

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

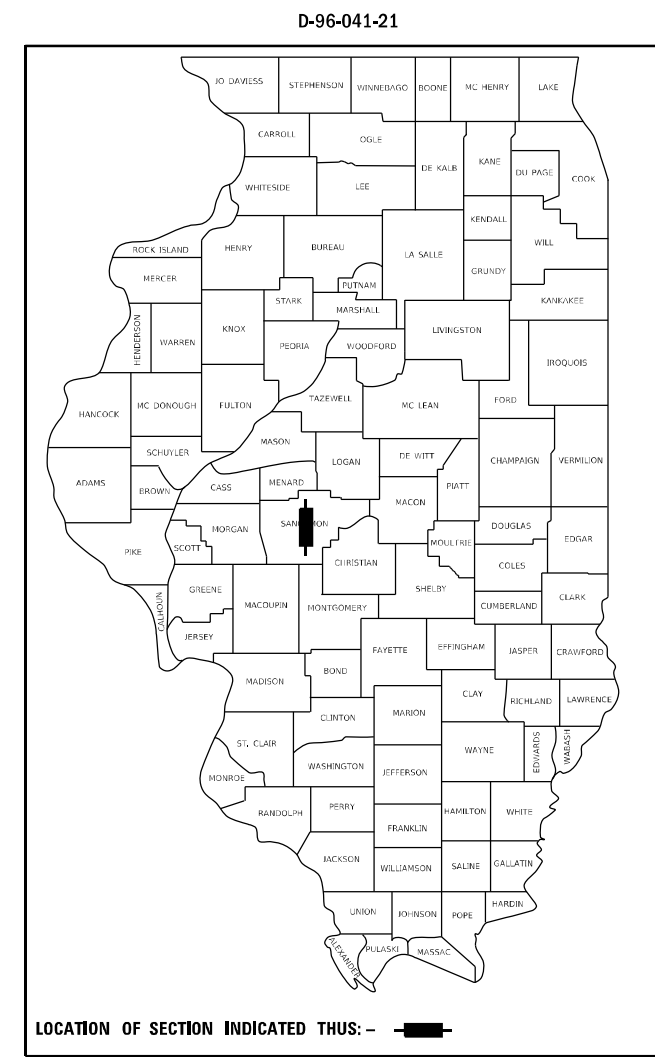
F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
55	(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9*	1
ILLINOIS			CONTRACT NO. 72M90	

* 9 + 1 = 10 TOTAL SHEETS

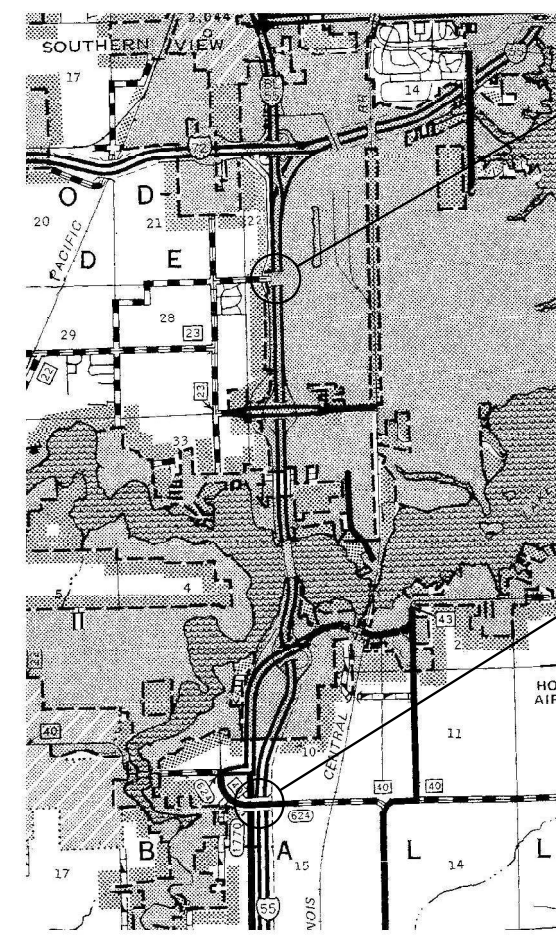
FOR INDEX OF SHEETS, SEE SHEET NO. 2

PROPOSED CONTRACT MAINTENANCE

FAI ROUTE 55 (I-55)
SECTION (84-4-3)BRR-1 (84-4-1)BRR
PROJECT (STATE)
BRIDGE SUPERSTRUCTURE REPAIRS
SANGAMON COUNTY

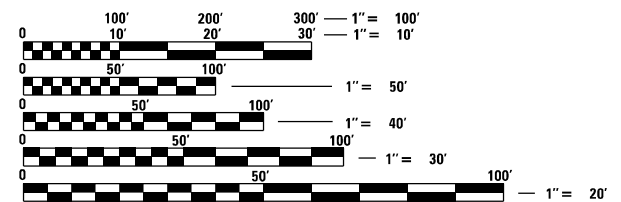


C-96-112-21



LOCATION #2
SN 084-0099
SOUTHWIND RD OVER I-55
1.0 MI S I-72

LOCATION #1
SN 084-0081
NEW CITY RD OVER I-55 & WFR
1.8 MI S LAKE SPRINGFIELD



FULL SIZE PLANS HAVE BEEN PREPARED USING STANDARD ENGINEERING SCALES, REDUCED SIZED PLANS WILL NOT CONFORM TO STANDARD SCALES. IN MAKING MEASUREMENTS ON REDUCED PLANS, THE ABOVE SCALES MAY BE USED.

J.U.L.I.E.
JOINT UTILITY LOCATION INFORMATION FOR EXCAVATORS
1-800-892-0123
OR 811

BRIDGE MAINTENANCE ENGINEER: BRANDON DUDLEY – (217) 785-9290

GROSS LENGTH = x.xx FT. = x.xxx MILE
NET LENGTH = x.xx FT. = x.xxx MILE

CONTRACT NO. 72M90

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUBMITTED March 24 2021

[Signature]
REGIONAL ENGINEER

May 7, 2021
[Signature]
ENGINEER OF DESIGN AND ENVIRONMENT

May 7, 2021
[Signature]
DIRECTOR OF HIGHWAYS PROJECT IMPLEMENTATION 13

PRINTED BY THE AUTHORITY
OF THE STATE OF ILLINOIS




INDEX OF SHEETS

- 1 COVER SHEET
- 2 INDEX, STANDARDS, SIGNATURES, & GENERAL NOTES
- 3 SUMMARY OF QUANTITIES
- 4-6A SN 084-0081 BRIDGE PLANS
- 7-9 SN 084-0099 BRIDGE PLANS

GENERAL NOTES:

STANDARDS

- 000001-08
- 001001-02
- 001006
- 701001-02
- 701006-05
- 701101-05
- 701106-02
- 701201-05
- 701301-04
- 701901-08

STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION DIVISION OF HIGHWAYS DISTRICT 6	
EXAMINED <u>March 8</u> 20 <u>21</u>	 ENGINEER OF OPERATIONS
EXAMINED <u>March 15</u> 20 <u>21</u>	 ENGINEER OF PROJECT IMPLEMENTATION
EXAMINED <u>March 22</u> 20 <u>21</u>	 ENGINEER OF PROGRAM DEVELOPMENT

MODEL: Default
FILE NAME: C:\OPERATIONS\Bridges\Bridges\CAD\72M90 - 084001 & 0099 base\ops\insheet.dgn

REV. - MS

	USER NAME = dudleybm	DESIGNED -	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	INDEX OF SHEETS, GENERAL NOTES, STANDARDS, & SIGNATURES	F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.	
		DRAWN -	REVISED -			55	(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9	2	
	PLOT SCALE = 100.0000' / in.	CHECKED -	REVISED -			CONTRACT NO. 72M90					
	PLOT DATE = 3/23/2021	DATE -	REVISED -			SCALE:	SHEET	OF	SHEETS	STA.	TO
ILLINOIS FED. AID PROJECT											

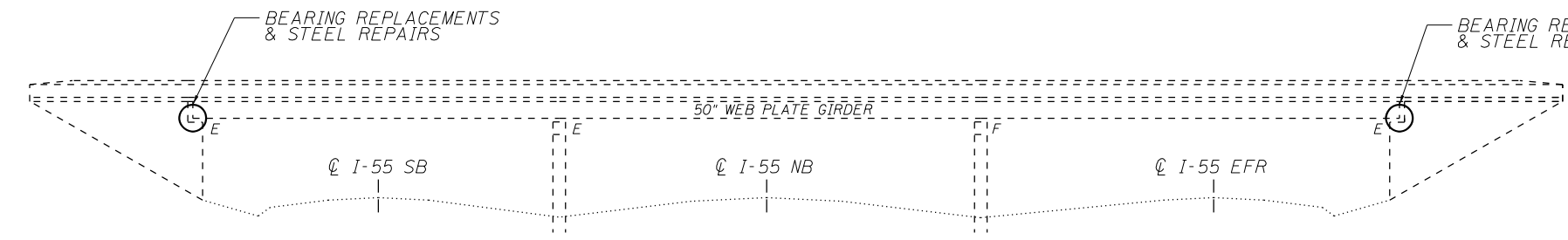
0-02176-6004	0-02176-6005
SN 084-0081	SN 084-0099
100% STATE	100% STATE
BRIDGE/URBAN 0047	BRIDGE/URBAN 0047
SANGAMON	SANGAMON

CODE NO.	ITEM	UNIT	TOTAL QUANTITY	BRIDGE/URBAN 0047 SANGAMON	BRIDGE/URBAN 0047 SANGAMON
50500405	FURNISHING AND ERECTING STRUCTURAL STEEL	POUND	2950	1800	1150
52100010	ELASTOMERIC BEARING ASSEMBLY, TYPE I	EACH	20	10	10
52100520	ANCHOR BOLTS, 1"	EACH	40	20	20
67100100	MOBILIZATION	L SUM	1	0.5	0.5
70100450	TRAFFIC CONTROL AND PROTECTION, STANDARD 701201	L SUM	1	0.5	0.5
Z0001899	JACK AND REMOVE EXISTING BEARINGS	EACH	20	10	10
Z0001905	STRUCTURAL STEEL REPAIR	POUND	460	460	0
Z0021914	SILICONE JOINT SEALER, 2.75"	FOOT	64	0	64

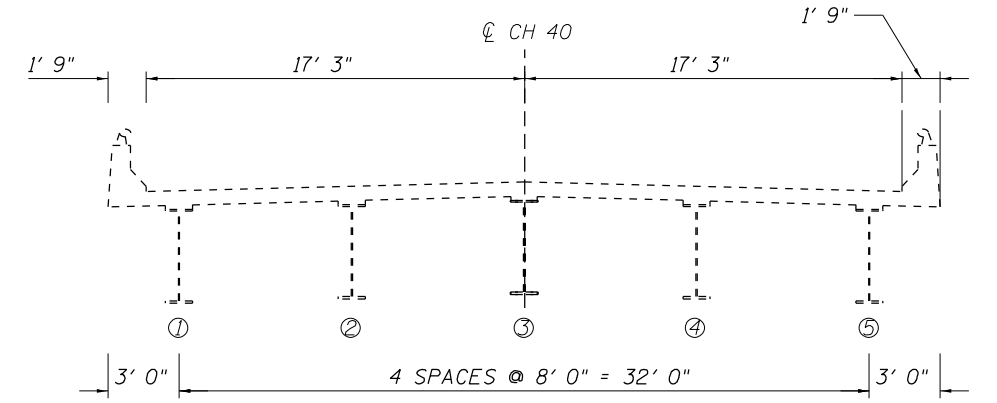
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REV. - MS

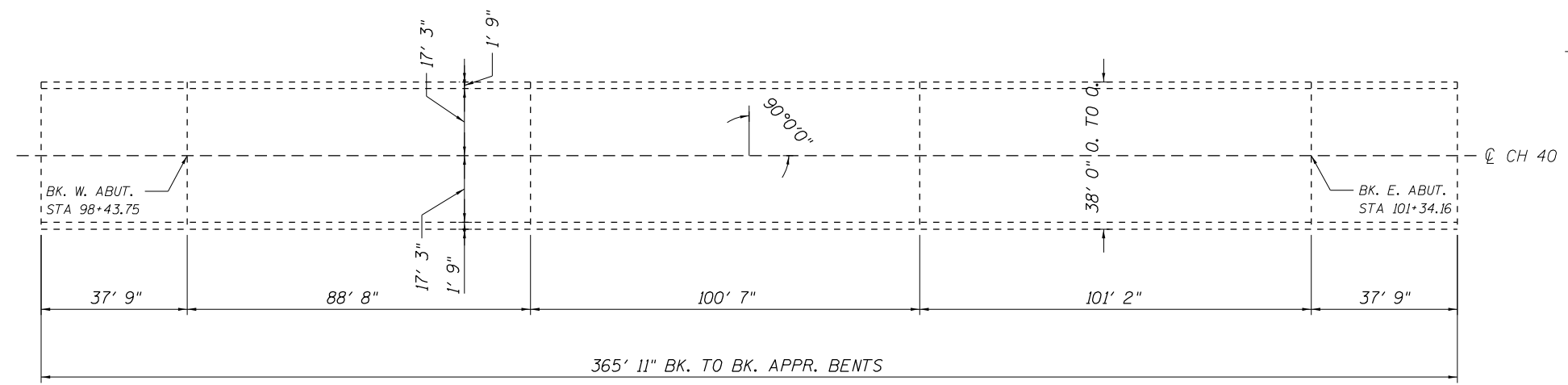
USER NAME = dudleybm	DESIGNED -	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	SUMMARY OF QUANTITIES	F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.	
DRAWN -	REVISED -	55			(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9	3		
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PLOT DATE = 3/23/2021	DATE -	REVISED -			SCALE:	SHEET	OF	SHEETS	STA.	TO STA.



ELEVATION



CROSS SECTION - LOOKING WEST



PLAN



Expires 11-30-2022

David Carl Puzey

05/05/2021

STRUCTURE GENERAL NOTES:

PLAN DIMENSIONS AND DETAILS RELATIVE TO EXISTING PLANS ARE SUBJECT TO NOMINAL CONSTRUCTION VARIATIONS. THE CONTRACTOR SHALL FIELD VERIFY EXISTING DIMENSIONS AND DETAILS AFFECTING NEW CONSTRUCTION AND MAKE NECESSARY APPROVED ADJUSTMENTS PRIOR TO CONSTRUCTION OR ORDERING OF MATERIALS. SUCH VARIATIONS SHALL NOT BE CAUSE FOR ADDITIONAL COMPENSATION FOR A CHANGE IN THE SCOPE OF WORK, HOWEVER, THE CONTRACTOR WILL BE PAID FOR THE QUANTITY ACTUALLY FURNISHED AT THE UNIT PRICE BID FOR THE WORK.

ALL STRUCTURAL STEEL SHALL BE AASHTO M270 GRADE 36 UNLESS OTHERWISE NOTED.

EXISTING STRUCTURAL STEEL THAT WILL BE IN CONTACT WITH NEW STRUCTURAL STEEL SHALL BE CLEANED AND PAINTED PRIOR TO ERECTION AS REQUIRED BY THE SPECIAL PROVISION "CLEANING AND PAINTING CONTACT SURFACE AREAS OF EXISTING STEEL STRUCTURES".

ALL NEW STRUCTURAL STEEL AND BEARING ASSEMBLIES SHALL BE HOT-DIP GALVANIZED. SEE SPECIAL PROVISIONS FOR "HOT DIP GALVANIZING FOR STRUCTURAL STEEL".

TOTAL BILL OF MATERIAL (084-0081)

ITEM	UNIT	QUANTITY
Structural Steel Repair	Pound	460
Elastomeric Bearing Assembly, Type I	Each	10
Jack and Remove Existing Bearings	Each	10
Furnishing and Erecting Structural Steel	Pound	1800
Anchor Bolts, 1" φ	Each	20

MODEL: D:\p\h... FILE NAME: C:\OPERATIONS\Bridges\Bridges\CAD\72M90 - 0840081 & 0099_becm\struct\struct.dgn

USER NAME = dudleybm	DESIGNED -	REVISED -
PLOT SCALE = 100,0000' / in.	DRAWN -	REVISED -
PLOT DATE = 3/23/2021	CHECKED -	REVISED -
	DATE -	REVISED -

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**BRIDGE PLAN & ELEVATION
SN 084-0081**

SCALE: SHEET 1 OF 3 SHEETS STA. TO STA.

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
55	(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9	4
ILLINOIS FED. AID PROJECT			CONTRACT NO. 72M90	

GENERAL NOTES

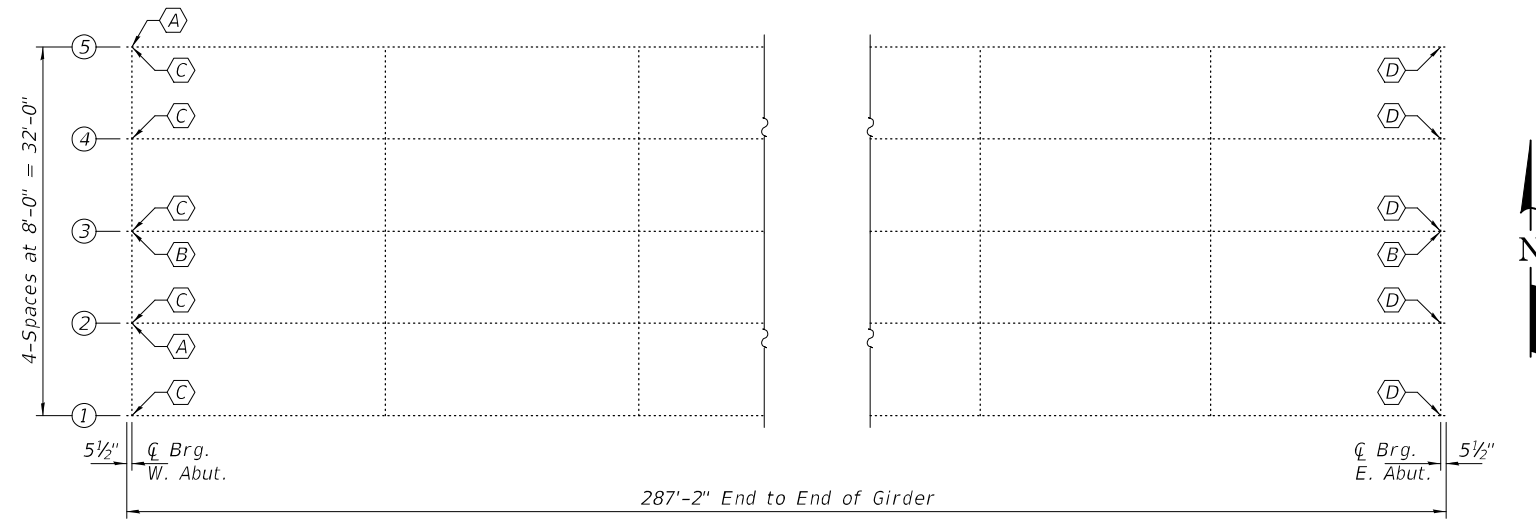
All structural steel shall conform to AASHTO Classification M-270 Gr. 36, unless otherwise noted.

Plan dimensions and details relative to existing plans are subject to nominal construction variations. The Contractor shall field verify existing dimensions and details affecting new construction and make necessary approved adjustments prior to construction or ordering of materials. Such variations shall not be cause for additional compensation for a change in scope of the work, however, the Contractor will be paid for the quantity actually furnished at the unit price bid for the work.

Fasteners shall be high strength bolts. Bolts $\frac{3}{4}"\text{Ø}$, open holes $\frac{1}{16}"\text{Ø}$, unless otherwise noted.

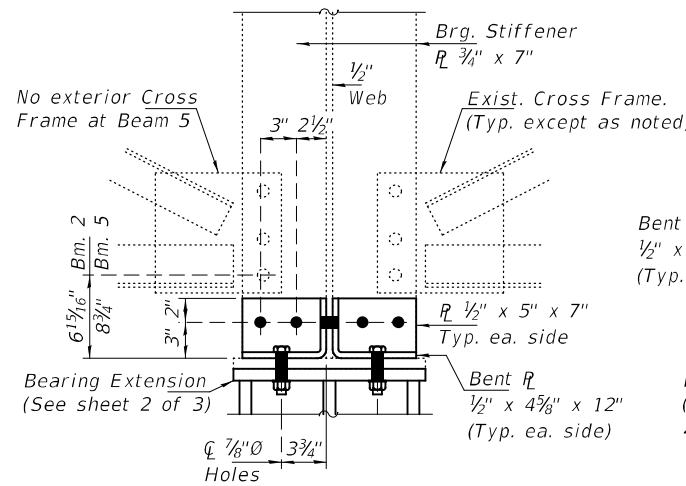
Cost of removal and re-installation of all members necessary to complete the work as detailed on the plans and as specified in the Special Provisions shall be included with Structural Steel Repair.

Cleaning & painting of all connections on this sheet shall meet the requirements for Primary Connections as specified in the special provision for "Cleaning and Painting Contact Surface Areas of Existing Steel Structures".

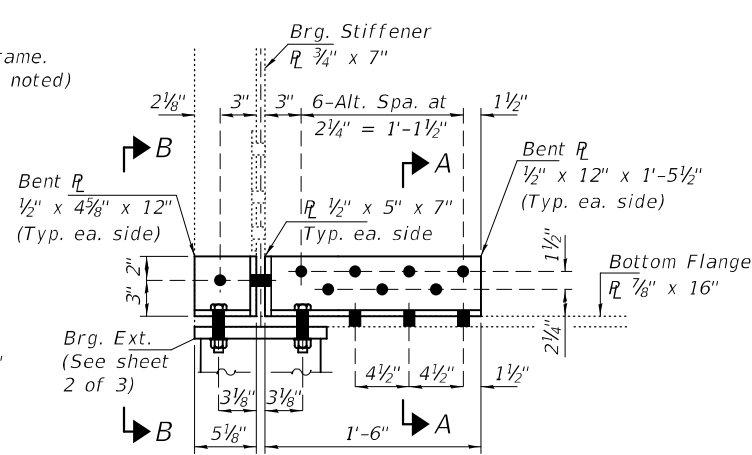


PARTIAL FRAMING PLAN

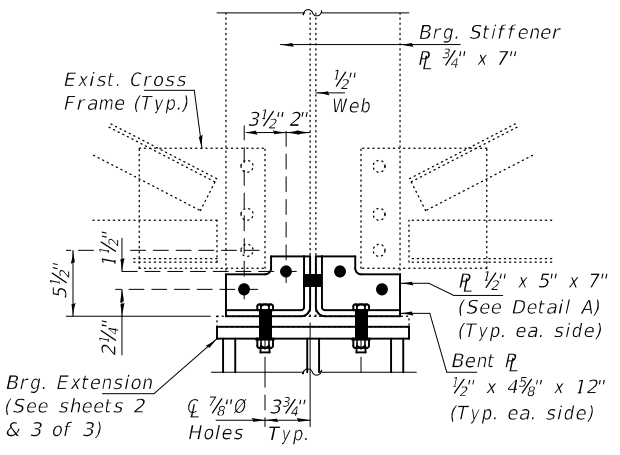
- (A) - Girder Repair Detail "A"
- (B) - Girder Repair Detail "B"
- (C) - Remove & Replace Bearing (See sheet 2 of 3)
- (D) - Remove & Replace Bearing (See sheet 3 of 3)



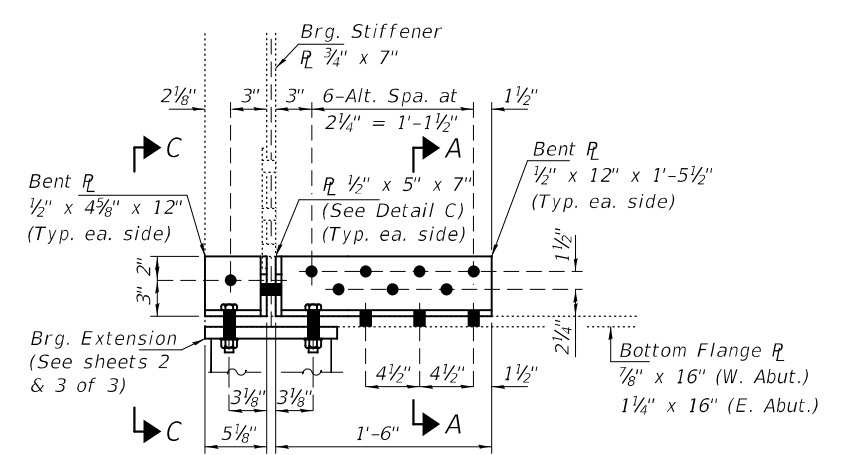
VIEW B-B



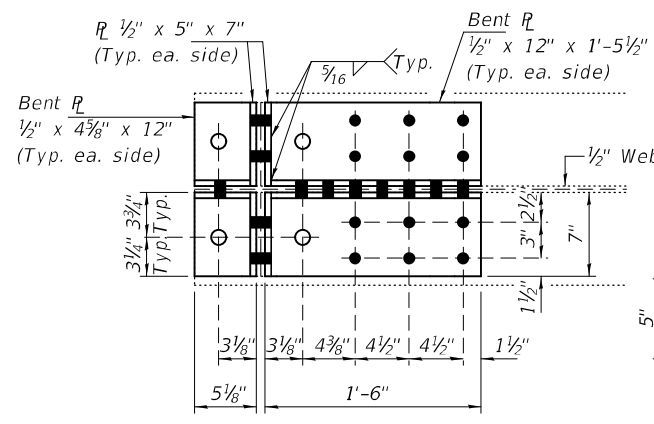
GIRDER REPAIR DETAIL "A"
(Beam 2 shown, Beam 5 similar except as noted.)



VIEW C-C

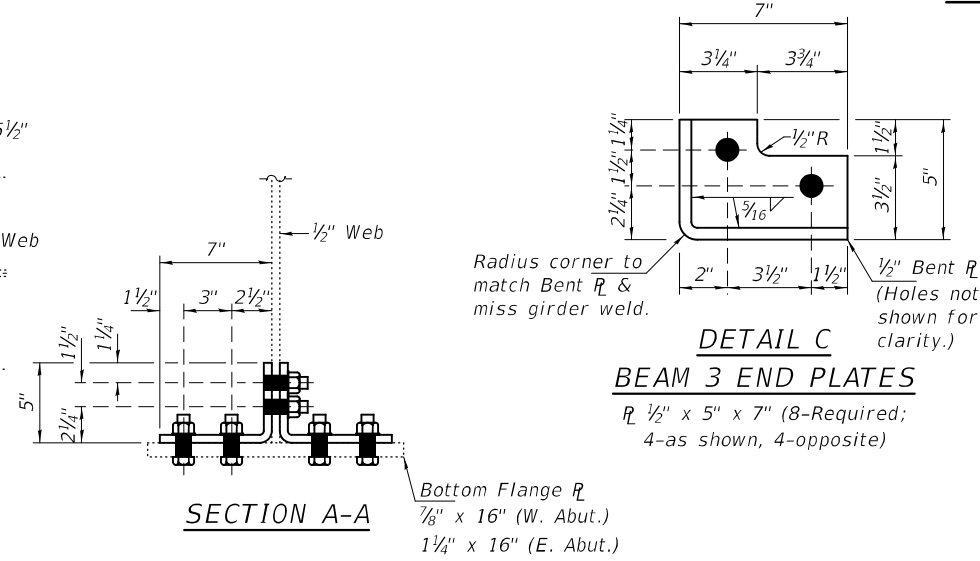


GIRDER REPAIR DETAIL "B"



TYPICAL REPAIR PLAN

Cross Frame Connection R's not shown for clarity.



SECTION A-A

DETAIL C

BEAM 3 END PLATES

R 1/2" x 5" x 7" (8-Required; 4-as shown, 4-opposite)

TOTAL BILL OF MATERIAL

ITEM	UNIT	QUANTITY
Structural Steel Repair	Pound	460
Jack and Remove Existing Bearings	Each	10
Elastomeric Bearing Assembly, Type I	Each	10
Furnishing and Erecting Structural Steel	Pound	1800
Anchor Bolts, 1"Ø	Each	20

Expires: November 30, 2022

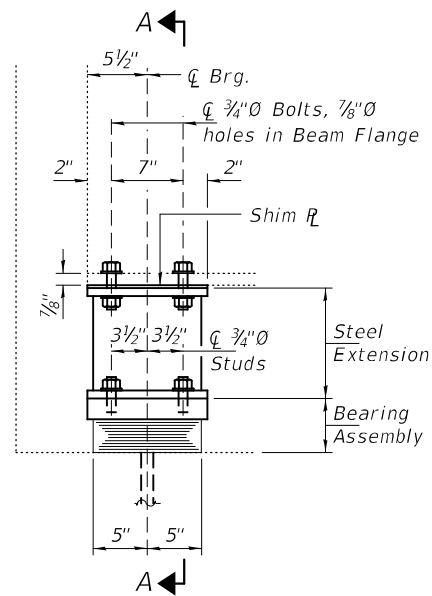
DESIGNED - STEPHEN M. RYAN	EXAMINED - _____	DATE - MAY 5, 2021
CHECKED - CHI-CHEUNG CHAU	ENGINEER OF STRUCTURAL SERVICES	
DRAWN - STEFFEN	PASSED - _____	REVISED - _____
CHECKED - SMR CCC	ENGINEER OF BRIDGES AND STRUCTURES	REVISED - _____

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

FRAMING PLAN AND GIRDER REPAIRS
NEW CITY ROAD OVER F.A.I. 55 & PALM ROAD
SN 084-0081

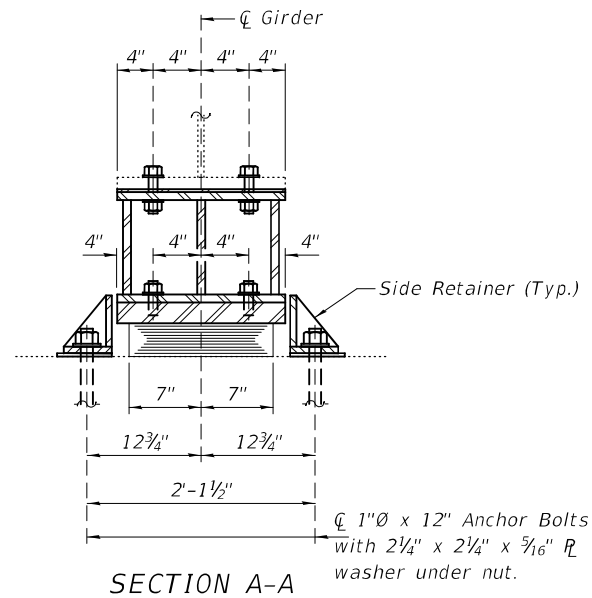
SHEET NO. 1 OF 3 SHEETS

F.A.I. RTE. 55	SECTION (84-4-3)BRR-1 (84-4-1)BRR	COUNTY SANGAMON	TOTAL SHEETS 9	SHEET NO. 5
CONTRACT NO. 72M90			ILLINOIS FED. AID PROJECT	



ELEVATION AT ABUTMENT

TYPE I ELASTOMERIC EXP. BRG.

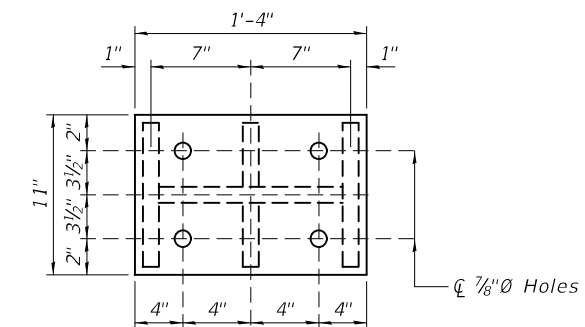


SECTION A-A

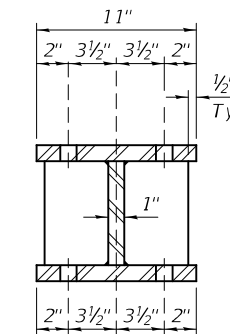
BEAM REACTIONS

R _l	(K)	47.3
R _t	(K)	45.5
Imp.	(K)	13.5
R (Total)	(K)	106.3

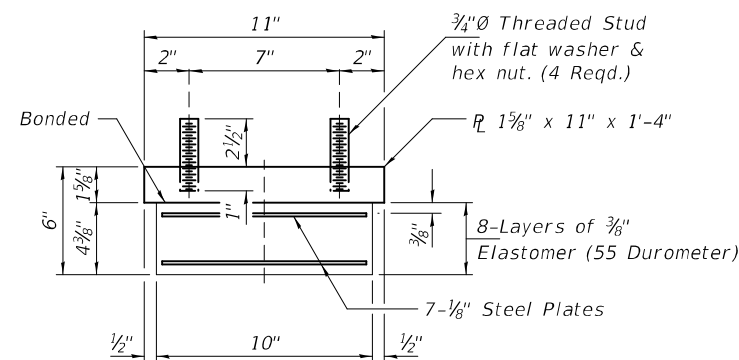
Notes:
 Diaphragm removal and reinstallation may be required to facilitate drilling holes. Cost included with Furnishing and Erecting Structural Steel.
 New steel extensions, shim plates and connection bolts are included with Furnishing and Erecting Structural Steel.
 Prior to ordering any material, the Contractor shall verify in the field all bearing height and shim thickness dimensions. Adjustment must account for deck heave due to pack rust (if present).
 Min. jack capacity = 58 Tons.
 Anchor bolts shall be ASTM F1554 all-thread (or an Engineer-approved alternate material) of the grade(s) and diameter(s) specified. ASTM A307 Grade C anchor bolts may be used in lieu of ASTM F1554 Grade 36 (Fy=36ksi). The corresponding specified grade of AASHTO M314 anchor bolts may be used in lieu of ASTM F1554.
 Drilled and set anchor bolts shall be installed according to Article 521.06 of the Standard Specifications.
 Cost of Side retainers and Stainless Steel plates shall be included in the cost of Elastomeric Bearing Assembly, Type I.



PLAN TOP AND BOTTOM PLATE

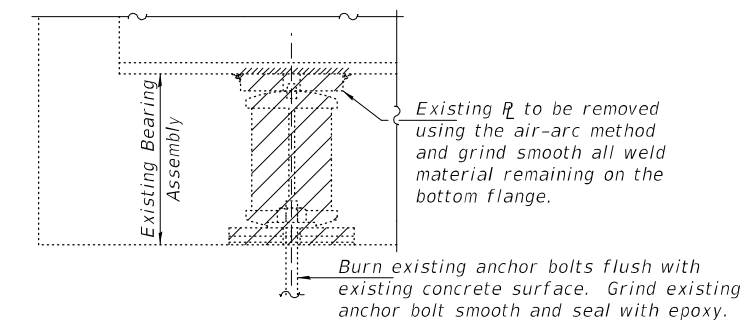


SECTION B-B



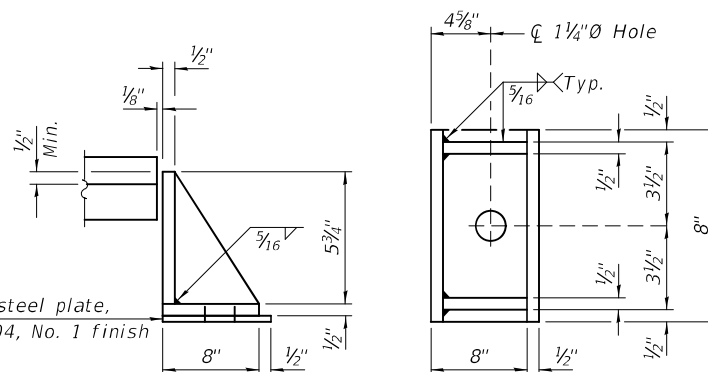
BEARING ASSEMBLY

Note:
 Shim plates shall not be placed under Bearing Assembly.



EXISTING BEARING REMOVAL DETAIL

Cost included with Jack and Remove Existing Bearings.



SIDE RETAINER

Equivalent rolled angle with stiffeners will be allowed in lieu of welded plates.

BILL OF MATERIAL

Item	Unit	Total
Elastomeric Bearing Assembly, Type I	Each	5
Jack and Remove Existing Bearings	Each	5
Furnishing and Erecting Structural Steel	Pound	850
Anchor Bolts, 1"Ø	Each	10

TYI/REPS 5-17-2018

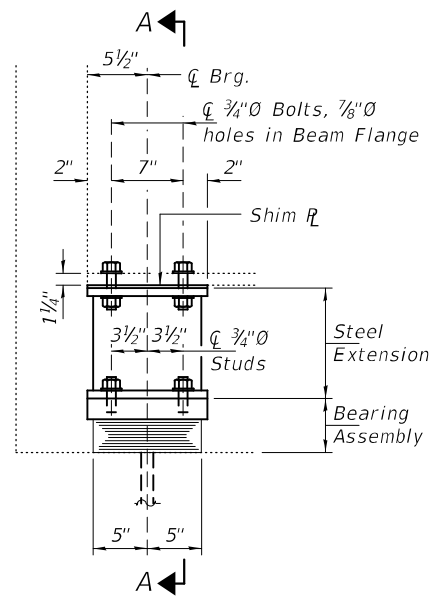
DESIGNED - SMR	EXAMINED - <i>Timothy A. Daulton</i>	DATE - MAY 5, 2021
CHECKED - CCC	ENGINEER OF STRUCTURAL SERVICES	
DRAWN - STEFFEN	PASSED - <i>Carl Ruyter</i>	REVISED -
CHECKED - SMR CCC	ENGINEER OF BRIDGES AND STRUCTURES	REVISED -

**STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION**

**WEST ABUTMENT BEARING REPLACEMENT DETAILS
 SN 084-0081**

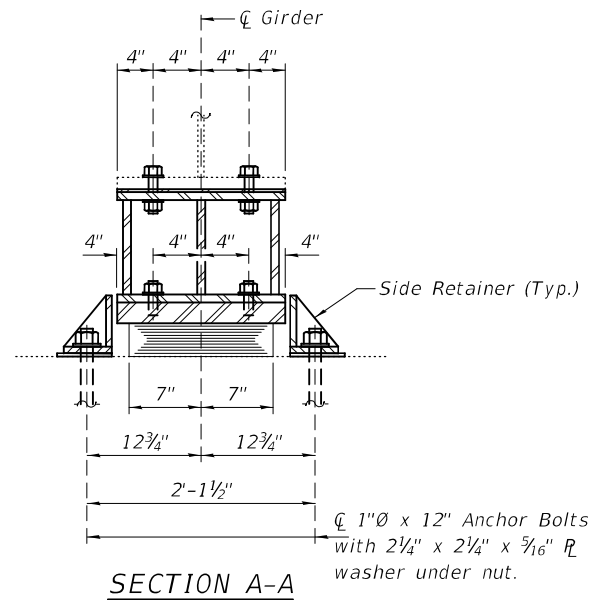
SHEET NO. 2 OF 3 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
55	(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9	6
CONTRACT NO. 72M90				
ILLINOIS FED. AID PROJECT				



ELEVATION AT ABUTMENT

TYPE I ELASTOMERIC EXP. BRG.



SECTION A-A

BEAM REACTIONS

R _l	(K)	56.2
R _t	(K)	46.4
Imp.	(K)	10.3
R (Total)	(K)	112.9

Notes:

Diaphragm removal and reinstallation may be required to facilitate drilling holes. Cost included with Furnishing and Erecting Structural Steel.

New steel extensions, shim plates and connection bolts are included with Furnishing and Erecting Structural Steel.

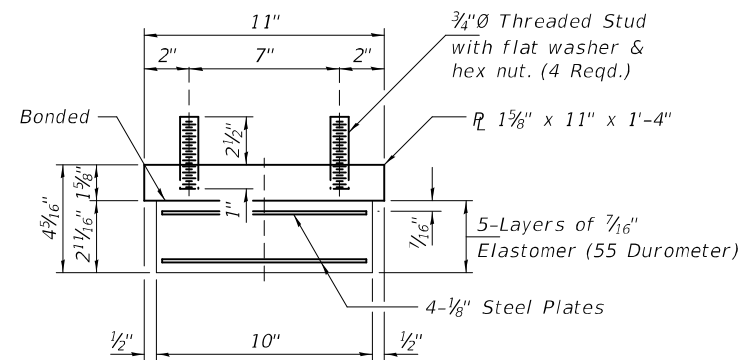
Prior to ordering any material, the Contractor shall verify in the field all bearing height and shim thickness dimensions. Adjustment must account for deck heave due to pack rust (if present).

Min. jack capacity = 63 Tons.

Anchor bolts shall be ASTM F1554 all-thread (or an Engineer-approved alternate material) of the grade(s) and diameter(s) specified. ASTM A307 Grade C anchor bolts may be used in lieu of ASTM F1554 Grade 36 (Fy=36ksi). The corresponding specified grade of AASHTO M314 anchor bolts may be used in lieu of ASTM F1554.

Drilled and set anchor bolts shall be installed according to Article 521.06 of the Standard Specifications.

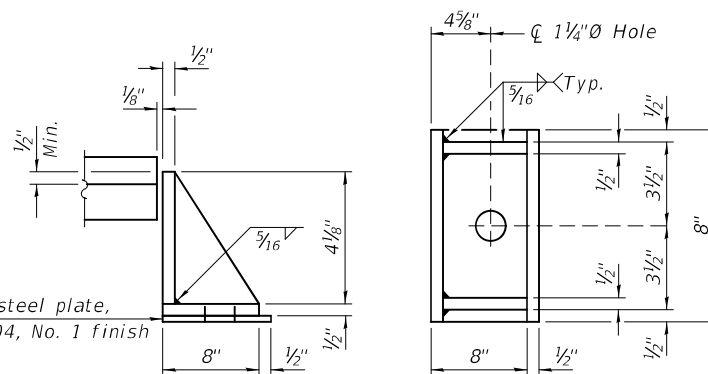
Cost of Side retainers and Stainless Steel plates shall be included in the cost of Elastomeric Bearing Assembly, Type I.



BEARING ASSEMBLY

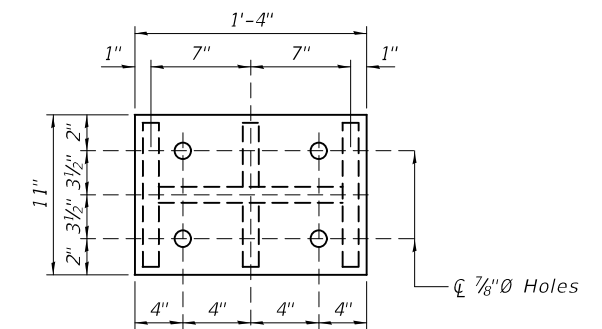
Note:

Shim plates shall not be placed under Bearing Assembly.

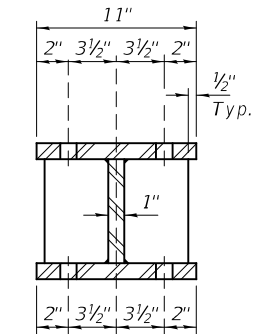


SIDE RETAINER

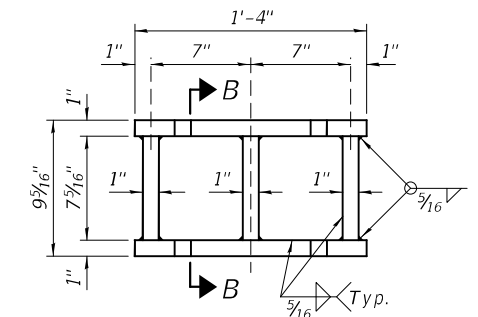
Equivalent rolled angle with stiffeners will be allowed in lieu of welded plates.



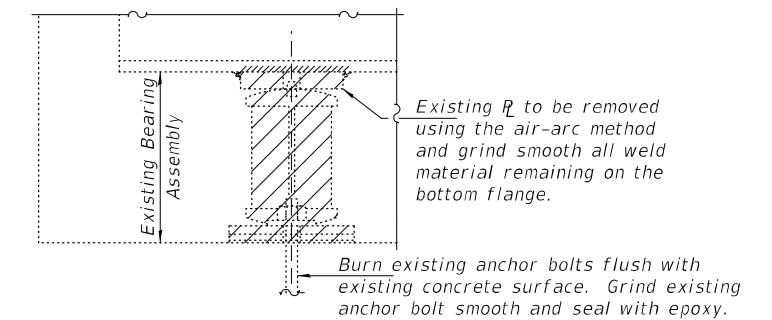
PLAN TOP AND BOTTOM PLATE



SECTION B-B



STEEL EXTENSION DETAIL



EXISTING BEARING REMOVAL DETAIL

Cost included with Jack and Remove Existing Bearings.

BILL OF MATERIAL

Item	Unit	Total
Elastomeric Bearing Assembly, Type I	Each	5
Jack and Remove Existing Bearings	Each	5
Furnishing and Erecting Structural Steel	Pound	950
Anchor Bolts, 1"Ø	Each	10

TYI/REPS 5-17-2018

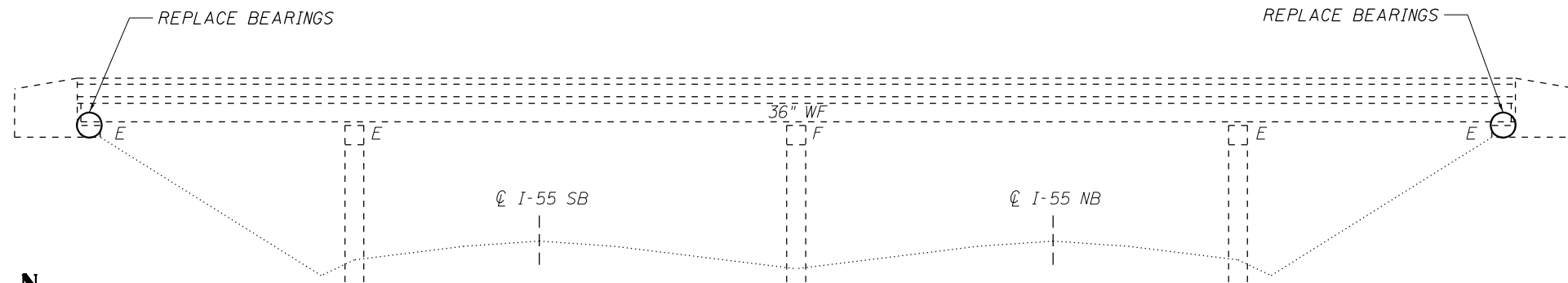
DESIGNED - SMR	EXAMINED - <i>Timothy A. Daulton</i>	DATE - MAY 5, 2021
CHECKED - CCC	ENGINEER OF STRUCTURAL SERVICES	
DRAWN - STEFFEN	PASSED - <i>Carl Ruyter</i>	REVISED -
CHECKED - SMR CCC	ENGINEER OF BRIDGES AND STRUCTURES	REVISED -

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

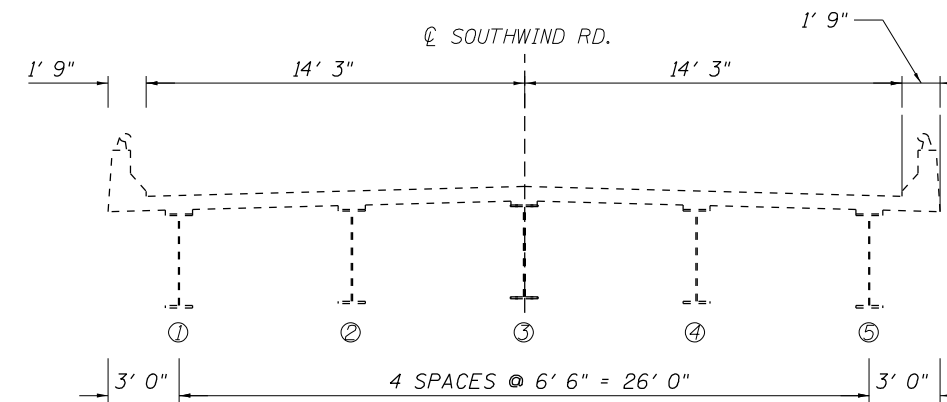
**EAST ABUTMENT BEARING REPLACEMENT DETAILS
SN 084-0081**

SHEET NO. 3 OF 3 SHEETS

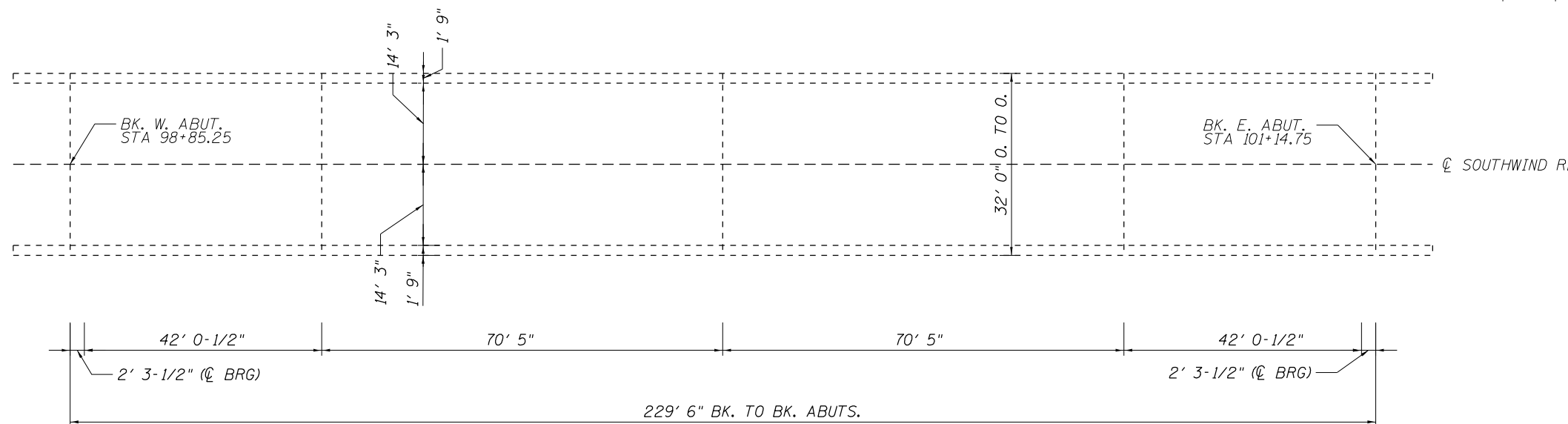
F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
55	(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9	6A
CONTRACT NO. 72M90				
ILLINOIS FED. AID PROJECT				



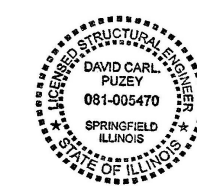
ELEVATION



CROSS SECTION - LOOKING EAST



PLAN



Expires 11-30-2022

David Carl Puzey

05/05/2021

STRUCTURE GENERAL NOTES:

PLAN DIMENSIONS AND DETAILS RELATIVE TO EXISTING PLANS ARE SUBJECT TO NOMINAL CONSTRUCTION VARIATIONS. THE CONTRACTOR SHALL FIELD VERIFY EXISTING DIMENSIONS AND DETAILS AFFECTING NEW CONSTRUCTION AND MAKE NECESSARY APPROVED ADJUSTMENTS PRIOR TO CONSTRUCTION OR ORDERING OF MATERIALS. SUCH VARIATIONS SHALL NOT BE CAUSE FOR ADDITIONAL COMPENSATION FOR A CHANGE IN THE SCOPE OF WORK, HOWEVER, THE CONTRACTOR WILL BE PAID FOR THE QUANTITY ACTUALLY FURNISHED AT THE UNIT PRICE BID FOR THE WORK.

ALL STRUCTURAL STEEL SHALL BE AASHTO M270 GRADE 36 UNLESS OTHERWISE NOTED.

EXISTING STRUCTURAL STEEL THAT WILL BE IN CONTACT WITH NEW STRUCTURAL STEEL SHALL BE CLEANED AND PAINTED PRIOR TO ERECTION AS REQUIRED BY THE SPECIAL PROVISION "CLEANING AND PAINTING CONTACT SURFACE AREAS OF EXISTING STEEL STRUCTURES".

ALL NEW STRUCTURAL STEEL AND BEARING ASSEMBLIES SHALL BE HOT-DIP GALVANIZED. SEE SPECIAL PROVISIONS FOR "HOT DIP GALVANIZING FOR STRUCTURAL STEEL".

TOTAL BILL OF MATERIAL (084-0099)

ITEM	UNIT	QUANTITY
Elastomeric Bearing Assembly, Type I	Each	10
Jack and Remove Existing Bearings	Each	10
Furnishing and Erecting Structural Steel	Pound	1150
Anchor Bolts, 1" φ	Each	20
Silicone Joint Sealer, 2-3/4"	Foot	64

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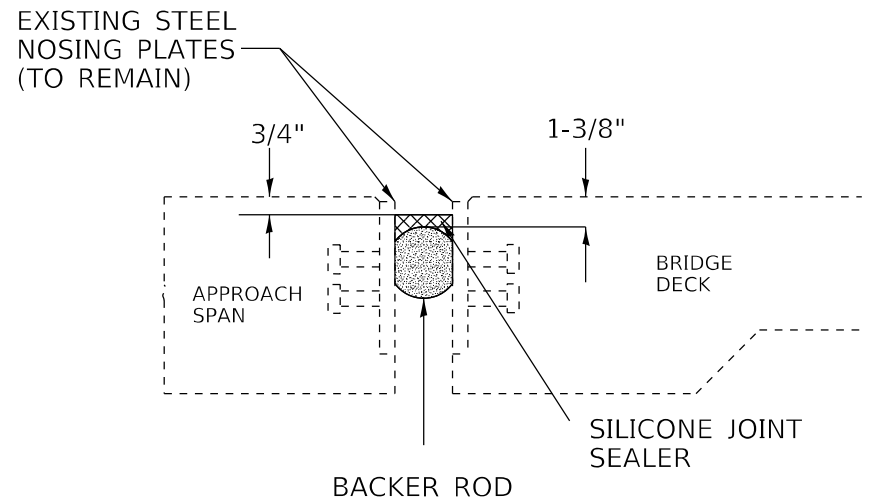
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PLOT SCALE = 100,0000' / in.	DRAWN -	REVISED -
PLOT DATE = 3/23/2021	CHECKED -	REVISED -
	DATE -	REVISED -

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

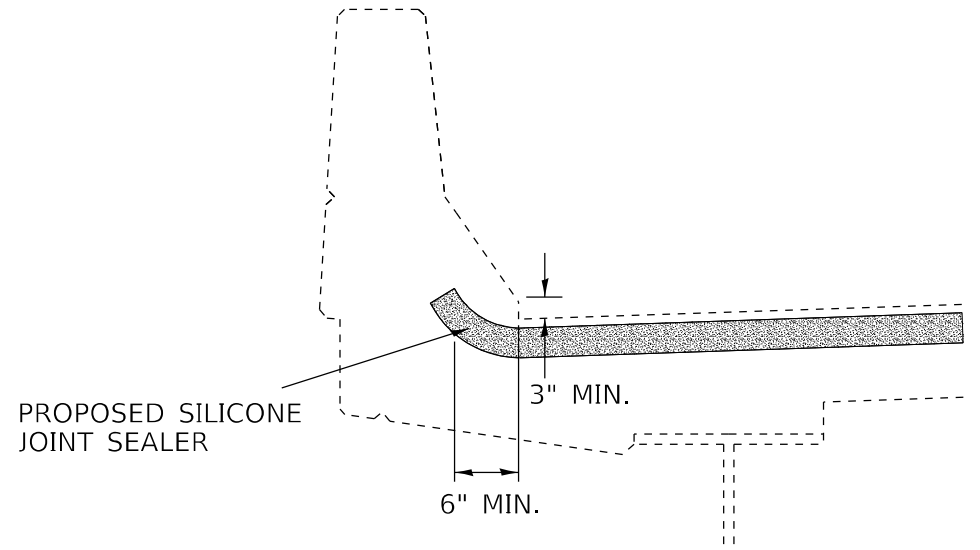
**BRIDGE PLAN & ELEVATION
SN 084-0099**

SCALE: SHEET 1 OF 3 SHEETS STA. TO STA.

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
55	(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9	7
ILLINOIS FED. AID PROJECT			CONTRACT NO. 72M90	



ABUTMENT JOINT CROSS SECTION:
SILICONE JOINT SEALER, 2-3/4"



TYPICAL PARAPET CROSS SECTION:
SILICONE JOINT SEALER END TREATMENT

NOTES:

- JOINT WIDTHS SPECIFIED IN PLANS ARE AT 50° F. THE CONTRACTOR SHALL INSTALL BACKER ROD HAVING A DIAMETER 25% GREATER THAN THE JOINT OPENING AT THE TIME OF INSTALLATION.
- THE COST OF REMOVING AND DISPOSING OF EXISTING JOINT SEAL MATERIAL SHALL BE INCLUDED IN THE BID PRICE FOR SILICONE JOINT SEALER.

JOINT REPAIR (084-0099)

ITEM	UNIT	QUANTITY
Silicone Joint Sealer 2-3/4"	Foot	64

MODEL: D:\p\h
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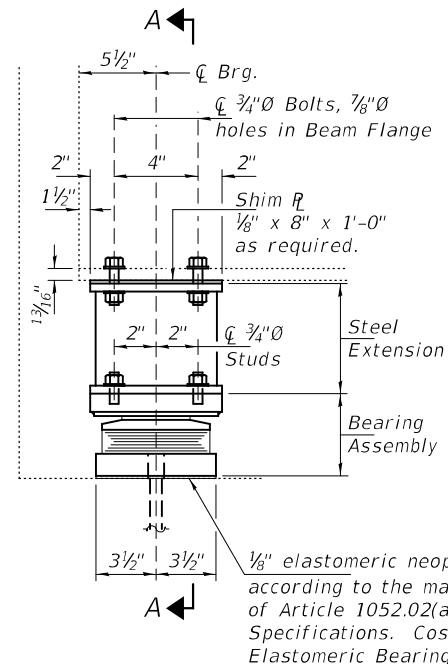
USER NAME = dudleybm	DESIGNED -	REVISED -
PLOT SCALE = 100,0000' / in.	DRAWN -	REVISED -
PLOT DATE = 3/23/2021	CHECKED -	REVISED -
	DATE -	REVISED -

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**JOINT REPAIR DETAILS
SN 084-0099**

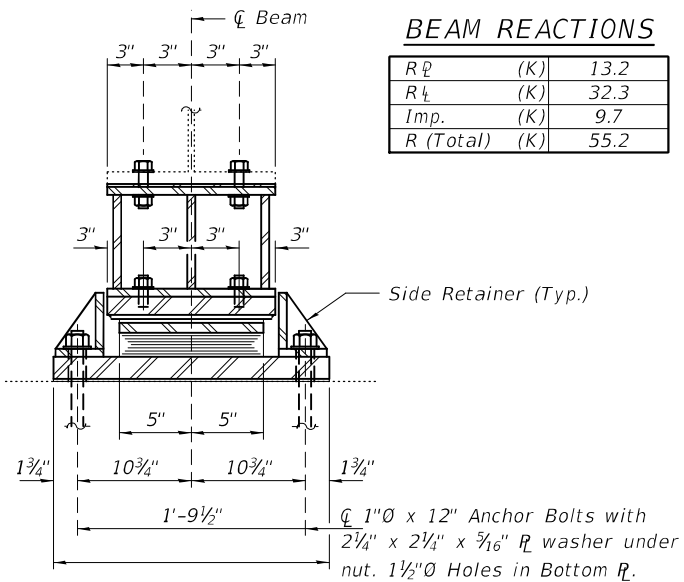
SCALE: SHEET 2 OF 3 SHEETS STA. TO STA.

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
55	(84-4-2)BRR-1 (84-4-1)BRR	SANGAMON	9	8
CONTRACT NO. 72M90				
ILLINOIS FED. AID PROJECT				



ELEVATION AT ABUTMENT

TYPE II TFE ELASTOMERIC EXP. BRG.

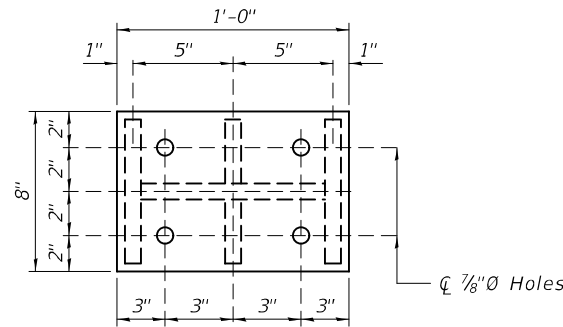


SECTION A-A

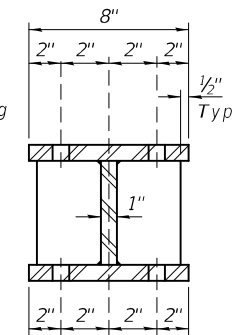
BEAM REACTIONS

R ₁	(K)	13.2
R ₂	(K)	32.3
Imp.	(K)	9.7
R (Total)	(K)	55.2

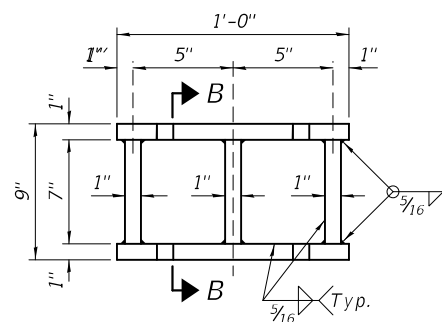
Notes:
 Diaphragm removal and reinstallation may be required to facilitate drilling holes. Cost included with Furnishing and Erecting Structural Steel.
 New steel extensions, shim plates and connection bolts are included with Furnishing and Erecting Structural Steel.
 Prior to ordering any material, the Contractor shall verify in the field all bearing height and shim thickness dimensions. Adjustment must account for deck heave due to pack rust (if present).
 Min. jack capacity = 26 Tons.
 Anchor bolts shall be ASTM F1554 all-thread (or an Engineer-approved alternate material) of the grade(s) and diameter(s) specified. ASTM A307 Grade C anchor bolts may be used in lieu of ASTM F1554 Grade 36 (Fy=36ksi). The corresponding specified grade of AASHTO M314 anchor bolts may be used in lieu of ASTM F1554.
 Anchor bolts at fixed bearings may be either cast in place or installed in holes drilled after the supported member is in place.
 Anchor bolts for Type II bearings shall be placed in holes drilled through the bottom bearing plate after members are in place. Side retainers shall be placed after bolts are installed.
 Drilled and set anchor bolts shall be installed according to Article 521.06 of the Standard Specifications.
 Side retainers shall be included in the cost of Elastomeric Bearing Assembly, Type II.
 The 1/8" PTFE sheet shall be bonded directly to the top steel plate with a two-component, medium viscosity epoxy resin, conforming to the requirements of the Federal Specification MMM-A-134, Type I. The bond agent shall be applied on the full area of the contact surfaces.
 Bonding of 1/8" PTFE sheet during vulcanizing process will be permitted provided the process and method of adjusting assembly height is approved by the Engineer.



PLAN TOP AND BOTTOM PLATE

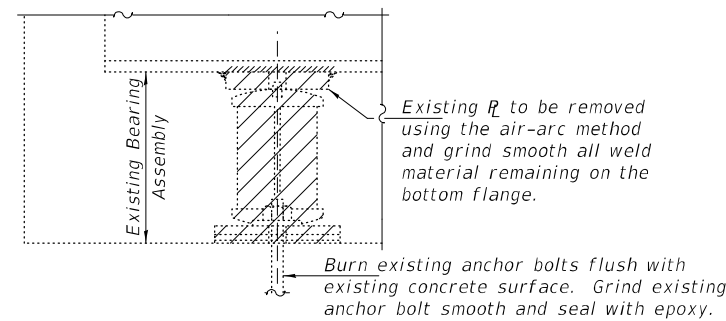


SECTION B-B



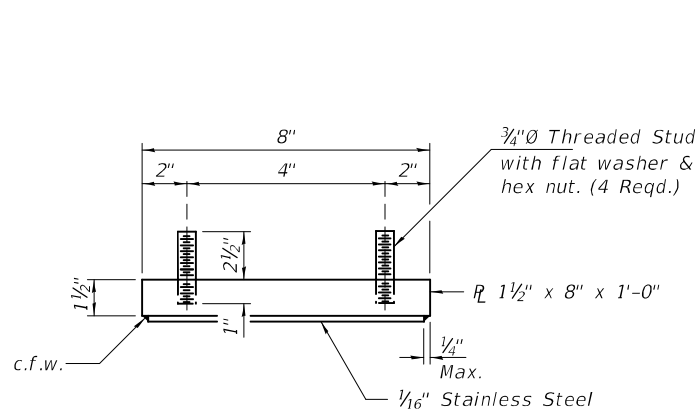
STEEL EXTENSION DETAIL

Note:
 Height of the steel extensions shown is required in order to raise the end of the deck to match the Approach elevation. See Special Provision for Jack and Remove Existing Bearing.

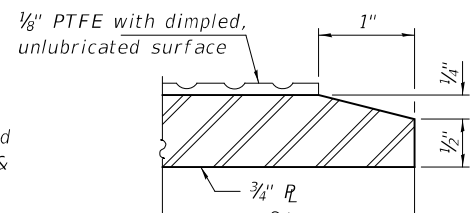


EXISTING BEARING REMOVAL DETAIL

Cost included with Jack and Remove Existing Bearings.

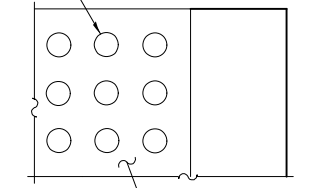


TOP BEARING ASSEMBLY

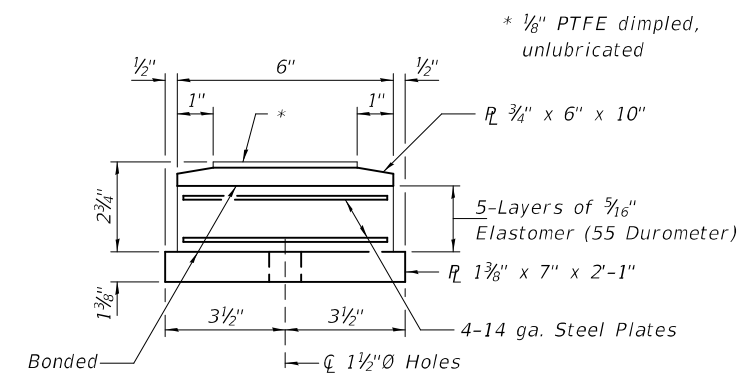


SECTION THRU PTFE

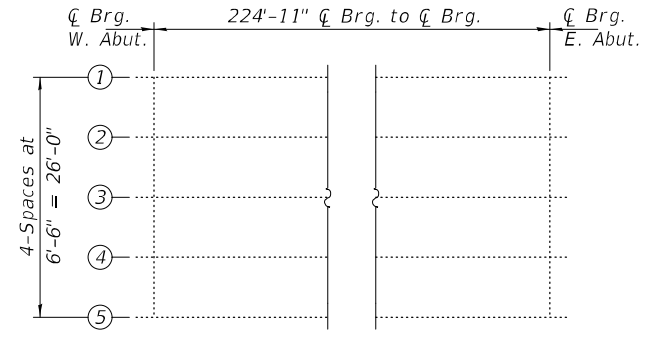
1/4" Dimples on 1/2" centers
 1/16" deep, or equivalent.



PLAN-PTFE SURFACE

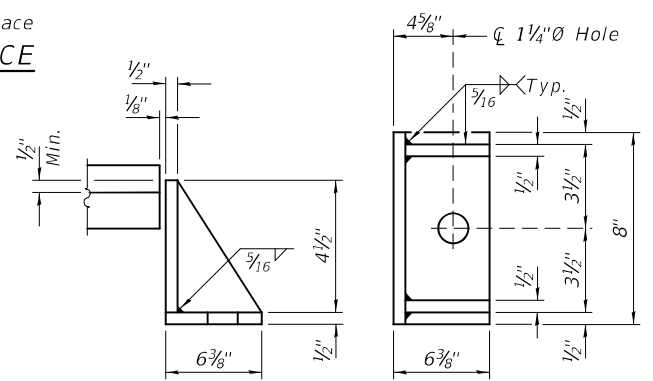


BOTTOM BEARING ASSEMBLY



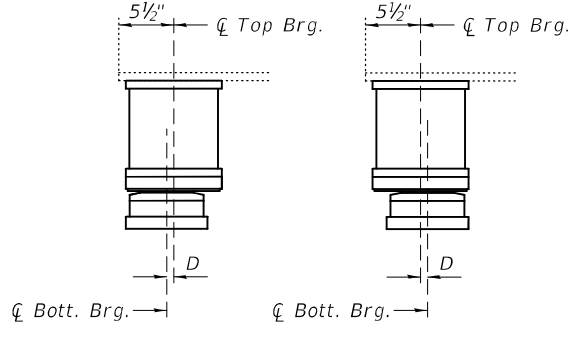
PARTIAL FRAMING PLAN

Remove & Replace Bearing Assemblies at West & East Abutments. (10-Locations)



SIDE RETAINER

Equivalent rolled angle with stiffeners will be allowed in lieu of welded plates.



SETTING ANCHOR BOLTS AT EXP. BRG.

D = 1/8" per each 100' of expansion for every 15° temp. change from the normal temp. of 50°F.

BILL OF MATERIAL

Item	Unit	Total
Elastomeric Bearing Assembly, Type II	Each	10
Jack and Remove Existing Bearings	Each	10
Furnishing and Erecting Structural Steel	Pound	1150
Anchor Bolts 1"Ø	Each	20

Expires: November 30, 2022

DESIGNED - STEPHEN M. RYAN	EXAMINED	DATE - MAY 3, 2021
CHECKED - ADRIAN T. HALLOWAY	ENGINEER OF STRUCTURAL SERVICES	
DRAWN - STEFFEN	PASSED	REVISED -
CHECKED - SMR ATH	ENGINEER OF BRIDGES AND STRUCTURES	REVISED -

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

ABUTMENT BEARING REPLACEMENT DETAILS
 SOUTHWIND ROAD OVER F.A.I. 55
 SN 084-0099

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
55	(84-4-3)BRR-1 (84-4-1)BRR	SANGAMON	9	9
CONTRACT NO. 72M90				