# **PROJECT MANUAL**

# **Pocahontas Community Improvement Project**

August 2023

**CHA PROJECT #: 068326** 

**Prepared for:** 

Sussex County, Virginia

Prepared by:

CHA 1341 Research Center Drive, Suite 2100 Blacksburg, VA 24060 (540) 552-5548

# Sussex County

# **Pocahontas Community Improvement Project**

# CONTRACT DOCUMENTS AND TECHNICAL SPECIFICATIONS

### TABLE OF CONTENTS

<b>Division 00 – Procurement and Contracting Requirements</b>	Page Number
INVITATION TO BID	001116
INSTRUCTIONS TO BIDDERS	002113
BID FORM	004113
BID BOND	004300
QUALIFICATION STATEMENT	004510
NOTICE OF AWARD	005100
AGREEMENT	005200
NOTICE TO PROCEED	005500
PERFORMANCE BOND	006100
PAYMENT BOND	006150
CERTIFICATE OF SUBSTANTIAL COMPLETION	006250
NOTICE OF ACCEPTABILITY	006260
GENERAL CONDITIONS	007200
SUPPLEMENTARY CONDITIONS	007300
CHANGE ORDER	009410
ESCROW AGREEMENT	009411

FEDERAL CONSTRUCTION CONTRACT INSERTS

#### **Division 01 – General Requirements**

- 011000 Summary
- 012200 Unit Prices
- 012600 Contract Modification Procedures
- 012900 Payment Procedures
- 013000 Project Management and Coordination
- 013300 Submittal Procedures
- 017300 Execution Requirements
- 017419 Construction Waste Management and Disposal
- 017700 Closeout Procedures

### **Division 02 - Existing Conditions**

- 023219 Exploratory Excavations
- 023313 Underground Utility Locator Service

#### **Division 31 – Earthwork**

- 310519.13 Geotextiles
- 311000 Site Clearing
- 312000 Earth Moving
- 312500 Erosion and Sediment Control

#### **Division 33 – Utilities**

- 330500 Common Work Results for Utilities
- 331113.13 Ductile Iron Public Water Utility Distribution Piping
- 331216 Water Distribution Valves
- 331219 Water Utility Distribution Fire Hydrants

#### SECTION 001116 - INVITATION TO BID

#### PART 1 – GENERAL

#### 1.1 RECEIPT OF BIDS

- A. Sealed Bids for the construction of Pocahontas Community Improvement Project will be received by Sussex County, 20135 Princeton Road, Sussex, VA 23884.
- B. Bids will be received until September 19, 2023 at 3:00 pm, local time, and shortly thereafter the Bids will be opened publicly and read aloud.

#### 1.2 GENERAL DESCRIPTION OF WORK

A. The work includes clearing and re-grading an existing drainage channel from Higgins Street to King Street to provide positive drainage and armoring areas of erosion potential. The work includes installation of four fire hydrants.

#### 1.3 TYPE OF BID

A. Bid shall be on a firm unit price basis for each of the bid items identified in the Base Bid Schedule of Section 004113 "Bid Form." The Total Base Bid Price will be the cumulative sum of the extension of the bid quantities times the unit prices for each bid item.

#### 1.4 DOCUMENT EXAMINATION AND PROCUREMENTS

A. The Contract Documents may be examined at the following locations:

Sussex County	CHA Consulting, Inc.
20135 Princeton Road	1341 Research Center Drive, Suite 2100
Sussex, VA 23884	Blacksburg, VA 24060
Attn: Beverly Walkup	Diackbourg, VII 24000

B. Copies of the Contract Documents (electronic version) may be requested from:

CHA Consulting, Inc. 1341 Research Center Drive, Suite 2100 Blacksburg, VA 24060 Phone: (540) 552-5548 Fax: (540) 552-5577

- C. The cost of hard copy Contract Documents is:
  - 1. Set of Contract Documents with full-size Drawings: \$100.
  - 2. Set of Contract Documents with half-size Drawings: \$75.
  - 3. Set of Contract Documents in PDF format on a CD: \$100.
- D. No partial sets of Specifications or Drawings will be issued.
- E. Revised drawings will be issued to plan holders at the size of the original issue as necessary with addenda.
- F. Refund Policy:
  - 1. Refund Policy: No refund for any Contract Documents will be made.

INVITATION TO BID
-------------------

#### 1.5 BID SECURITY

A. Each Bid shall be accompanied by bid security as described in the "Instructions to Bidders."

#### 1.6 CONTRACT SECURITY

A. The Successful BIDDER will be required to furnish performance and payment bonds as described in Section 007200 "General Conditions."

#### 1.7 PREBID CONFERENCE

A. A prebid conference will be held on September 6, 2023 at 10:00 am local time, at the Wakefield Town Office, 200 West Main Street, Wakefield, VA 23888.

#### 1.8 CONTRACT TIME

A. The Contract Time is defined in Section 007200 "General Conditions" and specified in Section 005200 "Agreement."

#### 1.9 QUALIFICATION OF BIDDERS

- A. Bidders are required under Section 54.1.1112 of the Code of Virginia to show evidence of Certificate of Registration before their Bid may be received and considered. The Bidder shall place on the outside of the envelope containing the Bid, the information required by Section 002113 "Instructions to Bidders."
- B. The qualifications, resources, and experience of the BIDDER in the area of grading and fire hydrant installation are considered to be essential for timely completion of this project.
- C. Qualification of Bidder shall also be in accordance with Article 1.3 of Section 002113 "Instructions to Bidders." Further, the Owner may make such other investigations as he deems necessary to determine the ability of the Bidder to perform the Work, and the Bidder shall furnish to the Owner all such information and data for this purpose as the Owner may request. The Owner reserves the right to reject any Bid if the evidence submitted by, or investigation of, such Bidder fails to satisfy the Owner that such Bidder is properly qualified to carry out the obligations of the Contract and to complete the Work contemplated therein.

#### 1.10 OWNER'S RIGHT TO REJECT BIDS

A. Owner reserves the full and unconditional right to waive irregularities and to reject any or all Bids.

#### 1.11 DETERMINATION OF SUCCESSFUL BIDDER

A. The Successful BIDDER shall be determined on the basis of the lowest, responsive, and responsible proposal in accordance with Section 002113 "Instructions to Bidders."

#### 1.12 FUNDING AGENCY REQUIREMENTS

A. The Contract awarded under this Invitation to Bid **is** expected to be funded in part from the Virginia Department of Housing and Community Development (VDHCD). VDHCD requirements are included in Section 002113 "Instructions to Bidders" and Section 007300 "Supplementary Conditions," and are a condition of this Contract.

#### 1.13 WITHDRAWAL OF BIDS

No Bid may be withdrawn for a period of 60 days after the date of bid opening except in accordance Α. with Section 2.2-4330 of the Code of Virginia, as amended. The OWNER, as Contracting Authority, has selected the first procedure (2.2-4330(B)(1)) for the withdrawal of bids as set forth in the section of the Code as cited above.

#### 1.14 NON-DISCRIMINATION POLICY

- A. In accordance with the Code of Virginia, Section 2.2-4343.1, the OWNER does not discriminate against faith-based organizations or on any other basis prohibited by state or federal law. The Owner does not discriminate on the basis of race, color, national origin, sex, age, disability, or religion.
- Β. The OWNER encourages participation and bid submission from any Disadvantaged Business Enterprises (DBE) and/or Minority or Women Business Enterprise (MBE or WBE) capable and otherwise qualified to perform work defined by this construction contract.
- C. The Successful Bidder must comply with the Presidents Executive Order #11246, prohibiting discrimination in employment regarding race, creed, sex, or national origin; Executive Orders #12138 and 11625 regarding utilization of MBE/WBE subcontractors in the performance of this Contract; provide certification that they do not or will not maintain or provide for their employees facilities that are segregated on the basis of race, color, creed, or national origin; comply with the provisions of Civil Rights Act of 1964; comply with the President's Executive Order 13658 regarding minimum wages on federally-funded construction projects; comply with the Davis-Bacon Act; and comply with Section 436 of P.L.113-76 American Iron and Steel Requirements.

#### 1.15 ANNOUNCEMENT OF AWARD

Α. Notice of Award or Notice of Intent to Award will be posted on the county's website when a decision is made.

#### 1.16 CONTRACT CHANGES

Any changes to the contract must be approved through issuance of a written contract addendum or Α. change order. The County will not assume responsibility for the cost of any changes made without issuance of a written contract addendum or change order. No fixed-price contract may be increased by more than twenty-five percent (25%) or \$50,000, whichever is greater, without advance approval of the Board of Supervisors.

#### 1.17 IMMIGRATION REFORM AND CONTROL ACT OF 1986

The Contractor certified that they do not, and shall not during the performance of the contract, A. knowingly employ an unauthorized alien as defined in the Federal Immigration Reform and Control Act of 1986.

#### 1.18 INDEPENDENT CONTRACTOR

A. The Contractor is an independent Contractor and nothing contained in the contract shall constitute or designate the Contractor or any of its agents or employees as employees of the County.

#### 1.19 CONTRACTUAL DISPUTES

A. Disputes and claims arising under the resulting contract shall be processed pursuant to the Code of Virginia 2.2-4363, as amended.

#### 1.20 FREEDOM OF INFORMATION

A. Ownership of all data, materials and documentation originated and prepared for the County pursuant to the IFB shall belong exclusively to the County and be subject to public inspection in accordance with the Virginia Freedom of Information Act. Trade secrets or proprietary information submitted by an Offeror shall not be subject to public disclosure under the Virginia Freedom of Information Act; however, the Bidder must invoke the protections of Section 2.2-4342(D) of the Code of Virginia, in writing, either before or at the time the data or other materials to be protected and state the reasons why protection is necessary. The proprietary or trade secret material submitted must be identified by some distinct method such as highlighting or underlining and must indicate only the specific words, figures, or paragraphs that constitute trade secret or proprietary information. The classification of an entire proposal document, line-item prices and/or total proposal prices as proprietary or trade secrets is not acceptable and will result in rejection of the proposal.

#### 1.21 TAXES

A. Pursuant to Virginia Code Section 58.1-609.1(4), the county is exempt from the payment of Virginia state sales and use taxes. Vendors should not include such taxes in invoices presented to the County for payment. State sales and use tax certificates of exemption, Form ST-12, will be issued upon request. Said taxes shall not be added to the contract price between the County and the Contractor, as the taxes shall be an obligation of the Contractor and not of the County, and the County shall be held harmless for same by the Contractor. Exemption certification will be supplied upon request.

#### 1.22 APPLICABLE LAWS, REGULATIONS AND COURTS

- A. This solicitation is governed by the laws of the Commonwealth of Virginia. Any dispute or controversy arising out of or relating to this solicitation or otherwise shall be brought in the Sussex County Circuit Court. Contractor expressly waives any objection to venue or jurisdiction of the Sussex County Circuit Court.
- B. Each of the parties irrevocably waive trial by jury in any action, proceeding, or counterclaim, whether at law or in equity, brought by either party for any claim, demand, action, or cause of action, arising out of this Agreement. Each of the parties hereby agrees and consents that any such claim, demand, action, or cause of action shall be decided by court trial without a jury.
- C. The Contractor shall comply with all federal, state and local laws, ordinances, rules, regulations, and lawful orders of any public authority bearing on the performance of the work and shall give all notices required thereby.

#### 1.23 ATTORNEY'S FEES

A. Each party shall bear its own respective costs, expenses, and attorney's fees with respect to any action, suit or other proceeding instituted concerning or arising out of the resultant contract.

#### 1.24 TERMINATION FOR CONVENIENCE

A. Unless otherwise stated, any resultant contract may be terminated, in whole or in part, whenever the County determines that such a termination is in its best interests. Any such termination shall become

effective on the date stated in a written notice of termination to the Contractor. The Contractor shall be paid for all goods delivered or services successfully completed prior to the termination date.

#### 1.25 TERMINATION BY COUNTY FOR CAUSE

- A. If the Contractor should be adjudged as bankrupt, or if he should make a general assignment for the benefit of his creditors, or if a receiver should be appointed on account of his insolvency, the County may terminate the contract. If the Contractor violates any provisions of the Virginia Governmental Fraud Act, the County may terminate the contract. If the Contractor should persistently or repeatedly refuse or should fail, except in cases for which extension of time is provided, to supply enough properly skilled workmen or proper materials, or if he should fail to make prompt payment to subcontractors or suppliers of material or labor, or persistently disregards laws, ordinances, or the written instructions of the County, or otherwise be guilty of a substantial violation of any provision of the contract then the County may terminate the contract.
- B. Prior to termination of the contract, the County shall give the Contractor and his surety, if applicable, ten (10) calendar days written notice, during which the Contractor and/or his surety may rectify the cause of the termination. If rectified to the satisfaction of the County within said ten (10) days, the County may rescind his notice of termination. If it does not, the termination for cause shall become effective at the end of the ten-day 10) notice period. In the alternative, the County may postpone the effective date of the termination notice, at its sole discretion, if it should receive reassurances from the Contractor and/or its surety that the cause of termination will be remedied in a time and manner which the County finds acceptable. If at any time more than ten (10) days after the notice of termination, the County determines that Contractor and/or its surety has not or is not likely to rectify the causes of termination in an acceptable manner or within the time allowed, then the County may immediately terminate the contract for cause by giving written notice to the Contractor and its surety. In no event shall termination for terminate the obligations of the Contractor's surety on its payment and performance bonds.
- C. Notice of terminations, whether initial or given after a period of postponement, may be served upon the Contractor and the surety by mail or any other means at their last known places of business in Virginia or elsewhere, by delivery to any officer or management/supervisory employee of either wherever they may be found, or, if no such officer, employee or place of business is known or can be found by reasonable inquiry within three (3) days, by posting the notice at the job site. Failure to accept or pick up registered or certified mail addressed to the last known address shall be deemed to be delivery.
- D. Upon such termination of the contract, the Contractor shall immediately cease work and shall immediately deliver to the County any and all materials and/or information kept on file, created or obtained on behalf of the County. County shall complete the work by whatever method it may deem expedient. In such case the Contractor shall not be entitled to receive any further payment. If the expense of finishing the work, including compensation for additional managerial and administrative services shall exceed the unpaid balance of the contract price, the Contractor shall pay the difference to the County, together with any other expenses of terminating the contract and having it completed by others.
- E. If it should be judicially determined that the County improperly terminated this contract for cause, then the termination shall be deemed to be termination for the convenience of the County.
- F. Termination of the contract under this section is without prejudice to any other right or remedy of the County.

#### 1.26 AVAILABILITY OF FUNDS

It is understood and agreed between the parties herein that the County shall be bound hereunder only A. to the extent of lawfully appropriated funds.

#### PAYMENT AND PERFORMANCE BONDS 1.27

In order to secure its performance of the Work, and pursuant to Section 2.2-4337 of the Code of A. Virginia, the Contractor shall cause to be furnished separate performance and payment bonds to the County in the amount of the Contract Price. The bonds shall be from the Contractor as obligor to the County as sole Obligee, provided that the bonds clearly state that no default by the Contractor shall excuse the surety from any obligations the surety has to the County under the bonds. Those to be protected under the payment bond will be intended third-party beneficiaries. The bonds shall be executed by a corporate surety or corporate sureties that are reasonably acceptable to the County, and duly authorized to do business in the Commonwealth. If a surety upon any bond furnished in connection herewith becomes insolvent, or otherwise not authorized to do business in the Commonwealth, then the Contractor shall promptly cause the replacement of the bond or cause equivalent security acceptable to the County to be furnished. The Contractor shall cooperate with the County in order to fulfill any reasonable requirements in connection with the financing for the Work with respect to the form of performance and payment bonds provided hereunder.

END OF SECTION

#### SECTION 002113 - INSTRUCTIONS TO BIDDERS

#### 1.1 DEFINED TERMS

- A. Terms used in these Instructions to Bidders, which are defined in Section 007200 "General Conditions," have the meanings assigned to them in the General Conditions.
- B. Certain additional terms used in these Instructions to Bidders have the meanings indicated below, which are applicable to both the singular and plural thereof.
  - 1. Bidder One who submits a Bid directly to Owner as distinct from a sub-bidder, who submits a bid to a Bidder.
  - 2. Issuing Office The office from which the Bidding Documents are to be issued and where the bidding procedures are to be administered.
  - 3. Successful Bidder The lowest, responsible, and responsive Bidder to whom Owner (on the basis of Owner's evaluation as hereinafter provided) makes an award.

### 1.2 COPIES OF BIDDING DOCUMENTS

- A. Complete sets of the Bidding Documents in the number and for the price stated in Section 001116 "Invitation to Bid" may be obtained from the Engineer.
- B. Complete sets of Bidding Documents must be used in preparing Bids; neither Owner nor Engineer assume any responsibility for errors or misinterpretations resulting from the use of incomplete sets of Bidding Documents.
- C. Owner and Engineer in making copies of Bidding Documents available on the above terms do so only for the purpose of obtaining Bids for the Work and do not confer a license or grant for any other use.

#### 1.3 QUALIFICATIONS OF BIDDERS

A. To demonstrate qualifications to perform the Work, each Bidder must be prepared to submit within five (5) days after Bid opening upon Owner's request detailed written evidence, such as financial data, previous experience, present commitments, and other such data as may be called for below (or elsewhere in the Contract Documents). Each Bid must contain evidence of Bidder's qualification to do business in the Commonwealth of Virginia.

#### 1.4 EXAMINATION OF CONTRACT DOCUMENTS AND SITE(S)

- A. It is the responsibility of each Bidder before submitting a Bid to:
  - 1. Examine thoroughly the Contract Documents and other related data identified in the Bidding Documents.
  - 2. Visit the site to become familiar with and satisfy Bidder as to the general, local and site conditions that may affect cost, progress, performance, or furnishing of the Work. This is to require an alert, heads-up, eyes-open, reasonable examination of the area(s) and conditions under which the Work is to be performed.
  - 3. Site visits can be scheduled in advance with Beverly Walkup, Sussex County Planning Director at 434-246-1042. Unescorted site visits are not permitted.
  - 4. Consider federal, state, and local laws and regulations that may affect cost, progress, performance, or furnishing of the Work.
  - 5. Study and carefully correlate Bidder's knowledge and observations with the Contract Documents and such other related data.

- 6. Promptly notify Engineer of all conflicts, errors, ambiguities, or discrepancies in or between the Contract Documents and such other related documents. When conflicts, errors, ambiguities, or discrepancies are discovered in or between Contract Documents and/or other related documents, and when said conflicts, etc., have not been resolved through the interpretations by Engineer as described in Article 1.7, Bidder shall include in the Bid the greater quantity or better quality of Work, or compliance with the more stringent requirement resulting in a greater cost. Such greater cost shall be included in the Bid.
- B. Provisions concerning responsibilities for the adequacy of data furnished to prospective Bidders with respect to subsurface conditions, other physical conditions and Underground Facilities, and possible changes in the Contract Documents due to differing or unanticipated conditions appear in Paragraphs 5.03 through 5.05 of the General Conditions.
- C. Before submitting Bid, each Bidder will be responsible to obtain such additional or supplementary examinations, investigations, explorations, tests, studies and data concerning conditions (surface, subsurface and underground facilities) at or contiguous to the site or otherwise, which may affect cost, progress, performance or furnishing of the Work or which relate to any aspect of the means, methods, techniques, sequences or procedures of construction to be employed by Bidder and safety precautions and programs incident thereto or which Bidder deems necessary to determine its Bid for performing and furnishing the Work in accordance with the time, price and other terms and conditions of the Contract Documents.
- D. The submission of a Bid will constitute an incontrovertible representation by Bidder (i) that Bidder has complied with every requirement of this Article 1.4, and (ii) that without exception the Bid is premised upon performing and furnishing the Work required by the Contract Documents and applying the specific means, methods, techniques, sequences or procedures of construction (if any) that may be shown or indicated or expressly required by the Contractor in furnishing the Work.
- E. The provisions of paragraphs A. through D. of this Article (1.4) inclusive, do not apply to Asbestos, Polychlorinated Biphenyls (PCBs), Petroleum, or hazardous waste covered by Paragraph 5.06 of the "General Conditions."

#### 1.5 PREBID CONFERENCE

 A prebid conference will be held at the time, date, and location as stated in Section 001116 "Invitation to Bid." Representatives of Owner and Engineer will be present to discuss the Project. Bidders are encouraged to attend and participate in the conference. Engineer will transmit to all prospective Bidders of record such Addenda as Engineer considers necessary in response to questions arising at the conference. Oral statements may not be relied upon and will not be binding or legally effective.

#### 1.6 AVAILABILITY OF LANDS FOR WORK, ETC.

- A. The lands upon which the Work is to be performed and other lands designated for use by Contractor in performing the Work are identified in the Contract Documents. All additional lands and access thereto are identified in the Contract Documents. All additional lands and access thereto required for temporary construction facilities, construction equipment, or storage of materials and equipment to be incorporated in the Work are to be obtained and paid for by Contractor.
- B. Contractor is not to perform work until all necessary permission is received from Owner and Landowners.

#### 1.7 INTERPRETATIONS AND ADDENDA

A. All questions about the meaning or intent of the Bidding Documents are to be directed to Engineer in writing. Interpretations or clarifications considered necessary by Engineer in response to such questions will be issued by Addenda digitally via email, mailed, or delivered to all parties recorded by Engineer as having received the Bidding Documents. Questions received less than seven (7) days prior to the date for opening of Bids may not be answered. Only questions answered by formal written Addenda will be binding. Oral and other interpretations or clarifications will be without legal effect. Direct questions to Engineer at:

CHA 1341 Research Center Drive, Suite 2100 Blacksburg, VA 24060 Phone: (540) 212-4368 Email: Steele@chacompanies.com Attn: Stephen Steele

B. Addenda may also be issued to modify the Bidding Documents as deemed advisable by Owner or Engineer.

#### 1.8 BID SECURITY

- A. Each Bid must be accompanied by Bid security made payable to Owner in an amount of 5 percent of Bidder's maximum Bid price and in the form of a certified or bank check, satisfactory evidence of a cash escrow, or a Bid Bond issued by a surety meeting the requirements of Paragraph 6.01 of the General Conditions.
- B. The Bid security of Successful Bidder will be retained until such Bidder has executed the Agreement, furnished the required contract security and certificates of insurance and met the other conditions of the Notice of Award, whereupon the Bid security will be returned. If the Successful Bidder fails to execute and deliver the Agreement and furnish the required contract security and certificates of insurance within 15 days after the Notice of Award, Owner may annul the Notice of Award and the Bid security of that Bidder will be forfeited to the Owner and considered liquidated damages. The Bid security of other Bidders whom Owner believes to have a reasonable chance of receiving the award may be retained by Owner until the earlier of the seventh day after the Effective Date of the Agreement or the sixty-first (61st) day (time period for award plus one (1) day) after the Bid opening, whereupon Bid security furnished by such Bidders will be returned.
- C. Bid bonds must be executed by a duly licensed corporate Surety authorized to do business in the Commonwealth of Virginia. All bid security shall be made payable without condition to the Owner.
- D. Bid security with Bids which are not competitive will be returned within seven (7) days after the Bid opening.

#### 1.9 CONTRACT TIMES

A. The number of days within which, or the dates by which, the Work is to be substantially completed and also completed and ready for final payment are set forth in the Agreement. (the term "Contract Times" is defined in Article 1 of the General Conditions).

#### 1.10 LIQUIDATED DAMAGES

A. Provisions for liquidated damages, if any, are set forth in Section 005200 "Agreement."

#### 1.11 SUBSTITUTE AND "OR-EQUAL" ITEMS

- A. The Contract, if awarded, will be on the basis of materials and equipment described on the Drawings or specified in the Specifications without consideration of possible substitute or "or-equal" items.
- B. However, when it is indicated in the drawings or specified in the Specifications that a "substitute" or "or-equal" item of material or equipment may be furnished or used by Contractor if acceptable to Engineer, application for such acceptance will not be considered by Engineer until after the Effective Date of the Agreement. The procedure for submission of any such application by Contractor and consideration by Engineer is set forth in Article 7 of the General Conditions and supplemented in "Substitution Procedures."

#### 1.12 SUBCONTRACTORS, SUPPLIERS AND OTHERS

- A. If the Contract Documents require the identity of certain Subcontractors, Suppliers, and other persons and organizations (including those who are to furnish the principal items of material and equipment) to be submitted to Owner in advance of a specified date prior to the Effective Date of the Agreement, the apparent Successful Bidder, and any other Bidder so requested, shall within five (5) days after Bid opening submit to Owner a list of all such Subcontractors, Suppliers and other persons and organizations proposed for those portions of the Work for which such identification is required. Such list shall be accompanied by a detailed experience statement with pertinent information regarding similar projects and other evidence of qualification for each such Subcontractor, Supplier, person or organization if requested by Owner. The Owner or Engineer, who after due investigation has reasonable objection to any proposed Subcontractor, Supplier, other person or organization, may before the Notice of Award is given request the apparent Successful Bidder to submit an acceptable substitute; in which case the apparent Successful Bidder shall submit an acceptable substitute. Bidder shall further indicate that Bidder's Bid price will be increased (or decreased) by the difference in cost occasioned by such substitution, and Owner may consider such price adjustment in evaluation Bids and making the contract award.
- B. If apparent Successful Bidder declines to make any such substitution, Owner may award the contract to the next lowest Bidder that proposes to use acceptable Subcontractors, Suppliers and other persons and organizations. The declining to make requested substitutions will not constitute grounds for sacrificing the Bid security of any Bidder. Any Subcontractor, Supplier, other person or organization listed and to whom Owner or Engineer does not make written objection prior to the giving of the Notice of Award will be deemed acceptable to Owner and Engineer subject to revocation of such acceptance after the Effective Date of the Agreement as provided in Paragraph 7.06 of the General Conditions.
- C. No Contractor shall be required to employ any Subcontractor, Supplier, other person or organization against whom Contractor has reasonable objection.

#### 1.13 PREPARATION OF BID

- A. The Bid form is included with the Bidding Documents; additional copies may be obtained from Engineer (or the Issuing Office).
- B. All blanks on the Bid form must be completed by printing in black ink, by typewriter, or by word processor.

- C. Bids by corporations must be executed in the corporate name by the president or a vice-president (or other corporate officer accompanied by evidence of legal authority to sign) and the corporate seal must be affixed and attested by the secretary or an assistant secretary. The corporate address and state of incorporation must be shown below the signature.
- D. Bids by partnerships must be executed in the partnership name and signed by a partner, whose title must appear under the signature and the official address of the partnership must be shown below the signature.
- E. All names must be typed or printed in black ink below the signature.
- F. The Bid shall contain an acknowledgment of receipt of all Addenda (the numbers of which must be filled in on the Bid form).
- G. The postal address, an email address, and a telephone number for communications regarding the Bid must be shown.
- H. Evidence of authority to conduct business as an out-of-state corporation in the state where the Work is to be performed shall be provided in accordance with Article 1.3 of this Section. Contractor license number must be shown.

#### 1.14 SUBMITTAL OF BIDS

- A. Bids shall be submitted on the prescribed Bid form, provided with the Bidding Documents, at the time and place indicated in Section 001116 "Invitation to Bid."
- B. Bid shall be enclosed in an opaque sealed envelope, marked with the Project title "Pocahontas Community Improvement Project" and the name and address of Bidder, and accompanied by the Bid security and other required documents. If the Bid is sent through the mail or other delivery system, the sealed envelope shall be enclosed in a separate envelope with the notation "BID ENCLOSED" on the face of it.
- C. Attention is called to Title 54.1-1112 of the Code of Virginia. All Bids must carry the Contractor's Virginia License Number. The Contractor's Virginia License Number must be placed on the face of the envelope containing the Bid.
- D. All Bids must be accompanied by a certified check or a Bidder's Bond in the amount of 5 percent of the total Bid made payable to the Owner.

#### 1.15 BASIS OF BID AND EVALUATION OF BID

- A. Unit Price:
  - 1. Bidders shall submit a Bid on a unit price basis for each item of Work listed in the Bid schedule.
  - 2. The total of all estimated prices will be determined as the sum of products of the estimated quantity of each item and the unit price Bid for the item. The final quantities and Contract Price will be determined in accordance with paragraph 13.03 of the General Conditions.
  - 3. Discrepancies between the multiplication of units of Work and unit prices will be resolved in favor of the unit prices. Discrepancies between the indicated sum of any column of figures and the correct sum thereof will be resolved in favor of the correct sum. Discrepancies between words and figures will be resolved in favor of words.

B. The Bid price shall include such amounts as the Bidder deems proper for overhead and profit on account of cash allowances, if any, named in the Contract Documents as provided in Paragraph 13.02 of the General Conditions.

#### 1.16 MODIFICATION AND WITHDRAWAL OF BIDS

- A. Bids may be modified or withdrawn by an appropriate document duly executed in the manner that a Bid must be executed and delivered to the place where Bids are to be submitted at any time prior to the opening of Bids. Bids may be modified in any way that is legally acceptable in the State where the Project is located.
- B. After opening of bids, no Bidder may withdraw his proposal for a period of sixty (60) days, except in accordance with the Virginia Public Procurement Act, Title 2.2-4330. The County of Sussex, being the Owner and Contracting Authority, will use the first procedure under Title 2.2-4330(i) for withdrawal of bids set forth in Title 2.2-4330. The Bidder must give notice in writing of his claim of right to withdraw his bid within two (2) business days after the conclusion of the bid opening procedure.

#### 1.17 OPENING OF BIDS

A. Bids will be opened and (unless obviously non-responsive) read aloud publicly at the place where Bids are to be submitted. An abstract of the amounts of the base Bids and major alternates (if any) will be made available to Bidders after the opening of Bids.

#### 1.18 BIDS TO REMAIN SUBJECT TO ACCEPTANCE

A. All Bids will remain subject to acceptance for the time period specified for Notice of Award, but Owner may, in sole discretion, release any Bid and return the Bid security prior to that date.

#### 1.19 AWARD OF CONTRACT

- A. Owner reserves the right to reject any or all Bids, including without limitation the rights to reject any or all nonconforming, nonresponsive, unbalanced or conditional Bids and to reject the Bid of any Bidder if Owner believes that it would not be in the best interest of the Project to make an award to that Bidder, whether because the Bid is not responsive or the Bidder is unqualified or of doubtful financial ability or fails to meet any other pertinent standard or criteria established by Owner. Owner also reserves the right to waive all informalities not involving price, time, or changes in the Work and to negotiate contract terms with the Successful Bidder.
- B. Discrepancies between the multiplication of units of Work and unit prices will be resolved in favor of the unit prices. Discrepancies between the indicated sum of any column of figures and the correct sum thereof will be resolved in favor of the correct sum. Discrepancies between words and figures will be resolved in favor of the words.
- C. Any or all bids will be rejected if Owner has reason to believe that collusion exists among the Bidders.
- D. The following are some of the causes which shall be considered as sufficient for the disqualification of a Bidder and the rejection of his Bid:
  - 1. More than one bid for the same work from an individual, firm, or corporation. (This does not apply to subcontractors.)

- 2. Poor performance in the execution of work under previous contracts whether for this Owner or otherwise.
- 3. For being in arrears on existing contracts, in litigation with the Owner, or having defaulted on a previous contract.
- 4. Lack of competency as revealed by financial statement, experience, and equipment.
- E. In evaluating Bids, Owner will consider the qualifications of Bidders, whether or not the Bids comply with the prescribed requirements, and such alternates, unit prices and other data, as may be requested in the Bid form or prior to the Notice of Award.
- F. Owner may consider the qualifications and experience of Subcontractors, Suppliers, and other persons and organizations proposed for those portions of the Work as to which the identity of Subcontractors, Suppliers, and other persons and organizations must be submitted as provided in the General Conditions. Owner also may consider the operating costs, maintenance requirements, performance data and guarantees of major items of materials and equipment proposed for incorporation in the Work when such data is required to be submitted prior to the Notice of Award.
- G. Owner may conduct such investigations as Owner deems necessary to assist in the evaluation of any Bid and to establish the responsibility, qualifications and financial ability of Bidders, proposed Subcontractors, Suppliers and other persons and organizations to perform and furnish the Work in accordance with the Contract Documents to Owner's satisfaction within the prescribed time.
- H. In making the Contract Award, the Owner shall take into consideration:
  - 1. Total base bid price.
  - 2. Magnitude of exceptions (if any).
  - 3. Bidder's technical, financial, or other qualifications.
  - 4. Bidder's demonstrated record for successful completion of similar projects within allocated time.
  - 5. Percentage of work to be executed by the Bidder himself. Preference will be given to the Bidder who intends to perform the greatest percentage of work with personnel in its direct employment.
- I. If the Contract is to be awarded, it will be awarded to lowest, responsive and responsible Bidder whose evaluation by Owner indicates to Owner that the award will be in the best interests of the Project and in accordance the Virginia Public Procurement Act.
- J. If the amount of all Bids received by the Owner in response to any invitation to Bid or solicitation of Bids exceeds allocated or budgeted funds of the Owner available for the procurement, the Owner may, in its discretion, elect to negotiate an adjustment of the Bid price with the lowest responsible Bidder in order to bring the amount Bid within the available funds of the Owner.
  - 1. In determining whether to undertake any such negotiations, the Owner shall take into account the time required for completion of the Contract Work by the Bidder, and the feasibility of resolicitation of Bids generally or a reduction in the terms and specifications of the procurement.
  - 2. In negotiating an adjustment of the Bid price under these procedures, the Owner may also negotiate changes in the work, specifications, and Bid requirements to the extent necessary to bring the Bid within the amount of available funds, provided that such adjustments in the sole discretion of the Owner do not materially alter the terms of the procurement or result in substantial competitive disadvantages to other Bidders and offerers.
  - 3. The Owner shall have the right at any time to terminate negotiations with any Bidder and to reject all Bids or proposals.

- 4. In any case in which the Owner undertakes to negotiate with the lowest responsible Bidder pursuant to these procedures, all other Bids and offers shall be deemed rejected.
- K. If the contract is to be awarded, Owner will give Successful Bidder a Notice of Award within **60** days after the day of the Bid opening. No other act of Owner or others will constitute acceptance of a Bid.

#### 1.20 CONTRACT SECURITY AND INSURANCE

A. Article 6 of the General Conditions, as may be modified by the Supplementary Conditions, sets forth Owner's requirements as to performance and payment Bonds and insurance. When the Successful Bidder delivers the executed Agreement to Owner, it must be accompanied by such Bonds and insurance.

#### 1.21 SIGNING OF AGREEMENT

A. When Owner gives a Notice of Award to the Successful Bidder, it will be accompanied by the required number of unsigned counterparts of the Agreement. Within fifteen (15) days thereafter, Contractor shall sign and deliver the required number of counterparts of the Agreement to Owner with the required Bonds, Certificates of Insurance, and Escrow Agreement, if required by law. Within ten (10) days thereafter, Owner shall deliver one fully signed counterpart to Contractor.

#### 1.22 SALES AND USE TAXES

- A. Owner is exempt from Virginia state sales and use taxes on materials and equipment to be incorporated in the Work for facilities constructed for the purposes of abating or preventing pollution. Such taxes shall not be included in the Bid Price. The Contractor shall be responsible to file the necessary forms for claiming exemption with the Virginia Department of Taxation. If this project is not for the purposes of abating or preventing pollution, then state sales tax shall be included in the Bid.
- B. All other taxes as described in Paragraph 7.09 of the General Conditions and including the Commonwealth of Virginia sales tax on non-exempt items shall be included in the Total Base Bid Price.

#### 1.23 RETAINAGE

A. Provisions concerning retainage and Contractor's rights to deposit securities in lieu of retainage are set forth in the Agreement.

#### 1.24 CONTRACTS TO BE ASSIGNED

- A. Owner has executed contracts with \_\_\_\_\_\_ for \_\_\_\_\_ for \_\_\_\_\_ for \_\_\_\_\_ for
- B. The materials and equipment provided for in these contracts are to be furnished and delivered to the Project site for installation by Contractor. The contracts will be assigned by Owner to Contractor. Identification of the materials and equipment and the procedures to be followed appear in Paragraph SC-6.3.4 of the Supplementary Conditions.
- C. Bidders may examine the contract documents for these contracts at the Issuing Office.

# 1.25 MINORITY BUSINESS AND WOMEN'S BUSINESS ENTERPRISES (MBE/WBE) REQUIREMENTS OF 40 CFR 33.240 – NOT USED

END OF SECTION

#### SECTION 004113 – BID FORM

#### PART 1 – GENERAL

#### 1.1 PROJECT/CONTRACT IDENTIFICATION

Sussex County Pocahontas Community Improvement Project

#### 1.2 THIS BID IS SUBMITTED TO

Sussex County 20135 Princeton Road Sussex, Virginia 23884 Attn: Beverly Walkup

herein after referred to as Owner

#### 1.3 ENTER INTO AGREEMENT

A. The undersigned Bidder proposes and agrees, if this Bid is accepted, to enter into an Agreement with Owner in the form included in the Contract Documents to perform and furnish all Work as specified or indicated in the Contract Documents for the Bid Price and within the Bid Times indicated in this Bid and in accordance with the other terms and conditions of the Contract Documents.

#### 1.4 BIDDER ACCEPT

**BID FORM** 

A. Bidder accepts all of the terms and conditions of Section 001116 "Invitation to Bid" and Section 002113 "Instructions to Bidders" including without limitation those dealing with the disposition of Bid security. This Bid will remain subject to acceptance for the period specified for Notice of Award after the day of Bid opening. Bidder will sign and deliver the required number of counterparts of the Agreement with the Bonds and other documents required by the Bidding Requirements within 15 days after the date of Owner's Notice of Award.

#### 1.5 BIDDER'S REPRESENTATIONS

- A. In submitting this Bid, Bidder represents, as more fully set forth in the Agreement, that:
  - 1. Bidder has examined and carefully studied the Bidding Documents and the following Addenda receipt of all, which is hereby acknowledged: (*List Addenda by Number and Date.*)

ADDENDA NUMBER	DATE

- 2. Bidder has visited the site and become familiar with and is satisfied as to the general, local and site conditions that may affect cost, progress, performance, and furnishing of the Work.
- 3. Bidder is familiar with and is satisfied as to all federal, state, and local laws and regulations that may affect cost, progress, performance, and furnishing of the Work.
- 4. Bidder has carefully studied all: (1) reports of explorations and tests of subsurface conditions at or adjacent to the Site and all drawings of physical conditions relating to existing surface or

subsurface structures at the Site that have been identified in the Supplementary Conditions, especially with respect to Technical Data in such reports and drawings, and (2) reports and drawings relating to Hazardous Environmental Conditions, if any, at or adjacent to the Site that have been identified in the Supplementary Conditions, especially with respect to Technical Data in such reports and drawings.

- 5. Bidder has considered the information known to Bidder itself; information commonly known to contractors doing business in the locality of the Site; information and observations obtained from visits to the Site; the Bidding Documents; and any Site-related reports and drawings identified in the Bidding Documents, with respect to the effect of such information, observations, and documents on (1) the cost, progress, and performance of the Work; (2) the means, methods, techniques, sequences, and procedures of construction to be employed by Bidder; and (3) Bidder's safety precautions and programs.
- Bidder agrees, based on the information and observations referred to in the preceding 6. paragraph, that no further examinations, investigations, explorations, tests, studies, or data are necessary for the determination of this Bid for performance of the Work at the price bid and within the times required, and in accordance with the other terms and conditions of the Bidding Documents.
- 7. Bidder acknowledges that Owner and Engineer do not assume responsibility for the accuracy or completeness of information and data shown or indicated in the Bidding Documents with respect to Underground Facilities at or contiguous to the site.
- Bidder is aware of the general nature of the Work to be performed by Owner and others at the 8. site that relates to Work for which this Bid is submitted as indicated in the Contract Documents. Bidder acknowledges the requirement to maintain existing operations of the facility during all phases of construction.
- Bidder has correlated the information known to Bidder, information and observations obtained 9. from visits to the site, reports and drawings identified in the Contract Documents and all additional examinations, investigations, explorations, tests, studies, and data with the Contract Documents.
- 10. Bidder has given Engineer written notice of all conflicts, errors, ambiguities, or discrepancies in the Contract Documents and the written resolution thereof by Engineer is acceptable to Bidder, and the Contract Documents are generally sufficient to indicate and convey understanding of all terms and conditions for performing and furnishing the Work for which this Bid is submitted.
  - Where conflicts, errors, ambiguities or discrepancies have been discovered in or between a. Contract Documents and/or other related documents, and where said conflicts, etc., have not been resolved through the interpretations or clarifications by Engineer as described in Section 002113 "Instructions to Bidders," because of insufficient time or otherwise, Bidder has included in the Bid the greater quantity or better quality of Work, or compliance with the more stringent requirement resulting in a greater cost.
- This Bid is genuine and not made in the interest of or on behalf of any undisclosed person, firm 11. or corporation and is not submitted in conformity with any agreement or rules of any group, association, organization or corporation; Bidder has not directly or indirectly induced or solicited any other Bidder to submit a false or sham Bid; Bidder has not solicited or induced any person, firm or corporation to refrain from bidding; and Bidder has not sought by collusion to obtain for itself any advantage over any other Bidder or over Owner.

#### **BIDDER'S CERTIFICATION** 1.6

- A. Bidder certifies that:
  - This Bid is genuine and not made in the interest of or on behalf of any undisclosed individual 1. or entity and is not submitted in conformity with any collusive agreement or rules of any group, association, organization, or corporation.

- 2. Bidder has not directly or indirectly induced or solicited any other Bidder to submit a false or sham Bid.
- 3. Bidder has not solicited or induced any individual or entity to refrain from bidding.
- 4. Bidder has not engaged in corrupt, fraudulent, collusive, or coercive practices in competing for the Contract. For the purposes of this Paragraph:
  - a. "corrupt practice" means the offering, giving, receiving, or soliciting of anything of value likely to influence the action of a public official in the bidding process.
  - b. "fraudulent practice" means an intentional misrepresentation of facts made (a) to influence the bidding process to the detriment of Owner, (b) to establish bid prices at artificial non-competitive levels, or (c) to deprive Owner of the benefits of free and open competition.
  - c. "collusive practice" means a scheme or arrangement between two or more Bidders, with or without the knowledge of Owner, a purpose of which is to establish bid prices at artificial, non-competitive levels.
  - d. "coercive practice" means harming or threatening to harm, directly or indirectly, persons or their property to influence their participation in the bidding process or affect the e execution of the Contract.

#### PART 2 – BID

Б

**BID FORM** 

#### 2.1 BASE BID PRICE

- A. The Base Bid Schedule summarizes the corresponding Unit Price and Extended Total Price for each Bid Item. Bidder acknowledges that the Extended Total Price shall be full compensation for all Base Bid Work complete, as described for each scheduled Bid Item.
- B. Bidder hereby agrees to perform all Work as described in the Specifications and as shown on the Drawings of these Contract Documents, complete for the following Total Base Bid price indicated in the following Base Bid Schedule:

	BASE BID S POCAHONTAS COMMUNITY			ENT PROJECT	
Item No.	Description	Unit	Estimated Quantity	Unit Price	Extended Total Price
1.	Bonds, Mobilization, and Insurance	LS	1	\$	\$
2.	Drainage Channel Improvements	LS	1	\$	\$
3.	Fire Hydrant Assembly	EA	4	\$	\$
			TOT	AL BASE BID	\$.00
ΤΟΤΑ	L BASE BID				
	(in words)				
(in wo	rds)				

C. Bidder acknowledges that final payment will be based on the Total Base Bid Price as adjusted for any alternate or combination of alternates selected by the Owner and any approved additions or deductions to the Contract.

#### 2.2 COMPLETION

- A. Bidder agrees that all Work will be completed as specified in the Agreement.
- B. Bidder accepts the provisions of the Agreement as to liquidated damages in the event of failure to complete the Work within the times specified.
- 2.3 MAJOR EQUIPMENT AND SYSTEMS SUPPLIERS NOT USED
- 2.4 SUBSTITUTIONS FOR MAJOR EQUIPMENT AND SYSTEMS NOT USED
- 2.5 SCHEDULE OF PROPOSED MAJOR EQUIPMENT AND SYSTEMS SUPPLIERS NOT USED
- 2.6 ESCROW ACCOUNT OPTION NOT USED
- 2.7 ATTACHED DOCUMENTS
  - A. The following documents are submitted with and made a condition of this Bid:
    - 1. Required Bid security.
    - 2. List of Proposed Subcontractors.
    - 3. List of Proposed Suppliers.
    - 4. List of Project References.
    - 5. Evidence of authority to do business in the state of the Project; or a written covenant to obtain such license within the time for acceptance of Bids.
    - 6. Contractor's License No.: **[or]** Evidence of Bidder's ability to obtain a State Contractor's License and a covenant by Bidder to obtain said license within the time for acceptance of Bids.
    - 7. Required Bidder Qualification Statement with supporting data.
  - B. The following documents shall be submitted by the apparent low bidder within five business days of the bid opening to the Engineer.
    - 1. Contractor's Policy of Non-Discrimination.
    - 2. Contractor's Policy of a Drug-Free Work Place.

#### 2.8 ADDRESS FOR COMMUNICATIONS

A. Communications concerning this Bid shall be addressed to:

#### **DEFINED TERMS** 2.9

Terms used in this Bid which are defined in the General Conditions or Instructions will have the A. meanings indicated in the General Conditions or Instructions.

SUBMITTED on, 20	
Registered Virginia Contractor No	
If Bidder is:	
An Individual	
By	(SEAL)
Doing business as:	
Business address:	
Phone No.:	
A Corporation	
By(Corporation Name)	
(State of Incorporation)	
By	(SEAL)
Title	
(Corporate Seal)	
Attest	_
(Secretary)	
Business address:	
Phone Number:	
BID FORM	PAGE 5 OF CHA PROJECT NO. 06832
\cha-llp.com\proj\ProjectSpecs\068326.000\QA_QC\Division 00 - Front end - Boiler Plate - Bid Documents\004113 Bid Form.docx	SECTION 00411

# A Partnership

Ву	Seal
(Firm Name)	
(General Partner)	
Business address:	
Phone Number:	
Joint Venture	
bint Venturer Name:	(SEAL)
y:	
(Signature of joint venture partner attach evidence of authority to sign) fame: (Typed or Printed)	
(Typed or Printed) Title:	
Business address:	
hone Number:	
oint Venturer Name:	(SEAL)
By:	
Jame:	
(Typed or Printed) itle:	
Business address:	
hone Number:	
there and Fox Number and Address for respirit of official communications.	
hone and Fax Number, and Address for receipt of official communications:	
ID FORM	PAG

(Each joint venturer must sign. The manner of signing for each individual, partnership, and corporation that is a party to the joint venture should be in the manner indicated above.)

END OF SECTION

#### COMMONWEALTH OF VIRGINIA

#### CONTRACTOR'S POLICY OF DRUG-FREE WORKPLACE

Pursuant to Section 2.2-4312 of the Code of Virginia, 1950, as amended, during the performance of this Contract, the Contractor agrees to:

- i. Provide a drug-free workplace for the Contractor's employees;
- ii. Post in conspicuous places, available to employees and applicants for employment, a statement notifying employees that the unlawful manufacture, sale, distribution, dispensation, possession, or use of a controlled substance or marijuana is prohibited in the Contractor's workplace and specifying the actions that will be taken against employees for violations of such prohibition;
- iii. State in all solicitations or advertisements for employees placed by or on behalf of the Contractor that the Contractor maintains a drug-free workplace; and
- iv. Include the provisions of the foregoing clauses in every subcontract or purchase order of over \$10,000, so that the provisions will be binding upon each subcontractor or vendor.

For the purposes of this statement, "drug-free workplace" means a site for the performance of work done in connection with this specific contract awarded to Contractor, the employees who are prohibited from engaging in the unlawful manufacture, sale, distribution, dispensation, possession, or use of any controlled substance or marijuana during the performance of the contract.

Signature of Authorized Agent

Date

#### COMMONWEALTH OF VIRGINIA

#### CONTRACTOR'S POLICY OF NONDISCRIMINATION

Pursuant to Section 2.2-4311 of the Code of Virginia, 1950, as amended, during the performance of this Contract, the Contractor agrees as follows:

- i. The Contractor will not discriminate against any employee or applicant for employment because of race, religion, color, sex, national origin, age, disability, or other basis prohibited by state law relating to discrimination in employment, except where there is a bona fide occupational qualification reasonably necessary to the normal operation of the Contractor. The Contractor agrees to post in conspicuous places, available to employees and applicants for employment, notices setting forth the provisions of this nondiscrimination clause.
- ii. The Contractor, in all solicitations or advertisements for employees placed by or on behalf of the Contractor, will state that such Contractor is an equal opportunity employer.
- iii. Notices, advertisements and solicitations placed in accordance with federal law, rule or regulation shall be deemed sufficient for the purpose of meeting the requirements of this section.

The Contractor will include the provisions of the foregoing paragraphs a, b and c in every subcontract or purchase order of over ten thousand dollars (\$10,000), so that the provisions will be binding upon each subcontractor or vendor.

Signature of Authorized Agent

Date



## **BID BOND**

Any singular reference to Bidder, Surety, Owner or other party shall be considered plural where applicable.

BIDDER (Name and Address):

SURETY (Name, and Address of Principal Place of Business):

OWNER (Name and Address):

BID

Bid Due Date: Description (Project Name – Include Location):

В

BOND			
Bon	d Number:		
Date	2:		
Pena	al sum		\$
	(Words)		(Figures)
Surety ar	nd Bidder, intending to be legally bound hereby,	subject t	o the terms set forth below, do each cause this
Bid Bond	to be duly executed by an authorized officer, a	gent, or re	epresentative.
BIDDER		SURETY	
	(Seal)		(Seal)
Bidder's	Name and Corporate Seal	Surety's	Name and Corporate Seal
By:		_By:	
	Signature		Signature (Attach Power of Attorney)
	Drint Norma	-	Drint Nome
	Print Name		Print Name
	Title	_	Title
Attest:		Attest:	
	Signature		Signature
	Title		Title
Note: Addr	esses are to be used for giving any required notice.		
	ecution by any additional parties, such as joint venturers, ij	f necessarv.	
	, ,		

EJCDC <sup>®</sup> C-430, Bid Bond (Penal Sum Form). Published 2013.
Prepared by the Engineers Joint Contract Documents Committee.
Page 1 of 2



1. Bidder and Surety, jointly and severally, bind themselves, their heirs, executors, administrators, successors, and assigns to pay to Owner upon default of Bidder the penal sum set forth on the face of this Bond. Payment of the penal sum is the extent of Bidder's and Surety's liability. Recovery of such penal sum under the terms of this Bond shall be Owner's sole and exclusive remedy upon default of Bidder.

2. Default of Bidder shall occur upon the failure of Bidder to deliver within the time required by the Bidding Documents (or any extension thereof agreed to in writing by Owner) the executed Agreement required by the Bidding Documents and any performance and payment bonds required by the Bidding Documents.

- 3. This obligation shall be null and void if:
  - 3.1 Owner accepts Bidder's Bid and Bidder delivers within the time required by the Bidding Documents (or any extension thereof agreed to in writing by Owner) the executed Agreement required by the Bidding Documents and any performance and payment bonds required by the Bidding Documents, or
  - 3.2 All Bids are rejected by Owner, or
  - 3.3 Owner fails to issue a Notice of Award to Bidder within the time specified in the Bidding Documents (or any extension thereof agreed to in writing by Bidder and, if applicable, consented to by Surety when required by Paragraph 5 hereof).

4. Payment under this Bond will be due and payable upon default of Bidder and within 30 calendar days after receipt by Bidder and Surety of written notice of default from Owner, which notice will be given with reasonable promptness, identifying this Bond and the Project and including a statement of the amount due.

5. Surety waives notice of any and all defenses based on or arising out of any time extension to issue Notice of Award agreed to in writing by Owner and Bidder, provided that the total time for issuing Notice of Award including extensions shall not in the aggregate exceed 120 days from the Bid due date without Surety's written consent.

6. No suit or action shall be commenced under this Bond prior to 30 calendar days after the notice of default required in Paragraph 4 above is received by Bidder and Surety and in no case later than one year after the Bid due date.

7. Any suit or action under this Bond shall be commenced only in a court of competent jurisdiction located in the state in which the Project is located.

8. Notices required hereunder shall be in writing and sent to Bidder and Surety at their respective addresses shown on the face of this Bond. Such notices may be sent by personal delivery, commercial courier, or by United States Registered or Certified Mail, return receipt requested, postage pre-paid, and shall be deemed to be effective upon receipt by the party concerned.

9. Surety shall cause to be attached to this Bond a current and effective Power of Attorney evidencing the authority of the officer, agent, or representative who executed this Bond on behalf of Surety to execute, seal, and deliver such Bond and bind the Surety thereby.

10. This Bond is intended to conform to all applicable statutory requirements. Any applicable requirement of any applicable statute that has been omitted from this Bond shall be deemed to be included herein as if set forth at length. If any provision of this Bond conflicts with any applicable statute, then the provision of said statute shall govern and the remainder of this Bond that is not in conflict therewith shall continue in full force and effect.

11. The term "Bid" as used herein includes a Bid, offer, or proposal as applicable.

EJCDC <sup>®</sup> C-430, Bid Bond (Penal Sum Form). Published 2013.	
Prepared by the Engineers Joint Contract Documents Committee.	
Page 2 of 2	
	_

# **QUALIFICATIONS STATEMENT**

# THE INFORMATION SUPPLIED IN THIS DOCUMENT IS CONFIDENTIAL TO THE EXTENT PERMITTED BY LAWS AND REGULATIONS

1.	SUBMITTED BY:	
	Official Name of Firm:	
	Address:	
2.	SUBMITTED TO:	
3.	SUBMITTED FOR:	
	Owner:	
	Project Name:	
	-	
	TYPE OF WORK:	
	TITL OF WORK.	
4.	CONTRACTOR'S CONTACT INF	ORMATION
	Contact Person:	
	Title:	
	Phone:	
	Email:	

EJCDC<sup>°</sup> C-451, Qualifications Statement. Copyright © 2013 National Society of Professional Engineers, American Council of Engineering Companies, and American Society of Civil Engineers. All rights reserved.

Page 1 of 8

## 5. AFFILIATED COMPANIES:

Name:

Address:

## 6. TYPE OF ORGANIZATION:

|--|

Name of Owner:

Doing Business As:

Date of Organization:

PARTNERSHIP

Date of Organization:

Type of Partnership:

Name of General Partner(s):

**CORPORATION** 

State of Organization:

Date of Organization:

**Executive Officers:** 

- President:

- Vice President(s):

- Treasurer:

- Secretary:

EJCDC<sup>®</sup> C-451, Qualifications Statement.

Copyright © 2013 National Society of Professional Engineers, American Council of Engineering Companies,

and American Society of Civil Engineers. All rights reserved.

Page 2 of 8

LIMITED LIABILITY COMPANY	
State of Organization:	
Date of Organization:	
Members:	
JOINT VENTURE	
Sate of Organization:	
Date of Organization:	
Form of Organization:	
Joint Venture Managing Partner	
- Name:	
- Address:	
Joint Venture Managing Partner	
- Name:	
- Address:	
Joint Venture Managing Partner	
- Name:	
- Address:	
	Qualifications Statement. al Engineers, American Council of Engineering Companies,

and American Society of Civil Engineers. All rights reserved. Page 3 of 8

# 7. LICENSING

8.

9.

Jurisdiction:			
Type of License:			
License Number:			
Jurisdiction:			
Type of License:			
License Number:			
CERTIFICATIONS		CERTIFIED BY:	
Disadvantage Business Ente	erprise:		
Minority Business Enterpris	se:		
Woman Owned Enterprise:	:		
Small Business Enterprise:			
Other (	):		
BONDING INFORMATION			
Bonding Company:			
Address:			
-			
Bonding Agent:			
Address:			
-			
-			
Contact Name:			
Phone:			
Aggregate Bonding Capacit	y:		
Available Bonding Capacity as of date of this submittal:			
EJCDC <sup>®</sup> C-451, Qualifications Statement. Copyright © 2013 National Society of Professional Engineers, American Council of Engineering Companies, and American Society of Civil Engineers. All rights reserved. Page 4 of 8			

#### 10. FINANCIAL INFORMATION

Financial Institution:	
Address:	
Account Manager:	
Phone:	

INCLUDE AS AN ATTACHMENT AN AUDITED BALANCE SHEET FOR EACH OF THE LAST 3 YEARS

#### 11. CONSTRUCTION EXPERIENCE:

**Current Experience:** 

List on **Schedule A** all uncompleted projects currently under contract (If Joint Venture list each participant's projects separately).

Previous Experience:

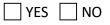
List on **Schedule B** all projects completed within the last 5 Years (If Joint Venture list each participant's projects separately).

Has firm listed in Section 1 ever failed to complete a construction contract awarded to it?

YES NO

If YES, attach as an Attachment details including Project Owner's contact information.

Has any Corporate Officer, Partner, Joint Venture participant or Proprietor ever failed to complete a construction contract awarded to them in their name or when acting as a principal of another entity?



If YES, attach as an Attachment details including Project Owner's contact information.

Are there any judgments, claims, disputes or litigation pending or outstanding involving the firm listed in Section 1 or any of its officers (or any of its partners if a partnership or any of the individual entities if a joint venture)?



If YES, attach as an Attachment details including Project Owner's contact information.

EJCDC <sup>®</sup> C-451, Qualifications Statement.			
Copyright © 2013 National Society of Professional Engineers, American Council of Engineering Companies,			
and American Society of Civil Engineers. All rights reserved.			

Page 5 of 8

### 12. SAFETY PROGRAM:

Name of Contractor's Safety Officer:

Include the following as attachments:

Provide as an Attachment Contractor's (and Contractor's proposed Subcontractors and Suppliers furnishing or performing Work having a value in excess of 10 percent of the total amount of the Bid) <u>OSHA No. 500- Log & Summary of Occupational Injuries & Illnesses</u> for the past 5 years.

Provide as an Attachment Contractor's (and Contractor's proposed Subcontractors and Suppliers furnishing or performing Work having a value in excess of 10 percent of the total amount of the Bid) list of all OSHA Citations & Notifications of Penalty (monetary or other) received within the last 5 years (indicate disposition as applicable) - <u>IF NONE SO STATE.</u>

Provide as an Attachment Contractor's (and Contractor's proposed Subcontractors and Suppliers furnishing or performing Work having a value in excess of 10 percent of the total amount of the Bid) list of all safety citations or violations under any state all received within the last 5 years (indicate disposition as applicable) - <u>IF NONE SO STATE.</u>

Provide the following for the firm listed in Section V (and for each proposed Subcontractor furnishing or performing Work having a value in excess of 10 percent of the total amount of the Bid) the following (attach additional sheets as necessary):

Workers' compensation Experience Modification Rate (EMR) for the last 5 years:

YEAR	 EMR	
YEAR	EMR	
YEAR	 EMR	
YEAR	EMR	
YEAR	EMR	

Total Recordable Frequency Rate (TRFR) for the last 5 years:

YEAR	 TRFR	
YEAR	 TRFR	

Page 6 of 8

Total number of man-hours worked for the last 5 Years:

YEAR	TOTAL NUMBER OF MAN-HOURS	
YEAR	TOTAL NUMBER OF MAN-HOURS	
YEAR	TOTAL NUMBER OF MAN-HOURS	
YEAR	TOTAL NUMBER OF MAN-HOURS	
YEAR	TOTAL NUMBER OF MAN-HOURS	

Provide Contractor's (and Contractor's proposed Subcontractors and Suppliers furnishing or performing Work having a value in excess of 10 percent of the total amount of the Bid) Days Away From Work, Days of Restricted Work Activity or Job Transfer (DART) incidence rate for the particular industry or type of Work to be performed by Contractor and each of Contractor's proposed Subcontractors and Suppliers) for the last 5 years:

YEAR	DART	
YEAR	DART	
YEAR	DART	
YEAR	DART	
YEAR	 DART	

#### 13. EQUIPMENT:

MAJOR EQUIPMENT:

List on **Schedule C** all pieces of major equipment available for use on Owner's Project.

I HEREBY CERTIFY THAT THE INFORMATION SUBMITTED HEREWITH, INCLUDING ANY ATTACHMENTS, IS TRUE TO THE BEST OF MY KNOWLEDGE AND BELIEF.

NAME OF ORGANIZATION:	
BY:	
TITLE:	
DATED:	
NOTARY ATTEST:	
SUBSCRIBED AND SWORN TO BEFORE ME	
THIS DAY OF, 20	
NOTARY PUBLIC - STATE OF	-
MY COMMISSION EXPIRES:	-
REQUIRED ATTACHMENTS	

- 1. Schedule A (Current Experience).
- 2. Schedule B (Previous Experience).
- 3. Schedule C (Major Equipment).
- 4. Audited balance sheet for each of the last 3 years for firm named in Section 1.
- 5. Evidence of authority for individuals listed in Section 7 to bind organization to an agreement.
- 6. Resumes of officers and key individuals (including Safety Officer) of firm named in Section 1.
- 7. Required safety program submittals listed in Section 13.
- 8. Additional items as pertinent.

SCHEDULE A

#### CURRENT EXPERIENCE

Project Name	Owner's Contact Person	Design Engineer	Contract Date	Type of Work	Status	Cost of Work
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				

#### SCHEDULE B

PREVIOUS EXPERIENCE (Include ALL Projects Completed within last 5 years)

Project Name	Owner's Contact Person	Design Engineer	Contract Date	Type of Work	Status	Cost of Work
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				
	Name:	Name:				
	Address:	Company:				
	Telephone:	Telephone:				

#### SCHEDULE B

#### PREVIOUS EXPERIENCE (Include ALL Projects Completed within last 5 years)

Project Name	Owner's Contact Person	Design Engineer	Contract Date	Type of Work	Status	Cost of Work
	Name: Address: Telephone:	Name: Company: Telephone:				
	Name: Address: Telephone:	Name: Company: Telephone:				
	Name: Address: Telephone:	Name: Company: Telephone:				
	Name: Address: Telephone:	Name: Company: Telephone:				
	Name: Address: Telephone:	Name: Company: Telephone:				
	Name: Address: Telephone:	Name: Company: Telephone:				
	Name: Address: Telephone:	Name: Company: Telephone:				

## SCHEDULE C - LIST OF MAJOR EQUIPMENT AVAILABLE

ITEM	PURCHASE DATE	CONDITION	ACQUIRED VALUE



# NOTICE OF AWARD

Date of Issuance:

Owner:

Engineer:

Project:

Bidder:

Bidder's Address:

TO BIDDER:

Owner's Contract No.: Engineer's Project No.: Contract Name:

You are notified that Owner has accepted your Bid dated [\_\_\_\_\_\_] for the above Contract, and that you are the Successful Bidder and are awarded a Contract for:

[describe Work, alternates, or sections of Work awarded]

The Contract Price of the awarded Contract is: \$\_\_\_\_\_[note if subject to unit prices, or cost-plus]

[ ] unexecuted counterparts of the Agreement accompany this Notice of Award, and one copy of the Contract Documents accompanies this Notice of Award, or has been transmitted or made available to Bidder electronically. *[revise if multiple copies accompany the Notice of Award]* 

a set of the Drawings will be delivered separately from the other Contract Documents.

You must comply with the following conditions precedent within 15 days of the date of receipt of this Notice of Award:

- 1. Deliver to Owner [\_\_\_\_]counterparts of the Agreement, fully executed by Bidder.
- 2. Deliver with the executed Agreement(s) the Contract security [e.g., performance and payment bonds] and insurance documentation as specified in the Instructions to Bidders and General Conditions, Articles 2 and 6.
- 3. Other conditions precedent (if any):

Failure to comply with these conditions within the time specified will entitle Owner to consider you in default, annul this Notice of Award, and declare your Bid security forfeited.

Within ten days after you comply with the above conditions, Owner will return to you one fully executed counterpart of the Agreement, together with any additional copies of the Contract Documents as indicated in Paragraph 2.02 of the General Conditions.

Owner:

Authorized Signature

By:

Title:

Copy: Engineer

#### POCAHONTAS COMMUNITY IMPROVEMENT SERVICES CONTRACT

This contract, ("Contract") dated this \_\_\_\_\_day of \_\_\_\_\_\_, 2023 between Sussex County, Virginia ("County" or "Owner") and \_\_\_\_\_\_("Contractor").

#### **RECITALS**

**WHEREAS**, the County issued an Invitation to Bid #\_\_\_\_\_ dated \_\_\_\_\_, 2023, for qualified bidders to provide clearing and re-grading of an existing drainage channel from Higgins Street to King Street to provide positive drainage and armoring areas of erosion potential as well as the installation of four fire hydrants, one at the corner of Knight Street and Railroad Avenue and the other at the intersection of Twilight Street and Knight Street (the "Work"); and

WHEREAS, Contractor was deemed the lowest responsive and responsible bidder; and

**WHEREAS**, the County determined to award this Contract to Contractor and the parties wish to enter into this Contract to define their respective rights and obligations.

#### **WITNESSETH**

**THEREFORE**, in consideration of the Recitals set forth above and good and valuable consideration as set forth below, the parties agree as follows:

- 1. Scope of Services. Contractor shall complete all Work as specified or indicated in the Contract Documents. This project is generally described as the Town of Wakefield Pocahontas Community Improvement Project.
- 2. Contract Price. The County agrees to pay Contractor an amount not to exceed \_\_\_\_\_\_\_ for completion of Work.
- **3. Period of Contract.** The Work will be substantially completed in accordance with Paragraph 15.03 of the General Conditions within **90** calendar days after the date when Contract Time commences to run, and that all Work will be completed and ready for Final Payment in accordance with Paragraph 15.06 of the General Conditions within **120** calendar days after the date when the Contract Time commences to run.

**Liquidated Damages.** Owner and Contractor recognize that time is of the essence of this Agreement and that Owner will suffer financial loss if the Work is not completed within the times specified in Paragraph 3 above, plus any extensions thereof allowed in accordance with Article 11 of the General Conditions. They also recognize the delays, expense, and difficulties involved in proving the actual loss suffered by Owner if the Work is not completed on time. Accordingly, instead of requiring any such proof, Owner and Contractor agree that as liquidated damages for delay (but not as a penalty), Contractor shall pay Owner two hundred and fifty dollars (\$250.00) for each day that expires after the time specified in Paragraph 3 (above) for Substantial Completion until the Work is substantially complete. After Substantial Completion, if Contractor shall neglect, refuse or fail to complete the remaining Work within the time specified in Paragraph 3 for completion and readiness for final payment or any proper extension thereof granted by Owner, Contractor shall pay Owner five hundred dollars (\$500.00) for each day that expires after the time specified in Paragraph 3 for completion and readiness for final payment.

4. Insurance and Licensure. Insurance shall be provided as set out in Exhibit \_\_\_\_\_.

- **5. Independent Contractor.** The Contractor is an independent Contractor and nothing contained in the contract shall constitute or designate the Contractor or any of its agents or employees as employees of the County.
- 6. Hold Harmless. Contractor agrees to indemnify and hold harmless the County, its agents and employees from any and all claims, actions, lawsuits, damages, judgments, or liabilities of any kind whatsoever arising out of the services conducted by Contractor. County shall promptly notify Contractor of any incident, claim, or lawsuit of which County becomes aware and shall fully cooperate in the defense of such claim.
- 7. Contract Documents. This Contract shall consist of the following Contract Documents, listed in order of precedence from first to last:
  - A. This Contract between the County and Contractor;
  - B. The IFB;
  - C. Specifications bearing the title "Town of Wakefield Pocahontas Community Improvement Project," as listed in table of contents thereof.
  - D. Drawings bearing the following general title: "Town of Wakefield Community Improvement Project."
  - E. The Contractor's Bid;
  - F. Addenda numbers \_\_\_\_\_ to \_\_\_\_, inclusive;
  - G. Documentation submitted by Contractor prior to Notice of Award;
  - H. General Conditions.
  - I. Supplementary Conditions;
  - J. Certificate of Insurance;
  - K. Performance and Payment Bonds; and
  - L. Notice to Proceed.

The Contract Documents may only be amended, modified, or supplemented as provided in Paragraph 11.01 of the General Conditions.

**8.** Engineer. The Project has been designed by CHA Consulting, Inc. of Blacksburg, Virginia, who is hereinafter called Engineer and who is to act as Owner's representative, assume all duties and responsibilities, and have the rights and authority assigned to Engineer in the Contract Documents in connection with completion of the Work in accordance with the Contract Documents.

#### 9. Payment Procedures

- A. Contractor shall submit Applications for Payment in accordance with Article 15 of the General Conditions. Applications for Payment will be processed by Engineer as provided in the General Conditions.
- 1. **Progress Payments; Retainage.** Owner shall make progress payments on account of the Contract Price on the basis of Contractor's Applications for Payment as recommended by Engineer, on or about the 25th day of each month during construction as provided in Paragraphs a. and b. below. All such payments will be measured by the schedule of values established in Paragraph 2.03 of the General Conditions (and in the case of Unit Price Work based on the number of units completed) or, in the event there is no schedule of values, as provided in the General Requirements.
  - a. Prior to Substantial Completion, progress payments will be made in an amount equal to the percentage indicated below, but, in each case, less the aggregate of payments previously made and less such amounts as Engineer shall determine, or Owner may withhold, in accordance with Paragraph 15.01 of the General Conditions.
    - i. 95 percent of Work completed (with the balance being retainage).
    - ii. 95% (with the balance being retainage) of materials and equipment not incorporated in the Work (but delivered, suitably stored and accompanied by

documentation satisfactory to Owner as provided in Paragraph 15.01 of the General Conditions).

- b. Where portions of the Contract price are to be retained, the Contractor shall have an option to use an escrow account procedure for utilization of project retainage.
  - i. In the event the Contractor elects to use the escrow account procedure, an "Escrow Contract" form shall be submitted to the Owner for approval within fifteen (15) calendar days after notification.
  - ii. In order to have retained funds paid to an Escrow Agent, the Contractor, the Escrow Agent, and the Surety shall execute the "Escrow Contract" form. The Contractor's Escrow Agent shall be a trust company, bank or savings institution with its principal office located in the Commonwealth of Virginia. The "Escrow Contract" and all regulations promulgated by the Owner shall be substantially the same as that used by the Virginia Department of Transportation.
- 2. Final Payment. Upon final completion and acceptance of the Work in accordance with Paragraph 15.06 of the General Conditions, Owner shall pay the remainder of the Contract Price as recommended by Engineer as provided in said Paragraph (15.06).

#### 10. Contractor's Representations

A. In order to induce Owner to enter into this Contract, Contractor makes the following representations:

- 1. Contractor has thoroughly examined and carefully studied the Contract Documents and the other related data identified in the Bidding Documents including "technical data."
- 2. Contractor has visited the site(s) and become familiar with and is satisfied as to the general, local, and site conditions that may affect cost, progress, performance, or furnishing of the Work.
- 3. Contractor is familiar with and is satisfied as to all federal, state, and local laws and regulations that may affect cost, progress, performance, and furnishing of the Work.
- 4. Contractor has carefully studied all: (1) reports of explorations and tests of subsurface conditions at or adjacent to the Site and all drawings of physical conditions relating to existing surface or subsurface structures at the Site that have been identified in the Supplementary Conditions, especially with respect to Technical Data in such reports and drawings, and (2) reports and drawings relating to Hazardous Environmental Conditions, if any, at or adjacent to the Site that have been identified in the Supplementary Conditions, especially with respect to Technical Data in such reports and drawings relating to Hazardous Environmental Conditions, especially with respect to Technical Data in such reports and drawings
- 5. Contractor is aware of the general nature of the Work to be performed by the Owner and others at the site that relates to the Work as indicated in the Contract Documents.
- 6. Contractor acknowledges that Owner and Engineer do not assume responsibility for the accuracy or completeness of information and data shown or indicated in the Contract Documents with respect to Underground Facilities at or contiguous to the site.
- 7. Contractor has obtained and carefully studied (or assumes responsibility for having done so) all such additional supplementary examinations, investigations, explorations, tests, studies, and data concerning conditions (surface, subsurface, and Underground Facilities) at or contiguous to the site or otherwise, which may affect cost, progress, performance, or furnishing of the Work or which relate to any aspect of the means, methods, techniques, sequences and procedures of construction to be employed by Contractor and safety precautions and programs incident thereto.
- 8. Contractor does not consider that any additional examinations, investigations, explorations, tests, studies, or data are necessary for the performance and furnishing of the Work at the Contract Price within the Contract Times and in accordance with the other terms and conditions of the Contract Documents.
- 9. Contractor has correlated the information known to Contractor, information and observations obtained from visits to the site(s), reports and drawings identified in the Contract Documents and all additional examinations, investigations, explorations, tests, studies, and data with the Contract

Documents.

- 10. Contractor has given Engineer written notice of all conflicts, errors, ambiguities, or discrepancies in the Contract Documents and the written resolution thereof by Engineer through issued addendum or addenda is acceptable to Contractor, and the Contract Documents are generally sufficient to indicate and convey understanding of all terms and conditions for performance and furnishing of the Work. When said conflicts, etc., have not been resolved through interpretation or clarification by Engineer, because of insufficient time or otherwise, Contractor has included in the Bid the greater quantity or better quality of Work, or compliance with the more stringent requirement resulting in a greater cost; and said greater cost is included in the Contract Price.
- 11. The Contract Documents are generally sufficient to indicate and convey understanding of all terms and conditions for performance and furnishing of the Work.
- 12. Contractor's entry into this Contract constitutes an incontrovertible representation by Contractor that without exception all prices in the Contract are premised upon performing and furnishing the Work required by the Contract Documents.

#### 11. Termination.

<u>Termination for Convenience</u>. Any resultant contract may be terminated, without cause and without prejudice to any other right or remedy of County, whenever the County determines that such a termination is in its best interests upon thirty (30) days prior written notice. The Contractor shall be paid for all goods delivered or services successfully completed prior to the termination date.

Contractor shall not be paid on account of loss of anticipated overhead, profits, or revenue, or other economic loss arising out of or resulting from such termination.

#### Termination by County for Cause.

- 1. If the Contractor should be adjudged as bankrupt, or if he should make a general assignment for the benefit of his creditors, or if a receiver should be appointed on account of his insolvency, the County may terminate the contract. If the Contractor violates any provisions of the Virginia Governmental Fraud Act, fails to obtain a required bond or to obtain and maintain the required insurance, or fails to perform or otherwise comply with the terms of the Contract Documents, the County may terminate the contract. If the Contractor should persistently or repeatedly refuse or should fail to perform the Work in accordance with Contract Documents, except in cases for which extension of time is provided, or to supply enough properly skilled workmen or proper materials, or if he should fail to make prompt payment to subcontractors or suppliers of material or labor, or persistently disregards laws, ordinances, or the written instructions of the County, or otherwise be guilty of a substantial violation of any provision of the contract then the County may terminate the contract.
- 2. Prior to termination of the contract, the County shall give the Contractor and his surety, if applicable, ten (10) calendar days written notice, during which the Contractor and/or his surety may rectify the cause of the termination. If rectified to the satisfaction of the County within said ten (10) days, the County may rescind his notice of termination. If it does not, the termination for cause shall become effective at the end of the ten-day 10) notice period. In the alternative, the County may postpone the effective date of the termination notice, at its sole discretion, if it should receive reassurances from the Contractor and/or its surety that the cause of termination will be remedied in a time and manner which the County finds acceptable. If at any time more than ten (10) days after the notice of termination, the County determines that Contractor and/or its surety has not or is not likely to rectify the causes of terminate the contract for cause by giving written notice to the Contractor and its surety. In no event shall termination for cause terminate the obligations of the Contractor by Owner will not release Contractor from liability.

- 3. Notice of terminations, whether initial or given after a period of postponement, may be served upon the Contractor and the surety by mail or any other means at their last known places of business in Virginia or elsewhere, by delivery to any officer or management/supervisory employee of either wherever they may be found, or, if no such officer, employee or place of business is known or can be found by reasonable inquiry within three (3) days, by posting the notice at the job site. Failure to accept or pick up registered or certified mail addressed to the last known address shall be deemed to be delivery.
- 4. Upon such termination of the contract, the Contractor shall immediately cease work and shall immediately deliver to the County any and all materials and/or information kept on file, created or obtained on behalf of the County. County shall complete the work by whatever method it may deem expedient. In such case the Contractor shall not be entitled to receive any further payment. If the expense of finishing the work, including compensation for additional managerial and administrative services shall exceed the unpaid balance of the contract price, the Contractor shall pay the difference to the County, together with any other expenses of terminating the contract and having it completed by others.
- 5. If it should be judicially determined that the County improperly terminated this contract for cause, then the termination shall be deemed to be termination for the convenience of the County.
- 6. Termination of the contract under this section is without prejudice to any other right or remedy of the County.
- <u>Termination Notices</u>: Written notice for termination for convenience, or termination for cause, shall be provided to:

Richard Douglas	[insert name]
County Administrator	[insert title]
P.O. 1397	[insert address]
Sussex, VA 23884	
rdouglas@sussexcounttyva.gov	[insert email]

- 12. Non-discrimination. During the performance of this Contract, Contractor agrees that it will not discriminate against any employee or applicant for employment because of race, religion, color, sex, or natural origin except where religion, sex, or natural origin is a bona fide occupational qualification reasonably necessary for the normal operation of the employer. Contractor agrees to post in conspicuous places available to employees and applicants for employment notices setting forth the provisions of this non-discrimination clause. Contractor in all solicitations or advertisements for employees placed by or on behalf of it will state that it is an equal opportunity employer. Contractor will include the provisions of this paragraph in every sub-contract or purchase order of over \$10,000.00 so that the provisions will be binding upon each sub-contractor or vendor. The County does not discriminate against faith-based organizations.
- **13. Drug-free Workplace.** During the performance of this contract, Contractor agrees to (i) provide a drug-free workplace for its employees; (ii) post in conspicuous places, available to employees and applicants for employment, a statement notifying employees that the unlawful manufacture, sale, distribution, dispensation, possession, or use of a controlled substance or marijuana is prohibited in the workplace and specifying the actions that will be taken against employees for violations of such prohibition; (iii) state in all solicitations or advertisements for employees that he maintains a drug-free workplace; and (iv) include the provisions of the foregoing clauses in every subcontract or purchase order of over \$10,000, so that the provisions will be binding upon each subcontractor or vendor. For the purposes of this section, "drug-free workplace" means a site for the performance of work done in connection with a specific contract awarded to an independent contractor in accordance with this

chapter, the employees of whom are prohibited from engaging in the unlawful manufacture, sale, distribution, dispensation, possession or use of any controlled substance or marijuana during the performance of the contract.

- **14.** Contractual Disputes. Disputes and claims arising under the resulting contract shall be processed pursuant to the Code of Virginia 2.2-4363.
- **15. Enforcement.** This Contract shall be governed by the laws of the Commonwealth of Virginia. Any action maintained by either party for the enforcement or interpretation of the terms of this Contract shall be filed in the Sussex County Circuit Court, Virginia.

Each of the parties irrevocably waive trial by jury in any action, proceeding, or counterclaim, whether at law or in equity, brought by either party for any claim, demand, action, or cause of action, arising out of this Agreement. Each of the parties hereby agrees and consents that any such claim, demand, action, or cause of action shall be decided by court trial without a jury.

- **16.** No Assignment. No assignment by a party hereto of any rights under or interests in the Contract Documents will be binding on another party hereto without the written consent of the party sought to be bound; and, specifically but without limitation, moneys that may become due and moneys that are due may not be assigned without such consent (except to the extent that the effect of this restriction may be limited by law), and unless specifically stated to the contrary in any written consent to an assignment, no assignment will release or discharge the assignor from any duty or responsibility under the Contract Documents.
- **17. Counterparts; Electronic Signatures.** The resulting Contract may be executed simultaneously in any number of counterparts, each of which may be deemed to be an original, and all of which may constitute but one and the same instrument. A signed copy of the Contract delivered by facsimile, e-mail/PDF or other means of electronic transmission may be deemed to have the same legal effect as delivery of an original signed copy of the Contract. Owner and Contractor have signed this Agreement in triplicate. One counterpart each has been delivered to Owner, Contractor, and Engineer. All portions of the Contract Documents have been signed, initialed, or identified by Owner and Contractor or identified by Engineer on their behalf.

**IN WITNESS WHEREOF,** the undersigned parties hereto have made and executed this Contract to commence on the date noted above.

CON	NTRACTOR:		COUNTY OF SUSSEX, VIRGINIA:		
By:			By: _	Distant Davida	
•	[insert name]	Date	•	Richard Douglas	Date
	[insert title]			County Administrator	
Lice	nse No.:			_	
Age	nt for Service of Process:				
Fede	eral Employer Identification Number:				

NOTE: If Contractor is a corporation, attach evidence of authority to sign.



	NOTICE TO PROCEED	
Owner:	Owner's Contract No.:	
Contractor:	Contractor's Project No.:	
Engineer:	Engineer's Project No .:	
Project:	Contract Name:	
	Effective Date of Contract:	

# TO CONTRACTOR:

Owner hereby notifies Contractor that the Contract Times under the above Contract will commence to run on , 20\_\_\_\_\_, 20\_\_\_\_\_, 20\_\_\_\_\_, 20\_\_\_\_, 20\_\_\_, 20\_\_\_\_, 20\_\_\_\_, 20\_\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_\_, 20\_\_\_\_, 20\_\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_\_, 20\_\_\_\_, 20\_\_\_, 20\_\_\_, 20\_\_\_\_, 20\_\_\_\_, 20\_\_\_,

On that date, Contractor shall start performing its obligations	s under the Contract Documents. No Work shall be
done at the Site prior to such date. In accordance with the	Agreement, [the date of Substantial Completion is
, and the date of readiness for	final payment is] or [the
number of days to achieve Substantial Completion is	, and the number of days to
achieve readiness for final payment is	_].

Before starting any Work at the Site, Contractor must comply with the following: [Note any access limitations, security procedures, or other restrictions]

Owner:

Authorized	Signature
Authonizeu	Signature

By:

Title: Date Issued:

Copy: Engineer



# **PERFORMANCE BOND**

CONTRACTOR (name and address):

SURETY (name and address of principal place of business):

OWNER (name and address):

	CONSTRU	JCTION	CONTRACT
--	---------	--------	----------

Effective Date of the Agreement:
Amount:
Description (name and location):

#### BOND

Bond Number:
Date (not earlier than the Effective Date of the Agreement of the Construction Contract):
Amount:
Modifications to this Bond Form: 🗌 None 📄 See Paragraph 16

Surety and Contractor, intending to be legally bound hereby, subject to the terms set forth below, do each cause this Performance Bond to be duly executed by an authorized officer, agent, or representative.

#### **CONTRACTOR AS PRINCIPAL**

#### SURETY

(seal)	(seal)
Contractor's Name and Corporate Seal	Surety's Name and Corporate Seal
Ву:	Ву:
Signature	Signature (attach power of attorney)
Print Name	Print Name
Title	Title
Attest:	Attest:
Signature	Signature
Title	Title

Notes: (1) Provide supplemental execution by any additional parties, such as joint venturers. (2) Any singular reference to Contractor, Surety, Owner, or other party shall be considered plural where applicable.

EJCDC® C-610, Performance Bond Copyright © 2013 National Society of Professional Engineers, American Council of Engineering Companies, and American Society of Civil Engineers. All rights reserved. 1 of 3 1. The Contractor and Surety, jointly and severally, bind themselves, their heirs, executors, administrators, successors, and assigns to the Owner for the performance of the Construction Contract, which is incorporated herein by reference.

2. If the Contractor performs the Construction Contract, the Surety and the Contractor shall have no obligation under this Bond, except when applicable to participate in a conference as provided in Paragraph 3.

3. If there is no Owner Default under the Construction Contract, the Surety's obligation under this Bond shall arise after:

3.1 The Owner first provides notice to the Contractor and the Surety that the Owner is considering declaring a Contractor Default. Such notice shall indicate whether the Owner is requesting a conference among the Owner, Contractor, and Surety to discuss the Contractor's performance. If the Owner does not request a conference, the Surety may, within five (5) business days after receipt of the Owner's notice, request such a conference. If the Surety timely requests a conference, the Owner shall attend. Unless the Owner agrees otherwise, any conference requested under this Paragraph 3.1 shall be held within ten (10) business days of the Surety's receipt of the Owner's notice. If the Owner, the Contractor, and the Surety agree, the Contractor shall be allowed a reasonable time to perform the Construction Contract, but such an agreement shall not waive the Owner's right, if any, subsequently to declare a Contractor Default;

3.2 The Owner declares a Contractor Default, terminates the Construction Contract and notifies the Surety; and

3.3 The Owner has agreed to pay the Balance of the Contract Price in accordance with the terms of the Construction Contract to the Surety or to a contractor selected to perform the Construction Contract.

4. Failure on the part of the Owner to comply with the notice requirement in Paragraph 3.1 shall not constitute a failure to comply with a condition precedent to the Surety's obligations, or release the Surety from its obligations, except to the extent the Surety demonstrates actual prejudice.

5. When the Owner has satisfied the conditions of Paragraph 3, the Surety shall promptly and at the Surety's expense take one of the following actions:

5.1 Arrange for the Contractor, with the consent of the Owner, to perform and complete the Construction Contract;

5.2 Undertake to perform and complete the Construction Contract itself, through its agents or independent contractors;

5.3 Obtain bids or negotiated proposals from qualified contractors acceptable to the Owner for a contract for performance and completion of the Construction Contract, arrange for a contract to be prepared for execution by the Owner and a contractor selected with the Owners concurrence,

to be secured with performance and payment bonds executed by a qualified surety equivalent to the bonds issued on the Construction Contract, and pay to the Owner the amount of damages as described in Paragraph 7 in excess of the Balance of the Contract Price incurred by the Owner as a result of the Contractor Default; or

5.4 Waive its right to perform and complete, arrange for completion, or obtain a new contractor, and with reasonable promptness under the circumstances:

5.4.1 After investigation, determine the amount for which it may be liable to the Owner and, as soon as practicable after the amount is determined, make payment to the Owner; or

5.4.2 Deny liability in whole or in part and notify the Owner, citing the reasons for denial.

6. If the Surety does not proceed as provided in Paragraph 5 with reasonable promptness, the Surety shall be deemed to be in default on this Bond seven days after receipt of an additional written notice from the Owner to the Surety demanding that the Surety perform its obligations under this Bond, and the Owner shall be entitled to enforce any remedy available to the Owner. If the Surety proceeds as provided in Paragraph 5.4, and the Owner refuses the payment or the Surety has denied liability, in whole or in part, without further notice the Owner shall be entitled to enforce any remedy available to the Owner.

7. If the Surety elects to act under Paragraph 5.1, 5.2, or 5.3, then the responsibilities of the Surety to the Owner shall not be greater than those of the Contractor under the Construction Contract, and the responsibilities of the Owner to the Surety shall not be greater than those of the Owner under the Construction Contract. Subject to the commitment by the Owner to pay the Balance of the Contract Price, the Surety is obligated, without duplication for:

7.1 the responsibilities of the Contractor for correction of defective work and completion of the Construction Contract;

7.2 additional legal, design professional, and delay costs resulting from the Contractor's Default, and resulting from the actions or failure to act of the Surety under Paragraph 5; and

7.3 liquidated damages, or if no liquidated damages are specified in the Construction Contract, actual damages caused by delayed performance or non-performance of the Contractor.

8. If the Surety elects to act under Paragraph 5.1, 5.3, or 5.4, the Surety's liability is limited to the amount of this Bond.

9. The Surety shall not be liable to the Owner or others for obligations of the Contractor that are unrelated to the Construction Contract, and the Balance of the Contract Price shall not be reduced or set off on account of any such unrelated obligations. No right of action shall accrue on this Bond to any person or entity other than the Owner or its heirs, executors, administrators, successors, and assigns.

10. The Surety hereby waives notice of any change, including changes of time, to the Construction Contract or to related subcontracts, purchase orders, and other obligations.

11. Any proceeding, legal or equitable, under this Bond may be instituted in any court of competent jurisdiction in the location in which the work or part of the work is located and shall be instituted within two years after a declaration of Contractor Default or within two years after the Contractor ceased working or within two years after the Surety refuses or fails to perform its obligations under this Bond, whichever occurs first. If the provisions of this paragraph are void or prohibited by law, the minimum periods of limitations available to sureties as a defense in the jurisdiction of the suit shall be applicable.

12. Notice to the Surety, the Owner, or the Contractor shall be mailed or delivered to the address shown on the page on which their signature appears.

13. When this Bond has been furnished to comply with a statutory or other legal requirement in the location where the construction was to be performed, any provision in this Bond conflicting with said statutory or legal requirement shall be deemed deleted herefrom and provisions conforming to such statutory or other legal requirement shall be deemed incorporated herein. When so furnished, the intent is that this Bond shall be construed as a statutory bond and not as a common law bond.

#### 14. Definitions

14.1 Balance of the Contract Price: The total amount payable by the Owner to the Contractor under the Construction Contract after all proper adjustments have been made including allowance for the Contractor for any amounts received or to be received by the Owner in settlement of insurance or other claims for damages to which the Contractor is entitled, reduced by all valid and proper payments made to or on behalf of the Contractor under the Construction Contract.

14.2 Construction Contract: The agreement between the Owner and Contractor identified on the cover page, including all Contract Documents and changes made to the agreement and the Contract Documents.

14.3 Contractor Default: Failure of the Contractor, which has not been remedied or waived, to perform or otherwise to comply with a material term of the Construction Contract.

14.4 Owner Default: Failure of the Owner, which has not been remedied or waived, to pay the Contractor as required under the Construction Contract or to perform and complete or comply with the other material terms of the Construction Contract.

14.5 Contract Documents: All the documents that comprise the agreement between the Owner and Contractor.

15. If this Bond is issued for an agreement between a contractor and subcontractor, the term Contractor in this Bond shall be deemed to be Subcontractor and the term Owner shall be deemed to be Contractor.

16. Modifications to this Bond are as follows:



# **PAYMENT BOND**

CONTRACTOR (name and address):

SURETY (name and address of principal place of business):

OWNER (name and address):

CONSTRUCTION CONTRACT Effective Date of the Agreement: Amount: Description (name and location):
BOND
Bond Number:
Date (not earlier than the Effective Date of the Agreement of the Construction Contract): Amount: Modifications to this Bond Form: None See Paragraph 18

Surety and Contractor, intending to be legally bound hereby, subject to the terms set forth below, do each cause this Payment Bond to be duly executed by an authorized officer, agent, or representative.

CONTRACTOR AS PRINCIPAL	SURETY
(seal,	)(seal)
Contractor's Name and Corporate Seal	Surety's Name and Corporate Seal
Ву:	Ву:
Signature	Signature (attach power of attorney)
Print Name	Print Name
Title	Title
Attest:	Attest:
Signature	Signature
Title	Title

Notes: (1) Provide supplemental execution by any additional parties, such as joint venturers. (2) Any singular reference to Contractor, Surety, Owner, or other party shall be considered plural where applicable.

EJCDC <sup>®</sup> C-615, Payment Bond	
Copyright © 2013 National Society of Professional Engineers, American Council of	f Engineering Companies,
and American Society of Civil Engineers. All rights reserved.	1 of 3

- 1. The Contractor and Surety, jointly and severally, bind themselves, their heirs, executors, administrators, successors, and assigns to the Owner to pay for labor, materials, and equipment furnished for use in the performance of the Construction Contract, which is incorporated herein by reference, subject to the following terms.
- 2. If the Contractor promptly makes payment of all sums due to Claimants, and defends, indemnifies, and holds harmless the Owner from claims, demands, liens, or suits by any person or entity seeking payment for labor, materials, or equipment furnished for use in the performance of the Construction Contract, then the Surety and the Contractor shall have no obligation under this Bond.
- 3. If there is no Owner Default under the Construction Contract, the Surety's obligation to the Owner under this Bond shall arise after the Owner has promptly notified the Contractor and the Surety (at the address described in Paragraph 13) of claims, demands, liens, or suits against the Owner or the Owner's property by any person or entity seeking payment for labor, materials, or equipment furnished for use in the performance of the Construction Contract, and tendered defense of such claims, demands, liens, or suits to the Contractor and the Surety.
- 4. When the Owner has satisfied the conditions in Paragraph 3, the Surety shall promptly and at the Surety's expense defend, indemnify, and hold harmless the Owner against a duly tendered claim, demand, lien, or suit.
- 5. The Surety's obligations to a Claimant under this Bond shall arise after the following:
  - 5.1 Claimants who do not have a direct contract with the Contractor,
    - 5.1.1 have furnished a written notice of nonpayment to the Contractor, stating with substantial accuracy the amount claimed and the name of the party to whom the materials were, or equipment was, furnished or supplied or for whom the labor was done or performed, within ninety (90) days after having last performed labor or last furnished materials or equipment included in the Claim; and
    - 5.1.2 have sent a Claim to the Surety (at the address described in Paragraph 13).
  - 5.2 Claimants who are employed by or have a direct contract with the Contractor have sent a Claim to the Surety (at the address described in Paragraph 13).

- 6. If a notice of non-payment required by Paragraph 5.1.1 is given by the Owner to the Contractor, that is sufficient to satisfy a Claimant's obligation to furnish a written notice of non-payment under Paragraph 5.1.1.
- 7. When a Claimant has satisfied the conditions of Paragraph 5.1 or 5.2, whichever is applicable, the Surety shall promptly and at the Surety's expense take the following actions:
  - 7.1 Send an answer to the Claimant, with a copy to the Owner, within sixty (60) days after receipt of the Claim, stating the amounts that are undisputed and the basis for challenging any amounts that are disputed; and
  - 7.2 Pay or arrange for payment of any undisputed amounts.
  - 7.3 The Surety's failure to discharge its obligations under Paragraph 7.1 or 7.2 shall not be deemed to constitute a waiver of defenses the Surety or Contractor may have or acquire as to a Claim, except as to undisputed amounts for which the Surety and Claimant have reached agreement. If, however, the Surety fails to discharge its obligations under Paragraph 7.1 or 7.2, the Surety shall indemnify the Claimant for the reasonable attorney's fees the Claimant incurs thereafter to recover any sums found to be due and owing to the Claimant.
- 8. The Surety's total obligation shall not exceed the amount of this Bond, plus the amount of reasonable attorney's fees provided under Paragraph 7.3, and the amount of this Bond shall be credited for any payments made in good faith by the Surety.
- 9. Amounts owed by the Owner to the Contractor under the Construction Contract shall be used for the performance of the Construction Contract and to satisfy claims, if any, under any construction performance bond. By the Contractor furnishing and the Owner accepting this Bond, they agree that all funds earned by the Contractor in the performance of the Construction Contract are dedicated to satisfy obligations of the Contractor and Surety under this Bond, subject to the Owner's priority to use the funds for the completion of the work.
- 10. The Surety shall not be liable to the Owner, Claimants, or others for obligations of the Contractor that are unrelated to the Construction Contract. The Owner shall not be liable for the payment of any costs or expenses of any Claimant under this Bond, and shall have under this Bond no obligation to make payments to or give notice on behalf of Claimants, or otherwise have any obligations to Claimants under this Bond.
- 11. The Surety hereby waives notice of any change, including changes of time, to the Construction Contract or to related subcontracts, purchase orders, and other obligations.

- 12. No suit or action shall be commenced by a Claimant under this Bond other than in a court of competent jurisdiction in the state in which the project that is the subject of the Construction Contract is located or after the expiration of one year from the date (1) on which the Claimant sent a Claim to the Surety pursuant to Paragraph 5.1.2 or 5.2, or (2) on which the last labor or service was performed by anyone or the last materials or equipment were furnished by anyone under the Construction Contract, whichever of (1) or (2) first occurs. If the provisions of this paragraph are void or prohibited by law, the minimum period of limitation available to sureties as a defense in the jurisdiction of the suit shall be applicable.
- 13. Notice and Claims to the Surety, the Owner, or the Contractor shall be mailed or delivered to the address shown on the page on which their signature appears. Actual receipt of notice or Claims, however accomplished, shall be sufficient compliance as of the date received.
- 14. When this Bond has been furnished to comply with a statutory or other legal requirement in the location where the construction was to be performed, any provision in this Bond conflicting with said statutory or legal requirement shall be deemed deleted herefrom and provisions conforming to such statutory or other legal requirement shall be deemed incorporated herein. When so furnished, the intent is that this Bond shall be construed as a statutory bond and not as a common law bond.
- 15. Upon requests by any person or entity appearing to be a potential beneficiary of this Bond, the Contractor and Owner shall promptly furnish a copy of this Bond or shall permit a copy to be made.

#### 16. Definitions

- 16.1 **Claim:** A written statement by the Claimant including at a minimum:
  - 1. The name of the Claimant;
  - The name of the person for whom the labor was done, or materials or equipment furnished;
  - 3. A copy of the agreement or purchase order pursuant to which labor, materials, or equipment was furnished for use in the performance of the Construction Contract;
  - 4. A brief description of the labor, materials, or equipment furnished;
  - 5. The date on which the Claimant last performed labor or last furnished materials or equipment for use in the performance of the Construction Contract;
  - The total amount earned by the Claimant for labor, materials, or equipment furnished as of the date of the Claim;
  - 7. The total amount of previous payments received by the Claimant; and

- 8. The total amount due and unpaid to the Claimant for labor, materials, or equipment furnished as of the date of the Claim.
- 16.2 Claimant: An individual or entity having a direct contract with the Contractor or with a subcontractor of the Contractor to furnish labor, materials, or equipment for use in the performance of the Construction Contract. The term Claimant also includes any individual or entity that has rightfully asserted a claim under an applicable mechanic's lien or similar statute against the real property upon which the Project is located. The intent of this Bond shall be to include without limitation in the terms of "labor, materials, or equipment" that part of the water, gas, power, light, heat, oil, gasoline, telephone service, or rental equipment used in the Construction Contract, architectural and engineering services required for performance of the work of the Contractor and the Contractor's subcontractors, and all other items for which a mechanic's lien may be asserted in the jurisdiction where the labor, materials, or equipment were furnished.
- 16.3 **Construction Contract:** The agreement between the Owner and Contractor identified on the cover page, including all Contract Documents and all changes made to the agreement and the Contract Documents.
- 16.4 **Owner Default**: Failure of the Owner, which has not been remedied or waived, to pay the Contractor as required under the Construction Contract or to perform and complete or comply with the other material terms of the Construction Contract.
- 16.5 **Contract Documents:** All the documents that comprise the agreement between the Owner and Contractor.
- 17. If this Bond is issued for an agreement between a contractor and subcontractor, the term Contractor in this Bond shall be deemed to be Subcontractor and the term Owner shall be deemed to be Contractor.
- 18. Modifications to this Bond are as follows:



# CERTIFICATE OF SUBSTANTIAL COMPLETION

Owner:	Owner's Contract No.:	
Contractor:	Contractor's Project No.:	
Engineer:	Engineer's Project No.:	
Project:	Contract Name:	
This [preliminary] [final] Certificate of Substantial Comple	etion applies to:	
All Work	The following specified portions of the Work:	

# Date of Substantial Completion

The Work to which this Certificate applies has been inspected by authorized representatives of Owner, Contractor, and Engineer, and found to be substantially complete. The Date of Substantial Completion of the Work or portion thereof designated above is hereby established, subject to the provisions of the Contract pertaining to Substantial Completion. The date of Substantial Completion in the final Certificate of Substantial Completion marks the commencement of the contractual correction period and applicable warranties required by the Contract.

A punch list of items to be completed or corrected is attached to this Certificate. This list may not be all-inclusive, and the failure to include any items on such list does not alter the responsibility of the Contractor to complete all Work in accordance with the Contract.

The responsibilities between Owner and Contractor for security, operation, safety, maintenance, heat, utilities, insurance, and warranties upon Owner's use or occupancy of the Work shall be as provided in the Contract, except as amended as follows: [Note: Amendments of contractual responsibilities recorded in this Certificate should be the product of mutual agreement of Owner and Contractor; see Paragraph 15.03.D of the General Conditions.]

Amendments to Owner's	
responsibilities:	None
	As follows

Amendments to	
Contractor's responsibilities:	None 🗌
	As follows

The following documents are attached to and made a part of this Certificate: [punch list; others]

This Certificate does not constitute an acceptance of Work not in accordance with the Contract Documents, nor is it a release of Contractor's obligation to complete the Work in accordance with the Contract.

E	XECUTED BY ENGINEER:		RECEIVED:		RECEIVED:
By:	(Authorized signature)	By:	Owner (Authorized Signature)	By:	Contractor (Authorized Signature)
Title:		Title:		Title:	
Date:		Date:		Date:	
	Prepared a		© C-625, Certificate of Substantial Comp ed 2013 by the Engineers Joint Contract I		Committee.
	ľ	·	Page 1 of 1		

This document has important legal consequences; consultation with an attorney is encouraged with respect to its use or modification. This document should be adapted to the particular circumstances of the contemplated Project and the controlling Laws and Regulations.

# NOTICE OF ACCEPTABILITY OF WORK

Prepared By



DOCUMENTS COMMITTEE







Endorsed By



Copyright<sup>©</sup> 2018

National Society of Professional Engineers 1420 King Street, Alexandria, VA 22314-2794 (703) 684-2882 www.nspe.org

American Council of Engineering Companies 1015 15th Street N.W., Washington, DC 20005 (202) 347-7474 www.acec.org

American Society of Civil Engineers 1801 Alexander Bell Drive, Reston, VA 20191-4400 (800) 548-2723 www.asce.org

The copyright for this EJCDC document is owned jointly by the three sponsoring organizations listed above. The National Society of Professional Engineers is the Copyright Administrator for the EJCDC documents; please direct all inquiries regarding EJCDC copyrights to NSPE.

NOTE: EJCDC publications may be purchased at <u>www.ejcdc.org</u>, or from any of the sponsoring organizations above.

# GUIDELINES FOR USE OF EJCDC® C-626, NOTICE OF ACCEPTABILITY OF WORK

# 1.0 PURPOSE AND INTENDED USE OF THE DOCUMENT

The Notice of Acceptability of Work is used by Engineer to notify the Owner and the Contractor that Engineer has determined that the Work is acceptable, and Engineer recommends that Owner make final payment to Contractor. The Notice is expressly subject to several conditions regarding the limitations of Engineer's review and determinations.

C-626 is the document referred to in Paragraph 15.06.C of EJCDC® C-700, Standard General Conditions of the Construction Contract (2018). It is also an exhibit to various EJCDC professional services agreements, which inform Owner that Engineer, as part of its scope of services, will issue such a form upon Contractor's completion of construction.

For additional information regarding C-626, see EJCDC<sup>®</sup> C-001, Commentary on the 2018 EJCDC Construction Documents (2018).

## 2.0 EDITING THIS DOCUMENT

- 2.1 It is intended that this document be edited for each Contract. Guidelines for editing include:
  - A. Remove the cover pages which consist of the title pages and these Guidelines for Use.
  - B. Type in required information as indicated by brackets ([]). Bracketed text will usually provide instructions for what is to be inserted in place of the brackets. Delete brackets and change formatting to match existing text after project specific text has been added, e.g. change "[Project Name]" to "Peach Street Renovation" (without brackets or bold, or quotation marks).
  - C. Fill in blanks, if any. It will be more common for information to be inserted by user to be indicated by a prompt in brackets, as described in Paragraph B above, rather than by an underline-style blank.
  - D. Most Notes to User are presented before the text to which they apply; some Notes to Users are interspersed in the text, usually within brackets. Delete all "Notes to User" after reviewing each note and taking appropriate action. Delete all associated numbering and brackets.

# 3.0 LICENSE AGREEMENT

This document is subject to the terms and conditions of the License Agreement, 2018 EJCDC<sup>®</sup> Construction Series Documents. A copy of the License Agreement was furnished at the time of purchase of this document, and is available for review at <u>www.ejcdc.org</u> and the websites of EJCDC's sponsoring organizations.

#### NOTICE OF ACCEPTABILITY OF WORK

Owner:
Engineer:
Contractor:
Project:
Contract Name:
Notice Date:

Owner's Project No.: Engineer's Project No.: Contractor's Project No.:

Effective Date of the Construction Contract:

The Engineer hereby gives notice to the Owner and Contractor that Engineer recommends final payment to Contractor, and that the Work furnished and performed by Contractor under the Construction Contract is acceptable, expressly subject to the provisions of the Construction Contract's Contract Documents ("Contract Documents") and of the Agreement between Owner and Engineer for Professional Services dated [date of professional services agreement] ("Owner-Engineer Agreement"). This Notice of Acceptability of Work (Notice) is made expressly subject to the following terms and conditions to which all who receive and rely on said Notice agree:

- 1. This Notice has been prepared with the skill and care ordinarily used by members of the engineering profession practicing under similar conditions at the same time and in the same locality.
- 2. This Notice reflects and is an expression of the Engineer's professional opinion.
- 3. This Notice has been prepared to the best of Engineer's knowledge, information, and belief as of the Notice Date.
- 4. This Notice is based entirely on and expressly limited by the scope of services Engineer has been employed by Owner to perform or furnish during construction of the Project (including observation of the Contractor's Work) under the Owner-Engineer Agreement, and applies only to facts that are within Engineer's knowledge or could reasonably have been ascertained by Engineer as a result of carrying out the responsibilities specifically assigned to Engineer under such Owner-Engineer Agreement.
- 5. This Notice is not a guarantee or warranty of Contractor's performance under the Construction Contract, an acceptance of Work that is not in accordance with the Contract Documents, including but not limited to defective Work discovered after final inspection, nor an assumption of responsibility for any failure of Contractor to furnish and perform the Work thereunder in accordance with the Contract Documents, or to otherwise comply with the Contract Documents or the terms of any special guarantees specified therein.
- 6. This Notice does not relieve Contractor of any surviving obligations under the Construction Contract, and is subject to Owner's reservations of rights with respect to completion and final payment.

Engineer

By (signature):	
Name (printed):	
Title:	

This document has important legal consequences; consultation with an attorney is encouraged with respect to its use or modification. This document should be adapted to the particular circumstances of the contemplated Project and the controlling Laws and Regulations.

# STANDARD GENERAL CONDITIONS OF THE CONSTRUCTION CONTRACT

Prepared by



Issued and Published Jointly by



American Council of Engineering Companies





These General Conditions have been prepared for use with the Agreement Between Owner and Contractor for Construction Contract (EJCDC<sup>®</sup> C-520, Stipulated Sum, or C-525, Cost-Plus, 2013 Editions). Their provisions are interrelated and a change in one may necessitate a change in the other.

To prepare supplementary conditions that are coordinated with the General Conditions, use EJCDC's Guide to the Preparation of Supplementary Conditions (EJCDC<sup>®</sup> C-800, 2013 Edition). The full EJCDC Construction series of documents is discussed in the Commentary on the 2013 EJCDC Construction Documents (EJCDC<sup>®</sup> C-001, 2013 Edition).

Copyright © 2013:

National Society of Professional Engineers 1420 King Street, Alexandria, VA 22314-2794 (703) 684-2882

www.nspe.org

American Council of Engineering Companies 1015 15th Street N.W., Washington, DC 20005 (202) 347-7474

www.acec.org

American Society of Civil Engineers 1801 Alexander Bell Drive, Reston, VA 20191-4400 (800) 548-2723 www.asce.org

The copyright for this document is owned jointly by the three sponsoring organizations listed above. The National Society of Professional Engineers is the Copyright Administrator for the EJCDC documents; please direct all inquiries regarding EJCDC copyrights to NSPE.

NOTE: EJCDC publications may be purchased at <u>www.ejcdc.org</u>, or from any of the sponsoring organizations above.

# STANDARD GENERAL CONDITIONS OF THE CONSTRUCTION CONTRACT

#### TABLE OF CONTENTS

a 1 D	Pa;	-
e 2 – P	reliminary Matters	. 6
2.01	Delivery of Bonds and Evidence of Insurance	. 6
2.02	Copies of Documents	. 6
2.03	Before Starting Construction	. 7
2.04	Preconstruction Conference; Designation of Authorized Representatives	.7
2.05	Initial Acceptance of Schedules	. 7
2.06	Electronic Transmittals	. 8
e 3 – D	ocuments: Intent, Requirements, Reuse	. 8
3.01	Intent	.8
3.02	Reference Standards	. 8
3.03	Reporting and Resolving Discrepancies	.9
3.04	Requirements of the Contract Documents	.9
3.05	Reuse of Documents	10
e 4 – C	ommencement and Progress of the Work	10
4.01	Commencement of Contract Times; Notice to Proceed	10
4.02	Starting the Work	10
4.03	Reference Points	11
4.04	Progress Schedule	11
4.05	Delays in Contractor's Progress	11
5.01	Availability of Lands	12
5.02	Use of Site and Other Areas	12
5.03	Subsurface and Physical Conditions	13
5.04	Differing Subsurface or Physical Conditions	14
5.05	Underground Facilities	15
	1.01 1.02 e 2 - P 2.01 2.02 2.03 2.04 2.05 2.06 e 3 - D 3.01 3.02 3.03 3.04 3.03 3.04 3.05 e 4 - C 4.01 4.02 4.03 4.04 4.05 e 5 - A itions 5.01 5.02 5.03 5.04	e 1 - Definitions and Terminology         1.01       Defined Terms         1.02       Terminology         e 2 - Preliminary Matters         2.01       Delivery of Bonds and Evidence of Insurance         2.02       Copies of Documents         2.03       Before Starting Construction         2.04       Preconstruction Conference; Designation of Authorized Representatives         2.05       Initial Acceptance of Schedules         2.06       Electronic Transmittals         e 3 - Documents: Intent, Requirements, Reuse       3.01         3.01       Intent         3.02       Reference Standards         3.03       Reporting and Resolving Discrepancies         3.04       Requirements of the Contract Documents         3.05       Reuse of Documents         e 4 - Commencement and Progress of the Work       4.02         4.03       Reference Points         4.04       Progress Schedule         4.05       Delays in Contractor's Progress         e 5 - Availability of Lands; Subsurface and Physical Conditions; Hazardous Environmental itions         5.01       Availability of Lands         5.02       Use of Site and Other Areas         5.03       Subsurface or Physical Conditions         5.04

EJCDC® C-700, Standard General Conditions of the Construction Contract.

Copyright © 2013 National Society of Professional Engineers, American Council of Engineering Companies, and American Society of Civil Engineers. All rights reserved. Page i

5.06	Hazardous Environmental Conditions at Site	17
Article 6 -	- Bonds and Insurance	19
6.01	Performance, Payment, and Other Bonds	
6.02	Insurance—General Provisions	
6.03	Contractor's Insurance	21
6.04	Owner's Liability Insurance	23
6.05	Property Insurance	23
6.06	Waiver of Rights	25
6.07	Receipt and Application of Property Insurance Proceeds	26
Article 7 -	- Contractor's Responsibilities	27
7.01	Supervision and Superintendence	27
7.02	Labor; Working Hours	
7.03	Services, Materials, and Equipment	27
7.04	"Or Equals"	
7.05	Substitutes	
7.06	Concerning Subcontractors, Suppliers, and Others	
7.07	Patent Fees and Royalties	
7.08	Permits	
7.09	Taxes	
7.10	Laws and Regulations	
7.11	Record Documents	
7.12	Safety and Protection	
7.13	Safety Representative	
7.14	Hazard Communication Programs	
7.15	Emergencies	
7.16	Shop Drawings, Samples, and Other Submittals	
7.17	Contractor's General Warranty and Guarantee	
7.18	Indemnification	
7.19	Delegation of Professional Design Services	
Article 8 -	- Other Work at the Site	
8.01	Other Work	
8.02	Coordination	
8.03	Legal Relationships	

Article 9 –	Owner's Responsibilities	41
9.01	Communications to Contractor	41
9.02	Replacement of Engineer	41
9.03	Furnish Data	41
9.04	Pay When Due	41
9.05	Lands and Easements; Reports, Tests, and Drawings	41
9.06	Insurance	42
9.07	Change Orders	
9.08	Inspections, Tests, and Approvals	
9.09	Limitations on Owner's Responsibilities	42
9.10	Undisclosed Hazardous Environmental Condition	42
9.11	Evidence of Financial Arrangements	
9.12	Safety Programs	42
Article 10	- Engineer's Status During Construction	42
10.01	Owner's Representative	42
10.02	Visits to Site	
10.03	Project Representative	43
10.04	Rejecting Defective Work	43
10.05	Shop Drawings, Change Orders and Payments	43
10.06	Determinations for Unit Price Work	43
10.07	Decisions on Requirements of Contract Documents and Acceptability of Work	43
10.08	Limitations on Engineer's Authority and Responsibilities	44
10.09	Compliance with Safety Program	44
Article 11 ·	- Amending the Contract Documents; Changes in the Work	
11.01	Amending and Supplementing Contract Documents	44
11.02	Owner-Authorized Changes in the Work	45
11.03	Unauthorized Changes in the Work	45
11.04	Change of Contract Price	46
11.05	Change of Contract Times	47
11.06	Change Proposals	47
11.07	Execution of Change Orders	48
11.08	Notification to Surety	
Article 12 -	- Claims	

12.01	Claims	48			
Article 13 – Cost of the Work; Allowances; Unit Price Work					
13.01	Cost of the Work	. 49			
13.02	Allowances	. 52			
13.03	Unit Price Work	. 52			
Article 14 –	Article 14 – Tests and Inspections; Correction, Removal or Acceptance of Defective Work 53				
14.01	Access to Work	. 53			
14.02	Tests, Inspections, and Approvals	. 53			
14.03	Defective Work	. 54			
14.04	Acceptance of Defective Work	. 55			
14.05	Uncovering Work	. 55			
14.06	Owner May Stop the Work	. 55			
14.07	Owner May Correct Defective Work	. 56			
Article 15 –	Payments to Contractor; Set-Offs; Completion; Correction Period	. 56			
15.01	Progress Payments	. 56			
15.02	Contractor's Warranty of Title	. 59			
15.03	Substantial Completion	. 60			
15.04	Partial Use or Occupancy	. 60			
15.05	Final Inspection	. 61			
15.06	Final Payment	. 61			
15.07	Waiver of Claims	. 62			
15.08	Correction Period	. 63			
Article 16 –	Suspension of Work and Termination	. 64			
16.01	Owner May Suspend Work	. 64			
16.02	Owner May Terminate for Cause	. 64			
16.03	Owner May Terminate For Convenience	65			
16.04	Contractor May Stop Work or Terminate	65			
Article 17 –	Final Resolution of Disputes	. 66			
17.01	Methods and Procedures	. 66			
Article 18 –	Miscellaneous	. 66			
18.01	Giving Notice	. 66			
18.02	Computation of Times	. 66			
18.03	Cumulative Remedies	. 66			

EJCDC® C-700, Standard General Conditions of the Construction Contract.

Copyright © 2013 National Society of Professional Engineers, American Council of Engineering Companies, and American Society of Civil Engineers. All rights reserved. Page iv

18.04	Limitation of Damages	67
18.05	No Waiver	67
18.06	Survival of Obligations	67
18.07	Controlling Law	67
18.08	Headings	67

#### **ARTICLE 1 – DEFINITIONS AND TERMINOLOGY**

## 1.01 Defined Terms

- A. Wherever used in the Bidding Requirements or Contract Documents, a term printed with initial capital letters, including the term's singular and plural forms, will have the meaning indicated in the definitions below. In addition to terms specifically defined, terms with initial capital letters in the Contract Documents include references to identified articles and paragraphs, and the titles of other documents or forms.
  - 1. *Addenda*—Written or graphic instruments issued prior to the opening of Bids which clarify, correct, or change the Bidding Requirements or the proposed Contract Documents.
  - 2. Agreement—The written instrument, executed by Owner and Contractor, that sets forth the Contract Price and Contract Times, identifies the parties and the Engineer, and designates the specific items that are Contract Documents.
  - 3. Application for Payment—The form acceptable to Engineer which is to be used by Contractor during the course of the Work in requesting progress or final payments and which is to be accompanied by such supporting documentation as is required by the Contract Documents.
  - 4. *Bid*—The offer of a Bidder submitted on the prescribed form setting forth the prices for the Work to be performed.
  - 5. Bidder—An individual or entity that submits a Bid to Owner.
  - 6. *Bidding Documents*—The Bidding Requirements, the proposed Contract Documents, and all Addenda.
  - 7. *Bidding Requirements*—The advertisement or invitation to bid, Instructions to Bidders, Bid Bond or other Bid security, if any, the Bid Form, and the Bid with any attachments.
  - 8. *Change Order*—A document which is signed by Contractor and Owner and authorizes an addition, deletion, or revision in the Work or an adjustment in the Contract Price or the Contract Times, or other revision to the Contract, issued on or after the Effective Date of the Contract.
  - 9. *Change Proposal*—A written request by Contractor, duly submitted in compliance with the procedural requirements set forth herein, seeking an adjustment in Contract Price or Contract Times, or both; contesting an initial decision by Engineer concerning the requirements of the Contract Documents or the acceptability of Work under the Contract Documents; challenging a set-off against payments due; or seeking other relief with respect to the terms of the Contract.
  - 10. *Claim*—(a) A demand or assertion by Owner directly to Contractor, duly submitted in compliance with the procedural requirements set forth herein: seeking an adjustment of Contract Price or Contract Times, or both; contesting an initial decision by Engineer concerning the requirements of the Contract Documents or the acceptability of Work under the Contract Documents; contesting Engineer's decision regarding a Change Proposal; seeking resolution of a contractual issue that Engineer has declined to address; or seeking other relief with respect to the terms of the Contract; or (b) a demand or assertion by Contractor directly to Owner, duly submitted in compliance with the procedural requirements set forth herein, contesting Engineer's decision regarding a Change Proposal; or seeking resolution of a contractual issue that Engineer has declined to address; or seeking other relief with respect to the terms of the Contract; or (b) a demand or assertion by Contractor directly to Owner, duly submitted in compliance with the procedural requirements set forth herein, contesting Engineer's decision regarding a Change Proposal; or seeking resolution of a contractual issue that Engineer

has declined to address. A demand for money or services by a third party is not a Claim.

- 11. Constituent of Concern—Asbestos, petroleum, radioactive materials, polychlorinated biphenyls (PCBs), hazardous waste, and any substance, product, waste, or other material of any nature whatsoever that is or becomes listed, regulated, or addressed pursuant to (a) the Comprehensive Environmental Response, Compensation and Liability Act, 42 U.S.C. §§9601 et seq. ("CERCLA"); (b) the Hazardous Materials Transportation Act, 49 U.S.C. §§5501 et seq.; (c) the Resource Conservation and Recovery Act, 42 U.S.C. §§6901 et seq. ("RCRA"); (d) the Toxic Substances Control Act, 15 U.S.C. §§2601 et seq.; (e) the Clean Water Act, 33 U.S.C. §§1251 et seq.; (f) the Clean Air Act, 42 U.S.C. §§7401 et seq.; or (g) any other federal, state, or local statute, law, rule, regulation, ordinance, resolution, code, order, or decree regulating, relating to, or imposing liability or standards of conduct concerning, any hazardous, toxic, or dangerous waste, substance, or material.
- 12. *Contract*—The entire and integrated written contract between the Owner and Contractor concerning the Work.
- 13. *Contract Documents*—Those items so designated in the Agreement, and which together comprise the Contract.
- 14. *Contract Price*—The money that Owner has agreed to pay Contractor for completion of the Work in accordance with the Contract Documents.
- 15. *Contract Times*—The number of days or the dates by which Contractor shall: (a) achieve Milestones, if any; (b) achieve Substantial Completion; and (c) complete the Work.
- 16. *Contractor*—The individual or entity with which Owner has contracted for performance of the Work.
- 17. *Cost of the Work*—See Paragraph 13.01 for definition.
- 18. *Drawings*—The part of the Contract that graphically shows the scope, extent, and character of the Work to be performed by Contractor.
- 19. *Effective Date of the Contract*—The date, indicated in the Agreement, on which the Contract becomes effective.
- 20. *Engineer*—The individual or entity named as such in the Agreement.
- 21. *Field Order*—A written order issued by Engineer which requires minor changes in the Work but does not change the Contract Price or the Contract Times.
- 22. Hazardous Environmental Condition—The presence at the Site of Constituents of Concern in such quantities or circumstances that may present a danger to persons or property exposed thereto. The presence at the Site of materials that are necessary for the execution of the Work, or that are to be incorporated in the Work, and that are controlled and contained pursuant to industry practices, Laws and Regulations, and the requirements of the Contract, does not establish a Hazardous Environmental Condition.
- 23. *Laws and Regulations; Laws or Regulations*—Any and all applicable laws, statutes, rules, regulations, ordinances, codes, and orders of any and all governmental bodies, agencies, authorities, and courts having jurisdiction.

- 24. *Liens*—Charges, security interests, or encumbrances upon Contract-related funds, real property, or personal property.
- 25. *Milestone*—A principal event in the performance of the Work that the Contract requires Contractor to achieve by an intermediate completion date or by a time prior to Substantial Completion of all the Work.
- 26. *Notice of Award*—The written notice by Owner to a Bidder of Owner's acceptance of the Bid.
- 27. *Notice to Proceed*—A written notice by Owner to Contractor fixing the date on which the Contract Times will commence to run and on which Contractor shall start to perform the Work.
- 28. *Owner*—The individual or entity with which Contractor has contracted regarding the Work, and which has agreed to pay Contractor for the performance of the Work, pursuant to the terms of the Contract.
- 29. *Progress Schedule*—A schedule, prepared and maintained by Contractor, describing the sequence and duration of the activities comprising the Contractor's plan to accomplish the Work within the Contract Times.
- 30. *Project*—The total undertaking to be accomplished for Owner by engineers, contractors, and others, including planning, study, design, construction, testing, commissioning, and start-up, and of which the Work to be performed under the Contract Documents is a part.
- 31. *Project Manual*—The written documents prepared for, or made available for, procuring and constructing the Work, including but not limited to the Bidding Documents or other construction procurement documents, geotechnical and existing conditions information, the Agreement, bond forms, General Conditions, Supplementary Conditions, and Specifications. The contents of the Project Manual may be bound in one or more volumes.
- 32. *Resident Project Representative*—The authorized representative of Engineer assigned to assist Engineer at the Site. As used herein, the term Resident Project Representative or "RPR" includes any assistants or field staff of Resident Project Representative.
- 33. *Samples*—Physical examples of materials, equipment, or workmanship that are representative of some portion of the Work and that establish the standards by which such portion of the Work will be judged.
- 34. Schedule of Submittals—A schedule, prepared and maintained by Contractor, of required submittals and the time requirements for Engineer's review of the submittals and the performance of related construction activities.
- 35. *Schedule of Values*—A schedule, prepared and maintained by Contractor, allocating portions of the Contract Price to various portions of the Work and used as the basis for reviewing Contractor's Applications for Payment.
- 36. *Shop Drawings*—All drawings, diagrams, illustrations, schedules, and other data or information that are specifically prepared or assembled by or for Contractor and submitted by Contractor to illustrate some portion of the Work. Shop Drawings, whether approved or not, are not Drawings and are not Contract Documents.

- 37. *Site*—Lands or areas indicated in the Contract Documents as being furnished by Owner upon which the Work is to be performed, including rights-of-way and easements, and such other lands furnished by Owner which are designated for the use of Contractor.
- 38. *Specifications*—The part of the Contract that consists of written requirements for materials, equipment, systems, standards, and workmanship as applied to the Work, and certain administrative requirements and procedural matters applicable to the Work.
- 39. *Subcontractor*—An individual or entity having a direct contract with Contractor or with any other Subcontractor for the performance of a part of the Work.
- 40. Substantial Completion—The time at which the Work (or a specified part thereof) has progressed to the point where, in the opinion of Engineer, the Work (or a specified part thereof) is sufficiently complete, in accordance with the Contract Documents, so that the Work (or a specified part thereof) can be utilized for the purposes for which it is intended. The terms "substantially complete" and "substantially completed" as applied to all or part of the Work refer to Substantial Completion thereof.
- 41. *Successful Bidder*—The Bidder whose Bid the Owner accepts, and to which the Owner makes an award of contract, subject to stated conditions.
- 42. *Supplementary Conditions*—The part of the Contract that amends or supplements these General Conditions.
- 43. *Supplier*—A manufacturer, fabricator, supplier, distributor, materialman, or vendor having a direct contract with Contractor or with any Subcontractor to furnish materials or equipment to be incorporated in the Work by Contractor or a Subcontractor.
- 44. Technical Data—Those items expressly identified as Technical Data in the Supplementary Conditions, with respect to either (a) subsurface conditions at the Site, or physical conditions relating to existing surface or subsurface structures at the Site (except Underground Facilities) or (b) Hazardous Environmental Conditions at the Site. If no such express identifications of Technical Data have been made with respect to conditions at the Site, then the data contained in boring logs, recorded measurements of subsurface water levels, laboratory test results, and other factual, objective information regarding conditions at the Site that are set forth in any geotechnical or environmental report prepared for the Project and made available to Contractor are hereby defined as Technical Data with respect to conditions at the Site under Paragraphs 5.03, 5.04, and 5.06.
- 45. Underground Facilities—All underground pipelines, conduits, ducts, cables, wires, manholes, vaults, tanks, tunnels, or other such facilities or attachments, and any encasements containing such facilities, including but not limited to those that convey electricity, gases, steam, liquid petroleum products, telephone or other communications, fiber optic transmissions, cable television, water, wastewater, storm water, other liquids or chemicals, or traffic or other control systems.
- 46. *Unit Price Work*—Work to be paid for on the basis of unit prices.
- 47. *Work*—The entire construction or the various separately identifiable parts thereof required to be provided under the Contract Documents. Work includes and is the result of performing or providing all labor, services, and documentation necessary to produce such construction; furnishing, installing, and incorporating all materials and equipment into such construction; and may include related services such as testing, start-up, and commissioning, all as required by the Contract Documents.

48. *Work Change Directive*—A written directive to Contractor issued on or after the Effective Date of the Contract, signed by Owner and recommended by Engineer, ordering an addition, deletion, or revision in the Work.

# 1.02 Terminology

- A. The words and terms discussed in the following paragraphs are not defined but, when used in the Bidding Requirements or Contract Documents, have the indicated meaning.
- B. Intent of Certain Terms or Adjectives:
  - 1. The Contract Documents include the terms "as allowed," "as approved," "as ordered," "as directed" or terms of like effect or import to authorize an exercise of professional judgment by Engineer. In addition, the adjectives "reasonable," "suitable," "acceptable," "proper," "satisfactory," or adjectives of like effect or import are used to describe an action or determination of Engineer as to the Work. It is intended that such exercise of professional judgment, action, or determination will be solely to evaluate, in general, the Work for compliance with the information in the Contract Documents and with the design concept of the Project as a functioning whole as shown or indicated in the Contract Documents (unless there is a specific statement indicating otherwise). The use of any such term or adjective is not intended to and shall not be effective to assign to Engineer any duty or authority to supervise or direct the performance of the Work, or any duty or authority to undertake responsibility contrary to the provisions of Article 10 or any other provision of the Contract Documents.
- C. Day:
  - 1. The word "day" means a calendar day of 24 hours measured from midnight to the next midnight.
- D. Defective:
  - 1. The word "defective," when modifying the word "Work," refers to Work that is unsatisfactory, faulty, or deficient in that it:
    - a. does not conform to the Contract Documents; or
    - b. does not meet the requirements of any applicable inspection, reference standard, test, or approval referred to in the Contract Documents; or
    - c. has been damaged prior to Engineer's recommendation of final payment (unless responsibility for the protection thereof has been assumed by Owner at Substantial Completion in accordance with Paragraph 15.03 or 15.04).
- E. Furnish, Install, Perform, Provide:
  - 1. The word "furnish," when used in connection with services, materials, or equipment, shall mean to supply and deliver said services, materials, or equipment to the Site (or some other specified location) ready for use or installation and in usable or operable condition.
  - 2. The word "install," when used in connection with services, materials, or equipment, shall mean to put into use or place in final position said services, materials, or equipment complete and ready for intended use.

- 3. The words "perform" or "provide," when used in connection with services, materials, or equipment, shall mean to furnish and install said services, materials, or equipment complete and ready for intended use.
- 4. If the Contract Documents establish an obligation of Contractor with respect to specific services, materials, or equipment, but do not expressly use any of the four words "furnish," "install," "perform," or "provide," then Contractor shall furnish and install said services, materials, or equipment complete and ready for intended use.
- F. Unless stated otherwise in the Contract Documents, words or phrases that have a wellknown technical or construction industry or trade meaning are used in the Contract Documents in accordance with such recognized meaning.

## **ARTICLE 2 – PRELIMINARY MATTERS**

- 2.01 Delivery of Bonds and Evidence of Insurance
  - A. *Bonds*: When Contractor delivers the executed counterparts of the Agreement to Owner, Contractor shall also deliver to Owner such bonds as Contractor may be required to furnish.
  - B. *Evidence of Contractor's Insurance*: When Contractor delivers the executed counterparts of the Agreement to Owner, Contractor shall also deliver to Owner, with copies to each named insured and additional insured (as identified in the Supplementary Conditions or elsewhere in the Contract), the certificates and other evidence of insurance required to be provided by Contractor in accordance with Article 6.
  - C. *Evidence of Owner's Insurance*: After receipt of the executed counterparts of the Agreement and all required bonds and insurance documentation, Owner shall promptly deliver to Contractor, with copies to each named insured and additional insured (as identified in the Supplementary Conditions or otherwise), the certificates and other evidence of insurance required to be provided by Owner under Article 6.
- 2.02 *Copies of Documents* 
  - A. Owner shall furnish to Contractor four printed copies of the Contract (including one fully executed counterpart of the Agreement), and one copy in electronic portable document format (PDF). Additional printed copies will be furnished upon request at the cost of reproduction.
  - B. Owner shall maintain and safeguard at least one original printed record version of the Contract, including Drawings and Specifications signed and sealed by Engineer and other design professionals. Owner shall make such original printed record version of the Contract available to Contractor for review. Owner may delegate the responsibilities under this provision to Engineer.
- 2.03 Before Starting Construction
  - A. *Preliminary Schedules*: Within 10 days after the Effective Date of the Contract (or as otherwise specifically required by the Contract Documents), Contractor shall submit to Engineer for timely review:
    - 1. a preliminary Progress Schedule indicating the times (numbers of days or dates) for starting and completing the various stages of the Work, including any Milestones specified in the Contract;
    - 2. a preliminary Schedule of Submittals; and

3. a preliminary Schedule of Values for all of the Work which includes quantities and prices of items which when added together equal the Contract Price and subdivides the Work into component parts in sufficient detail to serve as the basis for progress payments during performance of the Work. Such prices will include an appropriate amount of overhead and profit applicable to each item of Work.

# 2.04 *Preconstruction Conference; Designation of Authorized Representatives*

- A. Before any Work at the Site is started, a conference attended by Owner, Contractor, Engineer, and others as appropriate will be held to establish a working understanding among the parties as to the Work and to discuss the schedules referred to in Paragraph 2.03.A, procedures for handling Shop Drawings, Samples, and other submittals, processing Applications for Payment, electronic or digital transmittals, and maintaining required records.
- B. At this conference Owner and Contractor each shall designate, in writing, a specific individual to act as its authorized representative with respect to the services and responsibilities under the Contract. Such individuals shall have the authority to transmit and receive information, render decisions relative to the Contract, and otherwise act on behalf of each respective party.

# 2.05 Initial Acceptance of Schedules

- A. At least 10 days before submission of the first Application for Payment a conference, attended by Contractor, Engineer, and others as appropriate, will be held to review for acceptability to Engineer as provided below the schedules submitted in accordance with Paragraph 2.03.A. Contractor shall have an additional 10 days to make corrections and adjustments and to complete and resubmit the schedules. No progress payment shall be made to Contractor until acceptable schedules are submitted to Engineer.
  - 1. The Progress Schedule will be acceptable to Engineer if it provides an orderly progression of the Work to completion within the Contract Times. Such acceptance will not impose on Engineer responsibility for the Progress Schedule, for sequencing, scheduling, or progress of the Work, nor interfere with or relieve Contractor from Contractor's full responsibility therefor.
  - 2. Contractor's Schedule of Submittals will be acceptable to Engineer if it provides a workable arrangement for reviewing and processing the required submittals.
  - 3. Contractor's Schedule of Values will be acceptable to Engineer as to form and substance if it provides a reasonable allocation of the Contract Price to the component parts of the Work.

# 2.06 *Electronic Transmittals*

- A. Except as otherwise stated elsewhere in the Contract, the Owner, Engineer, and Contractor may transmit, and shall accept, Project-related correspondence, text, data, documents, drawings, information, and graphics, including but not limited to Shop Drawings and other submittals, in electronic media or digital format, either directly, or through access to a secure Project website.
- B. If the Contract does not establish protocols for electronic or digital transmittals, then Owner, Engineer, and Contractor shall jointly develop such protocols.
- C. When transmitting items in electronic media or digital format, the transmitting party makes no representations as to long term compatibility, usability, or readability of the items resulting from the recipient's use of software application packages, operating systems, or

computer hardware differing from those used in the drafting or transmittal of the items, or from those established in applicable transmittal protocols.

# **ARTICLE 3 – DOCUMENTS: INTENT, REQUIREMENTS, REUSE**

## 3.01 Intent

- A. The Contract Documents are complementary; what is required by one is as binding as if required by all.
- B. It is the intent of the Contract Documents to describe a functionally complete project (or part thereof) to be constructed in accordance with the Contract Documents.
- C. Unless otherwise stated in the Contract Documents, if there is a discrepancy between the electronic or digital versions of the Contract Documents (including any printed copies derived from such electronic or digital versions) and the printed record version, the printed record version shall govern.
- D. The Contract supersedes prior negotiations, representations, and agreements, whether written or oral.
- E. Engineer will issue clarifications and interpretations of the Contract Documents as provided herein.
- 3.02 *Reference Standards* 
  - A. Standards Specifications, Codes, Laws and Regulations
    - 1. Reference in the Contract Documents to standard specifications, manuals, reference standards, or codes of any technical society, organization, or association, or to Laws or Regulations, whether such reference be specific or by implication, shall mean the standard specification, manual, reference standard, code, or Laws or Regulations in effect at the time of opening of Bids (or on the Effective Date of the Contract if there were no Bids), except as may be otherwise specifically stated in the Contract Documents.
    - 2. No provision of any such standard specification, manual, reference standard, or code, or any instruction of a Supplier, shall be effective to change the duties or responsibilities of Owner, Contractor, or Engineer, or any of their subcontractors, consultants, agents, or employees, from those set forth in the part of the Contract Documents prepared by or for Engineer. No such provision or instruction shall be effective to assign to Owner, Engineer, or any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors, any duty or authority to supervise or direct the performance of the Work or any duty or authority to undertake responsibility inconsistent with the provisions of the part of the Contract Documents prepared by or for Engineer.

#### 3.03 *Reporting and Resolving Discrepancies*

- A. *Reporting Discrepancies*:
  - 1. Contractor's Verification of Figures and Field Measurements: Before undertaking each part of the Work, Contractor shall carefully study the Contract Documents, and check and verify pertinent figures and dimensions therein, particularly with respect to applicable field measurements. Contractor shall promptly report in writing to Engineer any conflict, error, ambiguity, or discrepancy that Contractor discovers, or has actual knowledge of, and shall not proceed with any Work affected thereby until the conflict,

error, ambiguity, or discrepancy is resolved, by a clarification or interpretation by Engineer, or by an amendment or supplement to the Contract Documents issued pursuant to Paragraph 11.01.

- 2. Contractor's Review of Contract Documents: If, before or during the performance of the Work, Contractor discovers any conflict, error, ambiguity, or discrepancy within the Contract Documents, or between the Contract Documents and (a) any applicable Law or Regulation, (b) actual field conditions, (c) any standard specification, manual, reference standard, or code, or (d) any instruction of any Supplier, then Contractor shall promptly report it to Engineer in writing. Contractor shall not proceed with the Work affected thereby (except in an emergency as required by Paragraph 7.15) until the conflict, error, ambiguity, or discrepancy is resolved, by a clarification or interpretation by Engineer, or by an amendment or supplement to the Contract Documents issued pursuant to Paragraph 11.01.
- 3. Contractor shall not be liable to Owner or Engineer for failure to report any conflict, error, ambiguity, or discrepancy in the Contract Documents unless Contractor had actual knowledge thereof.
- B. *Resolving Discrepancies*:
  - 1. Except as may be otherwise specifically stated in the Contract Documents, the provisions of the part of the Contract Documents prepared by or for Engineer shall take precedence in resolving any conflict, error, ambiguity, or discrepancy between such provisions of the Contract Documents and:
    - a. the provisions of any standard specification, manual, reference standard, or code, or the instruction of any Supplier (whether or not specifically incorporated by reference as a Contract Document); or
    - b. the provisions of any Laws or Regulations applicable to the performance of the Work (unless such an interpretation of the provisions of the Contract Documents would result in violation of such Law or Regulation).

# 3.04 *Requirements of the Contract Documents*

- A. During the performance of the Work and until final payment, Contractor and Owner shall submit to the Engineer all matters in question concerning the requirements of the Contract Documents (sometimes referred to as requests for information or interpretation—RFIs), or relating to the acceptability of the Work under the Contract Documents, as soon as possible after such matters arise. Engineer will be the initial interpreter of the requirements of the Contract Documents, and judge of the acceptability of the Work thereunder.
- B. Engineer will, with reasonable promptness, render a written clarification, interpretation, or decision on the issue submitted, or initiate an amendment or supplement to the Contract Documents. Engineer's written clarification, interpretation, or decision will be final and binding on Contractor, unless it appeals by submitting a Change Proposal, and on Owner, unless it appeals by filing a Claim.
- C. If a submitted matter in question concerns terms and conditions of the Contract Documents that do not involve (1) the performance or acceptability of the Work under the Contract Documents, (2) the design (as set forth in the Drawings, Specifications, or otherwise), or (3) other engineering or technical matters, then Engineer will promptly give written notice to Owner and Contractor that Engineer is unable to provide a decision or interpretation. If Owner and Contractor are unable to agree on resolution of such a matter in question, either party may pursue resolution as provided in Article 12.

#### 3.05 *Reuse of Documents*

- A. Contractor and its Subcontractors and Suppliers shall not:
  - have or acquire any title to or ownership rights in any of the Drawings, Specifications, or other documents (or copies of any thereof) prepared by or bearing the seal of Engineer or its consultants, including electronic media editions, or reuse any such Drawings, Specifications, other documents, or copies thereof on extensions of the Project or any other project without written consent of Owner and Engineer and specific written verification or adaptation by Engineer; or
  - 2. have or acquire any title or ownership rights in any other Contract Documents, reuse any such Contract Documents for any purpose without Owner's express written consent, or violate any copyrights pertaining to such Contract Documents.
- B. The prohibitions of this Paragraph 3.05 will survive final payment, or termination of the Contract. Nothing herein shall preclude Contractor from retaining copies of the Contract Documents for record purposes.

## **ARTICLE 4 – COMMENCEMENT AND PROGRESS OF THE WORK**

- 4.01 Commencement of Contract Times; Notice to Proceed
  - A. The Contract Times will commence to run on the thirtieth day after the Effective Date of the Contract or, if a Notice to Proceed is given, on the day indicated in the Notice to Proceed. A Notice to Proceed may be given at any time within 30 days after the Effective Date of the Contract. In no event will the Contract Times commence to run later than the sixtieth day after the day of Bid opening or the thirtieth day after the Effective Date of the Contract, whichever date is earlier.
- 4.02 *Starting the Work* 
  - A. Contractor shall start to perform the Work on the date when the Contract Times commence to run. No Work shall be done at the Site prior to such date.
- 4.03 *Reference Points* 
  - A. Owner shall provide engineering surveys to establish reference points for construction which in Engineer's judgment are necessary to enable Contractor to proceed with the Work. Contractor shall be responsible for laying out the Work, shall protect and preserve the established reference points and property monuments, and shall make no changes or relocations without the prior written approval of Owner. Contractor shall report to Engineer whenever any reference point or property monument is lost or destroyed or requires relocation because of necessary changes in grades or locations, and shall be responsible for the accurate replacement or relocation of such reference points or property monuments by professionally qualified personnel.

#### 4.04 Progress Schedule

- A. Contractor shall adhere to the Progress Schedule established in accordance with Paragraph
   2.05 as it may be adjusted from time to time as provided below.
  - 1. Contractor shall submit to Engineer for acceptance (to the extent indicated in Paragraph 2.05) proposed adjustments in the Progress Schedule that will not result in changing the Contract Times.

- 2. Proposed adjustments in the Progress Schedule that will change the Contract Times shall be submitted in accordance with the requirements of Article 11.
- B. Contractor shall carry on the Work and adhere to the Progress Schedule during all disputes or disagreements with Owner. No Work shall be delayed or postponed pending resolution of any disputes or disagreements, or during any appeal process, except as permitted by Paragraph 16.04, or as Owner and Contractor may otherwise agree in writing.

# 4.05 Delays in Contractor's Progress

- A. If Owner, Engineer, or anyone for whom Owner is responsible, delays, disrupts, or interferes with the performance or progress of the Work, then Contractor shall be entitled to an equitable adjustment in the Contract Times and Contract Price. Contractor's entitlement to an adjustment of the Contract Times is conditioned on such adjustment being essential to Contractor's ability to complete the Work within the Contract Times.
- B. Contractor shall not be entitled to an adjustment in Contract Price or Contract Times for delay, disruption, or interference caused by or within the control of Contractor. Delay, disruption, and interference attributable to and within the control of a Subcontractor or Supplier shall be deemed to be within the control of Contractor.
- C. If Contractor's performance or progress is delayed, disrupted, or interfered with by unanticipated causes not the fault of and beyond the control of Owner, Contractor, and those for which they are responsible, then Contractor shall be entitled to an equitable adjustment in Contract Times. Contractor's entitlement to an adjustment of the Contract Times is conditioned on such adjustment being essential to Contractor's ability to complete the Work within the Contract Times. Such an adjustment shall be Contractor's sole and exclusive remedy for the delays, disruption, and interference described in this paragraph. Causes of delay, disruption, or interference that may give rise to an adjustment in Contract Times under this paragraph include but are not limited to the following:
  - 1. severe and unavoidable natural catastrophes such as fires, floods, epidemics, and earthquakes;
  - 2. abnormal weather conditions;
  - 3. acts or failures to act of utility owners (other than those performing other work at or adjacent to the Site by arrangement with the Owner, as contemplated in Article 8); and
  - 4. acts of war or terrorism.
- D. Delays, disruption, and interference to the performance or progress of the Work resulting from the existence of a differing subsurface or physical condition, an Underground Facility that was not shown or indicated by the Contract Documents, or not shown or indicated with reasonable accuracy, and those resulting from Hazardous Environmental Conditions, are governed by Article 5.
- E. Paragraph 8.03 governs delays, disruption, and interference to the performance or progress of the Work resulting from the performance of certain other work at or adjacent to the Site.
- F. Contractor shall not be entitled to an adjustment in Contract Price or Contract Times for any delay, disruption, or interference if such delay is concurrent with a delay, disruption, or interference caused by or within the control of Contractor.

G. Contractor must submit any Change Proposal seeking an adjustment in Contract Price or Contract Times under this paragraph within 30 days of the commencement of the delaying, disrupting, or interfering event.

# ARTICLE 5 – AVAILABILITY OF LANDS; SUBSURFACE AND PHYSICAL CONDITIONS; HAZARDOUS ENVIRONMENTAL CONDITIONS

# 5.01 *Availability of Lands*

- A. Owner shall furnish the Site. Owner shall notify Contractor of any encumbrances or restrictions not of general application but specifically related to use of the Site with which Contractor must comply in performing the Work.
- B. Upon reasonable written request, Owner shall furnish Contractor with a current statement of record legal title and legal description of the lands upon which permanent improvements are to be made and Owner's interest therein as necessary for giving notice of or filing a mechanic's or construction lien against such lands in accordance with applicable Laws and Regulations.
- C. Contractor shall provide for all additional lands and access thereto that may be required for temporary construction facilities or storage of materials and equipment.
- 5.02 Use of Site and Other Areas
  - A. Limitation on Use of Site and Other Areas:
    - 1. Contractor shall confine construction equipment, temporary construction facilities, the storage of materials and equipment, and the operations of workers to the Site, adjacent areas that Contractor has arranged to use through construction easements or otherwise, and other adjacent areas permitted by Laws and Regulations, and shall not unreasonably encumber the Site and such other adjacent areas with construction equipment or other materials or equipment. Contractor shall assume full responsibility for (a) damage to the Site; (b) damage to any such other adjacent areas used for Contractor's operations; (c) damage to any other adjacent land or areas; and (d) for injuries and losses sustained by the owners or occupants of any such land or areas; provided that such damage or injuries result from the performance of the Work or from other actions or conduct of the Contractor or those for which Contractor is responsible.
    - If a damage or injury claim is made by the owner or occupant of any such land or area 2. because of the performance of the Work, or because of other actions or conduct of the Contractor or those for which Contractor is responsible, Contractor shall (a) take immediate corrective or remedial action as required by Paragraph 7.12, or otherwise; (b) promptly attempt to settle the claim as to all parties through negotiations with such owner or occupant, or otherwise resolve the claim by arbitration or other dispute resolution proceeding, or at law; and (c) to the fullest extent permitted by Laws and Regulations, indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them from and against any such claim, and against all costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to any claim or action, legal or equitable, brought by any such owner or occupant against Owner, Engineer, or any other party indemnified hereunder to the extent caused directly or indirectly, in whole or in part

by, or based upon, Contractor's performance of the Work, or because of other actions or conduct of the Contractor or those for which Contractor is responsible.

- B. *Removal of Debris During Performance of the Work*: During the progress of the Work the Contractor shall keep the Site and other adjacent areas free from accumulations of waste materials, rubbish, and other debris. Removal and disposal of such waste materials, rubbish, and other debris shall conform to applicable Laws and Regulations.
- C. *Cleaning*: Prior to Substantial Completion of the Work Contractor shall clean the Site and the Work and make it ready for utilization by Owner. At the completion of the Work Contractor shall remove from the Site and adjacent areas all tools, appliances, construction equipment and machinery, and surplus materials and shall restore to original condition all property not designated for alteration by the Contract Documents.
- D. Loading of Structures: Contractor shall not load nor permit any part of any structure to be loaded in any manner that will endanger the structure, nor shall Contractor subject any part of the Work or adjacent structures or land to stresses or pressures that will endanger them.
- 5.03 Subsurface and Physical Conditions
  - A. *Reports and Drawings*: The Supplementary Conditions identify:
    - 1. those reports known to Owner of explorations and tests of subsurface conditions at or adjacent to the Site;
    - 2. those drawings known to Owner of physical conditions relating to existing surface or subsurface structures at the Site (except Underground Facilities); and
    - 3. Technical Data contained in such reports and drawings.
  - B. Reliance by Contractor on Technical Data Authorized: Contractor may rely upon the accuracy of the Technical Data expressly identified in the Supplementary Conditions with respect to such reports and drawings, but such reports and drawings are not Contract Documents. If no such express identification has been made, then Contractor may rely upon the accuracy of the Technical Data (as defined in Article 1) contained in any geotechnical or environmental report prepared for the Project and made available to Contractor. Except for such reliance on Technical Data, Contractor may not rely upon or make any claim against Owner or Engineer, or any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors, with respect to:
    - 1. the completeness of such reports and drawings for Contractor's purposes, including, but not limited to, any aspects of the means, methods, techniques, sequences, and procedures of construction to be employed by Contractor, and safety precautions and programs incident thereto; or
    - 2. other data, interpretations, opinions, and information contained in such reports or shown or indicated in such drawings; or
    - 3. any Contractor interpretation of or conclusion drawn from any Technical Data or any such other data, interpretations, opinions, or information.

# 5.04 Differing Subsurface or Physical Conditions

- A. *Notice by Contractor*: If Contractor believes that any subsurface or physical condition that is uncovered or revealed at the Site either:
  - 1. is of such a nature as to establish that any Technical Data on which Contractor is entitled to rely as provided in Paragraph 5.03 is materially inaccurate; or
  - 2. is of such a nature as to require a change in the Drawings or Specifications; or
  - 3. differs materially from that shown or indicated in the Contract Documents; or
  - 4. is of an unusual nature, and differs materially from conditions ordinarily encountered and generally recognized as inherent in work of the character provided for in the Contract Documents;

then Contractor shall, promptly after becoming aware thereof and before further disturbing the subsurface or physical conditions or performing any Work in connection therewith (except in an emergency as required by Paragraph 7.15), notify Owner and Engineer in writing about such condition. Contractor shall not further disturb such condition or perform any Work in connection therewith (except with respect to an emergency) until receipt of a written statement permitting Contractor to do so.

- B. *Engineer's Review*: After receipt of written notice as required by the preceding paragraph, Engineer will promptly review the subsurface or physical condition in question; determine the necessity of Owner's obtaining additional exploration or tests with respect to the condition; conclude whether the condition falls within any one or more of the differing site condition categories in Paragraph 5.04.A above; obtain any pertinent cost or schedule information from Contractor; prepare recommendations to Owner regarding the Contractor's resumption of Work in connection with the subsurface or physical condition in question and the need for any change in the Drawings or Specifications; and advise Owner in writing of Engineer's findings, conclusions, and recommendations.
- C. Owner's Statement to Contractor Regarding Site Condition: After receipt of Engineer's written findings, conclusions, and recommendations, Owner shall issue a written statement to Contractor (with a copy to Engineer) regarding the subsurface or physical condition in question, addressing the resumption of Work in connection with such condition, indicating whether any change in the Drawings or Specifications will be made, and adopting or rejecting Engineer's written findings, conclusions, and recommendations, in whole or in part.
- D. Possible Price and Times Adjustments:
  - 1. Contractor shall be entitled to an equitable adjustment in Contract Price or Contract Times, or both, to the extent that the existence of a differing subsurface or physical condition, or any related delay, disruption, or interference, causes an increase or decrease in Contractor's cost of, or time required for, performance of the Work; subject, however, to the following:
    - a. such condition must fall within any one or more of the categories described in Paragraph 5.04.A;
    - b. with respect to Work that is paid for on a unit price basis, any adjustment in Contract Price will be subject to the provisions of Paragraph 13.03; and,

- c. Contractor's entitlement to an adjustment of the Contract Times is conditioned on such adjustment being essential to Contractor's ability to complete the Work within the Contract Times.
- 2. Contractor shall not be entitled to any adjustment in the Contract Price or Contract Times with respect to a subsurface or physical condition if:
  - a. Contractor knew of the existence of such condition at the time Contractor made a commitment to Owner with respect to Contract Price and Contract Times by the submission of a Bid or becoming bound under a negotiated contract, or otherwise; or
  - b. the existence of such condition reasonably could have been discovered or revealed as a result of any examination, investigation, exploration, test, or study of the Site and contiguous areas expressly required by the Bidding Requirements or Contract Documents to be conducted by or for Contractor prior to Contractor's making such commitment; or
  - c. Contractor failed to give the written notice as required by Paragraph 5.04.A.
- 3. If Owner and Contractor agree regarding Contractor's entitlement to and the amount or extent of any adjustment in the Contract Price or Contract Times, or both, then any such adjustment shall be set forth in a Change Order.
- 4. Contractor may submit a Change Proposal regarding its entitlement to or the amount or extent of any adjustment in the Contract Price or Contract Times, or both, no later than 30 days after Owner's issuance of the Owner's written statement to Contractor regarding the subsurface or physical condition in question.

# 5.05 Underground Facilities

- A. *Contractor's Responsibilities*: The information and data shown or indicated in the Contract Documents with respect to existing Underground Facilities at or adjacent to the Site is based on information and data furnished to Owner or Engineer by the owners of such Underground Facilities, including Owner, or by others. Unless it is otherwise expressly provided in the Supplementary Conditions:
  - 1. Owner and Engineer do not warrant or guarantee the accuracy or completeness of any such information or data provided by others; and
  - 2. the cost of all of the following will be included in the Contract Price, and Contractor shall have full responsibility for:
    - a. reviewing and checking all information and data regarding existing Underground Facilities at the Site;
    - b. locating all Underground Facilities shown or indicated in the Contract Documents as being at the Site;
    - c. coordination of the Work with the owners (including Owner) of such Underground Facilities, during construction; and
    - d. the safety and protection of all existing Underground Facilities at the Site, and repairing any damage thereto resulting from the Work.
- B. *Notice by Contractor*: If Contractor believes that an Underground Facility that is uncovered or revealed at the Site was not shown or indicated in the Contract Documents, or was not shown or indicated with reasonable accuracy, then Contractor shall, promptly after

becoming aware thereof and before further disturbing conditions affected thereby or performing any Work in connection therewith (except in an emergency as required by Paragraph 7.15), identify the owner of such Underground Facility and give written notice to that owner and to Owner and Engineer.

- C. Engineer's Review: Engineer will promptly review the Underground Facility and conclude whether such Underground Facility was not shown or indicated in the Contract Documents, or was not shown or indicated with reasonable accuracy; obtain any pertinent cost or schedule information from Contractor; prepare recommendations to Owner regarding the Contractor's resumption of Work in connection with the Underground Facility in question; determine the extent, if any, to which a change is required in the Drawings or Specifications to reflect and document the consequences of the existence or location of the Underground Facility; and advise Owner in writing of Engineer's findings, conclusions, and recommendations. During such time, Contractor shall be responsible for the safety and protection of such Underground Facility.
- D. Owner's Statement to Contractor Regarding Underground Facility: After receipt of Engineer's written findings, conclusions, and recommendations, Owner shall issue a written statement to Contractor (with a copy to Engineer) regarding the Underground Facility in question, addressing the resumption of Work in connection with such Underground Facility, indicating whether any change in the Drawings or Specifications will be made, and adopting or rejecting Engineer's written findings, conclusions, and recommendations in whole or in part.
- E. *Possible Price and Times Adjustments*:
  - Contractor shall be entitled to an equitable adjustment in the Contract Price or Contract Times, or both, to the extent that any existing Underground Facility at the Site that was not shown or indicated in the Contract Documents, or was not shown or indicated with reasonable accuracy, or any related delay, disruption, or interference, causes an increase or decrease in Contractor's cost of, or time required for, performance of the Work; subject, however, to the following:
    - a. Contractor did not know of and could not reasonably have been expected to be aware of or to have anticipated the existence or actual location of the Underground Facility in question;
    - b. With respect to Work that is paid for on a unit price basis, any adjustment in Contract Price will be subject to the provisions of Paragraph 13.03;
    - c. Contractor's entitlement to an adjustment of the Contract Times is conditioned on such adjustment being essential to Contractor's ability to complete the Work within the Contract Times; and
    - d. Contractor gave the notice required in Paragraph 5.05.B.
  - 2. If Owner and Contractor agree regarding Contractor's entitlement to and the amount or extent of any adjustment in the Contract Price or Contract Times, or both, then any such adjustment shall be set forth in a Change Order.
  - 3. Contractor may submit a Change Proposal regarding its entitlement to or the amount or extent of any adjustment in the Contract Price or Contract Times, or both, no later than 30 days after Owner's issuance of the Owner's written statement to Contractor regarding the Underground Facility in question.

#### 5.06 Hazardous Environmental Conditions at Site

- A. *Reports and Drawings*: The Supplementary Conditions identify:
  - 1. those reports and drawings known to Owner relating to Hazardous Environmental Conditions that have been identified at or adjacent to the Site; and
  - 2. Technical Data contained in such reports and drawings.
- B. Reliance by Contractor on Technical Data Authorized: Contractor may rely upon the accuracy of the Technical Data expressly identified in the Supplementary Conditions with respect to such reports and drawings, but such reports and drawings are not Contract Documents. If no such express identification has been made, then Contractor may rely on the accuracy of the Technical Data (as defined in Article 1) contained in any geotechnical or environmental report prepared for the Project and made available to Contractor. Except for such reliance on Technical Data, Contractor may not rely upon or make any claim against Owner or Engineer, or any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors with respect to:
  - 1. the completeness of such reports and drawings for Contractor's purposes, including, but not limited to, any aspects of the means, methods, techniques, sequences and procedures of construction to be employed by Contractor and safety precautions and programs incident thereto; or
  - 2. other data, interpretations, opinions and information contained in such reports or shown or indicated in such drawings; or
  - 3. any Contractor interpretation of or conclusion drawn from any Technical Data or any such other data, interpretations, opinions or information.
- C. Contractor shall not be responsible for removing or remediating any Hazardous Environmental Condition encountered, uncovered, or revealed at the Site unless such removal or remediation is expressly identified in the Contract Documents to be within the scope of the Work.
- D. Contractor shall be responsible for controlling, containing, and duly removing all Constituents of Concern brought to the Site by Contractor, Subcontractors, Suppliers, or anyone else for whom Contractor is responsible, and for any associated costs; and for the costs of removing and remediating any Hazardous Environmental Condition created by the presence of any such Constituents of Concern.
- E. If Contractor encounters, uncovers, or reveals a Hazardous Environmental Condition whose removal or remediation is not expressly identified in the Contract Documents as being within the scope of the Work, or if Contractor or anyone for whom Contractor is responsible creates a Hazardous Environmental Condition, then Contractor shall immediately: (1) secure or otherwise isolate such condition; (2) stop all Work in connection with such condition and in any area affected thereby (except in an emergency as required by Paragraph 7.15); and (3) notify Owner and Engineer (and promptly thereafter confirm such notice in writing). Owner shall promptly consult with Engineer concerning the necessity for Owner to retain a gualified expert to evaluate such condition or take corrective action, if any. Promptly after consulting with Engineer, Owner shall take such actions as are necessary to permit Owner to timely obtain required permits and provide Contractor the written notice required by Paragraph 5.06.F. If Contractor or anyone for whom Contractor is responsible created the Hazardous Environmental Condition in question, then Owner may remove and remediate the Hazardous Environmental Condition, and impose a set-off against payments to account for the associated costs.

- F. Contractor shall not resume Work in connection with such Hazardous Environmental Condition or in any affected area until after Owner has obtained any required permits related thereto, and delivered written notice to Contractor either (1) specifying that such condition and any affected area is or has been rendered safe for the resumption of Work, or (2) specifying any special conditions under which such Work may be resumed safely.
- G. If Owner and Contractor cannot agree as to entitlement to or on the amount or extent, if any, of any adjustment in Contract Price or Contract Times, or both, as a result of such Work stoppage or such special conditions under which Work is agreed to be resumed by Contractor, then within 30 days of Owner's written notice regarding the resumption of Work, Contractor may submit a Change Proposal, or Owner may impose a set-off.
- H. If after receipt of such written notice Contractor does not agree to resume such Work based on a reasonable belief it is unsafe, or does not agree to resume such Work under such special conditions, then Owner may order the portion of the Work that is in the area affected by such condition to be deleted from the Work, following the contractual change procedures in Article 11. Owner may have such deleted portion of the Work performed by Owner's own forces or others in accordance with Article 8.
- I. To the fullest extent permitted by Laws and Regulations, Owner shall indemnify and hold harmless Contractor, Subcontractors, and Engineer, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to a Hazardous Environmental Condition, provided that such Hazardous Environmental Condition (1) was not shown or indicated in the Drawings, Specifications, or other Contract Documents, identified as Technical Data entitled to limited reliance pursuant to Paragraph 5.06.B, or identified in the Contract Documents to be included within the scope of the Work, and (2) was not created by Contractor or by anyone for whom Contractor is responsible. Nothing in this Paragraph 5.06.H shall obligate Owner to indemnify any individual or entity from and against the consequences of that individual's or entity's own negligence.
- J. To the fullest extent permitted by Laws and Regulations, Contractor shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to the failure to control, contain, or remove a Constituent of Concern brought to the Site by Contractor or by anyone for whom Contractor is responsible, or to a Hazardous Environmental Condition created by Contractor or by anyone for whom Contractor to indemnify any individual or entity from and against the consequences of that individual's or entity's own negligence.
- K. The provisions of Paragraphs 5.03, 5.04, and 5.05 do not apply to the presence of Constituents of Concern or to a Hazardous Environmental Condition uncovered or revealed at the Site.

#### **ARTICLE 6 – BONDS AND INSURANCE**

# 6.01 *Performance, Payment, and Other Bonds*

- A. Contractor shall furnish a performance bond and a payment bond, each in an amount at least equal to the Contract Price, as security for the faithful performance and payment of all of Contractor's obligations under the Contract. These bonds shall remain in effect until one year after the date when final payment becomes due or until completion of the correction period specified in Paragraph 15.08, whichever is later, except as provided otherwise by Laws or Regulations, the Supplementary Conditions, or other specific provisions of the Contract. Contractor shall also furnish such other bonds as are required by the Supplementary Conditions or other specific provisions of the Contract.
- B. All bonds shall be in the form prescribed by the Contract except as provided otherwise by Laws or Regulations, and shall be executed by such sureties as are named in "Companies Holding Certificates of Authority as Acceptable Sureties on Federal Bonds and as Acceptable Reinsuring Companies" as published in Circular 570 (as amended and supplemented) by the Financial Management Service, Surety Bond Branch, U.S. Department of the Treasury. A bond signed by an agent or attorney-in-fact must be accompanied by a certified copy of that individual's authority to bind the surety. The evidence of authority shall show that it is effective on the date the agent or attorney-in-fact signed the accompanying bond.
- C. Contractor shall obtain the required bonds from surety companies that are duly licensed or authorized in the jurisdiction in which the Project is located to issue bonds in the required amounts.
- D. If the surety on a bond furnished by Contractor is declared bankrupt or becomes insolvent, or its right to do business is terminated in any state or jurisdiction where any part of the Project is located, or the surety ceases to meet the requirements above, then Contractor shall promptly notify Owner and Engineer and shall, within 20 days after the event giving rise to such notification, provide another bond and surety, both of which shall comply with the bond and surety requirements above.
- E. If Contractor has failed to obtain a required bond, Owner may exclude the Contractor from the Site and exercise Owner's termination rights under Article 16.
- F. Upon request, Owner shall provide a copy of the payment bond to any Subcontractor, Supplier, or other person or entity claiming to have furnished labor or materials used in the performance of the Work.
- 6.02 Insurance—General Provisions
  - A. Owner and Contractor shall obtain and maintain insurance as required in this Article and in the Supplementary Conditions.
  - B. All insurance required by the Contract to be purchased and maintained by Owner or Contractor shall be obtained from insurance companies that are duly licensed or authorized, in the state or jurisdiction in which the Project is located, to issue insurance policies for the required limits and coverages. Unless a different standard is indicated in the Supplementary Conditions, all companies that provide insurance policies required under this Contract shall have an A.M. Best rating of A-VII or better.
  - C. Contractor shall deliver to Owner, with copies to each named insured and additional insured (as identified in this Article, in the Supplementary Conditions, or elsewhere in the Contract), certificates of insurance establishing that Contractor has obtained and is

maintaining the policies, coverages, and endorsements required by the Contract. Upon request by Owner or any other insured, Contractor shall also furnish other evidence of such required insurance, including but not limited to copies of policies and endorsements, and documentation of applicable self-insured retentions and deductibles. Contractor may block out (redact) any confidential premium or pricing information contained in any policy or endorsement furnished under this provision.

- D. Owner shall deliver to Contractor, with copies to each named insured and additional insured (as identified in this Article, the Supplementary Conditions, or elsewhere in the Contract), certificates of insurance establishing that Owner has obtained and is maintaining the policies, coverages, and endorsements required of Owner by the Contract (if any). Upon request by Contractor or any other insured, Owner shall also provide other evidence of such required insurance (if any), including but not limited to copies of policies and endorsements, and documentation of applicable self-insured retentions and deductibles. Owner may block out (redact) any confidential premium or pricing information contained in any policy or endorsement furnished under this provision.
- E. Failure of Owner or Contractor to demand such certificates or other evidence of the other party's full compliance with these insurance requirements, or failure of Owner or Contractor to identify a deficiency in compliance from the evidence provided, shall not be construed as a waiver of the other party's obligation to obtain and maintain such insurance.
- F. If either party does not purchase or maintain all of the insurance required of such party by the Contract, such party shall notify the other party in writing of such failure to purchase prior to the start of the Work, or of such failure to maintain prior to any change in the required coverage.
- G. If Contractor has failed to obtain and maintain required insurance, Owner may exclude the Contractor from the Site, impose an appropriate set-off against payment, and exercise Owner's termination rights under Article 16.
- H. Without prejudice to any other right or remedy, if a party has failed to obtain required insurance, the other party may elect to obtain equivalent insurance to protect such other party's interests at the expense of the party who was required to provide such coverage, and the Contract Price shall be adjusted accordingly.
- I. Owner does not represent that insurance coverage and limits established in this Contract necessarily will be adequate to protect Contractor or Contractor's interests.
- J. The insurance and insurance limits required herein shall not be deemed as a limitation on Contractor's liability under the indemnities granted to Owner and other individuals and entities in the Contract.
- 6.03 *Contractor's Insurance* 
  - A. *Workers' Compensation*: Contractor shall purchase and maintain workers' compensation and employer's liability insurance for:
    - 1. claims under workers' compensation, disability benefits, and other similar employee benefit acts.
    - 2. United States Longshoreman and Harbor Workers' Compensation Act and Jones Act coverage (if applicable).
    - 3. claims for damages because of bodily injury, occupational sickness or disease, or death of Contractor's employees (by stop-gap endorsement in monopolist worker's compensation states).

- 4. Foreign voluntary worker compensation (if applicable).
- B. *Commercial General Liability—Claims Covered*: Contractor shall purchase and maintain commercial general liability insurance, covering all operations by or on behalf of Contractor, on an occurrence basis, against:
  - 1. claims for damages because of bodily injury, sickness or disease, or death of any person other than Contractor's employees.
  - 2. claims for damages insured by reasonably available personal injury liability coverage.
  - 3. claims for damages, other than to the Work itself, because of injury to or destruction of tangible property wherever located, including loss of use resulting therefrom.
- C. *Commercial General Liability—Form and Content*: Contractor's commercial liability policy shall be written on a 1996 (or later) ISO commercial general liability form (occurrence form) and include the following coverages and endorsements:
  - 1. Products and completed operations coverage:
    - a. Such insurance shall be maintained for three years after final payment.
    - b. Contractor shall furnish Owner and each other additional insured (as identified in the Supplementary Conditions or elsewhere in the Contract) evidence of continuation of such insurance at final payment and three years thereafter.
  - 2. Blanket contractual liability coverage, to the extent permitted by law, including but not limited to coverage of Contractor's contractual indemnity obligations in Paragraph 7.18.
  - 3. Broad form property damage coverage.
  - 4. Severability of interest.
  - 5. Underground, explosion, and collapse coverage.
  - 6. Personal injury coverage.
  - 7. Additional insured endorsements that include both ongoing operations and products and completed operations coverage through ISO Endorsements CG 20 10 10 01 and CG 20 37 10 01 (together); or CG 20 10 07 04 and CG 20 37 07 04 (together); or their equivalent.
  - 8. For design professional additional insureds, ISO Endorsement CG 20 32 07 04, "Additional Insured—Engineers, Architects or Surveyors Not Engaged by the Named Insured" or its equivalent.
- D. Automobile liability: Contractor shall purchase and maintain automobile liability insurance against claims for damages because of bodily injury or death of any person or property damage arising out of the ownership, maintenance, or use of any motor vehicle. The automobile liability policy shall be written on an occurrence basis.
- E. Umbrella or excess liability: Contractor shall purchase and maintain umbrella or excess liability insurance written over the underlying employer's liability, commercial general liability, and automobile liability insurance described in the paragraphs above. Subject to industry-standard exclusions, the coverage afforded shall follow form as to each and every one of the underlying policies.
- F. *Contractor's pollution liability insurance*: Contractor shall purchase and maintain a policy covering third-party injury and property damage claims, including clean-up costs, as a result

of pollution conditions arising from Contractor's operations and completed operations. This insurance shall be maintained for no less than three years after final completion.

- G. Additional insureds: The Contractor's commercial general liability, automobile liability, umbrella or excess, and pollution liability policies shall include and list as additional insureds Owner and Engineer, and any individuals or entities identified in the Supplementary Conditions; include coverage for the respective officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of all such additional insureds; and the insurance afforded to these additional insureds shall provide primary coverage for all claims covered thereby (including as applicable those arising from both ongoing and completed operations) on a non-contributory basis. Contractor shall obtain all necessary endorsements to support these requirements.
- H. *Contractor's professional liability insurance*: If Contractor will provide or furnish professional services under this Contract, through a delegation of professional design services or otherwise, then Contractor shall be responsible for purchasing and maintaining applicable professional liability insurance. This insurance shall provide protection against claims arising out of performance of professional design or related services, and caused by a negligent error, omission, or act for which the insured party is legally liable. It shall be maintained throughout the duration of the Contract and for a minimum of two years after Substantial Completion. If such professional design services are performed by a Subcontractor, and not by Contractor itself, then the requirements of this paragraph may be satisfied through the purchasing and maintenance of such insurance by such Subcontractor.
- I. *General provisions*: The policies of insurance required by this Paragraph 6.03 shall:
  - 1. include at least the specific coverages provided in this Article.
  - 2. be written for not less than the limits of liability provided in this Article and in the Supplementary Conditions, or required by Laws or Regulations, whichever is greater.
  - 3. contain a provision or endorsement that the coverage afforded will not be canceled, materially changed, or renewal refused until at least 10 days prior written notice has been given to Contractor. Within three days of receipt of any such written notice, Contractor shall provide a copy of the notice to Owner, Engineer, and each other insured under the policy.
  - 4. remain in effect at least until final payment (and longer if expressly required in this Article) and at all times thereafter when Contractor may be correcting, removing, or replacing defective Work as a warranty or correction obligation, or otherwise, or returning to the Site to conduct other tasks arising from the Contract Documents.
  - 5. be appropriate for the Work being performed and provide protection from claims that may arise out of or result from Contractor's performance of the Work and Contractor's other obligations under the Contract Documents, whether it is to be performed by Contractor, any Subcontractor or Supplier, or by anyone directly or indirectly employed by any of them to perform any of the Work, or by anyone for whose acts any of them may be liable.
- J. The coverage requirements for specific policies of insurance must be met by such policies, and not by reference to excess or umbrella insurance provided in other policies.

# 6.04 Owner's Liability Insurance

- A. In addition to the insurance required to be provided by Contractor under Paragraph 6.03, Owner, at Owner's option, may purchase and maintain at Owner's expense Owner's own liability insurance as will protect Owner against claims which may arise from operations under the Contract Documents.
- B. Owner's liability policies, if any, operate separately and independently from policies required to be provided by Contractor, and Contractor cannot rely upon Owner's liability policies for any of Contractor's obligations to the Owner, Engineer, or third parties.

# 6.05 *Property Insurance*

- A. *Builder's Risk*: Unless otherwise provided in the Supplementary Conditions, Contractor shall purchase and maintain builder's risk insurance upon the Work on a completed value basis, in the amount of the full insurable replacement cost thereof (subject to such deductible amounts as may be provided in the Supplementary Conditions or required by Laws and Regulations). This insurance shall:
  - include the Owner and Contractor as named insureds, and all Subcontractors, and any individuals or entities required by the Supplementary Conditions to be insured under such builder's risk policy, as insureds or named insureds. For purposes of the remainder of this Paragraph 6.05, Paragraphs 6.06 and 6.07, and any corresponding Supplementary Conditions, the parties required to be insured shall collectively be referred to as "insureds."
  - 2. be written on a builder's risk "all risk" policy form that shall at least include insurance for physical loss or damage to the Work, temporary buildings, falsework, and materials and equipment in transit, and shall insure against at least the following perils or causes of loss: fire; lightning; windstorm; riot; civil commotion; terrorism; vehicle impact; aircraft; smoke; theft; vandalism and malicious mischief; mechanical breakdown, boiler explosion, and artificially generated electric current; earthquake; volcanic activity, and other earth movement; flood; collapse; explosion; debris removal; demolition occasioned by enforcement of Laws and Regulations; water damage (other than that caused by flood); and such other perils or causes of loss as may be specifically required by the Supplementary Conditions. If insurance against mechanical breakdown, boiler explosion, and artificially generated electric current; earthquake; volcanic activity, and other earth movement; or flood, are not commercially available under builder's risk policies, by endorsement or otherwise, such insurance may be provided through other insurance policies acceptable to Owner and Contractor.
  - 3. cover, as insured property, at least the following: (a) the Work and all materials, supplies, machinery, apparatus, equipment, fixtures, and other property of a similar nature that are to be incorporated into or used in the preparation, fabrication, construction, erection, or completion of the Work, including Owner-furnished or assigned property; (b) spare parts inventory required within the scope of the Contract; and (c) temporary works which are not intended to form part of the permanent constructed Work but which are intended to provide working access to the Site, or to the Work under construction, or which are intended to provide temporary support for the Work under construction, including scaffolding, form work, fences, shoring, falsework, and temporary structures.
  - 4. cover expenses incurred in the repair or replacement of any insured property (including but not limited to fees and charges of engineers and architects).

- 5. extend to cover damage or loss to insured property while in temporary storage at the Site or in a storage location outside the Site (but not including property stored at the premises of a manufacturer or Supplier).
- 6. extend to cover damage or loss to insured property while in transit.
- 7. allow for partial occupation or use of the Work by Owner, such that those portions of the Work that are not yet occupied or used by Owner shall remain covered by the builder's risk insurance.
- 8. allow for the waiver of the insurer's subrogation rights, as set forth below.
- 9. provide primary coverage for all losses and damages caused by the perils or causes of loss covered.
- 10. not include a co-insurance clause.
- 11. include an exception for ensuing losses from physical damage or loss with respect to any defective workmanship, design, or materials exclusions.
- 12. include performance/hot testing and start-up.
- 13. be maintained in effect, subject to the provisions herein regarding Substantial Completion and partial occupancy or use of the Work by Owner, until the Work is complete.
- B. Notice of Cancellation or Change: All the policies of insurance (and the certificates or other evidence thereof) required to be purchased and maintained in accordance with this Paragraph 6.05 will contain a provision or endorsement that the coverage afforded will not be canceled or materially changed or renewal refused until at least 10 days prior written notice has been given to the purchasing policyholder. Within three days of receipt of any such written notice, the purchasing policyholder shall provide a copy of the notice to each other insured.
- C. *Deductibles*: The purchaser of any required builder's risk or property insurance shall pay for costs not covered because of the application of a policy deductible.
- D. Partial Occupancy or Use by Owner: If Owner will occupy or use a portion or portions of the Work prior to Substantial Completion of all the Work as provided in Paragraph 15.04, then Owner (directly, if it is the purchaser of the builder's risk policy, or through Contractor) will provide notice of such occupancy or use to the builder's risk insurer. The builder's risk insurance shall not be canceled or permitted to lapse on account of any such partial use or occupancy; rather, those portions of the Work that are occupied or used by Owner may come off the builder's risk policy, while those portions of the Work not yet occupied or used by Owner shall remain covered by the builder's risk insurance.
- E. *Additional Insurance*: If Contractor elects to obtain other special insurance to be included in or supplement the builder's risk or property insurance policies provided under this Paragraph 6.05, it may do so at Contractor's expense.
- F. Insurance of Other Property: If the express insurance provisions of the Contract do not require or address the insurance of a property item or interest, such as tools, construction equipment, or other personal property owned by Contractor, a Subcontractor, or an employee of Contractor or a Subcontractor, then the entity or individual owning such property item will be responsible for deciding whether to insure it, and if so in what amount.

# 6.06 Waiver of Rights

- A. All policies purchased in accordance with Paragraph 6.05, expressly including the builder's risk policy, shall contain provisions to the effect that in the event of payment of any loss or damage the insurers will have no rights of recovery against any insureds thereunder, or against Engineer or its consultants, or their officers, directors, members, partners, employees, agents, consultants, or subcontractors. Owner and Contractor waive all rights against each other and the respective officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, for all losses and damages caused by, arising out of, or resulting from any of the perils or causes of loss covered by such policies and any other property insurance applicable to the Work; and, in addition, waive all such rights against Engineer, its consultants, all Subcontractors, all individuals or entities identified in the Supplementary Conditions as insureds, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, under such policies for losses and damages so caused. None of the above waivers shall extend to the rights that any party making such waiver may have to the proceeds of insurance held by Owner or Contractor as trustee or fiduciary, or otherwise payable under any policy so issued.
- B. Owner waives all rights against Contractor, Subcontractors, and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them, for:
  - 1. loss due to business interruption, loss of use, or other consequential loss extending beyond direct physical loss or damage to Owner's property or the Work caused by, arising out of, or resulting from fire or other perils whether or not insured by Owner; and
  - 2. loss or damage to the completed Project or part thereof caused by, arising out of, or resulting from fire or other insured peril or cause of loss covered by any property insurance maintained on the completed Project or part thereof by Owner during partial occupancy or use pursuant to Paragraph 15.04, after Substantial Completion pursuant to Paragraph 15.03, or after final payment pursuant to Paragraph 15.06.
- C. Any insurance policy maintained by Owner covering any loss, damage or consequential loss referred to in Paragraph 6.06.B shall contain provisions to the effect that in the event of payment of any such loss, damage, or consequential loss, the insurers will have no rights of recovery against Contractor, Subcontractors, or Engineer, or the officers, directors, members, partners, employees, agents, consultants, or subcontractors of each and any of them.
- D. Contractor shall be responsible for assuring that the agreement under which a Subcontractor performs a portion of the Work contains provisions whereby the Subcontractor waives all rights against Owner, Contractor, all individuals or entities identified in the Supplementary Conditions as insureds, the Engineer and its consultants, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, for all losses and damages caused by, arising out of, relating to, or resulting from any of the perils or causes of loss covered by builder's risk insurance and any other property insurance applicable to the Work.

# 6.07 Receipt and Application of Property Insurance Proceeds

A. Any insured loss under the builder's risk and other policies of insurance required by Paragraph 6.05 will be adjusted and settled with the named insured that purchased the

policy. Such named insured shall act as fiduciary for the other insureds, and give notice to such other insureds that adjustment and settlement of a claim is in progress. Any other insured may state its position regarding a claim for insured loss in writing within 15 days after notice of such claim.

- B. Proceeds for such insured losses may be made payable by the insurer either jointly to multiple insureds, or to the named insured that purchased the policy in its own right and as fiduciary for other insureds, subject to the requirements of any applicable mortgage clause. A named insured receiving insurance proceeds under the builder's risk and other policies of insurance required by Paragraph 6.05 shall distribute such proceeds in accordance with such agreement as the parties in interest may reach, or as otherwise required under the dispute resolution provisions of this Contract or applicable Laws and Regulations.
- C. If no other special agreement is reached, the damaged Work shall be repaired or replaced, the money so received applied on account thereof, and the Work and the cost thereof covered by Change Order, if needed.

# **ARTICLE 7 – CONTRACTOR'S RESPONSIBILITIES**

# 7.01 Supervision and Superintendence

- A. Contractor shall supervise, inspect, and direct the Work competently and efficiently, devoting such attention thereto and applying such skills and expertise as may be necessary to perform the Work in accordance with the Contract Documents. Contractor shall be solely responsible for the means, methods, techniques, sequences, and procedures of construction.
- B. At all times during the progress of the Work, Contractor shall assign a competent resident superintendent who shall not be replaced without written notice to Owner and Engineer except under extraordinary circumstances.
- 7.02 Labor; Working Hours
  - A. Contractor shall provide competent, suitably qualified personnel to survey and lay out the Work and perform construction as required by the Contract Documents. Contractor shall at all times maintain good discipline and order at the Site.
  - B. Except as otherwise required for the safety or protection of persons or the Work or property at the Site or adjacent thereto, and except as otherwise stated in the Contract Documents, all Work at the Site shall be performed during regular working hours, Monday through Friday. Contractor will not perform Work on a Saturday, Sunday, or any legal holiday. Contractor may perform Work outside regular working hours or on Saturdays, Sundays, or legal holidays only with Owner's written consent, which will not be unreasonably withheld.
- 7.03 Services, Materials, and Equipment
  - A. Unless otherwise specified in the Contract Documents, Contractor shall provide and assume full responsibility for all services, materials, equipment, labor, transportation, construction equipment and machinery, tools, appliances, fuel, power, light, heat, telephone, water, sanitary facilities, temporary facilities, and all other facilities and incidentals necessary for the performance, testing, start up, and completion of the Work, whether or not such items are specifically called for in the Contract Documents.
  - B. All materials and equipment incorporated into the Work shall be of good quality and new, except as otherwise provided in the Contract Documents. All special warranties and

guarantees required by the Specifications shall expressly run to the benefit of Owner. If required by Engineer, Contractor shall furnish satisfactory evidence (including reports of required tests) as to the source, kind, and quality of materials and equipment.

C. All materials and equipment shall be stored, applied, installed, connected, erected, protected, used, cleaned, and conditioned in accordance with instructions of the applicable Supplier, except as otherwise may be provided in the Contract Documents.

# 7.04 *"Or Equals"*

- A. Whenever an item of material or equipment is specified or described in the Contract Documents by using the name of a proprietary item or the name of a particular Supplier, the Contract Price has been based upon Contractor furnishing such item as specified. The specification or description of such an item is intended to establish the type, function, appearance, and quality required. Unless the specification or description contains or is followed by words reading that no like, equivalent, or "or equal" item is permitted, Contractor may request that Engineer authorize the use of other items of material or equipment, or items from other proposed suppliers under the circumstances described below.
  - 1. If Engineer in its sole discretion determines that an item of material or equipment proposed by Contractor is functionally equal to that named and sufficiently similar so that no change in related Work will be required, Engineer shall deem it an "or equal" item. For the purposes of this paragraph, a proposed item of material or equipment will be considered functionally equal to an item so named if:
    - a. in the exercise of reasonable judgment Engineer determines that:
      - 1) it is at least equal in materials of construction, quality, durability, appearance, strength, and design characteristics;
      - it will reliably perform at least equally well the function and achieve the results imposed by the design concept of the completed Project as a functioning whole;
      - 3) it has a proven record of performance and availability of responsive service; and
      - 4) it is not objectionable to Owner.
    - b. Contractor certifies that, if approved and incorporated into the Work:
      - 1) there will be no increase in cost to the Owner or increase in Contract Times; and
      - 2) it will conform substantially to the detailed requirements of the item named in the Contract Documents.
- B. *Contractor's Expense*: Contractor shall provide all data in support of any proposed "or equal" item at Contractor's expense.
- C. Engineer's Evaluation and Determination: Engineer will be allowed a reasonable time to evaluate each "or-equal" request. Engineer may require Contractor to furnish additional data about the proposed "or-equal" item. Engineer will be the sole judge of acceptability. No "or-equal" item will be ordered, furnished, installed, or utilized until Engineer's review is complete and Engineer determines that the proposed item is an "or-equal", which will be evidenced by an approved Shop Drawing or other written communication. Engineer will advise Contractor in writing of any negative determination.

- D. *Effect of Engineer's Determination*: Neither approval nor denial of an "or-equal" request shall result in any change in Contract Price. The Engineer's denial of an "or-equal" request shall be final and binding, and may not be reversed through an appeal under any provision of the Contract Documents.
- E. *Treatment as a Substitution Request*: If Engineer determines that an item of material or equipment proposed by Contractor does not qualify as an "or-equal" item, Contractor may request that Engineer considered the proposed item as a substitute pursuant to Paragraph 7.05.

## 7.05 Substitutes

- A. Unless the specification or description of an item of material or equipment required to be furnished under the Contract Documents contains or is followed by words reading that no substitution is permitted, Contractor may request that Engineer authorize the use of other items of material or equipment under the circumstances described below. To the extent possible such requests shall be made before commencement of related construction at the Site.
  - 1. Contractor shall submit sufficient information as provided below to allow Engineer to determine if the item of material or equipment proposed is functionally equivalent to that named and an acceptable substitute therefor. Engineer will not accept requests for review of proposed substitute items of material or equipment from anyone other than Contractor.
  - 2. The requirements for review by Engineer will be as set forth in Paragraph 7.05.B, as supplemented by the Specifications, and as Engineer may decide is appropriate under the circumstances.
  - 3. Contractor shall make written application to Engineer for review of a proposed substitute item of material or equipment that Contractor seeks to furnish or use. The application:
    - a. shall certify that the proposed substitute item will:
      - 1) perform adequately the functions and achieve the results called for by the general design,
      - 2) be similar in substance to that specified, and
      - 3) be suited to the same use as that specified.
    - b. will state:
      - 1) the extent, if any, to which the use of the proposed substitute item will necessitate a change in Contract Times,
      - 2) whether use of the proposed substitute item in the Work will require a change in any of the Contract Documents (or in the provisions of any other direct contract with Owner for other work on the Project) to adapt the design to the proposed substitute item, and
      - 3) whether incorporation or use of the proposed substitute item in connection with the Work is subject to payment of any license fee or royalty.
    - c. will identify:
      - 1) all variations of the proposed substitute item from that specified, and

- 2) available engineering, sales, maintenance, repair, and replacement services.
- d. shall contain an itemized estimate of all costs or credits that will result directly or indirectly from use of such substitute item, including but not limited to changes in Contract Price, shared savings, costs of redesign, and claims of other contractors affected by any resulting change.
- B. *Engineer's Evaluation and Determination:* Engineer will be allowed a reasonable time to evaluate each substitute request, and to obtain comments and direction from Owner. Engineer may require Contractor to furnish additional data about the proposed substitute item. Engineer will be the sole judge of acceptability. No substitute will be ordered, furnished, installed, or utilized until Engineer's review is complete and Engineer determines that the proposed item is an acceptable substitute. Engineer's determination will be evidenced by a Field Order or a proposed Change Order accounting for the substitution itself and all related impacts, including changes in Contract Price or Contract Times. Engineer will advise Contractor in writing of any negative determination.
- C. *Special Guarantee*: Owner may require Contractor to furnish at Contractor's expense a special performance guarantee or other surety with respect to any substitute.
- D. Reimbursement of Engineer's Cost: Engineer will record Engineer's costs in evaluating a substitute proposed or submitted by Contractor. Whether or not Engineer approves a substitute so proposed or submitted by Contractor, Contractor shall reimburse Owner for the reasonable charges of Engineer for evaluating each such proposed substitute. Contractor shall also reimburse Owner for the reasonable charges of Engineer for making changes in the Contract Documents (or in the provisions of any other direct contract with Owner) resulting from the acceptance of each proposed substitute.
- E. *Contractor's Expense*: Contractor shall provide all data in support of any proposed substitute at Contractor's expense.
- F. *Effect of Engineer's Determination*: If Engineer approves the substitution request, Contractor shall execute the proposed Change Order and proceed with the substitution. The Engineer's denial of a substitution request shall be final and binding, and may not be reversed through an appeal under any provision of the Contract Documents. Contractor may challenge the scope of reimbursement costs imposed under Paragraph 7.05.D, by timely submittal of a Change Proposal.

# 7.06 Concerning Subcontractors, Suppliers, and Others

- A. Contractor may retain Subcontractors and Suppliers for the performance of parts of the Work. Such Subcontractors and Suppliers must be acceptable to Owner.
- B. Contractor shall retain specific Subcontractors, Suppliers, or other individuals or entities for the performance of designated parts of the Work if required by the Contract to do so.
- C. Subsequent to the submittal of Contractor's Bid or final negotiation of the terms of the Contract, Owner may not require Contractor to retain any Subcontractor, Supplier, or other individual or entity to furnish or perform any of the Work against which Contractor has reasonable objection.
- D. Prior to entry into any binding subcontract or purchase order, Contractor shall submit to Owner the identity of the proposed Subcontractor or Supplier (unless Owner has already deemed such proposed Subcontractor or Supplier acceptable, during the bidding process or otherwise). Such proposed Subcontractor or Supplier shall be deemed acceptable to Owner unless Owner raises a substantive, reasonable objection within five days.

- E. Owner may require the replacement of any Subcontractor, Supplier, or other individual or entity retained by Contractor to perform any part of the Work. Owner also may require Contractor to retain specific replacements; provided, however, that Owner may not require a replacement to which Contractor has a reasonable objection. If Contractor has submitted the identity of certain Subcontractors, Suppliers, or other individuals or entities for acceptance by Owner, and Owner has accepted it (either in writing or by failing to make written objection thereto), then Owner may subsequently revoke the acceptance of any such Subcontractor, Supplier, or other individual or entity so identified solely on the basis of substantive, reasonable objection after due investigation. Contractor shall submit an acceptable replacement for the rejected Subcontractor, Supplier, or other individual or entity.
- F. If Owner requires the replacement of any Subcontractor, Supplier, or other individual or entity retained by Contractor to perform any part of the Work, then Contractor shall be entitled to an adjustment in Contract Price or Contract Times, or both, with respect to the replacement; and Contractor shall initiate a Change Proposal for such adjustment within 30 days of Owner's requirement of replacement.
- G. No acceptance by Owner of any such Subcontractor, Supplier, or other individual or entity, whether initially or as a replacement, shall constitute a waiver of the right of Owner to the completion of the Work in accordance with the Contract Documents.
- H. On a monthly basis Contractor shall submit to Engineer a complete list of all Subcontractors and Suppliers having a direct contract with Contractor, and of all other Subcontractors and Suppliers known to Contractor at the time of submittal.
- I. Contractor shall be fully responsible to Owner and Engineer for all acts and omissions of the Subcontractors, Suppliers, and other individuals or entities performing or furnishing any of the Work just as Contractor is responsible for Contractor's own acts and omissions.
- J. Contractor shall be solely responsible for scheduling and coordinating the work of Subcontractors, Suppliers, and all other individuals or entities performing or furnishing any of the Work.
- K. Contractor shall restrict all Subcontractors, Suppliers, and such other individuals or entities performing or furnishing any of the Work from communicating with Engineer or Owner, except through Contractor or in case of an emergency, or as otherwise expressly allowed herein.
- L. The divisions and sections of the Specifications and the identifications of any Drawings shall not control Contractor in dividing the Work among Subcontractors or Suppliers or delineating the Work to be performed by any specific trade.
- M. All Work performed for Contractor by a Subcontractor or Supplier shall be pursuant to an appropriate contractual agreement that specifically binds the Subcontractor or Supplier to the applicable terms and conditions of the Contract Documents for the benefit of Owner and Engineer.
- N. Owner may furnish to any Subcontractor or Supplier, to the extent practicable, information about amounts paid to Contractor on account of Work performed for Contractor by the particular Subcontractor or Supplier.

- O. Nothing in the Contract Documents:
  - 1. shall create for the benefit of any such Subcontractor, Supplier, or other individual or entity any contractual relationship between Owner or Engineer and any such Subcontractor, Supplier, or other individual or entity; nor
  - 2. shall create any obligation on the part of Owner or Engineer to pay or to see to the payment of any money due any such Subcontractor, Supplier, or other individual or entity except as may otherwise be required by Laws and Regulations.

#### 7.07 Patent Fees and Royalties

- A. Contractor shall pay all license fees and royalties and assume all costs incident to the use in the performance of the Work or the incorporation in the Work of any invention, design, process, product, or device which is the subject of patent rights or copyrights held by others. If a particular invention, design, process, product, or device is specified in the Contract Documents for use in the performance of the Work and if, to the actual knowledge of Owner or Engineer, its use is subject to patent rights or copyrights calling for the payment of any license fee or royalty to others, the existence of such rights shall be disclosed by Owner in the Contract Documents.
- B. To the fullest extent permitted by Laws and Regulations, Owner shall indemnify and hold harmless Contractor, and its officers, directors, members, partners, employees, agents, consultants, and subcontractors from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals, and all court or arbitration or other dispute resolution costs) arising out of or relating to any infringement of patent rights or copyrights incident to the use in the performance of the Work or resulting from the incorporation in the Work of any invention, design, process, product, or device specified in the Contract Documents, but not identified as being subject to payment of any license fee or royalty to others required by patent rights or copyrights.
- C. To the fullest extent permitted by Laws and Regulations, Contractor shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to any infringement of patent rights or copyrights incident to the use in the performance of the Work or resulting from the incorporation in the Work of any invention, design, process, product, or device not specified in the Contract Documents.

#### 7.08 Permits

A. Unless otherwise provided in the Contract Documents, Contractor shall obtain and pay for all construction permits and licenses. Owner shall assist Contractor, when necessary, in obtaining such permits and licenses. Contractor shall pay all governmental charges and inspection fees necessary for the prosecution of the Work which are applicable at the time of the submission of Contractor's Bid (or when Contractor became bound under a negotiated contract). Owner shall pay all charges of utility owners for connections for providing permanent service to the Work

# 7.09 *Taxes*

A. Contractor shall pay all sales, consumer, use, and other similar taxes required to be paid by Contractor in accordance with the Laws and Regulations of the place of the Project which are applicable during the performance of the Work.

# 7.10 *Laws and Regulations*

- A. Contractor shall give all notices required by and shall comply with all Laws and Regulations applicable to the performance of the Work. Except where otherwise expressly required by applicable Laws and Regulations, neither Owner nor Engineer shall be responsible for monitoring Contractor's compliance with any Laws or Regulations.
- B. If Contractor performs any Work or takes any other action knowing or having reason to know that it is contrary to Laws or Regulations, Contractor shall bear all resulting costs and losses, and shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such Work or other action. It shall not be Contractor's responsibility to make certain that the Work described in the Contract Documents is in accordance with Laws and Regulations, but this shall not relieve Contractor of Contractor's obligations under Paragraph 3.03.
- C. Owner or Contractor may give notice to the other party of any changes after the submission of Contractor's Bid (or after the date when Contractor became bound under a negotiated contract) in Laws or Regulations having an effect on the cost or time of performance of the Work, including but not limited to changes in Laws or Regulations having an effect on procuring permits and on sales, use, value-added, consumption, and other similar taxes. If Owner and Contractor are unable to agree on entitlement to or on the amount or extent, if any, of any adjustment in Contract Price or Contract Times resulting from such changes, then within 30 days of such notice Contractor may submit a Change Proposal, or Owner may initiate a Claim.

# 7.11 *Record Documents*

A. Contractor shall maintain in a safe place at the Site one printed record copy of all Drawings, Specifications, Addenda, Change Orders, Work Change Directives, Field Orders, written interpretations and clarifications, and approved Shop Drawings. Contractor shall keep such record documents in good order and annotate them to show changes made during construction. These record documents, together with all approved Samples, will be available to Engineer for reference. Upon completion of the Work, Contractor shall deliver these record documents to Engineer.

#### 7.12 Safety and Protection

- A. Contractor shall be solely responsible for initiating, maintaining, and supervising all safety precautions and programs in connection with the Work. Such responsibility does not relieve Subcontractors of their responsibility for the safety of persons or property in the performance of their work, nor for compliance with applicable safety Laws and Regulations. Contractor shall take all necessary precautions for the safety of, and shall provide the necessary protection to prevent damage, injury, or loss to:
  - 1. all persons on the Site or who may be affected by the Work;

- 2. all the Work and materials and equipment to be incorporated therein, whether in storage on or off the Site; and
- 3. other property at the Site or adjacent thereto, including trees, shrubs, lawns, walks, pavements, roadways, structures, other work in progress, utilities, and Underground Facilities not designated for removal, relocation, or replacement in the course of construction.
- B. Contractor shall comply with all applicable Laws and Regulations relating to the safety of persons or property, or to the protection of persons or property from damage, injury, or loss; and shall erect and maintain all necessary safeguards for such safety and protection. Contractor shall notify Owner; the owners of adjacent property, Underground Facilities, and other utilities; and other contractors and utility owners performing work at or adjacent to the Site, when prosecution of the Work may affect them, and shall cooperate with them in the protection, removal, relocation, and replacement of their property or work in progress.
- C. Contractor shall comply with the applicable requirements of Owner's safety programs, if any. The Supplementary Conditions identify any Owner's safety programs that are applicable to the Work.
- D. Contractor shall inform Owner and Engineer of the specific requirements of Contractor's safety program with which Owner's and Engineer's employees and representatives must comply while at the Site.
- E. All damage, injury, or loss to any property referred to in Paragraph 7.12.A.2 or 7.12.A.3 caused, directly or indirectly, in whole or in part, by Contractor, any Subcontractor, Supplier, or any other individual or entity directly or indirectly employed by any of them to perform any of the Work, or anyone for whose acts any of them may be liable, shall be remedied by Contractor at its expense (except damage or loss attributable to the fault of Drawings or Specifications or to the acts or omissions of Owner or Engineer or anyone employed by any of them, or anyone for whose acts any of them may be liable, and not attributable, directly or indirectly, in whole or in part, to the fault or negligence of Contractor or any Subcontractor, Supplier, or other individual or entity directly or indirectly employed by any of them).
- F. Contractor's duties and responsibilities for safety and protection shall continue until such time as all the Work is completed and Engineer has issued a notice to Owner and Contractor in accordance with Paragraph 15.06.B that the Work is acceptable (except as otherwise expressly provided in connection with Substantial Completion).
- G. Contractor's duties and responsibilities for safety and protection shall resume whenever Contractor or any Subcontractor or Supplier returns to the Site to fulfill warranty or correction obligations, or to conduct other tasks arising from the Contract Documents.

# 7.13 Safety Representative

A. Contractor shall designate a qualified and experienced safety representative at the Site whose duties and responsibilities shall be the prevention of accidents and the maintaining and supervising of safety precautions and programs.

# 7.14 Hazard Communication Programs

A. Contractor shall be responsible for coordinating any exchange of material safety data sheets or other hazard communication information required to be made available to or

exchanged between or among employers at the Site in accordance with Laws or Regulations.

- 7.15 Emergencies
  - A. In emergencies affecting the safety or protection of persons or the Work or property at the Site or adjacent thereto, Contractor is obligated to act to prevent threatened damage, injury, or loss. Contractor shall give Engineer prompt written notice if Contractor believes that any significant changes in the Work or variations from the Contract Documents have been caused thereby or are required as a result thereof. If Engineer determines that a change in the Contract Documents is required because of the action taken by Contractor in response to such an emergency, a Work Change Directive or Change Order will be issued.
- 7.16 Shop Drawings, Samples, and Other Submittals
  - A. Shop Drawing and Sample Submittal Requirements:
    - 1. Before submitting a Shop Drawing or Sample, Contractor shall have:
      - reviewed and coordinated the Shop Drawing or Sample with other Shop Drawings and Samples and with the requirements of the Work and the Contract Documents;
      - b. determined and verified all field measurements, quantities, dimensions, specified performance and design criteria, installation requirements, materials, catalog numbers, and similar information with respect thereto;
      - c. determined and verified the suitability of all materials and equipment offered with respect to the indicated application, fabrication, shipping, handling, storage, assembly, and installation pertaining to the performance of the Work; and
      - d. determined and verified all information relative to Contractor's responsibilities for means, methods, techniques, sequences, and procedures of construction, and safety precautions and programs incident thereto.
    - 2. Each submittal shall bear a stamp or specific written certification that Contractor has satisfied Contractor's obligations under the Contract Documents with respect to Contractor's review of that submittal, and that Contractor approves the submittal.
    - 3. With each submittal, Contractor shall give Engineer specific written notice of any variations that the Shop Drawing or Sample may have from the requirements of the Contract Documents. This notice shall be set forth in a written communication separate from the Shop Drawings or Sample submittal; and, in addition, in the case of Shop Drawings by a specific notation made on each Shop Drawing submitted to Engineer for review and approval of each such variation.
  - B. *Submittal Procedures for Shop Drawings and Samples*: Contractor shall submit Shop Drawings and Samples to Engineer for review and approval in accordance with the accepted Schedule of Submittals. Each submittal will be identified as Engineer may require.
    - 1. Shop Drawings:
      - a. Contractor shall submit the number of copies required in the Specifications.
      - b. Data shown on the Shop Drawings will be complete with respect to quantities, dimensions, specified performance and design criteria, materials, and similar data to show Engineer the services, materials, and equipment Contractor proposes to

provide and to enable Engineer to review the information for the limited purposes required by Paragraph 7.16.D.

- 2. Samples:
  - a. Contractor shall submit the number of Samples required in the Specifications.
  - b. Contractor shall clearly identify each Sample as to material, Supplier, pertinent data such as catalog numbers, the use for which intended and other data as Engineer may require to enable Engineer to review the submittal for the limited purposes required by Paragraph 7.16.D.
- 3. Where a Shop Drawing or Sample is required by the Contract Documents or the Schedule of Submittals, any related Work performed prior to Engineer's review and approval of the pertinent submittal will be at the sole expense and responsibility of Contractor.
- C. *Other Submittals*: Contractor shall submit other submittals to Engineer in accordance with the accepted Schedule of Submittals, and pursuant to the applicable terms of the Specifications.
- D. Engineer's Review:
  - 1. Engineer will provide timely review of Shop Drawings and Samples in accordance with the Schedule of Submittals acceptable to Engineer. Engineer's review and approval will be only to determine if the items covered by the submittals will, after installation or incorporation in the Work, conform to the information given in the Contract Documents and be compatible with the design concept of the completed Project as a functioning whole as indicated by the Contract Documents.
  - 2. Engineer's review and approval will not extend to means, methods, techniques, sequences, or procedures of construction or to safety precautions or programs incident thereto.
  - 3. Engineer's review and approval of a separate item as such will not indicate approval of the assembly in which the item functions.
  - 4. Engineer's review and approval of a Shop Drawing or Sample shall not relieve Contractor from responsibility for any variation from the requirements of the Contract Documents unless Contractor has complied with the requirements of Paragraph 7.16.A.3 and Engineer has given written approval of each such variation by specific written notation thereof incorporated in or accompanying the Shop Drawing or Sample. Engineer will document any such approved variation from the requirements of the Contract Documents in a Field Order.
  - 5. Engineer's review and approval of a Shop Drawing or Sample shall not relieve Contractor from responsibility for complying with the requirements of Paragraph 7.16.A and B.
  - 6. Engineer's review and approval of a Shop Drawing or Sample, or of a variation from the requirements of the Contract Documents, shall not, under any circumstances, change the Contract Times or Contract Price, unless such changes are included in a Change Order.
  - 7. Neither Engineer's receipt, review, acceptance or approval of a Shop Drawing, Sample, or other submittal shall result in such item becoming a Contract Document.

- 8. Contractor shall perform the Work in compliance with the requirements and commitments set forth in approved Shop Drawings and Samples, subject to the provisions of Paragraph 7.16.D.4.
- E. Resubmittal Procedures:
  - 1. Contractor shall make corrections required by Engineer and shall return the required number of corrected copies of Shop Drawings and submit, as required, new Samples for review and approval. Contractor shall direct specific attention in writing to revisions other than the corrections called for by Engineer on previous submittals.
  - 2. Contractor shall furnish required submittals with sufficient information and accuracy to obtain required approval of an item with no more than three submittals. Engineer will record Engineer's time for reviewing a fourth or subsequent submittal of a Shop Drawings, sample, or other item requiring approval, and Contractor shall be responsible for Engineer's charges to Owner for such time. Owner may impose a set-off against payments due to Contractor to secure reimbursement for such charges.
  - 3. If Contractor requests a change of a previously approved submittal item, Contractor shall be responsible for Engineer's charges to Owner for its review time, and Owner may impose a set-off against payments due to Contractor to secure reimbursement for such charges, unless the need for such change is beyond the control of Contractor.
- 7.17 Contractor's General Warranty and Guarantee
  - A. Contractor warrants and guarantees to Owner that all Work will be in accordance with the Contract Documents and will not be defective. Engineer and its officers, directors, members, partners, employees, agents, consultants, and subcontractors shall be entitled to rely on Contractor's warranty and guarantee.
  - B. Contractor's warranty and guarantee hereunder excludes defects or damage caused by:
    - 1. abuse, modification, or improper maintenance or operation by persons other than Contractor, Subcontractors, Suppliers, or any other individual or entity for whom Contractor is responsible; or
    - 2. normal wear and tear under normal usage.
  - C. Contractor's obligation to perform and complete the Work in accordance with the Contract Documents shall be absolute. None of the following will constitute an acceptance of Work that is not in accordance with the Contract Documents or a release of Contractor's obligation to perform the Work in accordance with the Contract Documents:
    - 1. observations by Engineer;
    - 2. recommendation by Engineer or payment by Owner of any progress or final payment;
    - 3. the issuance of a certificate of Substantial Completion by Engineer or any payment related thereto by Owner;
    - 4. use or occupancy of the Work or any part thereof by Owner;
    - 5. any review and approval of a Shop Drawing or Sample submittal;
    - 6. the issuance of a notice of acceptability by Engineer;
    - 7. any inspection, test, or approval by others; or
    - 8. any correction of defective Work by Owner.

D. If the Contract requires the Contractor to accept the assignment of a contract entered into by Owner, then the specific warranties, guarantees, and correction obligations contained in the assigned contract shall govern with respect to Contractor's performance obligations to Owner for the Work described in the assigned contract.

# 7.18 Indemnification

- A. To the fullest extent permitted by Laws and Regulations, and in addition to any other obligations of Contractor under the Contract or otherwise, Contractor shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to the performance of the Work, provided that any such claim, cost, loss, or damage is attributable to bodily injury, sickness, disease, or death, or to injury to or destruction of tangible property (other than the Work itself), including the loss of use resulting therefrom but only to the extent caused by any negligent act or omission of Contractor, any Subcontractor, any Supplier, or any individual or entity directly or indirectly employed by any of them to perform any of the Work or anyone for whose acts any of them may be liable.
- B. In any and all claims against Owner or Engineer or any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors by any employee (or the survivor or personal representative of such employee) of Contractor, any Subcontractor, any Supplier, or any individual or entity directly or indirectly employed by any of them to perform any of the Work, or anyone for whose acts any of them may be liable, the indemnification obligation under Paragraph 7.18.A shall not be limited in any way by any limitation on the amount or type of damages, compensation, or benefits payable by or for Contractor or any such Subcontractor, Supplier, or other individual or entity under workers' compensation acts, disability benefit acts, or other employee benefit acts.
- C. The indemnification obligations of Contractor under Paragraph 7.18.A shall not extend to the liability of Engineer and Engineer's officers, directors, members, partners, employees, agents, consultants and subcontractors arising out of:
  - 1. the preparation or approval of, or the failure to prepare or approve maps, Drawings, opinions, reports, surveys, Change Orders, designs, or Specifications; or
  - 2. giving directions or instructions, or failing to give them, if that is the primary cause of the injury or damage.

# 7.19 Delegation of Professional Design Services

- A. Contractor will not be required to provide professional design services unless such services are specifically required by the Contract Documents for a portion of the Work or unless such services are required to carry out Contractor's responsibilities for construction means, methods, techniques, sequences and procedures. Contractor shall not be required to provide professional services in violation of applicable Laws and Regulations.
- B. If professional design services or certifications by a design professional related to systems, materials, or equipment are specifically required of Contractor by the Contract Documents, Owner and Engineer will specify all performance and design criteria that such services must satisfy. Contractor shall cause such services or certifications to be provided by a properly licensed professional, whose signature and seal shall appear on all drawings, calculations, specifications, certifications, and other submittals prepared by such professional. Shop

Drawings and other submittals related to the Work designed or certified by such professional, if prepared by others, shall bear such professional's written approval when submitted to Engineer.

- C. Owner and Engineer shall be entitled to rely upon the adequacy, accuracy, and completeness of the services, certifications, or approvals performed by such design professionals, provided Owner and Engineer have specified to Contractor all performance and design criteria that such services must satisfy.
- D. Pursuant to this paragraph, Engineer's review and approval of design calculations and design drawings will be only for the limited purpose of checking for conformance with performance and design criteria given and the design concept expressed in the Contract Documents. Engineer's review and approval of Shop Drawings and other submittals (except design calculations and design drawings) will be only for the purpose stated in Paragraph 7.16.D.1.
- E. Contractor shall not be responsible for the adequacy of the performance or design criteria specified by Owner or Engineer.

# ARTICLE 8 – OTHER WORK AT THE SITE

- 8.01 Other Work
  - A. In addition to and apart from the Work under the Contract Documents, the Owner may perform other work at or adjacent to the Site. Such other work may be performed by Owner's employees, or through contracts between the Owner and third parties. Owner may also arrange to have third-party utility owners perform work on their utilities and facilities at or adjacent to the Site.
  - B. If Owner performs other work at or adjacent to the Site with Owner's employees, or through contracts for such other work, then Owner shall give Contractor written notice thereof prior to starting any such other work. If Owner has advance information regarding the start of any utility work at or adjacent to the Site, Owner shall provide such information to Contractor.
  - C. Contractor shall afford each other contractor that performs such other work, each utility owner performing other work, and Owner, if Owner is performing other work with Owner's employees, proper and safe access to the Site, and provide a reasonable opportunity for the introduction and storage of materials and equipment and the execution of such other work. Contractor shall do all cutting, fitting, and patching of the Work that may be required to properly connect or otherwise make its several parts come together and properly integrate with such other work. Contractor shall not endanger any work of others by cutting, excavating, or otherwise altering such work; provided, however, that Contractor may cut or alter others' work with the written consent of Engineer and the others whose work will be affected.
  - D. If the proper execution or results of any part of Contractor's Work depends upon work performed by others under this Article 8, Contractor shall inspect such other work and promptly report to Engineer in writing any delays, defects, or deficiencies in such other work that render it unavailable or unsuitable for the proper execution and results of Contractor's Work. Contractor's failure to so report will constitute an acceptance of such other work as fit and proper for integration with Contractor's Work except for latent defects and deficiencies in such other work.

## 8.02 Coordination

- A. If Owner intends to contract with others for the performance of other work at or adjacent to the Site, to perform other work at or adjacent to the Site with Owner's employees, or to arrange to have utility owners perform work at or adjacent to the Site, the following will be set forth in the Supplementary Conditions or provided to Contractor prior to the start of any such other work:
  - 1. the identity of the individual or entity that will have authority and responsibility for coordination of the activities among the various contractors;
  - 2. an itemization of the specific matters to be covered by such authority and responsibility; and
  - 3. the extent of such authority and responsibilities.
- B. Unless otherwise provided in the Supplementary Conditions, Owner shall have sole authority and responsibility for such coordination.

#### 8.03 Legal Relationships

- If, in the course of performing other work at or adjacent to the Site for Owner, the Owner's Α. employees, any other contractor working for Owner, or any utility owner causes damage to the Work or to the property of Contractor or its Subcontractors, or delays, disrupts, interferes with, or increases the scope or cost of the performance of the Work, through actions or inaction, then Contractor shall be entitled to an equitable adjustment in the Contract Price or the Contract Times, or both. Contractor must submit any Change Proposal seeking an equitable adjustment in the Contract Price or the Contract Times under this paragraph within 30 days of the damaging, delaying, disrupting, or interfering event. The entitlement to, and extent of, any such equitable adjustment shall take into account information (if any) regarding such other work that was provided to Contractor in the Contract Documents prior to the submittal of the Bid or the final negotiation of the terms of the Contract. When applicable, any such equitable adjustment in Contract Price shall be conditioned on Contractor assigning to Owner all Contractor's rights against such other contractor or utility owner with respect to the damage, delay, disruption, or interference that is the subject of the adjustment. Contractor's entitlement to an adjustment of the Contract Times is conditioned on such adjustment being essential to Contractor's ability to complete the Work within the Contract Times.
- B. Contractor shall take reasonable and customary measures to avoid damaging, delaying, disrupting, or interfering with the work of Owner, any other contractor, or any utility owner performing other work at or adjacent to the Site. If Contractor fails to take such measures and as a result damages, delays, disrupts, or interferes with the work of any such other contractor or utility owner, then Owner may impose a set-off against payments due to Contractor, and assign to such other contractor or utility owner the Owner's contractual rights against Contractor with respect to the breach of the obligations set forth in this paragraph.
- C. When Owner is performing other work at or adjacent to the Site with Owner's employees, Contractor shall be liable to Owner for damage to such other work, and for the reasonable direct delay, disruption, and interference costs incurred by Owner as a result of Contractor's failure to take reasonable and customary measures with respect to Owner's other work. In response to such damage, delay, disruption, or interference, Owner may impose a set-off against payments due to Contractor.

D. If Contractor damages, delays, disrupts, or interferes with the work of any other contractor, or any utility owner performing other work at or adjacent to the Site, through Contractor's failure to take reasonable and customary measures to avoid such impacts, or if any claim arising out of Contractor's actions, inactions, or negligence in performance of the Work at or adjacent to the Site is made by any such other contractor or utility owner against Contractor, Owner, or Engineer, then Contractor shall (1) promptly attempt to settle the claim as to all parties through negotiations with such other contractor or utility owner, or otherwise resolve the claim by arbitration or other dispute resolution proceeding or at law, and (2) indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them from and against any such claims, and against all costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such damage, delay, disruption, or interference.

# **ARTICLE 9 – OWNER'S RESPONSIBILITIES**

- 9.01 *Communications to Contractor* 
  - A. Except as otherwise provided in these General Conditions, Owner shall issue all communications to Contractor through Engineer.
- 9.02 Replacement of Engineer
  - A. Owner may at its discretion appoint an engineer to replace Engineer, provided Contractor makes no reasonable objection to the replacement engineer. The replacement engineer's status under the Contract Documents shall be that of the former Engineer.
- 9.03 Furnish Data
  - A. Owner shall promptly furnish the data required of Owner under the Contract Documents.
- 9.04 Pay When Due
  - A. Owner shall make payments to Contractor when they are due as provided in the Agreement.
- 9.05 Lands and Easements; Reports, Tests, and Drawings
  - A. Owner's duties with respect to providing lands and easements are set forth in Paragraph 5.01.
  - B. Owner's duties with respect to providing engineering surveys to establish reference points are set forth in Paragraph 4.03.
  - C. Article 5 refers to Owner's identifying and making available to Contractor copies of reports of explorations and tests of conditions at the Site, and drawings of physical conditions relating to existing surface or subsurface structures at the Site.
- 9.06 Insurance
  - A. Owner's responsibilities, if any, with respect to purchasing and maintaining liability and property insurance are set forth in Article 6.
- 9.07 Change Orders
  - A. Owner's responsibilities with respect to Change Orders are set forth in Article 11.

- 9.08 Inspections, Tests, and Approvals
  - A. Owner's responsibility with respect to certain inspections, tests, and approvals is set forth in Paragraph 14.02.B.
- 9.09 *Limitations on Owner's Responsibilities* 
  - A. The Owner shall not supervise, direct, or have control or authority over, nor be responsible for, Contractor's means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto, or for any failure of Contractor to comply with Laws and Regulations applicable to the performance of the Work. Owner will not be responsible for Contractor's failure to perform the Work in accordance with the Contract Documents.
- 9.10 Undisclosed Hazardous Environmental Condition
  - A. Owner's responsibility in respect to an undisclosed Hazardous Environmental Condition is set forth in Paragraph 5.06.
- 9.11 Evidence of Financial Arrangements
  - A. Upon request of Contractor, Owner shall furnish Contractor reasonable evidence that financial arrangements have been made to satisfy Owner's obligations under the Contract Documents (including obligations under proposed changes in the Work).
- 9.12 Safety Programs
  - A. While at the Site, Owner's employees and representatives shall comply with the specific applicable requirements of Contractor's safety programs of which Owner has been informed.
  - B. Owner shall furnish copies of any applicable Owner safety programs to Contractor.

# **ARTICLE 10 – ENGINEER'S STATUS DURING CONSTRUCTION**

- 10.01 Owner's Representative
  - A. Engineer will be Owner's representative during the construction period. The duties and responsibilities and the limitations of authority of Engineer as Owner's representative during construction are set forth in the Contract.
- 10.02 Visits to Site
  - A. Engineer will make visits to the Site at intervals appropriate to the various stages of construction as Engineer deems necessary in order to observe as an experienced and qualified design professional the progress that has been made and the quality of the various aspects of Contractor's executed Work. Based on information obtained during such visits and observations, Engineer, for the benefit of Owner, will determine, in general, if the Work is proceeding in accordance with the Contract Documents. Engineer will not be required to make exhaustive or continuous inspections on the Site to check the quality or quantity of the Work. Engineer's efforts will be directed toward providing for Owner a greater degree of confidence that the completed Work will conform generally to the Contract Documents. On the basis of such visits and observations, Engineer will keep Owner informed of the progress of the Work and will endeavor to guard Owner against defective Work.
  - B. Engineer's visits and observations are subject to all the limitations on Engineer's authority and responsibility set forth in Paragraph 10.08. Particularly, but without limitation, during

or as a result of Engineer's visits or observations of Contractor's Work, Engineer will not supervise, direct, control, or have authority over or be responsible for Contractor's means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto, or for any failure of Contractor to comply with Laws and Regulations applicable to the performance of the Work.

## 10.03 Project Representative

A. If Owner and Engineer have agreed that Engineer will furnish a Resident Project Representative to represent Engineer at the Site and assist Engineer in observing the progress and quality of the Work, then the authority and responsibilities of any such Resident Project Representative will be as provided in the Supplementary Conditions, and limitations on the responsibilities thereof will be as provided in Paragraph 10.08. If Owner designates another representative or agent to represent Owner at the Site who is not Engineer's consultant, agent, or employee, the responsibilities and authority and limitations thereon of such other individual or entity will be as provided in the Supplementary Conditions.

#### 10.04 Rejecting Defective Work

- A. Engineer has the authority to reject Work in accordance with Article 14.
- 10.05 Shop Drawings, Change Orders and Payments
  - A. Engineer's authority, and limitations thereof, as to Shop Drawings and Samples, are set forth in Paragraph 7.16.
  - B. Engineer's authority, and limitations thereof, as to design calculations and design drawings submitted in response to a delegation of professional design services, if any, are set forth in Paragraph 7.19.
  - C. Engineer's authority as to Change Orders is set forth in Article 11.
  - D. Engineer's authority as to Applications for Payment is set forth in Article 15.
- 10.06 *Determinations for Unit Price Work* 
  - A. Engineer will determine the actual quantities and classifications of Unit Price Work performed by Contractor as set forth in Paragraph 13.03.
- 10.07 Decisions on Requirements of Contract Documents and Acceptability of Work
  - A. Engineer will render decisions regarding the requirements of the Contract Documents, and judge the acceptability of the Work, pursuant to the specific procedures set forth herein for initial interpretations, Change Proposals, and acceptance of the Work. In rendering such decisions and judgments, Engineer will not show partiality to Owner or Contractor, and will not be liable to Owner, Contractor, or others in connection with any proceedings, interpretations, decisions, or judgments conducted or rendered in good faith.

#### 10.08 Limitations on Engineer's Authority and Responsibilities

A. Neither Engineer's authority or responsibility under this Article 10 or under any other provision of the Contract, nor any decision made by Engineer in good faith either to exercise or not exercise such authority or responsibility or the undertaking, exercise, or performance of any authority or responsibility by Engineer, shall create, impose, or give rise to any duty in contract, tort, or otherwise owed by Engineer to Contractor, any Subcontractor, any Supplier, any other individual or entity, or to any surety for or employee or agent of any of them.

- B. Engineer will not supervise, direct, control, or have authority over or be responsible for Contractor's means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto, or for any failure of Contractor to comply with Laws and Regulations applicable to the performance of the Work. Engineer will not be responsible for Contractor's failure to perform the Work in accordance with the Contract Documents.
- C. Engineer will not be responsible for the acts or omissions of Contractor or of any Subcontractor, any Supplier, or of any other individual or entity performing any of the Work.
- D. Engineer's review of the final Application for Payment and accompanying documentation and all maintenance and operating instructions, schedules, guarantees, bonds, certificates of inspection, tests and approvals, and other documentation required to be delivered by Paragraph 15.06.A will only be to determine generally that their content complies with the requirements of, and in the case of certificates of inspections, tests, and approvals, that the results certified indicate compliance with the Contract Documents.
- E. The limitations upon authority and responsibility set forth in this Paragraph 10.08 shall also apply to the Resident Project Representative, if any.
- 10.09 Compliance with Safety Program
  - A. While at the Site, Engineer's employees and representatives will comply with the specific applicable requirements of Owner's and Contractor's safety programs (if any) of which Engineer has been informed.

## **ARTICLE 11 – AMENDING THE CONTRACT DOCUMENTS; CHANGES IN THE WORK**

- 11.01 Amending and Supplementing Contract Documents
  - A. The Contract Documents may be amended or supplemented by a Change Order, a Work Change Directive, or a Field Order.
    - 1. Change Orders:
      - a. If an amendment or supplement to the Contract Documents includes a change in the Contract Price or the Contract Times, such amendment or supplement must be set forth in a Change Order. A Change Order also may be used to establish amendments and supplements of the Contract Documents that do not affect the Contract Price or Contract Times.
      - b. Owner and Contractor may amend those terms and conditions of the Contract Documents that do not involve (1) the performance or acceptability of the Work, (2) the design (as set forth in the Drawings, Specifications, or otherwise), or (3) other engineering or technical matters, without the recommendation of the Engineer. Such an amendment shall be set forth in a Change Order.
    - 2. Work Change Directives: A Work Change Directive will not change the Contract Price or the Contract Times but is evidence that the parties expect that the modification ordered or documented by a Work Change Directive will be incorporated in a subsequently issued Change Order, following negotiations by the parties as to the Work Change Directive's effect, if any, on the Contract Price and Contract Times; or, if negotiations are unsuccessful, by a determination under the terms of the Contract Documents governing adjustments, expressly including Paragraph 11.04 regarding change of Contract Price. Contractor must submit any Change Proposal seeking an

adjustment of the Contract Price or the Contract Times, or both, no later than 30 days after the completion of the Work set out in the Work Change Directive. Owner must submit any Claim seeking an adjustment of the Contract Price or the Contract Times, or both, no later than 60 days after issuance of the Work Change Directive.

3. *Field Orders*: Engineer may authorize minor changes in the Work if the changes do not involve an adjustment in the Contract Price or the Contract Times and are compatible with the design concept of the completed Project as a functioning whole as indicated by the Contract Documents. Such changes will be accomplished by a Field Order and will be binding on Owner and also on Contractor, which shall perform the Work involved promptly. If Contractor believes that a Field Order justifies an adjustment in the Contract Price or Contract Times, or both, then before proceeding with the Work at issue, Contractor shall submit a Change Proposal as provided herein.

# 11.02 *Owner-Authorized Changes in the Work*

A. Without invalidating the Contract and without notice to any surety, Owner may, at any time or from time to time, order additions, deletions, or revisions in the Work. Such changes shall be supported by Engineer's recommendation, to the extent the change involves the design (as set forth in the Drawings, Specifications, or otherwise), or other engineering or technical matters. Such changes may be accomplished by a Change Order, if Owner and Contractor have agreed as to the effect, if any, of the changes on Contract Times or Contract Price; or by a Work Change Directive. Upon receipt of any such document, Contractor shall promptly proceed with the Work involved; or, in the case of a deletion in the Work, promptly cease construction activities with respect to such deleted Work. Added or revised Work shall be performed under the applicable conditions of the Contractor reasonably concludes cannot be performed in a manner consistent with Contractor's safety obligations under the Contract Documents or Laws and Regulations.

# 11.03 Unauthorized Changes in the Work

- A. Contractor shall not be entitled to an increase in the Contract Price or an extension of the Contract Times with respect to any work performed that is not required by the Contract Documents, as amended, modified, or supplemented, except in the case of an emergency as provided in Paragraph 7.15 or in the case of uncovering Work as provided in Paragraph 14.05.
- 11.04 Change of Contract Price
  - A. The Contract Price may only be changed by a Change Order. Any Change Proposal for an adjustment in the Contract Price shall comply with the provisions of Paragraph 11.06. Any Claim for an adjustment of Contract Price shall comply with the provisions of Article 12.
  - B. An adjustment in the Contract Price will be determined as follows:
    - 1. where the Work involved is covered by unit prices contained in the Contract Documents, then by application of such unit prices to the quantities of the items involved (subject to the provisions of Paragraph 13.03); or
    - 2. where the Work involved is not covered by unit prices contained in the Contract Documents, then by a mutually agreed lump sum (which may include an allowance for overhead and profit not necessarily in accordance with Paragraph 11.04.C.2); or
    - 3. where the Work involved is not covered by unit prices contained in the Contract Documents and the parties do not reach mutual agreement to a lump sum, then on

the basis of the Cost of the Work (determined as provided in Paragraph 13.01) plus a Contractor's fee for overhead and profit (determined as provided in Paragraph 11.04.C).

- C. *Contractor's Fee*: When applicable, the Contractor's fee for overhead and profit shall be determined as follows:
  - 1. a mutually acceptable fixed fee; or
  - 2. if a fixed fee is not agreed upon, then a fee based on the following percentages of the various portions of the Cost of the Work:
    - a. for costs incurred under Paragraphs 13.01.B.1 and 13.01.B.2, the Contractor's fee shall be 15 percent;
    - b. for costs incurred under Paragraph 13.01.B.3, the Contractor's fee shall be five percent;
    - c. where one or more tiers of subcontracts are on the basis of Cost of the Work plus a fee and no fixed fee is agreed upon, the intent of Paragraphs 11.01.C.2.a and 11.01.C.2.b is that the Contractor's fee shall be based on: (1) a fee of 15 percent of the costs incurred under Paragraphs 13.01.A.1 and 13.01.A.2 by the Subcontractor that actually performs the Work, at whatever tier, and (2) with respect to Contractor itself and to any Subcontractors of a tier higher than that of the Subcontractor that actually performs the Work, a fee of five percent of the amount (fee plus underlying costs incurred) attributable to the next lower tier Subcontractor; provided, however, that for any such subcontracted work the maximum total fee to be paid by Owner shall be no greater than 27 percent of the costs incurred by the Subcontractor that actually performs the work;
    - d. no fee shall be payable on the basis of costs itemized under Paragraphs 13.01.B.4, 13.01.B.5, and 13.01.C;
    - e. the amount of credit to be allowed by Contractor to Owner for any change which results in a net decrease in cost will be the amount of the actual net decrease in cost plus a deduction in Contractor's fee by an amount equal to five percent of such net decrease; and
    - f. when both additions and credits are involved in any one change, the adjustment in Contractor's fee shall be computed on the basis of the net change in accordance with Paragraphs 11.04.C.2.a through 11.04.C.2.e, inclusive.

# 11.05 Change of Contract Times

- A. The Contract Times may only be changed by a Change Order. Any Change Proposal for an adjustment in the Contract Times shall comply with the provisions of Paragraph 11.06. Any Claim for an adjustment in the Contract Times shall comply with the provisions of Article 12.
- B. An adjustment of the Contract Times shall be subject to the limitations set forth in Paragraph 4.05, concerning delays in Contractor's progress.

# 11.06 Change Proposals

A. Contractor shall submit a Change Proposal to Engineer to request an adjustment in the Contract Times or Contract Price; appeal an initial decision by Engineer concerning the requirements of the Contract Documents or relating to the acceptability of the Work under the Contract Documents; contest a set-off against payment due; or seek other relief under

the Contract. The Change Proposal shall specify any proposed change in Contract Times or Contract Price, or both, or other proposed relief, and explain the reason for the proposed change, with citations to any governing or applicable provisions of the Contract Documents.

- 1. *Procedures*: Contractor shall submit each Change Proposal to Engineer promptly (but in no event later than 30 days) after the start of the event giving rise thereto, or after such initial decision. The Contractor shall submit supporting data, including the proposed change in Contract Price or Contract Time (if any), to the Engineer and Owner within 15 days after the submittal of the Change Proposal. The supporting data shall be accompanied by a written statement that the supporting data are accurate and complete, and that any requested time or price adjustment is the entire adjustment to which Contractor believes it is entitled as a result of said event. Engineer will advise Owner regarding the Change Proposal.
- 2. Engineer's Action: Engineer will review each Change Proposal and, within 30 days after receipt of the Contractor's supporting data, either deny the Change Proposal in whole, approve it in whole, or deny it in part and approve it in part. Such actions shall be in writing, with a copy provided to Owner and Contractor. If Engineer does not take action on the Change Proposal within 30 days, then either Owner or Contractor may at any time thereafter submit a letter to the other party indicating that as a result of Engineer's inaction the Change Proposal is deemed denied, thereby commencing the time for appeal of the denial under Article 12.
- 3. *Binding Decision*: Engineer's decision will be final and binding upon Owner and Contractor, unless Owner or Contractor appeals the decision by filing a Claim under Article 12.
- B. *Resolution of Certain Change Proposals*: If the Change Proposal does not involve the design (as set forth in the Drawings, Specifications, or otherwise), the acceptability of the Work, or other engineering or technical matters, then Engineer will notify the parties that the Engineer is unable to resolve the Change Proposal. For purposes of further resolution of such a Change Proposal, such notice shall be deemed a denial, and Contractor may choose to seek resolution under the terms of Article 12.

# 11.07 Execution of Change Orders

- A. Owner and Contractor shall execute appropriate Change Orders covering:
  - 1. changes in the Contract Price or Contract Times which are agreed to by the parties, including any undisputed sum or amount of time for Work actually performed in accordance with a Work Change Directive;
  - 2. changes in Contract Price resulting from an Owner set-off, unless Contractor has duly contested such set-off;
  - 3. changes in the Work which are: (a) ordered by Owner pursuant to Paragraph 11.02, (b) required because of Owner's acceptance of defective Work under Paragraph 14.04 or Owner's correction of defective Work under Paragraph 14.07, or (c) agreed to by the parties, subject to the need for Engineer's recommendation if the change in the Work involves the design (as set forth in the Drawings, Specifications, or otherwise), or other engineering or technical matters; and
  - 4. changes in the Contract Price or Contract Times, or other changes, which embody the substance of any final and binding results under Paragraph 11.06, or Article 12.

- B. If Owner or Contractor refuses to execute a Change Order that is required to be executed under the terms of this Paragraph 11.07, it shall be deemed to be of full force and effect, as if fully executed.
- 11.08 Notification to Surety
  - A. If the provisions of any bond require notice to be given to a surety of any change affecting the general scope of the Work or the provisions of the Contract Documents (including, but not limited to, Contract Price or Contract Times), the giving of any such notice will be Contractor's responsibility. The amount of each applicable bond will be adjusted to reflect the effect of any such change.

## ARTICLE 12 – CLAIMS

- 12.01 Claims
  - A. *Claims Process*: The following disputes between Owner and Contractor shall be submitted to the Claims process set forth in this Article:
    - 1. Appeals by Owner or Contractor of Engineer's decisions regarding Change Proposals;
    - 2. Owner demands for adjustments in the Contract Price or Contract Times, or other relief under the Contract Documents; and
    - 3. Disputes that Engineer has been unable to address because they do not involve the design (as set forth in the Drawings, Specifications, or otherwise), the acceptability of the Work, or other engineering or technical matters.
  - B. *Submittal of Claim*: The party submitting a Claim shall deliver it directly to the other party to the Contract promptly (but in no event later than 30 days) after the start of the event giving rise thereto; in the case of appeals regarding Change Proposals within 30 days of the decision under appeal. The party submitting the Claim shall also furnish a copy to the Engineer, for its information only. The responsibility to substantiate a Claim shall rest with the party making the Claim. In the case of a Claim by Contractor seeking an increase in the Contract Times or Contract Price, or both, Contractor shall certify that the Claim is made in good faith, that the supporting data are accurate and complete, and that to the best of Contractor's knowledge and belief the amount of time or money requested accurately reflects the full amount to which Contractor is entitled.
  - C. *Review and Resolution*: The party receiving a Claim shall review it thoroughly, giving full consideration to its merits. The two parties shall seek to resolve the Claim through the exchange of information and direct negotiations. The parties may extend the time for resolving the Claim by mutual agreement. All actions taken on a Claim shall be stated in writing and submitted to the other party, with a copy to Engineer.
  - D. Mediation:
    - 1. At any time after initiation of a Claim, Owner and Contractor may mutually agree to mediation of the underlying dispute. The agreement to mediate shall stay the Claim submittal and response process.
    - 2. If Owner and Contractor agree to mediation, then after 60 days from such agreement, either Owner or Contractor may unilaterally terminate the mediation process, and the Claim submittal and decision process shall resume as of the date of the termination. If the mediation proceeds but is unsuccessful in resolving the dispute, the Claim

submittal and decision process shall resume as of the date of the conclusion of the mediation, as determined by the mediator.

- 3. Owner and Contractor shall each pay one-half of the mediator's fees and costs.
- E. *Partial Approval*: If the party receiving a Claim approves the Claim in part and denies it in part, such action shall be final and binding unless within 30 days of such action the other party invokes the procedure set forth in Article 17 for final resolution of disputes.
- F. *Denial of Claim*: If efforts to resolve a Claim are not successful, the party receiving the Claim may deny it by giving written notice of denial to the other party. If the receiving party does not take action on the Claim within 90 days, then either Owner or Contractor may at any time thereafter submit a letter to the other party indicating that as a result of the inaction, the Claim is deemed denied, thereby commencing the time for appeal of the denial. A denial of the Claim shall be final and binding unless within 30 days of the denial the other party invokes the procedure set forth in Article 17 for the final resolution of disputes.
- G. *Final and Binding Results*: If the parties reach a mutual agreement regarding a Claim, whether through approval of the Claim, direct negotiations, mediation, or otherwise; or if a Claim is approved in part and denied in part, or denied in full, and such actions become final and binding; then the results of the agreement or action on the Claim shall be incorporated in a Change Order to the extent they affect the Contract, including the Work, the Contract Times, or the Contract Price.

## ARTICLE 13 – COST OF THE WORK; ALLOWANCES; UNIT PRICE WORK

- 13.01 Cost of the Work
  - A. *Purposes for Determination of Cost of the Work*: The term Cost of the Work means the sum of all costs necessary for the proper performance of the Work at issue, as further defined below. The provisions of this Paragraph 13.01 are used for two distinct purposes:
    - 1. To determine Cost of the Work when Cost of the Work is a component of the Contract Price, under cost-plus-fee, time-and-materials, or other cost-based terms; or
    - 2. To determine the value of a Change Order, Change Proposal, Claim, set-off, or other adjustment in Contract Price. When the value of any such adjustment is determined on the basis of Cost of the Work, Contractor is entitled only to those additional or incremental costs required because of the change in the Work or because of the event giving rise to the adjustment.
  - B. *Costs Included*: Except as otherwise may be agreed to in writing by Owner, costs included in the Cost of the Work shall be in amounts no higher than those prevailing in the locality of the Project, shall not include any of the costs itemized in Paragraph 13.01.C, and shall include only the following items:
    - 1. Payroll costs for employees in the direct employ of Contractor in the performance of the Work under schedules of job classifications agreed upon by Owner and Contractor. Such employees shall include, without limitation, superintendents, foremen, and other personnel employed full time on the Work. Payroll costs for employees not employed full time on the Work. Payroll costs of their time spent on the Work. Payroll costs shall include, but not be limited to, salaries and wages plus the cost of fringe benefits, which shall include social security contributions, unemployment, excise, and payroll taxes, workers' compensation, health and retirement benefits, bonuses, sick leave, and vacation and holiday pay applicable

thereto. The expenses of performing Work outside of regular working hours, on Saturday, Sunday, or legal holidays, shall be included in the above to the extent authorized by Owner.

- 2. Cost of all materials and equipment furnished and incorporated in the Work, including costs of transportation and storage thereof, and Suppliers' field services required in connection therewith. All cash discounts shall accrue to Contractor unless Owner deposits funds with Contractor with which to make payments, in which case the cash discounts shall accrue to Owner. All trade discounts, rebates, and refunds and returns from sale of surplus materials and equipment shall accrue to Owner, and Contractor shall make provisions so that they may be obtained.
- 3. Payments made by Contractor to Subcontractors for Work performed by Subcontractors. If required by Owner, Contractor shall obtain competitive bids from subcontractors acceptable to Owner and Contractor and shall deliver such bids to Owner, who will then determine, with the advice of Engineer, which bids, if any, will be acceptable. If any subcontract provides that the Subcontractor is to be paid on the basis of Cost of the Work plus a fee, the Subcontractor's Cost of the Work and fee shall be determined in the same manner as Contractor's Cost of the Work and fee as provided in this Paragraph 13.01.
- 4. Costs of special consultants (including but not limited to engineers, architects, testing laboratories, surveyors, attorneys, and accountants) employed for services specifically related to the Work.
- 5. Supplemental costs including the following:
  - a. The proportion of necessary transportation, travel, and subsistence expenses of Contractor's employees incurred in discharge of duties connected with the Work.
  - b. Cost, including transportation and maintenance, of all materials, supplies, equipment, machinery, appliances, office, and temporary facilities at the Site, and hand tools not owned by the workers, which are consumed in the performance of the Work, and cost, less market value, of such items used but not consumed which remain the property of Contractor.
  - c. Rentals of all construction equipment and machinery, and the parts thereof, whether rented from Contractor or others in accordance with rental agreements approved by Owner with the advice of Engineer, and the costs of transportation, loading, unloading, assembly, dismantling, and removal thereof. All such costs shall be in accordance with the terms of said rental agreements. The rental of any such equipment, machinery, or parts shall cease when the use thereof is no longer necessary for the Work.
  - d. Sales, consumer, use, and other similar taxes related to the Work, and for which Contractor is liable, as imposed by Laws and Regulations.
  - e. Deposits lost for causes other than negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable, and royalty payments and fees for permits and licenses.
  - f. Losses and damages (and related expenses) caused by damage to the Work, not compensated by insurance or otherwise, sustained by Contractor in connection with the performance of the Work (except losses and damages within the deductible amounts of property insurance established in accordance with Paragraph 6.05), provided such losses and damages have resulted from causes

other than the negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable. Such losses shall include settlements made with the written consent and approval of Owner. No such losses, damages, and expenses shall be included in the Cost of the Work for the purpose of determining Contractor's fee.

- g. The cost of utilities, fuel, and sanitary facilities at the Site.
- h. Minor expenses such as communication service at the Site, express and courier services, and similar petty cash items in connection with the Work.
- i. The costs of premiums for all bonds and insurance that Contractor is required by the Contract Documents to purchase and maintain.
- C. *Costs Excluded*: The term Cost of the Work shall not include any of the following items:
  - 1. Payroll costs and other compensation of Contractor's officers, executives, principals (of partnerships and sole proprietorships), general managers, safety managers, engineers, architects, estimators, attorneys, auditors, accountants, purchasing and contracting agents, expediters, timekeepers, clerks, and other personnel employed by Contractor, whether at the Site or in Contractor's principal or branch office for general administration of the Work and not specifically included in the agreed upon schedule of job classifications referred to in Paragraph 13.01.B.1 or specifically covered by Paragraph 13.01.B.4. The payroll costs and other compensation excluded here are to be considered administrative costs covered by the Contractor's fee.
  - 2. Expenses of Contractor's principal and branch offices other than Contractor's office at the Site.
  - 3. Any part of Contractor's capital expenses, including interest on Contractor's capital employed for the Work and charges against Contractor for delinquent payments.
  - 4. Costs due to the negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable, including but not limited to, the correction of defective Work, disposal of materials or equipment wrongly supplied, and making good any damage to property.
  - 5. Other overhead or general expense costs of any kind and the costs of any item not specifically and expressly included in Paragraph 13.01.B.
- D. *Contractor's Fee*: When the Work as a whole is performed on the basis of cost-plus, Contractor's fee shall be determined as set forth in the Agreement. When the value of any Work covered by a Change Order, Change Proposal, Claim, set-off, or other adjustment in Contract Price is determined on the basis of Cost of the Work, Contractor's fee shall be determined as set forth in Paragraph 11.04.C.
- E. *Documentation*: Whenever the Cost of the Work for any purpose is to be determined pursuant to this Article 13, Contractor will establish and maintain records thereof in accordance with generally accepted accounting practices and submit in a form acceptable to Engineer an itemized cost breakdown together with supporting data.

#### 13.02 Allowances

A. It is understood that Contractor has included in the Contract Price all allowances so named in the Contract Documents and shall cause the Work so covered to be performed for such sums and by such persons or entities as may be acceptable to Owner and Engineer.

- B. Cash Allowances: Contractor agrees that:
  - 1. the cash allowances include the cost to Contractor (less any applicable trade discounts) of materials and equipment required by the allowances to be delivered at the Site, and all applicable taxes; and
  - 2. Contractor's costs for unloading and handling on the Site, labor, installation, overhead, profit, and other expenses contemplated for the cash allowances have been included in the Contract Price and not in the allowances, and no demand for additional payment on account of any of the foregoing will be valid.
- C. *Contingency Allowance*: Contractor agrees that a contingency allowance, if any, is for the sole use of Owner to cover unanticipated costs.
- D. Prior to final payment, an appropriate Change Order will be issued as recommended by Engineer to reflect actual amounts due Contractor on account of Work covered by allowances, and the Contract Price shall be correspondingly adjusted.

#### 13.03 Unit Price Work

- A. Where the Contract Documents provide that all or part of the Work is to be Unit Price Work, initially the Contract Price will be deemed to include for all Unit Price Work an amount equal to the sum of the unit price for each separately identified item of Unit Price Work times the estimated quantity of each item as indicated in the Agreement.
- B. The estimated quantities of items of Unit Price Work are not guaranteed and are solely for the purpose of comparison of Bids and determining an initial Contract Price. Payments to Contractor for Unit Price Work will be based on actual quantities.
- C. Each unit price will be deemed to include an amount considered by Contractor to be adequate to cover Contractor's overhead and profit for each separately identified item.
- D. Engineer will determine the actual quantities and classifications of Unit Price Work performed by Contractor. Engineer will review with Contractor the Engineer's preliminary determinations on such matters before rendering a written decision thereon (by recommendation of an Application for Payment or otherwise). Engineer's written decision thereon will be final and binding (except as modified by Engineer to reflect changed factual conditions or more accurate data) upon Owner and Contractor, subject to the provisions of the following paragraph.
- E. Within 30 days of Engineer's written decision under the preceding paragraph, Contractor may submit a Change Proposal, or Owner may file a Claim, seeking an adjustment in the Contract Price if:
  - 1. the quantity of any item of Unit Price Work performed by Contractor differs materially and significantly from the estimated quantity of such item indicated in the Agreement;
  - 2. there is no corresponding adjustment with respect to any other item of Work; and
  - 3. Contractor believes that it is entitled to an increase in Contract Price as a result of having incurred additional expense or Owner believes that Owner is entitled to a decrease in Contract Price, and the parties are unable to agree as to the amount of any such increase or decrease.

# ARTICLE 14 – TESTS AND INSPECTIONS; CORRECTION, REMOVAL OR ACCEPTANCE OF DEFECTIVE WORK

- 14.01 Access to Work
  - A. Owner, Engineer, their consultants and other representatives and personnel of Owner, independent testing laboratories, and authorities having jurisdiction will have access to the Site and the Work at reasonable times for their observation, inspection, and testing. Contractor shall provide them proper and safe conditions for such access and advise them of Contractor's safety procedures and programs so that they may comply therewith as applicable.
- 14.02 Tests, Inspections, and Approvals
  - A. Contractor shall give Engineer timely notice of readiness of the Work (or specific parts thereof) for all required inspections and tests, and shall cooperate with inspection and testing personnel to facilitate required inspections and tests.
  - B. Owner shall retain and pay for the services of an independent inspector, testing laboratory, or other qualified individual or entity to perform all inspections and tests expressly required by the Contract Documents to be furnished and paid for by Owner, except that costs incurred in connection with tests or inspections of covered Work shall be governed by the provisions of Paragraph 14.05.
  - C. If Laws or Regulations of any public body having jurisdiction require any Work (or part thereof) specifically to be inspected, tested, or approved by an employee or other representative of such public body, Contractor shall assume full responsibility for arranging and obtaining such inspections, tests, or approvals, pay all costs in connection therewith, and furnish Engineer the required certificates of inspection or approval.
  - D. Contractor shall be responsible for arranging, obtaining, and paying for all inspections and tests required:
    - 1. by the Contract Documents, unless the Contract Documents expressly allocate responsibility for a specific inspection or test to Owner;
    - 2. to attain Owner's and Engineer's acceptance of materials or equipment to be incorporated in the Work;
    - 3. by manufacturers of equipment furnished under the Contract Documents;
    - 4. for testing, adjusting, and balancing of mechanical, electrical, and other equipment to be incorporated into the Work; and
    - 5. for acceptance of materials, mix designs, or equipment submitted for approval prior to Contractor's purchase thereof for incorporation in the Work.

Such inspections and tests shall be performed by independent inspectors, testing laboratories, or other qualified individuals or entities acceptable to Owner and Engineer.

- E. If the Contract Documents require the Work (or part thereof) to be approved by Owner, Engineer, or another designated individual or entity, then Contractor shall assume full responsibility for arranging and obtaining such approvals.
- F. If any Work (or the work of others) that is to be inspected, tested, or approved is covered by Contractor without written concurrence of Engineer, Contractor shall, if requested by Engineer, uncover such Work for observation. Such uncovering shall be at Contractor's expense unless Contractor had given Engineer timely notice of Contractor's intention to

cover the same and Engineer had not acted with reasonable promptness in response to such notice.

## 14.03 Defective Work

- A. *Contractor's Obligation*: It is Contractor's obligation to assure that the Work is not defective.
- B. *Engineer's Authority*: Engineer has the authority to determine whether Work is defective, and to reject defective Work.
- C. *Notice of Defects*: Prompt notice of all defective Work of which Owner or Engineer has actual knowledge will be given to Contractor.
- D. *Correction, or Removal and Replacement*: Promptly after receipt of written notice of defective Work, Contractor shall correct all such defective Work, whether or not fabricated, installed, or completed, or, if Engineer has rejected the defective Work, remove it from the Project and replace it with Work that is not defective.
- E. *Preservation of Warranties*: When correcting defective Work, Contractor shall take no action that would void or otherwise impair Owner's special warranty and guarantee, if any, on said Work.
- F. *Costs and Damages*: In addition to its correction, removal, and replacement obligations with respect to defective Work, Contractor shall pay all claims, costs, losses, and damages arising out of or relating to defective Work, including but not limited to the cost of the inspection, testing, correction, removal, replacement, or reconstruction of such defective Work, fines levied against Owner by governmental authorities because the Work is defective, and the costs of repair or replacement of work of others resulting from defective Work. Prior to final payment, if Owner and Contractor are unable to agree as to the measure of such claims, costs, losses, and damages resulting from defective Work, then Owner may impose a reasonable set-off against payments due under Article 15.

# 14.04 Acceptance of Defective Work

A. If, instead of requiring correction or removal and replacement of defective Work, Owner prefers to accept it, Owner may do so (subject, if such acceptance occurs prior to final payment, to Engineer's confirmation that such acceptance is in general accord with the design intent and applicable engineering principles, and will not endanger public safety). Contractor shall pay all claims, costs, losses, and damages attributable to Owner's evaluation of and determination to accept such defective Work (such costs to be approved by Engineer as to reasonableness), and for the diminished value of the Work to the extent not otherwise paid by Contractor. If any such acceptance occurs prior to final payment, the necessary revisions in the Contract Documents with respect to the Work shall be incorporated in a Change Order. If the parties are unable to agree as to the decrease in the Contract Price, reflecting the diminished value of Work so accepted, then Owner may impose a reasonable set-off against payments due under Article 15. If the acceptance of defective Work occurs after final payment, Contractor shall pay an appropriate amount to Owner.

#### 14.05 Uncovering Work

A. Engineer has the authority to require special inspection or testing of the Work, whether or not the Work is fabricated, installed, or completed.

- B. If any Work is covered contrary to the written request of Engineer, then Contractor shall, if requested by Engineer, uncover such Work for Engineer's observation, and then replace the covering, all at Contractor's expense.
- C. If Engineer considers it necessary or advisable that covered Work be observed by Engineer or inspected or tested by others, then Contractor, at Engineer's request, shall uncover, expose, or otherwise make available for observation, inspection, or testing as Engineer may require, that portion of the Work in question, and provide all necessary labor, material, and equipment.
  - If it is found that the uncovered Work is defective, Contractor shall be responsible for all claims, costs, losses, and damages arising out of or relating to such uncovering, exposure, observation, inspection, and testing, and of satisfactory replacement or reconstruction (including but not limited to all costs of repair or replacement of work of others); and pending Contractor's full discharge of this responsibility the Owner shall be entitled to impose a reasonable set-off against payments due under Article 15.
  - 2. If the uncovered Work is not found to be defective, Contractor shall be allowed an increase in the Contract Price or an extension of the Contract Times, or both, directly attributable to such uncovering, exposure, observation, inspection, testing, replacement, and reconstruction. If the parties are unable to agree as to the amount or extent thereof, then Contractor may submit a Change Proposal within 30 days of the determination that the Work is not defective.

# 14.06 Owner May Stop the Work

- A. If the Work is defective, or Contractor fails to supply sufficient skilled workers or suitable materials or equipment, or fails to perform the Work in such a way that the completed Work will conform to the Contract Documents, then Owner may order Contractor to stop the Work, or any portion thereof, until the cause for such order has been eliminated; however, this right of Owner to stop the Work shall not give rise to any duty on the part of Owner to exercise this right for the benefit of Contractor, any Subcontractor, any Supplier, any other individual or entity, or any surety for, or employee or agent of any of them.
- 14.07 *Owner May Correct Defective Work* 
  - A. If Contractor fails within a reasonable time after written notice from Engineer to correct defective Work, or to remove and replace rejected Work as required by Engineer, or if Contractor fails to perform the Work in accordance with the Contract Documents, or if Contractor fails to comply with any other provision of the Contract Documents, then Owner may, after seven days written notice to Contractor, correct or remedy any such deficiency.
  - B. In exercising the rights and remedies under this Paragraph 14.07, Owner shall proceed expeditiously. In connection with such corrective or remedial action, Owner may exclude Contractor from all or part of the Site, take possession of all or part of the Work and suspend Contractor's services related thereto, and incorporate in the Work all materials and equipment stored at the Site or for which Owner has paid Contractor but which are stored elsewhere. Contractor shall allow Owner, Owner's representatives, agents and employees, Owner's other contractors, and Engineer and Engineer's consultants access to the Site to enable Owner to exercise the rights and remedies under this paragraph.
  - C. All claims, costs, losses, and damages incurred or sustained by Owner in exercising the rights and remedies under this Paragraph 14.07 will be charged against Contractor as set-offs against payments due under Article 15. Such claims, costs, losses and damages will

include but not be limited to all costs of repair, or replacement of work of others destroyed or damaged by correction, removal, or replacement of Contractor's defective Work.

D. Contractor shall not be allowed an extension of the Contract Times because of any delay in the performance of the Work attributable to the exercise by Owner of Owner's rights and remedies under this Paragraph 14.07.

# ARTICLE 15 – PAYMENTS TO CONTRACTOR; SET-OFFS; COMPLETION; CORRECTION PERIOD

- 15.01 *Progress Payments* 
  - A. *Basis for Progress Payments*: The Schedule of Values established as provided in Article 2 will serve as the basis for progress payments and will be incorporated into a form of Application for Payment acceptable to Engineer. Progress payments on account of Unit Price Work will be based on the number of units completed during the pay period, as determined under the provisions of Paragraph 13.03. Progress payments for cost-based Work will be based on Cost of the Work completed by Contractor during the pay period.
  - B. Applications for Payments:
    - 1. At least 20 days before the date established in the Agreement for each progress payment (but not more often than once a month), Contractor shall submit to Engineer for review an Application for Payment filled out and signed by Contractor covering the Work completed as of the date of the Application and accompanied by such supporting documentation as is required by the Contract Documents. If payment is requested on the basis of materials and equipment not incorporated in the Work but delivered and suitably stored at the Site or at another location agreed to in writing, the Application for Payment shall also be accompanied by a bill of sale, invoice, or other documentation warranting that Owner has received the materials and equipment free and clear of all Liens, and evidence that the materials and equipment are covered by appropriate property insurance, a warehouse bond, or other arrangements to protect Owner's interest therein, all of which must be satisfactory to Owner.
    - 2. Beginning with the second Application for Payment, each Application shall include an affidavit of Contractor stating that all previous progress payments received on account of the Work have been applied on account to discharge Contractor's legitimate obligations associated with prior Applications for Payment.
    - 3. The amount of retainage with respect to progress payments will be as stipulated in the Agreement.
  - C. *Review of Applications*:
    - 1. Engineer will, within 10 days after receipt of each Application for Payment, including each resubmittal, either indicate in writing a recommendation of payment and present the Application to Owner, or return the Application to Contractor indicating in writing Engineer's reasons for refusing to recommend payment. In the latter case, Contractor may make the necessary corrections and resubmit the Application.
    - 2. Engineer's recommendation of any payment requested in an Application for Payment will constitute a representation by Engineer to Owner, based on Engineer's observations of the executed Work as an experienced and qualified design professional, and on Engineer's review of the Application for Payment and the accompanying data and schedules, that to the best of Engineer's knowledge, information and belief:

- a. the Work has progressed to the point indicated;
- b. the quality of the Work is generally in accordance with the Contract Documents (subject to an evaluation of the Work as a functioning whole prior to or upon Substantial Completion, the results of any subsequent tests called for in the Contract Documents, a final determination of quantities and classifications for Unit Price Work under Paragraph 13.03, and any other qualifications stated in the recommendation); and
- c. the conditions precedent to Contractor's being entitled to such payment appear to have been fulfilled in so far as it is Engineer's responsibility to observe the Work.
- 3. By recommending any such payment Engineer will not thereby be deemed to have represented that:
  - a. inspections made to check the quality or the quantity of the Work as it has been performed have been exhaustive, extended to every aspect of the Work in progress, or involved detailed inspections of the Work beyond the responsibilities specifically assigned to Engineer in the Contract; or
  - b. there may not be other matters or issues between the parties that might entitle Contractor to be paid additionally by Owner or entitle Owner to withhold payment to Contractor.
- 4. Neither Engineer's review of Contractor's Work for the purposes of recommending payments nor Engineer's recommendation of any payment, including final payment, will impose responsibility on Engineer:
  - a. to supervise, direct, or control the Work, or
  - b. for the means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto, or
  - c. for Contractor's failure to comply with Laws and Regulations applicable to Contractor's performance of the Work, or
  - d. to make any examination to ascertain how or for what purposes Contractor has used the money paid on account of the Contract Price, or
  - e. to determine that title to any of the Work, materials, or equipment has passed to Owner free and clear of any Liens.
- 5. Engineer may refuse to recommend the whole or any part of any payment if, in Engineer's opinion, it would be incorrect to make the representations to Owner stated in Paragraph 15.01.C.2.
- 6. Engineer will recommend reductions in payment (set-offs) necessary in Engineer's opinion to protect Owner from loss because:
  - a. the Work is defective, requiring correction or replacement;
  - b. the Contract Price has been reduced by Change Orders;
  - c. Owner has been required to correct defective Work in accordance with Paragraph 14.07, or has accepted defective Work pursuant to Paragraph 14.04;
  - d. Owner has been required to remove or remediate a Hazardous Environmental Condition for which Contractor is responsible; or

- e. Engineer has actual knowledge of the occurrence of any of the events that would constitute a default by Contractor and therefore justify termination for cause under the Contract Documents.
- D. Payment Becomes Due:
  - 1. Ten days after presentation of the Application for Payment to Owner with Engineer's recommendation, the amount recommended (subject to any Owner set-offs) will become due, and when due will be paid by Owner to Contractor.
- E. Reductions in Payment by Owner:
  - 1. In addition to any reductions in payment (set-offs) recommended by Engineer, Owner is entitled to impose a set-off against payment based on any of the following:
    - a. claims have been made against Owner on account of Contractor's conduct in the performance or furnishing of the Work, or Owner has incurred costs, losses, or damages on account of Contractor's conduct in the performance or furnishing of the Work, including but not limited to claims, costs, losses, or damages from workplace injuries, adjacent property damage, non-compliance with Laws and Regulations, and patent infringement;
    - b. Contractor has failed to take reasonable and customary measures to avoid damage, delay, disruption, and interference with other work at or adjacent to the Site;
    - c. Contractor has failed to provide and maintain required bonds or insurance;
    - d. Owner has been required to remove or remediate a Hazardous Environmental Condition for which Contractor is responsible;
    - e. Owner has incurred extra charges or engineering costs related to submittal reviews, evaluations of proposed substitutes, tests and inspections, or return visits to manufacturing or assembly facilities;
    - f. the Work is defective, requiring correction or replacement;
    - g. Owner has been required to correct defective Work in accordance with Paragraph 14.07, or has accepted defective Work pursuant to Paragraph 14.04;
    - h. the Contract Price has been reduced by Change Orders;
    - i. an event that would constitute a default by Contractor and therefore justify a termination for cause has occurred;
    - j. liquidated damages have accrued as a result of Contractor's failure to achieve Milestones, Substantial Completion, or final completion of the Work;
    - k. Liens have been filed in connection with the Work, except where Contractor has delivered a specific bond satisfactory to Owner to secure the satisfaction and discharge of such Liens;
    - I. there are other items entitling Owner to a set off against the amount recommended.
  - 2. If Owner imposes any set-off against payment, whether based on its own knowledge or on the written recommendations of Engineer, Owner will give Contractor immediate written notice (with a copy to Engineer) stating the reasons for such action and the specific amount of the reduction, and promptly pay Contractor any amount

remaining after deduction of the amount so withheld. Owner shall promptly pay Contractor the amount so withheld, or any adjustment thereto agreed to by Owner and Contractor, if Contractor remedies the reasons for such action. The reduction imposed shall be binding on Contractor unless it duly submits a Change Proposal contesting the reduction.

3. Upon a subsequent determination that Owner's refusal of payment was not justified, the amount wrongfully withheld shall be treated as an amount due as determined by Paragraph 15.01.C.1 and subject to interest as provided in the Agreement.

#### 15.02 Contractor's Warranty of Title

A. Contractor warrants and guarantees that title to all Work, materials, and equipment furnished under the Contract will pass to Owner free and clear of (1) all Liens and other title defects, and (2) all patent, licensing, copyright, or royalty obligations, no later than seven days after the time of payment by Owner.

## 15.03 Substantial Completion

- A. When Contractor considers the entire Work ready for its intended use Contractor shall notify Owner and Engineer in writing that the entire Work is substantially complete and request that Engineer issue a certificate of Substantial Completion. Contractor shall at the same time submit to Owner and Engineer an initial draft of punch list items to be completed or corrected before final payment.
- B. Promptly after Contractor's notification, Owner, Contractor, and Engineer shall make an inspection of the Work to determine the status of completion. If Engineer does not consider the Work substantially complete, Engineer will notify Contractor in writing giving the reasons therefor.
- C. If Engineer considers the Work substantially complete, Engineer will deliver to Owner a preliminary certificate of Substantial Completion which shall fix the date of Substantial Completion. Engineer shall attach to the certificate a punch list of items to be completed or corrected before final payment. Owner shall have seven days after receipt of the preliminary certificate during which to make written objection to Engineer as to any provisions of the certificate or attached punch list. If, after considering the objections to the provisions of the preliminary certificate, Engineer concludes that the Work is not substantially complete, Engineer will, within 14 days after submission of the preliminary certificate to Owner, notify Contractor in writing that the Work is not substantially complete, stating the reasons therefor. If Owner does not object to the provisions of the certificate, or if despite consideration of Owner's objections Engineer concludes that the Work is substantially complete, then Engineer will, within said 14 days, execute and deliver to Owner and Contractor a final certificate of Substantial Completion (with a revised punch list of items to be completed or corrected) reflecting such changes from the preliminary certificate as Engineer believes justified after consideration of any objections from Owner.
- D. At the time of receipt of the preliminary certificate of Substantial Completion, Owner and Contractor will confer regarding Owner's use or occupancy of the Work following Substantial Completion, review the builder's risk insurance policy with respect to the end of the builder's risk coverage, and confirm the transition to coverage of the Work under a permanent property insurance policy held by Owner. Unless Owner and Contractor agree otherwise in writing, Owner shall bear responsibility for security, operation, protection of the Work, property insurance, maintenance, heat, and utilities upon Owner's use or occupancy of the Work.

- E. After Substantial Completion the Contractor shall promptly begin work on the punch list of items to be completed or corrected prior to final payment. In appropriate cases Contractor may submit monthly Applications for Payment for completed punch list items, following the progress payment procedures set forth above.
- F. Owner shall have the right to exclude Contractor from the Site after the date of Substantial Completion subject to allowing Contractor reasonable access to remove its property and complete or correct items on the punch list.

# 15.04 Partial Use or Occupancy

- A. Prior to Substantial Completion of all the Work, Owner may use or occupy any substantially completed part of the Work which has specifically been identified in the Contract Documents, or which Owner, Engineer, and Contractor agree constitutes a separately functioning and usable part of the Work that can be used by Owner for its intended purpose without significant interference with Contractor's performance of the remainder of the Work, subject to the following conditions:
  - 1. At any time Owner may request in writing that Contractor permit Owner to use or occupy any such part of the Work that Owner believes to be substantially complete. If and when Contractor agrees that such part of the Work is substantially complete, Contractor, Owner, and Engineer will follow the procedures of Paragraph 15.03.A through E for that part of the Work.
  - 2. At any time Contractor may notify Owner and Engineer in writing that Contractor considers any such part of the Work substantially complete and request Engineer to issue a certificate of Substantial Completion for that part of the Work.
  - 3. Within a reasonable time after either such request, Owner, Contractor, and Engineer shall make an inspection of that part of the Work to determine its status of completion. If Engineer does not consider that part of the Work to be substantially complete, Engineer will notify Owner and Contractor in writing giving the reasons therefor. If Engineer considers that part of the Work to be substantially complete, the provisions of Paragraph 15.03 will apply with respect to certification of Substantial Completion of that part of the Work and the division of responsibility in respect thereof and access thereto.
  - 4. No use or occupancy or separate operation of part of the Work may occur prior to compliance with the requirements of Paragraph 6.05 regarding builder's risk or other property insurance.

# 15.05 Final Inspection

A. Upon written notice from Contractor that the entire Work or an agreed portion thereof is complete, Engineer will promptly make a final inspection with Owner and Contractor and will notify Contractor in writing of all particulars in which this inspection reveals that the Work, or agreed portion thereof, is incomplete or defective. Contractor shall immediately take such measures as are necessary to complete such Work or remedy such deficiencies.

# 15.06 Final Payment

- A. Application for Payment:
  - 1. After Contractor has, in the opinion of Engineer, satisfactorily completed all corrections identified during the final inspection and has delivered, in accordance with the Contract Documents, all maintenance and operating instructions, schedules, guarantees, bonds, certificates or other evidence of insurance, certificates of

inspection, annotated record documents (as provided in Paragraph 7.11), and other documents, Contractor may make application for final payment.

- 2. The final Application for Payment shall be accompanied (except as previously delivered) by:
  - a. all documentation called for in the Contract Documents;
  - b. consent of the surety, if any, to final payment;
  - c. satisfactory evidence that all title issues have been resolved such that title to all Work, materials, and equipment has passed to Owner free and clear of any Liens or other title defects, or will so pass upon final payment.
  - d. a list of all disputes that Contractor believes are unsettled; and
  - e. complete and legally effective releases or waivers (satisfactory to Owner) of all Lien rights arising out of the Work, and of Liens filed in connection with the Work.
- 3. In lieu of the releases or waivers of Liens specified in Paragraph 15.06.A.2 and as approved by Owner, Contractor may furnish receipts or releases in full and an affidavit of Contractor that: (a) the releases and receipts include all labor, services, material, and equipment for which a Lien could be filed; and (b) all payrolls, material and equipment bills, and other indebtedness connected with the Work for which Owner might in any way be responsible, or which might in any way result in liens or other burdens on Owner's property, have been paid or otherwise satisfied. If any Subcontractor or Supplier fails to furnish such a release or receipt in full, Contractor may furnish a bond or other collateral satisfactory to Owner to indemnify Owner against any Lien, or Owner at its option may issue joint checks payable to Contractor and specified Subcontractors and Suppliers.
- B. Engineer's Review of Application and Acceptance:
  - If, on the basis of Engineer's observation of the Work during construction and final 1. inspection, and Engineer's review of the final Application for Payment and accompanying documentation as required by the Contract Documents, Engineer is satisfied that the Work has been completed and Contractor's other obligations under the Contract have been fulfilled, Engineer will, within ten days after receipt of the final Application for Payment, indicate in writing Engineer's recommendation of final payment and present the Application for Payment to Owner for payment. Such recommendation shall account for any set-offs against payment that are necessary in Engineer's opinion to protect Owner from loss for the reasons stated above with respect to progress payments. At the same time Engineer will also give written notice to Owner and Contractor that the Work is acceptable, subject to the provisions of Paragraph 15.07. Otherwise, Engineer will return the Application for Payment to Contractor, indicating in writing the reasons for refusing to recommend final payment, in which case Contractor shall make the necessary corrections and resubmit the Application for Payment.
- C. *Completion of Work*: The Work is complete (subject to surviving obligations) when it is ready for final payment as established by the Engineer's written recommendation of final payment.
- D. *Payment Becomes Due*: Thirty days after the presentation to Owner of the final Application for Payment and accompanying documentation, the amount recommended by Engineer (less any further sum Owner is entitled to set off against Engineer's recommendation,

including but not limited to set-offs for liquidated damages and set-offs allowed under the provisions above with respect to progress payments) will become due and shall be paid by Owner to Contractor.

## 15.07 Waiver of Claims

- A. The making of final payment will not constitute a waiver by Owner of claims or rights against Contractor. Owner expressly reserves claims and rights arising from unsettled Liens, from defective Work appearing after final inspection pursuant to Paragraph 15.05, from Contractor's failure to comply with the Contract Documents or the terms of any special guarantees specified therein, from outstanding Claims by Owner, or from Contractor's continuing obligations under the Contract Documents.
- B. The acceptance of final payment by Contractor will constitute a waiver by Contractor of all claims and rights against Owner other than those pending matters that have been duly submitted or appealed under the provisions of Article 17.

## 15.08 Correction Period

- A. If within one year after the date of Substantial Completion (or such longer period of time as may be prescribed by the terms of any applicable special guarantee required by the Contract Documents, or by any specific provision of the Contract Documents), any Work is found to be defective, or if the repair of any damages to the Site, adjacent areas that Contractor has arranged to use through construction easements or otherwise, and other adjacent areas used by Contractor as permitted by Laws and Regulations, is found to be defective, then Contractor shall promptly, without cost to Owner and in accordance with Owner's written instructions:
  - 1. correct the defective repairs to the Site or such other adjacent areas;
  - 2. correct such defective Work;
  - 3. if the defective Work has been rejected by Owner, remove it from the Project and replace it with Work that is not defective, and
  - 4. satisfactorily correct or repair or remove and replace any damage to other Work, to the work of others, or to other land or areas resulting therefrom.
- B. If Contractor does not promptly comply with the terms of Owner's written instructions, or in an emergency where delay would cause serious risk of loss or damage, Owner may have the defective Work corrected or repaired or may have the rejected Work removed and replaced. Contractor shall pay all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such correction or repair or such removal and replacement (including but not limited to all costs of repair or replacement of work of others).
- C. In special circumstances where a particular item of equipment is placed in continuous service before Substantial Completion of all the Work, the correction period for that item may start to run from an earlier date if so provided in the Specifications.
- D. Where defective Work (and damage to other Work resulting therefrom) has been corrected or removed and replaced under this paragraph, the correction period hereunder with respect to such Work will be extended for an additional period of one year after such correction or removal and replacement has been satisfactorily completed.

E. Contractor's obligations under this paragraph are in addition to all other obligations and warranties. The provisions of this paragraph shall not be construed as a substitute for, or a waiver of, the provisions of any applicable statute of limitation or repose.

# **ARTICLE 16 – SUSPENSION OF WORK AND TERMINATION**

- 16.01 Owner May Suspend Work
  - A. At any time and without cause, Owner may suspend the Work or any portion thereof for a period of not more than 90 consecutive days by written notice to Contractor and Engineer. Such notice will fix the date on which Work will be resumed. Contractor shall resume the Work on the date so fixed. Contractor shall be entitled to an adjustment in the Contract Price or an extension of the Contract Times, or both, directly attributable to any such suspension. Any Change Proposal seeking such adjustments shall be submitted no later than 30 days after the date fixed for resumption of Work.

# 16.02 *Owner May Terminate for Cause*

- A. The occurrence of any one or more of the following events will constitute a default by Contractor and justify termination for cause:
  - 1. Contractor's persistent failure to perform the Work in accordance with the Contract Documents (including, but not limited to, failure to supply sufficient skilled workers or suitable materials or equipment or failure to adhere to the Progress Schedule);
  - 2. Failure of Contractor to perform or otherwise to comply with a material term of the Contract Documents;
  - 3. Contractor's disregard of Laws or Regulations of any public body having jurisdiction; or
  - 4. Contractor's repeated disregard of the authority of Owner or Engineer.
- B. If one or more of the events identified in Paragraph 16.02.A occurs, then after giving Contractor (and any surety) ten days written notice that Owner is considering a declaration that Contractor is in default and termination of the contract, Owner may proceed to:
  - 1. declare Contractor to be in default, and give Contractor (and any surety) notice that the Contract is terminated; and
  - 2. enforce the rights available to Owner under any applicable performance bond.
- C. Subject to the terms and operation of any applicable performance bond, if Owner has terminated the Contract for cause, Owner may exclude Contractor from the Site, take possession of the Work, incorporate in the Work all materials and equipment stored at the Site or for which Owner has paid Contractor but which are stored elsewhere, and complete the Work as Owner may deem expedient.
- D. Owner may not proceed with termination of the Contract under Paragraph 16.02.B if Contractor within seven days of receipt of notice of intent to terminate begins to correct its failure to perform and proceeds diligently to cure such failure.
- E. If Owner proceeds as provided in Paragraph 16.02.B, Contractor shall not be entitled to receive any further payment until the Work is completed. If the unpaid balance of the Contract Price exceeds the cost to complete the Work, including all related claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals) sustained by Owner, such excess will be paid to Contractor. If the cost to complete the Work including such related claims, costs, losses,

and damages exceeds such unpaid balance, Contractor shall pay the difference to Owner. Such claims, costs, losses, and damages incurred by Owner will be reviewed by Engineer as to their reasonableness and, when so approved by Engineer, incorporated in a Change Order. When exercising any rights or remedies under this paragraph, Owner shall not be required to obtain the lowest price for the Work performed.

- F. Where Contractor's services have been so terminated by Owner, the termination will not affect any rights or remedies of Owner against Contractor then existing or which may thereafter accrue, or any rights or remedies of Owner against Contractor or any surety under any payment bond or performance bond. Any retention or payment of money due Contractor by Owner will not release Contractor from liability.
- G. If and to the extent that Contractor has provided a performance bond under the provisions of Paragraph 6.01.A, the provisions of that bond shall govern over any inconsistent provisions of Paragraphs 16.02.B and 16.02.D.
- 16.03 Owner May Terminate For Convenience
  - A. Upon seven days written notice to Contractor and Engineer, Owner may, without cause and without prejudice to any other right or remedy of Owner, terminate the Contract. In such case, Contractor shall be paid for (without duplication of any items):
    - 1. completed and acceptable Work executed in accordance with the Contract Documents prior to the effective date of termination, including fair and reasonable sums for overhead and profit on such Work;
    - 2. expenses sustained prior to the effective date of termination in performing services and furnishing labor, materials, or equipment as required by the Contract Documents in connection with uncompleted Work, plus fair and reasonable sums for overhead and profit on such expenses; and
    - 3. other reasonable expenses directly attributable to termination, including costs incurred to prepare a termination for convenience cost proposal.
  - B. Contractor shall not be paid on account of loss of anticipated overhead, profits, or revenue, or other economic loss arising out of or resulting from such termination.

# 16.04 Contractor May Stop Work or Terminate

- A. If, through no act or fault of Contractor, (1) the Work is suspended for more than 90 consecutive days by Owner or under an order of court or other public authority, or (2) Engineer fails to act on any Application for Payment within 30 days after it is submitted, or (3) Owner fails for 30 days to pay Contractor any sum finally determined to be due, then Contractor may, upon seven days written notice to Owner and Engineer, and provided Owner or Engineer do not remedy such suspension or failure within that time, terminate the contract and recover from Owner payment on the same terms as provided in Paragraph 16.03.
- B. In lieu of terminating the Contract and without prejudice to any other right or remedy, if Engineer has failed to act on an Application for Payment within 30 days after it is submitted, or Owner has failed for 30 days to pay Contractor any sum finally determined to be due, Contractor may, seven days after written notice to Owner and Engineer, stop the Work until payment is made of all such amounts due Contractor, including interest thereon. The provisions of this paragraph are not intended to preclude Contractor from submitting a Change Proposal for an adjustment in Contract Price or Contract Times or otherwise for

expenses or damage directly attributable to Contractor's stopping the Work as permitted by this paragraph.

#### **ARTICLE 17 – FINAL RESOLUTION OF DISPUTES**

#### 17.01 *Methods and Procedures*

- A. *Disputes Subject to Final Resolution*: The following disputed matters are subject to final resolution under the provisions of this Article:
  - 1. A timely appeal of an approval in part and denial in part of a Claim, or of a denial in full; and
  - 2. Disputes between Owner and Contractor concerning the Work or obligations under the Contract Documents, and arising after final payment has been made.
- B. *Final Resolution of Disputes*: For any dispute subject to resolution under this Article, Owner or Contractor may:
  - 1. elect in writing to invoke the dispute resolution process provided for in the Supplementary Conditions; or
  - 2. agree with the other party to submit the dispute to another dispute resolution process; or
  - 3. if no dispute resolution process is provided for in the Supplementary Conditions or mutually agreed to, give written notice to the other party of the intent to submit the dispute to a court of competent jurisdiction.

#### **ARTICLE 18 – MISCELLANEOUS**

- 18.01 *Giving Notice* 
  - A. Whenever any provision of the Contract Documents requires the giving of written notice, it will be deemed to have been validly given if:
    - 1. delivered in person, by a commercial courier service or otherwise, to the individual or to a member of the firm or to an officer of the corporation for which it is intended; or
    - 2. delivered at or sent by registered or certified mail, postage prepaid, to the last business address known to the sender of the notice.

#### 18.02 *Computation of Times*

- A. When any period of time is referred to in the Contract by days, it will be computed to exclude the first and include the last day of such period. If the last day of any such period falls on a Saturday or Sunday or on a day made a legal holiday by the law of the applicable jurisdiction, such day will be omitted from the computation.
- 18.03 Cumulative Remedies
  - A. The duties and obligations imposed by these General Conditions and the rights and remedies available hereunder to the parties hereto are in addition to, and are not to be construed in any way as a limitation of, any rights and remedies available to any or all of them which are otherwise imposed or available by Laws or Regulations, by special warranty or guarantee, or by other provisions of the Contract. The provisions of this paragraph will be as effective as if repeated specifically in the Contract Documents in connection with each particular duty, obligation, right, and remedy to which they apply.

#### 18.04 Limitation of Damages

A. With respect to any and all Change Proposals, Claims, disputes subject to final resolution, and other matters at issue, neither Owner nor Engineer, nor any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors, shall be liable to Contractor for any claims, costs, losses, or damages sustained by Contractor on or in connection with any other project or anticipated project.

#### 18.05 No Waiver

- A. A party's non-enforcement of any provision shall not constitute a waiver of that provision, nor shall it affect the enforceability of that provision or of the remainder of this Contract.
- 18.06 Survival of Obligations
  - A. All representations, indemnifications, warranties, and guarantees made in, required by, or given in accordance with the Contract, as well as all continuing obligations indicated in the Contract, will survive final payment, completion, and acceptance of the Work or termination or completion of the Contract or termination of the services of Contractor.

#### 18.07 *Controlling Law*

- A. This Contract is to be governed by the law of the state in which the Project is located.
- 18.08 Headings
  - A. Article and paragraph headings are inserted for convenience only and do not constitute parts of these General Conditions.

#### SECTION 007300 - SUPPLEMENTARY CONDITIONS

These Supplementary Conditions amend and supplement Section 007200 "General Conditions," and other provisions of the Contract Documents as indicated below. All provisions of the General Conditions that are amended or supplemented remain in full force and effect as so amended or supplemented. All provisions of the General Conditions which are not so amended or supplemented remain in full force and effect.

# **DEFINED TERMS**

The terms used in these Supplementary Conditions, which are defined in the General Conditions, have the meaning assigned to them in the General Conditions.

#### AMENDMENTS AND SUPPLEMENTS

The following are instructions that amend or supplement specific paragraphs in the General Conditions and other Contract Documents.

## **ARTICLE 1 – DEFINITIONS AND TERMINOLOGY**

#### SC-1.01. Defined Terms

Add the following language at the end of the definition for Addenda, 1.01.A.1:

"In case of inconsistency between the Contract Documents, Drawing, and Specifications and any Addenda, the Addenda supersedes other Contract Documents, Drawings, and Specifications."

Add the following language at the end of the definition for Change Order, 1.01.A.8:

"Extra work will not be considered for a Change Order or for an adjustment in the Contract Price or the Contract Times unless the document is executed by both Owner and Contractor. Furthermore, the parties agree that under no circumstances will an act or a failure to act on the part of the Owner or Engineer constitute waiver of the written Change Order requirement for extra work. A written Change Order is a strict condition precedent for payment for extra work."

Add the following language at the end of the definition for Contractor, 1.01.A.16:

"For the purposes of giving or receiving notice, directives, change orders, or any other information from Engineer or Owner to Contractor, the Contractor shall designate in writing one person as Project Manager to receive such notice, directives, change orders, or other information. If the person so identified by Contractor is not present on the job site during normal working hours for any consecutive 48-hour period, the Contractor shall in writing addressed to Engineer and Owner identify the individual who is acting as Project Manager."

Add the following language at the end of the definition for Engineer, 1.01.A.20:

"The Engineer shall identify a specific individual to serve as liaison between the Owner and Contactor and between the Engineer and Contractor. The Engineer will notify the Owner and Contractor of the name of an acting replacement as Engineer representative whenever the person so designated is not available. Whenever the Contractor or Owner requires information, direction, or assistance, the Contractor or Owner shall notify the individual designated by the Engineer." Add the following language at the end of the definition for Field Order, 1.01.A.21:

"Engineer will obtain the signature of the Contractor on all Field Orders. This signature confirms that the Contractor is not entitled to any change in the Contract Price or the Contract Times. The Engineer will endeavor to obtain the signature of the Contractor on all Field Orders on a weekly basis."

Delete paragraph 1.01.A.26 in its entirety and insert the following in its place:

"26. Notice of Award – The written notice by Owner to the apparent Successful Bidder stating that upon compliance by the apparent Successful Bidder with the conditions precedent enumerated therein, within the time specified. Owner (if Owner decides to proceed with the Work) will sign and deliver the Agreement to the apparent Successful Bidder. However, the Notice of Award shall not be construed as an agreement, meeting of the minds, contract, or any other legal obligation between the Owner and Contractor. Until the Contractor receives a Notice to Proceed from the Owner, the Contractor has no remedy against the Owner."

Delete paragraph 1.01.A.32 in its entirety and insert the following in its place:

"32. Resident Project Representative – The authorized representative of Owner assigned to assist Owner and Engineer at the Site. As used herein, the term Resident Project Representative or "RPR" includes any assistants or field staff of Resident Project Representative."

## SC-1.02. Terminology

Add the following new paragraph immediately before paragraph 1.02.B and renumber the remaining Articles in Section 1.02:

"A. Approved – When the words "approved," "satisfactory," "proper," or "as directed" are used, approval by the Architect-Engineer shall be understood except where approval by the Owner is specified or indicated."

Add the following new paragraphs immediately before paragraph 1.02.G and renumber the remaining Articles in Section 1.02:

- "G. Indicate When the word "indicate" including derivatives thereof is used, it shall mean as shown on the Contract Drawings or on approved Shop Drawings.
- H. Knowledge The terms "knowledge," "recognize," and "discover," their respective derivatives and similar terms in the Contract Documents, as used in reference to the Contractor, shall be interpreted to mean that which the Contractor knows or should know, recognizes or should recognize, and discovers or should discover in exercising the care, skill, and diligence required by the Contract Documents. Analogously, the expression "reasonably inferable" and similar terms in the Contract Documents shall be interpreted to mean reasonably inferable by the Contractor exercising the care, skill, and diligence required of the Contractor by the Contract Documents."

# **ARTICLE 2 – PRELIMINARY MATTERS**

# SC-2.03. Before Starting Construction

Add the following new paragraph immediately after paragraph GC 2.03.A.3.:

**"**4. Where a Contract is awarded on a lump sum basis, the Contractor shall file with the Engineer a balanced price segregation of his lump sum bid into items similar to the various subdivisions of the general and detailed specifications, the sum of which shall equal the lump sum bid. The cost of various materials shall be furnished upon request of the Engineer, and such data will then be used as a basis for making monthly estimates. Breakdown cost itemized by trade and specification section and distribute cost to individual applicable units and structures. Where structures, units, equipment, or other components are identified by a specific series or, identification number, utilize said designation throughout cost breakdown. Provide detailed breakdown for individual yard piping or conduit runs and identify approximate quantities involved to satisfaction of the Engineer. Provide separate breakdown for [ineligible items,] change order items, or items requested. Provide an additional breakdown sheet showing the tabulation format for stored materials. Submit this sheet each month with Contractor's pay request breakdown. The detail and format of cost breakdown and stored materials tabulation sheet shall be fully approved by Engineer."

#### SC-2.05. Initial Acceptance of Schedules

Add the following new paragraphs immediately following paragraph GC-2.05.A.3.:

- "B. The Owner's or Engineer's silence as to a submitted schedule that exceeds time limits current under the Contract Documents shall not relieve the Contractor of its obligation to meet those time limits, nor shall it make the Owner or Engineer liable for any Contractor damages incurred as a result of increased construction time or not meeting those time limits. Similarly, the Owner's or Engineer's silence as to a Contractor's schedule showing performance in advance of such time limits shall not create or infer any rights in favor of the Contractor for performance in advance of such time limits.
- C. For Progress Schedule, see Section 013200 "Construction Progress Documentation" and Shop Drawing Schedule.

# **ARTICLE 3 – DOCUMENTS: INTENT, REQUIREMENTS, REUSE**

#### SC-3.01. Intent

Add the following new paragraphs immediately after paragraph GC-3.01.E:

"F. The Specifications may vary in form, format, and style. Some specification sections are written in varying degrees of streamlined or declarative style and some sections may be relatively narrative by comparison. Omissions of such words and phrases as "the Contractor shall," "in conformity with," "as shown," or "as specified" are intentional in streamlined sections. Omitted words and phrases shall be supplied by inference. Similar types of provisions may appear in various parts of a section or articles within a part

depending on the format of the section. The Contractor shall not take advantage of any variation of form, format, or style in making claims for extra Work.

G. The cross referencing of specification sections under the subparagraph heading "Related Sections include but are not necessarily limited to:" and elsewhere within each specification section is provided as an aid and convenience to the Contractor. The Contractor shall not rely on the cross referencing provided and shall be responsible to coordinate the entire work under the Contract Documents and provide a complete Project whether or not the cross referencing is provided in each section or whether or not the cross referencing is complete."

#### SC-3.04 Requirements of the Contract Documents

Delete the last sentence of paragraph GC 3.04.C.

# **ARTICLE 4 – COMMENCEMENT AND PROGRESS OF THE WORK**

#### SC-4.03. Reference Points

Delete the first sentence of paragraph GC-4.03.A. and substitute the following:

"Contractor shall engage, at Contractor's expense, a licensed land surveyor to establish for Contractor a baseline and datum benchmark necessary to enable Contractor to proceed with the Work. Said Engineer or surveyor shall submit to Engineer a plat showing the baseline and datum benchmark, ties to existing permanent physical features, and shall certify the accuracy of said survey."

#### SC-4.05

Add the following to the end of paragraph GC-4.05.C.2:

"Contract times for weather delays will only be granted when the number for each month exceeds four days."

Add new paragraph (after paragraph GC-4.05.G), which are to read as follows:

"H. Owner, at Owner's sole discretion, may waive the requirements of paragraph GC-4.05 and grant extensions to the Contract Time for any reason Owner deems valid."

# ARTICLE 5 – AVAILABILITY OF LANDS; SUBSURFACE AND PHYSICAL CONDITIONS; HAZARDOUS ENVIRONMENTAL CONDITIONS

# SC-5.01. Availability of Lands

Add the following new paragraph immediately after paragraph 5.01.C:

"D. Easement lines shown on the Contract Drawings are approximate and were provided to establish a basis for bidding. Upon receiving the final easement descriptions, Contractor shall compare them to the lines shown on the Contract Drawings. If Contractor considers the final easements provided to differ materially from the representations on the Contract

Drawings, Contractor shall within 5 calendar days and before proceeding with the Work, notify Engineer in writing of any extra costs or time of performance associated with the differing easement line locations and the claim shall be administered in accordance with the Conditions of the Contract."

# SC-5.03. Subsurface and Physical Conditions

Delete Paragraphs 5.03.A and 5.03.B in their entirety and insert the following:

"A. No reports of explorations or tests of subsurface conditions at or adjacent to the Site, or drawings of physical conditions relating to existing surface or subsurface structures at the Site, are known to Owner."

#### SC-5.04. Differing Subsurface or Physical Conditions

In the paragraph after 5.04.A.4., modify the words "then Contractor shall, promptly..." to read as "then Contractor shall immediately (within 24 hours or less)..."

#### SC-5.06. Hazardous Environmental Conditions

Delete Paragraphs 5.06.A and 5.06.B in their entirety and insert the following:

- "A. No reports or drawings related to Hazardous Environmental Conditions at the Site are known to Owner.
- B. Not Used."

Delete Paragraph 5.06. I. and insert the following:

"I. Not Used"

# **ARTICLE 6 – BONDS AND INSURANCE**

#### SC-6.01. Performance, Payment, and Other Bonds

Amend paragraph 6.01.B. by adding the following sentence at the end of the paragraph.

"The performance bond shall include, in part, provisions to indemnify and hold harmless Owner, Engineer, Engineer's Consultants and their respective officers, directors, agents, and employees as provided in paragraph GC-7.18."

# SC-6.03. Contractor's Liability Insurance

Add the following new paragraph immediately after Paragraph 6.03.J:

"K. The limits of liability for the insurance required by Paragraph 6.03 of the General Conditions shall provide coverage for not less than the following amounts or greater where required by Laws and Regulations:

1. Workers' Compensation, and related coverages under Paragraphs 6.03.A.1 and A.2 of the General Conditions:

	a.	State:	Statutory				
	b.	Federal, if applicable (e.g., Longshoreman's):	Statutory				
	c.	Jones Act coverage, if applicable:					
		1) Bodily injury by accident, each accident:	\$				
		2) Bodily injury by disease, aggregate:	\$				
	d.	Employer's Liability:					
		1) Bodily injury, each accident	\$				
		2) Bodily injury by disease, each employee	\$				
		3) Bodily injury/disease aggregate	\$				
	e.	For work performed in monopolistic states, stop- gap liability coverage shall be endorsed to either the worker's compensation or commercial general liability policy with a minimum limit of:	\$				
	f.	Foreign voluntary worker compensation	Statutory				
2.	Contractor's Commercial General Liability under Paragraphs 6.03.B and 6.03.C of the General Conditions:						
	a.	General Aggregate:	\$				
	b.	Products - Completed Operations Aggregate:	\$				
	c.	Personal and Advertising Injury:	\$				
	d.	Each Occurrence (Bodily Injury and Property Damage):	\$				
3.	Automobile Liability under Paragraph 6.03.D. of the General Conditions:						
	a.	Bodily Injury:					
		1) Each person	\$				
		2) Each accident	\$				
	b.	Property Damage:					
		1) Each accident	\$				
4.	Exc	1) Combined Single Limit of	\$				
	a.	Per occurrence:	\$				
	b.	General Aggregate:	\$				
5.	Con	tractor's Pollution Liability:					
	a.	Each occurrence:	\$				

6.	<ul> <li>b. General Aggregate: \$</li> <li>If box is checked, Contractor is not required to provide Contractor's Pollution Liability insurance under this Contract</li> <li>Additional Insureds: In addition to Owner and Engineer, include as additional insureds the following: [Here list by name (not category, role, or classification) other persons or entities to be included on the commercial general liability, automobile liability, umbrella or excess, and pollution liability policies as additional insureds.]</li> </ul>					
7.	Contractor's Professional Liability:					
	a. Each claim:	\$				
8.	b. Annual Aggregate: [Here list additional types and amounts of	\$ insurance that may be required				

# SC-6.03. Contractor's Insurance

by Owner.]

Add paragraph 6.03.L.:

"L. The coverage shall be on an occurrence basis with an insurer licensed to conduct business in the Commonwealth of Virginia. The insurer must have an A.M. Best Rating of A- or better."

#### SC-6.04. Owner's Liability Insurance

Delete paragraph 6.04.A. and 6.04.B. in its entirety and replace with the following:

"A. In addition to the insurance required to be provided by Contractor under paragraph 6.03, Contractor shall purchase and maintain for Owner at Contractor's expense Owner's Protective Liability insurance identifying Owner as the named insured with Engineer and Engineer's Consultants as additional insureds. Said insurance will protect said parties against claims which may arise from operations under the Contract Documents. This coverage shall be written by the same company which provides Contractor's liability insurance coverage and in the same minimum amounts."

#### SC-6.05.A.1.

At the end of Paragraph 6.05.A.1, add the following sentence:

"The insured and the additional insured shall be listed in the insurance coverage by specific name and not by genre."

# SC-6.05.A.2.

At the end of Paragraph 6.05.A.2., add the following sentences:

"Additional perils are as follows: explosion, and underground exposures."

"Contractor will provide Boiler and Machinery insurance in the amount of

\$\_\_\_\_\_<enter amount> with \$\_\_\_\_\_<enter amount> deductible."

### SC-6.05.A.13.

Add the following paragraph immediately following paragraph 6.05.A.13:

"14. Other Property Insurance: a. Earthquake & Flood \$\_\_\_\_\_<enter amount>"

#### SC-6.05.D.1 and 6.05.D.2

Add two paragraphs immediately after Paragraph GC-6.05.D, which are to read as follows:

- "1. All insurance required by the Contract Documents, or by laws or regulations shall remain in full force and effect on all phases of the Work, whether or not the Work is occupied or utilized by Owner, until all Work included in the agreement has been completed and final payment has been made.
- 2. Nothing contained in the insurance requirements shall be construed to limit the extent of Contractor's responsibility for payment of damages resulting from his operations under the Contract. Contractor agrees that he alone shall be completely responsible for procuring and maintaining full insurance coverage as provided herein or as may be otherwise required by the Contract Documents. Any approval by Owner or Engineer shall not operate to the contrary."

#### SC-6.06 Waiver of Rights

Delete paragraph 6.06.B. and 6.06.C. and replace with the following:

- "B. Not Used.
- C. Not Used."

# **ARTICLE 7 – CONTRACTOR'S RESPONSIBILITIES**

#### SC-7.01. Supervision and Superintendence

Add the following sentence to the end of paragraph 7.01.B.:

"The superintendent will be in the direct employment of the Contractor and will be Contractor's representative at the Site and shall have authority to act on behalf of Contractor. All communications given to or received from the superintendent shall be binding on Contractor."

# SC-7.02. Labor; Working Hours

Add paragraph 7.02.C with the following:

"C. The cost of any overtime pay or other expense incurred by the Owner for Resident Project Representative [, **Owner's Representative**,] and construction observation services, occasioned by the conduct of Work on Saturday, Sunday, any legal holiday, or as overtime on any regular work day, shall be reimbursed to the Owner by the Contractor."

# SC-7.03. Services, Materials, and Equipment

Add a paragraph immediately after paragraph 7.03.A, which is to read as follows:

"1. Where the Work requires equipment be furnished, due to the lack of standardization of equipment as produced by the various manufacturers, it may become necessary to make minor modifications in the structures, buildings, piping, mechanical work, electrical work, accessories, controls, or other work, to accommodate the particular equipment offered. Contractor's bid price for any equipment offered shall include the cost of making any necessary changes subject to the approval of Engineer."

Add the following sentence at the end of the first sentence of paragraph 7.03.B.

"All items of standard equipment shall be the latest model at the time of delivery."

#### SC-7.05. Substitutes

Add a new paragraph after paragraph 7.05.F., which is to read as follows:

"G. See Section 012514 "Major Equipment and System Suppliers" and Section 016000 "Product Requirements" for additional requirements."

#### SC-7.06. Concerning Subcontractors, Suppliers, and Others

Add the following sentence to the end of paragraph 7.06.B.

"The Contractor shall include in any and all subcontracts a provision requiring each subcontractor to include or otherwise be subject to the same payment and interest requirements as exist between the Contractor and its subcontractors with respect to each lower-tier subcontractor."

Add the following new paragraphs after paragraph 7.06.O.:

- "1. In accordance with Section 2.2-4354(1)(a) and (b) of the Code of Virginia, 1050, as amended, the Contractor shall take one of the following courses of action within seven (7) calendar days after receipt of amounts paid to the Contractor by the Owner for work performed by any Subcontractor under this Contract:
  - a. Pay any and all Subcontractors for the proportionate share of the total payment received from the Owner attributable to all work performed by such Subcontractor(s) under this Contract; or
  - b. Notify the Owner and the appropriate Subcontractor(s), in writing, of his intention to withhold all or part of said Subcontractor(s) payment with the reason for nonpayment.
- 2. In accordance with Section 2.2-4354(3) and (4) of the Code of Virginia, 1950, as amended, the Contractor shall pay interest to any and all Subcontractors on all amounts owed by the Contractor that remain unpaid after seven days following receipt by the Contractor of payment from the Owner for work performed by any such Subcontractor under this Contract, except for payments withheld as allowed in the General Conditions. Unless otherwise provided under the terms of this Contract, interest shall accrue at the rate of one percent per month."

# **SC-7.07 Patent Fees and Royalties**

Delete paragraph 7.07.B. and replace with the following:

"B. Not Used"

#### SC-7.08. Permits

In paragraph 7.08.A., add the words "and bonds" at the end of the first sentence after the word "licenses".

Add the following new paragraph immediately after paragraph 7.08.A:

"B. In those instances where a certificate of occupancy must be obtained before the Work under this Contract can be occupied and placed into service by Owner, it shall be the responsibility of Contractor to arrange, coordinate, and pay any costs of obtaining said certificate."

#### SC-7.09. Taxes

Add a new paragraph after paragraph 7.09.A, which is to read as follows:

"B. If this is a wastewater collection and/or treatment project, Owner is exempt from state sales and use taxes on materials and equipment to be incorporated in the Work of facilities constructed for the purposes of abating or preventing pollution. Such taxes shall not be included in the Bid Price. The Contractor shall be responsible to file the necessary forms of claiming exemption with the Virginia Department of Taxation. Owner will submit tax exempt certification notification to the Virginia Department of Taxation."

#### **SC-7.11. Record Documents**

Insert the following sentence after the first sentence of paragraph 7.11.A:

"Contractor shall include accurate locations for buried and imbedded items."

At the end of paragraph 7.11.A, add the following language:

"Contractor to make one reproducible copy of said record drawings and deliver to Engineer for Owner."

#### SC-7.12.B.

Add the following sentence to the end of Paragraph 7.12.B:

"The Contractor shall comply with all OSHA regulations."

#### SC-7.16. Shop Drawings, Samples, and Other Submittals

Add the word "required" to the first sentence of paragraph 7.16.B., immediately after the words "Contractor shall submit."

#### SC-7.16.B.3.

After paragraph GC-7.16.B.3., add the following paragraphs:

- "a. The Contractor represents and warrants that all shop drawings shall be prepared by persons and entities possessing expertise and experience in the trade for which the shop drawing is prepared and, if required by the Contract Documents or applicable law, by a licensed architect or engineer, as appropriate.
- b. If a Shop Drawing or Sample, as submitted, indicates a variation from the Contract Requirements as set forth in the Contract Documents and Engineer finds same to be in the interest of Owner and to be so minor as not to involve a change in the Contract Price or time for performance, Engineer may approve the Shop Drawings or Samples; provided however, such departure is slight in nature and does not affect the design concept of the Work.
- c. Contractor shall submit all Shop Drawings and Samples sufficiently in advance of construction requirements to allow ample time for checking, correcting, resubmitting, and rechecking and to avoid any delay in progress of the Work.
- d. See Section 013300 "Submittal Procedures."

At the end of paragraph GC-7.16.B., add the following paragraphs:

- "4. Shop Drawings submitted as herein provided by Contractor and reviewed by Engineer for conformance with the design concept shall be executed in conformity with the Contract Documents unless otherwise required by Owner.
- 5. When Shop Drawings are submitted for the purpose of showing the installation in greater detail, their review shall not excuse Contractor from requirements shown on the drawings and Specifications."
- "6. For-Information-Only-For-Future-Use submittals upon which the Engineer is not expected to conduct review or take responsive action may be so identified in the Contract Drawings."

# SC-7.16.D.1.

Remove the word "timely" and add the word "required" to the first sentence of paragraph GC-7.16.D.1. immediately after the words "Engineer will provide".

# SC-7.16.D.4.

Add the word "required" to the first sentence of paragraph GC-7.16.D.4. immediately after the words "Engineer's review and approval of".

# SC-7.18.A.

Delete the following "but only to the extent caused by any negligent act or omission of Contractor, any Subcontractor, any Supplier, or any individual or entity directly or indirectly employed by any of them to perform any of the Work or anyone for whose acts any of them may be liable" in paragraph GC-7.18A and replace with the following "that is the result of any intentional or negligent act or omission of Contractor, any Subcontractor, any Supplier, or any individual or entity directly employed by any of them to perform any of the Work or anyone whose acts any of them may be liable."

# **ARTICLE 9 – OWNER'S RESPONSIBILITIES**

### 9.02 Replacement of Engineer

Delete the following in Paragraph 9.02.A. "provided Contractor makes no reasonable objection to the replacement engineer."

#### 9.11 Evidence of Financial Arrangements

Delete Paragraph 9.11 in its entirety and replace with the following "9.11 Not Used."

# **ARTICLE 10 – ENGINEER'S STATUS DURING CONSTRUCTION**

#### SC-10.03 Project Representative

Add the following new paragraphs immediately after Paragraph 10.03.A:

- "B. The Resident Project Representative (RPR) will be Engineer's representative at the Site, will act as directed by and under the supervision of Engineer, and will confer with Engineer regarding RPR's actions.
  - 1. General: RPR's dealings in matters pertaining to the Work in general shall be with Engineer and Contractor. RPR's dealings with Subcontractors shall only be through or with the full knowledge and approval of Contractor. RPR shall generally communicate with Owner only with the knowledge of and under the direction of Engineer.
  - 2. Schedules: Review the progress schedule, schedule of Shop Drawing and Sample submittals, and Schedule of Values prepared by Contractor and consult with Engineer concerning acceptability.
  - 3. Conferences and Meetings: Attend meetings with Contractor, such as preconstruction conferences, progress meetings, job conferences, and other Project-related meetings, and prepare and circulate copies of minutes thereof.
  - 4. Liaison:
    - a. Serve as Engineer's liaison with Contractor. Working principally through Contractor's authorized representative or designee, assist in providing information regarding the provisions and intent of the Contract Documents.
    - b. Assist Engineer in serving as Owner's liaison with Contractor when Contractor's operations affect Owner's On-Site operations.
    - c. Assist in obtaining from Owner additional details or information, when required for proper execution of the Work.

- 5. Interpretation of Contract Documents: Report to Engineer when clarifications and interpretations of the Contract Documents are needed and transmit to Contractor clarifications and interpretations as issued by Engineer.
- 6. Shop Drawings and Samples:
  - a. Record date of receipt of Samples and Contractor-approved Shop Drawings.
  - b. Receive Samples which are furnished at the Site by Contractor and notify Engineer of availability of Samples for examination.
  - c. Advise Engineer and Contractor of the commencement of any portion of the Work requiring a Shop Drawing or Sample submittal for which RPR believes that the submittal has not been approved by Engineer.
- 7. Modifications: Consider and evaluate Contractor's suggestions for modifications in Drawings or Specifications and report such suggestions, together with RPR's recommendations, if any, to Engineer. Transmit to Contractor in writing decisions as issued by Engineer.
- 8. Review of Work and Rejection of Defective Work:
  - a. Conduct on-Site observations of Contractor's work in progress to assist Engineer in determining if the Work is in general proceeding in accordance with the Contract Documents.
  - b. Report to Engineer whenever RPR believes that any part of Contractor's work in progress is defective, will not produce a completed Project that conforms generally to the Contract Documents, or will imperil the integrity of the design concept of the completed Project as a functioning whole as indicated in the Contract Documents, or has been damaged, or does not meet the requirements of any inspection, test or approval required to be made; and advise Engineer of that part of work in progress that RPR believes should be corrected or rejected or should be uncovered for observation, or requires special testing, inspection or approval.
- 9. Inspections, Tests, and System Start-ups:
  - a. Verify that tests, equipment, and systems start-ups and operating and maintenance training are conducted in the presence of appropriate Owner's personnel, and that Contractor maintains adequate records thereof.
  - b. Observe, record, and report to Engineer appropriate details relative to the test procedures and systems start-ups.

- 10. Records:
  - a. Prepare a daily report or keep a diary or log book, recording Contractor's hours on the Site, Subcontractors present at the Site, weather conditions, data relative to questions of Change Orders, Field Orders, Work Change Directives, or changed conditions, Site visitors, deliveries of equipment or materials, daily activities, decisions, observations in general, and specific observations in more detail as in the case of observing test procedures; and send copies to Engineer.
  - b. Record names, addresses, fax numbers, e-mail addresses, web site locations, and telephone numbers of all Contractors, Subcontractors, and Major Suppliers of materials and equipment.
  - c. Maintain records for use in preparing Project documentation.
- 11. Reports:
  - a. Furnish to Engineer periodic reports as required of progress of the Work and of Contractor's compliance with the Progress Schedule and schedule of Shop Drawing and Sample submittals.
  - b. Draft and recommend to Engineer proposed Change Orders, Work Change Directives, and Field Orders. Obtain backup material from Contractor.
  - c. Immediately notify Engineer of the occurrence of any Site accidents, emergencies, acts of God endangering the Work, force majeure or delay events, damage to property by fire or other causes, or the discovery of any Constituent of Concern or Hazardous Environmental Condition.
- 12. Payment Requests: Review applications for payment with Contractor for compliance with the established procedure for their submission and forward with recommendations to Engineer, noting particularly the relationship of the payment requested to the Schedule of Values, Work completed, and materials and equipment delivered at the Site but not incorporated in the Work.
- 13. Certificates, Operation and Maintenance Manuals: During the course of the Work, verify that materials and equipment certificates, operation and maintenance manuals and other data required by the Contract Documents to be assembled and furnished by Contractor are applicable to the items actually installed and in accordance with the Contract Documents, and have these documents delivered to Engineer for review and forwarding to Owner prior to payment for that part of the Work.
- 14. Completion:
  - a. Participate in Engineer's visits to the Site to determine Substantial Completion, assist in the determination of Substantial Completion and the preparation of a punch list of items to be completed or corrected.

- b. Participate in Engineer's final visit to the Site to determine completion of the Work, in the company of Owner and Contractor, and prepare a final punch list of items to be completed and deficiencies to be remedied.
- c. Observe whether all items on the final list have been completed or corrected and make recommendations to Engineer concerning acceptance and issuance of the notice of acceptability of the work.

#### C. The RPR shall not:

- 1. Authorize any deviation from the Contract Documents or substitution of materials or equipment (including "or-equal" items).
- 2. Exceed limitations of Engineer's authority as set forth in the Contract Documents.
- 3. Undertake any of the responsibilities of Contractor, Subcontractors, or Suppliers.
- 4. Advise on, issue directions relative to, or assume control over any aspect of the means, methods, techniques, sequences or procedures of Contractor's work.
- 5. Advise on, issue directions regarding, or assume control over security or safety practices, precautions, and programs in connection with the activities or operations of Owner or Contractor.
- 6. Participate in specialized field or laboratory tests or inspections conducted offsite by others except as specifically authorized by Engineer.
- 7. Accept Shop Drawing or Sample submittals from anyone other than Contractor.
- 8. Authorize Owner to occupy the Project in whole or in part."
- "B. On this Project, by agreement with the Owner, Engineer will not furnish a Resident Project Representative to represent Engineer at the Site or assist Engineer in observing the progress and quality of the Work. [See explanatory text at beginning of SC-9.13, and at beginning of SC-10.03, for discussion of this second alternative SC-10.03.B]."

# SC-10.04

Add a new paragraph immediately after paragraph GC-10.04.A., which is to read as follows:

"B. The acceptance at any time of materials or equipment by or on behalf of Owner shall not be a bar to future rejection if they are subsequently found to be defective, inferior in quality, or uniformity to material or equipment specified, or are not as represented to Engineer or Owner."

# SC-10.06.A.

Add the following language at the end of paragraph GC-10.06.A:

"Contractor shall, at his own expense, provide help and other assistance as may be required for making said measurements."

# **ARTICLE 11 – AMENDING THE CONTRACT DOCUMENTS; CHANGES IN THE WORK**

#### SC 11.04 A.

Delete the following "Any Claim for an adjustment of Contract Price shall comply with the provisions of Article 12" in Paragraph GC 11.04.A.

#### SC 11.04 B.

Delete the following "(which may include an allowance for overhead and profit not necessarily in accordance with Paragraph 11.04.C.2.); or" in Paragraph GC 11.04.B.2.

Delete Paragraph GC 11.04.B.3. in its entirety.

#### SC 11.04 C.

Delete Paragraph GC. 11.04.C. in its entirety.

#### SC-11.05.A.

Delete the following "Any Claim for an adjustment in the Contract Times shall comply with the provisions of Article 12" from Paragraph GC 11.05.A.

# SC-11.05.C.

Add a new paragraph after paragraph GC-11.05.B, which is to read as follows:

"C. No extension of the Contract Time will be allowed for additional Work or for claimed delay unless the additional Work contemplated or claimed delay is shown to be on the critical path of the Project's schedule of construction or Contractor can show by Critical Path Method analysis how the additional Work or claimed delay adversely affects the critical path."

# SC-11.06.A.

Delete the following "thereby commencing the time for an appeal of the denial under Article 12" from Paragraph GC 11.06.A.2.

Delete the following "Owner or Contractor appeals the decision by filing a Claim under Article 12" and replace with "either Party may follow the process for contractual disputes provided in paragraph 1.19 titles, "contractual disputes," as applicable." in paragraph GC 11.06.A.3.

#### SC-11.06.B.

Delete the following "and Contractor may choose to seek resolution under the terms of Article 12" and replace with "either party may follow the process for contractual disputes provided in paragraph 1.19 titled, "contractual disputes", as applicable" in Paragraph GC 11.06.B.

#### SC-11.07.A.

Delete the following "or Article 12" from Paragraph GC 11.07.A.4.

#### SC-11.07.C

Add the following new paragraph immediately following GC-11.07.B:

"C. Agreements on any Change Order shall constitute a final settlement of all matters relating to the change in the Work that is the subject of the Change Order, including, but not limited to, all direct and indirect costs associated with such change and any and all adjustments to the Contract Price and Contract Times. In the event a Change Order increases the Contract Price, the Contractor shall include the Work covered by such Change Order in applications for payments as if such Work were originally part of the Contract Documents."

# **ARTICLE 12 – CLAIMS**

Delete Article 12 of the General Conditions in its entirety and replace with "NOT USED."

# **ARTICLE 13 – COST OF THE WORK; ALLOWANCES; UNIT PRICE WORK**

#### SC-13.03.A.

Add the following language at the end of paragraph 13.03.A.:

"Work described in the Contract Documents but not identified in the listing of unit price items shall be considered incidental to unit price work listed and the cost of incidental work included as a part of the unit price."

#### SC-13.03.E.

Revise paragraph 13.03.E. to read as follows:

"E. No claim for an adjustment in the Contract Price shall be granted regardless of the quantity of unit price work performed. The Owner reserves the right to select the quantity of unit price work performed by the Contractor regardless of the unit price quantities listed in the Bid Form. This unit price work shall be paid at the unit price listed in the Bid Form with no exceptions."

# **ARTICLE 14 – TESTS AND INSPECTIONS; CORRECTION, REMOVAL OR ACCEPTANCE OF DEFECTIVE WORK**

# SC-14.02.C.

Add a new paragraph immediately after paragraph GC-14.02.C., which is to read as follows:

- "1. Contractor shall submit the name of the independent testing laboratory Contractor intends to use for the Project to Engineer for approval. Engineer will not withhold approval except for cause."
- "1. The Owner shall select the independent testing laboratory, and the Contractor to utilize the cash allowance in the Bid Form to pay for these services."

# ARTICLE 15 – PAYMENTS TO CONTRACTOR; SET-OFFS; COMPLETION; CORRECTION PERIOD

#### SC-15.01.D.1.

Replace the phrase "Ten days" at the beginning of GC-15.01.D.1 with the following:

"In accordance with the statutes of the State where the project is located".

#### SC 15.01.E.3.

Delete the following "and subject to interest as provided in the Agreement" from Paragraph 15.01.E.3.

# SC-15.03.H.

#### Add a new paragraph immediately after paragraph GC-15.03.G., which is to read as follows:

"H. If parts of the Work have been determined to be not acceptable for Substantial Completion requiring additional Work by Contractor and reinspection or retesting by Engineer, the cost of such reinspection or retesting including time, travel and living expense shall be paid by Contractor to Owner who will reimburse Engineer. Owner may offset said monies by deducting that amount from payments due to Contractor."

#### SC-15.07.B.

Delete the following "those pending matters that have been duly submitted or appealed under the provisions of Article 17" and replace with "disputes provided under paragraph titled "Contractual Disputes"" in paragraph GC-15.07.B.

# **ARTICLE 16 – SUSPENSION OF WORK AND TERMINATION**

#### SC-16.02.

Delete paragraph GC-16.02. in its entirety and replace with the following:

"A. If the Contractor should be adjudged as bankrupt, or if he should make a general assignment for the benefit of his creditors, or if a receiver should be appointed on account of his insolvency, the County may terminate the contract. If the Contractor violates any provisions of the Virginia Governmental Fraud Act, fails to obtain a required bond or to obtain and maintain the required insurance, or fails to perform or otherwise comply with the terms of the Contract Documents, the County may terminate the contract. If the Contractor violates are provided to perform the Work in accordance with Contract Documents, except in cases for which extension of time is provided, or to supply enough properly skilled workmen or proper materials, or if he should fail to make prompt payment to subcontractors or suppliers of material or labor, or persistently disregards laws, ordinances, or the written instructions of the County, or otherwise be guilty of a substantial violation of any provision of the contract then the County may terminate the contract.

B. Prior to termination of the contract, the County shall give the Contractor and his surety, if applicable, ten (10) calendar days written notice, during which the Contractor and/or his surety may rectify the cause of the termination. If rectified to the satisfaction of the County within said ten (10) days, the County may rescind his notice of termination. If it does not, the termination for cause shall become effective at the end of the ten-day 10) notice period. In the alternative, the County may postpone the effective date of the termination notice, at its sole discretion, if it should receive reassurances from the Contractor and/or its surety that the cause of termination will be remedied in a time and manner which the County finds acceptable. If at any time more than ten (10) days after the notice of termination, the County determines that Contractor and/or its surety has not or is not likely to rectify the causes of termination in an acceptable manner or within the time allowed, then the County may immediately terminate the contract for cause by giving written notice to the Contractor and its surety. In no event shall termination for cause terminate the obligations of the Contractor's surety on its payment and performance bonds. Any retention or payment of money due Contractor by Owner will not release Contractor from liability.

C. Notice of terminations, whether initial or given after a period of postponement, may be served upon the Contractor and the surety by mail or any other means at their last known places of business in Virginia or elsewhere, by delivery to any officer or management/supervisory employee of either wherever they may be found, or, if no such officer, employee or place of business is known or can be found by reasonable inquiry within three (3) days, by posting the notice at the job site. Failure to accept or pick up registered or certified mail addressed to the last known address shall be deemed to be delivery.

D. Upon such termination of the contract, the Contractor shall immediately cease work and shall immediately deliver to the County any and all materials and/or information kept on file, created or obtained on behalf of the County. County shall complete the work by whatever method it may deem expedient. In such case the Contractor shall not be entitled to receive any further payment. If the expense of finishing the work, including compensation for additional managerial and administrative services shall exceed the unpaid balance of the contract price, the Contractor shall pay the difference to the County, together with any other expenses of terminating the contract and having it completed by others.

E. If it should be judicially determined that the County improperly terminated this contract for cause, then the termination shall be deemed to be termination for the convenience of the County.

F. Termination of the contract under this section is without prejudice to any other right or remedy of the County."

# SC-16.03

Delete paragraph GC-16.03. in its entirety and replace with the following:

- A. Any resultant contract may be terminated, without cause and without prejudice to any other right or remedy of County, whenever the County determines that such a termination is in its best interests upon thirty (30) days prior written notice. The Contractor shall be paid for all goods delivered or services successfully completed prior to the termination date.
- B. Contractor shall not be paid on account of loss of anticipated overhead, profits, or revenue, or other economic loss arising out of or resulting from such termination.

# **ARTICLE 17 – FINAL RESOLUTION OF DISPUTES**

Delete the entire text of Article 17.

# **ARTICLE 18 – MISCELLANEOUS**

#### SC-18.07.A.

Delete paragraph GC-18.07.A in its entirety and replace with the following text:

"A. The Contract shall be governed by the laws of the Commonwealth of Virginia, both as to interpretation and performance. Every action brought under or related to the Contract shall be brought in the Circuit Court of the County of [\_\_\_\_], Virginia, and not elsewhere.

#### SC-18.09

Add the following new paragraph immediately after paragraph GC-18.08:

- "18.09 Additional Engineering Fees:
  - A. If the Contractor defaults and causes the Engineer to provide additional services, the Contractor shall be responsible for same. If the Contractor submits an extensive number of claims and the majority of such claims are rejected, the Contractor shall be responsible for any additional Engineer's fees for any such rejected claims. Any funds due under this paragraph shall be deducted by the Owner from the amounts due the Contractor for such additional Engineer's fees and paid directly to the Engineer."

#### SC-18.10

Add the following new paragraph immediately after paragraph GC-18.09:

- "18.10 Project Site Security:
  - A. Owner reserves the right to bar access to any individual for reasonable security reasons. Furthermore, Owner reserves the right to limit the location of entries to

the Project which may be used by Contractor, Subcontractors, Subsubcontractors, or any party for whom any of them may be responsible."

#### SC-18.11

Add the following new paragraph immediately after paragraph GC-18.10:

- "18.11 Confidentiality of Project Information
  - A. Contractor hereby warrants and represents that Contractor shall not knowingly or negligently communicate or disclose to any person or entity any information in connection with the Work, except (i) with Owner's prior written consent; (ii) as necessary to perform the Work, provided Owner receives prior notice of such necessity; or (iii) as may be required by law. Any authorized communication or disclosure shall be limited strictly to the extent of such authorization. If any person or entity seeks confidential information from Contractor regarding the Work, Contractor shall promptly notify Owner. All records and documents in connection with the Work are hereby considered proprietary materials and are confidential information. Contractor shall cause any Subcontractors, materialmen, consultants, or any other person or entity performing any portion of the Work to warrant and represent the items set forth in this paragraph. The representatives and warranties contained in this Paragraph 18.11 shall survive the complete performance of the Work or earlier termination of the Contract."

END OF SECTION



Change Order No.

Date of Issuance:	
Owner:	
Contractor:	
Engineer:	
Project:	

Effective Date: Owner's Contract No.: Contractor's Project No.: Engineer's Project No.: Contract Name:

The Contract is modified as follows upon execution of this Change Order: Description:

Attachments: [List documents supporting change]

CHANGE IN CONTRACT PRICE			CHANGE IN CONTRACT TIMES		
		[note changes in Milestones if applicable]			
Original Contract Price:			Original Contract	0	
			0		
\$					:
·				<b>J</b>	days or dates
[Increase] [Decrease] from previously	approve	d Change	[Increase] [Decrea	ase] fro	m previously approved Change
Orders No to No:			Orders No to No:		
			Substantial Comp	letion:	
\$			Ready for Final Payment:		
				-	days
Contract Price prior to this Change Ord	der:				his Change Order:
\$			Ready for Final Pa	yment	
					days or dates
[Increase] [Decrease] of this Change O	rder:		[Increase] [Decrea	ase] of t	this Change Order:
			Substantial Comp	letion:	
\$					
					days or dates
Contract Price incorporating this Chan	ge Order		Contract Times with all approved Change Orders:		
	•		Substantial Comp	letion:	
\$			Ready for Final Pa		
			-	-	days or dates
RECOMMENDED:		ACCE	PTED:		ACCEPTED:
Ву:	By:			By:	
Engineer (if required)		Owner (Aut	horized Signature)		Contractor (Authorized Signature)
Title:	Title			Title	
Date:	Date			Date	
Approved by Funding Agency (if					
applicable)					
			Data		
By:			Date:		
Title:					

#### {NAME OF OWNER}

# ESCROW AGREEMENT

THIS ESCROW AGREEMENT, made and entered into this day of
, 20 by, between and among
("" or "Owner"), and ("Contractor"),
(Name of Contractor)
(Address of Contractor)
(Name of Escrow Agent)
(Address of Escrow Agent)
a trust company, bank, or savings and loan institution (hereinafter referred to collectively as "Escrow Agent") with its principal office located in the Commonwealth of Virginia ("Commonwealth") and
(Name of Surety)
(Address of Surety)
("Surety") provides:
Contractor has entered into an Agreement dated with the Owner, for the
construction of
("Agreement"). This Escrow Agreement is pursuant to, but in no way amends or modifies, the Agreement. Payments made hereunder or the release of funds from escrow shall not be deemed approval or acceptance of performance by the Contractor. Payments should be made to Escrow Agent.
II.
In order to assure full and satisfactory performance by the Contractor of its obligations under the Agreement, Owner is required thereby to retain certain amounts otherwise due the Contractor. Contractor

Agreement, Owner is required thereby to retain certain amounts otherwise due the Contractor. Contractor has, with the approval of Owner, elected to have these retained amounts held in escrow by the Escrow Agent. This Escrow Agreement sets forth the terms of the escrow. Escrow Agent shall not be deemed a party to, bound by, or required to inquire into the terms of, the Agreement or any other instrument or contract between Owner and Contractor.

#### III.

Owner shall from time to time pursuant to the Agreement pay to Escrow Agent amounts retained by it under the Agreement. Except as to amounts actually withdrawn from escrow by Owner, Contractor shall look solely to the Escrow Agent for the payment of funds retained under the Agreement and paid by the Owner to the Escrow Agent.

The risk of loss by diminution of the principal of any funds invested under the terms of this Escrow Agreement shall be solely upon Contractor.

Funds and securities held by Escrow Agent pursuant to this Escrow Agreement shall not be subject to levy, garnishment, attachment, lien, or other process whatsoever. Contractor agrees not to assign, pledge, discount, sell, or otherwise transfer or dispose of its interest in the escrow account or any part thereof, except to the Surety.

#### IV.

Upon receipt of checks drawn by Owner and made payable to it as escrow agent, Escrow Agent shall promptly notify Contractor, negotiate the same, and deposit or invest and reinvest the proceeds in approved securities in accordance with the written instructions of Contractor. In no event shall Escrow Agent invest the escrowed funds in any security not approved, as set forth in Section V. below.

#### V.

The following securities, and none other, are approved securities for all purposes of this Agreement:

- (1) United States Treasury Bonds, United States Treasury Notes, United States Treasury Certificates of Indebtedness or United States Treasury Bills,
- (2) Bonds, notes, and other evidences of indebtedness unconditionally guaranteed as to the payment of principal and interest by the United States,
- (3) Bonds or notes of the Commonwealth of Virginia, and
- (4) Certificates of deposit issued by commercial Banks located within the Commonwealth, including, but not limited to, those insured by Escrow Agent and its affiliates.
- (6) Any bonds, notes, or other evidences of indebtedness listed in Sections (1) through (3) may be purchased pursuant to a repurchase agreement with a bank, within or without the Commonwealth of Virginia having a combined capital, surplus, and undivided profit of not less than \$25,000,000, provided the obligation of the bank to repurchase is within the time limitations established for investments as set forth herein. The repurchase agreement shall be considered a purchase of such securities even if title, and/or possession of such securities is not transferred to Escrow Agent, so long as the repurchase obligation of the bank is collateralized by the securities themselves, and the securities have on the date of the repurchase agreement a fair market value equal to at least 100 percent of the amount of the repurchase obligation of the bank, and the securities are held by a third party, and segregated from other securities owned by the bank.

No security is approved hereunder which matures more than five years after the date of its purchase by Escrow Agent or deposit by Contractor.

#### VI.

Contractor may from time to time withdraw the whole or any portion of the escrowed funds by depositing with the Escrow Agent approved securities as set forth in Section V above in an amount equal to, or in excess of, the amount so withdrawn. Any securities so deposited or withdrawn shall be valued at such time of deposit or withdrawal at the lower of par or market value, the latter as determined by Escrow Agent. Any securities so deposited shall thereupon become a part of the escrowed fund.

Upon receipt of a direction signed by Owner, Escrow Agent shall pay the principal of the fund, or any specified amount thereof, to Owner or as Owner may direct. If payment is to be made to Owner, it shall be made in cash. However, if payment has been authorized to be made to Contractor, Contractor may specify to Escrow Agent if payment is to be made in cash or in kind. Such payment and delivery shall be made as soon as is practicable after receipt of the direction.

#### VII.

For its services hereunder, Escrow Agent shall be entitled to a reasonable fee in accordance with its published schedule of fees or as may be agreed upon by Escrow Agent and Contractor. Such fee and any other costs of administration of this Escrow Agreement shall be paid from the income earned upon the escrowed fund and, if such income is not sufficient to pay the same, by Contractor.

#### VIII.

The net income earned and received upon the principal of the escrowed fund shall be paid over to Contractor in quarterly or more frequent installments. Until so paid or applied to pay Escrow Agent's fee or any other costs of administration, such income shall be deemed a part of the principal of the fund.

The Surety undertakes no obligation hereby but joins in this Escrow Agreement for the sole purpose of acknowledging that its obligations as surety for the Contractor's performance of the Agreement are not affected hereby.

WITNESS the following signatures, all as of the day and year first above written.

Typed name of Owner	_
Attest:	
	Assistant Director of Finance (Seal)
	Assistant Director of Finance (Sear)
Typed name of Contractor	
Attest: (if corporation) Witness: (if individual)	
	President/Vice President
	Partner or Owner (Seal)
Typed name of Escrow Agent	_
Attest:	
Bank Officer	President/Vice President
Typed name of Surety Company	_
Attest:	
Aust.	
	By:
	Attorney-In-Fact

(Director of Finance)

Page 4 of 4

# **Federal Contract Inserts**

# CD - 8.1

# **General Conditions - Part I**

- 1. Definitions
- 2. Engineer's Authority
- 3. Materials, Services, Workmanship and Facilities
- 4. Equals
- 5. Additional Instructions and Detail Drawings
- 6. Requests for Supplemental Information
- 7. Shop Drawings
- 8. Drawings and Specifications
- 9. Warranty of Title
- 10. Samples, Certificates and Tests
- 11. Surveys, Permits, and Codes
- 12. Patents
- 13. Superintendence by Contractor
- 14. Protection of Work, Property and Persons
- 15. Accident Prevention
- 16. Sanitary Facilities
- 17. Use of Premises/Storage
- 18. Schedules, Reports and Records
- 19. Inspection
- 20. Payments to Contractor
- 21. Payments by Contractor
- 22. Public Body's Use of Premises
- 23. Changes in the Work
- 24. Claims for Extra Cost/Subsurface Conditions
- 25. Time for Completion and Liquidated Damages

- 26. Suspension of Work, Termination and Delay
- 27. Correction of Work
- 28. Cleanup Requirements
- 29. Fitting and Coordination of the Work
- 30. Subcontracting
- 31. Separate Contracts
- 32. Lands and Rights-of-Way
- 33. As Constructed Drawings
- 34. Final Inspection and Closeout
- 35. Insurance
- 36. Assignment of Contract
- 37. Indemnification
- 38. Guarantee
- 39. Notices
- 40. Access to Records
- 41. Withholding of Funds
- 42. Federal Funding Termination
- 43. Interest of Contractor
- 44. Political Activity
- 45. Interest of Officials
- 46. Provisions Required by Law Deem Inserted
- 47. Contract Security
- 48. Contractual Disputes
- 49. Administrative Appeals Procedure and Arbitration
- 50. Other Contractual Requirements

General Conditions Part I must be included in CDBG contracts unless another substantially equivalent contract is provided by another state or federal agency which provides funding for the same activity and **equivalency is certified by the Project Engineer**. In such case, Section 40 Access to Records and all reference to Virginia Code provisions must be included.

# 1. Definitions

- A. Wherever used in the CONTRACT DOCUMENTS, the following terms shall have the meanings indicated and shall be applicable to both the singular and plural thereof:
- B. ADDENDA Written or graphic instruments issued prior to the execution of the Agreement which modify or interpret the CONTRACT DOCUMENTS, DRAWINGS and SPECIFICATIONS, by additions, deletions, clarifications, or corrections.
- C. BID The offer or proposal of the BIDDER submitted on the prescribed form setting forth the prices for the WORK to be performed.
- D. BIDDER Any person, firm, or corporation submitting a BID for the WORK.
- E. BONDS Bid, Performance, and Payment Bonds and other instruments of surety, furnished by the CONTRACTOR and the CONTRACTOR'S surety in accordance with the CONTRACT DOCUMENTS.
- F. CHANGE ORDER A written amendment to the construction contract between the CONTRACTOR and OWNER that changes either the CONTRACT PRICE and/or the CONTRACT TIME. All change orders must be approved by DHCD prior to their execution and must be signed by the ENGINEER/ARCHITECT, OWNER, CONTRACTOR and DHCD.
- G. CONTRACT DOCUMENTS The contract, including Invitation to BID, Instructions for BIDDERS, BID, BID BOND, Agreement, Payment BOND, Performance BOND, NOTICE OF AWARD, NOTICE TO PROCEED, CHANGE ORDER, DRAWINGS, SPECIFICATIONS, and ADDENDA.
- H. CONTRACT PRICE The total monies payable to the CONTRACTOR under the terms and conditions of the CONTRACT DOCUMENTS.
- I. CONTRACT TIME The number of calendar days stated in the CONTRACT DOCUMENTS for the completion of the WORK.
- J. CONTRACTOR The person, firm, or corporation with whom the OWNER has executed the Agreement.
- K. DRAWINGS The parts of the CONTRACT DOCUMENTS which show the characteristics and scope of the WORK to be performed and which have been prepared or approved by the ENGINEER.
- L. ENGINEER The engineer or architect responsible for the design and quality control of the WORK and so designated by the CONTRACT DOCUMENTS; or any other person or firm so designated by the PUBLIC BODY.

- M. FIELD ORDER A written order effecting a change in the WORK but not altering the scope of the project or involving an adjustment in the CONTRACT PRICE or an extension of the CONTRACT TIME, issued by the ENGINEER to the CONTRACTOR during construction.
- N. NOTICE OF AWARD The written notice of the acceptance of the BID from the OWNER to the successful BIDDER.
- O. NOTICE TO PROCEED Written communication issued by the OWNER to the CONTRACTOR authorizing him to proceed with the WORK and establishing the date for commencement of the WORK.
- P. PROJECT The undertaking to be performed in the manner as provided in the CONTRACT DOCUMENTS.
- Q. PROJECT MANAGER The authorized representative of the PUBLIC BODY for the PROJECT so named in the CONTRACT DOCUMENTS or any other person so designated by the PUBLIC BODY.
- R. PUBLIC BODY The legislative, executive or judicial body, agency, office, department, authority, post, commission, committee, institution, board or political subdivision created to perform some governmental duty, and which is empowered by law to undertake the activities described in the CONTRACT DOCUMENTS; and which is designated as such in the Agreement of the CONTRACT DOCUMENTS.
- S. SCOPE OF THE PROJECT The defined geographic area as set forth in the CDBG contract between the GRANTEE and DHCD within which construction improvements are being made that will benefit LMI persons who reside within that area.
- T. SHOP DRAWINGS All drawings, diagrams, illustrations, brochures, schedules and other data which are prepared by the CONTRACTOR, SUBCONTRACTOR, manufacturer, SUPPLIER or distributor, which illustrate how specific portions of the WORK shall be fabricated or installed.
- U. SPECIFICATIONS A part of the CONTRACT DOCUMENTS consisting of written descriptions of a technical nature of materials, equipment, construction systems, standards and workmanship.
- V. SUBCONTRACTOR An individual, firm, or corporation having a direct contract with the CONTRACTOR or with any other SUBCONTRACTOR for the performance of a part of the WORK at the site.
- W. SUBSTANTIAL COMPLETION That date certified by the ENGINEER when the construction of the PROJECT or a specified part thereof is sufficiently completed, in

accordance with the CONTRACT DOCUMENTS, so that the PROJECT or specified part can be utilized for the purposes for which it is intended.

- X. SUPPLIER Any person or organization who supplies materials or equipment for the WORK, including that fabricated to a special design, but who does not perform labor at the site.
- Y. WORK All labor necessary to produce the construction required by the CONTRACT DOCUMENTS, and all materials and equipment incorporated or to be incorporated in the PROJECT.
- Z. WRITTEN NOTICE Any notice to any party of the Agreement relative to any part of this Agreement in writing and considered delivered and the service thereof completed, when posted by certified or registered mail to the said party at their last given address, or delivered in person to said party or their authorized representative on the WORK.

# 2. Engineer's Authority

- A. The ENGINEER shall act as the PUBLIC BODY's representative during the construction period in the capacity as detailed in the CONTRACT DOCUMENTS. The ENGINEER shall decide questions which may arise as to quality and acceptability of materials furnished and WORK performed, and shall interpret the intent of the CONTRACT DOCUMENTS in a fair and unbiased manner. The ENGINEER shall make visits to the site and determine if the WORK is proceeding in accordance with the CONTRACT DOCUMENTS.
- B. Inspections may be at the factory or fabrication plant of the source of material supply.
- C. The ENGINEER shall not be responsible for the construction means, controls, techniques, sequences, procedures or construction safety.
- D. The ENGINEER shall promptly make decisions relative to the interpretation of the CONTRACT DOCUMENTS, insofar as he has the authority to do so by provisions of the CONTRACT DOCUMENTS in his capacity as representative of the PUBLIC BODY.

# 3. Materials, Services, Workmanship and Facilities

A. It is understood that, except as otherwise specifically stated in the CONTRACT DOCUMENTS, the CONTRACTOR shall provide and pay for all materials, labor, tools, equipment, water, light, power, transportation, supervision, temporary

construction of any nature, all other services and facilities of any nature whatsoever necessary to execute, complete, and deliver the WORK within the specified time.

- B. Materials shall be stored so as to insure the preservation of their quality and fitness for the work. Stored materials and equipment to be incorporated in the WORK shall be located so as to facilitate prompt inspection.
- C. Manufactured articles, materials and equipment shall be applied, installed, connected, erected, used, cleaned and conditioned as directed by the manufacturer.
- D. Materials, supplies and equipment shall be in accordance with samples submitted by the CONTRACTOR and approved by the ENGINEER.
- E. The CONTRACTOR shall submit to the ENGINEER for approval the manufacturer's detailed specifications for all machinery, mechanical and other special equipment, which is to be installed in the WORK. The CONTRACTOR shall further submit full information as to type, performance characteristics, and all other pertinent information as required concerning such equipment. The CONTRACTOR shall submit to the ENGINEER for approval full information, as required, concerning all other materials or articles which he proposes to incorporate in the WORK.
- F. Machinery, mechanical and other equipment, materials and articles installed or used without such prior approval shall be at the risk of subsequent rejection.
- G. Materials specified by reference to the number or symbol of a specific standard, such as on A.S.T.M. Standards, a Federal Specification or other similar standard, shall comply with requirements in the latest revision thereof and any amendment or supplement thereto in effect on the date of the Invitation To Bids, except as limited to type, class, or grade, or modified in such reference. The standards referred to, except as modified in the SPECIFICATIONS, shall have full force and effect as though printed therein.
- H. Unless otherwise specifically provided for in the SPECIFICATIONS, all workmanship, equipment, materials and articles incorporated into the WORK shall be new and the best grade of respective kinds for the purpose.

# 4. Equals

Whenever a material, article or piece of equipment is identified in the SPECIFICATIONS by reference to manufacturer's or vendor's names, trade names, catalog numbers, etc. it is intended merely to establish a standard; and unless otherwise provided in the Invitation to Bid any material, article, or equipment of other manufacturers and vendors which the ENGINEER determines to be equal of that specified, considering quality, workmanship, economy of operation, and suitability of purpose intended, shall be accepted. The purchase

or installation of such substituted material or equipment will not be allowed without the ENGINEER'S prior written approval.

# 5. Additional Instructions and Detail Drawings

- A. The CONTRACTOR may be furnished, with additional instructions and detail drawings by the ENGINEER, as necessary to carry out the CONTRACT DOCUMENTS.
- B. The additional drawings and instructions thus supplied will become a part of the CONTRACT DOCUMENTS. The CONTRACTOR shall carry out the WORK in accordance with the additional detail drawing and instructions.

# 6. Requests for Supplemental Information

- A. The CONTRACTOR shall request that the ENGINEER provide any additional information not already in his possession in order to execute the WORK. Such requests shall be made in a timely manner as the need appears, and shall be submitted in sufficient advance to allow preparation and appropriate action to be taken so as to avoid delay.
- B. Requests which shall be in writing must list the necessary items and the date by which each will be required by the CONTRACTOR. The first such list shall be submitted within two weeks after AWARD of CONTRACT and shall be as complete as possible at that time.
- C. The CONTRACTOR shall furnish any assistance and information the ENGINEER may require in responding to these requests.
- D. The CONTRACTOR shall be fully responsible for any delays in his work or to others due to his failure to comply with the provisions of this section.

# 7. Shop Drawings

A. The CONTRACTOR shall provide SHOP DRAWINGS as may be necessary for the prosecution of the WORK as required by the CONTRACT DOCUMENTS. The ENGINEER shall promptly review all SHOP DRAWINGS. The ENGINEER'S approval of any SHOP DRAWING shall not release the CONTRACTOR from responsibility for deviations from the CONTRACT DOCUMENTS.

- B. The approval of a SHOP DRAWING which substantially deviates from the requirement of the CONTRACT DOCUMENTS shall be evidenced by a CHANGE ORDER.
- C. The approval of a SHOP DRAWING which the ENGINEER deems to be a minor adjustment of the CONTRACT DOCUMENTS not involving scope change a change in the contract price or extension of time shall be evidenced by written documentation in substance, as follows:

"The modification shown on the attached drawing is approved in the interest of the PUBLIC BODY to effect an improvement for the project and is ordered with the understanding that it does not involve any change in scope, contract price or time; that it is subject generally to all CONTRACT DOCUMENTS and that it is without prejudice to any and all rights of the PUBLIC BODY under the CONTRACT and bond or bonds."

- D. When submitted for the ENGINEER'S review, SHOP DRAWINGS shall be the CONTRACTOR'S certification that he has reviewed, checked and approved the SHOP DRAWINGS and that they are in conformance with the requirements of the CONTRACT DOCUMENTS.
- E. Portions of the WORK requiring a SHOP DRAWING or sample submission shall not begin until the SHOP DRAWING or submission have been approved by the ENGINEER. A copy of each approved SHOP DRAWING and each approved sample shall be kept in good order by the CONTRACTOR on the site and shall be available to the ENGINEER.

# 8. Drawings and Specifications

- A. The intent of the DRAWINGS AND SPECIFICATIONS is that the CONTRACTOR shall furnish all labor, materials, tools, equipment, and transportation necessary for the proper execution of the WORK in accordance with the CONTRACT DOCUMENTS and for all incidental work necessary to complete the PROJECT in an acceptable manner, ready for use, occupancy, or operation by the PUBLIC BODY.
- B. In case of conflict between the DRAWINGS and SPECIFICATIONS, the SPECIFICATIONS shall govern. Figure dimensions on DRAWINGS shall govern over general DRAWINGS.
- C. Any discrepancies found between the DRAWINGS and SPECIFICATIONS and site conditions or any inconsistencies or ambiguities in the DRAWINGS or SPECIFICATIONS shall be immediately reported to the ENGINEER, in writing, who shall promptly correct such inconsistencies or ambiguities in writing. WORK done

by the CONTRACTOR after discovery of such discrepancies, inconsistencies, or ambiguities shall be done at the CONTRACTOR'S risk.

# 9. Warranty of Title

- A. No material, supplies, or equipment to be installed or furnished under this contract shall be purchased subject to any chattel mortgage or under a conditional sale, lease purchase or other agreement by which an interest therein or in any part thereof is retained by the seller or supplier. The CONTRACTOR shall warrant good title to all materials, supplies, and equipment installed or incorporated in the WORK, and upon completion of all work, shall deliver the same together with all improvements and appurtenances constructed or placed thereon by him to the PUBLIC BODY free from any claims, liens or charges.
- B. Neither the CONTRACTOR nor any person, firm, or corporation furnishing any material or labor for any work covered by this contract shall have any right to lien upon any improvement or appurtenance thereon.
- C. Nothing in this section, however, shall impair the right of persons furnishing materials or labor to recover under any bond given by the CONTRACTOR or any rights under the law permitting such persons to look to the funds due the CONTRACTOR in the hands of the PUBLIC BODY.
- D. The provisions of this section shall be inserted in all subcontracts and material contracts and notice of its provisions shall be given to all persons furnishing materials for the WORK when no formal contract is entered into for such materials.

# 10. Samples, Certificates and Tests

- A. The CONTRACTOR shall submit all materials or equipment samples, certificates, affidavits, etc. as required by the ENGINEER or called for in the CONTRACT DOCUMENTS. No such material or equipment shall be manufactured or delivered at the site except at the CONTRACTOR'S BOND, and except at the CONTRACTOR'S risk until required samples have been approved in writing by the ENGINEER. Any delay in the WORK caused by late or improper submission of samples or certificates for approval shall not be considered just cause for extension of contract time.
- B. Each sample submitted by the CONTRACTOR shall carry a label giving the name of the CONTRACTOR, the PROJECT, and the name of the producer. The accompanying certificate or letter from the CONTRACTOR shall state that the sample complies with contract requirements, shall state the name and brand of the product, its place of origin, the name and address of the producer and all specifications or other detailed information. It should also include a statement that all

materials or equipment furnished for use in the PROJECT shall comply with the samples and/or certified statements.

- C. Approval of materials shall be general only and shall not constitute a waiver of the PUBLIC BODY'S right to demand full compliance with the CONTRACT DOCUMENTS. After actual deliveries, the ENGINEER shall have such tests made as he deems necessary and may reject materials, equipment and accessories for cause, even though such materials and equipment have been given general approval. If materials, equipment or accessories which fail check tests have been incorporated into the WORK, the ENGINEER shall have the right to cause their removal, and replacement by proper materials or to secure such preparation by the CONTRACTOR as is equitable.
- D. Except as otherwise specifically stated in the CONTRACT DOCUMENTS the costs of sampling and testing will be divided as follows:
  - (1) The CONTRACTOR shall furnish without extra cost, including packing and delivery charges, all samples required for testing purposes.
  - (2) The CONTRACTOR shall assume all costs of re-testing materials which fail to meet contract requirements.
  - (3) The CONTRACTOR shall assume all costs of testing materials offered in substitution for those found deficient.
  - (4) The PUBLIC BODY will pay all other expenses.
- E. If the CONTRACT DOCUMENTS, laws, rules, regulations or orders of any public authority having jurisdiction require any WORK to specifically be inspected, tested or approved by someone other than the CONTRACTOR or ENGINEER, the CONTRACTOR will give the ENGINEER notice of readiness. The CONTRACTOR will then furnish the ENGINEER the required certificates of inspection, testing or approval.

# 11. Surveys, Permits, and Codes

A. The PUBLIC BODY shall furnish all boundary surveys and establish all base lines for locating the principal component parts of the WORK together with a suitable number of benchmarks adjacent to the WORK as shown in the CONTRACT DOCUMENTS. From the information provided by the PUBLIC BODY, unless otherwise specified in the CONTRACT DOCUMENTS, the CONTRACTOR shall develop and make all detail surveys needed for construction such as slopes, stakes, batter boards, stakes for pipe locations and other working points, lines, elevations and cutsheets.

- B. The CONTRACTOR shall carefully preserve benchmarks, reference points and stakes and, in case of willful or careless destruction, shall be charged with the resulting expense and shall be responsible for any mistake that may be caused by their unnecessary loss or disturbance.
- C. Permits and licenses of a temporary nature necessary for prosecution of the WORK shall be secured and paid for by the CONTRACTOR unless otherwise stated in the CONTRACT DOCUMENTS.

Permits, licenses and easements for permanent structures or permanent changes in existing facilities shall be secured and paid for by the PUBLIC BODY unless otherwise specified.

D. The CONTRACTOR shall give all notices and comply with all applicable laws, ordinances and codes of the appropriate jurisdictions for the WORK as drawn and specified. Before installing any work, the CONTRACTOR shall examine the CONTRACT DOCUMENTS for compliance with applicable ordinances and codes and shall immediately report any discrepancy to the ENGINEER in writing and any necessary changes shall be adjusted as provided for in Section 23, CHANGES IN THE WORK.

Should the CONTRACTOR fail to observe the foregoing provisions and proceed with the WORK or variance with any applicable ordinance or code (Notwithstanding compliance with the CONTRACT DOCUMENTS), the CONTRACTOR shall remove such work without cost to the PUBLIC BODY, and proceed in the manner specified in this section.

- E. The CONTRACTOR shall at his own expense secure and pay the appropriate department of the appropriate public authority fees or charges for all permits for street pavement, sidewalks, sheds, removal of abandoned water taps, sealing of house connection drains, pavement cuts, buildings, electrical, plumbing, gas and sewer permits required within the jurisdiction.
- F. The CONTRACTOR shall comply with applicable laws, and ordinances governing the disposal of surplus excavation, materials, debris and rubbish on or off the PROJECT and commit no trespass on any public or private property in any operation due to or connected with the WORK.

# **12. Patents**

The CONTRACTOR shall pay all applicable royalties and license fees, and shall defend all suits or claims for infringement of any patent rights, and save the PUBLIC BODY harmless from loss on account thereof, except that the PUBLIC BODY shall be responsible for any such loss when a particular manufacturer is specified, however

if the CONTRACTOR has reason to believe that the design, process or product specified is an infringement of a patent the CONTRACTOR shall be responsible for such loss unless the CONTRACTOR promptly gives such information to the ENGINEER.

# **13. Superintendence by Contractor**

- A. Except where the CONTRACTOR is an individual and provides personal superintendence to the WORK, the CONTRACTOR shall provide a competent superintendent, satisfactory to the ENGINEER and PUBLIC BODY, on the WORK at all times during working hours with full authority to act. The CONTRACTOR shall also provide adequate personnel for the proper coordination and expediting of his work.
- B. The CONTRACTOR will he held strictly to the intent of the CONTRACT DOCUMENTS in regard to the quality of materials, workmanship and execution of the WORK.
- C. The CONTRACTOR shall lay out his own work and he shall be responsible for all work executed by him under the CONTRACT. He shall verify all figures and elevations before proceeding with the WORK and will be held responsible for any error resulting from his failure to do so.

# 14. Protection of Work, Property and Persons

- A. The CONTRACTOR shall be responsible for initiating, maintaining and supervising all safety precautions and programs in connection with the WORK. The CONTRACTOR will take all necessary precautions for the safety of, and will provide the necessary protection: (1) to prevent damage, injury or loss to all employees on the WORK and other persons who may be affected thereby; and, (2) all material and equipment to be incorporated therein, whether in storage on or off the site or adjacent thereof, including trees, shrubs, lawns, walks, pavements, roadways, structures, utilities not designated for removal, relocation or replacement during the course of construction.
- B. The CONTRACTOR will comply with applicable laws, ordinances, rules, regulations and orders of any public body having jurisdiction. The CONTRACTOR will notify owners of adjacent utilities when prosecution of the WORK may affect them.

The CONTRACTOR will erect and maintain, as required by the conditions and progress of the WORK all necessary safeguards for safety and protection. The CONTRACTOR shall remedy all damage or loss to any property caused directly or indirectly, in whole or part, by the CONTRACTOR, any SUBCONTRACTOR or

anyone directly or indirectly employed by any of them or anyone of whose acts any of them may be liable, except damage or loss attributable to the fault of the CONTRACT DOCUMENTS or to the acts or omissions of the PUBLIC BODY, of the ENGINEER or anyone employed by either of them or anyone whose acts either of them may be liable, and not attributable, directly or indirectly in whole or in part, to the fault or negligence of the CONTRACTOR.

- C. The CONTRACTOR shall shore up, brace, underpin, secure and protect as may be necessary all foundations and other parts of existing structures adjacent to, or in the vicinity of the WORK, which may be affected in any manner by the WORK. The CONTRACTOR shall be responsible for giving any and all required notices to any potentially affected property owner or other affected party prior to commencement of any work.
- D. In an emergency affecting the safety of life, limb or property, including adjoining property, the CONTRACTOR, without special instructions or authorization from the PUBLIC BODY, is authorized to act at his discretion to prevent such threatened loss or injury and he shall so act. He shall likewise act if instructed by the PUBLIC BODY or the ENGINEER. Any compensation claimed will be determined by the procedure in Section 23, CHANGES IN THE WORK.

### **15. Accident Prevention**

- A. No person employed in the performance of this CONTRACT shall be required to work in surroundings or under working conditions which are unsanitary, hazardous or dangerous to his health or safety as determined under construction and health standards promulgated by the Secretary of Labor.
- B. Machinery, equipment and all site hazards shall be guarded in accordance with the safety provisions of the "Manual of Accident Prevention in Construction" published by the Associated General Contractors of America, Inc., to the extent that such provisions do not conflict with applicable law.
- C. The CONTRACTOR shall maintain an accurate record of all cases of death, occupational disease or injury requiring medical attention or causing loss of time from work, arising out of and in the course of employment on this PROJECT.

### **16. Sanitary Facilities**

The CONTRACTOR shall furnish, install and maintain ample sanitary facilities for workers. These facilities shall be sufficient to meet the needs of the PROJECT and be located to the satisfaction of the PUBLIC BODY. All such facilities and services shall be furnished in strict accordance with applicable health regulations.

# 17. Use of Premises/Storage

- A. The CONTRACTOR shall confine his equipment, storage of materials, and construction operations to PROJECT area as shown in the CONTRACT DOCUMENTS and prescribed by ordinances or permits, or as may be desired by the PUBLIC BODY, and shall not unreasonably encumber the PROJECT area or public rights-of-way with his materials and construction equipment.
- B. The CONTRACTOR shall consult with the PUBLIC BODY and the ENGINEER for suitable storage space for bulk materials on each project. If sufficient storage is not available on the PROJECT site the CONTRACTOR shall arrange for storage elsewhere.
- C. The CONTRACTOR shall comply with all reasonable instructions of the PUBLIC BODY, the ENGINEER, and all applicable regulations regarding signs, advertising, traffic, fires, explosives, danger signals and barricades.

# **18. Schedules, Reports and Records**

- A. The CONTRACTOR shall submit to the PUBLIC BODY such schedule of quantities and costs, progress schedules, payrolls, reports, estimates, records and other data where applicable as are required for the WORK to be performed.
- B. Prior to the first partial payment estimate the CONTRACTOR shall submit construction progress schedules showing the order in which the CONTRACTOR proposes to carry out the WORK, including dates at which various parts of the WORK will be started, estimated dates of completion of each part, and as applicable:
  - (1) The dates at which special detail drawings will be required.
  - (2) Respective dates for submission of SHOP DRAWINGS, the beginning of manufacturer, testing and the installation of materials, supplies and equipment.
- C. The CONTRACTOR shall submit a schedule of payments that the CONTRACTOR anticipates will be earned during the course of the WORK.
- D. The PUBLIC BODY, the ENGINEER, their authorized representatives, and authorized representatives of participating state and federal agencies shall have at all times access to the WORK, materials, payrolls, records, personnel, invoices of materials or other relevant data and records. The CONTRACTOR shall provide proper facilities for such access and observation of the WORK and also for any inspection or testing thereof.

#### **19. Inspection**

- A. All materials and workmanship shall be subject to inspection, examination, or test by the PUBLIC BODY and the ENGINEER of any and all items during manufacture or construction, and at any and all places where such manufacture or construction is carried on. The PUBLIC BODY and ENGINEER shall have the right to reject defective materials and workmanship or require its correction. Unacceptable workmanship shall be satisfactorily corrected.
- B. The ENGINEER shall act as the PUBLIC BODY'S representative in carrying out inspection and in assessing the acceptability of all aspects of the WORK in accordance with the CONTRACT DOCUMENTS. The opinions and directives of the ENGINEER concerning the WORK shall be adhered to at all times unless they conflict with the CONTRACT DOCUMENTS or are superseded by the PUBLIC BODY.
- C. The CONTRACTOR shall promptly furnish all materials reasonably necessary for any tests which may be required. All tests performed by the ENGINEER will be performed in such a manner as not to delay the WORK unnecessarily and will be made in accordance with the provisions of the CONTRACT DOCUMENTS.
- D. The CONTRACTOR shall notify the ENGINEER sufficiently in advance of backfilling or concealing any facilities to permit proper inspection. If any facilities are concealed without approval of the ENGINEER, the CONTRACTOR shall uncover for inspection and re-cover such facilities all at his Ohm expense.
- E. Should the PUBLIC BODY consider it necessary at any time prior to final acceptance of the WORK to examine any work already approved and completed, the CONTRACTOR shall on request promptly furnish all necessary facilities, labor and material. If such work is found to be defective due to the fault of the CONTRACTOR or his SUBCONTRACTORS, the CONTRACTOR shall defray the cost of such re-examination and of satisfactory reconstruction.

If such work is found to be acceptable according to the CONTRACT DOCUMENTS, the actual cost of such re-examination in labor and materials, plus 15% of such costs to cover general expenses shall be allowed the CONTRACTOR, and if such re-examination has delayed the WORK to a significant degree he shall be allowed a commensurate time extension.

### 20. Payments to Contractor

A. Partial Payments

- The CONTRACTOR shall prepare his requisition for partial payment as of the (1)last day of the month (unless the payment schedule is tied to milestone, in such case requisition is prepared at appropriate stage of completion) and submit it with the required number of copies to the ENGINEER for his approval. The amount of the payment due the CONTRACTOR shall be determined by adding the total value of the work completed to date to the value of the materials properly stored at the site, and deducting (a) five percent (5%) of the total amount to be retained until final payment, (b) the amount of all previous payments, and, (c) such claims as may be specifically excepted by the CONTRACTOR as provided for in Section 48 hereof. The total value of work completed to date shall be based upon the estimated quantities of work completed and on the unit prices contained in the agreement; mobilization costs shall not be included. The value of the materials properly stored on site shall be based upon the estimated quantities of such materials and the invoice prices. Copies of all invoices shall be available for inspection by the ENGINEER.
- (2) The ENGINEER will, within ten (10) days after receipt of each partial payment estimate, either indicate in writing approval of payment and submit the partial payment estimate to the PUBLIC BODY, or return the partial payment estimate to the CONTRACTOR indicating in writing the reason for refusing to approve payment. In such case the CONTRACTOR may make the necessary corrections and resubmit the partial payment estimate. The PUBLIC BODY will within thirty (30) days of presentation of an approved partial payment estimate, pay the CONTRACTOR a progress payment on the basis of the approved partial payment.
- (3) Monthly or partial payments made by the PUBLIC BODY to the CONTRACTOR are moneys advanced for the purpose of assisting the CONTRACTOR to expedite the WORK. The CONTRACTOR shall be responsible for the care and protection of all materials and work upon which such payments have been made until final acceptance of the PROJECT by the PUBLIC BODY. Such payments shall not constitute a waiver of the right of the PUBLIC BODY to require the fulfillment of all terms of the CONTRACT DOCUMENTS and all improvement embraced therein to the satisfaction of the PUBLIC BODY.
- B. Final Payment
  - (1) After final inspection and acceptance by the PUBLIC BODY of all WORK according to the CONTRACT DOCUMENTS, the CONTRACTOR shall prepare his requisition for final payment which shall be based upon the carefully measured or computed quantity of each item of work and the applicable unit prices stipulated in the CONTRACT DOCUMENTS. The total amount of the final payment due the CONTRACTOR under this CONTRACT shall be the amount computed as described above less all previous payments. Final

payment shall be made subject to the CONTRACTOR furnishing the PUBLIC BODY with a release in satisfactory form of all claims against the PUBLIC BODY arising under and by virtue of the CONTRACT DOCUMENTS, other than such claims as may be specifically excepted by the CONTRACTOR from the operation of the release as provided for under Section 48, CONTRACTUAL DISPUTES.

- (2) If a lump sum CONTRACT price is in effect the following wording is operative "The amount of the final payment due the CONTRACTOR shall be the lump sum shown in the CONTRACT DOCUMENTS or this sum as adjusted by approved CHANGE ORDERS.
- (3) The PUBLIC BODY, before paying the final payment, may require the CONTRACTOR to furnish releases or receipts from all SUBCONTRACTORS having performed any work and all persons having supplied materials, equipment and services to the CONTRACTOR, if the PUBLIC BODY deems the same necessary in order to protect its interests. The PUBLIC BODY may if it deems it advisable make payment to the CONTRACTOR in part or in full without requiring the furnishing of such releases or receipts, and any payments so made shall in no way impair the obligations of any surety furnished under the terms of the CONTRACT DOCUMENTS.
- (4) Any amount withheld by the PUBLIC BODY as "Liquidated Damages" under the terms of the CONTRACT DOCUMENTS shall be deducted from the final payment due the CONTRACTOR.
- (5) Upon completion and acceptance of the WORK, the ENGINEER shall issue a certificate to be attached to the final payment request that the WORK has been accepted under the conditions of the CONTRACT DOCUMENTS. The entire amount due the CONTRACTOR as described in provisions of this section shall be paid to the CONTRACTOR within thirty (30) days of completion and acceptance of the WORK. If the PUBLIC BODY fails to make payment thirty (30) days after approval by the ENGINEER, in addition to other remedies available to the CONTRACTOR, there shall be added to each such payment, interest of the maximum legal rate commencing on the first day after said payment is due and continuing until payment is received by the CONTRACTOR.
- C. Acceptance of Final Payment

The acceptance by the CONTRACTOR of final payment shall be and shall operate as a release to the PUBLIC BODY of all claims and all liability to the CONTRACTOR other than claims in stated amounts which may be specifically excepted by the CONTRACTOR for all things done or furnished in connection with this WORK and for every act and neglect of the PUBLIC BODY and others relating to or arising out of this WORK. Any payment, however, final or otherwise, shall not release the CONTRACTOR or its sureties from any obligations under the CONTRACT DOCUMENTS or the Performance or Payment BONDS.

# 21. Payments by Contractor

Except in cases of bona fide disputes, or where the CONTRACTOR has some other justifiable reason for delay, the CONTRACTOR shall pay:

- A. For all transportation and utility services not later than the end of the calendar month following that in which the services are rendered.
- B. For all materials, tools and other expendable equipment to the extend of ninety percent (90%) of the cost thereof not later than the end of the calendar month following that in which such materials, tools and equipment are delivered at the site of the PROJECT.
- C. To each of his SUBCONTRACTORS, not later than the end of the calendar month in which each payment is made to the CONTRACTOR, the representative amount allowed the CONTRACTOR on account of the work performed by his SUBCONTRACTORS, to the extent of each SUBCONTRACTOR'S interest therein.

### 22. Public Body's Use of Premises

- A. Prior to SUBSTANTIAL COMPLETION, the PUBLIC BODY with the concurrence of the ENGINEER and the CONTRACTOR, may use any completed or substantially completed portions of the WORK. Such use shall not constitute an acceptance of such portions of the WORK.
- B. The PUBLIC BODY shall have the right to enter the premises for the purpose of doing work not covered by the CONTRACT DOCUMENTS. This provision shall not be construed as relieving the CONTRACTOR of the sole responsibility for the care and protection of the WORK, or the restoration of any damaged WORK except such as may be caused by agents or employees of the PUBLIC BODY.

### 23. Changes in The Work

A. The PUBLIC BODY may make changes in the WORK required to be performed by the CONTRACTOR under the CONTRACT DOCUMENTS without releasing the CONTRACTOR from any of his obligations under the CONTRACT DOCUMENTS or any guarantee given by him pursuant to the CONTRACT provisions, and without affecting the validity of the guaranty BONDS, and without relieving or releasing the surety or sureties of said BONDS. All WORK shall be executed under the terms of the original CONTRACT DOCUMENTS unless it is expressly provided otherwise. If such changes increase or decrease the amount due under the CONTRACT DOCUMENTS, or in time required for performance of the WORK, an equitable adjustment shall be authorized by CHANGE ORDER. All change Orders must be approved by the Virginia Department of Housing and Community Development (DHCD) and may not alter the scope of the project. DHCD must receive justification for Change Orders from the grantee.

- B. Except for the purpose of affording protection against any emergency endangering health, life, limb or property as specified in Section 14, the CONTRACTOR shall make no change in the WORK as specified in the CONTRACT DOCUMENTS unless in pursuance of a written approved CHANGE ORDER from the PUBLIC BODY authorizing the CONTRACTOR to proceed with the change. No claim for an adjustment of the CONTRACT PRICE or time will be valid unless so ordered.
- C. If applicable unit prices are contained in the CONTRACT DOCUMENTS, the PUBLIC BODY may order the CONTRACTOR to proceed with the applicable unit prices specified in the CONTRACT DOCUMENTS; provided that in the case of a unit price contract the net value of all changes does not increase or decrease the original total amount shown in the CONTRACT DOCUMENTS by more than twenty five percent (25%).
- D. If the applicable unit prices are not contained in the CONTRACT DOCUMENTS or if the total net change increases or decreases the total CONTRACT PRICE more than twenty five percent (25%), or \$10,000 (whichever is greater) the PUBLIC BODY shall, before ordering the CONTRACTOR to proceed with the desired changes, request from him an itemized proposal covering the WORK involved in the change after which the procedure shall be as follows:
  - (1) If the proposal is acceptable the PUBLIC BODY will prepare the CHANGE ORDER in accordance therewith for acceptance by the CONTRACTOR.
  - (2) If the proposal is not acceptable, the PUBLIC BODY shall order the WORK change to be commenced and the CONTRACTOR and PUBLIC BODY shall follow the procedure detailed in Section 48, Contractual Disputes.
- E. Each CHANGE ORDER shall include in its final form:
  - (1) A detailed description of the change in the WORK
  - (2) The CONTRACTOR'S proposal (if any) or a confirmed copy thereof

- (3) A definite statement as to the resulting change in the CONTRACT PRICE or TIME
- (4) The statement that all WORK involved in the change shall be performed in accordance with the CONTRACT DOCUMENTS except as modified by the CHANGE ORDER.
- F. The procedures as outlined in this section for a unit price CONTRACT also apply in the case of a lump sum CONTRACT.
- G. The ENGINEER also, may at any time, by issuing a FIELD ORDER make changes in the details of the WORK. The CONTRACTOR shall proceed with the performance of any changes in the WORK so ordered by the ENGINEER unless the CONTRACTOR believes that such FIELD ORDER entitles the CONTRACTOR to a change in CONTRACT PRICE or TIME, or both, in which event the CONTRACTOR shall give the ENGINEER WRITTEN NOTICE thereof within seven (7) days after the receipt of such ordered change. Thereafter the CONTRACTOR shall document the basis for the change in CONTRACT PRICE or TIME within thirty (30) days. The CONTRACTOR shall not execute such changes pending the receipt of an executed CHANGE ORDER or further instructions from the PUBLIC BODY.
- H. All change orders must be approved in writing and in advance of any associated work performance by DHCD. Any change order, regardless of the cost, which results in a change in project scope will be disallowed.

# 24. Claims for Extra Cost/Subsurface Conditions

- A. Should the CONTRACTOR claim that any instructions by DRAWINGS or otherwise entitles him to a change in CONTRACT PRICE or TIME he shall follow the procedures in SECTION 23.
- B. Claims for additional compensation for extra work, due to alleged errors in ground elevations, contour lines or bench marks, will not be recognized unless accompanied by certified survey data made prior to the time the original ground was disturbed, clearly showing that errors exist which result in handling more material, or performing more work, than could be reasonably estimated from the CONTRACT DOCUMENTS.
- C. Any discrepancies which may be discovered between the actual conditions and those represented by the CONTRACT DOCUMENTS shall at once be reported to the PUBLIC BODY and work shall not proceed except at the CONTRACTOR' S risk until written instructions have been issued by the PUBLIC BODY.

D. The PUBLIC BODY shall promptly investigate the conditions, and if it is found that such conditions do so materially differ from those upon which the CONTRACT DOCUMENTS are based, and cause an increase or decrease in the cost of, or time required for, performance of the WORK an equitable adjustment shall be made and the CONTRACT DOCUMENTS shall be modified by a CHANGE ORDER.

Any claim of the CONTRACTOR for adjustment hereunder shall not be allowed unless required WRITTEN NOTICE has been given; provided that the PUBLIC BODY may, if it determines the facts so justify, consider and adjust any such claims asserted before the date of final payment.

### 25. Time for Completion and Liquidated Damages

- A. The date of beginning and the time for completion of the WORK are essential conditions of the CONTRACT DOCUMENTS and the WORK embraced shall be commenced on the date specified in the NOTICE TO PROCEED.
- B. The CONTRACTOR will proceed with the WORK at such rate of PROGRESS to insure full completion within the CONTRACT TIME. It is expressly understood and agreed by and between the CONTRACTOR and the PUBLIC BODY that the CONTRACT TIME for the completion of the WORK described herein is a reasonable time, taking into consideration the average climatic and economic conditions and other factors prevailing in the locality of the WORK.
- C. Liquidated Damages for Delays

If the WORK is not completed within the time stipulated in the CONTRACT DOCUMENTS including any extensions of time for excusable delays as herein provided, the CONTRACTOR shall pay to the PUBLIC BODY as fixed, agreed and liquidated damages for each calendar day of delay, until the WORK is completed, the amount set forth in the CONTRACT DOCUMENTS hereof and the CONTRACTOR and his sureties shall be liable to the PUBLIC BODY for the amount thereof. These fixed, agreed and liquidated damages are being set for delay because fixing actual damages for delay is impractical and extremely difficult.

The CONTRACTOR shall not be charged with liquidated damages or any excess cost when the delay in completion of the WORK is due to the following and the CONTRACTOR has promptly given WRITTEN NOTICE of such delay to the PUBLIC BODY and the ENGINEER:

(1) To any preference, priority or allocation order duly issued by the PUBLIC BODY.

- (2) To unforeseeable causes beyond the control and without the fault or negligence of the CONTRACTOR, including but not restricted to, acts of God, or of the public enemy, acts of the PUBLIC BODY, acts of another CONTRACTOR in the performance of a contract with the PUBLIC BODY, fires, floods, quarantine restrictions, strikes, freight embargoes, and abnormal and unforeseeable weather, and
- (3) To any delays of SUBCONTRACTORS occasioned by any of the causes specified in paragraphs C.(1) and C.(2) of this Section.

The aforementioned exemptions from payment of liquidated damages shall apply only if the CONTRACTOR promptly notifies the PUBLIC BODY within ten (10) days with WRITTEN NOTICE documenting the cause of such delay.

Upon receipt of such NOTICE the PUBLIC BODY shall ascertain the facts and the cause and the extent of such delay. If upon the basis of the facts and the terms of the CONTRACT DOCUMENTS, the delay is properly excusable, the PUBLIC BODY shall extend the CONTRACT TIME for completion of the WORK for a period commensurate with the period of excusable delay.

# 26. Suspension of Work, Termination And Delay

- A. The PUBLIC BODY may suspend the WORK or any portion thereof for a period of not more than ninety (90) days or such further time as agreed upon by the CONTRACTOR by WRITTEN NOTICE to the CONTRACTOR and the ENGINEER which shall fix the date on which the WORK shall be resumed. The CONTRACTOR will resume that WORK on the date so fixed. The CONTRACTOR will be allowed an increase in the CONTRACT PRICE or an extension of the CONTRACT TIME, or both, directly attributable to any suspension.
- B. If the CONTRACTOR is adjudged bankrupt or insolvent, or makes a general assignment for the benefit of its creditors, or if a trustee or receiver is appointed for the CONTRACTOR or for any of its property or if the CONTRACTOR files a petition to take advantage of any debtor's act, or to reorganize under the bankruptcy or applicable laws, or repeatedly fails to make prompt payments to SUBCONTRACTORS or for labor, materials or equipment, or disregards laws, ordinances, rules, regulations or orders of any public body having jurisdiction of the WORK, or disregards the authority of the ENGINEER, or otherwise violates any provision of the CONTRACT DOCUMENTS, then the PUBLIC BODY may, without prejudice to any other right or remedy and after giving the CONTRACTOR and its surety a minimum of ten (10) days from delivery of a WRITTEN NOTICE, terminate services of the CONTRACTOR and take possession of the PROJECT and all materials, equipment, tools, construction equipment and machinery thereon owned by the CONTRACTOR and finish the WORK by whatever method the PUBLIC

BODY may deem expedient. In such case the CONTRACTOR shall not be entitled to receive any further payment until the WORK is finished. If the unpaid balance of the CONTRACT PRICE exceeds the direct and indirect costs of completing the PROJECT, including compensation for additional professional services, such excess shall be paid to the CONTRACTOR. If such costs exceed such unpaid balance, the CONTRACTOR will pay the difference to the PUBLIC BODY. Such costs incurred by the PUBLIC BODY will be determined by the ENGINEER and incorporated in a CHANGE ORDER.

- C. Where the CONTRACTOR'S services have been so terminated by the PUBLIC BODY, said termination shall not affect any right of the PUBLIC BODY against the CONTRACTOR then existing or which may thereafter accrue. Any retention or payment of monies by the PUBLIC BODY due the CONTRACTOR will not release the CONTRACTOR from compliance with the CONTRACT DOCUMENTS.
- D. After ten (10) days from delivery of a WRITTEN NOTICE to the CONTRACTOR and the ENGINEER, the PUBLIC BODY may, without cause or prejudice to any other right or remedy, elect to abandon the PROJECT and to terminate the CONTRACT. In such case the CONTRACTOR shall be paid for all WORK executed and any expense sustained plus reasonable profit.
- It through no act or fault of the CONTRACTOR, the WORK is suspended for a E. period of more than ninety (90) days by the PUBLIC BODY or under an order of court or other public authority, or the ENGINEER fails to act on any request for payment within thirty (30) days after it is submitted, or the PUBLIC BODY fails to pay the CONTRACTOR substantially the sum approved by the ENGINEER or awarded through the legally recognized disputed claim procedure within thirty (30) days of its approval and presentation, then the CONTRACTOR may, after ten (10) days from delivery of a WRITTEN NOTICE to the PUBLIC BODY terminate the CONTRACT and recover from the PUBLIC BODY payment for all WORK executed and expenses sustained. In addition and in lieu of terminating the CONTRACT, if the ENGINEER has failed to act on a request for payment or if the PUBLIC BODY has failed to make any payment as foresaid, the CONTRACTOR may upon ten (10) days WRITTEN NOTICE to the PUBLIC BODY and ENGINEER stop the WORK until all amounts then due are paid, in which event and upon resumption of the WORK CHANGE ORDERS shall be issued for adjusting the CONTRACT PRICE or extending the CONTRACT TIME, or both, to compensate for the costs and delays attributable to the stoppage of the WORK.
- F. If the performance of all or any portion of the WORK is suspended, delayed, or interrupted as a result of the PUBLIC BODY or ENGINEER to act within the time specified in the CONTRACT DOCUMENTS, or if no time is specified, within a reasonable time, an adjustment in the CONTRACT PRICE or an extension of the CONTRACT TIME, or both, shall be made by CHANGE ORDER to compensate the

CONTRACTOR for the Costs and delays necessarily caused by the failure of the PUBLIC BODY or ENGINEER.

# **27. Correction of Work**

- A. The CONTRACTOR shall promptly remove from the premises all WORK rejected by the ENGINEER for failure to comply with the CONTRACT DOCUMENTS, whether incorporated in the construction or not, and the CONTRACTOR shall promptly replace and re-execute the WORK in accordance with the CONTRACT DOCUMENTS and without expense to the PUBLIC BODY and shall bear the expense of making good all WORK of other CONTRACTORS destroyed or damaged by such removal or replacement.
- B. All removal and replacement WORK shall be done at the CONTRACTOR'S expense. If the CONTRACTOR does not take action to remove such rejected WORK within ten (10) days after receipt of WRITTEN NOTICE, the PUBLIC BODY may remove such WORK and store the materials at the expense of the CONTRACTOR.
- C. If the PUBLIC BODY deems if not expedient to require the CONTRACTOR to correct WORK not done in accordance with the CONTRACT DOCUMENTS, an agreement may be made between the PUBLIC BODY and the CONTRACTOR for a change in CONTRACT PRICE with an equitable deduction in lieu of replacement and removal.

# 28. Cleanup Requirements

- A. The construction premises, job sites and any property leased for storage of equipment or materials shall be maintained by the CONTRACTOR in reasonably neat and orderly condition, free from accumulation of waste material and rubbish during the entire construction period. All crates, cartons and other flammable and trash shall be removed from work areas at the end of each working day. Trash burning on the site shall be prohibited unless done in accordance with local ordinance.
- B. The CONTRACTOR shall remove all rubbish and debris from WORK with reasonable promptness. Rubbish and debris shall not be permitted to accumulate in excessive amounts that will become hazardous underfoot and to vehicular traffic.
- C. Upon completion of the WORK, the CONTRACTOR shall remove all temporary construction facilities, including buildings, fences, scaffolding, unused materials; and rubbish of any kind. Buildings, job site and adjacent property shall be left in a neat and clean condition acceptable to the PUBLIC BODY.

#### **29. Fitting and Coordination of the Work**

The CONTRACTOR shall be responsible for the proper fitting of all WORK and for the coordination of the operation of all trades, SUBCONTRACTORS, or material supplies engaged in the WORK. The CONTRACTOR shall guarantee to each of his SUBCONTRACTORS the locations and measurements which they may require for the fitting of their work to all surrounding work.

### 30. Subcontracting

- A. The CONTRACTOR may utilize specialty SUBCONTRACTS on those parts of the WORK which, under normal contracting practices, are performed by specialty SUBCONTRACTORS.
- B. The CONTRACTOR shall not contract with any proposed SUBCONTRACTOR without the prior written approval of the PUBLIC BODY. Prior to the award of each SUBCONTRACT, the CONTRACTOR shall notify the PUBLIC BODY and the ENGINEER in writing of the name and trade of each SUBCONTRACTOR proposed, and furnish such written information as the PUBLIC BODY and the ENGINEER may require concerning the proposed SUBCONTRACTOR. Any objection the PUBLIC BODY may have concerning the proposed SUBCONTRACT shall be expressed in writing within seven (7) days after receipt by the PUBLIC BODY of the CONTRACTOR'S proposal of a SUBCONTRACT.
- C. The PUBLIC BODY may, without claim for extra cost by the CONTRACTOR, disapprove of any SUBCONTRACTOR based upon its own determination, or because of the fact that the proposed SUBCONTRACTOR is listed as ineligible to receive award of CONTRACTS for federally funded jobs due to being listed as debarred by the U. S. Department of Housing and Urban Development, the U. S. Department of Labor, or the Commonwealth of Virginia.
- D. The CONTRACTOR shall be as fully responsible for the acts and omissions of its SUBCONTRACTORS, and for persons either directly or indirectly employed by them, as the CONTRACTOR is for the acts and omissions of persons employed by the CONTRACTOR.
- E. The CONTRACTOR shall cause appropriate provisions to be inserted in all SUBCONTRACTS relative to the WORK to bind SUBCONTRACTORS to applicable provisions of the CONTRACT DOCUMENTS.
- F. There shall be nothing contained in the CONTRACT DOCUMENTS that shall create any contractual relation between any SUBCONTRACTOR and the PUBLIC BODY.

# **31. Separate Contracts**

- A. The PUBLIC BODY reserves the right to let other contracts in connection with this PROJECT. The CONTRACTOR shall afford other contractors reasonable opportunity for the introduction and storage of their materials and the execution of their work, and shall properly connect and coordinate the WORK with theirs. If the proper execution or results of any part of the CONTRACTOR'S WORK depends on the work of any other contractors, the CONTRACTOR shall inspect and promptly report to the ENGINEER any defect in such work that render it unsuitable for such proper execution and results.
- B. The PUBLIC BODY may perform additional work related to this PROJECT or the PUBLIC BODY may let other contracts containing provisions similar to these. The CONTRACTOR shall afford the other contractors who are parties to such contracts (or the PUBLIC BODY if the PUBLIC BODY is performing the additional work) reasonable opportunity for the introduction and storage of equipment and materials and the execution of work, and shall properly connect and coordinate the WORK with theirs.
- C. If the performance of additional work by other contractors or the PUBLIC BODY is not noted in the CONTRACT DOCUMENTS prior to the execution of the CONTRACT, written notice thereof shall be given to the CONTRACTOR prior to starting any such additional work. If the CONTRACTOR believes that the performance of such additional work by the PUBLIC BODY entitles him to an extension of CONTRACT TIME, the CONTRACTOR may make a claim thereof for a CHANGE ORDER.

# **32. Lands and Rights-Of-Way**

- A. Prior to issuance of NOTICE TO PROCEED the PUBLIC BODY shall obtain all land and rights-of-way necessary for carrying out and for completion of the WORK to be performed pursuant to the CONTRACT DOCUMENTS, unless otherwise mutually agreed.
- B. The PUBLIC BODY shall provide to the CONTRACTOR information which delineates and describes the lands owned and rights-of-way acquired.

# **33. As Constructed Drawings**

The CONTRACTOR shall provide the ENGINEER with accurate information to be used in the preparation of permanent As Constructed Drawings. For this purpose, the CONTRACTOR shall record on one set of CONTRACT DRAWINGS all changes from the installations originally indicated, and record final locations of underground lines by depth from finish grade and by accurate horizontal offset distances to permanent surface improvements such as buildings, curbs, or edges of walks etc.

# 34. Final Completion Inspection and Closeout

- A. When the WORK as described in the CONTRACT DOCUMENTS is substantially completed, the CONTRACTOR shall notify the ENGINEER and PUBLIC BODY by WRITTEN NOTICE that the WORK will be ready for final inspection on a definite date specified in such NOTICE. The WRITTEN NOTICE shall be given at least ten (10) days prior to the date state for final inspection. If the PUBLIC BODY determines that the status of the WORK is as represented, it will make arrangements necessary to conduct final inspection on the date stated in the NOTICE, or as soon thereafter as is practicable. The inspection party will include the ENGINEER and such representatives of the PUBLIC BODY as deemed appropriate.
- B. After the ENGINEER and the PUBLIC BODY have been satisfied that the CONTRACTOR has performed satisfactorily in accordance with the CONTRACT DOCUMENTS, the ENGINEER will certify that the CONTRACTOR is eligible for final payment by the PUBLIC BODY.
- C. The CONTRACTOR is required to execute a Release of Liens, Payment in Full to Subcontractors and Material Suppliers Certification, Warranty of Materials and Workmanship and all other appropriate documents that are essential to close out of the PROJECT as requested by the PUBLIC BODY.
- D. The PUBLIC BODY'S attorney will review the CONTRACTOR'S close out documents prior to acceptance by the PUBLIC BODY. If the PUBLIC BODY and its attorney are satisfied that the PUBLIC BODY is released from all liens, claims or other charges connected with the WORK, the PUBLIC BODY will make payment to the CONTRACTOR.

### 35. Insurance

- A. The CONTRACTOR shall purchase and maintain such insurance as will protect it from claims set forth below which may arise out of, or result from, the CONTRACTOR'S execution of the WORK, whether such execution be by the CONTRACTOR, any SUBCONTRACTOR, or by anyone directly or indirectly employed by any of them, or by anyone for whose acts any of them may be liable:
  - (1) Claims under workmen's compensation, disability benefit and other similar employee benefit acts;

- (2) Claims for damages because of bodily injury, occupational sickness or disease, or death of employees;
- (3) Claims for damages because of bodily injury, sickness or disease, or death of any person other than employees;
- (4) Claims for damages insured by usual personal injury liability coverage which are sustained (a) by any person as a result of an offense directly or indirectly related to the employment of such person by the CONTRACTOR, or (b) by any other person; and
- (5) Claims for damages because of injury to or destruction of tangible property, including loss of use resulting there from.
- B. Certificates of Insurance acceptable to the PUBLIC BODY shall be filed with the PUBLIC BODY prior to commencement of the WORK. These Certificates shall contain a provision that coverage afforded under the policies will not be cancelled unless at least fifteen (15) days prior WRITTEN NOTICE has been given to the PUBLIC BODY.
- C. The CONTRACTOR shall procure and maintain, at the CONTRACTOR'S own expense, during the CONTRACT TIME, Liability insurance as herein- after specified:
  - Contractor's General Public Liability and Property Damage Insurance including (1)vehicle coverage issued to the CONTRACTOR and protecting the CONTRACTOR from all claims for personal injury, including death, and all claims for destruction of or damage to property, arising out of or in connection with any operations under the CONTRACT DOCUMENTS, whether such operations be by the CONTRACTOR or by any SUBCONTRACTOR employed by the CONTRACTOR or anyone directly or indirectly employed by the CONTRACTOR or by a SUBCONTRACTOR employed by the CONTRACTOR. Insurance shall be written with a limit of liability of not less than \$500,000 for all damages arising out of bodily injury, including death, at any time resulting there from, sustained by anyone person in any one accident; and a limit of liability of not less than \$500,000 aggregate for any such damages sustained by two or more persons in any one accident. Insurance shall be written with a limit of liability of not less than \$200,000 for all property damage sustained by any one person in any one accident; and a limit of liability of not less than \$200,000 aggregate for any such damage sustained by two or more persons in any accident.
  - (2) The CONTRACTOR shall acquire and maintain, if applicable, Fire and Extended Coverage insurance upon the PROJECT to the full insurable value thereof for the benefit of the PUBLIC BODY, the CONTRACTOR, and

SUBCONTRACTORS as their interest may appear. This provision shall in no way release the CONTRACTOR or CONTRACTOR'S surety from obligations under the CONTRACT DOCUMENTS to fully complete the PROJECT.

- D. The CONTRACTOR shall procure and maintain, at the CONTRACTOR'S own expense, during the CONTRACT TIME, in accordance with the provisions of State law, Workman's Compensation Insurance, including occupational disease provisions, for all of the CONTRACTOR'S employees at the site of the PROJECT and in case any WORK is sublet, the CONTRACTOR shall require such SUBCONTRACTOR similarly to provide Workmen's Compensation Insurance, including occupational disease provisions for all of the latter's employees unless such employees are covered by the protection afforded by the CONTRACTOR. In case any class of employees engaged in hazardous work under this contract at the site for the PROJECT is not protected under Workmen's Compensation statue, the CONTRACTOR shall provide, and shall cause each SUBCONTRACTOR to provide, adequate and suitable insurance for the protection of its employees not otherwise protected.
- E. The CONTRACTOR shall secure, if applicable, "All Risk" type Builder's Risk Insurance for WORK to be performed. Unless specifically authorized by the PUBLIC BODY, the amount of such insurance shall not be less than the CONTRACT PRICE totaled in the BID. The policy shall cover not less than the losses due to fire, explosion, hail, lightning, vandalism, malicious mischief, wind, collapse, riot, aircraft, and smoke during the CONTRACT TIME, and until the WORK is accepted by the PUBLIC BODY. The policy shall name as the insured the CONTRACTOR, and the PUBLIC BODY.

# **36. Assignment of Contract**

- A. The CONTRACTOR' S obligations and duties under this CONTRACT shall not be assigned in whole or in part by the CONTRACTOR without the prior written approval of the PUBLIC BODY. This shall not prohibit the assignment of the proceeds due hereunder to a bank or financial institution, provided however that such assignment does not encumber or in any way lay claim to materials, equipment or machinery to be incorporated into the WORK or otherwise to be vested in the PUBLIC BODY by terms of the CONTRACT DOCUMENTS. This provision shall not preclude the CONTRACTOR from subletting as provided in the CONTRACT DOCUMENTS, parts of the WORK.
- B. This CONTRACT may be assigned by the PUBLIC BODY to any corporation, agency, or instrumentally authorized to accept such assignment.

# **37. Indemnification**

- A. The CONTRACTOR will indemnify and hold harmless the PUBLIC BODY and the ENGINEER and their agents and employees from and against all claims, damages, losses, and expenses including attorney fees arising out of or resulting from the performance of the WORK, provided that such claims, damage, loss, or expense is attributable to bodily injury, sickness, disease or death, or to injury to or destruction of tangible property including the loss of use there- from; and is caused in whole or in part by any negligent or willful act or omission of the CONTRACTOR, and SUBCONTRACTOR, anyone directly or indirectly employed by any of them or anyone for whose acts any of them may be liable.
- B. In any and all claims against the PUBLIC BODY or the ENGINEER, or any of their agents or employees, by any employee of the CONTRACTOR, any SUBCONTRACTOR, anyone directly or indirectly employed by any of them, or anyone for whose acts any of them may be liable, the indemnification obligation shall not be limited in any way by any limitation on the amount or type of damages, compensation, of benefits payable by or for the CONTRACTOR or any SUBCONTRACTOR under workmen's compensation acts, disability benefit acts or any other employee benefit acts.
- C. The obligation of the CONTRACTOR under this paragraph shall not extend to the liability of the ENGINEER, its agents, or employees arising out of the preparation or approval of maps, DRAWINGS, opinions, reports, surveys, CHANGE ORDERS, designs or SPECIFICATIONS.

# 38. Guarantee

The CONTRACTOR shall guarantee all materials and equipment furnished and WORK performed for a period of one (1) year from the date of substantial inspection. The CONTRACTOR warrants and guarantees for a period of one (1) year from the date of final inspection of the facility that the facility is free from all defects due to faulty materials and workmanship and the CONTRACTOR shall promptly make such corrections as may be necessary by reason of such defects including the repairs of the damages of other parts of the system resulting from such defects. The PUBLIC BODY will give notice of observed defects with reasonable promptness. In the event that the CONTRACTOR should fail to make such repairs, adjustments or other WORK that may be made necessary by such defects, the PUBLIC BODY may do so and charge the CONTRACTOR the cost thereby incurred. The Performance BOND shall remain in full force and effect through the guarantee period.

### **39. Notices**

- A. All NOTICES, demands, requests, instructions, approvals, proposals, and claims must be made in writing.
- B. Any NOTICE to or demand upon the CONTRACTOR shall be sufficiently given if delivered at the office of the CONTRACTOR stated on the signature page of the CONTRACT DOCUMENTS (or at such other office as he may from time to time designate in writing to the PUBLIC BODY, or deposited in the United States Mail in a sealed, postage paid envelope, or if delivered with charges prepaid to any telegraph company for transmission in each case addressed to such office).
- C. All NOTICES required to be delivered to the PUBLIC BODY shall, unless otherwise specified in writing to the CONTRACTOR, be delivered to the designated representative and any NOTICE to or demand upon the PUBLIC BODY shall be sufficiently given if so delivered in writing, or deposited in the United States Mail in a sealed, postage paid envelope, or delivered with charges prepaid to any telegraph company for transmission to said designated representative at such address, or to such other address as the PUBLIC BODY may subsequently specify in writing to the CONTRACTOR for such purposes.
- D. Any such WRITTEN NOTICE shall be deemed to have been given as of the time of actual delivery, or in the case of mailing, when the same should have been received in due course of post, or in the case of telegrams at the time of actual receipt, as the case may be.

# 40. Access to Records

The PUBLIC BODY, the Inspector General of the United States, U. S. Department of Housing and Urban Development, U. S. Department of Labor, the General Accounting Office, and DHCD shall be permitted by the CONTRACTOR to have full access to, and right to examine any pertinent books, documents, papers and records of the CONTRACTOR involving transactions related to this CONTRACT, during the period of this PROJECT and for five (5) years from the date of final payment or until all findings have been resolved to the satisfaction of the Commonwealth of Virginia. The CONTRACTOR agrees to permit any of the foregoing parties to reproduce by any means whatsoever or to copy excerpts and transcriptions as reasonably needed. The CONTRACTOR agrees to maintain all books, documents, papers and records required under this CONTRACT for a period of not less than five (5) years from the date of final payment or until all findings have been resolved to the satisfaction of the States and records required under this CONTRACT for a period of not less than five (5) years from the date of final payment or until all findings have been resolved to the satisfaction of the Commonwealth of Virginia.

### 41. Withholding Of Funds

Not withstanding the provisions of Section 20 herein, the following shall apply:

- A. The PUBLIC BODY may withhold or cause to be withheld from the CONTRACTOR so much of the accrued payments or advances as may be considered necessary to satisfy any liability of the CONTRACTOR or any SUBCONTRACTOR for liquidated damages under the CONTRACT Work Hours and Safety Standards Act Overtime Compensation.
- B. If the CONTRACTOR or any SUBCONTRACTOR fails to pay any laborer, mechanic, apprentice, trainee, watchman or guard employed on the WORK all or part of the wages required by the CONTRACT DOCUMENTS, the PUBLIC BODY may, upon WRITTEN NOTICE to the CONTRACTOR, take such action as may be necessary to cause suspension of any further payments or advances until such violations have ceased.

#### 42. Federal Funding Termination

In the event that federal funding is terminated or otherwise unavailable for the purpose of compensating the CONTRACTOR, the CONTRACT is null and void, releasing the CONTRACTOR from further obligations contained therein.

### 43. Interest of Contractor

The CONTRACTOR covenants that the CONTRACTOR presently has no interest and shall not acquire any interest, direct or indirect, which would conflict in any manner or degree with the CONTRACTOR'S services hereunder. The CONTRACTOR further covenants that in the performance of this CONTRACT no person having any such interest shall be employed.

# **44. Political Activity**

No portion of CONTRACT funds shall be directly used for any political activity or to further the election or defeat of any candidate for public office.

### 45. Interest of Officials

A. No member of or delegate to the Congress of the United States, shall be admitted to any share or part of this CONTRACT or to any benefit to arise there from; but this

provision shall not be construed to extend to this CONTRACT if made with a corporation for its general benefit.

B. No employee, officer or agent of the PUBLIC BODY shall participate in selection, or in the award or administration of this CONTRACT if a conflict of interest, real or apparent, would be involved. Such a conflict would arise when: the employee, officer or agent; any member of his immediate family; his partner; or an organization which employs or is about to employ any of the preceding persons has a financial or other interest in the CONTRACTOR or this CONTRACT.

# 46. Provisions Required By Law Deem Inserted

Each and every provision of law and clause required by law to be inserted in this CONTRACT shall be deemed to be inserted herein and the CONTRACT shall be read and enforced as though it were included herein.

# 47. Contract Security

<u>Requirements</u>: Section 2.2-4337 of the Virginia Public Procurement Act requires performance and payment bonds in the amount of the contract for construction contracts exceeding \$500,000 awarded to any prime contractor. State law does not preclude public bodies from requiring such bonds for construction contracts below \$500,000. Section 2.2-4337 also <u>allows</u> the contractor to require of each subcontractor a payment bond (but not a performance bond). HUD regulations at 24 CFR Part 85 requires performance and payment bonds for 100 percent of the contract price for contracts exceeding \$150,000 and such bonds must be obtained from companies listed in the U.S. Treasury Circular 570.

NOTE: The public body must use the sample wording or develop its own wording consistent with the requirements.

### <u>Sample</u>

- A. Simultaneous with the delivery of the executed CONTRACT, the CONTRACTOR shall furnish to the PUBLIC BODY the following BONDS payable to the PUBLIC BODY:
  - 1. A performance BOND in the sum of the CONTRACT amount conditioned upon the faithful performance of the CONTRACT in strict conformity with the CONTRACT DOCUMENTS.
  - 2. A payment BOND in the sum of the CONTRACT amount. Such BOND shall be for the protection of claimants who have and fulfill contracts to supply labor or materials to the CONTRACTOR, or to any of his SUBCONTRACTORS, in

the prosecution of the WORK, and shall be conditioned upon the prompt payment for all such material furnished or labor supplied or performed in the prosecution of the WORK. "Labor or materials" shall include public utility services and reasonable rental of equipment, but only for periods when the equipment rented is actually used at the site.

- B. Each of the BONDS shall be executed by one or more surety companies authorized to do business in Virginia. When the CONTRACT amount exceeds \$150,000, such company shall also be listed in the latest issue of the U.S. Treasury Circular 570 and the penal sum shall be within the maximum specified for such company in said Circular 570.
- C. In lieu of a payment or performance BOND, the CONTRACTOR may furnish a certified check or cash escrow in the face amount required by the BOND.

# **48. Contractual Disputes**

<u>Requirements</u>: Section 2.2-4363 of the Virginia Public Procurement Act requires public bodies to include in their contracts (or by reference) a procedure for consideration of contractual claims. Such procedure must establish a time limit for a final decision in writing by the public body. OMB Part 85 provides that "The grantee is responsible, in accordance with good administrative practice and sound business judgment, for the settlement of all contractual and administrative issues arising out of procurements entered in support of a grant. These include but are not limited to source evaluation, protests, disputes, and claims." As a minimum, ALL PUBLIC BODIES MUST ESTABLISH a procedure for consideration of contractual claims including a time limit for a final decision. TWO EXCEPTIONS MUST BE PROVIDED for in a general contractual disputes clause. These exceptions concern disputes arising out of the labor standards provisions of the contract and disputes relative to a contractor's compliance with the affirmative action clauses.

### <u>Sample</u>

A. Contractual claims whether for money or other relief, except disputes arising out of the Labor Standards Provisions of this CONTRACT and disputes relative to the CONTRACTOR'S compliance with the affirmative action clauses shall be submitted in writing no later than sixty (60) days after final payment, however, WRITTEN NOTICE of the CONTRACTOR'S intention to file such a claim must be given at the time of the occurrence or prior to beginning of that part of the WORK upon which the claim is based. Such WRITTEN NOTICE of the CONTRACTOR'S intention to file a claim need not detail the amount of the claim, but shall state the facts or issues relating to the claim in sufficient detail to identify the claim, together with its character and scope. Upon the filing of such WRITTEN NOTICE the CONTRACTOR shall proceed with the WORK as directed.

- B. The PUBLIC BODY, upon receipt of a detailed claim, may at any time render its decision and shall render such decision within days of final payment. Each such decision rendered by the PUBLIC BODY shall be forwarded to the CONTRACTOR by WRITTEN NOTICE.
- C. If the CONTRACTOR disagrees with the decision of the PUBLIC BODY concerning any pending claim he shall promptly notify the PUBLIC BODY by WRITTEN NOTICE that he is proceeding with the WORK under protest. Any claim not resolved, whether by failure of the CONTRACTOR to accept the decision of the PUBLIC BODY or under a WRITTEN NOTICE of CONTRACTOR'S intention to file a claim or a detailed claim not acted upon by the PUBLIC BODY, shall be specifically exempt by the CONTRACTOR from payment request, whether progress or final. Pendency of claims shall not delay payment of amounts agreed due in the final payment.
  - D. The decision on contractual claims by the PUBLIC BODY shall be final and conclusive unless the CONTRACTOR appeals within six months of the date of the final decision on the claim by the PUBLIC BODY by invoking the administrative appeals procedure, if available, or by instituting legal action in the appropriate circuit court.

# 49. Administrative Appeals Procedure and Arbitration

<u>Requirements</u>: Under Section 2.2-4365 of the Virginia Public Procurement Act, a public body <u>may</u> establish an administrative appeals procedure for hearing protests of a decision to award or an award, appeals from refusals to allow withdrawal of bids, appeals from disqualifications and determinations of nonresponsibility, and appeals from decisions on disputes arising during the performance of a contract. And such administrative procedure shall provide for a hearing before a disinterested person or panel.

The sample administrative appeals procedure is optional.

# Sample:

A. Not later than six months from the date of the decision of the PUBLIC BODY, the CONTRACTOR may invoke the Administrative Appeals Procedure, by filing with the PUBLIC BODY a WRITTEN NOTICE of an intention to arbitrate, which NOTICE shall contain a statement setting forth the nature of the dispute, the amount involved, and the remedy sought. The CONTRACTOR shall file two copies of said NOTICE with any Regional Office of the American Arbitration Association (AAA), together with two copies of the arbitration provisions of this CONTRACT and the appropriate filing fee as provided for in the administrative fee schedule of the AAA in

effect at the time of filing. Such dispute shall be settled in accordance with the Construction Industry Arbitration Rules of the American Arbitration Association.

- B. The award shall be final and conclusive and shall not be set aside unless the findings of fact contained therein are fraudulent or arbitrary or capricious, or so grossly erroneous as to imply bad faith.
- C. No determination on an issue of law shall be final if appropriate legal action is instituted in a timely manner. Any party to the Administrative Appeals Procedure shall be entitled to institute judicial review if such action is brought within thirty (30) days of the receipt of the written decision.
- D. Judgment upon the award may be entered in any court having jurisdiction thereof.
- E. Should the Administrative Appeals Procedure be invoked prior to completion of the WORK, the CONTRACTOR shall carry on the WORK and maintain the progress schedule unless otherwise agreed to by the CONTRACTOR and the PUBLIC BODY in writing.

### 50. Other Contractual Requirements

RETAINAGE: Section 2.2-4333 of the Virginia Public Procurement Act provides, "In any public contract for construction which provides for <u>progress payments in installments</u> <u>based upon an estimated percentage of completion</u>, the contractor shall be paid at least ninety-five percent of the earned sum when payment is due, with not more than five percent being retained to assure faithful performance of the contract. All amounts withheld may be included in the final payment... Any subcontract for a public project which provides for similar progress payments shall be subject to the same limitations."

There are no federal requirements addressing the retainage issues.

NOTE: The maximum five percent retainage allowable is incorporated in Section 20 of General Conditions - Part I.

EQUALS: Both 24 CFR Part 85 and Section 2.2-4315 of the Virginia Public Procurement Act require that in contracts the use of a certain brand, make or manufacture does not restrict the procurement to a specific brand, make or manufacturer. This requirement is found in Section 4 of General Conditions - Part I.

RECORDS RETENTION AND ACCESS TO: The federal requirements concerning retention of records and access to records and incorporated in Section 40 of General Conditions - Part I.

CONTRACT TERMINATION: The 24 CFR Part 85 requirements concerning contract termination are incorporated in the language found in Section 26 of General Conditions - Part I.

# CD - 8.2

#### **General Conditions - Part II**

(TO BE INSERTED VERBATIM IN ALL CDBG CONSTRUCTION CONTRACTS; Except Subpart A, Federal Labor Standards Provisions; and Subpart B, Contract Work hours and Safety Standards Act, do not apply to rehabilitation of residential property, including bathroom additions, for use by less than eight families)

#### Subpart A: Federal Labor Standards Provisions

#### 29 CFR 5.5 (a) - APPLICABILITY

The Project or Program to which the work covered by this Contract pertains is being assisted by the United States of America, and the following Federal Labor Standards Provisions are included in this contract pursuant to the provisions applicable to such Federal assistance.

(Applicable to all contracts/subcontracts in excess of \$2,000)

#### 1. Minimum Wages

All laborers and mechanics employed or working upon the site of the work will be A. paid unconditionally and not less often than once each week, and without subsequent deduction or rebate on any account (except such payroll deductions as are permitted by regulations issued by the Secretary of Labor under the Copeland Act (29 CFR Part 3), the full amount of wages and bona fide fringe benefits (or cash equivalents thereof) due at time of payment computed at rates not less than those contained in the wage determination of the Secretary of Labor which is hereto and made a part hereof, regardless of any contractual relationship which may be alleged to exist between the Contractor and such laborers and mechanics. Contributions made or costs reasonably anticipated for bona fide fringe benefits under Section 1(b) (2) of the Davis-Bacon Act on behalf of laborers or mechanics are considered wages paid to such laborers or mechanics, subject to the provisions of paragraph l(d) of this subpart; also regular contributions made or costs incurred for more than a weekly period (but not less often than quarterly) under plans, funds, or programs which cover the particular weekly period, are deemed to be constructively made or incurred during such weekly period. Such laborers and mechanics shall be paid the appropriate wage rate and fringe benefits of the wage determination for the classification of work actually performed, without regard to skill, except as provided in 29 CFR 5.5(a)(4). Laborers or mechanics performing work in more than one classification may be compensated at the rate specified for each classification for the time actually worked therein; provided that the employer's payroll records accurately set forth the time spent in each classification in which work is performed. The wage determination (including any classification and wage rates conformed under paragraph l(b) of this subpart) and the Davis-Bacon poster (WH-1321) shall be posted at all times by the contractor and its subcontractors at the site of the work in a prominent and accessible place where it can be easily seen by the workers.

В.

- (1) The Virginia Department of Housing and Community Development (DHCD) and the Public Body shall require that any class of laborers or mechanics which is not listed in the wage determination and which is to be employed under the contract shall be classified in conformance with the wage determination. DHCD and the U.S. Department of Labor shall approve an additional classification and wage rate and fringe benefits therefore only when the following criteria have been met:
  - i. The work to be performed by the classification requested is not performed by a classification in the wage determination; and
  - ii. The classification is utilized in the area by the construction industry; and
  - iii. The proposed wage rate, including any bona fide fringe benefits, bears a reasonable relationship to the wage rates contained in the wage determination.
- (2) If the contractor and the laborers and mechanics to be employed in the classification (if known), or their representatives, and DHCD agree on the classification and wage rate (including the amount designated for fringe benefits where appropriate), a report of the action taken shall be sent by DHCD to the Administrator of the Wage and Hour Division, Employment Standards Administration, U. S. Department of Labor, in Washington D. C. The Administrator, or an authorized representative, will approve, modify, or disapprove every additional classification action within 30 days of receipt and so advise DHCD, or will notify DHCD within the 30-day period that additional time is necessary.
- (3) In the event the contractor, the laborers or mechanics to be employed in the classification or their representatives, and the contracting officer do not agree on the proposed classification and wage rate (including the amount designated for fringe benefits, where appropriate), DHCD shall refer the questions, including the views of all interested parties and the recommendation of the contracting officer, to the Administrator for determination. The Administrator, or an authorized representative, will issue a determination within 30 days of receipt and so advise DHCD or will notify DHCD within the 30-day period that additional time is necessary.

- (4) The wage rate (including fringe benefits where appropriate) determined pursuant to subparagraphs 1 (b) (B) or (C) of this subpart, shall be paid to all workers performing work in the classification under this contract from the first day on which work is performed in the classification.
- C. Whenever the minimum wage rate prescribed in the contract for a class of laborers or mechanics includes a fringe benefit which is not expressed as an hourly rate, the contractor shall either pay the benefit as stated in the wage determination or shall pay another <u>bona fide</u> fringe benefit or an hourly cash equivalent thereof.
- D. If the contractor does not make payment to a trustee or other third person, the contractor may consider as part of the wages of any laborer or mechanic the amount of any costs reasonably anticipated in providing <u>bona fide</u> fringe benefits under a plan or program, <u>Provided</u>, That the Secretary of Labor has found, upon the written request of the contractor, that the applicable standards of the Davis-Bacon Act have been met. The Secretary of Labor may require the contractor to set aside in a separate account assets for the meeting of obligations under the plan or program.

# 2. Withholding

DHCD, or the Public Body, shall upon its own action or upon written request of an authorized representative of the Department of Labor, withhold or cause to be withheld from the contractor under this contract or any other Federal contract with the same prime contractor, or any other Federally-assisted contract subject to Davis-Bacon prevailing wage requirements, which is held by the same prime contractor, so much of the accrued payments or advances as may be considered necessary to pay laborers and mechanics, including apprentices, trainees, and helpers, employed by the contractor or any subcontractor the full amount of wages required by the contract. In the event of failure to pay any laborer or mechanic, including any apprentice, trainee, or helper, employed or working on the site of the work all or part of the wages required by the contract, DHCD may, after written notice to the contractor, sponsor, applicant, or owner, take such action as may be necessary to cause the suspension of any further payment, advance, or guarantee of funds until such violations have ceased.

# 3. Payrolls and Basic Records

A. Payrolls and basic records relating thereto shall be maintained by the contractor during the course of the work and preserved for a period of three years thereafter for all laborers and mechanics working at the site of the work. Such records shall contain the name, address, and social security number of each such worker, his or her correct classification, hourly rates of wages paid (including rates of contributions or costs anticipated for <u>bona fide</u> fringe benefits or cash equivalents thereof of the types described in section 1(b)(2)(B) of the Davis-Bacon Act), daily and weekly number of hours worked, deductions made and actual wages paid.

Whenever the Secretary of Labor has found under 29 CFR 5.5 (a)(l)(iv) that the wages of any laborer or mechanic include the amount of any costs reasonably anticipated in providing benefits under a plan or program described in section l(b) (2) (B) of the Davis-Bacon Act, the contractor shall maintain records which show that the commitment to provide such benefits is enforceable, that the plan or program is financially responsible, and that the plan or program has been communicated in writing to the laborers or mechanics affected, and records which show the costs anticipated or the actual cost incurred in providing such benefits. Contractors employing apprentices or trainees under approved programs shall maintain written evidence of the registration of apprentices and trainees, and the ratios and wage rates prescribed in the applicable programs.

#### A.

- (1) The contractor shall submit weekly for each week in which any contract work is performed a copy of all payrolls to the designated Public Body. The payrolls submitted shall set out accurately and completely all of the information required to be maintained under 29 CFR 5.5 (a) (3) (i). This information may be submitted in any form desired. The prime contractor is responsible for the submission of copies of payrolls by all subcontractors.
- (2) Each payroll submitted shall be accompanied by a "Statement of Compliance," signed by the contractor or subcontractor or his or her agent who pays or supervises the payment of the persons employed under the contract and shall certify the following:
  - i. That the payroll for the payroll period contains the information required to be maintained under 29 CFR 5.5(a)(3)(i), and that such information is correct and complete;
  - ii. That each laborer or mechanic (including each helper, apprentice, and trainee) employed on the contract during the payroll period has been paid the full weekly wages earned, without rebate, either directly or indirectly, and that no deductions have been made either directly or indirectly from the full wages earned, other than permissible deductions as set forth in Regulations 29 CFR Part 3;
  - iii. That each laborer or mechanic has been paid not less than the applicable wage rates and fringe benefits or cash equivalents for the classification of work performed, as specified in the applicable wage determination incorporated into the contract.
- (3) The weekly submission of a properly executed certification set forth on the reverse side of Optional Form WH-347 shall satisfy the requirement for submission of the "Statement of Compliance" required by paragraph 3(b) (B) of this subpart.

- (4) The falsification of any of the above certifications may subject the contractor or subcontractor to civil or criminal prosecution under Section 1001 of Title 18 and Section 231 of Title 31 of the United States Code.
- B. The contractor or subcontractor shall make the records required under paragraphs 3(a) of this subpart available for inspection, copying, or transcription by authorized representatives of the Public Body, DHCD or the U.S. Department of Labor, and shall permit such representatives to interview employees during working hours on the job. If the contractor or subcontractor fails to submit the required records or to make them available, the Federal agency may, after written notice to the contractor, sponsor, applicant, or owner, take such action as may be necessary to cause the suspension of any further payment, advance, or guarantee of funds. Furthermore, failure to submit the required records upon request or to make such records available may be grounds for debarment action pursuant to 29 CFR 5.12.

# 4. Apprentices and Trainees

Apprentices: Apprentices will be permitted to work at less than the predetermined A. rate for the work they performed when they are employed pursuant to and individually registered in a bona fide apprenticeship program registered with the U.S. Department of Labor, Employment and Training Administration, Bureau of Apprenticeship and Training, or with a State Apprenticeship Agency recognized by the Bureau, or if a person is employed in his or her first 90 days of probationary employment as an apprentice in such an apprenticeship program, who is not individually registered in the program, but who has been certified by the Bureau of Apprenticeship and Training or a State Apprenticeship Agency (where appropriate) to be eligible for probationary employment as an apprentice. The allowable ratio of apprentices to journeymen in any craft classification shall not be greater than the ratio permitted to the contractor as to his entire work force under the registered program. Any worker listed on a payroll at an apprentice wage rate, who is not registered or otherwise employed as stated above, shall be paid not less than the applicable wage rate on the wage rate determination for the classification of work actually performed. In addition, any apprentice performing work on the job site in excess of the ratio permitted under the registered program shall be paid not less than the applicable wage rate on the wage determination for the work actually performed. Where a contractor is performing construction on a project in a locality other than that in which its program is registered, the ratios and wage rates (expressed in percentages of the journeyman's hourly rate) specified in the contractor's or subcontractor's registered program shall be observed. Everv apprentice must be paid not less than the rate specified in the registered program for the apprentice's level of progress, expressed as a percentage of the journeyman hourly rate specified in the applicable wage determination. Apprentices shall be paid fringe benefits in accordance with the provisions of the apprenticeship If the apprenticeship program does not specify fringe benefits, program. apprentices must be paid the full amount of fringe benefits listed on the wage

determination for the applicable classification. If the Administrator determined that a different practice prevails for the applicable apprentice classification, fringes shall be paid in accordance with that determination. In the event the Employment and Training Administration, or a State Apprenticeship Agency recognized by the Bureau, withdraws approval of an apprenticeship program, the contractor will no longer be permitted to utilize apprentices at less than the applicable predetermined rate for the work performed until an acceptable program is approved.

- Trainees: Except as provided in 29 CFR 5.16, trainees will not be permitted to **B**. work at less than the predetermined rate for the work performed unless they are employed pursuant to and individually registered in a program which has received prior approval, evidenced by formal certification by the U.S. Department of Labor, Employment and Training Administration. The ratio of trainees to journeymen shall not be greater than permitted under the plan approved by the Employment and Training Administration. Every trainee must be paid at not less than the rate specified in the approved program for his level of progress, expressed as a percentage of the journeyman hourly rate specified in the applicable wage determination. Trainees shall be paid fringe benefits in accordance with the provisions of the trainee program. If the trainee program does not mention fringe benefits, trainees shall be paid the full amount of fringe benefits listed on the wage determination unless the Administrator of the Wage and Hour Division determines that there is an apprenticeship program associated with the corresponding journeyman wage rate on the wage determination which provides for less than full fringe benefits for apprentices. Any employee listed on the payroll at a trainee rate that is not registered and participating in a training plan approved by the Employment and Training Administration shall be paid not less than the wage rate determined by the Secretary of Labor for the classification of work he actually performed. In addition, any trainee performing work on the job site in excess of the ratio permitted under the registered program shall be paid not less than the applicable wage rate on the wage determination for the work actually performed. In the event the Employment and Training Administration withdraws approval of a training program, the contractor will no longer be permitted to utilize trainees at less than the applicable predetermined rate for the work performed until an acceptable program is approved.
- C. Equal Employment Opportunity: The utilization of apprentices, trainees and journeymen under this part shall be in conformity with the equal employment opportunity requirements of Executive Order 11246, as amended, and 29 CFR Part 30.

### 5. Compliance with Copeland Act Requirements

The Contractor shall comply with the requirements of 29 CFR Part 3, which are incorporated by reference in this contract.

# 6. Subcontracts

The contractor or subcontractor shall insert in any subcontract the clauses contained in 29 CFR 5.5(a) (1) through (12) and such other clauses as the Department of Housing and Community Development may by appropriate instruction require, and also a clause requiring the subcontractors to include these clauses in any lower tier subcontract. The prime contractor shall be responsible for the compliance by any subcontractor or lower tier subcontractor with all the contract clauses in 29 CFR 5.5.

# 7. Contract Termination: Debarment

A breach of the contract clauses in 29 CFR 5.5 may be grounds for termination of the contract, and for debarment as a contractor and a subcontractor as provided in 29 CFR 5.12.

# 8. Compliance with Davis-Bacon and Related Act Requirements

All rulings and interpretations of the Davis-Bacon and Related Acts contained in 29 CFR Parts 1, 3, and 5 are herein incorporated by reference in this contract.

# 9. Disputes Concerning Labor Standards

Disputes arising out of the labor standards provisions of this contract shall not be subject to the general disputes clause of this contract. Such disputes shall be resolved in accordance with the procedures of the Department of Labor set forth in 29 CFR Parts 5, 6, and 7. Disputes within the meaning of this clause include disputes between the contractor (or any of its subcontractors) and the contracting agency, the U.S. Department of Labor, or the employees or their representatives.

# 10. Certification of Eligibility

- A. By entering into this contract, the contractor certifies that neither it (nor he or she) nor any person or firm which has an interest in the contractor's firm is a person or firm ineligible to be awarded Government contracts by virtue of section 3(a) of the Davis-Bacon Act or 29 CFR 5.12(a) (1).
- B. No part of this contract shall be subcontracted to any person or firm ineligible for award of a Government contract by virtue of section 3(a) of the Davis-Bacon act or 29 CFR 5.12(a)(1).

C. The penalty for making false statements is prescribed in the U.S. Criminal Code, 18 U.S.C. 1001.

# **11. Employment of Certain Persons Prohibited**

No person under the age of sixteen years and no person who, at the time, is serving sentence in a penal or correctional institution shall be employed on the work covered by this Contract.

### 12. Questions Concerning Certain Federal Statutes and Regulations

All questions arising under this Contract not specifically addressed in the above paragraphs which relate to the application or interpretation of (a) the aforesaid Anti-Kickback Act, (b) the Contract Work Hours and Safety Standards Act, (c) the aforesaid Davis-Bacon Act, (d) the regulations issued by the Secretary of Labor, United States Department of Labor, pursuant to said Acts, or (e) the labor standards provisions of any other pertinent Federal statute, shall be referred, through the Public Body to the Virginia Department of Housing and Community Development, to the Secretary of Labor, United States Department of Labor, for said Secretary's appropriate ruling or interpretation which shall be authoritative and may be relied upon for the purposes of this Contract.

# Subpart B: Contract Work Hours And Safety Standards Act

(Applicable to all construction contracts. As used in this "Subpart" the terms "laborers" and "mechanics" include watchman and guards.)

### **1.** Overtime Requirements

No contractor or subcontractor contracting for any part of the contract work which may require or involve the employment of laborers or mechanics shall require or permit any such laborer or mechanic in any workweek in which he or she is employed on such work to work in excess of forty hours in such workweek unless such laborer or mechanic receives compensation at a rate not less than one and one-half times the basic rate of pay plus the straight-time rate of any required fringe benefits for all hours worked in excess of forty hours in such workweek.

### 2. Violation; Liability for Unpaid Wages; Liquidated Damages

In the event of any violation of the clause set forth in paragraph (1) of this subpart, the contractor and any subcontractor responsible therefore shall be liable for the unpaid wages. In addition, such contractor and subcontractor shall be liable to the United States for liquidated damages. Such liquidated damages shall be computed with respect to each individual laborer or mechanic, including watchmen and guards, employed in violation of the clause set forth in paragraph (1) of this subpart, in the sum of \$10 for each calendar day or which such individual was required or permitted to work in excess of the standard workweek of forty hours without payment of the overtime wages required by the clause set forth in paragraph (1) of this subpart.

# 3. Withholding For Unpaid Wages and Liquidated Damages

The Public Body or DHCD shall upon its own action or upon written request of an authorized representative of the Department of Labor withhold or cause to be withheld, from any moneys payable on account of work performed by the contractor or subcontractor under any such contract or any other Federal contract with the same prime contractor, or any other Federally-assisted contract subject to the Contract Work Hours and Safety Standards Act, which is held by the same prime contractor, such sums as may be determined to be necessary to satisfy any liabilities of such contractor or subcontractor for unpaid wages and liquidated damages as provided in the clause set forth in paragraph (2) of this subpart.

### 4. Subcontract

The contractor or subcontractor shall insert in any subcontracts the clauses set forth in paragraphs (1) through (4) of this subpart and also a clause requiring the subcontractors to include these clauses in any lower tier subcontract. The prime contractor shall be responsible for compliance by any subcontractor or lower tier subcontractor with the clauses set forth in paragraphs (1) through (4) of this subpart.

In addition to the clauses contained in Subpart B, in any contract subject only to the Contract Work Hours and Safety Standards Act and not to any of the other statues cites in 5.1, the Agency Head shall cause or require the contracting officer to insert a clause requiring that the contractor or subcontractor shall maintain payrolls and basic payroll records during the course of the work and shall preserve them for a period of three years from the completion of the contract. Such records shall contain the name and address of each such employee, social security number, correct classifications, hourly rates of wages paid, daily and weekly number of hours worked, deductions made, and actual wages paid. Further, the Agency Head shall cause or require the contracting officer to insert in any such contract a clause providing that the records to be maintained under Subpart B shall be made available by the contractor or subcontractor for inspection, copying, or

transcription by authorized representative of the Public Body, DHCD and/or the Department of Labor, and the contractor or subcontractor will permit such representatives to interview employees during working hours on the job.

# Subpart C: Equal Employment Opportunity

### 1. Executive Order 11246, As Amended.

(Applicable to all contracts/subcontracts in excess of \$10,000)

- A. During the performance of this contract, the contractor agrees as follows:
  - (1) The contractor will not discriminate against any employee or applicant for employment because of race, color, religion, sex, or national origin. The contractor will take affirmative action to ensure that applicants are employed, and that employees are treated during employment without regard to their race, color, religion, sex, or national origin. Such action shall include, but not be limited to the following: Employment, upgrading, demotion, or transfer; recruitment or recruitment advertising; layoff or termination; rates of pay or other forms of compensation; and selection for training, including apprenticeship. The contractor agrees to post in conspicuous places, available to employees and applicants for employment, notices to be provided setting forth the provisions of this nondiscrimination clause.
  - (2) The contractor will, in all solicitations or advertisements for employees placed by or on behalf of the contractor, state that all qualified applicants will receive considerations for employment without regard to race, color, religion, sex, or national origin.
  - (3) The contractor will send to each labor union or representative of workers with which he has a collective bargaining agreement or other contract or understanding, a notice to be provided advising the said labor union or workers' representatives of the contractor's commitments under this section, and shall post copies of the notice in conspicuous places available to employees and applicants for employment.
  - (4) The contractor will comply with all provisions of Executive Order 11246, as amended, and of the rules, regulations, and relevant orders of the Secretary of Labor.
  - (5) The contractor will furnish all information and reports required by Executive Order 11246, as amended, and by rules, regulations, and orders of the Secretary of Labor, or pursuant thereto, and will permit access to his

books, records, and accounts by the administering agency and the Secretary of Labor for purposes of investigation to ascertain compliance with such rules, regulations, and orders.

- (6) In the event of the contractor's noncompliance with the nondiscrimination clauses of this contract or with any of the said rules, regulations, or orders, this contract may be canceled, terminated, or suspended in whole or in part and the contractor may be declared ineligible for further Government contracts or federally assisted construction contracts in accordance with procedures authorized in Executive Order 11246, as amended, and such other sanctions may be imposed and remedies invoked as provided in Executive Order 1 1246, as amended, or by rule, regulation, or order of the Secretary of Labor, or as otherwise provided by law.
- (7) The contractor will include the portion of the sentence immediately preceding paragraph (i) and the provisions of paragraphs (i) through (vii) in every subcontract or purchase order unless exempted by rules, regulations, or orders of the Secretary of Labor issued pursuant to section 204 of Executive Order 11246, as amended, so that such provisions will be binding upon each subcontractor or vendor. The contractor will take such action with respect to any subcontract or purchase order as the administering agency may direct as a means of enforcing such provisions, including sanctions for noncompliance: <u>Provided, however</u>, That in the event a contractor or vendor as a result of such direction by the administering agency the contractor may request the United States to enter into such litigation to protect the interests of the United States.
- B. Subcontracts: Each nonexempt prime contractor or subcontractor shall include the equal opportunity clause in each of its nonexempt subcontracts.

### 2. Notice of Requirement for Affirmative Action to Ensure Equal Employment Opportunity (Executive Order 11246, as amended). (Applicable to all contracts and subcontracts exceeding \$10,000.)

- A. The Offeror's or Bidder's attention is called to the "Equal Opportunity Clause" and the "Standard Federal Equal Employment Opportunity Construction Contract Specifications" set forth herein.
- B. The goals and timetables for minority and female participation, expressed in percentage terms for the Contractor's aggregate workforce in each trade on all construction work in the covered area, are as follows:

Goals for minorityGoals forparticipation inparticipationeach tradeeach trade						
23.6%	6.9%					
	participation in each trade					

These goals are applicable to all the Contractor's construction work (whether or not it is Federal or federally assisted) performed in the covered area. If the contractor performs construction work in a geographical area located outside of the covered area, it shall apply the goals established for such geographical area where the work is actually performed. With regard to this second area, the contractor also is subject to the goals for both its federally involved and nonfederally involved construction.

The Contractor's compliance with the Executive Order 11246, as amended, and the regulations in 41 CFR Part 60-4 shall be based on its implementation of the Equal Opportunity Clause, specific affirmative action obligations required by the specifications set forth in 41 CFR 60-4.3(a), and its efforts to meet the goals established for the geographical area where the contract resulting from this solicitation is to be performed. The hours of minority and female employment and training must be substantially uniform throughout the length of the contract, and in each trade, and the contractor shall make a good faith effort to employ minorities and women evenly on each of its projects. The transfer of minority or female employees or trainees from Contractor to Contractor or from project to project for the sole purpose of meeting the Contractor's goals shall be a violation of the contract, the Executive Order and the regulations in 41 CFR Part 60-4. Compliance with the goals will be measured against the total work hours performed.

C. As used in this Notice, and in the contract resulting from this solicitation, the "covered area" is the boundaries of the County of *Sussex*, Virginia, in which the project area is located.

# **3.** Standard Federal Equal Employment Opportunity Construction Contract Specifications (Executive Order 11246).

(Applicable to all contracts/subcontracts in excess of \$10,000)

- A. As used in these specifications:
  - (1) "Covered area" means the geographical area described in the solicitation from which this contract resulted;
  - (2) "Director" means Director, Office of Federal Contract Compliance Programs, United States Department of Labor, or any person to whom the Director delegates authority;
  - (3) "Employer identification number" means the Federal Social Security number used on the Employer's Quarterly Federal Tax Return, U.S. Treasury Department Form 941.
  - (4) "Minority" includes:
    - Black (all persons having origins in any of the Black African racial groups not of Hispanic origin);
    - Asian or Pacific Islander (all persons having origins in any of the original peoples of the Far East, Southeast Asia, the Indian Subcontinent, or the Pacific Islands); and
    - American Indian or Alaskan Native (all persons having origins in any of the original peoples of North America and maintaining identifiable tribal affiliations through membership and participation or community identification).
    - Hispanic (all persons of Mexican, Puerto Rican, Cuban, Central or South American or other Spanish Culture or origin, regardless of race);
- B. Whenever the Contractor, or any Subcontractor at any tier, subcontracts a portion of the work involving any construction trade, it shall physically include in each subcontract in excess of \$10,000 the provisions of these specifications and the Notice which contains the applicable goals for minority and female participation and which is set forth in the solicitations from which this contract resulted.
- C. If the Contractor is participating (pursuant to 41 CFR 60-4.5) in a Hometown Plan approved by the U.S. Department of Labor in the covered area either individually or through an association, its affirmative action obligations on all work in the Plan area (including goals and timetables) shall be in accordance with that Plan for those trades which have unions participating in the Plan. Contractors must be able to

demonstrate their participation in and compliance with the provisions of any such Hometown Plan. Each Contractor or Subcontractor participating in an approved Plan is individually required to comply with its obligations under the EEO clause, and to make a good faith effort to achieve each goal under the Plan in each trade in which it has employees. The overall good faith performance by other Contractors or Subcontractors toward a goal in an approved Plan does not excuse any covered Contractor's or Subcontractor's failure to take good faith efforts to achieve the Plan goals and timetables.

- D. The Contractor shall implement the specific affirmative action standards provided in paragraphs g (1) through (16) of these specifications. The goals set forth in the solicitation from which this contract resulted are expressed as percentages of the total hours of employment and training of minority and female utilization the Contractor should reasonably be able to achieve in each construction trade in which it has employees in the covered area. Covered Construction Contractors performing construction work in geographical areas where they do not have a Federal or federally assisted construction contract, shall apply the minority and female goals established for the geographical area where the work is being performed. Goals are published periodically in the Federal Register in notice form, and such notices may be obtained from any Office of Federal Contract Compliance Programs office or from Federal procurement contracting officers. The Contractor is expected to make substantially uniform progress in meeting its goals in each craft during the period specified.
- E. Neither the provisions of any collective bargaining agreement, nor the failure by a union with whom the Contractor has a collective bargaining agreement, to refer either minorities or women shall excuse the Contractor's obligations under these specifications, Executive Order 11246, or the regulations promulgated pursuant thereto.
- F. In order for the nonworking training hours of apprentices and trainees to be counted in meeting the goals, such apprentices and trainees must be employed by the Contractor during the training period, and the Contractor must have made a commitment to employ the apprentices and trainees at the completion of their training, subject to the availability of employment opportunities. Trainees must be trained pursuant to training programs approved by the U. S. Department of Labor.
- G. The Contractor shall take specific affirmative actions to ensure equal employment opportunity. The evaluation of the Contractor's compliance with these specifications shall be based upon its effort to achieve maximum results from its action. The Contractor shall document these efforts fully, and shall implement affirmative action steps at least as extensive as the following:
  - (1) Ensure and maintain a working environment free of harassment, intimidation, and coercion at all sites, and in all facilities at which the Contractor's employees are assigned to work. The Contractor, where possible, will assign

two or more women to each construction project. The Contractor shall specifically ensure that all foremen, superintendents, and other on-site supervisory personnel are aware of and carry out the Contractor's obligation to maintain such a working environment, with specific attention to minority or female individuals working at such sites or in such facilities.

- (2) Establish and maintain a current list of minority and female recruitment sources, provide written notification to minority and female recruitment sources and to Community organizations when the Contractor or its unions have employment opportunities available, and maintain a record of the organizations' responses.
- (3) Maintain a current file of the names, addresses and telephone numbers of each minority and female off-the-street applicant and minority or female referral from a union, a recruitment source or community organization, and of what action was taken with respect to each such individual. If such individual was sent to the union hiring hall for referral and was not referred back to the Contractor by the union or, if referred, not employed by the Contractor, this shall be documented in the file with the reason therefore, along with whatever additional actions the Contractor may have taken.
- (4) Provide immediate written notification to the Director when the union or unions with which the Contractor has a collective bargaining agreement has not referred to the Contractor a minority person or woman sent by the Contractor, or when the Contractor has other information that the union referral process has impeded the Contractor's efforts to meet its obligations.
- (5) Develop on-the-job training opportunities and/or participate in training programs for the area which expressly include minorities and women, including upgrading programs and apprenticeship and trainee programs relevant to the Contractor's employment needs, especially those programs funded or approved by the Department of Labor. The Contractor shall provide notice of these programs to the sources compiled under G (2) above.
- (6) Disseminate the Contractor's EEO policy by providing notice of the policy to unions and training programs and requesting their cooperation in assisting the Contractor in meeting its EEO obligations; by including it in any policy manual and collective bargaining agreement; by publicizing it in the company newspaper, annual report, etc. ; by specific review of the policy with all management personnel and with all minority and female employees at least once a year; and by posting the company EEO policy on bulletin boards accessible to all employees at each location where construction work is performed.
- (7) Review, at least annually, the company's EEO policy and affirmative action obligations under these specifications with all employees having any

responsibility for hiring, assignment, layoff, termination or other employment decisions including specific review of these items with onsite supervisory personnel such as Superintendents, General Foremen, etc., prior to the initiation of construction work at any job site. A written record shall be made and maintained identifying the time and place of these meetings, persons attending, subject matter discussed, and disposition of the subject matter.

- (8) Disseminate the Contractor's EEO policy externally by including it in any advertising in the news media, specifically including minority and female news media, and providing written notification to and discussing the Contractor's EEO policy with other Contractors and Subcontractors with whom the Contractor does or anticipates doing business.
- (9) Direct its recruitment efforts, both oral and written, to minority, female and community organizations, to schools with minority and female students and to minority and female recruitment and training organizations serving the Contractor's recruitment area and employment needs. Not later than one month prior to the date for the acceptance of applications for apprenticeship or other training by any recruitment source, the Contractor shall send written notification to organizations such as the above, describing the openings, screening procedures, and tests to be used in the selection process.
- (10) Encourage present minority and female employees to recruit other minority persons and women and, where reasonable, provide after school, summer and vacation employment to minority and female youth both on the site and in other areas of a Contractor's work force.
- (11) Validate all tests and other selection requirements where there is an obligation to do so under 41 CFR Part 60-3.
- (12) Conduct, at least annually, an inventory and evaluation of all minority and female personnel for promotional opportunities and encourage these employees to seek or to prepare for, through appropriate training, etc., such opportunities.
- (13) Ensure that seniority practices, job classifications, work assignments and other personnel practices, do not have a discriminatory effect by continually monitoring all personnel and employment related activities to ensure that the EEO policy and the Contractor's obligations under these specifications are being carried out.
- (14) Ensure that all facilities and company activities are nonsegregated except that separate or single-user toilet and necessary changing facilities shall be provided to assure privacy between the sexes.

- (15) Document and maintain a record of all solicitations of offers for subcontracts from minority and female construction contractors and suppliers, including circulation of solicitations to minority and female contractor associations and other business associations.
- (16) Conduct a review, at least annually, of all supervisors' adherence to and performance under the Contractor's EEO policies and affirmative action obligations.
- H. Contractors are encouraged to participate in voluntary associations which assist in fulfilling one or more of their affirmative action obligations [g(1) through (16)]. efforts of contractor association, joint contractor-union, The a contractor-community, or other similar group of which the contractor is a member and participant, may be asserted as fulfilling any one or more of its obligations under g(1) through (16) of these Specifications provided that the contractor actively participates in the group, makes every effort to assure that the group has a positive impact on the employment of minorities and women in the industry, ensures that the concrete benefits of the program are reflected in the Contractor's minority and female workforce participation, makes a good faith effort to meet its individual goals and timetables, and can provide access to documentation which demonstrates the effectiveness of actions taken on behalf of the Contractor. The obligation to comply, however, is the Contractor's and failure of such a group to fulfill an obligation shall not be a defense for the Contractor's noncompliance.
- I. A single goal for minorities and a separate rate single goal for women have been established. The Contractor, however, is required to provide equal employment opportunity and to take affirmative action for all minority groups, both male and female, and all women, both minority and non-minority. Consequently, the Contractor may be in a violation of the Executive Order if a particular group is employed in a substantially disparate manner (for example, even through the Contractor has achieved its goals for women generally, the Contractor may be in violation of the Executive Order if a specific minority group of women is underutilized).
- J. The Contractor shall not use the goals and timetables or affirmative action standards to discriminate against any person because of race, color, religion, sex, or national origin.
- K. The Contractor shall not enter into any Subcontract with any person or firm debarred from Government contracts pursuant to Executive Order 11246, as amended.
- L. The Contractor shall carry out such sanctions and penalties for violation of these specifications and of the Equal Opportunity Clause, including suspension, termination and cancellation of existing subcontracts as may be imposed or ordered pursuant to Executive Order 11246, as amended, and its implementing regulations,

by the Office of Federal Contract Compliance Programs. Any Contractor who fails to carry out such sanctions and penalties shall be in violation of these specifications and Executive Order 11246, as amended.

- M. The Contractor, in fulfilling its obligations under these specifications, shall implement specific affirmative action steps, at least as extensive as those standards prescribed in paragraph g of these specifications, so as to achieve maximum results from its efforts to ensure equal employment opportunity. If the Contractor fails to comply with the requirements of the Executive Order, the implementing regulations, or these specifications, the Director shall proceed in accordance with 41 CFR 60-4.8.
- N. The Contractor shall designate a responsible official to monitor all employment related activity to ensure that the company EEO policy is being carried out, to submit reports relating to the provisions hereof as may be required by the Government and to keep records. Records shall at least include for each employee the name, address, telephone numbers, construction trade, union affiliation if any, employee identification number when assigned, social security number, race, sex, whether age is greater than 62 years, status (e.g., mechanic, apprentice trainee, helper, or laborer), dates of changes in status, hours worked per week in the indicated trade, rate of pay, and locations at which the work was performed. Records shall be maintained in any easily understandable and retrievable form; however, to the degree that existing records satisfy this requirement, contractors shall not be required to maintain separate records.
- O. Nothing herein provided shall be construed as a limitation upon the application of other laws which establish different standards of compliance or upon the application of requirements for the hiring of local or other area residents e.g.; those under the Public Works Employment Act of 1977 and the Community Development Block Grant Program.

### Subpart D: Title VI of the Civil Rights Act Of 1964, As Amended

No person in the United States shall, on the ground of race, color or national origin, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving Federal financial assistance.

# Subpart E: Section 109 Of The Housing And Community Development Act Of 1974, As Amended

No person in the United States shall on the ground of race, color, national origin, or sex be excluded from participation in, be denied the benefits of or be subjected to discrimination under any program or activity funded in whole or in part with funds made available under this title.

Any prohibition against discrimination on the basis of age under the *Age Discrimination Act of* 1975 or with respect to an otherwise qualified handicapped individual as provided in *Section 504* of the Rehabilitation Act of 1973 shall also apply to any such program or activity.

### Subpart F: Section 3 Of The Housing And Urban Development Act Of 1968

(Applicable to all contracts/subcontracts in excess of \$100,000)

- A. The Section 3 covered Project Area for this PROJECT is designated as the boundaries of the County of *Sussex*, Virginia, in which the project area is located.
- B. The purpose of Section 3 is to ensure that employment and other economic opportunities generated by Housing and Urban Development assistance or HUD-assisted projects covered by Section 3, shall, to the greatest extent feasible, be directed to low- and very low-income persons, particularly persons who are recipients of HUD assistance for housing.
- C. The parties to this contract agree to comply with HUD's regulations in 24 CFR part 135, which implement Section 3. As evidenced by their execution of this contract, the parties to this contract certify that they are under no contractual or other impediment that would prevent them from complying with the part 135 regulations.
- D. The contractor agrees to send to each labor organization or representative of workers with which the contractor has a collective bargaining agreement or other understanding, if any, a notice advising the labor organization or workers' representative of the contractor's commitments under this Section 3 clause, and will post copies of the notice in conspicuous places at the work site where both employees and applicants for training and employment positions can see the notice. The notice shall describe the Section 3 preference, shall set forth minimum number and job titles subject to hire, availability of apprenticeship and training positions, the qualifications for each; and the name and location of the person(s) taking applications for each of the positions; and the anticipated date the work shall begin.
- E. The contractor agrees to include this Section 3 clause in every subcontract subject to compliance with regulations in 24 CFR part 135, and agrees to take appropriate action, as provided in an applicable provision of the subcontractor or in this Section 3 clause, upon a finding that the subcontractor is in violation of the regulations in 24 CFR part 135. The contractor will not subcontract with any subcontractor where the contractor has notice or knowledge that the subcontractor has been found in violation of the regulations in 24 CFR part 135.
- F. The contractor will certify that any vacant employment positions, including training positions, that are filled (1) after the contractor is selected but before the contract is executed, and (2) with persons other than those to whom the regulations of 24 CFR part

135 require employment opportunities to be directed were not filled to circumvent the contractor's obligations under 24 CFR part 135.

G. Noncompliance with HUD's regulations in 24 CFR part 135 may result in sanctions, termination of this contract for default, and debarment or suspension from future HUD assisted contracts.

### Subpart G: Opportunities For Minority And Female-Owned Businesses

The work covered by this CONTRACT is subject to the provisions of OMB Part 85, Attachment 0 which requires that minority and female-owned businesses be solicited whenever they are sources of supplies, equipment, construction and services on federally funded projects.

- A. In procuring supplies, equipment, construction and services, the CONTRACTOR and all SUBCONTRACTORS will contact those appropriate minority and female-owned firms provided by the PUBLIC BODY on its solicitation list and provide such firms reasonable opportunities to compete for procurement contracts.
- B. The CONTRACTOR shall keep a complete and accurate record of all procurement of greater than ten thousand dollars (\$10,000) made in the execution of the PROJECT. Such record shall be on a form provided by the PUBLIC BODY and shall be submitted to the PUBLIC BODY no less than every thirty (30) days.

### Subpart H: Compliance With Air And Water Acts

(Applicable to all contracts/subcontracts in excess of \$100,000)

In compliance with Section 306 of the Clean Air Act, as amended, (42 USC 1857(h)), Section 508 of the Clean Water Act, as amended, (33 USC 1368), Executive Order 11738, and the regulations (40 CFR, Part 15) of the Environmental Protection Agency with respect thereto the Contractor agrees that:

- A. Any facility to be utilized in the performance of this contract or any subcontract shall not be a facility listed on the EPA List of Violating Facilities pursuant to 40 CFR 15.20.
- B. He will comply with all requirements of Section 306 of the Clean Air Act, as amended, and Section 508 of the Clean Water Act, as amended, and all regulations and guidelines issued thereunder.
- C. He will promptly notify the PUBLIC BODY of any notification received from the Director, Office of Federal Activities, EPA, indicating that a facility utilized or to be utilized for the contract is under consideration to be listed on the EPA List of Violating Facilities.

D. He will include or cause to be included the provisions of paragraph 1 through 4 of this subpart in every nonexempt subcontract and that he will take such action as the Government may direct as a means of enforcing such provisions.

### Subpart I: Lead-Based Paint Hazards

The construction or rehabilitation of residential structures is subject to the HUD Lead-Based Paint regulations, 24 CFR Part 35, issued pursuant to the Lead-Based Paint Poisoning Prevention Act, Public Law 91-695, 84 Stat. 2078, as amended by Public Law 93-151 and Public Law 94-317 (42 U.S.C. 4801).

- A. The CONTRACTOR and SUBCONTRACTORS shall not use lead-based paint in residential structures and shall eliminate any lead-based paint hazards in residential structures rehabilitated.
- B. The PUBLIC BODY shall be responsible for inspections and certifications required under Section 35.24.

### Subpart J: Immigration Reform And Control Act Of 1986

The Contractor agrees by signing this contract that he/she does not and will not during the performance of this contract violate the provisions of the Federal Immigration Reform and Control Act of 1986, which prohibits employment of illegal aliens.

### Subpart K: Disclosure

All contractors and subcontractors shall complete a disclosure statement at the time of contract execution that discloses those persons who have an interest in the contract proceeds. Attach form follows this page.

### Subpart L: Access To Records And Construction Site

The PUBLIC BODY, the Inspector General of the United States, United States Department of Housing and Urban Development, United States Department of Labor, the General Accounting Office, and the Virginia Department of Housing and Community Development shall be permitted by the CONTRACTOR to have full access to, and right to examine any pertinent books, documents, papers and records and construction site of the CONTRACTOR involving transactions related to this CONTRACT, during the period of this PROJECT and for three (3)

years from the date of final payment or until all findings have been resolved to the satisfaction of the Commonwealth of Virginia.

# VIRGINIA COMMUNITY IMPROVEMENT GRANT CONTRACTOR'S DISCLOSURE REPORT

### All Requested Information must be provided

(Completed by all Developers, Contractors, Subcontractors or Consultants)

1.	Local Government Name								
2.	CDBG Contract Number	CDBG #							
3.	Project Name	. <u>.</u>							
3.	Name of Firm								
	President								
	Address								
	Telephone								
	DUNS#								
	Type of Contract (check app	plicable description)							
	Construction Prime		*Construction Sub						
	Design		Other Specify						
	Description of work or service provided:								
5.	Date this Report	and# of pages.							
6.	Revision to Report Date and # pages.								
*Note	: Housing Rehabilitation subo	contractors are not req	uired to be listed or to comp	olete					

this Report.

Interested Parties	If Firm is an entity, identify each officer, director, principal stockholder and other persons who will have a \$50,000 or 10% interest, whichever is lower.						
Name (Last, First, Initial).	Last 4 # of SS	Type Participation	\$ and %				

If there are no persons with a reportable financial interest, you must also certify that this is true.

I hereby certify this information is true.

(Signature)

Date \_\_\_\_\_

Title \_\_\_\_\_

### Certification

**Warning**: If you knowingly make a false statement on this form you may be subject to civil or criminal penalties under Section 1001 of Title 18 of the United States Code. In addition, any person who knowingly and materially violates any required disclosure of information including intentional non-disclosure is subject to a civil money penalty not to exceed \$10,000 for each violation.

**Note**: Please copy this page and attach additional pages as needed. Please indicate # of pages and date on cover.

"General Decision Number: VA20230196 01/06/2023

Superseded General Decision Number: VA20220196

State: Virginia

Construction Type: Highway

Counties: King William and Sussex Counties in Virginia.

HIGHWAY CONSTRUCTION PROJECTS (excluding tunnels, building structures in rest area projects & railroad construction; bascule, suspension & spandrel arch bridges designed for commercial navigation, bridges involving marine construction; and other major bridges).

Note: Contracts subject to the Davis-Bacon Act are generally required to pay at least the applicable minimum wage rate required under Executive Order 14026 or Executive Order 13658. Please note that these Executive Orders apply to covered contracts entered into by the federal government that are subject to the Davis-Bacon Act itself, but do not apply to contracts subject only to the Davis-Bacon Related Acts, including those set forth at 29 CFR 5.1(a)(2)-(60).

If the contract is entered into on or after January 30, 2022, or the contract is renewed or extended (e.g., an option is exercised) on or after January 30, 2022:	<pre> . Executive Order 14026   generally applies to the   contract.  . The contractor must pay   all covered workers at   least \$16.20 per hour (or   the applicable wage rate   listed on this wage   determination, if it is   higher) for all hours   spent performing on the   contract in 2023.</pre>
If the contract was awarded on or between January 1, 2015 and January 29, 2022, and the contract is not renewed or extended on or after January 30, 2022:	

The applicable Executive Order minimum wage rate will be adjusted annually. If this contract is covered by one of the Executive Orders and a classification considered necessary for performance of work on the contract does not appear on this wage determination, the contractor must still submit a conformance request.

Additional information on contractor requirements and worker protections under the Executive Orders is available at http://www.dol.gov/whd/govcontracts.

### Modification Number Publication Date

0 01/06/2023

ELEC0080-011 12/01/2021

	Rates	Fringes
ELECTRICIAN, Includes Trai	ffic	
Signalization\$	30.55	11.51

SUVA2016-081 07/02/2018

	Rates	Fringes				
CARPENTER, Includes Form Work	\$ 19.22	0.00				
CEMENT MASON/CONCRETE FINISHER	.\$ 16.03 **	0.00				
IRONWORKER, REINFORCING	\$ 20.80	0.00				
IRONWORKER, STRUCTURAL	.\$ 27.38	0.00				
LABORER: Asphalt, Includes						
Raker, Shoveler, Spreader and						
Distributor	\$ 19.21	2.82				
LABORER: Common or General	\$ 15.47 **	0.00				
LABORER: Grade Checker	.\$ 14.88 **	0.00				

LABORER: Pipelayer	\$ 17.76	0.00
LABORER: Power Tool Operator	\$ 15.69 **	0.00
OPERATOR:		
Backhoe/Excavator/Trackhoe	\$ 18.31	2.91
OPERATOR: Bobcat/Skid		
Steer/Skid Loader	\$ 19.16	4.45
OPERATOR: Broom/Sweeper	\$ 17.40	2.01
OPERATOR: Crane	\$ 24.42	4.69
OPERATOR: Drill	\$ 24.66	0.00
OPERATOR: Gradall	\$ 19.26	0.00
OPERATOR: Grader/Blade	\$ 23.21	0.00
OPERATOR: Hydroseeder	\$ 16.64	0.00
OPERATOR: Loader	\$ 17.17	0.00
OPERATOR: Mechanic	\$ 21.43	0.00
OPERATOR: Milling Machine	\$ 23.12	3.60
OPERATOR: Paver (Asphalt,		
Aggregate, and Concrete)	\$ 20.32	0.00
OPERATOR: Piledriver	\$ 21.83	4.08
OPERATOR: Roller (Finishing)	\$ 19.05	1.29
OPERATOR: Roller	\$ 21.69	0.00
OPERATOR: Screed	\$ 22.13	4.89
OPERATOR: Asphalt Spreader		
and Distributor	.\$ 19.09	1.81
OPERATOR: Bulldozer,		
Including Utility	\$ 18.22	2.69
TRAFFIC CONTROL: Flagger	\$ 12.89 **	0.00
TRUCK DRIVER : HEAVY 7CY &		

UNDER	\$ 15.53 **	0.00
TRUCK DRIVER: Fuel and		
Lubricant Service	.\$ 18.25	0.00
TRUCK DRIVER: HEAVY OVER 7		
СҮ	\$ 16.98	0.00
TRUCK DRIVER: Single & Multi		
Axle	\$ 18.23	0.00

WELDERS - Receive rate prescribed for craft performing operation to which welding is incidental.

#### ------

\*\* Workers in this classification may be entitled to a higher minimum wage under Executive Order 14026 (\$16.20) or 13658 (\$12.15). Please see the Note at the top of the wage determination for more information.

Note: Executive Order (EO) 13706, Establishing Paid Sick Leave for Federal Contractors applies to all contracts subject to the Davis-Bacon Act for which the contract is awarded (and any

solicitation was issued) on or after January 1, 2017. If this contract is covered by the EO, the contractor must provide employees with 1 hour of paid sick leave for every 30 hours they work, up to 56 hours of paid sick leave each year. Employees must be permitted to use paid sick leave for their own illness, injury or other health-related needs, including preventive care; to assist a family member (or person who is like family to the employee) who is ill, injured, or has other health-related needs, including preventive care; or for reasons resulting from, or to assist a family member (or person who is like family to the employee) who is a victim of, domestic violence, sexual assault, or stalking. Additional information on contractor requirements and worker protections under the EO is available at <a href="https://www.dol.gov/agencies/whd/government-contracts">https://www.dol.gov/agencies/whd/government-contracts</a>. Unlisted classifications needed for work not included within the scope of the classifications listed may be added after award only as provided in the labor standards contract clauses (29CFR 5.5 (a) (1) (ii)).

\_\_\_\_\_

The body of each wage determination lists the classification and wage rates that have been found to be prevailing for the cited type(s) of construction in the area covered by the wage determination. The

classifications are listed in alphabetical order of "identifiers" that indicate whether the particular rate is a union rate (current union negotiated rate for local), a survey rate (weighted average rate) or a union average rate (weighted union average rate).

### **Union Rate Identifiers**

A four letter classification abbreviation identifier enclosed in dotted lines beginning with characters other than "SU" or "UAVG" denotes that the union classification and rate were prevailing for that classification in the survey. Example:

PLUM0198-005 07/01/2014. PLUM is an abbreviation identifier of the union which prevailed in the survey for this classification, which in this example would be Plumbers. 0198 indicates the local union number or district council number where applicable, i.e., Plumbers Local 0198. The next number, 005 in the example, is an internal number used in processing the wage determination. 07/01/2014 is the effective date of the most current negotiated rate, which in this example is July 1, 2014.

Union prevailing wage rates are updated to reflect all rate changes in the collective bargaining agreement (CBA) governing this classification and rate.

### Survey Rate Identifiers

Classifications listed under the ""SU"" identifier indicate that no one rate prevailed for this classification in the survey and the published rate is derived by computing a weighted average rate based on all the rates reported in the survey for that classification. As this weighted average rate includes all rates reported in the survey, it may include both union and non-union rates. Example: SULA2012-007 5/13/2014. SU indicates the rates are survey rates based on a weighted average calculation of rates and are not majority rates. LA indicates the State of Louisiana. 2012 is the year of survey on which these classifications and rates are based. The next number, 007 in the example, is an internal number used in producing the wage determination. 5/13/2014 indicates the survey completion date for the classifications and rates under that identifier.

Survey wage rates are not updated and remain in effect until a new survey is conducted.

Union Average Rate Identifiers Classification(s) listed under the UAVG identifier indicate that no single majority rate prevailed for those classifications; however, 100% of the data reported for the classifications was union data. EXAMPLE: UAVG-OH-0010 08/29/2014. UAVG indicates that the rate is a weighted union average rate. OH indicates the state. The next number, 0010 in the example, is an internal number used in producing the wage determination. 08/29/2014 indicates the survey completion date for the classifications and rates under that identifier.

A UAVG rate will be updated once a year, usually in January of each year, to reflect a weighted average of the current negotiated/CBA rate of the union locals from which the rate is based.

-----

#### WAGE DETERMINATION APPEALS PROCESS

- 1.) Has there been an initial decision in the matter? This can be:
- \* an existing published wage determination
- \* a survey underlying a wage determination
- \* a Wage and Hour Division letter setting forth a position on a wage determination matter
- \* a conformance (additional classification and rate) ruling

On survey related matters, initial contact, including requests for summaries of surveys, should be with the Wage and Hour National Office because National Office has responsibility for the Davis-Bacon survey program. If the response from this initial contact is not satisfactory, then the process described in 2.) and 3.) should be followed.

With regard to any other matter not yet ripe for the formal process described here, initial contact should be with the Branch of Construction Wage Determinations. Write to:

Branch of Construction Wage Determinations Wage and Hour Division U.S. Department of Labor 200 Constitution Avenue, N.W. Washington, DC 20210

2.) If the answer to the question in 1.) is yes, then an interested party (those affected by the action) can request review and reconsideration from the Wage and Hour Administrator (See 29 CFR Part 1.8 and 29 CFR Part 7). Write to:

Wage and Hour Administrator U.S. Department of Labor 200 Constitution Avenue, N.W. Washington, DC 20210

The request should be accompanied by a full statement of the interested party's position and by any information (wage payment data, project description, area practice material, etc.) that the requestor considers relevant to the issue.

3.) If the decision of the Administrator is not favorable, an interested party may appeal directly to the Administrative Review Board (formerly the Wage Appeals Board). Write to:

Administrative Review Board U.S. Department of Labor 200 Constitution Avenue, N.W. Washington, DC 20210

4.) All decisions by the Administrative Review Board are final.

END OF GENERAL DECISION

# **Explanation of Payroll Record (Form WH-347)**

What It Is Used For:	The contractor and subcontractors submit their weekly Payroll Report to the Grantee each week or part of a week in which there are employees assigned to the project. All workers assigned that week MUST be included.
When It Is Used:	During the construction phase of the project.
Where It Goes:	In the Grantee's Labor Standards project file.
General Instructions:	The Grantee must review each Payroll Report to assure that the Contractor and all subcontractors are complying with <i>Davis-Bacon Act, Contract Work Hours and Standards Act,</i> and <i>Copeland</i> " <i>Anti-Kickback</i> " <i>Act</i> requirements. Payroll records must be verified by field inspections (See Appendix 51 for Record of <i>Employee Interview</i> form) and checked against the <i>Register of Assigned Employees</i> (See Appendix 54 for form).

Form Instructions:

### PAYROLL REPORT

Contractor or Subcontractor: Fill in your firm's name and check appropriate box.

Address: Fill in your firm's address.

**Payroll No.:** Beginning with the number "1", list the payroll number for the submission.

For Week Ending: List the workweek ending date.

Project and Location: List the project's name as found on the CDBG Agreement.

Project or Contract No.: List the project's CIG number.

**Column 1 - Name and Individual Identifying Number of Worker:** Enter each worker's full name and an individual identifying number on each weekly payroll submitted e. g.; the last four digits of the employee's Social Security number (SSN). Full SNN shall ot be included on the payroll. Employers must maintain the current address and full SSN for each employee and must provide this information upon request to the Grantee and DHCD.

**Column 2 - No. of Withholding Exemptions:** This column is merely inserted for the employer's convenience and is not a requirement of Regulations, Part 3 and 5.

**Column 3 - Work Classifications:** List the classification as shown on the wage decision issued for this project. Consult classification and minimum wage schedule set forth in contract specifications. If additional classifications are deemed necessary, consult with your Grantee's Contract Compliance Officer. An individual may be shown as having worked in more than one classification provided an accurate breakdown or hours worked in each classification is maintained and shown on the submitted payroll by use of separate entries. When listing a sole proprietor/subcontractor on a payroll, a prime contractor should record the sole proprietor/subcontractor's information in the same manner as an employee.

**Column 4 - Hours worked:** List the day and date and straight time and overtime hours worked in the applicable boxes. On all contracts subject to the Contract Work Hours Standard Act, enter hours worked in excess of 40 hours a week as "overtime".

### Column 5 - Total: Self-explanatory

**Column 6 - Rate of Pay (Including Fringe Benefits):** In the "straight time" box for each worker, list the actual hourly rate paid for straight time worked, plus cash paid in lieu of fringe benefits paid. When recording the straight time hourly rate, any cash paid in lieu of fringe benefits may be shown separately from the basic rate. For example, "\$12.25/.40" would reflect a \$12.25 base hourly rate plus \$0.40 for fringe benefits. This is of assistance in correctly computing overtime. See "Fringe Benefits" below. When overtime is worked, show the overtime hourly rate paid plus any cash in lieu of fringe benefits paid in the "overtime" box for each worker; otherwise, you may skip this box. See "Fringe Benefits" below. Payment of not less than time and one-half the basic or regular rate paid is required for overtime under the Contract Work Hours Standard Act of 1962 if the prime contract exceeds \$100,000. In addition to paying no less than the predetermined rate for the classification which an individual works, the contract or must pay amounts predetermined as fringe benefits in the wage decision made part of the contract to approved fringe benefit plans, funds or programs or shall pay as cash in lieu of fringe benefits. See "FRINGE BENEFITS" below.

**Column 7 - Gross Amount Earned:** Enter gross amount earned on this project. If part of a worker's weekly wage was earned on projects other than the project described on this payroll, enter in column 7 first the amount earned on the Federal or Federally assisted project and then the gross amount earned during the week on all projects, thus "\$163.00/\$420.00" would reflect the earnings of a worker who earned \$163.00 on a Federally assisted construction project during a week in which \$420.00 was earned on all work.

**Column 8 - Deductions:** Five columns are provided for showing deductions made. An Employee Payroll Deduction Authorization must be provided for any deduction listed in the "Other" column. All deductions must be in accordance with the provisions of the Copeland Act Regulations, 29 C.F.R., Part 3. If an individual worked on other jobs in addition to this project,

show actual deductions from his/her weekly gross wage, and indicate that deductions are based on his gross wages.

### Column 9 - Net Wages Paid for Week: Self-explanatory.

**Totals** - Space has been left at the bottom of the columns so that totals may be shown if the contractor so desires.

**Submission of Payrolls** – Certified payroll reports may be submitted electronically, i.e., via the internet. However, the electronic signature/submission does not mean pdf files of signed payrolls attached to an email, or faxed copies of signed payrolls. These methods are comparable to photocopies and are not acceptable submissions.

### STATEMENT OF COMPLAINCE

**Statement Required by Regulations, Parts 3 and 5:** While the "statement of compliance" need not be notarized, the statement (on page 2 of the payroll form) is subject to the penalties provided by 18 U.S.C. § 1001, namely, a fine, possible imprisonment of not more than 5 years, or both. Accordingly, the party signing this statement should have knowledge of the facts represented as true.

**Items 1and 2:** Space has been provided between items (1) and (2) of the statement for describing any deductions made. If all deductions made are adequately described in the "Deductions" column above, state "*See* Deductions column in this payroll." *See* "FRINGE BENEFITS" below for instructions concerning filling out paragraph 4 of the statement.

**Item 4 FRINGE BENEFITS - Contractors who pay all required fringe benefits:** If paying all fringe benefits to approved plans, funds, or programs in amounts not less than were determined in the applicable wage decision of the Secretary of Labor, show the basic cash hourly rate and overtime rate paid to each worker on the face of the payroll and check paragraph 4(a) of the statement on page 2 of the WH-347 payroll form to indicate the payment. Note any exceptions in section 4(c).

**Contractors who pay no fringe benefits:** If not paying all fringe benefits to approved plans, funds, or programs in amounts of at least those that were determined in the applicable wage decision of the Secretary of Labor, pay any fringe benefit amount to each laborer and mechanic and insert in the "straight time" of the "Rate of Pay" column of the payroll an amount not less than the predetermined rate for each classification plus the amount of fringe benefits determined for each classification in the application wage decision. Inasmuch as it is not necessary to pay time and a half on cash paid in lieu of fringe benefits, the overtime rate shall be not less than the sum of the basic predetermined rate, plus the half time premium on basic or regular rate, plus the required cash in lieu of fringe benefits at the straight time rate. In addition, check paragraph 4(b) of the statement to indicate the payment of fringe benefits in cash directly to the workers. Note any exceptions in section 4(c).

### Use of Section 4(c), Exceptions

Any contractor who is making payment to approved plans, funds, or programs in amounts less than the wage determination requires is obliged to pay the deficiency directly to the covered worker as cash in lieu of fringe benefits. Enter any exceptions to section 4(a) or 4(b) in section 4(c). Enter in the Exception column the craft, and enter in the Explanation column the hourly amount paid each worker as cash in lieu of fringe benefits and the hourly amount paid to plans, funds, or programs as fringe benefits. The contractor must pay an amount not less than the predetermined rate plus cash in lieu of fringe benefits as shown in section 4(c) to each such individual for all hours worked (unless otherwise provided by applicable wage determination) on the Federal or Federally assisted project. Enter the rate paid and amount of cash paid in lieu of fringe benefits per hour in column 6 on the payroll. See paragraph on "Contractors who pay no fringe benefits" for computation of overtime rate.

Figure 16 If the wage decision(s) issued required no fringes to be paid, do not check off any of the boxes in Section 4. Make a note in the "Remarks" box that no fringes are required to be paid by the wage decision(s) issued.

		Persons alle not	/bquin	90 10 <b>1</b> 99	bond to t	ne cou	Denon				says acununi	y wand Can	is comporting	1100 C			Nev. Dec	. 2000
NAME OF CONTRACTOR OR SUBCONTR	ACTOR							ADO	RES	8							OMB No.: Expires: 0	1235-0008 14/30/2021
PAYROLL NO.		FOR WEEK ENDIN	NG					PR	DUEC	T AND LOCATI	ON				PROJECT	OR CONTRAC	T NO.	
(1)	(2) 9 9	(3)	F	6	4) DAY AM	ND DAT	E	(5	)	(8)	n			DED	(8) UCTIONS			(9)
NAME AND INDIVIDUAL IDENTIFYING NUMBER (e.g., LAST FOUR DIGTS OF SOCIAL SECURITY NUMBER) OF WORKER	NO. OF WITHOUT OF	WORK CLASSIFICATION	OT. OT 8	HOUR	S WORK	ED EAC		TOT	AL	RATE OF PAY	GROSS AMOUNT EARNED	FICA	WITH- HOLDING TAX			OTHER	TOTAL	NET WAGES PAID FOR WEEK
			۰							6. 7A		- nen				C'III C		
			s	_		$\bot$	$\square$		4		Ζ,							
			o s	+	$\vdash$	╋	$\left  \cdot \right $	_	┨									
			•	╈		╋	H		┫									
			s				Π				$\angle$							
			•	+			$\square$		4									
	+		•	+		╉	╞┼┨		┥		$\leftarrow$							
			s				Ħ		1									
			•						_									
	-		•	+		+	$\mathbb{H}$		┥									
			s				Ħ		1									
			۰						$\downarrow$									
			s															

U.S. Department of Labor

-

Wage and Hour Division

PAYROLL

(For Contractor's Optional Use; See Instructions at www.dol.gov/whd/forms/wh347instr.htm)

contractor s'opuonar ose, see insulucions at www.uor.gov/white/onis/whise/insularity

While completion of Form WH-347 is optional, it is mandatory for covered contractors and subcontractors performing work on Federally financed or assisted construction contracts to respond to the information collection contractors performing work on Federally financed or assisted construction contracts to respond to the information collection contractors performing work on Federally financed or assisted construction contracts to respond to the information collection contractors performing work on Federally financed or assisted construction contractors to respond to the information collection contractors performing work on Federally financed or assisted construction contracts to the wages paid each employee during the preceding week." U.S. Department of Labor (JCL) regulated on at 29 C.F.R. § 55(a)(3)(i) regular contractors to submit weekly a copy of all payrolls to the Federal agency contracting for or financing the construction project, accompanied by a signed "Statement" information contracts to submit weekly a copy of all payrolls to the Federal agency contracting for or financing the construction project, accompanied by a signed "Statement of Compliance" industry that each laborar or mechanic has been paid not less than the proper Davis-Bacon prevailing wage rate for the work performed. DOL and federal contracting agencies received logally required weagen and finge benefits.

Public Burden Statement

We estimate that is will take an average of 55 minutes to complete this collection, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. If you have any comments regarding these estimates or any other aspect of this collection, including suggestions for reducing this burden, send them to the Administrator, Wage and Hour Division, U.S. Department of Labor, Room 83502, 200 Constitution Avenue, N.W. Weshington, D.C. 20210

(over)



Date	
(Name of Signatory Party)	(Title)
o hereby state:	
(1) That I pay or supervise the payment of the pa	ersons employed by
(Contractor or Subco	on the
•	,
(Building or Work)	; that during the payroll period commencing on the
	nding the day of ,,
	d the full weekly wages earned, that no rebates have
	from the full
(Contractor or Sub	
I3 Start. 108, 72 Stat. 967; 76 Stat. 357; 40 U.Ś.C. §	o roy, and described below.
correct and complete; that the wage rates for laborers	act required to be submitted for the above period are s or mechanics contained therein are not less than the termination incorporated into the contract; that the chanic conform with the work he performed.
pprenticeship program registered with a State a	above period are duly registered in a bona fide pprenticeship agency recognized by the Bureau of nt of Labor, or if no such recognized agency exists in a p and Training, United States Department of Labor.
(4) That:	

(a) WHERE FRINGE BENEFITS ARE PAID TO APPROVED PLANS, FUNDS, OR PROGRAMS

in addition to the basic hourly wage rates paid to each laborer or mechanic listed in the above referenced payroll, payments of fringe benefits as listed in the contract have been or will be made to appropriate programs for the benefit of such employees, except as noted in section 4(c) below. (b) WHERE FRINGE BENEFITS ARE PAID IN CASH

Each laborer or mechanic listed in the above referenced payroll has been paid, as indicated on the payroll, an amount not less than the sum of the applicable basic hourly wage rate plus the amount of the required fringe benefits as listed in the contract, except as noted in section 4(c) below.

#### (c) EXCEPTIONS

EXCEPTION (CRAFT)	EXPLANATION					
REMARKS:						
NAME AND TITLE	SIGNATURE					
THE WILLFUL FALSIFICATION OF ANY OF THE ABOVE STATEMENTS MAY SUBJECT THE CONTRACTOR OR SUBCONTRACTOR TO CIVIL OR CRIMINAL PROSECUTION. SEE SECTION 1001 OF TITLE 16 AND SECTION 231 OF TITLE 31 OF THE UNITED STATES CODE.						

## **CERTIFICATION OF SUBCONTRACTORS ON SITE**

(To Be Submitted As Part of Weekly Payroll Report)

I,		, the general co	ontractor	, hereby certify	
that the e	mploye	es denoted on attached payroll reports for the week e	ending		
/	/	represent <u>all</u> employees that worked on CIG#	-	project for	
(insert Grantee's Name), including employee					

subcontractors.

Name and Title

	/	/		_
Date				

Names of Subcontractors That Worked On Project for This Pay Period.

## THIS PAGE INTENTIONALLY LEFT BLANK

## **EXPLANATION OF EMPLOYEE INTERVIEW FORM**

- What it is used for:To be used to interview project workers in order to determine that the<br/>Contractor and all subcontractors are complying with Davis-Bacon Act,<br/>Contract Work Hours and Standards Act, and Copeland "Anti-Kickback"<br/>Act requirements. It is used as a test against payroll information. It is also<br/>used to verify compliance with Section 3 requirements.
- *When It Is Used:* During the construction phase of the project.
- Where It Goes: Grantee's Labor Standards project file.
- General Instructions: Employees should be selected for interviews either at random or on the basis of suspected irregularities as determined through the site visit or Payroll Reports. The number of interviews necessary is determined by the size of the Project. A minimum of at least one worker per trade and 25% of the total number of workers must be interviewed. Interviews must be conducted during construction a minimum of once a month to determine the Contractor's compliance with the aforementioned federal requirements. Interviews must take place during the times in which each subcontract is being performed to assure that all trades are covered. This may mean that interviews will have to be conducted during or weekend hours.

Form Instructions:	Items 1a - 1c: Self-explanatory
	Items $2a - 2d$ : Enter the employee's full name, a telephone number where the employee can be reached, and the employee's home address. Many construction workers use a temporary address in the locality of the project and have a more permanent address elsewhere from which mail may be forwarded to them. Obtain a more permanent address, if available.
	Items $3a - 4c$ : Enter the employee's responses. Ask the employee whether they have a pay stub with them; if so, determine whether the pay stub is consistent with the information provided by the employee.
	Items $5-7$ : Try to get specific responses from the employee so it is easier to verify that the work observed is consistent with the job classification listed on the payroll report. For example, the job

classification (#5) must identify the trade involved e.g.; Carpenter, Electrician, Plumber, etc.

Items 8 - 12b: Self-explanatory. If the employee will not sign the form, just note it in the appropriate box

Items 13 – 15c: These items represent some of the most important information that can be gathered while conducting on-site interviews. Please be specific about the duties you observed the employee performing. It may be easiest to make these observations before initiating the interview. Please record any comments or remarks that may be helpful. For example, if the employee interviewed was working with a crew, how many workers were in the crew? What activities was the employee doing e.g.; dumping gravel, laying down pipe, connecting pipe in a ditch, etc. What tools and pieces of equipment was the employee using e.g.; shovel, level, pipe, pry bar, etc.

The level of specificity that is warranted is directly related to the extent to which interview(s) or other observations indicate that there may be violations present. If interviews indicate that there may be underpayments involving a particular trade(s), the interviewer is encouraged to interview as many workers in that trade(s) that are available.

Items 16 - 17b: The information on the form may be reviewed for general compliance, initially. For example, are the job classification and wage rate stated by the employee compatible with the classifications and wage rates on the applicable wage decision? Are the duties observed by the interviewer consistent with the job classification?

After completion of the interview the Contract Compliance Officer **must** note on the form whether the employee's statements were consistent and whether they verified what was observed.

The Contract Compliance Officer must cross reference the information on the Record of Employee Interview form with information from the Contractor's weekly Payroll Report, the Register of Assigned Employees, and the Wage Decision, indicating so by filling out the bottom part of the form. Appropriate action must be initiated to clear any discrepancies and questionable items.

Call your Community Representative for a copy of the *Record of Employee Interview* instructions in Spanish.

R

### Record of Employee Interview

#### U.S. Department of Housing and Urban Development Office of Labor Relations

The information is collected to ensure compliance with the Federal labor standards by recording interviews with construction workers. The information collected will assist HUD in the conduct of compliance monitoring; the information will be used to test the veracity of certified payroll reports submitted by the employer. The information collected on this form is considered sensitive and is protected by the Privacy Act. The Privacy Act requires that these records be maintained with appropriate administrative, technical, and physical safeguards to ensure their security and confidentiality. In addition, these records should be protected against any anticipated threats or hazards to their security or integrity that could result in substantial harm, embarrassment, inconvenience, or unfairness to any individual on whom the information is maintained.

1a. Project Name				2a. Employee Name					
1b. Project Number				2b. Employee Phone Number (including area code)					
1c. Contractor or Sub	contractor (Employer)		2c.	Employee Home Add	dress & Zip Code				
			24	2d. Verification of identification?					
			Yes						
3a. How long on this	3b. Last date on this	3c. No. of hours		Hourly rate of pay?	4b. Fringe Bene	efits?		4c. Pay s	tub?
job?	job before today?	day on this job?			Vacation Ye	s	No 🗌	Yes	No
					Medical Ye	s 🗌	No 🗌		
					Pension Ye	s 🗌	No 🗌		
5. Your job classificati	on(s) (list all) continue	on a separate she	et if necessar	y	1			I	
6. Your duties									
7. Tools or equipment	used								
	Y	N		at time and 1/ fam all	have we had in a			Y	
8. Are you an apprenti				st time and ½ for all					
9. Are you paid for all h		11. Have		en threatened or coer	rced into giving up	any par	t of your pay's	<u> </u>	
12a. Employee Signature				Date					
12 Dution observed b	y the Interviewer (Please	ha anagifia )							
13. Dulles observed b	y the interviewer (Please	be specific.)							
14. Remarks									
15a. Interviewer name (please print)15b. Sig			5b. Signature	e of Interviewer		15c. I	Date of interv	iew	
Payroll Exami	nation								
16. Remarks									
17a. Signature of Pa	vroll Examiner			17b. Date					
Previous editions are ob	osolete						Form HUD-11	(08/2004)	
									(

### Historial de Entrevista del Empleado

#### Departamento de Vivienda y Desarrollo Urbano de EE.UU. Oficina de Relaciones Laborales

La información que se recopila tiene la finalidad de garantizar la conformidad a las normas laborales Federales mediante entrevistas con obreros de construcción. La información recopilada asistirá a HUD a conducir el monitoreo de conformidad; la información se usará para examinar la veracidad de los informes de nómina certificados presentados por el patrón. La Ley de Privacidad requiere que estos archivos se mantengan con salvaguardas administrativos, técnicos, y físicos apropiados para garantizar su seguridad y confidencialidad. Además, estos archivos deberán ser protegidos contra cualquier amenaza anticipada o riesgos a su seguridad o integridad, que podría causar daño sustancial, vergüenza, inconveniencias, o injusticias a cualquier individuo de quien se mantiene la información. La información recopilada aquí es voluntaria y cualquier información proporcionada será mantenida como confidencial.

1a. Nombre del proyecto			2a. Nombre del empleado				
1b. Número del proyecto			2b. Número de teléfono del empleado (incluso prefijo local)				
1c. Contratista o subcontratista (Patrón)			2c. Dirección residencial del empleado y código postal				
			2d. ¿Verificación de identificación? Sí No				
3a. ¿Cuánto tiempo en este trabajo?	3b. ¿Último día en este trabajo antes de hoy?	3c. ¿No. de horas en su ultimo día en este trabajo?	4a. ¿Salario por hora?	4b. ¿Beneficios complementarios         Vacaciones       Sí         Médicos       Sí         Pensión       Sí	s? 4c. ¿Talonario de paga? Sí No		
5. Clasificación(es) de	e su trabajo(s) (enumere te	odas) continúe en una	página separada si es nece	esario			
6. Sus deberes							
7. Herramientas o equ	lipo usado						
8. ¿Es aprendiz? 9. ¿Le pagan todas las trabajadas?	s horas	horas semanale	s?	or todas las horas trabajadas superio rcionado a entregar parte de su pag			
12a. Firma del emplea	ado		12b. Fecha				
13. Deberes observad	los por el entrevistador (P	or favor sea específico.)	I				
14. Comentarios							
15a. Nombre del entre	evistador (use letra de imp	prenta) 15b. Fir	ma del entrevistador	15c. Fecha de	la entrevista		
Examinación o	de Nómina						
16. Comentarios							
17a. Firma del exami	inador de nómina		17b. Fecha				

# SIGN SPECIFICATIONS

DHCD requires that a project sign be installed within ninety (90) days of the execution of the CDBG Agreement, regardless if the first activity is a housing rehabilitation or an infrastructure activity.

At a minimum, the sign must identify the locality and project name. If known, the sign should also identify the architect/engineer and contractor. The Virginia Department of Housing and Community Development must be identified by name, logo and amount of funding.

Dimensions are as per attached schematic. Material can be plywood or other firm material that will withstand wind and moisture without warping

### The sign should be erected perpendicular to the adjacent road

Sign may be painted front and back if community desires. The background should be white. The lettering should be a medium shade of blue (such as royal); PMS = Pantone 285 U.

8' O" PROJECT NAME GOES HERE USUALLY TWO LINES Contractor Name Here Contractor Town Name Here Engineer Firm Name Here Engineer Town Name Here 4' 0" Funded by The Virginia Department of Housing and Community Development /IRGINI/ Through the **Community Development Block Grant Program** Hardwood Edging 5' 0" 4 x 4 Post Finish Grade

An EPS version of DHCD's logo is available upon request.



# VIRGINIA DEPARTMENT OF HOUSING AND COMMUNITY DEVELOPMENT

Partners for Better Communities

Register of Assigned Employees       Month Covered:, 20 Date Completed:         Submit initial list of workforce prior to start of construction; update monthly throughout construction to show changes.								
SECTION I: Identification of Level of Submittal, see instructions on back of form								
(1) Grantee: <u>County of Sussex</u>	Grant #: <u>17-10</u>	Project Name:	Pocahontas Comm	unity Improvem	ent Project			
HIRING GOALS: <u>30%</u> (Section 3	<u>23.6 %</u> MINORITY <u>6.9</u> % FEMALE							
Prime Contractor		Contracted Amount \$						
(2) Subcontractor		Contracted Amount \$	8					
SECTION II: List all workers paid by this contract. For NEW HIRES: complete items 'a' thru 'h.' For MODIFICATIONS: complete only item 'a' and item(s) being modified. Update the Register to add new hires, rehires and changes to job classifications, rate of pay or authorized payroll deductions.								
a. NAME OF EMPLOYEE b. COUNTY OF RESIDENCE	c. TRADE & JOB CLASSIFICATION d. RATE OF PAY & BENEFITS	e. (1). DATE HIRED or e (2 f. AUTHORIZED PAYROLI		g. MINORITY	h. GENDER			
a.	с.	e (1)	or e(2)	yes	female			
b.	d.	f.		no	male			
a.	с.	e (1)	or e(2)	yes	female			
b.	d.	f.		no	male			
a.	с.	e (1)	or e(2)	yes	female			
b.	d.	f.		no	male			
a.	с.	e (1)	or e(2)	yes	female			
b.	d.	f.		no	male			

\*SECTION 3 RESIDENT – A resident of the area in which Section 3 covered assistance is expended, and who qualifies as a low- or very low-income person. SECTION 3 BUSINESS: - A business of the area in which 51% or more is owned by Section 3 Residents or 30% of employed staff are Section 3 Residents; or 25% of contracts committed to Section 3 Businesses

### THIS PAGE INTENTIONALLY LEFT BLANK

# **EXPLANATION OF REGISTER OF ASSIGNED EMPLOYEES**

- *What it is used for:* To document all procurements of more than \$10,000 (or more than \$1,000 if a housing rehabilitation project) made in a CDBG project. To track progress toward hiring goals. To assist in assuring compliance with Section 3 and Davis-Bacon and Related Acts.
- *When it is used*: To document the initial workforce and new hires, rehires and any changes in job classifications, rate of pay and authorized deductions throughout the construction process. It is updated on an ongoing basis.
- *Where it goes*: The Grantee files all reviewed and accepted Registers in their labor standards and equal opportunity project files.

Instructions:\*

- COMPLETE THE "Month Covered" AND "Date Completed" IN THE TOP RIGHT CORNER.
- The Local LMI (Section 3) Hiring Goal is always 30%. Insert the Minority and Female goals as found in the Transmittal of Wage Decision letter sent to the Chief Executive Official by the PMO Program Manager.
- ROUND CONTRACT AMOUNTS TO THE NEAREST DOLLAR.
- NEW HIRES are registered as such one time and only on the original submittal or for the month in which it occurred; DO NOT DUPLICATE 'NEW HIRES' ON SUBSEQUENT SUBMITTALS.
- RECALLED means a person who was off of the Company's payroll and is now back on the payroll. The person is treated as NEW HIRES except that the date recalled is entered in e (2). Subsequent recalls of any employees, whether originally listed as a 'new hire' or a 'recall' are treated as 'modifications,' see below.
- MODIFICATIONS affect ONLY the following items: (ONLY ITEM 'a' AND ITEM(S) BEING MODIFIED ARE COMPLETED FOR MODIFICATIONS.)
  - changes to employee's name, e.g. due to marriage (item a) (if change is to name, show both old and new name)
  - changes in trade and job classification (item c)
  - changes in rate of pay and benefits (item d)
  - o changes in authorized payroll deductions (item f)
  - a recall of an employee previously registered (item e (2).

<u>GRANTEE'S RESPONSIBILITIES</u>: For every procurement with a prime contractor, the Grantee must complete item (1) of SECTION I and supply the prime contractor with enough copies for the duration of the contract. After submission of the Register by its Prime, the Grantee must review the Register for completeness, accuracy and consistency with the *Monthly CDBG Register of Contractors, Subcontractors, and Suppliers* and the *Payroll Report*.

<u>PRIME CONTRACTOR'S RESPONSIBILITIES</u>: The Prime Contractor must submit this prior to start of construction and update it as necessary throughout the construction process. The Prime Contractor must use the forms supplied by the Grantee in which item (1) of Section I is already completed; item (2) remains blank. In SECTION II, the Prime Contractor completes items 'a' thru 'h' on 'new hires' and first time 'recalls', and only item 'a' and the item(s) being modified for modifications.

For every procurement with a subcontractor, the Prime Contractor should complete item (2) of SECTION I (item (1) is already completed on the form) and supply the subcontractor with enough copies for the duration of the

subcontract. The Prime Contractor must obtain this form from all of its subcontractors for submission to the Grantee.

<u>SUBCONTRACTOR'S RESPONSIBILITIES:</u> The Subcontractor must submit this prior to start of construction, update it as necessary throughout the construction process and submit it to the Prime Contractor.

The Subcontractor must use the forms supplied by the Prime Contractor in which Section I is already completed. In SECTION II, the Subcontractor completes items 'a' thru 'h' on 'new hires' and first time 'recalls'; and only item 'a' and the item(s) being modified for modifications.

Monthly CDBG Register of Contractors, Subcontractors and Suppliers       Month Covered:						
SECTION I: Identification of Level of Submittal, see instructions on back of form						
(1)       Grantee: County of Sussex       Grant #: 17 -10       Project Name: Pocahontas Community Improvement Project       Section 3 County*:Sussex         (2)       General Contractor       IRS# (or owner's SSN)         (3)       Subcontractor       IRS# (or owner's SSN)						
SECTION II: Details of Proc						
Choose one:	Name and Physical Address of Business, and IRS# (or owners' SSN)	Contract Description or Items Supplied	Amount of Contract or Purchase	Ownership of Business (check All that apply)		
XXX General Contractor Subcontractor Supplier	IRS# (or SSN):		\$	Minority-Owned Business      White American        Section 3 Business      Native** American        Female-Owned Business      Asian American        Not American Owned      Not American Owned		
General Contractor Subcontractor Supplier	IRS# (or SSN):		\$	Minority-Owned Business      White American        Section 3 Business      Native** American        Female-Owned Business      Asian American        Not American Owned      Not American Owned		
General Contractor         Subcontractor         Supplier	IRS# (or SSN):		\$	Minority-Owned Business      White American        Section 3 Business      African American        Section 3 Business      Mative** American        Female-Owned Business      Asian American        Not American Owned      Not American Owned		
General Contractor         Subcontractor         Supplier	IRS# (or SSN):		\$	Minority-Owned Business      African American        Section 3 Business      Native** American        Section 3 Business      Native** American        Female-Owned Business      Asian American        Not American Owned      Not American Owned		

\*SECTION 3 RESIDENT: - A resident of the area in which Section 3 covered assistance is expended, and who qualifies as a low- or very low-income person.

SECTION 3 BUSINESS: - A business of the area in which 51% or more is owned by Section 3 residents or 30% of employed staff are Section 3 residents or 25% of subcontracts are committed to Section 3 businesses. \*\*NATIVE AMERICAN: - American Indian/Alaskan Natives

Г

### THIS PAGE INTENTIONALLY LEFT BLANK

# EXPLANATION OF MONTHLY REGISTER OF CONTRACTORS, SUBCONTRACTORS AND SUPPLIERS

*What it is used for*: To document all procurements of more than \$10,000 made in a CDBG project. To assist in assuring compliance with Section 3 and Davis-Bacon and the Related Acts.

- *When it is used*: Procurements are registered as they occur or on a monthly basis prior to submittal. This form is compiled by the Grantee, the General Contractor, and each subcontractor per the instructions below for each month and part of month during the course of a contract.
- *Where it goes*: The Grantee files all reviewed and accepted submittals in their procurement and equal opportunity project files.
- *Instructions:* Complete the "Month Covered" and "Date Completed" in the top right corner.
  - ROUND CONTRACT AMOUNTS TO THE NEAREST DOLLAR.
  - RECORD THE PHYSICAL ADDRESS OF BUSINESS ONLY. P. O. Boxes and other mailing addresses are not acceptable.
  - A procurement is registered one time and only for the month in which it occurred; DO NOT DUPLICATE PROCUREMENTS ON SUBSEQUENT SUBMITTALS.

<u>GRANTEE'S RESPONSIBILITIES</u>: The Grantee should complete this form each month to register all applicable procurements with General Contractors, subcontractors and suppliers. For submittal to itself the Grantee completes line (1) of SECTION I; line (2) and (3) will be left blank. For every procurement with a General Contractor, the Grantee should complete lines (1) and (2) of SECTION I and supply the General Contractor with enough copies for the duration of the contract. After submission of the Register by its Prime, the Grantee must review the Register for completeness, accuracy and consistency with the *Register of Assigned Employees* and the *Payroll Report*. The Grantee should not pay the prime its final invoice until it has received all of the required Registers and has determined their accuracy.

<u>GENERAL CONTRACTOR'S RESPONSIBILITIES</u>: The General Contractor must prepare and submit this form every month and part of month to the Grantee along with any submittals received from subcontractors. The General Contractor must use the forms supplied by the Grantee in which lines (1) and (2) of SECTION I are already completed and line (3) remains blank.

In SECTION II, the Prime will identify each procurement as either 'subcontractor' or 'supplier' and will give complete information in the remaining columns. For every procurement with a subcontractor, the General Contractor should complete item (3) of SECTION I (lines (1) and (2) being already completed by the Grantee) and supply the subcontractor with enough copies for the duration of the subcontract. The General Contractor must obtain this form monthly from all of its subcontractors for submission to the Grantee.

<u>SUBCONTRACTOR'S RESPONSIBILITIES</u>: The Subcontractor must complete this form every month and part of month during the course of the contract for submittal to the General Contractor. The Subcontractor should use the forms supplied by the General Contractor in which SECTION I is already completed. In SECTION II, the Subcontractor will identity each procurement as either 'subcontractor' or supplier' and will give complete information in the remaining columns. The subcontractor must submit its final Register to the General Contractor with its final invoice. The General Contractor must review its subcontractor's final register and verify that it is complete and accurate before payment of the final invoice to the subcontractor.

# **CONTRACTOR'S QUALIFICATION STATEMENT**

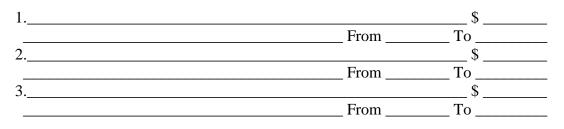
Please attach a photocopy of contractor's license and EPA Certification. All questions must be answered in full. Additional sheets for clarification of answers or additional information must be attached. **This statement must be notarized**.

1. Name, address, phone number, DPOR contractor license number, and DUNS number of company.

- 2. List the company's owner and principal officer and date and place organized.
- 3. Describe general character of work performed.

4. List any work awarded failed to be completed or contracts defaulted on. Note where and why.

5. List the three most important recent contracts over \$10,000. State the owner, work, approximate cost, place, date started and date completed.



6. List the contracts upon which you are currently working. State the owner, location, approximate cost, and estimated date of completion.

1		\$
2		\$
3		\$
List bank references and a	mount of credit availab	ble.
1		\$
2		\$
List insurance coverage an	nd amount.	
Liability-Property :		\$
Liability-Personal Injury:		\$
		\$
Vehicle and Equipment:		
Vehicle and Equipment: _ Other-	•	\$
Other(identify) List subcontractors utilize years of experience.	:	\$ss, specialty, subcontrac
Other(identify) List subcontractors utilize years of experience. 1. Name:	:ed. State name, addre	ss, specialty, subcontrac
Other(identify) List subcontractors utilize years of experience. 1. Name: Address:	:ed. State name, addre	ss, specialty, subcontrac
Other(identify) List subcontractors utilize years of experience. 1. Name: Address: Specialty:	:	ss, specialty, subcontrac
Other(identify) List subcontractors utilize years of experience. 1. Name: Address: Specialty: License #	: ed. State name, addre	ss, specialty, subcontrac
Other(identify) List subcontractors utilize years of experience. 1. Name: Address: Specialty: License # 2. Name:	:ed. State name, addre	ss, specialty, subcontrac
Other(identify) List subcontractors utilize years of experience. 1. Name: Address: Specialty: License # 2. Name: Address:	:ed. State name, addre	\$ss, specialty, subcontrac
Other(identify) List subcontractors utilize years of experience. 1. Name: Address: Specialty: License # 2. Name: Address:	:ed. State name, addre	ss, specialty, subcontrac
Other(identify) List subcontractors utilized years of experience. 1. Name:Address: Specialty:License # 2. Name:Address: Specialty:License #	:	\$ss, specialty, subcontrac
Other(identify) List subcontractors utilized years of experience. 1. Name:Address: Specialty:License # 2. Name:Address: Specialty:License # 3. Name:	:ed. State name, addre	\$ss, specialty, subcontrac
Other(identify) List subcontractors utilized years of experience. 1. Name:Address: Specialty:License # 2. Name:Address: Specialty:License # 3. Name:	: ed. State name, addre Years of Years of Years of	\$s

12. Number of current full-time employees Number employed at highest level in past twelve months

13.	Are you on any list of debar	red contractors maintained by the U.S. Department of Labor,
	U.S. Department of Housing	& Urban Development, or Virginia Department of Highways?
	YES	NO

14. All contractors, subcontractors and their workers, including electricians, must have appropriate lead-based paint training in order to be considered for work under this program.

a. Have any of your workers attended this training?	
YES   NO   If yes, complete the Empl	oyee Training Record.
	1 5
site. Do you need information about lead training and certificat	ion classes?
YES NO	
a.	YES NO If yes, complete the Emple If not, they will be required to attend the training before they site. Do you need information about lead training and certificat

b. Are you an EPA certified "Renovation, Repair and Painting" firm?

Contractor's Name:

The undersigned hereby authorizes and requests any person, firm or Corporation to furnish any information requested by \_\_\_\_\_\_\_ in verification of the recitals comprising this statement of contractor's qualifications:

City/County/Town of \_\_\_\_\_\_, Commonwealth of Virginia

\_\_\_\_\_\_ being duly sworn deposes and says that he/she is \_\_\_\_\_\_\_ of \_\_\_\_\_\_ and that the answers to the foregoing questions and all statements therein contained are true and correct.

My commission expires: \_\_\_\_\_.

Given under my hand this \_\_\_\_\_day of \_\_\_\_\_, 20\_\_\_.

Registration Number

### LEAD BASED PAINT RELATED TRAINING AND CERTIFICATIONS EMPLOYEE RECORD

Date:

	Duit
Employee's Name	Training Type and Level
	Certified Renovator

Note: All contractors, subcontractors and workers must have, at a minimum, the Lead Safe Work Practices training to work on DHCD housing rehabilitation projects consisting of interim controls. Each contractor must also have EPA Certification in "Renovation, Repair and Painting" as a firm and at least one individual Certified Renovator assigned to the project.

Contractor's Name:

# EXPLANATION OF EQUAL OPPORTUNITY CHECKLIST

What it is Used For:	This is required to assure that all required Equal Opportunity requirements are explained and all appropriate forms are conveyed to the Contractor and subcontractors.	
When it is Used:	During the Pre-construction Conference.	
Where it Goes:	To Grantee's Equal Opportunity project file.	
Instructions:	Part of the 'wage decision packet' sent by DHCD with the Wage Decision applicable to the activity(s) being contracted. Use the checklist to check off equal opportunity items as they are addressed at the Pre-construction Conference. Have the Contractor and any known subcontractors sign this checklist after completing review of items. <b>Any subcontractors hired subsequent of the</b> <b>Pre-construction Conference must also sign the checklist</b> .	
	See also "Equal Opportunity Requirements," as found in Chapter 8: Federal Labor Standards and Equal Opportunity Requirements.	

# EQUAL OPPORTUNITY CHECKLIST

### (to be completed initially at pre-construction conference)

Contractors have reviewed and understand Equal Opportunity/Section 3 contract provisions.		
Contractors must inform unions or other source of workers of Equal Opportunity requirements such as:		
a) taking applications at jobsite; and		
b) advertising in local or appropriate media.		
Contractors have received DHCD forms "Register of Assigned Employees" and "Register of Contractors, Subcontractors and Suppliers"; and have been instructed to submit initial forms at Start of Construction and every month or part of month during the course of the contract.		
Contractors are aware of goals for utilization of minority and female workers.		
Contractors are aware that they are obligated to the greatest extent feasible to hire lower income project area residents as workers and trainees and to utilize project are businesses and businesses owned by project area residents.		
Prime contractor has been given Equal Opportunity poster and will display it in prominent place at jobsite(s).		
If contractors employ more than 50 persons and contract is over \$50,000 they have submitted form EEO-1 to the Joint Reporting Committee, P. 0. Box 779, Norfolk, Virginia 23501; 804/461-1213.		

\* Denotes those items which must be submitted by the Contractor.

(Public Body):	(Prime Contractor):
Signature	Signature
Title	Title
	Company
(Subcontractor):	(Subcontractor):
Signature	Signature
Title	Title
Company	Company
(Subcontractor):	(Subcontractor):
Signature	Signature
Title	Title
Company	Company
(Subcontractor):	(Subcontractor):
Signature	Signature
Title	Title
Company	Company

# **EXPLANATION OF LABOR STANDARDS CHECKLIST**

What it is Used For:	This is required to assure that all required Labor Standards requirements are explained and all appropriate forms are conveyed to the Contractor and subcontractors.	
When it is Used:	During the Pre-construction Conference.	
Where it Goes:	To Grantee's Labor Standards project file.	
Instructions:	Part of the 'wage decision packet' sent by DHCD with the Wage Decision applicable to the activity(s) being contracted. Use the checklist to check off labor standards items as they are addressed at the Pre-construction Conference. Have the Contractor and any known subcontractors sign this checklist after completing review of items. <b>Any subcontractors hired subsequent of the Pre-</b> <b>construction Conference must also sign the checklist.</b> See also "Labor Standards Checklist," as found in Chapter 8: Federal Labor Standards and Equal Opportunity Requirements.	

# LABOR STANDARDS CHECKLIST

### (to be completed initially at pre-construction conference)

- Contractors have reviewed and understand all Labor Standards contract provisions.
- Contractors have reviewed and understand wage decision and job classifications.
- Contractors have been informed that all workers:
  - a) must be paid at least the appropriate minimum wage for the job classification;
  - b) must be paid time-and-a-half for all work beyond 40 hours per week;
  - c) must be paid at least weekly;
  - d) must perform only the work which is covered by the job classification they are listed and paid in. If a worker performs in more than one job classification, he must be paid either the wage of the highest paid job he works or time cards signed by the worker must document the amount of time worked in each job during the week.
  - Contractors will inform all workers:

- a) of their job classifications and duties;
- b) of their wage rates and fringe benefits;
- c) that they may be interviewed on the jobsite and are required to cooperate;
- d) of deductions from pay.
- Contractors will obtain each worker's name, permanent address, and social security number prior to assigning them to a jobsite.
- \* Contractors will obtain certification of any apprentices and trainees, including registration number and year of program, and will submit the same to the Public Body.
- Contractors are aware that they are responsible for the compliance of their subcontractors with Labor Standards provisions.
- Contractors must verify that the subcontractors(s) is/are not debarred from Federal or State contracts.

Contractors will construct and erect a project identification sign at the construction site identifying DHCD as a funding source per specifications as stated in contract documents.

Prime contractor has received and will post in a prominent place on the site:

a) Wage Decision;

- b) Labor Standards poster: "Notice to All Enployees..." (Davis-Bacon Act) WH-1321
- c) "Safety and Health Protection on the Job" poster (VA DOL).
- \* Contractors have received Payroll report form (WH-347) and understand:
  - a) how it is to be filled out;
  - b) that it must be filled out completely;
  - c) that it must include every worker assigned to the project (excluding non-working, supervisory, or clerical personnel);
  - d) that Payroll reports must be submitted for every week or part of a week during the course of the contract, and must be submitted by all subcontractors. Payroll reports will be submitted to the Grantee within seven (7) days of the end of the work week.
  - Contractors will maintain employment and payroll records which will be accessible to the Public Body, DHCD, and appropriate federal agencies for 3 years.

\*Denotes those items which must be submitted by the Contractor.

(Public Body):	(Prime Contractor):
Signature	Signature
Title	Title
	Company
(Subcontractor):	(Subcontractor):
Signature	Signature
Title	Title
Company	Company
(Subcontractor):	(Subcontractor):
Signature	Signature
Title	Title
Company	Company
(Subcontractor):	(Subcontractor):
Signature	Signature
Title	Title
Company	Company

# SECTION 3 PLAN OF ACTION CONTRACTOR OR SUBCONTRACTOR

For contracts exceeding \$100,000

### (to be completed initially at Pre-construction Conference)

<u>(Name of contractor)</u> agrees to implement the following specific Plan of Action steps directed at increasing the utilization of lower income residents and businesses within the County of \_\_\_\_\_\_.

- A. To ascertain from the locality's Grantee the exact boundaries of the Section 3 covered project area and where advantageous, seek the assistance of local officials in preparing and implementing the Section 3 Plan of Action for \_\_\_\_\_\_(*Name of Business*)
- B. Attempt to recruit from within the Section 3 area the necessary number of lower income residents through: a display advertisement in a local newspaper, signs placed at the project site, directly contacting the local Virginia Employment Commission (VEC) office, the local County (or City) Department of Social Services, or any Community Action Agencies that serve the Section 3 area.
- C. Maintain a list of all lower income residents who have applied either on their own or on referral from any source, and to employ such persons that are qualified, if otherwise eligible and if a vacancy exists.
- D. For all solicitations in excess of \$100,000 for subcontractors, determine if each responding subcontractor is a Section 3 business for the project and insert this Section 3 Plan of Action requirement in any resulting agreement. Contracts and subcontracts for less than \$100,000 are exempt from the preparation of a Section 3 Plan of Action.
- E. To formally contact subcontractors and other appropriate groups to secure their cooperation for the program.
- F. To ensure that all appropriate project area business concerns are notified of the pending sub-contractual opportunities.
- G. To maintain records, including copies of correspondence, memoranda etc., which document that all of the above affirmative action steps have been taken.
- H. To appoint or recruit an executive official of the company or agency as Equal Opportunity Officer to coordinate the implementation of this Section 3 Plan.
- I. To list on Table A information related to subcontracts to be awarded.

J. To list on Table B all projected workforce needs for all phases of this project by occupation, trade, skill level, and number of positions.

As officers and representative of <u>(Name of Contractor/Subcontractor)</u>, we the undersigned have read and fully agree to this Section 3 Plan of Action, and become a party to the full implementation of this program.

Signature

Title

Date

Signature

Title

Date

## SECTION 3 PROPOSED SUBCONTRACTS BREAKDOWN

### (to be completed initially at Pre-construction Conference)

### TABLE A

For the period covering \_\_\_\_\_ 20\_\_ through \_\_\_\_\_ 20\_\_

(Duration of the CDBG-Assisted Contract)

COLUMN 1	COLUMN 2	COLUMN 3	COLUMN 4	COLUMN 5
TYPE OF CONTRACT (BUSINESS OR PROFESSION)	TOTAL NUMBER OF CONTRACTS	TOTAL APPROXIMATE DOLLAR AMOUNT	ESTIMATED NUMBER OF CONTRACTS TO PROJECT AREA BUSINESSES*	ESTIMATED DOLLAR AMOUNT TO PROJECT AREA BUSINESSES*

\*The Project Area is coextensive with the Town/City/County of \_\_\_\_\_\_'s boundaries.

Company

Project Name

Project Number

EEO Officer (Signature)

Date

### SECTION 3 ESTIMATED PROJECT WORKFORCE BREAKDOWN

### (to be completed initially at Pre-construction Conference)

### TABLE B

COLUMN 1	COLUMN 2	COLUMN 3	COLUMN 4	COLUMN 5
JOB CATEGORY	TOTAL ESTIMATED POSITIONS	NO. POSITIONS CURRENTLY OCCUPIED BY PERMANENT EMPLOYEES	NO. POSITIONS NOT CURRENTLY OCCUPIED	NO. POSITIONS TO BE FILLED WITH LIPAR*
OFFICERS/SUPERVISORS				
PROFESSIONALS				
TECHNICIANS				
HOUSING SALES/RENTAL/MGMT.				
OFFICE CLERICAL				
SERVICE WORKERS				
OTHERS				

### TRADE:

JOURNEYMEN		
APPRENTICES		
MAXIMUM NO. TRAINEES		
OTHERS		

### TRADE:

JOURNEYMEN		
APPRENTICES		
MAXIMUM NO. TRAINEES		
OTHERS		

\*Lower Income Project Area Residents, Individuals residing within the City/County of \_\_\_\_\_\_ whose family income does not exceed 80% of the median income.

Company

# SECTION 3 BUSINESS CERTIFICATION

COUNTY OF \_\_\_\_\_

(ADDRESS) (PHONE NUMBER)

### CERTIFICATION FOR BUSINESS CONCERNS SEEKING NOTIFICATION OF SECTION 3 CONTRACTING (SERVICES AND CONSTRUCTION) OPPORTUNITIES

Name of Business		
Address of Business		
Phone #	Email Add	ress
DUNS Number	EIN #	or SS # (s)
Type of Business:	Corporation Sole Proprietorship	<ul><li>Partnership</li><li>Joint Venture</li></ul>
County Business License I	Registration #	

A <u>Section 3 Resident</u> is defined as any individual who resides within the County in which the federal assistance is expended and whose household income does not exceed 80% of the median income of the County adjusted for household size.

A <u>Section 3 Business</u> means a business that meets one or more of the following criteria:

- (1) The business is 51% or more owned by Section 3 residents;
- (2) The business has 30% or more permanent full-time employees that are certified Section 3 residents; or
- (3) The business provides written evidence of a commitment to subcontract in excess of 25% of the dollar award of all subcontracts with a Section 3 Business.

To become CERTIFIED as a Section 3 Business please check all boxes that apply and provide written evidence of the same:

Business owner(s) live in	County.
	County.

- **Business is 51% or more owned by Section 3 residents.**
- **Business has 30% or more permanent full-time employees that are certified Section** 3 residents.
- Business will subcontract in excess of 25% of the dollar award of all subcontracts with a Section 3 Business(es).

(Corporate Seal)

Printed Name of Authorized Official of Company

Signature of Authorized Official of Company Date

# SECTION 3 NEW EMPLOYEE TRACKING FORM

### CONTRACTOR'S/SUBCONTRACTOR'S NEW EMPLOYEE INFORMATION FORM

One *New Employee Information Form* is completed by the employer for each new employee hired for work on this project during the construction phase of the project.

This is a required form and should accompany the first payroll on which the name of the <u>newly</u> <u>hired employee appears.</u>

1.	Name of Grant Recipient	
2.	CDBG Contract Number	
3.	Name of Employer	
4.	Name of New Employee	
5.	Street Address or P.O. Box #	
6.	City and Zip Code	
7.	Date of Hire of New Employee	

- 8. Methods of attempting to recruit local persons of low and moderate income include: display advertisement in a local newspaper, public bulletin board, consideration of all applications received, U.S. employment service (i.e. local VEC office), a sign at the project site, and the posting of a notice at the project site. On the line below, list the method(s) used:
- 9. Does the employee live within the corporate limits (boundaries) of the Section 3 area listed on line 1? Yes No
  \*\*The Resident Employment Data sheet must accompany this form.

Signature of Employer or Employer Representative

Date

If the answer to 9 is "Yes" and if the household income is below the income category based on the number of persons residing in the household, and based on current Section 8 income limits, the employee is a Section 3 employee.

10.	Is the above	listed employ	ee a Section 3 emplo	oyee? 🗌 Yes	🗆 No

Signature of CDBG Grant Manager

Date

# **SECTION 3 INCOME SURVEY**

Your signature below will serve as self-certification of your Gross Household Income based on your household size. Circle the household size that reflects the total number of persons that currently reside in your household. Then review the corresponding income level and indicate whether your Gross Household Income is above or below the corresponding HH income referenced for your household size. Feel free to ask for assistance if you do not understand these instructions.

Name of Head of Household

Number of Persons Living in Household	Gross HH Income Level for the Section 3 County	Income ABOVE	Income BELOW
1	\$		
2	\$		
3	\$		
4	\$		
5	\$		
6	\$		
7	\$		
8	\$		

Street Address / Town / State / Zip Code

WARNING: Title 18, Section 1001 of the U.S. Code states that a person is guilty of a felony for knowingly and willingly making false or fraudulent statements to any department of the United States Government.

Householder Signature

Date

Print Name

Witness Signature

Date

Print Name

# **Minutes of Preconstruction Conference** \*\*

Grantee:
CDBG Contract #
Project Name:
Project Location:
Description of Project:
Prime Contractor:
Known Subcontractors:
Amount of Contract: \$
Date and Place of Conference:
Attendees/Name and Title:
** ATTACH AGENDA AND HANDOUTS

Summary of Items Covered: (Include all major construction related issues and attach Labor Standards and Equal Opportunity (Section 3) checklists)

Comments of Unresolved Issues:

Prime Contractor & Title

Project Engineer

Project Manager - Public Body

# EXPLANATION OF NOTICE TO PROCEED WITH CONSTRUCTION FORM Explanation of Form

After all Pre-construction Conference issues are resolved and the General Contractor submits all required bonds and insurance certifications, the construction contract may be executed. Following that, the *Notice to Proceed with Construction* should be given to the Contractor.

# **\*** A copy of the *Notice to Proceed with Construction* must be sent to your DHCD Community Development Specialist.

### NOTICE TO PROCEED WITH CONSTRUCTION

(Date)

ΓΟ:
(Successful Low Bidder)
ADDRESS:
CDBG CONTRACT#:
PROJECT NAME:
CONTRACT FOR:

You are hereby notified to commence work in accordance with the Contract Documents dated (*insert date*) on or before (*insert date*) and you are to complete the work within \_\_\_\_\_ consecutive calendar days thereafter. The date of substantial completion of all work is therefore (*insert date*) and the date of final completion of construction is (*insert date*).

A notice of Start of Construction and all required pre-construction documents must be submitted to the Public Body no later than one (1) day prior to commencement of work.

(Owner)

(Signature of Authorized Official)

(Type Title)

### ACCEPTANCE OF AWARD

(Contractor)

(Signature of Authorized Official)

(Type Title)

cc: Engineer

DHCD Community Development Specialist

# EXPLANATION OF APPLICABILITY OF EQUAL OPPORTUNITY CLAUSE

- 1. What contracts or subcontracts are subject to the Equal Opportunity Clause?
  - -- "Federal government contracts or subcontracts" exceeding \$10,000 or contracts or subcontracts with the Federal government which, in any 12 month period, total or can reasonably be expected to have an aggregate total value exceeding \$10,000.
  - -- "Federal assisted construction contracts/subcontracts and non-construction contracts/subcontracts" exceeding \$10,000.
- 2. When is a bidder required to have on file at each establishment, affirmative action programs?
  - -- For NON-CONSTRUCTION CONTRACTS (service and supply), DOL regulations (41 CFR 60-2) call for a Written Affirmative Action Plan from each prime contractor or subcontractor with 50 or more employees and (1) a contract of \$50,000 or more; or (2) Government bills of lading which, in any 12 month period, total or can be reasonably be expected to total \$50,000 or more.
  - -- For CONSTRUCTION CONTRACTS, DOL Regulations do not require a Written Affirmative Action Plan. However, Contractors must take specified Affirmative Action Steps and to demonstrate with evidence that the Specifications (41 CFR 60-4. 3) in the Equal Opportunity Clause have been implemented.
- 3. What reports are due under the applicable filing requirements?
  - -- Standard Form 100 (EEO-1)

Each person (contractor and subcontractor) shall file annually with the Joint Reporting Committee, on or before March 31, reports on Standard Form 100 (EEO-1), if such person (1) is not exempt as provided for by 41 CFR 60-1.5, (2) has 50 or more employees, and (a) a contract of \$50,000 or more; or (b) government bills of lading which, in any 12 month period, total or can reasonably be expected to total \$50,000 or more.

Each person required to submit reports shall file such report with the PUBLIC BODY within 30 days after the award to him of a contract or subcontract, UNLESS such person has submitted such a report within 12 months preceding the date of the award. Subsequent reports shall be submitted annually, on or before March 31, to the Joint Reporting Committee, P. 0. Box 779, Norfolk, Virginia 23501. Forms can be requested in writing or by calling 804/461-1213.

# **BIDDER COMPLIANCE STATEMENT**

# CERTIFICATION REGARDING EQUAL EMPLOYMENT OPPORTUNITY

Applicability: Bid exceeding ten thousand dollars (\$10,000) for contract/subcontract of unlimited amount and non-construction contract/subcontract for less than one million dollars (\$1,000,000).

This statement relates to a proposed contract between (<u>pick one</u>): Contractor and Public Body OR Contractor and Subcontractor to be funded under a federally assisted project. Pursuant to Executive Order 11246 and its implementing regulations at 41 CFR 60-1.7(b) (1), as the undersigned bidder, I certify that:

- 1) Bidder has participated in a previous contract or subcontract subject to the Equal Opportunity Clause.
  - YES NO
- Bidder has developed and has on file at each establishment, affirmative action programs pursuant to 41 CFR 60-2 (applies only to non-construction contractors).
   YES NO (contract less than \$50,000 AND fewer than 50 employees)
- Bidder has filed with the Joint Reporting Committee; the Director of the Office of Federal Contract Compliance Programs, U.S. Department of Labor; and agency; and/or the Equal Employment Opportunity Commission; all reports due under the applicable filing requirements.
   YES NO None Required

I understand that if I have failed to file any compliance reports which have been required of me, or have failed to develop and have on file at each establishment affirmative action programs pursuant to 41 CFR 60-2, when required, I am not eligible to have my bid or proposal considered, or to enter into the proposed contract.

I further understand that if awarded the proposed contract, and the contract for the FIRST time brings me under the filing requirements or the written affirmative action programs that I will, as applicable: (a) within 30 days file with the Public Body, Standard Form 100 (EEO- 1); and (b) within 120 days from the commencement of the contract, develop and submit to the Director of the Office of Federal Contract Compliance Programs, U.S. Department of Labor, for approval a Written Affirmative Action Plan.

Signature:		
Type Name:	Title:	
Address, including zip code:		
IRS # (or owner's social security #):		

Attachment: Any other reports that have been required pursuant to Executive Order 11246 by a contracting agency, the Equal Opportunity Commission, or the Director of the Office of Federal Contract Compliance Programs, U. S. DOL.

### **General Conditions - Part III**

### Attachment to Certain Construction Contracts

Applicable to contracts/subcontracts in excess of \$2,000 that are funded under legislation subject to Reorganization Plan Number 14 of 1950 (64 Stat. 1267), and which is for construction, alteration, and/or repair, including painting and decoration. Some of the legislation most likely to provide funding (that is, combined with CDBG funds) is: Appalachian Regional Development Act of 1965, Federal Water Pollution Control Act, as amended by the Water Quality Act of 1965, Public Works and Economic Development Act of 1965, Federal-Aid Highway acts, Vocational Education Act of 1963 and Vocational Education Amendments of 1968.

### Subpart A: Contract Work Hours and Safety Standards Act- Safety and Health

- 1. The contractor shall not require any laborer or mechanic employed in the performance of the contract to work in surroundings or under working conditions which are unsanitary, hazardous, or dangerous to his health or safety, as determined under construction safety and health standards promulgated by regulations of the Secretary of Labor.
- 2. The contractor shall comply with the Department of Labor Safety and Health Regulations for Construction promulgated under section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C. 327 et seq.).
- 3. The contractor shall include or cause to be included in each nonexempt subcontract the clauses in (1) and (2) above.

A person who undertakes to perform a portion of a contract involving the furnishing of supplies of materials will be considered a "subcontractor" under section 107 if the work in question involves the performance of construction work and is to be performed: (a) Directly on or near the construction site, or (b) by the employer for the specific project on a customized basis. Thus, a supplier of materials which will become an integral part of the construction is a "subcontractor" if the supplier fabricates or assembles the goods or materials in question specifically for the construction project.

### Subpart B: Immigration Reform and Control Act Of 1986

The Contractor agrees by signing this contract that he/she does not and will not during the performance of this contract violate the provisions of the Federal Immigration Reform and Control Act of 1986, which prohibits employment of illegal aliens.

#### SECTION 011000 - SUMMARY

#### PART 1 – GENERAL

#### 1.1 WORK COVERED BY CONTRACT DOCUMENTS

- A. Project Identification:
  - 1. Project Name: Pocahontas Community Improvement Project
  - 2. Project Location: Town of Wakefield, Virginia.
  - 3. Owner: County of Sussex.
- B. Engineer Identification: The Contract Documents, dated August 2023, were prepared for Project by CHA Consulting, Inc. 1341 Research Center Drive, Suite 2100, Blacksburg, Virginia 24060.
- C. The Work consists of:
  - 1. The project includes clearing and re-grading an existing drainage channel from Higgins Street to King Street to provide positive drainage and armoring areas of erosion potential.
  - 2. The project includes installation of four fire hydrants as shown on the drawings.

#### 1.2 CONTRACTS

A. Project will be constructed under a general construction contract.

#### 1.3 USE OF PREMISES

A. General: Contractor shall have full use of premises for construction operations, including use of Project site, during construction period. Contractor's use of premises is limited only by Owner's right to perform work or to retain other contractors on portions of Project.

#### 1.4 SPECIFICATION FORMATS AND CONVENTIONS

- A. Specification Format: The Specifications are organized into Divisions and Sections using the 48division format and CSI/CSC's "MasterFormat" numbering system.
  - 1. Section Identification: The Specifications use section numbers and titles to help crossreferencing in the Contract Documents. Sections in the Project Manual are in numeric sequence; however, the sequence is incomplete. Consult the table of contents at the beginning of the Project Manual to determine numbers and names of sections in the Contract Documents.
- B. Specification Content: The Specifications use certain conventions for the style of language and the intended meaning of certain terms, words, and phrases when used in particular situations. These conventions are as follows:
  - 1. Abbreviated Language: Language used in the Specifications and other Contract Documents is abbreviated. Words and meanings shall be interpreted as appropriate. Words implied, but not stated, shall be inferred as the sense requires. Singular words shall be interpreted as plural, and plural words shall be interpreted as singular where applicable as the context of the Contract Documents indicates.
  - 2. Imperative mood and streamlined language are generally used in the Specifications. Requirements expressed in the imperative mood are to be performed by Contractor. Occasionally, the indicative or subjunctive mood may be used in the Section Text for clarity to describe responsibilities that must be fulfilled indirectly by Contractor or by others when so noted.

a. The words "shall," "shall be," or "shall comply with," depending on the context, are implied where a colon (:) is used within a sentence or phrase.

PART 2 - PRODUCTS (NOT USED)

PART 3 – EXECUTION (NOT USED)

END OF SECTION

SUMMARY

PAGE 2 OF 2 CHA PROJECT NO. 068326 SECTION 011000

#### SECTION 012200 - UNIT PRICES

#### PART 1 – GENERAL

#### 1.1 SUMMARY

A. This Section includes administrative and procedural requirements for unit prices and covers methods of measurement and payment for unit prices.

#### 1.2 DEFINITIONS

A. Unit price is an amount proposed by bidders, stated on the Bid Form, as a price per unit of measurement for materials or services.

#### 1.3 GENERAL

A. The total bid shall cover all work required by the Contract Documents. All costs in connection with the proper and successful completion of the work, including furnishing all materials, equipment, supplies, and appurtenances; providing all construction plans, equipment, and tools; and performing all necessary labor and supervision to fully complete the Work, shall be included in the unit and lump sum prices bid. All Work not specifically set forth as a pay item in the Bid Form shall be considered subsidiary obligations of the Contractor, and all costs in connection therewith shall be included in the prices bid.

#### 1.4 PROCEDURES

- A. Unit prices include all necessary material plus cost for delivery, installation, insurance, applicable taxes, overhead, and profit.
- B. Owner reserves the right to reject Contractor's measurement of work-in-place that involves use of established unit prices and to have this work measured, at Owner's expense, by an independent surveyor acceptable to Contractor.
- C. The estimated quantities of work to be done and materials to be furnished are approximate. The quantities have been estimated for the purpose of comparison of the bids and are not to be assumed to be the actual final quantities which will be necessary to complete the work. The Owner reserves the right to increase or diminish any or all of the quantities of work as Owner sees appropriate. Increases or decreases in quantities from those estimated in the bid will not be considered sufficient grounds for granting an increase in the unit price bid.
- D. No direct or separate payment will be made for any work required by the Specifications or Drawings unless it is defined as a pay item. Full payment for all such labor, materials, and work required is included under the unit price or lump sum pay items.
- E. No direct or separate payment will be made for providing miscellaneous temporary or accessory works, plant, services, Contractor's office, Engineer's field office, layout surveys, job signs, sanitary requirements, testing, safety devices, approval and record drawings, water supplies, power, maintaining traffic, removal of remaining waste, watchman, bonds, insurance, and all other items as required by the General Conditions, Supplementary Conditions, and the General Requirements. Compensation for all such services, materials, and related work is to be included in the prices stipulated for the unit and lump sum pay items listed herein.

- F. Except where otherwise specified, the unity or lump sum bid prices for each item of work, which involves excavation or trenching, shall include all costs for such work. No direct payment shall be made for excavation or trenching unless shown elsewhere.
- G. List of Unit Prices: A list of unit prices is included at the end of this Section. Specification Sections referenced in the schedule contain requirements for materials described under each unit price.

#### PART 2 – PRODUCTS (Not Used)

#### PART 3 – EXECUTION

#### 3.1 VERIFICAITON OF ACTUAL QUANTITIES

A. Where the actual quantities differ by two percent (2%) or more from the estimates quantities, CONTRACTOR shall notify the OWNER immediately and shall not proceed with the work until the revised quantity is accepted

#### 3.2 UNIT PRICE SCHEDULE

- A. Bid Item No. 1 Bonds, Insurance and Mobilization:
  - 1. Measurement: Bonds, Insurance, Mobilization shall consist of the performance of construction preparatory operations, including the movement of personnel and equipment to the project site, placement of required project signage, payment of premiums for performance and payment bonds and insurance, for the establishment of the Contractor's office(s), building(s) and other facilities necessary to begin the Work, and for record as-built drawings. Mobilization, Bonds, Insurance shall be paid for at the contract lump sum price, which shall include full compensation for the furnishing of all materials, labor, tools, equipment, and incidentals necessary to mobilize, remobilize and subsequently demobilize the construction operations necessary to complete the Work. No additional payment will be made for demobilization and remobilization due to shutdowns, suspensions of the Work or for other mobilization activities. No adjustment in the amount bid for this item will be made regardless of increases or decreases in the Contract Price.
  - 2. Payment: Partial payments shall be made as follows:
    - a. The first partial payment shall be 50 percent of the amount bid for this item, or five (5) percent of the Contract Price, whichever is less.
    - b. When 10 percent of the Contract Price is earned, exclusive of this item, the next partial payment shall be 100 percent of the amount bid for this item, or five (5) percent of the Contract Price, whichever is less, minus any previous partial payment(s).
    - c. Any amount bid for this item in excess of five (5) percent of the Contract Price shall be paid when the Work is substantially complete.

The total sum of the partial payments shall not exceed the original amount bid for this item.

- B. Bid Item No. 2 Drainage Channel Improvements:
  - 1. Measurement: Measurement shall be based on a lump sum for completing the drainage channel improvements as indicated in the Contract Drawings and Specifications.
  - 2. Payment: The lump sum bid price for this item shall be full compensation for the drainage channel improvements that includes, but is not limited to, all materials, labor, and equipment necessary including traffic control, surveying, erosion and sediment control measures, clearing and grubbing, soil and rock excavation, dewatering, off-site disposal, grading, rip rap installation, vegetative streambank installation, and soil stabilization.

- C. Bid Item No. 3 Fire Hydrant Assembly:
  - 1. Measurement: Fire hydrant assembly installation shall be measured based on the number of fire hydrant assemblies installed in accordance with the Contract Documents.
  - 2. Payment: The unit price shall be full compensation for items and incidentals necessary to complete the bid item that includes, but is not limited to, all materials, labor, and equipment necessary for a complete installation including traffic control, surveying, pavement cutting, erosion and sediment control measures, clearing and grubbing, soil and rock excavation, dewatering, excavated material storage and/or off-site disposal, pipe and fittings and their installation, concrete thrust block placement, valve and box, fire hydrant and piping with appurtenances and their installation, improved bedding and its placement and compaction, harnessing and its installation, fittings and their installation, concrete and its placement, backfill and compaction, testing, disinfection, marking tape installation, complete restoration including top soiling, seeding, mulching, landscape restoration, and any other items necessary for a complete, working water system. For water main and fittings installed in pavement, all asphalt and concrete restoration shall conform to VDOT standards. The unit prices shall include approved traffic control measures.

END OF SECTION

### SECTION 012600 - CONTRACT MODIFICATION PROCEDURES

### PART 1 – GENERAL

#### 1.1 SUMMARY

A. This Section specifies administrative and procedural requirements for handling and processing Contract modifications.

#### 1.2 MINOR CHANGES IN THE WORK

A. Engineer will issue supplemental instructions authorizing Minor Changes in the Work, not involving adjustment to the Contract Sum or the Contract Time.

### 1.3 PROPOSAL REQUESTS

- A. Owner-Initiated Proposal Requests: Engineer will issue a detailed description of proposed changes in the Work that may require adjustment to the Contract Sum or the Contract Time. If necessary, the description will include supplemental or revised Drawings and Specifications.
  - 1. Proposal Requests issued by Engineer are for information only. Do not consider them instructions either to stop work in progress or to execute the proposed change.
  - 2. Within 7 days after receipt of Proposal Request, submit a quotation estimating cost adjustments to the Contract Sum and the Contract Time necessary to execute the change.
    - a. Include a list of quantities of products required or eliminated and unit costs, with total amount of purchases and credits to be made. If requested, furnish survey data to substantiate quantities.
    - b. Indicate applicable taxes, delivery charges, equipment rental, and amounts of trade discounts.
    - c. Include an updated Contractor's Construction Schedule that indicates the effect of the change, including, but not limited to, changes in activity duration, start and finish times, and activity relationship. Use available total float before requesting an extension of the Contract Time.
- B. Contractor-Initiated Proposals: If latent or unforeseen conditions require modifications to the Contract, Contractor may propose changes by submitting a request for a change to Engineer.
  - 1. Include a statement outlining reasons for the change and the effect of the change on the Work. Provide a complete description of the proposed change. Indicate the effect of the proposed change on the Contract Sum and the Contract Time.
  - 2. Include a list of quantities of products required or eliminated and unit costs, with total amount of purchases and credits to be made. If requested, furnish survey data to substantiate quantities.
  - 3. Indicate applicable taxes, delivery charges, equipment rental, and amounts of trade discounts.
  - 4. Include an updated Contractor's Construction Schedule that indicates the effect of the change, including, but not limited to, changes in activity duration, start and finish times, and activity relationship. Use available total float before requesting an extension of the Contract Time.
  - 5. Comply with requirements in Division 1 Section "Product Requirements" if the proposed change requires substitution of one product or system for product or system specified.
- C. Proposal Request Form: For Change Order Proposals, use CSI Change Order Request (proposal format).

CONTRACT MODIFICATIONS PROCEDURES

### 1.4 ALLOWANCES

- A. Allowance Adjustment: To adjust allowance amounts, base each Change Order proposal on the difference between purchase amount and the allowance, multiplied by final measurement of work-inplace. If applicable, include reasonable allowances for cutting losses, tolerances, mixing wastes, normal product imperfections, and similar margins.
  - 1. Include installation costs in purchase amount only where indicated as part of the allowance.
  - 2. If requested, prepare explanation and documentation to substantiate distribution of overhead costs and other margins claimed.
  - 3. Submit substantiation of a change in scope of work, if any, claimed in Change Orders related to unit-cost allowances.
  - 4. Owner reserves the right to establish the quantity of work-in-place by independent quantity survey, measure, or count.
- B. Submit claims for increased costs because of a change in scope or nature of the allowance described in the Contract Documents, whether for the Purchase Order amount or Contractor's handling, labor, installation, overhead, and profit. Submit claims within 21 days of receipt of the Change Order or Construction Change Directive authorizing work to proceed. Owner will reject claims submitted later than 21 days after such authorization.
  - 1. Do not include Contractor's or subcontractor's indirect expense in the Change Order cost amount unless it is clearly shown that the nature or extent of work has changed from what could have been foreseen from information in the Contract Documents.
  - 2. No change to Contractor's indirect expense is permitted for selection of higher- or lowerpriced materials or systems of the same scope and nature as originally indicated.

### 1.5 CHANGE ORDER PROCEDURES

A. On Owner's approval of a Proposal Request, Engineer will issue a Change Order for signatures of Owner and Contractor.

### 1.6 WORK CHANGE DIRECTIVE

- A. Work Change Directive: Engineer may issue a Work Change Directive. Work Change Directive instructs Contractor to proceed with a change in the Work, for subsequent inclusion in a Change Order.
  - 1. Work Change Directive contains a complete description of change in the Work. It also designates method to be followed to determine change in the Contract Sum or the Contract Time.
- B. Documentation: Maintain detailed records on a time and material basis of work required by the Work Change Directive.
  - 1. After completion of change, submit an itemized account and supporting data necessary to substantiate cost and time adjustments to the Contract.

### PART 2 – PRODUCTS (NOT USED)

### PART 3 – EXECUTION (NOT USED)

### END OF SECTION

### CONTRACT MODIFICATIONS PROCEDURES

### SECTION 012900 - PAYMENT PROCEDURES

#### PART 1 – GENERAL

#### 1.1 SUMMARY

A. This Section specifies administrative and procedural requirements necessary to prepare and process Applications for Payment.

#### 1.2 **DEFINITIONS**

A. Schedule of Values: A statement furnished by Contractor allocating portions of the Contract Sum to various portions of the Work and used as the basis for reviewing Contractor's Applications for Payment.

### 1.3 SCHEDULE OF VALUES

- A. Coordination: Coordinate preparation of the Schedule of Values with preparation of Contractor's Construction Schedule.
  - 1. Correlate line items in the Schedule of Values with other required administrative forms and schedules, including the following:
    - a. Contractor's progress schedule.
    - b. Application for Payment form.
    - c. List of subcontractors.
    - d. Schedule of allowances.
    - e. Schedule of alternates.
    - f. List of products.
    - g. List of principal suppliers and fabricators.
    - h. Schedule of submittals.
  - 2. Submit the Schedule of Values to Engineer at earliest possible date but no later than 21 days before the date scheduled for submittal of initial Applications for Payment.
  - 3. Subschedules: Where the Work is separated into phases requiring separately phased payments, provide subschedules showing values correlated with each phase of payment.
- B. Format and Content: Use the Project Manual table of contents as a guide to establish line items for the Schedule of Values. Provide at least one line item for each Specification Section.
  - 1. Identification: Include the following Project identification on the Schedule of Values:
    - a. Project name and location.
    - b. Name of Engineer.
    - c. Project number.
    - d. Contractor's name and address.
    - e. Date of submittal.
  - 2. Arrange the Schedule of Values in tabular form with separate columns to indicate the following for each item listed:
    - a. Generic Name
    - b. Related Specification Section or Division.
    - c. Description of the Work.
    - d. Name of subcontractor.
    - e. Name of manufacturer or fabricator.

### PAYMENT PROCEDURES

- f. Name of supplier.
- g. Change Orders (numbers) that affect value.
- h. Dollar value:
  - 1) Percentage of the Contract Sum to nearest one-hundredth percent adjusted to total 100 percent.
- 3. Provide a breakdown of the Contract Sum in enough detail to facilitate continued evaluation of Applications for Payment and progress reports. Coordinate with the Project Manual table of contents. Provide several line items for principal subcontract amounts where appropriate.
- 4. Round amounts to nearest whole dollar; total shall equal the Contract Sum.
- 5. Provide a separate line item in the Schedule of Values for each part of the Work where Applications for Payment may include materials or equipment purchased or fabricated and stored but not yet installed.
  - a. Differentiate between items stored on-site and items stored off-site. Include evidence of insurance or bonded warehousing if required.
- 6. Provide separate line items in the Schedule of Values for initial cost of materials, for each subsequent stage of completion, and for total installed value of that part of the Work.
- 7. Allowances: Provide a separate line item in the Schedule of Values for each allowance. Show line-item value of unit-cost allowances, as a product of the unit cost, multiplied by measured quantity. Use information indicated in the Contract Documents to determine quantities.
- 8. Each item in the Schedule of Values and Applications for Payment shall be complete. Include total cost and proportionate share of general overhead and profit for each item.
  - a. Temporary facilities and other major cost items that are not direct cost of actual work-inplace may be either shown as separate line items in the Schedule of Values or distributed as general overhead expense, at Contractor's option.
- 9. Schedule Updating: Update and resubmit the Schedule of Values before the next Applications for Payment when Change Orders or Construction Change Directives result in a change in the Contract Sum.

# 1.4 APPLICATIONS FOR PAYMENT

- A. Each Application for Payment shall be consistent with previous applications and payments as certified by Engineer and paid for by Owner.
  - 1. Initial Application for Payment, Application for Payment at time of Substantial Completion, and final Application for Payment involve additional requirements.
- B. Payment Application Times: The date for each progress payment is indicated in the Agreement between Owner and Contractor. The period of construction Work covered by each Application for Payment is the period indicated in the Agreement.
- C. Payment Application Times: The date for each progress payment is the 15th day of each month. The period covered by each Application for Payment starts on the day following the end of the preceding period and ends 15 days before the date for each progress payment.
- D. Payment Application Forms: Use AIA Document G702 and AIA Document G703 Continuation Sheets or EJCDC C-620 for Applications for Payment.
- E. Payment Application Forms: Use forms provided by Owner for Applications for Payment. Sample copies are included at end of this Section.

- F. Application Preparation: Complete every entry on form. Notarize and execute by a person authorized to sign legal documents on behalf of Contractor. Engineer will return incomplete applications without action:
  - 1. Entries shall match data on the Schedule of Values and Contractor's Construction Schedule. Use updated schedules if revisions were made.
  - 2. Include amounts of Change Orders and Construction Change Directives issued before last day of construction period covered by application.
- G. Transmittal: Submit 1 signed copy of each Application for Payment to Engineer by a method ensuring receipt within 24 hours. One copy shall include waivers of lien and similar attachments if required:
  - 1. Transmit each copy with a transmittal form listing attachments and recording appropriate information about application.
- H. Waivers of Mechanic's Lien: At Owner's request, submit waivers of mechanic's liens from subcontractors, sub-subcontractors, and suppliers for construction period covered by the previous application:
  - 1. Submit partial waivers on each item for amount requested, before deduction for retainage, on each item.
  - 2. When an application shows completion of an item, submit final or full waivers.
  - 3. Owner reserves the right to designate which entities involved in the Work must submit waivers.
  - 4. Waiver Delays: Submit each Application for Payment with Contractor's waiver of mechanic's lien for construction period covered by the application.
    - a. Submit final Application for Payment with or preceded by final waivers from every entity involved with performance of the Work covered by the application who is lawfully entitled to a lien.
  - 5. Waiver Forms: Submit waivers of lien on forms executed in a manner acceptable to Owner.
- I. Initial Application for Payment: Administrative actions and submittals that must precede or coincide with submittal of first Application for Payment include the following:
  - 1. List of subcontractors.
  - 2. Schedule of Values.
  - 3. Contractor's Construction Schedule (preliminary if not final).
  - 4. Products list.
  - 5. Schedule of unit prices.
  - 6. Submittals Schedule (preliminary if not final).
  - 7. List of Contractor's staff assignments.
  - 8. List of Contractor's principal consultants.
  - 9. Copies of building permits.
  - 10. Copies of authorizations and licenses from authorities having jurisdiction for performance of the Work.
  - 11. Initial progress report.
  - 12. Report of preconstruction conference.
  - 13. Certificates of insurance and insurance policies.
  - 14. Performance and payment bonds.
  - 15. Data needed to acquire Owner's insurance.
  - 16. Initial settlement survey and damage report if required.

## PAYMENT PROCEDURES

- J. Application for Payment at Substantial Completion: After issuing the Certificate of Substantial Completion, submit an Application for Payment showing 100 percent completion for portion of the Work claimed as substantially complete.
  - 1. Include documentation supporting claim that the Work is substantially complete and a statement showing an accounting of changes to the Contract Sum.
  - 2. This application shall reflect Certificates of Partial Substantial Completion issued previously for Owner occupancy of designated portions of the Work.
- K. Final Payment Application: Submit final Application for Payment with releases and supporting documentation not previously submitted and accepted, including, but not limited, to the following:
  - 1. Evidence of completion of Project closeout requirements.
  - 2. Insurance certificates for products and completed operations where required and proof that taxes, fees, and similar obligations were paid.
  - 3. Updated final statement, accounting for final changes to the Contract Sum.
  - 4. AIA Document G706, "Contractor's Affidavit of Payment of Debts and Claims."
  - 5. AIA Document G706A, "Contractor's Affidavit of Release of Liens."
  - 6. AIA Document G707, "Consent of Surety to Final Payment."
  - 7. Evidence that claims have been settled.
  - 8. Final meter readings for utilities, a measured record of stored fuel, and similar data as of date of Substantial Completion or when Owner took possession of and assumed responsibility for corresponding elements of the Work.
  - 9. Final, liquidated damages settlement statement.

### PART 2 – PRODUCTS (NOT USED)

### PART 3 – EXECUTION (NOT USED)

END OF SECTION

# PAYMENT PROCEDURES

### SECTION 013000 - PROJECT MANAGEMENT AND COORDINATION

### PART 1 – GENERAL

#### 1.1 SUMMARY

- A. This Section includes administrative provisions for coordinating construction operations on Project including, but not limited to, the following:
  - 1. Coordination.
  - 2. Submittals.
  - 3. Administrative and supervisory personnel.
  - 4. Project meetings.
  - 5. General installation provisions.
  - 6. Cleaning and protection.
- B. Where applicable, each prime Contractor shall participate in these coordination requirements, even though certain areas of responsibility are assigned to a specific prime Contractor.

### 1.2 COORDINATION

- A. Coordination: Coordinate construction activities included under various Sections of these Specifications to assure efficient and orderly installation of each part of the Work. Coordinate construction operations included under different Sections of these Specifications that are dependent upon each other for proper installation, connection, and operation.
- B. Coordination: Each prime contractor shall cooperate with Owner's, coordinate construction activities to assure efficient and orderly installation of each part of the Work.
  - 1. Where installation of one part of the Work is dependent on installation of other components, either before or after its own installation, cooperate with scheduled construction activities in the sequence required to obtain the best results.
  - 2. Where availability of space is limited, coordinate installation of different components to assure maximum accessibility for required maintenance, service and repair.
  - 3. Make adequate provisions to accommodate items scheduled for later installation.
  - 4. Coordinate construction activities with public and private utilities.
    - a. Notify "Miss Utility" prior to excavation or blasting.
    - b. Notify the Owner and Engineer of any utility locations encountered which conflict with the work. Coordinate with the Owner and Utility Company in the protection, removal, relocation or replacement of conflicting utility locations.
- C. Where necessary, prepare memoranda for distribution to each party involved outlining special procedures required for coordination. Include such items as required notices, reports, and attendance at meetings.
  - 1. Prepare similar memoranda for the Owner and separate Contractors where coordination of their Work is required.
- D. Administrative Procedures: Coordinate scheduling and timing of required administrative procedures with other construction activities and activities of other contractors to avoid conflicts and to ensure orderly progress of the Work. Such administrative activities include, but are not limited to, the following:
  - 1. Preparation of Contractor's Construction Schedule.

- 2. Preparation of the Schedule of Values.
- 3. Installation and removal of temporary facilities and controls.
- 4. Delivery and processing of submittals.
- 5. Progress meetings.
- 6. Pre-installation conferences.
- 7. Project closeout activities.
- E. Conservation: Coordinate construction activities to ensure that operations are carried out with consideration given to conservation of energy, water, and materials.
  - 1. Salvage materials and equipment involved in performance of, but not actually incorporated into, the Work. Refer to other Sections for disposition of salvaged materials that are designated as Owner's property.

## 1.3 SUBMITTALS

- A. Coordination Drawings: Prepare and submit coordination Drawings where close and careful coordination is required for installation of products and materials fabricated off-site by separate entities, and where limited space availability necessitates maximum utilization of space for efficient installation of different components.
  - 1. Show the interrelationship of components shown on separate Shop Drawings.
  - 2. Indicate required installation sequences.
  - 3. Comply with requirements contained in Section "Submittals Procedures."
  - 4. Refer to Section "Basic Mechanical Materials and Methods," Section "Coordinated Shop Drawings," and Section "Basic Electrical Requirements" for specific coordination Drawing requirements for mechanical and electrical installations.
- B. Staff Names: Within 15 days of starting construction operations, submit a list of principal staff assignments, including superintendent and other personnel in attendance at Project site. Identify individuals and their duties and responsibilities; list addresses and telephone numbers, including home and office telephone numbers. Provide names, addresses, and telephone numbers of individuals assigned as standbys in the absence of individuals assigned to Project.
  - 1. Post copies of list in Project meeting room, in temporary field office, and by each temporary telephone.

## 1.4 PROJECT MEETINGS

- A. General: Schedule and conduct meetings and conferences at Project site, unless otherwise indicated.
  - 1. Attendees: Inform participants and others involved, and individuals whose presence is required, of date and time of each meeting. Notify Owner and Engineer of scheduled meeting dates and times.
  - 2. Agenda: Prepare the meeting agenda. Distribute the agenda to all invited attendees.
  - 3. Minutes: Record significant discussions and agreements achieved. Distribute the meeting minutes to everyone concerned, including Owner and Engineer, within 3 days of the meeting.
- B. Preconstruction Conference: Schedule a preconstruction conference and organizational meeting at the Project site or other convenient site prior to commencement of construction activities. Conduct the meeting to review responsibilities and personnel assignments.
  - 1. Attendees: Authorized representatives of Owner, the Engineer, Engineer and their consultants; the Contractor and its superintendent; major subcontractors; manufacturers; suppliers and other concerned parties shall each be represented at the conference. All participants at the conference shall be familiar with Project and authorized to conclude matters relating to the Work.

- 2. Agenda: Discuss items of significance that could affect progress, including the following:
  - a. Tentative construction schedule.
  - b. Phasing.
  - c. Critical work sequencing.
  - d. Designation of responsible personnel.
  - e. Procedures for processing field decisions and Change Orders.
  - f. Procedures for processing Applications for Payment.
  - g. Distribution of the Contract Documents.
  - h. Submittal procedures.
  - i. Preparation of Record Documents.
  - j. Use of the premises.
  - k. Responsibility for temporary facilities and controls.
  - l. Parking availability.
  - m. Office, work, and storage areas.
  - n. Equipment deliveries and priorities.
  - o. Safety procedures.
  - p. First aid.
  - q. Security.
  - r. Progress cleaning.
  - s. Working hours.
  - t. Housekeeping.
  - u. Subcontractors.
  - v. Preliminary Schedule of Shop Drawings and Samples.
  - w. Minority Business Enterprise Goals.
  - x. Co-ordination with other contractors.
  - y. Insurance in Force.
  - z. Contractor's Schedule of Values.
- C. Pre-installation Conferences: Conduct a pre-installation conference at Project site before each construction activity that requires coordination with other construction.
  - 1. Attendees: Installer and representatives of manufacturers and fabricators involved in or affected by the installation and its coordination or integration with other materials and installations that have preceded or will follow, shall attend the meeting. Advise the Engineer of scheduled meeting dates.
  - 2. Agenda: Review progress of other construction activities and preparations for the particular activity under consideration at each pre-installation conference, including requirements for the following:
    - a. Contract Documents.
    - b. Options.
    - c. Related Change Orders.
    - d. Purchases.
    - e. Deliveries.
    - f. Shop Drawings, Product Data and quality control Samples.
    - g. Review of mockups.
    - h. Possible conflicts.
    - i. Compatibility problems.
    - j. Time schedules.

- k. Weather limitations.
- 1. Manufacturer's written recommendations.
- m. Warranty requirements.
- n. Compatibility of materials.
- o. Acceptability of substrates.
- p. Temporary facilities and controls.
- q. Space and access limitations.
- r. Governing regulations.
- s. Testing and inspecting requirements.
- t. Required performance results.
- u. Protection of construction and personnel.
- v. Safety.
- w. Recording requirements.
- 3. Record significant discussions, agreements and disagreements of each conference along with the approved progress schedule. Distribute the record of the meeting to everyone concerned, promptly, including the Owner and Engineer.
- 4. Do not proceed with installation if the conference cannot be successfully concluded. Initiate whatever actions are necessary to resolve impediments to performance of the Work and reconvene the conference at earliest feasible date.
- D. Progress Meetings: Conduct progress meetings at the Project Site at regularly scheduled intervals. Coordinate dates of meetings with preparation of payment requests.
  - 1. Attendees: In addition to representatives of the Owner and Engineer, each contractor, subcontractor, supplier, and other entity concerned with current progress or involved in planning, coordination, or performance of future activities shall be represented at these meetings. All participants at the conference shall be familiar with Project and authorized to conclude matters relating to the Work.
  - 2. Agenda: Review and correct or approve minutes of previous progress meeting. Review other items of significance that could affect progress. Include topics for discussion as appropriate to the current status of Project.
    - a. Contractor's Construction Schedule: Review progress since the last meeting. Determine whether each activity is on time, ahead of schedule, or behind schedule, in relation to Contractor's Construction Schedule. Determine how construction behind schedule will be expedited; secure commitments from parties involved to do so. Discuss whether schedule revisions are required to ensure that current and subsequent activities will be completed within the Contract Time.
    - b. Review present and future needs of each entity present, including the following:
      - 1) Interface requirements.
      - 2) Time.
      - 3) Sequence of operations.
      - 4) Status of submittals.
      - 5) Deliveries.
      - 6) Off-site fabrication.
      - 7) Access.
      - 8) Site utilization.
      - 9) Temporary facilities and controls.
      - 10) Work hours.
      - 11) Hazards and risks.
      - 12) Progress cleaning.

- 13) Quality and work standards.
- 14) Change Orders.
- 15) Documentation of information for payment requests.
- 3. Reporting: No later than 3 days after each progress meeting date, distribute copies of minutes of the meeting to each party present and to parties who should have been present. Include a brief summary, in narrative form, of progress since the previous meeting and report.
  - a. Schedule Updating: Revise Contractor's Construction Schedule after each progress meeting where revisions to the schedule have been made or recognized. Issue the revised schedule concurrently with the report of each meeting.
- E. Coordination Meetings: Conduct Project coordination meetings at regularly scheduled intervals. Project coordination meetings are in addition to specific meetings held for other purposes, such as progress meetings and pre-installation conferences.
  - 1. Attendees: In addition to representatives of the Owner and Engineer, each contractor, subcontractor, supplier, and other entity concerned with current progress or involved in planning, coordination, or performance of future activities shall be represented at these meetings. All participants at the conference shall be familiar with Project and authorized to conclude matters relating to the Work
  - 2. Agenda: Review and correct or approve minutes of the previous coordination meeting. Review other items of significance that could affect progress. Include topics for discussion as appropriate to status of Project.
    - a. Combined Contractor's Construction Schedule: Review progress since the last coordination meeting. Determine whether each contract is on time, ahead of schedule, or behind schedule, in relation to Combined Contractor's Construction Schedule. Determine how construction behind schedule will be expedited; secure commitments from parties involved to do so. Discuss whether schedule revisions are required to ensure that current and subsequent activities will be completed within the Contract Time.
    - b. Schedule Updating: Revise Combined Contractor's Construction Schedule after each coordination meeting where revisions to the schedule have been made or recognized. Issue revised schedule concurrently with report of each meeting.
    - c. Review present and future needs of each contractor present, including the following:
      - 1) Interface requirements.
      - 2) Time.
      - 3) Sequence of operations.
      - 4) Status of submittals.
      - 5) Deliveries.
      - 6) Off-site fabrication.
      - 7) Access.
      - 8) Site utilization.
      - 9) Temporary facilities and controls.
      - 10) Work hours.
      - 11) Hazards and risks.
      - 12) Progress cleaning.
      - 13) Quality and work standards.
      - 14) Change Orders.
  - 3. Reporting: Record meeting results and distribute copies to everyone in attendance and to others affected by decisions or actions resulting from each meeting.

### PART 2 – PRODUCTS (NOT APPLICABLE)

### PART 3 - EXECUTION

#### 3.1 GENERAL INSTALLATION PROVISIONS

- A. Inspection of Conditions: Require the Installer of each major component to inspect both the substrate and conditions under which Work is to be performed. Do not proceed until unsatisfactory conditions have been corrected in an acceptable manner.
- B. Manufacturer's Instructions: Comply with manufacturer's installation instructions and recommendations, to the extent that those instructions and recommendations are more explicit or stringent than requirements contained in Contract Documents.
- C. Inspect materials or equipment immediately upon delivery and again prior to installation. Reject damaged and defective items.
- D. Provide attachment and connection devices and methods necessary for securing Work. Secure Work true to line and level. Allow for expansion and building movement.
- E. Visual Effects: Provide uniform joint widths in exposed Work. Arrange joints in exposed Work to obtain the best visual effect. Refer questionable choices to the Engineer for final decision.
- F. Recheck measurements and dimensions, before starting each installation.
- G. Install each component during weather conditions and Project status that will ensure the best possible results. Isolate each part of the completed construction from incompatible material as necessary to prevent deterioration.
- H. Coordinate temporary enclosures with required inspections and tests, to minimize the necessity of uncovering completed construction for that purpose.
- I. Mounting Heights: Where mounting heights are not indicated, install individual components at standard mounting heights recognized within the industry for the particular application indicated. Refer questionable mounting height decisions to the Engineer for final decision.

## 3.2 CLEANING AND PROTECTION

- A. During handling and installation, clean and protect construction in progress and adjoining materials in place. Apply protective covering where required to ensure protection from damage or deterioration at Substantial Completion.
- B. Clean and maintain completed construction as frequently as necessary through the remainder of the construction period. Adjust and lubricate operable components to ensure operability without damaging effects.
- C. Limiting Exposures: Supervise construction activities to ensure that no part of the construction completed or in progress, is subject to harmful, dangerous, damaging, or otherwise deleterious exposure during the construction period. Where applicable, such exposures include, but are not limited to, the following:
  - 1. Excessive static or dynamic loading.
  - 2. Excessive internal or external pressures.

- 3. Excessively high or low temperatures.
- 4. Thermal shock.
- 5. Excessively high or low humidity.
- 6. Air contamination or pollution.
- 7. Water or ice.
- 8. Solvents.
- 9. Chemicals.
- 10. Light.
- 11. Radiation.
- 12. Puncture.
- 13. Abrasion.
- 14. Heavy traffic.
- 15. Soiling, staining and corrosion.
- 16. Bacteria.
- 17. Rodent and insect infestation.
- 18. Combustion.
- 19. Electrical current.
- 20. High speed operation.
- 21. Improper lubrication.
- 22. Unusual wear or other misuse.
- 23. Contact between incompatible materials.
- 24. Destructive testing.
- 25. Misalignment.
- 26. Excessive weathering.
- 27. Unprotected storage.
- 28. Improper shipping or handling.
- 29. Theft.
- 30. Vandalism.

END OF SECTION

### SECTION 013300 – SUBMITTAL PROCEDURES

### PART 1 – GENERAL

### 1.1 SUMMARY

A. This Section includes administrative and procedural requirements for submitting Shop Drawings, Product Data, Samples, and other miscellaneous submittals.

### 1.2 **DEFINITIONS**

- A. Action Submittals: Written and graphic information that requires Engineer's responsive action.
- B. Informational Submittals: Written information that does not require Engineer's approval. Submittals may be rejected for not complying with requirements.
- C. File Transfer Protocol (FTP): Communications protocol that enables transfer of files to and from another computer over a network and that serves as the basis for standard Internet protocols. An FTP site is a portion of a network located outside of network firewalls within which internal and external users are able to access files.
- D. Portable Document Format (PDF): An open standard file format licensed by Adobe Systems used for representing documents in a device-independent and display resolution-independent fixed-layout document format.

### 1.3 SUBMITTAL ADMINISTRATIVE REQUIREMENTS:

- A. Engineer's Digital Data Files: Electronic digital data files of the Contract Drawings will **not** be provided by Engineer for Contractor's use in preparing submittals.
- B. Coordination: Coordinate preparation and processing of submittals with performance of construction activities.
  - 1. Coordinate each submittal with fabrication, purchasing, testing, delivery, other submittals, and related activities that require sequential activity.
  - 2. Submit all submittal items required for each Specification Section concurrently unless partial submittals for portions of the Work are indicated on approved submittal schedule.
  - 3. Submit action submittals and informational submittals required by the same Specification Section as separate packages under separate transmittals.
  - 4. Coordinate transmittal of different types of submittals for related parts of the Work so processing will not be delayed because of need to review submittals concurrently for coordination.
    - a. Engineer reserves the right to withhold action on a submittal requiring coordination with other submittals until related submittals are received.
- C. Processing Time: Allow time for submittal review, including time for resubmittals, as follows. Time for review shall commence on Engineer's receipt of submittal. No extension of the Contract Time will be authorized because of failure to transmit submittals enough in advance of the Work to permit processing, including resubmittals.
  - 1. Initial Review: Allow 15 days for initial review of each submittal. Allow additional time if coordination with subsequent submittals is required. Engineer will advise Contractor when a submittal being processed must be delayed for coordination.

- 2. Intermediate Review: If intermediate submittal is necessary, process it in same manner as initial submittal.
- 3. Resubmittal Review: Allow 15 days for review of each resubmittal.
- 4. Sequential Review: Where sequential review of submittals by Engineer's consultants, Owner, or other parties is indicated, allow 21 days for initial review of each submittal.
- 5. Concurrent Consultant Review: Where the Contract Documents indicate that submittals may be transmitted simultaneously to Engineer and to Engineer's consultants, allow 15 days for review of each submittal. Submittal will be returned to Engineer before being returned to Contractor.
- D. Electronic Submittals: Identify and incorporate information in each electronic submittal file as follows:
  - 1. Assemble complete submittal package into a single indexed file incorporating submittal requirements of a single Specification Section and transmittal form with links enabling navigation to each item.
  - 2. Name file with submittal number or other unique identifier, including revision identifier.
    - a. File name shall use project identifier and Specification Section number followed by a decimal point and then a sequential number (e.g., LNHS-061000.01). Resubmittals shall include an alphabetic suffix after another decimal point (e.g., LNHS-061000.01.A).
  - 3. Provide means for insertion to permanently record Contractor's review and approval markings and action taken by Engineer.
  - 4. Transmittal Form for Electronic Submittals: Use electronic form acceptable to Owner, containing the following information:
    - a. Project name.
    - b. Date.
    - c. Name and address of Engineer.
    - d. Name of Construction Manager.
    - e. Name of Contractor.
    - f. Name of firm or entity that prepared submittal.
    - g. Names of subcontractor, manufacturer, and supplier.
    - h. Category and type of submittal.
    - i. Submittal purpose and description.
    - j. Specification Section number and title.
    - k. Specification paragraph number or drawing designation and generic name for each of multiple items.
    - 1. Drawing number and detail references, as appropriate.
    - m. Location(s) where product is to be installed, as appropriate.
    - n. Related physical samples submitted directly.
    - o. Indication of full or partial submittal.
    - p. Transmittal number.
    - q. Submittal and transmittal distribution record.
    - r. Other necessary identification.
    - s. Remarks.
  - 5. Metadata: Include the following information as keywords in the electronic submittal file metadata:
    - a. Project name.
    - b. Number and title of appropriate Specification Section.
    - c. Manufacturer name.

- d. Product name.
- E. Options: Identify options requiring selection by Engineer.
- F. Deviations and Additional Information: On an attached separate sheet, prepared on Contractor's letterhead, record relevant information, requests for data, revisions other than those requested by Engineer on previous submittals, and deviations from requirements in the Contract Documents, including minor variations and limitations. Include same identification information as related submittal.
- G. Resubmittals: Make resubmittals in same form and number of copies as initial submittal.
  - 1. Note date and content of previous submittal.
  - 2. Note date and content of revision in label or title block and clearly indicate extent of revision.
  - 3. Resubmit submittals until they are marked with approval notation from Engineer's action stamp.
- H. Distribution: Furnish copies of final submittals to manufacturers, subcontractors, suppliers, fabricators, installers, authorities having jurisdiction, and others as necessary for performance of construction activities. Show distribution on transmittal forms.
- I. Use for Construction: Retain complete copies of submittals on Project site. Use only final action submittals that are marked with approval notation from Engineer's action stamp.

### PART 2 – PRODUCTS

### 2.1 SUBMITTAL PROCEDURES

- A. General Submittal Procedure Requirements: Prepare and submit submittals required by individual Specification Sections. Types of submittals are indicated in individual Specification Sections.
  - 1. Submit electronic submittals via email as PDF electronic files.
    - a. Engineer will return annotated file. Annotate and retain one copy of file as an electronic Project record document file.
  - 2. Certificates and Certifications Submittals: Provide a statement that includes signature of entity responsible for preparing certification. Certificates and certifications shall be signed by an officer or other individual authorized to sign documents on behalf of that entity.
    - a. Provide a digital signature with digital certificate on electronically submitted certificates and certifications where indicated.
    - b. Provide a notarized statement on original paper copy certificates and certifications where indicated.
- B. Product Data: Collect information into a single submittal for each element of construction and type of product or equipment.
  - 1. If information must be specially prepared for submittal because standard published data are not suitable for use, submit as Shop Drawings, not as Product Data.
  - 2. Mark each copy of each submittal to show which products and options are applicable.
  - 3. Include the following information, as applicable:
    - a. Manufacturer's catalog cuts.
      - b. Manufacturer's product specifications.
      - c. Standard color charts.
      - d. Statement of compliance with specified referenced standards.

- e. Testing by recognized testing agency.
- f. Application of testing agency labels and seals.
- g. Notation of coordination requirements.
- h. Availability and delivery time information.
- 4. For equipment, include the following in addition to the above, as applicable:
  - a. Wiring diagrams showing factory-installed wiring.
  - b. Printed performance curves.
  - c. Operational range diagrams.
  - d. Clearances required to other construction, if not indicated on accompanying Shop Drawings.
- 5. Submit Product Data before or concurrent with Samples.
- 6. Submit Product Data in the following format:
  - a. PDF electronic file.
- C. Shop Drawings: Prepare Project-specific information, drawn accurately to scale. Do not base Shop Drawings on reproductions of the Contract Documents or standard printed data.
  - 1. Preparation: Fully illustrate requirements in the Contract Documents. Include the following information, as applicable:
    - a. Identification of products.
    - b. Schedules.
    - c. Compliance with specified standards.
    - d. Notation of coordination requirements.
    - e. Notation of dimensions established by field measurement.
    - f. Relationship and attachment to adjoining construction clearly indicated.
    - g. Seal and signature of professional engineer if specified.
  - 2. Sheet Size: Except for templates, patterns, and similar full-size drawings, submit Shop Drawings on sheets at least 8-1/2 by 11 inches, but no larger than 30 by 42 inches.
  - 3. Submit Shop Drawings in the following format:
    - a. PDF electronic file.
- D. Samples: Submit Samples for review of kind, color, pattern, and texture for a check of these characteristics with other elements and for a comparison of these characteristics between submittal and actual component as delivered and installed.
  - 1. Transmit Samples that contain multiple, related components such as accessories together in one submittal package.
  - 2. Identification: Attach label on unexposed side of Samples that includes the following:
    - a. Generic description of Sample.
    - b. Product name and name of manufacturer.
    - c. Sample source.
    - d. Number and title of applicable Specification Section.
    - e. Specification paragraph number and generic name of each item.
  - 3. For projects where electronic submittals are required, provide corresponding electronic submittal of Sample transmittal, digital image file illustrating Sample characteristics, and identification information for record.

- 4. Disposition: Maintain sets of approved Samples at Project site, available for quality-control comparisons throughout the course of construction activity. Sample sets may be used to determine final acceptance of construction associated with each set.
  - a. Samples that may be incorporated into the Work are indicated in individual Specification Sections. Such Samples must be in an undamaged condition at time of use.
  - b. Samples not incorporated into the Work, or otherwise designated as Owner's property, are the property of Contractor.
- 5. Samples for Initial Selection: Submit manufacturer's color charts consisting of units or sections of units showing the full range of colors, textures, and patterns available.
  - a. Number of Samples: Submit 1 full set of available choices where color, pattern, texture, or similar characteristics are required to be selected from manufacturer's product line. Engineer will return submittal with options selected.
- 6. Samples for Verification: Submit full-size units or Samples of size indicated, prepared from same material to be used for the Work, cured and finished in manner specified, and physically identical with material or product proposed for use, and that show full range of color and texture variations expected. Samples include, but are not limited to, the following: partial sections of manufactured or fabricated components; small cuts or containers of materials; complete units of repetitively used materials; swatches showing color, texture, and pattern; color range sets; and components used for independent testing and inspection.
  - a. Number of Samples: Submit 1 set of Samples.
    - 1) Submit a single Sample where assembly details, workmanship, fabrication techniques, connections, operation, and other similar characteristics are to be demonstrated.
    - 2) If variation in color, pattern, texture, or other characteristic is inherent in material or product represented by a Sample, submit at least **3** sets of paired units that show approximate limits of variations.
- E. Product Schedule: As required in individual Specification Sections, prepare a written summary indicating types of products required for the Work and their intended location. Include the following information in tabular form:
  - 1. Type of product. Include unique identifier for each product indicated in the Contract Documents or assigned by Contractor if none is indicated.
  - 2. Manufacturer and product name, and model number if applicable.
  - 3. Number and name of room or space.
  - 4. Location within room or space.
  - 5. Submit product schedule in the following format:
    - a. PDF electronic file.
- F. Coordination Drawing Submittals: Comply with requirements specified in Division 01 Section "Project Management and Coordination."
- G. Contractor's Construction Schedule: Comply with requirements specified in Division 01 Section "Construction Progress Documentation."
- H. Application for Payment and Schedule of Values: Comply with requirements specified in Division 01 Section "Payment Procedures."
- I. Test and Inspection Reports and Schedule of Tests and Inspections Submittals: Comply with requirements specified in Division 01 Section "Quality Requirements."

- J. Closeout Submittals and Maintenance Material Submittals: Comply with requirements specified in Division 01 Section "Closeout Procedures."
- K. Maintenance Data: Comply with requirements specified in Division 01 Section "Operation and Maintenance Data."
- L. Qualification Data: Prepare written information that demonstrates capabilities and experience of firm or person. Include lists of completed projects with project names and addresses, contact information of Engineers and owners, and other information specified.
- M. Welding Certificates: Prepare written certification that welding procedures and personnel comply with requirements in the Contract Documents. Submit record of Welding Procedure Specification and Procedure Qualification Record on AWS forms. Include names of firms and personnel certified.
- N. Installer Certificates: Submit written statements on manufacturer's letterhead certifying that Installer complies with requirements in the Contract Documents and, where required, is authorized by manufacturer for this specific Project.
- O. Manufacturer Certificates: Submit written statements on manufacturer's letterhead certifying that manufacturer complies with requirements in the Contract Documents. Include evidence of manufacturing experience where required.
- P. Product Certificates: Submit written statements on manufacturer's letterhead certifying that product complies with requirements in the Contract Documents.
- Q. Material Certificates: Submit written statements on manufacturer's letterhead certifying that material complies with requirements in the Contract Documents.
- R. Material Test Reports: Submit reports written by a qualified testing agency, on testing agency's standard form, indicating and interpreting test results of material for compliance with requirements in the Contract Documents.
- S. Product Test Reports: Submit written reports indicating that current product produced by manufacturer complies with requirements in the Contract Documents. Base reports on evaluation of tests performed by manufacturer and witnessed by a qualified testing agency, or on comprehensive tests performed by a qualified testing agency.
- T. Research Reports: Submit written evidence, from a model code organization acceptable to authorities having jurisdiction, that product complies with building code in effect for Project. Include the following information:
  - 1. Name of evaluation organization.
  - 2. Date of evaluation.
  - 3. Time period when report is in effect.
  - 4. Product and manufacturers' names.
  - 5. Description of product.
  - 6. Test procedures and results.
  - 7. Limitations of use.
- U. Preconstruction Test Reports: Submit reports written by a qualified testing agency, on testing agency's standard form, indicating and interpreting results of tests performed before installation of product, for compliance with performance requirements in the Contract Documents.

- V. Compatibility Test Reports: Submit reports written by a qualified testing agency, on testing agency's standard form, indicating and interpreting results of compatibility tests performed before installation of product. Include written recommendations for primers and substrate preparation needed for adhesion.
- W. Field Test Reports: Submit written reports indicating and interpreting results of field tests performed either during installation of product or after product is installed in its final location, for compliance with requirements in the Contract Documents.
- X. Design Data: Prepare and submit written and graphic information, including, but not limited to, performance and design criteria, list of applicable codes and regulations, and calculations. Include list of assumptions and other performance and design criteria and a summary of loads. Include load diagrams if applicable. Provide name and version of software, if any, used for calculations. Include page numbers.

## 2.2 CONTRACTOR'S PROJECT HEALTH & SAFETY PLAN

- A. No later than the Pre-construction meeting, the Contractor shall submit to the Engineer a written Project Health & Safety Plan, which states the Contractor's company policy relative to safety. The plan must also address specific health and safety concerns, which are expected to be encountered on the project. As a minimum this plan shall include:
  - 1. Listing of project and company safety officers.
  - 2. Specific company safety policies.
  - 3. Employee Safety Training Program.
  - 4. Administrative procedures to handle employee health & safety concerns.
  - 5. Procedures for insuring worker compliance with health and safety requirements.
- B. The Contractor shall be responsible to ensure that each Subcontractor employed on the project complies with the requirements of this section either by submitting a copy of the subcontractor's Project Health & Safety Plan or by submitting a letter from the Subcontractor stating that they will comply with the provisions of the Contractor's Project Health & Safety Plan.
- C. Submission of the required Project Health & Safety Plan by the Contractor is primarily for information or record purposes and shall not be construed to imply approval by the Engineer or to relieve the Contractor from the responsibility to adequately protect the health & safety of all workers involved in the project.

## PART 3 – EXECUTION

## 3.1 CONTRACTOR'S REVIEW

- A. Review each submittal and check for compliance with the Contract Documents. Note corrections and field dimensions. Mark with approval stamp before submitting to Engineer.
- B. Approval Stamp: Stamp each submittal with a uniform, approval stamp. Include Project name and location, submittal number, Specification Section title and number, name of reviewer, date of Contractor's approval, and statement certifying that submittal has been reviewed, checked, and approved for compliance with the Contract Documents.

### 3.2 ENGINEER'S ACTION

- A. General: Engineer] will not review submittals that do not bear Contractor's approval stamp and will return them without action.
- B. Action Submittals: Engineer will review each submittal, make marks to indicate corrections or modifications required, and return it. Engineer will stamp each submittal with an action stamp and will mark stamp appropriately to indicate action taken, as follows:
  - 1. Final Unrestricted Release: Where submittals are marked "No Exceptions Taken," that part of the Work covered by the submittal may proceed provided it complies with requirements of the Contract Documents; final acceptance will depend upon that compliance.
  - 2. Final-But-Restricted Release: When submittals are marked "Make Corrections Noted," that part of the Work covered by the submittal may proceed provided it complies with notations or corrections on the submittal and requirements of the Contract Documents; final acceptance will depend on that compliance.
  - 3. Returned for Resubmittal: When submittal is marked "Revise and Resubmit," "Rejected," or "Submit Specified Item," do not proceed with that part of the Work covered by the submittal, including purchasing, fabrication, delivery, or other activity. Revise or prepare a new submittal in accordance with the notations; resubmit without delay. Repeat if necessary to obtain a different action mark.
    - a. Do not permit submittals marked "Revise and Resubmit," "Rejected," or "Submit Specified Item" to be used at the Project site, or elsewhere where Work is in progress.
  - 4. Other Action: Where a submittal is primarily for information or record purposes, special processing or other activity, the submittal will be returned, marked "Action Not Required."
- C. Informational Submittals: Engineer will review each submittal and will not return it or will reject and return it if it does not comply with requirements. Engineer will forward each submittal to appropriate party.
- D. Submittals not required by the Contract Documents will not be reviewed and may be discarded.

END OF SECTION

### SECTION 017300 - EXECUTION REQUIREMENTS

### PART 1 – GENERAL

### 1.1 SUMMARY

- A. This Section includes general procedural requirements governing execution of the Work including, but not limited to, the following:
  - 1. Construction layout.
  - 2. Field engineering and surveying.
  - 3. General installation of products.
  - 4. Coordination of Owner-installed products.
  - 5. Progress cleaning.
  - 6. Starting and adjusting.
  - 7. Protection of installed construction.
  - 8. Correction of the Work.

### 1.2 SUBMITTALS

- A. Qualification Data: For land surveyor to demonstrate their capabilities and experience. Include lists of completed projects with project names and addresses, names and addresses of architects and owners, and other information specified.
- B. Certificates: Submit certificate signed by land surveyor certifying that location and elevation of improvements comply with requirements.
- C. Landfill Receipts: Submit copy of receipts issued by a landfill facility, licensed to accept hazardous materials, for hazardous waste disposal.
- D. Certified Surveys: Submit 2 copies signed by land surveyor.
- E. Final Property Survey: Submit 3 copies showing the Work performed and record survey data.

### 1.3 QUALITY ASSURANCE

- A. Land Surveyor Qualifications: A professional land surveyor who is legally qualified to practice in jurisdiction where Project is located and who is experienced in providing land-surveying services of the kind indicated.
- B. Engineer's Qualifications: A professional Engineer who is legally qualified to practice in jurisdiction where Project is located and who is experienced in providing engineering services of the kind indicated.

### PART 2 – PRODUCTS (NOT USED)

### EXECUTION REQUIREMENTS

### PART 3 – EXECUTION

### 3.1 EXAMINATION

- A. Existing Conditions: The existence and location of site improvements, utilities, and other construction indicated as existing are not guaranteed. Before beginning work, investigate and verify the existence and location of mechanical and electrical systems and other construction affecting the Work.
  - 1. Before construction, verify the location and points of connection of utility services.
- B. Existing Utilities: The existence and location of underground and other utilities and construction indicated as existing are not guaranteed. Before beginning sitework, investigate and verify the existence and location of underground utilities and other construction affecting the Work.
  - 1. Before construction, verify the location and invert elevation at points of connection of sanitary sewer, storm sewer, and water-service piping; and underground electrical services.
  - 2. Furnish location data for work related to Project that must be performed by public utilities serving Project site.
- C. Acceptance of Conditions: Examine substrates, areas, and conditions, with Installer or Applicator present where indicated, for compliance with requirements for installation tolerances and other conditions affecting performance. Record observations.
  - 1. Written Report: Where a written report listing conditions detrimental to performance of the Work is required by other Sections, include the following:
    - a. Description of the Work.
    - b. List of detrimental conditions, including substrates.
    - c. List of unacceptable installation tolerances.
    - d. Recommended corrections.
  - 2. Verify compatibility with and suitability of substrates, including compatibility with existing finishes or primers.
  - 3. Examine roughing-in for mechanical and electrical systems to verify actual locations of connections before equipment and fixture installation.
  - 4. Examine walls, floors, and roofs for suitable conditions where products and systems are to be installed.
  - 5. Proceed with installation only after unsatisfactory conditions have been corrected. Proceeding with the Work indicates acceptance of surfaces and conditions.

### 3.2 PREPARATION

- A. Existing Utility Information: Furnish information to Owner that is necessary to adjust, move, or relocate existing utility structures, utility poles, lines, services, or other utility appurtenances located in or affected by construction. Coordinate with authorities having jurisdiction.
- B. Existing Utility Interruptions: Do not interrupt utilities serving facilities occupied by Owner or others unless permitted under the following conditions and then only after arranging to provide temporary utility services according to requirements indicated:
  - 1. Notify Owner not less than 48 hours in advance of proposed utility interruptions.
  - 2. Do not proceed with utility interruptions without Owner's written permission.
- C. Field Measurements: Take field measurements as required to fit the Work properly. Recheck measurements before installing each product. Where portions of the Work are indicated to fit to other

construction, verify dimensions of other construction by field measurements before fabrication. Coordinate fabrication schedule with construction progress to avoid delaying the Work.

- D. Space Requirements: Verify space requirements and dimensions of items shown diagrammatically on Drawings.
- E. Review of Contract Documents and Field Conditions: Immediately on discovery of the need for clarification of the Contract Documents, submit a request for information to Engineer. Include a detailed description of problem encountered, together with recommendations for changing the Contract Documents. Submit requests on CSI Form 13.2A, "Request for Interpretation."

### 3.3 CONSTRUCTION LAYOUT

- A. Verification: Before proceeding to lay out the Work, verify layout information shown on Drawings, in relation to the property survey and existing benchmarks. If discrepancies are discovered, notify Engineer promptly.
- B. General: Engage a land surveyor to lay out the Work using accepted surveying practices.
  - 1. Establish benchmarks and control points to set lines and levels at each story of construction and elsewhere as needed to locate each element of Project.
  - 2. Establish dimensions within tolerances indicated. Do not scale Drawings to obtain required dimensions.
  - 3. Inform installers of lines and levels to which they must comply.
  - 4. Check the location, level and plumb, of every major element as the Work progresses.
  - 5. Notify Engineer when deviations from required lines and levels exceed allowable tolerances.
  - 6. Close site surveys with an error of closure equal to or less than the standard established by authorities having jurisdiction.
- C. Site Improvements: Locate and lay out site improvements, including pavements, grading, fill and topsoil placement, utility slopes, and invert elevations.
- D. Building Lines and Levels: Locate and lay out control lines and levels for structures, building foundations, column grids, and floor levels, including those required for mechanical and electrical work. Transfer survey markings and elevations for use with control lines and levels. Level foundations and piers from two or more locations.
- E. Record Log: Maintain a log of layout control work. Record deviations from required lines and levels. Include beginning and ending dates and times of surveys, weather conditions, name and duty of each survey party member, and types of instruments and tapes used. Make the log available for reference by Engineer.

### 3.4 FIELD ENGINEERING

- A. Identification: Owner will identify existing benchmarks, control points, and property corners.
- B. Reference Points: Locate existing permanent benchmarks, control points, and similar reference points before beginning the Work. Preserve and protect permanent benchmarks and control points during construction operations.
  - 1. Do not change or relocate existing benchmarks or control points without prior written approval of Engineer. Report lost or destroyed permanent benchmarks or control points promptly. Report the need to relocate permanent benchmarks or control points to Engineer before proceeding.

- 2. Replace lost or destroyed permanent benchmarks and control points promptly. Base replacements on the original survey control points.
- C. Certified Survey: On completion of foundation walls, major site improvements, and other work requiring field-engineering services, prepare a certified survey showing dimensions, locations, angles, and elevations of construction and sitework.
- D. Final Property Survey: Prepare a final property survey showing significant features (real property) for Project. Include on the survey a certification, signed by land surveyor, that principal metes, bounds, lines, and levels of Project are accurately positioned as shown on the survey.
  - 1. Show boundary lines, monuments, streets, site improvements and utilities, existing improvements and significant vegetation, adjoining properties, acreage, grade contours, and the distance and bearing from a site corner to a legal point.
  - 2. Recording: At Substantial Completion, have the final property survey recorded by or with authorities having jurisdiction as the official "property survey."

### 3.5 INSTALLATION

- A. General: Locate the Work and components of the Work accurately, in correct alignment and elevation, as indicated.
  - 1. Make vertical work plumb and make horizontal work level.
  - 2. Where space is limited, install components to maximize space available for maintenance and ease of removal for replacement.
  - 3. Conceal pipes, ducts, and wiring in finished areas, unless otherwise indicated.
- B. Comply with manufacturer's written instructions and recommendations for installing products in applications indicated.
- C. Install products at the time and under conditions that will ensure the best possible results. Maintain conditions required for product performance until Substantial Completion.
- D. Conduct construction operations so no part of the Work is subjected to damaging operations or loading in excess of that expected during normal conditions of occupancy.
- E. Tools and Equipment: Do not use tools or equipment that produce harmful noise levels.
- F. Anchors and Fasteners: Provide anchors and fasteners as required to anchor each component securely in place, accurately located and aligned with other portions of the Work.
  - 1. Mounting Heights: Where mounting heights are not indicated, mount components at heights directed by Engineer.
  - 2. Allow for building movement, including thermal expansion and contraction.
- G. Joints: Make joints of uniform width. Where joint locations in exposed work are not indicated, arrange joints for the best visual effect. Fit exposed connections together to form hairline joints.
- H. Hazardous Materials: Use products, cleaners, and installation materials that are not considered hazardous.

# 3.6 OWNER-INSTALLED PRODUCTS

A. Site Access: Provide access to Project site for Owner's construction forces.

- B. Coordination: Coordinate construction and operations of the Work with work performed by Owner's construction forces.
  - 1. Construction Schedule: Inform Owner of Contractor's preferred construction schedule for Owner's portion of the Work. Adjust construction schedule based on a mutually agreeable timetable. Notify Owner if changes to schedule are required due to differences in actual construction progress.
  - 2. Preinstallation Conferences: Include Owner's construction forces at preinstallation conferences covering portions of the Work that are to receive Owner's work. Attend preinstallation conferences conducted by Owner's construction forces if portions of the Work depend on Owner's construction.

# 3.7 PROGRESS CLEANING

- A. General: Clean Project site and work areas daily, including common areas. Coordinate progress cleaning for joint-use areas where more than one installer has worked. Enforce requirements strictly. Dispose of materials lawfully.
  - 1. Comply with requirements in NFPA 241 for removal of combustible waste materials and debris.
  - 2. Do not hold materials more than 7 days during normal weather or 3 days if the temperature is expected to rise above 80 deg F (27 deg C).
  - 3. Containerize hazardous and unsanitary waste materials separately from other waste. Mark containers appropriately and dispose of legally, according to regulations.
- B. Site: Maintain Project site free of waste materials and debris.
- C. Work Areas: Clean areas where work is in progress to the level of cleanliness necessary for proper execution of the Work.
  - 1. Remove liquid spills promptly.
  - 2. Where dust would impair proper execution of the Work, broom-clean or vacuum the entire work area, as appropriate.
- D. Installed Work: Keep installed work clean. Clean installed surfaces according to written instructions of manufacturer or fabricator of product installed, using only cleaning materials specifically recommended. If specific cleaning materials are not recommended, use cleaning materials that are not hazardous to health or property and that will not damage exposed surfaces.
- E. Concealed Spaces: Remove debris from concealed spaces before enclosing the space.
- F. Exposed Surfaces: Clean exposed surfaces and protect as necessary to ensure freedom from damage and deterioration at time of Substantial Completion.
- G. Cutting and Patching: Clean areas and spaces where cutting and patching are performed. Completely remove paint, mortar, oils, putty, and similar materials.
  - 1. Thoroughly clean piping, conduit, and similar features before applying paint or other finishing materials. Restore damaged pipe covering to its original condition.
- H. Waste Disposal: Burying or burning waste materials on-site will not be permitted. Washing waste materials down sewers or into waterways will not be permitted.
- I. During handling and installation, clean and protect construction in progress and adjoining materials already in place. Apply protective covering where required to ensure protection from damage or deterioration at Substantial Completion.

- J. Clean and provide maintenance on completed construction as frequently as necessary through the remainder of the construction period. Adjust and lubricate operable components to ensure operability without damaging effects.
- K. Limiting Exposures: Supervise construction operations to assure that no part of the construction, completed or in progress, is subject to harmful, dangerous, damaging, or otherwise deleterious exposure during the construction period.

### 3.8 STARTING AND ADJUSTING

- A. Start equipment and operating components to confirm proper operation. Remove malfunctioning units, replace with new units, and retest.
- B. Adjust operating components for proper operation without binding. Adjust equipment for proper operation.
- C. Test each piece of equipment to verify proper operation. Test and adjust controls and safeties. Replace damaged and malfunctioning controls and equipment.
- D. Manufacturer's Field Service: If a factory-authorized service representative is required to inspect field-assembled components and equipment installation, comply with qualification requirements in Division 1 Section "Quality Requirements."

### 3.9 PROTECTION OF INSTALLED CONSTRUCTION

- A. Provide final protection and maintain conditions that ensure installed Work is without damage or deterioration at time of Substantial Completion.
- B. Comply with manufacturer's written instructions for temperature and relative humidity.

# 3.10 CORRECTION OF THE WORK

- A. Repair or remove and replace defective construction. Restore damaged substrates and finishes. Comply with requirements in Division 1 Section "Cutting and Patching."
  - 1. Repairing includes replacing defective parts, refinishing damaged surfaces, touching up with matching materials, and properly adjusting operating equipment.
- B. Restore permanent facilities used during construction to their specified condition.
- C. Remove and replace damaged surfaces that are exposed to view if surfaces cannot be repaired without visible evidence of repair.
- D. Repair components that do not operate properly. Remove and replace operating components that cannot be repaired.
- E. Remove and replace chipped, scratched, and broken glass or reflective surfaces.

END OF SECTION

### EXECUTION REQUIREMENTS

### PART 1 – GENERAL

### 1.1 SUMMARY

- A. Section includes administrative and procedural requirements for the following:
  - 1. Salvaging nonhazardous demolition and construction waste.
  - 2. Recycling nonhazardous demolition and construction waste.
  - 3. Disposing of nonhazardous demolition and construction waste.

### 1.2 **DEFINITIONS**

- A. Construction Waste: Building and site improvement materials and other solid waste resulting from construction, remodeling, renovation, or repair operations. Construction waste includes packaging.
- B. Demolition Waste: Building and site improvement materials resulting from demolition or selective demolition operations.
- C. Disposal: Removal off-site of demolition and construction waste and subsequent sale, recycling, reuse, or deposit in landfill or incinerator acceptable to authorities having jurisdiction.
- D. Recycle: Recovery of demolition or construction waste for subsequent processing in preparation for reuse.
- E. Salvage: Recovery of demolition or construction waste and subsequent sale or reuse in another facility.
- F. Salvage and Reuse: Recovery of demolition or construction waste and subsequent incorporation into the Work.
- G. Solid Waste: Any garbage, refuse or material planned for disposal.

## PART 2 – PRODUCTS (NOT USED)

### PART 3 – EXECUTION

### 3.1 DISPOSAL OF WASTE

- A. General: Except for items or materials to be salvaged, recycled, or otherwise reused, remove waste materials from Project site and legally dispose of them in a landfill or incinerator acceptable to authorities having jurisdiction.
  - 1. Except as otherwise specified, do not allow waste materials that are to be disposed of accumulate on-site.
  - 2. Remove and transport debris in a manner that will prevent spillage on adjacent surfaces and areas.
- B. Burning: Do not burn waste materials.
- C. Disposal: Remove waste materials from Owner's property and legally dispose of them.

### END OF SECTION

CONSTRUCTION WASTE MANAGEMENT AND DISPOSAL

### SECTION 017700 - CLOSEOUT PROCEDURES

#### PART 1 - GENERAL

#### 1.1 SUMMARY

- A. This Section includes administrative and procedural requirements for contract closeout, including, but not limited to, the following:
  - 1. Inspection procedures.
  - 2. Project Record Documents.
  - 3. Operation and maintenance manuals.
  - 4. Warranties.
  - 5. Instruction of Owner's personnel.
  - 6. Final cleaning.

### 1.2 SUBSTANTIAL COMPLETION

- A. Preliminary Procedures: Before requesting inspection for determining date of Substantial Completion, complete the following. List items below that are incomplete in request.
  - 1. Prepare a list of items to be completed and corrected (punch list), the value of items on the list, and reasons why the Work is not complete.
  - 2. Advise Owner of pending insurance changeover requirements.
  - 3. Submit specific warranties, workmanship bonds, maintenance service agreements, final certifications, and similar documents.
  - 4. Obtain and submit releases permitting Owner unrestricted use of the Work and access to services and utilities. Include occupancy permits, operating certificates, and similar releases.
  - 5. Prepare and submit Project Record Documents, operation and maintenance manuals, Final Completion construction photographs, damage or settlement surveys, property surveys, and similar final record information.
  - 6. Deliver tools, spare parts, extra materials, and similar items to location designated by Owner. Label with manufacturer's name and model number where applicable.
  - 7. Make final changeover of permanent locks and deliver keys to Owner. Advise Owner's personnel of changeover in security provisions.
  - 8. Complete startup testing of systems.
  - 9. Submit test/adjust/balance records.
  - 10. Terminate and remove temporary facilities from Project site, along with mockups, construction tools, and similar elements.
  - 11. Advise Owner of changeover in heat and other utilities.
  - 12. Submit changeover information related to Owner's occupancy, use, operation, and maintenance.
  - 13. Complete final cleaning requirements, including touchup painting.
  - 14. Touch up and otherwise repair and restore marred exposed finishes to eliminate visual defects.
- B. Inspection: Submit a written request for inspection for Substantial Completion. On receipt of request, Engineer will either proceed with inspection or notify Contractor of unfulfilled requirements. Engineer will prepare the Certificate of Substantial Completion after inspection or will notify Contractor of items, either on Contractor's list or additional items identified by Engineer, that must be completed or corrected before certificate will be issued.
  - 1. Reinspection: Request reinspection when the Work identified in previous inspections as incomplete is completed or corrected.

2. Results of completed inspection will form the basis of requirements for Final Completion.

### 1.3 FINAL COMPLETION

- A. Preliminary Procedures: Before requesting final inspection for determining date of Final Completion, complete the following:
  - 1. Submit a final Application for Payment according to Division 1 Section "Payment Procedures."
  - 2. Submit certified copy of Engineer's Substantial Completion inspection list of items to be completed or corrected (punch list), endorsed and dated by Engineer. The certified copy of the list shall state that each item has been completed or otherwise resolved for acceptance.
  - 3. Submit evidence of final, continuing insurance coverage complying with insurance requirements.
  - 4. Submit pest-control final inspection report and warranty.
  - 5. Instruct Owner's personnel in operation, adjustment, and maintenance of products, equipment, and systems.
- B. Inspection: Submit a written request for final inspection for acceptance. On receipt of request, Engineer will either proceed with inspection or notify Contractor of unfulfilled requirements. Engineer will prepare a final Certificate for Payment after inspection or will notify Contractor of construction that must be completed or corrected before certificate will be issued.
  - 1. Reinspection: Request reinspection when the Work identified in previous inspections as incomplete is completed or corrected.

### 1.4 PROJECT RECORD DOCUMENTS

- A. General: Do not use Project Record Documents for construction purposes. Protect Project Record Documents from deterioration and loss. Provide access to Project Record Documents for Engineer's reference during normal working hours.
- B. Record Drawings: Maintain and submit one set of blue- or black-line white prints of Contract Drawings and Shop Drawings.
  - 1. Mark Record Prints to show the actual installation where installation varies from that shown originally. Require individual or entity who obtained record data, whether individual or entity is Installer, subcontractor, or similar entity, to prepare the marked-up Record Prints.
    - a. Give particular attention to information on concealed elements that cannot be readily identified and recorded later.
    - b. Accurately record information in an understandable drawing technique.
    - c. Record data as soon as possible after obtaining it. Record and check the markup before enclosing concealed installations.
    - d. Mark Contract Drawings or Shop Drawings, whichever is most capable of showing actual physical conditions, completely and accurately. Where Shop Drawings are marked, show cross-reference on Contract Drawings.
  - 2. Mark record sets with erasable, red-colored pencil. Use other colors to distinguish between changes for different categories of the Work at the same location.
  - 3. Mark important additional information that was either shown schematically or omitted from original Drawings.
  - 4. Note Construction Change Directive numbers, Change Order numbers, alternate numbers, and similar identification where applicable.
  - 5. Identify and date each Record Drawing; include the designation "PROJECT RECORD DRAWING" in a prominent location. Organize into manageable sets; bind each set with durable paper cover sheets. Include identification on cover sheets.

- C. Record Specifications: Submit one copy of Project's Specifications, including addenda and contract modifications. Mark copy to indicate the actual product installation where installation varies from that indicated in Specifications, addenda, and contract modifications.
  - 1. Give particular attention to information on concealed products and installations that cannot be readily identified and recorded later.
  - 2. Mark copy with the proprietary name and model number of products, materials, and equipment furnished, including substitutions and product options selected.
  - 3. Note related Change Orders, Record Drawings, where applicable.
- D. Record Product Data: Submit one copy of each Product Data submittal. Mark one set to indicate the actual product installation where installation varies substantially from that indicated in Product Data.
  - 1. Give particular attention to information on concealed products and installations that cannot be readily identified and recorded later.
  - 2. Include significant changes in the product delivered to Project site and changes in manufacturer's written instructions for installation.
  - 3. Note related Change Orders, Record Drawings, where applicable.
- E. Miscellaneous Record Submittals: Assemble miscellaneous records required by other Specification Sections for miscellaneous record keeping and submittal in connection with actual performance of the Work. Bind or file miscellaneous records and identify each, ready for continued use and reference.

### 1.5 OPERATION AND MAINTENANCE MANUALS

- A. Assemble a complete set of operation and maintenance data indicating the operation and maintenance of each system, subsystem, and piece of equipment not part of a system. Include operation and maintenance data required in individual Specification Sections and as follows:
  - 1. Operation Data:
    - a. Emergency instructions and procedures.
    - b. System, subsystem, and equipment descriptions, including operating standards.
    - c. Operating procedures, including startup, shutdown, seasonal, and weekend operations.
    - d. Description of controls and sequence of operations.
    - e. Piping diagrams.
  - 2. Maintenance Data:
    - a. Manufacturer's information, including list of spare parts.
    - b. Name, address, and telephone number of Installer or supplier.
    - c. Maintenance procedures.
    - d. Maintenance and service schedules for preventive and routine maintenance.
    - e. Maintenance record forms.
    - f. Sources of spare parts and maintenance materials.
    - g. Copies of maintenance service agreements.
    - h. Copies of warranties and bonds.
- B. Organize operation and maintenance manuals into suitable sets of manageable size. Bind and index data in heavy-duty, 3-ring, vinyl-covered, loose-leaf binders, in thickness necessary to accommodate contents, with pocket inside the covers to receive folded oversized sheets. Identify each binder on front and spine with the printed title "OPERATION AND MAINTENANCE MANUAL," Project name, and subject matter of contents.

### 1.6 WARRANTIES

- A. Submittal Time: Submit written warranties on request of Engineer for designated portions of the Work where commencement of warranties other than date of Substantial Completion is indicated.
- B. Partial Occupancy: Submit properly executed warranties within 15 days of completion of designated portions of the Work that are completed and occupied or used by Owner during construction period by separate agreement with Contractor.
- C. Organize warranty documents into an orderly sequence based on the table of contents of the Project Manual.
  - 1. Bind warranties and bonds in heavy-duty, 3-ring, vinyl-covered, loose-leaf binders, thickness as necessary to accommodate contents, and sized to receive 8-1/2-by-11-inch paper.
  - 2. Provide heavy paper dividers with plastic-covered tabs for each separate warranty. Mark tab to identify the product or installation. Provide a typed description of the product or installation, including the name of the product and the name, address, and telephone number of Installer.
  - 3. Identify each binder on the front and spine with the typed or printed title "WARRANTIES," Project name, and name of Contractor.
- D. Provide additional copies of each warranty to include in operation and maintenance manuals.

### PART 2 – PRODUCTS

### 2.1 MATERIALS

A. Cleaning Agents: Use cleaning materials and agents recommended by manufacturer or fabricator of the surface to be cleaned. Do not use cleaning agents that are potentially hazardous to health or property or that might damage finished surfaces.

### PART 3 - EXECUTION

#### 3.1 FINAL CLEANING

- A. General: Provide final cleaning. Conduct cleaning and waste-removal operations to comply with local laws and ordinances and Federal and local environmental and antipollution regulations.
- B. Cleaning: Employ experienced workers or professional cleaners for final cleaning. Clean each surface or unit to condition expected in an average commercial building cleaning and maintenance program. Comply with manufacturer's written instructions.
  - 1. Complete the following cleaning operations before requesting inspection for certification of Substantial Completion for entire Project or for a portion of Project:
    - a. Clean Project site, yard, and grounds, in areas disturbed by construction activities, including landscape development areas, of rubbish, waste material, litter, and other foreign substances.
    - b. Sweep paved areas broom clean. Remove petrochemical spills, stains, and other foreign deposits.
    - c. Rake grounds that are neither planted nor paved to a smooth, even-textured surface.
    - d. Remove tools, construction equipment, machinery, and surplus material from Project site.
    - e. Remove snow and ice to provide safe access to building.

#### CLOSEOUT PROCEDURES

- f. Clean exposed exterior and interior hard-surfaced finishes to a dirt-free condition, free of stains, films, and similar foreign substances. Avoid disturbing natural weathering of exterior surfaces. Restore reflective surfaces to their original condition.
- g. Remove debris and surface dust from limited access spaces, including roofs, plenums, shafts, trenches, equipment vaults, manholes, attics, and similar spaces.
- h. Sweep concrete floors broom clean in unoccupied spaces.
- i. Vacuum carpet and similar soft surfaces, removing debris and excess nap; shampoo if visible soil or stains remain.
- j. Clean transparent materials, including mirrors and glass in doors and windows. Remove glazing compounds and other noticeable, vision-obscuring materials. Replace chipped or broken glass and other damaged transparent materials. Polish mirrors and glass, taking care not to scratch surfaces.
- k. Remove labels that are not permanent.
- 1. Touch up and otherwise repair and restore marred, exposed finishes and surfaces. Replace finishes and surfaces that cannot be satisfactorily repaired or restored or that already show evidence of repair or restoration.
  - 1) Do not paint over "UL" and similar labels, including mechanical and electrical nameplates.
- m. Wipe surfaces of mechanical and electrical equipment, and similar equipment. Remove excess lubrication, paint and mortar droppings, and other foreign substances.
- n. Replace parts subject to unusual operating conditions.
- o. Clean plumbing fixtures to a sanitary condition, free of stains, including stains resulting from water exposure.
- p. Replace disposable air filters and clean permanent air filters. Clean exposed surfaces of diffusers, registers, and grills.
- q. Clean ducts, blowers, and coils if units were operated without filters during construction.
- r. Clean light fixtures, lamps, globes, and reflectors to function with full efficiency. Replace burned-out bulbs, and those noticeably dimmed by hours of use, and defective and noisy starters in fluorescent and mercury vapor fixtures to comply with requirements for new fixtures.
- s. Leave Project clean and ready for occupancy.
- C. Comply with safety standards for cleaning. Do not burn waste materials. Do not bury debris or excess materials on Owner's property. Do not discharge volatile, harmful, or dangerous materials into drainage systems. Remove waste materials from Project site and dispose of lawfully.

END OF SECTION

### SECTION 023219 – EXPLORATORY EXCAVATIONS

### PART 1 – GENERAL

#### 1.1 SUMMARY

A. This section includes exploratory excavations for the purpose of verifying the exact locations of underground utilities, structures, and other subsurface conditions.

#### 1.2 SUBMITTALS

- A. Sketches: Submit a sketch showing the location of the subsurface features which were uncovered in the test pit, including the following information:
  - 1. Horizontal location of the subsurface feature relative to three individual surface features.
  - 2. Depth of feature below ground surface.
  - 3. Diameter, type, material, and condition of pipe or conduit.
  - 4. Orientation of pipe, conduit, or structure relative to other site features.
  - 5. Other pertinent dimensions.
  - 6. Exploratory excavation identification number.
  - 7. Discrepancies from design plan.

#### 1.3 JOB CONDITIONS

- A. Perform exploratory excavations only within the limits of the work, easements, and rights of way.
- B. Excavate exploratory excavations with care to avoid damage to structures and utilities. Excavate by hand if necessary. Promptly repair any damaged utilities and structures at no cost to the Owner.

## PART 2 - PRODUCTS - NOT APPLICABLE

#### PART 3 - EXECUTION

### 3.1 GENERAL

- A. Exploratory excavations shall be performed in advance of construction, where necessary, at the locations shown on the Drawings or where directed by the Engineer. Determine the exact location of all pipes, conduits, duct, or other interfering structures in both horizontal and vertical locations. Excavate to the depth and width necessary to accurately determine the locations of the utilities of interest.
- B. Upon satisfactory execution of the required exploratory excavations the Engineer shall adjust pipe elevations, alignment, or design he feels necessary to minimize interferences.
- C. Backfill exploratory excavations in accordance with Division 31 Section "Trenching and Backfilling."

- D. Exploratory excavations performed in areas to be further disturbed shall be graded for temporarily traffic or use.
- E. Exploratory Excavations performed in areas not to be further disturbed shall be restored to preconstruction conditions.

END OF SECTION

#### EXPLORATORY EXCAVATIONS

### SECTION 023313 – UNDERGROUND UTILITY LOCATOR SERVICE

### PART 1 – GENERAL

#### 1.1 SUMMARY

- A. This Section includes provisions for the underground locating services.
- B. Underground utilities shall be located prior to any underground excavation work including, but not limited to, utility repair, geotechnical investigations, landscaping, post hole digging, installation of signs, and tent placement.

#### 1.2 REFERENCES

- A. All published standards of the following associations/organizations, as mandated by specific state standards, shall be followed and applied as a minimum:
  - 1. American Society of Civil Engineers, CI/ASCE 38-02, "Standard Guideline for the Collection and Depiction of Existing Subsurface Utility Data."
  - 2. "American Public Works Association, Uniform Color Code."

#### 1.3 DEFINITIONS

- A. Utility Quality Levels:
  - Level A: Precise horizontal and vertical location of utilities obtained by the actual exposure (or verification of previously exposed and surveyed utilities) and subsequent measurement of subsurface utilities, usually at a specific point. Minimally intrusive excavation equipment is typically used to minimize the potential for utility damage. A precise horizontal and vertical location, as well as other utility attributes, is shown on plan documents. Accuracy is typically set to 15 mm vertical and to applicable horizontal survey and mapping accuracy as defined or expected by the project owner.
  - 2. Level B: Information obtained through the application of appropriate surface geophysical methods to determine the existence and approximate horizontal position of subsurface utilities. Quality level B data should be reproducible by surface geophysics at any point of their depiction. This information is surveyed to applicable tolerances defined by the project and reduced onto plan documents.

### 1.4 DESCRIPTION

- A. Retain an independent utility locator service company to field locate and mark existing underground utilities and service connections. The word "independent" as used above means a person not in the regular employment of the Contractor or having any vested interest in the Contractor's business.
  - 1. Level B locator service shall be performed in all project areas where excavations, regrading of the ground surface, and penetrations of the ground surface are to be performed.
- B. Contractor shall include a minimum of **2** hours of Level A locator service to locate underground utilities as identified on the Contract Drawings or as identified during the Level B investigation that require more specific location, invert elevation, size, etc. Level A investigation shall only be performed at locations where shown or as directed.
  - 1. In heavy metal areas, such as near perimeter fences, ground penetrating radar shall be used to determine the location of underground utilities. The use of equipment that induce a tracing signal along the utility path (such as a Metrotech unit) can cause false readings shall not be used within 5 feet of fences.

#### UNDERGROUND UTILITY LOCATOR SERVICE

- 2. The Level A investigation shall be performed as follows:
  - a. Vacuum excavation.
  - b. All excavation test pits shall be backfilled by close of business that day.
- C. Support and protect all utilities and service connections to remain in place.
- D. The locator service shall field locate and mark underground utilities and service connections prior to excavation.
- E. The Contractor shall be responsible for coordinating the extent of the areas of subsurface investigation required to locate all underground utilities and service connections in the areas of excavation.
- F. All costs associated with the repair of underground utilities and service connections hit/damaged during the investigative work shall be the responsibility of the Contractor.
- G. Utility location services shall be in accordance with the provisions of CIASCE 38-02, "Standard Guideline for the Collection and Depiction of Existing Subsurface Utility Data."

### 1.5 SUBMITTALS

- A. Quality Control Submittals:
  - 1. Submit detailed experience and qualification information about the underground utility locator service company and the persons that will be performing the Work. Detailed experience and qualification information shall include:
    - a. Minimum of 5 years of experience in field locating, marking, and staking out of existing underground utilities and service connections.
      - 1) Qualifying Experience: Project information of 5 similar projects, which the locator service company, had worked on during the past 5 years. Information shall include for each project:
        - a) Name and address of project.
        - b) Dates worked on project.
        - c) Name and telephone number of contact person at the project site for which the locator service was performed.
    - b. Description of types of utility locator equipment (investigation equipment) that company will utilize to perform the underground utility investigation.
    - Names of persons that the persons that will be performing the Work including the number of years of experience and training that the persons have in the use of the equipment. Include copy of training certificates for locator equipment proving the person performing the locator service are trained on the equipment being used.
  - 2. Submit Quality Control Submittals within 10 days of contract award and before any excavation occurs.
- B. Schedules:
  - 1. Provide a schedule for the Underground Utility Locator Service Work required to the Engineer for approval. Upon approval of the schedule, notify the Engineer a minimum of 3 working days prior to performing the Work.

- C. Investigative Report:
  - 1. Submit detailed written report and scaled drawings of the subsurface investigation, documenting all underground utilities and service connections located and identified.
    - a. All documentation shall be referenced to existing data (horizontal and vertical) previously established.
    - b. Provide three (3) paper copies and one (1) electronic copy of detailed written report and drawings.
  - 2. Submit Investigative Report at least 1 week prior to advancing construction within the scheduled areas of excavation within the Project Site.

#### 1.6 COORDINATION AND SCHEDULING

- A. Coordinate the Work to determine the extent of the areas of subsurface investigation required to locate all underground utilities and service connections in the areas of excavation.
- B. Coordinate the Work with the Engineer to minimize utility disruptions and facility operations.
- C. Within the areas of excavation, all underground utilities and service connections shall be field located and their locations marked at least 1 week prior to the performance of the required excavation work.

#### PART 2 – PRODUCTS – NOT USED

#### PART 3 – EXECUTION

#### 3.1 WORK AREAS AND PERFORMANCE

- A. If any underground utilities and service connections are hit or damaged during the Work, immediately inform the Engineer for directions on how to proceed.
- B. The utility locator service investigative work, field location, and marking of underground utilities and service connections and submission of the Investigative Report must be completed before any excavation work can begin.
  - 1. Contractor shall maintain markings throughout the contract duration or until a time when directed (in writing) by the Engineer that maintaining of the markings are no longer required.
- C. Provide subsurface investigation information, detailed written report, and drawings of the subsurface investigation, documenting all underground utilities and service connections located and identified prior to the performance of the required excavation work.
- D. If during the Level B investigations, unknown underground utilities are discovered, the Engineer shall be notified as soon as possible or before the close of that business day.
- E. Field marking of underground utilities shall follow the American Public Works Association (APWA) uniform color code:
  - 1. White: Proposed excavation.
  - 2. Pink: Temporary survey markings.
  - 3. Red: Electric power lines, cables, conduit and lighting cables.
  - 4. Yellow: Gas, oil, steam, petroleum and gaseous material.
  - 5. Orange: Communications, alarm, signal lines, cables, or conduit.
  - 6. Blue: Potable water.

#### UNDERGROUND UTILITY LOCATOR SERVICE

- 7. Purple: Reclaimed water, irrigation, and slurry lines.
- 8. Green: Sewer and drain lines.

END OF SECTION

#### UNDERGROUND UTILITY LOCATOR SERVICE

### SECTION 310519.13 - GEOTEXTILES

### PART 1 – GENERAL

#### 1.1 SUMMARY

A. This Section includes the installation of separation/stabilization fabric as shown on the Drawings and as specified herein.

#### 1.2 QUALITY ASSURANCE

- A. The latest edition of the following standards, as referenced herein, shall be applicable.
  - 1. American Society for Testing and Materials (ASTM).
  - 2. Roads & Bridge Specifications, Virginia Department of Transportation (VDOT) Standards, latest edition

#### 1.3 SUBMITTALS

- A. Product Data:
  - 1. Submit Manufacturer's material specifications, product literature and installation instructions.

### 1.4 DELIVERY, STORAGE, AND HANDLING

- A. Delivery:
  - 1. Deliver sufficient materials to the site to prevent interruption of the work.
  - 2. All materials shall be inspected by Contractor upon delivery. Contractor shall notify Engineer of any damage. Products received at the site torn, with holes, deteriorated, or otherwise damaged will not be approved and shall be returned and replaced at no expense to the Owner.

#### B. Storage:

- 1. All material shall be stored in strict accordance with the manufacturer's recommendations and as approved by the Engineer.
- 2. Do not store products directly on ground. Ship and store geotextile with suitable wrapping for protection against moisture and ultraviolet exposure. Store geotextile in way that protects it from elements, if stored outdoors, elevate, and protect geotextile with waterproof cover.
- C. Handling:
  - 1. All material shall be handled in strict accordance with the manufacturer's recommendations and as approved by the Engineer.

#### PART 2 – PRODUCTS

### 2.1 NONWOVEN GEOTEXTILE

- A. Separation/Filtration Fabric: To be used in drainage ditches, haybale installation, culvert outfall installations, rip-rap outfall installations, and cover material separation
- B. Pervious sheet of polyester, polypropylene, or polyethylene fabricated into stable network of fibers that retain their relative position with respect to each other. Nonwoven geotextile shall be composed

GEOTEXTILES

of continuous or discontinuous (staple) fibers held together through needle-punching, spun-bonding, thermal-bonding, or resin-bonding.

- C. Geotextile Edges; selvaged or otherwise finished to prevent outer material from pulling away from geotextile.
- D. Unseamed Sheet Width: Minimum 12 feet.
- E. Physical Properties: Conform to the requirements noted below:

PROPERTY	DESIGN VALUE	TEST METHOD
Tensile Strength	160 pounds	ASTM D4632
Elongation	50 percent	ASTM D4632
Trapezoidal Tear	60 pounds	ASTM D4533
CBR Puncture Strength	400 pounds	ASTM D6241
A.O.S.	70 (US Sieve)	ASTM D4751
Permittivity	$1.4 \text{ sec}^{-1}$	ASTM D4491

### PART 3 – EXECUTION

#### 3.1 GENERAL

A. The Contractor shall be responsible for the installation and seaming of geotextile fabric in accordance with the specifications and the manufacturer's recommendations, as approved by the Engineer.

#### 3.2 SUBGRADE PREPARATION

- A. Surfaces to be covered with geotextile fabric shall be smooth and free of rocks, sticks, roots, sharp objects, and all debris that may damage the fabric. The surface to be covered shall be firm and unyielding, with no sudden changes or breaks in grade. There shall be no standing water or excessive moisture on the surface when the fabric is placed.
- B. The compacted subgrade shall be maintained in a smooth, uniform, and compacted condition during installation of the fabric.

#### 3.3 GEOTEXTILE INSTALLATION

- A. The fabric shall be cleaned of all debris or other materials that may negatively affect the fabric's performance.
- B. Mechanical equipment shall not be permitted to operate directly on the fabric unless authorized to do so by the manufacturer and approved by the Engineer.
- C. Geotextile Placement:
  - 1. Fabric shall be placed as recommended by the manufacturer and approved by the Engineer on surfaces which have been prepared to conform with these Specifications and found acceptable for fabric installation.
  - 2. The fabric shall be placed as smooth and wrinkle-free as possible.
  - 3. When installing geotextile in trenches, swales, ditches, etc., overlap geotextile in the direction of flow.
  - 4. All areas of fabric damaged during installation as determined by the Engineer shall be repaired or replaced by the Contractor as specified at no additional cost to the Owner. Should the fabric

#### GEOTEXTILES

be damaged during any step of the installation, the damaged section shall be repaired by covering it with a piece of fabric which extends at least 24 inches in all directions beyond the damaged area. The fabric shall be secured by sewing or bonding as approved by the Engineer.

- 5. At time of installation, fabric will be rejected if it has defects, ribs, holes, flaws, deterioration, or damage incurred during manufacture, transportation, handling, or storage. Damaged materials shall be removed and replaced at no additional cost to the Owner.
- 6. Fabric shall be placed with long dimension down slope.
- 7. Fabric shall be protected at all times during construction from contamination by surface run-off and any fabric so contaminated shall be removed and replaced with uncontaminated fabric.
- D. Seams and Overlaps of Geotextile:
  - 1. All overlaps shall be a minimum of 18 inches (450 mm).

### 3.4 COVER MATERIALS OVER GEOTEXTILES

- A. Granular materials shall be placed on geotextiles as shown on the Drawings. During backdumping and spreading, a minimum depth of 6 inches of granular material shall be maintained at all times between the fabric and wheels of trucks or spreading equipment. All equipment used in spreading or traveling on the cover layer for any reason shall exert low ground pressures and shall be approved by the manufacturer and Engineer. Dozer blades, etc., shall not make direct contact with the fabric; however, if tears occur in the fabric during the spreading operation, the granular material shall be cleared from the fabric and the damaged area repaired as previously described.
- B. The granular material shall be spread in the direction of fabric overlap. Large fabric wrinkles which may develop during the spreading operations shall be folded and flattened in the direction of the spreading. Occasionally, large folds may reduce the fabric overlap width. Special care shall be given to maintain proper overlap and fabric continuity.
- C. All equipment spreading cover material or traveling on the cover layer shall avoid making sharp turns, quick stops, or quick starts.
- D. Fabric shall be covered as soon as possible after placement to minimize exposure to sunlight. Fabric shall not be exposed for more than 5 days.

### 3.5 DISPOSAL OF SCRAP MATERIALS

A. On completion of installation, the Contractor shall legally dispose of all trash and scrap material offsite or in a location approved by the Owner and Engineer, remove equipment used in connection with the work herein, and shall leave the premises in a neat acceptable manner.

#### END OF SECTION

**GEOTEXTILES** 

### SECTION 311000 - SITE CLEARING

### PART 1 – GENERAL

### 1.1 SUMMARY

- A. This Section includes the following:
  - 1. Protecting existing trees, shrubs, groundcovers, plants, and grass to remain.
  - 2. Removing existing trees, shrubs, groundcovers, and grass.
  - 3. Clearing and grubbing.
  - 4. Stripping and stockpiling topsoil.
  - 5. Removing above- and below-grade site improvements.

### 1.2 DEFINITIONS

- A. Topsoil: Natural or cultivated surface-soil layer containing organic matter and sand, silt, and clay particles; friable, pervious, and black or a darker shade of brown, gray, or red than underlying subsoil; reasonably free of subsoil, clay lumps, gravel, and other objects more than 2 inches (50 mm) in diameter; and free of subsoil and weeds, roots, toxic materials, or other non-soil materials.
- B. Tree Protection Zone: Area surrounding individual trees or groups of trees to be protected during construction and defined by the drip line of individual trees or the perimeter drip line of groups of trees, unless otherwise indicated.
- C. Grubbing: Removal of vegetation and other organic matter including stumps, buried logs, and roots.

#### 1.3 MATERIAL OWNERSHIP

A. Except for excess stripped topsoil or other materials indicated to remain Owner's property, cleared materials shall become Contractor's property and shall be removed from Project site.

## 1.4 SUBMITTALS

- A. Photographs or videotape, sufficiently detailed, of existing conditions of trees and plantings, adjoining construction, and site improvements that might be misconstrued as damage caused by site clearing.
- B. Record drawings, according to Section "Project Record Documents," identifying and accurately locating capped utilities and other subsurface structural, electrical, and mechanical conditions.
- C. Certification: Submit written certification by qualified arborist that trees indicated to remain have been protected during the course of construction in accordance with recognized standards and that where damage did occur, trees were promptly and properly treated. Indicate which damaged trees (if any) are incapable of retaining full growth potential and are recommended to be replaced.

### 1.5 QUALITY ASSURANCE

- A. Stake limits of clearing, grubbing, and stripping, prior to commencing of work.
- B. Arborist Qualifications: Engage a qualified arborist who has successfully completed tree protection and trimming, to perform the following work:
  - 1. Remove branches from trees that are to remain, if required.

#### SITE CLEARING

- 2. Recommend procedures to compensate for loss of roots and perform initial pruning of branches and stimulation of root growth where removed to accommodate new construction.
- 3. Recommend procedures for excavation and grading work juxtaposed to established plants.
- 4. Perform tree repair work for damage incurred by new construction.

# 1.6 PROJECT CONDITIONS

- A. Traffic: Minimize interference with adjoining roads, streets, walks, and other adjacent occupied or used facilities during site-clearing operations.
  - 1. Do not close or obstruct streets, walks, or other adjacent occupied or used facilities without permission from Owner and authorities having jurisdiction.
  - 2. Provide alternate routes around closed or obstructed traffic ways if required by authorities having jurisdiction. Detour routes shall be identified by adequate signs in accordance with the MUTCD.
- B. Protect areas outside limits of disturbance from encroachment by construction personnel or equipment, regardless of property Ownership. Access shall be by specific, written permission or easement only
- C. Salvageable Improvements: Carefully remove items indicated to be salvaged and deliver to storage location defined on the plans or specified here in.
- D. Utility Locator Service: Properly notify utility locator service for area where Project is located before site clearing in accordance with local protocol.
- E. Do not commence site clearing operations until temporary erosion and sedimentation control measures are in place.
- F. Contractor shall verify existing grades prior to performing work under this section. If existing grades are at variance with the drawings, notify the Owner and receive instructions prior to proceeding. No additional compensation will be considered resulting from grade variances once site clearing has commenced.

## PART 2 – PRODUCTS (NOT USED)

## PART 3 – EXECUTION

## 3.1 PREPARATION

- A. Protect and maintain benchmarks and survey control points from disturbance during construction.
- B. Locate and clearly flag, fence and protect trees and vegetation to remain or to be relocated.
- C. Remove branches from trees that are to remain, if required to clear new construction and only if specifically approved by Owner or Engineer.
  - 1. Where directed by Engineer, extend pruning operation to restore natural shape of entire tree.
  - 2. Cut branches and roots, if required, with sharp pruning instruments; do not break or chop.
- D. Protect existing site improvements to remain from damage during construction.
  - 1. Restore damaged improvements to their original condition, as acceptable to Owner.

SITE CLEARING

### 3.2 TREE PROTECTION

- A. Erect and maintain temporary fencing around tree drip line before starting site clearing. Remove fence when construction is complete.
  - 1. Do not store construction materials, debris, or excavated material within fenced area.
  - 2. Do not permit vehicles, equipment, or foot traffic within fenced area.
  - 3. Maintain fenced area free of weeds and trash.
- B. Do not machine excavate within tree drip line.
- C. Where excavation for new construction is required within tree drip line, hand clear and excavate to minimize damage to root systems. Use narrow-tine spading forks, comb soil to expose roots, and cleanly cut roots as close to excavation as possible.
- D. Do not allow exposed roots to dry out before permanent backfill is placed; provide temporary earth cover or pack with peat moss and wrap with burlap. Water and maintain in moist condition and temporarily support and protect from damage until permanently relocated and covered with earth.
  - 1. Temporarily support and protect roots from damage until they are permanently redirected and covered with soil.
  - 2. Coat cut faces of roots more than 1-1/2 inches in diameter with an emulsified asphalt or other approved coating formulated for use on damaged plant tissues.
  - 3. Backfill with soil as soon as possible.
  - 4. Where trenching for utilities is required within drip line, tunnel under or around roots by hand digging. Do not cut main lateral roots or tap roots; cut only smaller roots that interfere with installation of new work. Cut roots with sharp pruning instruments; do not break or chop.
- E. Repair or replace trees and vegetation indicated to remain that are damaged by construction operations, in a manner approved by Engineer and acceptable to the Owner.
  - 1. Employ an arborist, licensed in jurisdiction where Project is located, to submit details of proposed repairs and to repair damage to trees and shrubs.
  - 2. Replace trees that cannot be repaired and restored to full-growth status, as determined by Engineer and acceptable.

#### 3.3 CLEARING AND GRUBBING

- A. Completely remove obstructions, trees, shrubs, stumps, roots, grass, and other vegetation to permit installation of new construction.
  - 1. Do not remove trees, shrubs, and other vegetation indicated to remain or to be relocated.
  - 2. Cut minor roots and branches of trees indicated to remain in a clean and careful manner where such roots and branches obstruct installation of new construction.
  - 3. Use only hand methods for grubbing within tree protection zone.
  - 4. Chip removed tree branches and dispose of off-site.
- B. Fill depressions caused by clearing and grubbing operations in accordance with Section "Earth Moving" unless further excavation or earthwork is indicated.
  - 1. Place fill material in horizontal layers not exceeding a loose depth of 8 inches and compact each layer to a density equal to adjacent original ground.

## 3.4 TOPSOIL STRIPPING

A. Remove sod and grass before stripping topsoil.

- B. Where trees are designated to remain, stop topsoil stripping and adequate distance from the trees to prevent damage to the main root system.
- C. Strip topsoil to whatever depths are encountered in a manner to prevent intermingling with underlying subsoil or other waste materials.
  - 1. Remove subsoil and non-soil materials from topsoil, including trash, debris, weeds, roots, and other waste materials.
- D. Stockpile topsoil materials away from edge of excavations without intermixing with subsoil. Grade and shape stockpiles to drain surface water. Cover to prevent windblown dust.
  - 1. Limit height of topsoil stockpiles to 72 inches.
  - 2. Do not stockpile topsoil within tree protection zones.
  - 3. Dispose of excess topsoil as specified for waste material disposal.

### 3.5 SITE IMPROVEMENTS

- A. Remove existing above- and below-grade improvements as indicated and as necessary to facilitate new construction.
- B. Remove slabs, paving, curbs, gutters, and aggregate base as indicated.
  - 1. Unless existing full-depth joints coincide with line of demolition, neatly saw-cut length of existing pavement to remain before removing existing pavement. Saw-cut faces vertically.
  - 2. Paint cut ends of steel reinforcement in concrete to remain to prevent corrosion.

# 3.6 DISPOSAL

A. Burning of debris onsite is not permitted.

## END OF SECTION

### SECTION 312000 - EARTH MOVING

#### PART 1 - GENERAL

#### 1.1 SUMMARY

- A. This Section includes the preparation of the site, protection, excavation, embankment, drainage, dewatering, for site grading, as shown on the Drawings, and as herein specified.
- B. The Contractor shall accept the site in the condition in which it exists at the time of the award of the Contract.
- C. The Engineer shall determine the suitability of materials that are to be used in the work and should any materials encountered be unsatisfactory for the purpose intended, they shall be removed from the site at the Contractor's expense.

### 1.2 QUALITY ASSURANCE

- A. Reference Standards:
  - 1. The latest edition of the following standards, as referenced herein, shall be applicable.
    - a. Roads & Bridge Specifications, Virginia Department of Transportation (VDOT) Standards, latest edition.
    - b. "Standard Specifications for Highway Materials and Methods of Sampling and Testing, American Association of State Highway and Transportation Officials (AASHTO)."
- B. The Contractor shall comply with the requirements for soil erosion and sedimentation control, and other requirements of governmental authorities having jurisdiction, including the Commonwealth of Virginia.
- C. The Contractor shall provide and pay for all costs in connection with an approved independent testing facility to determine conformance of soils and aggregate with the specifications in accordance with Section "Quality Requirements."

### 1.3 SUBMITTALS

- A. Samples:
  - 1. The Contractor shall furnish earth materials to the testing laboratory for analysis and report, as directed by the Engineer, or as outlined in the specifications.
- B. Test Results:
  - 1. The testing laboratory shall submit written reports of all tests, investigations, and recommendations to the Contractor and the Engineer.

### 1.4 PROJECT REQUIREMENTS

- A. Notify the Engineer of any unexpected subsurface condition.
- B. Protection of Existing Utilities:
  - 1. Locate existing underground utilities in areas of work. If utilities are to remain in place, provide adequate support and protection during earthwork operations, comply with OSHA requirements.

- 2. Coordinate interruption and/or termination of utilities with the utility companies and the Owner.
- 3. Provide a minimum of 48 hours' notice to the Owner and receive written notice to proceed before interrupting any utility.
- 4. Demolish and completely remove from the site any existing underground utilities designated to be removed as shown on the Drawings or as specified in Section "Site Clearing."
- 5. Repair any damaged utilities as acceptable to the Engineer, at no additional cost to the Owner.
- C. Protection of Persons and Property:
  - 1. Barricade open excavations occurring as part of this work, and post with warning lights.
  - 2. Operate warning lights as recommended by authorities having jurisdiction.
  - 3. Protect structures, utilities, sidewalks, pavements, and other facilities from damage caused by settlement, lateral movement, undermining, washout, and other hazards created by earthwork operations.
  - 4. Perform excavation within drip-line of large trees to remain by hand and protect the root system from damage or dryout to the greatest extent possible. Maintain moist conditions for root system and cover exposed roots with burlap. Paint root cuts of 1-inch diameter and larger with emulsified asphalt tree paint.

# PART 2 – PRODUCTS

# 2.1 PRECONSTRUCTION MATERIAL QUALIFICATION TESTING

- A. A 100-pound minimum representative sample shall be obtained from each potential borrow source. If different material gradations are known to exist in the pit, samples shall be obtained for each material. Each sample shall be mixed thoroughly and reduced to test specimen size, in accordance with AASHTO T87. The test shall be performed in the order shown. Failure to pass any test is grounds for disqualification and shall lead to cessation of the test program for that material.
  - 1. Particle Size Analysis:
    - a. Method: ASTM D422.
    - b. Number of Tests: One (1) per potential source.
    - c. Acceptance Criteria: Gradation within specified limits.
  - 2. Maximum Density Determination:
    - a. Method: ASTM D1557, Modified Proctor.
    - b. Number of Tests: One (1) per potential source.
  - 3. Re-establish gradation and maximum density of fill material if source is changed during construction.

## 2.2 SOIL MATERIALS

- A. General: Provide borrow soil materials when sufficient satisfactory soil materials are not available from excavations.
- B. Satisfactory Soils: Soil Classifications that are listed as satisfactory soils.
- C. Unsatisfactory Soils: Soil Classifications that are not listed as satisfactory soils.
  - 1. Unsatisfactory Soils also include satisfactory soils not maintained within 2 percent of optimum moisture content at time of compaction.

- D. Aggregate Base Course: VDOT Section 203, coarse-graded crushed stone, size No. 21A. Drainage Coarse may be used for Aggregate Base Coarse where indicated on the Drawings.
- E. Engineered Fill: Naturally or artificially graded mixture of natural or crushed gravel, crushed stone, and natural or crushed sand; ASTM D 2940; with at least 90 percent passing a 1-1/2 inch sieve and not more than 12 percent passing a No. 200 sieve.
- F. Bedding Coarse: Naturally or artificially graded mixture of natural or crushed gravel, crushed stone, and natural or crushed sand.
  - 1. For water service piping including domestic and fire services, No. 8 or smaller conforming to the requirements of VDOT Section 203.
  - 2. For storm and sanitary piping, No. 25 or No. 26 conforming to the requirements of VDOT Section 205.
- G. Class I Trench Backfill: In accordance with VDOT Section 302.g.
- H. Class II Trench Backfill: In accordance with VDOT Section 302.g.
- I. Drainage Course: VDOT Section 208, coarse graded crushed stone, size No. 57.
- J. Pea Gravel: VDOT Section 203, coarse graded crushed stone, size No. 8.
- K. Filter Stone: VDOT Section 203, coarse graded crushed stone, size No. 1.
- L. Sand: ASTM C 33; fine aggregate, natural or manufactured sand.
- M. Impervious Fill: On site or imported ASTM D 2487 Soil Classification Groups CL or CH or mixture of CH and CL capable of compacting to a dense state.
- N. Riprap: VDOT Section 414.03, various sizes; refer to drawings.

#### PART 3 - EXECUTION

- 3.1 PREPARATION
  - A. Establish required lines, levels, contours, and datum.
  - B. Maintain benchmarks and other elevation control points. Re-establish, if disturbed or destroyed, at no additional cost to the Owner.
  - C. Establish location and extent of utilities before commencement of grading operations.

#### 3.2 EXCAVATION

- A. Excavation shall consist, in general, of the excavation of whatever substance is encountered to the lines, grades, and sections shown on the Drawings including excavation as necessary for grading and other similar features.
- B. All suitable materials removed in excavation shall be used in the construction of embankments, subgrade, shoulders, slopes, and at such other places as directed. The Engineer shall be the sole judge of what constitutes suitable material.

- C. During construction, the grading operations shall be executed in such a manner that the excavation will be well drained at all times. All grading shall be finished on neat, regular lines conforming to the sections and contours shown on the Plans.
- D. Removal of materials beyond the indicated subgrade elevations, without authorization by the Engineer, shall be classified as unauthorized excavation and shall be performed at no additional cost to the Owner.
- E. Excavation shall be performed in proper sequence with all other associated operations.
- F. Maintain the slopes of excavation in a safe condition until completion of the grading operation.
- G. All excavation work shall be inspected and approved by the Engineer before proceeding with construction.
- H. Any excess excavation shall be removed from the site to disposal areas at the Contractor's expense.

### 3.3 FILL

- A. All site fill shall be "selected fill" unless otherwise shown on the Drawings or directed by the Engineer. "Select granular fill" shall be placed in lieu of selected fill where directed by the Engineer.
- B. Before depositing fills, the surface of the ground shall be cleared of all refuse, brush, and large stones. Conform to Section "Site Clearing."
- C. Prior to placing fill over undistributed material, scarify to a minimum depth of 6 inches.
- D. Where fills are made on hillsides or slopes, the slope of the original ground upon which the fill is to be placed shall be plowed or scarified deeply or where the slope ratio of the original ground is steeper than 2 horizontal to 1 vertical, the bank shall be stepped or benched.
- E. The original ground shall be proof rolled until the underlying soil is thoroughly compacted to the satisfaction of the Engineer before any filling is begun. A steel-wheel tandem roller weighing 8 to 10 tons or equipment capable of obtaining the same effort shall be used to obtain a thoroughly compacted subgrade. Remove or recompact any soft or loose soils as determined by the Engineer prior to filling.
- F. A thoroughly and satisfactorily subgrade is defined as having a minimum dry density of 95 percent of the maximum density of the material used. The subgrade material shall be compacted at a moisture content suitable for obtaining the required density.
- G. Place backfill and fill materials in layers not more than 12 inches in loose depth unless shown otherwise on the Drawings. Lift height shall be governed by the ability of the compaction equipment to obtain the required compaction with 12 inches as a maximum lift height. Before compaction, moisten or aerate each layer as necessary to facilitate compaction to the required density. Do not place backfill or fill material on surfaces that are muddy, frozen, or contain frost, ice, ponded water, or extraneous debris.
- H. When work is suspended during periods of freezing weather, measures shall be taken to prevent fill already in place from freezing. Upon resumption of work after any inclement weather, prepare the exposed surface by proof rolling to identify any zones of soft/loose soils. Soft/loose materials or frozen soils shall be removed and replaced by compacted granular fill.

- I. Moisture Control:
  - 1. Where fill or backfill must be moisture conditioned before compaction, uniformly apply water to the surface and to each layer of fill or backfill. Prevent ponding or other free water on surface subsequent to, or during, compaction operations.
  - 2. Remove and replace, or scarify and air dry, soil that is too wet to permit compaction to specified density. Soil that has been removed because it is too wet to permit compaction may be stockpiled or spread and allowed to dry. Assist drying by discing, harrowing, or pulverizing until moisture content is reduced to a value which will permit compaction to the percentage of maximum density specified.
- J. All fill shall be thoroughly and satisfactorily compacted to 95 percent of the maximum density of material used.

### 3.4 GRADING

- A. The present and finished grade lines are shown on the Drawings. Grade over the entire area, as shown on the drawings, shall be to the finished subgrade levels. Upon completion of this work, all debris shall be cleaned out and removed from the premises.
- B. All cutting, filling, backfilling and grading necessary shall be done to bring the area to the following grade or subgrade levels:
  - 1. For roadway surface areas to the finished subgrade levels specified on the contract drawings.
  - 2. For areas to be topsoiled and seeded to within 6 inches of the finished grade.
  - 3. For other surface treatments as detailed on the Drawings.
- C. Sufficient grading must be done during the progress of the work so that the entire site shall be well drained and free from water pockets.
- D. Finish grading, including dressing swales, cleaning up excess footing excavation, dressing terraces, disposing of excess material and all other work necessary to prepare the site for topsoil and seeding shall be done after construction of structures and roadway surface areas is substantially complete.

#### 3.5 COMPACTION EQUIPMENT

A. Compaction equipment used for the Work is subject to approval by the Engineer. Any equipment not originally manufactured for compaction purposes and equipment which is not in proper working order will not be approved. Furnish manufacturer's specifications covering data not obvious from a visual inspection of the equipment and necessary to determine its classification and performance characteristics.

#### 3.6 DRAINAGE AND DEWATERING

- A. Prevent surface, subsurface or ground water from flowing into excavation and from flooding project area, as well as surrounding areas.
- B. Do not allow water to accumulate in excavations. Remove water to prevent soil changes detrimental to the stability of subgrades.
- C. Provide and maintain the pumps, well points, sumps, suction and discharge lines, and other dewatering components necessary to convey water away from excavations.
- D. Provide and maintain temporary drainage ditches and other diversions outside excavation limits to convey rain water and water removed from excavations by dewatering, to collection or run-off areas.

### 3.7 FIELD QUALITY CONTROL

- A. Notify the Engineer at least one (1) working day in advance of all phases of filling and backfilling operations.
- B. Compaction testing shall be performed to ascertain the compacted density of the fill and backfill materials in accordance with the following methods:
  - 1. In-place relative density:
    - a. Method: AASHTO T310, Nuclear Method.
    - b. Number of Tests: One (1) per 8-inch vertical lift.
      - 1) Paved and Building Slab Areas: At subgrade and at each compacted fill and backfill layer, at least one (1) test for every 2,000 square feet or less of paved area of building slab, but in no case fewer than three (3) tests.
- C. The Engineer may direct additional tests to establish gradation, maximum density, and in-place density as required by working conditions, at the Contractor's expense.
- D. Acceptance Criteria: The sole criterion for acceptability of in-place fill shall be in situ dry density. Minimum dry density for all fill or backfill shall be 95 percent of the maximum dry density. If a test fails to qualify, the fill shall be further compacted and retested. Subsequent test failures shall be followed by removal and replacement of the material.

## 3.8 CLEAN UP

- A. Provide and maintain protections or newly filled areas against damage. Upon completion or when directed, correct all damaged and deficient work by building up low spots and remove temporary protections, fencing, shoring and bracing.
- B. Remove all surplus excavated material not required for filling and backfilling and legally dispose of same away from premises.
- C. Leave the premises and work in clean, satisfactory condition, ready to receive subsequent operations.

END OF SECTION

### SECTION 312500 - EROSION AND SEDIMENT CONTROL

### PART 1 – GENERAL

#### 1.1 SUMMARY

- A. This Section covers work necessary for stabilization of soil to prevent erosion and sedimentation during and after construction and land disturbing activities. The work shall include the furnishing of all labor, materials, tools, and equipment to perform the work and services necessary as herein specified and as indicated on the Drawings. This shall include installation, maintenance, and final removal of all temporary soil erosion and sediment control measures. All erosion and sediment control methods and devices used shall conform to the latest requirements imposed by federal, state, and local authorities.
- B. Comply with the latest version of Virginia Erosion and Sediment Control Handbook.
- C. The minimum areas requiring soil erosion and sediment control measures are indicated on the Drawings. The right is reserved to modify the use, location, and quantities of soil erosion and sediment control measures based on activities of the Contractor and as the Engineer considers to be the best interest of the Owner.
- D. The Contractor shall be responsible for repair of any damage caused and shall be financially responsible for any penalties imposed.

#### 1.2 QUALITY ASSURANCE

- A. Soil erosion and sediment control measures shall be implemented in accordance with the requirements and procedures outlined in this Specification, Contract Drawings and documents, state standards or guidelines for soil erosion and sediment control, and all regulatory authorities having jurisdiction. Where conflicts between requirements exist, the more restrictive rules shall govern.
- B. The Contractor shall provide all temporary control measures shown on the Drawings, or as directed by the Owner, Owner's representative, or soil conservation district for the duration of the contract. Erosion and sediment control Drawings are intended to be a guide to address the stages of work shown. Additional measures not specified on the Drawings may be necessary and shall be implemented to address intermediary stages of work and any conditions that may develop during construction at no cost to the Owner.
- C. Temporary control provisions shall be coordinated with permanent erosion control features to the extent practical to assure economical, effective, and continuous erosion and sediment control throughout the construction and post-construction period.
- D. Soil erosion and sediment control measures shall at all times be satisfactory to the Owner's Representative. Owner's Representative will inform the Contractor of unsatisfactory construction procedures and operations if observed. If the unsatisfactory construction procedures and operations are not responded to and corrected within 48 hours, the Owner's Representative may suspend the performance of any or all other construction until the unsatisfactory condition has been corrected. Such suspension shall not be the basis of any claim by the Contractor for additional compensation nor for an extension of time to complete the work. Any complaints, fines, etc. relating to ineffective erosion control, shall be the sole responsibility of the Contractor.
- E. The Contractor shall inspect all soil erosion and sediment control measures at least at the beginning and end of each day to ascertain that all devices are functioning properly during construction.

Maintenance of all soil erosion and sediment control measures on the project site shall be the responsibility of the Contractor until final stabilization is complete, and until the permanent soil erosion controls are established and in proper working condition.

F. The Contractor shall protect adjacent properties and watercourses from soil erosion and sediment damage throughout construction.

### 1.3 GENERAL

- A. Soil erosion stabilization and sediment control measures consist of the following elements:
  - 1. Maintenance of existing permanent or temporary storm drainage piping and channel systems, as necessary.
  - 2. Installation and maintenance of stabilized construction entrance(s).
  - 3. Construction of new permanent and temporary storm drainage piping and channel systems, as necessary.
  - 4. Construction of temporary erosion control facilities such as silt fences, check dams, etc.
  - 5. Topsoil and Seeding: Placement and maintenance of Temporary Seeding on all areas disturbed by construction. Placement of permanent topsoil, fertilizer, and seed, etc., in all areas not occupied by structures or pavement unless shown otherwise.
  - 6. Soil Stabilization Seeding: Placement of fertilizer and seed, etc., in areas as Specified hereinafter.
- B. The Contractor shall he responsible for phasing Work in areas allocated for his exclusive use during this Project, including any proposed stockpile areas, to restrict sediment transport. This will include installation of any temporary erosion control devices, ditches, or other facilities.
- C. The areas set aside for the Contractor's use during the Project may be temporarily developed to provide satisfactory working, staging, and administrative areas for his exclusive use. Preparation of these areas shall be in accordance with other requirements contained within these Specifications and shall he done in a manner to both control all sediment transport away from the area.
- D. Stockpiles remaining in place longer than 14 calendar days shall be considered permanent stockpiles for purposes of erosion and sediment control.
- E. All permanent stockpiles shall be seeded with soil stabilization seed and protected by construction of silt fences completely surrounding stockpiles and located within 10 feet of the toes of the stockpile slopes.
- F. Sediment transport and erosion from working stockpiles shall be controlled and restricted from moving beyond the immediate stockpile area by construction of temporary toe-of-slope ditches and accompanying silt fences as necessary. The Contractor shall keep these temporary facilities in operational condition by regular cleaning, regrading, and maintenance.
- G. The Contractor shall maintain all elements of the Soil Erosion Stabilization and Sedimentation Control systems and facilities to be constructed during this Project for the duration of his activities on this Project.
- H. Formal inspections made jointly by the Contractor and the Engineer shall be conducted every 2 weeks to evaluate the Contractor's conformance to the requirements of these Specifications.
- I. Replacement or repair of failed or overloaded silt fences, check dams, or other temporary erosion control devices shall be accomplished by the Contractor within 24 hours after receiving written notice from the Engineer.

EROSION AND SEDIMENT CONTROL

J. If the Contractor has not complied with any of the above maintenance efforts to the satisfaction of the Engineer within 2 working days after receiving written notification from the Engineer, the Owner shall have the prerogative of engaging others to perform any needed maintenance or cleanup, including removal of accumulated sediment at constructed erosion control facilities, and deduct from the Contractor's monthly partial payment the costs for such efforts in accordance with the General Conditions of the Contract.

### 1.4 SUBMITTALS

- A. Submittals shall he made in accordance with Section 013300 "Submittal Procedures."
- B. Material Certificates signed by material producer and Contractor, certifying that each material item complies with or exceeds specified requirements.
- C. Results of all tests and investigations, including recommendations.
- D. Submit product data, samples, specifications, and manufacturer's installation procedures for approval as directed by Engineer prior to use.

### PART 2 – PRODUCTS

### 2.1 GENERAL

A. Contractor shall provide all materials necessary to perform the work in accordance with the SWPPP or as shown on the Drawings or specified herein.

### 2.2 PERMANENT SEED

A. Refer to the Drawings.

#### 2.3 SOIL STABILIZATION AND TEMPORARY SEED

A. Temporary Seed: Rye grass, cereal grasses, or other quick growing species suitable to the area as a temporary cover, which will not compete with the grasses specified for permanent cover or as specified on the Drawings.

# 2.4 TOPSOIL

A. Topsoil shall be as specified in the Drawings.

#### 2.5 FERTILIZER

- A. Refer to the Drawings.
- 2.6 STRAW MULCH
  - A. Threshed straw of oats, wheat, barley, or rye, free from seed of noxious weeds or clean salt hay.

### 2.7 EROSION CONTROL BLANKET

A. Erosion Control Blanket (ECB) – Treatment 1: Biodegradable wood excelsior, straw, or coconut fiber mat enclosed in a photodegradable plastic mesh. Include manufacturer's recommended wood or steel wire staples, but no anchor/fastener shall be less than 6 inches long. Blanket shall conform to the

EROSION AND SEDIMENT CONTROL

Virginia Erosion and Sediment Control Handbook, Treatment-1 and VDOT Specifications EC-2. Blanket shall be listed on the most current VDOT "Approved Products List."

#### 2.8 HAY BALE

A. Bales shall be tightly bound, staked with 1 inch by 1 inch hardwood stakes. Hay shall be from mowings of acceptable herbaceous growth free from noxious weeds.

#### 2.9 ROCK CHECK DAM

A. Rock check dams shall be designed, installed and maintained in accordance with the requirements of Section 3.20 of the Virginia Erosion and Sediment Control Handbook.

#### 2.10 SILT FENCE

A. Silt Fence (SF) shall consist of woven geotextile fabric, posts, wire mesh backing, and fasteners meeting the requirements shown on the Drawings and Section 3.05 of the Virginia Erosion and Sediment Control Handbook.

### 2.11 COMPOST FILTER SOCK

A. Compost Filter Sock is a three-dimensional tubular sediment control device consisting of a knitted material filled with compost. The compost shall be reasonably free (<1% by dry weight) of manmade foreign matter and meet the product parameters listed in 244.02 (g) 3. Compost used in filter sock products shall be certified through the U.S. Composting Council's (USCC) Seal of Testing Assurance (STA) Program. Compost used for compost filter sock shall meet the following product size specification:

Parameters for	Gradation (units of measure)	Blanket Media to be Vegetated
Compost Filter Sock	% passing a selected mesh size, dry weight basis	2" (50 mm), 99% passing 3/8" (10 mm), 30 to 50% passing Maximum particle length of 2" (50 mm)

The knitted material for compost filter socks shall be the following:

Physical Requirements	3 mil HDPE	5 mil HDPE	3 mil HDPE	Multi-Filament Polypropylene (MFPP)	Heavy Duty Multi-Filament Polypropylene (HDMFPP)
Sock Diameters	12" 18"	12" 18" 24" 32"	12" 18" 24" 32"	12" 18" 24" 32"	12" 18" 24" 32"
Mesh Opening Tensile Strength	3/8" 26 psi	3/8" 26 psi	3/8" 26 psi	3/8" 44 psi	1/8" 202 psi

Ultraviolet Stability, % Original Strength (ASTM G155)	23% at 1000 hr.	23% at 1000 hr.	23% at 1000 hr.	100% at 1000 hr.	100% at 1000 hr.
Minimum Functional Longevity	6 months	9 months	6 months	1 year	2 years

NOTE: All material must be knitted. Extruded material will not be permitted. All material must be photo-degradable.

# PART 3 – EXECUTION

### 3.1 GENERAL

- A. The Contractor shall comply with and implement the Stormwater Pollution Plan provided in the contract documents.
- B. Review the soil erosion and sediment control Drawings as they apply to current conditions. Any deviation from the Drawings must be submitted for approval to the site Engineer in writing at least 72 hours prior to commencing that work.
- C. Initial soil sediment and erosion control devices shall be in place prior to any land disturbing activity in their proper sequence and maintained until permanent protection is established.
- D. The limit of the area of any earthwork operations in progress shall be commensurate with the Contractor's capability and progress in keeping the finished grading, mulching, seeding, and other such permanent control measures current and in accordance with the accepted schedule for construction phasing. Should seasonal limitations make such coordination unrealistic, as determined by the Owner's Representative, temporary erosion control measures shall be provided immediately by the Contractor at no expense of the Owner.
- E. Temporary erosion control measures shall be used to correct conditions which develop during construction that are needed prior to installation of permanent control features, or that are temporarily needed to control erosion that develops during normal construction practices but are not associated with permanent control features on the project.
- F. The Contractor shall incorporate all permanent erosion control features (stabilization) into the project at the earliest practical time to minimize the need for temporary controls.
- G. A stabilized construction entrance (SCE) shall be installed and maintained at any point where construction vehicles enter a public right-to-way, street, or parking area. The SCE shall be used to eliminate mud from the construction area onto public right-of-way. The SCE shall be constructed as shown on the Drawings. Any mud or debris tracked on streets shall be cleaned up immediately.
- H. Dust Control: The Contractor shall provide a commercial grade; enclosed broom mechanical street sweeper to control sediment and/or dust that is tracked on to the adjacent streets. The street sweeper shall be equipped with a water storage tank to wet the area prior to sweeping. Where on site controls do not prevent material from being tracked on to adjacent streets, the street sweeper shall be used to

clean the adjacent streets immediately. In addition, at a minimum, the adjacent streets shall be swept at the end of each day or as directed by the Engineer.

- I. Any disturbed or stockpiled areas that will be left exposed more than 14 days or less according to State NPDES General Stormwater Permits shall immediately receive temporary or permanent seeding. Mulch/straw shall be used if the season prevents the establishment of a temporary cover. Disturbed areas shall be limed and fertilized prior to temporary seeding.
- J. Permanent vegetation shall be established as specified on all exposed areas within 7 days or less according to State NPDES General Stormwater Permits after final grading. Mulch as necessary for seed protection and establishment. Lime and fertilize seedbed prior to permanent seeding.
- K. Slopes shall be permanently seeded and mulched. Any slopes that erode easily shall be temporarily seeded and mulched. Any slopes deeper than 3:1 or steeper or as indicated on Drawings shall be protected with Erosion Control Blanket per specifications.
- L. All storm drainage outlets must be stabilized, as specified, before the discharge points become operational. Equip all inlets with inlet protection immediately upon construction.
- M. Manufactured insert inlet protection shall be installed and anchored in accordance with the manufacturers recommendations and design details. The Contractor shall maintain all manufactured insert inlet protection units until the project is stabilized and shall remove and dispose of the sediment accumulation properly when the units are more than 1/3 full. Replace and reinstall the unit if necessary.
- N. Discharge from dewatering operations for the excavated areas shall not be directed to surface waters without first properly removing the suspended sediment through filtration and/or settlement. The Contractor shall obtain any required permits associated with dewatering activities.
- O. Silt fence shall be installed at locations on the Drawings and any additional locations necessary for proper sediment control. The Contractor shall maintain the silt fence until the project is stabilized and shall remove and dispose of the silt fence and silt accumulation when 1/3 the height of the fence is reached.
- P. Filter Socks shall be place at locations indicated on plans or as directed by the Engineer. They should be installed parallel to the base of the slope or other affected area. The Contractor shall maintain the Filter Socks and they shall be inspected weekly and after each rain event. If the Filter Sock requires repair, it shall be repaired in accordance with the manufacture's recommendations or replaced within 24 hours of inspection notification. Biodegradable filter socks shall be replaced after 6 months; photodegradable filter socks after 1 year. Polypropylene socks shall be replaced according to the manufacturer's recommendations.
- Q. Soil erosion and sediment control shall include but not be limited to the approved measures. The Contractor shall be responsible for providing all additional measures that may be necessary to accomplish the intent of the Drawings.
- R. Comply with all other requirements of authorities having jurisdiction.
- S. Soil Stabilization and Temporary Seeding:
  - 1. Soil stabilization seeding shall consist of the application of the following materials in quantities as further described herein for stockpiles and disturbed areas left inactive for more than 14 days.
    - a. Fertilizer.

EROSION AND SEDIMENT CONTROL

- b. Seed.
- c. Mulch.
- d. Maintenance.
- 2. Hydroseeding will be permitted as an alternative method of applying seed and associated soil conditioning agents described above. Should the Contractor elect to apply soil stabilization seeding by hydroseeding methods, he shall submit his operational plan and methods to the Engineer.
- 3. Temporary Seeding is to be placed and maintained over all disturbed areas prior to Permanent Seeding. Maintain Temporary Seeding until such time as areas are approved for Permanent Seeding. As a minimum, maintenance shall include the following:
  - a. Fix-up and reseeding of bare areas or re-disturbed areas.
  - b. Mowing for stands of grass or weeds exceeding 6 inches in height.

END OF SECTION

#### SECTION 330500 - COMMON WORK RESULTS FOR UTILITIES

#### PART 1 – GENERAL

#### 1.1 DESCRIPTION

A. Work Included: The work in this section shall include the furnishing, installation, and testing of all utility appurtenances and furnishing the equipment, labor, and appurtenances for the installation of utility appurtenances.

#### 1.2 REFERENCES

- A. General: The Work shall comply with the most recent or tentative standards as published at the date of the Contract and as listed in the Specifications using abbreviations shown.
- B. American Society for Testing and Materials (ASTM)
- C. American Water Works Association (AWWA)
- D. American National Standard Institute (ANSI)/American Society of Sanitary Engineers (ASME)
- E. American National Standard Institute (ANSI)/American Society of Sanitary Engineers (ASSE)
- F. National Sanitation Foundation Standards (NSF)
- G. Virginia Department of Transportation Road and Bridge Specifications, latest edition (VDOT)

#### 1.3 QUALITY ASSURANCE

- A. Quality Assurance: All utility appurtenances shall be new, free from defects or contamination and shall, whenever possible, be the standard product of a single manufacturer.
- B. Manufacturers Limitations: Products used in the work of this section shall be manufactured in the U.S. where possible by manufacturers regularly engaged in production of similar items.
- C. All material or products which come into contact with drinking water shall be third party certified as meeting the Specifications of the American National Institute/National Sanitation Foundation Standard 61, Drinking Water System Components- Health Effects. The certifying party shall be accredited by the American National Standards Institute.
- D. All pipe, fittings, packing, and jointing materials shall conform to Section C of the AWWA Standards.
- E. Comply with rules, regulations, and policies of the Commonwealth of Virginia.
- F. Any pipe, solder, or flux which is used in the installation or repair of any public water system, used in any plumbing which provides water through connection to a public water system for human consumption shall be lead free. Lead free, for solder and flux, means those containing not more than 0.2 percent lead. Lead free, for pipes and pipe fittings, as those containing not more than 8.0 percent lead. Leaded joints necessary for the repair of CIP shall be exempt from the above.

# 1.4 SUBMITTALS

- A. General: Submittals shall be in accordance with Section "Submittal Procedures."
- B. Certification that pipe and fittings furnished meet with applicable standards specified.
- C. Manufacturer's detailed information about pipe furnished. This information shall include, but not be limited to, pipe dimensions, composition of pipe, type of joints, fittings, gaskets, and recommendations for handling, storing, and installing pipe.
- D. When work is complete, submit "Construction Record Drawings" of pipe systems in project including project items and pre-existing items. Identify complete location, elevation, description of piping systems. Relate pipe systems to identified structures and appurtenances.
- E. Written verification of required pressure, leakage, and disinfection tests.
- F. Qualifications of lab performing disinfection analysis on water systems.

### 1.5 DELIVERY, STORAGE AND HANDLING

- A. General: Shall be in accordance with Section "Product Requirements."
- B. Inspect materials thoroughly upon arrival. Examine materials for damage. Remove damaged or rejected materials from site.
- C. Observe manufacturer's directions for delivery and storage of materials and accessories.
- D. Each joint shall be redundantly chocked at each end to prevent movement or rolling.
- E. Vehicular traffic shall not be unduly inconvenienced in placing a material along the streets or rightsof-way.
- F. Comply with VDOT requirements for storing pipe and fittings within highway rights-of-way.

## PART 2 – PRODUCTS

## 2.1 MATERIALS

A. Conform to Division 33 pipe specification(s).

### 2.2 GENERAL PIPING SYSTEMS

A. Unless otherwise shown on the Drawings or Drawing Schedule, piping system materials, fittings, and appurtenances are subject to requirements of specific technical specifications and shall be as follows:

SERVICE CATEGORY	SIZE RANGE	PIPING SYSTEM
Potable Water Piping	6 IN - 18 IN	Ductile Iron

#### COMMON WORK RESULTS FOR UTILITIES

### 2.3 TAPPING DEVICES

- A. General: All wet taps on the Owner's waterlines shall only be made with approved tapping sleeve or tapping saddle.
- B. Tapping Sleeves: Tapping sleeves are required for connecting to 2 IN and larger water mains with approved tapping valve as part of the tapping sleeve installation. Tapping sleeves and tapping valves shall be as indicated on the Drawings and in Section "Water Distribution Valves."

### 2.4 MANHOLES

A. In the event of damage to existing storm or sewer utilities, reference Section "Manholes and Structures".

### PART 3 - EXECUTION

- 3.1 EXCAVATION, BACKFILLING AND COMPACTION
  - A. General: Trench excavation shall be in accordance with Section "Trenching and Backfilling."

### 3.2 BURIED PIPE INSTALLATION

- A. General:
  - 1. Installation of all pipe, fittings, valves, specials, and appurtenances shall be subject to the review and/or approval of the Engineer.
  - 2. Install piping valves and fittings as shown, specified and as recommended by the manufacturer and in conformance with referenced standards, and approved Shop Drawings.
  - 3. Request instructions from Engineer before proceeding if there is a conflict between the manufacturer's recommendations and the Drawings or Specifications.
  - 4. All piping and appurtenances shall be inspected by the Contractor prior to installation.
  - 5. Present all conflicts between piping systems and equipment, structures or facilities to Engineer for determination of corrective measures before proceeding.
  - 6. Take field measurements prior to installation to ensure proper fitting of Work. Uncover the existing pipelines sufficiently in advance of the proposed Work in order that the type and location of the existing pipes and joints and other information required to fabricate the proposed piping can be determined. Obtain whatever information is required to complete the connections of the proposed pipelines to the existing pipelines.
  - 7. Carefully examine all piping for cracks, damage, or other defects before installation. Immediately remove defective materials from the site, unless the defective materials can be repaired in a manner acceptable to the manufacturer and Engineer. Remove, replace, or repair at the Contractor's expense piping found to be broken or defective.
  - 8. Inspect interior of all piping and mating surfaces and remove all dirt, gravel, sand, debris, or other foreign material before installation. Maintain the interior of all piping clean until acceptance of the completed Work. Prevent foreign matter from entering joint space.
  - 9. Install buried piping accurately to line and grade shown, specified or directed, unless otherwise approved by the Engineer. Use accurate means of determining and checking the alignment and grade subject to the approval of the Engineer. Remove and relay piping that is incorrectly installed at Contractor's expense.
  - 10. Do not lay piping in water, unless approved by the Engineer. Ensure that the water level in the trench is at least 6 IN below the bottom of piping. Maintain a dry trench until jointing and

backfilling are complete, unless otherwise specified in these Specifications or approved by the Engineer.

- 11. Pipe laying work shall be conducted so that trenching operations are not advanced too far ahead of the pipe laying operation resulting in excessive lengths of open trench. In general, open trench ahead of pipe laying shall not exceed 100 FT.
- 12. Start laying piping at lowest point and proceed toward the higher elevations, unless otherwise approved by the Engineer. Slope piping uniformly between elevations shown on the Drawings or as otherwise provided by the Engineer.
- 13. Where pipe crossings occur, the lower pipe shall be laid first and all backfill thoroughly compacted to the level of the higher pipe before the higher pipe is installed. Backfill material under such conditions may be earth, broken stone, or 2500 psi concrete.
- 14. Install piping so that the barrel of the piping and not the joints receives the bearing pressure from the trench bottom, or other bedding condition.
- 15. No piping shall be brought into position until the preceding length, valve, fitting, or special has been bedded and secured in place.
- 16. Whenever pipe laying is not actively in progress, the open ends of the piping shall be closed by a temporary plug or cap to prevent soil, water and other foreign matter from entering the piping.
- 17. Where required for inserting valves, fittings, special appurtenances, and closures, shall be made with a machine specially designed for cutting piping and in accordance with the manufacturer's instructions for field cutting of pipe. Make cuts carefully, without damage to piping, so as to leave a smooth end at right angles to the axis of the piping. Taper cut ends and file off sharp edges until smooth. Flame cutting will not be permitted. Replace and repair damaged piping.
- 18. Blocking under piping will not be permitted unless specifically approved by Engineer for special conditions.
- 19. Touch up protective linings and coatings prior to installation.
- 20. Rotate piping to place outlets in proper position.
- B. Bedding and Backfilling:
  - 1. Bedded and installed piping in conformance with Division 31, Section "Trenching and Backfilling" and as shown, except as otherwise specified.
  - 2. No piping shall be laid until Engineer approves the bedding condition.
  - 3. Excavation in excess of that required as shown on the Drawings or specified, which is not authorized by the Engineer, shall be at the Contractor's expense. Backfilling and compaction of the over excavated areas shall be at the Contractor's expense.
  - 4. Carefully and thoroughly compact all pipe bedding and fill up to the pipe centerline with handheld pneumatic compactors.
- C. Restraints, Supports, and Thrust Blocks:

Install restrained joints as shown, specified, required, and as recommended by manufacturer. Assembly of restrained joints shall be in strict accordance with manufacturer's recommendations.

- 1. Provide restrained joints at all fittings and to the length indicated below on both sides of all fittings:
  - a. 90-degree Bend, Tee, Wye, Cross, Valve, "Dead End": 60' minimum
  - b. 45-degree Bend: 40' minimum
  - c. 22.5-degree and 11.25-degree Bend: 20' minimum
  - d. Increase restraint length in accordance with manufacturer's instructions as necessary.

- 2. All restrained joint pipe will require retainer glands at all fittings and valves.
  - a. Retainer glands shall be Megalug Series 1100 for mechanical joint fittings or Megalug Series 1700 for push-on or couplings as manufactured by EBAA or approved equal.
- D. Transitions from One Type of Pipe to Another:
  - 1. Provide all necessary adapters, specials, and connection pieces required when connecting different types and sizes of pipe or connecting pipe made by different manufacturers.
- E. Work Affecting Existing Piping:
  - 1. Location of Existing Piping:
    - a. Locations of existing piping shown shall be considered approximate. Contractor shall perform all necessary subsurface investigation to verify actual locations in the field.
    - b. Determine exact location of existing piping to make connections, relocate, replace or which may be disturbed during earth moving operations, or which may be affected by work in any way.
    - c. Coordinate all excavations with utility companies, Owner and Engineer.
  - 2. Taking Existing Pipelines Out of Service:
    - a. Do not take pipelines out of service unless specifically approved by Engineer.
    - b. Notify Engineer at least 48 HR prior to taking any pipeline out of service.

### 3.3 SPECIFIC PIPE INSTALLATION

- A. Ductile Iron Pipe (DIP):
  - 1. Install all ductile iron piping in accordance with ANSI/AWWA C600.
  - 2. Lay pipe with bell and spigot joints with bells upstream. Lay water pipe on a continuously rising grade from low points to high points at service lines, hydrants or air valves.
  - 3. Unless otherwise noted, minimum depth of pipe shall be minimum 3 FT measured from top of pipe to finished grade.
  - 4. Field cut pipe for shorter than standard pipe lengths. Cut ends square, perpendicular to the pipe axis, and properly beveled without damaging the pipe or cement mortar lining. Do not lay cut pipe within three lengths of a bend or at the end of a line.
  - 5. Mechanical Joint Installation:
    - a. Thoroughly clean the last 8 IN of the outside of the spigot and the inside of the bell with a wire brush to remove foreign matter and paint with a soap solution prior to assembling mechanical joints.
    - b. Slip the gland and soaped rubber ring on the spigot end of the pipe immediately after applying the soap solution.
    - c. Centrally locate the spigot in the bell and push the pipe forward to seat the spigot in the bell. Press the gasket into place evenly within the bells and move the gland along the pipe into position for bolting.
    - d. Insert bolts and hand tighten all nuts. Nuts spaced 180 degrees apart shall be tightened alternately in order to produce an equal pressure on all parts of the gland. Tighten all nuts with a torque-limiting wrench in accordance with the torque recommendations of the manufacturer.
    - e. Final assembly of pipe with harnessed joints shall conform to the requirements of the manufacturer. Tighten nuts with a torque-limiting wrench in accordance with the torque recommendations of the manufacturer.

- 6. Push-On Joint Installation:
  - a. Thoroughly clean the last 8 IN of the outside of the spigot and the inside of the bell with a wire brush to remove foreign matter and paint with a soap solution prior to assembling mechanical joints.
  - b. Clean, flex, and then place the rubber gasket in the bell in accordance with the manufacturer's instructions. The gasket shall be smoothed out around the entire circumference of the bell to remove bulges and prevent interference with the proper entry of the spigot of the entering pipe section. A thin film of an approved lubricant may be applied to the surface of the gasket that will come in contact with the spigot of the entering pipe and/or the outside of the spigot of the entering pipe.
  - c. Centrally locate the spigot in the bell and push the pipe forward until it just makes contact with the gasket. After the gasket is compressed and before the spigot is installed entirely, check the gasket for proper positioning around the full circumference of the joint.
  - d. Push or pull the spigot end of the entering pipe past the gasket until it makes contact with base of the bell. Where an unreasonable amount of force is required, remove the spigot of the entering pipe and verify proper positioning of the rubber gasket. Damaged gaskets shall not be used.
  - e. Two (2) bronze wedges shall be installed at each joint in the 10 o'clock and 2 o'clock positions. Care shall be taken to ensure that the wedges do not become displaced due to pipe movement during laying and backfilling.
- 7. Joint Deflection:
  - a. When it is necessary to deflect pipe from a straight line, in either horizontal or vertical direction, the allowed deflection shall not exceed 3 degrees or what is listed in the manufacturer's installation instructions, whichever is less.
  - b. Deflect push-on joints after final joint assembly.
  - c. Deflect mechanical after joint assembly but prior to tightening bolts.

## 3.4 FIELD QUALITY CONTROL

## A. General:

- 1. Notify Engineer at least 48 HR in advance of all testing.
- 2. Provide all testing apparatus including pumps, hoses, gauges, fittings, temporary bulkheads, plugs, compressors and miscellaneous other required items.
- 3. Provide temporary blocking and bracing or approved thrust and joint restraint to prevent joint separation and pipe movement during testing.
- 4. Unless otherwise approved, conduct all tests in the presence of the Engineer and in the presence of local authorities having jurisdiction.
- 5. Water Source:
  - a. Provide all water for testing, flushing and other water uses. The source of the water shall be subject to the approval of the Engineer.
  - b. The point of introduction of water for conducting tests shall be subject to the approval of the Engineer.
- 6. All costs for tests shall be included in the Contractor's bid.
- 7. Locate, and repair or replace, section of piping which fail the test and retest until acceptance.
- B. Required Tests for Waterlines and Force Mains:
  - 1. Perform the following after the pipe has been installed and prior to final acceptance:
    - a. Pressure Test.
    - b. Leakage Test.

COMMON WORK RESULTS FOR UTILITIES

- 2. Presumptive hydrostatic tests may be performed when the system is partially backfilled to "check" the work, but final acceptance shall be based on hydrostatic tests performed on the finished system after it is completely backfilled.
- 3. Pressure Test:
  - a. Test piping to 1.5 times the pipe working pressure, or 250 psi, whichever is greater. Measure test pressures at the lowest point in the pipe section and correct to the elevation of the gauge.
  - b. Relieve trapped air at the section high points through hydrants, or taps installed for this purpose, provided temporary installations are removed and plugged after acceptance.
  - c. Maintain the test pressure for a period of 2 HR. At the end of the test period, if the test pressure remains constant, the pipe section shall have passed the test. If the pressure has dropped, it shall be brought back to the test pressure by pumping a known volume of water (by pumping from a graduated container or by metering) back into the pipe. The volume of water thus used, representing leakage from the pipe, shall be recorded. If the leakage is less than the allowable leakage specified below, the pipe shall have passed the test. If the leakage exceeds the allowable leakage specified, the Contractor shall locate the leak, permanently repair the section of pipe where the leak is occurring to the satisfaction of the Engineer, and retest the pipe as specified above.
- 4. Leakage Test:
  - a. Conduct the leakage test concurrently with the pressure test.
  - b. Perform the leakage test in accordance with all applicable AWWA standards.
  - c. The maximum allowed leakage is determined by the following formula:

$$\frac{\mathbf{L} = \mathbf{S} \times \mathbf{D} \times \mathbf{P}^{1/2}}{148,000}$$

where L = allowable leakage, in gphwhere S = length of pipe tested, in feetwhere D = nominal pipe diameter, in incheswhere P = average test pressure, in psig

HYDROSTATIC ALLOWABLE LEAKAGE PER 1,000 FEET OF PIPELINE <sup>A</sup> (gph) <sup>B</sup>													
AVG. TEST	NOMINAL PIPE DIAMETER (INCHES)												
PRESSURE (psi)	3	4	6	8	10	12	14	16	18	20	24	30	
450	0.43	0.57	0.86	1.15	1.43	1.72	2.01	2.29	2.58	2.87	3.44	4.30	
400	0.41	0.54	0.81	1.08	1.35	1.62	1.89	2.16	2.43	2.70	3.24	4.05	
350	0.38	0.51	0.76	1.01	1.26	1.52	1.77	2.02	2.28	2.53	3.03	3.79	
300	0.35	0.47	0.70	0.94	1.17	1.40	1.64	1.87	2.11	2.34	2.81	3.51	
275	0.34	0.45	0.67	0.90	1.12	1.34	1.57	1.79	2.02	2.24	2.69	3.36	
250	0.32	0.43	0.64	0.85	1.07	1.28	1.50	1.71	1.92	2.14	2.56	3.21	
225	0.30	0.41	0.61	0.81	1.01	1.22	1.42	1.62	1.82	2.03	2.43	3.04	
200	0.29	0.38	0.57	0.76	0.96	1.15	1.34	1.53	1.72	1.91	2.29	2.87	
175	0.27	0.36	0.54	0.72	0.89	1.07	1.25	1.43	1.61	1.79	2.15	2.68	
150	0.25	0.33	0.50	0.66	0.83	0.99	1.16	1.32	1.49	1.66	1.99	2.48	
125	0.23	0.30	0.45	0.60	0.76	0.91	1.06	1.21	1.36	1.51	1.81	2.27	
100	0.20	0.27	0.41	0.54	0.68	0.81	0.95	1.08	1.22	1.35	1.62	2.03	

<sup>A</sup> If the pipeline under test contains sections of various diameters, the allowable leakage will be the sum of the allowable leakage for each size.

<sup>B</sup> Calculated on the basis of the formula above.

- 5. Acceptance shall be determined on the basis of allowable leakage. If any pipe section discloses leakage greater than that specified, locate, repair, and retest until the leakage is within the limits specified.
- 6. Make all visible leaks tight regardless of the amount of leakage; and if the lines do not meet the above leakage test, repair and retest as necessary until the leakage requirement is met. Repair or replace all defective work.
- C. Disinfection of Potable Water Mains and Process Equipment:
  - 1. Disinfect all potable water mains and process equipment in accordance with the latest version of AWWA C651, except that the placement of chlorine powder or tablets inside the pipe during installation shall not be allowed. Disinfect water mains and process equipment after the piping has passed the pressure and leakage testing. The successful Bidder shall obtain the most recent applicable AWWA standard. This standard shall be at the jobsite with access granted to the Authority's Project Representative.
  - 2. Flush the pipe with water at a minimum velocity of 3 FT per second (fps) to clear all foreign material from the pipe.
  - 3. Apply a chlorine solution with a concentration between 50 parts per million (ppm) and 100 ppm. The chlorine solution shall remain in the piping for a minimum of 24 HR. The concentration at the end of this period shall be at least 25 ppm in all sections of the main. Repeat the entire procedure if the residual is less than 25 ppm.
    - a. While the chlorinated water is being added, all appurtenances (valves, hydrants, etc.) shall be operated so as to completely disinfect the new work.
    - b. Position valves so that the chlorine solution in the section being disinfected will not flow into water mains in active service.
    - c. Chlorine residual samples shall be taken as directed by the Engineer.
  - 4. After the 24 HR retention period, flush the main until residual testing indicates that the chlorine concentration is approximately that of the neighboring service area.
    - a. Dispose of heavily chlorinated water into sanitary sewer or tank truck or treat to remove chlorine residual down to less than 0.1 mg/L through dechlorinator. If disposing to the environment, testing chlorine residuals every 5 minutes will be required and if the chlorine levels exceed 0.1 mg/L, flushing must stop immediately.
    - b. The Owner and the owner of the sanitary sewer system shall be notified a minimum of 24 HR prior to the discharge of any water to the sanitary sewer. Contractor shall submit to the Engineer written confirmation that the owner of sanitary sewer system has approved the discharge of water to its sanitary sewer.
    - c. Under no circumstances will the emptying of water onto roadways, or into ditches, culverts, streams or wetlands be allowed.
  - 5. After disinfection and final flushing, and prior to placing the lines in service, the Contractor shall collect bacteriological samples (both coliform and heterotrophic plate count) and submit samples to an approved testing laboratory. Two consecutive sets of samples shall be taken at least 24 HR apart in accordance with AWWA C651 for approximately each 2,000 FT of the new water main plus one set from the end of the line and at least one set from each branch.
    - a. The testing laboratory performing the bacteriological analysis shall be acceptable to the Engineer.
    - b. Submit three (3) copies of the laboratory analysis to the Engineer.
    - c. Should safe results not occur after laboratory tests, the Contractor shall, at his expense, repeat the disinfection procedure until safe results are obtained. This includes a positive result for coliform or a measured heterotrophic plate count of greater than 500 colony-forming units per ML.
    - d. Contractor shall pay for all testing required.

COMMON WORK RESULTS FOR UTILITIES

6. All precaution shall be taken to maintain dry and sanitary conditions and prevent contamination of any piping. If, in the opinion of the Engineer, contamination has occurred, the Contractor shall repeat the disinfection procedure and testing at his cost and expense.

END OF SECTION

#### COMMON WORK RESULTS FOR UTILITIES

## SECTION 331113.13 - DUCTILE IRON PUBLIC WATER UTILITY DISTRIBUTION PIPING

### PART 1 – GENERAL

#### 1.1 SUMMARY

- A. This section includes specifications for materials to be used in ductile iron piping systems.
- B. Pipe, fittings, couplings, specials, jointing materials, bolts, nuts, gaskets, factory-applied painting, and all other appurtenances required for the installation, testing, and completion of piping systems are included in this section.

#### 1.2 REFERENCES

- A. All published standards of the following associations/organizations, as mandated by specific state standards, shall be followed and applied as a minimum:
  - 1. American Society of Testing and Materials (ASTM).
  - 2. American National Standards Institute (ANSI).
  - 3. American Waterworks Association (AWWA).

### 1.3 SUBMITTALS

- A. Submit the following in accordance with conditions of the contract and Division 1 specification sections.
  - 1. Illustrations, specifications, and engineering data including: Dimensions, materials, size, weight, coatings, and linings for pipe, fittings, and appurtenances.
  - 2. Manufacturer's instructions and recommendations for installation of pipe joints, fittings, and appurtenances.
  - 3. Statement of compliance with ANSI/AWWA specifications.

## 1.4 QUALITY ASSURANCE

### 1.5 DELIVERY, STORAGE, AND HANDLING

- A. Delivery and Storage:
  - 1. Deliver and store materials within the Contract limits as approved by Engineer.
- B. Handling:
  - 1. Handle materials carefully with approved handling devices in accordance with manufacturer's recommendations.
  - 2. Do not drop or roll products off trucks. Products are not to be otherwise dragged, rolled, or skidded.
- C. Products cracked, gouged, chipped, dented, or otherwise damaged will not be approved and are to be removed and replaced at the Contractor's expense, unless the product can be repaired in a manner acceptable to the manufacturer and Engineer.

## PART 2 – PRODUCTS

### 2.1 GENERAL

A. Provide only new ductile iron piping, fittings, and appurtenances. In no case, will second-hand or damaged material be acceptable.

## 2.2 EQUIPMENT

- A. Ductile Iron Pipe:
  - 1. Centrifugally cast in accordance with ANSI/AWWA C151/A21.51.
  - 2. Working Pressure: 150 psi.
  - 3. Pressure Class: 350 psi.
  - 4. Joints:
    - a. Push-on, ANSI/AWWA C111/A21.11.
    - b. Mechanical, ANSI/AWWA C111/A21.11.
    - c. Flanged, ANSI/AWWA C111/A21.11.
    - d. Modifications of each.
  - 5. Laying Length: 18 or 20 feet.

### 2.3 COMPONENTS

- A. Fittings:
  - 1. Cast or Ductile Iron: ANSI/AWWA C110/21.10 or ANSI/AWWA C153/A21.53 ductile iron compact fittings.
  - 2. Joints:
    - a. Mechanical, ANSI/AWWA C111/A21.11.
    - b. Flanged, ANSI/AWWA C111/A21.11.
    - c. Push on, ANSI/AWWA C111/A21.11.
    - d. Modifications of each.
  - 3. Working Pressure: 250 psi, if ANSI/AWWI C110/A21.10 fittings are used or 350 psi if ANSI/AWWA C153/A21.
- B. Modified Joints: Where restrained joints are shown on the Drawings, pipe, and fittings shall be furnished with M.J. retainer glands or other pipe-manufactured-provided joint restraint.

## 2.4 ACCESSORIES

- A. Lining and Coating:
  - 1. All ductile iron pipe and fittings shall be furnished with a seal coated double thickness cement mortar lining conforming to ANSI/AWWA C104/A21.4 confirming to the following:

PIPE AND FITTINGS SIZE (INCHES)	THICKNESS OF LININGS (INCHES)
3–12	1/8
14-24	3/16
30-64	1/4

DUCTILE IRON PUBLIC WATER UTILITY DISTRIBUTION PIPING

- 2. Buried pipe and fittings shall be furnished with a 1 mil thick standard petroleum asphaltic coating conforming to ANSI A21.51 and shall be wrapped with polyethylene film in accordance with ANSI/AWWA C105/A21.5.
- 3. Buried pipe and fittings shall be furnished with a standard bitumastic coating conforming to ANSI A21.51.
- B. Miscellaneous: Furnish the required joint accessories consisting of gray or ductile iron glands, highstrength low alloy steel tee bolts and nuts, SBR rubber gaskets, and joint lubricant.

## PART 3 – EXECUTION

## 3.1 INSTALLATION

- A. Trenching, backfilling and compaction shall conform to Section "Trenching and Backfilling."
- B. Conform to Section "Common Work Results for Utilities."

## 3.2 FIELD QUALITY CONTROL

- A. Tests:
  - 1. Conform to Section "Common Work Results for Utilities" for testing.
- B. Inspection:
  - 1. Inspect all pipe and fittings prior to laying in the trench. Remove defective pipe and fittings from the site.
  - 2. Do not backfill until inspection by the Engineer unless otherwise approved by the Engineer.

#### END OF SECTION

### SECTION 331216 - WATER DISTRIBUTION VALVES

### PART 1 – GENERAL

#### 1.1 SUMMARY

A. This Section includes the installation of gate valves and valve boxes of the sizes and types as shown on the Drawings and as specified herein.

#### 1.2 REFERENCES

- A. General: The work shall comply with the most recent standards or tentative standards as published at the date of the contract and as listed in this specification using the abbreviation shown.
- B. American National Standard Institute (ANSI)/American Society of Sanitary Engineers (ASME):
  - 1. B16.1, Gray Iron Pipe Flanges and Flanged Fittings, Class 25, 125, 250, and 800.
  - 2. B16.5, Pipe Flanges and Flanged Fittings: NPS <sup>1</sup>/<sub>2</sub> through 24.
- C. American National Standard Institute (ANSI)/American Water Works Association (AWWA):
  - 1. C500, Standard for Metal Seated Gate Valves for Water Supply Service.
  - 2. C509, Standard for Resilient-Seated Gate Valves for Water Supply Service.
  - 3. C515, Standard for Resilient-Seated Gate Valves for Water Supply Service.
  - 4. C550, Protective Epoxy Interior Coatings for Valves and Hydrants.
  - 5. C800, Underground Service Line Valves and Fittings.
- D. American Society for Testing and Material (ASTM):
  - 1. A126, Standard Specification for Gray Iron Castings for Valves, Flanges, and Pipe Fittings.
- E. National Sanitation Foundation Standards (NSF):
  - 1. 61, Drinking Water System Components.
  - 2. 372, Drinking Water Systema Components Lead Content.

#### 1.3 SYSTEM DESCRIPTION

A. General: Valves shall be non-rising stem with nut and operator as shown on the Drawings and specified herein.

### 1.4 SUBMITTALS

- A. General: Shall be in accordance with Section 013300 Submittal Procedures.
- B. Shop Drawings: As a minimum, shop drawing shall include manufacturer's names, class of materials, catalog, and engineering data showing compliance with the specified requirements including:
  - 1. Product technical data:
    - a. Acknowledgement that products submitted meet requirements of standards referenced.
    - b. Manufacturer's installation instructions.
    - c. Valve pressure and temperature rating.
    - d. Valve material of construction.
    - e. Special linings.
    - f. Valve dimensions and weight.

WATER DISTRIBUTION VALVES

- g. Valve flow coefficient.
- 2. Test reports
- C. Maintenance Instructions: Submit corrective and preventative maintenance instructions, including recommended spare parts.

### 1.5 DELIVERY, STORAGE AND HANDLING

- A. General: Shall be in accordance with Section 016000 Product Requirements.
- B. Delivery: Deliver valves to the job site packaged, tagged and marked.
- C. Storage: Store valves at the job site in a manner to prevent damage and accumulation of dirt and rust.

## PART 2 – PRODUCTS

## 2.1 VALVES – WATER (POTABLE)

- A. Resilient Seat Gate Valves:
  - 1. Acceptable Manufacturers:
    - a. Mueller.
    - b. Kennedy.
    - c. American.
    - d. Clow.
    - e. AVK.
    - f. Or approved equal.
  - 2. Valves shall be ductile iron, resilient wedge conforming to ANSI/AWWA C515.
  - 3. The body, bonnet, and O-ring plate shall be fusion bond epoxy coated, both interior and exterior on body and bonnet.
  - 4. Epoxy coating shall be NSF 61 approved and applied in accordance with AWWA C550.
  - 5. Wedge disc shall have two seating surfaces and provide smooth unobstructed waterway with 100 percent smooth passage.
  - 6. The seating rubber shall be permanently bonded to the wedge to meet ASTM tests for rubber metal bond ASTM D249.
  - 7. Valves shall have O-ring seals at all pressure retaining joints and open left (counterclockwise) with a 2 IN square wrench nut.
  - 8. Valve ends shall be mechanical joint type unless otherwise shown on the Drawings.
  - 9. Each valve shall have a maker's name, pressure rating, and year in which it was manufactured cast in the body.
  - 10. Prior to shipment from the factory, each valve shall be tested by hydrostatic pressure equal to the requirements of AWWA.
  - 11. Materials:
    - a. Stem and stem nut: Bronze, stem sealed by three (3) O-rings.
    - b. Body, gate: Ductile iron.
    - c. Resilient seat.
    - d. Interior epoxy coating NSF 61 approved and applied in accordance with AWWA C550.
    - e. Wedge: DI encapsulated with EPDM.
    - f. Bolting materials: 304 stainless steel.

WATER DISTRIBUTION VALVES

- 12. Design Requirements:
  - a. 250 psi working pressure.
  - b. Buried: NRS O-ring stem seal.
  - c. Actuator: Counterclockwise open rotation.

## 2.2 TAPPING SLEEVE AND VALVE

- A. Complete assembly, including tapping sleeve, tapping valve, and bolts and nuts. Use sleeve and valve compatible with tapping machine.
- B. Tapping Sleeve: Stainless steel meeting AWWA C223 with flanged outlet for new branch connection. Include sleeve matching size and type of pipe material being tapped and of outlet flange required for branch connection. Outlet neck shall be fitted with a 3/4 IN tap and stainless steel or bronze test plug. Tapping sleeve shall be full circle stainless steel sleeves equal to Ford Model FAST, Blair Smith 663, or Romac SST.
- C. Tapping Valve: Valve shall be of the resilient seated type with bodies and bonnets made of cast or ductile iron similar to those specified in 2.1.1. Outlet end of valve shall be mechanical joint and all ferrous surfaces shall be corrosion protected by a bonded epoxy coating applied prior to valve assembly to assure coverage of all surfaces. Tapping valve shall be equal to Mueller T-2360.

## 2.3 RELATED ITEMS

- A. Valve Boxes: Adjustable cast iron valve boxes of suitable diameter, length, and design shall be furnished and installed for all valves buried in the earth, unless otherwise noted. The valve boxes shall be a 3-piece screw type in accordance with the Details with 5-1/4 IN shaft. Two-piece boxes will also be acceptable. Base shall be of sufficient size and configuration to support the box without resting on the pipe or valve. The word "water" shall be cast on the box lid in letters not less than 1 IN high on all water valves. Valve boxes shall be minimum ASTM A48 cast iron and shall be H20 rated
- B. Valve Operators: Shall be nut-operated valves as indicated on the plans.

# PART 3 – EXECUTION

## 3.1 INSPECTION

A. General: Examine the areas and conditions under which Work of this Section will be performed. Correct conditions detrimental to proper and timely completion of work. Do not proceed until unsatisfactory conditions have been corrected.

## **3.2** INSTALLATION - ALL VALVES

- A. General: Valves shall be cleaned to remove all dirt or other foreign material. Valve installation shall comply with Standard Details and the Manufacturer's recommendations. Gate valve extensions are required where depth from the finished ground surface to the top of the operating nut exceeds 48 IN.
- B. Stems: Shall be oriented for accessibility as approved by the Authority's representative. Do not install valves with stems in the downward direction.
- C. Setting of Valves: A valve box or vault shall be provided for every valve. The valve box shall not transmit shock or stress to the valve and shall be centered and plumb over the wrench nut of the

valve, with the box cover flush with the surface of the finished grade or as directed by the Authority's representative. Concrete collars are required on all valve boxes. Valves boxes shall be installed in accordance with the Details.

- D. Transmitting Forces: Valves and valve boxes shall be installed so no forces are transmitted to the valve through the piping supports or valve boxes.
- E. Cleaning: All valves and appurtenances shall be flushed clear of all foreign material after installation.
- F. Testing: Field test all valves and appurtenances for proper operation, proper adjustments and settings, freedom from vibration, binding, scrapings, and other defects. Check all valve supports for strength and high-quality workmanship. All defects shall be corrected to the satisfaction of the Authority. Hydrostatic and leakage tests shall be in accordance with Section 330500 Common Work Results for Utilities.

END OF SECTION

WATER DISTRIBUTION VALVES

## SECTION 331219 - WATER UTILITY DISTRIBUTION FIRE HYDRANTS

### PART 1 – GENERAL

#### 1.1 SUMMARY

- A. This section includes provisions for the installation of hydrants and valve assemblies.
- B. Included in the hydrant and valve assembly are the following items:
  - 1. Hydrant.
  - 2. Anchoring pipe.
  - 3. Gate valve.
  - 4. Anchoring tee.
- C. Flow testing for hydrant acceptance.

### 1.2 SUBMITTALS

- A. Product Data: Submit manufacturer's product data and installation instructions.
- B. Certificates: Furnish a certificate that the required tests on various materials and on completed hydrants have been made, and the results of all tests conform to the requirements of AWWA C502.
- C. Post Installation Submittal: Hydrant Pressure Tests
  - 1. Provide static pressure (pressure reading prior to flow test)
  - 2. Provide highest steady flow achieved, along with date and time

#### 1.3 REFERENCES

- A. Reference Standards: Comply with applicable provisions and recommendations of the following, except as otherwise shown or specified:
  - 1. American Water Works Association (AWWA).
  - 2. American National Standards Institute (ANSI).
  - 3. American Society of Testing and Materials (ASTM).
  - 4. Virginia Department of Transportation (VDOT).

### 1.4 QUALITY ASSURANCE

- A. Permanently mark each hydrant with the following:
  - 1. Name of manufacturer.
  - 2. Year of manufacture.
  - 3. Model number.
  - 4. Main valve opening size.
- B. Markings shall be discernible and legible after the hydrant is installed.

### PART 2 – PRODUCTS

## 2.1 EQUIPMENT

- A. Approved Manufacturers:
  - 1. Mueller Centurion A-423
  - 2. Kennedy Guardian K-81A
  - 3. Or Approved Equal.
- B. Hydrants:
  - 1. Conform to the latest revision of AWWA C502.
  - 2. Pressure rated to 250 working psi.
  - 3. Fire hydrants are to have a 5-1/4-inch main valve opening and a 6-inch mechanical joint inlet connection.
  - 4. Suitable for a 3-foot minimum depth of bury, or greater, as required by waterline depth.
  - 5. Provide two 2-1/2-inch hose connections and one 4-1/2-inch pumper connection all with National Standard hose threads and outlet nozzle caps and chains. The outlet nozzle cap nuts are to be the same in size and dimensioning as the operating nut.
  - 6. All fire hydrants are to be of break flange construction with a frangible break flange located slightly above the ground line and a cast-iron break coupling on the stem at the same location, which is to be so designed that in case of breakage, only the break flange and cast-iron coupling need be replaced to complete repair.
  - 7. Stems with nuts are to open by turning counter clockwise. An arrow and the word "open" are to be cast on the top of the hydrant.

### 2.2 COMPONENTS

- A. Hydrant Leads:
  - 1. Valve: 6-inch, M.J. gate valve meeting the requirements of Section 331419 Water Distribution Valves.
  - 2. Anchoring Tee: Mechanical joint anchoring tee, watermain diameter by 6-inch with roto-ring glands.
  - 3. Anchoring Pipe: Mechanical joint anchoring pipe, 6-inch with roto-ring glands.

## 2.3 ACCESSORIES

- A. Paint:
  - 1. All hydrants shall be painted red with yellow bonnet and operating nut.
  - 2. All hydrants shall be furnished completely shop primed and with 1 finish coat of the specified color(s).
  - 3. After installation, the hydrants shall receive 1 additional finish coat of the specified color(s).
  - 4. Both the shop finish coat and field finish coat shall be a weather-resistant, high-gloss enamel, "New Color Horizons System" by Rust-Oleum or equal.
- B. Concrete: 3000 psi at 28 days.
- C. Crushed Stone: Per VDOT requirements.
- D. Stone Cover: Polyethylene sheet or building paper.

### PART 3 - EXECUTION

#### 3.1 INSTALLATION

- A. Hydrant Installation:
  - 1. Hydrant installation is to conform to the requirements of the detail(s) shown on the Drawings and AWWA M17.
  - 2. Carefully plumb hydrants before the connecting connection is made.
  - 3. Set on a poured concrete thrust block at least 12 inches square and 4 inches thick; the concrete slab to be supported by firm undisturbed material or well consolidated fill.
  - 4. Place crushed stone to a minimum depth and thickness of 12 inches around the drain up to a level at least 6 inches above the drain to provide for hydrant drainage in pervious soil, such as sand or gravel. In impervious soil, such as clay, excavate a drainage pit 2 feet in diameter and 3 feet deep below each hydrant and filled completely with crushed stone under and around the bottom of the hydrant up to a level at least 6 inches above the drain. In both cases, completely cover the top of the crushed stone with polyethylene or building paper to prevent the backfill from shifting down into the crushed stone drain.
  - 5. When required by the Engineer because of evidence of high ground water, plug the hydrant drain opening to prevent the entrance of ground water. In this case, no crushed stone needs to be placed under the hydrant.
- B. Water Main Connection:
  - 1. Locate gate valve as far from the hydrant and as close to the main as possible. Use separate mechanical restraint to secure the hydrant to the valve and then the valve to the main line tee or other fitting.
  - 2. Use an anchoring fitting with "roto-ring glands" to restrain the hydrant valve to the watermain. From the valve to the hydrant use an anchoring pipe with "roto-ring glands" for hydrant restraint.
  - 3. Block all hydrant-lead-valve assemblies against movement with poured concrete thrust blocks both behind the hydrant and behind the tee as shown on the drawings. Blocks are to bear against undisturbed material.
- C. Hydrant Testing:
  - 1. After installation is complete, test each hydrant for flow/pressure:
    - a. Notify Owner 72 hours prior to testing any hydrant.
    - b. Use Pollardwater HydrantPro FNST 2-1/2 inch Flow Test Kit, or equal.
    - c. Record static pressure prior to hydrant flow.
    - d. Record highest steady flow achieved for 3-minute period.
    - e. Flow test duration not to exceed 15 minutes.
- D. Provide hydrant with below grade and above grade coatings per AWWA C502.

## 3.2 APPLICATIONS

A. Touch up fire hydrants with approved finish paint immediately prior to project completion.

#### END OF SECTION

#### WATER UTILITY DISTRIBUTION FIRE HYDRANTS