

PTI Group Inc. – PTI Manufacturing P.O. Box 686
3790 – 98th Street NW
Edmonton, AB T6E 6B4
Tel: 780.463.8872
Email: darcy.duffy@ptigroup.com

PTI Group Inc. – Melita 254 Person Lodge
PTI Project No: 10050
BMCE 2012-061:30
Melita, Manitoba
Canada

Prime Consultant
Burns Maendel Consulting
Engineers Ltd.
1331 Princess Avenue
Brandon MB R7A 0R4
Tel: 204.728.7364

Electrical Consultant
A. J. Dunsmore Engineering
221 Kerr Ave.
Dauphin, MB R7N 3H9
Tel: 204.638.3073

Mechanical Consultant
Alliance Engineering
1035 Logan Ave.
Winnipeg, MB R3E1P6
Tel: 204.774.7859

These specifications were prepared under the supervision of the following registered coordinating professionals:

PRIME CONSULTANT

ELECTRICAL CONSULTANT

MECHANICAL CONSULTANT

Part 1 General

1.1 INVITATION TO BIDDER



.1

1.2 PROJECT DESCRIPTION

.1 In general, the scope of work includes the following:

- .1 Supply and installation of all underground gravity sewer infrastructure
- .2 Supply and installation of all pressure piping
- .3 Construction of the service building, including HVAC
- .4 Supply and installation of LPG lines
- .5 Placement of storage tanks (supplied by owner)
- .6 Supply and installation of C-Ring secondary containment system
- .7 Supply and installation of the concrete slab for the gen-set
- .8 Placement of the generator including the diesel tank
- .9 Installation of wood posts for parking
- .10 Excavation and backfill necessary to accommodate the manhole units
- .11 Supply and installation of the manhole units
- .12 Supply and installation of sanitary pump lift station
- .13 Fire pump by Others

1.3 SOLICITATION OF OFFERS

- .1 Offers under seal will be received by the Consultant located at 1331 Princess Avenue, Brandon, MB before 4:00:00 PM local time on the 18th day of July, 2013.
- .2 Bid documents for a Stipulated Price contract may be obtained from office of the Consultant free for one (1) set. Documents can only be obtained by general contract bidders. Others may view the Bid Documents at the Prime Consultant.
- .3 Provide all bid security requirements including Bid Bond.
- .4 The Owner reserves the right to accept an offer which is deemed most advantageous. The lowest or any offer will not necessarily be accepted.

END OF DOCUMENT

Part 1 Instructions to Bidders

1.1 Invitation

.1 Bid Call:

- .1 Ensure offers are signed under seal, executed, and dated and are received by Consultant located at 1331 Princess Avenue, Brandon, MB before 4:00 pm local time on Monday July 16th, 2013.
- .2 Offers submitted after above time may be returned to Bidder unopened.
- .3 Offers will be opened privately immediately after time for receipt of Bids.
- .4 Amendments to submitted offer will be permitted if received in writing prior to Bid closing and if endorsed by same party or parties who signed and sealed offer.

1.2 INTENT

- .1 Intent of this Bid call is to obtain an offer to perform Work to complete the Electrical installation for the PTI Group Inc. 254 Man Lodge in Melita, Manitoba for Stipulated Price contract, in accordance with Contract Documents.

1.3 CONTRACT DOCUMENTS IDENTIFICATION

- .1 Contract Documents are identified as Project BMCE 2012-061 as prepared by Burns Maendel Consulting Engineers Ltd., located at 1331 Princess Avenue, Brandon MB. and listed in the Table of Contents.
- .2 Contract Documents: Defined in CCDC 2 - Stipulated Price-2008, Agreement, General Conditions and Definitions. (CCDC 2 Contract shall be completed by successful bidder).

1.4 BID AND CONTRACT DOCUMENTS

- .1 Contract Documents: Defined in CCDC 2 - 2008 Stipulated Price Contract
- .2 Agreement Form.
- .3 Definitions:
 - .1 Bid Document: Contract Documents supplemented with Instructions to Bidders, Bid Form.
 - .2 Bid, Offer, or Bidding: act of submitting an offer under seal.
 - .3 Bid Price: monetary sum identified in Bid Form as an offer to perform Work.
- .4 Availability:
 - .1 Bid Documents may be obtained at office of Consultant located at 1331 Princess Avenue, Brandon, Manitoba.
 - .2 Bid Documents can be obtained by General Contractor free of charge up to 1 copy (24 x 36).
 - .3 An electronic version of Bid Documents can be obtained by General Contractor free of charge.

- .4 Bid Documents are made available only for purpose of obtaining offers for this project. Their use does not confer license or grant for other purposes.
- .5 Examination:
 - .1 Upon receipt of Bid Documents verify that documents are complete.
 - .2 Immediately notify Consultant upon finding discrepancies or omissions in Bid Documents.
- .6 Queries/Addenda:
 - .1 Direct questions to Consultant, Burns Maendel Consulting Engineers Ltd, Daniel Burns, telephone 204.728.7364 or by e-mail at d.burns@bmce.ca.
 - .2 Addenda may be issued during Bidding period. Addenda will become part of Contract Documents. Include costs in Bid Price.
 - .3 Verbal answers are only binding when confirmed by written addenda.
 - .4 Clarifications requested by Bidders must be in writing not less than four (4) days before date set for receipt of Bids. Reply will be in form of an addendum. Copy of addendum will be forwarded to known Bidders no later than two (2) working days before receipt of Bids.
- .7 Product/System Options:
 - .1 Where Bid Documents stipulate a particular product, substitutions will be considered by Consultant up to 7 days before receipt of Bids.
 - .2 When request to substitute product is made, Consultant may approve substitution and will issue Addendum to known Bidders.
 - .3 In submission of substitutions to products specified, Bidders are to include in their Bid, changes required in Work to accommodate such substitutions. Later claim by Bidder for addition to Contract Price a result of changes in Work necessitated by use of substitutions will not be considered.
 - .4 Substituted products will be considered if submitted as an attachment to Bid Form.
 - .5 Ensure submission provides sufficient information to enable Consultant to determine acceptability of such products.
 - .6 Provide complete information on required revisions to other work to accommodate each substitution, dollar amount of additions to or reductions from Bid Price, including revisions to other work.
 - .7 Provide specified products unless substitutions are submitted as noted and subsequently accepted.
 - .8 Approval to submit substitutions prior to submission of Bids is not required.

1.5 SITE EXAMINATION

- .1 Visit the project site and surrounding area before submitting a bid.
- .2 The currently un-occupied premises at the project site are open for examination by bidders at anytime.

1.6 SUBCONTRACTORS

- .1 The Owner reserves the right to reject a proposed subcontractor for reasonable cause.

1.7 BID INELIGIBILITY

- .1 Bids that are unsigned, improperly signed or sealed, conditional, illegible, obscure, contain arithmetical errors, erasures, alterations, or irregularities of any kind, may at the discretion of the Owner, declared non-compliant.
- .2 Bid Forms and enclosures which are improperly prepared may at the discretion of the Owner, be declared non-compliant.
- .3 Bids which contain qualifying conditions or otherwise fail to conform to these Instructions to Bidders may be disqualified or rejected.
- .4 The Owner may however, in its sole discretion, reject or retain for its consideration, bids which are non-conforming because they do not contain the content or form required or for failure to comply with the process for submission as set out in these Instructions to Bidders .
- .5 Failure to provide security deposit, bonding or insurance requirements may at the discretion of the Owner, be declared informal.

1.8 BID SUBMISSIONS

- .1 Bidders shall be solely responsible for the delivery of their bids in the manner and time prescribed.
- .2 Submit two (2) copies of the executed offer on the Bid Forms provided, signed and corporate sealed together with the required security in a closed opaque envelope, clearly identified with bidders name, project name and Owners name on the outside.
- .3 Faxed bids shall not be accepted.

1.9 SECURITY DEPOSIT

- .1 Bids shall be accompanied by a security deposit as follows:
 - .1 Bid bond or Certified cheque in the amount of not less than ten (10)% of the bid price.
 - .2 Endorse the Bid Bond or certified cheque in the name of the Owner as obligee, signed and sealed by the principal (Contractor) and surety.
- .2 Use Bid Bond Form CCDC 220.
- .3 The security deposit will be returned after delivery to the Owner of the required 50 % Performance and Labour and Materials Payment Bond(s) by the accepted bidder.
- .4 If no contract is awarded, all security deposits will be returned.

1.10 CONSENT OF SURETY

- .1 Submit with the Bid Form and Bid Bond, a Agreement to Bond, stating that the surety providing the Bid Bond is willing to supply the Performance and Labour and Materials Payment Bond of not less than 50% of the bid price.
- .2 Include the cost of bonds in the Bid Price.

1.11 BID ENCLOSURES/REQUIREMENTS

.1 PERFORMANCE ASSURANCE

- .1 The accepted bidder shall provide a Performance and Labour and Materials Payment bond.
- .2 Include the cost of bonds in the Bid Price.

.2 INSURANCE

- .1 Provide a signed "Undertaking of Insurance" on a standard form provided by the insurance company stating their intention to provide insurance to the bidder in accordance with the insurance requirements of the Contract Documents.

.3 BID FORM REQUIREMENTS

- .1 State in the Bid Form, the Time required to complete the Work. The completion date in the Agreement shall be this completion Time added to the commencement date.
- .2 Refer to Supplementary Conditions for inclusion of taxes and procedures for tax rebate claims by the Owner.

.4 FEES FOR CHANGES IN THE WORK

- .1 Include in the Bid Form, the overhead and profit fees applicable for changes in the Work, whether additions to or deductions from the Work on which the Bid Price is based.
- .2 Include in the Bid Form, the fees proposed for subcontract work for changes (both additions and deductions) in the Work. The Contractor shall apply fees as noted, to the subcontractor's gross (net plus fee) costs on additional work.

.5 BID SIGNING

- .1 The Bid Form shall be signed under seal by the bidder.
- .2 Sole Proprietorship: Signature of sole proprietor in the presence of a witness who will also sign. Insert the words "Sole Proprietor" under the signature. Affix seal.
- .3 Partnership: Signature of all partners in the presence of a witness who will also sign. Insert the word "Partner" under each signature. Affix seal to each signature.
- .4 Limited Company: Signature of a duly authorized signing officer(s) in their normal signatures. Insert the officer's capacity in which the signing officer acts, under each signature. Affix the corporate seal. If the bid is signed by officials other than the President and Secretary of the company, or the President-Secretary-Treasurer of the company, a copy of the by-law resolution of the Board of Directors authorizing them to do so, must also be submitted with the Bid in the Bid envelope.
- .5 Incorporated Company: signature of duly authorized signing officer(s) in normal signatures. Insert officer's capacity in which signing officer acts, under each signature. Affix corporate seal. If Bid is signed by officials other than President and Secretary of company, or President-Secretary-Treasurer of company, copy of by-law resolution of Board of Directors authorizing them to do so must also be submitted with Bid in Bid envelope.
- .6 Joint Venture: Each party of the joint venture shall execute the Bid under their respective seals in a manner appropriate to such party as described above, similar to the requirements of a Partnership.

.6 APPENDICES TO THE BID FORM

- .1 Appendix 'A' - Contract Documents: Include a complete listing of all documents and information issued by which the Bid Price was derived.
- .2 Appendix 'B' - Subcontractors: Include the names of all Subcontractors and the portion(s) of the Work the Bidder will perform.
- .3 Appendix 'C' - Unit Prices: Include a listing of unit prices specifically requested by the Contract Documents.

1.12 ACCEPTANCE OF OFFER

- .1 The Owner reserves the right in its absolute discretion to accept any bid which it deems most advantageous to itself and the right to reject any or all bids, in each instance without giving any notice.
- .2 The lowest or any bid will not necessarily be accepted. In no event will the Owner be responsible for the costs of preparation or submission of a bid.
- .3 After acceptance by the Owner, the Owner will issue to the successful bidder, a written bid acceptance.
- .4 After a bid has been accepted, all rejected bids will be returned to the respective bidders with submitted bid securities and other requested enclosures.

Part 2 Products

2.1 NOT USED

- .1 Not Used.

Part 3 Execution

3.1 NOT USED

- .1 Not Used.

END OF DOCUMENT

Part 1 General

1.1 BID INFORMATION

Date: _____

Submitted by: _____

(name) _____

(address) _____

To: PTI Group Inc. – PTI Manufacturing P.O. Box 686
3790 – 98th Street NW
Edmonton, AB T6E 6B4
Tel: 780.463.8872
Email:

Project: PTI Group Inc. – Melita 254 Person Lodge
PTI Project No: 10050
BMCE 2012-061:30
Melita, Manitoba
Canada

1.2 OFFER

- .1 Having examined the Place of The Work and all matters referred to in the Instructions to Bidders and the Contract Documents prepared by (Consultant) for the above mentioned project, we, the undersigned, hereby offer to enter into a contract using CCDC 2-2008 Contract form, to perform the Work for the price of:

\$ _____

dollars, in lawful money of Canada.

- .2 We have included herewith, the required security deposit/Bid Bond and Agreement to Bond as required by the Instruction to Bidders.

- .3 Taxes:

- .1 Applicable federal taxes (GST) are excluded from the Bid Price.
.2 Applicable provincial taxes are included in the Bid Price.

1.3 ACCEPTANCE

- .1 Refer to Section 00 21 10 - Instructions to Bidders for Conditions of acceptance.
- .2 This offer shall be open to acceptance and is irrevocable for thirty (30) calendar days from the Bid closing date and time.
- .3 If this Bid is accepted by the Owner within the time period stated above, we will:
 - .1 Execute the 'Agreement' within seven days of receipt of the form of execution.
 - .2 Furnish the required bonds within seven days of receipt of the Agreement in the form described in the Supplementary Conditions.
 - .3 Commence work within _____ days after written notification of acceptance of this bid.
 - .4 Complete the Work in _____ calendar weeks from notification of acceptance of this Bid.
- .4 If this Bid is accepted within the time stated herein, and we fail to commence the Work or we fail to provide the required Bond(s), the security deposit shall be forfeited as damages to the Owner by reason of our failure, limited in amount to the lesser of the face value of the deposit or the difference between this Bid and the Bid which the Contract is signed.
- .5 In the event our Bid is not accepted within the time stated above, the required security deposit shall be returned to the undersigned, in accordance with the provisions in the Instructions to Bidders; unless a mutually satisfactory arrangement is made for its retention and validity for an extended period of time.

1.4 APPENDICES

- .1 A list of the Contract Documents is appended hereto and identified as 'Appendix A'.
- .2 A list of Subcontractors is appended hereto and identified as 'Appendix B'.
- .3 A list of Unit Prices is appended hereto and identified as 'Appendix C'.

1.5 ADDENDA

- .1 The following Addenda have been received. The modifications to the Contract Documents noted therein have been considered and all costs thereto are included in the Bid Price.
 - .1 Addendum # _____ Dated _____.
 - .2 Addendum # _____ Dated _____.
 - .3 Addendum # _____ Dated _____.
 - .4 Addendum # _____ Dated _____.

1.6 BID FORM SIGNATURE(S)

The Corporate Seal of

(Bidder - please print)
was hereunto affixed in the presence of:

(Seal)

Authorized signing officer

Title

Authorized signing officer

Title

If this Bid is a joint venture or partnership, add additional forms of execution for each member of the joint venture on the appropriate form or forms, as above.

Appendix A: The following is the list of **Contract Documents** referred to in the Bid Form submitted by:
(Bidder) _____

(Owner) _____

dated _____ to which this Appendix is an integral part of the Bid Form.

The list of Contract Documents include the following:

- .1 Documents and Specifications cited in the Table of Contents at the beginning of the Project Manual.
- .2 Drawings List cited at or near the beginning of the package of drawings.

Appendix C - Unit Prices: The following is the list of Unit Prices referred to in the Bid Form submitted by:

(Bidder) _____

(Owner) _____

dated _____ to which this Appendix is an integral part of the Bid Form.

The following are incidental Unit Prices for specific portions of the Work as listed, and are applicable to authorized variations from the Contract Documents.

Item No.	Item of Work	Estimated Quantity	Units	Unit Price	Total
Total					

END OF BID FORM STIPULATED PRICE DOCUMENT

Part 1 General

1.1 AGREEMENT DECLARATION

- .1 CCDC 2 - 2008 Edition, Stipulated Price Contract, as may be amended, forms the basis of Agreement between the Owner and Contractor.

- .2 This Agreement is bound to the CCDC 2 - 2008 Edition, Definitions and CCDC 2 General Conditions.

END OF DOCUMENT

Part 1 General

1.1 DEFINITIONS DECLARATION

- .1 CCDC 2-2008 Edition, Stipulated Price Contract as may be amended, forms the basis of Definitions between the Owner and Contractor.
- .2 These Definitions are bound to the CCDC 2 Definitions and CCDC 2 General Conditions.

1.2 SUPPLEMENTARY WORDS AND TERMS TO CCDC 2-2008

- .1 The following words and terms are additional to the CCDC 2 Definitions.
- .2 **Addendum:** A document that amends the Bid Documents during the Bidding Period and becomes part of the Contract Documents when a Contract is executed. (Plural: Addenda)
- .3 **Agreement:** The signed and sealed legal instrument binding parties in a Contract, describing in strict terms their mutual arrangement, roles and responsibilities, commencement, and completion responsibilities.
- .4 **Alternative Price:** The amount stipulated by a Bidder for an Alternative and stated as an addition, a deduction, or no change to the Bid Price.
- .5 **Bid:** To offer as a Bid stating for what price a Contractor will assume a Contract.
- .6 **Bid Documents:** A set of documents consisting of the Instructions to Bidders, Bid Form, Contract Documents, and other information issued for the benefit of Bidders to prepare and submit a Bid.
- .7 **Bid Form:** The specific and detailed form used to collect information about a Bid.
- .8 **Bidding:** The process of preparing and submitting a Bid.
- .9 **Construction Documents:** The Drawings and Project Manual. When combined with a Contract and Contract conditions, these documents form the Contract Documents.
- .10 **Contingency Allowance:** An additional monetary amount added to a Project cost estimate and designated to cover unpredictable or unforeseen items of Work. The amount is usually based on some percentage of the estimated cost and expended and adjusted by Change Order. It is not intended to cover additions to the scope of Work.
- .11 **Cost Plus Contract:** A Contract under which a Contractor is reimbursed for the direct and indirect costs for the performance of a Contract and, in addition, is paid a Fee for services. The Fee is usually stated as a stipulated price or as a percentage of cost.
- .12 **General Conditions:** That part of the Contract Documents which sets forth many of the rights, responsibilities and relationships of the parties involved in a Contract.
- .13 **Instructions To Bidders:** Instructions contained in the Bid Documents to convey an Owner's expectations and criteria associated with submitting a Bid.

- .14 **Section:** A portion of a Project Specification covering one or more segments of the total Work or requirements. Sections are included in a Project manual as required to meet Project requirements.
- .15 **Standard:** A document describing a grade or a level of quality, which has been established by a recognized agency or organization, utilizing an internal voting process.
- .16 **Separate Price:** A separate price for work to be added to the base price if selected by the Owner. This price type is not a part of the base bid price.
- .17 **Stipulated Price:** An amount set forth in a Stipulated Price Contract as the total payment for the performance of the Work. Sometimes referred to as a stipulated sum or a lump sum stipulated price.
- .18 **Tender:** A term that was formally abandoned by CCDC and the Canadian Construction industry in the early 1980's in favour of the preferred term **Bid**.
- .19 **Unit Price:** The amount payable for a single unit of Work as stated in a Schedule of Prices.
- .20 **Install:** To remove from site storage, move or transport to intended location, install in position, connect to utilities, repair site caused damage, and make ready for use.
- .21 **Supply:** To acquire or purchase, ship or transport to the site, unload, remove packaging to permit inspection for damage, re-package, replace damaged items, and safely store on-site.

END OF DOCUMENT

Part 1 General

1.1 GENERAL CONDITIONS DECLARATION

- .1 CCDC 2-2008 - The General Conditions of the Stipulated Price Contract; is the General Conditions between the Owner and Contractor.

1.2 SUPPLEMENTARY CONDITIONS

- .1 Refer to Document 00 73 03 - Supplementary Conditions for amendments to these General Conditions.

END OF DOCUMENT

Part 1 CCDC 2-2008 - Supplementary Conditions

1.1 GC 1.1 - CONTRACT DOCUMENTS

.1 CCDC 2-2008, Paragraph 1.1.7: Revise this paragraph on Precedence of Documents, as follows:

- .1 In the event of conflict within and between the Contract Documents, the order of priority within specifications and drawings are - from highest to lowest:
 - .1 Agreement - Between Owner and Contractor including Definitions,
 - .2 Supplementary Conditions (if any),
 - .3 General Conditions of the Contract,
 - .4 Sections of Division 01 of the specifications,
 - .5 Specifications:
 - .1 Sections of Divisions 02 through 49 of the specifications, and
 - .2 Specifications as annotated on drawings.
 - .6 Schedules and keynotes:
 - .1 schedules within the specifications, then
 - .2 schedules on drawings.
 - .7 Drawings:
 - .1 Drawings of larger scale shall govern over those of smaller scale of the same date, then
 - .2 Dimensions shown on drawings shall govern over dimensions scaled from drawings, then
 - .3 Location of utility outlets indicated on architectural detail drawings takes precedence over positions or mounting heights located on mechanical or electrical drawings.
 - .8 Later dated documents shall govern over earlier documents of the same type.
- .2 In the event of conflict between documents, the decision of the Consultant shall be final.
- .3 The requirements stated in Division 01 specification sections apply to all other specification sections within Division 02 to 49. Refer to precedence statements above.

1.2 GC 11.1 - INSURANCE

.1 Provide construction insurance to requirements of CCDC 41 - CCDC Insurance Requirements.

1.3 GC 11.2 - CONTRACT SECURITY

.1 Add the following paragraphs:

11.2.3 Provide a Performance Bond in the name of the Owner for 50% of the Contract Price, to assure the faithful performance of the Contract, including corrections to the Work required under GC 12.3 - Warranty; using Performance Bond Form CCDC 221.

11.2.4 Provide a Labour and Material Payment Bond in the name of the Owner for 50% of the Contract Price, to assume faithful payment of monies to parties in contract with the Contract; on Labour and Material Payment Bond Form CCDC 222.

END OF DOCUMENT

Part 1 General

1.1 SCOPE OF WORK

- .1 Work under this covers the supply of all materials, labour, equipment and supervision to perform the work as specified and in accordance with Burns Maendel Consulting Engineers Ltd. (BMCE) drawings and specifications (BMCE 12-061).
- .2 In general, the scope of work includes the following:
 - .1 Supply and installation of all underground gravity sewer infrastructure
 - .2 Supply and installation of all pressure piping
 - .3 Construction of the service building, including HVAC
 - .4 Supply and installation of LPG lines
 - .5 Placement of storage tanks (supplied by owner)
 - .6 Supply and installation of C-Ring secondary containment system
 - .7 Supply and installation of the concrete slab for the gen-set
 - .8 Placement of the generator including the diesel tank
 - .9 Installation of wood posts for parking
 - .10 Excavation and backfill necessary to accommodate the manhole units
 - .11 Supply and installation of the manhole units
 - .12 Supply and installation of sanitary pump lift station
 - .13 Fire pump by Others
- .3 Drawings and specification sections more completely describe all aspects of work and material requirements.

1.2 CODES AND STANDARDS

- .1 Throughout the various sections and subsections for this specification, reference is made to domestic, national, and international standards. These standards shall be considered an integral part thereof and shall be read in conjunction with the drawings and specifications as if they were reproduced herein. The Contractor shall, therefore, be fully familiar with their contents and requirements. The latest editions of all standards shall be applicable whether or not a specifically dated edition is mentioned.
- .2 Perform all work in accordance with National Building Code of Canada (NBC) 2010 with Manitoba Amendments including all amendments to tender closing date.
- .3 Materials and workmanship must conform to or exceed applicable standards of Canadian General Standards Board (CGSB), Canadian Standards Association (CSA), American Society for Testing and Materials (ASTM), Canadian Electrical Code (CEC), Canadian Roofing Contractors Association (CRCA), and other referenced organizations.
- .4 Conform to latest edition of dated referenced standards, as reaffirmed or revised to date of Tended Specification. Standards or codes not dated shall be deemed the edition in force on date of the specification.

1.3 ON-SITE SUPERVISION

- .1 Contractor will designate a competent and qualified supervisor to be on site at all times during work, and act upon Owners Representative's instructions. Supervisor shall not be changed without the Owners Representative's permission or alternatively at his request and shall be capable of and having authority to speak on behalf of the Contractor's day-to-day matters.

1.4 WORK SCHEDULE

- .1 Provide within 7 working days after Contract award, schedule showing anticipated progress stages and final completion of work within time period required by Contract documents.
- .2 When schedule has been approved by the Owners Representative, take necessary measures to complete work within the scheduled time. Do not change schedule without Owners Representative's written approval.

1.5 CORDINATION OF TRADES

- .1 It will be the responsibility of the General Contractor to ensure where work involves multiple trades (or divisions) that each trade (or division) is aware of their work responsibility and their work responsibility is included in their tendered bid.

1.6 WORK RESTRICTIONS

- .1 Notify the Owners Representative and Utility companies of intended interruption of services and obtain required permission.
- .2 Where work involves breaking into or connecting to existing services, give the Owners Representative 48 hours of notice for necessary interruption of mechanical or electrical service throughout course of work. Keep duration of interruptions to a minimum.
- .3 The Contractor shall comply with the normal hours of work in effect at the site during the period of this Contract. Any deviation from these stipulated hours shall be approved in writing by the Owners Representative prior to inception.
- .4 Use of the site shall be in co-operation with the Owners Representative, the Contractor shall not have exclusive complete use for the execution of the work:
 - .1 Movement around site shall be subject to restrictions imposed by the Owners Representative.
 - .2 Access to the site shall be subject to restrictions imposed by the Owners Representative.
 - .3 Routes of entry and exit to the site shall be as set forth by the Owners Representative.
 - .4 Do not unreasonably encumber site with materials or equipment.

1.7 SITE INVESTIGATION, DRAWINGS, SPECIFICATIONS

- .1 The Contractor declares that, in bidding for the Work and in entering into the Contract:

- .1 Has investigated the Site, the nature of the Work to be done and all local conditions that might affect his Bid or his performance of the Work.
- .2 Has reviewed all Drawings and Specifications and understands the requirements of the Work.

1.8 SUBMITTAL PROCEDURES

.1 General

- .1 Submit to the Owners Representative submittals listed for review. Submit with reasonable promptness and in orderly sequence so as not to cause delay in work. Failure to submit in ample time is not considered sufficient reason for an extension of contract time and no claim for extension by reason of such default will be allowed.
- .2 Work affected by submittal shall not proceed until review is complete.
- .3 Present shop drawings, product data, and samples in SI Metric units.
- .4 Review submittals prior to submission to the Owners Representative. This review represents that necessary requirements have been determined and verified, or will be, and that each submittal has been checked and coordinated with requirements of work and Contract Documents. Submittals not stamped, signed, dated, and identified as to specific project will be returned without being examined and shall be considered rejected.
- .5 Contractor's responsibility for errors and omissions in submission is not relieved by Owners Representative's review of submittals.
- .6 Allow 7 working days for Owners Representative's review of each submission.

.2 Shop Drawings and Product Data

- .1 Indicate materials, methods of construction, and attachment or anchorage, erection diagrams, connections, explanatory notes, and other information necessary for completion of work. Where articles or equipment attach or connect to other articles or equipment, indicate that such items have been coordinated, regardless of Section under which adjacent items will be supplied and installed. Indicate cross references to design drawings and specifications.
- .2 Adjustments made on shop drawings by the Owners Representative are not intended to change Contract Price. If adjustments affect value of work, state such in writing to Owners Representative prior to proceeding with work.
- .3 Make changes in shop drawings as Owners Representative may require, consistent with Contract Documents. When resubmitting, notify Owners Representative in writing of any revisions other than those requested.
- .4 Submissions shall include:
 - .1 Date and revision dates.
 - .2 Project title and number.
 - .3 Name and address of:
 - .1 Subcontractor.
 - .2 Supplier.
 - .3 Manufacturer.

- .4 Contractor's stamp, signed by Contractor authorized representative certifying approval of submissions, verification of field measurements and compliance with Contract Documents.
- .5 Details of appropriate portions of work as applicable:
 - .1 Fabrication.
 - .2 Layout, showing dimensions, including identified field dimensions, and clearances.
 - .3 Setting or erection details.
 - .4 Capacities.
 - .5 Performance characteristics.
 - .6 Standards.
 - .7 Operating Weight.
- .5 If upon review by Owners Representative, no errors or omissions are discovered or if only minor corrections are made, copies will be returned and fabrication and installation of work may proceed. If shop drawings are rejected, noted copy will be returned and resubmission of corrected shop drawings through same procedure indicated above must be performed before fabrication and installation of work may proceed.
- .3 Samples
 - .1 Submit for review samples requested in respective specification Sections. Label samples with origin and intended use.
 - .2 Deliver samples prepaid to Owners Representative's business address.
 - .3 Adjustments made on samples by Owners Representative are not intended to change Contract Price. If adjustments affect value of work, state such in writing to the Owners Representative prior to proceeding with work.
 - .4 Make changes in samples which the Owners Representative may require, consistent with Contract Documents.
 - .5 Reviewed and accepted samples will become standard of workmanship and material against which installed work will be verified.

1.9 WORKMANSHIP AND MATERIALS

- .1 All workmanship and materials shall be of a high standard and in accordance with standard building practice.
- .2 The Contractor shall make good any inferior workmanship and replace defective materials at his own expense.
- .3 It is the Contractor's responsibility to produce an acceptable end result regardless of labour or quantity of material required.
- .4 It shall be the responsibility of the Contractor to make good any damage to Owners' property or adjacent private property resulting from, or attributable to, his work at his own expense.

1.10 GUARANTEE

- .1 The Contractor shall guarantee work for a minimum of two (2) years. Materials shall be guaranteed for ten (10) years by the manufacturer.

1.11 PRIME CONTRACTOR

- .1 The Owner and the Contractor acknowledge and agree that the Contractor is a “Prime Contractor” as that term is defined in The Workplace Safety and Health Act (Manitoba) for all purposes of that Act and without limiting the generality of the foregoing, it is further acknowledged and agreed that as the Prime Contractor, the Contractor is solely and completely responsible and liable for and in respect of all obligations, requirements and duties imposed on the Prime Contractor in the Act.

1.12 HEALTH AND SAFETY REQUIREMENTS

- .1 Contractor to observe:
 - .1 National Building Code of Canada 2010, Part 8.
 - .2 Canada Labour Code, Part II, Canada Occupational Safety and Health Regulations.
 - .3 Workplace Safety and Health Act W210, Manitoba.
 - .4 The Workplace Safety and Health Regulation of Manitoba 217/2006, Manitoba.
- .2 Contractor is aware of, and accepts, the appropriate safety and health jurisdiction to which he is working in. Contractor accepts the responsibility to comply with the specified provincial and federal regulatory instruments, as appropriate, and to ensure that all subcontractors do likewise.
- .3 Contractor is responsible for all subcontractors with respect to safety and health issues and shall be deemed as “site coordinator” to facilitate employer/contractor coordination.
- .4 At the request of the Owners Representative, Contractor (and his subcontractors) to submit proof of WCB coverage for all their personnel prior to commencing work.
- .5 Comply with requirements or Workplace Hazardous Materials Information System (WHMIS) regarding use, handling, storage, and disposal of hazardous materials; and regarding labeling and provision of material safety data sheets acceptable to Labour Canada and Health and Welfare Canada. Deliver copies of WHMIS data sheets to the Owners Representative on delivery of materials.
- .6 The Contractor shall supply competent personnel to implement a safety orientation program and ensure that Federal and Provincial safety and health standards, guidelines, policies, and regulations are being complied with.
- .7 The Contractor will report to the Owners Representative and jurisdictions having authority any accident or incident involving Contractor or public personnel and/or property arising from the Contractor’s execution of work.
- .8 If the Contractor is responsible for a delay in the progress of work due to an infraction of legislated Health and Safety requirements, the Contractor shall, without additional cost to the Contract, complete the work on time.

- .9 Excavations and trenching:
 - .1 No worker shall enter any excavations over 1.219 meters in depth unless:
 - .1 The sides of the excavation are properly shored or braced or sloped to a safe angle. In no case shall the slope be steeper than $\frac{3}{4}$ horizontal to one vertical.
 - .2 The workers are protected by other approved means.

1.13 FIRE SAFETY REQUIRMENTS

- .1 Prior to the commencement of construction or demolition, an acceptable Fire Safety Plan shall be prepared for the site and shall include:
 - .1 The designation and organization of site personnel to carry out fire safety duties including watchman service if applicable.
 - .2 The emergency procedures to be used in case of fire including:
 - .1 Sounding the alarm.
 - .2 Notifying the fire department.
 - .3 Instructing site personnel on procedures to be followed when the fire alarm sounds.
 - .4 Fire fighting procedure.
 - .3 Maintenance of fire fighting activities.
- .2 Portable extinguishers shall be installed and maintained for the duration of the Contract in conformance with Part 6 of the National Fire Code of Canada. The minimum rating for extinguishers shall be:
 - .1 Movable equipment – 2-A:10-BC.
 - .2 Other locations – 4-A:40-BC.
- .3 In addition to the requirements stated above, portable extinguishers shall be provided adjacent to:
 - .1 Cutting or welding operations.
 - .2 Areas where combustibles are stored.
 - .3 Any internal combustion engines.
 - .4 Areas where flammable liquids or gases are stored or handled.
 - .5 Temporary oil or gas fired equipment.
 - .6 Bitumen heating equipment.
- .4 Immediately remedy all unsafe fire situations observed by the Owners Representative or local fire authority.

1.14 ENVIRONMENTAL PROCEDURES

- .1 Fires:
 - .1 Fires and burning rubbish on site is not permitted.
- .2 Disposal of wastes:
 - .1 Do not bury rubbish and waste materials on site.

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- .2 Do not dispose of waste or volatile materials, such as mineral spirits, oil or paint thinner into waterways, storm or sanitary sewers.
 - .3 Drainage:
 - .1 Provide temporary drainage and plumbing as necessary to keep excavations and site free from water.
 - .2 Do not pump water containing suspended materials into waterways, sewer or drainage systems.
 - .3 Control disposal or runoff of water containing suspended materials or other harmful substances in accordance with local authority requirements.
 - .4 Site clearing and plant protection:
 - .1 Protect trees and plants on site and adjacent properties as directed by Owners Representative.
 - .2 Protect roots of designated trees to remain during excavation and site grading to prevent disturbance or damage. Avoid unnecessary traffic, dumping and storage of materials over root zones.
 - .3 Minimize stripping of topsoil and vegetation.
 - .4 Restrict tree removal to areas indicated or designated by the Owners Representative.
 - .5 Pollution control:
 - .1 Control emissions from equipment and plant to local authorities emission requirements.
 - .2 Cover or wet down dry materials and rubbish to prevent blowing dust and debris. Provide dust control for temporary roads.
 - .6 Storage and handling:
 - .1 All hazardous materials (any substance that is poisonous, exhibits flammability, corrosive, reactive or toxic) shall be stored and handled in a manner which is not harmful to human life and will not pollute the environment.
 - .7 Clean-ups:
 - .1 Leaks or spills or hazardous substances, regardless of the quantity or locations (whether indoors or outdoors), shall be stopped and cleaned-up immediately and be prevented from entering storm or sanitary sewer systems or contaminating soil or water.
 - .2 All spilled substances and materials contaminated by the spill shall be collected in leak proof containers or double bagged for disposal. Disposal shall be in a manner, which is acceptable to the local authority having jurisdiction over disposal of such substances.
 - .8 Reporting:
 - .1 All releases of hazardous substances into the environment (ground, water, drains, sewer systems, ditches, road, parking areas, air, etc.) shall be reported to the Owners Representative immediately.

1.15 TESTING SERVICES

- .1 Particular requirements for inspection and testing to be carried out by testing laboratory designated by the Owners Representative, as specified under various sections of specifications sections.
- .2 Owners Representative will appoint and pay for services of testing laboratory except for the following:
 - .1 Inspection and testing required by laws, ordinances, rules, regulations or orders of public authorities.
 - .2 Inspection and testing performed exclusively for Contractor's convenience.
 - .3 Tests specified to be carried out by Contractor under the supervision of Owners Representative.
 - .4 Non-specified testing, adjustment and balancing of conveying systems, mechanical and electrical equipment and systems.
 - .5 Mill tests and certificates of compliance.
- .3 Where tests or inspections by designated testing laboratory reveal work not in accordance with specifications sections, Contractor shall pay costs for additional test or inspections as the Owners Representative may require to verify acceptability of corrected work.
- .4 Notify Owners Representative sufficiently in advance of operations to allow for assignment of laboratory personnel and scheduling of test.

1.16 TEMPORARY FACILITIES

- .1 Installation and removal
 - .1 Provide construction facilities in order to execute work expeditiously.
 - .2 Remove from site all such work after use.
- .2 Site Office
 - .1 Provide office heated to 18 °C, lighted 750 lx and ventilated, of sufficient size to accommodate site meetings and furnished with drawing laydown table.
 - .2 Provide a clearly marked and fully stocked first-aid case in a readily available location.
 - .3 Subcontractors may provide their own offices as necessary. Direct location of these offices.
- .3 Site storage/loading
 - .1 Confine work and operations of employees by Contract Documents. Do not unreasonably encumber premises with products.
 - .2 Do not load or permit to load any part of Work with a weight or force that will endanger the Work.
- .4 Storage Sheds:
 - .1 Provide adequate weathertight sheds with raised floors, for storage of materials, tools and equipment which are subject to damage by weather.

- .5 Sanitary facilities:
 - .1 Provide sanitary facilities for work force in accordance with governing regulations and ordinances.
 - .2 Post notices and take such precautions as required by local health authorities. Keep area and premises in sanitary condition.
- .6 Construction signage:
 - .1 Provide and erect 1200x2400mm construction sign, of wood frame and plywood painted with exhibit lettering produced by a professional sign painter. Location of sign to be as directed by the Owners Representative.
 - .2 Indicate on sign, name of Owner, General Contractor and Engineer, of a design style established by the Owners Representative.
 - .3 No other signs or advertisements, other than warning signs, are permitted on site.
 - .4 Maintain approved signs and notices in good condition for duration of project, and dispose of on completion of project or earlier if directed by the Owners Representative.
- .7 Construction parking:
 - .1 Parking will be permitted on site provided it does not disrupt performance of work.
 - .2 Maintain and administer this space as directed by the Owners Representative.
- .8 Shoring:
 - .1 Maintain excavation in safe condition with suitable shoring.
 - .2 Provide necessary supports to building elements and services as necessary.

1.17 TEMPORARY UTILITIES

- .1 Power and Light:
 - .1 Provide and pay for temporary power during construction for temporary lighting and operating of power tools.
 - .2 Arrange for connection with appropriate utility company. Pay all costs for installation, maintenance and removal.
 - .3 Provide and maintain temporary lighting throughout project. Ensure level of illumination on all floors and stairs is not less than 200 lux.

1.18 REMOVAL OF MATERIAL AND EQUIPMENT

- .1 The Contractor shall not remove any salvageable materials or hardware from the job site without written permission from the Owners Representative and/or the Owner.
- .2 All structures, materials and equipment affixed to the work areas are the property of the occupant/owner.

1.19 COMMON PRODUCT REQUIREMENTS

- .1 Quality:

- .1 Products, materials, equipment and articles (referred to products throughout specifications) incorporated in work shall be new, not damaged or defective, and of best quality for purpose intended. If requested, furnish evidence as to type, source and quality of products provided.
 - .2 Defective products, whenever identified prior to completion of work, will be rejected, regardless of previous inspections. Inspections do not relieve responsibility, but is precaution against oversight or error. Remove and replace defective products at own expense and be responsible for delays and expenses caused by rejection.
- .2 Availability:
- .1 Immediately upon signing Contract, review product delivery requirements and anticipate foreseeable supply delays for any items. If delays in supply of products are foreseeable, notify Owners Representative of such, in order that substitutions or other remedial action may be authorized in ample time to prevent delay in performance of work.
 - .2 In event of failure to notify Owners Representative at commencement of work and should it subsequently appear that work may be delayed for such reason, the Owners Representative reserves right to substitute more readily available products of similar character, at no increase in Contract Price or Contract Time.
- .3 Manufacturer's Instructions:
- .1 Unless otherwise specified, comply with manufacturer's latest printed instructions for materials and installation.
 - .2 Notify Owners Representative in writing, of conflicts between specifications and manufacturer's instruction, so that Owners Representative may establish course of action.
 - .3 Improper installation or erection of products, due to failure in complying with these requirements, authorizes Owners Representative to require removal and re-installation at no increase in Contract Price or Contract Time.
- .4 Transportation, Storage and Protection:
- .1 Pay costs of transportation of products required in performance of work.
 - .2 Deliver, store and maintain packaged material and equipment with manufacturer's seals and labels intact.
 - .3 Prevent damage, adulteration and soiling of material and equipment during delivery, handling and storage. Immediately remove rejected material and equipment from site.
 - .4 Store material and equipment in accordance with suppliers' instructions.
 - .5 Touch-up damaged factory finished surfaces to Owners Representative's satisfaction. Use primer or enamel to match original. Do not paint over name plates.
- .5 Fastenings:
- .1 Provide metal fastenings and accessories in same texture, colour and finish as adjacent materials, unless indicated otherwise. Prevent electrolytic action between dissimilar metals and materials. Use non-corrosive galvanized steel fasteners and anchors for securing exterior work.

- .2 Space anchors within individual load limit or shear capacity and ensure they provide positive permanent anchorage. Wood, or any other organic material plugs are not acceptable.
- .3 Fastenings which cause spalling or cracking of material to which anchorage is made are not acceptable.
- .4 Use fastenings of standard commercial sizes and patterns with material and finish suitable for service.
- .5 Use heavy hexagon heads, semi finished unless otherwise specified. Use No. 304 stainless steel for exterior areas.
- .6 Bolts may not project more than one diameter beyond nuts.
- .7 Use plain type washers on equipment, sheet metal and soft gasket lock type washers where vibrations occur. Use resilient washers with stainless steel.

1.20 CLEANING

- .1 Project Cleanliness:
 - .1 Maintain work in tidy condition, free from accumulation of waste products and debris.
 - .2 Provide on-site metal containers for collection of waste materials and debris.
 - .3 Remove waste material and debris from site at end of each working day.
 - .4 Dispose of waste materials in accordance with local ordinances.
 - .5 Store volatile waste in covered metal containers, and remove from premises at end of each working day.
- .2 Final Cleaning:
 - .1 Remove waste products and debris other than that caused by others, and leave work clean and suitable for occupancy.
 - .2 Prior to final review, remove surplus products, tools, construction machinery and equipment.
 - .3 Use heavy duty magnet to pick-up nails, screws and metal pieces.
 - .4 All cleaning shall be done to the complete satisfaction of the Owners Representative.

1.21 CLOSEOUT SUBMITTALS

- .1 As-Built Drawings:
 - .1 Contractor is responsible to arrange, record and submit proper As-built drawings to the Owners Representative.
 - .2 White prints of the construction drawings shall be used to record as-built information. Mark on all white prints all changes as work progresses and as changes occur.
 - .3 Identify each as-built in lower right hand corner in letters at least 12mm high as follows: -"AS-BUILT DRAWING" (signature of Contractor)(date).
 - .4 Submit to Owners Representative for approval and make all corrections as directed.
- .2 Operation and Maintenance Manual:

- .1 Assemble, coordinate, bind and index required data into Operation and Maintenance Manual when specified in tendered specifications. Organize data into same numerical order as tendered specification.
- .2 The "O" and "M" Manual shall consist of an organized compilation of operating and maintenance data including detailed technical information, documents and records describing operation and maintenance of individual products or systems as specified in tendered specifications.
- .3 Submit complete operation and maintenance manual to Owners Representative immediately after completion of project.
- .4 Contents:
 - .1 Cover sheet containing:
 - .1 Date submitted.
 - .2 Project title, location and project number.
 - .3 Names and addresses of Contractor and all Subcontractors.
 - .2 Table of Contents of binder.
 - .3 List of maintenance materials requested from specification.
 - .4 List of special tools requested from specification.
 - .5 List of spare parts required from specification.
 - .6 Warranties and guarantees.
 - .7 Copies of approvals and certificates.
 - .8 Provide data as specified in individual sections of specification.
 - .9 All approved shop drawings.
- .3 Maintenance Materials:
 - .1 Provide maintenance and extra materials, in quantities specified in individual specification sections.
 - .2 Deliver specified items packaged to prevent damage.
 - .3 Identify, on carton or package, building number, room number, system or area as applicable where item is used.
- .4 Spare Parts:
 - .1 Provide spare parts, in quantities specified in individual specification sections.
 - .2 Include the following:
 - .1 Part number.
 - .2 Identification of equipment or system for which parts are applicable.
 - .3 Installation instructions as applicable.
 - .4 Name and address of nearest supplier.
 - .3 Identify spare parts to indicate equipment or system for which parts are applicable.
- .5 Warranties and Bonds:
 - .1 Separate each warranty or bond with index tab sheets keyed to Table of Contents listing.
 - .2 List sub-contractor, supplier, and manufacturer, with name, address, and telephone number of responsible principal.

- .3 Verify that documents are in proper form, contain full information, and are notarized.
- .4 Retain warranties and bonds until time specified for submittal.

Part 2 Materials

NOT USED

Part 3 Execution

NOT USED

END OF SECTION

Part 1 General

1.1 REFERENCES

- .1 Owner/Contractor Agreement.
- .2 Canadian Construction Documents Committee (CCDC)
 - .1 CCDC 2-2011, Stipulated Price Contract.

1.2 GENERAL

- .1 Items measured in lineal metres shall be measured to the nearest whole metre or cubic meter unless otherwise stated.

1.3 ITEMS COVERED BY CONTRACT PRICES

- .1 In addition to covering the Cost of various items of Work for which the Contract Unit Prices and Contract Lump Sum Prices are set forth in the Contract, the Contract Prices so set forth shall be held to cover and shall cover the cost of furnishing all materials, plant, tools, equipment, labour, services, transportation and incidentals necessary for executing the Work required of the Contractor under the terms of the Contract, plans and drawings and Specifications, and the observing, performing and keeping of all the terms, covenants and conditions of the Contract all of which shall be observed, performed and kept by the Contractor. Any item of work not specifically listed under Contract Unit or Lump Sum Prices shall be considered incidental to such other items as are listed.

1.4 MOBILIZATION I DEMOBILIZATION

- .1 METHOD OF MEASUREMENT — No measurement shall be taken for "Mobilization / Demobilization".
- .2 BASIS OF PAYMENT — Payment for "Mobilization / Demobilization" shall be at the Contract Lump Sum price for Mobilization and Demobilization as assessed by the Consultant and agreed to by the Contractor. The basis of payment will be as follows: 2/3 of the Lump Sum for Mobilization will be released when the Consultant has deemed that sufficient equipment is on site to carry out the Works and to which the Contractor agrees. 1/3 of the Lump Sum for Demobilization will be released when Total Performance has been awarded to the Contractor by the Consultant.

1.5 TOPSOIL STRIPPING

- .1 METHOD OF MEASUREMENT — Measurement of "Topsoil Stripping" described in the Specifications shall be based on the number of cubic metres of area for which "Topsoil Stripping" is completed. Quantities shall be measured by surveying a grid over the work area after stripping and prior to construction or utilizing the elevations stated in the Specifications. AutoCad 2012 Civil 3D will be used for calculations. Excavation beyond the lines specified will not be included for payment unless otherwise specified by the Engineer. Units shall be measured to the nearest cubic metre or area stripped as indicated on the plans and drawings and in the Specifications and as directed by the Consultant.

- .2 BASIS OF PAYMENT — Payment for "Topsoil Stripping" shall be at the Contract Unit Price for "Topsoil Stripping" measured as specified herein which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.6 COMMON EXCAVATION

- .1 METHOD OF MEASUREMENT — Measurement of "Common Excavation" described in the Specifications shall be based on the number of cubic metres of material excavated from its native state, placed and compacted to the elevations indicated on the drawings. Site grading, and ditching, shall be measured by surveying a grid over the work area on the exposed material after topsoil stripping, before construction. AutoCad 2012 Civil 3D will be used for calculations between survey grid and design elevations. Excavation beyond the lines specified will not be included for payment unless otherwise specified by the Engineer. All stockpiling, scarifying, depositing and compaction of excavated material to execute the site grading, ditching and redepositing of stripped and stockpiled topsoil and drying of soils shall be incidental to "Common Excavation".
- .2 BASIS OF PAYMENT — Payment for "Common Excavation" shall be at the Contract Unit Price for "Common Excavation" measured as specified herein which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.7 SILT FENCING

- .1 METHOD OF MEASUREMENT — Measurement of "Silt Fencing" as described in the Specifications shall be in linear metres along the centerline of the fence. Supply and installation silt fence, including any wire reinforcement; maintenance of silt fence; and for all materials, labour or materials necessary for the completion of the erosion and sediment control where required, including all measures as may be requested by DFO, and all other work necessary or incidental thereto for which separate payment is not elsewhere provided shall be considered incidental to "Silt Fencing".
- .2 BASIS OF PAYMENT — Payment for "Silt Fencing" shall be based on the Contract Unit Price for "Silt Fencing" as specified herein which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.8 CULVERTS

- .1 METHOD OF MEASUREMENT — Measurement of "Culverts" described in the Specifications shall be based on the number of linear metres of each size and type for which "Culverts" is completed. Units shall be measured to the nearest linear metre. Supply and installation of bedding material and culvert markers shall be considered incidental to "Culverts".
- .2 BASIS OF PAYMENT — Payment for "Culverts" shall be at the Contract Unit Price for "Culverts" measured as specified herein which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.9 TRAFFIC GRAVEL — CLASS 'A'

- .1 METHOD OF MEASUREMENT — Measurement for "Traffic Gravel — Class 'A'" as described in the Specifications shall be based on the number of cubic metres of material meeting required gradation supplied, placed and compacted. Transportation, placement, compaction and watering shall be considered incidental to "Traffic Gravel — Class 'A'". AutoCad 2012 Civil 3D will be used for calculations between the sub-grade and final grade.
- .2 BASIS OF PAYMENT — Payment for "Traffic Gravel — Class 'A'" shall be at the Contract Unit Price for "Traffic Gravel — Class 'A'" measured as specified herein, which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.10 GRANULAR BASE COURSE — CLASS 'C'

- .1 METHOD OF MEASUREMENT — Measurement for "Granular Base Course — Class 'C'" as described in the Specifications shall be based on the number of cubic metres of material meeting required gradation supplied, placed and compacted. Transportation, placement, compaction and watering shall be considered incidental to "Granular Base Course — Class 'C'". AutoCad 2012 Civil 3D will be used for calculations between the sub-grade and final grade.
- .2 BASIS OF PAYMENT — Payment for "Granular Base Course — Class 'C'" shall be at the Contract Unit Price for "Granular Base Course — Class 'C'" measured as specified herein, which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.11 CURB STOP VALVE REPLACEMENT

- .1 METHOD OF MEASUREMENT — Measurement for "Curb Stop Valve Replacement" as described on the project drawings shall be based on a lump sum for the location, excavation, and installation of a new curb stop at the location indicate on project drawings. All equipment and labour required to replace the curb stop valve shall be considered incidental to the project.
- .2 BASIS OF PAYMENT — Payment for "Curb Stop Valve Replacement " shall be at the Contract Unit Price for "Relocation of Curb Stop Valve " measured as specified herein, which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.12 NEW APPROACHES

- .1 METHOD OF MEASUREMENT — Measurement for "New Approaches" as described in the Specifications and drawings shall be based on a lump sum for each approach. Transportation, placement, compaction and watering of all required granular shall be considered incidental to "New Approaches".
- .2 BASIS OF PAYMENT — Payment for "New Approaches" shall be at the Contract Unit Price for "New Approaches" measured as specified herein, which shall be payment in full

for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.13 SOUTHERN ACCESS ROAD WIDENING

- .1 METHOD OF MEASUREMENT — Measurement for "Access road widening" as described in the Specifications shall be based on the linear meters of road reconstructed. Transportation, placement, compaction and watering of all required granular shall be considered incidental to "Road Widening".
- .2 BASIS OF PAYMENT — Payment for "Road Widening " shall be at the Contract Unit Price for "Access Road Widening" measured as specified herein, which shall be payment in full for those operations described in the Specifications and for those operations incidental to the Work for which no price or prices or provisions for payment are included in the Contract.

1.14 APPLICATIONS FOR PROGRESS PAYMENT

- .1 Refer to CCDC 2.
- .2 Make applications for payment on account as provided in Agreement monthly as Work progresses.
- .3 Date applications for payment last day of agreed monthly payment period and ensure amount claimed is for value, proportionate to amount of Contract, of Work performed and Products delivered to Place of Work at that date.
- .4 Submit to Consultant, at least 14 days before first application for payment. Schedule of values for parts of Work, aggregating total amount of Contract Price, to facilitate evaluation of applications for payment.

1.15 SCHEDULE OF VALUES

- .1 Provide schedule of values supported by evidence as Consultant may reasonably direct and when accepted by Consultant, be used as basis for applications for payment.
- .2 Include statement based on schedule of values with each application for payment.
- .3 Support claims for products delivered to Place of Work but not yet incorporated into Work by such evidence as Consultant may reasonably require to establish value and delivery of products.

1.16 PREPARING SCHEDULE OF STIPULATED PRICE TABLE ITEMS

- .1 Submit separate schedule of stipulated price items of Work requested in Bid form.
- .2 Make form of submittal parallel to Schedule of Values, with each line item identified same as line item in Schedule of Values. Include in stipulated prices only:
 - .1 Cost of material.
 - .2 Delivery and unloading at site.

- .3 Sales taxes.
- .4 Installation, overhead and profit.
- .3 Ensure stipulated prices multiplied by quantities given equal material cost of that item in Schedule of Values.

1.17 PROGRESS PAYMENT

- .1 Refer to CCDC 2.
- .2 Consultant will issue to Owner, no later than 10 days after receipt of an application for payment, certificate for payment in amount applied for or in such other amount as Consultant determines to be due. If Consultant amends application, Consultant will give notification in writing giving reasons for amendment.

1.18 SUBSTANTIAL PERFORMANCE OF WORK

- .1 Refer to CCDC 2.
- .2 Prepare and submit to Consultant comprehensive list of items to be completed or corrected and apply for a review by Consultant to establish Substantial Performance of Work or substantial performance of designated portion of Work when Work is substantially performed if permitted by lien legislation applicable to Place of Work designated portion which Owner agrees to accept separately is substantially performed. Failure to include items on list does not alter responsibility to complete Contract.
- .3 No later than 10 days after receipt of list and application, Consultant will review Work to verify validity of application, and no later than 7 days after completing review, will notify Contractor if Work or designated portion of Work is substantially performed.
- .4 Consultant: state date of Substantial Performance of Work or designated portion of Work in certificate.
- .5 Immediately following issuance of certificate of Substantial Performance of Work, in consultation with Consultant, establish reasonable date for finishing Work.

1.19 PAYMENT OF HOLDBACK UPON SUBSTANTIAL PERFORMANCE OF WORK

- .1 Refer to CCDC 2.
- .2 After issuance of certificate of Substantial Performance of Work:
 - .1 Submit application for payment of holdback amount.
 - .2 Submit sworn statement that accounts for labour, subcontracts, products, construction machinery and equipment, and other indebtedness which may have been incurred in Substantial Performance of Work and for which Owner might in be held responsible have been paid in full, except for amounts properly retained as holdback or as identified amount in dispute.
- .3 After receipt of application for payment and sworn statement, Consultant will issue certificate for payment of holdback amount.

- .4 Where holdback amount has not been placed in a separate holdback account, Owner shall, 10 days prior to expiry of holdback period stipulated in lien legislation applicable to Place of Work, place holdback amount in bank account in joint names of Owner and Contractor.
- .5 Amount authorized by certificate for payment of holdback amount is due and payable on day following expiration of holdback period stipulated in lien legislation applicable to Place of Work. Where lien legislation does not exist or apply, holdback amount is due and payable in accordance with other legislation, industry practice, or provisions which may be agreed to between parties. Owner may retain out of holdback amount sums required by law to satisfy liens against Work or, if permitted by lien legislation applicable to Place of Work, other third party monetary claims against Contractor which are enforceable against Owner.

1.20 FINAL PAYMENT

- .1 Refer to CCDC 2.
- .2 Submit application for final payment when Work is completed.
- .3 Consultant will, no later than 10 days after receipt of application for final payment, review Work to verify validity of application. Consultant will give notification that application is valid or give reasons why it is not valid, no later than 7 days after reviewing Work.
- .4 Consultant will issue final certificate for payment when application for final payment is found valid.

Part 2 Products

2.1 NOT USED

- .1 Not Used.

Part 3 Execution

3.1 NOT USED

- .1 Not Used.

END OF SECTION

Part 1 General

1.1 RELATED REQUIREMENTS SPECIFIED ELSEWHERE

- .1 Particular requirements for inspection and testing to be carried out by testing laboratory designated by Consultant are specified under various sections.

1.2 APPOINTMENT AND PAYMENT

- .1 Consultant will appoint and pay for services of testing laboratory except follows:
 - .1 Inspection and testing required by laws, ordinances, rules, regulations or orders of public authorities.
 - .2 Inspection and testing performed exclusively for Contractor's convenience.
 - .3 Tests specified to be carried out by Contractor under the supervision of Consultant.
 - .4 Additional tests specified as follows:
- .2 Where tests or inspections by designated testing laboratory reveal Work not in accordance with contract requirements, pay costs for additional tests or inspections as required by Consultant to verify acceptability of corrected work.

1.3 CONTRACTOR'S/DESIGN-BUILDER'S RESPONSIBILITIES

- .1 Provide labour, equipment and facilities to:
 - .1 Provide access to Work for inspection and testing.
 - .2 Facilitate inspections and tests.
 - .3 Make good Work disturbed by inspection and test.
 - .4 Provide storage on site for laboratory's exclusive use to store equipment and cure test samples.
- .2 Notify Consultant sufficiently in advance of operations to allow for assignment of laboratory personnel and scheduling of test.
- .3 Where materials are specified to be tested, deliver representative samples in required quantity to testing laboratory.
- .4 Pay costs for uncovering and making good Work that is covered before required inspection or testing is completed and approved by Consultant.

Part 2 Products

2.1 NOT USED

- .1 Not Used.

Part 3 Execution

3.1 NOT USED

.1 Not Used.

END OF SECTION