

# ANNEX 1 SPECIAL PROVISIONS (TENDER ITEMS)

# Station Beach Boardwalk Reconstruction Municipality of Kincardine RFT CS-2025-11

# PART "A" - GENERAL & MISCELLANEOUS

ITEM NO. A1

DESCRIPTION: Bonding and Insurance

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

Contractor's Cost to Furnish 50% Labour & Material Bond and 50% Performance Bond

One Hundred Percent (100%) of the Lump Sum (L.S.) tendered for this item will be paid on the first progress payment certificate.

### ITEM NO. A2

**DESCRIPTION:** Mobilization and Demobilization

SPECIFICATIONS: - Special Provisions

# **SPECIAL PROVISIONS:**

The contract lump sum for this item shall be compensation in full for labour, equipment, and materials required for:

- · Applications for and securement of necessary permits (exclusive of fees),
- Mobilization of all forces, including sub trades onto the site,
- Provision of Contractor's Liability Insurance,
- Provision of temporary facilities for construction, not specifically referenced otherwise, including temporary access to properties, waste management, etc.
- Preparation of a Soils Management Plan, Environmental Management Plan, Dewatering Plan, and a Site Safety Plan,
- Locating and protecting all utilities,
- Contractor layout
- Controlling surface drainage within the Limits of Construction,
- · Providing dust and mud control,
- All other incidental work and costs related to the project that are not specifically identified in the unit price items of work and,
- Demobilization of all equipment and forces.



This item shall also include the restoration of any disturbed or damaged areas to same as, or better than pre-construction conditions. The Contractor shall clean up and dispose of any surplus material, debris or the like, not provided for by any other item in the contract and restore all areas disturbed or damages in kind. This includes, but is not limited to, concrete, asphalt, topsoil and the supply and placement of native fill, topsoil and seeding and mulching on the road embankments, ditches and all disturbed areas resulting from the construction of the works.

The Contractor shall be responsible for obtaining all utility locates prior to any excavation work. Any utility conflicts with the proposed works shall be brought to the attention of the Contract Administrator immediately.

The Contractor shall ensure that a minimum required clearance from any overhead hydro lines is maintained at all times. The Contractor shall coordinate with Westario to ensure that all overhead hydro lines are protected during construction if required. The Contractor shall cover all the costs of all work associated with the overhead hydro line protection.

Forty percent (40%) of the contract lump sum for this item will be paid under the first progress payment certificate. The balance will be paid incrementally at each progress payment in proportions equal to the value of work performed relative to the total contract bid.

If the value of this item exceeds 8% of the total tender price, it may be considered an imbalance by the Owner and may be subject to review through other clauses herein.

# ITEM NO. A3

DESCRIPTION: Traffic Control

SPECIFICATION: - OPSS 706

- Special Provisions

### **SPECIAL PROVISIONS:**

The unit price bid for this item will include the supply, installation, and maintaining of all traffic control signage throughout the duration of the Contract. A Traffic Control Plan shall be submitted for approval to the Municipality by the Contractor within two (2) weeks of being awarded this Contract. The Traffic Control Plan shall provide a detailed outline of how traffic will be handled throughout the duration of the Contract and show the locations of all required signs and barricades during each phase of construction. The Traffic Control Plan shall conform to OTM Book 7.

- The Traffic Control Plan will also need to address pedestrian access including pedestrian safety.
- Erecting and maintaining barricades, fences, and other safety devices for the protection of the public during construction.

Emergency vehicles must be able to pass through the site at all times. Where this is deemed unattainable, the Contractor must notify all emergency services of the exact location where they cannot pass as well as the duration of the closure. All efforts shall be made to re-open the roadway for emergency vehicles as quickly as possible.



All traffic control/protection measures shall be inspected at least twice per day (at the beginning and end of the working day) and at least once on the weekend days to verify their conformance with the approved plan. Corrective measures for deficiencies observed shall be taken as soon as practicable after becoming aware of the situation.

Payment for this item will be on a proportional basis of the lump sum divided by the period (weeks) scheduled by the Contractor for the traffic control during construction shall be made if to the 100% satisfaction of the Municipality. Should traffic control during construction did not meet the above noted criteria, the weekly payment shall be denied.

# **ITEM NO. A4**

DESCRIPTION: Environmental Protection

SPECIFICATIONS: - OPSS 180, 182, 805, 823, 830

- Special Provisions

#### **SPECIAL PROVISIONS:**

The contract lump sum price for this item shall be compensation in full for all labour, equipment, and materials necessary for:

- Provision of all temporary straw bale flow checks as necessary,
- Maintaining, reinforcing and repairing all sediment and erosion control measures installed throughout the duration of the contract,
- Removal and disposal of any accumulated sediment from the upstream side of all sediment and erosion control measures as necessary to the satisfaction of the Engineer,
- Inspection of all sediment and erosion control measures on a weekly basis or after any rainfall event of 13mm or greater,
- Submitting weekly written inspection reports to the Contract Administrator,
- Ensuring maintenance is carried out, within 48 hours, on any part of the sediment and erosion control measures found to need repair, and
- Submitting written remediation reports to the Contract Administrator upon the completion of remedial works referencing what was repaired and how.

The Contractor shall submit a comprehensive Sediment and Erosion Control Plan, which shall outline the grading sequencing and deployment of erosion and sediment control measures.

The Saugeen Valley Conservation Authority (SVCA) has been informed about this project. The SVCA permit and conditions will be provided to the Contractor upon receipt. Any Environmental Protection works shall follow the provisions outlined by the SVCA and shall be followed throughout the construction process. These provisions generally include that all disturbed areas shall be stabilized, and dewatering operations be designed to prevent entry of sediment into the watercourse. Temporary silt control measures, including provision of filter cloth under catchbasin grates and other inlets, shall be implemented. All areas shall be restored upon completion of the work to the satisfaction of the SVCA, and all materials temporarily introduced shall be removed. Any variation from the SVCA permit conditions shall be addressed by the Contractor. Any additional permit applications or fees will be at the Contractor's expense.

The Contractor is expected to take a proactive approach towards the maintenance and inspection





of the sediment and erosion control measures. Should any part of the sediment and erosion control measures fail, or damage be done, the Contractor will be responsible for the removal of any silt and debris and the repair and remediation of the naturalized/affected areas. No additional payment shall be made.

Additional protection measures may be required depending on the Contractors approach to the works. The Contractor shall take all reasonable precautions to prevent silt release from entering the watercourse. These precautions shall include, but not be limited to, silt fences around stockpiled earth and topsoil, pump discharges onto grass flats and/or straw bale check dams, sediment traps or infiltration system. Such measures shall be in accordance with the details provided herein, and the Contractor's Sediment and Erosion Control Plan. Upon completion of the work, accumulated silt and debris shall be removed from the site along with the silt trap and debris fence. The Contractor shall note that no equipment shall be refueled or parked overnight within 30 m of the watercourse. Grading along the water course shall be completed in no or low flow conditions and will not be completed during or directly after a heavy rainfall event. Any discharges of water into the watercourse shall be free of any silt or other deleterious material. Pumping discharges onto grass flats, straw bale check dams, sediment traps or infiltration system shall be used to ensure that this objective is met.

Thirty percent (30%) of the lump sum price will be paid under the first payment certificate following the implementation of the environmental protection measures. The balance will be paid under subsequent progress certificates in increments proportionate to the value of the work performed relative to the total estimated value of the contract.

# ITEM NO. A5

DESCRIPTION: Construction Layout

SPECIFICATION: - Special Provisions

#### **SPECIAL PROVISIONS:**

This specification covers the requirements for the Contractor to supply and undertake all construction layout of the project.

# General

This specification sets out the requirements for the setting out of all construction works and undertakings for this project. The Contractor shall use qualified personnel to complete all the layout work.

The Contractor will be responsible for the true and proper setting out of the work and for the correctness of the position, levels, dimensions and alignment of all parts of the work, and for the provision of all necessary instruments and labour for the construction layout.

The Contract Administrator shall provide the benchmark locations and elevations and identify the horizontal alignment.

The Contractor shall be responsible for the protection and maintenance of the benchmarks and horizontal alignment monuments. If a benchmark or horizontal alignment monument is impacted by construction activities the Contractor is fully responsible to relocate or reset the monuments as required without limitation.





The checking of the setting out of any line or level by the Contract Administrator shall not in any way relieve the Contractor of his responsibility for the correctness of the work.

The Contractor shall supply the Contract Administrator with a copy of all necessary information to enable him to use the Contractor's field layout. All information, both on work sheets and stakes, shall be neat and legible.

No direct measurement for payment will be made for this item. The item shall be administered as a Lump Sum (LS).

Payment for this item at the Contract price shall be full compensation for all labour, equipment and materials necessary to completely layout the work. Payment shall be made on each Payment Certificate based on the Contract Administrator's estimate of the amount of layout that has been completed.

The layout required due to alterations in contract items shall be considered incidental to the work of the item, therefore no change will be made to the Lump Sum bid for this item.

# PART "B" - REMOVALS

# ITEM NO. B1

DESCRIPTION: Tree Removal and Grubbing

**SPECIFICATIONS:** - **OPSS** 180, 201, 206

- Special Provisions

#### SPECIAL PROVISIONS:

The lump sum price for this item shall be compensation in full for labour, equipment, and materials the clearing of all trees identified in contract drawings and to provide stump removal and grubbing to a depth of 200mm below existing grade including disposal offsite.

It is the responsibility of the Contractor to contact and coordinate tree removal with Westario as overhead electrical lines are in close proximity of the trees in question. All costs incurred by the Contractor associated with the compliance with Westario requirements shall be borne by the Contractor. The Contractor shall not make any claim for additional compensation due to delays in commencing the work due to compliance with Westario requirements.

One Hundred Percent (100%) of the Lump Sum tendered for this item will be paid upon completion of the clearing and grubbing.



DESCRIPTION: Topsoil Stripping and Removal

SPECIFICATIONS: - OPSS 180, 206

- Special Provisions

# **SPECIAL PROVISIONS:**

The unit price bid is to include all labour, equipment, and materials necessary to complete stripping of topsoil to a depth of 250mm as outlined on the contract drawings.

Topsoil is to be removed from the site and disposed of by the Contractor, at their expense. Any temporary topsoil stockpiles shall be surrounded by silt fence, with no additional payment.

Payment for this item shall be by square metre of land area stripped as measured in the field.

# <u>ITEM NO. B3 & B4</u>

DESCRIPTION: Earth Excavation

**SPECIFICATIONS:** - OPSS 180, 206, 510

- Special Provisions

- Ontario Regulation 406/19 On-Site and Excess Soil Management, Rules for Soil Management and

**Excess Soil Quality Standards** 

#### **SPECIAL PROVISIONS:**

The price bid is to include all equipment and labour to complete all on-site earth excavation, including temporary stockpiling and re-use of on-site soils Item B4 will be used to track and pay by the unit rate for the removal and disposal of surplus soils at a suitable off-site location. Soils testing will be arranged by the Contract Administrator, as necessary. In the event Table 2 and 3 soils or soils that exceed Table 2 and 3 are required to be disposed of at an off-site location, Provisional Items P1 or P2 will apply, as appropriate.

The primary objective of this contract is to re-deploy all on-site soils to achieve planned grades. The Contractor shall use best efforts to utilize all soils on-site. Item B4 includes a nominal volume of soil, which may require off-site disposal. The volume for this item may be adjusted by the Contract Administrator, as necessary, with no unit price adjustment.

All earth material excavated in carrying out the work included in this Contract, and which is unsuitable for, or which is surplus to, the grading requirements shall be disposed of off-site in accordance with Ontario Regulation 406/19. The excess material shall be disposed of at a site arranged by the contractor upon receipt of a sign-off by the property owner. The property owner must be aware of and must acknowledge the quality of the soil, in accordance with OPSS 180. The contractor shall submit appropriate forms to the Engineer.

All large boulders, and other "solid" materials are to be loaded and hauled separately from the other earth and granular materials and disposed of at an MECP-approved site obtained by the Contractor at no additional cost to the Owner.



One hundred percent (100%) of the lump sum tendered for this item will be paid upon completion of removals.

# **ITEM NO. B8**

DESCRIPTION: Remove and Dispose of Wooden Board Walk

SPECIFICATIONS: - OPSS 180

- Special Provisions

# **SPECIAL PROVISIONS:**

The Contract unit price for this item shall be compensation in full for all labour, equipment, fees and materials necessary to remove, sort, and dispose of the existing boardwalk c/w substructure as shown on contract drawings and transport it to Kincardine's Municipal landfill. Care shall be taken to minimize the amount of debris, soil/sand from the wood for consideration of sorting the wood at the landfill.

Tipping fees shall be paid directly by the municipality. The driver will be required to identify the project to the scale house for proper accounting.

Payment for this item shall be by square metre of board walk removed, as measured in the field.

# ITEM NO. B9

DESCRIPTION: Remove Wooden Rail/Wall

SPECIFICATIONS: - OPSS 180

- Special Provisions

#### **SPECIAL PROVISIONS:**

The Contract unit price for this item shall be compensation in full for all labour, equipment, fees and materials necessary to remove, sort, and dispose of the existing Wooden Retaining wall as shown on contract drawings and transport it to Kincardine's Municipal landfill. Care shall be taken to minimize the amount of debris, soil/sand from the wood for consideration of sorting the wood at the landfill.

Tipping fees shall be paid directly by the municipality. The driver will be required to identify the project to the scale house for proper accounting.

Payment for this item shall be by the linear metre of wooden retaining wall removed, as measured in the field.





DESCRIPTION: Remove Existing Deck Boards and Railing

(Gazebo)

SPECIFICATIONS: - OPSS 180

- Special Provisions

# **SPECIAL PROVISIONS:**

The Contract lump sum price for this item shall be compensation in full for all labour, equipment, fees and materials necessary to remove, sort, and dispose of the existing wooden Decking and Railings as shown on Contract drawings and transport it to Kincardine's Municipal landfill. Removal of the railings is to include all top rails, balusters, and bottom rail. Care shall be taken to minimize the amount of debris, soil/sand from the wood for consideration of sorting the wood at the landfill.

The Contractor is to notify GEI once removals have been completed to allow a structural assessment of the superstructure to be completed prior to starting installation of new materials. Installation of new materials is not to commence without approval by the Contract Administrator.

Contractor to ensure the area is secure during active construction to minimize public access. Fencing is to be included in this item.

Tipping fees shall be paid directly by the municipality. The driver will be required to identify the project to the scale house for proper accounting.

One hundred percent (100%) of the lump sum tendered for this item will be paid upon completion of removals.

#### <u>ITEM NO. B11</u>

DESCRIPTION: Remove Existing Deck Boards and Railing

(Viewing Platform)

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

The Contract lump sum price for this item shall be compensation in full for all labour, equipment, fees and materials necessary to remove, sort, and dispose of the existing wood decking and railings as shown on Contract Drawings and transport it to Kincardine's' Municipal landfill. Care shall be taken to minimize the amount of debris, soil/sand from the wood for consideration of sorting the wood at the landfill.

The Contractor is to notify GEI once removals have been completed to allow a structural assessment of the superstructure to be completed prior to starting installation of new materials. Installation of new materials is not to commence without approval by the Contract Administrator.





Contractor to ensure the area is secure during active construction to minimize public access. Fencing to be included in this item.

Tipping fees shall be paid directly by the municipality. The driver will be required to identify the project to the scale house for proper accounting.

One hundred percent (100%) of the lump sum tendered for this item will be paid upon completion of removals.

# ITEM NO. B12

DESCRIPTION: Remove and Salvage Concrete Pavers

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

Contractor to remove existing concrete pavers as shown on Contract Drawings and neatly stack on wooden skid at a location on site, determined by the Municipality. It will then be removed from the site by municipal staff.

Payment for this item shall be by square metre of Concrete pavers removed, as measured in the field.

# ITEM NO. B13

DESCRIPTION: Remove and Dispose Light Standards

SPECIFICATIONS: - Special Provisions

#### SPECIAL PROVISIONS:

Contractor to remove existing light standard c/w bases as shown on Contract Drawings and dispose of offsite. Care shall be taken to preserve existing electrical infrastructure.

Payment for this item shall be by unit price.



DESCRIPTION: Remove and Salvage Light Standards

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

Contractor to remove existing light standard c/w bases as shown on Contract Drawings and neatly stack on wooden Bunks. They will then be removed from the site by municipal staff.

Municipality will mark the 5 that will be salvaged.

Payment for this item shall be by unit price.

# ITEM NO. B15

DESCRIPTION: Remove Benches

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

Contractor to remove, relocate and store existing benches on site.

Payment for this item shall be by unit price.

# ITEM NO. B16

DESCRIPTION: Remove and Relocate Stone Monument

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

Contractor to remove and relocate the stone monument c/w granular base as per contract drawings. Contractor to provide a Relocation Plan to carry out the removal and relocation to the Contract Administrator review and approve prior to starting to ensure stone monument preservation.

Payment for this item shall be lump sum.



DESCRIPTION: Remove Existing Post and Tube Fence

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

Contractor to remove and salvage existing post and tube fence as identified on contract drawings.

Payment for this item shall be by linear metre, as measured in the field.

# PART "C" - SITE WORKS

**ITEM NO. C4, C5, C6** 

DESCRIPTION: Removable Boardwalk Modules

SPECIFICATIONS: - OPSS 1601

- Special Provisions

#### **SPECIAL PROVISIONS:**

The Contract unit price for this item shall be compensation in full for all labour, equipment, and materials necessary to supply, construct, and install the removable boardwalk modules, as shown on the Contract Drawings.

Additional to the work mentioned above, this item shall also include but not be limited to the following work:

- Excavation, grading and compaction of the native sand as detailed on the Contract Drawings,
- Provision of galvanized or stainless-steel connecting plates and fasteners,
- Supply and application of wood preservative to all cut ends,
- Supply and installation of all concrete anchors as detailed on the Contract Drawings.
- Assembly of the modular sections into a continuous boardwalk,
- Regrading of excavated soil as required.

All wood elements throughout the modular boardwalk are to be pressure treated, SPF, No. 2 or better lumber. Boards are to be in good condition, free of splits, twist, bows, crooks, knotholes, wane, cupping, and checks. Any other defects which may present a tripping hazard will be deemed unacceptable. Deck boards are to be installed perpendicular to the 140x140 sleeper beams, as shown on the Contract Drawings with the exception of the angled section 'B'. Where cut ends of the deck boards on section 'B' abut the rounded edges of the deck boards on sections 'A' and 'C', the cut ends shall be sanded to remove the hard edge to a rounded edge. All deck boards shall be installed with a 6mm gap between.

Fastener specifications and patterns are provided on the Contract Drawings. All anchors and



fasteners are to be installed in accordance with manufacturer's recommendations and industry standards. Any damages which occur during assembly shall be the responsibility of the Contractor to make good, at no additional cost to the owner.

Payment for this unit price item shall be made based on the actual number of each module once completely installed, as verified by the Contract Administrator.

# ITEM NO. C7

DESCRIPTION: Proposed Wood Boardwalk

SPECIFICATIONS: - OPSS 1601

- Special Provisions

#### **SPECIAL PROVISIONS:**

The Contract unit price for this item shall be compensation in full for all labour, equipment, and materials necessary to supply, construct, and install the permanent wooden boardwalk, as shown on the Contract Drawings.

Additional to the work mentioned above, this item shall also include but not be limited to the following work:

- Excavation, grading and compaction of the native sand as detailed on the Contract Drawings,
- Supply, placement, grading and compaction of the granular 'A' subgrade and deck fill,
- Provision of galvanized or stainless-steel connecting plates and fasteners.
- Supply and application of wood preservative to all cut ends,
- Supply and installation of all concrete anchors as detailed on the Contract Drawings,
- Assembly of the boardwalk and curbs boardwalk,
- Regrading of excavated soil as required.

All wood elements throughout the modular boardwalk are to be pressure treated, SPF, No. 2 or better lumber. Boards are to be in good condition, free of splits, twist, bows, crooks, knotholes, wane, cupping, and checks. Any other defects which may present a tripping hazard will be deemed unacceptable. Deck boards are to be installed perpendicular to the 140x140 sleeper beams, as shown on the Contract Drawings. Where cut ends of the deck occur within the travelled portion of the boardwalk the cut ends shall be sanded to remove the hard edge. All deck boards shall be installed with a 6mm gap between.

Fastener specifications and patterns are provided on the Contract Drawings. All anchors and fasteners are to be installed in accordance with manufacturer's recommendations and industry standards. Any damages which occur during assembly shall be the responsibility of the Contractor to make good, at no additional cost to the owner.

Payment for this unit price item shall be made on a square meter basis and the quantities completed, as measured by the Contract Administrator.



# ITEM NO. C9

DESCRIPTION: Concrete Walkway and Ramps

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

The Contract unit price for this item shall be compensation in full for all labour, equipment, and materials necessary to supply, construct, and install the concrete walkways and ramps as shown on the Contract Drawings.

Additional to the work mentioned above, this item shall also include but not be limited to the following work:

- Submit concrete mix design 3 weeks prior to placement of concrete walkways/paving/crosswalks for review and acceptance by the Contract Administrator.
- Excavation, grading, and compaction of native subgrade,
- Supply, placement, grading, and compaction of granular 'A' subgrade,
- Layout for all walkways/paving/and crosswalks.
- Supply, installation, maintenance, and removal of a necessary formwork. This is to include all consumables such as ties, nails, stakes, oils, as well as pre-placement preparation efforts (dampening, removal of standing water, etc.),
- Supply, place, finish and curing of all concrete walkways and ramps in accordance with the Contract Drawings,
- Install saw-cut and/or tooled control joints and full depth expansion joints to the specified depths, frequency, and layout in accordance with the applicable details.
- Provide AODA compliant accessible curb ramps at all crosswalk locations.

Work to be in accordance with OPSS.MUNI 351, CSA-A23.3, AODA regulations, and the applicable notes and details on the Contract Drawings. The Contractor is to provide the Contract Administrator with 48 hours' notice to review formwork prior to pouring concrete. The Contractor shall also notify the Contract Administrator 48 hours in advance of the concrete delivery and placement and make the material available for testing and reasonably aid the Contract Administrator during testing.

Measurement for payment shall be plan quantity measurement and the unit of measurement is square meters. There will no additional payment for ramps at intersections, crossings, etc. Payment at the Contract unit price shall be full compensation for all labour, equipment and material to do the work.



DESCRIPTION: Tactile Walking Surface Indicators (TWSI)
SPECIFICATIONS: - OPSD 310.039
- Special Provisions

# **SPECIAL PROVISIONS:**

The scope of work shall include:

- Supply and install powder coated cast-iron tactile walking surface indicators (TWSI) in specified locations and/or as directed by the Contract Administrator.
- Submit a copy of the manufacturer's product sheet, installation instructions, and working drawings to the Contract Administrator 2 weeks prior to installation, with indication of TWSI radius used (where applicable).
- Layout TWSI's and provide Contract Administrator with 48 hours' notice for review of layout, prior to installation.
- Cut TWSIs where in conflict with existing manhole covers/grates to achieve tight
  interface, where required. Where TWSIs are cut to accommodate round objects, cut
  TWSIs to match radius of abutting objects reasonably maintaining a 10mm tolerance.
  Angled or jagged interfaces will not be accepted.

Work to be in accordance with OPSS 351, OPSD 310.039, OPSD 310.033, AODA regulations, the manufacturer's specifications, and the applicable notes and details on the Contract Drawings.

TWSIs shall be 610mm x 610mm (24" x 24") powder coated cast-iron plates. At intersections, where radius plates are specified, Contractor shall propose the appropriate radius product best suited for each condition (where applicable) and submit to the Contract Administrator for approval, prior to installation.

TWSIs shall be the 7004 DURALAST Detectable Warning Plate – Colour: Red Brick by EJ, 519-448-3395 or approved equal to be verified prior to order.

TWSI plates shall be set and pressed into wet concrete to final elevation according to manufacturer's specifications. Remove any wet concrete that may spill onto the TWSI surface. Measurement for payment shall be plan quantity measurement and the unit of measurement is each.

Payment at the Contract unit price shall be full compensation for all labour, equipment, and material to do the work.



DESCRIPTION: Deck Boards and Railing (Gazebo)

SPECIFICATIONS: - Special Provisions

The Contract unit price for this item shall be compensation in full for all labour, equipment, and materials necessary to supply, construct, and install the new gazebo deck boards and railings.

Additional to the work mentioned above, this item shall also include but not be limited to the following work:

- Provision of galvanized or stainless-steel connecting plates and fasteners,
- Supply and application of wood preservative to all cut ends,
- · Assembly and installation of the wood deck and railing,

All wood elements throughout the gazebo are to be pressure treated, SPF, No. 2 or better lumber. Boards are to be in good condition, free of splits, twist, bows, crooks, knotholes, wane, cupping, and checks. Any other defects which may present a tripping hazard will be deemed unacceptable. Deck boards are to be installed perpendicular to the existing joists. All deck boards shall be installed with a 6mm gap between.

All anchors and fasteners are to be installed in accordance with manufacturer's recommendations and industry standards, and the 2024 Ontario Building Code (OBC). Any damages which occur during assembly shall be the responsibility of the Contractor to make good, at no additional cost to the owner. The new gazebo railings are to be OBC compliant and similar in appearance to the original railings. The Contractor shall provide Shop Drawings showing overall dimensions, and proposed method of construction for review by the Contract Administrator. Replacement of the railings shall not begin until the Shop Drawings have been reviewed and approved.

Payment for this unit price item shall be made on a square meter basis and the quantities completed, as measured by the Contract Administrator. Railings will be measured based on their face area (i.e. width x height) and will be paid at the same unit rate as the deck.

#### ITEM NO. C12

DESCRIPTION: Deck Boards and Railing (Viewing Platform)

SPECIFICATIONS: - Special Provisions

# **SPECIAL PROVISIONS:**

The Contract unit price for this item shall be compensation in full for all labour, equipment, and materials necessary to supply, construct, and install the new viewing platform deck boards and railings.

Additional to the work mentioned above, this item shall also include but not be limited to the following work:

Provision of galvanized or stainless-steel connecting plates and fasteners,





Supply and application of wood preservative to all cut ends,

- Assembly and installation of the wood deck,
- Assembly and installation of the glass guards with aluminum handrail

All wood elements throughout the gazebo are to be pressure treated, SPF, No. 2 or better lumber. Boards are to be in good condition, free of splits, twist, bows, crooks, knotholes, wane, cupping, and checks. Any other defects which may present a tripping hazard will be deemed unacceptable. Deck boards are to be installed perpendicular to the existing joists. All deck boards shall be installed with a 6mm gap between.

All anchors and fasteners are to be installed in accordance with manufacturer's recommendations and industry standards, and the 2024 Ontario Building Code (OBC). Any damages which occur during assembly shall be the responsibility of the Contractor to make good, at no additional cost to the owner.

The new viewing platform railings are to consist of a glass guard with prefinished black aluminum connectors and a prefinished black aluminum top rail. The glass panels shall be ordered to suit the existing viewing platform posts and shall conform to Part 3 and Part 4 of OBC, as well as the Ministry of Municipal Affairs and Housing Supplementary Standard SB-13 Glass in Guards. The prefinished aluminum top rail shall also conform to Part 3 and Part 4 of OBC. Shop Drawings for each component shall be submitted for review and approval by the Contract Administrator. Shop Drawings shall be sealed by a Professional Engineer licensed to practice in Ontario.

Payment for this unit price item shall be made on a square meter basis and the quantities completed, as measured by the Contract Administrator. Railings will be measured based on their face area (i.e. width x height) and will be paid at the same unit rate as the deck.

#### ITEM NO. C17

DESCRIPTION: Line Painting

SPECIFICATIONS: - OPSS 710

- Special Provisions

#### **SPECIAL PROVISIONS:**

Included in the unit price bid for this item shall be the cost to provide all painted lane markings shown on the contract Pavement markings shall be completed with two coats of water-bourne traffic point.





# ITEM Nos. E1 to E4 and P4 to P5

<u>Description:</u> Electrical Items

Specification: OPSS 106, S.P.

# **Special Provisions:**

The electrical items shall include all labour, materials, and equipment required for the complete design and installation of all electrical systems required for the proposed street lighting shown on contract drawings, including:

- Electrical connections to Sternberg light fixtures and gateway up-lighting in accordance with manufacturer specifications.
- Installation of underground wiring, pull ropes through existing conduits (if available), and metering.
- Coordination, permitting, and final inspection approvals from ESA and Hydro One.
- Full removal of existing underground electrical infrastructure, as identified in the field.

# Design & Coordination:

As the condition of the existing underground power supply is unknown at this time (direct buried, or conduit), the Contractor shall review the existing electrical infrastructure and submit a stamped electrical design for review and approval by the Contract Administrator prior to ordering any materials. The contractor will use best efforts to utilize any existing infrastructure (conduits, hand holds) that may be available to complete the new installation. Any new trenching and conduit installation that has been approved by the contract administrator shall be paid under provisional items P4 and P5.

Contractor shall coordinate all inspections and final connections with Hydro One, providing a minimum of one (1) week's written notice.

Contractor shall be responsible for securing ESA permits and scheduling all required inspections.

# Testing & Acceptance:

Upon completion, the contractor shall submit test results verifying functionality of all installed systems, including megger testing and panel connections.





(insert Sternberg Spec here)

B:\Working\KINCARDINE ON, MUNI OF\2401516 - 223321 Kincardine Station Beach Boardwalk\Work In Progress\Tender preparation docs\Spec-lighting



DESCRIPTION: Planting of trees, shrubs, plugs and salvaged plant material - Phase 1 Backdune Plantings

SPECIFICATIONS: - Special Provisions

# **SCOPE OF WORK**

.1 This section specifies the supply and planting of trees, shrubs, and other related material. Work includes all labour, materials, tools, services and incidentals to do all planting including fine grading, excavation, planting, mulching, care and replacements of unsatisfactory plant material.

#### **PART 1 - GENERAL**

### 1.1 QUALITY ASSURANCE

.1 All planting related work shall be done by experienced, qualified personnel under the direction and supervision of foreman with at least five (5) years experience.

# 1.2 PRODUCT DELIVERY, STORAGE AND HANDLING

- .1 Supply plant material as specified on the plant lists on the drawings.
- .2 Protect all plant material from damage and breakage. Protect all parts of the plant material from drving out from the time of digging until they are installed.
- 3. Do not transport plant material in an open truck unless it is adequately protected from sun and wind.
- 4. Carefully tie in all branches before transporting.
- 5. Heel in any plant material that cannot be planted during the current day's operation.
- 6. Keep all roots and root balls moist prior to planting.

### 1.3 **JOB CONDITIONS**

1. Proceed with planting operations only during suitable weather conditions. Do not plant when weather goes below 10°C, during high water or flooding or during heavy rain conditions.

### 1.4 SUBSTITUTIONS

1. Supply and install plant material as specified on the plant list. Substitutions with other plant material must be presented in writing and are subject to written approval by the Landscape Architect.

# 1.5 INSPECTIONS



- 1. Approval of plant material at source will not impair the right of the Contract Administrator to inspect plants upon arrival on the site or during the course of construction and to reject plants which have been damaged, or which, in any way, do not conform to the specifications.
- 2. Final inspection of all plant material will be made at the end of the specified guarantee period. All plants must be in a healthy growing condition at the time of this inspection.
- 3. Make all other Material available for inspection at source of supply or upon arrival on the site.

#### 1.6 MAINTENANCE – Trees and Shrubs

- 1. Trees and Shrubs shall be watered weekly if adequate rainfall does not occur until freeze up in their first season. Contractor shall provide a deep root watering of all trees and shrubs prior to freeze up.
- 2. If windy conditions occur the contractor will revisit the site to correct and blown over trees, uncover any plantings buried in sand, and replant items with exposed roots.
- 3. The contractor shall revisit the site the following spring to correct blown over trees, uncovered buried plantings and replant items with exposed roots.
- 4. Throughout the second season the contractor shall water trees and shrubs weekly under dry conditions.
- 5. A 75 mm layer of mulch is to be applied around each tree and shrub planted.

#### 1.8 GUARANTEE

- 1. During the guarantee period, replace all material that is dead or not in a satisfactory, healthy growing state or which does not meet the requirements of the specifications, at no extra cost to the contract.
- 2. All replacements must be plants of the same size and species as shown on the plant list, supplied and planted in accordance with the drawings and specifications.
- 3. If conditions have resulted in topsoil being lost it shall be replaced as specified prior to replanting of dead or unsatisfactory plant material.
- 4. Mulch shall be maintained at 75 mm throughout the guarantee period.

#### **PART 2 - PRODUCTS**

# 2.1 PLANT MATERIAL

- 1. All plant material must be nursery grown and meet the specifications set out in the latest Guide Specifications for Nursery Stock prepared by the Canadian Nursery Landscape Association (C.N.L.A.) for size, height, spread, grading, quality and method of cultivation.
- 2. Plant Material: true to name and type, structurally sound, well branched; healthy and



vigorous and free from disease, insect infestations, rodent damage, sun scald, frost cracks, and other abrasions to the bark and densely foliated with a healthy, well developed root system. Pruning wounds must show vigorous bark on all edges and all parts must show live and green cambium tissue when cut.

- 3. All material must conform to the sizes shown on the plant list, except that larger material may be used when approved by the Contract Administrator. Use of larger plants will not increase the contract price.
- 4. Plant material sizes must conform to the following standards:
  - height measured from the normal grade around the plant to the top of the main foliage mass.
  - b) spread the diameter of the main foliage mass, at its widest point.

# 2.2 SOIL MIX

1. **Imported Topsoil**: a fertile, friable, natural loam (A horizon layer), capable of sustaining vigorous plant growth, free of subsoil contamination, roots and stones over 50mm diameter, reasonably free of weeds (as determined by the Contract Administrator), and falling within the following guidelines:

Soil Texture Range: (OMAFRA soil texture triangle)	loam to sandy loam
pH range:	5.5 to 7.9
Total Salts (mmhos/cm)	less than 1.5
Organic Matter (%)	5% to 15%
N - Nitrogen (ppm)	As recommended by the soil report
P - Phosphorus (ppm)	10 – 60
K - Potassium (ppm)	80 – 250
Mg - Magnesium (ppm)	100 – 300
Ca - Calcium (ppm)	1000 – 4000
Na - Sodium (ppm)	less than 200
CI - Chloride (ppm)	less than 100
SAR - Sodium Absorption Rate	less than 15

- 1. Provide standard planting soil mix as follows: 5 parts topsoil to 1 part compost. Mix topsoil and compost thoroughly on the site, not more then two (2) days before backfilling.
- 2. Provide standard planting soil mix as follows: 5 parts topsoil to 1 part compost. Mix topsoil and compost thoroughly on the site, not more then two (2) days before backfilling.

### PART 3 - EXECUTION

Plantings shall be installed when conditions are above 10°C. Plantings shall not be installed in high water, high wind or flooded conditions.



# 3.1 SURFACE PREPARATION FOR BACKDUNE PLANTING BEDS

- 1. Backdune plantings are generally located where the existing boardwalk is to be removed. The area shall be free of all boardwalk materials prior to planting.
- 2. Existing Fence for repainting adjacent to backdune planting beds shall be painted prior to plantings being installed.
- 3. Within the limits of the Backdune Planting Beds, existing sand shall be removed to a depth of 300mm and replaced with topsoil as specified in section 2.2.
- 4. Due to surrounding trees for preservation, community gardens, fencing to remain and limited work space, sand removal and soil replacement and small stock planting works shall be completed using hand tools.
- 5. Removed sand can be deposited elsewhere within the construction area where erosion and sand loss has occurred.

# 3.2 PLANTING - Trees and Shrubs

- 1. Plantings shall be installed from August 20 November when conditions are above 10°C.
- 2. The location of trees, where shown on drawings, is approximate only and may require adjustment due to site conditions. All tree locations to be staked out by the Contractor and approved by the Contract Administrator.
- 3. The area to be planted shall be finished to line, grade, and the approval of the Contract Administrator before planting operations are begun.
- 4. The Landscape Architect will mark the location of all trees, including type on site.
- 5. Planting shall be done during periods suitable with respect to weather conditions, locally accepted practices and the approval of the Contract Administrator.
- 6. Planting in shrub beds shall be done in a continuous operation, completing total beds, rather than individual species, unless otherwise specified by Contract Administrator.
- 7. All plants shall be placed in a plumb position. Prepared backfill shall be placed around the root system. Tamping or watering shall accompany the backfilling operation to eliminate air pockets.
- 8. Planting beds: backfill with approved soil mix in 150mm layers and firmly tamp each layer to ensure the plant retains its orientation. Ensure no air pockets remain around the roots.
- 9. Water thoroughly when hole is 1/2 full of tamped soil mixture, and again when the operation is complete to the satisfaction of the Contract Administrator.
- 10. Apply 75 mm of mulch around plantings once installation is complete.

# PART 4 SEEDING - Backdune Restoration Seed Mix

#### **4.1 SCOPE OF WORK**

- 1. Supply all materials, labour and equipment necessary for site preparation and seeding of all areas, as indicated on drawings. Seeding consists of the application of the specified nurse crop to be selected based on time of application and permanent seed mixtures onto designated areas where indicated on Drawings.
- 2. Re-seeding and preparation of soil surface for seeded areas deemed unacceptable following inspection, is part of the scope of work under this section, at no increase to the contract amount.

# **4.2 SCHEDULING**

1. Seeding shall be completed in late fall, ideally early November depending on date of freeze up. Seeding is acceptable from end of September to freeze up.

# **4.3 PRODUCT DELIVERY, STORAGE AND HANDLING**

#### **Grade Standards**

1. All seed supplied shall comply with the provisions of the Canada Seeds Act and Regulations and the grade standards for that particular seed kind. All Native Seed Mix, shall be source identified and have originated in Seed Zone 32. Supplier shall be a recognized native seed supplier.

### **Certificate of Seed Analysis**

1. Native Seed Mixes shall be provided to the Landscape Architect. The supplier of the Native Seed Mix shall supply germination test results for all seed lots included. Minimum acceptable percentage of pure live seed shall be 80%.

# Seed Packaging, Labelling, and Storage

- 1. All seed mixes shall be in the original sealed package with a legible label, securely attached.
- 2. Labeling shall conform to the requirements of the Canada Seeds Act and regulations. Each package shall be labeled to show:
  - a. The name and address of the seed supplier;
  - b. The name of the seed mix and the various individual seed species that comprise the seed mix and the percentage by mass of each;
  - c. The grade of the seed or seed mix;
  - d. The supplier's lot designation number corresponding to the Certificate of Seed Analysis;



ne. Mass in kilograms of the seed mix.

3. Prior to use, all seed shall be stored in dry cool locations. Seeds shall not be subject to temperatures less than 0 degrees Celsius or greater than 25 degrees Celsius. Native seed types shall be stored according to conditions specified by supplier or in the absence of supplier instruction between 16 and 20 degrees Celsius.

# **4.4 MATERIALS**

- 1. The contractor shall supply and pay for all seed mixes, including custom blends and substitutions as may be directed by the Landscape Architect. The seed mixes applicable to this Contract are as noted on Drawing RA-3.
- 2. The specified seed mix is a custom mix. The Contractor shall need to source the mix. If any species is not available substitutions shall be approved by the project Landscape Architect.

# **4.5 EXECUTION**

- Hand Seeding will be performed either with mechanical "cyclone "seeders, by hand seeding or by another approved method that scatters seeds over the area uniformly. It is essentials that the recommended steps be undertaken to ensure good soil to seeds contact when broadcast seeding is used.
- 2. Seeds are to be broadcast evenly over the entire site. Seeds should be mixed thoroughly with a filler such as sand prior to seeding and be mixed occasionally in the spreader to prevent separation and settling.
- 3. Spread half of the seed in one direction (horizontally) and the remaining seed in the other direction (vertically).

### **4.6 OPERATIONAL CONSTRAINTS**

- 1. The seeding operation shall not commence until the Contract Administrator has approved the surface preparation and the layout of permanent seed mix locations and the different cover types.
- Seed and cover application or re-application shall not be carried out under adverse field conditions such as high wind; heavy rain; frozen soil; or soil covered with snow, ice, or standing water.
- The site shall be maintained until conditions permit application or re-application of seed and cover.



- 4. The sufface to be seeded shall be prepared not more than 7 days before the seeding operation.
- No seed or cover shall come in contact with the foliage of any trees, shrubs, or other vegetation, except as specified in the Seeding subsection. No seed or cover shall come in contact with water bodies.

# **4.7 SURFACE PREPARATION**

- 1. If rainfall packs the soil surface of the seeding areas, after the surface preparation has been completed but before seeding, surface preparation shall be re-done prior to seeding to provide a loose and friable surface.
- 2. Prepare Native Seed areas as follows:
  - a. Site preparation shall be reviewed with the Landscape Architect before seeding.
  - d. Apply seed mix using method specified.

# 4.8 CLEAN UP

1. At the completion of the seed and cover operation, materials applied to areas or objects other than those designated to grow grass shall be removed. Clean water shall be used to immediately wash seed and cover materials from the foliage of trees, shrubs, or other susceptible plant growth.



DESCRIPTION: Materials and Installation of Snow/Sand Fencing

SPECIFICATIONS: - Special Provisions

### **PART 1 - MATERIALS**

- .1 Fencing shall be composed of untreated natural wood. Slats shall be spaced 6cm apart. Slats shall be 1cm x 2.5cm-3.8cm. Wire shall be 4 strands of 14 ga twisted wire support or equivalent.
- .2 Fencing shall be 1m high.
- .3 Fence posts shall be 2 m t-posts or 4x4 inch wood posts. T-posts are the most desirable option.

#### **PART 2 - EXECUTION**

- .1 Fencing shall be installed at interim conditions prior to planting works beginning.
- .2 Fencing locations are to be confirmed in the field by the Contract Administrator prior to installation.
- .3 Post shall be installed at 3 m intervals.
- .4 Post shall be pounded a minimum of 0.7 m into sand.

#### PART 3 - MAINTENANCE

.1 Interim Fencing is to remain in place throughout the warranty period. Any deficiencies observed in fencing during the warranty period shall be corrected by the Contractor.

**END OF SECTION** 

# PROVISIONAL ITEMS - NOT INCLUDED IN TENDER TOTAL

# ITEM NO. P1 to P2

DESCRIPTION: Additional to Item B3 for Off-site Disposal of

**Impacted Soils** 

SPECIFICATIONS: - OPSS 180, 510

- Special Provisions

### **SPECIAL PROVISIONS:**

Earth Excavation Item B3 considers all excavation required to excavate and remove Table 1 soils from the site. In the event Table 2 and/or 3 soils are encountered, the prices provided for Provisional Items P1 or P2 will be added to Earth Excavation Item B3 for off-site disposal of these materials, as appropriate, at a site arranged by the Contractor. Any payment under either of these Provisional Items must be authorized by the Contract Administrator and supported by weigh tickets from an appropriate approved facility. Sorting and temporary stockpiling of these materials on-site is to be included in the unit pricing. The number of units provided is nominal only. No adjustment to the unit prices provided will be made for quantity variation. Payment of soil removal shall be per tonne. \*\*\*\*\* Consider a 1 truck or 8 tonne minimum payment to be fair to the contractor if they need to send a truck to Sarnia with ½ a cubic meter.

# ITEM NO. P3

DESCRIPTION: Irrigation Removal, Design, Supply, and

Installation

SPECIFICATIONS: - Special Provisions

#### **SPECIAL PROVISIONS:**

The work under this item includes the **design, supply, installation, testing, and site restoration** associated with a new irrigation system to service existing garden areas along a 190 m alignment, extending from the existing wet well south, as shown on the contract drawings.

The **existing system** consists of a pump in a wet well that feeds multiple gardens via a main line. The Contractor shall:

- Design an irrigation system to fully and evenly irrigate all existing garden areas.
- Provide pump sizing calculations and select a new pump to adequately supply the required pressure and flow.
- Design and install appropriate pipe sizing and routing.
- Include drain valves or blow-offs at all low points for winterization.
- Remove all existing underground electrical infrastructure associated with the previous irrigation system, as identified in the field.
- Ensure all materials and equipment are **commercial grade** and suitable for municipal applications.

The **final design layout**, including drawings and specifications, shall be submitted to the Contract Administrator for review and approval prior to material procurement or installation.



### TESTING & ACCEPTANCE:

Upon completion of the installation:

- The Contractor shall perform a **pressure test** of the irrigation system at **75 psi for a minimum of 2 hours**.
- The test shall be conducted in the presence of the Contract Administrator and all results shall be recorded and submitted.
- All leaks or deficiencies identified during testing shall be repaired at the Contractor's expense and the system re-tested until fully compliant.
- Final acceptance is contingent upon submission of:
  - Satisfactory test results,
  - As-built drawings,
  - o Operation and maintenance (O&M) manuals for the pump and control equipment.

#### RESTORATION:

The Contractor shall be responsible for the restoration of all areas disturbed during the course of irrigation work. This includes:

- Backfilling and compacting all trenches to prevent settlement.
- Reinstatement of all surfaces including:
  - o **Sod**, **topsoil**, and **mulch** in landscaped or turf areas.
  - o Granular or asphalt materials in any paved or trail surfaces.
- Removal of all debris, surplus materials, and temporary installations.
- Restoration work shall match pre-construction conditions or better, to the satisfaction of the Contract Administrator.

No separate payment will be made for restoration; all associated costs shall be included in the unit or lump sum price for the irrigation system.