



**THE CITY OF WINNIPEG**

## **APPENDIX 'E'**

# **BID CONFERENCE PRESENTATION AND BID CONFERENCE & SITE INVESTIGATION MEETING MINUTES**

**BID OPPORTUNITY NO. 9-2018**

**SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS**



SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY No. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

# SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Agenda:

- Please Fill in the Sign-In Sheet
- Project Team
- Scope of Work
- Review of Tender Documents
- Questions





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

City of Winnipeg – Water Services Division:

- Chris Sauv , P.Eng., PMP – Project Manager





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Design Team

(Dillon/Trek):

- Graeme Loepky – Project Manager
- Kevin Willis – Bridge Design
- Jun Tapia – Road Design
- Trek Geotechnical – Geotechnical Design

Contact Administration

(Dillon/Trek):

- Graeme Loepky – Project Manager
- Graeme Loepky – Contact Administrator
- Dillon – Resident Services
- Trek – Geotechnical Lead

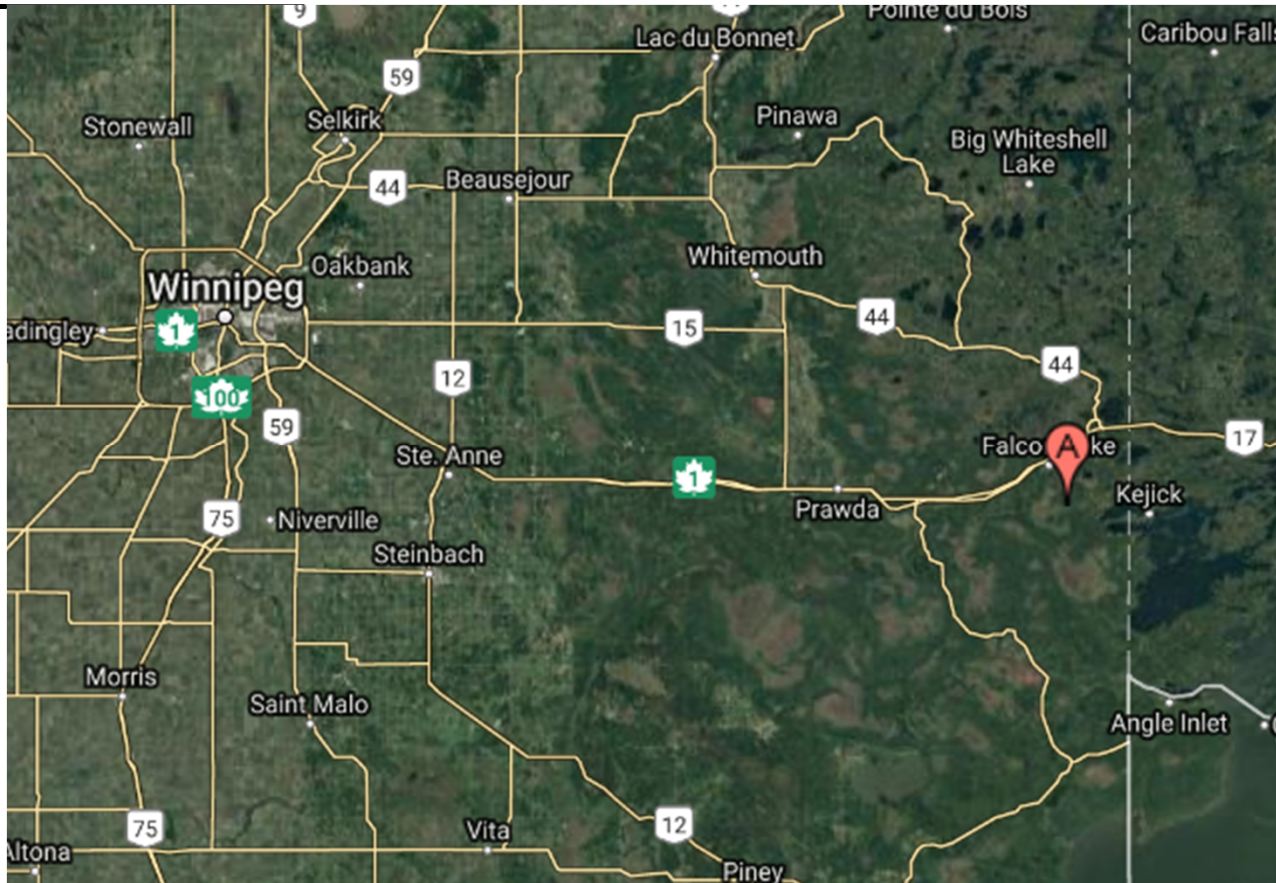




SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Project Location:

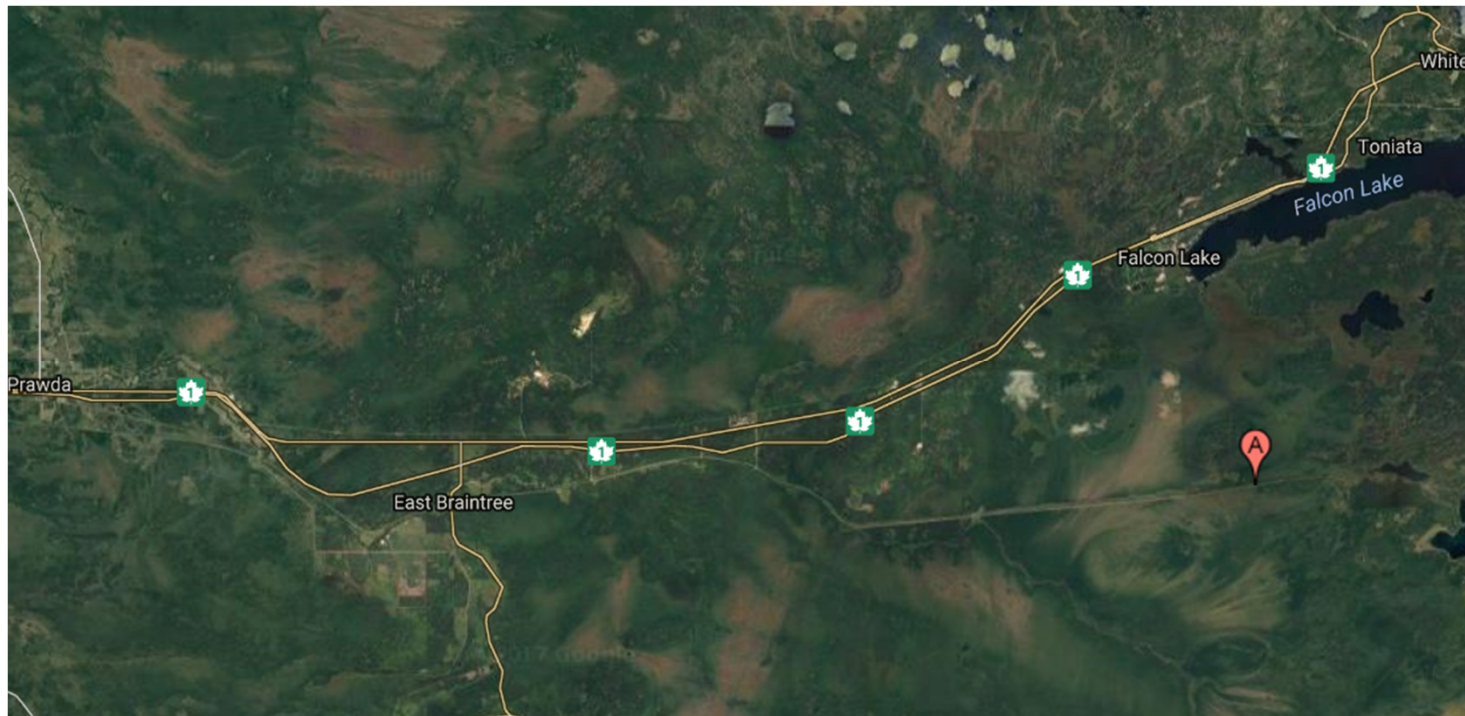




SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Project Location:





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Project Location:



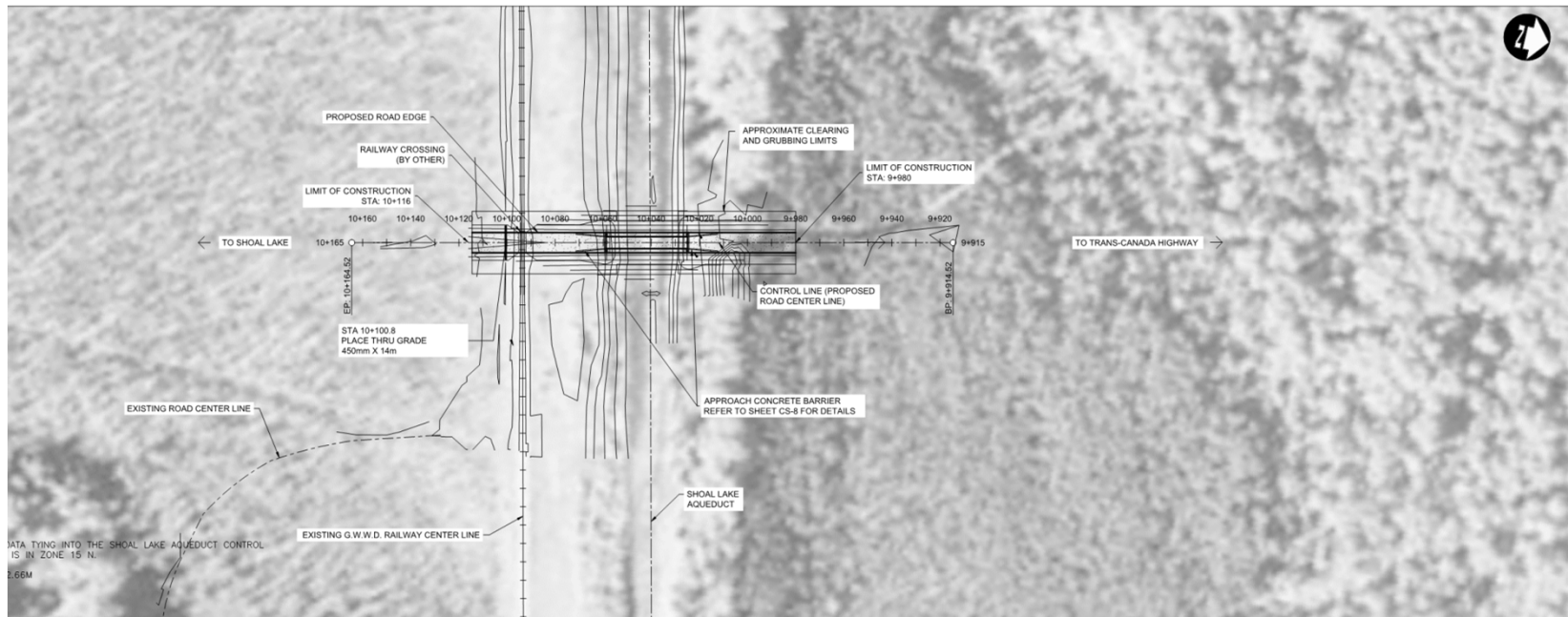




# SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

## Limits of Work:

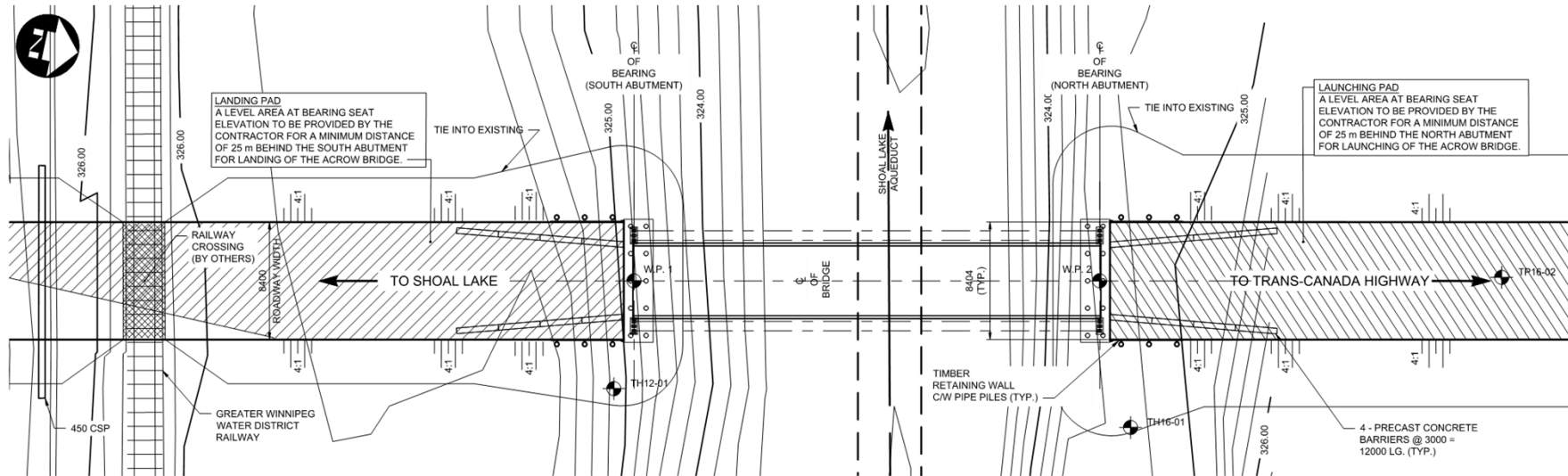




# SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

## Scope of Work: Bridge Construction



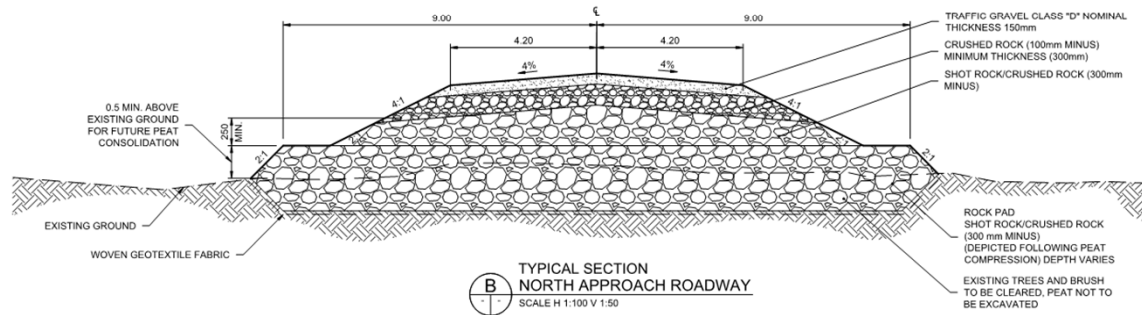
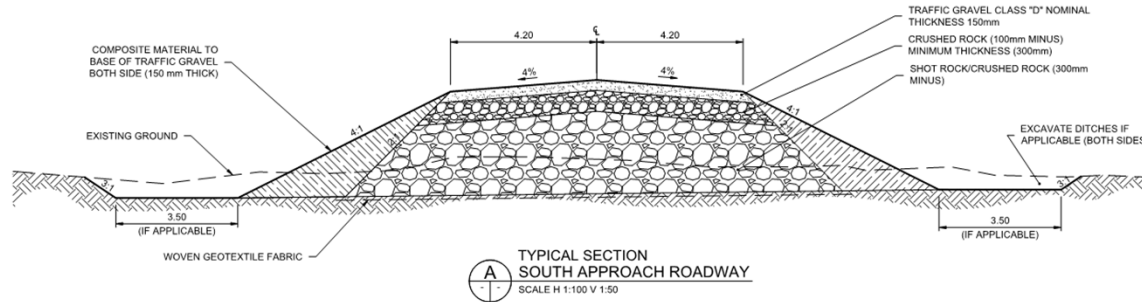


# SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

## Scope of Work:

## Typical Road Cross Sections





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Scope of Work:

- Construction of an Acrow panel bridge over the aqueduct
  - Supply and drilling steel pipe piles
  - Supply and placement of reinforcing steel
  - Construction of reinforced concrete abutments
  - Supply and install subdrain
  - Design, supply, transportation, assembly and erection of Acrow panel bridge
  - Supply and installation of timber bridge deck, backwalls, and wingwalls





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Scope of Work:

- Construction of an Acrow panel bridge over the aqueduct (cont'd)
  - Supply and installation of guard rail
  - Placement of granular backfilling at abutments
  - Placement of materials to construct approach roadway
  - Supply and installation of a corrugated steel pipe culvert
  - Erosion and sediment control and re-vegetation

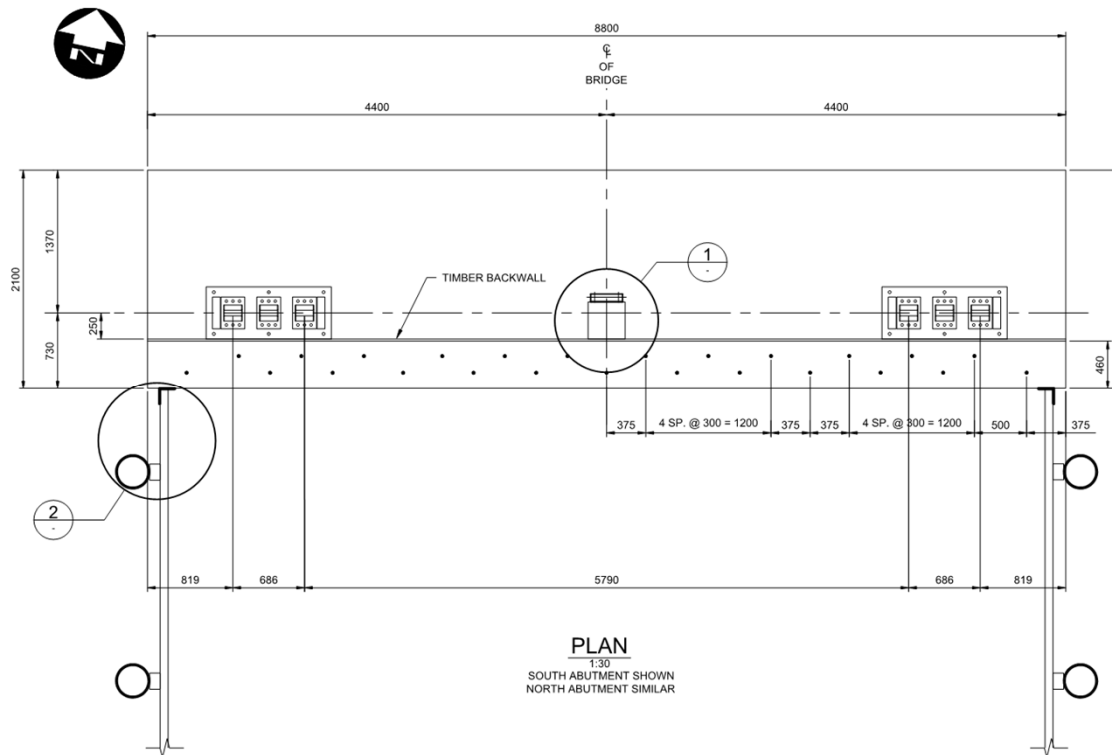




# SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

## Abutment Details:

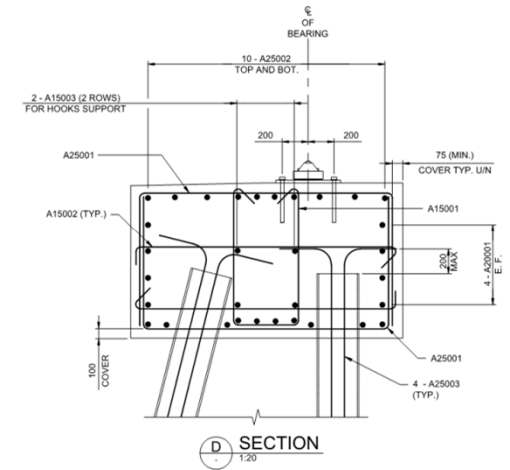
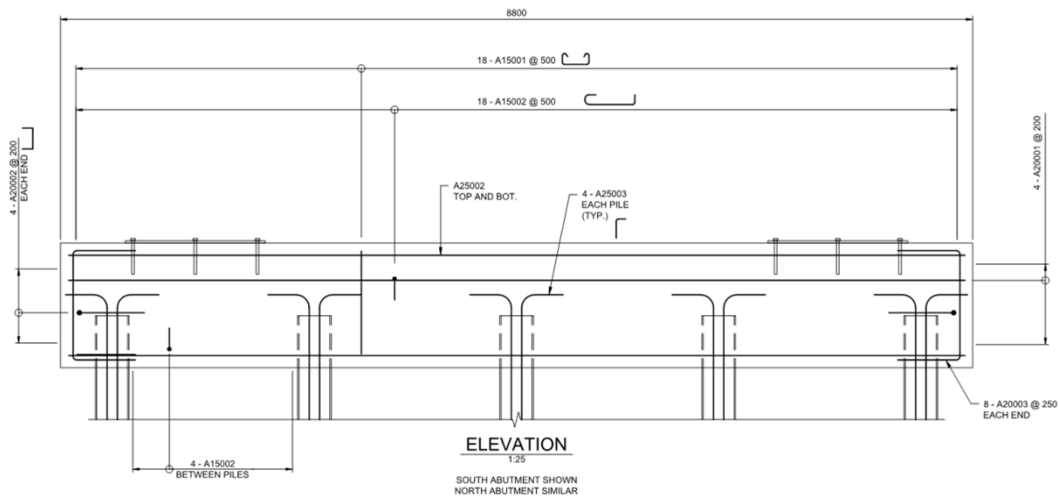




# SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

## Abutment Details (cont'd):

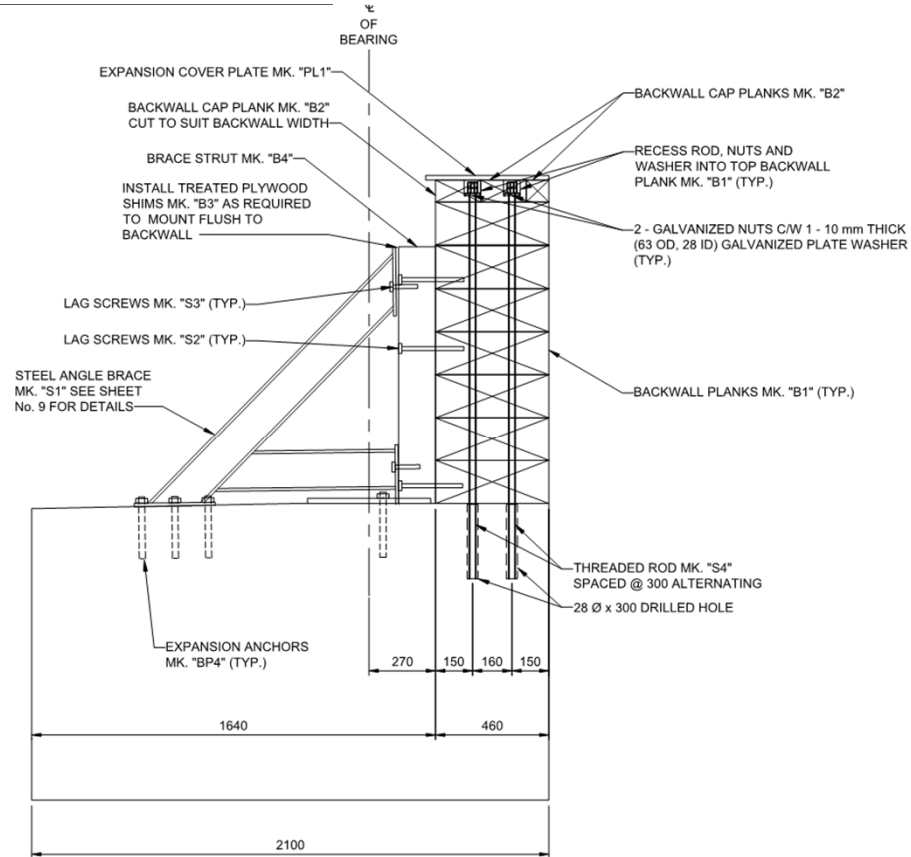




# SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS BID OPPORTUNITY No. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

## Abutment Backwall Detail:



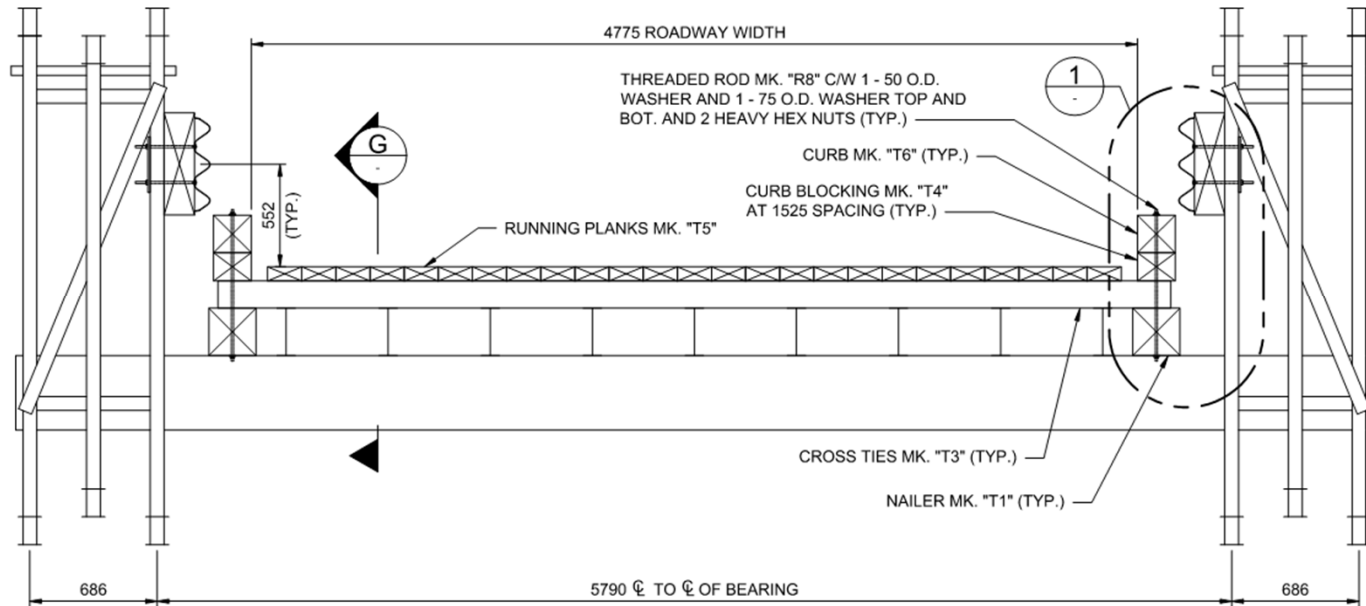




SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Timber Deck Details:

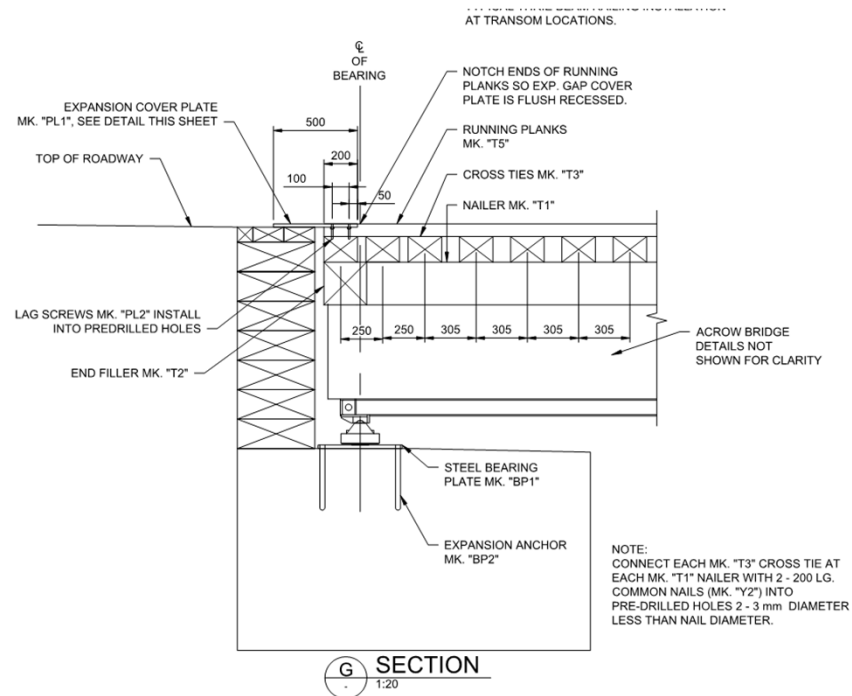




SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Timber Deck Details (cont'd):





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Supplemental Conditions:

- Insurance provided by the Contractor (D10):
  - Wrap-up Liability insurance
  - Automobile Liability insurance
  - “All Risk” Builders’ Risk Insurance
  - Contractors Pollution Liability insurance
  - Commercial General Liability Insurance (for Greater Winnipeg Water District, GWWD, Railway)
- Submissions by Contactor:
  - Safe Work Plan (D9)
  - Performance Security (D11)
  - Subcontractor List (D12)
  - Equipment List (D13)
  - Detailed Work Schedule (D14)
  - Environmental Protection Plan (D15 & E9)





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Substantial and Total Performance (D17.1 and D18.1):

- 1) Substantial Performance – **July 15<sup>th</sup>, 2018**
- 2) Total Performance – **July 31<sup>st</sup>, 2018**

Other Key Milestones:

- 1) Installation of steel pipe piles
- 2) Construction of concrete abutments
- 3) Supply and Installation of Acrow panel bridge
- 4) Construction of approach roadway embankments
- 5) Open Acrow panel bridge to traffic





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Key Specifications:

E9 Environmental Protection

- Diked fuel storage and refuelling must be located a minimum of 100 m from the waterway.
- Maximum vibration on the aqueduct not exceed 6 mm/second.



SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Key Specifications:

E10 Work by Others and Work with others

- The Contractor shall become the Prime Contractor upon entering the site for the first time.
- The Contract Administrator will provide two survey control points.
- The Contractor is responsible to cooperate with others working in the area which may include:
  - The supply of roadway materials by Shoal Lake First Nation 40
  - The contractor constructing the all weather road.
  - The City of Winnipeg's aqueduct and GWWD railway operation.





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Key Specifications:

E20 Acrow Panel Bridge

- The Contractor is required to supply (including design), transport, assemble and erect the Acrow panel bridge.
- The Contractor will be required to supply new, galvanized components to construct 1 – 33.528 m. span 700XS Acrow panel bridge with a roadway width (curb-to-curb) of 4.775m. and a clear width between trusses of 5.0m.
- The bridge shall include steel stringers to accommodate a timber deck.
- The bridge shall be designed according to the CAN/CSA-S6-14 Canadian Highway Bridge Design Code including all interims for the CL 625 design live load or a John Deere 300D with full payload of approximately 27.3 tonnes or a CAT 740 with full payload of approximately 38 tonnes.





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Key Specification:

E20 Acrow Panel Bridge (cont'd)

- All launching components and equipment including rollers, required for assembly and launching will be supplied by the City. The Contractor will be responsible to coordinate and pick up the equipment within 20 km from Winnipeg.
- The Contractor will be responsible for providing an Acrow Representative to assist with the planning, material assembly, launch design, launching, and erection of the Acrow Panel Bridge.
- Example of Acrow Bridge Construction
  - [https://www.youtube.com/watch?v=h\\_eJRX5iVnc&list=PLvqXTqcYDg\\_cpd6uzJZmqbADH88I3YT3t&index=2](https://www.youtube.com/watch?v=h_eJRX5iVnc&list=PLvqXTqcYDg_cpd6uzJZmqbADH88I3YT3t&index=2)







SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Key Specifications:

E21 Supply and Install Timber Decks, Backwalls, and Wingwalls

- The timber shall be Coastal Douglas Fir #2, or better; structural full sawn and treated. All timber shall be inspected by a certified inspection company after treatment.
- Backwalls shall be constructed of glulam timber beams.
- The timber decking shall be planed on two (2) edges and one side and laid heart side down.





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Key Specifications:

E29 Work on and around the aqueduct

- At no time shall there be any equipment, activity, or traffic on top of the aqueduct.
- Contractor shall be responsible to safeguard the aqueduct at all time during the construction.
- Contractor shall monitor the vibration at the aqueduct to ensure the vibration limit of 6mm/sec is not exceeded.





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Key Specifications:

E30 Use of and work on or near the Greater Winnipeg Water District (GWWD) Railway

- The GGWD Railway is available to the Contractor to transport equipment and material to the work area if no other reasonable transportation options are available.
- The Contractor will have limited use of the GWWD Railway facilities as the priority of the Railway use will be given to the City's tasks.



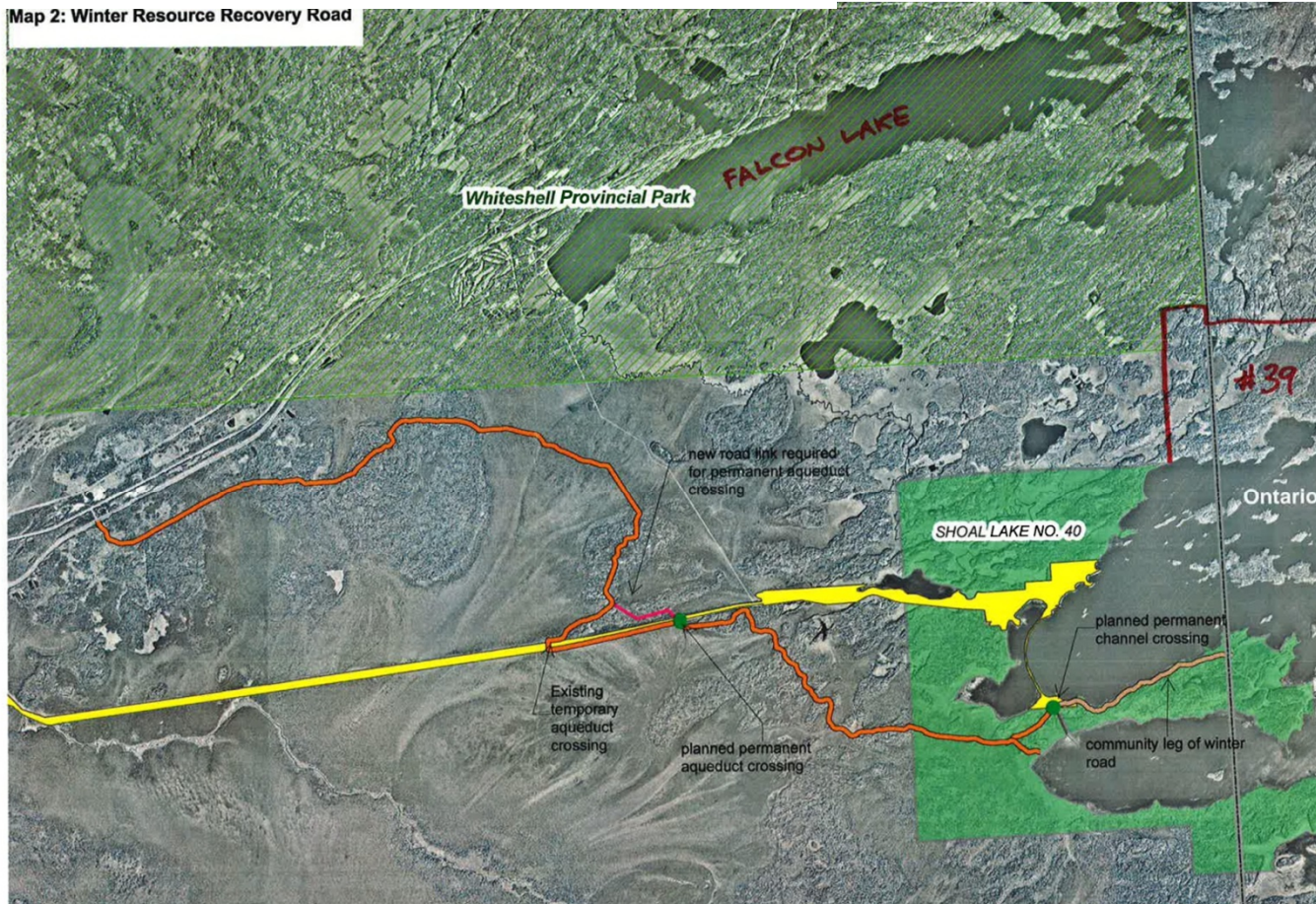


SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

# Winter Road

Map 2: Winter Resource Recovery Road





SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

## Site Access

- Temporary aqueduct crossing is approximately 2 km west from the construction site.
- Use of and work on or near the GWWD railway (Specification E30)



SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS  
BID OPPORTUNITY NO. 9-2018

BIDDERS CONFERENCE – JANUARY 18, 2018

Questions?



### SHOAL LAKE AQUEDUCT CROSSING AND ASSOCIATED ROADWORKS



### Bidders Conference Meeting Minutes

**DILLON FILE NO.:** 16-4481-2000  
**DATE:** January 18, 2018  
**TIME:** 9:30 am  
**LOCATION:** 552 Plinguet Street, Winnipeg, Manitoba  
**PROJECT:** Shoal Lake Aqueduct Crossing and Associated Roadworks

Item	Discussion
	Graeme Loeppky conducted the Bidders Conference for the City of Winnipeg Bid Opportunity No.9-2018. A copy of the slide presentation is included in the Bid Opportunity 9-2018 Appendix E Bidders Conference Presentation.
Question 1:	Does the launching equipment supplied by others include the launching nose?
Answer 1:	The launching equipment supplied by others includes the components for the launching nose as well as the rollers.
Question 2:	Is there a cost associated with the use of the GWWD Railway?
Answer 2:	There is no cost associated with the use of the GWWD Railway.
Question 3:	Is the Contractor allowed to use the City of Winnipeg Field House at the aqueduct intake facility for accommodations?
Answer 3:	Contractors cannot use the City of Winnipeg Field House at the aqueduct intake facility for accommodations.
Question 4:	Can Contractors use the GWWD railway if the Contractor provides their own highrail?
Answer 4:	A Contractor is able to use their own highrail on the GWWD railway provided they meet the insurance requirements.
Question 5:	Can the bridge be assembled and launched from the south?

Item	Discussion
Answer 5:	The bridge is shown to be assembled and launched from the north to avoid conflict with the GWWD railway. The Contractor may assemble and launch the bridge from the south provided there is no impact on the GWWD railway operations.
Question 6:	Can the City provide more clarity on when the GWWD railway and train be used by the Contractor?
Answer 6:	Mobilization of materials and equipment is expected to occur via the winter road during the winter road operation. When the winter road is not in operation, the Contractor may use the GWWD railway in accordance with Specification E30.
Question 7:	Where are the loading locations for the GWWD Railway?
Answer 7:	The loading locations for the GWWD railway are at 598 Plinquet and near the intersection of the GWWD and PR 308.
Question 8:	How does a Contractor access the project site that is North of the Aqueduct.
Answer 8:	The City of Winnipeg has cleared a trail that is on the berm to the north of the aqueduct from the existing winter road crossing at Mile 92 to the project site. This trail has been used in the past to complete the geotechnical investigation for the Shoal Lake Aqueduct Crossing as well as City of Winnipeg maintenance operations to remove beaver dams from the ditch to the North of the aqueduct. The north access trail will also be utilized by Shoal Lake No. 40 to deliver and stockpile aggregate to the north side of the project site.
Question 9:	When will the aggregate delivery occur?
Answer 9:	The aggregate delivery is expected to commence during the week of February 5, 2018 and is expected to be completed during the week of February 26, 2018.

**These minutes were recorded by Graeme Loeppky, P.Eng. Any errors or omissions should be reported to Dillon Consulting Limited immediately.**





**Site Investigation Meeting Minutes**

**DILLON FILE NO.:** 16-4481-2000  
**DATE:** January 18, 2018  
**TIME:** 1:30 pm  
**LOCATION:** Shoal Lake Aqueduct Crossing Site.  
**PROJECT:** Shoal Lake Aqueduct Crossing and Associated Roadworks

Item	Discussion
	During the Site Investigation for the City of Winnipeg Bid Opportunity No. 9-2018 the following questions were asked by potential Bidders.
Question 1:	Can additional clarification be provided regarding the condition of the north access trail?
Answer 1:	The north access trail is a cleared trail that is located on the berm that is to the north of the aqueduct. The berm was created from material that was excavated during the construction of the aqueduct in the 1920's. The trail is approximately 3 m wide and is relatively flat in profile along the length of the trail. The elevation of the trail is typically above the water elevation in the ditches on either side of the aqueduct.

**These minutes were recorded by Graeme Loeppky, P.Eng. Any errors or omissions should be reported to Dillon Consulting Limited immediately.**