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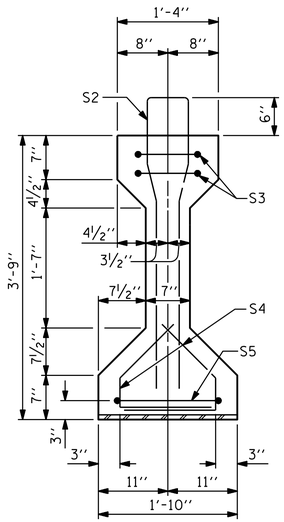
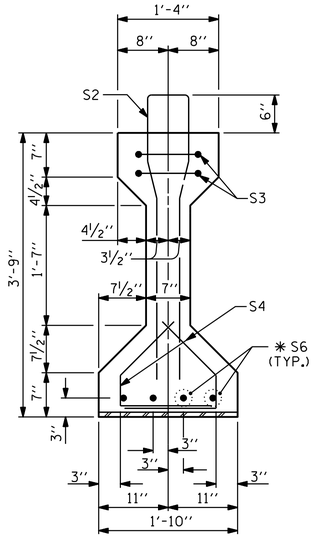
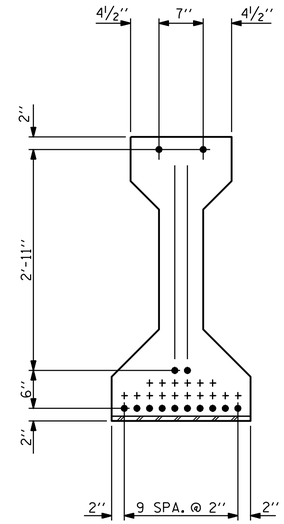


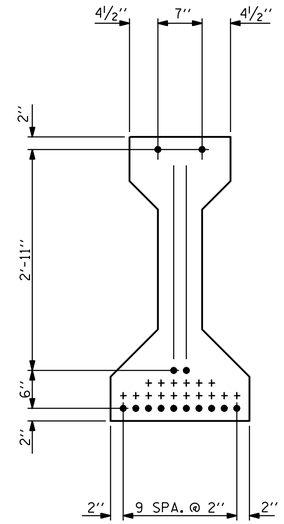
SECTION A-A



SECTION B-B



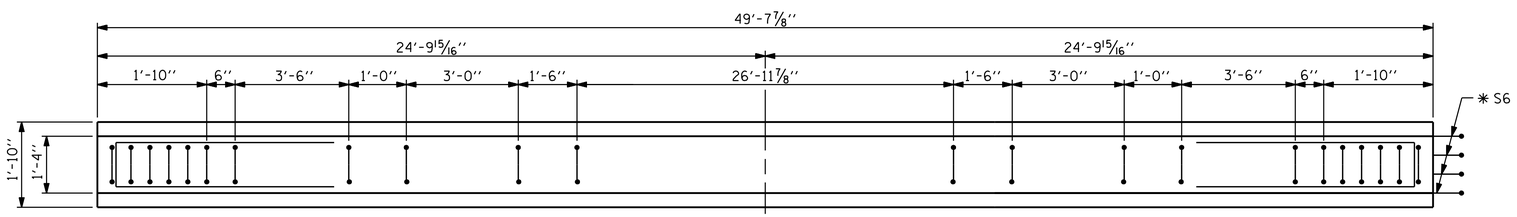
AT END OF GIRDER



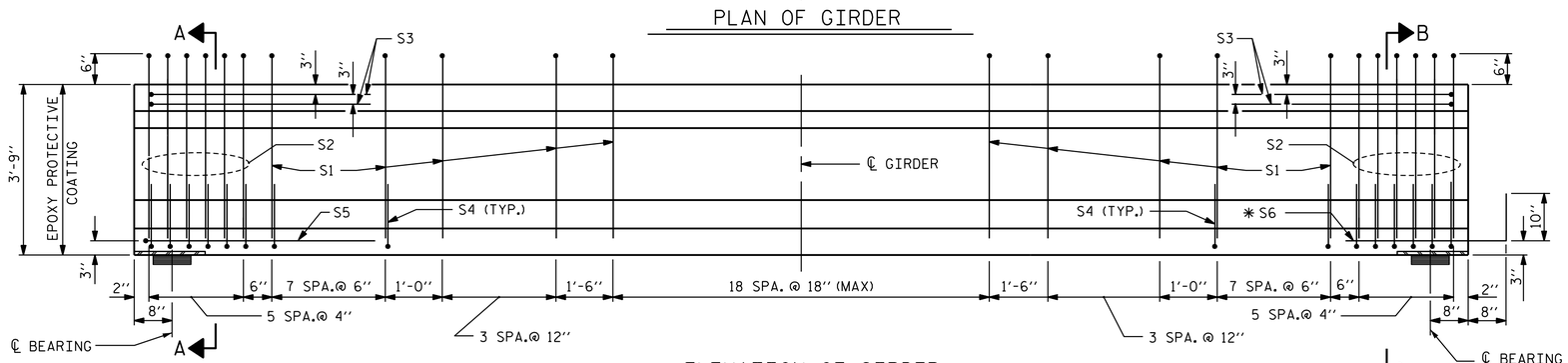
AT ℄ OF GIRDER

0.6'' Ø LOW RELAXATION STRAND LAYOUT

(14 STRANDS, ALL STRAIGHT, NO DEBONDING)



PLAN OF GIRDER



ELEVATION OF GIRDER

(SEE PARTIAL ELEVATION ON SHEET 3 OF 4 FOR ADDITIONAL "S" BARS)

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

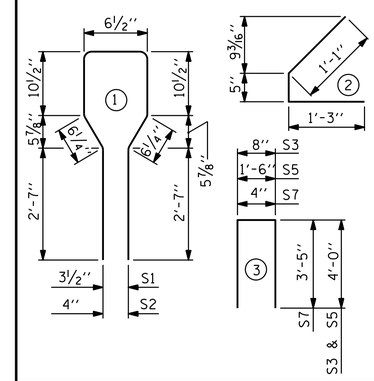
REINFORCING STEEL FOR ONE GIRDER

	BAR	NUMBER	SIZE	TYPE	LENGTH	WEIGHT
	S1	43	#4	1	8'-6''	244
	S2	12	#6	1	8'-6''	153
	S3	4	#4	3	8'-8''	23
	S4	56	#4	2	2'-9''	103
	S5	1	#4	3	9'-6''	6
	✱ S6	4	#5	STR	3'-8''	15
EXTERIOR GDR.	S7	2	#5	3	7'-2''	15
INTERIOR GDR.	S7	4	#5	3	7'-2''	30
EXTERIOR GDR.	S8	5	#4	STR	7'-0''	23
INTERIOR GDR.	S9	5	#4	STR	16-3'	54

✱ NOTE: S6 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	6000 PSI CONCRETE	0.6'' Ø L.R. STRANDS
	LB.	C.Y.	No.
EXTERIOR GIRDER	582	7.2	14
INTERIOR GIRDER	628	7.2	14

GIRDERS REQUIRED

NUMBER	LENGTH	TOTAL LENGTH
10	49'-7⅞''	496.56

PROJECT NO. I-0914BB

WARREN COUNTY

STATION: 197+54.33 -L-

SHEET 1 OF 4

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

AASHTO TYPE III
PRESTRESSED CONCRETE GIRDER
CONTINUOUS FOR LIVE LOAD

SPANS A & C
(NORTHBOUND LANE)

REVISIONS						SHEET NO.
NO.	BY:	DATE:	NO.	BY:	DATE:	S-47
1			3			TOTAL SHEETS
2			4			72

DRAWN BY: J. T. WILLIAMS DATE: 4-2014
CHECKED BY: J. E. MONDOLFI DATE: 4-2014
DESIGN ENGINEER OF RECORD: J. E. MONDOLFI DATE: 4-2014

PLANS PREPARED BY:
Hatch Mott MacDonald
PO Box 700
Fuquay-Varina, NC 27526
(919) 552-2253
www.hatchmott.com
LICENSE NO. F-0669

NORTH CAROLINA PROFESSIONAL SEAL 20532 ENGINEER JOHN E. MONDOLFI
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