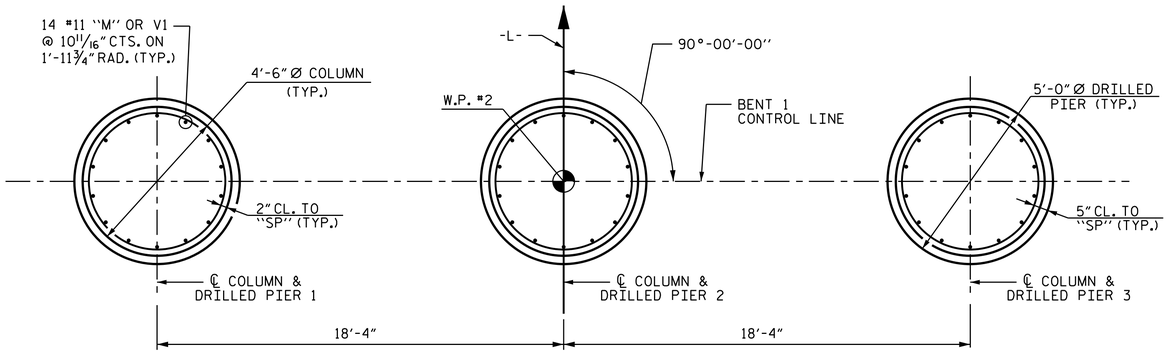
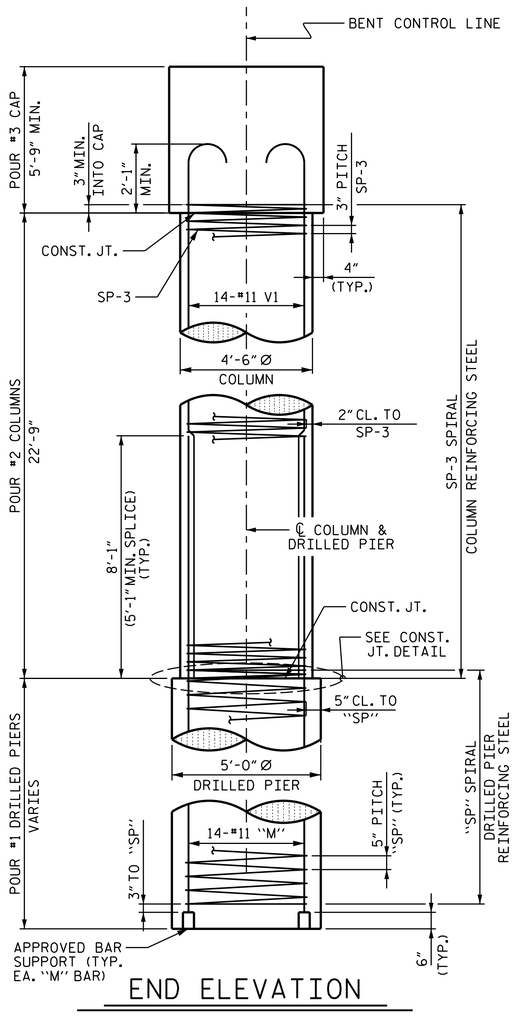
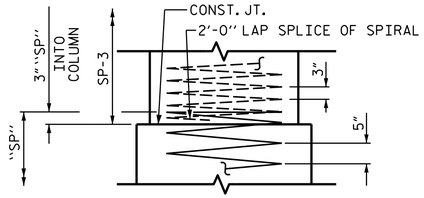


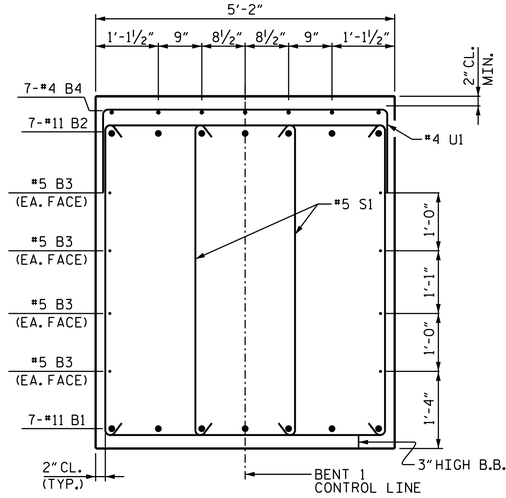
PLAN OF DRILLED PIERS & COLUMNS



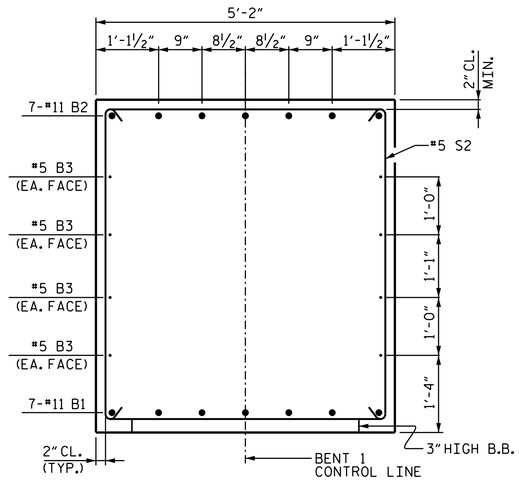
END ELEVATION



CONSTRUCTION JOINT DETAIL

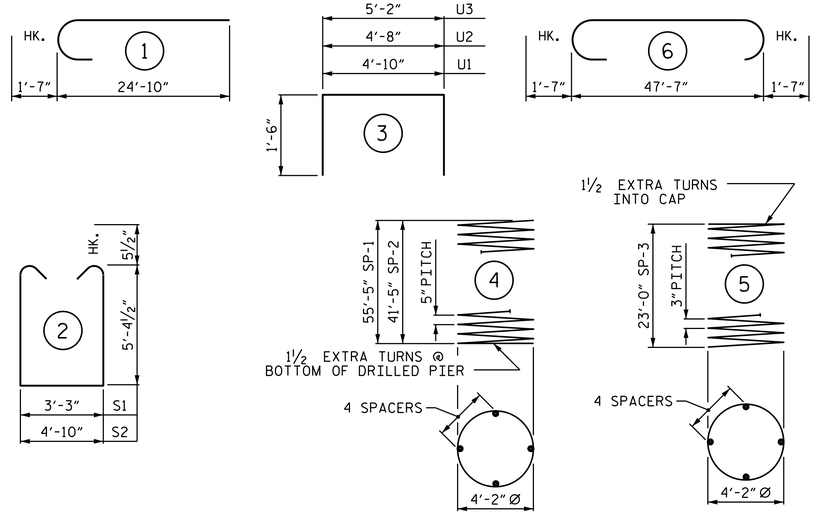


SECTION B-B

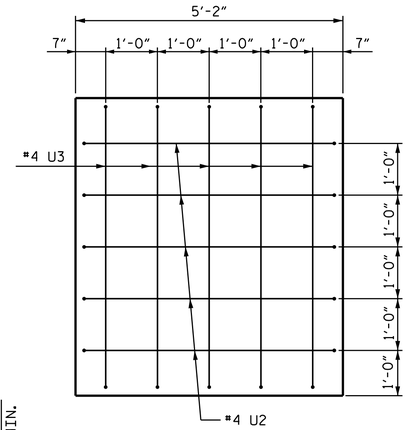


SECTION A-A

BAR TYPES



ALL BAR DIMENSIONS ARE OUT TO OUT



END VIEW

(TYP. EA. END)

BILL OF MATERIAL

FOR BENT 1

BAR	NO.	SIZE	TYPE	LENGTH	WEIGHT
B1	7	#11	STR	47'-9"	1,776
B2	7	#11	6	50'-9"	1,887
B3	8	#5	STR	47'-9"	398
B4	7	#4	STR	12'-9"	60
M1	56	#11	STR	34'-4"	10,215
M2	14	#11	STR	49'-6"	3,682
S1	88	#5	2	14'-11"	1,369
S2	14	#5	2	16'-6"	241
U1	56	#4	3	7'-10"	293
U2	10	#4	3	7'-8"	51
U3	10	#4	3	8'-2"	55
V1	42	#11	1	26'-5"	5,895

REINFORCING STEEL 25,922 LBS.

BAR	NO.	SIZE	TYPE	LENGTH	WEIGHT
SP-1	2	*	4	1,746'-0"	3,642
SP-2	1	*	4	1,306'-3"	1,362
SP-3	3	**	5	1,218'-5"	2,442

SPIRAL COLUMN REINFORCING STEEL 7,446 LBS.

* THE SP-1 & SP-2 SPIRAL REINFORCING STEEL SHALL BE W31 OR D-31 COLD DRAWN WIRE OR #5 PLAIN OR DEFORMED BAR

** THE SP-3 SPIRAL REINFORCING STEEL SHALL BE W20 OR D-20 COLD DRAWN WIRE OR #4 PLAIN OR DEFORMED BAR

CLASS A CONCRETE BREAKDOWN

POUR #2 (COLUMNS)	40.2 C.Y.
POUR #3 (CAP)	54.3 C.Y.
TOTAL CLASS A CONCRETE	94.5 C.Y.

DRILLED PIERS:

DRILLED PIER CONCRETE POUR #1	111.7 C.Y.

PROJECT NO. B-5831

SURRY/YADKIN COUNTY

STATION: 32+28.00 -L-

SHEET 2 OF 2

DRAWN BY : STM DATE : 06/24

CHECKED BY : MGC DATE : 07/24

DESIGN ENGINEER OF RECORD: STM DATE : 12/24

NORTH CAROLINA PROFESSIONAL SEAL 20125 ENGINEER MARSHALL G. CHEEK, JR.

Signed by: Marshall G. Cheek, Jr. 5FBCC2F3A4DC413...

9/23/2025

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

TGS ENGINEERS
706 HILLSBOROUGH STREET
SUITE 200
RALEIGH, NC 27603
PH (919) 773-8887
CORP. LICENSE NO.: C-0275

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

SUBSTRUCTURE

BENT 1

REVISIONS						SHEET NO.
NO.	BY:	DATE:	NO.	BY:	DATE:	S-44
1			3			TOTAL SHEETS
2			4			61

12/18/2024
g:\workdir\ncdot-pw.bentley.com_ncdot-pw-01\zachary smith\d0166590\B-5831-SMU-B101-850006.dgn
ZSmith