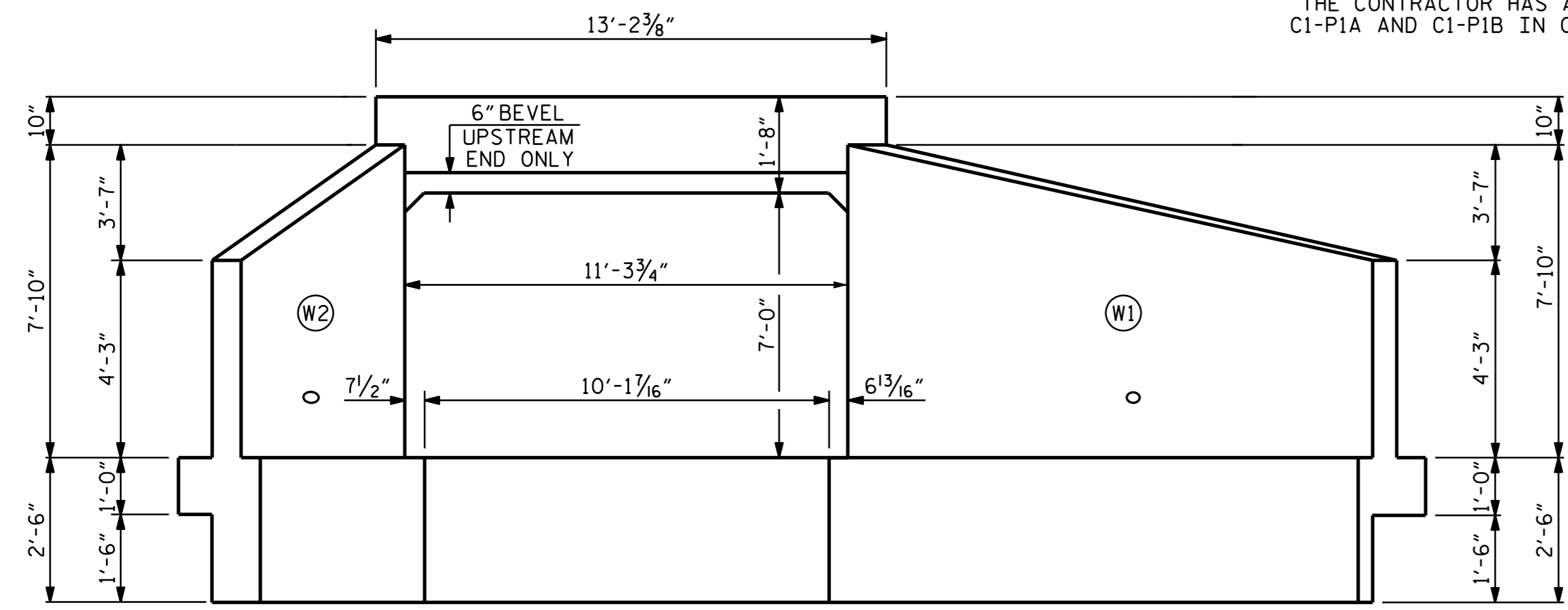


C1-P1B

C1-P1A

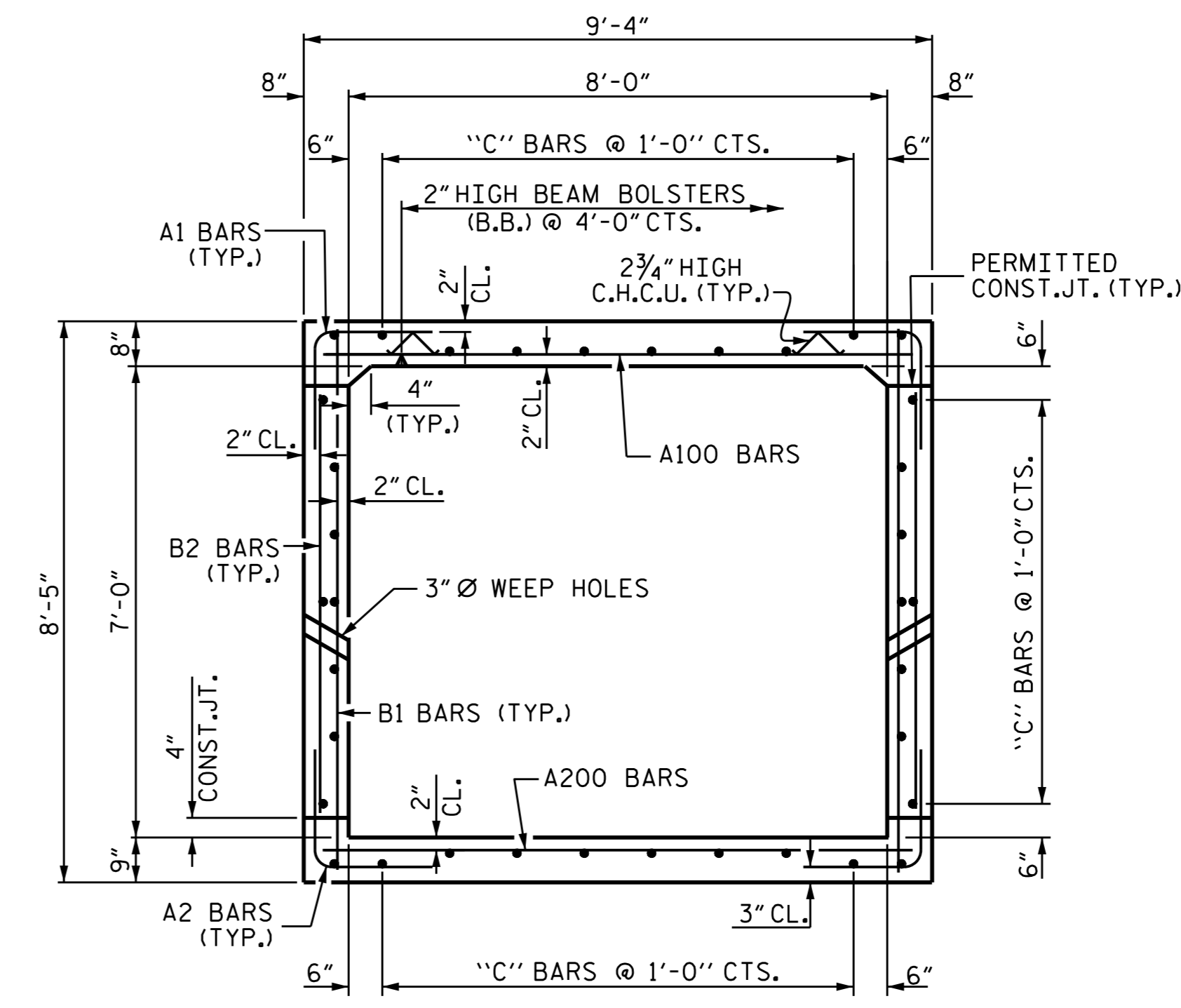
CULVERT SECTION ALONG CULVERT

FOR PIPES THRU EXTERIOR WALL, SEE WALL OPENING DETAILS.
THE CONTRACTOR HAS AN OPTION TO CONSTRUCT
C1-P1A AND C1-P1B IN ONE PHASE OR SEPARATELY.



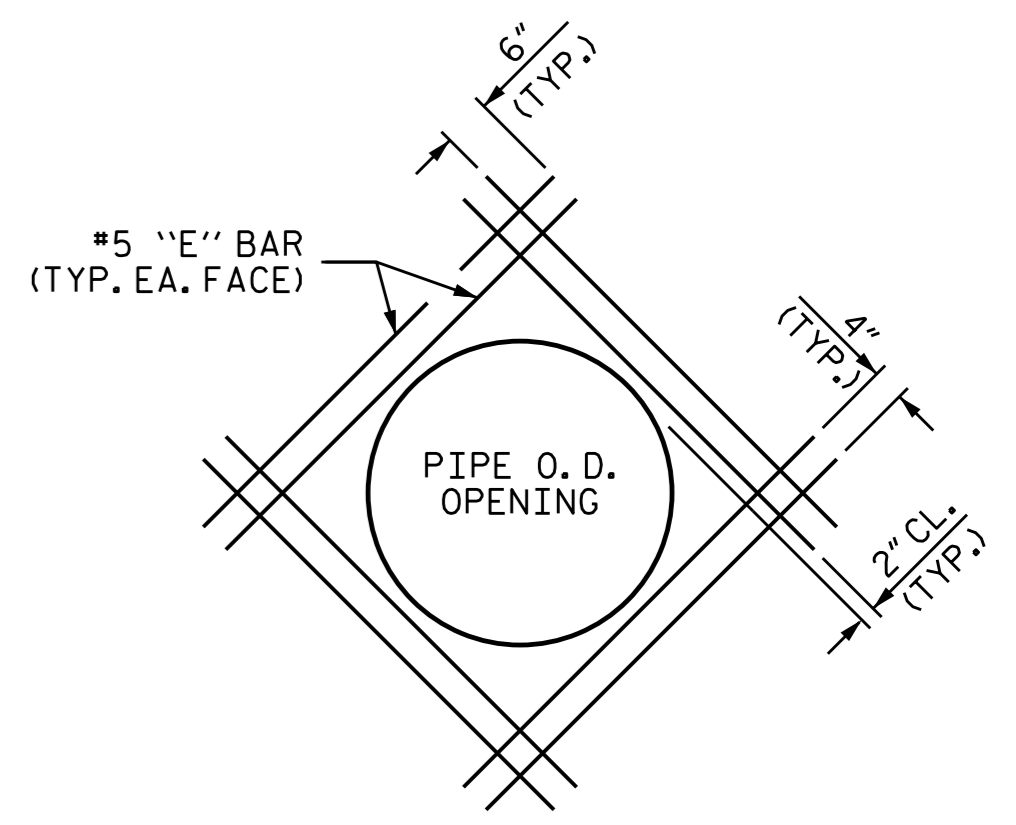
INLET END ELEVATION NORMAL TO SKEW

45° STD. WING AT INLET END



SECTION D-D

RIGHT ANGLE SECTION OF BARREL
THERE ARE 36 'C' BARS IN SECTION OF BARREL



WALL OPENING DETAILS

FOR PIPE THRU EXTERIOR WALL.
FIELD CUT & BEND 'B' & 'C' BARS AS NEEDED
TO CLEAR PIPE

PIPE SIZE	O. D.	BAR	LENGTH
15" Ø	19.5"	E1	3'-8"
18" Ø	23.0"	E2	4'-0"
30" Ø	37.0"	E3	5'-2"
36" Ø	44.0"	E4	5'-9"

TOTAL CULVERT #1 QUANTITIES			
PAY ITEM	PHASE 1A C1-P1A	PHASE 1B C1-P1B	TOTAL
CLASS A CONCRETE			
BARREL @ 0.840 CY/FT	1134.8 C.Y.	37.0 C.Y.	1171.8 C.Y.
WINGS ETC.		13.0 C.Y.	13.0 C.Y.
SUBTOTAL	1134.8 C.Y.	50.0 C.Y.	1184.8 C.Y.
REINFORCING STEEL			
BARREL	172,429 LBS.	5,978 LBS.	178,407 LBS.
WINGS ETC.		749 LBS.	749 LBS.
SUBTOTAL	172,429 LBS.	6,727 LBS.	179,156 LBS.
CULVERT EXCAVATION	LUMP SUM	LUMP SUM	LUMP SUM
FOUNDATION COND. MAT'L	1270 TONS	41 TONS	1311 TONS

PROJECT NO. U-2524D
GUILFORD COUNTY
STATION: 478+64.40 -L-

SHEET 2 OF 6

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH
BARREL STANDARD
CULVERT #1
SINGLE 8' X 7' RCBC
C1-P1A & C1-P1B
OFFSET 106.48' LEFT



DocuSigned by:
Ting Fang
E72088400977435... 7/15/2016

REVISIONS						SHEET NO.
NO.	BY:	DATE:	NO.	BY:	DATE:	TOTAL SHEETS
1			3			C-2
2			4			34

DOCUMENT NOT CONSIDERED
FINAL UNLESS ALL
SIGNATURES COMPLETED

DRAWN BY: A. SORSENGINH DATE: 1/2016
CHECKED BY: T. H. FANG DATE: 5/15/16
DESIGN ENGINEER OF RECORD: A. SORSENGINH DATE: 5/26/16