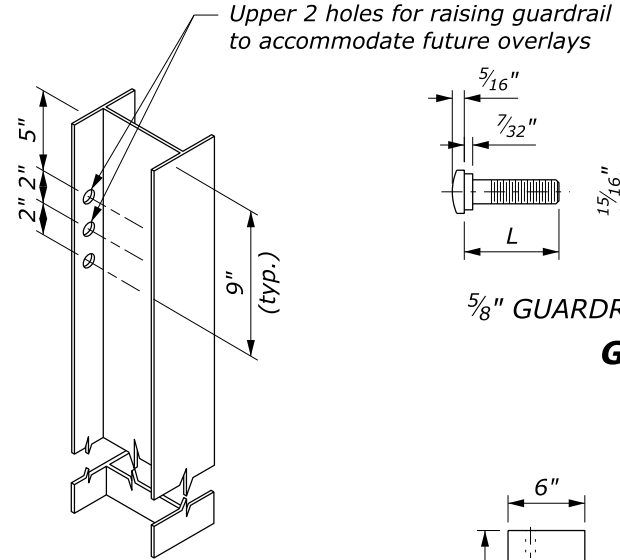
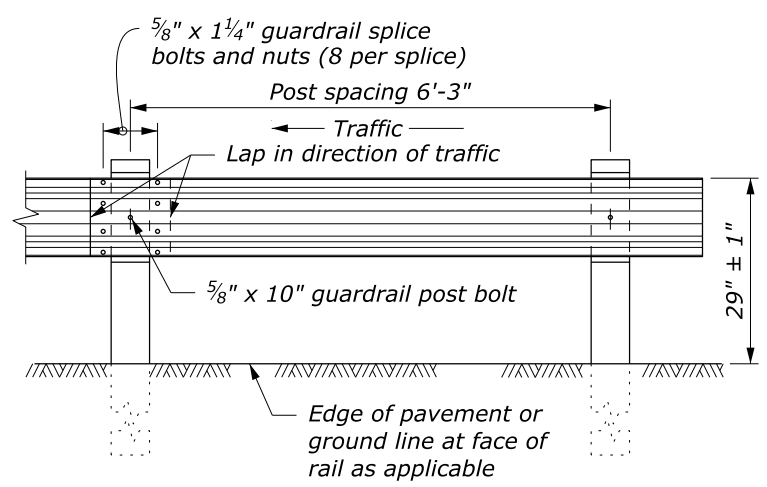
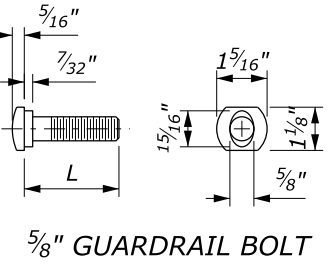


- NOTE:**
- When encountering impenetrable material, see Standard 617-13.
 - See Special Contract Requirements when 7 foot or longer posts are specified.
 - See Special Contract Requirements when the alternate hole arrangement is specified.
 - Install delineator every fourth post. Fasten delineator to post using two galvanized 2" x 3/8" bolts with a washer on both sides, a lock washer, and nut; or fasten as specified by the manufacturer. Alternate delineator types may be used if approved.
 - Blockout may be wood, plastic, or composite material. Use consistent material throughout the length of guardrail run.
 - Dimensional tolerances not shown or implied are intended to be those consistent with the proper functioning of the part, including its appearance, and accepted manufacturing practices.

W BEAM RAIL

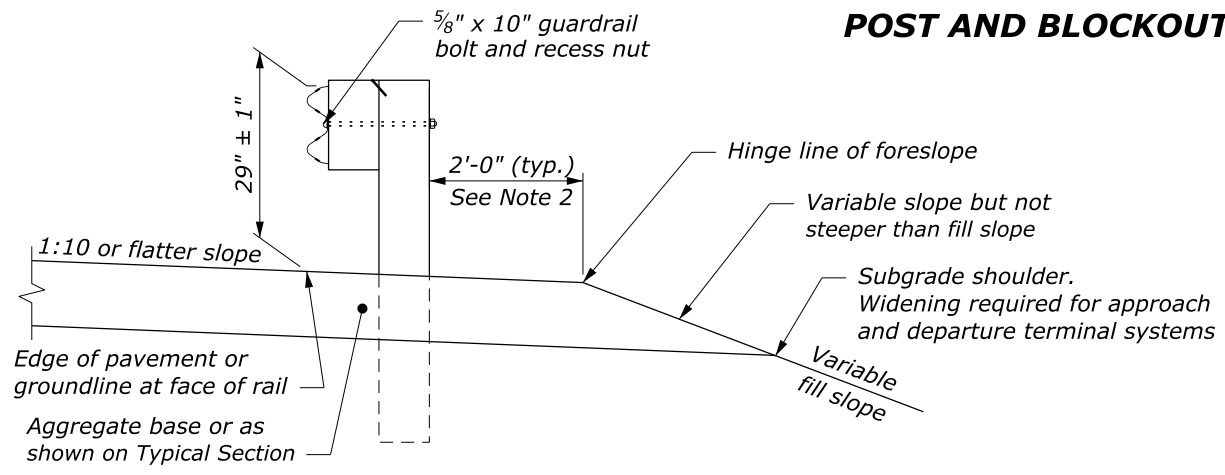


| L | Thread Length |
|--------|----------------|
| 1 1/4" | 1 1/8" minimum |
| 2" | 1 3/4" minimum |
| 10" | 4" minimum |
| 18" | 4" minimum |
| 25" | 4" minimum |



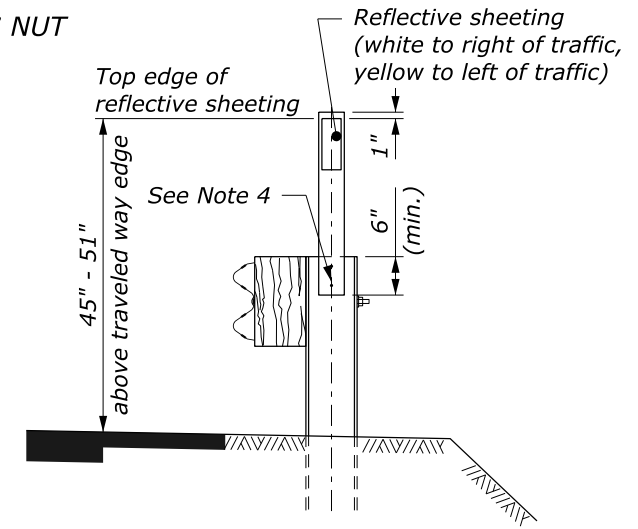
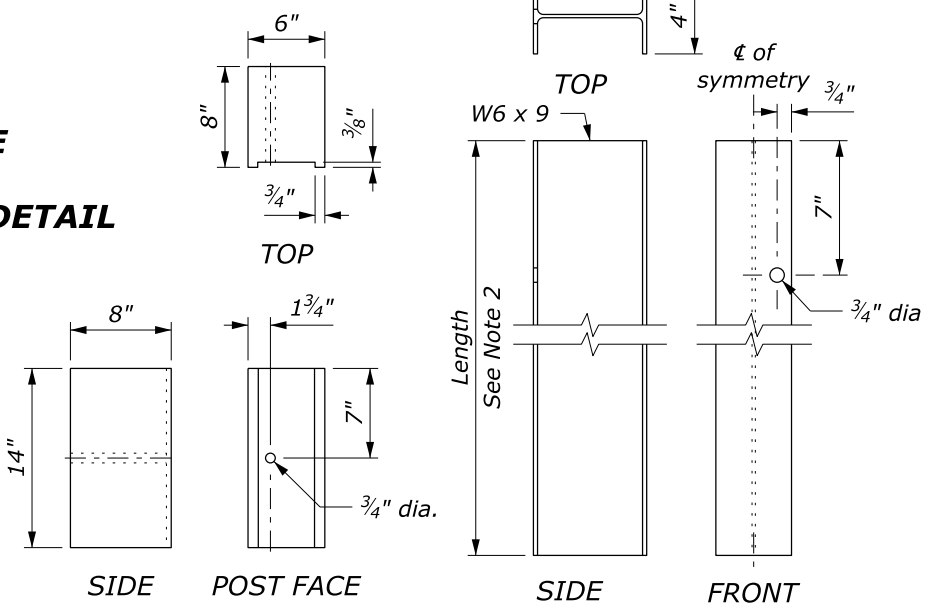
GUARDRAIL BOLT AND RECESS NUT

POST SPACING STANDARD POST SECTION



TYPICAL GUARDRAIL CROSS SECTION

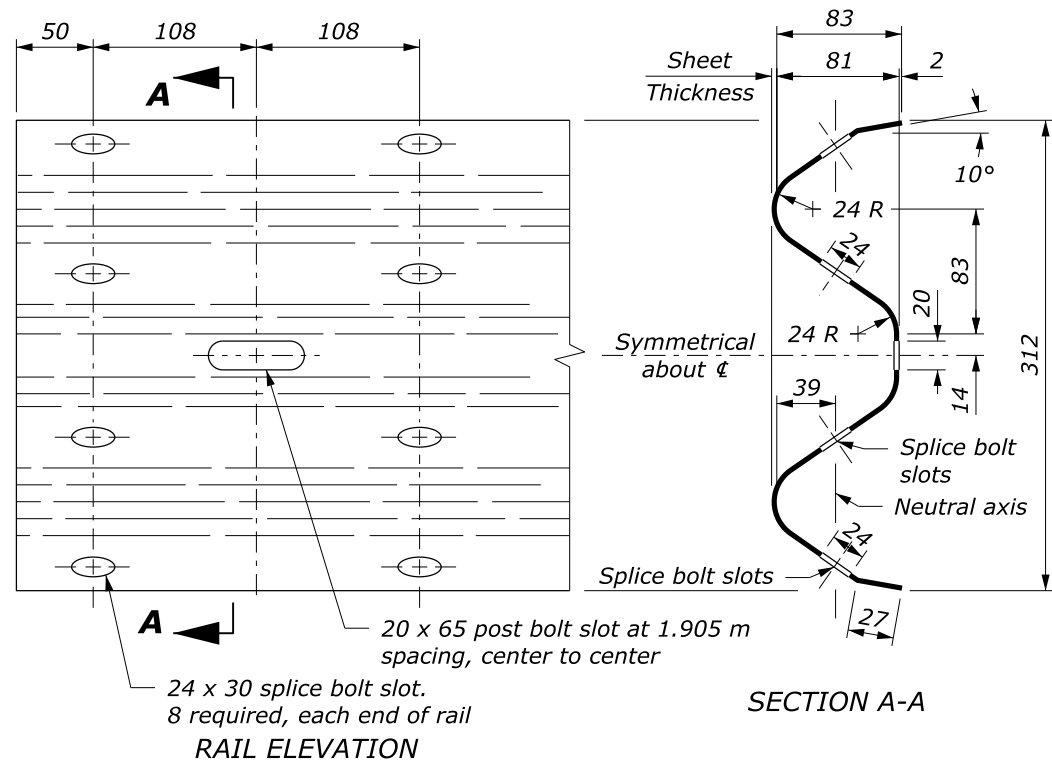
ALTERNATE HOLE ARRANGEMENT POST AND BLOCKOUT DETAIL



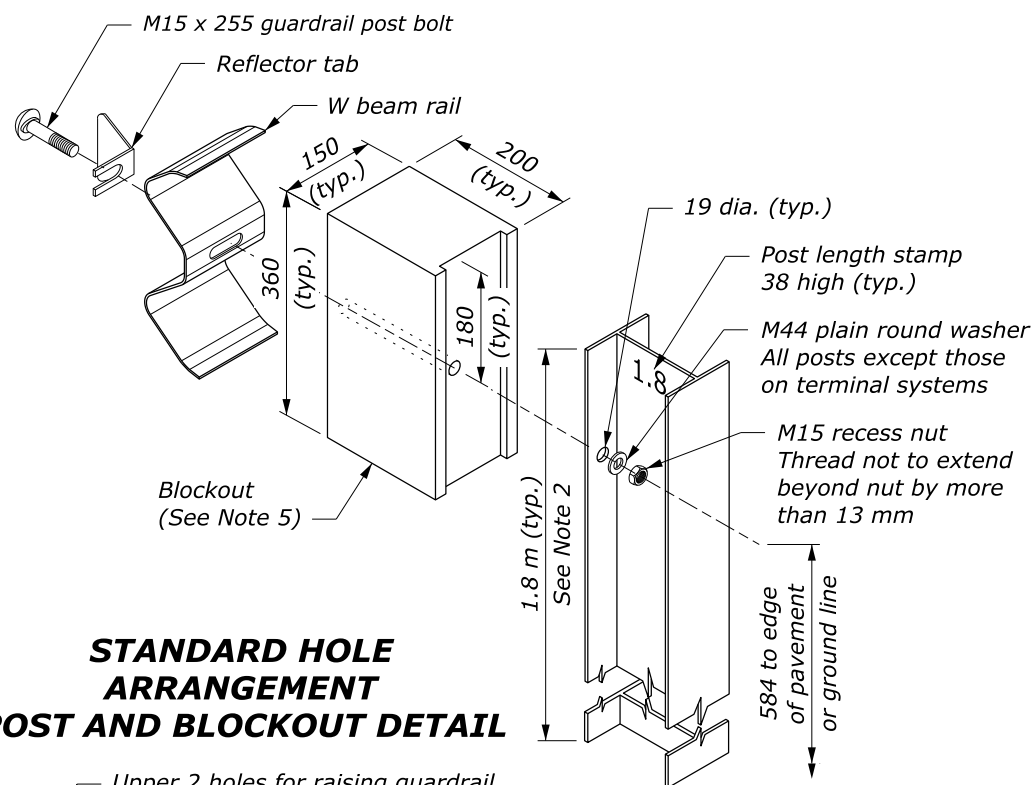
FLEXIBLE GUIDE POST GUARDRAIL MOUNT

| | |
|----------------------------------------------------------------------------|----------------------------|
| U.S. DEPARTMENT OF TRANSPORTATION, FHWA OFFICE OF FEDERAL LANDS HIGHWAY | FLH STANDARD 617-11 |
| G4 W-BEAM GUARDRAIL STEEL POSTS | SPECIFICATION FP-24 |
| | APPROVED FOR USE 1/2024 |

15 July 2024 2:47 PM c:\pwwork\00419223\Std617-11.dgn [Std 617-11]



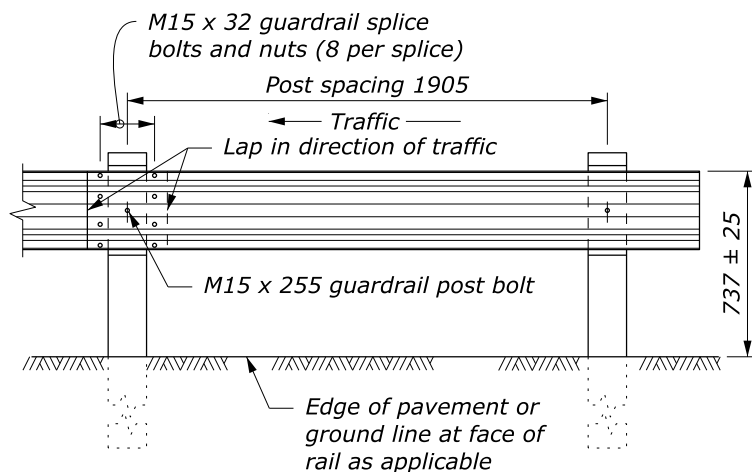
STANDARD HOLE ARRANGEMENT POST AND BLOCKOUT DETAIL



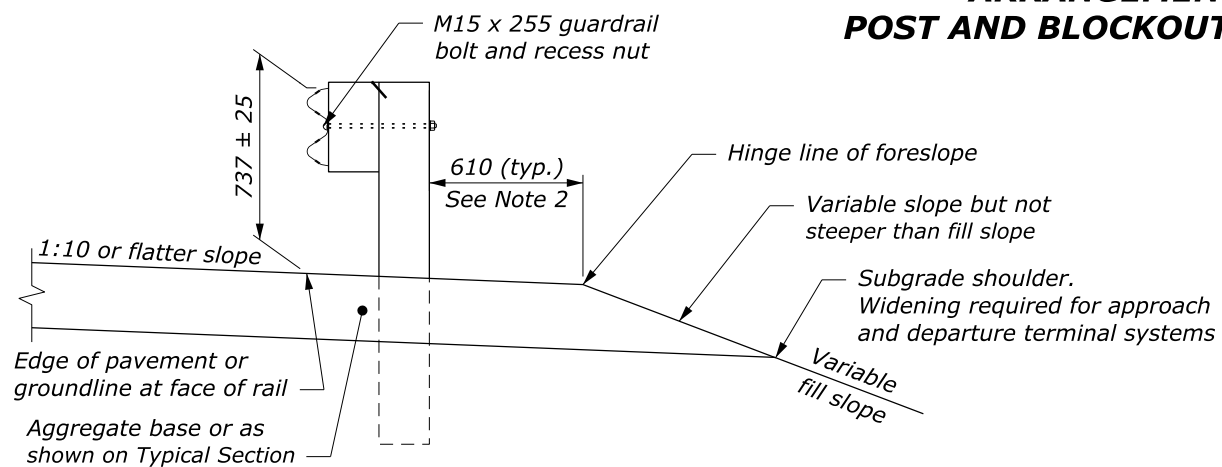
NOTE:

- When encountering impenetrable material, see Standard M617-13.
- See Special Contract Requirements when 2 m or longer posts are specified.
- See Special Contract Requirements when the alternate hole arrangement is specified.
- Install delineator every fourth post. Fasten delineator to post using two galvanized 50 mm x 9.5 mm bolts with a washer on both sides, a lock washer, and nut; or fasten as specified by the manufacturer. Alternate delineator types may be used if approved.
- Blockout may be wood, plastic, or composite material. Use consistent material throughout the length of guardrail run.
- Dimensional tolerances not shown or implied are intended to be those consistent with the proper functioning of the part, including its appearance, and accepted manufacturing practices.
- Furnish hardware in the metric sizes shown. Equivalent US Customary sizes may be used when metric sizes are unavailable.

W BEAM RAIL

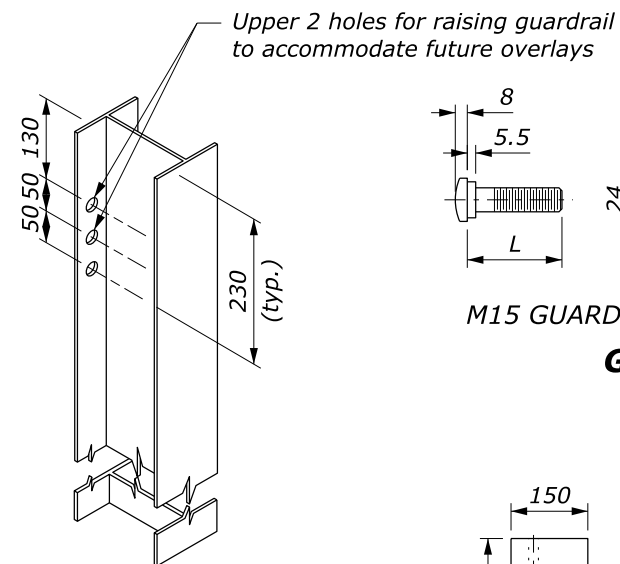


POST SPACING STANDARD POST SECTION



TYPICAL GUARDRAIL CROSS SECTION

ALTERNATE HOLE ARRANGEMENT POST AND BLOCKOUT DETAIL

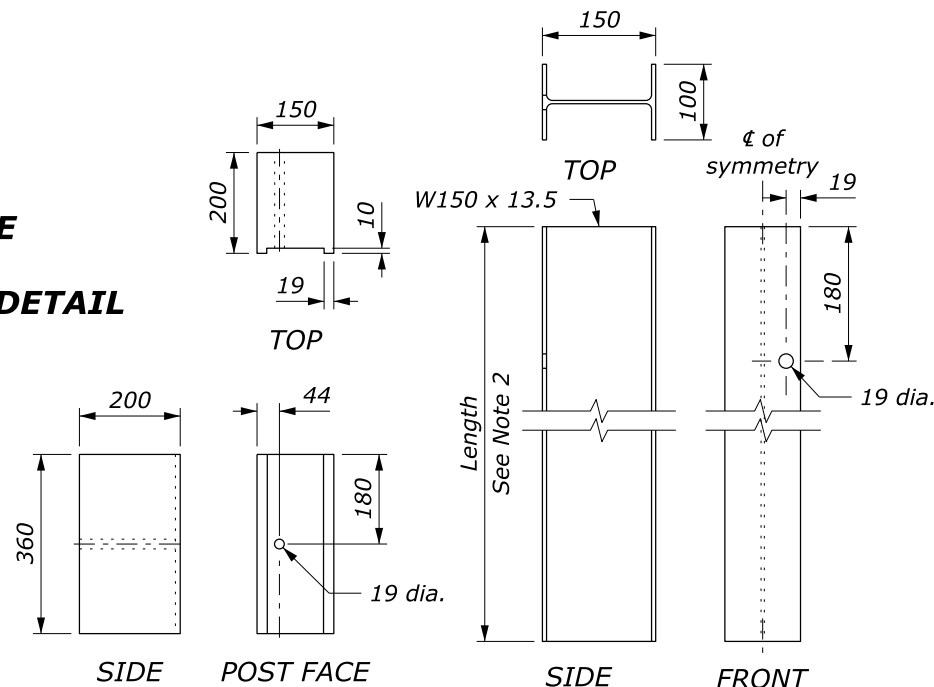


| L | Thread Length |
|-----|---------------|
| 32 | 30 minimum |
| 50 | 45 minimum |
| 255 | 100 minimum |
| 460 | 100 minimum |
| 640 | 100 minimum |

M15 GUARDRAIL BOLT

M15 RECESS NUT

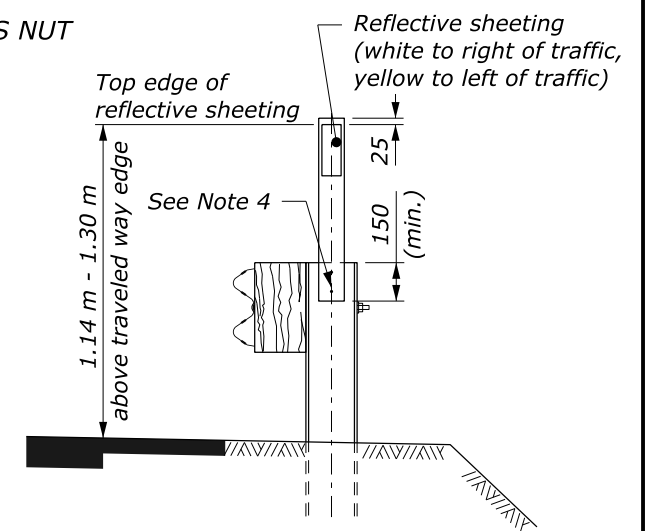
GUARDRAIL BOLT AND RECESS NUT



BLOCKOUT

STRUCTURAL SHAPE POST (STANDARD HOLE ARRANGEMENT)

NO SCALE



FLEXIBLE GUIDE POST GUARDRAIL MOUNT

This drawing contains **Metric** units of measure. Dimensions without units are millimeters.

U.S. DEPARTMENT OF TRANSPORTATION, FHWA
 OFFICE OF FEDERAL LANDS HIGHWAY
G4 W-BEAM GUARDRAIL STEEL POSTS

FLH STANDARD M617-11
 SPECIFICATION FP-24
 APPROVED FOR USE 1/2024