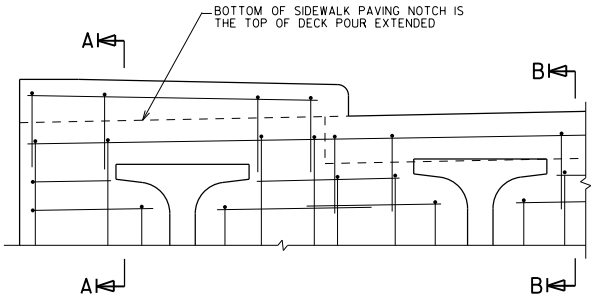
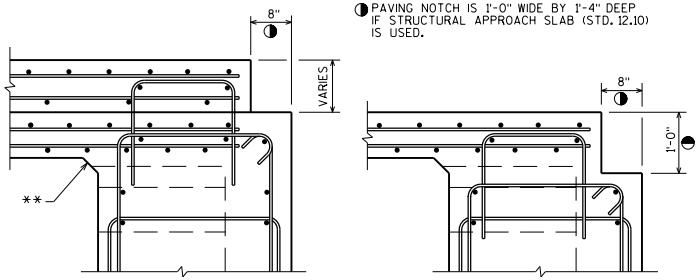


PART TRANSVERSE SECTION AT ABUTMENT TYPE A1 DIAPHRAGM WITH A RAISED SIDEWALK

(HORIZ. BARS SHOWN ARE THE FF BARS. DECK REINFORCEMENT NOT SHOWN FOR CLARITY.)

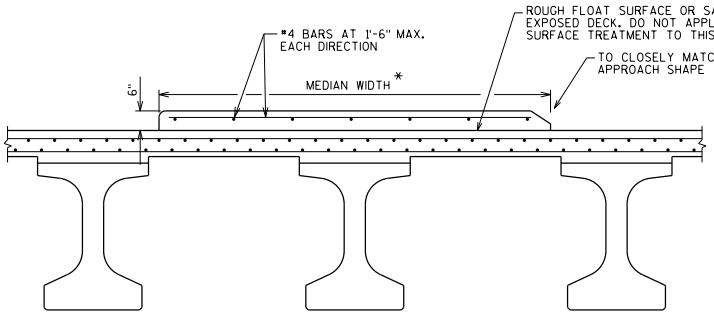


SECTION A-A

SECTION B-B

** 3" X 3" BEVEL ENDS AT EDGE OF BRIDGE DECK

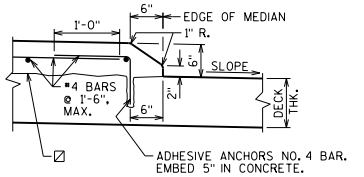
- SEE STANDARDS 19.33, 19.34, 19.35 FOR REINFORCEMENT DETAILS
- DETAILS SHOWN ARE FOR GIRDER STRUCTURES. SIMILAR REINFORCEMENT FOR SLAB STRUCTURES SHALL BE USED WITH A REMINDER THAT THE TRANSVERSE AND LONGITUDINAL REINFORCEMENT LAYERS ARE REVERSED.



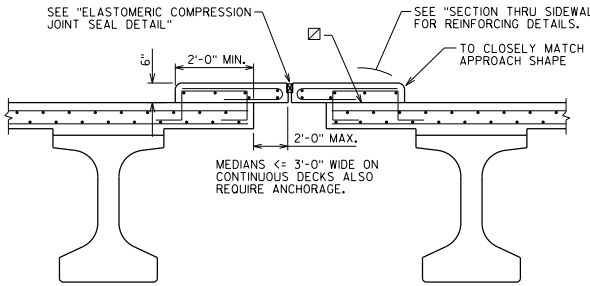
CROSS SECTION THRU UNANCHORED MEDIAN

* (ANCHORAGE TO DECK NOT REQUIRED FOR WIDTHS > 3'-0", EXCEPT ALL MEDIAN SECTIONS ON TOP OF PAVING BLOCK MUST BE ANCHORED)

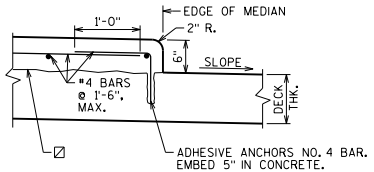
NOTE: CLEAN ALL LOOSE MATERIAL ON THE DECK AT THE MEDIAN LOCATION PRIOR TO MEDIAN PLACEMENT USING HIGH PRESSURE WATER OR AIR, ENSURING ALL FREE-STANDING WATER IS REMOVED PRIOR TO MEDIAN PLACEMENT. NEAT CEMENT IS REQUIRED AS PER 509.3.9.2 OF THE STANDARD SPECIFICATIONS UNLESS THE MEDIAN IS POURED WITHIN 45 DAYS OF COMPLETING THE DECK POUR.



ANCHORED MEDIAN CURB DETAIL

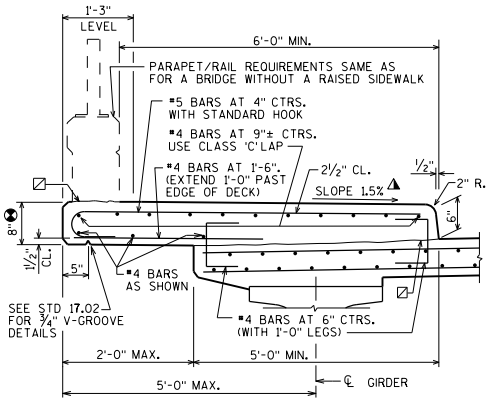


CROSS SECTION THRU MEDIAN WITH A JOINT

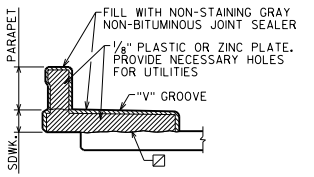


ANCHORED MEDIAN CURB DETAIL

☑ CONST. JOINT-STRIKE OFF AS SHOWN AND LEAVE ROUGH. FOR DECK POUR, MATCH BRIDGE X-SLOPE.



SECTION THRU SIDEWALK



DEFLECTION JOINT DETAIL

SHOW DEFLECTION JOINT IN PARAPET OR SIDEWALK USING THE FOLLOWING CRITERIA:

1. GIRDER STRUCTURES AND SLAB STRUCTURES WITH A RAISED SIDEWALK SHOULD HAVE A DEFLECTION JOINT IN THE SIDEWALK AND PARAPET OVER THE PIER. FOR SKEWS GREATER THAN 20°, DETAIL THE JOINT NORMAL TO THE SIDEWALK AND PARAPET WITH THE JOINT APPROX. CENTERED OVER ℄ PIER.

   IF THERE IS A LIGHT STANDARD AT THE PIER, PLACE A DEFLECTION JOINT APPROX. 4'-0" EACH SIDE OF PIER, WITH NONE DIRECTLY OVER THE PIER.

2. GIRDER STRUCTURES AND SLAB STRUCTURES WITHOUT SIDEWALKS SHOULD HAVE NO DEFLECTION JOINTS IN THE PARAPETS.

NOTES

WHEN PARAPETS ARE POURED CONTINUOUSLY FROM END TO END, THEY SHALL BE SEPARATED AT THE DEFLECTION JOINTS BY A PIECE OF ⅛" ZINC OR PLASTIC PLATE CUT AS SHOWN IN THE "DEFLECTION JOINT DETAIL". IF CONSTRUCTION JOINTS IN PARAPETS ARE USED AT THE DEFLECTION JOINTS, ONE SIDE OF JOINT SHALL BE COATED WITH AN APPROVED LIQUID BOND BREAKER AND PLATE SEPARATORS MAY BE OMITTED.

☑ CONST. JOINT-STRIKE OFF AS SHOWN AND LEAVE ROUGH. FOR DECK POUR, MATCH BRIDGE X-SLOPE.

◑ 8" MIN. SIDEWALK THICKNESS ALSO REQ'D AT EDGE OF DECK/SLAB.

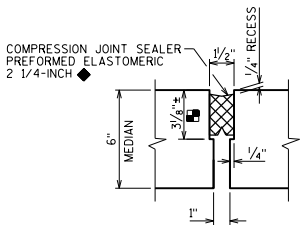
▲ ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

DESIGNER NOTES

FOR EXTREME SIDEWALK WIDTHS AND/OR SUPERELEVATIONS THE DECK MAY BE LEVEL BENEATH THE SIDEWALK (MAINTAIN CONSTANT DECK THICKNESS) TO REDUCE EXCESSIVE SIDEWALK THICKNESS.

FOR DEAD LOAD PURPOSES, THE SUPERSTRUCTURE DESIGN SHALL ACCOUNT FOR A MAXIMUM 2% SIDEWALK CROSS SLOPE.

SEE STD. 24.11 FOR DECK JOINT DETAIL FOR LONGITUDINAL AND TRANSVERSE JOINTS.



ELASTOMERIC COMPRESSION SEAL DETAIL

▪ VARIES BASED ON JOINT MANUFACTURER

◆ MANUFACTURER SHALL LABEL TOP OF SEAL

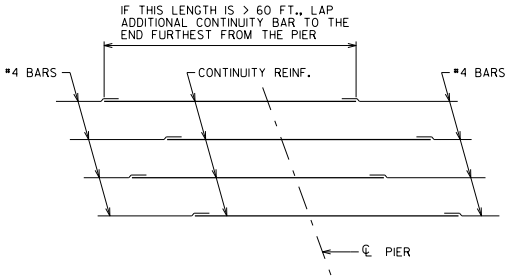
MEDIAN AND RAISED SIDEWALK DETAILS

BUREAU OF STRUCTURES

APPROVED: *Laura Shadewald*

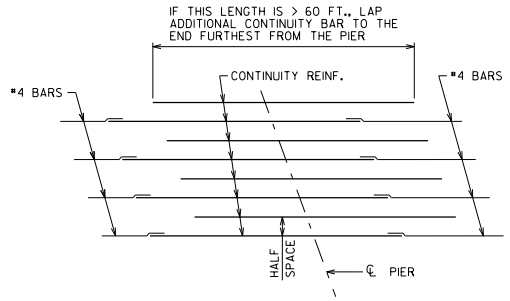
DATE: 1-22

STANDARD 17.01



PLAN VIEW OF DECK CONTINUITY REINFORCEMENT FOR PRESTRESSED GIRDER BRIDGES

(SHOWING TYPICAL BAR SPACING FROM CHAPTER 17 TABLES)



PLAN VIEW OF DECK CONTINUITY REINFORCEMENT FOR PRESTRESSED GIRDER BRIDGES SHOWING HALF-SPACES

(SHOWING TYPICAL BAR SPACING FROM CHAPTER 17 TABLES + HALF-SPACE)

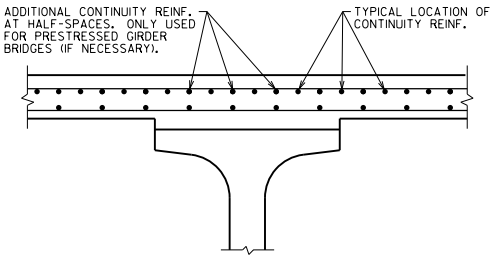
LONGITUDINAL CONSTRUCTION JOINT DETAIL

SEE STD. 24.11 FOR GIRDER SUPERSTRUCTURES
SEE STD. 18.02 FOR SLAB SUPERSTRUCTURES

DESIGNER NOTES

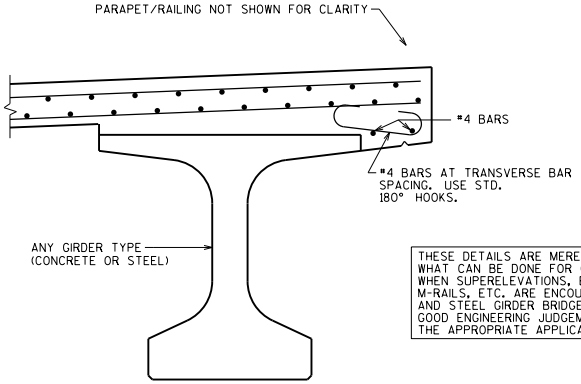
DETAIL REQUIRED WHEN WIDTH OF DECK EXCEEDS 90 FEET FOR GIRDER SUPERSTRUCTURES AND 52 FEET FOR SLAB SUPERSTRUCTURES. DETAIL SHOULD BE USED FOR STAGED CONSTRUCTION AND FOR OTHER COLD JOINT APPLICATIONS WITHIN THE DECK. OPTIONAL (CONTRACTOR) JOINTS ARE TO BE APPROVED BY THE ENGINEER.

JOINTS SHOULD BE PLACED AT LEAST 6 INCHES FROM THE EDGE OF THE TOP FLANGE OF THE GIRDER AND PREFERABLY LOCATED BENEATH THE MEDIAN OR PARAPET. AVOID PLACING NEAR WHEEL PATHS (PLACE AT LANE LINES OR IN THE MIDDLE OF THE LANE).



CROSS SECTION THRU DECK

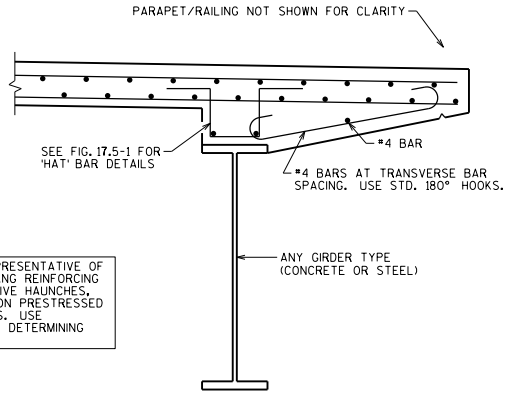
(SHOWING TOP LONGIT. REINF. LOCATION RELATIVE TO BOTTOM LONGIT. REINF.)



CROSS SECTION THRU EDGE OF DECK

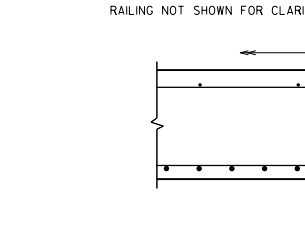
(SHOWING ADDITIONAL OVERHANG REINFORCEMENT)

THESE DETAILS ARE MERELY REPRESENTATIVE OF WHAT CAN BE DONE FOR OVERHANG REINFORCING WHEN SUPERELEVATIONS, EXCESSIVE HAUNCHES, M-RAILS, ETC. ARE ENCOUNTED ON PRESTRESSED AND STEEL GIRDER BRIDGE DECKS. USE GOOD ENGINEERING JUDGEMENT IN DETERMINING THE APPROPRIATE APPLICATION.



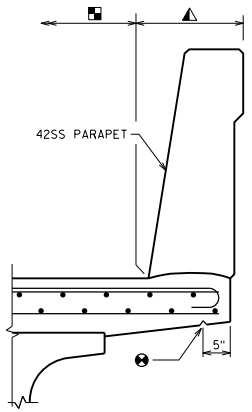
CROSS SECTION THRU EDGE OF DECK

(SHOWING ADDITIONAL OVERHANG REINFORCEMENT)



CROSS SECTION THRU EDGE OF DECK

(SHOWING DRIP GROOVE AND CONCRETE SEALING FOR OPEN RAILINGS)



CROSS SECTION THRU EDGE OF DECK

(SHOWING DRIP GROOVE AND CONCRETE SEALING FOR ALL PARAPETS)

CROSS SECTION THRU EDGE OF SLAB

(SHOWING DRIP GROOVE FOR ALL PARAPET AND RAILINGS, AND PROTECTIVE SURFACE TREATMENT FOR OPEN RAILINGS. FOR PARAPETS, PROTECTIVE SURFACE TREATMENT IS ONLY APPLIED GUTTERLINE TO GUTTERLINE)

DESIGNER NOTES

⊠ ¾" V-GROOVE REQUIRED AT THE EDGE OF DECK AND SLAB.

REFER TO STANDARD 40.01 FOR RESEALING CONCRETE SURFACES.

DO NOT APPLY CONCRETE SEALER TO SURFACES TO BE STAINED OR OTHER

◪ BID ITEM "PROTECTIVE SURFACE TREATMENT":

- APPLY TO DECK AND CONCRETE OVERLAY SURFACES.
- FOR OPEN RAILINGS, APPLY TO THE TOP AND EXTERIOR EXPOSED FACE OF WINGS, AND THE END 1'-0" OF THE FRONT FACE OF ABUTMENT.
- APPLY TO THE VERTICAL AND HORIZONTAL SURFACES OF SIDEWALKS, MEDIANS, AND PAVING NOTCHES.

◭ BID ITEM "PIGMENTED SUREFACE SEALER":

- APPLY TO INSIDE & TOP FACES OF PARAPETS, INCLUDING PARAPETS ON WINGS.

NOTES

⊠ ¾" V-GROOVE REQ'D. EXTEND TO 2'-0" FROM F.F. OF ABUT. BODY (FOR ABUTMENTS WITH EXPANSION JOINTS)

¾" V-GROOVE REQ'D. EXTEND TO 6" FROM F.F. OF ABUT. DIAPH. (FOR TYPE A1 FIXED AND SEMI-EXPANSION ABUTMENTS)

◪ PROTECTIVE SURFACE TREATMENT SHALL BE APPLIED TO THE (INSERT LOCATIONS).

◭ PIGMENTED SURFACE SEALER SHALL BE APPLIED TO THE (INSERT LOCATIONS).

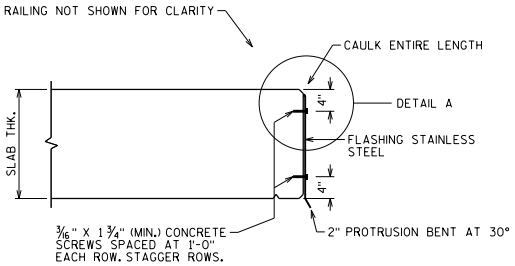
DECK AND SLAB DETAILS

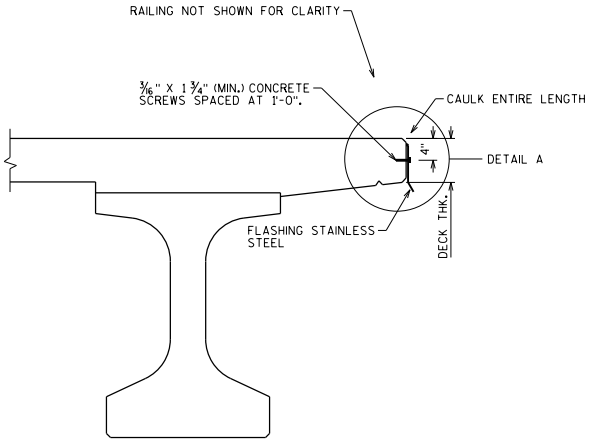
BUREAU OF STRUCTURES

APPROVED: Laura Shadewald

DATE: 1-21

STANDARD 17.02





FLASHING DETAIL FOR NEW BRIDGES WITH OPEN RAILING

THE BID ITEM "FLASHING STAINLESS STEEL" SHALL INCLUDE PROVIDING AND INSTALLING THE STAINLESS STEEL FLASHING, CAULK, 3/16" CONCRETE SCREWS AND CLEANING THE EDGE OF THE DECK PRIOR TO ATTACHMENT OF THE FLASHING.

DESIGNER NOTES

EDGE OF DECK FLASHING IS FOR OPEN RAIL BRIDGES AND MAY BE USED FOR REHABILITATION OR NEW CONSTRUCTION. CONTACT THE REGION BRIDGE MAINTENANCE ENGINEER FOR THE DECISION ON WHETHER OR NOT TO USE THE FLASHING ON NEW BRIDGES.

DETAIL 1 OR DETAIL 2, OR A COMBINATION OF THE TWO, MAY BE USED FOR REHABILITATION.

THE DESIGN ENGINEER SHALL PROVIDE CONCRETE SURFACE REPAIR DETAILS AS NEEDED. CONCEPTUAL DETAILS ARE SHOWN ON THIS STANDARD.

DO NOT USE FLASHING IF FREEBOARD IS LESS THAN 3" FOR A SLAB BRIDGE.

NOTES

THE BID ITEM "FLASHING STAINLESS STEEL" SHALL INCLUDE PROVIDING AND INSTALLING THE STAINLESS STEEL FLASHING, SILICONE CAULK AND 3/16" CONCRETE SCREWS.

FLASHING TO BE INSTALLED AFTER PROTECTIVE SURFACE TREATMENT APPLICATION.

CONCRETE SCREWS SHALL BE 410 STAINLESS STEEL.

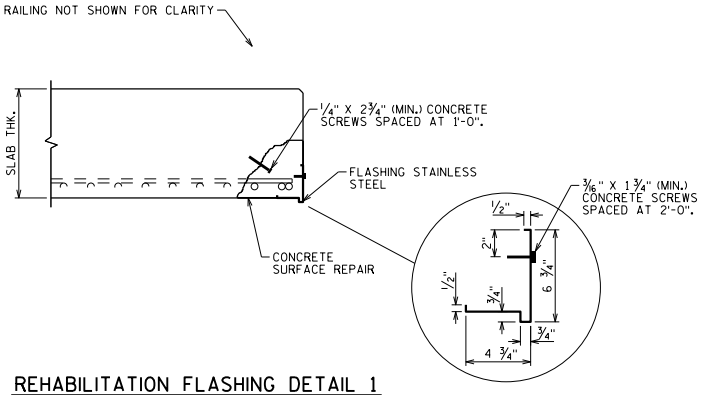
EXTEND FLASHING TO B.F. OF ABUTMENT DIAPHRAGM.

TOP OF FLASHING TO BEGIN APPROX. 1-INCH BELOW TOP OF DECK/SLAB SURFACE.

THE FLASHING IS TO BE A CONSTANT HEIGHT BASED ON THE THINNEST SLAB DEPTH OVER THE BRIDGE LENGTH.

PROVIDE 2" MINIMUM FLASHING OVERLAP, FASTEN WITH 3/16" X 2" (MIN.) CONCRETE SCREWS.

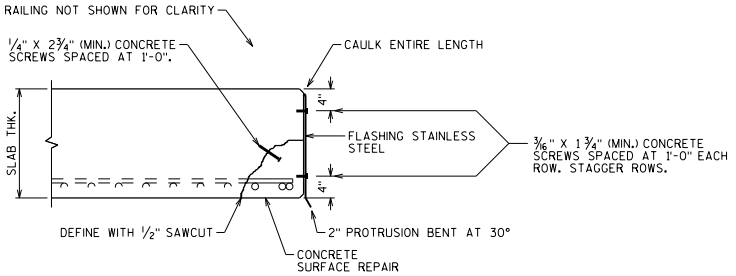
CAULK SHALL BE NON-STAINING, GRAY NON-BITUMINOUS JOINT SEALER.



REHABILITATION FLASHING DETAIL 1

DETAIL 1 NOT TO BE USED IF CLEARANCE IS AN ISSUE OR IF DEBRIS IS A CONCERN.

THE BID ITEM "FLASHING STAINLESS STEEL" SHALL INCLUDE PROVIDING AND INSTALLING THE STAINLESS STEEL FLASHING AND CONCRETE SCREWS, INCLUDING THE 1/4" SCREWS USED TO SECURE THE CONCRETE SURFACE REPAIR.



REHABILITATION FLASHING DETAIL 2

THE BID ITEM "FLASHING STAINLESS STEEL" SHALL INCLUDE PROVIDING AND INSTALLING THE STAINLESS STEEL FLASHING, CAULK, 3/16" AND 1/4" CONCRETE SCREWS, AND CLEANING THE EDGE OF THE DECK PRIOR TO ATTACHMENT OF THE FLASHING.

EDGE OF DECK FLASHING

BUREAU OF STRUCTURES

APPROVED: Laura Shadewald

DATE: 7-21

STANDARD 17.03