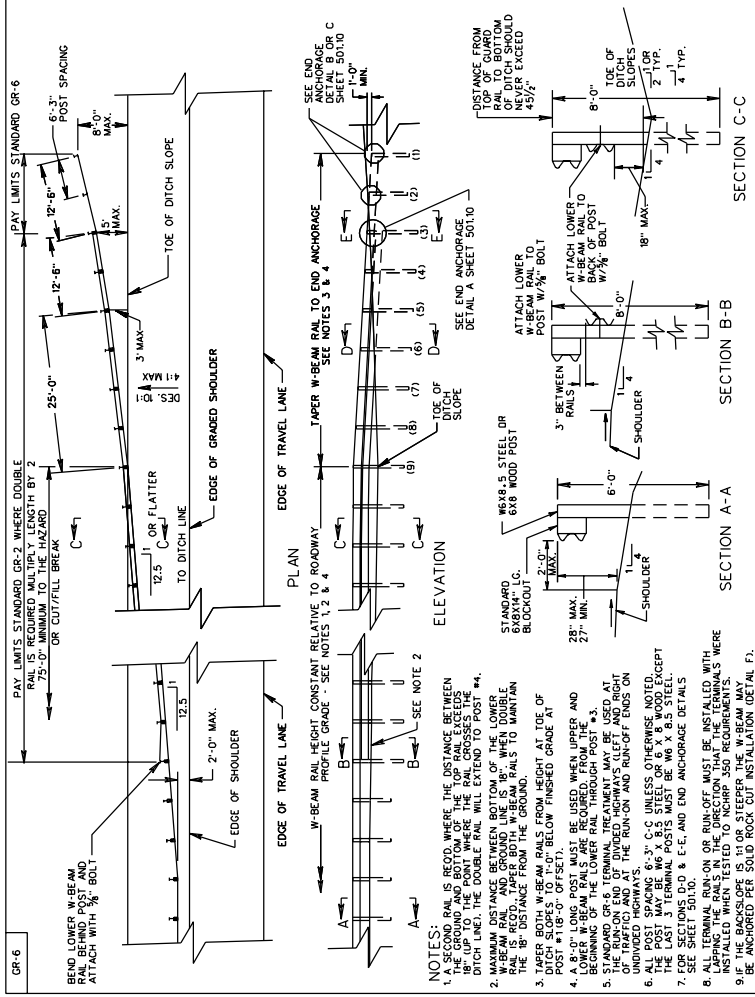


SURVEYED BY _____
SUPERVISED BY _____
DESIGNED BY _____

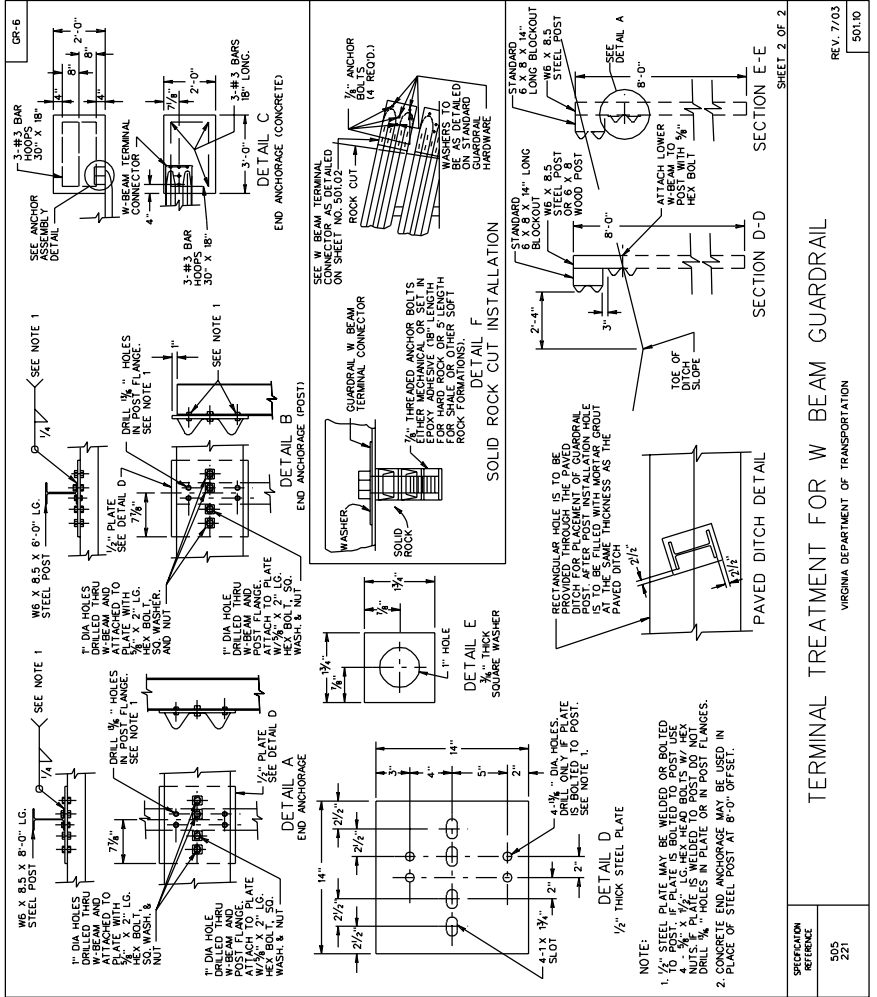
DESIGN FEATURES RELATING TO CONSTRUCTION OR TO REGULATION AND CONTROL OF TRAFFIC MAY BE SUBJECT TO CHANGE AS DEEMED NECESSARY BY THE DEPARTMENT

NO.	REVISION	DATE	BY	CHECKED	APPROVED



- NOTES:**
1. SECOND RAIL IS REQUIRED WHERE THE DISTANCE BETWEEN THE GROUND AND BOTTOM OF THE TOP RAIL EXCEEDS THE DITCH LINE. THE DOUBLE RAIL WILL EXTEND TO POST #4.
 2. MAXIMUM DISTANCE BETWEEN BOTTOM OF THE LOWER W-BEAM RAIL AND GROUND LINE IS 18". WHEN DOUBLE RAIL IS USED, THE 18" DISTANCE FROM THE GROUND.
 3. TAPER BOTH W-BEAM RAILS FROM HEIGHT AT TOE OF POST AT 18" OF OFFSET BELOW FINISHED GRADE AT 1:1.
 4. A 8'-0" LONG POST MUST BE USED WHEN UPPER AND LOWER W-BEAM RAILS ARE REQUIRED. FROM THE BOTTOM END OF DIVIDED-HIGHWAYS LEFT AND RIGHT UNDIVIDED HIGHWAYS.
 5. STANDARD GR-6 TERMINAL TREATMENT MAY BE USED AT UNDIVIDED HIGHWAYS.
 6. ALL POST SPACING 6'-3" O.C. UNLESS OTHERWISE NOTED. EXCEPT THE LAST 3 TERMINAL POSTS MUST BE W6 X 8.5 STEEL. SEE SHEET 501.09.
 7. FOR SECTIONS D-D & E-E, END ANCHORAGE DETAILS.
 8. LAPPING THE RAILS IN THE DIRECTION THAT THE TERMINALS WERE INSTALLED WHEN TESTED TO NCHRP 350 REQUIREMENTS.
 9. END ANCHORAGES MUST BE INSTALLED PER DETAIL F1.

TERMINAL TREATMENT FOR W BEAM GUARDRAIL
 VIRGINIA DEPARTMENT OF TRANSPORTATION
 SPECIFICATION REFERENCE: 505, 221
 REV. 7/03
 501.09



- NOTE:**
1. 1/2" THICK STEEL PLATE MAY BE WELDED OR BOLTED TO POST. IF PLATE IS BOLTED TO POST USE 4" LONG 1/2" O.C. BOLTS W/ HEX DRILL 1/4" HOLES IN PLATE OR IN POST FLANGES.
 2. CONCRETE END ANCHORAGE MAY BE USED IN PLACE OF STEEL POST AT 8'-0" OFFSET.

TERMINAL TREATMENT FOR W BEAM GUARDRAIL
 VIRGINIA DEPARTMENT OF TRANSPORTATION
 SPECIFICATION REFERENCE: 505, 221
 REV. 7/03
 SPECIAL DESIGN DRAWING NO. A-132

NO.	REVISION	DATE	BY	CHECKED	APPROVED