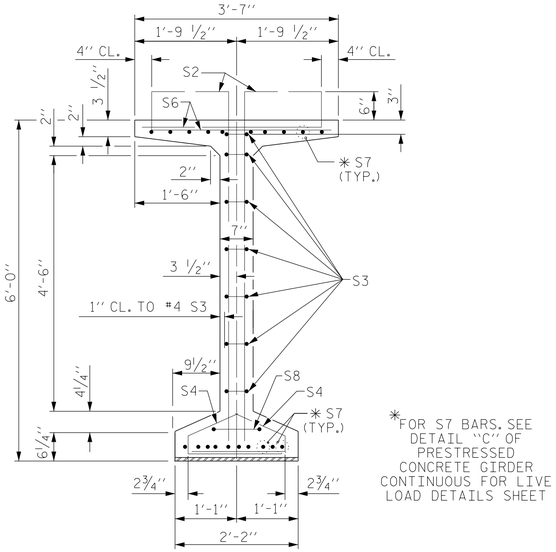
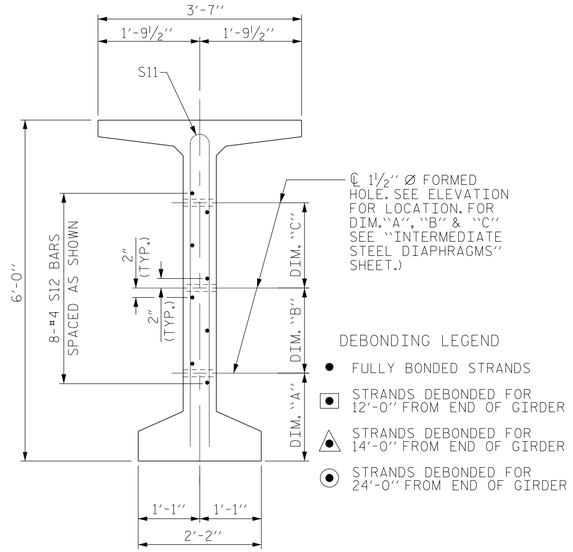


SECTION A-A

✳FOR S7 BARS. SEE DETAIL "C" OF PRESTRESSED CONCRETE GIRDER CONTINUOUS FOR LIVE LOAD DETAILS SHEET

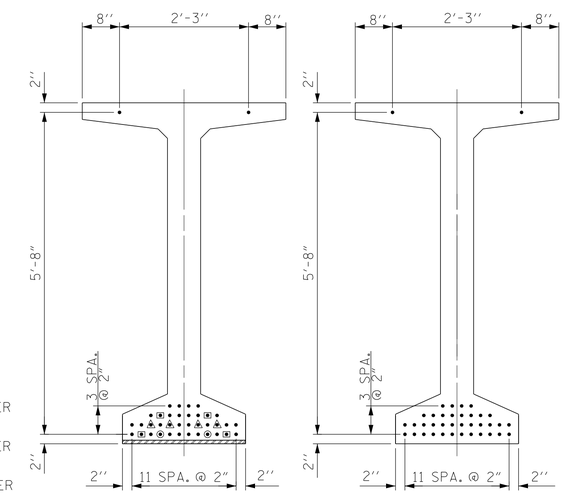


SECTION C-C

(S1, S6 AND S9 BARS NOT SHOWN)

DEBONDING LEGEND

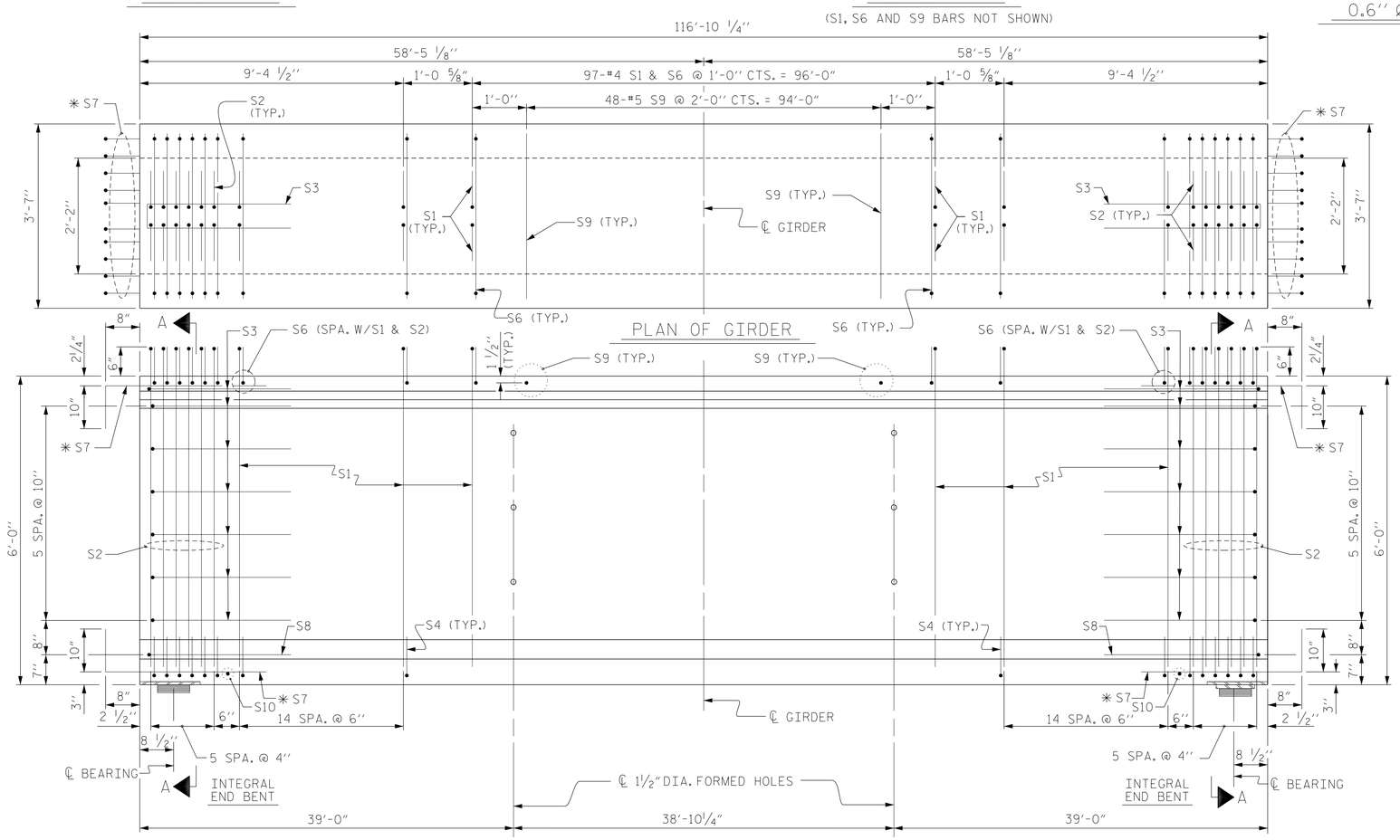
- ● FULLY BONDED STRANDS
- ▣ STRANDS DEBONDED FOR 12'-0" FROM END OF GIRDER
- ▲ STRANDS DEBONDED FOR 14'-0" FROM END OF GIRDER
- ⊙ STRANDS DEBONDED FOR 24'-0" FROM END OF GIRDER



AT END OF GIRDER

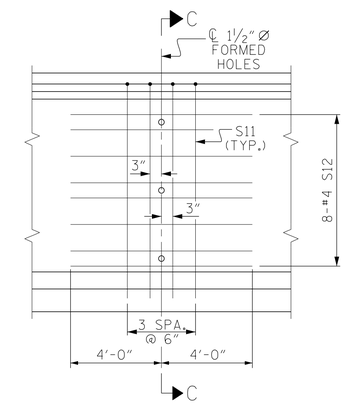
AT ℄ OF GIRDER

0.6" Ø LOW RELAXATION STRAND LAYOUT



PLAN OF GIRDER

ELEVATION OF GIRDER



PARTIAL ELEVATION

SHOWING INTERMEDIATE STEEL DIAPHRAGM REINFORCING STEEL

0.6" Ø L. R. GRADE 270 STRANDS

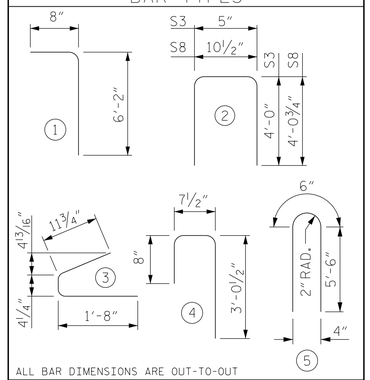
AREA (SQUARE INCHES)	ULTIMATE STRENGTH (LBS. PER STRAND)	APPLIED PRESTRESS (LBS. PER STRAND)
0.217	58,600	43,950

REINFORCING STEEL FOR ONE GDR

BAR	NUMBER	SIZE	TYPE	LENGTH	WEIGHT
S1	254	#4	1	6'-10"	1159
S2	24	#5	1	6'-10"	171
S3	14	#4	2	8'-5"	79
S4	84	#4	3	3'-0"	168
S6	278	#5	4	4'-4"	1256
✳ S7	40	#5	STR	3'-8"	153
S8	2	#5	2	9'-0"	19
S9	48	#5	STR	3'-3"	163
S10	2	#4	STR	1'-10"	1
S11	8	#5	5	11'-6"	96
S12	16	#4	STR	8'-0"	86

✳ NOTE: S7 BARS SHALL BE BENT BEFORE SHIPMENT. HEAT BENDING SHALL NOT BE ALLOWED.

BAR TYPES



ALL BAR DIMENSIONS ARE OUT-TO-OUT

QUANTITIES FOR ONE GIRDER

	REINFORCING STEEL	8500 PSI CONCRETE	0.6" Ø L.R. STRANDS
	LB.	C.Y.	No.
EXTERIOR GIRDER	3351	25.0	38
INTERIOR GIRDER	3351	25.0	38

GIRDERS REQUIRED

NUMBER	LENGTH	TOTAL LENGTH
5	116'-10 1/4"	584'-3 1/4"

PROJECT NO. I-0914BA

VANCE COUNTY

STATION: 421+29.07 -NBL- POT
13+36.32 -Y7- POT

SHEET 1 OF 1

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

STANDARD
72" PRESTRESSED CONCRETE MODIFIED BULB TEE CONTINUOUS FOR LIVE LOAD

NORTH CAROLINA PROFESSIONAL SEAL 11725 ENGINEER DAVID R. RUGGLES

DocuSigned by: David Ruggles C462768DF412422... 11/21/2014

DWG. 12 OF 26

Firm License No. C-1051
421 Fayetteville St,
Suite 400
Raleigh, NC 27601
T 919.380.8750
www.stewartinc.com

STEWART

REVISIONS						SHEET NO.
NO.	BY:	DATE:	NO.	BY:	DATE:	S-163
1			3			TOTAL SHEETS
2			4			177

STD. NO. PCG8

DRAWN BY: J. LOFTUS DATE : 05/14
CHECKED BY: D. RUGGLES DATE : 05/14
DESIGN ENGINEER OF RECORD: D. RUGGLES DATE : 04/14

SITE IV (-NBL-)