



**THE CITY OF WINNIPEG**

# **BID OPPORTUNITY**

**BID OPPORTUNITY NO. 598-2015**

**KING GEORGE V PLAYGROUND UPGRADES**

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## **PART B - BIDDING PROCEDURES**

### **B1. CONTRACT TITLE**

B1.1 KING GEORGE V PLAYGROUND UPGRADES

### **B2. SUBMISSION DEADLINE**

B2.1 The Submission Deadline is 4:00 p.m. Winnipeg time, August 4, 2015.

B2.2 Bids determined by the Manager of Materials to have been received later than the Submission Deadline will not be accepted and will be returned upon request.

B2.3 The Contract Administrator or the Manager of Materials may extend the Submission Deadline by issuing an addendum at any time prior to the time and date specified in B2.1.

### **B3. SITE INVESTIGATION**

B3.1 Further to C3.1, the Bidder may view the Site without making an appointment.

### **B4. ENQUIRIES**

B4.1 All enquiries shall be directed to the Contract Administrator identified in D3.1.

B4.2 If the Bidder finds errors, discrepancies or omissions in the Bid Opportunity, or is unsure of the meaning or intent of any provision therein, the Bidder shall notify the Contract Administrator of the error, discrepancy or omission, or request a clarification as to the meaning or intent of the provision at least five (5) Business Days prior to the Submission Deadline.

B4.3 Responses to enquiries which, in the sole judgment of the Contract Administrator, require a correction to or a clarification of the Bid Opportunity will be provided by the Contract Administrator to all Bidders by issuing an addendum.

B4.4 Responses to enquiries which, in the sole judgment of the Contract Administrator, do not require a correction to or a clarification of the Bid Opportunity will be provided by the Contract Administrator only to the Bidder who made the enquiry.

B4.5 The Bidder shall not be entitled to rely on any response or interpretation received pursuant to B4 unless that response or interpretation is provided by the Contract Administrator in writing.

### **B5. CONFIDENTIALITY**

B5.1 Information provided to a Bidder by the City or acquired by a Bidder by way of further enquiries or through investigation is confidential. Such information shall not be used or disclosed in any way without the prior written authorization of the Contract Administrator. The use and disclosure of the confidential information shall not apply to information which:

- (a) was known to the Bidder before receipt hereof; or
- (b) becomes publicly known other than through the Bidder; or
- (c) is disclosed pursuant to the requirements of a governmental authority or judicial order.

B5.2 The Bidder shall not make any statement of fact or opinion regarding any aspect of the Bid Opportunity to the media or any member of the public without the prior written authorization of the Contract Administrator.

## **B6. ADDENDA**

- B6.1 The Contract Administrator may, at any time prior to the Submission Deadline, issue addenda correcting errors, discrepancies or omissions in the Bid Opportunity, or clarifying the meaning or intent of any provision therein.
- B6.2 The Contract Administrator will issue each addendum at least two (2) Business Days prior to the Submission Deadline, or provide at least two (2) Business Days by extending the Submission Deadline.
- B6.2.1 Addenda will be available on the Bid Opportunities page at The City of Winnipeg, Corporate Finance, Materials Management Division website at <http://www.winnipeg.ca/matmgt/>
- B6.2.2 The Bidder is responsible for ensuring that he/she has received all addenda and is advised to check the Materials Management Division website for addenda regularly and shortly before the Submission Deadline, as may be amended by addendum.
- B6.2.3 The Bidder shall acknowledge receipt of each addendum in Paragraph 7 of Form A: Bid. Failure to acknowledge receipt of an addendum may render a Bid non-responsive.

## **B7. SUBSTITUTES**

- B7.1 The Work is based on the Plant, Materials and methods specified in the Bid Opportunity.
- B7.2 Substitutions shall not be allowed unless application has been made to and prior approval has been granted by the Contract Administrator in writing.
- B7.3 Requests for approval of a substitute will not be considered unless received in writing by the Contract Administrator at least five (5) Business Days prior to the Submission Deadline.
- B7.4 The Bidder shall ensure that any and all requests for approval of a substitute:
- (a) provide sufficient information and details to enable the Contract Administrator to determine the acceptability of the Plant, Material or method as either an approved equal or alternative;
  - (b) identify any and all changes required in the applicable Work, and all changes to any other Work, which would become necessary to accommodate the substitute;
  - (c) identify any anticipated cost or time savings that may be associated with the substitute;
  - (d) certify that, in the case of a request for approval as an approved equal, the substitute will fully perform the functions called for by the general design, be of equal or superior substance to that specified, is suited to the same use and capable of performing the same function as that specified and can be incorporated into the Work, strictly in accordance with the proposed work schedule and the dates specified in the Supplemental Conditions for Substantial Performance and Total Performance;
  - (e) certify that, in the case of a request for approval as an approved alternative, the substitute will adequately perform the functions called for by the general design, be similar in substance to that specified, is suited to the same use and capable of performing the same function as that specified and can be incorporated into the Work, strictly in accordance with the proposed work schedule and the dates specified in the Supplemental Conditions for Substantial Performance and Total Performance.
- B7.5 The Contract Administrator, after assessing the request for approval of a substitute, may in his/her sole discretion grant approval for the use of a substitute as an "approved equal" or as an "approved alternative", or may refuse to grant approval of the substitute.
- B7.6 The Contract Administrator will provide a response in writing, at least two (2) Business Days prior to the Submission Deadline, to the Bidder who requested approval of the substitute.

- B7.6.1 The Contract Administrator will issue an Addendum, disclosing the approved materials, equipment, methods and products to all potential Bidders. The Bidder requesting and obtaining the approval of a substitute shall be responsible for disseminating information regarding the approval to any person or persons he/she wishes to inform.
- B7.7 If the Contract Administrator approves a substitute as an “approved equal”, any Bidder may use the approved equal in place of the specified item.
- B7.8 If the Contract Administrator approves a substitute as an “approved alternative”, any Bidder bidding that approved alternative may base his/her Total Bid Price upon the specified item but may also indicate an alternative price based upon the approved alternative. Such alternatives will be evaluated in accordance with B18.
- B7.9 No later claim by the Contractor for an addition to the Total Bid Price because of any other changes in the Work necessitated by the use of an approved equal or an approved alternative will be considered.
- B7.10 Notwithstanding B7.2 to B7.9, and in accordance with B8.7, deviations inconsistent with the Bid Opportunity document shall be evaluated in accordance with B18.1(a).

## **B8. BID COMPONENTS**

- B8.1 The Bid shall consist of the following components:
- (a) Form A: Bid;
  - (b) Form B: Prices;
  - (c) Design Drawings as per B13;
  - (d) Component Descriptions as per B14.
- B8.2 Further to B8.1, the Bidder should include the written correspondence from the Contract Administrator approving a substitute in accordance with B7.
- B8.3 All components of the Bid shall be fully completed or provided, and submitted by the Bidder no later than the Submission Deadline, with all required entries made clearly and completely, to constitute a responsive Bid.
- B8.4 The Bid Submission may be submitted by mail, courier or personal delivery, or by facsimile transmission.
- B8.5 If the Bid Submission is submitted by mail, courier or personal delivery, it shall be enclosed and sealed in an envelope clearly marked with the Bid Opportunity number and the Bidder's name and address, and shall be submitted to:
- The City of Winnipeg  
Corporate Finance Department  
Materials Management Division  
185 King Street, Main Floor  
Winnipeg, MB R3B 1J1
- B8.5.1 Samples or other components of the Bid Submission which cannot reasonably be enclosed in the envelope may be packaged separately, but shall be clearly marked with the Bid Opportunity number, the Bidder's name and address, and an indication that the contents are part of the Bidder's Bid Submission.
- B8.6 Bidders are advised not to include any information/literature except as requested in accordance with B8.1.
- B8.7 Bidders are advised that inclusion of terms and conditions inconsistent with the Bid Opportunity document, including the General Conditions, will be evaluated in accordance with B18.1(a).

B8.8 If the Bid Submission is submitted by facsimile transmission, it shall be submitted to 204 949-1178.

B8.8.1 The Bidder is advised that the City cannot take responsibility for the availability of the facsimile machine at any time.

B8.8.2 Bids submitted by internet electronic mail (e-mail) will not be accepted.

## **B9. BID**

B9.1 The Bidder shall complete Form A: Bid, making all required entries.

B9.2 Paragraph 2 of Form A: Bid shall be completed in accordance with the following requirements:

- (a) if the Bidder is a sole proprietor carrying on business in his/her own name, his/her name shall be inserted;
- (b) if the Bidder is a partnership, the full name of the partnership shall be inserted;
- (c) if the Bidder is a corporation, the full name of the corporation shall be inserted;
- (d) if the Bidder is carrying on business under a name other than his/her own, the business name and the name of every partner or corporation who is the owner of such business name shall be inserted.

B9.2.1 If a Bid is submitted jointly by two or more persons, each and all such persons shall identify themselves in accordance with B9.2.

B9.3 In Paragraph 3 of Form A: Bid, the Bidder shall identify a contact person who is authorized to represent the Bidder for purposes of the Bid.

B9.4 Paragraph 9 of Form A: Bid shall be signed in accordance with the following requirements:

- (a) if the Bidder is a sole proprietor carrying on business in his/her own name, it shall be signed by the Bidder;
- (b) if the Bidder is a partnership, it shall be signed by the partner or partners who have authority to sign for the partnership;
- (c) if the Bidder is a corporation, it shall be signed by its duly authorized officer or officers;
- (d) if the Bidder is carrying on business under a name other than his/her own, it shall be signed by the registered owner of the business name, or by the registered owner's authorized officials if the owner is a partnership or a corporation.

B9.4.1 The name and official capacity of all individuals signing Form A: Bid should be printed below such signatures.

B9.4.2 All signatures shall be original.

B9.5 If a Bid is submitted jointly by two or more persons, the word "Bidder" shall mean each and all such persons, and the undertakings, covenants and obligations of such joint Bidders in the Bid and the Contract, when awarded, shall be both joint and several.

## **B10. PRICES**

B10.1 The Bidder shall state a price in Canadian funds for each item of the Work identified on Form B: Prices.

B10.2 The quantities listed on Form B: Prices are to be considered approximate only. The City will use said quantities for the purpose of comparing Bids.

**B10.3 The Bidder must complete the Approximate Quantity column for items 1, 3, 4, and 8 on Form B Prices. These quantities are dependent on the proposed design submitted.**

B10.4 The quantities for which payment will be made to the Contractor are to be determined by the Work actually performed and completed by the Contractor, to be measured as specified in the applicable Specifications.

B10.5 Payments to Non-Resident Contractors are subject to Non-Resident Withholding Tax pursuant to the Income Tax Act (Canada).

**B11. DISCLOSURE**

B11.1 Various Persons provided information or services with respect to this Work. In the City's opinion, this relationship or association does not create a conflict of interest because of this full disclosure. Where applicable, additional material available as a result of contact with these Persons is listed below.

B11.2 The Persons are:

- (a) N/A

**B12. QUALIFICATION**

B12.1 The Bidder shall:

- (a) undertake to be in good standing under The Corporations Act (Manitoba), or properly registered under The Business Names Registration Act (Manitoba), or otherwise properly registered, licensed or permitted by law to carry on business in Manitoba; and
- (b) be financially capable of carrying out the terms of the Contract; and
- (c) have all the necessary experience, capital, organization, and equipment to perform the Work in strict accordance with the terms and provisions of the Contract.

B12.2 The Bidder and any proposed Subcontractor (for the portion of the Work proposed to be subcontracted to them) shall:

- (a) be responsible and not be suspended, debarred or in default of any obligations to the City. A list of suspended or debarred individuals and companies is available on the Information Connection page at The City of Winnipeg, Corporate Finance, Materials Management Division website at <http://www.winnipeg.ca/matmgt/debar.stm>

B12.3 The Bidder and/or any proposed Subcontractor (for the portion of the Work proposed to be subcontracted to them) shall:

- (a) have successfully carried out work similar in nature, scope and value to the Work; and
- (b) be fully capable of performing the Work required to be in strict accordance with the terms and provisions of the Contract; and
- (c) have a written workplace safety and health program if required pursuant to The Workplace Safety and Health Act (Manitoba);

B12.4 Further to B12.3(c), the Bidder shall, within five (5) Business Days of a request by the Contract Administrator, provide proof satisfactory to the Contract Administrator that the Bidder/Subcontractors has a workplace safety and health program meeting the requirements of The Workplace Safety and Health Act (Manitoba), by providing:

- (a) a copy of their valid Manitoba COR certificate and Letter of Good Standing (or Manitoba equivalency) as issued under the Certificate of Recognition (COR) Program administered by the Construction Safety Association of Manitoba or by the Manitoba Heavy Construction Association's WORKSAFELY™ COR™ Program; or
- (b) a copy of their valid Manitoba SECOR™ certificate and Letter of Good Standing (or Manitoba equivalency) as issued under the Small Employer Certificate of Recognition Program (SECOR™) administered by the Construction Safety Association of Manitoba or by the Manitoba Heavy Construction Association's WORKSAFELY™ COR™ Program; or

- (c) a report or letter to that effect from an independent reviewer acceptable to the City. (A list of acceptable reviewers and the review template are available on the Information Connection page at The City of Winnipeg, Corporate Finance, Materials Management Division website at <http://www.winnipeg.ca/matmgt/>.)

B12.5 The Bidder shall submit, within three (3) Business Days of a request by the Contract Administrator, proof satisfactory to the Contract Administrator of the qualifications of the Bidder and of any proposed Subcontractor.

B12.6 The Bidder shall provide, on the request of the Contract Administrator, full access to any of the Bidder's equipment and facilities to confirm, to the Contract Administrator's satisfaction, that the Bidder's equipment and facilities are adequate to perform the Work.

### **B13. DESIGN DRAWINGS**

B13.1 The Bidder shall submit drawings that illustrate the proposed design and play equipment, such as plan, perspective and any other submissions to illustrate the design intent. Included in this shall be a plan showing the proposed play equipment and associated safety zones within the proposed play area and site, drawn to scale. Additional drawings may be requested prior to award for more detailed information.

### **B14. COMPONENT DESCRIPTIONS**

B14.1 The Bidder shall submit component description and / or graphic or catalogue reference outlining specifications of play equipment components

### **B15. OPENING OF BIDS AND RELEASE OF INFORMATION**

B15.1 Bids will not be opened publicly.

B15.2 Following the submission deadline, the names of the Bidders and their Total Bid Prices (unevaluated, and pending review and verification of conformance with requirements) will be available on the Closed Bid Opportunities (or Public/Posted Opening & Award Results) page at The City of Winnipeg, Corporate Finance, Materials Management Division website at <http://www.winnipeg.ca/matmgt/bidopp.asp>

B15.3 After award of Contract, the name(s) of the successful Bidder(s) and the Contract amount(s) will be available on the Closed Bid Opportunities (or Public/Posted Opening & Award Results) page at The City of Winnipeg, Corporate Finance, Materials Management Division website at <http://www.winnipeg.ca/matmgt/>

B15.4 The Bidder is advised that any information contained in any Bid may be released if required by City policy or procedures, by The Freedom of Information and Protection of Privacy Act (Manitoba), by other authorities having jurisdiction, or by law.

### **B16. IRREVOCABLE BID**

B16.1 The Bid(s) submitted by the Bidder shall be irrevocable for the time period specified in Paragraph 8 of Form A: Bid.

B16.2 The acceptance by the City of any Bid shall not release the Bids of the next two lowest evaluated responsive Bidders and these Bidders shall be bound by their Bids on such Work for the time period specified in Paragraph 8 of Form A: Bid.

### **B17. WITHDRAWAL OF BIDS**

B17.1 A Bidder may withdraw his/her Bid without penalty by giving written notice to the Manager of Materials at any time prior to the Submission Deadline.

- B17.1.1 Notwithstanding C23.3, the time and date of receipt of any notice withdrawing a Bid shall be the time and date of receipt as determined by the Manager of Materials.
- B17.1.2 The City will assume that any one of the contact persons named in Paragraph 3 of Form A: Bid or the Bidder's authorized representatives named in Paragraph 9 of Form A: Bid, and only such person, has authority to give notice of withdrawal.
- B17.1.3 If a Bidder gives notice of withdrawal prior to the Submission Deadline, the Manager of Materials will:
- (a) retain the Bid until after the Submission Deadline has elapsed;
  - (b) open the Bid to identify the contact person named in Paragraph 3 of Form A: Bid and the Bidder's authorized representatives named in Paragraph 9 of Form A: Bid; and
  - (c) if the notice has been given by any one of the persons specified in B17.1.3(b), declare the Bid withdrawn.
- B17.2 A Bidder who withdraws his/her Bid after the Submission Deadline but before his/her Bid has been released or has lapsed as provided for in B16.2 shall be liable for such damages as are imposed upon the Bidder by law and subject to such sanctions as the Chief Administrative Officer considers appropriate in the circumstances. The City, in such event, shall be entitled to all rights and remedies available to it at law.

## **B18. EVALUATION OF BIDS**

- B18.1 Award of the Contract shall be based on the following bid evaluation criteria:
- (a) compliance by the Bidder with the requirements of the Bid Opportunity or acceptable deviation there from (pass/fail);
  - (b) qualifications of the Bidder and the Subcontractors, if any, pursuant to B12 (pass/fail);
  - (c) Total Bid Price (10 points);
  - (d) Design Drawings/Component Descriptions (90 points);
  - (e) economic analysis of any approved alternative pursuant to B7.
- B18.2 Further to B18.1(a), the Award Authority may reject a Bid as being non-responsive if the Bid is incomplete, obscure or conditional, or contains additions, deletions, alterations or other irregularities. The Award Authority may reject all or any part of any Bid, or waive technical requirements or minor informalities or irregularities, if the interests of the City so require.
- B18.3 Further to B18.1(b), the Award Authority shall reject any Bid submitted by a Bidder who does not demonstrate, in his/her Bid or in other information required to be submitted, that he/she is responsible and qualified.
- B18.4 Further to B18.1(c), the Total Bid Price shall be the sum of the quantities multiplied by the unit prices for each item shown on Form B: Prices.
- (a) Further to B18.1(a), in the event that a unit price is not provided on Form B: Prices, the City will determine the unit price by dividing the Amount (extended price) by the approximate quantity, for the purposes of evaluation and payment.
  - (b) Further to B18.1(c), the Award Authority may reject a Bid as being non-responsive if it exceeds the budget as shown on Form B: Prices.
  - (c) The Total Bid Price shall be evaluated with a weighting of 10 points out of a total of 100 possible points. As such, the lowest Bidder shall receive the full 10 points, and the second lowest Bidder and subsequent Bidders shall be pro-rated accordingly.
  - (d) Further to B18.1(d), if the Contractor states play equipment components are compliant with CSA Standards which are not, liquidated damages shall be charged as per D16 should this result in additional design and/or meeting time on the part of the Contract Administrator.

**B18.5** The design shall be evaluated on the following criteria:

- (a) Compliance with CSA Standards (pass/fail);
- (b) Play value (maximum 43 points):
  - (i) 8 points – Gross Motor Play Experience(s) Overhead components, balancing, etc.);
  - (ii) 7 points – Imaginative/ Cognitive Play Component(s), including fine motor skills;
  - (iii) 7 points - Provides opportunities for appropriate social / interpersonal interaction and co-operative play;
  - (iv) 8 points – Motion Component(s) – to include at minimum one (1) see-saw, and two (2) spinner seat(s);
  - (v) 8 points – Climbing/Tunnel Component(s) - min. one for each age group: 2-5 year old and 5-12 year old;
  - (vi) 5 points - Variety of play Components.
- (c) Designed for inclusive play using Universal Design principles – Accessible Play Area only (maximum 15 points):
  - (i) Complies with section 2.3.5 of the 2010 City of Winnipeg Accessibility Design Standards ( [www.winnipeg.ca/ppd/Universal\\_Design.stm](http://www.winnipeg.ca/ppd/Universal_Design.stm) )(pass/fail);
  - (ii) 6 points - Layout of the play area for integration of the wheelchair accessible components to promote inclusive play;
  - (iii) 6 points – Provision of tactile and auditory play experiences.
  - (iv) 3 points – Layout of the play area for persons with visual impairment
- (d) Layout/circulation (maximum 22 points):
  - (i) 7 points - Flow and relationship between play area activities;
  - (ii) 6 points - Layout / orientation of components on Site and in relation to park entrances and seating areas;
  - (iii) 5 points – Orientation to provide good visibility to play area from adjacent roads;
  - (iv) 4 points – minimal amount of hollow plastic components to minimize vandalism
- (e) Durability (maximum 10 points):
  - (i) Use of durable / tamper-resistant materials, low maintenance finishes and connector systems & ease of repair / replacement of the products used with the playground area.

**B19. AWARD OF CONTRACT**

**B19.1** The City will give notice of the award of the Contract or will give notice that no award will be made.

**B19.2** The City will have no obligation to award a Contract to a Bidder, even though one or all of the Bidders are determined to be responsible and qualified, and the Bids are determined to be responsive.

**B19.2.1** Without limiting the generality of B19.2, the City will have no obligation to award a Contract where:

- (a) the prices exceed the available City funds for the Work;
- (b) the prices are materially in excess of the prices received for similar work in the past;
- (c) the prices are materially in excess of the City's cost to perform the Work, or a significant portion thereof, with its own forces;
- (d) only one Bid is received; or

(e) in the judgment of the Award Authority, the interests of the City would best be served by not awarding a Contract.

B19.3 Where an award of Contract is made by the City, the award shall be made to the responsible and qualified Bidder submitting the lowest evaluated responsive Bid, in accordance with B18.

B19.3.1 Following the award of contract, a Bidder will be provided with information related to the evaluation of his/her Bid upon written request to the Contract Administrator.

B19.4 Notwithstanding C4, the City may issue a Purchase Order to the successful Bidder in lieu of the execution of a Contract.

B19.5 The Contract, as defined in C1.1, in its entirety shall be deemed to be incorporated in and to form a part of the Purchase Order notwithstanding that it is not necessarily attached to or accompany said Purchase Order.

## PART C - GENERAL CONDITIONS

### C0. GENERAL CONDITIONS

- C0.1 The *General Conditions for Construction* (Revision 2006 12 15) are applicable to the Work of the Contract.
- C0.1.1 The *General Conditions for Construction* are available on the Information Connection page at The City of Winnipeg, Corporate Finance, Materials Management Division website at [http://www.winnipeg.ca/matmgt/gen\\_cond.stm](http://www.winnipeg.ca/matmgt/gen_cond.stm)
- C0.2 A reference in the Bid Opportunity to a section, clause or subclause with the prefix “**C**” designates a section, clause or subclause in the *General Conditions for Construction*.

## **PART D - SUPPLEMENTAL CONDITIONS**

### **GENERAL**

#### **D1. GENERAL CONDITIONS**

D1.1 In addition to the *General Conditions for Construction*, these Supplemental Conditions are applicable to the Work of the Contract.

#### **D2. SCOPE OF WORK**

D2.1 The Work to be done under the Contract shall consist of supply and installation of play equipment, playground curb edge, safety surfacing, and pathway and site furniture

D2.2 The major components of the Work are as follows:

- (a) Play equipment;
- (b) Engineered Wood Fibre (EWF) safety surfacing;
- (c) Playground curb edge;
- (d) Limestone path;
- (e) Site furniture; and
- (f) Sodding

#### **D3. CONTRACT ADMINISTRATOR**

D3.1 The Contract Administrator is McGowan Russell Group, represented by:

Aaron Hirota  
Senior Landscape Architect  
Telephone No. 204 956-0396  
Email ahirota@mcgowanrussell.com

D3.2 At the pre-construction meeting, Mr. Hirota will identify additional personnel representing the Contract Administrator and their respective roles and responsibilities for the Work.

D3.3 Bids Submissions must be submitted to the address in B8.5.

#### **D4. CONTRACTOR'S SUPERVISOR**

D4.1 At the pre-construction meeting, the Contractor shall identify his/her designated supervisor and any additional personnel representing the Contractor and their respective roles and responsibilities for the Work.

#### **D5. OWNERSHIP OF INFORMATION, CONFIDENTIALITY AND NON DISCLOSURE**

D5.1 The Contract, all deliverables produced or developed, and information provided to or acquired by the Contractor are the property of the City and shall not be appropriated for the Contractors own use, or for the use of any third party.

D5.2 The Contractor shall not make any public announcements or press releases regarding the Contract, without the prior written authorization of the Contract Administrator.

D5.3 The following shall be confidential and shall not be disclosed by the Contractor to the media or any member of the public without the prior written authorization of the Contract Administrator;

- (a) information provided to the Contractor by the City or acquired by the Contractor during the course of the Work;

- (b) the Contract, all deliverables produced or developed; and
- (c) any statement of fact or opinion regarding any aspect of the Contract.

D5.4 A Contractor who violates any provision of D5 may be determined to be in breach of Contract.

## **D6. NOTICES**

D6.1 Except as provided for in C23.2.2, all notices, requests, nominations, proposals, consents, approvals, statements, authorizations, documents or other communications to the Contractor shall be sent to the address or facsimile number identified by the Contractor in Paragraph 2 of Form A: Bid.

D6.2 All notices, requests, nominations, proposals, consents, approvals, statements, authorizations, documents or other communications to the City, except as expressly otherwise required in D6.3, D6.4 or elsewhere in the Contract, shall be sent to the attention of the Contract Administrator at the facsimile number identified in D3.1.

D6.3 Notwithstanding C21., all notices of appeal to the Chief Administrative Officer shall be sent to the attention of the Chief Financial Officer at the following facsimile number:

The City of Winnipeg  
Chief Financial Officer

Facsimile No.: 204 949-1174

D6.4 All notices, requests, nominations, proposals, consents, approvals, statements, authorizations, documents or other communications required to be submitted or returned to the City Solicitor shall be sent to the following facsimile number:

The City of Winnipeg  
Legal Services Department  
Attn: Director of Legal Services

Facsimile No.: 204 947-9155

D6.5 **Bids Submissions** must be submitted to the address in B8.5.

## **SUBMISSIONS**

### **D7. AUTHORITY TO CARRY ON BUSINESS**

D7.1 The Contractor shall be in good standing under The Corporations Act (Manitoba), or properly registered under The Business Names Registration Act (Manitoba), or otherwise properly registered, licensed or permitted by law to carry on business in Manitoba, or if the Contractor does not carry on business in Manitoba, in the jurisdiction where the Contractor does carry on business, throughout the term of the Contract, and shall provide the Contract Administrator with evidence thereof upon request.

### **D8. SAFE WORK PLAN**

D8.1 The Contractor shall provide the Contract Administrator with a Safe Work Plan at least five (5) Business Days prior to the commencement of any Work on the Site but in no event later than the date specified in C4.1 for the return of the executed Contract.

D8.2 The Safe Work Plan should be prepared and submitted in the format shown in the City's template which is available on the Information Connection page at The City of Winnipeg, Corporate Finance, Materials Management Division website at <http://www.winnipeg.ca/matmgt/Safety/default.stm>

## **D9. INSURANCE**

D9.1 The Contractor shall provide and maintain the following insurance coverage:

- (a) commercial general liability insurance, in the amount of at least two million dollars (\$2,000,000.00) inclusive, with The City of Winnipeg added as an additional insured, with a cross-liability clause, such liability policy to also contain contractual liability, unlicensed motor vehicle liability, non-owned automobile liability and products and completed operations, to remain in place at all times during the performance of the Work and throughout the warranty period;
- (b) if applicable, Automobile Liability Insurance covering all motor vehicles, owned and operated and used or to be used by the Contractor directly or indirectly in the performance of the Work. The Limit of Liability shall not be less than \$2,000,000 inclusive for loss or damage including personal injuries and death resulting from any one accident or occurrence;
- (c) all risks installation floater, carrying adequate limits to cover all machinery, equipment, supplies and/or materials intended to enter into and form part of any installation.

D9.2 Deductibles shall be borne by the Contractor.

D9.3 The Contractor shall provide the Contract Administrator with a certificate(s) of insurance, in a form satisfactory to the City Solicitor, at least two (2) Business Days prior to the commencement of any Work but in no event later than seven (7) Calendar Days from notification of the award of Contract by Purchase Order.

D9.4 The Contractor shall not cancel, materially alter, or cause each policy to lapse without providing at least thirty (30) Calendar Days prior written notice to the Contract Administrator.

## **D10. PERFORMANCE SECURITY**

D10.1 If the Contract Price exceeds twenty-five thousand dollars (\$25,000.00), the Contractor shall provide and maintain performance security until the expiration of the warranty period in the form of:

- (a) a performance bond of a company registered to conduct the business of a surety in Manitoba, in the form attached to these Supplemental Conditions (Form H1: Performance Bond), in the amount of fifty percent (50%) of the Contract Price; or
- (b) an irrevocable standby letter of credit issued by a bank or other financial institution registered to conduct business in Manitoba and drawn on a branch located in Winnipeg, in the form attached to these Supplemental Conditions (Form H2: Irrevocable Standby Letter of Credit), in the amount of fifty percent (50%) of the Contract Price; or
- (c) a certified cheque or draft payable to "The City of Winnipeg", drawn on a bank or other financial institution registered to conduct business in Manitoba, in the amount of fifty percent (50%) of the Contract Price.

D10.1.1 Where the performance security is in the form of a certified cheque or draft, it will be deposited by the City. The City will not pay any interest on certified cheques or drafts furnished as performance security.

D10.2 The Contractor shall provide the City Solicitor with the required performance security within seven (7) Calendar Days of notification of the award of the Contract by way of Purchase Order and prior to the commencement of any Work on the Site.

## **D11. SUBCONTRACTOR LIST**

D11.1 The Contractor shall provide the Contract Administrator with a complete list of the Subcontractors whom the Contractor proposes to engage (Form J: Subcontractor List) at least two (2) Business Days prior to the commencement of any Work on the Site but in no event later than seven (7) Calendar Days from notification of the award of Contract.

## **D12. DETAILED WORK SCHEDULE**

- D12.1 The Contractor shall provide the Contract Administrator with a detailed work schedule at least two (2) Business Days prior to the commencement of any Work on the Site but in no event later than the date specified in C4.1 for the return of the executed Contract.
- D12.2 The detailed work schedule shall consist of the following:
- (a) a critical path method (C.P.M.) schedule for the Work;
  - (b) a Gantt chart for the Work based on the C.P.M. schedule;
  - (c) a daily manpower schedule for the Work;
- all acceptable to the Contract Administrator.
- D12.3 Further to D12.2(a), the C.P.M. schedule shall clearly identify the start and completion dates of all of the following activities/tasks making up the Work as well as showing those activities/tasks on the critical path.
- D12.4 Further to D12.2(b), the Gantt chart shall show the time on a weekly basis, required to carry out the Work of each trade, or specification division. The time shall be on the horizontal axis, and the type of trade shall be on the vertical axis.
- D12.5 Further to D12.2(c), the daily manpower schedule shall list the daily number of individuals on the Site for each trade.

## **SCHEDULE OF WORK**

### **D13. COMMENCEMENT**

- D13.1 The Contractor shall not commence any Work until he/she is in receipt of a Purchase Order from the Award Authority authorizing the commencement of the Work.
- D13.2 The Contractor shall not commence any Work on the Site until:
- (a) the Contract Administrator has confirmed receipt and approval of:
    - (i) evidence of authority to carry on business specified in D7;
    - (ii) evidence of the workers compensation coverage specified in C6.15;
    - (iii) the Safe Work Plan specified in D8;
    - (iv) evidence of the insurance specified in D9;
    - (v) the performance security specified in D10;
    - (vi) the Subcontractor list specified in D11; and
    - (vii) the detailed work schedule specified in D12.
  - (b) the Contractor has attended a pre-construction meeting with the Contract Administrator, or the Contract Administrator has waived the requirement for a pre-construction meeting.
- D13.3 The Contractor shall commence the Work on the Site within seven (7) Working Days of receipt of the Purchase Order.

### **D14. SUBSTANTIAL PERFORMANCE**

- D14.1 The Contractor shall achieve Substantial Performance within twenty (20) consecutive Working Days of the commencement of the Work as specified in D13.
- D14.2 When the Contractor considers the Work to be substantially performed, the Contractor shall arrange, attend and assist in the inspection of the Work with the Contract Administrator for purposes of verifying Substantial Performance. Any defects or deficiencies in the Work noted during that inspection shall be remedied by the Contractor at the earliest possible instance and the Contract Administrator notified so that the Work can be reinspected.

D14.3 The date on which the Work has been certified by the Contract Administrator as being substantially performed to the requirements of the Contract through the issue of a certificate of Substantial Performance is the date on which Substantial Performance has been achieved.

#### **D15. TOTAL PERFORMANCE**

D15.1 The Contractor shall achieve Total Performance within twenty five (25) consecutive Working Days of the commencement of the Work as specified in D13.

D15.2 When the Contractor or the Contract Administrator considers the Work to be totally performed, the Contractor shall arrange, attend and assist in the inspection of the Work with the Contract Administrator for purposes of verifying Total Performance. Any defects or deficiencies in the Work noted during that inspection shall be remedied by the Contractor at the earliest possible instance and the Contract Administrator notified so that the Work can be reinspected.

D15.3 The date on which the Work has been certified by the Contract Administrator as being totally performed to the requirements of the Contract through the issue of a certificate of Total Performance is the date on which Total Performance has been achieved.

#### **D16. LIQUIDATED DAMAGES**

D16.1 If the Contractor fails to achieve Substantial Performance in accordance with the Contract by the day fixed herein for Substantial Performance, the Contractor shall pay the City one thousand dollars (\$1,000.00) per Working Day for each and every Working Day following the day fixed herein for Substantial Performance during which such failure continues.

D16.2 The amount specified for liquidated damages in D16.1 is based on a genuine pre-estimate of the City's damages in the event that the Contractor does not achieve Substantial Performance by the day fixed herein for same.

D16.3 The City may reduce any payment to the Contractor by the amount of any liquidated damages assessed.

#### **D17. SCHEDULED MAINTENANCE**

D17.1 The Contractor shall perform the following scheduled maintenance in the manner and within the time periods required by the Specifications:

(a) Topsoil and sod as specified in E28.

D17.2 Determination of Substantial Performance and Total Performance shall be exclusive of scheduled maintenance identified herein. All scheduled maintenance shall be completed prior to the expiration of the warranty period. Where the scheduled maintenance cannot be completed during the warranty period, the warranty period shall be extended for such period of time as it takes the Contractor to complete the scheduled maintenance.

### **CONTROL OF WORK**

#### **D18. JOB MEETINGS**

D18.1 Regular weekly job meetings will be held at the Site. These meetings shall be attended by a minimum of one representative of the Contract Administrator, one representative of the City and one representative of the Contractor. Each representative shall be a responsible person capable of expressing the position of the Contract Administrator, the City and the Contractor respectively on any matter discussed at the meeting including the Work schedule and the need to make any revisions to the Work schedule. The progress of the Work will be reviewed at each of these meetings.

D18.2 The Contract Administrator reserves the right to cancel any job meeting or call additional job meetings whenever he/she deems it necessary.

**D19. PRIME CONTRACTOR – THE WORKPLACE SAFETY AND HEALTH ACT (MANITOBA)**

D19.1 Further to C6.24, the Contractor shall be the Prime Contractor and shall serve as, and have the duties of the Prime Contractor in accordance with The Workplace Safety and Health Act (Manitoba).

**D20. THE WORKPLACE SAFETY AND HEALTH ACT (MANITOBA) – QUALIFICATIONS**

D20.1 Further to B12.4, the Contractor/Subcontractor must, throughout the term of the Contract, have a Workplace Safety and Health Program meeting the requirements of The Workplace Safety and Health Act (Manitoba). At any time during the term of the Contract, the City may, at its sole discretion and acting reasonably, require updated proof of compliance, as set out in B12.4.

**MEASUREMENT AND PAYMENT**

**D21. INVOICES**

D21.1 Further to C12, the Contractor shall submit an invoice for each portion of Work performed. to:

The City of Winnipeg  
Corporate Finance - Accounts Payable  
4th Floor, Administration Building, 510 Main Street  
Winnipeg MB R3B 1B9

Facsimile No.: 204-949-0864

Email: [CityWpgAP@winnipeg.ca](mailto:CityWpgAP@winnipeg.ca)

D21.2 Invoices must clearly indicate, as a minimum:

- (a) the City's purchase order number;
- (b) date of delivery;
- (c) delivery address;
- (d) type and quantity of work performed;
- (e) the amount payable with GST and MRST shown as separate amounts; and
- (f) the Contractor's GST registration number.

D21.3 The City will bear no responsibility for delays in approval of invoices which are improperly submitted.

D21.4 Bids Submissions must be submitted to the address in B8.5.

**D22. PAYMENT**

D22.1 Further to C12, the City may at its option pay the Contractor by direct deposit to the Contractor's banking institution.

**WARRANTY**

**D23. WARRANTY**

D23.1 Warranty is as stated in C13.

**FORM H1: PERFORMANCE BOND**  
(See D10)

KNOW ALL MEN BY THESE PRESENTS THAT

\_\_\_\_\_ ,  
(hereinafter called the "Principal"), and

\_\_\_\_\_ ,  
(hereinafter called the "Surety"), are held and firmly bound unto **THE CITY OF WINNIPEG** (hereinafter called the "Obligee"), in the sum of

\_\_\_\_\_ dollars (\$\_\_\_\_\_)

of lawful money of Canada to be paid to the Obligee, or its successors or assigns, for the payment of which sum the Principal and the Surety bind themselves, their heirs, executors, administrators, successors and assigns, jointly and severally, firmly by these presents.

WHEREAS the Principal has entered into a written contract with the Obligee for

BID OPPORTUNITY NO. 598-2015

KING GEORGE V PLAYGROUND UPGRADES

which is by reference made part hereof and is hereinafter referred to as the "Contract".

NOW THEREFORE the condition of the above obligation is such that if the Principal shall:

- (a) carry out and perform the Contract and every part thereof in the manner and within the times set forth in the Contract and in accordance with the terms and conditions specified in the Contract;
- (b) perform the Work in a good, proper, workmanlike manner;
- (c) make all the payments whether to the Obligee or to others as therein provided;
- (d) in every other respect comply with the conditions and perform the covenants contained in the Contract; and
- (e) indemnify and save harmless the Obligee against and from all loss, costs, damages, claims, and demands of every description as set forth in the Contract, and from all penalties, assessments, claims, actions for loss, damages or compensation whether arising under "The Workers Compensation Act", or any other Act or otherwise arising out of or in any way connected with the performance or non-performance of the Contract or any part thereof during the term of the Contract and the warranty period provided for therein;

THEN THIS OBLIGATION SHALL BE VOID, but otherwise shall remain in full force and effect. The Surety shall not, however, be liable for a greater sum than the sum specified above.

AND IT IS HEREBY DECLARED AND AGREED that the Surety shall be liable as Principal, and that nothing of any kind or matter whatsoever that will not discharge the Principal shall operate as a discharge or release of liability of the Surety, any law or usage relating to the liability of Sureties to the contrary notwithstanding.

IN WITNESS WHEREOF the Principal and Surety have signed and sealed this bond the

\_\_\_\_\_ day of \_\_\_\_\_, 20\_\_\_\_ .

**SIGNED AND SEALED**  
in the presence of:

\_\_\_\_\_  
(Witness as to Principal if no seal)

\_\_\_\_\_  
(Name of Principal)

Per: \_\_\_\_\_ (Seal)

Per: \_\_\_\_\_

\_\_\_\_\_  
(Name of Surety)

By: \_\_\_\_\_ (Seal)  
(Attorney-in-Fact)

**FORM H2: IRREVOCABLE STANDBY LETTER OF CREDIT  
(PERFORMANCE SECURITY)  
(See D10)**

\_\_\_\_\_  
(Date)

The City of Winnipeg  
Legal Services Department  
185 King Street, 3rd Floor  
Winnipeg MB R3B 1J1

RE: PERFORMANCE SECURITY - BID OPPORTUNITY NO. 598-2015  
KING GEORGE V PLAYGROUND UPGRADES

Pursuant to the request of and for the account of our customer,

\_\_\_\_\_  
(Name of Contractor)

\_\_\_\_\_  
(Address of Contractor)

WE HEREBY ESTABLISH in your favour our irrevocable Standby Letter of Credit for a sum not exceeding in the aggregate

\_\_\_\_\_ Canadian dollars.

This Standby Letter of Credit may be drawn on by you at any time and from time to time upon written demand for payment made upon us by you. It is understood that we are obligated under this Standby Letter of Credit for the payment of monies only and we hereby agree that we shall honour your demand for payment without inquiring whether you have a right as between yourself and our customer to make such demand and without recognizing any claim of our customer or objection by the customer to payment by us.

The amount of this Standby Letter of Credit may be reduced from time to time only by amounts drawn upon it by you or by formal notice in writing given to us by you if you desire such reduction or are willing that it be made.

Partial drawings are permitted.

We engage with you that all demands for payment made within the terms and currency of this Standby Letter of Credit will be duly honoured if presented to us at:

\_\_\_\_\_  
(Address)

and we confirm and hereby undertake to ensure that all demands for payment will be duly honoured by us.

All demands for payment shall specifically state that they are drawn under this Standby Letter of Credit.

Subject to the condition hereinafter set forth, this Standby Letter of Credit will expire on

\_\_\_\_\_  
(Date)

It is a condition of this Standby Letter of Credit that it shall be deemed to be automatically extended from year to year without amendment from the present or any future expiry date, unless at least 30 days prior to the present or any future expiry date, we notify you in writing that we elect not to consider this Standby Letter of Credit to be renewable for any additional period.

This Standby Letter of Credit may not be revoked or amended without your prior written approval.

This credit is subject to the Uniform Customs and Practice for Documentary Credit (2007 Revision), International Chamber of Commerce Publication Number 600.

\_\_\_\_\_  
(Name of bank or financial institution)

Per: \_\_\_\_\_  
(Authorized Signing Officer)

Per: \_\_\_\_\_  
(Authorized Signing Officer)





## PART E - SPECIFICATIONS

### GENERAL

#### E1. APPLICABLE SPECIFICATIONS AND DRAWINGS

- E1.1 These Specifications shall apply to the Work.
- E1.2 *The City of Winnipeg Standard Construction Specifications* in its entirety, whether or not specifically listed on Form B: Prices, shall apply to the Work.
- E1.2.1 *The City of Winnipeg Standard Construction Specifications* is available on the Information Connection page at The City of Winnipeg, Corporate Finance, Materials Management Division website at <http://www.winnipeg.ca/matmgt/Spec/Default.stm>
- E1.2.2 The version in effect three (3) Business Days before the Submission Deadline shall apply.
- E1.2.3 Further to C2.4(d), Specifications included in the Bid Opportunity shall govern over *The City of Winnipeg Standard Construction Specifications*.
- E1.3 The following are applicable to the Work:

<u>Drawing No.</u>	<u>Drawing Name/Title</u>
L1.0	King George V Playground Upgrades - Removals Plan
L1.1	King George V Playground Upgrades - Layout Plan
L1.2	King George V Playground Upgrades - Grading Plan
L2.0	King George V Playground Upgrades - Details
SCD-121A	Tache Bench Composite with Arms
SCD-154	Bilingual Park Sign with Address
SCD-643	Concrete play surface edging detail
SCD-645	Park Path Crushed Limestone
SCD-650	Engineered Wood Fibre Safety Surfacing Drainage Diagram
SCD-659	Multi-Flow Drainage

#### E2. HAZARDOUS MATERIALS

- E2.1 If asbestos or other hazardous materials are encountered during the Work of the Contract, the Contractor shall stop all work and notify the Contract Administrator immediately. Removal of hazardous materials shall be dealt with by the City and the Contractor shall await further instruction by the Contract Administrator.

#### E3. SITE CONDITION

- E3.1 The Contractor shall examine the Site and make themselves familiar with the existing conditions (both above and below grade) and nature of Work to be done.
- E3.2 Surface and sub-surface conditions shown on the Drawings and included herein are provided for general information and variations there from shall not affect the terms of the Contract.
- E3.3 The Contractor shall set all necessary control lines, benchmarks, survey, elevation stakes and layout in accordance with the individual Site conditions and in consultation with the Contract Administrator.

#### E4. LAYOUT OF WORKS

- E4.1 The Contractor will Work from layout information provided in the construction drawings and will be responsible to provide a full time experienced survey crew to layout and continuously check the locations and elevations of all components and paving of the Work included in this Contract.
- E4.2 The Contractor must provide all necessary survey equipment in good operating conditions.

- E4.3 The Contractor shall supply all materials (painting, stakes, ribbon, markers, etc) and labour necessary for the accurate location and setting out of the Work.
- E4.4 From time to time the Contract Administrator may have a survey crew on the Site, but they will check the Work done by the Contractor's survey personnel only. The checking of the Work by the City's surveyors will not relieve the Contractor of any responsibility of the correctness of the Work. Should any structure or paving or any part thereof be installed in any location other than that shown on the Drawings, then the error shall be rectified by the Contractor all at his own expense and at the satisfaction of, and in a manner specified by the Contract Administrator.
- E4.5 All costs associated with this item of Work shall be included in the unit prices bid for the supply and installation of the various items in the contract.

## **E5. PROTECTION OF THE SURVEY INFRASTRUCTURE**

- E5.1 Notwithstanding the "Protection of Survey Bars" of the Standard Provisions; Current legislation, The Surveys Act, places the onus on those undertaking construction to protect the Survey Infrastructure from damage as a result of their activity.
- E5.2 At least 72 hours prior to the commencement of the On-Site Work the Contractor shall contact the City of Winnipeg, Geomatics Services Branch at 918-1360 (8:00 am to 4:00 pm Monday to Friday excluding holidays) to obtain underground clearance. Geomatics Services will locate and mark all known outline survey monuments and geodetic control monuments and confirm the physical condition of those monuments upon completion of construction, at no cost to the Contractor.
- E5.3 Where a survey post, bar or control monument lies in the line of the proposed Work and must be disturbed, the Contractor shall provide the Contract Administrator with 48 hours notice to permit referencing for future replacement, at no cost to the Contractor. Failure to provide the specified notice shall result in the Contractor paying for all costs associated with replacing or relocating the disturbed outline survey monuments and geodetic control monuments.
- E5.4 Survey monuments and geodetic control monuments at or adjacent to the Site, not in the line of the proposed construction that are damaged or disturbed by the Contractor shall be replaced or relocated by the City or its agent and all associated costs shall be paid for by the Contractor. An approximate estimate of the costs involved to restore a legal survey monument is \$1,000 per bar and \$3,000 per control monument. Contractors must ensure their landscaping and other subcontractors are aware of this clearance procedure and the potential restoration costs.
- E5.5 Where possible, amounts owed to the City in accordance with the above will be deducted from any payments to be made by the City to the Contractor.

## **E6. PEDESTRIAN SAFETY AND TRAFFIC MANAGEMENT**

- E6.1 Further to CW 1130, the Contractor shall take such measures as are necessary to ensure safe and convenient pedestrian ingress and egress is maintained to private properties while he is Working near them. Any damage caused by the negligence of the Contractor or his Sub-Contractors to the adjacent Works or properties, shall be promptly repaired by him at his own expense, to the satisfaction of the Contract Administrator.
- E6.2 Ambulance/ Emergency vehicle access must be maintained at all times.

## **E7. CONSTRUCTION FACILITIES AND STAGING**

- E7.1 The Contractor shall be responsible for providing his own storage area for storage and handling of all his construction operations. The use of public right-of-ways will not be allowed.

**E8. ALL-WEATHER DUMP SITE**

E8.1 The Contractor shall have access to an all-weather dump site throughout the duration of the project. Prior to the start of construction, the Contractor shall provide the Contract Administrator with details in regards to the location of the all-weather dump site.

**E9. SURFACE RESTORATIONS**

E9.1 The Contractor shall temporarily repair any Work commenced and not completed in the 2015 construction season to the satisfaction of the Contract Administrator. The Contractor shall maintain the temporary repairs in a safe condition as determined by the Contract Administrator until permanent repairs are completed. The Contractor shall bear all costs associated with temporary repairs and their maintenance.

**E10. TEMPORARY RELOCATION OF AFFECTED STRUCTURES**

E10.1 The Contractor shall temporarily relocate any portable structure such as benches, waste receptacles, picnic benches, etc., which will interfere with the construction of the Work and are not identified as items to be relocated. The Contractor Administrator will identify the temporary locations for the portable structures. Following the completion of the applicable Work the Contractor shall replace the structures to the locations designated by the Contract Administrator. These relocations shall be considered incidental to the associated Works and no separate measurement for payment will be made.

**E11. TRUCK WEIGHT LIMITS**

E11.1 The City shall not pay for any portion of Material which results in the vehicle exceeding the maximum gross vehicle weight allowed under *The City of Winnipeg Traffic By-Law*, unless such vehicle is operating under special permit.

**E12. ACCESS**

E12.1 All access is to be on the designated routes through the Site. These routes will be determined at the Pre-Construction Meeting.

E12.2 Access to the Site as required by the Contractor shall be provided and maintained by the Contractor at his own expense and approved by the Contract Administrator.

E12.3 The Contractor's operations shall be limited to the minimum area necessary for undertaking the Work and he shall be responsible for all damage resulting from his Work on private property. The Contractor shall take such measures as are necessary to ensure safe and convenient pedestrian ingress and egress in maintained to private properties while he is working near them. Any damage caused by the negligence of the Contractor or his Sub-Contractors to the adjacent Works or properties, shall be promptly repaired by him at his own expense, to the satisfaction of the Contract Administrator.

E12.4 All necessary precautions shall be exercised by the Contractor so as not to remove, disturb, or damage any existing trees, shrubs, sod, pavements, streets, roads, boulevards, poles, hydrants, water pipes, gas pipes, electrical wires, cables, conduits, sewers or other existing facilities and equipment at the Site of the Work. For all damage incurred in the performance of the Work (either directly or indirectly), the Contractor shall either replace and repair such damage, whichever may be deemed necessary in the opinion of, and acceptable to, the Contract Administrator and the cost of which shall be borne entirely by the Contractor.

**E13. EXISTING UNDERGROUND SERVICES**

E13.1 The Contractor's attention is drawn to the existing underground lines or services that may be located in the area of the Work.

- E13.2 The Contractor shall take all necessary precautions when performing the Work to ensure that no damage is done to these existing services.
- E13.3 No responsibility will be assumed by the City for correctness or completeness of the Drawings, when provided, with respect to the existing utilities, pipes or other objects either underground or on the surface, shall not be liable for the incorrectness and inadequacy thereof. It shall be the responsibility of the Contractor to determine the location of all such utilities, pipes and other objects and to make good any damage done to them.
- E13.4 All costs in connection with this item including location of the existing service, repairs to any existing services damaged by the construction operation, etc. shall be included in the unit prices bid for supply and installation of the items included under this Contract.
- E13.5 The Contractor will be required to make his own arrangements in connection with the temporary use of lighting, power, gas, sewer, water or other utilities, and pay all costs in connection therewith.
- E13.6 All necessary permits, fees and other like expenses as well as the cost of temporary connections to existing facilities shall be arranged and paid for by the Contractor.

#### **E14. EXPOSING EXISTING UNDERGROUND SERVICES AND UTILITIES**

- E14.1 The exact location and depth of some of the existing underground services and utilities within the project limits are unknown.
- E14.2 Therefore, the Contractor shall supply all labour, equipment and materials required to expose all underground services and/or utilities sufficiently far enough in advance of the proposed Works to permit the Contract Administrator where necessary, to adjust the alignment and grade to avoid existing lines and ducts.
- E14.3 All costs in connection with this item of Work shall be included in the unit price bid for the various bid items.

#### **E15. EXISTING CURB STOP BOXES**

- E15.1 During the removal and installation of the concrete sidewalk, and unit paving, the Contractor shall take all necessary precautions when Working in the vicinity of any existing curb stop boxes.
- E15.2 All existing curb stop boxes not in use as determined by the Contract Administrator shall be abandoned by removing existing curb stop boxes. All costs associated with the abandoning of curb stop boxes are incidental
- E15.3 Any existing curb boxes requiring final adjustments (horizontal and/or vertical) are incidental.
- E15.4 Any curb stop boxes damaged as a result of the Contractor's operation shall be replaced at his own cost.

#### **E16. MATCHING EXISTING GRADES**

- E16.1 Wherever the proposed paving, or sod meets existing pathway/pavement, curb edge, or property line, the Contractor shall construct the proposed element to an acceptable grade, as directed by the Contract Administrator, to ensure that proper drainage and accessibility are maintained.

#### **E17. DAMAGE TO EXISTING STRUCTURES, TREES AND PROPERTY**

- E17.1 All necessary precautions shall be exercised by the Contractor so as not to remove, disturb, or damage any existing buildings, trees, shrubs, sod, pavements, streets, roads, boulevards, poles, hydrants, water pipes, gas pipes, electrical wires, cables, conduits, sewers or other

existing facilities and equipment at the Site of the Work. For all damage incurred in the performance of the Work (either directly or indirectly), the Contractor shall either replace and repair such damage, whichever may be deemed necessary in the opinion of, and acceptable to City of Winnipeg Contract Administrator, and the cost of which shall be borne entirely by the Contractor. The Contractor shall also indemnify and save harmless the City from all claims made directly or indirectly against it in respect to any such damage.

- E17.2 The Contractor shall take the following precautionary steps to prevent damage from construction activities to existing street trees within the limits of the construction area:
- (a) The Contractor shall not stockpile materials and soil or park vehicles and equipment within 2 metres of trees.
  - (b) Trees identified to be at risk by the Contract Administrator are to be strapped with 25x100x2400 wood planks, or suitable protected as approved by the Contract Administrator.
  - (c) Excavation shall be performed in a manner that minimizes damage to the existing root systems. Where possible, excavation shall be carried out such that the edge of the excavation shall be a minimum of 1.5 times the diameter (measured in inches), with the outcome read in feet, from the closest edge of the trunk. Where roots must be cut to facilitate excavation, they shall be pruned neatly at the face of excavation.
  - (d) Operation of equipment within the drip line of the trees shall be kept to a minimum required to perform the Work required. Equipment shall not be parked, repaired, refuelled; construction materials shall not be stored, and earth materials shall not be stockpiled within the drip lines of trees. The drip line of a tree shall be considered to be the ground surface directly beneath the tips of its outermost branches. The Contractor shall ensure that the operations do not cause flooding or sediment deposition on areas where trees are located.
- E17.3 All damage to existing trees caused by the Contractor's activities shall be repaired to the requirements and satisfaction of the Contract Administrator and the City Forester or his/her designate.
- E17.4 No separate measurement or payment will be made for the protection of trees.

## **E18. PERMITS, NOTICES, LICENCES, CERTIFICATIONS, LAWS, AND RULES**

- E18.1 The Contractor shall give all necessary notices, obtain all necessary permits and pay all fees in order that the Work may be carried out. The Contractor shall submit all plans required by any inspection authority and obtain approval of same before proceeding with the Work, and pay any cost attached to the inspection of such plans.
- E18.2 The Site Development Permits (including lot grading and damage deposits) will be obtained and paid for by the City of Winnipeg Planning, Property and Development Department prior to commencement of construction. A copy of this permit will be provided to the Contractor upon award of Contract.
- E18.3 The Contractor shall comply with all laws, ordinances, rules, and regulations that would relate to the Works.

## **E19. SITE ENCLOSURES**

- E19.1 Temporary Site enclosures, as determined necessary at the pre-construction meeting, shall be erected and maintained as required for the duration of the construction period.
- E19.2 Site enclosures shall be considered incidental to the Contract Work.

## **E20. SITE RESTORATION**

- E20.1 Total Performance of the Work shall not be attained until the Contractor has cleaned up the Site and has removed all tools, equipment, waste, debris and surplus foundation earth to the

satisfaction of the Contract Administrator. Unless otherwise specified, the Contractor shall restore all areas of the Site beyond the established limit of Work, which have been disturbed by the Contractor's operations to as good as or better than the original condition to the satisfaction of the Contract Administrator. The Contractor shall pay all costs associated with this Work.

## **E21. EXCAVATION, REMOVALS, AND GRADING**

### **E21.1 DESCRIPTION**

E21.1.1 This specification shall amend and supplement CW 3110 and CW 3170. It shall cover the excavation and legal disposal of existing sand safety surfacing; excavation for new pathways and new play areas; and site grading as per Drawings.

E21.1.2 All extraneous materials are to be removed from the Site and disposed of in a safe and legal manner.

- (a) The Work to be done by the Contractor under this specification shall include all labour, equipment and material necessary for and incidental to the satisfactory performance and completion of the Work herein specified.

E21.1.3 This Specification shall cover the removal of and disposal of all existing site elements, to build all work as shown on the Drawings, including, but not limited to:

- (a) Limestone path and associated base material as required;
- (b) Existing pea gravel and sand safety surfacing;
- (c) Existing earth and sod material.

E21.1.4 The Work to be done by the Contractor under this Specification shall include the furnishing of all superintendence, overhead, labour, equipment, tools, supplies and all other things necessary for and incidental to the satisfactory performance and completion of all Work hereinafter specified.

### **E21.2 EQUIPMENT**

E21.2.1 All equipment shall be of a type approved by the Contract Administrator and shall be kept in good Working order.

### **E21.3 CONSTRUCTION METHODS**

E21.3.1 Excavation includes the removal of items (i.e. sand, earth) as indicated on the Drawings and as directed by the Contract Administrator. Work includes the satisfactory disposal of unsuitable Site material such as clays susceptible to frost-heaving, silts, rock, rubble, rubbish and any surplus suitable Site material.

- (a) Stockpile suitable, approved material on Site for reuse (clean topsoil, clean earth fill) in a secure location. Remove and dispose of unsuitable material.
- (b) Disposal of material shall be understood to mean the hauling of all unsuitable material from the Site and the unloading in a legal manner acceptable to the Contract Administrator. If arrangements are made in advance excavated material may be disposed of on Site at a location designated by the Contract Administrator.
- (c) Contractor must coordinate with the Contract Administrator to ensure all removals have occurred.
- (d) Excavation should be coordinated with the installation of play equipment and safety surfacing so as not to leave an open excavation area subject to ponding water.
- (e) Excavate to the limits shown and as necessary to achieve finish grades as indicated on the Drawings:
  - (i) New Play Areas – depth to accommodate required safety surfacing based on proposed play equipment, in accordance with Drawings and per E24;
  - (ii) New Limestone Path 175 mm depth, in accordance with Drawings and per E22; and

- (iii) New topsoil and sod in accordance with Drawings and per E27, 28.

E21.3.2 Site Grading shall be as per Drawings.

- (a) The Contractor must ensure that the rough grading does not create tripping hazards and no areas of standing water remain. The mud grade of all excavated play areas must drain towards the subsurface drainage piping.

E21.3.3 Do not disturb adjacent items designated to remain in place.

#### E21.4 MEASUREMENT AND PAYMENT

E21.4.1 Method of Measurement shall be as follows:

- (a) Excavation will be measured on a square metre basis for:
  - (i) Item #1 "Remove and dispose of existing earth and safety surfacing for new pathway and play areas" on Form B: Prices.
- (b) The bidder must indicate for Item #1 on Form B: Prices the required quantity of units, dependent on the submission.

E21.4.2 Method of Payment shall be as follows:

- (a) Excavation, Removals and Grading will be paid for at the Contract Unit Prices. The amount to be paid for shall be the total number of units, as indicated on Form B: Prices. This price shall be full payment for supplying all labour, equipment and materials, and performing all operations herein described and all other items incidental to the Work and as accepted by the Contract Administrator.

E21.4.3 No payment will be made the Excavation and Grading for the new limestone path and base material as these items are incidental to E22.

### **E22. PARK PATH CRUSHED LIMESTONE**

#### E22.1 GENERAL DESCRIPTION

E22.1.1 The Work of this section comprises the furnishing of all labour, equipment and materials required to complete the supply and installation of limestone path as shown on the Drawings and as per SCD-645 and as hereinafter specified, including, but not necessarily confined to the excavation and removal of existing topsoil and sod, placement of base materials and limestone surface material.

#### E22.2 EXCAVATION

##### E22.2.1 DESCRIPTION

- (a) This specification shall be done in accordance the City of Winnipeg's Standard Construction Specification CW 3110- "Sub-Grade, Sub-Base and Base Course Construction" and as per SCD-645.
- (b) Excavation shall be understood to include all removal of existing in-situ material necessary to achieve finished grade and as indicated on Drawings, all in accordance with E21.

##### E22.2.2 CONSTRUCTION METHODS

- (a) Excavation shall be performed as outlined in CW 3310 – Item 3.2 "Excavation".
- (b) If any pavement exists at the limits of the designated area of removal, these shall be saw cut for the full depth of the pavement prior to the demolition and removal operations. All costs in connection with saw cutting are incidental and shall be included in the unit price bid for excavation.
- (c) All excavated material shall be removed, hauled, and legally disposed of off-site to the satisfaction of the Contract Administrator.

#### E22.3 SUB-BASE COMPACTION

#### E22.3.1 DESCRIPTION

- (a) This specification shall be done in accordance the City of Winnipeg's Standard Construction Specification CW 3110– “Sub-Grade, Sub-Base and Base Course Construction” and as per SCD-645.

#### E22.3.2 CONSTRUCTION METHODS

- (a) Sub-grade compaction shall be performed as outlined in CW 3110 item 3.3 “Preparation of Sub-Grade and Placement of Sub-Base Material”.
- (b) Sub-grade shall be free of any fibrous organics, softened and disturbed soil. The prepared sub-grade shall be proof rolled with a heavy sheep’s foot roller (min 25 passes) and inspected by the Contract Administrator to detect for any soft spots prior to the placement of overlying granular fills.

#### E22.4 GEOTEXTILE FABRIC

##### E22.4.1 DESCRIPTION

- (a) This specification shall be done in accordance the City of Winnipeg's Standard Construction Specification CW 3130 – “Supply and Installation of Geotextile Fabrics`.

##### E22.4.2 MATERIALS

- (a) The separation/ reinforcement geotextile fabric shall be **Non-Woven** and conform to the Products Approved as listed in City of Winnipeg Specification for Approved Products for Surface Works.

##### E22.4.3 CONSTRUCTION METHODS

- (a) Separation Reinforcement geotextile fabric shall be installed as outlined in CW 3110 item 3.1 ``Separation Reinforcement Geotextile Fabric``.
- (b) All limestone sub-base material shall be placed and compacted as specified to a finished thickness as per City of Winnipeg Specifications.

#### E22.5 CRUSHED LIMESTONE BASE COURSE MATERIAL

##### E22.5.1 DESCRIPTION

- (a) Crushed limestone base material shall be supplied and installed in accordance with City of Winnipeg’s Standard Construction Specification CW 3110 “Sub-Grade, Sub-Base and Base Course Construction”.

##### E22.5.2 MATERIALS

- (a) Base: 150mm (6``) of 20mm (3/4”) down crushed limestone as per SCD-645.

##### E22.5.3 CONSTRUCTION METHODS

- (a) Crushed limestone base material shall be supplied and installed as outlined in CW 3110 item 3.4 ``Placement of Sub-Base, Sub-Base Material with Geotextile Fabric``.
- (b) All limestone base course material shall be placed and compacted as specified to finished thickness as shown on the Drawings

#### E22.6 CRUSHED LIMESTONE SURFACE MATERIAL

##### E22.6.1 DESCRIPTION

- (a) Crushed limestone surface material shall be supplied and installed in accordance with City of Winnipeg’s Standard Construction Specification CW 3110 “Sub-Grade, Sub-Base and Base Course Construction”.

##### E22.6.2 MATERIALS

- (a) Surface material: 25mm (1``) of 6mm (1/4”) down crushed limestone as per SCD-645.

##### E22.6.3 CONSTRUCTION METHODS

- (a) Crushed limestone surface material shall be supplied and installed as outlined in CW 3150 item 3.2 ``Gravel Surfacing``.
- (b) All limestone surface course material shall be placed and compacted as specified to finished thickness as per City of Winnipeg Specifications.

## E22.7 MEASUREMENT AND PAYMENT

- E22.7.1 Limestone pathway and base material shall be measured and payment made on the contract unit price per square metre for "Supply and install limestone pathway". The area to be paid for shall be the total number of square metres placed in accordance with this Specification and the Construction Drawings, as determined by the Contract Administrator.

## E23. CAST-IN-PLACE CONCRETE

### E23.1 GENERAL DESCRIPTION

- E23.1.1 The Work of this section comprises the furnishing of all labour, equipment and materials required to complete the supply and installation of cast-in-place concrete playground curb edge and footings for Site furniture as shown on the drawings and as hereinafter specified, including, but not necessarily confined to the following:

- (a) Excavation
- (b) Granular Fill Work as required
- (c) Supply, erection and removal of all formwork as required
- (d) Design of concrete mixes
- (e) Supply, placing and curing of bases for benches and waste receptacle
- (f) Supply, placing and curing of bases for play equipment
- (g) Supply and installation of all joint material in concrete Work.
- (h) Supply and Installation of compacted granular base courses not supplied by other sections.
- (i) Clean-up.

- E23.1.2 The following items of Work are specified under other sections of the specifications and are not included in this section:

- (a) Supply of miscellaneous metal anchors, bolts, inserts, etc.

### E23.2 MATERIALS

- E23.2.1 All concrete Work shall be in accordance with CAN3-A23.1-Concrete Materials and Methods of Concrete Constrictions. Proportion normal density concrete in accordance with CAN3-A23.1 to govern the following properties.

- E23.2.2 Concrete for cast-in-place concrete curb and play equipment bases as follows:

Cement: Type 50  
Max. Coarse Aggregate: 20mm  
Min Compressive Strength at 28 days = 30 Mpa  
Min. Cement Content: 310 kg/cu.m  
Max. Water Cement Ratio: 0.45  
Class of Exposure: S-2  
Max. Slump: 90mm ± 20mm  
Air Content: 4 to 7%  
Flyash content: Max 15% of Cementitious Material

- E23.2.3 Fine aggregate shall consist of natural sand or manufactured sand and shall conform to all requirements of CAN3.A23.1.

- E23.2.4 Coarse aggregate shall consist of hard, strong, uncoated durable particles of crushed stone, gravel or approved combination thereof and shall be free from an excess of thin, elongated or soft pieces, frozen lumps, vegetable matter or other deleterious matter, and shall conform with all the requirements of CAN3-A23.1. Maximum size of coarse aggregate shall be 20 mm.
- E23.2.5 Water for concrete shall be clean and free from injurious amounts of oil, acid, alkali, salts, silt, organic matter or other deleterious matter. The quality of the water shall be equal to or better than that of potable water.
- E23.2.6 A non-detergent type of air-entraining admixture, supplied in liquid form, shall be metered into the mix. The total air in the placed concrete shall be 4% - 7%.
- E23.2.7 Curing compound shall be Sternson ritcure or approved equal.
- E23.2.8 Bonding agent shall be Sternson ST 431 Epoxy Bonding Agent.
- E23.2.9 Form Coating Shall be Sternson's Formseal or approved equal.
- E23.2.10 Compacted granular base courses for all cast in place concrete Works shall be in accordance with City of Winnipeg Specifications.
- E23.2.11 The Contract Administrator may engage a fully qualified Inspecting Engineer and Testing Laboratory to:
- (a) Inspect the pile excavations to determine that they have been augured to the specified depth, are of the specified size, are clean and level, and meet the design criteria.
  - (b) Take test cylinders during concrete placing and carry out compression tests to determine whether concrete produced complies with these Specifications.
  - (c) Take compaction tests of compacted granular sub-base and sub-grade material.
  - (d) Submit reports to the Contract Administrator of all materials, concrete, and caisson tests and inspections.
  - (e) Three concrete test cylinders to be taken for pile cast. One cylinder from each group shall be tested at 7 days, one at 14 days and the remainder at 28 days. Sampling and testing procedures shall be according to CAN3-A23.1 latest edition.
- E23.2.12 Curing and Protection
- (a) Curing shall immediately following the finishing operation as in CSA A23.1, Section 18 and shall continue for a minimum of five (5) days at 10°C.
  - (b) When the outside temperature is less than 4°C. the temperature of the concrete shall be maintained between 10°C. and 21°C. for the required curing period.
  - (c) When heat required for curing is being removed, the maximum temperature change shall not exceed 2.5°C. per hour or 27°C., in any 24 hour period.
  - (d) Unless adequate protection is provided, no concrete shall be placed during rain, sleet or snow.
  - (e) Rainwater shall not be allowed to increase the mixing water nor damage the surface finish.
- E23.3 CLEAN UP AND DAMAGE
- E23.3.1 This Contractor shall be responsible for making good all areas damaged by his operations in connection with this Contract regardless of the limits of the Contract as shown on the Drawings.
- E23.4 MEASUREMENT AND PAYMENT
- E23.4.1 Method of Measurement shall be as follows:
- (a) Edging will be measured on a linear basis for:
    - (i) Item #3 "Supply and Install playground curb edge" on Form B: Prices.

- (b) The bidder must indicate for Item #3 on Form B: Prices the required quantity of units, dependent on the submission.

E23.4.2 Method of Payment shall be as follows:

- (a) Playground curb edge will be paid for at the Contract Unit Prices. The amount to be paid for shall be the total number of units, as indicated on Form B: Prices. This price shall be full payment for supplying all labour, equipment and materials, and performing all operations herein described and all other items incidental to the Work and as accepted by the Contract Administrator.

E23.4.3 No separate measurement or payment shall be made for C.I.P. concrete bases for site furniture or play equipment as this Work is incidental to the unit prices bid for installation of those items.

## **E24. PROTECTIVE SURFACING AND SUB-SURFACE DRAINAGE**

### **E24.1 GENERAL DESCRIPTION**

E24.1.1 This specification shall cover the supply and install of wood fibre safety surfacing, gravel drainage course and associated sub-surface drainage.

### **E24.1.2 WOOD FIBRE SURFACING**

E24.1.3 Description

- (a) This specification shall cover the supply and installation of Wood Fibre Protective Surfacing within the two Play Equipment Areas.
- (b) This specification shall cover the supply and installation of Wood Fibre Protective Surfacing to drain externally as per Drawing SCD-650.
- (c) This specification shall cover the supply and installation of Multi-Flow Drainage and outflow as per Drawing SCD-659.

### **E24.2 MATERIALS**

- (a) Wood Fibre product shall be either Zeager Woodcarpet or Fibar System 200 or 300 products or substitute in accordance with B6.
- (i) Contact for Woodcarpet:  
Zeagar Bros. Inc.  
4000 East Harrisburg Pike ·  
Middletown, PA 17057 USA  
Ph: (1-888) 346-8524 or (717) 944-7481 ·  
Fax (717) 944-7681  
sales@zeager.com
- (ii) Contact for FibarSystem 200 or 300:  
The Fibar Group LLC  
80 Business Park Drive, Suite 300  
Armonk, NY 10504-1705 USA  
Ph: (800) 342-2721  
Fax: (914) 273-8659  
[info@FibarPlaygrounds.com](mailto:info@FibarPlaygrounds.com)
- (b) Wood Fibre surfacing shall include wood fibre, filter cloth, subsurface drainage system and mats under the ends of slides.
- (c) Granular base for below engineered wood safety surfacing to be 19 mm diameter, clean crushed limestone regardless of which wood fibre product is used.
- (d) Geotextile/Filter Fabric to be Armtec 200, or product supplied by engineered safety surfacing manufacturer or in accordance with section B7 Substitutes.

## E24.2.2 CONSTRUCTION METHODS

- (a) Wood Fibre shall be installed within the play areas, as defined by the timber/concrete edging to a minimum depth of 300 mm (after compaction). In the case where proposed play equipment includes a maximum fall height greater than 2.4m (8'), depth of material to directly correspond to maximum fall height of play equipment in accordance with manufacturer's specifications.
- (b) The installation of the Wood Fibre shall be done immediately after the play equipment has been installed.
- (c) Installation of entire system, including fibre, filter cloth, subsurface drainage and mats under slide ends shall be done according manufacturer's instructions. Adequate drainage within play equipment area must be ensured as per same.
- (d) Subsurface drainage lines shall be graded to drain to the existing catch basin. The cost for the underground drainage line, gravel base and surface repairs shall be included in the price for the wood fibre supply and installation.
- (e) Installation shall be done by equipment sized to suit the Work being done and the Wood Fibre shall be spread by hand as necessary in the immediate vicinity of the play equipment so as not to damage same. The play equipment shall be swept clean to the satisfaction of the Contract Administrator after installation of the Wood Fibre.

## E24.2.3 MEASUREMENT AND PAYMENT

### E24.2.4 Method of Measurement shall be as follows:

- (a) Protective surfacing will be measured on a square metre basis for:
  - (i) "Supply and install Wood Fibre Protective Surface with Multi-flow subsurface drainage" on Form B: Prices.
- (b) The bidder must indicate for Item #4 on Form B: Prices the required quantity of units, dependent on the submission.

### E24.2.5 Method of Payment shall be as follows:

- (a) Protective Surfacing will be paid for at the Contract Unit Prices. The amount to be paid for shall be the total number of units, as indicated on Form B: Prices. This price shall be full payment for supplying all labour, equipment and materials, and performing all operations herein described and all other items incidental to the Work and as accepted by the Contract Administrator.

## E24.3 SUB-SURFACE DRAINAGE

### E24.3.1 DESCRIPTION

- (a) This Work shall consist of providing and placing a geo-composite prefabricated drain system as required in the design submission and as described on the drawings and herein. Drainage system shall be installed in accordance with these specifications and in close conformity with the locations and dimensions as shown on the plans or specified by the Contract Administrator. The quantities of drain as shown may be increased or decreased at the direction of the Contract Administrator based on actual Site conditions that occur during construction of the project. Such variations in quantity will not be considered as alterations in the details of construction or a change in the character of the Work.

### E24.3.2 MATERIALS

- (a) Drainage pipe shall be Multi-Flow, or 100 mm perforated pvc pipe or approved substitute in accordance with B6. If Multi-Flow pipe use 150 mm (6") wide strips. The manufacturer will size and approve all fittings for use with Multi-Flow or approved substitute drainage pipe. . The Multi-Flow pipe may be installed horizontally.
- (b) The drain conduit shall be of flexible, prefabricated, rounded rectangular shaped, composite product. The drain conduit will be wrapped with a non-woven geotextile and will be a non-woven needle-punched construction and consist of long-chain

polymeric fibres composed of polypropylene, polyethylene or polyamide. The fibres will be oriented into a multi-directional stable network whereby they retain their positions relative with each other and allow the passage of water as specified. The fabric will be free of any chemical treatment or coating, which reduces permeability and will be inert to chemical commonly found in soil. The geotextile will conform to the following minimum average roll values.

Weight	ASTM D-3776	3.0 - 4.0
Tensile Strength	ASTM D-4632	100 - 130
Elongation %	ASTM D-4632	50 - 70
Puncture, lb	ASTM D-751	35 - 60
Mullen Burst, psi	ASTM D-3786	110 - 215
Trapezoidal Tear, lb	ASTM D-4533	40 - 42
Coefficient of Permeability	ASTM D-4491	.2 - .4 cm/sec
Flow Rate, gpm/ft <sup>2</sup>	ASTM D-4491	100 - 140
Permittivity, 1/sec	ASTM D-4491	1.3 - 2.0
Apparent Opening Size	ASTM D-4751	60/70 Max. US Std Sieve Opening
Seam Strength, lb/ft	ASTM D-4595	100
Fungus	ASTM G-21	No Growth

- (c) The drainage core shall be made of a high-density polyethylene. The core shall be constructed using interconnected corrugated pipes that define and provide the flow channels and structural integrity of the drain. The geotextile shall function only as a filter. The core of the edge drain shall conform to the following physical property requirements.

Thickness, inches	ASTM D-1777	1.0
Flow Rate, gpm/ft*	ASTM D-4716	29
Compressive Strength, psf	ASTM D-1621 (modified sand method)	6000
Pipe Stiffness, pii	ASTM D-2412	100

\* At gradient = 0.1, pressure = 10 psi for 100 hours.

- (d) Fittings
- (i) The fittings used with the edge drain shall be of a snap together design. In no case shall any drainage product be joined without the use of the manufacturers connector designed specifically for the purpose. Cleanouts will be provided as indicated on the drawing.

#### E24.3.3 Backfill for Trenches

- (a) Backfill will be coarse sand whose particle size is defined as less than 5% retained on a # 10 screen and less than 5% passing through a # 30 (US Std Sieve) In no case will more than 1% pass a # 60 screen.

#### E24.3.4 CONSTRUCTION METHODS

- (a) The layout of the sub-drain is to be marked on Site and approved by the Contract Administrator. Trenches shall be a min. 150mm in width. The trenches are to be installed to drain the water to the existing catch basin.
- (b) Sub-drain is to be laid on the prepared surface to facilitate cross movement of water. Sub-drain shall be installed below geotextile and in conformance with details provided. The sub-drain shall be sloped working from the low end of the side by the concrete catch basin and sloping upwards towards the play area.
- (c) Contractor is to protect sub-drain from excessive weight during the duration of construction and to repair and make good any pipe collapsed prior to acceptance.

- (d) Fittings for the drain will be installed in accordance with the manufacturer's recommendations and Specification.
- (e) Any damaged edge drain or outlet lateral will be replaced or repaired by splicing in an undamaged section of drain at the Contractor's expense. The repair must be in accordance with the manufacturer's specification and to the satisfaction of the Contract Administrator.
- (f) Outlet ends of drainage pipe shall have the geotextile fabric trimmed off flush with the drainage pipe to prevent vandals from pulling the pipe out of the ground.
- (g) Connection of Subdrain to Existing Catchbasins
  - (i) Connect drainage pipe to existing catchbasins as shown on the Drawings or as directed by the Contract Administrator.
  - (ii) Cut neat hole in wall of catchbasin to a maximum of 25 millimetres larger than the outside diameter of the drainage pipe.
  - (iii) Ensure drainage pipe does not protrude more than 150 millimetres beyond inside wall of catchbasin.
  - (iv) Grout connection of drainage pipe to catchbasin with cement patching compound to form a watertight and structurally sound connection.
  - (v) No bends greater than 45° will be permitted to alter the grade or alignment of the drainage pipe for the catch basin connection.

#### E24.4 MEASUREMENT AND PAYMENT

- E24.4.1 No payment will be made the Multi-Flow subsurface drainage material as these items are incidental to E24.

### E25. SITE FURNITURE

#### E25.1 GENERAL DESCRIPTION

- E25.1.1 The Work of this section comprises the furnishing of all labour, equipment and materials required to complete the supply and installation of site furniture as shown on the Drawings and as hereinafter specified, including, but not necessarily confined to the following:

- (a) Supply and installation of waste receptacles;
- (b) Pick up and installation of 'Tache' style benches;
- (c) Pick up and installation of bilingual City of Winnipeg park sign

- E25.1.2 Store units in a protected location, immediately upon arrival on the Site.

- E25.1.3 Remove from Site any units which have been damaged during transportation and replace.

#### E25.2 MATERIALS

- E25.2.1 Waste receptacle to be Alfa maxi 24 waste receptacle direct bury in black with grey slats as supplied by:

Alfa Products  
Ph: 1-800-665-7487  
Fax: (204) 694-7133

- E25.2.2 Park Bench to be in-ground mounted Tache Bench Composite with Arms as per City of Winnipeg detail SCD-121A as supplied by:

City of Winnipeg  
Supervisor Central Repair / Manufacturing  
Winnipeg Fleet Management Agency  
215 Tecumseh St.  
Winnipeg, Manitoba R3E 3S4  
Ph: (204) 986-5504 Fax: (204) 783-1248

Attn. Aaron Lennon

- E25.2.3 Park sign to be **Double sided Bilingual** Park Sign with address as per City of Winnipeg detail SCD-153. Park sign to have the following name and address: King George V Park", "5 Rue Des Meurons". Sign supplied by:

City of Winnipeg  
Supervisor Central Repair / Manufacturing  
Winnipeg Fleet Management Agency  
215 Tecumseh St.  
Winnipeg, Manitoba R3E 3S4  
Ph: (204) 986-5504 Fax: (204) 783-1248  
Attn. Aaron Lennon

#### E25.3 CONSTRUCTION METHODS

- E25.3.1 Install in-ground mounted park benches as per City of Winnipeg detail SCD-121A.
- E25.3.2 Install direct bury trash receptacle as per manufacturer's specifications.
- E25.3.3 Install park sign with address as per City of Winnipeg detail SCD-153.

#### E25.4 MEASUREMENT AND PAYMENT

- E25.4.1 Park benches shall be measured and paid on a per unit basis for "Pick up and install 'Tache' bench". The number to be paid shall be the total number of units installed in accordance with the Drawings and Specifications and as measured and accepted by the Contract Administrator.
- E25.4.2 Waste receptacles shall be measured and paid on a per unit basis for "Supply and install Alfa 'Maxi' trash receptacle". The number to be paid shall be the total number of units installed in accordance with the Drawings and Specifications and as measured and accepted by the Contract Administrator.
- E25.4.3 Park identification signage shall be measured and paid on a per unit basis for "Pick up and install City of Winnipeg Park Sign". The number to be paid shall be the total number of units installed in accordance with the Drawings and Specifications and as measured and accepted by the Contract Administrator.

### E26. PLAY EQUIPMENT

#### E26.1 GENERAL DESCRIPTION

- E26.1.1 The work of this section comprises the furnishing of all labour, equipment and materials incidental and required to complete the supply and installation of play equipment where indicated on the Drawings and as specified herein.
- E26.1.2 Play equipment shall be installed in the play areas as shown on the Layout Drawing. The play equipment and safety zones shall fit into the proposed play areas as indicated on the Drawings though the maximum available areas may be reduced as per the proposed drawing. Efficiency and good use of space will be considered in the evaluation of the submissions.
- E26.1.3 The Contractor shall furnish all labour, materials, equipment and services necessary to complete the Work according to the drawings and specifications.
- E26.1.4 The Contractor shall obtain all approvals including applicable permits if required.
- E26.1.5 Play Area:
- (a) Play areas are separated into two (2) areas: The junior area designed for children aged 2-5 and the senior area designed for children aged 6-12. Both play areas consist of independent components that are geared toward these ages.

- (b) Play equipment shall allow for visibility through the play area as much as possible and minimize the amount of hollow plastic in order to protect from vandalism.
- (c) Overall theme can be natural / forest.
- (d) Play equipment must provide the following play activities:
  - (i) Sensory & Imaginative Play;
  - (ii) Climbing and Crawling;
  - (iii) Balancing;
  - (iv) Motion (Spinning, Swinging).
- (e) The design submission shall be evaluated as per B18 and include the following elements:
  - (i) The Junior play area must include one (1) tunnel/climbing element;
  - (ii) The junior play area must include one (1) see-saw element;
  - (iii) The junior play area must include two (2) spinning elements;
  - (iv) The Senior play area must include one (1) "Parkour" style system that will allow the children to climb and jump between components
  - (v) The Junior play area must include one (1) single bay swing set.
  - (vi) The Senior play area must include one (1) double bay swing set.
  - (vii) The components in the play area must not replicate other play equipment within 300m radius of the Site.

E26.1.6 If colour is a feature of posts, top caps and panels, the Contract Administrator shall have the ability to modify specified colours from the proposed design after Contract Award. If the price of the equipment in the Bid Submission is subject to the colours of the proposed design, this must be indicated in the Bid Submission.

E26.1.7 Components which are unacceptable are the following:

- (a) Wooden structures;
- (b) Enclosed tube slides and enclosed crawl tubes;
- (c) Play panels with many small moving parts;
- (d) Talk tubes;
- (e) Barrel rollers;
- (f) Large number of plastic components.

E26.1.8 Components which are generally **not accepted but may be considered** are the following:

- (a) Cable rides;
- (b) Sand diggers,
- (c) Tire swings;
- (d) Merry-go-rounds.

## E26.2 MATERIALS

### E26.2.1 Posts/Caps

- (a) All posts shall be a minimum 5" O.D. or 4" square tubing for a post and deck structure.
- (b) 3.5 " O.D. round or 3.0" square tubing will be permitted in circumstances where a multi-deck structure has decks of varied heights which are all under 4', or for structures with 2 decks or less.
- (c) All posts shall be fabricated from either aluminum (0.125" (11 ga) min. wall thickness) or galvanized steel (0.120" (11 ga) min. wall thickness) tubing. All fabrication cuts, drill holes and weld joints shall be sprayed with a corrosion resistant coating. The bottom end of the posts is to be sealed with a moisture barrier.

- (d) In the case of a deckless structure, a minimum size of 2 3/8" O.D. round posts fabricated out of steel or aluminum is acceptable.
- (e) Top caps shall be made of steel construction and shall be factory installed and secured in place with tamper proof, self-sealing rivets. Plastic top caps will be accepted if made of solid construction (hollow caps not accepted).
- (f) If painted colour is a feature of posts and top caps, it shall be a baked-on polyester powder coating. The powder coating finish shall meet or exceed ASTM standards for hardness, adhesion, impact and salt spray resistance.\

E26.2.2 Decks (if applicable)

- (a) All decks shall be manufactured from vinyl-coated perforated steel or a steel core composite. Deck heights may vary to a maximum height of 6'.

E26.2.3 Clamping Systems

- (a) All deck, rail and play component clamping systems shall be fabricated from zinc plated, galvanized steel, stainless steel or aluminum. Tamper proof, corrosion resistant fasteners shall be used to retain clamping systems.

E26.2.4 Handrails, Safety Rails and Handloops (if applicable)

- (a) All handrails, safety rails and handloops shall be fabricated using a minimum of 15/16" (24mm) O.D. with a 120" wall thickness steel tubing. After all fabrication activities have occurred including end cuts, drill holes, bends and weld joints, all components shall be hot dipped galvanized.
- (b) Smooth all cut edges and weld joints prior to hot dip galvanizing and ensure that all tubing is free from burrs, cracks, defects and other imperfections.

E26.2.5 Hardware

- (a) All fasteners shall be socketed and tamper proof in design, and either carbon steel plated with zinc/nickel and iridescent chromate finish or stainless steel.
- (b) All necessary hardware shall be provided.

E26.2.6 Poly Components

- (a) Poly components such as slides and hoods shall be fabricated from U.V. stabilized, rotationally molded linear low-density polyethylene.
- (b) Poly components such as play panels shall be fabricated from compression molded solid colour, U.V. stabilized, high-density polyethylene.

E26.2.7 Each Each play structure shall have kick plates and hand loops as required to meet the most recent Canadian Standards Association Standards.

E26.3 INSTALLATION

E26.3.1 Play equipment shall be installed as per manufacturer's specifications and in accordance with the most recent Canadian Standards Association Standards.

E26.3.2 One play equipment installer on site, at minimum, must be a valid Canadian Certified Playground Inspector.

E26.3.3 All posts and other vertical items shall be plumb and true to vertical, if so designed.

E26.3.4 All decks shall be level, if so designed.

E26.4 INDEPENDENT COMPONENTS

E26.4.1 GENERAL DESCRIPTION

- (a) The Contractor shall furnish all labour, materials, equipment and services necessary to complete the Work according to the specifications.
- (b) This specification shall cover the supply and installation of Independent Components as specified herein.

- (c) Independent Components shall be installed as per the proposed design, as the proposed budget will allow.
- (d) Independent Components shall be installed in the available areas as shown on Drawings. The Components and their safety zones must fit into the proposed play area.

#### E26.4.2 MATERIALS

- (a) All materials shall be structurally sound and suitable for safe play. Durability shall be ensured on all parts and materials.
- (b) There shall be a minimum (or no) amount of hollow plastic components. Solid plastic is acceptable.
- (c) There shall be a minimum amount of solid elements which limit visibility through the Site.
- (d) Fasteners
  - (i) All hardware shall be tamper-proof in design and requiring special tools. It shall be either carbon steel plated with zinc/nickel and iridescent chromate finish or stainless steel. All necessary hardware and tools shall be provided.
- (e) Finishes
  - (i) Finishes shall meet or exceed ASTM standards for hardness, adhesion, impact and salt spray resistance. All fabrication cuts, drill holes and weld joints shall be sprayed with a corrosion resistant coating.
- (f) Foundations
  - (i) Shall be as per E23

#### E26.5 MEASUREMENT AND PAYMENT

- E26.5.1 Play equipment shall be measured and paid on a lump sum basis for "Supply and install play equipment" as per Form B: Prices. The number to be paid shall be the total number of units installed in accordance with the Drawings and Specifications and as measured and accepted by the Contract Administrator.

### **E27. TOPSOIL AND FINISH GRADING**

#### E27.1 GENERAL DESCRIPTION

- E27.1.1 The work of this section comprises the furnishing of all labour, equipment and materials incidental and required to complete the supply and installation topsoil and finished grading as indicated on the Drawings and as specified herein.

#### E27.2 MATERIALS

- E27.2.1 All topsoil and finish materials shall comply with City of Winnipeg Specification 3540-R5, Section 5.2.

#### E27.3 INSTALLATION

- E27.3.1 All work to conform to City of Winnipeg Specification 3540-R5.

#### E27.4 MEASUREMENT AND PAYMENT

- E27.4.1 There shall be no separate measurement for the Work associated with this Specification.
- E27.4.2 Payment for Work specified under this Specification is to be included with the price for Sodding.

### **E28. SODDING**

#### E28.1 GENERAL DESCRIPTION

E28.1.1 The work of this section comprises the furnishing of all labour, equipment and materials incidental and required to complete the supply and installation topsoil and finished grading as indicated on the Drawings and as specified herein.

## E28.2 MATERIALS

E28.2.1 All sod material shall comply with City of Winnipeg Specification 3510, Section 5.3.

## E28.3 INSTALLATION

E28.3.1 All work to conform to City of Winnipeg Specification 3510.

## E28.4 MEASUREMENT AND PAYMENT

E28.4.1 Method of Measurement shall be as follows:

- (a) Sod will be measured on a square metre basis for:
  - (i) "Supply and install Topsoil and Sod" on Form B: Prices.
- (b) The bidder must indicate for Item #8 on Form B: Prices the required quantity of units, dependent on the submission.

E28.4.2 Method of Payment shall be as follows:

- (a) Sod will be paid for at the Contract Unit Prices. The amount to be paid for shall be the total number of units, as indicated on Form B: Prices. This price shall be full payment for supplying all labour, equipment and materials, and performing all operations herein described and all other items incidental to the Work and as accepted by the Contract Administrator.

## E29. MAINTENANCE KITS

E29.1 All play equipment shall include the supply of maintenance kits. Maintenance kits shall include maintenance manuals, complete manufacturer's parts lists, touch-up paint, PVC repair paint, 10% extra of each bolt, washer and any other hardware utilized on the play equipment, and all special tools necessary for assembly and maintenance.

E29.2 There shall be no payment for the maintenance kits.