

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

**PROPOSED
BRIDGE REPAIRS**

FAP 315 (US 136)
SECTION (30) BDR, BJR

BRIDGE REPAIRS
HANCOCK COUNTY

C-96-009-17

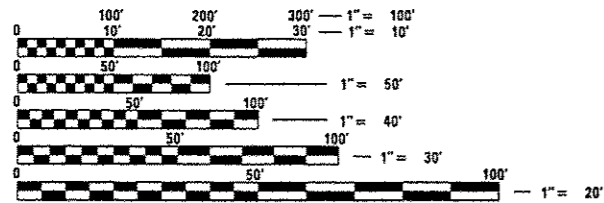
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
315	(30) BDR, BJR	HANCOCK	8	1
		ILLINOIS	CONTRACT NO. 72J50	

FOR INDEX OF SHEETS, SEE SHEET NO. 2

PROJECT LOCATION - SN 034-0001
US 136 OVER HAMILTON SLOUGH
0.1 MILES EAST OF MISSISSIPPI RIVER

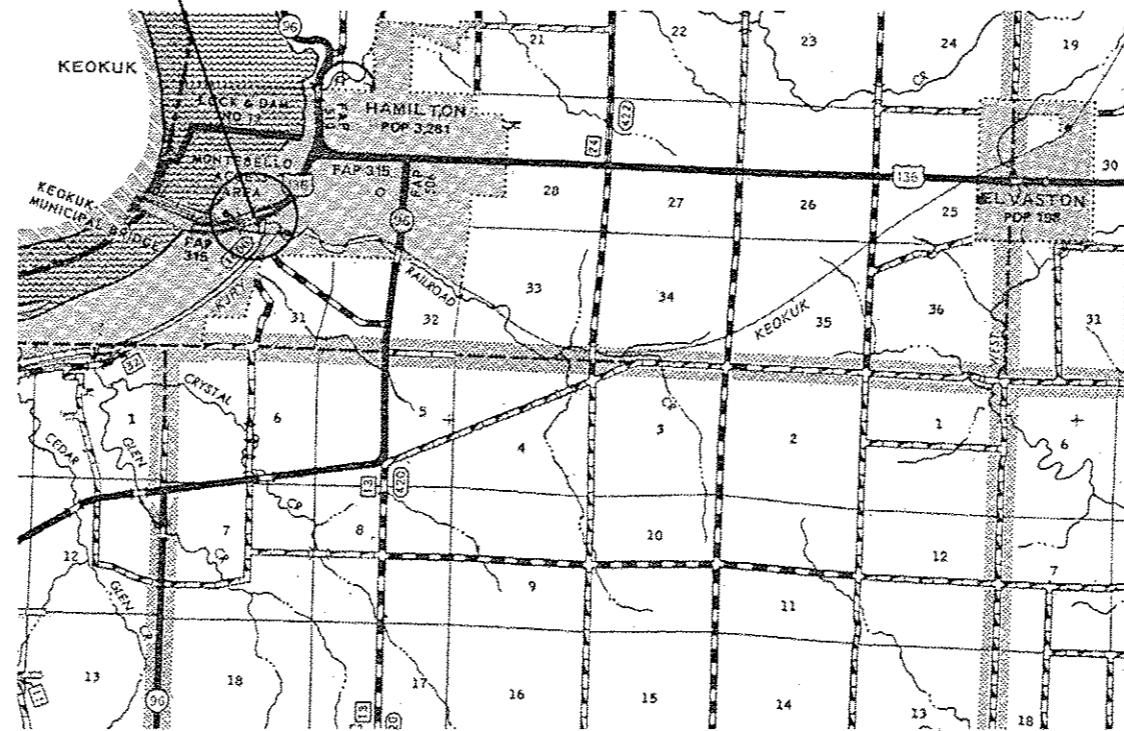


LOCATION OF SECTION INDICATED THUS: - [black bar] -



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 EXCAVATION
1-800-892-0123
OR 811



BRIDGE MAINTENANCE ENGINEER - BRANDON DUDLEY (217) 785-9290
BRIDGE INSPECTION ENGINEER - DAVE COPENBARGER (217) 785-5306

GROSS LENGTH = 210 FT = 0.04 MI
NET LENGTH = 210 FT = 0.04 MI

CONTRACT NO. 72J50

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

SUBMITTED 25 October 2016
[Signature] REGION FOUR ENGINEER

Dec 9 2016
Maureen M. Addis, P.E.
ENGINEER OF DESIGN AND ENVIRONMENT

Dec 9 2016
Cher Egan, P.E.
DIRECTOR OF HIGHWAYS, CHIEF ENGINEER

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INDEX OF SHEETS

- 1 COVER SHEET
- 2 INDEX, STANDARDS, GENERAL NOTES, SIGNATURES, & SUMMARY OF QUANTITIES
- 3-4 TRAFFIC CONTROL PLAN
- 5-8 BRIDGE PLANS - SN 034-0001

HIGHWAY STANDARDS

- 000001-06
- 001006
- 701101-05
- 701106-02
- 701422-09
- 701901-06

CODE NO.	ITEM	UNIT	TOTAL QUANTITY	
50102400	CONCRETE REMOVAL	CU YD	1.2	1.2
50300225	CONCRETE STRUCTURES	CU YD	1.0	1.0
67100100	MOBILIZATION	L SUM	1	1
70100320	TRAFFIC CONTROL AND PROTECTION, STANDARD 701422	L SUM	1	1
Z0001800	APPROACH SLAB REPAIR (PARTIAL DEPTH)	SQ YD	39	39
Z0016200	DECK SLAB REPAIR (PARTIAL)	SQ YD	4	4
Z0021904	SILICONE JOINT SEALER, 1"	FOOT	207	207
Z0021908	SILICONE JOINT SEALER, 2"	FOOT	190	190
Z0041895	POLYMER CONCRETE	CU FT	20	20
Z0048665	RAILROAD PROTECTIVE LIABILITY INSURANCE	L SUM	1	1

GENERAL NOTES:

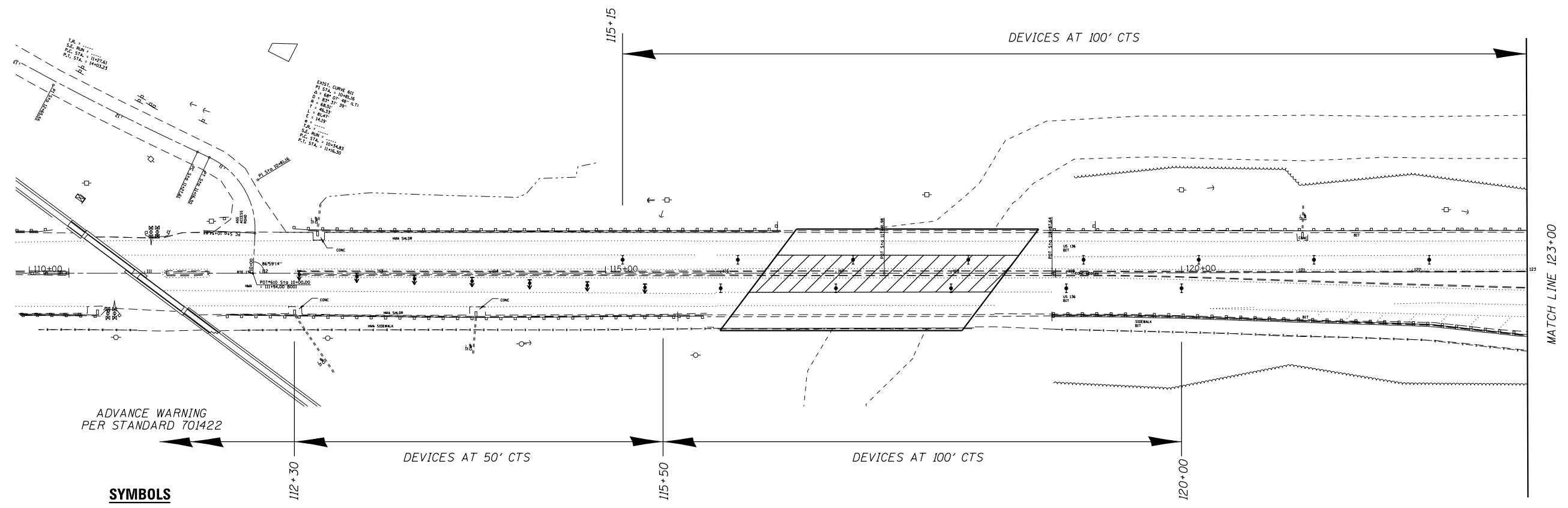
**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS
DISTRICT 6**

EXAMINED October 11th 20 16
[Signature]
ENGINEER OF OPERATIONS

EXAMINED October 6 20 16
[Signature]
ENGINEER OF PROJECT IMPLEMENTATION

EXAMINED October 11 20 16
[Signature]
ENGINEER OF PROGRAM DEVELOPMENT

10



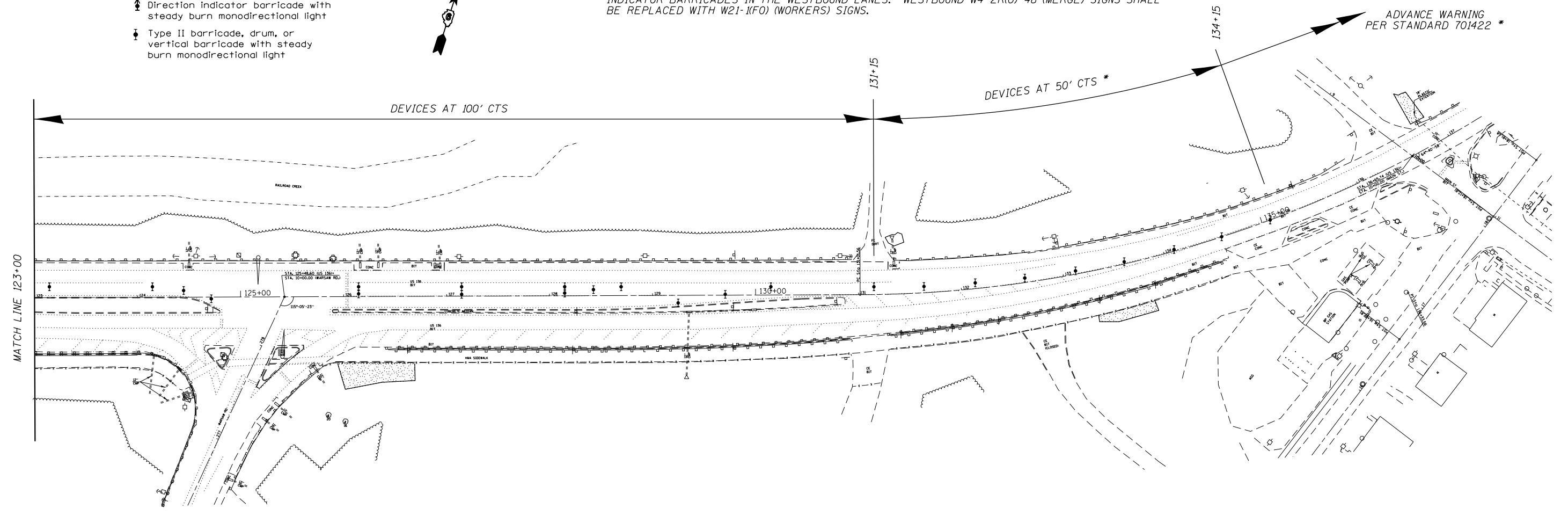
ADVANCE WARNING
PER STANDARD 701422

SYMBOLS

- Work area
- Direction indicator barricade with steady burn monodirectional light
- Type II barricade, drum, or vertical barricade with steady burn monodirectional light



* TYPE II BARRICADES, DRUMS, OR VERTICAL BARRICADES SHALL BE SUBSTITUTED FOR DIRECTION INDICATOR BARRICADES IN THE WESTBOUND LANES. WESTBOUND W4-2R(O)-48 (MERGE) SIGNS SHALL BE REPLACED WITH W21-1(F0) (WORKERS) SIGNS.



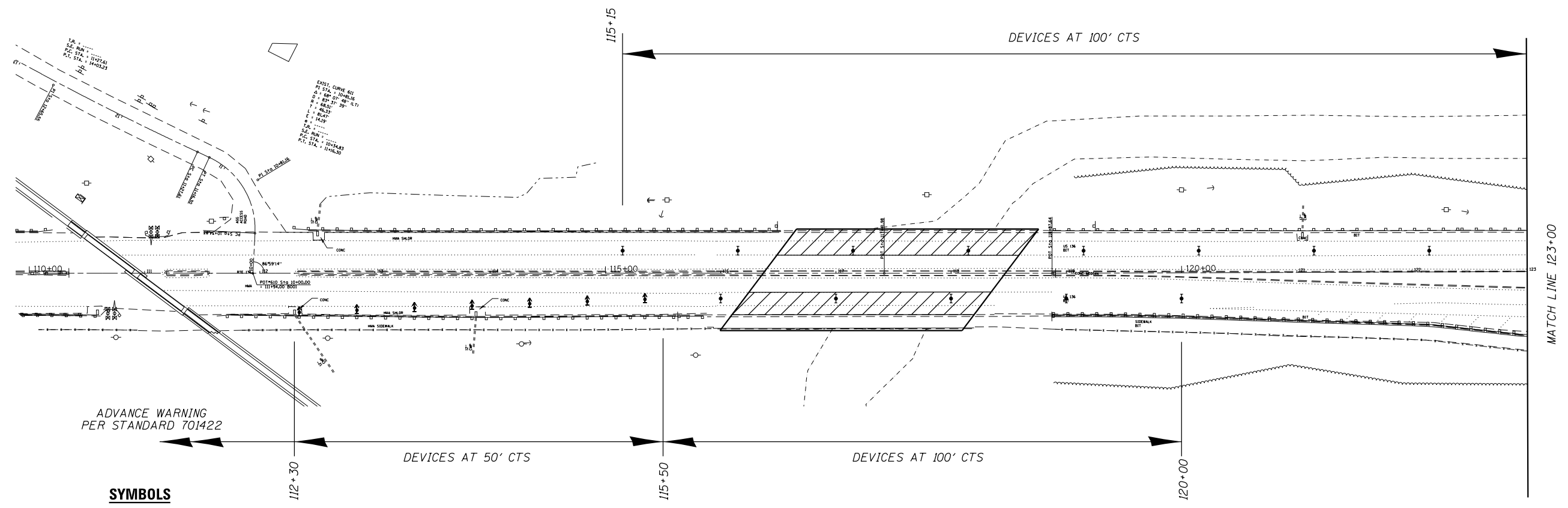
ADVANCE WARNING
PER STANDARD 701422 *

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Default	PLOT SCALE = 100.0000' / 1".	CHECKED -	REVISED -
	PLOT DATE = 10/20/2016	DATE -	REVISED -

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

STAGE I TRAFFIC CONTROL				
SCALE:	SHEET	OF	SHEETS	STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
315	(30) BDR, BUR	HANCOCK	8	3
CONTRACT NO. 72J50				
ILLINOIS FED. AID PROJECT				



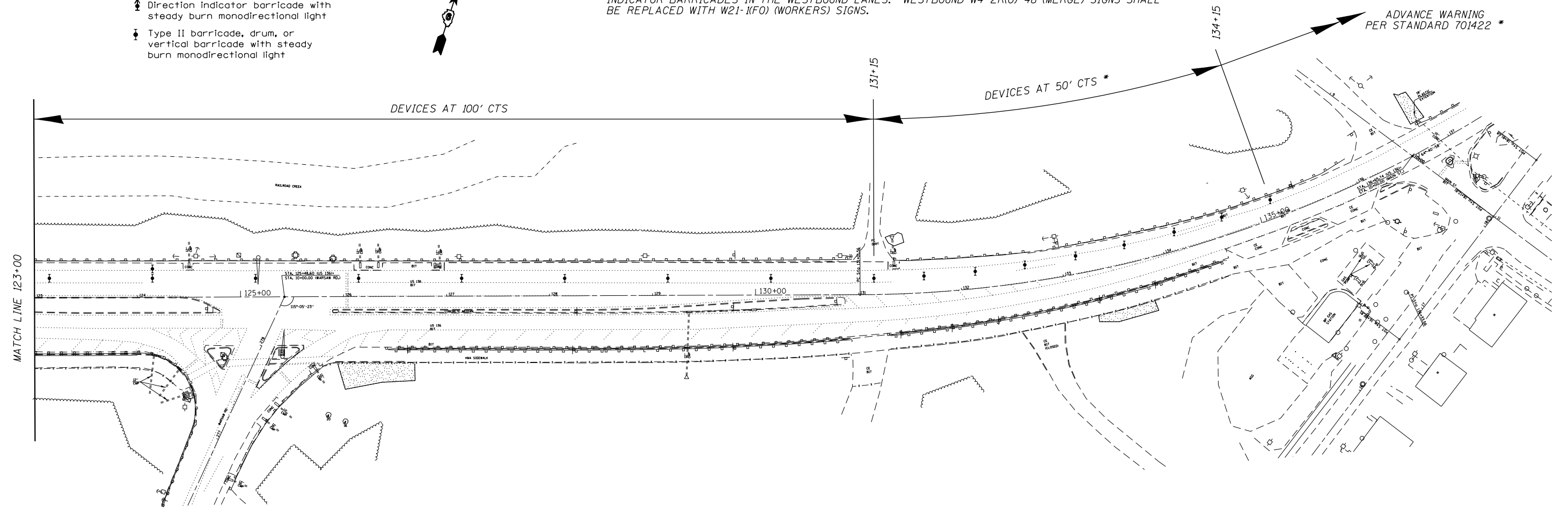
ADVANCE WARNING
PER STANDARD 701422

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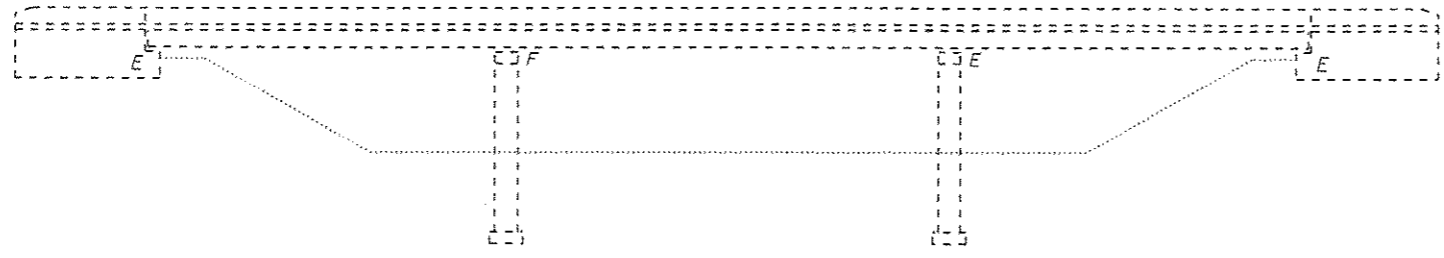
ADVANCE WARNING
PER STANDARD 701422 *

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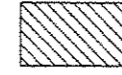
**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

STAGE II TRAFFIC CONTROL				
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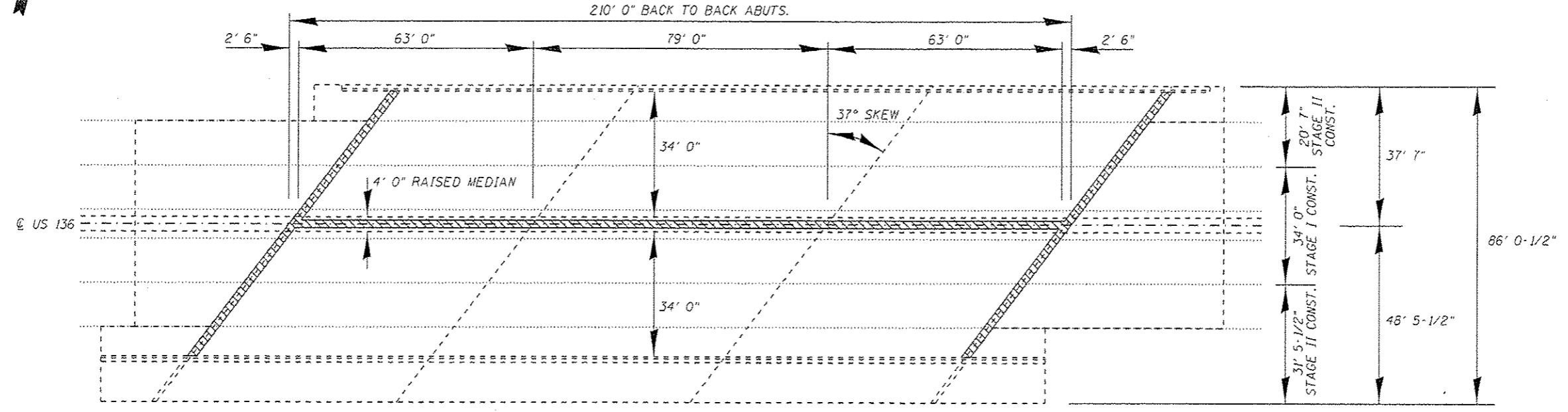
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
315	(30) BDR, BUR	HANCOCK	8	4
CONTRACT NO. 72J50				
ILLINOIS FED. AID PROJECT				



ELEVATION



PROPOSED JOINT REPAIRS - SEE FOLLOWING SHEETS FOR DETAILS



PLAN

NOTES:

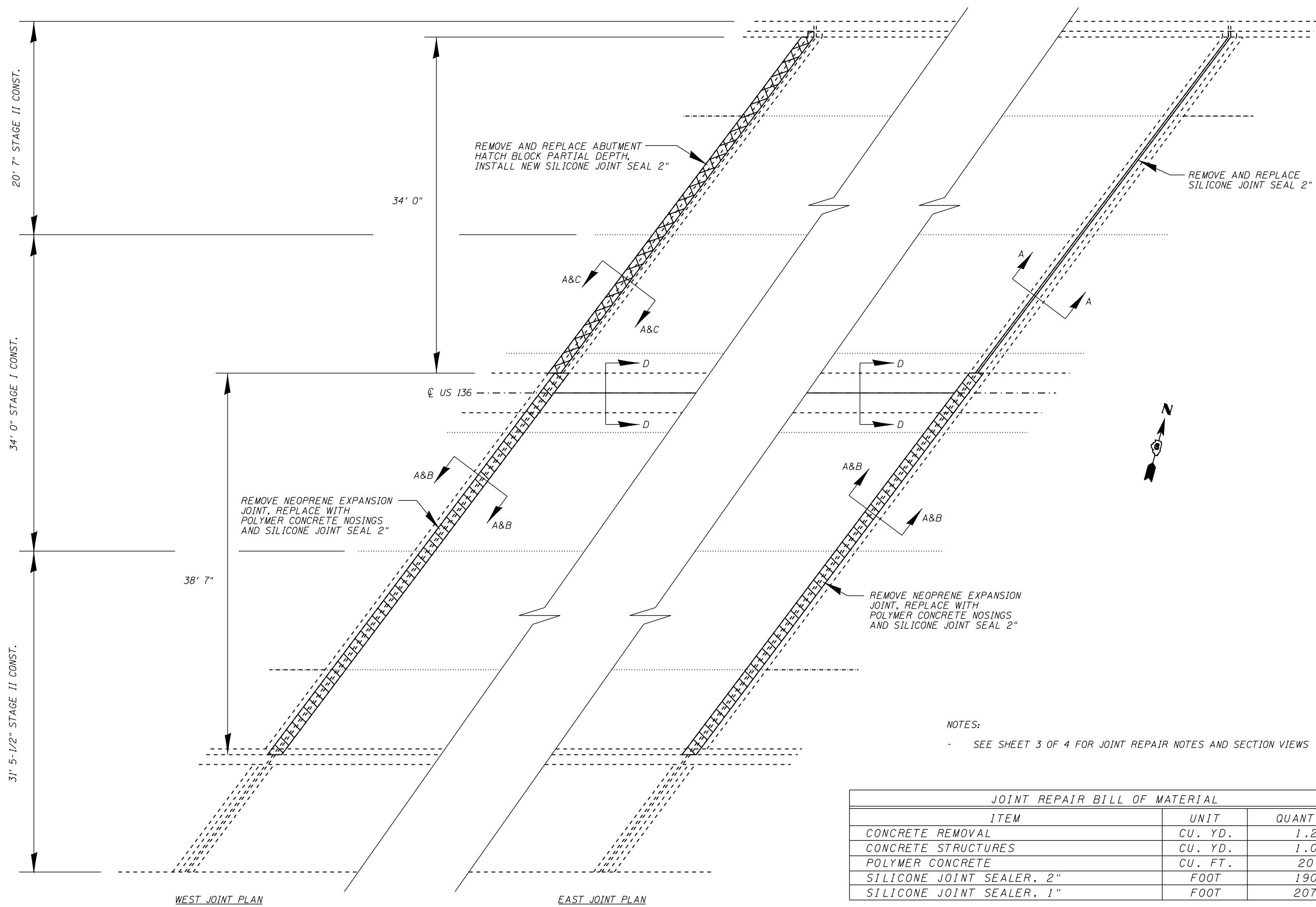
PLAN DIMENSIONS AND DETAILS RELATIVE TO EXISTING PLANS ARE SUBJECT TO NOMINAL CONSTRUCTION VARIATIONS. THE CONTRACTOR SHALL FIELD VERIFY EXISTING DIMENSIONS AND DETAILS AFFECTING NEW CONSTRUCTION AND MAKE NECESSARY APPROVED ADJUSTMENTS PRIOR TO CONSTRUCTION OR ORDERING OF MATERIALS. SUCH VARIATIONS SHALL 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.

BILL OF MATERIAL		
ITEM	UNIT	QUANTITY
CONCRETE REMOVAL	CU. YD.	1.2
CONCRETE STRUCTURES	CU. YD.	1.0
POLYMER CONCRETE	CU. FT.	20
SILICONE JOINT SEALER, 2"	FOOT	190
SILICONE JOINT SEALER, 1"	FOOT	207
APPROACH SLAB REPAIR (PARTIAL DEPTH)	SQ. YD.	39
DECK SLAB REPAIR (PARTIAL)	SQ. YD.	4



David Carl Puzey 12/2/16
Expires 11/30/18

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PLDT SCALE = 100.0000 1/4" = 1'-0"	CHECKED - DAC	REVISED -	REVISED -			SCALE:	SHEET 1 OF 4 SHEETS	STA. TO STA.	ILLINOIS FED. AID PROJECT			
PLDT DATE = 10/20/2016	DATE -	REVISED -	REVISED -			CONTRACT NO. 72J50						



REMOVE NEOPRENE EXPANSION JOINT, REPLACE WITH POLYMER CONCRETE NOSINGS AND SILICONE JOINT SEAL 2"

REMOVE AND REPLACE ABUTMENT HATCH BLOCK PARTIAL DEPTH, INSTALL NEW SILICONE JOINT SEAL 2"

REMOVE AND REPLACE SILICONE JOINT SEAL 2"

REMOVE NEOPRENE EXPANSION JOINT, REPLACE WITH POLYMER CONCRETE NOSINGS AND SILICONE JOINT SEAL 2"

NOTES:
- SEE SHEET 3 OF 4 FOR JOINT REPAIR NOTES AND SECTION VIEWS

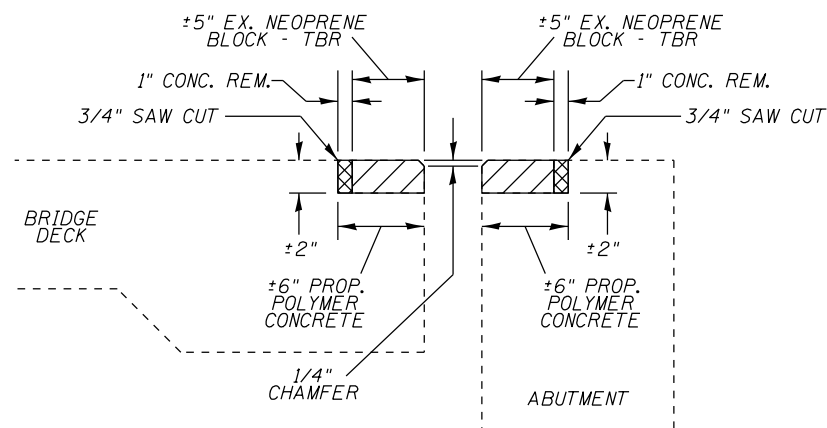
JOINT REPAIR BILL OF MATERIAL		
ITEM	UNIT	QUANTITY
CONCRETE REMOVAL	CU. YD.	1.2
CONCRETE STRUCTURES	CU. YD.	1.0
POLYMER CONCRETE	CU. FT.	20
SILICONE JOINT SEALER, 2"	FOOT	190
SILICONE JOINT SEALER, 1"	FOOT	207

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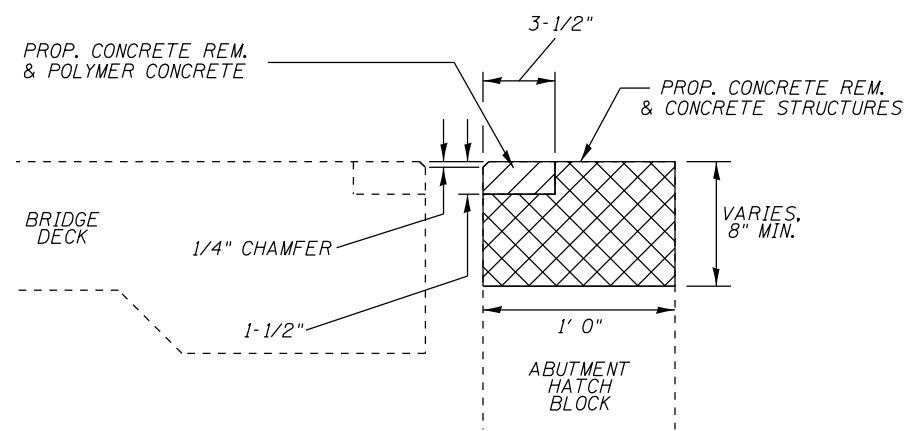
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

JOINT REPAIR PLAN
SN 034-0001
SCALE: SHEET 2 OF 4 SHEETS STA. TO STA.

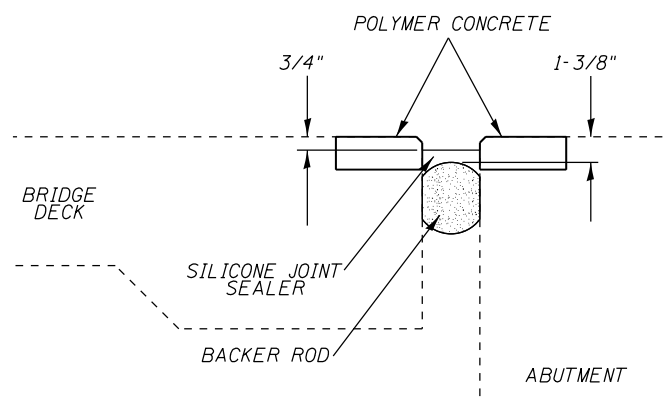
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315	(30) BDR, BJR	HANCOCK	8	6
CONTRACT NO. 72J50				
ILLINOIS FED. AID PROJECT				



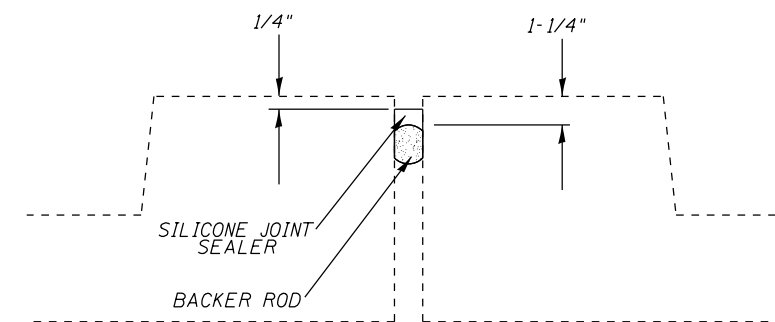
SECTION B-B
PROPOSED POLYMER CONCRETE
CROSS SECTION



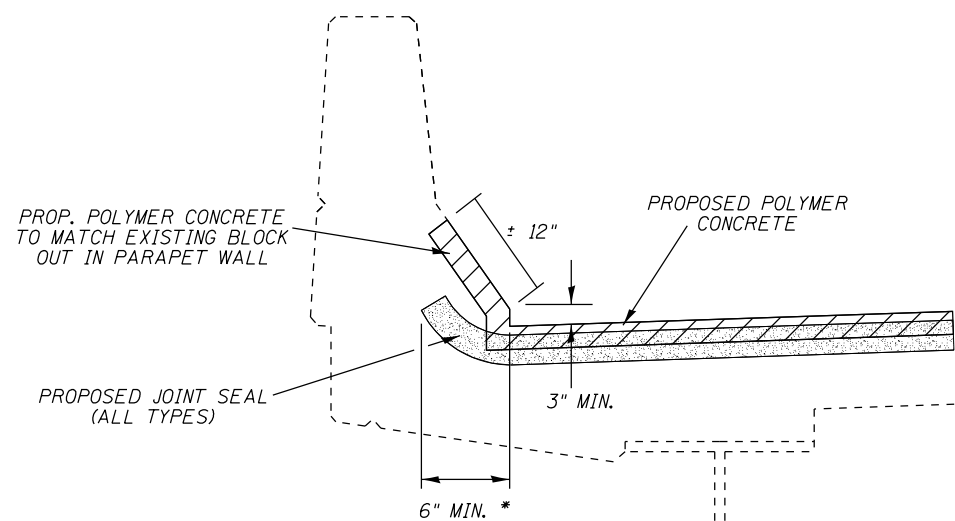
SECTION C-C:
ABUTMENT HATCH BLOCK REPLACEMENT



SECTION A-A:
SILICONE JOINT SEALER DETAIL



SECTION D-D:
LONGITUDINAL JOINT SEAL DETAIL



* EXTEND SEAL TO BACK OF SOUTH PARAPET.

TYPICAL PARAPET CROSS SECTION:
JOINT SEALER END TREATMENT

NOTES:

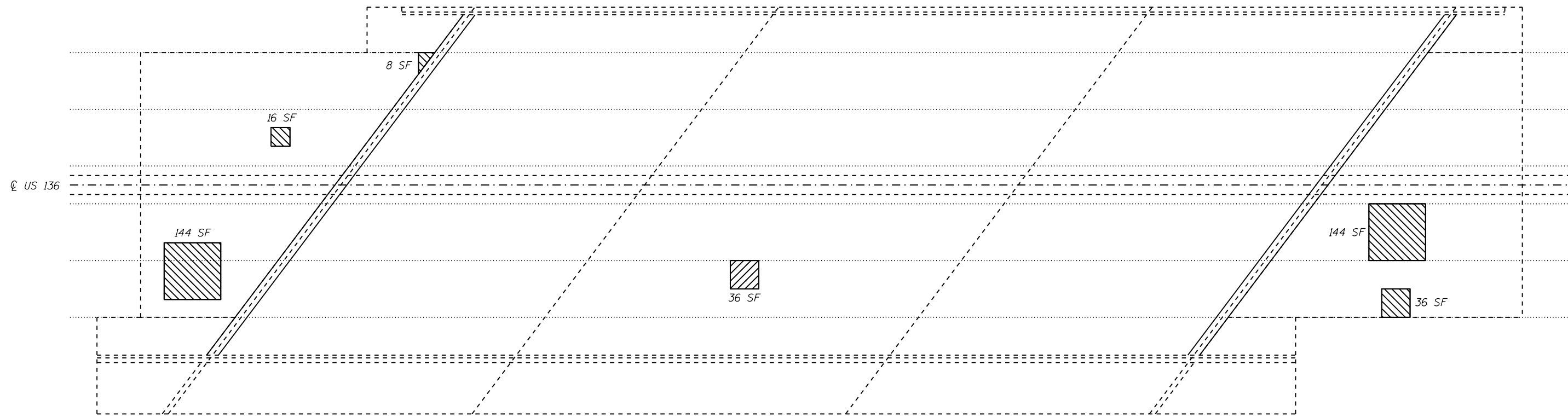
- 1/4" CHAMFER MAY BE ACHIEVED BY GRINDING AFTER POLYMER CONCRETE HAS CURED.
- REMOVAL OF EXISTING NEOPRENE EXPANSION JOINTS SHALL BE INCLUDED IN THE COST OF CONCRETE REMOVAL.
- ANY STEEL ANCHORING STUDS ENCOUNTERED IN THE NEOPRENE JOINT REMOVAL AREA SHALL BE CUT OFF FLUSH WITH THE EXISTING CONCRETE. COST TO BE INCLUDED IN THE BID PRICE FOR CONCRETE REMOVAL.
- 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.
- CONCRETE REMOVAL IN SECTION C-C SHALL BE DEEP ENOUGH TO REMOVE ALL UNSOUND CONCRETE, BUT SHALL NOT BE LESS THAN 8".
- EXISTING REINFORCEMENT IN THE REMOVAL AREA OF SECTION C-C SHALL BE RE-INCORPORATED INTO THE NEW CONCRETE STRUCTURES. IF NO REINFORCEMENT IS ENCOUNTERED, TWO #6 EPOXY COATED HORIZONTAL BARS SHALL BE PROVIDED AND EXTEND THE LENGTH OF THE JOINT. IF EXISTING VERTICAL REINFORCEMENT IS NOT PRESENT OR IF IT IS TOO SHORT TO PROPERLY ORIENT THE HORIZONTAL BARS, THE CONTRACTOR SHALL DRILL AND EPOXY GROUT NEW #6 EPOXY COATED VERTICAL REINFORCEMENT AT 24" CTS PARALLEL TO THE JOINT IN ORDER TO PROVIDE SUPPORT FOR THE PROPOSED HORIZONTAL BARS. THE NECESSARY EMBEDMENT LENGTH INTO EXISTING CONCRETE SHALL BE 9" MINIMUM AND IN ACCORDANCE WITH ARTICLE 584 OF THE STANDARD SPECIFICATIONS. WORK AND MATERIAL DESCRIBED IN THIS NOTE SHALL BE PAID FOR ACCORDING TO ARTICLE 109.04.
- THE CONTRACTOR SHALL NOT PLACE POLYMER CONCRETE ON TOP OF CONCRETE STRUCTURES AREAS UNTIL THEY HAVE CURED SUFFICIENTLY PER THE POLYMER CONCRETE MANUFACTURER'S RECOMMENDATION.

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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

JOINT REPAIR CROSS SECTIONS			
SN 034-0001			
SCALE:	SHEET 3	OF 4 SHEETS	STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
315	(30) BDR, BUR	HANCOCK	8	7
CONTRACT NO. 72J50				
ILLINOIS FED. AID PROJECT				



PATCHING PLAN

- APPROACH SLAB REPAIR (PARTIAL DEPTH)
- DECK SLAB REPAIR (PARTIAL)

NOTES:

- THE PATCH SIZES AND LOCATIONS SHOWN ARE ESTIMATED. THE FINAL PATCH LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.
- PATCHING SURVEY CONDUCTED 8-2016.

PATCHING BILL OF MATERIAL		
ITEM	UNIT	QUANTITY
APPROACH SLAB REPAIR (PARTIAL DEPTH)	SQ. YD.	39
DECK SLAB REPAIR (PARTIAL)	SQ. YD.	4