



DEPOT DRIVE CONSTRUCTION

**INVITATION TO BID
20-07-207897**

FEBRUARY 24, 2020

**ALASKA RAILROAD CORPORATION
327 WEST SHIP CREEK AVENUE
ANCHORAGE, ALASKA 99501**

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ALASKA RAILROAD CORPORATION
327 W. Ship Creek Avenue
Anchorage, AK 99501
Phone 907-265-2355
Fax 907-265-2439
BatesT@akrr.com

February 24, 2020

**INVITATION TO BID
20-20-207897**

DEPOT DRIVE CONSTRUCTION

Response Required: This page must be completed and returned ensuring receipt of future addenda or additional information. Please email this form to BatesT@akrr.com, or fax to (907) 265-2439. All addenda will be forwarded to the contact name and number listed below.

Firms that have not returned this cover sheet will not be informed of addendums and will only be alerted to addendums by checking with the ARRC procurement officer or by checking ARRC's internet site: www.alaskarailroad.com, select Suppliers and then Invitation to Bids. Bidders must acknowledge the receipt of all issued addendums in their proposal/bid submittal.

Company _____

Address _____

Contact _____

Phone _____ Fax _____

Email _____

Please direct all responses and/or questions concerning this ITB to Tim Bates, Alaska Railroad Corporation, Contracts, 327 Ship Creek Avenue, Second Floor, Anchorage, AK 99501, telephone number 907-265-2355, fax number 907-265-2439 or at email address BatesT@akrr.com.

www.AlaskaRailroad.com

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THIS IS NOT AN ORDER INVITATION TO BID NUMBER: 20-20-207897
DATE OF INVITATION TO BID: February 24, 2020

INVITATION TO BID
ALASKA RAILROAD CORPORATION
CONTRACTS SECTION
POST OFFICE BOX 107500
ANCHORAGE, ALASKA 99510-7500
ATTENTION: TIM BATES (907) 265-2355
FAX NUMBER (907) 265-2439
BatesT@akrr.com

ALASKA RAILROAD CORPORATION DEPOT DRIVE CONSTRUCTION

SEALED BIDS WILL BE RECEIVED **UNTIL 3:00 PM LOCAL TIME ON THURSDAY, MARCH 17, 2020** AT WHICH TIME BIDS WILL BE PUBLICLY OPENED:

Alaska Railroad Corporation
Attn. Tim Bates, 2nd Floor
327 W. Ship Creek Avenue
Anchorage, Alaska 99501

IMPORTANT

Pre-Bid Conference and /Site Visit: A pre-bid conference and site visit will be held on **March 3, 2020 at 10:00 AM** local time. Interested bidders will meet at the Alaska Railroad Historic Depot Lobby, 411 W. 1st Ave, Anchorage, AK. Please dress appropriately for weather and safety; high-vis vests and steel toe boots. This is not a mandatory meeting, although interested firms are encouraged to participate. A bidder's failure to attend the pre-bid conference will in no way relieve the bidder of the responsibility of performing the work in strict compliance with the true intent and meaning of the terms, conditions and specifications of this ITB.

Your bid package (qualifications and bids) must be complete. See instructions and conditions enclosed. Return bid packages in sealed envelopes according to the instructions in 20-20-207897. Bids received by facsimile transmission will not be considered for award. Bids shall be submitted on the forms furnished herein. Hand-delivered bids, amendments, or withdrawals must be received by ARRC's Contracts Section prior to the date and time listed above.

ARRC reserves the right to reject any and all bids, or any part thereof, negotiate changes in bids, accept any bids or any part thereof, waive minor informalities or defects in any bids, and not to award the proposed contract if it is in the best interest of the ARRC. Any resulting contract from this Invitation to Bid shall incorporate the Standard Instructions, and General Terms and Conditions incorporated in this Invitation to Bid.

This Invitation to Bid is not to be construed as a commitment of any kind nor does it commit the ARRC to pay for any costs incurred in the submission of an offer or for any other incurred cost prior to the execution of a formal contract

Bidder/contractor imposed terms and conditions which conflict with this Invitation to Bid terms and conditions are considered counter offers and, as such, will cause the Alaska Railroad Corporation to consider the bid non-responsive. PROSPECTIVE BIDDERS ARE CAUTIONED TO PAY PARTICULAR ATTENTION TO THIS CLAUSE.

ARRC Disadvantaged Business Enterprise (DBE) Program: ARRC is an equal opportunity corporation that encourages the participation of DBEs as prime contractors and subcontractors on its contracts funded in whole or in part by the Federal Transit Administration (FTA) or the Federal Highway Administration (FHWA). The ARRC has a race neutral DBE Program and does not set DBE goals on individual solicitations. Nonetheless, the ARRC aspires to achieve an overall DBE participation on federal contracts of 3.0 % in FY 2019-2021. If this contract is funded in whole or in part by funds from the FTA or the FHWA, it is imperative that you consult the Federal Terms and Conditions portion of this solicitation.



The Alaska Railroad is a member of Green Star (www.greenstarinc.org). ARRC earned an initial Green Star Award in 1994 and a Green Star Air Quality Award in 2007. The Alaska Railroad considers Green Star membership to be a positive business attribute, and regards a Green Star award as a tangible sign of an organization's commitment to environmental stewardship and continual improvement within its operations.

Please direct all responses and/or questions concerning this ITB to Tim Bates, Alaska Railroad Corporation, Contracts, 327 Ship Creek Avenue, Second Floor, Anchorage, AK 99501, telephone number 907-265-2355, fax number 907-265-2439 or at email address BatesT@akrr.com.

Sincerely,

Tim Bates

Tim Bates
Contract Administrator

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APPENDIX F	SUPPLEMENTAL CONDITIONS
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APPENDIX H	COST SCHEDULE

ATTACHMENTS:

1. M.A.S.S. SECTION III – Special Sign Shop Drawings (3 pages)
2. M.A.S.S. SECTION IV – Traffic Control Plan (1 page)
3. M.A.S.S. SECTION V – Geotechnical Report (239 pages)
4. M.A.S.S. SECTION VI – Depot Drive Final Plans (42 pages)
5. ML&P ELECTRICAL FACILITY CLEARANCE REQUIREMENTS (13 pages)
6. Enstar Excavation Safety for Natural Gas Pipeline (6 pages)
7. PAMPHLET 600 - Issue 39, Effective September 1, 2019

APPENDIX A

REQUIRED DOCUMENTS

REQUIRED FOR PROPOSAL/BID Bids will not be considered if the following documents are not completely filled out and submitted at the time of bidding.

1. Contractor Responsibility Questionnaire - [Form 395-0136]
2. Construction Bid Form - [Form 395-0121]
3. Bid Bond - [Form 395-0120]
4. Cost Schedule - Appendix H
5. Alaska Contractors License

REQUIRED AFTER NOTICE OF AWARD The successful proposer is required to complete and submit the following documents within **five (5) working days** after receipt of written notification:

1. Subcontractor List - [Form 395-0131]

REQUIRED FOR AWARD In order to be awarded the contract, the successful bidder must completely fill out and submit the following documents within the time specified in the intent to award letter:

1. Certificate of Insurance - [from Insurance Carrier]
2. Payment Bond - [Form 395-0126]
3. Performance Bond - [Form 395-0127]
4. Alaska Business Licenses
5. State of Alaska Department of Labor Notice of Work
6. Construction Contract - [Form 395-0122]; Notice to Proceed (from ARRC)
7. Construction Quality Control (CQC) Plan
8. Contractor's Site Health & Safety Plan

POST AWARD DOCUMENTATION

1. Weekly Certified Payrolls
2. Copy of State of Alaska Contractor Letter of Completion

APPENDIX B

BIDDERS INSTRUCTIONS & SPECIAL REQUIREMENTS (CONSTRUCTION)

To be considered for award, Bids must be made in accordance with the following requirements:

Duty to Seek Clarification: ARRC shall not be held responsible for a Bidder's lack of understanding of what is required by the Invitation to Bid. Should a Bidder not understand any aspect of the Invitation to Bid, or require further explanation or clarification regarding the intent or requirements of the same, it shall be the responsibility of the Bidder to seek clarification from ARRC prior to submitting his or her Bid.

Terms and Conditions: Any resulting contract from this Invitation to Bid shall incorporate the general terms and conditions contained in this bid package.

Contract Documents: Bidders shall familiarize themselves with the requirements of all of the Contract Documents which include, but are not limited to the "Bidders Instructions & Special Requirements", the Invitation to Bid, Bid and Contract Forms, General Conditions, Special Conditions, Specifications, Drawings, any Addenda issued prior to the receipt of Bids, and any other documents referenced or incorporated therein.

Examination and Interpretation of Documents: Each Bidder shall examine the Contract Documents carefully and shall make written requests to ARRC prior to Bid submission for interpretation or correction of any ambiguity, inconsistency, discrepancy, omission, or error therein which the bidder may discover. Any interpretation or correction will be issued in an Addendum by ARRC. Only a written interpretation or correction shall be binding. No Bidder shall rely on any interpretation or correction given by any other method.

Addenda: ARRC may modify the Invitation to Bid prior to the date fixed for opening of Bids by issuance of an Addendum to all parties who have been furnished the Bid Package for bidding purposes. Bidders must acknowledge receipt of all Addenda on the Construction Bid Form [Form 395-0121].

Qualification of Bidders: Pursuant to ARRC Procurement Rule 1600.3, before a Bid is considered for award, ARRC may request a Bidder to submit information regarding the Bidder's capability in all respects to fully perform the contract requirements or the individual integrity and reliability which will assure good faith performance. Such information shall include the Bidder's prior experience in performing comparable Work, the availability of necessary financing, equipment, facilities, expertise and personnel to perform the Work and whether he or she has ever been terminated or defaulted on construction work.

Bid Forms: Bids must be submitted on the forms provided by ARRC, completed in all respects as required by the Bid Forms and other Contract Documents and manually signed by an authorized official of the Bidder. Bidders may make copies of the Bid Forms for submission of Bids.

Submission of Bids: Bids must be sealed, marked, and addressed as directed in the Invitation to Bid and must be delivered to the office designated in the Invitation to Bid prior to the exact time set for opening bids. Late bids will not be considered.

Modification, Correction, Withdrawal of Bids: Modification, correction or withdrawal of Bids will be allowed only as provided in ARRC Procurement Rule 1200.8.

Bid Opening: Bids will be opened in public at the time set forth in the Invitation to Bid in accordance with ARRC Procurement Rule 1200.6. The contents of the Bids will be open for public inspection after the notice of intent to award a contract is given.

Evaluation of Bids: Bids will be evaluated in accordance with the provisions of ARRC Procurement Rule 1200.7. Alternative bids, if called for, are intended to provide ARRC a range of comparative costs which will allow identification of the combinations most responsive to ARRC's need. The order in which the alternatives are listed or set out in the Invitation to Bid should not be taken as any indication as to the order in which ARRC may elect to select the alternatives, if any. Bidders shall submit bid prices for all alternatives stated in the Invitation to Bid and are advised that the order in which the alternatives, if any, are chosen by ARRC, may affect which Bidder is the lowest responsive and responsible Bidder.

Bid Security: In accordance with ARRC Procurement Rule 1200.4, all Bids shall be accompanied by bid security in the form of a cashier's check or an acceptable Bid Bond, a form of which is provided herein, in the amount of five percent (5%) of the Bid price.

Rejection of Bids: ARRC reserves the right to waive minor defects or informalities in a Bid in accordance with the provisions of ARRC Procurement Rule 1200.8, or to reject any or all Bids in accordance with the provisions of ARRC Procurement Rule 1600.2.

Award of Contract: Unless the Invitation to Bid is canceled or all bids are rejected, the procurement officer shall award a contract based on the solicited bids with reasonable promptness by written notice to the lowest, responsible and responsive Bidder whose bid conforms in all material respects to the requirements and criteria set out in the Invitation to Bid.

Execution of Contract: A written contract must be signed by the Bidder to whom an award is made and returned to ARRC within ten (10) calendar days, together with all required performance and payment bonds, and certificate(s) of insurance in the amounts required by the Invitation to Bid. The Bidder to whom award is made shall not be permitted to occupy the project site until he has first obtained the required insurance and

submitted to ARRC proof of such insurance together with a statement certifying that said insurance conforms to requirements set forth in the Invitation to Bid.

Failure to Execute Contract: If the Bidder to whom the Contract is awarded refuses or neglects to execute it, or fails to furnish the required bonds and insurance within the time specified, the amount of his bid security may be retained by ARRC as liquidated damages.

Government Contract Requirements: If Federal funds will be used to pay for any part of the project described in the Invitation to Bid, any contract awarded hereunder will contain provisions requiring the successful Bidder to comply with all pertinent provisions, agreements, and clauses of the subject federal grant and all pertinent laws, regulations, Presidential directives, and executive orders to the extent they apply to the subject matter of the contract.

Drug and Alcohol-Free Workplace: Safety is paramount at ARRC. For that reason, ARRC maintains an alcohol and drug-free workplace and requires that the Contractor do the same. At all times during the performance of this contract, the Contractor shall have in place a written drug and alcohol program that includes, at a minimum, the following:

- a. a requirement that all applicants present a negative pre-employment drug screen prior to being hired by the Contractor;
- b. a requirement that employees submit to a "reasonable suspicion" drug and/or alcohol test when showing signs and symptoms of drug and/or alcohol influence on duty;
- c. a requirement that employees submit to "reasonable cause/post-accident" drug and alcohol tests following certain accidents or incidents (with the threshold level triggering testing to be determined by the Contractor);
- d. a provision defining a positive alcohol test as one that reveals a breath alcohol level of .02 or greater;
- e. a provision defining a positive drug test as one that reveals concentrations at the levels set forth in 49 C.F.R. § 40.87(b)(screening test) and 49 C.F.R. § 40.87(c)(confirmatory test) or greater;
- f. a provision that outlines the consequences of a positive drug or alcohol test and the consequences of an employee's refusal to submit to drug/alcohol testing; and
- g. a provision that establishes the conditions under which an employee may return to work following a positive drug and/or alcohol test, which at a minimum include an evaluation by a substance abuse professional and compliance with a recommended treatment program.

The Contractor agrees that at any time during the performance of this contract, if an ARRC employee reports to the Contractor that an employee of the Contractor or its subcontractor is showing signs and symptoms of drug/alcohol influence on duty, the Contractor shall remove the employee from ARRC property immediately and shall have the employee tested for drug/alcohol influence. If the employee tests positive, the Contractor shall ensure that the employee is not returned to work on the project until he/she has met the return to work requirements contained in the Contractor's written program.

Offer Acceptance Period: For the purpose of award, offers made in accordance with this ITB shall be good and firm for a period of thirty (30) days from the date of bid opening.

Site-Safety Plan Requirement: Before the contractor or any subcontractor begins any construction related work under this contract including but not limited to mobilization, equipment setup, storage, etc., taking place on sites under Alaska Railroad Corporation (ARRC) control, they will submit a site Health and Safety Plan to ARRC for compatibility acceptance.

The plan must be compatible with ARRC Safety Policies, including On-Track Safety, ARRC on-site employee safety including safety for Project Managers, Construction Managers, Flaggers, Visitors, Safety personnel, Quality Assurance staff, vendors, and the public. The plan must outline procedures for first aid, emergency response, chemical exposures, spills, site sign-in requirements for site-safety briefings, coordination with ARRC dispatch, Section 6.16 (SAFETY AND PROTECTION), Section 6.17 (WORK SAFETY ON RAILROAD PROPERTY), and Section 6.18 (EMERGENCIES), other sections of the contract GENERAL CONDITIONS, Appendix E.

A complete, detailed Site-Safety Plan shall be submitted to the Project Manager at least 10 days prior to commencement of any Work on the Project

Contractor's Instructions for Submitting Certified Payroll:

This contract includes work on an Alaska Railroad Corporation (ARRC) construction project, which is subject to the wage/certified payroll requirements of the Alaska Department of Labor Workforce Development (DOLWD) and/or it may include work on a federally funded construction project and be subject to U. S. Department of Labor Davis-Bacon Act wage/certified payroll requirements.

As part of the contract the following will be required:

1. All contractors on a construction project funded in whole or in part with federal funds shall pay laborers and mechanics the higher of the two wages listed in this contract from the U. S. Department of Labor (www.access.gpo.gov/davisbacon/ or <http://www.gpo.gov/davisbacon/ak.html>) or from the DOLWD (www.labor.state.ak.us/lss/home.htm). Contractors on an ARRC-funded construction project shall pay laborers and mechanics the appropriate wage established by the DOLWD under the Little Davis Bacon Act.

2. All contractors employing laborers and mechanics on the project for must submit weekly certified payrolls that contain the information listed on the DOLWD Weekly Certified Payroll Form 07-6058, pages 1 and 2. Page 2 is the “Statement of Compliance” and must bear an original signature. The prime contractor is responsible for gathering the certified payrolls from each subcontractor and for submitting them, along with their own, to ARRC.
3. These weekly certified payrolls must be sent to ARRC within seven days after the regular “payday” for that certified payroll at the following address:

Alaska Railroad Corporation
Attn: Certified Payroll Clerk
P.O. Box 107500
Anchorage, AK 99510-7500
Email: certifiedpayrollprocessor@akrr.com

The contractor and its subcontractors are also responsible for filing certified payrolls with DOLWD as required.

4. The certified payroll must be completely filled out by the contractor including, but not limited to:
 - i. **Contractor’s complete name**, including joint ventures, Inc., LLC, etc.
 - ii. **Contractor’s license number**, also called the contractor’s registration number, is required in addition to a business license to do construction work in the state
 - iii. **Employee’s**
 - a. Name
 - b. Address (domicile and mailing)
 - c. Social security number
 - d. Job classification
 - e. Hours worked
 - f. Wages/fringe benefits paid
 - iv. **Contracting agency project number**, which is the ARRC contract/purchase order number and is listed on the DOLWD finalized Notice of Work. This notice also lists the **DOLWD project number, project name, and location**. The prime contractor will supply all of this information to its subcontractors.
 - v. **Week ending date and payroll numbers**. The first week or part of a week of payroll will be designated as payroll number 1 for the first week, 2 for the second week, etc. until the final week worked on the project. If no work is completed during a given week, the contractor must nonetheless submit a certified payroll for that week, with the

appropriate consecutive payroll number for that week, and write “No Work Performed” on payroll.

- vi. The **Statement of Compliance** must be completely filled out indicating how fringe benefits are paid and listing the payroll period. The Statement of Compliance must be signed, dated, and filed within seven days of the payment date of the payroll.
- vii. **Stamp or write “Confidential”** on the certified payroll to help insure the privacy of contractor employees.

Sample copies of DOLWD certified payroll forms with the “Statement of Compliance is shown in Figures 1 and 2 below.

Failure to timely submit complete and accurately filled out weekly certified payrolls to ARRC may result in the delay of payment on the contract.

STATEMENT OF COMPLIANCE

CERTIFIED PAYROLL FORM 07-6058

Contractors & Subcontractors Please Note!!!

SSN MUST be listed for each employee on payroll

8 AAC 30.020 CERTIFIED PAYROLL. (a) All Contractors (including owners/operators) who perform work on a public construction contract for the state or political subdivision of the state shall file with the Department a certified payroll (Form 07-6058) before Friday of each week that covers the preceding week.

(b) The certified payroll shall be submitted to the Department's regional office in which the work is performed.

Region I,
North of N63°

Labor Standards & Safety Div. DOLWD
675 7th Ave., Station J-1
Fairbanks, AK 99701-4593
(907) 451-2886 Fax: (907) 451-2885

Region II,
South of N63°

Labor Standards & Safety Div. DOLWD
3301 Eagle Street, Suite 301
Anchorage, AK 99503-4149
(907) 269-4900 Fax: (907) 269-4915

Region IIA, Southeast Alaska,
(From Yakutat south)

Labor Standards & Safety, DOLWD
P. O. Box 21149
1111 W. 8th Street, Rm 302
Juneau, AK 99801
(907) 465-4842 Fax: (907) 465-3554

In lieu of submitting Form 07-6058, contractors may submit his/her payroll form: **THE FORM MUST CONTAIN SOCIAL SECURITY NUMBERS FOR EACH EMPLOYEE.**

The contractor's payroll record must contain the same information required on this form.

Sec. 35.05.040 requires that all contractors or subcontractors who perform work on a public construction contract for the state or a political subdivision of the state shall, **BEFORE**

FRIDAY OF EACH WEEK, file with the Department of Labor and Workforce Development (DOLWD), a sworn affidavit for the previous week, setting out in detail the

number of workers employed, wages paid each week, job classification of each employee, hours worked each day and week, and other information which the DOLWD requires

CONTRACTORS WHO DISREGARD THEIR OBLIGATIONS TO THEIR EMPLOYEES, INCLUDING PAYMENT OF THE APPROPRIATE PREVAILING RATES OF PAY, UNCONDITIONAL PAYMENT.

AND PAYMENT NOT LESS THAN ONCE A WEEK MAY BE DEBARRED FROM PUBLIC CONSTRUCTION.

Date: 22-Dec-04

(2) Alaska Strong Steel, Inc.
(Contractor / Subcontractor)

I, Jane Doe, President do hereby state
(Name of Signatory Party) (Title)
(1) That I pay or supervise the payment of persons employed by
Alaska Strong Steel, Inc. on the
(Contractor / Subcontractor)

Gold Creek Bridge Project; that during the payroll
(Building or Work)

period commencing on 12-Dec-04, and ending on
(date)

18-Dec-04, all persons employed on said project have
(date)

been paid full weekly wages earned, that no rebates have
been or will be made either directly or indirectly to or on behalf of
said

Alaska Strong Steel, Inc.
(Contractor / Subcontractor)

from the full weekly wages earned by an person, and that no
deductions have been made either directly or indirectly from the
full wages earned by any person, other than permissible
deductions, on projects covered by Alaska Statute 36 as defined
in regulations issued by the Commissioner of Labor, or on Federal
Projects as defined in Regulations, Part 3 (29 CFR Subtitle A),
issued by the Secretary of Labor under the Copeland Act, as
amended (48 Stat. 948; 63 Stat. 108; 72 Stat. 967; 76 Stat. 357;
40 USC 276 (c), and described below:

and;

(c) Each laborer, mechanic or field surveyor listed on
this payroll has been paid, as indicated on the payroll, an
amount not less than the sum of the applicable basic hourly
wage rate plus the amount of the required fringe benefits as
currently published by DOLWD, except as noted in Section

(d) Exceptions:

Exception (Craft)	Explanation

Remarks:

The willful falsification of any of the above information may subject the
contractor or subcontractor to civil or criminal prosecution. See Section
11091 of Title 18 and Section 231 of the United States Code. Also see AS
36.05.060.

Jane Doe
Signature (original signature required)

Jane Doe, President
Name & Title (print or type)

Figure 2 Sample Certified Payroll Statement of Compliance

APPENDIX C

DEPOT DRIVE

PHASE 1 (2020 WORK)

STATEMENT OF WORK

Background:

The Alaska Railroad (ARRC) is enhancing vehicle access and pedestrian safety by constructing a new roadway, Depot Drive designed by CRW Engineering Group. The project area is fully within the ARRC land reserve, and is located between Christensen Drive to the south, the main line track to the north, the Anchorage Historic Depot to the east and the 49th State Brewing Company facility to the west.

The project will enhance access by improving the intersection between the depot's west-end access roadway (the beginning of Depot Drive), and West 1st Avenue where it turns into Christensen Drive. The typical roadway cross section is reduced in width near the new retaining wall to provide separation from the wall and nearby railroad track.

The project will also widen the Depot Drive transportation corridor to support upgrading about 1,500 feet of the gravel access road into a paved commercial-industrial secondary street. Roadway improvements include an 8-foot wide pedestrian walkway, new street lighting and trespass mitigation involving a safety barrier and fencing.

Scope of Work:

All proposed Work is located within the Municipality of Anchorage corporate limits and is more particularly located west of the Historic Depot Building, north of 1st Avenue; see Drawings for detailed location. The Work included under this Contract consists of but is not limited to:

- Reconstructing the existing gravel roadway with a new, paved roadway including new structural section, curb and gutter, insulation, geogrid, approximately 10,800 tons of classified backfill and 880 tons of pavement
- Constructing a paved pedestrian pathway
- Installing new storm drain systems, including approximately 830 liner feet of pipe
- Replace the existing lighting infrastructure.
- Installing barriers along the active railroad operations area
- Furnishing all labor, materials, equipment, supervision, and other facilities necessary to successfully complete the Work set forth in the Contract Drawings and Specifications.

It is the responsibility of the bidder to prepare the bid so that all materials and/or fittings shall harmoniously conform to the intent of the Contract Drawings, Specifications, and Special Provisions.

Below are the schedules of Work that are presented in the Bid Proposal of this Contract:

SCHEDULE DESCRIPTION

- A. Roadway, Drainage and Storm Drain Improvements Base Bid
- B. Roadway and Drainage Improvements Additive Alternative 1

SPECIAL PROVISIONS & SPECIFICATIONS

MASTER INDEX

- I. SPECIAL PROVISIONS
- II. SUBMITTAL LIST
- III. SPECIAL DETAILS
- IV. TRAFFIC CONTROL PLAN
- V. SOILS INFORMATION
- VI. PLANS

ALASKA RAILROAD CORPORATION

**DEPOT DRIVE
PHASE 1 (2020 WORK)**

I

SPECIAL PROVISIONS

DEPOT DRIVE PHASE 1 (2020 WORK)

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DEPOT DRIVE PHASE 1 (2020 WORK)

SPECIAL PROVISIONS

SECTION 95.01 LOCATION AND SCOPE

All proposed Work is located within the Municipality of Anchorage corporate limits and is more particularly located west of the Historic Depot Building, north of 1st Avenue; see Drawings for detailed location. The Work included under this Contract consists of but is not limited to:

- Reconstructing the existing gravel roadway with a new, paved roadway including new structural section, curb and gutter, insulation, geogrid, approximately 9,300 tons of classified backfill and 860 tons of pavement
- Constructing a paved pedestrian pathway
- Installing new storm drain systems, including approximately 830 liner feet of pipe
- Replace the existing lighting infrastructure.
- Installing barriers along the active railroad operations area
- Furnishing all labor, materials, equipment, supervision, and other facilities necessary to successfully complete the Work set forth in the Contract Drawings and Specifications.

It is the responsibility of the bidder to prepare the bid so that all materials and/or fittings shall harmoniously conform to the intent of the Contract Drawings, Specifications, and Special Provisions.

Below are the schedules of Work that are presented in the Bid Proposal of this Contract:

SCHEDULE DESCRIPTION

- | | | |
|----|--|------------------------|
| A. | Roadway, Drainage and Storm Drain Improvements | Base Bid |
| B. | Roadway and Drainage Improvements | Additive Alternative 1 |

SECTION 95.02 REFERENCE TO MUNICIPALITY OF ANCHORAGE STANDARD SPECIFICATIONS

This Contract is subject to and hereby incorporates by reference the Municipality of Anchorage Standard Specifications, dated 2015, hereinafter referred to as M.A.S.S.; the Alaska Sign Design Specifications (ASDS) as adopted and amended by the Municipality; the Municipality of Anchorage Sign Manual; the Alaska Traffic Manual (ATM)-Manual on Uniform Traffic Control Devices (MUTCD) 2009 Edition, with the Alaska supplement, dated 1/13/12; the National Electrical Safety Code (NESC) as amended and adopted by the Municipality; the National Electrical Code as amended and adopted by the Municipality of Anchorage; and the Edition of the Standard Specifications for Structural Supports for Highway Sign, Luminaires and Traffic Signals provided in the appropriate divisions. When

conflicts exist between M.A.S.S. and MUTCD, the requirements of M.A.S.S. and these Special Provisions shall govern.

All applicable sections of MASS are incorporated, including but not limited to:

Division 10.00 – Standard General Provisions

Section 10.01	Definitions
Section 10.04	Scope of Work
Article 4.1	Contract Documents
Article 4.2	Interpretation of Contract, Specifications, and Drawings
Article 4.3	Submittal List
Article 4.7	Reference Stakes and Surveying
Article 4.8	Work Incidental to the Contract
Article 4.9	Disposal Sites
Article 4.10	Protection of Persons, Property, and Environment
Article 4.12	Public Convenience and Access
Article 4.13	Traffic Control Plan
Article 4.14	Maintenance and Drainage
Article 4.15	Temporary Erosion Control and Storm Water Pollution Prevention Plans for Construction
Article 4.17	Utilities
Article 4.19	Record Drawings
Article 4.20	Operating and Maintenance Manuals
Article 4.21	Ownership of Contract Documents
Section 10.05	Scope of Work
Article 5.5	Shop Drawings
Article 5.6	Product Data
Article 5.7	Materials
Article 5.12	Safeguarding of Excavations
Article 5.16	Responsibility for Damages
Article 5.17	Repair of Damages Caused by Contractor
Section 10.06	Legal Relations and Responsibilities
Article 6.1	Laws to be Observed
Article 6.6	Permits
Article 6.8	Safety

Division 20.00 – Earthwork

Section 20.01	General
Section 20.02	Storm Water Pollution Prevention Plan
Section 20.04	Clearing and Grubbing
Section 20.07	Removal of Sidewalk and Concrete Apron
Section 20.08	Removal of Curb and Gutter
Section 20.09	Removal of Pavement
Section 20.10	Excavation for Traffic Ways
Section 20.11	Grading Existing Surfaces
Section 20.13	Trench Excavation and Backfill
Section 20.16	Furnish Bedding Material
Section 20.21	Classified Fill and Backfill

Section 20.22	Leveling Course
Section 20.25	Geotextile Fabric
Section 20.26	Insulation
<u>Division 30.00 – Portland Cement Concrete</u>	
Section 30.01	General
Section 30.02	Portland Cement Concrete, Curb and Gutter and Valley Gutter
Section 30.03	Portland Cement Concrete Sidewalks
Section 30.04	Portland Cement Concrete Curb Ramps
Section 30.05	Structures and Retaining Walls
Section 30.10	Colored Concrete
<u>Division 40.00 – Asphalt Surfacing</u>	
Section 40.01	General
Section 40.04	Tack Coat
Section 40.06	Asphalt Concrete Pavement
<u>Division 50.00 – Sanitary Sewers</u>	
Section 55.01	General
Section 50.06	Existing manhole modifications
<u>Division 55.00 – Storm Drain Systems</u>	
Section 55.01	General
Section 55.02	Furnish and Install Pipe
Section 55.03	Subdrains
Section 55.04	Connections to Existing Manholes or Catch Basins
Section 55.05	Manholes and Catch Basin Manholes
Section 55.08	Adjust Storm Drain Manhole Ring to Finish Grade
Section 55.09	Construct Catch Basin
Section 55.11	Remove Manhole or Catch Basin
<u>Division 60.00 – Water Systems</u>	
Section 60.01	General
Section 60.03	Furnish and Install Valves
Section 60.04	Furnish and Install Fire Hydrants
<u>Division 65.00 – Construction Survey</u>	
Section 65.01	General
Section 65.02	Construction Surveying
<u>Division 70.00 – Miscellaneous</u>	
Section 70.01	General
Section 70.04	Adjust Electric/Telephone Manhole
Section 70.07	Remove Pipe
Section 70.08	Reset Fence
Section 70.10	Traffic Markings
Section 70.11	Standard Signs
Section 70.12	Traffic Maintenance
Section 70.13	Bollards
<u>Division 75.00 – Landscaping Improvements</u>	
Section 75.01	General
Section 75.02	Landscaping
Section 75.03	Topsoil

Section 75.04 Seeding

Section 75.11 Boulders

Standard Details as listed below

20-12 Class 'D' Bedding Material

20-14 Type II Classified Fill and Backfill

20-15 Type II-A Classified Fill and Backfill

20-18 Leveling Course

30-1 Curb and Gutter Cross Sections

30-10 Accessible (Type 1A/2A) Curb and Gutter Sections

30-11 Curb Ramp Clearances

50-25 Manhole Cone Adjustment

55-4 Storm Drain Manhole Type I

55-5 Storm Drain Manhole Type II

55-7 Storm Drain Manhole Cover

55-8 Storm Drain Top Intake Cover

55-9 Storm Drain Beehive Intake Cover

55-10 Manhole Heights

55-18 Manhole Ring Adjustment

55-19 Catch Basin Inlet Frame and Hood for Type 1 Curb & Gutter

55-20 Catch Basin Inlet Grates for Type 1 Curb & Gutter

55-22 Precast Catch Basin

60-8 Typical Valve Box

60-10 Single Pumper "L" Base Fire Hydrant Assembly

60-12 Fire Hydrant Guard Posts

70-6 Standard Method for Shoring Phone/Conduit ACS Approved Method

70-7 Striping Notes

70-18 Typical Curb Return with Sidewalk

70-23 Post Mounted Sign, Curb without Sidewalk

70-25 Post Mounted Sign, Curb with Sidewalk without Parkway

70-29 Sign on Round Post

70-31 Concrete Foundation for Sign Post

70-36 Steel Bollard

70-41 Fence Details

70-42 Fence Details

75-1 Shrub Planting Detail

75-3 Deciduous Tree Planting Detail

75-4 Boulder

General

All Divisions, All Sections: Delete Articles Entitled "Measurement" and "Basis of Payment" unless otherwise indicated in these special provisions and the Schedule of Values. The prices bid in the Schedule of Values shall include all materials, equipment, labor, supervision, disposal, administration, and all other incidentals necessary to complete the project in accordance with the Plans, referenced Specifications, these Special Provisions, and supplemental conditions.

All Divisions, All Sections: All references to “Municipality of Anchorage” shall mean “Owner.”

All Divisions, All Sections: References to construction within a Public Right-of-Way shall also include the construction areas as indicated on the drawings.

All Divisions, All Sections: All staking or surveys that are noted to be completed by the “Owner” or the “Engineer” shall be completed by the Contractor.

SECTION 95.03 TIME OF COMPLETION

This Project shall be completed no later than October 1st, 2020. An NTP is anticipated mid to end of April, 2020.

SECTION 95.04 MODIFICATIONS AND/OR ADDITIONS TO MUNICIPALITY OF ANCHORAGE STANDARD SPECIFICATIONS

The following listed provisions of M.A.S.S. are amended as hereinafter stated:

A. DIVISION 10 STANDARD GENERAL PROVISIONS

Add the following Section:

SECTION 10.00 ALL APPLICABLE M.A.S.S. ARTICLES

Delete all references to and requirements for compliance with Anchorage Municipal Code Chapter 7.60 the Disadvantaged/Women Owned Business (DBE/WBE) program and specifications.

SECTION 10.01 DEFINITIONS

Add the following item to the list of definitions:

BMP – Best Management Practices

FHWA - Federal Highway Administration

ML&P – Municipal Light and Power

NPDES – National Pollutant Discharge Elimination System

Record Drawings – Detailed drawings which accurately depict all changes in location (both horizontal and vertical), material, equipment, and other elements of Work accomplished by Contractor. The drawings shall also depict the horizontal and vertical locations of all other utilities and obstructions encountered during construction. Final elevations and locations shall be clearly marked with actual dimensions, or existing dimensions shall be noted with “ASB” if no changes occur.

UL – Underwriters Laboratories, Inc.

SECTION 10.04 SCOPE OF WORK

Article 4.8 Work Incidental to the Contract

Add the following items which shall be incidental to the cost of the Contract:

14. Asphalt for tack coat.
15. Sawcutting, unless otherwise noted to be paid for.
16. Repair of existing infrastructure or areas outside of demolition limits that are damaged by Contractor.
17. Furnishing and installing grounding conductors, ground rods, and ground rod clamps.
18. Installation of flexible delineators at the end of culverts, ends of retaining walls, field inlets, and other locations that may be hazardous or should be delineated for snow removal operations as determined by the Owner's Representative.
19. Removal and/or abandonment of soil boring caps, borings and piezometer tubes.
20. Remove and salvage existing signs.
21. Removal and disposal or replacement of private improvements within construction limits unless Pay Item is specifically identified on the Drawings
22. MOA Building Safety and Inspection permit fees
23. Removal and disposal of any encountered, abandoned underground utility.
24. All materials, equipment, labor, supervision, disposal, administration, and all other incidentals necessary to complete the project in accordance with the Plans, referenced Specifications, these Special Provisions, and supplemental conditions.

Article 4.17 Utilities

Add the following sentence to the end of the seventh paragraph:

Utilities are the responsibility of the Contractor to request locates, coordinate with the Work, maintain, and protect. Contractor is responsible to coordinate, submit all required items, perform all associated work, and pay any and all relocation or watch fees when utility companies perform relocation or watch services of their respective infrastructure, to include but not limited to: adjustment of fire hydrant to finish grade (AWWU), ML&P owned lines and infrastructure, and ARRC owned lines and infrastructure.

Add the following paragraph:

Underground utilities shall be continuously supported during backfill placement and compaction. Geotextile shall be separated from nearby utilities with a minimum of 1 foot of backfill material to prevent undue stress during the compaction and settlement process.

C. Gas

Add the following paragraph:

The Contractor shall download and follow the most current construction guidelines published by ENSTAR. Those guidelines can be downloaded from:

<https://www.enstarnaturalgas.com/safety-education/natural-gas-safety/safety-for-excavators-contractors/>

(Click on the link in the last sentence of the first paragraph.)

D. Electrical and Telecommunications

Add the following paragraph:

The Contractor shall download and follow the most current construction guidelines published by ML&P. Those guidelines can be downloaded from:

<https://www.mlandp.com/Outages-Safety/Contractor-Information>

Replace the list of utility companies after Article E with the following:

The following contact information is provided as a courtesy to the Contractor and is the most current list available.

Alaska Communications (ACS) – Rod Reyes, 564-7028

Anchorage Water & Wastewater Utility (AWWU) – Joe Sanks, 564-2717

AT&T – Mike Barsalou, 264-7325

ENSTAR Natural Gas – Jeff Hebert 334-7756

GCI, Inc. – David Blehm, 868-6769

Municipal Light & Power (ML&P) – Lance Cluff, 263-5244

Municipal Street and Storm Drain Maintenance – Eric Hodgson, 343-8100 or 317-7059

Municipal Street Light Maintenance – Kathy Bourque Parker, 343-8242

Municipal Traffic Signals Section – Mike Sickler, 343-8335

Solid Waste Services (SWS) – Evalu Filitaula, 343-6258 or 317-6863

Alaska Waste – Josh James, 688-4446

Add the following Articles:

Article 4.22Responsibility of Contractor to Act in Emergency

In case of an emergency that threatens loss and/or injury of property and/or safety of life, the Contractor shall act, without previous instructions from the Owner’s Representative, as the situation may warrant. The Contractor shall notify the Owner’s Representative thereof immediately thereafter. Any claim for compensation by the Contractor, together with substantiating documents in regard to expense, shall be submitted to the Owner through the Owner’s Representative. The amount of compensation shall be determined by agreement.

The Contractor shall supply the Owner’s Representative, prior to commencement of Work, with an emergency telephone number through which a responsible Contractor’s representative can be contacted on a twenty-four (24) hour a day basis, seven (7) days a week.

Article 4.23Payment for Common Work Items

The following Common Work Items may be necessary for more than one Work Schedule within the project Base Bid. For these Common Work Items, all of the necessary Work for

all Schedules in the Base Bid will be considered part of Schedule A - Roadway Improvements.

MASS Section	Common Work Item
20.02	Storm Water Pollution Prevention Plan (Type 3)
20.04	Clearing and Grubbing

Article 4.24 Coordination with Other Projects in the Area

It shall be the responsibility of the Contractor to coordinate with and minimize impact to other projects in the area including, but not limited to, the following:

- Utility Relocation/Protection Work by others.
- Downtown Edge Condominium work, including installation of a sewer main within the project area. Installation of the sewer main is not anticipated to be completed until June 2020.

The Contractor shall be responsible for affirmatively coordinating with other projects in the area so as to not unreasonably interfere with the performance of the other projects.

If the Work of the Contractor is delayed or disrupted because of the construction or transportation activities of other projects in the area, the Contractor shall not be entitled to additional compensation from the Owner, but may be entitled to an extension of time.

Except with regard to a possible entitlement to an extension of time, the Contractor shall hold harmless, defend, and indemnify the Owner from and against any and all claims by the Contractor arising directly or otherwise out of the other projects in the area.

Work required to coordinate with and minimize impact to other work in the Project area shall be considered incidental to the Project.

SECTION 10.05 CONTROL OF WORK

Add the following Article:

Article 5.34 Work Plan

Contractor shall prepare a Work Plan for approval by the Owner’s Representative prior to beginning construction. The goals of the Work Plan shall include the following:

- Maintain a safe transportation corridor through the project area for vehicles and pedestrians.
- Minimize impacts to existing utilities and protect existing utilities where required.
- Minimize impacts to vehicular and pedestrian traffic.
- Minimize dust and erosion generated by Construction activities.

- Minimize overall construction noise.
- Finish the project within the time of completion requirement.

Contractor shall submit a project Work Plan for approval by the Owner's Representative within seven (7) days after signature of the Contract. Contractor shall coordinate the Work Plan with the Traffic Control Plan, Dewatering/Trench Dewatering Plan, SWPPP Plan and adhere to all permit requirements. Work shall not proceed until the Owner's Representative has approved in writing the Work Plan. The Work Plan shall include estimated dates of completion for each significant element of Work.

No separate payment shall be made for the Work described in this Article and all Work required to provide an approved Work Plan is incidental to the Contract. The Work Plan shall be updated as the work progresses.

At a minimum, the Work Plan shall include the following requirements:

- A. Disruption of driveways shall be kept to a minimum. Contractor shall provide and maintain access to all adjacent properties and side streets in accordance with M.A.S.S. 10.04.10 and 10.04.12.
- B. Contractor shall provide for emergency vehicle access at all times in accordance with M.A.S.S 10.04.10.
- C. The Contractor shall protect existing surfaces located beyond the limits of the proposed improvements identified in the demolition plan.
- D. Contractor shall provide for uninterrupted utility service to nearby businesses and shall accommodate trash collection, paper delivery and mail delivery in a manner satisfactory to the utility provider.
- E. Contractor shall provide proper notification to businesses of impending construction activities. Contractor shall provide businesses with contact name(s) and phone number(s) for Contractor personnel with responsibility to inform and coordinate with businesses. The Contractor shall give written notice to the business of any adjacent property having direct driveway or parking access to the project area, 48 hours in advance of installing curb and gutter, sidewalk, or approach aprons across the driveway, or driveways serving the adjacent property.

SECTION 10.06 LEGAL RELATIONS AND RESPONSIBILITIES

Article 6.6 Permits

Add the following paragraphs:

Contract shall obtain a Right-of-Way (ROW) permit from the Municipality of Anchorage for the purpose of constructing the proposed improvements within Municipal ROW.

The Contractor shall confine his operations to the existing right-of-way and Alaska Railroad Corporation (ARRC) property. The Contractor shall comply with all special conditions, stipulations and restrictions thereof. Prior to the start of construction, the Contractor shall verify that all permits necessary for construction of the project have been obtained. The Contractor shall have a copy of all permits on the job site at all times.

No private property within the permitting areas shall be damaged except as necessary to construct the proposed improvements and the Contractor shall repair or replace damaged property to pre-project conditions to the satisfaction of the Owner's Representative.

The payment of basic and special fees, established under Anchorage Municipal Code (AMC) AMC 24.30.100 Fees for Use of Public Places (streets and rights-of-way), and which are applicable to the Project, shall be the responsibility of the Contractor.

Permit applications that have been submitted, which the Contractor is required to pick up from the MOA Permitting Department and pay for the associated inspection fees upon submittal of additional information, include:

<u>Permit</u>	<u>Number</u>	<u>Permit Inspection Fees (Estimated)</u>
MOA Building Permit	C20-xxxx (TBD)	\$1,500.00

It will be necessary for the Contractor to prepare and obtain approval of the SWPPP in accordance with specification Section 20.02 as a condition of obtaining the building permit. Contractor may also be required to provide information specific to his operations, materials sources, haul routes, planned hours of operation, dust control measures, and other aspects of construction to the Permitting Department prior to picking up the Permit.

Contractor shall submit a copy of the approved, filed Alaska Pollutant Discharge Elimination System (APDES) Notice of Intent (NOI) to the Alaska Department of Environmental Conservation (ADEC) to the Engineer and the Owner. Upon completion of the project, Contractor shall submit a copy of the approved, filed APDES Notice of Termination (NOT) to ADEC to the Engineer and Owner.

The Contractor shall be responsible for complying with the conditions and regulations of the MOA Building Permit. This shall include arranging and paying for MOA building and electrical inspections in accordance with MOA Handouts AG.13, AG.09, and E.01. Inspections can be arranged by contacting the MOA Inspection Request Line at 343-8300.

The Contractor shall also apply for, purchase, and obtain a Noise Permit from the Municipality of Anchorage for all Work included in this Contract. The conditions of the Noise Permit shall be complied with at all times during construction. Apply for Noise Permits with the Anchorage Department of Health and Human Services at 343-4200. The application for the Noise Permit shall include 24-hour construction to cover Work performed in the evening, at night and in the early morning in case of emergency operations or modified work schedule.

The Contractor shall be solely responsible for applying for and obtaining all other necessary State, Municipality, and Utility permits and fulfilling all other requirements of MASS and the Municipal Code, pertinent to the approval and issuance of the permits. Contractor shall coordinate with utilities and pay all fees associated with all the permits, inspection, deposits, dumping, or other requirements of any agency having jurisdiction over elements of the Work. This shall be considered incidental to the project and no separate payment shall be made.

B. DIVISION 20 STANDARD CONSTRUCTION SPECIFICATIONS FOR EARTHWORK

SECTION 20.01 GENERAL

Article 1.6 Subsurface Investigation

Add the following paragraph:

The soils information for the project is located in Section V.

SECTION 20.02 STORM WATER POLLUTION PREVENTION PLAN

Article 2.10Hazardous Material Control Plan (HMCP) Requirements

Replace the first sentence of the first paragraph with the following sentences:

The contractor shall prepare a HMCP for the prevention of pollution from handling, storage, use, containment, cleanup, and disposal of hazardous material, including petroleum products related to construction activities. Detail the plan for storing these materials as well as disposing of waste petroleum products and other hazardous materials generated by the project.

Add the following to the end of the seventh paragraph:

Any spill, regardless of the size, must be reported to the Owner's Representative.

Add the following after the last paragraph:

Specify the line of authority and designate the field representative for spill response and one representative for each subcontractor. Include a copy of the inspection form to be used for weekly compliance inspections in the HMCP with a certification of compliance or remedy. The Contractor shall sign and certify compliance with this plan. Implement all measures in the HMCP and ensure that it remains current.

Article 2.18 Measurement

Retain this article

Article 2.19 Payment

Retain this article

SECTION 20.04 CLEARING AND GRUBBING

Article 4.3 Measurement

Retain this article

Article 4.4 Payment

Retain this article

SECTION 20.09 REMOVAL OF PAVEMENT

Article 9.1 General

Add the following to the first paragraph after the word 'pavement':

...or RAP

SECTION 20.10 EXCAVATION FOR TRAFFIC WAYS

Article 10.1 General

Replace the first paragraph with the following paragraph:

The Work under this Section consists of furnishing all plant, labor, equipment, supplies, and material in performance of all operations pertaining to the excavation of unsuitable and/or surplus material for streets, alleys, access roads, parking lots, sidewalks, curbs, gutter, trails, bio-filtration swales, and detention/retention/infiltration basins.

Article 10.3 Miscellaneous

Add the following paragraph:

Any underground, abandoned utility encountered during the Work shall be removed and disposed of by the Contractor per Division 10, Section 10.04, Article 4.9 – Disposal Sites.

Article 10.5 Utilization or Disposal of Excavated Material

Delete this article in its entirety and replace with the following:

Excavated material conforming to the specifications for classified fill and backfill shall be used where practical for fill and backfill as directed by the Owner’s Representative. When this material is used, it shall be considered usable excavation. Usable excavation shall be compacted in accordance with Section 20.01, Article 1.5 - Compaction Standards. When not used on the Project site, the material shall be hauled away and treated as unusable excavation. Unusable material shall be hauled to Eklutna Sand and Gravel (Eklutna Gravel Pit) located at North Eagle River, Eklutna Park Drive, 696-2822. Coordinate delivery of unusable excavation with Paul Farnsworth of the ARRC first then with Eklutna Gravel Pit prior to the haul.

Unless otherwise specified in the Special Provisions, the Contractor will not be required to transport usable excavation from one schedule of a Contract for use in another schedule of the same Contract unless they are continuous or adjacent.

Article 10.7 Measurement

Retain this article

Article 10.8 Payment

Retain this article

SECTION 20.13 TRENCH EXCAVATION AND BACKFILL

Article 13.2 Trench Excavation and Backfill - Description

Add the following paragraph after the fifth paragraph:

Payment to the Contractor for Work resulting from any trench excavation required for this project, whether paid for on a cubic yard, ton, or linear foot basis, shall not exceed the pay limits as shown on the Contract Drawings.

E. Locator Tape

Delete the fourth sentence and replace with the following:

The Contractor shall install the locator tape at least 18 inches but no more than 36 inches above the crown of the pipe.

SECTION 20.21 CLASSIFIED FILL AND BACKFILL

Article 21.4 Measurement

Delete this article in its entirety and replace with the following:

Classified fill or backfill material Type II and Type IIA, obtained from borrow pits, will be measured will be in tons (2000 lbs.) of material obtained, delivered, and placed in accordance with these Specifications. The measurement may include moisture up to a maximum of four percent (4.0%) of dry weight of the material. When tests by the Engineer indicate that moisture contents in excess of four percent (4.0%) may be occurring consistently, the frequency of testing will be increased as necessary and the results averaged over a period of one week. When this average is greater than four percent (4.0%), the tonnage as measured over the above period, shall be reduced by the difference. No credit will be due the Contractor when moisture content is less than four percent (4.0%). Testing shall be done in accordance with Section 20.01, Article 1.3 – Applicable Standards.

Classified fill or backfill material Type II and Type IIA shall be owner-furnished from an Eklutna gravel pit located at North Eagle River, Eklutna Park Drive, 696-2822. Coordinate pickup of Type II and Type IIA with Paul Farnsworth of the ARRC first, then with Eklutna gravel pit prior to the haul. Measurement will be in tons (2000 lbs.) of material delivered and placed in accordance with these Specifications. The measurement may include moisture up to a maximum of four percent (4.0%) of dry weight of the material. When tests by the Engineer indicate that moisture contents in excess of four percent (4.0%) may be occurring consistently, the frequency of testing will be increased as necessary and the results averaged over a period of one week. When this average is greater than four percent (4.0%), the tonnage as measured over the above period, shall be reduced by the difference. No credit will be due the Contractor when moisture content is less than four percent (4.0%). Testing shall be done in accordance with Section 20.01, Article 1.3 – Applicable Standards.

Imported classified fill and backfill (all types) will be weighed on a scale certified by the State of Alaska. Weight tickets will be serialized and witnessed at the time of weighing by a Contractor-furnished weighman. The Owner’s Representative may at any time verify load weights and the weighing process.

Where excavation of unsuitable material beyond the lines and grades shown on the Drawings is ordered in writing, the measurement of classified backfill will include the material required for replacement. No measurement will be made for quantities placed beyond the lines and grade authorized or for quantities placed outside the limits of required excavation.

The Contractor and the Owner's Representative shall verify daily the quantity of material delivered to the Project site. Weight tickets not presented at time of delivery will require special verification by the Contractor before payment can be made.

Article 21.5 Basis of Payment

Payment for this Work shall be in accordance with Division 10, Section 10.07 - Measurement and Payment, and shall include full payment for all Work described in this Section.

Payment for the placement and compaction of usable excavation shall not be paid under this Section.

Payment shall be made under the following units:

ITEM	UNIT
Classified Fill and Backfill (Type)	Ton

SECTION 20.22 LEVELING COURSE

Article 22.4 Measurement

Remove the first sentence and replace with the following:

The leveling course shall be measured in tons of materials delivered and placed in accordance with these Specifications and adjusted for excess moisture as provided.

Article 22.4 Measurement

Retain this article

Article 22.5 Payment

Retain this article

SECTION 20.25 GEOTEXILE

Article 25.1 Description

Add the following to the end of the first paragraph:

Work under this Section shall also consist of furnishing and installing impermeable liners.

Article 25.2 Materials

Replace the second sentence in A. Type A Geotextile (Separation) with the following:

The Type A Geotextile (Separation) shall be a nonwoven pervious fabric constructed from long chain polymeric filaments such as polypropylene, polyethylene, polyester, polyvinylidene chloride or polyamide formed into a stable network such that the filaments or yarns retain their relative position to each other.

Add the following material type:

E. Impermeable Liner

Impermeable liners are used for prevention of drainage entering the subgrade. This material shall be constructed of polyethylene plastic with welded joints and have the following properties:

Property	Test Method	Frequency	Value
Thickness, mil, (lowest individual reading)	ASTM D 5199	Every roll	30 mils (27) mils
Density, g/cm ³	ASTM D 1505	200,000 lb	0.940
Tensile Properties (each direction) Break strength Yield strength Break elongation Yield elongation	ASTM D 6693, Type IV Dumbbell, 2 ipm G.L. 2.0 in G.L. 1.3 in	20,000 lb	114 lb/in-width 63 lb/in-width 700 % 12%
Tear Resistance	ASTM D 1004	45,000 lb	21 lb
Puncture Resistance	ASTM D 4833	45,000 lb	54 lb
Carbon Black Content (range)	ASTM D 4218	20,000 lb	2.0% - 3.0%
Notched Constant Tensile Load	ASTM D 5397	200,000 lb	500 hr
Oxidative Induction Time	ASTM D 3895, 200°C; O ₂ , 1 atm	200,000 lb	>100 mins

SECTION 20.26 INSULATION

Article 26.2 Materials

Add the following sentence after the first sentence:

Insulation board shall be provided in one inch-thick increments as required to meet the specified R-Value. Insulation board provided with fractional inch thickness shall be rejected.

Add the following New Section:

SECTION 20.31 SOIL REMEDIATION

Article 31.1 General

The Work under this Section consists of coordination with ARRC for contaminated soil handling. Work will include transport of impacted soil off site and may also consists of stockpiling soil that would require additional evaluation by ARRCs environmental contractor.

Article 31.2 Construction

Based on the project area soil information, minor soil contamination is expected in the project site; see soils information included in Section V. ARRC will coordinate with Alaska Department of Environmental Conservation (ADEC) and will obtain transport approval for removing soils off site for remediation. Unusable material, including soils that may contain minor contamination, shall be hauled by the contractor to Eklutna Sand and Gravel (Eklutna Gravel Pit) located at North Eagle River, Eklutna Park Drive, 696-2822. Coordinate delivery of unusable excavation with Paul Farnsworth of the ARRC first then with Eklutna Gravel Pit prior to the haul. Each Load of soil transported off the site will be covered and the bed of the truck will be dry swept after emptying the load.

If contractors observe visual or olfactory evidence of elevated concentrations including observation of free product in soils, contractor will be notified ARRC immediately. The contractor may be directed to place soils in an adjacent long term stockpile. Contractor shall insure soils stockpiled on adjacent site will comply with ADEC long term stockpile regulations and will include; berms, liners, and covers.

C. DIVISION 30 STANDARD CONSTRUCTION SPECIFICATIONS FOR PORTLAND CEMENT CONCRETE

SECTION 30.01 GENERAL

Article 1.3 Materials

B. Welded Steel Wire Fabric

Add the following paragraph:

Welded Steel Wire Fabric shall be used in all concrete driveways including colored concrete and in sidewalks at all driveway crossings and shall be 6x6-W4.0xW4.0.

SECTION 30.04 PORTLAND CEMENT CONCRETE CURB RAMPS

Article 4.1 General

Add the following Sentence:

The Work covered under this Section shall also include construction of backing curb, as required.

Article 4.2 Materials

Add the following Subsection:

C. Backing Curb

Backing curb materials and installation shall conform to the requirements of MASS Section 30.02 Portland Cement Concrete, Curb and Gutter and Valley Gutter, the Drawings, details and these specifications. Location and height of backing curb shall be as required to retain the neighboring ground, as approved by the Owner's Representative.

SECTION 30.05 STRUCTURES AND RETAINING WALLS

Article 5.1 Description

Add the following paragraphs:

This Work item includes but is not limited to all labor, materials, transportation, testing and maintenance necessary to form and cast:

- A. Concrete Planter Curb- freestanding curb as shown in the drawings
- B. Install owner-provided concrete barriers

Article 5.2 Construction

Add the following paragraph to the beginning of E. Finishing Concrete

Stripping forms and finishing for Concrete Planter Curb shall be per M.A.S.S. Section 30.02, Article 2.3, C. Finishing.

Add the following paragraphs:

- L. Submittals: Contractor shall provide submittals for all metal fabrications and ancillary structural items in accordance with MASS Section 10.05, Article 5.5, Shop Drawings, and as specified in this section.
- M. Delivery, Storage, and Handling: Store materials to permit easy access for inspection and identification.
- N. Material:
 - Concrete: Reference Section 30.01, Type A-3.
 - Reinforcing Steel: Reference Section 30.01, Article 1.3
- O. Concrete Barrier: place and install owner-supplied concrete barriers as shown on the Drawings.

SECTION 30.10 COLORED CONCRETE

Article 10.2Materials

- A. Concrete

Replace the paragraph entirely with the following:

Concrete mix for colored concrete shall conform to M.A.S.S. requirements for Class AA-3, normal weight concrete. Coloring shall be integral for the full depth of the concrete. It shall be added at the redi-mix concrete manufacturer plant per the manufacturer’s instructions and uniformly distributed throughout the mix.

Red concrete shall be made from integral color pigment “Baja Red” RG-2827R 6% (of cement material) as manufactured by Interstar or approved equal. The red color noted above may be modified by the Engineer. No separate payment shall be made if the red color is modified to color as requested and approved by the Engineer. Contractor shall submit color for approval by Engineer prior to ordering material.

Add the following Subsections:

D. Sealer

Sealer shall be a water-based acrylic sealer designed to provide UV protection, waterproofing, and chemical resistance. Sealer shall be manufactured by Interstar or approved equal.

E. Broom Finish

Broom finish all colored concrete.

Article 10.3 Construction

Add the following paragraphs at the end of this Article:

For broom finish, Contractor shall finish the concrete as follows: after final finishing of the concrete surface with wood and steel floats the surface shall be brushed with a fiber hair brush. The brushing shall be performed transverse to the predominant direction of pedestrian travel. The resulting surface shall be smooth with a linear texture resulting in a slip-resistant surface.

All colored concrete shall be sealed in accordance with the manufacturer of the sealer product. It may be necessary to seal the concrete approximately 28 days after the concrete has cured.

All vehicular traffic shall be kept off the colored concrete slab for the entire cure period. Pedestrian traffic may be allowed to travel on the concrete after 3 days upon approval by the Engineer. Concrete shall be protected against damage or defacement of any kind until it has been accepted by the Owner. Concrete which is not acceptable to the Engineer because of damage or defacement shall be removed and replaced at no additional cost to the Owner.

Install Welded Steel Wire Fabric in all colored concrete.

D. DIVISION 40 STANDARD CONSTRUCTION SPECIFICATIONS FOR ASPHALT SURFACING

SECTION 40.01 GENERAL

Add the following Articles:

Article 1.7 Asphalt Price Adjustment

This provision provides a price adjustment for asphalt material by:

1. an increase to the contract amount, or
2. a deduction from the contract amount.

The provision shall apply to asphalt concrete pavement which:

- is a major bid item as defined in M.A.S.S. Division 10, Section 10.04, Article 4.5 – Increased Quantities;

- is placed in the second or later year of the contract;
- conforms to M.A.S.S. Division 40, Section 40.06 – Asphalt Concrete Pavement; and
- is paid pursuant to M.A.S.S. Division 40, Section 40.06 – Asphalt Concrete Pavement

This provision shall only apply to cost changes in the asphalt material that occurs between the date of bid opening and the date the asphalt material is incorporated into the project.

The asphalt price adjustment shall only apply when there is more than a seven and one-half percent (7.5%) increase or decrease in the Alaska Asphalt Material Price Index from the date of the bid opening to the date the asphalt material is incorporated into the project.

As used in this Article, the Alaska Asphalt Material Price Index is calculated bi-monthly on the first and third Friday of each month, and will remain in effect from the day of calculation until the next bi-monthly calculation. The Alaska Asphalt Material Price Index is posted on the ADOT&PF’s Statewide Materials website and is calculated according to the formula posted therein.

The Asphalt Price Adjustment (APA) payment is cumulative and is calculated with each progress payment. Asphalt material price index in effect on the last day of the pay period is used to calculate the price adjustment for asphalt material incorporated into the project during that pay period. The Municipality will increase or decrease payment under this contract by the amount determined with the following asphalt material price adjustment formula:

$$\text{APA \{price}^{\text{increase/decrease}}\}^* = [(\pm \text{IPP} \mp \text{IB}) - (0.075 * \text{IB})] * \text{Q} * \% \text{AC}$$

Where,

Q = quantity of asphalt concrete pavement incorporated into the project during the pay period, in tons, and documented by weight tickets;

IB = Index at bid: the bi-monthly Alaska asphalt material price index in effect on date of bid, in dollars per ton;

IPP = Index at Pay Periods: the bi-monthly Alaska asphalt material price index in effect on the last day of the pay period, in dollars per ton; and

%AC = percentage asphalt cement content in the asphalt concrete pavement, as determined by the average asphalt cement content in project’s asphalt concrete quality control testing.

*Note: a negative price adjustment (APA) results in a price reduction to the Contract.

Method of measurement for determining quantity, Q, is the weight of asphalt concrete pavement material that conforms to M.A.S.S. Division 40, Section 40.06 – Asphalt Concrete Pavement and is incorporated into the project.

No asphalt price adjustment will be paid based on estimated quantities.

Contingent Sum payment shall be made on the following basis:

The final asphalt price adjustment on a project is the aggregate of the price adjustments paid on a project's respective progress pay estimates, i.e.,

$$APA = APA_1 + APA_2 + \dots + APA_n$$

Where,

n = partial payment estimate number.

SECTION 40.06 ASPHALT CONCRETE PAVEMENT

Article 4.3 Measurement

Retain this article

Article 4.4 Payment

Retain this article

E. DIVISION 55 STANDARD CONSTRUCTION SPECIFICATIONS FOR STORM DRAIN SYSTEMS

SECTION 55.02 FURNISH AND INSTALL PIPE

Article 2.2 Material

Replace the second sentence of E. High Density Polypropylene Pipe (HDPEP) with the following:

The pipe shall meet AASHTO M330.

SECTION 55.03 SUBDRAIN

Article 3.2 Material

Replace parargprah "D. Geotextile..." in its entirety and replace with the following:

D. Geotextile fabric shall conform to Division 20, Section 20.25 – Geotextile Fabric and shall be non-woven pervious drainage material or impermeable linear as indicated on the plans.

SECTION 55.04 CONNECTIONS TO EXISTING MANHOLES OR CATCH BASINS

Article 4.1 General

Add the following:

The Work under this Section shall also include the performance of all operations pertaining to the construction required for connections to existing storm drain pipes.

SECTION 55.05 MANHOLES AND CATCH BASIN MANHOLES

Article 5.3 Construction

B. Storm Drain Manholes and Catch Basin Manholes

Delete the second paragraph and replace it with the following:

After connecting the storm drain pipe to reinforced concrete manhole or catch basin, seal annular space around pipe penetrations with cement mortar or boot style connector, or approved equal. Cement mortar shall conform to the requirements of ASTM C-150, Type II. Boot style connector shall conform to the requirements of this Section. After the mortar has firmly set, Contractor shall cut the pipe evenly so that no more than two inches (2") of the pipe protrudes into the manhole. Boot style connectors shall be installed at all locations where watertight storm drain pipe connects to manholes.

F. DIVISION 60 STANDARD CONSTRUCTION SPECIFICATIONS FOR WATER SYSTEMS

SECTION 60.04 FURNISH AND INSTALL FIRE HYDRANTS

Article 4.1 General

Add the following:

Work under this section shall also include all materials, labor, coordination, and operations required to adjust fire hydrant to finish grade and install protective guard posts.

Article 4.4 Construction

Add the following paragraph:

Contractor shall adjust fire hydrants to final grade as directed by the AWWU Operations and Maintenance Division. Contractor shall provide AWWU with a minimum of 72-hours' notice, excluding non-working days, to coordinate fire hydrant adjustment. Contractor is responsible for access to the hydrant location and all trench excavation, dewatering, and backfill operations prior to, during, and after adjusting the fire hydrants. The cost for coordinating and providing trenching operations, AWWU coordination, and AWWU fees are incidental to project.

G. DIVISION 70 STANDARD CONSTRUCTION SPECIFICATIONS MISCELLANEOUS

SECTION 70.11 STANDARD SIGNS

Article 11.2Materials

After the fourth paragraph, add the following paragraph:

Contractor shall submit shop drawings for all signs for review and approval prior to installation.

SECTION 70.12 TRAFFIC MAINTENANCE

Article 12.5Materials

Delete items 8 and 9 and replace with the following items:

8. Portable Concrete Barriers. Provide portable concrete barriers that conform to ADOT&PF Standard Plan G-46.11 and are equipped with warning lights.
9. Work Zone Pavement Markings. Work zone pavement markings shall be either paint with glass beads or preformed marking tape.
10. Street Sweeping. Street sweeper shall be capable of collecting and storing materials for later disposal rather than ejecting them to the shoulder of the road.
11. Watering. Watering trucks shall be capable of providing both a high-pressure water stream to flush the pavement and a light-water spray to control dust.
12. Plastic Safety Fence. Use 4-foot high construction orange fence manufactured by one of the following companies or an approved equal:
 - “Safety Fence” by Services and Materials Company, Inc., 2200 South “J” Street, Elwood, Indiana, 46036. Phone (800) 428-8185.
 - “Flexible Safety Fencing” by Carsonite, 1301 Hot Springs Road, Carson City, Nevada, 89706. Phone (800) 648-7974.
 - “Warning Barrier Fence” by Plastic Safety Systems, Inc. P.O. Box 20140, Cleveland, Ohio, 44120. Phone (800) 662-6338.

Article 12.6Public Notice

Delete the first paragraph, inclusive of the list of local officials and transportation organizations, and replace with the following:

The Work Site Traffic Supervisor shall give notices of changes, delays, or lane/road closures to the following local officials and transportation organizations including, but not limited to:

1. Alaska Court System 264-8232
2. Alaska State Troopers 428-7200
3. Alaska Travel Industry Association 929-2842
4. Alaska Trucking Association..... 276-1149
5. Anchorage Chamber of Commerce 272-2401
6. Anchorage Fire Department 267-4950
7. Anchorage Police Department 786-8500
8. Anchorage Public Transportation 343-8253, 343-8386
9. ASD Pupil Transportation 742-1207
10. Commercial Vehicle Enforcement 365-1203
11. Local Emergency Medical Services 267-4950
12. Local Schools and Universities..... Varies
13. Local Solid Waste Utilities 563-3717
14. MOA Parks and Recreation 343-4297
15. U.S. Postal Service 266-3261

16. University of Alaska Anchorage..... 786-1800, 786-6763, 786-6764

SECTION 70.18 CHAIN LINK FENCE

Article 18.2 Materials

Add the following:

O. Reflective Inserts

Reflective Inserts shall be as produced by PrivacyLink® (130 West 700 South Smithfield, Utah 84335, (800) 574-1076) or approved equal. Color: Gold.

Article 18.3 Material Sizing

Delete Article 18.3 Tables and replace with the following:

Dimensions and weights of fence materials shall meet the following specifications:

Use	Section	Nominal Outside Diameter Dims; (Inches)	Nominal Weight per Foot, (Pounds)
Tubular End, Corner, and Pull Posts	Round	2.875	5.79
Rails and Post Braces	Round	2.375	3.65
Intermediate (Line) Posts	Round	2.375	3.65
Gate Posts	Round	4.000	8.65
Gate Frame Members	Round	1.90	2.28

Fencing Fabric Size:

Mesh Size	Gauge	Nominal Diameter Coated Wire (Inches)
2"	6	0.192

Add the following Section:

SECTION 70.22 SITE FURNITURE

Article 22.1 General

This Work item includes but is not limited to all labor, materials, transportation, testing and maintenance necessary for complete installation of:

- A. Table
- B. Bench
- C. Trash Receptacle

- D. Rope Fence
- E. Gate Tieback Keeper Post

Article 22.2 Submittals

Product Color and Materials: Product colors and materials to be confirmed and approved by owner prior to fabrication. Product colors and materials to be selected from manufacturer’s standard selections.

Product Data: For each type of product indicated, include construction details, material descriptions, dimensions of individual components and profiles, finishes, field-assembly requirements, and installation details.

Shop Drawings: Metal fabrications, including welding and fabrication information.

Article 22.3 Materials

Steel and Iron: Free of surface blemishes and complying with the following:

1. Plates, Shapes, and Bars: ASTM A 36/A 36M.
2. Steel Pipe: Standard-weight steel pipe complying with ASTM A 53, or electric-resistance-welded pipe complying with ASTM A 135.
3. Tubing: Cold-formed steel tubing complying with ASTM A 500.

Galvanizing: Where galvanizing is indicated for steel and iron components, provide the following protective zinc coating applied to components after fabrication:

Hot-Dip Galvanizing: According to ASTM A 123/A 123M, ASTM A 153/A 153M, or ASTM A 924/A 924M.

Powder Coating: Free of surface blemish and complying with the following:

Item	Specification
Color	As provided in drawings
Metal Treatment	Prior to powder coating, non-galvanized steel shall be cleaned according to SSPC-SP10 Near White Sand Blast. All non-galvanized parts shall be immersed in an iron phosphate bath, rinsed and sealed using a non-chrome final rinse. All parts shall be backed dry to remove moisture from fabrications.
Film Thickness	Min. 3.0 mil (75µm)
Gloss (60°)	ASTM D 523/ 60° ± 5 units
Humidity resistance	ASTM D 4585 4000 h/38°/100% Few /No. blisters (No. 4 ASTM D-714)

Item	Specification
Hardness	ASTM D3363, 2H Slightly perceptible marring by Gardco Pencil Hardness Gauge
Salt spray resistance.	ASTM B 117 3000 h/5% Na. Cl few No. 8 blisters No removal of film
Score Test (Cross Cut Tape Test)	ASTM D3359 5B No lifting of squares. Instrument: Scratch All and 6" Steel Rule
Natural weathering	Florida/10 year 45° South/wash A Color change <5 Hunter Units ASTM D4214 Chalking < No. 8 Gloss retention min 50% Erosion >10% film loss

Article 22.4 Quality Assurance

Welders Qualifications: Certified in accordance with American Welding Society (AWS) D1.1 92, Chapter 5.

Welding Procedures: Follow the requirements of AWS D1.1 92 and AWS D1.2 90.

Delivery, Storage and Handling: To the extent practicable, factory-assemble items specified in this Section. Package and clearly tag parts and assemblies that are of necessity shipped unassembled, in a manner that will protect materials from damage, and facilitate identification and field assembly.

Article 22.5 Manufacturers

All items to be confirmed and approved by owner prior to fabrication.

A. Table to be as manufactured by Victor Stanley (P.O. Drawer 330 Dunkirk, MD 20754 USA, 1.800.368.2573) or equivalent approved by owner:

- 1) Model: CP-4 (3' Square, backless)
- 2) Material: 2" x 4" (Nominal) Ipe Wood

B. In-Ground Mount, per drawings and per manufacturer's specifications
3) Paint Color: Black

C. Bench to be as manufactured by Victor Stanley (P.O. Drawer 330 Dunkirk, MD 20754 USA, 1.800.368.2573) or equivalent approved by owner:

- 1) Model: Eva Backless (4' length, intermediate arm rests)
 - 2) Materials: Ipe Wood slats
 - 3) Surface mounted, per manufacturer's specifications. Use appropriately sized stainless steel or galvanized hardware to secure furniture to concrete pad.
 - 4) Paint Color: Black
- D. Trash Receptacles to be as manufactured by Victor Stanley (P.O. Drawer 330 Dunkirk, MD 20754 USA, 1.800.368.2573) or equivalent approved by owner:
- 1) Model: S-42 (rain bonnet lid)
 - 2) Materials: Recycled Solid Steel Bar
 - 3) Surface mounted, per manufacturer's specifications. Use appropriately sized stainless steel or galvanized hardware to secure furniture to concrete pad.
 - 4) Paint Color: Black
- E. Natural Manila Fiber Rope
- 1) Provide a natural manila fiber rope made of abaca fibers, free of flaws and imperfections in materials, and manufactured to Cordage Institute Standards.
- F. Reflective Tape
- 1) Provide 2" width outdoor reflective tape as manufactured by Uline (12575 Uline Drive, Pleasant Prairie, WI 53158, -800-295-5510), Model S-22330W, or approved equal.
- G. Concrete
- 1) The Portland Cement Concrete and curing materials shall conform to M.A.S.S. Section 30.01 General, Article 1.3 Materials. Concrete mix shall conform to M.A.S.S. requirements for Class A-3, normal weight concrete.

Article 22.6 Fabrication

Fabricated materials shall meet the following:

- A. Finish exposed surfaces smooth, uniform, sharp, and true to well-defined lines. Provide fabricated product free of warps, kinks, dents, scrapes and other damage or unsightly condition.
- B. Horizontal elements shall be fabricated perpendicular to vertical elements, unless otherwise noted in drawings. Vertical elements shall be constructed to be installed plumb.
- C. Furnish necessary rabbets, lugs, and brackets so work can be assembled in neat, substantial manner.
- D. Conceal fastenings where practical; where exposed, flush countersink.
- E. Drill metalwork and countersink holes as required for attaching hardware or other materials.
- F. Round sharp edges to small uniform radius. Grind burrs, jagged edges, and surface defects smooth. Flame cutting is not permitted.

G. Steel Material Thinner than 1/8-Inch: Either galvanize before fabrication in accordance with ASTM A525-91a, Coating Designation G210, or after fabrication in accordance with ASTM A123-89a, except the weight of zinc coating shall average minimum 1.2 ounces per square foot of actual surface area with no individual specimen having a weight of less than 1 ounce per square foot.

H. Assembly:

- 1) Fit and assemble in largest practical sections for delivery to site.
- 2) Fabricate as shown on Drawings and in accordance with ASTM A385-80.
- 3) Weld connections and grind exposed welds smooth. When required to be watertight, make welds continuous.
- 4) Use fasteners as shown or scheduled.
- 5) Grind cut edges smooth and straight.

I. Welding:

- 1) Meet requirements of ANSI/AWS D1.1-92 for techniques of welding employed, appearance, quality of welds made, and the methods of correcting defective work.
- 2) Meet visual acceptance standards of ANSI/AWS D1.1-92, paragraph 8.15.1. Welds shall be ground smooth to required size and be free of putty, pits, pinholes and debris.
- 3) Complete welding before applying finish.
- 4) All welds shall be continuous unless shown otherwise.

Article 22.7 Construction

Examination: Examine areas and conditions, with Installer present, for compliance with requirements for correct and level finished grade, mounting surfaces, installation tolerances, and other conditions affecting performance.

Proceed with installation only after unsatisfactory conditions have been corrected. Obtain Engineer's acceptance prior to site cutting or making adjustments not scheduled.

Installation: Comply with manufacturer's written installation instructions, unless more stringent requirements are indicated. Complete field assembly of site furnishings, where required.

Unless otherwise indicated, install site furnishings after paving has been completed.

Install site furnishings level, plumb, true, and securely anchored at locations indicated on Drawings.

Cleaning: After completing site furnishing installation, inspect components. Remove spots, dirt, and debris. Repair damaged finishes to match original finish or replace component.

H. DIVISION 75 STANDARD CONSTRUCTION SPECIFICATIONS FOR LANDSCAPING IMPROVEMENTS

SECTION 75.02 LANDSCAPING

Article 2.1 General

A. Scope of Work

Add the following paragraph:

The Work shall also include an extended maintenance period and all equipment, labor, materials and transportation necessary to Prune Existing Trees, and to maintain the Landscape and Moose Protection Fence.

Installation of Tree Protection Zone Fences shall be per Section 75.12 Tree Protection Zone Fence.

Installation of Moose Protection Fence shall be per Section 75.14 Moose Protection Fence.

Article 2.2 Construction

Delete and replace the existing Paragraph with the following:

M. Pruning and Repair

For new plantings, the only pruning allowed at planting shall be removal of dead, damaged, or broken branches and roots. Pruning shall conform to the American National Standard for Tree Care Operation, ANSI A300. No pruning paint or other wound dressing shall be used.

Article 2.3 Maintenance

A. General

Add the following paragraphs:

Extended Maintenance: The plant establishment period shall be extended one year. The Contractor shall furnish all labor, materials, supplies and equipment required to maintain the Landscape and the Moose Protection Fence one year beyond the standard one-year plant establishment period from the date of acceptance of the initial planting operations. Contractor shall conduct periodic visual inspections and repair any damage due to moose, other wildlife or vandalism immediately. The Owner's Representative may notify the Contractor about damages in which case the repairs shall be made within 24 hours. The Contractor shall repair and replace all materials damaged or destroyed within the scope of the Work, regardless of cause.

The Contractor shall also furnish all labor, materials, supplies and equipment required remove the Moose Protection Fence two years from the date of acceptance of the initial planting operations.

Article 2.4 Landscaping Acceptance

Delete the second paragraph and replace with the following:

A Landscaping Acceptance Inspection of the project will occur after completion of the Plant Establishment Period. Owner’s Representative shall verify that Contractor performed maintenance functions as identified in Article 2.4 – Maintenance of this Section. Additional conditions governing Landscaping Acceptance of the planted and seeded areas are that, in the opinion of the Owner’s Representative, all plants are in a live, uniform, and sound and healthy and flourishing condition; free of disease, insect infestation and physical damage, and free of weeds, rubbish and construction debris. The Engineer shall verify that all Moose Protection Fencing has been removed as identified in Article 2.4 Maintenance of this Section. If the Owner’s Representative does not accept the plantings and removal of Moose Protection Fencing, the Contractor shall correct all deficiencies. All costs associated with correcting the deficiencies and extending the Plant Establishment Period shall be paid by the Contractor without additional cost to the Owner.

Should the required corrections not be made within thirty (30) days after the initial Landscaping Acceptance Inspection, the Contractor shall be assessed liquidated damages per Division 10, Section 10.05, Article 5.27 – Liquidated Damages, until all Work is complete and accepted by the Owner’s Representative.

SECTION 75.03 TOPSOIL

Article 3.1 General

Add the following paragraph:

The Work under this Section also consists of providing all operations pertaining to furnishing, transporting, installing, and spreading Engineered Soil

Article 3.2 Materials

Add the following material:

C. Engineered Soil

Engineered Soil shall conform to the following requirements:

<u>Item</u>	<u>Amount/Value</u>
Sand	50-60%
Compost	20-30%
Topsoil	20-30%
Organic Material	1.5-3%
Ph Range	5.5-6.5

Add the following Sections:

SECTION 75.12 TREE PROTECTION ZONE FENCE

Article 12.1 General

The Work under this Section includes but is not limited to all equipment, labor, and transportation necessary to provide and remove Tree Protection Zone Fences as

specified herein. Tree Protection Zone Fences are required where all work abuts mature tree plantings that are to remain in place. Tree Protection Zone Fences are to be removed when construction is complete.

Tree Protection Zone (TPZ): Tree Protection Zones shall be per Section 75.02.

The Contractor is responsible for the verification of all existing utilities or requesting locates of underground utility lines.

Article 12.2 Submittals

- A. Certification: provide a certification from a certified arborist that trees indicated to remain have been protected during construction according to recognized standards and that trees were promptly and properly treated and repaired when damaged.
- B. Maintenance Recommendations: From certified arborist, for care and protection of trees affected by construction during and after completing the Work.

Article 12.3 Quality Assurance

- A. Tree Service Firm Qualifications: An experienced tree service firm that has successfully completed tree protection and trimming work similar to that required for this Project and that will assign an experienced, qualified arborist to project site during execution of tree protection and trimming.
- B. Arborist Qualifications: An arborist certified by ISA or licensed in the jurisdiction where Project is located.
- C. Tree Pruning Standard: Comply with ANSI A300 (Part 1), "Tree, Shrub, and Other Woody Plant Maintenance--Standard Practices (Pruning)."
- D. Pre-installation Conference: Before tree protection operations begin, meet with the Engineer, Arborist to review tree protection procedures and responsibilities and determine tree protection fencing limits on site.
- E. Prior to any excavation, tree protection limits will be staked by the Contractor and approved by the Engineer.
- F. Provide written acceptance from a certified arborist that trees indicated to remain and protected by Tree Protection Zones have been protected during construction according to recognized standards and that trees were promptly and properly treated and repaired when damaged.

Article 12.4 Materials

- A. Topsoil: Topsoil shall be per Section 75.03
- B. Temporary Construction Fencing: 4' High, high visible orange safety fence.
- C. Steel T-Posts: with pointing and reflective safety caps, green color.

Article 12.5 Construction

- A. Construction Fencing: Install fencing around tree protection zones to protect remaining trees and vegetation from construction damage. Maintain temporary fence and remove when construction is complete.

- B. Protect tree root systems from damage caused by runoff or spillage of noxious materials while mixing, placing, or storing construction materials. Protect root systems from ponding, eroding, or excessive wetting caused by dewatering operations. Root pruning shall be per Section 75.13 ROOT PRUNING.
- C. Do not store construction materials, debris, or excavated material inside Tree Protection Zones. Do not permit vehicles or foot traffic within Tree Protection Zones; prevent soil compaction over root systems.
- D. Ensure that branches of trees within the Tree Protection Zone are not broken by equipment.
- E. Maintain Tree Protection Zones free of trash.
- F. Do not allow fires within Tree Protection Zones.

Article 12.6Tree Repair

Promptly repair trees damaged by construction operations within 24 hours. Treat damaged trunks, limbs, and roots according to Arborist’s written instructions.

SECTION 75.13 ROOT PRUNING

Article 13.1 General

The Work under this Section includes but is not limited to all equipment, labor, and transportation necessary to provide root pruning as shown on the Drawings and specified herein. Root Pruning is required where all work abuts mature tree plantings that are to remain in place.

The Contractor is responsible for the verification of all existing utilities or requesting locates of underground utility lines.

Article 13.2Materials

Burlap: A strong woven fabric made of jute, hemp, or flax fibers.

Article 13.3Quality Assurance

- A. Tree Service Firm Qualifications: An experienced tree service firm that has successfully completed tree protection and trimming work similar to that required for this Project and that will assign an experienced, qualified arborist to project site during execution of tree protection and trimming.
- B. Arborist Qualifications: An arborist certified by ISA or licensed in the jurisdiction where Project is located.

Article 13.4Construction

A. Workmanship and Procedure

- 1. Root Pruning shall be performed when below ground construction occurs within 16 feet of a mature tree. Mature trees are trees that are 4” diameter at breast height (DBH) or greater in size. Root Pruning shall be done to a depth of 18 inches. The distance to prune away from the base of a tree shall be determined by providing 1

foot of horizontal distance from the trunk of the tree for every 1 inch of DBH of that tree.

2. All roots 1" in diameter or greater shall be cut clean with a root pruner, a sharp saw, and/ or hand pruners.
3. Roots must not be pruned or removed from more than one side of a tree.
4. All pruned roots are to be covered by wet burlap and kept moist for the duration of time that the root is exposed.
5. Topsoil shall be used to backfill the excavated area around the root.

B. Maintenance

Keep the burlap that is covering pruned roots moist for the duration of time that the root is exposed.

SECTION 75.14 MOOSE PROTECTION FENCE

Article 14.1 General

The work under this section includes but is not limited to all labor, materials, transportation, and maintenance necessary to furnish and install temporary fencing for moose protection as shown on the drawings and specified herein. Moose Protection Fence is required around all new individual deciduous trees and/or deciduous tree groupings.

The Contractor is responsible for the verification of all existing utilities or requesting locates of underground utility lines.

Article 14.2 Materials

Posts: Steel T- posts with pointing, green color, 9' height.

Fabric: Fabric shall be 1-3/4 inch opening black nylon netting with 5/16" black polyester rope border. Use metal ties to secure to posts.

Article 14.3 Construction

A. Workmanship and Procedure

Moose protection fencings shall be erected immediately following the tree installation. The moose protection fencing shall be place at the outside edges of individual deciduous trees and/or all deciduous tree groupings. All deciduous trees shall be enclosed within the fencing without damaging branches or allowing branches to protrude.

B. Detail Drawings:

All assemblies specified herein shall be installed in accordance with the drawings.

C. Maintenance:

Maintenance of the Moose Protection Fence shall be per Section 75.02.

I. DIVISION 80 STANDARD CONSTRUCTION SPECIFICATIONS FOR TRAFFIC SIGNALS AND ILLUMINATION

SECTION 80.08 JUNCTION BOXES

Article 8.1 General

A. Scope of Work

Add the following paragraph:

The Work shall also include coordination with ARRC for adjustment of ARRC junction boxes to grade. Contractor is responsible for access to the infrastructure location and all trench excavation, dewatering, and backfill operations prior to, during, and after adjusting the infrastructure. The cost for coordinating and providing trenching operations, ARRC coordination, and ARRC fees are incidental to project.

Article 4.3 Construction

Add the following paragraph:

Contractor shall coordinate with ARRC for adjusting ARRC-owned junction boxes to grade. Contractor shall provide ARRC with a minimum of 72-hours' notice, excluding non-working days, to coordinate adjustment. Contractor is responsible for access to the junction boxes and all trench excavation, dewatering, and backfill operations prior to, during, and after ARRC personnel adjust the junction boxes.

END OF SPECIAL PROVISIONS

ALASKA RAILROAD CORPORATION

**DEPOT DRIVE
PHASE 1 (2020 WORK)**

II

SUBMITTAL LIST

**ALASKA RAILROAD CORPORATION
DEPOT DRIVE
PHASE 1 (2020 WORK)**

SUBMITTAL LIST

Job #: _____ Contractor:

Submittal Number	Description
20.02	Storm Water Pollution Prevention Plan
20.02	Hazardous Material Control Plan
20.12	ADEC Dewatering Plan Permit Approval
20.16	Bedding Material
20.21	Classified Fill and Backfill
20.22	Leveling Course
20.25	Geotextile (all types)
20.26	Insulation Board
30.01	All concrete mix designs
30.04	Detectable Warnings
30.10	Colored concrete
30.12	Trespass Mitigation Barrier
40.06.2	Certified Analysis of Asphalt for A.C. Pavement from Refinery Lab.
40.06.3	Asphalt Job Mix Formula for A.C. Pavement Laboratory
55.02	Storm Drain Televising Documentation
55.02	Storm Drain Pipe
55.05 & 55.09	Storm Drain Structure Shop Drawings

Submittal Number	Description
55.05	Bypass Gate Control Shop Drawings
70.11	Sign Shop Drawings
70.12	Traffic Control Plan
70.22	Decorative Fence
75.02	Landscape Maintenance Schedule
75.02	Tree Service Firm & Arborist Certification
75.03.2	Topsoil Analysis Test Reports
75.03	Topsoil Mix
75.03	Engineered Soil
75.04	Seed Certification
75.12	Tree Protection Zone Fence
80.00	All Electrical/Signal Equipment and Materials Submittals

NOTE: The above list of submittals is not all inclusive. In addition to the above, the Contractor is required to comply with all submittal requirements as required or identified in the Drawings, specifications, M.A.S.S., or as directed by the Engineer or Owner.

ALASKA RAILROAD CORPORATION

**DEPOT DRIVE
PHASE 1 (2020 WORK)**

III

SPECIAL DETAILS

SEE ATTACHMENT #1: SECTION III – Special Sign Shop Drawings

ALASKA RAILROAD CORPORATION

**DEPOT DRIVE
PHASE 1 (2020 WORK)**

IV

TRAFFIC CONTROL PLAN

SEE ATTACHMENT #2: SECTION IV – Traffic Control Plan

ALASKA RAILROAD CORPORATION

**DEPOT DRIVE
PHASE 1 (2020 WORK)**

V

SOILS INFORMATION

SEE ATTACHMENT #3: SECTION V – Geotechnical Report

ALASKA RAILROAD CORPORATION

**DEPOT DRIVE
PHASE 1 (2020 WORK)**

VI

PLANS

SEE ATTACHMENT #4: SECTION VI – Depot Drive Final Plans

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APPENDIX D
FORMS

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Bidder Questionnaire

Note: Failure to provide the information requested in this questionnaire may be cause for rejection of your bid or offer on the grounds of non-responsiveness and/or non-responsibility.

Project: ITB 20-07-207897 Depot Drive Construction

Name of Your Business: _____

Street Address: _____

Mailing Address if Different: _____

City: _____ State: _____ Mailing Zip: _____

Telephone: _____ Fax: _____ E-Mail: _____

Date Firm Established: _____

How many years has the business been under the above name? _____

Previous business name(s) if any: _____

Federal Tax ID Number: _____

Business License Number: _____

Contractor License Number (For Construction): _____

Bid Acceptance Period _____ Days. (Bids providing less than thirty - 30 calendar days for acceptance may be considered non-responsive and may be rejected.)

Discount for prompt pay _____ % _____ days.

The bidder shall list any variations from or exceptions to the Terms, Conditions or Specifications of the Invitation to Bid:

OVER PLEASE—continued on reverse

List the three most recent contracts performed by your company where the commodity or service requested in this Invitation to Bid was the primary commodity or service supplied. Include the client's name, contract amount, contract date, person to contact regarding performance, their telephone, facsimile number and e-mail.

Clients name, Contact person, Contact info. Description of Work and Contract Amount
 (Provide: telephone, fax, and email)

<u>List any other business related experience:</u>	

Are you acting as a broker or the primary supplier in this transaction?

- Broker
- Primary Supplier

Business Information (Please check all that apply):

- My business is Individual
- My business is a Partnership
- My business is a Non-Profit
- My business is a Joint-Venture
- My business is a Corporation incorporated under the laws of the State of _____
- My business is full-time
- My business is part-time
- My business **is not** a certified Disadvantaged Business (DBE)
- My business **is** a certified DBE
- My DBE was certified by State DOTPF
- My DBE was certified by the Municipality of Anchorage
- My business is an 8(a)/WBE/MBE and is certified by SBA
- My business was certified by _____
- My DBE Certification # is _____

Firms Annual Gross Receipts:

- <\$500,000
- \$500,000 - \$999,999
- \$1,000,000 - \$4,999,999
- \$5,000,000 - \$9,999,999
- \$10,000,000 - \$16,999,999
- >\$17,000,000

Completed by: _____ **Title:** _____

Signature: _____ **Date:** _____

**ALASKA RAILROAD CORPORATION
CONSTRUCTION BID FORM of**

NAME _____

ADDRESS _____

To the CONTRACTING OFFICER, ALASKA RAILROAD CORPORATION:

In compliance with your Invitation to Bid Number, _____, the Undersigned proposes to furnish and deliver all the materials and do all the work and labor required in the construction of the _____, located at or near _____ according to the plans and specifications and for the amount and prices named herein as indicated on the Cost Schedule, which is made a part of this Bid.

The Undersigned declares that he/she has carefully examined the contract requirements and that he/she has made a personal examination of the site of the work; that he/she understands that the quantities, where such are specified in the Cost Schedule or on the plans for this Project, are approximate only and subject to increase or decrease, and that he/she is willing to perform increased or decreased quantities of work at unit prices bid under the conditions set forth in the Contract Documents.

The Undersigned hereby agrees to execute the said contract and bonds within **Ten (10) Calendar Days**, or such further time as may be allowed in writing by the Contracting Officer, after receiving notification of the acceptance of this Bid, and it is hereby mutually understood and agreed that in case the Undersigned does not, the accompanying bid guarantee shall be forfeited to the Alaska Railroad Corporation as liquidated damages, and said Contracting Officer may proceed to award the contract to others.

The Undersigned agrees to commence the work within **Ten (10) Calendar Days** after the effective date of the Notice to Proceed and to complete the work by _____, unless extended in writing by the Contracting Officer.

The Undersigned proposes to furnish a Payment Bond in the amount of One Hundred Percent (100%) and a Performance Bond in the amount of One Hundred Percent (100%) (of the contract), as surety conditioned for the full, complete and faithful performance of this contract.

The Undersigned acknowledges receipt of the following addenda to the drawings and/or specifications (give number and date of each).

Addenda No.	Date Issued	Addenda No.	Date Issued	Addenda No.	Date Issued
_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____

NON-COLLUSION AFFIDAVIT

The Undersigned declares, under penalty of perjury under the laws of the United States, that neither he/she nor the firm, association, or corporation of which he/she is a member, has, either directly or indirectly, entered into any agreement, participated in any collusion, or otherwise taken any action in restraint of free competitive bidding in connection with this Bid.

The Undersigned has read the foregoing proposal and hereby agrees to the conditions stated therein by affixing his/her signature below:

Signature

Name and Title of Person Signing

Telephone Number

Facsimile Number

Form 395-0121 (12/99)

ALASKA RAILROAD CORPORATION - BID BOND

for ITB 20-07-207897 Depot Drive Construction

PRINCIPAL (Legal name and business address)				DATE BOND EXECUTED	
				TYPE OF ORGANIZATION	
				<input type="checkbox"/> INDIVIDUAL <input type="checkbox"/> PARTNERSHIP <input type="checkbox"/> JOINT VENTURE <input type="checkbox"/> CORPORATION	
				STATE OF INCORPORATION	
SURETY(IES) (Name and business address)					
A.		B.		C.	
PENAL SUM OF BOND				DATE OF BID	
<p>We, the PRINCIPAL and SURETY above named, are held and firmly bound to the Alaska Railroad Corporation (ARRC), in the penal sum of the amount stated above, for the payment of which sum will be made, we bind ourselves and our legal representatives and successors, jointly and severally, by this instrument.</p> <p>THE CONDITION OF THE FOREGOING OBLIGATION is that the Principal has submitted the accompanying bid or proposal in writing, date as shown above, on the following project: _____, in accordance with contract documents filed in the office of the Contracting Officer, and under the Invitation for Bids therefore, and is required to furnish a bond in the amount stated above.</p> <p>If the Principal's bid is accepted and he/she is offered the proposed contract for award, and if Principal fails to enter into the contract, then the obligation to ARRC created by this bond shall be in full force and effect.</p> <p>If the Principal enters into the contract, then the foregoing obligation is null and void.</p>					
PRINCIPAL					
Signature(s)	1.	2.	3.	Corporate Seal	
Name(s) & Titles [Typed]	1.	2.	3.		
CORPORATE SURETY(IES)					
S U R E T Y A	Name of Corporation		State of Incorporation	Liability Limit \$	
	Signature(s)	1.	2.	Corporate Seal	
	Name(s) & Titles [Typed]	1.	2.		

CORPORATE SURETY(IES)

S U R E T Y B	Name of Corporation		State of Incorporation	Liability Limit \$
	Signature(s)	1.	2.	Corporate Seal
	Name(s) & Titles [Typed]	1.	2.	

CORPORATE SURETY(IES)

S U R E T Y C	Name of Corporation		State of Incorporation	Liability Limit \$
	Signature(s)	1.	2.	Corporate Seal
	Name(s) & Titles [Typed]	1.	2.	

INSTRUCTIONS

1. This form shall be used whenever a bid bond is submitted.
2. Insert the full legal name and business address of the Principal in the space designated. If the Principal is a partnership or joint venture, the names of all principal parties must be included (e.g., "Smith Construction, Inc. and Jones Contracting, Inc. dba Smith/Jones Builders, a Joint Venture"). If the Principal is a corporation, the name of the state in which incorporated shall be inserted in the space provided.
3. Insert the full legal name and business address of the Surety in the space designated. The Surety on the bond may be any corporation or partnership authorized to do business in Alaska as an insurer under AS 21.09. Individual sureties will not be accepted.
4. The penal amount of the bond may be shown either as an amount (in words and figures) or as a percent of the contract bid price (a not-to-exceed amount may be included).
5. The scheduled bid opening date shall be entered in the space marked Date of Bid.
6. The bond shall be executed by authorized representatives of the Principal and Surety. Corporations executing the bond shall also affix their corporate seal.
7. Any person signing in a representative capacity (e.g., an attorney-in-fact) must furnish evidence of authority if that representative is not a member of the firm, partnership, or joint venture, or an officer of the corporation involved.
8. The states of incorporation and the limits of liability of each surety shall be indicated in the spaces provided.
9. The date that bond is executed must not be later than the bid opening date.

Form 395-0120

ALASKA RAILROAD CORPORATION

SUBCONTRACTOR LIST

[First Tier Subcontractors Only]

The apparent low bidder shall complete this form and submit it so as to be received by the Contracting Officer prior to the close of business on the **Fifth (5th) Working Day** after receipt of written notice from the Alaska Railroad Corporation.

Failure to submit this form with all required information by the due date will result in the bidder being declared non-responsive and may result in the forfeiture of the Bid Security.

Scope of work must be clearly defined. If an item of work is to be performed by more than one (1) firm, indicate the portion or percent of work to be done by each.

Check as applicable: All work on the below-referenced project will be accomplished without subcontracts greater than ½ of 1% of the contract amount.

Or

Subcontractor List is as follows:

FIRM NAME, ADDRESS, TELEPHONE NUMBER	BUSINESS LICENSE NUMBER AND CONTRACTOR'S REGISTRATION NUMBER	SCOPE OF WORK TO BE PERFORMED	TOTAL DOLLAR AMOUNT OF WORK

[CONTINUE SUBCONTRACTOR INFORMATION ON REVERSE]

I hereby certify that the above-listed licenses and registrations were valid at the time bids were received for this project. For contracts involving Federal-aid funding, Alaska Business License and Contractor Registration will be required prior to award of a subcontract.

COMPANY NAME

SIGNATURE BY AND FOR THE BIDDER

COMPANY ADDRESS

PRINTED NAME OF BIDDER

COMPANY ADDRESS

DATE OF BID

CONTACT PHONE NUMBER

CONTACT FAX NUMBER

Form 395-0131

**ALASKA RAILROAD CORPORATION
PAYMENT BOND**

KNOW ALL PERSONS BY THESE PRESENTS:

That _____
of: _____ as Principal,
and _____
of: _____ as Surety,
firmly bound and held unto the Alaska Railroad Corporation in the penal sum of _____ Dollars (\$ _____),
good and lawful money of the United States of America for the payment whereof, well and truly to be paid
to the Alaska Railroad Corporation, we bind ourselves, our heirs, successors, executors, administrators,
and assigns, jointly and severally, firmly by these presents.

WHEREAS, the said Principal has entered into a written contract with said Alaska Railroad Corporation,
on the _____ of _____, 20_____,
for _____, said work to be done
according to the terms of said contract. **ARRC Project: ITB 20-07-207897 Depot Drive
Construction.**

NOW, THEREFORE, the conditions of the foregoing obligation is such that if the said Principal shall
comply with all requirements of law and pay, as they become due, all just claims for labor performed and
materials and supplies furnished upon or for the work under said contract, whether said labor be
performed and said materials and supplies be furnished under the original contract, any subcontract, or
any and all duly authorized modifications thereto, then these presents shall become null and void;
otherwise they shall remain in full force and effect.

IN WITNESS WHEREOF, We have hereunto set our hands and seals this _____ day of
_____, 20_____.

Principal: _____

Address: _____

Telephone Number: _____

Contact Name: _____

By: _____

By: _____

Surety: _____

Address: _____

Contact Name: _____

By: _____

By: _____

The offered bond has been checked for adequacy under the applicable statutes and regulations:

Alaska Railroad Corporation [Authorized Representative] _____ Date

(Instructions on Next Page)

INSTRUCTIONS

1. This form, for the protection of persons supplying labor and material, shall be used whenever a payment bond is required. There shall be no deviation from this form without approval from the Contracting Officer.
2. The full legal name, business address, telephone number, and point of contact of the Principal and Surety shall be inserted on the face of the form. Where more than a single surety is involved, a separate form shall be executed for each surety.
3. The penal amount of the bond, or in the case of more than one surety the amount of obligation, shall be entered in words and in figures.
4. The bond shall be signed by authorized persons. Where such persons are signing in a representative capacity (e.g., an attorney-in-fact), but is not a member of the firm, partnership, or joint venture, or an officer of the corporation involved, evidence of authority must be furnished.

Form 395-0126

**ALASKA RAILROAD CORPORATION
PERFORMANCE BOND**

KNOW ALL PERSONS BY THESE PRESENTS:

That _____
of: _____ as Principal,
and _____
of: _____ as Surety,
firmly bound and held unto the Alaska Railroad Corporation in the penal sum of _____ Dollars (\$ _____), good and lawful money of the United States of America for the payment whereof, well and truly to be paid to the Alaska Railroad Corporation, we bind ourselves, our heirs, successors, executors, administrators, and assigns, jointly and severally, firmly by these presents.

WHEREAS, the said Principal has entered into a written contract with said Alaska Railroad Corporation, on the _____ of _____, 20____,
for _____,
said work to be done according to the terms of said contract. **ARRC Project:**

NOW, THEREFORE, the conditions of the foregoing obligation is such that if the said Principal shall well and truly perform and complete all obligations and work under said contract and if the Principal shall reimburse upon demand of the Alaska Railroad Corporation any sums paid him/her which exceed the final payment determined to be due upon completion of the project, then these presents shall become null and void; otherwise they shall remain in full force and effect.

IN WITNESS WHEREOF, We have hereunto set our hands and seals this _____ day of _____, 20_____.

Principal: _____

Address: _____

Telephone Number: _____

Contact Name: _____

By: _____

By: _____

Surety: _____

Address: _____

Contact Name: _____

By: _____

By: _____

The offered bond has been checked for adequacy under the applicable statutes and regulations:

Alaska Railroad Corporation

[Authorized Representative] Date
(Instructions on Next Page)

INSTRUCTIONS

1. This form shall be used whenever a performance bond is required. There shall be no deviation from this form without approval from the Contracting Officer.
2. The full legal name, business address, telephone number, and point of contact of the Principal and Surety shall be inserted on the face of the form. Where more than a single surety is involved, a separate form shall be executed for each surety.
3. The penal amount of the bond, or in the case of more than one surety the amount of obligation, shall be entered in words and in figures.
4. The bond shall be signed by authorized persons. Where such persons are signing in a representative capacity (e.g., an attorney-in-fact), but is not a member of the firm, partnership, or joint venture, or an officer of the corporation involved, evidence of authority must be furnished.

Form 395-0127

**ALASKA RAILROAD CORPORATION
CONSTRUCTION CONTRACT**

Contract Number: _____ OC

This CONTRACT, between the ALASKA RAILROAD CORPORATION, herein called ARRC, acting by and through its Contracting Officer, and _____, a Corporation, incorporated under the laws of the State of Alaska, its successors and assigns, hereinafter called the Contractor, is effective the date of the signature of the Contracting Officer on this document.

Billing Information: Invoices shall be submitted to Accounts Payable, Alaska Railroad Corporation, PO Box 107500, Anchorage, AK 99510-7500. Please reference your contract number on all invoices and correspondence.

WITNESSETH: That the Contractor, for and in consideration of the payment or payments herein specified and agreed to by ARRC, hereby covenants and agrees to furnish and deliver all the materials and to do and perform all the work and labor required in the construction of the following project:
_____ at the prices bid by the Contractor for the respective estimated quantities aggregating approximately the sum of: **Bid amount _____ dollars and /cents (\$_____.00)** for the Base Bid and such other items as are mentioned in the original Bid, which Bid and prices named, together with the Contract Documents (Invitation to Bid, Addenda & Contract) and Contractors Bid are made a part of this Contract and accepted as such, the project being situated at the Port of Anchorage, Alaska.

It is distinctly understood and agreed that no claim for additional work or materials, done or furnished by the Contractor and not specifically herein provided for shall be allowed by ARRC, nor shall the Contractor do any work or furnish any material not covered by this Contract, unless such work is ordered in writing by ARRC. In no event shall ARRC be liable for any materials furnished or used, or for any work or labor done, unless the materials, work, or labor are required by the Contract or on written order furnished by ARRC. Any such work or materials which may be done or furnished by the Contractor without written order first being given shall be at the Contractor's own risk, cost, and expense and the Contractor hereby covenants and agrees to make no claim for compensation for work or materials done or furnished without any such written order.

The Contractor further covenants and agrees that all materials shall be furnished and delivered and all labor shall be done and performed, in every respect, to the satisfaction of ARRC, **October 1, 2020.**

It is expressly understood and agreed that in case of the failure on the part of the Contractor, for any reason, except with the written consent of ARRC, to complete the furnishing and delivery of materials and the doing and performance of the work before the aforesaid date, ARRC shall have the right to deduct from any money due or which may become due the Contractor, or if no money shall be due, ARRC shall have the right

to recover liquidated damages as spelled out in General Conditions, Construction. The bonds given by the Contractor in the sum of: **100% of Bid Amount \$_____ Payment Bond, and 100% of Bid Amount \$_____ Performance Bond**, to secure the proper compliance with the terms and provisions of this Contract, are submitted herewith and made a part hereof.

IN WITNESS WHEREOF, the parties hereto have executed this Contract and hereby agree to its terms and conditions.

CONTRACTOR

Name of Contractor

Signature

Date

Name and Title

(Corporate Seal)

ALASKA RAILROAD CORPORATION

Contracting Officer (Signature)

Date

Typed or Print Name

Form 395-0122

APPENDIX E

GENERAL CONDITIONS (CONSTRUCTION)

(Revised 11/14/05)

1. ARTICLE 1 - DEFINITIONS:

Wherever used in the Contract Documents the following terms, or pronouns in place of them, are used, the intent and meaning, unless a different intent or meaning is clearly indicated, shall be interpreted as set forth below.

The titles and headings of the Sections, Subsections and Articles herein are intended for convenience of reference and shall not be considered as having bearing on their interpretation.

Whenever used in the Specifications or other Contract Documents the following terms have the meaning indicated which are applicable to both the singular and plural thereof. Working titles which have a masculine gender, are intended to refer to persons of either sex.

Terms not defined below shall have their ordinary accepted meanings within the context which they are used. "Webster's Third New International Dictionary of the English Language, Unabridged, Copyright 1961", or subsequent revision thereof, shall provide ordinarily accepted meanings. Words which have a well-known technical or trade meaning when used to describe Work, materials or equipment shall be interpreted in accordance with such meaning.

Addenda: All clarifications, corrections, or changes issued graphically or in writing by the Owner after the Invitation to Bid but prior to the opening of Bids.

Application for Payment: The form provided by the Owner which is used by the Contractor in requesting progress or Final payments and which is to include such supporting documentation as is required by the Contract Documents.

Approved or Approval: Means written approval by the Owner or his authorized representative as defined in paragraph 2.1.

ARRC Procurement Rules: Means the Rules governing the procurement of supplies, services, professional services and construction adopted by ARRC in accordance with A.S. 36.30.015(e). Said Rules may be downloaded from ARRC's web site, www.alaskarailroad.com, under General Information, Purchasing/Contracts.

A.S.: Initials which stand for Alaska Statute.

Award: The acceptance, by the Owner, of the successful Bid.

Bid: The offer of a Bidder, on the prescribed form to perform the Work in accordance with the Contract Documents at the prices quoted.

Bid Bond: The security furnished with a Bid to guarantee that the Bidder will enter into a Contract if his Bid is accepted by the Owner.

Bidder: Any individual, firm, corporation or any acceptable combination thereof, or joint venture submitting a Bid for the advertised Work.

Calendar Day: Every day shown on the calendar, beginning and ending at midnight.

Change Order: A written order by the Owner directing changes to the Contract, within its general scope.

Conditions of the Contract: Those portions of the Contract Documents which define the rights and responsibilities of the contracting parties and of others involved in the Work. The Conditions of the Contract include General Conditions, Supplementary Conditions and other Conditions specified in the Invitation to Bid.

Contract: The Contract Documents form the Contract between the Owner and the Contractor for the Work to be performed. The Contract represents the entire and integrated agreement between the parties hereto and supersedes prior negotiations, representations or agreements, either written oral.

Contract Documents: The Contract Form, Addenda, the bidding requirements and Contractor's Bid (including all appropriate bid tender forms), the Bonds, the Conditions of the Contract and all other Contract requirements, the Specifications, and the Drawings furnished by the Owner to the Contractor, together with all Change Orders and documents approved by the Contracting Officer for inclusion, modifications and supplements issued on or after the Effective Date of the Contract.

Contracting Officer: The person authorized to enter into and administer the Contract on behalf of the Owner. He has authority to make findings, determinations and decisions with respect to the Contract and, when necessary, to modify or terminate the Contract.

Contractor: The individual, firm, corporation or any acceptable combination thereof, contracting with the Owner for performance of the Work.

Contract Amount: The total moneys payable by the Owner to the Contractor under the terms of the Contract Documents.

Contract Time: The number of Calendar Days or the date specified in the Contract and authorized time extensions which identify how much time the Contractor is allowed to achieve Final Completion.

Consultant: A person, firm, agency or corporation retained by the Owner to prepare Contract Documents, perform construction administration services, or other Project related services.

Defective: An adjective which refers to Work that is unsatisfactory, faulty or deficient, or does not conform to the Contract Documents, or does not meet the requirements of any inspection, reference standard, test or Approval referred to in the Contract Documents, or has been damaged prior to the Owner's Approval of Final payment.

Directive: A written communication to the Contractor from the Owner interpreting or enforcing a Contract requirement or ordering commencement of an item of Work.

Drawings: The drawings which show the character and scope of the Work to be performed and which have been furnished by the Owner or the Owner's Consultant and are by reference made a part of the Contract Documents.

Effective Date of the Contract: The date on which the Contract is fully executed by both Contractor and the Owner.

Final Completion: The Work (or specified part thereof) has progressed to the point that all Work is complete as determined by the Owner.

General Requirements: Sections of the Contract Documents which contain administrative and procedural requirements as well as requirements for temporary facilities.

Holidays: The Owner recognizes the following Holidays:

New Years Day - January 1
President's Day - Third Monday in February
Memorial Day - Last Monday in May
Independence Day - July 4
Labor Day - First Monday in September
Columbus Day-Second Monday in October
Veteran's Day - November 11
Thanksgiving Day - Fourth Thursday in November
Christmas Day - December 25

If any Holiday listed above falls on a Saturday, Saturday and the preceding Friday are both legal Holidays. If the holiday should fall on a Sunday, Sunday and the following Monday are both legal Holidays.

Install: Means to build into the Work, ready to be used in complete and operable condition and in compliance with the Contract Documents.

Invitation to Bid: The public announcement, as required by law, inviting Bids for Work to be performed and/or materials to be furnished.

Notice of Intent to Award: The written notice by the Owner to all Bidders identifying the apparent successful Bidder and establishing the Owner's intent to execute the Contract when all conditions required for execution of the Contract are met.

Notice to Proceed: A written notice to the Contractor to begin the Work and establishing the date on which the Contract Time begins.

Owner: The Alaska Railroad Corporation ("ARRC") or its authorized representative(s).

Payment Bond: The security furnished by the Contractor and his Surety to guarantee payment of the debts arising out of performance of the Work.

Performance Bond: The security furnished by the Contractor and his Surety to guarantee performance and completion of the Work in accordance with the Contract Documents.

Project: The total construction, of which the Work performed under the Contract Documents is the whole or a part.

Project Manager: The authorized representative of the Owner who is responsible for administration of the Contract.

Regulatory Requirements: All laws, rules, regulations, ordinances, codes and/or orders applicable to the Work.

Shop Drawings: All Drawings, diagrams, illustrations, schedules and other data which are specifically prepared by or for the Contractor to illustrate some portion of the Work and all

illustrations, brochures, standard schedules, performance charts, instructions, diagrams and other information prepared by a supplier and submitted by the Contractor to illustrate material, equipment, fabrication, or erection for some portion of the Work.

Specifications: Those portions of the Contract Documents consisting of written technical descriptions of materials, equipment, construction systems, standards and workmanship as applied to the Work and certain administrative and procedural details applicable thereto.

Subcontractor: An individual, firm, or corporation to whom the Contractor sublets part of the Contract.

Substantial Completion: Although not fully completed, the Work (or a specified part thereof) has progressed to the point where, in the opinion of the Owner as evidenced by the Owner's written notice, it is sufficiently complete, in accordance with the Contract Documents, so that the Work (or specified part) can be utilized for the purposes for which it is intended. The terms "Substantially Complete" and "Substantially Completed" as applied to any Work refer to Substantial Completion thereof.

Supplemental Agreement: A written agreement between the Contractor and the Owner covering Work that is not within the general scope of the Contract.

Surety: The corporation, partnership, or individual, other than the Contractor, executing a bond furnished by the Contractor.

Unit Price Work: Work to be paid for on the basis of unit prices.

Work: Work is the act of, and the result of, performing services, furnishing labor, furnishing and incorporating materials and equipment into the Project and performing other duties and obligations, all as required by the Contract Documents. Such Work, however incremental, will culminate in the entire completed Project, or the various separately identifiable parts thereof.

2. ARTICLE 2 - AUTHORITIES AND LIMITATIONS:

2.1 AUTHORITIES AND LIMITATIONS:

2.1.1 The Owner alone, shall have the power to bind the Owner and to exercise the rights, responsibilities, authorities and functions vested in the Owner by the Contract Documents, except that the Owner shall have the right to designate in writing authorized representatives to act for him.

2.1.2 Wherever any provision of the Contract Documents specifies an individual or organization, whether Governmental or private, to perform any act on behalf of or in the interests of the Owner that individual or organization shall be deemed to be the Owner's authorized representative under this Contract but only to the extent so specified.

2.1.3 The Owner may, at any time during the performance of this Contract, vest in any such authorized representatives additional power and authority to act for the Owner or designate additional representatives, specifying the extent of their authority to act for the Owner. A copy of each document vesting additional authority in or removing that authority from an authorized representative or designating an additional authorized representative shall be furnished to the Contractor.

2.1.4 The Owner reserves the right to appoint a new Project Manager without affecting any of the Contractor's obligations to the Owner under this Contract.

2.1.5 The Contractor shall perform the Work in accordance with any written order (including but not limited to instruction, direction, interpretation or determination) issued by an

authorized representative in accordance with the authorized representative's authority to act for the Owner.

2.1.6 The Contractor assumes all the risk and consequences of performing the Work in accordance with any order (including but not limited to instruction, direction, interpretation or determination) of anyone not authorized to issue such order, and of any order not in writing.

2.1.7 Should the Owner or his authorized representative designate Consultant(s) to act for the Owner as provided for in Paragraph 2.1.1, the performance or nonperformance of the Consultant under such authority to act, shall not give rise to any Contractual obligation or duty of the Consultant to the Contractor, any subcontractor, any supplier, or any other organization performing any of the Work or any Surety representing them.

2.1.8 The term "Owner" when used in the text of these General Conditions or other Contract Documents following this section shall also mean any duly authorized representative of the Owner when authorized in accordance with Paragraph 2.1.1.

2.2 EVALUATIONS BY OWNER:

2.2.1 The Owner will decide all questions which may arise as to:

2.2.1.1 Quality and acceptability of materials furnished;

2.2.1.2 Quality and acceptability of Work performed;

2.2.1.3 Compliance with the Schedule of Progress;

2.2.1.4 Interpretation of Contract Documents;

2.2.1.5 Acceptable fulfillment of the Contract on the part of the Contractor.

2.2.2 In order to avoid cumbersome terms and confusing repetition of expressions in the Contract Documents, whenever the terms "as ordered", "as directed", "as required", "as approved", or terms of like effect or import are used, or the adjectives "reasonable", "suitable", "acceptable", "proper" or "satisfactory" or adjectives of like effect or import are used it shall be understood as if the expression were followed by the words "the Owner".

2.2.3 When such terms are used to describe a requirement, direction, review or judgment of the Owner as to the Work, it is intended that such requirement, direction, review or judgment will be solely to evaluate the Work for compliance with the Contract Documents (unless there is a specific statement indicating otherwise).

2.2.4 The use of any such term or adjective shall not be effective to assign to the Owner any duty or authority to supervise or direct the furnishing or performance of the Work or any duty or authority to undertake responsibility contrary to the provisions of paragraphs 2.3 or 2.4.

2.3 MEANS & METHODS:

2.3.1 The means, methods, techniques, sequences or procedures of construction, or safety precautions and the program incident thereto, and the failure to perform or furnish the Work in accordance with the Contract Documents are the sole responsibility of the Contractor.

2.4 VISITS TO SITE:

2.4.1 The Owner will make visits to the site, off-site fabrication sites and approved remote storage sites at intervals appropriate to the various stages of construction to observe the progress and quality of the executed Work and to determine, in general, if the Work is proceeding in accordance with the Contract Documents.

2.4.2 Such observations or the lack of such observations shall in no way relieve the Contractor from his duty to perform the Work in accordance with the Contract Documents.

3. ARTICLE 3 - CONTRACT DOCUMENTS: INTENT, AMENDING, REUSE:

3.1 INCOMPLETE CONTRACT DOCUMENTS:

3.1.1 The execution of the Contract by the Contractor is considered a representation that the Contractor examined the Contract Documents to make certain that all sheets and pages were

provided and that the Contractor is satisfied as to the conditions to be encountered in performing the Work.

3.1.2 The Owner expressly denies any responsibility or liability for a Bid submitted on the basis of an incomplete set of Contract Documents.

3.2 COPIES OF CONTRACT DOCUMENTS:

3.2.1 The Owner shall furnish to the Contractor up to five copies of the Contract Documents.

3.2.2 Additional copies will be furnished, upon request, at the cost of reproduction stated in the Invitation to Bid.

3.3 SCOPE OF WORK:

3.3.1 The Contract Documents comprise the entire Contract between the Owner and the Contractor concerning the Work.

3.3.2 The Contract Documents are complementary; what is called for by one is as binding as if called for by all. The Contract Documents will be construed in accordance with the Regulatory Requirements of the place of the Project.

3.3.3 It is specifically agreed between the parties executing this Contract that it is not intended by any of the provisions of the Contract to create in the public or any member thereof a third party benefit, or to authorize anyone not a party to this Contract to maintain a suit pursuant to the terms or provisions of the Contract.

3.4 INTENT OF CONTRACT DOCUMENTS:

3.4.1 It is the intent of the Contract Documents to describe a functionally complete Project to be constructed in accordance with the Contract Documents.

3.4.2 Any work, materials or equipment that may reasonably be inferred from the Contract Documents as being required to produce the intended result will be supplied, without any adjustment in Contract Amount or Contract Time, whether or not specifically called for.

3.4.3 Reference to standard specifications, manuals or codes of any technical society, organization or association, or to the Regulatory Requirements of any governmental authority, whether such reference be specific or by implication, shall mean the edition stated in the Contract Documents or if not stated the latest standard specification, manual, code or Regulatory Requirements in effect at the time of advertisement for the Project (or, in the Effective Date of the Contract if there was no advertisement).

3.4.4 However, no provision of any referenced standard specification, manual or code (whether or not specifically incorporated by reference in the Contract Documents) shall be effective to change the duties and responsibilities of the Owner and the Contractor, or any of their Consultants, agents or employees from those set forth in the Contract Documents, nor shall it be effective to assign to the Owner or any of the Owner's Consultants, agents or employees, any duty or authority to supervise or direct the furnishing or performance of the Work or any duty or authority to undertake responsibility contrary to the provisions of paragraphs 2.3 or 2.4.

3.4.5 Unless otherwise specified 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.

3.5 DISCREPANCY IN CONTRACT DOCUMENTS:

3.5.1 Before undertaking the Work, the Contractor shall carefully study and compare the Contract Documents and check and verify pertinent figures, and dimensions shown thereon and all applicable field measurements.

3.5.2 Work in the area by the Contractor shall imply verification of figures, dimensions and field measurements.

3.5.3 If, during the above study or during the performance of the Work, the Contractor finds a conflict, error, discrepancy or omission in the Contract Document, or a discrepancy between the Contract Documents and any standard specification, manual, code, or regulatory requirement which affects the Work, the Contractor shall promptly report such discrepancy in writing to the Owner.

3.5.4 The Contractor shall obtain a written interpretation or clarification from the Owner before proceeding with any Work affected thereby.

3.5.5 Any adjustment made by the Contractor without this determination shall be at his own risk and expense.

3.5.6 However, the Contractor shall not be liable to the Owner for failure to report any conflict, error or discrepancy in the Contract Documents unless the Contractor had actual knowledge thereof or should reasonably have know thereof.

3.6 DISCREPANCY - ORDER OF PRECEDENCE:

3.6.1 When conflicts, errors, or discrepancies within the Contract Documents exist, the order of precedence from most governing to least governing will be as follows:

3.6.1.1 Supplementary Conditions

3.6.1.2 General Conditions

3.6.1.3 Technical Specification

3.6.1.4 Drawings

3.6.1.5 Standard Construction Details

3.6.1.6 Standard Specifications

3.6.2 The Contractor shall not take advantage of any apparent error or omission in the Contract Documents. If the Contractor discovers an error or omission, the Owner shall be promptly notified. The Owner will make corrections and interpretation as necessary to fulfill the intent of the Contract. Scaled measurements shall not be used when the dimensions on the plan are given or can be computed.

3.7 CLARIFICATIONS AND INTERPRETATIONS:

3.7.1 The Owner will issue with reasonable promptness such written clarifications or interpretations of the requirements of the Contract Documents as the Owner may determine necessary, which shall be consistent with or reasonably inferable from the overall intent of the Contract Documents.

3.8 REUSE OF DOCUMENTS:

3.8.1 Neither the Contractor nor any subcontractor, or supplier or other person or organization performing or furnishing any of the Work under a direct or indirect Contract with the Owner shall have or acquire any title to or ownership rights in any of the Contract Documents (or copies thereof) prepared by or for the Owner and they shall not reuse any of the Contract Documents on extensions of the Project or any other Project without written consent of the Owner.

3.8.2 Contract Documents prepared by the Contractor in connection with the Work shall become the property of the Owner.

4. ARTICLE 4 - LANDS AND PHYSICAL CONDITIONS:

4.1 AVAILABILITY OF LANDS:

4.1.1 The Owner shall furnish as indicated in the Contract Documents, the lands upon which the Work is to be performed, rights-of-way and easements for access thereto, and such other lands which are designated for use of the Contractor in connection with the Work.

4.1.2 Easements for permanent structures or permanent changes in existing facilities will be obtained and paid for by the Owner, unless otherwise provided in the Contract Documents.

4.1.3 The Contractor shall provide for all additional lands and access thereto that may be required for temporary construction facilities or storage of materials and equipment.

4.2 VISIT TO SITE:

4.2.1 The execution of the Contract by the Contractor is considered a representation that the Contractor has visited and carefully examined the site and is satisfied as to the conditions to be encountered in performing the Work and as to the requirements of the Contract Documents.

4.3 EXPLORATIONS AND REPORTS:

4.3.1 Reference is made to the Supplementary Conditions for identification of those reports of explorations and tests of subsurface conditions at the site that have been utilized by the Owner in preparation of the Contract Documents.

4.3.2 The Contractor may for his purposes rely upon the accuracy of the factual data contained in such reports, but not upon interpretations or opinions drawn from such factual data contained therein or for the completeness or sufficiency thereof.

4.3.3 Except as indicated in the immediately preceding sentence and in paragraphs 4.4 and 9.9, Contractor shall have full responsibility with respect to surface and subsurface conditions at the site.

4.4 UTILITIES:

4.4.1 The horizontal and vertical locations of known underground utilities as shown or indicated by the Contract Documents are approximate and are based on information and data furnished to the Owner by the owners of such underground utilities.

4.4.2 The Contractor shall have full responsibility for:

4.4.2.1 Reviewing and checking all information and data concerning utilities.

4.4.2.2 Locating all underground utilities shown or indicated in the Contract Documents which are affected by the Work.

4.4.2.3 Coordination of the Work with the owners of all utilities during construction.

4.4.2.4 Safety and protection of all utilities as provided in paragraph 6.16.

4.4.2.5 Repair of any damage to utilities resulting from the Work in accordance with paragraphs 4.4.4 and 4.5.

4.4.3 If Work is to be performed by any utility owner, the Contractor shall cooperate with such owner to facilitate the Work.

4.4.4 In the event of interruption to any utility service as a result of accidental breakage or as a result of being exposed or unsupported, the Contractor shall promptly notify the utility owner and the Owner.

4.4.5 If service is interrupted repair Work shall be continuous until the service is restored.

4.4.6 No Work shall be undertaken around fire hydrants until provisions for continued service have been approved by the local fire authority.

4.5 DAMAGED UTILITIES:

4.5.1 When utilities are damaged by the Contractor, the utility owner shall have the choice of repairing the utility or having the Contractor repair the utility.

4.5.2 In the following circumstances, the Contractor shall reimburse the utility Owner for repair costs or provide at no cost to the utility owner or the Owner, all materials, equipment and labor necessary to complete repair of the damage:

4.5.2.1 When the utility is shown or indicated in the Contract Documents.

4.5.2.2 When the utility has been located by the utility owner.

4.5.2.3 When no locate was requested by the Contractor for utilities shown or indicated in the Contract Documents.

4.5.2.4 All visible utilities.

4.5.2.5 When the Contractor could have, otherwise, reasonably been expected to be aware of such utility.

4.6 UTILITIES NOT SHOWN OR INDICATED:

4.6.1 If, while directly performing the Work, an underground utility is uncovered or revealed at the site which was not shown or indicated in the Contract Documents and which the Contractor could not reasonably have been expected to be aware of, the Contractor shall, promptly after becoming aware thereof and before performing any Work affected thereby (except in an emergency as permitted by paragraph 6.18) identify the Owner of such underground facility and give written notice thereof to that owner and to the Owner.

4.6.2 The Owner will promptly review the underground utility to determine the extent to which the Contract Documents and the Work should be modified to reflect the impacts of the discovered utility.

4.6.3 The Contract Documents will be amended or supplemented to the extent necessary through the issuance of a Change Order by the Owner.

4.6.4 During such time, the Contractor shall be responsible for the safety and protection of such underground utility as provided in paragraph 6.16.

4.6.5 The Contractor may be allowed an increase in the Contract Amount or an extension of the Contract Time, or both, to the extent that they are directly attributable to the existence of any underground utility that was not shown or indicated in the Contract Documents and which the Contractor could not reasonably have been expected to be aware of.

4.7 SURVEY CONTROL:

4.7.1 The Owner will identify sufficient horizontal and vertical control data to enable the Contractor to survey and layout the Work.

4.7.2 All survey control work shall be performed under the direct supervision of a registered Land Surveyor.

4.7.3 Upon completion of survey work, all equipment and unused materials shall be removed and the Owner's property shall be left in a neat and clean condition satisfactory to the Owner.

4.7.4 Should the Contractor or its subcontractor fail to comply with the preceding subparagraph, the Owner may perform the required clean-up. All Owner costs and expenses for performing this work shall be collected from the Contractor.

5. ARTICLE 5 - BONDS, INSURANCE, AND INDEMNIFICATION:

5.1 DELIVERY OF BONDS:

5.1.1 When the Contractor delivers the executed Contract to the Owner, the Contractor shall also deliver to the Owner such bonds as the Contractor may be required to furnish in accordance with paragraph 5.2.

5.2 BONDS:

5.2.1 The Contractor shall furnish Performance and Payment Bonds, each in an amount as shown on the Contract as security for the faithful performance and payment of all Contractor's obligations under the Contract Documents.

5.2.2 These bonds shall remain in effect for one year after the date of Final Completion and until all obligations under this Contract, except special guarantees as per paragraph 12.7, have been met.

5.2.3 All bonds shall be furnished on forms provided by the Owner (or copies thereof) and shall be executed by such Sureties as are authorized to do business in the State of Alaska.

5.2.4 The Owner may at his option copy the Surety with notice of any potential default or liability.

5.3 REPLACEMENT OF BOND AND SURETY:

5.3.1 If the Surety on any bond furnished in connection with this Contract is declared bankrupt or becomes insolvent or its right to do business is terminated in any state where any part of the Project is located or it ceases to meet the requirements of paragraph 5.2, or otherwise becomes unacceptable to the Owner, or if any such Surety fails to furnish reports as to his financial condition as requested by the Owner, the Contractor shall within five days thereafter substitute another bond and Surety, both of which must be acceptable to Owner.

5.4 INSURANCE REQUIREMENTS:

5.4.1 The Contractor shall carry and maintain throughout the life of this Contract, at its own expense, insurance not less than the amounts and coverage herein specified, and the Owner shall be named as an additional named insured under the insurance coverage so specified, with respect to the performance of the Work.

5.4.2 There shall be no right of subrogation against the Owner or its agents performing work in connection with the Work, and this waiver of subrogation shall be endorsed upon the policies.

5.4.3 Insurance shall be placed with the companies acceptable to the Owner, and these policies providing coverage thereunder shall contain provisions that no cancellation or material changes in the policy shall become effective except upon 30 days prior written notice thereof to the Owner.

5.4.4 Prior to commencement of the Work, the Contractor shall furnish certificates to the Owner, in duplicate, evidencing that the insurance policy provisions required hereunder are in force.

5.4.5 Acceptance by the Owner of deficient evidence of insurance does not constitute a waiver of Contract insurance requirements.

5.4.6 The Contractor shall furnish the Owner with certified copies of policies upon request. The minimum coverages and limits required are as follows:

5.4.7 Worker's Compensation insurance in accordance with the statutory coverages required by the State of Alaska and Employers Liability insurance with limits not less than \$1,000,000 and, where applicable, insurance in compliance with any other statutory obligations, whether State or Federal, pertaining to the compensation of injured employees assigned to the Work, including but not limited to Voluntary Compensation, Federal Longshoremen and Harbor Workers Act, Maritime and the Outer Continental Shelf's Land Act and the Federal Employers Liability Act.

5.4.8 Commercial General Liability with limits not less than \$2,000,000 per occurrence and \$2,000,000 aggregate for Bodily Injury and Property Damage, including coverage for Premises and Operations Liability, Products and Completed Operations Liability, Contractual Liability, Broad Form Property Damage Liability and Personal Injury Liability. Coverage shall not contain any exclusions of Explosion, Collapse, or Underground.

5.4.9 Commercial Automobile Liability on all owned, non-owned, hired and rented vehicles with limits of liability of not less than \$1,000,000 Combined Single Limit for Bodily Injury and Property Damage per each accident or loss.

5.4.10 If Work involves use of aircraft, Aircraft Liability insurance covering all owned and non-owned aircraft with a per occurrence limit of not less than \$5,000,000.

5.4.11 If Work involves use of watercraft, Protection and Indemnity insurance with limits not less than \$5,000,000 per occurrence. Hull and Machinery coverage is to be carried on the vessel for the full current market value. This coverage requirement may be waived at the discretion of the Owner if the Contractor self-insures the equipment and will waive all rights of recovery against the Owner in writing.

5.4.12 Where applicable, Professional Liability insurance with limits of not less than \$1,000,000 per claim and \$2,000,000 aggregate, subject to a maximum deductible \$10,000 per

claim. The Owner has the right to negotiate increase of deductibles subject to acceptable financial information of the policyholder.

5.4.13 Where applicable, Pollution Liability insurance with a Project limit of not less than \$5,000,000 to include coverage for Asbestos, Hazardous Materials, Lead or other related environmental hazards.

5.4.14 Builder's Risk Insurance: Coverage shall be on an "All Risk" completed value basis and protect the interests of the Owner the Contractor and his subcontractors. Coverage shall include all materials, equipment and supplies that are intended for specific installation in the Project while such materials, supplies and equipment are located at the Project site and in transit from port of arrival to jobsite and while temporarily located away from the Project site.

5.4.15 All insurance policies as described above are required to be written on an "occurrence" basis. In the event occurrence coverage is not available, the Contractor agrees to maintain "claims made" coverage for a minimum of two years after Project Completion.

5.5 INDEMNIFICATION:

5.5.1 The Contractor shall indemnify, save harmless, and defend the Owner and its agents and its employees from any and all claims or actions for injuries or damages sustained by any person or property arising directly or indirectly from the Work or the Contractor's performance of this Contract; however, this provision has no effect if, but only if, the sole proximate cause of the injury or damage is the negligence of the Owner or its agents.

6. ARTICLE 6 - CONTRACTOR'S RESPONSIBILITIES:

6.1 SUPERVISION OF WORK:

6.1.1 The Contractor shall supervise and direct the Work competently and efficiently, devoting such attention thereto and applying such skills and expertise as may be necessary to perform the Work in accordance with the Contract Documents.

6.1.2 All Work under this Contract shall be performed in a skillful and workmanlike manner. The Contractor shall be solely responsible for the means, methods, techniques, sequences and procedures of construction.

6.1.3 The Contractor shall keep on the Work at all times during its progress a competent resident superintendent. The Owner shall be advised in writing of the superintendent's name, local address, and telephone number. This written advice is to be kept current until Final Completion.

6.1.4 The superintendent will be the Contractor's representative at the site and shall have full authority to act and sign documents on behalf of the Contractor.

6.1.5 All communications given to the superintendent shall be as binding as if given to the Contractor.

6.1.6 The Contractor shall cooperate with the Owner in every way possible.

6.2 CHARACTER OF WORKERS:

6.2.1 The Contractor shall provide a sufficient number of competent, suitable qualified personnel to survey and lay out the Work and perform construction as required by the Contract Documents.

6.2.2 The Contractor shall at all times maintain good discipline and order at the site.

6.2.3 The Owner may, in writing, require the Contractor to remove from the Work any employee the Owner deems incompetent, careless, or otherwise detrimental to the progress of the Work, but the Owner shall have no duty to exercise this right.

6.3 CONTRACTOR TO FURNISH:

6.3.1 Unless otherwise specified in the Contract Documents, the Contractor shall furnish and assume full responsibility for all materials, equipment and machinery, tools, appliances, fuel, power, light, heat, telephone, water, sanitary facilities, temporary facilities and all other facilities

and incidentals necessary for the furnishing, performance, testing, start-up and completion of the Work.

6.4 MATERIALS AND EQUIPMENT:

6.4.1 All materials and equipment shall be of specified quality and new, except as otherwise provided in the Contract Documents. If required by the Owner, the Contractor shall furnish satisfactory evidence (including reports of required tests) as to the kind and quality of materials and equipment.

6.4.2 All materials and equipment shall be applied, installed, connected, erected, used, cleaned, and conditioned in accordance with the instructions of the applicable Supplier except as otherwise provided in the Contract Documents; but no provision of any such instructions will be effective to assign to the Owner or any of the Owner's Consultants, agents or employees, any duty or authority to supervise or direct the furnishing or performance of the Work or any duty or authority to undertake responsibility contrary to the provisions of Paragraphs 2.3 or 2.4.

6.5 ANTICIPATED SCHEDULES:

6.5.1 The construction of this project shall be planned and recorded with a Critical Path Method ("CPM") schedule. The schedule shall be used for coordination and monitoring of all work under the contract including all activity of subcontractors, manufacturers, supplies, utility companies and review activity of the Owner. Within a reasonable time prior to the preconstruction conference, the Contractor shall submit for Owner's approval, a detailed initial CPM schedule. The schedule shall meet the requirements set forth below. The construction time for the entire project shall not exceed the specified Contract Time. Following the Owner's review, if revisions to the proposed CPM schedule are required, the Contractor shall do so promptly. The CPM schedule must be finalized within 30 days of the Notice to Proceed.

6.5.2 The CPM schedule shall be presented as a Precedence Diagram Network developed in the activity-on-node format and shall include a description of no less than 15 major project activities, the duration of each of the project activities, the resources required for each of the project activities, including:

6.5.2.1 Labor, showing workdays per week, holidays, shifts per day, men per shift, and hours per shift;

6.5.2.2 Equipment, including the number of units of each type of equipment; and

6.5.2.3 Materials.

6.5.3 Owner reserves the right to adjust or add to the required project activities.

6.5.4 The activity-on-node diagram shall show the sequence and interdependence of all activities required for complete performance of all items of Work under this Contract, including shop drawings submittals and reviews and fabrication and delivery activities. No activity duration shall be longer than 15 working days without the Owner's approval. Owner reserves the right to limit the number of activities on the schedule.

6.5.5 Before proceeding with any Work on site, the Contractor shall prepare, submit, and receive the Owner's approval of a 60-Day Preliminary Schedule. The Preliminary Schedule shall provide a detailed breakdown of activities scheduled for the first 60 days of the project and summary of activities for Work beyond 60 days. Said schedule shall include mobilization, submittals, procurement, and construction.

6.5.6 No Work may be pursued at the site without an approved 60-Day Preliminary Schedule or an approved CPM schedule. A Finalized CPM Schedule with detailed breakdown of activities for the entire contract period shall be submitted prior to the first progress payment and accepted prior to application of the second progress payment. The Contractor shall create a baseline schedule of the Accepted Finalized Schedule.

6.5.7 Within fifteen days after the date of the Notice to Proceed, the Contractor shall submit to the Owner for review: anticipated schedule of Shop Drawing submissions, and anticipated Schedule of Values for all of the Work which will include quantities and prices of items

aggregating the Contract Amount and will subdivide the Work into no less than 15 line item component parts to serve as the basis for progress payments during construction.

6.5.8 Such prices will include an appropriate amount of overhead and profit applicable to each item of Work which will be confirmed in writing by the Contractor at the time of submission

6.5.9 The CPM schedule shall be submitted in an MS Project format. For each submittal required hereunder, Contractor shall submit one copy in an electronic format and one hard copy.

6.6 FINALIZING SCHEDULES:

6.6.1 Prior to processing the first Application for Payment, the Owner and the Contractor will finalize the schedules required by paragraph 6.5.

6.6.2 Acceptance by the Owner of the progress schedule will neither impose on the Owner nor relieve the Contractor from full responsibility for the progress or scheduling of the Work.

6.6.3 If accepted, the Finalized Schedule of Shop Drawings and other required submissions will be acceptable to the Owner as providing a workable arrangement for processing the submissions. If accepted the Finalized Schedule of Values will be acceptable to the Owner as an approximation of anticipated value of Work accomplished over the anticipated Contract Time.

6.6.4 Receipt and acceptance of a schedule submitted by the Contractor shall not be construed to assign responsibility for performance or contingencies to the Owner or relieve the Contractor of his responsibility to adjust his forces, equipment, and work schedules as may be necessary to insure completion of the Work within prescribed Contract Time.

6.6.5 Should the prosecution of the Work be discontinued for any reason, the Contractor shall notify the Owner at least 24 hours in advance of resuming operations.

6.7 ADJUSTING SCHEDULES:

6.7.1 Job site progress meetings will be held bi-weekly by the Owner and the Contractor for the purpose of updating the CPM schedule. Progress will be reviewed to verify finish dates of completed activities, remaining duration of uncompleted activities, and any proposed logic and/or time estimate revisions. The Contractor shall submit a reviewed CPM schedule within seven (7) calendar days after this meeting. The revised schedule shall show finish dates of completed activities and updated times for the remaining Work, including any addition, deletion, or revision of activities required by contract modification. In submitting a revised CPM schedule, the Contractor shall state specifically the reason for the revision and the adjustments made in this schedule or methods of operation to ensure completion of all Work within the Contract Time.

6.7.2 The Contract Time will be adjusted only for causes specified in this Contract. As determined by CPM analysis, only delays in activities, which affect milestones dates or contract completion dates will be considered for a time extension. It is understood and agreed by the Owner and the Contractor that float is shared equally. Project float is the time between the scheduled completion of the Work and Substantial Completion and is a resource available to both the Owner and the Contractor. Neither owns the float: the Project owns the float. As such, liability for delay of the Substantial Completion date rests with the party whose actions, last in time, actually cause delay to the Substantial Completion date.

6.7.3 In addition to the CPM schedule, every week during construction, the Contractor shall submit a work plan detailing his/her proposed operations for the forthcoming two (2) weeks. The work plan presented shall be a time scaled Two Week Look Ahead bar chart based and correlated by activity number to the current schedule. In the event portions of the Work affecting critical milestone dates or contract completion dates are in danger of being delayed, or actually are delayed, the Contractor shall develop and present a plan for remedial action. This plan shall detail the following:

6.7.3.1 work activities;

6.7.3.2 manpower involved by trade;

- 6.7.3.3 work hours;
- 6.7.3.4 equipment involved; and
- 6.7.3.5 the location of the work to be performed.

6.7.4 Preparation and updating of the CPM schedule and Two Week Work Plans will not be paid for directly. Failure to submit the CPM work schedule and Two Week Work Plans as specified will result in partial withholding of progress payments.

6.8 SUBSTITUTES OR "OR-EQUAL" ITEMS:

6.8.1 Whenever materials or equipment are specified or described in the Contract Documents by using the name of a proprietary item or the name of a particular Supplier the naming of the item is intended to establish the type, function and quality required.

6.8.2 Unless the name is followed by words indicating that no substitution is permitted, materials or equipment of other Suppliers may be accepted by the Owner only if sufficient information is submitted by the Contractor which clearly demonstrates to the Owner that the material or equipment proposed is equivalent or equal in all aspects to that named.

6.8.3 Requests for review of substitute items of material and equipment will not be accepted by the Owner from anyone other than the Contractor.

6.8.4 If the Contractor wishes to furnish or use a substitute item of material or equipment, the Contractor shall make written application to the Owner for acceptance thereof, certifying that the proposed substitute will perform adequately the functions and achieve the results called for by the general design, be similar and of equal substance to that specified and be suited to the same use as that specified.

6.8.5 The application will state that the evaluation and acceptance of the proposed substitute will not delay the Contractor's achievement of Substantial Completion on time, whether or not acceptance of the substitute for use in the Work will require a change in any of the Contract Documents (or in the provisions of any other direct Contract with the Owner for Work on the Project) to adapt the design to the proposed substitute and whether or not incorporation or use of the substitute in connection with the Work is subject to payment of any license fee or royalty.

6.8.6 All variations of the proposed substitute from that specified will be identified in the application and available maintenance, repair and replacement service will be indicated.

6.8.7 The application will also contain an itemized estimate of all costs that will result directly or indirectly from acceptance of such substitute, including costs of redesign and claims of other contractors affected by the resulting change, all of which shall be considered by the Owner in evaluating the proposed substitute.

6.8.8 The Owner may require the Contractor to furnish at the Contractor's expense additional data about the proposed substitute.

6.8.9 The Owner may reject any substitution request which the Owner determines is not in the best interest of the Owner.

6.9 SUBSTITUTE MEANS AND METHODS:

6.9.1 If a specific means, method, technique, sequence or procedure of construction is indicated in or required by the Contract Documents, the Contractor may furnish or utilize a substitute means, method, sequence, technique or procedure of construction acceptable to the Owner, if the Contractor submits sufficient information to allow the Owner to determine that the substitute proposed is equivalent to that indicated or required by the Contract Documents.

6.10 EVALUATION OF SUBSTITUTION:

6.10.1 The Owner will be allowed a reasonable time within which to evaluate each proposed substitute. The Owner will be the sole judge of acceptability, and no substitute will be ordered, installed or utilized without the Owner's prior written acceptance which will be evidenced by either a Change Order or a Shop Drawing approved in accordance with paragraphs 6.19 and

6.20. The Owner may require the Contractor to furnish at the Contractor's expense a special Performance Bond or other Surety with respect to any substitute.

6.11 DIVIDING THE WORK:

6.11.1 The divisions and sections of the Specifications and the identifications of any Drawings shall not control the Contractor in dividing the Work among subcontractors or suppliers or delineating the Work to be performed by any specific trade, except as required by law.

6.12 SUBCONTRACTORS:

6.12.1 The Contractor may utilize the services of licensed specialty subcontractors on those parts of the Work which, under normal contracting practices, are performed by licensed specialty subcontractors, in accordance with the following conditions:

6.12.2 The Contractor shall not award any Work to any subcontractor without prior written Approval of the Owner. This Approval will not be given until the Contractor submits to the Owner a written statement concerning the proposed award to the subcontractor which shall contain required E.E.O. Documents, evidence of insurance, and a copy of the proposed subcontract executed by the subcontractor.

6.12.3 No acceptance by the Owner of any such subcontractor shall constitute a waiver of any right of the Owner to reject Defective Work.

6.12.4 The Contractor shall be fully responsible to the Owner for all acts and omissions of the subcontractors, suppliers and other persons and organizations performing or furnishing any of the Work under a direct or indirect Contract with Contractor just as Contractor is responsible for Contractor's own acts and omissions.

6.12.5 All Work performed for Contractor by a subcontractor will be pursuant to an appropriate written agreement between Contractor and the subcontractor which specifically binds the subcontractor to the applicable terms and conditions of the Contract Documents for the benefit of the Owner and contains waiver provisions as required by paragraph 13.17 and termination provisions as required by Article 14.

6.12.6 Nothing in the Contract Documents shall create any contractual relationship between the Owner and any such subcontractor, supplier or other person or organization, nor shall it create any obligation on the part of the Owner to pay or to see to the payment of any moneys due any such subcontractor, supplier or other person or organization except as may otherwise be required by Regulatory Requirements.

6.12.7 The Owner will not undertake to settle any differences between or among the Contractor, subcontractors, or suppliers.

6.12.8 The Contractor and subcontractors shall coordinate their Work and facilitate general progress of Work.

6.12.9 Each trade shall afford other trades every reasonable opportunity for installation of their Work and storage of materials.

6.12.10 If cooperative Work of one trade must be altered due to lack of proper supervision, or failure to make proper provisions in time by another trade, such conditions shall be remedied by the Contractor with no change in Contract Amount or Contract Time.

6.12.11 The Contractor shall include on his own payrolls any person or persons working on the Contract who are not covered by written subcontract, and shall ensure that all subcontractors include on their payrolls all persons performing Work under the direction of the subcontractor.

6.13 USE OF PREMISES:

6.13.1 The Contractor shall confine construction equipment, the storage of materials and equipment and the operations of workers to the Project limits and approved remote storage sites and lands and areas identified in and permitted by Regulatory Requirements, rights-of-way,

permits and easements, and shall not unreasonably encumber the premises with construction equipment or other materials or equipment.

6.13.2 The Contractor shall assume full responsibility for any damage to any such land or area, or to the owner or occupant thereof or of any land or areas contiguous thereto, resulting from the performance of the Work.

6.13.3 Should any claim be made against the Owner by any such owner or occupant because of the performance of the Work, the Contractor shall defend, indemnify and hold the Owner and its agents harmless therefrom.

6.14 STRUCTURAL LOADING:

6.14.1 The Contractor shall not load nor permit any part of any structure to be loaded in any manner that will endanger the structure, nor shall the Contractor subject any part of the Work or adjacent property to stresses or pressures that will endanger it.

6.15 RECORD DOCUMENTS:

6.15.1 The Contractor shall maintain in a safe place at the site one record copy of all Drawings, Specifications, Addenda, Field Memos, Work Orders, Change Orders, Supplemental Agreements, and written interpretations and clarifications issued pursuant to paragraph 3.7 in good order and annotated to show all changes made during construction.

6.15.2 Copies of these record documents together with all approved samples and a counterpart of all approved Shop Drawings shall be provided to the Owner on site.

6.15.3 Upon completion of the Work, the annotated record documents, samples and Shop Drawings will be delivered to the Owner.

6.15.4 Record documents shall accurately record variations in the Work which vary from requirements shown or indicated in the Contract Documents.

6.16 SAFETY AND PROTECTION:

6.16.1 The Contractor alone shall be responsible for initiating, maintaining and supervising all safety precautions and programs in connection with the Work.

6.16.2 The Contractor shall take all necessary precautions for the safety of, and shall provide the necessary protection to prevent damage, injury or loss to:

6.16.2.1 All employees on the Work and other persons and organizations who may be affected thereby;

6.16.2.2 All the Work and materials and equipment to be incorporated therein, whether in storage on or off the site; and

6.16.2.3 Other property at the site or adjacent thereto, including trees, shrubs, lawns, walks, pavements, roadways, structures, and utilities not designated for removal, relocation or replacement in the course of construction.

6.16.3 In the performance of this contract, the Contractor shall comply with all applicable Federal, State, and local laws governing safety, health, and sanitation. The contractor shall provide all safeguards, safety devices and protective equipment and take any other needed actions as it determines, or as the Owner may determine, to be reasonably necessary to protect the life and health of employees on the job and the safety of the public and to protect property in connection with the performance of the Work covered by the contract.

It is a condition of this contract, and shall be made a condition of each subcontract entered into pursuant to this contract, that the Contractor and any subcontractor shall not permit any employee in performance of the contract, to work in surroundings or under conditions which are unsanitary, hazardous, or dangerous to his/her health or safety, as determined under the OSHA construction safety and health standards (29 CFR 1926) promulgated by the Secretary of Labor, in accordance with Section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C. 333).

Pursuant to 29 CFR 1926.3, it is a condition of this contract that the Secretary of Labor or authorized representative thereof, shall have right of entry to any site of contract performance to inspect or investigate the matter of compliance with the construction safety and health standards and to carry out the duties of the Secretary under Section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C. 333).

6.16.4 The Contractor shall notify owners of adjacent property and utility owners when prosecution of the Work may affect them, and shall cooperate with them in the protection, removal, relocation and replacement of their property.

6.16.5 All damage, injury or loss to any property caused, directly or indirectly, in whole or in part, by the Contractor, any Subcontractor, supplier or any other person or organization directly or indirectly employed by any of them to perform or furnish any of the Work or anyone for whose acts any of them may be liable, shall be remedied by the Contractor with no change in Contract Amount or Contract Time except as stated in paragraph 4.6, except damage or loss attributable to unforeseeable causes beyond the control of and without the fault or negligence of the Contractor, including but not restricted to acts of God, or the public enemy or governmental authorities.

6.16.6 The Contractor's duties and responsibilities for the safety and protection of the Work shall continue until Final Completion except as otherwise expressly provided in connection with Substantial Completion.

6.16.7 The Contractor shall designate a responsible safety representative at the site. This person shall be the Contractor's superintendent unless otherwise designated in writing by the Contractor to the Owner.

6.17 WORK SAFETY ON RAILROAD PROPERTY:

6.17.1 The safety of personnel, property, rail operations, and the public is of paramount importance in the prosecution of the Work pursuant to this contract. As reinforcement and in furtherance of overall safety measures to be observed by Contractor (and not by way of limitation), the following special safety rules shall be followed while working on Alaska Railroad Corporation ("ARRC") property. Further railroad safety information may be obtained from the ARRC Safety Office at 907-265-2440. Safety information is also available on the ARRC website at www.alaskarailroad.com.

6.17.2 In the event Contractor or its subcontractor will be performing construction or other activities on or in close proximity to a railroad track, the Contractor shall be responsible for compliance with the Federal Railroad Administration's Roadway Worker Protection ("RWP") regulations (49 CFR 214, Subpart C). Under 49 CFR 214, Subpart C, railroad contractors are responsible for the training of their employees on these regulations. All RWP related Work shall be conducted in strict compliance with the RWP safety standards set forth in 49 CFR 214, Subpart C and the Contractor will be required to submit a Railroad Safety Plan to ARRC to demonstrate compliance with said safety standards prior to beginning any RWP related Work. Specific information on Railroad Safety Plans may be obtained from the ARRC Safety Office at 907-265-2440.

6.17.3 In the event Contractor will be performing construction or other activities on a railroad bridge, the provisions of 49 CFR 214 regarding bridge worker safety shall apply. All bridge related Work shall be conducted in strict compliance with the bridge worker safety standards set forth in 49 CFR 214 and the Contractor will be required to submit a Railroad Safety Plan to ARRC to demonstrate compliance with said safety standards prior to beginning any bridge related Work.

6.17.4 Contractor shall arrange with ARRC to keep itself informed on the time of arrival of all trains and shall stop any of Contractor's or Subcontractor's operations which might be or cause a hazard to the safe passage of the train past the Work site from 10 minutes before the expected arrival of the train until it has passed or at any other time as directed by the flagman.

6.17.5 ARRC flag protection is required before any activity can occur on or near a railroad operating facility such as a track, yard, bridge or shop building. For incidental work, such as

surveying or inspection, an ARRC qualified flagman will provide a safety briefing prior to the commencement of the Work to discuss how and when protection from train traffic is to be provided. For any activity involving a disturbance or potential disturbance to the track, track embankment, or any railroad facility, ARRC may require a specific Railroad Safety Plan prior to startup. Projects which involve activities which cross the tracks or are longitudinal to the tracks will require a specific Railroad Safety Plan and a one hour ARRC provided training course for Contractor's project supervisors prior to the initiation of Work on ARRC property.

6.17.6 The Contractor and/or Subcontractor shall arrange for ARRC flag protection when performing any Work within 20 feet of any track. All Work within 20 feet of the track shall cease when a train passes and all Contractor and Subcontractor employees shall maintain a distance of at least 20 feet from the track until the train has safely passed. In addition, any Work that could come within 20 feet of the track will cease when a train passes. For example, crane or pile driving activities shall stop when trains pass when the maximum boom and suspended load radius can come within 20 feet of the tracks. Pile driving shall not be done when trains are passing the Work site. Vehicles and other construction equipment shall not be operated or parked closer than 20 feet from any track without ARRC flag protection.

6.17.7 Track outages require ARRC's prior approval. Prior to a proposed track outage, the Contractor shall submit a closure plan to ARRC for approval. The plan will describe the Work to be accomplished, the equipment, manpower and other resources required, and the schedule. Once approved by ARRC, the Contractor shall follow the plan. ARRC reserves the right to assume control of the Work to reestablish rail service if the schedule is not met. Contractor shall bear all costs and damages which may result from failure to meet the closure schedule.

6.17.8 Whenever an ARRC flag person is required for performance of the Work, he or she will be provided by the ARRC at no expense to the Contractor. A minimum of 48 hours notice is required for ARRC flag protection.

6.18 EMERGENCIES:

6.18.1 In emergencies affecting the safety or protection of persons or the Work or property at the site or adjacent thereto, the Contractor, without special instruction or authorization from the Owner, is obligated to act to prevent threatened damage, injury or loss.

6.18.2 The Contractor shall give the Owner prompt written notice if the Contractor believes that any significant changes in the Work or variations from the Contract Documents is required because of the action taken in response to an emergency. A change will be authorized by one of the methods indicated in paragraph 9.2, as determined appropriate by the Owner.

6.19 SHOP DRAWINGS AND SAMPLES:

6.19.1 After checking and verifying all field measurements and after complying with applicable procedures specified in the Contract Documents, the Contractor shall submit to the Owner for review and Approval in accordance with the accepted schedule of Shop Drawing submissions the required number of all Shop Drawings, which will bear a stamp or specific written indication that the Contractor has satisfied Contractor's responsibilities under the Contract Documents with respect to the review of the submission. All submissions will be identified as the Owner may require. The data shown on the Shop Drawings will be complete with respect to quantities, dimensions, specified performance and design criteria, materials and similar data to enable the Owner to review the information as required.

6.19.2 The Contractor shall also submit to the Owner for review and Approval with such promptness as to cause no delay in Work, all samples required by the Contract Documents. All samples will have been checked by and accompanied by a specific written indication that the Contractor has satisfied Contractor's responsibilities under the Contract Documents with respect to the review of the submission and will be identified clearly as to material, Supplier, pertinent data such as catalog numbers and the use for which intended.

6.19.3 Before submission of each Shop Drawing or sample the Contractor shall have determined and verified all quantities, dimensions, specified performance criteria, installation requirements, materials, catalog numbers and similar data with respect thereto and reviewed or coordinated each Shop Drawing or sample with other Shop Drawings and samples and with the requirements of the Work and the Contract Documents.

6.19.4 At the time of each submission the Contractor shall give the Owner specific written notice of each variation that the Shop Drawings or samples may have from the requirements of the Contract Documents, and, in addition, shall cause a specific notation to be made on each Shop Drawing submitted to the Owner for review and Approval of each such variation.

6.19.5 All variations of the proposed Shop drawing from that specified will be identified in the submission and available maintenance, repair and replacement service will be indicated.

6.19.6 The submittal will also contain an itemized estimate of all costs that will result directly or indirectly from acceptance of such variation, including costs of redesign and claims of other contractors affected by the resulting change, all of which shall be considered by the Owner in evaluating the proposed variation.

6.19.7 If the variation may result in a change of Contract Time or Amount, or Contract responsibility, and is not minor in nature, the Contractor must submit a written request for Change Order with the variation to notify the Owner of his intent.

6.19.8 The Owner may require the Contractor to furnish at the Contractor's expense additional data about the proposed variation.

6.19.9 The Owner may reject any variation request which the Owner determines is not in the best interest of the Owner.

6.20 SHOP DRAWING AND SAMPLE REVIEW:

6.20.1 The Owner will review with reasonable promptness Shop Drawings and samples, but the Owner's review will be only for conformance with the design concept of the Project and for compliance with the information given in the Contract Documents and shall not extend to means, methods, techniques, sequences or procedures of construction (except where a specific means, method, technique, sequence or procedure of construction is indicated in or required by the Contract Documents) or to safety precautions or programs incident thereto.

6.20.2 The review of a separate item as such will not indicate acceptance of the assembly in which the item functions.

6.20.3 The Contractor shall make corrections required by the Owner and shall return the required number of corrected copies of Shop Drawings and submit as required new samples for review.

6.20.4 The Contractor shall direct specific attention in writing to revisions other than the corrections called for by the Owner on previous submittals.

6.20.5 The Owner's review of Shop Drawings or samples shall not relieve Contractor from responsibility for any variation from the requirements of the Contract Documents unless the Contractor has in writing advised the Owner of each such variation at the time of submission as required by paragraph 6.19.4.

6.20.6 The Owner, if he so determines, may give written Approval of each such variation by Change Order, except that, if the variation is minor and no Change Order has been requested a specific written notation thereof incorporated in or accompanying the Shop Drawing or sample review comments shall suffice as a modification.

6.20.7 No Approval by the Owner will relieve the Contractor from responsibility for errors or omissions in the Shop Drawings or from responsibility for having complied with the provisions of paragraph 6.20.3.

6.20.8 Where a Shop Drawing or sample is required by the Specifications, any related Work performed prior to the Owner's review of the pertinent submission will be at the sole expense and responsibility of the Contractor.

6.21 MAINTENANCE DURING CONSTRUCTION:

6.21.1 The Contractor shall maintain the Work during construction and until Substantial Completion, at which time the responsibility for maintenance shall be established in accordance with paragraph 13.10.

6.22 CONTINUING THE WORK:

6.22.1 The Contractor shall carry on the Work and adhere to the progress schedule during all disputes or disagreements with the Owner.

6.22.2 No Work shall be delayed or postponed pending resolution of any disputes, disagreements, or claims except as the Contractor and the Owner may otherwise agree in writing.

6.23 CONSENT TO ASSIGNMENT:

6.23.1 The Contractor shall obtain the prior written consent of the Owner to any proposed assignment of any interest in, or part of this Contract.

6.23.2 The consent to any assignment or transfer shall not operate to relieve the Contractor or his Sureties of any of his or its obligations under this Contract or the Performance Bonds.

6.23.3 Nothing herein contained shall be construed to hinder, prevent, or affect an assignment of monies due, or to become due hereunder, made for the benefit of the Contractor's creditors pursuant to law.

6.24 USE OF EXPLOSIVES:

6.24.1 When the use of explosives is necessary for the prosecution of the Work, the Contractor shall exercise the utmost care not to endanger life or property, including new Work and shall follow all Regulatory Requirements applicable to the use of explosives.

6.24.2 The Contractor shall be responsible for all damage resulting from the use of explosives.

6.24.3 All explosives shall be stored in a secure manner in compliance with all Regulatory Requirements, and all such storage places shall be clearly marked.

6.24.4 Where no Regulatory Requirements apply, safe storage shall be provided not closer than 1,000 feet from any building, camping area, or place of human occupancy.

6.24.5 The Contractor shall notify each public utility owner having structures in proximity to the site of his intention to use explosives. Such notice shall be given sufficiently in advance to enable utility owners to take such steps as they may deem necessary to protect their property from injury.

6.24.6 However, the Contractor shall be responsible for all damage resulting from the use of the explosives, whether or not, utility owners act to protect their property.

6.25 CONTRACTOR'S RECORDS:

6.25.1 Records of the Contractor and subcontractors relating to personnel, payrolls, invoices of materials, and any and all other data relevant to the performance of the Contract, must be kept on a generally recognized accounting system.

6.25.2 Such records must be available during normal Work hours to the Owner for purposes of investigation to ascertain compliance with Regulatory Requirements and provisions of the Contract Documents.

6.25.3 Payroll records must contain the name and address of each employee, his correct classification, social security number, rate of pay, daily and weekly number of hours of worked, deductions made, and actual wages paid and any other information required by the U.S. and/or State Department of Labor.

6.25.4 The Contractor and subcontractors shall make employment records available for inspection by the Owner and representatives of the U.S. and/or State Department of Labor and will permit such representatives to interview employees during working hours on the Project.

6.25.5 Records of all communications between the Owner and the Contractor and other parties, where such communications affected performance of this Contract, must be kept by the Contractor and maintained for a period of three years from Final Completion.

6.25.6 The Owner or its assigned representative may perform an audit of these records during normal work hours after written notice to the Contractor.

6.26 CONSTRUCTION QUALITY CONTROL PLAN:

6.26.1 The Contractor shall establish and maintain an effective quality management system. The quality management system shall consist of plans, procedures, and the organization necessary to provide material, equipment, and workmanship to comply with the requirements of the contract documents. The system shall cover the proposed sequence of the work including both on-site and off-site operations. To meet this requirement, the Contractor shall prepare a Construction Quality Control (CQC) plan that addresses all quality control requirements specified in the contract documents. A complete, detailed CQC plan shall be submitted to the Project Manager at least 10 days prior to commencement of any Work on the Project. The CQC must be approved in writing by the Project Manager prior to proceeding with the Work. The Contractor shall not revise the CQC or the quality staffing levels or replace any of the key personnel specified therein without prior written approval from the Project Manager.

7. ARTICLE 7 - LAWS AND REGULATIONS:

7.1 LAWS TO BE OBSERVED:

7.1.1 The Contractor shall keep fully informed of all Federal and State Regulatory Requirements and all Orders and decrees of bodies or tribunals having any jurisdiction or authority, which in any manner affect those engaged or employed on the Work, or which in any way affect the conduct of the Work.

7.1.2 The Contractor shall at all times observe and comply with all such Regulatory Requirements, orders and decrees; and shall defend and indemnify the Owner and its representatives against claim or liability arising from or based on the violation of any such Regulatory Requirement, order, or decree whether by the Contractor, subcontractor, or any employee of either.

7.1.3 Except where otherwise expressly required by applicable Regulatory Requirements, the Owner shall not be responsible for monitoring Contractor's compliance with any Regulatory Requirements.

7.2 PERMITS, LICENSES, AND TAXES:

7.2.1 The Contractor shall procure all permits and licenses, pay all charges, fees and taxes, and give all notices necessary and incidental to the due and lawful prosecution of the Work. As a condition of performance of this Contract, the Contractor shall pay all Federal, State and local taxes incurred by the Contractor, in the performance of the Contract. Proof of payment of these taxes is a condition precedent to Final payment by the Owner under this Contract.

7.2.2 The Contractor's certification that taxes have been paid (as contained in the Release of Contract) will be verified with the Department of Revenue and Department of Labor, prior to Final payment.

7.2.3 If any Federal, State or local tax is imposed, charged, or repealed after the date of Bid opening and is made applicable to and paid by the Contractor on the articles or supplies herein contracted for, then the Contract shall be increased or decreased accordingly by a Change Order.

7.3 PATENTED DEVICES, MATERIALS AND PROCESSES:

7.3.1 If the Contractor employs any design, device, material, or process covered by letters of patent, trademark or copyright, the Contractor shall provide for such use by suitable legal agreement with the patentee or owner.

7.3.2 The Contractor and the Surety shall, defend, indemnify and save harmless the Owner and its agents, any affected third party, or political subdivision from any and all claims for infringement by reason of the use of any such patented design, device, material or process, or any trademark or copyright, and shall indemnify the Owner for any costs, expenses, and damages which it may be obliged to pay by reason of any infringement, at any time during the prosecution or after the completion of the Work.

7.4 COMPLIANCE OF SPECIFICATION AND DRAWINGS:

7.4.1 If the Contractor observes that the Specification and Drawings supplied by the Owner are at variance with any Regulatory Requirements, Contractor shall give the Owner prompt written notice thereof, and any necessary changes will be authorized by one of the methods indicated in paragraph 9.2. as determined appropriate by the Owner.

7.4.2 If the Contractor performs any Work knowing or having reason to know that it is contrary to such Regulatory Requirements, and without such notice to the Owner, the Contractor shall bear all costs arising therefrom; however, it shall not be the Contractor's primary responsibility to make certain that the Specifications and Drawings supplied by the Owner are in accordance with such Regulatory Requirements.

7.5 ACCIDENT PREVENTION:

7.5.1 The Contractor shall comply with AS 18.60.075 and all pertinent provisions of the Construction Code Occupational Safety and Health Standards issued by the Alaska Department of Labor.

7.6 SANITARY PROVISIONS:

7.6.1 The Contractor shall provide and maintain in a neat and sanitary condition such accommodations for the use of his employees and Owner representatives in strict accordance with the requirements of the State and local Boards of Health, OSHA or of other bodies or tribunals having jurisdiction.

7.7 BUSINESS REGISTRATION:

7.7.1 The Contractor shall comply with AS 08.18.011, as follows: *"it is unlawful for a person to submit a bid or Work as a Contractor until he has been issued a certificate of registration by the Department of Commerce. A partnership or joint venture shall be considered registered if one of the general partners or venturers whose name appears in the name under which the partnership or venture does business is registered."*

7.8 PROFESSIONAL REGISTRATION AND CERTIFICATION:

7.8.1 All craft trades, architects, engineers and land surveyors, electrical administrators, explosive handlers, and welders employed under the Contract shall specifically comply with applicable provisions of AS 08.18, 08.48, 08.40, 08.52, and 08.99.

7.8.2 Provide copies of individual licenses within seven days following a request from the Owner.

7.9 LOCAL BUILDING CODES:

7.9.1 The Contractor shall comply with AS 35.10.025 which requires construction in accordance with applicable local building codes including the obtaining of required permits.

7.10 AIR QUALITY CONTROL:

7.10.1 The Contractor shall comply with all applicable provision of AS 46.03.04 as pertains to Air Pollution Control.

7.11 ARCHAEOLOGICAL OR PALEONTOLOGICAL DISCOVERIES:

7.11.1 When the Contractor's operation encounters prehistoric artifacts, burials, remains of dwelling sites, or paleontological remains, such as shell heaps, land or sea mammal bones or tusks, the Contractor shall cease operations immediately and notify the Owner.

7.11.2 No artifacts or specimens shall be further disturbed or removed from the ground and no further operations shall be performed at the site until so directed.

7.11.3 Should the Owner order suspension of the Contractor's operations in order to protect an archaeological or historical finding, or order the Contractor to perform extra Work, such shall be covered by an appropriate Contract change document.

7.12 WAGES AND HOURS OF LABOR:

7.12.1 The Contractor shall submit certified payrolls bearing an original signature on a weekly or biweekly basis to the State Department of Labor as required by law, and shall comply with all other applicable labor reporting laws. The Contractor shall also submit certified payrolls bearing an original signature, along with those of its subcontractors, to the Owner on a weekly basis and shall retain copies of the payrolls for a minimum of three (3) years.

7.12.2 The Contractor shall be responsible for the submission and retention of certified payrolls of all of its subcontractors.

7.12.3 The certification shall affirm that the payrolls are current and complete, that the wage rates contained therein are not less than the applicable rates referenced in the Contract Documents, and that the classification set forth for each laborer or mechanic conforms with the work he performed.

7.12.4 The Contractor and its subcontractors shall attend all hearings and conferences and produce such books, papers, and documents all as requested by the Department of Labor.

7.13 THE FOLLOWING LABOR PROVISIONS SHALL ALSO APPLY TO THIS CONTRACT:

7.13.1 The Contractor and his subcontractors shall pay all employees unconditionally and not less than once a week. Wages may not be less than those stated in the Invitation to Bid, regardless of the contractual relationship between the Contractor or Subcontractors and laborers, mechanics, or field surveyors. The scale of wages to be paid shall be posted by the Contractor in a prominent and easily accessible place at the site of the Work. The Owner shall withhold so much of the accrued payments as is necessary to pay laborers, mechanics, or field surveyors employed by the Contractor or Subcontractors the difference between the rates of wages required by the Contract to be paid laborers, mechanics, or field surveyors on the Work, and the rates of wages in fact received by laborers, mechanics or field surveyors.

7.14 OVERTIME WORK HOURS AND COMPENSATION:

7.14.1 Pursuant to 40 U.S.C. 327-330 and AS 23.10.060, the Contractor shall not require nor permit any laborer or mechanic in any workweek in which he is employed on any Work under this Contract to work in excess of eight hours in any Calendar Day or in excess of forty hours in such workweek on work subject to the provisions of the Contract Work Hours and Safety Standards Act unless such laborer or mechanic receives compensation at a rate not less than one and one half times his basic rate of pay for all such hours worked in excess of eight hours in any Calendar Day or in excess of forty hours in such workweek whichever is the greater number of overtime hours.

7.14.2 In the event of any violation of this provision, the Contractor shall be liable to any affected employee for any amounts due and penalties and to the Owner for liquidated damages. Such liquidated damages shall be computed with respect to each individual laborer or mechanic employed in violation of this provision in the sum of \$10.00 for each Calendar Day on which such employee was required or permitted to be employed on such Work in excess of eight hours or in

excess of the standard workweek of forty hours without payment of the overtime wages required by this paragraph.

7.15 COVENANT AGAINST CONTINGENT FEES:

7.15.1 The Contractor warrants that no person or selling agent has been employed or retained to solicit or secure this Contract upon an agreement or understanding for a commission, percentage, brokerage, or contingent fee, excepting bona fide employees or bona fide established commercial or selling agencies maintained by the Contractor for the purpose of securing business.

7.15.2 For breach or violation of this warranty, the Owner shall have the right to annul this Contract without liability or, in its discretion, to deduct such improper consideration from the Contract Amount or otherwise recover the full amount of such commission, percentage, brokerage, or contingent fee.

7.16 OFFICIALS NOT TO BENEFIT:

7.16.1 No member of or delegate to the U.S. Congress, the State Legislature, or other State or Owner officials shall be admitted to any share or part of this Contract, nor to any benefit that may arise there from. However, this provision shall not be construed to extend to this Contract if made with a corporation for its general benefit.

7.17 PERSONAL LIABILITY OF PUBLIC OFFICIALS:

7.17.1 In carrying out any of the provisions thereof, or in exercising any power or authority granted to the Owner by the Contract, there will be no liability upon the Owner nor upon its agents or authorized as its representatives, either personally or as officials of the State of Alaska, it being always understood that in such matters they act as agents and representatives of the Owner.

8. ARTICLE 8 - OTHER WORK:

8.1 RELATED WORK AT SITE:

8.1.1 The Owner reserves the right at any time to contract for and perform other or additional work on or near the Work covered by the Contract.

8.1.2 When separate contracts are let within the limits of the Project, the Contractor shall conduct his work so as not to interfere with or hinder the work being performed by other contractors. The Contractor shall join his work with that of the others in an acceptable manner and shall perform it in proper sequence to that of others.

8.1.3 If the fact that other such work is to be performed is identified or shown in the Contract Documents, the Contractor shall assume all liability, financial or otherwise, in connection with this Contract and indemnify and save harmless the Owner and its agents from any and all damages or claims that may arise because of inconvenience, delay, or loss experienced by the Contractor because of the presence and operations of other contractors.

8.1.4 If the fact that such other work is to be performed was not identified or shown in the Contract Documents, written notice thereof will be given to the Contractor prior to starting any such other work. If the Contractor believes that such performance will require an increase in Contract Amount or Contract Time, the Contractor shall notify the Owner of such required increase within fifteen (15) calendar days following receipt of the Owner's notice. Should the Owner find such increase(s) to be justified, a Change Order will be executed.

8.2 ACCESS, CUTTING, AND PATCHING:

8.2.1 The Contractor shall afford each utility owner and any other contractor who is a party to such a direct contract with the Owner (or the Owner, if the Owner is performing the additional work with the Owner's employees) proper and safe access to the site and a reasonable opportunity for the introduction and storage of materials and equipment and the execution of such work and shall properly connect and coordinate the Work with the work of others.

8.2.2 The Contractor shall do all cutting, fitting and patching of the Work that may be required to make its several parts come together properly and integrate with such other Work, the Contractor shall not endanger any Work of others by cutting, excavating or otherwise altering their Work and will only cut or alter such other Work with the written consent of the Owner.

8.2.3 The duties and responsibilities of the Contractor under this paragraph are for the benefit of other contractors to the extent that there are comparable provisions for the benefit of the Contractor in said direct Contracts between the Owner and other contractors.

8.3 DEFECTIVE WORK BY OTHERS:

8.3.1 If any part of the Contractor's Work depends for proper execution or results upon the Work of any such other Contractor, utility owner, or the Owner, the Contractor shall inspect and promptly report to the Owner in writing any delays, defects or deficiencies in such Work that render it unavailable or unsuitable for such proper execution and results. The Contractor's failure to so report will constitute an acceptance of the other Work as fit and proper for integration with Contractor's Work except for latent or non-apparent defects and deficiencies in the other Work.

8.4 COORDINATION:

8.4.1 If the Owner contracts with others for the performance of other Work at the site, Owner will have authority and responsibility for coordination of the activities among the various contractors.

9. ARTICLE 9 - CHANGES:

9.1 OWNER'S RIGHT TO CHANGE:

9.1.1 Without invalidating the Contract and without notice to any Surety, the Owner may, at any time or from time to time, order additions, deletions or revisions in the Work within the general scope of the Contract, including but not limited to changes:

9.1.1.1 In the Contract Documents;

9.1.1.2 In the method or manner of performance of the Work;

9.1.1.3 In Owner-furnished facilities, equipment, materials, services, or site;

9.1.1.4 Directing acceleration in the performance of the Work.

9.2 AUTHORIZATION OF CHANGES WITHIN THE GENERAL SCOPE:

9.2.1 Additions, deletions, or revisions in the Work within the general scope of the Contract as specified in paragraph 9.1 shall be authorized by one or more of the following ways:

9.2.1.1 Directive (pursuant to paragraph 9.3)

9.2.1.2 A Change Order (pursuant to paragraph 9.4)

9.2.1.3 Owner's acceptance of Shop Drawing variations from the Contract Documents as specifically identified by the Contractor as required by paragraph 6.19.4.

9.3 DIRECTIVE:

9.3.1 The Owner shall provide written clarification or interpretation of the Contract Documents (pursuant to paragraph 3.7).

9.3.2 The Owner may authorize minor variations in the Work from the requirements of the Contract Documents which do not involve an adjustment in the Contract Amount or the Contract Time and are consistent with the overall intent of the Contract Documents.

9.3.3 The Owner may order the Contractor to correct Defective Work or methods which are not in conformance with the Contract Documents.

9.3.4 The Owner may direct the commencement or suspension of Work or emergency related Work (as provided in paragraph 6.18).

9.3.5 Upon the issuance of a directive to the Contractor by the Owner, the Contractor shall immediately proceed with the performance of the Work as prescribed by such directive.

9.3.6 If the Contractor believes that the changes noted in a directive may cause an increase in the Contract Amount or an extension of Contract Time, the Contractor shall immediately provide written notice to the Owner depicting such increases before proceeding with the directive, except in the case of an emergency.

9.3.7 If the Owner finds the increase in Contract Amount or the extension of Contract Time justified, a Change Order will be issued.

9.3.8 If however, the Owner does not find that a Change Order is justified, the Owner may direct the Contractor to proceed with the Work.

9.3.9 The Contractor shall cooperate with the Owner in keeping complete daily records of the cost of such Work.

9.3.10 If a Change Order is ultimately determined to be justified, in the absence of agreed prices and unit prices, payment for such Work will be made on a cost of the Work basis as provided in paragraph 10.4.

9.4 CHANGE ORDER:

9.4.1 A change in Contract Time, Contract Amount, or responsibility may be made for changes within the scope of the Work only by Change Order.

9.4.2 Upon receipt of an executed Change Order, the Contractor shall promptly proceed with the Work involved which will be performed under the applicable conditions of the Contract Documents except as otherwise specifically provided.

9.4.3 Changes in Contract Amount and Contract Time shall be made in accordance with Articles 10 and 11.

9.5 SHOP DRAWING VARIATIONS:

9.5.1 Variations by Shop Drawings shall only be eligible for consideration under paragraph 9.4 when the conditions affecting the price, time, or responsibility are identified by the Contractor in writing and a request for a Change Order is submitted as per paragraph 6.19.7.

9.6 CHANGES OUTSIDE THE GENERAL SCOPE; SUPPLEMENTAL AGREEMENT

9.6.1 Any change which is outside the general scope of the Contract, as determined by the Owner, must be authorized by the appropriate representatives of the Owner and the Contractor.

9.7 UNAUTHORIZED WORK:

9.7.1 The Contractor shall not be entitled to an increase in the Contract Amount or an extension of the Contract Time with respect to any Work performed that is not required by the Contract Documents as amended, modified and supplemented as provided in this Article 9, except in the case of an emergency as provided in paragraph 6.18 and except in the case of uncovering Work as provided in paragraph 12.4.4.

9.8 NOTIFICATION OF SURETY:

9.8.1 If notice of any change affecting the general scope of the Work or the provisions of the Contract Documents including, but not limited to, Contract Amount or Contract Time is required by the provisions of any Bond to be given to a Surety, the giving of any such notice will be the Contractor's responsibility, and the amount of each applicable Bond will be adjusted accordingly.

9.9 DIFFERING SITE CONDITIONS:

9.9.1 The Contractor shall promptly, and before such conditions are disturbed (except in an emergency as permitted by paragraph 6.18), notify the Owner in writing of:

9.9.1.1 subsurface or latent physical conditions at the site differing materially from those indicated in the Contract, and which could not have been discovered by a careful examination of the site, or

9.9.1.2 unknown physical conditions at the site, or an unusual nature, differing materially from those ordinarily encountered and generally recognized as inherent in Work of the character provided for in this Contract.

9.9.2 The Owner shall promptly investigate the conditions, and if the Owner finds that such conditions do materially so differ and cause an increase or decrease in the Contractor's cost of, or time required for, performance of this Contract, an equitable adjustment shall be made and the Contract modified in writing accordingly.

9.9.3 Any claim for additional compensation by the Contractor under this clause shall be made in accordance with Article 15 and shall not be allowed unless the Contractor has first given the notice required by this Contract.

9.9.4 In the event that the Owner and the Contractor are unable to reach an agreement concerning an alleged differing site condition, the Contractor will be required to keep an accurate and detailed record which will indicate the actual cost of the Work done under the alleged differing site condition.

9.9.5 Failure to keep such a record shall be a bar to any recovery by reason of such alleged differing site conditions. The Owner shall be given the opportunity to supervise and check the keeping of such records.

9.10 VALUE ENGINEERING PROPOSALS BY THE CONTRACTOR:

9.10.1 Proposals may be submitted to the Owner for modifying the plans, specifications, or other requirements of the Contract for the sole purpose of reducing the total costs of construction without impairing in any manner the essential functions or characteristics of the project, including service life, economy of operations, ease of maintenance, benefits to the traveling public, desired appearance or design and safety standards. After execution of the Contract, an initiative may be recommended by the Contractor or, if applicable, sponsoring governmental agency. The initiative must be identified as a Value Engineering Proposal (VEP), and may include modifications to the plans or specifications, construction phasing or procedures, or other contract requirements. Any cost savings generated to the Contract as a result of VEP offered by the Contractor and approved by Owner will be shared equally between the Contractor and Owner as specified in paragraph 9.14. Bid prices are not to be based on the anticipated approval of a VEP. If a VEP is rejected, the Contract shall be completed in accordance with the original terms of the Contract or as otherwise modified. Any decision whether to approve or accept a VEP shall be within the sole discretion of Owner. Owner will bear no liability for any delay in considering a VEP, the refusal to accept or approve such a proposal, or any other matter connected with a VEP.

9.11 SUBMITTAL & REVIEW OF VEP CONCEPT OR IDEA:

9.11.1 The Contractor shall initially submit a brief letter proposal with graphics to Owner to illustrate the concept or idea. The Contractor shall indicate whether adequate time is available in its schedule for formal submittal and review prior to VEP implementation.

9.11.2 Owner will review the concept or idea within ten days of the Contractor's initial submittal and inform the Contractor in writing whether the concept or idea has merit and should be submitted as a formal VEP.

9.11.3 If Owner determines that the time for response is indicated in the Contractor's letter proposal is insufficient for review, Owner may choose to evaluate the need for a noncompensable time extension to the Contract. Its evaluation will be based on the additional time needed by the Owner for its review and the effect on the Contractor's schedule occasioned by the added time. The need for such a time extension will be evaluated in accordance with Article 11.

9.12 FORMAL SUBMITTAL OF THE VEP:

9.12.1 Within 30 days after Owner has determined the VEP concept or idea has merit, the Contractor shall formally submit a proposal. The proposal shall include sufficient data for Owner to make an informed decision regarding the proposal and shall include, at a minimum, the following information:

9.12.1.1 A statement that the Proposal is submitted as a VEP.

9.12.1.2 A description of the difference between the existing contract and the proposed change and the advantages and disadvantages of each, including effects on service life, economy of operations, ease of maintenance, benefits to the traveling public, desired appearance and safety.

9.12.1.3 A complete set of plans and specifications showing the proposed revisions relative to the original contract features and requirements supported by design computations as necessary for a thorough and expeditious evaluation.

9.12.1.4 A complete analysis indicating the final estimated costs and quantities to be replaced by the VEP compared to the new costs and quantities generated by the VEP.

9.12.1.5 A statement specifying the date by which a Change Order adopting the VEP must be executed to obtain the maximum cost reduction.

9.12.1.6 A statement detailing the effect the VEP will have on the time for completing the Contract.

9.12.1.7 A description of any previous use or testing of the VEP and the conditions and results. If the VEP was previously submitted on another Owner project, indicate the date, contract number, and the action taken by Owner.

9.12.1.8 A detailed statement indicating the costs for developing the changes, along with the costs for preparing the value engineering joint proposal.

9.13 VEP CONDITIONS:

9.13.1 Value Engineering Proposals will be considered only when all of the following conditions are met:

9.13.1.1 A VEP, approved or not approved by Owner applies only to the contract on which is it submitted. A submitted VEP becomes the property of Owner. The VEP shall contain no restrictions imposed by the Contractor on its use or disclosure. Owner has the right to use, duplicate and disclose in whole or in part any data necessary for the utilization of the VEP. Owner retains the right to use any accepted VEP or part thereof on other projects without obligation to the Contractor. This provision is not intended to deny rights provided by law with respect to patented materials or processes.

9.13.1.2 If Owner is already considering certain revisions to the Contract or has considered or approved changes in the Contract of a like nature on other contracts which are subsequently incorporated in a VEP, Owner may reject the VEP and may change the Contract without obligation to the Contractor.

9.13.1.3 The Contractor shall have no claim for additional costs or delays resulting from the rejection of a VEP, including development costs, loss of anticipated profits, increased material or labor costs except as allowed in paragraph 9.14.

9.13.1.4 Owner will determine if a VEP qualifies for consideration and evaluation. It may reject any VEP that requires excessive time or costs for review, evaluation or investigation, or that is not consistent with Owner's design policies and criteria for the project.

9.13.1.5 Owner will reject all or any portion of work performed under an approved VEP if unsatisfactory results are obtained. The Owner will direct the removal of rejected work and require construction to proceed under the original contract requirements without reimbursement for rejected work performed under the VEP, or for its removal. Where modifications to the VEP are approved to adjust to field or other conditions, reimbursement will be limited to the total amount payable for the work at the contract bid prices as if it were constructed under the original contract

requirements. The rejection or limitation of reimbursement shall not constitute the basis of any claim against Owner for delay or for other costs.

9.13.1.6 The proposed work shall not contain experimental features but shall contain features that have been used under similar or acceptable conditions on other projects or locations acceptable to Owner.

9.13.1.7 VEPs will not be considered if equivalent options are already provided in the Contract.

9.13.1.8 The savings generated by the VEP must be sufficient to warrant a review and processing. A savings resulting solely from the elimination or reduction in quantity of a single bid item will not be considered as a VEP. A savings resulting from the elimination or reduction in quantity of a bid item specified as part of a VEP will be considered.

9.13.1.9 Additional information needed to evaluate VEPs shall be provided in a timely manner. Untimely submittals of additional information will result in rejection of the VEP. Where design changes are proposed, the additional information could include results of field investigations and surveys, design computations, and field change sheets.

9.13.1.10 The Contractor may submit VEPs for an approved subcontractor. Reimbursement will be made to the Contractor. Subcontractors may not submit a VEP except through the Contractor.

9.13.1.11 The Contractor shall ensure the VEP is sealed by an Alaska Registered Engineer.

9.14 VEP ACCEPTANCE, REJECTION & PAYMENT:

9.14.1 Within 30 days of the Contractor's formal submission of the VEP, Owner will accept or reject the VEP.

9.14.2 The Contractor will be notified in writing by the Owner as to whether the proposal has been accepted. The decision by Owner is final and shall not be subject to the provisions of Article 15.

9.14.3 If the VEP is rejected, Owner will share equally in the Contractor's costs for developing and presenting the proposal, and the Contractor will share equally in the cost to Owner for investigating and evaluating the proposal. A Change Order will be executed to adjust the Contract Amount for the net increase or decrease in monies resulting from the Contractor's development costs as listed above in paragraph 9.12.1.8, and Owner's evaluation costs. The Change Order will terminate Owner's review of the VEP.

9.14.4 If the VEP is accepted in whole or part, the necessary contract modifications and contract price adjustments will be made by the execution of a Change Order which will specifically state that it is executed pursuant to the provisions of this subsection. Owner will be the sole judge of the acceptability of a VEP and of the estimated net savings in construction costs from the adoption of all or any part of the VEP.

9.14.5 The Contractor shall continue to perform the Work in accordance with the requirements of the Contract until a Change Order incorporating the VEP has been executed, or until the Contractor has been given written acceptance or rejection by the Owner.

9.14.6 The executed Change Order shall incorporate the changes in the plans, specifications, or other requirements of the Contract which are necessary to permit the VEP, or such part of it which has been accepted, to be put into effect, and shall include any conditions upon which Owner's approval thereof is based. The executed Change Order shall extend or decrease the Contract Time if required by Owner.

9.14.7 The executed Change Order shall provide that the Contractor be paid 50% of the net savings amount as reflected by the difference between the cost of the revised work and the cost of the related construction required by the original contract computed at contract bid prices. The net savings will take into account the Contractor's cost of developing the VEP and implementing the change, and reducing this amount by Owner's cost for investigating and evaluating the VEP, including any ascertainable collateral costs to Owner. Such collateral costs

may include increased costs for maintenance, operation, related work items, additional work items, or elements of related or additional work items.

9.14.8 The executed Change Order shall also provide for the adjustment of the Contract Amount. The Contract Amount shall be adjusted by subtracting Owner's share of the accrued net savings.

9.14.9 The amount specified to be paid to the Contractor in the executed Change Order shall constitute full compensation to the Contractor for the VEP and the performance of the work thereof pursuant to the said Change Order.

10. ARTICLE 10 - CONTRACT AMOUNT; COMPUTATION AND CHANGE:

10.1 CONTRACT AMOUNT:

10.1.1 The Contract Amount constitutes the total compensation (subject to authorized adjustments) payable to the Contractor for performing the Work. All duties, responsibilities and obligations assigned to or undertaken by the Contractor shall be at his expense without change in the Contract Amount. The Contract Amount may only be changed by a Change Order or Supplemental Agreement.

10.2 CLAIM FOR CHANGE IN CONTRACT AMOUNT:

10.2.1 Any claim for an increase or decrease in the Contract Amount shall be submitted in accordance with the terms of Article 15, and shall not be allowed unless the notice requirements of this Contract have been met.

10.3 CHANGE ORDER PRICE DETERMINATION:

10.3.1 The value of any Work covered by a Change Order for an increase or decrease in the Contract Amount shall be determined in one of the following ways:

10.3.2 Where the Work involved is covered by unit prices contained in the Contract Documents, by application of unit prices to the quantities of the items involved (subject to the provisions of paragraph 10.9).

10.3.3 By mutual acceptance of a lump sum price which includes overhead and profit.

10.3.4 When 10.3.1 and 10.3.2 are inapplicable, on the basis of the Cost of the Work (determined as provided in paragraphs 10.4 and 10.5) plus a contractor's fee for overhead and profit (determined as provided in paragraph 10.6).

10.4 COST OF THE WORK:

10.4.1 The term Cost of the Work means the sum of all costs necessarily incurred and paid by the Contractor in the proper performance of the Work.

10.4.2 Except as otherwise may be agreed to in writing by the Owner, such costs shall be in amount no higher than those prevailing in the locality of the Project, shall include only the following items and shall not include any of the costs itemized in paragraph 10.5:

10.4.2.1 Payroll costs for employees in the direct employ of the Contractor in the performance of the Work under schedules of job classifications agreed upon by the Owner and the Contractor.

10.4.2.2 Payroll costs for employees not employed full time on the Work shall be apportioned on the basis of their time spent on the Work.

10.4.2.3 Payroll costs shall include, but not be limited to, salaries and wages plus the cost of fringe benefits which shall include Social Security Contributions, Unemployment, Excise and Payroll Taxes, Workers' or Workmen's compensation, health and retirement benefits, bonuses, sick leave, vacation and holiday pay applicable thereto.

10.4.2.4 Such employees shall include superintendents and foremen at the site.

10.4.2.5 The expenses of performing Work after regular working hours, on Saturday, Sunday or Legal Holidays, shall be included in the above to the extent authorized by the Owner.

10.4.2.6 Cost of all materials and equipment furnished and incorporated in the Work, including costs of transportation and storage thereof, and suppliers' field services required in connection therewith. All cash discounts shall accrue to the Contractor unless the Owner deposits funds with the Contractor with which to make payments, in which case the cash discounts shall accrue to the Owner. All trade discounts, rebates and refunds and all returns from sale of surplus materials and equipment shall accrue to the Owner, and the Contractor shall make provisions so that they may be obtained.

10.4.2.7 Payments made by the Contractor to subcontractors for Work performed by subcontractors. If required by the Owner, Contractor shall obtain competitive quotes from subcontractors or suppliers acceptable to the Contractor and shall deliver such quotes to the Owner who will then determine which quotes will be accepted. If a subcontract provides that the subcontractor is to be paid on the basis of Cost of the Work plus a fee, the subcontractor's Cost of the Work shall be determined in the same manner as the Contractor's Cost of Work. All subcontracts shall be subject to the other provisions of the Contract Documents insofar as applicable.

10.4.2.8 Costs of special Consultants (including but not limited to engineers, architects, testing laboratories, and surveyors) employed for services necessary for the completion of the Work.

10.4.2.9 Supplemental costs including the following:

10.4.2.9.1 The proportion of necessary transportation, travel and subsistence expenses of the Contractor's employees incurred in discharge of duties connected with the Work.

10.4.2.9.2 Cost, including transportation and maintenance, of all materials, supplies, equipment, machinery, appliances, office and temporary facilities at the site and hand tools not owned by the workers, which are consumed in the performance of the Work, and cost less market value of such items used but not consumed which remain the property of the Contractor.

10.4.2.9.3 Rentals of all construction equipment and machinery and the parts thereof whether rented from the Contractor or others in accordance with rental agreements approved by the Owner and the costs of transportation, loading, unloading, Installation, dismantling and removal thereof - all in accordance with terms of said rental agreements. The rental of any such equipment, machinery or parts shall cease when the use thereof is no longer necessary for the Work.

10.4.2.9.4 Sales, consumer, use or similar taxes related to the Work, and for which the Contractor is liable, imposed by Regulatory Requirements.

10.4.2.9.5 Fees for permits and licenses.

10.4.2.9.6 Losses and damages (and related expenses), not compensated by insurance or otherwise, to the Work or otherwise sustained by the Contractor in connection with the performance and furnishing of the Work provided they have resulted from causes other than the negligence of the Contractor, any subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable. Such losses shall include settlements made with the written consent and Approval of the Owner. No such losses, damages and expenses shall be included in the Cost of the Work for the purpose of determining the Contractor's Fee. If, however, any such loss or damage requires reconstruction and the Contractor is placed in charge thereof, the Contractor shall be paid for services a fee in accordance with paragraph 10.6.

10.4.2.9.7 The cost of utilities, fuel and sanitary facilities at the site.

10.4.2.9.8 Minor expenses such as telegrams, long distance telephone calls, telephone service at the site, expressage and similar petty cash items in connection with the Work.

10.4.2.9.9 Cost of premiums for additional bonds and insurance required because of changes in the Work and premiums for property insurance coverage within the limits of the deductible amounts established by the Owner in accordance with Article 5.

10.5 EXCLUDED COSTS:

10.5.1 The term Cost of the Work shall not include any of the following:

10.5.1.1 Payroll costs and other compensation of Contractor's officers, executives, principles (of partnership and sole proprietorships), general managers, engineers, architects, estimators, attorneys, auditors, accountants, purchasing and contracting agency, expeditors, timekeepers, clerks and other personnel employed by Contractor whether at the site or in Contractor's principal or a branch office for general administration of the Work and not specifically included in the agreed upon schedule of job classifications referred to in paragraph 10.4.2.1 - all of which are to be considered administrative costs covered by the Contractor's Fee.

10.5.1.2 Expenses of Contractor's principal and branch offices other than Contractor's office at the site.

10.5.1.3 Any part of Contractor's capital expenses including interest on Contractor's capital employed for the Work and charges against Contractor for delinquent payments.

10.5.1.4 Cost of premiums for all bonds and for all insurance whether or not Contractor is required by the Contract Documents to purchase and maintain the same (except for the cost of premiums covered by subparagraph 10.4.2.9.9 above).

10.5.1.5 Costs due to the negligence of Contractor, any subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable, including but not limited to, the correction of Defective Work, disposal of materials or equipment wrongly supplied and making good any damage to property.

10.5.1.6 Costs for the use of small tools having a value of five hundred dollars (\$500) or less.

10.5.1.7 Other overhead or general expense costs of any kind and the costs of any item not specifically and expressly included in paragraph 10.4.

10.6 CONTRACTOR'S FEE:

10.6.1 The Contractor's Fee allowed to Contractor for overhead and profit shall be a mutually agreed upon fixed fee, or if none can be agreed upon, a fee based on the following percentages of the various portions of the Cost of the Work:

10.6.1.1 For costs incurred under subparagraphs 10.4.2.1 through 10.4.2.6, the Contractor's Fee shall be 15%;

10.6.1.2 For costs incurred under subparagraphs 10.4.2.7, 10.4.2.8 and 10.4.2.9, the Contractor's Fee shall be 10%; and if a subcontract is on the basis of Cost of the Work plus a fee, the maximum allowable to the Contractor on account of overhead and profit of all subcontractors shall be 10%;

10.6.2 No fee shall be payable on the basis of costs itemized under paragraph 10.5;

10.6.3 The amount of credit to be allowed by the Contractor to the Owner for any such change which results in a net decrease in cost will be the amount of the actual net decrease plus a deduction in Contractor's Fee by a mutually agreed upon amount or if none can be agreed upon, then an amount equal to 5% of the net decrease; and

10.6.4 When both additions and credits are involved in any one change, the adjustment in Contractor's Fee shall be computed on the basis of the net change in accordance with subparagraphs 10.6.1.1. and 10.6.1.2.

10.7 COST BREAKDOWN:

10.7.1 Whenever the cost of any Work is to be determined pursuant to paragraphs 10.4 and 10.5, the Contractor will submit in a form acceptable to the Owner an itemized cost breakdown together with supporting data.

10.8 CASH ALLOWANCES:

10.8.1 It is understood the Contractor has included in the Contract Amount all allowances so named in the Contract Documents and shall cause the Work so covered to be done by such subcontractors or suppliers and for such sums within the limit of the allowances as may be acceptable to the Owner. Contractor agrees that:

10.8.1.1 The allowances include the cost to Contractor (less any applicable trade discounts) of materials and equipment required by the allowances to be delivered at the site, and all applicable taxes; and

10.8.1.2 Contractor's cost for unloading and handling on the site, labor, installation costs, overhead, profit and other expenses contemplated for the allowances have been included in the Contract Amount and not in the allowances. No demand for additional payment on account of any thereof will be valid. Prior to Final payment, an appropriate Change Order will be issued to reflect actual amounts due the Contractor on account of Work covered by allowances, and the Contract Amount shall be correspondingly adjusted.

10.9 UNIT PRICE WORK:

10.9.1 Where the Contract Documents provide that all or part of the work is to be Unit Price Work, initially the Contract Amount will be deemed to include for all Unit Price Work an amount equal to the sum of the established unit prices for each separately identified item of Unit Price Work times the estimated quantity of each item as indicated in the Contract.

10.9.2 The estimated quantities of items of Unit Price Work are not guaranteed and are solely for the purpose of comparison of Bids and determining an initial Contract Amount.

10.9.3 Determinations of the actual quantities and classifications of Unit Price Work performed by the Contractor will be made by the Owner in accordance with paragraph 10.10.

10.9.4 Each unit price will be deemed to include an amount considered by the Contractor to be adequate to cover the Contractor's overhead and profit for each separately identified item.

10.9.5 If the "Basis of Payment" clause in the Contract Documents relating to any unit price in the bid schedule requires that the said unit price cover and be considered compensation for certain Work or material essential to the item, this same Work or material will not also be measured or paid for under any other pay item which may appear elsewhere in the Contract Documents.

10.9.6 Payment to the Contractor shall be made only for the actual quantities of Work performed and accepted or materials furnished, in conformance with the Contract Documents.

10.9.7 When the accepted quantities of Work or materials vary from the quantities stated in the bid schedule, or change documents, the Contractor shall accept as payment in full, payment at the stated unit prices for the accepted quantities of Work and materials furnished, completed and accepted, except as provided below:

10.9.7.1 When the quantity of Work to be done or material to be furnished under any item, for which the total cost of the item exceeds 10% of the total Contract Amount, is increased by more than 25% of the quantity stated in the bid schedule, or change documents, either party to the Contract, upon demand, shall be entitled to an equitable unit price adjustment on the portion of the Work above 125% of the quantity stated in the bid schedule.

10.9.7.2 When the quantity of Work to be done or material to be furnished under any major item, for which the total cost of the item exceeds 10% of the total Contract Amount, is decreased by more than 25% of the quantity stated in the bid schedule, or change documents, either party to the Contract, upon demand, shall be entitled to an equitable price adjustment for the quantity of Work performed or material furnished, limited to a total payment of not more than 75% of the amount originally bid for the item.

10.10 DETERMINATIONS FOR UNIT PRICES:

10.10.1 The Owner will determine the actual quantities and classifications of Unit Price Work performed by the Contractor .

10.10.2 The Owner will review with the Contractor preliminary determinations on such matters before certifying the prices on the Bid Schedule.

10.10.3 The Owner's certification thereon will be final and binding on the Contractor, unless, within ten days after the date of any such decision, the Contractor delivers to the Owner written notice of intention to appeal from such a decision.

11. ARTICLE 11 - CONTRACT TIME; COMPUTATION & CHANGE:

11.1 COMMENCEMENT OF CONTRACT TIME; NOTICE TO PROCEED:

11.1.1 The Contract Time will commence to run on the day indicated in the Notice to Proceed.

11.2 STARTING THE WORK:

11.2.1 No Work on Contract items shall be performed before the effective date of the Notice to Proceed. The Contractor shall notify the Owner at least 24 hours in advance of the time actual construction operations will begin. The Contractor may request a limited Notice to Proceed after Award has been made, to permit him to order long lead materials which could cause delays in Project completion. However, granting is within the sole discretion of the Owner, and refusal or failure to grant a limited Notice to Proceed shall not be a basis for claiming for delay, extension of time, or alteration of price.

11.3 COMPUTATION OF CONTRACT TIME:

11.3.1 When the Contract Time is specified on a Calendar Days basis, all Work under the Contract shall be completed within the number of Calendar Days specified.

11.3.2 The count of Contract Time begins on the day following receipt of the Notice to Proceed by the Contractor, if no starting day is stipulated therein.

11.3.3 Calendar Days shall continue to be counted against Contract Time until and including the date of Final Completion of the Work.

11.3.4 When the Contract completion time is specified as a fixed calendar date, it shall be the date of Final Completion.

11.4 TIME CHANGE:

11.4.1 The Contract Time may only be changed by a Change Order or Supplemental Agreement.

11.5 EXTENSION DUE TO DELAYS:

11.5.1 The right of the Contractor to proceed shall not be terminated nor the Contractor charged with liquidated or actual damages because of any delays to the completion of the Work due to unforeseeable causes beyond the control and without the fault or negligence of the Contractor, including, but not restricted to the following: acts of God or of the public enemy, acts of the Owner in contractual capacity, acts of another contractor in the performance of a contract with the Owner, floods, fires, epidemics, quarantine restrictions, strikes, freight embargoes, unusually severe weather and delays of subcontractors or suppliers due to such causes.

11.5.2 Any delay in receipt of materials on the site, caused by other than one of the specifically mentioned occurrences above, does not of itself justify a time extension.

11.5.3 The Owner shall ascertain the facts and the extent of the delay and extend the time for completing the Work when the findings of fact justify such an extension.

11.6 ESSENCE OF CONTRACT:

11.6.1 All time limits stated in the Contract Documents are of the essence of the Contract.

11.7 REASONABLE COMPLETION TIME:

11.7.1 It is expressly understood and agreed by and between the Contractor and the Owner that the date of beginning and the time for Final Completion of the Work described herein are reasonable times for the completion of the Work.

11.8 DELAY DAMAGES:

11.8.1 Whether or not the Contractor's right to proceed with the Work is terminated, he and his sureties shall be liable for damages resulting from his refusal or failure to complete the Work within the specified time. Liquidated damages for delay shall be paid by the Contractor or his Surety to the Owner in the amount as specified in the Supplementary Conditions for each Calendar Day the completion of the Work or any part thereof is delayed beyond the Contract Time required by the Contract, or any extension thereof. If such amount of liquidated damages is not established by the Contract Documents, then the Contractor and his Surety shall be liable to the Owner for any actual damages occasioned by such delay.

11.8.2 The Contractor acknowledges that the liquidated damages established herein are not a penalty but rather constitute an estimate of damages that the Owner will sustain by reason of delayed completion. These liquidated damages are intended as compensation for losses difficult to estimate, and include those items enumerated in the Supplementary Conditions.

11.8.3 These damages will continue to run both before and after termination in the event of default termination. These liquidated damages do not cover excess costs of completion or the Owner's costs, fees, and charges related to re-procurement.

11.8.4 If a default termination occurs, the Contractor or his Surety shall pay in addition to these damages, all excess costs and expenses related to completion as provided by Article 14.2.9.

12. ARTICLE 12 - QUALITY ASSURANCE:

12.1 WARRANTY AND GUARANTY:

12.1.1 The Contractor warrants and guarantees to the Owner that all Work will be in accordance with the Contract Documents and will not be Defective.

12.1.2 Prompt notice of all defects shall be given to the Contractor. All Defective Work, whether or not in place, may be rejected, corrected or accepted as provided for in this Article.

12.2 ACCESS TO WORK:

12.2.1 The Owner and the Project Managers, testing agencies and governmental agencies with jurisdiction interests will have access to the Work at reasonable times for their observation, inspecting and testing. The Contractor shall provide proper and safe conditions for such access.

12.3 TESTS AND INSPECTIONS:

12.3.1 The Contractor shall give the Owner timely notice of readiness of the Work for all required inspections, tests or Approvals.

12.3.2 If Regulatory Requirements of any public body having jurisdiction require any Work (or part thereof) to specifically be inspected, tested or approved, the Contractor shall assume full responsibility therefor, pay all costs in connection therewith and furnish the Owner the required certificates of inspection, testing or Approval.

12.3.3 The Contractor shall also be responsible for and shall pay all costs in connection with any inspection or testing required in connection with Owner's acceptance of a supplier of materials or equipment proposed to be incorporated in the Work, or of materials or equipment submitted for Approval prior to the Contractor's purchase thereof for incorporation in the Work.

12.3.4 The cost of all inspections, tests and Approvals in addition to the above which are required by the Contract Documents shall be paid by the Contractor.

12.3.5 The Owner may perform additional tests and inspections which it deems necessary to insure quality control. All such failed tests or inspections shall be at the Contractor's expense.

12.3.6 If any Work (including the Work of others) that is to be inspected, tested or approved is covered without written concurrence of the Owner, it must, if requested by the Owner, be uncovered for observation.

12.3.7 Such uncovering shall be at the Contractor's expense unless the Contractor has given the Owner timely notice of Contractor's intention to cover the same and the Owner has not acted with reasonable promptness in response to such notice.

12.3.8 Neither observations nor inspections, test or Approvals by the Owner of others shall relieve the Contractor from the Contractor's obligations to perform the Work in accordance with the Contract Documents.

12.4 UNCOVERING WORK:

12.4.1 If any Work is covered contrary to the written request of the Owner, it must, if requested by the Owner, be uncovered for the Owner's observation and replaced at the Contractor's expense.

12.4.2 If the Owner considers it necessary or advisable that covered Work be observed, inspected or tested, the Contractor, at the Owner's request, shall uncover, expose or otherwise make available for observation, inspection or testing as the Owner may require, that portion of the Work in question, furnishing all necessary labor, material and equipment.

12.4.3 If it is found that such Work is Defective, the Contractor shall bear all direct, indirect and consequential costs of such uncovering, exposure, observation, inspection and testing and of satisfactory reconstruction, (including but not limited to fees and charges of engineers, architects, attorneys and other professional) and the Owner shall be entitled to an appropriate decrease in the Contract Amount.

12.4.4 If, however, such Work is not found to be Defective, the Contractor shall be allowed an increase in the Contract Amount or an extension of the Contract Time, or both, directly attributable to such uncovering, exposure, observation, inspection, testing and reconstruction.

12.5 OWNER MAY STOP THE WORK:

12.5.1 If the Work is Defective, or the Contractor fails to supply suitable materials or equipment, or fails to furnish or perform the Work in such a way that the completed Work will conform to the Contract Documents, the Owner may order the Contractor to stop the Work, or any portion thereof, until the cause for such order has been eliminated; however, this right of the Owner to stop the Work shall not give rise to any duty on the part of the Owner to exercise this right for the benefit of the Contractor or any other party.

12.6 CORRECTION OR REMOVAL OF DEFECTIVE WORK:

12.6.1 If required by the Owner, the Contractor shall promptly, as directed, either correct all Defective Work, whether or not fabricated, installed or completed, or, if the Work has been rejected by the Owner, remove it from the site and replace it with Work which conforms to the requirements of the Contract Documents. The Contractor shall bear all direct, indirect and consequential costs of such correction removal (including but not limited to fees and charges of engineers, architects, attorneys and other professionals) made necessary thereby.

12.7 ONE YEAR CORRECTION PERIOD:

12.7.1 If within one year after the date of Final Completion or such longer period of time as may be prescribed by Regulatory Requirements or by the terms of any applicable special guarantee required by the Contract Documents or by any specific provision of the Contract Documents, any Work is found to be Defective, the Contractor shall promptly, without cost to the

Owner and in accordance with the Owner's written instructions, either correct such Defective Work, or, if it has been rejected by the Owner, remove it from the site and replace it with conforming Work.

12.7.2 If the Contractor does not promptly comply with the terms of such instructions, or in an emergency where delay would cause serious risk of loss or damage, the Owner may have the Defective Work corrected or the rejected Work removed and replaced, and all direct, indirect and consequential costs of such removal and replacement (including but not limited to fees and charges of engineers, architects, attorneys and other professionals) will be paid by the Contractor.

12.7.3 In special circumstances where a particular item of equipment is placed in continuous service for the benefit of the Owner before Substantial Completion of all the Work, the correction period for the item may begin on an earlier date if so provided in the Specifications or by Change Order.

12.7.4 Provisions of this paragraph are not intended to shorten the Statute of Limitations for bringing an action.

12.8 ACCEPTANCE OF DEFECTIVE WORK:

12.8.1 Instead of requiring correction or removal and replacement of Defective Work, the Owner may accept Defective Work, and in this event, the Contractor shall bear all direct, indirect and consequential costs attributable to the Owner's evaluation of and determination to accept such Defective Work (costs to include but not be limited to fees and charges of engineers, architects, attorneys and other professionals).

12.8.2 If any such acceptance occurs prior to Final payment, a Change Order will be issued incorporating the necessary revisions in the Contract Documents with respect to the Work and the Owner shall be entitled to an appropriate decrease in the Contract Amount.

12.8.3 If the Owner has already made Final payment to the Contractor, an appropriate amount shall be paid by the Contractor or his Surety to the Owner.

12.9 OWNER MAY CORRECT DEFECTIVE WORK:

12.9.1 If the Contractor fails within a reasonable time after written notice from the Owner to proceed to correct Defective Work or to remove and replace rejected Work as required by the Owner in accordance with paragraph 12.6, or if the Contractor fails to perform the Work in accordance with the Contract Documents, or if the Contractor fails to comply with any other provision of the Contract Documents, the Owner may, after seven days' written notice to the Contractor, correct and remedy any such deficiency. In exercising the rights and remedies under this paragraph the Owner shall proceed expeditiously.

12.9.2 To the extent necessary to complete corrective and remedial action, the Owner may exclude the Contractor from all or part of the site, take possession of all or part of the Work, and suspend the Contractor's services related thereto, take possession of the Contractor's tool, appliances, construction equipment and machinery at the site and incorporate in the Work all materials and equipment stored at the site or approved remote storage sites or for which the Owner has paid the Contractor but which are stored elsewhere, the Contractor shall allow the Owner and his authorized representatives such access to the site as may be necessary to enable the Owner to exercise the rights and remedies under this paragraph.

12.9.3 All direct, indirect and consequential costs of the Owner or its agents in exercising such rights and remedies will be charged against the Contractor, and a Change Order will be issued incorporating the necessary revisions in the Contract Documents with respect to the Work and the Owner shall be entitled to an appropriate decrease in the Contract Amount.

12.9.4 Such direct, indirect and consequential costs will include but not be limited to fees and charges of engineers, architects, attorneys and other professionals, all court and arbitration costs and all cost of repair and replacement of Work of others destroyed or damaged by correction, removal or replacement of the Contractor's Defective Work.

12.9.5 The Contractor shall not be allowed an extension of the Contract Time because of any delay in performance of the Work attributable to the exercise by the Owner of the Owner's rights and remedies hereunder.

13. ARTICLE 13 - PAYMENTS TO CONTRACTOR AND COMPLETION:

13.1 SCHEDULE OF VALUES:

13.1.1 The Schedule of Values established as provided in paragraph 6.6 will serve as the basis for progress payments and will be incorporated into a form of Application for Payment acceptable to the Owner. Progress payments on account of Unit Price Work will be based on the number of units completed.

13.2 PRELIMINARY PAYMENTS:

13.2.1 Upon Approval of the Schedule of Values the Contractor may be paid for direct costs substantiated by paid invoices and other prerequisite documents required by the Contract Documents. Direct costs shall include the cost of Bonds, insurance, approved materials stored on the site or at approved remote storage sites, deposits required by a supplier prior to fabricating materials, and other approved direct mobilization costs substantiated as indicated above. These payments shall be included as a part of the total Contract Amount as stated in the Contract.

13.3 APPLICATION FOR PROGRESS PAYMENT:

13.3.1 The Contractor shall submit to the Owner for review an Application for Payment filled out and signed by the Contractor covering the Work completed as of the date of the Application for Payment and accompanied by such supporting documentation as required by the Contract Documents.

13.3.2 Progress payments will be made as the Work progresses on a monthly basis.

13.4 REVIEW OF APPLICATION FOR PROGRESS PAYMENT:

13.4.1 Owner will, either indicate in writing a recommendation of payment, or return the Application for Payment to the Contractor indicating in writing the Owner's reasons for refusing to recommend payment.

13.4.2 If the latter case, the Contractor may make the necessary corrections and resubmit the Application for Payment.

13.5 STORED MATERIALS AND EQUIPMENT:

13.5.1 If payment is requested on the basis of materials and equipment not incorporated in the Work but delivered and suitably stored at the site or at another location agreed to in writing, the Application for Payment shall also be accompanied by a bill of sale, invoice or other documentation warranting that the Owner has received the materials and equipment free and clear of all charges, security interests and encumbrances and evidence that the materials and equipment are covered by appropriate property insurance and other arrangements to protect the Owner's interest therein, all of which will be satisfactory to the Owner.

13.5.2 No payment will be made for perishable materials that could be rendered useless because of long storage periods.

13.5.3 No progress payment will be made for living plant materials until planted.

13.5.4 The payment may be reduced by an amount equal to transportation and handling cost if the materials are stored offsite, in a remote location, or will require special handling.

13.6 CONTRACTOR'S WARRANTY OF TITLE:

13.6.1 The Contractor warrants and guarantees that title to all Work, materials and equipment covered by any Application for Payment, whether incorporated in the Project or not, will pass to the Owner no later than the time of payment free and clear of any claims, liens, security interests and further obligations.

13.7 WITHHOLDING OF PAYMENTS:

13.7.1 The Owner may withhold or refuse payment for any of the reasons listed below provided it gives written notice of its intent to withhold and of the basis for withholding:

13.7.2 The Work is Defective, or completed Work has been damaged requiring correction or replacement, or has been installed without Approval of Shop Drawings, or by an unapproved subcontractor.

13.7.3 The Contract Amount has been reduced by Change Order.

13.7.4 The Owner has been required to correct Defective Work or complete Work in accordance with paragraph 12.9.

13.7.5 The Owner's actual knowledge of the occurrence of any of the events enumerated in subparagraphs 14.2.1.1 through 14.2.1.11 inclusive.

13.7.6 Claims have been made against the Owner or against the funds held by the Owner on account of the Contractor's actions or inactions in performing this Contract, or there are other items entitling the Owner to a set off.

13.7.7 Subsequently discovered evidence or the results of subsequent inspections or tests, nullify any previous payments for reasons stated in subparagraphs 13.7.1 through 13.7.5.

13.7.8 The Contractor has failed to fulfill or is in violation of any of his obligations under any provision of this Contract.

13.8 RETAINAGE:

13.8.1 At any time the Owner finds that satisfactory progress is not being made it may in addition to the amounts withheld under 13.7 retain a maximum amount equal to 10% of the total amount earned on all subsequent progress payments.

13.8.2 This retainage may be released at such time as the Owner finds that satisfactory progress is being made.

13.9 REQUEST FOR RELEASE OF FUNDS:

13.9.1 If the Contractor believes the basis for withholding is invalid or no longer exists, immediate written notice of the facts and Contract provisions on which the Contractor relies, shall be given to the Owner, together with a request for release of funds and adequate documentary evidence proving that the problem has been cured.

13.9.2 In the case of withholding which has occurred at the request of the Department of Labor, the Contractor shall provide a letter from the Department of Labor stating that withholding is no longer requested.

13.9.3 Following such a submittal by the Contractor, the Owner shall have a reasonable time to investigate and verify the facts and seek additional assurances before determining whether release of withheld payments is justified.

13.10 SUBSTANTIAL COMPLETION:

13.10.1 When the Contractor considers the Work ready for its intended use the Contractor shall notify the Owner in writing that the Work of a designated portion thereof is substantially complete (except for items specifically listed by the Contractor as incomplete) and request that the Owner issue a certificate of Substantial Completion.

13.10.2 Within a reasonable time thereafter, the Owner, the Contractor and appropriate Consultant(s) shall make an inspection of the Work to determine the status of completion.

13.10.3 If the Owner does not consider the Work substantially complete, the Owner will notify the Contractor in writing giving the reasons therefore. If the Owner considers the Work

substantially complete, the Owner will within fourteen days execute and deliver to the Contractor a certificate of Substantial Completion with a tentative list of items to be completed or corrected.

13.10.4 At the time of delivery of the certificate of Substantial Completion the Owner will deliver to the Contractor a written division of responsibilities pending Final Completion with respect to security, operation, safety, maintenance, heat, utilities, insurance and warranties which shall be consistent with the terms of the Contract Documents.

13.10.5 The Owner shall be responsible for all Owner costs resulting from the initial inspection and the first re-inspection, and the Contractor shall pay all costs incurred by the Owner resulting from re-inspections, thereafter.

13.11 ACCESS FOLLOWING SUBSTANTIAL COMPLETION:

13.11.1 The Owner shall have the right to exclude the Contractor from the Work after the date of Substantial Completion, but the Owner shall allow Contractor reasonable access to complete or correct items on the tentative list.

13.12 FINAL INSPECTION:

13.12.1 Upon written notice from the Contractor that the entire Work or an agreed portion thereof is complete, the Owner will make a Final inspection with the Contractor and appropriate Consultants and will notify the Contractor in writing of all particulars in which this inspection reveals that the Work is incomplete or Defective.

13.12.2 The Contractor shall immediately take such measures as are necessary to remedy such deficiencies.

13.12.3 The Contractor shall pay for all costs incurred by the Owner resulting from re-inspections.

13.13 FINAL APPLICATION FOR PAYMENT:

13.13.1 After the Contractor has completed all such corrections to the satisfaction of the Owner and delivered all maintenance and operating instructions, schedules, guarantees, bonds, certificates of payment to all laborers, subcontractors and Suppliers, certificates of inspection, marked-up record documents and other documents all as required by the Contract Documents, and after the Owner has indicated that the Work is acceptable (subject to the provisions of paragraph 13.16), the Contractor may make application for Final payment following the procedure for progress payments.

13.13.2 The Application for Final Payment shall be accompanied by all certificates, warranties, guaranties, releases, affidavits, and other documentation required by the Contract Documents.

13.14 FINAL PAYMENT AND FINAL COMPLETION:

13.14.1 If on the basis of the Owner's observation of the Work during construction and Final inspection, and the Owner's review of the Application for Final Payment and accompanying documentation all as required by the Contract Documents, the Owner is satisfied that the Work has been completed and the Contractor's other obligations under the Contract Documents have been fulfilled, the Owner will process Application for Final Payment.

13.14.2 Otherwise, the Owner will return the Application for Final Payment to the Contractor, indicating in writing the reasons for refusing to process Final payment, in which case the Contractor shall make the necessary corrections and resubmit the Application for Final Payment.

13.14.3 If, through no fault of the Contractor, Final Completion of the Work is significantly delayed, the Owner shall, upon receipt of the Contractor's Final Application for Payment, 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 to be held by the Owner for Work not fully completed or corrected is less than the retainage provided for in paragraph 13.8, and if Bonds

have been furnished as required in paragraph 5.1, the written consent of the Surety to the payment of the balance due for that portion of the Work fully completed and accepted shall be submitted by the Contractor to the Owner with the application for such payment.

13.14.4 Such payment shall be made under the terms and conditions governing Final Payment, except that it shall not constitute a waiver of claims.

13.15 FINAL ACCEPTANCE:

13.15.1 Following receipt of the Contractor's Release with no exceptions, and certification that laborers, subcontractors and material men have been paid, certification of payment of payroll and revenue taxes, and Final payment to the Contractor, the Owner will issue a letter of Final Acceptance, releasing the Contractor from further obligations under the Contract, except as provided in paragraph 13.16.

13.16 CONTRACTOR'S CONTINUING OBLIGATION:

13.16.1 The Contractor's obligation to perform and complete the Work and pay all laborers, subcontractors, and material men in accordance with the Contract Documents shall be absolute.

13.16.2 Neither any progress or Final payment by the Owner, nor the issuance of a certificate of Substantial Completion, nor any use or occupancy of the Work or any part thereof by the Owner, nor any act of acceptance by the Owner nor any failure to do so, nor any review and Approval of a Shop Drawing or sample submission, nor any correction of Defective Work by the Owner will constitute an acceptance of Work not in accordance with the Contract Documents or a release of the Contractor's obligation to perform the Work in accordance with the Contract Documents.

13.17 WAIVER OF CLAIMS BY CONTRACTOR:

13.17.1 The making and acceptance of Final payment will constitute a waiver of all claims by the Contractor against the Owner other than those previously made in writing and still unsettled.

13.18 NO WAIVER OF LEGAL RIGHTS:

13.18.1 The Owner shall not be precluded or be estopped by any payment, measurement, estimate, or certificate made either before or after the completion and acceptance of the Work and payment therefor, from showing the true amount and character of the Work performed and materials furnished by the Contractor, nor from showing that any payment, measurement, estimate or certificate is untrue or is incorrectly made, or that the Work or materials are Defective.

13.18.2 The Owner shall not be precluded or estopped, not with standing any such measurement, estimate, or certificate and payment in accordance therewith, from recovering from the Contractor or his Sureties, or both, such damages as it may sustain by reason of Contractor's failure to comply with requirements of the Contract Documents.

13.18.3 Neither the acceptance by the Owner, or any representative of the Owner, nor any payment for or acceptance of the whole or any part of the Work, nor any extension of the Contract Time, nor any possession taken by the Owner, shall operate as a waiver of any portion of the Contract or of the power herein reserved, or of any right to damages.

13.18.4 A waiver by the Owner of any breach of the Contract shall not be held to be a waiver of any other subsequent breach.

13.19 DEDUCTIONS:

13.19.1 The Owner may deduct from the amount of any payment made to the Contractor any sums owed to the Owner by the Contractor including but not limited to:

13.19.1.1 Past due sales tax,

13.19.1.2 port and harbor fees,

13.19.1.3 property tax or rent.

13.19.2 Before making any such deductions, the Owner shall have provided Contractor written notice of the amount claimed by the Owner to be due and owing from the Contractor.

14. ARTICLE 14 - SUSPENSION OF WORK, DEFAULT AND TERMINATION:

14.1 OWNER MAY SUSPEND WORK:

14.1.1 The Owner may, at any time suspend the Work or any portion thereof by notice in writing to the Contractor. If the Work is suspended without cause the Contractor shall be allowed an increase in the Contract Amount or an extension of the Contract Time, or both, directly attributable to any suspension if the Contractor makes an approved claim therefore as provided in Article 15.

14.1.2 However, no adjustment shall be made under this clause for any suspension, delay, or interruption to the extent that suspension is due to the fault or negligence of the Contractor, or that suspension is necessary for Contract compliance, or that performance would have been so suspended, delayed, or interrupted by any other cause, including the fault or negligence of the Contractor.

14.1.3 In case of suspension of Work, the Contractor shall be responsible for preventing damage to or loss of any of the Work already performed and of all materials whether stored on or off the site or approved remote storage sites.

14.2 DEFAULT OF CONTRACTOR:

14.2.1 If the Contractor:

14.2.1.1 Fails to begin the Work under the Contract within the time specified in the Contract Documents, or

14.2.1.2 Fails to perform the Work in accordance with the Contract Documents (including, but not limited to, failure to supply sufficient skilled workmen or suitable materials or equipment or failure to adhere to the progress schedule established under paragraph 6.6 as revised from time to time), or

14.2.1.3 Performs the Work unsuitably or neglects or refuses to remove materials or to correct Defective Work.

14.2.1.4 Discontinues the prosecution of the Work, or

14.2.1.5 Fails to resume Work which has been discontinued within a reasonable time after notice to do so, or

14.2.1.6 Becomes insolvent or is declared bankrupt, or commits any act of bankruptcy or insolvency except as prohibited by 11 U.S.C. 363, or

14.2.1.7 Allows any final judgment to stand against him unsatisfied for period of 60 days, or

14.2.1.8 Makes an assignment for the benefit of creditors without the consent of the Owner, or

14.2.1.9 Disregards Regulatory Requirements of any public body having jurisdiction, or

14.2.1.10 Otherwise violates in any substantial way any provisions of the Contract Documents, or

14.2.1.11 For any cause whatsoever, fails to carry on the Work in an acceptable manner, the Owner may give notice in writing to the Contractor and his Surety of such delay, neglect, or default.

14.2.2 If the Contractor or Surety, within the time specified in the above Notice of Default, shall not proceed in accordance therewith, then the Owner may, upon written notification to the Contractor or Surety of the fact of such delay, neglect or default and the Contractor's failure to comply with such notice, have full power and authority without violating the Contract, to take the prosecution of the Work out of the hands of the Contractor.

14.2.3 The Owner may terminate the services of the Contractor, exclude the Contractor from the site and take possession of the Work and of all the Contractor's tools, appliances, construction equipment and machinery at the site and use the same to the full extent they could be used by the Contractor (without liability to the Contractor for trespass or conversion), incorporate in the Work all materials and equipment stored at the site or for which the Owner has paid the Contractor but which are stored elsewhere, and finish the Work as the Owner may deem expedient.

14.2.4 The Owner may enter into an agreement for the completion of said Contract according to the terms and provisions thereof, or use such other methods that in the opinion of the Owner are required for the completion of said Contract in an acceptable manner.

14.2.5 The Owner may, by written notice to the Contractor and his Surety or his representative, transfer the employment of the Work from the Contractor to the Surety, or if the Contractor abandons the Work undertaken under the Contract, the Owner may, at his option with written notice to the Surety and without any written notice to the Contractor, transfer the employment for said Work directly to the Surety.

14.2.6 The Surety shall submit its plan for completion of the Work, including any contracts or agreements with third parties for such completion, to the Owner for Approval prior to beginning completion of the Work. Approval of such Contracts shall be in accordance with all applicable requirements and procedures for Approval of subcontracts as stated in the Contract Documents.

14.2.7 Upon receipt of the notice terminating the services of the Contractor, the Surety shall enter upon the premises and take possession of all materials, tools, and appliances thereon for the purpose of completing the Work included under the Contract and employ by contract or otherwise any person or persons to finish the Work and provide the materials therefore, without termination of the continuing full force and effect of this Contract.

14.2.8 In case of such transfer of employment to the Surety, the Surety shall be paid in its own name on estimates covering Work subsequently performed under the terms of the Contract and according to the terms thereof without any right of the Contractor to make any claim for the same or any part thereof.

14.2.9 If the Contract is terminated for default, the Contractor and the Surety shall be jointly and severally liable for damages for delay as provided by paragraph 11.8, and for the excess cost of completion, and all costs and expenses incurred by the Owner in completing the Work or arranging for completion of the Work, including but not limited to costs of assessing the Work to be done, costs associated with advertising, soliciting or negotiating for bids or proposals for completion, and other re-procurement costs.

14.2.10 Following termination the Contractor shall not be entitled to receive any further balance of the amount to be paid under the Contract until the Work is fully finished and accepted, at which time if the unpaid balance exceeds the amount due the Owner and any amounts due to persons for whose benefit the Owner has withheld funds, such excess shall be paid by the Owner to the Contractor.

14.2.11 If the damages, costs, and expenses due the Owner exceed the unpaid balance, the Contractor and his Surety shall pay the difference.

14.2.12 If, after notice of termination of the Contractor's right to proceed under the provisions of this clause, it is determined for any reason that the Contractor was not in default under the provisions of this clause, or that the delay was excusable under the provisions of this clause, or that termination was wrongful, the rights and obligations of the parties shall be determined in accordance with the clause providing for convenience termination.

14.3 RIGHTS OR REMEDIES:

14.3.1 Where the Contractor's services have been so terminated by the Owner, the termination will not affect any rights or remedies of the Owner against the Contractor then existing or which may thereafter accrue.

14.3.2 Any retention or payment of moneys due the Contractor by the Owner will not release the Contractor from liability.

14.4 CONVENIENCE TERMINATION:

14.4.1 The performance of the Work may be terminated by the Owner in accordance with this section in whole or in part, whenever, for any reason the Owner shall determine that such termination is in the best interest of the Owner.

14.4.2 Any such termination shall be effected by delivery to the Contractor of a Notice of Termination, specifying termination is for the convenience of the Owner the extent to which performance of Work is terminated, and the date upon which such termination becomes effective.

14.4.3 Immediately upon receipt of a Notice of Termination and except as otherwise directed by the Owner the Contractor shall:

14.4.3.1 Stop Work on the date and to the extent specified in the Notice of Termination;

14.4.3.2 Place no further orders or subcontracts for materials, services, or facilities except as may be necessary for completion of such portion of the Work as is not terminated;

14.4.3.3 Terminate all orders and subcontracts to the extent that they relate to the performance of Work terminated by the Notice of Termination;

14.4.3.4 With the written Approval of the Owner, to the extent he may require, settle all outstanding liabilities and all claims arising out of such termination of orders and subcontracts, the cost of which would be reimbursable, in whole, or in part, in accordance with the provisions of the Contract;

14.4.3.5 Submit to the Owner a list, certified as to quantity and quality, of any or all items of termination inventory exclusive of items the disposition of which had been directed or authorized by the Owner;

14.4.3.6 Transfer to the Owner the completed or partially completed record Drawings, Shop Drawings, information, and other property which, if the Contract had been completed, would be required to be furnished to the Owner;

14.4.3.7 Take such action as may be necessary, or as the Owner may direct, for the protection and preservation of the property related to the Contract which is in the possession of the Contractor and in which the Owner has or may acquire any interest.

14.4.4 The Contractor shall proceed immediately with the performance of the above obligations.

14.4.5 When the Owner orders termination of the Work effective on a certain date, all Work in place as of that date will be paid for in accordance with the Basis of Payment clause of the Contract.

14.4.6 Materials required for completion and on hand but not incorporated in the Work will be paid for at cost plus 15% with materials becoming the property of the Owner or the Contractor may retain title to the materials and be paid an agreed upon lump sum.

14.4.7 Materials on order shall be canceled, and the Owner shall pay reasonable factory cancellation charges with the option of taking delivery of the materials in lieu of payment of cancellation charges.

14.4.8 The Contractor shall be paid 10% of the cost, freight not included, of materials canceled, and direct expenses only for Contractor chartered freight transport which cannot be canceled without charges, to the extent that the Contractor can establish them.

14.4.9 The extra costs due to cancellation of Bonds and insurance and that part of job start-up and phase-out costs not amortized by the amount of Work accomplished shall be paid by the Owner.

14.4.10 Charges for loss of profit or consequential damages shall not be recoverable except as provided above.

14.4.11 The termination claim shall be submitted promptly, but in no event later than 90 days from the effective date of termination, unless one or more extensions in writing are granted by the Owner upon request of the Contractor made in writing within the 90 day period.

14.4.12 Upon failure of the Contractor to submit his termination claim within the time allowed, the Owner may determine, on the basis of information available to him, the amount, if any, due to the Contractor by reason of the termination and shall thereupon pay to the Contractor so determined.

14.4.13 The Contractor and the Owner may agree upon whole or any part of the amount or amounts to be paid to the Contractor by reason of the total or partial termination of the Work pursuant to paragraph 14.4.

14.4.14 The Contract shall be amended accordingly, and the Contractor shall be paid the agreed amount. In the event of the failure of the Contractor and the Owner to agree in whole or in part, as provided heretofore, as to the amounts with respect to costs to be paid to the Contractor in connection with the termination of the Work the Owner shall determine, on the basis of information available to him, the amount, if any, due to the Contractor by reason of the termination and shall pay to the Contractor the amount determined as follows:

14.4.14.1 All costs and expenses reimbursable in accordance with the Contract not previously paid to the Contractor for the performance of the Work prior to the effective date of the Notice of Termination;

14.4.14.2 So far as not included above, the cost of settling and paying claims arising out of the termination of the Work under subcontracts or orders which are properly chargeable to the terminated portions of the Contract;

14.4.14.3 The reasonable costs of settlement with respect to the terminated portion of the Contract heretofore, to the extent that these costs have not been covered under the payment provisions of the Contract.

14.4.15 The Contractor shall have the right of appeal under the Owner's claim procedures, as defined in Article 15, for any determination made by the Owner, except if the Contractor has failed to submit his claim within the time provided and has failed to request an extension of such time, Contractor shall have no such right of appeal. In arriving at the amount due the Contractor under this section, there shall be deducted:

14.4.15.1 All previous payments made to the Contractor for the performance of Work under the Contract prior to termination;

14.4.15.2 Any claim for which the Owner may have against the Contractor;

14.4.15.3 The agreed price for, or the proceeds of sale of, any materials, supplies, or other things acquired by the Contractor or sold pursuant to the provisions of this section and not otherwise recovered by or credited to the Owner; and,

14.4.15.4 All progress payments made to the Contractor under the provisions of this section.

14.4.16 Where the Work has been terminated by the Owner said termination shall not affect or terminate any of the rights of the Owner against the Contractor or his Surety then existing or which may thereafter accrue because of a default.

14.4.17 Any retention or payment of monies by the Owner due to the Contractor under the terms of the Contract shall not release the Contractor or his Surety from liability.

14.4.18 Unless otherwise provided for in the Contract Documents, or by applicable statute, the Contractor, from the effective date of termination and for a period of three years after final settlement under this Contract, shall preserve and make available to the Owner at all reasonable times at the office of the Contractor, all its books, records, documents, and other evidence bearing on the cost and expenses of the Contractor under this Contract and relating to the Work terminated hereunder.

15. ARTICLE 15 - CLAIMS AND DISPUTES:

15.1 NOTIFICATION:

15.1.1 In addition to the notice requirements set out elsewhere in this Contract, if the Contractor becomes aware of any act or occurrence which may form the basis of a claim by the Contractor for additional compensation or an extension of time for performance, or if any dispute arises regarding a question of fact or interpretation of the Contract, the Contractor shall immediately inform the Project Manager.

15.1.2 If the matter cannot be resolved by agreement within 7 days, the Contractor shall, within the next 14 days, submit an Intent to Claim in writing to the Project Manager.

15.1.3 The Claim, if not resolved, shall be presented to the Project Manager, in writing, within 60 days following receipt of the Intent to Claim.

15.1.4 Receipt of the Claim will be acknowledged in writing by the Project Manager.

15.1.5 The Contractor agrees that unless these written notices are provided, the Contractor will have no entitlement to additional time or compensation for such act, event or condition.

15.1.6 The Contractor shall in any case continue diligent performance of the Contract.

15.2 PRESENTING CLAIM:

15.2.1 The Claim shall be submitted in accordance with ARRC Procurement Rule 1800.12 and shall specifically include the following:

15.2.1.1 The act, event or condition giving rise to the claim.

15.2.1.2 The Contract provisions which apply to the claim and under which relief is provided.

15.2.1.3 The item or items of Contract Work affected and how they are affected.

15.2.1.4 The specific relief requested, including additional Contract Time if applicable, and the basis upon which it was calculated.

15.3 CLAIM VALIDITY, ADDITIONAL INFORMATION, & PROJECT MANAGER'S ACTIONS:

15.3.1 The Claim, in order to be valid, must not only show that the Contractor suffered damages or delay but that those conditions were actually a result of the act, event or condition complained of and that the Contract provides entitlement to relief to the Contractor for such act, event, or condition.

15.3.2 The Project Manager reserves the right to make written request to the Contractor at any time for additional information which the Contractor may possess relative to the Claim.

15.3.3 The Contractor agrees to provide the Project Manager such additional information within 30 days of receipt of such a request. Failure to furnish such additional information may be regarded as a waiver of the Claim.

15.3.4 The Claim, if not resolved by agreement within 60 days of its receipt, will automatically be forwarded to the Owner for formal written decision.

15.4 OWNER'S DECISION:

15.4.1 The Contractor will be furnished the Owner's Decision within the next 90 days, unless additional information is requested by the Owner.

15.4.2 The Owner's Decision is final and conclusive unless fraudulent as to the Claim.

15.5 NOTICE OF APPEAL:

15.5.1 Within 14 days of receipt of the Owner's Decision, the Contractor may deliver a Notice of Appeal to the Owner in accordance with ARRC Procurement Rule 1800.13 and request a hearing.

15.5.2 The Notice of Appeal shall include specific exceptions to the Owner's Decision, including specific provisions of the Contract, which the Contractor intends to rely upon in the appeal.

15.5.3 General assertions that the Owner's Decision is contrary to law or to fact are not sufficient.

15.6 OWNER'S DECISION ON APPEAL:

15.6.1 The decision of the Owner on appeal will be rendered within 90 days after the conclusion of a hearing conducted under ARRC Procurement Rule 1800.15 or the date of receipt of the Notice of Appeal, whichever is later.

15.6.2 The time limits given above may be extended by mutual consent.

15.6.3 The decision of the Owner on appeal shall be final and conclusive unless the Contractor appeals to the superior court in accordance with ARRC Procurement Rule 1800.18.

16. ARTICLE 16 - MISCELLANEOUS:

16.1 GOVERNING LAW:

16.1.1 This Contract shall be governed by the laws of the State of Alaska and the provisions of ARRC's Procurement Rules.

16.2 CONTRACT CLAUSES:

16.2.1 If any contract clause is declared null and void, then all other clauses shall remain in force.

APPENDIX F

SUPPLEMENTAL CONDITIONS

The site work shall be carried out in accordance with the Municipality of Anchorage Standard Specifications, dated 2015, referred to as M.A.S.S, including all current standard modifications and special provisions, except as amended and supplemented by these Supplemental Conditions and the Contract Drawings.

SC-01 Safety

1. Roadway Worker Protection: Safety is of the utmost importance for the Alaska Railroad Corporation (ARRC); refer to ARRC General Conditions Section 6.17-Work Safety on Railroad Property. Note that a Railroad Safety Plan will be required. Contractor's project supervisors/foremen will be required to complete an ARRC approved Roadway Worker Protection (RWP) course. All Contractor employees expected to be working on or near the tracks are encouraged to complete an RWP course. An approved on-line version of this course is offered at www.contractororientation.com.
2. Site Safety Plan: The Contractor shall submit a site Health and Safety Plan to ARRC for compatibility acceptance before the contractor or any subcontractor begins any construction-related work under this contract. Construction-related work includes but is not limited to mobilization, equipment setup, storage, etc., taking place on sites under ARRC control.

The plan must outline procedures for first aid, emergency response, chemical exposures, spills, site sign-in requirements for site-safety briefings, coordination with ARRC dispatch, Section 6.16 (SAFETY AND PROTECTION), Section 6.17 (WORK SAFETY ON RAILROAD PROPERTY), Section 6.18 (EMERGENCIES) and other sections of the contract GENERAL CONDITIONS.

3. Contractor will be required to complete safety and security training as required by the Port of Anchorage. ARRC will coordinate training session to occur after the Pre-Construction meeting.

SC-02 Contract Time

1. Notice to Proceed: It is anticipated that the awarded Contractor will receive the Notice to Proceed (NTP) within three (3) weeks of the bid opening.
2. Site Access and Use: Except for restrictions indicated herein and in the associated project permits, the Contractor may access the project limits as indicated in the Contract Drawings immediately following notice to proceed. Access prior to this date must be approved and coordinated with the Owner.

3. Initial Project Completion: Initial Project Completion for Phase I work shall be complete on or before twenty-one (21) days after Substantial Completion. This work includes any outstanding rework or punch list items, site cleanup, and demobilization.
4. Final Completion: Final Completion of all work shall be on or before October 1, 2020

SC-03 Minimum Work to be Performed by the Contractor

The Contractor shall perform with their own organization not less than 30% of the original contract base amount.

SC-04 Progress Meetings and Reports

1. Preconstruction Meeting: A pre-construction meeting shall occur before commencing any work. The initial CPM project schedule will be reviewed at this meeting. This Meeting will include Port of Anchorage representatives and contractors.
2. Progress Meetings: Progress meeting shall be held weekly or as needed at owners discretion, at a pre-determined time and location designated by the Contractor and the Owner's Representative. Attendance at this meeting by Contractor supervisory personnel is mandatory. Other Contractor or sub-contractor personnel may be invited to discuss specific issues.
3. Work Plan: The Contractor shall provide a work plan as described in General Conditions 6.7.3. The work plan shall cover the current week and the following two (2) weeks for a three (3) week total overview and shall include all active prime and sub-contractor work. This work plan must be coordinated with the Owner to include track work construction items performed by the Owner and shall be updated for each scheduled progress meeting and submitted to the Owner's Representative at least two (2) business days before the progress meeting.
4. CPM Schedule Update: The CPM schedule shall be updated for each scheduled progress meeting and submitted to the Owner's Representative at least two (2) business days before the progress meeting.
5. Record Drawing Updates: The Contractor shall provide a list of edits or additions to any to the Record Drawings.

SC-05 Permit Requirements

1. Regulatory Permit Compliance: The contractor is required to comply with all applicable laws, federal, state and local, and the regulatory permits that govern the proposed bridge construction.

SC-06 ARRC General Construction Requirements

1. General Requirements:

- a. All construction, reconstruction, operation and maintenance on Railroad property shall be performed in compliance with these specifications. For the purposes of this contract, the project limits within the existing or new rights-of-way shall be considered Railroad property.
- b. Whenever in the opinion of the Owner's Representative, the construction may cause a hazard to the safe operation of the Railroad, the Owner may place at the site of the work the required number of qualified employees to protect the Railroad's operations. The providing of such employees and such other precautions as may be taken shall not relieve the Contractor or subcontractors from liability for the payment of damages caused by their operations. ARRC shall be the sole judge of the necessity for, and as to the number and classification of employees required. All ARRC cost and expense for providing such additional employees shall be collected from the Contractor, with the exception of flagging, which shall be paid for as described in the ARRC General Conditions 6.17.

2. Protection of Railroad Traffic and Property

- a. The Contractor shall make provisions satisfactory to the Owner's Representative against disturbing, in any manner, the embankment, structures and tracks during construction. If the work to be performed by the Contractor shall, as determined by the Owner's Representative, weaken or undermine the Railroad's embankment, structures or tracks, then said work shall be stopped, upon notice to do so. Should any damage occur to ARRC property as a result of the Contractor's unauthorized or negligent operations, the Owner may repair such damages and/or perform any work for protection of its property it may deem necessary and the actual cost thereof shall be borne by the Contractor.
- b. The Contractor shall furnish, install, maintain and subsequently remove temporary protective fencing, barricades, warning lights, and such additional protection as may be required at excavations, acceptable to the Owner's Representative.
- c. The following temporary clearances are the minimum, even with flag protection, which must be established and maintained at all times, prior to train passage, during the construction operations:
 - 1) Vertical: Twenty-three (23) feet above top of highest rail unless otherwise noted on the Plans.
 - 2) Horizontal: Nine (9) feet from centerline of the nearest track to the edge of obstruction, measured at right angles, thereto, unless otherwise indicated on the Plans.
- d. In the event that lesser clearances than the above are required for any part of the work, the Contractor must secure written authorization from the Owner's Representative for such lesser clearances in advance of the start of the work

on that portion of the project along, on, over or across the property or tracks of the ARRC.

- e. The Contractor shall follow Federal, State and local governmental guidelines and suggestions for notification and location of utility locations before proceeding with work.
- f. The Contractor shall, before entering onto the property of the ARRC or project limits for the performance of any construction work or work preparatory thereto, secure permission from the Owner's Representative for the occupancy and use of the ARRC property and shall confer with the Owner's Representative relative to the requirements for Railroad clearances, operation, and general safety regulations.
- g. The Contractor shall, upon the completion of the work, remove from the property of the ARRC, all machinery, equipment, surplus materials, falsework, rubbish and temporary buildings made necessary by the contract operations, and to leave said property in a neat condition satisfactory to the Owner's Representative.

3. Protection of Roadway Traffic

- a. The Contractor shall be exclusively responsible for all roadway-related activity and shall obtain and submit to the Owner an ADOT-approved traffic control plan for traffic impacts.
- b. All costs involved in the development and implementation of traffic control plans, including flagging, signs, roadway maintenance, approval by the agency responsible for the roadway, etc. shall be incidental to the work and shall be borne by the Contractor. No payment will be made for this by the Owner.

4. Access Roads

- a. No payment will be made to the Contractor by the Owner for any work done in constructing, improving, repairing or maintaining any road or structure for use in the performance of the work. The Owner assumes no responsibility for the condition or maintenance of any road or structure that may be used by the Contractor in performing the work or in traveling to and from the site of the work.
- b. All haul routes and access roads within the Railroad property shall be reviewed and approved by the Owner's Representative.
- c. Where it is necessary to place a portion of the haul or service road or occupy an area off the Railroad's right-of-way, the Contractor shall obtain written release from the landowner and tenant for the land involved. At the completion of the project, the area used by the Contractor shall be returned to a condition satisfactory to the landowner and duly constituted environmental agencies.

5. Utility Facilities.

- a. The Contractor shall coordinate with utility owners and ARRC for the relocation and protection of facilities during construction.

- b. All work shall be coordinated in such a manner as to protect the utility at all times from damages, or outages, resulting directly, or indirectly from the Contractor's or subcontractor's operations. The Contractor shall bear the costs of all damages or outages caused by their actions or the actions of their subcontractor.
 - c. Installation and repair of all underground utilities, including culverts, pipelines, and underground power and communication lines, on ARRC Property shall conform to the current AREMA standards.
6. Excavations.
- a. No water shall be allowed to stand in open excavations in the track area.
 - b. Bridging and shoring shall be adequate to safely carry Railroad traffic.
 - c. All open excavations shall be continuously protected by flags, barricades, or watchmen as directed by the Owner's Representative.
 - d. No open trenches shall be left open more than three (3) days, unless authorized by the Owner's Representative.
 - e. The Railroad embankment and cut slopes shall not be disturbed any more than necessary to accommodate the construction and shall be left in a stabilized condition.
 - f. Railroad ditches, culverts and roadways shall be kept clean and free of rock, gravel, construction debris and equipment at all times.
 - g. The Contractor shall obtain any appropriate permits required from the State and have the concurrence of the Owner's Representative prior to any dewatering activities.
7. Snow Removal.
- a. Snow removal operations shall be conducted in such a manner as to not place snow (1) upon the tracks of the Railroad, (2) where it impairs the visibility of either highway or rail traffic at the crossings, or (3) where it inhibits drainage.
8. Personal Injury Reporting
- a. ARRC is required to report certain injuries as a part of compliance with Federal reporting requirements.
 - b. Any personal injury sustained by a Contractor employee while on ARRC property must be reported immediately (by fax or email if unable to contact in person) to the Owner's Representative in charge of the project. The injury report form provided by the Railroad is to be completed and given to the Owner's Representative, no later than the close of shift on the date of injury. In the event of a serious incident, personal contact must be made.
 - c. The Contractor shall submit a one page typed report to the Owner's Representative within forty-eight (48) hours of incident. Report shall be a brief narrative describing details of incident, root cause as developed during

injury investigation and corrective measures recommended to prevent re-occurrences.

SC-07 Staging and Access

Materials and equipment must be stored in a neat, workmanlike manner. All materials, equipment, and debris must be removed at the completion of the project. Disturbed areas must be restored to pre-construction conditions. The ARRC will also be working on site at the same time as the contractor.

SC-08 Construction Buffer / Critical Areas

As part of the environmental requirements for this project, the existing drainage systems shall be protected during construction. Drainage system protection encompasses the protection of all existing watersheds, springs, wetlands, and watercourses (e.g., streams). Wherever possible, a minimum of twenty-five (25) feet of undisturbed natural vegetation and stabilized banks will be retained adjacent to water courses and wetlands as a buffer and sediment filter for runoff from adjacent disturbed areas. Buffers will be identified and flagged by the Contractor adjacent to streams, drainages, and wetlands prior to any clearing or restoration activities.

Should construction activities result in disturbance within the designated buffer, the Contractor must restore the area with native vegetation. A detailed restoration plan must be completed by the Contractor and submitted to the Owner for approval thirty days (30) prior to commencement of restoration activities. The Owner's Representative will review the draft restoration plan, and either approve it, or recommend changes. Make all necessary revisions to obtain the Owner's Representative's approval of the restoration plan. This plan must contain at a minimum: the design of and materials for restoration including a species list, number of plantings, schedule, watering, standards for success, and monitoring.

The Contractor will be responsible for successfully implementing the approved restoration plan and obtain approval of the Owner's Representative in writing.

SC-09 Temporary Erosion And Pollution Control

Stormwater Pollution Prevention Plan (SWPPP): The area of disturbance is above the 1 acre minimum that requires a SWPPP. The contractor shall be responsible for obtaining and complying with the environmental permits issued for this project.

Hazardous Material Control Plan (HMCP): The contractor shall prepare a HMCP for the handling, storage, cleanup, and disposal of petroleum products or other hazardous substances (See 40 CFR 117 and 302 for listing of hazardous materials.) List and give the location of all hazardous materials, including office materials, to be used and/or stored on-site, and their estimated quantities. Detail the plan for storing these materials

as well as disposing of waste petroleum products and other hazardous materials generated by the project.

Identify the locations where storage, fueling and maintenance activities will take place, describe the maintenance activities, and list all controls to prevent the accidental spillage of oil, petroleum products and other hazardous materials (i.e. maintenance and fueling pads, drip pans, absorbent materials).

Detail the procedures for containment and cleanup of hazardous substances, including a list of the types and quantities of equipment and materials available on site to be used.

Detail the plan for the prevention, containment, cleanup, and disposal of soil and water contaminated by accidental spills. The plan should also address how to deal with unexpected contaminated soil and water encountered during construction. Any spill, regardless of the size, must be reported to the Owner's Representative.

Specify the line of authority and designate the field representative for spill response and one representative for each subcontractor. Include a copy of the inspection form to be used for weekly compliance inspections in the HMCP with a certification of compliance or remedy. The Contractor shall sign and certify compliance with this plan. Implement all measures in the HMCP and ensure that it remains current. Inspections for the HMCP will be completed jointly by the Contractor and the Owner's Representative along with the BMP inspections, as outlined in section 641-3.01. Failure to comply with the HMCP requirements, or immediately remedy issues of noncompliance, will be subject to penalties equal to those specified under section 641-5.01.

Best Management Practice (BMP): is defined as any program, technology, process, sitting criteria, operating method, measure, or device which controls, prevents, removes, or reduces erosion, sedimentation, and/or pollution. BMPs include temporary and permanent structural and non-structural devices and practices.

SC-10 Rail Operations Coordination

General Background:

The proposed project will be constructed during active rail operations. This project is located in part of a critical freight transportation system. Railcars, containers and break bulk cargo are transferred from barge to rail at either the Whittier Terminal or Seward Terminal for transportation to the Anchorage Terminal and interior Alaska. The freight activities between rail and barge are closely coordinated and interdependent. The proposed embankment construction must be planned, scheduled and undertaken to avoid disruption to the rail freight operation.

The proposed project may be constructed outside of the peak passenger train season which typically ends around the middle of September. This will allow for less of an impact to construction activities when working around the tracks.

Operational schedules are adjusted and influenced by weather, tides, freight make-up, loading and off-loading quantities, and equipment reliability.

Other, infrequent barge freight operations also use the Whittier Terminal and Seward Terminal. In the past, these have included both Northland and Spenard Builders Supply. Generally, this additional barge traffic is due to unfavorable ice conditions in Cook Inlet.

Alaska Railroad train operations are scheduled to service the barge arrivals. The barge arrival schedules become firmer as the vessel progresses towards Whittier. Generally, the greatest schedule uncertainty is associated with the leg of the voyage that crosses the Gulf of Alaska. Inbound tows will sometimes choose to remain in Icy Strait awaiting fairer marine conditions to cross the Gulf. Occasionally, barges will stack-up in Icy Strait and later arrive nearly together at the Whittier Terminal.

Occasional barge double-tows require more off-loading time and longer periods of train activity before the final loaded train departs the terminals.

ARRC Flagging

Situational Requirements:

Railroad flag protection (flagging) is required whenever people, vehicles, or equipment are within 20' of the tracks.

Flagging is also required if equipment can reach within 20' of the tracks. Some examples of other situations which may require flagging:

- Surveying within 20' of the tracks
- Boring under the tracks
- Working over the tracks (on a bridge or with overhead utility lines)
- Working within 20' of any railroad facilities, including signal facilities.
- Movement of off-road or oversized/overweight loads over at-grade crossings
- Operating tracked equipment over at-grade crossings
- Using a sweeper truck on at-grade crossings
- Crossing tracks on foot with limited sight distance

Railroad flagging personnel are provided to protect ARRC personnel, equipment, passengers, and facilities from the work being performed, and to provide protection to contractors working within ARRC ROW from ARRC operations. They are NOT inspectors of the work being performed. ARRC reserves the right to require construction observation for work within ARRC ROW. Flaggers will provide daily job briefings and ensure at each briefing that all contractor activities planned for that day will comply with the most current version of the Alaska Railroad Safety Policies. All personnel entering the project limits are required to have a job briefing with the Flagger prior to work.

A single flagger may cover a limited length of track, depending on track curves, sight lines, radio contact, and other factors. The ARRC will determine in its discretion flagging

limits per location and how many flaggers are necessary to cover the required work area.

The minimum flag protection time for which the contractor shall be responsible is 8 hours per day, per flagger, regardless of the actual time during each day that flagging is required. No single flagger may work more than 12 hours in a given day, 60 hours in a given week, or 6 days in a row.

Flagging hours will typically exceed the contractor's onsite work hours. Additional time is required for flaggers to travel to and from the work site, to obtain track authority, and to set up and tear down equipment, each of which are included in the time allotted for flag protection. On average, a flagger will work 2-3 hours per day in addition to the onsite flagging time.

Flagging required for near track work will be billed to the contractor at the Flag Projection Cost. This includes additional flagger(s) required to be called out so as not to exceed the times stated above.

Scheduling:

Flagging requests must be submitted 10 business days prior to the start of work. ARRC will make a reasonable effort to provide flagging to accommodate contractors' schedules. However, staffing is limited during certain times of the year and personnel may not be available at specific times.

To avoid flagging charges, cancellations of flagging requests must be made at least 72 hours prior to the scheduled start of flagging operations. Any cancellations received with less than 72 hours' notice are subject to payment of the minimum daily rate, as determined by ARRC, for the number of flaggers assigned to the project.

Flag Protection Cost:

Flagging will be billed out at a daily rate of \$1,200.00 per flagger, per 12 hour shift. The rate will not be prorated for partial shifts. Anything over 12 hours will be billed an additional day at the daily rate stated.

Other On-Track Railroad Activities:

Other Railroad on-track activities that will pass the proposed project site include snow plowing and track inspection. The track is inspected, in accordance with federal regulations, twice a week by hyrail.

ARRC Work Train At The Contractors Expense:

1. If Work trains are elected to be used by the Contractor, they shall provide a minimum of 21 days' notice for ARRC work train coordination and use for mobilization, demobilization, loading/unloading materials.

2. Loading / Unloading and any other operation or procedure resulting from the use of a work train shall not, in any way, inhibit Rail traffic or any scheduled train.
3. Work Plans for any work train use shall be submitted to the ARRC and approved accordingly, prior to scheduling the work train.
4. The contractor may utilize a Work Train to move equipment and materials to and from the project site. Expenditures for train moves will be the responsibility of the contractor and pricing for such should be subsidiary to the applicable bid line items.
5. ARRC work trains may mobilize and demobilize jobsite facilities and equipment and materials at ARRC's convenience.
6. Contractor shall provide at least 4 people to remove load securements, 2 operator and 1 supervisor at the site during unloading of equipment and materials for mobilization and demobilization.
7. Marshalling area is available at the ARRC Anchorage Yard for moving contractor's equipment. ARRC may consider alternate marshalling areas proposed by the Contractor.
8. Materials will be loaded at ARRC's Birchwood Yard. ARRC may consider alternate areas proposed by the Contractor.
9. Overtime, stand-by time, or delays caused by work train schedules are the Contractor's responsibility.
10. ARRC Work Trains hours of service may and will not exceed 12 hours. Hours of service are set by Federal Regulations. Delays to the work train will be as outlined in these Contract Documents.

SC-11 Train Delays

1. All work on ARRC Property shall be conducted in such a manner as to prevent delays to trains or other rail traffic operated by ARRC.
2. Should any of the Permittee/Contractor's or its subcontractor's actions or activities cause delays to trains or other rail or water traffic, the agreed amount of liquidated damages shall be at the following rates and shall be collected from the Permittee/Contractor by ARRC.
 - a) Passenger trains each: \$50 per minute of delay, 60-minute minimum charge.
 - b) All other rail traffic: \$50 per minute for each delay over five minutes, 30-minute minimum charge.
 - c) Rail barges or other Connecting Carrier Vessels: No charge for delays of one hour or less; \$1,000 per hour for each hour or any part of an hour thereafter with a minimum charge of \$6,000.
 - d) Work Train delays: \$10,070.00 per day for each calendar day for delays.

Delay time will be taken from the train sheet in ARRC's Dispatcher's Office, Anchorage for all delays and such train sheet shall be the official document by which the length of

time a train is delayed will be determined. If another crew is needed to relieve the original crew, the charge shall also apply to the second crew. If such delay causes a water carrier to miss a sailing, the liquidated damage computation of time covering the period of time to the next possible sailing time shall be in addition to the length of time determined by said train sheet.

END OF SUPPLEMENTAL CONDITIONS

APPENDIX G

CONSTRUCTION QUALITY CONTROL (CQC) PLAN

1. SUBMITTAL AND GENERAL REQUIREMENTS

- 1.1. Section 6.26 of the General Conditions requires a CQC Plan. This section provides further information about CQC Plan requirements.
- 1.2. The Contractor shall establish and maintain an effective quality management system. The quality management system shall consist of plans, procedures, and the organization necessary to provide material, equipment, and workmanship that comply with the requirements of the contract documents. The system shall cover operations both onsite and offsite, and shall be keyed to the proposed sequence of the work.
- 1.3. The Contractor shall prepare a Construction Quality Control (CQC) plan in conformance with the requirements of this appendix and all other contract documents. A complete detailed CQC plan shall be submitted to the Project Manager within 10 days of intent to award and shall be approved in writing by the Project Manager prior to proceeding with the work.

The Contractor's CQC plan shall include. The CQC plan shall include detailed description of how manufactured materials will be stockpiled and protected prior to incorporation into the project.
- 1.4. The CQC plan shall be capable of ensuring that the procurement, shipping, handling, fabrication, installation, cleaning, inspection, construction, testing, storage, examination, repair maintenance, and required modifications of all materials, equipment, and elements of the work comply with the requirements of the contract documents and that all materials incorporated in the work will perform satisfactorily for the purpose intended.
- 1.5. If Contractor does not provide an acceptable CQC plan, ARRC may, at its sole discretion, elect to award the contract to others.

2. AUTHORITY AND RESPONSIBILITY

- 2.1. Authority: The persons and organizations performing quality control and quality assurance functions shall have sufficient authority and organizational freedom to identify quality problems and to initiate, recommend, provide, and verify implementation of the solution.
- 2.2. Changes in Plan or Personnel: The Contractor shall not revise the CQC or the quality staffing levels or replace any of the key personnel specified herein without prior written approval from the Project Manager.
- 2.3. Contractor's Responsibility: The Contractor is solely responsible for achieving project quality and shall have overall responsibility for the quality of all construction work. The contractor shall conduct quality management

activities, which include inspection, materials testing, and other activities specifically developed and/or chosen by the Contractor.

- 2.4. Owner's Responsibility: ARRC reserves the right to, and will, conduct inspections, testing, sampling, and evaluation associated with quality assurance and independent quality assurance. ARRC's role in construction is to provide the following.
 - 2.4.1. Quality assurance and independent assurance of construction activities, inspection, and materials testing. ARRC will do this with either its staff or a consultant acting as the Project Manager.
 - 2.4.2. Oversight of the Contractor's quality management activities to ensure adherence to the CQC plan and compliance with the contract documents.
 - 2.4.3. Notifying the Contractor promptly of irregularities or deficiencies observed in the work.
 - 2.4.4. Oversight of the Contractor's construction management, including but not limited to scheduling, invoicing, shop drawing review, submittal review and processing, document control, measurement of pay item quantities, and SWPPP implementation and maintenance and etc.

3. CONSTRUCTION QUALITY CONTROL (CQC) PLAN

- 3.1. Objectives: Quality in the construction phase is the program of policies, procedures, and responsibilities required to provide confidence that the desired characteristics have been obtained to help ensure the project will perform its intended function for its design life. Quality control in the construction phase shall consist of those actions necessary to assess production and construction processes so as to control the level of quality being produced in the end project. The Contractor's quality control actions shall include examining, checking, and inspecting in-process and completed work, and materials sampling and testing during production and construction, as a means of controlling and measuring the characteristics and conformity of an item, process, or feature to contract requirements.
- 3.2. The Contractor's CQC plan shall be capable of:
 - 3.2.1. Ensuring that the design, procurement, shipping, handling, fabrication, installation, cleaning, inspection, construction, testing, storage, examination, repair, maintenance, and required modifications of all materials, equipment, and elements of the work comply with the requirements of the contract documents.
 - 3.2.2. Ensuring that all materials incorporated in the work, all equipment, and all elements of the work will perform satisfactorily for the purpose intended.

- 3.3. Contents of the CQC Plan: The CQC plan shall delineate the type and frequency of inspection, sampling, and testing deemed necessary to measure and control the various properties of material and workmanship of all construction processes within the tolerances governed by the drawings and specifications, applicable codes and regulations, permit conditions, and other contract requirements as contained herein. The CQC plan shall include the following, at a minimum.
- 3.3.1. Construction activity and item inspection plans.
 - 3.3.2. Schedule of materials control including materials to be tested, test methods, and frequency of testing. The CQC Plan shall reference and match any test methods or frequencies described in the Contract Documents.
 - 3.3.3. Sampling techniques, and methodology, such as the use of random number tables, for selecting representative testing and or sampling locations.
 - 3.3.4. Control of workmanship.
 - 3.3.5. Identification and qualifications of key quality control personnel, including the quality control manager, inspectors, and technicians. Include an organization chart with reporting lines.
 - 3.3.6. Name and location of testing laboratories.
 - 3.3.7. Documentation procedures, including inspection and test records; accuracy and calibration checks; nature, number, and type of deficiencies found; nature of corrective actions; and quantities of work tested and sampled.
 - 3.3.8. Inventory of the field and laboratory equipment (along with calibration certifications) that will be used to perform the testing.
 - 3.3.9. Mandatory inspection points.
 - 3.3.10. Description of the quality control process that will be employed to ensure that any items manufactured off-site, including but not limited to multi-plate pipes, piles, bridge girders and structural steel meet contract requirements. If quality control is performed by subcontractors, manufacturers, or suppliers, provide their item-specific quality control processes as part of the CQC plan.
 - 3.3.11. Description of the quality control processes that will be employed to ensure installation of all structural items, including but not limited to utility crossings, culverts, multi-plate pipes, piles, structural concrete, and steel erection results in a product that conforms to contract requirements.
 - 3.3.12. Description of how and where manufactured materials will be stockpiled and protected prior to incorporation into the project.

4. CONSTRUCTION QUALITY ORGANIZATION

- 4.1. The construction CQC shall describe the Contractor's quality management organization for all of the project construction processes. At a minimum, the CQC shall identify the following positions.
 - 4.1.1. Construction Manager or Superintendent: The Construction Manager shall be the individual responsible for the overall project construction, quality management, and contract administration for this project.
 - 4.1.2. Construction Quality Manager: The Construction Quality Manager may work directly for the Contractor or may be contracted from an independent firm or organization. The Construction Quality Manager shall work under the direct supervision of the Construction Manager. The Construction Quality Manager and the Construction Manager or Superintendent shall not be the same person. It shall be the responsibility of the Construction Quality Manager to perform workmanship inspections, implement quality planning, oversee quality control testing, and coordinate with Owner's QA testing and independent assurance testing. The Construction Quality Manager shall also cooperate with the Project Manager in compiling a statistical correlation of materials and workmanship data. The Construction Quality Manager shall be responsible for submitting requested inspection, testing, and other data to the Project Manager on a daily basis or as determined by the Construction Quality Manager and ARRC's field representative.. The Construction Quality Manager shall have at least two years (within the last five years) of experience in inspection and materials testing for similar projects.
 - 4.1.3. Construction Testing Technicians: The construction testing technicians may work directly for the Contractor or may be contracted from an independent firm or organization. They shall work under the direct supervision of the Construction Quality Manager and perform testing and inspections as indicated in the CQC plan. Each Construction Testing Technician shall have training and/or technical certification, as appropriate, for the specific type and level of work that they will be testing, including sampling methods appropriate to the type of material being tested. Appropriately trained Construction Testing Technicians shall perform all contract required tests for excavation and embankment materials, selected embankment materials, subbase and base materials, asphalt pavement, concrete, welding, structural steel bolting, painting and coating, and any other materials or work for which the Contractor is responsible under the Contractor's quality management system.

- 5. PRECONSTRUCTION MEETING:** Before the start of construction, the Contractor shall meet with ARRC or its authorized representative in a pre-construction meeting. A topic of the pre-construction meeting shall be the Contractor's proposed quality

management system. During the meeting, a mutual understanding of the system details shall be developed, including the forms for recording the Contractor's quality control operations, control activities, testing, administration of the system for both onsite and offsite work, and the Contractor's quality control program. Minutes of the meeting shall be prepared and signed by both the Construction Manager and the Project Manager. The minutes shall become a part of the contract file. Additional conferences may be called at any time to reconfirm mutual understandings.

6. INSPECTIONS AND TESTS

- 6.1. Except where they are specifically indicated to be the Owner's responsibility, or are provided by another identified entity, the Contractor shall provide inspections, tests, and similar quality control services in accordance with the approved CQC plan. Costs for these services shall be included in the contract price, whether performed by the Contractor's personnel or an independent firm.
- 6.2. Associated Services: The Contractor shall cooperate with organizations performing required inspections, tests, and similar services and shall provide reasonable auxiliary services as requested. Auxiliary services required include, but are not limited to:
 - 6.2.1. Providing access to the work and furnishing incidental labor and facilities necessary to facilitate inspections and tests.
 - 6.2.2. Taking adequate quantities of representative samples of materials that require testing or assisting the Owner in taking samples.
 - 6.2.3. Providing facilities for storage or curing of test samples, and delivery of samples to testing laboratories.
 - 6.2.4. Providing the Owner with a proposed mix design for use for each materials mix that requires control. The mix design shall be for the current year, and shall be accompanied by current year test results from a materials testing laboratory with current AASHTO accreditation in the test methods required for the respective mix design. All source materials used for preparing the mix design shall be the same as those materials that will be used for the project.
 - 6.2.5. Security and protection of samples and test equipment at the project site.
- 6.3. Coordination: The Contractor, the Project Manager, and any independent testing agencies shall coordinate the sequence of activities to accommodate required inspection and testing services with a minimum of delay. In addition, the Contractor and ARRC shall coordinate activities so that removing and replacing construction to accommodate inspections and tests will not be required.
- 6.4. The Contractor is responsible for scheduling times for inspections, tests, taking samples, and similar activities.

- 6.5. Mandatory Inspection Documentation Points: Documentation points are mandatory verification and inspection points that shall be identified in the CQC plan and the project schedule, and specifically approved by the ARRC. Documentation points should be points at which critical characteristics are to be measured and documented by the Construction Quality Manager. It will be the responsibility of the Construction Quality Manager to certify that the construction has met the requirements of the plans and specifications and to sign all inspection documentation. Inspection documentation shall be submitted to ARRC or its representative when requested. It shall be the responsibility of the Contractor to determine inspection documentation point criteria and required documentation.
- 6.6. ARRC shall be notified a minimum of 48 hours prior to any mandatory inspection.
 - 6.6.1. The mandatory inspection points for this project shall be established through coordination between the contractor and the Project Manager.
- 6.7. Completion Inspection: At the completion of all work or any increment thereof established by a completion time stated in the schedule or in the CQC plan, the Construction Quality Manager shall conduct a completion inspection of the work and develop a punch list of items that do not conform to the contract documents. Such a list of deficiencies shall be included in the QC documentation as required herein, and shall include the estimated date by which the deficiencies will be corrected. The Construction Quality Manager shall make a second completion inspection to make certain that all deficiencies noted on the punch list have been corrected and so notify ARRC. The completion inspections and any deficiency corrections required by this paragraph shall be accomplished within the time stated for completion of the entire work or any particular increment thereof if the project is divided into increments by separate completion dates.

7. DOCUMENTATION

- 7.1. The Contractor shall maintain daily records of quality control operations, activities, and tests performed, including the work of suppliers and subcontractors. These records shall be on an acceptable form and shall include factual evidence that required activities or tests have been performed, including, but not limited to, the following.
 - 7.1.1. Type and number of control activities and tests involved.
 - 7.1.2. Results of control activities or tests.
 - 7.1.3. Nature of nonconformance's, defects, and/or causes for rejection.
 - 7.1.4. Proposed corrective action.
 - 7.1.5. Corrective actions taken.

- 7.1.6. List of trades and subcontractors working on the project, and the number of personnel working.
- 7.1.7. Description and inventory of materials delivered by suppliers for future incorporation into the work, including identification of supplier.
- 7.1.8. Description of weather and site conditions encountered any delays, and acknowledgement of any instructions given by ARRC.
- 7.2. The daily quality control report records shall cover both conforming and non-conforming work and shall include a statement that supplies and materials incorporated in the work and workmanship comply with the contract. The Construction Quality Manager shall sign the daily quality control report and furnish legible copies to ARRC by the end of the following workday.
- 7.3. Monthly quality control reports that summarize project status, work completed related to funds expended, any nonconformance, and subsequent corrective actions shall be provided.

APPENDIX H

**COST SCHEDULE
Depot Drive Construction
ITB No. 20-07-207897**

COST SCHEDULE: A Bidder's failure to provide the information requested in this Appendix may be cause for rejection of the bid on the basis on non-responsiveness. Cost shall be bid in accordance to all specifications in Appendix C, specifications incorporated in drawings, and terms and conditions.

Description

Schedule A – Base Bid

Item No.	Work Description	Per	Est. Quantity	Unit Bid Price	Total Bid Price
A-1	Storm Water Pollution Prevention Plan (Type 2)	LS	1		
A2	Clearing and Grubbing	ACRES	0.5		
A-3	Unusable Excavation	CY	6400		
A-4	Unclassified Fill and Backfill	CY	40		
A-5	Classified Fill and Backfill (Type II)	Ton	3300		
A-6	Classified Fill and Backfill (Type II-A)	Ton	4000		
A-7	Leveling Course	Ton	500		
A-8	A.C. Pavement (Class E)	Ton	660		
A-9	Roadway Complete	LS	1		
A-10	Storm Drain System Complete	LS	1		
A-11	Landscaping Complete	LS	1		
A-12	Electrical System Complete	LS	1		

Total Schedule A: _____

Schedule B – Additive Alternate 1

Item No.	Work Description	Per	Est. Quantity	Unit Bid Price	Total Bid Price
B-1	Storm Water Pollution Prevention Plan (Type 2)	LS	1		
B-3	Unusable Excavation	CY	2300		
B-4	Unclassified Fill and Backfill	CY	200		
B-5	Classified Fill and Backfill (Type II)	Ton	1000		
B-6	Classified Fill and Backfill (Type II-A)	Ton	2500		
B-7	Leveling Course	Ton	160		
B-8	A.C. Pavement (Class E)	Ton	220		
B-9	Roadway Complete	LS	1		
B-10	Storm Drain System Complete	LS	1		
B-11	Landscaping Complete	LS	1		
B-12	Electrical System Complete	LS	1		

Total Schedule B: _____

AWARD CRITERIA: A contract award resulting from this Invitation to Bid shall be made to the low, responsive, responsible bidder who meets the requirements as set forth in the plans and specifications and compliance thereof. An award shall be made in the aggregate of the Base Bid and or any combination of Base Bid and Add Alternates, whichever is deemed by the Contract Administrator to be in the best interest of the ARRC. The successful bidder shall hold unit prices of all additives firm for a period of thirty (30) days from the date of bid opening. Award is contingent on the availability of ARRC funds.

The Undersigned has read the foregoing ITB and hereby agrees to the terms and conditions stated therein by affixing his/her signature below.

NON-COLLUSION AFFIDAVIT: The Undersigned declares, under penalty of perjury under the laws of the United States, that neither he/she nor the firm, association, or corporation of which he/she is a member, has, either directly or indirectly, entered into any agreement, participated in any collusion, or otherwise taken any action in restraint of free competitive bidding in connection with this Bid.

BIDDERS NAME AND ADDRESS

COMPANY NAME

SIGNATURE BY AND FOR THE BIDDER

COMPANY ADDRESS

PRINTED NAME OF ABOVE BIDDER

DATE OF BID

CONTACT PHONE NUMBER

CONTACT FAX NUMBER