



**RETURN BIDS TO:  
RETOURNER LES SUBMISSION À :**

Parks Canada Agency Bid Receiving Unit  
National Contracting Services

**Bid Fax:** 1-866-246-6893

**Bid Email:** [soumissionsouest-bidswest@canada.ca](mailto:soumissionsouest-bidswest@canada.ca)

This is the only acceptable email address for responses to bid solicitation. Bids submitted by email directly to the Contracting Authority or to any other email address may not be accepted.

The maximum email file size is 15 megabytes. Parks Canada Agency (PCA) is not responsible for any transmission errors. Emails with links to bid documents will not be accepted.

**REVISION 003 TO A  
INVITATION TO TENDER**

**RÉVISION 003 INVITATION À  
SOUSSIONNER  
DEMANDE D'OFFRES À  
COMMANDES**

The referenced document is hereby revised; unless otherwise indicated, all other terms and conditions of the offer remain the same.

Ce document est par la présente révisé; sauf indication contraire, les modalités de l'offre demeurent les mêmes.

**Issuing Office - Bureau de distribution :**  
Parks Canada Agency  
Calgary, AB

<b>Title - Sujet :</b> Lake Louise Pipestone Waterline Crossing – Banff National Park	
<b>Solicitation No. - N° de l'invitation :</b> 5P420-20-0346/A	<b>Date :</b> January 19, 2021
<b>Amendment No. - N° de modification :</b> 003	
<b>Client Reference No. - N° de référence du client :</b> 914	
<b>GETS Reference No.   N° de référence de SEAG :</b> PW-20-00938896	

<b>Solicitation Closes - L'invitation prend fin :</b> <b>At - à :</b> 2:00 PM <b>On - le :</b> January 26, 2021	<b>Time Zone - Fuseau horaire</b> MST
---	--

<b>F.O.B. - F.A.B. :</b> <b>Plant - Usine :</b> <input type="checkbox"/> <b>Destination :</b> <input checked="" type="checkbox"/> <b>Other - Autre :</b> <input type="checkbox"/>		
<b>Address Enquiries to - Adresser toutes demande de renseignements à :</b> Jen Maheu		
<b>Telephone No. - N° de telephone :</b> (587) 432-8458	<b>Fax No. -N° de télécopieur :</b> (866) 246-6893	<b>Email Address – Courriel :</b> <a href="mailto:jennifer.maheu@canada.ca">jennifer.maheu@canada.ca</a>
<b>Destination of Goods, Services, and Construction - Destination des biens, services, et construction :</b> See Herein		

**TO BE COMPLETED BY THE BIDDER - À REMPLIR PAR LE SOUMISSIONNAIRE**

<b>Vendor/ Firm Name - Nom du fournisseur/ de l'entrepreneur :</b>	
<b>Address - Adresse :</b>	
<b>Telephone No. - N° de telephone :</b>	<b>Fax No. - N° de télécopieur :</b>
<b>Name of person authorized to sign on behalf of the Vendor/Firm Nom de la personne autorisée a signer au nom du fournisseur/ de l'entrepreneur</b>	
<b>Signature :</b>	<b>Date :</b>

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

---

## AMENDMENT 003

This addendum is being issued to distribute questions and answers, make changes to the tender package, and to replace Appendix 1 - Combined Price Form.

### A. QUESTIONS & ANSWERS

**Q1** There is a Pay Item for thrust blocks but Measurement and Payment states they are to be included with the pipe.

**A1** **Schedule B – Water Mains, Item 6 – Supply and Install Thrust/Anchor Blocks refers to only the Above Ground Thrust/Anchor Blocks as detailed on Sheet C105. See revised bid table for revised quantities. Standard thrust blocks are to be installed as per the typical thrust block detail on sheet C103 and are incidental to pipe install.**

**Q2** Could you also break thrust blocking quantity into Above Ground and Regular Thrust Blocks?

**A2** **See Q1 and revised bid table for revised quantities.**

**Q3** Drawing C-103, Thrust Block Details - What are the measurement units of the dead weight numbers? Is 3.7 for 300mm x 45 deg bend? Is that m3?

**A3** **Confirmed. Cubic metres (m3) to be used.**

**Q4** Measurement and Payment for “Connection to Ex. Watermain” refers to tapping sleeve and valve. Please confirm this is not required.

**A4** **Confirmed. Connection to Ex. Watermain to include all work and material required to connect and tie to existing stubs. See Tender Package Revisions.**

**Q5** Drawing C-103, Insulation Detail. Is this required for this project or does the insulation shell as noted on drawing C-105 suffice?

**A5** **Insulation as detailed on drawing C103 to be applied over any Non-Pre-Insulated watermain with less than 3.30m depth of cover.**

**Q6** Why is topsoil required to be removed offsite? And then new topsoil imported?

**A6** **Topsoil Stripping (haul offsite) is intended for any deleterious material that cannot be reused onsite. Any re-useable topsoil shall be stored onsite for reuse. Imported topsoil would be used to replace deleterious topsoil hauled off site and cover pre-approved areas requiring topsoil. Bidders should note that preference is to maintain organic material within the National Park. Any imported material must be approved by Parks Canada. See Tender Package Revisions.**

**Q7** The specification for the structural steel indicated on General note #2 Page S102, appears to indicate 350AT Category 3. Our suppliers have been unable to obtain this type of steel or they indicate that it extremely costly and difficult to procure. Is this the exact specification (cost and delivery issues) or can we use another type of steel?

**A7** **In substitution for CAN/CSA-G40.21 Grade 350AT, Category 3, the structural steel is acceptable to be any of the following:**

- **ASTM A709 Grade 345WT Type B with Charpy value of 27J @ -30 degree Celsius, no coating required**
- **CAN/CSA-G40.21 Grade 350WT Category 3, hot-dipped galvanized**

**Sliding support as detailed and indicated on general note 3 of Sheet C104 are to be of equal material selected for structural steel. Mounting straps are to be isolated from the casing pipe.**

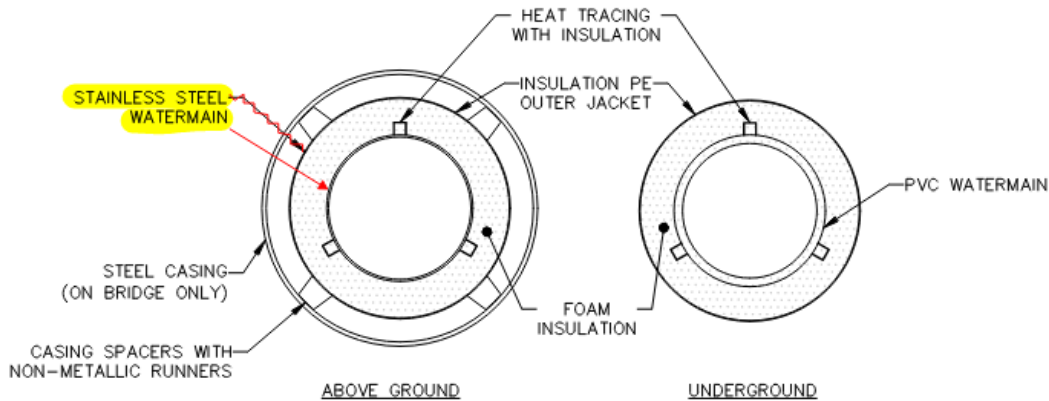
---

**Q8** Drawing C105, detail “Pre-insulated Watermain details”

For the above ground section, the tag “stainless steel watermain” is indicating the edge of the foam insulation instead of the inner circle.

Can you clarify this?

**A8** Leader “stainless steel watermain” should point to the inner circle. Detail to be updated in IFC drawings.



	PIPE NOMINAL SIZE (MM)	PIPE DR/SCHD	OUTSIDE DIAMETER (MM)	THICKNESS (MM)	FOAM INSULATION THICKNESS (MM)	INSULATION JACKET THICKNESS (MM)	HEAT TRACE CABLES (COUNT)
PVC WATERMAIN	300	18	335	19	75	1.9	1
STAINLESS WATERMAIN	300	10S	323.9	4.8	75	3.8	2
STAINLESS STEEL CASING	600	STANDARD	609.6	9.5	N/A	N/A	N/A

**PRE-INSULATED WATERMAIN DETAILS**

NTS

**Q9** Drawing C105, detail “Above ground pipe vertical anchor block details”

The pipe and insulation detail appears to be the same for an underground section of the pipe. Should it be the above ground detail instead?

**A9** The detail as shown is correct. The above ground thrust block is outside of the Casing extents. Refer to the “Pre-Insulated Watermain Details” on Drawing C105 and clarified in Q8.

Please note all other required thrust blocks to be as per the standard detail on C103. “

**Q10** Please provide manufacture information for the Electrical CDP 800A 120V/208V

**A10** See Appendix 2 – Supporting Photos of available photos of the existing panel and nameplate information.

**Q11** Please advise if new Electrical Conduit is to be by directional drill under the River or can be mounted on the existing bridges?

**A11** Routes are diagrammatic; new electrical conduit is to be mounted on the existing bridge beside existing conduits.

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

---

**Q12** Please advise if the relocated existing street lights require new conduits and wire and the correct item number in the pricing table to allow for this cost if needed?

**A12 Relocation of street lights will require new conduit and wire, incidental to the relocation.**

**Q13** Please provide clarification on the location/connection point for the temporary lighting

**A13 Similar to temporary hoarding requirements common on construction sites, the Contractor shall be required to fabricate professionally certified temporary pressure-treated wooden lighting poles with adequate base structure to seat the posts on the sidewalk. The posts shall be adequately secured to the existing railing to ensure the posts remain in place for the duration of the work. The contractor shall install such posts so as to not impede pedestrian and traffic safety. Alternatives may be considered. All temporary lighting arrangements will be reviewed by the Department Representative before approval on site.**

**Q14** Please advise if the existing street lights and pole can be stored on site or have to be removed from site and stored by contractor?

**A14 Street lights and pole may be stored on site. Protection of the lights and poles from damage or theft is the responsibility of the contractor.**

**Q15** Please provide clarification on note 18 on drawings E1.0. Does this note require a dedicated concrete light pole base or is the HTC to be mounted on the relocated existing street light?

**A15 The HTC may not be installed on an existing street light and shall be installed on its own dedicated pole using the same kind of concrete base as pole lights.**

**Q16** Please confirm the detail 3 on E1.0 is intended for the existing street light installation or is required for HTC mounting?

**A16 Detail 3 on drawing E1.0 represents the requirements for re-installing existing street lights after their bases have been removed for the purpose of installing underground piping. The new street light locations may not be installed in their original locations due to clearance requirements from the underground pipe route. The same kind of pole base for street lighting shall also be used to mount the 2 Heat Trace Controllers (HTCs) as indicated in Note 18.**

**Q17** Please confirm if the single line Diagram is correct on E1.0. Drawing shows a 30A 3 Pole GFI breaker and a 7.5KV<sub>a</sub> 208/240V single phase transformer

**A17 The circuit breaker may be 30A 2 Pole.**

**Q18** What are the internal/external coating requirements on the 600mm casing pipe?

**A18 Coating to meet Alberta Transportation Standard Specifications for Bridge Construction.**

**Q19** Would an adjustment to the hours of work be permitted? Some of the works may be easier to complete on a night shift.

**A19 Night shifts may be approved pending proposed work plan. Approval will be determined on noise and light pollution levels of the proposed work.**

**Q20** We are unsure of pay item B.10. Where is the temporary water service to be installed?

**A20 Temporary water service line item to be removed. See revised bid table.**

**Q21** Please provide detail drawings for key note 10 on E1.0 to clarify the installation in the existing Mechanical/Electrical room

**A21 There is adequate room and wall space in the electrical room for the required installation. Contractor shall ensure installation to be completed by a licensed professional tradesman, following best practices.**

---

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

---

**Q22** Please identify conduit size for alarm conduit shown of the Electrical site plan  
**A22 53mm (2") conduit**

**Q23** Please provide clarification on type of wire required for alarm conductors shown on site plan  
**A23 #12 AWG copper**

**Q24** Can you please provide a detail drawing for installation of the heat trace identified by Key note 6 on E1.0

**A24 Contractor shall ensure install is completed by a licensed professional and who shall assist with installation of the heat trace thermostat (AKA Controller) and terminate site wiring to heat tracing thermostat at locations shown on drawing E1.0.**

**Q25** Please provide clarification and further details for the Concrete Pull Boxes, specifically size, load capacity, duct configuration, etc.

**A25 Concrete Pull boxes as listed in Bid item D.3 – Concrete Pull Boxes, Complete including Connection to Utility and called out in Section 26 05 31 Electrical Concrete Products Part 2.2 Precast Cabinet Base shall meet the following:  
BULK436N07204 (or equal) – 24"W x 36"L x 24"D (MIN) HDPE w/ Polymer cover instead of concrete: Pull boxes shall be used by the contractor as required in order to remain within CEC minimum distances and number of bends for pulling conductors; required quantities listed are estimated. Contractor to carry number based on CEC rules.**

**Q26** Who will be installing heat supplied heat trace?

**A26 The Thermal management system (comprised of insulation and heat trace cable(s)) to protect the watermain in the areas shown requiring pre-insulated pipe from freezing shall be a single complementary system supplied by one supplier/vendor and be compatible with the specified pipe materials. Shop drawings for the Thermal management system and pipe material to be submitted and approved prior to procurement and install.**

**As part of this project, the Contractor shall be responsible for ensuring they are carrying a subcontractor capable of installing both the required heat tracing and temperature sensors within the pre-insulated pipe heat trace raceways as per vendor/manufacturer installation requirements.**

**Q27** Can you confirm Heat Trace and Heat trace Controller is being supplied to Parks?

**A27 Heat Trace & Controllers are to be supplied by the pre-insulated pipe vendor. See Q26. Supply and install of heat trace system and all accessories including temperature sensors, controller, etc. are incidental to pre-insulated pipe.**

## **B. TENDER PACKAGE REVISIONS**

**CHANGES ARE SHOWN IN RED.**

### **A. Specifications**

1. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.1

**Delete:** Item .6.3.3 Topsoil Stripping (Haul off-site)

**Replace with:** Item .6.3.3 Topsoil Stripping (Haul off-site)

.3 Excavating, loading and hauling to an approved dump site outside the Park **for any deleterious material.**

2. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.1  
**Add:** Item .6.3.5 Topsoil Stripping (Haul off-site)
- .3 Payment shall include the supply of all labour, material and plant to strip and haul materials offsite. The work includes:
- .5 Disposal includes all organic material contaminated by road gravel and salt.
3. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.2  
**Add:** Item .1.3.13 Water Main –300mm Stainless 316 Watermain c/w fittings (includes 300mm Stainless 316 Pipe, 3" Insulation, HDPE outer jacket and Heat Tracing System)
- .3 Payment shall include the supply of all labour, material and plant to install the new water main to lines and grades shown on the plans. The work includes:
- .13 All efforts required to complete topsoil stripping (to be reused), stockpiling, tarping, re-spreading of salvaged material, topsoil and seed of all disturbed areas.
4. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.2  
**Add:** Item .2.3.13 Water Main –300mm PVC Watermain c/w fittings (includes 300mm PVC Pipe, 3" Insulation, HDPE outer jacket and Heat Tracing System)
- .3 Payment shall include the supply of all labour, material and plant to install the new water main to lines and grades shown on the plans. The work includes:
- .13 All efforts required to complete topsoil stripping (to be reused), stockpiling, tarping, re-spreading of salvaged material, topsoil and seed of all disturbed areas.
5. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.2  
**Add:** Item .6.3.15 Thrust/Anchor Blocks
- .3 Payment shall include the supply of all labour, material and plant to install the thrust blocks. The work includes:
- .15 All efforts required to complete topsoil stripping (to be reused), stockpiling, tarping, re-spreading of salvaged material, topsoil and seed of all disturbed areas.
6. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.1  
**Delete:** Item .7.3.9 Connection to Existing Water Main c/w Valve  
**Replace with:** Item .7.3.9 Connection to Existing Water Main c/w Valve
- .9 The supply and installation of operating rod, concrete thrust blocking, bedding, epoxy coating, cathodic protection, cleaning, flushing and disinfecting, pressure and leakage testing.
-

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

---

7. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.2

**Add:** Item .8.3.11 Air Release Valves c/w Enclosure and Heater

.3 Payment shall include the supply of all labour, material and plant to install the air release valves, enclosure and heater. The work includes:

.11 All efforts required to complete topsoil stripping (to be reused), stockpiling, tarping, re-spreading of salvaged material, topsoil and seed of all disturbed areas.

8. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.2

**Delete:** Item .10 Temporary Water Service

9. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.4

**Add:** Item .1.3.5 Conduit

.3 Payment shall include the supply of all labour, material and plant to install each size of conduit indicated. The work includes:

.5 All efforts required to complete topsoil stripping (to be reused), stockpiling, tarping, re-spreading of salvaged material, topsoil and seed of all disturbed areas.

10. **In:** Section 01 29 01 Methods of Measurement and Payment Part 3. Section 3.5

**Add:** Item .11.3.10 New Concrete Sidewalks

.3 Payment shall include the supply of all labour, material and plant for concrete sidewalks. The work includes:

.10 All efforts required to complete topsoil stripping (to be reused), stockpiling, tarping, re-spreading of salvaged material, topsoil and seed of all disturbed areas.

11. **In:** Section 31 14 13 Soil Stripping and Stockpiling Part 3. Section 3.2

**Delete:** Item .13 Stripping of Topsoil

**Replace with:** Item .13 Stripping of Topsoil

.13 All topsoil imported from outside of the **National Park** has to be approved by the Environmental Department. Supply a sample as per Section 01 33 00 to be approved by Parks Canada.

12. **In:** Section 31 14 13 Soil Stripping and Stockpiling Part 3. Section 3.2

**Add:** Item.14 Stripping of Topsoil

.14 Disposal includes all organic material contaminated by road gravel and salt and all other deleterious material unsuitable for reuse.

13. **In:** Section 32 91 19.13 Topsoil Placement and Grading Part 2. Section 2.1

**Delete:** Item .1 Topsoil

---

**Replace with:** Item .1 Topsoil

- .1 Topsoil to be stripped and salvaged during excavation and redistributed upon completion. No topsoil is to be imported onto site **unless approved by the Departmental Representative and Parks Canada.**

14. **In:** Section 32 91 19.13 Topsoil Placement and Grading Part 3. Section 3.2  
**Add:** Item .6 Stripping of Topsoil

- .6 **Any organic material contaminated by road gravel and sand and all other deleterious material unsuitable for reuse shall be disposed of outside of the National Park.**

15. **In:** Section 26 05 21 Wires and Cables (0-1000 V Part 2. Section 2.4  
**Delete:** Item .2.1 Control Cables  
**Replace with:** Item .2.1 Control Cables

- .1 In accordance with Urecon **or approved equivalent** specifications; refer to manufacturers data sheets.

16. **In:** Section 26 24 26 Connections to Mechanical Part 1. Section 1.1  
**Delete:** Item .1 Requirements  
**Replace with:** Item .1 Requirements

- .1 Provide a complete system of wiring to mechanical apparatus (including static heating systems) and controls as specified herein, as shown on the drawings and in accordance with Urecon **or approved equivalent** installation methods and instructions.

17. **In:** Section 26 24 26 Connections to Mechanical Part 1. Section 1.1  
**Delete:** Item .10.1 Requirements  
**Replace with:** .10.1 Requirements

- .10 Some specific definitions of equipment wiring responsibilities are as follows:
  - .1 Urecon **or approved equivalent** Heat Trace Systems

18. **In:** Section 26 24 26 Connections to Mechanical Part 2. Section 2.1  
**Delete:** Item .1 208 and 240 VOLT, 1 Phase Motor Disconnect Switches  
**Replace with:** Item .1 Requirements

- .1 Provide means of locking and tagging out heat trace system at the Urecon **or approved equivalent** heat trace controller (AKA Thermostat).

19. **In:** Section 26 27 26 Wiring Devices Part 2. Section 2.5  
**Delete:** Item .1.1 Timers and Controllers  
**Replace with:** Item .1.1 Timers and Controllers

- .1 Heat Trace Controller (AKA Thermostat):
    - .1 Supplied by Urecon or **approved equivalent supplier/manufacturer**: obtain technical literature from Urecon or **approved equivalent prior** to installation.
-



Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

---

**C. APPENDIX 1 – COMBINED PRICE FORM (see following pages)**

**THE ATTACHED APPENDIX 1 - COMBINED PRICE FORM MUST BE USED IN ORDER FOR A BID TO BE DEEMED RESPONSIVE. ANY BIDS SUBMITTED NOT USING THE COMBINED PRICE FORM WILL NOT BE ACCEPTED.**

CHANGES ARE SHOWN IN RED.

Delete: *APPENDIX 1 – COMBINED PRICE FORM* in its entirety

Replace with: See attached

**ALL OTHER TERMS & CONDITIONS REMAIN UNCHANGED**

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

---

## **APPENDIX 1 - COMBINED PRICE FORM (6 Pages)**

- 1) The prices per unit will govern in establishing the Total Extended Amount. Any arithmetical errors in this Appendix will be corrected by Canada.
- 2) Canada may reject the bid if any of the prices submitted do not reasonably reflect the cost of performing the part of the work to which that price applies.

Note: Bidders are reminded that it is their responsibility to include in their bid all work as described in the drawings and specifications. Pricing for work including but not limited to Mobilization, De-Mobilization, etc. is to be included in the Lump Sum Table.

### **PRICE TABLE**

Lump Sum Amounts designate Work to which a Lump Sum Arrangement applies.

Unit Price items designate Work to which a Unit Price Arrangement applies.

- (a) Work included in each item is as described in the referenced specification section.
- (b) The Price per Unit shall not include any amounts for Work that is not included in that unit price Item.

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

**A: SITE WORKS**

Item No.	Specification Reference	Class of Labour, Plant or Material	Unit of Measurement	Estimated Quantity	Price per Unit (Tax extra)	Estimated Total Price (Tax extra)
1	01 21 00	Prime Cost Sum	Lump Sum	1		\$ 200,000.00
2	01 35 43	Erosion and Sediment Control	Lump Sum	1		\$
3	01 52 00 01 35 43	Traffic Control, Barricades & Signs	Lump Sum	1		\$
4	01 11 00	General Requirements	Lump Sum	1		\$
5	32 03 11 32 92 19.13	Landscaping Rehabilitation	Lump Sum	1		\$
6	31 14 13 32 91 19.13	Topsoil Stripping (Haul off-site)	Square Meter	300	\$	\$
7	31 11 00	Clearing and Grubbing	Square Meter	50	\$	\$
<b>A. SITE WORKS SUBTOTAL</b>						\$ _____

**B: WATER MAINS**

Item No.	Specification Reference	Class of Labour, Plant or Material	Unit of Measurement	Estimated Quantity	Price per Unit (Tax extra)	Estimated Total Price (Tax extra)
1	33 11 16	Supply and Install 300mm Stainless 316 Watermain c/w fittings (includes 300mm Stainless 316 Pipe, 3" Insulation, HDPE outer jacket and Heat Tracing System)	Liner Meter	104.1	\$	\$
2	33 11 16	Supply and Install 300mm PVC Watermain c/w fittings (includes 300mm PVC Pipe, 3" Insulation, HDPE outer jacket and Heat Tracing System)	Linear Meter	113	\$	\$
3	33 11 16.21	Supply and Install 600mm Metal Casing Pipe	Linear Meter	79.5	\$	\$

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

4	33 11 16.21	Supply and Install Metal Casing Pipe Sliding Supports	Each	6	\$	\$
5	31 23 33 33 11 16 33 12 13	Supply and Install 300mm dia Watermain Valves	Each	1	\$	\$
6	03 30 00 33 11 16	Supply and Install Thrust/Anchor Blocks	Each	4	\$	\$
7	31 23 33 33 11 16 33 11 16.13 33 12 13	Connection to Existing Water Main	Each	2	\$	\$
8	33 11 16	Air release valves, with enclosure and heater	Each	2	\$	\$
9	33 11 16	Expansion Joint	Each	2	\$	\$
10	01 51 00	Temporary Water Service	Lump Sum	1		\$
<b>B. WATER MAINS SUBTOTAL</b>						\$ _____

### C: STRUCTURAL

Item No.	Specification Reference	Class of Labour, Plant or Material	Unit of Measurement	Estimated Quantity	Price per Unit (Tax extra)	Estimated Total Price (Tax extra)
1	01 35 43 01 52 00	Work Platform and Environmental Containment	Lump Sum	1		\$
2	05 12 33	Supply and Delivery of Structural Steel	Kilogram	4500	\$	\$
3	05 12 33	Install of Structural Steel	Kilogram	4500	\$	\$
4	05 05 19 05 12 33	Delivery 25 DIA, 650 Embedment Stainless Steel Anchors	Each	64	\$	\$

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

5	05 05 19 05 12 33	Supply and Delivery 19 DIA 350 Embedment Stainless Steel Anchors	Each	48	\$	\$
6	05 05 19 05 12 33	Install 25 DIA, 650 Embedment Stainless Steel Anchors	Each	64	\$	\$
7	05 05 19 05 12 33	Install 19 DIA 350 Embedment Stainless Steel Anchors	Each	48	\$	\$
8	01 74 21	Concrete Removal and Patching (Quantity As Required based on Hammer Testing)	Square Meter	3	\$	\$
<b>C. STRUCTURAL SUBTOTAL</b>						\$ _____

#### D. ELECTRICAL

Item No.	Specification Reference	Class of Labour, Plant or Material	Unit of Measurement	Estimated Quantity	Price per Unit (Tax extra)	Estimated Total Price (Tax extra)
1	01 52 00	Supply and Install of Shallow Utility Ducts				
		a) 53mm dia PVC duct	Linear Meter	200	\$	\$
		b) 35mm dia PVC duct	Linear Meter	400	\$	\$
2	26 05 19 26 05 26	Supply and Installation of Wiring Conductors				
		a) 2#6 AWG + Ground	Linear Meter	160	\$	\$
		b) 2#8 AWG + Ground	Linear Meter	220	\$	\$
		c) 2#10 AWG +Ground	Linear Meter	300	\$	\$
3	26 05 00 26 05 31	Concrete pull boxes, Complete Including Connection to Utility	Each	3	\$	\$
4	26 22 00	7.5 kVA Transformer	Each	1	\$	\$

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

5	01 74 21 26 05 00 26 50 00	Removal and Re-Installation of Street Lights - bases, poles and lights (4 x 25' poles)	Each	4	\$	\$
6	01 51 00 26 50 00	Temporary Lighting c/w wood poles	Each	4	\$	\$
7	01 51 00 26 05 34	Temporary wiring for temp lighting	Linear Meter	200	\$	\$
8	31 23 33	Hydrovac'ing around building, propane tanks and air handling unit	Linear Meter	50	\$	\$
9	Division 26	Electrical Works for Parks Canada including but not limited to breakers, coring, installation of heat trace controllers, junction boxes, installation of heat trace, terminating wiring, alarm signals, electrical shutdowns, travel and other job expenses for the project **	Lump Sum	1		\$
<b>D. ELECTRICAL SUBTOTAL</b>						\$ _____

### E. ROADWORKS

Item No.	Specification Reference	Class of Labour, Plant or Material	Unit of Measurement	Estimated Quantity	Price per Unit (Tax extra)	Estimated Total Price (Tax extra)
1	31 23 33	Waste Excavation	Cubic Meter	250	\$	\$
2	02 41 13.13	Removal and Disposal of Ex Asphalt, including all saw cutting	Square Meter	265	\$	\$
3	01 52 00 01 74 21	Removal & Disposal of Existing Concrete Curb & Gutter	Linear Meter	75	\$	\$
4	01 52 00 01 74 21	Removal & Disposal of Existing Concrete Sidewalk	Square Meter	75	\$	\$
5	31 22 16.13	Subgrade Prep	Square Meter	265	\$	\$

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

6	31 05 16 32 11 16.01	Granular Sub-base a) 300 mm Compacted Thickness	Square Meter	265	\$	\$
7	31 05 16 32 11 16.01	Granular Base Course, 25 mm Crushed Gravel a) 100 mm Compacted Thickness	Square Meter	265	\$	\$
8	32 12 13.23	Prime Coat	Square Meter	265	\$	\$
9	32 12 13.16 32 12 16	Asphaltic Concrete Pavement a) Hot Mix - 140mm Compacted Thickness Mix 'A' or Superpave	Square Meter	265	\$	\$
10	32 12 13.16 32 12 16	Hot Mix - 40mm Compacted Thickness Mix 'C' or Superpave Fine	Square Meter	265	\$	\$
11	03 10 00 03 02 00 03 30 00 32 16 15	Install New Concrete Curb & Gutter	Linear Meter	85	\$	\$
12	03 10 00 03 02 00 03 30 00 32 16 15	Install New Sidewalk	Square Meter	85	\$	\$
13	01 56 00	Supply and Install Permanent Precast Barriers	Linear Meter	30	\$	\$
<b>E. ROADWORKS SUBTOTAL</b>						\$ _____

<b>TOTAL EXTENDED AMOUNT (TEA) (A+B+C+D+E)</b> Excluding applicable tax(es)	\$ _____
--	----------

Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title – Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

## D. APPENDIX 2 – SUPPORTING PHOTOS (2 PAGES)





Solicitation No. - N° de l'invitation :  
5P420-20-0346/A

Amd. No. - N° de la modif. :  
003

Contracting Authority - Autorité contractante :  
Jen Maheu

Client Ref. No. - N° de réf. du client :  
914

Title - Titre :  
Lake Louise Pipestone Waterline Crossing – Banff National Park

---

