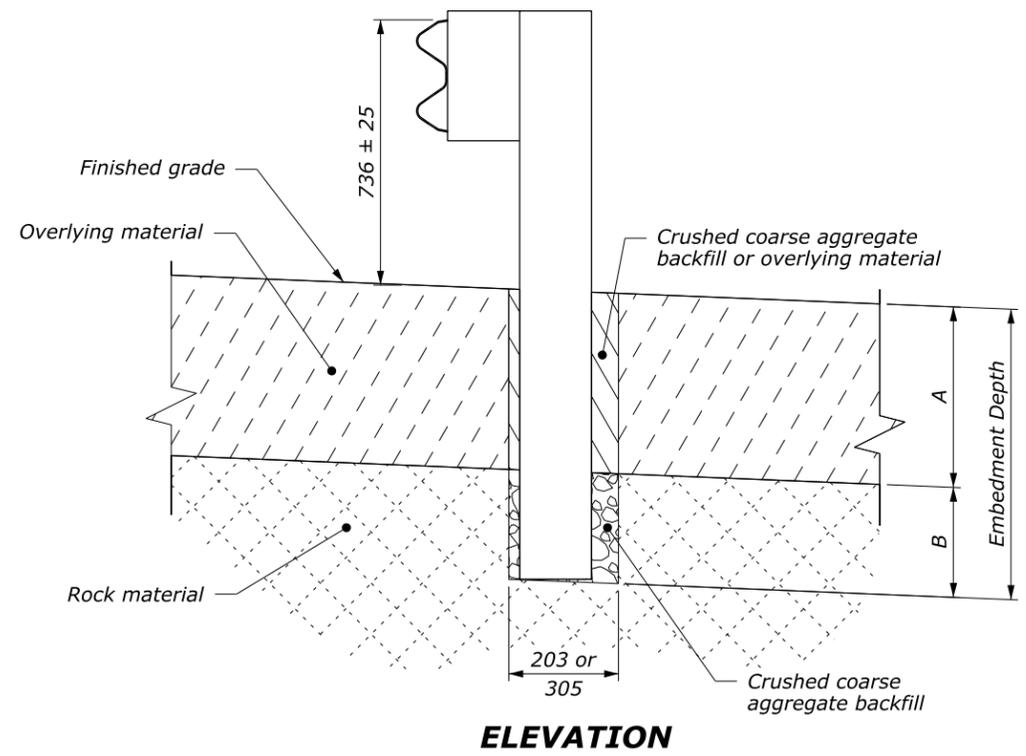
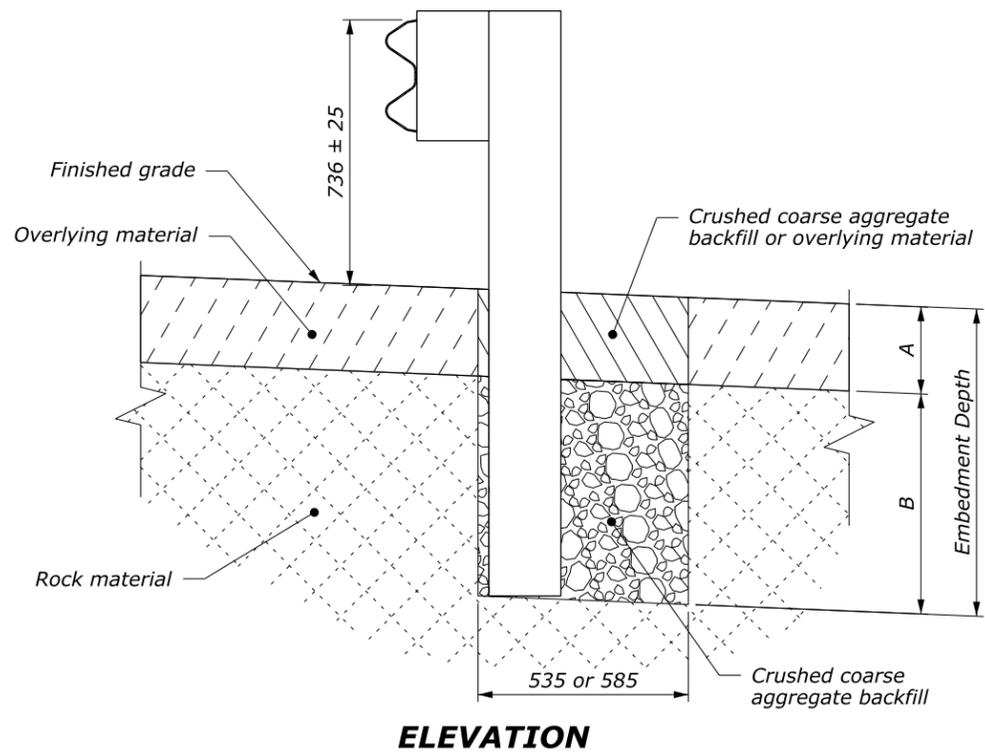


- NOTE:**
1. Use this standard when posts cannot be embedded to the minimum depth shown on Standards M617-10 or M617-11.
  2. Unless otherwise specified use either the circular or the oblong hole configuration for Case 1 conditions.
  3. Crushed coarse aggregate backfill conforms to "coarse aggregate for concrete", or "granular backfill for underdrain pipe with geotextile" in Section 703.
  4. Place crushed coarse aggregate according to the post requirements in Section 617.
  5. Treat field cut galvanized steel post surfaces that expose the base metal with two coats of zinc-oxide paint.
  6. Furnish hardware in the metric sizes shown. Equivalent US Customary sizes may be used when metric sizes are unavailable.
  7. Dimensions without units are millimeters.



**Case 1: Overlying material depth (A) is 457 mm or less.**

**Case 2: Overlying material depth (A) is greater than 457 mm.**

POST EMBEDMENT DIMENSIONS			
HOLE TYPE	EMBEDMENT DEPTH	OVERLYING MATERIAL (A)	DRILLING DEPTH (B)
Case 1	610 to 1065	0 to 457	610
Case 2	760 to 1065	> 457 to 760	305
	1065	> 760	1065 - A

NO SCALE

U.S. DEPARTMENT OF TRANSPORTATION  
 FEDERAL HIGHWAY ADMINISTRATION  
 FEDERAL LANDS HIGHWAY

METRIC STANDARD

**G4 W-BEAM GUARDRAIL  
 INSTALLATION IN ROCK**

STANDARD APPROVED FOR USE --/--

REVISID: 6/2014  
 DRAFT: 6/2014

STANDARD  
**M617-13**