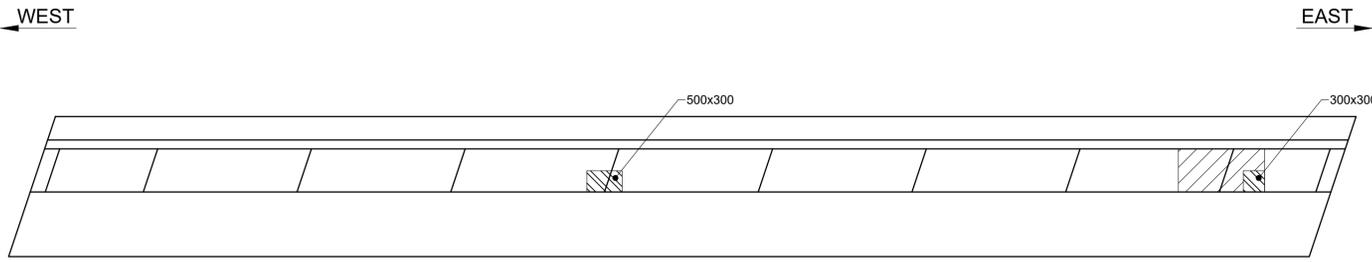
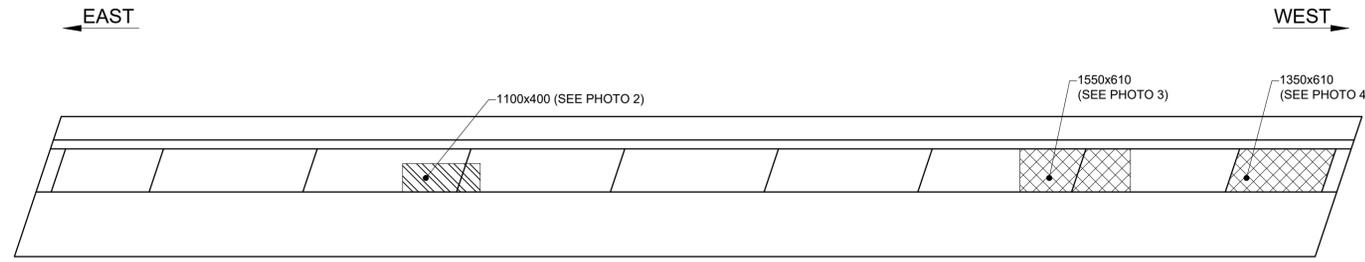


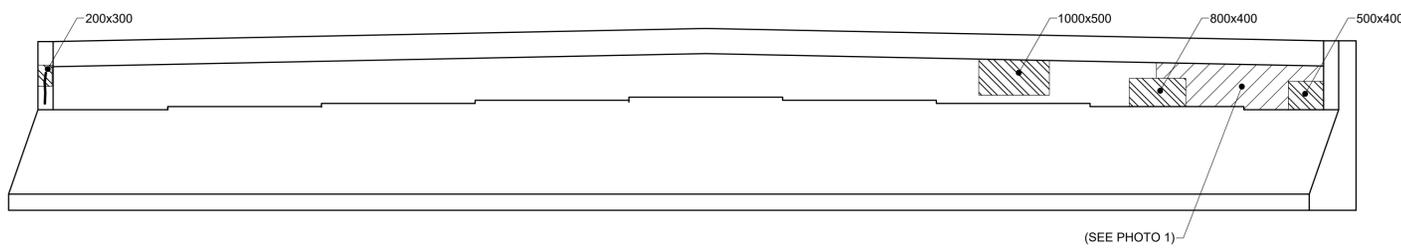
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 Last Saved: 9/5/2018 9:28 AM by: A.Higginer  
 Plotted: 9/5/2018 10:02 PM by: Alex Haggner  
 BSO A1 - 594mm x 841mm



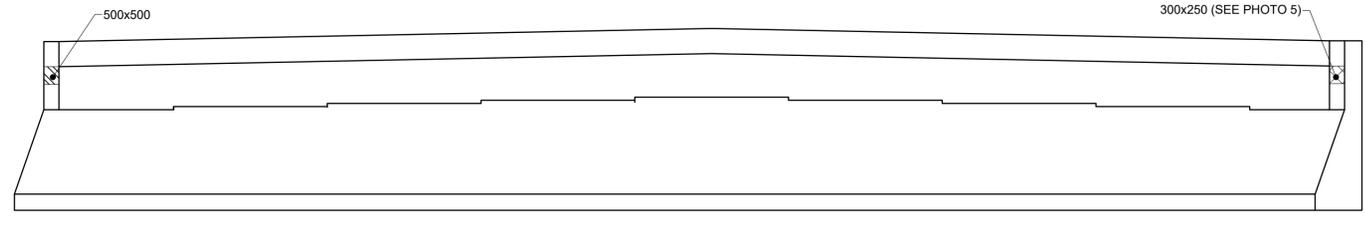
**NORTH ABUTMENT PLAN VIEW**  
SCALE: 1:50



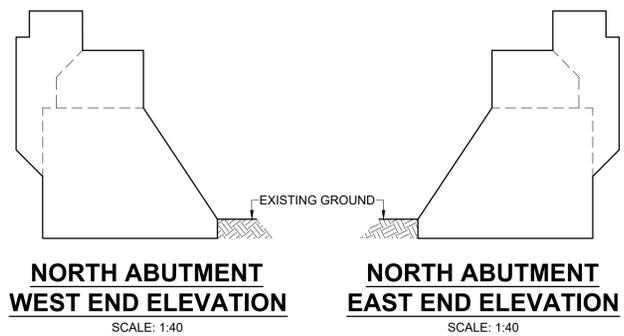
**SOUTH ABUTMENT PLAN VIEW**  
SCALE: 1:50



**NORTH ABUTMENT FRONT ELEVATION**  
SCALE: 1:50

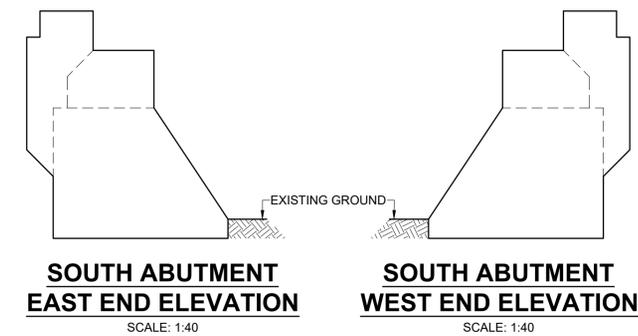


**SOUTH ABUTMENT FRONT ELEVATION**  
SCALE: 1:50



**NORTH ABUTMENT WEST END ELEVATION**  
SCALE: 1:40

**NORTH ABUTMENT EAST END ELEVATION**  
SCALE: 1:40



**SOUTH ABUTMENT EAST END ELEVATION**  
SCALE: 1:40

**SOUTH ABUTMENT WEST END ELEVATION**  
SCALE: 1:40



1. NORTH ABUTMENT EAST END



2. SOUTH ABUTMENT BEARING SEAT BETWEEN 3RD AND 4TH GIRDERS FROM THE EAST



3. SOUTH ABUTMENT BEARING SEAT BETWEEN 2ND AND 3RD GIRDERS FROM THE WEST



4. SOUTH ABUTMENT BEARING SEAT BELOW WEST EXTERIOR GIRDER



5. SOUTH ABUTMENT WEST CORNER BELOW MASK WALL

**LEGEND:**

- LOSS OF MORTAR SURFACE REPAIR
- DELAMINATION
- SPALL
- CRACK

- GENERAL NOTES:**
- PAVED SLOPE NOT MAPPED.
  - DEFECTS MAPPED OCTOBER 5, 2017.
  - CONTRACTOR TO UNDERTAKE DELAMINATION SURVEY WITH RESIDENT ENGINEER TO CONFIRM EXTENTS OF DEFECTS.
  - REPAIRS TO BE COMPLETED TO DELAMINATED, SPALLED, AND CRACKED CONCRETE PRIOR TO INSTALLING AND APPLYING ECE TREATMENT. REFER TO SHEET 99 FOR REPAIR DETAILS.

**ENGINEERS & GEOSCIENTISTS**  
 Certificate of Authorization  
**MORRISON HERSHFIELD**  
 No. 1736

**METRIC**  
 WHOLE NUMBERS INDICATE MILLIMETRES  
 DECIMALIZED NUMBERS INDICATE METRES

**LOCATION APPROVED**  
 UNDERGROUND STRUCTURES

DATE: \_\_\_\_\_

**NOTE:**  
 LOCATION OF UNDERGROUND STRUCTURES AS SHOWN ARE BASED ON THE BEST INFORMATION AVAILABLE BUT NO GUARANTEE IS GIVEN THAT ALL EXISTING UTILITIES ARE SHOWN OR THAT THE GIVEN LOCATIONS ARE EXACT. CONFIRMATION OF EXISTENCE AND EXACT LOCATION OF ALL SERVICES MUST BE OBTAINED FROM THE INDIVIDUAL UTILITIES BEFORE PROCEEDING WITH CONSTRUCTION.

No.	REVISIONS	DATE	BY
D	ISSUED FOR TENDER	18/09/04	BAP
C	ISSUED FOR 95% DESIGN REVIEW	18/08/07	BAP
B	ISSUED FOR 50% DESIGN REVIEW REV 1	18/06/28	AG
A	ISSUED FOR 50% DESIGN REVIEW	18/04/03	AG

**MORRISON HERSHFIELD**

DESIGNED BY: AG  
 CHECKED BY: BAP  
 DRAWN BY: AH  
 APPROVED BY: BE

HOR SCALE: AS SHOWN  
 VERT SCALE: AS SHOWN

RELEASED FOR CONSTRUCTION  
 N/A

DATE: \_\_\_\_\_

PROFESSIONAL'S SEAL

**B.A.F. PHILLIPS**  
 Member  
 32723

CONSULTANT FILE NAME  
 W160034 - DD SU.DWG

**THE CITY OF WINNIPEG**  
 PUBLIC WORKS DEPARTMENT  
 ENGINEERING DIVISION

**EMPRESS STREET PROJECT**  
 OVERPASS REHABILITATION WORKS  
 SUBSTRUCTURE  
 NORTH AND SOUTH ABUTMENT DEFECT MAP  
 AND SURFACE REPAIRS

CITY DRAWING NUMBER: P-3494-87  
 SHEET 87 OF 168  
 DRAWING No. REV 87 D

BID OPPORTUNITY No. 602-2018