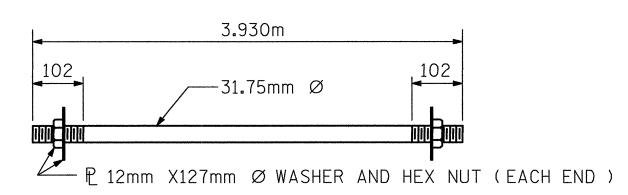
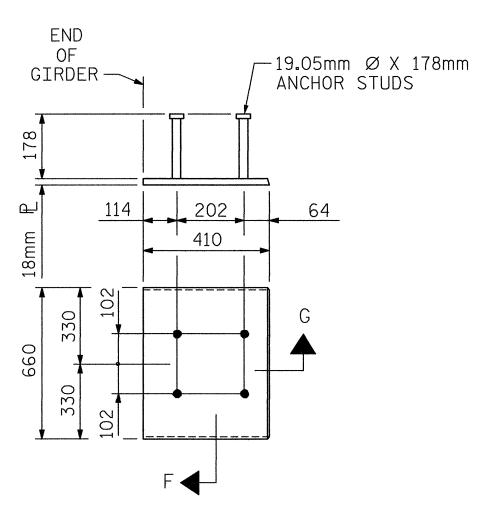


(FOR AASHTO TYPE IV GIRDERS)

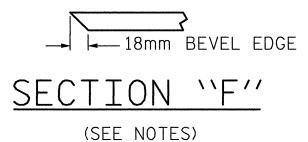


## 31.75mm Ø TIE ROD ASSEMBLY

(9 COMPLETE ASSEMBLIES REQUIRED)



## EMBEDDED PLATE "B-1" DETAILS FOR AASHTO TYPE IV GIRDER (2 REQ'D PER GIRDER)





SECTION "G"

## NOTES

ALL PRESTRESSING STRANDS SHALL BE 7-WIRE LOW-RELAXATION GRADE 270 STRANDS AND SHALL CONFORM TO AASHTO M203M EXCEPT FOR SAMPLING REQUIREMENTS WHICH SHALL BE IN ACCORDANCE WITH THE STANDARD SPECIFICATIONS.

TIE ROD ASSEMBLY SHALL BE AASHTO M270 GRADE 250 STRUCTURAL STEEL.

ALL REINFORCING STEEL SHALL BE GRADE 420.

APPLY EPOXY PROTECTIVE COATING TO END OF GIRDER SURFACES INDICATED IN ELEVATION VIEW. FOR EPOXY PROTECTIVE COATING, SEE SPECIAL PROVISIONS.

EMBEDDED PLATE "B-1" SHALL BE GALVANIZED IN ACCORDANCE WITH THE SPECIFICATIONS. BEVEL EDGES OF PLATE "B-1" TO GIVE CLOSE FIT BUT NOT TIGHT FIT TO STEEL CASTING FORM.

ANCHOR STUDS SHALL CONFORM TO AASHTO M169 GRADES 1010 THROUGH 1020 OR APPROVED EQUAL, AND SHALL MEET THE TYPE "B" REQUIREMENTS OF SUBSECTION 7.3 OF THE ANSI/AASHTO/AWS D1.5 BRIDGE WELDING CODE.

AT ENDS OF GIRDERS TO BE EMBEDDED IN CONCRETE DIAPHRAGMS OR END WALLS, PRESTRESSING STRANDS MAY EXTEND A MAXIMUM OF 50mm BEYOND THE GIRDER ENDS. OTHERWISE, PRESTRESSING STRANDS SHALL BE CUT FLUSH WITH THE GIRDER ENDS.

THE TRANSFER OF LOAD FROM THE ANCHORAGES TO THE GIRDER SHALL BE DONE WHEN CONCRETE HAS REACHED A COMPRESSIVE STRENGTH OF NOT LESS THAN 27.6 MPa FOR SPAN A & SPAN C AND NOT LESS THAN 48.3 MPa FOR SPAN B.

DEPENDING ON THE TYPE OF SYSTEM USED TO SUPPORT THE DECK SLAB FORMS, PRESET ANCHORS MAY BE NECESSARY IN THE PRESTRESSED CONCRETE GIRDER.

THE TOP SURFACE OF THE GIRDER, EXCLUDING THE OUTSIDE 100mm, SHALL BE RAKED TO A DEPTH OF 6mm.

WHEN DRAPED STANDS ARE DETAILED, THE LONGITUDINAL LOCATION OF THE HOLD DOWN DEVICES SHALL BE WITHIN 150mm OF THE LOCATION SHOWN AND THE CENTER OF GRAVITY OF THE GROUP OF DRAPED STRANDS SHALL BE LOCATED WITHIN 13mm OF THE THEORETICAL LOCATION SHOWN.

FOR VERTICAL CRACKS IN PRESTRESSED CONCRETE GIRDERS PRIOR TO DETENSIONING, SEE SPECIAL PROVISIONS.

THE UPLIFT FORCE DUE TO DRAPED STRANDS IS 103.9 kN.

FOR PRESTRESSED CONCRETE MEMBERS, SEE SPECIAL PROVISIONS.

			DEAD	) LO	AD [	DEFL	ECT.	ION	TAE	BLE	FOR	GIF	RDER	S -	SPA	AN A							
					2	GIRD	ERS 1	& 4									GIRD	ERS 2	8 & 3				
TENTH POINTS		0	.1	.2	<b>.</b> 3	.4	.5	.6	.7	.8	.9	1.0	0	.1	.2	.3	.4	<b>.</b> 5	.6	.7	.8	.9	1.0
CAMBER (GIRDER ALONE IN PLACE)	<b>A</b>	0.000	0.002	0.003	0.004	0.005	0.005	0.005	0.004	0.003	0.002	0.000	0.000	0.002	0.003	0.004	0.005	0.005	0.005	0.004	0.003	0.002	0.000
* DEFLECTION DUE TO SUPERIMPOSED D.L.	<b>V</b>	0.000	0.001	0.001	0.002	0.002	0.002	0.002	0.002	0.001	0.001	0.000	0.000	0.001	0.002	0.002	0.003	0.003	0.003	0.002	0.002	0.001	0.000
FINAL CAMBER	<b>†</b>	0	1	2	2	3	3	3	2	2	1	0	0	1	1	2	2	2	2	2	1	1	0

			DEAD	LO	AD [	DEFL	ECT	ION	TAE	BLE	FOR	GIF	RDER	?S -	SPA	AN B							
						GIRD	ERS 1	& 4									GIRD	ERS 2	2 & 3				
TENTH POINTS		0	.1	.2	.3	.4	.5	.6	.7	.8	.9	1.0	0	.1	.2	.3	.4	<b>.</b> 5	.6	.7	.8	.9	1.0
CAMBER (GIRDER ALONE IN PLACE)	A	0.000	0.025	0.048	0.065	0.076	0.080	0.076	0.065	0.048	0.025	0.000	0.000	0.025	0.048	0.065	0.076	0.080	0.076	0.065	0.048	0.025	0.000
* DEFLECTION DUE TO SUPERIMPOSED D.L.	¥	0.000	0.014	0.027	0.037	0.043	0.046	0.043	0.037	0.027	0.014	0.000	0.000	0.018	0.033	0.046	0.053	0.056	0.053	0.046	0.033	0.018	0.000
FINAL CAMBER	A	0	11	21	28	33	34	33	28	21	11	0	0	7	15	19	23	24	23	19	15	7	0

		DEAD	) LO	AD I	DEFL	LECT	ION	TAE	BLE	FOR	GIF	RDEF	?S -	SPA	AN C							
					GIRE	ERS 1	. & 4									GIRD	ERS 2	2 & 3				
	0	.1	.2	.3	.4	.5	.6	.7	.8	.9	1.0	0	.1	.2	.3	.4	.5	.6	.7	.8	.9	1.0
A	0.000	0.002	0.003	0.004	0.005	0.005	0.005	0.004	0.003	0.002	0.000	0.000	0.002	0.003	0.004	0.005	0.005	0.005	0.004	0.003	0.002	0.000
¥	0.000	0.001	0.002	0.003	0.003	0.003	0.003	0.003	0.002	0.001	0.000	0.000	0.001	0.002	0.003	0.004	0.004	0.004	0.003	0.002	0.001	0.000
<b>A</b>	0	1	1	1	2	2	2	1	1	1	0	0	1	1	1	1	1	1	1	1	1	0
	<b>†</b>	0 0.000	0 .1	0 .1 .2 0.000 0.002 0.003	0 .1 .2 .3 0.000 0.002 0.003 0.004	GIRE  0 .1 .2 .3 .4  0.000 0.002 0.003 0.004 0.005	GIRDERS 1         0       .1       .2       .3       .4       .5         0       0.000       0.002       0.003       0.004       0.005       0.005	GIRDERS 1 & 4  0 .1 .2 .3 .4 .5 .6  0.000 0.002 0.003 0.004 0.005 0.005 0.005	GIRDERS 1 & 4  0 .1 .2 .3 .4 .5 .6 .7  0 .000 0.002 0.003 0.004 0.005 0.005 0.005 0.004	GIRDERS 1 & 4  0	GIRDERS 1 & 4  O .1 .2 .3 .4 .5 .6 .7 .8 .9  O .000 0.002 0.003 0.004 0.005 0.005 0.005 0.004 0.003 0.002	GIRDERS 1 & 4  O .000 0.002 0.003 0.004 0.005 0.005 0.005 0.004 0.003 0.002 0.000	GIRDERS 1 & 4         0       .1       .2       .3       .4       .5       .6       .7       .8       .9       1.0       0         1       0.000       0.002       0.003       0.004       0.005       0.005       0.005       0.004       0.003       0.002       0.000       0.000	GIRDERS 1 & 4  0 1.1 2 3.3 4 5.5 6.6 7.7 8.8 9.9 1.0 0 0.000	GIRDERS 1 & 4  0 1.1 2 3.3 4 5.5 6.6 7.7 8.8 9.9 1.0 0.000 0.000 0.002 0.002 0.003 0.002 0.003	GIRDERS 1 & 4  O .000 0.002 0.003 0.004 0.005 0.005 0.005 0.004 0.003 0.002 0.000 0.000 0.002 0.003 0.004	0 1 2 3 4 5 1.0 0.000 0.002 0.003 0.004 0.005 0.005 0.005 0.005 0.004 0.003 0.002 0.000 0	GIRDERS 1 & 4  O .000 0.002 0.003 0.004 0.005 0.005 0.005 0.004 0.003 0.002 0.000 0.000 0.002 0.003 0.004 0.005 0.005	Signature   Company   C	Signature   Company   C	GIRDERS 1 & 4  O .1 .2 .3 .4 .5 .6 .7 .8 .9 .1.0 .0.00 0.000	GIRDERS 1 & 4  O 1.1 2 3.3 4.4 5.5 6.6 7.7 8.8 9.9 1.0 0.000

\* INCLUDES FUTURE WEARING SURFACE IN SUPERIMPOSED DEAD LOAD

NOTE:

ASSEMBLED BY : JDF	DATE : 05/01/02
CHECKED BY : MSB	DATE : 05/01/02
DRAWN BY: ELR 11/91 CHECKED BY: GRP 11/91	REV. 8/16/99 MAB/LES REV. 10/17/00 RWW/LES REV. 7/10/01 LES/RDR

ALL DIMENSIONS ARE SHOWN IN METERS EXCEPT FINAL CAMBER IS SHOWN IN MILLIMETERS.

VALUES ARE SHOWN AT TENTH POINTS BETWEEN BEARINGS.

JOHNSTON COUNTY

STATION: 97+46.378-L-RT POC



SHEET 4 OF 4



STATE OF NORTH CAROLINA

DEPARTMENT OF TRANSPORTATION
RALEIGH

STANDARD

PRESTRESSED CONCRETE GIRDER CONTINUOUS FOR LIVE LOAD DETAILS



	REVI	SION	S		SHEET NO.
BY:	DATE:	NO.	BY:	DATE:	5-129
*		3			TOTAL SHEETS
		4			431