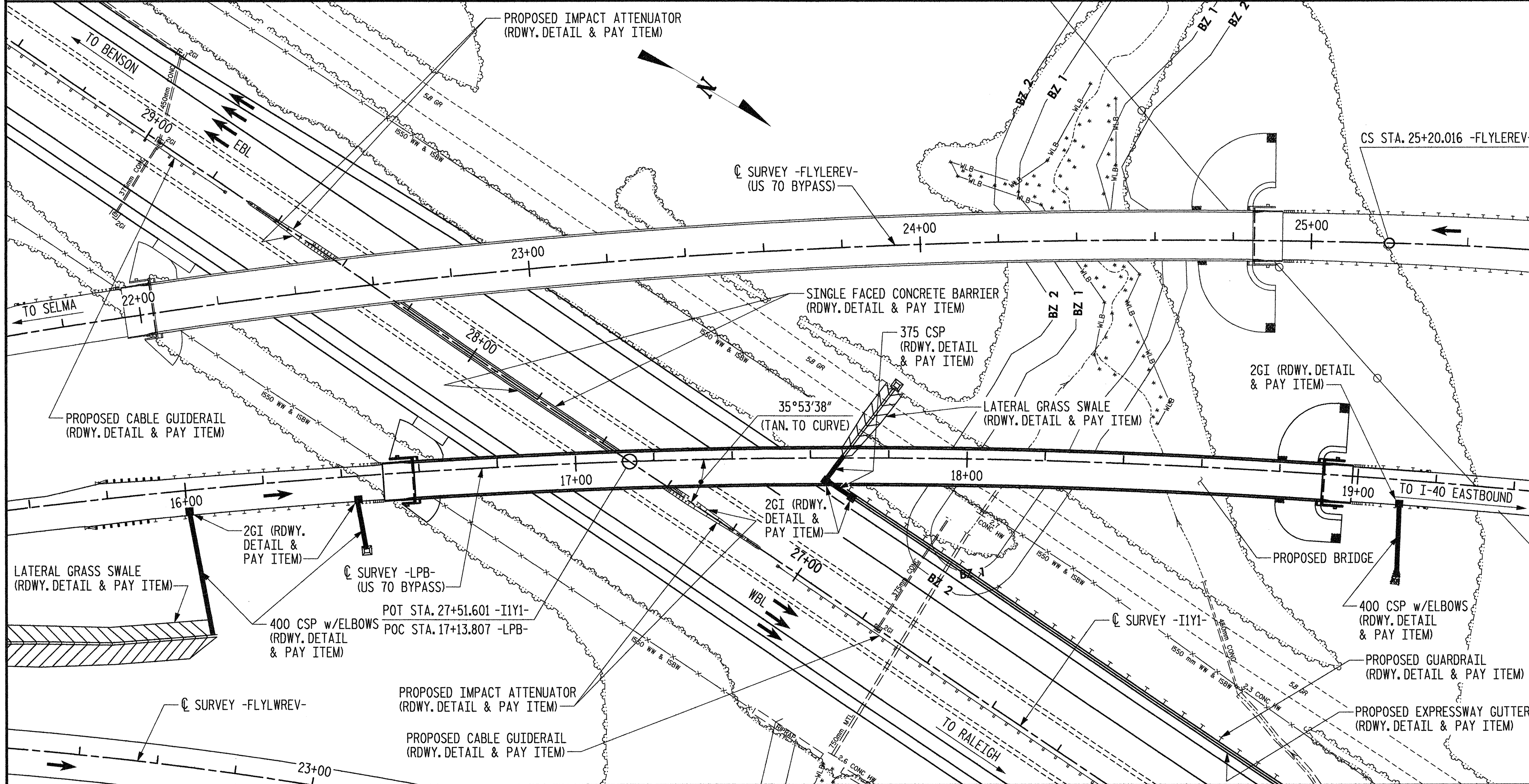


B.M. #R-2552-8: 760mm REBAR WITH NCDOT TRAVERSE CAP STAMPED WITH BM NUMBER, 1.166m LEFT OF STA. 27+40.737 -I1Y1-; EL. 84.103.



LOCATION SKETCH

NOTE: NO KNOWN UTILITY CONFLICTS.

NOTES

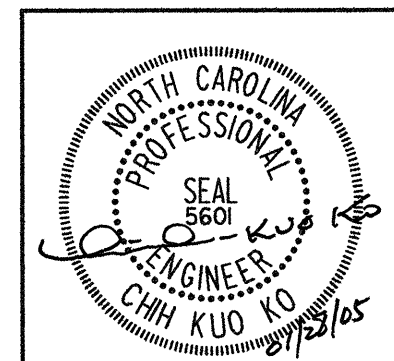
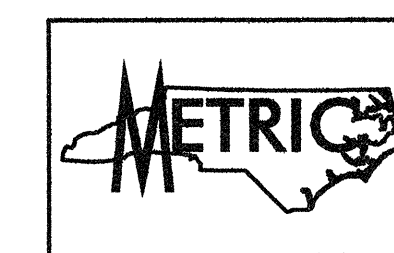
- ALL DIMENSIONS ARE IN MILLIMETERS UNLESS OTHERWISE NOTED.
- ALL ELEVATIONS ARE IN METERS.
- ASSUMED LIVE LOAD = MS 18 OR ALTERNATE LOADING.
- FOR OTHER DESIGN DATA AND GENERAL NOTES, SEE SHEET SNSM.
- THIS BRIDGE HAS BEEN DESIGNED BY THE STRENGTH DESIGN METHOD AS SPECIFIED IN AASHTO SPECIFICATIONS.
- THIS BRIDGE HAS BEEN DESIGNED IN ACCORDANCE WITH THE REQUIREMENTS OF THE "STANDARD SPECIFICATIONS FOR SEISMIC DESIGN OF HIGHWAY BRIDGES FOR SEISMIC PERFORMANCE CATEGORY A".
- ALL STRUCTURAL STEEL SHALL BE AASHTO M270 GRADE 345W AND PAINTED IN ACCORDANCE WITH SYSTEM 4 OF ARTICLE 442-7 OF THE STANDARD SPECIFICATIONS UNLESS OTHERWISE NOTED ON THE PLANS.
- FOR MAINTENANCE AND PROTECTION OF TRAFFIC BENEATH PROPOSED STRUCTURE, SEE SPECIAL PROVISIONS.
- FOR FALSEWORK AND FORMWORK, SEE SPECIAL PROVISIONS.
- FOR FALSEWORK AND FORMS OVER OR ADJACENT TO TRAFFIC, SEE SPECIAL PROVISIONS.
- FOR EROSION CONTROL MEASURES, SEE EROSION CONTROL PLANS.
- FOR SUBMITTAL OF WORKING DRAWING, SEE SPECIAL PROVISIONS.
- FOR METRIC STRUCTURAL STEEL, SEE SPECIAL PROVISIONS.
- NEEDLE BEAMS WILL NOT BE ALLOWED UNLESS OTHERWISE CALLED FOR ON THE PLANS OR APPROVED BY THE ENGINEER.
- PILES FOR END BENTS #1 AND #2 SHALL BE DRIVEN TO A MINIMUM BEARING CAPACITY OF 530 KN EACH.
- PILES FOR INTERIOR BENTS #1, #2 AND #3 SHALL BE DRIVEN TO A MINIMUM BEARING CAPACITY OF 530 KN EACH.
- WHEN DRIVING PILES, THE MAXIMUM BLOW COUNT SHALL NOT BE EXCEEDED.
- THE CLASS AA CONCRETE IN THE BRIDGE DECK SHALL CONTAIN FLY ASH OR GROUND GRANULATED BLAST FURNACE SLAG AT THE SUBSTITUTION RATE SPECIFIED IN ARTICLE 1024-1 AND IN ACCORDANCE WITH ARTICLES 1024-5 AND 1024-6 OF THE STANDARD SPECIFICATIONS. NO ADDITIONAL PAYMENT WILL BE MADE FOR THIS SUBSTITUTION AS IT IS CONSIDERED INCIDENTAL TO THE COST OF THE REINFORCED CONCRETE DECK SLAB.
- REMOVABLE FORMS MAY BE USED IN LIEU OF METAL STAY-IN-PLACE FORMS IN ACCORDANCE WITH ARTICLES 420-3 OF THE STANDARD SPECIFICATIONS.
- FOR LIMITS OF TEMPORARY SHORING FOR MAINTENANCE OF TRAFFIC, SEE TRAFFIC CONTROL PLANS. FOR PAY ITEM FOR TEMPORARY SHORING FOR MAINTENANCE OF TRAFFIC, SEE ROADWAY PLANS.
- FOR CRANE SAFETY, SEE SPECIAL PROVISIONS.

TOTAL BILL OF MATERIAL

	FOUNDATION EXCAVATION	REINFORCED CONCRETE DECK SLAB	GROOVING BRIDGE FLOORS	CLASS "A" CONCRETE	BRIDGE APPROACH SLABS	REINFORCING STEEL	STRUCTURAL STEEL	HP 310 X 79 STEEL PILES	CONCRETE BARRIER RAIL	100mm SLOPE PROTECTION	PLAIN RIP RAP CLASS II (600mm THICK)	FILTER FABRIC FOR DRAINAGE	POT BEARINGS	MODULAR EXPANSION JOINT SEALS	
	LUMP SUM	SQ. M	SQ. M	CU. M	LUMP SUM	kg	APPROX. kg	NO.	M	M	SQ. M.	METRIC TONS	SQ. M.	LUMP SUM	LUMP SUM
SUPERSTRUCTURE		2318.0	1993.2				548150		464.073					LUMP SUM	LUMP SUM
END BENT #1				33.2	LUMP SUM	2632		10	108.0		230				
BENT #1	LUMP SUM			133.4		12286		36	324.0						
BENT #2	LUMP SUM			90.3		8435		25	250.0						
BENT #3	LUMP SUM			117.7		12382		30	315.0						
END BENT #2				34.5	LUMP SUM	2747		10	155.0		500	520			
TOTAL	LUMP SUM	2318.0	1993.2	409.1	LUMP SUM	38482	548150	111	1152.0	464.073	230	500	520	LUMP SUM	LUMP SUM

PROJECT NO. R-2552AA  
 WAKE-JOHNSTON COUNTY  
 STATION: 27+51.601 -I1Y1-

SHEET 5 OF 5



STATE OF NORTH CAROLINA  
 DEPARTMENT OF TRANSPORTATION  
 RALEIGH  
 GENERAL DRAWING  
 FOR BRIDGE ON LOOP B (US 70 BYPASS)  
 OVER EXISTING I-40  
 BETWEEN SR 1525 (CORNWALLIS ROAD)  
 AND SR 2703 (NEW BETHEL ROAD)

Plans prepared by:  
**KO & ASSOCIATES, P.C.**  
 Consulting Engineers  
 1011 SCHAUB DR., SUITE #202  
 RALEIGH, N.C. 27606  
 For Division of Highways

REVISIONS						SHEET NO.
NO.	BY:	DATE:	NO.	BY:	DATE:	TOTAL SHEETS
1			3			5-41
2			4			429

DWG. NO. 5

PLOT: 01/28/2005 08:48:46 AM Ko & Associates, P.C.  
 FILE NAME: r-2552aa.dwg

DRAWN BY: B.E. LANNING DATE: JAN. 2005  
 CHECKED BY: J.C. KO / A.K. ORR DATE: JAN. 2005