

## INVITATION TO TENDER NO. PS20180617 (the "ITT")

### CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2

Tenders are to be addressed to the Supply Chain Management office, 4<sup>th</sup> Floor, City of Vancouver, 453 West 12<sup>th</sup> Avenue, Vancouver, British Columbia, Canada, V5Y 1V4, and must be received in the drop box at the Supply Chain Management office prior to 3:00pm, Vancouver Time (as defined in Note 3 below), on Tuesday, June 12, 2018 (the "Closing Time"). Tenders will not be publicly opened. Tender results can be found within 48 hours of the Closing Time at the following website:

http://vancouver.ca/doing-business/unverified-tender-results.aspx

#### NOTES:

- 1. Tenders may be delivered by couriers or otherwise in person at the address and location specified above, prior to the Closing Time.
- 2. Tenders must be in sealed envelopes or packages marked with the Tenderer's name and the ITT title and number. Tenderers should submit one copy of the Tender and one copy of each other document required by the Tender Documents, including the bid bond described in Part B of this ITT.
- 3. "Vancouver Time" will be conclusively deemed to be the time shown on the clock above the Supply Chain Management drop box on the 4th Floor of Vancouver City Hall.
- 4. The City of Vancouver is open on business days from 8:30 a.m. to 4:30 p.m., Vancouver Time, and is closed Saturdays, Sundays, and holidays.
- 5. DO NOT SUBMIT TENDERS BY FAX OR E-MAIL.
- 6. All queries related to this ITT should be submitted in writing to the attention of:

Brian Brennan, Contracting Specialist

Email: brian.brennan@vancouver.ca

(the "Contact Person")

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0 1 1 1 4 .	

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NOTE: The listed Specifications and Drawings are not included herewith but may be accessed by

potential Tenderers at the FTP: <a href="https://webtransfer.vancouver.ca/">https://webtransfer.vancouver.ca/</a> The user ID is: PS20180617DL@coveftp01

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The password is: Nx24c7av The password is case sensitive.)

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### 1.0 OVERVIEW OF PROJECT

- 1.1 The City of Vancouver (the "City") invites Tenders for the construction of watermain, separated storm and sanitary sewer infrastructure, and pavement improvements.
- 1.2 The Work generally includes, but is not limited to:
  - Supply and installation of approximately 720 linear metres of 200mm diameter ductile iron cement lined watermains. Watermain works includes the installation of fire hydrants, service renewals, all service connection change-overs, all valves, fittings and permanent street repairs associated with the installation of the above water mains;
  - Reconstruction of approximately 670 m of gravity storm and sanitary sewer mains, manholes, reconnection of existing service connections, proposed service connections;
  - Supply and install of all valves, fittings, saw cutting of pavement/curb/sidewalk, trench restoration, permanent street restoration and surface repairs associated with the installation of the sewer main and associated activities;
  - Supply of all materials and the furnishing of project management, superintendence, overhead, labour, equipment, tools, supplies and all other items necessary for and incidental to the satisfactory performance and completion of all work as shown on the Drawings and herein specified;
  - Provision of all survey, testing requirements, layout, quality control, and miscellaneous testing procedures;
  - Provision of geotechnical services. Please see the Geotechnical Reports attached as Appendix 4 for information purposes;
  - Supply and install of new pavement surfacing;
  - Please note and take into account in preparation of Tenders the materials and services to be supplied by the City as described in Appendix 5 to this Part A.
- 1.3 The Work Site is located in Vancouver, British Columbia, at:
  - W 39th Avenue between, approximately, Trafalgar Street and the lane east of Trafalgar;
  - W 42nd Avenue between, approximately, Dunbar Street and Blenheim Street;
  - W 43rd Avenue between, approximately, Dunbar Street and tie-in East of Blenheim Street;
  - Blenheim Street between, approximately, W43rd Avenue and W44th Avenue.

The Work Site is further described in the Tender Documents.

- 1.4 The purpose of this ITT is to select a Tenderer with the capability and experience to efficiently and cost-effectively perform and complete the Work.
- 1.5 IF A POTENTIAL TENDERER BELIEVES THAT THE CITY MAY BE UNABLE TO SELECT IT DUE TO A CONFLICT OF INTEREST, BUT IS UNCERTAIN ABOUT THIS, THE POTENTIAL TENDERER IS URGED TO CONTACT THE CONTACT PERSON AS SOON AS POSSIBLE WITH THE RELEVANT INFORMATION

SO THAT THE CITY MAY ADVISE THE POTENTIAL TENDERER REGARDING THE MATTER. SEE SCHEDULE "Q" FOR AN INDICATION OF THE TYPES OF CONFLICTS OF INTEREST THAT OFTEN ARISE.

### 2.0 SUSTAINABILITY

- 2.1 The City's Procurement Policy, Ethical Purchasing Policy and related Supplier Code of Conduct found at <a href="http://vancouver.ca/doing-business/selling-to-and-buying-from-the-city.aspx">http://vancouver.ca/doing-business/selling-to-and-buying-from-the-city.aspx</a> align the City's approach to procurement with its corporate social, environmental and economic sustainability values and goals. They evidence the City's commitment to maximize benefits to the environment through product and service selection, and to ensure safe and healthy workplaces, where human and civil rights are respected. Each Tenderer is expected to adhere to the supplier performance standards set forth in the Supplier Code of Conduct.
- A Contractor is to provide environmentally sensitive products or services wherever possible. Where there is a requirement that a Contractor supply materials, and where such materials may cause adverse environmental effects, each Tenderer should indicate the nature of the hazard(s) in its Tender. Furthermore, each Tenderer should advise the City of any known alternatives or substitutes for such materials that would mitigate such adverse effects.

#### 3.0 TENDER DOCUMENTS

- 3.1 The Tender Documents consist of the following (and include the documents referred to in Section 3.3 below):
  - (a) Part A Introduction, and its appendices:
    - (i) Appendix 1 Mandatory Information Meeting Attendance Form;
    - (ii) Appendix 2 Response Notification Form;
    - (iii) Appendix 3 Site Plan;
    - (iv) Appendix 4 Owner Supplied Materials and Services.
  - (b) Part B Terms and Conditions of ITT Process;
  - (c) Part C Form of Tender (including all schedules),
  - (d) Part D Form of Agreement (including all schedules);
  - (e) the Specifications (available separately and to be incorporated into the Contract when finalized);
  - (f) the Drawings (available separately and to be incorporated into the Contract when finalized);
  - (g) the Waterworks Connections Database Service Lists (available separately and to be incorporated into the Contract when finalized); and
  - (h) all addenda or amendments to the ITT, and all questions and answers in connection with the ITT, issued in writing by the City prior to the Closing Time, as well as any addenda, amendments or questions and answers issued in writing by the City after the Closing Time and accepted in writing by the Tenderers.

3.2 The Specifications and Drawings other than those referred to in the following Section 3.3 will be made available at the following FTP Site (the "FTP Site"):

To access the site externally, use your web browser and go to: https://webtransfer.vancouver.ca/

The user ID is: PS20180617ADM@coveftp01

The password is: Nx24c7av (The password is case sensitive)

The Specifications available at the FTP Site include:

• PS20180617 - Sewer Standard Construction Specifications - 2018-04-01

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0	Section 01310	Construction Schedule
0	Section 01340	Shop Drawings, Product Data and Samples
0	Section 01400	Quality Control
0	Section 01535	Temporary Facilities
0	Section 01561	Environmental Protection
0	Section 01570	Traffic Regulation
0	Section 01721	Project Record Documents
0	Section 02104	Shrub and Tree Preservation
0	Section 02210	Site Grading
0	Section 02221	Rock Removal

- Section 02221 Rock Removal
   Section 02223 Excavation, Trenching, Backfill and Surface Restoration
   Section 02226 Aggregates and Granular Materials
- o Section 02236 Controlled Density Fill
- o Section 02242 Dust Control
- o Section 02523 Concrete Walks, Curbs and Gutters
- o Section 02725 Manholes and Catchbasins
- o Section 02731 Sewers
- o Section 03200 Concrete Reinforcement
  o Section 03300 Cast-in-Place Concrete
- PS20180617 Water Standard Construction Specifications 2018-04-01

0	Section 01310	Construction Schedule
0	Section 01340	Shop Drawings, Product Data and Samples
0	Section 01400	Quality Control
0	Section 01535	Temporary Facilities
0	Section 01561	Environmental Protection
0	Section 01570	Traffic Regulation
0	Section 01721	Project Record Documents

0	Section 02104	Shrub and Tree Preservation
0	Section 02210	Site Grading
0	Section 02221	Rock Removal
0	Section 02223	Excavation, Trenching, Backfill and Surface Restoration
0	Section 02226	Aggregates and Granular Materials
0	Section 02230	Hot-Mix-Asphalt for Surface Restoration
0	Section 02523	Concrete Walks, Curbs and Gutters
0	Section 02742	Waterworks
0	Section 02921	Topsoil and Finish Grading
0	Section 02938	Sodding
0	Section 03300	Cast-in-Place Concrete

The Drawings available at the FTP Site include:

## Sewer Design Drawings:

•	DB3747-A7 -	W 39TH AVENUE - FROM TRAFALGAR ST TO LANE EAST OF TRAFALGAR ST
•	DB3747-C1 -	W 42ND AVE - FROM LANE EAST OF DUNBAR ST TO COLLINGWOOD ST
•	DB3747-SE1 -	TYPICAL SECTIONS
•	DB3747-SE2 -	TYPICAL SECTIONS
•	DB3462C	W 43RD AVE - FROM COLLINGWOOD ST EAST TO BLENHEIM ST - SHEET 1
•	DB3462C	W 43RD AVE - FROM LANE TO COLLINGWOOD ST - SHEET 2
•	DB3462C	CONSTRUCTION NOTES AND DETAILS - SHEET 3
•	PS20180617 - City o	of Vancouver - Sewer Standard Detail Drawings - 2018-04-01

## Water Design Drawings:

• EAST TO BLENHEIM ST

•	AB 1824	W42ND AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 1
•	AB 1824	W42ND AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 2
•	AB 1825	W43RD AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 1
•	AB 1825	W43RD AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 2

PS20180617 - City of Vancouver - Water Standard Detail Drawings - 2018-04-01

3.3 The Specifications and Drawings include the "Master Municipal Specifications and Standard Detail Drawings" contained within Volume II of the Master Municipal Construction Document, as supplemented by the PS20180617- City of Vancouver - Street Restoration Manual (rev. August 2008) which is available at the FTP Site. For certainty, all of Volume I and the following parts of Volume II of the MMCD are expressly excluded from the Tender Documents: Instructions to Tenderers - Part II. General Conditions (including Schedule 17.5.3 Letter Agreement with Referee, Changes and Extra Work flow chart, and Dispute Resolution Process flow chart).

3.4 Geotechnical reports regarding the Work Site, entitled "Geotechnical Investigation Sewer Infrastructure Design and Construction" (Western Consultants dated January 25, 2016) and "Geotechnical Exploration Report" (Braun Geotechnical dated February 1, 2017), will be accessible at the FTP site described below. However, except to the extent any of their contents may be specifically incorporated into the Specifications, they are made available for information purposes only and are not included in the Tender Documents. The geotechnical reports were prepared by independent consultants. Any opinions or recommendations expressed therein are solely those of the authors of the reports and not of the City. All Tenderers, for purposes of preparing their Tenders, must make their own determinations regarding and are solely responsible for determining for themselves the nature of the subsurface conditions at the Work Site, and they should not, for that purpose, rely on the geotechnical reports described here. Except to the extent that any of the contents of those reports may have been specifically incorporated into the Specifications, and then only to the extent provided or allowed by law, the Tender Contracts and, for a successful Tenderer, the Contract, the City makes no representations of any kind and shall not in any way be responsible or liable to any Tenderer for the accuracy, correctness or completeness thereof, and, without limitation to anything else in the Tender Documents, the City shall not be liable in any way to any Tenderers for any loss, injury, damage or expense of any kind that they or any of them may at any time suffer, incur or experience as a result of or in connection with the contents of those reports.

FTP site for the geotechnical reports:

To access the site externally, use your web browser and go to: <a href="https://webtransfer.vancouver.ca/">https://webtransfer.vancouver.ca/</a>

The user ID is: PS20180617DL@coveftp01

The password is: Nx24c7av

#### 4.0 MANDATORY INFORMATION MEETING

- 4.1 Tenderers are required to attend the mandatory information meeting (the "Mandatory Information Meeting") on Thursday, May 17, 2018 commencing at 10:00 a.m.
- The location of the Mandatory Information Meeting will be at the intersection of W 42nd Avenue and Dunbar Street in Vancouver, British Columbia.
- 4.3 Tenderers are asked to pre-register for the Mandatory Information Meeting by submitting the Mandatory Information Meeting Attendance Form (Appendix 1) to the Contact Person email prior to Tuesday, May 15, 2018.

### 5.0 ADMINISTRATIVE REQUIREMENTS

- Tenderers are asked to indicate their intentions to submit Tenders by submitting the Response Notification Form (Appendix 2) to the Contact Person email on or before Friday, June 8, 2018.
- 5.2 It is the sole responsibility of each Tenderer to check the City's website at <a href="http://vancouver.ca/doing-business/open-bids.aspx">http://vancouver.ca/doing-business/open-bids.aspx</a> regularly for addenda, amendments and questions and answers related to this ITT, which the City may issue at any time during the process, and for any reason, at its discretion.

## 6.0 CONDUCT OF ITT - INQUIRES AND CLARIFICATIONS

The City will have conduct of this ITT, and all communications are to be directed only to the Contact Person named on the cover page.

- 6.2 It is the responsibility of each Tenderer to thoroughly examine the Tender Documents and satisfy itself as to the full requirements of this ITT and their acceptability to the Tenderer.
- The City welcomes inquiries, requests for clarification or comments from registered Tenderers. All inquiries or comments to the City must be in written form only. All inquiries, requests for clarification and comments must be e-mailed to brian.brennan@vancouver.ca prior to Tuesday, June 5, 2018, and must in each case be addressed to the attention of the Contact Person. In response to inquiries, requests for clarification or comments, the City, in its sole discretion, may make amendments to this ITT or may issue questions and answers and post them on the City's website.

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 APPENDIX 1 (PART A) - INFORMATION MEETING ATTENDANCE FORM



## CITY OF VANCOUVER Supply Chain Management

Invitation to Tender No. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2

To acknowledge your intent to attend the Mandatory Information Meeting and to ensure that you receive the required information, please submit this form to the person identified below in accordance with the ITT:

Brian Brennan City of Vancouver

Email: brian.brennan@vancouver.ca

Your details:

Tenderer's Name:	
	"Tenderer"
Address:	
<u></u>	
Telephone:	Fax:
Key Contact Person:	
E-mail:	
We will attend the Mandatory Information I VANCOUVER WEST SEWER AND WATERWORKS F	Meeting for: ITT No. PS20180617, "CONSTRUCTION OF RENEWAL - PACKAGE #2".
Signature	Name of Authorized Signatory (Please print)
E-mail Address (Please print)	

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 APPENDIX 2 (PART A) - RESPONSE NOTIFICATION FORM



## CITY OF VANCOUVER Supply Chain Management

Invitation to Tender No. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2

To acknowledge your intent to submit a Tender and to ensure that you receive the required information, please submit this form to the person identified below in accordance with the ITT:

Brian Brennan City of Vancouver

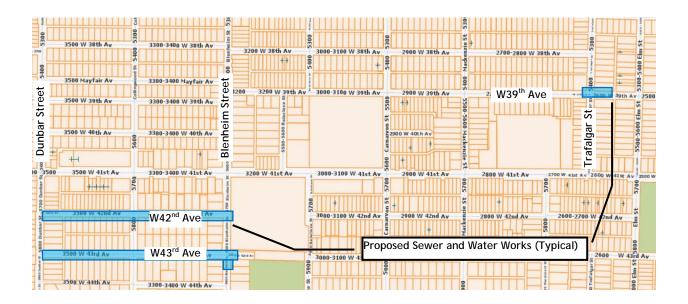
Email: brian.brennan@vancouver.ca

Your details:

Tenderer's Legal Name:	
	"Tenderer"
Address:	
Telephone:	Fax:
Key Contact Person:	
E-mail:	
We WILL □ / WILL NOT □ submit a Tender in respor VANCOUVER WEST SEWER AND WATERWORKS RENE\	
Signature	Name of Authorized Signatory (Please print)
E-mail Address (Please print)	Date

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 APPENDIX 3 (PART A) - SITE PLAN

## APPENDIX 3 SITE PLAN



## INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 APPENDIX 4 (PART A) - OWNER SUPPLIED MATERIALS AND SERVICES

#### 1.0 OWNER SUPPLIED MATERIALS AND SERVICES

### 1.1 OWNER SUPPLY OF BACKFILL MATERIALS AND RECEIPT OF EXCAVATED MATERIALS

(a) The Owner intends to receive all materials excavated by the Contractor that constitute part of the Works; the excavated materials will be received by the Owner at either its Kent Yard Facility (782-900 East Kent Ave S, Vancouver, BC) or its Vancouver Landfill (5400 72 St, Delta, BC).

The Contractor shall be required to segregate materials at source into the following key components:

- (i) General Native Material;
- (ii) Bulk Concrete & Asphalt (slab, curbs, gutters, sidewalks, etc.); and
- (iii) Asphalt Grindings (non-contaminated).

The Engineer will direct the Contractor as to the preferred disposal location dependent on material type, receipt capacity and level of segregation achieved.

- (b) The Owner intends to supply the following backfill materials required to complete the Works:
  - (i) 19 mm Minus Combined Crushed Aggregate (Mulch) Fill (City of Vancouver Item #9);
  - (ii) 75 mm Crushed Tailings (City of Vancouver Item #13);
  - (iii) Sand Fill (City of Vancouver Item #17);
  - (iv) 20 mm to 2.5 mm Clear Crushed Coarse Aggregate (Pipe Bedding) (City of Vancouver Item #15); and
  - (v) Recycled Aggregate Material (City of Vancouver Item #30).

It should be noted that the Tenderer will not be charged for:

- Disposal Fees at Kent Yard Facility or Vancouver Landfill upon delivery of excavated materials resultant from the Works; and
- Supply costs for backfill materials collected from Kent Yards Facility.

#### 1.0 DEFINITIONS AND INTERPRETATION

### 1.1 Definitions

The following capitalized terms have the meanings set out below when used in the Tender Documents, unless the context requires otherwise:

- (a) "City" means the City of Vancouver;
- (b) "Closing Time" has the meaning set out on the cover page of this ITT;
- (c) "Contract" means a contract substantially in the form of Part D Form Agreement, to be entered into between the City and a successful Tenderer;
- (d) "Contractor" means a Tenderer, the Tender of which the City has accepted, and which Tenderer has consequently entered into a Contract;
- (e) "Drawings" means the portion of the Tender Documents consisting of the graphic and pictorial representations of the Work or Work requirements;
- (f) "Engineer" means the architect, engineer or other professional consultant who will act as the City's agent for the purpose of managing and administering a Contract, who may be an employee of the City or an independent consultant engaged by the City on its behalf;
- (g) "Form of Tender" means the form of tender in Part C Form of Tender to this ITT on which Tenderers are to complete their Tenders;
- (h) "GST" means the tax payable and imposed pursuant to Part IX of the Excise Tax Act (Canada), as amended or replaced from time to time;
- (i) "Information and Privacy Legislation" includes the *Freedom of Information and Protection of Privacy Act* (British Columbia) and the regulations thereunder;
- (j) "Losses" means, in respect of any matter, all:
  - (i) direct and indirect; and
  - (ii) consequential,

claims, demands, proceedings, losses, damages, liabilities, deficiencies, costs and expenses (including without limitation, all legal and other professional fees and disbursements, interest, penalties and amounts paid in settlement, whether from a third person or otherwise);

- (k) "Notice of Award" has the meaning set out in Part C Form of Tender;
- (I) "Notice to Proceed" has the meaning set out in Part C Form of Tender;
- (m) "PST" means the provincial sales tax payable and imposed pursuant to the *Provincial Sales Tax Act* (British Columbia), as amended or replaced from time to time;
- (n) "Specifications" means the Tender Documents consisting of the written requirements and standards for products, systems, workmanship, quality, and the services necessary for the performance of the Work;

- (o) "Tender" means a tender submitted to the City in response to this ITT, or as used in Part C Form of Tender, a particular such entity;
- (p) "Tender Contract" means the contract between the City and each Tenderer governing the ITT process;
- (q) "Tender Documents" means the documents identified as such in Part A Introduction;
- (r) "Tenderer" means an entity eligible to participate in this ITT process;
- (s) "Tender Price" means the amount stipulated by the Tenderer in the space provided therefor in the Form of Tender, including all applicable taxes, which price, for greater certainty, is the Tenderer's proposed Contract Price to complete all of the Work;
- (t) "Work" means the total construction and related services required by the Tender Documents; and
- (u) "Work Site" or "Site" means the area or areas on or about the City's property where the Work is to be carried out.

All other capitalized terms used in this ITT have the meanings given to them elsewhere in the ITT.

## 1.2 Interpretation

- (a) In the Tender Documents, any reference to the masculine, the feminine or the neuter includes the others unless the context requires otherwise. Also, any reference to the singular includes the plural where appropriate.
- (b) If there is a conflict between or among (i) the Specifications and Drawings and (ii) the other Tender Documents, the other Tender Documents shall prevail over the Specifications and Drawings.
- (c) In these Tender Documents, the word "should" and the terms "is asked to" and "are asked to" are used to denote actions or Tender inclusions that, while not mandatory, are strongly recommended. In contrast, the terms "will", "shall", "must", "is to", "are to", "is required to" and "are required to" are used to denote mandatory requirements of the ITT. If a Tenderer is uncertain as to whether or not a particular action or Tender inclusion is mandatory, the Tenderer should submit an inquiry to the Contact Person.

## 2.0 SUBMISSION INSTRUCTIONS

- 2.1 Each Tenderer must complete its Tender on the Form of Tender and submit its Tender in accordance with the instructions set forth on the cover page of the ITT and elsewhere herein.
- 2.2 Any Tender received after the Closing Time may be returned unopened to the Tenderer.
- 2.3 Faxed or emailed Tenders and/or other documents will not be accepted.
- 2.4 Each Tender must be signed by an authorized signatory or authorized signatories of the Tenderer (as necessary for due execution on behalf of the Tenderer). Each Tender by a company or partnership should specify the full legal name of the legal entity submitting the Tender.

- 2.5 All blank spaces in the Form of Tender should be filled in and all schedules completed. Any failure by a Tenderer to complete the Form of Tender may result in preference being given to competing Tenderers. All prices and notations should be legibly written in a non-erasable medium. Erasures, interlineations or other corrections should be initialled by an authorized signatory of the Tenderer.
- 2.6 Subject to any alternatives or options in respect of which the City requests pricing or other information in a Schedule to the Form of Tender, Tenders are to be all inclusive and without qualification or condition.
- 2.7 The City may, at any time and for any reason, extend the Closing Time by means of a written amendment published on the City's website, as set out in Part A Introduction.
- A Tenderer that has already submitted a Tender may amend its Tender prior to the Closing Time: a) by submitting an amendment identifying a plus or minus variance to the Tenderer's Tender Price; or b) by sending in a completely new Tender, clearly indicating it replaces the previously submitted Tender. Any such revision must clearly identify the ITT number and the Closing Time. A Tender revision submitted as aforesaid shall effectively amend the Tender and the City shall only review and evaluate the Tender as amended.
- 2.9 The City will not be responsible for any cost incurred by any Tenderer in preparing a Tender.

### 3.0 BONDS

3.1 Tenders will be irrevocable and each offer made therein shall remain open for acceptance by the City for a period of ninety (90) calendar days after the Closing Time. Each Tender must be accompanied by a bid bond valid for a period of ninety (90) calendar days commencing on the Closing Time, payable to the "City of Vancouver", in the amount of ten percent (10%) of the Tender Price, and not a dollar amount, as a guarantee of the due execution of a Contract and the delivery of the performance bond and labour and material payment bond required by the Form of Tender. The forms of these bonds are to be those issued by the Canadian Construction Documents Committee as follows:

Bid Bond: CCDC 220 (latest)

Performance Bond: CCDC 221 (latest)

Labour and Material Payment Bond: CCDC 222 (latest)

- 3.2 Each Tender must be accompanied by a "Consent of Surety", substantially in the form provided as a schedule to the Form of Tender, duly completed by a surety company authorized and licensed to carry on business in British Columbia.
- 3.3 The bid bonds of unsuccessful Tenderers will be returned to them as soon as possible after the Contract is awarded and the bid bond of the Tenderer to whom the award is made will be returned upon execution of the Contract, delivery of a performance bond for 50% of the Tender Price and a labour and material payment bond for 50% of such price, commencement of the Work, and compliance with any other conditions set out in the Form of Tender. The cost of all bond premiums must be included in the Tender Price.
- 3.4 All bonds must be issued by a surety company authorized and licensed to carry on business in British Columbia.

#### 4.0 TENDER PRICE

- 4.1 Subject to any adjustment for changes to the Work, which is approved by the City in accordance with the Tender Documents or Contract Documents, the Tender Price shall be the maximum compensation owing to the Contractor for the Work and the Contractor's compensation shall cover and include all profit and all costs of supervision, labour, material, equipment, overhead, financing and all other costs and expenses whatsoever incurred in performing the Work.
- 4.2 If unit prices or other price breakdowns are requested in a schedule to the Form of Tender, such information <u>must</u> be included in the Tender. Furthermore, if such unit prices or other price breakdowns are requested in a schedule to the Form of Tender, such amounts may be used to compute interim progress payments and will be reviewed by the City in its evaluation of Tenders; therefore Tenderers should ensure that such amounts accurately reflect their costs for each item. A Tenderer may be required to justify any submitted unit price or other price breakdown.
- 4.3 If an itemized breakdown of the Tender Price is requested in a schedule to the Form of Tender, the City may delete any items in order to meet any budget limitation and award a Contract for only the remaining items to a Tenderer who is agreeable thereto.

## 5.0 ACCEPTANCE OF TENDERS

- 5.1 Despite anything to the contrary contained in the Tender Documents:
  - (a) Tenderers are notified that the lowest or any Tender need not necessarily be accepted and the City reserves the right to reject any and all Tenders at any time, or cancel the ITT process, without further explanation or to accept any Tender that is considered advantageous to the City.
  - (b) Acceptance of any offer made within a Tender is contingent on funds being approved and a contract award being made by, or pursuant to authority delegated by, Vancouver City Council and the compliance of the Tenderer with the conditions required to be satisfied upon receipt of a Notice of Award.
  - (c) Tenders which fail to conform to the Tender Documents may or may not be disqualified or rejected. The City may or may not waive any non-compliance with the Tender Documents, including any material non-compliance, irregularity or anomaly, and including any non-compliance as to the timing of delivery of anything required by the Tender Documents, and may at its sole discretion elect to retain for consideration Tenders which are non-conforming because they do not contain the content or form required by the Tender Documents or because they have not complied with the process for submission set out in this ITT.
  - (d) Where the City is of the view, in its sole discretion, that there is an ambiguity or other discrepancy which cannot be discerned or resolved from examining the contents of a Tender, then whether or not such an ambiguity or discrepancy actually exists on the face of the Tender, the City may, prior to any Contract award, solicit clarification from the Tenderer or accept clarification from the Tenderer on any aspect of the Tender. Such clarification may include the acceptance of any further documents or information which will then form part of the Tender. The soliciting or accepting of such clarification (whether or not solicited) by the City will be without any duty or obligation of the City to advise any other Tenderers or to allow them to vary their Tender Prices as a result of the acceptance of clarification from any one or more

Tenderers and the City will have no liability to any Tenderer as a result of such acceptance of clarification.

- (e) The award of any Contract will be based on an evaluation of the Tenders by the City to determine which, in the City's opinion, offer the best overall value to the City. The City expects to place the greatest emphasis on price; however, the City may take into account other factors affecting value, including those concerning quality, service or sustainability, or Tenderers' past work, reputations or experience. The City may also focus, where relevant, on the overall net impact of a Tender (or an offer therein) on the finances of the City (including both capital and operating costs). Therefore, the City may accept a Tender other than the lowest Tender.
- (f) If the City determines that all Tender Prices are too high, all Tenders may be rejected.
- (g) The City may, prior to any Contract award, agree, with the Tenderer considered to provide best value or any one or more Tenderers, to certain changes to the scope of the Work or certain changes to Contract conditions, in each case without having any duty or obligation to advise any other Tenderers or to allow them to vary their Tender Prices as a result of such changes, and the City will have no liability to any other Tenderer as a result of such changes. However, each Tender must be a tender in respect of the Work set forth herein, to complete that Work, under an agreement in the form of the Form of Agreement included as Part D of the ITT, and not propose variations thereto.
- (h) Each Tenderer acknowledges and agrees that the City will not be responsible for Losses incurred by the Tenderer as a result of or arising out of submitting a Tender, or due to the City's acceptance or non-acceptance of its Tender, or any part thereof, or any breach by the City of the Tender Contract between the City and the Tenderer, or arising out of any Contract award not being made in accordance with the express or implied terms of the Tender Documents.
- (i) The City may award a Contract on the basis of policies and preferences not stated in the Tender Documents or otherwise than as stated in the Tender Documents.
- (j) Prior to any Contract award, a Tenderer may be required to demonstrate financial stability. Should the City so request, a Tenderer may be required to provide annual financial reports or a set of financial statements prepared by an accountant.
- (k) City guidelines or policies that may be applicable to the ITT will not give rise to legal rights on the part of any Tenderer, Contractor, subcontractor, supplier, or other person as against the City and will in no case create any liability on the part of the City. For certainty, the City's Procurement Policy, as amended or replaced from time to time, is now agreed to be an internal guideline document and creates no legal rights or obligations with respect to this ITT.
- (I) The City may reject any Tender by a Tenderer that has engaged in collusion with another Tenderer or otherwise attempted to influence the outcome of the ITT other than through the submission of its Tender.
- (m) The City may elect, in its sole discretion, to accept for consideration Tenders that contain conditions or qualifications that are in the nature of corrections of typos or resolutions of internal inconsistencies in this ITT or the Form of Agreement in Part D, or that represent immaterial changes to the Form of Agreement in Part D and do not consist of changes of substance or changes to allocations of risk, or with respect to the scope of any Work, that are for the avoidance of doubt only and do not suggest any

deviation from the requirements of the ITT. This Section 5.1(m) is a reservation of rights for the benefit of the City and no Tenderer may rely on this paragraph to qualify its Tender.

### 6.0 AWARD OF CONTRACT

- Award of a Contract will be subject to approval by, or pursuant to authority delegated by, Vancouver City Council and the Tenderer's compliance with the conditions required to be met upon receipt of the Notice of Award.
- Any successful Tenderer will become a Contractor and will be required to sign a Contract with the City, subject to any amendments approved by the City in writing.

### 7.0 EXAMINATION OF TENDER DOCUMENTS

- 7.1 Each Tenderer should examine the Tender Documents and must also satisfy itself of the extent of the Work. Each Tenderer must make its own estimate of the facilities and difficulties attending the performance and the completion of the Work.
- 7.2 No allowance will be made on behalf of a Contractor for any error, omission or negligence on the Contractor's part or for non-compliance with the requirements of the foregoing clause 7.1.

### 8.0 SITE EXAMINATION/PRE-SUBMISSION DUE DILIGENCE BY TENDERER

- 8.1 Tenderers should make a careful examination of the Work Site and investigate and satisfy themselves at their own risk and expense as to all matters relating to the nature and extent of the Work, the means of access to the Work Site, the extent of required coordination with public use of adjacent areas, and any and all matters which are referred to in the Specifications and Drawings and other Tender Documents, or which are necessary for the full and proper completion of any Work or are required by the conditions under which it must be performed. No allowance will be made subsequently for any error, negligence, interpretation, or misinterpretation on a Contractor's part.
- 8.2 The City and the Engineer do not make any representations or warranties concerning the completeness or accuracy of Work Site and geotechnical information (if any) provided in or with the Tender Documents, and each Tenderer must evaluate such information as part of its overall assessment of actual Work Site conditions.
- 8.3 If any Tenderer wishes to evaluate any Work Site conditions, and, for that purpose, requires access or documents from the City beyond the access and documents already provided for in this ITT, the City encourages the Tenderer to submit a written request to the City as far in advance of the Closing Time as is possible. The City will then consider whether or not to facilitate the request. In response to such a request, the City may elect to, itself, undertake a particular study and distribute the results to all Tenderers.

## 9.0 INTERPRETATION AND CLARIFICATIONS

9.1 If any Tenderer is in doubt as to the correct interpretation of any part of the Specifications, Drawings, or other Tender Documents, the Tenderer should request an interpretation of the same from the City by the time stated in Part A - Introduction, Section 6.3. In the absence of such a request, the Tenderer's Tender will be presumed to be based upon the interpretation that may be subsequently given in accordance with the Contract Documents, after award of a Contract.

9.2 Prior to the Closing Time, requests for clarification of the Specifications, Drawings, or other Tender Documents may be answered in writing by the City and sent to all prospective Tenderers who have submitted a Response Notification Form on or before the indicated deadline. The City is not responsible for any other explanations or interpretations of the Specifications, Drawings or other Tender Documents.

### 10.0 PRODUCT APPROVAL

- 10.1 Wherever any material, machinery, equipment or fixture (any "Product") is specified or shown in the Tender Documents by reference to a proprietary item, product or model number, catalogue number, manufacturer or trade name or similar reference, each Tenderer obligates itself to submit its Tender and, if applicable, accept award of a Contract based upon the use of such Product. Use of any such reference in the Tender Documents is intended to establish the measure of quality which the City (or its Engineer) has determined to be requisite and necessary for the Work. Where two or more Products are shown or specified, the Contractor has the option of which to use.
- 10.2 For approval of Products other than those specified, a Tenderer should submit a request in writing to the City at least five business days prior to the Closing Time. Requests must clearly define and describe the Product for which approval is requested. Requests should be accompanied by manufacturer's literature, specifications, drawings, cuts, performance data or other information necessary to completely describe the items. Approval by the City will only be in the form of an addendum to the Specifications issued by the City.
- 10.3 Approvals of Products, as noted in clause 10.2 above, shall only be deemed effective insofar as the Products conform to the Specifications.

#### 11.0 INSURANCE

- 11.1 Each Tenderer should ensure that it can maintain the insurance described in the Form of Agreement (Part D).
- 11.2 The Tenderer should complete and submit the "Certificate of Existing Insurance" attached as a Schedule to the Form of Tender, together with the "Undertaking of Insurance" attached as a Schedule to the Form of Tender.
- Following Contract award, a successful Tenderer will be required to complete a "Certificate of Insurance" for the Work, a copy of which is attached as a schedule to the Form of Tender.

### 12.0 WORKSAFEBC

12.1 The Tenderer should ensure that it can comply with all WorkSafeBC requirements, as described in the Form of Agreement (Part D).

### 13.0 LABOUR RATES AND EQUIPMENT

Tenderers must provide, if requested in a schedule to the Form of Tender, the force account labour and equipment rates setting out the all-inclusive hourly rates for all applicable types of equipment as well as the all-inclusive hourly rates for all applicable categories of labour, which rates will then apply pursuant to any Contract.

#### 14.0 LISTS OF SUBCONTRACTORS AND SUPPLIERS

14.1 Tenderers should provide, if requested in a schedule to the Form of Tender, lists of proposed subcontractors and suppliers, specifying the name and address of, and the portion of the Work

to be completed by, or the equipment or materials to be supplied by, each proposed subcontractor or supplier.

The City reserves the right to object to any of the proposed subcontractors or suppliers listed in a Tender. If the City objects to a listed subcontractor or supplier, then the City will permit a Tenderer to propose a substitute subcontractor or supplier acceptable to the City. A Tenderer will not be required to make such a substitution and, if the City objects to a listed subcontractor or supplier, the Tenderer may, rather than propose a substitute subcontractor or supplier, consider its Tender rejected by the City and, by written notice, withdraw its tender. The City shall, in that event, return the Tenderer's bid security.

#### 15.0 TAXES AND FEES

- 15.1 The successful Tenderer will be required to obtain and pay for any applicable municipal, provincial and federal permits and licences necessary for the proper completion of the Work. The City will not be liable in any manner for the same, and the successful Tenderer agrees to indemnify and save the City harmless from and against all claims and Losses in relation to obtaining and paying for any applicable municipal, provincial and federal permits and licences necessary for the proper completion of the Work.
- 15.2 Each Tenderer's Tender Price (and each other price offered by the Tenderer in its Tender, if applicable) must, unless otherwise expressly stated, be inclusive of all applicable municipal, provincial, federal and other taxes, and all customs and excise duties and other assessments and charges, including sales taxes assessed upon the sale of goods and services to the City under the Contract, and the successful Tenderer agrees to indemnify and save the City harmless from and against all claims which shall be made with respect thereto.

### 16.0 NON-RESIDENT WITHHOLDING TAX

16.1 Tenderers are advised that, if the Contractor is not a resident of Canada, federal tax legislation may require that a certain percentage of any Contract Price otherwise payable to the Contractor be withheld by the City and remitted to the Receiver-General for Canada. The percentage required to be withheld and remitted varies depending on, among other things, the country of residence, the provisions of any applicable tax treaties and the nature of the payment. Non-resident Tenderers may contact the Vancouver office of the Canada Revenue Agency for further details. Under any Contract, any and all money so withheld and remitted shall be treated as a payment to the Contractor against the Contract Price.

### 17.0 NO CLAIM AGAINST THE CITY

- 17.1 The Tenderer acknowledges and agrees that the City will not be responsible for any Losses incurred by the Tenderer, including, without limiting the generality of the foregoing, any Losses incurred by the Tenderer directly or indirectly caused by any act or omission of the City or breach of any agreement or duty by the City, express or implied, and by submitting a Tender each Tenderer shall be deemed to have agreed that it has no claim whatsoever.
- 17.2 The Tenderer now indemnifies and will protect and save the City and any of its employees, advisors or representatives (including the Engineer) harmless from and against all Losses, in respect of any claim or threatened claim by any of its subcontractors, or materials or equipment suppliers alleging or pleading:
  - (a) a breach of the Tender Contract by the City or any of its employees, advisors or representatives (including the Engineer);

- (b) an unintentional tort, of the City or any of its employees, advisors or representatives (including the Engineer), occurring in the course of conducting this ITT; or
- (c) liability on any other basis related to the ITT or the Tender Contract.

### 18.0 DISPUTE RESOLUTION

- Any dispute relating in any manner to this ITT, except only disputes arising between the City and any Tenderer to whom the City has made an award of a Contract, which arise under such Contract, will be resolved by arbitration in accordance with the *Commercial Arbitration Act* (British Columbia), amended as follows:
  - (a) The arbitrator will be selected by the City's Director Supply Chain Management;
  - (b) Sections 17.1 and 17.2 above will:
    - (i) bind the arbitrator, the Tenderer and the City; and
    - (ii) survive any and all awards made by the arbitrator; and
  - (c) The Tenderer will bear all costs of the arbitration.

### 19.0 CONFIDENTIALITY AND PRIVACY

- 19.1 Each Tender, once submitted to the City, will be held in accordance with the City's role as a public body required under Information and Privacy Legislation to protect or disclose certain types of records according to certain statutory rules. Each Tender, upon submission to the City, will be received and held in confidence by the City, unless and to the extent that it is or must be disclosed pursuant to Information and Privacy Legislation or other applicable legal requirements, and except that the City may publicly disclose information about or from Tenders, including without limitation names and prices, in the course of publicly reporting to the Vancouver City Council about the ITT.
- 19.2 If unsuccessful, a Tenderer, at the City's request, shall destroy or return all copies and originals (in any format or medium) of the Tender Documents.

## 20.0 RELEASE OF INFORMATION RESTRICTED

20.1 The release of information about Tenders is restricted. Tenderers may attend the opening and registering of Tenders (referred to on the cover page of this ITT) in order to obtain information concerning the names of the other Tenderers who have submitted a Tender and the Tender Price shown on each Form of Tender. However, no other information is anticipated to be disclosed by the City.

Tender of:	
	Legal Name of Person, Partnership or Corporation (the "Tenderer")
Business Address:	
Postal or Zip Code:	
Cheques Payable to/Remit to Address:	
Postal or Zip Code:	
Key Contact Person:	
Telephone No.:	Fax No.:
E-mail:	
Tax Registration Numbers (as applicable):	
Dun & Bradstreet Number (if available):	WorkSafeBC Account Number:
City of Vancouver Business License Number (or, if available, Metro West Inter- municipal Business License Number):	Date, Jurisdiction and Form of Organization (as applicable):

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Name of Tenderer	Initials of Signing Officer

#### 1.0 TENDER PRICE AND SCHEDULE

Having carefully read and examined the Tender Documents, and having agreed to the terms and conditions set out in Parts A and B of the ITT, the undersigned Tenderer (for purposes of this Tender, the "Tenderer") offers to complete the Work and to furnish all plant, tools, equipment, labour, products, material and supervision necessary therefor, and to enter into an agreement in the form of the Form of Agreement set forth as Part D of the ITT to execute the Work, for the Tender Price specified below.

ITT NO. PS20180617		
The Tender Price (including all costs, taxes and fees)(as per Schedule A), is dollars		
and cents (\$	)	
The Tender Price <u>includes</u> all PST and GST.		

The Tenderer's offer to complete all of the Work is an offer made according to the following schedule:

- (a) The Work will begin by August 21, 2018, subject to the City issuing a Notice to Proceed.
- (b) Substantial performance of the Work will occur by November 30, 2018.
- (c) Total performance of the Work will occur by January 7, 2019.

## 2.0 ELECTRONIC PAYMENTS ACKNOWLEDGEMENT

If awarded a contract, the Tenderer agrees that all payments to be made by the City will be by electronic funds transfer, and the Tenderer will provide the City with the necessary banking information to facilitate this process.

### 3.0 IRREVOCABILITY; NOTICE OF AWARD

The Tenderer agrees that this Tender will be irrevocable and open for acceptance by the City for a period of ninety (90) calendar days commencing on the Closing Time, even if the Tender of another Tenderer is accepted by the City. If within this period the City delivers a written notice by which the City accepts the Tender (a "Notice of Award"), the Tenderer will, within ten (10) Working Days of the receipt of the Notice of Award, deliver to the City:

- (a) a performance bond and a labour and material payment bond, each in the amount of fifty percent (50%) of the Tender Price, issued by a surety licensed to carry on the business of suretyship in the province of British Columbia, and in a form acceptable to the City;
- (b) a detailed resource-loaded construction schedule for the Work:
  - (i) completed using Microsoft Project 2010 or such other scheduling software as may be approved by the Engineer;

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Name of Tenderer	Initials of Signing Officer(s)

- (ii) prepared in accordance with the full requirements of the City's construction specifications publication: City of Vancouver Construction Specifications, Section 01310 "Construction Schedule";
- (iii) consistent with the preliminary construction schedule included in the Form of Tender;
- (iv) providing a detailed breakdown of the Work by material components thereof and milestones therein, including include a line item for each major activity in and component of the Work with details of each with reference to corresponding Work Site location and of the dates planned for commencement and completion of each; and
- (v) demonstrates that the Work will be performed by the Total Performance date set out in the Tender;
- (c) a detailed Traffic Management Plan for approval by the City's Traffic & Data Management group and prepared in accordance with the latest version of the B.C. Ministry of Transportation's *Traffic and Control Manual for Work on Roadways* and, without limitation, addressing vehicular and pedestrian movement, public transit requirements, bike routes and safety and public access in and about the Work Site, with details regarding methods, signage and materials to be used therefor;
- (d) a detailed Work Site-specific Health, Safety & Environmental Management Plan, for the Engineer's approval, prepared in accordance with all applicable WorkSafeBC requirements and addresses, without limitation, Work Site layout, hazard identification, risk management, change management, objectives and targets, incident reporting, training requirements, record keeping, project specific safe work procedures and includes a job hazard assessment template and a safety/toolbox meeting schedule;
- (e) an updated Methodology Statement (draft to be submitted with Tender (see Schedule J to Form of Tender)), for the Engineer's approval, detailing the Tenderer's proposed methodology, equipment and Work sequencing. The methodology statement shall detail how and when tie-ins will occur, prerequisites for tie-ins and commissioning;
- (f) a site specific Quality Management Plan, for the Engineer's approval, including checklists and non-conformance reports and all relevant Inspection Test Plans (ITP) addressing, without limitation and as appropriate, fabrication, construction, inspection and test activities to be implemented during production, construction, installation and commissioning;
- (g) a WorkSafeBC number and a "clearance letter" confirming that the Tenderer is in WorkSafeBC compliance;
- (h) banking details to support payments by Electronic Funds Transfer (EFT); and
- (i) a completed and signed Certificate of Insurance (in the form attached as a schedule to this Form of Tender) indicating that all of the insurance coverage required by the Contract is in place.

## 4.0 NOTICE TO PROCEED

The Tenderer agrees that upon the City's receipt and acceptance (in the City's discretion) of the required submissions listed above, the Tenderer will, within two (2) Working Days, execute

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and return to the City the Contract and the other Contract Documents requiring execution (in each case, as prepared by the City for execution) and, upon the City's receipt and acceptance thereof, the City may deliver to the Tenderer a "Notice to Proceed", and the Tenderer will:

- (a) commence the relevant Work within two (2) Working Days of the receipt of the Notice to Proceed or such longer time as may be otherwise specified in the Notice to Proceed; and
- (b) issue, post, and copy the City on the "Notice of Project" as and when required under section 20.2 of the *Occupational Health & Safety Regulation* (BC Regulation 296/97).

## 5.0 CONDITIONS

- (a) The Tenderer agrees that if the Tenderer receives a Notice of Award or a Notice to Proceed and fails or refuses to comply with the requirements stated in the foregoing clause 3.0 or clause 4.0, as the case may be, then such failure or refusal will be deemed to be a repudiation of the Tender Contract and refusal to enter into the relevant Contract and the City may, on written notice to the Tenderer, award the Contract to another party. It is further agreed that, as full compensation on account of damages suffered by the City because of such failure or refusal, the bid security shall be forfeited to the City in the amount equal to the lesser of:
  - (i) the face value of the bid security; and
  - (ii) the amount by which the Tender Price is less than the amount for which the City contracts with another party to perform the Work.
- (b) The lowest or any submitted tender will not necessarily be accepted. The City reserves the right to reject this Tender at any time without further explanation or to accept any Tender considered advantageous to the City.
- (c) The schedules attached to this Form of Tender form an integral part of the same.

### 6.0 ADDENDA, AMENDMENTS AND QUESTIONS AND ANSWERS

The Tenderer acknowledges receipt of the following addenda, amendments and questions and answers to the Tender Documents:

Addendum No.	
Amendment No.	
Questions and Answers No.	
2040	

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	The Tenderer agrees that it thorou contained therein.	ughly understands and accepts the terms and conditions
7.0	CERTIFICATION	
	The Tenderer represents and warrant Documents.	ts that this Tender complies in all respects with the Tender
8.0	LABOUR	
	The above stated price is based union/non-union labour. (Delete "un	on the Work under the Contract being performed by nion" or "non-union" as applicable).
9.0	CONTRACT TERMS IN THE ITT	
	Without limitation, the Tenderer e conditions set forth in Part A and Par	expressly agrees with the City to all of the terms and t B of the ITT and is bound thereby.
SIGNE autho	ED on behalf of the Tenderer this orized signatory or signatories of the T	day of20 by the duly renderer:
Per:_		
Name	e and Title:	
Per:_		
Name	e and Title:	
corpo	Tenderer has a corporate seal, the prate seal should be applied in the below:	If the Tenderer is an individual, a proprietorship or a partnership, the above signature(s) should be witnessed:
		Witness signature
		Witness name
		Witness address
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Name	of Tenderer	Initials of Signing Officer(s)

#### SCHEDULE "A"

### SCHEDULE OF QUANTITIES AND PRICES

Each Tenderer must complete the Schedule A Excel pricing spreadsheet which can be found at the FTP site described in Section 3.2 of Part A to the ITT and, as completed, include it with the Tender as Schedule A thereto by way of one (1) hard copy and one (1) electronic copy saved on a USB stick.

### TENDER PRICE AND SCHEDULE - REQUIRED PRICING METHODOLOGY

Tenderers shall complete Schedules A-1, A-2, A-3 and A-4 on the basis that:

- all excavated materials, excluding Hydro related excavated materials, are to be taken to the City's Kent Yards facility for disposal and that no disposal fees will be charged therefor;
- the City will supply at its Kent Yards without charge all backfill materials required for the Work listed in APPENDIX 4 (PART A) OWNER SUPPLIED MATERIALS AND SERVICES;
- Tenderer pricing should include all transport costs for the removal from the Work Site and the disposal of all Work related excavated materials and delivery to the Work Site of Work related backfill materials.

Tenderers should note that at times while the Work is being carried out the City may, with not less than 3 days prior notice each time, require that excavated materials be taken to and disposed of at, as an alternate disposal facility, the Vancouver Landfill located in Delta, BC. For that reason, Tenders shall include in Schedule A-2 unit pricing rates for the transport of Work related excavated materials to the Vancouver Landfill.

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Name of Tenderer

Initials of Signing Officer(s)

Each of the undersign reviewed the complet satisfied that all prici respects with all other part of the Tender on b	ed Excel pricing numbers in Tender docume	ng spreadsheet s cluded therein a ents, and further	ubmitted as Sche are accurate and	edule A to the Ter correct and consis	nder and is stent in all
SIGNED this Tenderer:	_ day of	_2018 by the d	uly authorized si	gnatory or signato	ries of the
Per:			_		
Name and Title:			_		
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Name of Tenderer Initials of Signing Officer(s)

#### SCHEDULE "B"

## PRELIMINARY CONSTRUCTION SCHEDULE

The Work is expected to begin by August 21, 2018 and substantial performance is targeted for November 30, 2018.

In addition to a completed copy of the table below, the Tenderer should submit with the Tender a Preliminary Construction Schedule, in the form of a simple bar chart, which clearly identifies the key activities associated with the Work and details the commencement and completion dates of each and include the project commencement dates listed above.

The Tenderer should include, at a minimum, the activities identified in the table below.

	TABLE 1 - KEY ACTIVI	TIES & PROJECT MILESTONI	ES
	Key Activity / Milestone	Date of Commencement	Date of Completion
Con	nmencement of the Work		
Sew	er Works - W 39th Avenue : Trafalgar to Lane	East of Trafalgar - 0+70 to	1+70
•	Storm / Sanitary Main & Service Connections		
•	Street Restoration & Pavement Construction		
Sew	ver Works - W42nd Avenue: Collingwood to Dui	nbar - 0+80 to 2+90	
•	Storm / Sanitary Main & Service Connections		I
•	Street Restoration & Pavement Construction		
Sew	er Works - Blenheim Street - W44th to W43rd	- 0+90 to 1+30	.*
•	Storm / Sanitary Main & Service Connections		
•	Street Restoration & Pavement Construction		
Sew	ver Works - W43rd Avenue: Blenheim to Colling	gwood - 1+90 to 4+20	· <del>·</del>
•	Storm / Sanitary Main & Service Connections		
•	Street Restoration & Pavement Construction		
Sew	ver Works - W43rd Avenue: Collingwood to Dur	nbar - 4+20 to 6+25	
•	Storm / Sanitary Main & Service Connections		
•	Street Restoration & Pavement Construction		

Water Works - W42nd Avenue: Dunbar to Collingv	vood
Watermain & Service Connections	
Street Restoration & Pavement Construction	
Water Works - W42nd Avenue: Collingwood to Ble	enheim
Watermain & Service Connections	
Street Restoration & Pavement Construction	
Water Works - W43nd Avenue: Collingwood to Tie	-In East of Blenheim

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Watermain & Service Connections	
Street Restoration & Pavement Construction	
Substantial Performance of the Work	
Total Performance of the Work	

Additional pages may be attached to this page. Each such additional page is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE B", and is to be signed by the Tenderer.

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## SCHEDULE "C"

## SUBCONTRACTORS AND SUPPLIERS

## 1.0 SUBCONTRACTORS

The Tenderer intends to use the following subcontractors for the portions of the Work identified below. (All subcontractors who are proposed to perform any portion of the Work should be listed.)

Subcontractor	Address	Type of Work

Additional pages may be attached to this page. Each such additional page is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE C", and is to be signed by the Tenderer.

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## 2.0 SUPPLIERS

The Tenderer should list here all major suppliers and manufacturers and the corresponding products and materials it intends to use for the Work.

SUPPLIER	MANUFACTURER	ADDRESS	ITEM

Additional pages may be attached to this page. Each such additional page is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE C", and is to be signed by the Tenderer.

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Name of Tenderer	Initials of Signing Officer

## SCHEDULE "D"

## TENDERER'S EXPERIENCE WITH RELATED WORK

Tenderers should provide information demonstrating that they and their proposed subcontractors have experience required for the Work. Each Tenderer should provide in Schedule D to the Tender, for itself and each of its proposed subcontractors, detailed information regarding at least three projects similar in scope and size to the Work in which it has participated in a way similar to the role proposed here, including the following information:

Description of Project:			
Location of Project:			
Contract Value:	\$		(Cdn. Dollars)
Start and Completion Dates:			
Completed on Schedule?	Yes	No	(Circle Correct Response)
Name of Contract :			
Name of Project Reference:			
Current Telephone Number a	nd E-ma	il of Pr	oject Reference:
Names of Key Personnel and S	Subcont	ractors	:
			age. Each such additional page is to be clearly marked
"ITT No. PS20180617, FORM OF	TENDE	R - SCHI	EDULE D", and is to be signed by the Tenderer.
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Name of Tenderer			Initials of Signing Officer

#### SCHEDULE "E"

## FORCE ACCOUNT LABOUR, EQUIPMENT, MATERIAL & SUBCONTRACTOR RATES

Tenderers shall complete the following Tables 1 and 2 setting out the all-inclusive hourly rates for all equipment and labour required for the Work, which rates will then apply as force account rates under any Contract.

Small tool rates, including rental rates, should not be included in Table 2 - Equipment Rates, but rather should be included in Table 1 - Labour Rates as small tool allowances. Small tools are tools and equipment worth \$2,000 or less when new.

## **TABLE 1 - LABOUR RATES**

Labour Classification	Regular Rate (/hr)	Overtime Rate (/hr)	
	\$	\$	
	\$	\$	
	\$	\$	
	\$	\$	
	\$	\$	
	\$	\$	

## **TABLE 2 - EQUIPMENT RATES**

Item	Equipment Description	Hourly Rate	Standby Rate
		\$	\$
		\$	\$
		\$	\$
		\$	\$
		\$	\$

Additional pages may be attached to this page. Each such additional page is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE E", and is to be signed by the Tenderer.

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Name of Tenderer	Initials of Signing Officer

## SCHEDULE "F"

## LABOUR FORCE & WORKING HOURS

Tenderers should complete the following tables setting out the estimated labour force for manual direct man-hours and manual indirect man-hours required to complete the Work inclusive of subcontractor employees.

TABLE 1 - ESTIMATED LABOUR FORCE FOR MANUAL DIRECT MAN-HOURS AND MANUAL INDIRECT MAN-HOURS

Classification	Contract or	Number of Labour	Period of Employment		
Sub-contract Force	From Week Number Following Award of Contract	To Week Number Following Award of Contract			

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Name of Tenderer	Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "F" (PART C - FORM OF TENDER)

#### **TABLE 2 - WORKING HOURS**

The Tenderer should complete the following table setting out the intended normal working hours. The Tenderer should make due consideration to the requirement to comply at all times with all applicable requirements of the City of Vancouver's Noise By-law.

	From (AM)	To (PM)	Number of Working Hours (After deduction of breaks)
Monday		1	
Tuesday			
Wednesday			
Thursday			
Friday			
Saturday			
Sunday			
Total Num	ber of Working Ho	urs per Week =	

It should be noted that the Owner's employees work between the hours of 7:30 a.m. and 3:30 p.m. on all Working Days, except those when Vancouver City Hall is closed. The Contractor shall not expect any work to be performed by the Owner's staff/crews or contracted consultants outside these hours except by special arrangement agreed to by the Engineer or in case of emergency.

Additional pages may be attached to this page. Each such additional page is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE F", and is to be signed by the Tenderer.

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Name of Tenderer	
name of Tenderer	Initials of Signing Officer

### INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "G" (PART C - FORM OF TENDER)

May 10, 2018		Page FT16
Intentionally deleted.	CASH FLOW FORECAST	
	SCHEDULE "G"	

Name of Tenderer

Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "H" (PART C - FORM OF TENDER)

### SCHEDULE "H"

### PROPOSED KEY PERSONNEL

The Tenderers should provide details of its key personnel, in the table below, proposed to facilitate and delivery the Work.

### TABLE 1 - PROPOSED KEY PERSONNEL

Name	Current Position and Responsibilities (Including the Nature of any Supervisory or Management Responsibilities)	Key Duties Under This Contract	Relevant Qualifications and Training	Length of Service in Current Organisation	Experience in Current or Equivalent Position (Years)
		Project Superintendent			
		Project Manager			
		Construction Safety Officer			
		Foreman			

Additional pages may be attached to this page. Each such additional page is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE H", and is to be signed by the Tenderer.

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Name of Tenderer	Initials of Signing Officer
Name of Temperer	ilitiais of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "I" (PART C - FORM OF TENDER)

### SCHEDULE "I"

### STATEMENT OF MAJOR PLANT & EQUIPMENT

The Tenderers should provide a statement of its major items of Constructional Plant, in the table below, necessary for the performance of the Work.

### TABLE 1 - STATEMENT OF MAJOR PLANT & EQUIPMENT

Plant Description	Make, Model No., HP or Size	Approximate Age of Machine at Date of Award	Current Location	Current Ownership

Additional pages may be attached to this page. Each such additional page is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE I", and is to be signed by the Tenderer.

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Name of Tenderer	Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "J" (PART C - FORM OF TENDER)

#### SCHEDULE "J"

### METHODOLOGY STATEMENT

The Tenderer should submit a draft contractor's methodology statement that provides details of the methodologies and procedures the Tenderer proposes to use for the Work, with reference in particular to the key activities of the Work, and which is consistent with the proposed sequencing provided in the Preliminary Construction Schedule.

The draft contractor's methodology is to be clearly marked "ITT No. PS20180617, FORM OF TENDER - SCHEDULE J", and is to be signed by the Tenderer and included as an attachment to this Schedule.

The Tenderer should note that upon receipt of a Notice of Award the Tenderer will be required to update the Methodology Statement and re-submit as updated for approval by the Engineer.

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Name of Tenderer	

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "K" (PART C - FORM OF TENDER)

### SCHEDULE "K"

### FORM OF CONSENT OF SURETY

PROJECT: <u>INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2</u>

The Common Seal of was hereto affixed in the presence of:	
May 10, 2018  Name of Tenderer  Initia	Page FT20 als of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "L" (PART C - FORM OF TENDER)

### SCHEDULE "L"

## SUSTAINABILITY

1.	Please list any products or services contemplated in the Tender that are toxic or hazardous to
	the environment or humans and complete the following table in relation thereto.

Item	Description of Toxin/Hazard	Substantiation for Use	Mitigation strategy to reduce the effect of the Toxin/Hazard				

2.	Please identify t	the	Tenderer's	stand ard	practices	for	disposal	of	obsolete (	or	expired	products
	or equipment.											

Item	Type of Product/Equipment	Disposal Method		

3. Please identify the Tenderer's current or proposed solutions to address and reduce carbon emissions.

Item	Carbon Emission Risk	Solution to Reduce Carbon Emissions

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Name of Tenderer	Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "M" (PART C - FORM OF TENDER)

### SCHEDULE "M"

## CERTIFICATE OF INSURANCE

(TO BE COMPLETED IF AWARDED THE CONTRACT)

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Name of Tenderer Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "M" (PART C - FORM OF TENDER)



May 10, 2018

Name of Tenderer

### CERTIFICATE OF INSURANCE Project Specific Insurance

Schedule 7

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Initials of Signing Officer

Section 7 a) - City staff to select the required # of days Written Notice before sending out for completion Section 2 through 7 - to be completed and executed by the Insurer or its Authorized Representative THIS CERTIFICATE IS ISSUED TO: <u>City of Vancouver, 453 W 12<sup>th</sup> Avenue, Vancouver, BC, V5Y 1V4</u>
and certifies that the insurance policies as listed herein have been issued to the Named Insured(s) and are in full force and effect as of THIS CERTIFICATE IS ISSUED TO:\_ the effective date of the agreement described below. NAMED INSURED: [must be the same name as the Permittee/Licensee or Party(ies) to Contract and is/are either an individual(s) or a incorporated company(ies)] MAILING ADDRESS: LOCATION ADDRESS: DESCRIPTION OF PROJECT/CONTRACT: PS20180617 Construction of Sewer and Waterworks Renewal - Vancouver West Package No. 2 PROPERTY INSURANCE - ALL RISK COURSE OF CONSTRUCTION (Builder's Risk Form) /INSTALLATION FLOATER Providing All Risk Coverage including Earthquake and Flood up to full replacement cost of the Project/Contract described above Naming the City of Vancouver as an Insured and containing a Loss Payee Clause in favour of the City of Vancouver stating that proceeds of any claims against the Insurer be made payable to City of Vancouver as its interest may appear INSURED VALUES: (Full Replacement Cost value of Project) INSURER: TYPE OF COVERAGE: \_\_ Limit: \$ POLICY NUMBER: Deductible Per Loss: POLICY PERIOD: From WRAP UP LIABILITY INSURANCE (Occurrence Form) in the Joint Named Insureds of the Owner, City of Vancouver, Architects, Engineers, Consultants, Sub-consultants, Contractors, and Subcontractors, including their officials, officers, employees, agents, and all participants engaged in or connected with the above Project/Contract, including the following extensions: Check Additional Extensions where applicable and included: √ Personal Injury Cross Liability or Severability of Interest ☐ Work below ground level over 3 metres Employees as Additional Insureds Excavation, shoring, underpinning, pile driving or caisson Blanket Contractual Liability ☐ Demolition, removal or weakening of support of property Broad Form Products and Completed Operations ■ Blasting Broad Form Property Damage including Loss of Use Operation of hoist or attached machinery √ Non-Owned Auto Liability 24 months Completed Operations 36 months Completed Operations INSURER:\_ POLICYNUMBER: \_\_ POLICY PERIOD: From \_\_ LIMITS OF LIABILITY: (Bodily Injury and Property Damage Inclusive): Per Per Occurrence:\$ \_\_\_\_Aggregate:\$ \_\_ Deductible Occurrence:\$ AUTOMOBILE LIABILITY INSURANCE for operation of owned and/or leased vehicles LIMITS OF LIABILITY: INSURER: POLICY NUMBER: Combined Single Limit: \$ POLICY PERIOD: From \_ If vehicles are insured by ICBC, complete and provide Form APV-47. to 6. OTHER INSURANCE (e.g. Contractors' Equipment) - Please specify Name of Insurer(s), Policy Number, Policy Period, and Limit **POLICY PROVISIONS:** Where required by the governing contract, agreement, lease, permit or license, it is understood and agreed that: THIRTY (30) days written notice of cancellation or material change resulting in reduction of coverage with respect to any of the policies listed herein, either in part or in whole, will be given by the Insurer(s) to the Holder of this Certificate; the exception is cancellation for non-payment of premiums in which case the applicable statutory conditions will apply; All property insurance policies must contain a provision in which the Insurer(s), upon payment of a claim will waive all rights of subrogation against the City of Vancouver, its officials, officers, employees or agents;

The insurance policy (policies) listed herein shall be primary with respect to the above described project/contract. Any insurance or self-insurance maintained by the City of Vancouver shall be in excess of this insurance and shall not contribute to it. SIGNED BY THE INSURER OR ITS AUTHORIZED REPRESENTATIVE Dated: PRINT NAME OF INSURER OR ITS AUTHORIZED REPRESENTATIVE, ADDRESS AND PHONE NUMBER

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "N" (PART C - FORM OF TENDER)

### SCHEDULE "N"

## CERTIFICATE OF EXISTING INSURANCE

(TO BE COMPLETED AND SUBMITTED WITH TENDER)

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Name of Tenderer

Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "N" (PART C - FORM OF TENDER)



### CERTIFICATE OF INSURANCE Project Specific Insurance

Schedule N

Section 7 a) - City staff to select the required # of days Written Notice before sending out for completion Section 2 through 7 - to be completed and executed by the Insurer or its Authorized Representative THIS CERTIFICATE IS ISSUED TO:\_ City of Vancouver, 453 W 12th Avenue, Vancouver, BC, V5Y 1V4 and certifies that the insurance policies as listed herein have been issued to the Named Insured(s) and are in full force and effect as of the effective date of the agreement described below. NAMED INSURED: [must be the same name as the Permittee/Licensee or Party(ies) to Contract and is/are either an individual(s) or a incorporated company(ies)] MAILING ADDRESS: LOCATION ADDRESS: DESCRIPTION OF PROJECT/CONTRACT: PS20180617 Construction of Sewer and Waterworks Renewal - Vancouver West Package No. 2 PROPERTY INSURANCE - ALL RISK COURSE OF CONSTRUCTION (Builder's Risk Form) /INSTALLATION FLOATER Providing All Risk Coverage including Earthquake and Flood up to full replacement cost of the Project/Contract described above Naming the City of Vancouver as an Insured and containing a Loss Payee Clause in favour of the City of Vancouver stating that proceeds of any claims against the Insurer be made payable to City of Vancouver as its interest may appear INSURED VALUES: (Full Replacement Cost value of Project) INSURER: TYPE OF COVERAGE: Limit: POLICY NUMBER: Deductible Per Loss: POLICY PERIOD: From WRAP UP LIABILITY INSURANCE (Occurrence Form) in the Joint Named Insureds of the Owner, City of Vancouver, Architects, Engineers, Consultants, Sub-consultants, Contractors, and Subcontractors, including their officials, officers, employees, agents, and all participants engaged in or connected with the above Project/Contract, including the following extensions: Personal Injury Check Additional Extensions where applicable and included: Cross Liability or Severability of Interest ☐ Work below ground level over 3 metres Employees as Additional Insureds Excavation, shoring, underpinning, pile driving or caisson ☐ Demolition, removal or weakening of support of property
☐ Blasting Blanket Contractual Liability **Broad Form Products and Completed Operations** Operation of hoist or attached machinery Broad Form Property Damage including Loss of Use √ Non-Owned Auto Liability 24 months Completed Operations
36 months Completed Operations INSURER: POLICYNUMBER: POLICY PERIOD: From LIMITS OF LIABILITY: (Bodily Injury and Property Damage Inclusive): Per Occurrence:\$ Aggregate:\$ Deductible Per Occurrence:\$ AUTOMOBILE LIABILITY INSURANCE for operation of owned and/or leased vehicles LIMITS OF LIABILITY: INSURER: POLICY NUMBER: Combined Single Limit: POLICY PERIOD: From If vehicles are insured by ICBC, complete and provide Form APV-47. OTHER INSURANCE (e.g. Contractors' Equipment) - Please specify Name of Insurer(s), Policy Number, Policy Period, and Limit **POLICY PROVISIONS:** Where required by the governing contract, agreement, lease, permit or license, it is understood and agreed that: THIRTY (30) days written notice of cancellation or material change resulting in reduction of coverage with respect to any of the policies listed herein, either in part or in whole, will be given by the Insurer(s) to the Holder of this Certificate; the exception is cancellation for non-payment of premiums in which case the applicable statutory conditions will apply;

All property insurance policies must contain a provision in which the Insurer(s), upon payment of a claim will waive all rights of subrogation against the City of Vancouver, its officials, officers, employees or agents; The insurance policy (policies) listed herein shall be primary with respect to the above described project/contract. Any insurance or self-insurance maintained by the City of Vancouver shall be in excess of this insurance and shall not contribute to it. SIGNED BY THE INSURER OR ITS AUTHORIZED REPRESENTATIVE Dated: PRINT NAME OF INSURER OR ITS AUTHORIZED REPRESENTATIVE, ADDRESS AND PHONE NUMBER

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Name of Tenderer

Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "O" (PART C - FORM OF TENDER)

## SCHEDULE "O"

## UNDERTAKING OF INSURANCE

To: City of Vancouver

Re: ITT PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWA

Re: ITT PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2
Dear Sirs:
We, the undersigned have completed, signed and attached the "Certificate of Existing Insurance" enclosed with this undertaking and now also do hereby undertake and agree that if (the "Tenderer") is awarded a Contract, we will
insure the Contractor in accordance with the requirements of the Contract, the form of which is included in the Tender Documents and will form part of the Contract Documents.
Dated at, British Columbia, thisday of
Ву:
Title:
Full Corporate Name of Insurer:
authorized broker on behalf of the Insurance Company. A SEPARATE FORM (AND CERTIFICATE OF EXISTING INSURANCE) SHOULD BE SIGNED FOR EACH POLICY IF THE TENDERER HAS MORE THAN ONE INSURER OR BROKER FOR ITS POLICIES.

Name of Tenderer Initials of Signing Officer

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May 10, 2018

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "P" (PART C - FORM OF TENDER)

# SCHEDULE "P" DECLARATION OF SUPPLIER CODE OF CONDUCT COMPLIANCE

Purpose: All proposed suppliers are to complete and submit this form to certify compliance with the supplier performance standards set out in the Supplier Code of Conduct.

The City of Vancouver expects each supplier of goods and services to the City to comply with the supplier performance standards set out in the City's Supplier Code of Conduct (SCC) <a href="http://vancouver.ca/policy\_pdf/AF01401P1.pdf">http://vancouver.ca/policy\_pdf/AF01401P1.pdf</a>. The SCC defines minimum labour and environmental standards for City suppliers and their subcontractors.

the SCC and to the best of my knowledge,(vendor name) and its propose					
subcontractors have not been and are not currently in violation of the SCC or convicted of an offence und national and other applicable laws referred to in the SCC, other than as noted in the table below (include violations/convictions that have occurred in the past three years as well as plans for corrective action).					
Section of SCC / title of law	Date of violation /conviction	Description of violation / conviction	Regulatory / adjudication body and document file number	Corrective action plan	

I understand that a false deconsideration being given to the			plan may <i>(vendor na</i>	no no	furthe
Signature:					
Name and Title:					

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Name of Tenderer	Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "Q" (PART C - FORM OF TENDER)

#### SCHEDULE "Q"

#### CONFLICT OF INTEREST DECLARATION

#### NO CONFLICT OF INTEREST / NO COLLUSION / NO LOBBYING

#### Declaration as to no Conflict of Interest in ITT

- (a) The Tenderer confirms and warrants that there is no officer, director, shareholder, partner, employee or contractor of the Tenderer or of any of its proposed subcontractors, or any other person related to the Tenderer's or any proposed subcontractor's organization (a "person having an interest") or any spouse, business associate, friend or relative of a person having an interest who is:
  - a. an official or employee of the City; or
  - b. related to or has any business or family relationship with an elected official or employee of the City,

in each case, such that there could be any conflict of interest or any appearance of conflict of interest in the evaluation or consideration of the Tender by the City, and, in each case, except as set out, in all material detail in the section titled "Disclosure" in this Schedule "Q".

(b) The Tenderer confirms and warrants that there is no person having an interest (as defined above) who is a former official, former employee or former contractor of the City and who has non-public information relevant to the ITT obtained during his or her employment or engagement by the City, except as set out, in all material detail, in the section titled "Disclosure" in this Schedule "Q".

#### Declaration as to No Conflict of Interest Respecting Proposed Supply

The Tenderer confirms and warrants that neither the Tenderer nor any of its proposed subcontractors is currently engaged in supplying (or is proposing to supply) goods or services to a third party such that entering into an agreement with the City in relation to the subject matter of the ITT would create a conflict of interest or the appearance of a conflict of interest between the Tenderer's duties to the City and the Tenderer's or its subcontractors' duties to such third party, except as set out, in all material detail, in the section titled "Disclosure" in this Schedule "Q".

#### Declaration as to No Collusion

The Tenderer confirms and warrants that:

- (a) the Tenderer is not competing within the ITT with any entity with which it is legally or financially associated or affiliated; and
- (b) the Tenderer is not cooperating in any manner in relation to the ITT with any other tenderer responding to the ITT,

in each case, except as set out, in all material detail, in the section titled "Disclosure" in this Schedule "Q".

### **Declaration as to Lobbying**

The Tenderer confirms and warrants that:

(a) neither it nor any officer, director, shareholder, partner, employee or agent of the Tenderer or any of its proposed subcontractors is registered as a lobbyist under any lobbyist legislation in any jurisdiction in Canada or in the United States of America; and

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N 67 1	
Name of Tenderer	Initials of Signing Officer

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE "Q" (PART C - FORM OF TENDER)

(b) neither it nor any officer, director, shareholder, partner, employee or agent of the Tenderer or any of its proposed subcontractors has engaged in any form of political or other lobbying whatsoever with respect to the Tender or sought, other than through the submission of the Tender, to influence the outcome of the ITT,

in each case, except as set out, in all material detail, in the section titled "Disclosure" in this Schedule "Q".

Disclosure [Add disclosure here.]

(NOTE: The City will evaluate each matter disclosed to Tenderer can be given consideration in the ITT in light o	
THE TENDERER HAS EXECUTED AND DELIVERED THIS DECLIN THE MANNER AND SPACE SET OUT BELOW:	ARATION AS AN INTEGRAL PART OF ITS TENDER
Signature of Authorized Signatory for the Tenderer	Date
Name and Title	
Signature of Authorized Signatory for the Tenderer	Date
Name and Title	

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Name of Tenderer	Initials of Signing Officer



# INVITATION TO TENDER ("ITT") NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2

FORM OF AGREEMENT
between
and
CITY OF VANCOUVER
20

This AGREEN	MENT (this "Agreement") is made as of the the day of	·
BETWEEN:		
	CITY OF VANCOUVER, having an office at 453 West 12 <sup>th</sup> Avenue Vancouver, British Columbia, V5Y 1V4	
AND:	(hereinafter referred to as the "Owner")	OF THE FIRST PART
	[NTD: INSERT CONTRACTOR NAME/ADDRESS]	
	(hereinafter referred to as the "Contractor")	OF THE SECOND PART

#### WHEREAS:

- A. The Owner has appointed its employee, Bob Devlin, (hereinafter referred to as the "Engineer" for the purposes of this Contract) to act as its sole and exclusive agent for purposes of managing and administering the performance of the Work by the Contractor in accordance with the Specifications, Drawings and other Contract Documents; and
- B. The Contractor has agreed with the Owner to perform the Work and to furnish all plant, tools, equipment, labour, Products, material and supervision necessary therefor as hereinafter set forth.

NOW THEREFORE THIS AGREEMENT WITNESSES as follows:

#### ARTICLE 1 ROLE OF THE ENGINEER

The Owner hereby designates and appoints the Engineer as its sole and exclusive agent for the purpose of, on behalf of the Owner, managing and administering the performance of the Work, as set out in the Contract Documents. Unless otherwise notified in writing by the Owner to the Contractor, the agency of the Engineer shall continue for the entire duration of this Contract including the period of any guarantees or warranties given by or through the Contractor. In the event of the revocation in writing of the agency of the Engineer by the Owner, the Engineer shall have no further authority under this Contract, except as may be specifically designated in writing by the Owner and agreed to in writing by the Engineer, and all references to the Engineer in this Contract shall thereafter be deemed to be references to the Owner or to such other person designated in writing to the Contractor. The Engineer may from time to time delegate to a representative the performance of, or the authority to perform, the duties, responsibilities, rights and obligations of the Owner in respect of which the Engineer has been designated and appointed as its sole and exclusive agent.

#### ARTICLE 2 WORK

The Contractor will carry out the Work, and will furnish all materials, equipment, products, labour, services and supervision necessary to carry out the Work as specified in and in accordance with the Contract Documents.

All of the Work shall be done, performed or furnished by the Contractor in a proper and workmanlike manner and in accordance with the requirements of the Contract Documents (as hereinafter defined).

### ARTICLE 3 CONTRACT DOCUMENTS

- 3.1 The following are the Contract Documents, whether or not attached to this Agreement:
  - (a) this Agreement and the following schedules:
    - (i) Schedule 1 General Conditions (the "General Conditions");
    - (ii) Schedule 2 Specifications and Drawings (the Specifications and Drawings listed in Schedule 2 that are not included in Schedule 2 are incorporated by reference);
    - (iii) Schedule 3 Schedule of Quantities and Prices;
    - (iv) Schedule 4 Construction Schedule;
    - (v) Schedule 5 Subcontractors and Suppliers;
    - (vi) Schedule 6 Performance and Labour and Material Payments Bonds;
    - (vii) Schedule 7 Insurance Certificates;
    - (viii) Schedule 8 Insurance;
    - (ix) Schedule 9 Force Account Labour, Equipment, Material & Subcontractor Rates;
    - (x) Schedule 10 Labour Force & Materials;
    - (xi) Schedule 11 Cash Flow Forecast;
    - (xii) Schedule 12 Contractor's Key Personnel;
    - (xiii) Schedule 13 Statement of Major Plant & Equipment;
    - (xiv) Schedule 14 Contractor's Methodology Statement;
    - (xv) Schedule 15 Supplementary General Conditions;
    - (xvi) Schedule 16 Owners List of Known Workplace Hazards;
    - (xvii) Schedule 17 Contractor Pre-Contract Hazard Assessment Form;
    - (xviii) Schedule 18 Confined Space Identification and Hazard Assessment;
    - (xix) Schedule 19 Inspection Test Plan Pro-Forma Template;
  - (b) the tender submitted by the Contractor, dated [insert], titled [insert] (incorporated by reference);
  - (c) the Specifications and Drawings (i.e., those not included in Schedule 2 but incorporated herein by reference);
  - (d) the Traffic Management Plan provided by the Contractor to the Owner (incorporated by reference);
  - (e) the Waterworks Connections Database Service Lists (incorporated by reference);

- (f) the Site-specific Health, Safety & Environmental Management Plan (HSEMP) provided by the Contractor to the Owner (incorporated by reference); and
- (g) the Site specific Quality Management Plan (QMP) provided by the Contractor to the Owner (incorporated by reference).
- 3.2 The Contract Documents are complementary and what is called for by any one shall be as binding as if called for by all. The intent and spirit of the Contract Documents is that the Contractor is required to complete the Work in every detail within the times and for the purposes designated, and that the Contractor shall furnish and do any and everything necessary for such purposes notwithstanding any omission from the Contract Documents.

#### ARTICLE 4 SCHEDULE OF WORK

- 4.1 The Contractor will commence the Work as directed in writing by the Owner.
- 4.2 The Contractor will perform the Work diligently and in accordance with the Construction Schedule. The Contractor will:
  - (a) achieve Substantial Performance of the Work on or before November 30, 2018; and
  - (b) achieve Total Performance of the Work on or before January 7, 2019;

(collectively, the "Contract Time"), subject to the provisions of the Contract Documents for adjustments to the Contract Time.

4.3 Time shall be of the essence in this Contract.

#### ARTICLE 5 PAYMENT

### 5.1 Contract Price

- (a) The Contract Price (inclusive of all PST, GST and other taxes, duties assessments, charges and fees, all permit and inspection costs, and all WorkSafeBC assessments relating to the Work) to do, perform and supply all the Work in accordance with, and perform all the obligations specified by, the Contract Documents is [To Be Determined]
- (b) The GST payable by the Owner to the Contractor is [To Be Determined]. This amount is included in the Contract Price.
- (c) The (i) aforesaid GST and (ii) the PST and all other taxes, duties, assessments, charges and fees included in the Contract Price will be remitted by the Contractor to the applicable authorities as and when the Owner pays the Contract Price to the Contractor or as earlier required by applicable law.
- (d) All amounts are in Canadian dollars.
- (e) The Contract Price shall be subject to adjustments as provided for in the Contract Documents.

### 5.2 Application for Payment

(a) During progress of the Work, the Contractor, on or before the last day of every month while the Work is in progress, may apply to the Engineer in writing, in such form as the Engineer may require or approve, for payment of a portion of the Contract Price relating

- to any portion of the Work completed as of the date of the application, provided that the application includes with it any documentation required under GC.67 and a concisely detailed description of the completed portion of the Work for which payment is sought.
- (b) On Substantial Performance being certified in accordance with the procedures set out in Section 2 of GC.67 and the value of the certified deficiencies being agreed upon, the Contractor may make application to the Engineer for the balance of all monies then owing under this Contract to the Contractor, submitting also such documentation as is required by GC.67.
- On correction and completion of all deficient work listed on the Certificate of Substantial Performance, the Contractor shall submit its application to the Engineer for final payment, accompanied by the documentation required by GC.67.

### 5.3 Payment

- (a) The payment for any Work under this Contract which shall be made to the Contractor by the Owner shall not be construed as an acceptance of any Work as being in accordance with the Contract Documents. The issuance of the Certificate of Total Performance shall constitute a waiver by the Contractor of all claims except those previously made in writing and still unsettled, if any, and specified by the Contractor in its application for final payment pursuant to Section 5.2(c) above.
- (b) Payments to the Contractor will be made by the Owner as follows:
  - (i) On or before the fifth Working Day of the month following an application for progress payment made by the Contractor pursuant to paragraph 5.2(a), the Engineer will adjust, if necessary, and certify the Contractor's application for payment. Where the Engineer makes any changes to the amount submitted by the Contractor for payment, the Contractor shall be notified in writing within five Working Days and shall be given the opportunity to defend the Contractor's application without delay.
  - (ii) Within thirty calendar days of the date on which the Owner receives any Engineer-certified application for payment, along with a proper invoice therefor, the Owner will make payment to the Contractor up to the value of the completed Work as certified by the Engineer less any holdback required by the Builders Lien Act and less the aggregate of any previous payments, all in accordance with the Contract and with the Builders Lien Act (if and to the extent applicable).
  - (iii) The Owner will, in addition to other holdbacks as provided by the Contract Documents, be entitled to deduct and retain from payments otherwise due to the Contractor, a maintenance security holdback in the amount of five percent of the Contract Price (the "Maintenance Security Holdback") to cover the cost of corrections to the work that may be required under GC.58. The balance of the Maintenance Security Holdback not required under GC.58, and remaining at the end of the warranty period, shall be paid without interest to the Contractor.
    - The Contractor may substitute a letter of credit, in the amount of the Maintenance Security Holdback, in a form and from a financial institution acceptable to the Owner, for the Maintenance Security Holdback.
  - (iv) Where the Engineer has issued a certificate of completion in respect of a subcontract to which the Contractor was a party, and where 55 calendar days have elapsed since the issuance of the certificate without any claims of builders

lien being filed which arose under the subcontract, the Owner will release to the Contractor any holdback amount retained pursuant to the *Builders Lien Act* for such subcontract work.

- (v) After 55 calendar days have elapsed from the date of the Certificate of Substantial Performance issued in accordance with GC.67 and upon the Engineer's satisfaction that no encumbrance, lawful claim or lien exists, the Owner will, within a further ten calendar days, make payment to the Contractor of all monies due under this Contract at the date of Substantial Performance, including the release of all remaining Builders Lien Act holdback amounts, if any, but retaining at least twice the estimated value of the certified deficiencies, and retaining the Maintenance Security Holdback.
- (vi) Upon the issuance of the Certificate of Total Performance, the Owner will make a final payment of all monies owing to the Contractor under the Contract, except for the Maintenance Security Holdback, which shall be released as specified in Section 5.3(b)(iii).

### 5.4 Interest on Overdue Payments

Where payment is not made in accordance with the payment provisions contained in Section 5.3 above, the overdue amount shall bear interest at the lending rate of the Bank of Montreal for its prime commercial customers and such interest shall be calculated from and after the date upon which such payment was due and shall accrue until the date that payment of the overdue amount together with interest is made. This interest obligation on the Owner shall constitute the sole remedy of the Contractor for late payment.

#### ARTICLE 6 NOTICES

6.1 Unless otherwise specifically provided in the Contract Documents, all notices, instructions, orders or other communications in writing shall be conclusively deemed to have been given to the Contractor if delivered to the Contractor personally (or in the case of a company, to any of its officers or directors personally), or to the Contractor's superintendent or foreman, or delivered by mail to the Contractor at the business address of the Contractor set forth below:

#### Contractor:

### [NTD: Insert Contractor information]

6.2 Unless otherwise specifically provided in the Contract Documents all notices, requests, claims or other communications by the Contractor shall be in writing and shall be given by personal delivery or by registered mail addressed to the Owner at the following address:

### Owner:

City of Vancouver - Engineering Services Department - Sewers Design Branch 507 West Broadway Avenue Vancouver, British Columbia V57 0B4

Attention: Mark Schwark - Branch Manager, Sewers & Drainage Design Branch,

6.3 Any of the said addresses may be changed from time to time by written notice to the other party.

Any such notices, instructions, orders, requests or other communications sent by mail as aforesaid shall be deemed to have been given on the second Working Day following the mailing thereof.

#### ARTICLE 7 GENERAL

- 7.1 This Agreement shall inure to the benefit of and be binding upon the respective successors and permitted assigns of the Parties hereto.
- 7.2 Except as expressly set forth in the foregoing Section 7.1 or in Schedule 1, nothing in this Agreement shall be construed to give any rights or benefits to anyone other than the Owner and the Contractor.
- 7.3 This Agreement constitutes the entire agreement between the parties hereto with respect to the subject matter hereof and cancels and supersedes any prior understandings and agreements between the parties hereto with respect thereto. There are no representations, warranties, terms, conditions, undertakings or collateral agreements, express, implied or statutory, between the parties in relation to the subject matter hereof other than as expressly set forth in this Agreement.
- No modification of or amendment to this Agreement is valid or binding unless set forth in writing and fully executed by the parties hereto and no waiver of any breach of any term or provision of this Agreement is effective or binding unless made in writing and signed by the party purporting to give such waiver and, unless otherwise provided, is limited to the specific breach waiver.
- 7.5 This Agreement is governed by and must be construed in accordance with the laws of the Province of British Columbia.
- 7.6 This Agreement is subject to the exclusive jurisdiction of the courts in the Province of British Columbia except to the extent necessary to enforce, in another jurisdiction, any judgment of any court in the Province of British Columbia.
- 7.7 The Contractor agrees to do all things and execute all deeds, instruments, transfers or other documents as may be necessary or desirable to give full effect to the provisions of this Agreement and the transactions contemplated by it.
- 17.8 If any term or condition of this Agreement is for any reason held to be illegal, invalid, ineffective, inoperable or otherwise unenforceable, it shall be severed and deemed to be deleted from this Agreement and the validity and enforceability of the remainder of this Agreement shall not be affected or impaired thereby. If any term or condition of this Agreement is found to be illegal, invalid ineffective, inoperable or otherwise unenforceable, but would not be so if some part of it were deleted, the term or condition shall apply with such modifications as may be necessary to make it enforceable.
- 7.9 This Agreement may be executed in any number of counterparts. All counterparts, taken together, constitute one instrument. A party may execute this Agreement by signing any counterpart.
- 7.10 Delivery of an executed signature page to this Agreement by either party by electronic transmission shall be as effective as delivery of a manually executed copy of this Agreement by such party.
- 7.11 IN WITNESS WHEREOF the parties hereto have executed this Agreement on the date first herein above written.

CITY OF VANCO by its authorize		
Signature:		
Name:		
Title:	<u>Category Manager</u>	
Signature:		
Name:		
Title:	Chief Purchasing Official	
Signature:		
Name:		
Title:	General Manager, Engineering Services	<u>Department</u>
Signature:		
Name:		
Title:	<u>Director</u> , <u>Legal Services Department</u>	
[INSERT NAME by its authorize	OF CONTRACTOR] ed signatories:	
Signature:		
Name:		
Title:		
Signature:		
Name:		
Title:		

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#### GC.1 DEFINITIONS

Where used in this Agreement, unless otherwise defined:

- "Applicable Laws" means all laws, statues, bylaws, regulations, ordinances, standards, codes, orders, decrees, restrictions, and rules (including all occupational health and safety requirements) whether federal, provincial, or municipal in origin, having the force of law, existing at common law or enacted by any public authority having jurisdiction in relation to any aspect of the Project in force from time to time during the term of the Agreement;
- "Certificate of Insurance" means, subject always to GC.60, a certificate of insurance duly completed by the Contractor's insurers or insurance brokers, in a form acceptable to the Owner;
- "Certificate of Substantial Performance" means, subject always to Section 5.3 of the Agreement and to the warranty under GC.58, the certificate issued by the Engineer indicating that Substantial Performance of the Work has been achieved. Under no circumstances will issuance of the Certificate of Substantial Performance be deemed to mean that the Owner has accepted the Work as being in compliance with the Contract Documents;

- "Certificate of Total Performance" means, subject always to Section 5.3 of the Agreement and to the warranty under GC.58, a certificate issued by the Engineer accepting the Contractor's certification that the entire Work of the Contract has been performed by the Contractor to the requirements of the Contract Documents;
- "City" or "Owner" means the City of Vancouver, a municipal corporation continued pursuant to the Vancouver Charter, acting in its capacity as the owner of the streets and other infrastructure forming the Site, but expressly excludes the City of Vancouver, acting in its regulatory capacity;
- "Construction Schedule" means the written schedule for the carrying out of the Work which the Contractor, pursuant to the ITT, delivered to the Owner after receipt of the Notice of Award, as approved by the Engineer and set out in Schedule 4 and as it may be modified and/or replaced from time to time in accordance with this Agreement;
- "Contract" means the undertaking by the parties to perform their respective duties, responsibilities and obligations as prescribed in the Contract Documents;
- "Contract Documents" means the documents set out in Article 3 of the Agreement;
- "Contract Price" means the amount stipulated in Article 4 Payment of the Agreement;
- "Drawings" means all plans, profiles, drawings, sketches within, and all other graphic and pictorial portions of, the documents prepared for or in connection with the Work embraced under this Contract, which have been approved for use by the Owner or the Engineer, including those listed in Schedule 2 and those contained within the Master Municipal Specifications and Standard Detail Drawings, which are in turn contained within Volume II of the Master Municipal Construction Document, as further described in GC.4;
- "Engineer" means the Engineer as defined in the Agreement or his delegate, who may be an employee of the Owner or an independent engineer engaged by the Owner on its behalf;
- "Environmental Legislation" means any laws, statutes, regulations, orders, bylaws, permits or lawful requirements of any governmental authority with respect to environmental protection;
- "GST" means the tax payable and imposed pursuant to Part IX of the Excise Tax Act (Canada), as amended or replaced from time to time;
- "ITT" means the City's Invitation to Tender No. PS20180617;
- "Methodology Statement" means the written methodology statement for the Work which Contractor, pursuant to the ITT, delivered to the Owner after receipt of the Notice of Award and which is shown in Schedule 14 hereto;
- "Notice of Award" means the written notice from the Owner to the Contractor pursuant to the ITT by which the Owner gave to the Contractor notice of the Owner's acceptance of the Tender;
- "Notice to Proceed" means a written notice from the Owner to the Contractor pursuant to GC.9 requiring the Contractor to commence and carry out the Work;
- "Other Contractors" means any person, firm or corporation employed by or having a contract with the Owner and/or associated parties otherwise than through the Contractor;

- "Plant" means every temporary or accessory means necessary or required to carry on or complete the Work and extra work, in the time and manner herein provided including, without limiting the generality of the foregoing, all tools, fixed and moveable machinery, engines, motor vehicles, trucks, compressors, all temporary structures such as workshops, sheds, storehouses, shoring forms, trestles and hoardings and all other appliances, apparatus or equipment of every sort, kind and description whatsoever;
- "Products" means material incorporated or to be incorporated in the Work as required by the Contract Documents;
- "PST" means the provincial sales tax payable and imposed pursuant to the *Provincial Sales Tax Act* (British Columbia), as amended or replaced from time to time;
- "Site" means the place or places where the Work under the Contract is to be carried out, erected, built or constructed;
- "Site-specific Health, Safety & Environmental Management Plan" means the written site-specific health, Safety and environmental management plan which the Contractor, pursuant to the ITT, delivered to the Owner after receipt of the Notice of Award, as approved by the Engineer (incorporated by reference);
- "Site Specific Quality Management Plan" means the written site specific Work related quality management plan which the Contractor, pursuant to the ITT, delivered to the Owner after receipt of the Notice of Award, as approved by the Engineer (incorporated by reference);
- "Specifications" mean the portion of the Contract Documents, wherever located and whenever issued, consisting of the written requirements and standards for Products, systems, workmanship, quality, and the services necessary for the performance of the Work, including those listed in Schedule 2 and those contained within the Master Municipal Specifications and Standard Detail Drawings, which are in turn contained within Volume II of the Master Municipal Construction Document, as further described in GC.4;
- "Subcontractor" means the person or persons with whom the Contractor has made an agreement to perform a portion or portions of the Work or to supply Products therefor;
- "Substantial Performance" means that the Contract is "substantially performed" in accordance with the criteria set out in Section 1(2) of the *Builders Lien Act* (irrespective of the applicability of the Act to the Work);
- "Tender" means the Contractor's tender submitted to the Owner in response to the ITT;
- "Total Performance" occurs when all the Work, including the correction of all deficiencies, but excluding any correction of completed Work that appears during the warranty period set out in GC.58 or during the period of another on-going warranty or guarantee as provided by the Contract Documents, has been performed as required by the Contract Documents, as certified by the Engineer;
- "Traffic Management Plan" means the written traffic management plan which the Contractor, pursuant to the ITT, delivered to the Owner after receipt of the Notice of Award, as approved by the Traffic Data Management Branch of the City's Engineering Department (incorporated by reference) has the meaning set out in GC.40;
- "Waterworks Connection Database Service Lists" means information from the City's database showing location and material of existing water services;

"WorkSafeBC" means the workers compensation board established and functioning pursuant to the Workers Compensation Act (British Columbia) (the "WCA"), as amended, and/or related or successor legislation, and any successors in function thereto;

"WorkSafeBC Regulations" means the WCA, and all regulations thereunder, as amended or reenacted from time to time:

"Work" means (unless the context requires a different meaning) the total construction and related services required by the Contract Documents, including all materials, matters, Products and things required to be done or supplied therefor, and all work(s) mentioned or referred to in the Contract Documents, including all extra or additional work or materials, matters or things which may be ordered by the Owner or the Engineer as herein provided;

"Working Day" means any day other than a Saturday, Sunday or "holiday" as defined in the *Interpretation Act* (British Columbia).

#### GC.2 INTERPRETATION

In this Contract, the masculine includes the feminine and bodies corporate, and each includes the others. Also, any reference to the singular includes the plural where appropriate.

Drawings and Specifications are intended to be complementary. Should any difference exist between the Drawings and Specifications, or should any errors or inconsistency occur in any or between any of the Drawings and Specifications, the Contractor, before proceeding, shall bring them to the attention of the Engineer. The Engineer shall resolve the error or inconsistency and the Contractor shall proceed with the Work in the manner directed by the Engineer.

The Engineer will furnish from time to time such detail drawings and specifications as the Engineer may consider necessary for the Contractor's guidance. These detail drawings and specification shall be considered Drawings and Specification, respectively, and shall take precedence over Drawings or Specifications, and shall be considered as explanatory of them and not as indicating changes in the Work or as giving rise to any entitlement to a change in the Contract Price.

On all Drawings, figures take precedence over scaled dimensions. Scaling of dimensions, if done, is done at the Contractor's own risk. Despite the above, in the event of any inconsistency between the Drawings and Specifications or between any other Contract Documents or within any Contract Documents which could be construed as creating an ambiguity regarding the amount of Work involved, the cost or amount of Product to be supplied, the Contract Price being lower or higher, or any other similar discrepancy or inconsistency, the discrepancy or conflict will be resolved as follows:

- (a) the portion of the Contract Documents most favourable to the Owner will be deemed to be correct;
- (b) the more stringent will take precedence over the less stringent;
- (c) the more expensive item will take precedence over the less expensive; and
- (d) if none of the foregoing rules (a), (b) and (c) can be applied by the Engineer, the more specific provision will take precedence over the less specific.

#### GC.3 PERSONAL EXAMINATION

The Contractor has carefully and thoroughly examined the Site prior to entering into this Contract and the Contractor is familiar with conditions at the Site. Notwithstanding any other provision hereof, no adjustment to the Contract Price shall be made in relation to conditions at the Site that should reasonably have been noted by the Contractor as a result of its examination of the Site. The Contractor has examined carefully the Drawings, Specifications and other Contract Documents. The Contractor has satisfied itself as to the character, quality and quantity of work to be performed, as to the materials to be furnished, and as to the requirements of the Drawings, Specifications and other Contract Documents. The Drawings show or describe conditions as they are believed by the Engineer to exist, but it is not to be inferred that all of the conditions as shown thereon are actually existent, nor shall the Owner or any of its officials, employees or agents be liable for any loss sustained by the Contractor as a result of any variance between the conditions as stated in the Drawings or other Contract Documents and the actual conditions revealed during the progress of the Work, or otherwise.

The Contractor agrees that the Contractor has satisfied itself by the Contractor's own investigation and research regarding all conditions, that the Contractor's conclusion to enter into the Contract is based upon such investigation and that the Contractor will make no claim against the Owner or the Engineer because any estimates, tests or representations of any kind affecting the Work made by any officer, employee or agent of the Owner or the Engineer that may prove to be in any respect erroneous. The Contractor assumes the risk of unforeseen conditions and agrees to complete the Work under whatever circumstances may develop. Any information shown or described in the Drawings, Specifications or any other Contract Documents as to the soil or material borings or tests of existing material is not guaranteed, and no claim for extra work or damages will be considered if it is found during construction that the actual soil or material conditions vary from those indicated.

### GC.4 MASTER MUNICIPAL SPECIFICATIONS AND STANDARD DETAIL DRAWINGS

The Contract Documents incorporate by reference the "Master Municipal Specifications and Standard Detail Drawings" contained within Volume II of the Master Municipal Construction Document (2000) ("MMCD"), as supplemented by the PS20180617 - City of Vancouver - Street Restoration Manual (rev. August 2008), provided with the ITT, but hereby expressly exclude all of Volume I and the following parts of Volume II of the MMCD: Instructions to Tenderers - Part II. General Conditions (including Schedule 17.5.3 Letter Agreement with Referee, Changes and Extra Work flow chart, and Dispute Resolution Process flow chart).

#### GC.5 PERFORMANCE BOND

The Contractor shall, if it has not yet done so, immediately upon execution of this Agreement, deliver to the Owner a performance bond in the amount of 50% of the Contract Price, issued by a surety licensed to carry on the business of suretyship in the Province of British Columbia, and in a form acceptable to the Owner for the due and proper performance of the Contract, including the warranty obligations hereunder as required in the Notice of Award. The expense of the bond shall be borne by the Contractor.

#### GC.6 LABOUR AND MATERIALS PAYMENT BOND

The Contractor, if it has not yet done so, immediately upon execution of this Agreement, shall deliver to the Owner a labour and materials bond in the amount of 50% of the Contract Price, issued by a surety licensed to carry on the business of suretyship in the Province of British Columbia, and in a form acceptable to the Owner for the due and proper payment of the labour and materials used under the Contract as required in the Notice of Award. The expense of the bond shall be borne by the Contractor.

#### GC.7 WORKSAFE BC COVERAGE AND CONTRACTOR TO BE PRIME CONTRACTOR

- 1. Payment of WorkSafeBC Assessments The Contractor agrees that it shall at its own expense procure and carry or cause to be procured and carried and paid for, full WorkSafeBC coverage for itself and all workers, employees, servants and others engaged in or upon any work or service which is the subject of this Contract. The Contractor agrees that the Owner has the unfettered right to set off the amount of the unpaid premiums and assessments for such WorkSafeBC coverage against any monies owing by the Owner to the Contractor. The Owner shall have the right to withhold payment under this Contract until the WorkSafeBC premiums, assessments or penalties in respect of work done or service performed in fulfilling this Contract have been paid in full.
- 2. Prime Contractor Unless otherwise specified in the Contract Documents or notified to the contrary by the Engineer, the Contractor is the "Prime Contractor" for the purpose of all Applicable Laws relative to occupational health and safety, including the discharge of all duties of the "Prime Contractor" under the *Workers Compensation Act* (British Columbia), notwithstanding that the Owner, the Engineer or an Other Contractor may provide from time to time some of the services normally provided by such "Prime Contractor". In this GC.7 "Prime Contractor" has the definition ascribed to the term "prime contractor" under the *Workers Compensation Act* (British Columbia).

If the Contractor is the "Prime Contractor", the Contractor shall:

- a. Compliance with Law: comply with all Applicable Laws, and all reasonable rules established by the Owner of which the Contractor is given timely notice through the Engineer, relative to occupational health and safety;
- b. Safety Programs: initiate, maintain and supervise all safety programs and measures in connection with the performance of the Work, which programs and measures shall respond fully to the requirements of all Applicable Laws relative to occupational health and safety, all to the satisfaction of the Engineer;
- c. Site Meetings: conduct regular safety meetings at the Site, no less frequently than weekly, record minutes of such meetings and give copies of such minutes to the Engineer on a weekly basis;
- d. Safety Equipment: supply and maintain at the Site all safety equipment necessary to protect workers and others from accident or injury; and
- e. First Aid: supply and maintain at the Site all personnel, equipment and supplies necessary for the provision of appropriate first-aid to any worker or person suffering an accident or injury at or about the Site, and establish an emergency procedure for prompt removal of any such person from the Site to a hospital, clinic or medical office for further treatment.
- f. Notice to Project: prior to commencement of construction, the Contractor will:
  - (1) complete and file a "Notice of Project" with the WorkSafeBC in compliance with Section 20.2 of the WorkSafeBC Rules, and
  - (2) post the Notice of Project at the Site, and
  - (3) provide a copy of the Notice of Project to the Owner and confirm in writing that the Notice of Project has been posted at the Site.

If, or for so long as the Contractor is not the "Prime Contractor", the Contractor shall:

- a. Compliance with Law: comply with all Applicable Laws, and all reasonable rules established by the Owner of which the Contractor is given timely notice through the Engineer, relative to occupational health and safety;
- b. Compliance with Directions: comply with all reasonable directions issued by the "Prime Contractor" regarding compliance with Applicable Laws, and rules established by the Owner, relative to occupational health and safety; and
- c. Site Safety Meetings: attend all Site safety meetings convened by the "Prime Contractor".

Whether or not the Contractor is the "Prime Contractor", it shall:

- a. Reporting: report immediately to the "Prime Contractor" (if not the Contractor) and the Engineer all accidents and injuries of any kind or severity occurring on or about the Site and involving employees of the Contractor or any Subcontractor, or any other person of which the Contractor is aware, and arising out of or in connection with the Work;
- b. Written Confirmation: confirm in writing each report made under subparagraph (a); and
- c. City Policy: respect and adhere to the Owner's safety and training polices relative to the Site and the Work.

If the Engineer determines that the Contractor is not in compliance with its obligations as "Prime Contractor", if applicable, the Owner may, but is not obliged to, provide some or all of the services required to discharge those obligations. All costs incurred by the Owner in providing such services shall be paid by the Contractor to the Owner, and may be deducted from any amount then or thereafter becoming due to the Contractor under the Contract.

- Initial Proof of WorkSafeBC Registration/Good Standing Upon request of the Engineer or the Owner, the Contractor will provide the Owner and the Engineer with the Contractor's or any Subcontractors' WorkSafeBC registration number.
- 4. Subsequent Proof of WorkSafeBC Registration/Good Standing Concurrently with making any application for payment under this Contract, the Contractor will provide the Owner with written confirmation that the Contractor and all Subcontractors are registered in good standing with WorkSafeBC and that all assessments have been paid.
- 5. Owners List of Known Workplace Hazards - The Contractor has received, as part of the Contract Documents, a "Pre-Contract Hazard Assessment", a copy of which is attached as Schedule 15 to this Agreement, prepared by or for the Owner pursuant to the Owner's statutory obligations under the WorkSafeBC/H&S Regulation (Section 119 of the WCA) as an "owner of a workplace". Despite the Owner's statutory obligations, the Prime Contractor now acknowledges and agrees that the Contractor may not rely on the "Pre-Contract Hazard Assessment" and now agrees to assume by the terms of this Contract full responsibility for carrying out the Owner's obligations under Section 119 of the WCA, including without limitation and by way of example only, conducting all due diligence inquiries of all applicable Owner staff and departments in order to ascertain what, if any, information is known or has been recorded by Owner staff about the Site that is necessary to identify and eliminate or control hazards to the health or safety of persons at the Site. The Owner now agrees to make all reasonable efforts to assist the Contractor in obtaining timely access to Owner staff and Owner records for this purpose. The Contractor will immediately start conducting such due diligence inquiries and must complete and deliver written confirmation of the completion of such inquiries to the Engineer prior to the Owner being obligated to issue the Notice to Proceed.

- 6. Special Indemnity Against WorkSafeBC Non-Compliance The Contractor will indemnify the Owner and hold harmless the Owner from all manner of claims, demands, costs, losses, penalties and proceedings arising out of or in any way related to:
  - (a) unpaid WorkSafeBC assessments of the Contractor or any other employer for whom the Contractor is responsible under this Contract;
  - (b) the acts or omissions of any person engaged directly or indirectly by the Contractor in the performance of this Contract, or for whom the Contractor is liable pursuant to the Contractor's obligations as the Prime Contractor, and which acts or omissions are or are alleged by WorkSafeBC to constitute a breach of the WorkSafeBC/H&S Regulation or other failure to observe safety rules, regulations and practices of WorkSafeBC, including any and all fines and penalties levied by WorkSafeBC; or
  - (c) any breach of the Contractor's obligations under this GC.7.

#### GC.8 LABOUR

The Contractor agrees to employ appropriate tradesmen for the Work. Where the tradesmen are covered by collective agreements, the Contractor shall abide by the conditions of the collective agreements covering such tradesmen. Notwithstanding the foregoing, the Contractor shall pay or cause to be paid to every person employed on the Work not less than the wages or remuneration generally accepted as current at the time.

The Contractor shall endeavour to avoid labour problems and minimize work stoppages, jurisdictional or other labour disputes on the Site.

#### GC.9 COMMENCEMENT AND COMPLETION OF THE WORK

The Contractor shall not commence the Work or procure any material therefor until it has received the Notice to Proceed from the Owner. Within two (2) Working Days after it receives the Notice to Proceed or within such longer time as may be specified in the Notice to Proceed, the Contractor shall begin the Work and thereafter continuously carry it out to completion as required under this Agreement and give full possession thereof to the Owner before the date for Total Performance or such later date as the Engineer in writing may explicitly permit. No progress or interim estimate or certificate shall release the Contractor or its surety from any responsibility or shall be taken as evidence of any such release, or as an acceptance of any Work or material, or as a waiver of any condition herein. The whole Work and every portion and detail thereof shall, at the time of completion, be put and left by the Contractor in good and satisfactory condition, finished in all respects and at the time must be fully up to the requirements of the Drawings and Specifications in every particular aspect; and all surplus and refuse material and rubbish must be removed by the Contractor from the vicinity of the Work; the Site must be left by the Contractor in a neat and tidy condition; all damages to adjacent property, including pavements, foot walks, boulevards, sod, trees, shrubs and plants, or other things injured or interfered with by the Contractor, or in any way due to its work, must be made good by the Contractor; all wages must be paid, and every other requirement of the Contract must be complied with by the Contractor. The Contractor shall complete all of the Work in full compliance with all Environmental Legislation. In case of the Contractor's failure to finish the Work properly and fully, and as required, or in case of the Work or any part thereof being assumed by the Owner, as provided in these General Conditions, the Owner may proceed to finish the Work for the Contractor as its agent in this respect and at the Contractor's expense or proceed as provided in GC.69.

#### GC.10 CONSTRUCTION SCHEDULE

The Contractor shall carry out the Work in accordance with the Construction Schedule.

The Construction Schedule must be explicitly approved by the Engineer prior to commencement of Work, after which, on a weekly basis, the Contractor shall update the Construction Schedule to show the progress of the Work as compared to the Construction Schedule in its original form as approved by the Engineer, submit the updated version of the Construction Schedule to the Engineer for his approval and report in writing to the Engineer regarding the progress of the Work in relation to the Construction Schedule with particulars indicating the percentage of the Work completed.

The Contractor shall immediately advise the Engineer of any changes to or deviations from the Construction Schedule in the timing of the Work which the Contractor may at any time wish to propose.

If at any time, in the opinion of the Engineer, the Construction Schedule as submitted is inadequate to ensure the completion of the Work within the time proposed therefor in the Tender, or is otherwise not in accordance with the Tender, or if the Work is not being adequately or properly prosecuted in any respect, the Engineer, without derogating from the Owner's rights under the Contract, may require the Contractor to modify the Construction Schedule to provide for the proper and timely completion of the Work, and the Contractor shall not be entitled to claim for any extension of time on account of such requirement.

#### GC.11 MAINTENANCE OF SCHEDULE

#### 1. Work Delayed by the Contractor

- (a) The Contractor shall at all times provide a sufficient number of skilled personnel to maintain the progress of the Work and compliance with the Construction Schedule, and, if in the opinion of the Engineer, the Contractor delays the progress of the works of Other Contractors, then the Contractor shall be responsible for all loss and damage, including, without limitation, that of Other Contractors for stand-by time and/or delay occasioned thereby.
- (b) If, in the opinion of the Engineer, the Contractor delays or is about to delay the Work or the progress of any portion of the Work as shown by the Construction Schedule, then upon written notification by the Engineer, the Contractor shall use such additional overtime work or shifts as may be necessary to catch up and/or maintain the progress of the Work and the cost and expenses incurred by use of said overtime work or shifts shall be borne entirely by the Contractor.

### 2. Work Accelerated by the Engineer

- (a) Should the Engineer be required to expedite the final completion of the Work or the works of Other Contractors, then, provided the Contractor is not in default of any of the provisions of the Contract affecting the Construction Schedule, the Engineer may order the Contractor to work additional shifts for which the Owner will pay:
  - (i) the substantiated extra premium wage incurred by such shift work;
  - (ii) the approved additional wages of supervision; and
  - (iii) an agreed percentage addition for profit for accelerated work.

(b) Such instructions to the Contractor will only be valid when given in writing by the Engineer. The Contractor shall be responsible for having time sheets covering all such shift work checked and approved daily by the Engineer and claims for reimbursement of the extra wages will only be accepted when properly supported by such signed time sheets.

### 3. Work Out-of-Sequence

The Contractor shall at no additional cost perform its Work as to operation or location out-of-sequence as and when directed by the Engineer.

#### 4. Execution of Other Works or Contracts

- (a) The Contractor shall afford all facilities for the execution of any other works which may be undertaken by the Owner or by such parties as may be employed by them, so that such works may be properly and conveniently completed, and the Engineer shall have full authority to make and enforce such regulations as the Engineer may deem necessary for the conduct of the works; and the Contractor shall proceed in such manner and complete in such order such portions of the Work as the Engineer may require, and the Engineer shall be the sole judge as to what facilities are due and proper, and can be afforded without any undue interference with the execution of the Contract.
- (b) The Contractor shall at all times give free access and every reasonable facility to the employees of the Owner and to Other Contractors, to such portion of the works and adjoining land as may be necessary to enable them to execute and maintain works of any description; such accommodation and access being regulated and directed by the Engineer and no inconvenience or alleged inconvenience arising therefrom shall form any ground for claims, losses or damages, compensation or otherwise, by the Contractor against the Owner.

#### GC.12 HOURS OF WORK

The Contractor's hours of work shall be as proposed in the Tender and incorporated into this Agreement in Schedule 10 hereto.

Notwithstanding the foregoing, the Contractor, in its hours of work for the Work, must comply at all times with all applicable requirements of the City of Vancouver's *Noise By-law*.

The Contractor shall keep the Engineer fully informed of any changes to the Contractor's hours of work so that inspections can be co-ordinated. Work without inspection shall not be permitted.

The Contractor shall not expect any work to be performed by the Owner's personnel or contracted consultants outside their regular work hours, that is, between the hours of 7:30 a.m. and 3:30 p.m. on all Working Days, except when Vancouver City Hall is closed, except by special arrangement with the Engineer or in case of emergency.

#### GC.13 DELAY IN PROGRESS OF THE WORK

### 1. Delays

(a) If the Contractor is delayed in the performance of the Work by an act, omission or wilful default of the Owner, or the Engineer, or anyone employed or engaged by them,

- contrary to the provisions of the Contract Documents, then the time fixed herein for completion shall be extended for such reasonable time as the Engineer may decide.
- (b) If the Contractor is delayed in the performance of the Work by an order issued by a court or other public authority and provided that such order was not issued as the result of an act or fault of the Contractor or anyone employed or engaged by the Contractor directly or indirectly, then the time fixed for completion herein shall be extended for such reasonable time as the Engineer may decide.
- (c) If the Contractor is delayed in the performance of the Work by labour strikes, fire, or by unforeseeable causes beyond the Contractor's control, then the time fixed for completion herein shall be extended for such reasonable time as the Engineer may decide, but in no case shall the extension of time be less than the time lost as the result of the event causing the delay, unless such shorter extension is agreed to by the Contractor. The Contractor shall not be entitled to payment for any costs, loss, or damages incurred as the result of such delay.
- (d) The Engineer may, from time to time and for such period as the Engineer may deem expedient, suspend in whole or in part, the performance of the Work under the Contract, and the Engineer will order the time herein fixed for the completion of the Work to be extended for a period which is deemed by the Engineer equivalent to the time lost by reason of such suspension.
- (e) No extension shall be made for delay unless written notice of claim is given to the Engineer not later than seven calendar days after the commencement of delay, provided however, that in the case of a continuing cause of delay only one notice of claim shall be necessary.
- (f) In the event that the Work is delayed or suspended in accordance with:
  - Sections 1(a) or (d) of this GC.13, the Contractor shall not be entitled to make (i) any claim by reason of such delay or suspension for any losses, costs of damages except and unless, within seven calendar days of the occurrence of such delay or suspension the Contractor shall give notice in writing to the Engineer of the basis of its claim. Such claim shall be limited to such unavoidable direct costs (excluding all charges for storage of Products, tools and equipment and indirect, overhead or other like costs) incurred as a result of such delay or suspension, and approved by the Engineer. In the case of a delay as described in Section 1(a) or a suspension pursuant to Section 1(d), a sum equal to five percent of such approved, unavoidable direct costs (in lieu of all profit) shall also be allowed. Despite any other term of this Contract, in no event will the Owner's liability for any delay claim (whether under this GC.13 or otherwise, at law or in equity, in contract or in tort) exceed the lesser of \$500 for each Working Day of delay or two percent of the Contract Price. All unavoidable direct costs claimed by the Contractor must be submitted and substantiated to the Engineer for verification on a weekly basis as incurred, failing which, they shall not be considered nor payable by the Owner. Authorization for any payment of the claim shall only be given in a writing duly signed and issued by the Engineer; and
  - (ii) Sections 1(b) or 1(c), the Contractor shall not be entitled to payment for any costs, loss, or damages incurred as the result of such delay and despite any other term of this Contract, the Owner will incur no liability for any such delay claim whether or not such claim is brought at law or in equity, contract or tort, or any other basis.

#### 2. Weather Delays

The Contractor shall not be entitled to any extension of time for completion of the Work or compensation of any kind for any delays in the performance of the Work caused by adverse weather conditions, unless any such delays are caused by adverse weather conditions which are of extraordinary severity and/or duration such that they could not have been reasonably anticipated and as a result have had a reasonably unanticipated materially adverse impact on the Contractor's progress with the Work, in which case, the time for completion of the Work shall be extended for such reasonable time as the Engineer in his discretion may decide, but any such extension of time so granted shall be the Contractor's sole remedy for such delay.

### 3. Mitigation of Delays

Notwithstanding anything else in this Agreement, the Contractor shall take all reasonable measures necessary to mitigate and minimize the effects of any and all delays occurring in the performance of the Work, however caused, and any failure to do so on its part will be taken into account in any determinations hereunder regarding possible extensions of time for completion of the Work and Contractor claims for compensation in relation to such delays.

#### 4. Non-Avoidance

No delay or suspension described in this GC.13 shall vitiate or avoid the Contract, or any part thereof, or any security or obligation for the performance thereof, unless the Owner elects to the contrary.

### 5. Resumption of Work

At the end of such delay or suspension, or upon the removal of the cause thereof, or upon the Contractor receiving notice from the Engineer requiring the resumption of work, the Contractor shall at once resume the performance of the Work and diligently carry on the same under the direction of the Engineer.

#### 6. Continuance of Work After Time Fixed for Completion

The Contractor shall not construe any direct or inferred permission to continue work after expiry of the time for completion of the Work, as stipulated in the Contract or as amended by the order of the Engineer, as a waiver of damages for non-compliance with the requirement for the completion of the Work by or within such time. The Engineer may provide for the withholding of such amounts from amounts otherwise due to the Contractor as the Engineer deems necessary to satisfy claims by the Engineer, the Owner or Other Contractors caused by such non-compliance with the requirement for the completion of the Work by or within such time.

### GC.14 LIQUIDATED DAMAGES FOR LATE COMPLETION

If in carrying out the Work the Contractor fails to meet the date required for Substantial Performance thereof as set out in the Tender, or as adjusted in accordance with this Agreement, then the Owner may deduct from any monies owing to the Contractor for the Work:

(a) as a genuine pre-estimate of additional administrative, consultant and personnel costs to the Owner relating to this Agreement and the Work caused by such delay, the sum of \$1,200 per day (pro-rated for partial days) for each Working Day that passes after the date required for Substantial Performance until the date upon which it is actually achieved; and

(b) all out-of-pocket costs, such as costs for safety, security and equipment rental, reasonably incurred by the Owner as a direct result of such delay.

If monies owed by the Owner to the Contractor under this Agreement are less than the total amount owed by the Contractor to the Owner under this GC.14, then the difference between the two shall immediately, upon written notice from the Owner, and upon Substantial Performance, be due and owing by the Contractor to the Owner.

### GC.15 EMERGENCIES

The Engineer has the authority in an emergency to stop the progress of the Work whenever in the Engineer's opinion such stoppage may be necessary to ensure the safety of life, or the Work or neighbouring property. This includes authority to make changes in the Work, and to order, assess and award the cost of work extra to the Agreement or otherwise, as may in the Engineer's opinion be necessary. The Engineer shall within two Working Days confirm in writing any such instructions.

#### GC.16 CONTRACTOR'S METHODOLOGY

The Contractor shall carry out the Work in accordance with the Methodology Statement.

The Methodology Statement must be consistent with the other requirements of the Contract, and, prior to commencement of the Work, must be explicitly approved by the Engineer.

The Contractor shall immediately advise the Engineer of any changes to or deviations from the Methodology Statement which the Contractor may at any time wish to propose. Any and all such changes and/or deviations must be explicitly approved by the Engineer prior to activation thereof.

If at any time any inconsistencies arise between the Methodology Statement and any other requirements of the Contract, then such other Contract requirements shall take precedence and those inconsistent parts of the Methodology Statement shall, at the Engineer's discretion, be struck from the Methodology Statement.

The Contractor will notify the Engineer of any and all such consistencies in a timely manner, and failure by the Contractor to identify and notify of such inconsistencies shall not affect the Engineer's right to strike out any part of the Methodology Statement which in the Engineer's view is inconsistent with the other requirements of the Contract.

#### GC.17 SPECIFICATIONS AND DRAWINGS

The Contractor shall keep in its field office and available to the Engineer a complete set of the Specifications and Drawings, and of any further drawings which may from time to time be supplied or approved by the Engineer. The Contractor shall be supplied with three (3) sets of Specifications.

Wherever standard Specifications are referred to, they shall be the latest edition of those Specifications and they shall be considered to be a part of the Contract.

The Contractor will be supplied with three (3) prints of each of the Drawings and the Contractor must satisfy itself as to the accuracy of the said copies in every detail. Any additional copies desired will be furnished by the Engineer at cost to the Contractor.

The Drawings forming part of the Contract are intended to show the position and extent of the works, the general features of the design and construction, and the dimensions and proportions

of all principal parts, but neither they nor the Specifications are guaranteed to show or describe every part or detail of the Work; anything omitted from the Drawings and Specifications, which may fairly be considered to be necessary for the proper execution and completion of the Work, shall be deemed to be required of the Contractor under the Contract.

Anything whatever which may be imperfectly specified or imperfectly shown on the Drawings, must be taken, considered and done as if it were perfectly shown and perfectly specified.

All dimensions on the Drawings, except as noted thereon, are shown in metric units.

The Engineer may from time to time issue further drawings or revised drawings as the Engineer deems necessary and such drawings shall be deemed to form part of the Contract. All sets of Drawings and Specifications shall be kept up to date at all times utilizing the Engineer's revised drawings and other documents issued to the Contractor.

All Drawings, Specifications, model and copies thereof furnished by the Engineer are and shall remain the Engineer's property. Such documents and models are to be used only with respect to the Work, are not to be copied or revised in any manner without the written authorization of the Engineer and are to be returned to the Engineer on request at the completion of the Work.

#### GC.18 SHOP DRAWINGS

The Contractor shall submit, with such promptness so as to cause no delay in its work, or that of any Other Contractor, one (1) electronic pdf file and one (1) copy of all shop or setting drawings and schedules required for the Work of the Contractor, and the Engineer shall pass upon them with reasonable promptness. The Contractor shall make any corrections required by the Engineer, and file with the Engineer one (1) sepia and one (1) copy.

The Engineer's review of shop drawings or schedules shall not relieve the Contractor from responsibility for any deviation from Drawings and Specifications unless the Contractor has in writing called the Engineer's attention to such deviation at the time of submission, nor shall it relieve the Contractor from the responsibility for errors of any sort in shop drawings or schedules.

#### GC.19 RECORD PLANS

The Contractor shall supply the Engineer with three (3) complete sets of "as constructed record plans" of the Work, on or before the date the Contractor makes application to the Engineer for a Certificate of Substantial Performance.

#### GC.20 ENGINEER SOLE JUDGE

Should any discrepancies appear in, or any difference of opinion or misunderstanding arise as to the meaning of, the Contract Documents, or should any difference of opinion or misunderstanding arise as to any omissions therefrom, or misstatements therein, in any respect, or as to quality or dimensions or sufficiency of materials, Products, Plant or Work, or any part thereof, or as to the due and proper execution of the Work, or as to the measurement of quantity or valuation of any Work executed or to be executed under the Contract or as to any additional work required thereupon, or deductions therefrom, or as to any other questions or matters arising out of the Contract, the same shall be determined by the Engineer and the Engineer's decisions shall be final and binding upon all parties concerned, and from such decisions there shall be no appeal; and the Contractor shall immediately, when ordered by the Engineer, proceed with and execute the Work, or any part thereof, forthwith, according to such decisions, and with such additions to or deductions from the Contract Price as are

provided for under the terms of the Contract, without making any claim for any extension of time in completing the Contract or the Work, unless otherwise provided for in a writing signed by the Engineer in compliance herewith.

In all cases of misunderstanding and disputes, oral arrangements will not be considered, and the Contractor must produce written authority in support of its contentions, and shall advance no claim in the absence of such written authority, or use, or attempt to use, any conversation with any person whomsoever against the Engineer or the Owner or in prosecuting any claim against any of them.

#### GC.21 ENGINEER'S ABSENCE

In the absence of the Engineer, any of the Engineer's assistants, whom the Engineer may designate to supervise the Work, shall have (subject to the instructions of the Engineer) full power to decide as to the manner of conducting and executing the Work in every particular aspect, and the Contractor shall follow the instructions or orders of the person so designated.

#### GC.22 ACCESS AND ASSISTANCE

The Contractor shall furnish the Engineer and any of the Engineer's assistants at all times with convenient means of access to all parts of the Work, and also with all required assistance, to facilitate thorough examination of the same, and inspection, culling or removal of doubtful or defective material or Products and for any other purpose required in connection with the Work, or in the discharge of their respective duties, for which service no additional allowance will be made.

#### GC.23 COMMUNICATIONS WITH CONTRACTOR

At all times during the performance of the Work, the Contractor will maintain within the Greater Vancouver area an office equipped with a telephone and staffed at all times on all Working Days between 8:30 a.m. and 4:30 p.m. with a representative of the Contractor authorized to act on its behalf in connection with the Work and the Contract.

Before commencement of construction, the Contractor will provide the Engineer with a list of at least three persons with authority to act on the Contractor's behalf in times of emergency in connection with the Work, at least one of whom will be available at all times 24 hours per day after commencement of the Work until completion thereof.

Any notice or communication to the Contractor pursuant to the Contract will be deemed to be well and sufficiently given, delivered and received by the Contractor if delivered in person to any of its apparent representatives, or if mailed or sent to the Contractor at the address set out in the Agreement, or to its place of business, if that is different from the address given there, or left for the Contractor at any Work site or by fax or e-mail to the Contractor's fax number or email address as set out in the Agreement or in the Contractor's Tender.

In any written or printed notice the Owner gives communicating to the Contractor regarding requirements for the Work or otherwise in connection with the Work or the Contract, the Owner will not be obligated to specify minutely or in detail everything required, or to specify by measurement the exact extent thereof, or the precise place or places where any part of the Work, material or Products may be defective, or where any of the Specifications have not been observed, but a reference in such notice to the clause or clauses bearing upon the matter, or a description of the locality in general terms that is sufficiently clear, in the Engineer's opinion, to indicate where the defects or trouble exists, will be deemed to be ample notice.

#### GC.24 CONTRACTOR'S SUPERINTENDENT AND EMPLOYEES

The Contractor shall keep on the Site, during the progress of the Work, a competent superintendent and any necessary assistants, all satisfactory to the Engineer. The superintendent shall not be changed except with the consent of the Engineer, unless the superintendent proves to be unsatisfactory to the Contractor and ceases to be in its employ. The superintendent shall represent the Contractor in the Contractor's absence and directions given to the superintendent shall be held to be given to the Contractor. The Contractor shall give efficient supervision to the Work, using its best skill and attention.

Should any person employed on the Site, or in connection therewith, give any just cause for complaint, the Engineer may require that such person be replaced forthwith, and such person shall not be again employed by the Contractor on the Site without the consent, in writing, of the Engineer.

### GC.25 CONTRACTOR'S SUPERINTENDENT AND SUPERVISION (NON-WORKING)

The Contractor's Superintendent and/or Supervisors, while performing their duties as such, shall not perform or, other than in their superintendent and/or supervisory capacities, participate in the performance of any other Work related activities.

#### GC.26 REMOVAL OF PERSONS

The Engineer, by written notice to the Contractor, may object to any person engaged by the Contractor or any Subcontractor for the performance of the Work who, as determined by the Engineer in its sole discretion, has engaged in misconduct, is incompetent or does not have adequate working knowledge of the safety rules and procedures applicable to the Site. Upon receipt of any such notice, the Contractor will immediately cause such person to be removed from the Site and promptly replaced by a person with suitable qualifications and experience, at no extra cost or expense to the Owner. Notwithstanding any other provision in this GC.26, in all other respects, the Contractor and the Subcontractors will retain all authority and control over their respective employees, agents and Subcontractors.

### GC.27 INSPECTION OF WORK

The Engineer may appoint inspectors or surveyors to inspect all materials used, Products made and all Work done. Such inspections may extend to any or all parts of the Work and to the preparation or manufacture of the Products to be used whether on Site or elsewhere. Inspectors and surveyors are not authorized to revoke, alter, enlarge or accept any portion of the Work or to issue instructions contrary to the Drawings and Specifications.

#### GC.28 DAILY REPORT

The Engineer will maintain, in detail, a daily report to record progress of the Work, the number of personnel at the Site, the materials delivered to the Site, and all such other items which the Engineer deems necessary to record. The daily reports will be kept in the Engineer's Site office and the Contractor or the Contractor's representative shall be required to read and sign each report. In case of differences of opinion between the Engineer and the Contractor regarding the particulars stated in the daily report, the Contractor shall, within seven calendar days, give notice in writing to the Engineer expounding such difference.

#### GC.29 WEEKLY REPORT & MEETINGS

The Contractor, on a weekly basis while carrying out the work, will provide the Engineer with written reports regarding the Work performed in the week which is the subject matter of the

report and a detailed written preview of the Work to be performed in the next four week period. The time which is to mark the end the week for which the progress reports are prepared and which will mark the beginning of the 4 week period to be previewed in such preview reports is time which is the end of the work day on Friday of each week. All progress reports and 4 week previews will be submitted to the Engineer not later than 5pm the following Monday or such other time as may be explicitly approved by the Engineer.

The Contractor shall meet weekly with the Engineer on the Site to discuss progress of the Work, including, without limitation, the progress reports and 4 week previews discussed in this GC.29 and the Construction Schedule.

The Contractor will also provide the Engineer with such progress reports and previews for the Work at such other times as the Engineer may request from time to time.

#### GC.30 SUBCONTRACTORS AND SUPPLIERS

The Contractor may and when necessary shall use Subcontractors in the performance of the Work.

Except as the Engineer may otherwise approve in writing on the Contractor's written request, the Contractor may use as Subcontractors and Suppliers for the Work only those Subcontractors and Suppliers identified as such in the Tender and in Schedule 5 hereto.

The Contractor shall supply complete information to Subcontractors and equipment and material suppliers. The Contractor agrees to bind every Subcontractor by the terms of the Contract Documents as far as applicable to their component of the Work. Where Specifications and Drawings are required to provide complete information on any aspect of the Work, the Contractor shall supply them to the Subcontractor or supplier concerned.

In every subcontract, to the extent the *Builders Lien Act* is applicable, the Contractor shall specify that the Contractor or agent of the Contractor shall be the person responsible for payment certification under that subcontract for the purposes of the *Builders Lien Act* (and not the Owner or Engineer).

#### GC.31 CONTRACTOR'S PLANT AND UTILITIES

The Contractor shall at its own expense supply, maintain and remove its field office, all other Plant, and whatever electric or telephone facilities the Contractor requires for its Plant for either domestic or construction purposes.

The Contractor must provide and properly maintain, in clean and sanitary condition, suitable and convenient privy or toilet accommodation for the Contractor's employees so that they shall not be a source of inconvenience, complaint or nuisance to the public or to others in the vicinity of the Site.

The Contractor shall make all necessary arrangements with the Engineering Department of the Owner for obtaining water from the Owner.

#### GC.32 PLANT, LABOUR AND MATERIALS

The Contractor at its own expense shall provide all necessary temporary buildings and storage grounds and shall furnish all necessary labour, materials and Plant (consistent with the details provided in the Tender and the Schedules hereto) together with all proper and required facilities for moving and transporting the same, so that the Contract and all Work required to be done under it can and will be carried on in a workmanlike manner, properly, satisfactorily,

continuously and expeditiously, to completion, to the Engineer's satisfaction in all respects. Unless otherwise specified, all materials shall be new and both workmanship and materials shall be of good quality.

Should any Plant, equipment, appliance, materials or workmanship which the Engineer may deem to be inferior or unfit for use in or on the Work be brought on the Site or used, the same shall be wholly removed therefrom within 24 hours after notification to that effect from the Engineer, and in the case of failure or neglect on the part of the Contractor to remove the same the Engineer may cause the same to be taken away at the Contractor's expense, and deposited, wasted or otherwise disposed of in any locality, place or way the Engineer considers convenient or proper, and the Contractor shall forthwith pay to the Owner on demand, all expenses incurred including storage, if any, or the same may be deducted or collected by the Owner as provided in GC.65.

#### GC.33 MATERIAL AND EQUIPMENT SUPPLIED BY THE CONTRACTOR

Material and equipment supplied by the Contractor shall be as specified in the Contract Documents. If the Contractor wishes to supply and install items other than as specified, the Contractor shall apply for and must receive written permission from the Engineer before incorporating such items into the Work. Descriptive literature and price schedules covering such alternative items shall be supplied to the Engineer if requested.

The Contractor shall furnish for the approval of the Engineer as the Engineer may reasonably require samples of any material of any kind to be used in the Work and no material shall be used which is in any way inferior to the approved samples; but it is understood that the approval of any material shall not subject the Owner or the Engineer to pay for the same or prevent the rejection afterwards of any portion thereof which is found in the Engineer's judgement to be unsound or unfit to be used; nor shall such approval be considered as any waiver of objection to the Work at any subsequent period on account of the unsoundness or imperfection of the materials used.

### GC.34 MATERIAL IN IMPERIAL UNITS

Where manufactured materials that are specified in metric units are not available, materials manufactured to Imperial units may be substituted, provided the Contractor can satisfy the Engineer that the substitute materials are at least equivalent to those specified.

#### GC.35 SUPPLY OF MATERIALS BY THE OWNER

The Contractor's responsibility for materials supplied by the Owner shall begin upon the Contractor's acceptance at the points of supply to the Site. All such materials shall be examined and the Contractor shall advise the Engineer in writing of any defective or damaged material. Any material supplied by the Owner which is damaged after acceptance by the Contractor shall be replaced by the Contractor at his own expense.

Any material supplied by the Owner that is not required for the Work shall remain the property of the Owner. Such material shall be neatly stored at the point of original supply.

#### GC.36 TEMPORARY STRUCTURES

Temporary structures erected by the Contractor shall remain the Contractor's property and be removed from the Work Site on completion of the Work.

The Contractor shall be responsible for the design, adequacy, safety and efficiency of all falsework, temporary structures and construction processes required in connection with the

completion of the Contract. All such designs and plans shall be prepared and sealed by a Professional Engineer licensed to practice in British Columbia and submitted to the Engineer for review and comment, but such review shall not relieve the Contractor of any responsibility. The Contractor shall make good at the Contractor's expense immediately all defects arising from the Contractor's faulty design, equipment or application thereof.

#### GC.37 WORK AREAS AND CONTRACT LIMITS

The Contractor shall, as far as is practicable, confine operations to the Engineer's specified area within the Work Site. Rights to access any land or property outside Work Site boundaries which the Contractor requires during construction shall be acquired by the Contractor at the Contractor's own expense, and the Contractor shall make its own arrangements for the use of such land or property and for the compensation of its owners.

Work to be performed by the Contractor outside the Contract Work limits includes:

- (a) installation of barricades and barriers and other traffic control measures; and
- (b) repairing and making good property and improvements which are damaged or destroyed by the Contractor's operations.

#### GC.38 TRUCK SAFETY

All truck operators, acting under or for the Contractor, must operate their vehicles in a safe and courteous manner and in full compliance with Applicable Law.

All truck operators must comply with the City of Vancouver by-laws regulating truck use, including truck route, engine brake noise, and weight and load securement provisions. There will be zero tolerance on overloading trucks and untarped loads.

All vehicles must be inspected prior to leaving a site to ensure that loads are properly secured and tarped and that there is no debris on the vehicle and no debris or rocks between the tires.

Note: The City of Vancouver Street and Traffic By-Law 2849 - Spilling of Vehicle Loads on Streets - Securing of Loads.

99.(2)(a) No person shall drive, ride, or propel any vehicle containing any sawdust, solid waste, liquid waste, dirt, gravel, rocks, or other loose material on any street in the City unless such vehicles are kept tightly and securely covered in such a manner as to prevent any of the load from being blown, dropped or spilled from such vehicle.

### GC.39 STORAGE AREAS

Working and storage areas will be allocated by the Engineer for use by the Contractor. The Contractor shall be responsible for the maintenance and clean-up of the allotted areas.

#### GC.40 TRAFFIC CONTROL

The Contractor shall carry out the Work in accordance with the Traffic Management Plan.

The Traffic Management Plan must be explicitly approved by the Traffic & Data Management branch of the City's Engineering Department prior to commencement of Work.

For all works on City streets, lanes or sidewalks, all traffic control shall be provided by the Contractor, at the Contractor's expense, except where otherwise specifically provided for in this Contract. The Contractor shall adhere to the standard procedures and practices prescribed

in the B.C. Ministry of Transportation and Highways publication "Traffic Control Manual for Work on Roadways" (latest revision).

The Contractor shall also provide, at the Contractor's expense, erect and maintain all requisite barriers, fences or other proper protection and must provide and maintain such flagpersons, watchpersons and lights as may be necessary or as may be ordered by the Engineer, in order to ensure safety to the public as well as to those engaged about the Site, and must (where it is practicable in the Engineer's opinion) keep any roadway open for the use of the public, or for some restricted use specified by the Engineer, for such width as the Engineer may direct.

The Contractor shall, from the date of commencement to the date of completion of the Work, assume responsibility for the barricading and signing of hazards resulting from such works as utility trenches, out-of-grade utility-access covers, or any other obstruction or impediment to pedestrian or vehicular traffic, be these works in progress prior to or subsequent to the above mentioned date of commencement.

Unless ordered otherwise by the Engineer, the Contractor shall inspect the barricades and warning signs around the Site at least once per day.

When any work is carried out at night, the Contractor must supply, at the Contractor's expense, a sufficient number of electric or other approved lights to enable the work to be done in an efficient and satisfactory manner, and the Engineer shall have the right to order additional lights at the Contractor's expense if, in the Engineer's opinion, they are or may be required.

Licence numbers of vehicles legally parked at the time of placement of signs shall be recorded by the Contractor and made available for the Engineer. If these vehicles are still parked when Work commences, the Engineer shall be contacted by the Contractor for further instructions.

#### GC.41 PUBLIC CONVENIENCE

In carrying out the Work, or any portion thereof, the convenience of the public must always be specially considered and provided for by the Contractor, who must not obstruct any street, thoroughfare or sidewalk longer or to any greater extent than is absolutely necessary in the Engineer's opinion. The Contractor shall not deposit any material upon any street, sidewalk, boulevard, grass plot, or other City or public property, without the Engineer's permission; nor shall the Contractor allow the same to remain thereon longer than necessary but must remove all rubbish and other material, clean and thoroughly restore all such places to as good and as tidy a condition as the Contractor found them, as speedily as possible, from time to time as the Work progresses, or as directed. Unless material and rubbish are removed within four days after the completion of the Work, without previous notice to the Contractor the Engineer will proceed to do whatever is necessary to restore such places to as good and as tidy a condition as before the commencement of the Work and charge the cost thereof against the Contractor. Where the Contractor obstructs more of any street, roadway or place than is ordered or sanctioned by the Engineer in writing, then the Engineer may cause such obstructions to be removed at the expense of the Contractor.

#### GC.42 ACCESS TO EXISTING STRUCTURES

The Contractor shall at all times maintain satisfactory pedestrian access to buildings and private property.

The Contractor shall provide suitable notice to affected property owners prior to changes in access. Interruption of access to any entrance shall be kept to a minimum.

The Contractor shall maintain fire exits from existing buildings as required by the Applicable Law and Vancouver fire and rescue authorities.

#### GC.43 PROTECTION OF WORK AND PROPERTY

The Contractor shall maintain continuously adequate protection of all the Contractor's Work from damage and shall protect the Owner's property from all injury arising in connection with the Contract. The Contractor shall make good any such damage or injury. The Contractor shall protect adequately adjacent property as required by law and the Contract.

### GC.44 FIRE, SECURITY AND SAFETY REGULATIONS

## 1. Fire and Security

The Contractor shall comply, and the Contractor shall enforce compliance by all its agents, employees, Subcontractors and suppliers, with any and all fire regulations which have been or may be established from time to time by the Engineer and anybody having jurisdiction over such matters.

All security regulations which have or may be promulgated by the Engineer or other authorized representatives of the Owner shall be complied with. Watchmen for the Site may be provided by the Owner at the Owner's discretion. However, neither the Owner nor the Engineer will be responsible for any loss or damage to the property of the Contractor whether or not watchmen are provided by the Engineer. The Contractor will furnish such security as the Contractor feels necessary for the protection of the Contractor's equipment and Products stored or used on Site.

#### 2. Loss Control

The Contractor will establish a "Loss Control Program," satisfactory to the Owner to meet WorkSafeBC and other requirements.

## 3. Safety

When required by WorkSafeBC Regulations, first aid facilities, including an attendant, shall be provided on the Site at all times during working hours by the Contractor. Such facilities will be completely equipped in accordance with the requirements of WorkSafeBC.

The Contractor shall be fully responsible for taking all necessary precautions for the safety of the Contractor's workers on the Site or of complying with all applicable safety laws and regulations, including regulations pursuant to the *Workers' Compensation Act*, to prevent accidents or injury to persons on, about or adjacent to the Site.

The Contractor shall provide all safeguards required directly for or as a result of the Work as referred to in GC.43 - Protection of Work and Property and in the scope of Work described in the Contract Documents.

### 4. Trench Safety

For all excavations with a depth of 1.2 metres or more, the Contractor, without exception for any reason, including any form of trench certification from anyone, shall install shoring to prevent collapse and in doing so shall follow proper shoring procedures, equipment and materials to ensure worker safety in and around all excavations with a depth 1.2 metres or more created in the performance of the Work, including such procedures, equipment and

materials as required under Part 20 of the *Occupational Health and Safety Regulation* to the *Workers Compensation Act*.

#### GC.45 ARCHAEOLOGY / HERITAGE RESOURCE PROTECTION

The Contractor shall perform its construction activities in accordance with the City's publication "ENG - Policy - Environmental - Archaeology of Vancouver Guidelines for Archaeological Chance Find Management - 2016-09-26". Under these guidelines, if known or suspected archaeological materials are encountered during the course of project activities, work in that area must immediately cease and the steps outlined in the General City of Vancouver Guidelines for Archaeological Chance Find Management must be followed.

#### GC.46 OVERLOADING

No part of the Site shall be loaded with a load greater than it is calculated to bear safely. Should any damage or accident occur through the violation of this requirement, the Owner will hold the Contractor solely answerable and liable.

#### GC.47 DRAINAGE

The Contractor shall keep all portions of the Work well, properly and efficiently drained until completion, and the Contractor will be held responsible for all damage which may be caused or result from water backing up or flowing over, through, from or along any part of the Work, or which any of the Contractor's operations may cause to flow elsewhere.

#### GC.48 CLEANING UP

The Contractor shall at all times keep the Site free from accumulations of waste material or rubbish caused by its employees or work, and at the completion of the Work, it shall remove all its rubbish from and about the site and all its tools, scaffolding and surplus materials, and shall leave the Site "broom clean" or the equivalent, unless more exactly specified. In case of dispute, the Engineer may remove the rubbish and charge the cost to the Contractor as the Engineer shall determine to be just.

#### GC.49 SAFEGUARDING EXISTING PROPERTY

Existing property, buildings, fences or other improvements of any kind shall be protected by the Contractor during the life of the Contract. The Contractor shall make good to the satisfaction of the Engineer any damage done to the existing property, buildings, fences or other improvements. This applies to areas of private property incorporated in the Work area.

Where removal of existing improvements such as pavement, fences, structures, sewers and ducts is necessary during the course of the Work, the same shall be re-established by the Contractor to the satisfaction of the Engineer. The cost of protection and rehabilitation shall be borne by the Contractor.

## GC.50 EXISTING UTILITIES

#### 1. Existing Utilities

In carrying out the Work, the Contractor, at its expense, will ensure that it obtains and/or is familiar with all information, plans and permits necessary to lawfully and effectively carry out the Work in close proximity and without damage to any existing utilities of any kind within or about the Site.

The Contractor will be responsible for the care of all public utilities and in the event of any of these requiring to be removed, raised or lowered permanently, this will be done either by the Owner or by the utility company interested and at the expense of the Owner. If temporary alteration of location is required for purposes of the construction, such work shall be done by the Owner or by the utility company interested at the expense of the Contractor. The Contractor, however, will be held responsible for, and will have to bear the cost due to any damage done to utility services through its operations.

Reasonable notice must be given to the Engineer of any change required in utility services.

Existing utilities may or may not be shown on the Drawings. These, however, are shown for convenience only and the Owner assumes no responsibility for improper locations, or failure to show utility locations on the construction plans. The Contractor shall provide adequate barricades and lighting around and adjacent to any open excavation or potentially dangerous location or other locations designated by the Engineer.

The Contractor shall at all times ensure that the fire hydrants are not obstructed.

## 2. Locations of Existing Utilities

No less than 2 weeks prior to commencement of the Work at each Work Site, the Contractor, by way of a duly qualified Subcontractor, shall electronically locate and mark the location of all existing utilities and services within and in close proximity to the Work Site.

#### GC.51 DUST CONTROL

The Contractor shall at all times control the generation of dust by its operations by water sprinkling or by other methods approved by the Engineer.

### GC.52 ALTERATIONS, EXTRAS, DEDUCTIONS & CLAIMS

- (a) The Owner without invalidating the Contract shall have the right to make or order any alterations and changes to the Work, such as it may deem advisable, at any time before or during the prosecution of the Work, in any line, grade, Drawings, Specifications or detail thereof, or to increase or decrease the dimensions, quantity of material or work, or to alter the situation or level, or to vary the form or dimensions of any part of the Work, or to vary in any other way the Work; or to order any additional or extra work to be done or additional or extra materials to be furnished; and the Contractor shall, in pursuance of the Engineer's written orders to that effect, proceed with, carry out and execute the Work as directed, and shall supply such additional materials and do such additional or extra work in pursuance of such orders without being entitled to any extension of time for completion, or any additional payment on account thereof, except only as herein provided.
- (b) In each and every case where additional or extra work or material of any kind is ordered to be done or supplied, or where the Contractor does or supplies, or contemplates doing or supplying, any work or material the Contractor shall notify the Engineer in writing and shall state in its notification clearly and fully what the circumstances are, and the additional sum or compensation it intends to demand therefor, otherwise it shall have no claim in respect thereof. The Owner shall make such additional payments as the Engineer determines are reasonable and appropriate, provided that:
- (c) the Engineer shall follow any unit or lump sum prices contained in the Schedule of Quantities and Prices (Schedule 3) applicable to such work, labour or material, and if,

and to the extent that, in the opinion of the Engineer only some or none of the unit or lump sum prices aforesaid apply, the hourly rates set out in the Schedule of Force Account Labour, Equipment, Material & Subcontractor Rates (Schedule 9) (to the extent they are applicable);

- (d) any unit or lump sum prices contained in the Schedule of Quantities and Prices (Schedule 3) shall be deemed to include all amounts on account of overhead, profit, administrative, and any other indirect expenses or allowances; and
- (e) any compensation to the Contractor that is valued on a basis other than a unit or lump sum price contained in the Schedule of Quantities and Prices (Schedule 3) is consistent with the following:
  - (i) The Contractor will receive combined overhead and profit equal to ten percent (10%) of the direct unavoidable costs incurred by the Contractor's use of his own forces;
  - (ii) The Contractor will receive ten percent (10%) combined overhead and profit on the amounts paid by the Contractor to any Subcontractor as a direct result of the additional or extra work or material; and
  - (iii) Subcontractors will receive combined overhead and profit of ten percent (10%) on account of the direct unavoidable costs incurred by the Subcontractor as direct result of the additional or extra work or material.
- (f) If any work, labour or material is not required to be performed or supplied, then the Owner may deduct from the Contract Price the value of such work, labour or material not required to be performed or supplied which shall be determined by:
  - (i) using the unit or lump sum prices contained in the Schedule of Quantities and Prices (Schedule 3) applicable to such work, labour or material; or
  - (ii) if, and to the extent that, in the opinion of the Engineer some or none of the unit or lump sum prices aforesaid apply, then using the hourly rates set out in the Schedule of Force Account Labour, Equipment, Material & Subcontractor Rates (Schedule 9); or
  - (iii) such fixed sum as agreed upon between the Contractor and the Owner.
- (g) For all claim of any nature that the Contractor may wish to make in respect of the Contract or Work done thereunder, the Contractor:
  - within 7 calendar days of commencement of that part of the Work for which the claim is to be made, shall give to the Engineer a written notice of the claim;
  - (ii) within 30 calendar days of completion of that part of the Work for which the claim is to be made, shall provide the Engineer with documentation, such as invoices, daily records and any other relevant record or report, to substantiate the claim to the satisfaction of the Engineer; and
  - (iii) shall not make any claims of any nature afterwards; and no claim not then made or not then allowed by the Owner shall be sustainable, and the Owner shall be in no way disentitled to determine any and all questions concerning said claims, and no action or suit shall be commenced by either party to the

Contract until after the Certificate of Total Performance shall have been signed by the Engineer and then only for the amount appearing therein to be due to the Contractor.

## GC.53 OBLIGATION TO CONTINUE THE WORK

In the event of any dispute between the parties regarding the Work or the Contract prior to completion of the Work, the parties will continue to fulfill their obligations pursuant to the Contract until the Work is completed in accordance herewith, but they will do so without prejudice to their rights relating to the dispute.

#### GC.54 ERRORS BY CONTRACTOR

Changes, errors or mistakes made by the Contractor or the Contractor's Subcontractors, workmen or employees, and all settlements, washouts and defects, shall be rectified by the Contractor at its expense.

#### GC.55 TESTING OF MATERIALS

Except where otherwise specified, testing of materials will be carried out by the Contractor and paid for by the Contractor.

The Contractor shall supply the Engineer with the test results and all test certificates as soon as reasonably practical via a weekly transmittal of the previous week's records.

#### GC.56 QUALITY MANAGEMENT AND INSPECTION TEST PLANS

The Contractor shall perform the Work in accordance with the Site Specific Quality Management Plan.

The Site Specific Quality Management Plan must be explicitly approved by the Engineer prior to commencement of Work.

The Inspection and Test Plans (ITPs) included in the Site Specific Quality Management Plan shall be prepared and updated as the Work progresses and be in an approved format and shall encompass, as appropriate, all fabrication, construction, inspection and test activities to be implemented during production, construction, installation and commissioning in accordance with the Contract. If the Contractor submits ITPs using their own internal documents, they must meet as a minimum the requirements of the Owner's ITP proforma as outlined in the Site Specific Quality Management Plan. If the Contractor's ITP fails to meet these requirements, Contractor shall submit an amended ITP addressing any issues raised by the Engineer. The Contractor's ITP shall not be considered and accepted until approved in writing by the Engineer.

The Contractor shall prepare and maintain a Lot Register for the Work (2010 Microsoft Excel format), as the primary means of tracking all test results and inspections; the Lot Register will be updated on a weekly basis and be submitted to the Engineer as part of the weekly report.

#### GC.57 DEFECTIVE WORK

All defective work must be forthwith made good by the Contractor at its own expense to the Engineer's or Owner's satisfaction, as the case may be.

#### GC.58 WARRANTY

The Contractor shall perform the Work in a proper and workmanlike manner and in accordance with the requirements of the Contract Documents and guarantee the Work against any defects arising from faulty installation, material or workmanship during the period of 12 months from the date of issuance of the Certificate of Substantial Performance and make good in a permanent manner satisfactory to the Owner any defects arising from any of these causes. Where the Contract Documents provide for a warranty of greater scope or duration than set out in this General Condition, the broader and longer warranty provisions will apply.

Whether the Contractor should replace defective Products or Work, or repair the same, shall be determined by the Engineer. Should the Contractor fail to make good defects within three Working Days after being notified by the Owner to do so, the Owner at its option may do so and all costs, charges and expenses so incurred may be deducted or collected by the Owner as provided in GC.65 - Money Due to Owner; provided that the Owner shall first deduct such amounts from the Maintenance Security Holdback. If the Owner assesses the defects to be dangerous or determines that an emergency situation exists, the Owner, at the Owner's discretion will effect repairs immediately and all costs, charges and expenses so incurred may be deducted or collected by the Owner as provided in GC.65 - Money Due to Owner; provided that the Owner shall first deduct such amounts from the Maintenance Security Holdback. The decision of the Owner shall be final as to the necessity of repairs or of any work done or required to be done under the provisions of the Contract and for the amounts expended thereunder. If in the opinion of the Engineer, it is in the Owner's best interests (taking into account effects on the Owner's overall schedule, the difference in value between the Work as performed and that called for by the Contract Documents, and other relevant factors) not to correct defective Work or Work not provided in the Contract Documents, the Engineer will assess the amount which should be deducted from the amount otherwise due to the Contractor and will assess the length of time by which the obligations should be extended in order to put the Owner in as close a position financially and in terms of the useful life of the Work as would have been the case had the Contractor performed the Work as called for by the Contract Documents. For further certainty, the Engineer may extend the warranty period in appropriate circumstances to a minimum of twice the warranty period originally provided for under the Contract Documents, subject always to the above parameters.

#### GC.59 CONTRACTOR'S LIABILITY

The Contractor shall be liable for any and all losses, damages, or claims for damages, for injuries or accident to persons or property done or caused by the Contractor, the Contractor's Subcontractors or employees, or resulting from the prosecution of the Work or any of its operations, or caused by reason of the existence or location or condition of the Work, or of any materials, Products or Plant used therein or thereon, or which may happen by reason thereof, or arising from any failure, neglect or omission on the Contractor's part, or on the part of the Contractor's Subcontractors or employees, to do or perform any or all of the several acts or things required to be done by the Contractor or them under and by the Contract, and the Contractor covenants and agrees to indemnify and save harmless at all times the Owner against all such damages and claims for damages whatsoever arising out of or in connection therewith, and in the event of any such action being brought by any person against the Owner, either directly or indirectly, or by reason of the execution of the Contract, the Owner may enforce payment by the Contractor of all such loss, costs, damages and expenses as a debt due to the Owner.

In the case of the Contractor's failure, neglect or omission to observe and perform faithfully and strictly all the provisions of the Contract, the Owner may either with or without notice (except where in this Contract notice is specially provided for, and then upon giving the notice therein provided for), take such steps, procure such material, equipment, trucks, and men, and

do such work or things as it may deem advisable towards carrying out and enforcing the same, and any and all expenses so incurred may be deducted or collected by the Owner under the provisions of GC.65, or from the Maintenance Security Holdback.

Any such action taken by the Owner under this General Condition as it is herein empowered to take shall not in any way relieve the Contractor or its sureties from any liability under the Contract.

#### GC.60 INSURANCE BY THE CONTRACTOR

- (a) The Contractor shall obtain and maintain throughout the term of the Contract and the prosecution of the Work, all of the insurance policies required by Schedule 8.
- (b) All insurance coverage described in Schedule 8 shall be issued by an insurance carrier or agent acceptable to the Owner and licensed to conduct business in the Province of British Columbia.
- (c) Upon request of the Engineer or the Owner, the Contractor shall be required to deliver a Certificate of Insurance, and where required by the Owner's Director of Risk Management, certified copies of all policies and endorsements, evidencing the placement and endorsement of insurance in accordance with this GC.60.
- (d) Contractors and their Subcontractors shall be required to furnish evidence of the renewal of policies described in this General Condition by renewal certificate, endorsement or certified copy to be received by the Owner at least 15 calendar days prior to the expiry date of the policy.
- (e) If the Contractor fails to obtain and maintain insurance as required hereunder, or if the Owner does not approve any insurance policy or policies submitted to the Owner and the Contractor thereafter does not meet the requirements of the Owner as to terms and conditions of the insurance policy, the Owner shall have the right to place and maintain such insurance in the name of the Contractor. The cost thereof shall be payable by the Contractor to the Owner on demand, and the Owner may deduct the cost thereof from any monies which are due or may become due to the Contractor. If coverage should lapse, all work by the Contractor shall be stopped until satisfactory evidence of renewal is produced.
- (f) Each policy described in Schedule 8 shall be required to be endorsed to provide the following notice for policy changes and cancellations to the Owner: "It is understood and agreed that this policy will not be cancelled, reduced, materially altered or changed without the insurer giving at least 30 calendar days' prior written notice by registered mail to the City of Vancouver."
- (g) In addition to the requirements of Schedule 8, each Contractor and each of its Subcontractors shall provide at its own cost any additional insurance which it is required by law to provide or which it considers necessary.
- (h) All deductibles shall be for the account of and be paid by the Contractor upon demand by the Owner. The Owner shall have the right to deduct amounts for which the Contractor is responsible under this GC.60 from any monies which are due or may become due to the Contractor.

#### GC.61 WORKSAFEBC ASSESSMENTS

Prior to execution of the Agreement and prior to commencing the Work under the Contract, the Contractor shall provide a letter from the WorkSafeBC confirming the Contractor's registration and that all assessments have been paid to the date thereof. The Contractor shall require that the Contractor's Subcontractors maintain such coverage and pay such assessments as will protect them, the Owner and the Engineer from claims under the *Workers' Compensation Act* (British Columbia), as amended from time to time and regulations pursuant thereto.

#### GC.62 CLAIMS FOR WAGES

The Owner may settle any claim for damages, and pay all wages overdue or the price of any materials or the amount due and payable by the Contractor to any Subcontractor, for which payment is in arrears, and the amount thereof shall be debt due by the Contractor to the Owner, as and for money paid by them for the contractor and shall be deducted or collected by them as provided in GC.65 - Money Due to Owner, but the Owner does not assume any liability in this respect; nor shall the persons to whom such wages or payments are paid become, by such payments, the employees or servants of the Owner or third party beneficiaries of this Contract.

#### GC.63 LIENS

The Contractor hereby agrees to make payment and take all other steps which may be necessary to insure that all Contract monies, the Site and the Work, and every part thereof, shall be and remain at all times free from and not liable to any lien or charge at law or in equity, or to any claim of liability under the *Builders Lien Act*, or to any attachment for debt, garnishee process or otherwise, and the Contractor and its sureties, as well as its respective executors, administrators, successors and assigns, shall fully indemnify and save harmless the Owner and all its officers, servants and employees from any and all such liability, and shall, on demand, immediately cause any such lien, charge, claim or attachment to be removed or released from the records of any Land Title Office or court in which the same may appear.

Notwithstanding anything to the contrary contained in the Contract Documents, the Owners shall not be obliged to pay any monies to the Contractor if and for so long as any liens exist against the Work or the Site.

### GC.64 PATENT INFRINGEMENT

The Contractor shall fully indemnify the Owner against and from all suits or actions arising from the claim of any person or persons who are or claim to be patentees of any process used in connection with the Work or of any material, Products, Plant, machinery, tool or appliance used therein or thereon, or in any way therewith.

### GC.65 MONEY DUE TO OWNER

All money payable to the Owner by the Contractor may be retained out of any money then due, or which may become due from them to the Contractor under this or any other contract with the Owner, or otherwise howsoever, or may be recovered from the Contractor and its sureties, or any of either of them, in any Court of competent jurisdiction, as a debt due to them; and the Engineer shall have full power to withhold any estimate or certificate, if circumstances arise which may indicate to him the advisability of so doing, until the Engineer is satisfied that the Work and material so far done or furnished are in accordance with the Contract and that the Contractor is otherwise entitled thereto, though the sum to be retained may be unascertained.

#### GC.66 ASSIGNMENT

The Contractor shall not, without the consent in writing of the Owner first had and obtained, assign or transfer any sum or sums, or any part thereof, due or to become due to the Contractor under the Contract, or assign, transfer or sublet any portion of the Contract or of the Work but must carry out the Work with its own men or subcontract under the Contractor's supervision. This Section however does not apply to the furnishing of material for the different parts of the Work, for which material, however, the Contractor will be held strictly responsible, and no excuse for the quality of the material or for the non-delivery in good time by any Subcontractor, as affecting the progress of the Work, will be entertained, nor will the Owner's consent to the assigning, transferring or subletting of any portion of the Work relieve the Contractor from any of its obligations or liabilities under the Contract. No assignment, transfer or subletting hereinbefore mentioned, except if the same is made in accordance herewith, shall be in any manner valid or binding on the Owner.

#### GC.67 CERTIFICATES AND PAYMENTS

## 1. Payment Certifier

The Engineer shall be the "payment certifier" and the person responsible for payment certification under the Contract for the purposes of the *Builders Lien Act*, if and to the extent applicable, and shall otherwise be responsible for certifying payments in accordance herewith. The Engineer will not be the "payment certifier" under any subcontract.

#### 2. Certificate for Substantial Performance

- (a) The Contractor shall give written notice to the Engineer that the Work is substantially performed, and, upon subsequent inspection by the Engineer, a list of deficient work shall be issued to the Contractor by the Engineer. When these deficiencies have been rectified to the satisfaction of the Engineer, the Engineer shall recommend that the Work is substantially performed and ready for official inspection. At the time of the application for a Certificate of Substantial Performance, the Contractor shall deliver up to, and to the complete satisfaction of the Engineer:
  - (i) the "as constructed record plans" of the Work required by GC.19 Record Plans:
  - (ii) documentation showing compliance with WorkSafeBC requirements; and
  - (iii) a sworn declaration in a form acceptable to the Engineer that all amounts relating to the Work, due and owing as of the end of the month covered by Section 5.3 of the Form of Agreement to third parties including all Subcontractors and suppliers, have been paid.
- (b) The Owner, the Engineer and the Contractor shall inspect the Work and any remaining deficiencies shall be detailed and included on the Certificate of Substantial Performance. The date of Substantial Performance shall be as stated in this Certificate. Upon issuance of the Certificate of Substantial Performance to the Contractor, the Engineer shall set a reasonable date for the Total Performance of the Work.
- (c) For the purposes of the *Builders Lien Act* (to the extent applicable), the Certificate of Substantial Performance as described herein shall serve as the Contract's certificate of completion, and the date of Substantial Performance stated in the Certificate shall be deemed to be the date of the Certificate's issuance.

#### 3. Certificate of Total Performance

Upon the provision of satisfactory evidence that the deficiencies have been rectified, the Owner and the Engineer will then be permitted to verify such rectification. Upon rectification of all claims and the receipt of statutory declarations as specified in Section 4(b) of GC.67 to the reasonable satisfaction of the Engineer, the Engineer will issue the Certificate of Total Performance.

### 4. Statutory Declarations

The Contractor shall submit with each of the Contractor's applications for payment such statutory declarations as may be required herein, which shall be sworn in duplicate by the Contractor, or by such person on behalf of the Contractor as the Engineer may approve.

(a) Prior to payment and as condition to any payment, the Engineer may at any time require the Contractor to file with the Engineer a statutory declaration showing that all wages for the various classes of labour, the hire of trucks, equipment, etc., employed in or about the Site, all Products or other things supplied for use in or upon the Work and amounts due to Subcontractors and suppliers have been paid and satisfied and that there is no encumbrance, lawful claim or lien accruing for labour or services in connection with the Work.

Should any amounts be due and unpaid for wages, equipment, hire, Products and Subcontractors or suppliers as above listed or any encumbrance, lawful claim or lien accrue, the amounts shall be listed on a duly attested statement, in duplicate, and attached to the statutory declaration referred to above.

The Engineer may at any time, if the Engineer deems it advisable, require from the Contractor a statement showing the rates of wages paid by the Contractor for the various classes of labour, the rates of hire of trucks and equipment employed and the prices and quantities of any Products supplied for use in or upon the Work and may also require the statement to show in detail the names of unpaid employees, the rates of wages and amounts due to each, and the names of creditors, quantities, prices and amounts due to each. Such statement shall be duly attested in duplicate as above and be a condition precedent to the right of the Contractor to receive payment.

(b) Prior to final payment and as a condition to issuance by the Engineer of a Certificate of Total Performance, the Contractor shall file with the Engineer a statutory declaration showing that all Work in respect of the Contract has been completed; all accounts, detailed in the first sentence of Section 4(a) of this General Condition have been paid and satisfied and there is no encumbrance, lawful claim or lien accruing for labour, products or services in connection with the Work; and payments already received and now due under the final payment application are accepted by the Contractor as full compensation for everything furnished and done by the Contractor under the Contract.

#### 5. Other Documentation

The Engineer may as a further condition to any payment, at any time, require the Contractor to furnish such or other detailed information as may be necessary to establish to the Engineer's satisfaction the compliance by the Contractor with the conditions of the Contract.

#### 6. Books Open for Inspection

The Contractor's payrolls, time-books, books of account, invoices, receipt and statements relating to its Work under the Contract shall be at all times open for inspection and extract by the Engineer and the Owner and any authorized representative of them.

#### GC.68 TERMINATION OF CONTRACT WITHOUT DEFAULT OF CONTRACTOR

The Engineer may, as agent for and on behalf of the Owner, at the Engineer's discretion terminate the Contract at any time upon written notice to the Contractor notwithstanding the fact that the Contractor may not then be in default, in which event the Owner shall be liable to the Contractor only for a reasonable amount for Work done and materials delivered at or to the Site up to the date of the termination.

Upon payment of the aggregate of the aforesaid sums, the Owner, the Engineer and the Contractor shall be released from their liabilities or obligations under the Contract save and except that the liabilities and obligations of the Contractor shall continue with respect to deficiencies and warranties in the portion of the Work completed prior to termination.

#### GC.69 TERMINATION OF CONTRACT FOR CONTRACTOR'S DEFAULT

The Engineer as agent for and on behalf of the Owner, without prejudice to any other right, may elect to terminate the Contract forthwith upon notice to the Contractor if:

- (a) the Contractor fails to comply with the Notice to Proceed;
- (b) the Contractor commits an act of bankruptcy or becomes a bankrupt or makes a general assignment for the benefit of the Contractor's creditors;
- (c) a receiver is appointed for the Contractor's business;
- (d) the Contractor fails, on reasonable notice from the Engineer, to supply enough proper workmen or Products;
- the Contractor does not pay promptly the Contractor's employees, Subcontractors or suppliers;
- the Contractor does not comply with the requirements of the WorkSafeBC Regulations, or otherwise fails to meet the safety requirements of the Contract; or
- (g) the Contractor persistently or substantially breaches any provision of this Contract.

On such termination the Engineer may arrange for the performance of the Work by whatever method the Engineer deems expedient but without undue delay or expense.

The Engineer may take possession of all Products, equipment, tools, structures and appliances belonging to or provided by the Contractor located on the Site which the Engineer deems necessary to prosecute the Work which possession the Contractor hereby pledges to the Engineer as agent for and on behalf of the Owner, as security for the performance of the Contract and the Work, provided that upon completion of the Work the Engineer shall return to the Contractor or its legal representative any such chattels so taken in possession in their original condition (ordinary wear and tear excepted) if not incorporated in the Work, without any compensation for use thereof.

In case the Work or any part thereof is assumed from the Contractor, as herein provided, it shall in no way affect the relative obligations of the Owner and the Contractor or its sureties in

respect of the Contractor's or their obligation, or in respect of the remainder of the Work (if any), as the Engineer may consider reasonable. The Contractor and its sureties in every case shall be liable for such damages, expenditures and extra expenditures, and for all additional cost of the Work which may be incurred by reason of termination of the Contract pursuant to this GC.69, together with the compensation for liquidated damages, if any, from the date fixed for the Total Performance of the Work, and the same may be deducted or collected by the Owner as provided by GC.65.

All the powers of the Engineer with respect to the determination of any doubts, disputes and differences, and the determination of the sum or sums, or balance of money to be paid to or received from the Contractor, and otherwise in respect of the Contract shall nevertheless continue in force.

The fulfilment by the Contractor of any stipulation in the Contract may be enforced by legal proceedings and judgement, or order of Court, without prejudice to any other remedy herein contained. Neither the Owner nor any of its officials, officers, employees or other agents shall be liable or accountable to the Contractor in any way for the manner in which, or the price at which the Work, or any portion thereof, may have been or may be done or completed by the Owner.

No proceeding taken pursuant to this GC.69 or pursuant to any other provision of the Contract, shall at any time be deemed to be an assignment of the Contract or of any portion thereof, unless otherwise agreed to in writing.

#### GC.70 SUBMITTALS

The Contractor shall submit Product data and samples to the Engineer for review on request. The Contractor's responsibility for deviation in submittals is not relieved by the Engineer's review unless the Engineer gives written acceptance of specific deviations from the requirements of the Contract Documents. The Contractor shall make any changes in submittals which the Engineer may request consistent with the Contract Documents and shall resubmit as directed by the Engineer. The Contractor shall not proceed with work until relevant submittals have been reviewed by the Engineer. The Contractor shall co-ordinate submittals with the requirements of the Contract Documents and shall allow 14 calendar days for the Engineer's review.

#### GC.71 NON-RESIDENT WITHHOLDING TAX

If the Contractor is, at any time, a non-resident of Canada, within the meaning of the *Income Tax Act* (Canada) as amended, then, and the Contractor hereby so agrees, the Owner may deduct from all money payable under the Contract and remit to the Receiver-General of Canada, the Government of Canada or the Canada Revenue Agency sums required to be withheld and remitted by the *Income Tax Act* (Canada), as amended.

The Owner will receive a further credit under the Contract for money withheld as of and from the date of the withholding (regardless of when or whether remitted) and no interest will be payable by the Owner on sums withheld, not remitted as aforesaid and later paid directly to the Contractor.

#### GC.72 RELEASE AND INDEMNIFICATION

The Contractor now releases the Owner, its officers, officials, employees and agents from all costs, Losses, damages and expenses, including those caused by personal injury, death, property damage, loss and economic loss arising out of, suffered or experienced by the

Contractor, its Subcontractors, and their respective officers, employees and agents, or suffered or experienced by any other entity or person in connection with the performance of the Work.

Despite the provision of insurance coverage by the Owner, the Contractor hereby agrees to indemnify and save harmless the Owner, its successors, assigns and authorized representatives and each of them from and against Losses, claims, damages, actions, and causes of actions that the Owner may sustain, incur, suffer or be put to at any time either before or after the expiration or termination of the Contract, that arise out of the acts of the Contractor, its Subcontractors, or their respective officers, employees or agents under the Contract.

This indemnity will not affect or prejudice the Owner from exercising any other rights that may be available to it at law or in equity.

The release and indemnity set out above will survive the expiry or sooner termination of the Contract.

#### GC.73 NO PROMOTION OF RELATIONSHIP WITH THE OWNER

The Contractor shall not disclose or promote its relationship with the Owner, including by means of any verbal declarations, announcements, sales, marketing or other literature, letters, client lists, press releases, brochures or other written materials ("Communications") without the express prior written consent of the Owner (except as may be necessary for the Contractor to perform the Contractor's obligations under the terms of the Agreement). The Contractor shall not use the Owner's logo or any of the Owner's official marks without the express prior written consent of the Owner.

#### GC.74 LIVING WAGE

#### Definitions

For the purposes of this GC.74, the following terms shall have the following meanings:

- "Living Wage" means the hourly wage established by the Living Wage Certifier from time to time, which includes: (i) direct wages; and (ii) the value of any non-mandatory benefits such as paid sick leave, employer-paid Medical Services Plan premiums and extended health benefits;
- (b) "Living Wage Certifier" means the Living Wage for Families Campaign, any successor entity, or, in the event the Living Wage for Families Campaign ceases to carry on operations, such other living wage certification entity designated by the Owner to the Contractor in writing;
- (c) "Living Wage Employee" means any and all employees of the Contractor and all Subcontractors of the Contractor that perform any part of the Work on a property owned by or leased to the Owner, including all streets, sidewalks and other public rights of way, for at least one consecutive hour, but excluding Students, volunteers and employees of Social Enterprises;
- (d) "Social Enterprise" means a business that: (i) is owned by a non-profit organization or community services co-operative; (ii) is directly involved in the production and/or selling of goods and services for the combined purpose of generating income and achieving social, cultural, and/or environmental aims; and (iii) has a defined social and/or environmental mandate; and

(e) "Student" means an individual who is enrolled in a school, college, university or other educational institution and is employed by the Contractor or a Subcontractor, as the case may be, to obtain practical workplace experience as a requirement of or credit for their education.

### 2. Payment of Living Wage

- (a) Notwithstanding any other provision of any Contract Document but subject to GC.74(2)(b), the Contractor shall pay all Living Wage Employees not less than the Living Wage.
- (b) Notwithstanding GC.74(2)(a), the Contractor has up to 6 months from the date on which any increase in the Living Wage is published by the Living Wage Certifier to increase wages for all Living Wage Employees such that all Living Wage Employees continue to be paid not less than the Living Wage.
- (c) The Contractor shall ensure that the requirements of GC.74(2) apply to all Subcontractors.
- (d) A breach by the Contractor of its obligations pursuant to GC.74(2)(a) and (c) shall be deemed to constitute a failure by the Contractor to comply with the requirements of the Contract to a substantial degree and shall entitle the Owner to terminate the Contract in accordance with GC.62.
- (e) The Contractor shall maintain up-to-date records and accounts which clearly document its satisfaction of the requirements of this GC.74 and shall make the same available to the Owner upon request. The Owner may request copies of all such records and accounts which shall be provided to the Owner by the Contractor (subject to reimbursement of the Contractor's reasonable copying costs and any other direct costs and expenses, if any) at any time prior to the expiry of 365 days after Total Completion of the Work or earlier termination of this Agreement. Any records and accounts provided by the Contractor in accordance with this Section GC.74(2)(e) shall be treated by the Owner as confidential information.
- (f) The Contractor shall, at the direction of the Owner, post signs at Sites that are owned by or leased to the Owner, including all streets, sidewalks and other public rights of way, informing Living Wage Employees of the obligations of the Contractor and Subcontractor pursuant to this GC.74 and providing contact information to report any breaches thereof. The Owner shall supply the Contractor with all such signs and the Contractor shall return all such signs upon completion of the Work or otherwise at the request of the Owner.
- (g) The Contractor shall prepare and submit to the City in a format reasonably acceptable to the City before January 31 of each calendar year of the term or, for each partial calendar year of the term, within 30 days of the expiry of the term a living wage report setting out:
  - (i) the number of Living Wage Employees of the Contractor and each Subcontractor who were paid a Living Wage pursuant to this Section 3.12 during the previous calendar year or portion thereof that would not have received a Living Wage for substantially similar work but for the obligations of the Contractor pursuant to this GC.74; and

(ii) the total incremental costs incurred by the Contractor, including any amounts paid to Subcontractors, in order to fulfill its obligations pursuant to this GC.74 to pay a Living Wage to the Living Wage Employees described in GC.74(e)(i).

## **SCHEDULE 2**

## **SPECIFICATIONS AND DRAWINGS**

The following is a list of the Specifications:

<ul> <li>PS201</li> </ul>	80617 - Sewer	· Standard	Construction	Specifications	- 2018-04-01
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0	Section 01310	Construction Schedule
0	Section 01340	Shop Drawings, Product Data and Samples
0	Section 01400	Quality Control
0	Section 01535	Temporary Facilities
0	Section 01561	Environmental Protection
0	Section 01570	Traffic Regulation
0	Section 01721	Project Record Documents
0	Section 02104	Shrub and Tree Preservation
0	Section 02210	Site Grading
0	Section 02221	Rock Removal
0	Section 02223	Excavation, Trenching, Backfill and Surface Restoration
0	Section 02226	Aggregates and Granular Materials
0	Section 02236	Controlled Density Fill
0	Section 02242	Dust Control
0	Section 02523	Concrete Walks, Curbs and Gutters
0	Section 02725	Manholes and Catchbasins
0	Section 02731	Sewers
0	Section 03200	Concrete Reinforcement
0	Section 03300	Cast-in-Place Concrete

• PS20180617 - Water Standard Construction Specifications - 2018-04-01

0	Section 01310	Construction Schedule
0	Section 01340	Shop Drawings, Product Data and Samples
0	Section 01535	Temporary Facilities
0	Section 01561	Environmental Protection
0	Section 01570	Traffic Regulation
0	Section 01721	Project Record Documents
0	Section 02104	Shrub and Tree Preservation
0	Section 02210	Site Grading
0	Section 02221	Rock Removal
0	Section 02223	Excavation, Trenching, Backfill and Surface Restoration
0	Section 02226	Aggregates and Granular Materials

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 2 -SPECIFICATIONS AND DRAWINGS

0	Section 02230	Hot-Mix-Asphalt for Surface Restoration
0	Section 02523	Concrete Walks, Curbs and Gutters
0	Section 02742	Waterworks
0	Section 02921	Topsoil and Finish Grading
0	Section 02938	Sodding
0	Section 03300	Cast-in-Place Concrete

## The following is a list of the Drawings:

	3	3
•	DB3747 -	SITE PLAN, DRAWING INDEX
•	DB3747-A7 -	W 39TH AVENUE - FROM TRAFALGAR ST TO LANE EAST OF TRAFALGAR ST
•	DB3747-C1 -	W 42ND AVE - FROM LANE EAST OF DUNBAR ST TO COLLINGWOOD ST
•	DB3462C-	W 43RD AVE - FROM LANE TO COLLINGWOOD ST
•	DB3462C -	W 43RD AVE - FROM COLLINGWOOD ST EAST TO BLENHEIM ST
•	DB3747-SE1 -	TYPICAL SECTIONS
•	DB3747-SE2 -	TYPICAL SECTIONS
•	AB 1824	W42ND AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 1
•	AB 1824	W42ND AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 2
•	AB 1825	W43RD AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 1
•	AB 1825	W43RD AVE - FROM DUNBAR ST TO BLENHEIM ST - SHEET 2

• DB3748-DE1 - TIE-IN DETAILS

City of Vancouver - Sewer Standard Detail Drawings - 2018-04-01

• City of Vancouver - Water Standard Detail Drawings - 2018-04-01

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 3 - SCHEDULE OF QUANTITIES AND PRICES

## **SCHEDULE 3**

## SCHEDULE OF QUANTITIES AND PRICES

[To be added from Contractor's Tender.]

#### **SCHEDULE 4**

#### CONSTRUCTION SCHEDULE

The Construction Schedule shown in Schedule 4 shall be the basis for the Contractor's Construction Schedule as detailed in GC.10 of the General Conditions and further specified in City of Vancouver - Construction Specifications, Section 01310 "Construction Schedule".

The breakdown of the Construction Schedule shall:

- (a) be submitted in the form of a Critical Path Method bar chart in the form contained in the Contract or other form approved by the Engineer;
- (b) include an estimate of the percentage of the Works which will be completed at the end of each week during the Contract showing separately work to be performed on the Site and off the Site including off the Site manufacture and delivery and the inter-relationship to the work on the Site;
- (c) show the estimated monthly payments and manpower requirements; and
- (d) show any other information reasonably required by the Engineer.

Anything contained in the Construction Schedule that conflicts with the General Conditions or City of Vancouver - Construction Specifications, Section 01310 "Construction Schedule" will be invalid to the extent of the conflict.

## INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 5 - SUBCONTRACTORS AND SUPPLIERS

### **SCHEDULE 5**

#### SUBCONTRACTORS AND SUPPLIERS

#### **SUBCONTRACTORS**

The Contractor has provided the following list of the work packages proposed to be Sub-contracted, together with the Sub-contractors proposed to be used for the performance of each of the work packages.

[To be added from Contractor's Tender.]

### SUPPLIERS (THESE ARE ALSO "SUBCONTRACTORS" FOR PURPOSES OF THE CONTRACT).

The intended sources and suppliers of all major materials to be incorporated in the Works are listed below.

[To be added from Contractor's Tender.]

No Subcontractor or Supplier listed in Schedule 5 shall be replaced without the written consent of the City, which consent shall not be unreasonably withheld.

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 6 - PERFORMANCE AND LABOUR AND MATERIAL PAYMENT BONDS

## **SCHEDULE 6**

## PERFORMANCE AND LABOUR AND MATERIAL PAYMENT BONDS

[To be attached.]

## **SCHEDULE 7**

## **INSURANCE CERTIFICATES**

[To be attached.]

#### **SCHEDULE 8**

#### **INSURANCE**

#### 1. All Risk Course of Construction Insurance

### (a) Coverage

"All Risks" of physical loss or damage.

### (b) Property Insured

#### (i) At Site

All materials, equipment and machinery, labour and supplies of any nature whatsoever, Work in progress, including property of the insured or of others for which the insured may have assumed responsibility, to be used in or incidental to the Site preparations, demolition or existing structures, erection and/or fabrication and/or reconstruction and/or repair of the project insured, commencing when the property becomes at the insured's risk, at the Site, and while there awaiting, during and subsequent to erection and/or fabrication and/or repair and/or testing.

### (ii) Transit

Property to enter into and form a part of the project insured, from the commencement of loading at the original point of shipment anywhere in Canada or the continental United States of America, but excluding such property in the course of manufacturing or processing within buildings at the manufacturer's or supplier's site.

#### (iii) Off-Site

Off-Site coverage shall apply to property that is to be incorporated into and form a part of the project insured, anywhere in Canada or the Continental United States of America, but excluding such property while in transit or in the course of manufacturing or processing within buildings at the manufacturer's or supplier's site.

#### (c) *Insureds*

The Owner, the Contractor, and their respective officials, officers, employees and agents.

#### (d) Term

During the period of the construction operations and also during any period in which the property insured is being prepared for use and while partially used or occupied; provided all coverage shall cease when the Work has been formally accepted as complete by the Owner, whichever shall first occur.

#### (e) Limit and Deductibles at Site

(i) Limit of Liability: Full replacement value of the Work

(ii) Deductible not to exceed \$5,000.

## 2. "Wrap Up Liability Insurance"

### (a) Insureds

The Owner, the Engineer, the Contractor, and all Subcontractors, and their respective officials, officers, employees and agents.

### (b) Limits

Bodily injury liability and property damage liability including aggregate products and completed operations: \$5,000,000 for each occurrence.

### (c) Extensions of Coverage

- (i) Broad form products and completed operations liability, including coverage for activities of the Contractor and Subcontractors during the completed operations period;
- (ii) Owner's and contractor's protective liability;
- (iii) Blanket contractual liability;
- (iv) Contingent employer's liability;
- (v) Personal injury liability;
- (vi) non-owned automobile liability;
- (vii) Cross liability or severability of interest clause;
- (viii) Employees as additional insureds;
- (ix) Blasting, collapse, underpinning, shoring, pile driving, dredging or grading activities;
- (x) Loading and unloading of automobiles;
- (xi) Hoist liability;
- (xii) Unlicensed and specially licensed vehicles;
- (xiii) Operation of attached machinery;
- (xiv) Limited pollution liability arising out of hostile fire and sudden and accidental release of contaminants.

### (d) Deductibles

Deductible not to exceed \$5,000.

#### (e) Cross Liability

The insurance shall apply to any action brought against any one of the insureds by any other insured in the same manner as though separate policies were issued to each.

### (f) Term

Period of construction or completion of the Work, whichever shall first occur, plus 24 months for completed operations liability thereafter.

### (g) Waiver of Subrogation

It is understood and agreed that in the event of a loss and upon payment of claim hereunder, the insurer will waive the any right of subrogation against the Owner, the Engineer and all architects, engineers or consultants engaged in or connected with the construction and Site preparation and related operations of the Work and any of their servants, agents, employees, and parent, subsidiary, affiliated or associated firms.

#### 3. Automobile Insurance

A standard owner's form automobile policy for licensed vehicles providing third party liability and accident benefits insurance as provided by the Insurance Corporation of British Columbia (Autoplan) in accordance with applicable British Columbia law, with the minimum limits as follows:

Bodily injury and property damage (third party limit) inclusive limit: \$5,000,000.

#### 4. Contractor's Equipment Insurance

"All Risk" insurance with insurers acceptable to the Owner, covering all construction equipment, owned or rented, or for which the Contractor or any of its Subcontractors may be responsible. In the event of loss or damage to the said construction equipment, or any part thereof, the Contractor or the Subcontractor, as the case may be, shall, if so requested by the Owner in writing, forthwith replace such damaged or destroyed construction equipment.

It is understood and agreed that in the event of a loss and upon payment of claim hereunder, the insurer will waive any right of subrogation against the Owner, the Engineer and all architects, engineers or consultants engaged in or connected with the construction and Site preparation and related operations of the Work and any of their servants, agents, employees, and parent, subsidiary, affiliated or associated firms.

#### **SCHEDULE 9**

## FORCE ACCOUNT LABOUR, EQUIPMENT, MATERIAL & SUBCONTRACTOR RATES

### TABLE 1 - SCHEDULE OF LABOUR RATES

[To be added from Contractor's Tender.]

### TABLE 2 - SCHEDULE OF EQUIPMENT RATES

[To be added from Contractor's Tender.]

Labour and equipment rates must be inclusive of all taxes  $\underline{\text{except for GST}}$ , and all assessments, benefits, small tools, overhead and profits.

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 10 - LABOUR FORCE AND WORKING HOURS

## **SCHEDULE 10**

## LABOUR FORCE AND WORKING HOURS

[To be added from Contractor's Tender.]

## **SCHEDULE 11**

## **CASH FLOW FORECAST**

Intentionally deleted.

## INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 12 - CONTRACTOR'S KEY PERSONNEL

### **SCHEDULE 12**

### CONTRACTOR'S KEY PERSONNEL

Details of the Contractor's Key Personnel and its Sub-contractor's Key Personnel are set out below.

[To be added from Contractor's Tender.]

No Key Personnel listed in Schedule 12 shall be replaced without the written consent of the City, which consent shall not be unreasonably withheld.

## INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 13 - STATEMENT OF MAJOR PLANT & EQUIPMENT

### **SCHEDULE 13**

### STATEMENT OF MAJOR PLANT & EQUIPMENT

The Contractor has provided a statement of its major items of constructional plant necessary for the performance of the Works and this is set out below.

[To be added from Contractor's Tender.]

### INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 14 - CONTRACTOR'S METHODOLOGY

#### **SCHEDULE 14**

#### CONTRACTOR'S METHODOLOGY

The Contractor's methodology provided in this Schedule is required to be consistent with the other requirements of the Contract.

Where any inconsistency whatsoever occurs between the Contractor's methodology as included in Schedule 14 and any other requirements of the Contract as stated outside of Schedule 14, then the other Contract requirements as stated outside of Schedule 14 shall take precedence and the Contractor's methodology shall be struck out at the absolute discretion of the Engineer.

Failure by the Contractor to identify and notify such discrepancies shall not affect the Engineer's right to strike out any part of the Contractor's methodology which in the Engineer's view is inconsistent with the other requirements of the Contract. Where the Engineer has struck out any part of the Contractor's methodology in accordance with this provision, the Contractor shall perform the Works as Directed by the Engineer and in accordance with the Contract other than the part of Schedule 14 struck out by the Engineer.

[To be added prior to contract execution, upon approval by the Engineer.]

### INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 15 - SUPPLEMENTARY GENERAL CONDITIONS

#### SCHEDULE 15

#### SUPPLEMENTARY GENERAL CONDITIONS

#### SGC1. HOURS OF WORK

Notwithstanding GC.12, the Owner's staff/crews and contracted consultants are shutdown from 3:30 p.m. on 21 December 2018 to 7:30 a.m. on 07 January 2019; as such, Work will not be performed within this period except by special arrangement agreed to by the Engineer or in case of an emergency. Work performed in the absence of a required inspection is not permitted.

### SGC2. PROGRESS PAYMENTS

Notwithstanding Article 5 of the Form of Agreement, the Contractor shall not make application for payment, and the Owner is not obliged to make payment, for Work done until each section of sewer main, as described in the Form of Tender, has been installed, pressure tested, services have been changed over and the old sewer main has been abandoned, all in accordance with the Contract Documents.

#### SGC3. SCOPE OF WORK

These Contract Documents shall cover all phases of construction for this Tender.

The work to be done by the Contractor for this Tender shall include the supply of all materials and the furnishing of superintendence, overhead, labour, equipment, tools, supplies and all other things necessary for and incidental to the satisfactory performance and completion of all work as shown on the Drawings and herein specified.

The work shall be done in accordance with the Contract Documents and to the satisfaction of the Engineer. For inspection purposes, the Contractor shall coordinate its work with the Engineer. The Contractor shall have no cause for claim against the City whatsoever with respect to delays or other interruption of its work by City forces or due to the above requirement to coordinate its work with the Engineer.

#### SGC4. LAYING OUT THE WORK

The Contractor shall lay out the Work and establish all stakes, lines, and elevations to the satisfaction of the Engineer. The Contractor may have to modify the alignment and elevation of the Work to suit the as-built location of existing City sewers and watermains to which it will be connecting. The Contractor shall assume full responsibility for the alignment, dimensions, and elevations of each and every part of the Work and their mutual agreement, notwithstanding any other provision of the Contract Documents.

### SGC5. STOCKPILING OF EXCAVATED MATERIALS OR BACKFILL MATERIALS

Notwithstanding GC.41, The Contractor shall not stockpile any backfill or excavated material upon any portion of the Site including any street, laneway, sidewalk, boulevard, grass plot, or other City or public property, for a duration longer than two (2) calendar days. And under no circumstances shall any such material remain on Site over the period of any weekend. As such, the Contractor must schedule its truck haulage movements accordingly to achieve this requirement.

Where the Contractor does not comply with this requirement, then the Engineer may organize for such material to be removed from the Site at the expense of the Contractor.

### INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 15 - SUPPLEMENTARY GENERAL CONDITIONS

#### SGC6. EDGE PROTECTION OF OPEN EXCAVATIONS

The Contractor shall supply, erect and maintain hard-barricading or laterally restrained fencing, to a minimum height of two (2) metres, around all open excavations, regardless of depth of excavation, at the end of each shift prior to leaving the Site each day.

The Contractor shall not leave any excavation open, regardless of depth of excavation, over the period of any weekend. The Contractor shall schedule its work accordingly as to have all trenches backfilled and compacted prior to the end of the shift of the last working day of the week.

### SGC7. TEMPORARY SURFACE RESTORATION

The Contractor shall supply and install a temporary asphaltic repair (50mm minimum thickness) which is suitable for use by traffic, on any roadway or lane (including sidewalks, boulevard crossings, etc.) subject to vehicular or pedestrian traffic until permanent repairs have been made, and at the sole discretion of the Engineer. It shall be constructed in accordance with the PS20180617 - City of Vancouver - Street Restoration Manual (rev. August 2008) as per Section 02512, "Hot Mix Asphalt Concrete Paving", and shall be maintained in a safe condition at the expense of the Contractor. Gravel surfaced repair flush with the surrounding pavement may be acceptable in specific applications with the express written consent of the Engineer.

The temporary asphaltic repair shall be constructed and established continuously as work progresses and at no time shall a gravel surface remain unsurfaced for a period greater than ten (10) calendar days.

#### SGC8. NO PARKING SIGNS

The contractor must provide 72 hours' notice to the Engineer for erection or relocation of temporary no parking or no stopping signs. Parking regulation signage placed by the contractor is unenforceable.

#### SGC9. METRIC MEASUREMENTS AND CO-ORDINATION

The Work has been designed using metric dimensions. All linear dimensions have been expressed in millimetres in whole numbers (without decimal parts) and in metres with fractions thereof. The unit "mm" for millimetres has been deleted from the dimensioning of the drawings.

Within the Specifications, the unit symbols for all metric units are included. Also, the decimal parts have been included in the Specifications where Products have been "soft converted" (i.e., when the dimensions of the Product remain the same as they are at present but are expressed in metric equivalent units). Dimensions for spacing of Products have been expressed in millimetres in whole numbers in both the Specifications and Drawings.

As a general rule, all dimensioning of Products and equipment has been "soft converted". Exceptions to this rule are certain Products which are presently available in metric sizes and have been "hard converted"; i.e., where the Product itself is manufactured to rational metric dimensions.

Where "hard conversion" Products have been specified and are available they will be supplied.

## INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 15 - SUPPLEMENTARY GENERAL CONDITIONS

Care is required to ensure coordination of imperial and metric Products and in dimensioning and, in this regard, the Contractor will be entirely responsible for metric co-ordination of its Work.

The Contractor will ensure that all persons employed in the Work know how to use the metric system of measurement, and that they use metric references and measuring devices.

#### **SCHEDULE 16**

#### OWNERS LIST OF KNOWN WORKPLACE HAZARDS

CONTRACT TITLE: CONSTRUCTION OF VANCOUVER WEST SEWER SEPARATION - PACKAGE #2

PROJECT MANAGER (CITY EMPLOYEE): <u>BOB DEVLIN</u>
CONTRACT NAME & # (IF KNOWN): PS20180617

### **Purpose**

This document shall be completed by the project manager, who shall list all the <u>known</u> worksite hazards and all the <u>existing</u> work process hazards that will be associated with the upcoming contract. The completed document shall then be provided to all potential contractors, as part of the tender package, so the project can be bid appropriately based on the known worksite hazards.

#### **Definitions**

**Project Manager** - the City employee designated to be the liaison with the contractor for the purpose of managing, overseeing, coordinating or in any other way administering the contract.

### **Instructions for Completion**

The document must be completed in full. Choices for each entry are:

Y - Yes - the known worksite hazard or existing work process hazard does exist

N - No - the known worksite hazard or existing work process hazard does not exist\*

NA - Not Applicable - worksite hazard or existing work process is not applicable for this contract type

TBD - a third party (environmental consultant) will address the issue (primarily for a hazardous materials assessment)

\*based on reasonable estimation from all input by persons with expertise or relevant knowledge and understanding

#### Information from Hazardous Materials Assessments Provided by a Third Party

A hazardous materials assessment may be completed prior to the Project Manager completing the Owners List of Known Workplace Hazards. Any such assessment should be referenced by the Project Manager in this document and provided with the tender package. Hazardous materials may include asbestos, lead, crystalline silica, ammonia, PCB's, CFC's, moulds, mercury, ozone depleting substances (ODS), radioactive substances.

#### Assistance in Completing this Document

If you have questions while completing this document, or are unsure if the listed hazards apply, please seek assistance from Health and Safety (604.871.6078 or healthandsafety@vancouver.ca).

HAZARD OR ISSUE	Project Manager
1. ASBESTOS-CONTAINING MATERIALS - disturbance or penetrations of flooring, walls, ceiling tiles, pipe lagging, ac pipe, transite siding, particularly in older facilities; e.g., furniture/fixture installation, carpeting/flooring services, and boiler repair/tune-up services.	Yes (Y) No (N) Not Applicable (NA)
a) Asbestos containing materials (ACM) will be encountered	N
b) A hazardous materials assessment for asbestos is provided in the tender package	N
c) A hazardous materials assessment for asbestos is the responsibility of the contractor	Y

2. LEAD-CONTAINING MATERIALS - disturbance of lead-based paint, particularly in older facilities. Also present in certain electrical circuitry and metal alloys; .e.g., overhead bridge crane maintenance/repair, high-voltage cable splicing services, boiler repair/tune-up services, fixture installation services, and chiller maintenance/repair services.	
a) Inorganic lead-containing materials may be encountered	NA
b) A hazardous materials assessment for lead is provided in the tender package	NA
c) A hazardous materials assessment for lead is the responsibility of the contractor	NA

3. OTHER HAZARDOUS MATERIALS - may include ammonia, PCBs, CFCs, moulds, mercury, ozone depleting substances (ODS), radioactive substances, sewage, unknown contaminated materials, other: (list other here)	Yes (Y) No (N) Not Applicable (NA) To Be Determined (TBD)
a) A hazardous materials assessment for ammonia is provided in the tender package	NA
b) A hazardous materials assessment for (list the specific hazardous material) will be provided in the tender package	N
c) A hazardous materials assessment for (list the specific hazardous materials) will be the contractors responsibility	Y

4. (	CONFINED SPACES - working in vaults, chambers, pits, tanks, etc.; e.g., construction, inspection and testing services, water/fuel storage tank clean-out services, and utility corrosion inspection services.	Yes (Y) No (N) or Not Applicable (NA)
a)	A hazard assessment (for entry and inspection only) from the City of Vancouver is provided in the tender package	Y
b)	The City of Vancouver shall provide procedures to isolate adjacent piping, or to lock out equipment (complicated systems only)	N
c)	The contractor shall be responsible for isolation and lockout procedures in the confined space	Υ

5. LOCK OUT - industrial equipment maintenance, power machinery repair services, pump maintenance/repair services, mechanical refrigeration systems, elevator repair, overhead bridge crane maintenance/repair services, cathodic protection services, hydraulic test systems repair/service, and air compressor rebuilding services.		Yes (Y) No (N) or Not Applicable (NA)
a)	Lockout will be required to isolate or prevent the unexpected release of energy (electrical, mechanical, hydraulic, chemical, thermal, kinetic, gravitational, pneumatic)	Y
b)	Work will be performed on or near energized equipment, lines, or circuits	Υ

If yes to a) or b) describe:

Existing water sy	<u>/stem wiii</u>	be in service	(pressurizea)	auring wori	KS. LOCK OU	t requirea	auring	wate
installation work	S.		•			-		
								_

6. FALL PROTECTION - tree pruning, window and ledge cleaning, window replacement, overhead bridge crane maintenance/repair services, roll-up door replacement, tent installation, awning/canopy installation, overhead air exchange installation, construction inspection and testing services.	Yes (Y) No (N) or Not Applicable (NA)
a) Workers will be exposed to a potential fall in excess of 3 m (10 feet), or to a fall of less than 3 m which would likely result in a serious injury (ex. impalement on rebar)	Υ
b) Scaffolding or ladders will be required to be secured to a building or structure	Υ

7. OVERHEAD AND UNDERGROUND UTILITIES - tree pruning services, tree removal, utility relocation or replacement, underground utility identification (digging with powered equipment), concrete sawing services, pole painting		Yes (Y) No (N) or Not Applicable (NA)
a)	There will be electrical hazards associated with overhead power lines such as limits of approach and contact	Y
b)	Necessary assurances (in writing) have (or will be) obtained by the City, through the utility company, for any work where minimum limits of approach cannot be maintained (provide documentation and review at pre job meeting with the successful contractor candidate)	N
c)	Necessary assurances must be obtained (in writing) by the successful contractor, through the utility company, for any work where minimum limits of approach will not be able to be maintained	Y
d)	Underground or hidden utilities are located on the job site. Any excavation or drilling work in proximity to an underground utility service must be undertaken in conformity with the requirements of the owner of that utility service	Y

If yes to c), and the specific physical locations where minimum limits of approach will not be able to be maintained are known, how will this information be provided to the contractor?

Physical locations where minimum limits of approach cannot be maintained are to be confirmed by the contractor.

8.	CONSTRUCTION, EXCAVATION, SHORING AND DEMOLITION	Yes (Y) No (N) or Not Applicable (NA)
a)	As Prime Contractor, the City of Vancouver project manager will submit the Notice of Project. Successful contractor to submit Notice of Project.	N
b)	Workers will be required to enter an excavation over 1.2m (4 ft) in depth	Υ

9.	CHEMICALS, SOLVENTS, FUMES, VAPORS, AND/OR DUSTS (existing work processes or known worksite hazard only) - ice rinks, swimming pools, cleaning solvents, adhesives, paints, coatings, binders; e.g., storage tank clean-out services, countertop installation (epoxies), and flooring	Yes (Y) No (N) or Not Applicable (NA)
a)	The worksite has chemicals solvents, fumes, vapors or dusts that may affect the contractor	NA
b)	Material Safety Data Sheets for chemicals currently in use at the worksite will be available, on request, to the contractor	NA

If yes to a), list the work processes and/or chemicals in use:	

10. NOISE - (existing work processes only)	
a) Employees will be exposed to noise levels above 85dbA	Υ

OTHER HAZARDS (NOT IDENTIFIED ABOVE)					
a) Traffic					
b)					
c)					

KNOWN WORKPLACE HAZARDS LIST COMPLETED BY					
Project Manager Name (print): Bob Devlin	· · · · · · · · · · · · · · · · · · ·				
Project Manager Signature:	Date: 30 April 2018				
Jose (					
Title: Senior Project Manager - Sewers and Drainage Design Branch	Phone: 604-673-8101				

#### SCHEDULE 17

#### CONTRACTOR PRE-CONTRACT HAZARD ASSESSMENT FORM

[Completed form to be attached to the finalized agreement.]

Project Manager (City Employee)
Contractor Representative
Contract Name and No.

### **PURPOSE**

This document shall be completed by the contractor awarded the contract, who shall identify all the known and potential work process hazards associated with the contract. The contractor, who is responsible for all identified actions, shall provide a completed Pre-Contract Hazard Assessment Form to the Project Manager (City employee) for review and consultation before the contract work begins.

#### REFERENCE MATERIAL

In order to complete this document, the contractor should refer to a completed copy of any "List of Known Workplace Hazards," provided with the tender package. The contractor is also responsible to refer to any "Hazardous Materials Assessments," provided by the City with the tender package, and possibly referred to in such a "List of Known Workplace Hazards."

### INSTRUCTIONS FOR COMPLETION

The document must be completed in full. Choices for each entry are:

Yes (Y) this work process or worksite hazard will exist for this contract and is the

responsibility of the contractor

No (N) even though the work process or worksite hazard will exist, it will not be the

responsibility of the contractor

Not Applicable (NA) the work process or worksite hazard is not applicable for this contract

Each grouping of safety hazards or issues in this document (bold text, capitalized) may list some examples of work tasks where the relevant hazard may be encountered. These examples are not conclusive; there may be other examples of work tasks that create such a hazard or issue.

### **DOCUMENTATION AND TRAINING REQUIREMENTS**

During the contract term, the contractor may be requested by the City of Vancouver, and shall provide documented evidence for items identified with a (D) in this document.

The summary table at the end of the document provides all potentially required documentation, and if applicable, the WCB OHS Regulation reference.

For any identified hazard marked with a (T), the contractor is responsible to train its employees.

### **HAZARDOUS MATERIALS**

The contractor is responsible for providing additional information on hazardous materials which may be encountered as part of the work process, yet not identified in the List of Known Workplace Hazards.

	Hazard or Issue	Pro	ject N	<i>l</i> lanager
1. Asbestos-containing Materials. Disturbance or penetrations of flooring, ceiling tiles, pipe lagging, ac pipe, transite siding, particularly in older facilities; e.g., furniture/fixture installation, carpeting/flooring services boiler repair/tune-up services				
	(a) We have reviewed the hazardous materials assessment for asbestos provided by the City of Vancouver (or third party) in the tender package	Υ	N	NA
	(b) We will provide a written hazardous materials assessment for asbestos	Υ	N	NA
	(c) We have a written Asbestos Program (D)	Υ	N	NA
	(d) As "prime contractor", we will submit a Notice of Project Asbestos(NOP-A) to WorkSafeBC at least 24 hours in advance of the project start-up	Υ	N	NA
2.	Lead-containing Materials. Disturbance of lead-based paint, particularly in older facilities. Also present in certain electrical circuitry and metal alloys; .e.g., overhead bridge crane maintenance/repair, high-voltage cable splicing services, boiler repair/tune-up services, fixture installation services, and chiller maintenance/repair services			
	(a) We have reviewed the hazardous materials assessment for lead provided by the City of Vancouver (or third party) in the tender package	Υ	N	NA
	(b) We will provide a written hazardous materials assessment for lead	Υ	N	NA
	(c) We have a written exposure control program for Lead (D)	Υ	N	NA
3.	Other Hazardous Materials. May include pcb's, cfc's, moulds, mercury, ozono depleting substances (ods), radioactive substances, sewage and unidentified contaminated hazardous materials, other: (list other here)	9		
	(a) We have reviewed the hazardous materials assessment for (insert hazardous material type here) provided by the City of Vancouver, or a third party, in the tender package	Υ	N	NA
	(b) We have reviewed the hazardous materials assessment for (insert hazardous material type here) provided by the City of Vancouver, or a third party, in the tender package	Y	N	NA

	Hazard or Issue	Pro	ject N	<i>l</i> lanager
		or i	Vot	No (N) Ie (NA)
(c	We will provide a hazardous materials assessment for (insert hazardous material type here)	Υ	N	NA
(c	<ul> <li>We will provide a hazardous materials assessment for (insert hazardous material type here)</li> </ul>	Υ	N	NA
CC	onfined Spaces. Working in vaults, chambers, pits, tanks, etc.; e.g., onstruction, inspection and testing services, water/fuel storage tank cleanut services, and utility corrosion inspection services.			
(a	We have reviewed the confined space hazard assessment provided by the City of Vancouver in the tender package	Υ	N	NA
(b	) We have a written confined space entry program (D)	Υ	N	NA
(c	Our employees have received confined space training (T)	Υ	N	NA
(c	<ul> <li>We shall complete a confined space hazard assessment specific to the work to be performed (D)</li> </ul>	Υ	N	NA
(e	We shall develop site specific written safe operating procedures (including evacuation and rescue components) prior to starting work (D)	Υ	N	NA
(f	) We shall identify and record isolation points (D)	Υ	N	NA
<b>(</b> g	We will develop alternate procedures (as per WCB OHS Regulation # 9.22) to be used to isolate adjacent piping containing harmful substances (D)	Υ	N	NA
(h	) We will provide for the services of rescue persons	Υ	N	NA
If yes	to (g), provide brief description:			
se el pr	ock Out. Industrial equipment maintenance, power machinery repair ervices, pump maintenance/repair services, mechanical refrigeration systems, evator repair, overhead bridge crane maintenance/repair services, cathodic rotection services, hydraulic test systems repair/service, and air compressor ebuilding services			
<b>(</b> a	We will be required to lock out in order to isolate or prevent the unexpected release of energy (electrical, mechanical, hydraulic, chemical, thermal, kinetic, gravitational, pneumatic)	Υ	N	NA
(r	) We will perform work on, or near, energized equipment, lines or circuits	Υ	N	NA

		Hazard or Issue	Pro	ject N	<i>l</i> lanager
			or I	Vot	No (N) Ie (NA)
	(	f yes to (a) or (b) above, no work may be performed until reviewed by City of Vancouver project manager or project manager designate.  (a) or (b) describe:	ини пинини пинин		
6A.	repla repla	Protection. Tree pruning, window and ledge cleaning, window accement, overhead bridge crane maintenance/repair services, roll-up door accement, tent installation, awning/canopy installation, overhead air lange installation, construction inspection and testing services.			
	(a)	Our employees will be exposed to a potential fall in excess of 3 m (10 feet), or to a fall of less than 3 m which would likely result in a serious injury (ex. impalement on rebar)	Υ	N	NA
	(b)	We will produce a written Fall Protection Plan for work that will occur more than 25 feet above grade, or, if written procedures (control zone) are to be used as the means of fall protection (D)	Υ	N	NA
	(c)	Our employees who will be required to use fall protection have received training (T)	Υ	N	NA
		(a), describe:			
6B.		folding and Ladders. Window replacement or cleaning, tree pruning, rolloor replacement, tent installation, and awning/canopy installation			
	(a)	Our employees will use scaffolding or ladders for access to the work	Υ	N	NA
	(b)	The scaffolding or ladders will be exposed to wet and/or slippery conditions	Υ	N	NA
	(c)	We will ensure scaffolding or ladders are secured before accessing the worksite	Υ	N	NA
	(d)	Scaffolding will be erected and dismantled only by qualified workers	Υ	N	NA
7.	tree	rhead Power Lines and Underground Utilities. Tree pruning services, removal, utility relocation or replacement, underground utility tification services, concrete sawing services, pole painting			
	(a)	There are electrical hazards associated with overhead power lines such as limits of approach and contact	Υ	N	NA
	(b)	We will obtain necessary assurances, in writing, through the utility company, for any work where minimum limits of approach cannot be maintained	Υ	N	NA

		Hazard or Issue	Pro	ject N	<i>l</i> lanage
			or I	Vot	No (N) Ie (NA)
(	(c)	Underground or hidden utilities may be on the job site and we shall contact the Project Manager and BC OneCall at least four business days prior to the start of any excavation work	Υ	N	NA
(	(d)	In the event of an inadvertent utility strike, we will have a written procedure for immediate notification of both the utility company and WorkSafeBC (D)	Υ	N	NA
3. C	Cons	truction, Excavation, shoring and Demolition			
(	(a)	As "prime contractor", we will submit a Notice of Project (NOP) to WorkSafeBC at least 24 hours in advance of the project start-up date	Υ	N	NA
(	(b)	Workers may be required to enter an excavation over 1.2m (4 ft) in depth	Y	N	NA
(	(c)	We will develop site specific written safe operating procedures, including evacuation and rescue components, prior to starting any excavation work (D)	Υ	N	NA
(	(d)	Shoring will be installed in accordance with Part 20 of the WorkSafeBC OH&S Regulation	Υ	N	NA
(	(e)	We will provide safe means of entry and exit for excavations	Υ	N	NA
(	(f)	We will provide for the services of rescue persons and equipment (excavation rescue)	Υ	N	NA
(	(g)	We will develop a demolition/salvage plan (D)	Υ	N	NA
(	(h)	We will evaluate the demolition materials for reuse or recycling	Υ	N	NA
(	(i)	We will protect passers-by from potential hazards	Υ	N	NA
а	adhe	nicals, Solvents, Fumes, Vapours and Dusts. Cleaning solvents, sives, paints, coatings, binders; e.g., storage tank clean-out services, tertop installation (epoxies), and flooring			
(	(a)	We will complete a hazard assessment for chemicals we will use in our work, and if chemicals already exist at the workplace, our assessment will identify possible results of any reactions between our chemicals and those of the City's operations	Υ	N	NA
N t	Nois∈ :able	e and Vibration. Includes installations and heavy equipment operation. e examples for 85 - 90 dbA (at noise source) include forklift, smoke alarm, saw. Whole body vibration examples include truck or equipment operator ackhammer operation			
(	(a)	Our employees will be exposed to noise levels above 85dbA	Υ	N	NA
(	(b)	We have a written hearing conservation program (D)	Υ	N	NA
(	(c)	Our employees will be exposed to excessive levels of whole body vibration (WBV)	Y	N	NA
11. C	Эсси	pational Health and Safety Program			

		Hazard or Issue	Pro	ject N	<i>l</i> lanager
			or i	Vot	No (N) Ie (NA)
	(a)	We have a written Safety Program (D)	Υ	N	NA
	(b)	We will make regular inspections of all workplaces	Υ	N	NA
	(c)	We will immediately investigate any reported unsafe conditions and correct as required	Υ	N	NA
	(d)	We will investigate all incidents and provide written incident reports to the Project Manager	Υ	N	NA
	(e)	We will develop a written plan <b>(D)</b> identifying how risk to the public and workers will be minimized (may include the use of barriers and safe entry/exit points from the worksite)	Υ	N	NA
12. I	First	Aid			
	(a)	First aid equipment, supplies, facilities and services will be readily accessible during working hours	Υ	N	NA
	(b)	We will complete a first aid assessment (D)	Υ	N	NA
	(c)	We will post site drawings and signs indicating the location of, and how to summon, first aid	Υ	N	NA
	(d)	We will develop an effective means of communication between the first aid attendant and the work areas	Υ	N	NA
(	e.g.,	Protection. Solvents, fuels, soldering, torch cutting, or heating devices; gasoline and diesel fuel delivery services, flooring services, fire ression service, and water pipe repair services			
	(a)	We will weld, solder, or cut with a torch	Υ	N	NA
	(b)	We will use or store flammable/combustible liquids	Υ	N	NA
	(c)	We will use temporary heating devices	Υ	N	NA
	(d)	We will provide water and/or fire extinguishers on the job site	Υ	N	NA
14. I	Pers	onal Protective Equipment (PPE)			
	(a)	We will ensure our workers have appropriate personal protective clothing and equipment (e.g., safety footwear, hi-vis vests, hardhats, eye protection, face protection, hearing protection, chemical gloves/clothing)	Y	N	NA
	(b)	We have a written PPE program (D)	Υ	N	NA
15. I	Resp	iratory Protection			
	(a)	The work will involve materials or processes requiring respiratory protection	Υ	N	NA
	(b)	We have a written respiratory protection program (D)	Υ	N	NA

	Hazard or Issue	Pro	ject N	/lanager
16. To	ols Machinery and Equipment			
(a)	We will use powder-actuated tools.	Υ	N	NA
(b)	Our employees who operate equipment have been trained and are qualified in use of that equipment. (T)	Y	N	NA
If yes t	to (a), describe:			
prı	anes, Forklifts, and Manlifts. Heavy or oversized goods delivery, tree uning, overhead bridge crane maintenance/repair, and roll-up door blacement			
(a)	We will use a crane, forklift, manlift or other lifting equipment	Υ	N	NA
(b)	Our lifting and rigging equipment is certified where applicable, and inspected on a regular basis	Y	N	NA
(c)	Our operators shall have a valid operators certificate (mobile crane or tower crane) or have received training (boom lift, scissor lift or forklift) (T)	Υ	N	NA
(d)	Only lifting attachments approved for use by the forklift manufacturer will be used	Y	N	NA
18. <b>Ri</b> ç	gging			
(a)	We will lift or sling loads overhead	Υ	N	NA
(b)	We will inspect ropes, hooks and slings before use on each shift	Υ	N	NA
tra red aba	otor Vehicles and Heavy Equipment. Goods delivery, personnel insportation services, trailer relocation services, oil/water pump-out and cycling services, asphalt grinding and asphalt sealing services, weed/brush atement and mowing services, landscape hydro-seed services, tree stump nding, and concrete sawing and removal			
(a)	We will use motor vehicles or heavy equipment at the work location	Υ	N	NA
(b)	All operators have a valid provincial driver's license	Υ	N	NA
(c)	We will inspect vehicles, including safety features (e.g., ROPS)	Υ	N	NA
20. Tr	affic Control			
(a)	There will be uncontrolled movement of vehicular traffic at the worksite	Υ	N	NA
/h)	We will develop a written traffic control plan (D)	Υ	N	NA
(b)				

Hazard or Issue	Pro	ject N	lanager	
			Vot	Vo (N) Ie (NA)
(e) The traffic control devices conform to the Ministry Infrastructure (MoTI) "Traffic Control Manual for V		Υ	N	NA
We will provide Traffic Control Persons (TCP's) as required by	oy law	Υ	N	NA
21. Crystalline Silica Dust				
(a) Our work will involve jackhammering, rotohamme or other disturbance of concrete or stone, creating silica dust		Υ	N	NA
22. Additional Concerns				
We foresee additional health and safety concerns associated	with the work	Υ	N	NA
If yes, describe:  (a)	bove:			
PRE CONTRACT HAZARD ASSESSMENT COMPLETED BY				
Contractor's Representative Name (print):				
Contractor's Representative Signature:				
Title:	Phone:	***************************************		
CONTRACTOR'S DESIGNATE RESPONSIBLE FOR ONSITE SAFETY	,			
Name (print):				
Title: Phone:				

		or I	Vot	No (N) Ie (NA)
by t Boar	mary of Documentation (D) to be Provided by the Contractor upon request the City of Vancouver (documentation required as per Workers Compensation of Occupational Health and Safety (WCB OHS) Regulation, the Workers' pensation Act (WCA) or the City of Vancouver)			
(a)	Safety Program (WCB OHS Regulation Parts 3.1-3.3)	Υ	N	NA
(b)	Asbestos Exposure Control Plan (WCB OHS Regulation Part 6.3)	Υ	N	NA
(c)	Lead (Pb) Exposure Control Plan (WCB OHS Regulation Part 6.60)	Υ	N	NA
(d)	Respiratory Protection Program (WCB OHS Regulation Part 8.5)	Υ	N	NA
(e)	Confined Space Entry Program (WCB OHS Regulation Parts 9.5 and 9.6)	Υ	N	NA
(f)	Plan for minimizing risk to public and to workers (City of Vancouver)	Υ	N	NA
(g)	Personal Protective Equipment (PPE) Program (WCB OHS Regulation Part 8.5)	Υ	N	NA
(h)	Hearing Conservation Program (WCB OHS Regulation Part 7.5)	Υ	N	NA
(i)	Confined Space Hazard Assessment (WCB OHS Regulation Part 9.9)	Υ	N	NA
(j)	Work Procedure, including evacuation and rescue, for confined space (WCB OHS Regulation Part 9.10 and 9.11)	Υ	N	NA
(k)	Identification of Isolation Points (confined space) (WCB OHS Regulation Part 9.19)	Υ	N	NA
(I)	Alternate procedures to isolate adjacent piping (confined space) (WCB OHS Regulation Part 9.22)	Υ	N	NA
(m)	Fall Protection Plan (WCB OHS Regulation Part 11.3)	Υ	N	NA
(n)	Traffic Control Plan (Ministry of Transportation and Infrastructure (MOTI) manual, as referenced in WCB OHS Regulation Part 18.3)	Υ	N	NA
(o)	In the event of a utility strike, a written procedure for notification of Utility Provider (WCB OHS Regulation Part 4.18) and WorkSafeBC (Workers' Compensation Act Part 3, Division 10, Sec. 172 (1)(c))	Υ	N	NA
(p)	Work Procedure (including evacuation and rescue) for excavations (City of Vancouver)	Υ	N	NA
(q)	Demolition/Salvage Plan (City of Vancouver in reference to WCB OHS Regulation Part 20.112)	Υ	N	NA
(r)	First Aid Assessment (WCB OHS Regulation Part 3.16 (2))	Υ	N	NA
	mary of Training Requirements (T) of Contractor Employees (for any persons pleting this type of work throughout the duration of the contract)			
(a)	Confined Space Entry (WCB OHS Regulation Part 9.8)	Υ	N	NA
(b)	Fall Protection (WCB OHS Regulation Part 11.2 (6))	Υ	N	NA
(c)	Equipment Operation (WCB OHS Regulation Part 4.3(1)(b)(i)(ii))	Υ	N	NA
(d)	Mobile Equipment (ex. boom lift, scissor lift, forklift) (WCB OHS Regulation Part 16.4)			

### **SCHEDULE 18**

### CONFINED SPACE IDENTIFICATION AND HAZARD ASSESSMENTS

CITY OF VANCOUVER	Confined Space Indentification and Hazard Assessment	Assessed by: Andrew Ross Date Assessed: 2004-11-15
	Engineering Services - Sewers - Sewer manhole	Location:
1		CityWideCity wide. Inventory includes 22,00 sewer manholes.

3			Large enough and configured to perform work?	
yes	yes	yes	yes	

Access Means, Dimensions	Single 22" or 24" diameter hole protected by steel manhole cover. Steel rungs imbedded into concrete descending to the bench at the bottom of the manhole.
Space Description and Dimensions	Typically 4 ft in diameter made from pre-cast concrete sections manholes ranging in height from 5 ft to 24 ft and average 12 ft. Max vol: 300 ft3. Sewer pipe conections are greater than 16 inches in diameter.
Equipment	Steel rungs imbeded in concrete. Two or more conections entering or exiting the space. May be inspection ports to look up sewer mains at a higher grade than the bench and ramps to gradually drop sewage to the bench. Weirs, sluice gates or flapgates may be present
Purpose/function	Connect sewer mains and allow access points to the sewer system. Points to block, divert or allow overflow in the system. Larger diameter mains are more likely to be storm drains with high flow rates in periods of rain.

#### Rescue Pre-Plan

Basic information for VFRS	alegran . Me a				Anchorage required (y/n)	Anchorage Type	
	CS Type 4	N	Υ	N	N		
Comment	Contact sewers dispatch 604 326 4680						

### Rescue Plan

### **Pre Entry Hazard Assessment**

HAZARD	PRE	ESENT	HAZ	HAZARD RATING		REASON FOR HAZARD AND RATING
	NO	YES	LOW	MOD	HIGH	
Insect/Animal		Х				Rodents may be present.
Oxygen deficiency		×				Oxygen deficiency may be present from bacterial growth consuming oxygen. Variable air exchange in sewer contributes to changing oxygen levels
Oxygen enrichment	Х					
Chemical presence		×				Hydrogen sulfide and methane gas may be present from bacterial growth. Illegal dumping of solvents, ammonia, acids and other chemicals may be present. Variable air exchange determines presence and concentration of contaminants.

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Biohazard aerosol  X  Biohazard aerosol  X  Bacterial and mold aerosols will be present in sewer spaces. Sensitive individuals may experience allergic reactions.  Ingestion/Skin contact  X  Hand to mouth or splashed contact of sewer to mouth could result in acute gut illnesses.  Noise/Vibration  X  Heat/Cold stress  X  Radiation or Laser  X  Personal Confinement  X  Ladder access to space through manhole limits access. Siphons of other by-passes may be present in floor of manhole.  Mechanical Hazard  X  Hydraulic/Pneumatic  X  Traffic  X  Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural  X  Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.				
sewer spaces. Sensitive individuals may experience allergic reactions.  Ingestion/Skin contact  X  Hand to mouth or splashed contact of sewer to mouth could result in acute gut illnesses.  Noise/Vibration  X  Heat/Cold stress  X  Radiation or Laser  X  Personal Confinement  X  Ladder access to space through manhole limits access. Siphons of other by-passes may be present in floor of manhole.  Mechanical Hazard  X  Hydraulic/Pneumatic  X  Process Hazard  X  Traffic  X  Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural  X  Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical  X  Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip  X  Bench may be slippery  Visibility/Light  X  Abandoned needles may be present  Broken glass or other sharp debris may be present in the space.	Fire/Explosion		X	Methane gas from bacterial growth, illegal
Moise/Vibration X	Biohazard aerosol		×	sewer spaces. Sensitive individuals may
Heat/Cold stress X Radiation or Laser X Personal Confinement X Ladder access to space through manhole limits access. Siphons of other by-passes may be present in floor of manhole.  Mechanical Hazard X Hydraulic/Pneumatic X Process Hazard X Traffic X Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural X  Engulfment X Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X  Fall X Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X Bench may be slippery  Visibility/Light X Low light conditions may make inspections difficult.  Hot/Cold surfaces X Biohazards X Broken glass or other sharp debris may be present in the space.	Ingestion/Skin contact		Х	
Radiation or Laser X  Personal Confinement X  Ladder access to space through manhole limits access. Siphons of other by-passes may be present in floor of manhole.  Mechanical Hazard X  Hydraulic/Pneumatic X  Process Hazard X  Traffic X  Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural X  Engulfment X  Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X  Fall X  Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X  Bench may be slippery  Visibility/Light X  Low light conditions may make inspections difficult.  Hot/Cold surfaces X  Biohazards X  Broken glass or other sharp debris may be present in the space.	Noise/Vibration	Х		
Personal Confinement  X  Ladder access to space through manhole limits access. Siphons of other by-passes may be present in floor of manhole.  Mechanical Hazard X  Hydraulic/Pneumatic X  Process Hazard X  Traffic X  Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural X  Engulfment X  Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X  X  Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X  Bench may be slippery  Visibility/Light X  Low light conditions may make inspections difficult.  Hot/Cold surfaces X  Biohazards X  Broken glass or other sharp debris may be present in the space.	Heat/Cold stress	Х		
access. Siphons of other by-passes may be present in floor of manhole.  Mechanical Hazard X	Radiation or Laser	Х		
Hydraulic/Pneumatic X  Process Hazard X  Traffic X  Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural X  Engulfment X  Engulfment X  Engulfment X  Engulfment X  Luncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X  Fall X  Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X  Bench may be slippery  Visibility/Light X  Low light conditions may make inspections difficult.  Hot/Cold surfaces X  Biohazards X  Abandoned needles may be present  Sharp objects X  Broken glass or other sharp debris may be present in the space.	Personal Confinement		X	access. Siphons of other by-passes may be
Process Hazard X  Traffic X  Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural X  Engulfment X  Engulfment X  Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X  Fall X  Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X  Bench may be slippery  Visibility/Light X  Low light conditions may make inspections difficult.  Hot/Cold surfaces X  Biohazards X  Abandoned needles may be present  Sharp objects X  Broken glass or other sharp debris may be present in the space.	Mechanical Hazard	Х		
Traffic X Manholes usually in streets or intersections. Set up traffic control appropriate for conditions  Structural X Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X Bench may be slippery  Visibility/Light X Low light conditions may make inspections difficult.  Hot/Cold surfaces X Abandoned needles may be present  Sharp objects X Broken glass or other sharp debris may be present in the space.	Hydraulic/Pneumatic	Х		
Structural X  Engulfment X  Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X  Fall X  Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X  Bench may be slippery  Visibility/Light X  Low light conditions may make inspections difficult.  Hot/Cold surfaces X  Biohazards X  Abandoned needles may be present  Sharp objects X  Broken glass or other sharp debris may be present in the space.	Process Hazard	Х		
Engulfment  X  Uncontrolled flowing sewage or storm water in space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical  X  Fall  X  Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip  X  Bench may be slippery  Visibility/Light  X  Low light conditions may make inspections difficult.  Hot/Cold surfaces  X  Biohazards  X  Abandoned needles may be present  Broken glass or other sharp debris may be present in the space.	Traffic		X	
space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing worker down sewer pipe.  Electrical X Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X Bench may be slippery  Visibility/Light X Low light conditions may make inspections difficult.  Hot/Cold surfaces X Abandoned needles may be present  Sharp objects X Broken glass or other sharp debris may be present in the space.	Structural	Х		
Fall X Ladder rungs may be slippery. Falls over 10 feet may be possible.  Slip/Trip X Bench may be slippery  Visibility/Light X Low light conditions may make inspections difficult.  Hot/Cold surfaces X Abandoned needles may be present  Sharp objects X Broken glass or other sharp debris may be present in the space.	Engulfment		Х	space. Flow rate dependant on local sewer usage and rainfall. Larger diameter pipe increases risk of engulfment with increasing water flows pushing
may be possible.  Slip/Trip X Bench may be slippery  Visibility/Light X Low light conditions may make inspections difficult.  Hot/Cold surfaces X  Biohazards X Abandoned needles may be present  Sharp objects X Broken glass or other sharp debris may be present in the space.	Electrical	Х		
Visibility/Light X Low light conditions may make inspections difficult.  Hot/Cold surfaces X Biohazards X Abandoned needles may be present Sharp objects X Broken glass or other sharp debris may be present in the space.	Fall		Х	
Hot/Cold surfaces X  Biohazards X  Abandoned needles may be present  Sharp objects X  Broken glass or other sharp debris may be present in the space.	Slip/Trip		Х	Bench may be slippery
Biohazards X Abandoned needles may be present  Sharp objects X Broken glass or other sharp debris may be present in the space.	Visibility/Light		Х	
Sharp objects X Broken glass or other sharp debris may be present in the space.	Hot/Cold surfaces	Х		
present in the space.	Biohazards		Х	Abandoned needles may be present
Other X	Sharp objects		X	
	Other	Х		

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#### Job Hazards - Inspection, non-air contaminating tasks

HAZARD	PRESENT	HAZARD RATING		ING	REASON FOR HAZARD AND RATING
	YES	LOW	MOD	HIGH	
Chemical presence	Х	Х			Ventilation of manhole quickly dilutes any air contaminants and slightly pressurezes space to push sewer gases away from entry manhole
Personal Confinement	X	Х			Ladder access with limited room to move at the bottom. Wearing harness and lifeline minimizes hazard
Engulfment	Х	Х			Manholes to 16 inch and larger pipes create a chance of engulfment if worker accidently enters the pipe. Wearing a harness and lifeline eliminates this hazard.
Fall	Х	Х			Check rungs for weakness (rust, failed concrete). Always maintain 3 points of contact on rungs and use extra caution when wet.

#### Inspection, non-air contaminating tasks Hazard Assessment Summary

Lockout Required	Atmospheric Hazard	Ventilation Required	Fall Protection or Lifeline Required	Permit Required
Yes	Low	Yes	Yes	Yes
Yes	Low	Yes	Yes	Yes
Yes	Low	Yes	Yes	Yes
Yes	Low	Yes	Yes	Yes

#### Air Quality Readings

Date	Reading for	Measurement	Gas Detector Serial No.	Reading by
	i toutum g to			

#### Comments

Engulfment hazard. Sanitary sewers are designed for a max capacity (from early to mid morning and late afternoon thru mid evening)of 50% full or less. Storm sewers are designed for 25% full for regular rainfall and 85% full during a 10 year storm event.

For problems or comments on the information, please contact Andrew Ross (Manager Organizational Safety) 604-871-6459

CITY OF VANCOUVER	Confined Space Indentification and Hazard Assessment	Assessed by: Andrew Ross Date Assessed: 2003-10-17
1	Sewer manhole 15 inch dia. or smaller connections (ID: 551)	Location: CityWideInventory includes about 22,000 sewer manholes in the City.

			Large enough and configured to perform work?	
yes	yes	yes	yes	

Access Means, Dimensions	Single 22" or 24" diameter hole protected by steel manhole cover. Steel rungs imbedded into concrete or ladder fixed to concrete descending to the bench at the bottom of the manhole.
Space Description and Dimensions	Typically 4 ft in diameter made from pre-cast concrete manhole sections ranging in height from 5 ft to 24 ft and average 12 ft. Max vol: 300 ft3. Sewer pipe conections are 15 inches in diameter or less.
Equipment	Steel rungs imbedded in concrete. Two or more conections entering or exiting the space. May be inspection ports to look up sewer mains at a higher grade than the bench and ramps to gradually drop sewage to the bench. Weirs, sluice gates or flapgates may be present.
Purpose/function	Connect sewer mains and allow access points to the sewer system. Points to block, divert or allow overflow in the system.

### Rescue Pre-Plan

Basic information for VFRS	-Lucia Al-				Anchorage required (y/n)	Anchorage Type	
	CS TYPE 4	N	Y	N	N		
Comment	Contact Sewer dispatch 604 326 4680						

#### Rescue Plan

### Pre Entry Hazard Assessment

HAZARD	PR	ESENT	HAZ	ARD RA	TING	REASON FOR HAZARD AND RATING
	NO	YES	LOW	MOD	HIGH	
Electrical	Х					
Oxygen deficiency		×				Oxygen deficiency may be present from bacterial growth consuming oxygen. Variable air exchange in sewer contributes to changing oxygen levels.
Oxygen enrichment	X					
Chemical presence		×				Hydrogen sulfide and methane gas may be present from bacterial growth. Illegal dumping of solvents, ammonia, acids and other chemicals may be present. Variable air exchange determines presence and concentration of contaminants.

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Fire/Explosion		×	Explosive atmospheres are rare but do occur. Methane gas from bacterial growth, illegal dumping of solvents, gasoline and paint thinner.
Biohazard aerosol		Х	Bacterial and mold aerosols will be present in sewer spaces. Sensitive individuals may experience allergic reactions.
Ingestion/Skin contact		X	Hand to mouth or splashed contact of sewer to mouth could result in acute stomach illnesses.
Noise/Vibration	Х		
Heat/Cold stress	Х		
Radiation or Laser	Х		
Personal Confinement		X	Ladder access to space through manhole limits access. Siphons of other by-passes may be present in floor of manhole.
Mechanical Hazard	X		
Hydraulic/Pneumatic	Х		
Process Hazard	X		
Traffic		X	Manholes usually in streets or intersections. Set up traffic control appropriate for conditions
Structural	Х		
Engulfment		X	Uncontrolled flowing sewage or storm water in space. Flow rate dependant on time,location and rainfall. See comments at end of document.
Fall		X	Ladder rungs may be slippery. Falls over 10 feet may be possible.
Slip/Trip		X	Bench may be slippery
Visibility/Light		X	Low light conditions may make inspections difficult.
Hot/Cold surfaces	Х		
Biohazards		Х	Abandoned needles may be present
Insect/Animal		X	Rodents may be present.
Sharp objects		X	Broken glass or other sharp debris may be present in the space.
Other	X		

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### Job Hazards - Inspection, tool removal less than 5 minutes

HAZARD	PRESENT	HAZ	ZARD RAT	ING	REASON FOR HAZARD AND RATING
	YES	LOW	MOD	HIGH	
Chemical presence	Х	X			Ventilation of manhole will quickly dilute any air contaminants and slightly pressurize the space pushing chemical gases away from manhole
Personal Confinement	Х	X			Ladder access with limited room to move at the bottom. Difficult for rescuers to attend to victim. Wearing harness for short entries will assist rescuers.
Fall	Х	Х			Check rungs for weakness (rust, failed concrete). Always maintain 3 points of contact on rungs and use extra caution when wet. If defective rungs are found use SOP for Entry 5 min or more. Report manhole problems to Sewers office.
Engulfment	Х	X			Pipe diameter is too small for worker to enter accidentily. Water depth designed to less than 50% of the pipe diameter, harness assists rescue in unlikely event of debilitating injury during short inspection.
Other	Х	х			Harness must be worn for entry but lifeline/man hoist does not need to be set up. If there is a medical emergency and the worker loses consciousness the risk of engulfment (drowning) is increased.

### Inspection, tool removal less than 5 minutes Hazard Assessment Summary

Lockout Required	Atmospheric Hazard	Ventilation Required	Fall Protection or	Permit Required	
Lockout Nequired	Atmospheric Hazard	ventilation required	Lifeline Required	r emit required	
No	Low	Yes	No	Yes	
No	Low	Yes	No	Yes	
No	Low	Yes	No	Yes	
No	Low	Yes	No	Yes	
No	Low	Yes	No	Yes	

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### Job Hazards - Work longer than 5 minutes - Inspect, tool removal, blocking

HAZARD	PRESENT HAZARD RATING			REASON FOR HAZARD AND RATING	
	YES	LOW	MOD	HIGH	
Engulfment	Х	Х			15 inch and smaller diameter sewer pipes are too small for a worker to accidently enter. Harness and lifeline worn when work requires longer periods of time to be spent in manhole minimizes immersion hazard.
Chemical presence	Х	Х			Ventilation of manhole will quickly dilute any air contaminants and slightly pressurize the space pushing chemical gases away from manhole
Personal Confinement	Х				Ladder access with limited room to move at the bottom. Wearing harness and lifeline minimizes hazard.
Fall	Х	Х			see comment under inspection task

### Work longer than 5 minutes - Inspect, tool removal, blocking Hazard Assessment Summary

Lockout Required	Atmospheric Hazard	Ventilation Required	Fall Protection or Lifeline Required	Permit Required
No	Low	Yes	Yes	Yes
No	Low	Yes	Yes	Yes
No	Low	Yes	Yes	Yes
No	Low	Yes	Yes	Yes

#### Air Quality Readings

Date Reading for	Measurement	Gas Detector Serial No.	Reading by
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#### Comments

### Engulfment hazard.

Sanitary sewers are designed for a max capacity (from early to mid morning and late afternoon thru mid evening)of 50% full or less. Storm sewers are designed for 25% full for regular rainfall and 85% full during a 10 year storm event.

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### INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 19 - INSPECTION TEST PLAN PRO-FORMA TEMPLATE

#### **SCHEDULE 19**

#### INSPECTION TEST PLAN PRO-FORMA TEMPLATE

The following definitions shall apply to the preparation and use of ITPs:

- (i) Inspection & Test Point A stage in the manufacturing cycle where inspection and/or testing is carried out and the associated verifying documents are created.
- (ii) Witness Point The Contractor must provide the Engineer with 3 working days' notice of the event. If the Engineer or its representative is not present at the designated time and place, the Contractor shall continue with the inspection and/or tests as defined.
- (iii) Hold Point The Contractor must provide the Engineer with 3 working days' notice of the event and shall not proceed with the work without the Engineer or its representative being present, except where the Engineer has notified the Contractor in writing that he may proceed.
- (iv) Surveillance The continuing evaluation of the status of procedures, methods, processes, etc. and analysis of records to assure that QC requirements are met.
- (v) Review The process of verifying by examination of documentary evidence that nominated inspections and/or tests have been satisfactorily conducted.
- (vi) In-house (I) Applies to production at a facility under the direct control of the Contractor.
- (vii) Sub-contractor (S) Applies to production at a facility under the control of a Sub-contractor to the Contractor.

The Owner's "blank" Proforma ITP template is detailed below:

# INVITATION TO TENDER NO. PS20180617 CONSTRUCTION OF VANCOUVER WEST SEWER AND WATERWORKS RENEWAL - PACKAGE #2 SCHEDULE 19 - INSPECTION TEST PLAN PRO-FORMA TEMPLATE

### Sewer & Drainage Design Branch Inspection Test Plan



	ct Name/Title:			Drawing Number:						ITP Nu					
Cont	ractor:			ITP Prepared by:		Revision:									
				Date Prepared:								Revision Date:			
Vork	Component:	Sewer Main Installation													
oca	tion ID:	Location: XXX St - Chains					Test C	ertmeat	e No.:						
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