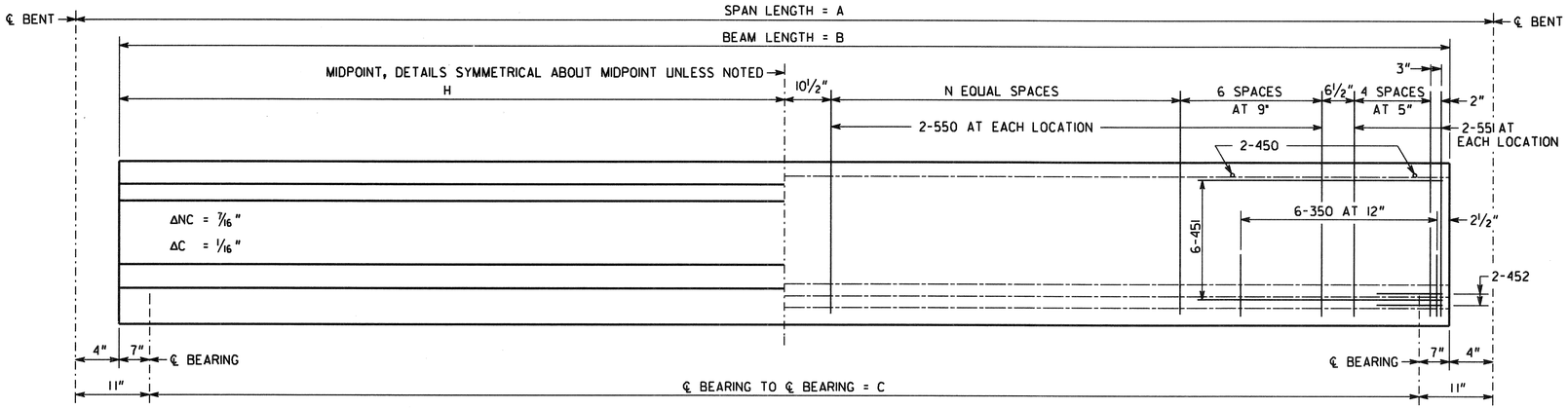
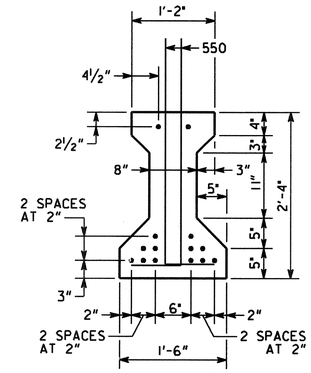
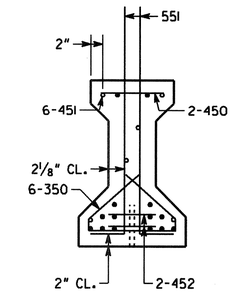
STATE	PROJECT NUMBER	SHEET NO.	TOTAL SHEETS
GA.	CSNHS-0008-00(232)	603	839



ELEVATION



SECTION AT MIDPOINT



SECTION AT END

MAINTAIN 1" MINIMUM CLEARANCE UNLESS SHOWN.
• INDICATES 0.6" DIAMETER LOW-RELAXATION PRESTRESSED STRANDS.

NOTES

1. BEAMS SHALL BE MAINTAINED IN AN UPRIGHT POSITION AT ALL TIMES AND SHALL BE PICKED UP WITHIN 3'-6" FROM THEIR ENDS. DISREGARDING THIS REQUIREMENT COULD LEAD TO COLLAPSE OF THE BEAM. PICK-UPS SHALL BE EMBEDDED TO WITHIN 4" OF THE BOTTOM OF THE BEAM. DETAILS OF PICK-UPS SHALL BE INCLUDED IN THE SHOP DRAWINGS.
2. CHAMFER EDGES OF BEAMS ½" OR ¾".
3. HORIZONTAL DIMENSIONS ARE IN PLACE DIMENSIONS. THE BEAM LENGTH INCLUDES THE ⅛" EPOXY MORTAR AT EACH END. SHOP DRAWINGS SHALL ADJUST HORIZONTAL DIMENSIONS FOR GRADE AND FABRICATION EFFECTS SUCH AS SHRINKAGE AND ELASTIC SHORTENING.
4. AT ℄ BEARING, FORM A 1½" DIAMETER X 7" DEEP HOLE AT THE FIXED ENDS AND A 4" X 1½" X 7" DEEP SLOT AT THE EXPANSION ENDS FOR A 1¼" DIAMETER SMOOTH DOWEL. SEE PLAN AND ELEVATION SHEET FOR LOCATION OF FIXED AND EXPANSION ENDS.
5. TOPS OF BEAMS SHALL BE ROUGH FLOATED AT APPROXIMATELY THE TIME OF INITIAL SET. ENTIRE TOP SHALL BE SCRUBBED TRANSVERSELY WITH A COARSE BRUSH TO REMOVE ALL LAITANCE AND TO PRODUCE A ROUGHENED SURFACE FOR BONDING TO THE SLAB. ROUGHENED SURFACE SHALL HAVE AN AMPLITUDE OF APPROXIMATELY ¼". CONCRETE FINS OR PROJECTIONS SHALL BE REMOVED TO PRODUCE A VERTICAL FACE AT THE EDGE OF THE BEAM.
6. NON-COMPOSITE DEAD LOAD DEFLECTION (ΔNC) AT THE MIDPOINT IS DUE TO THE WEIGHT OF THE SLAB AND COPING.
7. COMPOSITE DEAD LOAD DEFLECTION (ΔC) AT THE MIDPOINT IS DUE TO THE WEIGHT OF BARRIER AND MEDIAN.
8. STRANDS SHALL MEET ALL REQUIREMENTS OF ASTM A 416 GRADE 270.
9. PRESTRESSING DATA IS AS FOLLOWS:
   A. USE 14 - 0.6 " DIAMETER LOW-RELAXATION (A = 0.217 SQ IN) STRANDS. PRETENSION STRANDS TO 43,943 LBS EACH.
   B. PRETENSIONED STRANDS SHALL BE RELEASED AFTER THE CONCRETE HAS REACHED A MINIMUM STRENGTH (f'_{ci}) OF 5,400 PSI.
   C. THE TOTAL JACKING FORCE OF PRETENSIONING IS 615,202 LBS.
   D. THE NET PRESTRESSING FORCE OF THE STRANDS AFTER LOSSES IS 480,998 LBS.
10. CONCRETE STRENGTH (f'_c) = 5,600 PSI.
11. ALLOWABLE PSC BEAM TENSION = 449 PSI.

SPAN	BEAM	A	B	C	H	N
2,3	1	41'-6 3/16"	40'-10 3/16"	39'-8 3/16"	20'-5 1/8"	8
	2	41'-2 9/16"	40'-6 9/16"	39'-4 9/16"	20'-3 5/16"	7
	3	40'-10 7/8"	40'-2 7/8"	39'-0 7/8"	20'-1 7/16"	7
	4	40'-7 1/4"	39'-11 1/4"	38'-9 1/4"	19'-11 5/8"	7
	5	40'-3 5/8"	39'-7 5/8"	38'-5 5/8"	19'-9 13/16"	7
	6	40'-0"	39'-4"	38'-2"	19'-8"	7
	7	39'-8 3/8"	39'-0 3/8"	37'-10 3/8"	19'-6 3/16"	7
	8	39'-4 3/4"	38'-8 3/4"	37'-6 11/16"	19'-4 3/8"	7
	9	39'-1 1/16"	38'-5 1/16"	37'-3 1/16"	19'-2 9/16"	7
	10	38'-9 7/16"	38'-1 7/16"	36'-11 7/16"	19'-0 3/4"	7
	11	38'-5 13/16"	37'-9 13/16"	36'-7 13/16"	18'-10 15/16"	7
5	ALL	40'-0"	39'-4"	38'-2"	19'-8"	7

REINFORCEMENT

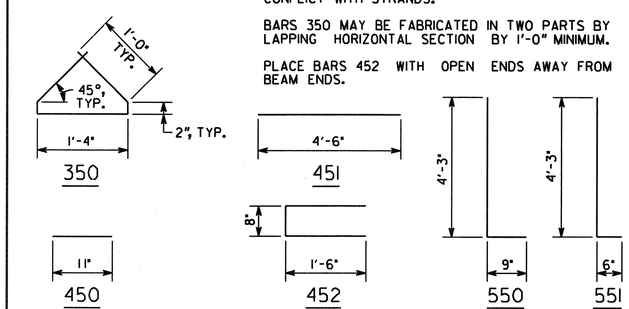
ALL BAR DIMENSIONS ARE OUT TO OUT.

AT THE TOP OF THE BEAM, BARS 550 AND 551 SHALL BE FIELD BENT OR SHOP BENT 90°, SUCH THAT THE HORIZONTAL LEG EXTENDS BETWEEN TOP AND BOTTOM MATS OF SLAB REINFORCEMENT.

SLIGHTLY SHIFT OR SLOPE BARS 451 TO AVOID CONFLICT WITH STRANDS.

BARS 350 MAY BE FABRICATED IN TWO PARTS BY LAPPING HORIZONTAL SECTION BY 1'-0" MINIMUM.

PLACE BARS 452 WITH OPEN ENDS AWAY FROM BEAM ENDS.



APPROVED FOR CONSTRUCTION 1/11/08

BRIDGE NO. 2

ARCADIS
2849 PACES FERRY ROAD, SUITE 400
ATLANTA, GEORGIA 30339
TEL: 770/431-8666 FAX: 770/435-2666

GEORGIA
DEPARTMENT OF TRANSPORTATION
PRECONSTRUCTION DIVISION-OFFICE OF BRIDGE DESIGN

TYPE I MOD PSC BEAM - SPANS 2, 3 & 5
KIA PARKWAY OVER LONG CANE CK.

TROUP COUNTY CSNHS-0008-00(232)

SCALE: NO SCALE JULY 2007

DESIGNED RHC	CHECKED JPT	REVIEWED WWD
DRAWN MLF	DESIGN GROUP SWW	APPROVED PVL

BY	REVISIONS	DATE

BRIDGE SHEET 10 OF 21

AS-BUILT

PLAN DATE: 01-25-08

User Name: MLF Date: 1/24/2008 Time: 8:27:59 AM Filename: g:\tro\63732-kia\bridge\final\bridge 2\63732b2-bm2.dgn