

PART E
SPECIFICATIONS

PART E - SPECIFICATIONS

GENERAL

E1. APPLICABLE SPECIFICATIONS, STANDARD DETAILS AND DRAWINGS

- E1.1 *The City of Winnipeg Standard Construction Specifications* in its entirety, whether or not specifically listed on Form B: Prices, shall apply to the Work.
- E1.1.2 *The City of Winnipeg Standard Construction Specifications* is available in Adobe Acrobat (.pdf) format on the Information Connection page at The City of Winnipeg, Corporate Finance, Materials Management Division internet site at <http://www.winnipeg.ca/matmgt>.
- E1.1.3 Further to GC:2.4(d), Specifications included in the Bid Opportunity shall govern over *The City of Winnipeg Standard Construction Specifications*.
- E1.2 The following Drawings are applicable to the Work:

<u>Drawing No.</u>	<u>Drawing</u>
0329-L1	Fairgrove Bay Park – Parking Lots

E2. LOCATION OF WORK

- E2.1 Fairgrove Bay Park – 2286 Inkster Blvd. At Groverdale Avenue, Winnipeg, Mb.

E3. IRRIGATION SYSTEMS

- E3.1 Information provided on irrigation systems is schematic only and, at the Contractor's request, the City will be responsible for locating and marking all irrigation heads and lines. Contract Administrator shall supply name of City contact person.
- E3.2 It is the Contractor's responsibility to protect all marked irrigation equipment during construction and make good any damage that may occur to the marked system.

E4. PROTECTION OF THE SURVEY INFRASTRUCTURE

- E4.1 Notwithstanding Clause 4 "Protection of Survey bars" of the Standard Provisions:
- E4.1.1 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.
- E4.2 Further to GC:6.28 (g), 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 986-4826 (8:00 a. 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.
- E4.3 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.

- E4.4 Outline 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.
- E4.5 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.

WORK

E5. DEMOLITION AND REMOVALS

- E5.1 General Description
- (a) This specification shall cover the removal of existing wood bollards and existing granular parking area.
- E5.2 Execution
- (a) Existing wood bollards, that are located within the proposed parking areas and as shown on the Drawing, are to be removed in their entirety. Contract Administrator shall supply name of City contact person so that the Contractor can arrange to deliver the removed bollards to the City Yard at 2170 Main Street.
- (b) Where existing granular parking area is to be removed, area is to be excavated to the depth required to remove the existing granular material in its entirety. Excavated materials are to be removed and disposed of in a safe and legal manner. Do not damage adjacent concrete lane.
- E5.3 Basis of Payment
- (a) Payment for Work specified under this section shall be paid for at the lump sum price for the "Items of Work" listed below, which price shall include all costs of removal and disposal. Site restoration work shall be considered incidental to the Work.
- (b) Items of Work:
- (i) Demolition and Removals

E6. ASPHALT PARKING LOTS

- E6.1 General Description
- (a) Further to CW 3110-R7 and CW3410-R5, this specification shall cover the supply and installation of the asphalt parking lot areas, including excavation, sub-base and base construction, asphaltic paving, and bumper curbs.
- E6.2 Materials and method
- (a) Materials and installation as per CW 3110-R7 and CW3410-R5.
- (b) Sub-base and base materials and depths are as specified on the Drawing.
- (c) Asphaltic paving depth as specified on the Drawing.
- (d) Asphaltic paving is to meet the existing concrete lane in a neat and precise manner at matching grades.
- (e) Parking lots are to be constructed to function within existing drainage patterns and are to slope at minimum 1% slope to drain.

- (f) Sub-base and base materials are to extend past the asphalt area as shown on the Drawing.
- (g) Site restoration around parking lots is to be as specified in E8.
- (h) Curbs : Pre-cast concrete bumper curbs, size 2438x203x140mm, grey, pinned to asphalt as per manufacturer's instructions and the City of Winnipeg, Department of Public Works standards.

E6.3 Basis of Payment

- (a) Payment for Work, specified under this section, shall be paid for at the square meters of Asphalt Paving installed and at the actual number of items installed in accordance with this Specification, for the "Items of Work" listed below. The price for Asphaltic Paving shall include all costs of excavation, material supply and proper material installation for sub-grade, sub-base and base preparation, and asphaltic paving. Rough and final grading and site restoration work shall be considered incidental to the Work.
- (b) Items of Work:
 - (i) Asphaltic Paving
 - (ii) Bumper Curbs

E7. LINE PAINTING

E7.1 General Description

E7.2 This specification shall cover the supply and installation of line painting to demarcate the individual parking stalls.

E7.3 Materials and Method

- (a) Paint: The line paint supplied shall be in accordance with CGSB 1-GP-74M+AMDT-MAY-81, Alkyd Traffic Paint.
- (b) Colour: The paint colour shall be to CGSB 1-GP-12C+AMDT-DEC-84, Yellow #505-308.
- (c) Site Conditions: Application of pavement markings is only to be done under conditions conducive to a clean and accurate installation. Pavement surface is to be free from water, frost, ice, dust, grease, oil and any other foreign material. Unless otherwise approved by the Contract Administrator, paint is to be applied only when air temperature is above 10 degrees C. and no rain or wind is forecast.
- (d) Application: Lines, which indicate stalls, shall be painted as per the Drawing and/or as directed by the Contract Administrator. Each stall line shall be 75mm wide with the length as specified on the Drawing. The paint shall be applied evenly at a rate of 3m²/L by an approved pressure type module distributor.
- (e) Tolerances: All paint markings shall be painted within 20mm, plus or minus.

E7.4 Basis of Payment

- (a) Payment for Work, specified under this section, shall be paid for at the at the actual number of lines installed in accordance with this Specification, for the "Items of Work" listed below.
- (b) Items of Work:
 - (i) Line Painting

E8. SODDING

E8.1 General Description

- (a) Further to CW 3510-R7, CW 3520-R4, and CW 3540-R2, this specification shall cover the supply and installation of Sod in the area where the existing granular parking area has been removed, and topdressing and seeding of seams, edges and areas of minor site restoration.
- (b) Any and all areas of sod, soil and seed repair shall be in accordance with CW 3510-R7, CW 3520-R4, and CW 3540-R2.

E8.2 Materials and Method

- (a) New turf is to be installed where the existing granular parking area has been removed as shown on the Drawing.
- (b) Site or turf restoration outside of this area is to be to the same specifications and considered incidental to the Work.
- (c) The perimeter of the areas being sodded is to be cut out with a sod cutter in straight lines.
- (d) Where new sod meets existing turf, the transition shall be such that it forms a uniform even surface and is level with adjoining grades. These joins shall be top dressed and seeded.

E8.3 Maintenance Period

- (a) The Contractor shall maintain the sod for 60 days after the completion of the installation or until such a time as the turf is established in accordance with CW 3510-R7.
- (b) In the event that the maintenance period is not achieved by September 15, 2004, the maintenance period will be extended and will commence on May 15, 2005.

E8.4 Basis of Payment

- (a) Payment for Sodding shall be paid for at the contract unit price for the "Items of Work" listed below, measured on a square meter basis, which price shall include all costs of material supply, sub-grade preparation, proper material installation and maintenance. Site restoration work outside of the Sod area shown on the Drawing, topdressing and seeding shall be incidental to the Work performed.
- (b) Items of Work
 - (i) Sodding

E9. BOLLARD FENCING

E9.1 General Description

- (a) This specification shall cover the supply and installation of Bollard Fencing as specified on the Drawing

E9.2 Materials and Method

- (a) Wood Bollard: round wood posts as specified on the Drawing. Bollards are to be installed by direct burial method at 1.8m O.C. Bollards are to be installed plumb and in a straight line with each other.

E9.3 Basis of Payment

- (a) Payment for Work specified under this section shall be paid for at the unit price for the "Items of Work" listed below, which price shall include all costs of material supply, and proper material installation. Site restoration work shall be considered incidental to the Work.
- (b) Items of Work:
 - (i) Bollards