

C-3280

RYMAD ENGINEERING

JOB SPRAY RIVER BRIDGE

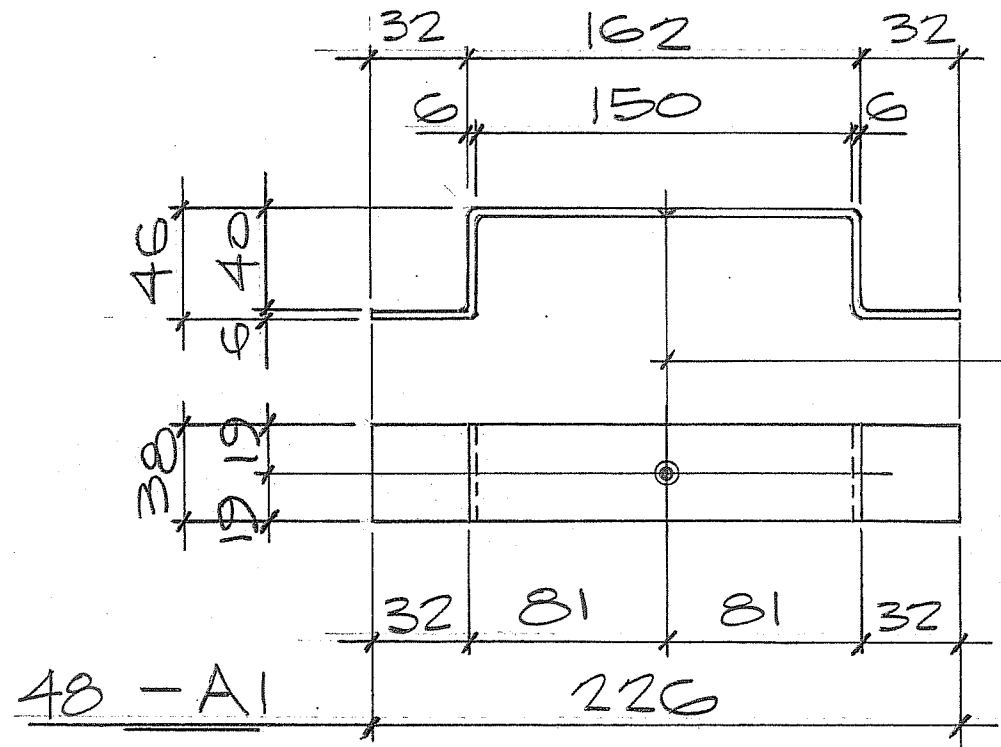
CUSTOMER _____

LOCATION _____

DWG	DESCRIPTION	MADE	CHK'D	SENT APPV'L	RET APPV'L	SENT APPV'L	RET APPV'L	QUANTITY	SHOP ISSUE	SHOP ISSUE	CUST ISSUE	CUST ISSUE					
E1		GHD		Nov. 21													
E2																	
E3																	
E4																	
E5																	
FB.1		GHD.															
ONE		GHD		Nov. 21					NOV 16/11	} SHOP WELDED TO BRIDGE							
2																	
3																	
4																	
5									NOV 21/11								
6									NOV 24/11								
7																	
8									NOV 23/11								
9									NOV 24/11								
10 (1 of 3)																	
(2 of 3)																	
(3 of 3)																	
11 (1 of 3)																	
(2 of 3)																	
(3 of 3)																	
LAST 12									NOV 23/11								

PLAIN MATERIAL

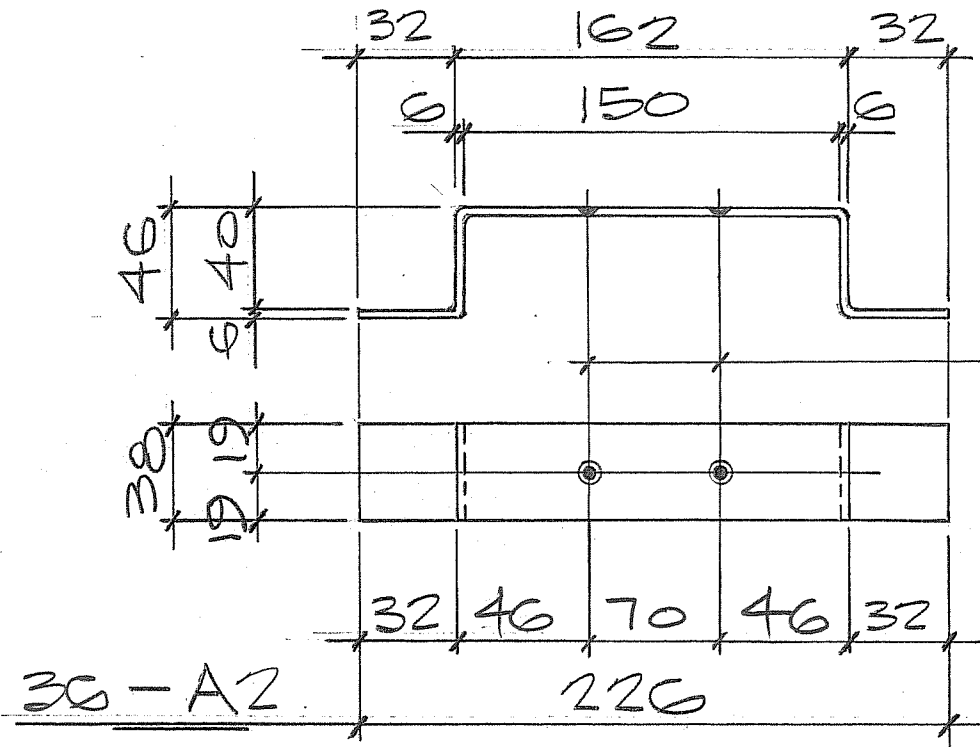
- 220 - FT 20 x 6 x 51 - B1
- 8 - FT 88 x 6 x 138 - C1
- 20 - FT 51 x 6 x 51 - D1



5/16" HOLE
COUNTERSINK FOR
4 SCREWS

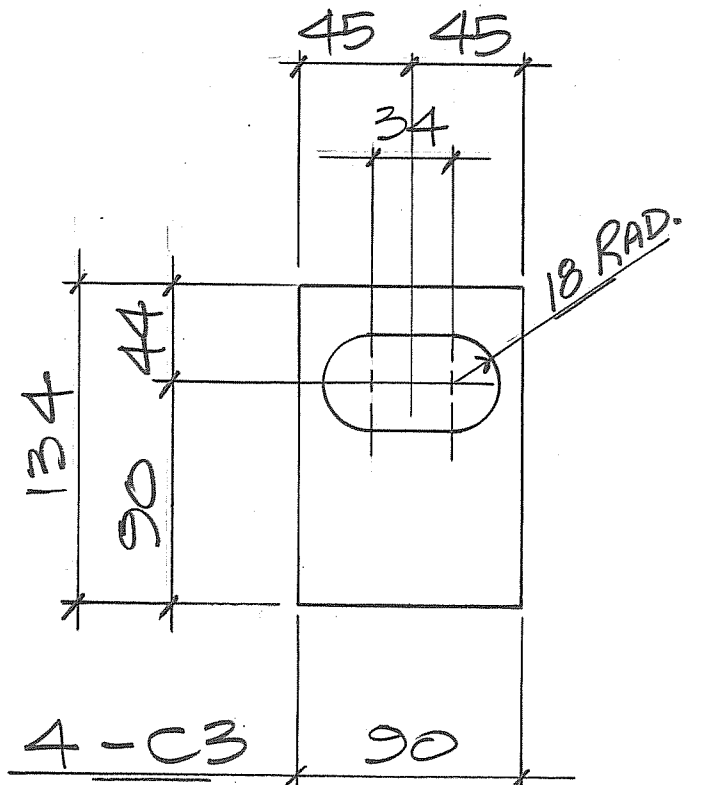
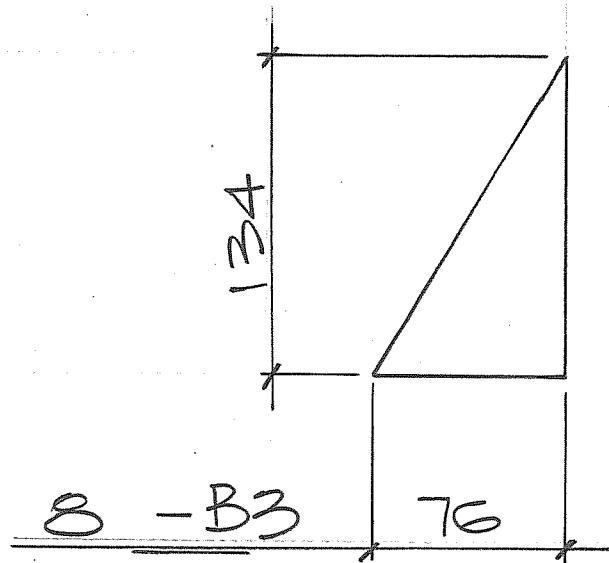
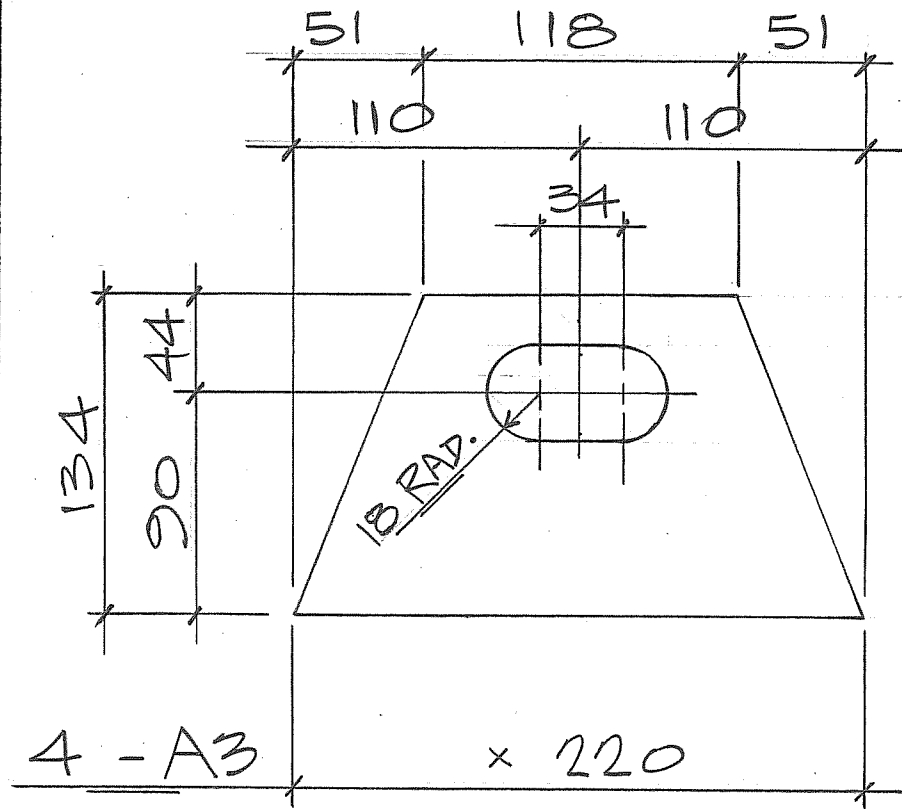
HOLES		ASNTD.		SHOP PAINT		THREE STAR STEEL (CALGARY) LTD.			
ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH	Weight Unit	Weight Total				
A1	48	FT 38 x 6	- 294 (±)			(BENT)	SPRAY RIVER BRIDGE BANFF NATIONAL PARK	CLAMP BENT FT. BRKTS. TYPE "B"	SHOP NOV 16 2011 ISSUED
B1	220	FT 20 x 6	- 51						
C1	8	FT 88 x 6	- 138			(FIT)		Rymad Engineering Inc.	
D1	20	FT 51 x 6	- 51						

DWN. BY: GHD DATE: NOV. 11 JOB No. C-3280
 CKD. BY: DATE: DWG No. ONE REV 1



- 5/16" HOLES
 - COUNTERSINK FOR
 1/4" SCREWS

HOLES		ASNTD.		SHOP PAINT		THREE STAR STEEL (CALGARY) LTD.			
ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH	Weight Unit	Weight Total				
A2	36	PLT 38 x 6	-294(I)		(BENT)	DESCRIPTION: SPRAY RIVER BRIDGE BANFF NATIONAL PARK		SHOP NOV 16 2011	ISSUED
						DETAIL: CLAMP BENT PLT BRKTS. TYPE "A"			
						PURCHASER: RYMAD ENGINEERING INC.			
						DWN. BY: GHD	DATE: NOV. 11	JOB No.	
						CKD. BY:	DATE:	C-3280	DWG No. 2
									REV



HOLES AS NTD. SHOP PAINT

ASS'BY MARK	NO. OF PIECES	DESCRIPTION	LENGTH		Weight Unit	Weight Total
A3	4	RT 134 x 6	-	220		(SHAPE)
B3	8	RT 76 x 6	-	134		↓
C3	4	RT 90 x 6	-	134		

THREE STAR STEEL (CALGARY) LTD.

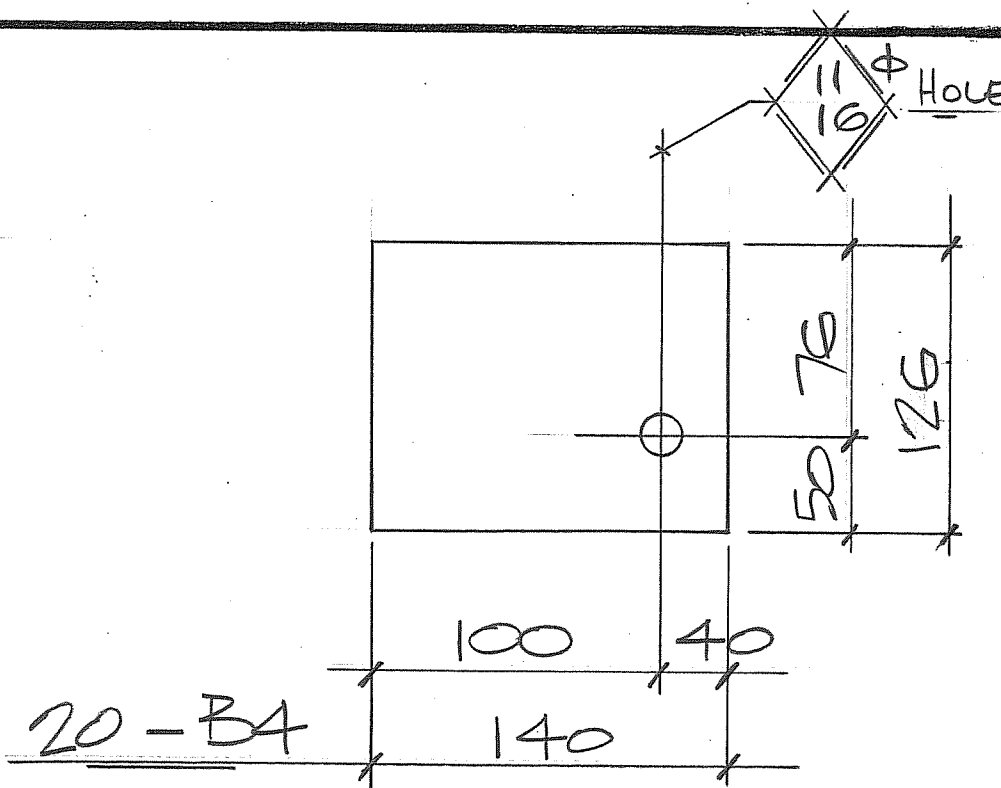
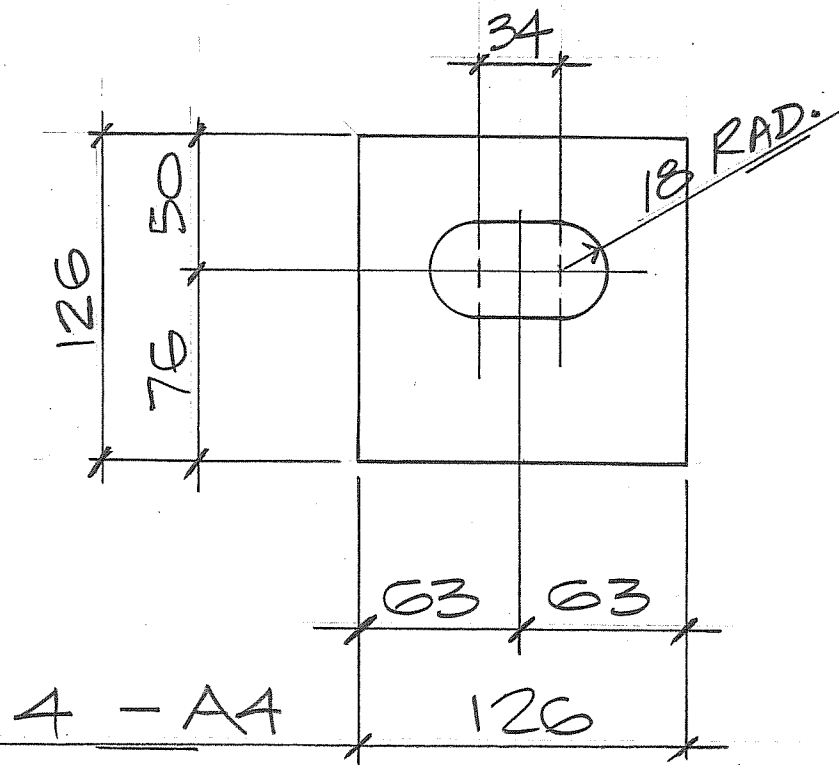
DESCRIPTION: SPRAY RIVER BRIDGE
BANFF NATIONAL PARK

DETAIL: ABUTMENT #2 BRG. RTS.

PURCHASER: RYMAD ENGINEERING INC.

SHOP
NOV 16 2011
ISSUED

DWN. BY: GHD	DATE: Nov. 11	JOB No. C-3280	DWG No. 3	REV. 1
CKD. BY:	DATE:			



20 - BA

4 - AA

126

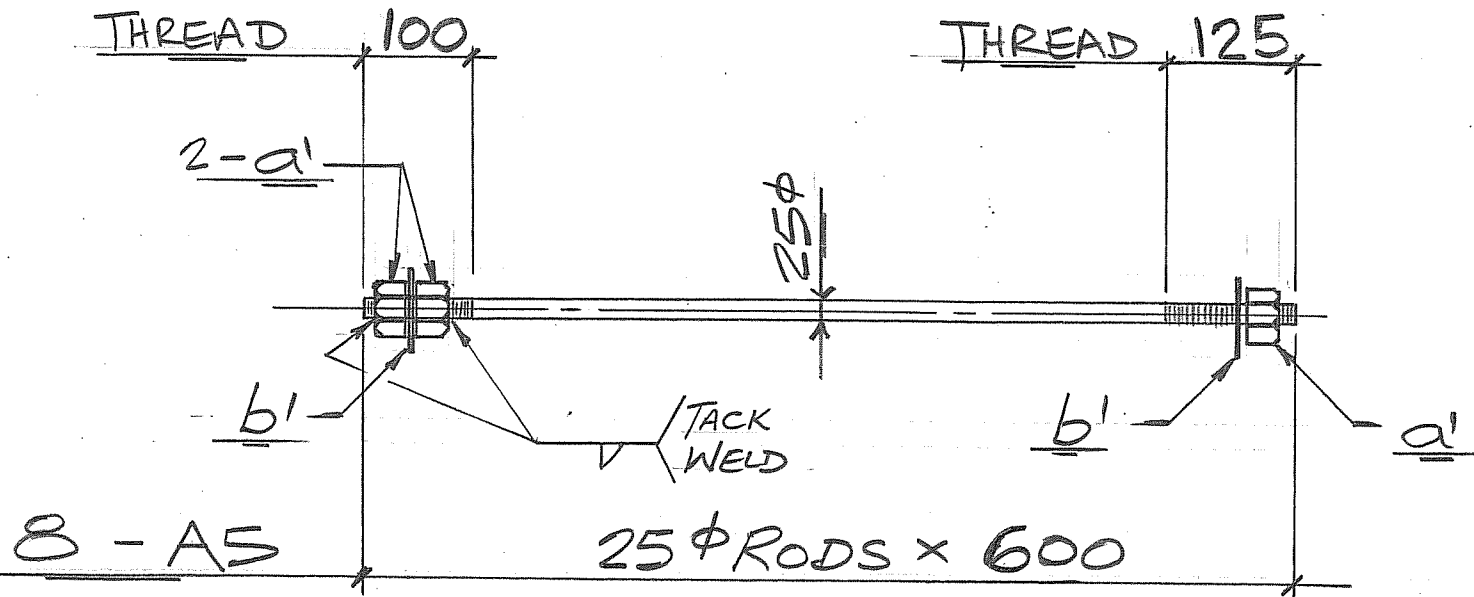
HOLES AS NTD.		SHOP PAINT		LENGTH		Weight Unit	Weight Total
ASS'BLY MARK	NO. OF PIECES	DESCRIPTION					
AA	4	PT 126 x 6	-	126			
BA	20	PT 126 x 6	-	140			

THREE STAR STEEL (CALGARY) LTD.

DESCRIPTION: SPRAY RIVER BRIDGE
 BANFF NATIONAL PARK
 DETAIL: BOT. ABUTMENT
 CHORD P.TE. - #2
 PURCHASER:
 RYMAD ENGINEERING INC.

SHOP
 NOV 16 2011
ISSUED

DWN. BY: GHD	DATE: Nov. 11	JOB No.	DWG. No.	REV.
CKD. BY:	DATE:	C-3280	4	⚠



HOLES		SHOP PAINT			
ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH	Weight Unit	Weight Total
A5	8	25φ 4140 HEAT-TREATED ROD	- 600	1/2	(THR. 2.E.)
a'	24	25φ HEAVY HEX NUT		-	
b'	16	25φ STD. WASHERS		-	

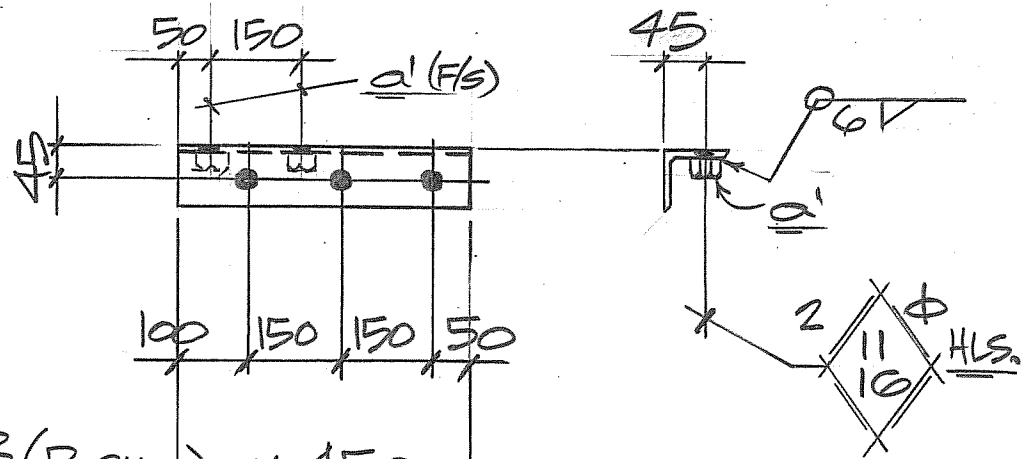
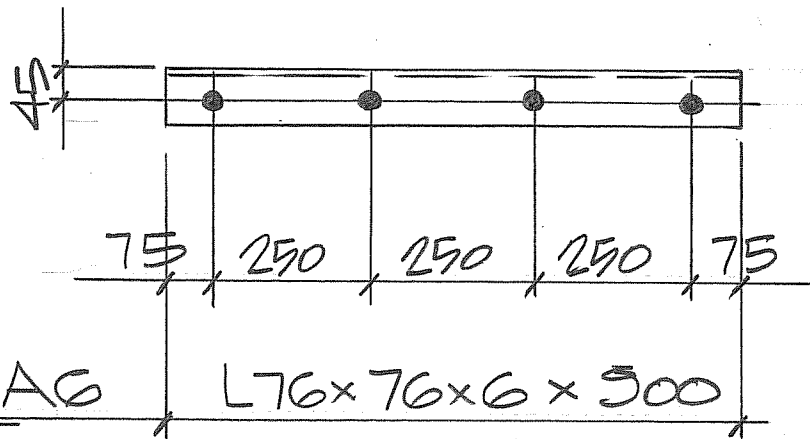
THREE STAR STEEL (CALGARY) LTD.

DESCRIPTION: SPRAY RIVER BRIDGE
 BANFF NATIONAL PARK
 DETAIL: TYPE #1 & #2
 ANCHOR BOLTS.
 PURCHASER:
 RYMAD ENGINEERING INC.

SHOP
 NOV 21 2011
ISSUED

DWN. BY: GHD DATE: Nov. 11 JOB No. C-3280
 CKD. BY: DATE:

DWG No. 5 REV.



5φ FIELD BOLTS
20 - 3/2φ HILTI HIT-TZ
(HY-150 MAX.) ANCHOR

3φ
4

⚠ REV^D NUT & HOLE DIA. ~ NOV. 25/11

HOLES ~~U/N~~ SHOP PAINT —

ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH		Weight Unit	Weight Total
AG	2	L76x76x6	—	900		29
BG ^R	2	L76x76x6	—	450		14
BG ^L	2	—do—	—	450		14
a'	8	5/8φ GR.2 HEX NUT CAD.F.P.				—
						57

THREE STAR STEEL (CALGARY) LTD.

DESCRIPTION: SPRAY RIVER BRIDGE
BANFF NATIONAL PARK

DETAIL: ABUTMENT #1 & #2 ANGLES

PURCHASER: RYMAD ENGINEERING INC.

DWN. BY: GHD

DATE: Nov. 11

JOB No.

C-3280

CKD. BY:

DATE:

SHOP

NOV 24 2011

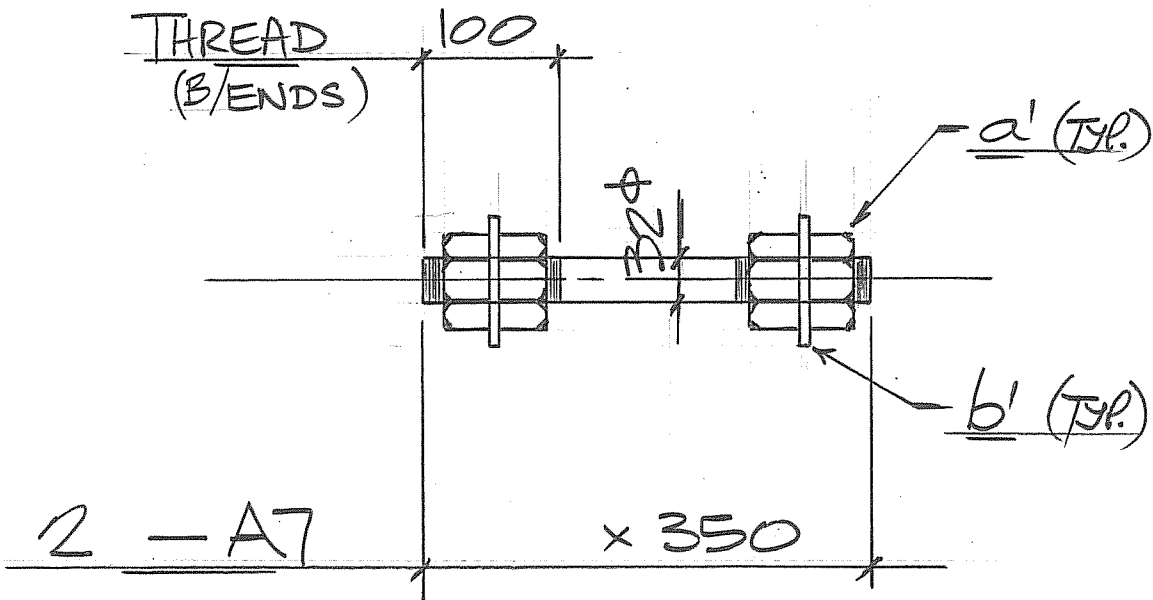
ISSUED

DWG No.

6

REV.



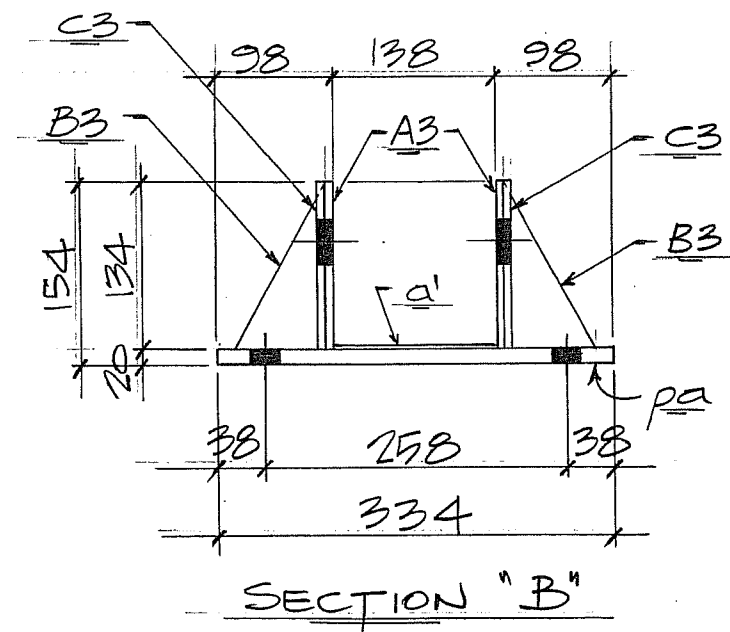
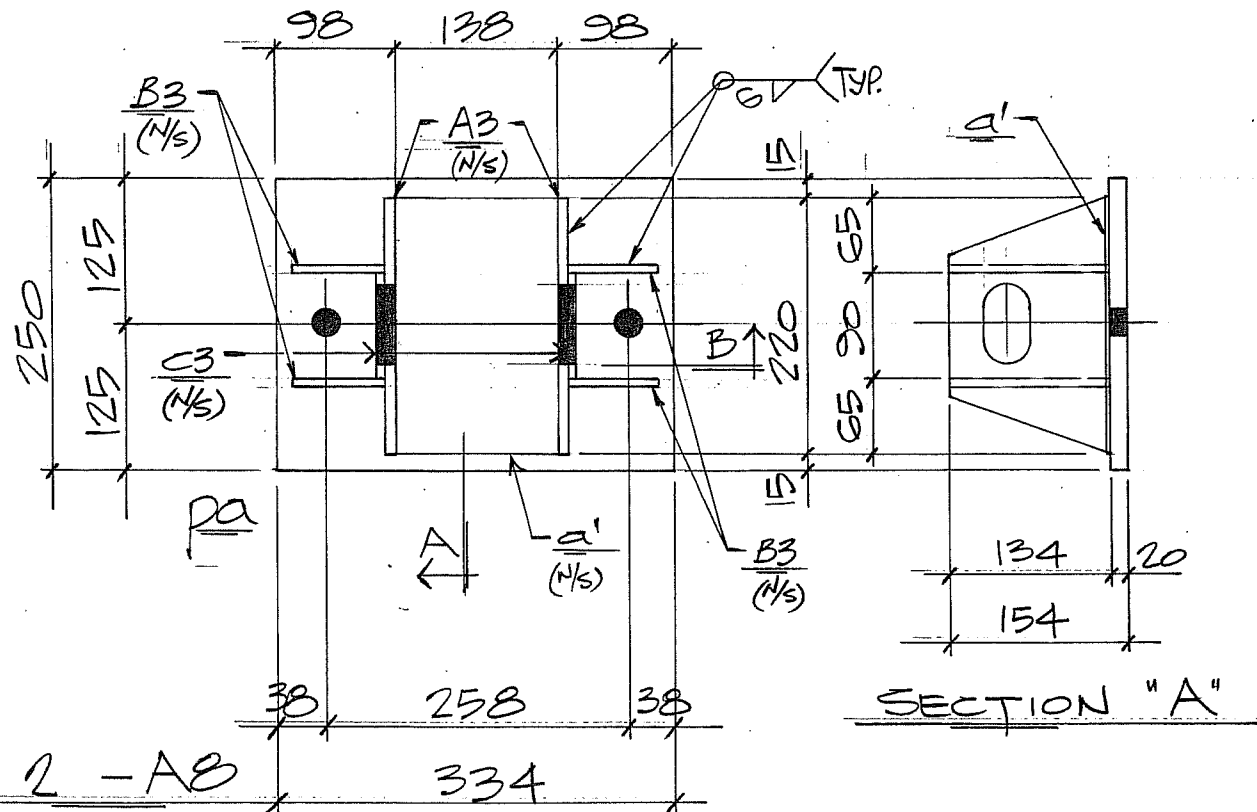


HOLES		SHOP PAINT		THREE STAR STEEL (CALGARY) LTD.			
ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH	Weight Unit	Weight Total		
A7	2	32φ (4140) HEAT-TREATED ROD.	350	10	(THR.2.E.)	DESCRIPTION: SPRAY RIVER BRIDGE BANFF NATIONAL PARK	
a	8	32φ HEAVY HEX NUT		-		DETAIL: ABUTMENT #2 PINS	
b	4	32φ WASHER		-		PURCHASER: RYMAD ENGINEERING INC.	
						DWN. BY: GHD	DATE: Nov. 11
						CKD. BY:	DATE:
						JOB No. C-3280	DWG. No. 7
							REV.

SHOP

NOV 24 2011

ISSUED



ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH	Weight	ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH	Weight
pa	2	FT 250 x 20	334	46					
a'	2	TEFLON PAD 138 x 2.3	220	3					
A3	4	FT 134 x 6	220	13					
B3	8	FT 76 x 6	134	9					
C3	4	FT 90 x 6	134	5					
				96					

HOLES 15φ
116φ

SHOP PAINT _____

THREE STAR STEEL (CALGARY) LTD.

DESCRIPTION: SPRAY RIVER BRIDGE
BANFF NATIONAL PARK

DETAIL: BASE FT
ABUTMENT #2 - ASSEMBLY

PURCHASER:
RYMAD ENGINEERING INC.

OWN. BY: GHD
CKD. BY:

DATE: Nov 11
DATE:

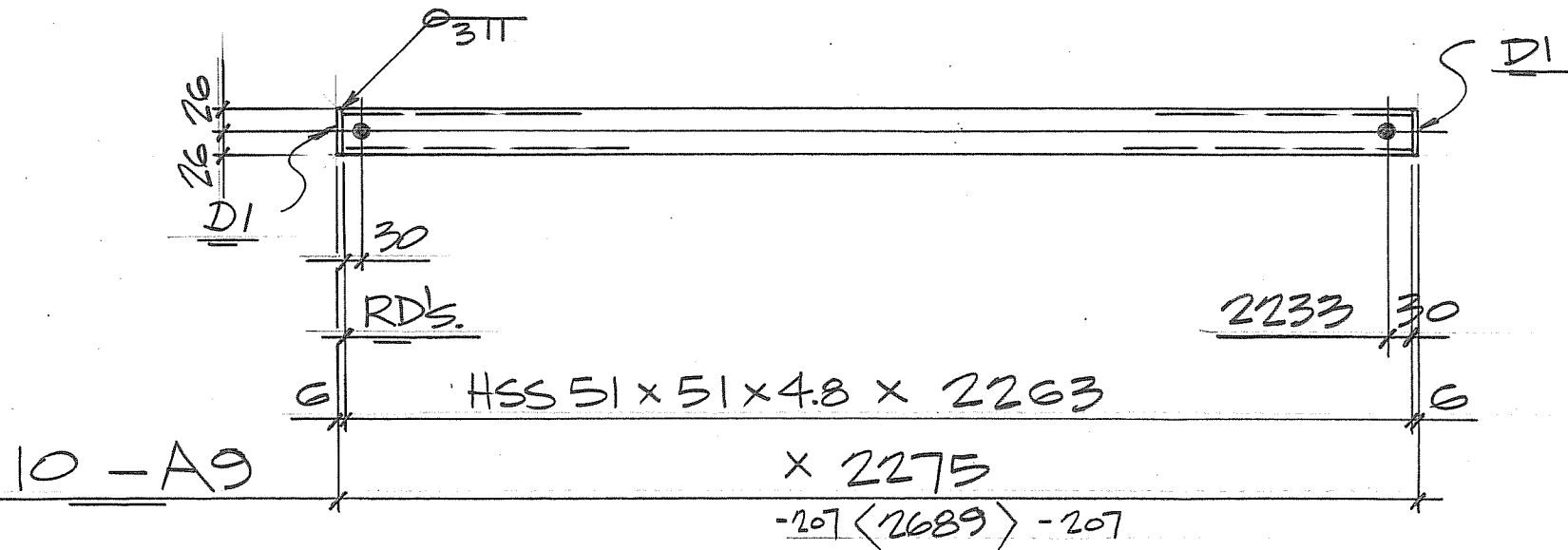
JOB No.
C-3280

SHOP

NOV 23 2011

ISSUED

DWG No. 8
REV

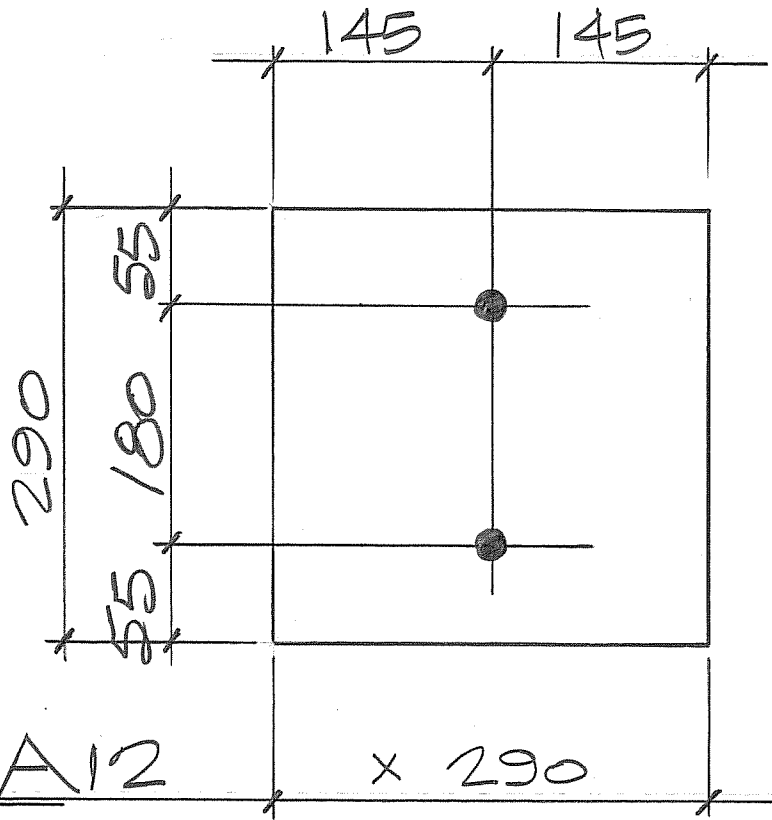


HOLES		SHOP PAINT		THREE STAR STEEL (CALGARY) LTD.				
ASS'BLY MARK	NO. OF PIECES	DESCRIPTION	LENGTH					Weight Unit
	10	A9					DESCRIPTION: SPRAY RIVER BRIDGE BANFF NATIONAL PARK	
	10	HSS 51 x 51 x 4.8	2263		321			DETAIL: BOT CHORD BRACING
DI	20	RT 51 x 6	- 51		6 (SEE DWG.#1)			
					327		DWN. BY: GHD DATE: Nov. 11	
							JOB No. C-3280	
							CKD. BY: DATE:	
							DWG No. 9	
							REV.	

SHOP

NOV 24 2011

ISSUED



HOLES		1 5/16 φ		SHOP PAINT				THREE STAR STEEL (CALGARY) LTD.			
ASS'BLY MARK	NO. OF PIECES	DESCRIPTION		LENGTH		Weight Unit	Weight Total				
A12	2	FET 290 x 20		- 290			56	DESCRIPTION: SPRAY RIVER BRIDGE BANFF NATIONAL PARK			
								PURCHASER: RYMAD ENGINEERING INC.			
								NOV 23 2011			
								DWG No. 12			
								△			