CITY OF NEW YORK

DEPARTMENT OF PARKS & RECREATION

FLUSHING MEADOWS-CORONA PARK

OLMSTED CENTER

FLUSHING, NEW YORK

INFORMATION FOR BIDDERS,

SOLICITATION, CONTRACT

DOCUMENTS AND SPECIFICATIONS

BROOKLYN STREET TREE PLANTING FY27 - COMMUNITY BOARDS 6, 13
KNOWN AS CONTRACT BG-426M

NOTICE TO BIDDERS

Bidders should note that the Agency has made changes to specifications that differ from prior contracts used by the Agency

These include but are not limited to the following:

1) The Articles of this contract have been modified in several cases, with significant changes to ARTICLE 40, 42, and 48.

2) Tree bed preparation “by hand” items have been added

3) Tree bed expansion item has been modified to include decompaction

4) Watering has increased to 18 times per tree, see PLANTING TREES items

This Notice is given as a courtesy to potential bidders, and nothing in it or omitted from it shall bind the Agency or excuse the bidder from thorough review of and compliance with the Contract documents

NOTICE TO BIDDERS

Please be advised that Riders to the March 2017 New York City Standard Construction Contract regarding: (1) Certified Payroll Requirements, (2) Non-Compensable Delays and Grounds for Extension, (3) Paid Safe and Sick Leave Law, and (4) New York City Mayoral Executive Order No. 39 Rider – City Fleet and Truck Safety Requirements for City Contractors have been attached and incorporated in this Invitation for Bid and Contract Documents. Other than provisions specifically delineated in these Riders, all other terms of the March 2017 New York City Standard Construction Contract continue to apply in full force and effect.

RIDER TO NEW YORK CITY STANDARD CONSTRUCTION CONTRACT (MARCH 2017) REGARDING CERTIFIED PAYROLLS

[Instructions to Agencies: Please attach this Rider to the March 2017 version of the New York City Standard Construction Contract]

The following provisions supersede the corresponding provisions in the March 2017 version of the New York City Standard Construction Contract. Article 38 provides as follows:

ARTICLE 38. PAYROLL REPORTS

38.1 The **Contractor** and its **Subcontractor(s)** shall maintain the original payrolls or transcripts thereof which the **Contractor** and its **Subcontractor(s)** are required to maintain and shall submit such original payrolls or transcripts, subscribed and affirmed by it as true, within thirty (30) **Days** after issuance of its first payroll, and every thirty (30) **Days** thereafter, pursuant to Labor Law Section 220(3-a)(a)(iii), as modified by Labor Law Section 220-j. The **Contractor** and **Subcontractor(s)** shall submit such original payrolls or transcripts into the Electronic Certified Payroll Database (as hereinafter defined). If payment requisitions are not submitted at least once a month, the **Contractor** and its **Subcontractor(s)** shall submit original payrolls and transcripts both at the same time payment requisitions are submitted and independently of its payment requisitions. For purposes of this Article 38, "Electronic Certified Payroll Record Database" means the City's publicly accessible online database of electronic certified payroll records through which contractors and subcontractors submit certified payroll reports in an electronic format. The database is accessible at the following link: https://nyc-oti.ecomply.us/

38.2 The **Contractor** shall maintain payrolls or transcripts thereof for six (6) years from the date of completion of the **Work** on this **Contract**. If such payrolls and transcripts are maintained outside of New York City after the completion of the **Work** and their production is required pursuant to this Article 38, the **Contractor** shall produce such records in New York City upon request by the City.

38.3 The **Contractor** and **Subcontractor(s)** shall comply with any written order, direction, or request made by the **Engineer**, the **Commissioner**, the **ACCO**, the **Agency EAO**, the **Agency Labor Law Investigator(s)**, or the **Comptroller**, to provide to the requesting party any of the following information and/or records within five (5) **Days** of such written order, direction, or request:

38.3.1 Such original payrolls or transcripts thereof subscribed and affirmed by it as true and the statements signed by each worker pursuant to this Chapter VIII; and/or

38.3.2 Attendance sheets for each **Day** on which any employee of the **Contractor** and/or any of the **Subcontractor(s)** performed **Work** on the **Site**, which attendance sheet shall be in a form acceptable to the **Agency** and shall provide information acceptable to the **Agency** to identify each such employee; and/or

38.3.3 Any other information to satisfy the **Engineer**, the **Commissioner**, the **ACCO**, the **Agency EAO**, the **Agency Labor Law Investigator(s)** or the **Comptroller**, that this Chapter VIII and the Labor Law, as to the hours of employment and prevailing rates of wages and/or supplemental benefits, are being observed.

RIDER TO NEW YORK CITY STANDARD CONSTRUCTION CONTRACT (MARCH 2017) REGARDING NON-COMPENSABLE DELAYS AND GROUNDS FOR EXTENSION

[Instructions to Agencies: Please attach this Rider to the March 2017 version of the New York City Standard Construction Contract]

The following provisions supersede the corresponding provisions in the March 2017 version of the New York City Standard Construction Contract:

1. Section **11.5.1** provides as follows:

   11.5.1 The acts or omissions of public or government bodies (other than **City** agencies) or of any third parties who are disclosed in the **Contract Documents,** or those third parties who are ordinarily encountered or who are generally recognized as related to the **Work**, including but not limited to, **Other Contractors**, utilities or private enterprises;

2. Section **11.5.6** provides as follows:

   11.5.6 Climatic conditions, storms, floods, droughts, tidal waves, fires, hurricanes, earthquakes, landslides or other catastrophes or acts of God; acts of war or of the public enemy or terrorist acts; disruption, outage or power failure caused by a utility's inability or failure to provide service, pandemics, epidemics, outbreaks of infectious disease or any other public health emergency; other states of emergency declared by the City, State or Federal government , quarantine restrictions, and freight embargoes; including the **City's** reasonable responses to any of the above; and

3. Section **13.3** provides as follows:

   13.3 Grounds for Extension: If such application is made, the **Contractor** shall be entitled to an extension of time for delay in completion of the **Work** caused solely:

   13.3.1 By any of the acts or omissions of the **City**, its officials, agents or employees set forth in Articles **11.4.1.1** through **11.4.1.9**; or

   13.3.2 By or attributable to any of the items set forth in Articles **11.5.1** through **11.5.7**.

   13.3.3 The **Contractor** shall, however, be entitled to an extension of time for such causes only for the number of **Days** of delay which the **ACCO** or the Board may determine to be due solely to such causes, and then only if the **Contractor** shall have strictly complied with all of the requirements of Articles 9 and 10

NYC EARNED SAFE AND SICK TIME ACT CONTRACT RIDER

(To supersede Section 4.06 of the January 2018 Appendix A and Section 35.5 of the March 2017 Standard Construction Contract and to be attached to other City contracts and solicitations)

A. *Introduction and General Provisions.*

1. The Earned Safe and Sick Time Act ("ESSTA"), codified at Title 20, Chapter 8 of the New York City Administrative Code, also known as the "Paid Safe and Sick Leave Law," requires covered employees (as defined in Admin. Code § 20-912) in New York City ("City") to be provided with paid safe and sick time. Contractors of the City or of other governmental entities may be required to provide safe and sick time pursuant to the ESSTA. The ESSTA is enforced by the City's Department of Consumer and Worker Protection ("DCWP"), which has promulgated 6 RCNY §§ 7-101 and 201 *et seq*. ("DCWP Rules").

2. The Contractor agrees to comply in all respects with the ESSTA and the DCWP Rules, and as amended, if applicable, in the performance of this agreement. The Contractor further acknowledges that such compliance is a material term of this agreement and that failure to comply with the ESSTA in performance of this agreement may result in its termination.

3. The Contractor must notify (with a copy to DCWP at ComplianceMonitoring@dcwp.nyc.gov) the Agency Chief Contracting Officer of the City Agency or other entity with whom it is contracting in writing within 10 days of receipt of a complaint (whether oral or written) or notice of investigation regarding the ESSTA involving the performance of this agreement. Additionally, the Contractor must cooperate with DCWP's guidance and must comply with DCWP's subpoenas, requests for information, and other document demands as set forth in the ESSTA and the DCWP Rules. More information is available at https://www1.nyc.gov/site/dca/about/paid-sick-leave-what-employers-need-to-know.page.

4. Upon conclusion of a DCWP investigation, Contractor will receive a findings letter detailing any employee relief and civil penalties owed. Pursuant to the findings, Contractor will have the opportunity to settle any violations and cure the breach of this agreement caused by failure to comply with the ESSTA either i) without a trial by entering into a consent order or ii) appearing before an impartial judge at the City's administrative tribunal. In addition to and notwithstanding any other rights and remedies available to the City, non-payment of relief and penalties owed pursuant to a consent order or final adjudication within 30 days of such consent order or final adjudication may result in the termination of this agreement without further opportunity to settle or cure the violations.

5. The ESSTA is briefly summarized below for the convenience of the Contractor. The Contractor is advised to review the ESSTA and the DCWP Rules in their entirety. The Contractor may go to www.nyc.gov/PaidSickLeave for resources for employers, such as Frequently Asked Questions, timekeeping tools and model forms, and an event calendar of upcoming presentations and webinars at which the Contractor can get more information about how to comply with the ESSTA and the DCWP Rules. The Contractor acknowledges that it is responsible for compliance with the ESSTA and the DCWP Rules notwithstanding any inconsistent language contained herein.

B. *Pursuant to the ESSTA and DCWP Rules: Applicability, Accrual, and Use.*

1. An employee who works within the City must be provided paid safe and sick time.[1] Employers with one hundred or more employees are required to provide 56 hours of safe and sick time for an employee each calendar year. Employers with fewer than one hundred employees are required to provide 40 hours of sick leave each calendar year. Employers must provide a minimum of one hour of safe and sick time for every 30 hours worked by an employee and compensation for such safe and sick time must be provided at the greater of the employee's regular hourly rate or the minimum wage at the time the paid safe or sick time is taken. Employers are not discouraged or prohibited from providing more generous safe and sick time policies than what the ESSTA requires.

2. Employees have the right to determine how much safe and sick time they will use, provided that an employer may set a reasonable minimum increment for the use of safe and sick time not to exceed four hours per day. For the use of safe time or sick time beyond the set minimum increment, an employer may set fixed periods of up to thirty minutes beyond the minimum increment. In addition, an employee may carry over up to 40 or 56 hours of unused safe and sick time to the following calendar year, provided that no employer is required to carry over unused paid safe and sick time if the employee is paid for such unused safe and sick time and the employer provides the employee with at least the legally required amount of paid safe and sick time for such employee for the immediately subsequent calendar year on the first day of such calendar year.

3. An employee entitled to safe and sick time pursuant to the ESSTA may use safe and sick time for any of the following:

a. such employee's mental illness, physical illness, injury, or health condition or the care of such illness, injury, or condition or such employee's need for medical diagnosis or preventive medical care;

b. such employee's care of a family member (an employee's child, spouse, domestic partner, parent, sibling, grandchild, or grandparent, the child or parent of an employee's spouse or domestic partner, any other individual related by blood to the employee, and any other individual whose close association with the employee is the equivalent of a family relationship) who has a mental illness, physical illness, injury or health condition or who has a need for medical diagnosis or preventive medical care;

---

[1] Pursuant to the ESSTA, if fewer than five employees work for the same employer, and the employer had a net income of less than one million dollars during the previous tax year, such employer has the option of providing such employees uncompensated safe and sick time.

c. closure of such employee's place of business by order of a public official due to a public health emergency;

d. such employee's need to care for a child whose school or childcare provider has been closed due to a public health emergency; or

e. when the employee or a family member has been the victim of a family offense matter, sexual offense, stalking, or human trafficking:

1. to obtain services from a domestic violence shelter, rape crisis center, or other shelter or services program for relief from a family offense matter, sexual offense, stalking, or human trafficking;
2. to participate in safety planning, temporarily or permanently relocate, or take other actions to increase the safety of the employee or employee's family members from future family offense matters, sexual offenses, stalking, or human trafficking;
3. to meet with a civil attorney or other social service provider to obtain information and advice on, and prepare for or participate in any criminal or civil proceeding, including but not limited to, matters related to a family offense matter, sexual offense, stalking, human trafficking, custody, visitation, matrimonial issues, orders of protection, immigration, housing, discrimination in employment, housing or consumer credit;
4. to file a complaint or domestic incident report with law enforcement;
5. to meet with a district attorney's office;
6. to enroll children in a new school; or
7. to take other actions necessary to maintain, improve, or restore the physical, psychological, or economic, health or safety of the employee or the employee's family member or to protect those who associate or work with the employee.

4. An employer must not require an employee, as a condition of taking safe and sick time, to search for a replacement. However, where the employee's need for safe and sick time is foreseeable, an employer may require an employee to provide reasonable notice of the need to use safe and sick time. For an absence of more than three consecutive work days, an employer may require reasonable documentation that the use of safe and sick time was needed for a reason listed in Admin. Code § 20-914; and/or written confirmation that an employee used safe and sick time pursuant to the ESSTA. However, an employer may not require documentation specifying the nature of a medical condition, require disclosure of the details of a medical condition, or require disclosure of the details of a family offense matter, sexual offense, stalking, or human trafficking, as a condition of providing safe and sick time. Health information and information concerning family offenses, sexual offenses, stalking or human trafficking obtained solely due to an

employee's use of safe and sick time pursuant to the ESSTA must be treated by the employer as confidential. An employer must reimburse an employee for all reasonable costs or expenses incurred in obtaining such documentation for the employer.

5. An employer must provide to all employees a written policy explaining its method of calculating sick time, policies regarding the use of safe and sick time (including any permissible discretionary conditions on use), and policies regarding carry-over of unused time at the end of the year, among other topics. It must provide the policy to employees using a delivery method that reasonably ensures that employees receive the policy. If such employer has not provided its written policy, it may not deny safe and sick time to an employee because of non-compliance with such a policy.

6. An employer must provide a pay statement or other form of written documentation that informs the employee of the amount of safe/sick time accrued and used during the relevant pay period and the total balance of the employee's accrued safe/sick time available for use.

7. Safe and sick time to which an employee is entitled must be paid no later than the payday for the next regular payroll period beginning after the safe and sick time was used.

C. *Exemptions and Exceptions*. Notwithstanding the above, the ESSTA does not apply to any of the following:

1. an independent contractor who does not meet the definition of employee under N.Y. Labor Law § 190(2);

2. an employee covered by a valid collective bargaining agreement, if the provisions of the ESSTA are expressly waived in such agreement and such agreement provides a benefit comparable to that provided by the ESSTA for such employee;

3. an audiologist, occupational therapist, physical therapist, or speech language pathologist who is licensed by the New York State Department of Education and who calls in for work assignments at will, determines their own schedule, has the ability to reject or accept any assignment referred to them, and is paid an average hourly wage that is at least four times the federal minimum wage;

4. an employee in a work study program under Section 2753 of Chapter 42 of the United States Code;

5. an employee whose work is compensated by a qualified scholarship program as that term is defined in the Internal Revenue Code, Section 117 of Chapter 20 of the United States Code; or

6. a participant in a Work Experience Program (WEP) under N.Y. Social Services Law § 336-c.

D. *Retaliation Prohibited.* An employer shall not take any adverse action against an employee that penalizes the employee for, or is reasonably likely to deter the employee from or interfere with the employee exercising or attempting in good faith to exercise any right provided by the ESSTA. In addition, an employer shall not interfere with any investigation, proceeding, or hearing pursuant to the ESSTA.

E. *Notice of Rights.*

1. An employer must provide its employees with written notice of their rights pursuant to the ESSTA. Such notice must be in English and the primary language spoken by an employee, provided that DCWP has made available a translation into such language. Downloadable notices are available on DCWP's website at https://www1.nyc.gov/site/dca/about/Paid-Safe-Sick-Leave-Notice-of-Employee-Rights.page. The notice must be provided to the employees by a method that reasonably ensures personal receipt by the employee.

2. Any person or entity that willfully violates these notice requirements is subject to a civil penalty in an amount not to exceed $50.00 for each employee who was not given appropriate notice.

F. *Records*. An employer must retain records documenting its compliance with the ESSTA for a period of at least three years, and must allow DCWP to access such records in furtherance of an investigation related to an alleged violation of the ESSTA.

G. *Enforcement and Penalties.*

1. Upon receiving a complaint alleging a violation of the ESSTA, DCWP must investigate such complaint. DCWP may also open an investigation to determine compliance with the ESSTA on its own initiative. Upon notification of a complaint or an investigation by DCWP, the employer must provide DCWP with a written response and any such other information as DCWP may request. If DCWP believes that a violation of the ESSTA has occurred, it has the right to issue a notice of violation to the employer .

2. DCWP has the power to grant an employee or former employee all appropriate relief as set forth in Admin. Code § 20-924(d). Such relief may include, but is not limited to, treble damages for the wages that should have been paid; statutory damages for unlawful retaliation; and damages, including statutory damages, full compensation for wages and benefits lost, and reinstatement, for unlawful discharge. In addition, DCWP may impose on an employer found to have violated the ESSTA civil penalties not to exceed $500.00 for a first violation, $750.00 for a second violation within two years of the first violation, and $1,000.00 for each succeeding violation within two years of the previous violation. When an employer has a policy or practice of not providing or refusing to allow the use of safe and sick time to its employees, DCWP may seek penalties and relief on a per employee basis.

3. Pursuant to Admin. Code § 20-924.2, (a) where reasonable cause exists to believe that an employer is engaged in a pattern or practice of violations of the ESSTA, the Corporation Counsel may commence a civil action on behalf of the City in a court of competent jurisdiction by filing a complaint setting forth facts relating to such pattern or practice and requesting relief, which may include injunctive relief, civil penalties and any other appropriate relief. Nothing in § 20-924.2 prohibits DCWP from exercising its authority under section 20-924 or the Charter, provided that a civil action pursuant to § 20-924.2 shall not have previously been commenced.

H. *More Generous Polices and Other Legal Requirements*. Nothing in the ESSTA is intended to discourage, prohibit, diminish, or impair the adoption or retention of a more generous safe and sick time policy, or the obligation of an employer to comply with any contract, collective bargaining agreement, employment benefit plan or other agreement providing more generous safe and sick time. The ESSTA provides minimum requirements pertaining to safe and sick time and does not preempt, limit, or otherwise affect the applicability of any other law, regulation, rule, requirement, policy or standard that provides for greater accrual or use by employees of safe and sick leave or time, whether paid or unpaid, or that extends other protections to employees. The ESSTA may not be construed as creating or imposing any requirement in conflict with any federal or state law, rule or regulation.

New York City Mayoral Executive Order No. 39 Rider

City Fleet and Truck Safety Requirements for City Contractors

Version: 11/19/24

[Instruction to Agencies: Please attach this Rider to the following agreements: (1) Procurement Contracts that meet the criteria set forth in Executive Order 39 of February 1, 2024; and (2) to the March 2017 version of the New York City Standard Construction Contract.]

Section 1.01 Background

This rider is included in the Agreement and made a part thereof pursuant to the provisions of Mayoral Executive Order 39 of 2024.

Section 1.02 Definitions

A. Capitalized terms not otherwise defined in this rider shall have the meaning ascribed to them in the Agreement.

B. Agreement: The agreement between the City and the Contractor, to which this rider has been added and made a part.

C. City-contracted Vehicle means a Truck (as hereinafter defined) or any other motor vehicle that the Contractor anticipates providing in accordance with this Agreement or using in performing its obligations under this Agreement on a weekly or more frequent basis[1]. This includes those vehicles anticipated to be provided or used by subcontractors to fulfill the scope of a subcontract for work to be performed under a contract that is subject to the Executive Order, regardless of monetary value of the subcontract, if the vehicle is utilized on a weekly or more frequent basis.

D. Contracting Agency: the City agency or office through which the City of New York has entered into this Agreement.

[1] The following vehicles are not considered City-contracted vehicles and are thus not subject to Executive Order 39: any motor vehicle or truck that is utilized pursuant to (1) contracts registered prior to July 1, 2024, including the renewal, extension, or modification of such contracts; (2) an agency on-call emergency contract; (3) an emergency procurement made pursuant to section 3-06 of title 9 of the Rules of the City of New York or pursuant to an executive order of the Mayor or Governor issued under section 24 or section 29-A of the New York State Executive Law; (4) intergovernmental contracts; (5) government-to-government contracts between the City and any State or Federal government agency; and (6) a contract for utilities, as identified in subdivision (b) of section 825 of the New York City Charter.

E. Contractor: the entity providing services under this Agreement.

F. Executive Order: Mayoral Executive Order 39 of 2024, as it may be amended.

G. High Vision Truck: A Truck with a cab-over or cab-forward design wherein the driver sits in front of the front axle as opposed to conventional cab design wherein the engine and front axle are in front of the driver. The distance from the forward of the center of the vehicle bumper at which the driver can see the top of a 3-foot cone shall not exceed eight feet and the distance beyond the exterior of the passenger side door at which the driver can first see the top of the 4-foot cone shall not exceed six feet.

H. Registration: Registration of this Agreement pursuant to Section 328 of the New York City Charter.

I. Telematics: Automatic vehicle location systems that track vehicle location and speed and alert the driver and another designated person(s) to such location and speed in real time.

J. Truck: A City-contracted Vehicle with a manufacturer's gross vehicle weight rating exceeding 10,000 pounds. The term does not include off-road construction vehicles.

K. Truck Surround Cameras: A system of cameras, sensors, and alerts placed on a Truck that provides a Truck operator with a full view of all four sides of the Truck.

L. Vehicle Safety Plan: A plan with regard to City-contracted Vehicles, approved by the Contracting Agency, that includes the components listed in Section 2.03(A) through (F) of this rider.

Section 2.01 Vehicle Requirements

All City-contracted Vehicles shall conform to the following requirements:

A. Truck Surround Cameras: All Trucks, other than High Vision Trucks, shall be outfitted with truck surround cameras in accordance with the following schedule:
   a. Contracts involving 10 or fewer Trucks: No later than 12 months from Registration.
   b. Contracts involving more than 10 Trucks: No later than 18 months from Registration.
   c. New or replacement Truck acquired after work under this Agreement has begun: Truck must be outfitted with Truck Surround Cameras within 12 months from the date of first using such Truck.
   d. Contractor must submit to the Contracting Agency photographic and purchase order evidence, that is satisfactory to the Contracting Agency, of compliance with this Paragraph (A).

B. Truck Side-guards: Contractor shall provide side-guards for City-contracted Vehicles as applicable pursuant to Section 6-141 of the New York City Administrative Code.

C. Telematics: All City-contracted Vehicles must be installed with Telematics. Data gathered by Telematics must be made available in a manner that is satisfactory to the Contracting Agency.

Section 2.02 Safety Requirements

Contractor shall provide the following:

A. Licensing: Contractors shall ensure proper licensing for all drivers who operate City-contracted Vehicles. Contractors shall ensure that all drivers operating City-contracted Vehicles are enrolled in the New York State License Notification System (LENS) and that all out-of-state licenses are being monitored by Contractor. Contractor must notify the Contracting Agency of any license suspensions and/or arrests tied to unsafe or illegal vehicle operation by any drivers of City-contracted Vehicles.

B. Training: Contractor must provide the Contracting Agency documentation, satisfactory to the Contracting Agency, showing:
    a. That all drivers of City-contracted Vehicles have taken a New York State approved defensive driving class within six months after Registration; or
    b. That all drivers of City-contracted Vehicles have attended a New York State-approved defensive driving class within 3 years prior to Registration; or
    c. That all drivers of City-contracted Vehicles have received alternative safe driver training acceptable to the Contracting Agency that is documented to the satisfaction of the Contracting agency.

C. Crash tracking: Contractors must notify the Contracting Agency of any and all collisions that take place involving City-contracted Vehicles while performing services under this Agreement.

Section 2.03 Vehicle Safety Plan

Within one month after Registration, the Contractor must submit, for review and approval, to Contracting Agency, at the address set forth in the Agreement for notices to the City, and DCAS Fleet (C/O Chief Fleet Management Officer, 23rd Floor South, Municipal Building, 1 Centre Street, NY, NY 10007) a proposed vehicle safety plan that shall include at the minimum the components listed in Paragraphs (A) through (E) below. If directed by the Contracting Agency,

Contractor shall revise said proposed vehicle safety plan in accordance with the directions of the Contracting Agency, and until the Contracting Agency issues its approval thereof, Contractor shall submit a revised proposed vehicle safety plan to the Contracting Agency in each case, within 15 days after receipt by Contractor of directions to that effect from the Contracting Agency. Upon approval of the proposed vehicle safety plan, said proposed plan shall be considered the Vehicle Safety Plan and Contractor shall comply with the terms thereof. Each second anniversary of the approval of the Vehicle Safety Plan the Contractor shall submit an update thereof. The Vehicle Safety Plan shall include at the minimum the following components:

A. Vehicle List: List of City-contracted Vehicles, including the year, make, model, VIN and license plate number of each City-contracted Vehicle;

B. Safety Training: Documentation showing that all drivers of City-contracted Vehicles have completed the training detailed in section 2.02(B) of this Rider;

C. Technology: A list of all relevant technology investments installed on City-contracted vehicles, including but not limited to the technology listed in section 2.01 of this Rider;

D. Crash Tracking: An explanation of Contractor's process of monitoring and reviewing collisions including plans to notify Contracting Agency of collisions that take place while performing services under this Agreement;

E. Corrective Action: A corrective action program for drivers of City-contracted Vehicles that engage in unsafe or dangerous driving behaviors and license monitoring; and

F. Additional Safety Measures: Contractor must indicate if there are any additional safety technologies, safety practices, training, or other procedures that are utilized for City-contracted Vehicles during the term of this Agreement.

Section 3.01 Liquidated Damages

A. Contractor acknowledges that its failure to comply with the provisions of this Vehicle Safety Plan will cause loss and damage to the City, the precise extent of which is difficult to ascertain in monetary terms. For this reason, the parties desire to provide fair and reasonable compensation to the City for such losses, which compensation shall not be construed as a penalty. It is therefore agreed that, in addition to any other liquidated damages that the Contractor shall be required to pay to the City in accordance with the provisions of the Agreement, Contractor shall pay to the City the following:
    a. The sum of $500.00 for each instance of a failure by the Contractor to submit a Vehicle Safety Plan in accordance with the provisions of Section 2.03.

b. The sum of $500.00 for each instance of a failure by the Contractor to comply with the provisions of Section 2.02(A) [Licensing].
c. The sum of $500.00 for each instance of a failure by the Contractor to comply with the provisions of Section 2.02(B) [Training].
d. The sum of $500.00 for each instance of a failure by the Contractor to comply with the provisions of Section 2.02(C) [Crash Tracking].
e. The sum of $500.00 for each instance of a failure by the Contractor to comply with the provisions of Section 2.01(C) [Telematics].
f. The sum of $3,000 for each instance of a failure by the Contractor to comply with the provisions of Section 2.01(A).
g. The Contracting Agency will provide at least 5 working days of notice to the Contractor and opportunity to rectify before implementing these liquidated damages.

B. Liquidated damages received pursuant to this Agreement are not intended to be nor shall they be treated as either a partial or full waiver or discharge of the City's right to indemnification, or the Contractor's obligation to indemnify the City, or to any other remedy provided for in this Agreement or by Law. The City may deduct and retain out of the monies which may become due under this Agreement, the amount of any such liquidated damages; and in case the amount which may become due hereunder shall be less than the amount of liquidated damages suffered by the City, the Contractor shall be liable to pay the difference.

Pages 17-21 is intentionally blank.

City of New York Department of Parks & Recreation

Information for Bidders

1. DEFINITIONS

The definitions set forth in Chapter 1, Section 1-01(e) of the PPB Rules shall apply here. To obtain a copy of the PPB Rules from the Procurement Policy Board, visit www.nyc.gov/ppb

2. INVITATION FOR BID DOCUMENTS

(A) DOCUMENTS TO BE INCLUDED. Except for titles, subtitles, headings, running headlines, tables of contents and indices (which are printed herein merely for convenience) the following, except for portions that are specifically excluded, shall be deemed to be part of the Contract and the Invitation for Bids:

(1) The Advertisement and Proposal for Bids;
(2) Information for Bidders;
(3) The Bid;
(4) The Agreement;
(5) The Specifications;
(6) The General Conditions and Special Conditions, if any;
(7) The Contract Drawings, including any applicable Standard Details;
(8) All Addenda and/or Technical Clarifications issued by the Commissioner prior to the receipt of bids;
(9) All provisions required by law to be inserted in this Contract, whether actually inserted or not;
(10) The Notice of Award;
(11) Bid Security (as required in Schedule A);
(12) Performance and Payment Bonds (as required in Schedule A); and
(13) Notice to Proceed with Work.

(B) This Invitation for Bids ("solicitation" or "RFx") is released through PASSPort, New York City's online procurement portal. In PASSPort, an RFx is synonymous with the solicitation that will go out to vendors. Responses to this RFx must be submitted via PASSPort. Prospective bidders must create an account within PASSPort if they have not already done so. Please see attached document entitled "Instructions for Responding to RFx."

3. AGENCY CONTACT PERSON

If you have questions about the details of the solicitation (RFx), please contact the designated Agency Contact Person located within the View RFx tab in PASSPort.

4. EXAMINATION OF PROPOSED CONTRACT

(A) REQUEST FOR INTERPRETATION OR CORRECTION. Prospective bidders must examine the Contract Documents carefully and before bidding must request of the Commissioner via the Agency Contact Person in writing or by e-mail for an interpretation or correction of every

patent ambiguity, inconsistency, or error therein which should have been discovered by a reasonably prudent bidder no later than seven (7) days prior to the bid due time and date prescribed in the Contract. No verbal questions will be entertained.

Such interpretation or correction, as well as any additional Contract provisions the Commissioner may decide to include, will be issued in writing by the Commissioner as an addendum to the Contract. The addendum will be available as a document in the RFx tab in PASSPort and will also be posted on the Agency's website. Upon such posting, such addendum(s) shall become a part of the Contract Documents, and binding on all bidders, whether or not actual notice of the addendum is shown.

(B) ONLY THE COMMISSIONER'S INTERPRETATION OR CORRECTION BINDING. Only the written interpretation or correction given by the Commissioner shall be binding.

5. EXAMINATION AND VIEWING OF SITE AND CONSIDERATION OF OTHER SOURCES OF INFORMATION

All bidders must carefully view and examine the site of the proposed work and its adjacent area and seek other sources of information in order to satisfy themselves as to all general and local conditions that may affect the cost or performance of the Contract. Bidders will be conclusively presumed to have full knowledge of any conditions on, about, or above, the site relating to or affecting in any way the performance of the work to be done under the Contract which were or should have been indicated to a reasonably prudent bidder. In no event will a failure to inspect a site constitute grounds for withdrawal of a bid after opening or for a claim after award of the Contract.

6. PRE-BID CONFERENCE

If applicable, a pre-bid conference may be held. Details may be found in the View RFx tab in PASSPort.

Nothing stated at the pre-bid conference shall change the terms and/or conditions of the Invitation for Bids and Contract unless the change is made by written addendum, amendment, or technical clarification.

7. BIDDER'S AFFIRMATIONS AND DECLARATIONS

By submission of its bid, bidder affirms and declares, under penalty of perjury:

(A) That matters stated and information furnished therein, are in all aspects true. A materially false statement willfully or fraudulently made in connection with the bid or any of the forms completed and submitted with the bid may result in the termination of any Contract between the City and the bidder. A bidder making or causing to be made any false, deceptive, or fraudulent material statement in any bid, proposal, or application may be barred from participating in future City contracts as well as be subject to possible criminal prosecution.

(B) That the bidder, if an individual, is of lawful age. That the bidder is the only one interested in this bid; and that no person, firm, or organization other than herein above named has any interest in this bid, or in the contract proposed to be taken.

(C) That to the best of knowledge and belief:

(1) The prices in this bid have been arrived at independently without collusion, consultation, communication, or agreement for the purpose of restricting competition as to any matter relating to such process with any other bidder or with any competitor.

(2) Unless otherwise required by law, the prices which have been quoted in this bid have not been knowingly disclosed by the bidder prior to bid opening, directly or indirectly to any other bidder or to any competitor.

(3) No attempt has been made or will be made by the bidder to induce any other person, partnership, or corporation to submit or not to submit a bid for the purpose of restricting competition.

(4) That no councilperson or other officer or employee or person whose salary is payable in whole or in part from the City Treasury is directly or indirectly interested in this bid, or in the supplies, materials, equipment, work, or labor to which it relates, or in any of the profits thereof.

(5) Said bidder is not in arrears to the City of New York upon debt, contract or taxes and is not a defaulter, as surety or otherwise, upon obligation to the City of New York, and has not been declared not responsible, or disqualified, by any agency of the City of New York or State of New York, nor is there any proceeding pending relating to the responsibility or qualification of the bidder to receive public contracts except as indicated.

(D) That the bidder has inspected the site where the services are to be performed and is satisfied as to all general and local conditions that may affect the cost of performance of the contract.

(E) That the bidder has examined all parts of this Proposal for Bid, including but not limited to the Agreement and the terms and conditions thereof; and if the bid is accepted as submitted, the bidder shall execute the Agreement as set forth herein.

(F) That the bidder certifies that it is duly licensed to do business in the City and State of New York and holds or agrees to obtain all necessary permits required by law or regulation for the performance of the contract.

(G) That the bidder executes this document expressly warranting and representing that should this bid be accepted by the City and the contract awarded to it, the bidder and its subcontractors engaged in the performance of the contract will comply with the provisions of Section 6-109 of the Administrative Code of the City of New York in relation to minimum wages and other stipulations and the rules and regulations of the Procurement Policy Board adopted pursuant thereto as more expressly and in detail set forth in the contract form.

(H) That in the event of breach or violation of any of the foregoing, the bidder may be subject to damages, liquidated or otherwise, cancellation of the contract and suspension as a bidder for a period of three (3) years.

(I) That the bidder (1) represents that its attention has been specifically drawn to the Equal Employment Provisions of the Contract Agreement, and (2) warrants that it will comply with all the terms and provisions prescribed therein.

(J) That the bidder executes this document expressly warranting and representing that should this bid be accepted and the contract awarded to the bidder, the bidder and its subcontractors engaged in the performance (1) will comply with the provisions of Section 6-109 of the Administrative Code of the City of New York and the nondiscrimination provisions of Sections 220 and 239 of the New York Labor Law as more expressly and in detail set forth in the contract form; and (2) will post notices to be furnished by the City, setting forth the requirements of the aforesaid law in prominent and conspicuous places in each and every plant, factory, building and structure where employees engaged in the performance of the contract can readily view it, and will continue to keep such notices posted until the supplies, materials and equipment, or work, labor and services required by the Contractor have been finally accepted by the City.

8. IRREVOCABILITY OF BID

The prices set forth in the bid cannot be revoked and shall be effective until the award of the Contract unless the bid is withdrawn as provided for in Articles 11 and 14 below.

9. MATERIAL SAMPLES AND DESCRIPTIVE LITERATURE

The submission of bid samples and descriptive literature, regardless of any attempt by a bidder to condition the bid, will not be deemed to vary any of the provisions of this Contract.

10. PROPRIETARY INFORMATION / TRADE SECRETS

The bidder shall make clear the portions of the bid that it deems to be confidential, proprietary information or trade secrets, and must provide justification why such materials shall not be disclosed by the City. All materials the bidder desires to remain confidential shall be clearly indicated by stamping the pages on which such information appears, at the top and bottom thereof, with the word "Confidential," such that materials stamped "Confidential" must be easily separable from non-confidential sections of the bid.

All such materials shall be reviewed by the Agency and any decision not to honor a request for confidentiality shall be communicated in writing to the bidder. For those bids that are unsuccessful, all confidential materials shall be returned to the bidder. Prices, makes, and model or catalog numbers of the items offered, deliveries, and terms of payment shall be publicly available after bidding regardless of any designation of confidentiality made by the bidder.

11. PRE-OPENING MODIFICATION OR WITHDRAWAL OF BIDS

Bids may be modified or withdrawn before the due date and time.

- To withdraw your bid after submittal but before the due date and time, click on the "Manage Responses" tab of the RFx (in the PASSPort system) and click the red button to withdraw.
- To modify your bid after submittal but before the due date and time, use the "Duplicate Response" button of the RFx to create a copy of your submitted response. Edit as needed and submit. Then, click into the original response and click the red button to withdraw the response.

12. BID EVALUATION AND AWARD

In accordance with the New York City Charter, the PPB Rules and the terms and conditions of this Information for Bidders, this Contract shall be awarded, if at all, to the responsible bidder whose bid meets the requirements and evaluation criteria set forth in the Bid documents, and whose bid price is either the most favorable bid price or if the Bid documents so state the most favorable evaluated bid price. A bid may not be evaluated for any requirement or criterion that is not disclosed in the Bid documents.

Where an "Add Alternate" component is shown in the Bid documents, the Contract shall be awarded, if at all, to the responsible bidder whose bid meets the evaluation criteria set forth in the Bid documents, and whose bid price is either (1) the lowest base bid price, or (2) the lowest total bid price including base bid plus alternate(s). The Agency will decide which of these alternatives to choose. Pricing for the "add alternate" items shall be included in the Total Bid Price; only one bid submission is required.

If a Bidder submits multiple bids (and did not successfully withdraw a previously submitted bid), then the Agency will accept and consider the lowest bid only. All other bids submitted by the vendor shall not be accepted.

13. LATE BIDS, LATE WITHDRAWALS, AND LATE MODIFICATIONS

It is strongly recommended that Bidders complete and submit their bids in the PASSPort system, which includes entering information, uploading documents, and entering log-in credentials, at least 72 hours in advance of the Bid Due Date and Time.

Any bid received after the time and date set for receipt of bids is late and shall not be considered. The same applies to any request for withdrawal or modification received after the time and date set for receipt of bids, except as provided in Article 14.

The exception to this provision is that a late modification of a successful bid that makes the bid terms more favorable to the City shall be considered at any time it is received.

14. WITHDRAWAL OF BIDS

Except as provided for in Article 11 above, a bidder may not withdraw its bid before the expiration of forty-five (45) days after the date of the opening of bids; thereafter, a bidder may withdraw its bid only in writing and in advance of an actual award. If, within sixty (60) days after the Contract has been registered by the Comptroller's Office, the Commissioner fails to fix the date of commencement of work by written notice to the bidder, the bidder, at its option, may ask to be relieved of its obligation to perform the work called for by written notice to the Commissioner. If such notice is given and the request to withdraw is granted, the bidder waives all claims in connection with the Contract.

15. MISTAKES IN COMPETITIVE SEALED BIDS FOR PUBLIC PROJECTS

(A) MISTAKES DISCOVERED BEFORE BID OPENING. A bidder may correct mistakes discovered before the time and date set for bid opening by withdrawing or correcting the bid according to Article 11 above.

(B) MISTAKES DISCOVERED AFTER BID OPENING. In accordance with Procurement Policy Board Rules §3-02(m), where a unilateral non-judgmental error or mistake is discovered in a bid, such bid may be withdrawn only upon written approval of the Commissioner. If so withdrawn, the Contract shall either be awarded to the next lowest bidder or re-solicited pursuant to the PPB Rules.

16. LOW TIE BIDS

When two or more low responsive bids from responsible bidders are identical in price, meeting all the requirements and criteria set forth in the Invitation for Bids, the Commissioner will break the tie in the following manner and order of priority:

(A) Award to a certified New York City small, minority or woman-owned business entity bidder.

(B) Award to a New York City bidder.

(C) Award to a certified New York State small, minority, or woman-owned business entity bidder.

(D) Award to a New York State bidder.

(E) Conduct a drawing. The bidders shall be invited to witness the drawing. A witness shall be present to verify the drawing and shall certify the results on the bid tabulation sheet.

17. REJECTION OF BIDS

(A) REJECTION OF INDIVIDUAL BIDS. The Agency may reject a bid if:

(1) the bidder fails to furnish any of the information required pursuant to this solicitation; or if

(2) the bidder is determined to be non-responsible pursuant to the PPB Rules; or if

(3) the bid is determined to be non-responsive pursuant to the PPB Rules; or if

(4) the bid, in the opinion of the Commissioner, contains unbalanced bid prices and is thus non-responsive, unless the bidder can prove that the prices are not unbalanced for the probable required quantity of such items, or if the imbalance is corrected pursuant to Article 15; or if

(5) the bidder's higher bids, if multiple bids have been inadvertently submitted by the same bidder.

(B) REJECTION OF ALL BIDS. The Agency, upon written approval by the Agency Chief Contracting Officer, may reject all bids and may elect to re-solicit by bid or by other method authorized by the PPB Rules.

18. RIGHT TO APPEAL DETERMINATION OF NON-RESPONSIVENESS OR NON-RESPONSIBILITY AND RIGHT TO PROTEST SOLICITATIONS AND AWARD

The bidder has the right to appeal a determination of non-responsiveness or non-responsibility and has the right to protest a solicitation and award. For further information concerning these rights, the bidder is directed to Chapter 2 of the PPB Rules.

19. EQUAL EMPLOYMENT OPPORTUNITY

This Information for Bidders is subject to applicable provisions of Federal, State, and Local Laws and executive orders requiring equal employment opportunity.

20. PASSPORT

Procurement and Sourcing Solutions Portal (PASSPort) Disclosure Filing (formerly known as Vendor Information Exchange System (VENDEX) Forms or Certificate of No Change)

All organizations intending to do business with the City of New York must complete the disclosure process in order to be considered for award of a contract. This disclosure process was formerly completed using Vendor Information Exchange System (VENDEX) paper-based forms. The City of New York has now moved collection of vendor disclosure information online. In anticipation of awards, potential bidders must create online accounts in the new Procurement and Sourcing Solutions Portal (PASSPort) and file all disclosure information. Paper submissions, including certifications of no changes to existing VENDEX packages will not be accepted in lieu of complete online filings. Any reference to VENDEX in the Information for Bidders should be deemed to be a reference to PASSPort; the VENDEX questionnaire included herein no longer applies and will not be accepted by the Mayor's Office of Contract Services.

For more information about PASSPort, please visit www.nyc.gov/passport

21. AUDIT BY COMPTROLLER

The New York City Comptroller is charged with the audit of Contracts in New York City. Any vendor who believes that there has been unfairness, favoritism, or impropriety in the bid process should inform the Comptroller, Office of Contract Administration, One Centre Street, New York, New York.

22. BID, PERFORMANCE AND PAYMENT SECURITY

(A) BID SECURITY. Each bid must be accompanied by bid security in an amount and type specified in Schedule A. The bid security shall assure the City of New York of the adherence of the bidder to its proposal, the execution of the Contract, and the furnishing of Performance and Payment Bonds by the bidder, if such Payment and Performance bonds are required in Schedule A.

(B) PERFORMANCE AND PAYMENT SECURITY. If required by Schedule A, the successful bidder shall, prior to or at the time of execution of the Contract, deliver to the Agency Contact Person payment and performance security in a form prescribed herein. If a Contractor fails to deliver the required payment and performance security, the award shall be rescinded, bid security enforced, and award of the Contract may be made to the next lowest responsive and responsible bidder, or the Contract may be re-bid.

(C) ACCEPTABLE SECURITY. Acceptable security for bids, performance and payment, shall be limited to:

(1) A one-time bond issued and maintained by a company with an A.M. Best rating of at least A-/VII or a Standard and Poor's rating of at least A in the form provided in the Bid Documents;

(2) A bank certified check or money order;

(3) City Bonds; or

(4) Other financial instruments as determined by the Mayor's Office of Contract Services in consultation with the Comptroller.

(D) FORM OF BONDS. Security provided in the form of bonds must be prepared on the form of bonds authorized by the City of New York. Forms for bid, performance, and payment bonds are included in the Invitation for Bids Documents. Such bonds must have as surety thereunder such surety company or companies as are: (1) approved by the City of New York; (2) authorized to do business in the State of New York, and (3) approved by the Department of the Treasury of the United States. Premiums for any required bonds must be included in the base bid.

The bidder is advised that submission of a bid bond where the surety on such bond fails to meet the criteria set forth herein, shall result in the rejection of the bid as non-responsive.
The Department of the Treasury of the United States advises that information concerning approved surety companies may be obtained as follows: (1) from the Government Printing Office at 215-364-6465; (2) through the Internet at https://www.fiscal.treasury.gov/surety-bonds/.

(E) POWER OF ATTORNEY. Attorneys in fact who sign bid, performance, or payment bonds must file with each bond a certified copy of their power of attorney to sign said bonds.

23. FAILURE TO EXECUTE CONTRACT AND FURNISH SECURITY

In the event of failure of the successful bidder to execute the Contract and furnish the required security within ten (10) days after notice of the award of the Contract, the deposit of the successful bidder shall be retained by the City, and the successful bidder shall be liable for and hereby agrees to pay on demand the difference between the price bid and the price for which such Contract shall be subsequently re-let, including the cost of this re-letting and less the amount of such deposit. No claim of mistake in such accepted bid shall be available to the bidder for the recovery of the deposit or as a defense to any action based upon such accepted bid. If the bidder fails to comply with this Article, any funding agency, body, or group (Federal, State, City, Public, Private, etc.) may terminate, cancel, or reduce the funding on this project. The bidder in such an event shall be liable also to the City for the amount of actual funding withdrawn by such agency on this project less the amount of the forfeited deposit.

24. BIDDER QUALIFICATIONS

(A) EXPERIENCE. The bidder must, within the last three (3) consecutive years prior to the bid opening, have recently completed as a prime contractor at least one (1) project of similar size, scope and complexity for a NYC agency, public authority, or jurisdiction with similar regulatory requirements.

For projects under $1,500,000.00, one of the following may, at the discretion of the Agency Chief Contracting Officer, constitute sufficient experience in lieu of the requirement above:

- The bidder's substantial experience completing multiple subcontracts in the last three (3) years of a similar size, scope and complexity for a NYC agency, public authority, or jurisdiction with similar regulatory requirements, or

- The principal's and officers' substantial experience completing multiple prime contracts of a similar size, scope and complexity for a NYC agency, public authority, or jurisdiction with similar regulatory requirements in the last five (5) years, while such principals and officers held significant management roles in the prior entity or entities.

Bidders seeking award of multiple contracts, or of a single contract whose term may coincide with the bidder's other active contracts, must demonstrate, within the last five (5) consecutive years prior to the bid opening, a history of successfully conducting and completing multiple simultaneous projects of similar number, size, scope, and complexity as a prime contractor for a NYC agency, public authority, or jurisdiction with similar regulatory requirements to the active project(s) and project(s) being bid.

Bidders with experience completing multiple similar projects must demonstrate that, within the last five (5) years, all such projects were completed successfully, as evidenced by performance evaluations, professional references, and other information and records as requested by the Agency Chief Contracting Officer.

In the event the bidder is a joint venture, at least one firm in the joint venture must meet the above-described experience requirement. Additionally, the prior experience of a joint venture may fulfill the requirements of this section for an individual member of the joint venture. In either case, the Agency may exclude prior experience from consideration under this section if, in the judgment of the Agency Chief Contracting Officer, its participation in either the past or proposed joint venture is minor, insufficient, imbalanced, or nominal.

Bidders must include with their bids all information necessary for a determination of bidder responsibility as set forth in the Contract Documents.

(B) BIDDER'S RECORDS. The Agency may require any bidder or prospective bidder to furnish all books of account, records, vouchers, statements, or other information concerning the bidder's financial status for examination as may be required by the Agency to ascertain the bidder's responsibility and capability to perform the contract. If required, a bidder must also submit a sworn statement setting forth such information as the Agency may require concerning present and proposed plant and equipment, the personnel and qualifications of his working organizations, prior experience, and performance record.

(C) ORAL EXAMINATION ON QUALIFICATIONS. In addition thereto, and when directed by the Agency, the bidder, or a responsible officer, agent, or employee of the bidder, must submit to an oral examination to be conducted by the Agency in relation to his proposed tentative plan and schedule of operations, and such other matters as the Agency may deem necessary in order to determine the bidder's ability and responsibility to perform the work in accordance with the Contract.

(D) FAILURE TO SUPPLY INFORMATION. If the bidder fails or refuses to supply any of the documents or information set forth in paragraph (A) hereof or fails to comply with any of the requirements thereof, the Agency may reject the bid.

25. EMPLOYMENT REPORTS (BUREAU OF LABOR SERVICES)

In accordance with Executive Order No. 50 as amended, the filing of a completed Employment Report (ER) is a requirement of doing business with the City of New York for construction contractors with contracts of $1,000,000 or more and subcontractors with construction subcontracts of $750,000 or more. The required forms and information are available from the NYC Small Business Services at https://www.nyc.gov/site/sbs/businesses/contract-compliance.page

26. LABOR LAW REQUIREMENTS

The successful bidder will be required to comply strictly with all Federal, State, and local labor laws and regulations, including but not limited to providing on-the job training opportunities and payment of prevailing wages.

All requests for clarification of the classification of trades required to be employed in the performance of the work under this Contract shall be directed to the Commissioner, in writing, at least 48 hours prior to bid opening.

In the event that a trade not listed in the classification of trades required to be used at the time of the award of the Contract is in fact employed during the performance of this Contract, the Contractor shall be required to obtain from this Agency the prevailing wage rates and supplementary benefits for the trades used and to complete the performance of this Contract at the price at which the Contract was awarded.

27. INSURANCE

Bidders are advised that the insurance requirements contained herein are regarded as a material term of this Contract. The insurance shall be maintained during the Contract. The Contractor shall maintain insurance in compliance with Schedule A for any work performed under the guarantee requirements of the Contract.

The Contractor must procure and maintain insurance with companies authorized to do business in the State of New York, the types and amounts of insurance specified in and described in the Agreement, Article 22 and General Conditions, Section C – Special Provisions, Article 3, Schedule A.

Pursuant to Section 57 of the New York State Worker's Compensation Law, the bidders must submit proof of worker's compensation and disability benefits coverage to this Agency prior to the execution of any Contract resulting from this solicitation. All other required insurance documentation must also be submitted prior to execution of this Contract.

28. LUMP SUM CONTRACTS

Bids on Lump Sum Contracts will be compared on the basis of the lump sum price bid and adjusted for alternate prices bid, if any.

29. UNIT PRICE CONTRACTS

(A) COMPARISON OF BIDS. Bids on Unit Price Contracts will be compared on the basis of total estimated price, arrived at by taking the sum of the estimated quantities of such items multiplied by the corresponding unit prices, and including any lump sum bids on individual items, in accordance with the Engineer's Estimate of Quantities set forth in the bid schedule.

A bid may be deemed non-responsive when it does not contain a unit price corresponding with each item for which there is a quantity exhibited in the bid. The unit price, item total and bid total(s) shall be indicated in figures.

(B) VARIATIONS FROM ENGINEER'S ESTIMATE. The bid schedule indicates the Agency's estimated quantity for each item of Work. The Contractor shall have no basis for claims or damages for any variation between the estimated quantity advertised for bid and the final quantity of any item. The Contractor agrees to provide overruns in accordance with Article 26 – Methods of Payment for Overruns and Extra Work.

30. MULTIPLE PRIME CONTRACTORS

If more than one prime Contractor will be involved on this Project, all Contractors are required to examine the solicitations for all other parts of the Project.

31. BID SUBMISSION REQUIREMENTS

The following must be completed and submitted in order for the Bid to be considered responsive:

(A) Completed electronic bid submission in PASSPort.

(1) All required fields in PASSPort must be completed.

(B) Bid Security (also see Article 22).

(1) If Bid Security is in the form of a bid bond, bidders must include it with their electronic PASSPort submission.

(2) If Bid Security is in the form of a certified check, bidders must physically deliver the certified check to the Agency before the bid due date and time. (Please see the project's RFx questionnaire in PASSPort for specific address and instructions.)

The following may result in the Bid being found non-responsive:

(A) Any discrepancy between the total bid price included in the project's RFx Item tab in PASSPort and the total bid price on the Bid Item Prices Excel file uploaded to the Questionnaire tab.

(B) Failure to upload required files or documents as part of a mandatory PASSPort Questionnaire response.

(C) Uploading an incorrect file as part of a mandatory PASSPort Questionnaire response.

Bid submissions received outside of the PASSPort system will not be considered.

32. COMPTROLLER'S CERTIFICATE

This Contract shall not be binding or of any force unless the Comptroller of the City endorses hereon his certificate that there remains unexpended and unapplied, as provided in Section 6-101 of the Administrative Code of the City of the New York, a balance of the appropriation of funds applicable thereto sufficient to pay the estimated expense of executing this Contract as certified by the officer making the same. This Contract shall continue in force only after annual appropriation of funds by the City of New York and certification as herein above set forth.

33. PROCUREMENT POLICY BOARD (PPB) RULES

This Information for Bidders is subject to the latest edition of the PPB Rules. In the event of a conflict between the PPB Rules and any provision of this Invitation for Bids, the PPB Rules shall take precedence.

34. COMPLIANCE WITH THE AMERICANS WITH DISABILITIES ACT

This Invitation for Bids is subject to Title II of the Americans with Disabilities Act of 1990 ("ADA") and regulations promulgated pursuant thereto which prohibits discrimination against individuals with a disability, as defined in the ADA, by a public entity in providing services, programs, or activities to the public.

35. PRICING

(A) The Contractor shall, whenever required during the Contract, including but not limited to the time of bidding, submit cost or pricing data, and formally certify that, to the best of its knowledge and belief, the cost or pricing data submitted was accurate, complete, and current as of a specified date. The Contractor shall be required to keep its submission of cost and pricing data current until the Contract has been completed.

(B) The price of any change order or Contract modification subject to the conditions of paragraph (A) shall be adjusted to exclude any significant sums by which the City finds that such price was based on cost or price data furnished by the supplier, which was inaccurate, incomplete, or not current as of the date agreed upon between the parties.

(C) TIME FOR CERTIFICATION. The Contractor must certify that cost or pricing data submitted are accurate, complete, and current as of a mutually determined date.

(D) REFUSAL TO SUBMIT DATA. When any Contractor refuses to submit the required data to support a price, the Contracting Officer shall not allow the price.

(E) CERTIFICATE OF CURRENT COST OR PRICING DATA. In those cases when cost or pricing data is required, such certification shall be retained in the Agency Contract file.

36. CHANGED CONDITIONS

Should the Contractor encounter during the progress of the work subsurface conditions at the site materially differing from any shown on the Contract Drawings or indicated in the specifications or such subsurface conditions as could not reasonably have been anticipated by the Contractor and were not anticipated by the City, which conditions will materially affect the cost of the work to be

done under the Contract, the attention of the Commissioner must be called immediately to such conditions before they are disturbed. The Commissioner shall thereupon promptly investigate the conditions. If he finds that they do so materially differ, or that they could not reasonably have been anticipated by the Contractor and were not anticipated by the City, the Contract may be modified with his written approval.

37. UPFRONT CAPITAL LOAN

The New York City Department of Small Business Services (SBS), in conjunction with the New York Business Development Corporation (NYBDC), has established a **NYC Construction Loan** pilot program to provide prime contractors and subcontractors financing for mobilization costs on certain City construction projects.

Under this initiative, loans are available for early-stage mobilization needs such as insurance, labor, supplies, and equipment. Bidders are strongly encouraged to visit "Growing Your Business" at www.nyc.gov/nycbusiness to learn more about the loan or contact constructionloan@sbs.nyc.gov / (212) 513-6444 to obtain details and to determine preliminary eligibility.

A successful loan applicant will be required to make an assignment of its Contract (or Subcontract) payments to the lender NYBDC until the loan is repaid. If the loan is to a Subcontractor, a prime contractor must honor the terms of such an assignment.

A prime contractor may not discriminate against a Subcontractor or potential Subcontractor by reason of the Subcontractor's participation, or nonparticipation, in the NYC Construction Loan program.

38. BOND GUARANTEE PROGRAM

The City of New York has revised the form of the performance bond that is required for City construction Contracts that exceed $5 million. The form of bond required for Contracts that do not exceed $5 million has not changed. The City's payment bond remains unchanged.

The bond form for Contracts that do not exceed $5 million has been approved by the U.S. Small Business Administration ("SBA") for participation in their Bond Guarantee Program. The SBA's Bond Guarantee Program enables small businesses to obtain or increase bonding by having the SBA act as a partial guarantor of the contractor to the surety. For information concerning the SBA program, including current limits on what size contracts are eligible for participation in the program, go to www.sba.gov/osg. If you are interested in participating in this program, we suggest that you contact your broker or SBA.

In order to maximize participation by small businesses in the SBA Guarantee Program, the City also encourages prime Contractors who are awarded Contracts greater than $5 million to allow their Subcontractors to use the SBA-approved form, particularly on Contracts that are subject to the M/WBE program, if the prime Contractor requires Subcontractors to obtain performance bonds.

NOTICE TO ALL PROSPECTIVE CONTRACTORS

PARTICIPATION BY MINORITY-OWNED AND WOMEN-OWNED BUSINESS ENTERPRISES IN CITY PROCUREMENT

ARTICLE I. M/WBE PROGRAM

Section 6-129 of the Administrative Code of the City of New York ("Section 6-129") establishes the program for participation in City procurement ("M/WBE Program") by minority-owned business enterprises ("MBEs") and women-owned business enterprises ("WBEs"), certified in accordance with Section 1304 of the New York City Charter. As stated in Section 6-129, the intent of the program is to address the impact of discrimination on the City's procurement process, and to promote the public interest in avoiding fraud and favoritism in the procurement process, increasing competition for City business, and lowering contract costs. The contract provisions contained herein are pursuant to Section 6-129, and the rules of the Department of Small Business Services ("DSBS") promulgated thereunder.

If this Contract is subject to the M/WBE Program established by Section 6-129, the specific requirements of MBE and/or WBE participation for this Contract are set forth in Schedule B of the Contract (entitled the "M/WBE Utilization Plan") and are detailed below. Contracts solicited through the Procurement and Sourcing Solutions Portal (PASSPort) will contain a Schedule B in the format outlined in the Schedule B – M/WBE Utilization Plan & PASSPort rider. The provisions of this notice will apply to contracts subject to the M/WBE Program established by Section 6-129 regardless of solicitation source.

The Contractor must comply with all applicable MBE and WBE requirements for this Contract.

All provisions of Section 6-129 are hereby incorporated in the Contract by reference and all terms used herein that are not defined herein shall have the meanings given such terms in Section 6-129.

References to MBEs or WBEs shall also include such businesses certified pursuant to the executive law where credit is required by section 311 of the New York City Charter or other provision of law.

Article I, Part A, below, sets forth provisions related to the participation goals for construction, standard and professional services contracts.

Article I, Part B, below, sets forth miscellaneous provisions related to the M/WBE Program.

PART A

PARTICIPATION GOALS FOR CONSTRUCTION, STANDARD AND PROFESSIONAL SERVICES CONTRACTS OR TASK ORDERS

1. The **MBE and/or WBE Participation Goals** established for this Contract or Task Orders issued pursuant to this Contract, ("**Participation Goals**"), as applicable, are set forth on Schedule B, Part 1 to this Contract (see Page 1, Line 1 Total Participation Goals) or will be set forth on Schedule B, Part 1 to Task Orders issued pursuant to this Contract, as applicable.

The **Participation Goals** represent a percentage of the total dollar value of the Contract or Task Order, as applicable, that may be achieved by awarding subcontracts to firms certified with DSBS as MBEs and/or WBEs, and/or by crediting the participation of prime contractors and/or qualified joint ventures as provided in Section 3 below, unless the goals have been waived or modified by Agency in accordance with Section 6-129 and Part A, Sections 10 and 11 below, respectively.

2. If **Participation Goals** have been established for this Contract or Task Orders issued pursuant to this Contract, Contractor agrees or shall agree as a material term of the Contract that Contractor shall be subject to the **Participation Goals**, unless the goals are waived or modified by Agency in accordance with Section 6-129 and Part A, Sections 10 and 11 below, respectively.

3. If **Participation Goals** have been established for this Contract or Task Order issued pursuant to this Contract, a Contractor that is an MBE and/or WBE shall be permitted to count its own participation toward fulfillment of the relevant **Participation Goal**, provided that in accordance with Section 6-129 the value of Contractor's participation shall be determined by subtracting from the total value of the Contract or Task Order, as applicable, any amounts that the Contractor pays to direct subcontractors (as defined in Section 6-129(c)(13)), and provided further that a Contractor that is certified as both an MBE and a WBE may count its own participation either toward the goal for MBEs or the goal for WBEs, but not both.

A Contractor that is a qualified joint venture (as defined in Section 6-129(c)(30)) shall be permitted to count a percentage of its own participation toward fulfillment of the relevant **Participation Goal**. In accordance with Section 6-129, the value of Contractor's participation shall be determined by subtracting from the total value of the Contract or Task Order, as applicable, any amounts that Contractor pays to direct subcontractors, and then multiplying the remainder by the percentage to be applied to total profit to determine the amount to which an MBE or WBE is entitled pursuant to the joint venture agreement, provided that where a participant in a joint venture is certified as both an MBE and a WBE, such amount shall be counted either toward the goal for MBEs or the goal for WBEs, but not both.

4. A. If **Participation Goals** have been established for this Contract, a prospective contractor shall be required to submit with its bid or proposal, as applicable, a completed Schedule B, M/WBE Utilization Plan, Part 2 (see Pages1-2) indicating: (a) whether the contractor is an MBE or WBE, or qualified joint venture; (b) the percentage of work it intends to award to direct subcontractors; (c) in cases where the contractor intends to award direct subcontracts, a description of the type and dollar value of work designated for participation by

MBEs and/or WBEs, and the time frames in which such work is scheduled to begin and end; as well as the name, addresses, and telephone numbers of the M/WBE subcontractors if required by the solicitation; and (d) the prospective contractor's required certification and affirmations. In the event that this M/WBE Utilization Plan indicates that the bidder or proposer, as applicable, does not intend to meet the **Participation Goals**, the bid or proposal, as applicable, shall be deemed non-responsive, unless Agency has granted the bidder or proposer, as applicable, a pre-award waiver of the **Participation Goals** in accordance with Section 6-129 and Part A, Section 10 below.

B. (i) If this Contract is for a master services agreement or other requirements type contract that will result in the issuance of Task Orders that will be individually registered ("Master Services Agreement") and is subject to M/WBE **Participation Goals**, a prospective contractor shall be required to submit with its bid or proposal, as applicable, a completed Schedule B, M/WBE Participation Requirements for Master Services Agreements That Will Require Individually Registered Task Orders, Part 2 (page 2) indicating the prospective contractor's certification and required affirmations to make all reasonable good faith efforts to meet participation goals established on each individual Task Order issued pursuant to this Contract, or if a partial waiver is obtained or such goals are modified by the Agency, to meet the modified **Participation Goals** by soliciting and obtaining the participation of certified MBE and/or WBE firms. In the event that the Schedule B indicates that the bidder or proposer, as applicable, does not intend to meet the **Participation Goals** that may be established on Task Orders issued pursuant to this Contract, the bid or proposal, as applicable, shall be deemed non-responsive.

(ii) **Participation Goals** on a Master Services Agreement will be established for individual Task Orders issued after the Master Services Agreement is awarded. If **Participation Goals** have been established on a Task Order, a contractor shall be required to submit a Schedule B – M/WBE Utilization Plan For Independently Registered Task Orders That Are Issued Pursuant to Master Services Agreements, Part 2 (see Pages 1-2) indicating: (a) whether the contractor is an MBE or WBE, or qualified joint venture; (b) the percentage of work it intends to award to direct subcontractors; (c) in cases where the contractor intends to award direct subcontracts, a description of the type and dollar value of work designated for participation by MBEs and/or WBEs, and the time frames in which such work is scheduled to begin and end; as well as the name, addresses, and telephone numbers of the M/WBE subcontractors if required by the solicitation; and (d) the prospective contractor's required certification and affirmations. The contractor must engage in good faith efforts to meet the **Participation Goals** as established for the Task Order unless Agency has granted the contractor a pre-award waiver of the **Participation Goals** in accordance with Section 6-129 and Part A, Section 10 below.

C. THE BIDDER/PROPOSER MUST COMPLETE THE SCHEDULE B INCLUDED HEREIN (SCHEDULE B, PART 2). A SCHEDULE B SUBMITTED BY THE BIDDER/PROPOSER WHICH DOES NOT INCLUDE THE VENDOR CERTIFICATION AND REQUIRED AFFIRMATIONS WILL BE DEEMED TO BE NON-RESPONSIVE, UNLESS A FULL WAIVER OF THE PARTICIPATION GOALS IS GRANTED (SCHEDULE B, PART 3). IN THE EVENT THAT THE CITY DETERMINES THAT THE BIDDER/PROPOSER HAS SUBMITTED A SCHEDULE B WHERE THE VENDOR CERTIFICATION AND REQUIRED AFFIRMATIONS ARE COMPLETED BUT OTHER ASPECTS OF THE SCHEDULE B ARE NOT COMPLETE, OR CONTAIN A COPY OR COMPUTATION ERROR THAT IS AT ODDS WITH THE

VENDOR CERTIFICATION AND AFFIRMATIONS, THE BIDDER/PROPOSER WILL BE NOTIFIED BY THE AGENCY AND WILL BE GIVEN FOUR (4) CALENDAR DAYS FROM RECEIPT OF NOTIFICATION TO CURE THE SPECIFIED DEFICIENCIES AND RETURN A COMPLETED SCHEDULE B TO THE AGENCY. FAILURE TO DO SO WILL RESULT IN A DETERMINATION THAT THE BID/PROPOSAL IS NON-RESPONSIVE. RECEIPT OF NOTIFICATION IS DEFINED AS THE DATE NOTICE IS E-MAILED OR FAXED (IF THE BIDDER/PROPOSER HAS PROVIDED AN E-MAIL ADDRESS OR FAX NUMBER), OR NO LATER THAN FIVE (5) CALENDAR DAYS FROM THE DATE OF MAILING OR UPON DELIVERY, IF DELIVERED.

5. Where an **M/WBE** Utilization Plan has been submitted, the Contractor shall, within 30 days of issuance by Agency of a notice to proceed, submit a list of proposed persons or entities to which it intends to award subcontracts within the subsequent 12 months. In the case of multi-year contracts, such list shall also be submitted every year thereafter. The Agency may also require the Contractor to report periodically about the contracts awarded by its direct subcontractors to indirect subcontractors (as defined in Section 6-129(c)(22)). **PLEASE NOTE: If this Contract is a public works project subject to GML §101(5) (i.e., a contract valued at or below $3M for projects in New York City) or if the Contract is subject to a project labor agreement in accordance with Labor Law §222, and the bidder is required to identify at the time of bid submission its intended subcontractors for the Wicks trades (plumbing and gas fitting; steam heating, hot water heating, ventilating and air conditioning (HVAC); and electric wiring), the Contractor must identify all those to which it intends to award construction subcontracts for any portion of the Wicks trade work at the time of bid submission, regardless of what point in the life of the contract such subcontracts will occur. In identifying intended subcontractors in the bid submission, bidders may satisfy any Participation Goals established for this Contract by proposing one or more subcontractors that are MBEs and/or WBEs for any portion of the Wicks trade work.** In the event that the Contractor's selection of a subcontractor is disapproved, the Contractor shall have a reasonable time to propose alternate subcontractors.

6. MBE and WBE firms must be certified by DSBS in order for the Contractor to credit such firms' participation toward the attainment of the **Participation Goals**. Such certification must occur prior to the firms' commencement of work. A list of city-certified MBE and WBE firms may be obtained from the DSBS website at www.nyc.gov/buycertified, by emailing DSBS at buyer@sbs.nyc.gov, by calling (212) 513-6451, or by visiting or writing DSBS at One Liberty Plaza, New York, New York, 10006, 11th floor. Eligible firms that have not yet been certified may contact DSBS in order to seek certification by visiting www.nyc.gov/getcertified, emailing MWBE@sbs.nyc.gov, or calling the DSBS certification helpline at (212) 513-6311. A firm that is certified as both an MBE and a WBE may be counted either toward the goal for MBEs or the goal for WBEs, but not both. No credit shall be given for participation by a graduate MBE or graduate WBE, as defined in Section 6-129(c)(20).

7. Where an **M/WBE** Utilization Plan has been submitted, the Contractor shall, with each voucher for payment, and/or periodically as Agency may require, submit statements, certified under penalty of perjury, which shall include, but not be limited to,: the total amount the Contractor paid to its direct subcontractors, and, where applicable pursuant to Section 6-129(j), the total amount direct subcontractors paid to indirect subcontractors; the names, addresses and contact numbers of each MBE or WBE hired as a subcontractor by the Contractor, and, where

applicable, hired by any of the Contractor's direct subcontractors; and the dates and amounts paid to each MBE or WBE. The Contractor shall also submit, along with its voucher for final payment: the total amount it paid to subcontractors, and, where applicable pursuant to Section 6-129(j), the total amount its direct subcontractors paid directly to their indirect subcontractors; and a final list, certified under penalty of perjury, which shall include the name, address and contact information of each subcontractor that is an MBE or WBE, the work performed by, and the dates and amounts paid to each.

8. If payments made to, or work performed by, MBEs or WBEs are less than the amount specified in the Contractor's **M/WBE** Utilization Plan, Agency shall take appropriate action, in accordance with Section 6-129 and Article II below, unless the Contractor has obtained a modification of its **M/WBE** Utilization Plan in accordance with Section 6-129 and Part A, Section 11 below.

9. Where an **M/WBE** Utilization Plan has been submitted, and the Contractor requests a change order the value of which exceeds the greater of 10 percent of the Contract or Task Order, as applicable, or $500,000, Agency shall review the scope of work for the Contract or Task Order, as applicable, and the scale and types of work involved in the change order, and determine whether the **Participation Goals** should be modified.

10. Pre-award waiver of **the Participation Goals**. (a) A bidder or proposer, or contractor with respect to a Task Order, may seek a pre-award full or partial waiver of the Participation Goals in accordance with Section 6-129, which requests that Agency change one or more **Participation Goals** on the grounds that the **Participation Goals** are unreasonable in light of the availability of certified firms to perform the services required, or by demonstrating that it has legitimate business reasons for proposing a lower level of subcontracting in its M/WBE Utilization Plan.

(b) To apply for a full or partial waiver of the **Participation Goals**, a bidder, proposer, or contractor, as applicable, must complete Part 3 of Schedule B **and submit such request no later than seven (7) calendar days prior to the date and time the bids, proposals, or Task Orders are due, in writing to the Agency Contact Person listed in Schedule B, Part 1**. **Full or partial waiver requests that are received later than seven (7) calendar days prior to the date and time the bids, proposals, or Task Orders are due may be rejected as untimely**. Bidders, proposers, or contractors, as applicable, who have submitted timely requests will receive an Agency response by no later than two (2) calendar days prior to the due date for bids, proposals, or Task Orders; provided, however, that if that date would fall on a weekend or holiday, an Agency response will be provided by close-of-business on the business day before such weekend or holiday date.

(c) If the Agency determines that the **Participation Goals** are unreasonable in light of the availability of certified firms to perform the services required, it shall revise the solicitation and extend the deadline for bids and proposals, or revise the Task Order, as applicable.

(d) Agency may grant a full or partial waiver of the **Participation Goals** to a bidder, proposer or contractor, as applicable, who demonstrates—before submission of the bid, proposal or Task Order, as applicable—that it has legitimate business reasons for proposing the level of

subcontracting in its **M/WBE** Utilization Plan. In making its determination, Agency shall consider factors that shall include, but not be limited to, whether the bidder, proposer or contractor, as applicable, has the capacity and the bona fide intention to perform the Contract without any subcontracting, or to perform the Contract without awarding the amount of subcontracts represented by the **Participation Goals**. In making such determination, Agency may consider whether the **M/WBE** Utilization Plan is consistent with past subcontracting practices of the bidder, proposer or contractor, as applicable, whether the bidder, proposer or contractor, as applicable, has made efforts to form a joint venture with a certified firm, and whether the bidder, proposer, or contractor, as applicable, has made good faith efforts to identify other portions of the Contract that it intends to subcontract.

11. Modification of **M/WBE** Utilization Plan. (a) A Contractor may request a modification of its **M/WBE** Utilization Plan after award of this Contract. **PLEASE NOTE: If this Contract is a public works project subject to GML §101(5) (i.e., a contract valued at or below $3M for projects in New York City) or if the Contract is subject to a project labor agreement in accordance with Labor Law §222, and the bidder is required to identify at the time of bid submission its intended subcontractors for the Wicks trades (plumbing and gas fitting; steam heating, hot water heating, ventilating and air conditioning (HVAC); and electric wiring), the Contractor may request a Modification of its M/WBE Utilization Plan as part of its bid submission.** The Agency may grant a request for Modification of a Contractor's **M/WBE** Utilization Plan if it determines that the Contractor has established, with appropriate documentary and other evidence, that it made reasonable, good faith efforts to meet the **Participation Goals**. In making such determination, Agency shall consider evidence of the following efforts, as applicable, along with any other relevant factors:

(i) The Contractor advertised opportunities to participate in the Contract, where appropriate, in general circulation media, trade and professional association publications and small business media, and publications of minority and women's business organizations;

(ii) The Contractor provided notice of specific opportunities to participate in the Contract, in a timely manner, to minority and women's business organizations;

(iii) The Contractor sent written notices, by certified mail or facsimile, in a timely manner, to advise MBEs or WBEs that their interest in the Contract was solicited;

(iv) The Contractor made efforts to identify portions of the work that could be substituted for portions originally designated for participation by MBEs and/or WBEs in the **M/WBE** Utilization Plan, and for which the Contractor claims an inability to retain MBEs or WBEs;

(v) The Contractor held meetings with MBEs and/or WBEs prior to the date their bids or proposals were due, for the purpose of explaining in detail the scope and requirements of the work for which their bids or proposals were solicited;

(vi) The Contractor made efforts to negotiate with MBEs and/or WBEs as relevant to perform specific subcontracts, or act as suppliers or service providers;

(vii) Timely written requests for assistance made by the Contractor to Agency's M/WBE liaison officer and to DSBS;

(viii) Description of how recommendations made by DSBS and Agency were acted upon and an explanation of why action upon such recommendations did not lead to the desired level of participation of MBEs and/or WBEs.

Agency's M/WBE officer shall provide written notice to the Contractor of the determination.

(b) The Agency may modify the **Participation Goals** when the scope of the work has been changed by the Agency in a manner that affects the scale and types of work that the Contractor indicated in its **M/WBE Utilization Plan** would be awarded to subcontractors.

12. If the Contractor was required to identify in its bid or proposal the MBEs and/or WBEs they intended to use in connection with the performance of the Contract or Task Order, substitutions to the identified firms may only be made with the approval of the Agency, which shall only be given when the Contractor has proposed to use a firm that would satisfy the **Participation Goals** to the same extent as the firm previously identified, unless the Agency determines that the Contractor has established, with appropriate documentary and other evidence, that it made reasonable, good faith efforts. In making such determination, the Agency shall require evidence of the efforts listed in Section 11(a) above, as applicable, along with any other relevant factors.

13. If this Contract is for an indefinite quantity of construction, standard or professional services or is a requirements type contract and the Contractor has submitted an **M/WBE** Utilization Plan and has committed to subcontract work to MBEs and/or WBEs in order to meet the **Participation Goals**, the Contractor will not be deemed in violation of the M/WBE Program requirements for this Contract with regard to any work which was intended to be subcontracted to an MBE and/or WBE to the extent that the Agency has determined that such work is not needed.

14. If **Participation Goals** have been established for this Contract or a Task Order issued pursuant to this Contract, at least once annually during the term of the Contract or Task Order, as applicable, Agency shall review the Contractor's progress toward attainment of its **M/WBE** Utilization Plan, including but not limited to, by reviewing the percentage of work the Contractor has actually awarded to MBE and/or WBE subcontractors and the payments the Contractor made to such subcontractors.

15. If **Participation Goals** have been established for this Contract or a Task Order issued pursuant to this Contract, Agency shall evaluate and assess the Contractor's performance in meeting those goals, and such evaluation and assessment shall become part of the Contractor's overall contract performance evaluation.

PART B

MISCELLANEOUS

1. The Contractor shall take notice that, if this solicitation requires the establishment of a **M/WBE** Utilization Plan, the resulting contract may be audited by DSBS to determine compliance with Section 6-129. See §6-129(e)(10). Furthermore, such resulting contract may also be examined by the City's Comptroller to assess compliance with the **M/WBE** Utilization Plan.

2. Pursuant to DSBS rules, construction contracts that include a requirement for a **M/WBE** Utilization Plan shall not be subject to the law governing Locally Based Enterprises set forth in Section 6-108.1 of the Administrative Code of the City of New York.

3. DSBS is available to assist contractors and potential contractors in determining the availability of MBEs and/or WBEs to participate as subcontractors, and in identifying opportunities that are appropriate for participation by MBEs and/or WBEs in contracts.

4. Prospective contractors are encouraged to enter into qualified joint venture agreements with MBEs and/or WBEs as defined by Section 6-129(c)(30).

5. By submitting a bid or proposal the Contractor hereby acknowledges its understanding of the M/WBE Program requirements set forth herein and the pertinent provisions of Section 6-129, and any rules promulgated thereunder, and if awarded this Contract, the Contractor hereby agrees to comply with the M/WBE Program requirements of this Contract and pertinent provisions of Section 6-129, and any rules promulgated thereunder, all of which shall be deemed to be material terms of this Contract. The Contractor hereby agrees to make all reasonable, good faith efforts to solicit and obtain the participation of MBEs and/or WBEs to meet the required **Participation Goals**.

ARTICLE II. ENFORCEMENT

1. If Agency determines that a bidder or proposer, as applicable, has, in relation to this procurement, violated Section 6-129 or the DSBS rules promulgated pursuant to Section 6-129, Agency may disqualify such bidder or proposer, as applicable, from competing for this Contract and the Agency may revoke such bidder's or proposer's prequalification status, if applicable.

2. Whenever Agency believes that the Contractor or a subcontractor is not in compliance with Section 6-129 or the DSBS rules promulgated pursuant to Section 6-129, or any provision of this Contract that implements Section 6-129, including, but not limited to any **M/WBE** Utilization Plan, Agency shall send a written notice to the Contractor describing the alleged noncompliance and offering the Contractor an opportunity to be heard. Agency shall then conduct an investigation to determine whether such Contractor or subcontractor is in compliance.

3. In the event that the Contractor has been found to have violated Section 6-129, the DSBS rules promulgated pursuant to Section 6-129, or any provision of this Contract that implements

Section 6-129, including, but not limited to, any **M/WBE** Utilization Plan, Agency may determine that one of the following actions should be taken:

(a) entering into an agreement with the Contractor allowing the Contractor to cure the violation;

(b) revoking the Contractor's pre-qualification to bid or make proposals for future contracts;

(c) making a finding that the Contractor is in default of the Contract;

(d) terminating the Contract;

(e) declaring the Contractor to be in breach of Contract;

(f) withholding payment or reimbursement;

(g) determining not to renew the Contract;

(h) assessing actual and consequential damages;

(i) assessing liquidated damages or reducing fees, provided that liquidated damages may be based on amounts representing costs of delays in carrying out the purposes of the M/WBE Program, or in meeting the purposes of the Contract, the costs of meeting utilization goals through additional procurements, the administrative costs of investigation and enforcement, or other factors set forth in the Contract;

(j) exercising rights under the Contract to procure goods, services or construction from another contractor and charge the cost of such contract to the Contractor that has been found to be in noncompliance; or

(k) taking any other appropriate remedy.

4. If an **M/WBE** Utilization Plan has been submitted, and pursuant to this Article II, Section 3, the Contractor has been found to have failed to fulfill its **Participation Goals** contained in its **M/WBE** Utilization Plan or the **Participation Goals** as modified by Agency pursuant to Article I, Part A, Section 11, Agency may assess liquidated damages in the amount of ten percent (10%) of the difference between the dollar amount of work required to be awarded to MBE and/or WBE firms to meet the **Participation Goals** and the dollar amount the Contractor actually awarded and paid, and/or credited, to MBE and/or WBE firms. In view of the difficulty of accurately ascertaining the loss which the City will suffer by reason of Contractor's failure to meet the **Participation Goals**, the foregoing amount is hereby fixed and agreed as the liquidated damages that the City will suffer by reason of such failure, and not as a penalty. Agency may deduct and retain out of any monies which may become due under this Contract the amount of any such liquidated damages; and in case the amount which may become due under this Contract shall be less than the amount of liquidated damages suffered by the City, the Contractor shall be liable to pay the difference.

5. Whenever Agency has reason to believe that an MBE and/or WBE is not qualified for certification, or is participating in a contract in a manner that does not serve a commercially useful function (as defined in Section 6-129(c)(8)), or has violated any provision of Section 6-129, Agency shall notify the Commissioner of DSBS who shall determine whether the certification of such business enterprise should be revoked.

6. Statements made in any instrument submitted to Agency pursuant to Section 6-129 shall be submitted under penalty of perjury and any false or misleading statement or omission shall be grounds for the application of any applicable criminal and/or civil penalties for perjury. The making of a false or fraudulent statement by an MBE and/or WBE in any instrument submitted pursuant to Section 6-129 shall, in addition, be grounds for revocation of its certification.

7. The Contractor's record in implementing its **M/WBE** Utilization Plan shall be a factor in the evaluation of its performance. Whenever Agency determines that a Contractor's compliance with an **M/WBE** Utilization Plan has been unsatisfactory, Agency shall, after consultation with the City Chief Procurement Officer, file an advice of caution form for inclusion in VENDEX as caution data.

REPORT

CORRUPTION, FRAUD, UNETHICAL CONDUCT

RELATING TO A NYC-FUNDED CONTRACT OR PROJECT

CALL THE NYC DEPARTMENT OF INVESTIGATION

212-825-5959

DOI CAN ALSO BE REACHED BY MAIL OR IN PERSON AT:

New York City Department of Investigation (DOI)
80 Maiden Lane, 17th floor
New York, New York 10038
Attention: COMPLAINT BUREAU

OR FILE A COMPLAINT ON-LINE AT:
www.nyc.gov/doi

All communications are confidential

THE LAW PROTECTS EMPLOYEES OF CITY CONTRACTORS WHO REPORT CORRUPTION

- Any employee of a City contractor, or subcontractor of the City, or a City contractor with a contract valued at more than $100,000 is protected under the law from retaliation by his or her employer if the employee reports wrongdoing related to the contract to the DOI.
- **To be protected by this law, an employee must report to DOI – or to certain other specified government officials** – information about fraud, false claims, corruption, criminality, conflict of interest, gross mismanagement, or abuse of authority relating to a City contract valued at more than $100,000.
- Any employee who makes such a report and who believes he or she has been dismissed, demoted, suspended, or otherwise subject to an adverse personnel action because of that report is entitled to bring a lawsuit against the contractor and recover damages

← Scan the QR Code at Left to File a Complaint

NOTICE OF PIP ENHANCEMENTS:
EFT/DIRECT DEPOSIT ENROLLMENT

April 2019

Various enhancements were made to the Payee Information Portal (PIP). Effective immediately, vendors are advised of the following PIP enhancements:

EFT/Direct Deposit:

- Enroll for EFT/Direct Deposit program online via the Payee Information Portal (PIP) at www.nyc.gov/PIP. PIP is now available for vendors to set up a single bank account for all vendor payments made from the New York City Financial Management System (FMS). Both existing and new city vendors can sign up for EFT/Direct Deposit through PIP.

- Existing EFT enabled vendors with a PIP User ID and password can update their bank account information in PIP.

- New vendors doing business with the City of New York can create a new PIP account and vendor code, and then add their bank account information for EFT/Direct Deposit immediately.

Other Features:

- When a vendor intends to move to another location on a particular day, they can deactivate their existing address by adding an "Active To" date (effective end date) to the address. A warning will be generated if any open orders or payments in FMS are using that address. Vendors should inform the agencies with which they do business about the address changes.

- When Vendors change their Legal Name or Tax Identification Number (TIN), documentation is now required to be attached in PIP.

- Vendors can submit questions online related to FMS Scheduled Payments, Check/EFT Information, and Tax Information. The questions will be forwarded to the agency associated with the transaction(s).

- Beginning with tax year 2018, vendors receiving an amended 1099 Form can print the amended PDF and view the details of the changes.

For learning resources, vendors are directed to the **Activation Quick Start Guide, EFT/Direct Deposit Enrollment Guide** and related online **EFT Enrollment eLearning** tutorials which are available on the PIP homepage.

For assistance with the PIP System, questions should be directed to the PIP Help Desk at 212-857-1777 or PIP@fisa-opa.nyc.gov.

The Payee Information Portal (PIP) can be accessed at www.nyc.gov/PIP.

Pages 47 is intentionally blank.

LABOR LAW ARTICLE 8 - NYC PUBLIC WORKS

Workers, Laborers and Mechanics employed on a public work project must receive not less than the prevailing rate of wage and benefits for the classification of work performed by each upon such public work. Pursuant to New York Labor Law Article 8 the Comptroller of the City of New York has promulgated this schedule solely for Workers, Laborers and Mechanics engaged by private contractors on New York City public work projects. Prevailing rates are required to be annexed to and form part of the public work contract pursuant to Labor Law section 220 (3).

This schedule is a compilation of separate determinations of the prevailing rate of wage and supplements made by the Comptroller for each trade classification listed herein pursuant to Labor Law section 220 (5). The source of the wage and supplement rates, whether a collective bargaining agreement, survey data or other, is listed at the end of each classification.

Agency Chief Contracting Officers should contact the Bureau of Labor Law's Classification Unit with any questions concerning trade classifications, prevailing rates or prevailing practices with respect to procurement on New York City public work contracts. Contractors are advised to review the Comptroller's Prevailing Wage Schedule before bidding on public work contracts. Contractors with questions concerning trade classifications, prevailing rates or prevailing practices with respect to public work contracts in the procurement stage must contact the contracting agency responsible for the procurement.

Any error as to compensation under the prevailing wage law or other information as to trade classification, made by the contracting agency in the contract documents or in any other communication, will not preclude a finding against the contractor of prevailing wage violation.

Any questions concerning trade classifications, prevailing rates or prevailing practices on New York City public work contracts that have already been awarded may be directed to the Bureau of Labor Law's Classification Unit by calling (212) 669-4443. All callers must have the agency name and contract registration number available when calling with questions on public work contracts. Please direct all other compliance issues to: laborlaw@comptroller.nyc.gov or Bureau of Labor Law, Attn: Paul Brumlik, Office of the Comptroller, 1 Centre Street, Room 651, New York, N.Y. 10007.

Pursuant to Labor Law § 220 (3-a) (a), the appropriate schedule of prevailing wages and benefits must be posted in a prominent and accessible place at all public work sites along with the Construction Poster provided on our web site at comptroller.nyc.gov/wages. In addition, covered employees must be given the appropriate schedule of prevailing wages and benefits along with the Worker Notice provided on our web site at the time the public work project begins, and with the first paycheck to each such employee after July first of each year.

This schedule is applicable to work performed during the effective period, unless otherwise noted. Changes to this schedule are published on our web site comptroller.nyc.gov/wages. Contractors must pay the wages and supplements in effect when the worker, laborer, mechanic performs the work. Preliminary schedules for future one-year periods appear in the City Record on or about June 1 each succeeding year. Final schedules appear on or about July 1 in the City Record and on our web site comptroller.nyc.gov/wages.

Prevailing rates and ratios for apprentices are published in the Construction Apprentice Prevailing Wage Schedule. Pursuant to Labor Law § 220 (3-e), only apprentices who are individually registered in a bona fide program to which the employer contractor is a participant, registered with the

New York State Department of Labor, may be paid at the apprentice rates. Apprentices who are not so registered must be paid as journey persons.

New York City public work projects awarded pursuant to a Project Labor Agreement ("PLA") in accordance with Labor Law section 222 may have different labor standards for shift, premium and overtime work. Please refer to the PLA's pre-negotiated labor agreements for wage and benefit rates applicable to work performed outside of the regular workday. More information is available at the Mayor's Office of Contract Services (MOCS) web page at:

https://www1.nyc.gov/site/mocs/legal-forms/project-labor-agreements.page

All the provisions of Labor Law Article 8 remain applicable to PLA work including, but not limited to, the enforcement of prevailing wage requirements by the Comptroller in accordance with the trade classifications in this schedule; however, we will enforce shift, premium, overtime and other non-standard rates as they appear in a project's pre-negotiated labor agreement.

In order to meet their obligation to provide prevailing supplemental benefits to each covered employee, employers must either:

1) **Provide bona fide fringe benefits which cost the employer no less than the prevailing supplemental benefits rate; or**
2) **Supplement the employee's hourly wage by an amount no less than the prevailing supplemental benefits rate; or**
3) **Provide a combination of bona fide fringe benefits and wage supplements which cost the employer no less than the prevailing supplemental benefits rate in total.**

Although prevailing wage laws do not require employers to provide bona fide fringe benefits (as opposed to wage supplements) to their employees, other laws may. For example, the Employee Retirement Income Security Act, 29 U.S.C. § 1001 et seq., the Patient Protection and Affordable Care Act, 42 U.S.C. § 18001 et seq., and the New York City Paid Sick Leave Law, N.Y.C. Admin. Code § 20-911 et seq., require certain employers to provide certain benefits to their employees. Labor agreements to which employers are a party may also require certain benefits. The Comptroller's Office does not enforce these laws or agreements.

Employers must provide prevailing supplemental benefits at the straight time rate for each hour worked unless otherwise noted in the classification.

Paid Holidays, Vacation and Sick Leave when listed must be paid or provided in addition to the prevailing hourly supplemental benefit rate.

For more information, please refer to the Comptroller's Prevailing Wage Law Regulations in Title 44 of the Rules of the City of New York, Chapter 2, available at comptroller.nyc.gov/wages.

Paul Brumlik
Director of Classifications
Bureau of Labor Law

TABLE OF CONTENTS

CLASSIFICATION	PAGE
ASBESTOS HANDLER	6
BLASTER	6
BOILERMAKER	7
BRICKLAYER	8
CARPENTER - BUILDING COMMERCIAL	9
CARPENTER - HEAVY CONSTRUCTION WORK	10
CARPENTER - HIGH RISE CONCRETE FORMS	11
CARPENTER - SIDEWALK SHED, SCAFFOLD AND HOIST	12
CARPENTER - WOOD WATER STORAGE TANK	13
CEMENT & CONCRETE WORKER	14
CEMENT MASON	15
CORE DRILLER	16
DERRICKPERSON AND RIGGER	17
DIVER	18
DOCKBUILDER - PILE DRIVER	19
DRIVER: TRUCK (TEAMSTER)	20
ELECTRICIAN	23
ELECTRICIAN - ALARM TECHNICIAN	28
ELECTRICIAN-STREET LIGHTING WORKER	29
ELEVATOR CONSTRUCTOR	31
ELEVATOR REPAIR & MAINTENANCE	32
ENGINEER	33
ENGINEER - CITY SURVEYOR AND CONSULTANT	37
ENGINEER - FIELD (BUILDING CONSTRUCTION)	39
ENGINEER - FIELD (HEAVY CONSTRUCTION)	40
ENGINEER - FIELD (STEEL ERECTION)	41
ENGINEER - OPERATING	42
FLAGGER	50
FLOOR COVERER	50
GLAZIER	51
GLAZIER - REPAIR & MAINTENANCE	52

HAZARDOUS MATERIAL HANDLER 53
HEAT AND FROST INSULATOR 54
HOUSE WRECKER 54
IRON WORKER - ORNAMENTAL 55
IRON WORKER - STRUCTURAL 56
LABORER – HEAVY & HIGHWAY 57
LABORER - PAVER & ROADBUILDER 58
LABORER - PAVER & ROADBUILDER LINE STRIPING (ROADWAY) 60
LANDSCAPING 61
MARBLE MECHANIC 63
MASON TENDER 64
MASON TENDER (INTERIOR DEMOLITION WORKER) 65
METALLIC LATHER 66
MILLWRIGHT 67
MOSAIC MECHANIC 68
PAINTER 68
PAINTER - BRIDGE & STRUCTURAL STEEL 69
PAINTER - METAL POLISHER 70
PAINTER - SIGN 72
PAPERHANGER 73
PLASTERER 73
PLASTERER - TENDER 74
PLUMBER 75
PLUMBER (MECHNICAL EQUIPMENT AND SERVICE) 76
PLUMBER (RESIDENTIAL RATES FOR 1, 2 AND 3 FAMILY HOME CONSTRUCTION) 77
PLUMBER: PUMP & TANK 78
POINTER, WATERPROOFER, CAULKER, SANDBLASTER, STEAMBLASTER 79
ROOFER 80
SHEET METAL WORKER 80
SHEET METAL WORKER - SPECIALTY 82
SHIPYARD WORKER 83
SIGN ERECTOR 84
STEAMFITTER 85

STEAMFITTER - REFRIGERATION AND AIR CONDITIONER 86
STONE MASON - SETTER 87
TAPER 88
TELECOMMUNICATION WORKER 88
TILE FINISHER 89
TILE LAYER - SETTER 90
TIMBERPERSON 91
TUNNEL WORKER 92
UTILITY LOCATOR 94
WELDER 96

ASBESTOS HANDLER
SEE HAZARDOUS MATERIAL HANDLER

BLASTER

Blaster

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $59.81
Supplemental Benefit Rate per Hour: $57.77

Blaster - Hydraulic Trac Drill

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $53.95
Supplemental Benefit Rate per Hour: $57.77

Blaster - Wagon: Air Trac: Quarry Bar: Drillrunners

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $53.12
Supplemental Benefit Rate per Hour: $57.77

Blaster - Journeyperson

(Laborer, Chipper/Jackhammer including Walk Behind Self Propelled Hydraulic Asphalt and Concrete Breakers and Hydro (Water) Demolition, Powder Carrier, Hydraulic Chuck Tender, Chuck Tender and Nipper)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.60
Supplemental Benefit Rate per Hour: $57.77

Blaster - Magazine Keepers: (Watch Person)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.30
Supplemental Benefit Rate per Hour: $57.77

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Memorial Day
Independence Day
Columbus Day
Christmas Day

Triple time the regular rate for work on the following holiday(s).
Labor Day
Thanksgiving Day

Paid Holidays
Labor Day
Thanksgiving Day

Shift Rates
When two shifts are employed, single time rate shall be paid for each shift. When three shifts are found necessary, each shift shall work seven and one half hours (7 ½), but shall be paid for eight (8) hours of labor, and be permitted one half hour for lunch.

(Local #731)

BOILERMAKER

Boilermaker

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $70.38
Supplemental Benefit Rate per Hour: $50.33
Supplemental Note: For time and one half overtime - $74.92 For double overtime - $99.51

Overtime Description
For Repair and Maintenance work:
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
For New Construction work:
Double time the regular rate after an 8 hour day.
Double time the regular time rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day

President's Day
Memorial Day
Independence Day
Columbus Day
Election Day
Veteran's Day
Thanksgiving Day
Christmas Day
Juneteenth

Quadruple time the regular rate for work on the following holiday(s).
Labor Day

Paid Holidays
Good Friday
Day after Thanksgiving
Day before Christmas
Day before New Year's Day

Shift Rates
On jobs requiring two (2) or three (3) shifts, the first shift shall work eight (8) hours at the regular straight-time hourly rate. The second shift shall work eight (8) hours and receive eight hours at the regular straight time hourly rate plus two dollars ($2.00) per hour. The third shift shall work eight (8) hours and receive eight hours at the regular straight time hourly rate plus two dollars and twenty-five cents ($2.25) per hour.

(Local #5)

BRICKLAYER

Bricklayer

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $61.29
Supplemental Benefit Rate per Hour: $46.60

Overtime Description
Time and one half the regular rate after a 7 hour day. If working on a job that is predominately Pointer, Cleaner, Caulker work, then Time and one half the regular rate after an 8 hour day.

Overtime
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).

New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
The second shift wage rate shall be a 15% wage premium with no premium for supplemental benefits. There must be a first shift in order to work a second shift.

(Bricklayer District Council)

CARPENTER - BUILDING COMMERCIAL

Building Commercial

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $60.05
Supplemental Benefit Rate per Hour: $50.83

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Day after Thanksgiving
Day before Christmas
Christmas Day
Day before New Year's Day

Paid Holidays
None

Shift Rates
The second shift will receive one hour at the double time rate of pay for the last hour of the shift; eight hours pay for seven hours of work, nine hours pay for eight hours of work. There must be a first shift in order to work a second shift. When it is not possible to conduct alteration or repair work during regular working hours in a building occupied by tenants, the rule for the second shift will apply.

(Carpenters District Council)

CARPENTER - HEAVY CONSTRUCTION WORK
(Construction of Engineered Structures and Building Foundations including all form work)

Heavy Construction Work

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $62.59
Supplemental Benefit Rate per Hour: $57.84

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates

Off shift work commencing between 5:00 P.M. and 11:00 P.M. shall work eight and one half hours allowing for one half hour for lunch. The wage rate shall be 113% of the straight time hourly wage rate and the supplemental benefits shall be paid at the straight time rate. When two (2) or more shifts of Carpenters are employed, single time will be paid for each shift.

(Carpenters District Council)

CARPENTER - HIGH RISE CONCRETE FORMS
(Excludes Engineered Structures and Building Foundations)

Carpenter High Rise A

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $51.48
Supplemental Benefit Rate per Hour: $44.74

Carpenter High Rise B

Carpenter High Rise B worker is excluded from high risk operations such as erection decking, perimeter debris netting, leading edge work, self-climbing form systems, and the installation of cocoon systems unless directly supervised by a Carpenter High Rise A worker.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.89
Supplemental Benefit Rate per Hour: $18.05

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Time and one half the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
The second shift wage rate shall be 113% of the straight time hourly wage rate. However, any shift beginning after 5:00 P.M. shall be paid at time and one half the regular hourly rate. There must be a first shift in order to work a second shift. When it is not possible to conduct alteration or repair work during regular working hours in a building occupied by tenants, the rule for the second shift will apply.

(Carpenters District Council)

CARPENTER - SIDEWALK SHED, SCAFFOLD AND HOIST

Carpenter - Hod Hoist

(Assisted by Mason Tender)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $57.20
Supplemental Benefit Rate per Hour: $51.20

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

Shift Rates

The second shift will receive 112% of the straight time hourly rate. Benefit fund contributions shall be paid at the straight time rate. There must be a first shift in order to work a second shift. When it is not possible to conduct alteration or repair work during regular working hours in a building occupied by tenants, the rule for the second shift will apply.

(Carpenters District Council)

CARPENTER - WOOD WATER STORAGE TANK

Tank Mechanic

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.58
Supplemental Benefit Rate per Hour: $27.26

Tank Helper

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.04
Supplemental Benefit Rate per Hour: $27.18

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Time and one half the regular rate for work on a holiday plus the day's pay.

Paid Holidays

New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Thanksgiving Day
Day after Thanksgiving
1/2 day on Christmas Eve if work is performed in the A.M.
Christmas Day
1/2 day on New Year's Eve if work is performed in the A.M.

Vacation

Employed for one (1) year.....one (1) week vacation (40 hours)
Employed for three (3) years.....two (2) weeks vacation (80 hours)
Employed for more than twenty (20) years.....three (3) weeks vacation (120 hours)

SICK LEAVE:

Two (2) sick days after being employed for twenty (20) years.

(Carpenters District Council)

CEMENT & CONCRETE WORKER
Building Work

Cement & Concrete Worker

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $47.28
Supplemental Benefit Rate per Hour: $34.20
Supplemental Note: $39.20 on Saturdays; $44.20 on Sundays & Holidays

Cement & Concrete Worker - (Hired after 2/6/2016)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $36.80
Supplemental Benefit Rate per Hour: $26.20
Supplemental Note: $29.20 on Saturdays; $32.20 on Sundays & Holidays

Overtime Description
Time and one half the regular rate after 7 hour day (time and one half the regular rate after an 8 hour day when working with Dockbuilders on pile cap forms and for work below street level to the top of the foundation wall, not to exceed 2 feet or 3 feet above the sidewalk-brick shelf, when working on the foundation and structure.)

Overtime
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Paid Holidays
1/2 day before Christmas Day
1/2 day before New Year's Day

Shift Rates
All night shifts are paid at straight time plus 10% differential.

(Cement & Concrete Workers District Council 16)

CEMENT MASON

Cement Mason

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $59.87
Supplemental Benefit Rate per Hour: $34.76
Supplemental Note: Supplemental benefit time and one half rate: $63.22; Double time rate: double the base supplemental benefit rate.

Overtime Description
Time and one-half the regular rate after an 8 hour day, double time the regular rate after 10 hours. Time and one-half the regular rate on Saturday, double time the regular rate after 10 hours. Double time the regular rate on Sunday. Four Days a week at Ten (10) hours straight time is allowed.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Paid Holidays
Any worker who reports to work on Christmas Eve or New Year's Eve pursuant to his employer's instruction shall be entitled to three (3) hours afternoon pay without working.

Shift Rates
For off shift work, (at times other than the regular 7:00 A.M. to 3:30 P.M. work day) a cement mason shall be paid at the regular hourly rate plus a 25% per hour differential.

(Local #780) (BCA)

CORE DRILLER
Test Boring

Core Driller

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.78
Supplemental Benefit Rate per Hour: $36.07

Core Driller Helper

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.15
Supplemental Benefit Rate per Hour: $36.07

Core Driller Helper(Third year in the industry)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.37
Supplemental Benefit Rate per Hour: $36.07
eucli

Core Driller Helper (Second year in the industry)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.61
Supplemental Benefit Rate per Hour: $36.07

Core Driller Helper (First year in the industry)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $26.83
Supplemental Benefit Rate per Hour: $36.07

Overtime Description
Time and one half the regular rate for work on a holiday plus Holiday pay when worked.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Time and one half the regular rate for work on the following holiday(s).

Paid Holidays
New Year's Day
Memorial Day

Independence Day
Labor Day
Veteran's Day
Thanksgiving Day
Christmas Day

Shift Rates

When two (2) or more shifts are employed, single time shall be paid for each shift, but those employees employed on a shift other than from 8:00 A.M. to 5:00 P.M. shall, in addition, receive two dollars ($2.00) per hour differential for each hour worked. When three (3) shifts are needed, each shift shall work seven and one-half (7 ½) hours paid for eight (8) hours of labor and be permitted one-half (½) hour for mealtime.

(Carpenters District Council)

DERRICKPERSON AND RIGGER

Derrick Person & Rigger

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $61.82
Supplemental Benefit Rate per Hour: $63.63

Overtime Description

The first two hours of overtime on weekdays and the first seven hours of work on Saturdays are paid at time and one half for wages and supplemental benefits. All additional overtimes is paid at double time for wages and supplemental benefits.

Overtime

Double time the regular rate for Sunday.

Overtime Holidays

Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays

1/2 day on Christmas Eve if work is performed in the A.M.

Derrick Person & Rigger- Handset

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $59.67
Supplemental Benefit Rate per Hour: $62.64

Overtime Description
The first two hours of overtime on weekdays and the first seven hours of work on Saturdays are paid at time and one half for wages and supplemental benefits. All additional overtimes is paid at double time for wages and supplemental benefits.

Overtime
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
1/2 day on Christmas Eve if work is performed in the A.M.

(Local #197)

DIVER

Diver (Marine)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $77.46
Supplemental Benefit Rate per Hour: $57.84

Diver Tender (Marine)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $57.00
Supplemental Benefit Rate per Hour: $57.84

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
When three shifts are utilized each shift shall work seven and one half-hours (7 1/2 hours) and paid for 8 hours, allowing for one half hour for lunch.

(Carpenters District Council)

DOCKBUILDER - PILE DRIVER

Dockbuilder - Pile Driver

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $62.59
Supplemental Benefit Rate per Hour: $57.84

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day

President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Paid Holidays

None

Shift Rates

Off shift work commencing between 5:00 P.M. and 11:00 P.M. shall work eight and one half hours allowing for one half hour for lunch. The wage rate shall be 113% of the straight time hourly wage rate and the supplemental benefits shall be paid at the straight time rate. When two (2) or more shifts of Dockbuilders are employed, single time will be paid for each shift.

(Carpenters District Council)

DRIVER: TRUCK (TEAMSTER)

Including work involving the delivery to and hauling from such worksites of aggregate supply construction materials and any time spent loading/unloading

Driver - Dump Truck

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $47.07
Supplemental Benefit Rate per Hour: $61.15
Supplemental Note: Over 40 hours worked: at time and one half rate - $25.50; at double time rate - $34.00

Driver - Tractor Trailer

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $50.76
Supplemental Benefit Rate per Hour: $60.15
Supplemental Note: Over 40 hours worked: at time and one half rate - $32.83; at double time rate - $41.60

Driver - Euclid & Turnapull Operator

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $50.07

Supplemental Benefit Rate per Hour: $60.15
Supplemental Note: Over 40 hours worked: at time and one half rate - $32.83; at double time rate - $41.60

Driver – Boom Truck

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $52.51
Supplemental Benefit Rate per Hour: $60.15
Supplemental Note: Over 40 hours worked: at time and one half rate - $32.83; at double time rate - $41.60

Driver – Goldhofer & Self Propelled Modular Trailer (SPMT)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $53.51
Supplemental Benefit Rate per Hour: $60.15
Supplemental Note: Over 40 hours worked: at time and one half rate - $32.83; at double time rate - $41.60

Overtime Description
For Paid Holidays: Holiday pay for all holidays shall be prorated based two hours per day for each day worked in the holiday week, not to exceed 8 hours of holiday pay.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Christmas Day

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Christmas Day

Shift Rates
Off shift work commencing between 6:00 P.M. and 5:00 A.M. shall work eight and one half (8 1/2) hours allowing for one half hour for lunch

---

Driver Redi-Mix (Sand & Gravel)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $44.50
Supplemental Benefit Rate per Hour: $54.88
Supplemental Note: Over 40 hours worked: time and one half rate $22.59; double time rate $30.12

Overtime Description
For Paid Holidays: Employees who do not work on a contractual holiday shall be compensated two (2) hours extra pay in straight time wages and benefits for every day on which the Employee does not pass up a day's work during the calendar week (Sunday through Saturday) of the holiday, up to a maximum of ten (10) hours in wages and eight (8) hours in benefit contributions for the holiday

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
Martin Luther King Jr. Day
President's Day
Columbus Day
Veteran's Day

Triple time the regular rate for work on the following holiday(s).
New Year's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Election Day
Thanksgiving Day
Christmas Day

(Local #282)

ELECTRICIAN

(Including installation of low voltage cabling carrying data, video and/or voice on building construction/alteration/renovation projects.)

Electrician "A" (Regular Day / Day Shift)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $64.00
Supplemental Benefit Rate per Hour: $70.28
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $64.00
Supplemental Benefit Rate per Hour: $72.74
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Electrician "A" (Regular Day Overtime after 7 hrs / Day Shift Overtime after 8 hrs)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $96.00
Supplemental Benefit Rate per Hour: $72.34
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $96.00
Supplemental Benefit Rate per Hour: $74.80
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Electrician "A" (Swing Shift)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $75.10
Supplemental Benefit Rate per Hour: $78.93
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $75.10
Supplemental Benefit Rate per Hour: $81.66
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Electrician "A" (Swing Shift Overtime after 7.5 hours)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $112.65
Supplemental Benefit Rate per Hour: $81.35
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $112.65
Supplemental Benefit Rate per Hour: $84.07
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Electrician "A" (Graveyard Shift)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $84.12
Supplemental Benefit Rate per Hour: $86.28
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $84.12
Supplemental Benefit Rate per Hour: $89.25
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Electrician "A" (Graveyard Shift Overtime after 7 hours)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $126.18
Supplemental Benefit Rate per Hour: $88.98
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $126.18
Supplemental Benefit Rate per Hour: $91.96
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

*** Supplemental Benefit Rate per Hour Note**
In addition to the Supplemental Benefit Rates per Hour listed above, the employer must provide an additional 6.2% of taxable gross pay earned on covered work only. This additional Supplemental Benefit Rate will terminate when the employee has contributed the maximum annual Social Security tax required by law, on all work performed.

Overtime
Time and one half the regular rate after a 7 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays
Time and one half the regular rate for work on a holiday.
New Year's Day
Martin Luther King Jr. Day
President's Day

Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays

None

Shift Rates

For multiple shifts of temporary light and/or power, the temporary light and/or power employee shall be paid for 8 hours at the straight time rate. For three or less workers performing 8 hours temporary light and/or power the supplemental benefit rate is $27.91, effective 04/15/2027 the supplemental benefit rate is $29.91 - See * Supplemental Benefit Rate per Hour Note above.

Electrician "M" 1st Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $27.50
Supplemental Benefit Rate per Hour: $26.79

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $27.50
Supplemental Benefit Rate per Hour: $27.42

Electrician "M" 1st Year (Overtime)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $41.25
Supplemental Benefit Rate per Hour: $28.52

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $41.25
Supplemental Benefit Rate per Hour: $29.16

Electrician "M" 2nd Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $28.50
Supplemental Benefit Rate per Hour: $27.32

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $28.50
Supplemental Benefit Rate per Hour: $27.97

Electrician "M" 2nd Year (Overtime)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $42.75
Supplemental Benefit Rate per Hour: $29.12

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $42.75
Supplemental Benefit Rate per Hour: $29.77

Electrician "M" 3rd Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $30.50
Supplemental Benefit Rate per Hour: $28.40

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $30.50
Supplemental Benefit Rate per Hour: $29.05

Electrician "M" 3rd Year (Overtime)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $45.75
Supplemental Benefit Rate per Hour: $30.33

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $45.75
Supplemental Benefit Rate per Hour: $30.98

Electrician "M" 4th Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $33.50
Supplemental Benefit Rate per Hour: $30.01

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $33.50
Supplemental Benefit Rate per Hour: $30.68

Electrician "M" 4th Year (Overtime)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $50.25
Supplemental Benefit Rate per Hour: $32.13

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $50.25

Supplemental Benefit Rate per Hour: $32.80

Electrician "M" 5th Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $36.50
Supplemental Benefit Rate per Hour: $31.62

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $36.50
Supplemental Benefit Rate per Hour: $32.31

Electrician "M" 5th Year (Overtime)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $54.75
Supplemental Benefit Rate per Hour: $33.93

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $54.75
Supplemental Benefit Rate per Hour: $34.61

Electrician "M" 6th Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $43.50
Supplemental Benefit Rate per Hour: $35.39

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $43.50
Supplemental Benefit Rate per Hour: $36.11

Electrician "M" 6th Year (Overtime)

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $65.25
Supplemental Benefit Rate per Hour: $38.14

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $65.25
Supplemental Benefit Rate per Hour: $38.85

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays

Time and one half the regular rate for work on the following holiday(s).

New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

(Local #3)

ELECTRICIAN - ALARM TECHNICIAN
(Scope of Work - Inspect, test, repair, and replace defective, malfunctioning, or broken devices, components and controls of Fire, Burglar and Security Systems)

Alarm Technician

Effective Period: 7/1/2026 - 3/11/2027
Wage Rate per Hour: $39.45
Supplemental Benefit Rate per Hour: $23.33
Supplemental Note: $21.20 only after 8 hours worked in a day

Effective Period: 3/12/2027 - 6/30/2027
Wage Rate per Hour: $40.45
Supplemental Benefit Rate per Hour: $23.86
Supplemental Note: $21.74 only after 8 hours worked in a day

Overtime Description
Time and one half the regular rate for work on the following holidays: Columbus Day, Veterans Day, Day after Thanksgiving.
Double time the regular rate for work on the following holidays: New Year's day, Martin Luther King Jr. Day, President's Day, Memorial Day, Independence Day, Labor Day, Thanksgiving Day, Christmas Day.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Paid Holidays

New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Shift Rates

Night Differential is based upon a ten percent (10%) differential between the hours of 4:00 P.M. and 12:30 A.M. and a fifteen percent (15%) differential for the hours 12:00 A.M. to 8:30 A.M.

Vacation

At least 1 year of employment.....ten (10) days
5 years or more of employment.....fifteen (15) days
10 years of employment.....twenty (20) days
Plus one Personal Day per year

Sick Days:
One day per Year. Up to 4 vacation days may be used as sick days.

(Local #3)

ELECTRICIAN-STREET LIGHTING WORKER

Electrician - Electro Pole Electrician

Effective Period: 7/1/2026 - 4/21/2027
Wage Rate per Hour: $64.00
Supplemental Benefit Rate per Hour: $72.46
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/22/2027 - 6/30/2027
Wage Rate per Hour: $64.00
Supplemental Benefit Rate per Hour: $74.92
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Electrician - Electro Pole Foundation Installer

Effective Period: 7/1/2026 - 4/21/2027
Wage Rate per Hour: $49.66
Supplemental Benefit Rate per Hour: $53.91
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/22/2027 - 6/30/2027
Wage Rate per Hour: $49.66
Supplemental Benefit Rate per Hour: $55.91
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Electrician - Electro Pole Maintainer

Effective Period: 7/1/2026 - 4/21/2027
Wage Rate per Hour: $43.61
Supplemental Benefit Rate per Hour: $48.96
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

Effective Period: 4/22/2027 - 6/30/2027
Wage Rate per Hour: $43.61
Supplemental Benefit Rate per Hour: $50.89
*** Supplemental Note: See Supplemental Benefit Rate per Hour Note below**

*** Supplemental Benefit Rate per Hour Note**
In addition to the Supplemental Benefit Rates per Hour listed above, the employer must provide an additional 6.2% of taxable gross pay earned on covered work only. This additional Supplemental Benefit Rate will terminate when the employee has contributed the maximum annual Social Security tax required by law, on all work performed.

Overtime Description
Electrician - Electro Pole Electrician: Time and one half the regular rate after a 7 hour day and after 5 consecutive days worked per week.
Electrician - Electro Pole Foundation Installer: Time and one half the regular rate after 8 hours within a 24 hour period and Saturday and Sunday.
Electrician - Electro Pole Maintainer: Time and one half the regular rate after a 7 hour day and after 5 consecutive days worked per week. Saturdays and Sundays may be used as a make-up day at straight time when a day is lost during the week to inclement weather.

Overtime Holidays
Time and one half the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

(Local #3)

ELEVATOR CONSTRUCTOR

Elevator Constructor

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $86.43
Supplemental Benefit Rate per Hour: $43.43

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $89.76
Supplemental Benefit Rate per Hour: $44.53

Overtime Description
For New Construction: work performed after an 8 hour day, Saturday, Sunday or between 5:30pm and 6:00am shall be paid at double time rate.

Existing buildings: work performed after an 8 hour day, Saturday, Sunday or between 6:00pm and 5:00 am shall be paid time and one half.

Overtime
Double time the regular rate for work on the following holiday(s).

Paid Holidays
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Vacation
Employer contributes 8% of regular basic hourly rate as vacation pay for employees with more than 15 years of service, and 6% for employees with 5 to 15 years of service, and 4% for employees with less than 5 years of service.

(Local #1)

ELEVATOR REPAIR & MAINTENANCE

Elevator Service/Modernization Mechanic

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $68.06
Supplemental Benefit Rate per Hour: $43.38

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $70.72
Supplemental Benefit Rate per Hour: $44.48

Overtime Description
For Scheduled Service Work: Double time - work scheduled in advance by two or more workers performed on Sundays, Holidays, and between midnight and 5:00am.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.
Time and one half the regular rate for work on a holiday plus the day's pay.

Paid Holidays
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Shift Rates
Afternoon shift - regularly hourly rate plus a (15%) fifteen percent differential. Graveyard shift - time and one half the regular rate.

Vacation
Employer contributes 8% of regular basic hourly rate as vacation pay for employees with more than 15 years of service, and 6% for employees with 5 to 15 years of service, and 4% for employees with less than 5 years of service.

(Local #1)

ENGINEER

Engineer - Heavy Construction Operating Engineer I

Cherrypickers 20 tons and over and Loaders (rubber tired and/or tractor type with a manufacturer's minimum rated capacity of six cubic yards and over).

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $79.50
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $127.20

Engineer - Heavy Construction Operating Engineer II

Backhoes, Basin Machines, Groover, Mechanical Sweepers, Bobcat, Boom Truck, Barrier Transport (Barrier Mover) & machines of similar nature. Operation of Churn Drills and machines of a similar nature, Stetco Silent Hoist and machines of similar nature, Vac-Alls, Meyers Machines, John Beam and machines of a similar nature, Ross Carriers and Travel Lifts and machines of a similar nature, Bulldozers, Scrapers and Turn-a-Pulls: Tugger Hoists (Used exclusively for handling excavated material); Tractors with attachments, Hyster and Roustabout Cranes, Cherrypickers. Austin Western, Grove and machines of a similar nature, Scoopmobiles, Monorails, Conveyors, Trenchers: Loaders-Rubber Tired and Tractor: Barber Greene and Eimco Loaders and Eimco Backhoes; Mighty Midget and similar breakers and Tampers, Curb and Gutter Pavers and Motor Patrol, Motor Graders and all machines of a similar nature. Locomotives 10 Tons or under. Mini-Max, Break-Tech and machines of a similar nature; Milling machines, robotic and demolition machines and machines of a similar nature, shot blaster, skid steer machines and machines of a similar nature including bobcat, pile rig rubber-tired excavator (37,000 lbs. and under), 2 person auger.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $76.95
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $123.12

Engineer - Heavy Construction Operating Engineer III

Minor Equipment such as Tractors, Post Hole Diggers, Ditch Witch (Walk Behind), Road Finishing Machines, Rollers five tons and under, Tugger Hoists, Dual Purpose Trucks, Fork Lifts, and Dempsey Dumpers, Fireperson.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $72.72
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $116.35

Engineer - Heavy Construction Maintenance Engineer I

Installing, Repairing, Maintaining, Dismantling of all equipment including Steel Cutting, Bending and Heat Sealing Machines, Mechanical Heaters, Grout Pumps, Bentonite Pumps & Plants, Screening Machines, Fusion Coupling Machines, Tunnel Boring Machines Moles and Machines of a similar nature, Power Packs, Mechanical Hydraulic Jacks; all drill rigs including but not limited to Churn, Rotary Caisson, Raised Bore & Drills of a similar

nature; Personnel, Inspection & Safety Boats or any boats used to perform functions of same, Mine Hoists, Whirlies, all Climbing Cranes, all Tower Cranes, including but not limited to Truck Mounted and Crawler Type and machines of similar nature; Maintaining Hydraulic Drills and machines of a similar nature; Well Point System-Installation and dismantling; Burning, Welding, all Pumps regardless of size and/or motor power, except River Cofferdam Pumps and Wells Point Pumps; Motorized Buggies (three or more); equipment used in the cleaning and televising of sewers, but not limited to jet-rodder/vacuum truck, vacall/vactor, closed circuit television inspection equipment; high powered water pumps, jet pumps; screed machines and concrete finishing machines of a similar nature; vermeers.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $76.55
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $122.48

Engineer - Heavy Construction Maintenance Engineer II

On Base Mounted Tower Cranes

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $102.42
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $163.87

Engineer - Heavy Construction Maintenance Engineer III

On Generators, Light Towers

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.50
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $77.60

Engineer - Heavy Construction Maintenance Engineer IV

On Pumps and Mixers including mud sucking

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.90
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $79.84

Engineer - Heavy Construction Service Engineer

Gradalls: Concrete Pumps: Power Houses: Driving Truck Cranes: Driving and Operating Fuel and Grease Trucks.

Effective Period: 7/1/2026 - 6/30/2027

Wage Rate per Hour: $68.42
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $109.47

Engineer - Heavy Construction Service Mechanic

Shovels: Cranes: Draglines: Backhoes: Keystones: Pavers: Trenching Machines: Gunite Machines: Compressors (three (3) or more in Battery): Crawler Cranes- having a straight lattice boom with no attachment or luffing boom, no jib and no auxiliary attachment.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $45.50
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $72.80

Engineer - Steel Erection Maintenance Engineers

Derrick, Travelers, Tower, Crawler Tower and Climbing Cranes

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $73.88
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $118.21

Engineer - Steel Erection Oiler I

On a Truck Crane

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $68.81
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $110.10

Engineer - Steel Erection Oiler II

On a Crawler Crane

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.83
Supplemental Benefit Rate per Hour: $51.76
Supplemental Note: $95.97 on overtime
Shift Wage Rate: $74.93

Overtime Description

On jobs of more than one shift, if the next shift employee fails to report for work through any cause over which the employer has no control, the employee on duty who works the next shift continues to work at the single time rate.

Overtime

Double time the regular rate after an 8 hour day.
Double time the regular time rate for Saturday.
Double time the regular rate for Sunday.
Double time the regular rate for work on the following holiday(s).

Paid Holidays

New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Engineer - Building Work Maintenance Engineers I

Installing, repairing, maintaining, dismantling (of all equipment including: Steel Cutting and Bending Machines, Mechanical Heaters, Mine Hoists, Climbing Cranes, Tower Cranes, Linden Peine, Lorain, Liebherr, Mannes, or machines of a similar nature, Well Point Systems, Deep Well Pumps, Concrete Mixers with loading Device, Concrete Plants, Motor Generators when used for temporary power and lights), skid steer machines of a similar nature including bobcat.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $63.77
Supplemental Benefit Rate per Hour: $50.85
Supplemental Note: $94.15 on overtime

Engineer - Building Work Maintenance Engineers II

On Pumps, Generators, Mixers and Heaters

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.27
Supplemental Benefit Rate per Hour: $50.85
Supplemental Note: $94.15 on overtime

Engineer - Building Work Oilers I

All gasoline, electric, diesel or air operated Gradealls: Concrete Pumps, Overhead Cranes in Power Houses: Their duties shall be to assist the Engineer in oiling, greasing and repairing of all machines; Driving Truck

Cranes: Driving and Operating Fuel and Grease Trucks, Cherrypickers (hydraulic cranes) over 70,000 GVW, and machines of a similar nature.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $60.35
Supplemental Benefit Rate per Hour: $50.85
Supplemental Note: $94.15 on overtime

Engineer - Building Work Oilers II

Oilers on Crawler Cranes, Backhoes, Trenching Machines, Gunite Machines, Compressors (three or more in Battery).

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $43.39
Supplemental Benefit Rate per Hour: $50.85
Supplemental Note: $94.15 on overtime

Overtime Description
On jobs of more than one shift, if an Employee fails to report for work through any cause over which the Employer has no control, the Employee on duty will continue to work at the rate of single time.

Overtime
Double time the regular rate after an 8 hour day.
Double time the regular time rate for Saturday.
Double time the regular rate for Sunday.
Double time the regular rate for work on the following holiday(s).

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Christmas Day

Shift Rates
When two (2) or more shifts are employed, single time will be paid for each shift.

(Local #15)

ENGINEER - CITY SURVEYOR AND CONSULTANT

Party Chief

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.27
Supplemental Benefit Rate per Hour: $29.92
Supplemental Note: Overtime Benefit Rate - $35.66 per hour (time & one half) $41.39 per hour (double time).

Instrument Person

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.26
Supplemental Benefit Rate per Hour: $29.92
Supplemental Note: Overtime Benefit Rate -$35.66 per hour (time & one half) $41.39 per hour (double time).

Rodperson

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $33.55
Supplemental Benefit Rate per Hour: $29.92
Supplemental Note: Overtime Benefit Rate - $35.66 per hour (time & one half) $41.39 per hour (double time).

Rodperson 1st Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.00
Supplemental Benefit Rate per Hour: $29.92
Supplemental Note: Overtime Benefit Rate - $35.66 per hour (time & one half) $41.39 per hour (double time).

Overtime Description

Time and one half the regular rate after an 8 hour day, Time and one half the regular rate for Saturday for the first eight hours worked, Double time the regular time rate for Saturday for work performed in excess of eight hours, Double time the regular rate for Sunday and Double time the regular rate for work on a holiday.

Paid Holidays

New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day
Employees must work at least one day in the payroll week in which the holiday occurs to receive the paid holiday

(Operating Engineer Local #15-D)

ENGINEER - FIELD (BUILDING CONSTRUCTION)
(Construction of Building Projects, Concrete Superstructures, etc.)

Field Engineer - BC Party Chief

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $71.62
Supplemental Benefit Rate per Hour: $46.38
Supplemental Note: Overtime Benefit Rate - $65.85 per hour (time & one half) $85.31 per hour (double time).

Field Engineer - BC Instrument Person

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $50.50
Supplemental Benefit Rate per Hour: $46.38
Supplemental Note: Overtime Benefit Rate - $65.85 per hour (time & one half) $85.31 per hour (double time).

Field Engineer - BC Rodperson

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.86
Supplemental Benefit Rate per Hour: $46.38
Supplemental Note: Overtime Benefit Rate - $65.85 per hour (time & one half) $85.31 per hour (double time).

Overtime Description
Time and one half the regular rate after a 7 hour work and time and one half the regular rate for Saturday for the first seven hours worked, Double time the regular time rate for Saturday for work performed in excess of seven hours, Double time the regular rate for Sunday and Double time the regular rate for work on a holiday.

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day
Employees must work at least one day in the payroll week in which the holiday occurs to receive the paid holiday

(Operating Engineer Local #15-D)

ENGINEER - FIELD (HEAVY CONSTRUCTION)
(Construction of Roads, Tunnels, Bridges, Sewers, Building Foundations, Engineering Structures etc.)

Field Engineer - HC Party Chief

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $80.18
Supplemental Benefit Rate per Hour: $51.37
Supplemental Note: Overtime benefit rate - $73.21 per hour (time & one half), $95.05 per hour (double time).

Field Engineer - HC Instrument Person

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $56.72
Supplemental Benefit Rate per Hour: $51.37
Supplemental Note: Overtime benefit rate - $73.21 per hour (time & one half), $95.05 per hour (double time).

Field Engineer - HC Rodperson

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.30
Supplemental Benefit Rate per Hour: $51.37
Supplemental Note: Overtime benefit rate - $73.21 per hour (time & one half), $95.05 per hour (double time).

Field Engineer - HC Rodperson 1st Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.00
Supplemental Benefit Rate per Hour: $51.37
Supplemental Note: Overtime benefit rate - $73.21 per hour (time & one half), $95.05 per hour (double time).

Overtime Description
Time and one half the regular rate after an 8 hour day, Time and one half the regular rate for Saturday for the first eight hours worked, Double time the regular time rate for Saturday for work performed in excess of eight hours, Double time the regular rate for Sunday and Double time the regular rate for work on a holiday.

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day

Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day
Employees must work at least one day in the payroll week in which the holiday occurs to receive the paid holiday

(Operating Engineer Local #15-D)

ENGINEER - FIELD (STEEL ERECTION)

Field Engineer - Steel Erection Party Chief

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $76.11
Supplemental Benefit Rate per Hour: $49.70
Supplemental Note: Overtime benefit rate - $70.71 per hour (time & one half), $91.71 per hour (double time).

Field Engineer - Steel Erection Instrument Person

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $53.33
Supplemental Benefit Rate per Hour: $49.70
Supplemental Note: Overtime benefit rate - $70.71 per hour (time & one half), $91.71 per hour (double time).

Field Engineer - Steel Erection Rodperson

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $33.45
Supplemental Benefit Rate per Hour: $49.70
Supplemental Note: Overtime benefit rate - $70.71 per hour (time & one half), $91.71 per hour (double time).

Field Engineer - Steel Erection Rodperson 1st Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.00
Supplemental Benefit Rate per Hour: $49.70
Supplemental Note: Overtime benefit rate - $67.22 per hour (time & one half), $87.07 per hour (double time).

Overtime Description
Time and one half the regular rate for Saturday for the first eight hours worked.
Double time the regular rate for Saturday for work performed in excess of eight hours.

Overtime
Time and one half the regular rate after an 8 hour day.
Double time the regular rate for Sunday.

Double time the regular rate for work on the following holiday(s).

Paid Holidays

New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day
Employees must work at least one (1) day in the payroll week in which the holiday occurs to receive the paid holiday

(Operating Engineer Local #15-D)

ENGINEER - OPERATING

Operating Engineer - Road & Heavy Construction I

Back Filling Machines, Cranes, Mucking Machines and Dual Drum Paver.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $95.27
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $152.43

Operating Engineer - Road & Heavy Construction II

Backhoes, Power Shovels, Hydraulic Clam Shells, Steel Erection, Moles and machines of a similar nature.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $98.67
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $157.87

Operating Engineer - Road & Heavy Construction III

Mine Hoists (Cranes, etc. when used as Mine Hoists)

Effective Period: 7/1/2026 - 6/30/2027

Wage Rate per Hour: $101.86
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $162.98

Operating Engineer - Road & Heavy Construction IV

Gradealls, Keystones, Cranes on land or water (with digging buckets), Bridge Cranes, Vermeer Cutter and machines of a similar nature, Trenching Machines.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $99.37
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $158.99

Operating Engineer - Road & Heavy Construction V

Pile Drivers & Rigs (working alongside Dock Builder foreperson): Derrick Boats, Tunnel Shovels.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $97.41
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $155.86

Operating Engineer - Road & Heavy Construction VI

Mixers (Concrete with loading attachment), Concrete Pavers, Cableways, Land Derricks, Power Houses (Low Air Pressure Units).

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $92.51
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $148.02

Operating Engineer - Road & Heavy Construction VII

Barrier Movers, Barrier Transport and Machines of a Similar Nature.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $74.63
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $119.41

Operating Engineer - Road & Heavy Construction VIII

Utility Compressors

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $57.84
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $73.02

Operating Engineer - Road & Heavy Construction IX

Horizontal Boring Rig

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $87.98
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $140.77

Operating Engineer - Road & Heavy Construction X

Elevators (manually operated as personnel hoist).

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $80.83
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $129.33

Operating Engineer - Road & Heavy Construction XI

Compressors (Portable 3 or more in battery), Driving of Truck Mounted Compressors, Well-point Pumps, Tugger Machines Well Point Pumps, Churn Drill.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $62.68
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $100.29

Operating Engineer - Road & Heavy Construction XII

All Drills and Machines of a similar nature.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $93.50
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $149.60

Operating Engineer - Road & Heavy Construction XIII

Concrete Pumps, Concrete Plant, Stone Crushers, Double Drum Hoist, Power Houses (other than above).

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $90.57
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $144.91

Operating Engineer - Road & Heavy Construction XIV

Concrete Mixer

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $86.55
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $138.48

Operating Engineer - Road & Heavy Construction XV

Compressors (Portable Single or two in Battery, not over 100 feet apart), Pumps (River Cofferdam) and Welding Machines, Push Button Machines, All Engines Irrespective of Power (Power-Pac) used to drive auxiliary equipment, Air, Hydraulic, etc.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $58.23
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $93.17

Operating Engineer - Road & Heavy Construction XVI

Concrete Breaking Machines, Hoists (Single Drum), Load Masters, Locomotives (over ten tons) and Dinkies over ten tons, Hydraulic Crane-Second Engineer.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $82.63
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $132.21

Operating Engineer - Road & Heavy Construction XVII

On-Site concrete plant engineer, On-site Asphalt Plant Engineer, and Vibratory console.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $83.23
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Shift Wage Rate: $133.17

Operating Engineer - Road & Heavy Construction XVIII

Tower Crane

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $119.67
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $191.47

Operating Engineer - Paving I

Asphalt Spreaders, Autogrades (C.M.I.), Roto/Mil

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $92.51
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $148.02

Operating Engineer - Paving II

Asphalt Roller

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $90.14
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $144.22

Operating Engineer - Paving III

Asphalt Plants

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $76.11
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $121.78

Operating Engineer - Concrete I

Cranes

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $98.93
Supplemental Benefit Rate per Hour: $40.40

Supplemental Note: $74.50 overtime hours

Operating Engineer - Concrete II

Compressors

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $58.68
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Concrete III

Micro-traps (Negative Air Machines), Vac-All Remediation System.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $78.97
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Steel Erection I

Three Drum Derricks

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $103.35
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $165.36

Operating Engineer - Steel Erection II

Cranes, 2 Drum Derricks, Hydraulic Cranes, Fork Lifts and Boom Trucks.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $99.29
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $158.86

Operating Engineer - Steel Erection III

Compressors, Welding Machines.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $54.73
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $87.57

Operating Engineer - Steel Erection IV

Compressors - Not Combined with Welding Machine. (Public Works Only)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $52.08
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
Shift Wage Rate: $83.33

Operating Engineer - Building Work I

Forklifts, Plaster (Platform machine), Plaster Bucket, Concrete Pump and all other equipment used for hoisting material.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $74.34
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Building Work II

Compressors, Welding Machines (Cutting Concrete-Tank Work), Paint Spraying, Sandblasting, Pumps (with the exclusion of Concrete Pumps), All Engines irrespective of Power (Power-Pac) used to drive Auxiliary Equipment, Air, Hydraulic, Jacking System, etc.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $55.45
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Building Work III

Double Drum

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $94.79
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Building Work IV

Stone Derrick, Cranes, Hydraulic Cranes Boom Trucks.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $100.43
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Building Work V

Dismantling and Erection of Cranes, Relief Engineer.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $82.68
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Building Work VI

4 Pole Hoist, Single Drum Hoists.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $81.79
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours

Operating Engineer - Building Work VII

Rack & Pinion and House Cars

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $64.87
Supplemental Benefit Rate per Hour: $40.40
Supplemental Note: $74.50 overtime hours
For New House Car projects Wage Rate per Hour $51.61
For New House Car projects: Supplemental Benefit overtime hours: $74.50

Overtime Description
On jobs of more than one shift, if an Employee fails to report for work through any cause over which the Employer has no control, the Employee on duty will continue to work at the rate of single time.

For House Cars and Rack & Pinion only: Overtime paid at time and one-half for all hours in excess of eight hours in a day, Saturday, Sunday and Holidays worked.

Overtime
Double time the regular rate after an 8 hour day.
Double time the regular time rate for Saturday.
Double time the regular rate for Sunday.
Double time the regular rate for work on the following holiday(s).

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving

Christmas Day

Shift Rates

When two (2) or more shifts are employed, single time will be paid for each shift.
For Steel Erection Only: Shifts may be worked at the single time rate at other than the regular working hours (8:00 A.M. to 4:30 P.M.) on the following work ONLY: Heavy construction jobs on work below the street level, over railroad tracks and on building jobs.

(Operating Engineer Local #14)

FLAGGER

Flagger to be paid at the rate of the journeyperson or apprentice in the trade performing the underlying work.

In accordance with the Comptroller's Prevailing Wage Memorandum Regarding Flag Persons dated June 1, 2024, this title includes traffic control duty only for City public works contracts and subcontracts solicited on or after July 1, 2024.

On City public works contracts and subcontracts solicited on or after July 1, 2024, traffic control worker to be paid at the rate of the journeyperson or apprentice in the trade performing the underlying work.

If the trade performing the underlying work does not regularly employ a flagger or traffic control worker, then one of the following titles must be used on such projects:
Laborer - Heavy & Highway
Laborer - Paver & Roadbuilder
Laborer - Paver & Roadbuilder Line Striping (Roadway)

FLOOR COVERER

(Interior vinyl composition tile, sheath vinyl linoleum and wood parquet tile including site preparation and synthetic turf not including site preparation)

Floor Coverer

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $60.05
Supplemental Benefit Rate per Hour: $50.83

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Day after Thanksgiving
Day before Christmas
Christmas Day
Day before New Year's Day

Shift Rates
Two shifts may be utilized with the first shift working 8 a.m. to the end of the shift at straight time rate of pay. The wage rate for the second shift consisting of 7 hours shall be paid at 114.29% of straight time wage rate. The wage rate for the second shift consisting of 8 hours shall be paid 112.5% of the straight time wage rate. When it is not possible to conduct alteration or repair work during regular working hours in a building occupied by tenants, the rule for the second shift will apply.

(Carpenters District Council)

GLAZIER
(New Construction, Remodeling, and Alteration)

Glazier

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.72
Supplemental Benefit Rate per Hour: $60.05

Supplemental Note: Supplemental benefit contributions are to be made at the applicable overtime rates.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

DC9 (Local #1087)

GLAZIER - REPAIR & MAINTENANCE
(For the Installation of Glass - All repair and maintenance work on a particular building.)

Craft Jurisdiction for repair, maintenance and fabrication

Plate glass replacement, Storm windows and storm doors, Herculite door repairs, Door closer repairs, Glass tinting.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.32
Supplemental Benefit Rate per Hour: $28.68

Overtime
Time and one half the regular rate after an 8 hour day.
Double time the regular rate for Sunday.
Time and one half the regular rate for work on the following holiday(s).
Time and one half the regular hourly rate after 40 straight time hours in any work week.

Paid Holidays
New Year's Day
President's Day
Memorial Day

Independence Day
Labor Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day
Employees must work at least one day in the payroll week in which the holiday occurs to receive the paid holiday

DC9 (Local #1087)

HAZARDOUS MATERIAL HANDLER
(Removal, abatement, encapsulation or decontamination of asbestos, lead, mold, or other toxic or hazardous waste/materials)

Handler

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.00
Supplemental Benefit Rate per Hour: $26.27

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Sunday.
Time and one half the regular hourly rate after 40 straight time hours in any work week.

Overtime Holidays
Time and one half the regular rate for work on the following holiday(s).
New Year's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Veteran's Day
Thanksgiving Day
Christmas Day
Easter

Paid Holidays
None

(Local #78 and Local #12A)

HEAT AND FROST INSULATOR

Heat & Frost Insulator

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $73.21
Supplemental Benefit Rate per Hour: $37.81

Overtime Description
Supplemental Benefit contributions are to be made at the applicable overtime rates.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Triple time the regular rate for work on the following holiday(s).
Labor Day

Paid Holidays
None

Shift Rates
The first shift shall work seven hours at the regular straight time rate. The second and third shift shall work seven hours the regular straight time hourly rate plus a fourteen percent wage and benefit premium. There must be a first shift to work the second shift, and a second shift to work the third shift. Off-hour jobs in occupied buildings may be worked on weekdays with an increment of one-dollar ($1.00) per hour and eight (8) hours pay for seven (7) hours worked.

(Local #12) (BCA)

HOUSE WRECKER
(TOTAL DEMOLITION)

House Wrecker - Tier A

On all work sites the first, second, eleventh and every third House Wrecker thereafter will be Tier A House Wreckers (i.e. 1st, 2nd, 11th, 14th etc). Other House Wreckers may be Tier B House Wreckers.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.60
Supplemental Benefit Rate per Hour: $32.80

House Wrecker - Tier B

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $29.83
Supplemental Benefit Rate per Hour: $25.21

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

(Mason Tenders District Council)

IRON WORKER - ORNAMENTAL

Iron Worker - Ornamental

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.65
Supplemental Benefit Rate per Hour: $69.29
Supplemental Note: Supplemental benefits are to be paid at the applicable overtime rate when overtime is in effect.

Overtime Description
Monday through Friday- the first eight hours are paid at straight time, the 9th and 10th hours are paid at time and one-half the regular rate, all additional weekday overtime is paid at double the regular rate. Saturdays- the first eight hours are paid at time and one-half the regular rate, double time thereafter. Sunday-all shifts are paid at double time. Four Days a week at Ten (10) hours straight time is allowed.

Overtime
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
When two or three shifts are employed on a job, Monday through Friday, each shift will be paid eight (8) hours at the straight time rate for eight (8) hours of work; at time and one-half the regular straight time rate for the first two (2) hours of overtime worked beyond eight (8) hours; and at double time for all work thereafter. When it is not possible to conduct alteration or repair work during regular working hours in a building occupied by tenants, eight (8) hours will be paid at straight time rate for seven (7) hours of work, and all overtime shall be paid at time and one-half the regular straight time rates. On Saturday, Sundays and Holidays, time and one-half the regular straight time rate shall be paid for all work up to seven (7) hours and double time shall be paid for all work thereafter.

(Local #580)

IRON WORKER - STRUCTURAL

Iron Worker - Structural

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $59.45
Supplemental Benefit Rate per Hour: $94.63
Supplemental Note: Supplemental benefits are to be paid at the applicable overtime rate when overtime is in effect.

Overtime Description

Monday through Friday- the first eight hours are paid at straight time, the 9th and 10th hours are paid at time and one-half the regular rate, all additional weekday overtime is paid at double the regular rate. Saturdays- the first eight hours are paid at time and one-half the regular rate, double time thereafter. Sunday-all shifts are paid at double time. Four Days a week at Ten (10) hours straight time is allowed.

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays

Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays

1/2 day on Christmas Eve if work is performed in the A.M.
1/2 day on New Year's Eve if work is performed in the A.M.

Shift Rates

Monday through Friday - First Shift: First eight hours are paid at straight time, the 9th & 10th hours are paid at time and a half, double time paid thereafter. Second and third Shifts: First eight hours are paid at time and one-half, double time thereafter. Saturdays: All shifts, first eight hours paid at time and one-half, double time thereafter: Sunday all shifts are paid at double time.

Four (4), ten (10) hour days may be worked at straight time during a week, Monday thru Thursday.

(Local #40 & #361)

LABORER – HEAVY & HIGHWAY
(Foundation, Concrete, Excavating, Street Pipe Layer and Common)

Laborer - Heavy & Highway

Excavation and foundation work for buildings, heavy construction, street pipe laying, engineering work, and hazardous waste removal in connection with the above work. Landscaping tasks in connection with heavy construction work, engineering work and building projects. Projects include, but are not limited to pollution plants, sewers, parks, subways, bridges, highways, etc. In accordance with the Comptroller's Prevailing Wage Memorandum Regarding Flag Persons dated June 1, 2024, for City public work contracts and subcontracts solicited on or after July 1, 2024 only, includes traffic control duty associated with such projects.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.60
Supplemental Benefit Rate per Hour: $57.77

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Memorial Day
Independence Day
Columbus Day
Christmas Day

Triple time the regular rate for work on the following holiday(s).
Labor Day
Thanksgiving Day

Paid Holidays
Labor Day
Thanksgiving Day

Shift Rates
When two shifts are employed, single time rate shall be paid for each shift. When three shifts are found necessary, each shift shall work seven and one half hours (7 ½), but shall be paid for eight (8) hours of labor, and be permitted one half hour for lunch.

(Local #731)

LABORER - PAVER & ROADBUILDER

Laborer - Paver & Roadbuilder

Paving and road construction work, regardless of material used, including but not limited to preparation of job sites, removal of old surfaces, asphalt and/or concrete, by whatever method, including but not limited to milling; laying of concrete; laying of asphalt for temporary, patchwork, and utility paving (but not production paving); site preparation and incidental work for installation of rubberized materials and similar surfaces; installation and repair of temporary construction fencing; slurry/seal coating, paving stones, maintenance of safety surfaces; play equipment installation, and other related work. In accordance with the Comptroller's Prevailing Wage Memorandum Regarding Flag Persons dated June 1, 2024, for City public work contracts and subcontracts solicited on or after July 1, 2024 only, includes traffic control duty associated with such projects.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.98

Supplemental Benefit Rate per Hour: $56.65
Supplemental Note: For time and one half overtime - $61.53 For double overtime - $66.40

Paver & Roadbuilder - Formsetter

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $50.85
Supplemental Benefit Rate per Hour: $56.65
Supplemental Note: For time and one half overtime - $61.53 For double overtime - $66.40

Production Paver & Roadbuilder - Shoveler

General laborer (except removal of surfaces - see Paver and Roadbuilder-Laborer) including but not limited to tamper, AC paint and liquid tar work.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.98
Supplemental Benefit Rate per Hour: $56.65
Supplemental Note: For time and one half overtime - $61.53 For double overtime - $66.40

Production Paver & Roadbuilder - Raker

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $50.85
Supplemental Benefit Rate per Hour: $56.65
Supplemental Note: For time and one half overtime - $61.53 For double overtime - $66.40

Production Paver & Roadbuilder - Screed Person

(Production paving is asphalt paving when using a paving machine or on a project where a paving machine is traditionally used)

Adjustment of paving machinery on production paving jobs.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $51.45
Supplemental Benefit Rate per Hour: $56.65
Supplemental Note: For time and one half overtime - $61.53 For double overtime - $66.40

Overtime Description

If an employee works New Year's Day or Christmas Day, they receive the single time rate plus 25%.

For Paid Holidays: Holiday pay for all holidays shall be prorated based two hours per day for each day worked in the holiday week, not to exceed 8 hours of holiday pay.

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays

Double time the regular rate for work on the following holiday(s).
Memorial Day
Independence Day
Labor Day
Columbus Day
Thanksgiving Day

Paid Holidays

Memorial Day
Independence Day
Labor Day
Thanksgiving Day

Shift Rates

When two shifts are employed, the work period for each shift shall be a continuous eight (8) hours. When three shifts are employed, each shift will work seven and one half (7 ½) hours but will be paid for eight (8) hours at the straight time rate since only one half (1/2) hour is allowed for meal time.
When two or more shifts are employed, single time will be paid for each shift.

(Local #1010)

LABORER - PAVER & ROADBUILDER LINE STRIPING (ROADWAY)

(Road markings, applications of striping and surface coatings on Roadways, Bus lanes, Bike lanes & Pedestrian Plazas)

Striping - Machine Operator (Thermoplastic & Epoxy)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $43.00
Supplemental Benefit Rate per Hour: $25.77
Supplemental Note: For time and one half overtime - $28.02 For double overtime - $30.27

Lineperson - Crew Chief

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $47.00
Supplemental Benefit Rate per Hour: $25.77
Supplemental Note: For time and one half overtime - $28.02 For double overtime - $30.27

Laborer: Striping Assistant - Green Infrastructure - Traffic Control

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $41.00

Supplemental Benefit Rate per Hour: $25.77
Supplemental Note: For time and one half overtime - $28.02 For double overtime - $30.27

Overtime Description
For Paid Holidays: Employees will only receive Holiday Pay for holidays not worked if said employee worked both the regularly scheduled workday before and after the holiday.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.
Time and one half the regular rate for work on the following holiday(s).

Paid Holidays
New Year's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Shift Rates
Vacation
As of January 1, 2026, Vacation removed and its value was incorporated in the Supplemental Benefit rate above.

Vacation
Vacation Employees with one to two years service shall accrue vacation based on hours worked: 250 hours worked - 1 day vacation; 500 hours worked - 2 days vacation; 750 hours worked - 3 days vacation; 900 hours worked - 4 days vacation; 1,000 hours worked - 5 days vacation. Employees with two to five years service receive two weeks vacation. Employees with five to twenty years service receive three weeks vacation. Employees with twenty to twenty-five years service receive four weeks vacation. Employees with 25 or more years service receive five weeks vacation.

(Local #1010)

LANDSCAPING

Landscaper (Year 6 and above)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.66
Supplemental Benefit Rate per Hour: $18.55

Landscaper (Year 3 - 5)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.39
Supplemental Benefit Rate per Hour: $18.55

Landscaper (up to 3 years)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $36.19
Supplemental Benefit Rate per Hour: $18.55

Groundsperson

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $36.19
Supplemental Benefit Rate per Hour: $18.55

Tree Remover / Pruner

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $47.08
Supplemental Benefit Rate per Hour: $18.55

Landscaper Sprayer (Pesticide Applicator)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.28
Supplemental Benefit Rate per Hour: $18.55

Watering - Plant Maintainer

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.85
Supplemental Benefit Rate per Hour: $18.55

Overtime Description
For all overtime work performed, supplemental benefits shall include an additional seventy-five ($0.75) cents per hour.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Time and one half the regular rate for work on a holiday plus the day's pay.

Paid Holidays
New Year's Day
Memorial Day
Independence Day

Labor Day
Thanksgiving Day
Christmas Day

Shift Rates

Work performed on a 4pm to 12am shift has a 15% differential. Work performed on a 12am to 8am shift has a 20% differential.

(Local #175)

MARBLE MECHANIC

Marble Setter

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $60.21
Supplemental Benefit Rate per Hour: $44.96

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $60.61
Supplemental Benefit Rate per Hour: $45.31

Marble Finisher

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $46.17
Supplemental Benefit Rate per Hour: $41.91

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $46.49
Supplemental Benefit Rate per Hour: $42.11

Marble Polisher

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $45.11
Supplemental Benefit Rate per Hour: $35.01

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $45.47
Supplemental Benefit Rate per Hour: $35.21

Marble Maintenance Finisher

Effective Period: 7/1/2026 - 7/1/2026

Wage Rate per Hour: **$28.30**
Supplemental Benefit Rate per Hour: **$15.94**

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: **$28.56**
Supplemental Benefit Rate per Hour: **$16.09**

Overtime Description
Supplemental Benefit contributions are to be made at the applicable overtime rates.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

(Local #7)

MASON TENDER
Building Laborer

Mason Tender

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$42.55**
Supplemental Benefit Rate per Hour: **$34.64**

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays

Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays

None

Shift Rates

The employer may work two (2) shifts with the first shift at the straight time wage rate and the second shift receiving 114.3% of straight time on wage rate and fringe benefit rate. When it is not possible to conduct alteration work during regular working hours in a building occupied by tenants, the rule for the second shift will apply.

(Local #79)

MASON TENDER (INTERIOR DEMOLITION WORKER)

Mason Tender Tier A

Tier A Interior Demolition Worker performs all burning, chopping, and other technically skilled tasks related to interior demolition work.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.40
Supplemental Benefit Rate per Hour: $26.89

Mason Tender Tier B

Tier B Interior Demolition Worker performs manual work and work incidental to demolition work, such as loading and carting of debris from the work site to an area where it can be loaded in to bins/trucks for removal.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.59
Supplemental Benefit Rate per Hour: $21.21

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

(Local #79)

METALLIC LATHER

Metallic Lather

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $47.85
Supplemental Benefit Rate per Hour: $57.11
Supplemental Note: For time and one half overtime - $69.11 For double overtime - $90.51

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Thanksgiving Day
Christmas Day

Paid Holidays
1/2 day on Christmas Eve if work is performed in the A.M.

1/2 day on New Year's Eve if work is performed in the A.M.

Shift Rates
Off-shift work outside of normal working hours shall receive straight time rate plus $12 per hour for the first eight (8) hours.

(Local #46)

MILLWRIGHT

Millwright

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $62.03
Supplemental Benefit Rate per Hour: $59.98

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Veteran's Day
Thanksgiving Day
Christmas Day

Paid Holidays
1/2 day on Christmas Eve if work is performed in the A.M.
1/2 day on New Year's Eve if work is performed in the A.M.

Shift Rates
Second and third shifts receives the straight time rate of pay plus fifteen (15%) percent allowing for one half hour for a meal. There must be a first shift to work a second and third shift. All additional hours worked shall be paid at the time and one-half rate of pay plus fifteen (15%) percent for weekday hours.

(Local #740)

MOSAIC MECHANIC

Mosaic Mechanic - Mosaic & Terrazzo Mechanic

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $55.82
Supplemental Benefit Rate per Hour: $49.47

Mosaic Mechanic- Mosaic & Terrazzo Mechanic / Machine Operator Grinder

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $54.22
Supplemental Benefit Rate per Hour: $49.47

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

(Local #7)

PAINTER

Painter - Brush & Roller

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $45.50
Supplemental Benefit Rate per Hour: $45.72
Supplemental Note: Supplemental benefits for time and one half overtime - $54.78, For double overtime - $63.83

Spray & Scaffold / Decorative / Sandblast

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.50
Supplemental Benefit Rate per Hour: $45.72
Supplemental Note: Supplemental benefits for time and one half overtime - $54.78, For double overtime - $63.83

Overtime
Time and one half the regular rate after a 7 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

(District Council of Painters #9)

PAINTER - BRIDGE & STRUCTURAL STEEL

Painters on Structural Steel

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $57.00
Supplemental Benefit Rate per Hour: $57.21

Painter - Power Tool

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $64.00

Supplemental Benefit Rate per Hour: $57.21
Overtime Wage Rate: $7.00 above the "Painters on Structural Steel" overtime rate.

Overtime Description
Supplemental Benefits shall be paid for each hour worked, up to forty (40) hours per week for the period of May 1st to November 15th or up to fifty (50) hours per week for the period of November 16th to April 30th.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
Second shift is paid at regular hourly wage rates plus a ten percent (10%) differential. There must be a first shift to work a second shift.

(Local #806)

PAINTER - METAL POLISHER

METAL POLISHER

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $35.00
Supplemental Benefit Rate per Hour: $12.84

METAL POLISHER - NEW CONSTRUCTION

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $35.95
Supplemental Benefit Rate per Hour: $12.84

METAL POLISHER - SCAFFOLD OVER 34 FEET

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.50
Supplemental Benefit Rate per Hour: $12.84

ASSISTANT METAL POLISHER

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.19
Supplemental Benefit Rate per Hour: $12.47

ASSISTANT METAL POLISHER - NEW CONSTRUCTION

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.94
Supplemental Benefit Rate per Hour: $12.47

ASSISTANT METAL POLISHER - SCAFFOLD OVER 34 FEET

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $29.69
Supplemental Benefit Rate per Hour: $12.47

Overtime Description
All work performed on Saturdays shall be paid at time-in-a half. The exception being; for suspended scaffold work and work deemed as a construction project; an eight (8) hour shift lost during the week due to circumstances beyond the control of the employer, up to a maximum of eight (8) hours per week, may be worked on Saturday at the straight time rate.

Holiday Pay
Double time the regular rate for work on the following Holiday plus the day's pay. Only employees who have completed one year of service, including any trial period shall be eligible for holiday pay.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day

Day after Thanksgiving
Christmas Day

Shift Rates
Four Days a week at Ten (10) hours straight a day.

Local 8A-28A

PAINTER - SIGN

Sign Painter

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.39
Supplemental Benefit Rate per Hour: $29.75

Assistant Sign Painter

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $41.98
Supplemental Benefit Rate per Hour: $29.04

Overtime Description
If any employee is required to work on any of the paid holidays then the employee shall receive double time rate of wages as well as the holiday pay for that day.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Paid Holidays
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Election Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day
Personal Day

Vacation
At least 1 year of employment.....1 week

2 years or more of employment.....2 weeks
8 years or more of employment.....3 weeks

(Local #8A-28A)

PAPERHANGER

Paperhanger

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.02
Supplemental Benefit Rate per Hour: $46.90
Supplemental Note: Supplemental benefits for time and one half overtime - $55.87, For double overtime - $64.84

Overtime
Time and one half the regular rate after a 7 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

Shift Rates
None

(District Council of Painters #9)

PLASTERER

Plasterer

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.51
Supplemental Benefit Rate per Hour: $32.78

Plasterer II

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $32.11
Supplemental Benefit Rate per Hour: $16.70

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
When it is not possible to conduct work during regular working hours (between 6:00am and 4:30pm), a shift differential shall be paid at the regular hourly rate plus a twelve percent (12%) per hour differential. Workers on shift work shall be allowed a paid one-half hour meal break.

(Local #262)

PLASTERER - TENDER

Plasterer - Tender

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $42.55
Supplemental Benefit Rate per Hour: $34.64

Overtime
Time and one half the regular rate after an 8 hour day.

Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
When work commences outside regular work hours, workers receive an hour additional (differential) wage and supplement payment. Eight hours pay for seven hours work or nine hours pay for eight hours work.

(Mason Tenders District Council)

PLUMBER

Plumber

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $78.05
Supplemental Benefit Rate per Hour: $46.40
Supplemental Note: Double time shall be paid for supplemental benefits during overtime work.

Plumber - Temporary Services

Temporary Services - When there are no Plumbers on the job site, there may be three shifts designed to cover the entire twenty-four hour period, including weekends if necessary, at the following rate straight time.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $62.52
Supplemental Benefit Rate per Hour: $37.04
Supplemental Note: Double time shall be paid for supplemental benefits during overtime work.

Overtime Description
Where the plumbing contract price is one and one half million dollars ($1,500,000.00) or less, double time the regular rate after an 8 hour day.

Overtime
Double time the regular rate after a 7 hour day.
Double time the regular time rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Shift Rates
Shift work, when directly specified in public agency or authority contract documents, and continues for a period of not less than ten (10) consecutive work days. A shift shall consist of seven (7) hours with one-half (1/2) hour for lunch after the first four (4) hours of each shift. A premium of thirty percent (30%) for wages and supplemental benefits on shift work performed Monday through Friday on the 4 P.M. and midnight shifts. For shift work performed on weekends the shift premium shall be fifty percent (50%) of wages and supplemental benefits. For shift work performed on holidays designated below, double time wages and supplemental benefits shall be paid. Also noted that the normal workday Monday through Friday 8:00 A.M. to 3:30 P.M. is not considered shift work, and therefore not subject to shift premium.

(Plumbers Local #1)

PLUMBER (MECHNICAL EQUIPMENT AND SERVICE)
Mechanical Equipment and Service work is any repair and/or replacement of the present plumbing system that does not change existing roughing or water supply lines. Projects regardless of work type which have approved plans and specifications wherein the plumbing exceeds $725,000 are excluded.

Plumber

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.90
Supplemental Benefit Rate per Hour: $22.86

Overtime
Time and one half the regular rate after an 8 hour day.

Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

(Plumbers Local # 1)

PLUMBER (RESIDENTIAL RATES FOR 1, 2 AND 3 FAMILY HOME CONSTRUCTION)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $54.25
Supplemental Benefit Rate per Hour: $33.21

Overtime
Double time the regular rate after an 8 hour day.
Double time the regular time rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

Shift Rates

Shift work, when directly specified in public agency or authority contract documents, and continues for a period of not less than ten (10) consecutive work days. A shift shall consist of seven (7) hours with one-half (1/2) hour for lunch after the first four (4) hours of each shift. A premium of thirty percent (30%) for wages and supplemental benefits on shift work performed Monday through Friday on the 4 P.M. and midnight shifts. For shift work performed on weekends the shift premium shall be fifty percent (50%) of wages and supplemental benefits. For shift work performed on holidays designated below, double time wages and supplemental benefits shall be paid. Also noted that the normal workday Monday through Friday 8:00 A.M. to 3:30 P.M. is not considered shift work, and therefore not subject to shift premium.

(Plumbers Local #1)

PLUMBER: PUMP & TANK

Oil Trades (Installation and Maintenance)

Plumber - Pump & Tank

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $75.00
Supplemental Benefit Rate per Hour: $35.81

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays

Time and one half the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Election Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays

None

Shift Rates

All work outside the regular workday (8:00 A.M. to 4:30 P.M.) is to be paid at time and one half the regular hourly rate

(Plumbers Local #1)

POINTER, WATERPROOFER, CAULKER, SANDBLASTER, STEAMBLASTER
(Exterior Building Renovation)

Journeyperson

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $66.58
Supplemental Benefit Rate per Hour: $33.85

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Time and one half the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
All work outside the regular work day (an eight hour workday between the hours of 6:00 A.M. and 4:00 P.M.) is to be paid at time and one half the regular rate. However, the employer may establish one (1) or two (2) shifts starting at or after 4:00 P.M. to be paid at the regular hourly rate plus a 10% differential. For projects bid and performed after July 1, 2023, the first shift shall be paid at the regular hourly rate plus a 5% differential.

(Bricklayer District Council)

ROOFER

Roofer

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $52.50
Supplemental Benefit Rate per Hour: $40.03

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays
Time and one half the regular rate for work on the following holiday(s).
New Year's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
Second shift - Regular hourly rate plus a 10% differential. Third shift - Regular hourly rate plus a 15% differential. There must be a first shift to work the second shift, and a second shift to work the third shift. All other work outside the regular work day (an eight hour workday between the hours of 5:00 A.M. and 4:00 P.M.) is to be paid at time and one half the regular rate.

(Local #8)

SHEET METAL WORKER

Sheet Metal Worker

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $57.08
Supplemental Benefit Rate per Hour: $60.70
Supplemental Note: Supplemental benefit contributions are to be made at the applicable overtime rates.

Sheet Metal Worker - Fan Maintenance

(The temporary operation of fans or blowers in new or existing buildings for heating and/or ventilation, and/or air conditioning prior to the completion of the project.)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $45.66
Supplemental Benefit Rate per Hour: $60.70

Sheet Metal Worker - Duct Cleaner

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $21.00
Supplemental Benefit Rate per Hour: $13.06

Overtime Description
Double time the regular rate after 10 hours on Saturday.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day
Juneteenth

Paid Holidays
None

Shift Rates
Work that can only be performed outside regular working hours (eight hours of work between 7:30 A.M. and 3:30 P.M.) - First shift (work between 3:30 P.M. and 11:30 P.M.) - 10% differential above the established hourly rate. Second shift (work between 11:30 P.M. and 7:30 A.M.) - 15% differential above the established hourly rate.

For Fan Maintenance: On all full shifts of fan maintenance work the straight time hourly rate of pay will be paid for each shift, including nights, Saturdays, Sundays, and holidays.

(Local #28)

SHEET METAL WORKER - SPECIALTY
(Decking & Siding)

Sheet Metal Specialty Worker

The first worker to perform this work must be paid at the rate of the Sheet Metal Worker. The second and third workers shall be paid the Specialty Worker Rate. The ratio of One Sheet Metal Worker, then Two Specialty Workers shall be utilized thereafter.

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $52.54
Supplemental Benefit Rate per Hour: $31.61
Supplemental Note: Supplemental benefit contributions are to be made at the applicable overtime rates.

Overtime Description
Double time the regular rate after 10 hours on Saturday.

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Christmas Day
Juneteenth

Paid Holidays
None

(Local #28)

SHIPYARD WORKER

Shipyard Mechanic - First Class

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $33.06
Supplemental Benefit Rate per Hour: $3.04

Shipyard Mechanic - Second Class

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.89
Supplemental Benefit Rate per Hour: $2.26

Shipyard Laborer - First Class

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.74
Supplemental Benefit Rate per Hour: $3.28

Shipyard Laborer - Second Class

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.92
Supplemental Benefit Rate per Hour: $2.41

Shipyard Dockhand - First Class

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.65
Supplemental Benefit Rate per Hour: $3.27

Shipyard Dockhand - Second Class

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $20.78
Supplemental Benefit Rate per Hour: $3.20

Overtime Description

Work performed on holiday is paid double time the regular hourly wage rate plus holiday pay.

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Time and one half the regular hourly rate after 40 straight time hours in any work week.

Paid Holidays

New Year's Day
Martin Luther King Jr. Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Based on Survey Data

SIGN ERECTOR
(Sheet Metal, Plastic, Electric, and Neon)

Sign Erector

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $58.00
Supplemental Benefit Rate per Hour: $63.44

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.
Time and one half the regular rate for work on the following holiday(s).

Paid Holidays

New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Election Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Shift Rates

Time and one half the regular hourly rate is to be paid for all hours worked outside the regular workday either (7:00 A.M. through 2:30 P.M.) or (8:00 A.M. through 3:30 P.M.)

(Local #137)

STEAMFITTER

Steamfitter

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $61.80
Supplemental Benefit Rate per Hour: $64.89
Supplemental Note: Overtime supplemental benefit rate for double time: $129.04. For time & half: $96.97

Steamfitter -Temporary Services

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.97
Supplemental Benefit Rate per Hour: $52.50

Overtime
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Time and one half the regular rate for work on the following holiday(s).
New Year's Day
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

The single time rate plus 15%.
Martin Luther King Jr. Day
President's Day
Columbus Day
Veteran's Day

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Christmas Day

Shift Rates
When shift work is performed the wage rate for regular time worked is a 15% percent premium on wage.

Local 638

STEAMFITTER - REFRIGERATION AND AIR CONDITIONER
(Maintenance and Installation Service Person)

Refrigeration and Air Conditioner Mechanic

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.35
Supplemental Benefit Rate per Hour: $23.46

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Independence Day
Labor Day
Veteran's Day
Thanksgiving Day
Christmas Day

Double time and one half the regular rate for work on the following holiday(s).
Martin Luther King Jr. Day
President's Day
Memorial Day
Columbus Day

Paid Holidays
New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day

Christmas Day

(Local #638-B)

STONE MASON - SETTER

Stone Mason - Setter

(Assisted by Derrickperson and Rigger)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $62.52
Supplemental Benefit Rate per Hour: $56.92

Overtime Description
Monday through Friday: Time and one quarter after seven hours worked. Time and one half after eight hours worked. Double time after 9 hours worked.
Saturday: Time and one half for the first nine hours worked. Double time after 9 hours worked.
Sunday and Holiday: double time for all hours worked.
Site Work: (paving and base course) paid at straight time for the first eight hours.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Thanksgiving Day
Christmas Day

Paid Holidays
1/2 day on Christmas Eve if work is performed in the A.M.

Shift Rates
For all hours worked outside 8:00 am to 3:30 pm shall be paid double time unless flex band hours and/or site work are in use.

(Bricklayers District Council)

TAPER

Drywall Taper

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.01
Supplemental Benefit Rate per Hour: $37.67
Supplemental Note: Supplemental benefits for time and one half overtime - $42.80, For double overtime - $75.34

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Good Friday
Memorial Day
Independence Day
Columbus Day
Thanksgiving Day
Day before Christmas
Christmas Day
Day before New Year's Day

(Local #1974)

TELECOMMUNICATION WORKER
(Install/maintain/repair telecommunications cables carrying data, video, and/or voice except for installation on building construction/alteration/renovation projects.)

Telecommunication Worker

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $47.03
Supplemental Benefit Rate per Hour: $23.15
Supplemental Note: The above rate applies for Manhattan, Bronx, Brooklyn, Queens. $22.84 for Staten Island only.

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Time and one half the regular rate for Sunday.

Overtime Holidays

Time and one half the regular rate for work on the following holiday(s).
New Year's Day
Lincoln's Birthday
Washington's Birthday
Memorial Day
Independence Day
Labor Day
Columbus Day
Election Day
Veteran's Day
Thanksgiving Day
Christmas Day

Paid Holidays

New Year's Day
Lincoln's Birthday
Washington's Birthday
Memorial Day
Independence Day
Labor Day
Columbus Day
Election Day
Veteran's Day
Thanksgiving Day
Christmas Day
Employees have the option of observing either Martin Luther King's Birthday or the day after Thanksgiving instead of Lincoln's Birthday

Shift Rates

For any workday that starts before 8A.M. or ends after 6P.M. there is a 10% differential for the applicable worker's hourly rate.

Vacation

After 6 months.....one week.
After 12 months but less than 7 years.....two weeks.
After 7 or more but less than 15 years.....three weeks.
After 15 years or more but less than 25 years.....four weeks.

(C.W.A.)

TILE FINISHER

Tile Finisher

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $50.93
Supplemental Benefit Rate per Hour: $34.66

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays
Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Paid Holidays
None

Shift Rates
Off shift work day (work performed outside the regular 8:00 A.M. to 3:30 P.M. workday): shift differential of one and one quarter (1¼) times the regular straight time rate of pay for the seven hours of actual off-shift work.

(Local #7)

TILE LAYER - SETTER

Tile Layer - Setter

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $66.35
Supplemental Benefit Rate per Hour: $38.06

Overtime
Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.

Overtime Holidays

Double time the regular rate for work on the following holiday(s).
New Year's Day
Martin Luther King Jr. Day
President's Day
Good Friday
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving
Christmas Day

Shift Rates

Off shift work day (work performed outside the regular 8:00 A.M. to 3:30 P.M. workday): shift differential of one and one quarter (1¼) times the regular straight time rate of pay for the seven hours of actual off-shift work.

(Local #7)

TIMBERPERSON

Timberperson

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $57.59
Supplemental Benefit Rate per Hour: $57.41

Overtime

Time and one half the regular rate after an 8 hour day.
Time and one half the regular rate for Saturday.
Double time the regular rate for Sunday.
Saturday may be used as a make-up day at straight time when a day is lost during that week to inclement weather.

Overtime Holidays

Double time the regular rate for work on the following holiday(s).
New Year's Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Presidential Election Day
Thanksgiving Day
Christmas Day

Paid Holidays
None

Shift Rates
Off shift work commencing between 5:00 P.M. and 11:00 P.M. shall work eight and one half hours allowing for one half hour for lunch. The wage rate shall be 113% of the straight time hourly wage rate. Benefits for off-shift work shall be paid at the straight time rate.

(Local #1556)

TUNNEL WORKER

Blasters, Mucking Machine Operators (Compressed Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $75.14
Supplemental Benefit Rate per Hour: $66.51

Tunnel Workers (Compressed Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $72.46
Supplemental Benefit Rate per Hour: $64.41

Top Nipper (Compressed Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $71.24
Supplemental Benefit Rate per Hour: $63.14

Outside Lock Tender, Outside Gauge Tender,Muck Lock Tender (Compressed Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $69.83
Supplemental Benefit Rate per Hour: $62.11

Bottom Bell & Top Bell Signal Person: Shaft Person (Compressed Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $69.83
Supplemental Benefit Rate per Hour: $62.11

Changehouse Attendant: Powder Watchperson (Compressed Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $61.57
Supplemental Benefit Rate per Hour: $58.18

Blasters (Free Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $71.69
Supplemental Benefit Rate per Hour: $63.84

Tunnel Workers (Free Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $68.58
Supplemental Benefit Rate per Hour: $61.18

All Others (Free Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $63.40
Supplemental Benefit Rate per Hour: $56.62

Microtunneling (Free Air Rates)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $54.86
Supplemental Benefit Rate per Hour: $48.95

Overtime Description

For work performed during excavation and primary concrete tunnel lining phases - Double time the regular rate after an 8 hour day and Saturday, Sunday and on the following holiday(s) listed below.
For Repair-Maintenance Work on Existing Equipment and Facilities - Time and one half the regular rate after a 8 hour day, Saturday, Sunday and double time the regular rate for work on the following holiday(s) listed below.
For Small-Bore Micro Tunneling Machines - Time and one-half the regular rate shall be paid for all overtime.
For work not listed above - Time and one half the regular rate after an 8 hour day and Saturday and double time the regular rate on Sunday and on the following holiday(s) listed below.

Paid Holidays

New Year's Day
Martin Luther King Jr. Day
President's Day
Memorial Day
Independence Day
Labor Day
Columbus Day
Veteran's Day
Thanksgiving Day
Day after Thanksgiving

Christmas Day

(Local #147)

UTILITY LOCATOR
(Locate & mark underground utilities including gas for street excavation and utility line repairs)

Utility Locator (Months Over 60)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.03
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 55-60)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $35.83
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 49-54)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.07
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 43-48)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $32.30
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 37-42)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.54
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 31-36)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.78

Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 25-30)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.02
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 19-24)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.26
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 13-18)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.50
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 7-12)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $21.74
Supplemental Benefit Rate per Hour: $1.43

Utility Locator (Months 0-6)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.98
Supplemental Benefit Rate per Hour: $1.43
Supplemental Note: No Benefits for the first 90 days of employment.

Overtime
Time and one half the regular rate for work on the following holiday(s).
Time and one half the regular hourly rate after 40 straight time hours in any work week.

Paid Holidays
New Year's Day
Memorial Day
Independence Day
Thanksgiving Day
Christmas Day

Shift Rates
10% shift differential to employees working any shift starting between noon and 5 AM.

Vacation
For up to 1 year 0 hours

For year 1 - 2 48 hours per year
For year 3 - 9 96 hours per year
For year 10 or more 144 hours per year

Sick Days:
For up to 1 year employee receives 40 hours paid sick leave.
For year 1 employee earns 2 hours of paid sick leave for every 100 overtime hours worked.
For year 2 - 9 years employee earns 4 hours of paid sick leave for every 100 overtime hours worked.
For year 10 or more employee earns 6 hours of paid sick leave for every 100 overtime hours worked.

(C.W.A.)

WELDER

WELDER AND FIREWATCH TO BE PAID AT THE RATE OF THE JOURNEYPERSON OR REGISTERED APPRENTICE IN THE TRADE PERFORMING THE WORK.

OFFICE OF THE COMPTROLLER

CITY OF NEW YORK

CONSTRUCTION APPRENTICE PREVAILING WAGE SCHEDULE

Pursuant to Labor Law § 220 (3-e), only apprentices who are individually registered in a bona fide program to which the employer contractor is a participant and registered with the New York State Department of Labor, may be paid at the apprentice rates in this schedule. Apprentices who are not so registered must be paid as journey persons in accordance with the trade classification of the work they actually performed.

Apprentice ratios are established to ensure the proper safety, training and supervision of apprentices. A ratio establishes the number of journey workers required for each apprentice in a program and on a job site. Ratios are interpreted as follows: in the case of a 1:1, 1:4 ratio, there must be one journey worker for the first apprentice, and four additional journey workers for each subsequent apprentice.

TABLE OF CONTENTS

CLASSIFICATION	PAGE
BOILERMAKER	3
BRICKLAYER	4
CARPENTER	5
CARPENTER - HIGH RISE CONCRETE FORMS	6
CEMENT AND CONCRETE WORKER	6
CEMENT MASON	7
DERRICKPERSON & RIGGER (STONE)	7
DOCKBUILDER/PILE DRIVER	8
ELECTRICIAN	9
ELEVATOR CONSTRUCTOR	11
ELEVATOR REPAIR & MAINTENANCE	12
ENGINEER	13
ENGINEER - OPERATING	14
FLOOR COVERER	14
GLAZIER	15
HAZARDOUS MATERIAL HANDLER	16
HEAT & FROST INSULATOR	16
HOUSE WRECKER	17
IRON WORKER - ORNAMENTAL	18
IRON WORKER - STRUCTURAL	18
LABORER - HEAVY & HIGHWAY	19
LABORER - PAVER & ROADBUILDER	20
LABORER - PAVER AND ROADBUILDER - LINE STRIPING (ROADWAY)	20
MARBLE MECHANICS	21
MASON TENDER	24
MASON TENDER (INTERIOR DEMOLITION WORKER)	25
METALLIC LATHER	26
MILLWRIGHT	26
MOSAIC MECHANIC	27
PAINTER	28
PAINTER - BRIDGE & STRUCTURAL STEEL	29
PAINTER - METAL POLISHER	29
PLASTERER	30
PLASTERER - TENDER	31
PLUMBER	31
POINTER, WATERPROOFER, CAULKER, SANDBLASTER, STEAMBLASTER	32
ROOFER	33
SHEET METAL WORKER	34
SIGN ERECTOR	35
STEAMFITTER	37
STEAMFITTER - REFRIGERATION & AIR CONDITIONER	38
STONE MASON - SETTER	38
TAPER	39
TILE LAYER - SETTER	40
TIMBERPERSON	41

BOILERMAKER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Boilermaker (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $45.75
Supplemental Benefit Rate per Hour: $35.60

Boilermaker (Second Year: 1st Six Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.27
Supplemental Benefit Rate per Hour: $37.70

Boilermaker (Second Year: 2nd Six Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $52.79
Supplemental Benefit Rate per Hour: $39.81

Boilermaker (Third Year: 1st Six Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $56.30
Supplemental Benefit Rate per Hour: $41.89

Boilermaker (Third Year: 2nd Six Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $59.82
Supplemental Benefit Rate per Hour: $44.02

Boilermaker (Fourth Year: 1st Six Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $63.34
Supplemental Benefit Rate per Hour: $46.13

Boilermaker (Fourth Year: 2nd Six Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $66.86
Supplemental Benefit Rate per Hour: $48.24

(Local #5)

BRICKLAYER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Bricklayer (First 650 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.52
Supplemental Benefit Rate per Hour: $29.85

Bricklayer (Second 650 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.65
Supplemental Benefit Rate per Hour: $29.85

Bricklayer (Third 650 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $36.77
Supplemental Benefit Rate per Hour: $29.85

Bricklayer (Fourth 650 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $42.90
Supplemental Benefit Rate per Hour: $29.85

Bricklayer (Fifth 650 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.03
Supplemental Benefit Rate per Hour: $29.85

Bricklayer (Last 750 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $55.16
Supplemental Benefit Rate per Hour: $29.85

(Bricklayer District Council)

CARPENTER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Carpenter (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour For Building Apprentice: $25.20
Supplemental Benefit Rate Per Hour For Building Apprentice: $20.20

Wage Rate Per Hour For Heavy Apprentice: $28.98
Supplemental Benefit Rate Per Hour For Heavy Apprentice: $39.89

Carpenter (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour For Building Apprentice: $28.20
Supplemental Benefit Rate Per Hour For Building Apprentice: $21.70

Wage Rate Per Hour For Heavy Apprentice: $34.58
Supplemental Benefit Rate Per Hour For Heavy Apprentice: $39.89

Carpenter (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour For Building Apprentice: $32.45
Supplemental Benefit Rate Per Hour For Building Apprentice: $25.30

Wage Rate Per Hour For Heavy Apprentice: $42.96
Supplemental Benefit Rate Per Hour For Heavy Apprentice: $39.89

Carpenter (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour For Building Apprentice: $40.33
Supplemental Benefit Rate Per Hour For Building Apprentice: $27.30

Wage Rate Per Hour For Heavy Apprentice: $51.35
Supplemental Benefit Rate Per Hour For Heavy Apprentice: $39.89

(Carpenters District Council)

CARPENTER - HIGH RISE CONCRETE FORMS
(Ratio of Apprentice to Journeyperson: 1 to 1, 2 to 5)

Carpenter - High Rise (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $18.27
Supplemental Benefit Rate per Hour: $17.55

Carpenter - High Rise (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.70
Supplemental Benefit Rate per Hour: $17.68

Carpenter - High Rise (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.28
Supplemental Benefit Rate per Hour: $17.81

Carpenter - High Rise (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.90
Supplemental Benefit Rate per Hour: $17.96

(Carpenters District Council)

CEMENT AND CONCRETE WORKER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Cement & Concrete Worker (First 1333 hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.27
Supplemental Benefit Rate per Hour: $17.97

Cement & Concrete Worker (Second 1333 hours)

Effective Period: 7/1/2026 - 6/30/2027

Wage Rate per Hour: **$25.24**
Supplemental Benefit Rate per Hour: **$23.41**

Cement & Concrete Worker (Last 1334 hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$31.21**
Supplemental Benefit Rate per Hour: **$24.85**

(Cement Concrete Workers District Council)

CEMENT MASON
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Cement Mason (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$23.77**
Supplemental Benefit Rate per Hour: **$14.86**

Cement Mason (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$28.74**
Supplemental Benefit Rate per Hour: **$15.16**

Cement Mason (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$34.27**
Supplemental Benefit Rate per Hour: **$15.27**

(Local #780)

DERRICKPERSON & RIGGER (STONE)
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Derrickperson & Rigger (stone) - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.91
Supplemental Benefit Rate per Hour: $31.63

Derrickperson & Rigger (stone) - Second Year: 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $43.27
Supplemental Benefit Rate per Hour: $47.63

Derrickperson & Rigger (stone) - Second Year: 2nd Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.46
Supplemental Benefit Rate per Hour: $47.63

Derrickperson & Rigger (stone) - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $55.64
Supplemental Benefit Rate per Hour: $47.63

(Local #197)

DOCKBUILDER/PILE DRIVER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 6)

Dockbuilder/Pile Driver (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $28.98
Supplemental Benefit Rate Per Hour: $39.89

Dockbuilder/Pile Driver (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $34.58
Supplemental Benefit Rate Per Hour: $39.89

Dockbuilder/Pile Driver (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $42.96
Supplemental Benefit Rate Per Hour: $39.89

Dockbuilder/Pile Driver (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $51.35
Supplemental Benefit Rate Per Hour: $39.89

(Carpenters District Council)

ELECTRICIAN
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Electrician 1st year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $19.25
Supplemental Benefit Rate per Hour: $19.84
Overtime Supplemental Rate Per Hour: $21.11

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $19.25
Supplemental Benefit Rate per Hour: $20.93
Overtime Supplemental Rate Per Hour: $22.21

Electrician 2nd Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $21.25
Supplemental Benefit Rate per Hour: $20.88
Overtime Supplemental Rate Per Hour: $22.29

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $21.25
Supplemental Benefit Rate per Hour: $21.99
Overtime Supplemental Rate Per Hour: $23.40

Electrician 3rd Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $23.25
Supplemental Benefit Rate per Hour: $21.93

Overtime Supplemental Rate Per Hour: $23.48

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $23.25
Supplemental Benefit Rate per Hour: $23.05
Overtime Supplemental Rate Per Hour: $24.59

Electrician 4th Year

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $26.25
Supplemental Benefit Rate per Hour: $23.50
Overtime Supplemental Rate Per Hour: $25.25

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $26.25
Supplemental Benefit Rate per Hour: $24.64
Overtime Supplemental Rate Per Hour: $26.38

Electrician 5th Term (0-12 Months)

MIJ 1

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $27.50
Supplemental Benefit Rate per Hour: $26.79
Overtime Supplemental Rate Per Hour: $28.52

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $27.50
Supplemental Benefit Rate per Hour: $27.42
Overtime Supplemental Rate Per Hour: $29.16

Electrician 5th Term (13-18 Months)

MIJ 2

Effective Period: 7/1/2026 - 4/14/2027
Wage Rate per Hour: $33.50
Supplemental Benefit Rate per Hour: $30.01
Overtime Supplemental Rate Per Hour: $32.13

Effective Period: 4/15/2027 - 6/30/2027
Wage Rate per Hour: $33.50
Supplemental Benefit Rate per Hour: $30.68
Overtime Supplemental Rate Per Hour: $32.80

Overtime Description

Overtime Wage paid at time and one half the regular rate

(Local #3)

ELEVATOR CONSTRUCTOR
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 2)

Elevator (Constructor) - First Year

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $37.09
Supplemental Benefit Rate per Hour: $36.18

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $38.53
Supplemental Benefit Rate per Hour: $36.88

Elevator (Constructor) - Second Year

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $47.54
Supplemental Benefit Rate per Hour: $36.90

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $49.37
Supplemental Benefit Rate per Hour: $37.64

Elevator (Constructor) - Third Year

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $56.18
Supplemental Benefit Rate per Hour: $38.35

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $58.34
Supplemental Benefit Rate per Hour: $39.17

Elevator (Constructor) - Fourth Year

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $64.82

Supplemental Benefit Rate per Hour: $39.81

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $67.32
Supplemental Benefit Rate per Hour: $40.71

(Local #1)

ELEVATOR REPAIR & MAINTENANCE
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 2)

Elevator Service/Modernization Mechanic (First Year)

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $37.09
Supplemental Benefit Rate per Hour: $36.15

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $38.53
Supplemental Benefit Rate per Hour: $36.85

Elevator Service/Modernization Mechanic (Second Year)

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $37.43
Supplemental Benefit Rate per Hour: $36.87

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $38.90
Supplemental Benefit Rate per Hour: $37.61

Elevator Service/Modernization Mechanic (Third Year)

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $44.24
Supplemental Benefit Rate per Hour: $38.32

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $45.97
Supplemental Benefit Rate per Hour: $39.14

Elevator Service/Modernization Mechanic (Fourth Year)

Effective Period: 7/1/2026 - 3/16/2027
Wage Rate per Hour: $51.05
Supplemental Benefit Rate per Hour: $39.76

Effective Period: 3/17/2027 - 6/30/2027
Wage Rate per Hour: $53.04
Supplemental Benefit Rate per Hour: $40.66

(Local #1)

ENGINEER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 5)

Engineer - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $29.09
Supplemental Benefit Rate per Hour: $36.76

Engineer - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $36.36
Supplemental Benefit Rate per Hour: $36.76

Engineer - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.00
Supplemental Benefit Rate per Hour: $36.76

Engineer - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $43.63
Supplemental Benefit Rate per Hour: $36.76

(Local #15)

ENGINEER - OPERATING
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 5)

Operating Engineer - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.96
Supplemental Benefit Rate per Hour: $29.90

Operating Engineer - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.70
Supplemental Benefit Rate per Hour: $29.90

Operating Engineer - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $58.44
Supplemental Benefit Rate per Hour: $29.90

(Local #14)

FLOOR COVERER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Floor Coverer (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $26.54
Supplemental Benefit Rate per Hour: $19.11

Floor Coverer (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $29.60
Supplemental Benefit Rate per Hour: $20.87

Floor Coverer (Third Year)

Effective Period: 7/1/2026 - 6/30/2027

Wage Rate per Hour: $34.05
Supplemental Benefit Rate per Hour: $24.87

Floor Coverer (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $42.40
Supplemental Benefit Rate per Hour: $27.12

(Carpenters District Council)

GLAZIER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Glazier (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.52
Supplemental Benefit Rate per Hour: $20.08

Glazier (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.41
Supplemental Benefit Rate per Hour: $35.41

Glazier (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.96
Supplemental Benefit Rate per Hour: $44.44

Glazier (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.42
Supplemental Benefit Rate per Hour: $49.97

DC9 (Local #1087)

HAZARDOUS MATERIAL HANDLER
(Ratio of Apprentice Journeyperson: 1 to 1, 1 to 3)

Handler (First 1000 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $20.80
Supplemental Benefit Rate per Hour: $19.00

Handler (Second 1000 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $21.85
Supplemental Benefit Rate per Hour: $19.00

Handler (Third 1000 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.92
Supplemental Benefit Rate per Hour: $19.00

Handler (Fourth 1000 Hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.08
Supplemental Benefit Rate per Hour: $19.00

(Local #78)

HEAT & FROST INSULATOR
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Heat & Frost Insulator (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $32.95
Supplemental Benefit Rate per Hour: $17.02

Heat & Frost Insulator (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.27
Supplemental Benefit Rate per Hour: $20.80

Heat & Frost Insulator (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $47.59
Supplemental Benefit Rate per Hour: $24.58

Heat & Frost Insulator (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $54.91
Supplemental Benefit Rate per Hour: $28.37

(Local #12)

HOUSE WRECKER
(TOTAL DEMOLITION)
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

House Wrecker - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.27
Supplemental Benefit Rate per Hour: $12.22

House Wrecker - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.02
Supplemental Benefit Rate per Hour: $12.22

House Wrecker - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.52
Supplemental Benefit Rate per Hour: $12.22

House Wrecker - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.02
Supplemental Benefit Rate per Hour: $12.22

(Mason Tenders District Council)

IRON WORKER - ORNAMENTAL
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Iron Worker (Ornamental) - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.98
Supplemental Benefit Rate per Hour: $15.99

Iron Worker (Ornamental) - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.45
Supplemental Benefit Rate per Hour: $17.99

Iron Worker (Ornamental) - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.80
Supplemental Benefit Rate per Hour: $18.99

Iron Worker (Ornamental) - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.39
Supplemental Benefit Rate per Hour: $20.99

(Local #580)

IRON WORKER - STRUCTURAL
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 6)

Iron Worker (Structural) - 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.87
Supplemental Benefit Rate per Hour: $65.75

Iron Worker (Structural) - 7- 18 Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.47
Supplemental Benefit Rate per Hour: $65.75

Iron Worker (Structural) - 19 - 36 months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $32.08
Supplemental Benefit Rate per Hour: $65.75

(Local #40 and #361)

LABORER - HEAVY & HIGHWAY
(Ratio Apprentice to Journeyperson: 1 to 1, 1 to 3)

Laborer - Heavy & Highway - First 1000 hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.30
Supplemental Benefit Rate per Hour: $57.77

Laborer - Heavy & Highway - Second 1000 hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.96
Supplemental Benefit Rate per Hour: $57.77

Laborer - Heavy & Highway - Third 1000 hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.95
Supplemental Benefit Rate per Hour: $57.77

Laborer - Heavy & Highway - Fourth 1000 hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $41.94
Supplemental Benefit Rate per Hour: $57.77

(Local #731)

LABORER - PAVER & ROADBUILDER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Paver and Roadbuilder - First Year (Minimum 1000 hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $32.86
Supplemental Benefit Rate per Hour: $28.87

Paver and Roadbuilder - Second Year (Minimum 1000 hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.50
Supplemental Benefit Rate per Hour: $28.87

(Local#1010)

LABORER - PAVER AND ROADBUILDER - LINE STRIPING (ROADWAY)
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Paver and Roadbuilder - Line Striping (Roadway) - First Year (Minimum 1000 hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $32.86
Supplemental Benefit Rate per Hour: $25.77

Paver and Roadbuilder - Line Striping (Roadway) - Second Year (Minimum 1000 hours)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.50
Supplemental Benefit Rate per Hour: $25.77

(Local #1010)

MARBLE MECHANICS
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Cutters & Setters - 0-3000 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $25.39
Supplemental Benefit Rate per Hour: $30.18
NO BENEFITS PAID DURING THE FIRST TWO MONTHS (PROBATIONARY PERIOD)

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $26.35
Supplemental Benefit Rate per Hour: $29.52
NO BENEFITS PAID DURING THE FIRST TWO MONTHS (PROBATIONARY PERIOD)

Cutters & Setters - 3001-3750 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $38.07
Supplemental Benefit Rate per Hour: $34.03

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $39.51
Supplemental Benefit Rate per Hour: $33.04

Cutters & Setters - 3751-4500 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $41.24
Supplemental Benefit Rate per Hour: $34.99

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $42.80
Supplemental Benefit Rate per Hour: $33.92

Cutters & Setters - 4501-5250 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $44.41
Supplemental Benefit Rate per Hour: $35.96

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $46.09
Supplemental Benefit Rate per Hour: $34.80

Cutters & Setters - 5251-6000 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $47.58
Supplemental Benefit Rate per Hour: $36.92

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $49.39
Supplemental Benefit Rate per Hour: $35.68

Cutters & Setters - 6001-7500 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $49.48
Supplemental Benefit Rate per Hour: $44.08

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $51.51
Supplemental Benefit Rate per Hour: $42.68

Finisher- 0-750 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $23.56
Supplemental Benefit Rate per Hour: $12.18

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $23.78
Supplemental Benefit Rate per Hour: $12.29

Finisher- 751-1500 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $24.20
Supplemental Benefit Rate per Hour: $12.68

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $24.43

Supplemental Benefit Rate per Hour: $12.79

Finisher- 1501-2250 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $24.83
Supplemental Benefit Rate per Hour: $13.18

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $25.07
Supplemental Benefit Rate per Hour: $13.30

Finisher- 2251-3000 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $25.46
Supplemental Benefit Rate per Hour: $13.68

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $25.70
Supplemental Benefit Rate per Hour: $13.81

Finisher- 3001-3750 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $26.41
Supplemental Benefit Rate per Hour: $14.43

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $26.65
Supplemental Benefit Rate per Hour: $14.57

Finisher- 3751-4500 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $27.68
Supplemental Benefit Rate per Hour: $15.43

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $27.93
Supplemental Benefit Rate per Hour: $15.58

Polisher- 0-900 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $33.84
Supplemental Benefit Rate per Hour: $30.90

Effective Period: 7/2/2026 - 6/30/2027

Wage Rate per Hour: $31.82
Supplemental Benefit Rate per Hour: $30.71

Polisher- 901-1800 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $38.68
Supplemental Benefit Rate per Hour: $31.32

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $36.37
Supplemental Benefit Rate per Hour: $31.12

Polisher- 1801-2700 Hours

Effective Period: 7/1/2026 - 7/1/2026
Wage Rate per Hour: $43.51
Supplemental Benefit Rate per Hour: $31.79

Effective Period: 7/2/2026 - 6/30/2027
Wage Rate per Hour: $40.91
Supplemental Benefit Rate per Hour: $31.55

(Local #7)

MASON TENDER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Mason Tender - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.27
Supplemental Benefit Rate per Hour: $11.72

Mason Tender - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.02
Supplemental Benefit Rate per Hour: $11.72

Mason Tender - Third Year

Effective Period: 7/1/2026 - 6/30/2027

Wage Rate per Hour: **$25.52**
Supplemental Benefit Rate per Hour: **$11.72**

Mason Tender - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$28.02**
Supplemental Benefit Rate per Hour: **$11.72**

(Local #79)

MASON TENDER (INTERIOR DEMOLITION WORKER)
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Mason Tender (Interior Demolition) - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$21.75**
Supplemental Benefit Rate per Hour: **$11.27**

Mason Tender (Interior Demolition) - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$23.50**
Supplemental Benefit Rate per Hour: **$11.27**

Mason Tender (Interior Demolition) - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$25.00**
Supplemental Benefit Rate per Hour: **$11.27**

Mason Tender (Interior Demolition) - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: **$27.50**
Supplemental Benefit Rate per Hour: **$11.27**

(Local #79)

METALLIC LATHER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Metallic Lather (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.55
Supplemental Benefit Rate per Hour: $17.87

Metallic Lather (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.00
Supplemental Benefit Rate per Hour: $17.92

Metallic Lather (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.00
Supplemental Benefit Rate per Hour: $16.92

Metallic Lather (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.00
Supplemental Benefit Rate per Hour: $16.92

(Local #46)

MILLWRIGHT
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Millwright (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $33.04
Supplemental Benefit Rate per Hour: $39.09

Millwright (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.89
Supplemental Benefit Rate per Hour: $42.79

Millwright (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $44.74
Supplemental Benefit Rate per Hour: $47.14

Millwright (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $56.44
Supplemental Benefit Rate per Hour: $53.90

(Local #740)

MOSAIC MECHANIC
Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4

Mosaic & Terrazzo Mechanic 0-1500

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.45
Supplemental Benefit Rate per Hour: $10.96

Mosaic & Terrazzo Mechanic 1501-3000

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.80
Supplemental Benefit Rate per Hour: $14.08

Mosaic & Terrazzo Mechanic 3001-3750

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.35
Supplemental Benefit Rate per Hour: $22.33

Mosaic & Terrazzo Mechanic 3751-4500

Effective Period: 7/1/2026 - 6/30/2027

Wage Rate per Hour: $39.00
Supplemental Benefit Rate per Hour: $31.70

Mosaic & Terrazzo Mechanic 4501-5250

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $45.56
Supplemental Benefit Rate per Hour: $33.67

Mosaic & Terrazzo Mechanic 5251-6000

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $51.05
Supplemental Benefit Rate per Hour: $37.71

(Local 7)

PAINTER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Painter - Brush & Roller - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $18.20
Supplemental Benefit Rate per Hour: $20.34

Painter - Brush & Roller - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.76
Supplemental Benefit Rate per Hour: $25.91

Painter - Brush & Roller - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $27.30
Supplemental Benefit Rate per Hour: $30.60

Painter - Brush & Roller - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $36.40

Supplemental Benefit Rate per Hour: $39.74

(District Council of Painters)

PAINTER - BRIDGE & STRUCTURAL STEEL
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Painter - Bridge & Structural Steel (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.80
Supplemental Benefit Rate per Hour: $18.53

Painter - Bridge & Structural Steel (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.20
Supplemental Benefit Rate per Hour: $34.29

Painter - Bridge & Structural Steel (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $45.60
Supplemental Benefit Rate per Hour: $45.76

(Local #806)

PAINTER - METAL POLISHER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Metal Polisher (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $20.17
Supplemental Benefit Rate per Hour: $8.91
New Construction - Wage Rate Per Hour: $20.56
Scaffold Over 34 Feet - Wage Rate Per Hour: $22.67

Metal Polisher (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.18
Supplemental Benefit Rate per Hour: $8.91
New Construction - Wage Rate Per Hour: $22.62
Scaffold Over 34 Feet - Wage Rate Per Hour: $24.68

Metal Polisher (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.20
Supplemental Benefit Rate per Hour: $8.91
New Construction - Wage Rate Per Hour: $24.74
Scaffold Over 34 Feet - Wage Rate Per Hour: $26.70

(Local 8A-28)

PLASTERER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)
(Each Term is 800 Hours.)
(Rates are based of the Plasterer II)

Plasterer - First Term

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.15
Supplemental Benefit Rate per Hour: $12.98

Plasterer - Second Term

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.54
Supplemental Benefit Rate per Hour: $13.47

Plasterer - Third Term

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.95
Supplemental Benefit Rate per Hour: $14.12

(Local #262)

PLASTERER - TENDER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Plasterer Tender - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.27
Supplemental Benefit Rate per Hour: $11.72

Plasterer Tender - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.02
Supplemental Benefit Rate per Hour: $11.72

Plasterer Tender - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.52
Supplemental Benefit Rate per Hour: $11.72

Plasterer Tender - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.02
Supplemental Benefit Rate per Hour: $11.72

(Local #79)

PLUMBER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Plumber - First Year: 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.00

Supplemental Benefit Rate per Hour: $5.43

Plumber - First Year: 2nd Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $21.00
Supplemental Benefit Rate per Hour: $6.43

Plumber - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.78
Supplemental Benefit Rate per Hour: $24.44

Plumber - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $33.88
Supplemental Benefit Rate per Hour: $24.44

Plumber - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $36.73
Supplemental Benefit Rate per Hour: $24.44

Plumber - Fifth Year: 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $38.13
Supplemental Benefit Rate per Hour: $24.44

Plumber - Fifth Year: 2nd Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $50.20
Supplemental Benefit Rate per Hour: $24.44

(Plumbers Local #1)

POINTER, WATERPROOFER, CAULKER, SANDBLASTER, STEAMBLASTER
(Exterior Building Renovation)

(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Pointer, Waterproofer, Caulker, Sandblaster, Steamblaster - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.96
Supplemental Benefit Rate per Hour: $15.65

Pointer, Waterproofer, Caulker, Sandblaster, Steamblaster - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.69
Supplemental Benefit Rate per Hour: $21.00

Pointer, Waterproofer, Caulker, Sandblaster, Steamblaster - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.12
Supplemental Benefit Rate per Hour: $24.75

Pointer, Waterproofer, Caulker, Sandblaster, Steamblaster - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $55.30
Supplemental Benefit Rate per Hour: $25.75

(Bricklayer District Council)

ROOFER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 2)

Roofer - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.95
Supplemental Benefit Rate per Hour: $8.06

Roofer - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.63

Supplemental Benefit Rate per Hour: $18.39

Roofer - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $26.25
Supplemental Benefit Rate per Hour: $20.35

Roofer - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.50
Supplemental Benefit Rate per Hour: $24.28

Roofer - Fifth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.38
Supplemental Benefit Rate per Hour: $30.20

(Local #8)

SHEET METAL WORKER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Sheet Metal Worker (0-6 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.57
Supplemental Benefit Rate per Hour: $8.26

Sheet Metal Worker (7-18 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $19.84
Supplemental Benefit Rate per Hour: $22.30

Sheet Metal Worker (19-30 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $25.57
Supplemental Benefit Rate per Hour: $30.13

Sheet Metal Worker (31-36 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.31
Supplemental Benefit Rate per Hour: $35.67

Sheet Metal Worker (37-42 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.31
Supplemental Benefit Rate per Hour: $35.67

Sheet Metal Worker (43-48 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.93
Supplemental Benefit Rate per Hour: $44.01

Sheet Metal Worker (49-54 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.93
Supplemental Benefit Rate per Hour: $44.01

Sheet Metal Worker (55-60 Months)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $45.64
Supplemental Benefit Rate per Hour: $49.58

(Local #28)

SIGN ERECTOR
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Sign Erector - First Year: 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $20.30
Supplemental Benefit Rate per Hour: $18.25

Sign Erector - First Year: 2nd Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.20
Supplemental Benefit Rate per Hour: $20.68

Sign Erector - Second Year: 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $26.10
Supplemental Benefit Rate per Hour: $23.14

Sign Erector - Second Year: 2nd Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $29.00
Supplemental Benefit Rate per Hour: $25.61

Sign Erector - Third Year: 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $31.90
Supplemental Benefit Rate per Hour: $34.50

Sign Erector - Third Year: 2nd Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.80
Supplemental Benefit Rate per Hour: $37.54

Sign Erector - Fourth Year: 1st Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $37.70
Supplemental Benefit Rate per Hour: $41.43

Sign Erector - Fourth Year: 2nd Six Months

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.60
Supplemental Benefit Rate per Hour: $44.55

Sign Erector - Fifth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $43.50
Supplemental Benefit Rate per Hour: $47.68

Sign Erector - Sixth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.40
Supplemental Benefit Rate per Hour: $50.78

(Local #137)

STEAMFITTER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Steamfitter - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.72
Supplemental Benefit Rate per Hour: $26.40

Steamfitter - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $30.90
Supplemental Benefit Rate per Hour: $32.82

Steamfitter - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $37.08
Supplemental Benefit Rate per Hour: $39.23

Steamfitter - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $43.26
Supplemental Benefit Rate per Hour: $45.65

Steamfitter - Fifth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $49.44
Supplemental Benefit Rate per Hour: $52.06

(Local #638)

STEAMFITTER - REFRIGERATION & AIR CONDITIONER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 3)

Refrigeration & Air Conditioner (First Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.39
Supplemental Benefit Rate per Hour: $15.35

Refrigeration & Air Conditioner (Second Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.25
Supplemental Benefit Rate per Hour: $16.91

Refrigeration & Air Conditioner (Third Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $32.91
Supplemental Benefit Rate per Hour: $18.53

Refrigeration & Air Conditioner (Fourth Year)

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.75
Supplemental Benefit Rate per Hour: $20.73

(Local #638-B)

STONE MASON - SETTER
(Ratio Apprentice of Journeyperson: 1 to 1, 1 to 2)

Stone Mason - Setters - First 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.41
Supplemental Benefit Rate per Hour: $23.93

Stone Mason - Setters - Second 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $29.26
Supplemental Benefit Rate per Hour: $32.93

Stone Mason - Setters - Third 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $34.85
Supplemental Benefit Rate per Hour: $32.93

Stone Mason - Setters - Fourth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $40.44
Supplemental Benefit Rate per Hour: $32.93

Stone Mason - Setters - Fifth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $46.04
Supplemental Benefit Rate per Hour: $32.93

Stone Mason - Setters - Sixth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $51.63
Supplemental Benefit Rate per Hour: $32.93

(Bricklayers District Council)

TAPER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Drywall Taper - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $22.96
Supplemental Benefit Rate per Hour: $15.55

Drywall Taper - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $24.51
Supplemental Benefit Rate per Hour: $26.61

Drywall Taper - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $29.41
Supplemental Benefit Rate per Hour: $28.82

Drywall Taper - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $39.21
Supplemental Benefit Rate per Hour: $33.24

(Local #1974)

TILE LAYER - SETTER
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 4)

Tile Layer - Setter - First 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $23.09
Supplemental Benefit Rate per Hour: $13.45

Tile Layer - Setter - Second 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $28.32
Supplemental Benefit Rate per Hour: $13.45

Tile Layer - Setter - Third 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $35.65
Supplemental Benefit Rate per Hour: $16.56

Tile Layer - Setter - Fourth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027

Wage Rate per Hour: $40.86
Supplemental Benefit Rate per Hour: $16.56

Tile Layer - Setter - Fifth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $44.67
Supplemental Benefit Rate per Hour: $17.98

Tile Layer - Setter - Sixth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $48.38
Supplemental Benefit Rate per Hour: $19.48

Tile Layer - Setter - Seventh 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $52.23
Supplemental Benefit Rate per Hour: $20.86

Tile Layer - Setter - Eighth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $57.45
Supplemental Benefit Rate per Hour: $20.86

Tile Layer - Setter - Ninth 750 Hours

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate per Hour: $59.83
Supplemental Benefit Rate per Hour: $23.71

(Local #7)

TIMBERPERSON
(Ratio of Apprentice to Journeyperson: 1 to 1, 1 to 6)

Timberperson - First Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $26.96
Supplemental Rate Per Hour: $39.69

Timberperson - Second Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $32.07
Supplemental Rate Per Hour: $39.69

Timberperson - Third Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $39.72
Supplemental Rate Per Hour: $39.69

Timberperson - Fourth Year

Effective Period: 7/1/2026 - 6/30/2027
Wage Rate Per Hour: $47.38
Supplemental Rate Per Hour: $39.69

(Local #1536)

Pages 186-197 are intentionally blank.

SECTION A

CITY OF NEW YORK

STANDARD CONSTRUCTION CONTRACT

March 2017

CITY OF NEW YORK
STANDARD CONSTRUCTION CONTRACT

TABLE OF CONTENTS

CHAPTER I: THE CONTRACT AND DEFINITIONS 1
ARTICLE 1. THE CONTRACT **1**
ARTICLE 2. DEFINITIONS **1**
CHAPTER II: THE WORK AND ITS PERFORMANCE 4
ARTICLE 3. CHARACTER OF THE WORK **4**
ARTICLE 4. MEANS AND METHODS OF CONSTRUCTION **4**
ARTICLE 5. COMPLIANCE WITH LAWS **5**
ARTICLE 6. INSPECTION **10**
ARTICLE 7. PROTECTION OF WORK AND OF PERSONS AND PROPERTY; NOTICES AND INDEMNIFICATION **11**
CHAPTER III: TIME PROVISIONS 12
ARTICLE 8. COMMENCEMENT AND PROSECUTION OF THE WORK **12**
ARTICLE 9. PROGRESS SCHEDULES **13**
ARTICLE 10. REQUESTS FOR INFORMATION OR APPROVAL **13**
ARTICLE 11. NOTICE OF CONDITIONS CAUSING DELAY AND DOCUMENTATION OF DAMAGES CAUSED BY DELAY **14**
ARTICLE 12. COORDINATION WITH OTHER CONTRACTORS **18**
ARTICLE 13. EXTENSION OF TIME FOR PERFORMANCE **19**
ARTICLE 14. COMPLETION AND FINAL ACCEPTANCE OF THE WORK **21**
ARTICLE 15. LIQUIDATED DAMAGES **23**
ARTICLE 16. OCCUPATION OR USE PRIOR TO COMPLETION **23**
CHAPTER IV: SUBCONTRACTS AND ASSIGNMENTS 24
ARTICLE 17. SUBCONTRACTS **24**
ARTICLE 18. ASSIGNMENTS **26**
CHAPTER V: CONTRACTOR'S SECURITY AND GUARANTEE 26
ARTICLE 19. SECURITY DEPOSIT **26**
ARTICLE 20. PAYMENT GUARANTEE **27**
ARTICLE 21. RETAINED PERCENTAGE **29**
ARTICLE 22. INSURANCE **30**
ARTICLE 23. MONEY RETAINED AGAINST CLAIMS **36**
ARTICLE 24. MAINTENANCE AND GUARANTY **37**
CHAPTER VI: CHANGES, EXTRA WORK, AND DOCUMENTATION OF CLAIM 38
ARTICLE 25. CHANGES **38**
ARTICLE 26. METHODS OF PAYMENT FOR OVERRUNS AND EXTRA WORK **38**
ARTICLE 27. RESOLUTION OF DISPUTES **41**
ARTICLE 28. RECORD KEEPING FOR EXTRA OR DISPUTED WORK OR WORK ON A TIME & MATERIALS BASIS **45**
ARTICLE 29. OMITTED WORK **46**
ARTICLE 30. NOTICE AND DOCUMENTATION OF COSTS AND DAMAGES; PRODUCTION OF FINANCIAL RECORDS **46**
CHAPTER VII: POWERS OF THE RESIDENT ENGINEER,THE ENGINEER OR ARCHITECT AND THE COMMISSIONER 48
ARTICLE 31. THE RESIDENT ENGINEER **48**
ARTICLE 32. THE ENGINEER OR ARCHITECT OR PROJECT MANAGER **48**
ARTICLE 33. THE COMMISSIONER **48**
ARTICLE 34. NO ESTOPPEL **49**
CHAPTER VIII: LABOR PROVISIONS 49
ARTICLE 35. EMPLOYEES **49**
ARTICLE 36. NO DISCRIMINATION **57**
ARTICLE 37. LABOR LAW REQUIREMENTS **59**

ARTICLE 38. PAYROLL REPORTS **64**
ARTICLE 39. DUST HAZARDS **64**
CHAPTER IX: PARTIAL AND FINAL PAYMENTS 65
ARTICLE 40. CONTRACT PRICE **65**
ARTICLE 41. BID BREAKDOWN ON LUMP SUM **65**
ARTICLE 42. PARTIAL PAYMENTS **65**
ARTICLE 43. PROMPT PAYMENT **66**
ARTICLE 44. SUBSTANTIAL COMPLETION PAYMENT **66**
ARTICLE 45. FINAL PAYMENT **67**
ARTICLE 46. ACCEPTANCE OF FINAL PAYMENT **68**
ARTICLE 47. APPROVAL BY PUBLIC DESIGN COMMISSION **69**
CHAPTER X: CONTRACTOR'S DEFAULT 69
ARTICLE 48. COMMISSIONER'S RIGHT TO DECLARE CONTRACTOR IN DEFAULT **69**
ARTICLE 49. EXERCISE OF THE RIGHT TO DECLARE DEFAULT **71**
ARTICLE 50. QUITTING THE SITE **71**
ARTICLE 51. COMPLETION OF THE WORK **71**
ARTICLE 52. PARTIAL DEFAULT **71**
ARTICLE 53. PERFORMANCE OF UNCOMPLETED WORK **72**
ARTICLE 54. OTHER REMEDIES **72**
CHAPTER XI: MISCELLANEOUS PROVISIONS 72
ARTICLE 55. CONTRACTOR'S WARRANTIES **72**
ARTICLE 56. CLAIMS AND ACTIONS THEREON **73**
ARTICLE 57. INFRINGEMENT **73**
ARTICLE 58. NO CLAIM AGAINST OFFICIALS, AGENTS OR EMPLOYEES **74**
ARTICLE 59. SERVICE OF NOTICES **74**
ARTICLE 60. UNLAWFUL PROVISIONS DEEMED STRICKEN FROM CONTRACT **74**
ARTICLE 61. ALL LEGAL PROVISIONS DEEMED INCLUDED **74**
ARTICLE 62. TAX EXEMPTION **74**
ARTICLE 63. INVESTIGATION(S) CLAUSE **76**
ARTICLE 64. TERMINATION BY THE CITY **78**
ARTICLE 65. CHOICE OF LAW, CONSENT TO JURISDICTION AND VENUE **80**
ARTICLE 66. PARTICIPATION IN AN INTERNATIONAL BOYCOTT **81**
ARTICLE 67. LOCALLY BASED ENTERPRISE PROGRAM **82**
ARTICLE 68. ANTITRUST **82**
ARTICLE 69. MACBRIDE PRINCIPLES PROVISIONS **83**
ARTICLE 70. ELECTRONIC FILING/NYC DEVELOPMENT HUB **85**
ARTICLE 71. PROHIBITION OF TROPICAL HARDWOODS **85**
ARTICLE 72. CONFLICTS OF INTEREST **85**
ARTICLE 73. MERGER CLAUSE **85**
ARTICLE 74. STATEMENT OF WORK **85**
ARTICLE 75. COMPENSATION TO BE PAID TO CONTRACTOR **85**
ARTICLE 76. ELECTRONIC FUNDS TRANSFER **85**
ARTICLE 77. RECORDS RETENTION **86**
ARTICLE 78. EXAMINATION AND VIEWING OF SITE, CONSIDERATION OF OTHER SOURCES OF INFORMATION AND CHANGED SITE CONDITIONS **86**

WITNESSETH:

The parties, in consideration of the mutual agreements contained herein, agree as follows:

CHAPTER I: THE CONTRACT AND DEFINITIONS

ARTICLE 1. THE CONTRACT

1.1 Except for titles, subtitles, headings, running headlines, tables of contents and indices (all of which are printed herein merely for convenience), the following, except for such portions thereof as may be specifically excluded, shall be deemed to be part of this **Contract**:

1.1.1 All provisions required by law to be inserted in this **Contract**, whether actually inserted or not;

1.1.2 The Contract Drawings and Specifications;

1.1.3 The General Conditions and Special Conditions, if any;

1.1.4 The **Contract**;

1.1.5 The Information for Bidders; Request for Proposals; Notice of Solicitation and Proposal For Bids; Bid or Proposal, and, if used, the Bid Booklet;

1.1.6 All Addenda issued prior to the receipt of the bids; the Notice of Award; Performance and Payment Bonds, if required; and the Notice to Proceed or the Order to Work.

1.2 Should any conflict occur in or between the Drawings and Specifications, the **Contractor** shall be deemed to have estimated the most expensive way of doing the **Work**, unless the **Contractor** shall have asked for and obtained a decision in writing from the **Commissioner** of the **Agency** that is entering into this **Contract**, before the submission of its bid, as to what shall govern.

ARTICLE 2. DEFINITIONS

2.1 The following words and expressions, or pronouns used in their stead, shall, wherever they appear in this Contract, be construed as follows, unless a different meaning is clear from the context:

2.1.1 **"Addendum"** or **"Addenda"** shall mean the additional Contract provisions and/or technical clarifications issued in writing by the Commissioner prior to the receipt of bids.

2.1.2 **"Agency"** shall mean a city, county, borough or other office, position, department, division, bureau, board or commission, or a corporation, institution or agency of government, the expenses of which are paid in whole or in part from the City treasury.

2.1.3 **"Agency Chief Contracting Officer" (ACCO)** shall mean a person delegated authority by the Commissioner to organize and supervise the procurement activity of subordinate Agency staff in conjunction with the CCPO, or his/her duly authorized representative.

2.1.4 **"Allowance"** shall mean a sum of money which the Agency may include in the total amount of the Contract for such specific contingencies as the Agency believes may be necessary to complete the Work, *e.g.*, lead or asbestos remediation, and for which the Contractor will be paid on the basis of stipulated unit prices or a formula set forth in the Contract or negotiated between the parties provided, however, that if the Contractor is not directed to use the Allowance, the Contractor shall have no right to such money and it shall be deducted from the total amount of the Contract.

2.1.5 **"City"** shall mean the City of New York.

2.1.6 **"City Chief Procurement Officer" (CCPO)** shall mean a person delegated authority by the Mayor to coordinate and oversee the procurement activity of Mayoral agency staff, including the ACCO and any offices which have oversight responsibility for the procurement of construction, or his/her duly authorized representative.

2.1.7 **"Commissioner"** shall mean the head of the Agency that has entered into this Contract, or his/her duly authorized representative.

2.1.8 **"Comptroller"** shall mean the Comptroller of the City of New York.

2.1.9 **"Contract"** or **"Contract Documents"** shall mean each of the various parts of the contract referred to in Article 1 hereof, both as a whole and severally.

2.1.10 **"Contract Drawings"** shall mean only those drawings specifically entitled as such and listed in the Specifications or in any Addendum, or any drawings furnished by the Commissioner, pertaining or supplemental thereto.

2.1.11 **"Contract Work"** shall mean everything required to be furnished and done by the Contractor by any one or more of the parts of the Contract referred to in Article 1, except Extra Work as hereinafter defined.

2.1.12 **"Contractor"** shall mean the entity which executed this Contract, whether a corporation, firm, partnership, joint venture, individual, or any combination thereof, and its, their, his/her successors, personal representatives, executors, administrators, and assigns, and any person, firm, partnership, joint venture, individual, or corporation which shall at any time be substituted in the place of the Contractor under this Contract.

2.1.13 **"Days"** shall mean calendar days, except where otherwise specified.

2.1.14 **"Engineer"** or **"Architect"** or **"Project Manager"** shall mean the person so designated in writing by the Commissioner in the Notice to Proceed or the Order to Work to act as such in relation to this Contract, including a private Architect or Engineer or Project Manager, as the case may be. Subject to written approval by the Commissioner, the Engineer, Architect or Project Manager may designate an authorized representative.

2.1.15 **"Engineering Audit Officer" (EAO)** shall mean the person so designated by the Commissioner to perform responsible auditing functions hereunder.

2.1.16 **"Extra Work"** shall mean Work other than that required by the Contract at the time of award which is authorized by the Commissioner pursuant to Chapter VI of this Contract.

2.1.17 **"Federal-Aid Contract"** shall mean a contract in which the United States (federal) Government provides financial funding as so designated in the Information for Bidders.

2.1.18 **"Final Acceptance"** shall mean final written acceptance of all the Work by the Commissioner, a copy of which shall be sent to the Contractor.

2.1.19 **"Final Approved Punch List"** shall mean a list, approved pursuant to Article 14.2.2, specifying those items of Work to be completed by the Contractor after Substantial Completion and dates for the completion of each item of Work.

2.1.20 **"Law"** or **"Laws"** shall mean the Constitution of the State of New York, the New York City Charter, the New York City Administrative Code, a statute of the United States or of the State of New York, a local law of the City of New York, any ordinance, rule or regulation having the force of law, or common law.

2.1.21 **"Materialman"** shall mean any corporation, firm, partnership, joint venture, or individual, other than employees of the Contractor, who or which contracts with the Contractor or any Subcontractor, to fabricate or deliver, or who actually fabricates or delivers, plant, materials or equipment to be incorporated in the Work.

2.1.22 **"Means and Methods of Construction"** shall mean the labor, materials, temporary structures, tools, plant, and construction equipment, and the manner and time of their use, necessary to accomplish the result intended by this Contract.

2.1.23 **"Notice to Proceed" or "Order to Work"** shall mean the written notice issued by the Commissioner specifying the time for commencement of the Work and the Engineer, Architect or Project Manager.

2.1.24 **"Other Contractor(s)"** shall mean any contractor (other than the entity which executed this Contract or its Subcontractors) who or which has a contract with the City for work on or adjacent to the building or Site of the Work.

2.1.25 **"Payroll Taxes"** shall mean State Unemployment Insurance (SUI), Federal Unemployment Insurance (FUI), and payments pursuant to the Federal Insurance Contributions Act (FICA).

2.1.26 **"Project"** shall mean the public improvement to which this Contract relates.

2.1.27 **"Procurement Policy Board" (PPB)** shall mean the Agency of the City of New York whose function is to establish comprehensive and consistent procurement policies and rules which shall have broad application throughout the City.

2.1.28 **"Required Quantity"** in a unit price Contract shall mean the actual quantity of any item of Work or materials which is required to be performed or furnished in order to comply with the Contract.

2.1.29 **"Resident Engineer"** shall mean the representative of the Commissioner duly designated by the Commissioner to be his/her representative at the site of the Work.

2.1.30 **"Site"** shall mean the area upon or in which the Contractor's operations are carried on, and such other areas adjacent thereto as may be designated as such by the Engineer.

2.1.31 **"Small Tools"** shall mean items that are ordinarily required for a worker's job function, including but not limited to, equipment that ordinarily has no licensing, insurance or substantive storage costs associated with it; such as circular and chain saws, impact drills, threaders, benders, wrenches, socket tools, etc.

2.1.32 **"Specifications"** shall mean all of the directions, requirements, and standards of performance applying to the Work as hereinafter detailed and designated under the Specifications.

2.1.33 **"Subcontractor"** shall mean any person, firm or corporation, other than employees of the Contractor, who or which contracts with the Contractor or with its subcontractors to furnish, or actually furnishes labor, or labor and materials, or labor and equipment, or superintendence, supervision and/or management at the Site. Wherever the word Subcontractor appears, it shall also mean sub-Subcontractor.

2.1.34 **"Substantial Completion"** shall mean the written determination by the Engineer that the Work required under this Contract is substantially, but not entirely, complete and the approval of the **Final Approved Punch List**.

2.1.35 **"Work"** shall mean all services required to complete the Project in accordance with the Contract Documents, including without limitation, labor, material, superintendence, management, administration, equipment, and incidentals, and obtaining any and all permits, certifications and licenses as may be necessary and required to complete the Work, and shall include both Contract Work and Extra Work.

CHAPTER II: THE WORK AND ITS PERFORMANCE

ARTICLE 3. CHARACTER OF THE WORK

3.1 Unless otherwise expressly provided in the **Contract Drawings**, **Specifications,** and **Addenda**, the **Work** shall be performed in accordance with the best modern practice, utilizing, unless otherwise specified in writing, new and unused materials of standard first grade quality and workmanship and design of the highest quality, to the satisfaction of the **Commissioner**.

ARTICLE 4. MEANS AND METHODS OF CONSTRUCTION

4.1 Unless otherwise expressly provided in the **Contract Drawings**, **Specifications,** and **Addenda**, the **Means and Methods of Construction** shall be such as the **Contractor** may choose; subject, however, to the **Engineer's** right to reject the **Means and Methods of Construction** proposed by the **Contractor** which in the opinion of the **Engineer**:

4.1.1 Will constitute or create a hazard to the **Work**, or to persons or property; or

4.1.2 Will not produce finished **Work** in accordance with the terms of the **Contract**; or

4.1.3 Will be detrimental to the overall progress of the **Project**.

4.2 The **Engineer's** approval of the **Contractor's Means and Methods of Construction**, or his/her failure to exercise his/her right to reject such means or methods, shall not relieve the **Contractor**

of its obligation to complete the **Work** as provided in this **Contract**; nor shall the exercise of such right to reject create a cause of action for damages.

ARTICLE 5. COMPLIANCE WITH LAWS

5.1 The **Contractor** shall comply with all **Laws** applicable to this **Contract** and to the **Work** to be done hereunder.

5.2 Procurement Policy Board Rules: This **Contract** is subject to the Rules of the **PPB** ("**PPB** Rules") in effect at the time of the bid opening for this **Contract**. In the event of a conflict between the **PPB** Rules and a provision of this **Contract**, the **PPB** Rules shall take precedence.

5.3 Noise Control Code provisions.

5.3.1 In accordance with the provisions of Section 24-216(b) of the Administrative Code of the **City** ("Administrative Code"), Noise Abatement Contract Compliance, devices and activities which will be operated, conducted, constructed or manufactured pursuant to this **Contract** and which are subject to the provisions of the **City** Noise Control Code shall be operated, conducted, constructed, or manufactured without causing a violation of the Administrative Code. Such devices and activities shall incorporate advances in the art of noise control development for the kind and level of noise emitted or produced by such devices and activities, in accordance with regulations issued by the **Commissioner** of the **City** Department of Environmental Protection.

5.3.2 The **Contractor** agrees to comply with Section 24-219 of the Administrative Code and implementing rules codified at 15 Rules of the City of New York ("RCNY") Section 28-100 *et seq*. In accordance with such provisions, the **Contractor**, if the **Contractor** is the responsible party under such regulations, shall prepare and post a Construction Noise Mitigation Plan at each **Site**, in which the **Contractor** shall certify that all construction tools and equipment have been maintained so that they operate at normal manufacturers operating specifications. If the **Contractor** cannot make this certification, it must have in place an Alternative Noise Mitigation Plan approved by the **City** Department of Environmental Protection. In addition, the **Contractor**'s certified Construction Noise Mitigation Plan is subject inspection by the **City** Department of Environmental Protection in accordance with Section 28-101 of Title 15 of RCNY. No **Contract Work** may take place at a **Site** unless there is a Construction Noise Mitigation Plan or approved Alternative Noise Mitigation Plan in place. In addition, the **Contractor** shall create and implement a noise mitigation training program. Failure to comply with these requirements may result in fines and other penalties pursuant to the applicable provisions of the Administrative Code and RCNY.

5.4 Ultra Low Sulfur Diesel Fuel: In accordance with the provisions of Section 24-163.3 of the Administrative Code, the **Contractor** specifically agrees as follows:

5.4.1 Definitions. For purposes of this Article 5.4, the following definitions apply:

5.4.1(a) "Contractor" means any person or entity that enters into a Public Works Contract with a **City Agency**, or any person or entity that enters into an agreement with such person or entity, to perform work or provide labor or services related to such Public Works Contract.

5.4.1(b) "Motor Vehicle" means any self-propelled vehicle designed for transporting persons or property on a street or highway.

5.4.1(c) "Nonroad Engine" means an internal combustion engine (including the fuel system) that is not used in a Motor Vehicle or a vehicle used solely for competition, or that is not subject to standards promulgated under Section 7411 or Section 7521 of Title 42 of the United States Code, except that this term shall apply to internal combustion engines used to power generators, compressors or similar equipment used in any construction program or project.

5.4.1(d) "Nonroad Vehicle" means a vehicle that is powered by a Nonroad Engine, fifty (50) horsepower and greater, and that is not a Motor Vehicle or a vehicle used solely for competition, which shall include, but not be limited to, excavators, backhoes, cranes, compressors, generators, bulldozers, and similar equipment, except that this term shall not apply to horticultural maintenance vehicles used for landscaping purposes that are powered by a Nonroad Engine of sixty-five (65) horsepower or less and that are not used in any construction program or project.

5.4.1(e) "Public Works Contract" means a contract with a **City Agency** for a construction program or project involving the construction, demolition, restoration, rehabilitation, repair, renovation, or abatement of any building, structure, tunnel, excavation, roadway, park or bridge; a contract with a **City Agency** for the preparation for any construction program or project involving the construction, demolition, restoration, rehabilitation, repair, renovation, or abatement of any building, structure, tunnel, excavation, roadway, park or bridge; or a contract with a **City Agency** for any final work involved in the completion of any construction program or project involving the construction, demolition, restoration, rehabilitation, repair, renovation, or abatement of any building, structure, tunnel, excavation, roadway, park or bridge.

5.4.1(f) "Ultra Low Sulfur Diesel Fuel" means diesel fuel that has a sulfur content of no more than fifteen parts per million (15 ppm).

5.4.2 Ultra Low Sulfur Diesel Fuel

5.4.2(a) All **Contractors** shall use Ultra Low Sulfur Diesel Fuel in diesel-powered Nonroad Vehicles in the performance of this **Contract**.

5.4.2(b) Notwithstanding the requirements of Article 5.4.2(a), **Contractors** may use diesel fuel that has a sulfur content of no more than thirty parts per million (30 ppm) to fulfill the requirements of this Article 5.4.2, where the Commissioner of the **City** Department of Environmental Protection ("DEP Commissioner") has issued a determination that a sufficient quantity of Ultra Low Sulfur Diesel Fuel is not available to meet the needs of **Agencies** and **Contractors**. Any such determination shall expire after six (6) months unless renewed.

5.4.2(c) **Contractors** shall not be required to comply with this Article 5.4.2 where the **City Agency** letting this **Contract** makes a written finding, which is approved, in writing, by the DEP Commissioner, that a sufficient quantity of Ultra Low Sulfur Diesel Fuel, or diesel fuel that has a sulfur content of no more than thirty parts per million (30 ppm) is not available to meet the requirements of Section 24-163.3 of the Administrative Code, provided that such **Contractor** in its fulfillment of the

requirements of this **Contract**, to the extent practicable, shall use whatever quantity of Ultra Low Sulfur Diesel Fuel or diesel fuel that has a sulfur content of no more than thirty parts per million (30 ppm) is available. Any finding made pursuant to this Article 5.4.2(c) shall expire after sixty (60) **Days**, at which time the requirements of this Article 5.4.2 shall be in full force and effect unless the **City Agency** renews the finding in writing and such renewal is approved by the DEP Commissioner.

5.4.2(d) **Contractors** may check on determinations and approvals issued by the DEP Commissioner pursuant to Section 24-163.3 of the Administrative Code, if any, at www.dep.nyc.gov or by contacting the **City Agency** letting this **Contract**.

5.4.2(e) The requirements of this Article 5.4.2 do not apply where they are precluded by federal or State funding requirements or where the **Contract** is an emergency procurement.

5.4.3 Best Available Technology

5.4.3(a) All **Contractors** shall utilize the best available technology for reducing the emission of pollutants for diesel-powered Nonroad Vehicles in the performance of this **Contract**. For determinations of best available technology for each type of diesel-powered Nonroad Vehicle, **Contractors** shall comply with the regulations of the **City** Department of Environmental Protection, as and when adopted, Chapter 14 of Title 15 of the Rules of the City of New York (RCNY). The **Contractor** shall fully document all steps in the best available technology selection process and shall furnish such documentation to the **City Agency** or the DEP Commissioner upon request. The **Contractor** shall retain all documentation generated in the best available technology selection process for as long as the selected best available technology is in use.

5.4.3(b) No **Contractor** shall be required to replace best available technology for reducing the emission of pollutants or other authorized technology utilized for a diesel-powered Nonroad Vehicle in accordance with the provisions of this Article 5.4.3 within three (3) years of having first utilized such technology for such vehicle.

5.4.3(c) This Article 5.4.3 shall not apply to any vehicle used to satisfy the requirements of a specific Public Works Contract for fewer than twenty (20) **Days**.

5.4.3(d) The **Contractor** shall not be required to comply with this Article 5.4.3 with respect to a diesel-powered Nonroad Vehicle under the following circumstances:

5.4.3(d)(i) Where the **City Agency** makes a written finding, which is approved, in writing, by the DEP Commissioner, that the best available technology for reducing the emission of pollutants as required by this Article 5.4.3 is unavailable for such vehicle, the **Contractor** shall use whatever technology for reducing the emission of pollutants, if any, is available and appropriate for such vehicle.

5.4.3(d)(ii) Where the DEP Commissioner has issued a written waiver based upon the **Contractor** having demonstrated to the DEP Commissioner that the use of the best available technology for reducing the emission of pollutants might endanger the operator of such vehicle or those working near such vehicle, due to engine malfunction, the **Contractor** shall use whatever technology for

reducing the emission of pollutants, if any, is available and appropriate for such vehicle, which would not endanger the operator of such vehicle or those working near such vehicle.

5.4.3(d)(iii) In determining which technology to use for the purposes of Articles 5.4.3(d)(i) and 5.4.3(d)(ii) above, the **Contractor** shall primarily consider the reduction in emissions of particulate matter and secondarily consider the reduction in emissions of nitrogen oxides associated with the use of such technology, which shall in no event result in an increase in the emissions of either such pollutant.

5.4.3(d)(iv) The **Contractor** shall submit requests for a finding or a waiver pursuant to this Article 5.4.3(d) in writing to the DEP Commissioner, with a copy to the **ACCO** of the **City Agency** letting this **Contract**. Any finding or waiver made or issued pursuant to Articles 5.4.3(d)(i) and 5.4.3(d)(ii) above shall expire after one hundred eighty (180) **Days**, at which time the requirements of Article 5.4.3(a) shall be in full force and effect unless the **City Agency** renews the finding, in writing, and the DEP Commissioner approves such finding, in writing, or the DEP Commissioner renews the waiver, in writing.

5.4.3(e) The requirements of this Article 5.4.3 do not apply where they are precluded by federal or State funding requirements or where the **Contract** is an emergency procurement.

5.4.4 Section 24-163 of the Administrative Code. The **Contractor** shall comply with Section 24-163 of the Administrative Code related to the idling of the engines of motor vehicles while parking.

5.4.5 Compliance

5.4.5(a) The **Contractor's** compliance with Article 5.4 may be independently monitored. If it is determined that the **Contractor** has failed to comply with any provision of Article 5.4, any costs associated with any independent monitoring incurred by the **City** shall be reimbursed by the **Contractor**.

5.4.5(b) Any **Contractor** who violates any provision of Article 5.4, except as provided in Article 5.4.5(c) below, shall be liable for a civil penalty between the amounts of one thousand ($1,000) and ten thousand ($10,000) dollars, in addition to twice the amount of money saved by such **Contractor** for failure to comply with Article 5.4.

5.4.5(c) No **Contractor** shall make a false claim with respect to the provisions of Article 5.4 to a **City Agency**. Where a **Contractor** has been found to have done so, such **Contractor** shall be liable for a civil penalty of twenty thousand ($20,000) dollars, in addition to twice the amount of money saved by such **Contractor** in association with having made such false claim.

5.4.6 Reporting

5.4.6(a) For all Public Works Contracts covered by this Article 5.4, the **Contractor** shall report to the **City Agency** the following information:

5.4.6(a)(i) The total number of diesel-powered Nonroad Vehicles used to fulfill the requirements of this Public Works Contract;

5.4.6(a)(ii) The number of such Nonroad Vehicles that were powered by Ultra Low Sulfur Diesel Fuel;

5.4.6(a)(iii) The number of such Nonroad Vehicles that utilized the best available technology for reducing the emission of pollutants, including a breakdown by vehicle model and the type of technology;

5.4.6(a)(iv) The number of such Nonroad Vehicles that utilized such other authorized technology in accordance with Article 5.4.3, including a breakdown by vehicle model and the type of technology used for each such vehicle;

5.4.6(a)(v) The locations where such Nonroad Vehicles were used; and

5.4.6(a)(vi) Where a determination is in effect pursuant to Article 5.4.2(b) or 5.4.2(c), detailed information concerning the **Contractor's** efforts to obtain Ultra Low Sulfur Diesel Fuel or diesel fuel that has a sulfur content of no more than thirty parts per million (30 ppm).

5.4.6(b) The **Contractor** shall submit the information required by Article 5.4.6(a) at the completion of **Work** under the Public Works Contract and on a yearly basis no later than August 1 throughout the term of the Public Works Contract. The yearly report shall cover **Work** performed during the preceding fiscal year (July 1 - June 30).

5.5 Ultra Low Sulfur Diesel Fuel. In accordance with the Coordinated Construction Act for Lower Manhattan, as amended:

5.5.1 Definitions. For purposes of this Article 5.5, the following definitions apply:

5.5.1(a) "Lower Manhattan" means the area to the south of and within the following lines: a line beginning at a point where the United States pierhead line in the Hudson River as it exists now or may be extended would intersect with the southerly line of West Houston Street in the Borough of Manhattan extended, thence easterly along the southerly side of West Houston Street to the southerly side of Houston Street, thence easterly along the southerly side of Houston Street to the southerly side of East Houston Street, thence northeasterly along the southerly side of East Houston Street to the point where it would intersect with the United States pierhead line in the East River as it exists now or may be extended, including tax lots within or immediately adjacent thereto.

5.5.1(b) "Lower Manhattan Redevelopment Project" means any project in Lower Manhattan that is funded in whole or in part with federal or State funding, or any project intended to improve transportation between Lower Manhattan and the two air terminals in the **City** known as LaGuardia Airport and John F. Kennedy International Airport, or between Lower Manhattan and the air terminal in Newark known as Newark Liberty International Airport, and that is funded in whole or in part with federal funding.

5.5.1(c) "Nonroad Engine" means an internal combustion engine (including the fuel system) that is not used in a Motor Vehicle or a vehicle used solely for competition, or that is not subject to standards promulgated under Section 7411 or Section 7521 of Title 42 of the United States Code, except that this term shall apply to internal combustion engines used to power generators, compressors or similar equipment used in any construction program or project.

5.5.1(d) "Nonroad Vehicle" means a vehicle that is powered by a Nonroad Engine, fifty (50) horsepower (HP) and greater, and that is not a Motor Vehicle or a vehicle used solely for competition, which shall include, but not be limited to, excavators, backhoes, cranes, compressors, generators, bulldozers, and similar equipment, except that this terms shall not apply to horticultural maintenance vehicles used for landscaping purposes that are powered by a Nonroad Engine of sixty-five (65) HP or less and that are not used in any construction program or project.

5.5.1(e) "Ultra Low Sulfur Diesel Fuel" means diesel fuel that has a sulfur content of no more than fifteen parts per million (15 ppm).

5.5.2 Requirements. **Contractors** and **Subcontractors** are required to use only Ultra Low Sulfur Diesel Fuel to power the diesel-powered Nonroad Vehicles with engine HP rating of fifty (50) HP and above used on a Lower Manhattan Redevelopment Project and, where practicable, to reduce the emission of pollutants by retrofitting such Nonroad Vehicles with oxidation catalysts, particulate filters, or technology that achieves lowest particulate matter emissions.

5.6 Pesticides. In accordance with Section 17-1209 of the Administrative Code, to the extent that the **Contractor** or any **Subcontractor** applies pesticides to any property owned or leased by the **City**, the **Contractor,** and any **Subcontractor** shall comply with Chapter 12 of the Administrative Code.

5.7 Waste Treatment, Storage, and Disposal Facilities and Transporters. In connection with the **Work**, the **Contractor** and any **Subcontractor** shall use only those waste treatment, storage, and disposal facilities and waste transporters that possess the requisite license, permit or other governmental approval necessary to treat, store, dispose, or transport the waste, materials or hazardous substances.

5.8 Environmentally Preferable Purchasing. The **Contractor** shall ensure that products purchased or leased by the **Contractor** or any **Subcontractor** for the **Work** that are not specified by the **City** or are submitted as equivalents to a product specified by the **City** comply with the requirements of the New York City Environmentally Preferable Purchasing Program contained in Chapter 11 of Title 43 of the RCNY, pursuant to Chapter 3 of Title 6 of the Administrative Code.

ARTICLE 6. INSPECTION

6.1 During the progress of the **Work** and up to the date of **Final Acceptance**, the **Contractor** shall at all times afford the representatives of the **City** every reasonable, safe, and proper facility for inspecting all **Work** done or being done at the **Site** and also for inspecting the manufacture or preparation of materials and equipment at the place of such manufacture or preparation.

6.2 The **Contractor's** obligation hereunder shall include the uncovering or taking down of finished **Work** and its restoration thereafter; provided, however, that the order to uncover, take down and restore shall be in writing, and further provided that if **Work** thus exposed proves satisfactory, and if the **Contractor** has complied with Article 6.1, such uncovering or taking down and restoration shall be

considered an item of **Extra Work** to be paid for in accordance with the provisions of Article 26. If the **Work** thus exposed proves unsatisfactory, the **City** has no obligation to compensate the **Contractor** for the uncovering, taking down or restoration.

6.3 Inspection and approval by the **Commissioner**, the **Engineer**, **Project Manager**, or **Resident Engineer**, of finished **Work** or of **Work** being performed, or of materials and equipment at the place of manufacture or preparation, shall not relieve the **Contractor** of its obligation to perform the **Work** in strict accordance with the **Contract**. Finished or unfinished **Work** not found to be in strict accordance with the **Contract** shall be replaced as directed by the **Engineer**, even though such **Work** may have been previously approved and paid for. Such corrective **Work** is **Contract Work** and shall not be deemed **Extra Work**.

6.4 Rejected **Work** and materials shall be promptly taken down and removed from the **Site**, which must at all times be kept in a reasonably clean and neat condition.

ARTICLE 7. PROTECTION OF WORK AND OF PERSONS AND PROPERTY; NOTICES AND INDEMNIFICATION

7.1 During the performance of the **Work** and up to the date of **Final Acceptance**, the **Contractor** shall be under an absolute obligation to protect the finished and unfinished **Work** against any damage, loss, injury, theft and/or vandalism and in the event of such damage, loss, injury, theft and/or vandalism, it shall promptly replace and/or repair such **Work** at the **Contractor's** sole cost and expense, as directed by the **Resident Engineer**. The obligation to deliver finished **Work** in strict accordance with the **Contract** prior to **Final Acceptance** shall be absolute and shall not be affected by the **Resident Engineer's** approval of, or failure to prohibit, the **Means and Methods of Construction** used by the **Contractor**.

7.2 During the performance of the **Work** and up to the date of **Final Acceptance**, the **Contractor** shall take all reasonable precautions to protect all persons and the property of the **City** and of others from damage, loss or injury resulting from the **Contractor's**, and/or its **Subcontractors'** operations under this **Contract.** The **Contractor's** obligation to protect shall include the duty to provide, place or replace, and adequately maintain at or about the **Site** suitable and sufficient protection such as lights, barricades, and enclosures.

7.3 The **Contractor** shall comply with the notification requirements set forth below in the event of any loss, damage or injury to **Work**, persons or property, or any accidents arising out of the operations of the **Contractor** and/or its **Subcontractors** under this **Contract**.

7.3.1 The **Contractor** shall make a full and complete report in writing to the **Resident Engineer** within three (3) **Days** after the occurrence.

7.3.2 The **Contractor** shall also send written notice of any such event to all insurance carriers that issued potentially responsive policies (including commercial general liability insurance carriers for events relating to the **Contractor**'s own employees) no later than twenty (20) days after such event and again no later than twenty (20) days after the initiation of any claim and/or action resulting therefrom. Such notice shall contain the following information: the number of the insurance policy, the name of the Named Insured, the date and location of the incident, and the identity of the persons injured or property damaged. For any policy on which the **City** and/or the **Engineer**, **Architect**, or **Project Manager** are Additional Insureds, such notice shall expressly specify that "this notice is

being given on behalf of the City of New York as Additional Insured, such other Additional Insureds, as well as the Named Insured."

7.3.2(a) Whenever such notice is sent under a policy on which the **City** is an Additional Insured, the **Contractor** shall provide copies of the notice to the **Comptroller,** the **Commissioner** and the **City** Corporation Counsel. The copy to the **Comptroller** shall be sent to the Insurance Unit, NYC Comptroller's Office, 1 Centre Street – Room 1222, New York, New York, 10007. The copy to the **Commissioner** shall be sent to the address set forth in Schedule A of the General Conditions. The copy to the **City** Corporation Counsel shall be sent to Insurance Claims Specialist, Affirmative Litigation Division, New York City Law Department, 100 Church Street, New York, New York 10007.

7.3.2(b) If the **Contractor** fails to provide any of the foregoing notices to any appropriate insurance carrier(s) in a timely and complete manner, the **Contractor** shall indemnify the **City** for all losses, judgments, settlements, and expenses, including reasonable attorneys' fees, arising from an insurer's disclaimer of coverage citing late notice by or on behalf of the **City**.

7.4 To the fullest extent permitted by law, the **Contractor** shall defend, indemnify, and hold the **City**, its employees, and officials (the "Indemnitees") harmless against any and all claims (including but not limited to claims asserted by any employee of the **Contractor** and/or its **Subcontractors**) and costs and expenses of whatever kind (including but not limited to payment or reimbursement of attorneys' fees and disbursements) allegedly arising out of or in any way related to the operations of the **Contractor** and/or its **Subcontractors** in the performance of this **Contract** or from the **Contractor's** and/or its **Subcontractors'** failure to comply with any of the provisions of this **Contract** or of the **Law**. Such costs and expenses shall include all those incurred in defending the underlying claim and those incurred in connection with the enforcement of this Article 7.4 by way of cross-claim, third-party claim, declaratory action or otherwise. The parties expressly agree that the indemnification obligation hereunder contemplates (1) full indemnity in the event of liability imposed against the Indemnitees without negligence and solely by reason of statute, operation of **Law** or otherwise; and (2) partial indemnity in the event of any actual negligence on the part of the Indemnitees either causing or contributing to the underlying claim (in which case, indemnification will be limited to any liability imposed over and above that percentage attributable to actual fault whether by statute, by operation of **Law**, or otherwise). Where partial indemnity is provided hereunder, all costs and expenses shall be indemnified on a pro rata basis.

7.4.1 Indemnification under Article 7.4 or any other provision of the **Contract** shall operate whether or not **Contractor** or its **Subcontractors** have placed and maintained the insurance specified under Article 22.

7.5 The provisions of this Article 7 shall not be deemed to create any new right of action in favor of third parties against the **Contractor** or the **City**.

CHAPTER III: TIME PROVISIONS

ARTICLE 8. COMMENCEMENT AND PROSECUTION OF THE WORK

8.1 The **Contractor** shall commence the **Work** on the date specified in the **Notice to Proceed** or the **Order to Work**. The time for performance of the **Work** under the **Contract** shall be computed from

the date specified in the **Notice to Proceed** or the **Order to Work**. **TIME BEING OF THE ESSENCE** to the **City**, the **Contractor** shall thereafter prosecute the **Work** diligently, using such **Means and Methods of Construction** as are in accord with Article 4 herein and as will assure its completion not later than the date specified in this Contract, or on the date to which the time for completion may be extended.

ARTICLE 9. PROGRESS SCHEDULES

9.1 To enable the **Work** to be performed in an orderly and expeditious manner, the **Contractor**, within fifteen (15) **Days** after the **Notice to Proceed** or **Order to Work**, unless otherwise directed by the **Engineer**, shall submit to the **Engineer** a proposed progress schedule based on the Critical Path Method in the form of a bar graph or in such other form as specified by the **Engineer**, and monthly cash flow requirements, showing:

9.1.1 The anticipated time of commencement and completion of each of the various operations to be performed under this **Contract**; and

9.1.2 The sequence and interrelation of each of these operations with the others and with those of other related contracts; and

9.1.3 The estimated time required for fabrication or delivery, or both, of all materials and equipment required for the **Work**, including the anticipated time for obtaining required approvals pursuant to Article 10; and

9.1.4 The estimated amount in dollars the **Contractor** will claim on a monthly basis.

9.2 The proposed schedule shall be revised as directed by the **Engineer**, until finally approved by the **Engineer**, and after such approval, subject to the provisions of Article 11, shall be strictly adhered to by the **Contractor**.

9.3 If the **Contractor** shall fail to adhere to the approved progress schedule, or to the schedule as revised pursuant to Article 11, it shall promptly adopt such other or additional **Means and Methods of Construction**, at its sole cost and expense, as will make up for the time lost and will assure completion in accordance with the approved progress schedule. The approval by the **City** of a progress schedule which is shorter than the time allotted under the **Contract** shall not create any liability for the **City** if the approved progress schedule is not met.

9.4 The **Contractor** will not receive any payments until the proposed progress schedule is submitted.

ARTICLE 10. REQUESTS FOR INFORMATION OR APPROVAL

10.1 From time to time as the **Work** progresses and in the sequence indicated by the approved progress schedule, the **Contractor** shall submit to the **Engineer** a specific request in writing for each item of information or approval required by the **Contractor**. These requests shall state the latest date upon which the information or approval is actually required by the **Contractor**, and shall be submitted in a reasonable time in advance thereof to provide the **Engineer** a sufficient time to act upon such submissions, or any necessary re-submissions thereof.

10.2 The **Contractor** shall not have any right to an extension of time on account of delays due to the **Contractor's** failure to submit requests for the required information or the required approval in accordance with the above requirements.

ARTICLE 11. NOTICE OF CONDITIONS CAUSING DELAY AND DOCUMENTATION OF DAMAGES CAUSED BY DELAY

11.1 After the commencement of any condition which is causing or may cause a delay in completion of the **Work**, including conditions for which the **Contractor** may be entitled to an extension of time, the following notifications and submittals are required:

11.1.1 Within fifteen (15) **Days** after the **Contractor** becomes aware or reasonably should be aware of each such condition, the **Contractor** must notify the **Resident Engineer** or **Engineer**, as directed by the **Commissioner**, in writing of the existence, nature and effect of such condition upon the approved progress schedule and the **Work**, and must state why and in what respects, if any, the condition is causing or may cause a delay. Such notice shall include a description of the construction activities that are or could be affected by the condition and may include any recommendations the **Contractor** may have to address the delay condition and any activities the **Contractor** may take to avoid or minimize the delay.

11.1.2 If the **Contractor** shall claim to be sustaining damages for delay as provided for in this Article 11,within forty-five (45) **Days** from the time such damages are first incurred for each such condition, the **Contractor** shall submit to the **Commissioner** a verified written statement of the details and estimates of the amounts of such damages, including categories of expected damages and projected monthly costs, together with documentary evidence of such damages as the **Contractor** may have at the time of submission ("statement of delay damages"), as further detailed in Article 11.6. The **Contractor** may submit the above statement within such additional time as may be granted by the **Commissioner** in writing upon written request therefor.

11.1.3 Articles 11.1.1 and 11.1.2 do not relieve the **Contractor** of its obligation to comply with the provisions of Article 44.

11.2 Failure of the **Contractor** to strictly comply with the requirements of Article 11.1.1 may, in the discretion of the **Commissioner**, be deemed sufficient cause to deny any extension of time on account of delay arising out of such condition. Failure of the **Contractor** to strictly comply with the requirements of both Articles 11.1.1 and 11.1.2 shall be deemed a conclusive waiver by the **Contractor** of any and all claims for damages for delay arising from such condition and no right to recover on such claims shall exist.

11.3 When appropriate and directed by the **Engineer**, the progress schedule shall be revised by the **Contractor** until finally approved by the **Engineer**. The revised progress schedule must be strictly adhered to by the **Contractor**.

11.4 Compensable Delays

11.4.1 The **Contractor** agrees to make claim only for additional costs attributable to delay in the performance of this **Contract** necessarily extending the time for completion of the **Work** or resulting from acceleration directed by the **Commissioner** and required to maintain the progress schedule, occasioned solely by any act or omission to act of the **City** listed below. The **Contractor** also agrees that delay from any other cause shall be

compensated, if at all, solely by an extension of time to complete the performance of the **Work**.

11.4.1.1 The failure of the **City** to take reasonable measures to coordinate and progress the **Work** to the extent required by the **Contract**, except that the City shall not be responsible for the **Contractor's** obligation to coordinate and progress the **Work** of its **Subcontractors**.

11.4.1.2 Unreasonable delays attributable to the review of shop drawings, the issuance of change orders, or the cumulative impact of change orders that were not brought about by any act or omission of the **Contractor**.

11.4.1.3 The unavailability of the **Site** caused by acts or omissions of the **City**..

11.4.1.4 The issuance by the **Engineer** of a stop work order that was not brought about through any act or omission of the **Contractor**.

11.4.1.5 Differing site conditions or environmental hazards that were neither known nor reasonably ascertainable on a pre-bid inspection of the **Site** or review of the bid documents or other publicly available sources, and that are not ordinarily encountered in the **Project**'s geographical area or neighborhood or in the type of **Work** to be performed.

11.4.1.6 Delays caused by the **City's** bad faith or its willful, malicious, or grossly negligent conduct;

11.4.1.7 Delays not contemplated by the parties;

11.4.1.8 Delays so unreasonable that they constitute an intentional abandonment of the **Contract** by the **City**; and

11.4.1.9 Delays resulting from the **City's** breach of a fundamental obligation of the **Contract**.

11.4.2 No claim may be made for any alleged delay in **Substantial Completion** of the **Work** if the **Work** will be or is substantially completed by the date of **Substantial Completion** provided for in Schedule A unless acceleration has been directed by the **Commissioner** to meet the date of **Substantial Completion** set forth in Schedule A, or unless there is a provision in the **Contract** providing for additional compensation for early completion.

11.4.3 The provisions of this Article 11 apply only to claims for additional costs attributable to delay and do not preclude determinations by the **Commissioner** allowing reimbursements for additional costs for **Extra Work** pursuant to Articles 25 and 26 of this **Contract**. To the extent that any cost attributable to delay is reimbursed as part of a change order, no additional claim for compensation under this Article 11 shall be allowed.

11.5 Non-Compensable Delays. The **Contractor** agrees to make no claim for, and is deemed to have included in its bid prices for the various items of the **Contract**, the extra/additional costs attributable to any delays caused by or attributable to the items set forth below. For such items, the **Contractor** shall be compensated, if at all, solely by an extension of time to complete the performance of the **Work**, in accordance with the provisions of Article 13. Such extensions of time will be granted, if at all, pursuant to the grounds set forth in Article 13.3.

11.5.1 The acts or omissions of any third parties, including but not limited to **Other Contractors**, public/ governmental bodies (other than **City Agencies**), utilities or private enterprises, who are disclosed in the **Contract Documents** or are ordinarily encountered or generally recognized as related to the **Work**;

11.5.2 Any situation which was within the contemplation of the parties at the time of entering into the **Contract**, including any delay indicated or disclosed in the **Contract Documents** or that would be generally recognized by a reasonably prudent contractor as related to the nature of the **Work**, and/or the existence of any facility or appurtenance owned, operated or maintained by any third party, as indicated or disclosed in the **Contract Documents** or ordinarily encountered or generally recognized as related to the nature of the **Work**;

11.5.3 Restraining orders, injunctions or judgments issued by a court which were caused by a Contractor's submission, action or inaction or by a Contractor's **Means and Methods of Construction**, or by third parties, unless such order, injunction or judgment was the result of an act or omission by the **City**;

11.5.4 Any labor boycott, strike, picketing, lockout or similar situation;

11.5.5 Any shortages of supplies or materials, or unavailability of equipment, required by the **Contract Work**;

11.5.6 Climatic conditions, storms, floods, droughts, tidal waves, fires, hurricanes, earthquakes, landslides or other catastrophes or acts of God, or acts of war or of the public enemy or terrorist acts, including the **City's** reasonable responses thereto; and

11.5.7 **Extra Work** which does not significantly affect the overall completion of the **Contract**, reasonable delays in the review or issuance of change orders or field orders and/or in shop drawing reviews or approvals.

11.6 Required Content of Submission of Statement of Delay Damages

11.6.1 In the verified written statement of delay damages required by Article 11.1.2, the following information shall be provided by the **Contractor**:

11.6.1.1 For each delay, the start and end dates of the claimed periods of delay and, in addition, a description of the operations that were delayed, an explanation of how they were delayed, and the reasons for the delay, including identifying the applicable act or omission of the City listed in Article 11.4.

11.6.1.2 A detailed factual statement of the claim providing all necessary dates, locations and items of **Work** affected by the claim.

11.6.1.3 The estimated amount of additional compensation sought and a breakdown of that amount into categories as described in Article 11.7.

11.6.1.4 Any additional information requested by the **Commissioner**.

11.7 Recoverable Costs

11.7.1 Delay damages may be recoverable for the following costs actually and necessarily incurred in the performance of the **Work**:

11.7.1.1 Direct labor, including payroll taxes (subject to statutory wage caps) and supplemental benefits, based on time and materials records;

11.7.1.2 Necessary materials (including transportation to the **Site**), based on time and material records;

11.7.1.3 Reasonable rental value of necessary plant and equipment other than small tools, plus fuel/energy costs according to the applicable formula set forth in Articles 26.2.4 and/or 26.2.8, based on time and material records;

11.7.1.4 Additional insurance and bond costs;

11.7.1.5 Extended **Site** overhead, field office rental, salaries of field office staff, on-site project managers and superintendents, field office staff vehicles, **Project**-specific storage, field office utilities and telephone, and field office consumables;

11.7.1.6 Labor escalation costs based on actual costs;

11.7.1.7 Materials and equipment escalation costs based on applicable industry indices unless documentation of actual increased cost is provided;

11.7.1.8 Additional material and equipment storage costs based on actual documented costs and additional costs necessitated by extended manufacturer warranty periods; and

11.7.1.9 Extended home office overhead calculated based on the following formula:

(1) Subtract from the original **Contract** amount the amount earned by original contractual **Substantial Completion** date (not including change orders);

(2) Remove 15% overhead and profit from the calculation in item (1) by dividing the results of item (1) by 1.15;

(3) Multiply the result of item (2) by 7.25% for the total home office overhead;

(4) Multiply the result of item (3) by 7.25% for the total profit; and

(5) The total extended home office overhead will be the total of items (3) and (4).

11.7.2 Recoverable Subcontractor Costs. When the **Work** is performed by a **Subcontractor**, the **Contractor** may be paid the actual and necessary costs of such subcontracted **Work** as outlined above in Articles 11.7.1.1 through 11.7.1.8, and an additional overhead of 5% of the costs outlined in Articles 11.7.1.1 through 11.7.1.3.

11.7.3 Non-Recoverable Costs. The parties agree that the **City** will have no liability for the following items and the **Contractor** agrees it shall make no claim for the following items:

11.7.3.1 Profit, or loss of anticipated or unanticipated profit, except as provided in Article 11.7.1.9;

11.7.3.2 Consequential damages, including, but not limited to, construction or bridge loans or interest paid on such loans, loss of bonding capacity, bidding opportunities, or interest in investment, or any resulting insolvency;

11.7.3.3 Indirect costs or expenses of any nature except those included in Article 11.7.1;

11.7.3.4 Direct or indirect costs attributable to performance of **Work** where the **Contractor**, because of situations or conditions within its control, has not progressed the **Work** in a satisfactory manner; and

11.7.3.5 Attorneys' fees and dispute and claims preparation expenses.

11.8 Any claims for delay under this Article 11 are not subject to the jurisdiction of the Contract Dispute Resolution Board pursuant to the dispute resolution process set forth in Article 27.

11.9 Any compensation provided to the **Contractor** in accordance with this Article 11 will be made pursuant to a claim filed with the **Comptroller**. Nothing in this Article 11 extends the time for the **Contractor** to file an action with respect to a claim within six months after **Substantial Completion** pursuant to Article 56.

ARTICLE 12. COORDINATION WITH OTHER CONTRACTORS

12.1 During the progress of the **Work**, **Other Contractors** may be engaged in performing other work or may be awarded other contracts for additional work on this **Project**. In that event, the **Contractor** shall coordinate the **Work** to be done hereunder with the work of such **Other Contractors** and the **Contractor** shall fully cooperate with such **Other Contractors** and carefully fit its own **Work** to that provided under other contracts as may be directed by the **Engineer**. The **Contractor** shall not commit or permit any act which will interfere with the performance of work by any **Other Contractors**.

12.2 If the **Engineer** determines that the **Contractor** is failing to coordinate its **Work** with the work of **Other Contractors** as the **Engineer** has directed, then the **Commissioner** shall have the right to withhold any payments otherwise due hereunder until the **Contractor** completely complies with the **Engineer's** directions.

12.3 The **Contractor** shall notify the **Engineer** in writing if any **Other Contractor** on this **Project** is failing to coordinate its work with the **Work** of this **Contract**. If the **Engineer** finds such charges to be true, the **Engineer** shall promptly issue such directions to the **Other Contractor** with respect thereto as the situation may require. The **City** shall not, however, be liable for any damages suffered by any **Other Contractor's** failure to coordinate its work with the **Work** of this **Contract** or by reason of the **Other Contractor's** failure to promptly comply with the directions so issued by the **Engineer**, or by reason of any **Other Contractor's** default in performance, it being understood that the **City** does not guarantee the responsibility or continued efficiency of any contractor. The **Contractor** agrees to make no claim against the **City** for any damages relating to or arising out of any directions issued by the **Engineer** pursuant to this Article 12 (including but not limited to the failure of any **Other Contractor** to comply or promptly comply with such directions), or the failure of any **Other Contractor** to coordinate its work, or the default in performance of any **Other Contractor**.

12.4 The **Contractor** shall indemnify and hold the **City** harmless from any and all claims or judgments for damages and from costs and expenses to which the **City** may be subjected or which it may suffer or incur by reason of the **Contractor's** failure to comply with the **Engineer's** directions promptly; and the **Comptroller** shall have the right to exercise the powers reserved in Article 23 with respect to any claims which may be made for damages due to the **Contractor's** failure to comply with the **Engineer's** directions promptly. Insofar as the facts and **Law** relating to any claim would preclude the **City** from being completely indemnified by the **Contractor**, the **City** shall be partially indemnified by the **Contractor** to the fullest extent provided by **Law**.

12.5 Should the **Contractor** sustain any damage through any act or omission of any **Other Contractor** having a contract with the **City** for the performance of work upon the **Site** or of work which may be necessary to be performed for the proper prosecution of the **Work** to be performed hereunder, or through any act or omission of a subcontractor of such **Other Contractor**, the **Contractor** shall have no claim against the **City** for such damage, but shall have a right to recover such damage from the **Other**

Contractor under the provision similar to the following provisions which apply to this **Contract** and have been or will be inserted in the contracts with such **Other Contractors**:

12.5.1 Should any **Other Contractor** having or who shall hereafter have a contract with the **City** for the performance of work upon the **Site** sustain any damage through any act or omission of the **Contractor** hereunder or through any act or omission of any **Subcontractor** of the **Contractor**, the **Contractor** agrees to reimburse such **Other Contractor** for all such damages and to defend at its own expense any action based upon such claim and if any judgment or claim (even if the allegations of the action are without merit) against the **City** shall be allowed the **Contractor** shall pay or satisfy such judgment or claim and pay all costs and expenses in connection therewith and agrees to indemnify and hold the **City** harmless from all such claims. Insofar as the facts and **Law** relating to any claim would preclude the **City** from being completely indemnified by the **Contractor**, the **City** shall be partially indemnified by the **Contractor** to the fullest extent provided by **Law**.

12.6 The **City's** right to indemnification hereunder shall in no way be diminished, waived or discharged by its recourse to assessment of liquidated damages as provided in Article 15, or by the exercise of any other remedy provided for by **Contract** or by **Law**.

ARTICLE 13. EXTENSION OF TIME FOR PERFORMANCE

13.1 If performance by the **Contractor** is delayed for a reason set forth in Article 13.3, the **Contractor** may be allowed a reasonable extension of time in conformance with this Article 13 and the **PPB** Rules.

13.2 Any extension of time may be granted only by the **ACCO** or by the Board for the Extension of Time (hereafter "Board") (as set forth below) upon written application by the **Contractor**.

13.3 Grounds for Extension: If such application is made, the **Contractor** shall be entitled to an extension of time for delay in completion of the **Work** caused solely:

13.3.1 By the acts or omissions of the **City**, its officials, agents or employees; or

13.3.2 By the act or omissions of **Other Contractors** on this **Project**; or

13.3.3 By supervening conditions entirely beyond the control of either party hereto (such as, but not limited to, acts of God or the public enemy, excessive inclement weather, war or other national emergency making performance temporarily impossible or illegal, or strikes or labor disputes not brought about by any act or omission of the **Contractor**).

13.3.4 The **Contractor** shall, however, be entitled to an extension of time for such causes only for the number of **Days** of delay which the **ACCO** or the Board may determine to be due solely to such causes, and then only if the **Contractor** shall have strictly complied with all of the requirements of Articles 9 and 10.

13.4 The **Contractor** shall not be entitled to receive a separate extension of time for each of several causes of delay operating concurrently, but, if at all, only for the actual period of delay in completion of the **Work** as determined by the **ACCO** or the Board, irrespective of the number of causes contributing to produce such delay. If one of several causes of delay operating concurrently results from any act, fault or omission of the **Contractor** or of its **Subcontractors** or **Materialmen**, and would of itself (irrespective

of the concurrent causes) have delayed the **Work**, no extension of time will be allowed for the period of delay resulting from such act, fault or omission.

13.5 The determination made by the **ACCO** or the Board on an application for an extension of time shall be binding and conclusive on the **Contractor**.

13.6 The **ACCO** or the Board acting entirely within their discretion may grant an application for an extension of time for causes of delay other than those herein referred.

13.7 Permitting the **Contractor** to continue with the **Work** after the time fixed for its completion has expired, or after the time to which such completion may have been extended has expired, or the making of any payment to the **Contractor** after such time, shall in no way operate as a waiver on the part of the **City** of any of its rights under this **Contract**.

13.8 Application for Extension of Time:

13.8.1 Before the **Contractor's** time extension request will be considered, the **Contractor** shall notify the **ACCO** of the condition which allegedly has caused or is causing the delay, and shall submit a written application to the **ACCO** identifying:

13.8.1(a) The **Contractor**; the registration number; and **Project** description;

13.8.1(b) Liquidated damage assessment rate, as specified in the **Contract**;

13.8.1(c) Original total bid price;

13.8.1(d) The original **Contract** start date and completion date;

13.8.1(e) Any previous time extensions granted (number and duration); and

13.8.1(f) The extension of time requested.

13.8.2 In addition, the application for extension of time shall set forth in detail:

13.8.2(a) The nature of each alleged cause of delay in completing the **Work**;

13.8.2(b) The date upon which each such cause of delay began and ended and the number of **Days** attributable to each such cause;

13.8.2(c) A statement that the **Contractor** waives all claims except for those delineated in the application, and the particulars of any claims which the **Contractor** does not agree to waive. For time extensions for **Substantial Completion** and final completion payments, the application shall include a detailed statement of the dollar amounts of each element of claim item reserved; and

13.8.2(d) A statement indicating the **Contractor's** understanding that the time extension is granted only for purposes of permitting continuation of **Contract** performance and payment for **Work** performed and that the **City** retains its right to conduct an investigation and assess liquidated damages as appropriate in the future.

13.9 Analysis and Approval of Time Extensions:

13.9.1 For time extensions for partial payments, a written determination shall be made by the **ACCO** who may, for good and sufficient cause, extend the time for the performance of the **Contract** as follows:

13.9.1(a) If the **Work** is to be completed within six (6) months, the time for performance may be extended for sixty (60) **Days**;

13.9.1(b) If the **Work** is to be completed within less than one (1) year but more than six (6) months, an extension of ninety (90) **Days** may be granted;

13.9.1(c) If the **Contract** period exceeds one (1) year, besides the extension granted in Article 13.9.1(b), an additional thirty (30) **Days** may be granted for each multiple of six (6) months involved beyond the one (1) year period; or

13.9.1(d) If exceptional circumstances exist, the **ACCO** may extend the time for performance beyond the extensions in Articles 13.9.1(a), 13.9.1(b), and 13.9.1(c). In that event, the **ACCO** shall file with the Mayor's Office of Contract Services a written explanation of the exceptional circumstances.

13.9.2 For extensions of time for **Substantial Completion** and final completion payments, the **Engineer**, in consultation with the **ACCO**, shall prepare a written analysis of the delay (including a preliminary determination of the causes of delay, the beginning and end dates for each such cause of delay, and whether the delays are excusable under the terms of this **Contract**). The report shall be subject to review by and approval of the Board, which shall have authority to question its analysis and determinations and request additional facts or documentation. The report as reviewed and made final by the Board shall be made a part of the **Agency** contract file. Neither the report itself nor anything contained therein shall operate as a waiver or release of any claim the **City** may have against the **Contractor** for either actual or liquidated damages.

13.9.3 Approval Mechanism for Time Extensions for **Substantial Completion** or Final Completion Payments: An extension shall be granted only with the approval of the Board which is comprised of the **ACCO** of the **Agency**, the **City** Corporation Counsel, and the **Comptroller**, or their authorized representatives.

13.9.4 Neither the granting of any application for an extension of time to the **Contractor** or any **Other Contractor** on this **Project** nor the papers, records or reports related to any application for or grant of an extension of time or determination related thereto shall be referred to or offered in evidence by the **Contractor** or its attorneys in any action or proceeding.

13.10 No Damage for Delay: The **Contractor** agrees to make no claim for damages for delay in the performance of this **Contract** occasioned by any act or omission to act of the **City** or any of its representatives, except as provided for in Article 11.

ARTICLE 14. COMPLETION AND FINAL ACCEPTANCE OF THE WORK

14.1 Date for **Substantial Completion**: The **Contractor** shall substantially complete the **Work** within the time fixed in Schedule A of the General Conditions, or within the time to which such **Substantial Completion** may be extended.

14.2 Determining the Date of **Substantial Completion**: The **Work** will be deemed to be substantially complete when the two conditions set forth below have been met.

14.2.1 Inspection: The **Engineer** or **Resident Engineer**, as applicable, has inspected the **Work** and has made a written determination that it is substantially complete.

14.2.2 Approval of **Final Approved Punch List** and Date for **Final Acceptance**: Following inspection of the **Work**, the **Engineer/Resident Engineer** shall furnish the **Contractor** with a final punch list, specifying all items of **Work** to be completed and proposing dates for the completion of each specified item of **Work**. The **Contractor** shall then submit in writing to the **Engineer/Resident Engineer** within ten (10) **Days** of the **Engineer/Resident Engineer** furnishing the final punch list either acceptance of the dates or proposed alternative dates for the completion of each specified item of **Work**. If the **Contractor** neither accepts the dates nor proposes alternative dates within ten (10) **Days**, the schedule proposed by the **Engineer/Resident Engineer** shall be deemed accepted. If the **Contractor** proposes alternative dates, then, within a reasonable time after receipt, the **Engineer/Resident Engineer**, in a written notification to the **Contractor**, shall approve the **Contractor's** completion dates or, if they are unable to agree, the **Engineer/Resident Engineer** shall establish dates for the completion of each item of **Work**. The latest completion date specified shall be the date for **Final Acceptance** of the **Work**.

14.3 Date of **Substantial Completion**. The date of approval of the **Final Approved Punch List**, shall be the date of **Substantial Completion**. The date of approval of the **Final Approved Punch List** shall be either (a) if the **Contractor** approves the final punch list and proposed dates for completion furnished by the **Engineer/Resident Engineer**, the date of the **Contractor**'s approval; or (b) if the **Contractor** neither accepts the dates nor proposes alternative dates, ten (10) **Days** after the **Engineer/Resident Engineer** furnishes the **Contractor** with a final punch list and proposed dates for completion; or (c) if the **Contractor** proposes alternative dates, the date that the **Engineer/Resident Engineer** sends written notification to the **Contractor** either approving the **Contractor**'s proposed alternative dates or establishing dates for the completion for each item of **Work**.

14.4 Determining the Date of **Final Acceptance**: The **Work** will be accepted as final and complete as of the date of the **Engineer**'s/**Resident Engineer**'s inspection if, upon such inspection, the **Engineer/Resident Engineer** finds that all items on the **Final Approved Punch List** are complete and no further **Work** remains to be done. The **Commissioner** will then issue a written determination of **Final Acceptance**.

14.5 Request for Inspection: Inspection of the **Work** by the **Engineer/Resident Engineer** for the purpose of **Substantial Completion** or **Final Acceptance** shall be made within fourteen (14) **Days** after receipt of the **Contractor's** written request therefor.

14.6 Request for Re-inspection: If upon inspection for the purpose of **Substantial Completion** or **Final Acceptance**, the **Engineer/Resident Engineer** determines that there are items of **Work** still to be performed, the **Contractor** shall promptly perform them and then request a re-inspection. If upon re-inspection, the **Engineer/Resident Engineer** determines that the **Work** is substantially complete or finally accepted, the date of such re-inspection shall be the date of **Substantial Completion** or **Final Acceptance**. Re-inspection by the **Engineer/Resident Engineer** shall be made within ten (10) **Days** after receipt of the **Contractor's** written request therefor.

14.7 Initiation of Inspection by the **Engineer/Resident Engineer**: If the **Contractor** does not request inspection or re-inspection of the **Work** for the purpose of **Substantial Completion** or **Final Acceptance**, the **Engineer/Resident Engineer** may initiate such inspection or re-inspection.

ARTICLE 15. LIQUIDATED DAMAGES

15.1 In the event the **Contractor** fails to substantially complete the **Work** within the time fixed for such **Substantial Completion** in Schedule A of the General Conditions, plus authorized time extensions, or if the **Contractor**, in the sole determination of the **Commissioner**, has abandoned the **Work**, the **Contractor** shall pay to the **City** the sum fixed in Schedule A of the General Conditions, for each and every **Day** that the time consumed in substantially completing the **Work** exceeds the time allowed therefor; which said sum, in view of the difficulty of accurately ascertaining the loss which the **City** will suffer by reason of delay in the **Substantial Completion** of the **Work** hereunder, is hereby fixed and agreed as the liquidated damages that the **City** will suffer by reason of such delay, and not as a penalty. This Article 15 shall also apply to the **Contractor** whether or not the **Contractor** is defaulted pursuant to Chapter X of this **Contract**. Neither the failure to assess liquidated damages nor the granting of any time extension shall operate as a waiver or release of any claim the **City** may have against the **Contractor** for either actual or liquidated damages.

15.2 Liquidated damages received hereunder are not intended to be nor shall they be treated as either a partial or full waiver or discharge of the **City's** right to indemnification, or the **Contractor's** obligation to indemnify the **City**, or to any other remedy provided for in this **Contract** or by **Law**.

15.3 The **Commissioner** may deduct and retain out of the monies which may become due hereunder, the amount of any such liquidated damages; and in case the amount which may become due hereunder shall be less than the amount of liquidated damages suffered by the **City**, the **Contractor** shall be liable to pay the difference.

ARTICLE 16. OCCUPATION OR USE PRIOR TO COMPLETION

16.1 Unless otherwise provided for in the **Specifications**, the **Commissioner** may take over, use, occupy or operate any part of the **Work** at any time prior to **Final Acceptance**, upon written notification to the **Contractor**. The **Engineer** or **Resident Engineer**, as applicable, shall inspect the part of the **Work** to be taken over, used, occupied, or operated, and will furnish the **Contractor** with a written statement of the **Work**, if any, which remains to be performed on such part. The **Contractor** shall not object to, nor interfere with, the **Commissioner's** decision to exercise the rights granted by Article 16. In the event the **Commissioner** takes over, uses, occupies, or operates any part of the **Work:**

16.1.1 the **Engineer/Resident Engineer** shall issue a written determination of **Substantial Completion** with respect to such part of the **Work**;

16.1.2 the **Contractor** shall be relieved of its absolute obligation to protect such part of the unfinished **Work** in accordance with Article 7;

16.1.3 the **Contractor's** guarantee on such part of the **Work** shall begin on the date of such use by the **City**; and;

16.1.4 the **Contractor** shall be entitled to a return of so much of the amount retained in accordance with Article 21 as it relates to such part of the **Work**, except so much thereof as may be retained under Articles 24 and 44.

CHAPTER IV: SUBCONTRACTS AND ASSIGNMENTS

ARTICLE 17. SUBCONTRACTS

17.1 The **Contractor** shall not make subcontracts totaling an amount more than the percentage of the total **Contract** price fixed in Schedule A of the General Conditions, without prior written permission from the **Commissioner**. All subcontracts made by the **Contractor** shall be in writing. No **Work** may be performed by a **Subcontractor** prior to the **Contractor** entering into a written subcontract with the **Subcontractor** and complying with the provisions of this Article 17.

17.2 Before making any subcontracts, the **Contractor** shall submit a written statement to the **Commissioner** giving the name and address of the proposed **Subcontractor**; the portion of the **Work** and materials which it is to perform and furnish; the cost of the subcontract; the VENDEX questionnaire if required; the proposed subcontract if requested by the **Commissioner**; and any other information tending to prove that the proposed **Subcontractor** has the necessary facilities, skill, integrity, past experience, and financial resources to perform the **Work** in accordance with the terms and conditions of this **Contract**.

17.3 In addition to the requirements in Article 17.2, **Contractor** is required to list the **Subcontractor** in the web based Subcontractor Reporting System through the City's Payee Information Portal (PIP), available at www.nyc.gov/pip.[1] For each **Subcontractor** listed, **Contractor** is required to provide the following information: maximum contract value, description of **Subcontractor's** Work, start and end date of the subcontract and identification of the **Subcontractor**'s industry. Thereafter, **Contractor** will be required to report in the system the payments made to each **Subcontractor** within 30 days of making the payment. If any of the required information changes throughout the Term of the **Contract**, **Contractor** will be required to revise the information in the system.

Failure of the **Contractor** to list a **Subcontractor** and/or to report **Subcontractor** payments in a timely fashion may result in the **Commissioner** declaring the **Contractor** in default of the **Contract** and will subject **Contractor** to liquidated damages in the amount of $100 per day for each day that the **Contractor** fails to identify a **Subcontractor** along with the required information about the **Subcontractor** and/or fails to report payments to a **Subcontractor**, beyond the time frames set forth herein or in the notice from the **City**. Article 15 shall govern the issue of liquidated damages.

17.4 If an approved **Subcontractor** elects to subcontract any portion of its subcontract, the proposed sub-subcontract shall be submitted in the same manner as directed above.

17.5 The **Commissioner** will notify the **Contractor** in writing whether the proposed **Subcontractor** is approved. If the proposed **Subcontractor** is not approved, the **Contractor** may submit another proposed **Subcontractor** unless the **Contractor** decides to do the **Work**. No **Subcontractor** shall be permitted to enter or perform any work on the **Site** unless approved.

17.6 Before entering into any subcontract hereunder, the **Contractor** shall provide the proposed **Subcontractor** with a complete copy of this document and inform the proposed **Subcontractor** fully and completely of all provisions and requirements of this **Contract** relating either directly or indirectly to the **Work** to be performed and the materials to be furnished under such subcontract, and every such

[1] In order to use the new system, a PIP account will be required. Detailed instructions on creating a PIP account and using the new system are also available at www.nyc.gov/pip. Additional assistance with PIP may be obtained by emailing the Financial Information Services Agency Help Desk at pip@fisa.nyc.gov.

Subcontractor shall expressly stipulate that all labor performed and materials furnished by the **Subcontractor** shall strictly comply with the requirements of this **Contract**.

17.7 Documents given to a prospective **Subcontractor** for the purpose of soliciting the **Subcontractor's** bid shall include either a copy of the bid cover or a separate information sheet setting forth the **Project** name, the **Contract** number (if available), the **Agency** (as noted in Article 2.1.6), and the **Project's** location.

17.8 The **Commissioner's** approval of a **Subcontractor** shall not relieve the **Contractor** of any of its responsibilities, duties, and liabilities hereunder. The **Contractor** shall be solely responsible to the **City** for the acts or defaults of its **Subcontractor** and of such **Subcontractor's** officers, agents, and employees, each of whom shall, for this purpose, be deemed to be the agent or employee of the **Contractor** to the extent of its subcontract.

17.9 If the **Subcontractor** fails to maintain the necessary facilities, skill, integrity, past experience, and financial resources (other than due to the **Contractor's** failure to make payments where required) to perform the **Work** in accordance with the terms and conditions of this **Contract**, the **Contractor** shall promptly notify the **Commissioner** and replace such **Subcontractor** with a newly approved **Subcontractor** in accordance with this Article 17.

17.10 The **Contractor** shall be responsible for ensuring that all **Subcontractors** performing **Work** at the **Site** maintain all insurance required by **Law**.

17.11 The **Contractor** shall promptly, upon request, file with the **Engineer** a conformed copy of the subcontract and its cost. The subcontract shall provide the following:

17.11.1 Payment to **Subcontractors**: The agreement between the **Contractor** and its **Subcontractor** shall contain the same terms and conditions as to method of payment for **Work**, labor, and materials, and as to retained percentages, as are contained in this **Contract**.

17.11.2 Prevailing Rate of Wages: The agreement between the **Contractor** and its **Subcontractor** shall include the prevailing wage rates and supplemental benefits to be paid in accordance with Labor Law Section 220.

17.11.3 Section 6-123 of the Administrative Code: Pursuant to the requirements of Section 6-123 of the Administrative Code, every agreement between the **Contractor** and a **Subcontractor** in excess of fifty thousand ($50,000) dollars shall include a provision that the **Subcontractor** shall not engage in any unlawful discriminatory practice as defined in Title VIII of the Administrative Code (Section 8-101 *et seq.*).

17.11.4 All requirements required pursuant to federal and/or state grant agreement(s), if applicable to the **Work**.

17.12 The **Commissioner** may deduct from the amounts certified under this **Contract** to be due to the **Contractor**, the sum or sums due and owing from the **Contractor** to the **Subcontractors** according to the terms of the said subcontracts, and in case of dispute between the **Contractor** and its **Subcontractor**, or **Subcontractors**, as to the amount due and owing, the **Commissioner** may deduct and withhold from the amounts certified under this **Contract** to be due to the **Contractor** such sum or sums as may be claimed by such **Subcontractor**, or **Subcontractors**, in a sworn affidavit, to be due and owing until such time as such claim or claims shall have been finally resolved.

17.13 On contracts where performance bonds and payment bonds are executed, the **Contractor** shall include on each requisition for payment the following data: **Subcontractor's** name, value of the subcontract, total amount previously paid to **Subcontractor** for **Work** previously requisitioned, and the amount, including retainage, to be paid to the **Subcontractor** for **Work** included in the requisition.

17.14 On **Contracts** where performance bonds and payment bonds are not executed, the **Contractor** shall include with each requisition for payment submitted hereunder, a signed statement from each and every **Subcontractor** and/or **Materialman** for whom payment is requested in such requisition. Such signed statement shall be on the letterhead of the **Subcontractor** and/or **Materialman** for whom payment is requested and shall (i) verify that such **Subcontractor** and/or **Materialman** has been paid in full for all **Work** performed and/or material supplied to date, exclusive of any amount retained and any amount included on the current requisition, and (ii) state the total amount of retainage to date, exclusive of any amount retained on the current requisition.

ARTICLE 18. ASSIGNMENTS

18.1 The **Contractor** shall not assign, transfer, convey or otherwise dispose of this **Contract**, or the right to execute it, or the right, title or interest in or to it or any part thereof, or assign, by power of attorney or otherwise any of the monies due or to become due under this **Contract**, unless the previous written consent of the **Commissioner** shall first be obtained thereto, and the giving of any such consent to a particular assignment shall not dispense with the necessity of such consent to any further or other assignments.

18.2 Such assignment, transfer, conveyance or other disposition of this **Contract** shall not be valid until filed in the office of the **Commissioner** and the **Comptroller**, with the written consent of the **Commissioner** endorsed thereon or attached thereto.

18.3 Failure to obtain the previous written consent of the **Commissioner** to such an assignment, transfer, conveyance or other disposition, may result in the revocation and annulment of this **Contract**. The **City** shall thereupon be relieved and discharged from any further liability to the **Contractor**, its assignees, transferees or sublessees, who shall forfeit and lose all monies therefor earned under the **Contract**, except so much as may be required to pay the **Contractor's** employees.

18.4 The provisions of this clause shall not hinder, prevent, or affect an assignment by the **Contractor** for the benefit of its creditors made pursuant to the **Laws** of the State of New York.

18.5 This **Contract** may be assigned by the **City** to any corporation, agency or instrumentality having authority to accept such assignment.

CHAPTER V: CONTRACTOR'S SECURITY AND GUARANTEE

ARTICLE 19. SECURITY DEPOSIT

19.1 If performance and payment bonds are required, the **City** shall retain the bid security to ensure that the successful bidder executes the **Contract** and furnishes the required payment and performance security within ten (10) **Days** after notice of the award of the **Contract**. If the successful bidder fails to execute the **Contract** and furnish the required payment and performance security, the **City** shall retain such bid security as set forth in the Information for Bidders. If the successful bidder executes the

Contract and furnishes the required payment and performance security, the **City** shall return the bid security within a reasonable time after the furnishing of such bonds and execution of the **Contract** by the **City**.

19.2 If performance and payment bonds are not required, the bid security shall be retained by the **City** as security for the **Contractor**'s faithful performance of the **Contract**. If partial payments are provided, the bid security will be returned to the **Contractor** after the sum retained under Article 21 equals the amount of the bid security, subject to other provisions of this **Contract**. If partial payments are not provided, the bid security will be released when final payment is certified by the **City** for payment.

19.3 If the **Contractor** is declared in default under Article 48 prior to the return of the deposit, or if any claim is made such as referred to in Article 23, the amount of such deposit, or so much thereof as the **Comptroller** may deem necessary, may be retained and then applied by the **Comptroller**:

19.3.1 To compensate the **City** for any expense, loss or damage suffered or incurred by reason of or resulting from such default, including the cost of re-letting and liquidated damages; or

19.3.2 To indemnify the **City** against any and all claims.

ARTICLE 20. PAYMENT GUARANTEE

20.1 On **Contracts** where one hundred (100%) percent performance bonds and payment bonds are executed, this Article 20 does not apply.

20.2 In the event the terms of this **Contract** do not require the **Contractor** to provide a payment bond or where the **Contract** does not require a payment bond for one hundred (100%) percent of the **Contract** price, the **City** shall, in accordance with the terms of this Article 20, guarantee payment of all lawful claims for:

20.2.1 Wages and compensation for labor performed and/or services rendered; and

20.2.2 Materials, equipment, and supplies provided, whether incorporated into the **Work** or not, when demands have been filed with the **City** as provided hereinafter by any person, firm, or corporation which furnished labor, material, equipment, supplies, or any combination thereof, in connection with the **Work** performed hereunder (hereinafter referred to as the "beneficiary") at the direction of the **City** or the **Contractor**.

20.3 The provisions of Article 20.2 are subject to the following limitations and conditions:

20.3.1 If the **Contractor** provides a payment bond for a value that is less than one hundred (100%) percent of the value of the **Contract Work**, the payment bond provided by the **Contractor** shall be primary (and non-contributing) to the payment guarantee provided under this Article 20.

20.3.2 The guarantee is made for the benefit of all beneficiaries as defined in Article 20.2 provided that those beneficiaries strictly adhere to the terms and conditions of Article 20.3.4 and 20.3.5.

20.3.3 Nothing in this Article 20 shall prevent a beneficiary providing labor, services or material for the **Work** from suing the **Contractor** for any amounts due and owing the beneficiary by the **Contractor**.

20.3.4 Every person who has furnished labor or material, to the **Contractor** or to a **Subcontractor** of the **Contractor**, in the prosecution of the **Work** and who has not been paid in full therefor before the expiration of a period of ninety (90) **Days** after the date on which the last of the labor was performed or material was furnished by him/her for which the claim is made, shall have the right to sue on this payment guarantee in his/her own name for the amount, or the balance thereof, unpaid at the time of commencement of the action; provided, however, that a person having a direct contractual relationship with a **Subcontractor** of the **Contractor** but no contractual relationship express or implied with the **Contractor** shall not have a right of action upon the guarantee unless he/she shall have given written notice to the **Contractor** within one hundred twenty (120) **Days** from the date on which the last of the labor was performed or the last of the material was furnished, for which his/her claim is made, stating with substantial accuracy the amount claimed and the name of the party to whom the material was furnished or for whom the labor was performed. The notice shall be served by delivering the same personally to the **Contractor** or by mailing the same by registered mail, postage prepaid, in an envelope addressed to the **Contractor** at any place where it maintains an office or conducts its business; provided, however, that where such notice is actually received by the **Contractor** by other means, such notice shall be deemed sufficient.

20.3.5 Except as provided in Labor Law Section 220-g, no action on this payment guarantee shall be commenced after the expiration of the one-year limitations period set forth in Section 137(4)(b) of the State Finance Law.

20.3.6 The **Contractor** shall promptly forward to the **City** any notice or demand received pursuant to Article 20.3.4. The **Contractor** shall inform the **City** of any defenses to the notice or demand and shall forward to the **City** any documents the **City** requests concerning the notice or demand.

20.3.7 All demands made against the **City** by a beneficiary of this payment guarantee shall be presented to the **Engineer** along with all written documentation concerning the demand which the **Engineer** deems reasonably appropriate or necessary, which may include, but shall not be limited to: the subcontract; any invoices presented to the **Contractor** for payment; the notarized statement of the beneficiary that the demand is due and payable, that a request for payment has been made of the **Contractor** and that the demand has not been paid by the **Contractor** within the time allowed for such payment by the subcontract; and copies of any correspondence between the beneficiary and the **Contractor** concerning such demand. The **City** shall notify the **Contractor** that a demand has been made. The **Contractor** shall inform the **City** of any defenses to the demand and shall forward to the **City** any documents the **City** requests concerning the demand.

20.3.8 The **City** shall make payment only if, after considering all defenses presented by the **Contractor**, it determines that the payment is due and owing to the beneficiary making the demand.

20.3.9 No beneficiary shall be entitled to interest from the **City**, or to any other costs, including, but not limited to, attorneys' fees, except to the extent required by State Finance Law Section 137.

20.4 Upon the receipt by the **City** of a demand pursuant to this Article 20, the **City** may withhold from any payment otherwise due and owing to the **Contractor** under this **Contract** an amount sufficient to satisfy the demand.

20.4.1 In the event the **City** determines that the demand is valid, the **City** shall notify the **Contractor** of such determination and the amount thereof and direct the **Contractor** to immediately pay such amount to the beneficiary. In the event the **Contractor**, within seven (7) **Days** of receipt of such notification from the **City**, fails to pay the beneficiary, such failure shall constitute an automatic and irrevocable assignment of payment by the **Contractor** to the beneficiary for the amount of the demand determined by the **City** to be valid. The **Contractor**, without further notification or other process, hereby gives its unconditional consent to such assignment of payment to the beneficiary and authorizes the **City**, on its behalf, to take all necessary actions to implement such assignment of payment, including without limitation the execution of any instrument or documentation necessary to effectuate such assignment.

20.4.2In the event that the amount otherwise due and owing to the **Contractor** by the **City** is insufficient to satisfy such demand, the **City** may, at its option, require payment from the **Contractor** of an amount sufficient to cover such demand and exercise any other right to require or recover payment which the **City** may have under **Law** or **Contract**.

20.4.3 In the event the **City** determines that the demand is invalid, any amount withheld pending the **City**'s review of such demand shall be paid to the **Contractor**; provided, however, no lien has been filed. In the event a claim or an action has been filed, the terms and conditions set forth in Article 23 shall apply. In the event a lien has been filed, the parties will be governed by the provisions of the Lien Law of the State of New York.

20.5 The provisions of this Article 20 shall not prevent the **City** and the **Contractor** from resolving disputes in accordance with the **PPB** Rules, where applicable.

20.6 In the event the **City** determines that the beneficiary is entitled to payment pursuant to this Article 20, such determination and any defenses and counterclaims raised by the **Contractor** shall be taken into account in evaluating the **Contractor's** performance.

20.7 Nothing in this Article 20 shall relieve the **Contractor** of the obligation to pay the claims of all persons with valid and lawful claims against the **Contractor** relating to the **Work**.

20.8 The **Contractor** shall not require any performance, payment or other bonds of any **Subcontractor** if this **Contract** does not require such bonds of the **Contractor**.

20.9 The payment guarantee made pursuant to this Article 20 shall be construed in a manner consistent with Section 137 of the State Finance Law and shall afford to persons furnishing labor or materials to the **Contractor** or its **Subcontractors** in the prosecution of the **Work** under this **Contract** all of the rights and remedies afforded to such persons by such section, including but not limited to, the right to commence an action against the **City** on the payment guarantee provided by this Article 20 within the one-year limitations period set forth in Section 137(4)(b).

ARTICLE 21. RETAINED PERCENTAGE

21.1 If this **Contract** requires one hundred (100%) percent performance and payment security, then as further security for the faithful performance of this **Contract**, the **Commissioner** shall deduct, and

retain until the substantial completion of the **Work**, five (5%) percent of the value of **Work** certified for payment in each partial payment voucher.

21.2 If this **Contract** does not require one hundred (100%) percent performance and payment security and if the price for which this **Contract** was awarded does not exceed one million ($1,000,000) dollars, then as further security for the faithful performance of this **Contract**, the **Commissioner** shall deduct, and retain until the substantial completion of the **Work**, five (5%) percent of the value of **Work** certified for payment in each partial payment voucher.

21.3 If this **Contract** does not require one hundred (100%) percent performance and payment security and if the price for which this **Contract** was awarded exceeds one million ($1,000,000) dollars, then as further security for the faithful performance of this **Contract,** the **Commissioner** shall deduct, and retain until the substantial completion of the **Work**, up to ten (10%) percent of the value of **Work** certified for payment in each partial payment voucher. The percentage to be retained is set forth in Schedule A of the General Conditions.

ARTICLE 22. INSURANCE

22.1 Types of Insurance: The **Contractor** shall procure and maintain the following types of insurance if, and as indicated, in Schedule A of the General Conditions (with the minimum limits and special conditions specified in Schedule A). Such insurance shall be maintained from the date the **Contractor** is required to provide Proof of Insurance pursuant to Article 22.3.1 through the date of completion of all required **Work** (including punch list work as certified in writing by the **Resident Engineer**), except for insurance required pursuant to Article 22.1.4, which may terminate upon **Substantial Completion** of the **Contract**. All insurance shall meet the requirements set forth in this Article 22. Wherever this Article requires that insurance coverage be "at least as broad" as a specified form (including all ISO forms), there is no obligation that the form itself be used, provided that the **Contractor** can demonstrate that the alternative form or endorsement contained in its policy provides coverage at least as broad as the specified form.

22.1.1 Commercial General Liability Insurance: The **Contractor** shall provide Commercial General Liability Insurance covering claims for property damage and/or bodily injury, including death, which may arise from any of the operations under this **Contract**. Coverage under this insurance shall be at least as broad as that provided by the latest edition of Insurance Services Office ("ISO") Form CG 0001. Such insurance shall be "occurrence" based rather than "claims-made" and include, without limitation, the following types of coverage: premises operations; products and completed operations; contractual liability (including the tort liability of another assumed in a contract); broad form property damage; independent contractors; explosion, collapse and underground (XCU); construction means and methods; and incidental malpractice. Such insurance shall contain a "per project" aggregate limit, as specified in Schedule A, that applies separately to operations under this **Contract**.

22.1.1(a) Such Commercial General Liability Insurance shall name the **City** as an Additional Insured. Coverage for the City shall specifically include the **City's** officials and employees, be at least as broad as the latest edition of ISO Form CG 20 10 and provide completed operations coverage at least as broad as the latest edition of ISO Form CG 20 37.

22.1.1(b) Such Commercial General Liability Insurance shall name all other entities designated as additional insureds in Schedule A but only for claims arising from the

Contractor's operations under this **Contract**, with coverage at least as broad as the latest edition of ISO Form CG 20 26.

22.1.1(c) If the **Work** requires a permit from the Department of Buildings pursuant to 1 RCNY Section 101-08, the **Contractor** shall provide Commercial General Liability Insurance with limits of at least those required by 1 RCNY section 101-08 or greater limits required by the Agency in accordance with Schedule A. If the **Work** does not require such a permit, the minimum limits shall be those provided for in Schedule A.

22.1.1(d) If any of the **Work** includes repair of a waterborne vessel owned by or to be delivered to the **City**, such Commercial General Liability shall include, or be endorsed to include, Ship Repairer's Legal Liability Coverage to protect against, without limitation, liability arising from navigation of such vessels prior to delivery to and acceptance by the **City**.

22.1.2 Workers' Compensation Insurance, Employers' Liability Insurance, and Disability Benefits Insurance: The **Contractor** shall provide, and shall cause its **Subcontractors** to provide, Workers Compensation Insurance, Employers' Liability Insurance, and Disability Benefits Insurance in accordance with the **Laws** of the State of New York on behalf of all employees providing services under this **Contract** (except for those employees, if any, for which the **Laws** require insurance only pursuant to Article 22.1.3).

22.1.3 United States Longshoremen's and Harbor Workers Act and/or Jones Act Insurance: If specified in Schedule A of the General Conditions or if required by **Law**, the **Contractor** shall provide insurance in accordance with the United States Longshoremen's and Harbor Workers Act and/or the Jones Act, on behalf of all qualifying employees providing services under this **Contract**.

22.1.4 Builders Risk Insurance: If specified in Schedule A of the General Conditions, the **Contractor** shall provide Builders Risk Insurance on a completed value form for the total value of the **Work** through **Substantial Completion** of the **Work** in its entirety. Such insurance shall be provided on an All Risk basis and include coverage, without limitation, for windstorm (including named windstorm), storm surge, flood and earth movement. Unless waived by the **Commissioner**, it shall include coverage for ordinance and law, demolition and increased costs of construction, debris removal, pollutant clean up and removal, and expediting costs. Such insurance shall cover, without limitation, (a) all buildings and/or structures involved in the **Work**, as well as temporary structures at the **Site**, and (b) any property that is intended to become a permanent part of such building or structure, whether such property is on the **Site**, in transit or in temporary storage. Policies shall name the **Contractor** as Named Insured and list the **City** as both an Additional Insured and a Loss Payee as its interest may appear.

22.1.4(a) Policies of such insurance shall specify that, in the event a loss occurs at an occupied facility, occupancy of such facility is permitted without the consent of the issuing insurance company.

22.1.4(b) Such insurance may be provided through an Installation Floater, at the **Contractor's** option, if it otherwise conforms with the requirements of this Article 22.1.4.

22.1.5 Commercial Automobile Liability Insurance: The **Contractor** shall provide Commercial Automobile Liability Insurance for liability arising out of ownership,

maintenance or use of any owned (if any), non-owned and hired vehicles to be used in connection with this **Contract**. Coverage shall be at least as broad as the latest edition of ISO Form CA0001. If vehicles are used for transporting hazardous materials, the Automobile Liability Insurance shall be endorsed to provide pollution liability broadened coverage for covered vehicles (endorsement CA 99 48) as well as proof of MCS 90.

22.1.6 Contractors Pollution Liability Insurance: If specified in Schedule A of the General Conditions, the **Contractor** shall maintain, or cause the **Subcontractor** doing such **Work** to maintain, Contractors Pollution Liability Insurance covering bodily injury and property damage. Such insurance shall provide coverage for actual, alleged or threatened emission, discharge, dispersal, seepage, release or escape of pollutants (including asbestos), including any loss, cost or expense incurred as a result of any cleanup of pollutants (including asbestos) or in the investigation, settlement or defense of any claim, action, or proceedings arising from the operations under this **Contract**. Such insurance shall be in the **Contractor's** name and list the **City** as an Additional Insured and any other entity specified in Schedule A. Coverage shall include, without limitation, (a) loss of use of damaged property or of property that has not been physically injured, (b) transportation, and (c) non-owned disposal sites.

22.1.6(a) Coverage for the **City** as Additional Insured shall specifically include the **City's** officials and employees and be at least as broad as provided to the **Contractor** for this **Project**.

22.1.6(b) If such insurance is written on a claims-made policy, such policy shall have a retroactive date on or before the effective date of this **Contract**, and continuous coverage shall be maintained, or an extended discovery period exercised, for a period of not less than three (3) years from the time the **Work** under this **Contract** is completed.

22.1.7 Marine Insurance:

22.1.7(a) Marine Protection and Indemnity Insurance: If specified in Schedule A of the General Conditions or if the **Contractor** engages in marine operations in the execution of any part of the **Work**, the **Contractor** shall maintain, or cause the **Subcontractor** doing such Work to maintain, Marine Protection and Indemnity Insurance with coverage at least as broad as Form SP-23. The insurance shall provide coverage for the **Contractor** or **Subcontractor** (whichever is doing this **Work**) and for the **City** (together with its officials and employees) and any other entity specified in Schedule A as an Additional Insured for bodily injury and property damage arising from marine operations under this **Contract**. Coverage shall include, without limitation, injury or death of crew members (if not fully provided through other insurance), removal of wreck, damage to piers, wharves and other fixed or floating objects and loss of or damage to any other vessel or craft, or to property on such other vessel or craft.

22.1.7(b) Hull and Machinery Insurance: If specified in Schedule A of the General Conditions or if the **Contractor** engages in marine operations in the execution of any part of the **Work**, the **Contractor** shall maintain, or cause the **Subcontractor** doing such **Work** to maintain, Hull and Machinery Insurance with coverage for the **Contractor** or **Subcontractor** (whichever is doing this Work) and for the **City** (together with its officials and employees) as Additional Insured at least as broad as the latest edition of American Institute Tug Form for all tugs used under this

Contract and Collision Liability at least as broad as the latest edition of American Institute Hull Clauses.

22.1.7(c) Marine Pollution Liability Insurance: If specified in Schedule A of the General Conditions or if the **Contractor** engages in marine operations in the execution of any part of the **Work**, the **Contractor** shall maintain, or cause the **Subcontractor** doing such Work to maintain, Marine Pollution Liability Insurance covering itself (or the Subcontractor doing such Work) as Named Insured and the **City** (together with its officials and employees) and any other entity specified in Schedule A as an Additional Insured. Coverage shall be at least as broad as that provided by the latest edition of Water Quality Insurance Syndicate Form and include, without limitation, liability arising from the discharge or substantial threat of a discharge of oil, or from the release or threatened release of a hazardous substance including injury to, or economic losses resulting from, the destruction of or damage to real property, personal property or natural resources.

22.1.8 The **Contractor** shall provide such other types of insurance, at such minimum limits and with such conditions, as are specified in Schedule A of the General Conditions.

22.2 General Requirements for Insurance Coverage and Policies:

22.2.1 All required insurance policies shall be maintained with companies that may lawfully issue the required policy and have an A.M. Best rating of at least A-/VII or a Standard and Poor's rating of at least A, unless prior written approval is obtained from the **City** Corporation Counsel.

22.2.2 The **Contractor** shall be solely responsible for the payment of all premiums for all required policies and all deductibles and self-insured retentions to which such policies are subject, whether or not the **City** is an insured under the policy.

22.2.3 In his/her sole discretion, the **Commissioner** may, subject to the approval of the **Comptroller** and the **City** Corporation Counsel, accept Letters of Credit and/or custodial accounts in lieu of required insurance.

22.2.4 The **City's** limits of coverage for all types of insurance required pursuant to Schedule A of the General Conditions shall be the greater of (i) the minimum limits set forth in Schedule A or (ii) the limits provided to the **Contractor** as Named Insured under all primary, excess, and umbrella policies of that type of coverage.

22.2.5 The **Contractor** may satisfy its insurance obligations under this Article 22 through primary policies or a combination of primary and excess/umbrella policies, so long as all policies provide the scope of coverage required herein.

22.2.6 Policies of insurance provided pursuant to this Article 22 shall be primary and non-contributing to any insurance or self-insurance maintained by the **City**.

22.3 Proof of Insurance:

22.3.1 For all types of insurance required by Article 22.1 and Schedule A, except for insurance required by Articles 22.1.4 and 22.1.7, the **Contractor** shall file proof of insurance in accordance with this Article 22.3 within ten (10) **Days** of award. For insurance

provided pursuant to Articles 22.1.4 and 22.1.7, proof shall be filed by a date specified by the **Commissioner** or ten (10) **Days** prior to the commencement of the portion of the **Work** covered by such policy, whichever is earlier.

22.3.2 For Workers' Compensation Insurance provided pursuant to Article 22.1.2, the **Contractor** shall submit one of the following forms: C-105.2 Certificate of Workers' Compensation Insurance; U-26.3 - State Insurance Fund Certificate of Workers' Compensation Insurance; Request for WC/DB Exemption (Form CE-200); equivalent or successor forms used by the New York State Workers' Compensation Board; or other proof of insurance in a form acceptable to the **Commissioner**. For Disability Benefits Insurance provided pursuant to Article 22.1.2, the Contractor shall submit DB-120.1 - Certificate Of Insurance Coverage Under The NYS Disability Benefits Law, Request for WC/DB Exemption (Form CE-200); equivalent or successor forms used by the New York State Workers' Compensation Board; or other proof of insurance in a form acceptable to the **Commissioner**. ACORD forms are not acceptable.

22.3.3 For policies provided pursuant to all of Article 22.1 other than Article 22.1.2, the **Contractor** shall submit one or more Certificates of Insurance on forms acceptable to the **Commissioner**. All such Certificates of Insurance shall certify (a) the issuance and effectiveness of such policies of insurance, each with the specified minimum limits (b) for insurance secured pursuant to Article 22.1.1 that the **City** and any other entity specified in Schedule A is an Additional Insured thereunder; (c) in the event insurance is required pursuant to Article 22.1.6 and/or Article 22.1.7, that the City is an Additional Insured thereunder; (d) the company code issued to the insurance company by the National Association of Insurance Commissioners (the NAIC number); and (e) the number assigned to the **Contract** by the **City**. All such Certificates of Insurance shall be accompanied by either a duly executed "Certification by Insurance Broker or Agent" in the form contained in Part III of Schedule A or copies of all policies referenced in such Certificate of Insurance as certified by an authorized representative of the issuing insurance carrier. If any policy is not available at the time of submission, certified binders may be submitted until such time as the policy is available, at which time a certified copy of the policy shall be submitted.

22.3.4 Documentation confirming renewals of insurance shall be submitted to the **Commissioner** prior to the expiration date of coverage of policies required under this **Contract**. Such proofs of insurance shall comply with the requirements of Articles 22.3.2 and 22.3.3.

22.3.5 The **Contractor** shall be obligated to provide the **City** with a copy of any policy of insurance provided pursuant to this Article 22 upon the demand for such policy by the **Commissioner** or the **City** Corporation Counsel.

22.4 Operations of the **Contractor**:

22.4.1 The **Contractor** shall not commence the **Work** unless and until all required certificates have been submitted to and accepted by the **Commissioner**. Acceptance by the **Commissioner** of a certificate does not excuse the **Contractor** from securing insurance consistent with all provisions of this Article 22 or of any liability arising from its failure to do so.

22.4.2 The **Contractor** shall be responsible for providing continuous insurance coverage in the manner, form, and limits required by this **Contract** and shall be authorized to perform **Work** only during the effective period of all required coverage.

22.4.3 In the event that any of the required insurance policies lapse, are revoked, suspended or otherwise terminated, for whatever cause, the **Contractor** shall immediately stop all **Work**, and shall not recommence **Work** until authorized in writing to do so by the **Commissioner**. Upon quitting the **Site**, except as otherwise directed by the **Commissioner**, the **Contractor** shall leave all plant, materials, equipment, tools, and supplies on the **Site**. **Contract** time shall continue to run during such periods and no extensions of time will be granted. The **Commissioner** may also declare the **Contractor** in default for failure to maintain required insurance.

22.4.4 In the event the **Contractor** receives notice, from an insurance company or other person, that any insurance policy required under this Article 22 shall be cancelled or terminated (or has been cancelled or terminated) for any reason, the **Contractor** shall immediately forward a copy of such notice to both the **Commissioner** and the New York City Comptroller, attn: Office of Contract Administration, Municipal Building, One Centre Street, room 1005, New York, New York 10007. Notwithstanding the foregoing, the **Contractor** shall ensure that there is no interruption in any of the insurance coverage required under this Article 22.

22.4.5 Where notice of loss, damage, occurrence, accident, claim or suit is required under an insurance policy maintained in accordance with this Article 22, the **Contractor** shall notify in writing all insurance carriers that issued potentially responsive policies of any such event relating to any operations under this **Contract** (including notice to Commercial General Liability insurance carriers for events relating to the **Contractor**'s own employees) no later than 20 days after such event. For any policy where the **City** is an Additional Insured, such notice shall expressly specify that "this notice is being given on behalf of the City of New York as Insured as well as the Named Insured." Such notice shall also contain the following information: the number of the insurance policy, the name of the named insured, the date and location of the damage, occurrence, or accident, and the identity of the persons or things injured, damaged or lost. The **Contractor** shall simultaneously send a copy of such notice to the City of New York c/o Insurance Claims Specialist, Affirmative Litigation Division, New York City Law Department, 100 Church Street, New York, New York 10007.

22.4.6 In the event of any loss, accident, claim, action, or other event that does or can give rise to a claim under any insurance policy required under this Article 22, the **Contractor** shall at all times fully cooperate with the **City** with regard to such potential or actual claim.

22.5 **Subcontractor** Insurance: In the event the **Contractor** requires any **Subcontractor** to procure insurance with regard to any operations under this **Contract** and requires such **Subcontractor** to name the **Contractor** as an **Additional Insured** thereunder, the **Contractor** shall ensure that the **Subcontractor** name the **City**, including its officials and employees, as an Additional Insured with coverage at least as broad as the most recent edition of ISO Form CG 20 26.

22.6 Wherever reference is made in Article 7 or this Article 22 to documents to be sent to the **Commissioner** (e.g., notices, filings, or submissions), such documents shall be sent to the address set forth in Schedule A of the General Conditions. In the event no address is set forth in Schedule A, such documents are to be sent to the **Commissioner's** address as provided elsewhere in this **Contract**.

22.7 Apart from damages or losses covered by insurance provided pursuant to Articles 22.1.2, 22.1.3, or 22.1.5, the **Contractor** waives all rights against the **City**, including its officials and employees, for any damages or losses that are covered under any insurance required under this Article 22 (whether or

not such insurance is actually procured or claims are paid thereunder) or any other insurance applicable to the operations of the **Contractor** and/or its employees, agents, or **Subcontractors**.

22.8 In the event the **Contractor** utilizes a self-insurance program to satisfy any of the requirements of this Article 22, the **Contractor** shall ensure that any such self-insurance program provides the **City** with all rights that would be provided by traditional insurance under this Article 22, including but not limited to the defense and indemnification obligations that insurers are required to undertake in liability policies.

22.9 Materiality/Non-Waiver: The **Contractor's** failure to secure policies in complete conformity with this Article 22, or to give an insurance company timely notice of any sort required in this **Contract** or to do anything else required by this Article 22 shall constitute a material breach of this **Contract**. Such breach shall not be waived or otherwise excused by any action or inaction by the **City** at any time.

22.10 Pursuant to General Municipal Law Section 108, this **Contract** shall be void and of no effect unless **Contractor** maintains Workers' Compensation Insurance for the term of this **Contract** to the extent required and in compliance with the New York State Workers' Compensation Law.

22.11 Other Remedies: Insurance coverage provided pursuant to this Article 22 or otherwise shall not relieve the **Contractor** of any liability under this **Contract**, nor shall it preclude the **City** from exercising any rights or taking such other actions available to it under any other provisions of this **Contract** or **Law**.

ARTICLE 23. MONEY RETAINED AGAINST CLAIMS

23.1 If any claim shall be made by any person or entity (including **Other Contractors** with the **City** on this **Project**) against the **City** or against the **Contractor** and the **City** for any of the following:

(a) An alleged loss, damage, injury, theft or vandalism of any of the kinds referred to in Articles 7 and 12, plus the reasonable costs of defending the **City**, which in the opinion of the **Comptroller** may not be paid by an insurance company (for any reason whatsoever); or

(b) An infringement of copyrights, patents or use of patented articles, tools, etc., as referred to in Article 57; or

(c) Damage claimed to have been caused directly or indirectly by the failure of the **Contractor** to perform the **Work** in strict accordance with this **Contract,**

the amount of such claim, or so much thereof as the **Comptroller** may deem necessary, may be withheld by the **Comptroller**, as security against such claim, from any money due hereunder. The **Comptroller**, in his/her discretion, may permit the **Contractor** to substitute other satisfactory security in lieu of the monies so withheld.

23.2 If an action on such claim is timely commenced and the liability of the **City**, or the **Contractor**, or both, shall have been established therein by a final judgment of a court of competent jurisdiction, or if such claim shall have been admitted by the **Contractor** to be valid, the **Comptroller** shall pay such judgment or admitted claim out of the monies retained by the **Comptroller** under the provisions of this Article 23, and return the balance, if any, without interest, to the **Contractor**.

ARTICLE 24. MAINTENANCE AND GUARANTY

24.1 The **Contractor** shall promptly repair, replace, restore or rebuild, as the **Commissioner** may determine, any finished **Work** in which defects of materials or workmanship may appear or to which damage may occur because of such defects, during the one (1) year period subsequent to the date of **Substantial Completion** (or use and occupancy in accordance with Article 16), except where other periods of maintenance and guaranty are provided for in Schedule A.

24.2 As security for the faithful performance of its obligations hereunder, the **Contractor**, upon filing its requisition for payment on **Substantial Completion**, shall deposit with the **Commissioner** a sum equal to one (1%) percent of the price (or the amount fixed in Schedule A of the General Conditions) in cash or certified check upon a state or national bank and trust company or a check of such bank and trust company signed by a duly authorized officer thereof and drawn to the order of the **Comptroller**, or obligations of the **City**, which the **Comptroller** may approve as of equal value with the sum so required.

24.3 In lieu of the above, the **Contractor** may make such security payment to the **City** by authorizing the **Commissioner** in writing to deduct the amount from the **Substantial Completion** payment which shall be deemed the deposit required above.

24.4 If the **Contractor** has faithfully performed all of its obligations hereunder the **Commissioner** shall so certify to the **Comptroller** within five (5) **Days** after the expiration of one (1) year from the date of **Substantial Completion** and acceptance of the **Work** or within thirty (30) **Days** after the expiration of the guarantee period fixed in the **Specifications**. The security payment shall be repaid to the **Contractor** without interest within thirty (30) **Days** after certification by the **Commissioner** to the **Comptroller** that the **Contractor** has faithfully performed all of its obligations hereunder.

24.5 Notice by the **Commissioner** to the **Contractor** to repair, replace, rebuild or restore such defective or damaged **Work** shall be timely, pursuant to this article, if given not later than ten (10) **Days** subsequent to the expiration of the one (1) year period or other periods provided for herein.

24.6 If the **Contractor** shall fail to repair, replace, rebuild or restore such defective or damaged **Work** promptly after receiving such notice, the **Commissioner** shall have the right to have the **Work** done by others in the same manner as provided for in the completion of a defaulted **Contract**, under Article 51.

24.7 If the security payment so deposited is insufficient to cover the cost of such **Work**, the **Contractor** shall be liable to pay such deficiency on demand by the **Commissioner**.

24.8 The **Engineer's** certificate setting forth the fair and reasonable cost of repairing, replacing, rebuilding or restoring any damaged or defective **Work** when performed by one other than the **Contractor**, shall be binding and conclusive upon the **Contractor** as to the amount thereof.

24.9 The **Contractor** shall obtain all manufacturers' warranties and guaranties of all equipment and materials required by this **Contract** in the name of the **City** and shall deliver same to the **Commissioner**. All of the **City's** rights and title and interest in and to said manufacturers' warranties and guaranties may be assigned by the **City** to any subsequent purchasers of such equipment and materials or lessees of the premises into which the equipment and materials have been installed.

CHAPTER VI: CHANGES, EXTRA WORK, AND DOCUMENTATION OF CLAIM

ARTICLE 25. CHANGES

25.1 Changes may be made to this **Contract** only as duly authorized in writing by the **Commissioner** in accordance with the **Law** and this **Contract**. All such changes, modifications, and amendments will become a part of the **Contract**. **Work** so ordered shall be performed by the **Contractor**.

25.2 **Contract** changes will be made only for **Work** necessary to complete the **Work** included in the original scope of the **Contract** and/or for non-material changes to the scope of the **Contract**. Changes are not permitted for any material alteration in the scope of **Work** in the **Contract**.

25.3 The **Contractor** shall be entitled to a price adjustment for **Extra Work** performed pursuant to a written change order. Adjustments to price shall be computed in one or more of the following ways:

25.3.1 By applicable unit prices specified in the **Contract**; and/or

25.3.2 By agreement of a fixed price; and/or

25.3.3 By time and material records; and/or

25.3.4 In any other manner approved by the **CCPO**.

25.4 All payments for change orders are subject to pre-audit by the **Engineering Audit Officer** and may be post-audited by the **Comptroller** and/or the **Agency**.

ARTICLE 26. METHODS OF PAYMENT FOR OVERRUNS AND EXTRA WORK

26.1 Overrun of Unit Price Item: An overrun is any quantity of a unit price item which the **Contractor** is directed to provide which is in excess of one hundred twenty-five (125%) percent of the estimated quantity for that item set forth in the bid schedule.

26.1.1For any unit price item, the **Contractor** will be paid at the unit price bid for any quantity up to one hundred twenty-five (125%) percent of the estimated quantity for that item set forth in the bid schedule. If during the progress of the **Work**, the actual quantity of any unit price item required to complete the **Work** approaches the estimated quantity for that item, and for any reason it appears that the actual quantity of any unit price item necessary to complete the **Work** will exceed the estimated quantity for that item by twenty-five (25%) percent, the **Contractor** shall immediately notify the **Engineer** of such anticipated overrun. The **Contractor** shall not be compensated for any quantity of a unit price item provided which is in excess of one hundred twenty-five (125%) percent of the estimated quantity for that item set forth in the bid schedule without written authorization from the **Engineer**.

26.1.2 If the actual quantity of any unit price item necessary to complete the **Work** will exceed one hundred twenty five (125%) percent of the estimated quantity for that item set forth in the bid schedule, the **City** reserves the right and the **Contractor** agrees to negotiate a new unit price for such item. In no event shall such negotiated new unit price exceed the unit bid price. If the **City** and **Contractor** cannot agree on a new unit price, then the **City** shall order the **Contractor** and the **Contractor** agrees to provide additional quantities of

the item on the basis of time and material records for the actual and reasonable cost as determined under Article 26.2, but in no event at a unit price exceeding the unit price bid.

26.2 **Extra Work:** For **Extra Work** where payment is by agreement on a fixed price in accordance with Article 25.3.2, the price to be paid for such **Extra Work** shall be based on the fair and reasonable estimated cost of the items set forth below. For **Extra Work** where payment is based on time and material records in accordance with Article 25.3.3, the price to be paid for such **Extra Work** shall be the actual and reasonable cost of the items set forth below, calculated in accordance with the formula specified therein, if any.

26.2.1 Necessary materials (including transportation to the **Site**); plus

26.2.2 Necessary direct labor, including payroll taxes (subject to statutory wage caps) and supplemental benefits; plus

26.2.3 Sales and personal property taxes, if any, required to be paid on materials not incorporated into such **Extra Work**; plus

26.2.4 Reasonable rental value of **Contractor**-owned (or **Subcontractor**-owned, as applicable), necessary plant and equipment other than **Small Tools**, plus fuel/energy costs. Except for fuel costs for pick-up trucks which shall be reimbursed based on a consumption of five (5) gallons per shift, fuel costs shall be reimbursed based on actual costs or, in the absence of auditable documentation, the following fuel consumption formula per operating hour: (.035) x (HP rating) x (Fuel cost/gallon). Reasonable rental value is defined as the lower of either seventy-five percent of the monthly prorated rental rates established in "The AED Green Book, Rental Rates and Specifications for Construction Equipment" published by Equipment Watch (the "Green Book"), or seventy-five percent of the monthly prorated rental rates established in the "Rental Rate Blue Book for Construction Equipment" published by Equipment Watch (the "Blue Book") (the applicable Blue Book rate being for rental only without the addition of any operational costs listed in the Blue Book). The reasonable rental value is deemed to be inclusive of all operating costs except for fuel/energy consumption and equipment operator's wages/costs. For multiple shift utilization, reimbursement shall be calculated as follows: first shift shall be seventy-five (75%) percent of such rental rates; second shift shall be sixty (60%) percent of the first shift rate; and third shift shall be forty (40%) percent of the first shift rate. Equipment on standby shall be reimbursed at one-third (1/3) the prorated monthly rental rate. **Contractor**-owned (or **Subcontractor**-owned, as applicable) equipment includes equipment from rental companies affiliated with or controlled by the **Contractor** (or **Subcontractor**, as applicable), as determined by the **Commissioner**. In establishing cost reimbursement for non-operating **Contractor**-owned (or **Subcontractor**-owned, as applicable) equipment (scaffolding, sheeting systems, road plates, etc.), the **City** may restrict reimbursement to a purchase-salvage/life cycle basis if less than the computed rental costs; plus

26.2.5 Necessary installation and dismantling of such plant and equipment, including transportation to and from the **Site**, if any, provided that, in the case of non-**Contractor**-owned (or non-**Subcontractor**-owned, as applicable) equipment rented from a third party, the cost of installation and dismantling are not allowable if such costs are included in the rental rate; plus

26.2.6 Necessary fees charged by governmental entities; plus

26.2.7 Necessary construction-related service fees charged by non-governmental entities, such as landfill tipping fees; plus

26.2.8 Reasonable rental costs of non-**Contractor**-owned (or non-**Subcontractor**-owned, as applicable) necessary plant and equipment other than **Small Tools**, plus fuel/energy costs. Except for fuel costs for pick-up trucks which shall be reimbursed based on a consumption of five (5) gallons per shift, fuel costs shall be reimbursed based on actual costs or, in the absence of auditable documentation, the following fuel consumption formula per hour of operation: (.035) x (HP rating) x (Fuel cost/gallon). In lieu of renting, the **City** reserves the right to direct the purchase of non-operating equipment (scaffolding, sheeting systems, road plates, etc.), with payment on a purchase-salvage/life cycle basis, if less than the projected rental costs; plus

26.2.9 Workers' Compensation Insurance, and any insurance coverage expressly required by the **City** for the performance of the **Extra Work** which is different than the types of insurance required by Article 22 and Schedule A of the General Conditions. The cost of Workers' Compensation Insurance is subject to applicable payroll limitation caps and shall be based upon the carrier's Manual Rate for such insurance derived from the applicable class Loss Cost ("LC") and carrier's Lost Cost Multiplier ("LCM") approved by the New York State Department of Financial Services, and with the exception of experience rating, rate modifiers as promulgated by the New York Compensation Insurance Rating Board ("NYCIRB"); plus

26.2.10 Additional costs incurred as a result of the **Extra Work** for performance and payment bonds; plus

26.2.11 Twelve percent (12%) percent of the total of items in Articles 26.2.1 through 26.2.5 as compensation for overhead, except that no percentage for overhead will be allowed on **Payroll Taxes** or on the premium portion of overtime pay or on sales and personal property taxes. Overhead shall include without limitation, all costs and expenses in connection with administration, management superintendence, small tools, and insurance required by Schedule A of the General Conditions other than Workers' Compensation Insurance; plus

26.2.12 Ten (10%) percent of the total of items in Articles 26.2.1 through 26.2.5, plus the items in Article 26.2.11, as compensation for profit, except that no percentage for profit will be allowed on **Payroll Taxes** or on the premium portion of overtime pay or on sales and personal property taxes; plus

26.2.13 Five (5%) percent of the total of items in Articles 26.2.6 through 26.2.10 as compensation for overhead and profit.

26.3 Where the **Extra Work** is performed in whole or in part by other than the **Contractor's** own forces pursuant to Article 26.2, the **Contractor** shall be paid, subject to pre-audit by the **Engineering Audit Officer**, the cost of such **Work** computed in accordance with Article 26.2 above, plus an additional allowance of five (5%) percent to cover the **Contractor's** overhead and profit.

26.4 Where a change is ordered, involving both **Extra Work** and omitted or reduced **Contract Work,** the **Contract** price shall be adjusted, subject to pre-audit by the **EAO**, in an amount based on the difference between the cost of such **Extra Work** and of the omitted or reduced **Work**.

26.5 Where the **Contractor** and the **Commissioner** can agree upon a fixed price for **Extra Work** in accordance with Article 25.3.2 or another method of payment for **Extra Work** in accordance with

Article 25.3.4, or for **Extra Work** ordered in connection with omitted **Work**, such method, subject to pre-audit by the **EAO**, may, at the option of the **Commissioner**, be substituted for the cost plus a percentage method provided in Article 26.2; provided, however, that if the **Extra Work** is performed by a **Subcontractor**, the **Contractor** shall not be entitled to receive more than an additional allowance of five (5%) percent for overhead and profit over the cost of such **Subcontractor's Work** as computed in accordance with Article 26.2.

ARTICLE 27. RESOLUTION OF DISPUTES

27.1 All disputes between the **City** and the **Contractor** of the kind delineated in this Article 27.1 that arise under, or by virtue of, this **Contract** shall be finally resolved in accordance with the provisions of this Article 27 and the **PPB** Rules. This procedure for resolving all disputes of the kind delineated herein shall be the exclusive means of resolving any such disputes.

27.1.1 This Article 27 shall not apply to disputes concerning matters dealt with in other sections of the **PPB** Rules, or to disputes involving patents, copyrights, trademarks, or trade secrets (as interpreted by the courts of New York State) relating to proprietary rights in computer software.

27.1.2 This Article 27 shall apply only to disputes about the scope of **Work** delineated by the **Contract**, the interpretation of **Contract** documents, the amount to be paid for **Extra Work** or disputed work performed in connection with the **Contract**, the conformity of the **Contractor's Work** to the **Contract**, and the acceptability and quality of the **Contractor's Work**; such disputes arise when the **Engineer**, **Resident Engineer**, **Engineering Audit Officer**, or other designee of the **Commissioner** makes a determination with which the **Contractor** disagrees.

27.2 All determinations required by this Article 27 shall be made in writing clearly stated, with a reasoned explanation for the determination based on the information and evidence presented to the party making the determination. Failure to make such determination within the time required by this Article 27 shall be deemed a non-determination without prejudice that will allow application to the next level.

27.3 During such time as any dispute is being presented, heard, and considered pursuant to this Article 27, the **Contract** terms shall remain in force and the **Contractor** shall continue to perform **Work** as directed by the **ACCO** or the **Engineer**. Failure of the **Contractor** to continue **Work** as directed shall constitute a waiver by the **Contractor** of its claim.

27.4 Presentation of Disputes to **Commissioner**.

Notice of Dispute and Agency Response. The **Contractor** shall present its dispute in writing ("Notice of Dispute") to the **Commissioner** within thirty (30) Days of receiving written notice of the determination or action that is the subject of the dispute. This notice requirement shall not be read to replace any other notice requirements contained in the **Contract**. The Notice of Dispute shall include all the facts, evidence, documents, or other basis upon which the **Contractor** relies in support of its position, as well as a detailed computation demonstrating how any amount of money claimed by the **Contractor** in the dispute was arrived at. Within thirty (30) Days after receipt of the detailed written submission comprising the complete Notice of Dispute, the **Engineer**, **Resident Engineer**, **Engineering Audit Officer**, or other designee of the **Commissioner** shall submit to the **Commissioner** all materials he or she deems pertinent to the dispute. Following initial submissions to the **Commissioner**, either party may demand of the other the production of any document or other material the demanding party believes may be relevant to the dispute. The requested party shall produce all relevant materials that are not otherwise

protected by a legal privilege recognized by the courts of New York State. Any question of relevancy shall be determined by the **Commissioner** whose decision shall be final. Willful failure of the **Contractor** to produce any requested material whose relevancy the **Contractor** has not disputed, or whose relevancy has been affirmatively determined, shall constitute a waiver by the **Contractor** of its claim.

27.4.1 **Commissioner** Inquiry. The **Commissioner** shall examine the material and may, in his or her discretion, convene an informal conference with the **Contractor**, the **ACCO**, and the **Engineer**, **Resident Engineer**, **Engineering Audit Officer**, or other designee of the **Commissioner** to resolve the issue by mutual consent prior to reaching a determination. The **Commissioner** may seek such technical or other expertise as he or she shall deem appropriate, including the use of neutral mediators, and require any such additional material from either or both parties as he or she deems fit. The **Commissioner's** ability to render, and the effect of, a decision hereunder shall not be impaired by any negotiations in connection with the dispute presented, whether or not the **Commissioner** participated therein. The **Commissioner** may or, at the request of any party to the dispute, shall compel the participation of any **Other Contractor** with a contract related to the **Work** of this **Contract**, and that **Contractor** shall be bound by the decision of the **Commissioner**. Any **Other Contractor** thus brought into the dispute resolution proceeding shall have the same rights and obligations under this Article 27 as the **Contractor** initiating the dispute.

27.4.2 **Commissioner** Determination. Within thirty (30) **Days** after the receipt of all materials and information, or such longer time as may be agreed to by the parties, the **Commissioner** shall make his or her determination and shall deliver or send a copy of such determination to the **Contractor**, the **ACCO,** and **Engineer**, **Resident Engineer**, **Engineering Audit Officer**, or other designee of the **Commissioner**, as applicable, together with a statement concerning how the decision may be appealed.

27.4.3 Finality of **Commissioner's** Decision. The **Commissioner's** decision shall be final and binding on all parties, unless presented to the Contract Dispute Resolution Board pursuant to this Article 27. The **City** may not take a petition to the Contract Dispute Resolution Board. However, should the **Contractor** take such a petition, the **City** may seek, and the Contract Dispute Resolution Board may render, a determination less favorable to the **Contractor** and more favorable to the **City** than the decision of the **Commissioner**.

27.5 Presentation of Dispute to the **Comptroller**. Before any dispute may be brought by the **Contractor** to the Contract Dispute Resolution Board, the **Contractor** must first present its claim to the **Comptroller** for his or her review, investigation, and possible adjustment.

27.5.1 Time, Form, and Content of Notice. Within thirty (30) **Days** of its receipt of a decision by the **Commissioner,** the **Contractor** shall submit to the **Comptroller** and to the **Commissioner** a Notice of Claim regarding its dispute with the **Agency**. The Notice of Claim shall consist of (i) a brief written statement of the substance of the dispute, the amount of money, if any, claimed and the reason(s) the **Contractor** contends the dispute was wrongly decided by the **Commissioner**; (ii) a copy of the written decision of the **Commissioner**; and (iii) a copy of all materials submitted by the **Contractor** to the **Agency**, including the Notice of Dispute. The **Contractor** may not present to the **Comptroller** any material not presented to the **Commissioner**, except at the request of the **Comptroller**.

27.5.2 Response. Within thirty (30) **Days** of receipt of the Notice of Claim, the **Agency** shall make available to the **Comptroller** a copy of all material submitted by the **Agency** to the **Commissioner** in connection with the dispute. The **Agency** may not present to the **Comptroller** any material not presented to the **Commissioner** except at the request of the **Comptroller**.

27.5.3 **Comptroller** Investigation. The **Comptroller** may investigate the claim in dispute and, in the course of such investigation, may exercise all powers provided in Sections 7-201 and 7-203 of the Administrative Code. In addition, the **Comptroller** may demand of either party, and such party shall provide, whatever additional material the **Comptroller** deems pertinent to the claim, including original business records of the **Contractor**. Willful failure of the **Contractor** to produce within fifteen (15) **Days** any material requested by the **Comptroller** shall constitute a waiver by the **Contractor** of its claim. The **Comptroller** may also schedule an informal conference to be attended by the **Contractor**, **Agency** representatives, and any other personnel desired by the **Comptroller**.

27.5.4 Opportunity of **Comptroller** to Compromise or Adjust Claim. The **Comptroller** shall have forty-five (45) **Days** from his or her receipt of all materials referred to in Article 27.5.3 to investigate the disputed claim. The period for investigation and compromise may be further extended by agreement between the **Contractor** and the **Comptroller**, to a maximum of ninety (90) **Days** from the **Comptroller's** receipt of all materials. The **Contractor** may not present its petition to the Contract Dispute Resolution Board until the period for investigation and compromise delineated in this Article 27.5.4 has expired. In compromising or adjusting any claim hereunder, the **Comptroller** may not revise or disregard the terms of the **Contract** between the parties.

27.6 Contract Dispute Resolution Board. There shall be a Contract Dispute Resolution Board composed of:

27.6.1 The chief administrative law judge of the Office of Administrative Trials and Hearings (OATH) or his/her designated OATH administrative law judge, who shall act as chairperson, and may adopt operational procedures and issue such orders consistent with this Article 27 as may be necessary in the execution of the Contract Dispute Resolution Board's functions, including, but not limited to, granting extensions of time to present or respond to submissions;

27.6.2 The **CCPO** or his/her designee; any designee shall have the requisite background to consider and resolve the merits of the dispute and shall not have participated personally and substantially in the particular matter that is the subject of the dispute or report to anyone who so participated; and

27.6.3 A person with appropriate expertise who is not an employee of the **City**. This person shall be selected by the presiding administrative law judge from a prequalified panel of individuals, established and administered by OATH with appropriate background to act as decision-makers in a dispute. Such individual may not have a contract or dispute with the **City** or be an officer or employee of any company or organization that does, or regularly represents persons, companies, or organizations having disputes with the **City**.

27.7 Petition to the Contract Dispute Resolution Board. In the event the claim has not been settled or adjusted by the **Comptroller** within the period provided in this Article 27, the **Contractor**,

within thirty (30) **Days** thereafter, may petition the Contract Dispute Resolution Board to review the **Commissioner's** determination.

27.7.1 Form and Content of Petition by **Contractor**. The **Contractor** shall present its dispute to the Contract Dispute Resolution Board in the form of a petition, which shall include (i) a brief written statement of the substance of the dispute, the amount of money, if any, claimed, and the reason(s) the **Contractor** contends the dispute was wrongly decided by the **Commissioner**; (ii) a copy of the written Decision of the **Commissioner,** (iii) copies of all materials submitted by the **Contractor** to the Agency; (iv) a copy of the written decision of the **Comptroller**, if any, and (v) copies of all correspondence with, or written material submitted by the **Contractor**, to the **Comptroller**. The **Contractor** shall concurrently submit four (4) complete sets of the Petition: one set to the **City** Corporation Counsel (Attn: Commercial and Real Estate Litigation Division) and three (3) sets to the Contract Dispute Resolution Board at OATH's offices with proof of service on the **City** Corporation Counsel. In addition, the **Contractor** shall submit a copy of the written statement of the substance of the dispute, cited in (i) above, to both the **Commissioner** and the **Comptroller**.

27.7.2 **Agency** Response. Within thirty (30) **Days** of its receipt of the Petition by the **City** Corporation Counsel, the **Agency** shall respond to the brief written statement of the **Contractor** and make available to the Contract Dispute Resolution Board all material it submitted to the **Commissioner** and **Comptroller**. Three (3) complete copies of the **Agency** response shall be provided to the Contract Dispute Resolution Board and one to the **Contractor**. Extensions of time for submittal of the **Agency** response shall be given as necessary upon a showing of good cause or, upon consent of the parties, for an initial period of up to thirty (30) Days.

27.7.3 Further Proceedings. The Contract Dispute Resolution Board shall permit the **Contractor** to present its case by submission of memoranda, briefs, and oral argument. The Contract Dispute Resolution Board shall also permit the **Agency** to present its case in response to the **Contractor** by submission of memoranda, briefs, and oral argument. If requested by the **City** Corporation Counsel, the **Comptroller** shall provide reasonable assistance in the preparation of the **Agency's** case. Neither the **Contractor** nor the **Agency** may support its case with any documentation or other material that was not considered by the **Comptroller**, unless requested by the Contract Dispute Resolution Board. The Contract Dispute Resolution Board, in its discretion, may seek such technical or other expert advice as it shall deem appropriate and may seek, on its own or upon application of a party, any such additional material from any party as it deems fit. The Contract Dispute Resolution Board, in its discretion, may combine more than one dispute between the parties for concurrent resolution.

27.7.4 Contract Dispute Resolution Board Determination. Within forty-five (45) **Days** of the conclusion of all written submissions and oral arguments, the Contract Dispute Resolution Board shall render a written decision resolving the dispute. In an unusually complex case, the Contract Dispute Resolution Board may render its decision in a longer period, not to exceed ninety (90) **Days**, and shall so advise the parties at the commencement of this period. The Contract Dispute Resolution Board's decision must be consistent with the terms of the **Contract**. Decisions of the Contract Dispute Resolution Board shall only resolve matters before the Contract Dispute Resolution Board and shall not have precedential effect with respect to matters not before the Contract Dispute Resolution Board.

27.7.5 Notification of Contract Dispute Resolution Board Decision. The Contract Dispute Resolution Board shall send a copy of its decision to the **Contractor**, the **ACCO**, the Engineer, the **Comptroller**, the **City** Corporation Counsel, the CCPO, and the **PPB**. A decision in favor of the **Contractor** shall be subject to the prompt payment provisions of the **PPB** Rules. The Required Payment Date shall be thirty (30) Days after the date the parties are formally notified of the Contract Dispute Resolution Board's decision.

27.7.6 Finality of Contract Dispute Resolution Board Decision. The Contract Dispute Resolution Board's decision shall be final and binding on all parties. Any party may seek review of the Contract Dispute Resolution Board's decision solely in the form of a challenge, filed within four (4) months of the date of the Contract Dispute Resolution Board's decision, in a court of competent jurisdiction of the State of New York, County of New York pursuant to Article 78 of the Civil Practice Law and Rules. Such review by the court shall be limited to the question of whether or not the Contract Dispute Resolution Board's decision was made in violation of lawful procedure, was affected by an error of **Law**, or was arbitrary and capricious or an abuse of discretion. No evidence or information shall be introduced or relied upon in such proceeding that was not presented to the Contract Dispute Resolution Board in accordance with this Article 27.

27.8 Any termination, cancellation, or alleged breach of the **Contract** prior to or during the pendency of any proceedings pursuant to this Article 27 shall not affect or impair the ability of the **Commissioner** or Contract Dispute Resolution Board to make a binding and final decision pursuant to this Article 27.

ARTICLE 28. RECORD KEEPING FOR EXTRA OR DISPUTED WORK OR WORK ON A TIME & MATERIALS BASIS

28.1 While the **Contractor** or any of its **Subcontractors** is performing **Work** on a time and material basis or **Extra Work** on a time and material basis ordered by the **Commissioner** under Article 25, or where the **Contractor** believes that it or any of its **Subcontractors** is performing **Extra Work** but a final determination by **Agency** has not been made, or the **Contractor** or any of its **Subcontractors** is performing disputed **Work** (whether on or off the **Site**), or complying with a determination or order under protest in accordance with Articles 11, 27, and 30, in each such case the **Contractor** shall furnish the **Resident Engineer** daily with three (3) copies of written statements signed by the **Contractor's** representative at the **Site** showing:

28.1.1 The name, trade, and number of each worker employed on such **Work** or engaged in complying with such determination or order, the number of hours employed, and the character of the **Work** each is doing; and

28.1.2 The nature and quantity of any materials, plant and equipment furnished or used in connection with the performance of such **Work** or compliance with such determination or order, and from whom purchased or rented.

28.2 A copy of such statement will be countersigned by the **Resident Engineer**, noting thereon any items not agreed to or questioned, and will be returned to the **Contractor** within two (2) **Days** after submission.

28.3 The **Contractor** and its **Subcontractors**, when required by the **Commissioner**, or the **Comptroller**, shall also produce for inspection, at the office of the **Contractor** or **Subcontractor**, any and all of its books, bid documents, financial statements, vouchers, records, daily job diaries and reports,

and cancelled checks, and any other documents relating to showing the nature and quantity of the labor, materials, plant and equipment actually used in the performance of such **Work**, or in complying with such determination or order, and the amounts expended therefor, and shall permit the **Commissioner** and the **Comptroller** to make such extracts therefrom, or copies thereof, as they or either of them may desire.

28.4 In connection with the examination provided for herein, the **Commissioner**, upon demand therefor, will produce for inspection by the **Contractor** such records as the **Agency** may have with respect to such **Extra Work** or disputed **Work** performed under protest pursuant to order of the **Commissioner**, except those records and reports which may have been prepared for the purpose of determining the accuracy and validity of the **Contractor's** claim.

28.5 Failure to comply strictly with these requirements shall constitute a waiver of any claim for extra compensation or damages on account of the performance of such **Work** or compliance with such determination or order.

ARTICLE 29. OMITTED WORK

29.1 If any **Contract Work** in a lump sum **Contract**, or if any part of a lump sum item in a unit price, lump sum, or percentage-bid **Contract** is omitted by the **Commissioner** pursuant to Article 33, the **Contract** price, subject to audit by the EAO, shall be reduced by a pro rata portion of the lump sum bid amount based upon the percent of **Work** omitted subject to Article 29.4. For the purpose of determining the pro rata portion of the lump sum bid amount, the bid breakdown submitted in accordance with Article 41 shall be considered, but shall not be the determining factor.

29.2 If the whole of a lump sum item or units of any other item is so omitted by the **Commissioner** in a unit price, lump sum, or percentage-bid **Contract**, then no payment will be made therefor except as provided in Article 29.4.

29.3 For units that have been ordered but are only partially completed, the unit price shall be reduced by a pro rata portion of the unit price bid based upon the percentage of **Work** omitted subject to Article 29.4.

29.4 In the event the **Contractor**, with respect to any omitted **Work**, has purchased any non-cancelable material and/or equipment that is not capable of use except in the performance of this **Contract** and has been specifically fabricated for the sole purpose of this **Contract**, but not yet incorporated into the **Work**, the **Contractor** shall be paid for such material and/or equipment in accordance with Article 64.2.1(b); provided, however, such payment is contingent upon the **Contractor's** delivery of such material and/or equipment in acceptable condition to a location designated by the **City**.

29.5 The **Contractor** agrees to make no claim for damages or for loss of overhead and profit with regard to any omitted **Work**.

ARTICLE 30. NOTICE AND DOCUMENTATION OF COSTS AND DAMAGES; PRODUCTION OF FINANCIAL RECORDS

30.1 If the **Contractor** shall claim to be sustaining damages by reason of any act or omission of the **City** or its agents, it shall submit to the **Commissioner** within forty-five (45) **Days** from the time such damages are first incurred, and every thirty (30) **Days** thereafter to the extent additional damages are being incurred for the same condition, verified statements of the details and the amounts of such

damages, together with documentary evidence of such damages. The **Contractor** may submit any of the above statements within such additional time as may be granted by the **Commissioner** in writing upon written request therefor. Failure of the **Commissioner** to respond in writing to a written request for additional time within thirty (30) **Days** shall be deemed a denial of the request. On failure of the **Contractor** to strictly comply with the foregoing provisions, such claims shall be deemed waived and no right to recover on such claims shall exist. Damages that the **Contractor** may claim in any action or dispute resolution procedure arising under or by reason of this **Contract** shall not be different from or in excess of the statements and documentation made pursuant to this Article 30. This Article 30.1 does not apply to claims submitted to the **Commissioner** pursuant to Article 11 or to claims disputing a determination under Article 27.

30.2 In addition to the foregoing statements, the **Contractor** shall, upon notice from the **Commissioner**, produce for examination at the **Contractor's** office, by the **Engineer**, **Architect** or **Project Manager**, all of its books of account, bills, invoices, payrolls, subcontracts, time books, daily reports, bank deposit books, bank statements, check books, and cancelled checks, showing all of its acts and transactions in connection with or relating to or arising by reason of this **Contract**, and submit itself and persons in its employment, for examination under oath by any person designated by the **Commissioner** or **Comptroller** to investigate claims made or disputes against the **City** under this **Contract**. At such examination, a duly authorized representative of the **Contractor** may be present.

30.3 In addition to the statements required under Article 28 and this Article 30, the **Contractor** and/or its **Subcontractor** shall, within thirty (30) **Days** upon notice from the **Commissioner** or **Comptroller**, produce for examination at the **Contractor's** and/or **Subcontractor's** office, by a representative of either the **Commissioner** or **Comptroller**, all of its books of account, bid documents, financial statements, accountant workpapers, bills, invoices, payrolls, subcontracts, time books, daily reports, bank deposit books, bank statements, check books, and cancelled checks, showing all of its acts and transactions in connection with or relating to or arising by reason of this **Contract**. Further, the **Contractor** and/or its **Subcontractor** shall submit any person in its employment, for examination under oath by any person designated by the **Commissioner** or **Comptroller** to investigate claims made or disputes against the **City** under this **Contract**. At such examination, a duly authorized representative of the **Contractor** may be present.

30.4 Unless the information and examination required under Article 30.3 is provided by the **Contractor** and/or its **Subcontractor** upon thirty (30) **Days'** notice from the **Commissioner** or **Comptroller**, or upon the **Commissioner's** or **Comptroller's** written authorization to extend the time to comply, the **City** shall be released from all claims arising under, relating to or by reason of this **Contract**, except for sums certified by the **Commissioner** to be due under the provisions of this **Contract**. It is further stipulated and agreed that no person has the power to waive any of the foregoing provisions and that in any action or dispute resolution procedure against the **City** to recover any sum in excess of the sums certified by the **Commissioner** to be due under or by reason of this **Contract**, the **Contractor** must allege in its complaint and prove, at trial or during such dispute resolution procedure, compliance with the provisions of this Article 30.

30.5 In addition, after the commencement of any action or dispute resolution procedure by the **Contractor** arising under or by reason of this **Contract**, the **City** shall have the right to require the **Contractor** to produce for examination under oath, up until the trial of the action or hearing before the Contract Dispute Resolution Board, the books and documents described in Article 30.3 and submit itself and all persons in its employ for examination under oath. If this Article 30 is not complied with as required, then the **Contractor** hereby consents to the dismissal of the action or dispute resolution procedure.

CHAPTER VII: POWERS OF THE RESIDENT ENGINEER,THE ENGINEER OR ARCHITECT AND THE COMMISSIONER

ARTICLE 31. THE RESIDENT ENGINEER

31.1 The **Resident Engineer** shall have the power to inspect, supervise, and control the performance of the **Work**, subject to review by the **Commissioner**. The **Resident Engineer** shall not, however, have the power to issue an **Extra Work** order, except as specifically designated in writing by the **Commissioner**.

ARTICLE 32. THE ENGINEER OR ARCHITECT OR PROJECT MANAGER

32.1 The **Engineer** or **Architect** or **Project Manager**, in addition to those matters elsewhere herein delegated to the **Engineer** and expressly made subject to his/her determination, direction or approval, shall have the power, subject to review by the **Commissioner**:

32.1.1 To determine the amount, quality, and location of the **Work** to be paid for hereunder; and

32.1.2 To determine all questions in relation to the **Work**, to interpret the **Contract Drawings**, **Specifications**, and **Addenda**, and to resolve all patent inconsistencies or ambiguities therein; and

32.1.3 To determine how the **Work** of this **Contract** shall be coordinated with **Work** of **Other Contractors** engaged simultaneously on this **Project**, including the power to suspend any part of the **Work**, but not the whole thereof; and

32.1.4 To make minor changes in the **Work** as he/she deems necessary, provided such changes do not result in a net change in the cost to the **City** or to the **Contractor** of the **Work** to be done under the **Contract**; and

32.1.5 To amplify the **Contract Drawings**, add explanatory information and furnish additional **Specifications** and drawings, consistent with this **Contract**.

32.2 The foregoing enumeration shall not imply any limitation upon the power of the **Engineer** or **Architect** or **Project Manager**, for it is the intent of this **Contract** that all of the **Work** shall generally be subject to his/her determination, direction, and approval, except where the determination, direction or approval of someone other than the **Engineer** or **Architect** or **Project Manager** is expressly called for herein.

32.3 The **Engineer** or **Architect** or **Project Manager** shall not, however, have the power to issue an **Extra Work** order, except as specifically designated in writing by the **Commissioner**.

ARTICLE 33. THE COMMISSIONER

33.1 The **Commissioner**, in addition to those matters elsewhere herein expressly made subject to his/her determination, direction or approval, shall have the power:

33.1.1 To review and make determinations on any and all questions in relation to this **Contract** and its performance; and

33.1.2 To modify or change this **Contract** so as to require the performance of **Extra Work** (subject, however, to the limitations specified in Article 25) or the omission of **Contract Work**; and

33.1.3 To suspend the whole or any part of the **Work** whenever in his/her judgment such suspension is required:

33.1.3(a) In the interest of the **City** generally; or

33.1.3(b) To coordinate the **Work** of the various contractors engaged on this **Project** pursuant to the provisions of Article 12; or

33.1.3(c) To expedite the completion of the entire **Project** even though the completion of this particular **Contract** may thereby be delayed.

ARTICLE 34. NO ESTOPPEL

34.1 Neither the **City** nor any **Agency**, official, agent or employee thereof, shall be bound, precluded or estopped by any determination, decision, approval, order, letter, payment or certificate made or given under or in connection with this **Contract** by the **City**, the **Commissioner**, the **Engineer**, the **Resident Engineer**, or any other official, agent or employee of the **City**, either before or after the final completion and acceptance of the **Work** and payment therefor:

34.1.1 From showing the true and correct classification, amount, quality or character of the **Work** actually done; or that any such determination, decision, order, letter, payment or certificate was untrue, incorrect or improperly made in any particular, or that the **Work**, or any part thereof, does not in fact conform to the requirements of this **Contract**; and

34.1.2 From demanding and recovering from the **Contractor** any overpayment made to it, or such damages as the **City** may sustain by reason of the **Contractor's** failure to perform each and every part of its **Contract**.

CHAPTER VIII: LABOR PROVISIONS

ARTICLE 35. EMPLOYEES

35.1 The **Contractor** and its **Subcontractors** shall not employ on the **Work**:

35.1.1 Anyone who is not competent, faithful and skilled in the **Work** for which he/she shall be employed; and whenever the **Commissioner** shall inform the **Contractor**, in writing, that any employee is, in his/her opinion, incompetent, unfaithful or disobedient, that employee shall be discharged from the **Work** forthwith, and shall not again be employed upon it; or

35.1.2 Any labor, materials or means whose employment, or utilization during the course of this **Contract**, may tend to or in any way cause or result in strikes, work stoppages, delays, suspension of **Work** or similar troubles by workers employed by the **Contractor** or its **Subcontractors**, or by any of the trades working in or about the buildings and premises where **Work** is being performed under this **Contract**, or by **Other Contractors** or their **Subcontractors** pursuant to other contracts, or on any other building or premises owned or operated by the **City**, its **Agencies**, departments, boards or authorities. Any violation by the **Contractor** of this requirement may, upon certification of the **Commissioner**, be considered as proper and sufficient cause for declaring the **Contractor** to be in default, and for the **City** to take action against it as set forth in Chapter X of this **Contract**, or such other article of this **Contract** as the Commissioner may deem proper; or

35.1.3 In accordance with Section 220.3-e of the Labor Law of the State of New York (hereinafter "Labor Law"), the **Contractor** and its **Subcontractors** shall not employ on the **Work** any apprentice, unless he/she is a registered individual, under a bona fide program registered with the New York State Department of Labor. The allowable ratio of apprentices to journey-level workers in any craft classification shall not be greater than the ratio permitted to the **Contractor** as to its work force on any job under the registered program. Any employee listed on a payroll at an apprentice wage rate, who is not registered as above, shall be paid the wage rate determined by the **Comptroller** of the **City** for the classification of **Work** actually performed. The **Contractor** or **Subcontractor** will be required to furnish written evidence of the registration of its program and apprentices as well as all the appropriate ratios and wage rates, for the area of the construction prior to using any apprentices on the **Contract Work**.

35.2 If the total cost of the **Work** under this **Contract** is at least two hundred fifty thousand ($250,000) dollars, all laborers, workers, and mechanics employed in the performance of the **Contract** on the public work site, either by the **Contractor**, **Subcontractor** or other person doing or contracting to do the whole or a part of the **Work** contemplated by the **Contract**, shall be certified prior to performing any **Work** as having successfully completed a course in construction safety and health approved by the United States Department of Labor's Occupational Safety and Health Administration that is at least ten (10) hours in duration.

35.3 In accordance with Local Law Nos. 30-2012 and 33-2012, codified at sections 6-132 and 12-113 of the Administrative Code, respectively,

35.3.1 The **Contractor** shall not take an adverse personnel action with respect to an officer or employee in retaliation for such officer or employee making a report of information concerning conduct which such officer or employee knows or reasonably believes to involve corruption, criminal activity, conflict of interest, gross mismanagement or abuse of authority by any officer or employee relating to this **Contract** to (a) the Commissioner of the Department of Investigation, (b) a member of the New York City Council, the Public Advocate, or the **Comptroller**, or (c) the **CCPO**, **ACCO**, **Agency** head, or **Commissioner**.

35.3.2 If any of the **Contractor**'s officers or employees believes that he or she has been the subject of an adverse personnel action in violation of Article 35.3.1, he or she shall be entitled to bring a cause of action against the **Contractor** to recover all relief necessary to make him or her whole. Such relief may include but is not limited to: (a) an injunction to restrain continued retaliation, (b) reinstatement to the position such employee would have had but for the retaliation or to an equivalent position, (c) reinstatement of full fringe benefits and seniority rights, (d) payment of two times back

pay, plus interest, and (e) compensation for any special damages sustained as a result of the retaliation, including litigation costs and reasonable attorney's fees.

35.3.3 The **Contractor** shall post a notice provided by the **City** in a prominent and accessible place on any site where work pursuant to the **Contract** is performed that contains information about:

35.3.3(a) how its employees can report to the New York City Department of Investigation allegations of fraud, false claims, criminality or corruption arising out of or in connection with the **Contract**; and

35.3.3(b) the rights and remedies afforded to its employees under Administrative Code sections 7-805 (the New York City False Claims Act) and 12-113 (the Whistleblower Protection Expansion Act) for lawful acts taken in connection with the reporting of allegations of fraud, false claims, criminality or corruption in connection with the **Contract**.

35.3.4 For the purposes of this Article 35.3, "adverse personnel action" includes dismissal, demotion, suspension, disciplinary action, negative performance evaluation, any action resulting in loss of staff, office space, equipment or other benefit, failure to appoint, failure to promote, or any transfer or assignment or failure to transfer or assign against the wishes of the affected officer or employee.

35.3.5 This Article 35.3 is applicable to all of the **Contractor**'s **Subcontractors** having subcontracts with a value in excess of $100,000; accordingly, the **Contractor** shall include this rider in all subcontracts with a value a value in excess of $100,000.

35.4 Article 35.3 is not applicable to this **Contract** if it is valued at $100,000 or less. Articles 35.3.1, 35.3.2, 35.3.4, and 35.3.5 are not applicable to this **Contract** if it was solicited pursuant to a finding of an emergency.

35.5 Paid Sick Leave Law.

35.5.1 Introduction and General Provisions.

35.5.1(a) The Earned Sick Time Act, also known as the Paid Sick Leave Law ("PSLL"), requires covered employees who annually perform more than 80 hours of work in New York City to be provided with paid sick time.[2] Contractors of the **City** or of other governmental entities may be required to provide sick time pursuant to the PSLL.

35.5.1(b) The PSLL became effective on April 1, 2014, and is codified at Title 20, Chapter 8, of the New York City Administrative Code. It is administered by the City's Department of Consumer Affairs ("DCA"); DCA's rules promulgated under the PSLL are codified at Chapter 7 of Title 6 of the Rules of the City of New York ("Rules").

[2] Pursuant to the PSLL, if fewer than five employees work for the same employer, as determined pursuant to New York City Administrative Code § 20-912(g), such employer has the option of providing such employees uncompensated sick time.

35.5.1(c) The **Contractor** agrees to comply in all respects with the PSLL and the Rules, and as amended, if applicable, in the performance of this **Contract**. The **Contractor** further acknowledges that such compliance is a material term of this **Contract** and that failure to comply with the PSLL in performance of this **Contract** may result in its termination.

35.5.1(d) The **Contractor** must notify the **Agency Chief Contracting Officer** of the **Agency** with whom it is contracting in writing within ten (10) days of receipt of a complaint (whether oral or written) regarding the PSLL involving the performance of this **Contract**. Additionally, the **Contractor** must cooperate with DCA's education efforts and must comply with DCA's subpoenas and other document demands as set forth in the PSLL and Rules.

35.5.1(e) The PSLL is summarized below for the convenience of the **Contractor**. The **Contractor** is advised to review the PSLL and Rules in their entirety. On the website www.nyc.gov/PaidSickLeave there are links to the PSLL and the associated Rules as well as additional resources for employers, such as Frequently Asked Questions, timekeeping tools and model forms, and an event calendar of upcoming presentations and webinars at which the **Contractor** can get more information about how to comply with the PSLL. The **Contractor** acknowledges that it is responsible for compliance with the PSLL notwithstanding any inconsistent language contained herein.

35.5.2 Pursuant to the PSLL and the Rules: Applicability, Accrual, and Use.

35.5.2(a) An employee who works within the City of New York for more than eighty hours in any consecutive 12-month period designated by the employer as its "calendar year" pursuant to the PSLL ("Year") must be provided sick time. Employers must provide a minimum of one hour of sick time for every 30 hours worked by an employee and compensation for such sick time must be provided at the greater of the employee's regular hourly rate or the minimum wage. Employers are not required to provide more than 40 hours of sick time to an employee in any Year.

35.5.2(b) An employee has the right to determine how much sick time he or she will use, provided that employers may set a reasonable minimum increment for the use of sick time not to exceed four hours per **Day**. In addition, an employee may carry over up to 40 hours of unused sick time to the following Year, provided that no employer is required to allow the use of more than forty hours of sick time in a Year or carry over unused paid sick time if the employee is paid for such unused sick time and the employer provides the employee with at least the legally required amount of paid sick time for such employee for the immediately subsequent Year on the first **Day** of such Year.

35.5.2(c) An employee entitled to sick time pursuant to the PSLL may use sick time for any of the following:

i. such employee's mental illness, physical illness, injury, or health condition or the care of such illness, injury, or condition or such employee's need for medical diagnosis or preventive medical care;
ii. such employee's care of a family member (an employee's child, spouse, domestic partner, parent, sibling, grandchild or grandparent, or the child or parent of an employee's spouse or domestic partner) who has a mental

illness, physical illness, injury or health condition or who has a need for medical diagnosis or preventive medical care;

iii. closure of such employee's place of business by order of a public official due to a public health emergency; or

iv. such employee's need to care for a child whose school or childcare provider has been closed due to a public health emergency.

35.5.2(d) An employer must not require an employee, as a condition of taking sick time, to search for a replacement. However, an employer may require an employee to provide: reasonable notice of the need to use sick time; reasonable documentation that the use of sick time was needed for a reason above if for an absence of more than three consecutive work days; and/or written confirmation that an employee used sick time pursuant to the PSLL. However, an employer may not require documentation specifying the nature of a medical condition or otherwise require disclosure of the details of a medical condition as a condition of providing sick time and health information obtained solely due to an employee's use of sick time pursuant to the PSLL must be treated by the employer as confidential.

35.5.2(e) If an employer chooses to impose any permissible discretionary requirement as a condition of using sick time, it must provide to all employees a written policy containing those requirements, using a delivery method that reasonably ensures that employees receive the policy. If such employer has not provided its written policy, it may not deny sick time to an employee because of non-compliance with such a policy.

35.5.2(f) Sick time to which an employee is entitled must be paid no later than the payday for the next regular payroll period beginning after the sick time was used.

35.5.3 Exemptions and Exceptions. Notwithstanding the above, the PSLL does not apply to any of the following:

35.5.3(a) an independent contractor who does not meet the definition of employee under section 190(2) of the New York State Labor Law;

35.5.3(b) an employee covered by a valid collective bargaining agreement in effect on April 1, 2014, until the termination of such agreement;

35.5.3(c) an employee in the construction or grocery industry covered by a valid collective bargaining agreement if the provisions of the PSLL are expressly waived in such collective bargaining agreement;

35.5.3(d) an employee covered by another valid collective bargaining agreement if such provisions are expressly waived in such agreement and such agreement provides a benefit comparable to that provided by the PSLL for such employee;

35.5.3(e) an audiologist, occupational therapist, physical therapist, or speech language pathologist who is licensed by the New York State Department of Education and who calls in for work assignments at will, determines his or her own schedule, has the ability to reject or accept any assignment referred to him or her, and is paid an average hourly wage that is at least four times the federal minimum wage;

35.5.3(f) an employee in a work study program under Section 2753 of Chapter 42 of the United States Code;

35.5.3(g) an employee whose work is compensated by a qualified scholarship program as that term is defined in the Internal Revenue Code, Section 117 of Chapter 20 of the United States Code; or

35.5.3(h) a participant in a Work Experience Program (WEP) under section 336-c of the New York State Social Services Law.

35.5.4 Retaliation Prohibited. An employer may not threaten or engage in retaliation against an employee for exercising or attempting in good faith to exercise any right provided by the PSLL. In addition, an employer may not interfere with any investigation, proceeding, or hearing pursuant to the PSLL.

35.5.5 Notice of Rights.

35.5.5(a) An employer must provide its employees with written notice of their rights pursuant to the PSLL. Such notice must be in English and the primary language spoken by an employee, provided that DCA has made available a translation into such language. Downloadable notices are available on DCA's website at http://www.nyc.gov/html/dca/html/law/PaidSickLeave.shtml.

35.5.5(b) Any person or entity that willfully violates these notice requirements is subject to a civil penalty in an amount not to exceed fifty dollars for each employee who was not given appropriate notice.

35.5.6 Records. An employer must retain records documenting its compliance with the PSLL for a period of at least three years, and must allow DCA to access such records in furtherance of an investigation related to an alleged violation of the PSLL.

35.5.7 Enforcement and Penalties.

35.5.7(a) Upon receiving a complaint alleging a violation of the PSLL, DCA has the right to investigate such complaint and attempt to resolve it through mediation. Within 30 **Days** of written notification of a complaint by DCA, or sooner in certain circumstances, the employer must provide DCA with a written response and such other information as DCA may request. If DCA believes that a violation of the PSLL has occurred, it has the right to issue a notice of violation to the employer.

35.5.7(b) DCA has the power to grant an employee or former employee all appropriate relief as set forth in New York City Administrative Code § 20-924(d). Such relief may include, among other remedies, treble damages for the wages that should have been paid, damages for unlawful retaliation, and damages and reinstatement for unlawful discharge. In addition, DCA may impose on an employer found to have violated the PSLL civil penalties not to exceed $500 for a first violation, $750 for a second violation within two years of the first violation, and $1,000 for each succeeding violation within two years of the previous violation.

35.5.8 More Generous Polices and Other Legal Requirements. Nothing in the PSLL is intended to discourage, prohibit, diminish, or impair the adoption or retention of a more generous sick time policy, or the obligation of an employer to comply with any contract,

collective bargaining agreement, employment benefit plan or other agreement providing more generous sick time. The PSLL provides minimum requirements pertaining to sick time and does not preempt, limit or otherwise affect the applicability of any other law, regulation, rule, requirement, policy or standard that provides for greater accrual or use by employees of sick leave or time, whether paid or unpaid, or that extends other protections to employees. The PSLL may not be construed as creating or imposing any requirement in conflict with any federal or state law, rule or regulation.

35.6 HireNYC: Hiring and Reporting Requirements. This Article 35.6 applies to construction contracts of $1,000,000 or more. The **Contractor** shall comply with the requirements of Articles 35.6.1-35.6.5 for all non-trades jobs (e.g., for an administrative position arising out of **Work** ant located in New York City). The **Contractor** shall reasonably cooperate with SBS and the **City** on specific outreach events, including "Hire-on-the-Spot" events, for the hiring of trades workers in connection with the **Work**. If provided elsewhere in this **Contract**, this **Contract** is subject to a project labor agreement.

35.6.1 Enrollment. The **Contractor** shall enroll with the HireNYC system, found at www.nyc.gov/sbs, within thirty (30) days after the registration of this **Contract** pursuant to Section 328 of the New York City Charter. The **Contractor** shall provide information about the business, designate a primary contact and say whether it intends to hire for any entry to mid-level job opportunities arising from this **Contract** and located in New York City, and, if so, the approximate start date of the first hire.

35.6.2 Job Posting Requirements.

35.6.2(a) Once enrolled in HireNYC, the **Contractor** agrees to update the HireNYC portal with all entry to mid-level job opportunities arising from this **Contract** and located in New York City, if any, which shall be defined as jobs requiring no more than an associate degree, as provided by the New York State Department of Labor (see Column F of https://labor.ny.gov/stats/2012-2022- NYS-Employment-Prospects.xls). The information to be updated includes the types of entry and mid-level positions made available from the work arising from the **Contract** and located in New York City, the number of positions, the anticipated schedule of initiating the hiring process for these positions, and the contact information for the **Contractor's** representative charged with overseeing hiring. The **Contractor** must update the HireNYC portal with any hiring needs arising from the contract and located in New York City, and the requirements of the jobs to be filled, no less than three weeks prior to the intended first day of employment for each new position, except with the permission of SBS, not to be unreasonably withheld, and must also update the HireNYC portal as set forth below.

35.6.2(b) After enrollment through HireNYC and submission of relevant information, SBS will work with the **Contractor** to develop a recruitment plan which will outline the candidate screening process, and will provide clear instructions as to when, where, and how interviews will take place. HireNYC will screen applicants based on employer requirements and refer applicants whom it believes are qualified to the **Contractor** for interviews. The **Contractor** must interview referred applicants whom it believes are qualified.

35.6.2(c) After completing an interview of a candidate referred by HireNYC, the **Contractor** must provide feedback via the portal within twenty (20) business days to indicate which candidates were interviewed and hired, if any. In addition, the **Contractor** shall provide the start date of new hires, and additional information

reasonably related to such hires, within twenty (20) business days after the start date. In the event the **Contractor** does not have any job openings covered by this Rider in any given year, the **Contractor** shall be required to provide an annual update to HireNYC to that effect. For this purpose, the reporting year shall run from the date of the registration of the **Contract** pursuant to Charter section 328 and each anniversary date.

35.6.2(d) These requirements do not limit the **Contractor's** ability to assess the qualifications of prospective workers, and to make final hiring and retention decisions. No provision of this Article 35.6 shall be interpreted so as to require the **Contractor** to employ any particular worker.

35.6.2(e) In addition, the provisions of this Article 35.6 shall not apply to positions that the **Contractor** intends to fill with employees employed pursuant to the job retention provision of Section 22-505 of the Administrative Code of the City of New York. The **Contractor** shall not be required to report such openings with HireNYC. However, the **Contractor** shall enroll with the HireNYC system pursuant to Article 35.6.1, above, and, if such positions subsequently become open, then the remaining provisions of this Article 35.6 will apply.

35.6.3 Breach and Liquidated Damages. If the **Contractor** fails to comply with the terms of the **ContrSact** and this Article 35.6 (l) by not enrolling its business with HireNYC; (2) by not informing HireNYC, as required, of open positions; or (3) by failing to interview a qualified candidate, the **Agency** may assess liquidated damages in the amount of two-thousand five hundred dollars ($2,500) per breach. For all other events of noncompliance with the terms of this Article 35.6, the **Agency** may assess liquidated damages in the amount of five hundred dollars ($500) per breach. Furthermore, in the event the **Contractor** breaches the requirements of this Article 35.6 during the term of the **Contract**, the **City** may hold the **Contractor** in default of this **Contract**.

35.6.4 Audit Compliance. In addition to the auditing requirements set forth in other parts of the **Contract**, the **Contractor** shall permit SBS and the **City** to inspect any and all records concerning or relating to job openings or the hiring of individuals for work arising from the **Contract** and located in New York City. The **Contractor** shall permit an inspection within seven (7) business days of the request.

35.6.5 Other Reporting Requirements. The **Contractor** shall report to the **City**, on a monthly basis, all information reasonably requested by the **City** that is necessary for the **City** to comply with any reporting requirements imposed by **Law**, including any requirement that the **City** maintain a publicly accessible database. In addition, the **Contractor** agrees to comply with all reporting requirements imposed by **Law**, or as otherwise requested by the **City**.

35.6.6 Federal Hiring Requirements. If this **Contract** is federally funded (as indicated elsewhere in this Contract), the **Contractor** shall comply with all federal hiring requirements as may be set forth in this **Contract**, including, as applicable: (a) Section 3 of the HUD Act of 1968, which requires, to the greatest extent feasible, economic opportunities for 30 percent of new hires be given to low- and very low-income persons, particularly persons who are recipients of HUD assistance for housing and Executive Order 11246, which prohibits discrimination in employment due to race, color, religion, sex or national origin, and requires the implementation of goals for minority and female participation for work involving any construction trade.

ARTICLE 36. NO DISCRIMINATION

36.1 The **Contractor** specifically agrees, as required by Labor Law Section 220-e, as amended, that:

36.1.1 In the hiring of employees for the performance of **Work** under this **Contract** or any subcontract hereunder, neither the **Contractor**, **Subcontractor**, nor any person acting on behalf of such **Contractor** or **Subcontractor**, shall by reason of race, creed, color or national origin discriminate against any citizen of the State of New York who is qualified and available to perform the **Work** to which the employment relates;

36.1.2 Neither the **Contractor**, **Subcontractor**, nor any person on its behalf shall, in any manner, discriminate against or intimidate any employee hired for the performance of **Work** under this **Contract** on account of race, creed, color or national origin;

36.1.3 There may be deducted from the amount payable to the **Contractor** by the **City** under this **Contract** a penalty of fifty ($50.00) dollars for each person for each **Day** during which such person was discriminated against or intimidated in violation of the provisions of this **Contract**; and

36.1.4 This **Contract** may be cancelled or terminated by the **City** and all moneys due or to become due hereunder may be forfeited, for a second or any subsequent violation of the terms or conditions of this Article 36.

36.1.5 This Article 36 covers all construction, alteration and repair of any public building or public work occurring in the State of New York and the manufacture, sale, and distribution of materials, equipment, and supplies to the extent that such operations are performed within the State of New York pursuant to this **Contract**.

36.2 The **Contractor** specifically agrees, as required by Section 6-108 of the Administrative Code, as amended, that:

36.2.1 It shall be unlawful for any person engaged in the construction, alteration or repair of buildings or engaged in the construction or repair of streets or highways pursuant to a **Contract** with the **City** or engaged in the manufacture, sale or distribution of materials, equipment or supplies pursuant to a **Contract** with the **City** to refuse to employ or to refuse to continue in any employment any person on account of the race, color or creed of such person.

36.2.2 It shall be unlawful for any person or any servant, agent or employee of any person, described in Article 36.1.2, to ask, indicate or transmit, orally or in writing, directly or indirectly, the race, color or creed or religious affiliation of any person employed or seeking employment from such person, firm or corporation.

36.2.3 Breach of the foregoing provisions shall be deemed a violation of a material provision of this **Contract**.

36.2.4 Any person, or the employee, manager or owner of or officer of such firm or corporation who shall violate any of the provisions of this Article 36.2 shall, upon

conviction thereof, be punished by a fine of not more than one hundred ($100.00) dollars or by imprisonment for not more than thirty (30) **Days**, or both.

36.3 This **Contract** is subject to the requirements of Executive Order No. 50 (1980) ("E.O. 50"), as revised, and the rules and regulations promulgated thereunder. No contract will be awarded unless and until these requirements have been complied with in their entirety. By signing this **Contract**, the **Contractor** agrees that it:

36.3.1 Will not engage in any unlawful discrimination against any employee or applicant for employment because of race, creed, color, national origin, sex, age, disability, marital status or sexual orientation with respect to all employment decisions including, but not limited to, recruitment, hiring, upgrading, demotion, downgrading, transfer, training, rates of pay or other forms of compensation, layoff, termination, and all other terms and conditions of employment; and

36.3.2 Will not engage in any unlawful discrimination in the selection of **Subcontractors** on the basis of the owner's race, color, creed, national origin, sex, age, disability, marital status or sexual orientation; and

36.3.3 Will state in all solicitations or advertisements for employees placed by or on behalf of the **Contractor** that all qualified applicants will receive consideration for employment without unlawful discrimination based on race, creed, color, national origin, sex, age, citizens status, disability, marital status, sexual orientation, or that it is an equal employment opportunity employer; and

36.3.4 Will send to each labor organization or representative of workers with which it has a collective bargaining agreement or other contract or memorandum of understanding, written notification of its equal employment opportunity commitments under E.O. 50 and the rules and regulations promulgated thereunder; and

36.3.5 Will furnish, before the award of the **Contract**, all information and reports, including an employment report, that are required by E.O. 50, the rules and regulations promulgated thereunder, and orders of the **City** Department of Business Services, Division of Labor Services (**DLS**) and will permit access to its books, records, and accounts by the **DLS** for the purposes of investigation to ascertain compliance with such rules, regulations, and orders.

36.4 The **Contractor** understands that in the event of its noncompliance with the nondiscrimination clauses of this **Contract** or with any of such rules, regulations, or orders, such noncompliance shall constitute a material breach of this **Contract** and noncompliance with E.O. 50 and the rules and regulations promulgated thereunder. After a hearing held pursuant to the rules of the **DLS**, the Director of the **DLS** may direct the **Commissioner** to impose any or all of the following sanctions:

36.4.1 Disapproval of the **Contractor**; and/or

36.4.2 Suspension or termination of the **Contract**; and/or

36.4.3 Declaring the **Contractor** in default; and/or

36.4.4 In lieu of any of the foregoing sanctions, the Director of the **DLS** may impose an employment program.

In addition to any actions taken under this **Contract**, failure to comply with E.O. 50 and the rules and regulations promulgated thereunder, in one or more instances, may result in a **City Agency** declaring the **Contractor** to be non-responsible in future procurements. The **Contractor** further agrees that it will refrain from entering into any **Contract** or **Contract** modification subject to E.O. 50 and the rules and regulations promulgated thereunder with a **Subcontractor** who is not in compliance with the requirements of E.O. 50 and the rules and regulations promulgated thereunder.

36.5 The **Contractor** specifically agrees, as required by Section 6-123 of the Administrative Code, that:

36.5.1 The **Contractor** will not engage in any unlawful discriminatory practice in violation of Title 8 of the Administrative Code; and

36.5.2 Any failure to comply with this Article 36.5 may subject the **Contractor** to the remedies set forth in Section 6-123 of the Administrative Code, including, where appropriate, sanctions such as withholding of payment, imposition of an employment program, finding the **Contractor** to be in default, cancellation of the **Contract**, or any other sanction or remedy provided by **Law** or **Contract**.

ARTICLE 37. LABOR LAW REQUIREMENTS

37.1 The **Contractor** shall strictly comply with all applicable provisions of the Labor Law, as amended. Such compliance is a material term of this **Contract**.

37.2 The **Contractor** specifically agrees, as required by Labor Law Sections 220 and 220-d, as amended, that:

37.2.1 Hours of **Work**: No laborer, worker, or mechanic in the employ of the **Contractor**, **Subcontractor** or other person doing or contracting to do the whole or a part of the **Work** contemplated by this **Contract** shall be permitted or required to work more than eight (8) hours in any one (1) **Day**, or more than five (5) **Days** in any one (1) week, except as provided in the Labor Law and in cases of extraordinary emergency including fire, flood, or danger to life or property, or in the case of national emergency when so proclaimed by the President of the United States of America.

37.2.2 In situations in which there are not sufficient laborers, workers, and mechanics who may be employed to carry on expeditiously the **Work** contemplated by this **Contract** as a result of such restrictions upon the number of hours and **Days** of labor, and the immediate commencement or prosecution or completion without undue delay of the **Work** is necessary for the preservation of the **Site** and/or for the protection of the life and limb of the persons using the same, such laborers, workers, and mechanics shall be permitted or required to work more than eight (8) hours in any one (1) **Day**; or five (5) **Days** in any one (1) week; provided, however, that upon application of any **Contractor**, the **Commissioner** shall have first certified to the Commissioner of Labor of the State of New York (hereinafter "Commissioner of Labor") that such public **Work** is of an important nature and that a delay in carrying it to completion would result in serious disadvantage to the public; and provided, further, that such Commissioner of Labor shall have determined that such an emergency does in fact exist as provided in Labor Law Section 220.2.

37.2.3 Failure of the **Commissioner** to make such a certification to the Commissioner of Labor shall not entitle the **Contractor** to damages for delay or for any cause whatsoever.

37.2.4 Prevailing Rate of Wages: The wages to be paid for a legal day's **Work** to laborers, workers, or mechanics employed upon the **Work** contemplated by this **Contract** or upon any materials to be used thereon shall not be less than the "prevailing rate of wage" as defined in Labor Law Section 220, and as fixed by the **Comptroller** in the attached Schedule of Wage Rates and in updated schedules thereof. The prevailing wage rates and supplemental benefits to be paid are those in effect at the time the **Work** is being performed.

37.2.5 Requests for interpretation or correction in the Information for Bidders includes all requests for clarification of the classification of trades to be employed in the performance of the **Work** under this **Contract**. In the event that a trade not listed in the **Contract** is in fact employed during the performance of this **Contract**, the **Contractor** shall be required to obtain from the **Agency** the prevailing wage rates and supplementary benefits for the trades used and to complete the performance of this **Contract** at the price at which the **Contract** was awarded.

37.2.6 Minimum Wages: Except for employees whose wage is required to be fixed pursuant to Labor Law Section 220, all persons employed by the **Contractor** and any **Subcontractor** in the manufacture or furnishing of the supplies, materials, or equipment, or the furnishing of work, labor, or services, used in the performance of this **Contract**, shall be paid, without subsequent deduction or rebate unless expressly authorized by **Law**, not less than the sum mandated by **Law**.

37.3 Working Conditions: No part of the **Work**, labor or services shall be performed or rendered by the **Contractor** in any plants, factories, buildings or surroundings or under working conditions which are unsanitary or hazardous or dangerous to the health and safety of employees engaged in the performance of this **Contract**. Compliance with the safety, sanitary, and factory inspection **Laws** of the state in which the **Work** is to be performed shall be prima facie evidence of compliance with this Article 37.3.

37.4 Prevailing Wage Enforcement: The **Contractor** agrees to pay for all costs incurred by the **City** in enforcing prevailing wage requirements, including the cost of any investigation conducted by or on behalf of the **Agency** or the **Comptroller,** where the **City** discovers a failure to comply with any of the requirements of this Article 37 by the **Contractor** or its **Subcontractor(s)**. The **Contractor** also agrees that, should it fail or refuse to pay for any such investigation, the **Agency** is hereby authorized to deduct from a **Contractor's** account an amount equal to the cost of such investigation.

37.4.1 The Labor Law Section 220 and Section 220-d, as amended, provide that this **Contract** shall be forfeited and no sum paid for any **Work** done hereunder on a second conviction for willfully paying less than:

37.4.1(a) The stipulated prevailing wage scale as provided in Labor Law section 220, as amended, or

37.4.1(b) The stipulated minimum hourly wage scale as provided in Labor Law section 220-d, as amended.

37.4.2 For any breach or violation of either working conditions (Article 37.3) or minimum wages (Article 37.2.6) provisions, the party responsible therefor shall be liable to the **City** for liquidated damages, which may be withheld from any amounts due on any contracts with the **City** of such party responsible, or may be recovered in actions brought by the **City**

Corporation Counsel in the name of the **City**, in addition to damages for any other breach of this **Contract**, for a sum equal to the amount of any underpayment of wages due to any employee engaged in the performance of this **Contract**. In addition, the **Commissioner** shall have the right to cancel contracts and enter into other contracts for the completion of the original contract, with or without public letting, and the original **Contractor** shall be liable for any additional cost. All sums withheld or recovered as deductions, rebates, refunds, or underpayment of wages hereunder, shall be held in a special deposit account and shall be paid without interest, on order of the **Comptroller**, directly to the employees who have been paid less than minimum rates of pay as set forth herein and on whose account such sums were withheld or recovered, provided that no claims by employees for such payments shall be entertained unless made within two (2) years from the date of actual notice to the **Contractor** of the withholding or recovery of such sums by the **City**.

37.4.3 A determination by the **Comptroller** that a **Contractor** and/or its **Subcontractor** willfully violated Labor Law Section 220 will be forwarded to the **City's** five District Attorneys for review.

37.4.4 The **Contractor's** or **Subcontractor's** noncompliance with this Article 37.4 and Labor Law Section 220 may result in an unsatisfactory performance evaluation and the **Comptroller** may also find and determine that the **Contractor** or **Subcontractor** willfully violated the New York Labor **Law**.

37.4.4(a) An unsatisfactory performance evaluation for noncompliance with this Article 37.4 may result in a determination that the **Contractor** is a non-responsible bidder on subsequent procurements with the **City** and thus a rejection of a future award of a contract with the **City**, as well as any other sanctions provided for by **Law**.

37.4.4(b) Labor Law Section 220-b, as amended, provides that when two (2) final determinations have been rendered against a **Contractor** or **Subcontractor** within any consecutive six (6) year period determining that such **Contractor** or **Subcontractor** has willfully failed to pay the prevailing rate of wages or to provide supplements in accordance with the Labor Law and this Article 37.4, whether such failures were concurrent or consecutive and whether or not such final determinations concerning separate public works projects are rendered simultaneously, such **Contractor** or **Subcontractor** shall be ineligible to submit a bid on or be awarded any public works contract with the **City** for a period of five (5) years from the second final determination. If the final determination involves the falsification of payroll records or the kickback of wages or supplements, the **Contractor** or **Subcontractor** shall be ineligible to submit a bid on or be awarded any public works contract with the **City** for a period of five (5) years from the first final determination.

37.4.4(c) Labor Law Section 220, as amended, provides that the **Contractor** or **Subcontractor** found to have violated this Article 37.4 may be directed to make payment of wages or supplements including interest found to be due, and the **Contractor** or **Subcontractor** may be directed to make payment of a further sum as a civil penalty in an amount not exceeding twenty-five (25%) percent of the total amount found to be due.

37.5 The **Contractor** and its **Subcontractors** shall within ten (10) **Days** after mailing of a Notice of Award or written order, post in prominent and conspicuous places in each and every plant, factory, building, and structure where employees of the **Contractor** and its **Subcontractors** engaged in the

performance of this **Contract** are employed, notices furnished by the **City**, in relation to prevailing wages and supplements, minimum wages, and other stipulations contained in Sections 220 and 220-h of the Labor Law, and the **Contractor** and its **Subcontractors** shall continue to keep such notices posted in such prominent and conspicuous places until **Final Acceptance** of the supplies, materials, equipment, or **Work**, labor, or services required to be furnished or rendered under this **Contract**.

37.6 The **Contractor** shall strictly comply with all of the provisions of Articles 37.6.1 through 37.6.5, and provide for all workers, laborers or mechanics in its employ, the following:

37.6.1 Notices Posted At **Site**: Post, in a location designated by the **City**, schedules of prevailing wages and supplements for this **Project**, a copy of all re-determinations of such schedules for the **Project**, the Workers' Compensation **Law** Section 51 notice, all other notices required by **Law** to be posted at the **Site**, the **City** notice that this **Project** is a public works project on which each worker is entitled to receive the prevailing wages and supplements for the occupation at which he or she is working, and all other notices which the **City** directs the **Contractor** to post. The **Contractor** shall provide a surface for such notices which is satisfactory to the **City**. The **Contractor** shall maintain and keep current such notices in a legible manner and shall replace any notice or schedule which is damaged, defaced, illegible or removed for any reason. The **Contractor** shall post such notices before commencing any **Work** on the **Site** and shall maintain such notices until all **Work** on the **Site** is complete; and

37.6.2 Daily **Site** Sign-in Sheets: Maintain daily **Site** sign-in sheets, and require that **Subcontractors** maintain daily **Site** sign-in sheets for its employees, which include blank spaces for an employee's name to be both printed and signed, job title, date started and Social Security number, the time the employee began work and the time the employee left work, until **Final Acceptance** of the supplies, materials, equipment, or **Work**, labor, or services to be furnished or rendered under this **Contract** unless exception is granted by the **Comptroller** upon application by the **Agency**. In the alternative, subject to the approval of the **CCPO**, the **Contractor** and **Subcontractor** may maintain an electronic or biometric sign-in system, which provides the information required by this Article 37.6.2; and

37.6.3 Individual Employee Information Notices: Distribute a notice to each worker, laborer or mechanic employed under this **Contract**, in a form provided by the **Agency**, that this **Project** is a public works project on which each worker, laborer or mechanic is entitled to receive the prevailing rate of wages and supplements for the occupation at which he or she is working. If the total cost of the **Work** under this **Contract** is at least two hundred fifty thousand ($250,000) dollars, such notice shall also include a statement that each worker, laborer or mechanic must be certified prior to performing any **Work** as having successfully completed a course in construction safety and health approved by the United States Department of Labor's Occupational Safety and Health Administration that is at least ten (10) hours in duration. Such notice shall be distributed to each worker before he or she starts performing any **Work** of this **Contract** and with the first paycheck after July first of each year. "Worker, laborer or mechanic" includes employees of the **Contractor** and all **Subcontractors** and all employees of suppliers entering the **Site**. At the time of distribution, the **Contractor** shall have each worker, laborer or mechanic sign a statement, in a form provided by the **Agency**, certifying that the worker has received the notice required by this Article 37.6.3, which signed statement shall be maintained with the payroll records required by this **Contract**; and

37.6.3(a) The **Contractor** and each **Subcontractor** shall notify each worker, laborer or mechanic employed under this **Contract** in writing of the prevailing rate of

wages for their particular job classification. Such notification shall be given to every worker, laborer, and mechanic on their first pay stub and with every pay stub thereafter; and

37.6.4 **Site** Laminated Identification Badges: The **Contractor** shall provide laminated identification badges which include a photograph of the worker's, laborer's or mechanic's face and indicate the worker's, laborer's or mechanic's name, trade, employer's name, and employment starting date (month/day/year). Further, the **Contractor** shall require as a condition of employment on the **Site**, that each and every worker, laborer or mechanic wear the laminated identification badge at all times and that it may be seen by any representative of the **City**. The **Commissioner** may grant a written waiver from the requirement that the laminated identification badge include a photograph if the **Contractor** demonstrates that the identity of an individual wearing a laminated identification badge can be easily verified by another method; and

37.6.5 Language Other Than English Used On **Site**: Provide the **ACCO** notice when three (3) or more employees (worker and/or laborer and/or mechanic) on the **Site**, at any time, speak a language other than English. The **ACCO** will then provide the **Contractor** the notices described in Article 37.6.1 in that language or languages as may be required. The **Contractor** is responsible for all distributions under this Article 37; and

37.6.6 Provision of Records: The **Contractor** and **Subcontractor(s)** shall produce within five (5) **Days** on the **Site** of the **Work** and upon a written order of the **Engineer**, the **Commissioner**, the **ACCO**, the **Agency EAO**, or the **Comptroller,** such records as are required to be kept by this Article 37.6; and

37.6.7 The **Contractor** and **Subcontractor(s)** shall pay employees by check or direct deposit. If this **Contract** is for an amount greater than one million ($1,000,000) dollars, checks issued by the **Contractor** to covered employees shall be generated by a payroll service or automated payroll system (an in-house system may be used if approved by the **Agency**). For any subcontract for an amount greater than seven hundred fifty thousand ($750,000) dollars, checks issued by a **Subcontractor** to covered employees shall be generated by a payroll service or automated payroll system (an in-house system may be used if approved by the **Agency**); and

37.6.8 The failure of the **Contractor** or **Subcontractor(s)** to comply with the provisions of Articles 37.6.1 through 37.6.7 may result in the **Commissioner** declaring the **Contractor** in default and/or the withholding of payments otherwise due under the **Contract**.

37.7 The **Contractor** and its **Subcontractors** shall keep such employment and payroll records as are required by Section 220 of the Labor Law. The failure of the **Contractor** or **Subcontractor(s)** to comply with the provisions of this Article 37.7 may result in the **Commissioner** declaring the **Contractor** in default and/or the withholding of payments otherwise due under the **Contract.**

37.8 At the time the **Contractor** makes application for each partial payment and for final payment, the **Contractor** shall submit to the **Commissioner** a written payroll certification, in the form provided by this **Contract**, of compliance with the prevailing wage, minimum wage, and other provisions and stipulations required by Labor Law Section 220 and of compliance with the training requirements of Labor Law Section 220-h set forth in Article 35.2. This certification of compliance shall be a condition precedent to payment and no payment shall be made to the **Contractor** unless and until each such certification shall have been submitted to and received by the **Commissioner**.

37.9 This **Contract** is executed by the **Contractor** with the express warranty and representation that the **Contractor** is not disqualified under the provisions of Section 220 of the Labor Law from the award of the **Contract**.

37.10 Any breach or violation of any of the foregoing shall be deemed a breach or violation of a material provision of this **Contract**, and grounds for cancellation thereof by the **City**.

ARTICLE 38. PAYROLL REPORTS

38.1 The **Contractor** and its **Subcontractor(s)** shall maintain on the **Site** during the performance of the **Work** the original payrolls or transcripts thereof which the **Contractor** and its **Subcontractor(s)** are required to maintain and shall submit such original payrolls or transcripts, subscribed and affirmed by it as true, within thirty (30) **Days** after issuance of its first payroll, and every thirty (30) **Days** thereafter, pursuant to Labor Law Section 220(3-a)(a)(iii). The **Contractor** and **Subcontractor(s)** shall submit such original payrolls or transcripts along with each and every payment requisition. If payment requisitions are not submitted at least once a month, the **Contractor** and its **Subcontractor(s)** shall submit original payrolls and transcripts both along with its payment requisitions and independently of its payment requisitions.

38.2 The **Contractor** shall maintain payrolls or transcripts thereof for six (6) years from the date of completion of the **Work** on this **Contract**. If such payrolls and transcripts are maintained outside of New York City after the completion of the **Work** and their production is required pursuant to this Article 38, the **Contractor** shall produce such records in New York City upon request by the City.

38.3 The **Contractor** and **Subcontractor(s)** shall comply with any written order, direction, or request made by the **Engineer**, the **Commissioner**, the **ACCO**, the **Agency EAO**, the **Agency Labor Law Investigator(s)**, or the **Comptroller**, to provide to the requesting party any of the following information and/or records within five (5) **Days** of such written order, direction, or request:

38.3.1 Such original payrolls or transcripts thereof subscribed and affirmed by it as true and the statements signed by each worker pursuant to this Chapter VIII; and/or

38.3.2 Attendance sheets for each **Day** on which any employee of the **Contractor** and/or any of the **Subcontractor(s)** performed **Work** on the **Site**, which attendance sheet shall be in a form acceptable to the **Agency** and shall provide information acceptable to the **Agency** to identify each such employee; and/or

38.3.3 Any other information to satisfy the **Engineer**, the **Commissioner**, the **ACCO**, the **Agency EAO**, the **Agency Labor Law Investigator(s)** or the **Comptroller**, that this Chapter VIII and the Labor Law, as to the hours of employment and prevailing rates of wages and/or supplemental benefits, are being observed.

38.4 The failure of the **Contractor** or **Subcontractor(s)** to comply with the provisions of Articles 38.1 and/or 38.2 may result in the **Commissioner** declaring the **Contractor** in default and/or the withholding of payments otherwise due under the **Contract**.

ARTICLE 39. DUST HAZARDS

39.1 Should a harmful dust hazard be created in performing the **Work** of this **Contract**, for the elimination of which appliances or methods have been approved by the Board of Standards and Appeals

of the City of New York, such appliances and methods shall be installed, maintained, and effectively operated during the continuance of such harmful dust hazard. Failure to comply with this provision after notice shall make this **Contract** voidable at the sole discretion of the **City**.

CHAPTER IX: PARTIAL AND FINAL PAYMENTS

ARTICLE 40. CONTRACT PRICE

40.1 The **City** shall pay, and the **Contractor** agrees to accept, in full consideration for the **Contractor's** performance of the **Work** subject to the terms and conditions hereof, the lump sum price or unit prices for which this **Contract** was awarded, plus the amount required to be paid for any **Extra Work** ordered by the **Commissioner** under Article 25, less credit for any **Work** omitted pursuant to Article 29.

ARTICLE 41. BID BREAKDOWN ON LUMP SUM

41.1 Within fifteen (15) **Days** after the commencement date specified in the **Notice to Proceed** or **Order to Work**, unless otherwise directed by the **Resident Engineer**, the **Contractor** shall submit to the **Resident Engineer** a breakdown of its bid price, or of lump sums bid for items of the **Contract**, showing the various operations to be performed under the **Contract**, as directed in the progress schedule required under Article 9, and the value of each of such operations, the total of such items to equal the lump sum price bid. Said breakdown must be approved in writing by the **Resident Engineer**.

41.2 No partial payment will be approved until the **Contractor** submits a bid breakdown that is acceptable to the **Resident Engineer**.

41.3 The **Contractor** shall also submit such other information relating to the bid breakdown as directed by the **Resident Engineer**. Thereafter, the breakdown may be used only for checking the **Contractor's** applications for partial payments hereunder, but shall not be binding upon the **City**, the **Commissioner**, or the **Engineer** for any purpose whatsoever.

ARTICLE 42. PARTIAL PAYMENTS

42.1 From time to time as the **Work** progresses satisfactorily, but not more often than once each calendar month (except where the **Commissioner** approves in writing the submission of invoices on a more frequent basis and for invoices relating to **Work** performed pursuant to a change order), the **Contractor** may submit to the **Engineer** a requisition for a partial payment in the prescribed form, which shall contain an estimate of the quantity and the fair value of the **Work** done during the payment period.

42.2 Partial payments may be made for materials, fixtures, and equipment in advance of their actual incorporation in the **Work**, as the **Commissioner** may approve, and upon the terms and conditions set forth in the General Conditions.

42.3 The **Contractor** shall also submit to the **Commissioner** in connection with every application for partial payment a verified statement in the form prescribed by the **Comptroller** setting forth the information required under Labor Law Section 220-a.

42.4 Within thirty (30) **Days** after receipt of a satisfactory payment application, and within sixty (60) **Days** after receipt of a satisfactory payment application in relation to **Work** performed pursuant to a change order, the **Engineer** will prepare and certify, and the **Commissioner** will approve, a voucher for a partial payment in the amount of such approved estimate, less any and all deductions authorized to be made by the **Commissioner** under the terms of this **Contract** or by **Law**.

ARTICLE 43. PROMPT PAYMENT

43.1 The Prompt Payment provisions of the **PPB** Rules in effect at the time of the bid will be applicable to payments made under this **Contract**. The provisions require the payment to the **Contractor** of interest on payments made after the required payment date, except as set forth in the **PPB** Rules.

43.2 The **Contractor** shall submit a proper invoice to receive payment, except where the **Contract** provides that the **Contractor** will be paid at predetermined intervals without having to submit an invoice for each scheduled payment.

43.3 Determination of interest due will be made in accordance with the **PPB** Rules.

43.4 If the **Contractor** is paid interest, the proportionate share(s) of that interest shall be forwarded by the **Contractor** to its **Subcontractor(s)**.

43.5 The **Contractor** shall pay each **Subcontractor** or **Materialman** not later than seven (7) **Days** after receipt of payment out of amounts paid to the **Contractor** by the **City** for **Work** performed by the **Subcontractor** or **Materialman** under this **Contract**.

> 43.5.1 If **Contractor** fails to make any payment to any **Subcontractor** or **Materialman** within seven (7) **Days** after receipt of payment by the **City** pursuant to this Article 43.5, then the **Contractor** shall pay interest on amounts due to such **Subcontractor** or **Materialman** at the rate of interest in effect on the date such payment is made by the **Contractor** computed in accordance with Section 756-b (1)(b) of the New York General Business Law. Accrual of interest shall commence on the **Day** immediately following the expiration of the seventh **Day** following receipt of payment by the **Contractor** from the **City** and shall end on the date on which payment is made.

43.6 The **Contractor** shall include in each of its subcontracts a provision requiring each **Subcontractor** to make payment to each of its **Subcontractors** or **Materialmen** for **Work** performed under this **Contract** in the same manner and within the same time period set forth above.

ARTICLE 44. SUBSTANTIAL COMPLETION PAYMENT

44.1 The **Contractor** shall submit with the **Substantial Completion** requisition:

> 44.1.1 A final verified statement of any pending Article 27 disputes in accordance with the **PPB** Rules and this **Contract** and any and all alleged claims against the **City**, in any way connected with or arising out of this **Contract** (including those as to which details may have been furnished pursuant to Articles 11, 27, 28, and 30) setting forth with respect to each such claim the total amount thereof, the various items of labor and materials included therein, and the alleged value of each item; and if the alleged claim be one for delay, the alleged cause of each such delay, the period or periods of time, giving the dates when the

Contractor claims the performance of the **Work** or a particular part thereof was delayed, and an itemized statement and breakdown of the amount claimed for each such delay.

44.1.1(a) With respect to each such claim, the **Commissioner**, the **Comptroller** and, in the event of litigation, the **City** Corporation Counsel shall have the same right to inspect, and to make extracts or copies of, the **Contractor's** books, vouchers, records, etc., as is referred to in Articles 11, 27, 28, and 30. Nothing contained in this Article 44.1.1(a) is intended to or shall relieve the **Contractor** from the obligation of complying strictly with Articles 11, 27, 28, and 30. The **Contractor** is warned that unless such claims are completely set forth as herein required, the **Contractor** upon acceptance of the **Substantial Completion** payment pursuant to this Article 44, will have waived any such claims.

44.1.2 A **Final Approved Punch List**.

44.1.3 Where required, a request for an extension of time to achieve **Substantial Completion** or final extension of time.

44.2 The **Commissioner** shall issue a voucher calling for payment of any part or all of the balance due for **Work** performed under the **Contract**, including monies retained under Article 21, less any and all deductions authorized to be made by the **Commissioner**, under this **Contract** or by **Law**, and less twice the amount the **Commissioner** considers necessary to ensure the completion of the balance of the **Work** by the **Contractor**. Such a payment shall be considered a partial and not a final payment. No **Substantial Completion** payment shall be made under this Article 44 where the **Contractor** failed to complete the **Work** within the time fixed for such completion in the Schedule A of the General Conditions, or within the time to which completion may have been extended, until an extension or extensions of time for the completion of **Work** have been acted upon pursuant to Article 13.

44.3 No further partial payments shall be made to the **Contractor** after **Substantial Completion**, except the **Substantial Completion** payment and payment pursuant to any **Contractor's** requisition that were properly filed with the **Commissioner** prior to the date of **Substantial Completion**; however, the **Commissioner** may grant a waiver for further partial payments after the date of **Substantial Completion** to permit payments for change order **Work** and/or release of retainage and deposits pursuant to Articles 21 and 24. Such waiver shall be in writing.

44.4 The **Contractor** acknowledges that nothing contained in this Article 44 is intended to or shall in any way diminish the force and effect of Article 13.

ARTICLE 45. FINAL PAYMENT

45.1 After completion and **Final Acceptance** of the **Work**, the **Contractor** shall submit all required certificates and documents, together with a requisition for the balance claimed to be due under the **Contract**, less the amount authorized to be retained for maintenance under Article 24. Such submission shall be within 90 days of the date of the **Commissioner's** written determination of **Final Acceptance**, or within such additional time as may be granted by the **Commissioner** in writing. If the **Contractor** fails to submit all required certificates and documents within the time allowed, no payment of the balance claimed shall be made to the **Contractor** and the **Contractor** shall be deemed to have forfeited its right to payment of any balance claimed. A verified statement similar to that required in connection with applications for partial payments shall also be submitted to the **Commissioner**.

45.2 Amended Verified Statement of Claims: The **Contractor** shall also submit with the final requisition any amendments to the final verified statement of any pending dispute resolution procedures in accordance with the **PPB** Rules and this **Contract** and any and all alleged claims against the **City**, in any way connected with or arising out of this **Contract** (including those as to which details may have been furnished pursuant to Articles 11, 27, 28, and 30) that have occurred subsequent to **Substantial Completion**, setting forth with respect to each such claim the total amount thereof, the various items of labor and materials included therein, and the alleged value of each such item; and if the alleged claim be one for delay, the alleged cause of each such delay, the period or periods of time, giving the dates when the **Contractor** claims the performance of the **Work** or a particular part thereof was delayed, and an itemized statement and breakdown of the amount claimed for each such delay. With reference to each such claim, the **Commissioner**, the **Comptroller** and, in the event of litigation, the **City** Corporation Counsel shall have the same right to inspect, and to make extracts or copies of, the **Contractor's** books, vouchers, records, etc., as is referred to in Articles 11, 27, 28, and 30. Nothing contained in this Article 45.2, is intended to or shall relieve the **Contractor** from the obligation of complying strictly with Articles 11, 27, 28, and 30. The **Contractor** is warned that unless such claims are completely set forth as herein required, the **Contractor**, upon acceptance of the Final Payment pursuant to Article 46, will have waived any such claims.

45.3 Preparation of Final Voucher: Upon determining the balance due hereunder other than on account of claims, the **Engineer** will prepare and certify, for the Commissioner's approval, a voucher for final payment in that amount less any and all deductions authorized to be made by the **Commissioner** under this **Contract** or by **Law**. In the case of a lump sum **Contract**, the **Commissioner** shall certify the voucher for final payment within thirty (30) **Days** from the date of completion and acceptance of the **Work**, provided all requests for extensions of time have been acted upon.

45.3.1 All prior certificates and vouchers upon which partial payments were made, being merely estimates made to enable the **Contractor** to prosecute the **Work** more advantageously, shall be subject to correction in the final voucher, and the certification of the **Engineer** thereon and the approval of the **Commissioner** thereof, shall be conditions precedent to the right of the **Contractor** to receive any money hereunder. Such final voucher shall be binding and conclusive upon the **Contractor**.

45.3.2 Payment pursuant to such final voucher, less any deductions authorized to be made by the **Commissioner** under this **Contract** or by **Law**, shall constitute the final payment, and shall be made by the **Comptroller** within thirty (30) **Days** after the filing of such voucher in his/her office.

45.4 The **Contractor** acknowledges that nothing contained in this Article 45 is intended to or shall in any way diminish the force and effect of Article 13.

ARTICLE 46. ACCEPTANCE OF FINAL PAYMENT

46.1 The acceptance by the **Contractor**, or by anyone claiming by or through it, of the final payment, whether such payment be made pursuant to any judgment of any court, or otherwise, shall constitute and operate as a release of the **City** from any and all claims of and liability to the **Contractor** for anything heretofore done or furnished for the **Contractor** relating to or arising out of this **Contract** and the **Work** done hereunder, and for any prior act, neglect or default on the part of the **City** or any of its officials, agents or employees, excepting only a claim against the **City** for the amounts deducted or retained in accordance with the terms and provisions of this **Contract** or by **Law**, and excepting any claims, not otherwise waived, or any pending dispute resolution procedures which are contained in the

verified statement filed with the **Contractor's** substantial and final requisitions pursuant to Articles 44 and 45.

46.2 The **Contractor** is warned that the execution by it of a release, in connection with the acceptance of the final payment, containing language purporting to reserve claims other than those herein specifically excepted from the operation of this Article 46, or those for amounts deducted by the **Commissioner** from the final requisition or from the final payment as certified by the **Engineer** and approved by the **Commissioner**, shall not be effective to reserve such claims, anything stated to the **Contractor** orally or in writing by any official, agent or employee of the **City** to the contrary notwithstanding.

46.3 Should the **Contractor** refuse to accept the final payment as tendered by the **Comptroller**, it shall constitute a waiver of any right to interest thereon.

46.4 The **Contractor**, however, shall not be barred by this Article 46 from commencing an action for breach of **Contract** to the extent permitted by **Law** and by the terms of the **Contract** for any claims that are contained in the verified statement filed with the **Contractor's** substantial and final requisitions pursuant to Articles 44 and 45 or that arose after submission of the final payment requisition, provided that a detailed and verified statement of claim is served upon the contracting **Agency** and **Comptroller** not later than forty (40) **Days** after the making of such final payment by electronic funds transfer (EFT) or the mailing of such final payment. The statement shall specify the items upon which the claim will be based and any such claim shall be limited to such items.

ARTICLE 47. APPROVAL BY PUBLIC DESIGN COMMISSION

47.1 All works of art, including paintings, mural decorations, stained glass, statues, bas-reliefs, and other sculptures, monuments, fountains, arches, and other structures of a permanent character intended for ornament or commemoration, and every design of the same to be used in the performance of this **Contract**, and the design of all bridges, approaches, buildings, gates, fences, lamps, or structures to be erected, pursuant to the terms of this **Contract**, shall be submitted to the Art Commission, d/b/a the Public Design Commission of the City of New York, and shall be approved by the Public Design Commission prior to the erection or placing in position of the same. The final payment shall not become due or payable under this **Contract** unless and until the Public Design Commission shall certify that the design for the **Work** herein contracted for has been approved by the said Public Design Commission, and that the same has been executed in substantial accordance with the design so approved, pursuant to the provisions of Chapter 37, Section 854 of the **City** Charter, as amended.

CHAPTER X: CONTRACTOR'S DEFAULT

ARTICLE 48. COMMISSIONER'S RIGHT TO DECLARE CONTRACTOR IN DEFAULT

48.1 In addition to those instances specifically referred to in other Articles herein, the **Commissioner** shall have the right to declare the **Contractor** in default of this **Contract** if:

48.1.1 The **Contractor** fails to commence **Work** when notified to do so by the **Commissioner**; or if

48.1.2 The **Contractor** shall abandon the **Work**; or if

48.1.3 The **Contractor** shall refuse to proceed with the **Work** when and as directed by the **Commissioner**; or if

48.1.4 The **Contractor** shall, without just cause, reduce its working force to a number which, if maintained, would be insufficient, in the opinion of the **Commissioner**, to complete the **Work** in accordance with the progress schedule; or if

48.1.5 The **Contractor** shall fail or refuse to increase sufficiently such working force when ordered to do so by the **Commissioner**; or if

48.1.6 The **Contractor** shall sublet, assign, transfer, convert or otherwise dispose of this **Contract** other than as herein specified; or sell or assign a majority interest in the **Contractor**; or if

48.1.7 The **Contractor** fails to secure and maintain all required insurance; or if

48.1.8 A receiver or receivers are appointed to take charge of the **Contractor's** property or affairs; or if

48.1.9 The **Commissioner** shall be of the opinion that the **Contractor** is or has been unnecessarily or unreasonably or willfully delaying the performance and completion of the **Work**, or the award of necessary subcontracts, or the placing of necessary material and equipment orders; or if

48.1.10 The **Commissioner** shall be of the opinion that the **Contractor** is or has been willfully or in bad faith violating any of the provisions of this **Contract**; or if

48.1.11 The **Commissioner** shall be of the opinion that the **Work** cannot be completed within the time herein provided therefor or within the time to which such completion may have been extended; provided, however, that the impossibility of timely completion is, in the **Commissioner's** opinion, attributable to conditions within the **Contractor's** control; or if

48.1.12 The **Work** is not completed within the time herein provided therefor or within the time to which the **Contractor** may be entitled to have such completion extended; or if

48.1.13 Any statement or representation of the **Contractor** in the **Contract** or in any document submitted by the **Contractor** with respect to the **Work**, the **Project**, or the **Contract** (or for purposes of securing the **Contract**) was untrue or incorrect when made; or if

48.1.14 The **Contractor** or any of its officers, directors, partners, five (5%) percent shareholders, principals, or other persons substantially involved in its activities, commits any of the acts or omissions specified as the grounds for debarment in the **PPB** Rules.

48.2 Before the **Commissioner** shall exercise his/her right to declare the **Contractor** in default, the **Commissioner** shall give the **Contractor** an opportunity to be heard, upon not less than two (2) **Days**' notice.

ARTICLE 49. EXERCISE OF THE RIGHT TO DECLARE DEFAULT

49.1 The right to declare the **Contractor** in default for any of the grounds specified or referred to in Article 48 shall be exercised by sending the **Contractor** a notice, signed by the **Commissioner**, setting forth the ground or grounds upon which such default is declared (hereinafter referred to as a "Notice of Default").

49.2 The **Commissioner's** determination that the **Contractor** is in default shall be conclusive, final, and binding on the parties and such a finding shall preclude the **Contractor** from commencing a plenary action for any damages relating to the **Contract**. If the **Contractor** protests the determination of the **Commissioner**, the **Contractor** may commence an action in a court of competent jurisdiction of the State of New York under Article 78 of the New York Civil Practice Law and Rules.

ARTICLE 50. QUITTING THE SITE

50.1 Upon receipt of such notice the **Contractor** shall immediately discontinue all further operations under this **Contract** and shall immediately quit the **Site**, leaving untouched all plant, materials, equipment, tools, and supplies then on the **Site**.

ARTICLE 51. COMPLETION OF THE WORK

51.1 The **Commissioner**, after declaring the **Contractor** in default, may then have the **Work** completed by such means and in such manner, by contract with or without public letting, or otherwise, as he/she may deem advisable, utilizing for such purpose such of the **Contractor's** plant, materials, equipment, tools, and supplies remaining on the **Site**, and also such **Subcontractors**, as he/she may deem advisable.

51.2 After such completion, the **Commissioner** shall make a certificate stating the expense incurred in such completion, which shall include the cost of re-letting and also the total amount of liquidated damages (at the rate provided for in the **Contract**) from the date when the **Work** should have been completed by the **Contractor** in accordance with the terms hereof to the date of actual completion of the **Work**. Such certificate shall be binding and conclusive upon the **Contractor**, its sureties, and any person claiming under the **Contractor**, as to the amount thereof.

51.3 The expense of such completion, including any and all related and incidental costs, as so certified by the **Commissioner**, and any liquidated damages assessed against the **Contractor**, shall be charged against and deducted out of monies which are earned by the **Contractor** prior to the date of default. Should the expense of such completion, as certified by the **Commissioner**, exceed the total sum which would have been payable under the **Contract** if it had been completed by the **Contractor**, any excess shall be paid by the **Contractor**.

ARTICLE 52. PARTIAL DEFAULT

52.1 In case the **Commissioner** shall declare the **Contractor** in default as to a part of the **Work** only, the **Contractor** shall discontinue such part, shall continue performing the remainder of the **Work** in strict conformity with the terms of this **Contract**, and shall in no way hinder or interfere with any **Other Contractor(s)** or persons whom the **Commissioner** may engage to complete the **Work** as to which the **Contractor** was declared in default.

52.2 The provisions of this Chapter relating to declaring the **Contractor** in default as to the entire **Work** shall be equally applicable to a declaration of partial default, except that the **Commissioner** shall be entitled to utilize for completion of the part of the **Work** as to which the **Contractor** was declared in default only such plant, materials, equipment, tools, and supplies as had been previously used by the **Contractor** on such part.

ARTICLE 53. PERFORMANCE OF UNCOMPLETED WORK

53.1 In completing the whole or any part of the **Work** under the provisions of this Chapter X, the **Commissioner** shall have the power to depart from or change or vary the terms and provisions of this **Contract**, provided, however, that such departure, change or variation is made for the purpose of reducing the time or expense of such completion. Such departure, change or variation, even to the extent of accepting a lesser or different performance, shall not affect the conclusiveness of the **Commissioner's** certificate of the cost of completion referred to in Article 51, nor shall it constitute a defense to an action to recover the amount by which such certificate exceeds the amount which would have been payable to the **Contractor** hereunder but for its default.

ARTICLE 54. OTHER REMEDIES

54.1 In addition to the right to declare the **Contractor** in default pursuant to this Chapter X, the **Commissioner** shall have the absolute right, in his/her sole discretion and without a hearing, to complete or cause to be completed in the same manner as described in Articles 51 and 53, any or all unsatisfactory or uncompleted punch list **Work** that remains after the completion date specified in the **Final Approved Punch List**. A written notice of the exercise of this right shall be sent to the **Contractor** who shall immediately quit the **Site** in accordance with the provisions of Article 50.

54.2 The expense of completion permitted under Article 54.1, including any and all related and incidental costs, as so certified by the **Commissioner**, shall be charged against and deducted out of monies which have been earned by the **Contractor** prior to the date of the exercise of the right set forth in Article 54.1; the balance of such monies, if any, subject to the other provisions of this **Contract**, to be paid to the **Contractor** without interest after such completion. Should the expense of such completion, as certified by the **Commissioner**, exceed the total sum which would have been payable under the **Contract** if it had been completed by the **Contractor**, any excess shall be paid by the **Contractor**.

54.3 The previous provisions of this Chapter X shall be in addition to any and all other remedies available under **Law** or in equity.

54.4 The exercise by the **City** of any remedy set forth herein shall not be deemed a waiver by the **City** of any other legal or equitable remedy contained in this **Contract** or provided under **Law**.

CHAPTER XI: MISCELLANEOUS PROVISIONS

ARTICLE 55. CONTRACTOR'S WARRANTIES

55.1 In consideration of, and to induce, the award of this **Contract** to the **Contractor**, the **Contractor** represents and warrants:

55.1.1 That it is financially solvent, sufficiently experienced and competent to perform the **Work**; and

55.1.2 That the facts stated in its bid and the information given by it pursuant to the Information for Bidders is true and correct in all respects; and

55.1.3 That it has read and complied with all requirements set forth in the **Contract**.

ARTICLE 56. CLAIMS AND ACTIONS THEREON

56.1 Any claim, that is not subject to dispute resolution under the **PPB** Rules or this **Contract**, against the **City** for damages for breach of **Contract** shall not be made or asserted in any action, unless the **Contractor** shall have strictly complied with all requirements relating to the giving of notice and of information with respect to such claims, as herein before provided.

56.2 Nor shall any action be instituted or maintained on any such claims unless such action is commenced within six (6) months after **Substantial Completion**; except that:

56.2.1 Any claims arising out of events occurring after **Substantial Completion** and before **Final Acceptance** of the **Work** shall be asserted within six (6) months of **Final Acceptance** of the **Work**;

56.2.2 If the **Commissioner** exercises his/her right to complete or cause to complete any or all unsatisfactory or uncompleted punch list **Work** that remains after the completion date specified in the **Final Approved Punch List** pursuant to Article 54, any such action shall be commenced within six (6) months from the date the **Commissioner** notifies the **Contractor** in writing that he/she has exercised such right. Any claims for monies deducted, retained or withheld under the provisions of this **Contract** shall be asserted within six (6) months after the date when such monies otherwise become due and payable hereunder; and

56.2.3 If the **Commissioner** exercises his/her right to terminate the **Contract** pursuant to Article 64, any such action shall be commenced within six (6) months of the date the **Commissioner** exercises said right.

ARTICLE 57. INFRINGEMENT

57.1 The **Contractor** shall be solely responsible for and shall defend, indemnify, and hold the **City** harmless from any and all claims (even if the allegations of the lawsuit are without merit) and judgments for damages and from costs and expenses to which the **City** may be subject to or which it may suffer or incur allegedly arising out of or in connection with any infringement by the **Contractor** of any copyright, trade secrets, trademark or patent rights or any other property or personal right of any third party by the **Contractor** and/or its **Subcontractors** in the performance or completion of the **Work**. Insofar as the facts or **Law** relating to any claim would preclude the **City** from being completely indemnified by the **Contractor**, the **City** shall be partially indemnified by the **Contractor** to the fullest extent permitted by **Law**.

ARTICLE 58. NO CLAIM AGAINST OFFICIALS, AGENTS OR EMPLOYEES

58.1 No claim whatsoever shall be made by the **Contractor** against any official, agent or employee of the **City** for, or on account of, anything done or omitted to be done in connection with this **Contract**.

ARTICLE 59. SERVICE OF NOTICES

59.1 The **Contractor** hereby designates the business address, fax number, and email address specified in its bid, as the place where all notices, directions or other communications to the **Contractor** may be delivered, or to which they may be mailed. Any notice, direction, or communication from either party to the other shall be in writing and shall be deemed to have been given when (i) delivered personally; (ii) sent by certified mail, return receipt requested; (iii) delivered by overnight or same day courier service in a properly addressed envelope with confirmation; or (iv) sent by fax or email and, unless receipt of the fax or e-mail is acknowledged by the recipient by fax or e-mail, deposited in a post office box regularly maintained by the United States Postal Service in a properly addressed, postage pre-paid envelope.

59.2 **Contractor's** notice address, email address, or fax number may be changed at any time by an instrument in writing, executed and acknowledged by the **Contractor**, and delivered to the **Commissioner**.

59.3 Nothing herein contained shall, however, be deemed to preclude or render inoperative the service of any notice, direction or other communication upon the **Contractor** personally, or, if the **Contractor** is a corporation, upon any officer thereof.

ARTICLE 60. UNLAWFUL PROVISIONS DEEMED STRICKEN FROM CONTRACT

60.1 If this **Contract** contains any unlawful provision not an essential part of the **Contract** and which shall not appear to have been a controlling or material inducement to the making thereof, the same shall be deemed of no effect and shall, upon notice by either party, be deemed stricken from the **Contract** without affecting the binding force of the remainder.

ARTICLE 61. ALL LEGAL PROVISIONS DEEMED INCLUDED

61.1 It is the intent and understanding of the parties to this **Contract** that each and every provision of **Law** required to be inserted in this **Contract** shall be and is inserted herein. Furthermore, it is hereby stipulated that every such provision is to be deemed to be inserted herein, and if, through mistake or otherwise, any such provision is not inserted, or is not inserted in correct form, then this **Contract** shall forthwith upon the application of either party be amended by such insertion so as to comply strictly with the **Law** and without prejudice to the rights of either party hereunder.

ARTICLE 62. TAX EXEMPTION

62.1 The **City** is exempt from payment of Federal, State, and local taxes, including sales and compensating use taxes of the State of New York and its cities and counties on all tangible personal property sold to the **City** pursuant to the provisions of this **Contract**. These taxes are not to be included in bids. However, this exemption does not apply to tools, machinery, equipment or other property leased by or to the **Contractor**, **Subcontractor** or **Materialman** or to tangible personal property which, even

though it is consumed, is not incorporated into the completed **Work** (consumable supplies) and tangible personal property that the **Contractor** is required to remove from the **Site** during or upon completion of the **Work**. The **Contractor** and its **Subcontractors** and **Materialmen** shall be responsible for and pay any and all applicable taxes, including sales and compensating use taxes, on such leased tools, machinery, equipment or other property and upon all such consumable supplies and tangible personal property that the **Contractor** is required to remove from the **Site** during or upon completion of the **Work**.

62.2 The **Contractor** agrees to sell and the **City** agrees to purchase all tangible personal property, other than consumable supplies and other tangible personal property that the **Contractor** is required to remove from the **Site** during or upon completion of the **Work**, that is required, necessary or proper for or incidental to the construction of the **Project** covered by this **Contract**. The sum paid under this **Contract** for such tangible personal property shall be in full payment and consideration for the sale of such tangible personal property.

62.2.1 The **Contractor** agrees to construct the **Project** and to perform all **Work**, labor and services rendered, necessary, proper or incidental thereto for the sum shown in the bid for the performance of such **Work**, labor, and services, and the sum so paid pursuant to this **Contract** for such **Work**, labor, and services, shall be in full consideration for the performance by the **Contractor** of all its duties and obligations under this **Contract** in connection with said **Work,** labor, and services.

62.3 20 NYCRR Section 541.3(d) provides that a **Contractor**'s purchases of tangible personal property that is either incorporated into real property owned by a governmental entity or purchased for and sold to a governmental entity are exempt from sales and use tax. The **City** shall not pay sales tax for any such tangible personal property that it purchases from the **Contractor** pursuant to the **Contract.** With respect to such tangible personal property, the **Contractor**, at the request of the **City**, shall furnish to the **City** such bills of sale and other instruments as may be required by the **City**, properly executed, acknowledged and delivered assuring to the **City** title to such tangible personal property, free of liens and/or encumbrances, and the **Contractor** shall mark or otherwise identify all such tangible personal property as the property of the **City**.

62.4 Title to all tangible personal property to be sold by the **Contractor** to the **City** pursuant to the provisions of the **Contract** shall immediately vest in and become the sole property of the **City** upon delivery of such tangible personal property to the **Site**. Notwithstanding such transfer of title, the **Contractor** shall have the full and continuing responsibility to install such tangible personal property in accordance with the provisions of this **Contract**, protect it, maintain it in a proper condition and forthwith repair, replace and make good any damage thereto, theft or disappearance thereof, and furnish additional tangible personal property in place of any that may be lost, stolen or rendered unusable, without cost to the **City**, until such time as the **Work** covered by the **Contract** is fully accepted by the **City**. Such transfer of title shall in no way affect any of the **Contractor's** obligations hereunder. In the event that, after title has passed to the **City**, any of the tangible personal property is rejected as being defective or otherwise unsatisfactory, title to all such tangible personal property shall be deemed to have been transferred back to the **Contractor**.

62.5 The purchase by **Subcontractors** or **Materialmen** of tangible personal property to be sold hereunder shall be a purchase or procurement for resale to the **Contractor** (either directly or through other **Subcontractors**) and therefore not subject to the aforesaid sales and compensating use taxes, provided that the subcontracts and purchase agreements provide for the resale of such tangible personal property and that such subcontracts and purchase agreements are in a form similar to this **Contract** with respect to the separation of the sale of consumable supplies and tangible personal property that the

Contractor is required to remove from the **Site** during or upon completion of the **Work** from the **Work** and labor, services, and any other matters to be provided, and provided further that the subcontracts and purchase agreements provide separate prices for tangible personal property and all other services and matters. Such separation shall actually be followed in practice, including the separation of payments for tangible personal property from the payments for other **Work** and labor and other things to be provided.

62.6 The **Contractor** and its **Subcontractors** and **Materialmen** shall furnish a **Contractor** Exempt Purchase Certificate to all persons, firms or corporations from which they purchase tangible personal property for the performance of the **Work** covered by this **Contract**.

62.7 In the event any of the provisions of this Article 62 shall be deemed to be in conflict with any other provisions of this **Contract** or create any ambiguity, then the provisions of this Article 62 shall control.

ARTICLE 63. INVESTIGATION(S) CLAUSE

63.1 The parties to this **Contract** agree to cooperate fully and faithfully with any investigation, audit or inquiry conducted by a United States, a State of New York (State) or a **City** governmental agency or authority that is empowered directly or by designation to compel the attendance of witnesses and to examine witnesses under oath, or conducted by the Inspector General of a governmental agency that is a party in interest to the transaction, submitted bid, submitted proposal, contract, lease, permit or license that is the subject of the investigation, audit or inquiry.

63.2 If any person who has been advised that his/her statement, and any information from such statement, will not be used against him/her in any subsequent criminal proceeding refuses to testify before a grand jury or other governmental agency or authority empowered directly or by designation to compel the attendance of witnesses and to examine witnesses under oath concerning the award of or performance under any transaction, agreement, lease, permit, contract, or license entered into with the **City**, the State, or any political subdivision or public authority thereof, or the Port Authority of New York and New Jersey, or any local development corporation within the **City**, or any public benefit corporation organized under the **Laws** of the State of New York, or;

63.3 If any person refuses to testify for a reason other than the assertion of his/her privilege against self incrimination in an investigation, audit or inquiry conducted by a **City** or State governmental agency or authority empowered directly or by designation to compel the attendance of witnesses and to take testimony under oath, or by the Inspector General of the governmental agency that is a party in interest in, and is seeking testimony concerning the award of, or performance under any transaction, agreement, lease, permit, contract, or license entered into with the **City**, the State, or any political subdivision thereof or any local development corporation within the **City**, then;

63.4 The **Commissioner** whose **Agency** is a party in interest to the transaction, submitted bid, submitted proposal, contract, lease, permit, or license shall convene a hearing, upon not less than five (5) **Days**' written notice to the parties involved to determine if any penalties should attach for the failure of a person to testify.

63.5 If any non-governmental party to the hearing requests an adjournment, the **Commissioner** who convened the hearing may, upon granting the adjournment, suspend any contract, lease, permit, or license, pending the final determination pursuant to Article 63.7 without the **City** incurring any penalty or damages for delay or otherwise.

63.6 The penalties which may attach after a final determination by the **Commissioner** may include but shall not exceed:

63.6.1 The disqualification for a period not to exceed five (5) years from the date of an adverse determination for any person, or any entity of which such person was a member at the time the testimony was sought, from submitting bids for, or transacting business with, or entering into or obtaining any contract, lease, permit or license with or from the **City**; and/or

63.6.2 The cancellation or termination of any and all such existing **City** contracts, leases, permits or licenses that the refusal to testify concerns and that have not been assigned as permitted under this **Contract**, nor the proceeds of which pledged, to an unaffiliated and unrelated institutional lender for fair value prior to the issuance of the notice scheduling the hearing, without the **City** incurring any penalty or damages on account of such cancellation or termination; monies lawfully due for goods delivered, work done, rentals, or fees accrued prior to the cancellation or termination shall be paid by the **City**.

63.7 The **Commissioner** shall consider and address in reaching his/her determination and in assessing an appropriate penalty the factors in Articles 63.7.1 and 63.7.2. The **Commissioner** may also consider, if relevant and appropriate, the criteria established in Articles 63.7.3 and 63.7.4, in addition to any other information which may be relevant and appropriate:

63.7.1 The party's good faith endeavors or lack thereof to cooperate fully and faithfully with any governmental investigation or audit, including but not limited to the discipline, discharge, or disassociation of any person failing to testify, the production of accurate and complete books and records, and the forthcoming testimony of all other members, agents, assignees or fiduciaries whose testimony is sought.

63.7.2 The relationship of the person who refused to testify to any entity that is a party to the hearing, including but not limited to, whether the person whose testimony is sought has an ownership interest in the entity and/or the degree of authority and responsibility the person has within the entity.

63.7.3 The nexus of the testimony sought to the subject entity and its contracts, leases, permits or licenses with the **City**.

63.7.4 The effect a penalty may have on an unaffiliated and unrelated party or entity that has a significant interest in an entity subject to penalties under Article 63.6, provided that the party or entity has given actual notice to the **Commissioner** upon the acquisition of the interest, or at the hearing called for in Article 63.4, gives notice and proves that such interest was previously acquired. Under either circumstance the party or entity shall present evidence at the hearing demonstrating the potential adverse impact a penalty will have on such person or entity.

63.8 Definitions:

63.8.1 The term "license" or "permit" as used in this Article 63 shall be defined as a license, permit, franchise or concession not granted as a matter of right.

63.8.2 The term "person" as used in this Article 63 shall be defined as any natural person doing business alone or associated with another person or entity as a partner, director, officer, principal or employee.

63.8.3 The term "entity" as used in this Article 63 shall be defined as any firm, partnership, corporation, association, joint venture, or person that receives monies, benefits, licenses, leases, or permits from or through the **City** or otherwise transacts business with the **City**.

63.8.4 The term "member" as used in this Article 63 shall be defined as any person associated with another person or entity as a partner, director, officer, principal or employee.

63.9 In addition to and notwithstanding any other provision of this **Contract**, the **Commissioner** may in his/her sole discretion terminate this **Contract** upon not less than three (3) **Days'** written notice in the event the **Contractor** fails to promptly report in writing to the **Commissioner** of the Department of Investigations ("DOI") of the **City** any solicitation of money, goods, requests for future employment or other benefit or thing of value, by or on behalf of any employee of the **City** or other person, firm, corporation or entity for any purpose which may be related to the procurement or obtaining of this **Contract** by the **Contractor**, or affecting the performance of this **Contract**.

ARTICLE 64. TERMINATION BY THE CITY

64.1 In addition to termination pursuant to any other article of this **Contract**, the **Commissioner** may, at any time, terminate this **Contract** by written notice to the **Contractor**. In the event of termination, the **Contractor** shall, upon receipt of such notice, unless otherwise directed by the **Commissioner**:

64.1.1 Stop **Work** on the date specified in the notice;

64.1.2 Take such action as may be necessary for the protection and preservation of the **City's** materials and property;

64.1.3 Cancel all cancelable orders for material and equipment;

64.1.4 Assign to the **City** and deliver to the **Site** or another location designated by the **Commissioner**, any non-cancelable orders for material and equipment that is not capable of use except in the performance of this **Contract** and has been specifically fabricated for the sole purpose of this **Contract** and not incorporated in the **Work**;

64.1.5 Take no action which will increase the amounts payable by the **City** under this **Contract**.

64.2 In the event of termination by the **City** pursuant to this Article 64, payment to the **Contractor** shall be in accordance with Articles 64.2.1, 64.2.2 or 64.2.3, to the extent that each respective article applies.

64.2.1 Lump Sum Contracts or Items: On all lump sum **Contracts**, or on lump sum items in a **Contract**, the **City** will pay the **Contractor** the sum of the amounts described in Articles 64.2.1(a) and 64.2.1(b), less all payments previously made pursuant to this **Contract**. On lump sum **Contracts** only, the **City** will also pay the **Contractor** an additional sum as provided in Article 64.2.1(c).

64.2.1(a) For **Work** completed prior to the notice of termination, the **Contractor** shall be paid a pro rata portion of the lump sum bid amount, plus approved change orders, based upon the percent completion of the **Work**, as determined by the

Commissioner. For the purpose of determining the pro rata portion of the lump sum bid amount to which the **Contractor** is entitled, the bid breakdown submitted in accordance with Article 41 shall be considered, but shall not be dispositive. The **Commissioner's** determination hereunder shall be final, binding, and conclusive.

64.2.1(b) For non-cancelable material and equipment that is not capable of use except in the performance of this **Contract** and has been specifically fabricated for the sole purpose of this **Contract**, but not yet incorporated in the **Work**, the **Contractor** shall be paid the lesser of the following, less salvage value:

64.2.1(b)(i) The Direct Cost, as defined in Article 64.2.4; or

64.2.1(b)(ii) The fair and reasonable value, if less than Direct Cost, of such material and equipment, plus necessary and reasonable delivery costs.

64.2.1(b)(iii) In addition, the **Contractor** shall be paid five (5%) percent of the amount described in Article 64.2.1(b)(i) or Article 64.2.1(b)(ii), whichever applies.

64.2.1(c) Except as otherwise provided in Article 64.2.1(d), on all lump sum **Contracts**, the **Contractor** shall be paid the percentage indicated below applied to the difference between the total lump sum bid amount and the total of all payments made prior to the notice of termination plus all payments allowed pursuant to Articles 64.2.1(a) and 64.2.1(b):

64.2.1(c)(i) Five (5%) percent of the first five million ($5,000,000) dollars; and

64.2.1(c)(ii) Three (3%) percent of any amount between five million ($5,000,000) dollars and fifteen million ($15,000,000) dollars; plus

64.2.1(c)(iii) One (1%) percent of any amount over fifteen million ($15,000,000) dollars.

64.2.1(d) In the event the **City** terminates a lump sum **Contract** pursuant to this Article 64 within ninety (90) **Days** after registration of the **Contract** with the **Comptroller**, the **Contractor** shall be paid one (1%) percent of the difference between the lump sum bid amount and the total of all payments made pursuant to this Article 64.2.

64.2.2 Unit Price Contracts or Items: On all unit price **Contracts**, or on unit price items in a **Contract**, the **City** will pay the **Contractor** the sum of the amounts described in Articles 64.2.2(a) and 64.2.2(b), less all payments previously made pursuant to this **Contract**:

64.2.2(a) For all completed units, the unit price stated in the **Contract**, and

64.2.2(b) For units that have been ordered but are only partially completed, the **Contractor** will be paid:

64.2.2(b)(i) A pro rata portion of the unit price stated in the **Contract** based upon the percent completion of the unit and

64.2.2(b)(ii) For non-cancelable material and equipment, payment will be made pursuant to Article 64.2.1(b).

64.2.3 Time and Materials Contracts or Items Based on Time and Material Records: On all **Contracts** or items in a **Contract** where payment for the **Work** is based on time and material records, the **Contractor** shall be paid in accordance with Article 26, less all payments previously made pursuant to this **Contract**.

64.2.4 Direct Costs: Direct Costs as used in this Article 64.2 shall mean:

64.2.4(a) The actual purchase price of material and equipment, plus necessary and reasonable delivery costs,

64.2.4(b) The actual cost of labor involved in construction and installation at the **Site**, and

64.2.4(c) The actual cost of necessary bonds and insurance purchased pursuant to requirements of this **Contract** less any amounts that have been or should be refunded by the **Contractor's** sureties or insurance carriers.

64.2.4(d) Direct Costs shall not include overhead.

64.3 In no event shall any payments under this Article 64 exceed the **Contract** price for such items.

64.4 All payments pursuant to Article 64 shall be in the nature of liquidated damages and shall be accepted by the **Contractor** in full satisfaction of all claims against the **City**.

64.5 The **City** may deduct or set off against any sums due and payable pursuant to this Article 64, any deductions authorized by this **Contract** or by **Law** (including but not limited to liquidated damages) and any claims it may have against the **Contractor**. The **City's** exercise of the right to terminate the **Contract** pursuant to this Article 64 shall not impair or otherwise effect the **City's** right to assert any claims it may have against the **Contractor** in a plenary action.

64.6 Where the **Work** covered by the **Contract** has been substantially completed, as determined in writing by the **Commissioner**, termination of the **Work** shall be handled as an omission of **Work** pursuant to Articles 29 and 33, in which case a change order will be issued to reflect an appropriate reduction in the **Contract** sum, or if the amount is determined after final payment, such amount shall be paid by the **Contractor**.

ARTICLE 65. CHOICE OF LAW, CONSENT TO JURISDICTION AND VENUE

65.1 This **Contract** shall be deemed to be executed in the **City** regardless of the domicile of the **Contractor**, and shall be governed by and construed in accordance with the **Laws** of the State of New York and the **Laws** of the United States, where applicable.

65.2 The parties agree that any and all claims asserted against the **City** arising under this **Contract** or related thereto shall be heard and determined in the courts of the State of New York ("New York State Courts") located in the **City** and County of New York. To effect this **Contract** and intent, the **Contractor** agrees:

65.2.1 If the **City** initiates any action against the **Contractor** in Federal court or in a New York State Court, service of process may be made on the **Contractor** either in person, wherever such **Contractor** may be found, or by registered mail addressed to the **Contractor** at its address as set forth in this **Contract**, or to such other address as the **Contractor** may provide to the **City** in writing; and

65.2.2 With respect to any action between the **City** and the **Contractor** in a New York State Court, the **Contractor** hereby expressly waives and relinquishes any rights it might otherwise have:

65.2.2(a) To move to dismiss on grounds of forum non conveniens;

65.2.2(b) To remove to Federal Court; and

65.2.2(c) To move for a change of venue to a New York State Court outside New York County.

65.2.3 With respect to any action brought by the **City** against the **Contractor** in a Federal Court located in the **City**, the **Contractor** expressly waives and relinquishes any right it might otherwise have to move to transfer the action to a Federal Court outside the **City**.

65.2.4 If the **Contractor** commences any action against the **City** in a court located other than in the **City** and County of New York, upon request of the **City**, the **Contractor** shall either consent to a transfer of the action to a New York State Court of competent jurisdiction located in the **City** and County of New York or, if the Court where the action is initially brought will not or cannot transfer the action, the **Contractor** shall consent to dismiss such action without prejudice and may thereafter reinstate the action in a New York State Court of competent jurisdiction in New York County.

65.3 If any provision(s) of this Article 65 is held unenforceable for any reason, each and all other provision(s) shall nevertheless remain in full force and effect.

ARTICLE 66. PARTICIPATION IN AN INTERNATIONAL BOYCOTT

66.1 The **Contractor** agrees that neither the **Contractor** nor any substantially owned affiliated company is participating or shall participate in an international boycott in violation of the provisions of the Federal Export Administration Act of 1979, as amended, or the regulations of the United States Department of Commerce (Commerce Department) promulgated thereunder.

66.2 Upon the final determination by the Commerce Department or any other agency of the United States as to, or conviction of the **Contractor** or a substantially-owned affiliated company thereof for participation in an international boycott in violation of the provisions of the Export Administration Act of 1979, as amended, or the regulations promulgated thereunder, the **Comptroller** may, at his/her option, render forfeit and void this **Contract**.

66.3 The **Contractor** shall comply in all respects, with the provisions of Section 6-114 of the Administrative Code and the rules and regulations issued by the **Comptroller** thereunder.

ARTICLE 67. LOCALLY BASED ENTERPRISE PROGRAM

67.1 This **Contract** is subject to the requirements of Section 6-108.1 of the Administrative Code and regulations promulgated thereunder. No construction contract shall be awarded unless and until these requirements have been complied with in their entirety; however, compliance with this Article 67 is not required if the Agency sets Subcontractor Participation Goals for Minority- and Women-Owned Business Enterprises (M/WBEs).

67.2 Unless specifically waived by the **Commissioner** with the approval of the Division of Economic and Financial Opportunity of the **City** Department of Business Services, if any portion of the **Contract** is subcontracted, not less than ten (10%) percent of the total dollar amount of the **Contract** shall be awarded to locally based enterprises (LBEs); except that where less than ten (10%) percent of the total dollar amount of the **Contract** is subcontracted, such lesser percentage shall be so awarded.

67.3 The **Contractor** shall not require performance and payment bonds from LBE **Subcontractors**.

67.4 If the **Contractor** has indicated prior to award that no **Work** will be subcontracted, no **Work** shall be subcontracted without the prior approval of the **Commissioner**, which shall be granted only if the **Contractor** makes a good faith effort beginning at least six (6) weeks before the **Work** is to be performed to obtain LBE **Subcontractors** to perform the **Work**.

67.5 If the **Contractor** has not identified sufficient LBE **Subcontractors** prior to award, it shall sign a letter of compliance stating that it complies with Section 6-108.1 of the Administrative Code, recognizes that achieving the LBE requirement is a condition of its **Contract**, and shall submit documentation demonstrating its good faith efforts to obtain LBEs. After award, the **Contractor** shall begin to solicit LBE's to perform subcontracted **Work** at least six (6) weeks before the date such **Work** is to be performed and shall demonstrate that a good faith effort has been made to obtain LBEs on each subcontract until it meets the required percentage.

67.6 Failure of the **Contractor** to comply with the requirements of Section 6-108.1 of the Administrative Code and the regulations promulgated thereunder shall constitute a material breach of this **Contract**. Remedy for such breach may include the imposition of any or all of the following sanctions:

67.6.1 Reducing the **Contractor's** compensation by an amount equal to the dollar value of the percentage of the LBE subcontracting requirement not complied with;

67.6.2 Declaring the **Contractor** in default;

67.6.3 If the **Contractor** is an LBE, de-certifying and declaring the **Contractor** ineligible to participate in the LBE program for a period of up to three (3) years.

ARTICLE 68. ANTITRUST

68.1 The **Contractor** hereby assigns, sells, and transfers to the **City** all right, title, and interest in and to any claims and causes of action arising under the antitrust **Laws** of New York State or of the United States relating to the particular goods or services purchased or procured by the **City** under this **Contract**.

ARTICLE 69. MacBRIDE PRINCIPLES PROVISIONS

69.1 Notice To All Prospective **Contractors**:

69.1.1 Local Law No. 34 of 1991 became effective on September 10, 1991 and added Section 6-115.1 of the Administrative Code. The local **Law** provides for certain restrictions on **City Contracts** to express the opposition of the people of the **City** to employment discrimination practices in Northern Ireland to promote freedom of work-place opportunity.

69.1.2 Pursuant to Section 6-115.1, prospective **Contractors** for **Contracts** to provide goods or services involving an expenditure of an amount greater than ten thousand ($10,000.) dollars, or for construction involving an amount greater than fifteen thousand ($15,000.) dollars, are asked to sign a rider in which they covenant and represent, as a material condition of their **Contract**, that any business operations in Northern Ireland conducted by the **Contractor** and any individual or legal entity in which the **Contractor** holds a ten (10%) percent or greater ownership interest in the **Contractor** will be conducted in accordance with the MacBride Principles of nondiscrimination in employment.

69.1.3 Prospective **Contractors** are not required to agree to these conditions. However, in the case of **Contracts** let by competitive sealed bidding, whenever the lowest responsible bidder has not agreed to stipulate to the conditions set forth in this notice and another bidder who has agreed to stipulate to such conditions has submitted a bid within five (5%) percent of the lowest responsible bid for a **Contract** to supply goods, services or contraction of comparable quality, the **Agency** shall refer such bids to the Mayor, the Speaker or other officials, as appropriate, who may determine, in accordance with applicable **Law**, that it is in the best interest of the **City** that the **Contract** be awarded to other than the lowest responsible pursuant to Section 313(b)(2) of the **City** Charter.

69.1.4 In the case of **Contracts** let by other than competitive sealed bidding, if a prospective **Contractor** does not agree to these conditions, no **Agency**, elected official or the **City** Council shall award the **Contract** to that bidder unless the **Agency** seeking to use the goods, services or construction certifies in writing that the **Contract** is necessary for the **Agency** to perform its functions and there is no other responsible **Contractor** who will supply goods, services or construction of comparable quality at a comparable price.

69.2 In accordance with Section 6-115.1 of the Administrative Code, the **Contractor** stipulates that such **Contractor** and any individual or legal entity in which the **Contractor** holds a ten (10%) percent or greater ownership interest in the **Contractor** either:

69.2.1 Have no business operations in Northern Ireland, or

69.2.2 Shall take lawful steps in good faith to conduct any business operations they have in Northern Ireland in accordance with the MacBride Principles, and shall permit independent monitoring of their compliance with such principles.

69.3 For purposes of this Article, the following terms shall have the following meanings:

69.3.1 "MacBride Principles" shall mean those principles relating to nondiscrimination in employment and freedom of work-place opportunity which require employers doing business in Northern Ireland to:

69.3.1(a) increase the representation of individuals from under-represented religious groups in the workforce, including managerial, supervisory, administrative, clerical and technical jobs;

69.3.1(b) take steps to promote adequate security for the protection of employees from under-represented religious groups both at the work-place and while traveling to and from **Work**;

69.3.1(c) ban provocative religious or political emblems from the workplace;

69.3.1(d) publicly advertise all job openings and make special recruitment efforts to attract applicants from under-represented religious groups;

69.3.1(e) establish layoff, recall, and termination procedures which do not in practice favor a particular religious group;

69.3.1(f) abolish all job reservations, apprenticeship restrictions and different employment criteria which discriminate on the basis of religion;

69.3.1(g) develop training programs that will prepare substantial numbers of current employees from under-represented religious groups for skilled jobs, including the expansion of existing programs and the creation of new programs to train, upgrade, and improve the skills of workers from under-represented religious groups;

69.3.1(h) establish procedures to asses, identify, and actively recruit employees from under-represented religious groups with potential for further advancement; and

69.3.1(i) appoint a senior management staff member to oversee affirmative action efforts and develop a timetable to ensure their full implementation.

69.4 The **Contractor** agrees that the covenants and representations in Article 69.2 are material conditions to this **Contract**. In the event the **Agency** receives information that the **Contractor** who made the stipulation required by this Article 69 is in violation thereof, the **Agency** shall review such information and give the **Contractor** an opportunity to respond. If the **Agency** finds that a violation has occurred, the **Agency** shall have the right to declare the **Contractor** in default in default and/or terminate this **Contract** for cause and procure supplies, services or **Work** from another source in the manner the **Agency** deems proper. In the event of such termination, the **Contractor** shall pay to the **Agency**, or the **Agency** in its sole discretion may withhold from any amounts otherwise payable to the **Contractor**, the difference between the **Contract** price for the uncompleted portion of this **Contract** and the cost to the **Agency** of completing performance of this **Contract** either itself or by engaging another **Contractor** or **Contractors**. In the case of a requirement **Contract**, the **Contractor** shall be liable for such difference in price for the entire amount of supplies required by the **Agency** for the uncompleted term of **Contractor's Contract**. In the case of a construction **Contract**, the **Agency** shall also have the right to hold the **Contractor** in partial or total default in accordance with the default provisions of this **Contract**, and/or may seek debarment or suspension of the **Contractor**. The rights and remedies of the **Agency** hereunder shall be in addition to, and not in lieu of, any rights and remedies the **Agency** has pursuant to this **Contract** or by operation of **Law**.

ARTICLE 70. ELECTRONIC FILING/NYC DEVELOPMENT HUB

70.1 The **Contractor** shall electronically file all alteration type-2 and alteration type-3 applications via the New York City Development Hub Web site, except applications for the following types of minor alterations: enlargements, curb cuts, legalizations, fire alarms, builders pavement plans, and jobs filed on Landmark Preservation Commission calendared properties. All such filings must be professionally certified. Information about electronic filing via the New York City Development Hub is available on the **City** Department of Buildings Web site at www.nyc.gov/buildings.

ARTICLE 71. PROHIBITION OF TROPICAL HARDWOODS

71.1 Tropical hardwoods, as defined in Section 165 of the New York State Finance Law (Finance Law), shall not be utilized in the performance of this **Contract** except as expressly permitted by Section 165 of the Finance Law.

ARTICLE 72. CONFLICTS OF INTEREST

72.1 Section 2604 of the **City** Charter and other related provisions of the **City** Charter, the Administrative Code, and the Penal Law are applicable under the terms of this **Contract** in relation to conflicts of interest and shall be extended to **Subcontractors** authorized to perform **Work**, labor and services pursuant to this **Contract** and further, it shall be the duty and responsibility of the **Contractor** to so inform its respective **Subcontractors**. Notice is hereby given that, under certain circumstances, penalties may be invoked against the donor as well as the recipient of any form of valuable gift.

ARTICLE 73. MERGER CLAUSE

73.1 The written **Contract** herein, contains all the terms and conditions agreed upon by the parties hereto, and no other agreement, oral or otherwise, regarding the subject matter of this **Contract** shall be deemed to exist or to bind any of the parties hereto, or to vary any of the terms contained herein.

ARTICLE 74. STATEMENT OF WORK

74.1 The **Contractor** shall furnish all labor and materials and perform all **Work** in strict accordance with the **Specifications** and **Addenda** thereto, numbered as shown in Schedule A.

ARTICLE 75. COMPENSATION TO BE PAID TO CONTRACTOR

75.1 The **City** will pay and the **Contractor** will accept in full consideration for the performance of the **Contract**, subject to additions and deductions as provided herein, the total sum shown in Schedule A, this said sum being the amount at which the **Contract** was awarded to the **Contractor** at a public letting thereof, based upon the **Contractor's** bid for the **Contract**.

ARTICLE 76. ELECTRONIC FUNDS TRANSFER

76.1 In accordance with Section 6-107.1 of the Administrative Code, the **Contractor** agrees to accept payments under this **Contract** from the **City** by electronic funds transfer (EFT). An EFT is any

transfer of funds, other than a transaction originated by check, draft or similar paper instrument, which is initiated through an electronic terminal, telephonic instrument or computer or magnetic tape so as to order, instruct or authorize a financial institution to debit or credit an account. Prior to the first payment made under this **Contract**, the **Contractor** shall designate one financial institution or other authorized payment agent and shall complete the attached "EFT Vendor Payment Enrollment Form" in order to provide the Commissioner of the **City** Department of Finance with information necessary for the **Contractor** to receive electronic funds transfer payments through a designated financial institution or authorized payment agent. The crediting of the amount of a payment to the appropriate account on the books of a financial institution or other authorized payment agent designated by the **Contractor** shall constitute full satisfaction by the **City** for the amount of the payment under this **Contract**. The account information supplied by the **Contractor** to facilitate the electronic funds transfer shall remain confidential to the fullest extent provided by **Law**.

76.2 The **Commissioner** may waive the application of the requirements of this Article 76 to payments on contracts entered into pursuant to Section 315 of the **City** Charter. In addition, the Commissioner of the Department of Finance and the Comptroller may jointly issue standards pursuant to which the **Agency** may waive the requirements of this Article 76 for payments in the following circumstances: (i) for individuals or classes of individuals for whom compliance imposes a hardship; (ii) for classifications or types of checks; or (iii) in other circumstances as may be necessary in the interest of the **City**.

ARTICLE 77. RECORDS RETENTION

77.1 The **Contractor** agrees to retain all books, records, and other documents relevant to this **Contract** for six years after the final payment or termination of this **Contract**, whichever is later. **City**, state, and federal auditors and any other persons duly authorized by the **City** shall have full access to and the right to examine any such books, records, and other documents during the retention period.

ARTICLE 78. EXAMINATION AND VIEWING OF SITE, CONSIDERATION OF OTHER SOURCES OF INFORMATION AND CHANGED SITE CONDITIONS

78.1 Pre-Bidding (Investigation) Viewing of Site – Bidders must carefully view and examine the **Site** of the proposed **Work**, as well as its adjacent area, and seek other usual sources of information, for they will be conclusively presumed to have full knowledge of any and all conditions and hazards on, about or above the **Site** relating to or affecting in any way the performance of the **Work** to be done under the **Contract** that were or should have been known by a reasonably prudent bidder. To arrange a date for visiting the **Site**, bidders are to contact the **Agency** contact person specified in the bid documents.

78.2 Should the **Contractor** encounter during the progress of the Work site conditions or environmental hazards at the **Site** materially differing from any shown on the **Contract Drawings** or indicated in the **Specifications** or such conditions or environmental hazards as could not reasonably have been anticipated by the **Contractor**, which conditions or hazards will materially affect the cost of the **Work** to be done under the **Contract**, the attention of the **Commissioner** must be called immediately to such conditions or hazards before they are disturbed. The **Commissioner** shall thereupon promptly investigate the conditions or hazards. If the **Commissioner** finds that they do so materially differ, and that they could not have been reasonably anticipated by the **Contractor**, the **Contract** may be modified with the **Commissioner**'s written approval.

PERFORMANCE BOND

KNOWN ALL PEOPLE BY THESE PRESENTS,
That we,_____

_____

_____

hereinafter referred to as the "Principal,"
and,_____

_____

_____

hereinafter referred to as the "Surety" ("Sureties") are held and firmly bound to THE CITY OF NEW YORK, hereinafter referred to as the "City" or to its successors and assigns in the penal sum of_____

_____

_____

($ _____) Dollars, lawful money of the United States for the payment of which said sum of money well and truly to be made, we, and each of us, bind ourselves, our heirs, executors, administrators, successors and assigns, jointly and severally, firmly by these presents.

WHEREAS, The Principal is about to enter, or has entered, into a Contract in writing with the City for

_____

_____

a copy of which Contract is annexed to and hereby made a part of this bond as though herein set forth in full;

NOW, THEREFORE, the conditions of this obligation are such that if the Principal, his or its representatives or assigns, shall well and faithfully perform the said Contract and all modifications, amendments, additions and alterations thereto that may hereafter be made, according to its terms and its true intent and meaning, including repair and or replacement of defective work and guarantees of maintenance for the periods stated in the Contract, and shall fully indemnify and save harmless the City from all cost and damage which it may suffer by reason of the Principal's default of the Contract, and shall fully reimburse and repay the City for all outlay and expense which the City may incur in making

good any such default and shall protect the said City of New York against, and pay any and all amounts, damages, cost and judgments which may or shall be recovered against said City or its officers or agents or which the said City of New York may be called upon to pay any person or corporation by reason of any damages arising or growing out of the Principal's default of the Contract, then this obligation shall be null and void, otherwise to remain in full force and effect.

The Surety (Sureties), for value received, hereby stipulates and agrees, upon written notice from the City that the City has determined that the Principal is in default of the Contract, to (1) pay the City the cost to complete the contract as determined by the City in excess of the balance of the Contract held by the City, plus any damages or costs to which the City is entitled, up to the full amount of the above penal sum, (2) fully perform and complete the Work to be performed under the Contract, pursuant to the terms, conditions, and covenants thereof, or (3) tender a completion Contractor that is acceptable to the City. The Surety (Sureties) further agrees, at its option, either to notify the City that it elects to pay the city the cost of completion plus any applicable damages and costs under option (1) above, or to commence and diligently perform the Work specified in the Contract, including physical site work, within twenty-five (25) business days after written notice thereof from the City and, if the Surety elects to fully perform and complete the Work, then to complete all Work within the time set forth in the Contract or such other time as agreed to between the City and Surety in accordance with the Contract. If the Surety elects to tender payment pursuant to (1) above, then the Surety shall tender such amount within fifteen (15) business days notification from the City of the cost of completion. The Surety and the City reserve all rights and defenses each may have against the other; provided, however, that the Surety expressly agrees that its reservation of rights shall not provide a basis for non-performance of its obligation to pay the City the cost of completion, to commence and complete all Work as provided herein, or to tender a completion contractor.

The Surety (Sureties), for value received, for itself and its successors and assigns, hereby stipulates and agrees that the obligation of said Surety (Sureties) and its bond shall be in no way impaired or affected by any extension of time, modification, omission, addition, or change in or to the said Contract or the Work to be performed thereunder, or by any payment thereunder before the time required therein, or by any waiver of any provisions thereof, or any moneys due or to become due thereunder; and said Surety (Sureties) does hereby waive notice of any and all of such extensions, modifications, omissions, additions, changes, payments, and waivers, and hereby expressly stipulates and agrees that any and all things done and omitted to be done by and in relation to subcontractors shall have the same effect as to said Surety (Sureties) as though done or omitted to be done by or in relation to said Principal. Notwithstanding the above, if the City makes payments to the Principal before the time required by the contract that in the aggregate exceed $100,000 or 10% of the Contract price, whichever is less, and that have not become earned prior to the Principal being found to be in default, then all payments made to the Principal before the time required by the Contract shall be added to the remaining contract value available to be paid for the completion of the Contract as if such sums had not been paid to the Principal, but shall not provide a basis for non-performance of its obligation to pay the City the cost of completion, to commence and to complete all Work as provided herein, or to tender a completion contractor

IN WITNESS WHEREOF, The Principal and the Surety (Sureties) have hereunto set their hands and seals, and such of them as are corporations have caused their corporate seals to be hereunto affixed and these presents to be signed by their proper officers, this

NEW YORK CITY PERFORMANCE BOND $5 MILLION OR LESS (SBA APPROVED)

_____ day of _____, 20_____

_____ (L.S.)

(Seal) Principal

By _____

(Seal) _____

Surety

By _____

(Seal) _____

Surety

By _____

(Seal) _____

Surety

By _____

(Seal) _____

Surety

By _____

(Seal) _____

Surety

By _____

Bond Premium Rate _____.

Bond Premium Cost _____.

If the Contractor (Principal) is a partnership, the bond should be signed by each of the individuals who are partners.

If the Contractor (Principal) is a corporation, the bond should be signed in its correct corporate name by a duly authorized officer, agent, or attorney-in-fact.

There should be executed an appropriate number of counterparts of the bond corresponding to the number of counterparts of the Contract.

ACKNOWLEDGMENT OF PRINCIPAL IF A CORPORATION

State of _____ County of _____ ss:

On this _____ day of _____ 20____, before me personally came

_____,

to me known, who, being by me duly sworn did depose and say that he/she resides at

_____;

that he/she is the _____ of _____,

the corporation described in and which executed the foregoing instrument; and that he/she signed his/her name to the foregoing instrument by order of the directors of said corporation as the duly authorized and binding act thereof.

_____
Notary Public or Commissioner of Deeds.

ACKNOWLEDGMENT OF PRINCIPAL IF A PARTNERSHIP

On this _____ day of _____ 20____, before me personally came

_____,

to me known, who, being by me duly sworn did depose and say that he/she resides at

_____;

that he/she is_____ partner of_____

a limited/general partnership existing under the laws of the State of _____, the Partnership described in and which executed the foregoing instrument; and that he/she signed his/her name to the foregoing instrument as the duly authorized and binding act of said partnership.

_____
Notary Public or Commissioner of Deeds.

ACKNOWLEDGMENT OF PRINCIPAL IF AN INDIVIDUAL

On this _____ day of _____ 20____, before me personally came

_____,

to me known, who, being by me duly sworn did depose and say that he/she resides at

_____;

and that he/she is the individual whose name is subscribed to the within instrument and acknowledged to me that by his/her signature on the instrument, said individual executed the instrument.

_____
Notary Public or Commissioner of Deeds.

Affix Acknowledgments and justification of Sureties

PERFORMANCE BOND

KNOW ALL PEOPLE BY THESE PRESENTS:,
That we,_____

_____

_____

hereinafter referred to as the "Principal,"
and,_____

_____

_____

hereinafter referred to as the "Surety" ("Sureties") are held and firmly bound to THE CITY OF NEW YORK, hereinafter referred to as the "City" or to its successors and assigns in the penal sum of_____

_____

_____

($ _____) Dollars, lawful money of the United States for the payment of which said sum of money well and truly to be made, we, and each of us, bind ourselves, our heirs, executors, administrators, successors and assigns, jointly and severally, firmly by these presents.

WHEREAS, The Principal is about to enter, or has entered, into a Contract in writing with the City for

_____

_____

a copy of which Contract is annexed to and hereby made a part of this bond as though herein set forth in full;

NOW, THEREFORE, the conditions of this obligation are such that if the Principal, his or its representatives or assigns, shall well and faithfully perform the said Contract and all modifications, amendments, additions and alterations thereto that may hereafter be made, according to its terms and its true intent and meaning, including repair and or replacement of defective work and guarantees of maintenance for the periods stated in the Contract, and shall fully indemnify and save harmless the City from all cost and damage which it may suffer by reason of the Principal's default of the Contract, and shall fully reimburse and repay the City for all outlay and expense which the City may incur in making

good any such default and shall protect the said City of New York against, and pay any and all amounts, damages, cost and judgments which may or shall be recovered against said City or its officers or agents or which the said City of New York may be called upon to pay any person or corporation by reason of any damages arising or growing out of the Principal's default of the Contract, then this obligation shall be null and void, otherwise to remain in full force and effect.

The Surety (Sureties), for value received, hereby stipulates and agrees, upon written notice from the City that the City has determined that the Principal is in default of the Contract, to either (1) pay the full amount of the above penal sum in complete discharge and exoneration of this bond and of all the liabilities of the Surety relating to this bond, or (2) fully perform and complete the Work to be performed under the Contract, pursuant to the terms, conditions, and covenants thereof. The Surety (Sureties) further agrees, at its option, either to tender the penal sum or to commence and diligently perform the Work specified in the Contract, including physical site work, within twenty-five (25) business days after written notice thereof from the City and to complete all Work within the time set forth in the Contract or such other time as agreed to between the City and Surety in accordance with the Contract. The Surety and the City reserve all rights and defenses each may have against the other; provided, however, that the Surety expressly agrees that its reservation of rights shall not provide a basis for non-performance of its obligation to commence and to complete all Work as provided herein.

The Surety (Sureties), for value received, for itself and its successors and assigns, hereby stipulates and agrees that the obligation of said Surety (Sureties) and its bond shall be in no way impaired or affected by any extension of time, modification, omission, addition, or change in or to the said Contract or the Work to be performed thereunder, or by any payment thereunder before the time required therein, or by any waiver of any provisions thereof, or by any assignment, subletting or other transfer thereof or of any Work to be performed or any moneys due or to become due thereunder; and said Surety (Sureties) does hereby waive notice of any and all of such extensions, modifications, omissions, additions, changes, payments, waivers, assignments, subcontracts and transfers, and hereby expressly stipulates and agrees that any and all things done and omitted to be done by and in relation to assignees, subcontractors, and other transferees shall have the same effect as to said Surety (Sureties) as though done or omitted to be done by or in relation to said Principal.

IN WITNESS WHEREOF, The Principal and the Surety (Sureties) have hereunto set their hands and seals, and such of them as are corporations have caused their corporate seals to be hereunto affixed and these presents to be signed by their proper officers, this

_____ day of _____ 20 _____ .

(Seal)

_____ (L.S.)

Principal

By _____.

(Seal)

Surety

By _____.

Performance Bond Greater Than $5 Million

(Seal) _____.
Surety

By _____.
_____.

(Seal)
Surety

By _____.
_____.

(Seal)
Surety

By _____.
_____.

(Seal)
Surety

By _____.

Bond Premium Rate _____.

Bond Premium Cost _____.

If the Contractor (Principal) is a partnership, the bond should be signed by each of the individuals who are partners.

If the Contractor (Principal) is a corporation, the bond should be signed in its correct corporate name by a duly authorized officer, agent, or attorney-in-fact.

There should be executed an appropriate number of counterparts of the bond corresponding to the number of counterparts of the Contract.

ACKNOWLEDGMENT OF PRINCIPAL IF A CORPORATION

State of _____ County of _____ ss:

On this _____ day of _____ 20 _____ before me personally came _____,
to me known, who, being by me duly sworn did depose and say that he/she resides
at _____
_____; that he/she is the _____
of ___ the corporation described in and which executed the foregoing instrument; and that he signed his name to the foregoing instrument by order of the directors of said corporation as the duly authorized and binding act thereof.

_____
Notary Public or Commissioner of Deeds.

ACKNOWLEDGMENT OF PRINCIPAL IF A PARTNERSHIP

State of _____ County of _____ ss:

On this _____ day of _____ 20 _____ before me personally came _____
to me known, who, being by me duly sworn did depose and say that he/she resides
at _____
_____; that he/she is _____ partner of
_____, a limited/general partnership existing under the laws of the State of
_____, the partnership described in and which executed the foregoing instrument;
and that he/she signed his/her name to the foregoing instrument as the duly authorized and binding act of said partnership.

_____
Notary Public or Commissioner of Deeds.

ACKNOWLEDGMENT OF PRINCIPAL IF AN INDIVIDUAL

State of _____County of _____ ss:

On this_____day of _____ 20 _____before me personally came_____
to me known, who, being by me duly sworn did depose and say that he/she resides
at_____
_____, and that he/she is the individual whose name is subscribed to the within instrument and acknowledged to me that by his/her signature on the instrument, said individual executed the instrument.

_____
Notary Public or Commissioner of Deeds.

Affix Acknowledgments and justification of Sureties

PAYMENT BOND (Pg.1)

KNOW ALL MEN BY THESE PRESENTS, That we, _____

_____

_____

_____

hereinafter referred to as the "Principal" and _____

_____

_____

_____

hereinafter referred to as the "Surety" ("Sureties") are held and firmly bound to THE CITY OF NEW YORK, hereinafter referred to as the "City" or to its successors and assigns, in the penal sum of:

_____

_____ Dollars,

($_____) lawful money of the United States, for the payment of which said sum of money well and truly to be made, we, and each of us, bind ourselves, our heirs, executors, administrators, successors and assigns, jointly and severally, firmly by these presents.

WHEREAS, the Principal is about to enter, or has entered, into a Contract in writing with the City for:

_____

_____

_____

_____

_____

a copy of which Contract is annexed to and hereby made a part of this bond as though herein set forth in full.

NOW, THEREFORE, the conditions of this obligation are such that if the Principal, his or its representatives or assigns and other Subcontractors to whom Work under this Contract is sublet and his or their successors and assigns shall promptly pay or cause to be paid all lawful claims for:

(a) Wages and compensation for labor performed and services rendered by all persons engaged in the prosecution of the Work under said Contract, and any amendment or extension thereof or addition thereto, whether such persons be agents, servants or employees of the Principal or of any such Subcontractors, including all persons so engaged who perform the work of laborers or mechanics at or in the vicinity of the site of the Project regardless of any Contractual relationship between the Principal or such Subcontractors, or his or their successors or assigns, on the one hand and such laborers or mechanics on the other, but not including office employees not regularly stationed at the site of the Project, and

(b) Materials and supplies (whether incorporated in the permanent construction or not), as well as teams, fuels, oils, implements or machinery furnished, used or consumed by said Principal or any Subcontractors at or in the vicinity of the site of the Project in the prosecution of the Work under said Contract and any amendment or extension thereof or addition thereto; then this obligation shall be null and void; otherwise to remain in full force and effect.

This bond is subject to the following additional conditions, limitations and agreements:

(a) The Principal and Surety (Sureties) agree that this bond shall be for the benefit of any materialman or laborer having a just claim, as well as the City itself.

(b) All persons who have performed labor, rendered services or furnished materials and supplies, as aforesaid, shall have a direct right of action against the Principal and his, its or their successors and assigns, and the Surety (Sureties) herein, or against either or both or any of them and their successors and assigns. Such persons may sue in their own name, and may prosecute the suit to judgment and execution without the necessity of joining with any other person as party plaintiff.

(c) The Principal and Surety (Sureties) agree that neither of them will hold the City liable for any judgment for costs or

otherwise, obtained against either or both of them by a laborer or materialman in a suit brought by either a laborer or materialman under this bond for moneys allegedly due for performing work or furnishing material.

(d) The Surety (Sureties) or its successors and assigns shall not be liable for any compensation recoverable by an employee or laborer under the Workmen's Compensation Law.

(e) In no event shall the Surety (Sureties), or its successors or assigns, be liable for a greater sum than the penalty of this bond or be subject to any suit, action or proceeding hereon that is instituted by any person, firm, or corporation hereunder later than two (2) years after the complete performance of said Contract and final settlement thereof.

The Principal, for himself and his successors and assigns, and the Surety (Sureties), for itself and its successors and assigns, do hereby expressly waive any objection that might be interposed as to the right of the City to require a bond containing the foregoing provisions, and they do hereby further expressly waive any defense which they or either of them might interpose to an action brought hereon by any person, firm or corporation, including Subcontractors, materialmen and third persons, for work, labor, services, supplies or material performed, rendered, or furnished as aforesaid upon the ground that there is no law authorizing the City to require the foregoing provisions to be placed in this bond.

And the Surety (Sureties) for value received, for itself and its successors and assigns, hereby stipulates and agrees that the obligation of said Surety (Sureties) and its bond shall be in no way impaired or affected by any extension of time, modification, omission, addition, or change in or of the said Contract or the Work to be performed thereunder, or by any payment thereunder before the time required therein, or by any waiver of any provisions thereof, or by any assignment, subletting or other transfer thereof or of any part thereof, or of any Work to be performed, or any moneys due or to become due thereunder; and said Surety (Sureties) does hereby waive notice of any and all of such extensions, modifications, omissions, additions, changes, payments, waivers, assignments, subcontracts and transfers, and hereby expressly stipulates and agrees that any and all things done and omitted to be done by and in relation to assignees, Subcontractors, and other transferees shall have the same effect as to said Surety (Sureties) as though done or omitted to be done by or in relation to said Principal.

PAYMENT BOND (Pg.4)

IN WITNESS WHEREOF, the Principal and the Surety (Sureties) have hereunto set their hands and seals, and such of them as are corporations have caused their corporate seals to be hereunto affixed and these presents to be signed by their proper officers,

this_____day of_____.,20_____

(SEAL) _____(L.S.)
Principal

By: _____

(SEAL) _____
Surety

By: _____

(SEAL) _____
Surety

By: _____

(SEAL) _____
Surety

By: _____

(SEAL) _____
Surety

By: _____

BOND PREMIUM RATE: _____

BOND PREMIUM COST: _____

If the Contractor (Principal) is a partnership, the bond should be signed by each of the individuals who are partners. If the Contractor (Principal) is a corporation, the bond should be signed in its correct corporate name by a duly authorized officer, agent, or attorney-in-fact. There should be executed an appropriate member of counterparts of the bond corresponding to the number of counterparts of the Contract.

PAYMENT BOND (Pg.5)

ACKNOWLEDGMENT OF PRINCIPAL - IF A CORPORATION

State of_____County of _____ss.:

On this _____ day of _____,20_____

before me personally came _____

to me known, who, being by me duly sworn did depose and say that he resides at_____

_____

that he is the _____ of _____

the corporation described in and which executed the foregoing instrument; that he knows the seal of said corporation; that one of the seals affixed to said instrument is such seal; that it was so affixed by order of the directors of said corporation, and that he signed his name thereto by like order.

_____
Notary Public

ACKNOWLEDGMENT OF PRINCIPAL - IF A PARTNERSHIP

State of_____ County of _____ss.:

On this _____day of _____,20____

before me personally appeared _____

to me known and known to me to be one of the members of the firm of:

_____
described in and who executed the foregoing instrument and he acknowledged to me that he executed the same as and for the act and deed of said firm.

_____
Notary Public

PAYMENT BOND (Pg.6)

ACKNOWLEDGMENT OF PRINCIPAL - IF AN INDIVIDUAL

State of_____ County of _____SS.:

On this _____day of _____, 20____ before me

personally appeared _____ known to me to be the person described in and who executed the foregoing instrument and acknowledged that he executed the same.

_____
Notary Public

Each executed bond should be accompanied by:

(a) appropriate acknowledgments of the respective parties;

(b) appropriate duly certified copy of Power of Attorney or other certificate of authority where bond is executed by agent, officer or other representative of Principal or Surety;

(c) a duly certified extract from by-laws or resolutions of Surety under which Power of Attorney or other certificate of authority of its agent, officer or representative was issued, and

(d) a duly certified copy of latest published financial statement of assets and liabilities of Surety.

****

AFFIX ACKNOWLEDGMENTS AND JUSTIFICATIONS OF SURETIES

GENERAL CONDITIONS

SECTION B – MATERIALS AND METHODS OF CONSTRUCTION

ARTICLE 1. GENERAL REQUIREMENTS

All materials proposed to be used in construction shall have due examination and be subjected to the required tests before acceptance. Those which are to be tested by the Laboratory shall have samples taken and submitted in accordance with the Engineer's instructions. Samples are to be taken of all sand, gravel, stone, cement, concrete, bars, steel fabric, bituminous material or other materials used in construction when the Engineer in charge has not been notified that such samples have already been taken. Such materials shall be tested by the Laboratory and no materials of which laboratory tests are required shall be used, unless otherwise directed, until the Engineer has received written notification of acceptance, and then only so long as its quality remains equal to that of the accepted sample. The Contractor shall furnish all samples, shall bear all expense in connection with their sampling and transportation, and shall furnish all facilities and labor required in connection with their testing.

The acceptance at any time of any materials shall not be a bar to its' future rejection if subsequently found to be defective or inferior in quality or uniformity to the material specified. Contractors shall furnish to companies from whom they purchase materials, which are inspected at manufacturing plants, the contract number and destination for each shipment of material so ordered. If any part of the contract is sublet, the sub-contractor shall also conform to the foregoing requirements.

Any materials which have been plant inspected and accepted by the Engineer shall not be shipped to other work under another Contract unless so authorized by the Engineer.

Materials which have been rejected based upon the results of Laboratory tests will not be resampled or retested except as provided for in the Specifications for any particular material, unless otherwise directed by the Engineer.

Weight shall be used in all cases for percentage determination on all solid material.

Any material may be rejected if, in the opinion of the Engineer, service records indicated that it is unsound or otherwise unsatisfactory.

The results obtained in the test of any materials for concrete may be compared with the records of similar materials in actual service and when such service record is unsatisfactory, as determined by the Engineer, the use of the material will not be allowed even though the tests are satisfactory.

ARTICLE 2. AGGREGATES

The term "aggregate" shall mean inert material which is mixed with cement and water to produce concrete, consisting in general of sand, pebbles, gravel, cinders, crushed stones, blast furnace slag, burnt shale or clay, or similar materials.

Concrete aggregates shall conform to "Standard Specification for Concrete Aggregates," A.S.T.M. C33, or to "Standard Specification for Lightweight Aggregates for Structural Concrete," of A.S.T.M. C330; lightweight aggregate shall be approved by the Board of Standards and Appeals. The size of the aggregate shall be at most one-fifth of the narrowest dimension between forms of the member for which the concrete is to be used, three-fourths of the minimum clear spacing between reinforcing bars.

All sources of aggregate shall be thoroughly stripped of all inferior and objectionable material before operations are started and shall be kept stripped far enough from the working face to insure against undesirable material becoming mixed with output.

Aggregate stock piles shall be located at points approved by the Engineer and so arranged that the fine and coarse aggregates or coarse aggregates separated by the specification requirements do not become mixed. The Contractor shall provide either approved platforms or prepared bases satisfactory to the Engineer; or at least 6 inches of the base stock pile material shall be left undisturbed until the completion of the pavement and structures. Materials from different sources of supply shall not be stored in the same stock pile unless approved by the Engineer.

Aggregates shall be delivered to the mixer in the batch boxes or trucks with the compartments of sufficient capacity to carry individual batches so there will be no loss or overrun of concrete materials either during transit or during the operation of dumping batches at the mixer. Truck bodies or batch boxes used to transport cement shall be equipped with waterproof tarpaulins for protection against rain and wind. Railroad cars, barges, etc., used for the transportation of materials shall be clear when any materials are deposited therein.

If undesirable material is furnished from acceptable sources of supply through faulty operation or any other cause whatsoever, all material from the source of supply may be rejected by the Engineer.

Representative samples of both fine and coarse aggregate shall be taken and sent by the representative of the Engineer to the Laboratory unless materials from the same source of supply

have been tested and approved during the year preceding the award of the Contract except that local stone need not be resampled if the supply has not been worked and the test is not more than three years old; and except that local sand and gravel need not be resampled if the supply has not been worked and the test is not more than two years old.

If, after approval, the character of the material changes it shall be subjected to further test for approval or rejection.

If, after trial, it is found that partly developed quarries, ledges, pits, banks or other sources of supply do not furnish a uniform product, or if for any reason, the product from any source, at any time, proves to be unsatisfactory to the Engineer, said Engineer may require the Contractor to furnish acceptable material from other sources of supply, and the Contractor shall have no claim for increased payment on account of such requirements.

Whenever any specifications or methods of test are stipulated in these Specifications the same shall mean that specification or method of test given by the serial designation mentioned or the bulletin referred to.

When a sieve number is mentioned in these Specifications the same is to comply with the Tyler Standard Screen Scale Sieves as to size of sieve opening.

ARTICLE 3. PORTLAND CEMENT

All Portland Cement shall be sampled at the mill by a representative of the Engineer.

Portland Cement shall be tested according to approved methods of tests and shall conform to "Standard Specifications for Portland Cement" of A.S.T.M. Designation C 150, where not otherwise modified by these specifications and except that test samples for cement taken from cars, bins or warehouses shall represent amounts to be determined by the Laboratory. Samples of each lot shall be required to show practically uniform results in tests; marked deviation from such results may be considered cause for rejection, even though test requirements may be otherwise fulfilled.

Compound percentages shall be computed to the nearest one-tenth of one per cent and reported to the nearest one percent.

Cement may be accepted on the results of the seven-day tests provided these tests are satisfactory. Cement not satisfactory in the seven-day tests may be held awaiting the results of twenty-eight day tests before acceptance or rejection. The Engineer, however, reserves the right to reject any cement that fails to meet

the requirements of the twenty-eight-day tests, even though it had been previously accepted on the seven-day tests. The cement shall be delivered in suitable bags of an approved type with the brand and the name of the manufacturer plainly marked thereon. A bag shall contain 94 pounds net. A barrel shall contain 376 pounds net. One bag of cement shall be considered as containing 1 cubic foot.

Bulk cement may be used providing it is batched by an approved weighing device meeting the following requirements:

The weighing hopper and scale entirely encased and arrangement made for locking.

The discharge chute shall be so arranged that cement will not lodge therein and so that there will be no loss of cement.

The hopper inlet mechanism shall be interlocked against opening when the discharge gate is open.

The hopper discharge mechanism shall be inter-locked against opening until the full batch is in the hopper scales, balanced against opening while hopper is being filled, against closing until hopper is entirely discharged and scales back is balance, and against opening if batch in hopper is either over or under weight by more than one per cent of the amount specified.

The weighing hopper discharge gate shall be operated by electrical mechanism. The weighing hopper discharge chute shall be suspended from the encasement and not from the weighing hopper.

Shipment or transportation of cement in cloth bags will not be permitted.

Provision shall be made by the Contractor for storing cement, in a dry place and in such a manner as to permit easy access for proper inspection and identification of each shipment. The use of cement of a temperature in excess of 140°F will not be permitted.

All cement stored over winter by the Contractor shall not be used until retested by the Laboratory. All accepted cement held in storage more than six months at mills, plants, storage sheds, etc., shall be resampled and retested before use. However, accepted cement which has been in storage more than one (1) year from the time of original sampling shall not be used.

Cement failing to meet the requirements of the Specifications shall be neither resampled nor retested, except as provided for in the Standard Specifications of the American Society for Testing Materials.

ARTICLE 4. FINE AGGREGATE FOR CONCRETE

Fine aggregate shall consist of sand, ore or garnet tailings, stone screenings (except limestone screenings) or a mixture of these, which shall conform to the following requirements and sieve analysis when dry.

Fine aggregate for concrete shall consist of grains or particles of hard and durable rocks, the surfaces of which are not coated with any injurious material. Any fine aggregate may be rejected if, in the opinion of the Engineer, it contains sufficient deleterious or unsound material to be harmful.

Natural or concrete sand shall be so graded that, when dry, 100 per cent shall pass 1/4-inch sieve, 90 to 100 per cent shall pass a No. 4 sieve; 50 to 85 per cent shall pass a No. 16 sieve; 10 to 30 per cent shall pass a No. 50 sieve, and 2 to 10 per cent shall pass a No. 100 sieve.

Stone screenings, ore or garnet tailings shall be so graded that when dry, 100 per cent shall pass a 1/4 -inch sieve; 90 to 100 per cent shall pass a No. 4 sieve; 55 to 85 per cent shall pass a No. 16 sieve; 15 to 30 per cent shall pass a No. 50 sieve, and not more than 10 percent shall pass a No. 100 sieve. When subjected to ten (10) alternations of the sodium sulphate solution and soundness test, it shall lose not more than ten (10) per cent by weight.

All natural sand shall be thoroughly washed before using. All washed fine aggregate shall be stored in stock piles for a period of at least twelve (12) hours before batching. No new aggregate shall be added to any stock pile while materials from that pile are being batched.

Fine aggregate shall be rejected if it contains more than two (2%) per cent by weight of four (4%) per cent by volume of loam and slit.

Fine aggregate shall be tested for Mortar-Making properties as described in the standard method of test for Measuring Mortar-Making Properties of Fine Aggregate, A.A.S.H.O. Designation T71.

Fine aggregate for masonry mortar shall consist of natural sand or manufactured sand and shall meet the requirements of the Standard Specification for Aggregate for Masonry Mortar of A.S.T.M. Designation C144.

Samples tested during the progress of the work may be accepted on the basis of the seven-day test. The Engineer, however, reserves the right to rescind such acceptance if mortar fails on the 28-day test.

All proportioning tables for fine aggregate have been increased by three (3) per cent to take care of average moisture conditions.

ARTICLE 5. MORTAR SAND

The requirements for Fine Aggregate for Concrete shall apply except as herein modified. When dry, 100 percent shall pass a No. 4 sieve, 95-100 per cent shall pass a No. 8 sieve, 10-35 per cent a No. 50 sieve and 2-15 per cent a No. 100 sieve. Sand shall be rejected if it contains more than 2% by weight or 4% by volume of loam and slit.

ARTICLE 6. GROUT SAND

Grout sand shall consists of clean, hard, durable, uncoated stone particles free from lumps of clay and all deleterious substances.

Grout sand shall be of such a size that when dry 100 per cent shall pass a No. 16 sieve and 0-10 per cent by weight shall pass a No. 100 sieve.

Sand may be rejected for this class if it contains more than 6 per cent by volume of loam and slit. When the sand is mixed with Portland Cement in the proportions of 1 part of cement to 3 parts of sand, the resulting mortar shall have a compressive strength of at least 60 per cent of that developed in the same time by a mortar of the same proportion and consistency made of the same cement and standard Ottawa sand.

ARTICLE 7. CUSHION SAND

Cushion sand shall consist of clean, hard, durable, uncoated stone particles free from lumps of clay and all deleterious substances.

Cushion sand shall be so graded that when dry, 100 per cent shall pass a one quarter (1/4) inch square opening sieve; and 0- 35 per cent by weight shall pass a No. 50 sieve, and 0- 10 per cent by weight shall pass a No. 100 sieve.

Sand may be rejected for this category if it contains more than ten (10) per cent by weight of loam and slit.

ARTICLE 8. COARSE AGGREGATE

Coarse aggregate shall consist of well graded, uniformly mixed broken stone, crushed gravel, screened gravel, or broken slag, and shall meet the requirements given for these materials. Broken slag or screened gravel shall not be used as coarse aggregate in any item unless it is so noted on the plans or in the itemized

proposal. The coarse aggregate for concrete in reinforced concrete piles and in slabs, curbs, beams, steel encasement, arches, roadway pavement and frames shall be broken stone. The Contractor may use either gravel or broken stone for other concrete.

If deliveries of coarse aggregate show segregation of sizes, material shall be deposited in stock piles and mixed before using.

Coarse aggregate shall be graded within the ranges shown to produce maximum density. Coarse aggregate coated with or containing mud, clay, dirt, stone dust, quicksand, or other objectionable material, shall be washed to the satisfaction of the Engineer. Run of bank gravel, a.k.a. "Bank run" shall not be permitted for concrete aggregate.

Coarse aggregate for concrete in which the maximum size aggregate is limited to No. 2 size shall consist of a mixture of No. 1 and No. 2 size particles, providing that no more than 50 percent or less than 30 percent shall be of No. 1 size and not more than 70 percent or less than 50 percent shall be of No. 2 size.

Stone or crushed gravel coarse aggregate for other concrete shall consist of a mixture of No. 1, No. 2 and No. 3- a size particles, 50 to 60 percent of which shall be of No. 3-a size, 40 to 50 percent of which shall be combined No. 1 and No. 2 sizes at least 40 percent of these combined No.1 and No. 2 sizes shall be of No.1 size particles. The combined No. 1 and No. 2 sizes shall be stored and batched separately except that separate delivery and stocking of the coarse aggregate will not be necessary where weight batching is not required.

Where stone is produced locally the crusher bins shall be so arranged that the No.1 and No.2 size particles are collected in the same bin.

Gravel coarse aggregate for other concrete shall consist of a mixture of No.1, No.2 and No.3 size particles, not more than 40 percent of which shall be of No.3 size, 60 to 100 percent of which shall be of No.3 size, 60 to 100 percent of which shall be combined No.1 and No.2 sizes of which not less than 40 percent nor more than 50 percent of these combined No.1 and No.2 sizes shall be of No.1 size particles. The combined No.1 and No.2 sizes shall be stored and batched separately except that separate delivery and stocking of the coarse aggregate will not be necessary where weight batching is not required.

When broken slag coarse aggregate is permitted, it shall meet the gradation requirements for coarse aggregate in which the maximum size is limited to 1 inch; and in items requiring weight batching it shall be adjusted in the field at the direction of the Engineer.

For slabs and structural concrete not exceeding one foot in thickness, for concrete deposited under water, and for concrete in pipe piles or concrete piles, the aggregate shall be limited to no larger than No.2 size.

The sizes of all stone, gravel, slag, etc., furnished locally or commercially and used under these Specifications shall be determined by its passing over the minimum and through the maximum square apertures for the various sizes tabulated as follows:

SIZES, OF STONE, GRAVEL AND SLAG

Percentage by Weight Passing the Following Square Openings (Sieve)

Sizes	4"	3-1/4"	2-1/4"	1-7/8"	1"	½"	1/4"	1/8"	No. 80
Screenings						100	90-100		
IB							100	90-100	0-15
IA						100	90-100	0-15	
I					100	90-100	0-15		
2				100	90-100	0-15			
3A			100	90-100	0-15				
3		100	90-100		0-15				

Sizes	4"	3-1/4"	2-1/4"	1-7/8"	1"	½"	1/4"	1/8"	No. 80
4	100	90-100	0-15						
5	90-100	0-15							

*Screenings shall include all of the fine material passing a one quarter (1/4") inch screen.

If at any time during the progress of the work the sizes of the stone furnished prove unsatisfactory due to stone "carrying by", fracturing under the roller, etc., the Contractor shall vary the sizes of the screen apertures as directed by the Engineer.

All crushing plants installed on the work shall be fitted with a tailing chute so that no stone will reach the bins other than that which passes through the proper screen.

All stone, gravel or slag must be of the required size when placed in the roadway, and no breaking up of stone, gravel or slag by hammers or otherwise will be permitted after the stone, gravel or slag has been placed in the work.

Stone

The broken stone shall consist of clean, durable, sharp angled fragments of rock (including ore tailings) of uniform quality throughout, free from thin or elongated pieces, soft or disintegrated stone, dirt or other objectionable features. Samples shall be tested for abrasion in accordance Standard Test Methods for "Resistance to Degradation of Small-Size and Large-Size Coarse Aggregate by Abrasion and Impact in the Los Angeles Machine" of ASTM Designations C131 and C535

When subjected to ten (10) cycles of sodium sulphate solution and soundness test, as hereinafter specified, it shall lose not more than five (5) percent by weight.

Stone for coarse aggregate for concrete, for all top coarse macadam, and for all mixed bituminous pavements, shall have a percentage of wear of not more than five and seven tenths (5-7/10%).

Gravel hardheads retained on a four (4") inch square scalping screen and crushed will be accepted as stone coarse aggregate for all concrete items provided such hardheads shall meet the stone abrasion requirement and provided that the finished product shall meet the gradation requirements for broken stone.

Crushed gravel of No.1A, No.1B, No.1 and No. 2 sizes produced from No.4 and larger size acceptable gravel will be considered as crushed stone for use in all retread, mixed in place and mixing method bituminous pavements.

Crushed Gravel

Acceptable screened gravel which has 75 percent of particles fractured shall be considered as crushed gravel for coarse aggregate for concrete and shall meet the gradation requirements for broken stone.

Gravel

Gravel shall consist of clean, sound, tough, hard stone, free from dirt, foreign matter, organic matter, coating or other deleterious matter and shall be washed if so directed.

Crushed gravel which contains more than 25 percent of unfractured particles shall be considered as screened gravel and shall meet all the requirements therefor. In making the abrasion determination only uncrushed particles shall be used.

Gravel for use in concrete work shall have a percent of wear of not more than 10 as determined by the Deval abrasion test for gravel in accordance with the Standard Specifications of the American Association of State Highway Officials, latest Method.

When subjected to 10 cycles of sodium sulphate solution and soundness test, as described under Materials of Construction, it shall lose not more than 5 percent by weight.

Slag

Broken slag, if specified for use, shall be hard and durable, composed of angular fragments reasonably uniform in density and quality, reasonably free from thin, elongated or glassy pieces, dirt or other objectionable matter.

Broken slag shall weigh not less than 70 pounds per cubic foot as determined by the Standard Test Method for "Unit Weight and Voids in Aggregate" for Concrete of the American Society for Testing Materials, Serial Designation C 29.

Slag for coarse aggregate for concrete and for all top coarse macadam shall have a percentage of wear of not more than 12 as determined by the Standard Method of Tests for "Resistance to Degradation of Large-Size Coarse Aggregate by Abrasion and Impact". American Society for Testing Materials, Serial Designation C 535 using, however, a weight of 4000 gms. of slag, measured loose, broken in pieces as nearly uniform in size as possible, and containing as nearly 50 pieces as possible.

ARTICLE 9. SODIUM TESTS

Soundness of aggregate shall be determined by using American Society of Testing Materials, Serial Designation C-88 latest revision tests for Soundness of aggregate by use of Sodium Sulphate or Magnesium Sulphate.

ARTICLE 10. MAGNESIUM SULPHATE TESTS

The above test A.S.T.M. C-88 shall apply to these tests.

ARTICLE 11. WATER

Water for concrete shall be free from oil, acid, alkali, vegetable matter, organic matter or other deleterious substances.

ARTICLE 12. EXPANSION JOINT MATERIAL

Premoulded Cork Expansion Joint

General: The premoulded cork joint shall be of the dimensions shown on the plans or in the Specifications. A tolerance of 1/8 of an inch in thickness will be permitted. All joints shall be cleanly cut and plainly stamped with the manufacturer's name.

Composition: Cork expansion joints shall be formed from clean cork particles compressed and bound together by a cementing material insoluble on water. The cork particles comprising the joint shall be present in their original state and shall not have been exposed in the process of manufacture to a high temperature.

Weight: The weight of the room dry cork expansion joint, computed on a cubic foot basis, shall not be more than 20 pounds.

Boiling Test: The expansion joint shall withstand boiling for one-half hour in distilled water without showing any indication of disintegration.

Compression Test: A sample of the room dry expansion joint, without encasement and not exceeding 1 inch in thickness, shall be compressed at room temperature at the rate of 0.1 inch per minute to one-half of its original thickness. Upon being reduced to 50 percent of its original thickness the pressure shall be released, following which the sample shall return to not less than

85 percent of its original thickness within one hour. The pressure necessary for compression shall not exceed 350 pounds per square inch. The expansion joint shall show no indication of disintegration after the compression test.

Bituminous Premoulded Fiber Joint

General: The bituminous premoulded joint shall be of the dimensions shown on the plans or in the Specifications and shall be of fibre and bituminous composition of approved quality. A tolerance of 1/16 of an inch thickness will be permitted. The joint shall be of such character that it will not be deformed by ordinary handling during the hot summer months or become hard and brittle in cold weather. Thin strips of stiffener will be allowed. All joints shall be plainly stamped with the name of the manufacturer.

Physical Properties: The joint shall consist of cane or other suitable long fibers of a cellular nature and asphalt. The asphalt in the joint shall have penetration of not more than 120 (77°F.--100g.--5 sec.)

(a) Asphalt content: The asphalt content of the joint shall be between 35 and 50 percent by weight.

(b) Weight: The weight of the joint shall not exceed 40 lbs. per cubic foot.

(c) Absorption: When a specimen 2" x 6" cut from the joint material is immersed in water for 24 hours, it shall absorb not more than 15 per cent for 1 inch thick material, 20 per cent for 3/4 inch thick material, and 25 per cent for ½ inch and less thick material. All percentages are by weight.

(d) Brittleness: The bituminous premoulded joint shall not crack or shatter when subjected to the following tests: The sample to be tested, 2" x 6", is clamped between two boards so that the expansion joint cantilevers 3-1/2", same being held in any suitable support. A cast iron ball weighing 0.95 pound and having a diameter of 1.875 inches suspended by a cord which is tied to an eyelet soldered to the ball. For samples having a thickness of ½" and less, the ball is suspended one foot above the center of the projected portion of the specimen. For samples over ½" in thickness the ball is suspended 2 feet above the specimen. (The ball is released by burning the string above the eyelet.) The test is made on the sample after it has been maintained at a temperature of from 4° to 6°C. for at least 2 hours prior to testing.

(e) Distortion: The sample shall not show a deflection from horizontal of more than 1 inch subjected to the following test: The sample 2"x6" absolutely flat and straight is clamped between two blocks so that the expansion joint cantilevers 3.5 inches. The clamp, with the expansion joint, is then placed in an oven 125°F and left therein for 2 hours.

(f) Deflection: A section of the joint (full size) cantilevered 3 feet shall not deflect more than 3 inches in 30 minutes at a temperature of 77°F.

(g) Extrusion: A section of the joint 6"x 6" confined on three sides when compressed to one- half original thickness by a lead so applied as to produce a compression of 0.10" per minute shall not extrude more than one quarter (1/4") after being compressed for one (1) hour. When compressed as above the material shall not lose more than 2% by weight of the original weight of the sample tested.

The Engineer reserves the right to require samples of any or all materials used in the manufacture of the joint.

Sealing Expansion Joints

Where called for on the plans or directed by the Engineer, expansion joints shall be sealed with expansion joint compound in accordance with the State Department of Transportation Specifications.

Elastic Cement

Elastic cement shall conform to the requirements of Federal Specification SS-C-153.

Caulking Compound for Structures

(a) Material: Caulking compound shall be an approved gray elastic compound complying with the following tests:

(b) Strain Test: The joint to be tested shall be made between two slabs of limestone eight (8) inches by ten (10) inches by one (1) inch, one of which shall have a hole in the center about (1) inch in diameter. The slabs shall be spaced one-quarter (1/4) inch apart by a strip of metal one- quarter (1/4) inch by one-eighth (1/8) inch in cross section, bent to form a square of six and one- half (6 ½) inches on each side. This spacer is laid concentrically on one slab and the other slab is then placed on top so that the long side of one slab is then placed on top so that the long side of one slab is parallel to the short side of the other. the slabs to be caulked are clamped on the spacer and the caulking compound is forced in at the four edges, giving a joint one-quarter (1/4) inch thick, three -quarters (3/4) inch deep and a perimeter of thirty-two (32) inches around the outer edge of the joint. The specimen shall be cured at room temperature for thirty (30) days, after which the space between the slabs shall be filled with water through the hole in the center of the upper slab. The slabs shall be pulled apart by increments of approximately one-hundredth (.01) inch at ten (10) second intervals. The caulking compound shall stand a strain of at least five-hundredth (.05) inch before water starts to leak through the joint.

(c) Slump Test: A metal groove three-eighths (3/8) inch wide, three quarters (3/4) inch deep and four (4) inches long, shall be filled with caulking compound and placed in a vertical position for twenty-four (24) hours at room temperature and then transferred to an oven at fifty (50) degrees C. where it shall remain in a vertical position for twenty-four (24) hours. There shall be no appreciable slumping of the material under these conditions.

(d) Straining Test: A pat of caulking compound on limestone at room temperature shall show no objectionable stain within a period of twenty (20) days.

(e) Application: Caulking Compound shall be applied with either a pneumatic or ratchet hand gun. All surfaces in contact with caulking compound shall be primed with clear lacquer or shellac.

Poured Joints

Poured joints shall be formed by placing a temporary joint, shaped to the section, of a type and material approved by the Engineer, which shall afterward be removed and the joint immediately filled with acceptable sealant or filler material. Temporary metal wedge shaped joints may be used having 1/16 inches less thickness than specified on the plans. Temporary wood joints will not be permitted.

The pouring shall be done by means of a device acceptable to the Engineer and the pouring shall be manipulated in such a manner that the acceptable sealant or filler material shall not be spread over the surface for a width of more than One (1) inch on either side of the joint and care shall be taken in order that the acceptable sealant or filler material shall not be spilled on the exposed surface of adjacent curbs and structures.

Temporary joints shall be held securely in place by means of pins driven two (2) feet apart.

ARTICLE 13. REINFORCEMENT FOR CEMENT CONCRETE

Steel Bars: Reinforcing steel shall be of a quality and character meeting the requirements of the "Standard Specifications for Deformed and Plain Billet-Steel Bars for Concrete Reinforcement" of the American Society for Testing Materials, Serial Designation A 615, except that stirrups shall be Structural Grade. Each and every bar shall be rolled with a letter denoting the mill of origin, which shall be acceptable to the Engineer. All steel shall be subjected to such tests as prescribed in the A.S.T.M. Specifications. In addition, the Contractor shall furnish additional proof, such as mill records, that the steel meets the requirements stated herein.

All bar reinforcement for concrete shall be of open-hearth steel, rolled from new billets. No re- rolled material or cold twisted bars will be accepted.

All bars shall be "deformed" bars unless otherwise specified. The term "deformed bar" shall mean a reinforcing bar conforming to "Standard Specification for Deformed and Plain Billet- Steel Bars for

Concrete Reinforcement" of A.S.T.M. Designation A615, Grade 60 and Standard Specification for Zinc-Coated (Galvanized) Steel Bars for Concrete Reinforcement of A.S.T.M. Designation A767.

Table Showing Weights and Sizes of Steel Bars

Bar No. or Size Specified	Standard Weight (Lbs. Per Foot)	Bar No. or Size Specified	Standard Weight (Lbs. Per Foot)
2	0.167	7	2.044
3	0.376	8	2.670
4	0.668	1" Square	3.400
1/2" Square	0.850	1-1/8" Square	4.303
5	1.043	10	4.303
6	1.502	1-1/4 Square	5.313

Steel Fabric: Steel Fabric reinforcement shall consist of longitudinal main members with transverse members at right angles thereto. All points of intersection of the members shall be firmly connected in an approved manner.

Steel fabric shall meet the requirements given for cold drawn steel wire for concrete reinforcement in the Standard Specification for "Steel Wire, Plain, for Concrete Reinforcement" of A.S.T.M. Designation A 82-90a, except that samples shall be taken as directed by the Engineer.

All welded steel fabric shall meet the Standard Specification for "Steel Welded Wire Fabric, Plain, for Concrete Reinforcement" of the A.S.T.M. Designation A 185-90a.

ARTICLE 14. STRUCTURAL STEEL

All structural carbon steel, bolts, and steel billets shall conform to Standard Specification for "Structural Steel" of A.S.T.M. Designation A 36-90, supplemented by the following paragraphs:

Test specimens of structural steel shall show a fracture having a silky or fine granular structure throughout with a bluish gray or dove color, and shall be entirely free from granular, black and brilliant specks.

Finished rolled material shall be free from cracks, flaws, injurious seams, laps, blisters, ragged and imperfect edges, and other defects. It shall have a smooth, uniform finish and shall be straightened in the mill before shipment.

Material shall be free from loose mill scale, rust, pits, or other defects affecting its strength and durability.

Physical tests shall be required for billets bearing against, or functioning as, expansion rollers or rockers.

Rivet steel shall conform to the requirements of the Standard Specification for "Steel Structural Rivets" A.S.T.M. Designation A502-91.

ARTICLE 15. STEEL CASTINGS

Steel castings shall conform to the requirements of the Standard Specification for "Steel Castings, Carbon, for General Application" of the A.S.T.M. Designation A27, with the following additions:

Unless otherwise specified, all steel castings shall be Grade 65-35, fully annealed.

Test specimens shall show a fracture having a silky or fine granular structure throughout, easily machined and meet all chemical and physical requirements of this specification.

Castings shall be true to pattern, free from cracks, gas holes, flaws and excessive shrinkage. Large castings, if required by the Engineer, shall be suspended and hammered all over. No cracks, flaws or other defects shall appear after such treatment.

No sharp unfilleted angles or corners will be allowed.

One tension test and one bend test shall be made from each melt in each heat treatment charge and from each casting weighing five hundred (500) pounds or over.

ARTICLE 16. IRON CASTINGS

Iron castings shall conform to the requirements of the Standard Specification for "Gray Iron Castings" of A.S.T.M. Designation A-48 latest issue, Class 30, with the following additions:

Iron castings shall be true to pattern in form and dimensions, close and even grained, free from pouring faults, sponginess, cracks, gas holes and other defects in positions affecting their strength and value for the service intended.

Castings having blow holes plugged or filled with putty or cement of any kind will be rejected.

ARTICLE 17. STEEL FORGINGS

All carbon and alloy steel forgings from which pins, rollers, and other forged parts are to be made shall conform to the requirements of the Standard Specification for "Steel Forgings, Carbon and Alloy, for General Industrial Use" of A.S.T.M. Designation A 668, with the following additions:

Structural forgings shall be Class C carbon steel, unless otherwise, called for. Machinery forgings shall be Class C carbon steel, Class E carbon steel, or Class H nickel steel, as specified. All forgings shall be thoroughly annealed.

The yield point of Class C forgings shall be not less than 33,000 pounds per square inch.

The tensile requirements for forgings from 20 to 30 inches in diameter shall conform to the requirements for forgings 12 to 20 inches in diameter.

All forgings shall meet the bend test requirements of paragraph S3, supplementary requirements of Specification A668.

ARTICLE 18. DUCTILE IRON

Ductile iron castings shall conform to the requirements of the Standard Specification for Ductile Iron Castings of A.S.T.M. Designation A536. Foundry certificate, when required, will provide chemical and mechanical properties of test specimens. Tensile requirements shall be a minimum Grade 60-40-18 unless otherwise specified.

ARTICLE 19. CAST AND DUCTILE IRON PIPE

Cast iron pipe shall conform to the requirements of the Standard Specification for "Cast Iron Soil Pipe and Fittings" of A.S.T.M. Designation A74. Ductile iron pipe shall conform to the requirements of the Standard Specification for "Ductile Iron Gravity Sewer Pipe" of A.S.T.M. Designation A746 and shall be centrifugally cast. All cast iron pipe shall be marked in clear lettering with trade name of manufacturer, weight, class or nominal thickness.

ARTICLE 20. MALLEABLE CASTINGS

Malleable castings conform to the requirements of the Standard Specification for "Ferritic Malleable Iron Castings" of A.S.T.M. Designation A47, Grade 32510.

Malleable castings shall be true to pattern in form and dimensions, close and even grained and free from pouring faults, sponginess, cracks, gas holes and other defects in locations affecting their strength and value for the service intended.

The castings shall be boldly filleted at angles, and the arises shall be sharp and perfect. The surfaces shall have a workmanlike finish.

Particular care shall be exercised so as not to embrittle malleable castings when galvanizing. All galvanized malleable castings shall meet specification requirements after galvanizing.

ARTICLE 21. ROLLED PHOSPHOR BRONZE

Rolled Phosphor-Bronze shall conform to the Standard Specification for "Rolled Copper-Alloy Bearing and Expansion Plates and Sheets for Bridge and Other Structural Uses" of A.S.T.M. Designation B-100.

ARTICLE 22. BRONZE CASTINGS

Bronze for machinery parts shall conform to the requirements of the Standard Specification for "Bronze Castings for Bridges and Turntables" of A.S.T.M. Designation B-22, with the following modifications:

Bronze shall not contain sulphur. The phosphorous shall be introduced in the form of phosphor- tin or in phosphor-copper. The alloy shall be cast into ingots and allowed to cool, and the castings shall be poured from the re-melted ingots. The chemical analysis of each heat shall be furnished.

Cracks or other evidence of excessive brittleness in compression test specimens after test may be cause for rejection. The hardness of the finished castings shall be tested by the Brinell ball method and a record of the test furnished. The ball shall be of hardened steel, 10 millimeters in diameter, and the load shall be 500 kilograms. The load shall be applied for 30 seconds to a finished plane surface. At least two Hardness tests shall be made upon each heat. A test shall be made on each trunnion bearing.

Test specimens shall be made from coupons which are a part of the casting and which have been fed and cooled under the same conditions as the casting.

At least one compression test shall be made from each melt from grades A, B, and C; and one compression and one tension test for grade D. For castings weighing over 100 pounds, finished, the prescribed tests shall be made for each casting. The permanent set in inches under 50,000 pounds per square inch shall be recorded for grades A, B, C, and D.

Bronze castings shall be free from inclusions of foreign material, casting faults, injurious blow holes or other defects rendering them unsuitable for the service intended.

Certain small bearings, where called for on the Plans, shall be equipped with self-lubricating bronze bushings. The bronze shall conform to the requirements given above and shall be equal to Grade "C". Holes shall be drilled into the bearing surfaces of these bushings in a regular pattern to cover the entire surface of the rotating parts. After the bushings have been machined to the proper tolerances, the holes shall be filled with metal and graphite lubricating inserts applied under a pressure of 20,000 lbs. per square inch. These bushings shall be equal to the Lubrite bearings manufactured by Merriman Brothers, Boston, Mass.

ARTICLE 23. WELDING

All welding shall be done by the electric arc method or other approved method and the welding operators shall be experienced in this particular class of work.

Preparation: Surfaces to be welded shall be reasonably cleaned by wire brushing, chipping or hammering of loose scale, rust, paint or other foreign matter; except that a thin coating of linseed oil need not be removed before welding.

During welding, the parts to be welded shall be held by sufficient clamps or other adequate means to keep them straight and in close contact.

Electrodes: Wires used for electrodes or welding rods shall be an approved covered commercial steel wire made for this purpose, of uniform homogeneous physical structure, free from irregularities in surface, from hardness, segregation, foreign matter, oxides, pipes, seams, or other defects.

Either the recommendations of the electrode manufacturer, or information based on the tests of the same kind of electrodes with the same kind of current shall be used in determining the range of current values for each electrode size.

Welding: In any respect not covered by the above provisions the work shall conform to the specifications for Design Construction Alteration and Repair of Highway and Railway Bridge Fusion Welding of the American Welding Society, 1941.

Welds: All slag shall be removed from finished welds and they shall show uniform section, smoothness of weld metal, feather edges without overlaps and freedom from porosity and clinkers. Visual inspection at edges and ends of fillets and butt joint welds shall indicate good fusion with, and penetration into, base metals.

ARTICLE 24. GALVANIZED METAL

Where called for in the itemized specifications, iron such as screw bolts, nuts, washers and bolts or equal, spikes, pipes, etc., shall be galvanized. All screw bolts and nuts must be threaded before galvanizing.

Before galvanizing all iron shall be thoroughly cleaned of all scale, rust, dirt, grease, etc., by first bathing it in a solution of sulfuric acid, then dipping it in turn in lukewarm water and in a strong solution of muriatic acid.

All galvanized articles must stand the following test. After eight one-minute immersions in a standard solution of copper sulphate, the article being thoroughly wiped after each immersion, there shall be no copper deposit observed. Lots, the samples of which do not stand this test, may be rejected. This test shall be performed in accordance with Standard Test Method for "Weight of Coating on Zinc-Coated (Galvanized) Iron or Steel Articles" of A.S.T.M. Designation A-90. Certificates of Tests may be accepted.

ARTICLE 25. COPPER

Sheet copper shall be either hot or cold rolled and shall be free from bad edges and corners and all surface defects. It shall be clean, of uniform and quality, true to gauge and patent leveled. It shall be free from sulphur and other detrimental impurities and contain a minimum of ninety-nine and one-half (99 ½) per cent pure copper and shall conform to the requirements of the Standard Specification for "Copper Sheet, Strip, Plate, and Rolled Bar" of A.S.T.M. Designation B152.

ARTICLE 26. WATERPROOFING MATERIAL

Asphalt and coal tar pitch shall be chemically inert, impervious to or unaffected by water or by alkalies in acids or cinders. They shall form, without the use of primer, a permanent, tenacious, mechanical bond, not only to the fabric and concrete to which it is applied but also the concrete poured against it.

Coal tar pitch shall be homogeneous, high carbon coal tar pitch and shall conform to the requirements of the Standard Specification for "Coal-Tar Pitch Used in Roofing, Dampproofing, and Waterproofing" of A S.T.M. Designation D450.

Asphalt shall be a tough asphaltic bitumen derived from an asphaltic petroleum by careful refining. It shall not be a fluxed or cut-back product, and shall be free from coal tar and any of its derivatives.

Asphalt shall be homogeneous, free from water and shall conform to the requirements of Standard Specification for "Asphalt Used in Dampproofing and Waterproofing" of A.S.T.M. Designation D449.

Asphalt and pitch shall be delivered on the work in packages that are plainly marked with the manufacturer's brand and indicating the grade and quality of the material.

Waterproofing felt shall be a roofing felt produced by "felting" vegetable and animal fibers. The surface of the felt shall be uniformly smooth and upon splitting or tearing on the bias, shall appear reasonably free from lumps and unbeaten stock (i.e., stock which has not been beaten or shredded into fiber in the process of manufacture) and particles of foreign substances (i.e., fragments of stone, metal, leather, rubber, straw, wood, etc.).

The desaturated felt shall conform to the following requirements:

Weight of Moisture-Free Desaturated Felt-Minimum five and two-tenths (5.2) lbs. per hundred (100) sq. ft. ("Number" 25).

Ash in Moisture -Free Desaturated Felt-Maximum Ten (10%) per cent.

The saturant for the felt shall be composed of coal tar from which the highly volatile constituents have been removed.

In the process of manufacture, a single thickness of dry roofing felt shall be saturated with the saturant.

The felt shall be thoroughly and uniformly saturated and shall show no unsaturated spots at any point upon cutting two (2) inch strips at random across the entire sheet and splitting them open for their full length.

The fabricated bituminized felt shall conform to the Standard Specification for "Coal-Tar- Saturated Organic Felt Used in Roofing and Waterproofing" of A.S.T.M. Designation D227.

ARTICLE 27. CONCRETE AND MASONRY

Material

Concrete shall consist of Portland cement, fine aggregate, and a coarse aggregate mixed in the proportions specified for the various classes given. The same brand of cement, and the same kind of aggregate shall be used throughout the whole of any showing face.

Proportions

All concrete shall be made of Portland cement, fine and coarse aggregate proportioned as indicated under its respective item.

The proportions of aggregate to cement for any concrete shall be such as to produce a mixture which will work readily into the corners and angles of the forms and around reinforcement with the method of placing employed on the work, but without permitting the materials to segregate or excess free water to collect on the surface. The combined aggregates shall be of such composition of sizes that when separated on the No.4

standard sieve, the weight passing the sieve (fine aggregate) shall not be less than thirty percent nor greater than fifty percent of the total, unless otherwise approved by the Engineer.

The methods of measuring concrete materials shall be such that the proportions can be accurately controlled and easily checked at any time during the work.

a. Plain Concrete: Plain concrete shall have a minimum cement factor of five bags per cubic yard of concrete, and a maximum of eight and one-half U.S. gallons of water per bag of cement including water contained in the aggregate. Such concrete shall develop a strength of at least two thousand pounds per square inch when tested in accordance with the Standard Test Method for "Compressive Strength of Cylindrical Concrete Specimens" of A.S.T.M. Designation C39.

b. Average Concrete: Proportions and Twenty-Eight Day Strengths

The producer of average concrete shall use mix proportions and water cement ratios which have been shown by previous use to produce satisfactory concrete of the required strength at a suitable slump with a maximum of four inches for heavy slabs and five inches for walls and footings. Average concrete shall be limited to the concrete strengths shown in Table "A" below, and the cement factor used shall not be less than the value given in the table for the corresponding concrete strengths.

Table A

Minimum compressive strength in 28 days (f'c) pounds per square inch	Minimum bags of cement per cubic yard of concrete	Maximum permissible water cement ratio, U.S. Gallons per 94-pound sack of cement for air-entrained concrete
3200	6.0	6-1/4

Each load of concrete shall be certified by the producer, whether produced at ready mix plant or site mixed, as to the concrete strength and actual quantities per cubic yard of each material, including water, contained therein.

c. Controlled Concrete: Proportions and Twenty-Eight Day Strengths

The strength of all controlled concrete shall be established in accordance with the following provisions:

Preliminary tests of controlled concrete. (a) Job site, weighed, batched and mixed concrete. Preliminary tests of controlled concrete shall be made by an approved testing laboratory, in advance of the beginning of operations, using the materials proposed and consistencies as hereinafter specified, and tested wet in accordance with the standard method of test for compressive strength of molded concrete cylinders, Standard Test Method for "Compressive Strength of Cylindrical Concrete Specimens" of A.S.T.M. Designation C39, including tests of fine and coarse aggregated and the provisions therein for curing in a moist room of seventy (70°) degrees Fahrenheit. A curve representing the relation between the average strength of the concrete at twenty-eight days, or at earlier periods, and the water cement ratio shall be established for a range of values including all of the strengths and ages called for the plans. The tests shall include at least four different water cement ratios, and at least four specimens for each water cement ratio. The mixes used in the tests shall have a slump of five inches, with a tolerance of plus or minus one inch. The water cement ratio to be used in the structure shall be the corresponding to a point on the curve established by these tests, representing a strength of concrete fifteen per cent higher than the minimum ultimate strength called for on the plans. The cement factor used in the work shall have at least the value established by the tests, but shall not be less than the factor given in Table "B" below for the corresponding concrete strength.

Table B

Minimum compressive strength in twenty- eight days (f'c) pounds per square inch	Minimum bags of cement per cubic yard of freshly mixed concrete
2000	5.00
2500	5.25
3000	5.75
3200	6.00
3500	6.50
3750	6.75
4000	7.00
5000	7.50

Sampling

During the progress of the work, samples of concrete shall be taken directly from the mixer in accordance with Standard Method of "Sampling Freshly Mixed Concrete" of A.S.T.M. C172. Each sample shall be tested for slump, air content, temperature and weight per cubic foot in accordance with Standard Test Method for "Unit Weight, Yield, and Air Content (Gravimetric) of Concrete" of A.S.T.M. C138 and Standard Test Method for "Slump of Hydraulic Cement Concrete" of A.S.T.M. C143. If the measured slump or air content falls outside the limits specified, a check sampling shall be made immediately on another portion of the same sample. In the event of a second failure, the concrete shall be considered to have failed to meet the requirements.

If the time required to discharge the load being sampled is greater than 15 minutes, a separate set of test cylinders shall be made from each one-third portion of the load taken at a greater interval than 15 minutes.

Molding Standard Test Acceptance Cylinders

For each class of concrete placed on any one day, three standard acceptance cylinders shall be made from the sampling described above for each fifty cubic yards or fraction thereof placed. These specimens shall be molded, stored for 24 hours, carefully transported to an approved testing laboratory and cured for 27 days in accordance with Standard Practice for "Making and Curing Concrete Test Specimens in the Field" of A.S.T.M. Designation C31.

Additional specimens for determining when forms may be stripped or a structure may be put to use may also be required. These field cylinders shall be removed from their molds after 24 hours, stored and cured on the work site as near to the sampled concrete in the structure as possible, and subject to the same exposures as the job concrete of which it is representative. These field cylinders shall be kept unmolested on the structure for at least three-fourths of the test period before being taken to the laboratory for testing.

The specimens shall be marked and identified with tags on which shall be noted the class of concrete, date and time of day when molded, the delivery receipt and truck number if ready- mixed, the results of the tests of slump, air content and temperature, and a clear description of where the concrete was placed in the structure. The date of arrival at the testing laboratory also shall be noted thereon.

Compression Tests

Twenty-eight days after the specimens were molded the three acceptance cylinders shall be tested in compression in accordance with Standard Test Method for "Compressive Strength of Cylindrical Concrete

Specimens" of A.S.T.M. Designation C39. by a testing laboratory designated by the Engineer. The test strength shall be the average of the breaking strengths of the three acceptance cylinders. If one of the molded specimens shall show manifest evidence of improper sample, molding, handling or testing, it shall be discarded and the remaining two averaged. If more than one cylinder must be discarded, the entire test shall be discarded. In no case shall a given class of concrete be represented by less than three separate samplings and three compression test strengths.

When the average strength of the test cylinders falls consistently below the minimum ultimate strength required by the design, a change in the proportions or water content of the concrete shall be made, to obtain the required strength for the remaining portion of the structure.

When the average strength of the test cylinders for any portion of the structure is less than that required by the design, the concrete represented by such cylinders may be considered to be of adequate strength if: (1) the designer of the structure submits a correct analysis of stresses to show that the stresses in the portion of the structure affected will not exceed the allowable stresses, with the value of f'c equal to the compressive strength of the concrete as determined by the tests; or (2) if the tests are performed in accordance with the specifications for the Standard Test Method for "Obtaining and Testing Drilled Cores and Sawed Beams of Concrete" of A.S.T.M. C42 using hardened concrete for compressive and flexural strengths, and the tests show that the strength of the concrete equals or exceeds the design strength, and provided test specimens are obtained from the structure in such manner that the strength of the structure is not impaired; or (3) the structure may be considered to meet the designated requirement if load tests are performed as specified in Section 27-607 "Inspections" of the New York City Local Law 65-1990, Article 5, for that portion of the structure where the concrete of questionable strength has been placed and the results and interpretation of such tests and the resulting safe capacity of the structure are approved by the Engineer.

Arrangements for tests of concrete, concrete materials and reinforced concrete structures where required by the provisions of this article or ordered by the Engineer shall be made by the Contractor. All such tests shall be made without additional expense to the City.

Mixing and Placing Concrete

Preparation of equipment and place of deposit: Before concrete is placed, all equipment for mixing and transporting the concrete shall be cleaned, all debris and ice shall be removed from the spaces to be occupied by the concrete, forms shall be thoroughly wetted or oiled masonry filler units that will be in contact with concrete shall be well drenched and the reinforcement shall be thoroughly cleaned of ice or other coatings. Water shall be removed from place of deposit before concrete is placed unless otherwise permitted by the Engineer.

Mixing of concrete: All concrete shall be mixed until there is a uniform distribution of the materials and shall be discharged completely before the mixer is recharged.

Hand mixing will not be permitted in any structure.

Machine Mixing

Batch mixers of an approved type and of not less than 7S-AGC rating shall be used. No continuous mixer shall be used. Mixing shall be continued for at least one and one- quarter (1 1/4) minutes after all the materials and water are in the mixer drum, at a speed of not less than 14 or more than 20 revolutions per minute.

When cement is delivered in bags for use in any item, the batch shall be so proportioned as to use only full batches (i.e.) no fraction of a bag will be permitted.

Mixing shall be continued for at least one and one-half (1 ½) minutes after all the solid materials and water are in the mixer drum.

In all machine mixing the batches of concrete shall be proportioned to the size of the mixer to produce the best results.

For batches larger than one (1) cubic yard, mixing time shall be increased fifteen (15) seconds for each additional cubic yard or fraction thereof.

Retempering
All mortar and concrete shall be used while fresh and before it has begun to harden. Any mortar or concrete which has begun to harden shall be removed and not used in the work. No retempering of mortar or concrete shall be allowed.

Central Mixing
Concrete may be mixed in an approved central plant provided it is hauled to the work in an approved rotating container under the following provisions:

1.) Mixing time shall not be less than three (3) minutes.

2.) Not more than thirty (30) minutes shall elapse between batching and placing.

3.) Not more than ten (10) minutes shall elapse between placing of consecutive batches.

4.) The rotating container shall be thoroughly cleaned after each batch.

The concrete will be rejected if there is any evidence of "setting up" in the mixture.

Transit Mixing
Concrete may be mixed in approved transit mixers under the following provisions:

The water shall be added to the mix not more than 10 minutes previous to its discharge from the mixer. Water shall not be added while trucks are in transit.

Mixing time shall not be less than five (5) minutes, nor less than one and a half (1 ½) minutes for each cubic yard contained.

Not more than ten (10) minutes shall elapse between placing of consecutive batches.

Concrete is to be mixed in accordance with the Standard Specification for "Ready-Mixed Concrete" of A.S.T.M. Designation C94.

Conveying
Concrete shall be conveyed from the mixer to the place of final deposit by methods which will prevent the separation or loss of materials.

Equipment for chuting, pumping and pneumatically conveying concrete shall be of such size and design as to insure a practically continuous flow of concrete at the delivery end without separation of materials.

Consistency
As a guide to the consistency required, the range in slump shall be as shown in the following table:

Slump

Type of Construction	Slump in Inches - Minimum	Slump in Inches - Maximum
Pavements	1-1/2	3
Floors, Massive Section, Heavy Slabs	1	4
Pavement Bases, Sidewalks	1-1/2	4
Walls, Beams, Columns	2	5

In general, the consistency of concrete mixture shall be such that:

1. The mortar clings to the coarse aggregate.
2. The concrete is not sufficiently fluid to segregated when transported to the place of deposit.
3. The concrete, when dropped directly from the discharge chute of the mixer, shall flatten out at the center of the pile but shall stand up and flow at the edges.
4. The mortar shall show no free water when removed from the mixer.
5. The concrete shall settle into place when deposited in the forms and, when transported in metal chutes at an angle of 30 degrees with the horizontal, it shall slide and not flow into place.
6. The upper layer of the set concrete shall show a cement film upon the surface but shall be free from laitance.

Depositing

Concrete shall be deposited as nearly as practicable in its final position to avoid segregation due to rehandling or flowing. The concreting shall be carried on at such a rate that the concrete is at all times plastic and flows readily into the spaces between the bars. No concrete that has partially hardened or been contaminated by foreign materials shall be deposited on the work, nor shall retempered concrete be used.

When concreting is once started, it shall be carried on as a continuous operation until the placing of the panel or section is completed. The top surface shall be generally level.

All concrete shall be thoroughly compacted by suitable means during the operation of placing and shall be thoroughly worked around the reinforcement and embedded fixtures and into the corners of the forms.

Where conditions make compacting difficult, or where the reinforcement is congested, batches of mortar containing the same proportions of cement to sand as used in the concrete, shall first be deposited in the forms to a depth of at least one inch.

Construction Joints

Construction joints other than those shown on the plans will not be permitted without the written permission of the Engineer. The operation of placing concrete shall be continuous between construction joints.

The use of long chutes for conveying concrete from the mixing plant to the forms will be permitted only on written authority from the Engineer. If chutes are allowed and the quality of concrete as it reaches the forms or the methods of placing or working it therein are not satisfactory, the Contractor shall, upon orders from the Engineer, discontinue the use of chutes and reequip his plant for placing the concrete in a satisfactory manner. Under no conditions shall this system be used on work exposed to the effects of salt or brackish water.

Troughs, pipes or short chutes used as aids in placing concrete shall be arranged and used in such a manner that the ingredients of the concrete are not separated. Where steep slopes are required the chutes shall be equipped with baffle boards or be in short lengths that reverse the direction of movement. When pipes are used they shall be kept full of concrete and have their lower ends kept buried in fresh concrete in the same manner that a tremie is used. All chutes, troughs and pipes shall be kept clean and free from coatings of hardened concrete by thoroughly flushing with water after each run. Water used for flushing shall be discharged clear of concrete in place. Open troughs and chutes shall be of either of metal or metal lined and shall extend as nearly as possible to the point of deposit. When the discharge must be intermittent, a hopper or other device for regulating the discharge shall be provided.

Dropping the concrete a distance of more than 5 feet or depositing a large quantity at any point and running or working it along the forms will not be permitted.

Special care shall be taken to fill each part of the forms by depositing concrete directly as near final position as possible, to work the coarser aggregates back from the face and to force the concrete under and around

the reinforcement bars without displacing them. After the concrete has taken its initial set, care hall be exercised to avoid jarring the forms or placing any strain on the ends of projecting reinforcement.

Concrete shall be compacted by continuous working with a suitable tool in a manner acceptable to the Engineer. Slab and girder work, arch ribs and all thin section work shall be thoroughly worked with a steel slicing rod.

In order to secure a smooth, even surface on the exposed surfaces of concrete structures, fine stone forks or spades shall be used to work the coarser aggregate back into the mass and allow the mortar and fine particles to occupy the space adjacent to the forms.

Unless otherwise directed in the itemized specifications, concrete shall be thoroughly compacted during and immediately after depositing by vibrating the concrete internally by means of mechanical vibrating equipment.

Internal mechanical vibrators shall be of a type to be approved by the Engineer. They shall be of sturdy construction, adequately powered, capable of transmitting vibration to the concrete in frequencies of not less than 5000 impulses per minute and shall produce a vibration of sufficient intensity to cause flow or settlement of the concrete into place without a separation of the ingredients.

The vibratory element shall be inserted into the concrete at the points of deposit and in the areas of freshly placed concrete. The time of vibration shall be of sufficient duration to accomplish through consolidation, complete embedment of the reinforcement, the production of smooth surfaces free from honeycombing and air bubbles, and to work the concrete into all angles and corners of the form. However, over vibration shall be avoided and vibration shall continue in a spot only until the concrete has become uniformly plastic and shall not continue to the extent that pools of grout are formed.

The length of time of vibration depends upon the frequency of the vibration (impulses per minute), size of the vibrators and the slump of the concrete; and this length of time be determined in the field.

The internal vibrators shall be applied at points uniformly spaced not further apart than the radius over which the vibration is visibly effective and shall be applied close enough to the forms to effectively vibrate the surface concrete. The vibration shall not be dissipated in lateral motion but shall be concentrated in vertical settlement in consolidation of the concrete.

The vibrator shall not be used to push or distribute the concrete laterally. The vibrating element shall be inserted in the concrete mass sufficient depth to vibrate the bottom of each layer effectively, in as nearly vertical position as practicable. It shall be withdrawn completely from the concrete before being advanced to the next point of application.

To secure even and dense surfaces, free from aggregate pockets or honeycomb, vibration shall be supplemented by working or spading by hand in the corners and angles of forms and along form surfaces while the concrete is plastic under the vibratory action.

A sufficient number of vibrators shall be employed so that at the required rate of placement, thorough consolidation is secured throughout the entire volume of each layer of concrete. Extra vibrators shall be on hand for emergency use, and for use when other vibrators are being serviced.

The use of surface vibrators to supplement internal vibration will be permitted when satisfactory surfaces cannot be obtained by the internal vibration alone and when the Contractor has obtained the approval of the Engineer of the equipment to be used. Surface vibrators shall be applied only long enough to embed the coarse aggregate and to bring enough mortar to the surface for satisfactory finishing.

The use of approved form vibrators will only be permitted when it is impossible to use internal or external vibrators. When permitted, they shall be attached to or held on the forms in such a manner as to effectively transmit the vibration to the concrete and so that the principle path of motion of the vibration is in a horizontal plane.

All exposed edges of concrete and exposed joints shall be chamfered one inch, unless otherwise shown or noted.

Concrete shall be placed in continuous horizontal layers, the thickness of which generally shall not exceed 10 to 12 inches. When it is necessary by reason of an emergency to place less than a complete horizontal layer at one operation, such layer shall terminate in a vertical bulkhead. In any given layer the separate batches shall follow each other so closely that each one shall not be injured and that there shall be no line of separation between the batches. Each layer of concrete shall generally be left somewhat rough to secure efficient bonding with the next layer above. A succeeding layer placed before the underlying layer has become set shall be compacted in a manner that will entirely break up and obliterate that tendency to produce a construction joint between the layers.

Layers completing a day's work or placed just prior to temporarily discontinuing operations shall generally be cleaned of all objectionable material as soon as the surface has become sufficiently firm to retain its form. To avoid visible joints as far as possible upon exposed faces, the top surface of the concrete adjacent to the forms shall be finished by being smoothed with a plaster mason's trowel.

Horizontal layers so located as to produce a construction joint at a location wherein a "feather edge" might be produced in the succeeding layer, shall be so formed by inset form work that the succeeding layer will end in a body of concrete having a thickness of not less than six (6") inches.

After the concrete has begun to harden, it shall not be walked upon in less than twelve hours. The operation of compacting the concrete shall be conducted so as to form a compact, dense, impervious artificial stone which shall show a smooth face on an exposed surface. The weight of rammers, if used, shall be satisfactory to the Engineer. Porous, plastered or defective concrete shall be removed and replaced, as directed by the Engineer, entirely at the Contractor's expense.

Concrete shall not be exposed to the action of water before setting, or deposited in water, except with the approval of the Engineer and under his immediate supervision.

The method and manner of placing shall be as hereinafter designated.

Concrete deposited under water shall be carefully placed in a compacted mass in its final position by means of a tremie, a closed bottom dump bucket or other approved method and shall not be disturbed after being deposited. Special care must be exercised to maintain still water at the point of deposit. No concrete shall be placed in running water and all form work designed to retain concrete under water shall be water-tight. The consistency of the concrete shall be carefully regulated and special care shall be exercised to prevent segregation of the materials. The method of depositing concrete shall be so regulated as to produce approximately horizontal surfaces.

When a tremie is used, it shall consist of a tube having a diameter of not less than 10 inches, constructed in sections having flange couplings fitted with gaskets. The means of supporting the tremie shall be such as to permit the free movement of the discharge and over the entire top surface of the work and shall be such as to permit it to be rapidly lowered when necessary to choke off or retard the flow. The discharge end shall be entirely sealed at all times and the tremie tube kept full to the bottom of the hopper. When a batch is dumped into the hopper the tremie shall be slightly raised, but not out of the concrete at the bottom, until the batch discharges the bottom of the hopper. The flow is then stopped by lowering the tremie. The flow shall be continuous and in no case shall be interrupted until the work is complete.

When concrete is placed by means of a bottom dump bucket, the bucket shall have a capacity of not less than ½ cubic yard. The bucket shall be lowered gradually and carefully until it rests upon the concrete already placed. It shall then be raised very slowly during the discharge travel, the intent being to maintain as nearly as possible, still water at the point of the discharge and to avoid agitating the mixture.

Bonding Construction Joints: In joining fresh concrete to concrete that has already set, the work already in place shall have its surface raked out over thoroughly with a suitable tool to remove all

loose and foreign material. This surface shall then be washed and scrubbed with wire brooms and thoroughly drenched.

It shall remain moist until the new concrete is placed. Immediately prior to the placing of the new concrete, all forms shall be drawn tight against the concrete already in place and the old surface shall be thoroughly coated with a very thin coating of neat cement.

In order to bond successive courses, suitable keys shall be formed at the top of the upper layer of each day's work and at other levels where work is interrupted. These keys shall occupy about one-third of the area of the joint unless otherwise noted on the plans and be formed with beveled wood forms which shall be thoroughly saturated with water prior to placing. Rough stone or steel dowels may be used in lieu of keys if so permitted by the Engineer in writing. The size and spacing of keys and dowels shall be as determined by the Engineer.

In construction joints exposed to view or in other construction joints where seepage of water is particularly objectionable, a metal baffle strip of 16- ounce copper, shall be inserted. This strip shall be placed not less than three (3) inches from the unexposed face of the concrete a distance of not less than two (2) inches.

Forms and Detail of Construction

Design and construction of forms: The design and construction of forms shall conform to the following requirements: Forms shall conform to the shape, lines and dimensions of the member as called for on the plans. Forms shall be substantial and sufficiently tight to prevent leakage of mortar; and shall be properly braced or tied together so as to maintain position and shape and insure safety to workmen and passerby. Temporary openings shall be provided where necessary, to facilitate cleaning and inspection immediately before depositing concrete.

Where the height of the shores exceeds ten feet, adequate diagonal bracing shall be provided in both longitudinal and transverse directions. In addition, adequate diagonal braces shall be provided at the ends of the framework. Diagonal bracing shall extend from the top of the bottom of shores.

The unbraced length of wood shores supporting forms shall not exceed fifty times the least dimension. Metal shores or frames shall be types approved by the Engineer and shall be installed in accordance with his approval. Shores shall be adequately secured at the top and shall be properly wedged at top or bottom, if required.

Where shores rest upon the ground, adequate mud sills, or other bases, shall be provided to support the shores adequately.

Qualified workmen shall be detailed constantly during the placing of concrete to insure that there is no movement of shores, braces or other supports. The name of the foreman in charge of the form work shall be posted in the field office of the contractor.

The individual firm or corporation who does the concrete work shall be responsible for the adequate design and construction of all forms used in the construction of the building. Wherever the shore height exceeds fourteen feet, or the load on the forms exceeds one hundred fifty pounds per square foot, or power buggies are used, or two stage shores are used, the contractor shall certify that the form design has been checked and approved as adequate by a licensed professional engineer who has had at least five years of experience as a structural engineer, and that the forms have been constructed in conformance with the design which was checked and approved by the said engineer.

Detailed plans for false work or centering shall be supplied to the Engineer on request, but his approval of them, or acquiescence in the work constructed according to them, will not relieve the Contractor of responsibility for satisfactory results. For calculating the strength of false work or centering, a weight of 150 pounds per cubic foot shall be assumed for green concrete.

In general, false work which cannot be founded upon a solid footing, shall be supported by false work piling. False work piling shall be spaced and driven as ordered by the Engineer. No extra compensation for false work or false work piling will be allowed, such work being considered as part of the form work.

The Engineer may require the contractor to employ screw jacks or hardwood wedges in connection with the centering or false work in order to take up any slight settlement in the form work either before or during the placing of concrete.

Falsework shall be set to give the structural camber indicated on the plans or as specified, plus allowance for shrinkage and settlement.

Any metal ties or anchorages which are required within the forms to hold them to correct alignment and location shall be so constructed that the metal work can be removed to a depth of at least 2 inches from the face surface by spalling or otherwise. Wire ties will not be permitted without written permission of the Engineer. In case wire ties are permitted, all wires upon removal of the forms, shall be cut back at least 1/4 inch from the face of the concrete with sharp chisels or nippers. Nippers are necessary for green concrete.

All cavities produced by the removal of metal ties shall be carefully fitted with a mortar of fine aggregate and cement in the proportion that has been employed for the particular class of concrete treated and the surface left smooth and even and uniform in color. The surface film of all such pointed surfaces shall be carefully removed before setting occurs.

All forms shall be set and maintained true to the line designated until the concrete is sufficiently hardened. In general, form work shall remain in place, after placing of concrete, for the approximate periods hereinafter specified under "Removal of Forms."

For narrow walls where access to the bottom of the forms is not readily attainable otherwise, the lower form boards shall be left loose so that they may be removed for cleaning out all chips, dirt, sawdust or other extraneous material immediately prior to placing concrete.

Forms reused shall be maintained at all times in good conditions as to accuracy of shape, strength, rigidity, water tightness and smoothness of surface. Any warped or bulged lumber must be carefully resized before being reused. Forms unsatisfactory in any respect shall not be used, and, if condemned, it shall be removed immediately from the work.

For parapets or balustrades and the exposed faces of girders, arch ribs, copings, etc., forms shall be treated with an approved oil. All other forms shall be treated with approved oil; or thoroughly drenched and saturated with water on both faces immediately before concrete is placed therein. Any material that will stick to or discolor the concrete shall not be used.

The foregoing specifications as regards design, mortar, water tightness, filleted corners, beveled projections, bracing, alignment, removal, reuse and oiling, shall apply with equal force to Metal Forms. The metal used for forms shall be of such thickness that the forms remain true to shape. All bolt and rivet heads shall be counter-sunk. Clamps, pins or other connecting devices shall be designed to hold the forms rigidly together and to allow removal without injury to the concrete. Metal forms which do not present a smooth surface or line up properly shall not be used. Special care shall be exercised to keep metal forms free from rust, grease or other foreign matter such as will tend to discolor the concrete.

The time of removal of forms shall be subject to the approval of the Engineer.

Except on side faces to be surface finished, the following table may be used as a guide for the minimum time required before the removal forms, not counting the days in which the temperature is below 40 degrees Fahrenheit.

Minimum Periods (in Days) for Removing Forms for Different Cement Items

Cement Item	Number of Days
Arch Centers*	15 - 20
Centering under beams	10 - 15
Floor slabs	7 - 13
Columns	5
Walls, sides of beams and all other parts	3

*** Arch centering shall be removed in such a manner as to insure the complete safety of the structure.**

Forms shall be removed in such a manner as to insure the complete safety of the structure. Where the structure as a whole is supported on shores, beam and girder sides, column and similar vertical forms may be removed after twenty-four hours or when the concrete is sufficiently hard not to be injured thereby. In no case shall the supporting forms or shoring be removed until the members have acquired sufficient strength to support safely their weight and the load thereon.

Reinforcement

Cleaning and Bending reinforcement: Metal reinforcement, at the time concrete is placed, shall be free from loose rust scale or other coatings that will destroy or reduce the bond. All bars shall be bent cold. Reinforcement shall be formed to the dimensions indicated on the plans before it is embedded in the concrete.

Placing Reinforcement

Metal reinforcement shall be accurately placed, spaced and adequately secured in position by concrete or metal chairs or spacers. The clear distance between parallel bars, except in columns, shall be not less than the nominal diameter of the bars, one and one-third times the maximum size of the coarse aggregate, nor one inch. Where reinforcement in beams or girders is placed in two or more layers, the clear distance between layers shall not be less than one in., and the bars in the upper layers shall be placed directly above those in the bottom layer.

Splices in Reinforcement of Slabs, Beams and Girders

In slabs, beams and girders, splices of reinforcement at points of maximum stress shall be avoided wherever possible. Such splices where used shall be welded, lapped or otherwise fully developed, but in any case, shall transfer the entire stress from bar to bar without exceeding the allowable bond and shear stresses. The minimum overlap for a lapped splice shall be twenty-four bar diameters, but not less than twelve inches for bars. The clear distance between bars shall also apply to the clear distance between a contact splice and adjacent splice or bars.

Concrete Protection for Reinforcement

The reinforcement of footings and other principal structural members in which the concrete is deposited against the ground shall have no less than three inches of concrete between it and the ground contact surface. If concrete surfaces after removal of the forms are to be exposed to the weather or be in contact with the ground, the reinforcement shall be protected with not less than two-inches of concrete for bars larger than No. 5 and one and one-half inches for No. 5 bars or smaller.

The concrete protective covering for reinforcement at surfaces not exposed directly to the ground or weather shall be not less than three-quarters of an inch for slabs and walls; and not less than one and one-half inches for beams and girders, and two inches for columns. In concrete joist floors in which the clear distance between joists is not more than thirty inches, the protection of reinforcement shall be at least three-quarters of an inch.

Concrete protection for reinforcement shall in all cases be at least equal to the diameter of the bars.

Exposed reinforcing bars intended for bonding with future extension shall be protected by an anti- corrosive coating or other adequate covering.

Provision for Concreting in Cold Weather

No concrete shall be placed when the atmospheric temperature is below 40 degrees Fahrenheit unless permission to do so is granted in writing by the Engineer. In order to receive written approval, the Contractor must submit the concrete mix design and method of installation to assure that the concrete will not freeze until it attains a compressive strength of 500 psi.

Acceptable methods include, but are not limited to the following:

1. Provide protection against freezing for at least five (5) days after the concrete is installed. Acceptable protection includes, but is not limited to, heated enclosures, polystyrene foam sheets, insulation blankets, and polyethylene sheeting.
2. Amend the concrete mix design to achieve high early strength. Examples of acceptable amendments: Type III cement in lieu of Type II or concrete admixtures in accordance with ASTM C494/494M, Type C or E. Concrete admixtures shall contain no more than two (2%) percent of Calcium Chloride ($CaCl_2$).
3. Heating mixing water or aggregates so the temperature of the mixed concrete is not less than sixty-five degrees (65°) Fahrenheit at the time of placing in the forms.
4. An approved equal method or a combination of the three methods above.

Installation: Concrete shall not be placed on frozen subgrade. All contact surface shall be above the freezing temperature of water and free from ice or frost. Follow guidelines set forth in ACI306R "Guide to Cold Weather Concreting."

Waterproofing

Unless otherwise noted on the plans or directed by the Engineer the surfaces of all reinforced concrete bridge abutments and retaining walls, arch and culvert bridges, which will come in contact with fill, shall be waterproofed above the foundations by coating with approved Bituminous Waterproofing Material. Bituminous material shall be a two coat system consisting of primer and asphalt coats. Primer shall conform to the Standard Specification for "Asphalt Primer Used in Roofing, Dampproofing, and Waterproofing" of A.S.T.M. Designation D 41. Topcoat shall conform to Standard Specification for "Asphalt Used in Dampproofing and Waterproofing" of A.S.T.M. Designation D 449 Types I, II or III.

Curing Concrete

Careful attention shall be given to the proper curing of all concrete parapets, balustrades, floors, sidewalks and finished surfaces.

Such surfaces shall be covered and remain wet as indicated below or be sprinkled each morning and evening or more frequently if deemed necessary by the Engineer.

For all concrete structures, concrete made with normal Portland cement shall be maintained above fifty degrees (50°) Fahrenheit in a moist condition for at least the first seven days after placing and high-early strength concrete shall be so maintained for at least the first three days.

Parapets, balustrades, pavements, floor and sidewalk slabs and all exposed surfaces shall be cured by the following methods:

1. Quilted Covers: Approved quilted covers shall consist of outer covering materials of burlap, cotton or other approved fabric, the bottom and top cover of which shall each weigh at least six (6) ounces per square yard of fabric, and an inner layer of cotton batting or other approved material weighing at least eight (8) ounces per square yard. These mats shall be quilted, to securely hold the inner cotton batting lining in place and shall be two (2) feet greater in width, after shrinking, than the pavement slabs being cured, and shall be securely held in place and weighted down to completely cover the edges, as well as the top of the pavement. Adjoining quilts shall be lapped at least twelve (12) inches. Quilted covers shall be kept wet and left in

place for a period of not less than five (5) days. These quilted covers shall be laid directly on the pavement as soon as the brooming is completed.

2. Waterproof Sheet Materials: Approved blankets and covers shall have edges lapped at least twelve (12) inches and all edges shall be sealed with pressure sensitive tape. Sheet materials shall be capable of withstanding normal job use without puncturing or tearing. Waterproof Paper Blankets and Polyethylene Coated-White Burlap Blankets shall conform to the material requirements of the Standard Specifications for "Sheet Materials for Curing Concrete" of A.S.T.M. Designation C 171.

3. Membrane Curing Compounds: Approved liquid membrane-forming compounds shall be Type 1,clear or translucent; Type 1-D, clear or translucent with fugitive dye; or Type 2, white pigmented in accordance with the Standard Specification for "Liquid Membrane-Forming Compounds for Curing Concrete" of A.S.T.M. Designation C 309. Curing compound shall be uniformly applied by spray or roller over freshly placed damp concrete at a rate of one gallon per 150 square feet. Curing compound shall remain intact for at least 7 days before becoming powdery and non-adherent due to weathering.

The entire surface of the pavement, including the edges and sides shall be kept wet by the above methods or sprinkling with water for the period shown on the following table. The water shall be applied by means of tank trunk sprinkler with a fan spray, unless otherwise ordered by the Engineer, calcium chloride mixed integrally may be used for curing, if shown on the plans.

The interval of laying adjacent slabs, the period to opening to traffic, and the curing period shall be in accordance with the following table depending upon the type of cement used and the season of the year placed; except in cases where a pavement is placed upon a bridge floor, when the Contractor shall proceed as directed by the Engineer.

Laying, Opening and Curing Table

Pavement Laid from	Minimum Period of Laying Adjacent Slabs	Minimum Period of Opening to Traffic	Minimum Curing Period	
			Misting with Water	Quilts
Jun 1 to Sep 15	5 days	10 days	8 days	5 days
Sep 15 to Jun 1*	7 days	15 days	12 days	7 days

***when average temperature is above 45°F, unless otherwise directed by the Engineer**

The periods of the curing of concrete floors, in the area where waterproofing is to be applied, may be further reduced when approved by the Engineer, provided the waterproofing is placed over this surface of the floor immediately after the quilted covers or waterproof curing sheets, have been removed and the concrete pavement placed as soon as possible thereafter. For this case, in transporting and placing waterproofing and concrete on the bridge floor, individual transporting units in excess of 1,000 pounds including material will not be permitted and hand finishing will be required.

Joints

Sliding surfaces of expansion plates shall be planed true and smooth, the marks of the plane paralleling the movement of the joint. Expansion plates shall be well anchored as shown on the plans. All sliding surfaces of expansion plates shall be thoroughly coated with a mixture of graphite and grease just before being placed in position and special care taken to avoid placing concrete in such manner as to interfere with their free action.

Open joints shall be placed at locations designated on the plans and shall be formed by the insertion and subsequent removal of a template of timber, metal or other suitable material. The method of insertion and removal of joint templates shall be such as to avoid the possibility of chipping or breaking down at the

edges and the templates shall be so constructed that their removal may be readily accomplished without injury to the work.

Unless otherwise shown on the plans, the expansion joints in the exposed faces of masonry shall be filled for a depth of one (1") inch from the exposed surface with an approved plastic cement which is colored to match the concrete or mortar joints, the balance of the joint shall be filled with premoulded joint material.

False joints matching those in the adjacent pavement shall be formed in structural roadway slabs as shown on the plans or directed by the Engineer.

Construction Joints

Joints not indicated on the plans shall be so made and located as to least impair the strength of the structure. Where a joint is to be made, the surface of the concrete shall be thoroughly cleaned and all laitance removed. In addition to the foregoing, all joints shall be thoroughly wetted and slushed with a coat of neat cement grout immediately before placing of new concrete.

At least two hours must elapse after depositing concrete in the columns or walls before depositing in beams, girders or slabs supported thereon. Beams, girders, brackets, column capitals, and haunches shall be considered part of the floor system and shall be placed monolithically therewith.

Construction joints in floors shall be located near the middle of the spans of slabs, beams, girders or unless a beam intersects a girder at such point in which case the joints in the girders shall be offset a distance equal to twice the width of the beam. In this last case provision shall be made for shear by use of inclined reinforcement.

Sidewalk Finish on Bridges

Sidewalk finish shall have a one inch wearing surface of mortar, composed of one part Portland cement and two parts fine aggregate, applied at the same time the concrete is placed, to insure thorough bonding. The surface shall be worked, floated and otherwise finished as directed by the Engineer, and marked off at intervals of about six feet unless otherwise shown on the plans. The one inch wearing surface will be paid for at the unit price bid for the concrete with which it is bonded.

Finishing Surfaces

The upper surfaces of bridge seats or other bearing surfaces under metal shall be left approximately 1/4 of an inch high and bush hammered to the exact level, unless otherwise noted on the Plans or directed by the Engineer. Where so indicated on the drawings, surfaces shall be tooled or treated by sand blast.

Regardless of any other provisions of these specifications, and subject to the approval of the Engineer, the forms carrying no load, on side faces to be finished may be removed 24 hours to 72 hours (depending on the temperature and the kind of cement used) after the concrete is poured. Immediately after forms have been removed, surfaces that will be exposed in the finished structure shall have all projections and irregularities carefully removed and all cavities neatly filled with mortar of the proportion used in concrete.

Plastering of surfaces will not be allowed. The surface film of all such pointed surfaces shall be carefully removed before setting occurs. The surfaces shall then be given one of the following finishes:

Surface Finish: Surfaces exposed to view shall, unless otherwise indicated on the plans, be defined as follows:

Copings, Railings and Curbs: All surfaces, except the upper horizontal surfaces not subjected to wear including Columns, Spandrel Walls, Piers, Abutments, Wingwalls and Retaining Walls. All surfaces not in contact with earth and above low water, except the bridge seats, face of back walls and the upper horizontal surfaces not subjected to wear.

Arch Ribs or Rings: All surfaces not in contact with earth and above low water except that portion of the extrados which cannot be seen.

Slabs, Beams and Girders: For structures over highways and railroads, all surfaces above the ground except sidewalk and roadway surfaces. For structures over streams, the fascias, such as the outside surface of outside beams and girders.

For all surfaces the Engineer shall be the sole judge of what surfaces may be seen and also of the elevation which is deemed to be low water.

If in the opinion of the Engineer any exposed surfaces do not present a smooth surface of even texture and appearance, then the following finish shall be repeated as many times as the Engineer deems it necessary, to secure a satisfactory finish. The Engineer shall be the sole judge of the amount of rubbing which will be required.

Immediately after the forms are removed, and necessary patching and smoothing is done, the surface shall be wetted and rubbed with No. 16 Carborundum brick or other abrasive until it is even and smooth and of uniform appearance, without applying any cement or other coating.

The final finish shall be obtained by a thorough rubbing with a No. 30 Carborundum brick or other abrasive of equal quality. After the final rubbing, the surface shall be drenched and kept wet for a period of 7 days, unless otherwise directed.

Railing balusters and other precast members which have been disfigured by the drip from the abrasive shall be thoroughly cleaned by means of a dilute solution of muriatic acid.

Treatment and Finish for Horizontal Surfaces Not Subjected to Wear: All upper horizontal surfaces such as the tops of handrail posts and caps and the tops of parapets, copings and bridge seats shall be formed by placing an excess of material in the forms and removing or striking off such excess with a wooden templet, forcing the coarse aggregate below the mortar surface. The use of mortar topping for concrete railing caps and other surfaces falling under this classification will in no case be permitted.

The final finish for caps and railings shall be obtained in one of the following ways as specified: After the concrete has been struck off as above described, the surface shall be thoroughly worked and floated with a wooden, canvas or cork float. The operation shall be performed by skilled and experienced concrete finishers. Before this last finish has set, the surface shall be lightly striped with a fine brush to remove the surface cement film, leaving a fine-grained, smooth, but sanded texture.

In lieu of the above, the surface may be finished with a rough carpet float or other suitable device leaving the surface even but distinctly sandy or pebbled in texture.

Embedded Stone

Boulders and fragments of rock may be embedded in a large mass of second and third-class concrete. Each stone before being embedded or placed shall be thoroughly washed and scrubbed, if necessary, to free it from all dirt. Stones embedded in concrete shall be at least three inches apart at all points, and no stones shall be placed within three inches of any face of the concrete. Stones shall be laid on their largest bed and worked down into the concrete by bars so as to exclude air from any pockets in the lower surface of the stone.

Weep Holes

The contractor shall construct weep holes in all retaining walls and abutments at such points as are indicated on the plans or designated by the Engineer. Payment for all labor and materials required to construct and protect these weep holes will be included in the contract price for concrete.

Damaged Concrete

All damage to or disfigurement of concrete of any kind occurring prior to the final acceptance of the work shall be remedied by the Contractor at his own expense and to the satisfaction of the Engineer.

Foundation for Concrete
Where concrete is to rest on any excavated surface other than rock, special care shall be taken not to disturb the bottom of the excavation, and the final removal of material to grade shall not be made until just before the concrete is laid; except in concrete foundations for pavement.

The excavation lines and bases of structures shown on the plans shall be considered as only approximate; and when ordered in writing by the Engineer, shall be placed at such an elevation or changed to such dimensions as will give a satisfactory foundation. Any additional concrete that may be ordered by the Engineer below or beyond the lines shown on the plans will be paid for at the contract price.

No structure shall be commenced without the Engineer's approval.

All rock or hardpan foundation surfaces shall be freed from loose pieces, cut to firm surfaces and cleaned to the satisfaction of the Engineer, before laying concrete. All seams shall be cleaned out and filled with concrete or mortar; and payment for such cleaning out and filling shall be made at the contract price for the class of concrete used.

Concrete Parapets
In no case shall concrete parapets or balustrades be placed until the centering or false work for the span has been released and in the case of steel bridges, the riveting completed. In the case of earth filled arch bridges the parapets or balustrades shall not be poured until the fill has been placed.

Concrete Floors
Before concrete floors are placed on steel-spans the centering under the bridge shall be released and the span swung free on its supports and the riveting completed.

The operation of placing the concrete in any floor slab shall be continuous between construction or expansion joints.

On steel truss or open Spandrel concrete spans, the concrete in the floor system shall be placed symmetrically about the center line of the span, beginning at the center and working simultaneously toward each end, or beginning at the ends and working simultaneously toward the center. Care shall be taken to prevent the displacement of reinforcement during the placing of concrete.

If for any reason it becomes necessary to introduce a construction joint, this shall be formed by means of a vertical bulkhead so constructed as to produce a key or dove-tailed joint, and shall be placed as shown on the plans or as directed by the Engineer.

In placing concrete around steel shapes it shall be placed only on one side of the shape until it slushes up over the bottom flange of the shape on the opposite side, after which it shall be placed on both sides to completion.

ARTICLE 28. PAINT AND PAINTING

General
All paint furnished must be shipped in strong, substantial containers, plainly marked with the name, weight and volume of paint content, together with the color, formula and name and address of manufacturer.

Unless otherwise provided, the materials entering into the composition of paints shall conform to the requirements of the Federal Specifications Board on Paints issued by the U.S. Bureau of Standards, and in the examination of paints the methods specified shall be used.

All paints and coatings shall comply with VOC (volatile organic compounds) content limits in accordance with current environmental regulations.

Requirements

The paints shall consist of pigments of the required fineness and composition ground to the desired consistency in pure raw linseed oil in a suitable grinding machine, to which shall be added additional oil and drier as herein-after specified.

The linseed oil, thinner and drier which are to be used in the preparation of the paints shall meet the following requirements: Raw linseed oil shall meet the requirements of the Standard Specification for "Raw Linseed Oil" of A.S.T.M. D-234 latest issue.

Boiled linseed oil shall meet the requirements of the Standard Specification for "Boiled Linseed Oil" of A.S.T.M. D-260 latest issue.

Thinner

(a) The turpentine used shall either be the distillate commonly known as "Gum Spirits of Turpentine" or "Steam-Distilled Wood Turpentine" meeting the requirements of the Standard Specification for "Spirits of Turpentine" of A.S.T.M. D-13 latest issue.

(b) Mineral Spirits. The mineral spirits shall be clear and free from suspended matter and water and shall meet the requirements of Standard Specification for 'Mineral Spirits (Petroleum Spirits) (Hydrocarbon Dry Cleaning Solvent)" of A.S.T.M. D-235 latest issue.

The color shall be "Water White".

Spot Test: The mineral spirits shall evaporate completely from filter paper.

The flash point shall be not lower than 30°C (86°F) when tested in a closed cup tester. Sulphur shall be absent, as determined by the white lead test.

The distillate below 130°C (266°F) shall not exceed five percent.

The distillate below 230°C (446°F) shall be not less than ninety-seven per cent.

The reaction shall be neutral.

Drier

The drier shall be composed of manganese or cobalt, or a mixture of any of these elements combined with a suitable fatty oil, with or without resins or "gums" and mineral spirits or turpentine, or a mixture of these solvents. It shall be free from sediment and suspended matter. The drier when flowed on metal and baked for two hours at 100°C (212°F) shall leave an elastic film. The flash point shall be not lower than 30°C (86°F) when tested in a closed cup tester.

It shall mix with pure raw linseed oil in the proportion of one volume of drier to nineteen volumes of oil without curdling, and the resulting mixture when flowed on glass shall dry in not more than eighteen hours. When mixed with pure raw linseed oil in the proportion of one volume of drier to eight of oil, the resulting mixture shall be no darker than a solution of 6 g. of potassium bichromate in 100 cc. of pure sulfuric acid of specific gravity 1.84.

Black Paint

The paint shall be well ground, shall not settle badly or cake in the container, shall be readily broken up with a paddle to a smooth, uniform paint of good brushing consistently and shall dry within eighteen hours to a full oil gloss without streaking, running or sagging. The color and hiding power shall be that which may be specified.

Pigment: The pigment shall consist of carbon black 35 to 50 percent and the balance insoluble silicates.

Liquid: The liquid in the paint shall consist of not less than eighty percent of pure linseed oil, previously specified, the balance to be combined drier and thinner.

THE PAINT SHALL CONSIST OF:	MIN. PERCENT	MAX. PERCENT
Pigment	40	45
Liquid (containing at least 80% Linseed Oil)	55	60
Water	--	0.5
Coarse particles and "skins" (total residue retained on 325 sieve on pigment)	--	1.5

White Paint

The paint shall be well ground, shall not settle badly or cake in the container, shall be readily broken up with a paddle to a smooth, uniform paint of good brushing consistency, and shall dry within eighteen hours to a full oil gloss without streaking, running or sagging. The color and hiding power shall be equal to that which may be specified.

Pigment:

THE PIGMENT SHALL BE COMPOSED OF	MINIMUM PER CENT	MAXIMUM PER CENT
Pigment color	50	70
Zinc Oxide (ZnO)	30	40
Silica, magnesium silicate, aluminum silicate, barium sulphate, or any mixture thereof.....	--	10

Liquid: The liquid in the paint shall consist of not less than ninety percent of pure raw linseed oil previously specified, the balance to be combined drier and thinner.

THE PAINT SHALL CONSIST OF:	MINIMUM PERCENT	MAXIMUM PERCENT
Pigment	62	66
Liquid (containing at least 90% Linseed Oil)	34	38
Water	--	0.5
Coarse particles and "skins" (total residue retained on 200 sieve on pigment)	--	0.5

Black Enamel Paint

The paint shall be well ground, shall not settle badly or cake in the container, shall be readily broken up with a paddle to a smooth uniform paint of good brushing consistency and shall dry to a full gloss without streaking, running or sagging.

The formulas for making twenty (20) gallons of Black Enamel Paint are as follows:

Eighty-one (81) pounds of Basic Paste of which the pigment is six (6) per cent minimum and the vehicle is ninety-four (94) per cent maximum. The vehicle shall be an alkyd resin solution of ninety-four (94) percent minimum and six (6) percent dipentene maximum.

The pigment shall be standard grade carbon black, color #26 and shall meet the requirements of the N.Y.C. Dept. of Citywide Administrative Services Specification No. 31-P-93:66.

The alkyd resin solution shall meet the requirements of the N.Y.C. Dept. of Citywide Administrative Services Specification No.31-E-10:92.

To this is to be added the following vehicle:

Seven (7) Gallons	Mineral Spirits
Two and one-half (2 ½) Gallons	Esteral #750
Two Pounds Ten Ounces (2 lbs. 10oz.)	Drier (32%)
One Pound Five Ounces (1lb. 5oz.)	Cobalt Drier (6%)
Ten Ounces (10 oz.)	Manganese Napthenate Drier (6%)

The mineral spirits shall meet the requirements of the N.Y.C. Dept. of Citywide Administrative Services Specification No. 31-M-1:91.

The liquid paint driers shall meet the requirements of the N.Y.C. Dept. of Citywide Administrative Services Specification No. 31-D-1:64.

Colored Paint

The colored paints will be ordered in the form of ready-mixed paint and they shall meet the requirements as to composition as called for under White Paint but having substituted for the extending pigments sufficient suitable pigment color in order to furnish the required color and hiding power. The paint for first coat shall be tinted lighter in color than the second coat.

Aluminum Paint

Requirements--Metal Portion: The metal portion of aluminum paste shall be made from commercially pure aluminum and shall be in the form of fine flakes. It shall contain no filler or adulterant such as mica, shall be suitable for making aluminum paint and shall meet the requirements of N.Y.C. Dept. of Citywide Administrative Services Specification No. 31-P-95:94 and shall meet the following requirements:

Paste:

Coarse particles, using alcohol or mineral spirits as the wash liquid:	**Minimum Percent**	**Maximum Percent**
Total residue retained on No. 200 sieve	--	0.5
Total residue retained on No. 325 sieve	--	3.0
Fatty or oil matter (polishing lubricant)	--	3.0
Non-volatile portion	63	--

Liquid Portion: The liquid which the aluminum bronze powder is compounded to form the paste shall be completely volatile at 105°C.

Leafing properties: The aluminum paste shall show a leafing percentage of a minimum of 60% and shall show a leafing percentage of a minimum of 60% after heating in a closed vessel for three (3) hours at a temperature of 45°C.

Settling: There shall be no appreciable settling out of the metallic portion of the paste in the container, i.e., no free liquid shall be present.

Paint Film: The paint shall be made by mixing with a spar mixing varnish meeting U.S. Navy

Department Specification TT-V81 in the proportion of two (2) pounds of aluminum paste to one (1) gallon of vehicle and shall give a free flowing, smooth, continuous coating, free from breaks and sags when applied to a smooth, vertical steel surface.

Determination of Leafing Properties: This determination requires the use of a polished steel spatula having a blade substantially free from taper and of the following dimensions:

Length.....5-1/2 inches (minimum)
Width.....1/2 to 9/16 inch
Thickness.....1/16 inch (maximum)

A test tube 6 inches long by 1/4 inch diameter is also required. The leafing reagent or vehicle is made by dissolving 30 gr. of finely powdered (100 mesh) hard cumarone resin in 100 cc. of volatile mineral spirits having a specific gravity at 60°F. of 0.794 and meeting the requirements of the Federal Specification No. TT-T-291. Solution of the resin may be hastened by warming the mixture. The specific gravity of the solution at 600F. is adjusted between the limits of 0.875 and 0.882 by the addition of sufficient mineral spirits. The resulting mixture is allowed to settle and the clear supernatant solution decanted for use in the test. To determine the leafing percentage a 3-1/2 gr. sample of the paste is thoroughly mixed with 25 cc. of the leafing reagent and transferred to the test tube to a depth of 11.5 cm. The tube is closed with a stopper and rotated until a uniform suspension is formed. The clean spatula is then dipped into the mixture, maintained at a temperature or 77°F plus or minus 5°F rotated for 20 seconds, withdrawn at a uniform rate of speed requiring a total time of 6 seconds plus or minus 1 second without touching the sides of the test tube, and suspended vertically in free space for 2 minutes. The height of the perfectly leafed area, defined as that portion of the completely covered surface free from cracks or breaks and possessing a high luster or mirror-like reflection, is then measured. The per cent leaf is defined by the equation:

$$\frac{\text{Length of Perfectly Leafed Area}}{\text{Total Depth of Immersion}} \times 100 = \text{Leafing Percentage}$$

Determination of Leaf Retention after Heating: After determining the leafing properties of the sample of paste as described above, place 10 gr. of paste in a mall, loosely closed, container and heat in an oven at 45°C for 3 hours. Again measure the leafing properties to determine the loss of leaf caused by heating.

Painting of Metal Structures

The painting of metal structures shall include, unless otherwise provided in the contract, the proper preparation of the metal surfaces, the application protection and drying of the paint coatings, the protection of pedestrian, vehicular or other traffic upon or underneath the structure and sub-structure, the protection of all portions of the structure (super-structure and sub-structure) against disfigurement by spatters, splashes and smirches of paint or of paint materials, and the supplying of all tools, tackle, scaffolding, labor, workmanship and materials necessary for the entire work.

Paint shall be applied by means of brushed only. All brushes shall be either round or oval in shape. The paint when applied shall be so manipulated under the brush as to produce a uniform even coating in close contact with the metal or with previously applied paint. In general, the primary movement of the brush shall describe a series of small circles to thoroughly fill all irregularities in the surface, after which the coating shall be smoothed and thinned by a series of parallel strokes.

To secure a maximum thickness of paint film upon the rivet heads and edges of plates, angles, or other rolled shapes, these areas shall be "striped" in advance of the general painting, and shortly afterward shall be given a second or "wash" coat when the general coat is applied. The paint shall be kept stirred while being applied. The paint shall be well worked into all joints and open spaces.

Paint shall be thoroughly stirred, preferably by means of mechanical mixers, before being removed from the containers, and to keep the pigments in suspension it shall be kept stirred while being applied.

All painting must be done in a neat and workmanlike manner.

On all surfaces which are inaccessible for paint brushes, the paint shall be applied with sheepskin daubers specially constructed for the purpose.

All metal coated with impure or unauthorized paint shall be thoroughly cleaned and repainted to the satisfaction of the Engineer, at the expense of the Contractor.

If it is necessary in cool weather to thin the paint in order that it shall spread more freely, this shall be done only by heating in hot water or on steam radiators.

Shop Painting

All dirt, rust, loose mill scale, grease, and other foreign matter shall be removed from the surfaces required to be shop painted, by means of an oxygen acetylene torch.

The torches to be used shall be of two general types: type one shall be used for flat surfaces, and type two shall be used for rivet heads, fittings, and other projections inaccessible to torch type number one. Torch type No. 1, multiple tip type, consists of multiple flame orifices arranged so as to give a wide flat series of neutral clear cone flames. Torch type No. 2, round tip type, consists of multiple orifices so as to give a circular series of neutral clear cone flames.

All surfaces of structural steel to be shop painted shall be flame cleaned with the proper type of torch traversed over the surface at a rate of speed necessary to dehydrate and remove loose mill scale, etc. Immediately after the application of the flame, surfaces shall be hand wire-brushed and swept clean of loose particles and dust. Cleaning by means of compressed air will not be permitted.

The conditions under which the flame cleaning of structural steel surfaces shall be undertaken shall be such that the following objectives will be attained: Removal of foreign matter, dehydration of the surface, and application of paint before recondensation of moisture on steel.

Paint shall be applied to the surface promptly after cleaning, but in no case shall paint be applied more than two hours after the flame cleaning of the surface or when the metal has absorbed sufficient heat to cause the paint to blister and produce a porous paint film or when the temperature of the steel and the surrounding air is less than 40°F. Erection marks shall be painted upon painted surfaces. Unless otherwise noted on the drawings, all steel work, after it has been approved by the Inspector and before leaving the shop, shall be given one coat of alkyd-linseed oil primer paint.

The paint shall be carefully and thoroughly applied and well worked into all joints and open spaces. All surfaces in contact shall be cleaned (but not painted) before assembling.

All surfaces not accessible after erection, except surfaces in contact, shall receive two shop coats the second to be of the proportions specified for the first field coat and tinted as directed. All open spaces, where, in the opinion of the Engineer, water is apt to accumulate and corrosion occur because of the impossibility of painting, shall be filled thoroughly and carefully with litharge or approved substitute.

All surfaces embedded in concrete shall be cleaned but not painted. Tops of beams in contact with concrete slabs shall be painted. Machined surfaces shall be given a heavy coat of metal lacquer or other approved coating before leaving shop. Surfaces to be welded shall not be painted until welding is completed. Where welding is to be done in the field, the shop painting shall consist of a coat of linseed oil.

No material shall be shipped until the shop paint has dried sufficiently to preclude injury from shipping or handling.

Field Painting

After arrival at the site, all surfaces of members which will be inaccessible after erection and which are to be given the first field coast of paint in the shop shall be given two coats of paint corresponding to the second and third field coats as specified herein.

Prior to application of any coat of paint, all damage to the previous coat shall be touched up with the corresponding specified paint, each coat being allowed to dry thoroughly before the subsequent coat is applied. The Contractor shall restore any damage that may have been caused to other parts of the structure. Immediately after they have been inspected and approved, heads of field rivets shall be given a coat of paint of the proportions and quality specified for shop paint.

The underside of each fixed shoe and bed plate shall be cleaned of all foreign matter but shall not be painted.

When the erection work is complete including all riveting, straightening of bent metal, etc., all adhering rust, scale, dirt, grease or other foreign matter shall be removed from steel surfaces by means of approved power wire brush apparatus. Oil and grease shall be removed by the use of gasoline or benzine; bristle and wood fibre brushes may be used for removing loose dust; upon permission of the inspector, brushes, scrapers, chisels, hammers, and other effective means may be employed when necessary.

All painting shall be done in dry weather. The steel shall be free from moisture or frost when being painted, and the temperature of both the steel and the surrounding air shall be at least 40°F and rising. Painting shall not be done when the metal has absorbed sufficient heat to cause the paint to blister and produce a porous paint film. Field painting shall not be started until so directed by the Engineer and in no case shall surfaces, which are liable to be damaged by concrete work be painted until after the concrete work is completed and the forms removed. As soon as the concrete work is done to the satisfaction of the Engineer, all surfaces except as noted on the drawings and otherwise herein specified, shall be given three field coats of paint. The second and third field coats of paint shall not be applied until the preceding coat has dried thoroughly.

Paint Packages and Thinning

All paint furnished must be shipped in strong, substantial containers, plainly marked with the name and address of manufacturer. The paint shall be delivered in sealed packages and the Inspector shall be permitted to seal the packages at any time during the progress of the Work. The seals shall be broken by the Inspector only, and no paint shall be used until accepted by the Engineer. No thinning of the paint, or the addition of any material whatsoever, will be permitted except by order of the Engineer.

SECTION C - SPECIAL PROVISIONS

ARTICLE 1. DESCRIPTION OF WORK

This contract provides for Brooklyn Street Tree Planting FY27, CBs 6,13 known as Contract BG-426M.

This work includes removal of stumps over 4" in diameter and dead trees of over 4" up to and including 24" in diameter; saw cutting and removal of sidewalk for new tree pits; excavation (this includes removal of stumps and dead trees up to and including 4" dia.) and preparation of all tree pits; planting trees; maintaining and replacing various types of trees in prepared, new, existing and lawn tree pits; restoration of new and existing abandoned tree pits; installing steel tree bed guards; and all work incidental thereto, in accordance with sketches and specifications to the satisfaction of the Project Manager.

The above enumeration of the general scheme is not to be construed as including all items and operations necessary for the completion of work. All work shall be completed according to the Contract Document and as director by the Project Manager.

Any references to “Owner” in the Contract Documents shall mean the “Agency” as defined in the City of New York Standard Construction Contract.

ARTICLE 2. CONTRACT DRAWINGS AND SUPPLEMENTARY DRAWINGS:

There are no contract Drawings.

Locations will be provided following award.

----------END OF PAGE----------

ARTICLE 3. REFERENCED PROVISIONS (SCHEDULE A)

Pursuant to the sections of the Information for Bidders and the City of New York Standard Construction Contract referenced below, the Contractor shall observe the following requirements and provisions as indicated below.

Information for Bidders, Section 22

Bid Security	REQUIRED	5% bid bond **OR** 5% bid deposit	% based on the total bid price
Payment Security	REQUIRED	Payment Bond	100% of the Contract Price
Performance Security	REQUIRED	Performance Bond	100% of the Contract Price

NYC Standard Construction Contract, Article 14

The date for Substantial Completion is **365** consecutive calendar days from the Order to Work date.

ARTICLE 3. REFERENCED PROVISIONS (SCHEDULE A)

General conditions including conditions relating to Article 22 – Insurance

PART I. REQUIRED INFORMATION

INFORMATION FOR BIDDERS BID BOND The **Contractor** shall obtain a bid bond in the amount indicated to the right.	See Article 3
INFORMATION FOR BIDDERS PERFORMANCE AND PAYMENT BONDS The **Contractor** shall obtain performance and payment bonds in the amount indicated to the right.	See Article 3
CONTRACT ARTICLE 14. DATE FOR SUBSTANTIAL COMPLETION The **Contractor** shall substantially complete the **Work** in the number of calendar days indicated to the right.	See Article 3
LIQUIDATED DAMAGES If the **Contractor** fails to substantially complete the work within the time fixed for substantial completion plus authorized time extensions or if the contractor, in the sole determination of the Commissioner, has abandoned the work, the contractor shall pay to the City the amount indicated to the right. If the Contractor fails to correct tree protection deficiencies with 24 hours of notification by the Agency in accordance with Article 14 of this Section, the Contractor shall pay to the City the amount indicated to the right. If Contractor fails to perform as required under the Contract Articles and terms as indicated to the right; the Contractor shall pay to the City the amount indicated to the right.	**$500.00** for each consecutive calendar day past Substantial Completion date for Contracts under $1 million **$1,000.00** for each consecutive calendar day past Substantial Completion date for Contracts $1 million or more **$300.00** for each day tree protection deficiencies are not remedied in accordance with Article 14 of this Section **$195.00** per tree for failure to maintain performance productivity levels in accordance with Article 42 of this Section **$75.00** per linear foot of tree guards for failure to maintain performance levels in accordance with Article 42 of this Section **$5.00** per square foot of tree bed not prepared in accordance with Article 42 of this Section. **$200.00** per tree for failure to replace any tree on the replacement list by dates listed in punchlist letters (Items #19-22, #27-29) **$400.00** per tree for failure to replace any caliper tree on the replacement list by dates listed in punchlist letters (Items #23-26, #30-32) **$200.00** per day for unremoved debris pile until debris is removed in accordance with Item #38 of this Section

CONTRACT ARTICLE 17. **SUB-CONTRACTOR** The **Contractor** shall not make subcontracts totaling an amount more than the percentage of the total **Contract** price indicated to the right.	Not to exceed 50% of the **Contract** price
CONTRACT ARTICLE 21. **RETAINAGE** The **Commissioner** shall deduct and retain until the substantial completion of the **Work** the percent value of the **Work** indicated to the right.	When Performance and Payment Security are Required **- 5%** of the value of the **Work** When Performance and Payment Security are NOT required, and the **Contract** award amount does not exceed $1 million - **5**% of the value of the **Work** When Performance and Payment Security are NOT required, and the **Contract** award amount is over $1 million - 10% of the value of the **Work**
CONTRACT ARTICLE 22. **(Per Directions Below)**	
CONTRACT ARTICLE 24. **DEPOSIT GUARANTEE** As security for the faithful performance of its obligations, the **Contractor**, upon filing its requisition for payment on **Substantial Completion**, shall deposit with the **Commissioner** a sum equal to the percentage of the **Contract** price indicated to the right.	**4%** of **Contract** price
CONTRACT ARTICLE 24. **PERIOD OF GUARANTEE** Periods of maintenance and guarantee other than the period set forth in Article 24.1 are indicated to the right.	**One year**
CONTRACT ARTICLE 74. **STATEMENT OF WORK** The **Contractor** shall furnish all labor and materials and perform all **Work** in strict accordance with the **Contract Drawings**, **Specifications,** and all **Addenda** thereto, numbered **as shown in the column to the right.**	
CONTRACT ARTICLE 75. **COMPENSATION TO BE PAID TO CONTRACTOR** The **City** shall pay and the **Contractor** shall accept in full consideration for the performance of the **Contract**, subject to additions and deductions as provided herein, the total sum **shown in the column to the right,** this said sum being the amount at which the **Contract** was awarded to the **Contractor** at a public letting thereof, based upon the **Contractor's** bid for the **Contract.**	Amount for which the **Contract** was awarded: $ _____

SCHEDULE A

General conditions relating to Article 22 - Insurance

PART II. TYPES OF INSURANCE, MINIMUM LIMITS AND SPECIAL CONDITIONS

Note: All certificate(s) of insurance submitted pursuant to Contract Article 22.3. 3 must be accompanied by a Certification by Broker consistent with Part III below and include the following information:

- For each insurance policy, the name and NAIC number of issuing company, number of policy, and effective dates;
- Policy limits consistent with the requirements listed below;
- Additional insured or loss payees consistent with the requirements listed below; and
- The number assigned to the Contract by the City (in the "Description of Operations" field).

Insurance indicated by a blackened box (■) or by X in a ☐ to left will be required under this contract

Types of Insurance (per Article 22 in its entirety, including listed paragraph)	Minimum Limits and Special Conditions
■ Commercial General Liability Art. 22.1.1	The minimum limits shall be **$1 million** per occurrence and **$2 million** per project aggregate applicable to this Contract unless the Work requires a permit from the Department of Buildings and greater limits of Commercial General Liability Insurance are required pursuant to 1 RCNY section 101-08. Additional Insured: 1. City of New York, including its officials and employees, with coverage at least as broad as ISO Forms CG 20 10 and CG 20 37, and 2. All person(s) or organization(s), if any, that Article 22.1.1(b) of the **Contract** requires to be named as Additional Insured(s), with coverage at least as broad as ISO Form CG 20 26. The Additional Insured endorsement shall either specify the entity's name, if known, or the entity's title (e.g., Project Manager).

■ Workers' Compensation Art. 22.1.2 ■ Disability Benefits Insurance Art. 22.1.2 ■ Employers' Liability Art. 22.1.2 □ Jones Act Art. 22.1.3 □ U.S. Longshoremen's and Harbor Workers Compensation Act Art. 22.1.3	Workers' Compensation, Employers' Liability, and Disability Benefits Insurance: Statutory per New York State law without regard to jurisdiction. **Note**: The following forms are acceptable: (1) New York State Workers' Compensation Board Form No. C-105.2, (2) State Insurance Fund Form No. U-26.3, (3) New York State Workers' Compensation Board Form No. DB-120.1 and (3) Request for WC/DB Exemption Form No. CE-200. The City will not accept an ACORD form as proof of Workers' Compensation or Disability Insurance. Jones Act and U.S. Longshoremen's and Harbor Workers' Compensation Act: Statutory per U.S. law.
□ Builders Risk Art. 22.1.4	□ Required - 100 % of total Contract amount □ Required - 100 % of total bid amount for Item(s): **Contractor** the Named Insured; the **City** both an Additional Insured and one of the loss payees as its interests may appear. If the **Work** does not involve construction of a new building or gut renovation work, the **Contractor** may provide an installation floater in lieu of Builders Risk insurance. Note: Builders Risk Insurance may terminate upon **Substantial Completion** of the **Work** in its entirety.
■ Commercial Auto Liability Art. 22.1.5	**$1 million** per accident combined single limit If vehicles are used for transporting hazardous materials, the Contractor shall provide pollution liability broadened coverage for covered vehicles (endorsement CA 99 48) as well as proof of MCS 90
□ Contractors Pollution Liability Art. 22.1.6	$_____ per occurrence $_____ aggregate Additional Insured: City of New York, including its officials and employees
□ Marine Protection and Indemnity Art. 22.1.7(a)	$_____ per occurrence $_____ aggregate Additional Insured: City of New York, including its officials and employees

□ Hull and Machinery Insurance Art. 22.1.7(b)	$_____ per occurrence $_____ aggregate Additional Insured: City of New York, including its officials and employees
□ Marine Pollution Liability Art. 22.1.7(c)	$_____ each occurrence Additional Insured: City of New York, including its officials and employees
□ Other Art. 22.1.8 Transportation Pollution Liability Insurance Contractor shall maintain pollution liability insurance or shall cause subcontractor performing Item(s) _____ to maintain pollution liability insurance that provides coverage for bodily injury, including death, and property damage arising out of the transportation, storage and disposal of pollutants and pollution incidents created by loading or unloading vehicles. Such insurance shall protect the City of New York, including its officials and employees, as additional insured. If commercially available, such insurance shall be maintained on an occurrence form. If an occurrence form is unavailable and such insurance is written on a claims-made form, continuous coverage shall be maintained, or an extended discovery period exercised, for a period of not less than three (3) years from the time the work under this contract is completed.	$_____ per occurrence $_____ aggregate Additional Insured: **City of New York**, including its officials and employees

PART III. CERTIFICATES OF INSURANCE

Instructions to New York City Agencies, Departments, and Offices

All certificates of insurance (except certificates of insurance solely evidencing Workers' Compensation Insurance, Employer's Liability Insurance, and/or Disability Benefits Insurance) must be accompanied by one of the following:

(1) the Certification by Insurance Broker or Agent on the following page setting forth the required information and signatures;

-- OR --

(2) copies of all policies as certified by an authorized representative of the issuing insurance carrier that are referenced in such certificate of insurance. If any policy is not available at the time of submission, certified binders may be submitted until such time as the policy is available, at which time a certified copy of the policy shall be submitted.

CITY OF NEW YORK CERTIFICATION BY INSURANCE BROKER OR AGENT

The undersigned insurance broker or agent represents to the City of New York that the attached Certificate of Insurance is accurate in all material respects.

_____

[Name of broker or agent (typewritten)]

_____

[Address of broker or agent (typewritten)]

_____

[Email address of broker or agent (typewritten)]

_____

[Phone number/Fax number of broker or agent (typewritten)]

_____

[Signature of authorized official, broker, or agent]

_____

[Name and title of authorized official, broker, or agent (typewritten)]

State of .....)
) ss.:
County of .....)

Sworn to before me this _____ day of _____ 20___

_____

NOTARY PUBLIC FOR THE STATE OF _____

SCHEDULE A
(GENERAL CONDITIONS TO CONSTRUCTION CONTRACT)

PART IV. ADDRESS OF COMMISSIONER

Wherever reference is made in Article 7 or Article 22 to documents to be sent to the **Commissioner** (e.g., notices, filings, or submissions), such documents shall be sent to the address set forth below or, in the absence of such address, to the **Commissioner's** address as provided elsewhere in this **Contract**.

Legal Office - Capital Projects
NYC Parks & Recreation
Capital Projects
Olmsted Center – Flushing Meadows Corona Park
Flushing, NY 11368

ARTICLE 4. [INTENTIONALLY OMITTED]

ARTICLE 5. TESTING AND INSPECTIONS, GENERALLY

The Contractor is responsible for coordinating Special Inspections and notifying the Agency in writing at least 48 hours prior to each Special Inspection. The Contractor is required to make all required documentation and approvals available on Site for the Special Inspector's review. The Contractor is required to facilitate the Special Inspection by granting access to the Special Inspector and accommodating the inspection of the Work.

All methods of construction subject to testing and inspection by New York City Construction Codes shall be performed under the direct supervision of a Professional Engineer licensed by the State of New York. Materials subject to testing and inspection by New York City Construction Codes shall likewise be procured, furnished and installed by the Contractor, unless prohibited by law, under the supervision of a Professional Engineer licensed by the State of New York.

SELECTION OF INSPECTORS: Except as specifically provided in the Specifications, the Engineer will select and designate all persons, firms or corporations to make or witness all inspections, tests, or analyses, with or without reports.

NOTICE TO ENGINEER: The Contractor shall give notice in writing to the Engineer sufficiently in advance of the commencement of manufacture or preparation of special materials to be incorporated into the Work. Such notice shall contain a request for inspection and the dates of expected commencement and completion of the manufacture or preparation of materials. Upon receipt of such notice, the Engineer will either arrange to have a representative present at such times during the manufacture as may be necessary to inspect the materials, notify the Contractor that the inspection will be made at a point other than the point of manufacture, or waive the inspection.

CERTIFICATES OF MANUFACTURE: When no direct test, inspection, or analysis of materials, products, or equipment is required at the point of manufacture, the Contractor shall submit evidence such as certificates of manufacture showing that the materials, products, or equipment to be used in the work have been manufactured and tested in conformity with the Specifications. These certificates shall include the results of physical tests and chemical analysis (where necessary) that have been made directly on the product or on similar products being fabricated by the manufacturer.

NON-TESTED MATERIALS: When materials or manufactured products comprise such small quantities that it is not practicable to make physical tests or chemical analysis directly on the materials or products furnished, a certificate stating the results of such tests or analysis of similar materials or products which were concurrently produced may, at the discretion of the Engineer, be considered as the basis for the acceptance of such materials or manufactured products.

NO SHIPPING BEFORE INSPECTION: The Contractor shall comply with the foregoing before authorizing the manufacture, production, preparation or shipping of any material to be incorporated into the Work.

REJECTIONS: If the Engineer determines that material or equipment does not comply with the Contract, the Contractor will be notified and directed to refrain from delivering said material or equipment, or to promptly remove it from the site or from the work and replace it with acceptable material without cost to the City. Upon rejection of any material or equipment submitted as the equivalent of that specifically named

in the Contract, the Contractor shall furnish the specifically named material or equipment or follow the appropriate procedure for approval of an equivalent.

COST OF TESTS: Unless otherwise specified, the costs of tests, inspections and analyses shall be borne by the Contractor and shall be deemed to be included in the Contract price. Where the Agency performs its own tests on materials or equipment to determine compliance with the Specifications, the Contractor shall reimburse the City for the costs of testing items rejected for noncompliance. Where independent third-party tests and inspections (including controlled inspections) of materials, equipment and construction are required by New York City Construction Codes and there is an obligation to avoid conflict of interest, the Agency will pay Inspectors and DOB approved testing laboratories directly.

ARTICLE 6. CONTRACTOR'S EMERGENCY CONTACT

Within 10 days of the Order to Work date, the Contractor shall furnish 24-hour telephone numbers of at least three responsible representatives who can be reached in times of emergency relating to the Work or the Site.

ARTICLE 7. MATERIAL AND SUBCONTRACTOR APPROVALS

SAME MANUFACTURER: All materials, equipment and components of one and the same kind, type or classification and used for the identical purpose shall be made by the same manufacturer.

APPROVED EQUAL: Whenever a material or piece of equipment is identified in the Contract Documents either by reference to a manufacturer's or vendor's trade name, catalogue number or make or by the name of a patentee, said identification is intended to establish a standard and shall be taken as intending to mean and specify the material, apparatus, equipment or process designated, or any other equal thereto in quality, finish and durability and equally serviceable for the purposes for which it is intended. Any material or equipment of other manufacturers and vendors which perform adequately the duties required by the general design may be considered equally acceptable provided that: (1) In the opinion of the Agency, the material, article or equipment so proposed is of equal quality, substance and function, and (2) The Contractor shall not provide or install any such proposed material, article or equipment without the prior written approval of the Project Manager.

CERTIFICATION: Wherever certification by or membership in a nongovernmental entity or organization is required, such requirement may be fulfilled by equivalent qualifications or characteristics as determined by the Engineer. The foregoing shall not be construed to be a waiver or any legally required Federal, State or local certification or licensing requirement, nor shall it apply where certification by the manufacturer of materials or equipment is required.

DIRECT COMMUNICATION: Requests for an Agency representative to communicate directly with manufacturers, material providers or Subcontractors must be made in writing to the Engineer and are subject to Agency approval, which may be revoked at any time. Any such communications shall not in any way release the Contractor from its full responsibility under the Contract.

NO CLAIM OR EXTENSION: The Agency reserves unlimited discretion to approve or reject materials, equipment, certifications or other requests made or proposed pursuant to this Article and is in no way obligated to explain or justify to the Contractor the basis for its decision. The Contractor shall not be entitled to any extension in the time for performance and shall have no claim in money or delay damages against

the Agency for its use of such discretion or failure to provide a reason or justification for its decisions made pursuant to the matters governed by this Article.

ARTICLE 8. PARTIAL PAYMENTS FOR STORED MATERIALS

Pursuant to Article 42.2 of the Standard Construction Contract, the Commissioner may authorize partial payment for certain materials prior to incorporation of such materials into the Work subject to the followings terms and conditions:

REQUEST AND ESTIMATE: The request for such partial payment shall be accompanied by a schedule of the types, prices and quantities of materials, and shall state whether such materials are to be stored on the Site ("onsite") or off the Site ("offsite"). The Contractor shall include in each succeeding partial payment requisition a summary of materials stored which shall set forth the quantity and value of materials in storage at the end of each preceding estimate period, the amount removed for incorporation in the Work, the quantity and value of materials delivered during the current period, proof of insurance for the stored material, and the total value of materials on hand for which payment thereof will be included in the current payment requisition.

INSURANCE AND RISK: Materials stored offsite must be insured against all risk of loss or damage to the satisfaction of the Commissioner. The insurance policy must remain in effect at all times the materials are stored offsite at no cost to the Agency and on terms as the Commissioner shall determine. The Contractor shall provide proof of insurance for the stored materials at the request of the Agency, and such proof shall be written in English and legible. The Contractor bears all risk and cost associated with storage and handling of materials until their incorporation into the Work, upon which the relevant provisions for inspection and guaranty apply.

OFFSITE STORAGE: Materials stored offsite may not be stored on the Contractor's premises except by written consent and according to the terms of the Commissioner. The Contractor shall set apart and separately store at the place or places of storage all materials and shall clearly mark same "PROPERTY OF THE CITY OF NEW YORK" and shall not at any time move any of said materials to another offsite place of storage without the prior written consent of the Commissioner. Materials may be removed from their place of storage offsite for incorporation in the work upon approval of the Resident Engineer.

ONSITE STORAGE: Where the materials are to be stored onsite, they shall be stored at such locations as shall be designated by the Resident Engineer and only in such quantities as, in the opinion of the Resident Engineer, will not interfere with the proper performance of the Work by the Contractor or by Other Contractors then engaged in performing work onsite. Such materials shall not, except for incorporation in the Work, be moved from their place of storage without the approval of the Resident Engineer.

TITLE: When requesting payment for such materials, the Contractor shall submit duly authenticated documents of title such as bills of sale, invoices or warehouse receipts along with the partial payment estimate. The executed bills of sale shall transfer title to the materials from the Contract to the City. In the event that the invoices state that the material has been purchased by a Subcontractor, the Contractor must submit bills of sale transferring title to the materials from the Subcontractor to the Contractor.

EXCEPTION: Where the Contractor with approval of the Commissioner has purchased unusually large quantities of materials, the Commissioner may waive the requirements of the preceding paragraph provided the Contractor furnishes evidence in the form of an affidavit and such other proof as the Commissioner may require that it is the sole owner of such materials and has purchased them free and clear of all liens and encumbrances. In such event, the Contractor shall pay for such materials and submit proof thereof, in the

same manner as provided in the preceding paragraph, within seven (7) days after receipt of payment therefor from the Comptroller. Failure on the part of the Contractor to submit satisfactory evidence that it has paid in full for all such materials shall preclude the Contractor from payments under this Contract.

PARTIAL PAYMENT: Upon proof to the satisfaction of the Commissioner of the actual cost of such materials and upon submission of proper proof of insurance, storage and title, the Agency will authorize payment in the amount of 85% of the lower of (1) the actual cost of such materials or (2) the estimated cost of such materials included in the approved detailed breakdown estimate submitted in accordance with Article 40 of the Standard Construction Contract.

PAYMENT OF BALANCE: Upon the incorporation into the Work of any such materials, which have been paid for in advance of such incorporation in accordance with the foregoing provisions, payment will be made for such materials incorporated in the work pursuant to Article 42 of the Standard Construction Contract, less any sums paid pursuant to this Article 8.

Nothing in this Article shall be construed to obligate the Commissioner or Agency to accept or agree to a partial payment request made pursuant to Article 42.2 of the Standard Construction Contract. Payment made pursuant to this Article does not operate as an acceptance of materials or a waiver of any Agency right under this Contract including inspection, approval and guaranty.

ARTICLE 9. [INTENTIONALLY OMITTED]

ARTICLE 10. THE SITE

ON-SITE "SUPER": The Contractor shall provide a qualified superintendent or site supervisor ("Super") who shall be continuously on Site when any Work is being executed. The Super shall be deemed to have the Contractor's authority to receive and execute any directions given by the Engineer.

CLEAN UP, MAINTENANCE AND PROTECTION: The Contractor shall, while the Work progresses and during the entire term of the Contract, keep the Site in a clean, well-maintained condition, free from rubbish and all undue accumulation of surplus materials. The Contractor shall protect and prevent damage to material, equipment and persons within and around the Site, and shall repair any damage done to the Work and the Site. All possible fire precautions shall be taken. The Contractor shall water and mow the grass and remove snow and ice from paths and roads as necessary from the Order to Work date until the date of Substantial Completion.

USE OF PRIVATE PROPERTY: The Contractor hereby agrees not to occupy property adjacent to the Site unless an affidavit or other agreement granting such permission has been obtained from the owners or lessees of said private property and approved by the Engineer. Copies of all such permissions shall be approved by the Engineer prior to the placement of any materials or on private property.

COORDINATION WITH OTHERS: For Standard Construction Contract Articles 12, 13 and 32 and this paragraph only, the definition of "Other Contractor(s)" is expanded to also include any entity authorized by the Commissioner or by law to enter the Site. The Contractor shall not require any Other Contractor to add the Contractor as an Additional Insured to the Other Contractor's insurance policy as a condition precedent to: 1) permitting the Other Contractor to access or perform work on the Site or 2) complying with Article 12 of the Standard Construction Contract or any other provision of this Contract.

ARTICLE 11. SUBMITTALS

Submittals by the Contractor to the NYC Parks Department ("the Agency") shall be made as required electronically to the Designer/Project Manager/Contract Manager with a cc to the Construction Director, Resident Engineer and the team's general shop drawings email address for In-house designed projects or electronically to the Consultant Designer with a cc to the Parks Consultant Project Manager, Construction Director, Resident Engineer, and the team's general shop drawings email address for Consultant-designed projects for approval or for record as specified in the Contract Documents. All email addresses will be provided at the pre-construction meeting.

GENERALLY:

Submittals include, but are not limited to: shop drawings; samples; catalogue cuts; manufacturers' manuals regarding installation, operation and maintenance; test reports; certificates, warranties and guarantees.

All submittals shall be accompanied by a dated transmittal sheet enumerating the contents of the submittal, and bearing the name, address and telephone number of the Contractor, and the name of the Contractor's project contact person.

WHEN REQUIRED:

Shop drawings and other submittals shall be furnished when specifically required in the Contract Documents, or when there is any departure from the materials, certifications or procedures specified in the Agency's Standard Details or the Contract Documents.

To the extent the Contract Documents do not fully detail or describe an aspect of the Work, the Contractor must furnish shop drawings and other appropriate submittals for approval prior to the start of any fabrication or construction.

EXCEPTION to REQUIREMENTS:

The requirement for the furnishing of shop drawings and other submittals may be waived by the Designer/ /Consultant Designer/Project Manager when the equipment, apparatus, device or material to be furnished conforms in all respects to the Contract Documents.

GENERAL REQUIREMENTS for SUBMITTALS:

A) For each item submittal, the Contractor shall submit electronically a PDF file of the submittal as well as a transmittal memo. The subject line of the email shall include all relevant information including the contract number, item number and item name the submittal is for (i.e. SD#### / Contract Number / Item # / Item Name). As mentioned above, for In-house designed projects, the Contractor shall email a PDF file of the submittal as well as a transmittal memo to the Designer/Project Manager/Contract Manager and cc the Construction Director, Resident Engineer and the team's general shop drawing email address. For Consultant-designed projects, the Contractor shall email a PDF file of the submittal as well as a transmittal memo to the Consultant Designer and cc the Parks Consultant Project Manager, the Construction Director, Resident Engineer and the team's general shop drawing email address.

B) For each sample submittal, the Contractor shall email photos of the samples (JPEG files less than 10 MB per email), a transmittal memo letting everyone know the samples are in the mail, and provide any relevant package tracking information. For very large and/or heavy samples, the Contractor and Resident Engineer shall coordinate with the In-house Designer/Project Manager/Contract Manager for In-house designed projects or the Consultant Designer and Parks Consultant Project Manager for Consultant-designed projects to have the samples made available for review either at the site or at the fabricator's/manufacturer's facility. The Contractor shall email photos of the samples and let everyone know the samples are available for review at the site or at the fabricator's/manufacturer's facility.

   If the sample is not too large or heavy, the Contractor shall follow the process below:

   1- For In-house designed projects, the email shall be sent to the Designer/Project Manager/Contract Manager and cc the Construction Director, Resident Engineer and

the team's general shop drawings email address. In the subject line of the email, the Contractor shall use the following format to identify all relevant information: SD#### / Contract Number / Item # / Item Name Sample. The Contractor shall ship or deliver the required number of samples as stated in the Contract Documents to the Designer/Project Manager/Contract Manager at the Olmsted Center. If the Contract Documents do not state how many samples are required, 2 (two) identical samples shall be sent.

2- For Consultant-designed projects, the email shall be sent to the Consultant Designer and cc the Parks Consultant Project Manager, Construction Director, Resident Engineer and the team's general shop drawings email address. In the subject line of the email, the Contractor shall use the following format to identify all relevant information: SD#### / Contract Number / Item # / Item Name Sample. The Contractor shall ship or deliver the required number of identical samples as stated in the Contract Documents – one to the Consultant Designer and one to the Parks Consultant Project Manager at the Olmsted Center. If the Contract Documents do not state how many samples are required, 2 (two) identical samples shall be sent (one directly to the Consultant Designer and one to the Parks Consultant Project Manager at the Olmsted Center).

C) The Contractor shall fully check and approve each submittal for completeness and compliance with the Contract Documents. The Contractor shall fully check and approve all material quantities, sizes, details, fabricating dimensions, temporary erection connections or closures, tolerances, and the proper fit or mating with adjacent materials. The Contractor shall also establish critical dimensions by means of field measurements taken from the work, arrange for fabrication to suit these dimensions and to fit actual construction conditions, and fully check and approve all information pertaining to fabrication processes and techniques of construction.

D) The Contractor shall identify deviations from the Contract Drawings and Specifications (hereinafter, "List of Deviations") and call attention to them by supplying a list of such deviations.

E) The Contractor shall require manufacturers of materials to provide installation specifications for the exact assemblies and construction as shown and required by the Contract Documents. The Contractor shall require manufacturers of materials to provide pertinent data establishing the compatibility and performance of their materials under the exact conditions shown and as required by the Contract Documents.

SPECIAL REQUIREMENTS for VARIOUS TYPES of SUBMITTALS:

Shop Drawings

The Contractor shall provide shop drawings showing the relationship of subject work to all related structures and contiguous work; show, identify and give dimensions of all external connections and attachments; and include notations on all physical, mechanical and electrical characteristics for products and equipment, as appropriate, for identification and coordination. Suppliers' standard drawings showing components may be submitted only if they clearly show exact items required as above. The Contractor shall also cross-reference and identify related work as well as provide composite shop drawings showing work of separate suppliers, when required, to ensure full coordination and proper fitting of the work and when so directed by the Designer/Consultant Designer/Project Manager and/or Engineer.

The term "By Others" (or the like) is not acceptable in the submission of shop drawings.

Brochures (including catalogue cuts, schedules and manufacturers' installation instructions)

The exact item submitted for approval must be clearly identified. When several pages are required to show an assembly, each page and item shall be clearly marked and the brochure shall be indexed for ready reference.

The Contractor shall furnish brochure submittals in the quantities required as detailed in the Contract Documents.

Samples

Samples shall reflect characteristics of the materials and finishes specified. Samples of any material to be used in the work must be furnished, whether samples are required in the specifications or not, upon request by the Engineer. All samples submitted must have all identifying information as specified above on a securely attached label. Pack samples to ensure arrival in prime condition. Samples will be retained unless otherwise specified (see Section A of this Contract). As mentioned above, for very large and/or heavy samples, the Contractor and Resident Engineer shall coordinate with the In-house Designer/Project Manager/Contract Manager for In-house designed projects or the Consultant Designer and Parks Consultant Project Manager for Consultant-designed projects to have the samples made available for review either at the site or at the fabricator's/manufacturer's facility.

The Contractor shall furnish the quantity of samples required in the Contract Documents. If a quantity is not specified, 2 (two) samples are required.

Test Reports (including design mixes and material tests)

The Contractor shall provide complete technical reports of laboratory test results, in acceptable form, showing all information necessary to establish the quality of performance of the work tested and provide a statement on whether the mixes, tests, etc., conform to the Contract Documents.

The above requirements shall not restrict or affect Agency's right to test materials itself.

Certificates and Labels

When specified, the Contractor shall furnish to the Agency authoritative evidence in the form of certificates of manufacture that the materials to be used in the Work have been manufactured and tested in conformity with the Contract Documents.

All such Certificates shall be on the letterhead of the certifying party and should be signed by an authorized representative thereof.

Warranties and Guarantees

When so required, the Contractor shall obtain all manufacturers' warranties and guarantees of all equipment and materials.

Sample warranties and guarantees shall be submitted to the Designer/Project Manager/Contract Manager or Consultant Designer according to the process outlined above to prove that the materials and equipment meet the provisions of the specifications prior to installation. After installation or application of all such warrantied or guaranteed equipment or materials, the Contractor shall document the date of installation or application and the telephone numbers of the manufacturers' distributor(s) and authorized representative(s). Upon completion of the project, all signed and dated warranties and guarantees shall be collected and submitted electronically as a PDF file to the Construction Director.

The Construction Director shall distribute the warranty and guarantee information electronically as a PDF file to the following:

1. Chief of Staff for Innovation and Performance Management
2. Borough Foreman of Mechanics
3. Agency Resident Engineer

The delivery of such manufacturers' warranties and guarantees shall in no respect relieve the Contractor from any obligation under the preceding provisions of these documents.

The submission shall be made upon completion of the project and shall be submitted prior to final payment. The submission of the above is required for all contracts and should NOT be waived.

Operations and Maintenance Manuals

The Contractor shall supply copies of manufacturer's literature for new equipment. The literature shall include instructions for normal operation, normal preventive maintenance schedules, parts breakdown and diagnostics, and a parts list for reordering.

All such manufacturer's literature shall be submitted electronically as a PDF file to the Construction Director. The Construction Director shall distribute these manuals to the following:

1. Chief of Staff for Innovation and Performance Management
2. Borough Foreman of Mechanics
3. Agency Resident Engineer (for delivery to site)

APPROVAL PROCEDURE:

Only those items highlighted, labeled and described in the List of Deviations (see "General Requirements for Submittals" section, paragraph D) will be reviewed by the Designer/Consultant Designer/Project Manager. Any changes or deviations from the Contract Plans and Specifications appearing in the submitted work which are not highlighted, labeled and listed will be deemed a material breach of this Contract. No approval for changes or deviations from the Contract Plans and Specifications can be given unless those changes or deviations are highlighted on the shop drawings and other submittals, as well as labeled and described in the List of Deviations. No oral modifications will be accepted.

Subsequently, submittals will be stamped or marked with one of the following, indicating whether or not any further actions will be required of the Contractor.

For In-house designed projects:

(a) APPROVED - If the submittal is satisfactory, the Designer/Project Manager/Contract Manager will stamp or mark the submittal "APPROVED," date it, and return it electronically to the Contractor. The Contractor may then proceed with fabrication.

(b) APPROVED AS NOTED - If the submittal requires minor corrections, the Designer/Project Manager/Contract Manager will note the corrections on the submittal, stamp or mark it "APPROVED AS NOTED," date it, and return it electronically to the Contractor.

Fabrication may proceed only after incorporating the noted corrections. Any questions or objections to such corrections shall be communicated to the Designer/Project Manager/Contract Manager immediately upon receipt by the Contractor of the returned submittal. Absence of such communication within 5 (five) working days should indicate the Contractor's acceptance of and compliance with the noted corrections.

(c) REVISE & RESUBMIT - Revise or correct the submittal or drawings and resubmit to the Designer/Project Manager/Contract Manager within 5 (five) days. The Contractor must revise the submittal and resubmit it to the Designer/Project Manager/Contract Manager to confirm the comments have been addressed.

In making corrections on submittals for resubmission, the Contractor shall make no changes beyond those noted or required unless such new or revised information is clearly identified and delineated on each resubmission as described in the section on List of Deviations.

(d) DISAPPROVED - If the submittal is unsatisfactory in the opinion of the Designer/Project Manager/Contract Manager, the submittal will be stamped or marked "DISAPPROVED" and returned electronically to the Contractor. Unsatisfactory submittals shall be corrected and redrawn by the Contractor and resubmitted to the Designer/Project Manager/Contract Manager.

The Contractor shall not proceed with that part of the work covered by the submittal, including purchasing, fabrication, delivery, or other activity until the revised resubmittal is approved by the Designer/Project Manager/Contract Manager.

(e) ACTION NOT REQUIRED (N/A) - Where a submittal is primarily for information or record purposes, the accompanying transmittal shall be copied, stamped or marked "ACTION NOT REQUIRED (N/A)" by the Designer/Project Manager/Contract Manager and returned electronically to the Contractor.

For Consultant Designed projects, the Consultant Designer shall follow the same dispositions as above. Once the submittal or sample is reviewed and given a disposition, the Consultant Designer shall scan and

save the submittal as a PDF file and email it to the Parks Consultant Project Manager. If the Consultant Designer's disposition approves something different than what was specified in the contract that was not previously discussed with and approved by the Parks Consultant Project Manager, the Parks Consultant Project Manager shall immediately bring it to the attention of the Parks Director of Landscape Architecture/Unit Director for further discussion to ensure a substitution is acceptable to the Agency and to determine if there's any cost impact to the project.

If the Agency is not in agreement with the Consultant Designer's disposition on the submittal, the Parks Consultant Project Manager shall have a discussion with the Consultant Designer to make it clear that the Agency does not approve of a substitution and provide written direction via email about how to proceed.

If Parks is comfortable with the disposition, the Parks Consultant Project Manager shall send the scanned submittal with the disposition back to the Contractor by replying to the email in which the shop drawing or notification of the sample was received, cc the Construction Director, Resident Engineer and the team's general shop drawing email address.

The Agency will make every effort to review submittals and respond to the Contractor in a timely manner.

ARTICLE 12. [INTENTIONALLY OMITTED]

ARTICLE 13. [INTENTIONALLY OMITTED]

ARTICLE 14. TREE WORK

PROTECTION OF EXISTING TREES:

The Contractor shall notify the Director of Tree Preservation by email a minimum of 48 hours in advance of any work on or impacting existing trees as described in this Article and to formulate a Tree Protection Plan where none exists.

A Tree Protection Plan shall be formulated and/or finalized in consultation with the Project Manager, Resident Engineer, and the Director of Tree Preservation or their designated authorized representative.

This plan should include, but not necessarily be limited to, the location of temporary wooden tree guards, construction fence, temporary snow fence boundary, range fencing, micro tunneling, hand and/or pneumatic excavation, soil compaction prevention and mitigation requirements and a pruning and fertilization schedule. In addition, the plan should address the Contractor's operations, including designated staging areas, site access and stockpiling of materials.

The Tree Protection Zone (TPZ) shall be defined as the area within the drip line of existing trees, unless otherwise shown on the Tree Protection Plan included in the Contract Documents.

TREE PROTECTION PLAN

Mandatory provisions of the Tree Protection Plan must always include at least the following provisions:

The Contractor shall not be permitted to park vehicles or equipment or to stockpile materials of any nature within the TPZ in order to minimize surface and subsurface root damage and soil compaction. This directive applies to all trees where the drip line is either fully or partially in the contract limit line.

All tree pruning and tree removal is to be performed by an arborist holding certification from the International Society of Arboriculture (ISA) or equivalent education and experience.

All contact between equipment and overhead tree limbs should be avoided. Bending or breakage of limbs is prohibited. If clearance pruning is proposed, it shall not be performed without the written permission

from the Director of Tree Preservation or their designated representative and then shall only be performed with professional equipment per the Agency's standards and specifications for such work.

All trees within the contract limit line are to receive at least one (1") inch (the equivalent of 750 gallons of water per 1000 square feet of Tree Protection Zone) of water per week between the months of March and October as directed by the Director of Tree Preservation or their designated representative. If rainfall in any given week is below this quantity, the Contractor must supplement the amount received by utilizing soaker hoses or as directed by the Agency. If a water source is unavailable at the site, then the Contractor must provide a water truck to apply the requisite amount of water.

Where excavation is performed within the TPZ for removal of existing features or installation of new work, the excavated area shall be backfilled immediately and/or roots shall be kept constantly moist with burlap covered with white plastic and checked a minimum of two (2) times a day, once in the morning and once in the afternoon, for a maximum of forty-eight (48) hours, until backfill is complete as directed by the Director of Tree Preservation or their designated representative. If directed, soaker hoses shall be installed to facilitate properly moist conditions. No pooling of water or continuous running water shall be permitted within the TPZ other than during the irrigation process.

The Contractor shall exercise extreme care in removing concrete or asphalt within the TPZ by lifting rather than dragging paving pieces. Tools and equipment for this activity shall be approved by the Director of Tree Preservation or their designated representative prior to the start of excavation.

Any excavation or trenching within a TPZ or elsewhere on the site as designated by the Director of Tree Preservation or their designated representative shall be performed by hand or pneumatic excavation, or micro tunneling.

If directed, the critical root zone of a tree shall be covered with wood chips to a depth of at least six (6) inches, with plywood or ground protection mats, or a combination thereof, in order to protect roots from damage caused by heavy equipment. Such covering shall be maintained during the course of construction and removed after the end of construction. Removal shall be by hand or as specified by the Director of Tree Preservation or their designated representative.

Tree guards with tree wraps and tree protection fences shall follow Parks specifications and standards and shall be installed as shown on the Tree Protection Plan. Fences and tree guards shall be maintained for the duration of the contract and shall not be removed or moved without written permission of the Director of Tree Preservation or their designated representative.

All tree protection fenced zones shall be so indicated with signage posted visibly on the fenced in area. Wording shall read "Tree Protection Zone", font to be Helvetica bold or Arial Black, 72 point minimum letters. Sign shall be 8 ½" x 11" in size, color of paper to be orange, laminated and fixed to fencing as directed. Signs shall be fixed to fence at thirty (30") foot intervals. Signs will be provided and installed by the Contractor. Contractor shall be responsible for maintaining signs for the duration of the Contract.

Plants shall not be placed within 3 feet of the tree trunk unless approved and all planting beds within TPZ can only be installed in the presence of the Director of Tree Preservation or their designated representative.

All excavation and plant installation within the TPZ shall be performed by hand, with minimal soil disturbance. No roots shall be cut without the written authorization of the Director of Tree Preservation or their designated representative.

TREE PROTECTION DEFICIENCIES

Failure to follow the tree protection guidelines in this Article 14 may result in assessment of liquidated damages. When a tree protection deficiency, as determined by the Director of Tree Preservation or their designated representative is identified, it must be remedied within 24 hours of notification by the Agency. Failure to correct the deficiency within this timeframe will result in a liquidated damages in the amount set forth in Schedule A of this Section.

REMEDIATION

In the event of damage to trees resulting from the Contractor's work or failure to follow Article 14 guidelines, as determined by the Director of Tree Preservation or their designated representative, any of the following site restoration or mitigation measures may be required by the Agency. These measures shall be assumed at the expense of the Contractor and shall only be performed with the approval and under the direction of the Director of Tree Preservation or their designated representative.

a) Soil analysis and fertilization. Soil testing may be required to determine fertilization and soil amendment applications.

b) Decompact tree. See specification.

c) Soil aeration or pneumatic excavation. See specification.

d) Pruning of dead or diseased tree branches.

e) Root collar excavation, to remove any soil that accumulated around the base of the tree during construction.

f) Tree irrigation, for up to one year after the end of construction. Method is to be as directed by the Director of Tree Preservation or their designated representative or as per the applicable specification.

g) Tree growth regulator.

h) Soil replacement in eroded areas.

i) Root pruning.

j) Bark tracing.

RESTITUTION

TREE DAMAGE: For trees that are injured during the course of construction but not destroyed, restitution will be enforced per Title 56 of the New York City Rules and Regulations, Chapter 5, Section 5-02(e) Injured Trees. Payment to the Department shall be the difference between the tree's condition appraisal, as per the NYC Parks Tree Valuation Method described in Section 5-02(a) before and after the damage. The damage assessment shall be determined by their designated representative. If no pre-damage assessment was made, the tree will be assumed to have been in perfect condition.

TREE DESTRUCTION/UNAUTHORIZED TREE REMOVAL: For trees irreparably damaged or destroyed and/or trees removed without authorization during the course of construction as determined by the Director of Tree Preservation or their designated representative, restitution will be enforced per Title 56 of the New York City Rules and Regulations, Chapter 5, section 5-02(c) and 5-02(d). Local Law 3 of 2010 shall apply and restitution shall be made according to the NYC Parks Tree Valuation Method, as determined by the Director of Tree Preservation or their designated representative. If no pre-damage

assessment was made, the tree will be assumed to have been in perfect condition. For irreparable tree damage, the tree shall be removed at the Contractor's sole expense.

Restitution as described above will be as determined and directed by the Director of Tree Preservation or their designated representative and may include the following:

1. Direct planting by the Contractor or its subcontractor of the required equivalent number of replacement trees at locations determined by the Director of Tree Preservation or their designated representative; or
2. A monetary credit for the value of the tree destroyed; or
3. A combination of (1) and (2) above, as determined by the Director of Tree Preservation or their designated representative.

QUARANTINE ZONE:

Contractors shall comply with Federal and State regulations for plant pest and disease control

Any QUARANTINE AREAS AND ORDERS FOR THE ESTABLISHMENT OF PROTECTIVE ZONE PROVISIONS: The Contractor is required to abide by all existing, new, or revised legislation and orders regarding quarantines and protective zones while working on this contract. Full information can be obtained from Federal and State pest and disease control agencies and personnel.

UTILITY PRUNING REQUIREMENTS:

Wires shall be treated as live and high voltage until verified by the utility. Branches touching wires shall be pruned by the utility before work begins. Limbs and branches shall not be dropped onto overhead wires. If limbs or branches fall across electrical wires, all work shall stop immediately and the utility shall be notified.

When climbing or working in trees, pruners shall try to position themselves so that the trunk or limbs are between their bodies and electrical wires. Pruners shall not work with their backs toward electrical wires. A bucket truck is the preferred method of pruning when climbing poses a greater electrical contact threat.

Personal protective gear shall have appropriate all-electric characteristics needed for working near electricity.

ARTICLE 15. [INTENTIONALLY OMITTED]

ARTICLE 16. DEW POINT CHART FOR PAINTING

The following chart shall serve as a guide in finding the minimum allowable temperature for paint application under the various items of this Contract. The painting Contractor is required to carry a surface temperature thermometer to prove that the surface temperature is above the minimum as required in this Chart:

DEW POINT CHART (Degrees Fahrenheit)

Ambient Air Temperature

Percent Relative Humidity	20	30	40	50	60	70	80	90	100	110
90	18	28	37	47	57	67	77	87	97	107
85	17	26	36	45	55	65	75	84	95	104
80	16	25	34	44	54	63	73	82	93	102
75	15	24	33	42	52	62	71	80	91	100
70	13	22	31	40	50	60	68	78	88	96
65	12	20	29	38	47	57	66	76	85	93
60	11	19	27	36	45	55	64	73	83	92
55	9	17	25	34	43	53	61	70	80	89
50	6	15	23	31	40	50	59	67	77	86
45	4	13	21	29	37	47	56	64	73	82
40	1	11	18	26	35	43	52	61	69	78

DEW POINT: Temperature at which moisture will condense on surface. No coatings should be applied unless surface temperature is a minimum of 5 degrees F above this point. Temperature must be maintained during curing. To calculate the proper surface temperature, use the above charts follows:

EXAMPLE: If air temperature is 70 degrees F and relative humidity is 65%, the dew point is 57 degrees F. No coating should be applied unless surface temperature is 62 degree F minimum.

ARTICLE 17. CONSTRUCTION CODES

The New York City Construction Codes (set forth in Title 28 of the New York City Administrative Code, as amended) ("Code" or "Codes") shall be considered a part of these specifications and all provisions of the Code which may apply to the work of this contract are part of these specifications as if repeated in full herein and shall be preferred to any provisions herein which may conflict.

ARTICLE 18. ENVIRONMENTAL AND SAFETY MANAGEMENT

This Article covers the requirements for a Construction Health and Safety Plan ("CHASP"). The Contractor shall prepare a CHASP that covers any visitor and Agency employees working at the Site. The plan shall be prepared by a New York State Qualified Environmental Professional (QEP) described in 6 CRRNY Part 375-1.2(a-k) or equivalent education and experience, as determined by the Agency. The Contractor shall follow the instructions of this Article for activities associated with the Contractor's conformance with 29 CFR 1926 (OSHA's Safety & Health Regulations for Construction), as well as Contractor's workers and the public's potential for being exposed to typical urban park soils (during the period of construction) and any chemicals brought to the construction site by Contractor's personnel (including equipment fuel and coolant).

The Contractor shall prepare and submit to the Agency a site-specific CHASP for each category of the Contractor's personnel performing soil excavation work or other work that requires personal protective equipment (PPE), designed to protect workers from serious workplace injuries or illnesses resulting from contact with chemical, physical, or other workplace hazards. Examples of PPE include gloves for protection of hands, hard hats for the protection of the head, goggles for eye protection, dust mask for respiratory protection, and protective coveralls for the protection of skin and prevention of contaminants adsorbing onto personal clothing. Also, the Contractor shall identify precautions to be taken to avoid chemical exposures by the public who may be in areas proximate to the Site. Contractor must consider site specific activities and conditions before selecting the level of worker protection and be prepared to adjust protective levels immediately should field conditions warrant a change. If site-specific data is absent or incomplete, the Contractor shall assume that the site soil is urban fill possessing chemical constituents exceeding Restricted Residential Soil Cleanup Objectives (RRSCO) of 6 CCRNY Part 375-6.8(b).

The Contractor shall update the CHASP as required by addendum in the event of key site safety officer or site personnel changes and any substantive changes to the scope of work that may change worker protection methods or activities.

The CHASP shall, at a minimum:

Identify a Contractor representative who shall perform as the Site Safety Officer ("SSO") during the entire period of construction at the Site. The SSO shall be responsible for compliance with all State, local, and OSHA health and safety regulations. The SSO's name and mobile phone number shall be listed in the CHASP Emergency Contact List, along with that of the Agency's Resident Engineer (RE). Also included in the list are authorities to be called in case of emergencies, including chemical spillage.

List all chemical compounds (solids, liquids, and gases) and their reportable quantities (RQs) (i.e., reportable to the DEC, U.S. Coast Guard, US EPA, etc.) that the Contractor plans to bring to the site that, if spilled, would obligate the Agency to report them to City, State, and federal authorities (i.e., prepare a Spill Prevention Control and Countermeasures ("SPCC") Section of the CHASP). Typical construction equipment chemicals include gasoline (RQ of 5 gallons), diesel fuel (RQ of 5 gallons), and ethylene glycol (antifreeze coolant) (RQ of 1 pound). The SPCC must include this statement: The Agency will make all spill reports to NYS DEC and other appropriate agencies unless there is a risk that the 2-hour deadline for spill reporting will not be met; in that case, the Contractor may make the calls using the phone numbers listed in the Emergency Contact List Section of the CHASP and inform the Agency about such calls.

Provide a map to the nearest hospital emergency room, with the travel route clearly marked, with name and phone number of the hospital in the Hospital Emergency Room Directions Section of the CHASP.

SUMMARY OF DELIVERABLES: The CONTRACTOR shall submit the CHASP to the Agency within thirty (30) days of Order to Work (OTW) date, and must, at a minimum, include the following information:

Identity of the Contractor's SSO and the Agency's Resident Engineer including their mobile phone numbers.

Spill Prevention Control and Countermeasures (SPCC) Hospital Emergency Room Directions

Emergency Contact List

Site-specific precautions the Contractor will take to comply with 29 CFR 1926 regulations Where current or historic environmental Site data has been provided by the Agency, this data should be included as an appendix to the CHASP.

ARTICLE 19. LICENSED PLUMBER REQUIREMENTS

It shall be unlawful for any person to perform plumbing work unless such person is a licensed master plumber ("Master Plumber") as defined in the New York City Construction Codes, or is working under the direct and continuing supervision of a Master Plumber, either personally or through one or more, butmore than three, levels of competent supervision over individuals performing the actual Master Plumber trade work who are: (a.) in the direct employ of an individual who is a Master Plumber; or (b.) in the direct employ of a plumbing business employing the Master Plumber licensee(s) in accordance with the limitations and requirements set forth for such business in the New York City Construction Codes; or, (c.) in the direct employ of a plumbing business where one (1) or more Master Plumbers uses his(her) license on behalf of such business, provided that such business is properly disclosed to the New York City Department of Buildings pursuant to New York City Construction Codes.

Unless the Contractor is such a Master Plumber or plumbing business properly employing such licensee(s) in accordance with the limitations and requirements set forth for such business in the New York City Construction Codes, the Contractor shall subcontract all plumbing work to such a Master Plumber or plumbing business properly employing such licensee(s) in accordance with the limitations and requirements set forth for such business in the New York City Construction Codes. Copies of a valid Master Plumber license issued by the New York City Department of Buildings to such Master Plumber or Master Plumber licensee(s) affiliated with such business shall be made available the Department for inspection upon its request.

ARTICLE 20. LICENSED ELECTRICIAN REQUIREMENTS

It shall be unlawful for any person to perform electrical work unless such person is a licensed master electrician ("Master Electrician") as defined in the New York City Construction Codes, or is working under the direct and continuing supervision of a Master Electrician, either personally or through one or more, but no more than three, levels of competent supervision over individuals performing the actual Master Electrician trade work who are: (a.) in the direct employ of an individual who is a Master Electrician; or (b.) in the direct employ of an electrical business employing the Master Electrician licensee(s) in accordance with the limitations and requirements set forth for such business in the New York City Construction Codes; or, (c.) in the direct employ of an electrical business where one (1) or more Master Electricians uses his(her) license on behalf of such business, provided that such business is properly disclosed to the New York City Department of Buildings pursuant to New York City Construction Codes.

Unless the Contractor is such a Master Electrician or an electrical business properly employing such licensee(s) in accordance with the limitations and requirements set forth for such business in the New York City Construction Codes, the Contractor shall subcontract all electrical work to such a Master Electrician or an electrical business properly employing such licensee(s) in accordance with the limitations and requirements set forth for such business in the New York City Construction Codes. Copies of a valid Master Electrician license issued by the New York City Department of Buildings to such Master Electrician or Master Electrician licensee(s) affiliated with such business shall be made available the Department for inspection upon its request.

ARTICLE 21. CODE AND INDUSTRY STANDARD REFERENCES

When reference is made to the standards of any technical society, organization, or body; it shall be construed to mean the latest standard, code, specification, or tentative specification adopted and published. Governing Federal, State, and Local law shall always control in the event of a conflict. When no reference is made to a code, standard or specification, the standards of the ASTM or AIEE shall govern.

ABBREVIATIONS: Reference to the technical society, organization or body may be made in the Specifications in accordance with the following lists:

ACI	American Concrete Institute
AGA	American Gas Association
AGMA	American Gear Manufacturers Association
AIEE	American Institute of Electrical Engineers
AISC	American Institute of Steel Construction
API	American Petroleum Institute
ASA	American Standards Association
ASCE	American Society of Civil Engineers
ASME	American Society of Mechanical Engineers
ASTM Des.	American Society for Testing Materials Designation
AWSC	American Welding Society Code
AWWA	American Water Works Association
BS&A	New York City Board of Standards & Appeals
CIPRA	Cast Iron Pipe Research Association
DCAS*	Dept. of Citywide Administrative Services (NYC)
DEP	Dept. Of Environmental Protection (NYC)
FED. SPEC.	Federal Specifications
IPCEA	Insulated Power Cable Engineer's Association
NAVY Spec.	Navy Department Specification
NEC	National Electric Code
NEMA	National Electrical Manufacturers Association
NYBC	New York City Building Construction Code (f/k/a New York City Building Code)
NYEC	New York City Electrical Code
N.Y. Spec.*	New York City Dept. for Purchase Specifications
PPS	Power Piping Society
SAE	Society of Automotive Engineers Standards

* These Specifications may be viewed or obtained free of charge at the Office of Vendor Relations, Municipal Building, 1 Centre Street, 18th Floor, NY, NY (212) 669-8562.

ARTICLE 22. CLAIMS FOR OTHER REMEDIES

If the Commissioner exercises his/her rights pursuant to the Contract to complete or cause to be completed any or all unsatisfactory or uncompleted punch list Work that remains after the completion date in the Final Approved Punch List, the Contractor shall not make, assert, institute or maintain any claim or action against the City for damages unless the Contractor has strictly complied with all requirements relating to the giving of notice and of information with respect to such claims, and such action is commenced within six (6) months of the date the Commissioner exercises said right.

ARTICLE 23. PROGRESS SCHEDULE

In the event the Contractor cannot adhere to its approved progress schedule, the Contractor shall provide a revised progress schedule within fifteen (15) days of the Agency's request. The Contractor's failure to submit a revised progress schedule in a form acceptable to the Agency shall be deemed a material breach of this Contract. The Contractor will not receive any payment until the proposed or revised progress schedule is submitted and approved. This requirement supplements Article 9.4 of the City of New York Standard Construction Contract.

ARTICLE 24. [INTENTIONALLY OMITTED]

ARTICLE 25. [INTENTIONALLY OMITTED]

ARTICLE 26. ENGINEER'S DIRECTIVES

The Contractor shall verify all dimensions, quantities and details shown on plans, sketches, schedules or other direction received from the Engineer, and shall notify the Engineer pursuant to Article 10 of the Standard Construction Contract of all errors, omissions, conflicts and discrepancies found therein. Failure to discover or correct errors, conflicts or discrepancies shall not relieve the Contractor of full responsibility for unsatisfactory Work, faulty construction or improper operation resulting therefrom nor from rectifying such conditions at its own expense.

ARTICLE 27. [INTENTIONALLY OMITTED]

ARTICLE 28. SURVEYS AND LANDMARKS

PRESERVATION OF LANDMARKS: The Contractor shall preserve all stakes and marks except where the Engineer directs their relocation or removal. If, in the opinion of the Engineer, any survey or construction stakes or marks have carelessly or willfully been destroyed or disturbed by the Contractor, the cost of replacing them shall be charged against the Contractor and will be deducted from payment for the Work.

NONDISTURBANCE OF MONUMENTS: Except upon the express written permission from the President of the Borough in which the project is located or other governmental agency concerned, the Contractor shall not excavate within five (5) feet of or otherwise disturb any monuments, bolts or bench marks belonging to the City or any other government agency as may exist within the Site. Should the Contractor encounter such monuments in the course of the Work, it shall cease its Work at such locations until the monuments have been referenced, reset or otherwise disposed of to the satisfaction of the Engineer.

ARTICLE 29: FINAL PAYMENT CERTIFICATES AND DOCUMENTS

All "As-Built" drawings, photographic documentation, guarantees, warranties, certifications, foundry certificates, time extensions and/or verified statement of claims required under the Contract Documents shall constitute "required" certificates and documents as set forth in Article 45 (Final Payment) of the Standard Construction Contract.

ARTICLE 30: MAINTENANCE AND PROTECTION OF TRAFFIC

The Contractor must conduct its operations so as to avoid interference with the passage of vehicles, pedestrians and all other kinds of public traffic to the extent practicable. The Contractor must take every precaution against accidents happening to such vehicles, pedestrians and other traffic because of its operations. The costs of labor and material, personnel, lights and any additional supplies or services necessary to maintain and protect traffic on account of the Contractor's operation throughout the Work is deemed included the Contractor's bid price unless otherwise specified.

ARTICLE 31. PRESERVING NATURAL FEATURES

The Contractor shall protect trees, shrubbery and other natural features on the property of the Agency and adjacent owners from being cut, trimmed, or injured, except to the extent ordered by the Engineer for cleaning the Site or performing the Work. The Contractor shall prevent its employees and subcontractors from tramping in landscaped areas, and shall prohibit horses or vehicles from being driven through wooded lands. The Contractor shall protect trees adjacent to the Site with plank wells as necessary.

ARTICLE 32. RESTORATION

LANDSCAPED AREAS: All roadway and walk pavements, sodded and planted areas, structures and substructures not specifically provided for in the Engineer's estimate which are disturbed by the Contractor shall be carefully protected and restored to their original conditions by the Contractor in a manner satisfactory to the Engineer and at no cost to the Agency. The Contractor shall do all work necessary to connect new construction to existing construction at no cost to the Agency.

STREETS: For street openings, the restoration shall consist of either three-inch asphaltic concrete on a six-inch concrete base or three-inch sheet asphalt on a six-inch concrete base; whichever type most nearly matches the existing pavement. Pavement shall be restored according to the standard specifications of the New York City Department of Transportation.

ARTICLE 33. CRANE AND DERRICK SAFETY

Use of cranes and derricks shall comply with Section 3319 of the New York City Building Code, and Occupational Safety and Health Administration, OSHA 29 CFR 1926 Subpart CC, "Cranes & Derricks in Construction". The Contractor shall submit to the Agency, fifteen (15) days prior to the Order to Work date, the means and methods for use of all cranes and/or derricks that the Contractor intends to use to perform the Work. The Contractor shall submit proof of any and all necessary permits from all oversight agencies regarding the operation and use of the cranes and/or derricks prior to transporting the equipment to the Site. The Contractor shall also submit the names of the authorized representative who will inspect the crane(s) and/or (derrick(s), any operator(s) of the crane(s) and/or derrick(s), and proof that the operator(s) is certified to operate the crane. The Contractor shall not transport the crane to the Site nor operate it without prior written approval from the Agency.

----------END OF PAGE----------

ARTICLE 34. AWARD AMOUNT

This is a fixed sum contract. The not-to-exceed amount of this contract is $2,325,000.00 (TWO MILLION THREE HUNDRED TWENTY FIVE THOUSAND DOLLARS).

Pursuant to General Conditions, Section C – Special Provisions, Article 3, Schedule A of this contract, the successful bidder shall submit Performance Bonds and Payment Security for 100% of the award amount of the contract.

The bid schedule indicates the Agency's estimated quantity for each item of Work. The Contractor shall have no basis for claim or damages for any variation between the estimated quantity advertised for bid and the final quantity of any item. The Contractor agrees to provide overruns in accordance with Article 26 – Methods of Payment for Overruns and Extra Work.

ARTICLE 35. [INTENTIONALLY OMITTED]

ARTICLE 36. REGULATIONS FOR PRIVATE AND NON-EMERGENCY SERVICE AGENCY VEHICLES OPERATING ON PARK AREAS, PATHS AND CLOSED PARK ROADS

In many cases, contract, governmental or private vehicles are authorized to operate within park areas such as park paths, closed park roads and recreation spaces. No private or non-emergency service governmental agency vehicle may operate on these park areas without specific authorization from City of New York, Parks & Recreation. Vehicles authorized to operate in park spaces must ensure the safety of all park patrons and exercise the highest level of caution. The following guidelines must be adhered to:

Permits: All vehicles authorized to work in park spaces, including contractor vehicles, vehicles involved with special events, or other authorized uses, must display an official Parks Permit for the purpose and noting the date and time of authorized use.

Operating within park areas:

1. When within a park, vehicles must operate on designated park drives or roads only. Vehicles may operate on park paths or in park use areas, such as playgrounds or lawns, only when essential to performing required work and with Parks specific approval. Private vehicles may never go through a park area simply for convenience.
2. Even when authorized to perform work on a park area, a private vehicle may never operate on a lawn, ballfield, outdoor pool, boardwalk, or playground unless they are closed or another person is outside and in front guiding the vehicle. The guider must be dedicated and focused to this task. Guiders shall also be used whenever a vehicle is operating in a crowded or tight space within a park area.
3. *Traffic lights and signs must be obeyed at all times, including on closed park roads.*
4. Vehicle flashers and hazard safety lights must be in use whenever a vehicle is on a parks path or area. When appropriate, horns may also be used to alert pedestrians.
5. Always yield to pedestrians, skaters, bikers, joggers, and park users within Parks property. They always have the right of way. Always obey a 5 mph speed limit on pedestrian paths and a 15 mph speed limit on park drives.
6. Be aware of the height, width and line of sight of the vehicle. Vehicles such as dump trucks may have high lines of sight that can impede the view of ground objects.
7. Plan the safest route possible. Use the park entrances closest to your work site and always follow the safety plan for the event or project.
8. Vehicles may not be stored on Parks property without written Agency authorization.
9. Please be alert to and follow any posted signs or instructions from Parks staff. Violators of these rules subject their vehicles to possible towing, cancellation of permit and denial of future permits, and other related contract or event sanctions. To contact Parks, call 311.

ARTICLE 37. USE INSPECTION

It is the intent of the contract to complete the work, including but not limited to stump removals, tree removals, tree guards, concrete pavements, and defective work, as expeditiously as possible. The "Use" inspection shall only be granted when ALL required work and complaints under this contract have been completed. Property damaged during construction including but not limited to fences, furniture, equipment, landscape, utility, sidewalk, paths, and lawn areas shall be repaired, replaced, and/or reseeded before such "Use" inspection is granted. At the discretion of the Project Manager, "Use" inspections may be granted for significant portions of work performed, specifically as it relates to initiating guarantee periods in a timely manner including but not limited to planted trees, concrete, and installed tree guards.

If weather and/or field conditions preclude the possibility of laying tree bed pavements, resolving complaints/defective work, and/or installing tree guards, the Contractor will be required to submit a progress schedule or other documentation which clearly outlines the Contractor's intent to advance the work when field conditions are more favorable. Upon approval of such documentation by the Project Manager, a "Use" inspection shall be granted.

ARTICLE 38. UTILITIES, SERVICES, AND PERMITS

1. **SIDEWALK OPENING PERMITS:** A "sidewalk opening permit" shall be required for each location (or block, as applicable) where a tree bed is to be sawcut and/or excavated within the public right-of-way. Permits will be issued by the NYC Department of Transportation provided the provision in Article 40 is strictly observed, and all insurance and bonding requirements are met. Contractors are responsible for renewing permits as required.

2. **UTILITIES & SERVICES:** It is the Contractor's responsibility to detect and protect existing utilities from damage during construction. Prior to the start of construction, the Contractor is required to notify:

   New York 811 website: http:/www.ny-811.com
   (800) 272-4480 (Admin); (800) 524-7599 (Fax)
   E-mail: NY@occinc.com

   when excavation, saw cutting, stump grinding, or related digging operations are to be conducted of any item of work that is deemed part of the original contract provisions or is specifically ordered by the Agency.

   New York State General Business Law Article 36 and New York State Public Service Law Section 119-b, as set forth in Code Rule 753 mandates that the Contractor notify all underground facility operators in the area not less than two (2) and not more than ten (10) business days before the start of excavation to ensure that utility service lines are properly marked prior to excavation.

   The Contractor's obligation to protect utilities, including water infrastructure, is not relieved by calling the One-Call Center. The Contractor shall understand that not all utilities will be identified by the One-Call Center and the Contractor is still responsible to locate these and other utilities, to the best of their ability, using electronic probes, or other methods, prior to the start of excavation. The Contractor shall then proceed cautiously and perform hand excavation, as necessary, to protect the utility as directed by the Project Manager, at no extra cost to the City. If a utility is inadvertently damaged, it is the Contractor's responsibility to restore that utility to operating condition, equal to that existing prior to damage. The Contractor shall remain at the site with the damaged utility until it has been restored and there is no danger to the public (i.e. exposed live electrical wires, etc.).

The Contractor shall provide, operate and maintain a pipe and cable locator similar to Fisher Research Laboratory's TW6 or Mitchell Instrument Company's C6TW6, or approved equal.

1. The instrument shall be kept in good condition.
2. The Contractor shall supply the necessary or required accessories, and labor that may be required to locate underground pipes, valves and manholes.
3. The payment for the above shall be deemed included in the price bid for the various items in the work.

All NYCDOT permits, bonding, 811 tickets, etc., shall be obtained without additional expense to the City and should be deemed included in the unit price bid for the appropriate contract items. This shall apply to all permits and bonding obtained by the Contractor.

ARTICLE 39. [INTENTIONALLY OMMITTED]

ARTICLE 40. WORK AREA

- All pedestrian and/or vehicular traffic control and/or protection shall comply with Occupational Safety and Health Administration (OSHA) and Manual on Uniform Traffic Control Device (MUTCD) standards, specifically, though not limited to, MUTCD PART 6 "TEMPORARY TRAFFIC CONTROL". The Agency reserves the right to increase safety requirements above those required by OSHA and/or MUTCD at no additional cost to the city.
- All maintenance and protection of traffic shall follow the stipulations set forth by the current NYCDOT OCMC traffic stipulations relevant to this contract. Contractor shall be permitted to occupy an eight-foot lane adjacent to the curb. Traffic shall not be fully blocked off at any time during work operations unless approved by NYCDOT and/or the Project Manager.
- When staging in the roadway, channeling devices such as cones must be used to delineate the work area with sufficient buffer for traffic and workers; adequate tapers and transition areas must be used to protect the public and workers from the work activity area. Signs must be used to alert vehicles that are approaching a work zone.
- Flag Persons "Flaggers"/Temporary Traffic Control (TTC) Workers: All work operations must be staffed with dedicated TTC workers in accordance with ANSI Z133.1 and MUTCD. The contractor must have the ability to increase flagger capacity throughout the work day to meet the situational requirements of each work area, both on the roadway and on the sidewalk, and/or as directed by the Project Manager. "STOP/SLOW" paddles shall always be used.
- A clear path on the sidewalk must always be maintained. If the TTC zone of the work area affects the movement of pedestrians, adequate pedestrian access and walkways shall be provided, including the placement of signage to alert pedestrians that they are approaching a work zone. A minimum of six (6) 28" tall orange reflective cones must be placed around each work area with cone bars attached, and any additional cones or safety equipment as directed by the Project Manager to prevent pedestrians from walking into an open excavation. Trees, stakes, mulch and soil are to always be staged on site with a clear path on the sidewalk maintained in adherence with ADA standards. Consideration should be made to separate pedestrian movements from both worksite activity and vehicular traffic. Unless an acceptable route that does not involve crossing the roadway can be provided, pedestrians should be appropriately directed with advance signing that encourages them to cross to the opposite side of the roadway. These signs should be placed at intersections (rather than midblock locations).
- Working on two sides of the street simultaneously is prohibited unless otherwise approved by the Project Manager.
- Contractor shall follow all requirements, laws, rules, and codes, set forth by NYCDOT in relation to construction activities within bus stops, bus lanes, bike lanes, and any other regulated travel or parking areas.

ARTICLE 41. LOCATIONS AND QUANTITIES

1. After award of the contract, and prior to each season, a list of site locations, bed types and species will be given to the Contractor. The Project Manager reserves the right to adjust the list of locations.
2. The quantities are approximate only and are given as a basis for the uniform comparison of bids and are not in any way guaranteed or represented as correct or intended to be relied upon and shall form no basis for any claim in case they do not correspond with the final measurement of quantities. It is further understood that the Department of Parks and Recreation reserves the right to increase, diminish or omit these quantities.
3. The tree beds shall be constructed as directed by the Agency to ensure a healthy growing environment for the tree.
4. A progress schedule that accurately reflects all work assigned by the Agency shall be submitted on a seasonal basis for review. At the discretion and direction of the Project Manager, adjustments shall be made to the schedule and shall be submitted to the Agency for approval within 3 business days. The accepted format for all progress schedules must be in accordance with Article 9 of the Standard Contract.

ARTICLE 42. PERFORMANCE

Due to the seasonal nature of the work of this contract and because of the importance of honoring commitments made by Parks to perform work within specified timeframes, it is imperative that adequate performance by the Contractor is assured. Productivity requirements will be prorated for weeks with a federal holiday.

It is a specific requirement of the contract that the following performance standards apply to the work of a single crew, unless otherwise approved by the Project Manager. Accordingly, the following shall be required:

1. The Agency shall solely determine the beginning and end of "planting season" for each individual contract, based on weather conditions and availability of plant material. When directed by the Agency, the Contractor shall plant any priority planting sites within one (1) week of notification.

2. If trees are not immediately available for delivery after sites have been marked and a "Post Marking Book" has been issued to the Contractor, unless otherwise approved by the Agency, the Contractor shall prepare tree beds ("pre-excavate") and maintain a minimum productivity of four thousand eight hundred (4,800) square feet per week. At the discretion and direction of the Agency, this productivity minimum may be adjusted to a higher amount to achieve contract goals.

3. Once available, a minimum of 4 nursery truckloads per day shall be accepted by the contractor. At the discretion and direction of the Agency, the number of truckloads delivered per day may be adjusted based on contract goals and contractor availability. Under no circumstances shall the lack of a "Post Marking Book" from the Agency delay the delivery of trees to the Contractor.

4. Unless otherwise approved by the Project Manager, the Contractor shall begin planting operations no more than one week after all trees have been delivered to the Contractor and a "Post Marking Book" has been issued to the Contractor, whichever is later. After beginning planting the Contractor shall plant a minimum of one hundred twenty (120) trees per week, including associated tree bed preparation if not previously completed. At the discretion and direction of the Agency, this productivity minimum may be adjusted to a higher amount to achieve contract goals.

5. Paving and restoration work, weather issued in a "Post Marking Book" or "Outstanding Work List", shall begin no later than three (3) weeks after all trees in the associated "Post Marking Book"

   have been planted and shall continue until all paving and restoration work is complete. If the paving and restoration work is issued in a "Post Marking Book" that does not include any adjacent tree plantings or excavation work, the paving and restoration work shall begin no later than three (3) weeks after the "Post Marking Book" is issued and shall continue until all paving and restoration work is complete. Contractors shall submit "Cold Weather Concrete Plans" for approval by the Agency to install concrete during cold temperatures.

6. Tree guard installation shall commence for sites no later than eight (8) weeks after sites have been given to a contractor through a "Post Marking Book" where there is no associated tree planting or after the tree bed has been excavated, whichever date is later and shall continue until the Project Manager determines weather conditions prohibit further installation and shall be completed at a minimum rate of 800 linear feet of tree guards installed per week or as otherwise approved by the Project Manager. At the discretion and direction of the Agency, this productivity minimum may be adjusted to a higher amount to achieve contract goals. At the direction and discretion of the Project Manager, the Contractor shall provide proof of payment or other documentation necessary to verify the ordering, manufacture, and delivery of materials to complete this work.

7. All non-seasonal work not related to or contingent on tree planting shall be completed no greater than eight weeks after being given to the Contractor in a "Post Marking Book" unless otherwise approved by the Project Manager.

Liquidated Damages: If the Contractor fails to initiate and maintain these levels of productivity, the Agency reserves the right to assess liquidated damages of $195 per tree, $75 per linear foot of tree guards, or $5 per square foot of tree beds not prepared (the difference between the minimum required production as defined above and the actual weekly production). Furthermore, the Contractor's failure to meet the above minimum performance requirements may be considered a material breach of this contract and result in the default of the Contractor in accordance with Article 48 of the agreement.

ARTICLE 43. [INTENTIONALLY OMITTED]

ARTICLE 44. [INTENTIONALLY OMITTED]

ARTICLE 45. [INTENTIONALLY OMITTED]

ARTICLE 46. SIGNS

The Contractor shall have secured to each vehicle (such as dump and pick up trucks) used during the performance of this contract, a sign measuring two (2) feet by three (3) feet with font Akkurat Bold and Akkurat regular, font colors PMS368C, and font size 150/152 (bold part), 110/112 (Mayor and Commissioner names), and 90/92 (URL). Sign template will be provided by NYC Parks prior to construction.

Sign will be read as follows:

The Contractor's name address and telephone number are to be legibly printed in three (3) inch high letters on both truck doors.

After two warnings by the Project Manager, any vehicle arriving on the site without the above described sign may be barred from the site at the discretion of the Project Manager.

The cost of the sign shall be considered as part of the contract bid price.

ARTICLE 47. TERM OF CONTRACT AND RENEWAL OPTION

The term of this contract shall be three hundred sixty-five (365) consecutive calendar days from the original order-to-work date.

At the discretion of the Commissioner, the Department of Parks & Recreation may exercise an option to renew the contract with substantially unchanged terms and conditions as the original contract, but quantities, lists, or schedules or items to be supplied may be revised, at an amount to be determined by the funds available at the time of renewal. The contract may be renewed one time for a period of three hundred sixty-five (365) consecutive calendar days. An important consideration in the decision to renew will be the Contractor's performance evaluation for work during the original contract.

PRICE ESCALATION UPON RENEWAL

If the renewal option is exercised, the contractor's bid prices will be subject to a 4% increase for the term of the renewal contract.

ARTICLE 48. CONTRACTOR, PERSONNEL AND EQUIPMENT QUALIFICATIONS

1) **CONTRACTOR:**
   The Contractor shall have successfully completed tree planting projects of similar scope and scale. The Contractor should have three (3) years of experience in horticulture and Tree Planting.

The Contractor shall use trained persons directly employed and/or supervised by the Contractor. The current prevailing wage rates and supplemental benefits, as established by the Office of the Comptroller of the City of New York, shall be paid to all assigned personnel. The Contractor can exceed these rates. However, the Contractor shall not use lower rates.

The Contractor or their authorized representative shall be present on the work site at all times while work is being performed to receive and promptly execute all orders or directions of the Project Manager. The foregoing provision shall be complied with irrespective of whether work is being performed by the Contractor or their subcontractor's forces.

The Contractor shall maintain daily communication with the Project Manager. The Contractor shall refer any questions and/or complaints regarding work under this contract to the Project Manager.
The City of New York reserves the right to change the scope relating to work requirements.

2. PERSONNEL:

JOB SUPERVISOR/COORDINATOR/PROJECT MANAGER

The job supervisor/coordinator/project manager shall oversee and coordinate the activities of planting and removal crews as directed by the Project Manager. They shall be responsible for the crew abiding by the contract specifications, submitting all appropriate paperwork in a timely manner, and acting as a liaison with the Project Manager.

CREW QUALIFICATIONS:
The contractor shall effectively staff the work with competent workers, including a foreperson that is on site with each crew at all times. Unless specifically noted below, crew sizes and qualifications shall reflect the requirements of the specific work being performed, both in a safe and progressive manner, employing all applicable labor trade classifications required by law to facilitate public work. The agency may direct the contractor to adjust its means and methods as it relates to crew size and deployment if the contractor does not meet the production requirements of the contract. Each tree planting or removal worker shall be experienced and highly qualified with the necessary horticultural skills to successfully complete this contract. Said skills shall also include worker safety and ability in compliance with current OSHA and ANSI Z-133.1 Standards. Only qualified employees with horticultural experience are to be assigned to this contract for the trimming, maintaining, planting and/or removal of trees and the disposal of generated tree debris from street and parkland trees under the jurisdiction of Parks.

TREE REMOVAL: A crew is defined for tree removal operations as at least five (5) crew members. One (1) aerial lift operator or climber aloft and engaged in tree cutting with a chainsaw and/or hand saw, two (2) ground workers engaged in assisting worker aloft in lowering limbs, clearing and chipping wood debris in a wood chipper attached to a truck for chip collection and two (2) worksite safety specialists exclusive of tree work operations and engaged in securing a safe work zone and directing vehicular and pedestrians around the active work zones. For smaller trees that do not require an aerial lift, the contractor may have a minimum of four (4) crew members. Every tree removal crew must have one member (inclusive of or in addition to the minimum crew size) who is a certified arborist by the International Society of Arboriculture (ISA), or a New Jersey Licensed Tree Care Operator (or an approved equal license from another state). The ISA certified Arborist or equivalent shall oversee all tree removal activities full time. He or she shall have the necessary skills and knowledge to effectively oversee, direct, and approve all tree work done in accordance with the Contract and to the satisfaction of the Agency. The Contractor must comply with OSHA’s Electrical Safety Related Work Practices Standard (1910.331)

and Electric Power Generation, Transmission and Distribution Standard (1910.269) as well as the most current version of ANSI Z133 Section 4 Electrical Hazards. At least two (2) employees on each crew working within ten (10) feet of any electrical contractor must be qualified line-clearance arborists orincidental line-clearance arborists as certified by TCIA's Electrical Hazards Awareness Program (EHAP) or approved equal Electrical Hazard Awareness Training (EHAT) program. If updated ANSI Z133 standards are published during the term of this contract, the contractor shall comply with the most current version of the ANSI Z133 guidelines as applicable to the scope of work.

STUMP REMOVAL: A crew is defined for stump removal operations as at least three (3) crew members. One (1) stump grinder operator, and two (2) crew members engaged as worksite safety specialists and/or backfilling and site cleanliness and equipment maneuvering.

SAW CUTTING: A crew is defined for saw cutting operations as at least two (2) crew members. One (1) saw operator, and one (1) crew member engaged as a worksite safety specialist and/or site cleanliness and equipment maneuvering.

TREE PLANTING AND EXCAVATION: The contractor should determine the appropriate means and methods related to tree planting and tree bed preparation crew size to progress the work in a safe and efficient manner. At a *minimum*, two (2) dedicated flaggers shall be always staffed when performing tree planting and excavation work.

3. EQUIPMENT/FACILITIES:

All equipment shall be in good working condition and have current registrations and inspections. The Contractor shall remove and replace any equipment deemed, by the Project Manager, to be in unsatisfactory repair or condition or otherwise unsuitable.

Prior to use, a list of proposed vehicle and equipment types, sizes, age, including copies of registration and company fleet number, if any, shall be submitted to the Project Manager for their approval. This "list" must be submitted with the Contractor's questionnaire. Recommended equipment may consist of but does not have to be limited to the following: two (2) low bed trailers of fifteen (15) ton capacity (or an equivalent), three (3) dump trucks of 10-20 yards' capacity, and one (1) backhoe large enough to remove concrete and debris from tree beds.

Contractor's facility shall be large enough to be able to accept delivery of trees as required for the season as described in Delivery of Procured Plant Material section in the "PLANTING PROCURED TREES" items.

In order to maintain instant communication with supervisors, the Contractor shall supply cellular phones to the crew foreperson or to individual crew members when working alone, such as but not limited to watering operations. The Contractor shall be responsible for the proper operation of communication equipment.

ARTICLE 49. QUALIFICATION OF CONTRACTORS AND/ OR SUBCONTRACTORS

QUALIFICATIONS REQUIREMENTS:

The following categories of work require prequalification of the Contractor/sub-contractor, at the time of bid:

ITEM NO. 12 – Preparing New Sidewalk Tree Beds
ITEM NO. 13 – Preparing Existing Sidewalk Tree Beds
ITEM NO. 14 – Preparing Lawn Tree Beds
ITEM NO. 15 – Preparing Existing Sidewalk Tree Beds - Hand Excavation
ITEM NO. 16 – Preparing Lawn Tree Beds - Hand Excavation
ITEM NO. 17 – Preparing Existing Sidewalk Tree Beds with Amended Existing Soil

ITEM NO. 18 – Preparing Lawn Tree Beds with Amended Existing Soil
ITEM NO. 19 – Planting Procured Street Trees, 2.0 – 2.5 Inch Caliper
ITEM NO. 20 – Planting Procured Street Trees, 2.5 – 3.0 Inch Caliper
ITEM NO. 21 – Planting Procured Street Trees, 3.0 – 3.5 Inch Caliper
ITEM NO. 22 – Planting Procured Street Trees, 3.5 – 4.0 Inch Caliper
ITEM NO. 23 – Planting Street Trees, 2.0 – 2.5 Inch Caliper
ITEM NO. 24 – Planting Street Trees, 2.5 – 3.0 Inch Caliper
ITEM NO. 25 – Planting Street Trees, 3.0 - 3.5 Inch Caliper
ITEM NO. 26 – Planting Street Trees, 3.5 – 4.0 Inch Caliper
ITEM NO. 27 – Planting Grow Bag/Packaged Trees 25 Gallons (City-Procured)
ITEM NO. 28 – Planting Grow Bag/Packaged Trees 35 Gallons (City-Procured)
ITEM NO. 29 – Planting Grow Bag/Packaged Trees 45 Gallons (City-Procured)
ITEM NO. 30 – Planting Grow Bag/Packaged Trees 25 Gallons (Contractor-Procured)
ITEM NO. 31 – Planting Grow Bag/Packaged Trees 35 Gallons (Contractor-Procured)
ITEM NO. 32 – Planting Grow Bag/Packaged Trees 45 Gallons (Contractor-Procured)

The bidder or Subcontractors whom the bidder will use for the performance of the Work shall meet the qualifications specified below and provide such information with their bid. Bidder must complete the Technical Qualifications section of the Questionnaire tab of the RFx (PASSPort solicitation) as part of the submission of the bid. Failure on the part of the bidder to satisfactorily meet the qualification requirements or provide information regarding technical qualifications at the time of submission of the bid may result in the bidder being found non-responsive and may be grounds for rejection of the bid.

Additionally, the bid may be rejected if the bidder or Subcontractor has established on former jobs, either government, municipal, or commercial, a record for unsatisfactory performance or has repeatedly failed to complete contracts awarded to them within the contract time.
Should the Contractor, at any time, wish to submit a Subcontractor other than the Subcontractor(s) approved per this Article, then the Contractor will be required to resubmit technical qualification information for the new proposed Subcontractor. Substitute Subcontractor(s) may not perform work unless their qualifications are submitted and approved in advance by the Agency. Approval of the substitute Subcontractor(s) will be granted only in instances where, in the discretion of the
Agency, the substitute Subcontractor(s) possess equivalent or better qualifications than the original pre-approved Subcontractor(s). All requests for approval of substitute Subcontractor(s) must be submitted to the Project Manager. The Contractor may be liable for any delays due to the substitution of any previously approved Subcontractor.

The completed technical qualification information must show verifiable evidence of the following:

1. A minimum of three (3) years of experience working on projects as a Contractor/subcontractor
2. Two (2) examples of similar types of work successfully completed within the last three (3) years; “Project #1.” and “Project #2.”
3. The list of equipment to be used and description of facility where trees will be stored. As watering and establishing each tree planted are a significant component of the Work, all equipment necessary to perform such services as watering, weeding, mulching, etc, shall be noted.
4. A minimum of two (2) verifiable references from past clients.
5. In accordance with Article 48, please provide the name(s) of at least one employee who holds a valid certification from the International Society of Arboriculture or equivalent education and experience to be determined at the sole discretion of the Agency.

INSTRUCTIONS FOR COMPLETING TECHNICAL QUALIFICATION INFORMATION

Firm Information:

1. Describe your firm's experience – include the number of years of experience and specific accomplishments of the firm. Include any and all certifications and/or accreditations pertinent to the performance of this work.

2. Describe how you will proceed through the contract requirements, including safe excavation along public right-of-way, tree watering, and tree establishment to perform the work applicable to your firm including how you will meet qualification in Article 48.

Project Information:

Select two projects that your firm has completed commendably in the past, which are similar in cost, type, size, and complexity to the proposed categories of work identified above.

1. Fill out project name, completed date, location, and a thorough description of the work shown, explaining the materials and methods used to accomplish the job illustrated.

2. Fill out the client's/owner's name, client's/owner's address, contact person for the client/owner, his/her title, email address, and telephone number.

3. Photographs (optional) may accompany each project to indicate result of the firm's work. Use judgment regarding the distance from the detailing which you wish to demonstrate. Coordinate the written data with the photographs submitted.

ARTICLE 50. MOBILIZATION

This contract does not include a separate item for Mobilization. Contractor's cost for insurance, bonds, and other initial expenses required to set up its facilities and operations at each site should be considered as part of its general overhead and factored into its unit prices bid for the individual work items.

ARTICLE 51. [INTENTIONALLY OMITTED]

ARTICLE 52. SCHEDULING OF WORK AND MATERIALS

The work shall be performed by one crew during a five (5) day, forty (40) hour week, inclusive, Monday through Friday, except for legal holidays, between the hours of 7:00am and 4:00pm, unless otherwise directed or approved by the Project Manager and in accordance with local city ordinances. The Project Manager is to be notified in writing no less than two (2) working days in advance before commencing work, including punch list and guarantee compliance work. The Contractor shall provide a routing sheet of the work to be performed on a daily basis. The proposed route sheet for the work must be provided no later than 5PM the preceding day, in accordance with the format agreed upon at the preconstruction meeting, along with crew contact information for each individual crew. Failure to provide routing sheets, start locations, and/or crew contact information may result in withheld payment for the work performed or a Stop Work Order. Permission to work on a Saturday or holiday must be requested at least one week in advance of the work. Saturday or holiday work must be approved by the Project Manager, and the Agency reserves the right to refuse coverage or crew deployment. To allow for adequate supervision and payment verification of the work, the contractor shall clearly communicate projected crew sizes and roles for the work being performed, including projected total performance (such as number of trees planted) for the upcoming day of work. If any large crew is anticipated to split into multiple smaller crews, it must be communicated in advance of the work to ensure adequate coverage.

ARTICLE 53.COMPLIANCE WITH WATERING REQUIREMENTS

The contractor is required to certify that it will comply with the watering requirements of the Contract. Certification shall be made at the time of bid by completion of the Certification of Compliance with Watering Requirements Form.

----------END OF PAGE----------

ITEM #1 STUMP REMOVALS OF OVER 4 UP TO AND INCLUDING 8 INCHES IN DIAMETER
ITEM #2 STUMP REMOVALS OF OVER 8 UP TO AND INCLUDING 12 INCHES IN DIAMETER
ITEM #3 STUMP REMOVALSOF OVER 12 UP TO AND INCLUDING 18 INCHES IN DIAMETER
ITEM #4 STUMP REMOVALS OF OVER 18 UP TO AND INCLUDING 24 INCHES IN DIAMETER
ITEM #5 STUMP REMOVALS OF OVER 24 UP TO AND INCLUDING 30 INCHES IN DIAMETER
ITEM #6 STUMP REMOVALS OF OVER 30 UP TO AND INCLUDING 36 INCHES IN DIAMETER
ITEM #7 STUMP REMOVALS OF OVER 36 INCHES OR GREATER IN DIAMETER

WORK: Under these items, the Contractor shall remove and dispose of all designated stumps in each size class. All work shall be performed in accordance with the plans and specifications by experienced workers to the satisfaction of the Project Manager.

METHOD: Stumps and roots shall be excavated to a depth of twenty-four (24) inches within the entire tree bed area. All voids and excavations left after removal of the stump shall be filled to grade. Chips generated by root removal operations may be used to backfill the tree bed, however the pile shall be left neat and clean, and no higher than 6 inches from surrounding grade. Unless otherwise approved by the Project Manager, a stump grinder shall be used to mitigate the risk of damage to surrounding sidewalk flags and lawn area. Maximum safety and care must be used by Contractor during stump removal. All safety precautions must be followed as outlined in the current (Occupational Safety and Health Commission) OSHA and the (American National Standards Institute) ANSI Z-133.1 standards. Safety goggles should be worn by all personnel during stump removals. During stump grinding operations, plywood must be used to protect adjacent vehicles, real property, and pedestrians.

DAMAGES AND UTILITIES: If existing walks or curbs are disturbed when removing stumps, the Contractor shall restore and/or reset these walks and curbs at no additional cost to the City, to the satisfaction of the Project Manager. Any damage done to surrounding vehicles or real property, including sidewalks and irrigation systems, by stump removal operations must be addressed within three (3) days and shall be replaced or restored to their original conditions to the satisfaction of the Project Manager. The Contractor shall keep a standard irrigation repair kit with an adequate supply of replacement parts at all times with every work crew and repair any damaged irrigation system before leaving the site whenever possible. The Contractor is responsible for locating and protecting underground utilities from damage during excavation and/or stump removal operations in accordance with Article 38 of the General Conditions of this Contract.

After removal of stumps in each size class to a depth of twenty-four (24) inches below the ground surface, additional required work for planting shall conform to the appropriate items of this contract. If the tree bed is abandoned during the course of stump removal due to no fault of the Contractor, the Contractor shall restore the tree bed, if required, in accordance with the specifications and to the satisfaction of the Project Manager.

MEASUREMENT AND PAYMENT: The quantity of **STUMP REMOVALS** to be paid for under this item shall be the number of stumps completely removed in accordance with the specifications and to the satisfaction of the Project Manager. The diameter of stumps shall be measured by recording the average of the longest and shortest part of the cut face of the stump.

The price bid shall be a unit price of **EACH** stump removed of each size class and shall include the cost of all labor, materials and equipment for removing and disposing of the stump and roots to a depth of twenty four (24) inches below the existing surface, the disposal of any generated material and required fees for disposal, and all other incidentals necessary to complete the work in accordance with the specifications to the satisfaction of the Project Manager. Additional work required for planting shall be paid for under the respective and appropriate items.

----------END OF ITEM----------

ITEM #8 TREE REMOVALS OF OVER 4 UP TO AND INCLUDING 8 INCHES DBH
ITEM #9 TREE REMOVALS OF OVER 8 UP TO AND INCLUDING 12 INCHES DBH
ITEM #10 TREE REMOVALS OF OVER 12 UP TO AND INCLUDING 18 INCHES DBH
ITEM #11 TREE REMOVALS OF OVER 18 UP TO AND INCLUDING 24 INCHES DBH

WORK: Under these items the Contractor shall cut and remove any designated dead, dying or undesirable street trees in each size class, as indicated in the contract list or as directed by the Project Manager. All work shall be performed by experienced workers and all work shall be performed to the satisfaction of the Project Manager.

METHOD: The Contractor shall cut and remove all trees designated for removal as indicated in the contract list or as directed by the Project Manager. No tree shall be removed except as ordered by the Project Manager. The DBH (diameter breast height) of all trees shall be measured before removal at the height of four and a half (4.5) feet from the ground.

Cutting of trees shall be done by competent workers to the satisfaction of the Project Manager and overseen by an ISA (International Society of Arboriculture) Certified Arborist or approved equal. All trees shall be "topped" and "limbed" prior to felling unless otherwise directed by the Project Manager. Lowering ropes and guide lines are to be used where necessary. All safety precautions as outlined in the current OSHA and ANSI Z-133.1 standards, including (Personal Protective Equipment) PPE requirements, must be followed.

At each specified location, the stump shall be cleanly and neatly cut with a chainsaw so the final surface is no more than six (6") inches above the existing grade at any point. The finished cut surface shall be left smooth and with no jagged edges. For stumps on slopes the final cut surface should be angled at the same pitch as the surrounding surface. All debris must be removed and disposed of by the Contractor. The Contractor must inform the Agency immediately if the stump cannot be flush-cut to the specified height due to obstruction or because it contains materials such as metal or concrete.

The Contractor shall carefully protect against damage to all existing trees, plants, curbs, tree guards, sidewalks and utilities and other features to remain. The Contractor shall be liable for any damage to such trees, plants, curbs, walks, real property, including irrigation systems, vehicles and utilities, caused by tree removal operations. All damaged trees, plants, curbs, walks, real property, irrigation systems, vehicles and utilities must be addressed within three (3) days and shall be replaced or restored to their original conditions, at no additional cost and to the satisfaction of the Project Manager prior to substantial completion use inspection. The Contractor shall keep a standard irrigation repair kit with an adequate supply of replacement parts at all times with every work crew and repair any damaged irrigation system before leaving the site whenever possible.

All branches, limbs, trunks and other debris, including chips shall be removed and disposed of by the Contractor, and the area shall be restored by completion of the work day, to the satisfaction of the Project Manager.

Contractors shall comply with Federal and State regulations for plant pest and disease control.

QUARANTINE AREAS and ORDERS FOR THE ESTABLISHMENT OF PROTECTIVE ZONE PROVISIONS: The Contractor is required to abide by all existing and any new or revisions to legislation and orders regarding quarantines and protective zones while working on this contract. Full information can be obtained from Federal and State Pest and Disease Control agencies and personnel.

MEASUREMENT AND PAYMENT: The quantity of **TREE REMOVALS** to be paid for under these items shall be the number of trees removed in accordance with the specifications and directions of the Project Manager.

The price bid shall be a unit price of **EACH** tree removed of each size class and shall include the cost of all labor, materials and equipment necessary for removing and disposing trees, the disposal of any generated material and required fees for disposal, and all other incidentals necessary to complete the work in accordance with the specifications to the satisfaction of the Project Manager. Additional required work for planting and removal of stumps shall be paid for under the respective and appropriate items.

----------END OF ITEM----------

ITEM #12 PREPARING NEW SIDEWALK TREE BEDS

WORK: Under this item the Contractor shall do all work necessary to **PREPARE NEW SIDEWALK TREE BEDS** for planting in specified size beds and maintaining soil grade level with surrounding sidewalks throughout the term of the contract, including the guarantee period.

Sawcutting, removal of existing sidewalk pavement up to 7" in thickness, removal of stumps in the designated planting bed up to and including 4" in diameter that are found below grade and under concrete, excavation, furnishing, mixing, and placing topsoil in all tree beds, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

CONTRACTOR'S LIABILITES

The Contractor shall be liable for any damage to property, including but not limited to sidewalks and curbs, caused by operations and related work, and all areas disturbed by construction shall be restored to their original conditions to the satisfaction of the Project Manager.

All work to prepare a tree bed that is voided due to an underground obstruction or interference will be paid under the UNCLASSIFIED EXCAVATION ITEM for the full cubic yards excavated including the depth of sidewalk excavated even if the concrete will be restored. If saw cutting work was performed in preparation for excavation of the voided tree bed the contractor shall be paid under the SAW CUT PAVEMENT ITEM. The UNCLASSIFIED EXCAVATION and SAW CUT PAVEMENT ITEM shall not be certified for payment for voided tree beds as a result of utility conflicts if the Contractor cannot provide sufficient documentation showing compliance with Code 753.

In order to best serve the public, all work required to repair any damage shall be complete within three (3) days of occurrence, including sidewalks and curbs damaged during construction, to install concrete pavement without base as per the CONCRETE PAVEMENT W/O BASE - 4" OR CONCRETE PAVEMENT W/O BASE - 7" ITEMS, or to install concrete curbs per the CONCRETE CURB ITEM, unless directed otherwise by the Project Manager. Repairs to all damaged sidewalk shall be done at the direction and to the satisfaction of the Agency. If adjacent turf is damaged, the Contractor shall apply grass seed to loosened soil.

PRESERVATION OF SIDEWALKS DURING CONSTRUCTION:

In the interest of preserving city sidewalks, the stabilizer legs of the Contractor's backhoe, excavator, or other heavy machinery to be used on sidewalks must have padded feet. If not, the Contractor must place wooden planking between the feet of the machine and the sidewalk so that the latter are protected to the Project Manager's satisfaction. If the Contractor drives on City sidewalks and causes damage, they will be required to repair all damage, including the removal of tracks of pulverized rubber from equipment tires, at no additional cost to the City.

EXCAVATION OF TREE BEDS: Sizes of tree beds shall be indicated on the list of locations.

MARKING SITES PRIOR TO EXCAVATION AND RECORDKEEPING:
No tree beds shall be dug until the proposed locations are marked by the Contractor and the Project Manager with WHITE construction spray paint, to ensure compliance with all City, State, and utility company regulations. It is the obligation of the contractor to maintain accurate records of sites marked at the time of marking.

NOTIFICATION OF WORK AND ROUTING:
The Contractor shall notify the Agency forty-eight (48) hours in advance of all work. Proper routing must be received no later than 5PM the preceding day prior to commencing work.

NYC DOT PERMITS:
No tree bed shall be sawcut or dug until the contractor has obtained a sidewalk opening permit from the Department of Transportation. A sidewalk opening permit shall be required for each block where the pavement is broken for a new tree bed. At the request of the Project Manager, valid permits shall be produced. Failure to produce valid permits may result in temporary suspension of work and/or a Stop Work Order. Any delay caused by lack of coordination or inadequate records on the contractor's part may result in liquidated damages if minimum productivity is not met.

NYC DOT street opening permit type 0120 (Tree Pit) can be obtained after the Order to Work for this contract at no fee to the Contractor under this contract.

SAWCUTTING: All work shall be done by competent workers in an approved manner to the satisfaction of the Project Manager. All sawcutting shall be carried out to the full depth of the pavement to be cut. The contractor shall pay special attention to "monolithic curbs" to ensure that all joints are thoroughly cut. Saw cutting shall be done to accurate, neat and straight lines marked prior to the commencement of work. Sawcutting shall be done with approved power saws specifically designed and manufactured for such a purpose. Reasonable effort shall be made to reduce the dust generated during saw cutting operation. Sidewalk shall be thoroughly rinsed so that no concrete residue is left on adjacent sidewalk as a result of sawcutting operation, and car covers used to protect vehicles from dust. As with all work operations, necessary safety precautions are to be exercised by the Contractor and its personnel, including but not limited to sufficient placement of cones, Personal Protective Equipment, and safe passage for pedestrian traffic. No saw cutting work shall occur until locations have been marked/cleared by utility operators in accordance with New York State Industrial Code 753. The Project Manager is to be notified immediately for further direction prior to any sawcutting of the designated planting bed if it is observed by the Contractor's crew that a utility marking conflicts with the designated planting bed at the time of sawcutting.

EXCAVATION: The Contractor shall break the pavement to be removed from the tree bed into smaller pieces. In accordance with NYDOT rules and regulations, ram hoe/truck mounted pavement breakers are not permitted. Pieces should not be larger than 2' x 2' in size when being moved from the tree bed to the truck. All rubble and debris shall be removed and the perimeter secured at sites that are left broken but not yet excavated at day's end in accordance with all applicable conditions and stipulation outlined in Section 6.70 of the New York City Department

of Transportation Standard Highway Specifications Volume II, in addition to the MUTCD (Manual on Uniform Traffic Control Devices) standards, unless otherwise approved by the Project Manager. The Contractor shall remove all materials from the tree bed for the full length and width specified on the location list to the depth of the tree's root ball. All tree beds shall have vertical sides, unless otherwise directed. Extreme care shall be taken not to excavate to a depth greater than required. The subgrade below the root ball shall be tamped slightly to prevent settlement. If the excavation and planting are not completed concurrently, the tree bed shall be excavated to a depth of eighteen (18) inches where a tree 3.5" caliper or less is to be planted, and thirty (30) inches where a tree greater than 3.5" caliper is to be planted.

All excavated materials shall be removed from the site and disposed of by the Contractor. Excavated materials shall be loaded into a container separate from that of the clean backfill to avoid contaminating clean backfill. No tree beds shall be backfilled until approved by the Project Manager. The Contractor is permitted to add biochar to each tree bed at the time of excavation if not occurring at the time of planting, however payment for biochar is included with the items PLANTING (PROCURED) STREET TREES or PLANTING GROW BAG/PACKAGED TREES. All tree beds are to be closed and filled with approved backfill and made level with existing sidewalk grade. Each tree bed is to be made secure and safe at the end of the workday.

Where subsurface obstructions are encountered during excavation, the Contractor shall restore the disturbed area to its original condition. A new planting location shall be designated by the Project Manager, if conditions permit.

Where excavation and backfilling are complete and the tree bed is abandoned due to no fault of the Contractor, a new planting location shall be designated by the Project Manager if conditions permit. However, the Agency is under no obligation to designate an alternate location. Installation of concrete pavement without base in abandoned street tree beds shall be paid for under the CONCRETE PAVEMENT W/O BASE - 4" OR CONCRETE PAVEMENT W/O BASE - 7" Items.

SUBMITTALS

BACKFILL: Material shall consist of natural loam topsoil with the presence of humus only and no other soil type, such as a sand or clay soil type, shall be accepted. The organic content and particle size distribution shall be the result of natural soil formation. Topsoil must be free from subsoil, obtained from an area which has never been stripped or from a facility that is permitted by the State to process construction and demolition debris. It shall be removed to a depth of one (1) foot, or less if subsoil is encountered. Topsoil shall be of uniform quality, free from hard clods, stiff clay, hardpan, sods, partially disintegrated stone, lime, cement, ashes, slag, concrete, tar residues, tarred paper, boards, chips, sticks or any other undesirable material. Any topsoil considered by the Project Manager to contain too much undesirable material shall be rejected. No topsoil shall be delivered in a frozen or muddy condition.

Topsoil shall comply with the following requirements:

CHEMICAL AND PHYSICAL COMPOSITION: Natural loam shall comply with the following requirements:
a. Organic Matter-- backfill shall contain 3-10% organic matter.
b. The pH shall be in the range of 5.5 to 7.2 inclusive, unless otherwise approved or specified by the Project Manager.
c. Soil Textural Analysis: Topsoil shall consist of the following percentages of sand, silt and clay. Any soil that does not meet the requirements below will be rejected and removed from the site.

Rocks, Stone and Gravel (>2.0 mm)	<20%
Sand (0.05-2 mm)	≤70%
Silt (0.002-0.05 mm)	<55%
Clay (<0.002 mm)	25% maximum

Electrical conductivity shall be a maximum of 0.75. mmhos/cm. A higher level would indicate salt content too high to be acceptable, which will be rejected and must be removed from the site by the Contractor.

COMPOST: Compost shall be a well decomposed, stable, weed free organic matter source. It shall be derived from: agricultural or food residuals or yard trimmings. The product shall contain no substances toxic to plants and shall be reasonably free (< 1% by dry weight) of man-made foreign matter. The compost will possess no objectionable odors and shall not resemble the raw material from which it was derived. The product shall be certified through the U.S. Composting Council's (USCC) Seal of Testing Assurance (STA) Program or equivalent certification. Compost shall be subject to the final approval of the Project Manager, and may be obtained from The City of New York Department of Sanitation or an approved equal. The City makes no representations as to the availability of compost. The contractor will be required to obtain compost from an alternate provider if compost is not available from the City at no additional cost to the City.

PROCESS FOR APPROVAL AND AMENDMENT OF BACKFILL MATERIAL:

At the direction of the Project Manager, the Contractor shall furnish a certified report from an approved Materials Soil Testing Laboratory showing the analysis of representative samples of the topsoil from the soil vendor(s) which they propose to use. These reports shall be designated the Soil Vendors Reports alone and shall not be considered sufficient cause for provisional or final approval. The Soil Vendor Reports must reflect a sample tested within 6 months of the Contractor's submission to the Agency. These representative samples of screened topsoil must meet the above requirements with no additional organic matter added. The Soil Vendor Reports must be submitted to the Agency within 15 days of the OTW.

Once a Soil Vendor Report is found to meet the specifications, one or more samples will be obtained from the Soil Vendor(s) by the Project Manager, who will deliver them to the Rutgers Soil Testing Laboratory or approved equal. The price bid shall include inspection and laboratory charges.

CONDITIONS MEETING AGENCY PROVISIONAL APPROVAL:
To facilitate the performance of work on the Contract, the Project Manager may provisionally approve the use of soil based off a visual assessment prior to receiving the formal soil test results. Visual assessment and subsequent provisional approval are solely at the discretion of the Project Manager. Provisional approvals will be documented in a letter to the Contractor for this contract specifically by the Project Manager.

Upon receiving certified laboratory test results for the samples collected by the Agency, if it is determined by the Project Manager that the topsoil varies only slightly from the specifications, Provisional Approval may be granted by the Project Manager under the condition that the contractor and/or vendor amends the soil in accordance with the Project Manager's directive in order to meet the specifications. The quantities needed to meet the ranges above shall be determined based upon the soil test results.

For organic matter specifically: In cases where certified laboratory test results indicate that organic matter falls under the minimum required range above, the Contractor will be permitted to blend topsoil and compost at their yard or through their soil provider. The quantities needed to meet the ranges above shall be determined based upon the soil test results. Compost shall not be so excessive as to significantly alter the chemical properties of the topsoil. The compost must meet or exceed the chemical and physical properties above.

The Contractor shall notify the Agency of its amended stockpile so that the Project Manager may obtain a new soil sample for visual assessment and laboratory testing. For amended stockpiles, the Project Manager may issue a revised Provisional Approval Letter.

Should the soil vendor's certified report fail to meet the specifications, the Contractor must seek two (2) alternative vendors and furnish certified reports for each from an approved Materials Soil Testing Laboratory for consideration within five (5) business days of the Project Manager's request. Once obtained by the Project Manager and found to meet the backfill requirements of this Contract, the Provisional Approval process will begin again.

No topsoil shall be delivered for use on this Contract until the provisional approval of samples by the Project Manager, however, such approval shall not constitute notice of substantial completion. The Project Manager reserves the right to reject any materials which do not, in their opinion, meet these specifications and resample upon or after delivery. The Project Manager may take as many samples as they deem necessary to ensure the quality of the topsoil is, and remains, within the specifications of the contract during the life of the contract.

NOTICE OF SUBSTANTIAL COMPLETION AND APPROVAL BACKFILL MATERIAL:

It is the obligation of the Contractor under this Contract to source and provide backfill material(s) in accordance with the Specifications outlined above. Notice of substantial completion and Approval of backfill material shall be granted once a certified topsoil report for the samples collected by the Agency is shown to conform to Contract specifications, within 60 calendar days of the Order to Work. If the Contractor is unable to obtain a passing certified topsoil report for the samples collected by the Agency on Provisionally Approved material, the Agency reserves the

right to reject the sourcing of material from the applicable vendor(s). Failure to produce a certified topsoil report which conforms to Contract specifications within 60 calendar days of the Order to Work is considered a breach of Contract and may result in a Stop Work Order.

MAINTENANCE OF SURROUNDING GRADE: The Contractor shall maintain soil levels at grade with surrounding sidewalks for all tree beds under this contract for the entire term of the contract.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **NEW SIDEWALK TREE BEDS PREPARED** in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of new sidewalk tree beds prepared, and shall include the cost of saw cutting and removing sidewalk, excavating tree beds, removal of stumps up to and including 4" in diameter in designated tree beds, removal and disposal of excavating materials, furnishing and incorporating approved backfill in all tree beds, maintaining soil levels at grade with surrounding sidewalk throughout the guarantee period, and all other work incidental thereto, in accordance with sketches, specifications, to the satisfaction of the Project Manager. Only those areas requiring concrete removal will be paid under this item. Areas not requiring concrete removal for tree bed preparation will be paid for under the other applicable items of the contract.

----------END OF ITEM----------

ITEM #13 PREPARING EXISTING SIDEWALK TREE BEDS

WORK: Under this item the Contractor shall do all work necessary to **PREPARE EXISTING SIDEWALK TREE BEDS** for planting and maintaining soil grade level with surrounding sidewalks throughout the term of the contract, including the guarantee period.

Removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4” in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, removal of existing block pavements and/or existing asphalt pavement, excavation, furnishing, mixing, and placing topsoil in all tree beds, and all incidental work shall be completed under this item for all tree beds that are surrounded by concrete and do not require saw cutting. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Unless otherwise specified herein, all materials, workmanship and requirements shall conform to applicable provisions of the PREPARING NEW SIDEWALK TREE BEDS item.

CONTRACTOR’S LIABILITES The Contractor shall be liable for any damage to property, including but not limited to sidewalks and curbs, caused by operations and related work, and all areas disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. If the Contractor drives on City sidewalks and causes damage they will be required to repair all damage, including the removal of tracks of pulverized rubber from equipment tires, at no additional cost to the City.

All work to prepare a tree bed that is voided will be paid under the UNCLASSIFIED EXCAVATION ITEM for the full cubic yards excavated including the depth of sidewalk excavated even if the concrete is to be restored.

Where subsurface obstructions are encountered during excavation, the Contractor shall restore the disturbed area to its original condition. A substitute location shall be designated by Project Manager, if conditions permit. However, the Agency is under no obligation to designate an alternate location.

MAINTENANCE OF SURROUNDING GRADE: The Contractor shall maintain soil levels at grade with surrounding sidewalks for all tree beds under this contract for the entire term of the contract.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **EXISTING SIDEWALK TREE BEDS PREPARED** in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of existing sidewalk tree beds prepared, and shall include the cost of removal of existing block pavements and/or existing asphalt pavement, excavating tree beds, removal and disposal of excavated materials, removal of stumps and trees up to and including 4" in diameter in designated tree beds, furnishing and incorporating approved backfill in all tree beds, maintaining soil levels at grade with surrounding

sidewalk/surface throughout the guarantee period and all other work incidental thereto, in accordance with sketches, specifications, to the satisfaction of the Project Manager.

---------- END OF ITEM ----------

ITEM #14 PREPARING LAWN TREE BEDS

WORK: Under this item the Contractor shall do all work necessary to **PREPARE LAWN TREE BEDS** for planting and maintaining soil grade level with surrounding sidewalks throughout the term of the contract, including the guarantee period.

Removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4” in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, excavation, furnishing, mixing, and placing topsoil in all tree beds, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Unless otherwise specified herein, all material, workmanship and requirements shall conform to applicable provisions of the PREPARING NEW SIDEWALK TREE BEDS Item.

CONTRACTOR’S LIABILITIES:

The Contractor shall be liable for any damage to property caused by operations and related work, including but not limited to sidewalks, curbs, and irrigation systems. All disturbed areas shall be restored to their original conditions to the satisfaction of the Project Manager within 3 days of occurrence. The Contractor shall always keep a standard irrigation repair kit with an adequate supply of replacement parts with every work crew and repair any damaged irrigation system before leaving the site whenever possible. If turf is damaged the Contractor shall apply grass seed to loosened soil, topsoil and grass seed if ruts are created, or the Project Manager may request sod to be installed, at no additional cost to the City. If the Contractor drives on City sidewalks and causes damage, they will be required to repair all damage, including the removal of tracks of pulverized rubber from equipment tires, at no additional cost to the City.

All work to prepare a tree bed that is voided will be paid under the UNCLASSIFIED EXCAVATION ITEM for the full cubic yards excavated including the depth of sidewalk excavated even if the concrete is to be restored. The Project Manager may request grass seed to be spread at abandoned lawn beds.

Where subsurface obstructions are encountered during excavation, the Contractor shall restore the disturbed area to its original condition. A substitute location shall be designated by Project Manager, if conditions permit. However, the Agency is under no obligation to designate an alternate location.

EDGING OF PLANTING AREAS: The Contractor shall establish a neat edge where lawn tree bed areas meet grass areas as shown on sketches or as directed by the Project Manager. Edging shall be done by competent workers only, in a professional manner with a spade or edging tool immediately after excavation is completed to the satisfaction of the Project Manager. Edging shall be maintained by the Contractor.

MAINTENANCE OF SURROUNDING GRADE: The Contractor shall maintain soil levels at grade with surrounding sidewalks for all tree beds under this contract for the entire term of the contract.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **LAWN TREE BEDS PREPARED** in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of lawn tree beds prepared, and shall include the cost of excavating lawn tree beds, removal of stumps and dead trees up to and including 4" in diameter in designated locations, removal and disposal of excavated materials, furnishing and incorporating approved backfill in all tree beds, maintaining soil levels at grade with surrounding sidewalk/surface throughout the guarantee period, and all other work incidental thereto, in accordance with sketches, specifications, to the satisfaction of the Project Manager.

---------- END OF ITEM ----------

ITEM #15 PREPARING EXISTING SIDEWALK TREE BEDS – HAND EXCAVATION

WORK: Under this item the Contractor shall do all work necessary to **PREPARE EXISTING SIDEWALK TREE BEDS – HAND EXCAVATION** for planting and maintaining soil grade level with surrounding sidewalks/surface throughout the term of the contract, including the guarantee period.

Removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4" in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, removal of existing block pavements and/or existing asphalt pavement, excavation, furnishing, mixing, and placing topsoil in all tree beds, and all incidental work shall be completed under this item for all tree beds that do not require saw cutting. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

INTENT: The intent of the item is to fully hand excavate tree bed locations. These are areas, where in the opinion of the Project Manager, use of mechanized equipment such as a skid-steer or excavator would cause significant disturbance to lawn, landscaped, hardscaped, playground safety surfacing, and/or natural areas of park property, adjacent tree roots, and/or underground utilities such as gas, electric, irrigation, and water. Additionally, this item is to be used in areas where mechanized equipment cannot access planting locations due to fencing, terrain, or other impediments per the discretion of the Project Manager. No mechanized equipment to excavate or backfill the designated tree bed shall be permitted.

Unless otherwise specified herein, all materials, workmanship and requirements shall conform to applicable provisions of the PREPARING EXISTING TREE BEDS item.

CONTRACTOR'S LIABILITES The Contractor shall be liable for any damage to property, including but not limited to lawns, playgrounds, pathways, sidewalks, and curbs, caused by operations and related work, and all areas disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. If the Contractor drives on City sidewalks, park pathways, lawns, or playground safety surfacing, and causes damage they will be required to repair all damage at no additional cost to the City.

All work to prepare a tree bed that is voided will be paid under the UNCLASSIFIED EXCAVATION ITEM for the full cubic yards excavated including the depth of sidewalk excavated even if the concrete is to be restored.

Where subsurface obstructions are encountered during excavation, the Contractor shall restore the disturbed area to its original condition. A substitute location shall be designated by Project Manager, if conditions permit. However, the Agency is under no obligation to designate an alternate location.

MAINTENANCE OF SURROUNDING GRADE: The Contractor shall maintain soil levels at grade with surrounding sidewalks for all tree beds under this contract for the entire term of the contract.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **EXISTING TREE BEDS PREPARED** by hand in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of existing tree beds prepared by hand, and shall include the cost of removal of existing block pavements and/or existing asphalt pavement, excavating tree beds, removal and disposal of excavated materials, removal of stumps and trees up to and including 4" in diameter in designated tree beds, furnishing and incorporating approved backfill in all tree beds, maintaining soil levels at grade with surrounding sidewalk/surface throughout the guarantee period and all other work incidental thereto, in accordance with sketches, specifications, to the satisfaction of the Project Manager.

---------- END OF ITEM ----------

ITEM #16 PREPARING LAWN TREE BEDS – HAND EXCAVATION

WORK: Under this item the Contractor shall do all work necessary to **PREPARE LAWN TREE BEDS – HAND EXCAVATION** for planting and maintaining soil grade level with surrounding sidewalks/surface throughout the term of the contract, including the guarantee period.

Removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4" in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, excavation, furnishing, mixing, and placing topsoil in all tree beds, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Unless otherwise specified herein, all material, workmanship and requirements shall conform to applicable provisions of the PREPARING LAWN TREE BEDS Item.

INTENT: The intent of the item is to fully hand excavate tree bed locations. These are areas, where in the opinion of the Project Manager, use of mechanized equipment such as a skid-steer or excavator would cause significant disturbance to lawn, landscaped, hardscaped, playground safety surfacing, and/or natural areas of park property, adjacent tree roots, and/or underground utilities such as gas, electric, irrigation, and water. Additionally, this item is to be used in areas where mechanized equipment cannot access planting locations due to fencing, terrain, or other impediments per the discretion of the Project Manager. No mechanized equipment to excavate or backfill the designated tree bed shall be permitted.

Unless otherwise specified herein, all materials, workmanship and requirements shall conform to applicable provisions of the PREPARING LAWN TREE BEDS item.

CONTRACTOR'S LIABILITES The Contractor shall be liable for any damage to property, including but not limited to lawns, playgrounds, pathways, sidewalks, and curbs, caused by operations and related work, and all areas disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. If the Contractor drives on City sidewalks, park pathways, lawns, or playground safety surfacing, and causes damage they will be required to repair all damage at no additional cost to the City.

All work to prepare a tree bed that is voided will be paid under the UNCLASSIFIED EXCAVATION ITEM for the full cubic yards excavated including the depth of sidewalk excavated even if the concrete is to be restored.

Where subsurface obstructions are encountered during excavation, the Contractor shall restore the disturbed area to its original condition. A substitute location shall be designated by Project Manager, if conditions permit. However, the Agency is under no obligation to designate an alternate location.

EDGING OF PLANTING AREAS: The Contractor shall establish a neat edge where lawn tree bed areas meet grass areas as shown on sketches or as directed by the Project Manager. Edging shall be done by competent workers only, in a professional manner with a hand spade or edging

tool immediately after excavation is completed to the satisfaction of the Project Manager. Edging shall be maintained by the Contractor.

MAINTENANCE OF SURROUNDING GRADE: The Contractor shall maintain soil levels at grade with surrounding sidewalks/surface for all tree beds under this contract for the entire term of the contract.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **LAWN TREE BEDS PREPARED** by hand in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of lawn tree beds prepared, and shall include the cost of excavating lawn tree beds, removal of stumps and dead trees up to and including 4" in diameter in designated locations, removal and disposal of excavated materials, furnishing and incorporating approved backfill in all tree beds, maintaining soil levels at grade with surrounding sidewalk/surface throughout the guarantee period, and all other work incidental thereto, in accordance with sketches, specifications, to the satisfaction of the Project Manager.

---------- END OF ITEM ----------

ITEM #17 PREPARING EXISTING SIDEWALK TREE BEDS WITH AMENDED EXISTING SOIL

WORK: Under this item the Contractor shall do all work necessary to **PREPARE EXISTING SIDEWALK TREE BEDS WITH AMENDED EXISTING SOIL** for planting and maintaining soil grade level with surrounding sidewalks throughout the term of the contract, including the guarantee period.

Removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4" in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, excavation, furnishing, amendment and mixing of existing on site soil, removal and partial disposal of existing undesirable material, including but not limited to turf layer, roots and debris in the designated planting bed, and all incidental work shall be completed under this item for all tree beds that are surrounded by concrete and do not require sawcutting. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Unless otherwise specified herein, all material, workmanship and requirements shall conform to applicable provisions of the PREPARING EXISTING SIDEWALK TREE BEDS ITEM.

The Contractor shall excavate, cultivate, tamp and amend all soil.

CONTRACTOR'S LIABILITIES:
All work to prepare a tree bed that is voided will be paid under the UNCLASSIFIED EXCAVATION ITEM for the full cubic yards excavated including the depth excavated even if the bed is to be restored. However, if the site is excavated and prepared according to specifications described under this item and at direction of Project Manager becomes a voided site at a later time, all work shall remain billable under this item.

Where subsurface obstructions are encountered during tree bed preparation, the Contractor shall restore the disturbed area to its original condition. A substitute location shall be designated by the Project Manager, if conditions permit. However, the Agency is under no obligation to designate an alternate location.

The Contractor shall be liable for any damage to property, including but not limited to sidewalks and curbs caused by operations and related work, and all areas disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. If the Contractor drives on City sidewalks and causes damage, they will be required to repair all damage, including the removal of tracks of pulverized rubber from equipment tires, at no additional cost to the City.

EXCAVATION AND/OR PREPARATION OF TREE BEDS: Sizes of tree beds shall be provided by the Project Manager.

No tree beds shall be dug until the proposed locations are first identified and approved by the Project Manager. The Contractor shall then take full responsibility for the tree bed locations.

METHOD:
Site Setup: All site safety setup requirements dictated in Article 40 and the MUTCD shall be followed. The Contractor shall lay a tarp or other approved material adjacent to the designated tree bed(s) prior to excavation to maintain cleanliness and to facilitate ease of placing the excavated material back into the tree bed. The Contractor shall remove any undesirable material from the surface of the tree bed, including but not limited to turf, weeds, trash, brick, glass, metal objects, sod clumps, rubble, or other debris as directed by the Project Manager.

Grading and addition of compost: The Contractor shall place 3 (three) cubic feet of compost on top of the existing soil within the existing tree bed. For reference, this equates to approximately 4 to 5 five-gallon buckets of compost. In the event that the existing grade is lower than the surroundings after the addition of compost, additional topsoil that conforms to the requirements of PREPARING NEW SIDEWALK TREE BEDS shall be placed as well to meet the grade, and will be paid for under the TOPSOIL FOR TREE BEDS item.
Soil Fracturing: Using a backhoe, excavator, or other equipment as approved by the Project Manager, loosen the soil with the compost (and topsoil if applicable) laid on top to a depth of approximately 24 inches. Lift and then drop the loosened soil immediately back into the planting bed. The Contractor shall continue this method until the full dimensions of the tree bed have been prepared for planting, tamping lightly to ensure that no air pockets remain in the amended planting bed. The amended planting bed soil shall not be entirely homogenized. The Contractor must remove any undesirable material including but not limited to trash, brick, glass, metal objects, sod clumps, rubble, or other debris as directed by the Project Manager. The Contractor shall ensure that the finished grade of all tree beds prepared under this item meets the surrounding grade.

SUBMITTALS: All submittals must be approved by the Project Manager in advance of work commencing.

COMPOST: Compost shall be a well decomposed, stable, weed free organic matter source. It shall be derived from: agricultural or food residuals or yard trimmings. The product shall contain no substances toxic to plants and shall be reasonably free (< 1% by dry weight) of man-made foreign matter. The compost will possess no objectionable odors and shall not resemble the raw material from which it was derived. The product shall be certified through the U.S. Composting Council's (USCC) Seal of Testing Assurance (STA) Program. Compost shall meet the approval of the Project Manager and shall conform to The City of New York Department of Sanitation compost or an approved equal. The City makes no representations as to the availability of compost. The contractor will be required to obtain compost from an alternate provider if compost is not available from the City at no additional cost to the City.

MAINTENANCE OF SURROUNDING GRADE: The Contractor shall maintain soil levels at grade with surrounding sidewalks for all tree beds under this contract for the entire term of the contract.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **EXISTING SIDEWALK TREE BEDS WITH AMENDED EXISTING SOIL PREPARED** in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of existing beds prepared, and shall include the cost of excavating existing tree beds, amending existing tree beds, removal and disposal of unapproved materials, removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4” in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, furnishing and incorporating approved amendments and existing soil in all tree beds, maintaining soil levels at grade with surrounding surface throughout the guarantee period and all other work incidental thereto, in accordance with sketches, specifications, and to the satisfaction of the Project Manager.

---------- END OF ITEM ----------

ITEM #18 PREPARING LAWN TREE BEDS WITH AMENDED EXISTING SOIL

WORK: Under this item the Contractor shall do all work necessary to **PREPARING LAWN TREE BEDS WITH AMENDED EXISTING SOIL** for planting and maintaining soil grade level with surrounding sidewalks throughout the term of the contract, including the guarantee period.
Removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4" in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, excavation, furnishing, amendment and mixing of existing on site soil, removal and partial disposal of existing undesirable material, including but not limited to turf layer, roots and debris in the designated planting bed, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Unless otherwise specified herein, all material, workmanship and requirements shall conform to applicable provisions of the PREPARING LAWN TREE BEDS Item.

The contractor shall excavate, cultivate, tamp and amend all soil. All material and work required for tree planting will be paid under the respective PLANTING (PROCURED) STREET TREES or PLANTING GROW BAG/PACKAGED TREES item.

CONTRACTOR'S LIABILITIES:
All work to prepare a tree bed that is voided will be paid under the UNCLASSIFIED EXCAVATION Item for the full cubic yards excavated including the depth excavated even if the bed is to be restored. However, if the site is excavated and prepared according to specifications described under this item and at direction of Project Manager becomes a voided site at a later time, all work shall remain billable under this item.

Where subsurface obstructions are encountered during tree bed preparation, the Contractor shall restore the disturbed area to its original condition. A substitute location shall be designated by the Project Manager, if conditions permit. However, the Agency is under no obligation to designate an alternate location.

The Contractor shall be liable for any damage to property, including but not limited to irrigation systems, caused by operations and related work and all areas disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. The Contractor shall always keep a standard irrigation repair kit with an adequate supply of replacement parts with every work crew and repair any damaged irrigation system before leaving the site whenever possible. If the Contractor drives on City sidewalks and causes damage, they will be required to repair all damage, including the removal of tracks of pulverized rubber from equipment tires, at no additional cost to the City.

EXCAVATION AND/OR PREPARATION OF TREE BEDS: Sizes of tree beds shall be provided by the Project Manager.

No tree beds shall be dug until the proposed locations are first identified and approved by the Project Manager. The Contractor shall then take full responsibility for the tree bed locations.

METHOD:

Site Setup: All site safety setup requirements dictated in Article 40 and the MUTCD shall be followed. The Contractor shall lay a tarp or other approved material adjacent to the designated tree bed(s) prior to excavation to maintain cleanliness and to facilitate ease of placing the excavated material back into the tree bed. The Contractor shall first remove and dispose of the turf layer within the dimensions of the tree bed, and any undesirable material from the surface of the tree bed, including but not limited to weeds, trash, brick, glass, metal objects, rubble, or other debris as directed by the Project Manager.

Grading and addition of compost: The Contractor shall place 3 (three) cubic feet of compost on top of the existing soil within the existing tree bed. For reference, this equates to approximately 4 to 5 five-gallon buckets of compost. In the event that the existing grade is lower than the surroundings after the addition of compost, additional topsoil that conforms to the requirements of PREPARING NEW SIDEWALK TREE BEDS shall be placed as well to meet the grade, and will be paid for under the TOPSOIL FOR TREE BEDS item.

Soil Fracturing: Using a backhoe, excavator, or other equipment as approved by the Project Manager, loosen the soil with the compost (and topsoil if applicable) laid on top to a depth of approximately 24 inches. Lift and then drop the loosened soil immediately back into the planting bed. The Contractor shall continue this method until the full dimensions of the tree bed have been prepared for planting, tamping lightly to ensure that no air pockets remain in the amended planting bed. The amended planting bed soil shall not be entirely homogenized. The Contractor must remove any undesirable material including but not limited to trash, brick, glass, metal objects, sod clumps, rubble, or other debris as directed by the Project Manager. The Contractor shall ensure that the finished grade of all tree beds prepared under this item meets the surrounding grade.

SUBMITTALS: All submittals must be approved by the Project Manager in advance of work commencing.

COMPOST: Compost shall be a well decomposed, stable, weed free organic matter source. It shall be derived from: agricultural or food residuals or yard trimmings. The product shall contain no substances toxic to plants and shall be reasonably free (< 1% by dry weight) of man-made foreign matter. The compost will possess no objectionable odors and shall not resemble the raw material from which it was derived. The product shall be certified through the U.S. Composting Council's (USCC) Seal of Testing Assurance (STA) Program. Compost shall meet the approval of the Project Manager and shall conform to The City of New York Department of Sanitation compost or an approved equal. The City makes no representations as to the availability of compost. The contractor will be required to obtain compost from an alternate provider if compost is not available from the City at no additional cost to the City.

EDGING OF PLANTING AREAS: The Contractor shall establish a neat edge where lawn bed areas meet grass areas as shown on sketches or as directed by the Project Manager. Edging shall be done by competent workers only, in a professional manner with a spade or edging tool immediately after excavation is completed to the satisfaction of the Project Manager. Edging shall be maintained by the Contractor.

MAINTENANCE OF SURROUNDING GRADE: The Contractor shall maintain soil levels at grade with surrounding sidewalks for all tree beds under this contract for the entire term of the contract.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **LAWN TREE BEDS WITH AMENDED EXISTING SOIL PREPARED** in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of lawn beds prepared, and shall include the cost of excavating lawn tree beds, amending lawn tree beds, removal and disposal of unapproved materials, removal of designated dead, dying or undesirable trees in the designated planting tree bed up to and including 4" in diameter, stumps in the designated planting tree bed up to and including 4" in diameter, furnishing and incorporating approved amendments and existing soil in all tree beds, maintaining soil levels at grade with surrounding surface throughout the guarantee period and all other work incidental thereto, in accordance with sketches, specifications, and to the satisfaction of the Project Manager.

---------- END OF ITEM ----------

ITEM #19 PLANTING PROCURED STREET TREES, 2.0- 2.5 INCH CALIPER
ITEM #20 PLANTING PROCURED STREET TREES, 2.5- 3.0 INCH CALIPER
ITEM #21 PLANTING PROCURED STREET TREES, 3.0- 3.5 INCH CALIPER
ITEM #22 PLANTING PROCURED STREET TREES, 3.5- 4.0 INCH CALIPER

PROCURED PLANT MATERIAL:
Trees for this item will be supplied by a tree procurement nursery that has been contracted with the Agency.

WORK: Under these items of the contract the Contractor shall do all work necessary for the **PLANTING OF PROCURED STREET TREES** in accordance with the plans, specifications, and directions of the Project Manager. All work necessary to prepare tree beds for planting shall be performed under the applicable tree bed preparation items of this Contract.

Receiving and unloading, proper storage, planting, watering, establishing, maintaining, and replacing new trees of the type and size designated on lists, furnishing and installing tree stakes, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Trees shall be planted where indicated on the lists provided once marking has been completed, unless written approval is obtained from the Parks Department. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

CONTRACTOR'S LIABILITIES:
The Contractor shall be liable for any damage to property caused by planting operations and related work, including but not limited to irrigation systems. All areas and construction disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. The Contractor shall always keep a standard irrigation repair kit with an adequate supply of replacement parts with every work crew and repair any damaged irrigation system before leaving the site whenever possible.

In the interest of preserving city sidewalks, the stabilizer legs of the Contractor's backhoe, excavator or other heavy machinery to be used on sidewalks must have padded feet. If not, the Contractor must place wooden planking between the feet of the machine and the sidewalk so that the sidewalk is protected to the Project Manager's satisfaction.

NOTIFICATION FLAG AND SIDEWALK DECAL PROCUREMENT AND INSTALLATION:
The Contractor shall be responsible for the procurement and installation of sidewalk decals for new tree beds and notification flags for lawn strips or existing tree beds. The design artwork and a sample of each will be distributed at the pre-construction meeting. The Contractor may obtain a sample by contacting the Project Manager. See details B and C for the design of the sidewalk decal and notification flag.

The contractor will install the sidewalk decals and notification flags at all planting locations at the time of marking with the Project Manager. Failure to have procured the sidewalk decals and notification flags will result in a delay in marking with the Project Manager. Sidewalk decals and notification flags shall only be installed at those locations indicated in the lists provided and at the direction of the Project Manager.

MATERIAL & DIMENSIONS:
The sidewalk decals shall measure five (5) by eight (8) inches and be a minimum of 2.1 millimeters in thickness. Sidewalk decals shall be adhesive backed, durable and slip resistant. Printing designs will be provided by NYC Parks. The Agency's messaging and logos shall be printed on the sidewalk decals with non-water-based ink and must be UV durable. The printed surface of the decal shall be outdoor sidewalk/textwalk vinyl. Sidewalk decals can be procured through Vanguard, New York NY, or an approved equal.

The notification flags shall be made of white vinyl and be fixed to a twenty-one (21) inch, 1/8" diameter steel wire pole. Flags shall be five (5) by six (6) inches and shall be glued to the pole. The flag print area shall be four (4) by four (4). The Agency's messaging and logos shall be printed on the notification flags and must be UV durable. Notification flags can be procured Vanguard New York NY, or approved equal METHOD:
Where applicable, one (1) sidewalk decal shall be attached to the sidewalk at all PREPARE NEW SIDEWALK TREE BEDS locations or as directed by the Project Manager. Sidewalk decals shall be attached at the curbside of the sidewalk and fixed parallel to the 'T' where trees are to be centered. The area should be cleared of debris before the sidewalk decals are firmly and neatly installed, without creases, to the sidewalk. The decal must be installed on a portion of the sidewalk that will be removed during excavation.

Where applicable, one (1) notification flag shall be inserted into the soil at all PREPARING EXISTING SIDEWALK TREE BEDS or PREPARING LAWN TREE BEDS, locations or as directed by the project manager. Notification flags are to be inserted to a minimum depth of eight (8") inches into the center of the tree bed parallel with the curbside 'T' and stand vertical upon insertion.

REMOVAL & DISPOSAL:
Sidewalk decals and notification flags shall be removed from tree bed locations at time of tree bed excavation and shall be properly disposed of by the Contractor.

QUALITY AND INSPECTION: The Contractor shall have the option to accompany the Project Manager to the tree procurement nursery. The Contractor may exercise this option by contacting a member of the Department of Parks, Environment & Planning staff after the contract is awarded. All of the Contractor's costs associated with accompanying the Project Manager to and from the tree procurement nursery shall be the responsibility of Contractor. If the Contractor chooses to accompany the Agency to the tree procurement nursery, the Contractor must notify the Agency in writing no later than February 1 for spring planting and October 1 for fall planting. The Contractor must provide a minimum of three dates that the Contractor is available to the Agency with its notification.

The Contractor shall not be able to tag individual trees but can view representative samples of trees that will be delivered.

DIMENSIONS: Each tree shall be dimensioned as it stands in its natural position. Trees shall be calipered six (6) inches above ground. Trees furnished shall represent a fair average of the maximum and minimum caliper ranges. Trees furnished shall be delivered in the rootball size appropriate for the tree caliper based on species, trunk flares, or other tree-specific variables. The caliper of some species may exceed the specified caliper based on species, trunk flares or other tree-specific variables, but no tree shall be furnished that exceeds a rootball diameter of 28" for 2-2.5" caliper trees, 32" for 2.5-3" caliper trees, 38" for 3-3.5" trees, and 42" for 3.5-4" caliper trees. In the case of rootball size discrepancies the circumference of the top-most ring of the rootball basket shall be taken and must be less than 96" for 2-2.5" trees, 110" for 2.5-3" trees, 120" for 3-3.5" trees, while 3.5-4" trees must have a circumference of less than 140" or the tree shall be rejected.

PREPARATION OF TREES: The tree procurement nursery shall be responsible for taking all precautions customary in good trade practice in preparing the trees to be moved. The Contractor shall immediately notify the Project Manager if, upon delivery of the trees, it appears that the workmanship of the tree procurement nursery fails to meet the highest standards. The Project Manager will inspect the trees and will determine if the trees will be rejected.

DELIVERY OF PROCURED PLANT MATERIAL: The Contractor will schedule delivery of trees with the tree procurement nursery. The tree procurement nursery will be responsible for the cost of delivery. All trees shall be delivered to a location as specified by the Contractor and the Agency. The location shall be within New York City or within twenty (20) miles from the city limits. Ten (10) days prior to commencement of tree delivery the contractor shall have the option at their own cost to confirm trees are of an acceptable state of dormancy to be dug and delivered. Failure to visit each nursery prior to trees being shipped waives the Contractors' ability to reject trees at the time of tree delivery for trees not being sufficiently dormant. The tree procurement nursery will provide Parks with written confirmation of the delivery schedule. The tree procurement nursery shall provide forty-eight (48) hour notice to both the Contractor and the Agency.

As soon as trees are available for delivery from the tree procurement nursery, as determined by the Project Manager, the Contractor shall be required to accept a minimum of 4 truckloads (if available) per delivery per week. The Contractor must continue to accept a minimum of 4 truckloads (if available) per week and per delivery until the total quantity of trees required for the season has been delivered, unless otherwise directed by the Project Manager.

The delivery schedule arranged between the Contractor and the tree procurement nursery must meet these minimum requirements unless Parks approves an alternate delivery schedule in advance of the delivery. Trees may be delivered in open or enclosed vehicles. It shall be the responsibility of the Contractor to unload the trees once delivered.

ACCEPTANCE OF PROCURED PLANT MATERIAL:

All plant material must be accepted by the Contractor and the Agency in writing. An Agency and Contractor representative must be on site when trees are being delivered to the specified location. Plant material will be rejected if delivered to the site in an unacceptable condition, or if damaged during transport. Once the Contractor accepts delivery of the trees from the tree procurement nursery, the Contractor shall then be responsible for the trees until planted. The contractor shall be responsible for accepting, planting and guaranteeing any and all tree species referred to within the nursery trade as "fall hazards" regardless of planting season in which trees are planted.

In cases of differing opinion, the Agency's Project Manager and subject matter expert shall use reasonable judgement to determine what trees shall be accepted or rejected. Reasonable judgement shall be defined as those factors that will not affect the establishment, long term longevity, or overall health of an individual tree.

HANDLING AND STORAGE OF PROCURED PLANT MATERIAL:

Trees shall be handled with utmost care to insure adequate protection against injury prior to acceptance by the Contractor and the Agency. Balled and burlapped trees shall be set on the ground and balls shall be covered with soil prior to transport. When trees are being loaded, care should be taken not to damage the root ball or burlap. All trees shall be moved appropriately ensuring the root ball is lifted and supported from the base using nursery jaws, forks or a backhoe bucket. Any alternative method of tree handling must be approved in advance by the Agency. Chains may not be used to lift, drag or move the trees. Forklifts shall never pinch the root ball. Any root balls that appear to have been damaged, distorted or pinched during loading/unloading will be rejected.

All materials shall be properly maintained to the satisfaction of the Project Manager. **Trees shall be watered at least 3-4 times per week to ensure that they are kept adequately moist before they are planted.** The project manager may call for less watering if there has been significant rainfall and/ or low temperatures.

ON-SITE INSPECTION: No plant material shall be planted by the Contractor until inspected by the Project Manager at the work site. If a load of trees is delivered from the Contractor's yard to the site in an opened vehicle and the trees were uncovered during transit, the entire load of trees will be rejected. Plant material will be rejected if delivered to site in an unacceptable condition, or if damaged on site due to rough handling. All rejected materials shall be marked by the Project Manager and must be removed from the site and replaced with acceptable material at no additional cost to the Agency. Substantial completion use inspection shall be made upon completion of the Contract.

SITE SPECIFICATIONS:

Time of Planting: Planting under the contract shall begin as directed by the Director of Tree Planting on or about March 1 or October 15 depending on the season, or as otherwise directed by the Director of Tree Planting.

Location: All tree planting shall be completed at tree bed locations designated by the Project Manager, in accordance with the sketches and plans. Site characteristics, such as overhead power

lines, existing vegetation, and infrastructure items, such as curbs and sidewalks, shall be considered. When possible, the tree's leader shall be offset from power lines.

NOTIFICATION TO THE AGENCY:
The Project Manager is to be notified in writing not less than two (2) working days in advance before any tree planting.

The Contractor shall provide a routing sheet of the work to be performed on a daily basis. The proposed route sheet must be provided no later than 5PM the preceding day. The Project Manager must be notified of any changes made to the routing. The format for the routing sheets will be provided at the preconstruction meeting.

PLANTING: No planting shall be done, except in the presence of the Project Manager. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

The contractor may be required to de-compact soil within the tree bed that has become compacted prior to tree planting in pre-excavated tree beds, as directed by the Project Manager.

All ropes, stones, etc. shall be removed from the planting site before backfilling. Backfilling mixture shall be loose and friable, and not frozen. Soil shall be firmed at six (6) to eight (8) inch intervals.

Place balled and burlapped material in the prepared planting tree bed by lifting and carrying it by the rootball so that the ball will not be loosened. Set the tree straight and in the center of the tree bed with the most desirable side facing toward the predominant view. The Contractor's attention is called to the different widths of curbs and that a uniform distance shall be maintained from the center of the tree to the outside of the curb, or as directed by the Project Manager. The Contractor shall verify root flare prior to planting (noting that adventitious roots may be present above the first true root) and remove excess soil over root ball as required to expose the root flare. **Care shall be taken to ensure that roots are not damaged during this process.** Trees shall be installed so that the top of the first true root (the "trunk flare" or "root flare") will be flush with finished grade after settling, and depth of the planting hole adjusted accordingly. Any soil added to reduce the depth of the planting hole must be properly compacted to minimize settling. Care shall be exercised in setting the trees plumb.

The Contractor shall cut and remove rope or wire from the top 2/3 of the rootball and pull the burlap back to the edge of the ball and remove as much woven product and twine as possible, and adjusted to prevent the formation of air pockets where applicable. Where directed by the Project Manager, the burlap shall be entirely removed. All plastic or synthetic fabric must be removed from the ball at the time of planting. Any wire basket enclosed root ball will need to have at least 2/3 of the wire basket cut away from the sides and top of the ball and removed from the site.

Biochar: The Contractor shall furnish and place Biochar in accordance with the plans, specifications and directions of the Project Manager. Biochar shall be applied in the upper 6-8

inches of the backfill mix at a rate of 0.02 cubic feet or 2.5 cups per tree. Biochar cannot be pre-mixed with topsoil and shall be brought to the site un-mixed.

Biochar shall be Soil Reef™ Biochar Gardeners Blend, BioPlex BioCHAR Bio's + PGIR™, Lesco® CarbonPro™ - G, National Carbon's NCTerra, or approved equivalent. Biochar shall be only approved plant-based biochar (PBC), not agricultural waste or grasses, brush, etc. Biochar shall be inoculated with mycorrhizae.

Finishing Surface after Backfilling: The Contractor shall cultivate and rake over finished planting areas and shall leave them in an orderly condition. On level ground or slight slopes, the Contractor shall use topsoil to construct a shallow basin slightly larger than the diameter of the tree ball around each tree, as shown on the sketches, or as directed by the Project Manager. At no time should topsoil be mounded to cover the trunk of the tree. Final soil level, except for the shallow basin, shall be flush with the surrounding sidewalk grade to prevent potential tripping hazard.

Staking: Stakes and ties shall be installed by the Contractor on all trees under this contract.

Submittals:
Stakes shall be of white cedar or similar wood approved by the Project Manager with or without bark attached and shall show no sign of cracking or decay. Each pair of stakes used for a single tree shall consist of identical material. They shall have a maximum allowable deflection of ten percent (10%). All trees shall be supported by two (2) stakes, they shall be eight (8) feet long; the diameter at the middle shall be not less than (2) inches nor more than two and three quarters (2-3/4) inches and the diameter at the butt shall not exceed three (3) inches. Stakes shall be placed a minimum distance of fourteen (14) inches away from the trunk of the tree, taking care to stay clear of the roots, driven thirty (30) inches into the ground, and shall be fastened to the tree with a suitable length of ¾" wide, flat, woven polypropylene material as manufactured by DeepRoot®, Arborstart® or approved equal that is twisted at least three times, tied and knotted to the tree stake as directed by the Project Manager.

Unless otherwise directed, trees shall be staked as shown on the plans and in accordance with these specifications. Stakes shall be set parallel to curbs and be cut to the same height if necessary. Trees shall stand plumb after staking. Stakes and woven polypropylene material shall be removed at the end of the one-year guarantee period, unless directed otherwise by the Project Manager. At the time the stakes are removed any holes left by the stake shall be filled with topsoil of the same quality as that specified in the tree bed preparation items of this Contract.

Pruning: Pruning shall be in accordance with ANSI A300 Part 1 Standard Practices for structural pruning. When directed by the Project Manager, trees shall be pruned so the resulting crown retains the growth habit of the tree species. All branches interfering with or hindering the healthy growth of the tree shall be removed. All diseased branches and all dead branches shall be removed. Any branch which may be partly dead yet has a healthy lateral branch at least one-third the diameter of the parent branch shall be removed beyond the healthy branch. All stubs or improper cuts resulting from former pruning shall be removed. All cuts shall be cleanly made with sharp tools as close to the parent trunk or limb as possible without disturbing the branch bark ridge or callus collar. Any existing nails, spikes, wire, plastic or other materials found driven into or fastened to the trunk or

branches shall be removed or if approved they shall be cut flush in a manner to permit complete healing over.

Mulching: The Contractor shall furnish and place Shredded Bark Mulch in accordance with the plans, specifications, and directions of the Project Manager. Shredded Bark Mulch shall be applied as a ground cover to the surface of all planting tree beds at a depth of three inches (3") at the time of planting.

Shredded Bark Mulch shall be a natural forest product composed of shredded bark or wood not exceeding three inches (3") in length and one inch (1") in width. Mulch shall be derived from tree material, not from wood waste or by-products like sawdust, shredded palettes, or other debris. Mulch shall be natural in color and not dyed. It shall be of a uniform grade with no additives or any other treatment. Mulch with leaves, twigs, and/or debris shall not be acceptable.

NYC Parks-Supplied Mulch:
The Contractor may request to source free mulch directly from the Agency at Cunningham Park or other designated locations. The City makes no representations as to the availability of mulch. The contractor shall be required to obtain mulch from an alternate source if mulch is not available from the City at no additional cost to the City.

Submittals:
Prior to the work commencing, the Contractor shall furnish a representative sample consisting of two - one-pound zip-lock bags labeled with Contractor's name and contract number of the Shredded Bark Mulch the Contractor proposes to use to the Project Manager. No Shredded Bark Mulch shall be delivered until the approval of samples by the Project Manager, but such approval shall not constitute notice of substantial completion. The Project Manager reserves the right to reject on or after delivery any materials which do not, in their opinion, meet these specifications. The Agency's Shredded Bark Mulch is pre-approved for use on this Contract.

The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

WATERING AT THE TIME OF PLANTING: At the time of planting, the soil around each tree shall be thoroughly saturated with at least thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater. Water shall be free from oil, have a pH not less than 6.0 nor greater than 8.0 and shall be free from impurities injurious to vegetation. Unless otherwise directed, water may be drawn from mains owned by or supplying water to the City of New York. Water shall not be applied in a manner that damages plants, plant saucers, stakes or adjacent areas. Each plant saucer shall be carefully filled with water in a manner that does not erode the soil or the plant saucer. Watering shall not cause uprooting or exposure of plant's roots to the air. Damages resulting from these operations shall be immediately repaired at the Contractor's expense. Where water is supplied from City hydrants, the Contractor shall obtain a hydrant permit from the Department of Environmental Protection. The Contractor is responsible for keeping the permits current. Upon the Project Manager's request, hydrant permits shall be provided immediately. The Contractor is responsible for complying with Department of Environmental

Protection regulations for hydrant use, including the use of a backflow prevention device. To ensure compliance, the Contractor must have all tools and permits necessary for using city hydrants in their possession at the time of planting. If conditions do not allow the use of New York City water sources, the Contractor must obtain their own source of water. No direct payment shall be made for water obtained from other than city sources, but the cost thereof shall be deemed included in various items of the contract.

WATERING PRIOR TO AND DURING GUARANTEE:
Watering shall also take place after planting, whether or not the tree has yet been accepted for Use by the agency, and throughout the guarantee period for all trees under this contract. During the watering season, from June 1st through Oct 1st, each tree planted shall be watered weekly (no later than 7 consecutive days since the previous watering event) at a rate of thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater for a total of 18 watering instances. If the contractor finishes planting two weeks or more prior to June 1st, the Project Manager may order watering operations to commence prior to June 1st. If watering is to begin prior to June 1st, the contractor's total watering obligations of 18 instances will be taken into consideration to determine the end of watering season date.

All watering activities under this contract shall be recorded in the Agency's tree watering and establishment system, the details of which are found below this section. The Project Manager may order less watering based on weather conditions, resulting soil water content, or other factors as determined solely by the Agency. If watering is cancelled by the Director of Tree Planting for seven (7) consecutive calendar days or more, the Agency will credit the Contractor a single watering instance for each tree planted prior to the Notice of Cancellation under this Contract.

TREE WATERING AND ESTABLISHMENT SYSTEM:
In order to comply with the watering requirements above and below, the Contractor will receive user license(s) for each individual crew member performing watering under this Contract from the City. The use license will allow individual crew members to record watering activities in the Agency's tree watering and establishment system. **There is no cost to the Contractor to receive this license.**

Prior to commencing watering operations, the contractor shall be responsible for the following:

- (a) Providing the contact information, a valid cell phone number, and compatible cellular device as specified herein for all watering crews during the watering season(s) so that the Agency may contact individual crews to confirm their exact location. In order to quantify trees watered the watering crews will be required to record their watering activities in the Agency's tree watering and establishment system.
- (b) All crew members who will be using the tree watering and establishment system must read through the user guide provided by the Agency at the preconstruction meeting.
- Compatible cellular devices shall be defined as running Android 16 or iOS 26 operating system(s) or greater. Location services shall be turned on when utilizing this system and during the performance of this Work.

Other than the hardware to run the application in the field and a desktop computer for office use, there is no physical version of this technology. All watering and establishment work described

above and below shall be recorded in this database and utilized before and during the guarantee period to certify the Contractor's work activities. All cellular devices required to employ this technology shall be included in the price bid.

ESTABLISHMENT OF TREES DURING THE GUARANTEE PERIOD: The Contractor shall establish all planted trees and is responsible for maintaining new planting areas within the limits of this contract, and in accordance with the plans, specifications, and directions of the Project Manager, until one (1) year after issuance of a written determination of Substantial Completion.

The work performed during the establishment and/or guarantee period shall include mulching, weeding, cultivating, edging, control of insects, fungus, and other diseases by means of spraying with an approved insecticide or fungicide, pruning, adjustment and repair of stakes if installed, and woven polypropylene material if installed, repair of minor washouts, soil replacement and other horticultural operations necessary for the proper growth of all trees, and for keeping the entire area within the contract limits neat in appearance.

Post-Planting Mulching Schedule and Other Establishment Work:
Shredded Bark Mulch shall be applied to a uniform depth of three (3) inches and shall be so distributed as to create a smooth, level cover over the exposed soil. A gap of approximately 2" should be left between the Shredded Bark Mulch and the trunk of the tree to avoid mounding above the trunk flare. The Contractor shall cultivate the soil as needed prior to mulching to improve permeability of the soil surface. After planting, the mulching schedule shall be as follows: (1) when directed by the Project Manager, and (2) within 2 weeks prior to the expiration of the guarantee period.

The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

All planting areas shall be cultivated and weeded with hoes or other approved tools within the period from June 15th through Oct 1st, and such cultivating and weeding shall be repeated at least every two (2) weeks. Weeds shall be removed with the root, weed whackers may not be used. Under no conditions shall weeds be allowed to attain more than six (6) inches of growth including weeds within tree beds where a tree has died, is missing, or has been vandalized and is scheduled to be replaced.

Pavement and/or soil level in the tree bed shall be maintained flush with adjacent pavement during the guarantee period. Maintenance of soil levels shall be factored into the price of the appropriate bid items. At the expiration of the guarantee period, the Contractor shall leave the area around the tree cultivated, mulched, and weed-free in accordance with the specifications above.

When instructed by the Project Manager, all establishment and punch list work, once completed, shall be uploaded into the Agency's tree watering and establishment system including before and after photos as sufficient proof of completion. The Contractor's staff will be required to attend a training held by the Agency regarding the proper use of this system on a mobile device.

To facilitate the fulfillment of these requirements, the Contractor shall notify the Agency of its intent to perform work 48-hours in advance.

The cost of this work shall be included in the price bid.

REPLACEMENT:
The Contractor shall replace, in accordance with the contract plans and specifications, any planted tree that is dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or other causes including clearly-demonstrable vandalism as determined by the Agency, prior to Substantial Completion, within 21 days when trees are available or in the next planting season when trees cannot be dug.

Vandalism: Trees that are proven or show substantial evidence to have been vandalized by means of illegal tree damage shall be replaced a maximum of one (1) time by the Contractor, at no additional cost to the City. The presence of a tree stump or standing shaft within the original tree bed shall not constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage alone. Evidence of vehicular damage shall not constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage alone. The determination of clearly demonstrable vandalism and/or illegal tree damage shall be made solely by the Agency.

There shall be a one (1) year guarantee on trees commencing upon issuance of a written determination of Substantial Completion. When instructed by the Project Manager, the Contractor shall replace trees that have died within the one-year guarantee period after Substantial Completion in the next appropriate planting season even when the next planting season falls outside the one-year period. All topsoil within the designated tree bed must be excavated to the depth specified in the tree bed preparation items under this Contract, depending on the caliper of the tree, during replacement planting operations. Unless otherwise directed by the Project Manager, existing topsoil from the original tree planting under this contract may be reused.

All items within the tree bed including tree guards, grates, pavers, perennials, bulbs, etc. shall remain on site and be replaced neatly at no additional cost to the City. Trees that die and/or are missing within the one (1) year guarantee period shall be replaced as many times as necessary so that there is a live tree at each location at the end of the guarantee period. Trees that are dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or missing for any reason at the guarantee inspection shall be replaced prior to release of retainage and/or deposit guarantee, unless otherwise approved by the Project Manager. The cost of replacement tree(s), the excavation and reuse of existing topsoil, and excavation work necessary to replace the tree including the removal of bricks or asphalt, shall be included in the unit price bid for the various furnished items of the contract.

All replacement trees shall be inspected and tagged at a nursery selected by the Contractor and approved by the Project Manager prior to digging by a member of Environment & Planning Division. The Contractor is required to find replacement of species and caliper that match exactly what the Project Manager has specified. If a specific species cannot be located after efforts have

been made, the contractor is required to notify the Agency by March 1 for spring replacements and October 1 for fall replacements. All approved trees should be planted by dates directed in the punch list and/or seasonal replacement letters. Failure to replace any tree on the replacement list by dates listed in punch list and/or seasonal replacement letters may result in an assessment of liquidated damages in the amount of $200 per tree. The assessment of said liquidated damages shall not absolve the Contractor of its responsibility to replace the trees.

Where dead trees have been identified, whether due to natural causes or vandalism, the Contractor shall remove the dead material, including stakes, and ties **within three (3) weeks of notification** by the Project Manager or his/her designated representative. The Contractor shall add topsoil, grass seed or appropriate paving material at the direction of the Project Manager to the tree bed to eliminate potential tripping hazards at the time of removal.

MEASUREMENT AND PAYMENT: The quantity of **PLANT PROCURED STREET TREES** to be paid for under this item shall be the number of trees of each size and species, planted, and services rendered to establish planted trees, in accordance with the details and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price for **EACH** street tree of each size planted, and shall include the cost of inspecting the trees procured for the contract by the Agency at the tree procurement nursery, planting, pruning, staking, mulching, procuring and installation of sidewalk decals and notification flags, watering, maintaining, and replacing all trees, and all other work incidental thereto, in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price of water, regardless of the source, is deemed included in the unit price bid. No extra payment shall be made for water obtained from the Contractor's own source.

----------END OF ITEM----------

ITEM #23 PLANTING STREET TREES, 2.0- 2.5 INCH CALIPER
ITEM #24 PLANTING STREET TREES, 2.5- 3.0 INCH CALIPER
ITEM #25 PLANTING STREET TREES, 3.0- 3.5 INCH CALIPER
ITEM #26 PLANTING STREET TREES, 3.5- 4.0 INCH CALIPER

WORK: Under these items the Contractor shall do all work necessary for the **PLANTING OF STREET TREES,** in accordance with the plans, specifications, and directions of the Project Manager. All work necessary to prepare tree beds for planting shall be performed under the applicable tree bed preparation items of this Contract.

Furnishing, planting, watering, maintaining and replacing new trees of the type and size designated on lists, furnishing and installing tree stakes, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Trees shall be planted where indicated on the lists provided once marking has been completed, unless written approval is obtained from the Parks Department. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

The Contractor shall be liable for any damage to property, including but not limited to irrigation systems, caused by planting operations and related work. All areas and construction disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. The Contractor shall keep a standard irrigation repair kit with additional replacement parts at all times with every work crew and repair any irrigation system on site whenever possible.

In the interest of preserving city sidewalks, the stabilizer legs of the Contractor's backhoe, excavator or other heavy machinery to be used on sidewalks must have padded feet. If not, the Contractor must place wooden planking between the feet of the machine and the sidewalk so that the sidewalk is protected to the Project Manager's satisfaction.

NOTIFICATION FLAG AND SIDEWALK DECAL PROCUREMENT AND INSTALLATION: The Contractor shall be responsible for the procurement and installation of sidewalk decals for new tree beds and notification flags for lawn strips or existing tree beds. The design artwork and a sample of each will be distributed at the pre-construction meeting. The Contractor may obtain a sample by contacting the Project Manager. See details B and C for the design of the sidewalk decal and notification flag.

The contractor will install the sidewalk decals and notification flags at all planting locations at the time of marking with the Project Manager. Failure to have procured the sidewalk decals and notification flags will result in a delay in marking with the Project Manager. Sidewalk decals and notification flags shall only be installed at those locations indicated in the lists provided and at the direction of the Project Manager.

MATERIAL & DIMENSIONS:
The sidewalk decals shall measure five (5) by eight (8) inches and be a minimum of 2.1 millimeters in thickness. Sidewalk decals shall be adhesive backed, durable and slip resistant. Printing designs will be provided by NYC Parks. The Agency's messaging and logos shall be printed on the sidewalk decals with non-water-based ink and must be UV durable. The printed surface of the decal shall be laminate finished. Sidewalk decals can be procured through Power Graphics, Sandy, Utah or an approved equal.

The notification flags shall be made of white vinyl and be fixed to a twenty-one (21) inch, 1/8" diameter steel wire pole. Flags shall be five (5) by six (6) inches and shall be glued to the pole. The flag print area shall be four (4) by four (4). The Agency's messaging and logos shall be printed on the notification flags and must be UV durable. Notification flags can be procured Vanguard New York NY, or approved equal

METHOD:
One (1) sidewalk decal shall be attached to the sidewalk at all PREPARE NEW SIDEWALK TREE BEDS locations or as directed by the Project Manager. Sidewalk decals shall be attached at the curbside of the sidewalk and fixed parallel to the 'T' where trees are to be centered. The area should be cleared of debris before the sidewalk decals are firmly and neatly installed, without creases, to the sidewalk. The decal must be installed on a portion of the sidewalk that will be removed during excavation.

One (1) notification flag shall be inserted into the soil at all PREPARING EXISTING SIDEWALK TREE BEDS or PREPARING LAWN TREE BEDS locations or as directed by the project manager. Notification flags are to be inserted to a minimum depth of eight (8") inches into the center of the tree bed parallel with the curbside 'T' and stand vertical upon insertion.

REMOVAL & DISPOSAL:
Sidewalk decals and notification flags shall be removed from tree bed locations at time of sidewalk excavation and shall be properly disposed of by the Contractor.

PLANT MATERIAL: The below shall apply to all trees under this item.

NAMES: Plant names shall agree with the nomenclature of "Standardized Plant Names" as adopted by the American Joint Committee on Horticultural Nomenclature 1942 edition: size and grading standards shall conform to those of American Standard for Nursery Stock (2014), unless otherwise specified. No substitutions shall be permitted except by written permission of the Project Manager. All tree cultivars, patented or otherwise, must be certified by the supplying nursery.

QUALITY AND INSPECTION: All trees shall be typical of their species or variety. They shall have normal well-developed branches and a vigorous fibrous root system. They shall be sound, healthy, vigorous trees, free from defects, disfiguring knots, sunscald injuries, abrasions of the bark, plant diseases, insect eggs, borers and all forms of infestations. Trees shall not have damaged or missing leaders, multiple leaders, Y-crotches, or indications of topping or heading back. All trees including replacement trees shall be inspected and tagged at the nursery prior to digging by a member of Parks Environment & Planning Division staff who shall reject all trees not meeting

the above specifications. All trees shall be nursery grown and shall have been growing under the same climatic conditions as those occurring in New York City for at least two (2) years prior to date of the contract. All nursery sources must be approved by the Director of Tree Planting prior to tagging. Trees held in storage shall be rejected if they do not comply with current ANSI Z60.1 standards. Cost of inspection shall be included in the price bid per tree.

DIMENSIONS: Each tree shall be dimensioned as it stands in its natural position. Trees shall be callipered six (6) inches above ground. Trees furnished shall represent a fair average of the maximum and minimum caliper ranges. Trees furnished shall be delivered in the rootball size appropriate for the tree caliper based on species, trunk flares, or other tree-specific variables. The caliper of some species may exceed 3" or 4" caliper based on species, trunk flares or other tree-specific variables, but no tree shall be furnished that exceeds a rootball diameter of 28" for 2-2.5" caliper trees 32" for 2.5-3" caliper trees, 38" for 3-3.5" trees and 42" for 3.5-4" caliper trees. In the case of rootball size discrepancies the circumference of the top most ring of the rootball basket shall be taken and must be less than 96" for 2.0-2.5" trees, 110" for 2.5-3" trees for 2.5-3" trees, 120" for 3-3.5" trees, while 3.5-4" trees must have a circumference of less than 140" or the tree shall be rejected.

PREPARATION OF TREES: All precautions customary in good trade practice shall be taken in preparing trees for moving, and workmanship that fails to meet the highest standards will be rejected. All trees shall be dug immediately before moving unless otherwise specified. All trees shall be dug to retain as many fibrous roots as possible. Balled and burlapped trees shall have a solid ball of earth of the minimum specified size, securely held in place by untreated burlap and stout rope (nylon rope is NOT acceptable). Oversize or exceptionally heavy trees are acceptable if the size of the ball or spread of roots is proportionally increased, to the satisfaction of the Project Manager. Loose, broken, or manufactured balls will be rejected.

DELIVERY: Trees shall be handled with the utmost care to ensure adequate protection against injury. When transported in closed vehicles, plants shall receive adequate ventilation to prevent sweating. When transported in open vehicles, plants shall be protected by tarpaulins or other suitable cover material. Balled and burlapped trees shall be set on the ground and balls shall be covered with soil prior to transport. When trees are being loaded care should be taken not to damage the root ball or burlap. All trees shall be moved appropriately ensuring the root ball is lifted and supported from the base using nursery jaws, forks or a backhoe bucket. Any alternative method of tree handling must be approved in advance by the Agency. Chains may not be used to lift, drag or move the trees. Forklifts shall never pinch the root ball. Any root balls that appear to have been damaged, distorted or pinched during loading/unloading will be rejected. All materials shall be properly maintained to the satisfaction of the Project Manager. Trees shall be watered at least 3-4 times per week to ensure that they are kept adequately moist before they are planted. The project manager may call for less watering if there has been significant rainfall and/or low temperatures.

The Contractor is required to provide 48 hour notice to the Project Manager in writing prior to tree delivery as to when tree deliveries will occur. Any trees not meeting current American Standards for Nursery Stock ANSI Z60.1 shall be rejected by the Project Manager.

ON-SITE INSPECTION: No plant material shall be planted by the Contractor until inspected by the Project Manager at the work site. If a load of trees is delivered from the Contractor's yard to the site in an opened vehicle and the trees were uncovered during transit, the entire load of trees will be rejected. Plant material will be rejected if delivered to site in an unacceptable condition, or if damaged on site due to rough handling. All rejected material shall be marked by the Project Manager and must be removed from the site and replaced with acceptable material at no additional cost to the Agency. Substantial completion use inspection shall be made upon completion of the Contract.

SITE SPECIFICATIONS:
Time of Planting: Planting under the contract shall begin as directed by the Director of Tree Planting on or about March 1 or October 15 depending on the season, or as otherwise directed by the Director of Tree Planting.

Location: All tree planting shall be completed at tree bed locations designated by the Project Manager, in accordance with the sketches and plans. Site characteristics, such as overhead power lines, existing vegetation, and infrastructure items, such as curbs and sidewalks, shall be considered. When possible the tree's leader shall be offset from power lines.

PLANTING: No planting shall be done, except in the presence of the Project Manager. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

The Project Manager is to be notified in writing not less than two (2) working days in advance before any saw cutting, removal, excavation of a tree bed, or tree planting. The Contractor shall provide a routing sheet of the work to be performed on a daily basis. The proposed route sheet must be provided no later than 5PM the preceding day. The Project Manager must be notified of any changes made to the routing. The format for the routing sheets will be provided at the preconstruction meeting.

The contractor may be required to de-compact soil within the tree bed that has become compacted prior to tree planting in pre-excavated tree beds, as directed by the Project Manager.

Place balled and burlapped material in the prepared planting tree bed by lifting, and carrying it by the rootball so that the ball will not be loosened. Set the tree straight and in the center of the tree bed with the most desirable side facing toward the predominant view. The Contractor's attention is called to the different widths of curbs and that a uniform distance shall be maintained from the center of the tree to the outside of the curb, or as directed by the Project Manager. The Contractor shall verify root flare prior to planting (noting that adventitious roots may be present above the first true root), and remove excess soil over root ball as required to expose the root flare. Care shall be taken to ensure that roots are not damaged during this process. Trees shall be installed so that the top of the first true root (the "trunk flare" or "root flare") will be flush with finished grade after settling, and depth of the planting hole adjusted accordingly. Any soil added to reduce the depth of the planting hole must be properly compacted to minimize settling. Care shall be exercised in setting the trees plumb.

The Contractor shall cut and remove rope or wire from the top 2/3 of the rootball and pull the burlap back to the edge of the ball and remove as much woven product and twine as possible. All plastic or synthetic fabric must be removed from the ball at the time of planting. Any wire basket enclosed root ball will need to have at least 2/3 of the wire basket cut away from the sides and top of the ball, and removed from the site.

At least 2/3 of the burlap shall be removed, and the remaining burlap pulled back and adjusted to prevent the formation of air pockets. Where directed by the Project Manager, the burlap shall be entirely removed. All ropes, stones, etc. shall be removed from the planting site before backfilling. Backfilling mixture shall be loose and friable, and not frozen. Soil shall be firmed at six (6) to eight (8) inch intervals.

Biochar: The Contractor shall furnish and place Biochar in accordance with the plans, specifications and directions of the Project Manager. Biochar shall be applied in the upper 6-8 inches of the backfill mix at a rate of 0.02 cubic feet or 2.5 cups per tree. Biochar cannot be pre-mixed with topsoil and shall be brought to the site un-mixed.

Biochar shall be Soil Reef™ Biochar Gardeners Blend, BioPlex BioCHAR Bio's + PGIR™, Lesco® CarbonPro™ - G or approved equivalent. Biochar shall be only approved plant-based biochar (PBC), not agricultural waste or grasses, brush, etc. Biochar shall be inoculated with mycorrhizae.

Finishing Surface after Backfilling: The Contractor shall cultivate and rake over finished planting areas and shall leave them in an orderly condition. On level ground or slight slopes, the Contractor shall use topsoil to construct a shallow basin slightly larger than the diameter of the tree ball around each tree, as shown on the sketches, or as directed by the Project Manager. At no time should topsoil be mounded to cover the trunk of the tree. Final soil level, except for the shallow basin, shall be flush with the surrounding sidewalk grade to prevent potential tripping hazard.

Staking: Stakes and ties shall be installed by the contractor on all trees under this contract.
Stakes shall be of white cedar or similar wood approved by the Project Manager with or without bark attached and shall show no sign of cracking or decay. Each pair of stakes used for a single tree shall consist of identical material. They shall have a maximum allowable deflection of ten percent (10%). All trees shall be supported by two (2) stakes, they shall be eight (8) feet long; the diameter at the middle shall be not less than (2) inches nor more than two and three quarters (2-3/4) inches and the diameter at the butt shall not exceed three (3) inches. Stakes shall be placed a minimum distance of fourteen (14) inches away from the trunk of the tree, taking care to stay clear of the roots, driven thirty (30) inches into the ground, and shall be fastened to the tree with a suitable length of ¾" wide, flat, woven polypropylene material as manufactured by DeepRoot®, Arborstart® or approved equal that is twisted at least three times, tied and knotted to the tree stake as directed by the Project Manager.

Unless otherwise directed, trees shall be staked as shown on the plans and in accordance with these specifications. Stakes shall be set parallel to curbs and be cut to the same height if necessary. Trees shall stand plumb after staking. Stakes and woven polypropylene material shall be removed at the

end of the one year guarantee period, unless directed otherwise by the Project Manager. At the time the stakes are removed any holes left by the stake shall be filled with topsoil of the same quality as that specified in the PREPARING NEW SIDEWALK TREE BEDS Item.

Pruning: Pruning shall be in accordance with ANSI A300 Part 1 Standard Practices for structural pruning. When directed by the Project Manager, trees shall be pruned so the resulting crown retains the growth habit of the tree species. Any and all branches interfering with or hindering the healthy growth of the tree shall be removed. All diseased branches and all dead branches shall be removed. Any branch which may be partly dead, yet has a healthy lateral branch at least one-third the diameter of the parent branch shall be removed beyond the healthy branch. All stubs or improper cuts resulting from former pruning shall be removed. All cuts shall be cleanly made with sharp tools as close to the parent trunk or limb as possible without disturbing the branch bark ridge or callus collar. Any existing nails, spikes, wire, plastic or other materials found driven into or fastened to the trunk or branches shall be removed or if approved they shall be cut flush in a manner to permit complete healing over.

Mulching: The Contractor shall furnish and place Shredded Bark Mulch in accordance with the plans, specifications, and directions of the Project Manager. Shredded Bark Mulch shall be applied as a ground cover to the surface of all planting tree beds at a depth of three inches (3") at the time of planting.

Shredded Bark Mulch shall be a natural forest product composed of shredded bark or wood not exceeding three inches (3") in length and one inch (1") in width. Mulch shall be derived from tree material, not from wood waste or by-products like sawdust, shredded palettes, or other debris. Mulch shall be natural in color and not dyed. It shall be of a uniform grade with no additives or any other treatment. Mulch with leaves, twigs, and/or debris shall not be acceptable.

NYC Parks-Supplied Mulch:
The Contractor may request to source free mulch directly from the Agency at Cunningham Park or other designated locations. The City makes no representations as to the availability of mulch. The contractor shall be required to obtain mulch from an alternative source if mulch is not available from the City at no additional cost to the City.

Submittals:
Prior to the work commencing, the Contractor shall furnish a representative sample consisting of two - one-pound zip-lock bags labeled with Contractor's name and contract number of the Shredded Bark Mulch the Contractor proposes to use to the Project Manager. No Shredded Bark Mulch shall be delivered until the approval of samples by the Project Manager, but such approval shall not constitute notice of substantial completion. The Project Manager reserves the right to reject on or after delivery any materials which do not, in their opinion, meet these specifications. The Agency's Shredded Bark Mulch is pre-approved for use on this Contract.

The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

WATERING AT THE TIME OF PLANTING: At the time of planting, the soil around each tree shall be thoroughly saturated with at least thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater. Water shall be free from oil, have a pH not less than 6.0 nor greater than 8.0 and shall be free from impurities injurious to vegetation. Unless otherwise directed, water may be drawn from mains owned by or supplying water to the City of New York. Water shall not be applied in a manner that damages plants, plant saucers, stakes or adjacent areas. Each plant saucer shall be carefully filled with water in a manner that does not erode the soil or the plant saucer. Watering shall not cause uprooting or exposure of plant's roots to the air. Damages resulting from these operations shall be immediately repaired at the Contractor's expense. Where water is supplied from City hydrants, the Contractor shall obtain a hydrant permit from the Department of Environmental Protection. The Contractor is responsible for keeping the permits current. Upon the Project Manager's request, hydrant permits shall be provided immediately. The Contractor is responsible for complying with Department of Environmental Protection regulations for hydrant use, including the use of a backflow prevention device. To ensure compliance, the Contractor must have all tools and permits necessary for using city hydrants in their possession at the time of planting. If conditions do not allow the use of New York City water sources, the Contractor must obtain their own source of water. No direct payment shall be made for water obtained from other than city sources, but the cost thereof shall be deemed included in various items of the contract.

WATERING PRIOR TO AND DURING GUARANTEE:
Watering shall also take place after planting, whether or not the tree has yet been accepted for Use by the Agency, and throughout the guarantee period for all trees under this contract. During the watering season, from June 1st through Oct 1st, each tree planted shall be watered weekly (no later than 7 consecutive days since the previous watering event) at a rate of thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater for a total of 18 watering instances. If the contractor finishes planting two weeks or more prior to June 1st, the Project Manager may order watering operations to commence prior to June 1st. If watering is to begin prior to June 1st, the contractor's total watering obligations of 18 instances will be taken into consideration to determine the end of watering season date.

All watering activities under this contract shall be recorded in the Agency's tree watering and establishment system, the details of which are found below this section. The Project Manager may order less watering based on weather conditions, resulting soil water content, or other factors as determined solely by the Agency. If watering is cancelled by the Director of Tree Planting for seven (7) consecutive calendar days or more, the Agency will credit the Contractor a single watering instance for each tree planted prior to the Notice of Cancellation under this Contract.

TREE WATERING AND ESTABLISHMENT SYSTEM:
In order to comply with the watering requirements above and below, the Contractor will receive user license(s) for each individual crew member performing watering under this Contract from the City. The use license will allow individual crew members to record watering activities in the Agency's tree watering and establishment system. **There is no cost to the Contractor to receive this license.**

Prior to commencing watering operations, the contractor shall be responsible for the following:

- (a) Providing the contact information, a valid cell phone number, and compatible cellular device as specified herein for all watering crews during the watering season(s) so that the Agency may contact individual crews to confirm their exact location. In order to quantify trees watered the watering crews will be required to record their watering activities in the Agency's tree watering and establishment system.
- (b) All crew members who will be using the tree watering and establishment system must read through the user guide provided by the Agency at the preconstruction meeting.
- Compatible cellular devices shall be defined as running Android 16 or iOS 26 operating system(s) or greater. Location services shall be turned on when utilizing this system and during the performance of this Work.

Other than the hardware to run the application in the field and a desktop computer for office use, there is no physical version of this technology. All watering and establishment work described above and below shall be recorded in this database and utilized before and during the guarantee period to certify the Contractor's work activities. All cellular devices required to employ this technology shall be included in the price bid.

ESTABLISHMENT OF TREES DURING THE GUARANTEE PERIOD: The Contractor shall establish all planted trees and is responsible for maintaining new planting areas within the limits of this contract, and in accordance with the plans, specifications, and directions of the Project Manager, until one (1) year after issuance of a written determination of Substantial Completion.

The work performed during the establishment and/or guarantee period shall include mulching, weeding, cultivating, edging, control of insects, fungus, and other diseases by means of spraying with an approved insecticide or fungicide, pruning, adjustment and repair of stakes if installed, and woven polypropylene material if installed, repair of minor washouts, soil replacement and other horticultural operations necessary for the proper growth of all trees, and for keeping the entire area within the contract limits neat in appearance.

Post-Planting Mulching Schedule and Other Establishment Work:
Shredded Bark Mulch shall be applied to a uniform depth of three (3) inches and shall be so distributed as to create a smooth, level cover over the exposed soil. A gap of approximately 2" should be left between the Shredded Bark Mulch and the trunk of the tree to avoid mounding above the trunk flare. The Contractor shall cultivate the soil as needed prior to mulching to improve permeability of the soil surface. After planting, the mulching schedule shall be as follows: (1) when directed by the Project Manager, and (2) within 2 weeks prior to the expiration of the guarantee period.

The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

All planting areas shall be cultivated and weeded with hoes or other approved tools within the period from June 15th through Oct 1st, and such cultivating and weeding shall be repeated at least

every two (2) weeks. Weeds shall be removed with the root, weed whackers may not be used. Under no conditions shall weeds be allowed to attain more than six (6) inches of growth including weeds within tree beds where a tree has died, is missing, or has been vandalized and is scheduled to be replaced.

Pavement and/or soil level in the tree bed shall be maintained flush with adjacent pavement during the guarantee period. Maintenance of soil levels shall be factored into the price of the appropriate bid items. At the expiration of the guarantee period, the Contractor shall leave the area around the tree cultivated, mulched, and weed-free in accordance with the specifications above.

When instructed by the Project Manager, all establishment and punch list work, once completed, shall be uploaded into the Agency's tree watering and establishment system including before and after photos as sufficient proof of completion. The Contractor's staff will be required to attend a training held by the Agency regarding the proper use of this system on a mobile device.

To facilitate the fulfillment of these requirements, the Contractor shall notify the Agency of its intent to perform work 48-hours in advance.

The cost of this work shall be included in the price bid.

REPLACEMENT:
The Contractor shall replace, in accordance with the contract plans and specifications, any planted tree that is dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or other causes including clearly-demonstrable vandalism as determined by the Agency, prior to Substantial Completion, within 21 days when trees are available or in the next planting season when trees cannot be dug.

Vandalism: Trees that are proven or show substantial evidence to have been vandalized by means of illegal tree damage shall be replaced a maximum of one (1) time by the Contractor, at no additional cost to the City. The presence of a tree stump or standing shaft within the original tree bed shall not alone constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage. Evidence of vehicular damage shall not alone constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage. The determination of clearly demonstrable vandalism and/or illegal tree damage shall be made solely by the Agency.

There shall be a one (1) year guarantee on trees commencing upon issuance of a written determination of Substantial Completion. When instructed by the Project Manager, the Contractor shall replace trees that have died within the one-year guarantee period after Substantial Completion in the next appropriate planting season even when the next planting season falls outside the one-year period. All topsoil within the designated tree bed must be excavated to the depth specified in the PREPARING NEW SIDEWALK TREE BEDS item, depending on the caliper of the tree.. Unless otherwise directed by the Project Manager, existing topsoil from the original tree planting under this contract may be reused.

All items within the tree bed including tree guards, grates, pavers, perennials, bulbs, etc. shall remain on site and be replaced neatly at no additional cost to the City. Trees that die and/or are missing within the one (1) year guarantee period shall be replaced as many times as necessary so that there is a live tree at each location at the end of the guarantee period. Trees that are dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or missing for any reason at the guarantee inspection shall be replaced prior to release of retainage and/or deposit guarantee, unless otherwise approved by the Project Manager. The cost of replacement tree(s), the excavation and reuse of existing topsoil, and excavation work necessary to replace the tree including the removal of bricks or asphalt, shall be included in the unit price bid for the various furnished items of the contract.

All replacement trees shall be inspected and tagged at a nursery selected by the Contractor and approved by the Project Manager prior to digging by a member of Parks Environment & Planning Division. The Contractor is required to find replacement of species and caliper that match exactly what the Project Manager has specified. If a specific species cannot be located after efforts have been made, the contractor is required to notify the Agency by March 1 for spring replacements and October 1 for fall replacements. All approved trees should be planted by dates directed in the punchlist and/or seasonal replacement letters. Failure to replace any tree on the replacement list by dates listed in punchlist and/or seasonal replacement letters may result in the assessment of liquidated damages in the amount of $400 per tree. The assessment of said liquidated damages shall not absolve the Contractor of its responsibility to replace the trees.

Where dead trees have been identified, whether due to natural causes or vandalism, the Contractor shall remove the dead material, including stakes, and ties **within three (3) weeks of notification** by the Project Manager or his/her designated representative. The Contractor shall add topsoil, grass seed or appropriate paving material at the direction of the Project Manager to the tree bed to eliminate potential tripping hazards at the time of removal.

MEASUREMENT AND PAYMENT: The quantity of **PLANTING STREET TREES** to be paid for under this item shall be the number of trees of each size and species, planted, and services rendered to establish planted trees, in accordance with the details and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price for **EACH** tree of each size planted, and shall include the cost of the City inspecting the trees procured for the contract by the Contractor at the Contractor's nursery/nurseries, planting, pruning, staking, mulching, procuring and installation of sidewalk decals and notification flags, watering, maintaining, and replacing all trees, and all other work incidental thereto, in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price of water, regardless of the source, is deemed included in the unit price bid. No extra payment shall be made for water obtained from the Contractor's own source.

----------END OF ITEM----------

ITEM #27 PLANTING GROW BAG/PACKAGED TREES 25 GALLONS (CITY-PROCURED)
ITEM #28 PLANTING GROW BAG/PACKAGED TREES 35 GALLONS (CITY-PROCURED)
ITEM #29 PLANTING GROW BAG/PACKAGED TREES 45 GALLONS (CITY-PROCURED)

PROCURED PLANT MATERIAL:
Trees for this item will be supplied by a tree procurement nursery that has been contracted with the Agency.

WORK: Under these items the Contractor shall do all work necessary for the **PLANTING OF GROW BAG/PACKAGED TREES,** in accordance with the plans, specifications, and directions of the Project Manager. All work necessary to prepare tree beds for planting shall be performed under the applicable "PREPARING TREE BEDS" items.

Receiving and unloading, proper storage, planting, watering, establishing, maintaining, and replacing new trees of the type and size designated on lists, furnishing and installing tree stakes, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Trees shall be planted where indicated on the lists provided once marking has been completed, unless written approval is obtained from the Parks Department. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

CONTRACTOR'S LIABILITIES:
The Contractor shall be liable for any damage to property caused by planting operations and related work, including but not limited to irrigation systems. All areas and construction disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. The Contractor shall always keep a standard irrigation repair kit with an adequate supply of replacement parts with every work crew and repair any damaged irrigation system before leaving the site whenever possible.

In the interest of preserving city sidewalks, the stabilizer legs of the Contractor's backhoe, excavator or other heavy machinery to be used on sidewalks must have padded feet. If not, the Contractor must place wooden planking between the feet of the machine and the sidewalk so that the sidewalk is protected to the Project Manager's satisfaction.

NOTIFICATION FLAG AND SIDEWALK DECAL PROCUREMENT AND INSTALLATION: The Contractor shall be responsible for the procurement and installation of sidewalk decals for new tree beds and notification flags for lawn strips or existing tree beds. The design artwork and a sample of each will be distributed at the pre-construction meeting. The Contractor may obtain a sample by contacting the Project Manager. See details B and C for the design of the sidewalk decal and notification flag.

The contractor will install the sidewalk decals and notification flags at all planting locations at the time of marking with the Project Manager. Failure to have procured the sidewalk decals and notification flags will result in a delay in marking with the Project Manager. Sidewalk decals and

notification flags shall only be installed at those locations indicated in the lists provided and at the direction of the Project Manager.

MATERIAL & DIMENSIONS:
The sidewalk decals shall measure five (5) by eight (8) inches and be a minimum of 2.1 millimeters in thickness. Sidewalk decals shall be adhesive backed, durable and slip resistant. Printing designs will be provided by NYC Parks. The Agency's messaging and logos shall be printed on the sidewalk decals with non-water-based ink and must be UV durable. The printed surface of the decal shall be laminate finished. Sidewalk decals can be procured through Power Graphics, Sandy, Utah or an approved equal.

The notification flags shall be made of white vinyl and be fixed to a twenty-one (21) inch, 1/8" diameter steel wire pole. Flags shall be five (5) by six (6) inches and shall be glued to the pole. The flag print area shall be four (4) by four (4). The Agency's messaging and logos shall be printed on the notification flags and must be UV durable. Notification flags can be procured Vanguard New York NY, or approved equal

METHOD:
One (1) sidewalk decal shall be attached to the sidewalk at all PREPARE NEW SIDEWALK TREE BEDS locations or as directed by the Project Manager. Sidewalk decals shall be attached at the curbside of the sidewalk and fixed parallel to the 'T' where trees are to be centered. The area should be cleared of debris before the sidewalk decals are firmly and neatly installed, without creases, to the sidewalk. The decal must be installed on a portion of the sidewalk that will be removed during excavation.

One (1) notification flag shall be inserted into the soil at all PREPARING EXISTING SIDEWALK TREE BEDS or PREPARING LAWN TREE BEDS locations or as directed by the project manager. Notification flags are to be inserted to a minimum depth of eight (8") inches into the center of the tree bed parallel with the curbside 'T' and stand vertical upon insertion.

REMOVAL & DISPOSAL:
Sidewalk decals and notification flags shall be removed from tree bed locations at time of sidewalk excavation and shall be properly disposed of by the Contractor.

PLANT MATERIAL: The below shall apply to all trees under this item.

QUALITY AND INSPECTION: The Contractor shall have the option to accompany the Project Manager to the tree procurement nursery. The Contractor may exercise this option by contacting a member of the Department of Parks Environment & Planning Division staff after the contract is awarded. All of the Contractor's costs associated with accompanying the Project Manager to and from the tree procurement nursery shall be the responsibility of Contractor. If the Contractor chooses to accompany the Agency to the tree procurement nursery, the Contractor must notify the Agency in writing no later than February 1 for spring planting and October 1 for fall planting. The Contractor must provide a minimum of three dates that the Contractor is available to the Agency with its notification.

The Contractor shall not be able to tag individual trees but can view representative samples of trees that will be delivered.

DIMENSIONS:

For all 25-gallon fabric bags/packaged trees, dimensions shall be, in accordance with ANSI Z60.1:

- Equivalent caliper range 1.75 inches to 2.25 inches, inclusive
- Average height range 10 feet to 16 feet

For all 35-gallon fabric bags/packaged trees, dimensions shall be, in accordance with ANSI Z60.1:

- Equivalent caliper range 2 inches to 2.75 inches, inclusive
- Average height range 10 feet to 18 feet

For all 45-gallon fabric bags/packaged trees, dimensions shall be, in accordance with ANSI Z60.1:

- Equivalent caliper range 2.5 inches to 3.25 inches, inclusive
- Average height range 10 feet to 18 feet

Variations in dimensions of procured tree material shall be permitted and approved solely by the Project Manager if, in their opinion, the tree meets all standard requirements for health and vigor.

PREPARATION OF TREES: The tree procurement nursery shall be responsible for taking all precautions customary in good trade practice in preparing the trees to be moved. The Contractor shall immediately notify the Project Manager if, upon delivery of the trees, it appears that the workmanship of the tree procurement nursery fails to meet the highest standards. The Project Manager will inspect the trees and will determine if the trees will be rejected.

DELIVERY OF PROCURED PLANT MATERIAL: The Contractor will schedule delivery of trees with the tree procurement nursery. The tree procurement nursery will be responsible for the cost of delivery. All trees shall be delivered to a location as specified by the Contractor and the Agency. The location shall be within New York City or within twenty (20) miles from the city limits. The tree procurement nursery will provide Parks with written confirmation of the delivery schedule. The tree procurement nursery shall provide forty-eight (48) hour notice to both the Contractor and the Agency.

As soon as trees are available for delivery from the tree procurement nursery, as determined by the Project Manager, the Contractor shall be required to accept a minimum of 4 truckloads (if available) per delivery per week. The Contractor must continue to accept a minimum of 4 truckloads (if available) per week and per delivery until the total quantity of trees required for the season has been delivered, unless otherwise directed by the Project Manager.

The delivery schedule arranged between the Contractor and the tree procurement nursery must meet these minimum requirements unless Parks approves an alternate delivery schedule in advance of the delivery. Trees may be delivered in open or enclosed vehicles. It shall be the responsibility of the Contractor to unload the trees once delivered.

ACCEPTANCE OF PROCURED PLANT MATERIAL:

All plant material must be accepted by the Contractor and the Agency in writing. An Agency and Contractor representative must be on site when trees are being delivered to the specified location. Plant material will be rejected if delivered to the site in an unacceptable condition, or if damaged during transport. Once the Contractor accepts delivery of the trees from the tree procurement nursery, the Contractor shall then be responsible for the trees until planted.

In cases of differing opinion, the Agency's Project Manager and subject matter expert shall use reasonable judgement to determine what trees shall be accepted or rejected. Reasonable judgement shall be defined as those factors that will not affect the establishment, long term longevity, or overall health of an individual tree.

HANDLING AND STORAGE OF PROCURED PLANT MATERIAL:

All trees shall be moved and maneuvered appropriately, ensuring the root ball is lifted and supported from the base by hand or by using other equipment approved by the Agency. Extreme care shall be taken not to damage the integrity of the roots, trunk, or branches. Any alternative method of tree handling must be approved in advance by the Agency. Chains may not be used to lift, drag or move the trees. Forklifts shall never pinch the root ball. Any root balls that appear to have been damaged, distorted or pinched during loading/unloading will be rejected

All materials shall be properly maintained in the Contractor's yard to the satisfaction of the Project Manager. Trees shall be watered at least 4-5 times per week during the warmest and driest times of the year, April through October, to ensure that they are kept adequately moist before they are planted. The project manager may call for less watering if there has been significant rainfall and/or low temperatures.

ON-SITE INSPECTION: No plant material shall be planted by the Contractor until inspected by the Project Manager at the work site. If a load of trees is delivered from the Contractor's yard to the site in an open vehicle and the trees were uncovered during transit, the entire load of trees will be rejected. Plant material will be rejected if delivered to site in an unacceptable condition, or if damaged on site due to rough handling. All rejected material shall be marked by the Project Manager and must be removed from the site and replaced with acceptable material at no additional cost to the Agency. Substantial completion use inspection shall be made upon completion of the Contract.

SITE SPECIFICATIONS:

Time of Planting: Planting under the contract shall begin as directed by the Director of Tree Planting on or about Oct 1 and continue until May 31 or as otherwise directed by the Director of Tree Planting.

Location: All tree planting shall be completed at tree bed locations designated by the Project Manager, in accordance with the sketches and plans. Site characteristics, such as overhead power lines, existing vegetation, and infrastructure items, such as curbs and sidewalks, shall be considered. When possible, the tree's leader shall be offset from power lines.

PLANTING: No planting shall be done, except in the presence of the Project Manager. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

The Project Manager is to be notified in writing not less than two (2) working days in advance before any saw cutting, removal, excavation of a tree bed, or tree planting. The Contractor shall provide a route sheet of the work to be performed on a daily basis. The proposed route sheet must be provided no later than 5PM the preceding day. The Project Manager must be notified of any changes made to the routing. The format for the routing sheets will be provided at the preconstruction meeting.

The contractor may be required to de-compact soil within the tree bed that has become compacted prior to tree planting in pre-excavated tree beds, as directed by the Project Manager.

The tree shall be placed in the prepared planting tree bed by lifting and carrying it by the fabric/package handles so that the soil within the bag/package will not be loosened. The tree shall be set straight and in the center of the tree bed with the most desirable side facing toward the predominant view. When planting trees in proximity to other new plantings or existing trees, a uniform distance shall be maintained from the center of the tree to the outside of the curb, regardless of variation in curb width, unless directed by the Project Manager.

The Contractor shall cut and remove rope from the outside of the fabric bag/package and rootball if present. The Contractor shall then remove all fabric container material, leaving only the exposed soil medium. The Contractor shall verify the height of the first true root (the “trunk flare” or “root flare”) prior to planting (noting that adventitious roots may be present above the first true root), and remove excess soil as required to expose the root flare. All excess soil medium around the root flare, if present, shall be gently removed to expose the root flare, ensuring that it is flush with surrounding grade, and adjusting backfill soil depth as necessary to achieve such planting height. Care shall be taken to ensure that roots are not damaged during this process. The depth of the planting hole shall be adjusted prior to installation of the tree so that the top of the first true root will be flush with finished grade after settling. Any soil added to reduce the depth of the planting hole must be properly compacted to minimize settling. Care shall be exercised in setting the trees plumb.

Backfilling mixture shall be loose and friable, and not frozen. Soil shall be firmed at six (6) to eight (8) inch intervals. All fabric and/or rope from the fabric grow bag/package shall be removed from the site.

Biochar: The Contractor shall furnish and place Biochar in accordance with the plans, specifications and directions of the Project Manager. Biochar shall be applied in the upper 6-8 inches of the backfill mix at a rate of 0.02 cubic feet or 2.5 cups per tree. Biochar cannot be pre-mixed with topsoil and shall be brought to the site un-mixed.

Biochar shall be Soil Reef™ Biochar Gardeners Blend, BioPlex BioCHAR Bio’s + PGIR™, Lesco® CarbonPro™ - G or approved equivalent. Biochar shall be only approved plant-based biochar (PBC), not agricultural waste or grasses, brush, etc. Biochar shall be inoculated with mycorrhizae.

Finishing Surface after Backfilling: The Contractor shall cultivate and rake over finished planting areas and shall leave them in an orderly condition. On level ground or slight slopes, the Contractor shall use topsoil to construct a shallow basin slightly larger than the diameter of the tree ball around each tree, as shown on the sketches, or as directed by the Project Manager. At no time shall the trunk or trunk flare of the tree be covered with soil. Final soil level, except for the shallow basin, shall be flush with the surrounding sidewalk grade to prevent potential tripping hazard.

Staking: Stakes and ties shall be installed by the contractor on all trees under this contract. Stakes shall be of white cedar or similar wood approved by the Project Manager with or without bark attached and shall show no sign of cracking or decay. Each pair of stakes used for a single tree shall consist of identical material. They shall have a maximum allowable deflection of ten percent (10%). All trees shall be supported by two (2) stakes, they shall be six to eight (6-8) feet long; the diameter at the middle shall be not less than (2) inches nor more than two and three quarters (2-3/4) inches and the diameter at the butt shall not exceed three (3) inches. Stakes shall be placed a minimum distance of fourteen (14) inches away from the trunk of the tree, taking care to stay clear of the roots, driven thirty (30) inches into the ground, and shall be fastened to the tree with a suitable length of ¾" wide, flat, woven polypropylene material as manufactured by DeepRoot®, Arborstart® or approved equal that is twisted at least three times, tied and knotted to the tree stake as directed by the Project Manager.

Unless otherwise directed, trees shall be staked as shown on the plans and in accordance with these specifications. Stakes shall be set parallel to curbs and be cut to the same height if necessary. Trees shall stand plumb after staking. Stakes and woven polypropylene material shall be removed at the end of the one year guarantee period, unless directed otherwise by the Project Manager. At the time the stakes are removed any holes left by the stake shall be filled with topsoil of the same quality as that specified in the PREPARING NEW SIDEWALK TREE BEDS Item.

Pruning: Pruning shall be in accordance with ANSI A300 Part 1 Standard Practices for structural pruning. When directed by the Project Manager, trees shall be pruned so the resulting crown retains the growth habit of the tree species. Any and all branches interfering with or hindering the healthy growth of the tree shall be removed. All diseased branches and all dead branches shall be removed. Any branch which may be partly dead yet has a healthy lateral branch at least one-third the diameter of the parent branch, shall be removed beyond the healthy branch. All stubs or improper cuts resulting from former pruning shall be removed. All cuts shall be cleanly made with sharp tools as close to the parent trunk or limb as possible without disturbing the branch bark ridge or callus collar. Any existing nails, spikes, wire, plastic or other materials found driven into or fastened to the trunk or branches shall be removed or if approved they shall be cut flush in a manner to permit complete healing over.

Mulching: The Contractor shall furnish and place Shredded Bark Mulch in accordance with the plans, specifications, and directions of the Project Manager. Shredded Bark Mulch shall be applied as a ground cover to the surface of all planting tree beds at a depth of three inches (3") at the time of planting. At no time shall the trunk or trunk flare of the tree be covered with mulch.

Shredded Bark Mulch shall be a natural forest product composed of shredded bark or wood not exceeding three inches (3") in length and one inch (1") in width. Mulch shall be derived from tree material, not from wood waste or by-products like sawdust, shredded palettes, or other debris. Mulch shall be natural in color and not dyed. It shall be of a uniform grade with no additives or any other treatment. Mulch with leaves, twigs, and/or debris shall not be acceptable.

NYC Parks-Supplied Mulch:
The Contractor may request to source free mulch directly from the Agency at Cunningham Park or other designated locations. The City makes no representations as to the availability of mulch. The contractor shall be required to obtain mulch from an alternative source if mulch is not available from the City at no additional cost to the City.

Submittals:
Prior to the work commencing, the Contractor shall furnish a representative sample consisting of two - one-pound zip-lock bags labeled with Contractor's name and contract number of the Shredded Bark Mulch the Contractor proposes to use to the Project Manager. No Shredded Bark Mulch shall be delivered until the approval of samples by the Project Manager, but such approval shall not constitute notice of substantial completion. The Project Manager reserves the right to reject on or after delivery any materials which do not, in their opinion, meet these specifications. The Agency's Shredded Bark Mulch is pre-approved for use on this Contract.

The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

WATERING AT THE TIME OF PLANTING: At the time of planting, the soil around each tree shall be thoroughly saturated with at least thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater. Water shall be free from oil, have a pH not less than 6.0 nor greater than 8.0 and shall be free from impurities injurious to vegetation. Unless otherwise directed, water may be drawn from mains owned by or supplying water to the City of New York.

Water shall not be applied in a manner that damages plants, plant saucers, stakes or adjacent areas. Each plant saucer shall be carefully filled with water in a manner that does not erode the soil or the plant saucer. Watering shall not cause uprooting or exposure of plant's roots to the air. Damages resulting from these operations shall be immediately repaired at the Contractor's expense.

Where water is supplied from City hydrants, the Contractor shall obtain a hydrant permit from the Department of Environmental Protection. The Contractor is responsible for keeping the permits current. Upon the Project Manager's request, hydrant permits shall be provided immediately. The Contractor is responsible for complying with Department of Environmental Protection regulations for hydrant use, including the use of a backflow prevention device.
To ensure compliance, the Contractor must have all tools and permits necessary for using city hydrants in their possession at the time of planting. If conditions do not allow the use of New York City water sources, the Contractor must obtain their own source of water. No direct payment shall

be made for water obtained from other than city sources, but the cost thereof shall be deemed included in various items of the contract.

WATERING PRIOR TO AND DURING GUARANTEE:
Watering shall also take place after planting, whether or not the tree has yet been accepted for Use by the agency, and throughout the guarantee period for all trees under this contract. During the watering season, from June 1st through Oct 1st, each tree planted shall be watered weekly (no later than 7 consecutive days since the previous watering event) at a rate of thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater for a total of 18 watering instances. If the contractor finishes planting two weeks or more prior to June 1st, the Project Manager may order watering operations to commence prior to June 1st. If watering is to begin prior to June 1st, the contractor's total watering obligations of 18 instances will be taken into consideration to determine the end of watering season date.

All watering activities under this contract shall be recorded in the Agency's tree watering and establishment system, the details of which are found below this section. The Project Manager may order less watering based on weather conditions, resulting soil water content, or other factors as determined solely by the Agency. If watering is cancelled by the Director of Tree Planting for seven (7) consecutive calendar days or more, the Agency will credit the Contractor a single watering instance for each tree planted prior to the Notice of Cancellation under this Contract.

TREE WATERING AND ESTABLISHMENT SYSTEM:
In order to comply with the watering requirements above and below, the Contractor will receive user license(s) for each individual crew member performing watering under this Contract from the City. The use license will allow individual crew members to record watering activities in the Agency's tree watering and establishment system. **There is no cost to the Contractor to receive this license.**

Prior to commencing watering operations, the contractor shall be responsible for the following:

- (a) Providing the contact information, a valid cell phone number, and compatible cellular device as specified herein for all watering crews during the watering season(s) so that the Agency may contact individual crews to confirm their exact location. In order to quantify trees watered the watering crews will be required to record their watering activities in the Agency's tree watering and establishment system.
- (b) All crew members who will be using the tree watering and establishment system must read through the user guide provided by the Agency at the preconstruction meeting.
- Compatible cellular devices shall be defined as running Android 16 or iOS 26 operating system(s) or greater. Location services shall be turned on when utilizing this system and during the performance of this Work.

Other than the hardware to run the application in the field and a desktop computer for office use, there is no physical version of this technology. All watering and establishment work described above and below shall be recorded in this database and utilized before and during the guarantee period to certify the Contractor's work activities. All cellular devices required to employ this technology shall be included in the price bid.

ESTABLISHMENT OF TREES DURING THE GUARANTEE PERIOD: The Contractor shall establish all planted trees and is responsible for maintaining new planting areas within the limits of this contract, and in accordance with the plans, specifications, and directions of the Project Manager, until one (1) year after issuance of a written determination of Substantial Completion.

The work performed during the establishment and/or guarantee period shall include mulching, weeding, cultivating, edging, control of insects, fungus, and other diseases by means of spraying with an approved insecticide or fungicide, pruning, adjustment and repair of stakes if installed, and woven polypropylene material if installed, repair of minor washouts, soil replacement and other horticultural operations necessary for the proper growth of all trees, and for keeping the entire area within the contract limits neat in appearance.

Post-Planting Mulching Schedule and Other Establishment Work
Shredded Bark Mulch shall be applied to a uniform depth of three (3) inches and shall be so distributed as to create a smooth, level cover over the exposed soil. A gap of approximately 2" should be left between the Shredded Bark Mulch and the trunk of the tree to avoid mounding above the trunk flare. The Contractor shall cultivate the soil as needed prior to mulching to improve permeability of the soil surface. After planting, the mulching schedule shall be as follows: (1) when directed by the Project Manager, and (2) within 2 weeks prior to the expiration of the guarantee period.

The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

All planting areas shall be cultivated and weeded with hoes or other approved tools within the period from June 1 through Oct 15th, and such cultivating and weeding shall be repeated at least every two (2) weeks. Weeds shall be removed with the root, weed whackers may not be used. Under no conditions shall weeds be allowed to attain more than six (6) inches of growth including weeds within tree beds where a tree has died, is missing, or has been vandalized and is scheduled to be replaced.

Pavement and/or soil level in the tree bed shall be maintained flush with adjacent pavement during the guarantee period. Maintenance of soil levels shall be factored into the price of the appropriate bid items. At the expiration of the guarantee period the Contractor shall leave the area around the tree cultivated, mulched, and weed-free, in accordance with the specifications above.

When instructed by the Project Manager, all establishment and punch list work, once completed, shall be uploaded into the Agency's tree watering and establishment system including before and after photos as sufficient proof of completion. The Contractor's staff will be required to attend a training held by the Agency regarding the proper use of this system on a mobile device.

To facilitate the fulfillment of these requirements, the Contractor shall notify the Agency of its intent to perform work 48-hours in advance. The cost of this work shall be included in the price bid.

REPLACEMENT:
The Contractor shall replace, in accordance with the contract plans and specifications, any planted tree that is dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or other causes including clearly-demonstrable vandalism as determined by the Agency, prior to Substantial Completion, within 21 days when trees are available or in the next planting season as determined solely by the Agency.

Vandalism: Trees that are proven or show substantial evidence to have been vandalized by means of illegal tree damage shall be replaced a maximum of one (1) time by the Contractor, at no additional cost to the City. The presence of a tree stump or standing shaft within the original tree bed shall not alone constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage. Evidence of vehicular damage shall not alone constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage. The determination of clearly demonstrable vandalism and/or illegal tree damage shall be made solely by the Agency.

There shall be a one (1) year guarantee on trees commencing upon issuance of a written determination of Substantial Completion. When instructed by the Project Manager, the Contractor shall replace trees that have died within the one-year guarantee period after Substantial Completion in the next appropriate planting season even when the next planting season falls outside the one-year period. All topsoil within the designated tree bed must be excavated to the depth specified in the PREPARING TREE BEDS item(s), Unless otherwise directed by the Project Manager, existing topsoil from the original tree planting under this contract may be reused.

All items within the tree bed including tree guards, grates, pavers, perennials, bulbs, etc. shall remain on site and be replaced neatly at no additional cost to the City. Trees that die and/or are missing within the one (1) year guarantee period shall be replaced as many times as necessary so that there is a live tree at each location at the end of the guarantee period. Trees that are dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or missing for any reason at the guarantee inspection shall be replaced prior to release of retainage and/or deposit guarantee, unless otherwise approved by the Project Manager. The cost of replacement tree(s), the excavation and reuse of existing topsoil, and excavation work necessary to replace the tree including the removal of bricks or asphalt, shall be included in the unit price bid for the various furnished items of the contract.

All replacement trees shall be inspected and tagged at a nursery selected by the Contractor and approved by the Project Manager prior to selection and delivery by a member Parks Environment & Planning staff Division The Contractor is required to find replacement of species and caliper that match exactly what the Project Manager has specified. The contractor shall provide a list of 5 nurseries from which they have current inventory or availability and submit for the Agency's review. If a specific species cannot be located after efforts have been made, the contractor is required to notify the Agency by March 1 for spring replacements and October 1 for fall replacements.

All approved trees should be planted by dates directed in the punchlist and/or seasonal replacement letters. Failure to replace any tree on the replacement list by dates listed in punchlist and/or seasonal replacement letters may result in the assessment of liquidated damages in the amount of $200 per tree. The assessment of said liquidated damages shall not absolve the Contractor of its responsibility to replace the trees.

Where dead trees have been identified, whether due to natural causes or vandalism, the Contractor shall remove the dead material, including stakes, and ties **within three (3) weeks of notification** by the Project Manager or his/her designated representative. The Contractor shall add topsoil, grass seed or appropriate paving material at the direction of the Project Manager to the tree bed to eliminate potential tripping hazards at the time of removal.

MEASUREMENT AND PAYMENT: The quantity of **PLANTING GROW BAG/PACKAGED TREES (CITY-PROCURED)** to be paid for under this item shall be the number of trees of each size and species, planted, and services rendered to establish planted trees, in accordance with the details and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price for **EACH** tree of each size planted, and shall include the cost of cost of inspecting the trees procured for the contract by the Agency at the tree procurement nursery, planting, pruning, staking, mulching, procuring and installation of sidewalk decals and notification flags, watering, maintaining, and replacing all trees, and all other work incidental thereto, in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price of water, regardless of the source, is deemed included in the unit price bid. No extra payment shall be made for water obtained from the Contractor's own source.

----------END OF ITEM----------

ITEM #30 PLANTING GROW BAG/PACKAGED TREES 25 GALLONS (CONTRACTOR-PROCURED)
ITEM #31 PLANTING GROW BAG/PACKAGED TREES 35 GALLONS (CONTRACTOR-PROCURED)
ITEM #32 PLANTING GROW BAG/PACKAGED TREES 45 GALLONS (CONTRACTOR-PROCURED)

WORK: Under these items the Contractor shall do all work necessary for the **PLANTING OF GROW BAG/PACKAGED TREES,** in accordance with the plans, specifications, and directions of the Project Manager. All work necessary to prepare tree beds for planting shall be performed under the applicable "PREPARING TREE BEDS" items.

Furnishing, planting, watering, maintaining, and replacing new trees of the type and size designated on lists, furnishing and installing tree stakes, and all incidental work shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Trees shall be planted where indicated on the lists provided once marking has been completed, unless written approval is obtained from the Parks Department. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

CONTRACTOR'S LIABILITIES:
The Contractor shall be liable for any damage to property caused by planting operations and related work, including but not limited to irrigation systems. All areas and construction disturbed shall be restored to their original conditions to the satisfaction of the Project Manager, within three (3) days of occurrence. The Contractor shall always keep a standard irrigation repair kit with an adequate supply of replacement parts with every work crew and repair any damaged irrigation system before leaving the site whenever possible.

In the interest of preserving city sidewalks, the stabilizer legs of the Contractor's backhoe, excavator or other heavy machinery to be used on sidewalks must have padded feet. If not, the Contractor must place wooden planking between the feet of the machine and the sidewalk so that the sidewalk is protected to the Project Manager's satisfaction.

NOTIFICATION FLAG AND SIDEWALK DECAL PROCUREMENT AND INSTALLATION: The Contractor shall be responsible for the procurement and installation of sidewalk decals for new tree beds and notification flags for lawn strips or existing tree beds. The design artwork and a sample of each will be distributed at the pre-construction meeting. The Contractor may obtain a sample by contacting the Project Manager. See details B and C for the design of the sidewalk decal and notification flag.

The contractor will install the sidewalk decals and notification flags at all planting locations at the time of marking with the Project Manager. Failure to have procured the sidewalk decals and notification flags will result in a delay in marking with the Project Manager. Sidewalk decals and notification flags shall only be installed at those locations indicated in the lists provided and at the direction of the Project Manager.

MATERIAL & DIMENSIONS:

The sidewalk decals shall measure five (5) by eight (8) inches and be a minimum of 2.1 millimeters in thickness. Sidewalk decals shall be adhesive backed, durable and slip resistant. Printing designs will be provided by NYC Parks. The Agency's messaging and logos shall be printed on the sidewalk decals with non-water-based ink and must be UV durable. The printed surface of the decal shall be laminate finished. Sidewalk decals can be procured through Power Graphics, Sandy, Utah or an approved equal.

The notification flags shall be made of white vinyl and be fixed to a twenty-one (21) inch, 1/8" diameter steel wire pole. Flags shall be five (5) by six (6) inches and shall be glued to the pole. The flag print area shall be four (4) by four (4). The Agency's messaging and logos shall be printed on the notification flags and must be UV durable. Notification flags can be procured Vanguard New York NY, or approved equal

METHOD:
One (1) sidewalk decal shall be attached to the sidewalk at all PREPARE NEW SIDEWALK TREE BEDS locations or as directed by the Project Manager. Sidewalk decals shall be attached at the curbside of the sidewalk and fixed parallel to the 'T' where trees are to be centered. The area should be cleared of debris before the sidewalk decals are firmly and neatly installed, without creases, to the sidewalk. The decal must be installed on a portion of the sidewalk that will be removed during excavation.

One (1) notification flag shall be inserted into the soil at all PREPARING EXISTING SIDEWALK TREE BEDS or PREPARING LAWN TREE BEDS locations or as directed by the project manager. Notification flags are to be inserted to a minimum depth of eight (8") inches into the center of the tree bed parallel with the curbside 'T' and stand vertical upon insertion.

REMOVAL & DISPOSAL:
Sidewalk decals and notification flags shall be removed from tree bed locations at time of sidewalk excavation and shall be properly disposed of by the Contractor.

PLANT MATERIAL: The below shall apply to all trees under this item

NAMES: Plant names shall agree with the nomenclature of "Standardized Plant Names" as adopted by the American Joint Committee on Horticultural Nomenclature 1942 edition: size and grading standards shall conform to those of American Standard for Nursery Stock (2014 or most recent), unless otherwise specified. No substitutions shall be permitted except by written permission of the Project Manager. All tree cultivars, patented or otherwise, must be certified by the supplying nursery.

QUALITY AND INSPECTION: All trees shall be typical of their species or variety. They shall have normal well-developed branches and a vigorous fibrous root system. They shall be sound, healthy, vigorous trees, free from defects, disfiguring knots, sunscald injuries, abrasions of the bark, plant diseases, insect eggs, borers, and all forms of infestations. Trees shall not have damaged or missing leaders, multiple leaders, Y-crotches, or indications of topping or heading back.

All trees including replacement trees shall be inspected and tagged at the nursery prior to selection and delivery by a member of Parks Environment & Planning Division staff who shall reject all trees not meeting the above specifications.

All trees shall be nursery grown and shall have been grown in nurseries located within USDA Hardiness Zones 5a through 8a for at least two (2) years prior to date of the contract. All trees shall have been growing in the containers they are to be delivered in for at least 1 year. Trees shall not be pot-bound. Trees must be firmly rooted in their containers but not be pot-bound and shall not move more than 1" in each direction when held by the trunk. Soil media shall not be significantly loose as this would indicate poor root structure and vigor within the container.

All nursery sources must be approved in writing by the Project Manager prior to tagging. Trees held in storage shall be rejected if they do not comply with current ANSI Z60.1 standards. Cost of inspection shall be included in the price bid per tree.

DIMENSIONS:

For all 25-gallon fabric bags/packaged trees, dimensions shall be, in accordance with ANSI Z60.1:

- Equivalent caliper range 1.75 inches to 2.25 inches, inclusive
- Average height range 10 feet to 16 feet

For all 35-gallon fabric bags/packaged trees, dimensions shall be, in accordance with ANSI Z60.1:

- Equivalent caliper range 2 inches to 2.75 inches, inclusive
- Average height range 10 feet to 18 feet

For all 45 gallon fabric bags/packaged trees, dimensions shall be, in accordance with ANSI Z60.1:

- Equivalent caliper range 2.5 inches to 3.25 inches, inclusive
- Average height range 10 feet to 18 feet

Variations in dimensions of procured tree material shall be permitted and approved solely by the Project Manager if, in their opinion, the tree meets all standard requirements for health and vigor.

PREPARATION OF TREES: All precautions customary in good trade practice shall be taken in preparing trees for moving, and workmanship that fails to meet the highest standards will be rejected. All trees shall be grown to retain as many fibrous roots as possible. Oversize or exceptionally heavy trees are acceptable if the size of the fabric container/package if, in the opinion of the Project Manager, the tree meets all standard requirements for health and vigor. Loose, broken, or torn fabric bags/packages will be rejected.

DELIVERY TO CONTRACTOR'S YARD AND TO PLANTING SITES: Trees shall be handled with the utmost care to ensure adequate protection against injury. When transported in closed vehicles, plants shall receive adequate ventilation to prevent transpiration and desiccation. When transported in open vehicles, plants shall be protected by tarpaulins or other suitable cover material. When trees are being loaded care should be taken not to damage the root ball, trunk, branches, buds, or foliage (if present).

All trees shall be moved and maneuvered appropriately, ensuring the root ball is lifted and supported from the base by hand or by using other equipment approved by the Agency. Extreme care shall be taken not to damage the integrity of the roots, trunk, or branches. Any alternative method of tree handling must be approved in advance by the Agency. Chains may not be used to lift, drag or move the trees. Forklifts shall never pinch the root ball. Any root balls that appear to have been damaged, distorted or pinched during loading/unloading will be rejected. Significantly loose soil spilling from trees' containers may be deemed sufficient cause for the Project Manager to reject the tree(s). Trees shall not move more than 1" in each direction when held by the trunk, or they may be rejected at the discretion of the Project Manager.

Any rejected trees shall be replaced by the contractor at no extra cost to the City. The cost of procuring any trees that are ultimately rejected is the contractor's alone and no additional cost shall be levied on the City.

All materials shall be properly maintained in the Contractor's yard to the satisfaction of the Project Manager. Trees shall be watered at least 4-5 times per week during the warmest and driest times of the year, April through October, to ensure that they are kept adequately moist before they are planted. The project manager may call for less watering if there has been significant rainfall and/or low temperatures.

The Contractor is required to provide 48-hour notice to the Project Manager in writing prior to tree delivery as to when tree deliveries will occur. Any trees not meeting current American Standards for Nursery Stock ANSI Z60.1 shall be rejected by the Project Manager.

ON-SITE INSPECTION: No plant material shall be planted by the Contractor until inspected by the Project Manager at the work site. If a load of trees is delivered from the Contractor's yard to the site in an open vehicle and the trees were uncovered during transit, the entire load of trees will be rejected. Plant material will be rejected if delivered to site in an unacceptable condition, or if damaged on site due to rough handling. All rejected material shall be marked by the Project Manager and must be removed from the site and replaced with acceptable material at no additional cost to the Agency. Substantial completion use inspection shall be made upon completion of the Contract.

SITE SPECIFICATIONS:
Time of Planting: Planting under the contract shall begin as directed by the Director of Tree Planting on or about Oct 1 and continue until May 31 or as otherwise directed by the Director of Tree Planting.

Location: All tree planting shall be completed at tree bed locations designated by the Project Manager, in accordance with the sketches and plans. Site characteristics, such as overhead power lines, existing vegetation, and infrastructure items, such as curbs and sidewalks, shall be considered. When possible, the tree's leader shall be offset from power lines.

PLANTING: No planting shall be done, except in the presence of the Project Manager. Any tree planted in a location not on the contract list and without the knowledge of the Project Manager shall not be approved for payment.

The Project Manager is to be notified in writing not less than two (2) working days in advance before any saw cutting, removal, excavation of a tree bed, or tree planting. The Contractor shall provide a route sheet of the work to be performed on a daily basis. The proposed route sheet must be provided no later than 5PM the preceding day. The Project Manager must be notified of any changes made to the routing. The format for the routing sheets will be provided at the preconstruction meeting.

The contractor may be required to de-compact soil within the tree bed that has become compacted prior to tree planting in pre-excavated tree beds, as directed by the Project Manager.

The tree shall be placed in the prepared planting tree bed by lifting and carrying it by the fabric/package handles so that the soil within the bag/package will not be loosened. The tree shall be set straight and in the center of the tree bed with the most desirable side facing toward the predominant view. When planting trees in proximity to other new plantings or existing trees, a uniform distance shall be maintained from the center of the tree to the outside of the curb, regardless of variation in curb width, unless directed by the Project Manager.

The Contractor shall cut and remove rope from the outside of the fabric bag/package and rootball if present. The Contractor shall then remove all fabric container material, leaving only the exposed soil medium. The Contractor shall verify the height of the first true root (the “trunk flare” or “root flare”) prior to planting (noting that adventitious roots may be present above the first true root), and remove excess soil as required to expose the root flare. All excess soil medium around the root flare, if present, shall be gently removed to expose the root flare, ensuring that it is flush with surrounding grade, and adjusting backfill soil depth as necessary to achieve such planting height. Care shall be taken to ensure that roots are not damaged during this process. The depth of the planting hole shall be adjusted prior to installation of the tree so that the top of the first true root will be flush with finished grade after settling. Any soil added to reduce the depth of the planting hole must be properly compacted to minimize settling. Care shall be exercised in setting the trees plumb.

Backfilling mixture shall be loose and friable, and not frozen. Soil shall be firmed at six (6) to eight (8) inch intervals. All fabric and/or rope from the fabric grow bag/package shall be removed from the site.

Biochar: The Contractor shall furnish and place Biochar in accordance with the plans, specifications and directions of the Project Manager. Biochar shall be applied in the upper 6-8 inches of the backfill mix at a rate of 0.02 cubic feet or 2.5 cups per tree. Biochar cannot be pre-mixed with topsoil and shall be brought to the site un-mixed.

Biochar shall be Soil Reef™ Biochar Gardeners Blend, BioPlex BioCHAR Bio’s + PGIR™, Lesco® CarbonPro™ - G or approved equivalent. Biochar shall be only approved plant-based biochar (PBC), not agricultural waste or grasses, brush, etc. Biochar shall be inoculated with mycorrhizae.

Finishing Surface after Backfilling: The Contractor shall cultivate and rake over finished planting areas and shall leave them in an orderly condition. On level ground or slight slopes, the

Contractor shall use topsoil to construct a shallow basin slightly larger than the diameter of the tree ball around each tree, as shown on the sketches, or as directed by the Project Manager. At no time shall the trunk or trunk flare of the tree be covered with soil. Final soil level, except for the shallow basin, shall be flush with the surrounding sidewalk grade to prevent potential tripping hazard.

Staking: Stakes and ties shall be installed by the contractor on all trees under this contract.
Stakes shall be of white cedar or similar wood approved by the Project Manager with or without bark attached and shall show no sign of cracking or decay. Each pair of stakes used for a single tree shall consist of identical material. They shall have a maximum allowable deflection of ten percent (10%). All trees shall be supported by two (2) stakes, they shall be six to eight (6-8) feet long; the diameter at the middle shall be not less than (2) inches nor more than two and three quarters (2-3/4) inches and the diameter at the butt shall not exceed three (3) inches. Stakes shall be placed a minimum distance of fourteen (14) inches away from the trunk of the tree, taking care to stay clear of the roots, driven thirty (30) inches into the ground, and shall be fastened to the tree with a suitable length of ¾" wide, flat, woven polypropylene material as manufactured by DeepRoot®, Arborstart® or approved equal that is twisted at least three times, tied and knotted to the tree stake as directed by the Project Manager.

Unless otherwise directed, trees shall be staked as shown on the plans and in accordance with these specifications. Stakes shall be set parallel to curbs and be cut to the same height if necessary. Trees shall stand plumb after staking. Stakes and woven polypropylene material shall be removed at the end of the one year guarantee period, unless directed otherwise by the Project Manager. At the time the stakes are removed any holes left by the stake shall be filled with topsoil of the same quality as that specified in the PREPARING NEW SIDEWALK TREE BEDS Item.

Pruning: Pruning shall be in accordance with ANSI A300 Part 1 Standard Practices for structural pruning. When directed by the Project Manager, trees shall be pruned so the resulting crown retains the growth habit of the tree species. Any and all branches interfering with or hindering the healthy growth of the tree shall be removed. Any and all diseased branches and all dead branches shall be removed. Any branch which may be partly dead yet has a healthy lateral branch at least one-third the diameter of the parent branch, shall be removed beyond the healthy branch. All stubs or improper cuts resulting from former pruning shall be removed. All cuts shall be cleanly made with sharp tools as close to the parent trunk or limb as possible without disturbing the branch bark ridge or callus collar. Any existing nails, spikes, wire, plastic or other materials found driven into or fastened to the trunk or branches shall be removed or if approved they shall be cut flush in a manner to permit complete healing over.

Mulching: The Contractor shall furnish and place Shredded Bark Mulch in accordance with the plans, specifications, and directions of the Project Manager. Shredded Bark Mulch shall be applied as a ground cover to the surface of all planting tree beds at a depth of three inches (3") at the time of planting. At no time shall the trunk or trunk flare of the tree be covered with mulch.

Shredded Bark Mulch shall be a natural forest product composed of shredded bark or wood not exceeding three inches (3") in length and one inch (1") in width. Mulch shall be derived from tree material, not from wood waste or by-products like sawdust, shredded palettes, or other debris.

Mulch shall be natural in color and not dyed. It shall be of a uniform grade with no additives or any other treatment. Mulch with leaves, twigs, and/or debris shall not be acceptable.
NYC Parks-Supplied Mulch:
The Contractor may request to source free mulch directly from the Agency at Cunningham Park or other designated locations. The City makes no representations as to the availability of mulch. The contractor shall be required to obtain mulch from an alternate source if mulch is not available from the City at no additional cost to the City.

Submittals:
Prior to the work commencing, the Contractor shall furnish a representative sample consisting of two - one-pound zip-lock bags labeled with Contractor's name and contract number of the Shredded Bark Mulch the Contractor proposes to use to the Project Manager. No Shredded Bark Mulch shall be delivered until the approval of samples by the Project Manager, but such approval shall not constitute notice of substantial completion. The Project Manager reserves the right to reject on or after delivery any materials which do not, in their opinion, meet these specifications. The Agency's Shredded Bark Mulch is pre-approved for use on this Contract.

The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

WATERING AT THE TIME OF PLANTING: At the time of planting, the soil around each tree shall be thoroughly saturated with at least thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater. Water shall be free from oil, have a pH not less than 6.0 nor greater than 8.0 and shall be free from impurities injurious to vegetation. Unless otherwise directed, water may be drawn from mains owned by or supplying water to the City of New York.

Water shall not be applied in a manner that damages plants, plant saucers, stakes or adjacent areas. Each plant saucer shall be carefully filled with water in a manner that does not erode the soil or the plant saucer. Watering shall not cause uprooting or exposure of plant's roots to the air. Damages resulting from these operations shall be immediately repaired at the Contractor's expense.

Where water is supplied from City hydrants, the Contractor shall obtain a hydrant permit from the Department of Environmental Protection. The Contractor is responsible for keeping the permits current. Upon the Project Manager's request, hydrant permits shall be provided immediately. The Contractor is responsible for complying with Department of Environmental Protection regulations for hydrant use, including the use of a backflow prevention device.

To ensure compliance, the Contractor must have all tools and permits necessary for using city hydrants in their possession at the time of planting. If conditions do not allow the use of New York City water sources, the Contractor must obtain their own source of water. No direct payment shall be made for water obtained from other than city sources, but the cost thereof shall be deemed included in various items of the contract.

WATERING PRIOR TO AND DURING GUARANTEE:
Watering shall also take place after planting, whether or not the tree has yet been accepted for Use by the Agency, and throughout the guarantee period for all trees under this contract. During the watering season, from June 1st through Oct 1st, each tree planted shall be watered weekly (no later than 7 consecutive days since the previous watering event) at a rate of thirty (30) gallons of water, or forty (40) gallons of water for trees 3.5" caliper or greater for a total of 18 watering instances. If the contractor finishes planting two weeks or more prior to June 1st, the Project Manager may order watering operations to commence prior to June 1st. If watering is to begin prior to June 1st, the contractor's total watering obligations of 18 instances will be taken into consideration to determine the end of watering season date.

All watering activities under this contract shall be recorded in the Agency's tree watering and establishment system, the details of which are found below this section. The Project Manager may order less watering based on weather conditions, resulting soil water content, or other factors as determined solely by the Agency. If watering is cancelled by the Director of Tree Planting for seven (7) consecutive calendar days or more, the Agency will credit the Contractor a single watering instance for each tree planted prior to the Notice of Cancellation under this Contract.

TREE WATERING AND ESTABLISHMENT SYSTEM:
In order to comply with the watering requirements above and below, the Contractor will receive user license(s) for each individual crew member performing watering under this Contract from the City. The use license will allow individual crew members to record watering activities in the Agency's tree watering and establishment system. **There is no cost to the Contractor to receive this license.**

Prior to commencing watering operations, the contractor shall be responsible for the following:

- (a) Providing the contact information, a valid cell phone number, and compatible cellular device as specified herein for all watering crews during the watering season(s) so that the Agency may contact individual crews to confirm their exact location. In order to quantify trees watered the watering crews will be required to record their watering activities in the Agency's tree watering and establishment system.
- (b) All crew members who will be using the tree watering and establishment system must read through the user guide provided by the Agency at the preconstruction meeting.
- Compatible cellular devices shall be defined as running Android 16 or iOS 26 operating system(s) or greater. Location services shall be turned on when utilizing this system and during the performance of this Work.

Other than the hardware to run the application in the field and a desktop computer for office use, there is no physical version of this technology. All watering and establishment work described above and below shall be recorded in this database and utilized before and during the guarantee period to certify the Contractor's work activities. All cellular devices required to employ this technology shall be included in the price bid.

ESTABLISHMENT OF TREES DURING THE GUARANTEE PERIOD: The Contractor shall establish all planted trees and is responsible for maintaining new planting areas within the

limits of this contract, and in accordance with the plans, specifications, and directions of the Project Manager, until one (1) year after issuance of a written determination of Substantial Completion.

The work performed during the establishment and/or guarantee period shall include mulching, weeding, cultivating, edging, control of insects, fungus, and other diseases by means of spraying

with an approved insecticide or fungicide, pruning, adjustment and repair of stakes if installed, and woven polypropylene material if installed, repair of minor washouts, soil replacement and other horticultural operations necessary for the proper growth of all trees, and for keeping the entire area within the contract limits neat in appearance.

Post-Planting Mulching Schedule and Other Establishment Work
Shredded Bark Mulch shall be applied to a uniform depth of three (3) inches and shall be so distributed as to create a smooth, level cover over the exposed soil. A gap of approximately 2" should be left between the Shredded Bark Mulch and the trunk of the tree to avoid mounding above the trunk flare. The Contractor shall cultivate the soil as needed prior to mulching to improve permeability of the soil surface. After planting, the mulching schedule shall be as follows: (1) when directed by the Project Manager, and (2) within 2 weeks prior to the expiration of the guarantee period.
The Contractor shall add topsoil to tree beds prior to mulching if soil levels are below the surrounding grade. Maintenance of soil levels shall be included in the price bid of the appropriate items under this Contract.

All planting areas shall be cultivated and weeded with hoes or other approved tools within the period from June 1 through Oct 15th, and such cultivating and weeding shall be repeated at least every two (2) weeks. Weeds shall be removed with the root, weed whackers may not be used. Under no conditions shall weeds be allowed to attain more than six (6) inches of growth including weeds within tree beds where a tree has died, is missing, or has been vandalized and is scheduled to be replaced.

Pavement and/or soil level in the tree bed shall be maintained flush with adjacent pavement during the guarantee period. Maintenance of soil levels shall be factored into the price of the appropriate bid items. At the expiration of the guarantee period the Contractor shall leave the area around the tree cultivated, mulched, and weed-free, in accordance with the specifications above.

When instructed by the Project Manager, all establishment and punch list work, once completed, shall be uploaded into the Agency’s tree watering and establishment system including before and after photos as sufficient proof of completion. The Contractor’s staff will be required to attend a training held by the Agency regarding the proper use of this system on a mobile device.

To facilitate the fulfillment of these requirements, the Contractor shall notify the Agency of its intent to perform work 48-hours in advance.

The cost of this work shall be included in the price bid.

REPLACEMENT:
The Contractor shall replace, in accordance with the contract plans and specifications, any planted tree that is dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or other causes including clearly-demonstrable vandalism as determined by the Agency, prior to Substantial Completion, within 21 days when trees are available or in the next planting season as determined solely by the Agency.

Vandalism: Trees that are proven or show substantial evidence to have been vandalized by means of illegal tree damage shall be replaced a maximum of one (1) time by the Contractor, at no additional cost to the City. The presence of a tree stump or standing shaft within the original tree bed shall not alone constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage. Evidence of vehicular damage shall not alone constitute sufficient evidence of clearly demonstrable vandalism and/or illegal tree damage. The determination of clearly demonstrable vandalism and/or illegal tree damage shall be made solely by the Agency.

There shall be a one (1) year guarantee on trees commencing upon issuance of a written determination of Substantial Completion. When instructed by the Project Manager, the Contractor shall replace trees that have died within the one-year guarantee period after Substantial Completion in the next appropriate planting season even when the next planting season falls outside the one-year period. All topsoil within the designated tree bed must be excavated to the depth specified in the PREPARING TREE BEDS item(s), Unless otherwise directed by the Project Manager, existing topsoil from the original tree planting under this contract may be reused.

All items within the tree bed including tree guards, grates, pavers, perennials, bulbs, etc. shall remain on site and be replaced neatly at no additional cost to the City. Trees that die and/or are missing within the one (1) year guarantee period shall be replaced as many times as necessary so that there is a live tree at each location at the end of the guarantee period. Trees that are dead or, in the opinion of the Project Manager, is in an unhealthy or unsightly condition, and/or has lost its natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or missing for any reason at the guarantee inspection shall be replaced prior to release of retainage and/or deposit guarantee, unless otherwise approved by the Project Manager. The cost of replacement tree(s), the excavation and reuse of existing topsoil, and excavation work necessary to replace the tree including the removal of bricks or asphalt, shall be included in the unit price bid for the various furnished items of the contract.

All replacement trees shall be inspected and tagged at a nursery selected by the Contractor and approved by the Project Manager prior to selection and delivery by a member of Parks Environment & Planning Division. The Contractor is required to find replacement of species and caliper that match exactly what the Project Manager has specified. The contractor shall provide a list of 5 nurseries from which they have current inventory or availability and submit for the Agency's review. If a specific species cannot be located after efforts have been made, the contractor is required to notify the Agency by March 1 for spring replacements and October 1 for fall replacements.

All approved trees should be planted by dates directed in the punchlist and/or seasonal replacement letters. Failure to replace any tree on the replacement list by dates listed in punchlist and/or seasonal replacement letters may result in the assessment of liquidated damages in the amount of $400 per tree. The assessment of said liquidated damages shall not absolve the Contractor of its responsibility to replace the trees.

Where dead trees have been identified, whether due to natural causes or vandalism, the Contractor shall remove the dead material, including stakes, and ties **within three (3) weeks of notification** by the Project Manager or his/her designated representative. The Contractor shall add topsoil, grass seed or appropriate paving material at the direction of the Project Manager to the tree bed to eliminate potential tripping hazards at the time of removal.

MEASUREMENT AND PAYMENT:
The quantity of **PLANTING GROW BAG/PACKAGED TREES (CONTRACTOR-PROCURED** to be paid for under this item shall be the number of trees of each size and species, planted, and services rendered to establish planted trees, in accordance with the details and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price for **EACH** tree of each size planted, and shall include the cost of the City inspecting the trees procured for the contract by the Contractor at the Contractor's nursery/nurseries, planting, pruning, staking, mulching, procuring and installation of sidewalk decals and notification flags, watering, maintaining, and replacing all trees, and all other work incidental thereto, in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price of water, regardless of the source, is deemed included in the unit price bid. No extra payment shall be made for water obtained from the Contractor's own source.

----------END OF ITEM----------

ITEM #33 TRANSPLANTING TREES UP TO 4" CALIPER

WORK: Under this Item, the Contractor shall **TRANSPLANT TREES UP TO 4"CALIPER** and maintain and replace all trees specified by the Project Manager, in accordance with the plans, specifications, and directions of the Project Manager.

The Contractor shall be liable for any damages to property, including irrigation systems, by transplanting operations and all areas disturbed shall be restored to their original condition, to the satisfaction of the Project Manager. The Contractor shall keep a standard irrigation repair kit with an adequate supply of replacement parts at all times with every work crew and repair any damaged irrigation system before leaving the site whenever possible.

MATERIALS:
Plants: Plants shall be as specified by the Project Manager.
Burlap: Burlap shall be a natural fabric. No nylon burlap shall be permitted.
Cord or Rope: Cord or rope shall be sisal twine. Nylon rope shall not be permitted.

EXECUTION:
Preparation of Plants: All precautions customary in good trade practice shall be taken in preparing plants for moving, and workmanship that fails to meet the highest standards will be rejected. All plants shall be dug immediately before moving unless otherwise directed. All plants shall be dug to retain as many fibrous roots as possible. Plants shall be balled and burlapped having a solid ball of earth of minimum specified size according to the American Association of Nurserymen Standards (2014) securely held in place by burlap and sisal twine. Root balls require Drum Lacing and shall be laced with three (3) ply sisal. All root balls shall be inspected by the Project Manager before moving. Loose, broken, and wire caged balls will be rejected. All rejected material shall be immediately removed from the site and replaced with acceptable material at no additional cost.

The Contractor shall add topsoil, grass seed or appropriate paving material at the direction of the Project Manager to the abandoned tree bed to eliminate potential tripping hazards at the time of removal.

Time of Transplanting: Unless otherwise directed by the Project Manager, material shall be transplanted from March 1st to May 1st and from October 15th to December 1st.

EXCAVATION OF PLANTING TREE BEDS: Sizes of planting tree beds shall be determined by the Project Manager. Payment for excavation of tree beds shall be made under the applicable tree bed preparation items of the contract.

PLANTING AND TREE ESTABLISHMENT: No transplanting shall be done except in the presence of the Project Manager. Unless otherwise specified herein, all materials, workmanship and requirements, including the establishment and guarantee requirement, shall conform to applicable provisions of the PLANTING OF PROCURED STREET TREES Item.

REPLACEMENT: The Contractor shall replace in accordance with the contract plans and specifications any transplanted trees that are dead or, in the opinion of the Project Manager, are in an unhealthy or unsightly condition, and/or have lost their natural shape due to dead branches, excessive pruning, inadequate or improper maintenance, or other causes. Unless otherwise specified herein replacement requirements shall conform to applicable provisions of the PLANTING OF PROCURED STREET TREES Item.

MEASUREMENT AND PAYMENT: The quantity of **TRANSPLANT TREES UP TO 4" CALIPER**, to be paid for under these items shall be the number of Trees transplanted, maintained, and replaced in accordance with the plans and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **EACH** tree transplanted as specified by the Project Manager and shall include the cost of transplanting, inspecting, planting, pruning, mulching, staking, watering, replacing, and maintaining all trees, and all other work incidental thereto in accordance with the plans and specifications, to the satisfaction of the Project Manager.

When, in the opinion of the Project Manager, the Contractor has made an adequate attempt but due to improper site conditions a proper ball cannot be formed and the tree cannot be transplanted the Contractor shall be paid 50% of the unit price bid.

----------END OF ITEM----------

ITEM #34 GRANITE BLOCK PAVERS FOR TREE BEDS

WORK: Under this item the Contractor shall furnish and install **GRANITE BLOCK PAVERS FOR TREE BEDS** on a sand base in accordance with the plans, details and specifications, and directions of the Project Manager.

MATERIALS:
Granite Block Pavers: Granite blocks shall be new or used and shall be cut from fine to medium grained sound and durable granite. The granite shall be reasonably uniform in quality and texture throughout and shall be free from an excess of mica and feldspar and from seams, scales or evidence of disintegration. If used blocks are utilized they shall be clean, free from mortar, asphalt, etc.

Unless otherwise shown on plans, new Granite Block shall be White Mount Airy Granite as manufactured by the North Carolina Granite Corp., Mt. Airy, NC; or Rockville White as manufactured by Coldspring Granite, Cold Spring, MN; or Old Berkshire as manufactured by Williams Stone Company, East Otis, MA; or approved equal.

Unless otherwise noted on the plans, Granite Block shall be fairly rectangular in shape and shall be seven to twelve inches (7”-12”) in length, four to five inches (4”-5”) in width, and three to five inches (3”-5”) in depth. The blocks shall be cut so that opposite faces will be approximately parallel and adjoining faces approximately at right angles to each other. Blocks shall be so dressed that they may be laid with maximum one (1”) inch joints. All Blocks shall be a split face finish on all block faces.

Sand Cushion: Cushion sand shall consist of clean, hard, durable uncoated stone particles, free of lumps of clay and all deleterious substances and shall be so graded that when dry, one hundred percent (100%) shall pass a one quarter (1/4”) inch square opening sieve; not more than thirty-five percent (35%) by weight shall pass a No. 50 sieve. Cushion sand may be rejected if it contains more than ten percent (10%) by weight of loam and silt.

Cement Mortar: The mortar shall be composed on one (1) part of Portland cement and a maximum of two (2) parts sand, with no more than five (5%) percent of the cement content of hydrated lime or lime putty as specified in Section B of the specifications.

Samples: The Contractor shall furnish two (2) samples of granite block pavers before starting work, for approval by the Project Manager. Pavers used on the work shall conform to the approved samples, in the opinion of the Project Manager.

METHOD:
Preparation of Subgrade: The Contractor shall trim and tamp the subgrade to smooth, uniform lines to the satisfaction of the Project Manager, prior to placing the pavers.

Placement of Sand Cushion: The blocks shall be laid on a sand cushion of a maximum thickness of one inch (1"). The sand cushion shall be compacted by being rolled with a roller weighing one hundred fifty pounds (150 lbs.) per foot of width or by tamping, as directed by the Project Manager.

Laying Pavers: The granite block pavers shall be carefully laid on a sand cushion according to the patterns shown on the detail or as directed by the Project Manager. Pavers shall be solidly set in position. All joints shall be a maximum of one (1") inch and a minimum of three quarters (¾") inch in width. Pavers shall be clean of all adhering materials when placed in the pavement. Pavers which, in the opinion of the Project Manager, are not satisfactorily clean shall be well washed before being placed. Pavers with chips or surface damage will not be accepted. Cutting of pavers to meet the pattern requirements will be permitted subject to approval of the Project Manager however, no paver shall be cut to a size less than half the width of the paver.

Filling Joints: All joints shall be mortared in place. The cement mortar should be firmly packed to completely fill these joints. Immediately after the joints are filled, the pavement shall be swept clean. The finished surface shall be free of all excess mortar and cement staining.

TIME OF PAVING: Unless otherwise directed by the Project Manager, the paving of all spring planted trees must be started no later than June 15. The paving of all fall planted trees must be started within a week after planting is completed and continue until the weather prohibits further paving. The above shall be strictly enforced.

MEASUREMENT AND PAYMENT: The quantity of **GRANITE BLOCK PAVERS FOR TREE BEDS** to be paid for under this item shall be the number of **SQUARE FEET** paved in accordance with the plans, specifications and directions of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of granite block pavers in the work complete, and shall include furnishing of all labor, materials, equipment and incidental expense necessary to complete the work, including excavation, preparation of subgrade, furnishing and placing sand cushion, furnishing and placing blocks, furnishing and placing cement mortar joints, furnishing, placing and compacting sand joints, and removing excess mortar all in accordance with the plans and specifications to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #35 RANGE FENCE 4'-0" HEIGHT

WORK: Under this Item, the Contractor shall furnish and install a **RANGE FENCE 4'-0" HT.** in accordance with the plans, specifications, and directions of the Project Manager.
MATERIALS: Unless otherwise indicated herein, all materials and methods of construction shall conform to the applicable portions of Section B.
Fabric: Fabric shall be four (4') foot wide rolls of fuse bonded PVC powder coated four (4") inch (vertical) by two (2") inch (horizontal) 12 or 12 ½ gauge galvanized wire mesh, 10 gauge after powder coating such as "Duro-Fence" as manufactured by C. E. Shepherd Co., Houston, TX, or approved equal. Color to be Black or Dark Green. Fabric color shall match post color.
Steel line posts: Steel line posts shall be minimum 14 gauge, galvanized steel with stabilizing anchor plate, minimum six (6'-0") foot height. Line post shall be "Heavy Duty Steel Studded "T" post" as manufactured by Chicago Heights Steel, Chicago Heights, IL or approved equal. Color to be Black or Dark Green.
Tie wire: Shall be aluminum or steel ties.
INSTALLATION: Line post spacing shall not exceed eight (8') feet on center. The steel line posts shall be driven into the ground to a depth of two (2') feet. Fabric shall be fastened to posts on hooks, studs or tabs and tensioned as recommended by fabric manufacturer. Fabric shall be pulled taut and then secured to post, using fence pliers to close tabs so fabric will not dislodge from post. Tie wire shall be installed as necessary to secure wire mesh. Posts at end shall be braced longitudinally. The Contractor shall maintain the range fence during the life of this contract and shall repair or replace all members that are disturbed, damaged, destroyed, or vandalized at no extra cost to the City.
MEASUREMENT AND PAYMENT: The quantity of **RANGE FENCE 4'-0" HEIGHT** to be paid for under this Item shall be the number of **LINEAR FEET** furnished and installed complete, measured in final position in accordance with the plans and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **LINEAR FOOT** of **RANGE FENCE 4'-0" HEIGHT** and shall include the cost of all labor, materials, and equipment necessary to complete and maintain the work, in accordance with the plans and specifications, to the satisfaction of the Project Manager.

The installed Range Fence 4'-0" Height shall become the property of the New York City Parks Department upon completion of the life of the Contract, and shall either remain in place or turned over to the Borough representative as directed.

----------END OF ITEM----------

ITEM #36 EXPANSION OF EXISTING SIDEWALK TREE BEDS

WORK: Under this item the Contractor shall do all work necessary to expand existing sidewalk tree beds, including saw cutting and removing the existing sidewalk pavement, watering tree, and all incidental work for the expanded portion of the tree bed shall be completed under this item. All work shall be in accordance with the plans and specifications to the satisfaction of the Project Manager.

Any work completed within the existing tree bed shall be paid under the respective and appropriate items.

CONTRACTOR LIABILITIES
The Contractor shall be liable for any damage to property, including but not limited to sidewalks and curbs, caused by operations and related work, and all areas disturbed by construction shall be restored to their original conditions to the satisfaction of the Project Manager.

All work to prepare a tree bed that is voided will be paid under the UNCLASSIFIED EXCAVATION ITEM for the full cubic yards excavated including the depth of sidewalk excavated even if the concrete will be restored. If saw cutting work was performed in preparation for excavation of the voided tree bed the contractor shall be paid under the SAW CUT PAVEMENT ITEM. The UNCLASSIFIED EXCAVATION and SAW CUT PAVEMENT ITEM shall not be certified for payment for voided tree beds as a result of utility conflicts if the Contractor cannot provide sufficient documentation showing compliance with Code 753.

In order to best serve the public, all work required to repair any damage shall be complete within three (3) days of occurrence, including sidewalks and curbs damaged during construction, to install concrete pavement without base as per the CONCRETE PAVEMENT W/O BASE - 4" OR CONCRETE PAVEMENT W/O BASE - 7" ITEMS, or to install concrete curbs per the CONCRETE CURB ITEM, unless directed otherwise by the Project Manager. Repairs to all damaged sidewalk shall be done at the direction and to the satisfaction of the Agency. If adjacent turf is damaged, the Contractor shall apply grass seed to loosened soil.

PRESERVATION OF SIDEWALKS DURING CONSTRUCTION:
In the interest of preserving city sidewalks, the stabilizer legs of the Contractor's backhoe, excavator, or other heavy machinery to be used on sidewalks must have padded feet. If not, the Contractor must place wooden planking between the feet of the machine and the sidewalk so that the latter are protected to the Project Manager's satisfaction. If the Contractor drives on City sidewalks and causes damage, they will be required to repair all damage, including the removal of tracks of pulverized rubber from equipment tires, at no additional cost to the City.

EXCAVATION OR PNEUMATIC DECOMPACTION OF TREE BEDS: The Project Manager shall determine if the expanded tree bed area shall be dug with soil replacement, or pneumatically decompacted with additional soil to be added. No tree beds shall be dug or decompacted until the proposed locations are marked by the Contractor, in the presence of the Project Manager, with WHITE construction spray paint, to insure compliance with all City, State

and utility company regulations. The Contractor shall then take full responsibility for the tree bed locations.

EXCAVATION OF TREE BEDS: All tree beds shall have vertical sides, unless otherwise directed. Excavated materials shall be removed from the site and disposed of by the Contractor. No tree beds shall be backfilled until approved by the Project Manager. The area is to be made secure and safe at the end of the workday. All tree beds are to be closed and filled with topsoil or backfill and made level with existing conditions. Without disturbing any existing tree roots, the Contractor shall remove all materials from the surface of the tree bed to a maximum depth of 18 inches. All excavation shall be performed manually, unless use of a backhoe is approved by the Project Manager. The Contractor shall cautiously remove soil, checking for roots throughout the excavation. No roots over 1” shall be severed, unless otherwise directed by the Project Manager. Final excavation depth is dependent upon the concentration and size of roots encountered.

Where subsurface obstructions are encountered during excavation, the Contractor shall restore the disturbed area to its original condition.

PNEUMATIC DECOMPACTION OF TREE BEDS: During soil decompaction, as directed by the Project Manager, the Contractor shall break up existing compacted soil by Pneumatic Air Device to a depth of 6”-8” inches or as specified by the Project Manager. The contractor shall incorporate compost at a rate of 1”-2” inches thickness over the work zone and till in said compost using Pneumatic Air Device. No roots over 1” shall be severed, unless otherwise directed by the Project Manager. Immediately after decompaction is completed, the contractor is to replace any removed soil with "TOPSOIL FOR TREE BED AREAS"as specified in the plans or as directed by the Project Manager. Mulch shall be applied at a thickness of 2”-3” to fully cover the amended soil. Mulch shall not cover the root flare at the base of the tree. Project Manager may substitute mulch for turf establishment.

The Project Manager is to be notified in writing not less than two (2) working days in advance before any work is done under this item including saw cutting. The Contractor shall provide a routing sheet of the work to be performed on a daily basis. The proposed route sheet must be provided no later than 5PM the preceding day. The format for the routing sheets will be provided at the preconstruction meeting.

UTILITIES AND SERVICES: It is the Contractor's responsibility to detect and protect existing utilities (to remain) from damage during construction. Prior to start of construction the Contractor is required to notify New York 811 (Formerly Dignet of NYC & LI Inc.), when excavation operations are to be conducted in the installation of any item of work which is deemed part of the original contract provisions or is specifically ordered by the Agency.

New York State Industrial Code Rule 753 mandates that the Contractor notify all underground facility operators in the area not less than two (2) and not more than ten (10) business days before the start of excavation to ensure that utility service lines are properly marked prior to excavation.

The Contractor's obligation to protect utilities is not relieved by calling New York 811 Center. The Contractor shall understand that not all utilities may be located and the Contractor is responsible

to locate other utilities, to the best of their ability, using electronic probes, or other methods, prior to the start of excavation. The Contractor shall then proceed cautiously and perform hand excavation, as necessary, to protect the utility as directed by the Project Manager, at no extra cost to the City. If a utility is inadvertently damaged, it is the Contractor's responsibility to restore that utility to operating condition, equal to that existing prior to damage. The Contractor shall remain at the site with the damaged utility until it has been restored and there is no danger to the public (i.e. exposed live electrical wires, etc.).

BACKFILL: Unless otherwise specified herein, all materials, workmanship and requirements shall conform to applicable provisions of the PREPARING NEW SIDEWALK TREE BEDS Item.

FINISHING SURFACE AFTER BACKFILLING: The Contractor shall cultivate and rake over finished planting areas and shall leave them in an orderly condition. Soil need only be added to areas of the expanded tree bed so that the level of soil in the expanded area meets the surrounding grade.

Mulching: The Contractor shall furnish and place Shredded Bark Mulch in accordance with the plans, specifications and directions of the Project Manager. All mulching shall be done during tree bed expansion operation.

Shredded Bark Mulch shall be a natural forest product composed of shredded bark or wood not exceeding three inches (3”) in length and one inch (1”) in width. Mulch shall be derived from tree material, not from wood waste or by-products like sawdust, shredded palettes, or other debris. Mulch shall be natural in color and not dyed. It shall be of a uniform grade with no additives or any other treatment. Mulch with leaves, twigs, and/or debris shall not be acceptable.

The Contractor shall furnish a representative sample (two - one pound sealable plastic bags labeled with Contractor’s name and contract number) of the Shredded Bark Mulch they propose to use to the Project Manager. No Shredded Bark Mulch shall be delivered until the approval of samples by the Project Manager, but such approval shall not constitute notice of substantial completion. The Project Manager reserves the right to reject on or after delivery any materials which do not, in their opinion, meet these specifications. The Contractor may request to source free mulch directly from the Agency at Cunningham Park or other designated locations. The City makes no representations as to the availability of mulch. The contractor shall be required to obtain mulch from alternate source of mulch is not available from the City at no additional cost to the City.

Shredded Bark Mulch shall be applied as a ground cover to the surface of both the expanded and unexpanded portion of the planting tree beds at the time of expansion and one year after expansion. Shredded Bark Mulch shall be applied to a uniform depth of three (3) inches and shall be so distributed as to create a smooth, level cover over the exposed soil. A gap of approximately 2" should be left between the Shredded Bark Mulch and the trunk of the tree to avoid mounding above the trunk flare.

WATERING: At the time of excavation, the soil around each tree shall be thoroughly saturated with at least thirty (30) gallons of water per 12” caliper or as directed by the Project Manager. Water shall be free from oil, have a pH not less than 6.0 nor greater than 8.0 and shall be free from

impurities injurious to vegetation. The Project Manager may order less watering based on weather conditions, resulting soil water content or other factors.

Water shall not be applied in a manner that damages plants, plant saucers, stakes or adjacent areas. Each plant saucer shall be carefully filled with water in a manner that does not erode the soil or the plant saucer. Watering shall not cause uprooting or exposure of plant's roots to the air. Damages resulting from these operations shall be immediately repaired at the Contractor's expense.

Water permits shall be obtained where water is supplied from City hydrants.

MAINTENANCE: The Contractor shall maintain all expanded tree beds within the limits of this contract, and in accordance with the plans, specifications, and directions of the Project Manager, until one (1) years after the issuance of a written determination of Substantial Completion.

Maintenance shall include weeding, cultivating, edging, control of insects, fungus, and other diseases by means of spraying with an approved insecticide or fungicide, pruning, repair of minor washouts, soil replacement and other horticultural operations necessary for the proper growth of all trees, and for keeping the entire area within the contract limits neat in appearance. All planting areas shall be cultivated and weeded with hoes or other approved tools within the period from May 1st to October 31st, and such cultivating and weeding shall be repeated at least every two (2) weeks. Weeds shall be removed with the root, weed whackers may not be used. Under no conditions shall weeds be allowed to attain more than six (6) inches of growth including weeds within tree beds where a tree has died, is missing, or has been vandalized and is scheduled to be replaced. The cost of maintenance shall be included in the price bid.

Pavement and/or soil level in the tree bed shall be maintained flush with adjacent pavement during the guarantee period. At the expiration of the guarantee period the Contractor shall leave the area around the tree cultivated and weed free.

MEASUREMENT AND PAYMENT: The quantity to be paid for under this item shall be the total number of **SQUARE FEET** of **EXPANSION** of **EXISTING SIDEWALK TREE BEDS** performed in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of Expansion of Existing Sidewalk Tree Beds, and shall include the cost of saw cutting and removing sidewalk for only the expanded portion including: excavation of tree bed, furnishing and incorporating topsoil, furnishing and installing mulch, and all other work incidental thereto; watering and all necessary maintenance shall be performed within the expanded and unexpanded area in accordance with sketches, specifications, and to the satisfaction of the Project Manager. Work performed within the original tree bed area shall be billed under the respective and appropriate items.

---------- END OF ITEM ----------

ITEM #37 REMOVE BLOCK AND/OR STONE PAVEMENT

WORK: Under this item the Contractor shall remove all flagstone, concrete, hexagonal, and/or granite block pavement set in a sand bed or mortared in a sand/cement grout, all in accordance with the plans, specifications and directions of the Project Manager.

DESCRIPTION: It is the intent of this item to remove flagstone, concrete, hexagonal, and/or granite block pavement in areas where existing pavement will not be replaced. Replacement topsoil, if needed, shall be covered under the TOPSOIL FOR TREE BED AREAS Item.

DISPOSAL: All materials shall be properly disposed of by the Contractor.

MEASUREMENT AND PAYMENT: The quantity of **REMOVE BLOCK AND/OR STONE PAVEMENT** to be paid under this item shall be the number of **SQUARE FEET** of flagstone, concrete, hexagonal, and/or granite block pavement entirely removed and salvaged in accordance with the plans, specifications and directions of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of flagstone, concrete, hexagonal, and/or granite block pavement removed and disposed of by the Contractor and shall include the cost of all labor, materials, equipment and incidental expenses necessary to complete the work in accordance with the plans and specifications to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #38 REMOVE DEBRIS (TREE BED AND TREE CANOPY)

WORK: Under this item the Contractor shall provide all labor and materials necessary to completely remove miscellaneous debris within tree beds and tree canopies in accordance with the plans, specifications and directions of the Project Manager. This may include but is not limited to items such as canopy lighting, construction materials, brick or concrete walls, railroad ties, basketball hoops, signs, tree houses, balloons, disconnected lighting fixtures, and trash. Iron railings or guards are included in other items.

The Contractor shall carefully protect all trees, shrubs and other growth to remain. The Contractor shall be liable for any and all damages to property caused by debris removal. All damaged trees and plants, areas, and construction shall be replaced or restored to their original condition to the satisfaction of the Project Manager.

Work completed under this item shall be for work not specified under any other contract items.

METHOD: Unless otherwise directed, the Contractor shall thoroughly remove all objectionable materials as directed by the Project Manager.

No trees or shrubs shall be removed, no branches shall be pruned, and no soil disturbed except as ordered by the Project Manager. The use of climbing spikes is not acceptable.

DEBRIS DISPOSAL: The Contractor shall remove from the site all debris generated during the course of a day by the end of that day's work. In the event debris is not removed within this time, liquidated damages of $200 per debris pile, per day will be imposed until debris is removed. All material, unless otherwise salvageable by Parks, shall be properly disposed of by the Contractor.

MEASUREMENT AND PAYMENT: The amount paid for this item shall be the number of **HOURS** of straight, actual time spent on the job in accordance with the specifications of the Project Manager.

The number of Tradespersons employed on this Contract will be determined by the Project Manager. No workers shall be sent to the job unless specifically authorized and cleared by the Project Manager.

The price bid shall be unit prices per **HOUR** for straight time for each Tradesperson. No additional compensation will be made for overtime, weekends, holidays and/or supplemental benefits. The hourly rate shall be inclusive. No work shall be performed on legal holidays.

The prices bid shall include all labor, profit, overhead, tolls, travel time, supervisory personnel, tools and equipment required or used up on performing the Work and any other incidentals necessary to perform and complete the Work in accordance with the specifications and to the satisfaction of the Project Manager.

Daily time sheets must be filled out by the Tradespersons on the job describing the Work Performed and time involved. These must be submitted to the Project Manager and will be subject to verifications.

The estimated number of hours are based on an assumed number of hours which will naturally vary from the actual number of hours required during the year. The Contractor will be paid only for actual hours worked at the job site. All hours are subject to the Agency's review, audit and approval.

----------END OF ITEM----------

ITEM # 39 REMOVE AND RESET METAL TREE GUARDS AND GRATES

WORK: Under this item the Contractor shall completely remove metal (steel, wrought iron or other type) tree guards and grates of all sizes and reset metal tree guards in accordance with the plans, specifications and directions of the Project Manager.

REMOVAL: In the process of removing metal grates and guards, the Contractor shall do no damage or the least amount of damage possible to the surrounding sidewalk. Any damaged sidewalk shall be restored at the Contractor's expense.

All metal tree guards or grates should be removed completely. All traces of the tree guard or grate, including cement footings if present, shall be removed completely during the preparation of the tree bed for planting.

All proper safety precautions should be taken while working. Where possible, the Contractor shall reserve a 10-foot buffer around work area, restricting pedestrian access within the protected area.

EXCAVATION OF PLANTING TREE BEDS: Payment for excavation of tree beds shall be made under the applicable PREPARING TREE BEDS Items of the contract.

RESETTING: The metal tree bed guards shall be reset in soil only, inside the tree beds. The posts shall be set in place and properly supported to hold them to line and grade. The lowest portion of the steel band at the bottom of all side rails shall be flush with the soil. Any guards not set plumb and true to line and grade shall be removed and replaced at the Contractor's expense. This item will also include any welding or other metal work that may be necessary to properly align or reset a tree guard to the satisfaction of the project manager.

DISPOSAL: All materials that are not scheduled to be reset shall be removed and properly disposed of at the direction of the Project Manager. The site shall be left in a clean and safe condition.

NOTIFICATION: Before any work may proceed, the Contractor shall provide at least 48 hours notification to the Project Manager of work plans so proper supervision can be obtained. All work will be supervised by the Project Manager.

QUALIFICATIONS: Only those persons with adequate experience shall be allowed to perform the specified work. All subcontractors must meet the same requirements and must be approved by the Project Manager.

MEASUREMENT AND PAYMENT: The amount paid for this item shall be the number of **HOURS** of straight, actual time spent on the job in accordance with the specifications of the Project Manager.

The number of Tradespersons employed on this Contract will be determined by the Project Manager. No workers shall be sent to the job unless specifically authorized and cleared by the Project Manager.

The price bid shall be unit prices per **HOUR** for straight time for each Tradesperson. No additional compensation will be made for overtime, weekends, holidays and/or supplemental benefits. The hourly rate shall be inclusive. No work shall be performed on legal holidays.

The prices bid shall include all labor, profit, overhead, tolls, travel time, supervisory personnel, tools and equipment required or used up on performing the Work and any other incidentals necessary to perform and complete the Work in accordance with the specifications and to the satisfaction of the Project Manager.

Daily time sheets must be filled out by the Tradespersons on the job describing the Work Performed and time involved. These must be submitted to the Project Manager and will be subject to verifications.

The estimated number of hours are based on an assumed number of hours which will naturally vary from the actual number of hours required during the year. The Contractor will be paid only for actual hours worked at the job site. All hours are subject to the Agency's review, audit and approval.

----------END OF ITEM----------

ITEM #40 TOPSOIL FOR TREE BED AREAS

WORK: Under this item, the Contractor shall furnish and place topsoil for existing tree areas in tree beds with existing trees (not including any STUMP/TREE REMOVAL, PREPARING TREE BEDS or PLANT PROCURED/TREES ITEMS of this Contract), in accordance with the plans, specifications and directions of the Project Manager. The Contractor shall be liable for any damage to property caused by topsoil operations and all areas of construction disturbed shall be restored to their original condition to the satisfaction of the Project Manager. No topsoil shall be furnished until ordered by the Project Manager.

MATERIALS: Unless otherwise specified herein, all materials, workmanship and requirements shall conform to applicable provisions of the PREPARING NEW SIDEWALK TREE BEDS Item.

SPREADING: The Project Manager will designate work areas. Topsoil for tree beds shall be spread to the depth required to meet the finished grade of adjacent pavements. No topsoil shall be handled when in the opinion of the Project Manager it is too wet.

FINISHING SURFACE AFTER BACKFILLING: The Contractor shall cultivate and rake over finished planting areas and shall leave them in an orderly condition.

MEASUREMENT AND PAYMENT: The quantity of **TOPSOIL FOR TREE BED AREAS** to be paid for under this item shall be the number of **CUBIC FEET** of topsoil furnished, placed and incorporated in the completed work in accordance with the plans and specifications to the satisfaction of the Project Manager, measured in the planting tree bed, at the work site. No topsoil shall be furnished until ordered by the Project Manager.

The price bid shall be a unit price per **CUBIC FOOT** of topsoil, measured in place, and shall include the cost of all labor, materials and equipment necessary to prepare topsoil areas, furnish, place and incorporate topsoil and all other work incidental thereto, in accordance with the plans and specifications to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #41 SHREDDED BARK MULCH

WORK: Under this item the Contractor shall furnish and place shredded bark mulch in accordance with the plans, specifications, and directions of the Project Manager.

MATERIAL: Shredded Bark Mulch shall be a natural forest product composed of shredded bark or wood not exceeding three inches (3") in length and one inch (1") in width. Mulch shall be derived from tree material, not from wood waste or by-products like sawdust, shredded palettes, or other debris. Mulch shall be natural in color and not dyed. It shall be of a uniform grade with no additives or any other treatment. Mulch with leaves, twigs, and/or debris shall not be acceptable.

The Contractor shall furnish a representative sample (two – one pound zip-lock bags labeled with Contractor's name and contract number) of the Shredded Bark Mulch before starting work for approval by the Project Manager. No Shredded Bark Mulch shall be delivered until the approval of samples by the Project Manager, but such approval shall not constitute notice of substantial completion. The Project Manager reserves the right to reject on or after delivery any materials which do not meet these specifications. The Contractor may request to source free mulch directly from the Agency at Cunningham Park or other designated locations. The City makes no representations as to the availability of mulch. The contractor shall be required to obtain mulch from an alternate source if mulch is not available from the City at no additional cost to the City.

METHOD: Shredded Bark Mulch shall be applied as a ground cover to the surface of all tree beds after the expansion, planting or excavation is completed. Shredded Bark Mulch shall be applied to a uniform depth of three inches (3") over tree bed areas and two inches (2") over areas of tree bed where groundcover has been installed and shall be so distributed as to create a smooth, level cover over the exposed soil. Plants shall not be covered. A gap of approximately 2" should be left between the Shredded Bark Mulch and the trunk of the tree to avoid mounding above the trunk flare.

MEASUREMENT AND PAYMENT: The quantity of **SHREDDED BARK MULCH** to be paid for under this item shall be the number of **SQUARE YARDS** furnished and installed in accordance with the plans, specifications and directions of the Project Manager.

The price bid shall be per **SQUARE YARD** and shall include the cost of all labor, materials and equipment necessary or required to complete the work in accordance with the plans and specifications, to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #42 SAW CUT PAVEMENT

WORK: Under this item the Contractor shall saw cut existing pavements in accordance with the plans, specification, and direction of the Project Manager.

EXECUTION: All work shall be done by competent mechanics in an approved manner to the satisfaction of the Project Manager.

All saw cutting shall be carried out to the full depth of the pavement to be cut. Saw cutting shall be done to accurate, neat and straight lines marked previous to commencement of work. Saw cutting shall be done with approved power saws specifically designed and manufactured for such a purpose. Reasonable effort shall be made to reduce the dust generated during saw cutting operation. Sidewalk shall be thoroughly rinsed so that no concrete residue is left on adjacent sidewalk as a result of saw cutting operation, and car covers used to protect adjacent vehicles from dust. At the request of the Project Manager this item may also include caulking or sealant to be placed in sawcut joints.

Sealant: Prepared expansion joints shall be coated with a primer followed by installation of a bond breaker and a self-leveling two-component polyurethane-based elastomeric sealant. The Contractor shall apply Sikaflex 429 primer with Sikaflex - 2C, SL sealant, or Sonneborn 733 primer with Sonolastic SL 2 sealant, or approved equal. Color of sealant shall be concrete gray. Asphalt cement will not be approved as a sealant.

Sikaflex products are manufactured by Sika Corp., Lyndhurst, N.J. Sonolastic products are manufactured by Sonneborn and Chem Rex, Inc., Shakopee, MN

Workers shall wear safety clothing and eye protection while operating saw equipment and shall be thoroughly familiar in the safe operation of the equipment.

MEASUREMENT AND PAYMENT: The quantity of **SAW CUT PAVEMENT** to be paid for under this item shall be the number of **LINEAR FEET** of saw cutting performed in accordance with the plans, specifications and directions of the Project Manager.

The price bid shall be a unit price per **LINEAR FOOT** and shall include the cost of all labor, materials, equipment and incidentals necessary to complete the work in accordance with the plans and specifications to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #43 UNCLASSIFIED EXCAVATION

WORK: Under this item the Contractor shall do all excavating, not included under other items, required for grading, trenching, paving, curbs, construction and reconstruction of structures, such as buildings, subsurface structures or any other structures; and shall place, compact and dispose of excavated materials in accordance with the plans, specifications, and directions of the Project Manager.

DEFINITION: Excavation shall be defined as the removal of fence footings, pavements (including concrete pavement reinforced with welded wire mesh), all curbs (except Parks standard type eight (8) and larger), earth, boulders, buried timbers, broken concrete pieces, unit masonry foundations e.g. concrete block, brick, large root masses, and other materials of any nature whatsoever encountered that will not require special rock or hoe ram type heavy concrete breaking equipment, unless otherwise specified.

Where directed, excavation within the tree protection zone shall be performed with equipment of lighter weight to avoid compaction, as approved by the Project Manager.

EXCAVATION AND FILLING: The entire area of work shall be brought to the required lines and grades by excavation and filling. Excavation materials suitable in the opinion of the Project Manager, shall be used in making embankments and filling the low areas of the work, and at such places as the Project Manager may direct.

PROTECTION OF EXISTING TREES AND SHRUBS: All tree and shrub roots exposed by excavating operations must be kept constantly moist with burlap covered with white plastic and checked a minimum of two (2) times a day, once in the morning and once in the afternoon, for a maximum of forty-eight (48) hours, until backfill is complete as directed by the Project Manager. If directed, soaker hoses shall be installed to facilitate properly moist conditions. No roots shall be cut without written permission of the Project Manager. In certain areas the Contractor shall use the Standard Specification “Hand and/or Pneumatic Excavation”, in accordance with the Contract Drawings and directions of the Project Manager. Also see Section C, Article 14, ‘Tree Work’ for additional information and requirements.

SUBGRADE: All soft, boggy, clayey or other objectionable material below the proposed subgrade shall be removed, and the area refilled with acceptable material.

SOD: Sod removed from excavation shall be disposed of to the satisfaction of the Project Manager.

BOULDERS: The Contractor shall remove all boulders, stone or pieces of concrete, lumber, iron or other material that project above subgrade. Any stone larger than two (2) cubic feet in volume shall not be placed within two (2) feet of the finished surface.

BOTTOMS OF EXCAVATIONS: The Contractor shall level the bottoms of all excavations accurately to the lines and levels shown on the plans or as directed by the Project Manager to receive the bottoms of footings or other work supported on soil.

SURPLUS: Excess material excavated by the Contractor shall be properly disposed of by the Contractor at the Contractor's expense.

INSPECTION: When the excavations have been carried to the required depth as shown on the drawings, the Contractor shall do no more work until after inspection by the Project Manager, who shall order the other work to proceed, or further excavation, as the conditions indicate. No other work shall be done until the excavations therefore have been approved by the Project Manager.

BACKFILL: After inspection and approval of depth of the excavation, the excavated area shall be carefully backfilled with topsoil and/or structural soil as directed by the Project Manager and shall be paid for under TOPSOIL FOR TREE BED AREAS ITEM, unless in the event of an a "voided" tree bed where the excavated material can be used as backfill

No direct payment shall be made for rehandling of excavated materials for any purposes necessary to complete the work as shown on the plans, but the compensation will be considered as having been included in the price bid for excavation. Rehandling of excavated materials may be paid for as excavation when the same is made necessary by changes of plans and is ordered in writing by the Project Manager.

UTILITIES AND SERVICES: It is the Contractor's responsibility to detect and protect existing utilities (to remain) from damage during construction. Prior to start of construction the Contractor is required to notify:

New York 811 website: http:/www.ny-811.com
(800) 272-4480 (Admin); (800) 524-7599 (Fax)
E-mail: NY@occinc.com

when excavation operations are to be conducted in the installation of any item of work that is deemed part of the original contract provisions or is specifically ordered by the Agency.

New York State General Business Law Article 36 and New York State Public Service Law Section 119-b, as set forth in Code Rule 753 mandates that the Contractor notify all underground facility operators in the area not less than two (2) and not more than ten (10) business days before the start of excavation to ensure that utility service lines are properly marked prior to excavation.

The Contractor's obligation to protect utilities is not relieved by calling the One Call Center. The Contractor shall understand that not all utilities will be identified by the One-Call Center and the Contractor is still responsible to locate these and other utilities, to the best of their ability, using electronic probes, or other methods, prior to the start of excavation. The Contractor shall then proceed cautiously and perform hand excavation, as necessary, to protect the utility as directed by the Project Manager, at no extra cost to the City. If a utility is inadvertently damaged, it is the Contractor's responsibility to restore that utility to operating condition, equal to that existing prior to damage. The Contractor shall remain at the site with the damaged utility until it has been restored and there is no danger to the public (i.e. exposed live electrical wires, etc.).

MEASUREMENT AND PAYMENT: The quantity of **UNCLASSIFIED EXCAVATION** to be paid for under this item shall be the number of **CUBIC YARDS** of material, measured in its original position, excavated and disposed of as directed by the Project Manager.

The price bid for unclassified excavation shall be a unit price per **CUBIC YARD** and shall include the cost of all labor, materials, equipment and incidental expenses necessary for the excavation, removal and disposal of excavated material, pumping, and other incidental work and expenses necessary to complete the work in accordance with the plans and specifications to the satisfaction of the Project Manager.

For computation of quantities of excavation, no deductions shall be made in the areas of any cross section for any pipe or similar obstruction unless the area of such obstruction is greater than one square foot. Unless otherwise specified, **all Excavation payment lines shall be produced from neat lines except as follows:** Payment lines for pipes, drainage structures and building walls shall be as shown on Drainage Details - Number 2 of D.P.R. Standard Details.

Removal of all curbs (including those with steel reinforcement) shall be paid for under this item.

Hand and/or Pneumatic Excavation, topsoil, and structural soil where deemed necessary, shall be paid for separately under its own item.

----------END OF ITEM----------

ITEM #44 HAND AND/OR PNEUMATIC EXCAVATION

WORK: Under this Item, the Contractor shall perform **HAND AND/OR PNEUMATIC EXCAVATION** in accordance with the plans, specifications, and directions of the Project Manager.

INTENT: The intent of the item is to either hand excavate or excavate with a pneumatic air device in areas where trenching or other excavation is required within the drip line of existing trees and/or excavation around gas lines and other sensitive areas. These are areas, where in the opinion of the Project Manager, use of a backhoe or tractor would not be appropriate.

METHOD: Prior to beginning work, the area to be trenched/excavated shall be thoroughly wetted, 24 hours in advance, to minimize dust to the greatest extent possible. Trenching/Excavation shall be accomplished either by hand or with a pneumatic device such as an Air-Spade® CGP System, as manufactured by AirSpade, Chicopee, MA, or approved equal. The Contractor shall provide a compressor unit for operating the pneumatic excavator rated at one hundred fifty standard cubic feet per minute (150 scfm) at ninety pounds per square foot gauge (90 psfg). All pneumatic excavation shall be as minimal as possible in width and depth, thereby minimizing the impact on tree roots and other areas where the Project Manager determines that conventional machine excavation may be detrimental. Different nozzles may be used on the air spade to expedite the work or minimize the amount of airborne material. Depth shall be as indicated on Contract Drawings or as directed by the Project Manager. Depths greater than 18" shall require removal of soil by hand shovel, or other appropriate means. Where a pneumatic device is used, care shall be taken to avoid rocks being scattered and inadvertently damaging private or public property. In addition, operators must be equipped with adequate protective clothing and gear, in accordance with manufacturers' recommendations. All tree roots exposed by the pneumatic or hand excavation operation must be kept constantly moist with burlap covered with white plastic and checked a minimum of two (2) times a day, once in the morning and once in the afternoon, for a maximum of forty-eight (48) hours, until backfill is complete as directed by the Project Manager. If directed, soaker hoses shall be installed to facilitate properly moist conditions.

Necessary inspections of piping shall be scheduled in advance, especially those involving inspections performed by outside Agencies.

In cases where roots must be cut, the Contractor must receive written approval from Project Manager prior to cutting any roots larger than one inch (1") in diameter. Roots must be cut cleanly with pruning shears, loppers, or pruning saws. All root cuts must be approved by the Project Manager prior to backfilling. (See Article 14)

SUBMITTALS: All submittals shall be in accordance with the requirements of the General Conditions, Section C, Special Provisions, Article 11.

The Contractor shall submit in advance the proposed method of excavation performed under this item. If a device other than the Air-Spade® is proposed, all product literature shall be submitted for review.

MEASUREMENT AND PAYMENT: The quantity of **HAND AND/OR PNEUMATIC EXCAVATION** to be paid for under this Item shall be the number of **CUBIC YARDS** of material excavated and backfilled, as measured in its original position, in accordance with the plans, specifications, and directions of the Project Manager.

The price bid shall be a unit price per **CUBIC YARD** of Hand And/Or Pneumatic Excavation and shall include the cost of all labor, materials, and equipment (including compressor), and incidental expense necessary for the excavation, removal and disposal of excavated material, backfilling and other incidental work and expenses necessary to complete the work in accordance with the plans and specifications, to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #45 STRUCTURAL SOIL FOUNDATION MATERIAL

WORK: Under this Item, the Contractor shall furnish and install **STRUCTURAL SOIL FOUNDATION MATERIAL** in accordance with the plans, specifications, and directions of the Project Manager.

INTENT: This specification is to provide a foundation material intended to provide a durable pavement design while simultaneously supporting successful root growth when planting new trees in paved areas. It may also be used on an experimental basis for pavements with existing trees.

MATERIALS: Unless otherwise specified herein, all materials and methods shall comply with Section B, 'Materials and Methods of Construction.

Structural Soil Foundation Material: Shall conform with CU-Soil™, as patented by Cornell University, patent #5,849,069 or approved equal. Structural Soil shall be obtained from a licensed producer of CU-Soil™ or Structural Soil producer of approved equal qualifications. Proof of CU-Soil™ licensing or approved equal qualifications shall be submitted to the Project Manager prior to delivery. As of the date of this solicitation, licensed providers of Structural Soil meeting the requirements of this specification include, but are not limited to: East Coast Mines, East Quogue, NY; Long Island Compost, Yaphank, NY; Ascape Landscape, Blauvelt, NY; and Advanced Soil Technologies, LLC, Brick, NJ.
Structural Soil components shall be mixed by the licensed or approved producer to the following proportions:

Component	Unit of Weight (Dry)
Crushed Stone	80%
Clay Loam	20%
Hydrogel	1.1 ounces per 200 pounds of stone

Crushed Stone: all stone shall be crushed granite or traprock or washed limestone, no sandstone shall be accepted. No recycled material shall be accepted. Except for areas with existing tree roots, stone shall meet the AASHTO/ ASTM C33 requirements for #4 crushed angular stone graded within the following limits:

Passing Sieve (dry analysis)	Percent by Weight
2 inch	100%
1 1/2 inch	90-100%
1 inch	20-55%
3/4 inch	0-15%
3/8 inch	0-5%

Stone shall be clean and certified to meet NYCDOT aggregate soundness requirements for use in road construction. A single sized crushed stone near one-inch (1") will be preferable to a wider size distribution or smaller single size stone fitting the general description. As directed (where existing tree roots are present), the Project Manager may direct the Contractor to substitute #2 stone to facilitate installation around roots.

Clay Loam: Shall be as determined by the USDA Classification System and mechanical analysis, as per ASTM D-422. Clay loam shall be of uniform composition, without admixture of subsoil, and free of stones greater than one-half inch (1/2") diameter, leaves, roots, debris, toxic materials, or lumps or clods over one inch (1") diameter. It shall have been obtained from naturally well drained areas which have never been previously stripped for topsoil and shall have a history of supporting satisfactory vegetative growth. It shall contain not less than two percent (2%) nor more than five percent (5%) organic matter, as determined by loss on ignition of oven-dried samples, dried to a constant weight at a temperature of 230 º F, plus or minus 9 º F. Mechanical analysis for clay loam shall be as follows:

Textural Class	Percent of Total Weight (Dry)
Gravel	Less than 5%
Sand	20 - 45%
Silt	20 - 50%
Clay	20 - 40%

Clay loam shall meet or be amended to meet the following chemical analysis criteria:

1. pH between 5.5 and 6.5.
2. Organic matter 2 - 5 percent by dry weight.
3. Nutrient levels as required by the testing laboratory recommendations for the types of plants to be grown in the structural soil.
4. Toxic elements and compounds below the US EPA Standards for Exceptional Quality Sludge, or local standards, whichever are more stringent.
5. Soluble salts less than 1.0 millimho per cm.
6. Cation exchange capacity (CEC) greater than 10.
7. Carbon/ Nitrogen ratio less than 33: 1.

Clay loam shall be the product of a commercial processing facility specializing in production of stripped natural topsoil. No clay loam shall come from USDA classified prime farmland.

Slow Release Fertilizer: Commercial fertilizer shall comply with U.S. and N.Y State fertilizer laws. Fertilizer shall be delivered in original unopened containers. The fertilizer shall be 15-2-15 liquid slow release (50%), or approved equal, formulated for mixing into the soil and certified by the manufacturer to provide controlled release of nitrogen continuously for a period of no more than twelve (12) months. Fertilizer shall be delivered in original unopened containers, which shall bear the manufacturer's certificate of compliance covering analysis, and shall be furnished to the Project Manager.

pH Adjustment: To lower the clay loam pH to acceptable levels, commercial granular ferrous sulfate, ninety six percent (96%) pure sulfur may be added to lower soil pH above 6.5. To raise pH levels, the manufacturer may add agricultural limestone containing a minimum of eighty five percent (85%) carbonates. Minimum gradation: 100% passing 10 mesh sieve, 98% passing 20 mesh sieve, 55% passing 60 mesh sieve, and 40% passing 100 mesh sieve.

Hydrogel: Shall be Gelscape® Tackifier, a potassium propenoate-propenamide copolymer hydrogel, as manufactured by Amereq, Inc., New City, N.Y., or approved equal.

SOIL MIXING AND QUALITY CONTROL TESTING: All Structural Soil shall be mixed using appropriate soil measuring, mixing, and shredding equipment of sufficient capacity and capability to assure proper quality control and consistent mix ratios. Structural soil must be mixed in the presence of the licensee, and no soil shall be placed until inspected by the licensee. No mixing of Structural Soil at the project site shall be permitted unless a large paved area is available for mixing and the site has been pre-approved for use by the Project Manager. No Structural Soil shall be mixed or placed in air temperatures below 40 º F or delivered or placed in frozen, wet, or muddy conditions. Material shall be delivered at or near optimal compaction moisture content, as determined by AASHTO T 99 (ASTM D 698). No material shall be delivered or placed in an excessively moist condition, beyond two percent (2%) above optimal compaction moisture content, as determined by AASHTO T 99 (ASTM D 698).

Warning: Do not mix or transport structural soil when rain is expected. Place pavement immediately after placing and compacting structural soil to prevent excessive hydration.

Structural Soil components and the finished mixture shall be protected from excess water absorption and erosion at all times. Do not store materials unprotected from rainfall, nor allow excess water to enter the site prior to compaction. If water is introduced into the material after grading, allow material to drain to near optimal compaction moisture content.

The licensed producer shall add soil amendments to alter soil fertility, including fertilizer and pH adjustment at the rates recommended by soil test results. The soil pH shall be adjusted to fall between 5.5 and 6.5 two months after mixing, if the material is stored. The soil component Carbon/ Nitrogen ratio shall be adjusted to be less than 33:1 within two months after mixing.

The Contractor shall mix sufficient quantity in advance of the time the material is needed at the job site to allow adequate time for the required quality control testing. Storage piles shall be protected from rain and erosion by covering with plastic sheeting.

INSTALLATION: The Contractor shall notify the Project Manager of any subsurface conditions which will affect the Contractor's ability to complete the work, and shall locate and confirm the locations of all underground utility lines and structures prior to starting any excavation in the area to receive Structural Soil by calling New York City/Long Island Call One Center, (800) 272-4480. The Contractor shall be liable to repair any damage to underground utilities or structures caused by their activity during the progress of this work, at their own expense. Where tree roots larger than one inch (1") diameter are damaged, the Contractor shall ensure that damaged root sections are cleanly cut with sterilized pruning equipment.

Structural Soil shall only be installed after the installation of all walls, curbs, footings, and utility work in the area has been completed. For site elements dependent on the Structural Soil for foundation support, postpone installation until immediately after the installation of the Structural Soil. The Contractor shall be responsible for any and all damage caused by the installation of structural soil and all disturbed areas shall be restored to their original condition, to the satisfaction of the Project Manager.

Site Preparation: The Contractor shall excavate and compact the proposed subgrade to the required depths and dimensions indicated on the drawings or as directed in the field. Do not over excavate

compacted subgrades of adjacent pavement or structures. Confirm that the subgrade is at the proper elevation and compacted as required. The excavation shall be cleared of all construction debris, trash, rubble, and foreign material.

Install the first six inch (6") lift of Structural Soil mix over the prepared subgrade. Install succeeding layers in six inch (6") lifts and compact each lift. Compact all materials to not less than ninety five percent (95%) of peak dry density from a standard AASHTO compaction curve (AASHTO T 99). No compaction shall occur when moisture content exceeds the maximum listed herein. Delay compaction at least twenty four (24) hours if moisture content exceeds the maximum allowable, and protect the Structural Soil during delays in compaction with plastic or plywood, as directed by the Project Manager.

Prior to placing pavement, the licensed CU-Soil™ or approved equal provider and the Project Manager shall check the Structural Soil material for consistency with the color and texture of the approved sample supplied by the Contractor. In the event that the material supplied varies significantly from the approved sample, the Project Manager may request that the Contractor test the installed Structural Soil. Any mix which varies significantly from the approved testing results, as determined by the Project Manager, shall be removed and new Structural Soil installed that meets the specifications.

SUBMITTALS: All submittals shall be in accordance with Section "C" General Conditions, Special Provisions, Article 11. The Contractor shall submit test reports for Structural Soil Foundation Material components from an approved independent testing laboratory indicating the following:

1. License: Submit the manufacturer's license to produce "CU-Soil™" or approved equal proof of manufacturer's satisfactory compliance with the requirements of this specification and proof of at least three years' experience of such compliance.

2 Clay Loam: Submit test results for particle size, bulk density, pH, percent organic content by weight, nutrient levels including nitrogen, phosphorus, and potassium, soluble salts in ppm, and chemical analysis. In addition, submit the locations of all field sources for the clay loam and a list of all chemicals, insecticides, and herbicides applied to the clay loam in the previous five (5) years, and a list of all crops grown in the clay loam source fields in the previous three (3) years.

3. Crushed Stone: A three pound (3 lb.) bag of crushed stone shall be submitted with test results and contract name and number attached for approval prior to installation. Submit test results for particle size, loose and rodded unit weight, bulk specific gravity, soundness, absorbance, and stone dimension description, as per ASTM D 4791, for the crushed stone.

Alternatives to CU-Soil® may be submitted for approval, but alternative system must be supported with scientific research as demonstrated by the following additional required submittals:

1. Contractor shall submit one or more scientific papers, demonstrating research conducted over a five year time period or longer on improving plant performance in highly urbanized paved areas where trees are planted in soil materials used as a foundation for pavement that meet construction needs while also promoting successful root growth.

2. Contractor shall submit a follow –up scientific paper demonstrating improved shoot and root growth over several years for various species of trees growing in these designed urban soils.
3. Contractor shall submit follow-up evaluations and studies at designated controlled experimental sites, where several trees are planted in agricultural soil field control plots, several planted in typical pavement design and several planted in the proposed structural soil alternative. Minimum study period must be five years.
4. Contractor must demonstrate that alternative designed urban soil meets engineered loadbearing AASHTO requirements for 90% proctor density.

MEASUREMENT AND PAYMENT: The quantity of **STRUCTURAL SOIL FOUNDATION MATERIAL** to be paid for under this Item shall be the number of **CUBIC YARDS** furnished, placed, and incorporated in the finished work, in accordance with the plans, specifications, and directions of the Project Manager, measured in trucks used for delivery, at the project site.

The price bid shall be a unit price per **CUBIC YARD** of Structural Soil Foundation Material measured in trucks and shall include the cost of all labor, materials, and equipment necessary to prepare and place the structural soil mix, including clay loam, hydrogel, crushed stone, fertilizer, pH adjustment, all required testing, submittals, licensing fees, and incidental expenses, in accordance with the plans and specifications, to the satisfaction of the Project Manager.

Unclassified Excavation, Concrete Pavement without Base or Granite Pavers, and Plant Material shall be paid for under their respective Contract Items.

----------END OF ITEM----------

ITEM #46 CONCRETE PAVEMENT W/O BASE - 4"
ITEM #47 CONCRETE PAVEMENT W/O BASE - 7"

WORK: Under these items the Contractor shall furnish and place **CONCRETE PAVEMENT W/O BASE** in accordance with the plans and specifications and directions of the Project Manager.

Pavement shall consist of a single course, thickness as shown on the plans or directed by the Project Manager to conform with N.Y.C. Department of Transportation Builders Pavement requirements.

This work shall also include any excavation of existing concrete, soil, pavers, asphalt, removal of debris, or removal of stumps four (4) inches or less that will be necessary to pour the concrete pavement. All concrete restorations shall be full flag restorations to comply with NYC Department of Transportation standards or as approved by the Project Manager.

MATERIALS: Unless otherwise herein specified, all materials of construction shall conform to applicable portions of Section B, "Materials and Methods of Construction".

Cement: Air Entraining Gray Portland Cement shall comply with the ASTM Specifications for Portland Cement, Designation C150.

Concrete Pavement: The pavement shall consist of a single course thickness and reinforcement placed as shown. Concrete shall conform to N.Y.C. Dept. of Transportation class B-32, Type II A, air entrained, moderate sulphate resistant. The batch shall contain a minimum of six (6) bags of cement per cubic yard of concrete, maximum of 6 1/4 gallons of water per bag, a maximum of three (3") inch slump, and compressive strength of 3,200 psi. Large aggregate shall be limited to one (1") inch.

Fly Ash/GGBFS: A maximum of thirty (30 %) percent of Portland Cement content may be substituted with Fly Ash or Ground Granulated Blast Furnace Slag. Fly Ash shall conform to the requirements for Class F as defined by ASTM C618 – "Standard Specification for Coal Fly Ash and Raw or Calcined Natural Pozzolan for Use in Concrete". Ground Granulated Furnace Blast Slag (GGBFS) shall conform to the requirements for Grade 100 or 120 slag as defined by ASTM C989 – "Standard Specification for Slag Cement for Use in Concrete and Mortars". Portland Cement substitutions that demonstrate the same or similar properties as Fly Ash/GGBFS shall be accepted pending Parks review and approval.

Expansion Joint: The expansion joint material shall be one of the following:

A premoulded bituminous fiber joint filler as specified in Section "B" (requires a bond breaker and sealant) or,

A premoulded closed cell expanded polyethylene foam joint filler such as MasterSeal 920 by BASF Inc., Shakopee, MN (requires only sealant) or an approved equal.

Bond Breaker: If bituminous fiber material is used, a bond breaker such as one-half (1/2) inch width polyethylene tape or five-eighths (5/8) inch diameter expanded polyethylene foam backer

rod shall be installed as recommended by manufacturer. A bond breaker will not be required for a premoulded foam joint, but sealant is always required.

Sealant: Prepared expansion joints shall be coated with a primer followed by installation of a bond breaker and a self-leveling two-component polyurethane-based elastomeric sealant. The Contractor shall apply Sikaflex 429 primer with Sikaflex - 2C, SL sealant, or BASF MasterSeal P 173 with MasterSeal SL 2 sealant, or approved equal. Color of sealant shall be concrete gray. Asphalt cement will not be approved as a sealant.

Sikaflex products are manufactured by Sika Corp., Lyndhurst, N.J. MasterSeal products are manufactured by BASF, Inc., Shakopee, MN.

INSTALLATION:

Forms: Forms shall be made of substantial material (preferably steel), with suitable metal dividing plates and of sufficient strength to satisfactorily resist distortion when fastened together and secured in place. Forms and dividing plates shall be of a depth not less than that of the thickness of the concrete slab, be properly located with tops set to the designated sidewalk surface and be left in place until the concrete is set.

Construction: Foundation shall be wetted immediately before concrete is placed. The concrete shall be placed within the forms and thoroughly tamped until the surface is at the finished grade.

The top surface shall be finished to true smooth planes by trowelling and finally by wood floats. Each rectangular slab shall have all edges neatly rounded with proper tools and be bounded on all sides by a trowelled border about one (1) inch in width.

Slabs: Pavement shall be constructed in independent rectangular slabs, four to five feet long, or in approximately twenty (20) foot slabs between expansion joints, as shown on the plans or directed by the Project Manager. Sidewalks shall conform to N.Y.C. Department of Transportation Builders Pavement requirements. Also, the expansion joints shall be constructed after every 400 square feet of concrete paving.

When pavement is constructed in independent slabs, they shall be separated by joints approximately one-quarter (1/4) inch wide. When twenty (20) foot slabs are placed, tooled dummy joints shall be provided as directed. Adjacent to structures, (manholes, hydrants, etc.) expansion joints and sealant shall be installed.

Expansion Joints: For pavements located within Park property, expansion joints shall conform to this specification. For sidewalks, the expansion joints shall conform to N.Y.C. Dept. of Transportation Builders Pavement requirements.

After the concrete is placed, finished, and set, and the bond breaker, if necessary, installed, the space as shown in the drawings shall be filled with a poured joint sealer.

Thoroughly clean expansion joints of dirt, loose particles, asphalt, tar, paint, wax, waterproofing and curing compounds. When dry, apply primer to the clean dry surfaces by brushing on a thin

uniform coat. Allow primer to dry, tack free. Fill joint with joint filler where necessary and compressible backer rod and leave a 1/2 inch deep void for placement of sealant.

Cover adjacent sides of joints with masking tape to prevent spillage onto pavement.

Sealant: Fully mix the two component sealant and pour into joint slot in one direction and allow to flow and level out as necessary. Smaller joints can be filled from a bulk-loading gun. Fill joints from bottom to prevent air voids. Tool lightly to smooth out ripples and maximize adhesion to the sides of joints. If bubbles form, wait 5-10 minutes before tooling to break the bubbles. Remove excess sealant promptly as the work progresses and clean adjacent surfaces. Remove masking tape.

Install sealant in accordance with manufacturer's instructions including allowable minimum temperature of 40 degrees Fahrenheit. If the Contractor wishes to install concrete below temperatures below 40 degrees Fahrenheit, an installation plan must be submitted and approved by the Project Manager in advance of commencing work.

PROTECTION AND CURING: Concrete shall be carefully protected from the drying effects of the sun and wind, traffic, or other causes by means of suitable guards and coverings, and shall be kept moist for a period of three days. Curing shall be performed in accordance with Section B, Article 27, subheading p. 'Curing Concrete.' Concrete shall be kept moist for the required period or cured by application of a water based curing compound similar to Clear Resin Cure (J11W) as manufactured by Dayton Superior Corp., Miamisburg, OH or approved equal. When concrete is to be painted, the curing compound shall be removed first with a stripper such as Citrus Cleaner as manufactured by Dayton Superior Corp., or approved equal. Apply all products according to manufacturer's written instructions. Curing shall begin immediately after finishing.

REPLACEMENT: Concrete shall have a one year guarantee. At the direction of the Project Manager, the Contractor shall replace, in accordance with the contract plans and specifications, any concrete work that is in an unacceptable or unsightly condition, such as cracks, spalling, or settling, including any vandalism that may occur to concrete prior to the expiration on the one year guarantee period.

MEASUREMENT AND PAYMENT: The quantity of **CONCRETE PAVEMENT W/O BASE -4" and 7"** to be paid for under these items shall be the number of **SQUARE FEET** of pavement, of each thickness, constructed as shown on the plans or as directed by the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** and shall include the cost of all labor, materials, equipment and incidental expenses necessary to complete the work including expansion joint material and sealant, all in accordance with the plans and specifications to the satisfaction of the Project Manager.

Saw Cutting and Foundation Material for Concrete Pavement will be paid for under their respective items.

----------END OF ITEM----------

ITEM #48 CONCRETE CURB

WORK: Under this Item, the Contractor shall construct **CONCRETE CURB** and footings of the types shown on the plans or to match existing curbs, in accordance with the plans, specifications, and directions of the Project Manager.

MATERIALS: Unless otherwise herein specified, all materials and methods of construction shall comply with Part II-C Materials and Methods of Construction.

Cement: Air Entraining Portland Cement shall comply with the ASTM Specification for Portland cement, Designation C150.

Concrete: Concrete shall conform to N.Y.C. Department of Transportation Class B-32, Type IIA, air entrained, moderate sulfate resistant. The batch shall contain a minimum of six (6) bags of cement per cubic yard, a one and one-half (1 1/2") to four (4") inch slump, and compressive strength of 3,500 psi. Large aggregate shall be limited to one (1") inch.

Steel Bar Reinforcement: Reinforcement shall meet the requirements of the applicable paragraphs of Part II-C Materials and Methods of Construction , the N.Y.C. Building Code and the latest ASTM specification for Deformed and Plain Billet-Steel Bars for Concrete Reinforcement", Designation A-615 and in accordance with the item "Steel Bar Reinforcement". Reinforcement shall be of the sizes and dimensions shown on the plans.

Bond Breaker: If bituminous fiber material is used, a bond breaker such as one-half inch (1/2") wide polyethylene tape or five-eighths inch (5/8") diameter expanded polyethylene foam backer rod shall be installed as recommended by the manufacturer. A bond breaker will not be required for a pre-molded foam joint, but sealant is always required.

Sealant: A bond breaker and a non-sag multi-component polyurethane-based elastomeric sealant shall be installed in prepared expansion joints. The Contractor shall apply Sikaflex - 2C, NS sealant, or Sonneborn Sonolastic NP 2 sealant, or approved equal. Color of sealant shall be concrete gray. Asphalt cement will not be approved as a sealant.

Sikaflex products are manufactured by Sika Corp., Lyndhurst, NJ. Sonolastic products are manufactured by BASF Construction Chemicals, LLC., Shakopee, MN.

Expansion Joint: The expansion joint material shall be a pre-molded bituminous fiber joint filler as specified in Part II-C Materials and Methods of Construction or an approved equal.

METHOD OF CONSTRUCTION: Curb shall be constructed in independent sections and shall have smooth plane ends separated by expansion joints of the size shown on the standard details.

Care shall be taken when installing curbs that all the requirements of Article 14, “Tree Work”, shall be followed. No roots shall be cut without written permission of the Director of Tree Preservation or designated representative. Where required, Parks Standard Detail for Root Bridging shall be used.

All forms shall be set true to line and grade and held rigidly in position. They shall be either of metal or of acceptable planed and matched lumber, and of such construction that a smooth surface

shall be provided. After the forms are erected and reinforcing steel is set in place, all contact surfaces within forms shall be moistened. Concrete shall be placed in horizontal layers of uniform thickness, with each layer thoroughly consolidated before placement of the next layer. Thickness of each layer shall not exceed eighteen (18") inches with reinforced members. Stiff concrete mixes (low slump) shall be consolidated either by hand tools or by mechanical vibrators in accordance with Part II-C Materials and Methods of Construction. The concrete shall be worked thoroughly around the reinforcement and around the pipe sleeves. In the use of internal vibrators, care shall be taken to avoid separation of aggregate and to avoid hitting the forms sufficiently to cause damage. Exposed concrete surfaces shall have a float finish. Surfaces shall be finished smooth and true by means of wooden or steel floats and have edges, including those of joints, rounded or chamfered.

Forms shall be left in place for a minimum of three (3) days or until the concrete has set sufficiently so that, in the opinion of the Project Manager, they can be removed without damage to the curbing. The curbing shall immediately upon removal of the forms be wetted and rubbed down to a smooth and uniform surface by means of carborundum or other abrasive blocks. For this work, a competent and skilled finisher shall be employed. The Contractor shall do all the necessary work to join new curb to existing in a neat and workmanlike manner to the satisfaction of the Project Manager.

CURB FOOTINGS: Curb footings shall be of the same concrete as the curbs and shall be constructed as shown on the details. Concrete footings shall be installed on all curb ends and corners with concrete forming tubes of the proper diameter and cut to the required lengths.

MATERIAL TESTING: When quantities exceed thirty (30) cubic yards in a single day, or at the direction and discretion of the Project Manager, the Contractor shall furnish necessary concrete test cylinders to the Project Manager at no cost to the City. The General Requirements of the General Conditions. Section C – Special Provisions, Articles 5 and 11 will apply.

PROTECTION: The Contractor shall protect the curbing and keep it in first class condition until the completion of his operation at the site. Any curbing which is damaged at any time previous to the notice of substantial completion of the work shall be removed and replaced with satisfactory curbing at the Contractor's expense. The general specifications in Part II-C Materials of Construction shall apply for protection and curing.

MEASUREMENT AND PAYMENT: The quantity of **CONCRETE CURB** to be paid for under this Item shall be the number of **CUBIC YARDS** of curbs and footings constructed and incorporated in the work, in accordance with the plans, specifications, and directions of the Project Manager.

The price bid shall be a unit price per **CUBIC YARD** of Concrete Curbs and footings constructed and incorporated in the work complete, and shall include the cost of furnishing all labor, materials, equipment, and incidental expenses necessary to complete the work, including expansion material, sealant, tar paper, and steel bar reinforcement, all in accordance with the plans and specifications, to the satisfaction of the Project Manager.

Excavation shall be paid for under its respective item.

----------END OF ITEM----------

ITEM #49 FOUNDATION MATERIAL FOR CONCRETE (MEASURED ON SITE)

WORK: Under this Item, the Contractor shall furnish and place FOUNDATION MATERIAL FOR CONCRETE in accordance with the plans, specifications, and directions of the Project Manager.

MATERIALS: Unless otherwise herein specified, all materials and methods of construction shall comply with Part II-C Materials and Methods of Construction.

Material for Foundation shall be a straight run of single size aggregate and shall consist of either all one and one-half (1 1/2") inch stone or all three-quarter (3/4") inch stone in accordance with ASTM C33, free from organic or other deleterious material. In addition, Foundation Material may contain no more than five (5%) percent of fines, defined as aggregates passing a No.4 sieve or smaller. Coarse aggregate shall be graded within the following limits:

Passing Sieve (Dry Analysis)	Percent by Weight
2 1/2"	100
2"	90-100
No. 4	0-5
No. 200	0-2

The Magnesium Sulfate Soundness loss after ten (10) cycles shall be eighteen (18%) percent or less, as per ASTM C88. Coarse aggregate may be one of the following:

A. Broken Stone or gravel of approved quality and conforming to the requirements of Part II-C, "Materials and Methods of Construction".

B. Recycled material consisting of at least ninety-five (95%) percent by weight of the following:

1. Recycled Portland Cement Concrete Aggregate or
2. Recycled Portland Cement Concrete Aggregate mixed with Stone Gravel.

LABORATORY TESTING: The Contractor shall at the direction and discretion of the Project Manager, or when quantities exceed (30) cubic yards, furnish a certified report by an approved Materials Testing Laboratory showing the materials composition, sieve analysis, plasticity index, and soundness of the representative samples of the material they propose to use.

The Project Manager will deliver the samples to an independent testing laboratory. The Contractor shall bear the responsibility for all costs associated with laboratory testing. No recycled material shall be delivered to the site until positive test results have been obtained. The Project Manager reserves the right to reject on or after delivery any material which does not, in their opinion, meet these specifications.

INSTALLATION:

Preparation of Fine Grades for New Construction: Before any concrete is placed upon fine grade, the fine grade shall be prepared to line and grade and compacted where practicable with an approved self-propelled roller weighing not less than ten (10) tons. All hollows and depressions developed under rolling shall be filled with acceptable material and rerolled. This process of shaping, filling, and rolling shall be repeated until no depressions develop.

The Contractor shall remove from the subgrade all debris, foreign material, and all other undesirable material designated by the Project Manager. The fine grade shall not be muddy or otherwise unsatisfactory when the pavement is placed upon it. If the fine grade becomes rutted or displaced, due to any cause whatsoever, the Contractor shall re-grade same without additional payment.

Preparation of Existing Foundation: Existing foundation material shall be supplemented as required to achieve the required thickness shown on the plans or provide for positive drainage of completed pavement.

Spreading: Foundation material shall be evenly spread on prepared subgrade or existing foundation in the position shown on the plans or as directed by the Project Manager Foundation material shall be laid in four (4") inch layers (maximum) and rolled while wet with a seven (7) to twelve (12) ton tandem roller (or other approved method satisfactory to the Project Manager) to the thickness shown on the plans or as directed by the Project Manager.

SUBMITTALS: All submittals shall be in accordance with the General Conditions. Section C – Special Provisions, Article 11.

MEASUREMENT AND PAYMENT: The quantity of **FOUNDATION MATERIAL FOR CONCRETE** to be paid for under this Item shall be the number of **CUBIC YARDS, (MEASURED ON SITE)** in final position, and furnished and placed in accordance with the plans, specifications, and directions of the Project Manager.

The price bid shall be a unit price per **CUBIC YARD (MEASURED ON SITE)** in final position, and furnished and placed and shall include the cost of all labor, materials, equipment, and incidental expenses necessary to complete the work, including laboratory testing (if necessary) and preparation of fine grades, all in accordance with the plans and specifications, to the satisfaction of the Project Manager.

Excavation shall be paid for under its respective item.

----------END OF ITEM----------

ITEM #50 STEEL EDGING

WORK: Under this item, the Contractor shall furnish and install **STEEL EDGING** in accordance with the Standard Details, specifications, and directions of the Project Manager.
STEEL EDGE: Steel edge shall consist of lengths of hot rolled steel sections, one quarter (¼") inch thick by five (5") inches in depth by designated length. Tapered steel stakes, fifteen (15") inches long, shall be spaced thirty (30") inches on center along the length of the edging. Joints between edging strips shall be overlapped as indicated on the standard detail sheet. All edging and stakes shall be shop painted with weather resistant paint or powdercoated. Color shall be green unless otherwise shown in the drawings or directed by the Project Manager. Steel edging shall be "Steel Landscape Edging" by Border Concepts, Charlotte, NC; "Steel Landscape Edging" as manufactured by Sure-Loc Edging Corporation, Holland, MI, or approval equal.

INSTALLATION: The steel edging shall be installed true to line and grade in accordance with the designs indicated on the plans. All bends and curves shall be smooth and uniform. Where bends or curves are of such radius as to make field bending impracticable, they shall be made in the shop. All joints shall be welded as shown on the detail sheet.

MEASUREMENT AND PAYMENT: The quantity of **STEEL EDGING** to be paid for under this item shall be the actual number of **LINEAR FEET** installed in the work. No additional measurement will be made for laps.

The price bid shall be a unit price per **LINEAR FOOT** of **STEEL EDGING** and shall include the cost of all stakes and of all necessary and incidental expenses required to complete the work in accordance with the plans and specifications to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #51 STEEL TREE BED GUARD 'A'
ITEM #52 STEEL TREE BED GUARD 'B'
ITEM #53 STEEL TREE BED GUARD 'C'
ITEM #54 STEEL TREE BED GUARD 'D'
ITEM #55 STEEL TREE BED GUARD 'E'

WORK: Under these Items, the Contractor shall furnish and erect **STEEL TREE BED GUARD** of the types and sizes shown on details #F-J, in accordance with the plans, specifications, and directions of the Project Manager.

MATERIAL: Steel Tree Bed Guards shall be constructed of steel bars, posts, and rails of the sizes shown on the plans. All materials shall conform to the requirements of A1S1 1015, low carbon steel. Tree bed guards located adjacent to street curb shall be 3- sided unless otherwise shown on the plans.

FABRICATION: Steel Tree Bed Guards shall be fabricated in strict accordance with the plans and approved shop drawings. Posts and rails shall be formed into panels of the shapes on the sketches and joints completely welded with welds of proper size and shape, all welds ground smooth to a neat finish. Connection shall be provided as indicated on the plans. Welding shall conform to the requirements given under the "Materials and Methods of Construction", Section B.

Posts and pickets shall, in all cases, be truly vertical. Rails and bars shall be parallel to grade as shown on the sketches. All posts shall be solid steel. Panels shall be curved as required by the work. Dimensions of individual tree bed guards may vary as required by existing site conditions, in accordance with the directions of the Project Manager.

PAINTING The guards shall receive three (3) shop applied coats of paint after welding. A field applied touch-up coat shall be applied at the direction of the Project Manager. Immediately prior to painting, all surfaces of framework shall be thoroughly free of debris. All surfaces that are rust free shall be treated in accordance with SP-1, Solvent Cleaning. Treatment shall be performed with a solvent such as mineral spirits, xylol or turpentine to remove all dirt, grease, and foreign matter. Surfaces that show evidence of scale and rust shall be cleaned in accordance with SP-2, Hand Tool Cleaning, a method generally confined to wire brushes, sand paper, hand scrapers, or hand impact tools or SP-3, Power Tool cleaning, a method generally confined to power wire brushes, impact tools, power sanders, and grinders in order to achieve a sound substrate. After the steel tree bed guards have been cleaned and prepared, they shall be painted as follows:

First Coat (Shop Applied): D.T.M.(Direct to Metal) Alkyd semi-gloss P24, as manufactured by Benjamin Moore & Co., Montvale, NJ, or Pro Industrial Pro-Cryl Universal Primer B66-1300 Series, red oxide, as manufactured by Sherwin Williams Company, Woodside, NY, or approved equal. Primer shall be a fast drying, 53 to 61% weight solids, low VOC, rust inhibiting, modified alkyd metal primer with a dry film thickness of 1.7 - 5 mils. Paint requires up to two (2) to two and a half (2 ½) hours drying time before recoating (with alkyds).

Second Coat and Third Coats (Shop Applied): D.T.M.(Direct to Metal) Alkyd semi-gloss P24, Safety Black, as manufactured by Benjamin Moore & Co., Montvale, NJ, or Sher-Cryl HPA B66-350 Series, semi-gloss, black, as manufactured by Sherwin Williams Company, Woodside, NY,

or approved equal. Color to be Black unless otherwise shown on the contract drawings. Topcoat shall be a silicon alkyd, semi or high gloss coating having a dry film thickness of 1.7 - 3 mils. Paint requires up to thirty (30) hours drying time at 50º F; up to sixteen (16) to eighteen (18) hours drying time @ 77º F. Paint adhesion shall be 100% retention in accordance with ASTM D3359, classification 5B.

All paints shall be applied when ambient air temperature is 50º F minimum and rising. No painting will be allowed below the minimum ambient air temperature. Surfaces to be painted shall be moisture free. In addition, no painting will be allowed below the temperature at which moisture will condense on surfaces. Refer to the Dew Point Chart in Section C, Article 16 to find the minimum allowed moisture free temperature.

ERECTION: The tree bed guards shall be erected in soil only, inside the tree beds. The posts shall be set in place and properly supported to hold them to line and grade. Each post of the tree guard shall have a piece of ¾" steel that is 24" welded to the base and inserted into the soil as an anchor. If the anchor stake of the tree guard post is being installed and a tree root or utility is encountered the steel anchor must be removed, cut to size, and re-inserted to ensure no root or utility damage occurs. All anchor stakes must be installed straight, not at an angle. The lowest portion of the steel band at the bottom of all side rails shall be raised 2-3 inches above the soil grade. Any guards not set plumb and true to line and grade shall be removed and replaced at the Contractor's expense. All tree guard ends shall be setback between 12 to 18 inches from the front face of the curb of the street. The entire tree guard shall be installed so that there is less than a two inch gap between the bottom of the tree guard and the surrounding concrete otherwise the Project Manager reserves the right to reject. After installation, paint shall be applied as necessary to touch up any damage that may have occurred during shipping or installation.

MAINTENANCE: The Contractor shall maintain the tree bed guards during the life of the contract including the guarantee period and shall paint, repair, and/or replace all tree bed guards that are disturbed, damaged, or destroyed as directed by the Project Manager. Tree bed guards shall have a one year guarantee.

SUBMITTALS: The Contractor shall submit for the approval of the Project Manager finished samples of parts of the tree bed guards. The final product and finish shall be equal to the approved samples. Also, the Contractor shall submit detailed shop drawings of tree bed guards for the approval of the Project Manager.

Paint Substitution: A written request for paint substitution must be submitted to the Parks Coordinator of Submittals. Contractor shall submit this request, along with manufacturer's data sheets for approval, a minimum of two weeks prior to the intended date of paint application. All paint substitutes must be approved in writing prior to use.

MEASUREMENT AND PAYMENT: The quantity of **STEELTREE BED GUARD** to be paid for shall be the number of **LINEAR FEET** of each type tree bed guard furnished and erected complete, in accordance with the plans, specifications, and directions of the Project Manager.

The prices bid shall be unit prices per **LINEAR FOOT** of **STEELTREE BED GUARD** shall include the cost of all labor, material and equipment required to furnish and erect tree bed guards, including painting and all incidental expenses necessary to complete the work in accordance with the plans and specifications, to the satisfaction of the Project Manager.

----------END OF ITEM----------

ITEM #56 REPAIR SIDEWALK VAULT

WORK: Under this item, the Contractor shall furnish all labor and equipment required for the repair, shoring and the protection of critical infrastructure including but not limited to electrical and mechanical equipment within the vault space.

INTENTION: The intent of this item is to fix vaults in the event they are unexpectedly encountered during the excavation process of tree beds.

SHORING, PROTECTION AND SIDEWALK SLAB REMOVAL: The Contractor shall isolate the buildings tenants and public from the work zones.

The Contractor shall furnish all labor and equipment required to remove the sidewalk pavement and other infrastructure as identified by the Project Manager to allow for the repair and installation of the new infrastructure system and new sidewalk pavement. Upon the removal of the sidewalk the contractor shall determine the compatibility of the existing infrastructure materials and systems to the one specified.

The contractor shall notify Parks of any required changes to any specified material or requirement.

Do not start the sidewalk repairs until the weather forecast indicates an extended period of no precipitation. The Contractor shall obtain all required permits. Contractor will need to supply their own electrical power and water.

NOTIFICATION: The contractor shall notify Parks three business days prior to the start of the sidewalk vault repairs. The Contractor shall also notify the Vault Owner three business days prior to the start of the sidewalk repairs, as vault access will be necessary throughout work.

SHORING: Shoring shall be installed at the direction and approval of Project Manager. Prior to the start of the sidewalk repairs the contractor shall install shoring to support the vault structure. The shoring shall remain in place until the repairs have been completed. Shoring shall be constructed from plywood and/or wooden support beams and be installed only temporarily.

PROTECTION: Protection materials shall be installed at the direction and approval of the Project Manager. The Contractor shall isolate the buildings tenants and public from the work zones by enclosing the perimeter of the work zones with a self-supporting four foot high plywood barrier designed to withstand wind gusts.

The Contractor shall protect all the electrical and mechanical equipment within the vault space by enclosing the equipment within self-supporting plywood enclosures design to withstanding the impact of falling debris, all enclosure shall be covered with waterproof tarps.

Protection structures shall remain in place until the repairs have been completed. Waste and debris materials used in the repair of sidewalk vault (protection and construction) shall be removed from site and transported to a construction and demolition debris processing facility. Contractor must abide to all NYS and City regulations regarding waste materials. Vault sites shall be cleaned to the

satisfaction of Parks. Damage to the vault interior spaces, private/public property, utility lines and other infrastructure shall be repaired in kind by the contractor to the satisfaction of Parks and at no additional cost to the City and within timeframe specified by the Project Manager.

PROTECTION FROM THE ELEMENTS: Upon the completion of the day's work all exposed surfaces of the vault structure shall be covered with a waterproof tarp and/or steel or wooden planks and sealed at the perimeter to prevent water from entering the interior/ vault space. Tarps shall be secured against wind gusts. All indoor or covered construction areas shall be swept or vacuumed clean at the end of each work day.

Damage to the interior spaces shall be repaired in kind by the contractor within 3 days of the completion of vault repair to the satisfaction of Parks and at no additional cost to the City.

ITEMS TO REMAIN: Curb and sidewalk as indicated on the drawings.

SAWCUTTING: The Contractor shall take great care in sawcutting the perimeter of the area that will be repaired. All sawcutting work is included in the REPAIR SIDEWALK VAULT item.

SLAB REMOVAL: The Contractor shall employ methods to remove the sidewalk slab to avoid damage to the vault structure. Saw cutting is only permitted within the area of sidewalk slab that is to be removed as indicated on the drawings. The Project Manager may determine saw cut depth limits from two and a half to ten inches according to site conditions.

Extreme care shall be taken when jack hammering is performed and during removal of the top slab of concrete to ensure no additional damage occurs to the structural slab underneath.

The Contractor shall employ a licensed New York State Engineer to provide the necessary designs for all the required repairs to the vault. The Engineer shall provide plans/ details, sign, seal and file the documents with the Agency having jurisdiction over the work and secure the required permits.

MATERIALS: The contractor will not be permitted to store any materials at the site. Delivery of materials should be scheduled to arrive and be removed on the same day, with the exception of installed shoring. The contractor must always keep the site in a clean and safe condition.

WATERPROOFING: The Contractor shall furnish and install waterproofing in accordance with the plans, specifications directions of the manufacturers technical advisor and Project Manager as part of the bid price of this item. Waterproofing shall be CCW-MIRADRI 860/861 manufactured by Carlisle Coatings & Waterproofing or approved equal.

Upon the removal of the slab the contractor shall determine the compatibility of the existing waterproofing system to the one specified. The contractor shall notify Parks of any required changes to any specified material or requirement. The waterproofing shall be installed as per the manufacturers written specifications and directions of the manufacturer's technical advisor. The surface of the existing waterproofing shall be prepared as required to assure a bond between the two systems. The surface of the existing/new waterproofing shall be protected from the elements and damage with protection boards and waterproof tarps until the sidewalk slab is installed.

CONCRETE: The Contractor shall install concrete consistent with the specification noted in CONCRETE PAVEMENT W/O BASE – 4" and CONCRETE PAVEMENT W/O BASE – 7" line items.

Foundation Material for Concrete: The Contractor shall install foundation material consistent with the specification noted in FOUNDATION MATERIAL FOR CONCRETE.

MAINTENANCE AND PROTECTION OF TRAFFIC: The Contractor shall maintain and protect the traveling public and traffic for the duration of the portion of the contract work performed in the street and/or sidewalk. The purpose is to protect the traveling public from all damage to persons and property within the contract limits and furnish, erect and maintain warning signs, barricades and lamps, at the direction of the Project Manager.

NOTE FOR TRAFFIC PROTECTION: The Contractor should to perform all work required to adequately protect the traveling public in accordance with the specification and as directed by the Project Manager.

Nothing herein contained shall be construed so as to prevent the Project Manager from requesting the Contractor to provide such other suitable devices or special measures as the Project Manager determines necessary for proper safety of the public or for the control of traffic during construction work. Obstructions to traffic (both vehicular and pedestrian) at any location will be tolerated only so long as is necessary for the proper performance of the contract work.

SCOPE OF WORK FOR TRAFFIC PROTECTION: The typical work under this item will consist of all provisions necessary for maintenance and protection of traffic in conjunction with contract work as follows:

TYPE A: Street excavations for utilities, including water taps and connections to subsurface utilities.

TYPE B: Construction of sidewalks and/or street pavements or curbs. Also shall include work described under TYPE A, above.

The Contractor shall conduct their operations so as to interfere with traffic as little as possible, and effect, by every reasonable means, the safety and comfort of pedestrians, vehicles and vehicular passengers passing over or adjacent to the work site. In the execution of the Contract, work shall be arranged and traffic shall be maintained as scheduled and directed by the Project Manager.

The Contractor shall perform the following as approved by the Project Manager:

Keep the surface of all pavement used by the public free and clean of all dirt, debris, stones, timbers, or other obstructions to provide a safe travelled way.

Furnish, erect and place approved signs and cones for the directing the traveling public, traffic, danger signs for curves, narrow pavement and other dangerous locations, and road closure signs.

Provide watchmen and flag persons as may be necessary in the opinion of the Project Manager for the protection of the traveling public and traffic.

Furnish and erect barricades which shall be adequately lighted at night and on which red danger lights shall be displayed where needed.

Furnish and erect temporary barricades and guide railing at points of hazard.

SIGNS: Under these items, the Contractor shall construct, erect and maintain suitable signs for the direction and protection of traffic. These signs shall not only warn the traveler of the route or track to be followed in case of detours, but shall also warn of points of unusual danger. At points of termination of pavement, where shown on drawings or where required by the Project Manager, signs of sizes indicated on plans shall be erected. Warning signs for termination of pavement shall be erected in advance of the point of pavement change as directed by the Project Manager.

Signs required for maintenance of traffic shall be in accordance with the rules, regulations and specifications of the State Traffic Commission.

All barricades, danger signals, warning signs, indicators or obstructions not designed or suitable for use in the dark shall be removed from the roadway each evening by a time not later than one half (1/2) hour after sunset, as reported daily in newsprint referring to New York City, and the particular day in question, nor shall any obstructions as noted above be placed in the street earlier than one half (1/2) hour before sunrise.

When performing work during the dark hours, the Contractor shall use reflective barricades, reflective signs, illuminated devices, and suitable warning lights facing the approaching traffic to warn, direct and protect from damage vehicles, pedestrians, work and equipment. All such warning devices shall have the approval of the Project Manager, and they shall prescribe the minimum requirements for each such warning device.

GENERAL: All areas in which work is to be done shall be adequately barricaded and closed off before such work is begun.

At least one flag person shall be required to be on duty for the direction of traffic during all working hours and one night watch person may be required to continuously patrol the contract to make sure that all signs are in place, all lights lighted, and all temporary timber curbing properly in place.

Danger signs shall be equipped with acetylene Gas Generating Units for such locations where electrical energy is not suitably available.

The Contractor shall furnish, erect, and install illuminated barricades when needed and as directed by the Project Manager. The details of these may be shown on the plans.

Barricades shall be erected at points of abrupt changes in the direction of traffic, at points of similar hazard or where required by the Project Manager. They shall be painted in alternate black and white stripes as directed by the Project Manager, or indicated on drawing.

When necessary to perform the work and allow traffic to flow unimpeded, the Contractor shall install steel plates in the roadway in compliance with NYC DOT rules and as directed by the Project Manager. Pursuant to NYC DOT rules all steel plates shall comply with the New York State Skid Resistance of 36 or greater, matching the existing adjacent surfaces of the roadway. The number of 36-skid resistance is determined by ASTM E274- (Skid resistance of paved surfaces using full scale tire test). In addition the plates shall comply with the British Pendulum Test with a BPN of 55 or greater as determined by ASTM E303, latest revision. These test results numbers shall be maintained as long as the plates remain in the roadway.

The Contractor shall paint all barricades, signs and railings with two (2) coats of white paint, after which the Contractor shall apply one (1) coat of colored paint where shown on the plans or as directed by the Project Manager.

Upon completion of the work, all signs, barricades and temporary curbing shall be removed from the site by the Contractor.

PERMITS: Contractor is responsible for obtaining all permits from appropriate agencies and utilities prior to commencement of work. Contractor shall coordinate work per Mayor's Traffic Construction Coordinating Council (M.T.C.C.C.) requirements and shall prepare a Maintenance and Protection of Traffic Plan if so required by same.

The Contractor shall obtain all necessary permits for the closing of roads and shall comply with all laws or ordinances applicable to the work under this contract. The contractor shall pay for all service charges and permits at his own expense.

COOPERATION: The Contractor shall cooperate in every respect with other agencies of the State, City and private agencies engaged in construction work in the vicinity. Lighting and other methods of protection shall be changed from time to time as conditions change and as ordered by the Project Manager.

LIABILITY: Any method or clause under this item is intended to be the minimum requirement. The Contractor shall provide any other facilities that may be required.

The Contractor agrees to assume all responsibility for damage to persons or property that may accrue during the completion of the work, due to negligence of themselves, their agents or employees, in failing to comply with the requirements of this specification or other necessary precautions for the protection and safety of traffic.

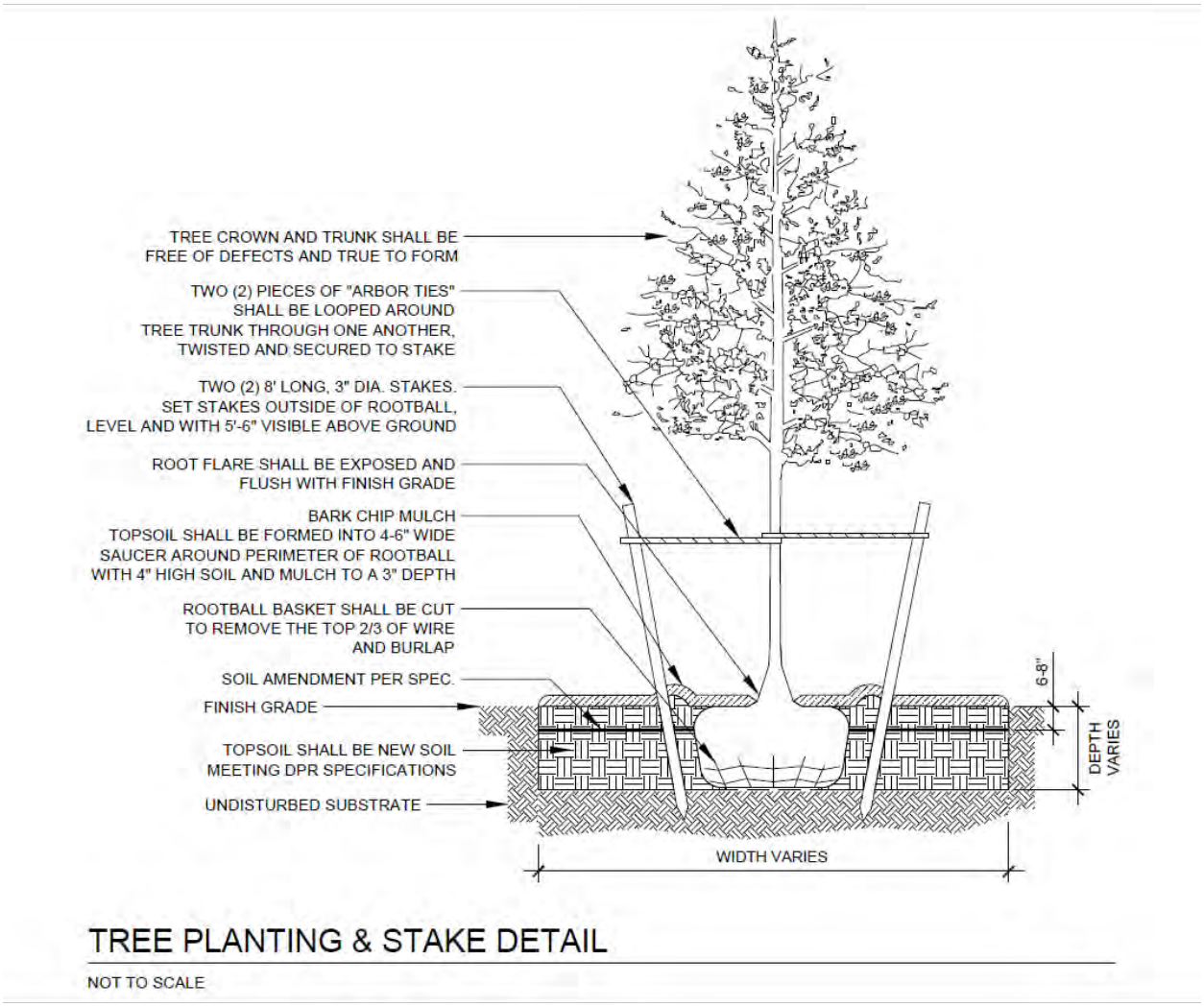
SUBMITTAL: Shop drawings, product data, and Project Manager signed documents shall be submitted before work is performed on site.

MEASUREMENT AND PAYMENT: The quantity of **REPAIR SIDEWALK VAULT** to be paid for under this item shall be a unit price per **SQUARE FOOT** of the sawcut area where vault repair is performed in accordance with the sketches and specifications, to the satisfaction of the Project Manager.

The price bid shall be a unit price per **SQUARE FOOT** of the sawcut area where vault repair is required and shall include shoring, protection and sidewalk slab removal, notification, waterproofing, maintenance and protection of traffic, sawcutting, concrete pavement without base and sidewalk foundation material in accordance with sketches, specifications and to the satisfaction of the Project Manager.

----------END OF ITEM----------

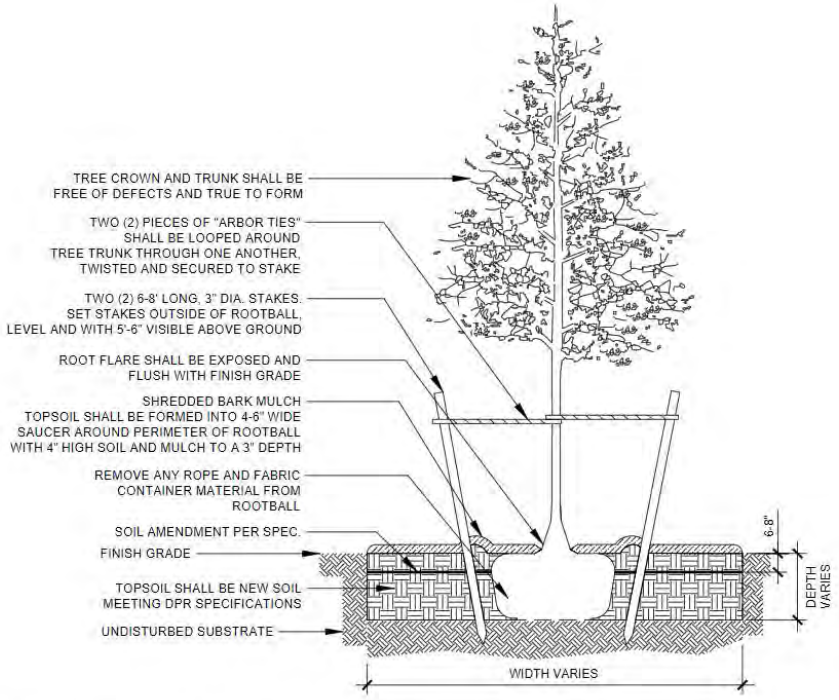
DETAIL A: TREE PLANTING & STAKE DETAIL



TREE PLANTING & STAKE DETAIL

NOT TO SCALE

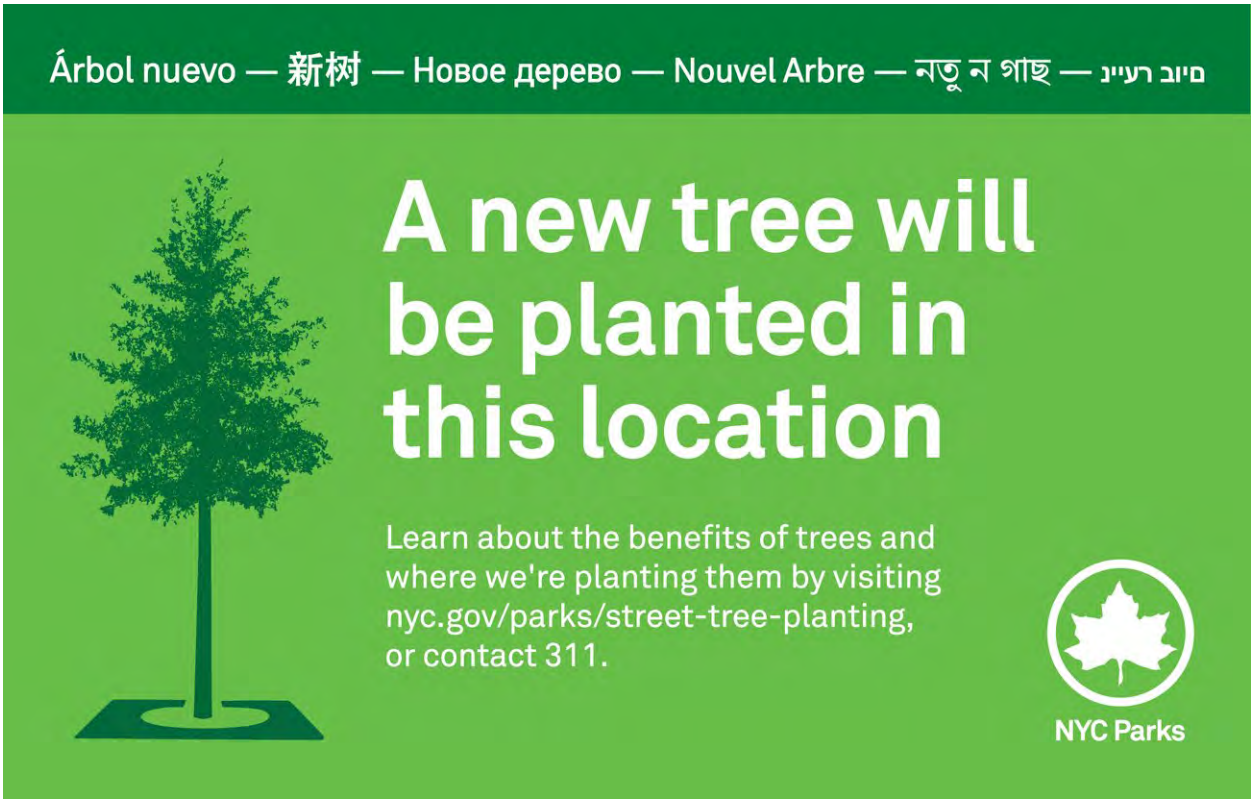
DETAIL A.1 – GROW BAG/PACKAGE TREE DETAIL



TREE PLANTING & STAKE DETAIL

NOT TO SCALE

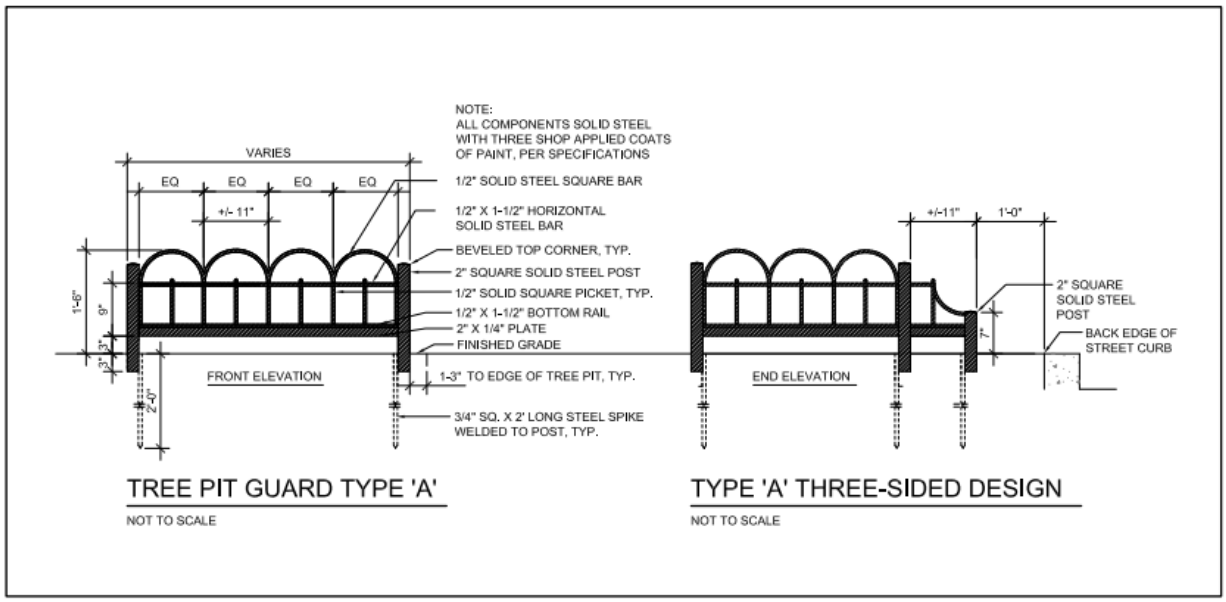
DETAIL B: SIDEWALK DECAL



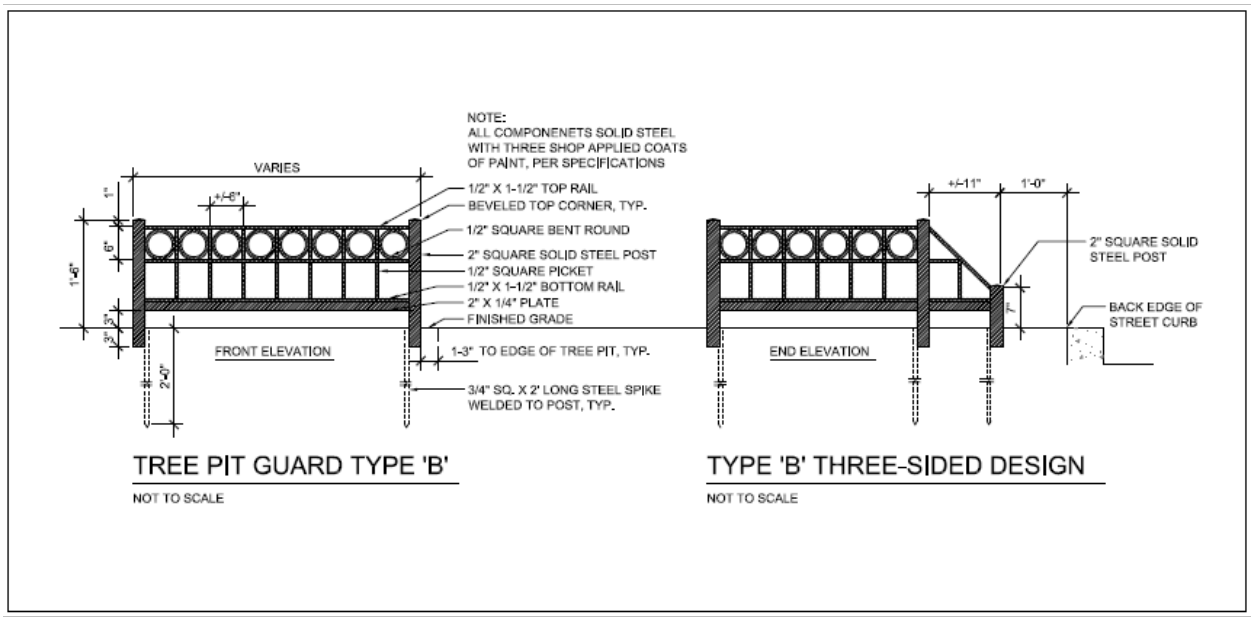
DETAIL C: NOTIFICATION FLAG



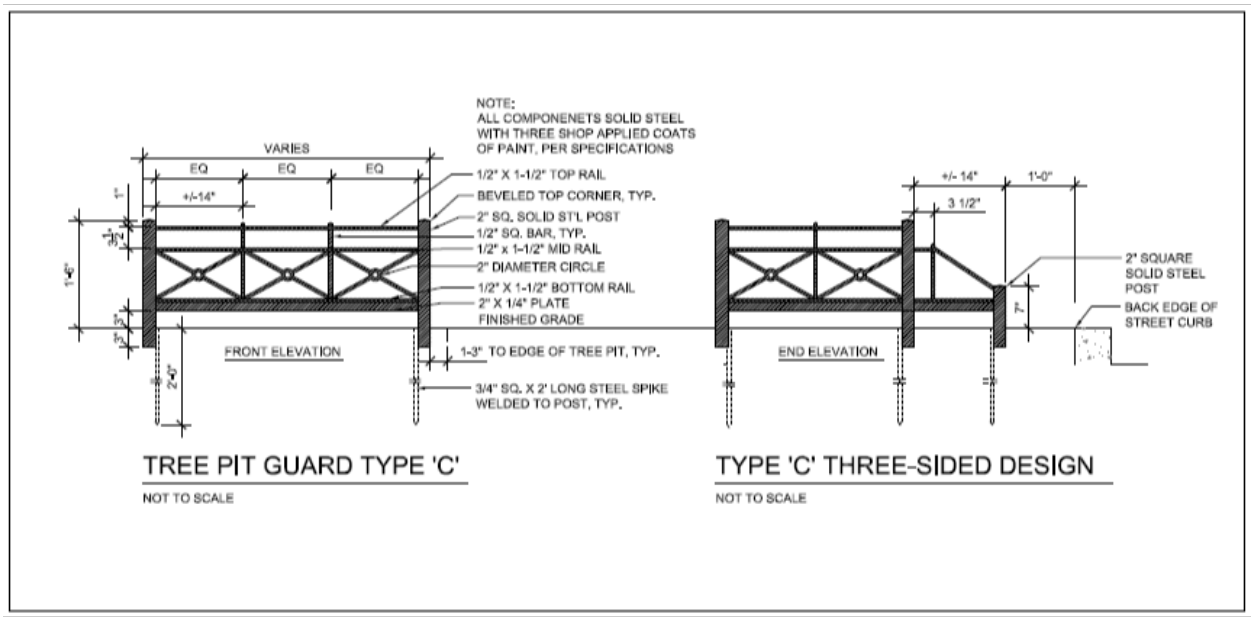
DETAIL D: STEEL TREE GUARD TYPE ‘A’



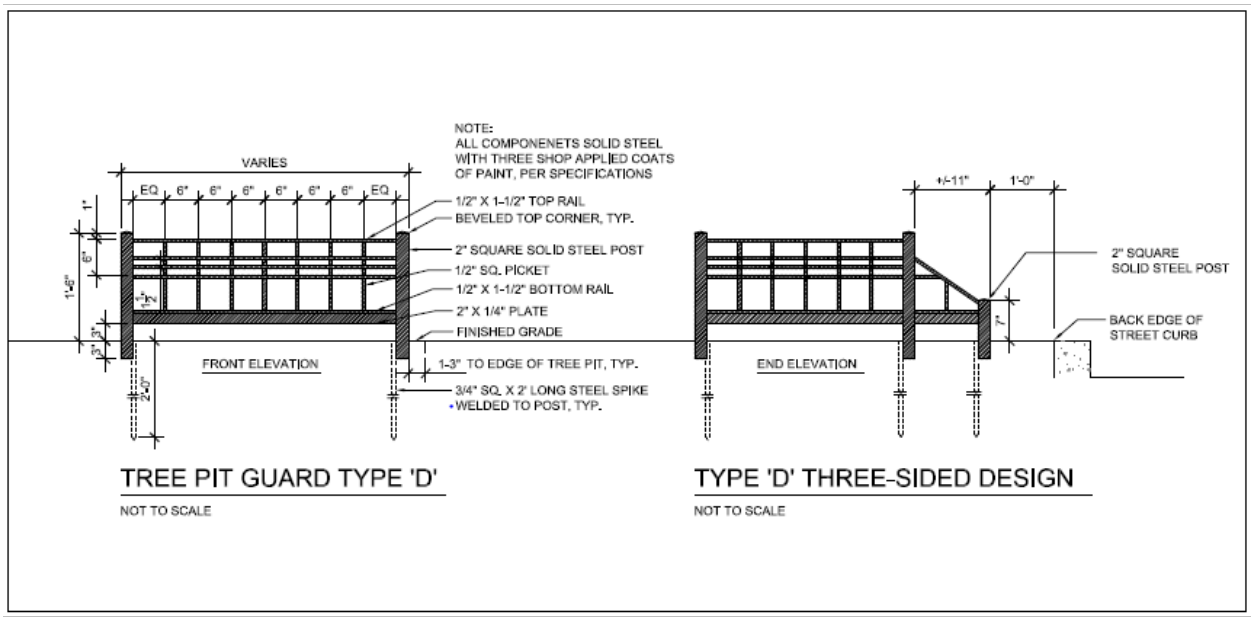
DETAIL E: STEEL TREE GUARD TYPE 'B'



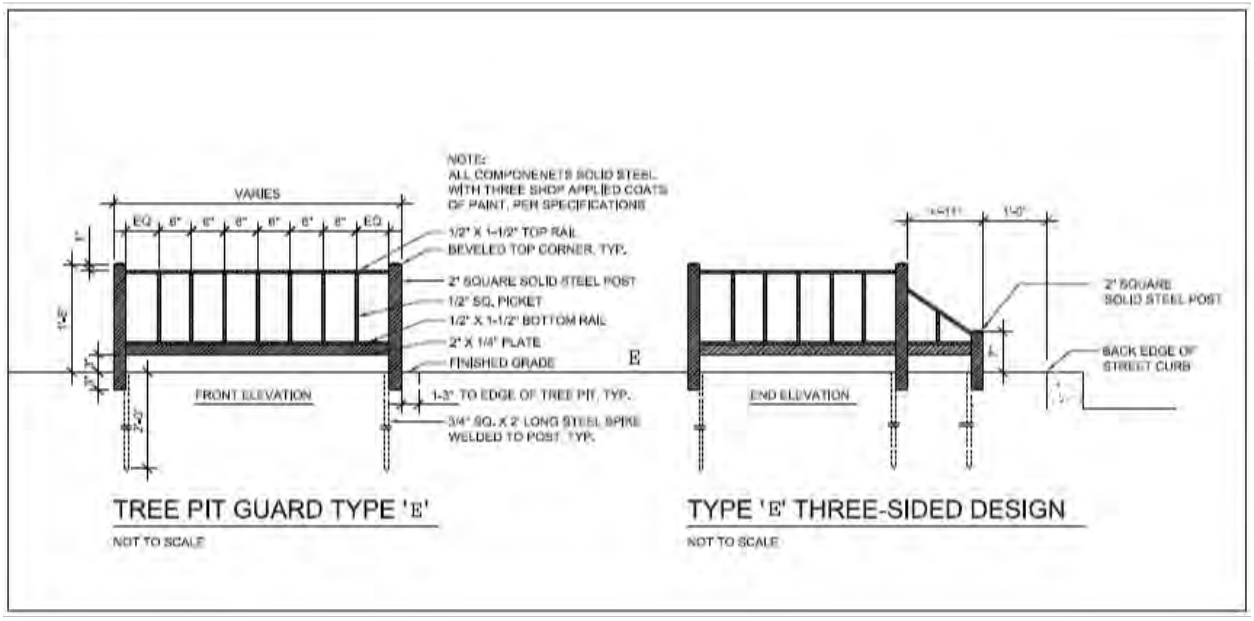
DETAIL F: STEEL TREE GUARD TYPE ‘C’:



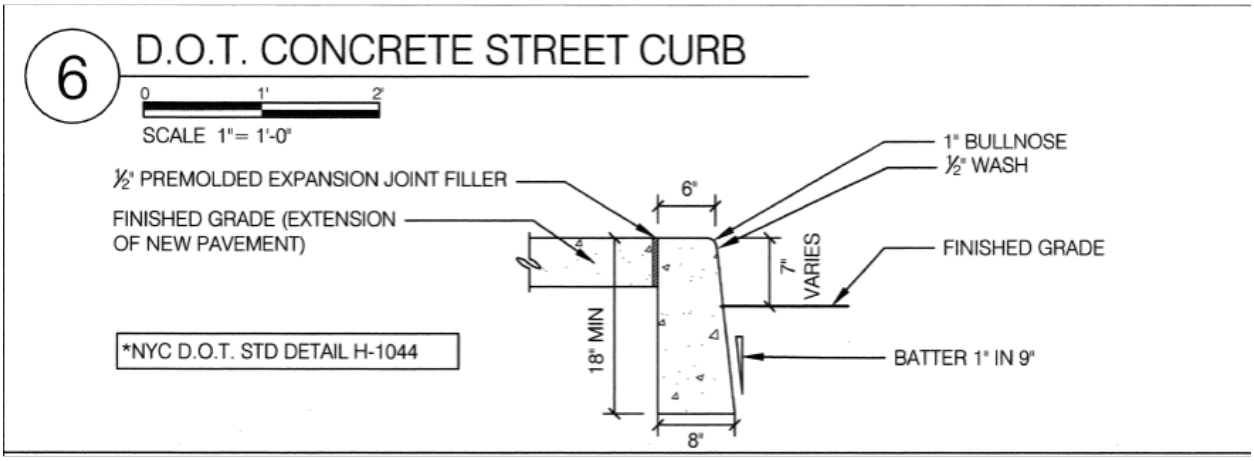
DETAIL G: STEEL TREE GUARD TYPE ‘D’



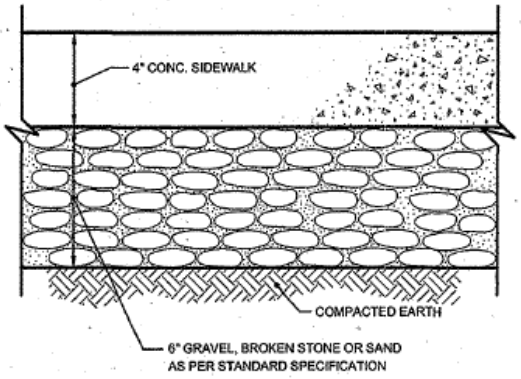
DETAIL H: STEEL TREE GUARD TYPE ‘E’



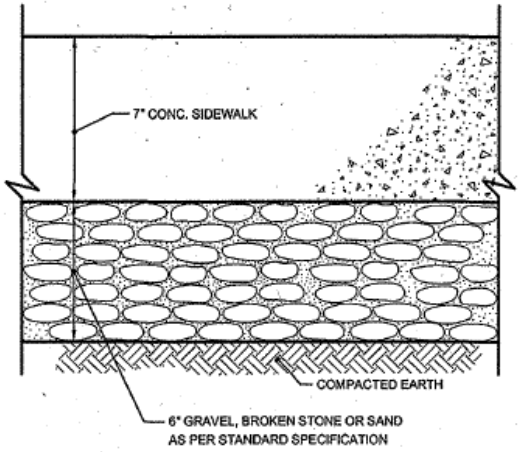
DETAIL I: CONCRETE CURB



DETAIL J: CONCRETE PAVEMENT



TYPE I - SIDEWALK, OUTSIDE DRIVEWAY
AND CORNER QUADRANTS
N.T.S.



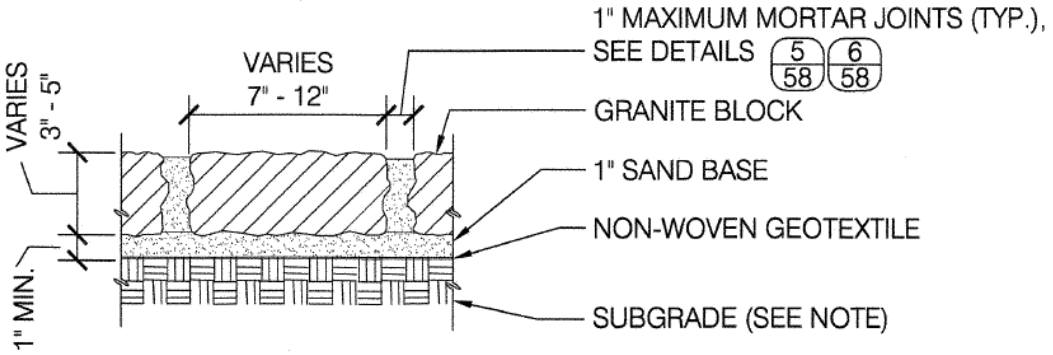
TYPE II - SIDEWALK, IN DRIVEWAY
AND IN CORNER QUADRANTS
N.T.S.

DETAIL K: GRANITE BLOCK PAVERS FOR TREE BEDS

11 GRANITE BLOCK ON SAND FOR TREE PITS

0 .25' .5' 1'

SCALE 3"= 1'-0"



NOTES:

1. FOR TREE PITS SEE STD. DETAIL SHEET "PLANTING DETAILS".
2. AROUND NEW TREES SUBGRADE TO BE COMPACTED.
3. AROUND EXISTING TREES; MIN. EXCAVATION. MIN. COMPACTION.
4. SEE SECTION C, ARTICLE 14.

INDEX
GENERAL CONDITIONS – SECTION C

ARTICLE 1. DESCRIPTION OF WORK
ARTICLE 2. CONTRACT DRAWINGS AND SUPPLEMENTARY DRAWINGS
ARTICLE 3. REFERENCED PROVISIONS (SCHEDULE A)
ARTICLE 4. [INTENTIONALLY OMITTED]
ARTICLE 5. TESTING AND INSPECTIONS, GENERALLY
ARTICLE 6. CONTRACTOR'S EMERGENCY CONTACT
ARTICLE 7. MATERIAL AND SUBCONTRACTOR APPROVALS
ARTICLE 8. PARTIAL PAYMENTS FOR STORED MATERIALS
ARTICLE 9. [INTENTIONALLY OMITTED]
ARTICLE 10. THE SITE
ARTICLE 11. SUBMITTALS
ARTICLE 12. [INTENTIONALLY OMITTED]
ARTICLE 13. [INTENTIONALLY OMITTED]
ARTICLE 14. TREE WORK
ARTICLE 15. [INTENTIONALLY OMITTED]
ARTICLE 16. DEW POINT CHART FOR PAINTING
ARTICLE 17. CONSTRUCTION CODES
ARTICLE 18. ENVIRONMENTAL AND SAFETY MANAGEMENT
ARTICLE 19. LICENSED PLUMBER REQUIREMENTS
ARTICLE 20. LICENSED ELECTRICIAN REQUIREMENTS
ARTICLE 21. CODE AND INDUSTRY STANDARD REFERENCES
ARTICLE 22. CLAIMS FOR OTHER REMEDIES
ARTICLE 23. PROGRESS SCHEDULE
ARTICLE 24. [INTENTIONALLY OMITTED]
ARTICLE 25. [INTENTIONALLY OMITTED]
ARTICLE 26. ENGINEER'S DIRECTIVES
ARTICLE 27. [INTENTIONALLY OMITTED]
ARTICLE 28. SURVEYS AND LANDMARKS
ARTICLE 29. FINAL PAYMENT CERTIFICATES AND DOCUMENTS
ARTICLE 30. MAINTENANCE AND PROTECTION OF TRAFFIC
ARTICLE 31. PRESERVING NATURAL FEATURES
ARTICLE 32. RESTORATION
ARTICLE 33. CRANE AND DERRICK SAFETY
ARTICLE 34. AWARD AMOUNT
ARTICLE 35. [INTENTIONALLY OMITTED]
ARTICLE 36. REGULATIONS FOR PRIVATE AND NON-EMERGENCY SERVICE AGENCY VEHICLES OPERATING ON PARK AREAS, PATHS AND CLOSED PARK ROADS
ARTICLE 37. USE INSPECTION
ARTICLE 38. UTILITIES, SERVICES, AND PERMITS
ARTICLE 39. [INTENTIONALLY OMMITTED]
ARTICLE 40. WORK AREA
ARTICLE 41. LOCATIONS AND QUANTITIES
ARTICLE 42. PERFORMANCE
ARTICLE 43. [INTENTIONALLY OMITTED]
ARTICLE 44. [INTENTIONALLY OMITTED]
ARTICLE 45. [INTENTIONALLY OMITTED]
ARTICLE 46. SIGNS
ARTICLE 47. TERM OF CONTRACT AND RENEWAL OPTION

ARTICLE 48. CONTRACTOR, PERSONNEL AND EQUIPMENT QUALIFICATIONS
ARTICLE 49. QUALIFICATION OF CONTRACTORS AND/ OR SUBCONTRACTORS
ARTICLE 50. MOBILIZATION
ARTICLE 51. [INTENTIONALLY OMITTED]
ARTICLE 52. SCHEDULING OF WORK AND MATERIALS
ARTICLE 53. COMPLIANCE WITH WATERING REQUIREMENTS

ITEM #1 STUMP REMOVALS OF OVER 4 UP TO AND INCLUDING 8 INCHES IN DIAMETER
ITEM #2 STUMP REMOVALS OF OVER 8 UP TO AND INCLUDING 12 INCHES IN DIAMETER
ITEM #3 STUMP REMOVALSOF OVER 12 UP TO AND INCLUDING 18 INCHES IN DIAMETER
ITEM #4 STUMP REMOVALS OF OVER 18 UP TO AND INCLUDING 24 INCHES IN DIAMETER
ITEM #5 STUMP REMOVALS OF OVER 24 UP TO AND INCLUDING 30 INCHES IN DIAMETER
ITEM #6 STUMP REMOVALS OF OVER 30 UP TO AND INCLUDING 36 INCHES IN DIAMETER
ITEM #7 STUMP REMOVALS OF OVER 36 INCHES OR GREATER IN DIAMETER
ITEM #8 TREE REMOVALS OF OVER 4 UP TO AND INCLUDING 8 INCHES DBH
ITEM #9 TREE REMOVALS OF OVER 8 UP TO AND INCLUDING 12 INCHES DBH
ITEM #10 TREE REMOVALS OF OVER 12 UP TO AND INCLUDING 18 INCHES DBH
ITEM #11 TREE REMOVALS OF OVER 18 UP TO AND INCLUDING 24 INCHES DBH
ITEM #12 PREPARING NEW SIDEWALK TREE BEDS
ITEM #13 PREPARING EXISTING SIDEWALK TREE BEDS
ITEM #14 PREPARING LAWN TREE BEDS
ITEM #15 PREPARING EXISTING SIDEWALK TREE BEDS – HAND EXCAVATION
ITEM #16 PREPARING LAWN TREE BEDS – HAND EXCAVATION
ITEM #17 PREPARING EXISTING SIDEWALK TREE BEDS WITH AMENDED EXISTING SOIL
ITEM #18 PREPARING LAWN TREE BEDS WITH AMENDED EXISTING SOIL
ITEM #19 PLANTING PROCURED STREET TREES, 2.0– 2.5 INCH CALIPER
ITEM #20 PLANTING PROCURED STREET TREES, 2.5– 3.0 INCH CALIPER
ITEM #21 PLANTING PROCURED STREET TREES, 3.0– 3.5 INCH CALIPER
ITEM #22 PLANTING PROCURED STREET TREES, 3.5– 4.0 INCH CALIPER
ITEM #23 PLANTING STREET TREES, 2.0– 2.5 INCH CALIPER
ITEM #24 PLANTING STREET TREES, 2.5– 3.0 INCH CALIPER
ITEM #25 PLANTING STREET TREES, 3.0– 3.5 INCH CALIPER
ITEM #26 PLANTING STREET TREES, 3.5– 4.0 INCH CALIPER
ITEM #27 PLANTING GROW BAG/PACKAGED TREES 25 GALLONS (CITY-PROCURED)
ITEM #28 PLANTING GROW BAG/PACKAGED TREES 35 GALLONS (CITY-PROCURED)
ITEM #29 PLANTING GROW BAG/PACKAGED TREES 45 GALLONS (CITY-PROCURED)
ITEM #30 PLANTING GROW BAG/PACKAGED TREES 25 GALLONS (CONTRACTOR-PROCURED)
ITEM #31 PLANTING GROW BAG/PACKAGED TREES 35 GALLONS (CONTRACTOR-PROCURED)
ITEM #32 PLANTING GROW BAG/PACKAGED TREES 45 GALLONS (CONTRACTOR-PROCURED)
ITEM #33 TRANSPLANTING TREES UP TO 4" CALIPER
ITEM #34 GRANITE BLOCK PAVERS FOR TREE BEDS
ITEM #35 RANGE FENCE 4'- 0" HEIGHT
ITEM #36 EXPANSION OF EXISTING SIDEWALK TREE BEDS
ITEM #37 REMOVE BLOCK AND/OR STONE PAVEMENT
ITEM #38 REMOVE DEBRIS (TREE BED AND TREE CANOPY)
ITEM #39 REMOVE AND RESET METAL TREE GUARDS AND GRATES
ITEM #40 TOPSOIL FOR TREE BED AREAS

ITEM #41 SHREDDED BARK MULCH
ITEM #42 SAW CUT PAVEMENT
ITEM #43 UNCLASSIFIED EXCAVATION
ITEM #44 HAND AND/OR PNEUMATIC EXCAVATION
ITEM #45 STRUCTURAL SOIL FOUNDATION MATERIAL
ITEM #46 CONCRETE PAVEMENT W/O BASE - 4"
ITEM #47 CONCRETE PAVEMENT W/O BASE - 7"
ITEM #48 CONCRETE CURB
ITEM #49 FOUNDATION MATERIAL FOR CONCRETE (MEASURED ON SITE)
ITEM #50 STEEL EDGING
ITEM #51 STEEL TREE BED GUARD 'A'
ITEM #52 STEEL TREE BED GUARD 'B'
ITEM #53 STEEL TREE BED GUARD 'C'
ITEM #54 STEEL TREE BED GUARD 'D'
ITEM #55 STEEL TREE BED GUARD 'E'
ITEM #56 REPAIR SIDEWALK VAULT

DETAIL A: TREE PLANTING & STAKE DETAIL
DETAIL A.1 – GROW BAG/PACKAGE TREE DETAIL
DETAIL B: SIDEWALK DECAL
DETAIL C: NOTIFICATION FLAG
DETAIL D: STEEL TREE GUARD TYPE 'A'
DETAIL E: STEEL TREE GUARD TYPE 'B'
DETAIL F: STEEL TREE GUARD TYPE 'C':
DETAIL G: STEEL TREE GUARD TYPE 'D'
DETAIL H: STEEL TREE GUARD TYPE 'E'
DETAIL I: CONCRETE CURB
DETAIL J: CONCRETE PAVEMENT
DETAIL K: GRANITE BLOCK PAVERS FOR TREE BEDS

CITY OF NEW YORK

DEPARTMENT OF PARKS & RECREATION

CAPITAL PROJECTS | OLMSTED CENTER | FLUSHING MEADOWS-CORONA PARK | FLUSHING NY 11368

NYC Parks