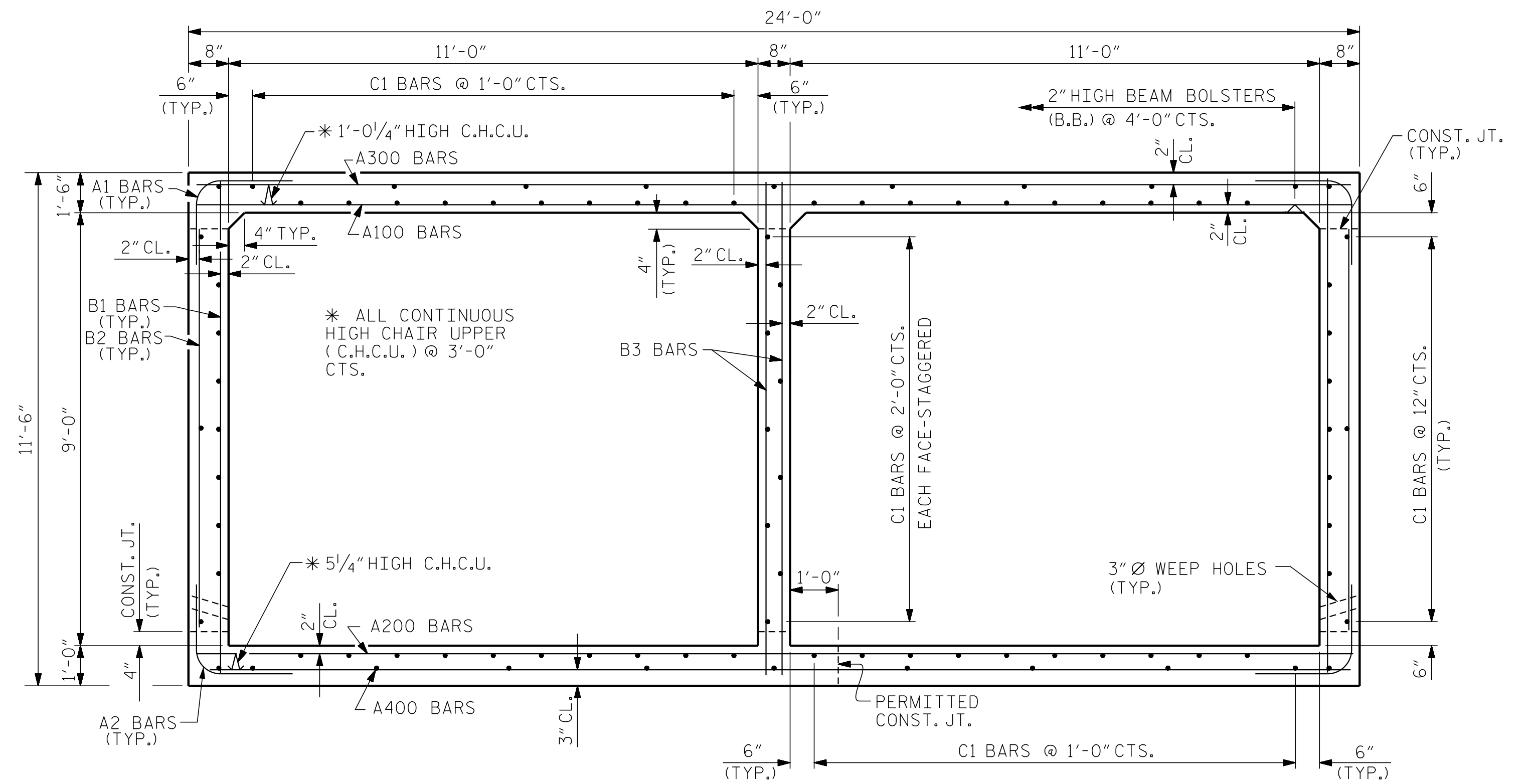


BARREL REINFORCING STEEL

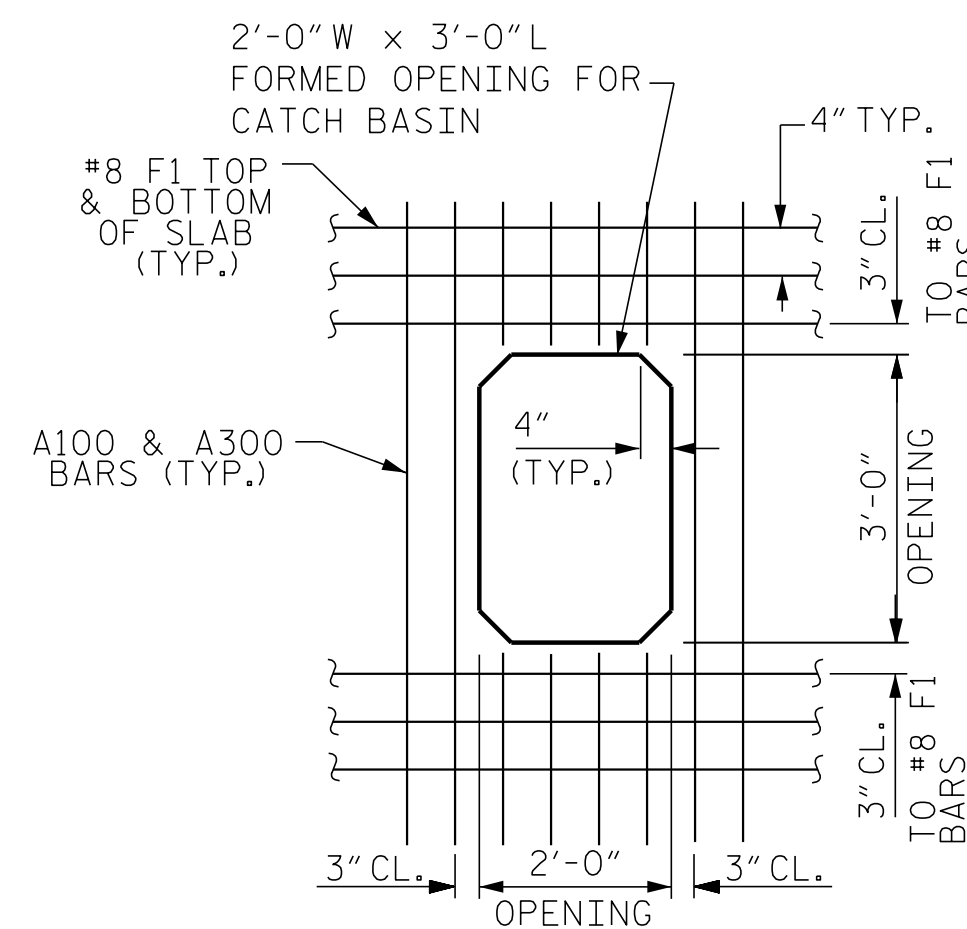
BAR	NO	SIZE	TYPE	LENGTH	WEIGHT	BAR	NO	SIZE	TYPE	LENGTH	WEIGHT	BAR	NO	SIZE	TYPE	LENGTH	WEIGHT
A1	356	5	1	6'-4"	2352	A300	150	6	STR	23'-8"	5332	B1	214	4	STR	11'-1"	1584
A2	356	5	1	5'-9"	2135	A301	2	6	STR	23'-2"	70	B2	356	4	STR	8'-4"	1982
						A302	2	6	STR	22'-3"	67	B3	177	4	STR	11'-1"	1310
						A303	2	6	STR	21'-5"	64						
A100	150	5	STR	23'-8"	3703	A304	2	6	STR	20'-7"	62						
A101	2	5	STR	23'-2"	48	A305	2	6	STR	19'-8"	59	C1	364	4	STR	23'-8"	5755
A102	2	5	STR	22'-3"	46	A306	2	6	STR	18'-10"	57						
A103	2	5	STR	21'-5"	45	A307	2	6	STR	17'-11"	54	D1	15	6	STR	2'-7"	58
A104	2	5	STR	20'-7"	43	A308	2	6	STR	17'-1"	51	D2	27	6	STR	1'-7"	64
A105	2	5	STR	19'-8"	41	A309	2	6	STR	16'-3"	49						
A106	2	5	STR	18'-10"	39	A310	2	6	STR	15'-4"	46	E1	16	5	STR	4'-0"	67
A107	2	5	STR	17'-11"	37	A311	2	6	STR	14'-6"	44						
A108	2	5	STR	17'-1"	36	A312	2	6	STR	13'-8"	41	F1	12	8	STR	12'-6"	401
A109	2	5	STR	16'-3"	34	A313	2	6	STR	12'-9"	38						
A110	2	5	STR	15'-4"	32	A314	2	6	STR	11'-11"	36	G1	8	5	STR	27'-4"	228
A111	2	5	STR	14'-6"	30	A315	2	6	STR	11'-0"	33						
A112	2	5	STR	13'-8"	29	A316	2	6	STR	10'-2"	31	S2	12	8	STR	27'-4"	876
A113	2	5	STR	12'-9"	27	A317	2	6	STR	9'-4"	28						
A114	2	5	STR	11'-11"	25	A318	2	6	STR	8'-5"	25						
A115	2	5	STR	11'-0"	23	A319	2	6	STR	7'-7"	23						
A116	2	5	STR	10'-2"	21	A320	2	6	STR	6'-8"	20						
A117	2	5	STR	9'-4"	19	A321	2	6	STR	5'-10"	18						
A118	2	5	STR	8'-5"	18	A322	2	6	STR	5'-0"	15						
A119	2	5	STR	7'-7"	16	A323	2	6	STR	4'-1"	12						
A120	2	5	STR	6'-8"	14	A324	2	6	STR	3'-3"	10						
A121	2	5	STR	5'-10"	12	A325	2	6	STR	2'-4"	7						
A122	2	5	STR	5'-0"	10												
A123	2	5	STR	4'-1"	9	A400	150	6	STR	23'-8"	5332						
A124	2	5	STR	3'-3"	7	A401	2	6	STR	23'-2"	70						
A125	2	5	STR	2'-4"	5	A402	2	6	STR	22'-3"	67						
						A403	2	6	STR	21'-5"	64						
A200	150	5	STR	23'-8"	3703	A404	2	6	STR	20'-7"	62						
A201	2	5	STR	23'-2"	48	A405	2	6	STR	19'-8"	59						
A202	2	5	STR	22'-3"	46	A406	2	6	STR	18'-10"	57						
A203	2	5	STR	21'-5"	45	A407	2	6	STR	17'-11"	54						
A204	2	5	STR	20'-7"	43	A408	2	6	STR	17'-1"	51						
A205	2	5	STR	19'-8"	41	A409	2	6	STR	16'-3"	49						
A206	2	5	STR	18'-10"	39	A410	2	6	STR	15'-4"	46						
A207	2	5	STR	17'-11"	37	A411	2	6	STR	14'-6"	44						
A208	2	5	STR	17'-1"	36	A412	2	6	STR	13'-8"	41						
A209	2	5	STR	16'-3"	34	A413	2	6	STR	12'-9"	38						
A210	2	5	STR	15'-4"	32	A414	2	6	STR	11'-11"	36						
A211	2	5	STR	14'-6"	30	A415	2	6	STR	11'-0"	33						
A212	2	5	STR	13'-8"	29	A416	2	6	STR	10'-2"	31						
A213	2	5	STR	12'-9"	27	A417	2	6	STR	9'-4"	28						
A214	2	5	STR	11'-11"	25	A418	2	6	STR	8'-5"	25						
A215	2	5	STR	11'-0"	23	A419	2	6	STR	7'-7"	23						
A216	2	5	STR	10'-2"	21	A420	2	6	STR	6'-8"	20						
A217	2	5	STR	9'-4"	19	A421	2	6	STR	5'-10"	18						
A218	2	5	STR	8'-5"	18	A422	2	6	STR	5'-0"	15						
A219	2	5	STR	7'-7"	16	A423	2	6	STR	4'-1"	12						
A220	2	5	STR	6'-8"	14	A424	2	6	STR	3'-3"	10						
A221	2	5	STR	5'-10"	12	A425	2	6	STR	2'-4"	7						
A222	2	5	STR	5'-0"	10												
A223	2	5	STR	4'-1"	9												
A224	2	5	STR	3'-3"	7												
A225	2	5	STR	2'-4"	5												

REINFORCING STEEL 38,134 LBS

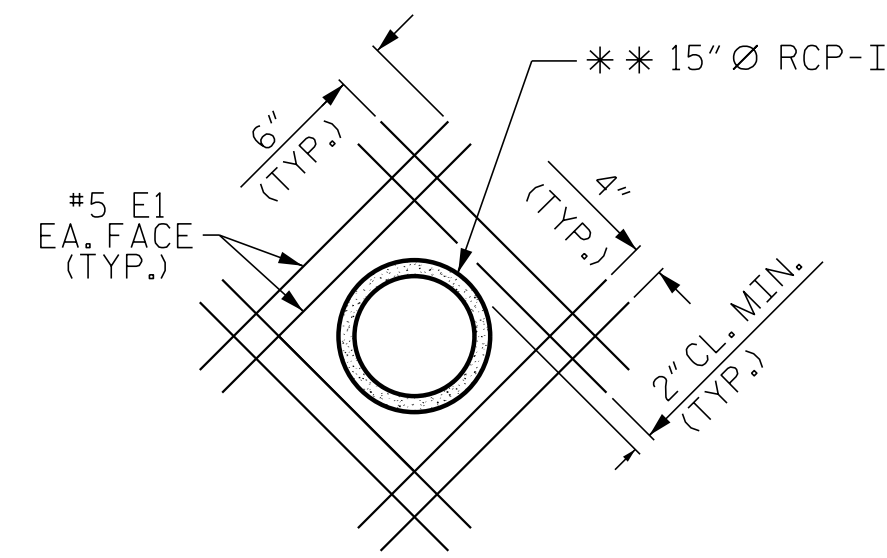


RIGHT ANGLE SECTION OF BARREL

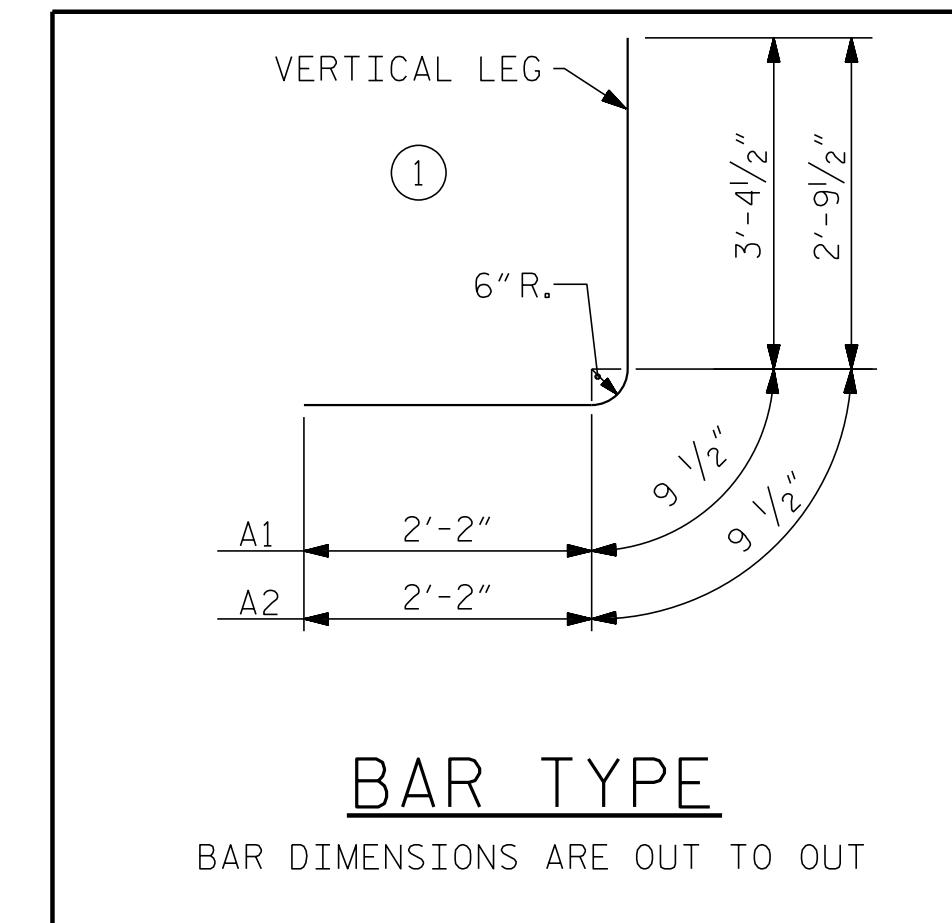
THERE ARE 91 "C" BARS IN SECTION OF BARREL.



PLAN - FORMED OPENING IN ROOF SLAB



ELEV. - 15" PIPE THRU EXTERIOR WALL DETAIL



BAR TYPE

BAR DIMENSIONS ARE OUT TO OUT

SPLICE LENGTHS CHART		
BAR	SIZE	SPLICE LENGTH
A200	#5	2'-2"
A400	#6	2'-9"
"B"	#4	1'-9"
C1	#4	1'-11"

NOTE:
 ** THE 15" PIPE THRU THE EXTERIOR WALL OF THE CULVERT AND 2'-0" W x 3'-0" L FORMED OPENING IN ROOF SLAB IS SHOWN IN IT'S APPROXIMATE LOCATION, THE FINAL LOCATION SHALL BE VERIFIED BY THE ENGINEER PRIOR TO POURING THE CULVERT WALLS AND ROOF SLAB. FIELD BEND AND/OR CUT A1, C1, B1 & B2 BARS ONLY AS NECESSARY TO AVOID CONFLICT WITH THE PROPOSED 15" RCP. CUT A100 & A300 BARS TO PROVIDE 2" CLEARANCE TO FORMED OPENING. SEE DRAINAGE SUMMARY SHEET FOR INVERT ELEVATION.

PROJECT NO. U-5888
HAYWOOD COUNTY
 STATION: 14+99.00 -Y4-

SHEET 4 OF 11

ENGINEER OF RECORD
 6/17/2019

 John Arthur Dilworth
 ETHERILL ENGINEERING
 1223 Jones Franklin Rd.
 Raleigh, N.C. 27606
 Bus: 919 851 8077
 Fax: 919 851 8107
 LICENSE NO. F-6377

STATE OF NORTH CAROLINA
 DEPARTMENT OF TRANSPORTATION
 RALEIGH
**DOUBLE
 11 FT. X 9 FT.
 CONCRETE BOX CULVERT**

REVISIONS						SHEET NO.
NO.	BY:	DATE:	NO.	BY:	DATE:	C4
1			3			TOTAL SHEETS
2			4			11

DOCUMENT NOT CONSIDERED FINAL
 UNLESS ALL SIGNATURES COMPLETED

DRAWN BY: J. PENDERGRAFT DATE: 12-18
 CHECKED BY: J. DILWORTH DATE: 1-19