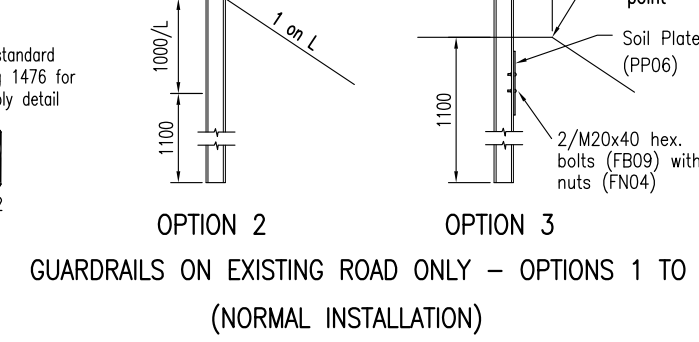
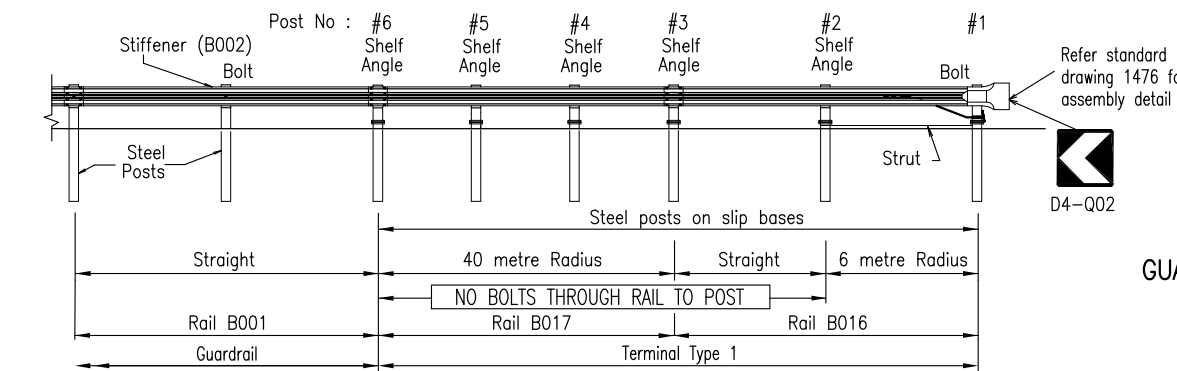
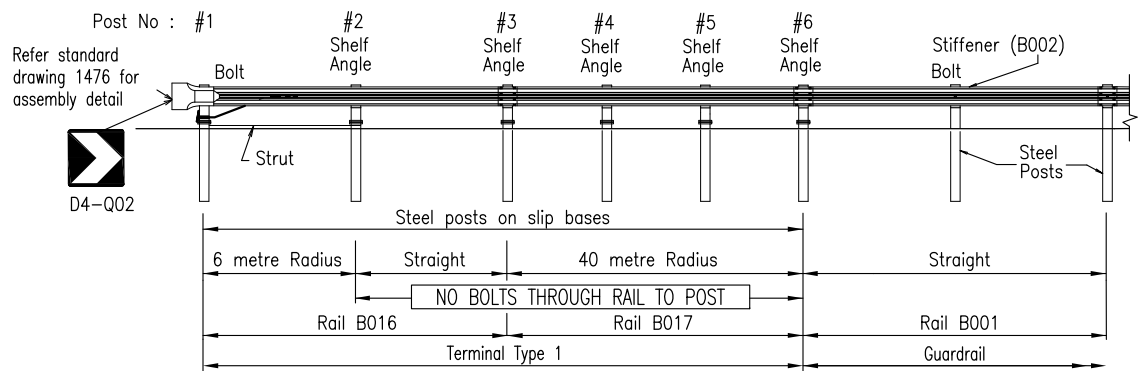
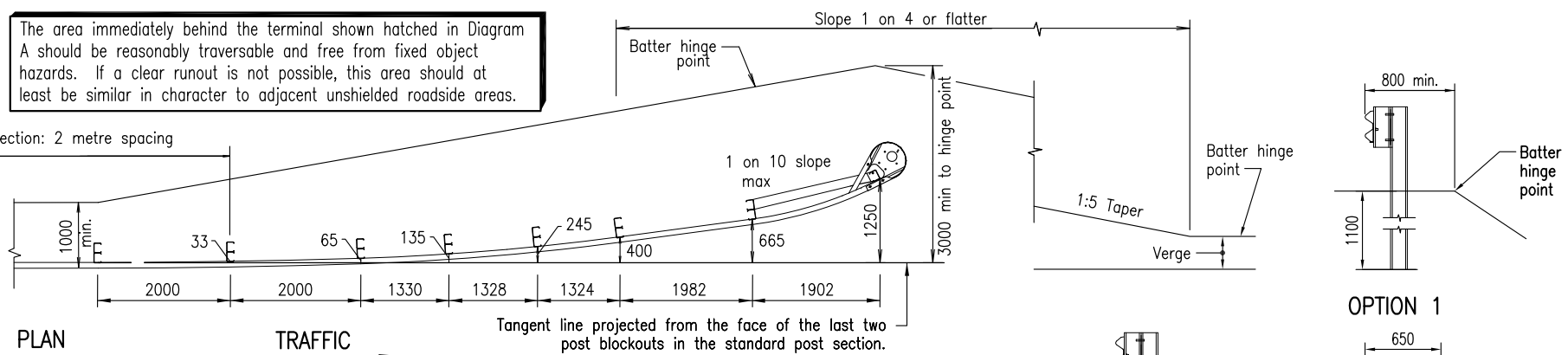
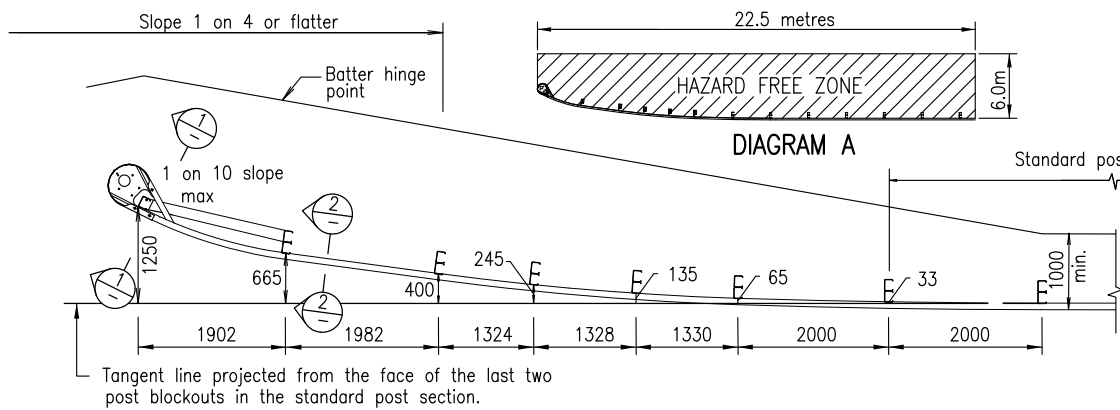
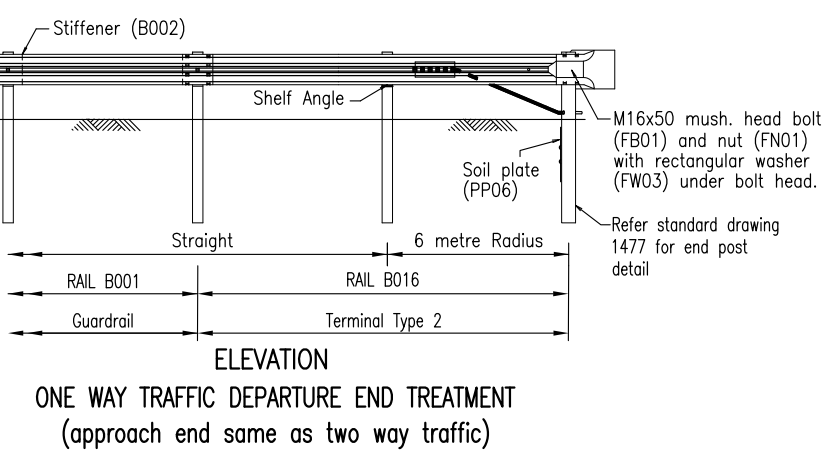
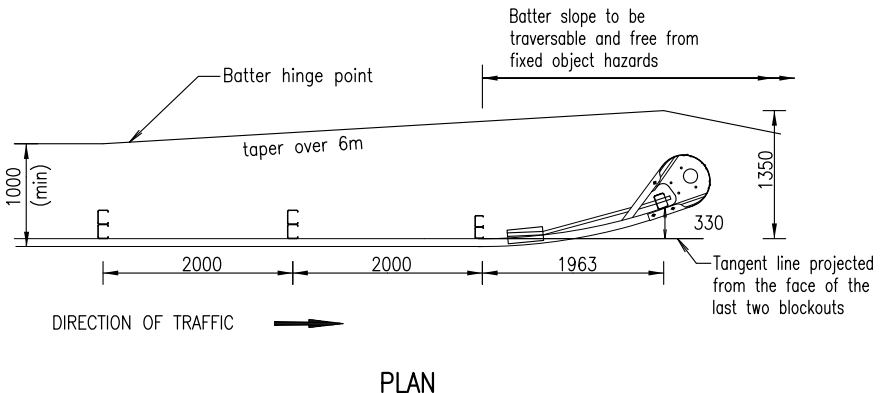


The area immediately behind the terminal shown hatched in Diagram A should be reasonably traversable and free from fixed object hazards. If a clear runoff is not possible, this area should at least be similar in character to adjacent unshielded roadside areas.



GUARDRAILS ON EXISTING ROAD ONLY – OPTIONS 1 TO 3 (NORMAL INSTALLATION)

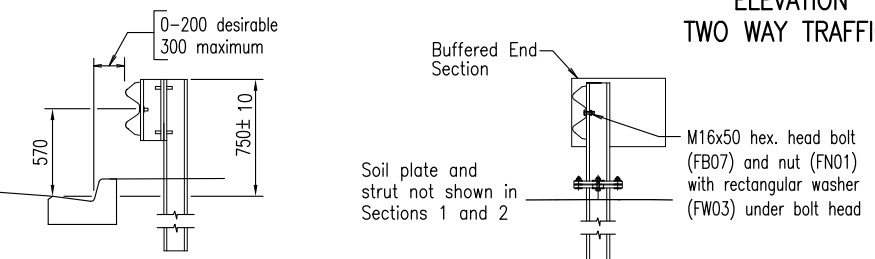
ELEVATION TWO WAY TRAFFIC



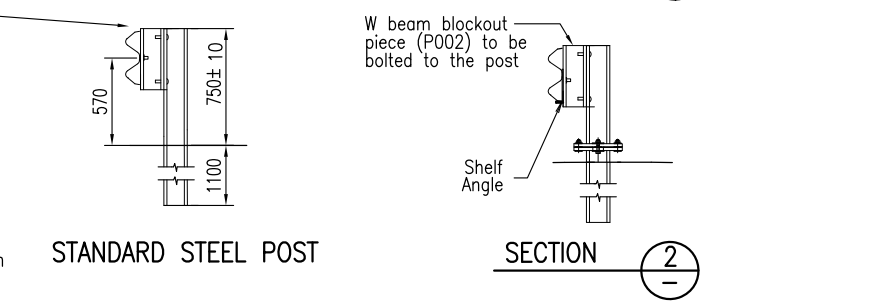
ONE WAY TRAFFIC DEPARTURE END TREATMENT (approach end same as two way traffic)

One way traffic departure end treatments are to be used on safety barriers only when there is no possibility of opposing traffic impacting them. They are not to be used within clear zone of opposing traffic.

- NOTES:**
- TIGHTENING OF NUTS: Nut FN01 for slip base plates to be tightened to 25 Nm. Nut FN05 to cable assembly to be tightened so that there is no slack in the cable. All other nuts shall be snug tight to AS4100.
 - FLAME CUTTING of galvanised post or rail is not permitted.
 - THE MELT SYSTEM extends from Post #1 to Post #6, a length of 8 metres.
 - GUARDRAIL LAPS are to be in the direction of adjacent traffic to avoid exposing the end of the rail to oncoming vehicles.
 - STIFFENER PLATES shall be used at standard posts without a rail lap.
 - THE MINIMUM INSTALLED LENGTH of W beam barrier shall be: 28 metres for a two way road – i.e. a MELT both ends. 20 metres for a one way road – i.e. a MELT on the approach end and one way departure end treatment on the depart end.
 - DIMENSIONS are in millimetres unless otherwise shown.
- ASSOCIATED DOCUMENTS:**
Main Roads Standard Drawings Roads Manual
Main Roads Specifications and Technical Standards Manual
- REFERENCED DOCUMENTS:**
Standard Drawings:
1043 Reinforcing Steel – Standard Bar Shapes Drawing 1 of 2 and 2 of 2
1044 Reinforcing Steel – Standard Hook, Lap and Bend Details and General Steel Reinforcement Information
1476 Steel Beam Guardrail – Terminal Components
1477 Steel Beam Guardrail – Posts and Blockouts, Soil and Bearing Plates, Slip Base Plate
1478 Steel Beam Guardrail – W Beam Anchor Bracket Delineation Unit Post on Base Plate Abraham Blockout
1479 Steel Beam Guardrail – Bolts, Nuts, Screws and Washers Cable Assembly with Fasteners
1480 Steel Beam Guardrail – Fabrication Details for W Beam Rails and Rail Components
1482 Steel Beam Guardrail – W Beam and Thrie Beam Assemblies
1490 Steel Beam Guardrail – Installation and Setout Footing Details
- Standard Specifications:**
MRTS03 Drainage, Retaining Structures and Protective Treatments
MRTS14A Road Furniture (Steel Work)
- Australian Standards:**
AS/NZS 3845 Road Safety Barrier Systems
AS/NZS 4671 Steel Reinforcing Materials

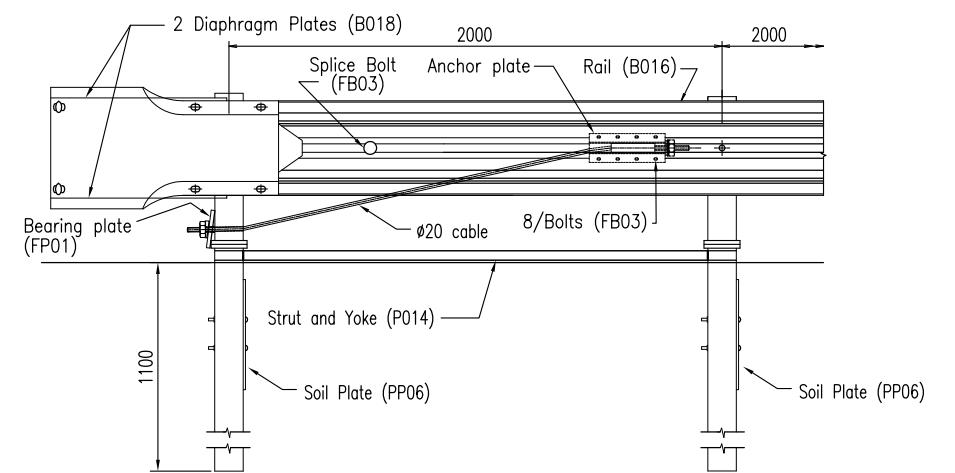


GUARDRAIL BEHIND KERB



STANDARD STEEL POST

* Guardrail installed fully in accordance with the dimensions and tolerances provided will result in an upstand between the top of the rail and the top of the blockout/post of dimension 11.5mm to 34mm.



Kerbs shall not be located in front of Terminal Type1. Specialist advice should be sought regarding alternative kerb location and treatment.

ELEVATION – APPROACH END

STEEL BEAM GUARDRAIL		Queensland Government	
		Department of Transport and Main Roads	
INSTALLATION AND SETOUT	A3	Standard Drawing No	
	Not to Scale	1474	
		Date	11/10
	A	B	C