

**Comments to Appendix/Drawings
in Joint BNSF-UPRR Guidelines for Railroad Grade Separation Projects**

Fence Details – Plan 711000 Sheet 1:

1. This sheet suggests that an 8'-0" tall fence would be required on retaining walls. Provisions for such a tall fence will only be used in areas with possible vandalism. If required simply to protect railroad employees from accidentally walking off a retaining wall or abutment element, TxDOT reserves the right to specify a shorter handrail or extension of the retaining wall/abutment that provides a height of at least 42" above finished ground.

General Overhead Structure Drawing – Plan 711100 Sheet 1:

1. See previous comments regarding 23'-4" vertical clearance.
2. See previous comments regarding access roads.
3. See previous comments regarding fences.
4. See previous comments regarding pier locations (not necessarily out of RR ROW)
5. See previous comments regarding maintenance of culverts.
6. See previous comments regarding future tracks.

Rolled Beams w/ Steel Plate Deck – Plan 711200 Sheet 2:

1. See previous comments regarding fascia beams.
2. Handrail with fence appears too short to function as vandalism prevention. Suggest indicating how tall a fence would need to be in this application (8 to 10 ft above top of ballast curb).

Steel Plate Girders w/ Steel Plate Deck – Plan 711200 Sheet 3:

1. See previous comments regarding fascia beams.
2. Handrail with fence appears too short to function as vandalism prevention. Suggest indicating how tall a fence would need to be in this application (8 to 10 ft above top of ballast curb).
3. Sole plate with bearing pad might not be appropriate bearing type at longer span lengths.

Rolled Beams w/ Concrete Deck – Plan 711200 Sheet 4:

1. See previous comments regarding fascia beams.
2. Suggest indicating how tall a fence would need to be in this application (8 to 10 ft above top of ballast curb).

Steel Plate Girders w/ Concrete Deck – Plan 711200 Sheet 5:

1. See previous comments regarding fascia beams.
2. Suggest indicating how tall a fence would need to be in this application (8 to 10 ft above top of ballast curb).

RR Standard Prestr Precast Concrete Double Cell Box Beams – Plan 711200 Sheet 6:

1. See previous comments regarding fascia beams.

2. Suggest indicating how tall a fence would need to be in this application (8 to 10 ft above top of ballast curb).

Prestressed Precast Concrete Box Beams – Plan 711200 Sheet 7:

1. See previous comments regarding fascia beams.
2. Suggest indicating how tall a fence would need to be in this application (8 to 10 ft above top of ballast curb).

Prestr Precast Concrete AASHTO Type Girder w/ Concrete Deck– Plan 711200 Sheet 8:

1. See previous comments regarding fascia beams.
2. Suggest indicating how tall a fence would need to be in this application (8 to 10 ft above top of ballast curb).
3. Please confirm that prestressed precast I-beams are not limited to AASHTO shapes, but that bulb tee shapes are also acceptable.
4. Shape of deck overhang may be altered to flange up with different superstructure type (ie. gull wing to match curb/walkway of through girder)

Steel Through Plate Girders w/ Steel Plate Deck – Plan 711200 Sheet 9:

1. 12'-0" centerline of track to centerline girder dimension could vary significantly depending on span length. In many cases this could be as little as 10'-6".

Waterproofing Details – Plan 711200 Sheet 11:

1. Indicate details for steel plate deck
2. For skewed condition, clarify if the 13" wide armor plate should be used at the 12' wide rear edge of the approach slab only, or also along the sides of the approach slab and the skewed back edge of the abutment backwall outside of the approach slab.
3. We have received comment that the 13" wide armor plate have a top curved lip to hold down edge of waterproofing system. Please advise if this is desired.
4. Should cover plates be galvanized or weathering steel in the case of the weathering steel deck plates?

Flashing Details for Waterproofign – Plan 711200 Sheet 12:

1. Galvanized plates and hardware should not be used in the case of weathering steel or painted weathering steel.
2. 1'-6" dimension for concrete deck is to end of waterproofing, while same dimension is to CL flashing connection bolt for steel deck. These probably should net the same waterproofing depth (18"). Please clarify.