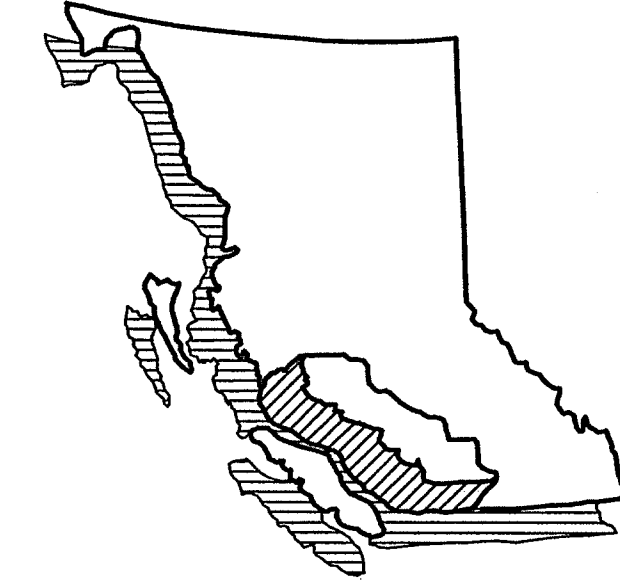


City of Abbotsford

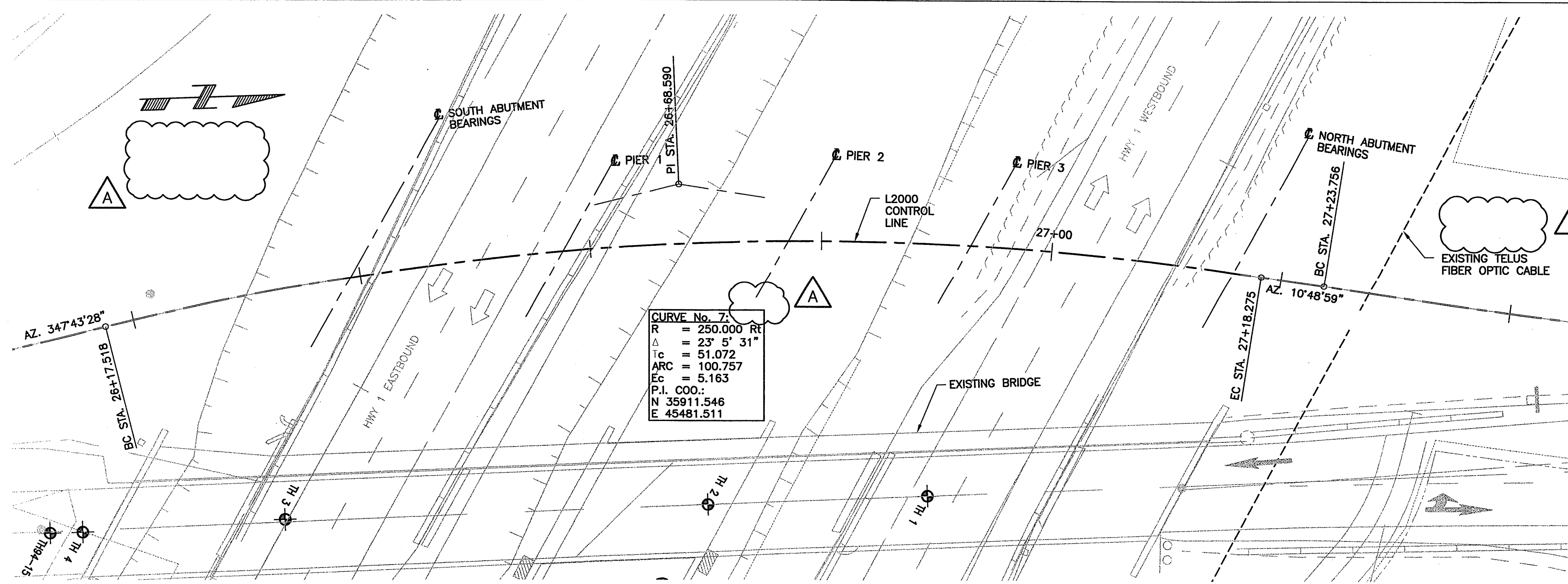


MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

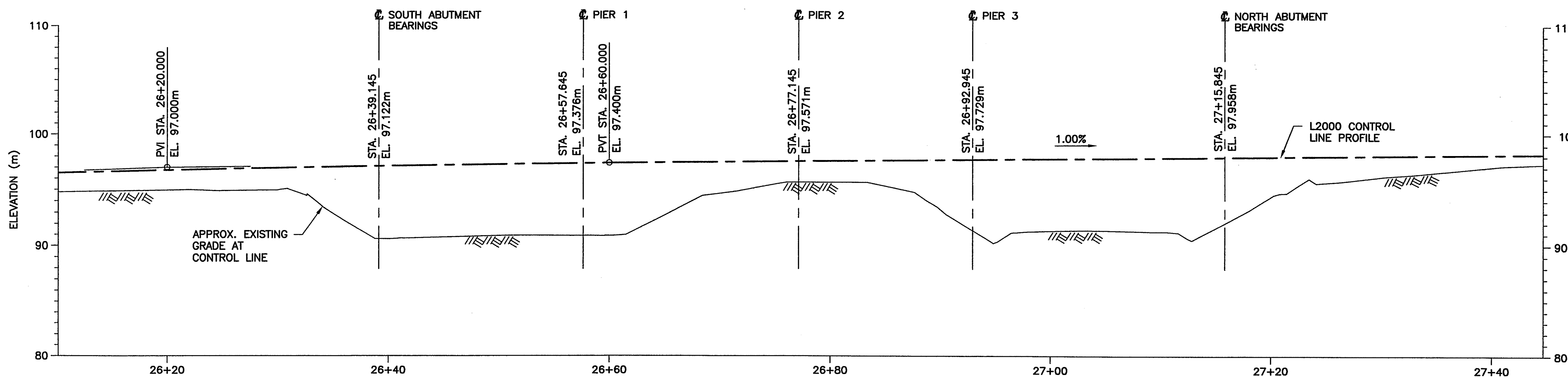


CONTRACT NO. 04-29

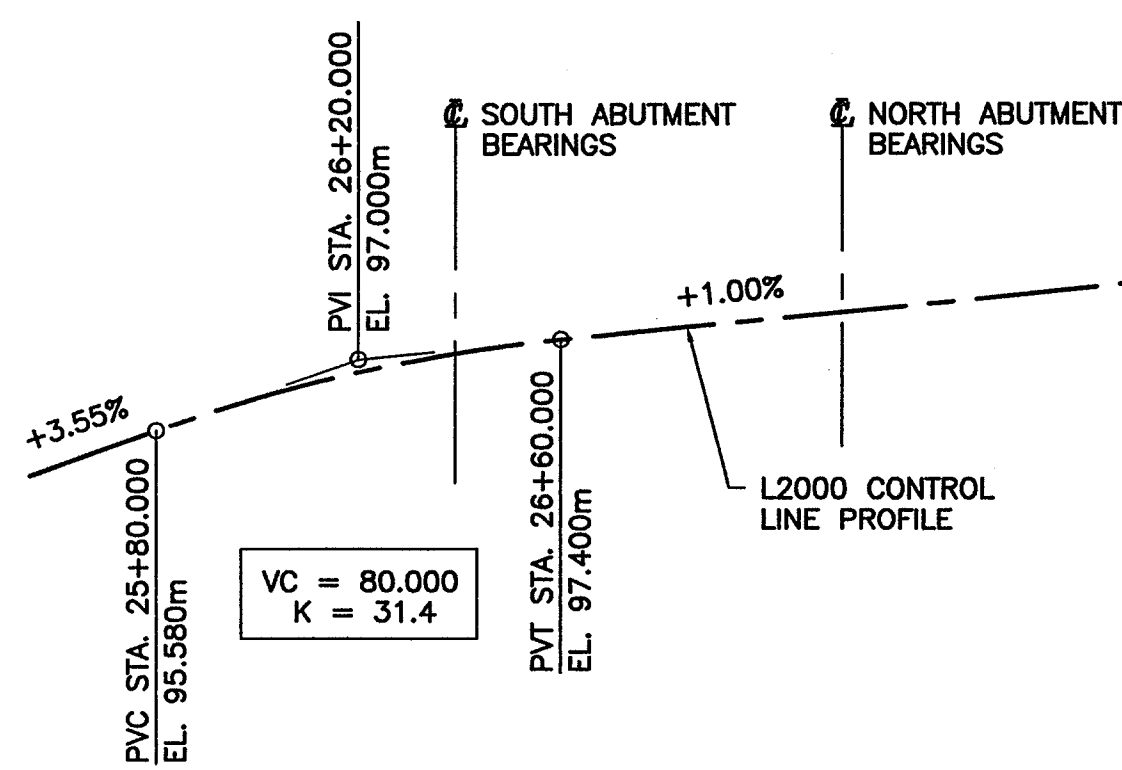
MT. LEHMAN UNDERPASS
BRIDGE No. 1562



PLAN
1:250



PROFILE ALONG L2000 CONTROL LINE
1:250



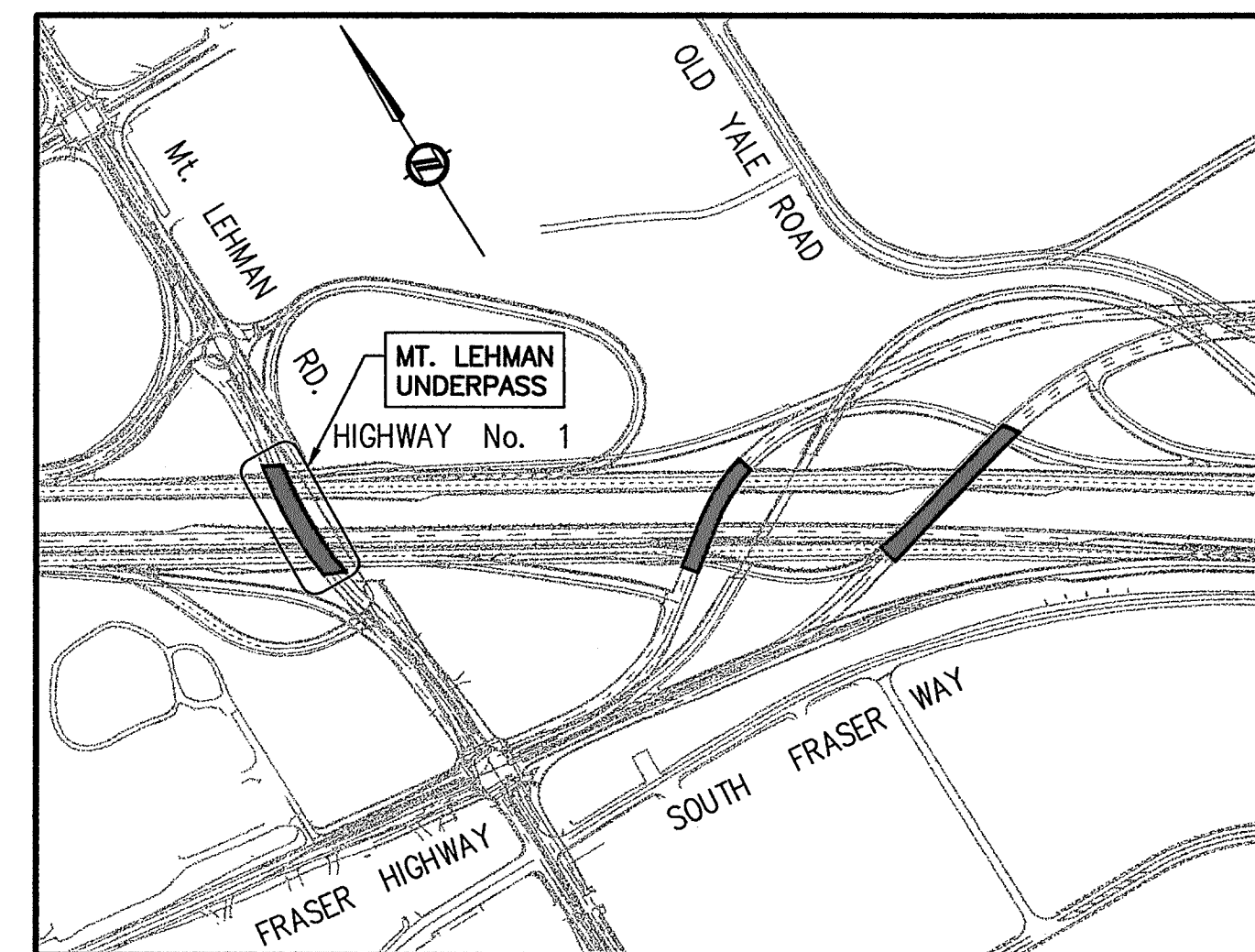
L2000 VERTICAL ALIGNMENT
NTS

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-102.
- SURVEY BY: BC MINISTRY OF HIGHWAYS
- DATUM: GEODETIC.
- ALL STATIONS AND ELEVATIONS IN METRES.

LEGEND:

- TH TESTHOLE
SEE MOT TESTHOLE LOGS (REF: FACTUAL GEOTECHNICAL REPORT, SEPT. 5, 2000, APPENDIX C)
- TP TEST PIT
SEE TEST PIT LOGS BY TROW ASSOCIATES INK.



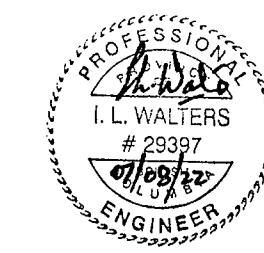
KEY PLAN
N.T.S.

DRAWING LIST:

DRAWING No.	TITLE
1562-101A	SITE PLAN
1562-102A	GENERAL ARRANGEMENT
1562-103A	FOUNDATION LAYOUT
1562-104A	FOUNDATION REINFORCEMENT
1562-105A	SOUTH ABUTMENT
1562-106A	NORTH ABUTMENT
1562-107A	ABUTMENT - REINFORCEMENT
1562-108A	PIERS
1562-109A	PIER REINFORCEMENT
1562-110A	PRECAST STRINGER LAYOUT
1562-111A	CONCRETE BOX STRINGERS MK1
1562-112A	CONCRETE BOX STRINGERS MK2
1562-113A	CONCRETE BOX STRINGERS MK3
1562-114A	CONCRETE BOX STRINGERS MK4
1562-115A	DECK
1562-116A	DECK REINFORCEMENT
1562-117B	MSE WALLS

REFERENCE DRAWINGS:

DRAWING No.	REV.	TITLE
2784-1	Q	STANDARD BRIDGE PARAPET - 810mm HIGH
SP941-03.04.01, 02		STANDARD BRIDGE PARAPET - 810mm HIGH TRANSITION
2785-2	B	STANDARD BRIDGE PARAPET STEEL RAILING (1995)
2891-1	L	STANDARD STEEL SIDEWALK FENCE
SP741-07.01		SIDEWALK FENCE - WELDED OR SLIP-ON
SP941-02.01.05-07		PRECAST CONCRETE PIER BARRIER - 810mm CPB



Rev	Date	Description	Initial	SCALE	ISSUE RECORD
J				DESIGNED: GAN DATE: 04/09/30	
I				CHECKED: ILW DATE: 04/09/30	
H				DRAWN: CTL DATE: 04/09/30	
G				AS SHOWN	
F					
E					
D				04/12/14	ISSUED FOR CONSTRUCTION ILW
C				04/11/03	ISSUED FOR TENDER ILW
B				04/09/30	100% ISSUE FOR REVIEW ILW
A				04/08/26	90% ISSUE FOR REVIEW ILW
A	07/08/22	RECORD DRAWINGS	ILW	04/06/22	50% ISSUE FOR REVIEW ILW
				Date	ISSUE RECORD Initial

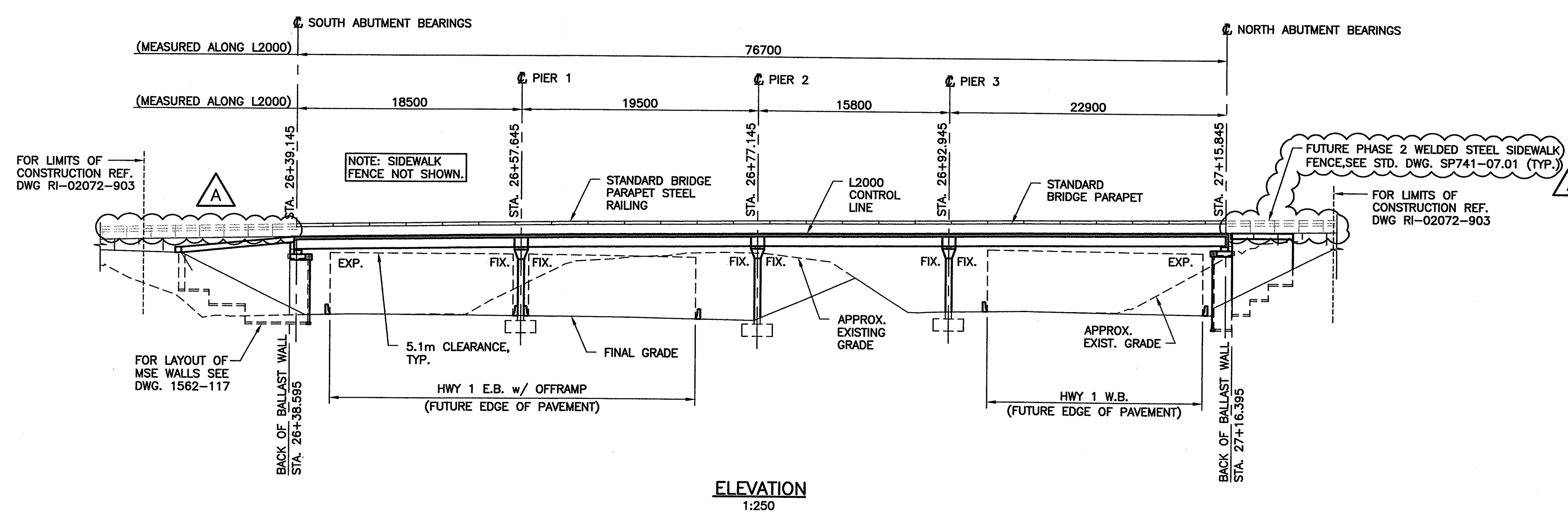
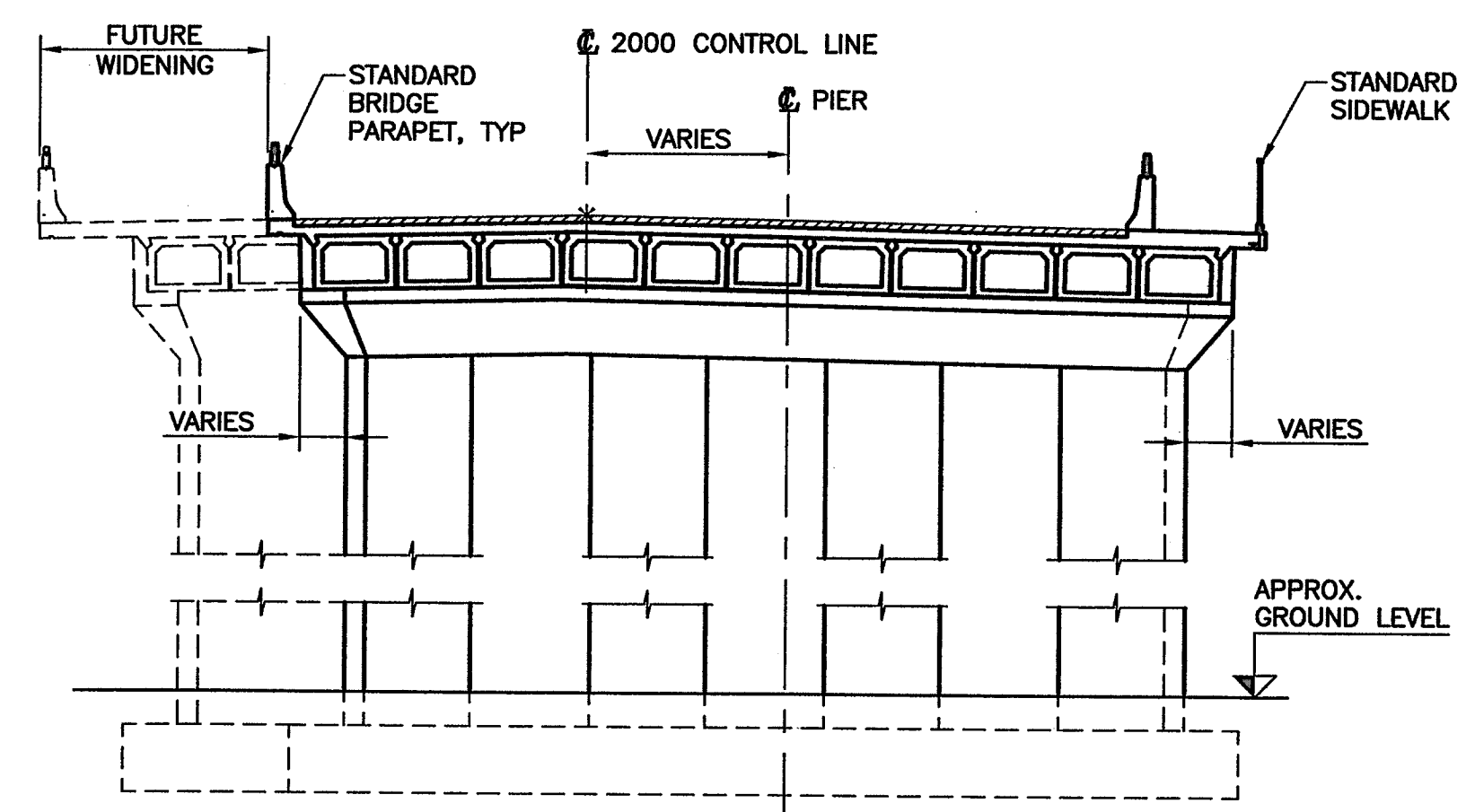
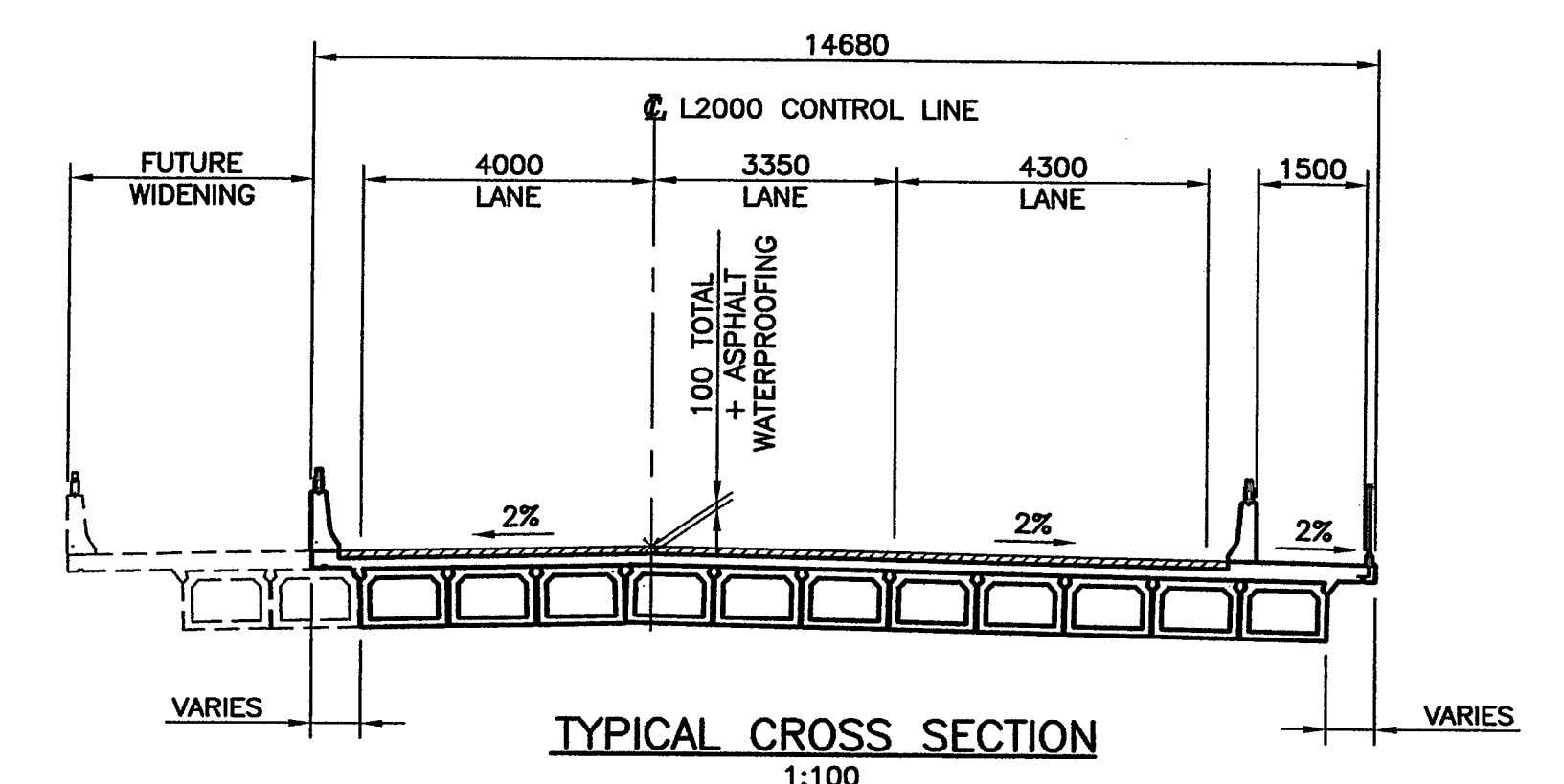
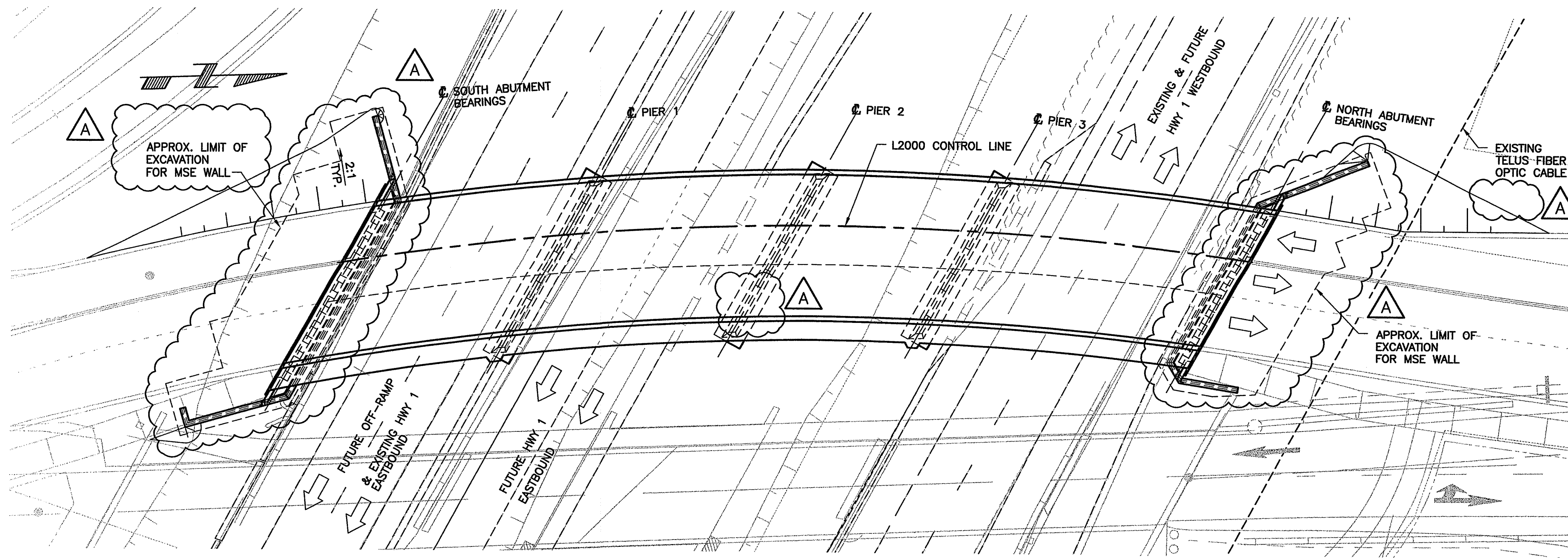
City of Abbotsford

MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

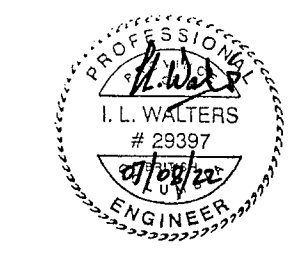
1562 MT. LEHMAN UNDERPASS
SITE PLAN

601896

FILE No. 1
DRAWING No. 1562-101
1



- GENERAL NOTES:**
- DESIGN SPECIFICATION: CSA STANDARD CAN/CSA-S6-00.
 - SEISMIC DESIGN SPECIFICATIONS: BRIDGE: CSA STANDARD CAN/CSA-S6-00 MSE WALLS: PER AASHTO STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES, 16th ED., 1996.
 - DESIGN LOADS:
 - (a) LIVE LOAD: CS-625
 - (b) WIND LOAD:
 - 10 YEAR RETURN: 0.415 kPa
 - 30 YEAR RETURN: 0.550 kPa
 - 100 YEAR RETURN: 0.710 kPa
 - (c) SEISMIC:
 - ACCELERATION COEFFICIENT A: 0.20 (10% PROBABILITY OF EXCEEDANCE IN 50 YEARS)
 - SOIL AMPLIFICATION A: 1.2
 - SEISMIC PERFORMANCE CATEGORY D
 - CLIMATIC:
 - (a) MAXIMUM DAILY MEAN TEMPERATURE: +28° C
 - (b) MINIMUM DAILY MEAN TEMPERATURE: -14° C
 - (c) DESIGN RAINFALL: 10mm IN 15 MINUTES
 - DIMENSIONS AND ELEVATIONS SHOWN ON DRAWINGS ARE FOR A REFERENCE TEMPERATURE OF 15° C.



Rev	Date	Description	Initial	SCALE	
J				DESIGNED: CAN DATE: 04/09/30	
I				AS SHOWN CHECKED: ILW DATE: 04/09/30	
H				DRAWN: CTL DATE: 04/09/30	
G					
F					
E					
D					
C					
B					
A	07/08/22	RECORD DRAWINGS	ILW	04/06/22 50% ISSUE FOR REVIEW	
REVISIONS				Date	ISSUE RECORD

City of Abbotsford

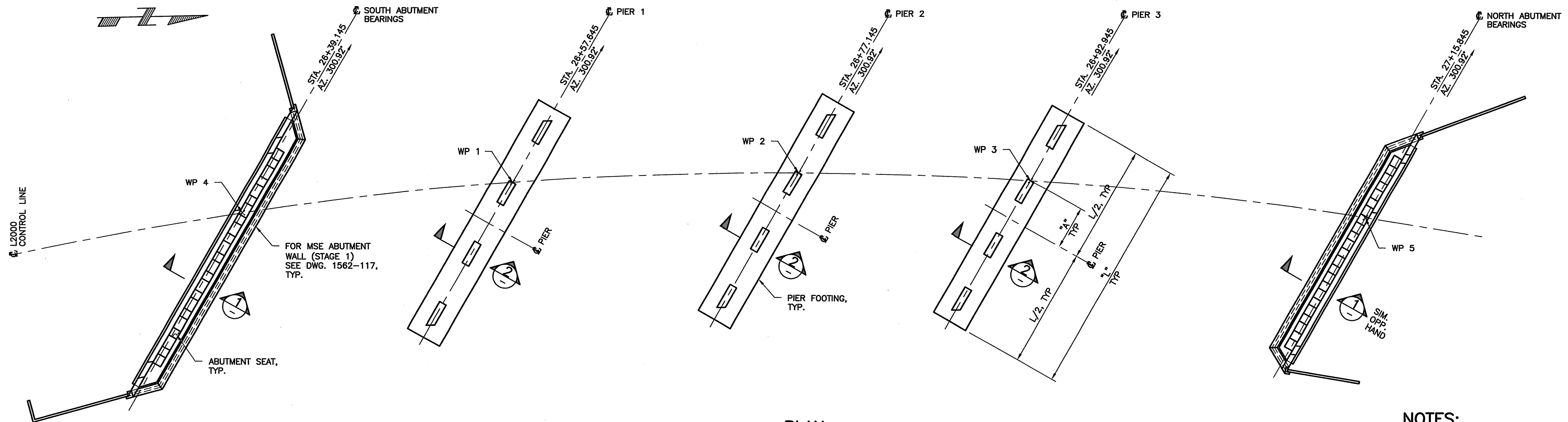
MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

1562 MT. LEHMAN UNDERPASS
GENERAL ARRANGEMENT

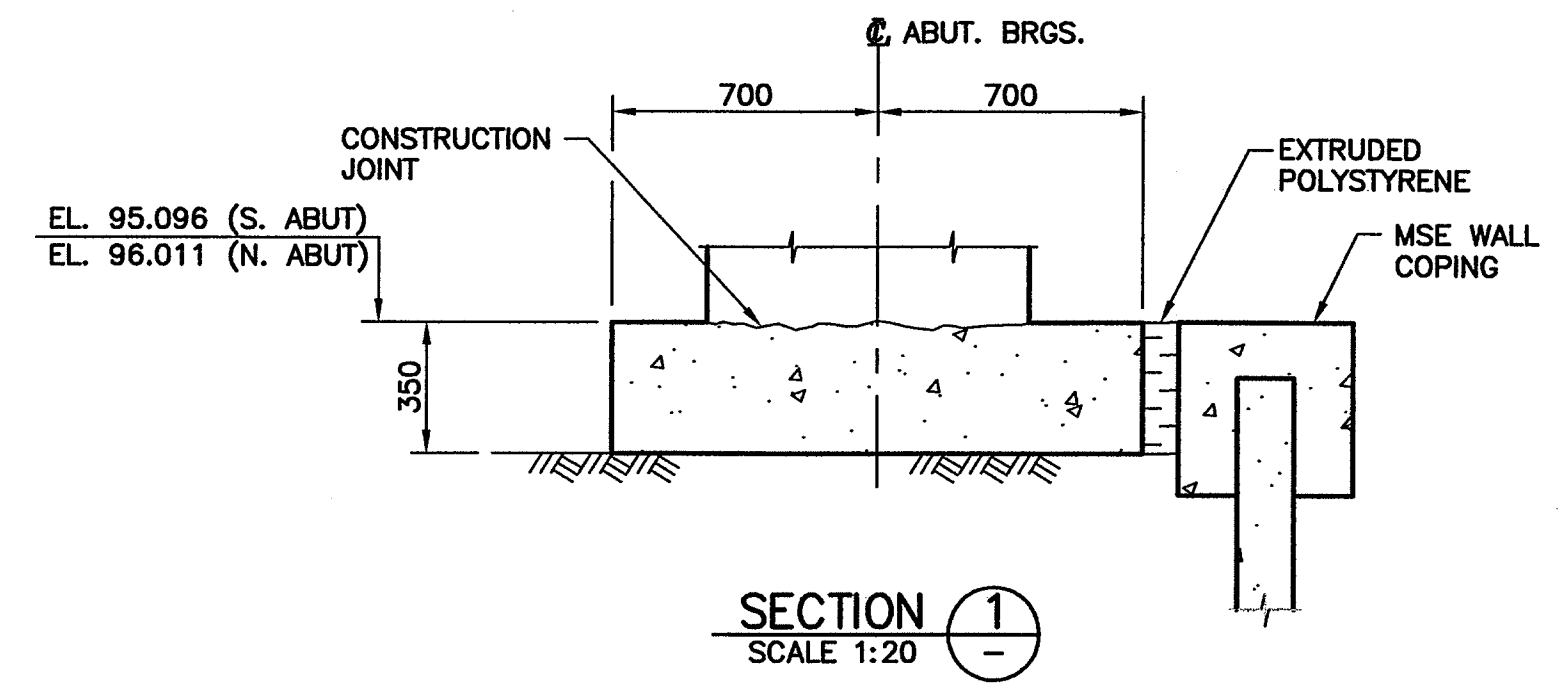
601897

FILE No. REGION 1 DRAWING No. 1562-102

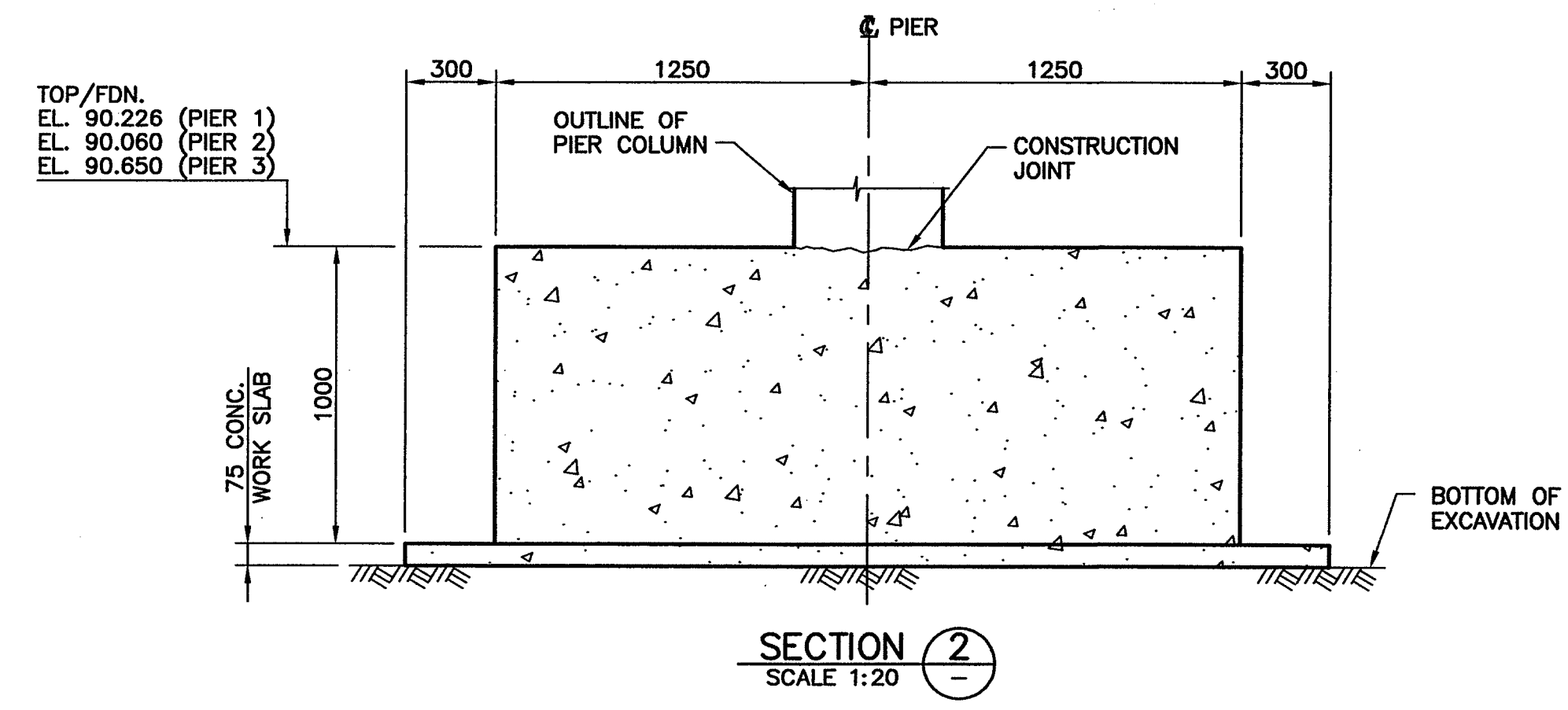
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Plotfile: August 22, 2007 13:41:16



PLAN
1:150



SECTION 1
SCALE 1:20



SECTION 2
SCALE 1:20

PIER	"A"	"L"
1	3266	18000
2	3092	17100
3	2979	16300

WP	STATION	COORDINATES	
		NORTHING	EASTING
1	26+57.645	35901.366	45487.014
2	26+77.145	35920.859	45486.727
3	26+92.945	35936.632	45487.609
4	26+39.145	35882.947	45488.690
5	27+15.845	35959.321	45490.650

Is this different than chart on dwg. 215



NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-102.
- SUBSTRUCTURE NOTES:**
 - CONCRETE SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH AT 28 DAYS AS FOLLOWS:
SUBSTRUCTURE CONCRETE: 30 MPa
WORK SLAB: 20 MPa
 - ALL EXPOSED EDGES OF CONCRETE SHALL BE CHAMFERED 20mm UNLESS NOTED OTHERWISE.
 - FOOTINGS AND WORK SLABS SHALL BE AT DEPTH SHOWN OR TO LOWER ELEVATIONS AS MAY BE ORDERED BY THE OWNER'S REPRESENTATIVE.
 - ALL REINFORCING STEEL SHALL CONFORM TO CAN/CSA G30.18-M GRADE 400R. MAXIMUM YIELD STRENGTH 525 MPa.
 - CLEAR COVER TO REINFORCING STEEL:
CAST AGAINST SOIL: 100mm
ELSEWHERE: 70mm
 - BARS DENOTED "ME" SHALL BE EPOXY COATED.
 - ALL LAPS OF REINFORCING BARS FOR SPLICES SHALL BE AS FOLLOWS UNLESS NOTED OTHERWISE:

BAR SIZE	UNCOATED	EPOXY COATED (B*)	EPOXY COATED (T**)
10M	400	500	600
15M	500	700	850
20M	700	800	1050
25M	1100	1300	1700
30M	1300	1550	2000

(B*) DENOTES VERTICAL BARS WITH LESS THAN 300mm CONCRETE BELOW BARS
(T**) DENOTES HORIZONTAL BARS WITH MORE THAN 300mm OF CONCRETE BELOW BARS

Rev	Date	Description	Initial	SCALE	DESIGNED	DATE
J				AS SHOWN	GAN	04/09/30
I					ILW	04/09/30
H					CTL	04/09/30
G						
F						
E				04/12/14		ISSUED FOR CONSTRUCTION
D				04/11/03		ISSUED FOR TENDER
C				04/09/30		100% ISSUE FOR REVIEW
B				04/08/26		90% ISSUE FOR REVIEW
A	07/08/22	RECORD DRAWINGS	ILW	04/06/22		50% ISSUE FOR REVIEW
REVISIONS				Date	ISSUE RECORD	Initial

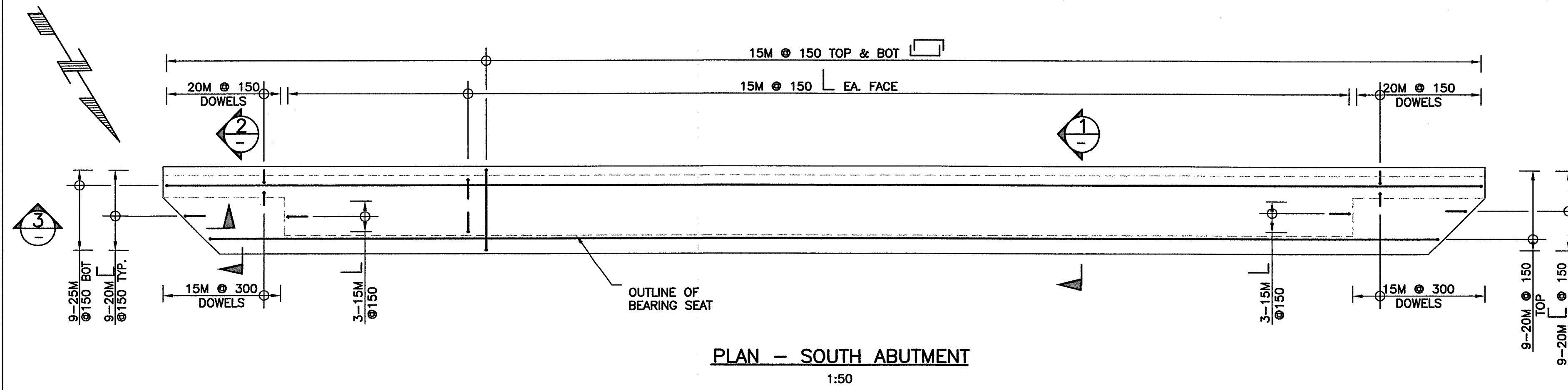
City of Abbotsford

MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

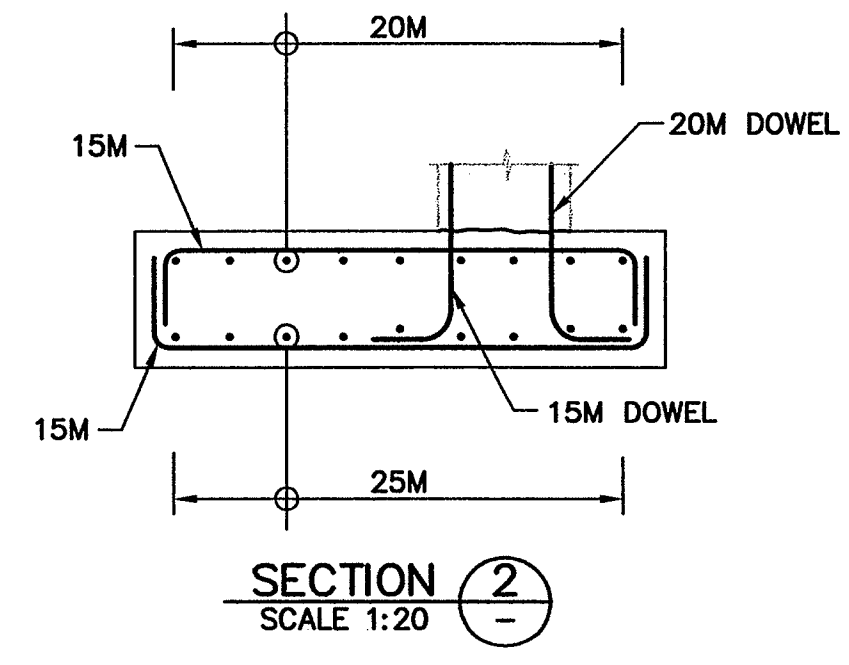
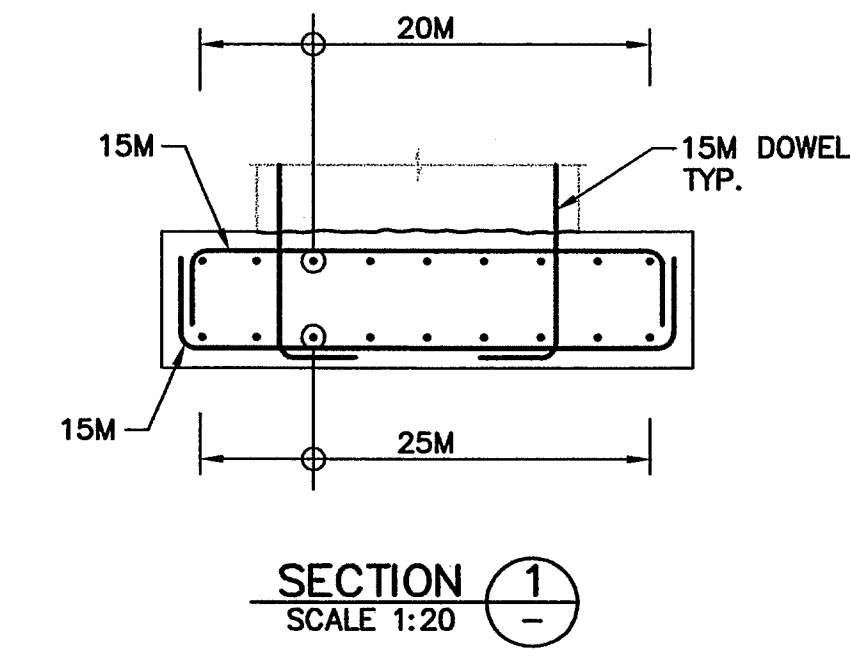
1562 MT. LEHMAN UNDERPASS
FOUNDATION LAYOUT

601898

FILE No. **1562-103** REGION **1** DRAWING No. **1562-103**

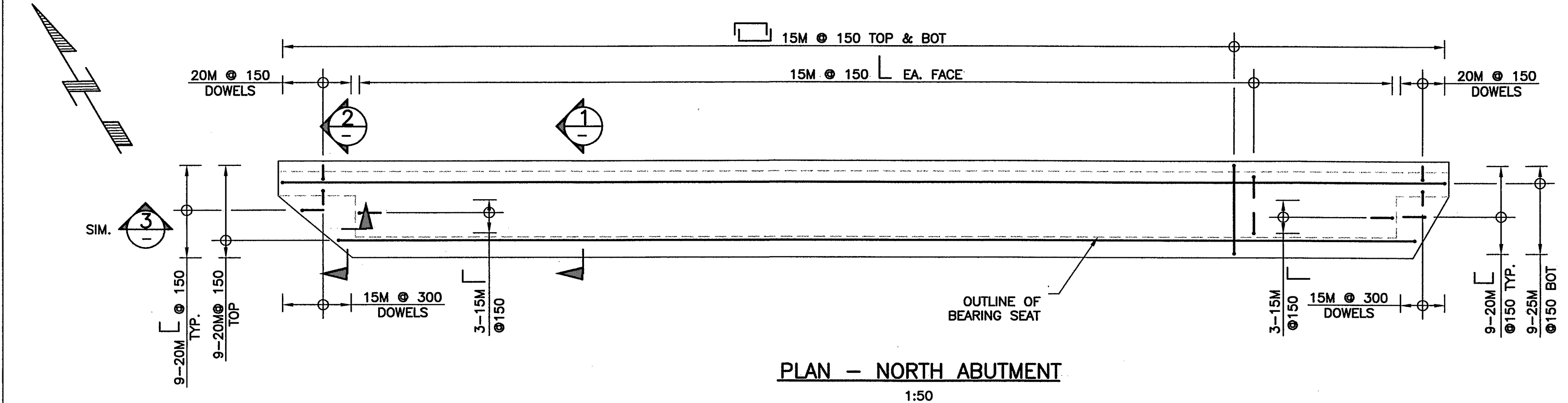


PLAN - SOUTH ABUTMENT
1:50

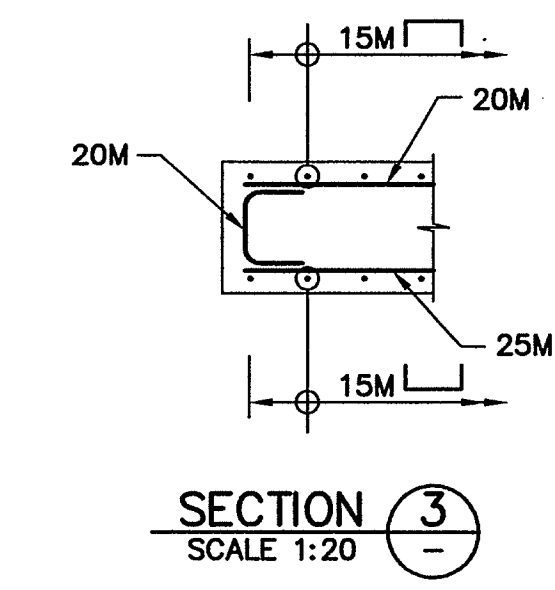


SECTION 1
SCALE 1:20

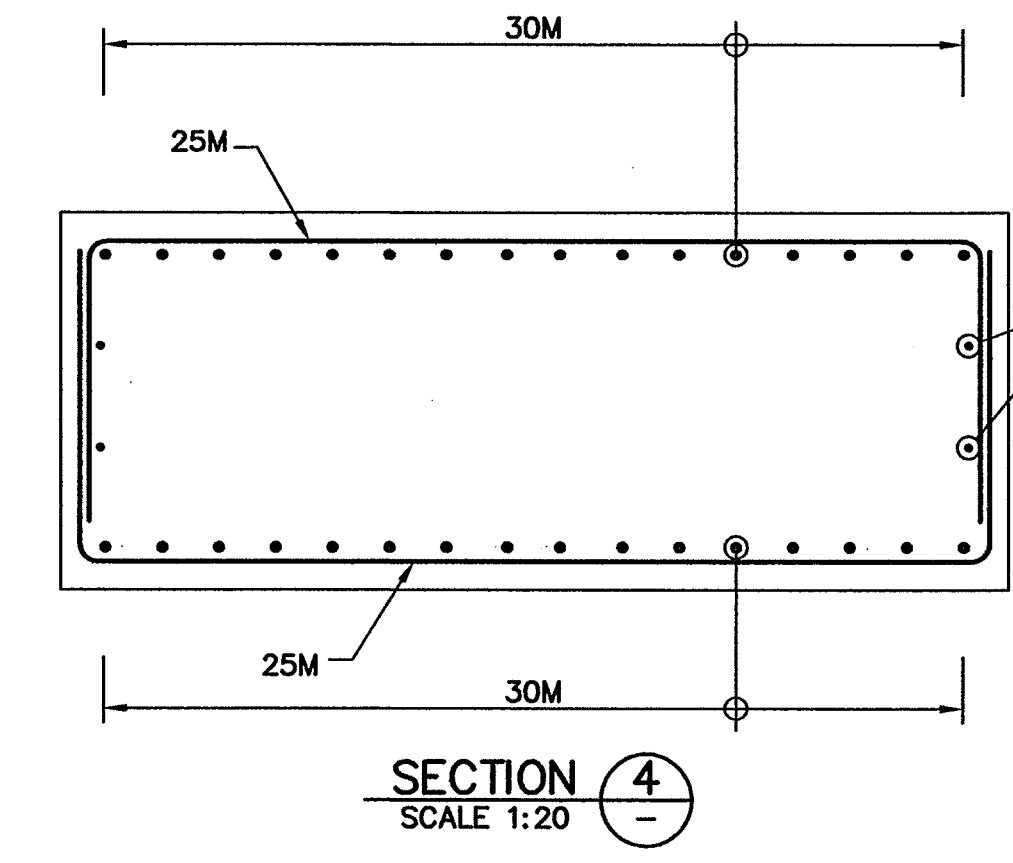
SECTION 2
SCALE 1:20



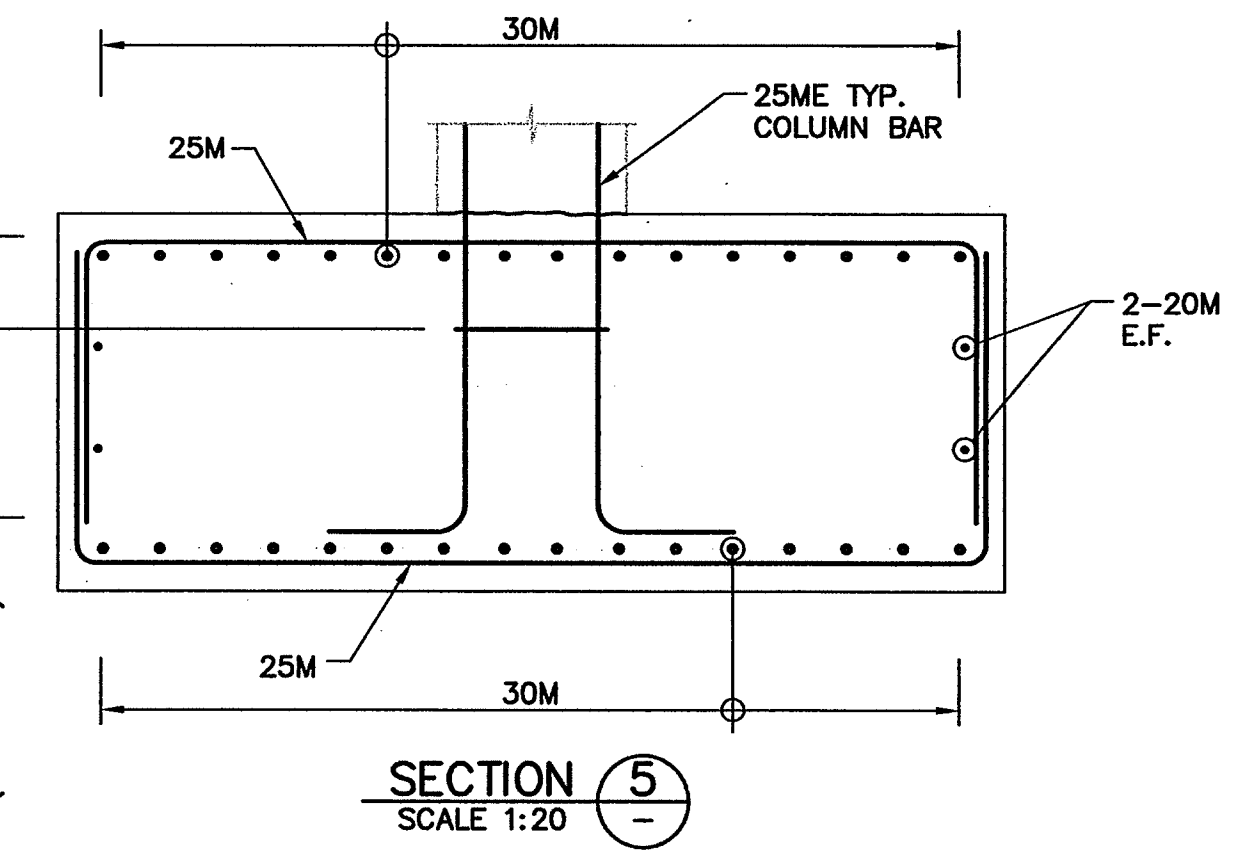
PLAN - NORTH ABUTMENT
1:50



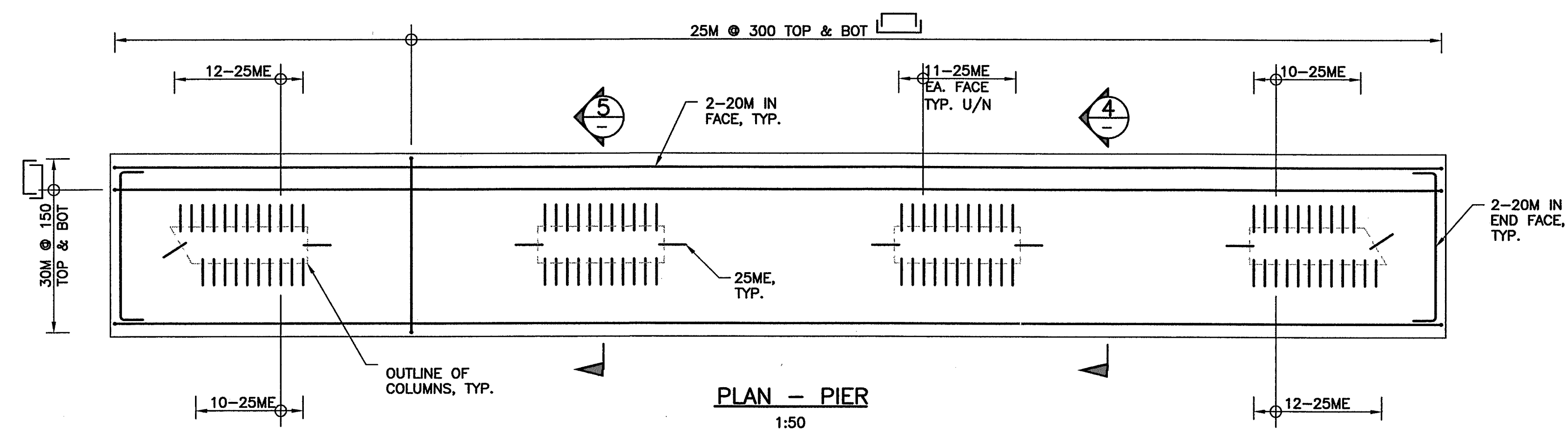
SECTION 3
SCALE 1:20



SECTION 4
SCALE 1:20



SECTION 5
SCALE 1:20



PLAN - PIER
1:50

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-102.
- SEE DRAWING 1562-103 FOR SUBSTRUCTURE NOTES.
- SEE DRAWING 1562-109 FOR COLUMN STIRRUP DETAILS.



File name: G:\1562\Drawings\1562-104.dwg ML Lehman Layout
Plotted: August 22, 2007 13:24:40

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C							
B							
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REVISIONS			Date	ISSUE RECORD	Initial		

City of Abbotsford

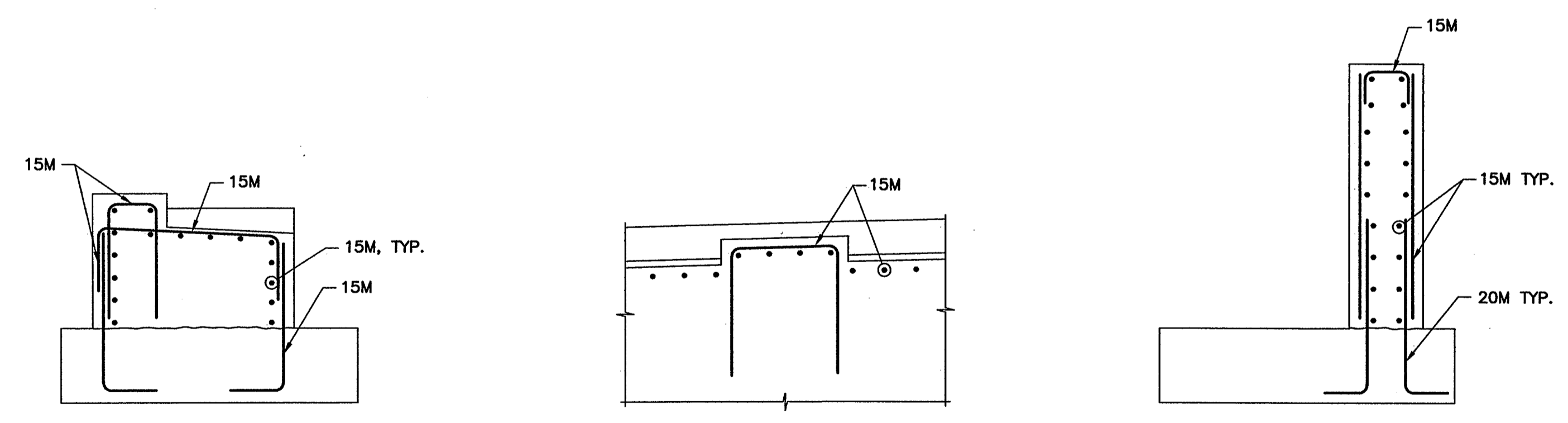
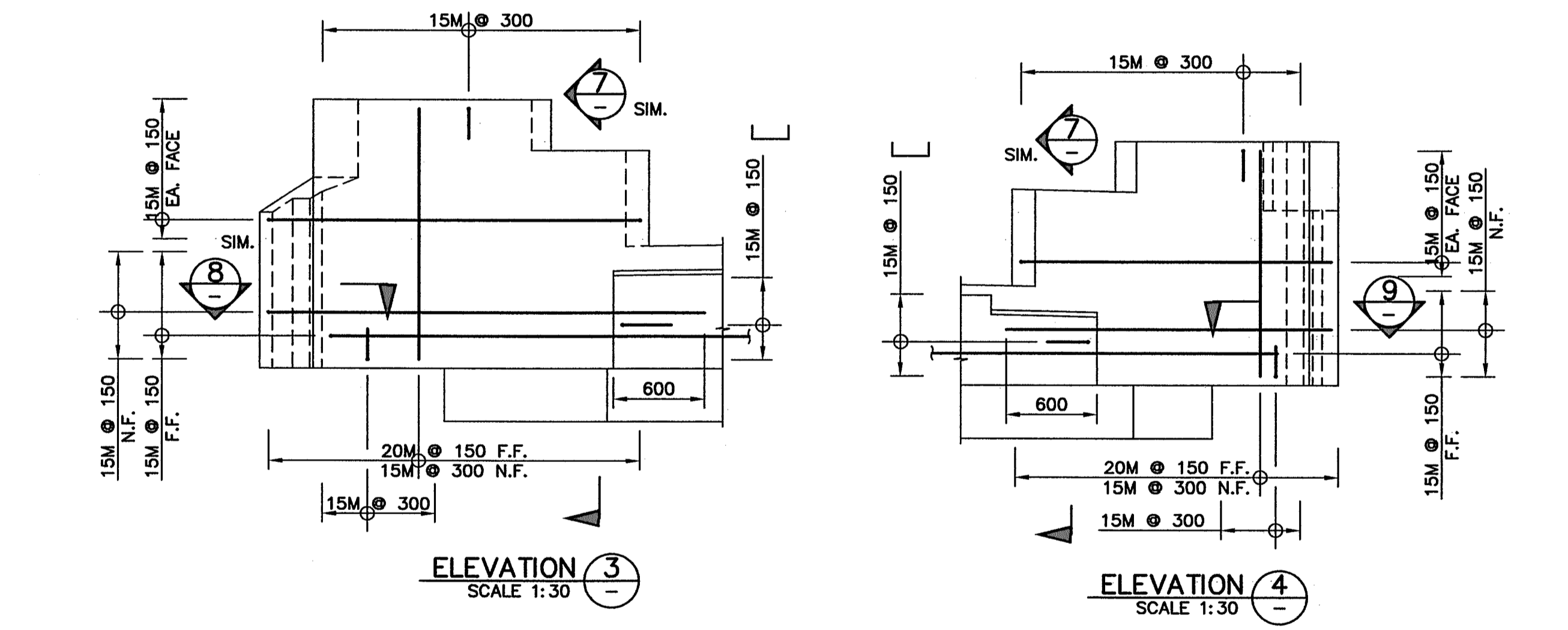
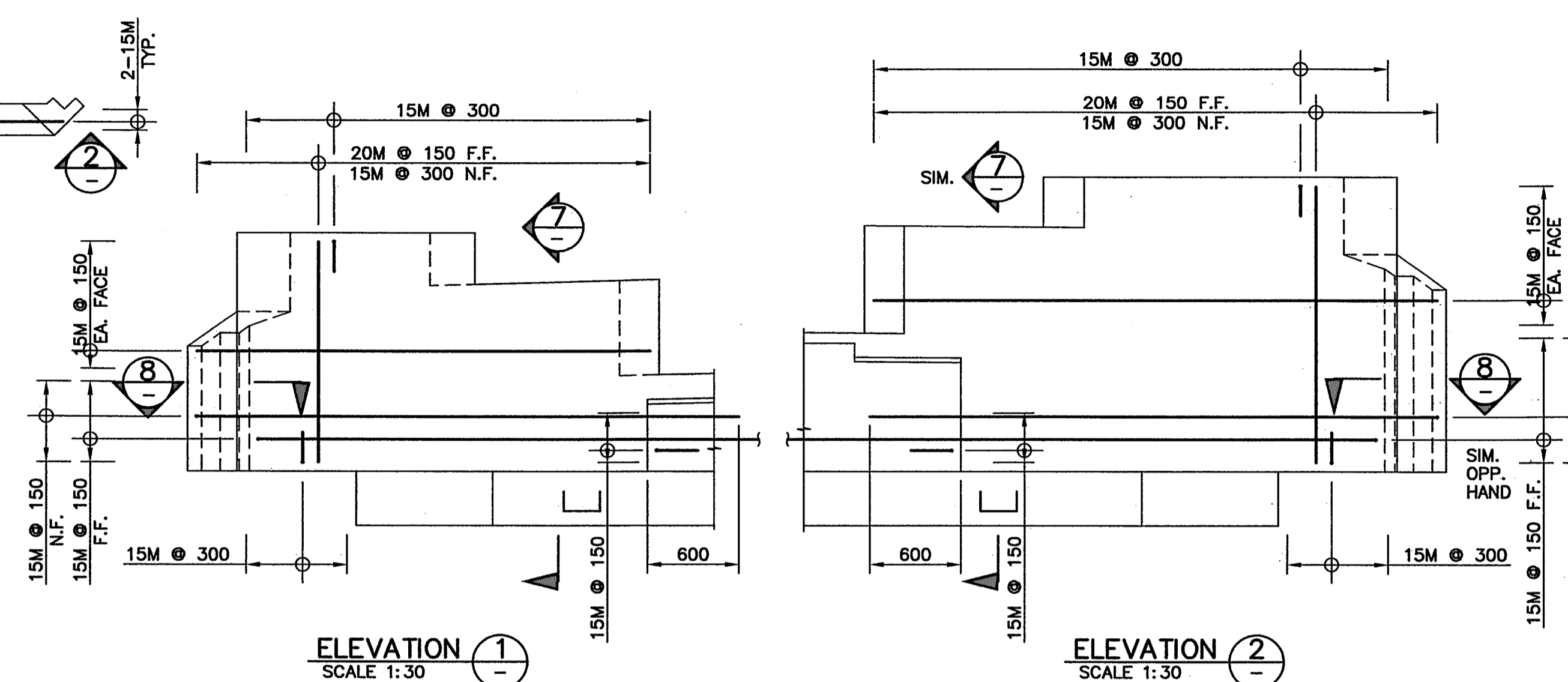
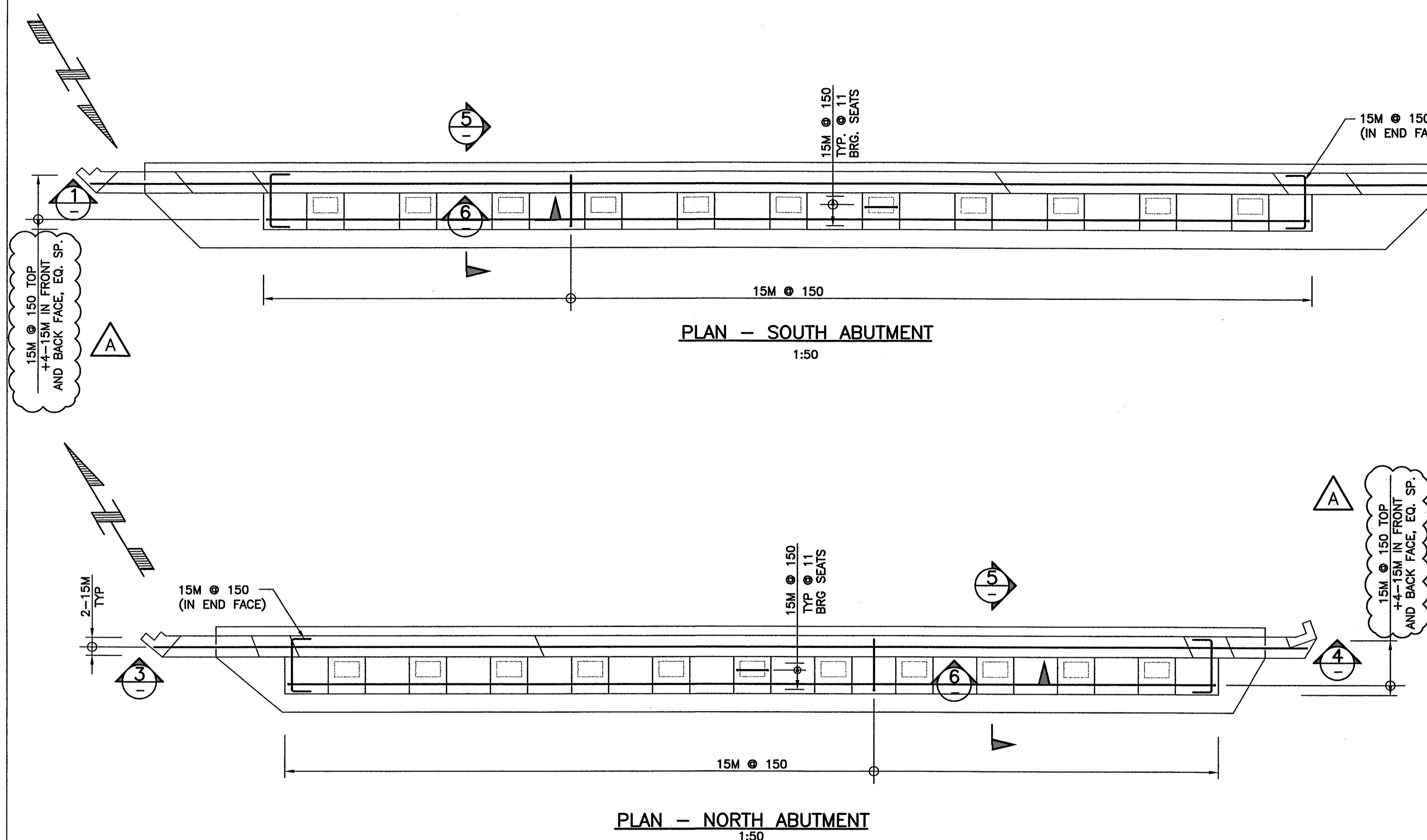
MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

1562 MT. LEHMAN UNDERPASS
FOUNDATION REINFORCEMENT

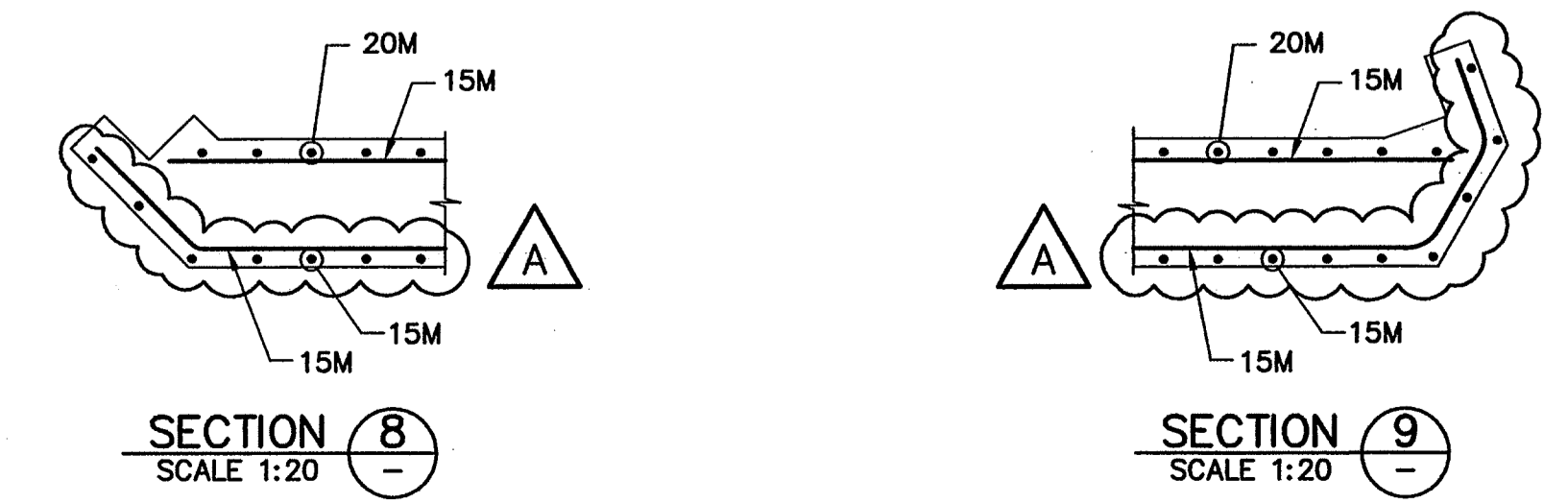
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FILE No. **DUCOLAND & TAYLOR** REGION **1** DRAWING No. **1562-104**

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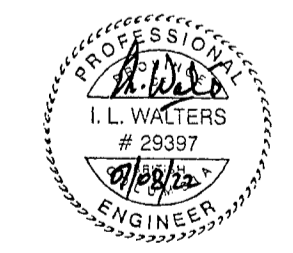


SECTION 5 SCALE 1:20
SECTION 6 SCALE 1:20
SECTION 7 SCALE 1:20



SECTION 8 SCALE 1:20
SECTION 9 SCALE 1:20

- NOTES:**
- FOR GENERAL NOTES SEE DRAWING 1562-102.
 - FOR SUBSTRUCTURE NOTES SEE DRAWING 1562-103.
 - FOR FOUNDATION REINFORCEMENT SEE DRAWING 1562-104.



Rev	Date	Description	Initial	SCALE	DESIGNED	DATE	CHECKED	DATE	DRAWN	DATE
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I										
H										
G										
F										
E										
D										
C										
B										
A	07/08/22	RECORD DRAWINGS	ILW							
REVISIONS				Date	ISSUE RECORD		Initial			

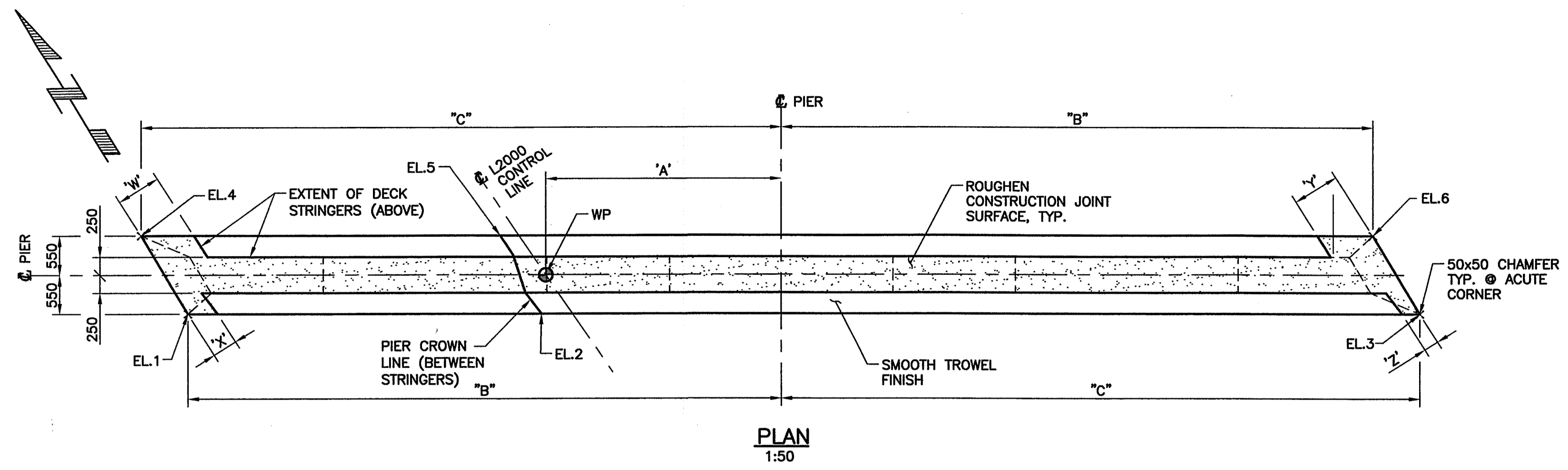
City of Abbotsford

MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

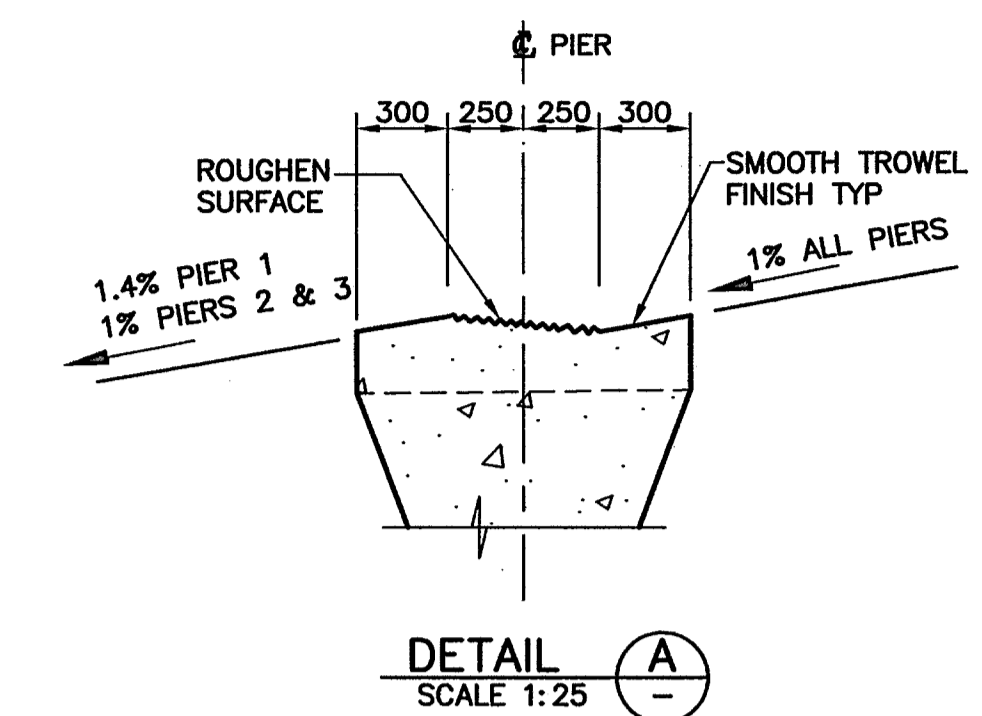
**1562 MT. LEHMAN UNDERPASS
ABUTMENT REINFORCEMENT**

601902

FILE No. **BUSBY & TYLER** REGION **1** DRAWING No. **1562-107**



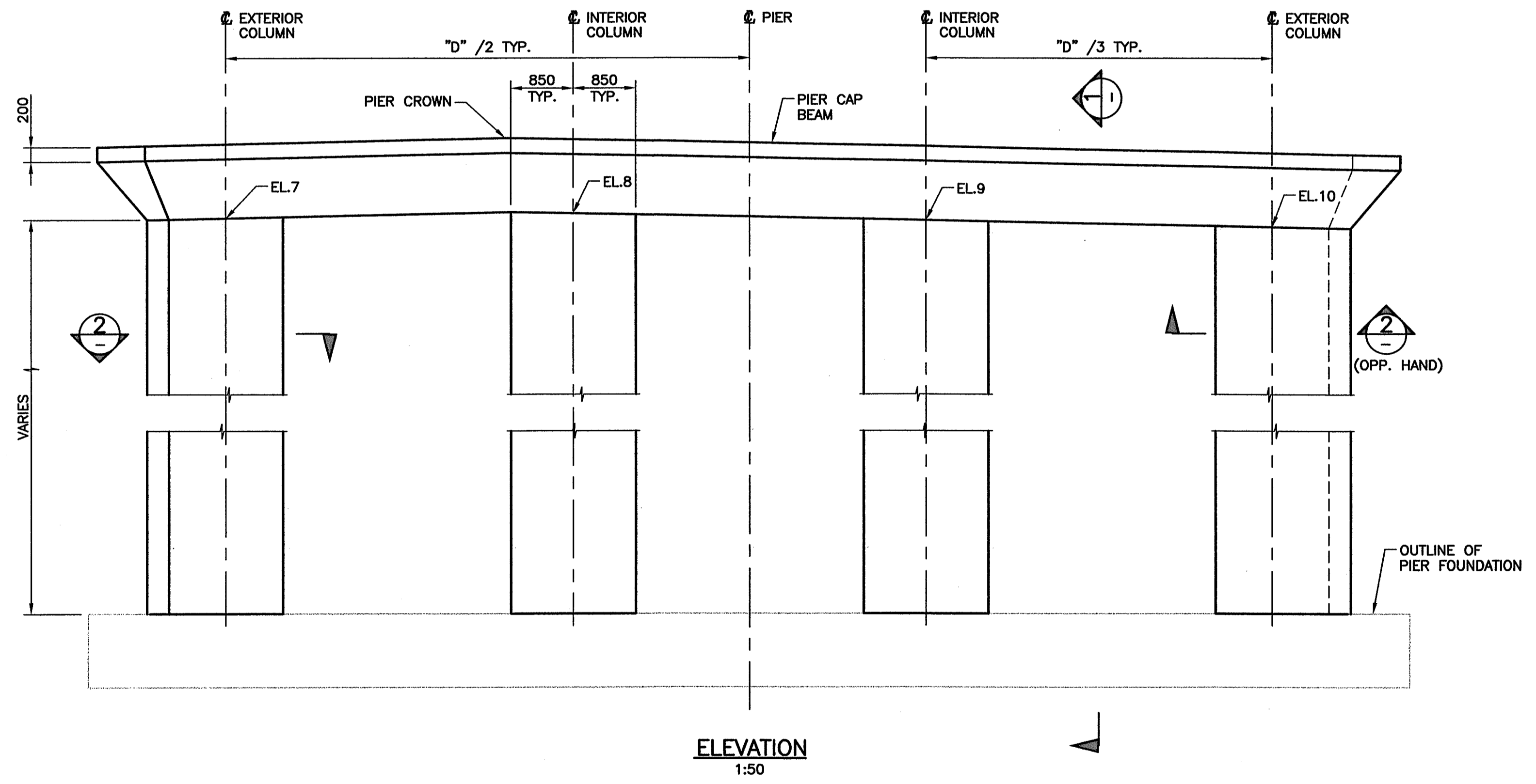
PLAN
1:50



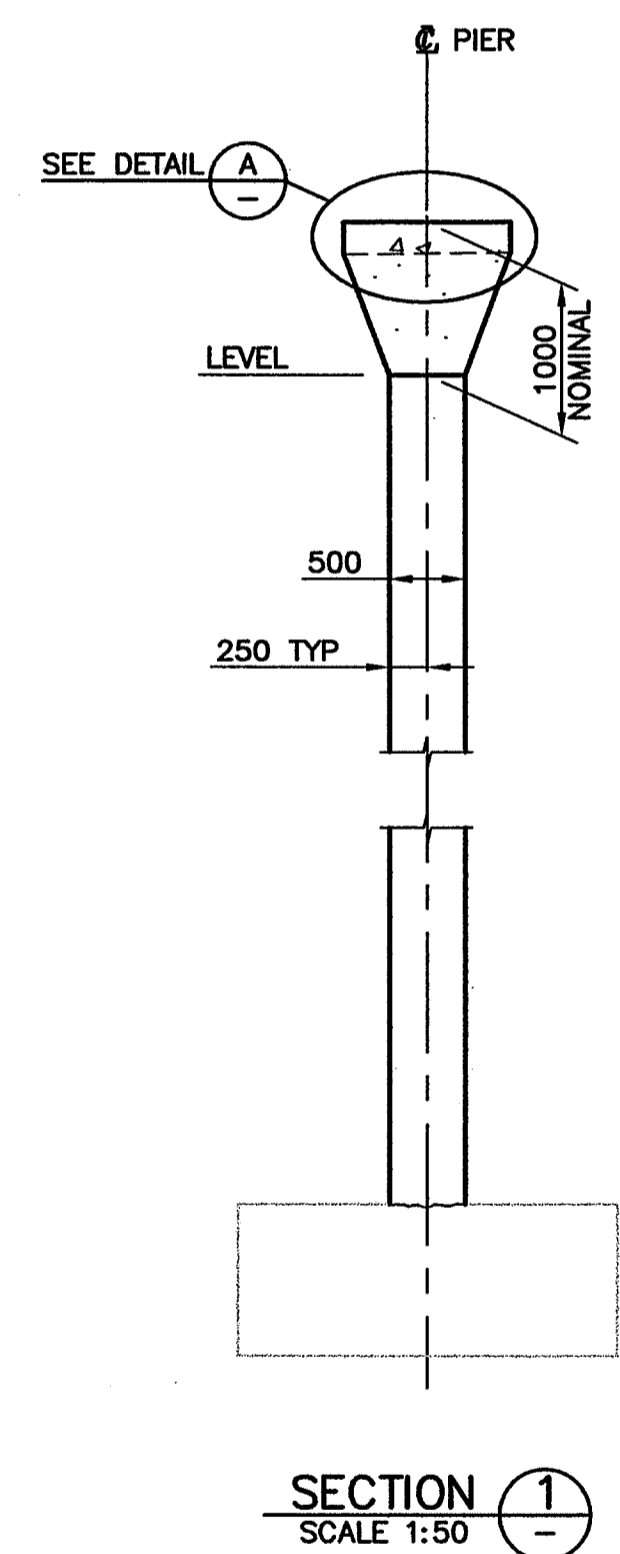
DETAIL A
SCALE 1:25

ELEVATIONS

PIER	NO.	ELEVATION (m)
1	1	96.206
	2	96.247
	3	95.940
	4	96.200
	5	96.258
	6	95.982
	7	95.216
	8	95.232
	9	95.113
	10	94.994
2	1	96.388
	2	96.443
	3	96.177
	4	96.391
	5	96.454
	6	96.198
	7	95.406
	8	95.429
	9	95.324
	10	95.219
3	1	96.544
	2	96.600
	3	96.347
	4	96.546
	5	96.613
	6	96.367
	7	95.562
	8	95.588
	9	95.488
	10	95.388



ELEVATION
1:50



SECTION 1
SCALE 1:50

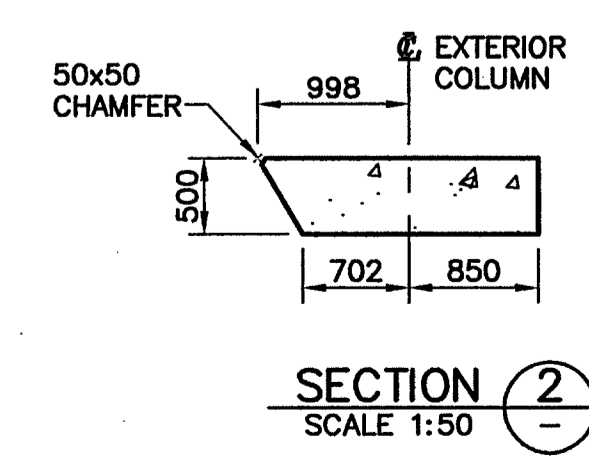
PIER GEOMETRY

PIER	"A"	"B"	"C"	"D"
1	3266	8225	8875	14400
2	3092	7785	8435	13520
3	2979	7450	8100	12850

PIER	"W"	"X"	"Y"	"Z"
1	631	355	668	210
2	572	289	518	252
3	570	229	424	283

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-102.
- SEE DRAWING 1562-103 FOR SUBSTRUCTURE NOTES.
- ELEVATIONS ARE BASED ON 75mm THICK TEMPORARY SUPPORTS FOR DECK STRINGERS.
- ELEVATIONS ON DRAWINGS DO NOT ACCOUNT FOR FOUNDATION SETTLEMENTS. ELEVATIONS TO BE ADJUSTED FOR SETTLEMENT PREDICTIONS RESULTING FROM CONSTRUCTION MONITORING.



SECTION 2
SCALE 1:50

NOTES:
AT PIER 3, 3 COATS OF SIKAGARD COLOR A50 WAS APPLIED TO COLUMNS UP TO 2 METERS ABOVE FINISHED GRADE.

Rev	Date	Description	Initial	SCALE	DESIGNED	DATE	CHECKED	DATE	DRAWN	DATE
J				AS SHOWN	GN	04/09/30	ILW	04/09/30	CTL	04/09/30
I										
H										
G										
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E										
D										
C										
B										
A	07/08/22	RECORD DRAWINGS	ILW							

City of Abbotsford

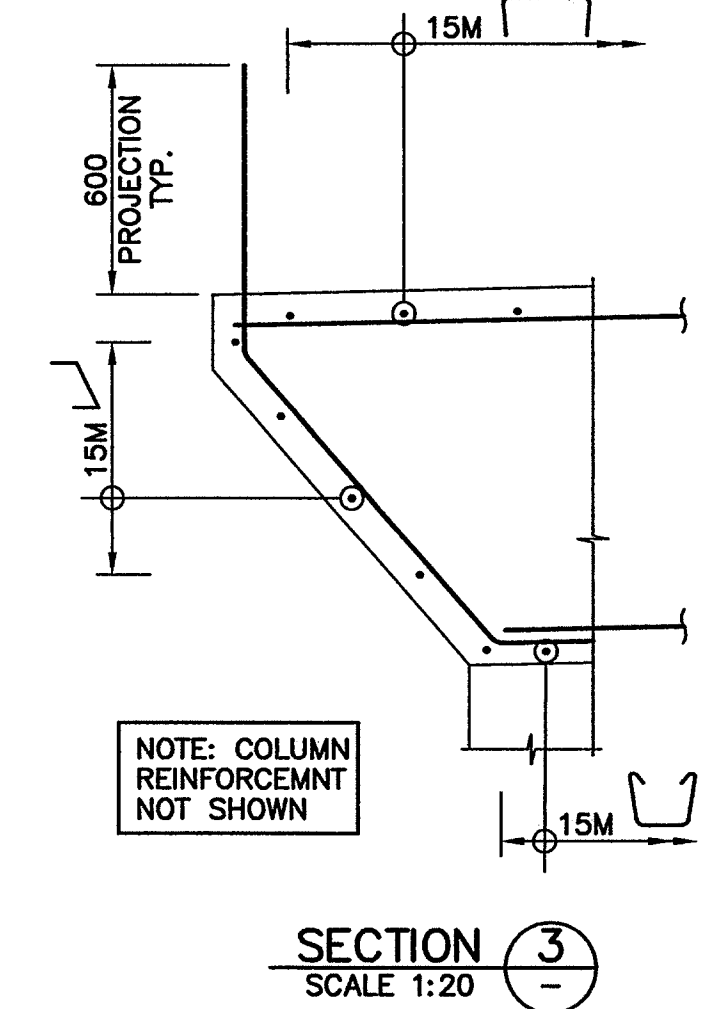
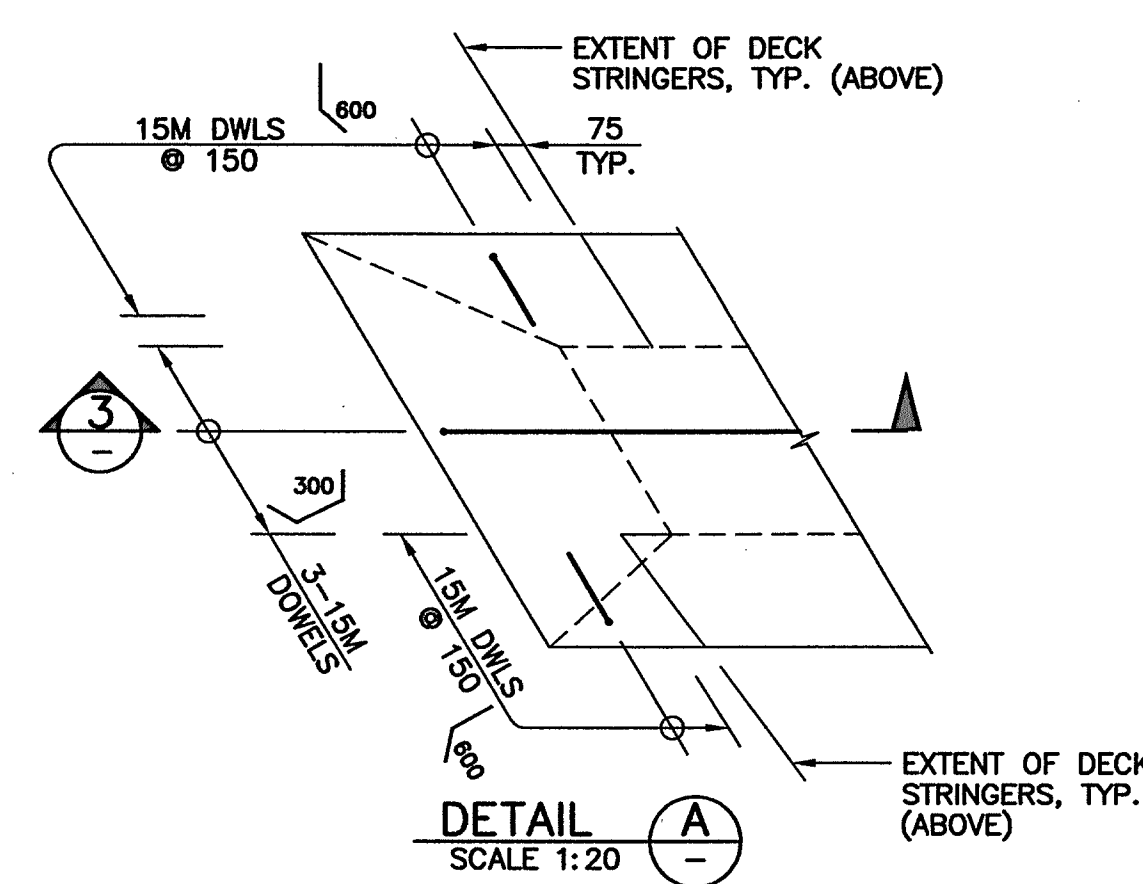
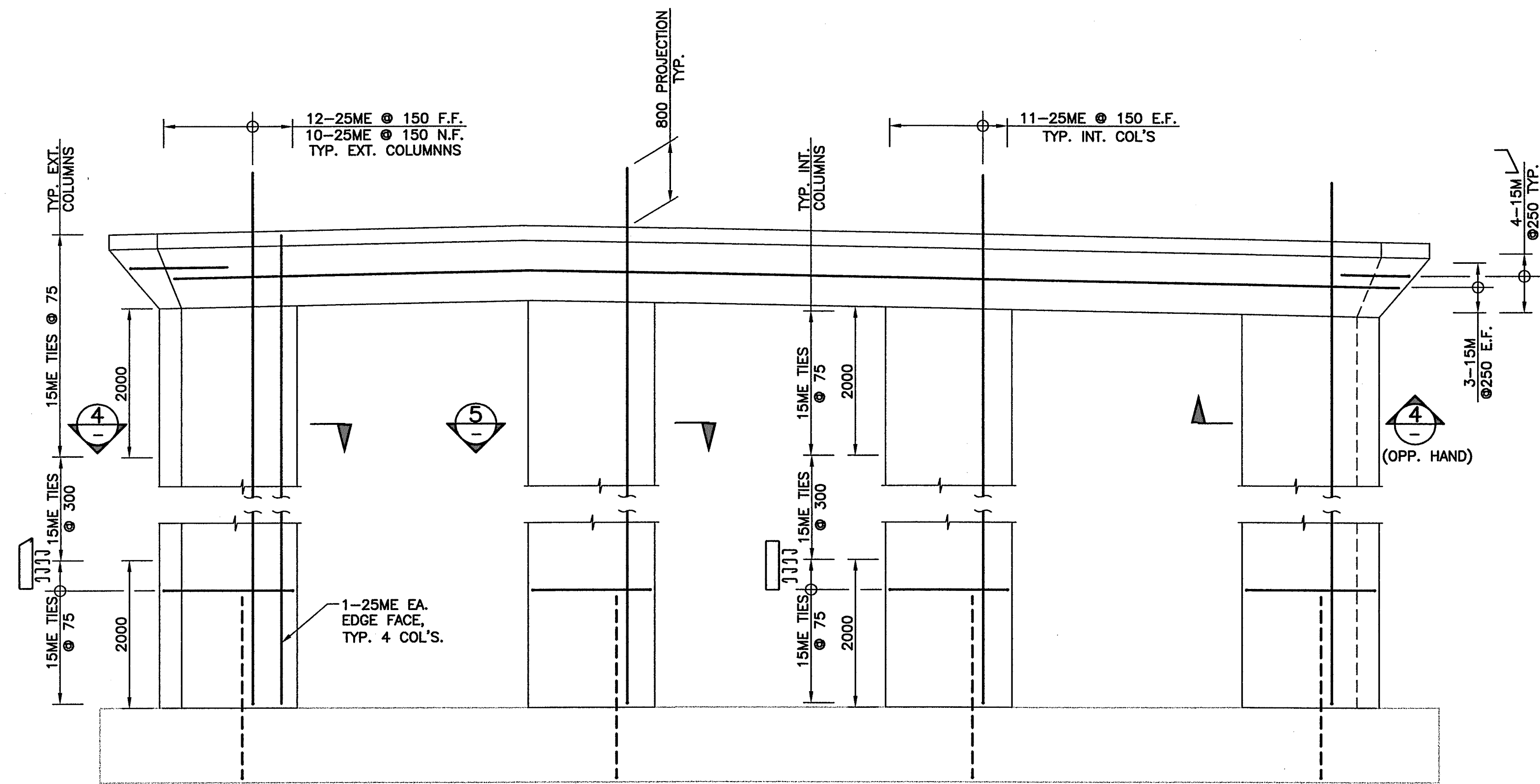
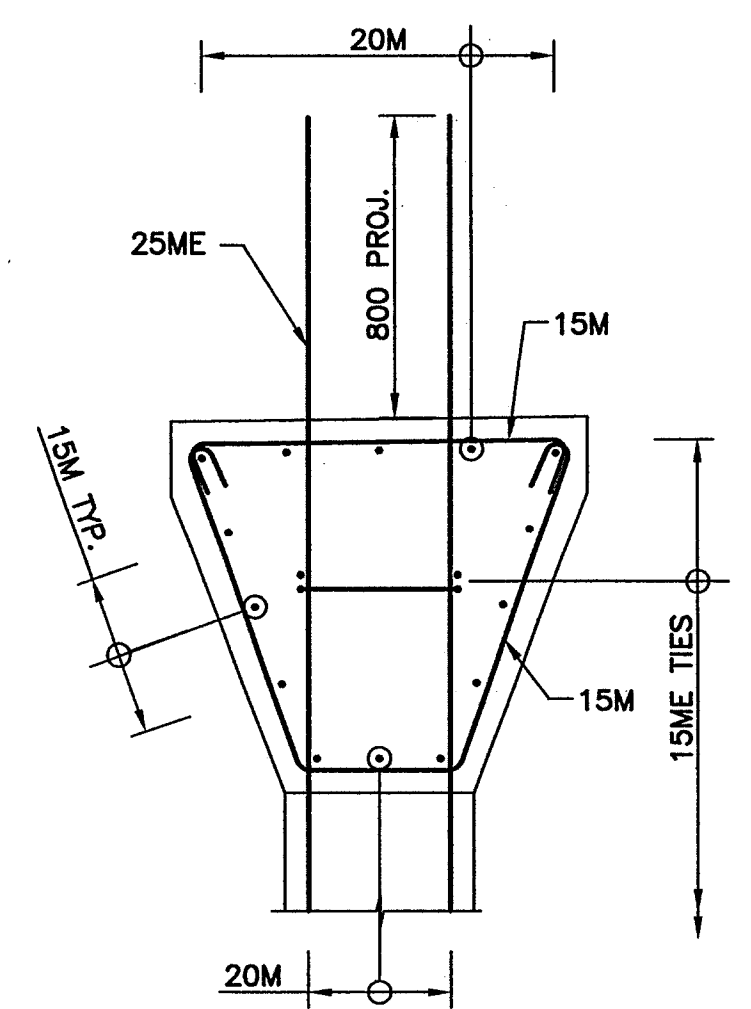
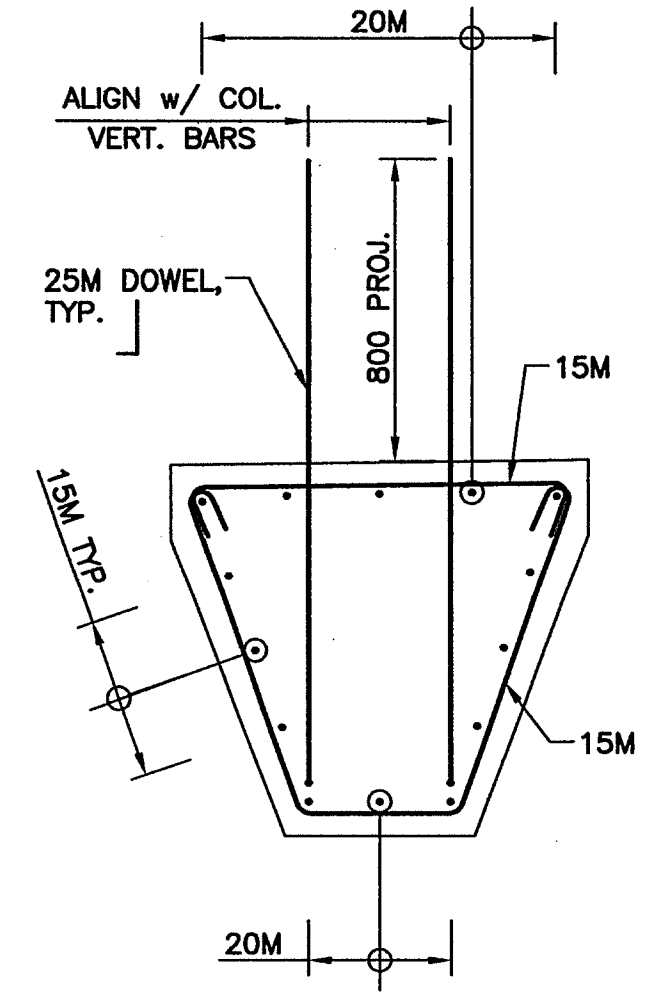
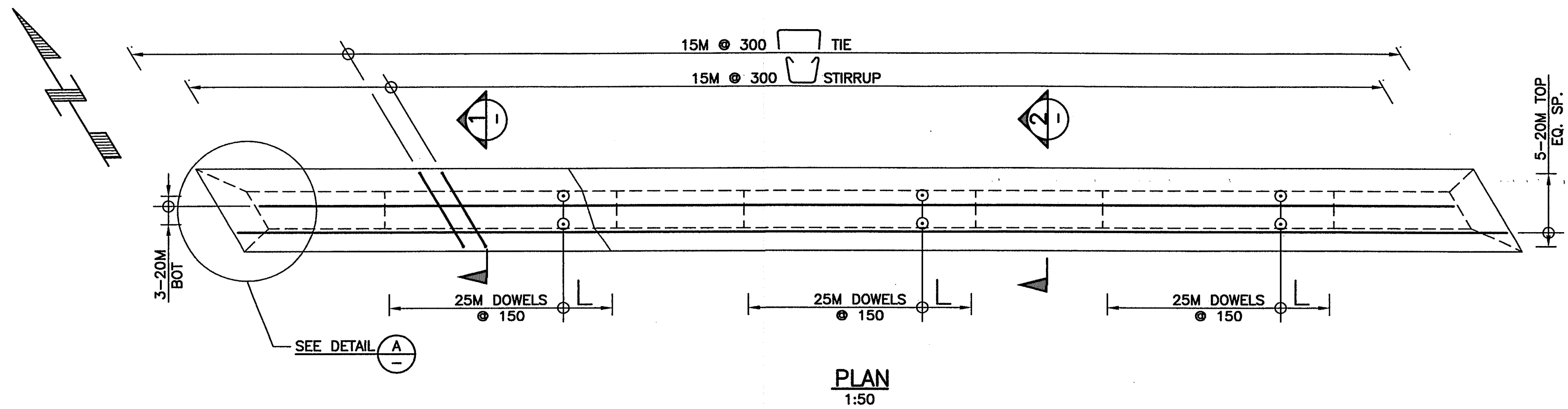
MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

**1562 MT. LEHMAN UNDERPASS
PIERS**

601903

FILE No. **CUCLELAND & TAYLOR** REGION **1** DRAWING No. **1562-108**

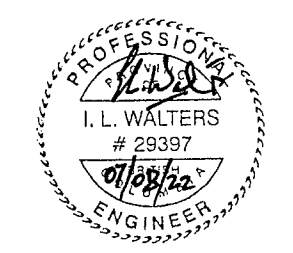
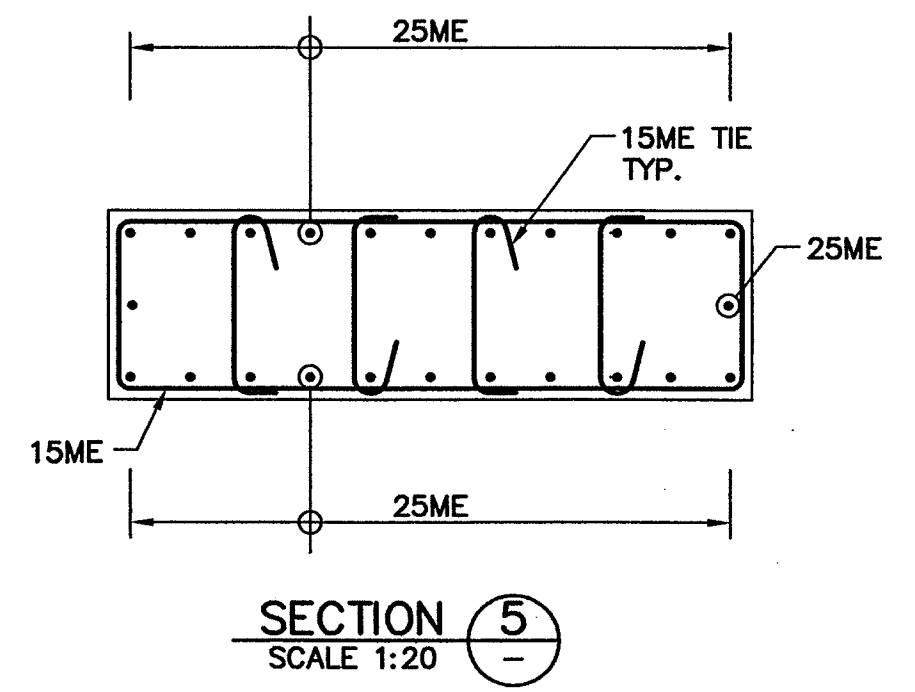
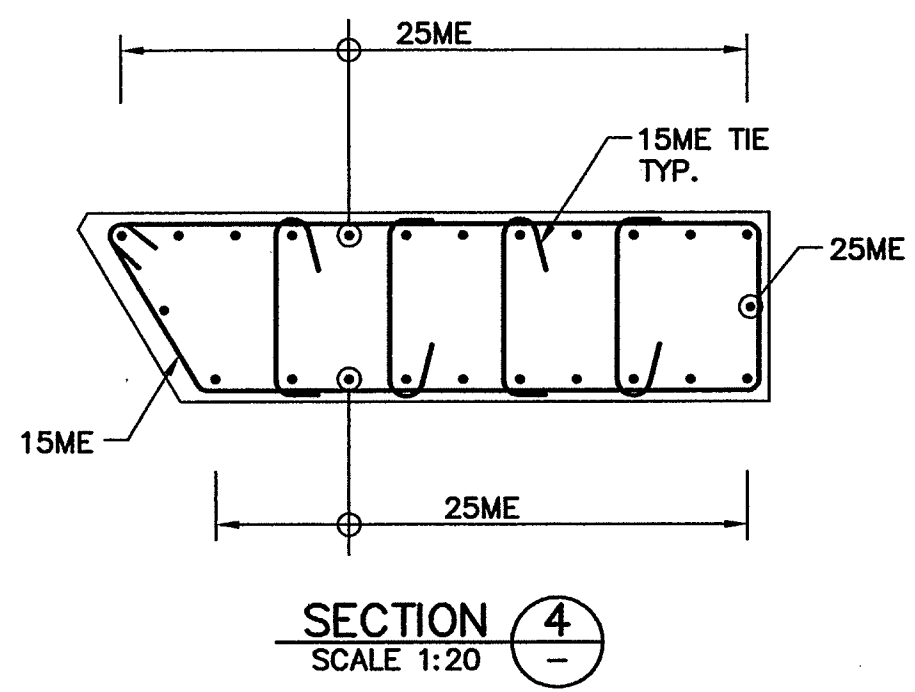
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NOTE: PIER CAP BEAM STIRRUPS, TIES AND DOWELS NOT SHOWN

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-102.
- SEE DRAWING 1562-103 FOR SUBSTRUCTURE NOTES.
- FOR FOUNDATION REINFORCEMENT SEE DRAWING 1562-104.



Rev	Date	Description	Initial	SCALE	DESIGNED: GAN DATE: 04/09/30
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I					DRAWN: LMB DATE: 04/09/30
H					
G					
F					
E				04/12/14	ISSUED FOR CONSTRUCTION ILW
D				04/11/03	ISSUED FOR TENDER ILW
C				04/09/30	100% ISSUE FOR REVIEW ILW
B				04/08/26	90% ISSUE FOR REVIEW ILW
A	07/08/22	RECORD DRAWINGS	ILW	04/06/22	50% ISSUE FOR REVIEW ILW
REVISIONS			Date	ISSUE RECORD	Initial



City of Abbotsford



MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

**1562 MT. LEHMAN UNDERPASS
PIER REINFORCEMENT**

601904

FILE No.



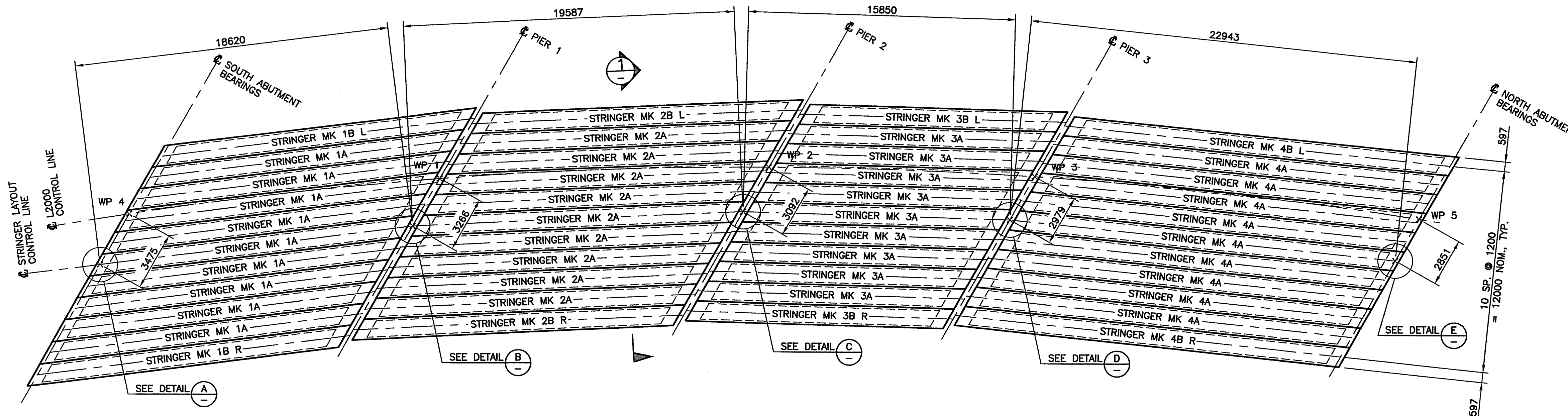
REGION
1

DRAWING No.
1562-109

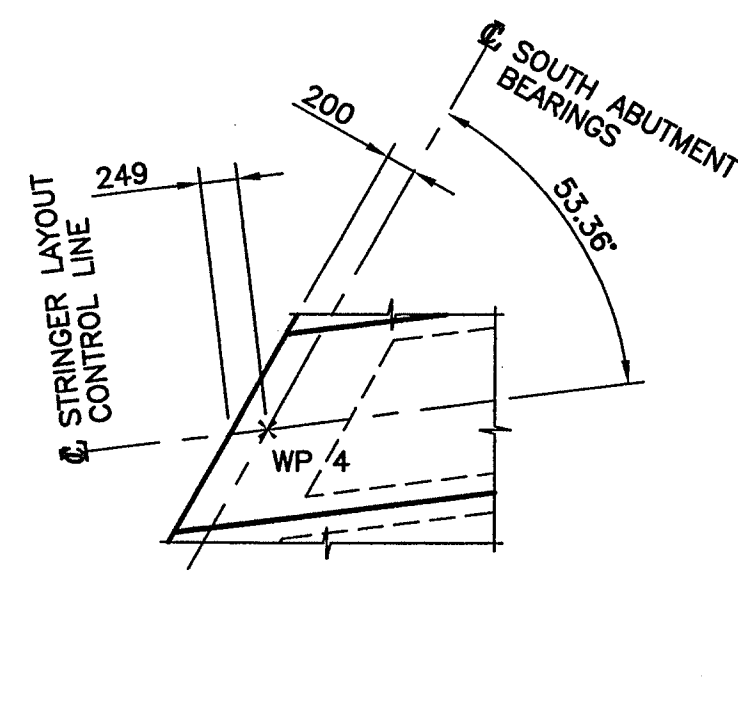
CANCEL PRINTS BEARING EARLIER LETTER

BOX STRINGER NOTES:

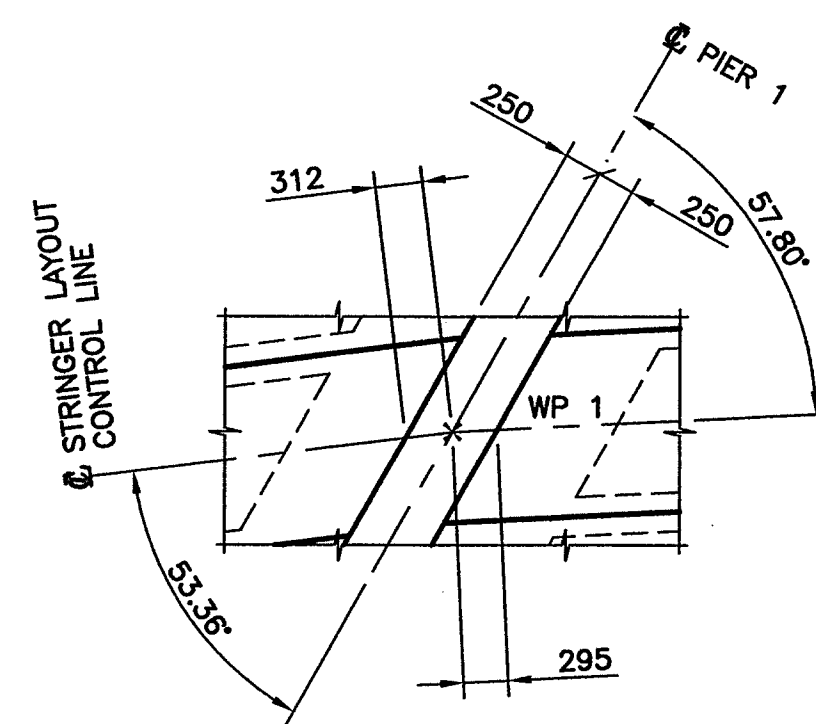
- PRESTRESSING STRANDS SHALL BE 13 DIA. 7 WIRE. UNCOATED LOW RELAXATION STRANDS CONFORMING TO CSA G279, GRADE 1860 MPa. MINIMUM TENSILE FORCE IMMEDIATELY BEFORE RELEASE OF STRANDS SHALL BE 138 kN.
- CONCRETE SHALL HAVE A 35 MPa MINIMUM COMPRESSIVE STRENGTH AT TIME OF RELEASE. MINIMUM COMPRESSIVE STRENGTH AT 28 DAYS SHALL BE 45MPa.
- REINFORCING STEEL SHALL BE IN ACCORDANCE WITH CSA G30.18M GRADE 400W MPa.
- REINFORCING STEEL SHALL HAVE 35 MINIMUM COVER UNLESS NOTED OTHERWISE. PRESTRESSING STRANDS SHALL HAVE 45 MINIMUM COVER UNLESS NOTED OTHERWISE.
- LAP OF BARS FOR SPLICES TO BE 40 x BAR DIAMETER UNLESS NOTED OTHERWISE. SPLICES TO BE STAGGERED SO THAT NOT MORE THAN EVERY SECOND BAR IS SPLICED AT ANY CROSS SECTION.
- TOP SURFACE OF ALL STRINGERS SHALL BE SANDBLASTED TO EXPOSE AGGREGATE AND PROVIDE 6mm AMPLITUDE. OUTER SURFACES OF EXTERIOR STRINGERS SHALL RECEIVE A CLASS 2 RUBBED FINISH. ALL OTHER SURFACES SHALL BE SMOOTH FORM FINISH.
- LIFTING DEVICES BY OTHERS SHALL BE LOCATED ONLY OVER BEARINGS. ONLY VERTICAL LIFTS SHALL BE PERMITTED. SUDDEN IMPACT LOADS ON THE STRINGER SHALL BE PREVENTED.
- STRINGERS SHALL BE TEMPORARILY SUPPORTED ONLY AT BEARING LOCATIONS.
- ALL PLAN DIMENSIONS ARE HORIZONTAL. ALLOWANCE SHALL BE MADE FOR ELASTIC SHORTENING, SHRINKAGE, CREEP AND SLOPE. ENDS OF STRINGERS SHALL BE SET VERTICAL DURING CASTING.
- ELEVATION OF STRINGERS TO BE SURVEYED BY THE CONTRACTOR AT 2m INTERVALS AFTER STRINGER ERECTION. DECK THICKNESS SHALL BE ADJUSTED TO ACCOUNT FOR STRINGER DEFLECTION AND CAMBER.
- INTERIOR FORMWORK SHALL ALLOW FREE MOVEMENT OF WATER TO THE DRAIN HOLES.
- UNLESS NOTED OTHERWISE, BOTTOM EDGES OF STRINGERS SHALL BE CHAMFERED 20mm.
- ALL STRINGERS TO BE CAST A MINIMUM OF 30 DAYS PRIOR TO ERECTION OR AT AN EARLY STAGE SUBJECT TO APPROVAL BY THE ENGINEER.



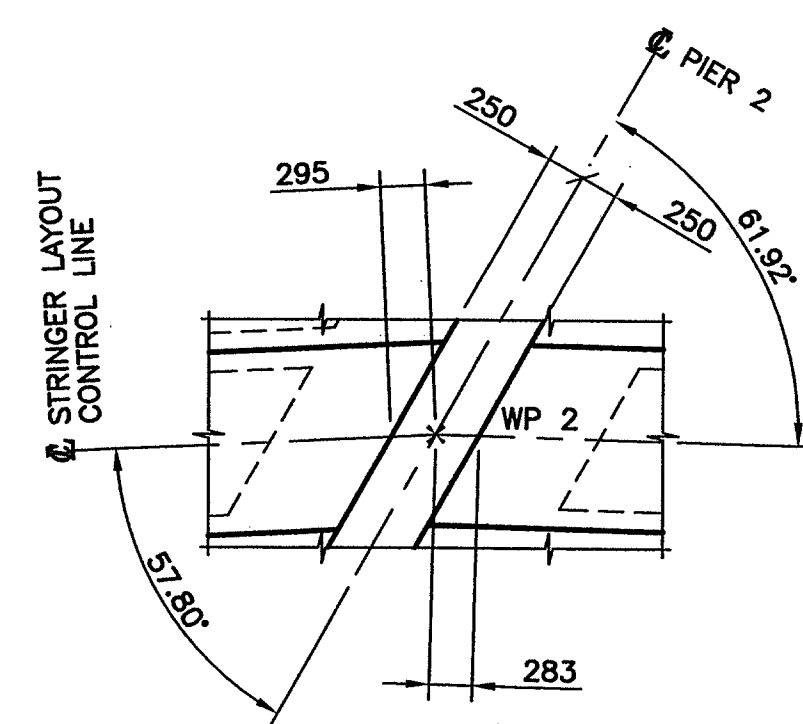
PLAN
1:150



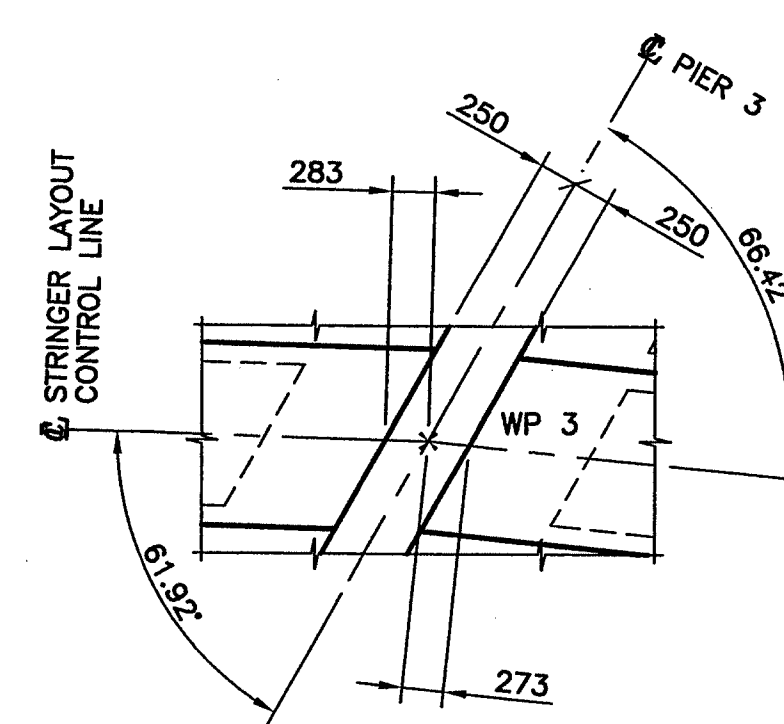
DETAIL A
SCALE 1:50



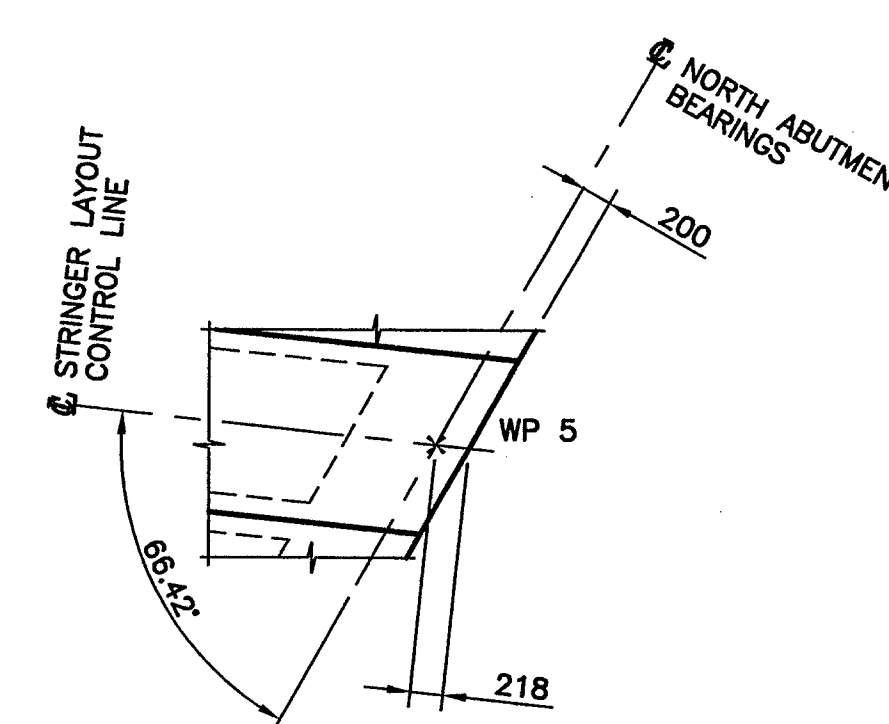
DETAIL B
SCALE 1:50



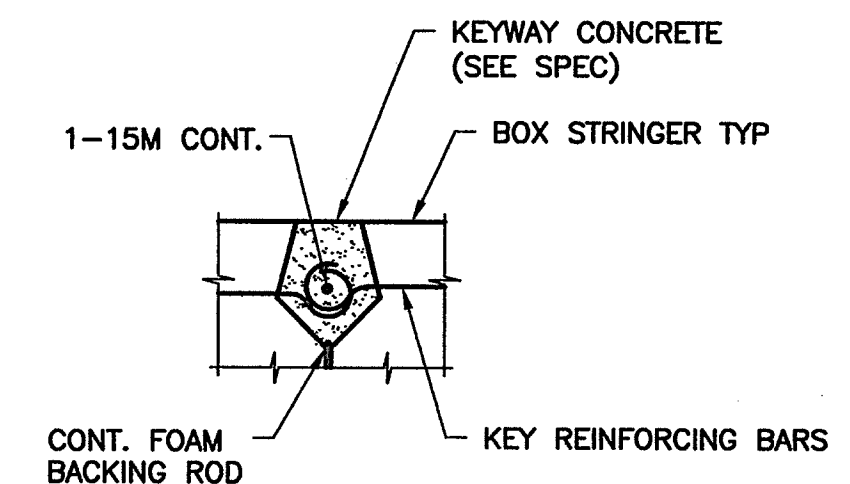
DETAIL C
SCALE 1:50



DETAIL D
SCALE 1:50



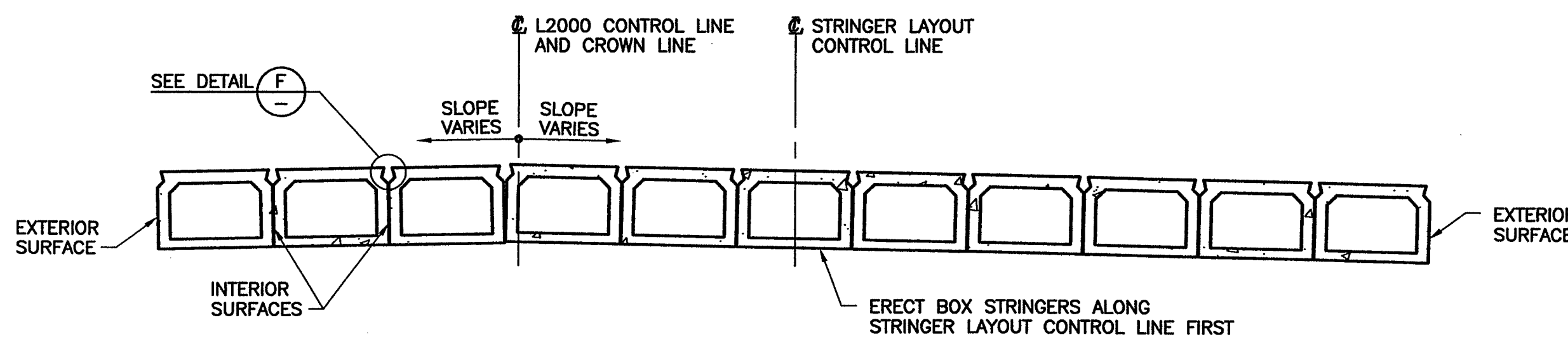
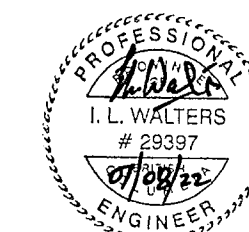
DETAIL E
SCALE 1:50



DETAIL F
SCALE 1:10

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-102.
- FOR BOX STRINGER DETAILS SEE DRAWINGS 1562-111, 112, 113 & 114.



SECTION 1
SCALE 1:50

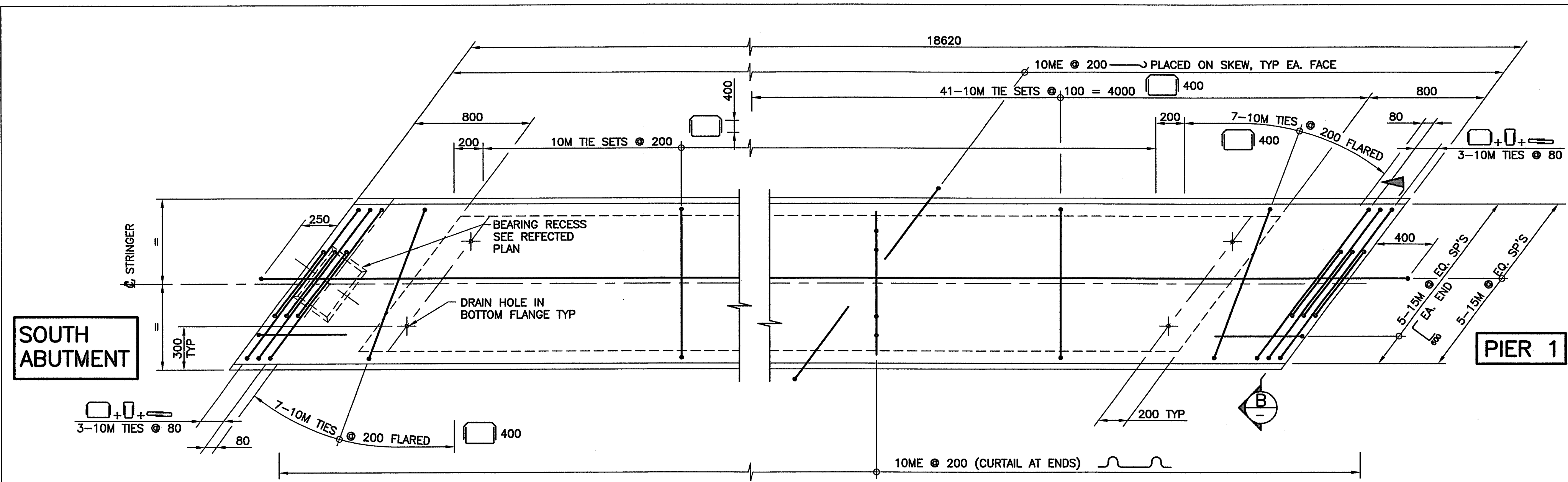
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I					DRAWN: <u>CTL/IE</u> DATE: <u>04/09/30</u>	
H						
G						
F						
E						
D				04/12/14	ISSUED FOR CONSTRUCTION	
C				04/11/03	ISSUED FOR TENDER	
B				04/09/30	100% ISSUE FOR REVIEW	
A	07/08/22	RECORD DRAWINGS	ILW	04/08/26	90% ISSUE FOR REVIEW	
REVISIONS				Date	ISSUE RECORD	Initial

City of Abbotsford

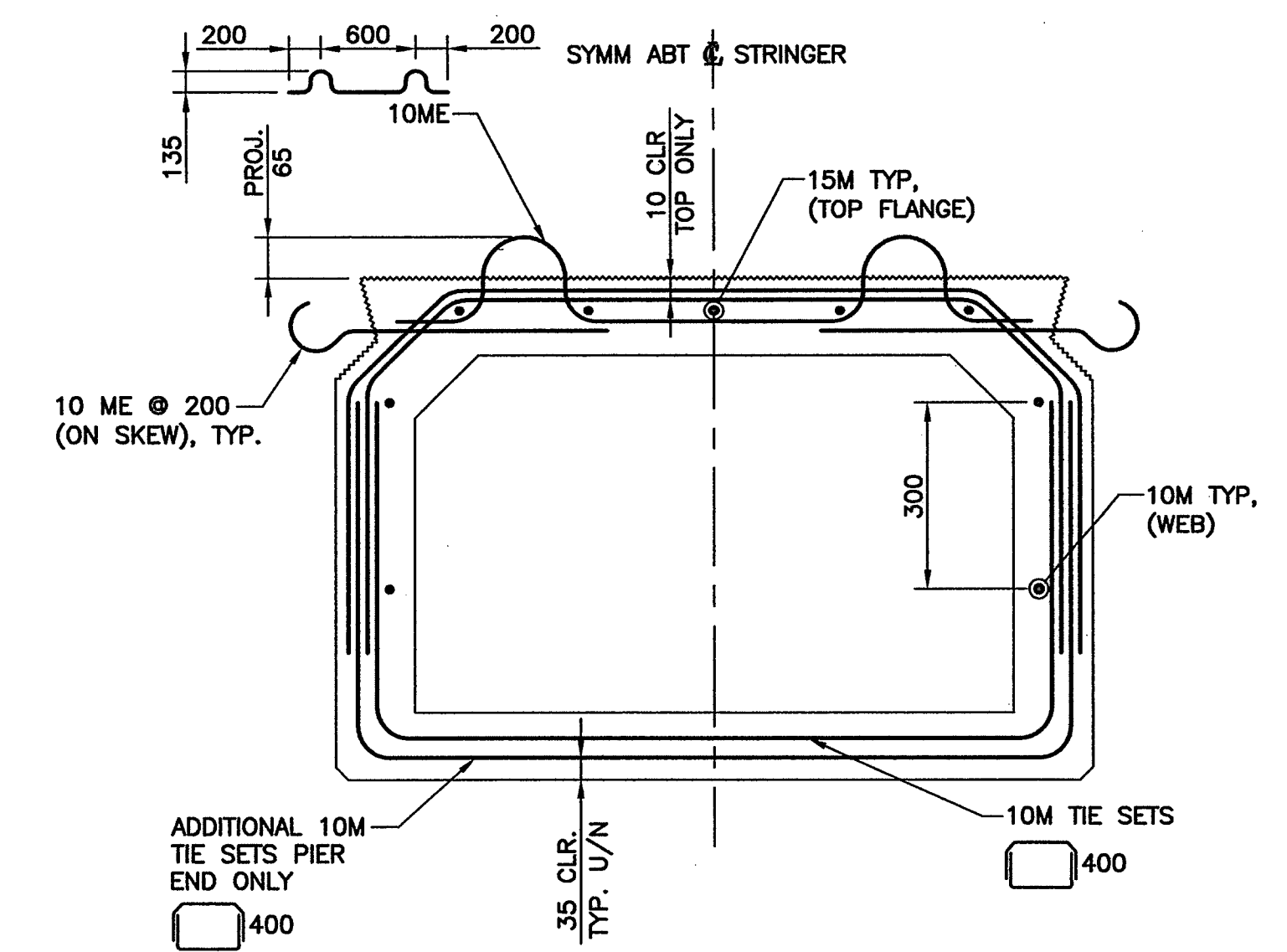
MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

1562 MT. LEHMAN UNDERPASS
PRECAST STRINGER LAYOUT 601905

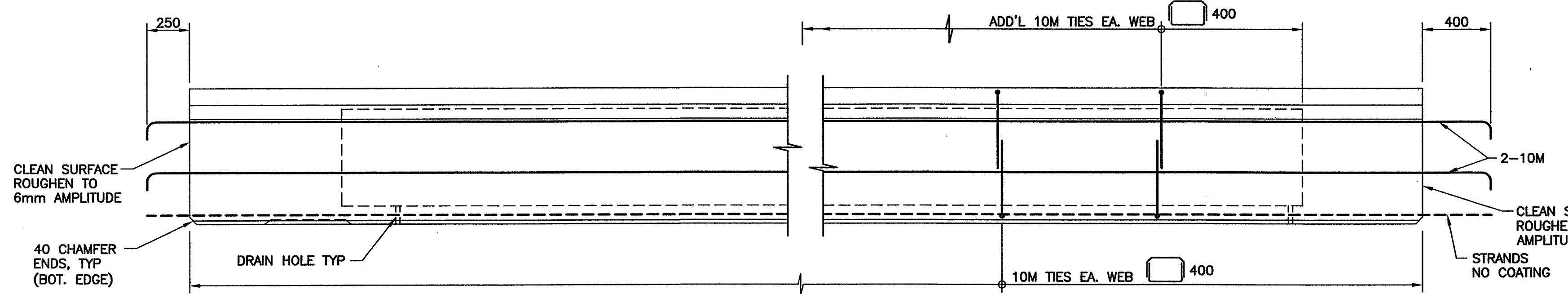
FILE No. **1** REGION **1** DRAWING No. **1562-110**



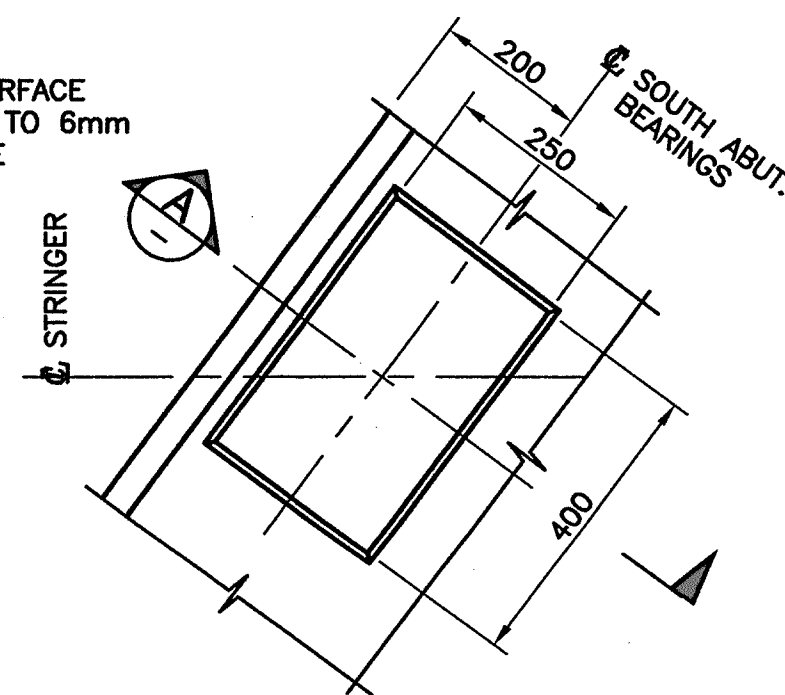
PLAN
1:20



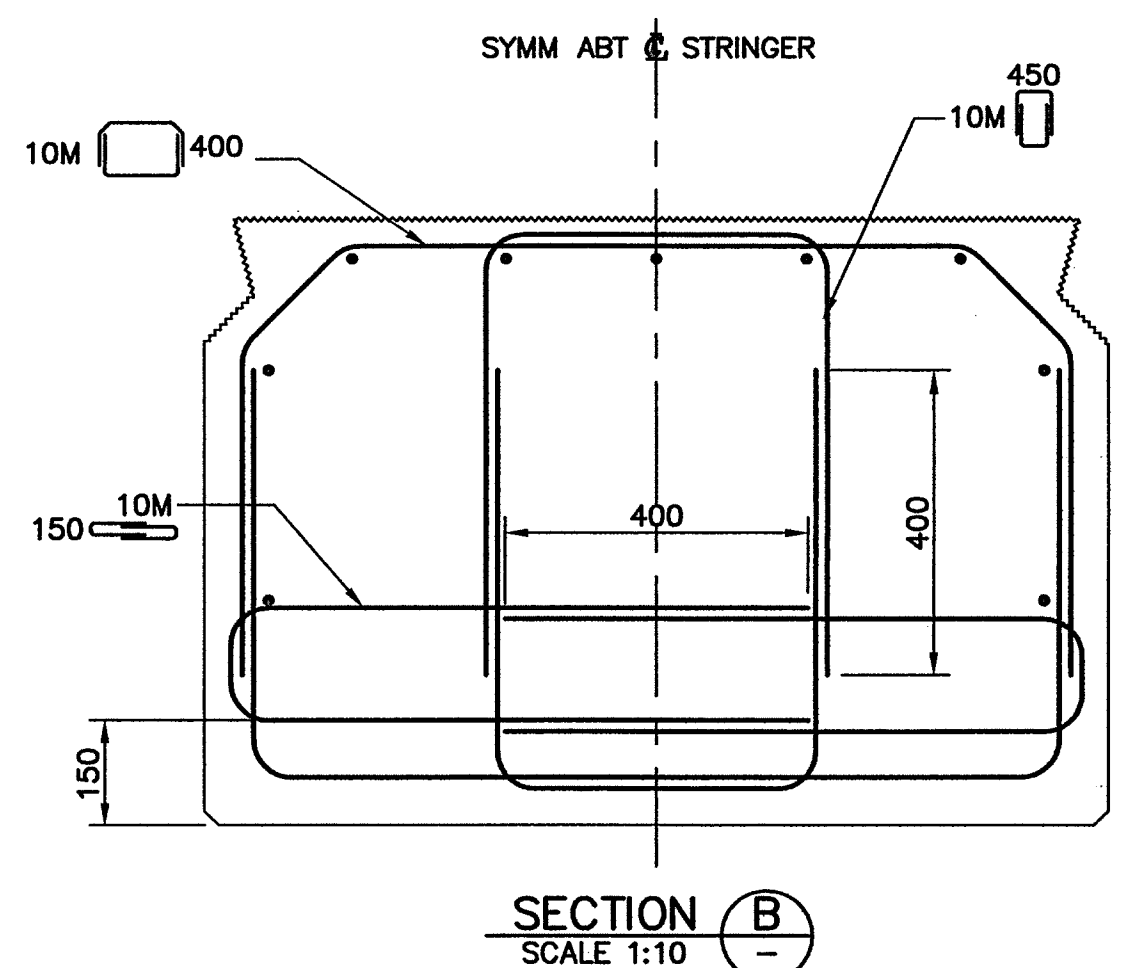
TYPICAL REINFORCING
1:10



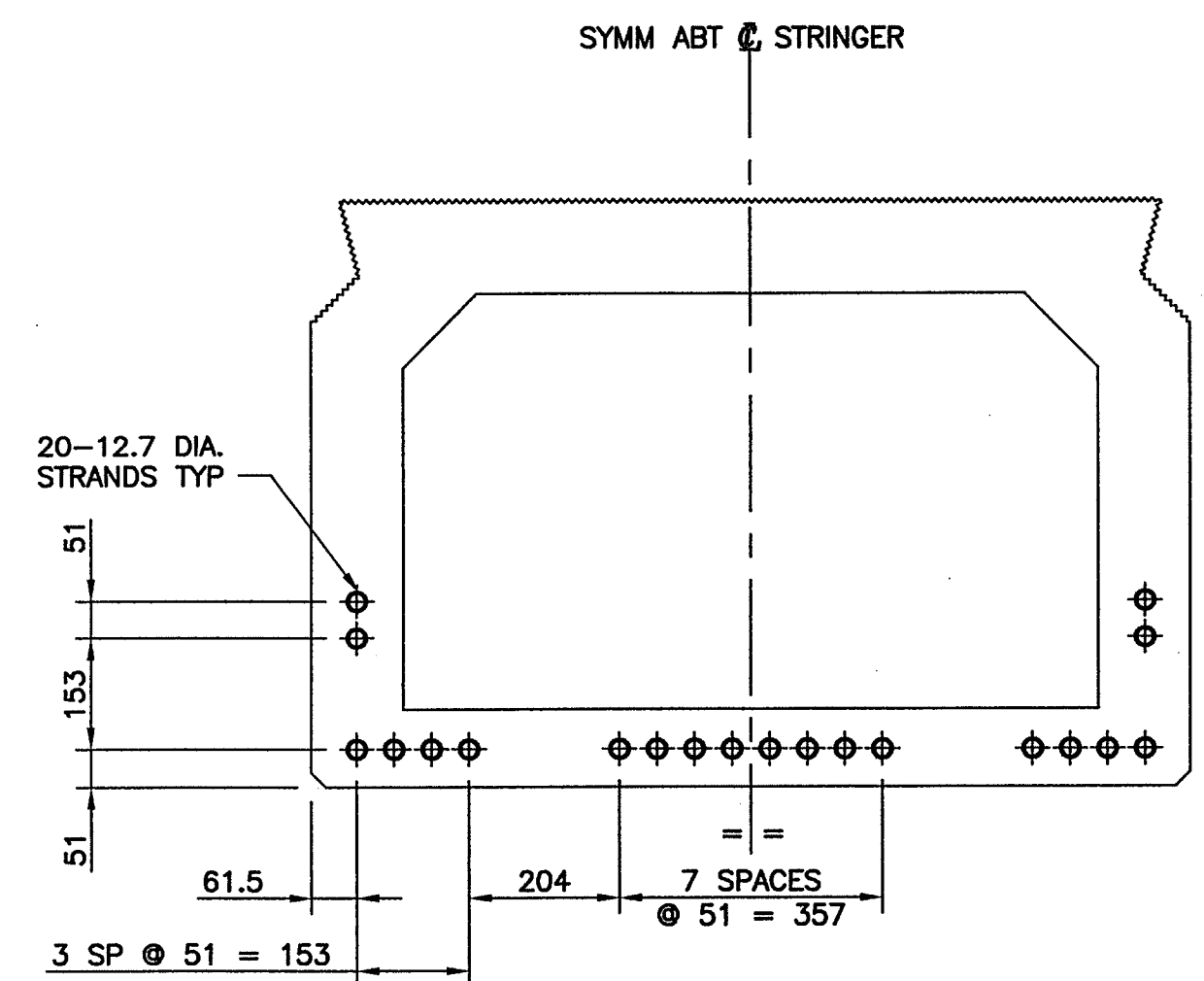
ELEVATION
1:20



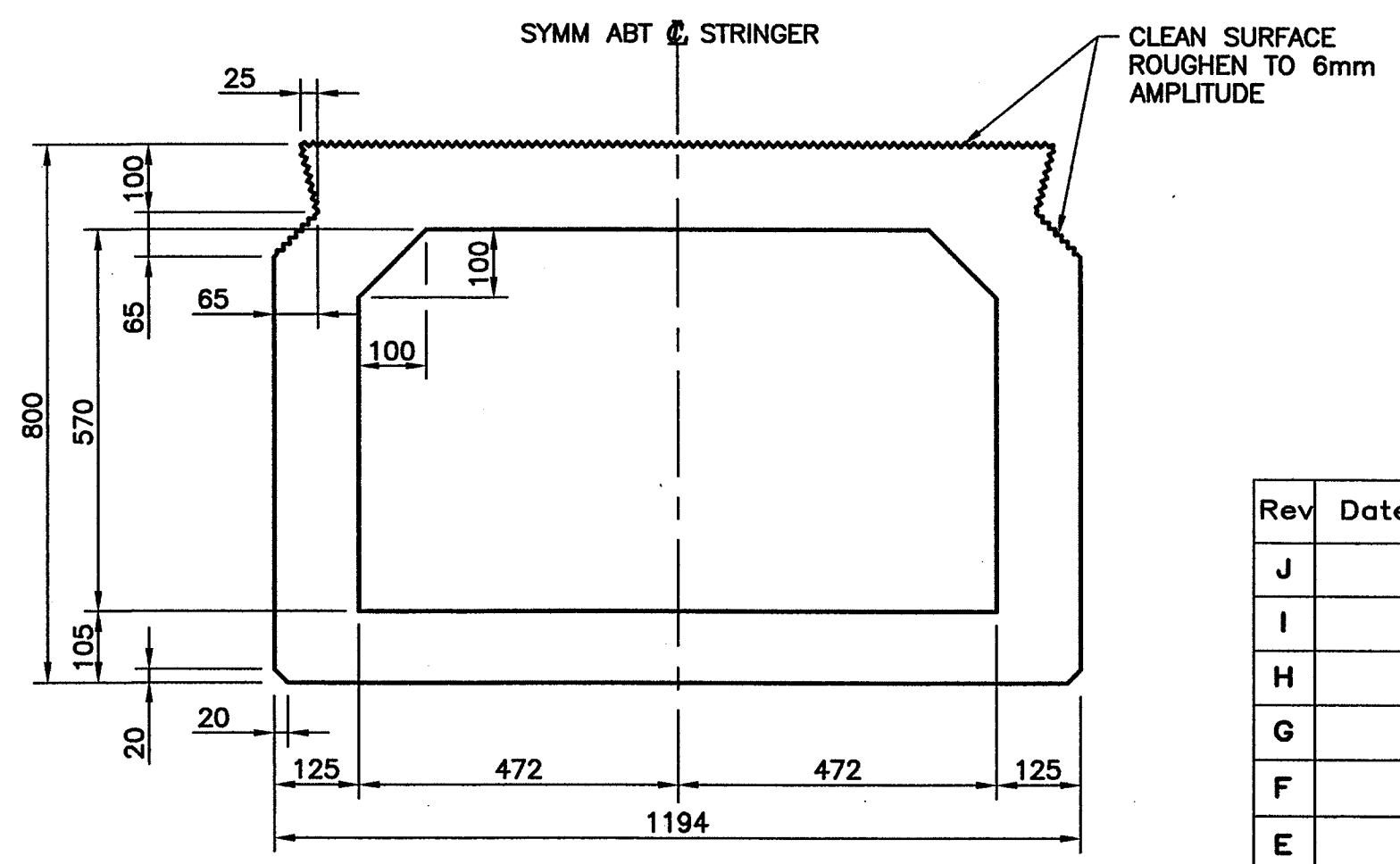
REFLECTED PLAN (BRG RECESS)
1:10



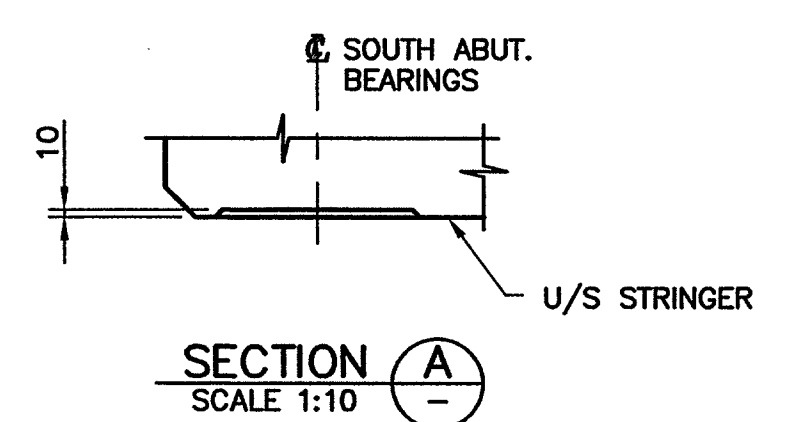
SECTION B
SCALE 1:10



PRESTRESSING STRAND LAYOUT
1:10



TYPICAL CROSS SECTION
1:10



SECTION A
SCALE 1:10

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-101.
- FOR BOX STRINGER NOTES SEE DRAWING 1562-110.



City of Abbotsford

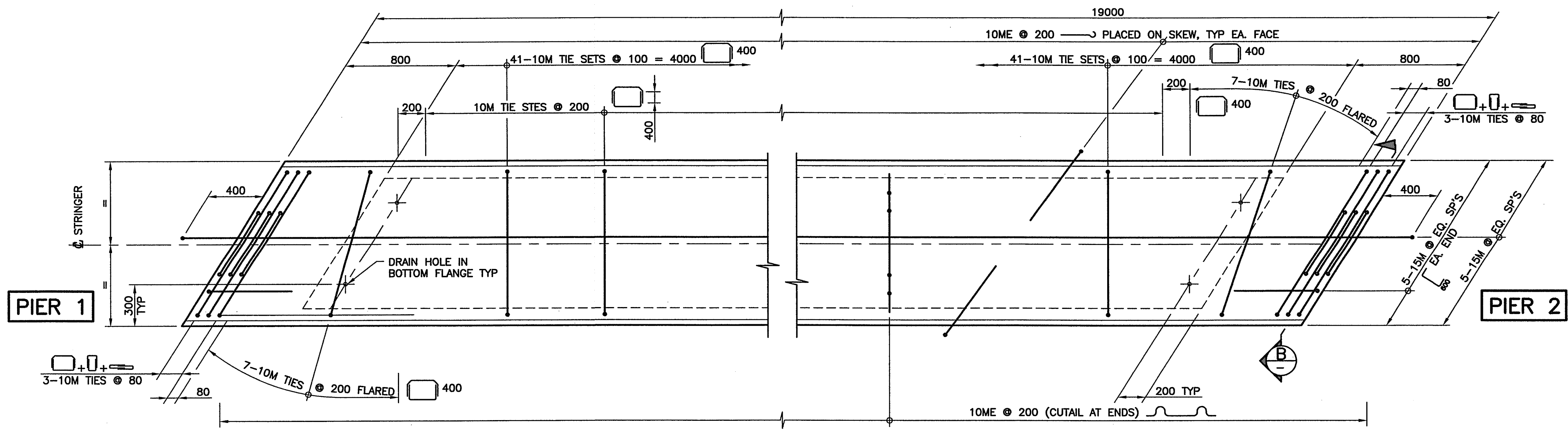
MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

1562 MT. LEHMAN UNDERPASS
CONCRETE BOX STRINGERS MK1

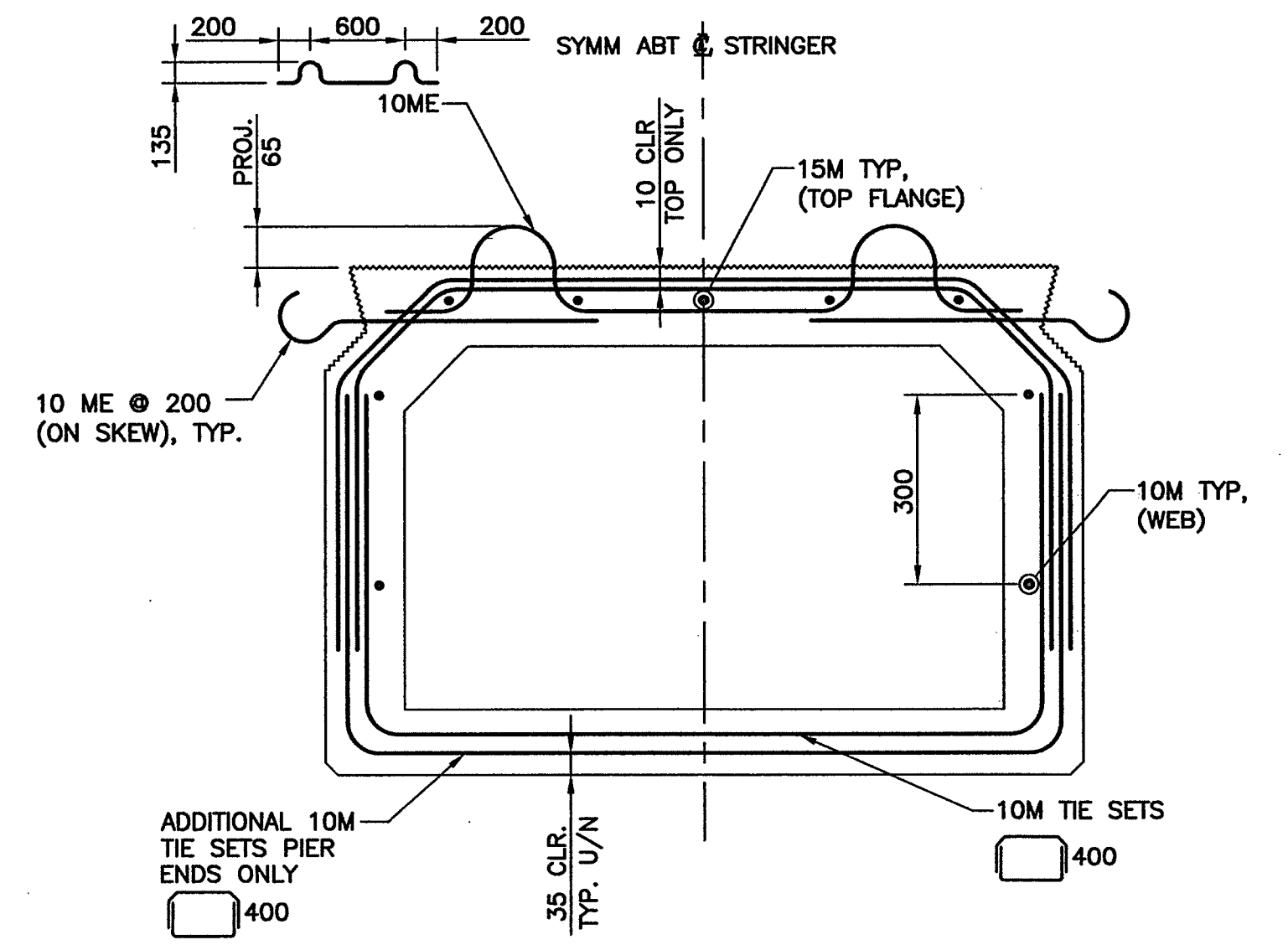
601906

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REVISIONS				Date	ISSUE RECORD		Initial			

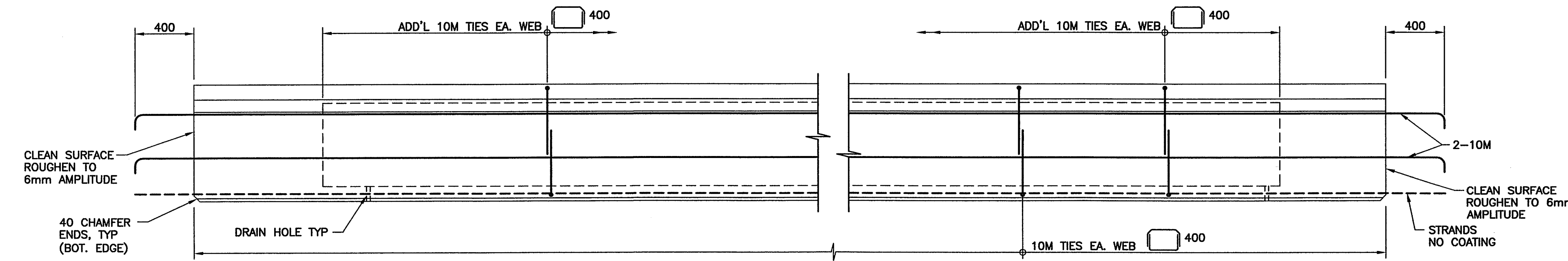
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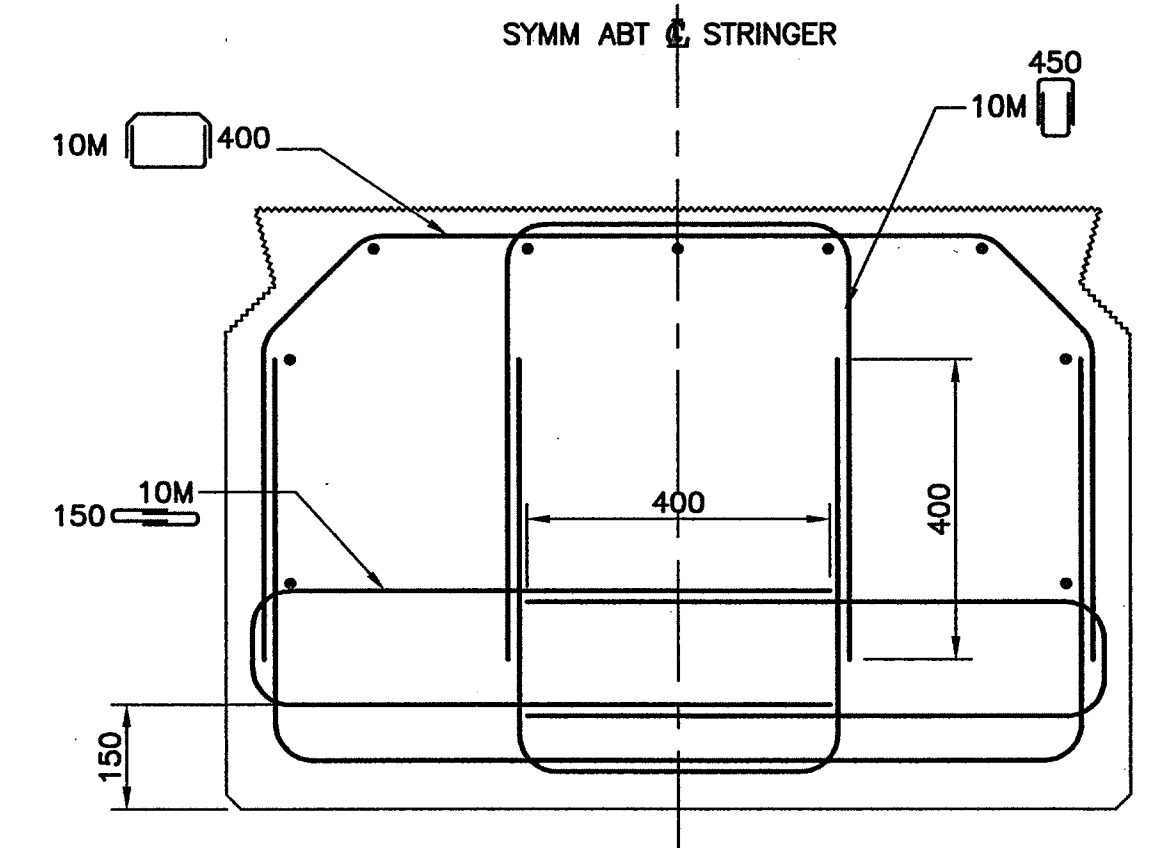
PLAN
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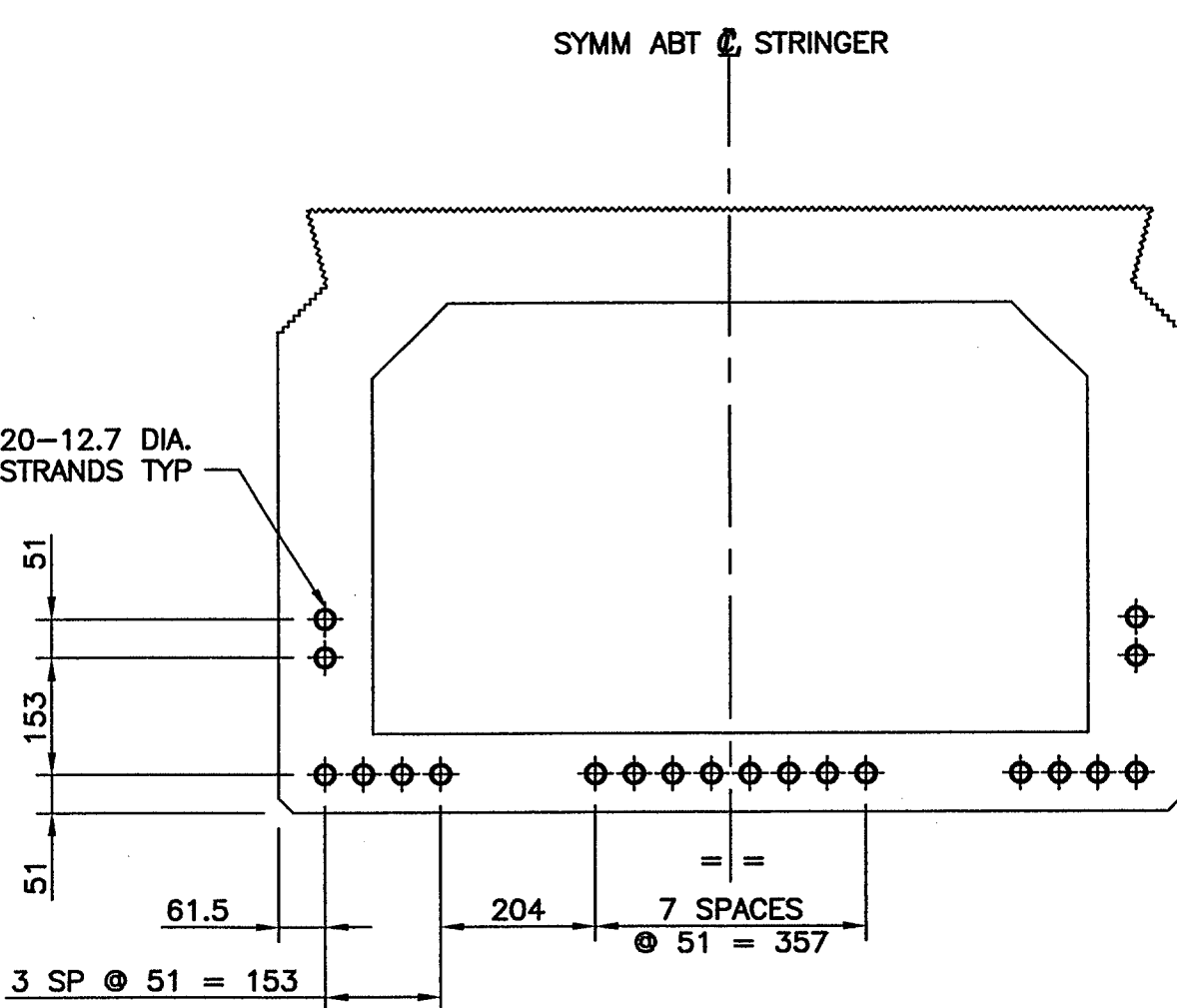
TYPICAL REINFORCING
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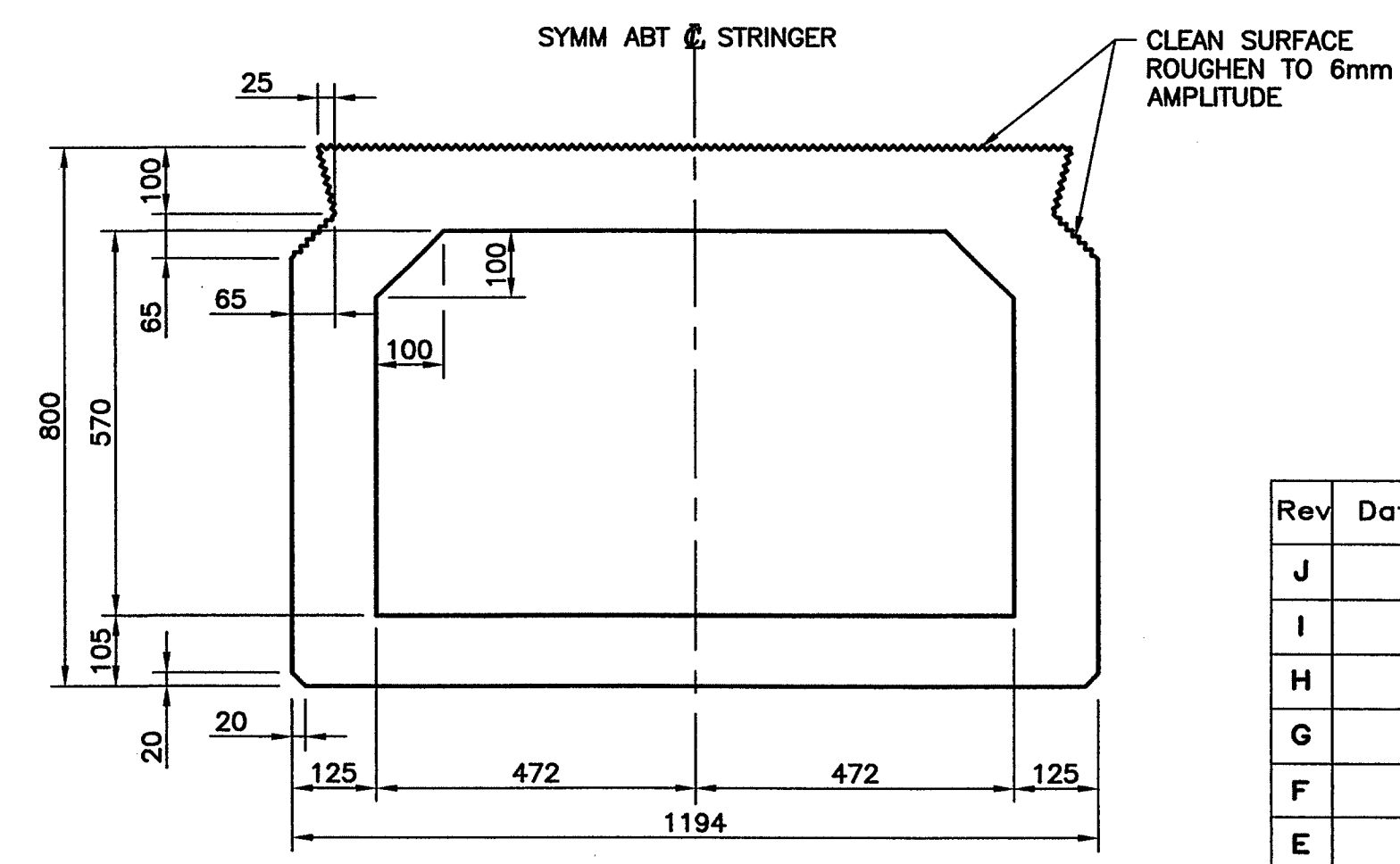
ELEVATION
1:20



SECTION B-B
SCALE 1:10



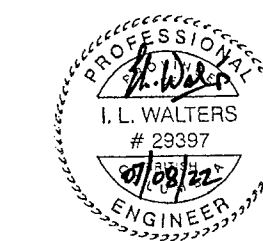
PRESTRESSING STRAND LAYOUT
1:10



TYPICAL CROSS SECTION
1:10

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-101.
- FOR BOX STRINGER NOTES SEE DRAWING 1562-110.



Rev	Date	Description	Initial	SCALE	DESIGNED	DATE	CHECKED	DATE	DRAWN	DATE
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D										
C				04/12/14						
B				04/11/03						
A	07/08/22	RECORD DRAWINGS	ILW	04/09/30						
REVISIONS				Date	ISSUE RECORD		Initial			



City of Abbotsford



MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

1562 MT. LEHMAN UNDERPASS
CONCRETE BOX STRINGERS MK2

601907

FILE No.



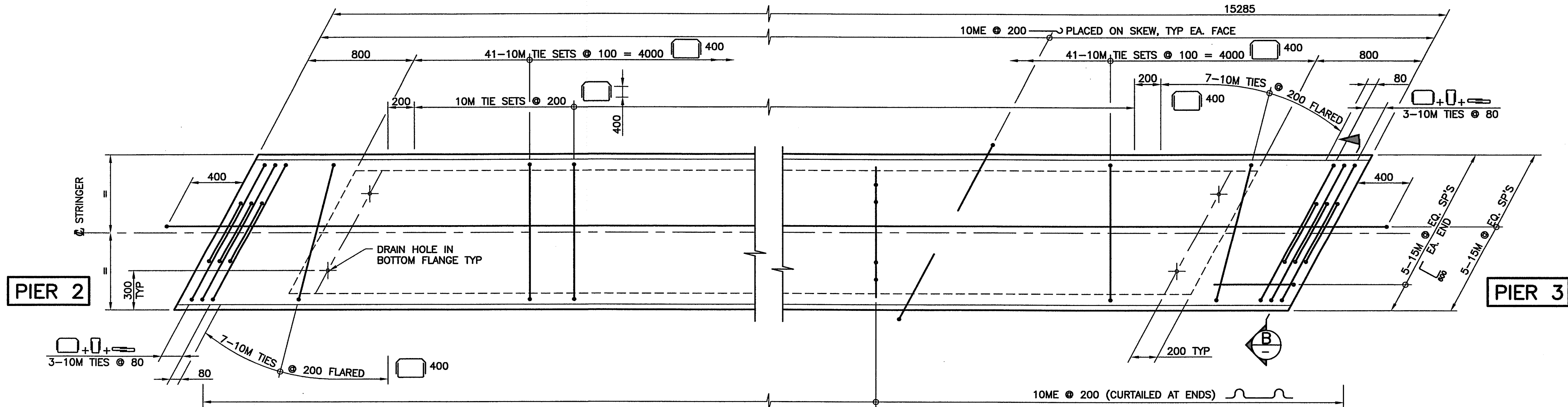
REGION

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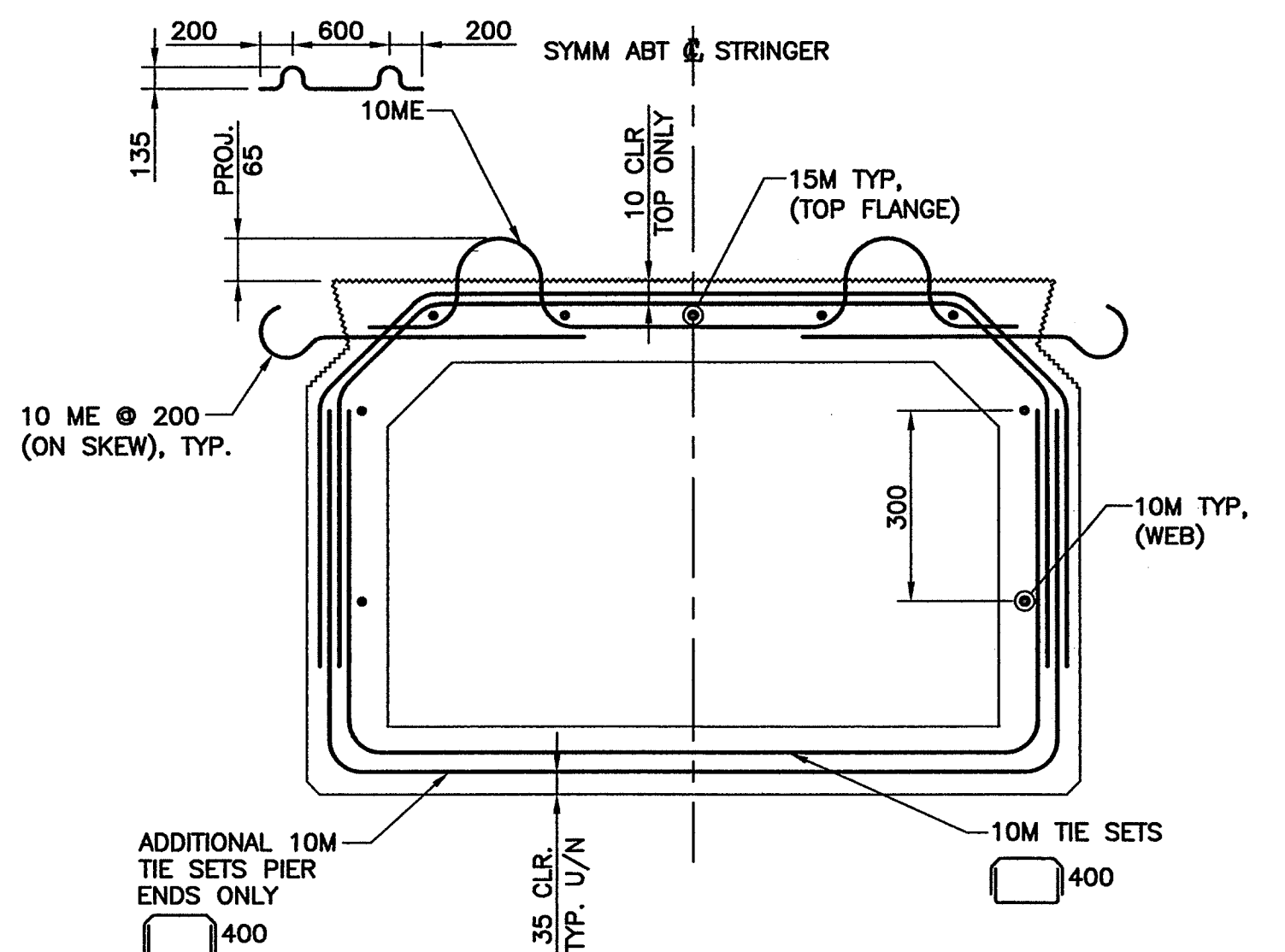
DRAWING No.

1562-112

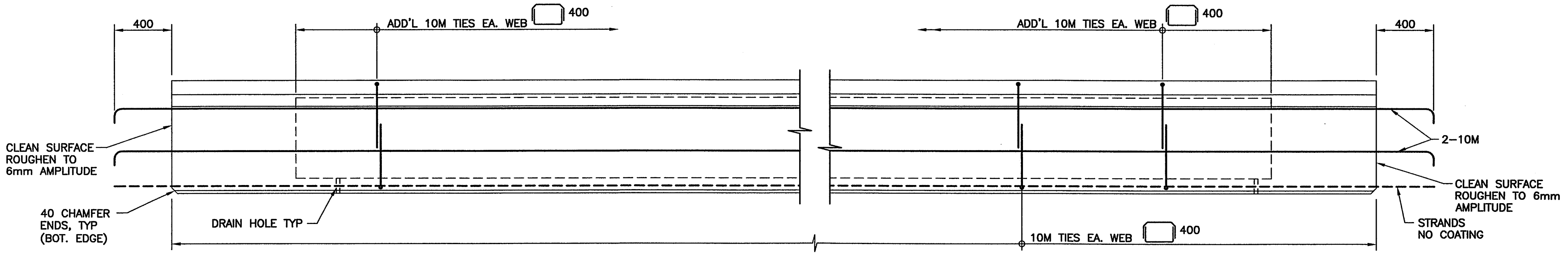
CANCEL PRINTS BEARING EARLIER LETTER



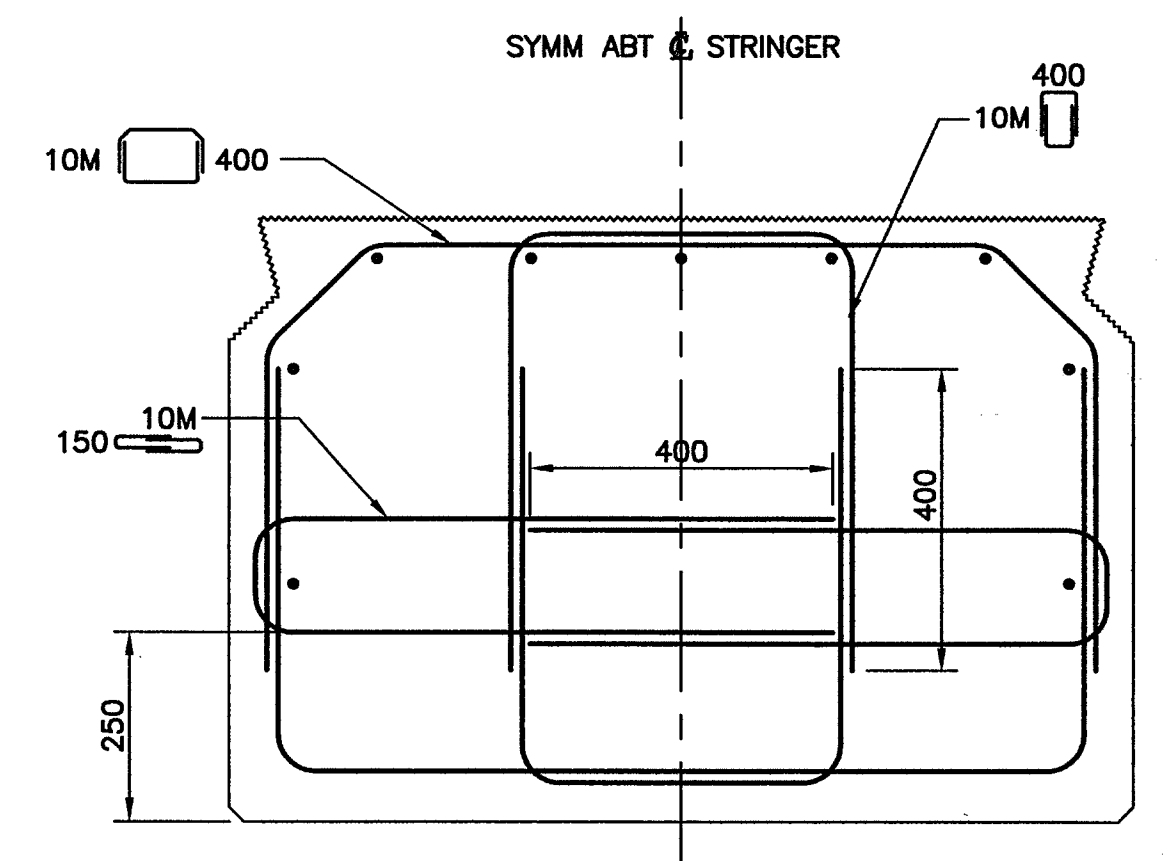
PLAN
1:20



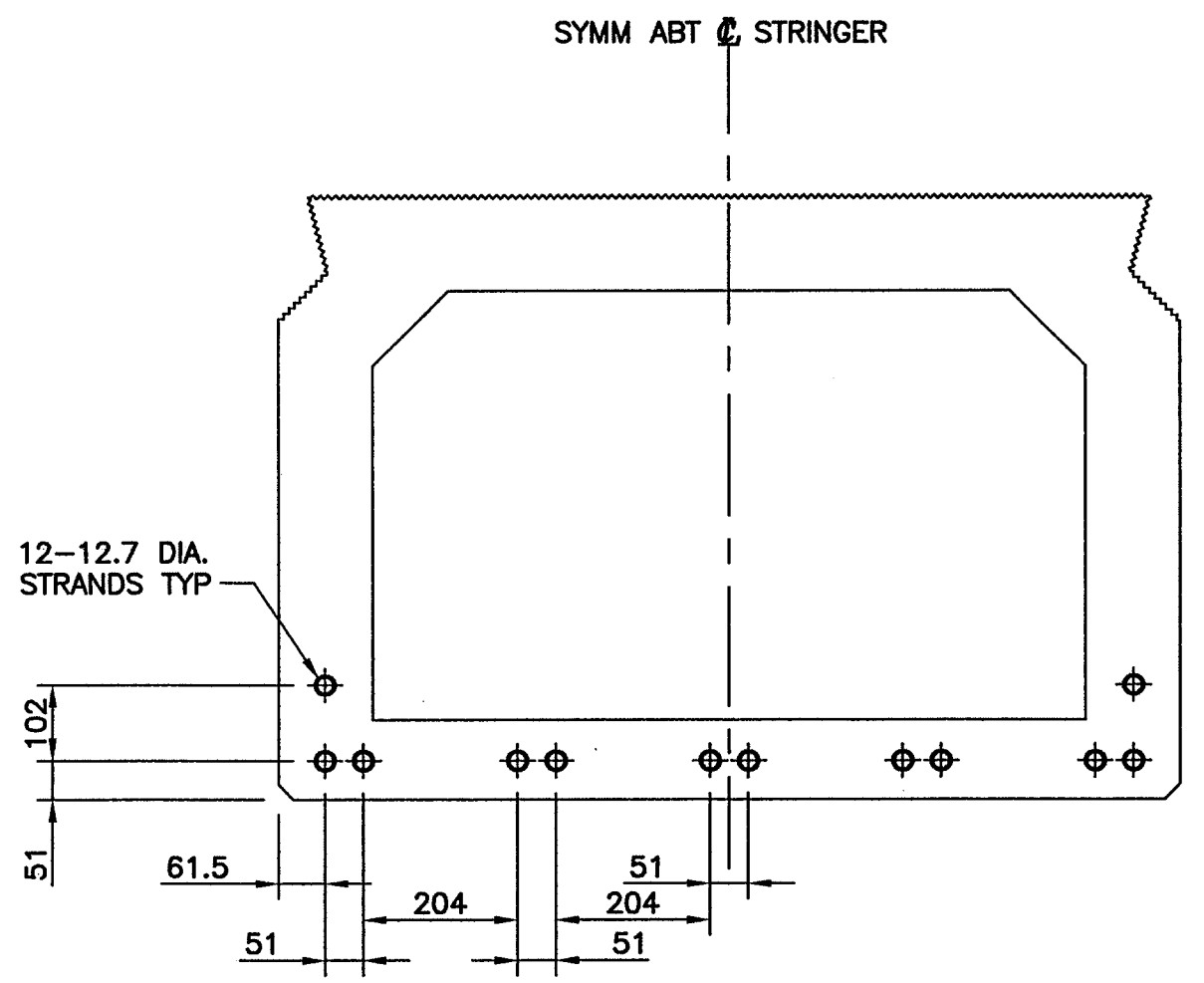
TYPICAL REINFORCING
1:10



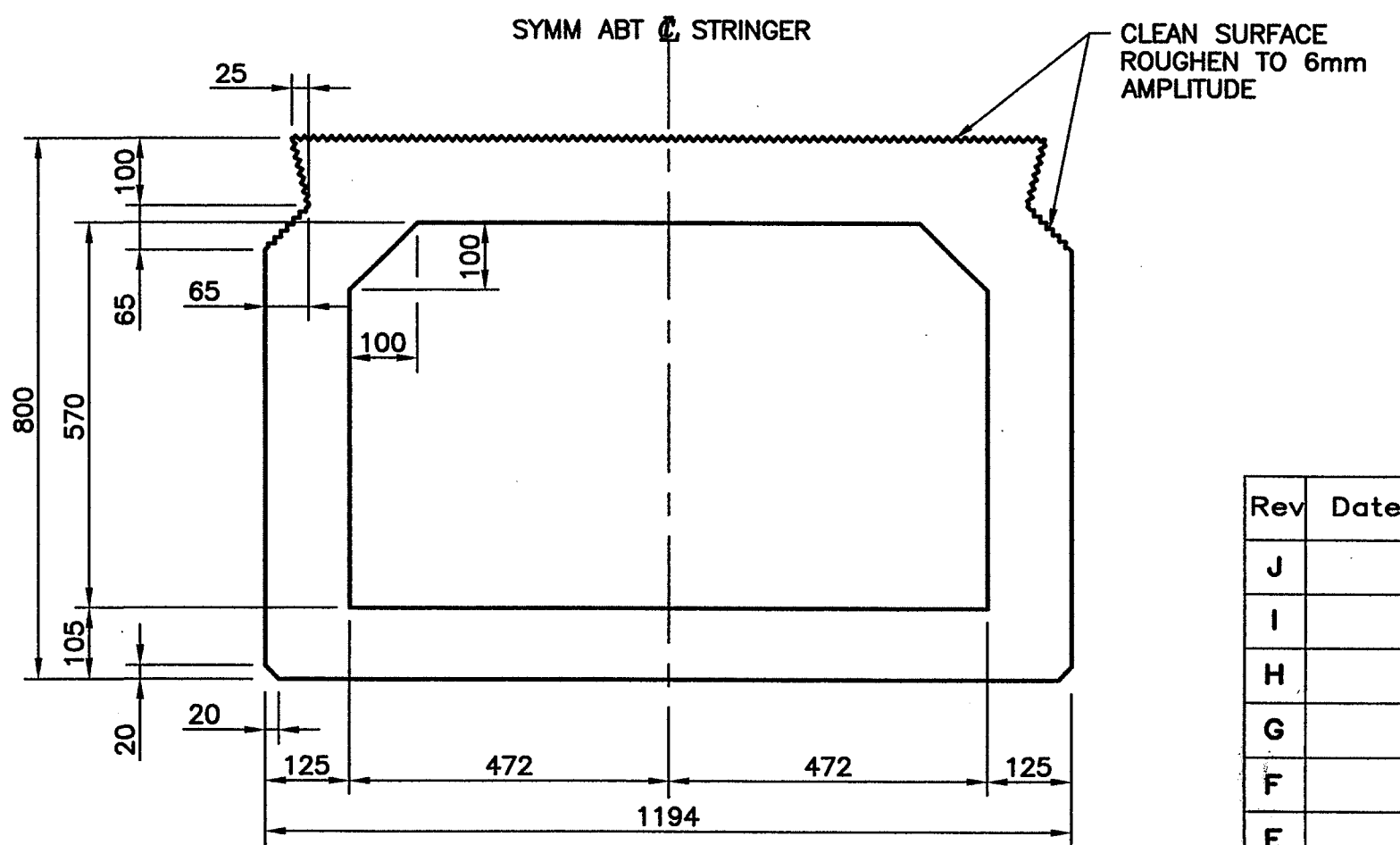
ELEVATION
1:20



SECTION B-B
SCALE 1:10



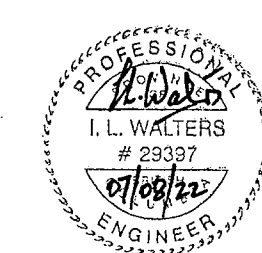
PRESTRESSING STRAND LAYOUT
1:10



TYPICAL CROSS SECTION
1:10

NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-101.
- FOR BOX STRINGER NOTES SEE DRAWING 1562-110.



Rev	Date	Description	Initial	SCALE	DESIGNED	DATE	CHECKED	DATE	DRAWN	DATE
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REVISIONS				Date	ISSUE RECORD	Initial				

City of Abbotsford

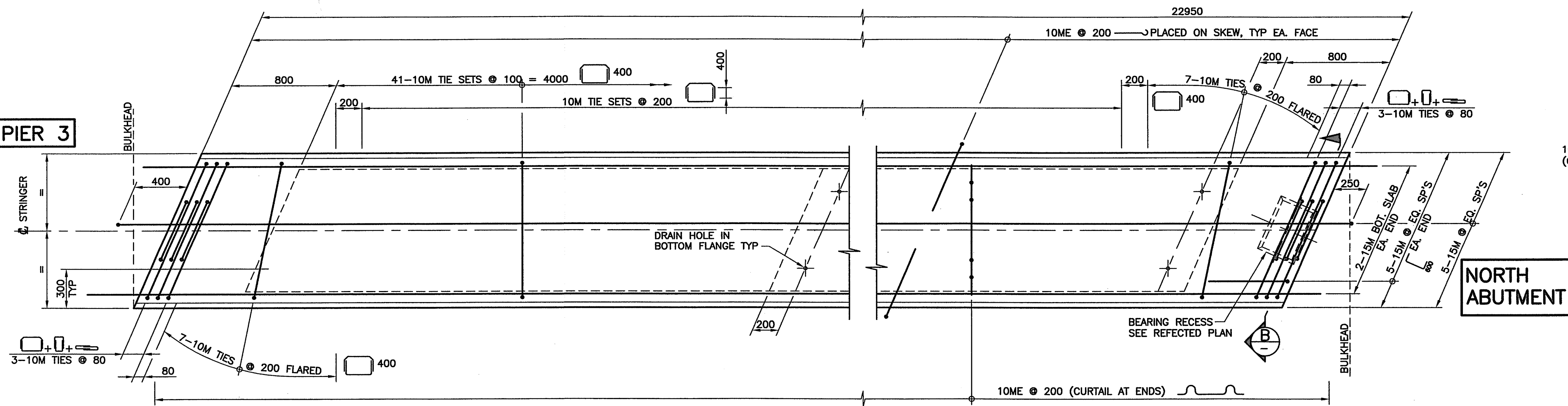
MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

1562 MT. LEHMAN UNDERPASS
CONCRETE BOX STRINGERS MK3
601908

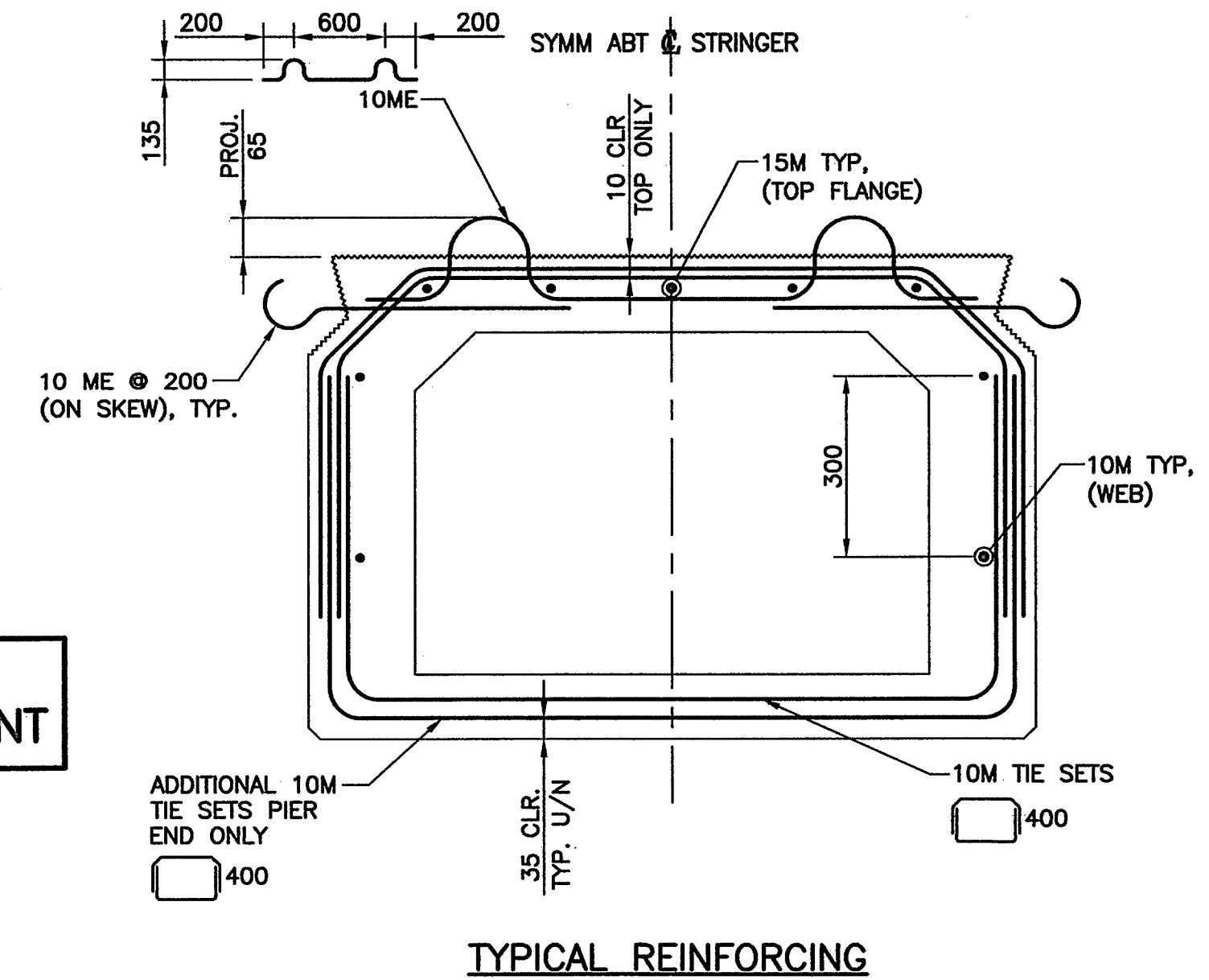
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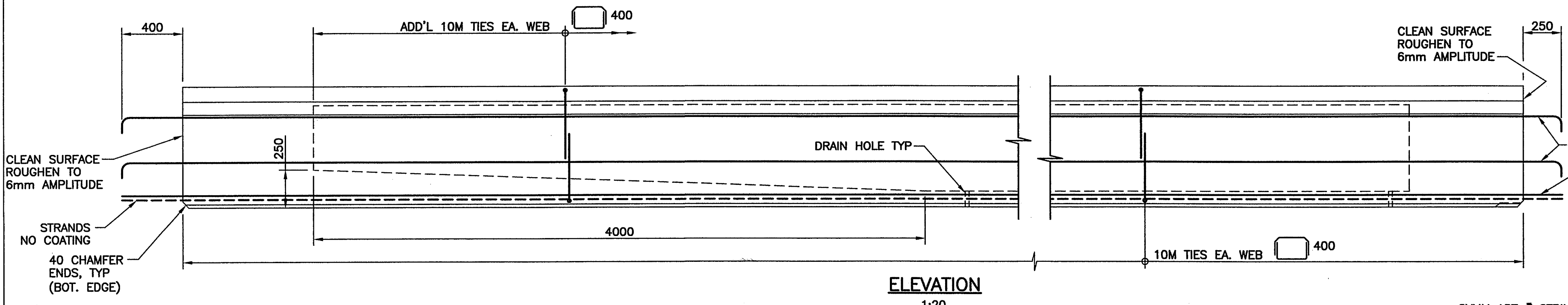
PIER 3



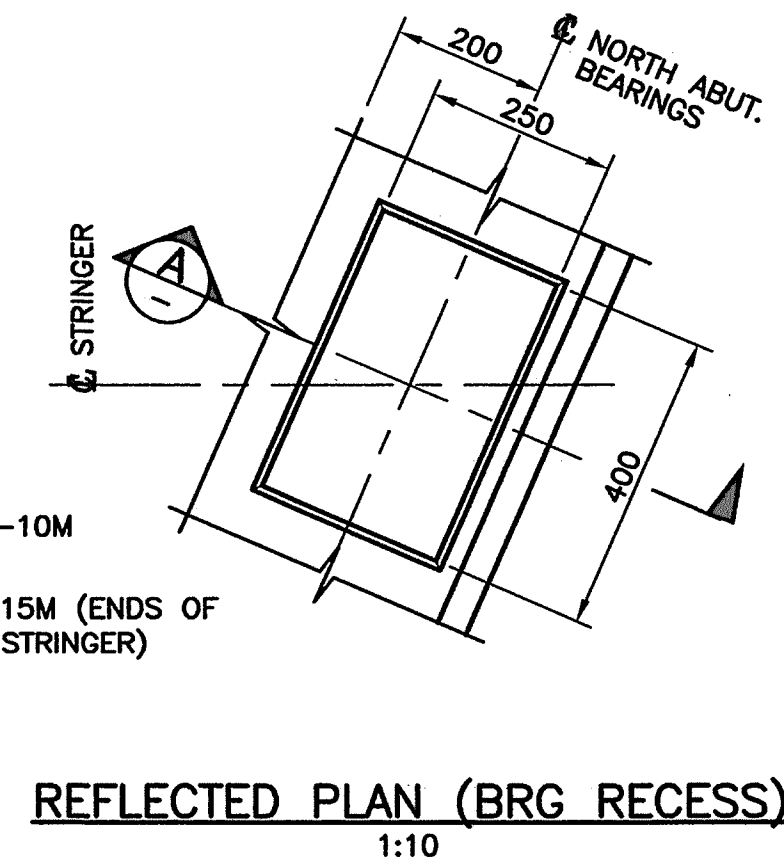
PLAN
1:20



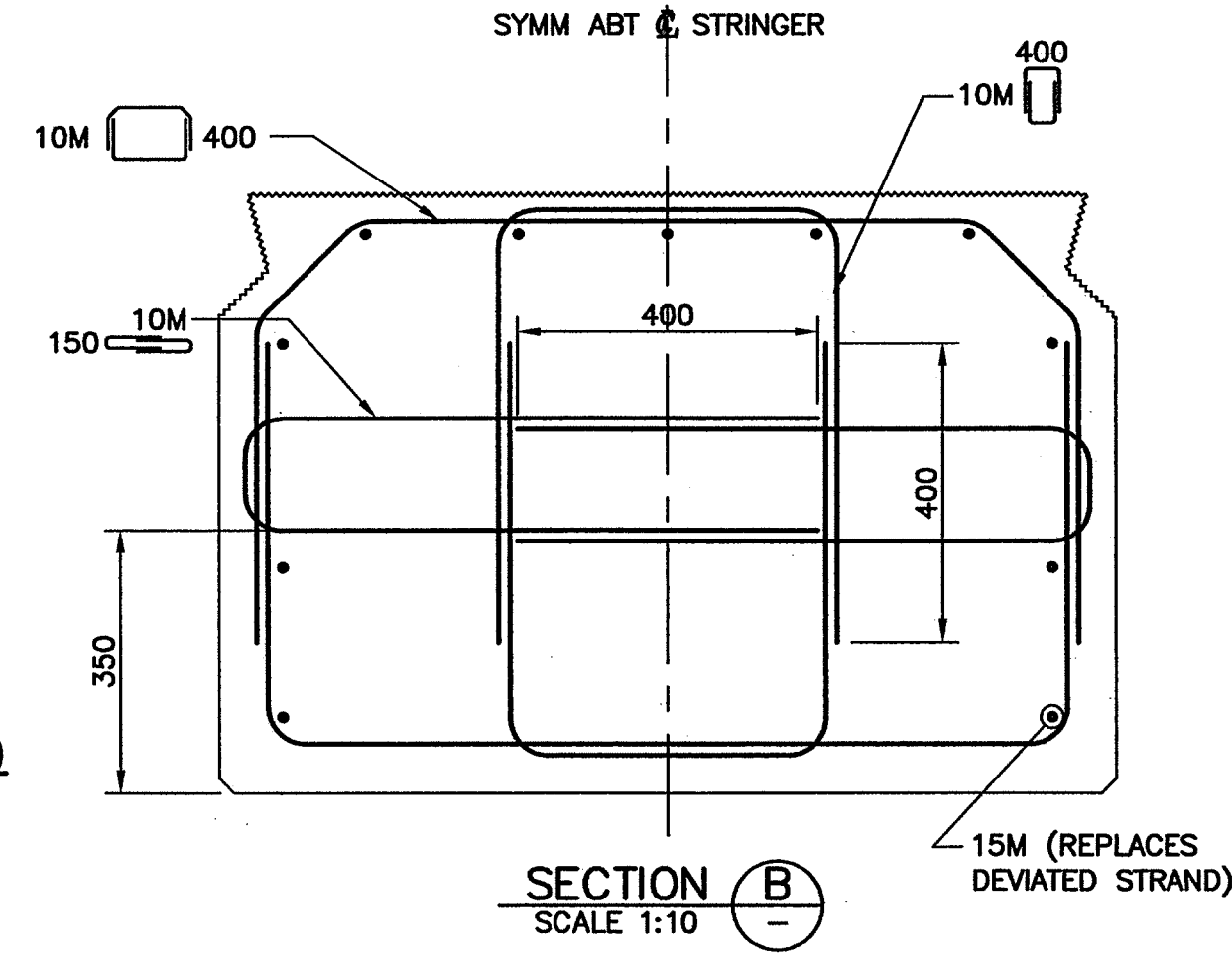
TYPICAL REINFORCING
1:10



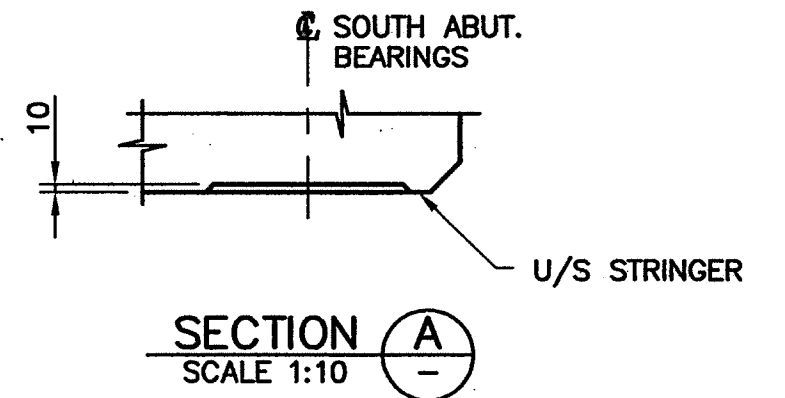
ELEVATION
1:20



REFLECTED PLAN (BRG RECESS)
1:10



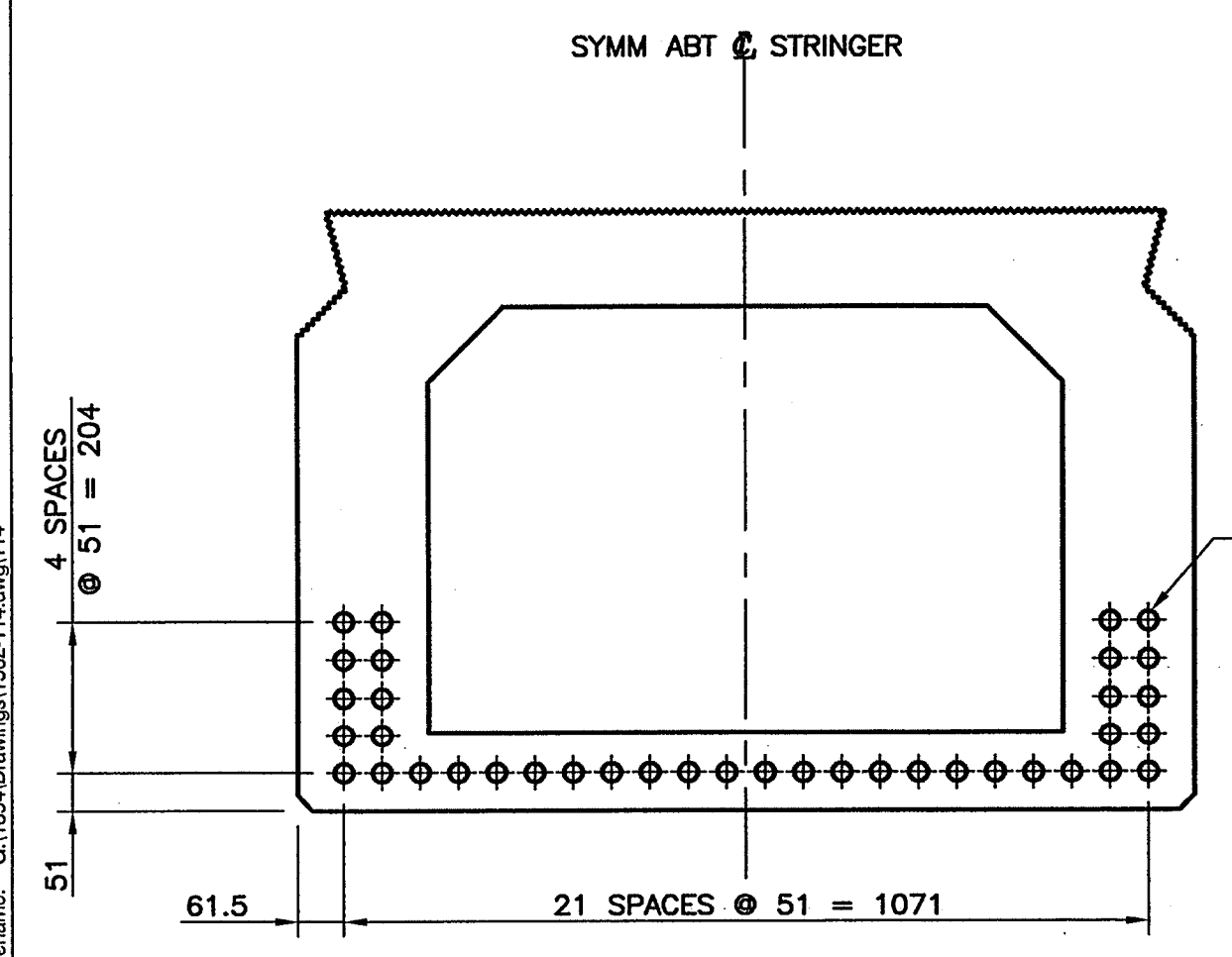
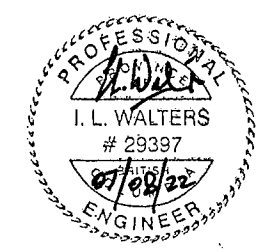
SECTION B
SCALE 1:10



SECTION A
SCALE 1:10

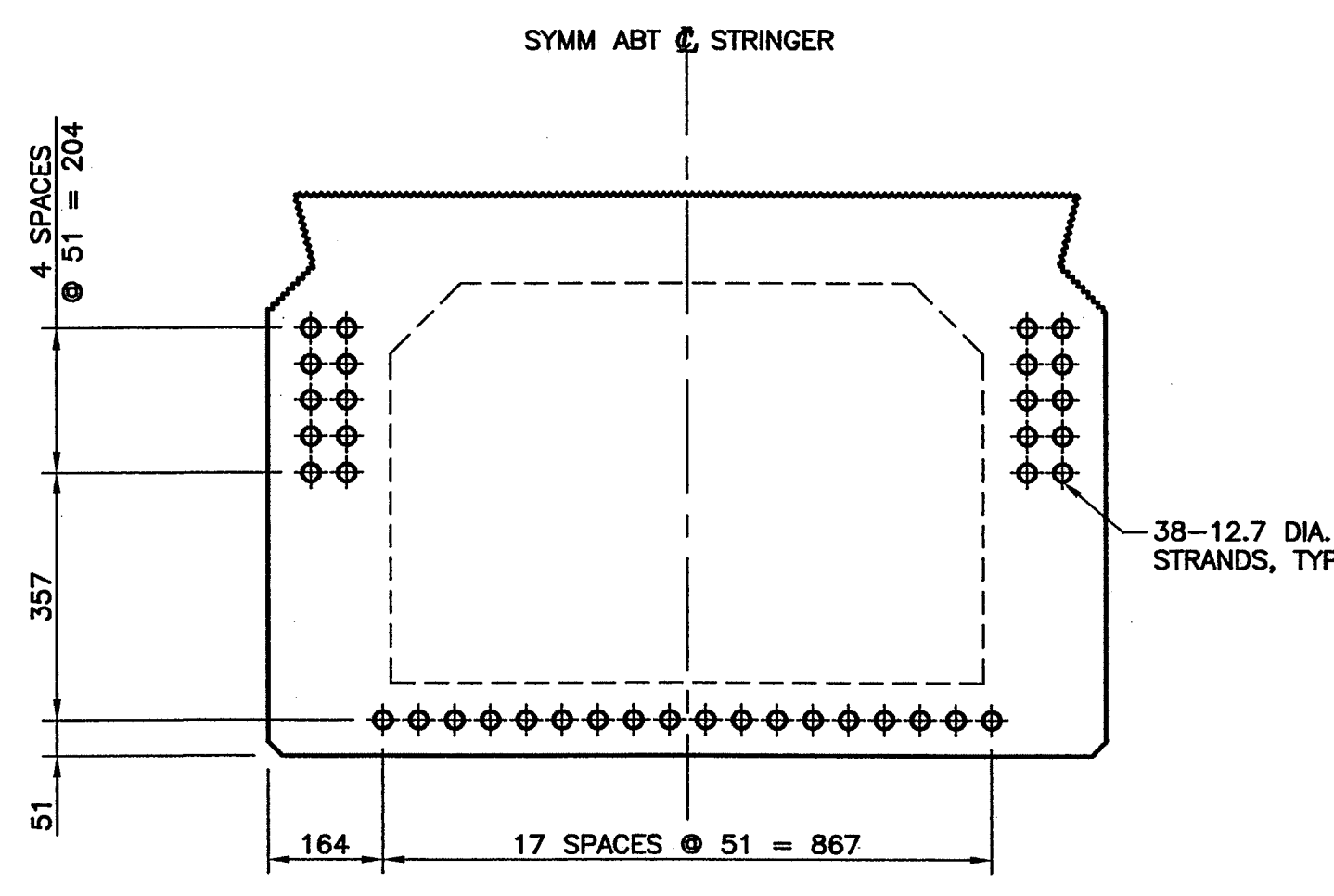
NOTES:

- FOR GENERAL NOTES SEE DRAWING 1562-101.
- FOR BOX STRINGER NOTES SEE DRAWING 1562-110.

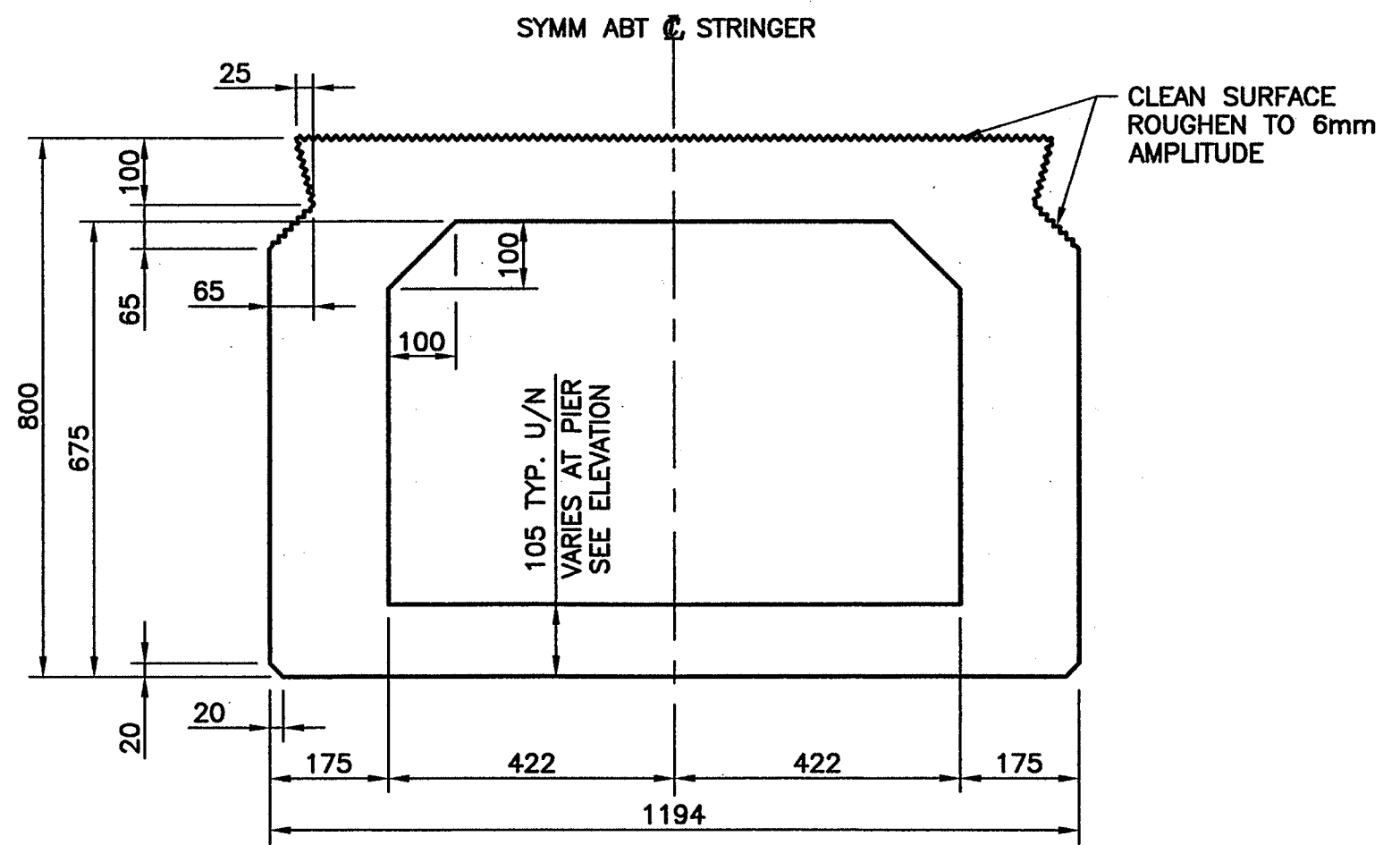


PRESTRESSING STRAND LAYOUT @ MIDSPAN
1:10

NOTE: STRANDS SHALL BE DEVIATED AT THIRD POINTS



PRESTRESSING STRAND LAYOUT @ BULKHEADS
1:10



TYPICAL CROSS SECTION
1:10

Rev	Date	Description	Initial	SCALE	DESIGNED	DATE	CHECKED	DATE	DRAWN	DATE
J				AS SHOWN	RC	04/09/30	ILW	04/09/30	IE	04/09/30
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A	07/08/22	RECORD DRAWINGS	ILW							

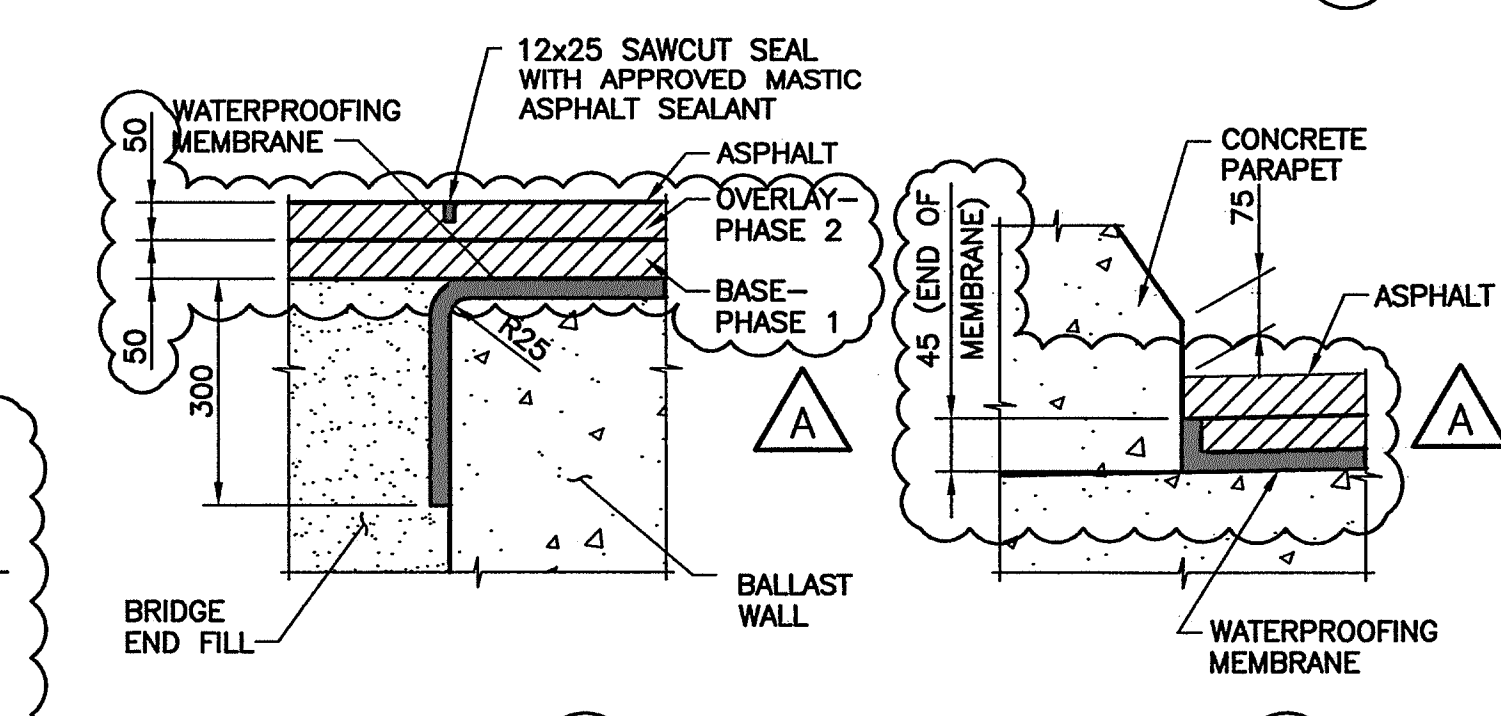
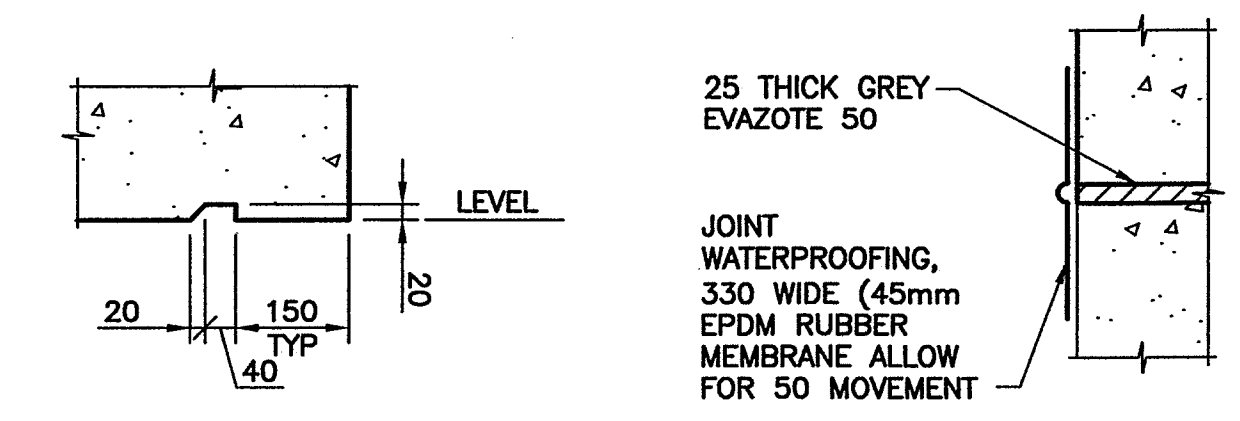
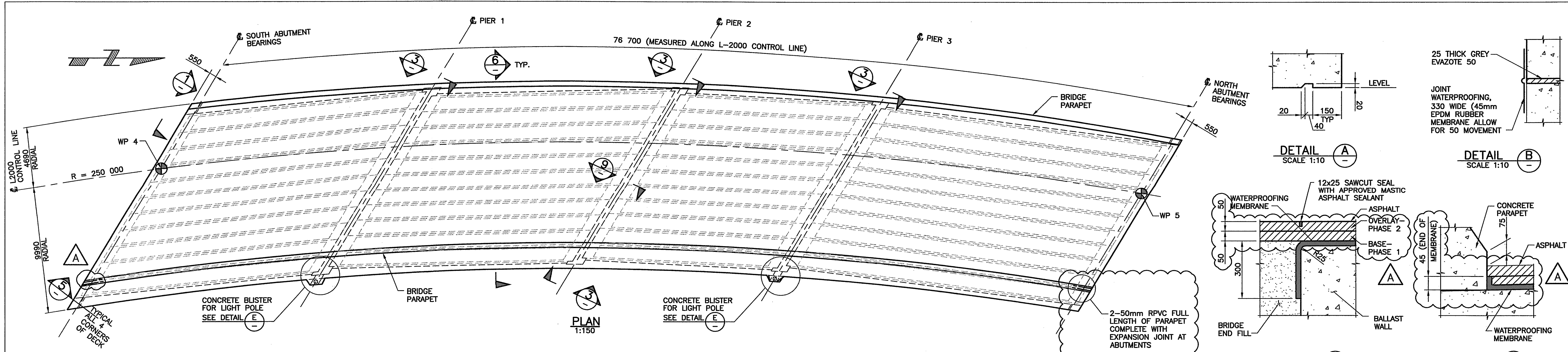
City of Abbotsford

MINISTRY OF TRANSPORTATION
SOUTH COAST REGION

1562 MT. LEHMAN UNDERPASS
CONCRETE BOX STRINGERS MK4

FILE No. 1 REGION 1 DRAWING No. 1562-114

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SUPERSTRUCTURE NOTES:

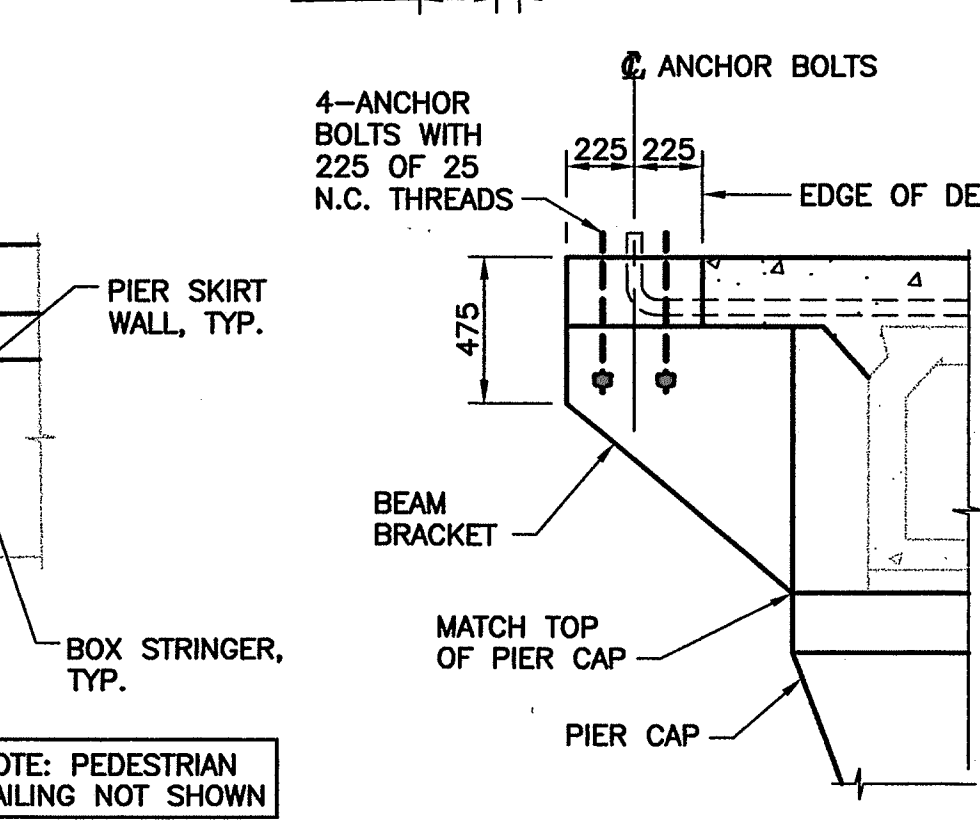
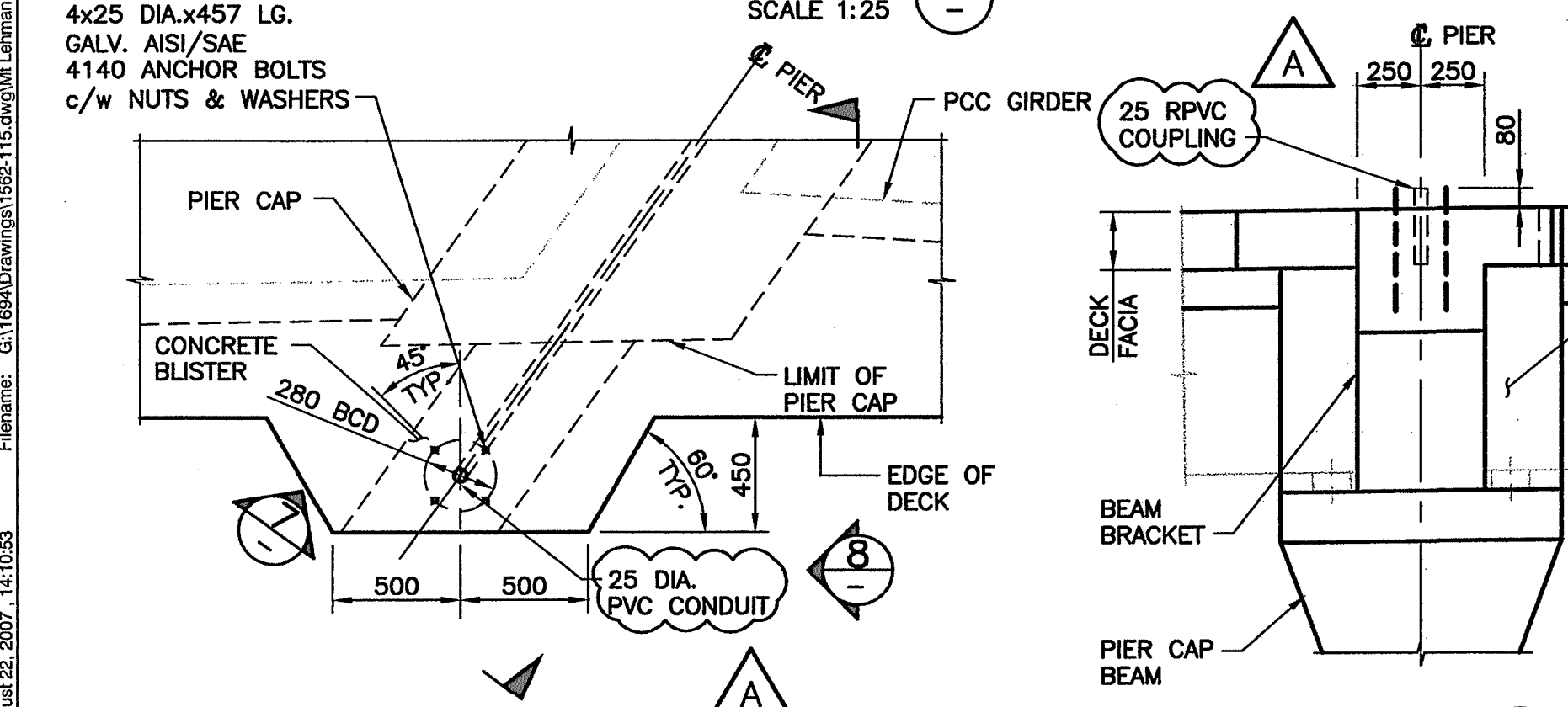
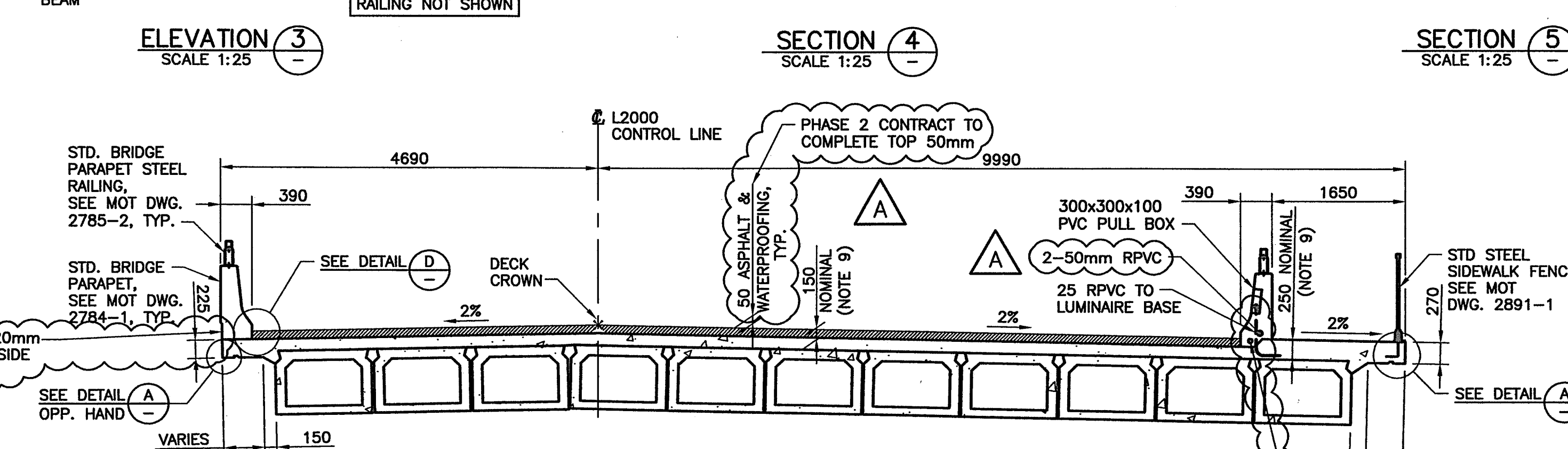
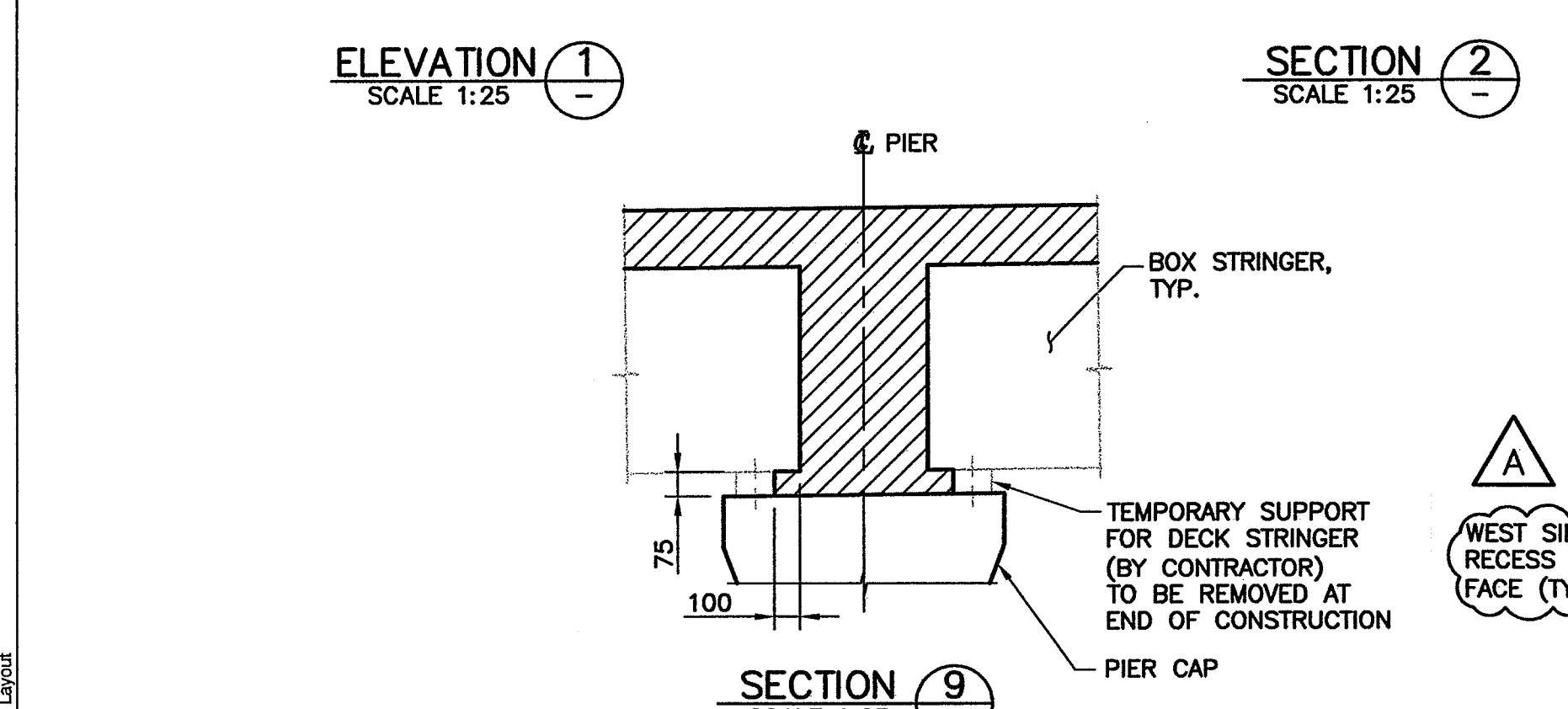
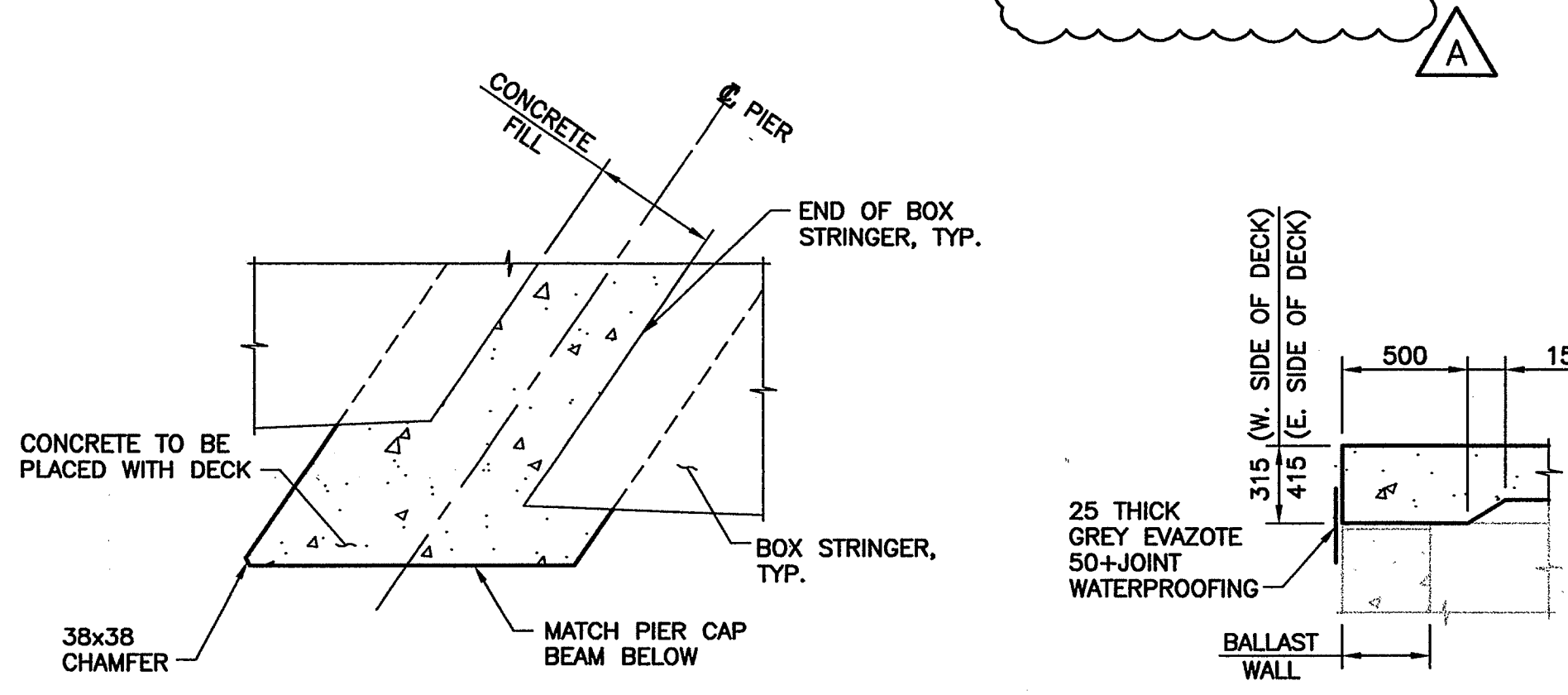
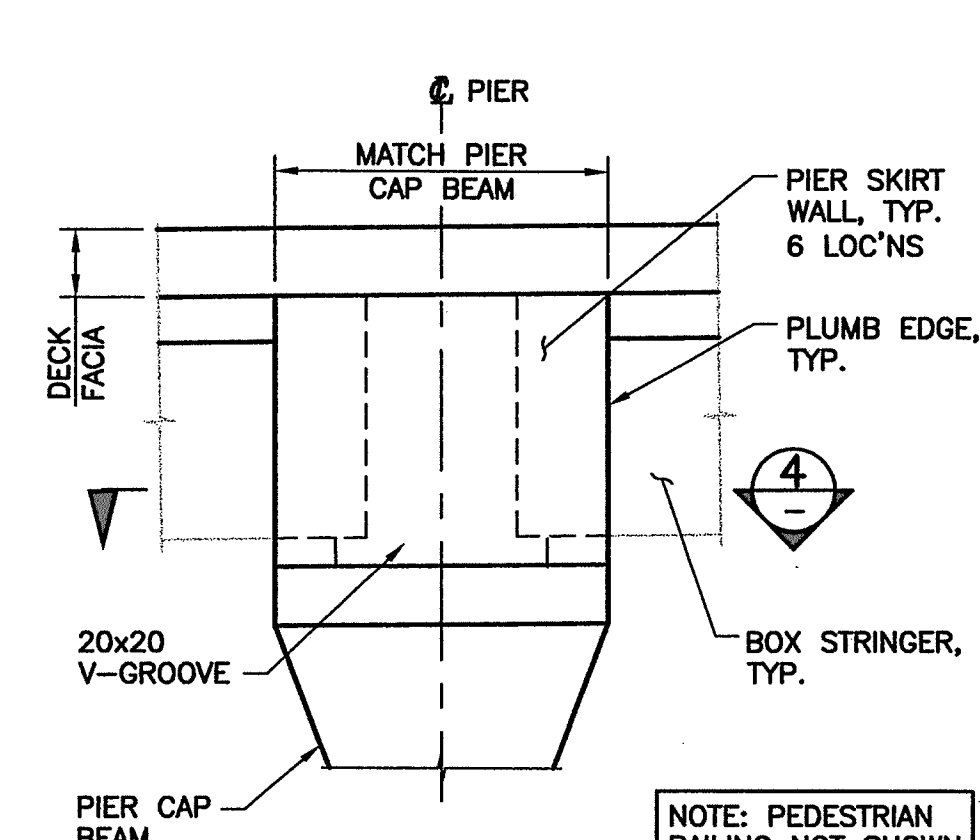
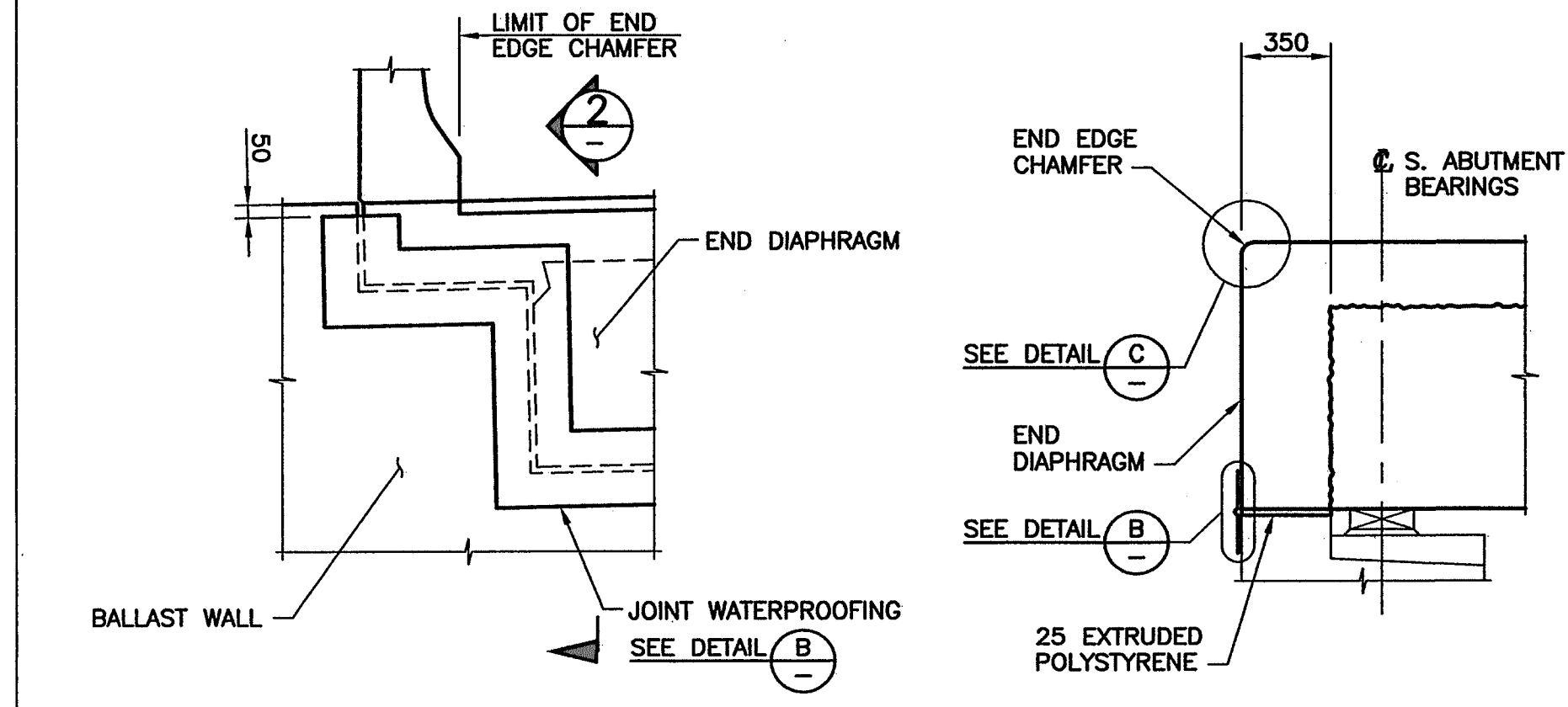
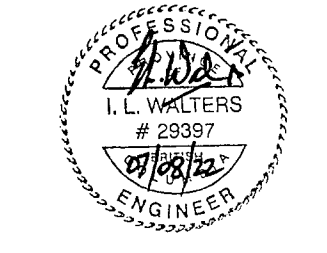
- CAST-IN-PLACE CONCRETE IN DECK AND PARAPETS SHALL BE HIGH PERFORMANCE CONCRETE (HPC) WITH MINIMUM COMPRESSIVE STRENGTH OF 35 MPa AT 28 DAYS.
- EXPOSED EDGES OF CONCRETE SHALL BE CHAMFERED 20mm UNLESS NOTED OTHERWISE.
- REINFORCING STEEL SHALL CONFORM TO CAN/CSA G30.18-M GRADE 400R. MAXIMUM YIELD STRENGTH 525 MPa.
- CLEAR COVER TO REINFORCING STEEL: TOP/DECK (WATERPROOFED): 70mm; BOTTOM/DECK: 50mm
- BARS DENOTED "ME" SHALL BE EPOXY COATED. TRANSVERSE BARS SHALL NOT BE SPLICED.
- LONGITUDINAL BAR SPLICES SHALL BE STAGGERED SO THAT NO MORE THAN 33% OF BARS ARE SPLICED AT ANY CROSS SECTION OF THE DECK.
- ALL LAPS OF REINFORCING BARS FOR SPLICES SHALL BE AS FOLLOWS UNLESS NOTED OTHERWISE.

BAR SIZE	UNCOATED	EPOXY COATED (B*)	EPOXY COATED (T**)
10M	400	450	600
15M	550	650	800
20M	650	750	1000

* "B" DENOTES VERTICAL BARS AND HORIZONTAL BARS WITH LESS THAN 300mm OF CONCRETE BELOW BARS.

** "T" DENOTES HORIZONTAL BARS WITH MORE THAN 300mm OF CONCRETE BELOW BARS.

- PARAPET CONCRETE SHALL BE PLACED ONLY AFTER DECK CONCRETE HAS ATTAINED A MINIMUM COMPRESSIVE STRENGTH OF 20MPa.
- DEFLECTION AND CAMBER WILL BE ACCOMMODATED BY SCREED ELEVATIONS SUPPLIED BY THE OWNER'S REPRESENTATIVE. DECK THICKNESS WILL VARY ACCORDINGLY.



Rev	Date	Description	Initial	SCALE
J				DESIGNED: GAN DATE: 04/09/30
I				CHECKED: ILW DATE: 04/09/30
H				DRAWN: CT/LMB DATE: 04/09/30
G				
F				
E	04/12/14	ISSUED FOR CONSTRUCTION	ILW	
D	04/11/03	ISSUED FOR TENDER	ILW	
C	04/09/30	100% ISSUE FOR REVIEW	ILW	
B	04/08/26	90% ISSUE FOR REVIEW	ILW	
A	07/08/22	RECORD DRAWINGS	ILW	04/06/22

REVISIONS	Date	ISSUE RECORD	Initial

City of Abbotsford

MINISTRY OF TRANSPORTATION SOUTH COAST REGION

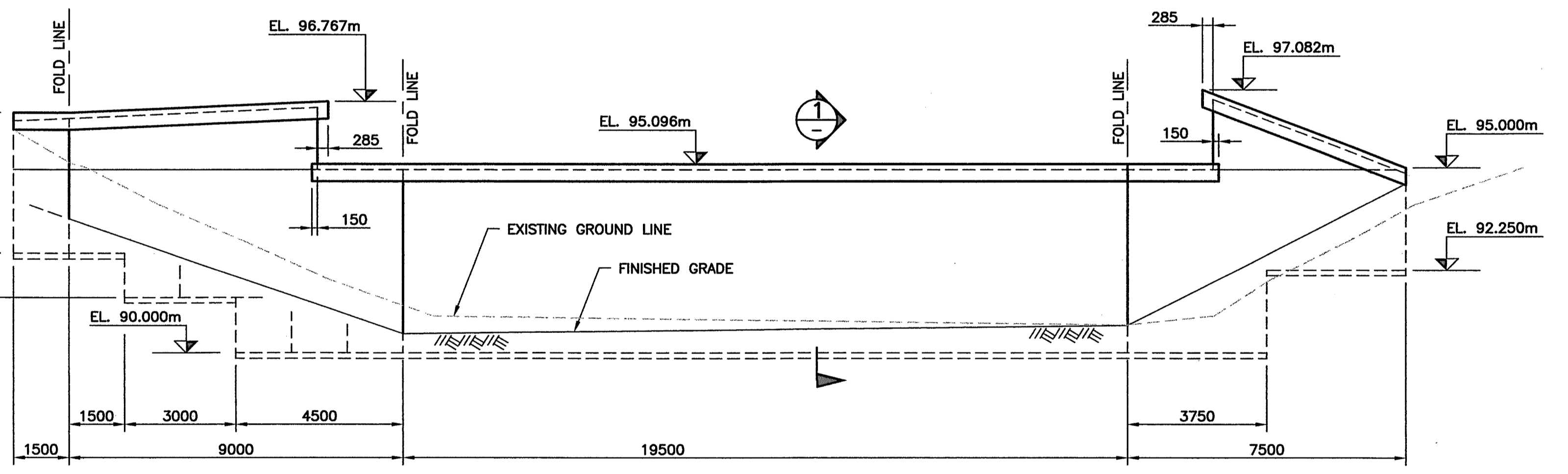
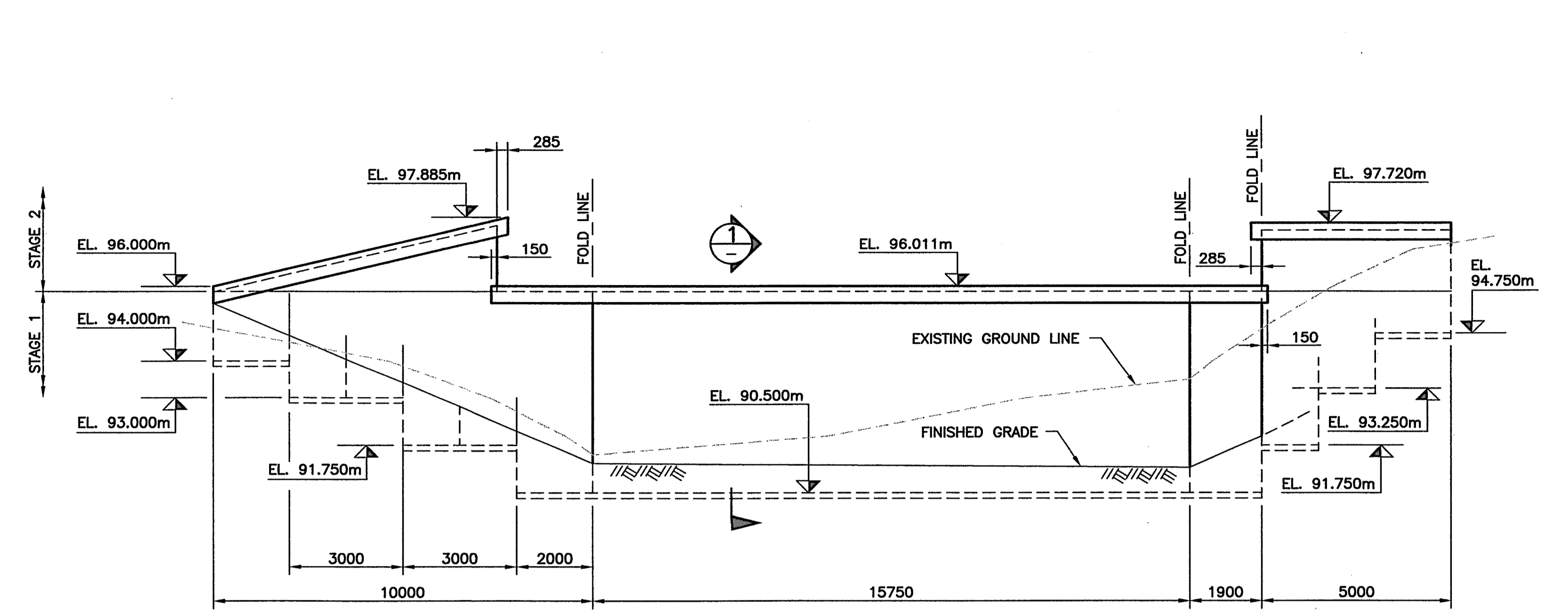
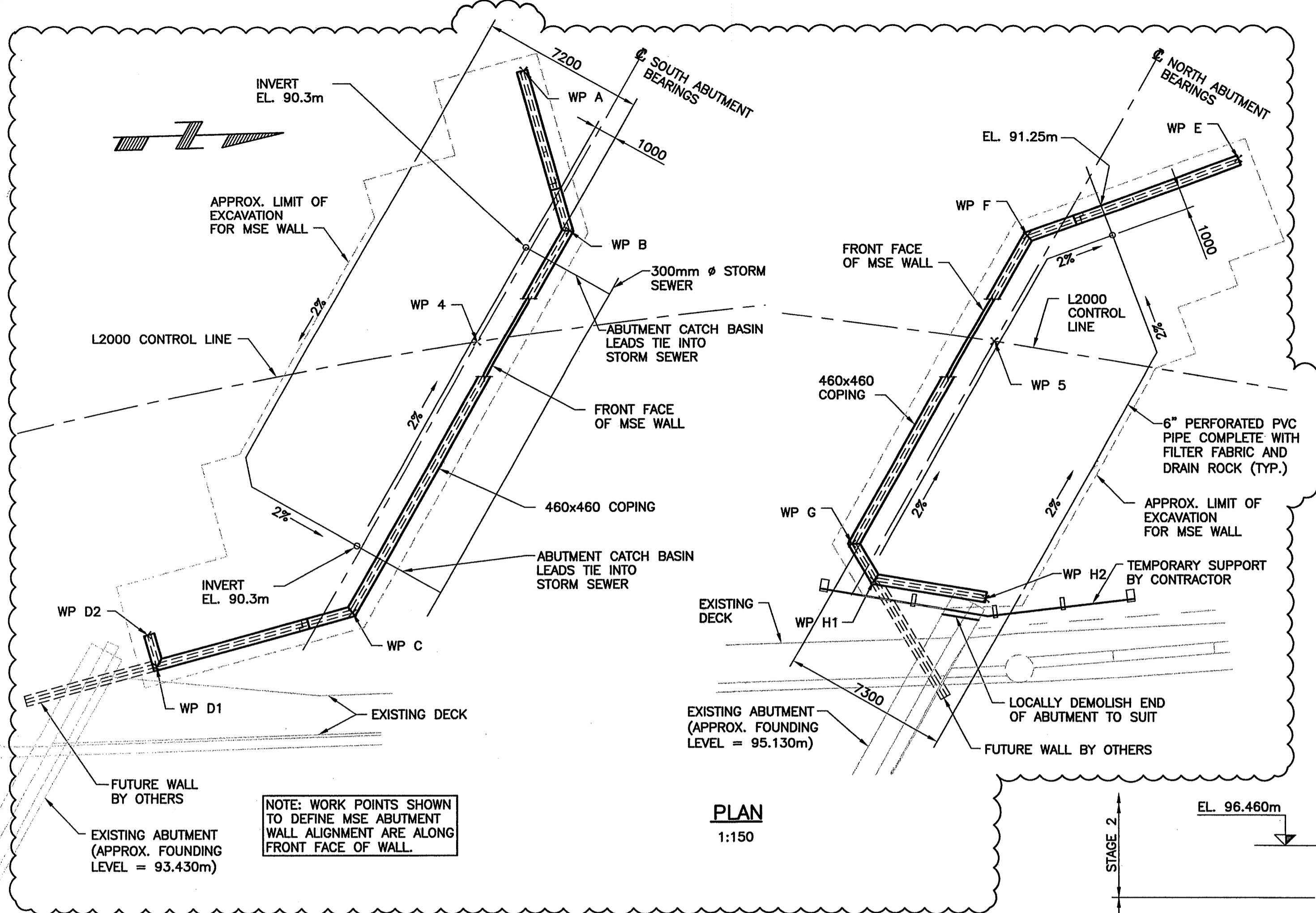
1562 MT. LEHMAN UNDERPASS DECK

601910

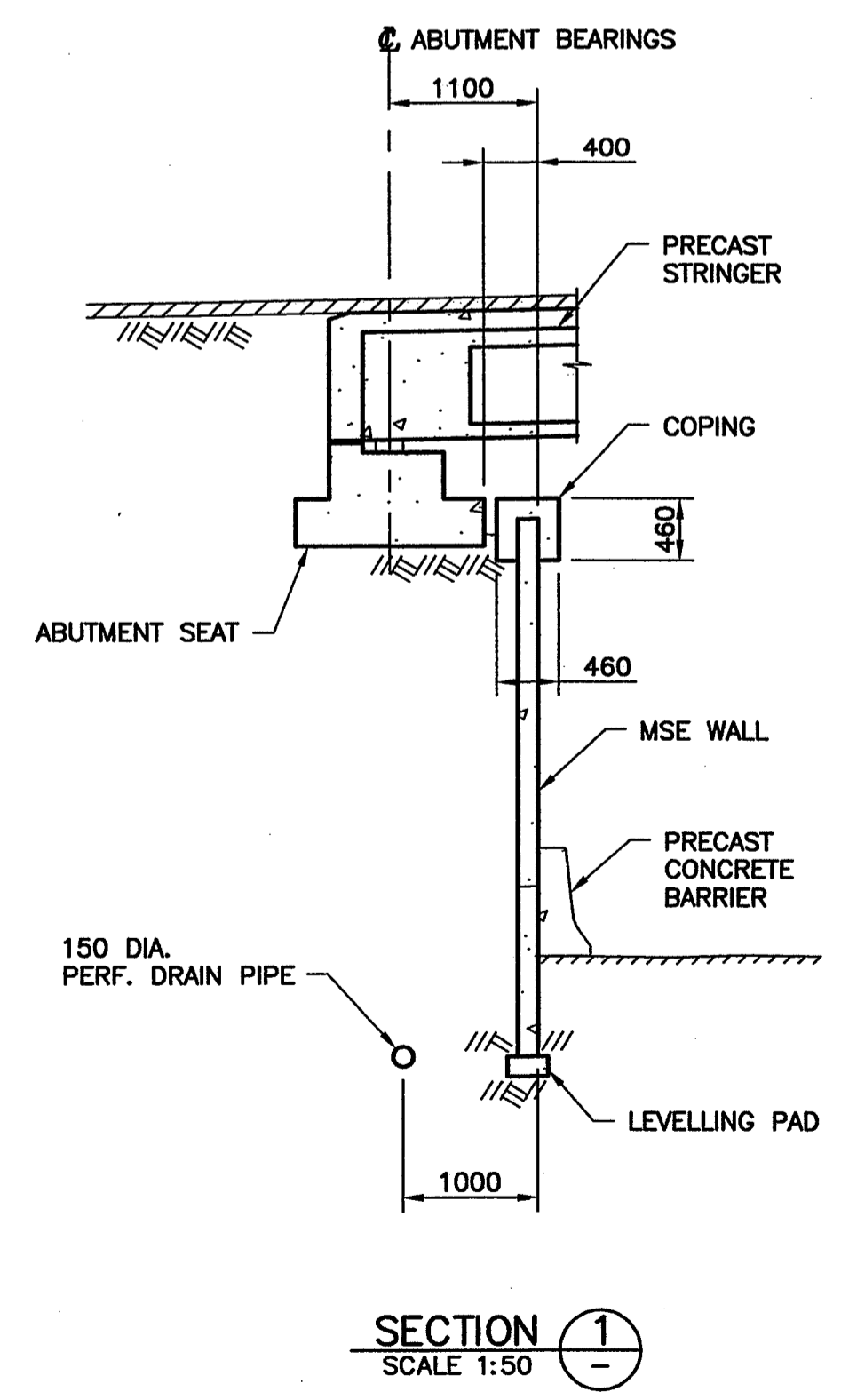
FILE No. **1** REGION **1** DRAWING No. **1562-115**

QUADLAND & TAYLOR Inc. Bridge Engineering

Plotter: August 22, 2007 14:10:53
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D2	35868.045	45501.261
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F	35860.886	45485.897
G	35852.793	45499.409
H1	35853.716	45501.070
H2	35858.626	45502.017

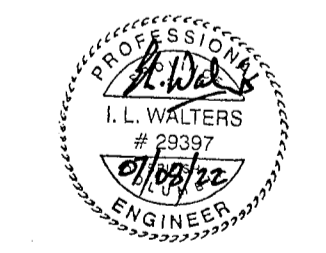


DESIGN CRITERIA:

- DESIGN CODE: CAN/CSA S6-00 AND AASHTO.
- BRIDGE LOADS AT U/S OF SEATING:
 - VERTICAL D.L. = 187 kN/m
 - VERTICAL L.L. = 97 kN/m
 - TRANSVERSE SEISMIC = 27 kN/m
 - LONGITUDINAL SEISMIC = 69 kN/m
 - HORIZONTAL BRAKING LOAD = 9 kN/m
- BACKFILL PROPERTIES:
 - $\phi = 38^\circ$
 - $\gamma = 21 \text{ kN/m}^3$
- CORROSION ALLOWANCE PER AASHTO (100 YEARS).
- ZONAL ACCELERATION RATIO (ABBOTSFORD) = 0.20
- FRONT FACE FINISH CLASS 3.

NOTES:

- FOR NOTES SEE DRAWING 1562-102.
- STAGE 2 WALLS SHALL BE CONSTRUCTED AFTER BALLAST WALLS AND APPROACH SLABS.
- ELEVATIONS ON DRAWINGS DO NOT ACCOUNT FOR FOUNDATION SETTLEMENTS. ELEVATIONS TO BE ADJUSTED FOR SETTLEMENT PREDICTIONS RESULTING FROM CONSTRUCTION MONITORING.



Rev	Date	Description	Initial	SCALE	DESIGNED	DATE	CHECKED	DATE	DRAWN	DATE
J				AS SHOWN	GM	04/09/30	ILW	04/09/30	CTI	04/09/30
I										
H										
G										
F										
E				04/11/23						
D				04/11/03						
C				04/09/30						
B	07/08/22	RECORD DRAWINGS	ILW	04/08/26						
A	04/12/14	APPROACH SLAB OMITTED, ISSUED FOR CONSTRUCTION	ILW	04/06/22						

City of Abbotsford

**MINISTRY OF TRANSPORTATION
SOUTH COAST REGION**

**1562 MT. LEHMAN UNDERPASS
MSE WALLS**

601912

FILE No. **DUCHELAN & TYLER** REGION **1** DRAWING No. **1562-117**

Filename: G:\1562\Drawings\1562-117.dwg\MT Lehman Layout
Printed: August 22, 2007, 14:11:51