

PROJECT MANUAL

Rogers Road Street Widening Improvements

502 Southtown Circle
Rolesville, NC 27571

OWNER:

Town of Rolesville

Eric Marsh, Assistant Town Manager
502 Southtown Circle
PO Box 250
Rolesville, NC 27571
(919) 556-3506
eric.marsh@rolesville.nc.gov

DESIGNER:

Bolton & Menk, Inc.

418 S Dawson St
Raleigh, NC 27601
(919) 417-6753
Jacqueline Thompson
Jacqueline.thompson@bolton-menk.com

December 6, 2023



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- Identification of HBU Certified/Minority Business Participation
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ADVERTISEMENT FOR BIDS

Sealed proposals will be received until 10:00 AM local time on January 17, 2024, at the Rolesville Town Hall, 502 Southtown Circle, Rolesville, NC 27571, for the construction of street widening of Rogers Road at which time and place bids will be opened and read.

Complete plans and specifications for this project can be obtained from Eric Marsh, Assistant Town Manager, Town of Rolesville, 502 Southtown Circle, Rolesville, NC 27571 or via email at eric.marsh@rolesville.nc.gov or by calling (919) 556-3506 during normal office hours.

An optional pre-bid meeting will be held at Town Hall, 502 Southtown Circle, Rolesville NC 27571 on December 20, 2024, at 10 AM local time.

Work included in the project consists of milling the top 1.5 inches of existing pavement and widening the existing 2 lane roadway to 3 lanes. The widening will occur on both the northbound and southbound sides, tapering from the existing width to a maximum 7 ft widening on both sides. New storm sewer structures and pipes will be installed to collect drainage and maintain existing drainage patterns, and ditches will be regraded.

The State Department of Administration requires participation by minority or women-owned businesses according to General Statute 143-128.2.

Town of Rolesville, as owner reserves the right to reject any and all bids for any reason.

Bolton & Menk, Inc.
Brian Laux
Senior Project Engineer
418 S Dawson St
Raleigh, NC 27601
919-309-6382

Town of Rolesville
Eric Marsh
Assistant Town Manager
502 Southtown Circle
Rolesville, NC 27571
919-556-3506

INSTRUCTIONS TO BIDDERS

Quality Monitoring

Work must be completed to the satisfaction of both Bolton & Menk, Inc. AND the Town of Rolesville.

Clarifications and Questions During Bidding

Submit questions and request for clarification no less than 10 days before the Receipt of Bids. Questions and clarifications will be answered by Addenda no less than 4 days prior to Receipt of Bids. Address questions and request for clarification to

Brian Laux
Senior Project Engineer
Bolton & Menk, Inc.
brian.laux@bolton-menk.com
919-309-6382

Withdrawing Bids

Bidders may withdraw their bids anytime up to the time indicated as the Receipt of Bids in the Advertisement for Bids and if so desired, submit a revised bid prior to the indicated Receipt of Bid date and Time. Following the Opening of the Bids, Bids may not be withdrawn for a period of 60 days.

Payment Methods and Approvals

Payment applications will be processed monthly based on work completed. Retainage of 5% of contract amount will be withheld until completion of any and all punch list items.

Bolton & Menk, Inc. will review all pay applications as indicated in the Agreement and forward with recommendation to the Town of Rolesville.

Scheduling

Project will begin on or about April 8, 2024 and the substantial completion date is June 19, 2024. Work should occur between the hours of 7am and 5pm on weekdays. Additional hours or weekend work may be possible in limited circumstances.

Pre-construction meeting to be held withing 14 days of project start.

Notice to Proceed

After Contractor receives written notice to proceed by way of signed contract (anticipated to be approximately February 14, 2024), a construction schedule is to be submitted to Bolton & Menk, Inc.

Liquidated Damages

Contractor will not be held responsible for delays outside of their control, such as unusual weather. Contractor is responsible for notifying Bolton & Menk, Inc. in writing as to any

anticipated delays and the reasons for same. Contractor will be assessed liquidated damages in amount of \$500.00 per day after the completion date established in the construction contract if there is any remaining work or punch list items.

Licensing Reminder

All contractors must have licenses under State laws for respective trades.

Bonds Requirements

Bid bonds equal to not less than 5% of bid amount will be required, and should be submitted with the Bid Form. Performance bonds and Payment bonds will be required for the full amount of the contract and for the duration of the project only. Please NOTE again; payments WILL NOT BE MADE until work is completed and accepted by owner and architect.

MWSBE Requirements

In accordance with State General Statute 143-128.2, The Town of Rolesville has established a verifiable goal of ten percent (10%) for participation by minority businesses in the total value of the work. As part of the Bid submission, Bidders are to include the Identification of Minority Business Participation and either Affidavit A or Affidavit B as included following the Bid Form at the end of the Project Manual.

Owner's Right to Reject Bids

Owner reserves the right to reject any or all bids and to waive informalities.

PROCEDURE FOR REPORTING NORTH CAROLINA SALES TAX EXPENDITURES ON TOWN OF ROLESVILLE CONTRACTS

The following procedure in handling the North Carolina sales tax is applicable to this project. Contractors shall comply fully with the requirements outlined hereinafter, in order that the owner may recover the amount of the tax permitted under the law.

1. It shall be the general contractor's responsibility to furnish the owner documentary evidence showing the materials used and sales tax paid by the general contractor and each of his subcontractors. Any county sales tax included in the Contractor's statements must be shown separately from the state sales tax. If more than one county is shown, each county shall be listed separately.
2. The documentary evidence shall consist of a certified statement, by the general contractor and each of his subcontractors individually, showing total purchases of materials from each separate vendor and total sales taxes by each county paid each vendor. The certified statement must show the invoice number(s) covered and inclusive dates of such invoices. State sales tax shall be listed separately from county sales tax. If more than one county is shown, each county shall be listed separately.
3. Materials used from general contractor's or subcontractor's warehouse stock shall be shown in a certified statement at warehouse stock prices.
4. The general contractor shall not be required to certify the subcontractor's statements.
5. The documentary evidence to be furnished to owners eligible for sales or use tax refunds covers sales and/or use taxes paid on building materials used by contractors and subcontractors in the performance of contracts with churches, orphanages, hospitals not operated for profit, educational institutions not operated for profit, and other charitable or religious institutions or organization not operated for profit, and incorporated cities, towns, and counties in this State. The documentary evidence is to be submitted to the above-named institutions, organizations, and governmental units to be included in claims for refunds to be prepared and submitted by them to obtain refunds provided by G.S> 105-164.14 and is to include the purchases of building materials, supplies, fixtures, and equipment which become a part of or annexed to buildings or structures being erected, altered, or repaired under contract with such institutions, organizations, or governmental units.

The Contractor or contractors to whom an award is made on this project will be required to follow the procedure outlined above.

The Contractor is advised that all requests for payment, partial or final, for work completed under this contract must include a sales tax report submitted in accordance with the procedures outlined above.

CONSTRUCTION CONTRACT for the TOWN OF ROLESVILLE

This Construction Contract for the Town of Rolesville (the "Agreement") is made and entered into this the _____ day of _____, 20____ by and between the **TOWN OF ROLESVILLE, NORTH CAROLINA**, a municipal corporation of the State of North Carolina ("Owner") and _____ (the "Contractor"). Owner and Contractor are, collectively, the "Parties" and individually, a "Party."

The Project: []
Name and Location: []

The Designer is: []

1. **CONTRACT DOCUMENTS.** The "Contract Documents" consist of this Agreement, General Conditions of the Contract for Construction ("General Conditions"); Specifications; Drawings; Addenda issued prior to execution of the Agreement; other documents listed in Paragraph 19 of the Agreement (if any); and Modifications executed by the Parties after execution of the Agreement; and, for public Projects, the Owner's Advertisements to Bid or Invitations to Bid, the Owner's Instructions to Bidders, the Contractor's Bid or Proposal, Performance and Payment Bonds, and Certificates of Insurance (together, the "Contract"). The Contract Documents form the Contract and are fully a part of the Contract as if attached to the Agreement or repeated herein. In the event of conflicts among the Contract Documents, the Specifications shall take precedence over the Drawings, and the Supplementary Conditions shall take precedence over the General Conditions. The Contract Documents shall not be construed to create a contractual relationship of any kind between the Owner and a Subcontractor or Sub-subcontractor.

The Owner and Contractor agree that should the Contractor utilize the services of a Subcontractor for any Work under this Contract, the Subcontractor shall be required to comply with all terms and conditions of this Contract and any and all Contract Documents entered into between the Owner and Contractor and any of its Subcontractors shall require the same of their Subcontractors.

2. **WORK.** The Contractor shall fully execute the Work described in the Contract Documents or reasonably inferable by the Contractor as necessary to produce the results intended by the Contract Documents, except to the extent specifically indicated in the Contract Documents to be the responsibility of others.
3. **RELATIONSHIP OF THE PARTIES.** The Contractor accepts the relationship of trust and confidence established by this Agreement and covenants with the Owner to cooperate with the Designer and exercise the Contractor's skill and judgment in furthering the interests of the Owner; to furnish efficient business administration and supervision; to furnish at all times an adequate supply of workers and materials; and to perform the Work in an expeditious and economical manner consistent with the Owner's interests. The Owner agrees to furnish and approve information required by the Contractor and to make payments to the Contractor, both in accordance with the requirements of the Contract Documents.
4. **DATE OF COMMENCEMENT AND SUBSTANTIAL COMPLETION.** The Work required by the Contract shall be commenced by the Contractor not later than [] calendar days after the Owner's notice to the Contractor to proceed and the entire work shall be completed not later than [] calendar days after the date of notice to proceed.

The Contractor acknowledges and recognizes that the Owner is entitled to full and beneficial

occupancy and use of the completed Work following expiration of the Contract Time as defined above, and that the Owner has entered into, or will enter into, binding agreements with third parties based upon the Contractor's achieving Substantial Completion of the Work within the Contract Time. The Contractor further acknowledges and agrees that if the Contractor fails to complete substantially or fails to cause the Substantial Completion of any portion of the Work within the Contract Time, the Owner will sustain extensive damages and serious loss as a result of such failure. The exact amount of such damages will be difficult to ascertain. Therefore, the Owner and Contractor agree that the Owner shall be entitled to liquidated damages for the Contractor's failure to complete substantially or failure to cause Substantial Completion of any portion of the Work within the Contract Time as set forth below.

If the Contractor fails to complete substantially or fails to cause the Substantial Completion of any Work within the Contract Time, the Owner shall be entitled to retain or recover from the Contractor, as liquidated damages and not as a penalty, the following per diem amounts commencing on the upon the first day following expiration of the Contract Time and continuing until the date that the Contractor achieves Substantial Completion of the entire Work. Such liquidated damages are hereby agreed to be a reasonable pre-estimate of damages the Owner will incur as a result of delayed completion of the Work: [] per day.

The Owner may deduct liquidated damages described above from any unpaid amounts then or thereafter due the Contractor under this Contract. Any liquidated damages not so deducted from any unpaid amounts due the Contractor shall be payable by the Contractor to the Owner at the demand of the Owner, together with interest from the date of the demand at a rate equal to the prime interest rate as published by the Wall Street Journal.

Notwithstanding anything to the contrary in the Contract, if the Owner is unable to recover any portion of liquidated damages in accordance with the terms and conditions above because any portion thereof is found to be unenforceable or invalid as a penalty or otherwise, then the Owner shall be entitled to recover from the Contractor all of the Owner's actual damages in connection with any failure by the Contractor to complete substantially to achieve Substantial Completion of the Work within the Contract Time, including without limitation, consequential damages.

5. CONTRACT SUM AND PAYMENT

5.1 Owner agrees to pay for services, satisfactorily performed, in accordance with the Contract Documents. Unless otherwise specified, Contractor shall submit an Application for Payment in the manner described in Article 9 of the General Conditions. Payment will be processed promptly upon receipt and upon approval of the Application by Owner.

5.2 Contractor shall receive from Owner a sum not to exceed \$ [], as full compensation for the provision of construction services provided under this Contract, subject to additions and deductions as provided in the Contract Documents.

5.3 The Contract Sum is based upon the following alternates, if any, which are described in the Contract Documents and are hereby accepted by the Owner:

[]

5.4 Unit prices, if any, are as follows:

[May reference bid form]

6. **PROGRESS PAYMENTS.** Based upon Applications for Payment submitted to the Designer by the Contractor and Certificates for Payment issued by the Designer pursuant to Sections 9.5 and 9.6 of the General Conditions, the Owner shall make progress payments on account of the Contract Sum to the Contractor as provided in Sections 9.3, 9.4, and 9.7 of the General Conditions.
7. **FINAL PAYMENT.** Final payment, constituting the entire unpaid balance of the Contract Sum, shall be made by the Owner to the Contractor when (1) the Contract has been fully performed by the Contractor and all requirements expressed in Sections 9.3 and 9.11 of the General Conditions have been satisfied except for those requirements set forth in Sections 11.2 and 11.3 of the General Conditions and any other requirements which necessarily survive final payment; and (2) a final Certificate for Payment has been issued by the Designer; such final payment shall be made by the Owner not more than 30 days after the issuance of the Designer's final Certificate for Payment.
8. **INDEMNIFICATION.** The Contractor's indemnification obligations connected with the Contract are set forth in Paragraph 3.17 of the General Conditions.
9. **NOTICES.** All notices which may be required by this Contract or any rule of law shall be effective when received by the following individuals through personal delivery or by certified mail at the following addresses:

FOR: **TOWN OF ROLESVILLE**

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|
|

FOR: **CONTRACTOR**

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10. **NON-DISCRIMINATION.** Contractor shall not discriminate against any employee or applicant for employment because of age, sex, race, creed, national origin, or disability. Contractor shall take affirmative action to ensure that applicants are employed and that employees are treated fairly and legally during employment with regard to their age, sex, race, creed, national origin, or disability. In the event Contractor is determined by the final order of an appropriate agency or court to be in violation of any non-discrimination provision of federal, state, or local law, or this provision, this Contract may be canceled, terminated or suspended in whole or in part by Owner, and Contractor may be declared ineligible for further Owner contracts.
11. **HEALTH AND SAFETY.** Contractor shall be responsible for initiating, maintaining and supervising all safety precautions and programs required by OSHA and all other regulatory agencies while providing services under this Contract.
12. **NON-ASSIGNMENT.** This Contract is not assignable by either Party, by operation of law or otherwise, except as provided in Section 12.2 of the General Conditions.
13. **MODIFICATION.** This Contract may be modified only by a written agreement executed by both Parties.
14. **TERMINATION OR SUSPENSION.** This Contract may be terminated by the Owner or the Contractor as provided in Article 13 of the General Conditions. The Work may be suspended by the Owner as provided in Section 13.4 of the General Conditions.

15. E-VERIFY. As a condition of payment for services rendered under this Contract, Contractor shall comply with the requirements of Article 2 of Chapter 64 of the North Carolina General Statutes. Further, if Contractor provides Work utilizing a Subcontractor, Contractor shall require the Subcontractor to comply with the requirements of Article 2 of Chapter 64 of the North Carolina General Statutes as well. Contractor shall verify by affidavit compliance of the terms of this section upon request by the Owner.
16. IRAN DIVESTMENT ACT. Contractor attest that it is not listed on the Final Divestment List created by the State Treasurer pursuant to N.C.G.S. 143-6A-4. Individuals or companies on the Final Divestment List are ineligible to contract or subcontract with Local Government Units. (See N.C.G.S. 143C-6A-6(a).) It is Contractor's responsibility to monitor its compliance with this restriction. Contracts valued at less than \$1,000 are exempt from this restriction.
17. DIVESTMENT FROM COMPANIES THAT BOYCOTT ISRAEL. Contractor certifies that it has not been designated by the North Carolina State Treasurer pursuant to N.C.G.S. 147-86.81 as a company engaged in the boycott of Israel. It is Contractor's responsibility to monitor compliance with this restriction. Contracts valued at less than \$1,000 are exempt from this restriction.
18. INSURANCE AND BONDS
 - 18.1 CONTRACTOR'S INSURANCE. Contractor agrees to purchase at its own expense insurance coverages to satisfy the following minimum requirements and to secure the required insurance prior to performing Work. A certificate reflecting the following minimum coverages shall accompany this Agreement:
 - Workers' Compensation Insurance - Limits of no less than \$1,000,000 for each accident and each employee. Waivers of Indemnity are not recognized by the North Carolina Department of Insurance and will not be accepted by the Town of Rolesville.
 - Commercial General Liability - Combined single limits of no less than \$1,000,000 each occurrence, and \$2,000,000 in the aggregate. This insurance shall include Comprehensive Broad Form Coverage including contractual liability. It shall provide coverage for claims including (1) damages because of bodily injury, sickness or disease, including occupational sickness or disease, and death of any person; (2) personal injury and advertising injury; (3) damages because of physical damage to or destruction of tangible property, including the loss of use of such property; (4) bodily injury or property damage arising out of completed operations; and (5) the Contractor's indemnity obligations under Section 3.17 of the General Conditions. The following language must be endorsed onto the policies and listed on Certificate of Insurance: "Town of Rolesville is named additional insured as its interests may appear."
 - Commercial Automobile Liability – Automobile Liability covering vehicles owned and non-owned vehicles used by the Contractor, with policy limits of no less than \$1,000,000 per accident for bodily injury, death of any person, and property damage arising out of the ownership, maintenance, and use of those motor vehicles along with any other statutorily required automobile coverage. Evidence of commercial automobile coverage is only necessary if vehicles are used in the provision of services under this Agreement and/or are brought on an Owner site. The following language must be endorsed onto the policies and listed on Certificate of Insurance: "Town of Rolesville is named additional insured as its interests may appear."

All insurance companies used by the Contractor must be licensed in North Carolina.

Contractor shall disclose to the Owner any deductible or self-insured retentions applicable to any insurance required to be provided by the Contractor and shall provide the Owner no less than thirty (30) days' notice of cancellation, or any material change, to any insurance coverage required by this Contract.

18.2 PERFORMANCE BOND AND PAYMENT BOND. The Contractor has furnished and attached hereto a Performance Bond in the penal sum of \$[], and a Payment Bond in the penal sum of \$[] covering the faithful performance of this Contract and the payment of all obligations arising hereunder, in such form and content as the Owner may prescribe and with surety approved by the Owner. Should any surety upon the bond for the performance of this Contract become unacceptable to the Owner, the Contractor must promptly furnish additional security as may be required from time to time by the Owner to protect the interests of the Owner and of persons, firms and corporations supplying labor or materials in the performance of the work contemplated by the Contract.

19. INCORPORATION OF CONTRACT DOCUMENTS. The Contract Documents, except for Modifications issued after execution of this Contract, are enumerated as indicated:

- () Agreement
- () General Conditions of the Contract for Construction
- () Supplemental and Other Conditions
- () Job Specifications
 - Title
 - []
- () Project Drawings
 - Title
 - []
- () Addenda
 - Number / Date
 - []
- () Advertisement to Bid
- () Instructions to Bidders
- () Contractor's Proposal
- () Performance Bond (w/Power-of-Attorney)
- () Payment Bond (w/Power-of-Attorney)
- () Certificate of Insurance
- () Other (Describe)
 - []

20. The Agreement and the other Contract Documents described herein represent the entire and integrated agreement between the Owner and Contractor and supersede any and all prior negotiations, representations or agreements concerning the Project between the Parties, whether written or oral.

21. OTHER PROVISIONS.

- 21.1 If a court finds any provision of the Contract invalid or unenforceable, in whole or in part, the finding shall not affect the validity or enforceability of any other provision of the Contract or the remainder of the provision in question.
- 21.2 No act or failure to act by the Owner or Contractor constitutes a waiver of any right, remedy, obligation or duty afforded them under the Contract or Law, or approval of, or acquiescence in, any breach of contract or negligence of the other party, except as stated in the Contract or otherwise agreed in writing.
- 21.3 The Parties may sign this Agreement in counterparts. Together the counterparts shall constitute a complete document. Signatures transmitted electronically shall have the same effect as physical delivery of the paper bearing the original signatures.

SIGNATURE PAGE FOLLOWS

TOWN OF ROLESVILLE

This instrument has been pre-audited
in the manner required by the Local
Government Budget and Fiscal Control Act.

By: _____

Date: _____

Finance Officer

CONTRACTOR

ATTEST:

By: _____

Print Name: _____

Title: _____

STATE OF NORTH CAROLINA
COUNTY OF _____

I, a Notary Public in and for the aforesaid County and State, do hereby certify that _____
personally appeared before me this day and acknowledged that he is _____ of
_____, a North Carolina corporation, and that by authority duly given and as the act of
the corporation, the foregoing instrument was signed in its name by its _____, sealed with its
corporate seal and attested by _____ as its _____.

Witness my hand and notarial seal this ____ day of _____, 20__.

(SEAL)

Notary Public

My commission expires: _____

GENERAL CONDITIONS OF THE CONTRACT FOR CONSTRUCTION

1 ARTICLE 1 GENERAL PROVISIONS

1.1 **BASIC DEFINITIONS**

- 1.1.1 Contract. The Contract Documents form the Contract for Construction. The Contract represents the entire and integrated agreement between the Parties hereto and supersedes prior negotiations, representations or agreements, either written or oral. The Contract may be amended or modified only by a Modification. The Contract Documents shall not be construed to create a contractual relationship of any kind (1) between the Contractor and the Designer or the Designer's consultants, (2) between the Owner and a Subcontractor or a Sub-subcontractor, (3) between the Owner and the Designer or the Designer's consultants, or (4) between any persons or entities other than the Owner and the Contractor.
- 1.1.2 Contract Documents. The Contract Documents are enumerated in the Construction Contract for the Town of Rolesville (hereinafter, the Agreement).
- 1.1.3 Contractor. The Contractor is the person or entity identified as such in the Agreement, and is referred to throughout the Contract Documents as if singular in number. Unless otherwise stated, the term "Contractor" shall mean the General Contractor or the General Contractor's authorized representative(s).
- 1.1.4 Drawings. The Drawings are the graphic and pictorial portions of the Contract Documents, wherever located and whenever issued, showing the design, location and dimensions of the Work, generally including plans, elevations, sections, details, schedules, and diagrams.
- 1.1.5 Designer. The Designer is the Architect or Engineer registered in accordance with the provisions of Chapter 89C of the North Carolina General Statutes, is identified as such in the Agreement, and is referred to throughout the Contract Documents as if singular in number. Unless otherwise stated, the term "Designer" shall mean the Designer or the Designer's authorized representative(s).
- 1.1.6 Modification. A Modification is (1) a written amendment to the Agreement or to other Contract Documents signed by both Parties, (2) a Change Order, (3) a Construction Change Directive, or (4) a written order for a minor change in the Work issued by the Designer.
- 1.1.7 Owner. The Owner is the Town of Rolesville. The term "Owner" shall mean the Owner or the Owner's authorized representative(s).
- 1.1.8 Project. The Project is the total construction of which the Work performed under the Contract Documents may be the whole or a part and which may include construction by the Owner or by separate contractors.
- 1.1.9 Project Manual. The Project Manual is the volume usually assembled for the Work which may include the bidding requirements, sample forms, Conditions of the Contract, and Specifications.
- 1.1.10 Separate Contractor. The term "Separate Contractor(s)" shall mean other contractors retained by the Owner under separate agreements.
- 1.1.11 Specifications. The Specifications are that portion of the Contract Documents consisting of the written requirements for materials, equipment, construction systems, standards and workmanship for the Work, and performance of related services.
- 1.1.12 Work. The term "Work" means the construction and services required by the Contract

Documents, whether completed or partially completed, and includes all other labor, materials, equipment, and services provided or to be provided by the Contractor to fulfill the Contractor's obligations. The Work may constitute the whole or a part of the Project.

1.2 EXECUTION, CORRELATION, AND INTENT

- 1.2.1 The Contract Documents shall be signed by the Owner and Contractor as provided in the Contract.
- 1.2.2 Execution of the Contract by the Contractor is a representation that the Contractor has visited the worksite, is familiar with local conditions under which the Work is to be performed, has correlated personal observations with requirements of the Contract Documents, has checked and verified all worksite conditions.
- 1.2.3 The intent of the Contract Documents is to include all items necessary for the proper execution and completion of the Work by the Contractor. The Contract Documents are complementary, and what is required by one shall be as binding as if required by all.
- 1.2.4 Organization of the Specifications into divisions, sections and articles, and arrangement of Drawings shall not control the Contractor in dividing the Work among Subcontractors or in establishing the extent of Work to be performed by any Subcontractor.
- 1.2.5 Unless otherwise stated in the Contract Documents, words which have well-known technical or construction industry meanings are used in the Contract Documents in accordance with such recognized meanings.

1.3 OWNERSHIP AND USE OF DESIGNER'S DRAWINGS, SPECIFICATIONS AND OTHER

DOCUMENTS: The Drawings, Specifications, and other documents prepared by the Designer are instruments of the Designer's service, which describe the Work to be executed by the Contractor. The Contractor may retain one contract record set. Neither the Contractor nor any Subcontractor, Sub-subcontractor, or material or equipment supplier shall own or claim a copyright in the Drawings, Specifications, and other documents prepared by the Designer. The Owner will retain all common law, statutory, and other reserved rights, in addition to the copyright of the Drawings, Specifications, and other documents prepared by the Designer. All copies of them, except the Contractor's record set, shall be returned or suitably accounted for to the Designer, on request, upon completion of the Work. The Drawings, Specifications, and other documents prepared by the Designer, and copies thereof furnished to the Contractor, are for use solely with respect to this Project; they are not to be used by the Contractor or any Subcontractor, Sub-subcontractor, or material or equipment supplier on other projects without the specific written consent of the Owner and Designer. The Contractor, Subcontractors, Sub-subcontractors, and material or equipment suppliers are granted a limited license to use and reproduce applicable portions of the Drawings, Specifications, and other documents prepared by the Designer appropriate to and for use in the execution of their Work under the Contract Documents. All copies made under this license shall bear the statutory copyright notice, if any, shown on the Drawings, Specifications, and other documents prepared by the Designer. Submittal or distribution to meet official regulatory requirements or for other purposes in connection with this Project is not to be construed as publication in derogation of the Owner's copyright or other reserved rights.

- 1.4 **CAPITALIZATION:** Terms capitalized in these General Conditions include those which are (1) specifically defined, (2) the titles of numbered articles and identified references to Articles, Sections, Paragraphs, Subparagraphs, and Clauses in the document or (3) the titles of other

documents.

- 1.5 INTERPRETATION:** In the interest of brevity the Contract Documents frequently omit modifying words such as “all” and “any” and articles such as “the” and “an,” but the fact that a modifier or an article is absent from one statement and appears in another is not intended to affect the interpretation of either statement.

2 ARTICLE 2 OWNER

2.1 INFORMATION AND SERVICES REQUIRED OF THE OWNER

- 2.1.1 The Owner shall furnish plan and profile of existing Town utilities. The Contractor is responsible for locating all existing utilities prior to Work.
- 2.1.2 Except for permits and fees which are the responsibility of the Contractor under the Contract Documents, the Owner shall secure and pay for necessary approvals, easements, assessments, and charges required for construction, use, or occupancy of permanent structures or for permanent changes in existing facilities.
- 2.1.3 Information or services under the Owner’s control shall be furnished by the Owner with reasonable promptness to avoid delay in orderly progress of the Work.
- 2.1.4 Unless otherwise provided in the Contract Documents, the Contractor will be furnished, free of charge, such copies of Drawings and Project Manuals as are reasonably necessary for execution of the Work.

- 2.2 OWNER’S RIGHT TO STOP THE WORK:** If the Contractor fails to correct Work that is not in accordance with the requirements of the Contract Documents or repeatedly fails to carry out Work in accordance with the Contract Documents, the Owner may issue a written order to the Contractor to stop the Work, or any portion thereof, until the cause for such order has been eliminated; however, the right of the Owner to stop the Work shall not give rise to a duty on the part of the Owner to exercise this right for the benefit of the Contractor or any other person or entity.

- 2.3 OWNER’S RIGHT TO CARRY OUT THE WORK:** If the Contractor defaults or neglects to carry out the Work in accordance with the Contract Documents and fails within a seven-day period after receipt of written notice from the Owner to commence and continue correction of such default or neglect with diligence and promptness, the Owner may, after such seven-day period, without prejudice to other remedies the Owner may have, correct such deficiencies. In such case, an appropriate Change Order shall be issued deducting from payments then or thereafter due the Contractor the cost of correcting such deficiencies, including compensation for the Designer’s additional services and expenses made necessary by such default, neglect, or failure. Such action by the Owner and amounts charged to the Contractor are both subject to prior review and confirmation by the Designer. If payments then or thereafter due the Contractor are not sufficient to cover such amounts, the Contractor shall pay the difference to the Owner.

3 ARTICLE 3 CONTRACTOR

3.1 REVIEW OF CONTRACT DOCUMENTS AND FIELD CONDITIONS BY CONTRACTOR

- 3.1.1 The Contractor shall carefully study and compare the Contract Documents with each other and with information furnished by the Owner pursuant to Section 2.1, and shall at once report to the Designer any errors, inconsistencies, or omissions discovered. If the Contractor performs any construction activity when it knew or should have known that such work involves any

errors, inconsistencies, or omissions in the Contract Documents without providing notice to the Designer, the Contractor shall assume full responsibility for such performance and shall bear the full costs for any required correction.

- 3.1.2 The Contractor shall take field measurements, verify field conditions, and shall carefully compare such field measurements, conditions, and other information known to the Contractor with the Contract Documents before commencing and construction activity. If the Contractor discovers errors, inconsistencies, or omissions it shall promptly report such conditions to the Designer.
- 3.1.3 The Contractor shall perform the Work in accordance with the Contract Documents and submittals approved pursuant to Section 3.11.

3.2 SUPERVISION AND CONSTRUCTION PROCEDURES

- 3.2.1 The Contractor shall supervise and direct the Work, using the Contractor's best skill and attention. The Contractor shall be solely responsible for and have control over construction means, methods, techniques, sequences, and procedures. The Contractor shall be solely responsible for coordinating all portions of the Work under the Contract, unless Contract Documents give other specific instructions concerning these matters.
- 3.2.2 The Contractor shall be responsible to the Owner for acts and omissions of the Contractor's employees, Subcontractors and their agents and employees, and other persons or entities performing portions of the Work for, or on behalf of the Contractor or any of its Subcontractors.
- 3.2.3 The Contractor shall not be relieved of obligations to perform the Work in accordance with the Contract Documents either by activities or duties of the Designer in the Designer's administration of the Contract, or by tests, inspections, or approvals required or performed by persons other than the Contractor.
- 3.2.4 The Contractor shall be responsible for inspection of portions of Work already performed under this Contract (if any) to determine that such portions are in proper condition to receive subsequent Work.

3.3 LABOR AND MATERIALS

- 3.3.1 Unless otherwise provided in the Contract Documents, the Contractor shall provide and pay for labor, materials, equipment, tools, construction equipment and machinery, water, heat, utilities, transportation, and other facilities and services necessary for proper execution and completion of the Work, whether temporary or permanent and whether or not incorporated or to be incorporated in the Work.
- 3.3.2 The Contractor shall enforce strict discipline and good order among the Contractor's employees and other persons carrying out the Contract. The Contractor shall not permit employment of unfit persons or persons not skilled in tasks assigned to them.
- 3.3.3 Materials, equipment, or items required for a complete job that are shown on the Drawings but not mentioned in the Specifications; or materials, equipment, or items required by the Specifications but not shown on the Drawings, shall be furnished and installed the same as if they were both shown on the Drawings and required by the Specifications.

3.4 WARRANTY

- 3.4.1 The Contractor warrants to the Owner and Designer that materials and equipment furnished

under the Contract will be of good quality and new unless otherwise required or permitted by the Contract Documents; that the Work will be free from defects not inherent in the quality required or permitted; and that the Work will conform with the requirements of the Contract Documents. Work not conforming to these requirements, including substitutions not properly approved and authorized, may be considered defective. If required by the Designer, the Contractor shall furnish satisfactory evidence as to the kind and quality of materials and equipment.

3.4.2 Except as otherwise specifically stated below, the Contractor shall guarantee his materials and workmanship against defect due to faulty materials or faulty workmanship or negligence for a period of twelve (12) months following Substantial Completion of the Work. Where the manufacturer's warranty on equipment or parts thereof exceeds twelve (12) months, the guarantee period on such equipment or parts thereof shall be extended to include the full warranty of the manufacturer. The Contractor shall repair or replace such defective materials, equipment, or workmanship to the full satisfaction of the Owner within the stipulated guarantee period without cost to the Owner.

3.4.3 All material, equipment, or other special warranties required by the Contract Documents shall be issued in the name of the Owner, or shall be transferable to the Owner, and shall commence on the date of Substantial Completion of the Work or designated portion thereof unless otherwise provided in the Certificate of Substantial Completion.

3.5 TAXES: The Contractor shall pay sales, consumer, use, and similar taxes for the Work or portions thereof provided by the Contractor which are legally enacted when bids are received or negotiations concluded, whether or not yet effective or merely scheduled to go into effect.

3.6 PERMITS, FEES AND NOTICES

3.6.1 Unless otherwise provided in the Contract Documents, the Contractor shall secure and pay for the building permit and other permits and governmental fees, licenses, and inspections necessary for proper execution and completion of the Work which are customarily secured after execution of the Contract for Construction and which are legally required when bids are received or negotiations concluded.

3.6.2 The Contractor shall comply with and give notices required by laws, ordinances, rules, regulations, and lawful orders of public authorities bearing on performance of the Work.

3.6.3 It is not the Contractor's responsibility to ascertain that the Contract Documents are in accordance with applicable laws, statutes, ordinances, building codes, and rules and regulations. However, if the Contractor observes that portions of the Contract Documents are at variance therewith, the Contractor shall promptly notify the Designer and Owner in writing, and necessary changes shall be accomplished by appropriate Modification.

3.6.4 If the Contractor performs Work the Contractor knows or should have known it to be contrary to laws, statutes, ordinances, building codes, and rules and regulations without such notice to the Designer and Owner, the Contractor shall assume full responsibility for such Work and shall bear the attributable costs.

3.7 ALLOWANCES

3.7.1 The Contractor shall include in the Contract Sum all allowances stated in the Contract Documents. Items covered by allowances shall be supplied for such amounts and by such persons or entities as the Owner may direct, but the Contractor shall not be required to

employ persons or entities against which the Contractor makes reasonable objection.

3.7.2 Unless otherwise provided in the Contract Documents:

- 1 materials and equipment under an allowance shall be selected promptly by the Owner to avoid delay in the Work;
- 2 allowances shall cover the cost to the Contractor of materials and equipment delivered to the site and all required taxes, less applicable trade discounts;
- 3 Contractor's costs for unloading and handling at the site, labor, installation costs, overhead, profit and other expenses contemplated for stated allowance amounts shall be included in the Contract Sum and not in the allowances;
- 4 whenever costs are more than or less than allowances, the Contract Sum shall be adjusted accordingly by a Change Order. The amount of the Change Order shall reflect (a) the difference between actual costs and the allowances under Clause 3.7.2(2) and (b) changes in Contractor's costs under Clause 3.7.2(3). To the extent that any allowance is not fully used, then the unused amount of each allowance shall be credited to the Owner by a Change Order.

3.8 SUPERINTENDENT: The Contractor shall employ a competent superintendent and necessary assistants who shall be in attendance at the Project site during performance of the Work. The superintendent shall represent the Contractor, and communications given to the superintendent shall be as binding as if given to the Contractor. Important communications shall be confirmed in writing upon request.

3.9 CONTRACTOR'S CONSTRUCTION SCHEDULES

3.9.1 Promptly after being awarded the Contract, the Contractor shall prepare and submit for the Designer's review and comment a construction schedule for the Work. The schedule shall not exceed time limits provided in the Contract Documents, shall be revised at appropriate intervals as required by the conditions of the Work and Project, shall be related to the entire Project to the extent required by the Contract Documents, and shall provide for expeditious and practicable execution of the Work. If separate prime contracts are awarded by the Owner in connection with this Project, the Contractor shall additionally submit a Contractor's construction schedule for the Work to the General Contractor in order for the General Contractor to carry out its duties under Article 6.

3.9.2 The Contractor shall prepare and keep current, for the Designer's approval, a schedule of submittals which is coordinated with the Contractor's construction schedule and allows the Designer reasonable time to review submittals.

3.9.3 The Contractor shall perform Work in general accordance with the most recent schedules.

3.10 DOCUMENTS AND SAMPLES AT THE SITE

The Contractor shall maintain at the site for the Owner one record copy of the Drawings, Specifications, addenda, Change Orders, and other Modifications, in good order and marked currently to record changes and selections made during construction, and in addition approved Shop Drawings, Product Data, Samples, and similar required submittals. These shall be available to the Designer and shall be delivered to the Designer for submittal to the Owner upon completion of the Work.

3.11 SHOP DRAWINGS, PRODUCT DATA, AND SAMPLES

- 3.11.1 Shop Drawings are drawings, diagrams, schedules, and other data specially prepared for the Work by the Contractor or a Subcontractor, Sub-subcontractor, manufacturer, supplier, or distributor to illustrate some portion of the Work.
- 3.11.2 Product Data are illustrations, standard schedules, performance charts, instructions, brochures, diagrams, and other information furnished by the Contractor to illustrate materials or equipment for some portion of the Work.
- 3.11.3 Samples are physical examples, which illustrate materials, equipment, or workmanship and establish standards by which the Work will be judged.
- 3.11.4 Shop Drawings, Product Data, Samples, and similar submittals are not Contract Documents. The purpose of their submittal is to demonstrate for those portions of the Work for which submittals are required the way the Contractor proposes to conform to the information given and the design concept expressed in the Contract Documents. Review by the Designer is subject to the limitations of Paragraph 4.1.6.
- 3.11.5 The Contractor shall review, approve, and submit to the Designer Shop Drawings, Product Data, Samples, and similar submittals required by the Contract Documents with reasonable promptness and in such sequence as to cause no delay in the Work or in the activities of the Owner or of Separate Contractors. Submittals made by the Contractor which are not required by the Contract Documents may be returned without action.
- 3.11.6 The Contractor shall perform no portion of the Work requiring submittal and review of Shop Drawings, Product Data, Samples, or similar submittals until the respective submittal has been reviewed and approved or other appropriate action taken by the Designer. Such Work shall be in accordance with approved submittals.
- 3.11.7 By approving and submitting Shop Drawings, Product Data, Samples, and similar submittals, the Contractor represents that the Contractor has determined and verified materials, field measurements, and field construction criteria related thereto, or will do so, and has checked and coordinated the information contained within such submittals with the requirements of the Work and of the Contract Documents.
- 3.11.8 The Contractor shall not be relieved of responsibility for deviations from requirements of the Contract Documents by the Designer's review and approval of Shop Drawings, Product Data, Samples, or similar submittals unless the Contractor has specifically informed the Designer in writing of such deviation at the time of submittal and the Designer has given written approval to the specific deviation. The Contractor shall not be relieved of responsibility for errors or omissions in Shop Drawings, Product Data, Samples, or similar submittals by the Designer's approval thereof.
- 3.11.9 The Contractor shall direct specific attention, in writing or on resubmitted Shop Drawings, Product Data, Samples, or similar submittals, to revisions other than those requested by the Designer on previous submittals.
- 3.11.10 Informational submittals upon which the Designer is not expected to take responsive action may be so identified in the Contract Documents.
- 3.11.11 When professional certification of performance criteria of materials, systems, or equipment is required by the Contract Documents, the Designer shall be entitled to rely upon the accuracy and completeness of such calculations and certificates.
- 3.12 USE OF SITE:** The Contractor shall confine operations at the site to areas permitted by law,

ordinances, permits, and the Contract Documents and shall not unreasonably encumber the site with materials or equipment.

3.13 CUTTING AND PATCHING

- 3.13.1 The Contractor shall be responsible for cutting, fitting, or patching required to complete the Work or to make its parts fit together properly.
- 3.13.2 The Contractor shall not damage or endanger a portion of the Work or fully or partially completed construction of the Owner or Separate Contractors by cutting, patching, or otherwise altering such construction, or by excavation. The Contractor shall not cut or otherwise alter such construction by the Owner or a Separate Contractor except with written consent of the Owner and of such Separate Contractor; such consent shall not be unreasonably withheld. The Contractor shall not unreasonably withhold from the Owner or a Separate Contractor the Contractor's consent to cutting or otherwise altering the Work.

3.14 CLEANING UP

- 3.14.1 The Contractor shall keep the premises and surrounding area free from accumulation of waste materials or rubbish caused by operations under the Contract. At completion of the Work the Contractor shall remove from and about the Project waste materials, rubbish, the Contractor's tools, construction equipment, machinery, and surplus materials.
- 3.14.2 If the Contractor fails to clean up as provided in the Contract Documents, the Owner may do so and the cost thereof shall be charged to the Contractor.

3.15 ACCESS TO WORK: The Contractor shall provide the Owner and Designer access to the Work in preparation and progress wherever located.

3.16 ROYALTIES AND PATENTS: The Contractor shall pay all royalties and license fees. The Contractor shall defend suits or claims for infringement of patent rights and shall hold the Owner and Designer harmless from loss unless a particular design, process or product of a particular manufacturer or manufacturers is required by the Contract Documents. However, if the Contractor has reason to believe that the required design, process, or product is an infringement of a patent, the Contractor shall be responsible for such loss unless such information is promptly furnished to the Designer.

3.17 INDEMNIFICATION

- 3.17.1 To the fullest extent permitted by law, the Contractor shall defend, indemnify, and hold harmless the Owner, the Owner's elected officials, officers, directors, managers, agents, employees, and affiliated entities of any of them; the Designer, the Designer's consultants, agents, employees, and affiliated entities of any of them; and any parties which the Contract Documents require the Contractor to defend, indemnify, or hold harmless (altogether, the "Indemnified Parties") from and against any and all claims, losses, damages, demands, injuries, judgments, causes of action, suits, and liability of every kind including without limitation attorneys' fees and other litigation expenses incurred by an Indemnified Party (collectively, the "Indemnified Claims") for the following:

- 1 For bodily injury to or the death of any person, or damage to or destruction of tangible property (including the loss of its use) arising from the negligence of the Contractor or the Contractor's derivative parties (as "derivative parties" are defined by N.C. Gen. Stat. § 22B-1); provided, however, that the Contractor shall not be required to indemnify or hold harmless an Indemnified Party against any damages arising out of

bodily injury to persons or damage to personal property proximately caused by or resulting from the negligence, in whole or in part, of such Indemnified Party.

2 For all Indemnified Claims not included in Subparagraph 1 above, in which the fault of the Contractor or its derivative parties (as "fault" and "derivative parties" are defined by N.C. Gen. Stat. § 22B-1) is a proximate cause of the loss, damage, or expense indemnified.

3 For all Indemnified Claims against the Indemnified Party arising from or relating to liens asserted under Chapter 44A of the General Statutes of North Carolina.

3.17.2 In any and all Indemnified Claims against the Indemnified Parties by an employee of the Contractor, to the fullest extent permitted by law, any indemnification obligation shall not be limited by amount or type of damages, compensation, or benefits payable by or for the Contractor under workers' compensation acts, disability benefit acts, or other employee benefit acts.

3.17.3 The obligations of the Contractor under this Section 3.17, shall not extend to the liability of the Designer, the Designer's consultants, and agents and employees of any of them arising out of (a) the preparation or approval of maps, drawings, opinions, reports, surveys, Change Orders, designs, or specifications, or (b) the giving of or the failure to give directions or instructions by the Designer, the Designer's consultants, and agents and employees of any of them provided such giving or failure to give is the primary cause of the injury or damage.

3.17.4 If any indemnity obligation of the Contractor under this Section 3.17 or elsewhere in the Contract, is held to be unenforceable, Contractor shall indemnify and hold harmless the Indemnified Parties to the full extent permitted by Law. Further, the Contractor's liability resulting from its defense and indemnity obligations under the Contract is not limited or affected in any way by insurance coverage or lack thereof.

4 ARTICLE 4 ADMINISTRATION OF THE CONTRACT

4.1 DESIGNER'S ADMINISTRATION OF THE CONTRACT

4.1.1 The Designer will provide administration of the Contract as described in the Contract Documents, and will be the Owner's representative during construction through final payment, and with the Owner's concurrence, from time to time during the correction period described in Section 11.2. The Designer will advise and consult with the Owner. The Designer will have authority to act on behalf of the Owner only to the extent provided in the Contract Documents, unless otherwise modified by written instrument in accordance with other provisions of the Contract.

4.1.2 The Designer will not have control over or charge of and will not be responsible for construction means, methods, techniques, sequences or procedures, or for safety precautions and programs in connection with the Work, since these are solely the Contractor's responsibility as provided in Section 3.2. The Designer will not be responsible for the Contractor's failure to carry out the Work in accordance with the Contract Documents. The Designer will not have control over or charge of and will not be responsible for acts or omissions of the Contractor, Subcontractors, or their agents or employees, or of any other persons performing portions of the Work.

4.1.3 Except as otherwise provided in the Contract Documents or when direct communications have been specially authorized, the Owner and Contractor shall endeavor to communicate through

the Designer. Communications by and with the Designer's consultants shall be through the Designer. Communications by and with Subcontractors and material suppliers shall be through the Contractor. Communications by and with Separate Contractors shall be through the Designer.

- 4.1.4 Based on the Designer's inspections, observations, and evaluations of the Contractor's Applications for Payment, the Designer will review and certify the amounts due the Contractor and will issue Certificates for Payment in such amounts.
- 4.1.5 The Designer will have authority to reject Work which does not conform to the Contract Documents. Whenever the Designer considers it necessary or advisable for implementation of the intent of the Contract Documents, the Designer will have authority to require additional inspection or testing of the Work in accordance with Paragraphs 12.7.2 and 12.7.3, whether or not such Work is fabricated, installed, or completed. However, neither this authority of the Designer nor a decision made in good faith either to exercise or not to exercise such authority shall give rise to a duty or responsibility of the Designer to the Contractor, Subcontractors, material and equipment suppliers, their agents or employees, or other persons performing portions of the Work.
- 4.1.6 The Designer will review and approve or take other appropriate action upon the Contractor's submittals such as Shop Drawings, Product Data, and Samples but only for the limited purpose of checking for conformance with information given and the design concept expressed in the Contract Documents. The Designer's action will be taken with such reasonable promptness as to cause no delay in the Work or in the activities of the Owner, Contractor or Separate Contractors, while allowing sufficient time in the Designer's professional judgment to permit adequate review. Review of such submittals is not conducted for the purpose of determining the accuracy and completeness of other details such as dimensions and quantities, or for substantiating instructions for installation or performance of equipment or systems, all of which remain the responsibility of the Contractor as required by the Contract Documents. The Designer's review of the Contractor's submittals shall not relieve the Contractor of the obligations under Article 3. The Designer's review shall not constitute approval of safety precautions or, unless otherwise specifically stated by the Designer, of any construction means, methods, techniques, sequences, or procedures. The Designer's approval of a specific item shall not indicate approval of an assembly of which the item is a component.
- 4.1.7 The Designer will prepare Change Orders and Construction Change Directives, and may authorize minor changes in the Work as provided in Section 7.4.
- 4.1.8 The Designer will conduct inspections to determine the date or dates of Substantial Completion and the date of final completion, will receive and forward to the Owner for the Owner's review and records, written warranties and related documents required by the Contract and assembled by the Contractor, and will issue a final Certificate for Payment upon compliance with the requirements of the Contract Documents.
- 4.1.9 The Designer will interpret and decide matters concerning performance under and requirements of the Contract documents on written request of either the Owner or Contractor. The Designer's response to such requests will be made with reasonable promptness and within any time limits agreed upon. If no agreement is made concerning the time within which interpretations required of the Designer shall be furnished in compliance with this Paragraph 4.1.9, then delay shall not be recognized on account of failure by the Designer to furnish such interpretations until 15 days after written request is made for them.

- 4.1.10 Interpretations and decisions of the Designer will be consistent with the intent of and reasonably inferable from the Contract Documents and will be in writing or in the form of drawings. When making such interpretations and decisions, the Designer will endeavor to secure faithful performance by both Owner and Contractor, and will not show partiality to either.
- 4.1.11 The Designer's decisions on matters relating to aesthetic effect will be final if consistent with the intent expressed in the Contract Documents.
- 4.1.12 If the Contractor fails to correct Work which is not in accordance with the requirements of the Contract Documents as required by Section 11.2 or persistently fails to carry out Work in accordance with the Contract Documents, the Designer may order the Contractor to stop the Work, or any portion thereof, until the cause for such order has been eliminated; however, the right of the Designer to stop the Work shall not give rise to a duty on the part of the Designer to exercise this right for the benefit of the Contractor or any other person or entity.

4.2 CLAIMS AND DISPUTES

- 4.2.1 A Claim is a demand or assertion by one of the Parties seeking, as a matter of right, adjustment or interpretation of Contract terms, payment of money, extension of time, or other relief with respect to the terms of the Contract. Claims include other disputes and matters in question between the Owner and Contractor arising out of or relating to the Contract. Claims must be made pursuant to the Dispute Resolution Procedure set forth in Section 4.4. The responsibility to substantiate Claims shall rest with the party making the Claim.
- 4.2.2 Decision of Designer. Claims, including those alleging an error or omission by the Designer, shall be referred initially to the Designer for action as provided in Section 4.4. A decision by the Designer shall be required as a condition precedent to mediation and litigation of a Claim between any Party involved in this construction Project as to all such matters arising prior to the date final payment is due, regardless of whether such matters relate to execution and progress of the Work or the extent to which the Work has been completed. The decision by the Designer in response to a Claim shall not be a condition precedent to litigation in the event (1) the position of Designer is vacant, (2) the Designer has not received evidence or has failed to render a decision within agreed time limits, or (3) forty-five (45) days have passed after the Claim has been referred to the Designer.
- 4.2.3 Time Limits on Claims. Claims by the Contractor must be made within ten (10) days after occurrence of the event giving rise to such Claim or within ten (10) days after the Contractor first recognizes the condition giving rise to the Claim, whichever is later. Claims must be made by written notice. An additional Claim made after the initial Claim has been implemented by Change Order will not be considered.
- 4.2.4 Continuing Contract Performance. Pending final resolution of a Claim, unless otherwise agreed in writing, the Contractor shall proceed diligently with performance of the Contract and the Owner shall continue to make payments in accordance with the Contract Documents.
- 4.2.5 Waiver of Claims: Final Payment. The making of final payment shall constitute a waiver of Claims by the Owner except those arising from:
- 1 unsettled claims arising out of the Contract; or
 - 2 failure of the Work to comply with the requirements of the Contract Documents; or
 - 3 terms of special warranties required by the Contract Documents

Acceptance of final payment by the Contractor waives all Claims by the Contractor against the Owner except those previously asserted and remaining unsettled.

- 4.2.6 Claims for Concealed Or Unknown Conditions. If conditions are encountered at the site which are (a) subsurface or otherwise concealed physical conditions which differ materially from those indicated in the Contract Documents or (b) unknown physical conditions of an unusual nature, which differ materially from those ordinarily found to exist and generally recognized as inherent in construction activities of the character provided for in the Contract Documents, then notice by the observing Party shall be given to the other Party promptly before conditions are disturbed and in no event later than ten (10) days after first observance of the conditions. The Designer will promptly investigate such conditions and, if they differ materially and cause an increase or decrease in the Contractor's cost of, or time required for, performance of any part of the Work, will recommend an equitable adjustment in the Contract Sum or Contract Time, or both. If the Designer determines that the conditions at the site are not materially different from those indicated in the Contract Documents and that no change in the terms of the Contract is justified the Designer shall so notify the Owner and Contractor in writing stating the reasons, Claims by either party in opposition to such determination must be made within twenty-one (21) days after the Designer has given notice of the decision. If the Owner and Contractor cannot agree on an adjustment in the Contract Sum or Contract Time, the adjustment shall be referred to the Designer for initial determination, subject to further proceedings pursuant to Section 4.4.
- 4.2.7 Claims for Additional Cost. If the Contractor wishes to make Claim for an increase in the Contract Sum, written notice as provided herein shall be given before proceeding to execute the Work. Prior notice is not required for Claims relating to an emergency endangering life or property arising under Section 10.3. If the Contractor believes additional cost is involved for reasons including but not limited to (a) a written interpretation from the Designer, (b) a written order for a minor change in the Work issued by the Designer, (c) termination of the Contract by the Owner, Claim shall be filed in accordance with the procedure established herein. This Article, and Article 7, shall be the exclusive means by which the Contractor may claim additional cost or damages from the Owner, and the Contractor hereby waives any and all right to claim additional cost or damages by any other remedy including, without limitation, quantum meruit, subrogation, or implied contract.
- 4.2.8 Claims for Additional Time. If the Contractor wishes to make Claim for an increase in the Contract Time, written notice as provided herein shall be given. The Contractor's Claim shall include an estimate of cost and of probable effect of delay on progress of the Work. In the case of a continuing delay only one Claim is necessary. Adverse weather conditions shall not be a basis for a Claim for additional costs.
- 4.2.9 Waiver of Claims for Consequential Damages. The Contractor waives Claims against the Owner for consequential damages arising out of or relating to this Contract except to the extent that such damages are covered and paid under a policy of insurance maintained by the Owner. This waiver includes damages incurred by the Contractor for principal office expenses including the compensation of personnel stationed there, for losses of financing, business and reputation, and for loss of profit, except anticipated profit arising directly from the Work. This waiver is applicable, without limitation, to all consequential damages due to the Owner's termination in accordance with Article 13. Nothing contained in this Paragraph 4.2.9 shall be deemed to preclude assessment of liquidated damages, when applicable, in accordance with the requirements of the Contract Documents.

4.3 INJURY OR DAMAGE TO PERSON OR PROPERTY: If either party to the Contract suffers injury or damage to person or property because of an act or omission of the other Party, of any of the other Party's employees or agents, or of others for whose acts such Party is legally liable, written notice as such injury or damage, whether or not insured, shall be given to the other Party within a reasonable time not exceeding ten (10) days after first observance. The notice shall provide sufficient detail to enable the other party to investigate the matter. If a Claim for additional cost or time related to this Claim is to be asserted, it shall be filed as provided in Paragraphs 4.2.7 or 4.2.8.

4.4 DISPUTE RESOLUTION PROCEDURE

- 4.4.1 To prevent all disputes and litigation, it is agreed by the Parties that any Claim, question, difficulty, or dispute arising from this Contract or the construction process shall be first submitted to the Designer to address the issue. Upon review of the Claim, the Designer shall take one or more of the following preliminary actions within ten (10) days of receipt of a Claim: (1) request additional supporting data from the claimant, (2) submit a schedule to the Parties indicating when the Designer expects to take action, (3) reject the Claim in whole or in part stating reasons for rejection, (4) recommend approval of the Claim by the other Party, or (5) suggest a compromise. The Designer may also, but is not obligated to, notify the surety, if any, of the nature and amount of the Claim.
- 4.4.2 If a Claim has been resolved, the Designer will prepare or obtain appropriate documentation.
- 4.4.3 If a Claim has not been resolved, the Party making the Claim shall, within ten (10) days after the Designer's preliminary response, take one or more of the following actions: (1) submit additional supporting data requested by the Designer, (2) modify the initial Claim and resubmit it to the Designer, or (3) notify the Designer that the initial Claim stands and submit the Claim for mediation pursuant to Paragraph 4.4.4, below.
- 4.4.4 A mediator shall address any properly submitted Claim, question, difficulty, or dispute arising from this Contract or the construction process, which has not been satisfactorily resolved by the Designer or Owner. The mediator's orders, decisions, and decrees shall be non-binding. Mediation, pursuant to this Paragraph, shall be a pre-condition to initiating litigation concerning the dispute. During the pendency of any dispute and after a determination thereof, the Parties to the dispute shall act in good faith to mitigate any potential damages including utilization of construction schedule changes and alternate means of construction. The mediator shall be agreed upon by the Parties and the Designer.
- 4.4.5 The mediation session shall be private. Prior to commencement of mediation, if requested by either Party or the mediator, the Parties and the mediator shall execute a written confidentiality agreement in accordance with the provisions of North Carolina law. All such mediation sessions shall be held in Wake County, North Carolina.
- 4.4.6 If, as a result of mediation, a voluntary settlement is reached the agreement shall be reduced to writing, and it shall be enforceable in the General Court of Justice in the Wake County, North Carolina, which shall be the exclusive venue and jurisdiction for disputes arising thereunder.
- 4.4.7 If the disputed issue cannot be resolved in mediation or either party disagrees with the results of the mediation, the parties may seek resolution in the General Court of Justice in the County of Wake and the State of North Carolina.
- 4.4.8 The dispute resolution procedure set forth in this Paragraph shall be made available to any party involved in this construction project including Owner, Contractor, Designer,

Subcontractors, as well as Sub-subcontractors and is a precondition to initiation of litigation concerning the dispute.

- 4.4.9 The Parties shall share the mediator's fee and any filing fees equally.

5 ARTICLE 5 SUBCONTRACTORS

5.1 DEFINITIONS

- 5.1.1 A Subcontractor is a person or entity who has a direct contract with the Contractor to perform a portion of the Work at the site. The term "Subcontractor" is referred to throughout the Contract Documents as if singular in number and means a Subcontractor or an authorized representative of the Subcontractor. The term "Subcontractor" does not include a Separate Contractor or subcontractors of a Separate Contractor.

- 5.1.2 A Sub-subcontractor is a person or entity who has a direct or indirect contract with a Subcontractor to perform a portion of the Work at the site. The term "Sub-subcontractor" is referred to throughout the Contract Documents as if singular in number and means a Sub-subcontractor or an authorized representative of the Sub-subcontractor.

5.2 AWARD OF SUBCONTRACTS AND OTHER CONTRACTS FOR PORTIONS OF THE WORK

- 5.2.1 Unless otherwise stated in the Contract Documents or the bidding requirements, the Contractor, as soon as practicable after award of the Contract, shall furnish in writing to the Owner through the Designer the names of persons or entities (including those who are to furnish materials or equipment fabricated to a special design) proposed for each principal portion of the Work, including (1) Heating, ventilating, and air conditioning, (2) Plumbing, (3) Electrical, and (4) General. The Designer will promptly reply to the Contractor in writing stating whether or not the Owner or the Designer, after due investigation, has reasonable objection to any such proposed person or entity. Failure of the Owner or Designer to reply promptly shall constitute notice of no reasonable objection.

- 5.2.2 The Contractor shall not contract with a proposed person or entity to whom the Owner or Architect has made reasonable and timely objection. The Contractor shall not be required to contract with anyone to whom the Contractor has made reasonable objection.

- 5.3 The Contractor shall NOT substitute any person or company listed in the Contractor's original Bid Proposal, except (1) when one of the listed Subcontractor's bid is later determined by the Contractor to be non-responsible or non-responsive or the listed Subcontractor refuses to enter into a contract for the complete performance of the Work, or (2) with the approval of the Owner for good cause shown by the Contractor.

- 5.4 **SUBCONTRACTUAL RELATIONS:** By appropriate agreement, written where legally required for validity, the Contractor shall require each Subcontractor, to the extent of the Work to be performed by the Subcontractor, to be bound to the Contractor by terms and conditions of the Contract Documents and Contract for Construction, and to assume toward the Contractor all the obligations and responsibilities which the Contractor, by these documents, assumes toward the Owner and Designer. Each subcontract agreement shall preserve and protect the rights of the Owner and Designer under the Contract Documents with respect to the Work to be performed by the Subcontractor so that subcontracting thereof will not prejudice such rights, and shall allow to the Subcontractor, unless specifically provided otherwise in the subcontract agreement, the benefit of all rights, remedies and redress against the Contractor that the Contractor, by the Contract Documents, has against the Owner. Where appropriate, the

Contractor shall require each Subcontractor to enter into similar agreements with Sub-subcontractors. The Contractor shall make available to each proposed Subcontractor, prior to the execution of the subcontract agreement, copies of the Contract Documents to which the Subcontractor will be bound, and, upon written request of the Subcontractor, identify to the Subcontractor terms and conditions of the proposed subcontract agreement which may be at variance with the Contract Documents. Subcontractors shall similarly make copies of applicable portions of such documents available to their respective proposed Sub-subcontractors.

6 ARTICLE 6 CONSTRUCTION BY OWNER OR BY SEPARATE CONTRACTORS

6.1 OWNER'S RIGHT TO PERFORM CONSTRUCTION AND TO AWARD SEPARATE CONTRACTS

- 6.1.1 The Owner reserves the right to perform construction or operations related to the Project with the Owner's own forces, and to award separate contracts in connection with other portions of the Project or other construction or operations on the site.
- 6.1.2 When separate contracts are awarded for different portions of the Project or other construction or operations on the site, the term Contractor in the Contract Documents in each case shall mean the Contractor who executes each separate Owner-Contractor Contract.
- 6.1.3 The General Contractor shall provide for coordination of the activities of each Separate Contractor with the Work of the Contractor, who shall cooperate with them. The Contractor shall participate with any Separate Contractors and the General Contractor (and the Owner and Designer as needed) in reviewing their construction schedules. The Contractor shall make any revisions to the construction schedule deemed necessary after a joint review and mutual agreement. The construction schedules shall then constitute the schedules to be used by the Contractor and Separate Contractors until subsequently revised.
- 6.1.4 Unless otherwise provided in the Contract Documents, when the Owner performs construction or operations related to the Project with the Owner's own forces, the Owner shall be deemed to be subject to the same obligations and to have the same rights which apply to the Contractor under the Conditions of the Contract, including, without excluding others, those stated in Article 3, this Article 6, and Articles 10 and 11.
- 6.1.5 The General Contractor shall be responsible for scheduling the work of all contractors; the maintenance of the progress schedule for all prime contractors for this Project; and for the notification of the Designer of any changes in the progress schedule.

6.2 MUTUAL RESPONSIBILITY

- 6.2.1 The Contractor shall afford the Owner and Separate Contractors (if any) reasonable opportunity for introduction and storage of their materials and equipment and performance of their activities and shall connect and coordinate the Contractor's construction and operations with theirs as required by the Contract Documents.
- 6.2.2 If part of the Contractor's Work depends for proper execution or results upon construction or operations by the Owner or a Separate Contractor, the Contractor shall, prior to proceeding with that portion of the Work, promptly report to the Designer apparent discrepancies or defects in such other construction that would render it unsuitable for such proper execution and results. Failure of the Contractor so to report shall constitute an acknowledgment that the Owner's or the Separate Contractor's completed or partially completed construction is fit and proper to receive the Contractor's Work, except as to defects not then reasonably discoverable.

- 6.2.3 Costs caused by delays, by improperly timed activities, defective construction, or any other damages shall be borne by the party responsible therefor. The Owner shall not be liable nor responsible for any delays or damages to the Contractor caused by Separate Contractors or the Designer.
- 6.2.4 The Contractor shall promptly remedy damage wrongfully caused by the Contractor to completed or partially completed construction or to property of the Owner or Separate Contractors as provided in Paragraph 10.2.5.
- 6.2.5 Claims and other disputes and matters in question between the Contractor and a Separate Contractor shall be subject to the provisions of Sections 4.2 and 4.4, provided the Separate Contractor has reciprocal obligations.
- 6.2.6 The Owner and each Separate Contractor shall have the same responsibilities for cutting and patching as are described for the Contractor in Section 3.13.
- 6.3 OWNER'S RIGHT TO CLEAN UP:** If a dispute arises among the Contractor, Separate Contractors and the Owner as to the responsibility under their respective contracts for maintaining the premises and surrounding area free from waste materials and rubbish as described in Section 3.14, the Owner may clean up and allocate the cost among those responsible as the Designer determines to be just.

7 ARTICLE 7 CHANGES IN THE WORK

7.1 CHANGES

- 7.1.1 Changes in the Work may be accomplished after execution of the Contract, and without in validating the Contract, by Change Order, Construction Change Directive, or order for a minor change in the Work, subject to the limitations stated in this Article 7 and elsewhere in the Contract Documents.
- 7.1.2 A Change Order shall be based upon agreement among the Owner, Contractor, and Designer; a Construction Change Directive requires agreement by the Owner and Designer and may or may not be agreed to by the Contractor; an order for a minor change in the Work may be issued by the Designer alone pursuant to Section 7.4.
- 7.1.3 Changes in the Work shall be performed under applicable Provisions of the Contract Documents, and the Contractor shall proceed promptly, unless otherwise provided in the Change Order, Construction Change Directive, or order for a minor change in the Work.
- 7.1.4 If unit prices are stated in the Contract Documents or subsequently agreed upon, and if quantities originally contemplated are so changed in a proposed Change Order or Construction Change Directive that application of such unit prices to quantities of Work proposed will cause substantial inequity to the Owner or Contractor, the applicable unit prices shall be equitably adjusted.
- 7.1.5 Overhead and profit shall not exceed 15% of the value of labor and material for work performed by any contractor or Subcontractor. If the work is performed by a Subcontractor, the prime contractor's overhead and profit shall not exceed 5%.

7.2 CHANGE ORDERS

- 7.2.1 A Change Order is a written instrument prepared by the Designer and signed by the Owner, Contractor, and Designer, stating their agreement upon all of the following:
 - 1 a change in the Work;

- 2 the amount of the adjustment in the Contract Sum, if any; and
- 3 the extent of the adjustment in the Contract Time, if any.

7.2.2 Methods used in determining adjustments to the Contract Sum may include those listed in Paragraph 7.3.3.

7.3 CONSTRUCTION CHANGE DIRECTIVES

7.3.1 A Construction Change Directive is a written order prepared by the Designer and signed by the Owner and Designer, directing a change in the Work and stating a proposed basis for adjustment, if any, in the Contract Sum or Contract Time, or both. The Owner may by Construction Change Directive, without invalidating the Contract, order changes in the Work within the general scope of the Contract consisting of additions, deletions or other revisions, the Contract Sum and Contract Time being adjusted accordingly.

7.3.2 A Construction Change Directive shall be used in the absence of total agreement on the terms of a Change Order.

7.3.3 If the Construction Change Directive provides for an adjustment to the Contract Sum, the adjustment shall be based on one of the following methods:

- 1 mutual acceptance of a lump sum properly itemized and supported by sufficient substantiating data to permit evaluation;
- 2 unit prices stated in the Contract Documents or subsequently agreed upon;
- 3 cost to be determined in a manner agreed upon by the parties and a mutually acceptable fixed or percentage fee; or
- 4 as provided in Paragraph 7.3.6.

7.3.4 Upon receipt of a Construction Change Directive, the Contractor shall promptly proceed with the change in the Work involved and advise the Designer of the Contractor's agreement or disagreement with the method, if any, provided in the Construction Change Directive for determining the proposed adjustment in the Contract Sum or Contract Time.

7.3.5 A Construction Change Directive signed by the Contractor indicates the agreement of the Contractor therewith, including adjustment in Contract Sum and Contract Time or the method for determining them. Such agreement shall be effective immediately and shall be recorded as a Change Order.

7.3.6 If the Contractor does not respond promptly or disagrees with the method for adjustment in the Contract Sum, the method and the adjustment shall be determined by the Designer on the basis of reasonable expenditures and savings of those performing the Work attributable to the change, including, in case of an increase in the Contract Sum, a reasonable allowance for overhead and profit. In such case, and also under Clause 7.3.3(3), the Contractor shall keep and present, in such form as the Designer may prescribe, an itemized accounting together with appropriate supporting data. Unless otherwise provided in the Contract Documents, costs for the purposes of this Paragraph 7.3.6 shall be limited to the following:

- 1 costs of labor, including social security, old age, and unemployment insurance, fringe benefits required by agreement or custom, and workers' compensation insurance;
- 2 costs of materials, supplies, and equipment, including cost of transportation, whether incorporated or consumed;

- 3 rental costs of machinery and equipment, exclusive of hand tools, whether rented from the Contractor or others;
 - 4 costs of premiums for all bonds and insurance, permit fees, and sales, use, or similar taxes related to the Work; and
 - 5 additional costs of supervision and field office personnel directly attributable to the change.
- 7.3.7 Pending final determination of cost to the Owner, amounts not in dispute may be included in Applications for Payment. The amount of credit to be allowed by the Contractor to the Owner for a deletion or change which results in a net decrease in the Contract Sum shall be actual net cost as confirmed by the Designer. When both additions and credits covering related Work or substitutions are involved in a change, the allowance for overhead and profit shall be figured on the basis of net increase, if any, with respect to that change.
- 7.3.8 If the Owner and Contractor do not agree with the adjustment in Contract Time or the method for determining it, the adjustment or the method shall be referred to the Designer for determination.
- 7.3.9 When the Owner and Contractor agree with the determination made by the Designer concerning the adjustments in the Contract Sum and Contract Time, or otherwise reach agreement upon the adjustments, such agreement shall be effective immediately and shall be recorded by preparation and execution of an appropriate Change Order.
- 7.4 MINOR CHANGES IN THE WORK:** The Designer will have authority to order minor changes in the Work not involving adjustment in the Contract Sum or extension of the Contract Time and not inconsistent with the intent of the Contract Documents. Such changes shall be effected by written order and shall be binding on the Owner and Contractor. If the Contractor believes that the proposed minor change in the Work will affect the Contract Sum or Contract Time, the Contractor shall notify the Designer and shall not proceed to implement the change in the Work. If the Contractor performs the Work set forth in the Designer's order for a minor change without prior notice to the Designer that such change will affect the Contract Sum or Contract Time, the Contractor waives any adjustment to the Contract Sum or extension of the Contract Time. The Contractor shall carry out such written orders promptly.

8 ARTICLE 8 TIME

8.1 DEFINITIONS

- 8.1.1 Unless otherwise provided, Contract Time is the period of time, including authorized adjustments, allotted in the Contract Documents for Substantial Completion of the Work.
- 8.1.2 The date of commencement of the Work is the date established in the Contract. The date shall not be postponed by the failure to act of the Contractor or of persons or entities for whom the Contractor is responsible.
- 8.1.3 The date of Substantial Completion is the date certified by the Designer in accordance with Section 9.9.
- 8.1.4 The term "day" as used in the Contract Documents shall mean calendar day unless otherwise specifically defined.

8.2 PROGRESS AND COMPLETION

- 8.2.1 Time limits stated in the Contract Documents are of the essence of the Contract. By executing

the Contract, the Contractor confirms that the Contract Time is a reasonable period for performing the Work. The Contractor and the Contractor's surety shall be liable for and shall pay the Owner such sums as shall be set forth in the Contract between Owner and Contractor as liquidated damages each calendar day of delay until the Work is substantially complete.

- 8.2.2 The Contractor shall not knowingly, except by agreement or instruction of the Owner in writing, prematurely commence operations on the site or elsewhere prior to the effective date of insurance required by the Contract for Construction to be furnished by the Contractor. The date of commencement of the Work shall not be changed by the effective date of such insurance. Unless the date of commencement is established by a notice to proceed given by the Designer, the Contractor shall notify the Owner and Designer in writing not less than five days before commencing the Work.
- 8.2.3 The Contractor shall proceed expeditiously with adequate forces and shall achieve Substantial Completion within the Contract Time.

8.3 DELAYS AND EXTENSIONS OF TIME

- 8.3.1 If the Contractor is delayed at any time in progress of the Work by an act or neglect of the Owner or Designer, or of an employee of either, or of a Separate Contractor employed by the Owner, or by changes ordered in the Work, or by labor disputes, fire, unusual delay in deliveries, unavoidably casualties or other causes beyond the Contractor's control, or by delay authorized by the Owner pending litigation, or by other causes which the Designer determines may justify delay, then the Contract Time shall be extended by Change Order for such reasonable time as the Designer may determine.
- 8.3.2 Claims relating to time shall be made in accordance with applicable provisions of Paragraph 4.2.8.
- 8.3.3 Should the Work be interrupted or hindered by the Owner or Designer, the Contractor shall be entitled to an extension of time pursuant to Section 4.2 in an amount equal to such interruption or hindrance, but the Contractor hereby waives any claim for damages resulting from such interruption or hindrance.
- 8.3.4 Should the Work be delayed in whole by any act or acts of the Contractor, the Contractor shall not be entitled to an extension of time pursuant to Section 4.2, nor shall such delay constitute a claim either for damages or for loss of anticipated profits by the Contractor. Should the Work be delayed in part by any act or acts of the Contractor and in part by any act or acts of the Owner or Designer, the Contractor shall be entitled to an extension of time pursuant to Section 4.2 in an amount equal to that portion of the delay for which the Contractor is not responsible, but such delay shall not constitute a claim either for damages or for loss of anticipated profits by the Contractor.
- 8.3.5 Should the Work be delayed, interrupted or hindered, in whole or in part, by any act or acts of any separate prime contractors, the Contractor shall be entitled to an extension of time pursuant to Paragraph 4.2.8 in an amount equal to such delay, interruption or hindrance but such delay, interruption or hindrance shall not constitute a claim for damages nor for loss of anticipated profits by the Contractor.

9 ARTICLE 9 PAYMENTS AND COMPLETION

- 9.1 **CONTRACT SUM:** The Contract Sum is stated in the Agreement and, including authorized adjustments, is the total amount payable by the Owner to the Contractor for performance of

the Work under the Contract Documents.

- 9.2 SCHEDULE OF VALUES:** Before the first Application for Payment, the Contractor shall submit to the Designer a Schedule of Values allocated to various portions of the Work, prepared in such form and supported by such data to substantiate its accuracy as the Designer may require. This Schedule of Values, unless objected to by the Designer, shall be used as a basis for reviewing the Contractor's Applications for Payment.

9.3 APPLICATIONS FOR PAYMENT

- 9.3.1 At least twenty (20) days before the date established for each progress payment, the Contractor shall submit to the Designer an itemized Application for Payment for operations completed in accordance with the Schedule of Values. Such application shall be notarized, supported by such data substantiating the Contractor's right to payment as the Owner or Designer may require, such as copies of requisitions from Subcontractors and material suppliers and reflecting retainage if provided for elsewhere in the Contract Documents.
- 9.3.2 Such applications may include requests for payment on account of changes in the Work which have been properly authorized by Construction Change Directives but not yet included in Change Orders.
- 9.3.3 Such applications may not include requests for payment of amounts the Contractor does not intend to pay to a Subcontractor or material supplier because of a dispute or other reason.
- 9.3.4 Unless otherwise provided in the Contract Documents, payments shall be made on account of materials and equipment delivered and suitably stored at the site for subsequent incorporation in the Work. If approved in advance by the Owner, payment may similarly be made for materials and equipment suitably stored off the site at a location agreed upon in writing. Payment for materials and equipment stored on or off the site shall be conditioned upon compliance by the Contractor with procedures satisfactory to the Owner to establish the Owner's title to such materials and equipment or otherwise protect the Owner's interest, and shall include applicable insurance, storage and transportation to the site for such materials and equipment stored off the site.
- 9.3.5 The Contractor warrants that title to all Work covered by an Application for Payment will pass to the Owner no later than the time of payment. The Contractor further warrants that upon submittal of an Application for Payment all Work for which Certificates for Payment have been previously issued and payments received from the Owner shall, to the best of the Contractor's knowledge, information and belief, be free and clear of liens, claims, security interests, or encumbrances in favor of the Contractor, Subcontractors, material suppliers, or other persons or entities making a claim by reason of having provided labor, materials, and equipment relating to the Work.
- 9.3.6 Provided an Application for Payment is received by the Designer not later than the tenth (10th) day of a month, the Owner shall make payment to the Contractor pursuant to a Certificate of Payment within thirty (30) days.

9.4 RETAINAGE

To ensure proper performance of this Contract, Owner shall retain five percent (5%) of the amount of each approved Application for Payment until the project Work is 50% complete provided that the Contractor continues to perform satisfactorily and any non-conforming Work identified in writing prior to submission of the application has been corrected by the

Contractor and accepted by the Owner. The project shall be deemed fifty percent (50%) complete when the Contractor's gross project invoices, excluding the value of materials stored off-site, equal or exceed fifty percent (50%) of the value of the contract, except the value of materials stored on-site shall not exceed twenty percent (20%) of the Contractor's gross project invoices for the purpose of determining whether the project is fifty percent (50%) complete.

After the Work is 50% complete, if the Owner determines the Contractor's performance is unsatisfactory and/or it has failed to correct non-conforming Work, the Owner may reinstate the retainage amount of 5% for each subsequent periodic Application for Payment until the Contractor's performance becomes satisfactory.

Notwithstanding the above, after the Work is 50% complete, the Owner may also withhold additional retainage from any subsequent periodic payment, not to exceed 5%, in order to allow the Owner to retain 2.5% total retainage through the completion of the Project.

Within sixty (60) days after the submission of a final pay application, the Owner with written consent of the Surety shall release to the Contractor all retainage on payments held by the Owner if (1) the Owner receives a certificate of Substantial Completion from the Designer or the Contractor, or (2) the Owner receives beneficial occupancy or use of the Project. However, the Owner may retain sufficient funds to secure completion of the Project or corrections to any Work. If the Owner retains funds, the amount retained shall not exceed two and one half times the estimated cost of the Work to be completed or corrected. Any reduction in the amount of retainage on payments shall be with the consent of the Contractor's Surety. Retainer provisions contained in Contractor's subcontracts may not exceed the terms and conditions for retainage provided herein. Contractor is further required to satisfy the retainage provisions of N.C.Gen. Stat. §143-134.1(b2) with regard to subcontracts for early finishing trades (structural steel, piling, caisson, and demolition) and to coordinate the release of retainage for such trades from the retainage held by Owner from the Contractor pursuant to statute.

Nothing herein shall prevent the Owner from withholding payment to the Contractor in addition to the amounts identified herein for unsatisfactory job progress, defective construction not remedied, non-conforming Work, disputed Work, and/or third party claims filed against the Owner or reasonable evidence that a third party claim will be filed.

9.5 CERTIFICATES FOR PAYMENT

9.5.1 The Designer will, within seven (7) days after receipt of the Contractor's Application for Payment, either issue to the Owner a Certificate for Payment, with a copy to the Contractor, for such amount as the Designer determines is properly due, or notify the Contractor and Owner in writing of the Designer's reasons for withholding certification in whole or in part as provided in Paragraph 9.6.1.

9.5.2 The Designer's certification for payment shall constitute a representation to the Owner, based on the Designer's inspections at the site and on the data comprising the Contractor's Application for Payment, that the Work has progressed to the point indicated and that the inspections of the construction, repairs, or installations have been conducted with the degree of care and professional skill and judgment ordinarily exercised by a member of his profession; and that to the best of his knowledge and in the professional opinion of the Designer, the Contractor has fulfilled the obligations of such plans, specifications, and contract. The Designer's certification for payment shall be signed and sealed by the Designer and presented to the Owner. The foregoing representations are subject to an evaluation of the Work for

conformance with the Contract Documents upon Substantial Completion, to results of subsequent tests and inspections, to minor deviations from the Contract Documents correctable prior to completion, and to specific qualifications expressed by the Designer. The issuance of a Certificate for Payment shall further constitute a representation by the Designer, that the Contractor is entitled to payment in the amount certified.

9.6 DECISIONS TO WITHHOLD CERTIFICATION

9.6.1 The Designer may decide not to certify payment and may withhold a Certificate for Payment in whole or in part, to the extent reasonably necessary to protect the Owner, if in the Designer's opinion, the representations to the Owner required by Paragraph 9.5.2 cannot be made. If the Designer is unable to certify payment in the amount of the Application, the Designer will notify the Contractor and Owner as provided in Paragraph 9.5.1. If the Contractor and Designer cannot agree on a revised amount, the Designer will promptly issue a Certificate for Payment for the amount for which the Designer is able to make such representations to the Owner. The Designer may also decide not to certify payment or, because of subsequently discovered evidence or subsequent observations, may nullify the whole or a part of a Certificate for Payment previously issued, to such extent as may be necessary in the Designer's opinion to protect the Owner from loss due to:

- 1 defective Work not remedied;
- 2 third party claims filed or reasonable evidence indicating probable filing of such claims;
- 3 failure of the Contractor to make payments properly to Subcontractors or for labor, materials or equipment;
- 4 reasonable evidence that the Work cannot be completed for the unpaid balance of the Contract Sum;
- 5 damage to the Owner or another contractor;
- 6 reasonable evidence that the Work will not be completed within the Contract Time, and that the unpaid balance would not be adequate to cover actual or liquidated damages for the anticipated delay; or
- 7 persistent failure to carry out the Work in accordance with the Contract Documents.

9.6.2 When the above reasons for withholding certification are removed, certification will be made for amounts previously withheld.

9.7 PROGRESS PAYMENTS

9.7.1 After the Designer has issued a Certificate for Payment, the Owner shall make payment in the manner and within the time provided in the Contract Documents, and shall so notify the Designer.

9.7.2 The Contractor shall promptly pay each Subcontractor, upon receipt of payment from the Owner, out of the amount paid to the Contractor on account of such Subcontractor's portion of the Work, the amount to which said Subcontractor is entitled, reflecting percentages actually retained from payments to the Contractor on account of such Subcontractor's portion of the Work. The Contractor shall, by appropriate agreement with each Subcontractor, require each Subcontractor to make payments to Sub-subcontractors in similar manner.

9.7.3 The Designer will furnish to a Subcontractor, upon request and if practicable, information

regarding percentages of completion or amounts applied for by the Contractor and action taken thereon by the Designer and Owner on account of portions of the Work done by such Subcontractor.

9.7.4 Neither the Owner nor Designer shall have an obligation to pay or to see to the payment of money to a Subcontractor except as may otherwise be required by law.

9.7.5 Payment to material suppliers shall be treated in a manner similar to that provided in Paragraphs 9.7.2, 9.7.3, and 9.7.4.

9.7.6 A Certificate for Payment, a progress payment, or partial or entire use or occupancy of the Project by the Owner shall not constitute acceptance of Work not in accordance with the Contract Documents.

9.8 FAILURE OF PAYMENT: The Contractor shall not stop the Work for the failure of the Designer to issue a Certificate of Payment, or the Owner to make timely payment.

9.9 SUBSTANTIAL COMPLETION

9.9.1 Substantial Completion is the stage in the progress of the Project when the Work or designated portion thereof is sufficiently complete in accordance with the Contract Documents, so the Owner can occupy or utilize the Work for its intended use.

9.9.2 When the Contractor considers that the Work, or a portion thereof which the Owner agrees to accept separately, is substantially complete, the Contractor shall prepare and submit to the Designer a comprehensive list of items to be completed or corrected. The Contractor shall proceed promptly to complete and correct items on the list. Failure to include an item on such list does not alter the responsibility for the Contractor to complete all Work in accordance with the Contract Documents. Upon receipt of the Contractor's list, the Designer will make an inspection to determine whether the Work or designated portion thereof is substantially complete. If the Designer's inspection discloses any item, whether or not included on the Contractor's list, which is not in accordance with the requirements of the Contract Documents, the Contractor shall, before issuance of the Certificate of Substantial Completion, complete or correct such item upon notification by the Designer. The Contractor shall then submit a request for another inspection by the Designer to determine Substantial Completion.

9.9.3 When the Work or designated portion thereof is substantially complete, the Designer will prepare a Certificate of Substantial Completion which shall establish the date of Substantial Completion, shall establish responsibilities of the Owner and Contractor for security, maintenance, heat, utilities, damage to the Work and insurance, and shall fix the time within which the Contractor shall finish all items on the list accompanying the Certificate. Warranties required by the Contract Documents shall commence on the date of Substantial Completion of the Work or designated portion thereof unless otherwise provided in the Certificate of Substantial Completion. The Certificate of Substantial Completion shall be submitted to the Owner and Contractor for their written acceptance of responsibilities assigned to them in such Certificate.

9.9.4 Upon Substantial Completion of the Work or designated portion thereof and upon application by the Contractor and certification by the Designer, the Owner shall make payment, reflecting adjustment in retainage, if any, for such Work or portion thereof as provided in the Contract Documents.

9.10 PARTIAL OCCUPANCY OR USE

- 9.10.1 The Owner may occupy or use any completed or partially completed portion of the Work at any stage when such portion is designated by separate agreement with the Contractor, provided such occupancy or use is authorized by public authorities having jurisdiction over the Work. Such partial occupancy or use may commence whether or not the portion is substantially complete, provided the Owner and Contractor have accepted in writing the responsibilities assigned to each of them for payments, retainage if any, security, maintenance, heat, utilities, damage to the Work and insurance, and have agreed in writing concerning the period for correction of the Work and commencement of warranties required by the Contract Documents. When the Contractor considers a portion substantially complete, the Contractor shall prepare and submit a list to the Designer as provided under Paragraph 9.9.2. Consent of the Contractor to partial occupancy or use shall not be unreasonably withheld. The stage of the progress of the Work shall be determined by written agreement between the Owner and Contractor or, if no agreement is reached, by decision of the Designer.
- 9.10.2 Immediately prior to such partial occupancy or use, the Owner, Contractor, and Designer shall jointly inspect the area to be occupied or portion of the Work to be used in order to determine and record the condition of the Work.
- 9.10.3 Unless otherwise agreed upon, partial occupancy or use of a portion or portions of the Work shall not constitute acceptance of Work not complying with the requirements of the Contract Documents.

9.11 FINAL COMPLETION AND FINAL PAYMENT

- 9.11.1 Upon receipt of written notice that the Work is ready for final inspection and acceptance and upon receipt of a final Application for Payment, the Designer will promptly make such inspections and, when the Designer finds the Work acceptable under the Contract Documents and the Contract fully performed, the Designer will promptly issue a Final Certificate for Payment stating that to the best of the Designer's knowledge, information and belief, and on the basis of the Designer's observations and inspections, the Work has been completed in accordance with terms and conditions of the Contract Documents and that the entire balance found to be due the Contractor and noted in said Final Certificate is due and payable. The Designer's Final Certificate for Payment will constitute a further representation that the conditions listed in Paragraph 9.11.2 as precedent to the Contractor's being entitled to final payment have been fulfilled.
- 9.11.2 Neither final payment nor any remaining retained percentage shall become due until the Contractor submits to the Designer (1) an affidavit that payrolls, bills for materials and equipment, and other indebtedness connected with the Work for which the Owner or the Owner's property might be responsible or encumbered (less amounts withheld by Owner) have been paid or otherwise satisfied, (2) a certificate evidencing that insurance required by the Contract for Construction to remain in force after final payment is currently in effect and will not be canceled or allowed to expire until at least 30 days prior written notice has been given to the Owner, (3) a written statement that the Contractor knows of no substantial reason that the insurance will not be renewable to cover the period required by the Contract Documents, (4) consent of surety, if any, to final payment and (5) if required by the Owner, other or additional data establishing payment or satisfaction of obligations, such as receipts, releases and waivers of liens, claims, security interests, or encumbrances rising out of the Contract, to the extent and in such form as may be designated by the Owner. If a Subcontractor refuses to furnish a release or waiver required by the Owner, the Contractor may furnish a bond satisfactory to the Owner to indemnify the Owner against such lien. If such lien remains

unsatisfied after payments are made, the Contractor shall refund to the Owner all money that the Owner may be compelled to pay in discharging such lien, including all costs and reasonable attorneys' fees.

- 9.11.3 If, after Substantial Completion of the Work, final completion thereof is materially delayed through no fault of the Contractor or by issuance of Change Orders affecting final completion, and the Designer so confirms, the Owner shall, upon application by the Contractor and certification by the Designer, and without terminating the Contract, make payment of the balance due for that portion of the Work fully completed and accepted. If the remaining balance for Work not fully completed and accepted is less than retainage stipulated in the Contract Documents, and if bonds have been furnished, the written consent of surety to payment of the balance due for that portion of the Work fully completed and accepted shall be submitted by the Contractor to the Designer prior to certification of such payment. Such payment shall be made under terms and conditions governing final payment, except that it shall not constitute a waiver of claims.
- 9.11.4 Acceptance of final payment by the Contractor, Subcontractor, or material supplier shall constitute a waiver of claims by that payee except those previously made in writing and identified by that payee as unsettled at the time of final Application for Payment.

10 ARTICLE 10 PROTECTION OF PERSONS AND PROPERTY

10.1 SAFETY PRECAUTIONS AND PROGRAMS

- 10.1.1 The Contractor shall be responsible for initiating, maintaining, and supervising all safety precautions and programs in connection with the performance of the Contract and construction of the Project.
- 10.1.2 In the event the Contractor encounters on the site material reasonably believed to be asbestos or polychlorinated biphenyl (hereinafter "APCB") which has not been rendered harmless, the Contractor shall immediately stop Work in the area affected and report the condition to the Owner and Designer by phone and in writing. The Work in the affected area shall not thereafter be resumed except by written agreement of the Owner and Contractor if in fact the material is asbestos or PCB and has not been rendered harmless. The Work in the affected area shall be resumed in the absence of asbestos or PCB, or when it has been rendered harmless, by written agreement of the Owner and Contractor, or in accordance with final determination by the Designer.
- 10.1.3 The Contractor shall not be required to perform without consent of Owner and Designer any Work relating to asbestos or PCB.

10.2 SAFETY OF PERSONS AND PROPERTY

- 10.2.1 The Contractor shall take reasonable precautions for safety of, and shall provide reasonable protection to prevent damage, injury, or loss to:
- 1 employees working on the Project and other persons who may be affected thereby;
 - 2 the Work and materials and equipment to be incorporated therein, whether in storage on or off the site, under care, custody or control of the Contractor or the Contractor's Subcontractors or Sub-subcontractors; and
 - 3 other property at the site or adjacent thereto, such as trees, shrubs, lawns, walks, pavements, roadways, structures, and utilities not designated for removal, relocation,

or replacement in the course of construction.

- 10.2.2 The Contractor shall comply with and give notices required by applicable laws, ordinances, rules, regulations, and lawful orders of public authorities bearing on safety of persons or property or their protection from damage, injury, or loss.
- 10.2.3 The Contractor shall erect and maintain, as required by existing conditions and performance of the Contract, reasonable safeguards for safety and protection, including erecting necessary barricades or other temporary walls and structures as required during the period of construction, posting danger signs and other warnings against hazards, promulgating safety regulations, and notifying owners and users of adjacent sites and utilities.
- 10.2.4 When use or storage of explosives or other hazardous materials or equipment or unusual methods are necessary for execution of Work, the Contractor shall exercise utmost care and carry on such activities under supervision of properly qualified personnel.
- 10.2.5 The Contractor shall promptly remedy damage and loss to property referred to in Clauses 10.2.1(2) and (3), caused in whole or in part by the Contractor, Subcontractor, a Sub-subcontractor, or anyone directly or indirectly employed by any of them, or by anyone for whose acts they may be liable and for which the Contractor is responsible under Clauses 10.2.1(2) and (3), except damage or loss attributable to acts or omissions of the Owner or Designer and not attributable to the fault or negligence of the Contractor. The foregoing obligations of the Contractor are in addition to the Contractor's obligations under Article 3. All costs to repair any damage and loss to property referred to in Clauses 10.2.1(2) and (3), shall be the sole responsibility of the Contractor and such repair or replacement shall be performed expeditiously without cost to the Owner.
- 10.2.6 The Contractor shall designate a responsible member of the Contractor's organization at the site whose duty shall be the prevention of accidents. This person shall be the Contractor's Superintendent, required under Section 3.8, unless otherwise designated by the Contractor in writing to the Owner and Designer.
- 10.2.7 The Contractor shall not load or permit any part of the construction or site to be loaded so as to endanger its safety.
- 10.2.8 Existing utilities have been identified and described in the Contract Documents insofar as information is reasonably available, however, it is the Contractor's responsibility to verify such information and to preserve all existing utilities whether shown in the Contract Documents or not. If utility conflicts are encountered by the Contractor during construction, Contractor shall file sufficient notice to the owners of the utilities so that they may make the necessary adjustments, as well as the Designer.

10.3 EMERGENCIES

In an emergency affecting the safety of persons or property, the Contractor shall act, at the Contractor's discretion, to prevent threatened damage, injury, or loss. Additional compensation or extension of time claimed by the Contractor on account of an emergency shall be determined as provided in Paragraphs 4.2.7, 4.2.8 and Article 7.

11 ARTICLE 11 UNCOVERING AND CORRECTION OF WORK

11.1 UNCOVERING OF WORK

- 11.1.1 If a portion of the Work is covered contrary to the Designer's request or to requirements

specifically expressed in the Contract Documents, it must, if required in writing by the Designer, be uncovered for the Designer's observation and be replaced at the Contractor's sole expense without change in the Contract Time.

- 11.1.2 If a portion of the Work has been covered which the Designer has not specifically requested to observe prior to its being covered, the Designer may request to see such Work and it shall be uncovered by the Contractor. If such Work is not in accordance with the Contract Documents, the Contractor shall pay such costs unless the condition was caused by the Owner or a separate contractor in which event the Owner or separate contractor shall be responsible for payment of such costs. If such Work is in accordance with the Contract Documents, the Owner, by appropriate Change Order, shall be charged with the cost of uncovering and replacement.

11.2 CORRECTION OF WORK

- 11.2.1 The Contractor shall promptly correct Work rejected by the Designer or failing to conform to the requirements of the Contract Documents, whether observed before or after Substantial Completion and whether or not fabricated, installed, or completed. The Contractor shall bear any and all costs of correcting such rejected Work, including additional testing and inspections and compensation for the Designer's services and expenses made necessary thereby.
- 11.2.2 If, within one year after the date of Substantial Completion of the Work or designated portion thereof, or after the date for commencement of warranties established under Paragraph 9.10.1 or by terms of an applicable special warranty required by the Contract Documents, any of the Work is found not to be in accordance with the requirements of the Contract Documents, the Contractor shall correct it promptly after receipt of written notice from the Owner to do so unless the Owner has previously given the Contractor a written acceptance of such condition. This period of one year shall be extended with respect to portions of Work first performed after Substantial Completion by the period of time between Substantial Completion and the actual performance of the Work. This obligation under this Paragraph 11.2.2 shall survive acceptance of the Work under the Contract and termination of the Contract. The Owner shall give such notice promptly after discovery of the condition.
- 11.2.3 The Contractor shall remove from the site portions of the Work which are not in accordance with the requirements of the Contract Documents and are neither corrected by the Contractor nor accepted by the Owner.
- 11.2.4 If the Contractor fails to correct non-conforming Work within a reasonable time, the Owner may correct it in accordance with Section 2.2. If the Contractor does not proceed with correction of such nonconforming Work within a reasonable time fixed by written notice from the Designer, the Owner may remove it and store the salvageable materials or equipment at the Contractor's expense. If the Contractor does not pay costs of such removal and storage within ten days after written notice, the Owner may upon ten additional days written notice sell such materials and equipment at auction or at private sale and shall account for the proceeds thereof, after deducting costs and damages that should have been borne by the Contractor, including compensation for the Designer's services and expenses made necessary thereby. If such proceeds of sale do not cover costs which the Contractor should have borne, the Contract Sum shall be reduced by the deficiency. If payments then or thereafter due the Contractor are not sufficient to cover such amount, the Contractor shall pay the difference to the Owner.
- 11.2.5 The Contractor shall bear the cost of correcting destroyed or damaged construction, whether completed or partially completed, of the Owner or separate contractors caused by the

Contractor's correction or removal of Work which is not in accordance with the requirements of the Contract Documents.

- 11.2.6 Nothing contained in this Section 11.2 shall be construed to establish a period of limitation with respect to other obligations which the Contractor might have under the Contract Documents. Establishment of the time period of one year as described in Paragraph 11.2.2, relates only to the specific obligation of the Contractor to correct the Work, and has no relationship to the time within which the obligation to comply with the Contract Documents may be sought to be enforced nor to the time within which proceedings may be commenced to establish the Contractor's liability with respect to the Contractor's obligations other than specifically to correct the Work.

11.3 ACCEPTANCE OF NON-CONFORMING WORK

If the Owner prefers to accept Work which is not in accordance with the requirements of the Contract Documents, the Owner may do so instead of requiring its removal and correction, in which case the Contract Sum will be reduced as appropriate and equitable. Such adjustment shall be effected whether or not final payment has been made.

12 ARTICLE 12 MISCELLANEOUS PROVISIONS

- 12.1 **GOVERNING LAW:** This Contract for Construction shall be governed by and in accordance with the laws of the State of North Carolina. All actions relating in any way to this Contract, shall be brought in the General Court of Justice in the County of Wake and the State of North Carolina, after exhausting the dispute resolution procedure set forth in Section 4.4, herein.
- 12.2 **SUCCESSORS AND ASSIGNS:** The Owner and Contractor respectively bind themselves, their partners, successors, assigns, and legal representatives if any to the other party hereto and to partners, successors, assigns, and legal representatives of such other party in respect to covenants, agreements, and obligations contained in the Contract Documents. Neither Party to the Contract shall assign the Contract as a whole without written consent of the other. If either Party attempts to make such an assignment without such consent, that party shall nevertheless remain legally responsible for all obligations under the Contract.
- 12.3 **WRITTEN NOTICE:** Where Contract Documents require one Party to notify or give notice to the other Party, such notice shall be provided in writing to the representative of the other Party designated in Paragraph 9 of the Agreement in the manners designated in the agreement.
- 12.4 **RIGHTS AND REMEDIES:** Duties and obligations imposed by the Contract Documents and rights and remedies available thereunder shall be in addition to and not a limitation of duties, obligations, rights, and remedies otherwise imposed or available by law.
- 12.5 **WAIVER OF A RIGHTS:** No action or failure to act by the Owner or Designer shall constitute an obligation or duty afforded them under the Contract, nor shall such action or failure to act constitute approval of or acquiescence in a breach thereunder, except as may be specifically agreed in writing.
- 12.6 **COMPLIANCE WITH LAWS:** Contractor represents that it is in compliance with all Federal, State, and local laws, regulations or orders, as amended or supplemented. The implementation of this contract will be carried out in strict compliance with all Federal, State, or local laws regarding discrimination in employment.
- 12.7 **TESTS AND INSPECTIONS**

- 12.7.1 Tests, inspections, and approvals of portions of the Work required by the Contract Documents or by laws, ordinances, rules, regulations, or orders of public authorities having jurisdiction shall be made at an appropriate time. Unless otherwise provided, the Contractor shall make arrangements for such tests, inspections, and approvals with an independent testing laboratory or entity acceptable to the Owner, or with the appropriate public authority, and the Owner shall bear the costs of tests, inspections, and approvals. Should any retest be necessary due to the failure of the Work to pass the first test or for any other reason whatsoever, the Contractor shall bear all related costs of retests, inspections or re- inspections, and approvals. The Contractor shall give the Designer timely notice of when and where tests and inspections are to be made so the Designer may observe such procedures.
- 12.7.2 If the Designer, Owner, or public authorities having jurisdiction determine that portions of the Work require additional testing, inspection, or approval not included under Paragraph 12.7.1, the Designer will, upon written authorization from the Owner, instruct the Contractor to make arrangements for such additional testing, inspection, or approval by an entity acceptable to the Owner, and the Contractor shall give timely notice to the Designer of when and where tests and inspections are to be made so the Designer may observe such procedures.
- 12.7.3 If such procedures for testing, inspection, or approval under Paragraphs 12.7.1 and 12.7.2 reveal failure of the portions of the Work to comply with requirements established by the Contract Documents, the Contractor shall bear all costs made necessary by such failure including those of repeated procedures and compensation for the Designer's services and expenses.
- 12.7.4 Required certificates of testing, inspection, or approval shall, unless otherwise required by the Contract Documents, be secured by the Contractor and promptly delivered to the Designer.
- 12.7.5 If the Designer is required by the Contract Documents to observe tests, inspections, or approvals, the Designer will do so promptly and, where practicable, at the normal place of testing.
- 12.7.6 Tests or inspections conducted pursuant to the Contract Documents shall be made promptly to avoid unreasonable delay in the Work.

13 ARTICLE 13 TERMINATION OR SUSPENSION OF THE CONTRACT

13.1 TERMINATION BY THE CONTRACTOR

- 13.1.1 The Contractor may terminate the Contract if the Work is stopped for a period of 180 consecutive days through no act or fault of the Contractor or a Subcontractor, Sub-subcontractor, or their agents or employees, or any other persons performing portions of the Work under contract with the Contractor, for any of the following reasons:
- 1 issuance of an order of a court or other public authority having jurisdiction;
 - 2 an act of government, such as a declaration of national emergency, making material unavailable;
 - 3 because the Designer has not issued a Certificate for Payment and has not notified the Contractor of the reason for withholding certification as provided in Section 9.6.
- 13.1.2 If one of the above reasons exists, the Contractor may, upon seven (7) additional days' written notice to the Owner and Designer, terminate the Contract and recover from the Owner payment for Work executed and for proven loss with respect to materials, equipment, tools,

and construction equipment and machinery, not including overhead, profit, or damages.

13.2 TERMINATION BY THE OWNER FOR CAUSE

13.2.1 The Owner may terminate the Contract if the Contractor:

- 1 persistently or repeatedly refuses or fails to supply enough properly skilled workers or proper materials;
- 2 fails to make payment to Subcontractors for materials or labor in accordance with the respective agreements between the Contractor and the Subcontractors;
- 3 persistently disregards laws, ordinances, or rules or regulations or orders of a public authority having jurisdiction;
- 4 fails to abide by the Non-Discrimination requirements of Paragraph 10 of the Agreement; or,
- 5 is otherwise in substantial breach of a provision of the Contract Documents.

13.2.2 When any of the above reasons exist, the Owner may, without prejudice to any other rights or remedies of the Owner and after giving the Contractor and the Contractor's surety, if any, seven (7) days' written notice, terminate employment of the Contractor and may, subject to any prior rights of surety:

- 1 take possession of the site and of all materials, equipment, tools, and construction equipment and machinery thereon owned by the Contractor; and
- 2 finish the Work by whatever reasonable method the Owner may deem expedient.

13.2.3 When the Owner terminates the Contract for one of the reasons stated in Paragraph 13.2.1, the Contractor shall not be entitled to receive further payment.

13.2.4 If the unpaid balance of the Contract Sum does not cover the cost of finishing the Work, the Contractor shall pay the difference to the Owner. The amount to be paid to the Owner shall be certified by the Designer, upon application, and this obligation for payment shall survive termination of the Contract.

13.3 TERMINATION BY THE OWNER FOR CONVENIENCE

13.3.1 The Owner may, at any time, terminate the Contract for the Owner's convenience and without cause.

13.3.2 Upon receipt of notice from the Owner of such termination for the Owner's convenience, the Contractor shall: (1) cease operations as directed by the Owner in the notice; (2) take actions necessary, or that the Owner may direct, for the protection and preservation of the Work; and (3) except for Work directed to be performed prior to the effective date of termination stated in the notice, terminate all existing subcontracts and purchase orders and enter into no further subcontracts and purchase orders.

13.3.3 In case of such termination for the Owner's convenience, the Owner shall pay the Contractor for Work properly executed; costs incurred by reason of the termination, including costs attributable to termination of Subcontracts, but not for overhead or profit on the Work not executed.

13.4 SUSPENSION BY THE OWNER FOR CONVENIENCE

The Owner may, without cause, order the Contractor in writing to suspend, delay, or interrupt

the Work in whole or in part for such period of time as the Owner may determine.

13.5 BANKRUPTCY

- 13.5.1 The bankruptcy of the Contractor shall not terminate this Contract until such time that it is specifically rejected by the Trustee or Contractor in bankruptcy. During the election period the Contractor has to assume or reject this Contract, the Contractor shall continue to perform its Work under the Contract.
- 13.5.2 In the event the Contractor in Bankruptcy assumes the Contract, the Contractor shall apply progress payments to all of its unpaid obligations on this project before using any of these monies for either administrative expenses of the bankruptcy or as general assets of the estate.

14 ARTICLE 14 SECURITY OF NON-PUBLIC RECORDS

- 14.1 SECURITY OF NON-PUBLIC RECORDS:** Pursuant to N.C. Gen. Stat. § 132-1.7 entitled, "Sensitive Public Security Information", public records, as defined in N.C. Gen. Stat. § 132-1, shall not include information containing specific details of public security plans and arrangements or the detailed plans and drawings of public buildings and infrastructure facilities. Therefore, all information provided, received, gathered, or obtained by Contractor containing specific details of public security plans and arrangements or the detailed plans and drawings of public buildings and infrastructure facilities shall be held confidential and shall be used by the Contractor only for the purpose of fulfilling the terms of this Contract. All plans and drawings shall be returned to the Owner, or otherwise destroyed at the direction of the Owner, upon termination or expiration of this Contract. Any breach of this Paragraph 14.1 by Contractor shall result in the immediate termination of this Contract.

SECTION 01 22 00 - UNIT PRICES

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes administrative and procedural requirements for unit prices.

1.3 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.

1.4 PROCEDURES

- A. Unit prices include all necessary material, plus cost for delivery, installation, insurance, taxes, overhead, and profit.
- B. Measurement and Payment: Refer to individual Technical Specifications Sections for the descriptions and methods of measurement for each unit price. Quantities and payment for unit prices are listed in the Bid Form.
- C. 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 agent.
- D. The quantities in the bid form are based on estimated quantities and are not guaranteed. Determination of actual quantities are to be made by a representative of the Owner in consultation with the contractor.

PART 2 - PRODUCTS (Not Used)

PART 3 - EXECUTION

3.1 LIST OF UNIT PRICES

- A. Bidders shall submit a bid in a unit price basis for each item of Work listed in the Bid Form.

END OF SECTION 01 22 00

SECTION 01 31 00 - PROJECT MANAGEMENT AND COORDINATION

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. To enable orderly review during progress of the Work, and to provide for systematic discussion of problems, the Contractor will conduct project meetings and compile an agenda for each meeting throughout the construction period.
- B. This Section includes administrative provisions for coordinating construction operations on the Project including, but not limited to, the following:
 - 1. General project coordination procedures.
 - 2. Conservation.
 - 3. Coordination Drawings.
 - 4. Administrative and supervisory personnel.
 - 5. Project meetings.

1.3 COORDINATION

- A. Coordination: Coordinate construction operations included in the Technical Specifications and Special Provisions to ensure efficient and orderly installation of each part of the Work. Coordinate construction operations that depend on each other for proper installation, connection, and operation.
 - 1. Schedule construction operations in sequence required to obtain the best results where installation of one part of the Work depends on installation of other components.
 - 2. Coordinate installation of different components with other contractors to ensure maximum accessibility for required maintenance, service, and repair.
 - 3. Make adequate provisions to accommodate items scheduled for later installation.
- B. If necessary, the Contractor shall prepare memoranda for distribution to each party involved, outlining special procedures required for coordination. Include such items as required notices, reports, and list of attendees at meetings.
 - 1. Prepare similar memoranda for Owner and separate contractors if coordination of their Work is required.
- C. 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.

- D. 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.

1.4 SUBMITTALS

- E. Coordination Drawings: Prepare Coordination Drawings if limited space availability necessitates maximum utilization of space for efficient installation of different components or if coordination is required for installation of products and materials fabricated by separate entities.
 - 1. Indicate relationship of components shown on separate Shop Drawings.
 - 2. Indicate required installation sequences.
 - 3. .
- F. Staff Names: Fourteen days prior to the Pre-Construction conference, 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.

1.5 ADMINISTRATIVE AND SUPERVISORY PERSONNEL

- G. General: In addition to Project superintendent, provide other administrative and supervisory personnel as required for proper performance of the Work.

1.6 PROJECT MEETINGS

- H. 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.
 - 2. Agenda: The Contractor shall prepare the meeting agenda. Distribute the agenda to all invited attendees.
 - 3. Minutes:
 - a. The Contractor will compile minutes of each project meeting, and will distribute copies to the Designer and required copies to the Owner.
 - b. Recipients of copies may make and distribute such other copies as they wish.
 - 4. Attendance:
 - a. To the maximum extent practical, assign the same person or persons to represent the Contractor at the project meetings throughout progress of the Work.
 - b. Subcontractors, materials suppliers, and others may be invited to attend those project meetings in which their aspect of the Work is involved.
 - 5. Minimum agenda:
 - a. Review, revise as necessary, and approve minutes of previous meetings.
 - b. Review progress of the Work since last meeting, including status of submittals for approval.
 - c. Identify problems which impede planned progress.
 - d. Develop corrective measures and procedures to regain planned schedule.

- e. Complete other current business.
- I. Pre-construction Conference: Schedule a pre-construction conference before starting construction, at a time convenient to Owner and Designer, but no later than 14 days after execution of the Construction Contract. Hold the conference at Project site or another convenient location. Conduct the meeting to review responsibilities and personnel assignments.
 - 1. Attendees: Authorized representatives of Owner, Designer, and their consultants; Contractor and its superintendent; major subcontractors and other concerned parties shall attend 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. Security.
 - p. Working hours.
- J. 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 Designer of scheduled meeting dates.
 - 2. Agenda: Review progress of other construction activities and preparations for the particular activity under consideration, including requirements for the following:
 - a. Contract Documents.
 - b. Options.
 - c. Related Change Orders.
 - d. Purchases.
 - e. Deliveries.
 - f. Submittals.
 - g. Review of mockups.
 - h. Possible conflicts.
 - i. Time schedules.
 - j. Weather limitations.
 - k. Manufacturer's written recommendations.
 - l. Temporary facilities and controls.
 - m. Space and access limitations.
 - n. Regulations of authorities having jurisdiction.
 - o. Testing and inspecting requirements.
 - p. Required performance results.

- q. Protection of construction and personnel.

Record significant conference discussions, agreements, and disagreements.

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.

- L. Progress Meetings: Conduct progress meetings at a minimum of once every two weeks. Coordinate dates of meetings with preparation of payment requests.
 - 1. Attendees: Representatives at the meeting shall be the Owner, Designer, Subcontractors, 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 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) Sequence of operations.
 - 3) Status of submittals.
 - 4) Deliveries.
 - 5) Access.
 - 6) Work hours.
 - 7) Hazards and risks.
 - 8) Review of Record Drawings
 - 9) Review of construction defects that has been identified by the Designer
 - 3. Reporting: Distribute 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 revised schedule concurrently with the report of each meeting.

1.7 REQUESTS FOR INTERPRETATION (RFI's)

- M. Procedure: Immediately on discovery of the need for interpretation of the Contract Documents, and if not possible to request interpretation at Project meeting, prepare and submit an RFI in the form specified.
 - 1. RFI's shall originate with Contractor. RFIs submitted by entities other than Contractor will be returned with no response.
 - 2. Coordinate and submit RFIs in a prompt manner so as to avoid delays in Contractor's work or work of subcontractors.

- N. Content of the RFI: Include a detailed, legible description of item needing interpretation and the following:
1. Project Name
 2. Date
 3. Name of Contractor
 4. Name of Designer.
 5. RFI number, numbered sequentially.
 6. Specification Section number and title and related paragraphs, as appropriate.
 7. Drawing number and detail references, as appropriate.
 8. Field dimensions and conditions, as appropriate.
 9. Contractor's suggested solution(s). If Contractor's solution(s) impact the Contract Time or the Contract Sum, Contractor shall state impact in the RFI.
 10. Contractor's signature.
 11. Attachments: Include drawings, descriptions, measurements, photos, Product Data, Shop Drawings, and other information necessary to fully describe items needing interpretation.
- O. RFI Format: Contractor's standard form, submitted as hard-copy or PDF electronic submittal.
- P. Standard Form
1. Identify each page of attachments with the RFI number and sequential page number.
- Q. Designer's Action: Designer will review each RFI, determine action required, and return it. Allow seven (7) working days for Architect's response for each RFI. RFIs received after 1:00 p.m. will be considered as received the following working day.
1. The following RFIs will be returned without action:
 - a. Requests for approval of substitutions.
 - b. Requests for coordination information already indicated in the Contract Documents.
 - c. Requests for adjustments in the Contract Time or the Contract Sum.
 - d. Requests for interpretation of Designer's actions on submittals.
 - e. Incomplete RFIs or RFIs with numerous errors.
 2. Designer's action may include a request for additional information, in which case Architect's time for response will start again.
 3. Designer's action on RFI's that may result in a change to the Contract Time or the Contract Sum does not constitute an approval to proceed with the additional Work. Contractor must submit a Change Proposal and receive written approval to proceed.
 - a. If Contractor believes the RFI response warrants a change in the Contract Time or the Contract Sum, notify Designer in writing within five (5) days of receipt of the RFI response.
- R. On receipt of Designer's action, update the RFI log and immediately distribute the RFI response to affected parties. Review response and notify Architect within seven (7) days if Contractor disagrees with response.
- S. RFI Log: Prepare, maintain, and submit a tabular log of RFIs organized by the RFI number. Submit log biweekly. Include the following:
1. Project Name
 2. Name and address of Contractor.
 3. Name and address of Designer.
 4. RFI number including RFI's that were dropped and not submitted.
 5. RFI description
 6. Date the RFI was submitted.
 7. Date Designer's response was received.

8. Identification of the related Minor Change in the Work, Construction Change Directive and Proposal Request as appropriate.
9. Identification of related Field Order, Work Change Directive and Proposal Request as appropriate.

PART 2 - PRODUCTS (Not Used)

PART 3 - EXECUTION (Not Used)

END OF SECTION 01 31 00

SECTION 01 32 00 - CONSTRUCTION PROGRESS DOCUMENTATION

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes administrative and procedural requirements for documenting the progress of construction during performance of the Work, including the following:
 - 1. Preliminary Construction Schedule.
 - 2. Contractor's Construction Schedule.

1.3 SUBMITTALS

- A. Qualification Data: For firms and persons specified in "Quality Assurance" Article to demonstrate their capabilities and experience. Include lists of completed projects with project names and addresses, names and addresses of Designers and owners, and other information specified. The date shall be submitted for any change of construction personal.
- B. Preliminary Construction Schedule: Submit three printed copies; one a single sheet, of the Preliminary Construction Schedule.
- C. Contractor's Construction Schedule: Submit three printed copies of initial schedule, large enough to show entire schedule for entire construction period.

1.4 COORDINATION

- A. Coordinate preparation and processing of schedules with performance of construction activities and with scheduling and reporting of separate contractors.
- B. Coordinate Contractor's Construction Schedule with the Schedule of Values, list of subcontracts, payment requests, and other required schedules and reports.
 - 1. Secure time commitments for performing critical elements of the Work from parties involved.
 - 2. Coordinate each construction activity in the network with other activities and schedule them in proper sequence.

PART 2 - PRODUCTS

2.1 CONTRACTOR'S CONSTRUCTION SCHEDULE, GENERAL

- A. Time Frame: Extend schedule from date established for the Notice to Proceed, through the date of Substantial Completion and Final Completion.

1. Contract completion date shall not be changed, unless specifically authorized by Change Order.
- B. Activities: Treat each area as a separate numbered activity for each principal element of the Work. Comply with the following:
1. Activity Duration: Define activities so no activity is longer than 20 days, unless specifically allowed by Designer.
 2. Procurement Activities: Include procurement process activities for long lead items and major items, requiring a cycle of more than 30 days, as separate activities in schedule. Procurement cycle activities include, but are not limited to, submittals, approvals, purchasing, fabrication, and delivery.
 3. Substantial Completion: Indicate completion in advance of date established for Substantial Completion, and allow time for Designer's administrative procedures necessary for certification of Substantial Completion.
- C. Constraints: Include constraints and work restrictions indicated in the Contract Documents and as follows in the schedule, and show how the sequence of the Work is affected.
1. Phasing: Arrange list of activities on schedule by phase.
 2. Work Restrictions: Show the effect of the following items on the schedule:
 - a) Coordination with existing construction.
 - b) Limitations of continued occupancies.
 - c) Uninterruptible services.
 - d) Partial occupancy before Substantial Completion.
 - e) Use of premises restrictions.
 - f) Environmental control.
 3. Work Stages: Indicate important stages of construction for each major portion of the Work, including, but not limited to, the following:
 - a) Submittals.
 - b) Purchases.
 - c) Mockups.
 - d) Fabrication.
 - e) Sample testing.
 - f) Deliveries.
 - g) Installation.
 - h) Tests and inspections.
 - i) Startup and placement into final use and operation.
- D. Milestones: If not included in the Construction Documents, milestones shall be indicated in the Construction Schedule for the Designer's and Owner's approval and shall be reference points of the construction progress.
- E. Contract Modifications: For each proposed contract modification and concurrent with its submission, prepare a time-impact analysis using fragments to demonstrate the effect of the proposed change on the overall project schedule.

2.2 PRELIMINARY CONSTRUCTION SCHEDULE

- A. Bar-Chart Schedule: Submit preliminary horizontal bar-chart-type construction schedule within seven (7) days of date established for the Notice to Proceed

- B. Preparation: Indicate each significant construction activity separately. Identify first workday of each week with a continuous vertical line. Outline significant construction activities for first 30 days of construction. Include skeleton diagram for the remainder of the Work.

2.3 CONTRACTOR'S CONSTRUCTION SCHEDULE (CPM SCHEDULE)

- A. Preliminary Network Diagram: Submit diagram within 14 days of date established for the Notice to Proceed. Outline significant construction activities for the first 30 days of construction. Include skeleton diagram for the remainder of the Work.
- B. CPM Schedule: Prepare Contractor's Construction Schedule using a CPM network analysis diagram.
 - 1. Develop network diagram in sufficient time to submit CPM schedule so it can be accepted for use no later than 30 days after date established for the Notice to Proceed
 - 2. Conduct educational workshops to train and inform key Project personnel, including subcontractors' personnel, in proper methods of providing data and using CPM schedule information.
 - 3. Establish procedures for monitoring and updating CPM schedule and for reporting progress. Coordinate procedures with progress meeting and payment request dates.
 - 4. Use "one workday as the unit of time.
- D. CPM Schedule Preparation: Prepare a list of all activities required to complete the Work. Using the preliminary network diagram, prepare a skeleton network to identify probable critical paths.
 - 1. Activities: Indicate the estimated time duration, sequence requirements, and relationship of each activity in relation to other activities. Include estimated time frames for the following activities:
 - a) Preparation and processing of submittals.
 - b) Purchase of materials.
 - c) Delivery.
 - d) Fabrication.
 - e) Installation.
 - 2. Processing: Process data to produce output data or a computer-drawn, time-scaled network. Revise data, reorganize activity sequences, and reproduce as often as necessary to produce the CPM schedule within the limitations of the Contract Time.
 - 3. Format: Mark the critical path. Locate the critical path near center of network; locate paths with most float near the edges.
 - a) Sub-networks on separate sheets are permissible for activities clearly off the critical path.
- E. Initial Issue of Schedule: Prepare initial network diagram from a list of straight "early start-total float" sort. Identify critical activities. Prepare tabulated reports showing the following:
 - 1. Contractor or subcontractor and the Work or activity.
 - 2. Description of activity.

3. Principal events of activity.
 4. Immediate preceding and succeeding activities.
 5. Early and late start dates.
 6. Early and late finish dates.
 7. Activity duration in workdays.
 8. Total float or slack time.
 9. Average size of workforce.
- F. Schedule Updating: Concurrent with making revisions to schedule, prepare tabulated reports showing the following:
1. Identification of activities that have changed.
 2. Changes in early and late start dates.
 3. Changes in early and late finish dates.
 4. Changes in activity durations in workdays.
 5. Changes in the critical path.
 6. Changes in total float or slack time.
 7. Changes in the Contract Time.

PART 3 - EXECUTION

3.1 CONTRACTOR'S CONSTRUCTION SCHEDULE

- A. Contractor's Construction Schedule Updating: At monthly intervals, update schedule to reflect actual construction progress and activities. Issue schedule one week before each regularly scheduled progress meeting.
1. Revise schedule immediately after each meeting or other activity where revisions have been recognized or made. Issue updated schedule concurrently with the report of each such meeting.
 2. Include a report with updated schedule that indicates every change, including, but not limited to, changes in logic, durations, actual starts and finishes, and activity durations.
 3. As the Work progresses, indicate Actual Completion percentage for each activity.
- B. Distribution: Distribute copies of approved schedule to Designer, Owner, separate Contractors, testing and inspecting agencies, and other parties identified by Contractor with a need-to-know schedule responsibility.
1. Post copies in Project meeting rooms and temporary field offices.
 2. When revisions are made, distribute updated schedules to the same parties and post in the same locations. Delete parties from distribution when they have completed their assigned portion of the Work and are no longer involved in performance of construction activities.

END OF SECTION 01 32 00

SECTION 01 32 20 - PHOTOGRAPHIC DOCUMENTATION

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes administrative and procedural requirements for the following:
 - 1. Preconstruction photographs.
 - 2. Periodic construction photographs.
 - 3. Final Completion construction photographs.

1.3 SUBMITTALS

- A. Qualification Data: For firms and persons specified in "Quality Assurance" Article to demonstrate their capabilities and experience. Include lists of completed projects with project names and addresses, names and addresses of Designers and owners, and other information specified.
- B. Key Plan: Submit key plan of Project site with notation of vantage points marked for location and direction of each photograph. Indicate elevation or story of construction. Include the same label information as the corresponding set of photographs.
- C. Construction Photographs: Submit 1 PDF of each photographic view within **7** days of taking photographs.
 - 1. Format: Digital "PDF".
 - a. All references to pdf format within the Project Manual are defined as "Portable Document Format" (pdf) as made standard by digital image-viewing software widely used throughout the design and construction industry.
 - 2. Digital Images: Submit a complete set of digital image electronic files as a Project Record Document. Identify electronic media with date photographs were taken. Submit images that have the same aspect ratio as the sensor, uncropped.

1.4 COORDINATION

- A. Auxiliary Services: Cooperate with photographer and provide auxiliary services requested, including access to Project site and use of temporary facilities including temporary lighting.

PART 2 - PRODUCTS – NOT USED

PART 3 - EXECUTION

3.1 PHOTOGRAPHS, GENERAL

- A. Date Stamp: Unless otherwise indicated, date and time stamp each photograph as it is being taken so stamp is integral to photograph.

3.2 CONSTRUCTION PHOTOGRAPHS

- A. Preconstruction Photographs: Before starting construction, take color photographs of Project site and surrounding properties from different vantage points, as directed by Designer.
 - 1. Take 4 photographs to show existing conditions of each side of building adjacent to the property before starting the Work.
 - 2. Take 4 photographs of existing buildings either on or adjoining the property to accurately record the physical conditions at the start of construction.
- B. Periodic Construction Photographs: Take color digital photographs to document progress with the cutoff date associated with each Application for Payment. Photographer shall select vantage points to best show status of construction and progress since the last photographs were taken.
- C. Final Completion Construction Photographs: Take 10 digital color photographs of each project after date of Substantial Completion for submission as Project Record Documents. Designer will direct photographer for desired vantage points.
 - 1. Do not include date stamp.

END OF SECTION 01 32 20

SECTION 01 33 00 - SUBMITTAL PROCEDURES

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes administrative and procedural requirements for submitting Shop Drawings, Product Data, Samples, and other miscellaneous submittals.

1.3 DEFINITIONS

- A. Action Submittals: Written and graphic information that requires Designer's responsive action.
- B. Informational Submittals: Written information that does not require Designer's approval. Submittals may be rejected for not complying with requirements.

1.4 SUBMITTAL PROCEDURES

- A. The Contractor shall provide the submittals as required by the Designer's Submittal Log and the Contract Documents.
- B. General: Electronic copies of CAD Drawings of the Contract Drawings will not be provided by Designer for Contractor's use in preparing submittals.
- C. 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. 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. Designer reserves the right to withhold action on a submittal requiring coordination with other submittals until related submittals are received.
- D. Submittals Schedule: Comply with requirements in Division 1, of the Technical Specifications Section "Construction Progress Documentation" for list of submittals and time requirements for scheduled performance of related construction activities. (Submittal Log)
- E. Processing Time: Allow enough time for submittal review, including time for re-submittals, as follows. Time for review shall commence on Designer's receipt of submittal.
 - 1. Initial Review: Allow seven (7) days for initial review of each submittal. Allow additional time if processing must be delayed to permit coordination with subsequent submittals. Designer will advise Contractor when a submittal being processed must be delayed for coordination.
 - 2. Concurrent Review: Where concurrent review of submittals by Designer's consultants, Owner, or other parties is required, allow twenty-one (21) days for initial review of each submittal.

3. If intermediate submittal is necessary, process it in same manner as initial submittal.
 4. Allow seven (7) days for processing each re-submittal.
 5. No extension of the Contract Time will be authorized because of failure to transmit submittals enough in advance of the Work to permit processing.
- F. Identification: Place a permanent label or title block on each submittal for identification.
1. Indicate name of firm or entity that prepared each submittal on label or title block.
 2. Provide a space approximately 4 by 5 inches on label or beside title block to record Contractor's review and approval markings and action taken by Designer.
 3. Include the following information on label for processing and recording action taken:
 - a. Project name.
 - b. Date.
 - c. Name and address of Designer.
 - d. Name and address of Contractor.
 - e. Name and address of subcontractor.
 - f. Name and address of supplier.
 - g. Name of manufacturer.
 - h. Unique identifier, including related specification section/number and revision number.
 - i. Number and title of appropriate Technical Specifications Section.
 - j. Drawing number and detail references, as appropriate.
 - k. Other necessary identification.
- G. Deviations: Highlight, encircle, or otherwise identify deviations from the Contract Documents on submittals.
- H. Additional Copies: Unless additional copies are required for final submittal, and unless Designer observes noncompliance with provisions of the Contract Documents, initial submittal may serve as final submittal.
1. Submit one copy of submittal to concurrent reviewer in addition to specified number of copies to Designer.
 2. Additional copies submitted for maintenance manuals will be marked with action taken and will be returned.
- I. Transmittal: Package each submittal individually and appropriately for transmittal and handling. Transmit each submittal using a transmittal form. Designer will return submittals, without review, received from sources other than Contractor.
1. On an attached separate sheet, prepared on Contractor's letterhead, record relevant information, requests for data, revisions other than those requested by Designer on previous submittals, and deviations from requirements of the Contract Documents, including minor variations and limitations. Include the same label information as the related submittal.
 2. Include Contractor's certification stating that information submitted complies with requirements of the Contract Documents.
 3. Transmittal Form: Use one form to be defined by the Designer.
- J. 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.
- K. Use for Construction: Use only final submittals with mark indicating action taken by Designer in connection with construction.

PART 2 - PRODUCTS

2.1 ACTION SUBMITTALS

- A. General: Prepare and submit Action Submittals required by individual Specification Sections. Submit PDF files electronically by email or Project management software.
- 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 printed 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 written recommendations.
 - b. Manufacturer's product specifications.
 - c. Manufacturer's installation instructions.
 - d. Standard color charts.
 - e. Manufacturer's catalog cuts.
 - f. Wiring diagrams showing factory-installed wiring.
 - g. Printed performance curves.
 - h. Operational range diagrams.
 - i. Mill reports.
 - j. Standard product operating and maintenance manuals.
 - k. Compliance with recognized trade association standards.
 - l. Compliance with recognized testing agency standards.
 - m. Application of testing agency labels and seals.
 - n. Notation of coordination requirements.
 - o. Manufacturer's location.
- 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: Include the following information, as applicable:
 - a. Dimensions.
 - b. Identification of products.
 - c. Fabrication and installation drawings.
 - d. Roughing-in and setting diagrams and existing conditions.
 - e. Wiring diagrams showing field-installed wiring, including power, signal, and control wiring.
 - f. Shopwork manufacturing instructions.
 - g. Templates and patterns.
 - h. Schedules.
 - i. Design calculations.
 - j. Compliance with specified standards.
 - k. Notation of coordination requirements.
 - l. Notation of dimensions established by field measurement.
 - 2. Wiring Diagrams: Differentiate between manufacturer-installed and field-installed wiring.
 - 3. 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 40 inches.
 - 4. Number of Copies: Submit one (1) PDF copy.
- D. Coordination Drawings: Comply with requirements in Division 1 Section "Project Management and Coordination."

- E. Samples: Prepare physical units of materials or products, including the following:
1. Verify the samples are true presentation of the materials to be used.
 2. 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.
 3. Preparation: Mount, display, or package Samples in manner specified to facilitate review of qualities indicated. Prepare Samples to match Designer's sample where so indicated. Attach label on unexposed side that includes the following:
 - a. Generic description of Sample.
 - b. Product name or name of manufacturer.
 - c. Sample source.
 4. Additional Information: On an attached separate sheet, prepared on Contractor's letterhead, provide the following:
 - a. Size limitations.
 - b. Compliance with recognized standards.
 - c. Availability.
 - d. Delivery time.
 5. Submit Samples for review of kind, color, pattern, and texture for a final check of these characteristics with other elements and for a comparison of these characteristics between final submittal and actual component as delivered and installed.
 - a. If variation in color, pattern, texture, or other characteristic is inherent in the product represented by a Sample, submit at least three sets of paired units that show approximate limits of the variations. The Designer will return submittal with the option selected.
 - b. Refer to individual Specification Sections for requirements for Samples that illustrate workmanship, fabrication techniques, details of assembly, connections, operation, and similar construction characteristics.
 6. 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.
- F. Product Schedule or List: 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.
 2. Number and name of room or space.
 3. Location within room or space.
- G. Delegated-Design Submittal: Comply with requirements in Division 1 Section "Quality Requirements."
- H. Submittals Schedule: Comply with requirements in Division 1 Section "Construction Progress Documentation."
- I. Application for Payment: Comply with requirements in Division 1 Section "Payment Procedures."

- J. Schedule of Values: Comply with requirements in Division 1 Section "Payment Procedures."
- K. Subcontract List: Prepare a written summary identifying individuals or firms proposed for each portion of the Work, including those who are to furnish products or equipment fabricated to a special design. Include the following information in tabular form:
 - 1. Name, address, and telephone number of entity performing subcontract or supplying products.

2.2 INFORMATIONAL SUBMITTALS

- A. General: Prepare and submit Informational Submittals required by other Specification Sections.
 - 1. Submit PDF files electronically unless otherwise indicated. Designer will not return copies.
 - 2. Certificates and Certifications: Provide a notarized 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.
- B. Contractor's Construction Schedule: Comply with requirements in Division 1 Section "Construction Progress Documentation."
- C. Qualification Data: If requested, prepare written information that demonstrates capabilities and experience of firm or person. Include lists of completed projects with project names and addresses, names and addresses of Designer and owners, and other information specified.
- D. Product Certificates: Prepare written statements on manufacturer's letterhead certifying that product complies with requirements.
- E. Welding Certificates: Prepare written certification that welding procedures and personnel comply with requirements. Submit record of Welding Procedure Specification (WPS) and Procedure Qualification Record (PQR) on AWS forms. Include names of firms and personnel certified.
- F. Installer Certificates: Prepare written statements on manufacturer's letterhead certifying that Installer complies with requirements and, where required, is authorized for this specific Project.
- G. Manufacturer Certificates: Prepare written statements on manufacturer's letterhead certifying that manufacturer complies with requirements. Include evidence of manufacturing experience where required.
- H. Material Certificates: Prepare written statements on manufacturer's letterhead certifying that material complies with requirements.
- I. Compatibility Test Reports: Prepare 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 for the application.
- J. Product Test Reports: Prepare written reports indicating current product produced by manufacturer complies with requirements. 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.
- K. Coordinate individual Specification Sections with paragraph below by including specific model code organization in that Section. If all are same, insert name below.
Maintenance Data: Prepare written and graphic instructions and procedures for operation and normal maintenance of products and equipment. Comply with requirements in Division 1 Section "Closeout Procedures Operation and Maintenance Data."

- L. **Manufacturer's Instructions:** Prepare written or published information that documents manufacturer's recommendations, guidelines, and procedures for installing or operating a product or equipment. Include name of product and name, address, and telephone number of manufacturer. Include the following, as applicable:
 - 1. Preparation of substrates.
 - 2. Required substrate tolerances.
 - 3. Sequence of installation or erection.
 - 4. Required installation tolerances.
 - 5. Required adjustments.
 - 6. Recommendations for cleaning and protection.
- M. **Manufacturer's Field Reports:** Prepare written information documenting factory-authorized service representative's tests and inspections. Include the following, as applicable:
 - 1. Name, address, and telephone number of factory-authorized service representative making report.
 - 2. Statement on condition of substrates and their acceptability for installation of product.
 - 3. Statement that products at Project site comply with requirements.
 - 4. Summary of installation procedures being followed, whether they comply with requirements and, if not, what corrective action was taken.
 - 5. Results of operational and other tests and a statement of whether observed performance complies with requirements.
 - 6. Statement whether conditions, products, and installation will affect warranty.
 - 7. Other required items indicated in individual Specification Sections.
- N. **Material Safety Data Sheets:** Submit two copies for the Designer and the Owner and keep a copy at the job site. Post warning signs when appropriate.

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 Designer.
- 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 DESIGNER'S ACTION

- A. **General:** Designer will not review submittals that do not bear Contractor's approval stamp and will return them without action.
- B. **Action Submittals:** Designer will review each submittal, make marks to indicate corrections or modifications required, and return it. Designer will stamp each submittal with an action stamp and will mark stamp appropriately to indicate action taken, as follows:
- C. **Informational Submittals:** Designer will review each submittal and will not return it, or will reject and return it if it does not comply with requirements. Designer will forward each submittal to appropriate party.
- D. Submittals not required by the Contract Documents will not be reviewed and may be discarded unless a justification is also submitted.

END OF SECTION 01 33 00

SECTION 01 40 00 - QUALITY REQUIREMENTS

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes administrative and procedural requirements for quality assurance and quality control.
- B. Testing and inspecting services are required to verify compliance with requirements specified or indicated. These services do not relieve Contractor of responsibility for compliance with the Contract Document requirements.
 - 1. Specific quality-control requirements for individual construction activities are specified in the Sections that specify those activities. Requirements in those Sections may also cover production of standard products.
 - 2. Specified tests, inspections, and related actions do not limit Contractor's quality-control procedures that facilitate compliance with the Contract Document requirements.
 - 3. Requirements for Contractor to provide quality-control services required by Designer, Owner, or authorities having jurisdiction are not limited by provisions of this Section.

1.3 DEFINITIONS

- A. Quality-Assurance Services: Activities, actions, and procedures performed before and during execution of the Work to guard against defects and deficiencies and ensure that proposed construction complies with requirements.
- B. Quality-Control Services: Tests, inspections, procedures, and related actions during and after execution of the Work to evaluate that completed construction comply with requirements. Services do not include contract enforcement activities performed by Designer.
- C. Testing Agency: An entity engaged to perform specific tests, inspections, or both. Testing laboratory shall mean the same as testing agency.

1.4 REGULATORY REQUIREMENTS

- A. Copies of Regulations: Obtain copies of the referenced regulations and retain at Project site to be available for reference by parties who have a reasonable need

1.5 QUALITY ASSURANCE

- A. Fabricator Qualifications: A firm experienced in producing products similar to those indicated for this Project and with a record of successful in-service performance, as well as sufficient production capacity to produce required units.
- B. Factory-Authorized Service Representative Qualifications: An authorized representative of manufacturer who is trained and approved by manufacturer to inspect installation of manufacturer's products that are similar in material, design, and extent to those indicated for this Project.

- C. Installer Qualifications: A firm or individual experienced in installing, erecting, or assembling work similar in material, design, and extent to that indicated for this Project, whose work has resulted in construction with a record of successful in-service performance.
- D. Manufacturer Qualifications: A firm experienced in manufacturing products or systems similar to those indicated for this Project and with a record of successful in-service performance.
- E. Professional Engineer 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. Engineering services are defined as those performed for installations of the system, assembly, or product that are similar to those indicated for this Project in material, design, and extent for a second option.
- F. Testing Agency Qualifications: An agency with the experience and capability to conduct testing and inspecting indicated, as documented by ASTM E 548, and that specializes in types of tests and inspections to be performed.

1.6 QUALITY CONTROL

- A. Owner Responsibilities: Where quality-control services are indicated as Owner's responsibility, Owner will engage a qualified testing agency to perform these services.
 - 1. Owner will furnish Contractor with names, addresses, and telephone numbers of testing agencies engaged and a description of the types of testing and inspecting they are engaged to perform.
 - 2. Costs for retesting and re-inspecting construction that replaces or is necessitated by work that failed to comply with the Contract Documents will be charged to Contractor, and the Contract Sum will be adjusted by Change Order.
- B. Contractor Responsibilities: Unless otherwise indicated, provide quality-control services specified and required by authorities having jurisdiction.
 - 1. Where services are indicated as Contractor's responsibility, engage a qualified testing agency to perform these quality-control services.
 - a. Contractor shall not employ the same entity engaged by Owner, unless agreed to in writing by Owner.
 - 2. Notify testing agencies at least 24 hours in advance of time when Work that requires testing or inspecting will be performed.
 - 3. Where quality-control services are indicated as Contractor's responsibility, submit a certified written report, in duplicate, of each quality-control service.
 - 4. Testing and inspecting requested by Contractor and not required by the Contract Documents are Contractor's responsibility.
 - 5. Submit additional copies of each written report directly to authorities having jurisdiction, when they so direct.
- C. Special Tests and Inspections: Owner will engage a testing agency to conduct special tests and inspections required by authorities having jurisdiction as the responsibility of Owner.
 - 1. Testing agency will notify Designer and Contractor promptly of irregularities and deficiencies observed in the Work during performance of its services.
 - 2. Testing agency will submit a certified written report of each test, inspection, and similar quality-control service to Designer with copy to Contractor and to authorities having jurisdiction.
 - 3. Testing agency will submit a final report of special tests and inspections at Substantial Completion, which includes a list of unresolved deficiencies.

4. Testing agency will interpret tests and inspections and state in each report whether tested and inspected work complies with or deviates from the Contract Documents.
 5. Testing agency will retest and re-inspect corrected work.
- D. Manufacturer's Field Services: Where indicated, engage a factory-authorized service representative to inspect field-assembled components and equipment installation, including service connections. Report results in writing.
- E. Retesting/Re-inspecting: Regardless of whether original tests or inspections were Contractor's responsibility, provide quality-control services as requested by the Designer at the Contractor's expense, including retesting and re-inspecting, for construction that revised or replaced Work, at the Contractor's expense, that failed to comply with requirements established by the Contract Documents.
- F. Testing Agency Responsibilities: Cooperate with Designer and Contractor in performance of duties. Provide qualified personnel to perform required tests and inspections.
1. In the event there is a need for the Contractor to have testing performed.
 2. Notify Designer and Contractor promptly of irregularities or deficiencies observed in the Work during performance of its services.
 3. Interpret tests and inspections and state in each report whether tested and inspected work complies with or deviates from requirements.
 4. Submit a certified written report, in duplicate, of each test, inspection, and similar quality-control service through Contractor.
 5. Do not release, revoke, alter, or increase requirements of the Contract Documents or approve or accept any portion of the Work.
 6. Do not perform any duties of Contractor.
- G. Associated Services: Cooperate with agencies performing required tests, inspections, and similar quality-control services, and provide reasonable auxiliary services as requested. Notify agency sufficiently in advance of operations to permit assignment of personnel. Provide the following:
1. Access to the Work.
 2. Incidental labor and facilities necessary to facilitate tests and inspections.
 3. Adequate quantities of representative samples of materials that require testing and inspecting. Assist agency in obtaining samples.
 4. Facilities for storage and field-curing of test samples.
 5. Delivery of samples to testing agencies.
 6. Preliminary design mix proposed for use for material mixes that require control by testing agency.
 7. Security and protection for samples and for testing and inspecting equipment at Project site.
- H. Coordination: Coordinate sequence of activities to accommodate required quality-assurance and quality-control services with a minimum of delay and to avoid necessity of removing and replacing construction to accommodate testing and inspecting.
1. Schedule times for tests, inspections, obtaining samples, and similar activities.
- I. Schedule of Tests and Inspections: Prepare a schedule of tests, inspections, and similar quality-control services required by the Contract Documents. Submit schedule within 30 days of date established for the Notice to Proceed.
1. Distribution: Distribute schedule to Owner, Designer, testing agencies, and each party involved in performance of portions of the Work where tests and inspections are required.

PART 2 - PRODUCTS: (NOT USED)

PART 3 - EXECUTION

3.1 REPAIR AND PROTECTION

- A. General: On completion of testing, inspecting, sample taking, and similar services, repair damaged construction and restore substrates and finishes.
 - 1. Provide materials and comply with installation requirements specified in other Sections of these Specifications. Restore patched areas and extend restoration into adjoining areas in a manner that eliminates evidence of patching.
 - 2. Comply with the Contract Document requirements for Division 1, of the Technical Specifications Section "Cutting and Patching."
- B. Protect construction exposed by or for quality-control service activities.
- C. Repair and protection are Contractor's responsibility, regardless of the assignment of responsibility for quality-control services.

END OF SECTION 01 40 00

SECTION 01 50 50 - CONSTRUCTION WASTE MANAGEMENT

PART 1 - GENERAL

1.1 DESCRIPTION

- A. The Owner has established that this Project shall include proactive measures for waste management participation by all parties to the contract.
 - 1. The purpose of this program is to ensure that during the course of the Project all diligent means are employed to pursue practical and economically feasible waste management and recycling options.
 - 2. Upon award, each subcontractor shall be required to furnish documentation from suppliers or manufacturers regarding waste management and recycling options for those products and procedures furnished.
 - 3. Waste disposal to landfills shall be minimized.
- B. Definitions:
 - 1. Waste: Any material that has reached the end of its intended use. Waste includes salvageable, returnable, recyclable and reusable material.
 - 2. Construction waste: Solid wastes including, but not limited to, building materials, packaging materials, debris, and trash resulting from construction operations.
 - 3. Salvage: To remove a waste material from the Project site to another site for resale or reuse by others.
 - 4. Hazardous waste: Any material or byproduct of construction that is regulated by the Environmental Protection Agency and that may not be disposed in any landfill or other waste end-source without adherence to applicable laws.
 - 5. Trash: Any product or material unable to be returned, reused, recycled or salvaged.
 - 6. Landfill: Any public or private business involved in the practice of trash disposal.
 - 7. Waste Management Plan: A Project-related plan for the collection, transportation, and disposal of the waste generated at the construction site.

1.2 SUBMITTALS:

- A. Project Information:
 - 1. Contractor's Construction Waste Management Plan.

1.3 CONSTRUCTION WASTE MANAGEMENT PLAN

- A. Waste Management Plan shall include the following:
 - 1. Solid Waste Disposal and Diversion document.
 - a. Identification of materials recycled.
 - b. Identification of materials landfill.
 - c. Identification of hazardous wastes and disposal.
 - 2. Locations of sorting and waste storage facilities on Site Plan of project.
 - 3. Final documentation of subcontractor/supplier waste management/recycling data.
 - 4. Final documentation of hazardous waste disposal plan.
- B. Construction Waste Management Plan Implementation:
 - 1. The Contractor shall designate an on-site party (or parties) responsible for instructing workers and overseeing and documenting the Waste Management Plan.

2. The "Summary of Construction Waste/Recycling" shall be completed each month and submitted as part of Application For Payment.
 - a. All materials identified in the Summary shall be reported by weight.
 - b. Where weight is not applicable, Contractor shall report materials by units applicable to material recipient.
 - c. Contractor shall procure receipts or other validation of waste management procedures and include them as part of the submittal.
 3. The Contractor shall distribute copies of the "Summary of Construction Waste/Recycling" to the Designer, Owner and each subcontractor involved in the plan.
 4. The Contractor shall provide on-site instruction of appropriate separation, handling, and recycling, salvage, reuse and return methods to be used by all parties at appropriate stages of the Work.
 5. Separation facilities:
 - a. Contractor shall define specific areas to facilitate separation of materials for recycling, salvage, re-use or return.
 - b. Recycle and waste bin areas are to be maintained in an orderly manner and clearly marked to avoid contamination of materials.
 - c. Do not mix recyclable materials.
 - d. Store hazardous waste in secure areas.
 6. Hazardous wastes:
 - a. Hazardous wastes shall be separated, stored and disposed of in accordance with local and EPA regulations and additional criteria listed below:
 - 1) Building products manufactured with PVC or containing chlorinated compounds shall not be incinerated.
 - 2) Disposal of fluorescent tubes to open containers is not permitted.
 - 3) Unused fertilizers shall not be co-mingled with construction waste.
- C. Program profits:
1. All profits from recycling of construction waste shall be granted to the Contractor.

PART 2 - PRODUCTS: (NOT USED)

PART 3 - EXECUTION: (NOT USED)

END OF SECTION 01 50 50

SECTION 01 70 00 - EXECUTION REQUIREMENTS

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes general procedural requirements governing execution of the Work including, but not limited to, the following:
 - 1. Field engineering and surveying
 - 2. Progress cleaning.
 - 3. Starting and adjusting.
 - 4. Protection of installed construction.
 - 5. Correction of the Work.

1.3 SUBMITTALS

- A. Landfill Receipts: Submit copy of receipts issued by a landfill facility, licensed to accept hazardous materials, for hazardous waste disposal.
- B. Certified Surveys: Submit two copies signed by land surveyor or professional engineer as required.

1.4 QUALITY ASSURANCE

- A. Land Surveyor Qualifications: A licensed 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.

PART 2 - PRODUCTS: (NOT USED)

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 site work, 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.

3.2 PREPARATION

- A. Existing Utility Information: Furnish information to local utility, Owner, and Designer 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. 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.
- C. Space Requirements: Verify space requirements and dimensions of items shown diagrammatically on Drawings.
- D. 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 Designer. Include a detailed description of problem encountered, together with recommendations for modifications of the Contract Documents.

3.3 FIELD ENGINEERING

- A. 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 Designer. Report lost or destroyed permanent benchmarks or control points promptly. Report the need to relocate permanent benchmarks or control points to Designer before proceeding.
 2. Replace lost or destroyed permanent benchmarks and control points promptly. Base replacements on the original survey control points.

3.4 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.
 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.
 3. Containerize hazardous and unsanitary waste materials separately from other waste. Mark containers appropriately and dispose of legally, according to regulations. Dispose of material in accordance to Division 1, Section "Construction Waste Management".
- 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 surfaces and similar features before applying paint or other finishing materials.
- 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 until 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.

3.5 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.

3.6 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.

3.7 CORRECTION OF THE WORK

- A. Repair or remove and replace defective construction. Restore damaged substrates and finishes.
 - 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 01 70 00

SECTION 01 77 00 - CLOSEOUT PROCEDURES

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes administrative and procedural requirements for contract closeout, including, but not limited to, the following:
 - 1. Inspection procedures.
 - 2. Project As-Builts Documents.
 - 3. Operation and maintenance manuals.
 - 4. Warranties.
 - 5. Instruction of Owner's personnel.
 - 6. Final cleaning.

1.3 SUBSTANTIAL COMPLETION

- A. Preliminary Procedures: The Contractor shall, 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, "As-Builts" drawings, operation and maintenance manuals, Final Completion construction photographs and photographic negatives if required, 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. Terminate and remove temporary facilities from Project site, along with mockups, construction tools, and similar elements.
 - 8. Complete final cleaning requirements, including touchup painting.
 - 9. 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, Designer will either proceed with inspection or notify Contractor of unfulfilled requirements. Designer 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 Designer, that must be completed or corrected before certificate will be issued. The Designer's Substantial Completion list is composed by verification of the punch list submitted by the Contractor and any additional defects in the work observed by the Designer.
 - 1. Re-inspection: Request re-inspection 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.

1.4 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, of the Technical Specifications Section "Payment Procedures."
 - 2. Submit certified copy of Designer's Substantial Completion inspection list of items to be completed or corrected (punch list), endorsed and dated by Designer. 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.
- B. Inspection: Submit a written request for final inspection for acceptance. On receipt of request, Designer will either proceed with inspection or notify Contractor of unfulfilled requirements. Designer 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. Re-inspection: Request re-inspection when the Work identified in previous inspections as incomplete is completed or corrected.
 - 2. The Contractor shall take immediate steps to correct the stated deficiencies, and send a written notice to the Designer, certifying the Project is complete, at which time the Designer will re-inspect the Work. This review and additional reviews by the Designer where the Work is not considered Substantial Completion or Final Completion will be considered an additional service from the Designer. The Contractor will be charged for these additional services incurred by such failure including travel time, observation time, and administrative time at the Designer's hourly rate, as well as all expenses associated with the distribution of a written notice stating the reasons for failure to reach final completion.
 - 3. In the event the Contractor is granted Substantial Completion by the Designer and the Contractor fails to complete and/or correct all of the items listed in the Substantial Completion within **30** calendar days after the date of Substantial Completion, the liquated damages shall start to accrue until all of the items on the Substantial Completion list are completed and/or corrected and have been approved by the Designer.
 - 4. If the Designer is required to make more than two inspections for the project to achieve Substantial Completion, the Contractor shall pay for the Designer's time and expenses.

1.5 LIST OF INCOMPLETE ITEMS (PUNCH LIST)

- A. Preparation: Submit three copies of list. Include name and identification of each space and area affected by construction operations for incomplete items and items needing correction including, if necessary, areas disturbed by Contractor that are outside the limits of construction.
 - 1. Organize list of in sequential order.
 - 2. Organize items applying to each major element:
 - a. Project name.
 - b. Date.
 - c. Name of Designer.
 - d. Name of Contractor.
 - e. Page number.

1.6 WARRANTIES

- A. Submittal Time: Submit written warranties on request of Designer 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.

- C. Organize warranty documents into an orderly sequence based on the table of contents of the Project Manual.
- D. Provide copies of each warranty to include in operation and maintenance manuals.

PART 2 - PRODUCTS (NOT USED)

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. Clean exposed 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.
 - f. Wipe surfaces of mechanical and electrical equipment, and similar equipment. Remove excess lubrication, paint and mortar droppings, and other foreign substances.
 - g. Replace parts subject to unusual operating conditions.
- 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 01 77 00

SECTION 01 78 10 - PROJECT RECORD DOCUMENTS

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

- A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and all Divisions of the Technical Specifications, apply to this Section.

1.2 SUMMARY

- A. This Section includes administrative and procedural requirements for Project Record Documents, including the following:
 - 1. As-Built Drawings.
 - 2. As-Built Survey

1.3 SUBMITTALS

- A. As-Built Drawings: Comply with the following:
 - 1. Number of Copies: Submit one sets of marked-up As-Built Drawings to the Designer for the Designer to prepare the Record Drawings.
- B. As-Built Survey: Upon completion of the project, engage land surveyor or professional engineer to perform a certified survey.

PART 2 - PRODUCTS

2.1 AS-BUILT DRAWINGS

- A. As-Built Drawings: Maintain one set of black-line white prints of the Contract Drawings and Shop Drawings.
 - 1. Preparation: Mark As-Built Drawings 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 As-Built Drawings.
 - a. Give particular attention to information on concealed elements that would be difficult to identify or measure and record 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.
 - 2. Content: Types of items requiring marking include, but are not limited to, the following:
 - a. Dimensional changes to Drawings.
 - b. Revisions to details shown on Drawings.
 - c. Depths of foundations below first floor.
 - d. Locations and depths of underground utilities.
 - e. Revisions to routing of piping and conduits.
 - f. Revisions to electrical circuitry.
 - g. Actual equipment locations.
 - h. Duct size and routing.
 - i. Locations of concealed internal utilities.
 - j. Changes made by Change Order or Construction Change Directive.
 - k. Changes made following Designer's written orders.
 - l. Details not on the original Contract Drawings.
 - m. Field records for variable and concealed conditions.

- n. Record information on the Work that is shown only schematically.
 - o. Clarification Drawings.
 - 3. Mark the Contract Drawings or Shop Drawings, whichever is most capable of showing actual physical conditions, completely and accurately. If Shop Drawings are marked, show cross-reference on the Contract Drawings.
 - 4. 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.
 - 5. Mark important additional information that was either shown schematically or omitted from original Drawings.
 - 6. Note Construction Change Directive numbers, alternate numbers, Change Order numbers, and similar identification, where applicable.
 - 7. Identify and date each As-Built Drawing; include the designation "PROJECT AS-BUILTS DRAWING" in a prominent location. Organize into manageable sets; bind each set with durable paper cover sheets. Include identification on cover sheets.
- B. Newly Prepared As-Built Drawings: Prepare new Drawings instead of preparing As-Built Drawings where Designer determines that neither the original Contract Drawings nor Shop Drawings are suitable to show actual installation.
- 1. New Drawings may be required when a Change Order is issued as a result of accepting a substitution or other modification.
 - 2. Consult with Designer for proper scale and scope of detailing and notations required to record the actual physical installation and its relation to other construction. Integrate newly prepared As-Built Drawings into Record Drawing sets; comply with procedures for formatting, organizing, copying, binding, and submitting.

2.2 CERTIFIED SURVEY

- A. Engage licensed professional land surveyor to prepare survey of conditions at the completion of the project including but not limited to
- 1. Sitework
 - 2. Site Improvements
 - 3. Utilities

PART 3 - EXECUTION:

3.1 RECORDING AND MAINTENANCE

- A. Recording: Maintain one copy of each submittal during the construction period for Project Record Document purposes. Post changes and modifications to Project Record Documents as they occur; do not wait until the end of Project.
- B. Maintenance of Record Documents and Samples: Store Record Documents and Samples in the field office apart from the Contract Documents used for construction. Do not use Project Record Documents for construction purposes. Maintain Record Documents in good order and in a clean, dry, legible condition, protected from deterioration and loss. Provide access to Project Record Documents for Designer's reference during normal working hours.

END OF SECTION 01 78 10

SP-00 - PROJECT SPECIAL PROVISIONS

STANDARD SPECIFICATIONS

Except where modified by Project Special Provisions here within, the project shall conform to the current and effective revision of the North Carolina Department of Transportation Standard Specifications for Roads and Structures (*NCDOT Standard Specifications*). This shall include revisions or amendments as issued by the North Carolina Department of Transportation in the form of Supplemental Specifications, Standard Special Provisions, etc.

PROJECT SPECIAL PROVISIONS

Project Special Provisions are provided here within to provide specific descriptions, materials, construction methods, maintenance, and other supplemental specifications unique to this specific bid proposal and contract.

Unless otherwise directed by the Owner and/or Engineer, the absence of a unique specification for any specific item shall automatically refer to the appropriate section or sections of the *NCDOT Standard Specifications*.

Measurement and payment are included for each Project Special Provision here within. Payment will be made under the Pay Item(s) and Pay Unit(s) noted for each Project Special Provision.

SP-01	Work Zone Traffic Control	Bolton & Menk
SP-02	Erosion and Sedimentation Control	Bolton & Menk
SP-03	Tree Protection	Bolton & Menk
SP-04	Watermain Relocation	Bolton & Menk
SP-05	Signage	Bolton & Menk
SP-06	Mailboxes	Bolton & Menk
SP-07	Light Relocation	Bolton & Menk

REFERENCES

The following references and codes are noted throughout the following project special provisions and shall be referenced by the Contractor as necessary per the contract. The list below is not all inclusive, and as such, the Contractor is responsible for reviewing the current effective revision of applicable reference documents as necessary.

2018 North Carolina Department of Transportation Standard Specifications for Roads and Structures (*NCDOT Standard Specifications*). This reference can be viewed online at: <https://connect.ncdot.gov/resources/Specifications/StandSpecLibrary/2018%20Standard%20Specifications%20for%20Roads%20and%20Structures.pdf>.

North Carolina Department of Transportation 2018 Roadway Standard Drawings. This reference can be viewed online at: <https://connect.ncdot.gov/resources/Specifications/Pages/2018-Roadway-Standard-Drawings.aspx>

North Carolina Department of Environmental Quality (DEQ) Erosion and Sediment Control Planning and Design Manual. This reference can be viewed online at: <https://deq.nc.gov/about/divisions/energy-mineral-and-land-resources/erosion-and-sediment-control/erosion-and-sediment-control-planning-and-design-manual>.

2018 North Carolina State Building Code: Building Code. This reference can be viewed online at: <https://www.ncosfm.gov/codes/codes-current-and-past>.

Manual of Uniform Traffic Control Devices for Streets and Highways (MUTCD). This reference can be viewed online at: [Manual on Uniform Traffic Control Devices \(MUTCD\) - FHWA \(dot.gov\)](https://www.fhwa.dot.gov/publications/mutcd/).

North Carolina Department of Transportation (NCDOT) supplemental o Manual of Uniform Traffic Control Devices for Streets and Highways (MUTCD).

City of Raleigh Public Utilities Handbook. This reference can be viewed online at: <https://cityofraleigh0drupal.blob.core.usgovcloudapi.net/drupal-prod/COR25/PublicUtilitiesHandbook.pdf>

City of Raleigh City Tree Manual. This reference can be viewed online at: <https://cityofraleigh0drupal.blob.core.usgovcloudapi.net/drupal-prod/COR24/UrbanForestryCityTreeManual.pdf>

American with Disabilities Act (ADA)

Architectural and Transportation Barriers Compliance Board, Proposed Accessibility Guidelines for Pedestrian Facilities in the Public Right-of-Way (PROWAG).

American Concrete Institute (ACI) Standards

American Association of State Highway and Transportation Officials (AASHTO) Standards

American Society for Testing and Materials (ASTM) Standards

END OF SECTION

SP-01 - TRAFFIC CONTROL

1.0 DESCRIPTION

This item shall include all elements of work covered by the referenced NCDOT Specifications and the numbered Additional City Specifications provided herein.

NCDOT Specifications

- 1101, "Work Zone Traffic Control General Requirements"
- 1105, "Temporary Traffic Control Devices"
- 1110, "Work Zone Signs"
- 1130, "Drums"
- 1135, "Cones"
- 1145, "Barricades"
- 1150, "Flaggers"
- 1180, "Skinny Drums"

Additional City Specifications

1. Protection for Construction Staking: The Contractor is responsible for providing, placing, maintaining and removing upon completion, all traffic control devices necessary for the protection of survey crews performing construction staking requested by the Contractor for construction of this project when any offset, reference points, benchmark or any other control point is within the travel lane of any roadway, drive, parking lot or other area where vehicles could endanger or obstruct the survey crew.

2. Beginning Work and Street Closings: The Contractor is responsible for notifying the Town of Rolesville and NCDOT of any work where the number of travel lanes is reduced, or traffic patterns are changed from normal conditions.

- a. The Contractor shall install advance warning signs for the Project. These signs shall be in place for 7 calendar days before construction activity begins. The Contractor shall begin construction activity on a street on the scheduled date for the closing of the travel lane.
- b. During daily construction work hours, the Contractor will maintain at least one lane of traffic. During periods of construction inactivity, all lanes of traffic will be open unless otherwise shown on the plans or noted in the specifications.

3. Right-of-Way Use Permit: The Contractor will not be responsible for obtaining the Right-of-Way Use Permit(s) from NCDOT for approval to work in the streets rights-of-way of NCDOT. The permit(s) have been obtained by the Town's Engineer.

4. Traffic Control Plan: Traffic control will be performed by the Contractor based upon the Traffic Control Special Provisions and the plan sheets.

- a. All traffic control devices and procedures shall conform to the requirements of the current edition of the Federal Highway Administration (FHWA) *Manual on Uniform Traffic Control Devices* (MUTCD), the current edition of the North Carolina Department of Transportation (NCDOT) Supplement to the *Manual on Uniform Traffic Control Devices for Streets and Highways*, the NCDOT Roadway Standard Drawings and the current edition of the NCDOT Standard Specifications for Roads and Structures.
- b. The Contractor shall maintain the traffic control as described herein unless the Contractor submits an alternate traffic control plan to the Engineer, and it is approved by the Engineer. The Engineer may direct the Contractor to modify the traffic control if, in the Engineer's opinion, traffic is not moving safely or efficiently.
- c. Traffic Control Phasing for this project shall be in accordance with the Traffic Control Plans. The contractor shall adhere to these plans and diagrams. If these diagrams are not typical for field conditions, the diagrams may be combined or altered upon approval of the Engineer. The standards and diagrams are the minimum required. Additional signs,

cones, drums, barricades, and warning devices may be used, but at no time will less than what is specified on the plans, in the standards, and on diagrams be acceptable.

- 5. Maintenance of Traffic: The Contractor shall maintain all travel lanes in accordance with the Traffic Control Plan sheets.
 - a. Construction or maintenance work that involves closure of additional lanes of traffic, outside of what the plans show, will not be allowed during the peak flow hours unless otherwise specified in the Contract Documents.
 - b. In areas of drop-offs and low shoulders, the Contractor shall backfill up to the edge and elevation of the existing pavement in accordance with the Traffic Control Notes.
 - c. The Contractor will be required to maintain ingress and egress to all adjacent properties, and easy access to fire hydrants.
 - d. The Contractor shall not work on both sides of the road simultaneously within the same area.
 - e. The Contractor shall provide adequate drainage under driveways and within the Project area for the duration of the Project.
 - f. The Contractor shall mark all hazards within the Project limits with well-maintained signs, barricades, warning and/or channelizing devices.
- 6. Traffic Control Devices: The Contractor shall furnish, install, operate, relocate, maintain and remove all temporary traffic control devices necessary for controlling traffic in accordance with the MUTCD. The Contractor shall notify the Town of Rolesville regarding conflicting permanent signs to review and coordinate with NCDOT. Only NCDOT forces shall install, remove or relocate any permanent signs within the right-of-way, outside of what the plans show. All construction signs and barricades shall remain in place until the appropriate permanent signs and pavement markings are installed.
- 7. Equipment and Material Storage: During periods of construction inactivity, all construction materials and equipment shall be stored by the Contractor.
- 8. Excavation and Trenches: Excavations and trenches shall be properly backfilled and patched prior to the end of the workday.

2.0 MEASUREMENT

There will be no separate measurement made for Traffic Control.

3.0 PAYMENT

Traffic Control will be paid at the lump sum price for “Traffic Control”. This payment will be full compensation for all elements of work required to complete the Project as specified.

Partial payments will be made as follows:

- 25% of the lump sum price on the first partial payment estimate made after any work has been performed on the item of “Traffic Control”.
- 25% of the lump sum price on the first partial payment after work is 25% complete.
- 25% of the lump sum price on the first partial payment after work is 50% complete.
- 25% of the lump sum price on the first partial payment after work is 100% complete.

Payment will be made under:

TRAFFIC CONTROL.....LS

SP-02 - EROSION AND SEDIMENT CONTROL

1.0 DESCRIPTION

This item shall include all elements of work covered by the referenced NCDOT Specifications and the numbered Additional City Specifications provided herein.

NCDOT Specifications

1605, "Temporary Silt Fence"
1610, "Stone for Erosion Control"
1615, "Temporary Mulching"
1620, "Temporary Seeding"
1622, "Temporary Slope Drains"
1630, "Construction and Maintenance of Silt Detention Devices"
1631, "Rolled Erosion Control Products"
1633, "Temporary Rock Silt Checks"
1634, "Temporary Rock Sediment Dams"
1635, "Rock Pipe Inlet Sediment Trap"
1640, "Coir Fiber Baffle"
1651, "Selective Vegetation Removal"
1660, "Seeding and Mulching"
1661, "Repair Seeding"
1662, "Supplemental Seeding"
1665, "Fertilizer Topdressing"
1667, "Specialized Hand Mowing"

Additional City Specifications

1. Erosion Control: includes but is not limited to furnishing, installing, and maintaining silt fence, rock inlet sediment traps, silt sacks, all stone for erosion control, rock check dams, block and gravel and inlet protection, catch basin inlet protection, temporary rock construction entrances, silt basins, and all other erosion control measures required by, the plans, current ordinances, project permitting, and the Contractor's means and methods. The contractor shall remove all erosion control measures as directed by the Engineer.
2. Seeding and Mulching: all temporary and permanent seeding and mulching required to complete the project in accordance with the plans and specifications shall be included in this item. All work shall be in accordance with NPDES and NCDOT requirements and included in this item.
3. Erosion Control Matting: includes but is not limited to furnishing, installing, and maintaining temporary matting required for the project as required in the plans, current ordinances, project permitting, and the Contractor's means and methods. Erosion Control Matting shall be used on all slopes steeper than 3:1. Matting may also be required in other areas as needed to stabilize the site and to maintain erosion control and/or as noted on plans.

2.0 MEASUREMENT

There will be no separate measurement made for Erosion Control.

3.0 PAYMENT

For the above-referenced NCDOT sections and numbered Additional City Specifications, there will be no direct measurement, payment or compensation, all cost incurred to complete the work as specified shall be included in the Lump Sum price bid incidental to "Erosion Control".

There will be **no separate measurement or payment** for the items listed or referenced in this specification.

Partial payments will be made as follows:

- 25% of the lump sum price on the first partial payment estimate made after any work has been performed on the item of "Erosion and Sediment Control".
- 25% of the lump sum price on the first partial payment after work is 25% complete.
- 25% of the lump sum price on the first partial payment after work is 50% complete.
- 25% of the lump sum price on the first partial payment after work is 100% complete.

Payment will be made under:

EROSION AND SEDIMENT CONTROLLS

SP-03 - TREE PROTECTION

1.0 DESCRIPTION

This item shall include all elements of work covered by the referenced NCDOT Specifications and the numbered Additional City Specifications provided herein.

NCDOT Specifications

General Sections

Additional City Specifications

1. Tree Protection: includes but is not limited to furnishing, installing, and maintaining tree protection fence. Tree protection fence shall be in accordance with the standard detail in the plans, at the locations shown on the plans and as directed. The following shall apply:

a. Construction Methods:

i. Construct tree protection fence in accordance with the current effective City of Raleigh City Tree Manual standards, at the locations shown on the plans and as directed. The following shall apply:

1. A preinstallation conference shall be conducted at the project site prior to construction on the tree protection fence.
2. Tree protection fence shall be constructed prior to commencing any land disturbing activity.
3. Examine the site to verify that temporary erosion and sedimentation control measures are in place. Verify that flows of water redirected from construction areas or generated by construction activity do not enter or cross protection zones.

4. Field Conditions:

a. The following practices are prohibited within protection zones:

- i. Storage or stockpile of construction materials, debris, or excavated material.
- ii. Moving, parking, refueling, repairing or storage of vehicles, machinery, or equipment.
- iii. Foot traffic.
- iv. Erection of sheds or structures.
- v. Impoundment of water.
- vi. Excavation or other digging unless otherwise indicated.
- vii. Attachment of signs to or wrapping materials around trees or plants unless otherwise indicated.

b. Do not direct vehicle or equipment exhaust toward protection zones.

c. Do not release petroleum products, fuels, paints, or lubricants within or near protection zones or in areas or in areas that may drain into the tree protection zones.

d. Do not apply or release herbicides, fertilizers or chemicals of any kind that may be toxic to vegetation within or near protection zones.

e. Do not wash out concrete trucks or other equipment within or near protection zones or in areas or in areas that may drain into the tree protection zones clean.

f. Prohibit heat sources, flames, ignition sources, and smoking within or near protection zones and organic mulch.

5. Supplemental irrigation may be necessary during periods of drought or stress and shall be provided as directed and approved by the Owner and/or Engineer.

6. Tree protection zone signage shall be installed in visibly prominent locations in a manner approved by Owner and/or Engineer.

- a. Signs shall be made of durable, weatherproof material with letters a minimum of 3-inches high, clearly legible and spaced as shown on Detail 7, Sheet C-900.
 - b. Signs shall be a minimum of 40-inches wide and clearly display the following message in both English and Spanish: TREE PROTECTION ZONE DO NOT ENTER.
 - c. Signs shall be placed at 50' maximum intervals. Place a sign at each end of linear tree protection and 50' on center for the remainder. For tree protection areas less than 200' in perimeter, provide no less than one sign per protected area.
- 7. Any practice obviously hazardous to people or harmful to the trees, or other violations of tree protection measures here within, as determined by the Owner and/or Engineer, shall be immediately discontinued by the Contractor upon receipt of either written or oral notice to discontinue such practice. Such violations, at the discretion of the Owner and/or Engineer, shall be cause for immediate suspension of all work until the violation is resolved or repaired to the satisfaction of the Owner and/or Engineer. Such suspension of work will not be considered justification for extension of the contract time or adjustment in compensation in accordance with Section 104, *NCDOT Standard Specifications*.
- b. Maintenance and Removal:
 - i. Maintain all installed tree protection fence until the project is accepted or until the fence is removed as directed. Tree protection zones shall remain free of weeds, litter, and other debris.
 - ii. Maintain protection-zone fencing and signage in good condition as acceptable to Owner and/or Engineer and remove when construction operations are complete and equipment has been removed from the site, upon approval of Owner and/or Engineer. Removed tree protection fence becomes the property of the Contractor and shall be removed and legally disposed of off Owner's property. Fill all holes left by vertical posts of fencing with suitable soil. Weed/mow and restore area to original condition.
 - iii. If at any time the Owner and/or Engineer determines that the tree protection fence is damaged, improperly installed or signed, the Owner and/or Engineer may suspend work wholly until corrective action is taken and determined to be in satisfactory by the Owner and/or Engineer.
 - iv. Pruning is only permitted as approved by Owner and/or Engineer and shall conform to the City of Raleigh standards. Pruning shall follow proper pruning techniques as established in the current revision of *American National Standards Institute ANSI Z133.1, American National Standard for Arboricultural Operations— Safety Requirements* and perform pruning by a professional arborist.
 - 1. If pruning is required a written description and schedule detailing scope and extent of proposed pruning of trees to remain that interfere with or are affected by construction is required for Owner and/or Engineer review and approval prior to conducting work. Submittal shall include arborist qualifications.
 - a. Arborist Qualifications: Certified Arborist as certified by ISA, licensed arborist in jurisdiction where Project is located, current member of ASCA, or registered Consulting Arborist as designated by ASCA.

2.0 MEASUREMENT

Tree protection fence will be measured and paid in linear feet, accepted in place, along the ground line of the fence that has been satisfactorily installed and accepted by the Owner and/or Engineer. Tree protection fence that requires removal and replacement due to damage or general deterioration will be

paid at contract unit prices. Repairs to the fence due to carelessness or neglect on the part of the Contractor will be at no cost to the Owner.

3.0 PAYMENT

Such price and payment shall be full compensation for all work covered by this section including, but is not limited to, furnishing all labor, tools, equipment, materials and incidentals, construction, maintenance and removal of the tree protection fence, and final grading necessary upon removal of measure. Mulch and/or watering as required will be incidental to the completion of work in this section.

No revision in the contract unit price will be allowed because of any overrun or underrun.

Payment will be made under:

TREE PROTECTIONLF

SP-04 - WATERMAIN RELOCATION

1.0 DESCRIPTION

This item shall include all elements of work covered by the referenced NCDOT Specifications and the numbered Additional City Specifications provided herein.

NCDOT Specifications

General Sections

Additional City Specifications

1. Watermain Relocation: The Contractor is responsible for coordinating with the City of Raleigh for the watermain relocation as shown on the plan sheets. This work includes installing vertical drops to relocate the water below the proposed storm sewer with a minimum 18-inch separation. Installation shall follow City of Raleigh details.
 - a. The watermain relocation shall occur under a temporary water shut off that is to be coordinated with the Town of Rolesville and the City of Raleigh Public Utilities. This water shut off shall not affect the adjacent properties based on existing valve locations.
 - b. The contractor shall contact Raleigh Water (WDSERVICEREQUESTDL@raleighnc.gov) 48 hours prior to constructing the watermain vertical drops.
2. Equipment and Material Storage: During periods of construction inactivity, all construction materials and equipment shall be stored by the Contractor.
3. Excavation and Trenches: Excavations and trenches shall be properly backfilled and patched prior to the end of the workday.

2.0 MEASUREMENT

There will be no separate measurement made for Watermain Relocation.

3.0 PAYMENT

Watermain relocation will be paid per each for "Watermain Relocation", based upon size of the watermain. This payment will be full compensation for all elements of work required to complete the Project as specified.

Payment will be made under:

6" WATERMAIN RELOCATION.....	EA
8" WATERMAIN RELOCATION.....	EA
12" WATERMAIN RELOCATION.....	EA

SP-05 - SIGNAGE

1.0 DESCRIPTION

This item shall include all elements of work covered by the referenced NCDOT Specifications and the numbered Additional City Specifications provided herein.

NCDOT Specifications

- 900, "General Requirements for Signing"
- 901, "Sign Fabrication"
- 902, "Foundations for Ground Mounted Signs"
- 903, "Ground Mounted Sign Supports"
- 904, "Sign Erection"
- 907, "Disposal and Stockpiling of Signing Components"

Additional City Specifications

1. Sign Relocation: includes but is not limited to furnishing, installing, and maintaining sign and posts as required by, the plans, current ordinances, project permitting, and the Contractor's means and methods.
 - a. Remove signs and posts as shown on the Drawings or as directed by the Owner/Engineer.
 - b. Provide Engineer or Owner 48 hours' notice prior to removal.
 - c. In no case shall a traffic sign or street sign be removed or disturbed by Contractor without prior notification being given to Owner/Engineer and then only after satisfactory arrangements have been made for a temporary installation or its disposition:
 - i. Maintain temporary post mounted street identification signage at all times due to its importance to the 911 Emergency Response System.
 - ii. Maintain temporary post mounted traffic signage on all streets open to traffic.
 - iii. Temporary post mounted installation shall be considered incidental to the Project.
 - d. Contractor to remove sign and post from locations shown on the Drawings and protect throughout construction.
 - e. Install temporary post mounted signs, as needed, as described above.
 - f. Install post and sign at locations designated in the plans or as directed by Owner/Engineer.
 - g. Remove signs that are damaged during construction and replace with new signs as incidental to the Project. Contact NCDOT directly related to all signs within the right-of-way that may need to be temporarily or permanently removed.
2. Contractor Furnished, Street Name Blade Sign: includes but is not limited to furnishing, installing, and maintaining sign and posts as required by, the plans, current ordinances, project permitting, and the Contractor's means and methods.
 - a. The new street name blade sign shall be furnished and installed by Contractor. The sign shall be 36-inches long and 9-inches tall with 6-inch tall lettering, and shall replicate what is being used at the intersection of Spicer Lane and Rogers Road, including the post.

2.0 MEASUREMENT

Sign Relocation will be measured and paid per actual number relocated. Price and payment shall be full compensation for all work covered by this section including, but is not limited to, furnishing all labor, tools, equipment, materials and incidentals.

Contractor Furnished, Street Name Blade Sign will be measured and paid per actual number relocated. Price and payment shall be full compensation for all work covered by this section including, but is not limited to, furnishing all labor, tools, equipment, materials and incidentals.

3.0 PAYMENT

Payment will be made under:

SIGN RELOCATION..... EA
CONTRACTOR FURNISHED, STREET NAME BLADE SIGN EA

SP-06 - MAILBOXES

1.0 DESCRIPTION

This item shall include all elements of work covered by the referenced NCDOT Specifications and the numbered Additional City Specifications provided herein.

NCDOT Specifications

NA

Additional City Specifications

1. Mailbox Relocation: includes but is not limited to salvage, protect, and reinstall the mailbox, including similar footing, as required by, the plans, current ordinances, project permitting, and the Contractor's means and methods. Mailbox locations shall be determined by the Engineer in the field.
 - a. Remove and salvage existing mailboxes that interfere with the Work or whose access is restructured by the construction activities.
 - b. Place at a temporary location as directed by the Engineer.
 - c. Removal, temporary re-installation, and replacement shall occur such that mail delivery is not interrupted.
 - d. Reinstall in locations as shown on Drawings or as directed by Engineer.
 - e. Replace mailboxes, posts, and appurtenances damaged during construction at no charge to Owner.
2. Temporary Mailbox: includes but is not limited to furnishing, installing, and maintaining temporary mailboxes as required by, the plans, current ordinances, project permitting, and the Contractor's means and methods. The temporary mailbox location shall be determined by the Engineer in the field.
 - a. Remove, store safely, and replace all mailboxes and posts that may interfere with construction. Mailboxes and post shall be protected throughout construction and reinstalled as directed by Engineer.

2.0 MEASUREMENT

Temporary mailbox will be measured and paid per actual number installed. Price and payment shall be for full compensation for all work covered by this section including, but is not limited to, furnishing and installing a temporary mailbox at a temporary location as determined by the Engineer in the field.

Mailbox Relocation will be measured and paid per actual number relocated. Price and payment shall be for full compensation for all work covered by this section including, but is not limited to, all costs to salvage and reinstall the mailbox, including similar footing.

3.0 PAYMENT

Payment will be made under:

TEMPROARY MAILBOX..... EA
MAILBOX RELOCATION..... EA

SP-07 - LIGHT RELOCATION

1.0 DESCRIPTION

This item shall include all elements of work covered by the referenced NCDOT Specifications and the numbered Additional City Specifications provided herein.

NCDOT Specifications

NA

Additional City Specifications

1. Relocate Decorative Light: includes but is not limited to removing, protecting and installing a private decorative lighting unit at the location directed by the Owner/Engineer.
 - a. Remove the existing private decorative lighting unit, without damaging the light or wiring, prior to grading the adjacent ditches.
 - b. Install the lighting unit, with an in-kind foundation, at a location directed by the Owner/Engineer that is out of the grading limits. If the installation cannot occur immediately after removal, the lighting unit shall be protected and stored in a location on site to prevent damage to the system.

2.0 MEASUREMENT

Relocate Decorative Light will be measured and paid as the actual number relocated. Price and payment shall be full compensation for all work covered by this section including, but is not limited to, furnishing all labor, tools, equipment, materials and incidentals, excavation, construction and finished grading.

3.0 PAYMENT

Payment will be made under:

RELOCATE DECORATIVE LIGHT EA

BID PROPOSAL FORM

OWNER: Town of Rolesville
502 Southtown Circle
Rolesville, NC 7571

PROJECT: Rolesville Town Hall Renovations

Bidder's Interest: The undersigned, as Bidder, hereby declares that only the person or persons interested in this proposal as principal or principals is or are named herein and that no other person than herein mentioned has any interest in this proposal or in the contract to be entered into; that this proposal is made without connection with any person, company or parties making a bid or proposal. In all respects bidder's proposal is made fairly and in good faith without collusion or fraud.

Knowledge of Local Conditions and Contract Documents: The bidder further declares that he has examined the sites of proposed work and informed himself fully in regard to all conditions relating to the place where the work is to be done. Further, bidder declares he has examined drawings, specifications, and contract documents relative to the work and has read all provisions prior to opening of bids and has satisfied himself relative to work to be performed.

Stipulated Amount: Bidder hereby proposes and agrees if this proposal is accepted to contract with the Town of Rolesville in the form of agreement specified, and to furnish all materials, equipment, machinery, tools, apparatus, means of transportation, services, and labor necessary to complete the Base Bid work for construction this Project.

Owner's Rights Reserved: Undersigned understands the Owner reserves the right to reject any and all proposals or to waive any formality or technicality in any proposal in the interest of the owner.

Additional work: Bidder agrees to perform additional work which may be required to complete the work upon execution by both parties of a proper Change Order. Bidder is not to commence any additional work prior to approval and execution of such Change Orders.

Contract Time: Upon award of contract, Undersigned agrees to fully complete all work prior to schedule, as specified in the Contract Documents.

Addenda: Undersigned hereby acknowledges receipt of the following addenda to the bidding documents:

Addendum Number	Date	Received
_____	_____	_____
_____	_____	_____

Bidder will complete work in full and complete accordance with specifications and contract documents to the full and entire satisfaction of the Town of Rolesville with understanding that no money will be allowed for extra work except as set forth in the General Conditions of the Contract Documents. Bidder will complete the work for the amounts listed hereafter.

CONSTRUCTION CONTRACT – UNIT PRICES

LINE ITEM	SECTION NO.	DESCRIPTION	QUANTITY	UNIT	UNIT PRICE	AMOUNT (Qty x Unit Price)
1	800	MOBILIZATION	1.00	LS	\$	\$
2	801	CONSTRUCTION SURVEYING	1.00	LS	\$	\$
3	200	SELECT TREE REMOVAL	2.00	EA	\$	\$
4	SP-01	TRAFFIC CONTROL	1.00	LS	\$	\$
5	340	PIPE REMOVAL	115.00	LF	\$	\$
6	607	MILLED ASPHALT PAVEMENT 1.5 INCH DEPTH	3,935.00	SY	\$	\$
7	848	4 INCH CONCRETE SIDEWALK	45.00	SY	\$	\$
8	848	CONCRETE CURB RAMP	2.00	EA	\$	\$
9	848	6 INCH CONCRETE DRIVEWAY	40.00	SY	\$	\$
10	545	INCIDENTAL STONE BASE (DRIVEWAYS)	70.00	TON	\$	\$
11	225	UNCLASSIFIED EXCAVATION	1,785.00	CY	\$	\$
12	226	GRADING	1.00	LS	\$	\$
13	SP-02	EROSION AND SEDIMENT CONTROL	1.00	LS	\$	\$
14	SP-03	TREE PROTECTION	150.00	LF	\$	\$
15	520	AGGREGATE BASE COURSE	400.00	TON	\$	\$
16	610	ASPHALT CONCRETE BASE COURSE, TYPE B25.0C	40.00	TON	\$	\$
17	610	ASPHALT CONCRETE BASE COURSE, TYPE I19.0C	320.00	TON	\$	\$
18	610	ASPHALT CONCRETE BASE COURSE, TYPE S9.5C	610.00	TON	\$	\$
19	620	ASPHALT BINDER FOR PLANT MIX	36.00	TON	\$	\$
20	1205	PAINT PAVEMENT MARKING LINES, 4"	10,745.00	LF	\$	\$
21	1205	PAINT PAVEMENT MARKING SYMBOL	10.00	EA	\$	\$
22	846	30 INCH CONCRETE CURB AND GUTTER	60.00	LF	\$	\$
23	848	ADJUSTMENT OF METER BOXES OR VALVE BOXES	6.00	EA	\$	\$

LINE ITEM	SECTION NO.	DESCRIPTION	QUANTITY	UNIT	UNIT PRICE	AMOUNT (Qty x Unit Price)
24	SP-04	6 INCH WATERMAIN RELOCATION	1.00	EA	\$	\$
25	SP-04	8 INCH WATERMAIN RELOCATION	1.00	EA	\$	\$
26	SP-04	12 INCH WATERMAIN RELOCATION	1.00	EA	\$	\$
27	310	15 INCH PIPE END SECTION, PRECAST FLARED END	9.00	EA	\$	\$
28	310	24 INCH PIPE END SECTION, PRECAST FLARED END	1.00	EA	\$	\$
29	310	15 INCH R.C. PIPE CULVERTS, CLASS IV	230.00	LF	\$	\$
30	310	24 INCH R.C. PIPE CULVERTS, CLASS IV	60.00	LF	\$	\$
31	840	DRAINAGE STRUCTURE	2.00	EA	\$	\$
32	851	RIP RAP, CLASS B	25.00	TON	\$	\$
33	851	GEOTEXTILE FOR DRAINAGE	80.00	SY	\$	\$
34	901	CONTRACTOR FURNISHED, TYPE E SIGN	1.00	EA	\$	\$
35	SP-05	CONTRACTOR FURNISHED, STREET NAME BLADE SIGN	1.00	EA	\$	\$
36	SP-05	SIGN RELOCATION	2.00	EA	\$	\$
37	SP-06	TEMPORARY MAILBOXES	6.00	EA	\$	\$
38	SP-06	MAILBOX RELOCATION	6.00	EA	\$	\$
39	SP-07	RELOCATED DECORATIVE LIGHT	1.00	EA	\$	\$

A. Base Bid: \$ _____

B. Owner's Contingency: \$ _____ \$30,000.00

C. Total Base Bid: \$ _____

The undersigned has enclosed the following with this Proposal:

_____ Bid Bond or Bid Deposit
 _____ Listing of Good Faith Efforts
 _____ Identification of Subcontractor Participation

Proposal respectfully submitted this _____ day of _____, 20____.

(Firm or Corporation Name Making Bid)

Witness:

By: _____

By: _____
(proprietorship or partnership)

Title: _____
(owner, partner, corporate president, or vp)

Attest:

Address: _____

By: _____

NC License No: _____

Title _____
(corporate secretary or assistant secretary)

(Corporate Seal)

Identification of HUB Certified/ Minority Business Participation

I, _____
(Name of Bidder)

do hereby certify that on this project, we will use the following HUB Certified/ minority business as construction subcontractors, vendors, suppliers or providers of professional services.

Firm Name, Address and Phone #

Work Type

*Minority
Category

****HUB
Certified
(Y/N)**

[illegible]

*Minority categories: Black, African American (**B**), Hispanic (**H**), Asian American (**A**) American Indian (**I**), Female (**F**) Socially and Economically Disadvantaged (**D**)

**** HUB Certification with the state HUB Office required to be counted toward state participation goals.**

The total value of minority business contracting will be (\$)_____.

State of North Carolina AFFIDAVIT A – Listing of Good Faith Efforts

County of _____

(Name of Bidder)

Affidavit of _____

I have made a good faith effort to comply under the following areas checked:

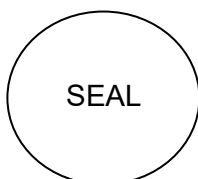
Bidders must earn at least 50 points from the good faith efforts listed for their bid to be considered responsive. (1 NC Administrative Code 30 I.0101)

- ☐ **1 – (10 pts)** Contacted minority businesses that reasonably could have been expected to submit a quote and that were known to the contractor, or available on State or local government maintained lists, at least 10 days before the bid date and notified them of the nature and scope of the work to be performed.
- ☐ **2 --(10 pts)** Made the construction plans, specifications and requirements available for review by prospective minority businesses, or providing these documents to them at least 10 days before the bids are due.
- ☐ **3 – (15 pts)** Broken down or combined elements of work into economically feasible units to facilitate minority participation.
- ☐ **4 – (10 pts)** Worked with minority trade, community, or contractor organizations identified by the Office of Historically Underutilized Businesses and included in the bid documents that provide assistance in recruitment of minority businesses.
- ☐ **5 – (10 pts)** Attended prebid meetings scheduled by the public owner.
- ☐ **6 – (20 pts)** Provided assistance in getting required bonding or insurance or provided alternatives to bonding or insurance for subcontractors.
- ☐ **7 – (15 pts)** Negotiated in good faith with interested minority businesses and did not reject them as unqualified without sound reasons based on their capabilities. Any rejection of a minority business based on lack of qualification should have the reasons documented in writing.
- ☐ **8 – (25 pts)** Provided assistance to an otherwise qualified minority business in need of equipment, loan capital, lines of credit, or joint pay agreements to secure loans, supplies, or letters of credit, including waiving credit that is ordinarily required. Assisted minority businesses in obtaining the same unit pricing with the bidder's suppliers in order to help minority businesses in establishing credit.
- ☐ **9 – (20 pts)** Negotiated joint venture and partnership arrangements with minority businesses in order to increase opportunities for minority business participation on a public construction or repair project when possible.
- ☐ **10 - (20 pts)** Provided quick pay agreements and policies to enable minority contractors and suppliers to meet cash-flow demands.

The undersigned, if apparent low bidder, will enter into a formal agreement with the firms listed in the Identification of Minority Business Participation schedule conditional upon scope of contract to be executed with the Owner. Substitution of contractors must be in accordance with GS143-128.2(d) Failure to abide by this statutory provision will constitute a breach of the contract.

The undersigned hereby certifies that he or she has read the terms of the minority business commitment and is authorized to bind the bidder to the commitment herein set forth.

Date: _____ Name of Authorized Officer: _____
 Signature: _____
 Title: _____



State of _____, County of _____
 Subscribed and sworn to before me this _____ day of _____ 20____
 Notary Public _____
 My commission expires _____

**State of North Carolina --AFFIDAVIT B-- Intent to Perform Contract
with Own Workforce.**

County of _____

Affidavit of _____

(Name of Bidder)

I hereby certify that it is our intent to perform 100% of the work required for the _____

_____ contract.

(Name of Project)

In making this certification, the Bidder states that the Bidder does not customarily subcontract elements of this type project, and normally performs and has the capability to perform and will perform all elements of the work on this project with his/her own current work forces; and

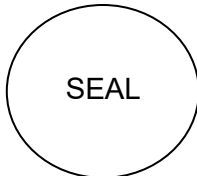
The Bidder agrees to provide any additional information or documentation requested by the owner in support of the above statement. The Bidder agrees to make a Good Faith Effort to utilize minority suppliers where possible.

The undersigned hereby certifies that he or she has read this certification and is authorized to bind the Bidder to the commitments herein contained.

Date: _____ Name of Authorized Officer: _____

Signature: _____

Title: _____



State of _____, County of _____

Subscribed and sworn to before me this _____ day of _____ 20____

Notary Public _____

My commission expires _____