
ORIGINATION FORM

Proposed Revisions to a Standard Plans Index (Please provide all information — Incomplete forms will be returned)

Contact Information:

Date: February 12, 2020

Originator: Cheryl Hudson

Phone: (850) 414-5332

Email: cheryl.hudson@dot.state.fl.us

Standard Plans:

Index Number: 521-428

Sheet Number (s): 1

Index Title: Traffic Railing - (42" Single-Slope)

Summary of the changes:

Sheet 1: Numbered and reorganized notes; Added drainage slot information; Clarified the height transitions; Deleted crash rating; Sheet 3: Changed height transitions (deleted transition to 44") Changed Notes

Commentary / Background:

MASH crash criteria met is in the SPI (not a construction note). Numbered notes to make them consistent with other Indexes and within the Single-Slope Traffic Railings. Sheet 2 deleted Detail "B" because it is included in 521-610 and does not transition to 44" Roadway Barriers which are for pier protection-different shape.

Other Affected Offices / Documents: (Provide name of person contacted)

Yes	No	
☐	☒	Other Standard Plans –
☐	☒	FDOT Design Manual –
☐	☒	Basis of Estimates Manual –
☐	☒	Standard Specifications –
☐	☒	Approved Product List –
☐	☒	Construction –
☐	☒	Maintenance –

Origination Package Includes:

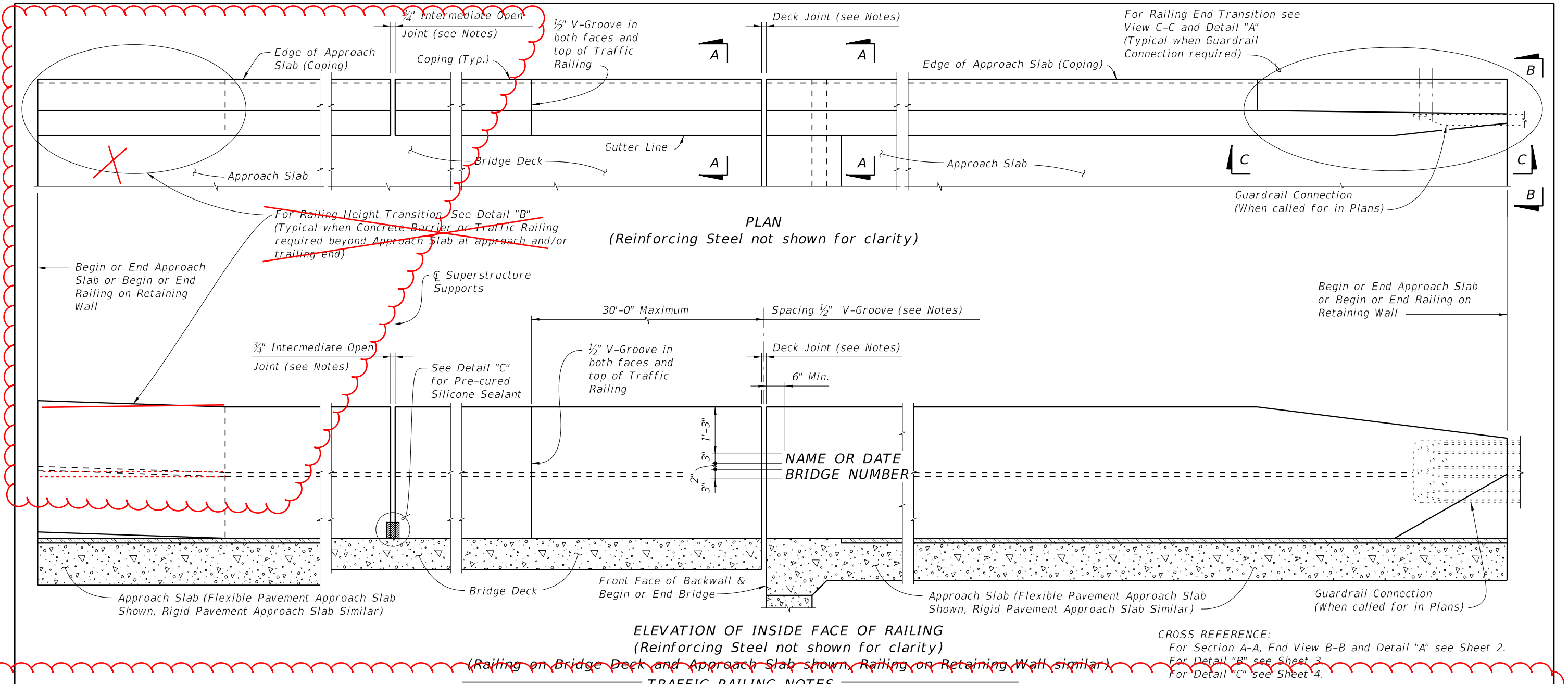
(Email or hand deliver package to Rick Jenkins)

Yes	N/A	
☒	☐	Redline Mark-ups
☐	☐	Proposed Standard Plan Instruction (SPI)
☐	☐	Revised SPI
☐	☐	Other Support Documents

Implementation:

- ☐ Design Bulletin (Interim)
- ☐ DCE Memo
- ☐ Program Mgmt. Bulletin
- ☒ FY-Standard Plans (Next Release)

Contact the Roadway Design Office for assistance in completing this form



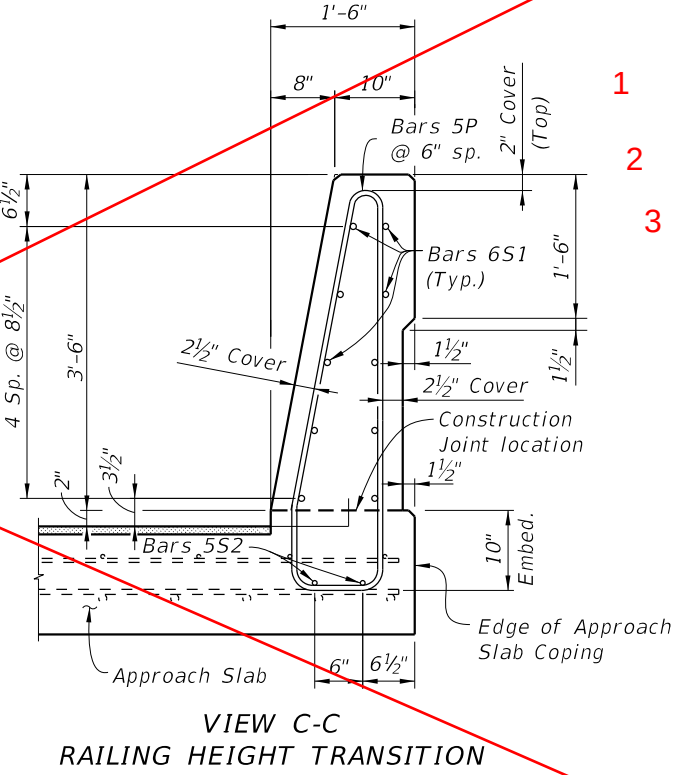
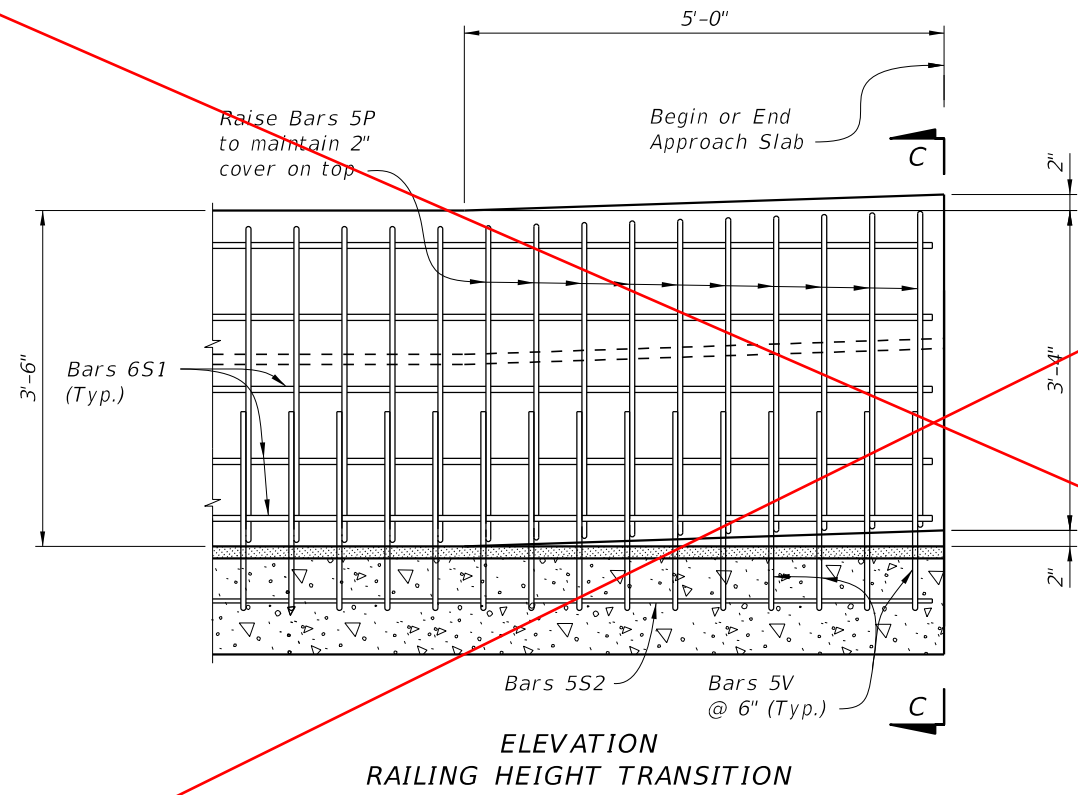
Numbered and reorganized notes. Added note on transitions.

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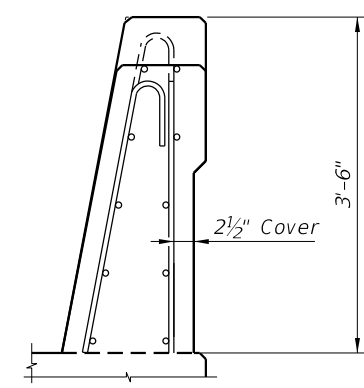
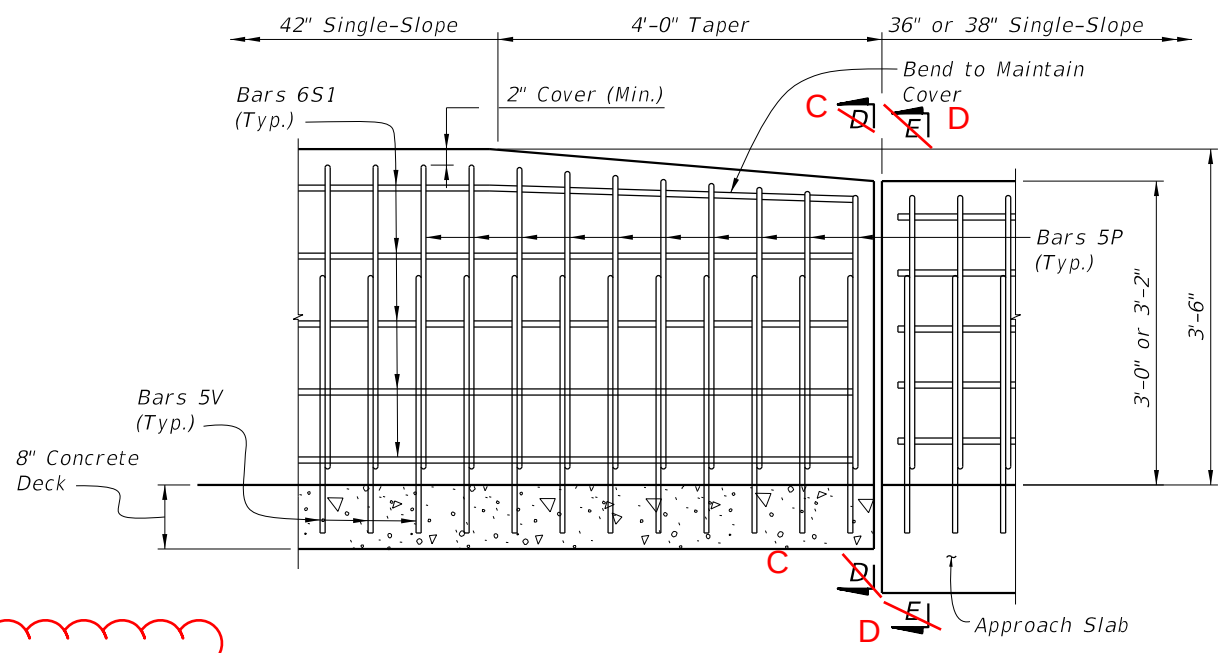
LAST REVISION	DESCRIPTION:	FY 2020-21 STANDARD PLANS	TRAFFIC RAILING - (42" SINGLE-SLOPE)	INDEX	SHEET
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- NOTE:
- ~~1. Provide Detail "B" height transition where 42" Single Slope Traffic Railings increase to 44" Barriers beyond flexible pavement approaches.~~
 - ~~2. Work Detail "B" with Index 400-090.~~
 - ~~3. Provide Detail "B" height transition where 42" Traffic Railings are required on bridge, and 36" or 38" Barriers are shown on approaches.~~
 - ~~4. Work Detail "B" with Indexes 400-090 or 400-091, 521-427, and 521-610 as necessary.~~
 - ~~5. Field cut 5P Bars as shown to maintain 2" min. (4" max.) cover at top of traffic railing.~~

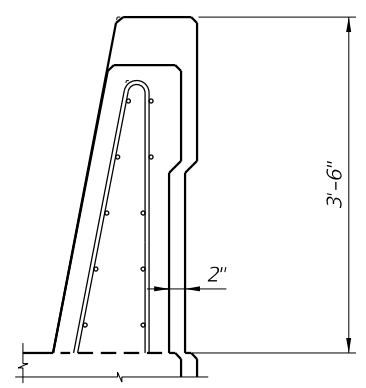
1
2
3



DETAIL "B"



VIEW ~~D-D~~ C-C
RAILING HEIGHT TRANSITION
(Begin/End of Bridge)
(Bars 5V not shown for clarity)



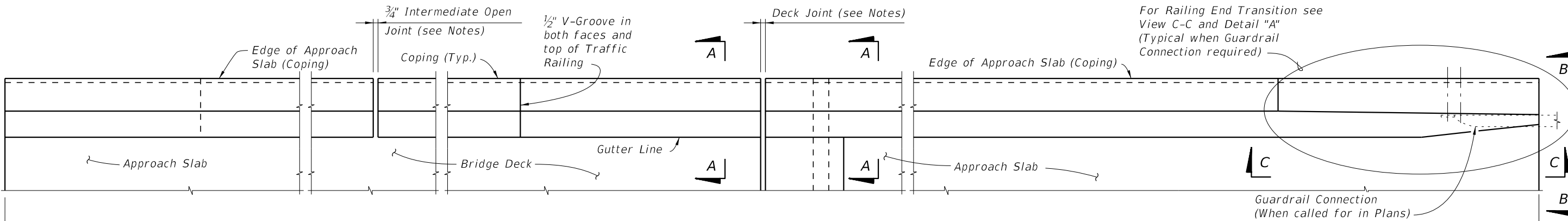
SECTION ~~E-E~~ D-D
(Index 400-091 Shown, 400-090 Similar)
(Index 521-427 Bars 4V not shown for Clarity)

DETAIL "C"

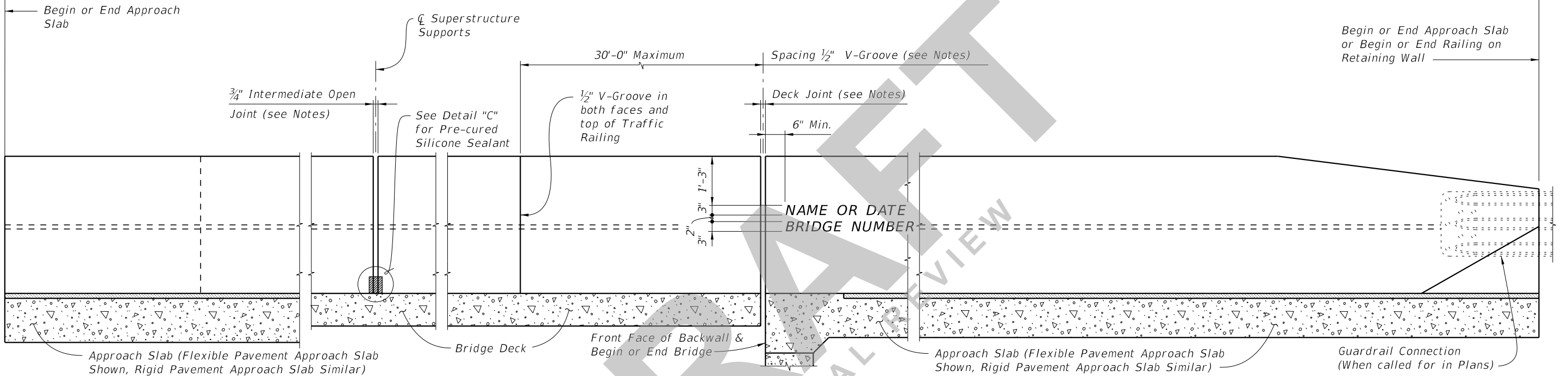
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11/01/19	REVISION							



PLAN
(Reinforcing Steel not shown for clarity)



ELEVATION OF INSIDE FACE OF RAILING
(Reinforcing Steel not shown for clarity)
(Railing on Bridge Deck and Approach Slab shown, Railing on Retaining Wall similar)

TRAFFIC RAILING NOTES

CROSS REFERENCE:
For Section A-A, End View B-B and Detail "A" see Sheet 2.
For Detail "B" see Sheet 3.
For Detail "C" see Sheet 4.

1. Materials: See Structures Plans, General Notes

2. Guardrail Connection Details: See Index 534-001

3. Superelevation: Traffic Railings on Superelevated bridges may be constructed perpendicular to the roadway surface. If an adjoining railing is constructed plumb, transition the end of the Traffic Railing from perpendicular to plumb over a minimum distance of 20'-0". The cost of all modifications will be at the Contractor's expense.

4. Name, Date & Bridge Number: Place the Name and Bridge Number on the Traffic Railing on the driver's right side when approaching the bridge. Place the Date on the driver's left side when approaching the bridge. Use the Name as shown in the General Notes of the Structures Plans. The Date is the year the bridge is completed. For a widening when the existing railing is removed, use both the date on the removed rail and the year of the widening. Form letters and figures with 3/8" V-Grooves using preformed letters and figures. Black plastic letters and figures 3" tall may be used, if approved by the Engineer.

5. Open Joints: See the Superstructure Plans, Approach Slab and Retaining Wall Sheets for Deck Joint dimensions and orientation. Provide Open Railing Joints matching the dimensions of the Deck Joint at Deck Expansion Joint locations.
A. For treatment of railings on skewed bridges see Index 521-427 Sheet 3.

6. Open Joints: Provide 3/4" Open Joints at:
A. Superstructure supports where the slab is continuous.
B. At ends of approach slabs when adjacent to retaining walls and at expansion joints on retaining wall junction slabs.
7. V-Grooves: Construct 1/2" V-Grooves plumb. Space V-Grooves equally between 3/4" Open Joints and/or Deck Joints and the at V-Groove locations on the Retaining Wall footing/junction slabs.

8. Barrier Delineators: Install Barrier Delineators on top of the Traffic Railing 2" from the face of the traffic side in accordance with Specification Section 705. Match the Barrier Delineator to the color (white or yellow) of the near edgeline.

9. Traffic Railing Transitions: See Plans for type and location
A. Transition to guardrail: See Detail "A" and View B-B.
B. Transitions to 36" or 38" concrete barriers at end of approach slab: See Detail "B", View C-C and Section D-D.

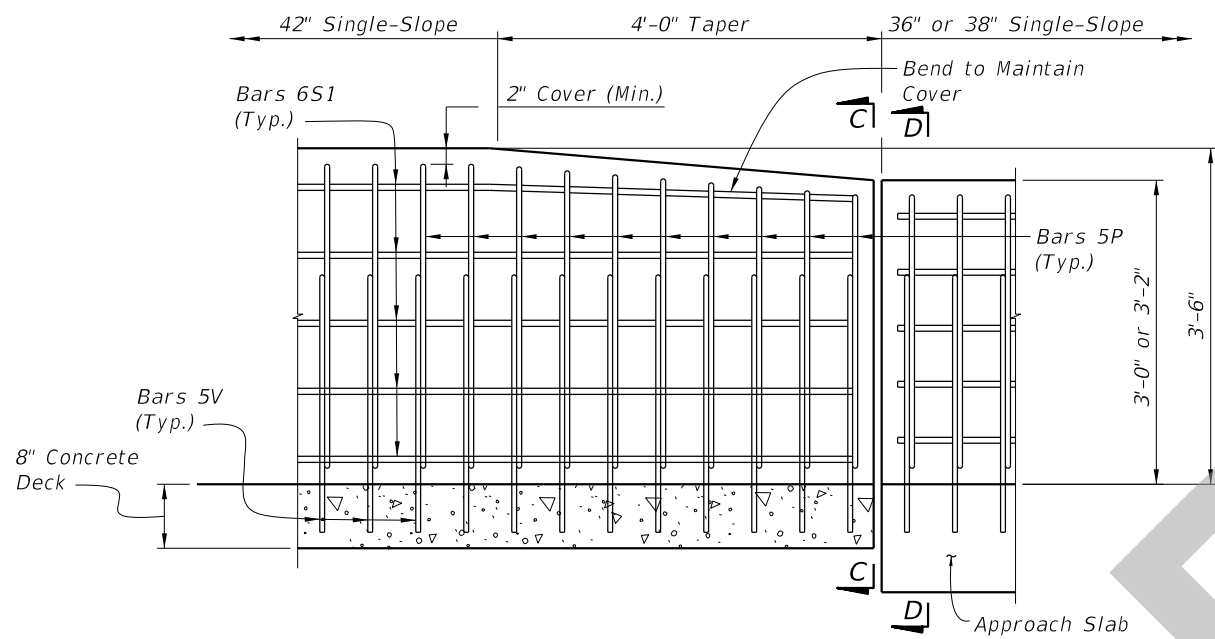
10. Drainage Slots: See Superstructure Plans for drainage slot locations and size (if required). See Index 521-427 Sheet 5 for details.

11. Embedded conduit and junction boxes: See Index 630-010.

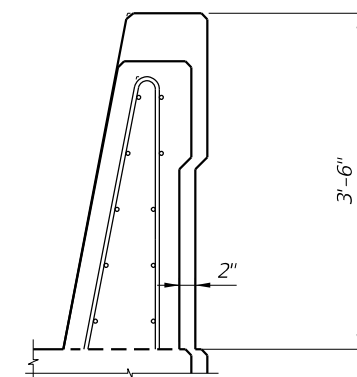
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 - 3. Field cut 5P Bars as shown to maintain 2" min. (4" max.) cover at top of traffic railing.



VIEW C-C
RAILING HEIGHT TRANSITION
(Begin/End of Bridge)
(Bars 5V not shown for clarity)



SECTION D-D
(Index 400-091 Shown, 400-090 Similar)
(Index 521-427 Bars 4V not shown for Clarity)

DETAIL "B"



FY 2020-21
STANDARD PLANS

TRAFFIC RAILING - (42" SINGLE-SLOPE)

INDEX
521-428

SHEET
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LAST
REVISION
11/01/20

REVISION

DESCRIPTION: