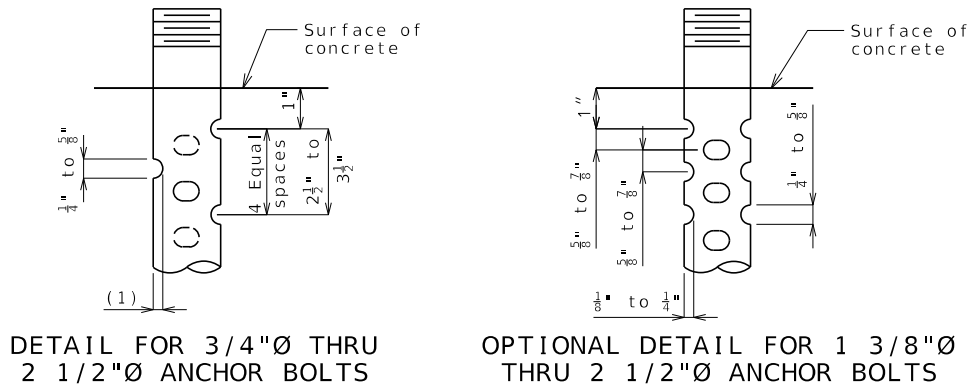


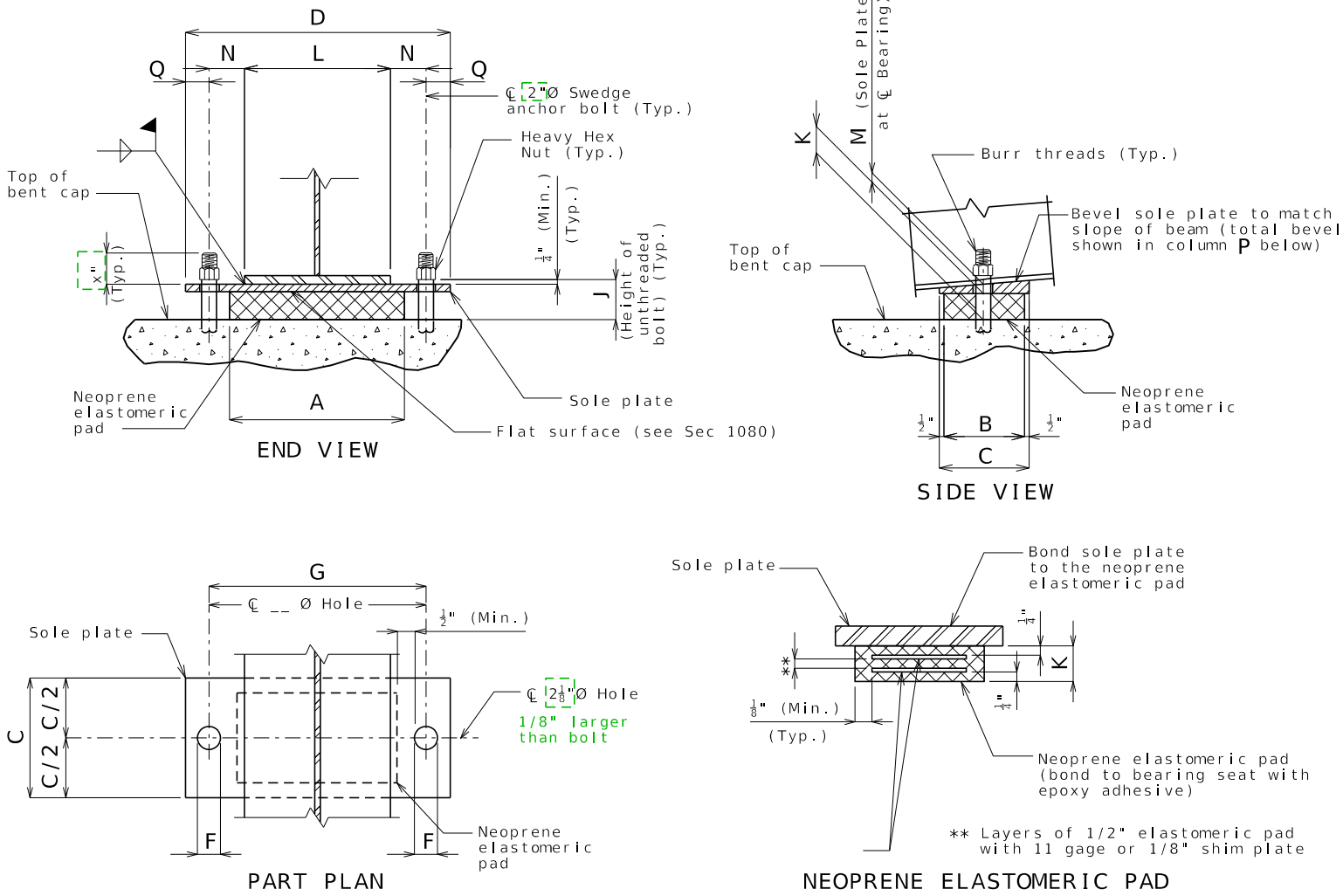
EPG 751.11 Bearings

Use current standard sheet found in ProjectWise under Bridge/Br Std Dwgs/Bearings BRG/Current/



SWEDGE ANCHOR BOLT DETAILS

- (1) 1/8" for 3/4"Ø thru 1 1/4"Ø anchor bolts
- 1/8" to 1/4" for 1 3/8"Ø thru 2 1/2"Ø anchor bolts



FIXED BEARINGS														NUMBER OF SHIM PLATES *	NUMBER REQUIRED
BENT NO.	A	B	C	D	F	G	J	K	L	M	N	P	Q		
2	18"	16"	17"	27"	2 1/2"	21"	4 1/4"	2 1/2"	15"	1 1/2"	3"	1/4"	3"	4	4
* The required shim plate shall be placed between layers of elastomer and molded together to form an integral unit.														TOTAL BEARINGS	4

Fill in (from design)

EPG 751.50  
Standard  
Detailing  
Notes

Note H3.45

Note H3.46

Note H3.47

Note H3.49,  
(or H3.49.1)

Note H3.50

GENERAL NOTES:

- Anchor bolts shall be 2"Ø ASTM F1554 Grade 55 swaged bolts and shall extend 18" into the concrete with ASTM A563 Grade A Heavy Hex nuts. Actual manufacturer's certified mill test reports (chemical and mechanical) shall be provided. Swedging shall be 1" less than extension into the concrete.
- Anchor bolts and heavy hex nuts shall be coated with a minimum of two coats of inorganic zinc primer to provide a total dry film thickness of 4 mils minimum, 6 mils maximum, or galvanized in accordance with Sec 1081.
- Neoprene Elastomeric Pads shall be 60 Durometer.
- Structural steel for sole plate shall be ASTM A709 Grade 50 and shall be coated with a minimum of two coats of inorganic zinc primer to provide a total dry film thickness of 4 mils minimum, 6 mils maximum.
- Laminated Neoprene Bearing Pad Assembly shall be in accordance with Sec 716.

LAMINATED NEOPRENE BEARING PAD ASSEMBLY

DATE PREPARED  
5/22/2023

ROUTE  
BR

DISTRICT  
BR

COUNTY

JOB NO.

CONTRACT ID.

PROJECT NO.

BRIDGE NO.  
EXAMPLE

STATE  
MO

SHEET NO.  
1

DESCRIPTION

DATE

MISSOURI HIGHWAYS AND TRANSPORTATION  
COMMISSION

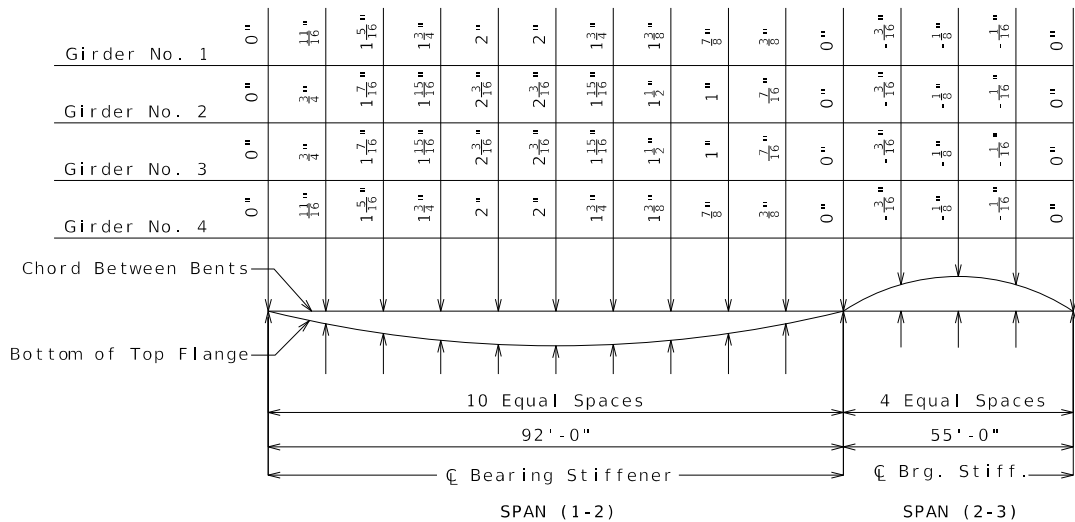
105 WEST CAPITOL  
JEFFERSON CITY, MO 65102  
1-888-ASK-MODOT (1-888-273-6636)

MoDOT

IF A SEAL IS PRESENT ON THIS SHEET IT HAS BEEN ELECTRONICALLY SEALED AND DATED.

Note: Use cells for quarter points if span is less than 75'.

CADD Stds: Deadload Deflection - Tenth Pts (Steel Girders)  
Fill in info from design. Modify diagram as needed.



From design

17% of dead load deflection is due to the weight of structural steel.  
Dead load deflection includes weight of structural steel, concrete slab, and barrier.

DEAD LOAD DEFLECTION

CADD Stds: Pl Girder Camber Diagram - Tenth Pts (Steel Girders)  
Fill in info from design. Modify diagram as needed.

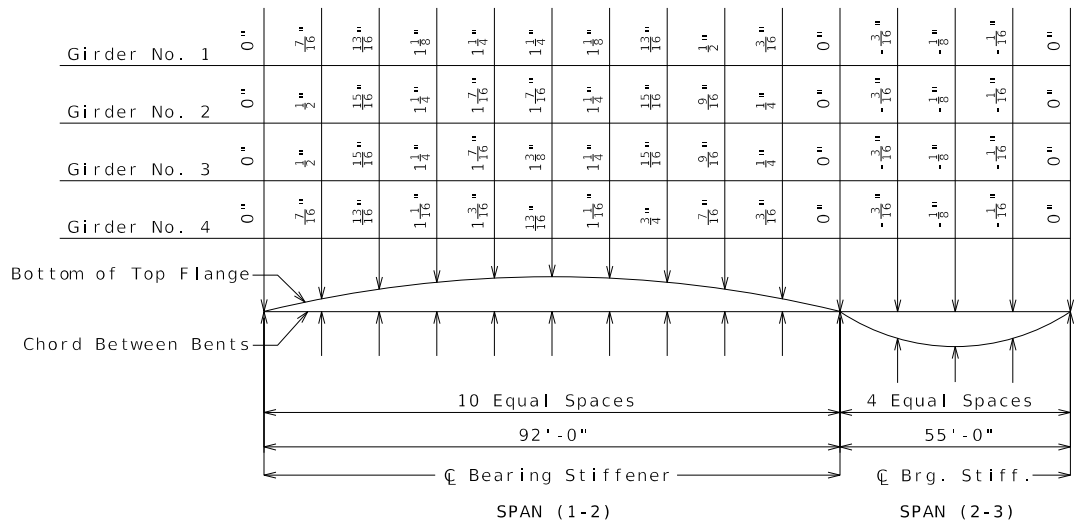


PLATE GIRDER CAMBER DIAGRAM

Camber includes allowance for vertical curve, and dead load deflection due to concrete slab, barrier curb and structural steel.

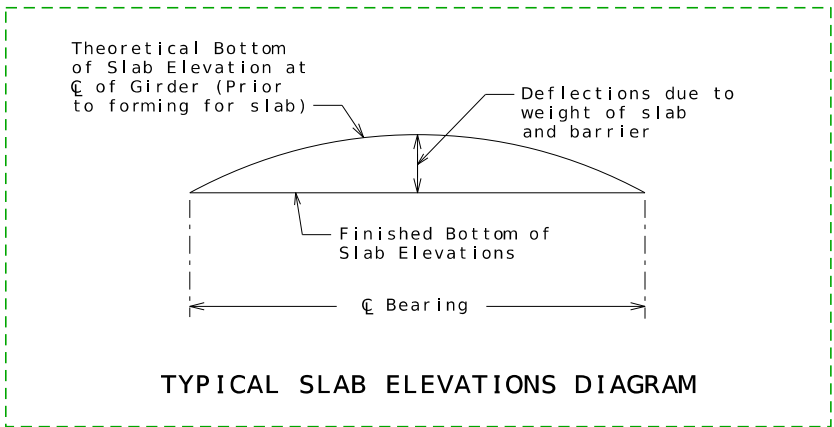
Theoretical Bottom of Slab Elevations at CL of Girder (Prior to Forming for Slab) \*\*

Girder Number	Span (1-2) (92'-0" CL Brg - CL Brg.)										Span (2-3) (55'-0" CL Brg - CL Brg.)					
	CL Brg.	.10	.20	.30	.40	.50	.60	.70	.80	.90	CL Brg.	.25	.50	.75	CL Brg.	
1	1011.90	1011.98	1012.06	1012.13	1012.19	1012.25	1012.29	1012.33	1012.36	1012.40	1012.44	1012.44	1012.53	1012.64	1012.75	1012.85
2	1012.08	1012.16	1012.24	1012.32	1012.38	1012.43	1012.47	1012.51	1012.54	1012.57	1012.61	1012.61	1012.70	1012.81	1012.91	1013.02
3	1012.07	1012.15	1012.23	1012.31	1012.37	1012.42	1012.46	1012.49	1012.52	1012.55	1012.59	1012.59	1012.68	1012.79	1012.90	1013.01
4	1011.88	1011.96	1012.03	1012.10	1012.16	1012.21	1012.25	1012.29	1012.32	1012.35	1012.40	1012.40	1012.49	1012.59	1012.70	1012.81

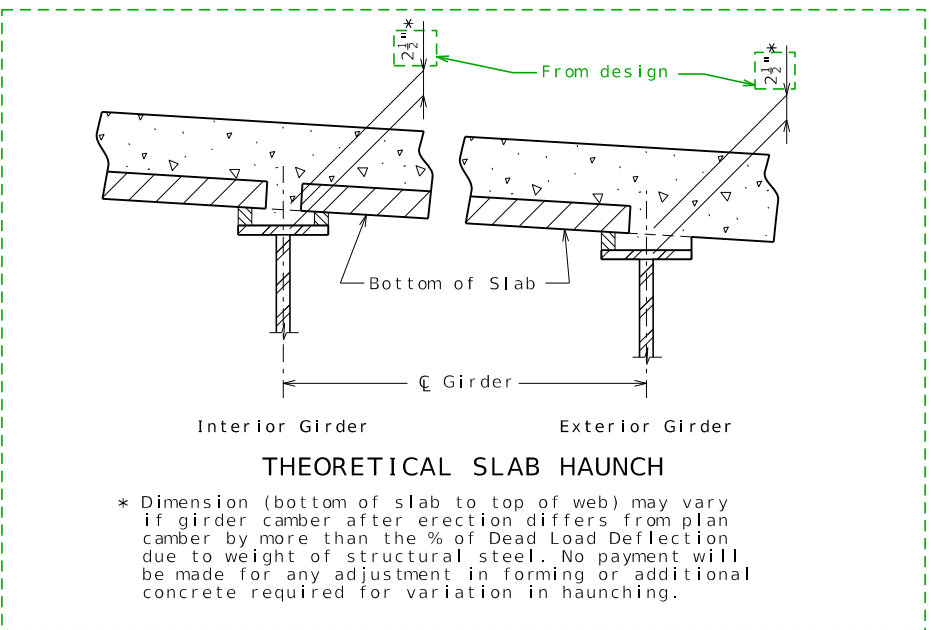
\*\* Elevations are based on a constant slab thickness of 8 1/2" and include allowance for theoretical dead load deflections due to weight of slab (including precast panel) and barrier curb.

CADD Std: Girder Bottom of Slab Elevations - Tenth Pts (Slab Sheet Details)  
Fill in with info from design.

CADD Stds: Girder Bottom of Slab Elevations Diagram (Slab Sheet Details)



CADD Stds: Theoretical Slab Haunch for Deck Panels (Steel Girders)



STEEL PLATE GIRDER DETAILS

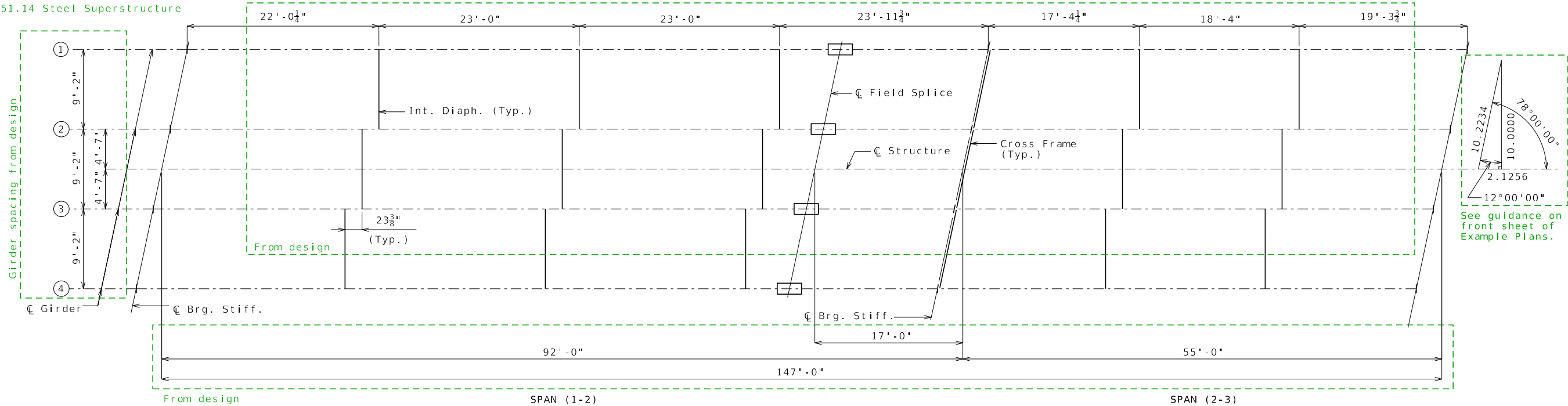
Detailed Nov. 2014  
Checked Nov. 2014

Note: This drawing is not to scale. Follow dimensions.

Sheet No. of

DATE PREPARED	
1/2/2024	
ROUTE	STATE
BR	MO
DISTRICT	SHEET NO.
BR	2
COUNTY	
JOB NO.	
CONTRACT ID.	
PROJECT NO.	
BRIDGE NO.	
EXAMPLE	
DESCRIPTION	
DATE	
MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION	
105 WEST CAPITOL JEFFERSON CITY, MO 65102 1-888-ASK-MODOT (1-888-273-6636)	

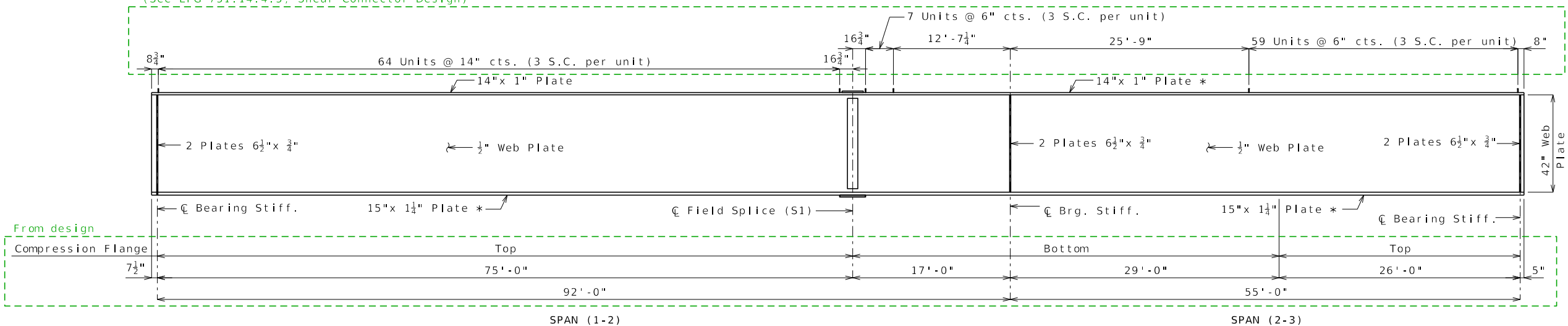




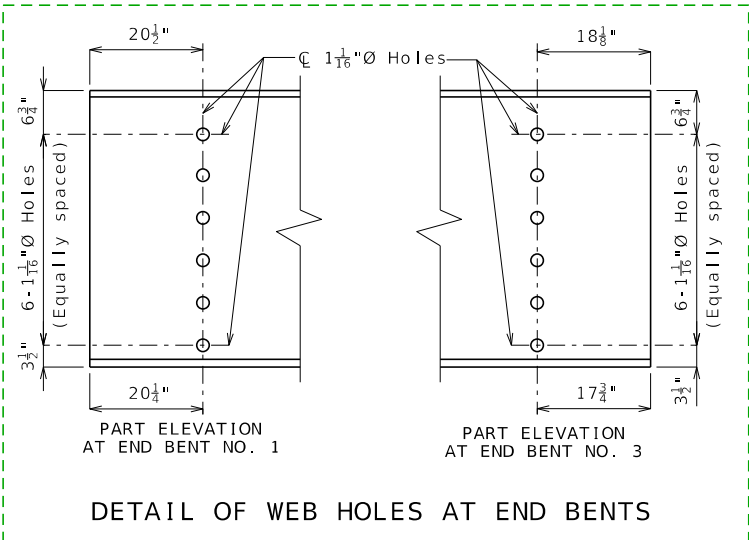
Shear connector spacing from design  
(See EPG 751.14.4.5, Shear Connector Design)

### PLAN OF STRUCTURAL STEEL

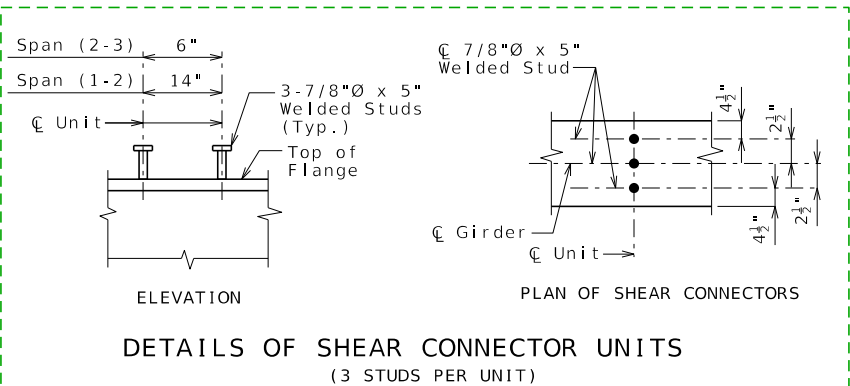
Longitudinal dimensions are horizontal.



See EPG 751.35.5.1  
(Applies to integral end bents only)



See EPG 751.14.4.5 Spacing info from design



EPG 751.50  
Notes

Note H1.21

Note H1.17

Note H1.18

Note H1.4

Note H1.23a

Note H1.29

Notes:

\* Indicates flange plate subject to notch toughness requirements. All web plates shall be subject to notch toughness requirements.

Weight of 1,530 pounds of shear connectors is included in the weight of Fabricated Structural Low Alloy Steel (Plate Girder) A709, Grade 50W.

Shear connectors shall be in accordance with Sec 712, 1037 & 1080.

Plate girders shall be fabricated in accordance with the camber diagram shown on Sheet No. \_.

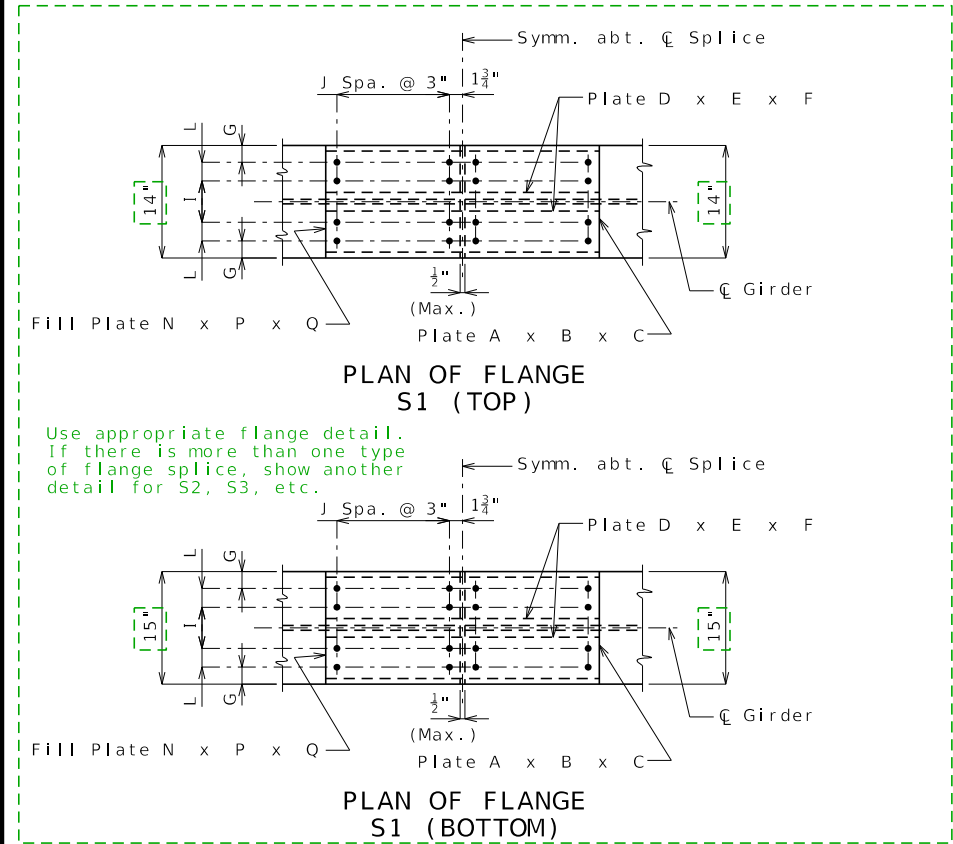
For details of bolted field splices and Part Longitudinal Section, see Sheet No. \_.

For details of intermediate diaphragms, cross frames, bearing stiffeners and intermediate diaphragm connection plates, see Sheet No. \_.

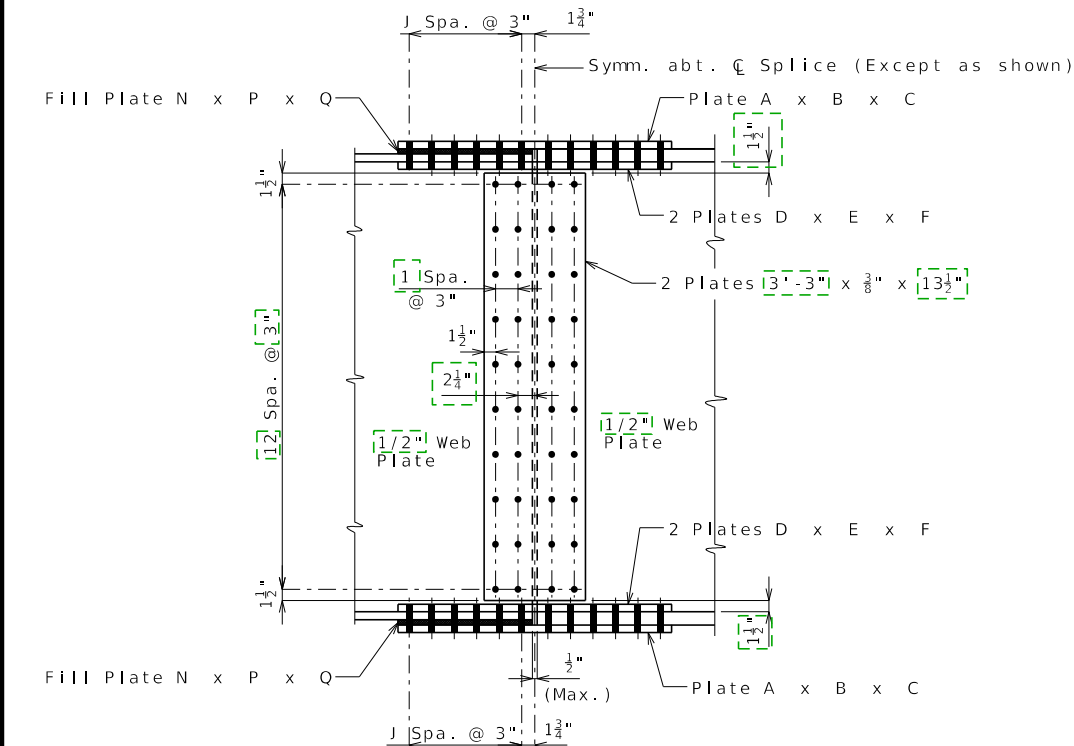
For location of slab drain attachment holes, see Slab Drain Details sheet.

Fabricated structural steel shall be ASTM A709, Grade 50W, except as noted.

Longitudinal dimensions are horizontal from  bearing to  bearing. See Part-Longitudinal Sections on Sheet No. \_.



For location of S1 field splice, see Elevation of Girder on Sheet No. \_\_.



Bolts shall be 7/8-inch diameter ASTM F3125 Grade A325 Type 1 in 15/16-inch diameter holes.

Contact surfaces shall be in accordance with Sec 1081 for surface preparation.

Detailed May 2023  
Checked May 2023

Note: This drawing is not to scale. Follow dimensions.

STEEL PLATE GIRDER DETAILS

Sheet No.    of   

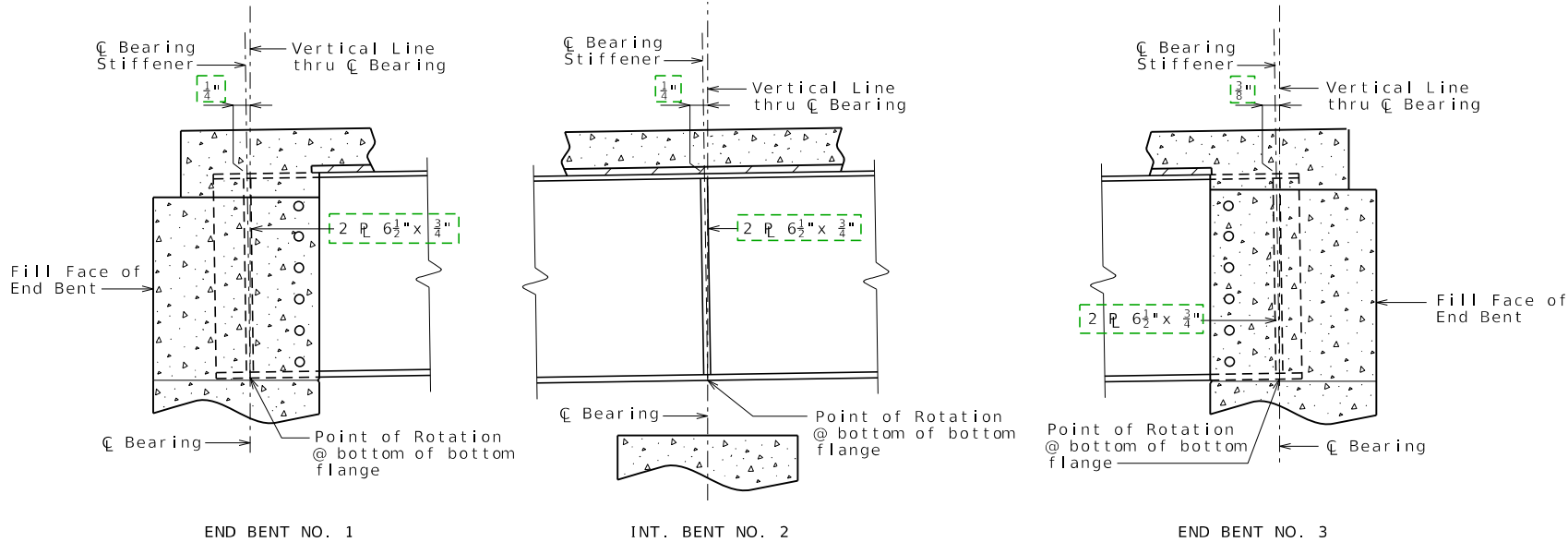
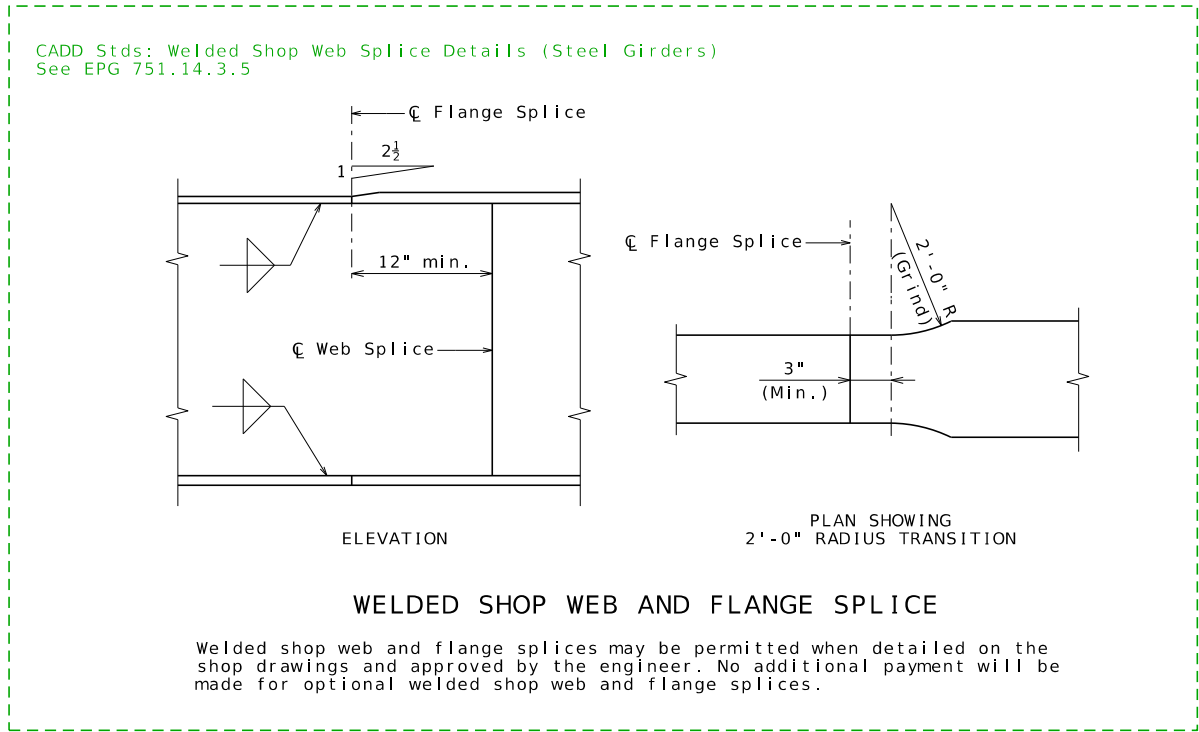


TABLE OF DIMENSIONS - FIELD SPLICE												
LOCATION	A	B	C	D	E	F	G	I	J	L	N	Q
S1 (Top)	14"	$\frac{5}{8}$ "	2'-3 $\frac{1}{2}$ "	5 $\frac{1}{2}$ "	$\frac{3}{4}$ "	2'-3 $\frac{1}{2}$ "	2"	5"	3	2 $\frac{1}{2}$ "	0	0
S1 (Bottom)	15"	$\frac{3}{4}$ "	2'-9 $\frac{1}{2}$ "	5 $\frac{1}{2}$ "	$\frac{3}{4}$ "	2'-3 $\frac{1}{2}$ "	2"	6"	4	2 $\frac{1}{2}$ "	0	0

If filler plate is not required, use zero.

DATE PREPARED  
1/2/2024

ROUTE  
BR

DISTRICT  
BR

COUNTY

JOB NO.

CONTRACT ID.

PROJECT NO.

BRIDGE NO.  
EXAMPLE

STATE  
MO

SHEET NO.  
5

DESCRIPTION

DATE

MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION

105 WEST CAPITOL  
JEFFERSON CITY, MO 65102  
1-888-ASK-MODOT (1-888-275-6636)