THE WAY AHEAD

# GROAT ROAD BRIDGES REHABILITATION

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# GROAT ROAD BRIDGES REHABILITATION

INFORMATION SESSION | NOVEMBER 29, 2016







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## WELCOME

### Purpose of the Information Session:

- To inform residents, commuters, and businesses about the rehabilitation project
- To present information regarding the anticipated scope of work, community impacts, and timelines for the project
- To discuss with residents, commuters, and businesses the proposed bridge rehabilitation plans for the project
- To gather comments and answer questions from residents and businesses regarding the information and plans presented







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### GROAT ROAD BRIDGES REHABILITATION

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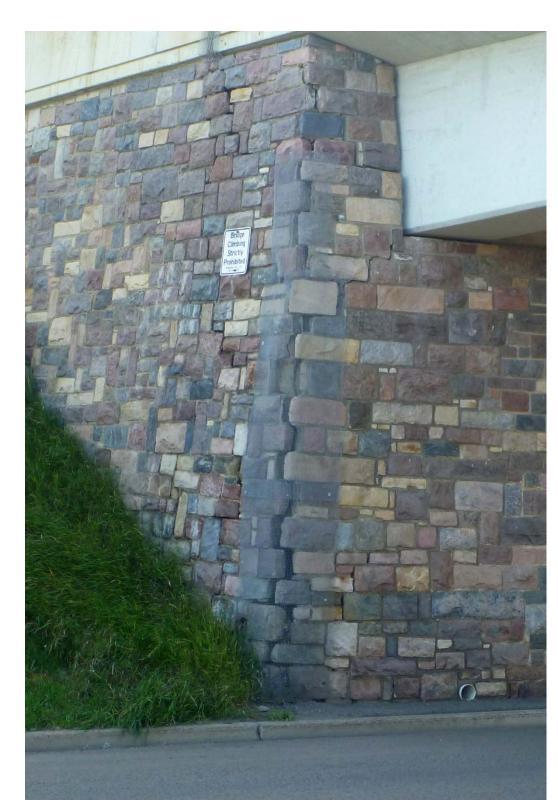




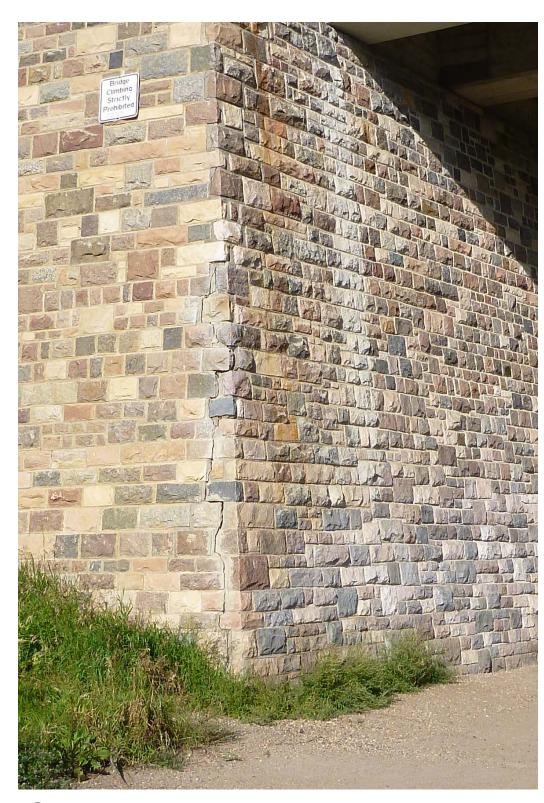
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### Condition Assessment



Stone wall separation at north abutment.



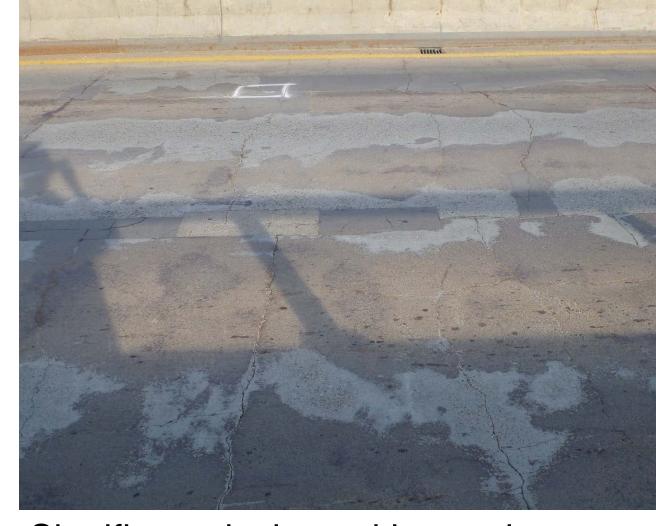
Stone wall separation at south abutment.



Girders are strength deficient and need strengthening or replacement for continual use.



Concrete repairs and staining on girders and deck underside indicate possible chloride permeation.



Significant deck cracking and spalling. Epoxy overlay is severely debonding.



Cracking on underside of cantilever that supports sidewalks on east side of bridge. Cantilevers not post-tensioned.



Hanger hinges in girders are susceptible to corrosion if deck joints are leaking.







### GROAT ROAD BRIDGE REHABILITATION

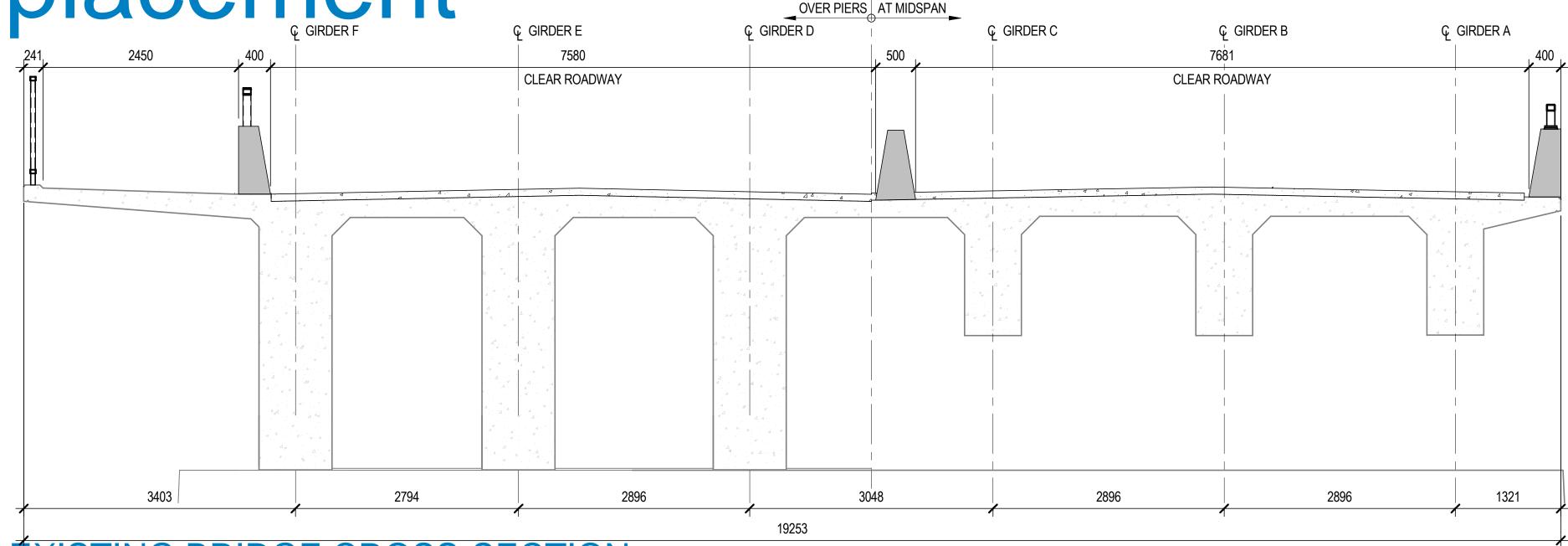
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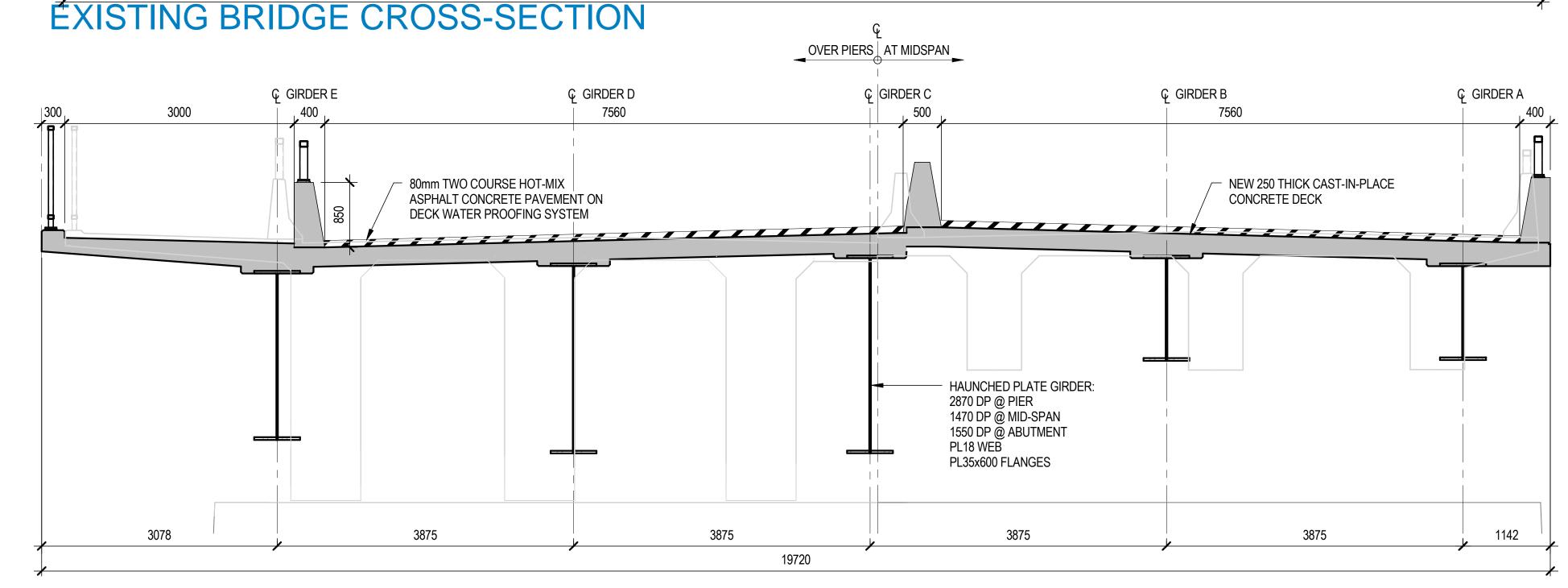
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Superstructure Replacement

## Major work on the bridge will include:

- Demolish existing concrete deck and girders
- Install new steel girders, a wider concrete deck, and new barriers and railings
- Reconstruct abutment roof slab and beams
- Remove and restore stone veneer at abutments











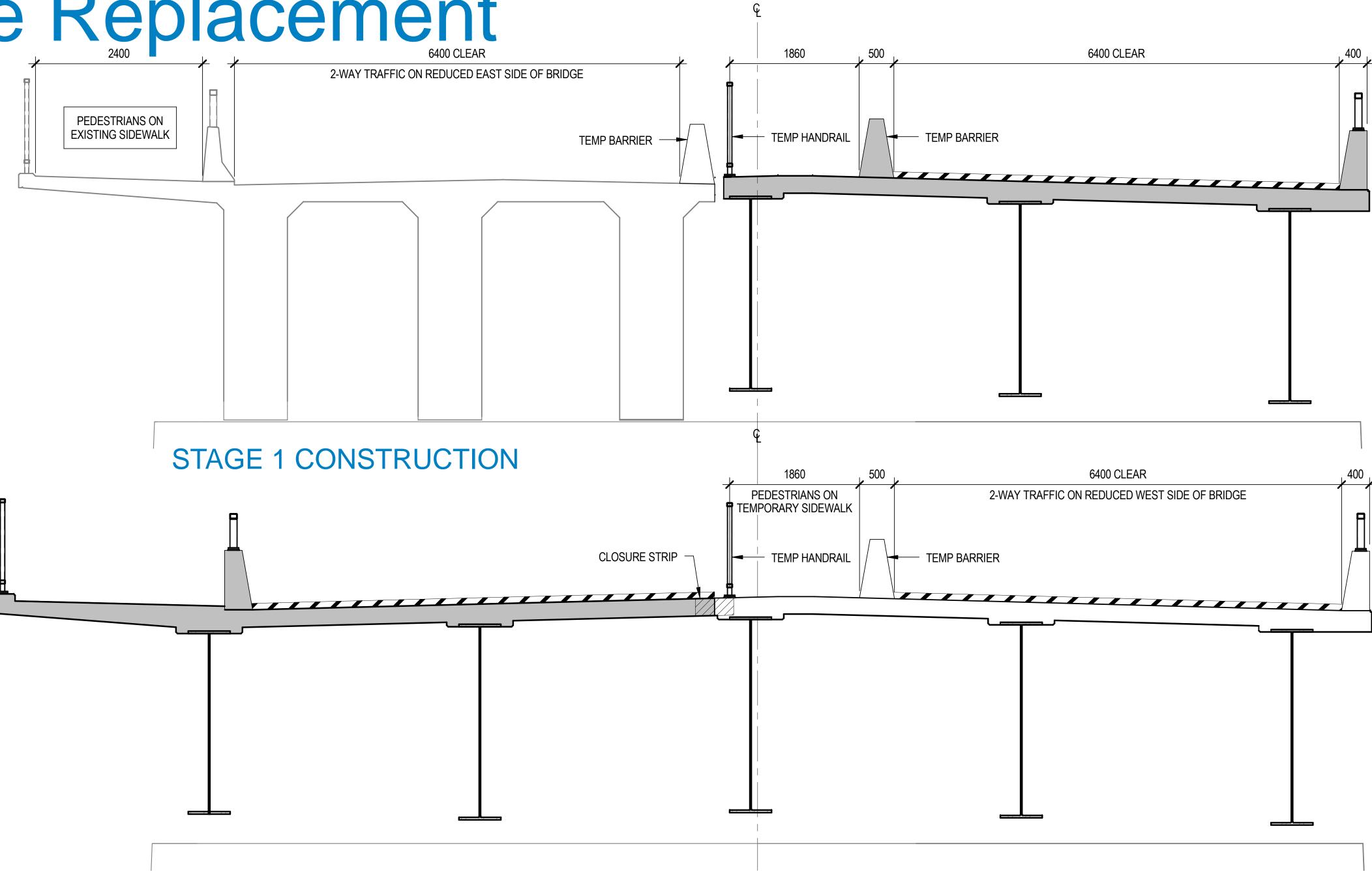
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Superstructure Replacement

#### **Construction Staging:**

Construction will be staged to keep two lanes of traffic and a narrowed pedestrian sidewalk open throughout the project.











### MAYFAIR BRIDGE REHABILITATION

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## Major repairs for the bridge will include:

- Grout pad repairs
- Partial depth repairs to the substructure concrete
- Replace deck joints
- Crack repairs to the curbs
- Construction of a new bridgerail on south curb of bridge
- Repaint pedestrian railings



New Bridgerail



East deck joint to be replaced



Deteriorated abutment concrete to be repaired







### VICTORIA PARK ROAD BRIDGE REHABILITATION

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## Major repairs for the bridge will include:

- Removal and replacement of existing wearing surface
- Partial and full depth repairs to bridge deck concrete and substructure
- Abutment deck joint modifications
- Median barrier replacement



Concrete spalls at deck underside





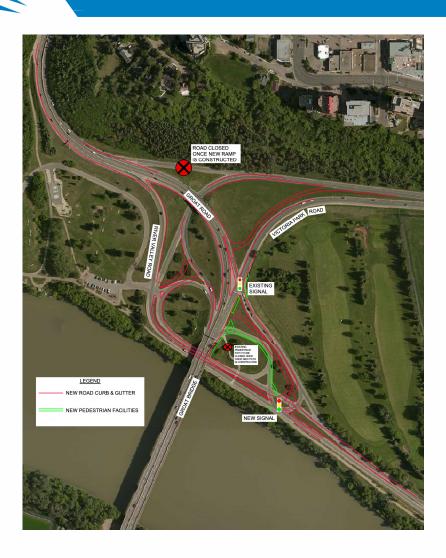
Cracking and delamination at pier







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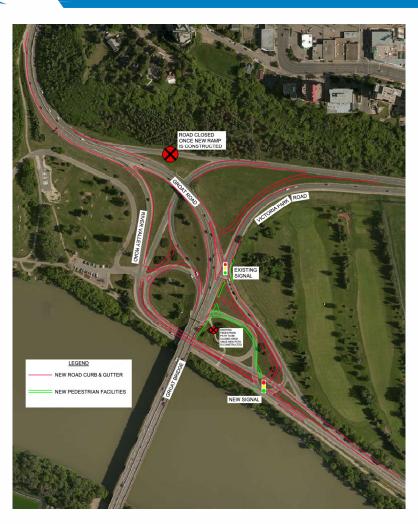
#### **Road Work**

- Roadway construction project to improve safety
- Realigned pedestrian connection provided from Groat Bridge to River Valley Road
- Proposed changes align with the Concept Planning Study 2015 report and recommendations





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#### **Construction Impacts**

- Reduced travel speeds
- Reduced lane widths
- Some roadways and turning movements may require temporary closure during the project to facilitate construction
- No bus stop locations will be impacted
- Additional travel time will be added to bus routes 128 and 130 as required during construction
- Park and Ride services to the area for social events will also be adjusted as required during construction





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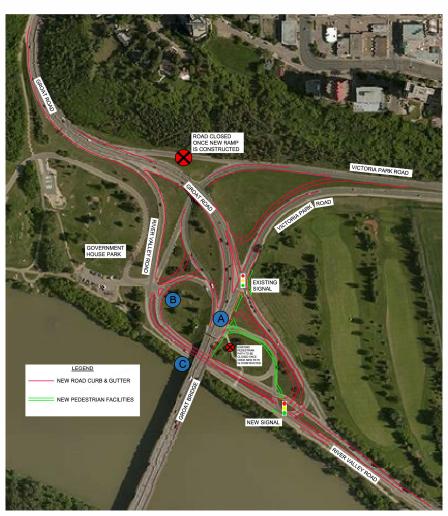
#### **Construction Impacts – South Side**

- A Shortened merge from Emily Murphy Park Road to Groat Road
- B Changes to access the Parks Area and Royal Mayfair Golf Course (access to remain open)
- C Restricted pedestrian access underneath Groat Bridge during bridge demolition and reconstruction
  - Pedestrian access across Groat Bridge will be maintained but narrowed.
- D Lane merging and restriction of traffic on Groat Road to one lane in each direction during bridge demolition and reconstruction





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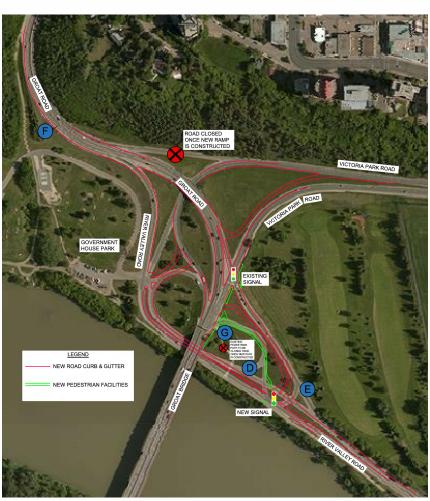
#### **Construction Impacts – North Side**

- A Shortened merges (southbound) from Groat Road and River Valley Road West onto Groat Bridge
  - Shortened diverges (northbound) from Groat Bridge to Groat Road North, Victoria Park Road and River Valley Road
- B Temporary closure of access to Government House Park from River Valley Road West (access from River Valley Road East and Victoria Park Road to remain open)
- Restricted pedestrian access underneath Groat Bridge during bridge demolition and reconstruction





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#### **Construction Impacts – North Side (continued)**

- D River Valley Road West underneath Groat Bridge closed while new ramps to Victoria Park Road are constructed
- E Access to Groat Road and Victoria Park Road from River Valley Road East and West closed during new ramp, intersection and signal construction
- Edmonton DIALOG\* ALTERIA

- F Existing walk on the south side of Groat Road will be closed and permanently removed from this point south; pedestrian access to River Valley Road is maintained through Government House Park
- G Local pedestrian detours while new pathway connection from Groat Bridge to River Valley Road is constructed



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## ENVIRONMENTAL

- Environmental assessments have been completed
- Applications for environmental permits are being prepared
- A field investigation will be conducted in spring 2017 to determine if historical artifacts are present in key project areas







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## THANKYOU

for your interest in this important project.

More information regarding this project is available on the project information sheet provided and on the City of Edmonton website at:

www.Edmonton.ca/GroatRoadBridges

- Please speak with the project representatives in attendance about your comments and suggestions regarding the project
- Please fill out a comment sheet and leave it in the box by the door or submit it online before December 13, 2016
- All comments will be reviewed by the City of Edmonton



