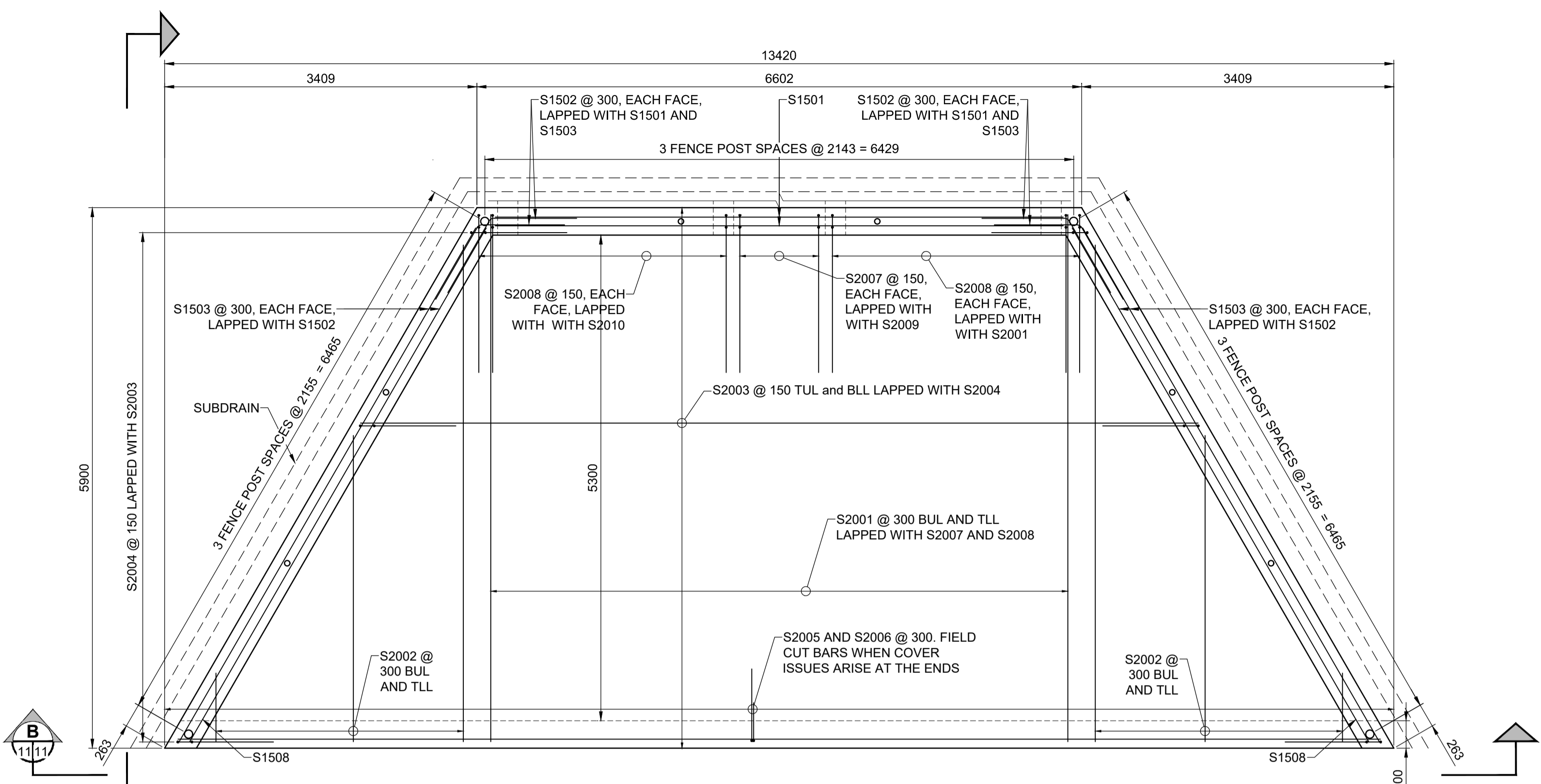
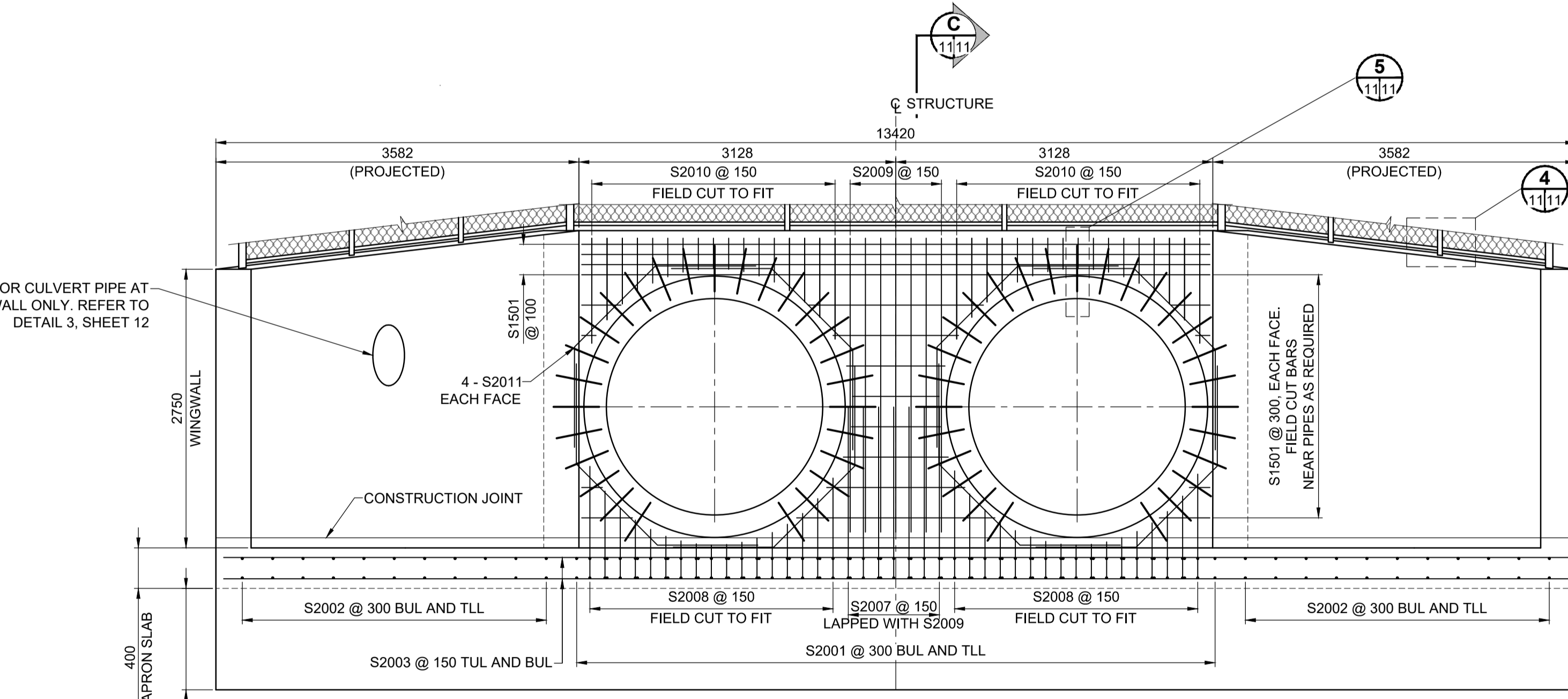


ISO A1 - 594mm x 841mm
 M:\Proj\5160966\09_Drawing\05_Design\06_Sheets\Detailed Design\5160966-HEADWALL DETL-11&12.dwg
 Last Saved: 8/17/2017 7:11 PM by mshabbir
 Plotted: 9/13/2017 5:04 PM by Mufaddal Shabbir



1 **DETAIL - HEADWALL PLAN**
 SCALE: 1:40

NOTE:
 1. HORIZONTAL CUT-OFF WALL REINFORCEMENT NOT SHOWN FOR CLARITY.
 2. FOR FENCE POST CONNECTION TO HEADWALL, REFER TO DETAIL 4, PAGE 11.



B **TYPICAL HEADWALL ELEVATION**
 SCALE: 1:40

NOTES:
 1. HEADWALL GEOMETRY FOR SOUTH HEADWALL SHOWN. NORTH HEADWALL SIMILAR.
 2. CUT-OFF WALL AND WINGWALL REINFORCEMENT NOT SHOWN FOR CLARITY.

HEADWALL NOTES:
 1. REFER TO SHEET 02 FOR CONCRETE CLEAR COVER REQUIREMENTS.



METRIC
 WHOLE NUMBERS INDICATE MILLIMETRES
 DECIMALIZED NUMBERS INDICATE METRES

LOCATION APPROVED UNDERGROUND STRUCTURES	
SUPR. U/G STRUCTURES COMMITTEE	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
0	ISSUED FOR TENDER	17/09/15	DAN

MORRISON HERSHFIELD	
DESIGNED BY: AGG	CHECKED BY: DAN
DRAWN BY: AGG	APPROVED BY: SAL
HOR SCALE: AS SHOWN	RELEASED FOR CONSTRUCTION
VERT SCALE: AS SHOWN	DATE



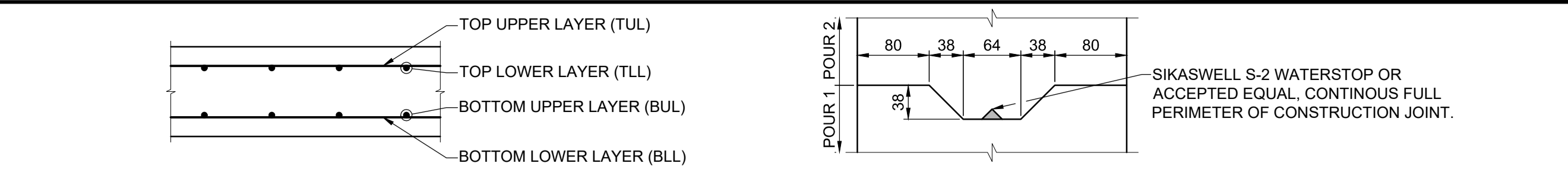
THE CITY OF WINNIPEG
 PUBLIC WORKS DEPARTMENT
 ENGINEERING DIVISION

**RUE DES TRAPPISTES AT WESTENDORF
 COULEE CULVERT REPLACEMENT AND
 ROAD RECONSTRUCTION**

**HEADWALL DETAILS AND
 REINFORCEMENT I**

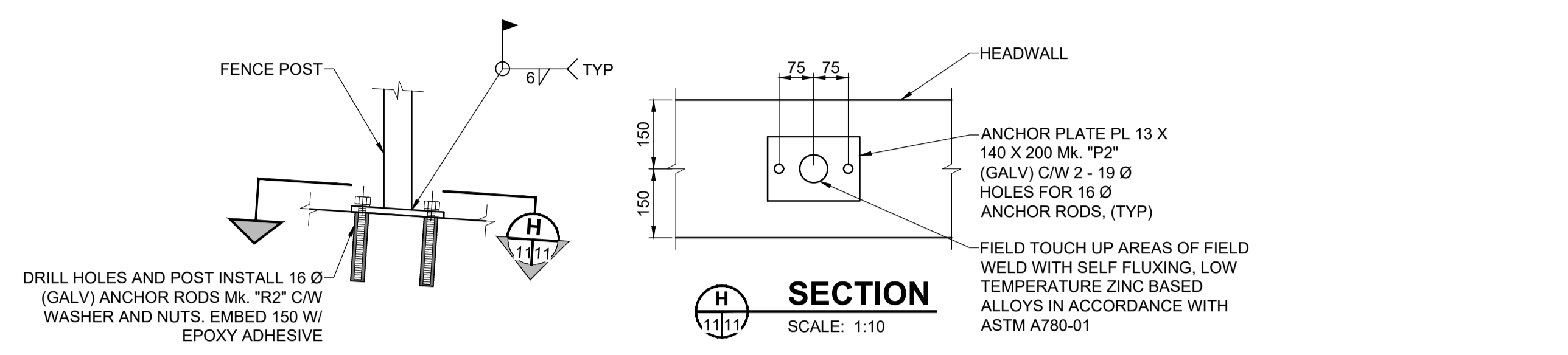
CITY DRAWING NUMBER C372-17-11	SHEET OF 11 OF 22
DRAWING No.	REV
11	0

BID OPPORTUNITY No. 698-2017



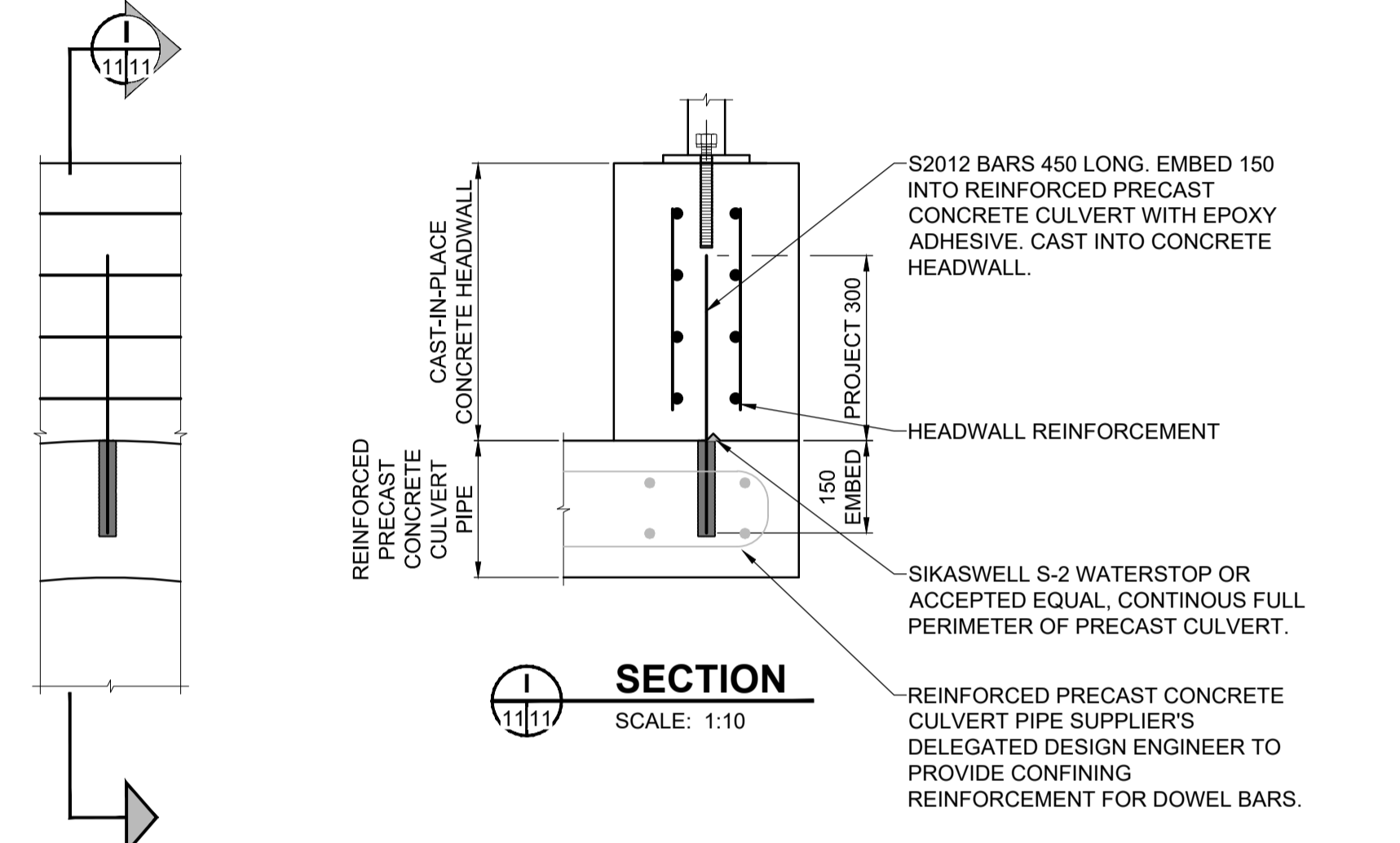
SLAB REBAR LAYER TERMINOLOGY

2 **DETAIL - CONSTRUCTION JOINT**
 SCALE: 1:5

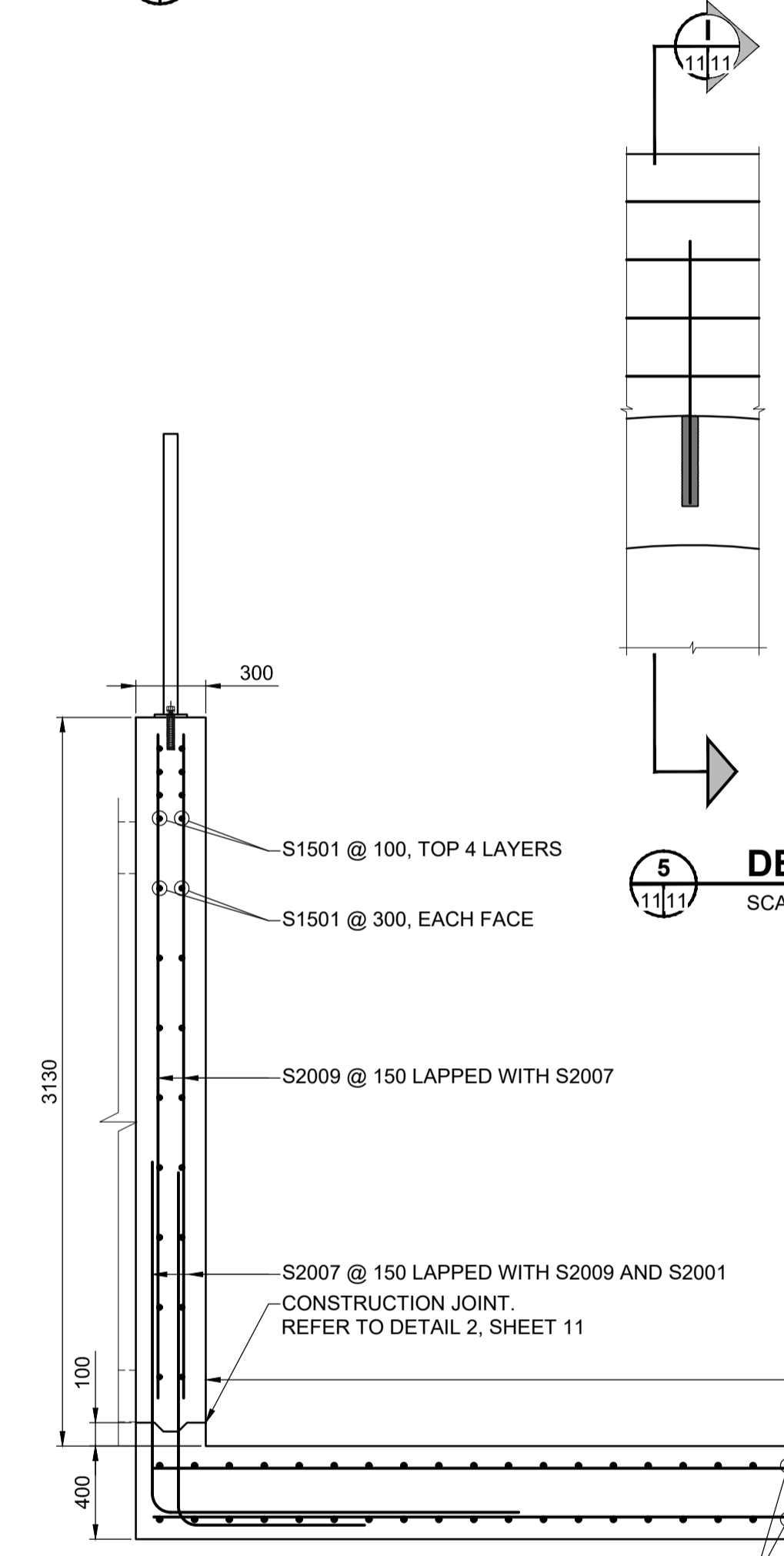


4 **DETAIL - FENCE POST TO WINGWALL/HEADWALL CONNECTION**
 SCALE: 1:10

H **SECTION**
 SCALE: 1:10



5 **DETAIL - CULVERT PIPE TO HEADWALL CONNECTION**
 SCALE: 1:10



C **SECTION**
 SCALE: 1:25

BID OPPORTUNITY No. 698-2017