06-14-2024 LETTING ITEM 029

F.A.P RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	1
	ILLINOIS	CONTRACT NO. 66L10		

INDEX OF SHEETS

SEE SHEET NO. 2 FOR LIST OF HIGHWAY STANDARDS

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

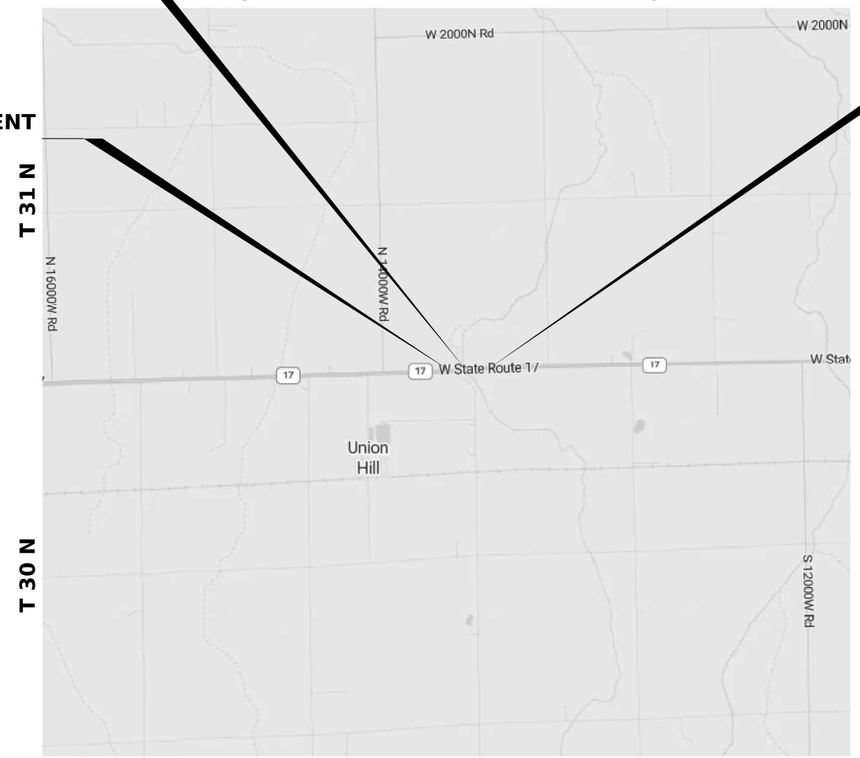
PROPOSED HIGHWAY PLANS

FAP ROUTE 41 (IL 17)
SECTION (13)BR–2
PROJECT STP–W9VF(435)
BRIDGE REPLACEMENT
KANKAKEE COUNTY
C–93–074–23

EXISTING S.N. 046-0031
STA 849+99.00
PROPOSED S.N. 046-0162
STA 849+99.00

BEGIN IMPROVEMENT
STA 846+50.00

END IMPROVEMENT
STA 853+50.00



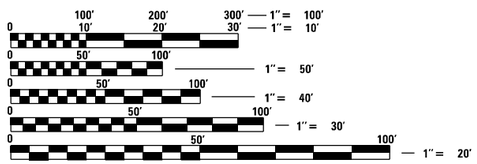
N

N.T.S.

P-93-021-08

LOCATION OF SECTION INDICATED THUS: –

FUNCTIONAL CLASSIFICATION
MINOR ARTERIAL (RURAL)
F.A.P. ROUTE 41 (IL 17)
2023 ADT = 2575
P.V.=82.0% S.U.=6.0% M.U.=12.0%



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

DISTRICT 3 NO. (815) 434–6131
PROJECT ENGINEER – JOSEPH KANNEL, P.E.
UNIT CHIEF – DARCY MITCHELL

CONTRACT NO. 66L10

GROSS LENGTH = 700 FT. = 0.133 MILE
NET LENGTH = 700 FT. = 0.133 MILE

JACOB N. HOWE
062-064387
REGISTERED PROFESSIONAL ENGINEER OF ILLINOIS

SIGNATURE:
DATE SIGNED: 03/25/2024
LICENSE EXPIRATION DATE: 11/30/2025
WIGHT AND COMPANY

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUBMITTED March 26, 20 24
Trista Thompson
for REGIONAL ENGINEER

May 10, 2024
ENGINEER OF DESIGN AND ENVIRONMENT

May 10, 2024
DIRECTOR OF HIGHWAYS PROJECT IMPLEMENTATION

PRINTED BY THE AUTHORITY OF THE STATE OF ILLINOIS

GENERAL NOTES:

(1) THE THICKNESS OF HMA SHOWN ON THE PLANS IS THE NOMINAL THICKNESS. DEVIATIONS FROM THE NOMINAL THICKNESS WILL BE PERMITTED WHEN SUCH DEVIATIONS OCCUR DUE TO IRREGULARITIES IN THE EXISTING SURFACE OR BASE ON WHICH THE HMA IS PLACED.

(2) EXCEPT AS NOTED ON THE PLANS, PAVEMENT GRADES SHOWN ARE AT THE TOP OF THE PAVEMENT SURFACES.

(3) FOR STABILIZATION, ALL TYPE III BARRICADES WILL REQUIRE A MINIMUM OF FOUR SAND BAGS PER BARRICADE.

(4) THE FINISHED EARTHWORK SHALL HAVE A VEGETATION SUSTAINING SOIL COVERING THE TOP FOUR INCHES IN AREAS TO BE SEEDED OR SODDED. THE VEGETATION SUSTAINING SOIL REQUIRED WILL NOT BE PAID FOR SEPARATELY BUT WILL BE INCLUDED IN THE COST OF FURNISHED EXCAVATION.

(5) ALL ELEVATIONS REFERRING TO U.S.G.S. MEAN SEA LEVEL DATUM.

(6) ABANDONED UNDERGROUND UTILITIES THAT CONFLICT WITH CONSTRUCTION SHALL BE DISPOSED OF OUTSIDE THE LIMITS OF THE RIGHT OF WAY ACCORDING TO ARTICLE 202.03 OF THE STANDARD SPECIFICATIONS AND AS DIRECTED BY THE ENGINEER. THIS WORK WILL NOT BE PAID FOR SEPARATELY, BUT WILL BE INCLUDED IN THE COST OF EARTH EXCAVATION.

THE FOLLOWING RATES OF APPLICATION HAVE BEEN USED IN CALCULATING PLAN QUANTITIES:

GRANULAR MATERIALS	2.05	TONS / CU YD
HMA RESURFACING	112	LBS / SQ YD / IN
SHORT TERM PAVEMENT MARKING	10	FT / 100 FT OF APPLICATION

MEMBERS OF JULIE KNOWN TO BE WITHIN THE LIMITS OF THE IMPROVEMENT ARE:
AT&T
COMED
NATURAL GAS PIPELINE CO (KINDER MORGAN)

THE CONTRACTOR SHALL CONTACT J.U.L.I.E. AT LEAST 48 HOURS PRIOR TO EXCAVATION TO DETERMINE WHICH UTILITIES ARE IN THE AREA.

HIGHWAY STANDARDS

000001-08	STANDARD SYMBOLS, ABBREVIATIONS AND PATTERNS
001001-02	AREAS OF REINFORCEMENT BARS
001006	DECIMAL OF AN INCH AND A FOOT
280001-07	TEMPORARY EROSION CONTROL SYSTEMS
420401-13	PAVEMENT CONNECTOR (PCC) FOR BRIDGE APPROACH SLAB
482011-03	HMA SHOULDER STRIPS WITH RESURFACING OR WIDENING & RESURFACING PROJECTS
515001-04	NAME PLATE FOR BRIDGES
542001-06	CONCRETE END SECTIONS FOR PIPE CULVERTS 15"-84" DIAMETER
630001-13	STEEL PLATE BEAM GUARDRAIL
630201-07	PCC-HMA STABILIZATION AT STEEL PLATE BEAM GUARDRAIL
630301-09	SHOULDER WIDENING FOR TYPE I GUARDRAIL TERMINALS
631031-18	TRAFFIC BARRIER TERMINAL, TYPE 6
642006-01	SHOULDER RUMBLE STRIPS 8"
701001-02	OFF-RD OPERATIONS 2L 2W MORE THAN 15FT
701006-05	OFF-RD OPERATIONS 2L 2W 15' TO 24" FROM PAVEMENT EDGE
701011-04	OFF-RD MOVING OPERATIONS 2L 2W DAY ONLY
701201-05	LANE CLOSURE, 2L 2W, DAY ONLY 45MPH OR MORE
701311-03	LANE CLOSURE, 2L, 2W, MOVING OPERATIONS DAY ONLY
701321-18	LANE CLOSURE, 2L, 2W, BRIDGE REPAIR WITH BARRIER
701326-04	LANE CLOSURE, 2L, 2W, PAVEMENT WIDENING 45MPH OR MORE
701901-09	TRAFFIC CONTROL DEVICES
704001-08	TEMPORARY CONCRETE BARRIER
725001-01	OBJECT AND TERMINAL MARKERS
780001-05	TYPICAL PAVEMENT MARKINGS
781001-04	TYPICAL APPLICATIONS RAISED REFLECTIVE PAVEMENT MARKERS
782006-01	GUARDRAIL AND BARRIER WALL REFLECTOR MOUNTING DETAILS

COMMITMENTS:

(1) TREES THREE INCHES OR GREATER IN DIAMETER AT BREAST HEIGHT SHALL NOT BE CLEARED APRIL 1 THROUGH SEPTEMBER 30.

(2) PROTECTIVE FENCING SHALL BE PLACED FROM STATION 851+50 (69' RT) TO STATION 852+31 (37' RT) TO STATION 853+21 (49' RT) TO PROTECT THE WETLAND SITE #1 DURING CONSTRUCTION.

(3) CONSTRUCTION OPERATIONS SHALL NOT EXCEED 125' IN HEIGHT.

HMA MIXTURE REQUIREMENT TABLE					
LOCATIONS:	ENTIRE PROJECT	ENTIRE PROJECT	ENTIRE PROJECT	ENTIRE PROJECT	ENTIRE PROJECT
MIXTURE USE(S):	HMA	HMA	HMA	HMA SHOULDER 8"	HMA SHOULDER 8"
	BINDER	SURFACE	BASE COURSE	BOTTOM LIFT(S)	TOP LIFT
BINDER GRADE (PG):	PG 64-22	PG 64-22	PG 64-22	PG 64-22	PG 64-22
DESIGN AIR VOIDS:	4.0% @ N70	4.0% @ N70	4.0% @ N70	4.0% @ N50	4.0% @ N50
MIXTURE COMPOSITION:	IL 19.0	IL 9.5	IL 19.0	IL 19.0	IL 9.5
(MIXTURE GRADATION)					
FRICTION AGGREGATE:		MIXTURE C			
MIXTURE WEIGHT:	112.0 LB/SY/IN	112.0 LB/SY/IN	112.0 LB/SY/IN	112.0 LB/SY/IN	112.0 LB/SY/IN
QUALITY MANAGEMENT PROGRAM:	QCQA	QCQA	QCQA	QCQA	QCQA
SUBLOT SIZE:	N/A	N/A	N/A	N/A	N/A
DENSITY TEST METHOD:	CORES/NUCLEAR	CORES/NUCLEAR	CORES/NUCLEAR	CORES/NUCLEAR	CORES/NUCLEAR
MATERIAL TRANSFER DEVICE (REQUIRED):	NO	NO	NO	NO	NO

				CONSTRUCTION CODE
CODE NO.	ITEM	UNIT	TOTAL QUANTITY	BRIDGE REPLACEMENT 0010 046-0162 (80% FED / 20% STATE)
20100110	TREE REMOVAL (6 TO 15 UNITS DIAMETER)	UNIT	55	55
20100210	TREE REMOVAL (OVER 15 UNITS DIAMETER)	UNIT	47	47
20101000	TEMPORARY FENCE	FOOT	178	178
20101400	NITROGEN FERTILIZER NUTRIENT	POUND	100	100
20101500	PHOSPHORUS FERTILIZER NUTRIENT	POUND	100	100
20101600	POTASSIUM FERTILIZER NUTRIENT	POUND	100	100
20200100	EARTH EXCAVATION	CU YD	500	500
20400800	FURNISHED EXCAVATION	CU YD	285	285
20800150	TRENCH BACKFILL	CU YD	70	70
25000210	SEEDING, CLASS 2A	ACRE	1.25	1.25
25100630	EROSION CONTROL BLANKET	SQ YD	4470	4470
25100635	HEAVY DUTY EROSION CONTROL BLANKET	SQ YD	800	800
28000250	TEMPORARY EROSION CONTROL SEEDING	POUND	110	110
28000305	TEMPORARY DITCH CHECKS	FOOT	170	170

Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED -	
	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUMMARY OF QUANTITIES

SCALE: NTS | SHEET 1 OF 7 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	3
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

CODE NO.	ITEM	UNIT	TOTAL QUANTITY	CONSTRUCTION CODE BRIDGE REPLACEMENT 0010 046-0162 (80% FED / 20% STATE)
28000400	PERIMETER EROSION BARRIER	FOOT	1710	1710
28000500	INLET AND PIPE PROTECTION	EACH	2	2
28001100	TEMPORARY EROSION CONTROL BLANKET	SQ YD	4470	4470
28001200	TEMPORARY HEAVY DUTY EROSION CONTROL BLANKET	SQ YD	800	800
28100107	STONE RIPRAP, CLASS A4	SQ YD	937	937
28200200	FILTER FABRIC	SQ YD	883	883
40600370	LONGITUDINAL JOINT SEALANT	FOOT	510	510
40600982	HOT-MIX ASPHALT SURFACE REMOVAL - BUTT JOINT	SQ YD	50	50
40600990	TEMPORARY RAMP	SQ YD	246	246
40603085	HOT-MIX ASPHALT BINDER COURSE, IL-19.0, N70	TON	251	251
40604052	HOT-MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N70	TON	141	141
42000080	PAVEMENT CONNECTOR (PCC) FOR BRIDGE APPROACH SLAB	SQ YD	143	143
44000100	PAVEMENT REMOVAL	SQ YD	337	337
44000164	HOT-MIX ASPHALT SURFACE REMOVAL, 3 3/4"	SQ YD	1710	1710

				CONSTRUCTION CODE
CODE NO.	ITEM	UNIT	TOTAL QUANTITY	BRIDGE REPLACEMENT 0010 046-0162 (80% FED / 20% STATE)
44004250	PAVED SHOULDER REMOVAL	SQ YD	455	455
44201670	CLASS D PATCHES, TYPE I, 2 INCH	SQ YD	5	5
44201713	CLASS D PATCHES, TYPE I, 6 INCH	SQ YD	12	12
48102100	AGGREGATE WEDGE SHOULDER, TYPE B	TON	52	52
48203029	HOT-MIX ASPHALT SHOULDERS, 8"	SQ YD	630	630
50100100	REMOVAL OF EXISTING STRUCTURES	EACH	1	1
50105220	PIPE CULVERT REMOVAL	FOOT	100	100
50200100	STRUCTURE EXCAVATION	CU YD	359	359
50300225	CONCRETE STRUCTURES	CU YD	70.7	70.7
50300255	CONCRETE SUPERSTRUCTURE	CU YD	178.6	178.6
50300260	BRIDGE DECK GROOVING	SQ YD	599	599
50300300	PROTECTIVE COAT	SQ YD	751	751
50301350	CONCRETE SUPERSTRUCTURE (APPROACH SLAB)	CU YD	106.9	106.9
50401310	FURNISHING AND ERECTING PRECAST PRESTRESSED CONCRETE BEAMS, IL 36	FOOT	583.5	583.5

Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	SUMMARY OF QUANTITIES	
	DRAWN - TJB	REVISED -			
PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -		SCALE: NTS	SHEET 3 OF 7 SHEETS STA. TO STA.
PLOT DATE = 3/19/2024	DATE -	REVISED -			

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	5
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

				CONSTRUCTION CODE
CODE NO.	ITEM	UNIT	TOTAL QUANTITY	BRIDGE REPLACEMENT 0010 046-0162 (80% FED / 20% STATE)
50800205	REINFORCEMENT BARS, EPOXY COATED	POUND	83050	83050
50800515	BAR SPLICERS	EACH	598	598
51201800	FURNISHING STEEL PILES HP14X73	FOOT	500	500
51202305	DRIVING PILES	FOOT	500	500
51203800	TEST PILE STEEL HP14X73	EACH	2	2
51204650	PILE SHOES	EACH	12	12
51500100	NAME PLATES	EACH	1	1
52200010	TEMPORARY SHEET PILING	SQ FT	561	561
542D1081	PIPE CULVERTS, CLASS D, TYPE 2 36"	FOOT	102	102
54261636	CONCRETE END SECTION, STANDARD 542001, 36", 1:6	EACH	2	2
58600101	GRANULAR BACKFILL FOR STRUCTURES	CU YD	104	104
59100100	GEOCOMPOSITE WALL DRAIN	SQ YD	56	56
60146304	PIPE UNDERDRAINS FOR STRUCTURES 4"	FOOT	141	141
* 63000001	STEEL PLATE BEAM GUARDRAIL, TYPE A, 6 FOOT POSTS	FOOT	63	63

*= SPECIALTY ITEM

Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED -	
	DRAWN - TJB	REVISED -	
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PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUMMARY OF QUANTITIES

SCALE: NTS | SHEET 4 OF 7 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	6
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

REV. 4/10/24

	CODE NO.	ITEM	UNIT	TOTAL QUANTITY	CONSTRUCTION CODE BRIDGE REPLACEMENT 0010 046-0162 (80% FED / 20% STATE)
*	63100085	TRAFFIC BARRIER TERMINAL, TYPE 6	EACH	4	4
*	63100167	TRAFFIC BARRIER TERMINAL, TYPE 1 (SPECIAL) TANGENT	EACH	4	4
	63200310	GUARDRAIL REMOVAL	FOOT	657	657
	64200108	SHOULDER RUMBLE STRIPS, 8 INCH	FOOT	1419	1419
	67000400	ENGINEER'S FIELD OFFICE, TYPE A	CAL MO	12	12
	67100100	MOBILIZATION	L SUM	1	1
	70100405	TRAFFIC CONTROL AND PROTECTION, STANDARD 701321	EACH	1	1
	70100450	TRAFFIC CONTROL AND PROTECTION, STANDARD 701201	L SUM	1	1
	70100500	TRAFFIC CONTROL AND PROTECTION, STANDARD 701326	L SUM	1	1
	70106500	TEMPORARY BRIDGE TRAFFIC SIGNALS	EACH	1	1
	70106700	TEMPORARY RUMBLE STRIPS	EACH	6	6
	70300150	SHORT TERM PAVEMENT MARKING REMOVAL	SQ FT	1630	1630
	70307120	TEMPORARY PAVEMENT MARKING - LINE 4" - TYPE IV TAPE	FOOT	1400	1400
	70307130	TEMPORARY PAVEMENT MARKING - LINE 6" - TYPE IV TAPE	FOOT	700	700

*= SPECIALTY ITEM

Wight

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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUMMARY OF QUANTITIES

SCALE: NTS | SHEET 5 OF 7 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	7
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

REV. 4/10/24

					CONSTRUCTION CODE
	CODE NO.	ITEM	UNIT	TOTAL QUANTITY	BRIDGE REPLACEMENT 0010 046-0162 (80% FED / 20% STATE)
	70400100	TEMPORARY CONCRETE BARRIER	FOOT	462.5	462.5
	70400125	PINNING TEMPORARY CONCRETE BARRIER	EACH	74	74
	70400200	RELOCATE TEMPORARY CONCRETE BARRIER	FOOT	350	350
	70600250	IMPACT ATTENUATORS, TEMPORARY (NON- REDIRECTIVE), TEST LEVEL 3	EACH	2	2
	70600350	IMPACT ATTENUATORS, RELOCATE (NON- REDIRECTIVE), TEST LEVEL 3	EACH	2	2
*	72501000	TERMINAL MARKER - DIRECT APPLIED	EACH	4	4
*	78009004	MODIFIED URETHANE PAVEMENT MARKING - LINE 4"	FOOT	3001	3001
*	78009006	MODIFIED URETHANE PAVEMENT MARKING - LINE 6"	FOOT	360	360
*	78100100	RAISED REFLECTIVE PAVEMENT MARKER	EACH	18	18
*	78200005	GUARDRAIL REFLECTORS, TYPE A	EACH	16	16
*	78200011	BARRIER WALL REFLECTORS, TYPE C	EACH	65	65
	78300200	RAISED REFLECTIVE PAVEMENT MARKER REMOVAL	EACH	18	18
	78300202	PAVEMENT MARKING REMOVAL - WATER BLASTING	SQ FT	270	270
	X5080530	BAR TERMINATOR	EACH	432	432

*= SPECIALTY ITEM

Wight

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PLOT DATE = 3/19/2024	DATE -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUMMARY OF QUANTITIES

SCALE: NTS | SHEET 6 OF 7 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	8
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

REV. 4/10/24

				CONSTRUCTION CODE
CODE NO.	ITEM	UNIT	TOTAL QUANTITY	BRIDGE REPLACEMENT 0010 046-0162 (80% FED / 20% STATE)
X6350204	LINEAR DELINEATOR PANELS, 4 INCH	EACH	6	6
X6350206	LINEAR DELINEATOR PANELS, 6 INCH	EACH	74	74
Z0005216	HOT-MIX ASPHALT STABILIZATION 6" AT STEEL PLATE BEAM GUARD RAIL	SQ YD	170	170
Z0030850	TEMPORARY INFORMATION SIGNING	SQ FT	42	42
Z0062456	TEMPORARY PAVEMENT	SQ YD	108	108

Wight

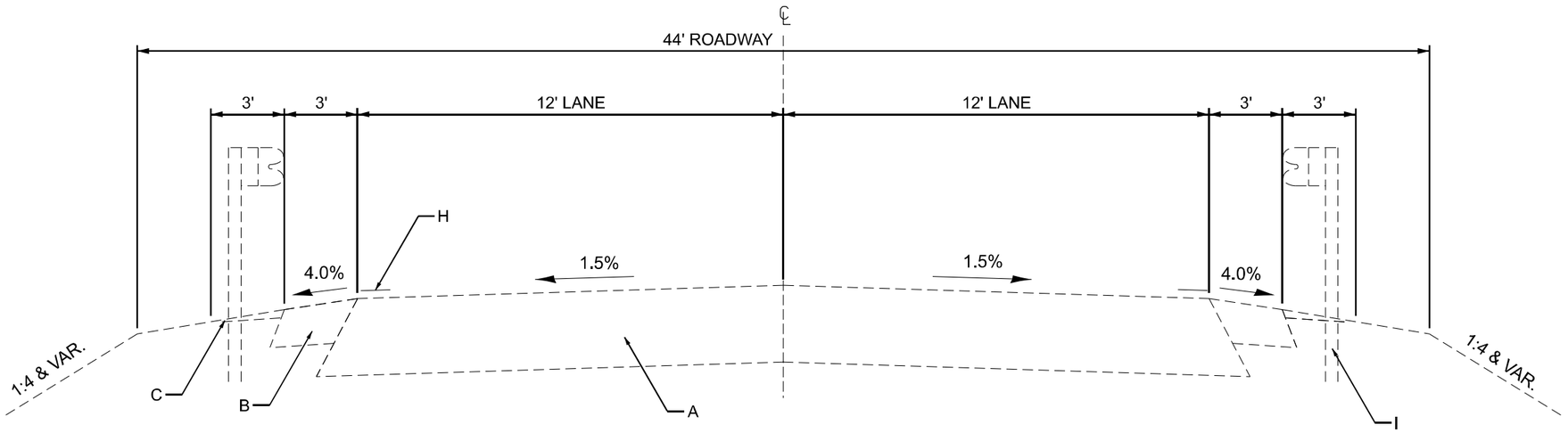
USER NAME = tbarker	DESIGNED -	REVISED -
	DRAWN -	REVISED -
PLOT SCALE = 0.16666633 ' / in.	CHECKED -	REVISED -
PLOT DATE = 3/26/2024	DATE -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUMMARY OF QUANTITIES

SCALE: NTS | SHEET 7 OF 7 SHEETS | STA. | TO STA.

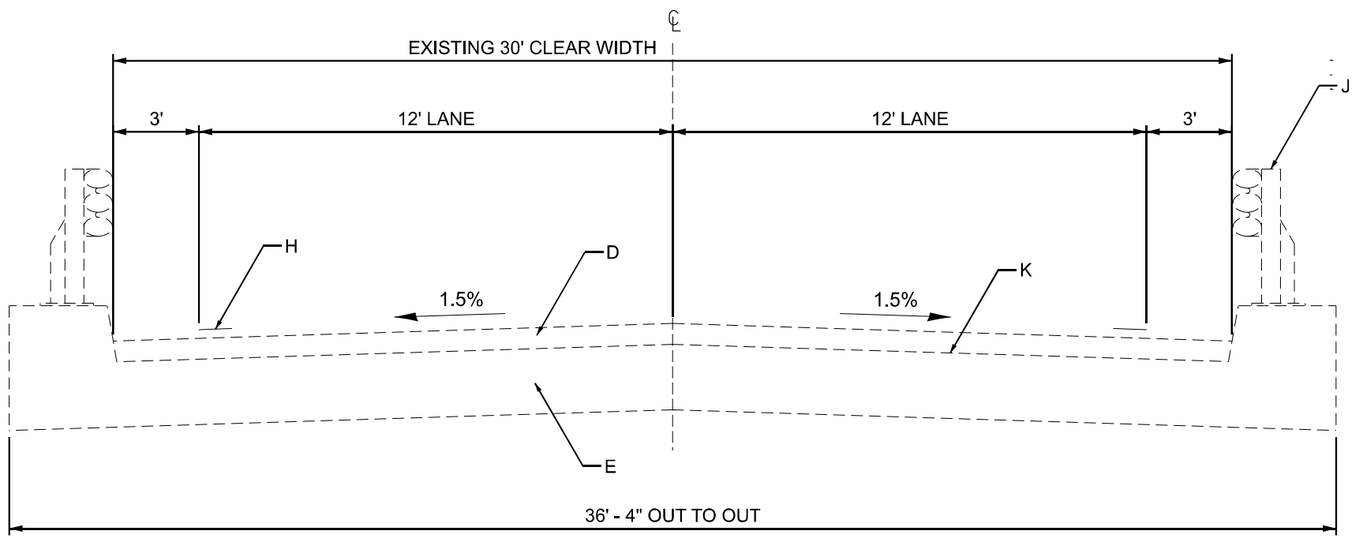
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	9
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			



IL 17 EXIST TYPICAL SECTION

STA. 846+50.00 TO STA. 849+54.09
STA. 850+43.92 TO STA. 853+50.00

LEGEND
A - EXISTING HMA PAVEMENT, 10"
B - EXISTING HMA SHOULDERS W/ RUMBLE STRIPS (TYP.)
C - EXISTING AGGREGATE SHOULDERS (TYP.)
D - EXISTING HMA OVERLAY, 1 1/2"
E - EXISTING BRIDGE SLAB, 12"
F - EXISTING AGGREGATE ROADWAY
G - EXISTING LOW TYPE BITUMINOUS SURFACE - CHIP SEAL
H - EXISTING PAVEMENT MARKING - LINE 4" SOLID WHITE
I - EXISTING GUARDRAIL
J - EXISTING BEAM GUARDRAIL BOLTED TO 9" BRIDGE CURB (TYP.)
K - EXISTING WATERPROOF MEMBRANE
L - EXISTING HMA SHOULDER REMOVAL
M - PROPOSED HMA SURFACE REMOVAL, 3 3/4"
N - PROPOSED HMA SURFACE REMOVAL, 3 3/4" & VARIES
O - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2"
P - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2" & VARIES
Q - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4"
R - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4" & VARIES
S - PROPOSED HMA SHOULDERS, 8"
T - PROPOSED HMA SHOULDERS W/ RUMBLE STRIP, 8" (TYP.)
U - PROPOSED HMA STABILIZATION, 6"
V - PROPOSED AGGREGATE WEDGE SHOULDER, TYPE B
W - LONGITUDINAL JOINT SEALANT
X - MODIFIED URETHANE PAVEMENT MARKING - LINE 4"
Y - SPBGR, TYPE A, 6' POSTS



SN 046-0031 EXIST TYPICAL SECTION

STA. 849+54.09 TO STA. 850+43.92

Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED -	
	DRAWN - TJB	REVISED -	
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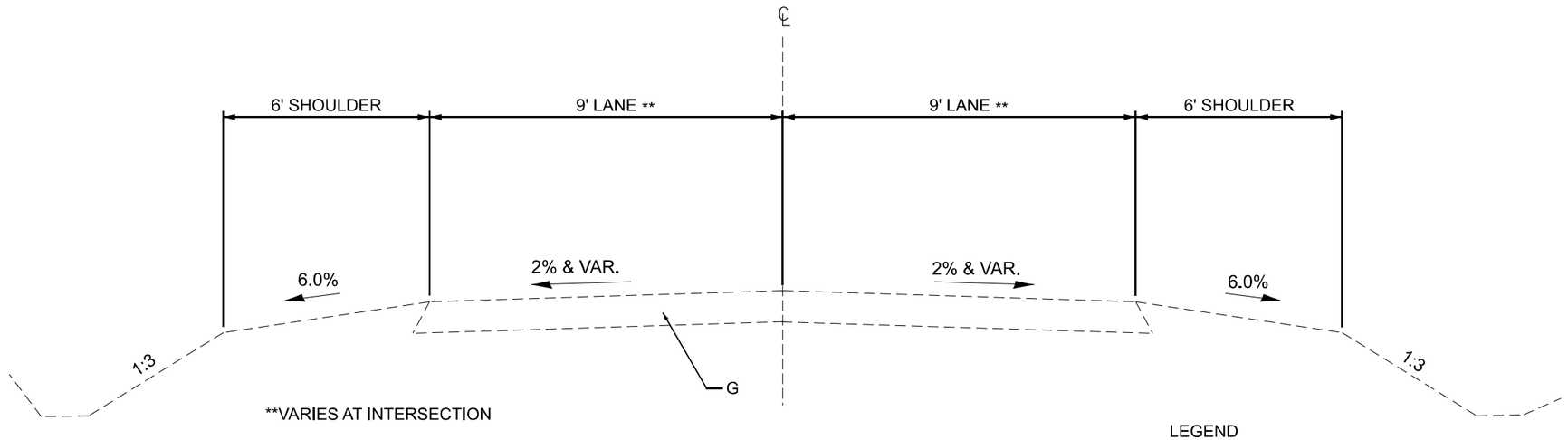
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TYPICAL SECTIONS
IL 17 OVER HORSE CREEK

SCALE: NTS | SHEET 1 OF 4 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	10
		CONTRACT NO. 66L10		
		ILLINOIS	FED. AID PROJECT	



**VARIES AT INTERSECTION

TR 32 (S1400W RD.) EXIST TYPICAL SECTION

STA. 0+00.00 TO STA. 0+91.66

LEGEND
A - EXISTING HMA PAVEMENT, 10"
B - EXISTING HMA SHOULDERS W/ RUMBLE STRIPS (TYP.)
C - EXISTING AGGREGATE SHOULDERS (TYP.)
D - EXISTING HMA OVERLAY, 1 1/2"
E - EXISTING BRIDGE SLAB, 12"
F - EXISTING AGGREGATE ROADWAY
G - EXISTING LOW TYPE BITUMINOUS SURFACE - CHIP SEAL
H - EXISTING PAVEMENT MARKING - LINE 4" SOLID WHITE
I - EXISTING GUARDRAIL
J - EXISTING BEAM GUARDRAIL BOLTED TO 9" BRIDGE CURB (TYP.)
K - EXISTING WATERPROOF MEMBRANE
L - EXISTING HMA SHOULDER REMOVAL
M - PROPOSED HMA SURFACE REMOVAL, 3 3/4"
N - PROPOSED HMA SURFACE REMOVAL, 3 3/4" & VARIES
O - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2"
P - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2" & VARIES
Q - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4"
R - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4" & VARIES
S - PROPOSED HMA SHOULDERS, 8"
T - PROPOSED HMA SHOULDERS W/ RUMBLE STRIP, 8" (TYP.)
U - PROPOSED HMA STABILIZATION, 6"
V - PROPOSED AGGREGATE WEDGE SHOULDER, TYPE B
W - LONGITUDINAL JOINT SEALANT
X - MODIFIED URETHANE PAVEMENT MARKING - LINE 4"
Y - SPBGR, TYPE A, 6' POSTS

Wight

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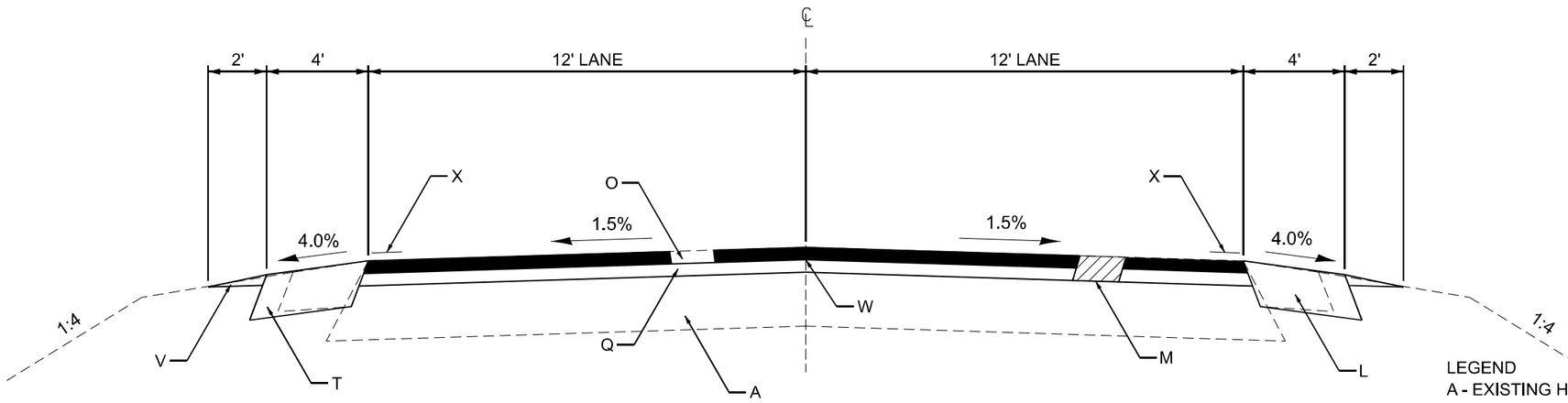
	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TYPICAL SECTIONS
IL 17 OVER HORSE CREEK

SCALE: NTS | SHEET 2 OF 4 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	11
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			



IL 17 PROP TYPICAL SECTION

STA. 846+50.00 TO STA. 848+13.47
STA. 852+34.38 TO STA. 853+50.00

LEGEND
A - EXISTING HMA PAVEMENT, 10"
B - EXISTING HMA SHOULDERS W/ RUMBLE STRIPS (TYP.)
C - EXISTING AGGREGATE SHOULDERS (TYP.)
D - EXISTING HMA OVERLAY, 1 1/2"
E - EXISTING BRIDGE SLAB, 12"
F - EXISTING AGGREGATE ROADWAY
G - EXISTING LOW TYPE BITUMINOUS SURFACE - CHIP SEAL
H - EXISTING PAVEMENT MARKING - LINE 4" SOLID WHITE
I - EXISTING GUARDRAIL
J - EXISTING BEAM GUARDRAIL BOLTED TO 9" BRIDGE CURB (TYP.)
K - EXISTING WATERPROOF MEMBRANE
L - EXISTING HMA SHOULDER REMOVAL
M - PROPOSED HMA SURFACE REMOVAL, 3 3/4"
N - PROPOSED HMA SURFACE REMOVAL, 3 3/4" & VARIES
O - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2"
P - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2" & VARIES
Q - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4"
R - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4" & VARIES
S - PROPOSED HMA SHOULDERS, 8"
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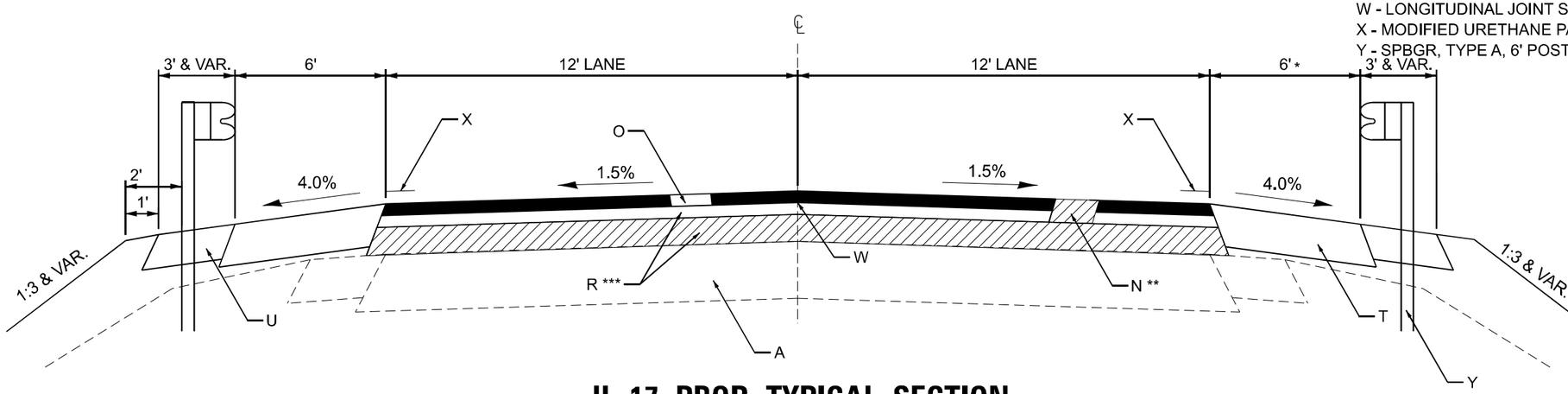

* VARIES TO ACCOMODATE 1:24 GUARDRAIL TAPER FROM APPROACH PARAPET (SW QUAD OF BRIDGE)
** VARIES FROM 3 3/4" TO 1 1/2" FROM STA. 846+50.00 TO STA. 847+84.59 & 1 1/2" FROM STA. 847+84.59 TO STA. 849+04.04 & 1 1/2" FROM STA. 850+93.96 TO STA. 851+37.12 & VARIES FROM 1 1/2" TO 3 3/4" FROM STA. 851+37.12 TO STA. 853+50.00
*** VARIES FROM 2 1/4" TO 10" FROM STA. 847+84.59 TO STA. 849+04.04 & VARIES FROM 4 1/2" TO 2 1/4" FROM STA. 850+93.96 TO STA. 851+37.12

IL 17 PROP TYPICAL SECTION

STA. 848+13.47 TO STA. 849+19.04
STA. 850+78.96 TO STA. 852+34.38

MODEL: Typical Sections - Typical Sections-2 [Sheet]
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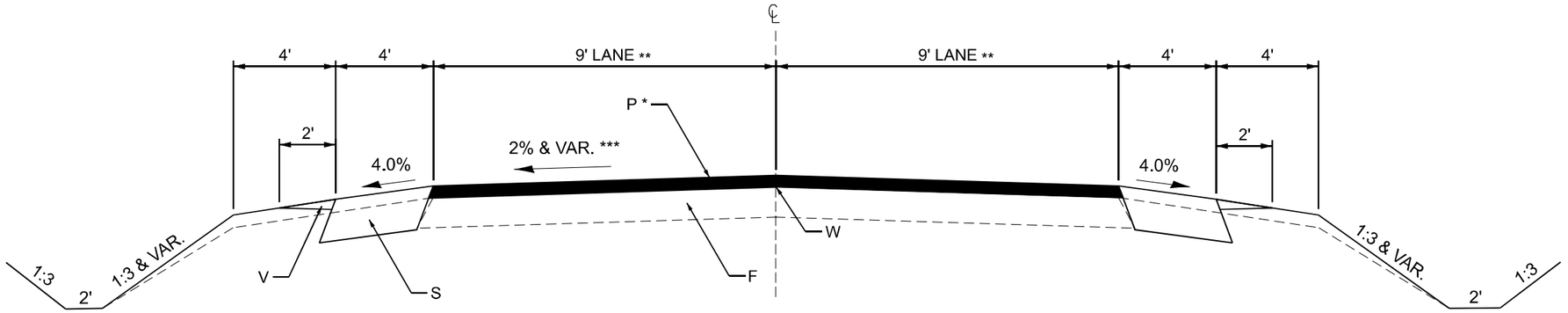
PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TYPICAL SECTIONS
IL 17 OVER HORSE CREEK

SCALE: NTS | SHEET 3 OF 4 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	12
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



* VARIES FROM 2 3/4" TO 1 1/2"
FROM STA. 0.00+00 TO STA. 0+47.62
** VARIES AT INTERSECTION
*** MATCH INTO EXISTING
TRANSITION TO 6% S.E.
AT PROJECT LIMITS

TR 32 (S1400W RD.) PROP TYPICAL SECTION

STA. 0+00.00 TO STA. 0+91.66

LEGEND
A - EXISTING HMA PAVEMENT, 10"
B - EXISTING HMA SHOULDERS W/ RUMBLE STRIPS (TYP.)
C - EXISTING AGGREGATE SHOULDERS (TYP.)
D - EXISTING HMA OVERLAY, 1 1/2"
E - EXISTING BRIDGE SLAB, 12"
F - EXISTING AGGREGATE ROADWAY
G - EXISTING LOW TYPE BITUMINOUS SURFACE - CHIP SEAL
H - EXISTING PAVEMENT MARKING - LINE 4" SOLID WHITE
I - EXISTING GUARDRAIL
J - EXISTING BEAM GUARDRAIL BOLTED TO 9" BRIDGE CURB (TYP.)
K - EXISTING WATERPROOF MEMBRANE
L - EXISTING HMA SHOULDER REMOVAL
M - PROPOSED HMA SURFACE REMOVAL, 3 3/4"
N - PROPOSED HMA SURFACE REMOVAL, 3 3/4" & VARIES
O - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2"
P - PROPOSED HMA SURFACE COURSE, IL-9.5, MIX "C", N70, 1 1/2" & VARIES
Q - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4"
R - PROPOSED HMA BINDER COURSE, IL-19.0, N70, 2 1/4" & VARIES
S - PROPOSED HMA SHOULDERS, 8"
T - PROPOSED HMA SHOULDERS W/ RUMBLE STRIP, 8" (TYP.)
U - PROPOSED HMA STABILIZATION, 6"
V - PROPOSED AGGREGATE WEDGE SHOULDER, TYPE B
W - LONGITUDINAL JOINT SEALANT
X - MODIFIED URETHANE PAVEMENT MARKING - LINE 4"
Y - SPBGR, TYPE A, 6' POSTS

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Wight

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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TYPICAL SECTIONS
IL 17 OVER HORSE CREEK

SCALE: NTS | SHEET 4 OF 4 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	13
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

EARTHWORK

LOCATION		EARTH EXCAVATION		EMBANKMENT VOLUME	EARTHWORK BALANCE WASTE (+) OR SHORTAGE (-)
		EARTH EX	ADJUSTMENT FOR SHRINKAGE		
FROM	TO	CU YD	CU YD	CU YD	CU YD
846+50.00	847+00.00	3.23	2.42	30.52	-28.10
847+00.00	847+50.00	8.93	6.70	160.21	-153.52
847+50.00	848+00.00	11.36	8.52	146.07	-137.55
848+00.00	848+50.00	14.13	10.59	93.53	-82.93
848+50.00	849+00.00	28.91	21.68	99.57	-77.88
849+00.00	849+19.04	15.04	11.28	18.99	-7.71
850+78.96	851+00.00	68.26	51.19	1.39	49.80
851+00.00	851+50.00	157.78	118.33	50.87	67.46
851+50.00	852+00.00	96.15	72.11	51.17	20.94
852+00.00	852+50.00	51.59	38.69	1.42	37.27
852+50.00	853+00.00	27.82	20.87	0.97	19.90
853+00.00	853+50.00	12.75	9.56	0.73	8.83
TOTAL		500	375	660	-285

(1) QUANTITY OF EARTH EXCAVATION IS ADJUSTED FOR A SHRINKAGE FACTOR OF 25%
(2) (-) QUANTITY OF FILL NEEDED, (+) QUANTITY TO WASTE
(3) TOTAL QUANTITIES ROUNDED TO MULTIPLE OF 5

STRUCTURE EXCAVATION = 359 CU YD * 0.75 = 269.25 CU YD

REMOVALS

LOCATION		PAVEMENT REMOVAL	HOT-MIX ASPHALT SURFACE REMOVAL, 3 3/4"	PAVED SHOULDER REMOVAL	REMOVAL OF EXISTING STRUCTURES	PIPE CULVERT REMOVAL
FROM	TO	SQ YD	SQ YD	SQ YD	EACH	FOOT
846+50.00	849+04.04	-	860	-	-	-
849+04.04	850+93.96	337	-	-	-	-
849+19.04	850+78.96	-	-	-	1	-
850+93.96	853+50.00	-	850	-	-	-
846+50.00	853+50.00	-	-	455	-	-
847+49.57	848+48.37	-	-	-	-	100
TOTAL		337	1710	455	1	100

TEMPORARY EROSION CONTROL

LOCATION		EROSION CONTROL BLANKET	HEAVY DUTY EROSION CONTROL BLANKET	TEMPORARY EROSION CONTROL SEEDING	TEMPORARY DITCH CHECKS	PERIMETER EROSION BARRIER	INLET AND PIPE PROTECTION	TEMPORARY EROSION CONTROL BLANKET	TEMPORARY HEAVY DUTY EROSION CONTROL BLANKET
FROM	TO	SQ YD	SQ YD	POUND	FOOT	FOOT	EACH	SQ YD	SQ YD
846+50.00	853+50.00	4470	800	110	170	1710	2	4470	800

WORK ZONE TRAFFIC CONTROL

LOCATION		TEMPORARY CONCRETE BARRIER	RELOCATE TEMPORARY CONCRETE BARRIER	BARRIER WALL REFLECTORS, TYPE C	IMPACT ATTENUATORS TEMPORARY (NON-REDIRECTIVE), TEST LEVEL 3	IMPACT ATTENUATORS RELOCATE (NON-REDIRECTIVE), TEST LEVEL 3	TERMINAL MARKER - DIRECT APPLIED	LINEAR DELINEATOR PANELS, 6 INCH	PINNING TEMPORARY CONCRETE BARRIER	CLASS D PATCHES, TYPE I, 2 INCH	CLASS D PATCHES, TYPE I, 6 INCH
FROM	TO	FOOT	FOOT	EACH	EACH	EACH	EACH	EACH	EACH	SQ YD	SQ YD
847+81.89	852+43.61	462.5	350	65	2	2	4	74	74	5	12

PAVEMENT AND SHOULDERS

LOCATION		LONGITUDINAL JOINT SEALANT	HOT-MIX ASPHALT BINDER COURSE, IL-19.0, N70	HOT-MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "D", N70	HOT-MIX ASPHALT STABILIZATION 6" AT STEEL PLATE BEAM GUARD RAIL	HOT-MIX ASPHALT SHOULDERS, 8"	AGGREGATE WEDGE SHOULDER, TYPE B
FROM	TO	FOOT	TON	TON	SQ YD	SQ YD	SQ YD
846+50.00	849+04.04	254	157	57	-	-	-
849+19.04	850+78.96	-	-	-	-	-	-
850+93.96	853+50.00	256	94	58	-	-	-
848+13.87	852+34.38	-	-	-	170	-	-
846+50.00	853+50.00	-	-	-	-	630	52
0+00.00	0+71.66	-	-	26	-	-	-
TOTAL		510	251	141	170	630	52

PAVEMENT MARKING

LOCATION		MODIFIED URETHANE PAVEMENT MARKING - LINE 4"	MODIFIED URETHANE PAVEMENT MARKING - LINE 6"	TEMPORARY PAVEMENT MARKING - LINE 4" - TYPE IV TAPE	TEMPORARY PAVEMENT MARKING - LINE 6" - TYPE IV TAPE	SHORT TERM PAVEMENT MARKING REMOVAL	RAISED REFLECTIVE PAVEMENT MARKER	RAISED REFLECTIVE PAVEMENT MARKER REMOVAL
FROM	TO	FOOT	FOOT	FOOT	FOOT	SQ FT	EACH	EACH
846+50.00	853+50.00	3001	360	1400	700	1630	18	18

GUARDRAIL

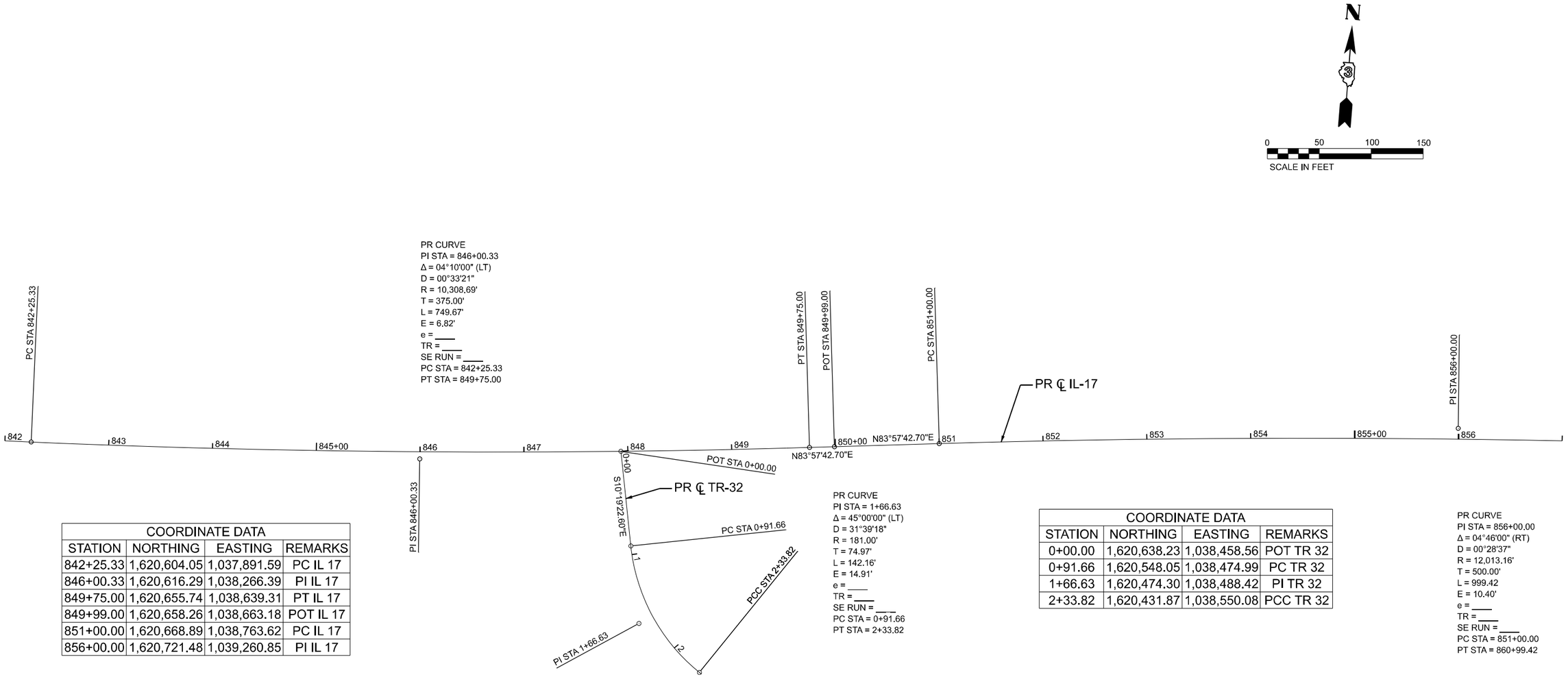
LOCATION				STEEL PLATE BEAM GUARDRAIL, TYPE A 6 FOOT POST	TRAFFIC BARRIER TERMINAL, TYPE 6	TRAFFIC BARRIER TERMINAL, TYPE I TANGENT	GUARDRAIL REMOVAL	TERMINAL MARKER DIRECT APPLIED	GUARDRAIL REFLECTORS, TYPE A	LINEAR DELINEATOR PANELS, 4"
FROM	OFFSET	TO	OFFSET	FOOT	EACH	EACH	FOOT	EACH	EACH	EACH
848+34.64	22.77' RT	848+84.49	20.69' RT	-	-	1	-	1	2	-
848+84.49	20.69' RT	848+96.96	20.17' RT	13	-	-	-	-	-	-
848+96.96	20.17' RT	849+35.18	18.57' RT	-	1	-	-	-	2	-
848+47.14	18.75' LT	848+97.08	18.00' LT	-	-	1	-	1	2	-
848+97.08	18.00' LT	849+34.04	18.00' LT	-	1	-	-	-	2	-
850+63.96	18.00' RT	851+00.86	18.00' RT	-	1	-	-	-	2	-
851+00.86	18.00' RT	851+50.86	18.75' RT	-	-	1	-	1	2	-
850+63.96	18.00' LT	851+01.02	18.00' LT	-	1	-	-	-	2	-
851+01.02	18.00' LT	851+50.86	18.00' LT	50	-	-	-	-	-	-
851+50.86	18.00' LT	852+00.86	18.75' LT	-	-	1	-	1	2	-
848+28.45	21.29 RT	851+54.98	18.46' RT	-	-	-	340	-	-	-
848+53.32	17.46' LT	851+69.37	20.31' LT	-	-	-	317	-	-	6
TOTAL				63	4	4	657	4	16	6

LANDSCAPING

LOCATION		TREE REMOVAL (6 TO 15 UNITS DIAMETER)	TREE REMOVAL (OVER 15 UNITS DIAMETER)	SEEDING, CLASS 2A	NITROGEN FERTILIZER NUTRIENT	PHOSPHORUS FERTILIZER NUTRIENT	POTASSIUM FERTILIZER NUTRIENT	STONE RIPRAP, CLASS A4	FILTER FABRIC
FROM	TO	UNIT	UNIT	ACRE	POUND	POUND	POUND	SQ YD	SQ YD
846+50.00	853+50.00	-	-	1.25	100	100	100	-	-
849+38.49	850+58.96	-	-	-	-	-	-	892	838
850+64.70	851+58.38	55	47	-	-	-	-	-	-
850+75.96	850+81.96	-	-	-	-	-	-	45	45
TOTAL		55	47	1.25	100	100	100	937	883

DRAINAGE

LOCATION		PIPE CULVERT, CLASS D, TYPE 2, 36"	CONCRETE END SECTION, 36", 1:6	UPSTREAM END SECTION			DOWNSTREAM END SECTION		
FROM	TO	FOOT	EACH	STATION	INVERT ELEVATION	OFFSET	STATION	INVERT ELEVATION	OFFSET
847+45.78	848+46.53	102	2	847+45.78	607.75	55.24 RT	848+46.53	607.30	48.76 RT



COORDINATE DATA			
STATION	NORTHING	EASTING	REMARKS
842+25.33	1,620,604.05	1,037,891.59	PC IL 17
846+00.33	1,620,616.29	1,038,266.39	PI IL 17
849+75.00	1,620,655.74	1,038,639.31	PT IL 17
849+99.00	1,620,658.26	1,038,663.18	POT IL 17
851+00.00	1,620,668.89	1,038,763.62	PC IL 17
856+00.00	1,620,721.48	1,039,260.85	PI IL 17

COORDINATE DATA			
STATION	NORTHING	EASTING	REMARKS
0+00.00	1,620,638.23	1,038,458.56	POT TR 32
0+91.66	1,620,548.05	1,038,474.99	PC TR 32
1+66.63	1,620,474.30	1,038,488.42	PI TR 32
2+33.82	1,620,431.87	1,038,550.08	PCC TR 32

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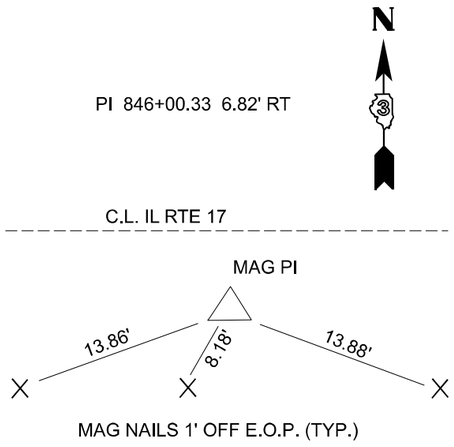
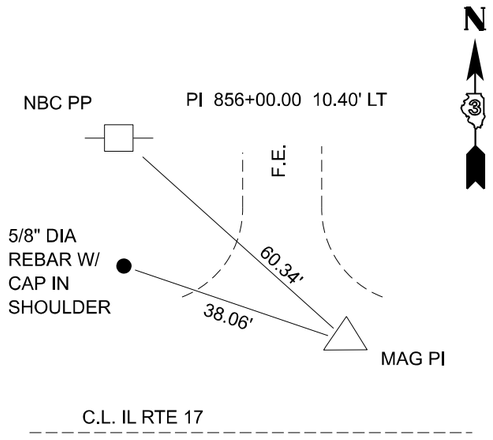
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

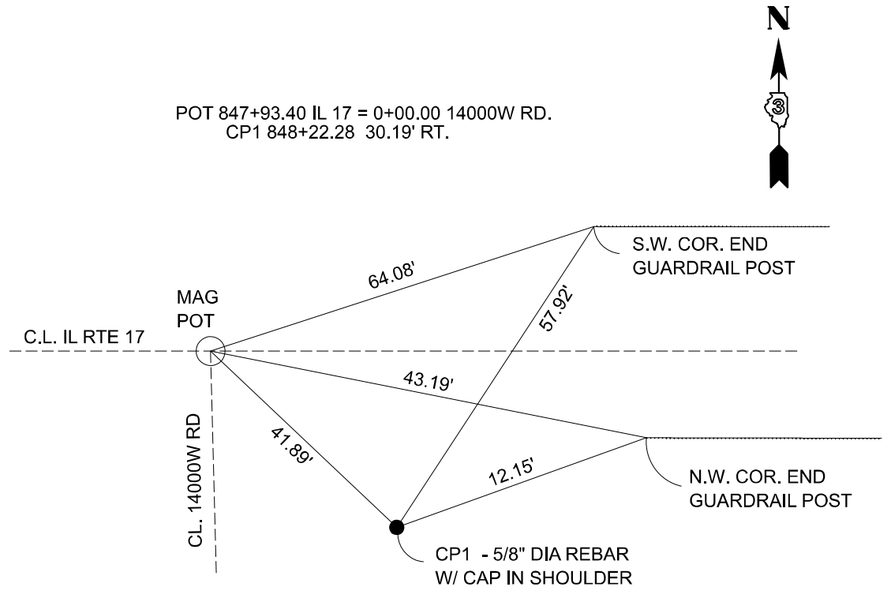
ALIGNMENT, TIES, AND BENCHMARKS

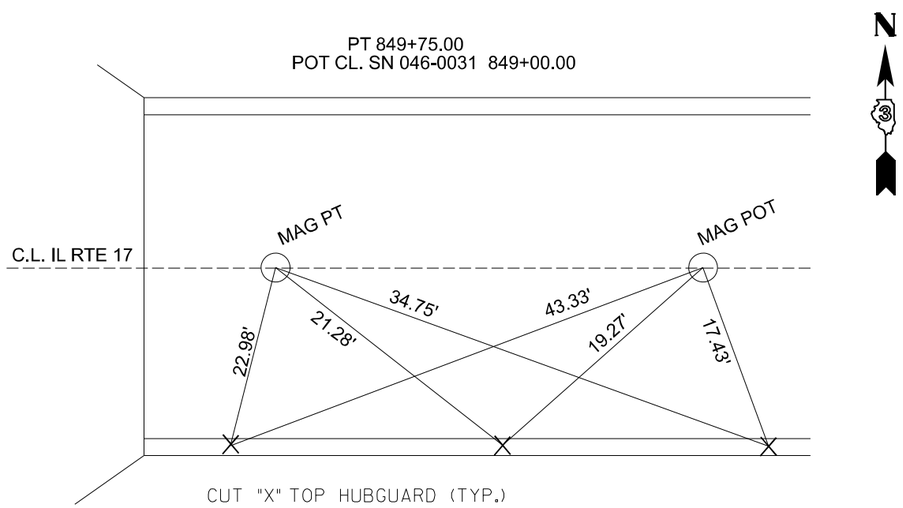
SCALE: 1"=50' | SHEET 1 OF 2 SHEETS | STA. | TO STA.

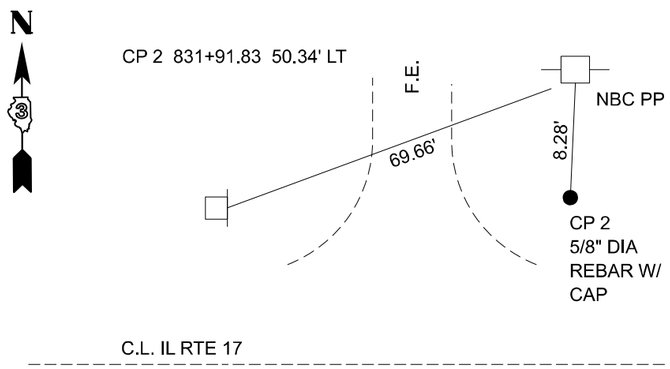
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	15
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			











B.M. 1 CUT "□" TOP OF SW WINGWALL SN 053-0097, STA 950+58.03, 20.25' RT ELEV 713.40

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ALINGMENTS, TIES, AND BENCHMARKS

SCALE: NTS | SHEET 2 OF 2 SHEETS | STA. | TO STA.

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41	(13)BR-2	KANKAKEE	79	16
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

N

0 50' 100'

1" = 30'

EXISTING FIELD ENTRANCE REMOVAL
PAID FOR AS EARTH EXCAVATION

PIPE CULVERT REMOVAL
STA. 850+75.71 TO STA. 851+09.78

REMOVAL OF EXISTING STRUCTURES
REFER TO STRUCTURE PLANS

GUARDRAIL REMOVAL
STA. 848+53.31 TO STA. 851+69.37

BEGIN STA. 846+50.00

END STA. 853+50.00

846 847 848 849 850+00 851 852 853 854

PIPE CULVERT REMOVAL
STA. 847+49.57 TO STA. 848+48.37

STA. 849+04.04

STA. 850+93.96

RETIRED IN PLACE

GUARDRAIL REMOVAL
STA. 848+28.45 TO STA. 851+54.98

RETIRED IN PLACE

STA. 0+71.66

STA. 0+91.66

HOT-MIX ASPHALT SURFACE
REMOVAL - BUTT JOINT

TREE REMOVAL		
STATION	OFFSET	DIAMETER (IN)
850+64.70	53.82	28
851+26.32	51.27	15
851+41.47	51.19	19
851+42.39	53.20	8
851+55.54	54.24	12
851+56.13	53.50	5
851+58.38	53.82	15

REMOVAL OF EXISTING STRUCTURES

HOT-MIX ASPHALT SURFACE REMOVAL, 3 3/4" & VARIES

PAVED SHOULDER REMOVAL

HOT-MIX ASPHALT SURFACE REMOVAL - BUTT JOINT

PAVEMENT REMOVAL

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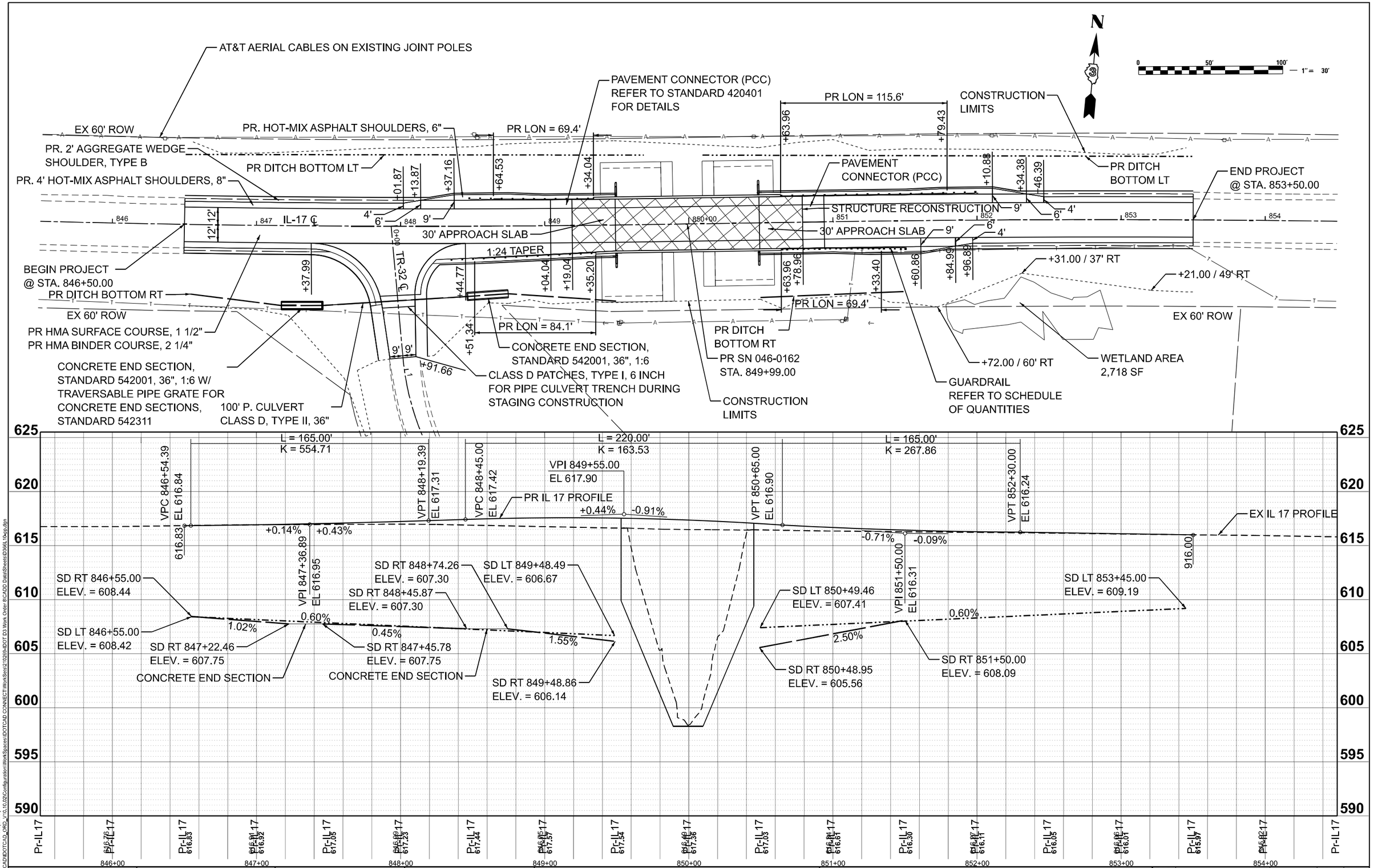
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

REMOVAL PLAN
IL 17 OVER HORSE CREEK

SCALE: 1"=30' | SHEET 1 OF 1 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	17
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		



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PLOT DATE = 3/19/2024	DATE -	REVISED -	

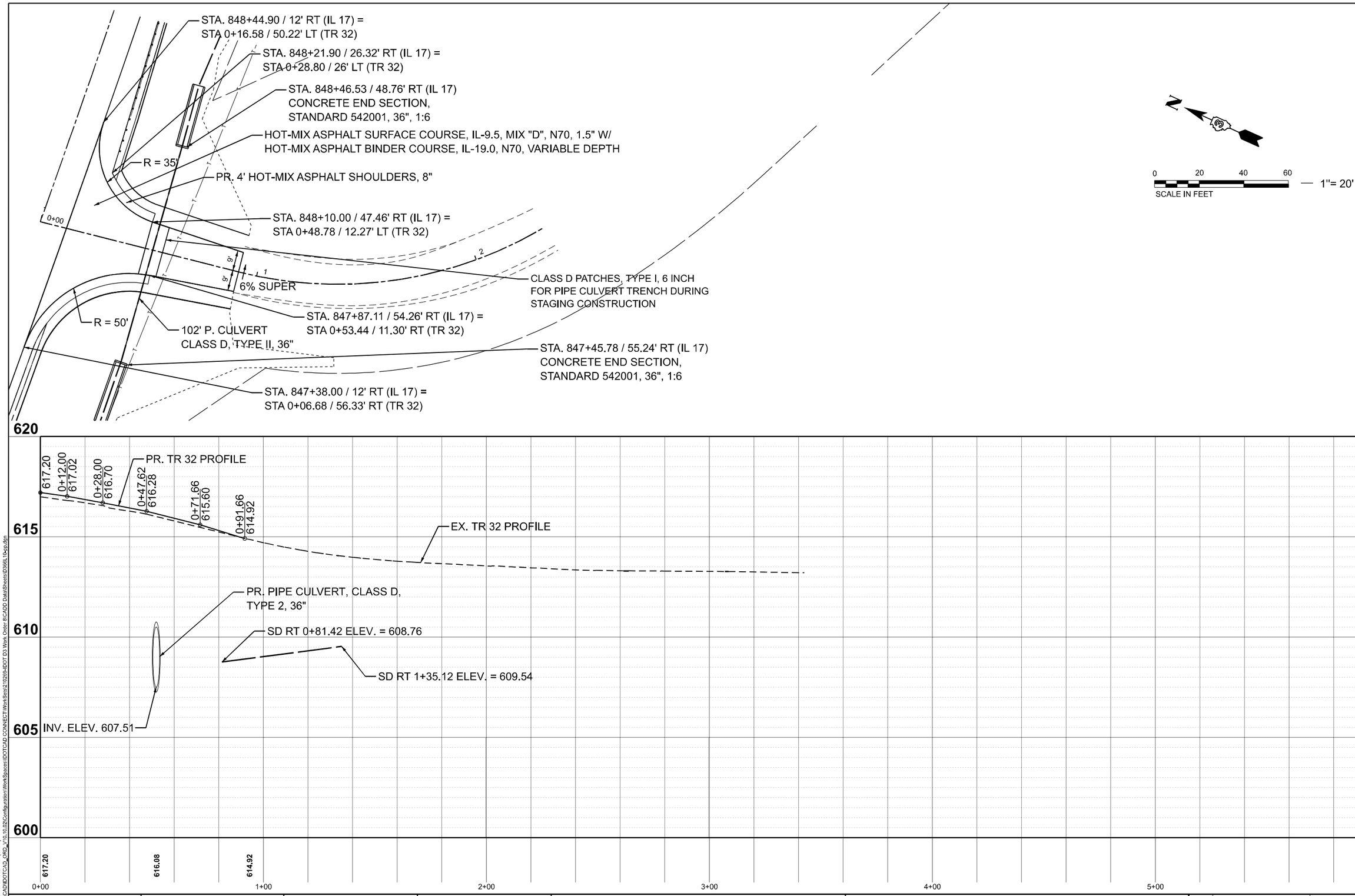
Wight

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

PLAN AND PROFILE
IL 17 OVER HORSE CREEK

SCALE: 1"=30' | SHEET 1 OF 2 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	18
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



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PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED -
PLOT DATE = 3/19/2024	DATE -	REVISED -

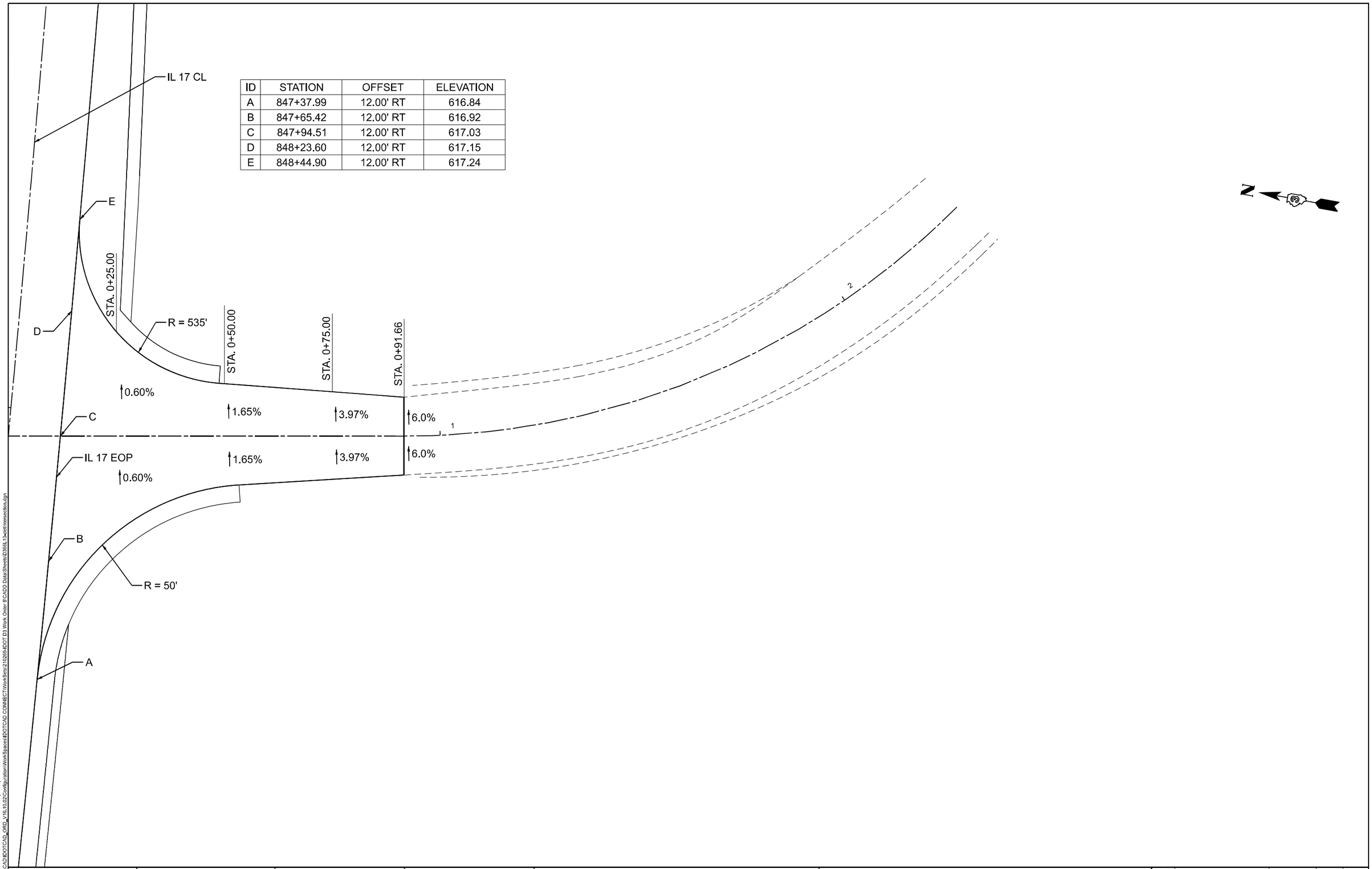
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

PLAN AND PROFILE
S1400W RD. (TR 32)

SCALE: 1"=20' | SHEET 2 OF 2 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	19
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

ID	STATION	OFFSET	ELEVATION
A	847+37.99	12.00' RT	616.84
B	847+65.42	12.00' RT	616.92
C	847+94.51	12.00' RT	617.03
D	848+23.60	12.00' RT	617.15
E	848+44.90	12.00' RT	617.24



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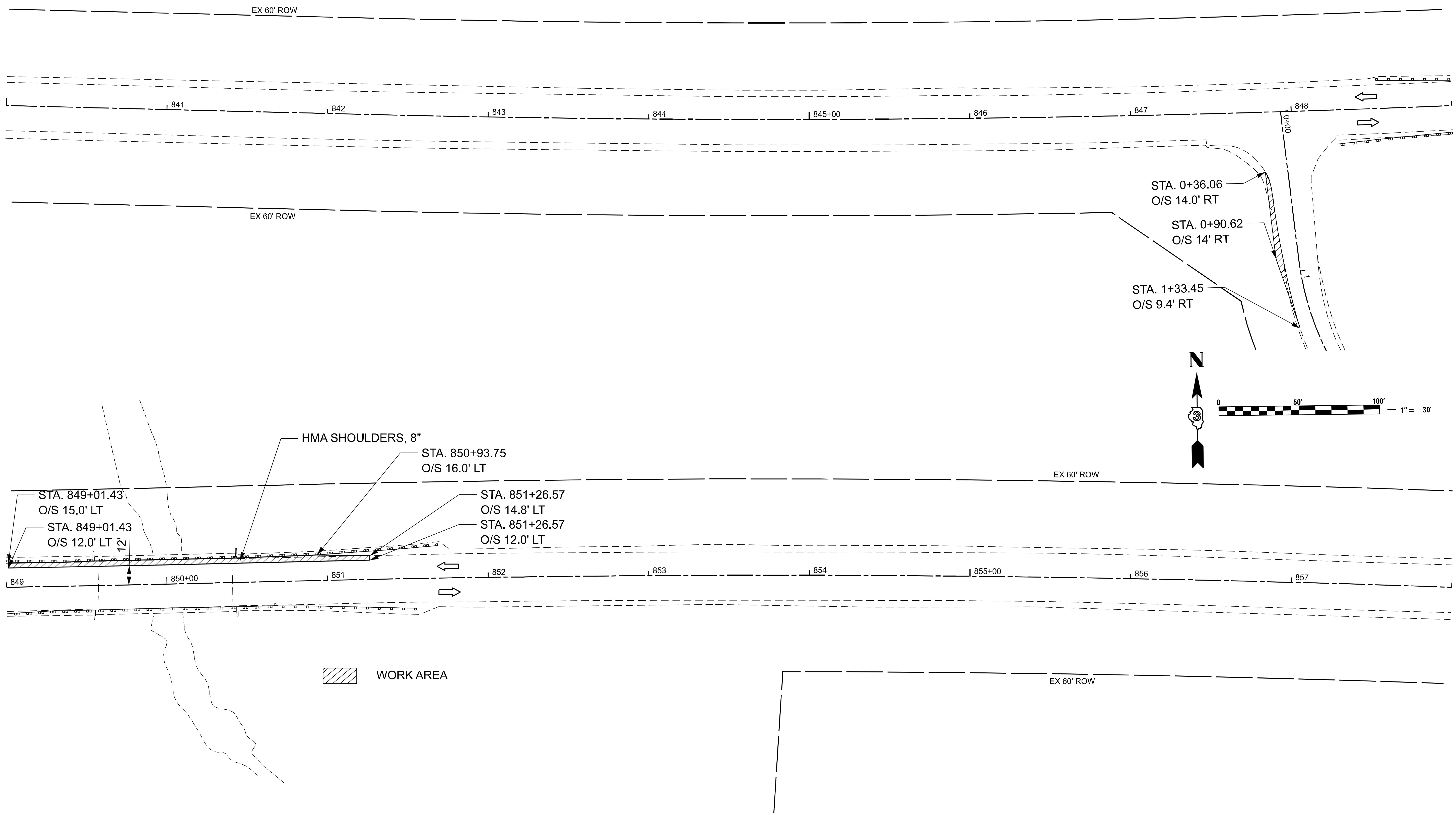
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

INTERSECTION DETAILS
IL 17 & S1400W RD. (TR 32)

SCALE: 1"=10" | SHEET 1 OF 1 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	20
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



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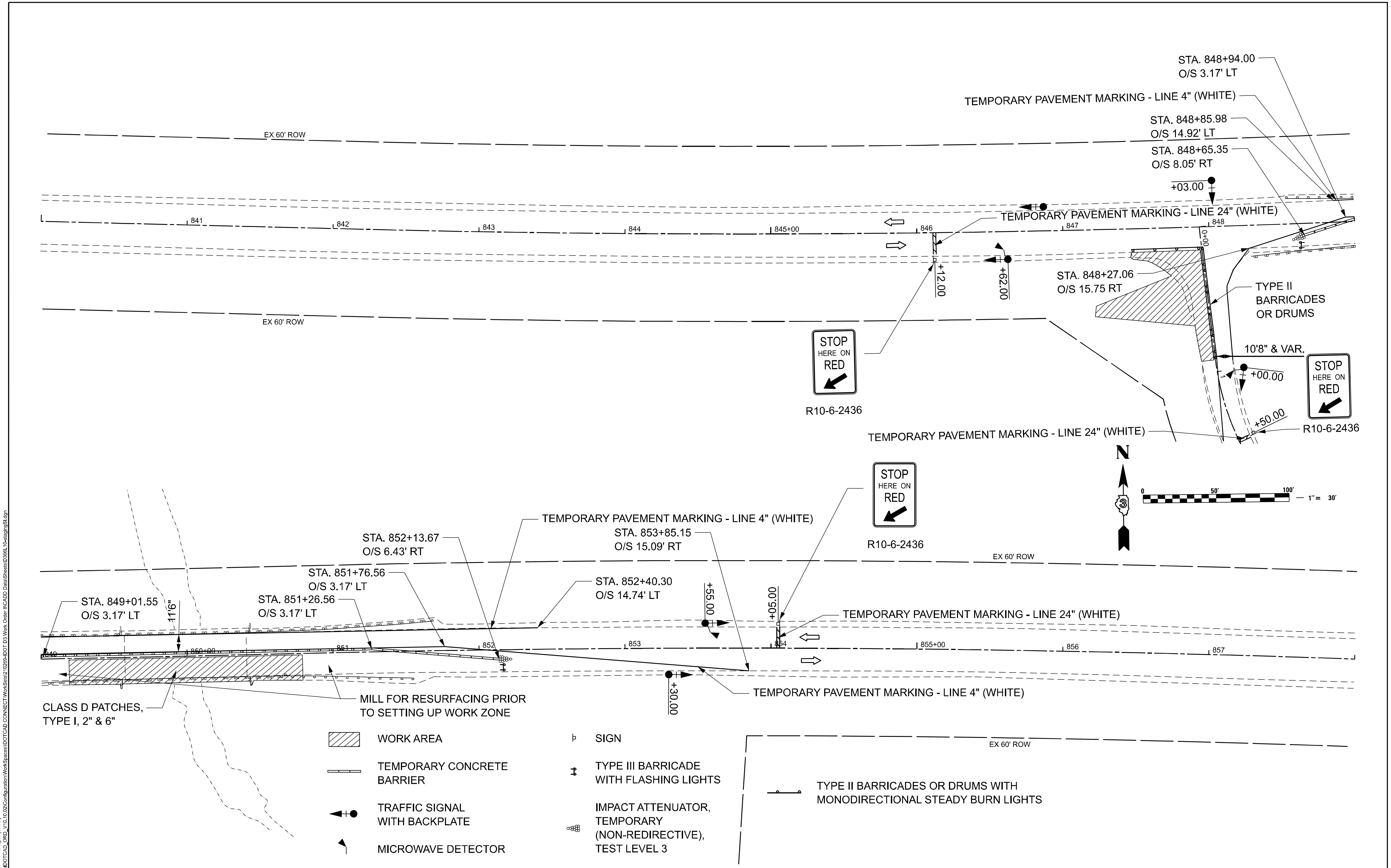
Wight	USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	MAINTENANCE OF TRAFFIC PRE–STAGE I	F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
		DRAWN - TJB	REVISED -			41	(13)BR-2	KANKAKEE	79	21
	PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -			CONTRACT NO. 66L10				
	PLOT DATE = 3/19/2024	DATE -	REVISED -		SCALE: 1"=30' SHEET 1 OF 4 SHEETS STA. TO STA.	ILLINOIS FED. AID PROJECT				



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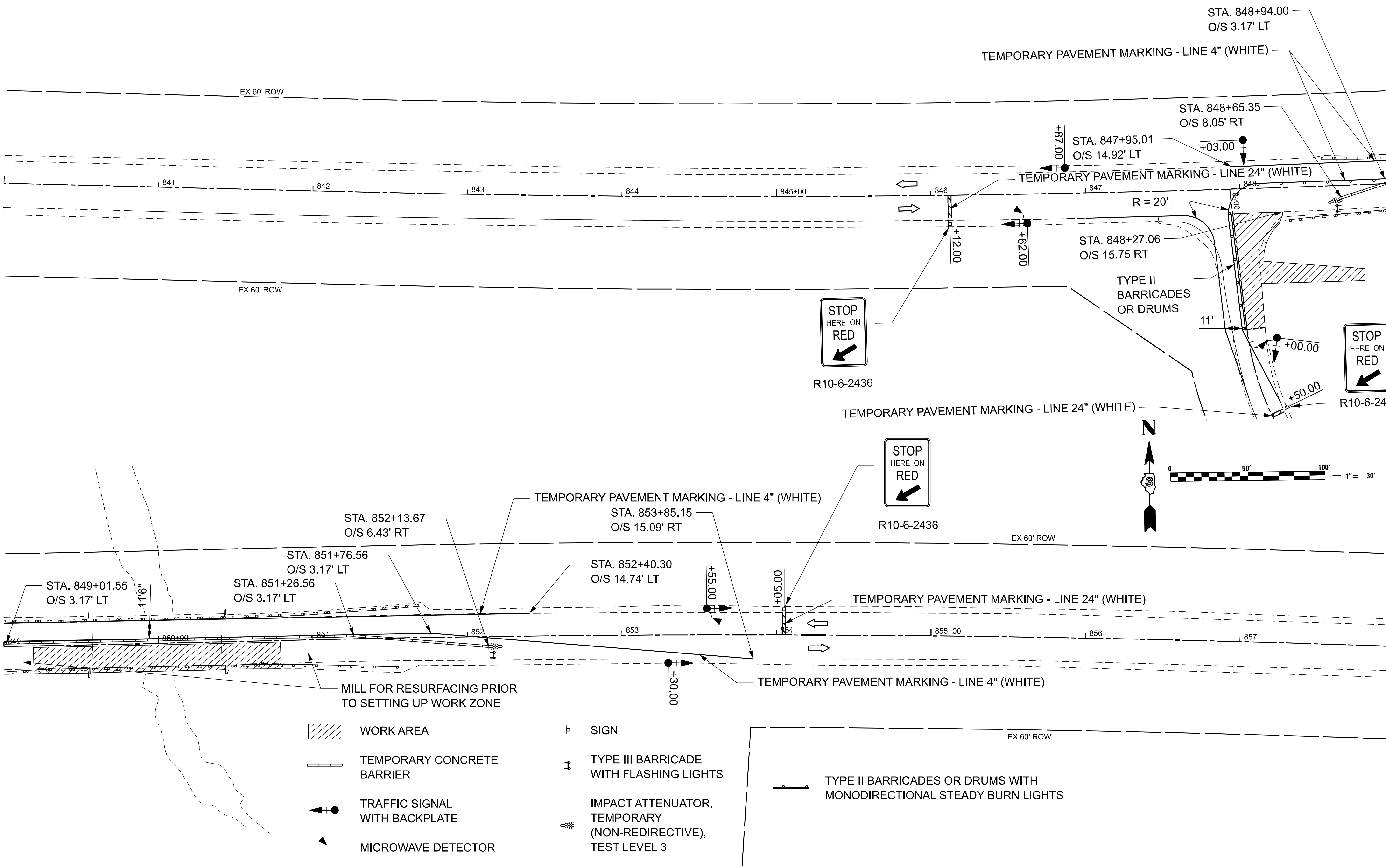
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

MAINTENANCE OF TRAFFIC
STAGE I

SCALE: 1"=30' | SHEET 2 OF 4 SHEETS | STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	22
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



MODEL: MOT Stage IA - MOT Stage IA [Sheet]

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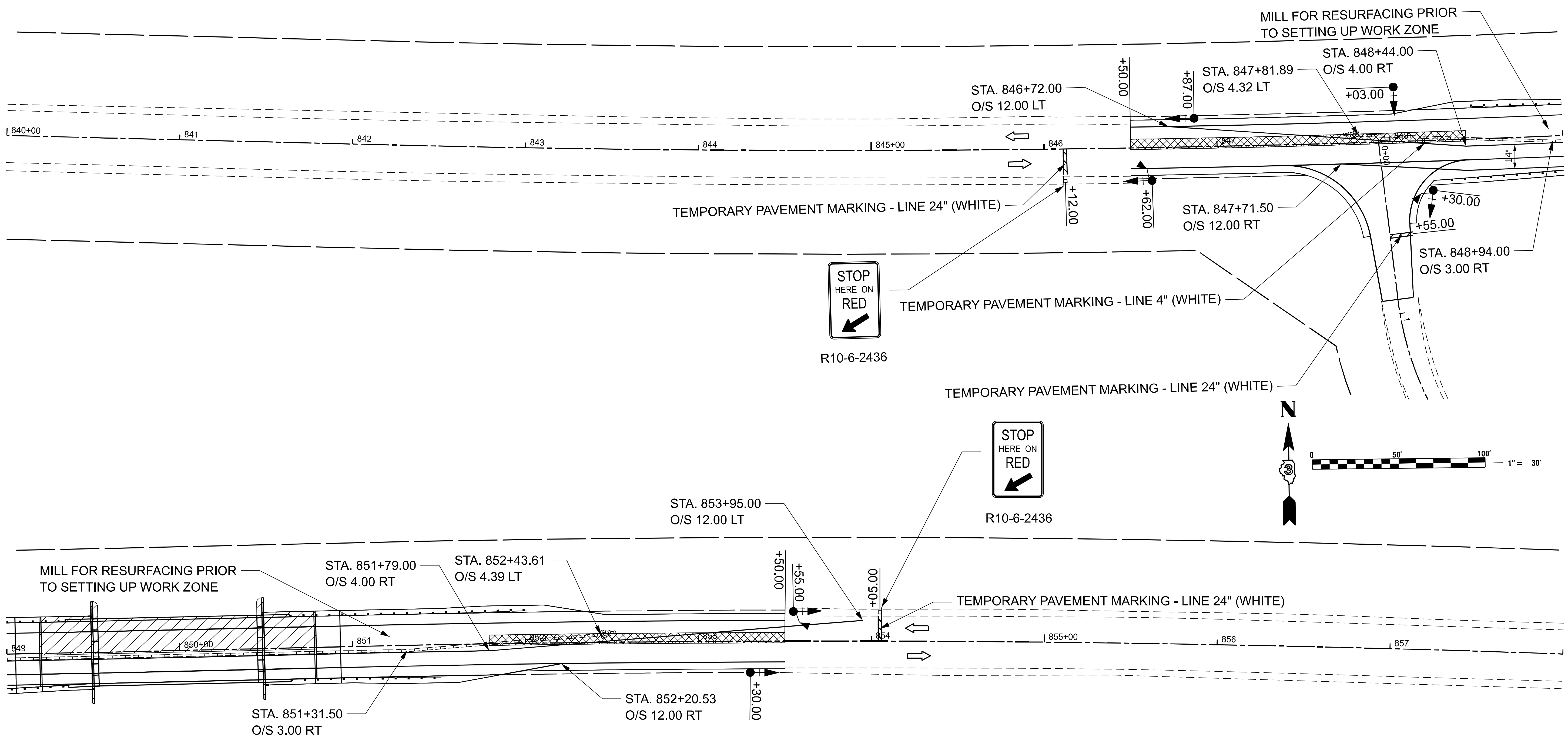
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

MAINTENANCE OF TRAFFIC
STAGE IA

SCALE: 1"=30' SHEET 3 OF 5 SHEETS STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	23
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		



WORK AREA

TEMPORARY CONCRETE BARRIER

TRAFFIC SIGNAL WITH BACKPLATE

MICROWAVE DETECTOR

SIGN

TYPE III BARRICADE WITH FLASHING LIGHTS

IMPACT ATTENUATOR, TEMPORARY (NON-REDIRECTIVE), TEST LEVEL 3

TEMPORARY RAMP

MODEL: MOT Stage II - MOT Stage II [Sheet]

Wight

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	DRAWN - TJB	REVISED -	
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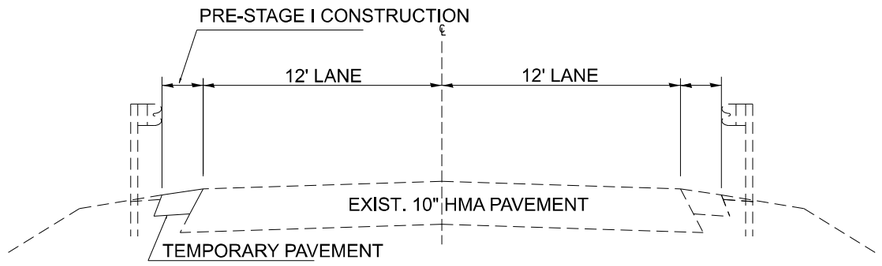
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

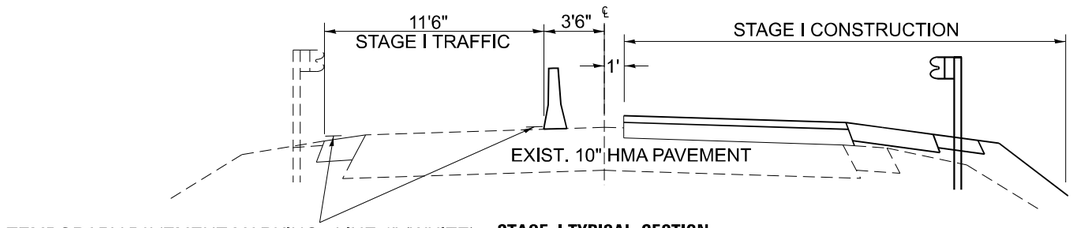
MAINTENANCE OF TRAFFIC
STAGE II

SCALE: 1"=30' | SHEET 3 OF 4 SHEETS | STA. TO STA.

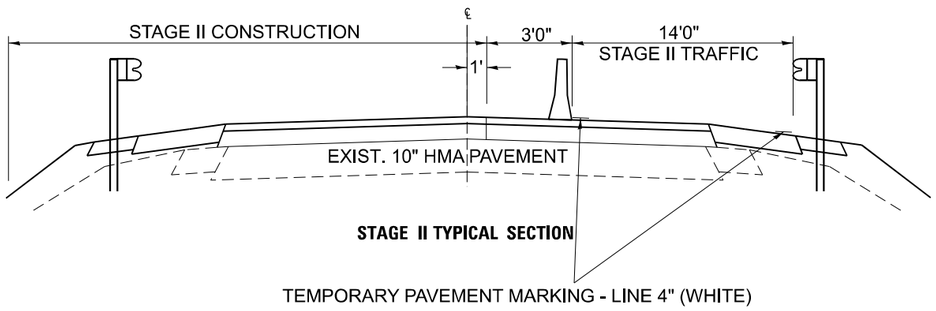
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	24
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		



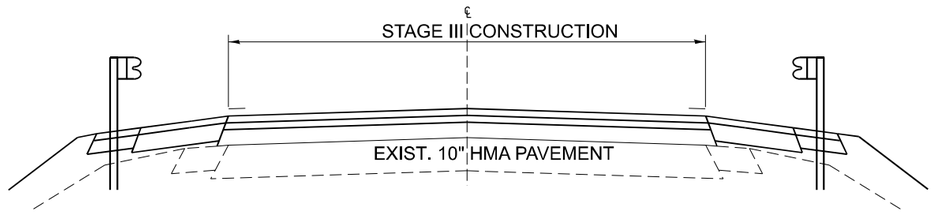
PRE–STAGE I TYPICAL SECTION



STAGE I TYPICAL SECTION



STAGE II TYPICAL SECTION



STAGE III TYPICAL SECTION

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PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

MAINTENANCE OF TRAFFIC
DETAILS

SCALE: NTS | SHEET 4 OF 4 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	25
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

N

0 50' 100' — 1" = 30'

100' SPACING FOR DITCH CHECKS

EX 60' ROW

850+75.96

850+81.96

EX 60' ROW

846 847 848 849 850+00 851 852 853 854

0+00

EX 60' ROW

+21.00 / 49' RT

+31.00 / 37' RT

EX 60' ROW

+72.00 / 60' RT

ORANGE FENCE FOR WETLAND PROTECTION

EX. WETLAND

SILT FENCE FOR WETLAND PROTECTION

INLET AND PIPE PROTECTION

1

1

2

NOTE:
STONE RIPRAP AND FILTER FABRIC TO BE INSTALLED AT THE CONCLUSION OF STAGE I AND STAGE II CONSTRUCTION. RIPRAP TO REMAIN IN PLACE.

TEMPORARY EROSION CONTROL BLANKET & TEMPORARY EROSION CONTROL SEEDING

TEMPORARY HEAVY DUTY EROSION CONTROL BLANKET & TEMPORARY EROSION CONTROL SEEDING

STONE RIPRAP, CLASS A4 & FILTER FABRIC

PERIMETER EROSION BARRIER

TEMPORARY FENCE

TEMPORARY DITCH CHECKS

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PLOT DATE = 3/19/2024	DATE -	REVISED -	

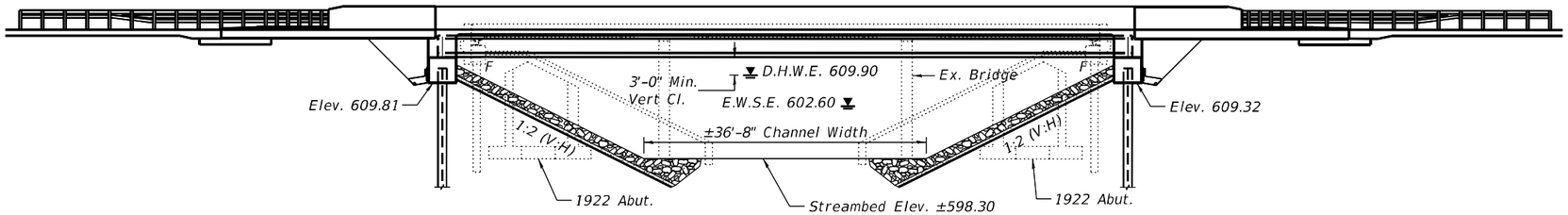
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EROSION CONTROL
IL 17 OVER HORSE CREEK

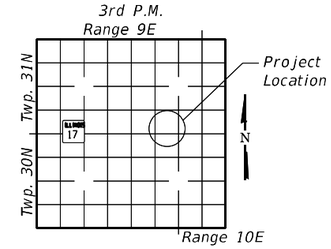
SCALE: 1"=30' | SHEET 1 OF 1 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	26
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

Exhibit



ELEVATION



LOCATION SKETCH

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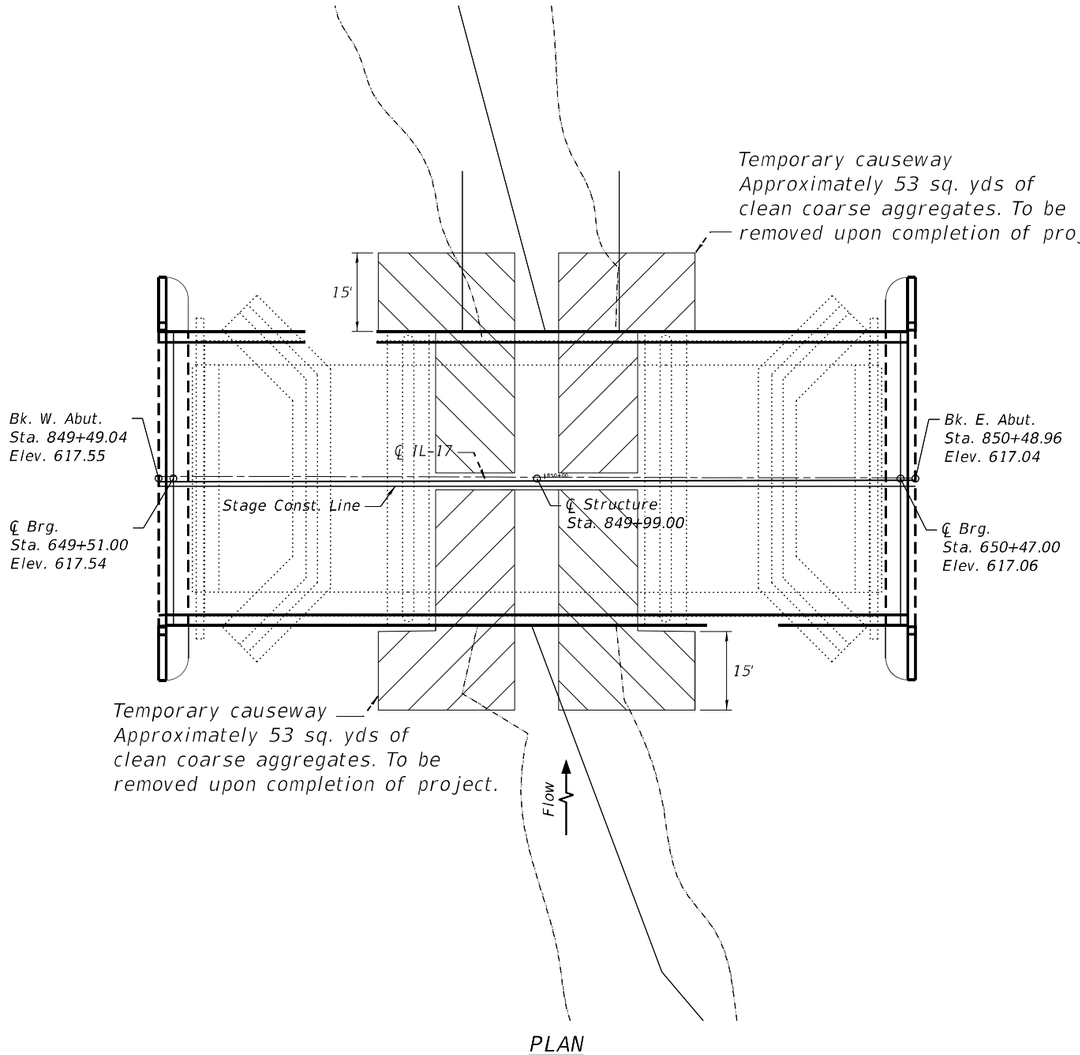

PLAN

Not to Scale

GENERAL PLAN AND ELEVATION
IL ROUTE 17 OVER HORSE CREEK
FAP ROUTE 41 - SECTION (13)BR-2
KANKAKEE COUNTY
STATION 849+99.00
EXISTING STRUCTURE NUMBER 046-0031
PROPOSED STRUCTURE NUMBER 046-0162

USER NAME =	DESIGNED -	REVISED -
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PLOT SCALE =	DRAWN -	REVISED -
PLOT DATE =	CHECKED -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

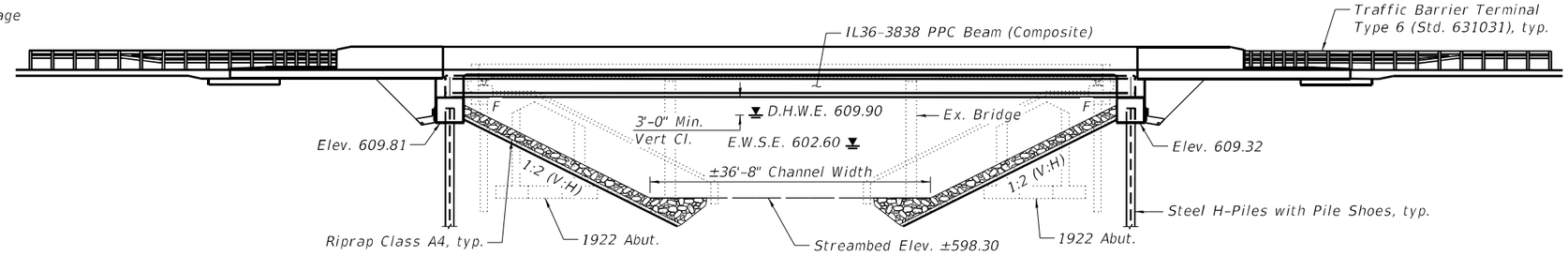
CAUSEWAY / WORKPAD DRAWING

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	27
		CONTRACT NO. 66L10		
		ILLINOIS	FED. AID PROJECT	

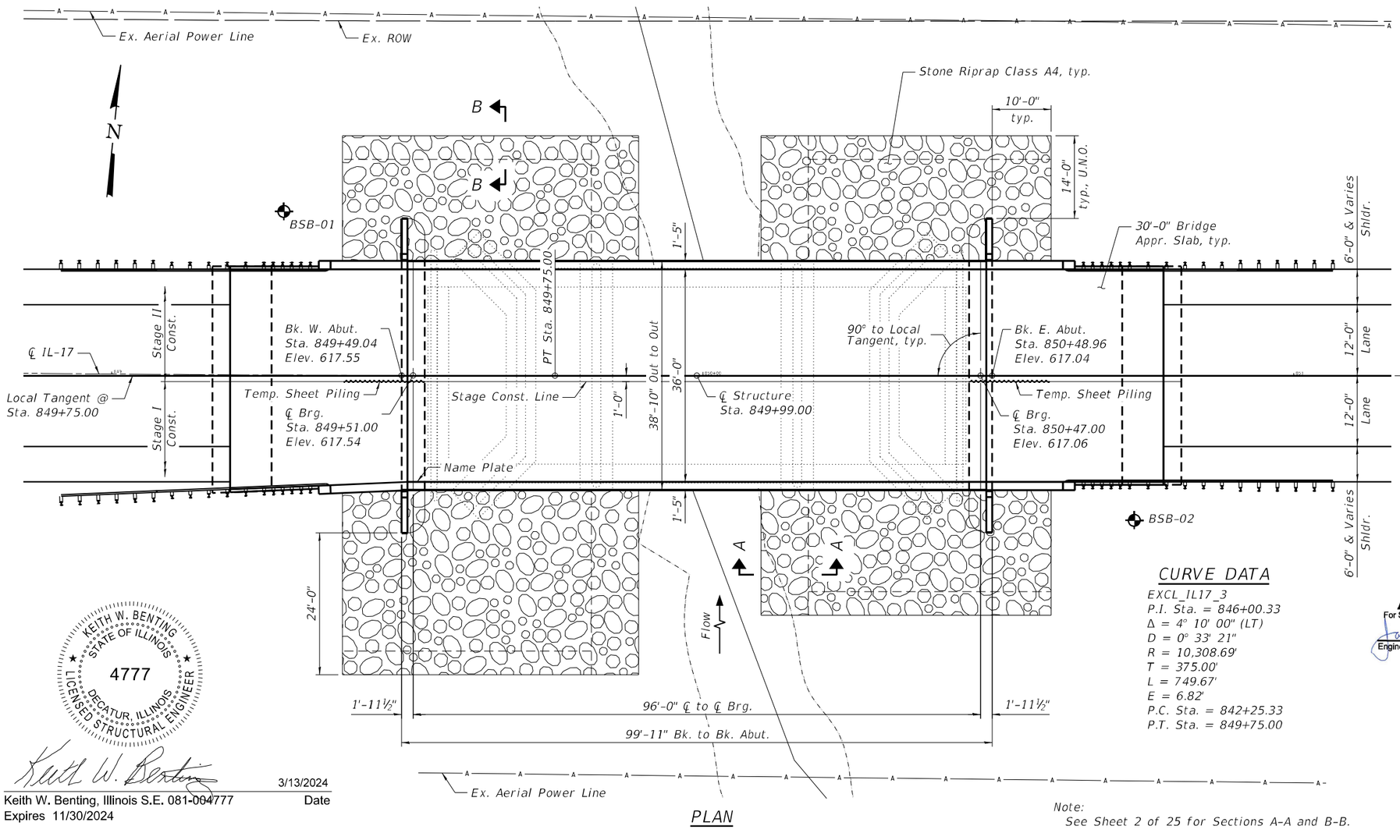
Bench Mark: Benchmark: Cut '□' on SW Wing of SN 046-0031. Sta. 849+54.98, Offset 19.23' Rt., Elev. 617.04.

Existing Structure: SN 046-0031 Built in 1959 as S.B.I. Route 17, Section 13-BR at Sta. 849+99. Existing structure consists of 3-Span continuous cast in place reinforced concrete slab superstructure and supported by stub concrete abutments and solid wall concrete piers. Structure is 90'-0" long Bk. to Bk. abutments and 36'-4" Out to Out deck. Structure to be removed and replaced. Traffic to be maintained utilizing stage construction.

No Salvage



ELEVATION



PLAN

CURVE DATA

EXCL_IL17_3
P.I. Sta. = 846+00.33
Δ = 4° 10' 00" (LT)
D = 0° 33' 21"
R = 10,308.69'
T = 375.00'
L = 749.67'
E = 6.82'
P.C. Sta. = 842+25.33
P.T. Sta. = 849+75.00

Note:
See Sheet 2 of 25 for Sections A-A and B-B.

INDEX OF SHEETS

LOADING HL-93

Allow 50#/sq. ft. for future wearing surface.

DESIGN SPECIFICATIONS

2020 AASHTO LRFD Bridge Design Specifications, 9th Edition

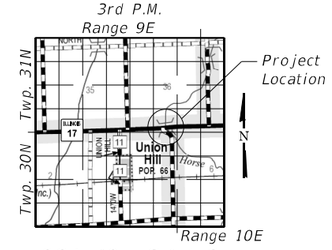
DESIGN STRESSES

FIELD UNITS

f'c = 4,000 psi (Superstructure)
f'c = 3,500 psi (Substructure)
fy = 60,000 psi (Reinforcement)
fy = 50,000 psi (M270 Grade 50)

PRECAST PRESTRESSED UNITS

f'c = 8,500 psi
f'ci = 6,500 psi
fpu = 270,000 psi (0.6"Ø low lax. strands)
fpbt = 202,300 psi (0.6"Ø low lax. strands)



LOCATION SKETCH

APPROVED
For Structural Adequacy Only
Engineer of Bridges & Structures

KEITH W. BENTING
STATE OF ILLINOIS
4777
DECATUR, ILLINOIS
LICENSED STRUCTURAL ENGINEER

3/13/2024
Keith W. Benting, Illinois S.E. 081-004777 Date
Expires 11/30/2024

GENERAL PLAN AND ELEVATION
IL ROUTE 17 OVER HORSE CREEK
FAP ROUTE 41 - SECTION (13)BR-2
KANKAKEE COUNTY
STATION 849+99.00
STRUCTURE NUMBER 046-0162

QUIGG ENGINEERING INC	USER NAME = cstokes	DESIGNED - CFS	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION
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	PLOT SCALE =	DRAWN - CFS	REVISED -	SHEET 1 OF 25 SHEETS
	PLOT DATE =	CHECKED - MDC	REVISED -	

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	28
		CONTRACT NO. 66L10		
		ILLINOIS	FED. AID PROJECT	

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3/13/2024 3:05:18 PM

GENERAL NOTES

Reinforcement bars designated (E) shall be epoxy coated.

If the Contractor chooses to alter the temporary cantilevered sheet piling design requirements shown on the plans, a design submittal including plan details and calculations will be required for review and acceptance by the Engineer.

Layout of the slope protection system may be varied to suit ground conditions in the field as directed by the Engineer.

A pay item has been added to the Roadway Plans for "Class D Patches, Type I, 2 Inch" to be used at the discretion of the Engineer to maintain the existing deck riding surface during Stage I traffic. See Roadway Plans.

WATERWAY INFORMATION

Drainage Area = 26.7 sq. mi.

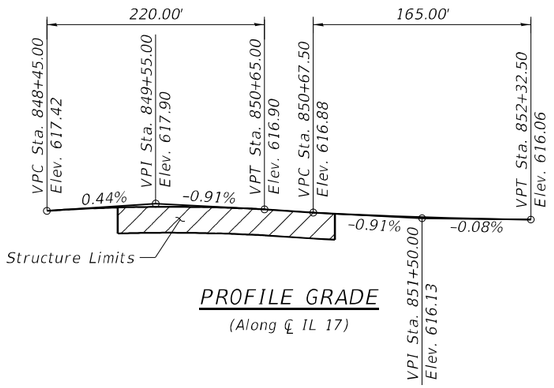
Existing Overtopping Elev. 616.49 @ Sta. 850+43
Proposed Overtopping Elev. 617.09 @ Sta. 850+44

Flood	Freq. Yr.	Q C.F.S.	Opening Ft² Exist.	Opening Ft² Prop.	Nat. H.W.E.	Head – Ft. Exist.	Head – Ft. Prop.	Headwater El. Exist.	Headwater El. Prop.
	10	1,230	269	439	608.3	0.0	0.0	608.3	608.3
Design	50	1,820	353	565	609.9	0.0	0.0	609.9	609.9
Base	100	2,090	376	608	610.3	0.2	0.1	610.5	610.4
Overtopping	200	2,350	394	633	610.6	0.3	0.2	610.9	610.8
Max. Calc.	500	2,700	413	659	610.9	0.4	0.3	611.3	611.2

10-Year Velocity through Existing Structure = 4.6 fps
10-Year Velocity through Proposed Structure = 2.8 fps

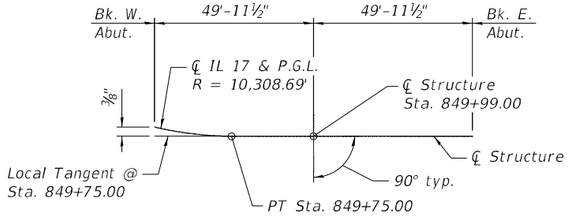
TOTAL BILL OF MATERIAL

ITEM	UNIT	SUPER	SUB	TOTAL
Stone Riprap, Class A4	Sq. Yd.		892	892
Filter Fabric	Sq. Yd.		838	838
Removal of Existing Structures	Each			1
Structure Excavation	Cu. Yd.		359	359
Concrete Structures	Cu. Yd.		70.7	70.7
Concrete Superstructures	Cu. Yd.	178.6		178.6
Bridge Deck Grooving	Sq. Yd.	599		599
Protective Coat	Sq. Yd.	751		751
Concrete Superstructures (Approach Slab)	Cu. Yd.	106.9		106.9
Furnishing and Erecting Precast Prestressed Beams, IL36	Foot	583.5		583.5
Reinforcement Bars, Epoxy Coated	Pound	71,090	11,960	83,050
Bar Splicers	Each	498	100	598
Furnishing Steel Piles HP14x73	Foot		500	500
Driving Piles	Foot		500	500
Test Pile Steel HP14x73	Each		2	2
Pile Shoes	Each		12	12
Name Plate	Each	1		1
Temporary Sheet Piling	Sq. Ft.			561
Granular Backfill for Structures	Cu. Yd.		104	104
Geocomposite Wall Drain	Sq. Yd.		56	56
Pipe Underdrains for Structures 4"	Foot		141	141
Bar Terminators	Each	80	352	432



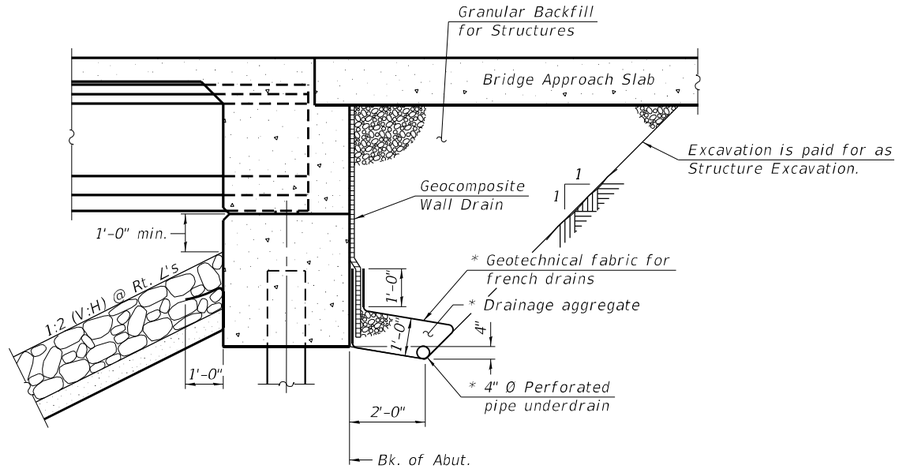
PROFILE GRADE

(Along ℄ IL 17)



DESIGN SCOUR ELEVATION TABLE

Event / Limit State	Design Scour Elevations (ft.) W. Abut.	E. Abut.	Item 113
Q100	609.81	609.32	8
Q200	609.81	609.32	
Design	609.81	609.32	
Check	609.81	609.32	



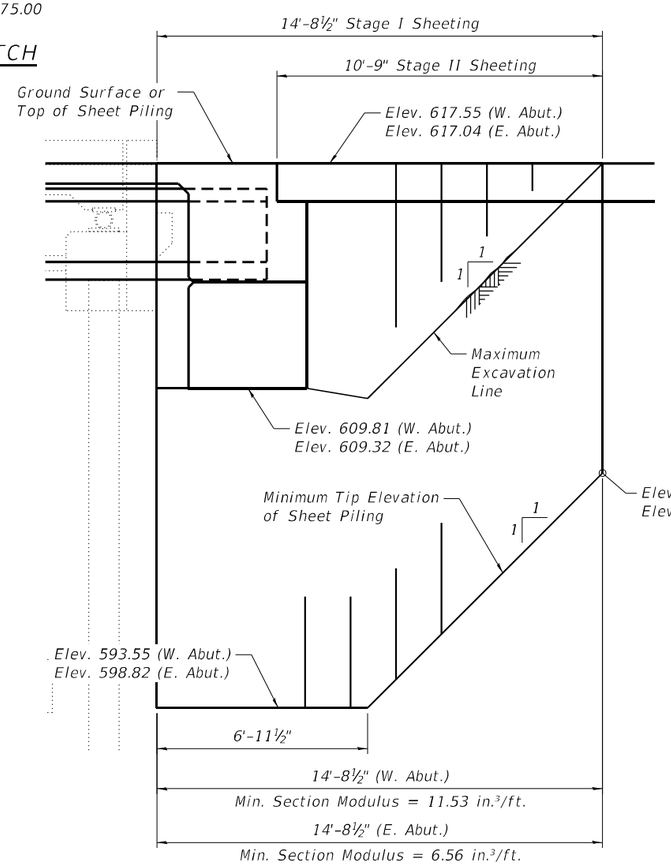
SECTION THRU INTEGRAL ABUTMENT

(Horiz. dim. at Rt. ℄'s)

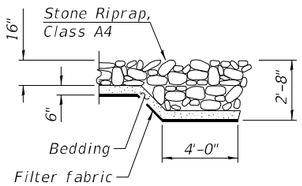
* Included in the cost of Pipe Underdrains for Structures.

Note:
All drainage system components shall extend to 2'-0" from the end of each wingwall except an outlet pipe shall extend until intersecting with the side slopes. The pipes shall drain into concrete headwalls. (See Article 601.05 of the Standard Specifications and Highway Standard 601101).

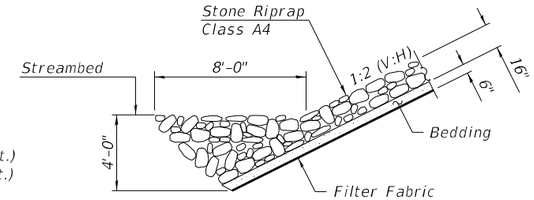
OFFSET SKETCH



TEMPORARY SHEET PILING



SECTION B-B



SECTION A-A

STA. 849+99.00
BUILT 20 BY
STATE OF ILLINOIS
F.A.P. Rt. 41 Sec. (13)BR-2
LOADING HL-93
STR. NO. 046-0162

NAME PLATE

See Std. 515001

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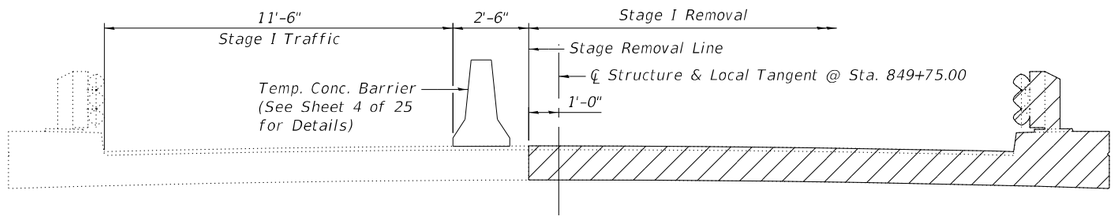
0460162-66L10-002-GD.dgn	CHECKED - KWB	REVISED -	
PLOT SCALE =	DRAWN - CFS	REVISED -	
PLOT DATE =	CHECKED - MDC	REVISED -	

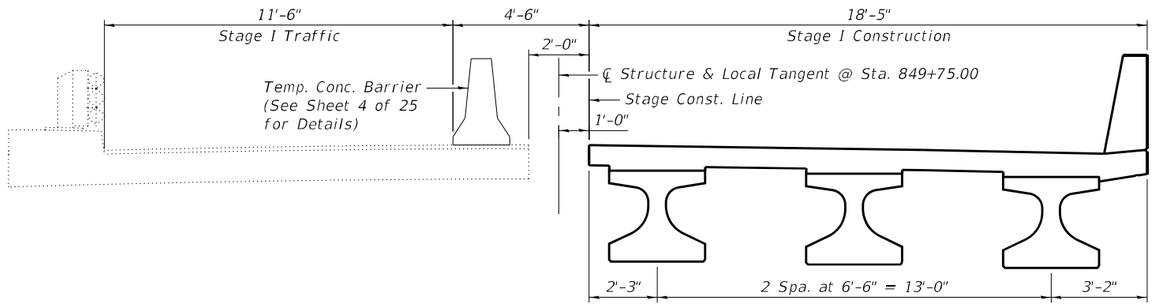
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

GENERAL DATA
STRUCTURE NO. 046-0162
SHEET 2 OF 25 SHEETS

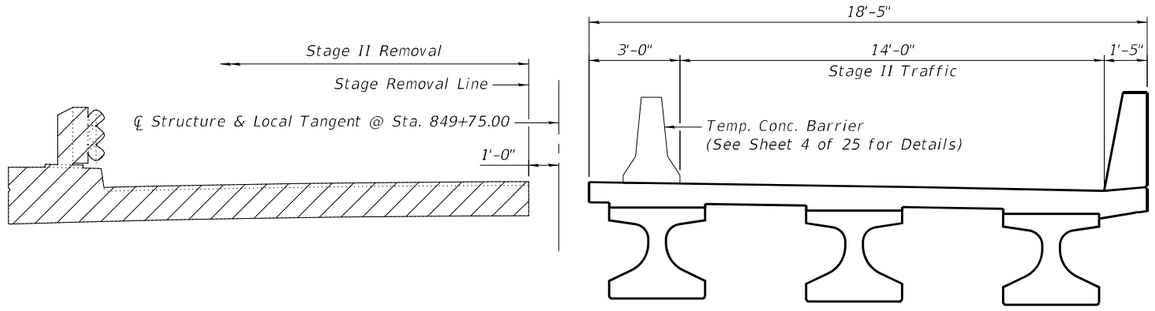
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	29
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



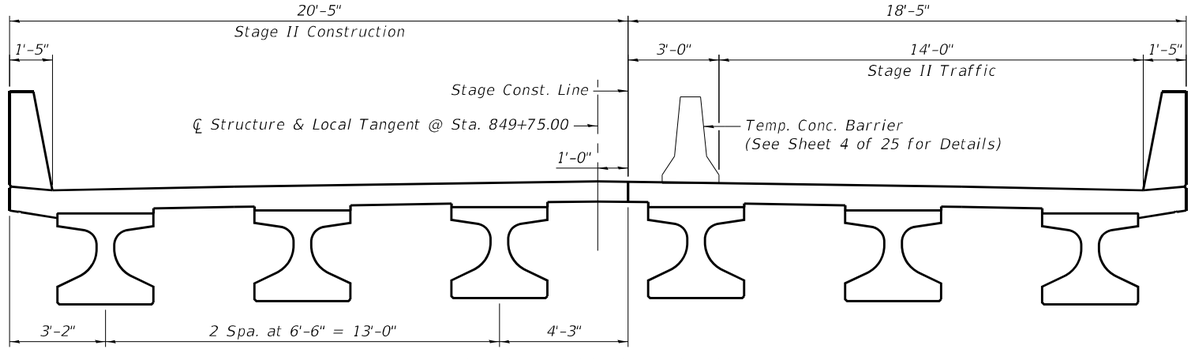
STAGE I REMOVAL
(Looking East)



STAGE I CONSTRUCTION
(Looking East)



STAGE II REMOVAL
(Looking East)



STAGE II CONSTRUCTION
(Looking East)

Notes:
For quantity of Temporary Concrete Barrier, see Roadway Plans.
Hatched ares indicate Removal of Existing Structures.

QUIGG ENGINEERING INC

USER NAME = cstokes	DESIGNED - CFS	REVISED -	
0460162-66L10-003-Staging.dgn	CHECKED - KWB	REVISED -	
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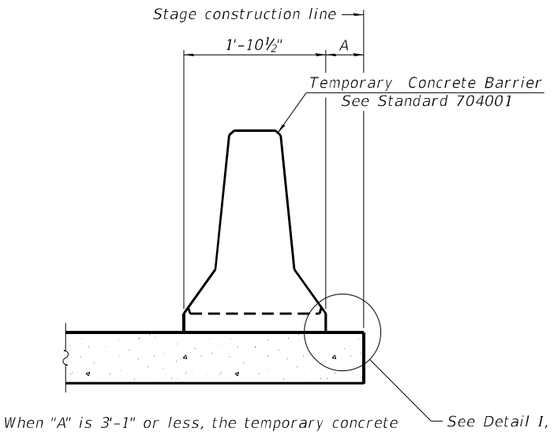
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

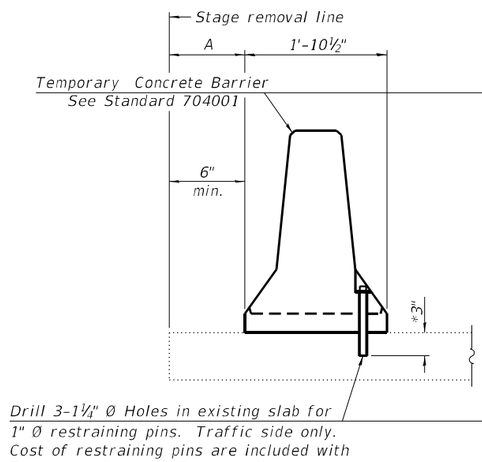
STAGE CONSTRUCTION DETAILS
STRUCTURE NO. 046-0162
SHEET 3 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	30
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



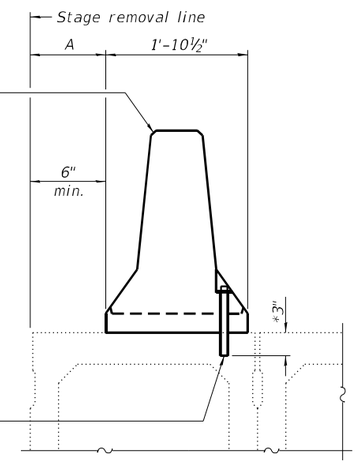
When "A" is 3'-1" or less, the temporary concrete barrier shall be restrained to the new slab according to Detail I, II or III. No restraint is required when "A" is greater than 3'-1".

NEW SLAB OR NEW DECK BEAM



Drill 3-1¼" Ø Holes in existing slab for 1" Ø restraining pins. Traffic side only. Cost of restraining pins are included with Temporary Concrete Barrier. No restraint is required when "A" is greater than 3'-1".

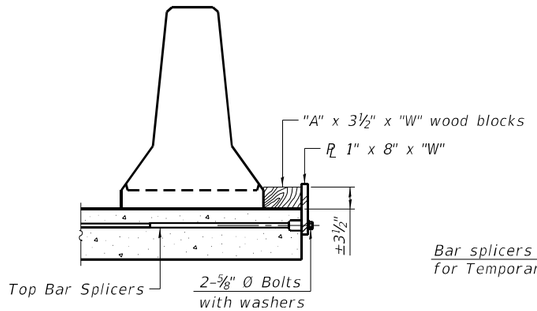
EXISTING SLAB



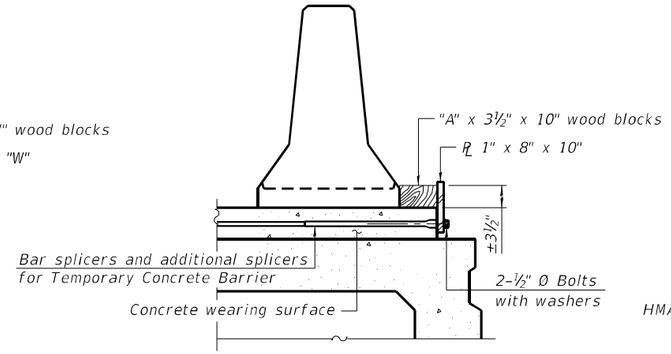
* When hot-mix asphalt wearing surface is present, embedment shall be 3" plus the wearing surface depth.

EXISTING DECK BEAM

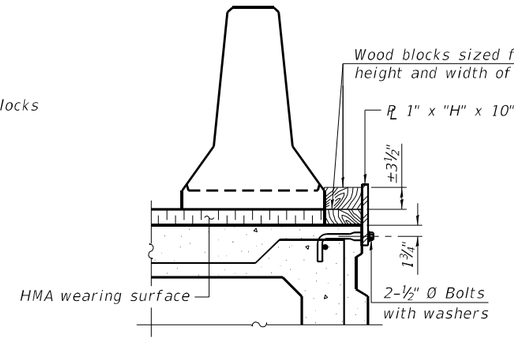
SECTIONS THRU SLAB OR DECK BEAM



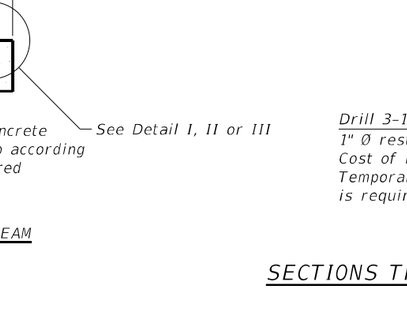
DETAIL I



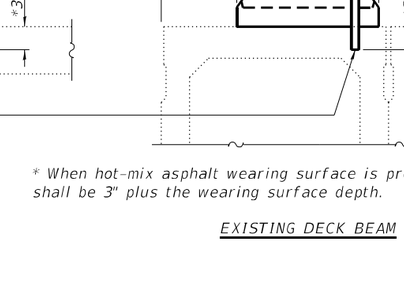
DETAIL II



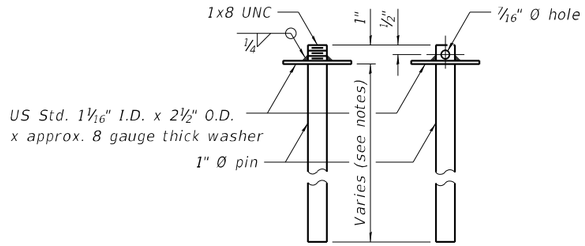
DETAIL III



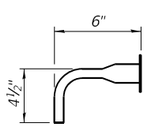
STEEL RETAINER ℄ 1" x 8" x "W"
(Detail I and II)



STEEL RETAINER ℄ 1" x "H" x 10"
(Detail III)



RESTRAINING PIN



BAR SPLICER FOR #4 BAR - DETAIL III

Notes:

Cost of retainer assembly is included with Temporary Concrete Barrier.

A retainer assembly shall be located at the approximate ℄ of each temporary concrete barrier.

The retainer plate shall not be removed until the concrete on the adjacent stage is ready to be poured. For Detail III applications the retainer plate shall not be removed until just prior to placing the adjacent beam.

When the 'A' dimension is less than 1½", the wood block shall be omitted and the barrier shall be placed in direct contact with the steel retainer plate. For deck beam applications the minimum required 'A' distance is 6" to accommodate the shear key clamping device.

Detail I - Installation for a new bridge deck or bridge slab.

Detail II - Installation for a new deck beam with an initial concrete wearing surface. Additional bar splicers shall be provided at 6'-0" centers and paired with the bar splicers of the concrete wearing surface reinforcement to accommodate the installation of the retainer assemblies. The cost of the additional bar splicers is included with the concrete wearing surface.

Detail III - Installation for a new deck beam with no initial wearing surface or with an initial hot-mix asphalt (HMA) wearing surface present. The deck beam directly beneath the temporary concrete barrier shall be fabricated with bar splicer inserts in the side of the beam, as detailed, to accommodate the installation of the retainer assemblies. A pair of bar splicers, 6" apart, shall be placed at 6'-0" centers along the length of the beam. The cost of the bar splicers is included with the deck beam.

RAILING CRITERIA

NCHRP 350 Test Level	3
Railing Weight (plf)	440

R-27

10-12-2021

MODEL: Default
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0460162-66L10-004-TCB.dgn	CHECKED - KWB	REVISED -	
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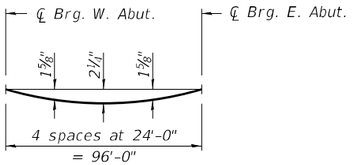
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TEMPORARY CONCRETE BARRIER
STRUCTURE NO. 046-0162

SHEET 4 OF 25 SHEETS

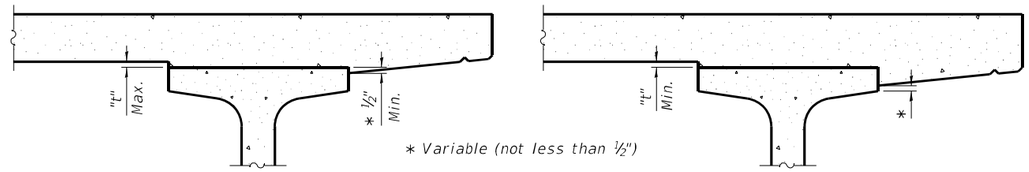
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	31
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



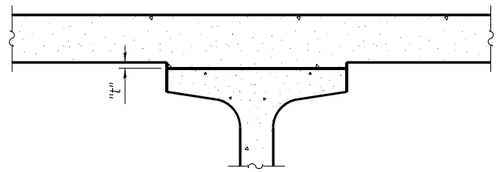
DEAD LOAD DEFLECTION DIAGRAM

(Includes weight of concrete only, excluding beams.)

Note:
The above deflections are not to be used in the field if the engineer is working from the grade elevations adjusted for dead load deflections as shown on Sheet 6 of 25.



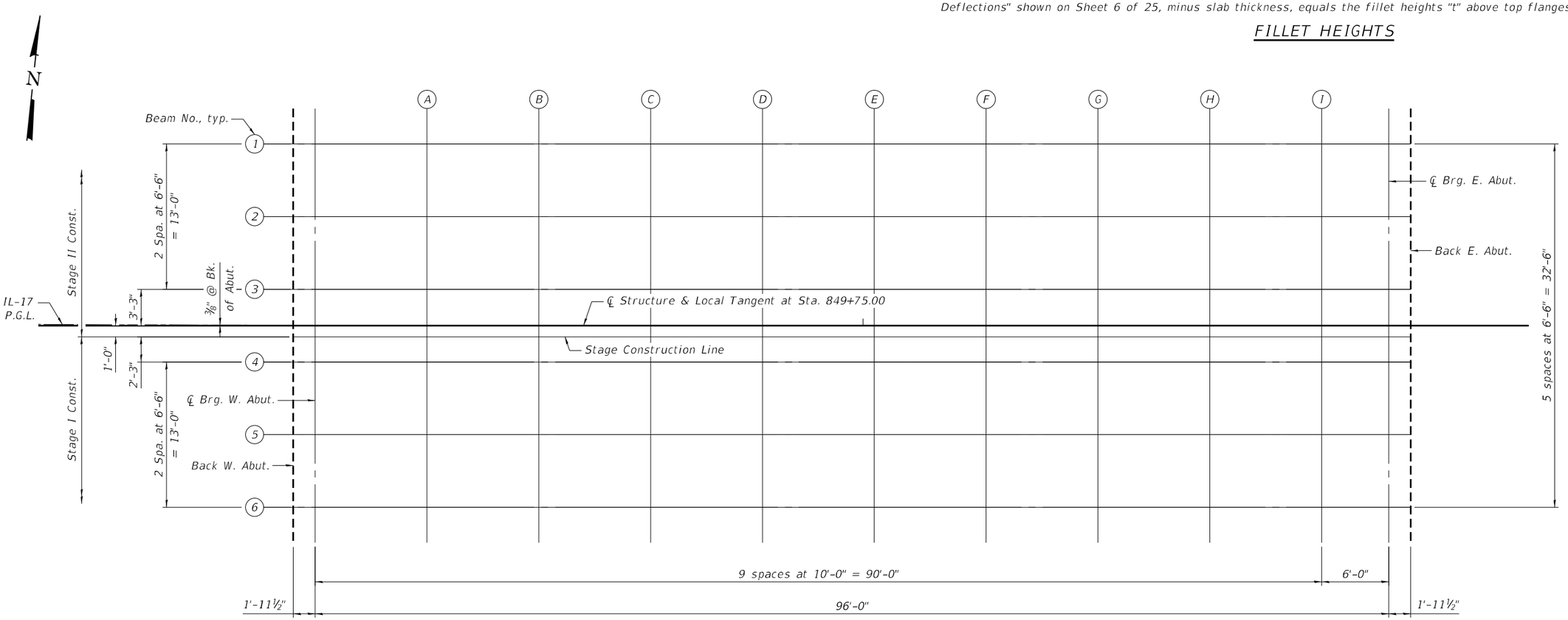
EXTERIOR BEAMS



INTERIOR BEAMS

To determine "t": After all precast prestressed beams have been erected, elevations of the top flanges of the beams shall be taken at intervals shown below. These elevations subtracted from the "Theoretical Grade Elevations Adjusted for Dead Load Deflections" shown on Sheet 6 of 25, minus slab thickness, equals the fillet heights "t" above top flanges of beams.

FILLET HEIGHTS



PLAN

MODEL: Default
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0460162-66L10-005-TOS Elev.dgn	CHECKED - KWB	REVISED -	
PLOT SCALE =	DRAWN - CFS	REVISED -	
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TOP OF SLAB ELEVATIONS
STRUCTURE NO. 046-0162
SHEET 5 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	32
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

BEAM NO. 1

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.00	-16.22	617.28	617.28
℄ Brg. W. Abut.	849+50.96	-16.22	617.28	617.28
A	849+60.98	-16.24	617.25	617.31
B	849+70.99	-16.25	617.22	617.34
C	849+81.00	-16.25	617.19	617.34
D	849+91.00	-16.25	617.14	617.33
E	850+01.00	-16.25	617.09	617.28
F	850+11.00	-16.25	617.04	617.21
G	850+21.00	-16.25	616.98	617.12
H	850+31.00	-16.25	616.91	617.01
I	850+41.00	-16.25	616.84	616.87
℄ Brg. E. Abut.	850+47.00	-16.25	616.79	616.79
Bk. of E. Abut.	850+48.96	-16.25	616.78	616.78

BEAM NO. 2

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.02	-9.72	617.40	617.40
℄ Brg. W. Abut.	849+50.98	-9.72	617.40	617.40
A	849+60.99	-9.74	617.37	617.43
B	849+71.00	-9.75	617.34	617.46
C	849+81.00	-9.75	617.30	617.46
D	849+91.00	-9.75	617.26	617.45
E	850+01.00	-9.75	617.21	617.40
F	850+11.00	-9.75	617.16	617.34
G	850+21.00	-9.75	617.10	617.24
H	850+31.00	-9.75	617.03	617.13
I	850+41.00	-9.75	616.96	616.99
℄ Brg. E. Abut.	850+47.00	-9.75	616.91	616.91
Bk. of E. Abut.	850+48.96	-9.75	616.89	616.89

BEAM NO. 3

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.03	-3.22	617.50	617.50
℄ Brg. W. Abut.	849+50.99	-3.22	617.49	617.49
A	849+61.00	-3.24	617.47	617.53
B	849+71.00	-3.25	617.44	617.55
C	849+81.00	-3.25	617.40	617.56
D	849+91.00	-3.25	617.36	617.54
E	850+01.00	-3.25	617.31	617.50
F	850+11.00	-3.25	617.26	617.43
G	850+21.00	-3.25	617.20	617.34
H	850+31.00	-3.25	617.13	617.22
I	850+41.00	-3.25	617.05	617.09
℄ Brg. E. Abut.	850+47.00	-3.25	617.01	617.01
Bk. of E. Abut.	850+48.96	-3.25	616.99	616.99

℄ IL-17 AND P.G.L.

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.04	0.00	617.55	617.55
℄ Brg. W. Abut.	849+51.00	0.00	617.54	617.54
A	849+61.00	0.00	617.52	617.58
B	849+71.00	0.00	617.49	617.60
C	849+81.00	0.00	617.45	617.61
D	849+91.00	0.00	617.41	617.59
E	850+01.00	0.00	617.36	617.55
F	850+11.00	0.00	617.30	617.48
G	850+21.00	0.00	617.24	617.39
H	850+31.00	0.00	617.18	617.27
I	850+41.00	0.00	617.10	617.14
℄ Brg. E. Abut.	850+47.00	0.00	617.06	617.06
Bk. of E. Abut.	850+48.96	0.00	617.04	617.04

STAGE CONSTRUCTION LINE

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.04	1.03	617.53	617.53
℄ Brg. W. Abut.	849+51.00	1.03	617.53	617.53
A	849+61.00	1.01	617.50	617.56
B	849+71.00	1.00	617.47	617.59
C	849+81.00	1.00	617.44	617.59
D	849+91.00	1.00	617.39	617.58
E	850+01.00	1.00	617.34	617.54
F	850+11.00	1.00	617.29	617.47
G	850+21.00	1.00	617.23	617.37
H	850+31.00	1.00	617.16	617.26
I	850+41.00	1.00	617.09	617.12
℄ Brg. E. Abut.	850+47.00	1.00	617.04	617.04
Bk. of E. Abut.	850+48.96	1.00	617.03	617.03

BEAM NO. 4

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.05	3.28	617.50	617.50
℄ Brg. W. Abut.	849+51.01	3.28	617.49	617.49
A	849+61.00	3.26	617.47	617.53
B	849+71.00	3.25	617.44	617.55
C	849+81.00	3.25	617.40	617.56
D	849+91.00	3.25	617.36	617.54
E	850+01.00	3.25	617.31	617.50
F	850+11.00	3.25	617.26	617.43
G	850+21.00	3.25	617.20	617.34
H	850+31.00	3.25	617.13	617.22
I	850+41.00	3.25	617.05	617.09
℄ Brg. E. Abut.	850+47.00	3.25	617.01	617.01
Bk. of E. Abut.	850+48.96	3.25	616.99	616.99

BEAM NO. 5

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.07	9.78	617.40	617.40
℄ Brg. W. Abut.	849+51.02	9.78	617.39	617.39
A	849+61.01	9.76	617.37	617.43
B	849+71.00	9.75	617.34	617.46
C	849+81.00	9.75	617.30	617.46
D	849+91.00	9.75	617.26	617.45
E	850+01.00	9.75	617.21	617.40
F	850+11.00	9.75	617.16	617.34
G	850+21.00	9.75	617.10	617.24
H	850+31.00	9.75	617.03	617.13
I	850+41.00	9.75	616.96	616.99
℄ Brg. E. Abut.	850+47.00	9.75	616.91	616.91
Bk. of E. Abut.	850+48.96	9.75	616.89	616.89

BEAM NO. 6

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. of W. Abut.	849+49.08	16.28	617.28	617.28
℄ Brg. W. Abut.	849+51.04	16.28	617.28	617.28
A	849+61.02	16.26	617.25	617.31
B	849+71.01	16.25	617.22	617.34
C	849+81.00	16.25	617.19	617.34
D	849+91.00	16.25	617.14	617.33
E	850+01.00	16.25	617.09	617.28
F	850+11.00	16.25	617.04	617.21
G	850+21.00	16.25	616.98	617.12
H	850+31.00	16.25	616.91	617.01
I	850+41.00	16.25	616.84	616.87
℄ Brg. E. Abut.	850+47.00	16.25	616.79	616.79
Bk. of E. Abut.	850+48.96	16.25	616.78	616.78

NORTH EDGE OF SHOULDER

Location	Station	Offset	Theoretical Grade Elevations
W. End of W. Appr. Slab	849+19.95	-17.85	617.28
A1	849+29.96	-17.90	617.27
A2	849+39.98	-17.95	617.26
E. End of W. Appr. Slab	849+50.00	-17.97	617.24

NORTH EDGE OF PAVEMENT

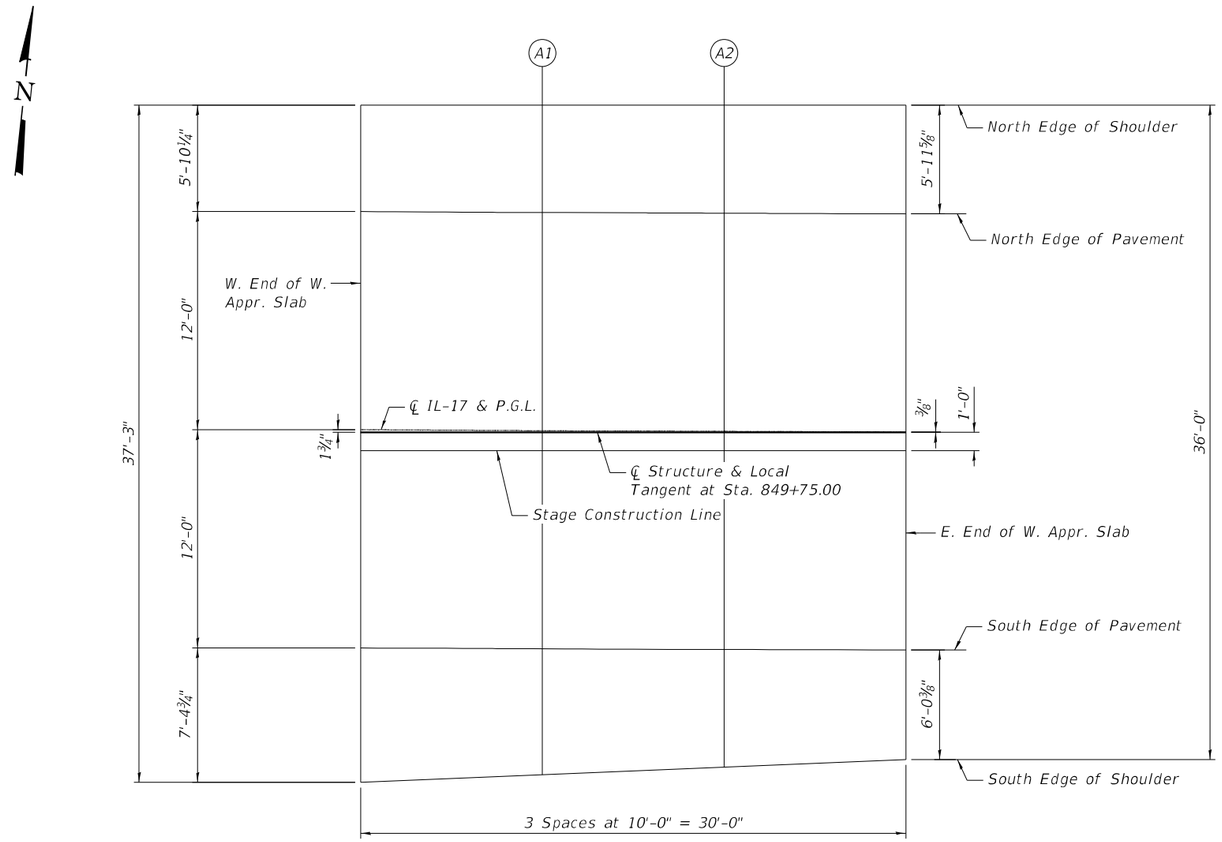
Location	Station	Offset	Theoretical Grade Elevations
W. End of W. Appr. Slab	849+19.98	-12.00	617.40
A1	849+29.99	-12.00	617.39
A2	849+40.00	-12.00	617.38
E. End of W. Appr. Slab	849+50.01	-12.00	617.36

℄ IL-17 AND P.G.L.

Location	Station	Offset	Theoretical Grade Elevations
W. End of W. Appr. Slab	849+20.04	0.00	617.58
A1	849+30.04	0.00	617.57
A2	849+40.04	0.00	617.56
E. End of W. Appr. Slab	849+50.04	0.00	617.54

STAGE CONSTRUCTION LINE

Location	Station	Offset	Theoretical Grade Elevations
W. End of W. Appr. Slab	849+20.05	1.15	617.56
A1	849+30.05	1.10	617.56
A2	849+40.05	1.06	617.55
E. End of W. Appr. Slab	849+50.04	1.03	617.53



PLAN
(West Approach)

SOUTH EDGE OF PAVEMENT

Location	Station	Offset	Theoretical Grade Elevations
W. End of W. Appr. Slab	849+20.11	12.00	617.40
A1	849+30.09	12.00	617.39
A2	849+40.08	12.00	617.38
E. End of W. Appr. Slab	849+50.07	12.00	617.36

SOUTH EDGE OF SHOULDER

Location	Station	Offset	Theoretical Grade Elevations
W. End of W. Appr. Slab	849+20.14	19.40	617.25
A1	849+30.12	18.93	617.25
A2	849+40.10	18.48	617.25
E. End of W. Appr. Slab	849+50.09	18.03	617.24

Notes:
Offsets are measured perpendicular from ℄ IL-17.
Transverse dimensions are measured perpendicular to ℄ Structure.
Longitudinal dimensions are measured parallel to ℄ Structure.

E-AS 2-17-2017

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21IL082 - PTB 201-27 D3-Wight-Various I&I\IWO #8 - 15P BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-007-TOS Elev W Appr.dgn
3/13/2024 3:05:26 PM

QUIGG ENGINEERING INC

USER NAME = cstokes	DESIGNED - CFS	REVISED -	
0460162-66L10-007-TOS Elev W Appr.dgn	CHECKED - KWB	REVISED -	
PLOT SCALE =	DRAWN - CFS	REVISED -	
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TOP OF WEST APPROACH SLAB ELEVATIONS
STRUCTURE NO. 046-0162
SHEET 7 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	34
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

NORTH EDGE OF SHOULDER

Location	Station	Offset	Theoretical Grade Elevations
W. End of E. Appr. Slab	850+47.96	-18.00	616.75
A3	850+57.96	-18.00	616.67
A4	850+67.96	-18.00	616.58
E. End of E. Appr. Slab	850+77.96	-18.00	616.49

NORTH EDGE OF PAVEMENT

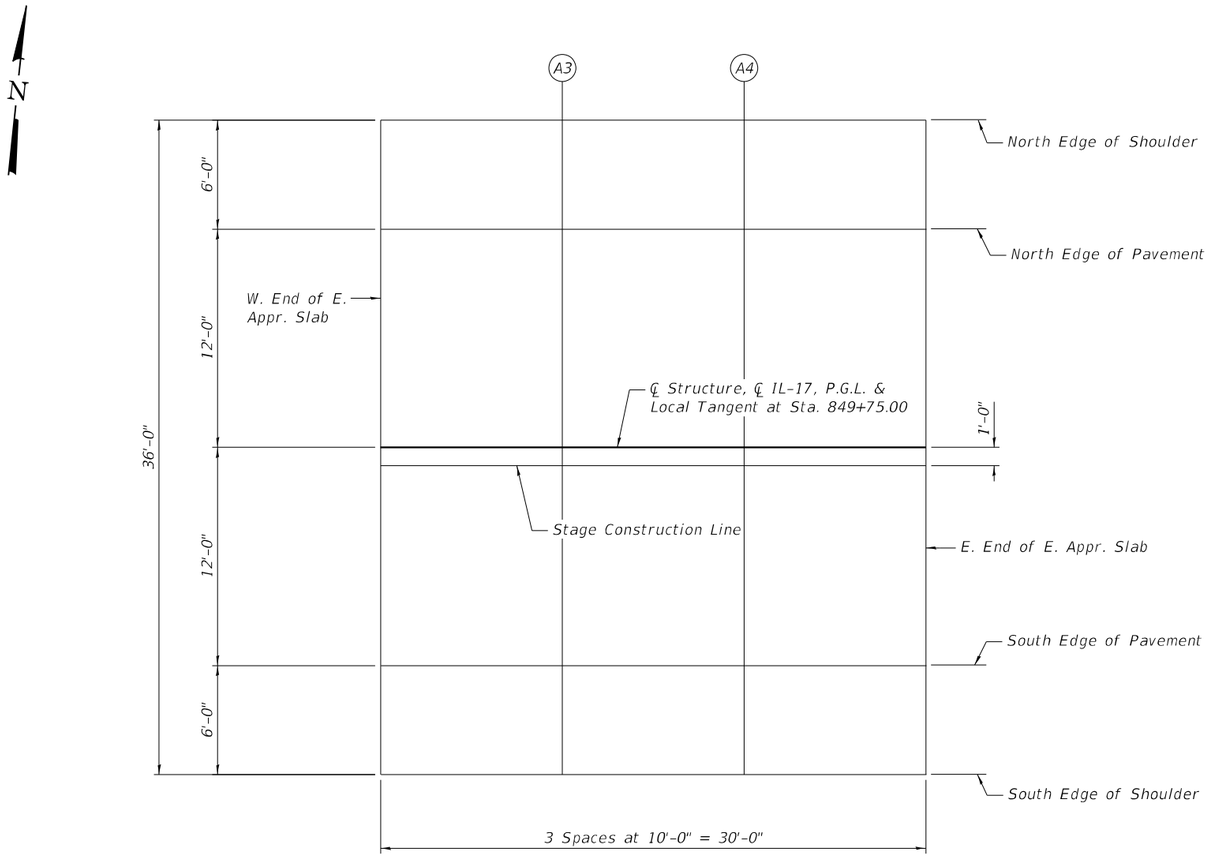
Location	Station	Offset	Theoretical Grade Elevations
W. End of E. Appr. Slab	850+47.96	-12.00	616.87
A3	850+57.96	-12.00	616.79
A4	850+67.96	-12.00	616.70
E. End of E. Appr. Slab	850+77.96	-12.00	616.61

℄ IL-17 AND P.G.L.

Location	Station	Offset	Theoretical Grade Elevations
W. End of E. Appr. Slab	850+47.96	0.00	617.05
A3	850+57.96	0.00	616.97
A4	850+67.96	0.00	616.88
E. End of E. Appr. Slab	850+77.96	0.00	616.79

STAGE CONSTRUCTION LINE

Location	Station	Offset	Theoretical Grade Elevations
W. End of E. Appr. Slab	850+47.96	1.00	617.03
A3	850+57.96	1.00	616.95
A4	850+67.96	1.00	616.86
E. End of E. Appr. Slab	850+77.96	1.00	616.77



PLAN
(East Approach)

SOUTH EDGE OF PAVEMENT

Location	Station	Offset	Theoretical Grade Elevations
W. End of E. Appr. Slab	850+47.96	12.00	616.87
A3	850+57.96	12.00	616.79
A4	850+67.96	12.00	616.70
E. End of E. Appr. Slab	850+77.96	12.00	616.61

SOUTH EDGE OF SHOULDER

Location	Station	Offset	Theoretical Grade Elevations
W. End of E. Appr. Slab	850+47.96	18.00	616.75
A3	850+57.96	18.00	616.67
A4	850+67.96	18.00	616.58
E. End of E. Appr. Slab	850+77.96	18.00	616.49

Notes:
Offsets are measured perpendicular from ℄ IL-17.
Transverse dimensions are measured perpendicular to ℄ Structure.
Longitundinal dimensions are measured parallel to ℄ Structure.

E-AS 2-17-2017

QUIGG ENGINEERING INC

USER NAME = cstokes	DESIGNED - CFS	REVISED -
0460162-66L10-008-TOS Elev E Appr.dgn	CHECKED - KWB	REVISED -
PLOT SCALE =	DRAWN - CFS	REVISED -
PLOT DATE =	CHECKED - MDC	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TOP OF EAST APPROACH SLAB ELEVATIONS
STRUCTURE NO. 046-0162
SHEET 8 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	35
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\Dot01\Projects\2021\2 IL082 - PTB 201-27 D3-Wight-Various I&R\WO #8 - 15P BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-008-TOS Elev E Appr.dgn
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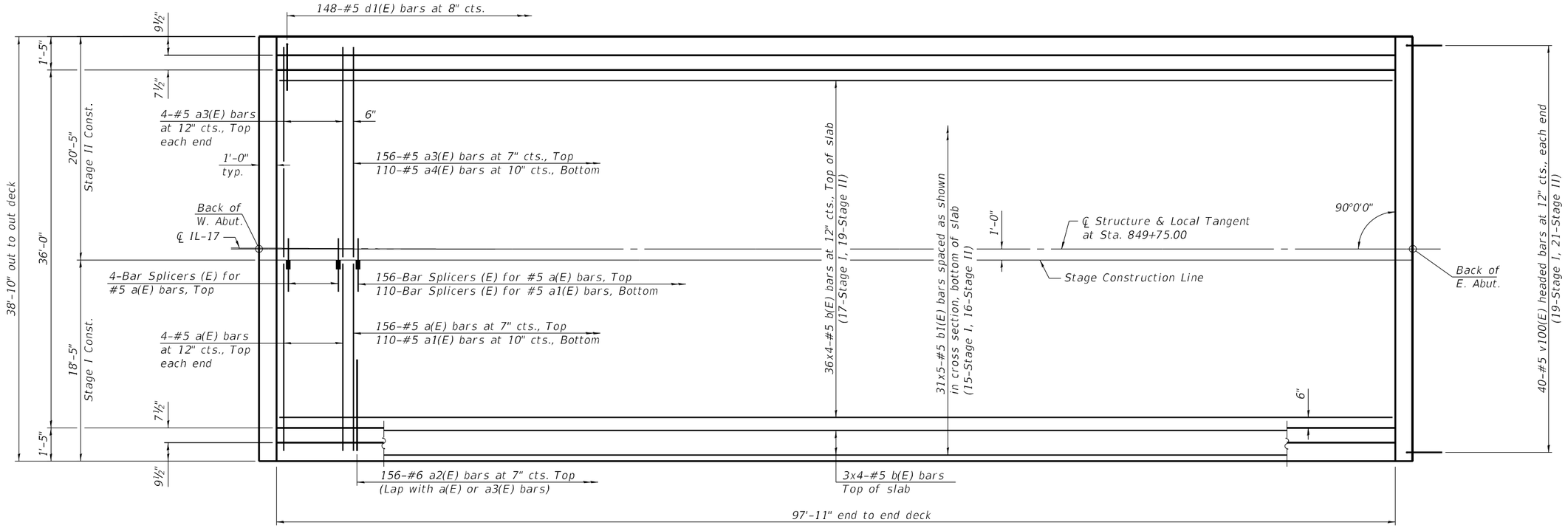
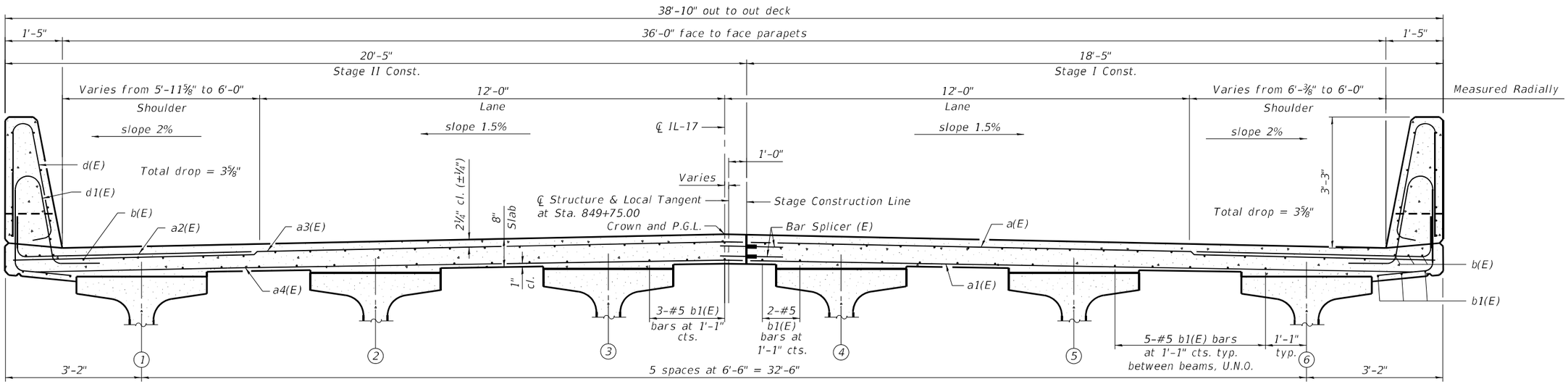


MINIMUM BAR LAP

#5 bar = 3'-6"

PLAN

Notes:
See sheet 10 of 25 for superstructure details and Bill of Material.
Bars indicated thus 20 x 3-#5 etc. indicates 20 lines of bars with 3 lengths per line.
See sheet 23 of 25 for bar splicer details.
Transverse dimensions are measured perpendicular to ℄ structure.
Longitudinal dimensions are measured parallel to ℄ structure.



CROSS SECTION

(Looking East)

SI-IL3690-1-0 8-13-2021

QUIGG ENGINEERING INC	USER NAME = cstokes	DESIGNED - CFS	REVISED -
	0460162-66L10-009-Super.dgn	CHECKED - KWB	REVISED -
	PLOT SCALE =	DRAWN - CFS	REVISED -
	PLOT DATE =	CHECKED - MDC	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUPERSTRUCTURE
STRUCTURE NO. 046-0162
SHEET 9 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	36
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21IL082 - PTB 201-27 D3-Wight-Various I&II\WO #8 - 1SP BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-009-Super.dgn
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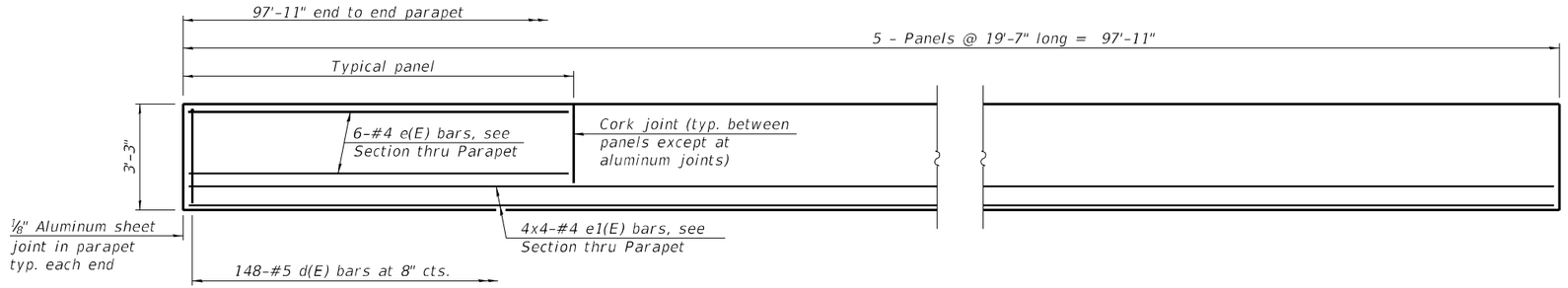
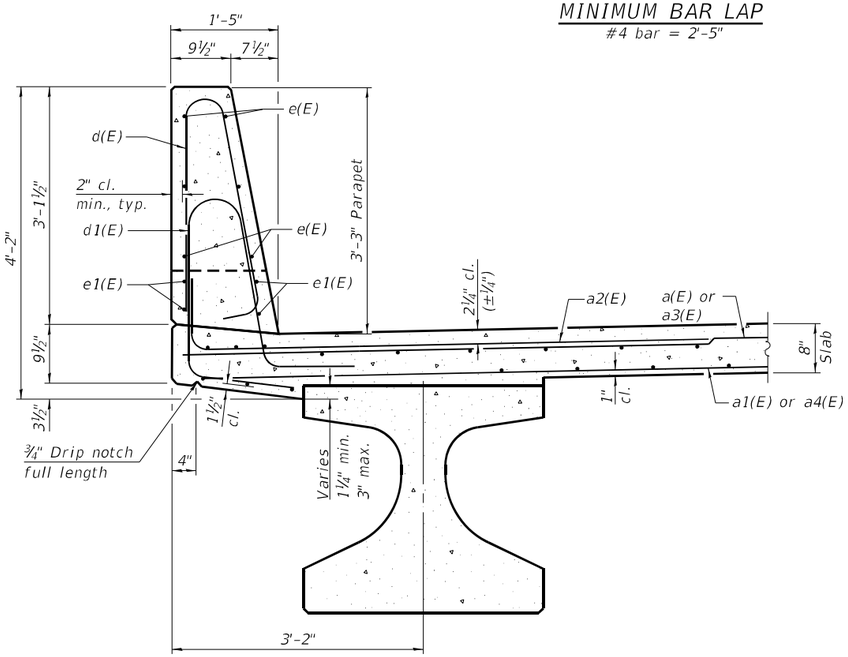


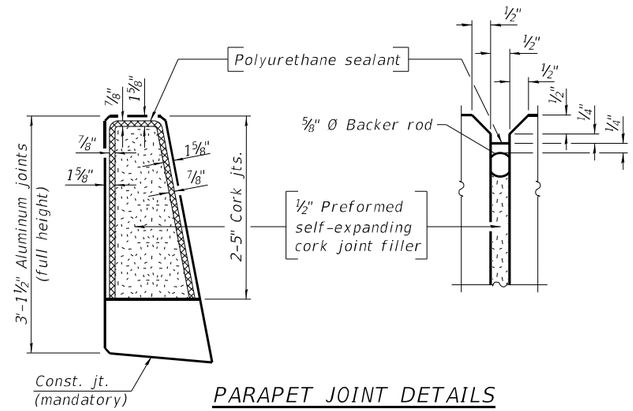
INSIDE ELEVATION OF PARAPET



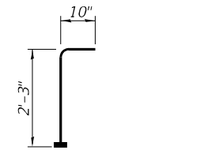
SECTION THRU PARAPET

MINIMUM BAR LAP

#4 bar = 2'-5"

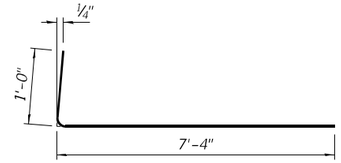


PARAPET JOINT DETAILS

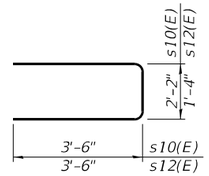


BAR v100(E)

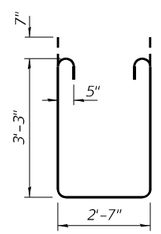
(Headed)
(80-#5 Bar Terminators)



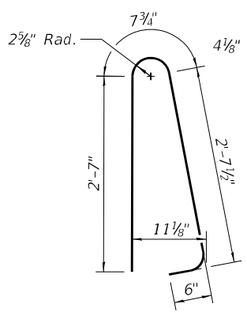
BAR a2(E)



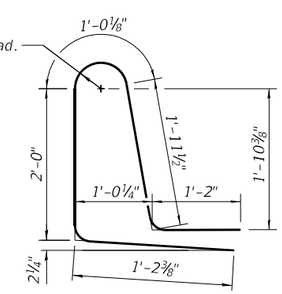
BARS s10(E) & s12(E)



BAR s11(E)



BAR d(E)



BAR d1(E)

SUPERSTRUCTURE BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a(E)	164	#5	18'-2"	
a1(E)	110	#5	17'-11"	
a2(E)	312	#6	8'-4"	
a3(E)	164	#5	20'-2"	
a4(E)	110	#5	19'-11"	
b(E)	168	#5	27'-2"	
b1(E)	155	#5	22'-5"	
d(E)	296	#5	6'-5"	
d1(E)	296	#5	7'-4"	
e(E)	60	#4	19'-3"	
e1(E)	32	#4	26'-4"	
m10(E)	8	#6	18'-2"	
m11(E)	16	#6	5'-1"	
m12(E)	8	#6	2'-4"	
m13(E)	8	#6	3'-0"	
m14(E)	4	#6	1'-3"	
m15(E)	24	#5	4'-0"	
m16(E)	2	#6	2'-4"	
m17(E)	8	#6	20'-2"	
s10(E)	52	#5	9'-2"	
s11(E)	52	#5	10'-3"	
s12(E)	48	#5	8'-4"	
v100(E)	80	#5	3'-1"	
Reinforcement Bars, Epoxy Coated		Lbs.	31,260	
Concrete Superstructure		Cu. Yds.	170.8	

Bars indicated thus 1 x 2-#4 etc. indicates 1 line of bars with 2 lengths per line.

Notes:

The ⅛" Aluminum sheet shall be ASTM B 209 alloy 3003-H14 and coated to minimize reaction with wet concrete. Cost included with Concrete Superstructure.

The polyurethane sealant shall be according to Article 1050.04 of the Std. Spec. and the color shall be gray.

Bar terminators, paid for separately. See Total Bill of Material.

SDI-IL36-1 6-15-2019

QUIGG ENGINEERING INC

USER NAME = JCray	DESIGNED - CFS	REVISED -	
0460162-66L10-010-Super Details.dgn	CHECKED - KWB	REVISED -	
PLOT SCALE =	DRAWN - CFS	REVISED -	
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUPERSTRUCTURE DETAILS
STRUCTURE NO. 046-0162
SHEET 10 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	37
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\Ds01\Projects\2021\21IL082 - PTB 201-27 D3-Wight-Various I&II\WO #8 - 1SP BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-010-Super Details.dgn
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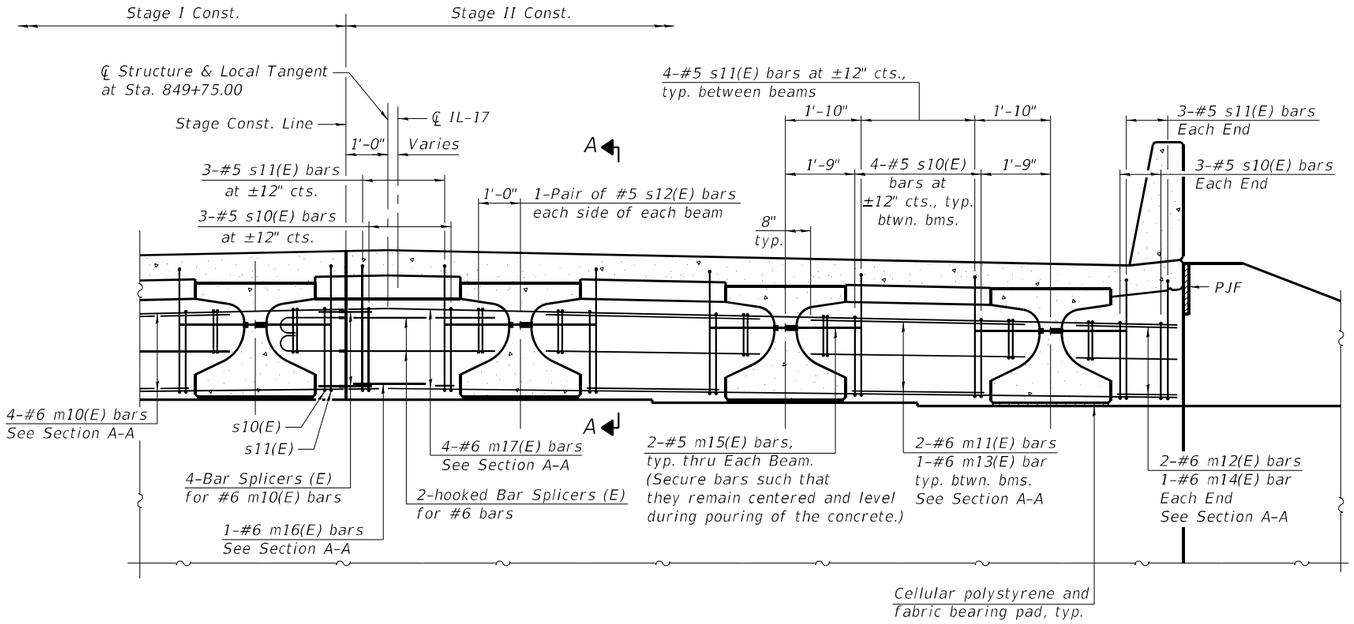
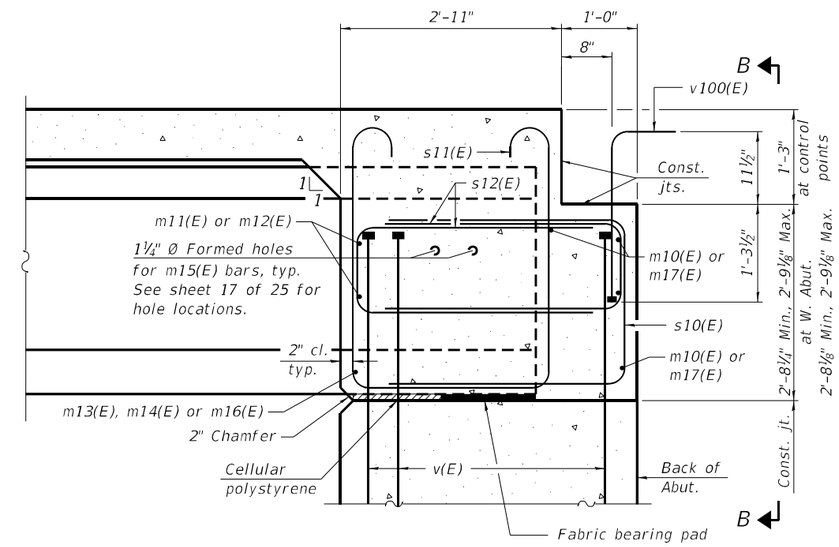
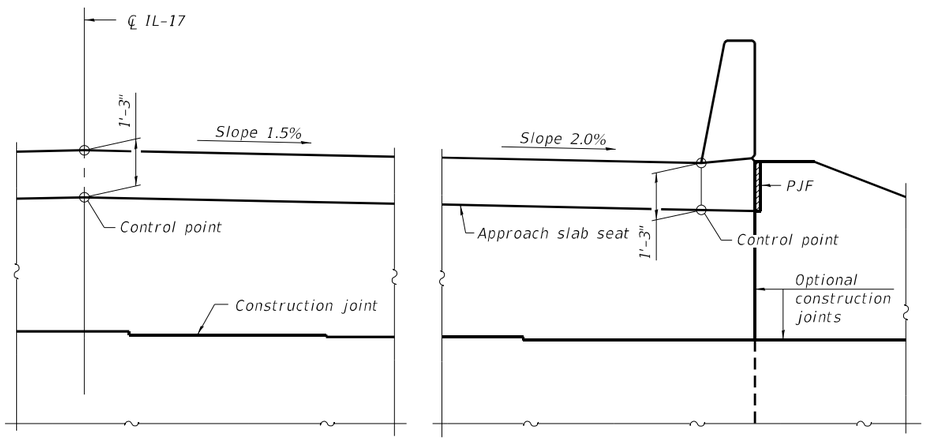


DIAPHRAGM AT ABUTMENT

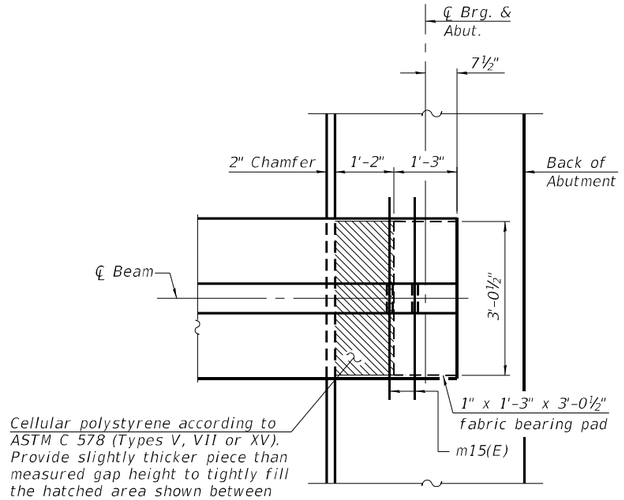
(West Diaphragm looking West shown, East Diaphragm looking East similar)



SECTION A-A



VIEW B-B



PLAN AT ABUTMENT

(Showing bottom flange of beam)

Notes:

See sheet 10 of 25 for superstructure details and Bill of Material.

See sheets 12 and 14 of 25 for PJF details.

The approach slab seat shall have a constant slope determined from the control points shown.

Cost of cellular polystyrene is included with Concrete Superstructure.

See sheet 23 of 25 for bar splicer details.

DIA-IL36-0

6-15-2019

QUIGG ENGINEERING INC	USER NAME = cstokes	DESIGNED - CFS	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	DIAPHRAGM DETAILS STRUCTURE NO. 046-0162
	0460162-66L10-011-Dia.dgn	CHECKED - KWB	REVISED -		SHEET 11 OF 25 SHEETS
	PLOT SCALE =	DRAWN - CFS	REVISED -		
	PLOT DATE =	CHECKED - MDC	REVISED -		

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	38
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21L082 - PTB 201-27 D3-Wight-Various I&II\WO #8 - 1SP BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-011-Dia.dgn
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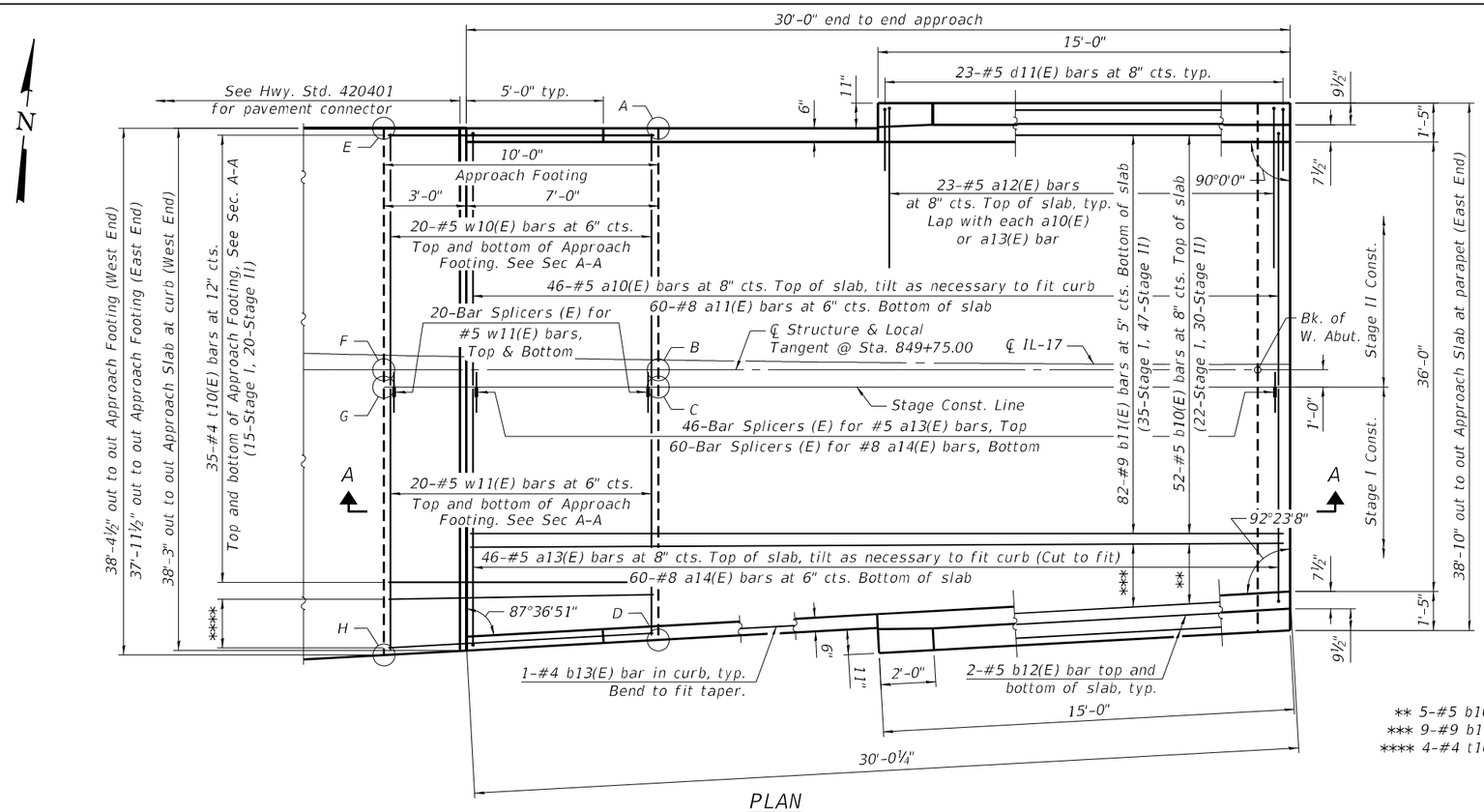


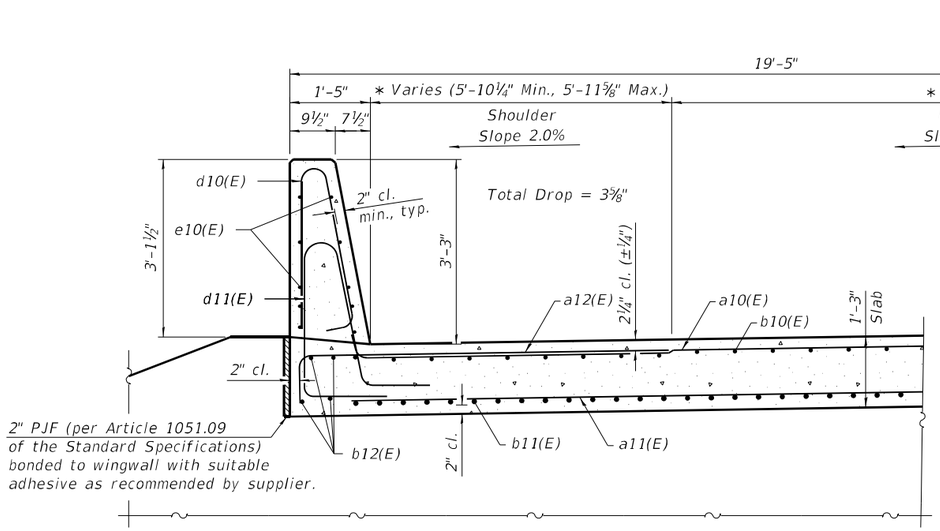
PLAN

TOP AND BOTTOM ELEVATIONS FOR APPROACH FOOTING

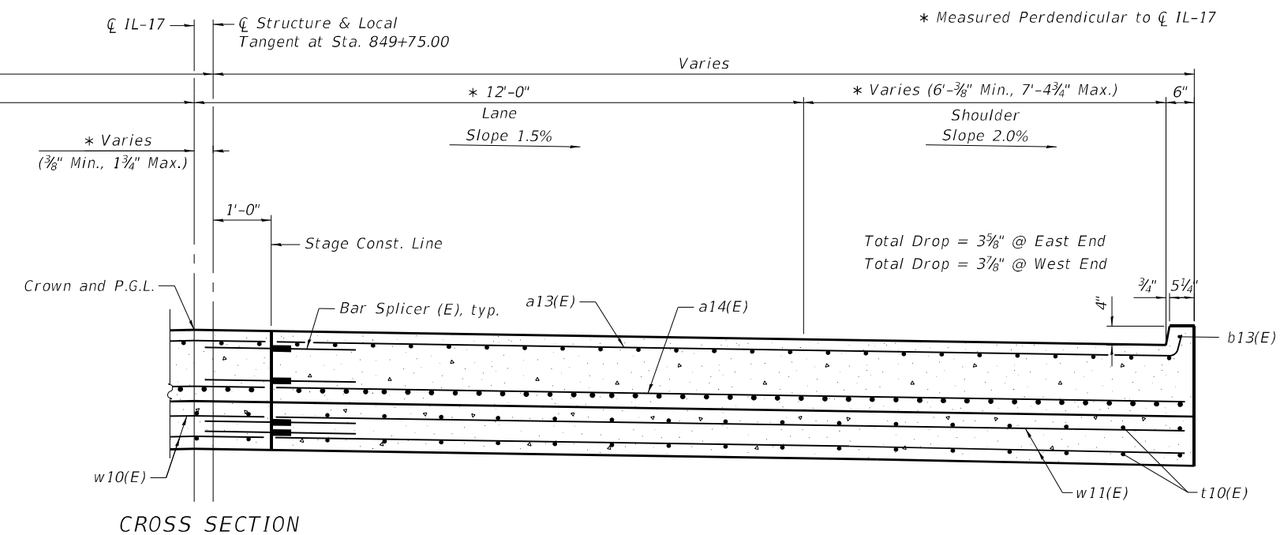
West Approach		
Point	Top	Bottom
A	615.98	615.15
B	616.29	615.46
C	616.27	615.44
D	615.96	615.13
E	615.99	615.15
F	616.29	615.46
G	616.28	615.44
H	615.95	615.12

Note:
See sheet 23 of 25 for bar splicer details.

** 5-#5 b10(E) bars flared at ±8" cts. Top of Slab
*** 9-#9 b11(E) bars flared at ±5" cts. Bottom of Slab
**** 4-#4 t10(E) bars flared at ±12" cts. Top and bottom of Approach Footing



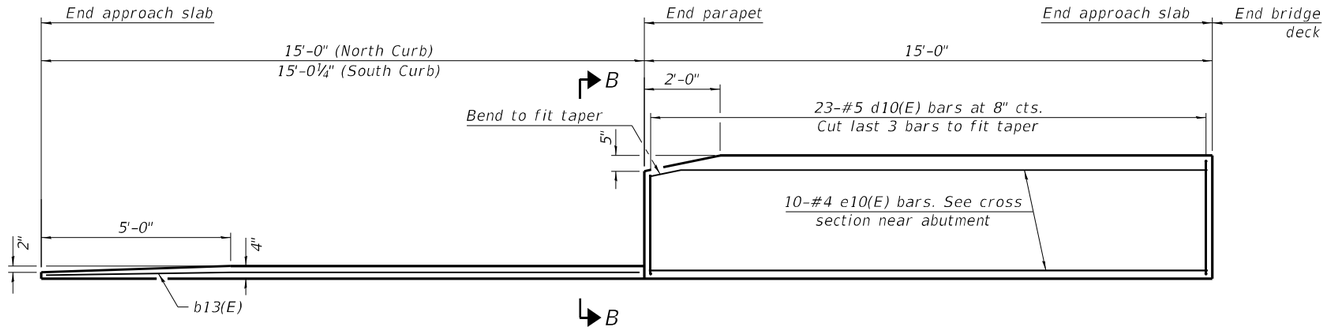
NEAR ABUTMENT



CROSS SECTION
(Looking East)

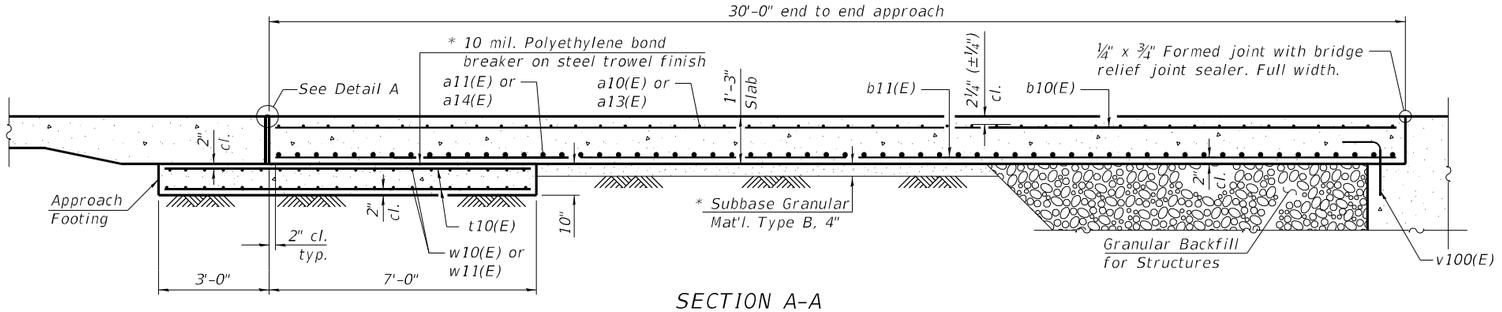
AT APPROACH FOOTING

(Sheet 1 of 2)

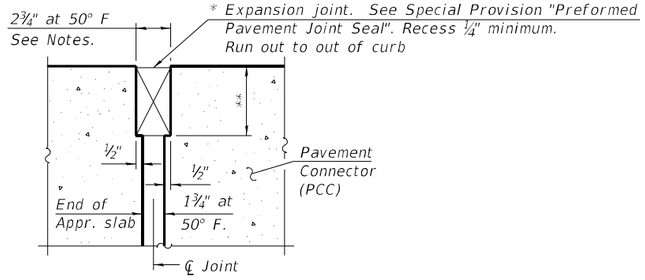


INSIDE ELEVATION OF PARAPET AND CURB

(North Parapet and Curb shown, South Parapet and Curb similar unless noted otherwise)



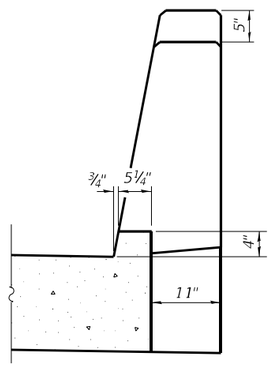
SECTION A-A



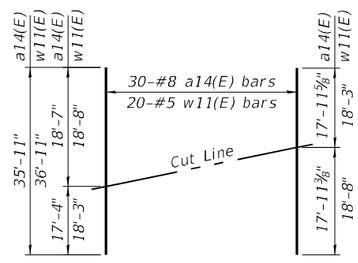
DETAIL A

* Cost included with Concrete Superstructure (Approach Slab).

** Per manufacturer recommendations



VIEW B-B



FIELD CUTTING DIAGRAM

Order w11(E) bars full length. Cut as shown and use remainder of bars in bottom of approach footing.

Order a14(E) bars full length. Cut as shown and use the remainder of bars in opposite side of approach slab.

Notes:

The joint opening shall be adjusted for temperature per Article 520.04 of the Standard Specifications. However, since this detail is for jointless structures, the length of bridge used to calculate the adjustment shall be equal to half the total bridge length plus the length of the bridge approach slab.

Parapet concrete shall be paid for as Concrete Superstructure.

Approach slab shall be paid for as Concrete Superstructure (Approach Slab).

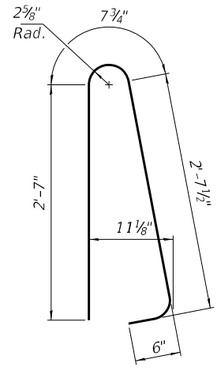
Approach footing concrete shall be paid for as Concrete Structures.

The approach footing maximum applied service bearing pressure (Qmax) = 2.0 ksf.

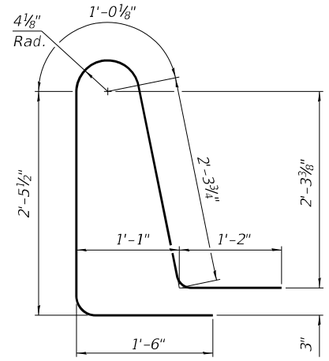
Cost of excavation for approach footing included with Concrete Structures.

For Granular Backfill for Structures and drainage treatment details, see sheet 2 of 25.

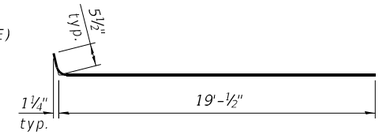
For Type 6 terminal connections see Highway Standard 631031.



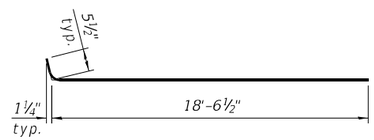
BAR d10(E)



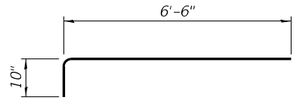
BAR d11(E)



BAR a10(E)



BAR a13(E)



BAR a12(E)

WEST APPROACH BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a10(E)	46	#5	19'-6"	
a11(E)	60	#8	19'-2"	
a12(E)	46	#5	7'-4"	
a13(E)	46	#5	19'-0"	
a14(E)	30	#8	35'-11"	
b10(E)	57	#5	29'-8"	
b11(E)	91	#9	29'-8"	
b12(E)	8	#5	14'-8"	
b13(E)	2	#4	14'-8"	
d10(E)	46	#5	6'-5"	
d11(E)	46	#5	8'-6"	
e10(E)	20	#4	14'-8"	
t10(E)	78	#4	9'-8"	
w10(E)	40	#5	19'-2"	
w11(E)	20	#5	36'-11"	
Concrete Superstructure			Cu. Yd.	3.9
Concrete Superstructure (Approach Slab)			Cu. Yd.	53.9
Concrete Structures			Cu. Yd.	11.8
Reinforcement Bars, Epoxy Coated			Pound	22,220

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21IL082 - PTB 201-27 D3-Wight-Various I&II\WO #8 - 1SP BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-013-W Appr.dgn

QUIGG ENGINEERING INC

USER NAME = cstokes	DESIGNED - CFS	REVISED -	
0460162-66L10-013-W Appr.dgn	CHECKED - KWB	REVISED -	
PLOT SCALE =	DRAWN - CFS	REVISED -	
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

WEST BRIDGE APPROACH SLAB DETAILS
STRUCTURE NO. 046-0162

SHEET 13 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	40
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			

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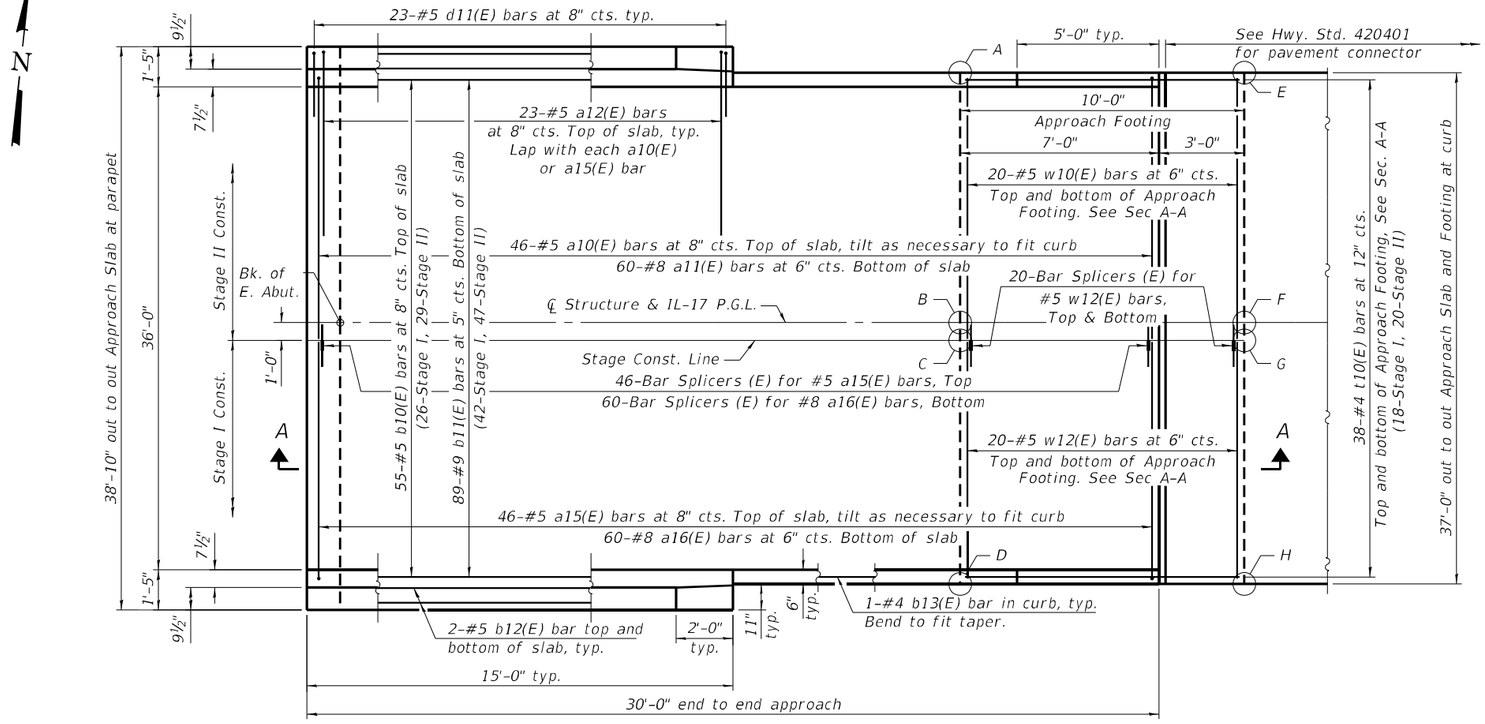
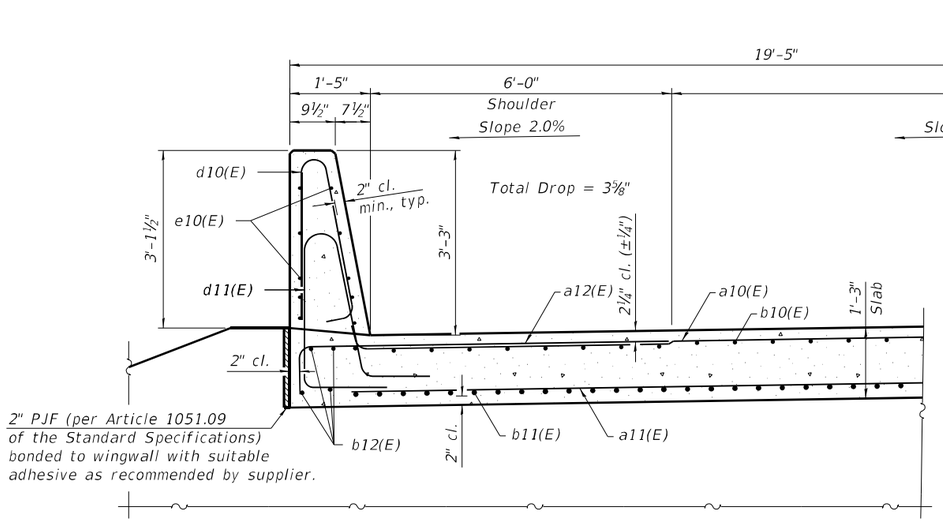


PLAN

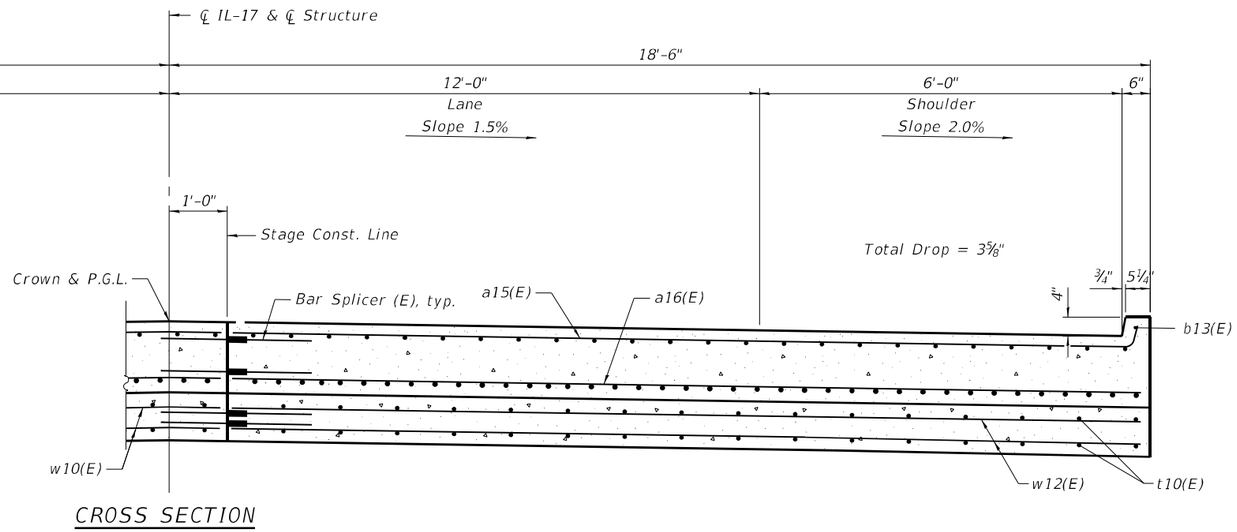
TOP AND BOTTOM ELEVATIONS FOR APPROACH FOOTING

East Approach		
Point	Top	Bottom
A	615.26	614.42
B	615.57	614.73
C	615.55	614.72
D	615.26	614.42
E	615.17	614.34
F	615.48	614.65
G	615.46	614.63
H	615.17	614.34

Note:
See sheet 23 of 25 for bar splicer details.



NEAR ABUTMENT



CROSS SECTION
(Looking East)

AT APPROACH FOOTING

BAIA-CIP-39CS-0 2-1-2023

QUIGG ENGINEERING INC	USER NAME = cstokes	DESIGNED - CFS	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EAST BRIDGE APPROACH SLAB DETAILS STRUCTURE NO. 046-0162
	0460162-66L10-014-E Appr.dgn	CHECKED - KWB	REVISED -		SHEET 14 OF 25 SHEETS
	PLOT SCALE =	DRAWN - CFS	REVISED -		
	PLOT DATE =	CHECKED - MDC	REVISED -		

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	41
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
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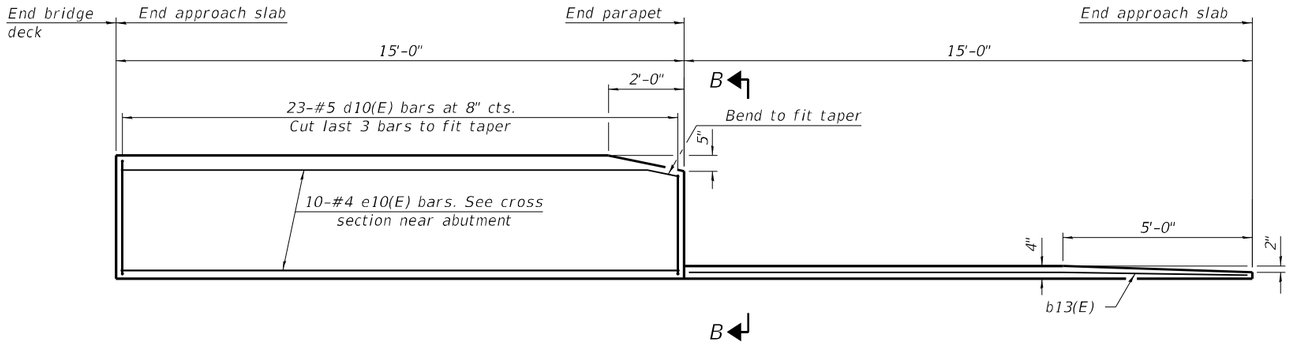
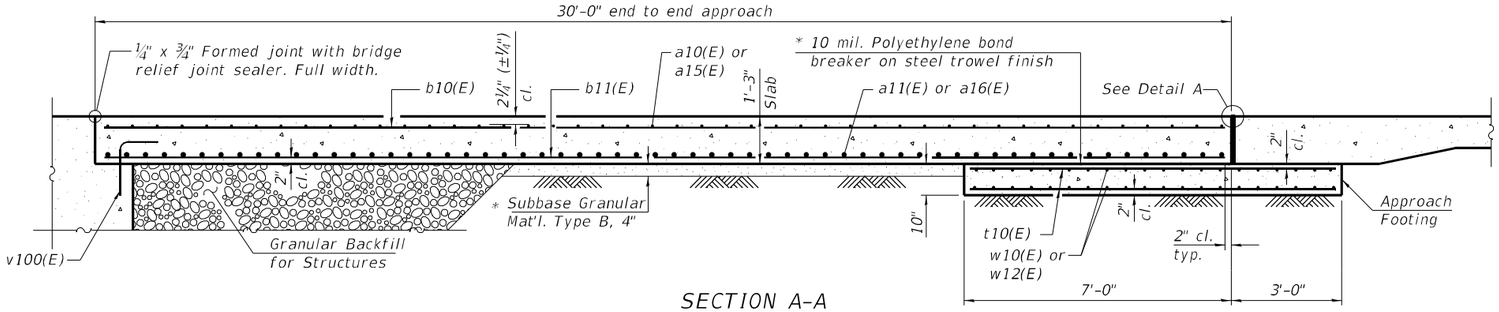
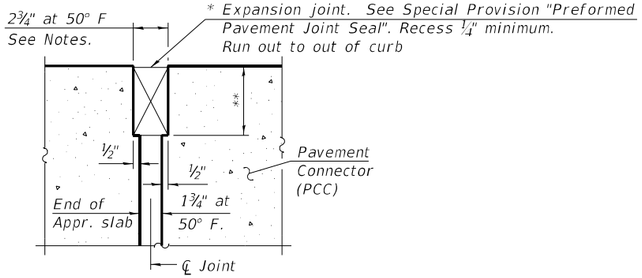


INSIDE ELEVATION OF PARAPET AND CURB



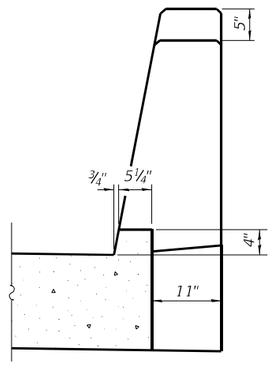
SECTION A-A



DETAIL A

* Cost included with Concrete Superstructure (Approach Slab).

** Per manufacturer recommendations



VIEW B-B

Notes:

The joint opening shall be adjusted for temperature per Article 520.04 of the Standard Specifications. However, since this detail is for jointless structures, the length of bridge used to calculate the adjustment shall be equal to half the total bridge length plus the length of the bridge approach slab.

Parapet concrete shall be paid for as Concrete Superstructure.

Approach slab shall be paid for as Concrete Superstructure (Approach Slab).

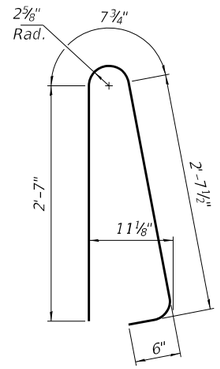
Approach footing concrete shall be paid for as Concrete Structures.

The approach footing maximum applied service bearing pressure (Qmax) = 2.0 ksf.

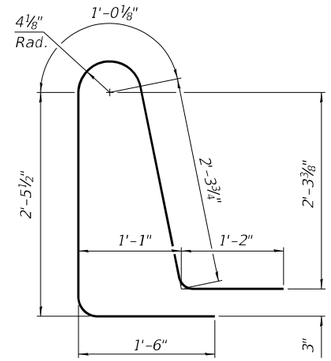
Cost of excavation for approach footing included with Concrete Structures.

For Granular Backfill for Structures and drainage treatment details, see sheet 2 of 25.

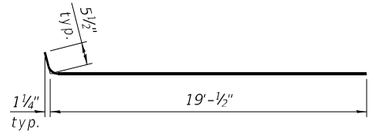
For Type 6 terminal connections see Highway Standard 631031.



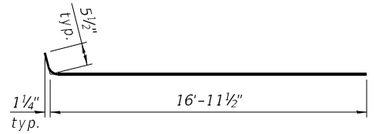
BAR d10(E)



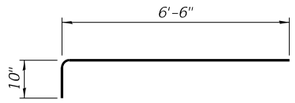
BAR d11(E)



BAR a10(E)



BAR a15(E)



BAR a12(E)

EAST APPROACH BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a10(E)	46	#5	19'-6"	
a11(E)	60	#8	19'-2"	
a12(E)	46	#5	7'-4"	
a15(E)	46	#5	17'-5"	
a16(E)	60	#8	17'-2"	
b10(E)	55	#5	29'-8"	
b11(E)	89	#9	29'-8"	
b12(E)	8	#5	14'-8"	
b13(E)	2	#4	14'-8"	
d10(E)	46	#5	6'-5"	
d11(E)	46	#5	8'-6"	
e10(E)	20	#4	14'-8"	
t10(E)	76	#4	9'-8"	
w10(E)	40	#5	19'-2"	
w12(E)	40	#5	17'-2"	
Concrete Superstructure			Cu. Yd.	3.9
Concrete Superstructure (Approach Slab)			Cu. Yd.	53
Concrete Structures			Cu. Yd.	11.5
Reinforcement Bars, Epoxy Coated			Pound	21,690

BAIA-CIP-39CS-0 2-1-2023

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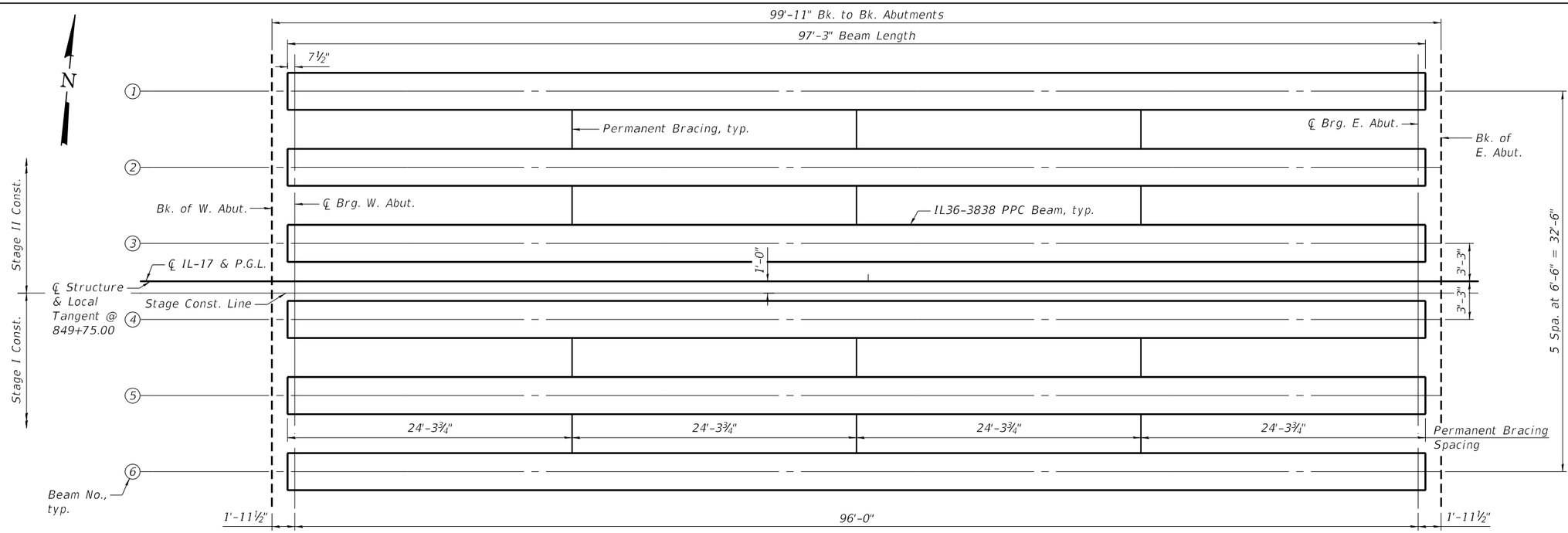
	PLOT DATE =	CHECKED - MDC	REVISED -

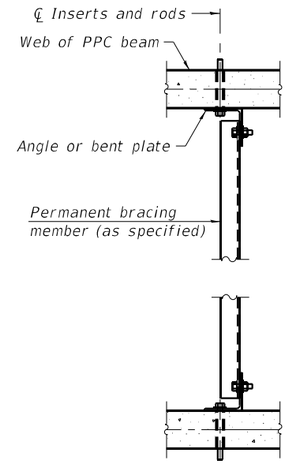
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EAST BRIDGE APPROACH SLAB DETAILS
STRUCTURE NO. 046-0162
SHEET 15 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	42
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



FRAMING PLAN



PLAN

Notes:

All material for bracing shall be hot dip galvanized according to AASHTO M111 unless otherwise noted.

Two hardened washers are required for each set of oversized holes.

All holes shall be 15/16" Ø unless otherwise noted.

5/16" x 3" x 3" plate washers are required over all slotted holes.

All bolts, threaded rods, and hardware shall be galvanized according to AASHTO M232.

Threaded rods shall be ASTM F 1554 Grade 55.

Bracing shall be installed as beams are erected and tightened as soon as possible during erection.

Permanent bracing shall not be paid for separately, but shall be included in the cost of Furnishing and Erecting Precast Prestressed Concrete Beams.

* Fabricator shall locate to miss strands within permissible tolerances.

** Alternate MC6x18 channels are permitted to facilitate material acquisition.

*** Place pads as necessary to provide a flat mounting surface between the steel and concrete.

PERMANENT BRACING DETAILS FOR IL36 BEAMS

INTERIOR BEAM MOMENT TABLE		
		0.5 Sp. 1
I	(in^4)	124,639
I'	(in^4)	297,192
S_b	(in^3)	7,563
S_b'	(in^3)	11,852
S_t	(in^3)	6,385
S_t'	(in^3)	27,206
DC1	(k/')	1.565
M_{DC1}	('k)	1,803
DC2	(k/')	0.175
M_{DC2}	('k)	202
DW	(k/')	0.325
M_{DW}	('k)	374
LLDF		0.548
M_{L+IM}	('k)	1,461

INTERIOR BEAM REACTION TABLE		
		Abutments
LLDF		0.716
OCF		1.000
R_{DC1}	(k)	75.1
R_{DC2}	(k)	8.4
R_{DW}	(k)	15.6
R_{L+IM}	(k)	83.9
R_{Total} (Strength I)(Impact)	(k)	274.6
R_{Total} (Strength I)(No Impact)	(k)	247.7

I: Non-composite moment of inertia of beam section ($in.^4$).

I': Composite moment of inertia of beam section ($in.^4$).

S_b: Non-composite section modulus for the bottom fiber of the prestressed beam ($in.^3$).

S_b': Composite section modulus for the bottom fiber of the prestressed beam ($in.^3$).

S_t: Non-composite section modulus for the top fiber of the prestressed beam ($in.^3$).

S_t': Composite section modulus for the top fiber of the prestressed beam ($in.^3$).

DC1: Un-factored non-composite dead load (kips/ft.).

M_{DC1}: Un-factored moment due to non-composite dead load (kip-ft.).

DC2: Un-factored long-term composite (superimposed excluding future wearing surface) dead load (kips/ft.).

M_{DC2}: Un-factored moment due to long-term composite (superimposed excluding future wearing surface) dead load (kip-ft.).

DW: Un-factored long-term composite (superimposed future wearing surface only) dead load (kips/ft.).

M_{DW}: Un-factored moment due to long-term composite (superimposed future wearing surface only) dead load (kip-ft).

LLDF: Live Load Distribution Factor for moment and shear computed according to Article 4.6.2.2 and further IDOT provisions.

M_{L+IM}: Un-factored live load moment plus dynamic load allowance (impact) (kip-ft.).

OCF: Obtuse Correction Factor computed according to Article 4.6.2.2.3c or as further simplified by IDOT provisions.

R_{DC1}: Un-factored reaction due to non-composite dead load (kip).

R_{DC2}: Un-factored reaction due to long-term composite (superimposed excluding future wearing surface) dead load (kip).

R_{DW}: Un-factored reaction due to long-term composite (superimposed future wearing surface only) dead load (kip).

R_L: Un-factored live load reaction (kip).

R_{IM}: Un-factored dynamic load allowance (impact) (kip).

R_{Total} (Strength I)(Impact): Total factored reaction including dynamic load allowance (impact) (kip).

R_{Total} (Strength I)(No Impact): Total factored reaction not including dynamic load allowance (impact) (kip).

MODEL: Default
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0460162-66L10-016-Framing.dgn	CHECKED - KWB	REVISED -	
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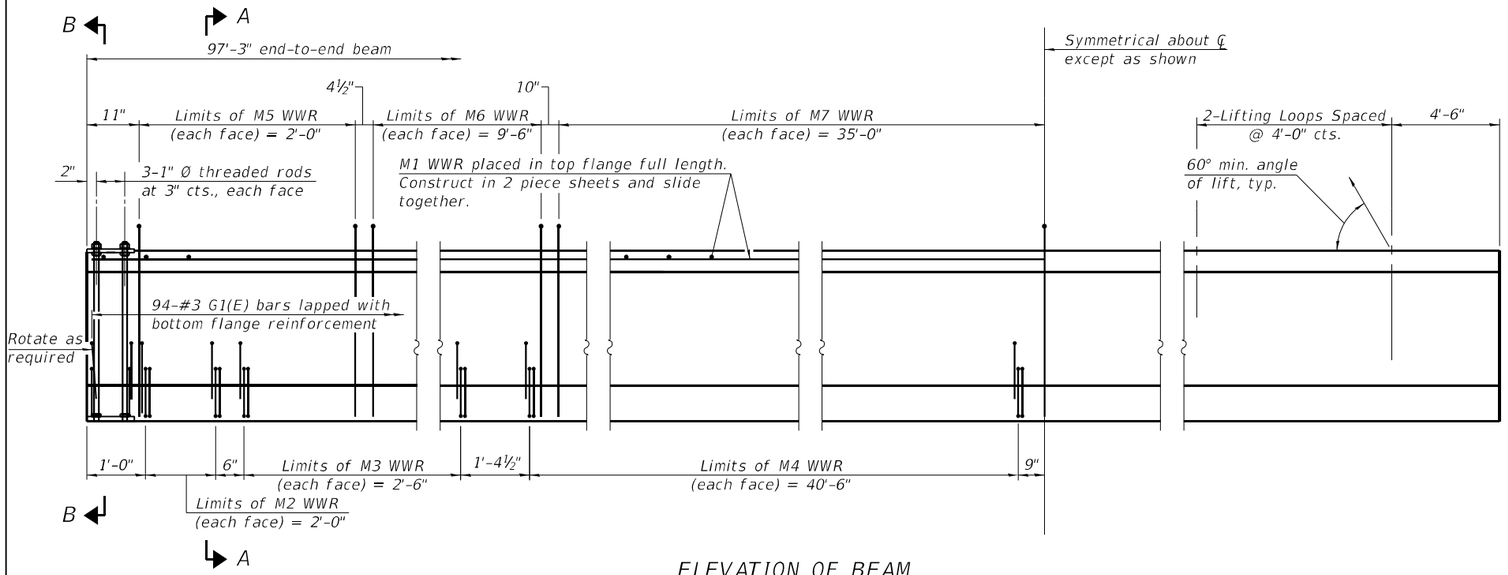
PLOT DATE =	CHECKED - MDC	REVISED -	

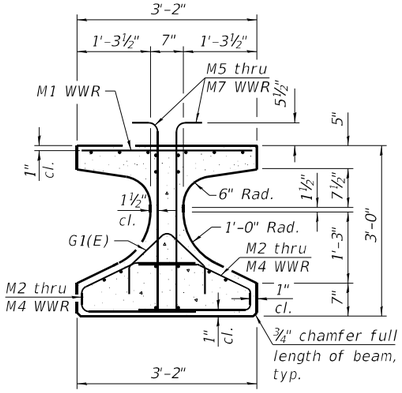
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

FRAMING PLAN
STRUCTURE NO. 046-0162
SHEET 16 OF 25 SHEETS

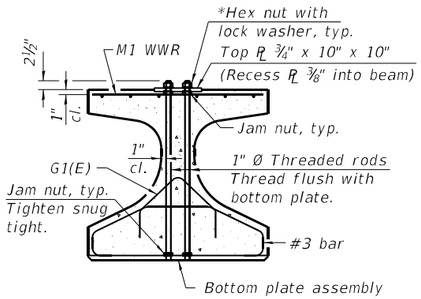
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	43
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



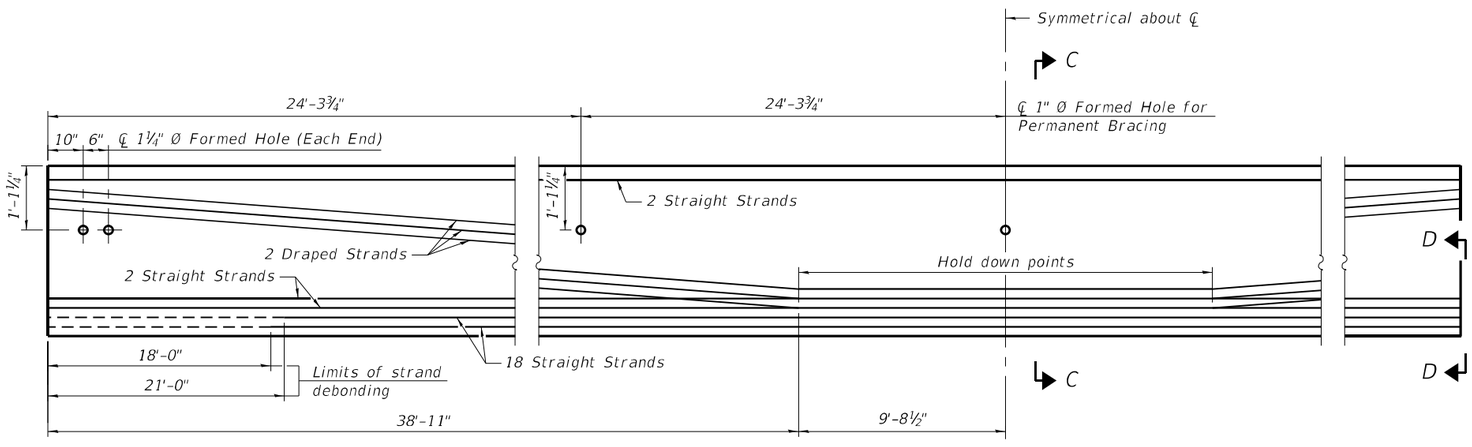
ELEVATION OF BEAM
(Showing reinforcement & dimensions)



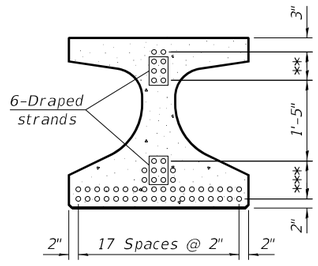
SECTION A-A



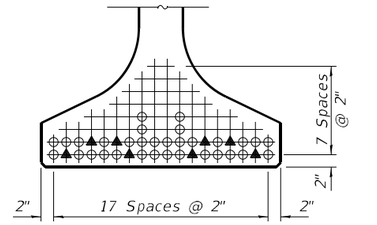
SECTION B-B
*Only tighten sufficiently to
compress lock washers



ELEVATION OF BEAM
(Showing prestressing steel)

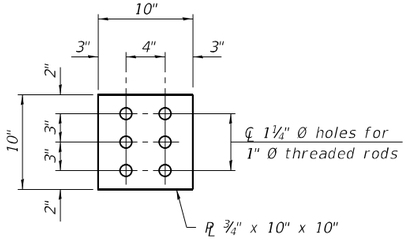


SECTION C-C
(48-0.6" Ø 270 ksi strands)
** 3 Spa. at 2" = 6"
*** 4 Spa. at 2" = 8"

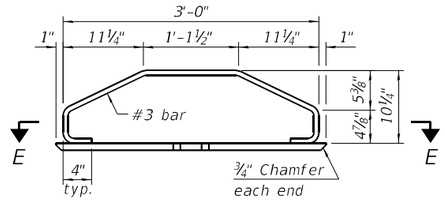


VIEW D-D
○ Fully bonded strand
▲ Partially debonded strand

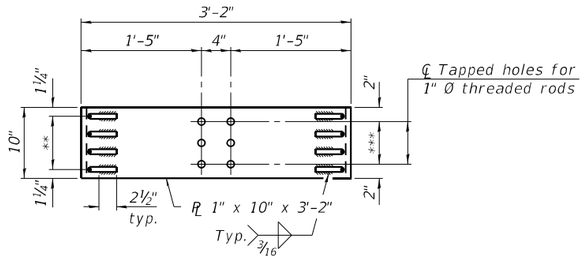
Note:
See sheet 18 of 25 for additional
details and Bill of Material.



PLAN - TOP PLATE



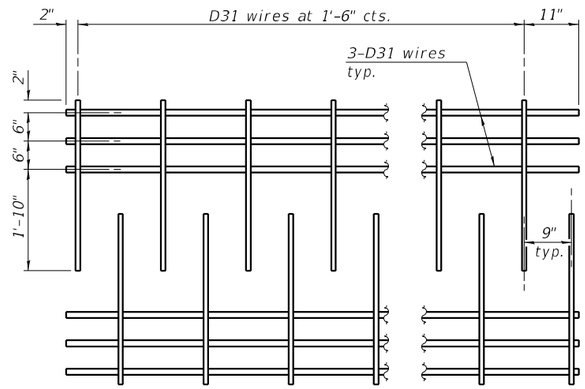
ELEVATION - BOTTOM PLATE ASSEMBLY



SECTION E-E

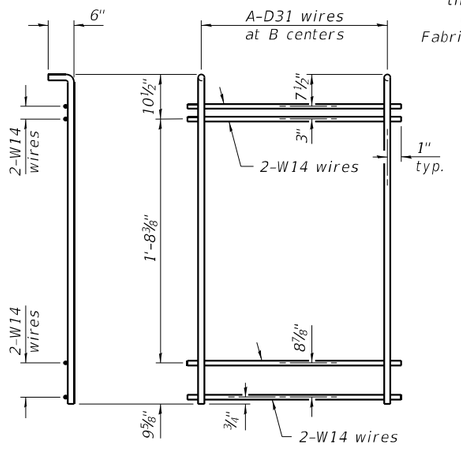
** 3 Spaces at 2½" = 7½"

*** 2 Spaces at 3" = 6"



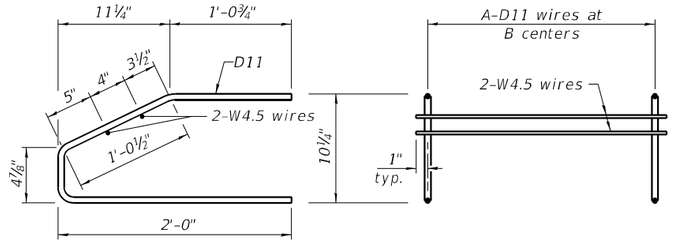
M1 WWR DETAIL

When multiple sheets of M1 WWR are required along the beam length, #5(E) bars (5'-0" long) shall be used to splice the longitudinal D31 wires together (Min. Lap 2'-2").



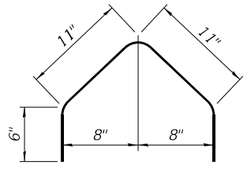
M5 THRU M7 WWR DETAIL

(See Table of Dimensions)



M2 THRU M4 WWR DETAIL

(See Table of Dimensions)



BAR G1(E)

NOTES

Inserts for ¾" Ø threaded dowel rods, when specified, are to be two strut, ferrule type for interior beams and single ferrule, flared loop type for exterior beams.

Prestressing steel shall be uncoated high strength, low relaxation 7-wire strand, Grade 270. The nominal diameter for beam strands shall be 0.6" and the nominal cross-sectional area shall be 0.217 sq. in. The nominal diameter for lifting loops shall be ½" and the nominal cross sectional area shall be 0.153 sq. in.

The beams shall have a final concrete compressive strength, f'c, of 8500 psi and a release concrete compressive strength, f'ci, of 6500 psi.

A minimum 2½" Ø lifting pin shall be used to engage the lifting loops during handling.

The top and bottom plates shall be AASHTO M270 Grade 50.

The top plates and bottom plate assemblies shall be galvanized according to AASHTO M111. The threaded rods, nuts and washers shall be galvanized according to AASHTO M232.

Threaded rods shall be ASTM F 1554 Grade 55.

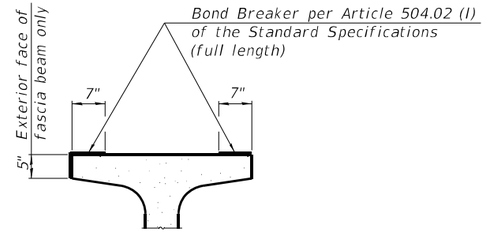
Welded Wire Reinforcement (WWR) shall conform to ASTM A884 with a Class A, Type 1 epoxy coating or ASTM A1060, Table 3 galvanized coating.

TABLE OF DIMENSIONS

(The WWR designs assume grade 60. If necessary, this permits the fabricator to directly substitute grade 60 rebar as detailed in the Manual for Fabrication of Precast Prestressed Concrete Products.)

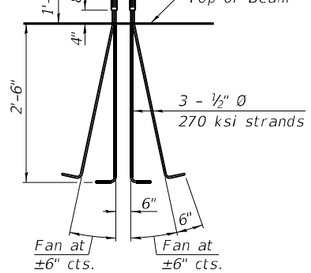
SPAN

WWR	A	B
M2	9	3"
M3	6	6"
M4	28	1'-6"
M5	9	3"
M6	20	6"
M7	71	1'-0"



SECTION THRU TOP FLANGE

(Showing limits of bond breaker)



LIFTING LOOP DETAIL

BILL OF MATERIAL

Item	Unit	Total
Furnishing and Erecting Precast Prestressed Concrete Beams, IL36	Ft.	583.5

IL36-3838D 2-1-2023

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	PLOT DATE =	CHECKED - MDC	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

IL36 BEAM DETAILS
STRUCTURE NO. 046-0162
SHEET 18 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	45
		CONTRACT NO. 66L10		
		ILLINOIS	FED. AID PROJECT	

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21IL082 - PTB 201-27 D3-Wight-Various I&II\WO #8 - 15P BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-018-Beam Details.dgn
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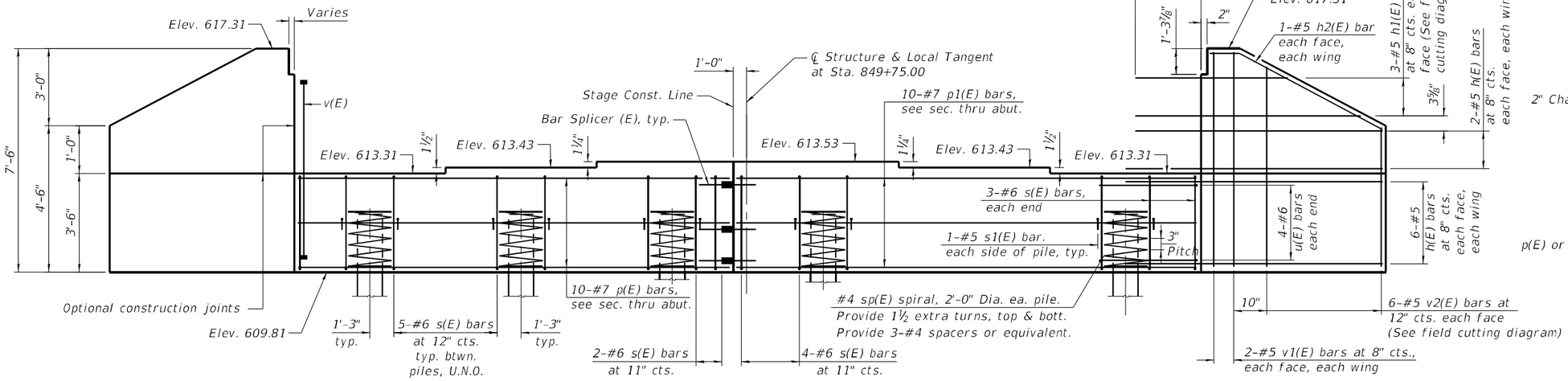

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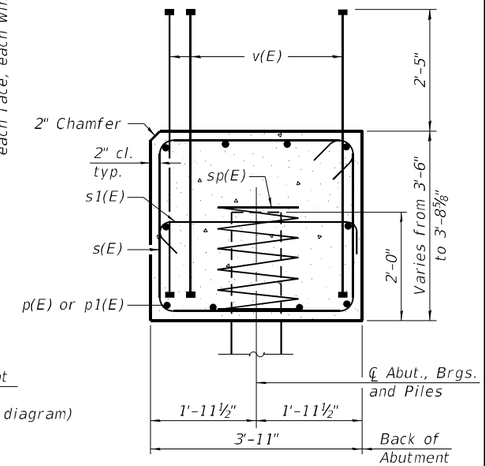

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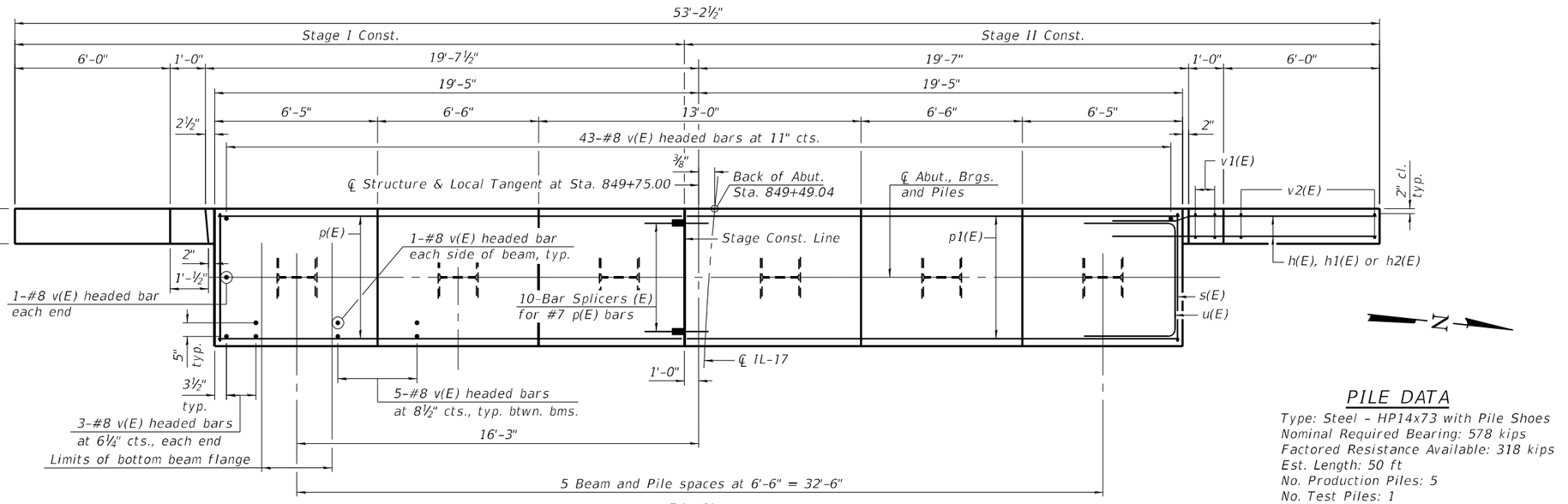


PLAN

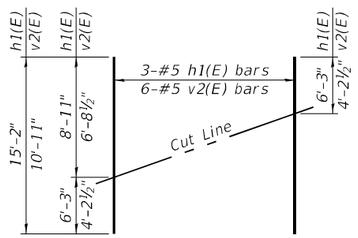
BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h(E)	32	#5	9'-3"	
h1(E)	6	#5	15'-2"	
h2(E)	4	#5	7'-2"	
p(E)	10	#7	18'-1"	
p1(E)	10	#7	20'-1"	
s(E)	32	#6	14'-10"	
s1(E)	12	#5	4'-7"	
sp(E)	6	#4	2'-0"	
u(E)	8	#6	12'-1"	
v(E)	88	#8	5'-8"	
v1(E)	8	#5	7'-2"	
v2(E)	12	#5	10'-11"	
Structure Excavation		Cu. Yd.	180	
Concrete Structures		Cu. Yd.	23.7	
Reinforcement Bars, Epoxy Coated		Pound	3,940	
Furnishing Steel Piles HP14x73		Foot	250	
Driving Piles		Foot	250	
Test Pile Steel HP14x73		Each	1	
Pile Shoes		Each	6	

* Length is height of spiral.

PILE DATA

Type: Steel - HP14x73 with Pile Shoes
Nominal Required Bearing: 578 kips
Factored Resistance Available: 318 kips
Est. Length: 50 ft
No. Production Piles: 5
No. Test Piles: 1
No. Pile Shoes: 6

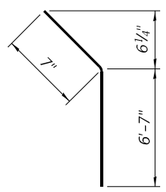


FIELD CUTTING DIAGRAM

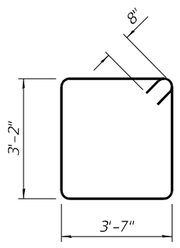
Order h1(E) and v2(E) full length. Cut as shown and use remainder of bars in opposite wing.

BAR v(E)

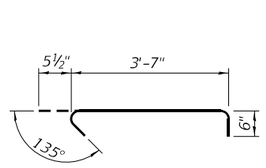
(Headed)
(176-#8 Bar Terminators)



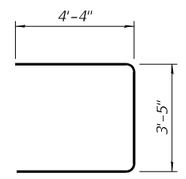
BAR h2(E)



BAR s(E)



BAR s1(E)



BAR u(E)

Notes:
Pour steps monolithically with cap.
Bar terminators, paid for separately. See Total Bill of Material.
See sheet 21 of 25 for details of piles.
See sheet 23 of 25 for bar splicer details.

AI-CBS-0

6-15-2019

QUIGG ENGINEERING INC

USER NAME = JCray	DESIGNED - CFS	REVISED -	
0460162-66L10-019-W Abut.dgn	CHECKED - KWB	REVISED -	
PLOT SCALE =	DRAWN - CFS	REVISED -	
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

WEST ABUTMENT
STRUCTURE NO. 046-0162
SHEET 19 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	46
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21L082 - PTB 201-27 D3-Wght-Various I&II\WO #8 - 1SP BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-019-W Abut.dgn
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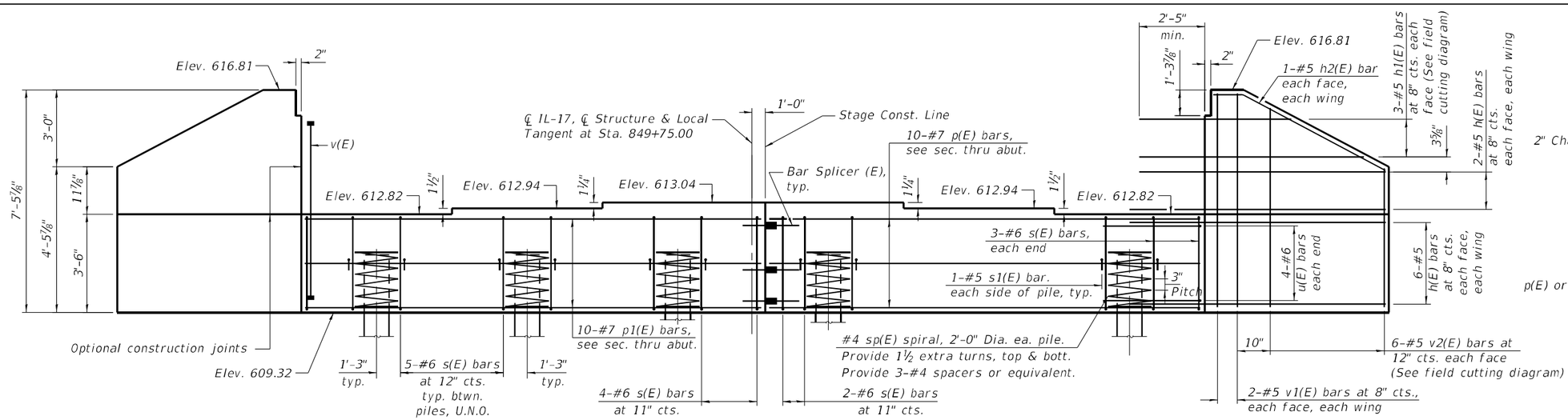

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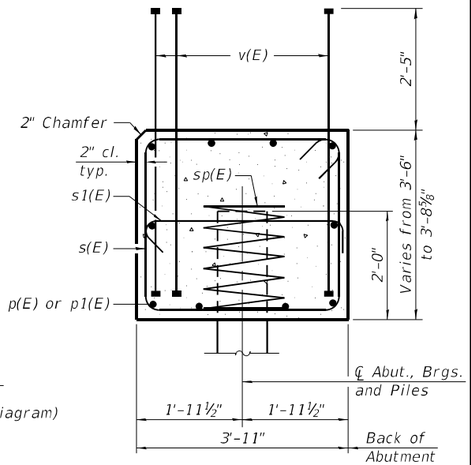

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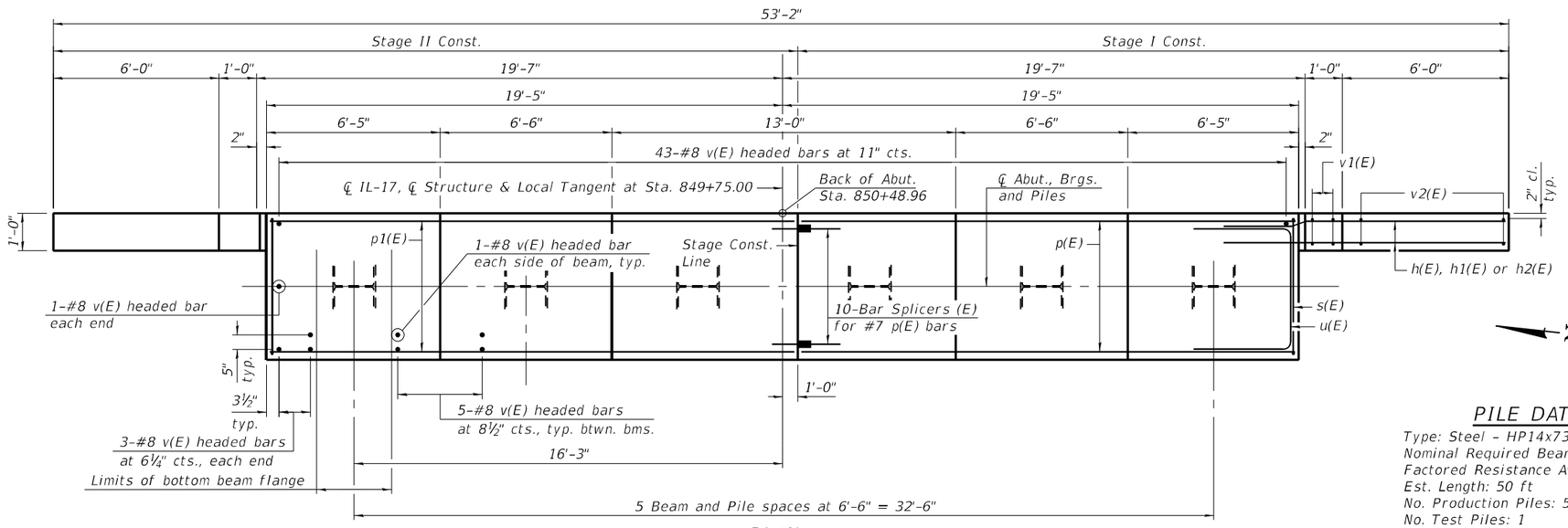

PLAN

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h(E)	32	#5	9'-3"	
h1(E)	6	#5	15'-2"	
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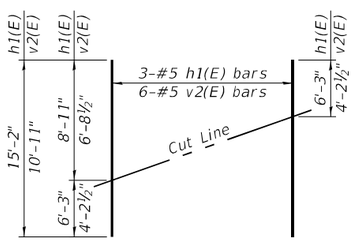
p1(E)	10	#7	20'-1"	
s(E)	32	#6	14'-10"	
s1(E)	12	#5	4'-7"	
sp(E)	6	#4	2'-0"	
u(E)	8	#6	12'-1"	
v(E)	88	#8	5'-8"	
v1(E)	8	#5	7'-2"	
v2(E)	12	#5	10'-11"	
Structure Excavation	Cu. Yd.		179	
Concrete Structures	Cu. Yd.		23.7	
Reinforcement Bars, Epoxy Coated	Pound		3,940	
Furnishing Steel Piles HP14x73	Foot		250	
Driving Piles	Foot		250	
Test Pile Steel HP14x73	Each		1	
Pile Shoes	Each		6	

* Length is height of spiral.

PILE DATA

Type: Steel - HP14x73 with Pile Shoes
Nominal Required Bearing: 578 kips
Factored Resistance Available: 318 kips
Est. Length: 50 ft
No. Production Piles: 5
No. Test Piles: 1
No. Pile Shoes: 6

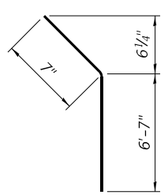


FIELD CUTTING DIAGRAM

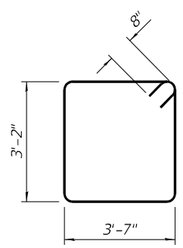
Order h1(E) and v2(E) full length. Cut as shown and use remainder of bars in opposite wing.

BAR v(E)

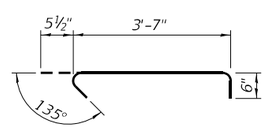
(Headed)
(176-#8 Bar Terminators)



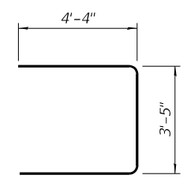
BAR h2(E)



BAR s(E)



BAR s1(E)



BAR u(E)

Notes:
Pour steps monolithically with cap.
Bar terminators, paid for separately. See Total Bill of Material.
See sheet 21 of 25 for details of piles.
See sheet 23 of 25 for bar splicer details.

AI-CBS-0 6-15-2019

QUIGG ENGINEERING INC	USER NAME = JCray	DESIGNED - CFS	REVISED -
	0460162-66L10-020-E Abut.dgn	CHECKED - KWB	REVISED -
	PLOT SCALE =	DRAWN - CFS	REVISED -
	PLOT DATE =	CHECKED - MDC	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EAST ABUTMENT
STRUCTURE NO. 046-0162
SHEET 20 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	47
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\bs01\Projects\2021\2111L082 - PTB 201-27 D3-Wight-Various I&II\WO #8 - 1SP BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-020-E Abut.dgn
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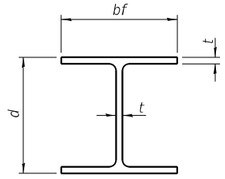
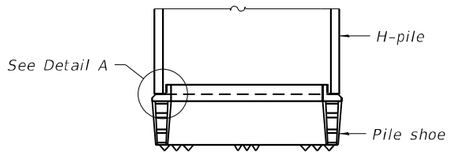


STEEL PILE TABLE

Designation	Depth d	Flange width bf	Web and Flange thickness t	Encasement diameter A
HP 14x117	14 1/4"	14 7/8"	13/16"	30"
x102	14"	14 3/4"	11/16"	30"
x89	13 7/8"	14 3/4"	5/8"	30"
x73	13 5/8"	14 5/8"	1/2"	30"
HP 12x84	12 1/4"	12 1/4"	11/16"	24"
x74	12 1/8"	12 1/4"	5/8"	24"
x63	12"	12 1/8"	1/2"	24"
x53	11 3/4"	12"	7/16"	24"
HP 10x57	10"	10 1/4"	9/16"	24"
x42	9 3/4"	10 1/8"	7/16"	24"
HP 8x36	8"	8 1/8"	7/16"	18"



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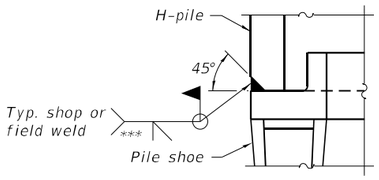
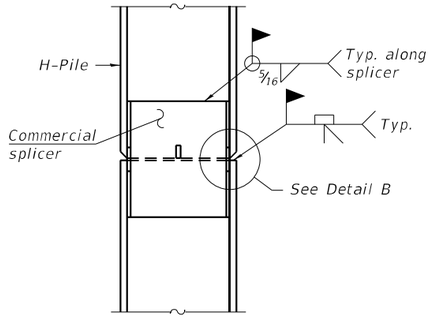


DETAIL A

SHOE ATTACHMENT

Note:
The steel H-piles shall be according to AASHTO M270 Grade 50.



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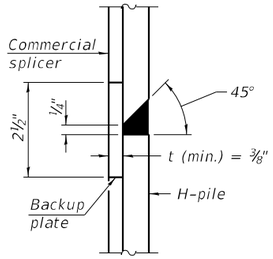
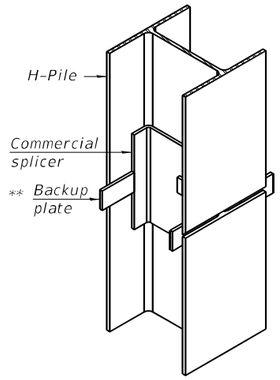
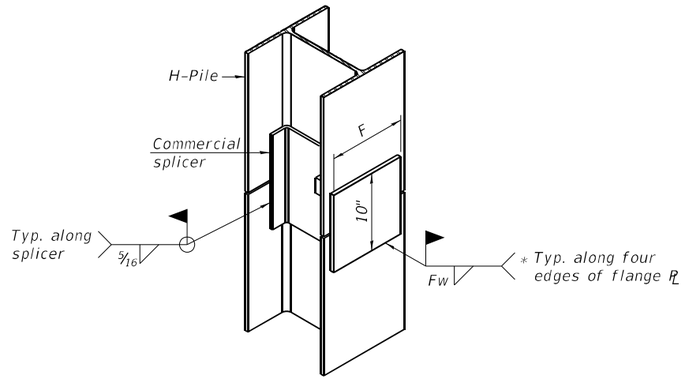


DETAIL "B"



ISOMETRIC VIEW

WELDED COMMERCIAL SPLICE



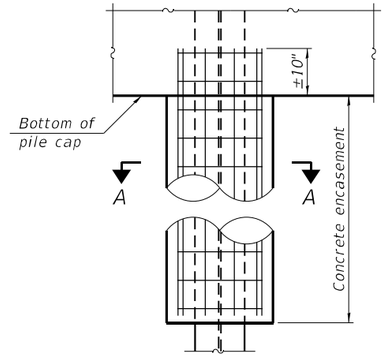
ISOMETRIC VIEW

WELDED COMMERCIAL SPLICE ALTERNATE

* Interrupt welds 1/4" from end of web and/or each flange.

** Remove portions of backup plates that extend outside the flanges.

*** Weld size per pile shoe manufacturer (5/16" min.).



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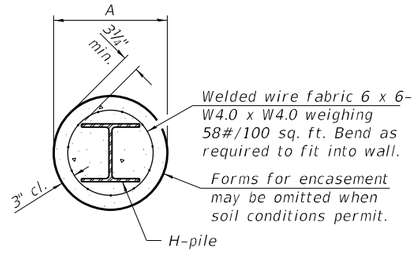
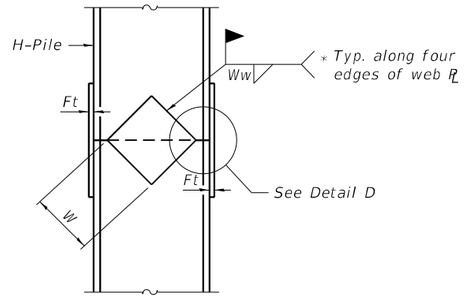


SECTION A-A

INDIVIDUAL PILE CONCRETE ENCASEMENT

(when specified)



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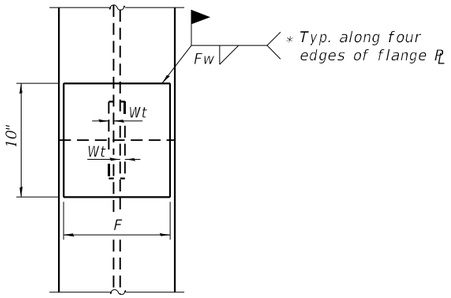
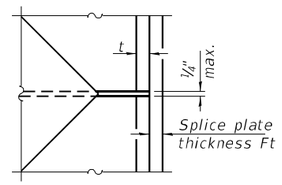


END VIEW



DETAIL D

Designation	F	Ft	Fw	W	Wt	Ww
HP 14x117	12 1/2"	1"	7/8"	7 3/4"	5/8"	1/2"
x102	12 1/2"	7/8"	3/4"	7 3/4"	5/8"	1/2"
x89	12 1/2"	3/4"	11/16"	7 3/4"	5/8"	1/2"
x73	12 1/2"	5/8"	9/16"	7 3/4"	5/8"	1/2"
HP 12x84	10"	7/8"	11/16"	6 1/2"	5/8"	1/2"
x74	10"	7/8"	11/16"	6 1/2"	5/8"	1/2"
x63	10"	5/8"	1/2"	6 1/2"	1/2"	3/8"
x53	10"	5/8"	1/2"	6 1/2"	1/2"	3/8"
HP 10x57	8"	3/4"	9/16"	5 1/4"	1/2"	3/8"
x42	8"	5/8"	9/16"	5 1/4"	1/2"	3/8"
HP 8x36	7"	5/8"	7/16"	4 1/4"	1/2"	3/8"

WELDED PLATE FIELD SPLICE

F-HP 2-1-2023

QUIGG ENGINEERING INC

USER NAME = cstokes	DESIGNED - CFS	REVISED -	
0460162-66L10-021-Pile.dgn	CHECKED - KWB	REVISED -	
PLOT SCALE =	DRAWN - CFS	REVISED -	
PLOT DATE =	CHECKED - MDC	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

HP PILE DETAILS
STRUCTURE NO. 046-0162
SHEET 21 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	48
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21IL082 - PTB 201-27 D3-Wight-Various I&II\WO #8 - 15P BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-021-Pile.dgn
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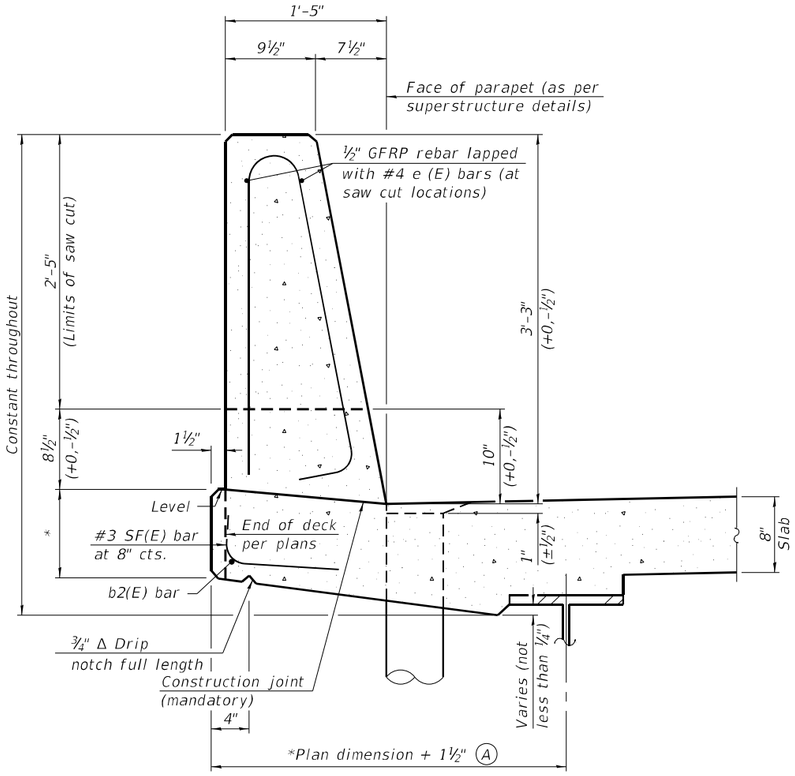
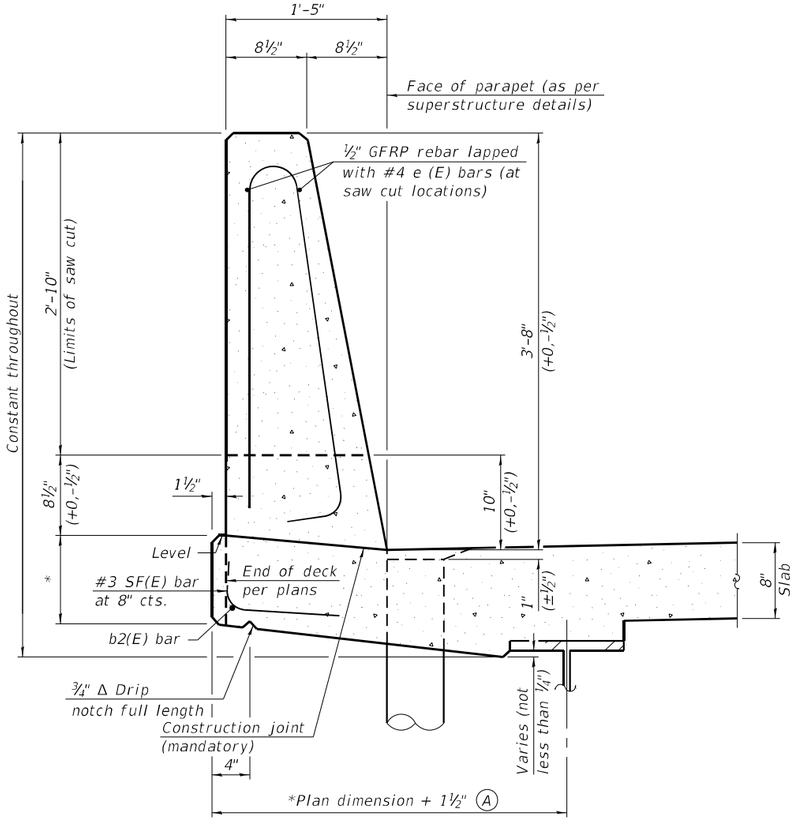


39" CONSTANT-SLOPE PARAPET SECTION

(Showing dimensions, d(E), and ½" Ø GFRP rebar)



44" CONSTANT-SLOPE PARAPET SECTION

(Showing dimensions, d(E), and ½" Ø GFRP rebar)

*See Superstructure Details.

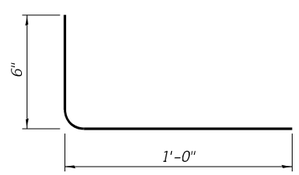
Notes:

All dimensions shall remain the same as shown on superstructure details, except dimension A which is to be revised as shown. Additional concrete needed to revise dimension A = 0.00348 cu. yds./ft. for 39" and 44" parapets.

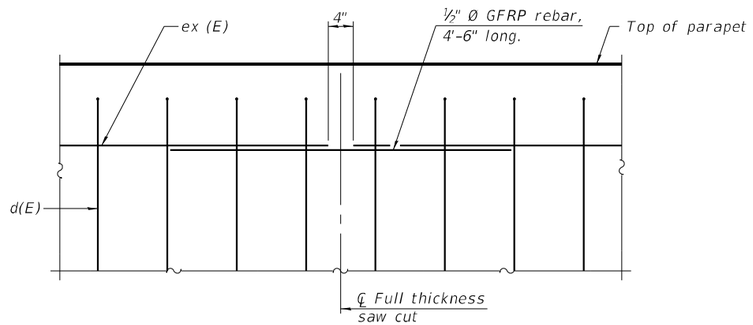
Place full depth aluminum sheets as shown on superstructure details.

Replace all cork joint filler locations with a full thickness saw cut.

Steel superstructure shown. Other superstructure types similar.



SF(E) BAR



GFRP REBAR STIFFENING DETAIL

(Place as shown in parapet section at each parapet joint location.)

SFP 39-44

11-1-2022

QUIGG ENGINEERING INC	USER NAME = cstokes	DESIGNED - CFS	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	CONCRETE PARAPET SLIPFORMING OPTION STRUCTURE NO. 046-0162
	0460162-66L10-022-Slipform.dgn	CHECKED - KWB	REVISED -		
	PLOT SCALE =	DRAWN - CFS	REVISED -		
	PLOT DATE =	CHECKED - MDC	REVISED -		SHEET 22 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	49
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

MODEL: Default
FILE NAME: \\bs01\Projects\2021\21IL082 - PTB 201-27 D3-Wgh\-Various I&II\WO #8 - 1SP BR PH2 Design IL-17\CADD\CADD Sheets\0460162-66L10-022-Slipform.dgn
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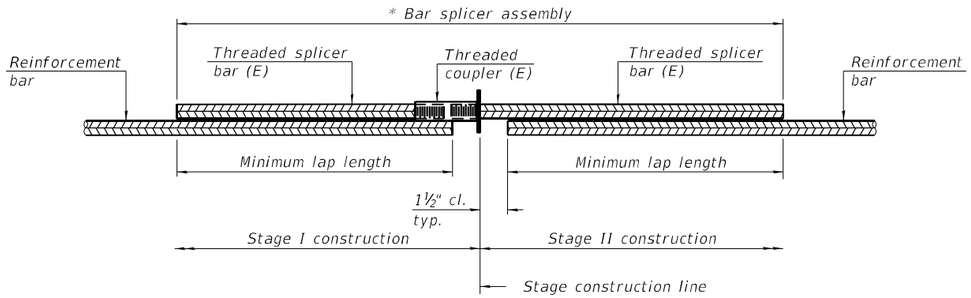


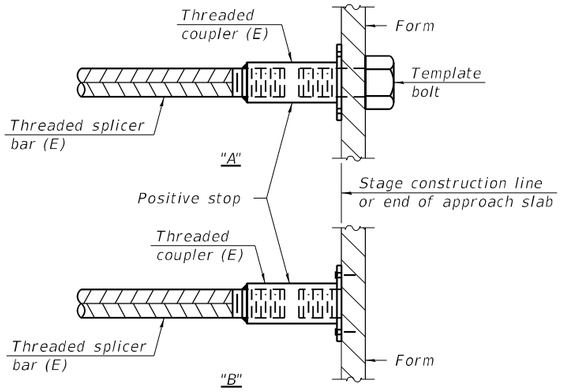
STANDARD BAR SPLICER ASSEMBLY PLAN

Only bar splicer assemblies as presented on the approved QPL list may be used.

Threaded splicer bar length = min. lap length + 1½" + thread length

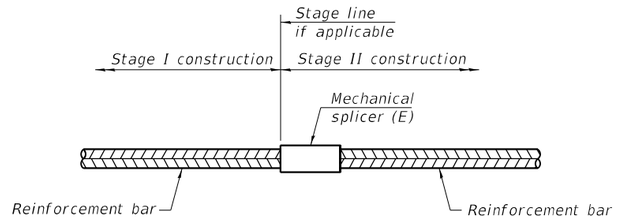
* Epoxy not required on Bar Splicer Assembly components used in conjunction with black bars.

Location	Bar size	No. assemblies required	Minimum lap length
Top of Deck	#5	164	3'-0"
Bottom of Deck	#5	110	3'-6"
End Diaphragm	#6	8	4'-0"
Top of Appr. Slab	#5	92	3'-4"
Bottom of Appr. Slab	#8	120	4'-9"
Appr. Footing	#5	80	3'-2"
Abut. Cap	#7	20	5'-0"



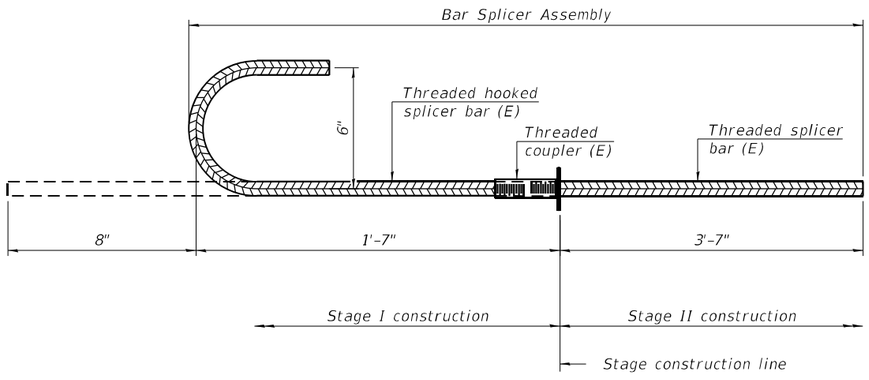
INSTALLATION AND SETTING METHODS

"A" : Set bar splicer assembly by means of a template bolt.
"B" : Set bar splicer assembly by nailing to wood forms or cementing to steel forms.
(E) : Indicates epoxy coating.



STANDARD MECHANICAL SPLICER

Location	Bar size	No. assemblies required



BAR SPLICER ASSEMBLY FOR #6 BAR IN END DIAPHRAGMS

(At Stage Construction Line)
(No. of Assemblies Required = 4)

Notes:
Splicer bars shall be deformed with threaded ends and have a minimum 60 ksi yield strength.
All reinforcement shall be lapped and tied to the splicer bars.
Bar splicer assemblies shall be epoxy coated according to the requirements for reinforcement bars. See Section 508 of the Standard Specifications.
See approved list of bar splicer assemblies and mechanical splicers for alternatives.

QUIGG ENGINEERING INC

USER NAME = cstokes	DESIGNED - CFS	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	BAR SPLICER ASSEMBLY AND MECHANICAL SPLICER DETAILS STRUCTURE NO. 046-0162	
0460162-66L10-023-Splicer.dgn	CHECKED - KWB	REVISED -			
PLOT SCALE =	DRAWN - CFS	REVISED -			
PLOT DATE =	CHECKED - MDC	REVISED -		SHEET 23 OF 25 SHEETS	

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	50
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

rubino ENGINEERING INC.

SOIL BORING LOG

Date 9/29/21

ROUTE FAP 41 (IL 17) **DESCRIPTION** IL 17 over Horse Creek, 0.7 mi. E of Union Hill Rd **LOGGED BY** M.K.

SECTION (13)BR-2 **LOCATION** SW 1/4

COUNTY Kankakee **DRILLING METHOD** Hollow Stem Auger **HAMMER TYPE** Automatic

STRUCT. NO. 046-0031 Existing
Station 849+99

BORING NO. BSB-01 (NW Quad.)
Station 849+29
Offset 27.7Lt
Ground Surface Elev. 615.88 ft

Surface Water Elev. 602.60 ft
Stream Bed Elev. 598.30 ft

Groundwater Elev.:
First Encounter N/A ft
Upon Completion N/A ft
After 18 **Hrs.** 13.5 ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Approximately 8 inches of TOPSOIL 615.22			
FILL: dark brown to black SILTY CLAY to SILTY CLAY LOAM	2 3 2	2.5 P	12
611.88			
FILL: black SANDY LOAM	1 2 1		20
609.88			
Very soft to soft, black SILTY CLAY, trace sand and gravel *A-7-6*	0 0 1	0.3 B	33
LL = 53 *PL = 27* *PI = 26*	0 0 1	0.3 P	30
	3 2 1		14
602.38 ▽			
Stiff, gray SILTY CLAY, trace to little sand and gravel	3 4 6	2.0 B	14
599.88			
Very stiff to hard, gray SILTY CLAY, trace to little sand and gravel	7 8 20	1.3 B	14
	18 20 23	4.5 P	10
Very stiff to hard, gray SILTY CLAY, trace to little sand and gravel *(continued)*	12 13 17	4.5 P	15
592.38			
Very stiff, SILTY LOAM, trace sand and gravel	10 13 15	4.5 P	16
589.88			
Very stiff to hard, gray SILTY CLAY, trace sand and gravel	10 13 21	5.5 B	10
	12 13 16	4.5 P	9
	10 13 17	4.5 P	13

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

BBS, from 137 (Rev. 8-99)

Rubino Report No: G21.171 REV1

rubino ENGINEERING INC.

SOIL BORING LOG

Date 9/29/21

ROUTE FAP 41 (IL 17) **DESCRIPTION** IL 17 over Horse Creek, 0.7 mi. E of Union Hill Rd **LOGGED BY** M.K.

SECTION (13)BR-2 **LOCATION** SW 1/4

COUNTY Kankakee **DRILLING METHOD** Hollow Stem Auger **HAMMER TYPE** Automatic

STRUCT. NO. 046-0031 Existing
Station 849+99

BORING NO. BSB-01 (NW Quad.)
Station 849+29
Offset 27.7Lt
Ground Surface Elev. 615.88 ft

Surface Water Elev. 602.60 ft
Stream Bed Elev. 598.30 ft

Groundwater Elev.:
First Encounter N/A ft
Upon Completion N/A ft
After 18 **Hrs.** 13.5 ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Very stiff to hard, gray SILTY CLAY, trace sand and gravel *(continued)*			
	48 31 22	4.5 P	
	8 9 16	1.6 B	
565.22			
Possible WEATHERED LIMESTONE 565.05	50/2"		
Auger and spoon refusal at approximately 50 feet 10 inches below existing grade due to possible limestone bedrock. End of boring at approximately 50 feet 10 inches below existing grade.			

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

BBS, from 137 (Rev. 8-99)

Rubino Report No: G21.171 REV1

QUIGG ENGINEERING INC

USER NAME = cstokes	DESIGNED - CFS	REVISED -
0460162-66L10-024-Boring.dgn	CHECKED - KWB	REVISED -
PLOT SCALE =	DRAWN - CFS	REVISED -
PLOT DATE =	CHECKED - MDC	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

BORING LOG
STRUCTURE NO. 046-0162
SHEET 24 OF 25 SHEETS

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	51
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

rubino ENGINEERING INC.

SOIL BORING LOG

Date 9/30/21

ROUTE FAP 41 (IL 17) **DESCRIPTION** IL 17 over Horse Creek, 0.7 mi. E of Union Hill Rd **LOGGED BY** M.K.

SECTION (13)BR-2 **LOCATION** SW 1/4

COUNTY Kankakee **DRILLING METHOD** Hollow Stem Auger **HAMMER TYPE** Automatic

STRUCT. NO. 046-0031 Existing
Station 849+99

BORING NO. BSB-02 (SE Quad.)
Station 850+73
Offset 24.5Rt
Ground Surface Elev. 615.27 ft

Surface Water Elev. 602.60 ft
Stream Bed Elev. 598.30 ft

Groundwater Elev.:
First Encounter 16 ft ▼
Upon Completion 22.5 ft ▽
After ____ **Hrs.** N/A ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Approximately 8 inches of TOPSOIL 614.61			
FILL: dark brown silty clay to silty clay loam, trace to little sand and gravel	2 3 6	0.8 B	25
	3 4 6	2.0 B	21
609.27			
Stiff to very stiff, dark brown to black SILTY CLAY LOAM	11 13 13	2.3 P	23
	13 7 7		22
604.27			
Medium stiff, brown and gray SILTY CLAY, trace sand and gravel	2 3 4	1.6 B	23
601.77			
Stiff, gray SILT, trace sand and gravel 601.27	3	3.6	15
Stiff, gray CLAY, trace sand and gravel	5 8	B	
599.27 ▼			
Hard, gray SILTY CLAY LOAM, little sand and gravel	11 12 21	2.5 S	12
596.77			
Very stiff to hard, gray CLAY, trace to little sand and gravel	13 14 17	7.9 S	9
Very stiff to hard, gray CLAY, trace to little sand and gravel *(continued)*	7 10 13	5.8 S	12
	6 12 16	10.5 S	13
	13 20 22	6.2 S	11
586.77			
Hard, gray SILTY CLAY, little sand and gravel	15 16 25		12
	33 28 20	3.0 B	
576.77			
Very stiff to very hard, gray CLAY LOAM, trace gravel and rock chips	9 14 20		15

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

BBS, from 137 (Rev. 8-99)

Rubino Report No: G21.171 REV1

rubino ENGINEERING INC.

SOIL BORING LOG

Date 9/30/21

ROUTE FAP 41 (IL 17) **DESCRIPTION** IL 17 over Horse Creek, 0.7 mi. E of Union Hill Rd **LOGGED BY** M.K.

SECTION (13)BR-2 **LOCATION** SW 1/4

COUNTY Kankakee **DRILLING METHOD** Hollow Stem Auger **HAMMER TYPE** Automatic

STRUCT. NO. 046-0031 Existing
Station 849+99

BORING NO. BSB-02 (SE Quad.)
Station 850+73
Offset 24.5Rt
Ground Surface Elev. 615.27 ft

Surface Water Elev. 602.60 ft
Stream Bed Elev. 598.30 ft

Groundwater Elev.:
First Encounter 16 ft ▼
Upon Completion 22.5 ft ▽
After ____ **Hrs.** N/A ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Very stiff to very hard, gray CLAY LOAM, trace gravel and rock chips *(continued)*			
	34 30 38		13
566.77			
Dense, light gray SANDY LOAM, some gravel and rock chips	20 14 31		12
565.27	50/0"		
Auger and spoon refusal at approximately 50 feet below existing grade due to possible limestone bedrock. End of boring at approximately 50 feet below existing grade.			

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

BBS, from 137 (Rev. 8-99)

Rubino Report No: G21.171 REV1

MODEL: Default
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3/13/2024 3:06:16 PM

QUIGG ENGINEERING INC	USER NAME = cstokes	DESIGNED - CFS	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	BORING LOG STRUCTURE NO. 046-0162
	0460162-66L10-025-Boring.dgn	CHECKED - KWB	REVISED -		SHEET 25 OF 25 SHEETS
	PLOT SCALE =	DRAWN - CFS	REVISED -		
	PLOT DATE =	CHECKED - MDC	REVISED -		

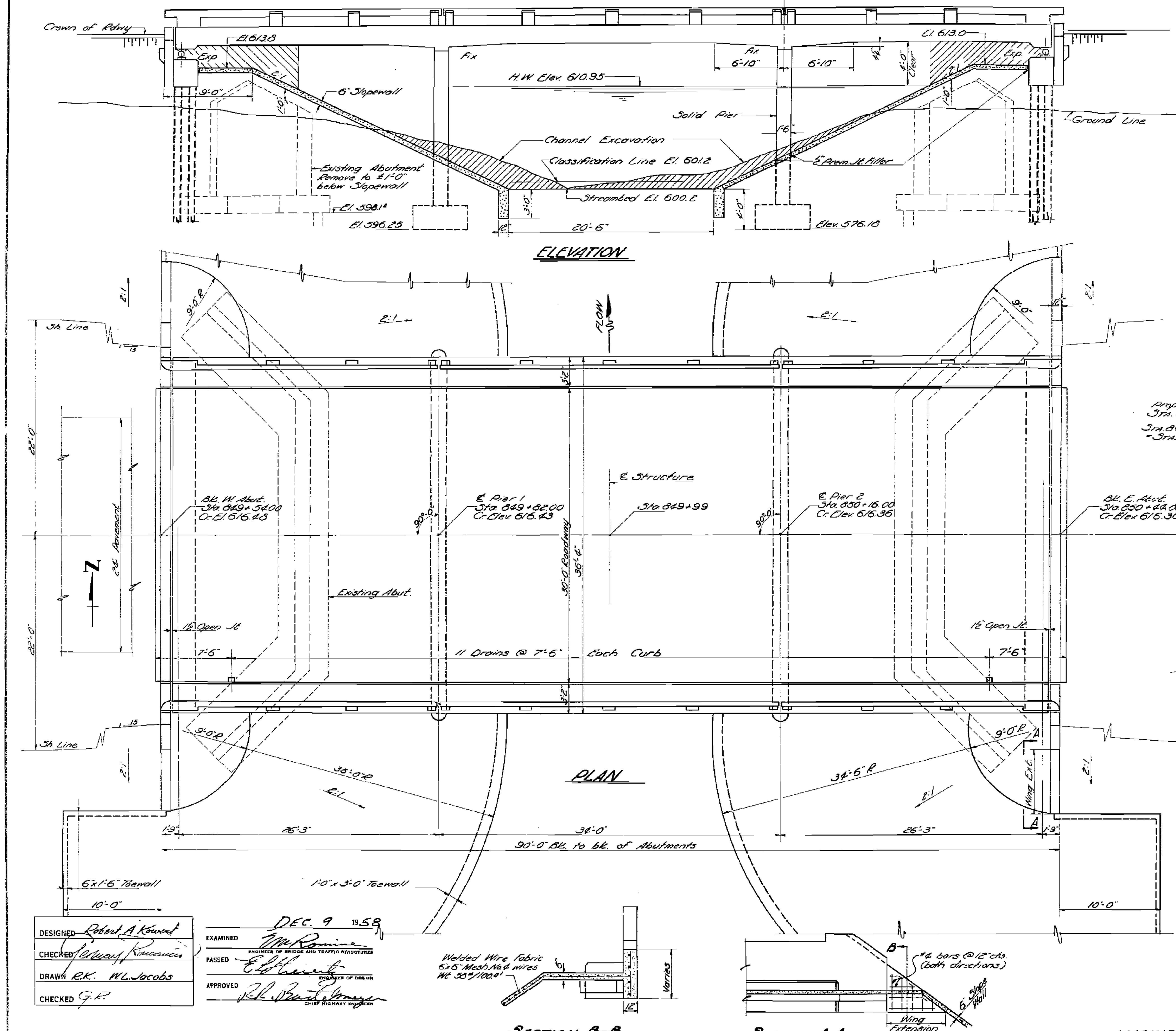
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	52
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

B.M.: #143 □ on W. Abut. 16' Rt. Sta. 849+58. Elev. 614.16.
Existing Structure: Concrete Thru Girder; 1 Span @ 60'; 21'-0" Rdwy. on closed abutments.
To be removed as required by Bridge Contractor before new structure is built.

STATE OF ILLINOIS
DEPARTMENT OF PUBLIC WORKS & BUILDINGS
DIVISION OF HIGHWAYS

ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
S.B.I. 17 F.A.	13 BR	KANKAKEE	19	13
FED. ROAD DIST. NO. 7		ILLINOIS FED. AID PROJECT		

SHEET NO. 1
4 SHEETS



DESIGNED Robert A. Kowert
CHECKED
DRAWN R.K. W.L. Jacobs
CHECKED G.P.
DEC. 9 1958
EXAMINED — ENGINEER OF BRIDGE AND TRAFFIC STRUCTURES
PASSED — ENGINEER OF DESIGN
APPROVED — CHIEF HIGHWAY ENGINEER

GENERAL NOTES

Class X Concrete shall be used throughout except in Handrails. Handrail Concrete shall be used in the Handrails.

The Concrete Floor slab shall be finished in accordance with Article 51.19 of the Standard Specifications.

Slope Wall shall be reinforced with Welded Wire Fabric, 6x6 mesh, #4 wire weighing #58/100 sq.ft.

All Rollers, Bearing Plates, Lead Plates, Pintles and Anchor Bolts shall be fabricated in accordance with Article 51.15 of the Standard Specifications and are included in quantity of Structural Steel. Est. Wt. 4520 lbs.

The Roadway Expansion Guard shall be fabricated and erected in accordance with Article 51.13(d) of the Standard Specifications and is included in quantity of Structural Steel. Est. Wt. 1630 lbs. All surfaces of the Expansion Guard inaccessable after erection shall receive two shop coats of red lead paint except the Anchor Straps which shall not be painted.

Except as otherwise provided all Structural Steel shall receive one shop of red paint and two field coats of Aluminum Paint. See Article 56.1 to 56.5 inclusive of the Standard Specifications.

All paint shall be furnished and applied by the Contractor.

The Contractor shall drive one test pile in permanent location at West Abutment before ordering remainder of the piles.

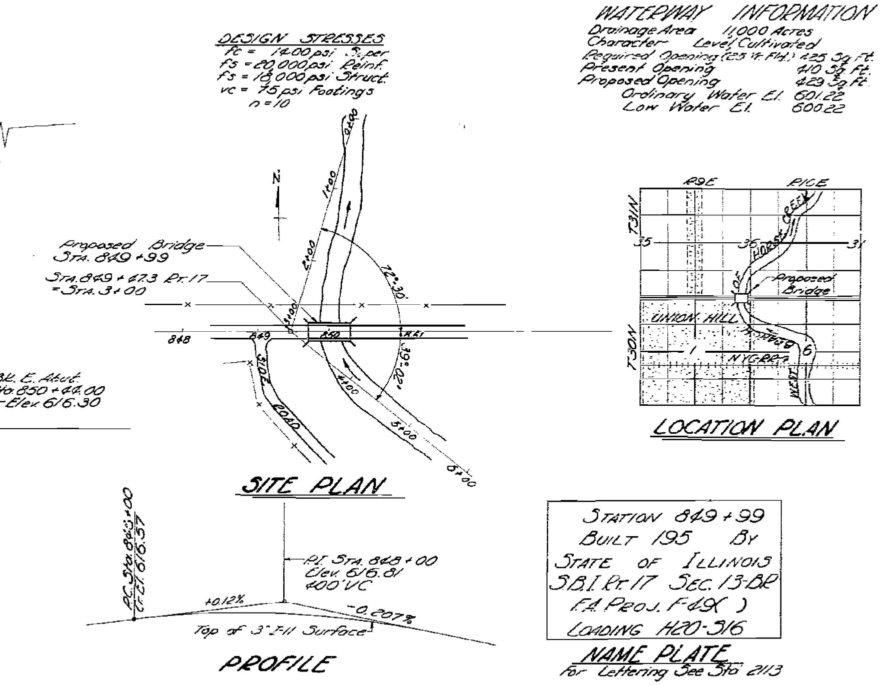
The handrail concrete in the railposts and railing shall be poured in separate operations

DESIGN STRESSES

fc = 1400 psi Super
fs = 20,000 psi Reinf.
fs = 18,000 psi Struct.
vc = 75 psi Footings
n = 10

WATERWAY INFORMATION

Drainage Area 11,000 Acres
Character Level, Cultivated
Required Opening (25 Yr. Fld.) 425 Sq. Ft.
Present Opening 410 Sq. Ft.
Proposed Opening 429 Sq. Ft.
Ordinary Water El. 601.22
Low Water El. 600.22



STATION 849+99
BUILT 195_ BY
STATE OF ILLINOIS
S.B.I. Rt. 17 SEC. 13-BR
F.A. PROJ. F-49( )
LOADING H20-S16

NAME PLATE
For Lettering See Std. 2113

TOTAL BILL OF MATERIAL

ITEM		SUPER	SUB	TOTAL
Class "X" Concrete	Cu. Yds.	149.1	125.3	274.4
Handrail Concrete	Cu. Yds.	4.3		4.3
Reinforcement Bars	Lbs.	37970	8210	46180
Structural Steel	Lbs.	6200		6200
Concrete Piles	Lin. Ft.		180	180
Test Piles (Concrete)	Each		One	One
Class A Excavation for Structures	Cu. Yds.		90	90
Class B Excavation for Structures	Cu. Yds.		250	250
Channel Excavation	Cu. Yds.		200	200
Removal of Existing Structures	Each			One
Slope Wall	Sq. Yds.		960	960
Name Plates	Each			1

PROJ. F-49( )
GENERAL PLAN & ELEVATION
WEST BRANCH OF HORSE CREEK
S.B.I. Rt. 17 - Sec. 13-BR
KANKAKEE COUNTY
Sta. 849+99

FOR INFORMATION ONLY

Wight	USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EXISTING STRUCTURE PLANS IL 17 OVER HORSE CREEK
		DRAWN - TJB	REVISED -		
	PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -		
	PLOT DATE = 3/7/2024	DATE -	REVISED -		SCALE: NTS SHEET 1 OF 12 SHEETS STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	53
CONTRACT NO. 66L10				
ILLINOIS FED. AID PROJECT				

MODEL: Existing Structure Plans - Existing Structure Plans [Sheet]
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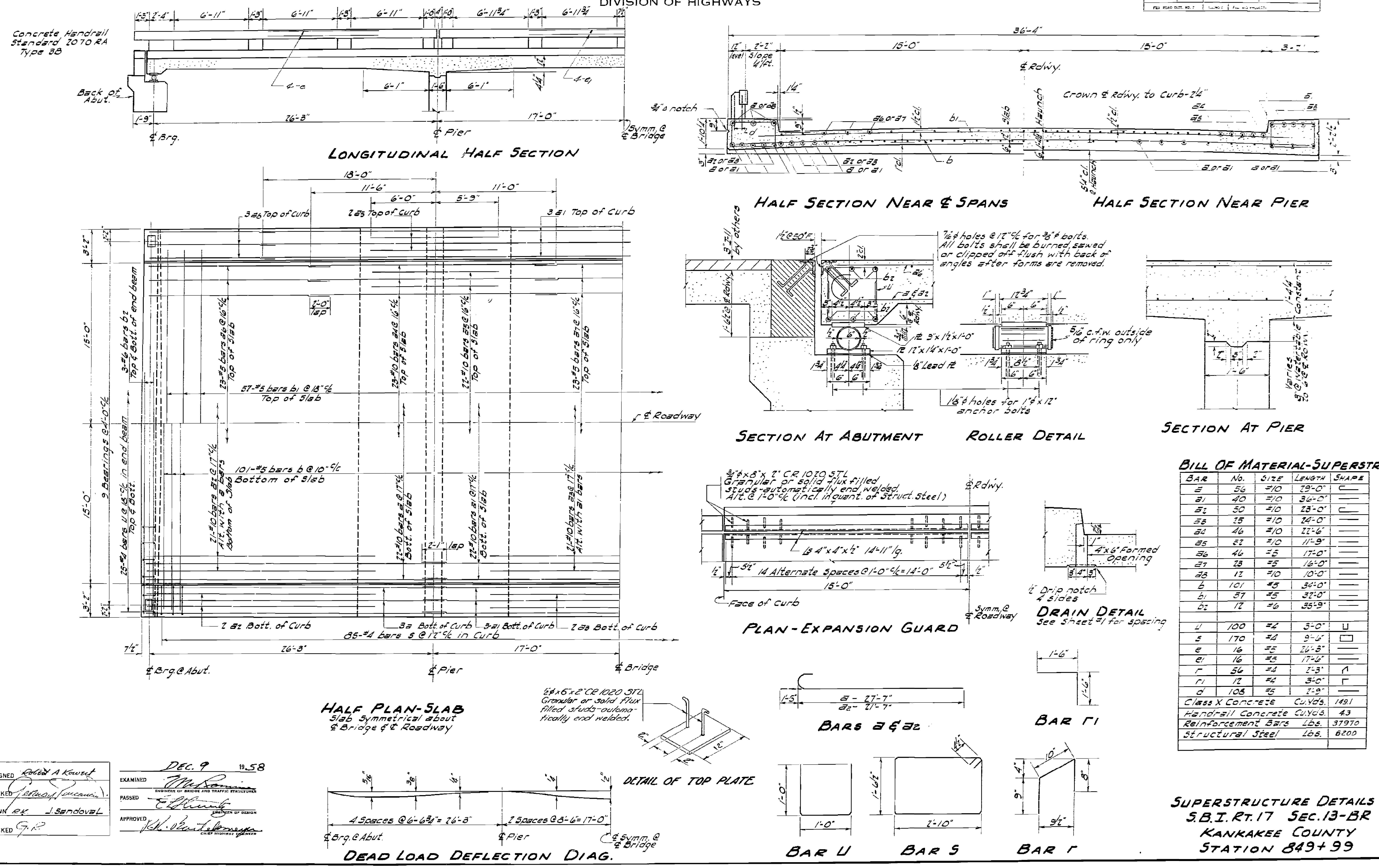
STATE OF ILLINOIS
DEPARTMENT OF PUBLIC WORKS & BUILDINGS
DIVISION OF HIGHWAYS

ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
S.B.I. 17 F.A.	13 BR	KANKAKEE	19	14

SHEET NO. 2
4 SHEETS



BILL OF MATERIAL-SUPERSTR.

BAR	NO.	SIZE	LENGTH	SHAPE
a	56	#10	29'-0"	⊏
a1	40	#10	36'-0"	—
a2	50	#10	23'-0"	⊏
a3	25	#10	24'-0"	—
a4	46	#10	22'-6"	—
a5	52	#10	11'-9"	—
a6	46	#5	17'-0"	—
a7	23	#5	16'-0"	—
a8	12	#10	10'-0"	—
b	101	#5	34'-0"	—
b1	57	#5	32'-0"	—
b2	12	#6	35'-9"	—
u	100	#4	3'-0"	⊔
s	170	#4	9'-6"	▭
e	16	#5	26'-3"	—
e1	16	#5	17'-6"	—
r	56	#4	2'-3"	⋂
r1	12	#4	3'-0"	⌐
d	108	#5	2'-9"	—
Class X Concrete		Cu.Yds.		149.1
Handrail Concrete		Cu.Yds.		43
Reinforcement Bars		Lbs.		37970
Structural Steel		Lbs.		6200

DESIGNED Robert A Kowert
CHECKED [signature]
DRAWN RK J. Sandoval
CHECKED G.R.

DEC. 9 1958
EXAMINED [signature] ENGINEER OF BRIDGE AND TRAFFIC STRUCTURES
PASSED [signature] ENGINEER OF DESIGN
APPROVED [signature] CHIEF HIGHWAY ENGINEER

SUPERSTRUCTURE DETAILS
S.B.I. RT. 17 SEC. 13-BR
KANKAKEE COUNTY
STATION 849+99

FOR INFORMATION ONLY

USER NAME = tbarker	DESIGNED - TJB	REVISED -
	DRAWN - TJB	REVISED -
PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -
PLOT DATE = 3/7/2024	DATE -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EXISTING STRUCTURE PLANS
IL 17 OVER HORSE CREEK

SCALE: NTS | SHEET 2 OF 12 SHEETS | STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	54

CONTRACT NO. 66L10
ILLINOIS | FED. AID PROJECT

MODEL: Existing Structure Plans - Existing Structure Plans-1 [Sheet]
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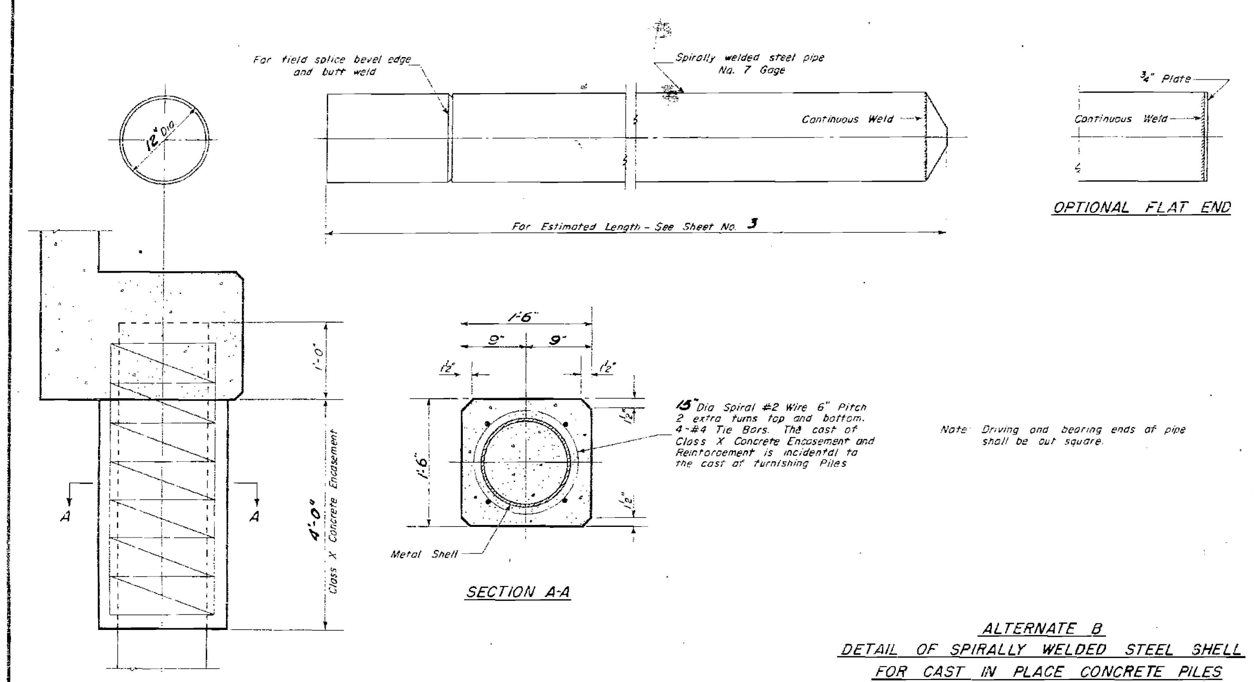
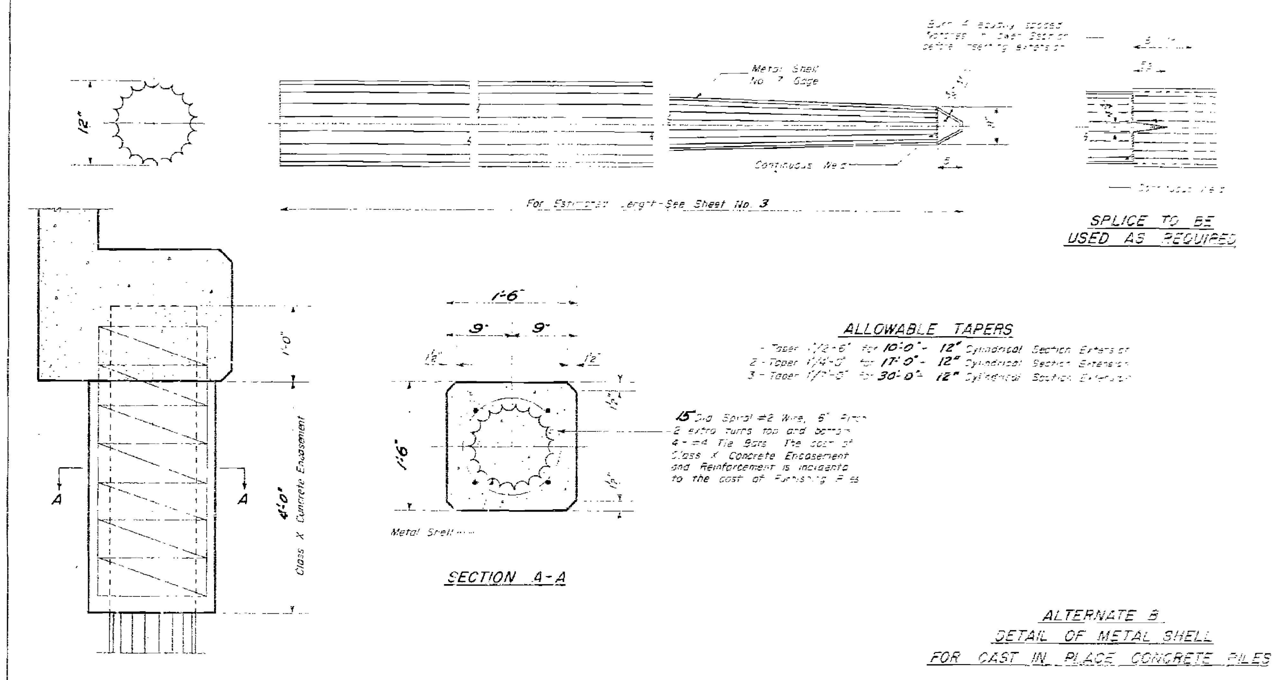
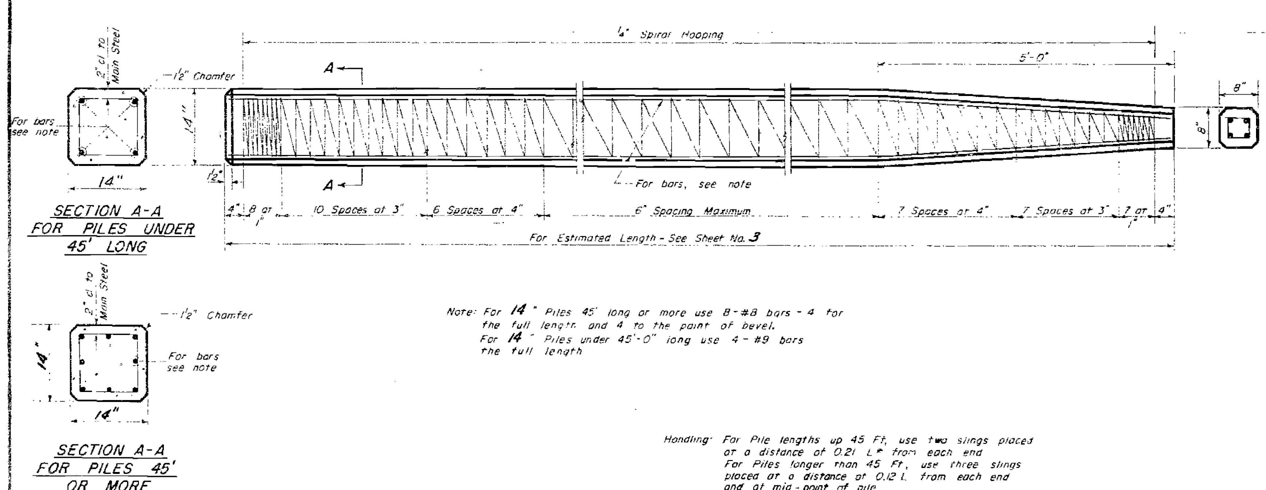
STATE OF ILLINOIS
DEPARTMENT OF PUBLIC WORKS & BUILDINGS
DIVISION OF HIGHWAYS

RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
17	13 BR	KANKAKEE	19	16







Note: For 14" Piles 45' long or more use 8-#8 bars - 4 for the full length and 4 to the point of bevel.
For 14" Piles under 45'-0" long use 4-#9 bars the full length

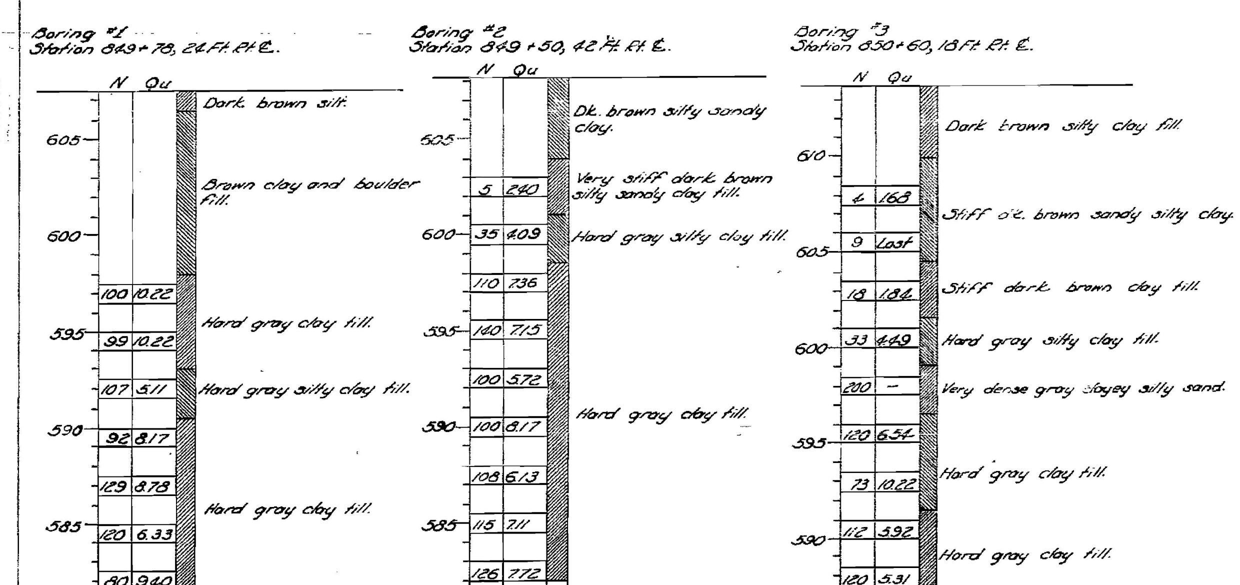
Handling: For Pile lengths up 45 Ft. use two slings placed at a distance of 0.21 L* from each end. For Piles longer than 45 Ft. use three slings placed at a distance of 0.12 L from each end and at mid-point of pile.
* L = Over all length of pile to be handled

DESIGNED	Robert A. Kowal
CHECKED	[illegible]
DRAWN	W. H. Solomon
CHECKED	R.K.

DEC. 4 1958
EXAMINED — ENGINEER OF BRIDGES AND TRAFFIC STRUCTURES
PASSED — ENGINEER OF DESIGN
APPROVED — CHIEF HIGHWAY ENGINEER

X-1

ALTERNATE A
DETAIL OF PRECAST CONCRETE PILES



BORING DATA

Note: N = Blows per foot of penetration of sampling spoon. Hammer Weight = 350 Lbs. Drop = 12 inches.
Qu = Unconfined compressive strength in tons per square foot.

PILE DETAILS AND BORING DATA
S.B.I. RT. 17 SEC. 13 B.R.
KANKAKEE CO.
STATION 849+99

FOR INFORMATION ONLY

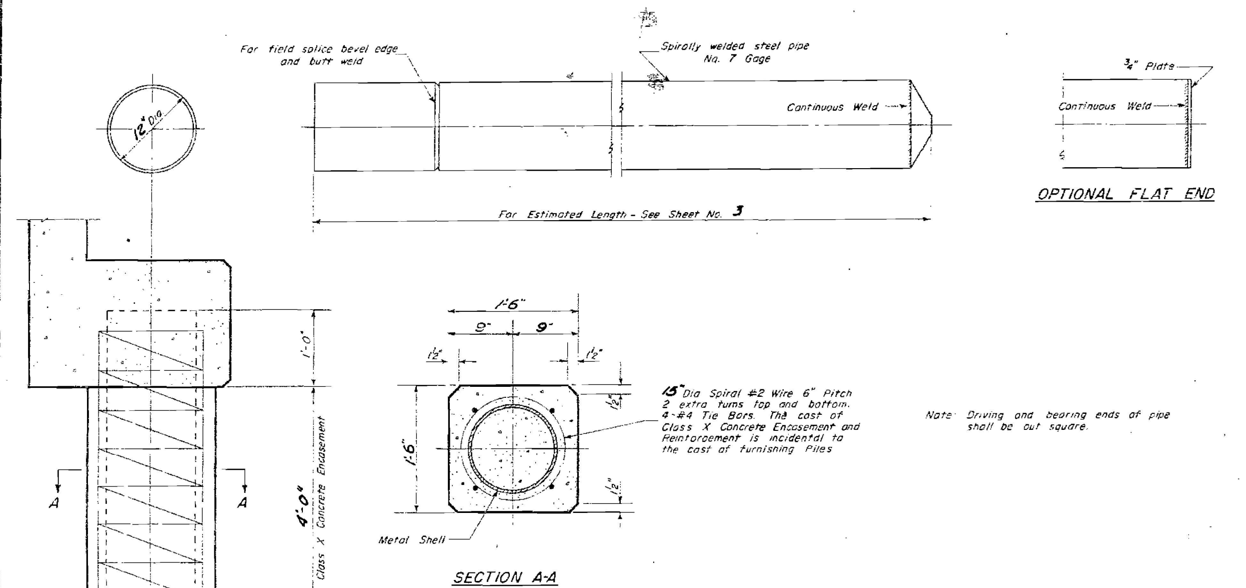
USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EXISTING STRUCTURE PLANS IL 17 OVER HORSE CREEK
	DRAWN - TJB	REVISED -		
PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -		
PLOT DATE = 3/7/2024	DATE -	REVISED -		SCALE: NTS SHEET 3 OF 12 SHEETS STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	55
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		

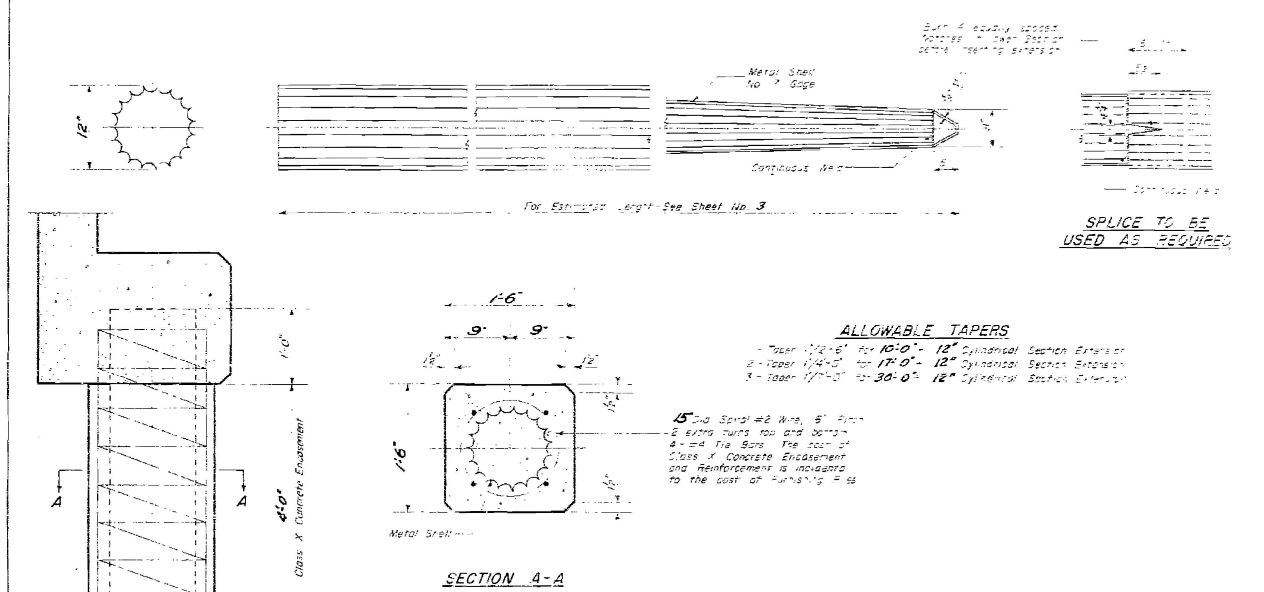
MODEL: Existing Structure Plans - Existing Structure Plans-2 [Sheet]

STATE OF ILLINOIS
DEPARTMENT OF PUBLIC WORKS & BUILDINGS
DIVISION OF HIGHWAYS

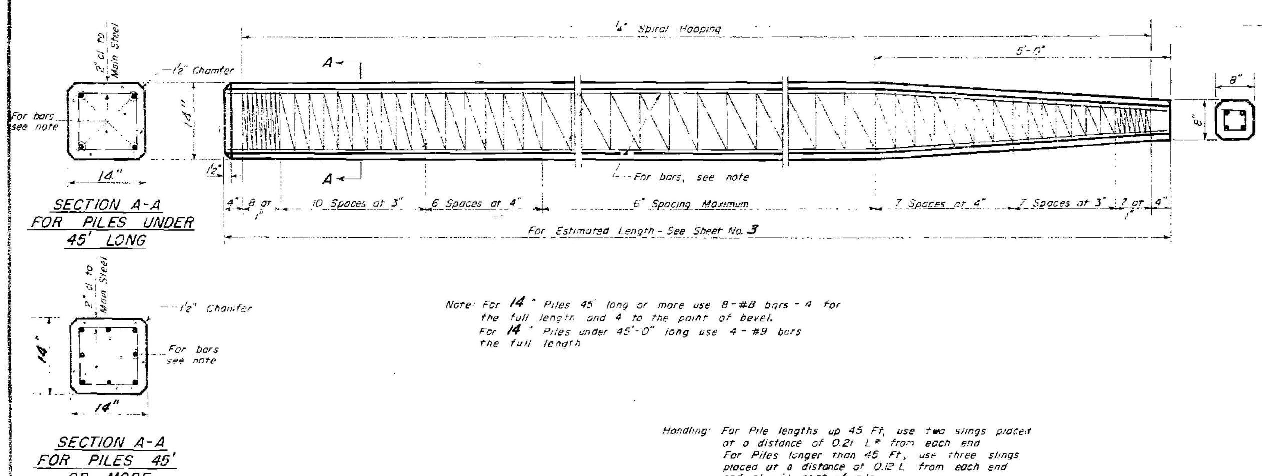
S.B.I. 17	13 BR	KANKAKEE	19	16	4



ALTERNATE B
DETAIL OF SPIRALLY WELDED STEEL SHELL
FOR CAST IN PLACE CONCRETE PILES



ALTERNATE B
DETAIL OF METAL SHELL
FOR CAST IN PLACE CONCRETE PILES



Note: For 14" Piles 45' long or more use 8-#8 bars - 4 for the full length and 4 to the point of bevel. For 14" Piles under 45'-0" long use 4-#9 bars the full length.

Handling: For Pile lengths up 45 Ft. use two slings placed at a distance of 0.21 L* from each end. For Piles longer than 45 Ft. use three slings placed at a distance of 0.12 L from each end and at mid-point of pile.

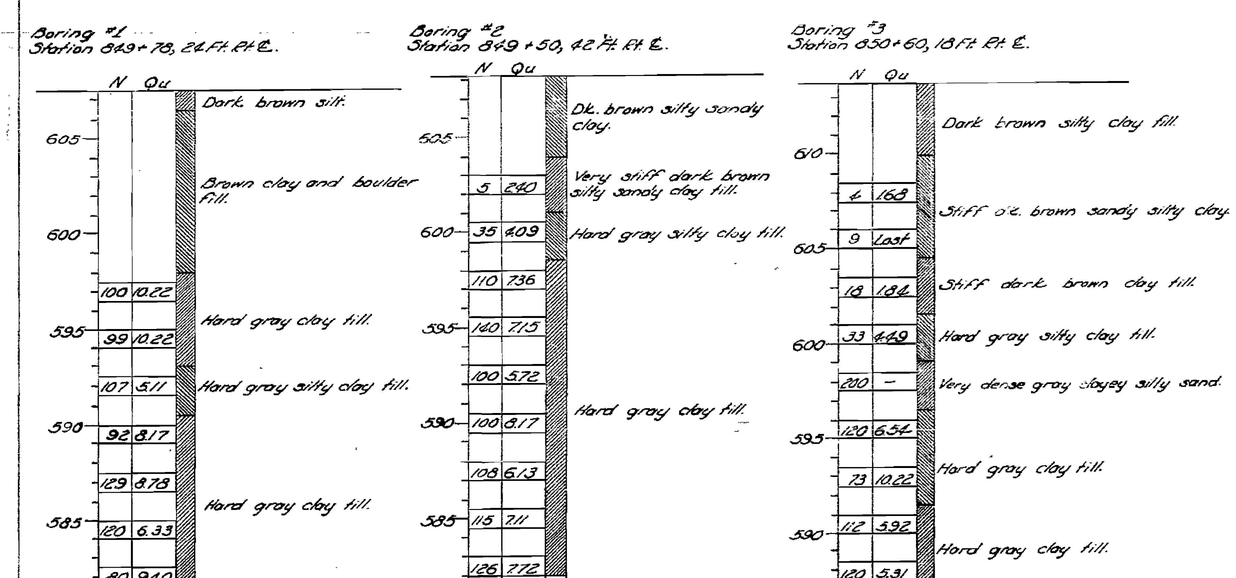
* L = Over all length of pile to be handled

DESIGNED Robert A. Kowal
CHECKED
DRAWN W. R. Solomon
CHECKED R.K.

DEC. 9 1958
EXAMINED — ENGINEER OF BRIDGE AND TRAFFIC STRUCTURES
PASSED — ENGINEER OF DESIGN
APPROVED — CHIEF HIGHWAY ENGINEER

X-1 DRAWN 12-31-57

ALTERNATE A
DETAIL OF PRECAST CONCRETE PILES



BORING DATA
Note: N = Blows per foot of penetration of sampling spoon. Hammer Weight = 350 Lbs. Drop = 12 inches. Qu = Unconfined compressive strength in tons per square foot.

PILE DETAILS AND BORING DATA
S.B.I. RT. 17 SEC. 13 B.R.
KANKAKEE CO.
STATION 849+99

FOR INFORMATION ONLY

USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION
	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 '/ in.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/7/2024	DATE -	REVISED -	

EXISTING STRUCTURE PLANS
IL 17 OVER HORSE CREEK
SCALE: NTS | SHEET 4 OF 12 SHEETS | STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	56
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		

Wight

MODEL: Existing Structure Plans - Existing Structure Plans-3 [Sheet]
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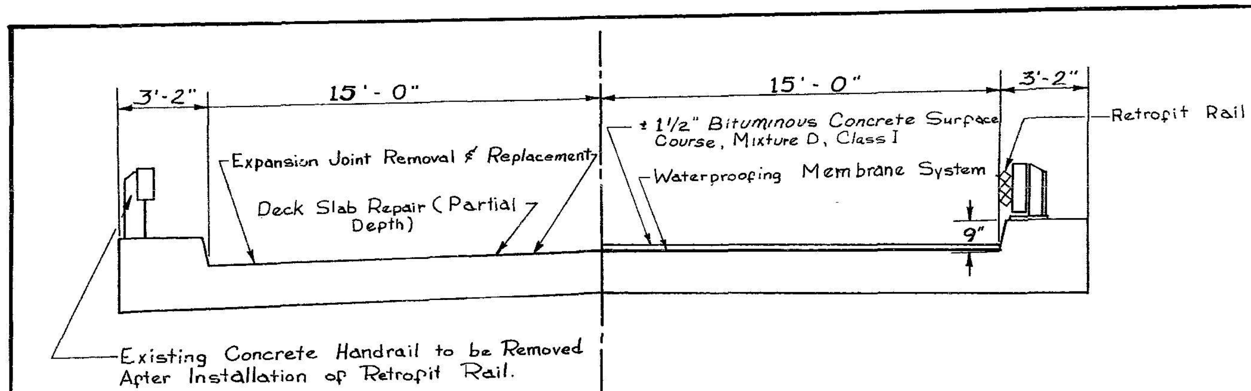
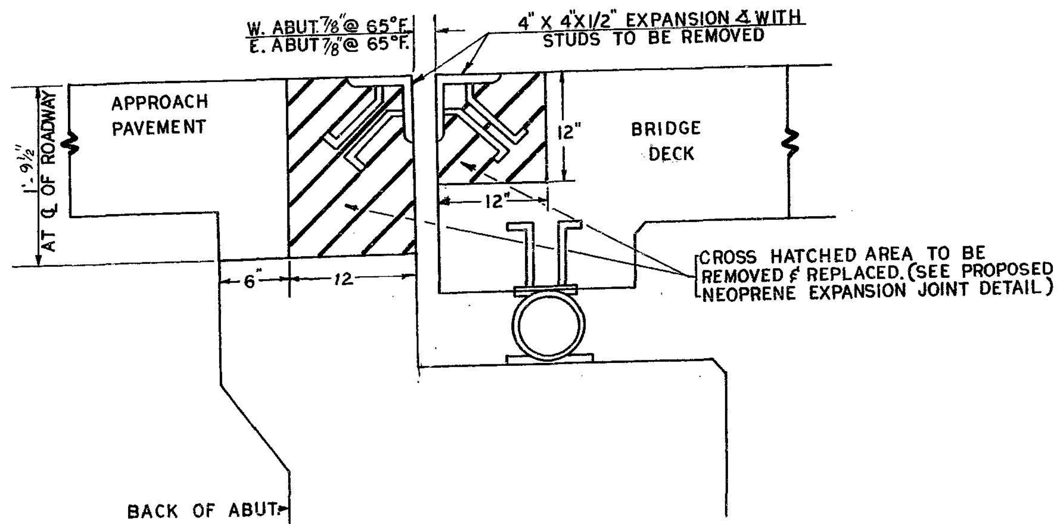
ROUTE	SECTION	COUNTY	TOTAL SHEETS	SHEET NUMBER
ILL. 17	*	KANKAKEE	3	16
F.H.W.A. REG. 4	ILLINOIS	PROJECT		

Sec. (12, 13, 14) RS.

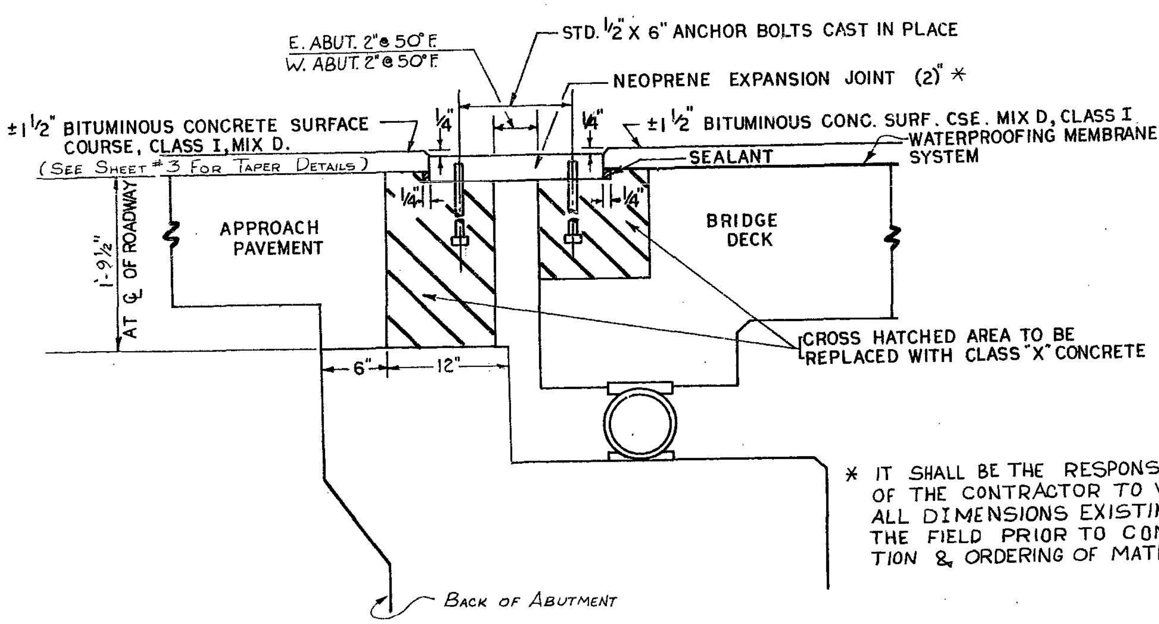


Half Section Existing

Half Section Proposed

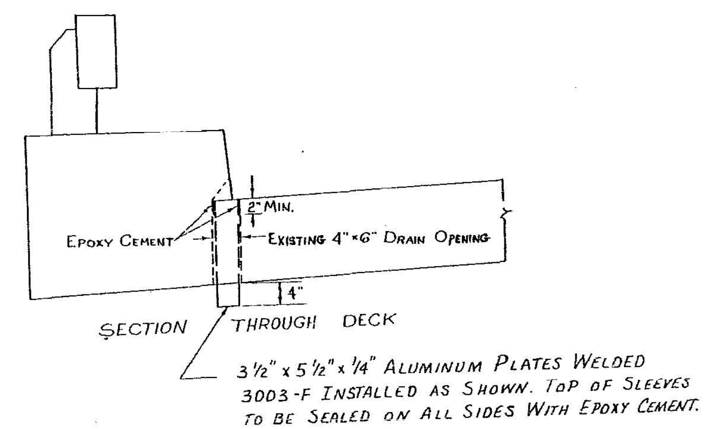


EXISTING JOINT DETAIL

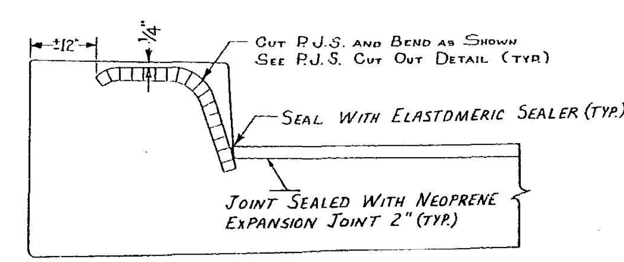


* IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY ALL DIMENSIONS EXISTING IN THE FIELD PRIOR TO CONSTRUCTION & ORDERING OF MATERIALS.

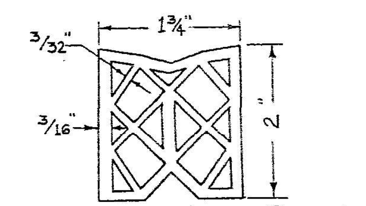
PROPOSED 2" NEOPRENE EXPANSION JOINT DETAIL



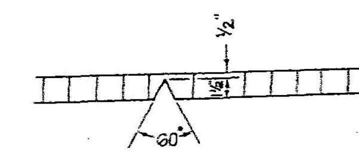
DRAIN EXTENSION DETAIL



CURB SEALER TREATMENT



PREFORMED JOINT SEALER 1¾"



1¾" P.J.S. CUT OUT DETAIL

GENERAL NOTES:

IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY ALL DIMENSIONS EXISTING IN THE FIELD PRIOR TO CONSTRUCTION AND ORDERING MATERIALS.

ALL EXPOSED EXISTING REINFORCEMENT IN THE AREA OF CONCRETE REMOVAL IS TO BE CLEANED AND INCORPORATED INTO THE NEW CONCRETE UNLESS OTHERWISE NOTED. (SEE SPECIAL PROVISIONS).

LIST OF QUANTITIES

CODE NO.	ITEM	UNIT	QUANTITY
406013	BIT. CONC. SURF. CSE., MIX D, CL. I	TON	25
501024	CONCRETE REMOVAL	CU YD	6.2
501041	BRIDGE HANDRAIL REMOVAL	LIN FT	180
504003	CLASS "X" CONCRETE	CU YD	6.2
Z10181	DECK SLAB REPAIR (PARTIAL DEPTH)	SQ YD	75
Z10279	NEOPRENE EXPANSION JOINT 2"	LIN FT	60
Z10327	PREFORMED JOINT SEAL 1¾"	LIN FT	12
Z10530	WATERPROOFING MEMBRANE SYSTEM	SQ YD	293
	RELOCATE EXISTING NAME PLATE	EACH	1
	FLOOR DRAIN EXTENSION	EACH	22
X64806	TRAFFIC CONTROL AND PROTECTION STANDARD 2309, LOCATION 6	EACH	1

STATION 849+99 (MILE 5.81)
STRUCTURE # 046-0031

FOR INFORMATION ONLY

USER NAME = tbarker	DESIGNED - TJB	REVISED -	
	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/7/2024	DATE -	REVISED -	

Wight

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

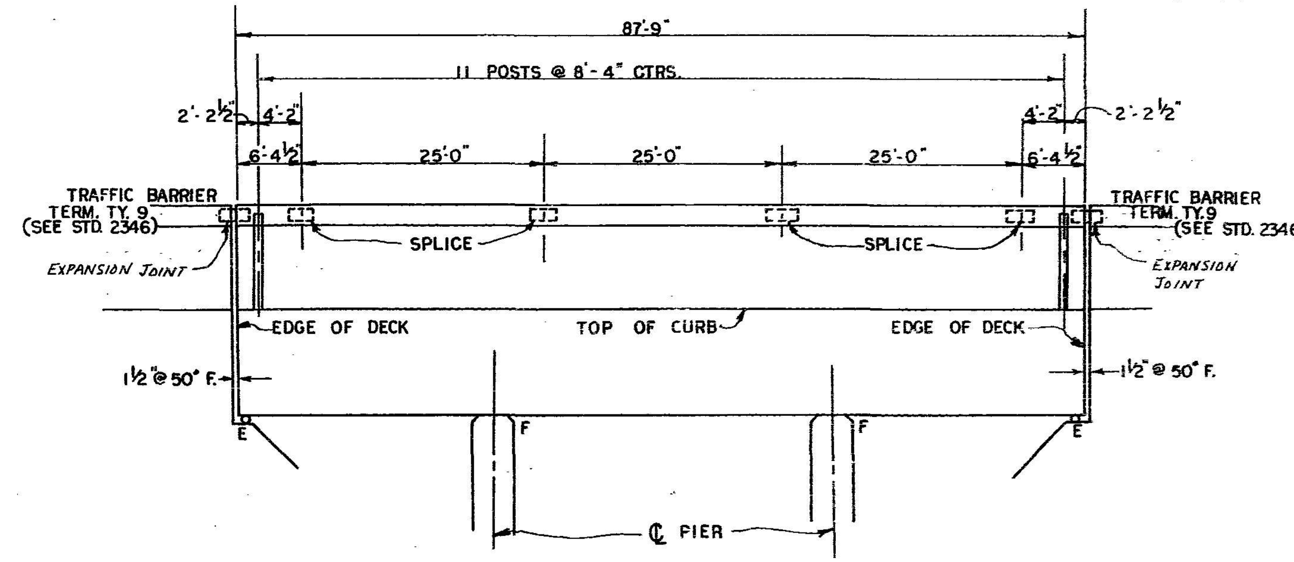
EXISTING STRUCTURE PLANS
IL 17 OVER HORSE CREEK

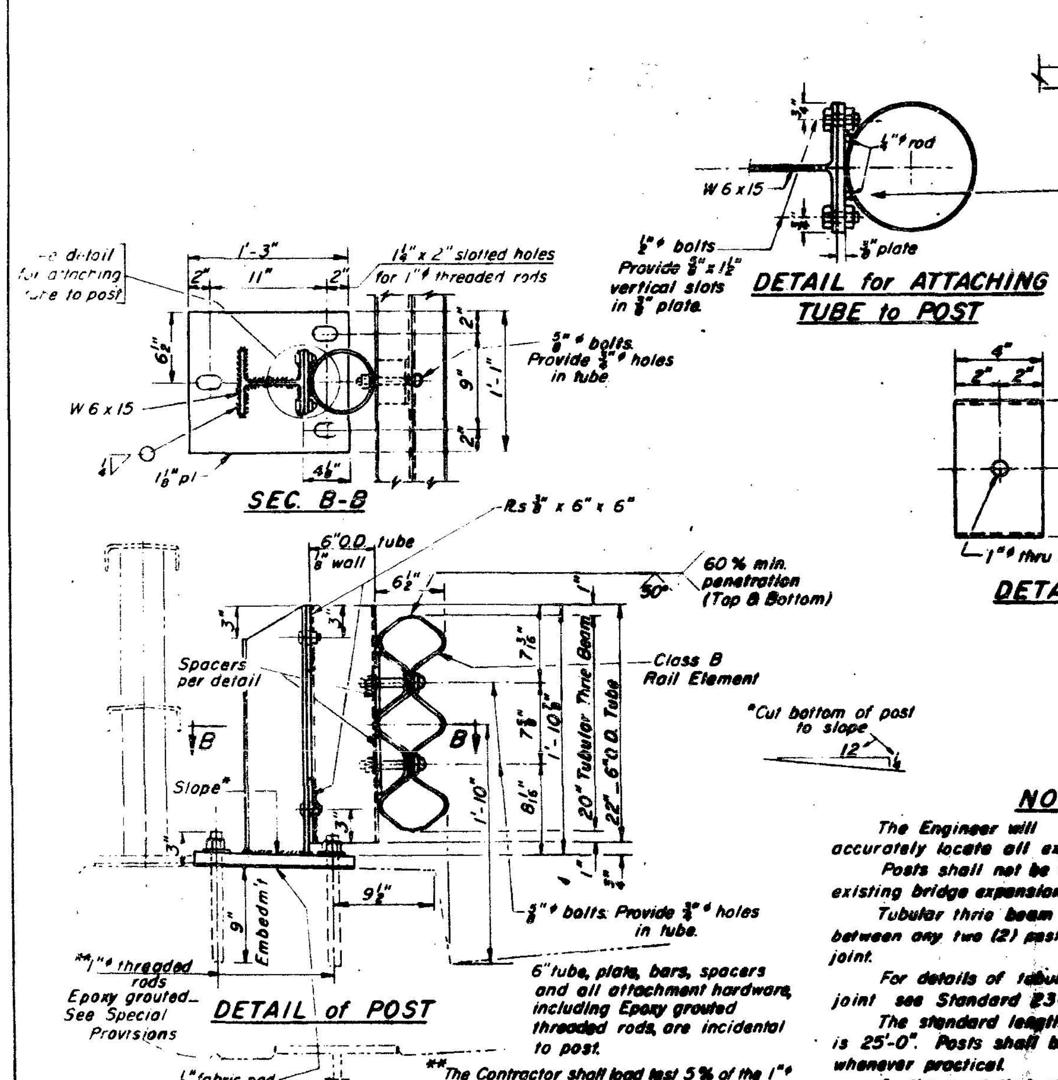
SCALE: NTS | SHEET 5 OF 12 SHEETS | STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	57
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		

ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
ILL.17	*	KANKAKEE	19	17

* SEC.(12,13,14)RS

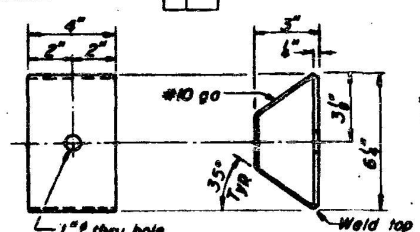




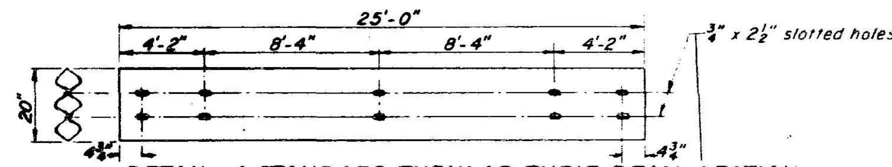
SEC. B-B

DETAIL for ATTACHING TUBE to POST

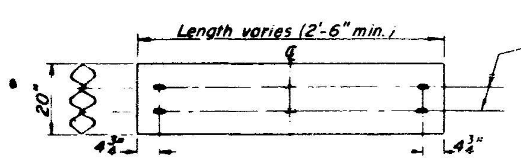
DETAIL of POST



DETAIL of SPACER



DETAIL of STANDARD TUBULAR THRIE BEAM SECTION



DETAIL of CUSTOM LENGTH TUBULAR THRIE BEAM SECTION

6" tube, plate, bars, spacers and all attachment hardware, including Epoxy grouted threaded rods, are incidental to post.

**The Contractor shall load test 5% of the 1"ϕ threaded anchor rods in the presence of the Engineer. The equipment and method used shall meet the approval of the Engineer. Pull out load shall be 7,400 lbs. per rod after epoxy has set. For each anchor that fails the test, two (2) more anchors, selected by the Engineer, shall be tested. Each anchor that fails shall be reset in epoxy and retested until it passes the test.

NOTES

The Engineer will measure bridge longitudinally and accurately locate all expansion joints.

Posts shall not be located closer than 1'-3" c-c to an existing bridge expansion joint or end of bridge.

Tubular thrie beam expansion joint shall be provided between any two (2) posts which span a bridge expansion joint.

For details of tubular thrie beam splice and expansion joint see Standard 2346.

The standard length for a tubular thrie beam section is 25'-0". Posts shall be provided at standard 8'-4" centers whenever practical.

In the event that standard lengths of tubular thrie beam cannot be longitudinally positioned to meet the above requirements shorter custom fabricated section(s) will be specified.

A Traffic Barrier Terminal Type 9, as detailed on Standard 2346 shall be provided at each of the four (4) corners of the bridge.

Provide 1-⅛" and 2-1/16" steel shims for 25% of the Posts. Shims shall be similar to base plate in size and holes.

The Tubular Thrie Beam rail section shall be fabricated by welding two (2) Thrie Beam rail elements as shown. The Thrie Beam rail section shall conform to the requirements of AASHTO M 180 Type I of the class specified.

All structural steel shapes and plates shall conform to AASHTO M 183 and shall be galvanized after fabrication in accordance with AASHTO M 111 and ASTM A-385

BASIS of PAYMENT: This work will be paid for at the contract unit price per lineal foot, measured in place, for TUBULAR THRIE BEAM RETROFIT RAIL FOR BRIDGES, complete in place as shown hereon.

NOTE: IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY ALL DIMENSIONS EXISTING IN THE FIELD PRIOR TO CONSTRUCTION AND ORDERING MATERIALS.

BILL of MATERIAL

Item	[illegible]	[illegible]
Posts	each	22
Splice rails	[illegible]	12
Standard 25 ft lengths of Tubular Thrie Beam	each	6
Custom lengths of Tubular Thrie Beam (2'-6" min.)		
6' 4½ long	each	4
long	each	
long	each	

The quantities shown above are the total required for one (1) bridge

Bridge Station 849 + 99 (Mile 5.81)
Structure # 0031

F-3.34a

FOR INFORMATION ONLY

Illinois Department of Transportation
PASSED Feb 5, 1980 — Engineer of Bridges and Traffic Structures
APPROVED Feb 5, 1980 — Engineer of Design
ISSUED 2-23-78

TUBULAR THRIE BEAM RETROFIT RAIL for BRIDGES

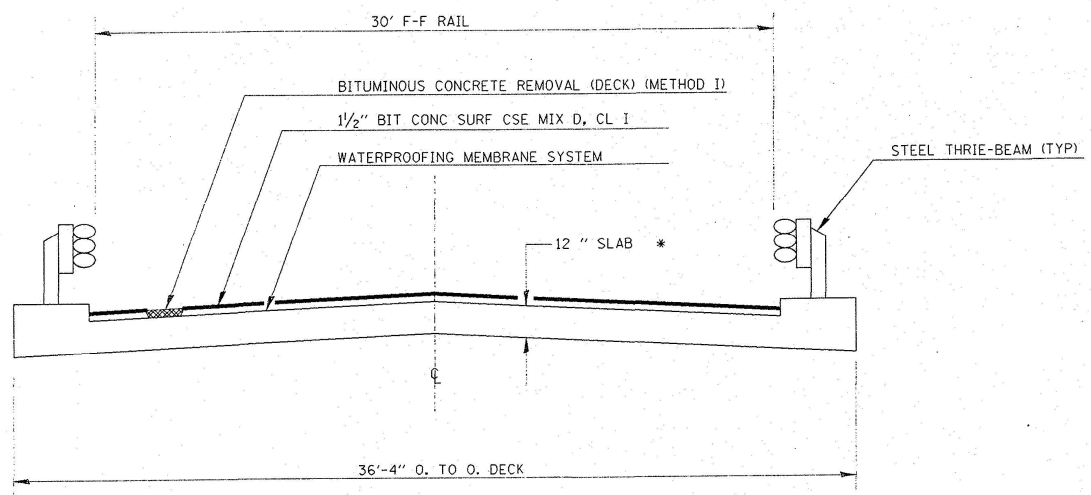
STANDARD 2348-1

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO
FA 41	*	KANKAKEE	64	49
STA.		TO STA.		
FED. ROAD DIST. NO.	ILLINOIS	FED. AID PROJECT		

* (12)RS-3, BR-1; (13)RS-2, BR-1, BR-2, BR-3; (14)RS-2, BR-1, BR-2

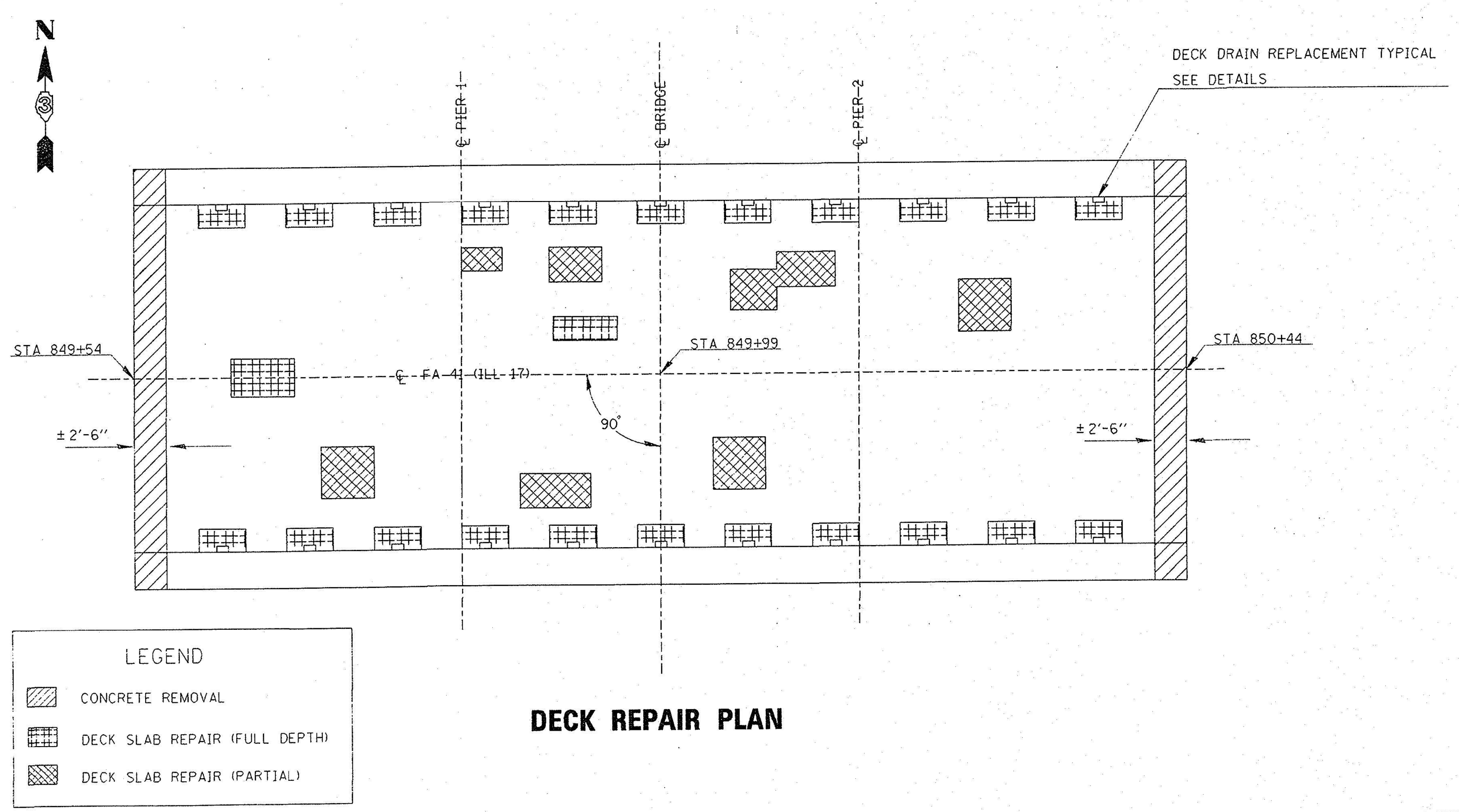
SHEET 1 OF 6

EXISTING STRUCTURE: 13-BR
CONTINUOUS SLAB, 3 SPAN STRUCTURE
2 SPANS AT 26'-3" & 1 SPAN AT 34'-0"
90'-0" BK TO BK ABUTMENTS



* HAUNCHES TO 1'-4¼" @ PIERS

TYPICAL SECTION



DECK REPAIR PLAN

GENERAL NOTES

1 *Plan dimensions and details relative to the existing structure have been taken from existing plans and are subject to nominal construction variations. It shall be the contractor's responsibility to verify such dimensions and details in the field and make necessary approved adjustments prior to construction or ordering 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.*

2 *Reinforcing bars shall conform to the requirements of AASHTO M-31, M-42, OR M-53 grade 60*

3 *Existing reinforcement shall be cleaned and incorporated into new construction.*

4 *Removal of existing bearings shall be incidental to concrete removal and new bearing pay items.*

5. The Contractor shall provide support system for the slab in area of existing bearing removal, as required in order to maintain "as-built" deck profile. The support system shall be approved by the Engineer, such approval will not relieve the Contractor of responsibility for safety of the structure. See Special Provisions.

LIST OF QUANTITIES		
ITEM	UNIT	QUANTITY
CHANNEL EXCAVATION	CU YD	65
BITUMINOUS CONCRETE SURFACE COURSE, MIXTURE D, CLASS I, TYPE 2	TON	25
CONCRETE REMOVAL	CU YD	15.4
PREFORMED JOINT SEAL 2 1/2"	LIN FT	72
ELASTOMERIC BEARING ASSEMBLY, TYPE I	EACH	18
CLASS X CONCRETE	CU YD	16.8
FURNISHING AND ERECTING STRUCTURAL STEEL	POUND	3150
REINFORCEMENT BARS, EPOXY COATED	POUND	1950
BAR SPLICERS	EACH	32
TEMPORARY SLAB SUPPORT SYSTEM	L SUM	1
STONE DUMPED RIPRAP, CLASS A4	SQ YD	340
BITUMINOUS CONCRETE REMOVAL (DECK)	SQ YD	294
SLOPE WALL REMOVAL	SQ YD	275
TRAFFIC CONTROL AND PROTECTION, STANDARD 2409 (SPECIAL)	EACH	1
REMOVAL AND REINSTALLATION OF TRAFFIC BARRIER TERMINAL, TYPE 9	EACH	4
TUBULAR THRIE BEAM RETROFIT RAIL FOR BRIDGES (SPECIAL)	LIN FT	125
DECK DRAIN REPLACEMENT	EACH	22
DECK SLAB REPAIR (FULL DEPTH, TYPE I)	SQ YD	22.9
DECK SLAB REPAIR (PARTIAL)	SQ YD	16.3
EPOXY CRACK SEALING	LIN FT	153
POLYMER MODIFIED PORTLAND CEMENT MORTAR	CU FT	1.2
CRACK FILLING	POUND	40
FILTER FABRIC FOR USE WITH RIPRAP	SQ YD	340
WATERPROOFING MEMBRANE SYSTEM	SQ YD	294

NOT TO SCALE

REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION
STRUCTURE REHABILITATION
FA 41 (ILL 17)
SECTION 13BR-1
KANKAKEE COUNTY
STR NO 046-0031
STA 849+99

SCALE: VERT. HORIZ. DRAWN BY SPK
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MODEL: Existing Structure Plans - Existing Structure Plans-6 [Sheet]
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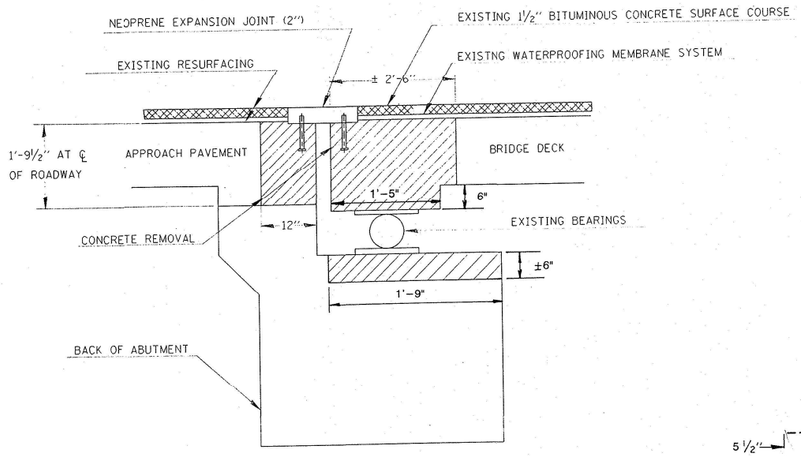
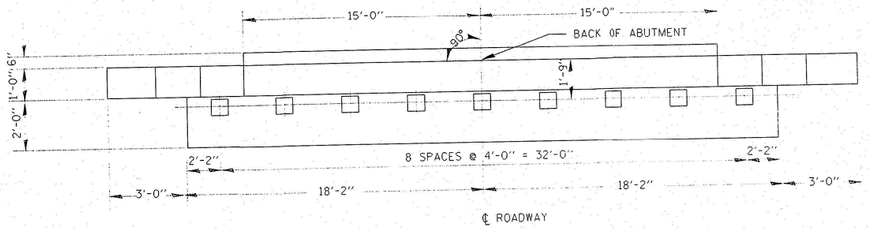
F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
FA 41	*	KANKAKEE 64		50
STA.		TO STA.		

* (12)RS-3, BR-1; (13)RS-2, BR-1, BR-2, BR-3; (14)RS-2, BR-1, BR-2

SHEET 2 OF 6

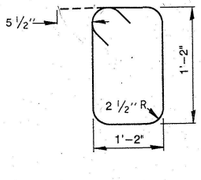


EXISTING ABUTMENT

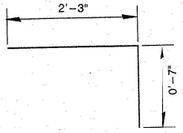


TOP VIEW

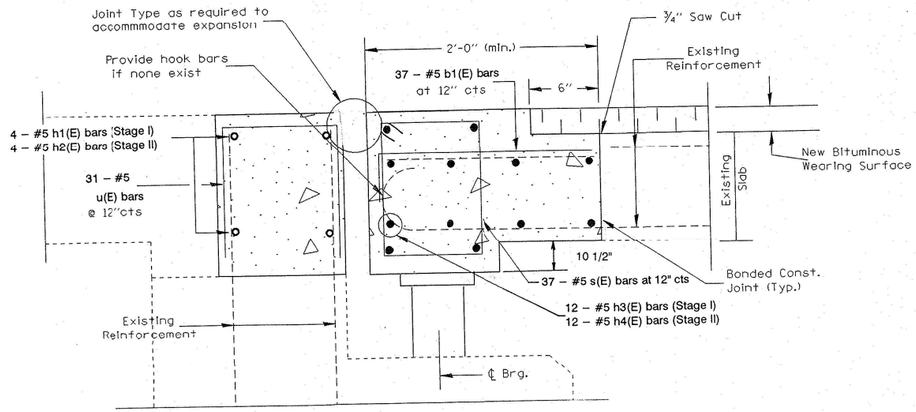
SHOWING BEARING LOCATIONS



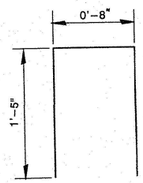
BAR s(E)



BAR b1(E)



WITH BITUMINOUS WEARING SURFACE



BAR u(E)

BILL OF MATERIAL

BAR	NUMBER	SIZE	LENGTH
b1 (E)	74	#5	2'-10"
h1 (E)	8	#5	15'-0"
h2 (E)	8	#5	14'-0"
h3 (E)	24	#5	18'-0"
h4 (E)	24	#5	17'-0"
s (E)	74	#5	5'-0"
u (E)	62	#5	3'-6"
REINFORCEMENT BARS, EPOXY COATED		POUNDS	1950
CONCRETE REMOVAL		CU YD	15.4
CLASS X CONCRETE		CU YD	16.8

BAR SPLICERS REQUIRED FOR ALL STAGE I "h" BARS

NOT TO SCALE

LEGEND

- FORMED CONCRETE REPAIR (DEPTH EQUAL TO OR LESS THAN 5")
- EPOXY MORTAR REPAIR
- EPOXY CRACK SEALING

REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION
STRUCTURE REHABILITATION
FA 41 (ILL 17)
SECTION 13BR-1
KANKAKEE COUNTY
STR NO 046-0033
STA 849+99

SCALE: VERT.
HORIZ.
DATE

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	DRAWN - TJB	REVISED -
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PLOT DATE = 3/7/2024	DATE -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EXISTING STRUCTURE PLANS
IL 17 OVER HORSE CREEK

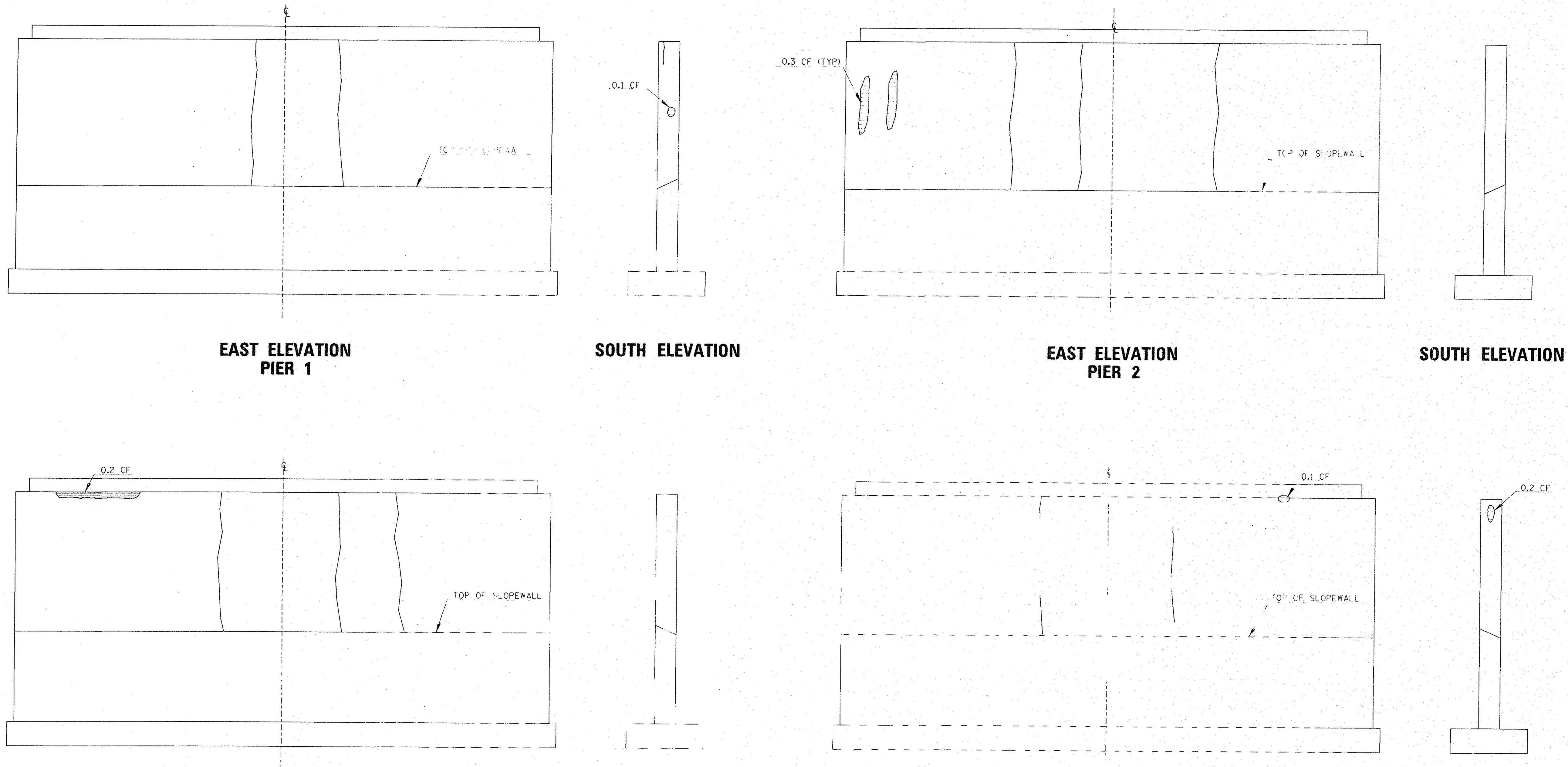
SCALE: NTS | SHEET 8 OF 12 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	60
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

F. A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO
FA 41	*	KANKAKEE	64	51
STA.		TO STA.		
FED. ROAD DIST. NO.	ILLINOIS	FED. AID PROJECT		

* (12)RS-3, BR-1; (13)RS-2, BR-1, BR-2, BR-3; (14)RS-2, BR-1, BR-2

SHEET 3 OF 6



EAST ELEVATION
PIER 1

SOUTH ELEVATION

EAST ELEVATION
PIER 2

SOUTH ELEVATION

WEST ELEVATION
PIER 1

NORTH ELEVATION

WEST ELEVATION
PIER 2

NORTH ELEVATION

NOT TO SCALE

ILLINOIS DEPARTMENT OF TRANSPORTATION
STRUCTURE REHABILITATION
FA 41 (ILL 17)
SECTION 13BR-1
KANKAKEE COUNTY
STR NO 046-0031
STA 849+99

REVISIONS
NAME | DATE

SCALE: VERT. HORIZ.
DATE
DRAWN BY SPK
CHECKED BY

FOR INFORMATION ONLY

Wight	USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EXISTING STRUCTURE PLANS IL 17 OVER HORSE CREEK
		DRAWN - TJB	REVISED -		
	PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -		
	PLOT DATE = 3/7/2024	DATE -	REVISED -		SCALE: NTS SHEET 9 OF 12 SHEETS STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	61
CONTRACT NO. 66L10				
ILLINOIS FED. AID PROJECT				

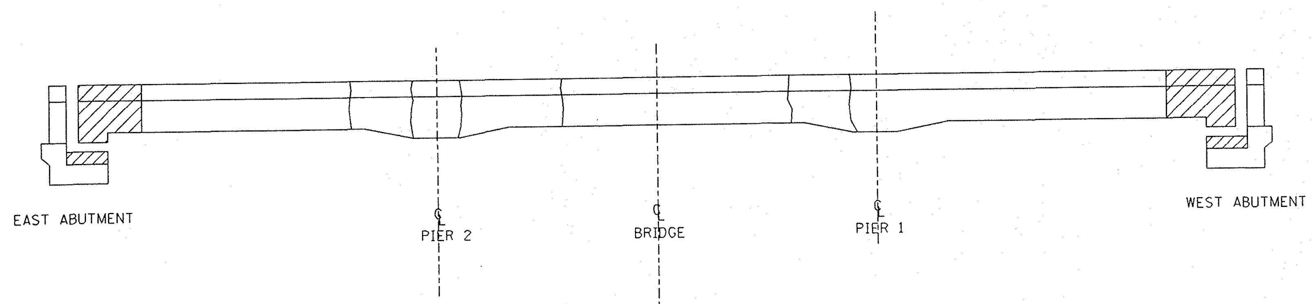
F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
FA 41	*	KANKAKEE	64	52

STA. TO STA.

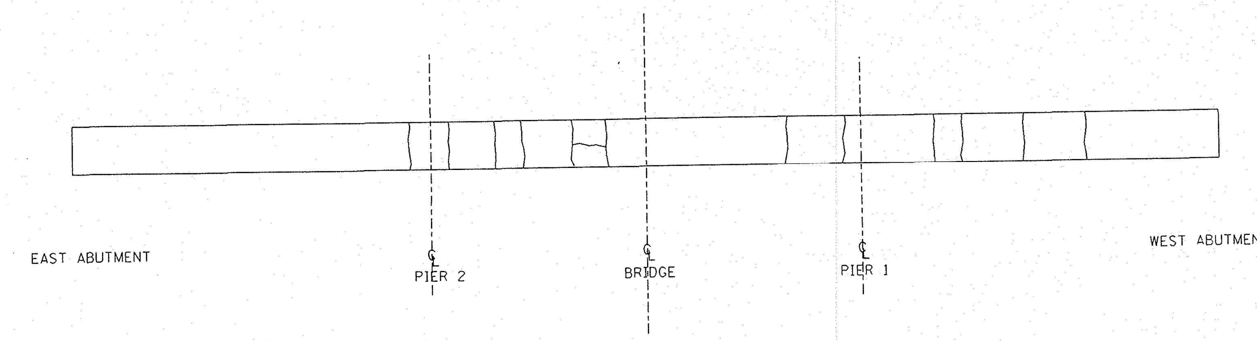
FED. ROAD DIST. NO. ILLINOIS FED. AID PROJECT

* (12)RS-3, BR-1; (13)RS-2, BR-1, BR-2, BR-3; (14)RS-2, BR-1, BR-2

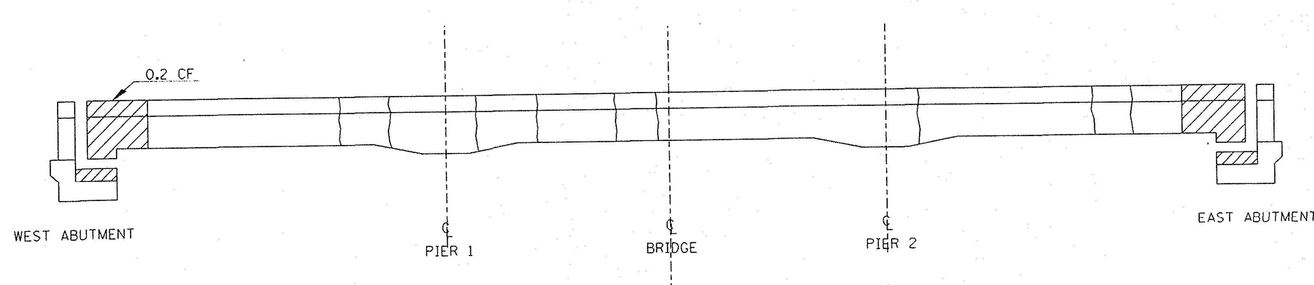
SHEET 4 OF 6



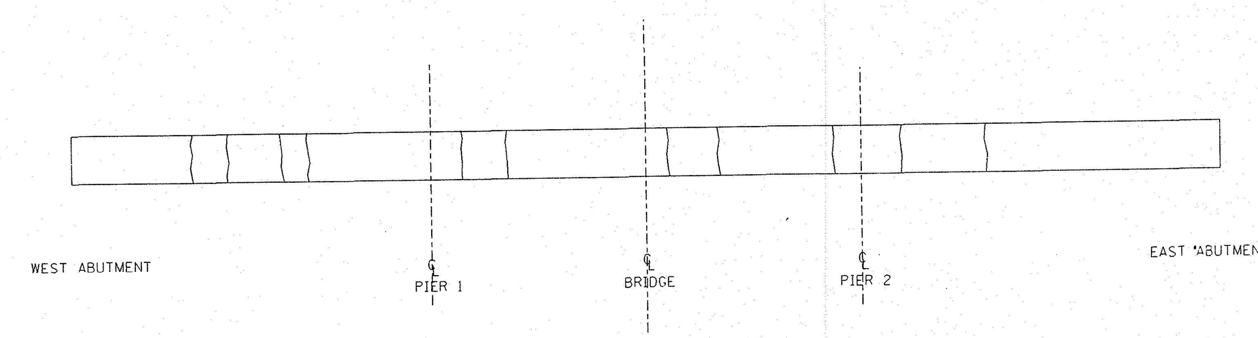
NORTH ELEVATION
NORTH BRIDGE RAIL



NORTH ELEVATION -
SOUTH BRIDGE RAIL



SOUTH ELEVATION
SOUTH BRIDGE RAIL



SOUTH ELEVATION
NORTH BRIDGE RAIL

NOT TO SCALE

LEGEND

- FORMED CONCRETE REPAIR (DEPTH EQUAL TO OR LESS THAN 5")
- POLYMER MODIFIED PORTLAND CEMENT MORTAR
- EPOXY CRACK SEALING

REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION
STRUCTURE REHABILITATION
FA 41 (ILL 17)
SECTION 13BR-1
KANKAKEE COUNTY
STR NO 046-0031
STA 849+99

SCALE: VERT. HORIZ. DRAWN BY SPK
DATE CHECKED BY

Dec. 29, 1993 09:58:56
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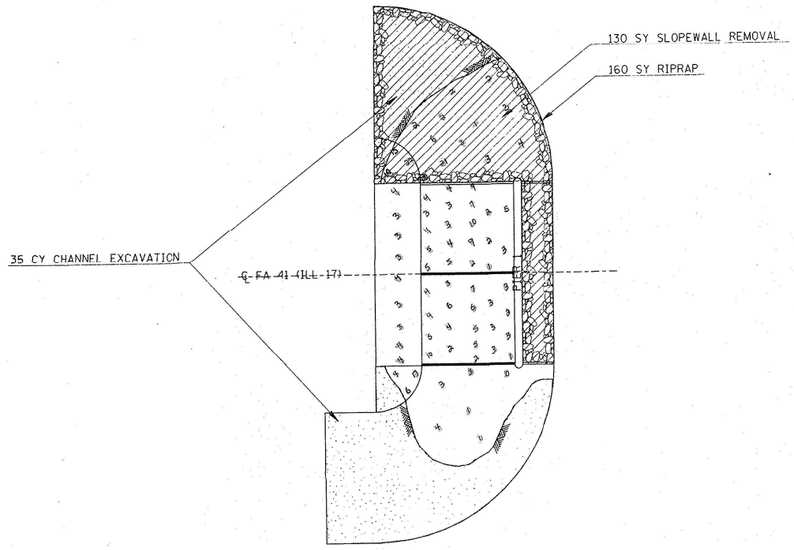
Wight	USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EXISTING STRUCTURE PLANS IL 17 OVER HORSE CREEK
		DRAWN - TJB	REVISED -		
	PLOT SCALE = 0.16666633 ' / in.	CHECKED - JNH	REVISED -		
	PLOT DATE = 3/7/2024	DATE -	REVISED -		SCALE: NTS SHEET 10 OF 12 SHEETS STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	62
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO
FA 41	*	KANKAKEE	64	53
STA.		TO STA.		
FED. ROAD DIST. NO.	ILLINOIS	FED. AID PROJECT		

* (12)RS-3, BR-1; (13)RS-2, BR-1, BR-2, BR-3; (14)RS-2, BR-1, BR-2



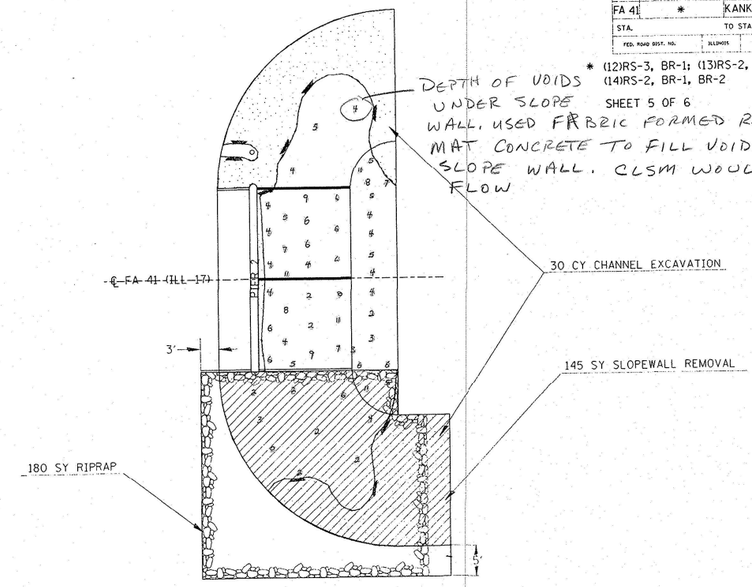
WEST SLOPEWALL

N

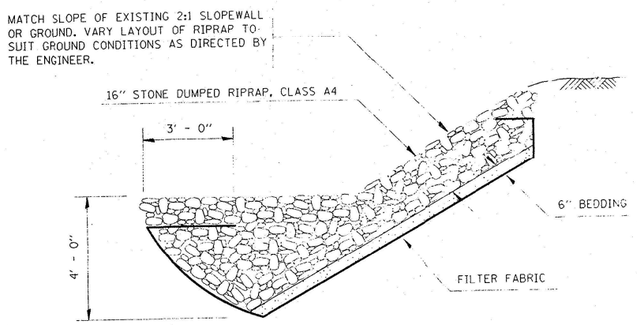
LEGEND

- CHANNEL EXCAVATION
- ~~SLOPEWALL REMOVAL~~ DELETED
- RIPRAP
- CRACK FILLING

DEPTH OF VOIDS UNDER SLOPE SHEET 5 OF 6 WALL. USED FABRIC FORMED REVETMENT MAT CONCRETE TO FILL VOIDS UNDER SLOPE WALL. CLSM WOULD NOT FLOW



EAST SLOPEWALL



STONE RIPRAP DETAIL

NOT TO SCALE

REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION
STRUCTURE REHABILITATION
FA 41 (ILL 17)
SECTION 13BR-1
KANKAKEE COUNTY
STR NO 046-0031
STA 849+99

SCALE: VERT. HORIZ. DRAWN BY SPK
DATE CHECKED BY

Dec. 29, 1993 09:58:56
(P3086901 P3086900AA.DGN

FOR INFORMATION ONLY

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	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/7/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

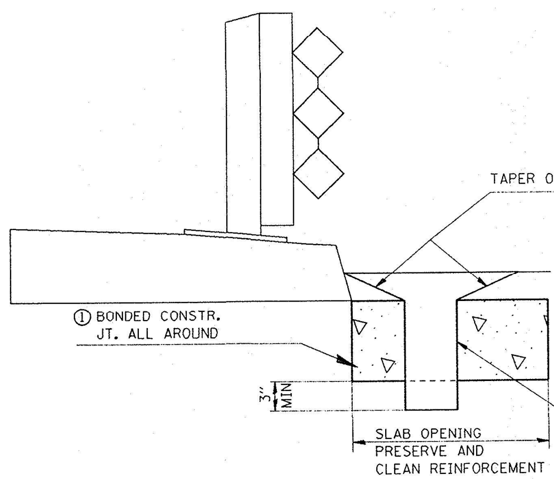
EXISTING STRUCTURE PLANS
IL 17 OVER HORSE CREEK

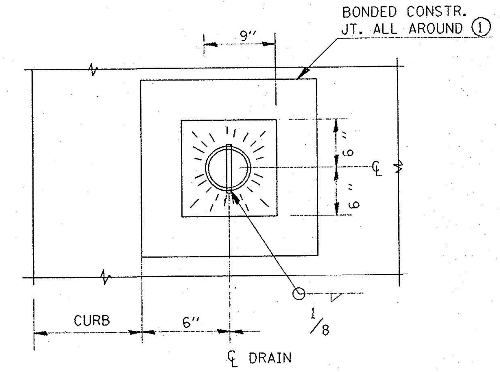
SCALE: NTS | SHEET 11 OF 12 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	63
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
FA 41	*	KANKAKEE	64	54

* (12)RS-3, BR-1; (13)RS-2, BR-1, BR-2, BR-3; (14)RS-2, BR-1, BR-2
SHEET 6 OF 6

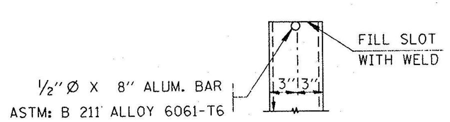




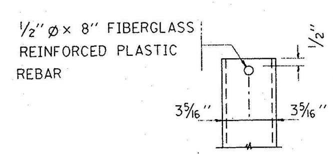
TOP PLAN

(SHOWING ALUMINUM TUBE)
(22 REQUIRED)

1. ALL BONDED CONSTRUCTION JOINTS SHALL BE IN ACCORDANCE WITH ARTICLE 504.13 (a)2 STANDARD SPECIFICATIONS



ALUMINUM TUBE



FIBERGLASS PIPE

DECK DRAIN REPLACEMENT DETAIL

Fiberglass pipe shall conform to ASTM D2996 with short term rupture strength hoop tensile stress of 30000 p.s.i. min. The surface of the fiberglass pipe shall free of bond inhibiting agents. The exterior surfaces of the fiberglass deck drain shall be cleaned and given a washcoat pretreatment in accordance with Steel structures Painting Councils Spec. SSPC-SP1 & SSPC-Paint 27 prior to painting with a vinyl enamel coat. The color shall be light grey Munsell No. 10Y 7/1. Painting of the fiberglass deck drains will not be required when the exterior surfaces of the furnished drains are coated by the manufacturer with a pigment that matches the color of the concrete beams.

NOT TO SCALE

REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION
STRUCTURE REHABILITATION
FA 41 (ILL 17)
SECTION 13BR-1
KANKAKEE COUNTY
STR NO 046-0031
STA 849+99

SCALE: VERT. HORIZ. DRAWN BY SAF
DATE CHECKED BY

Dec. 29, 1993 09:58:56
(P3086901 P308690AA.DGN

FOR INFORMATION ONLY

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PLOT DATE = 3/7/2024	DATE -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

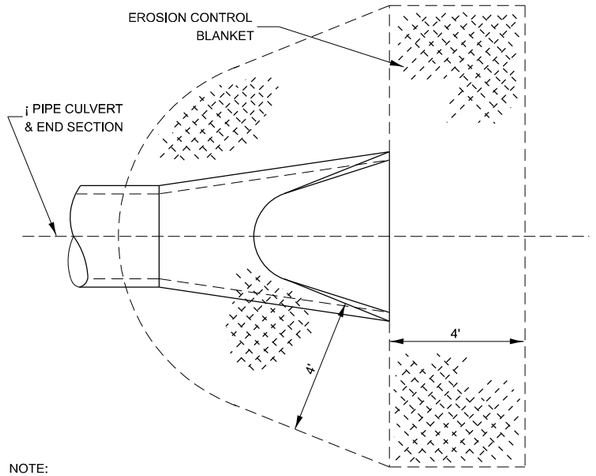
EXISTING STRUCTURE PLANS
IL 17 OVER HORSE CREEK

SCALE: NTS | SHEET 12 OF 12 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	64

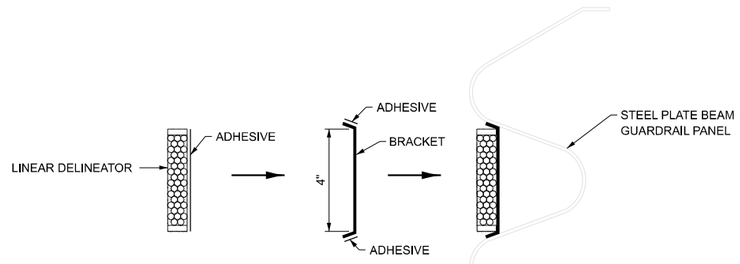
CONTRACT NO. 66L10

ILLINOIS | FED. AID PROJECT



NOTE:
TO BE USED AT ALL END SECTIONS

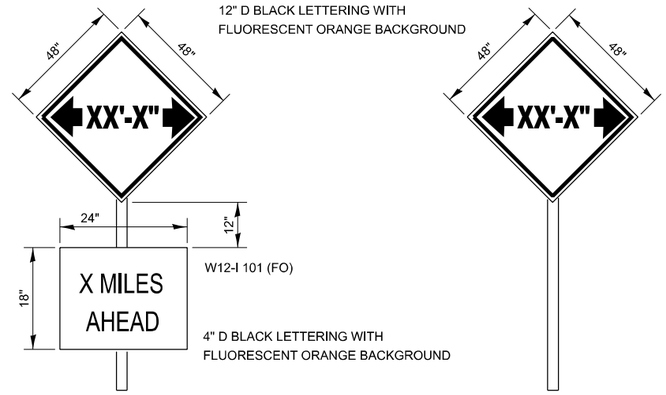
DETAIL OF EROSION CONTROL BLANKET LINING AROUND END SECTION



4" BRACKET

LINEAR DELINEATOR APPLICATION TO STANDARD GALVANIZED GUARDRAIL

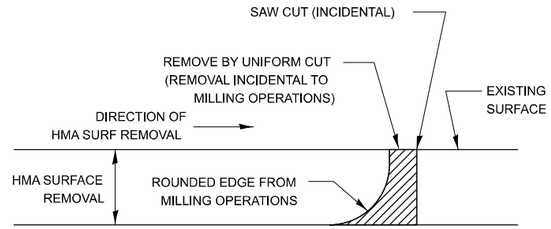
LINEATOR DELINEATOR SHALL BE APLLIED ACCORDING TO THE MANUFACTURER'S RECOMMENDATIONS



TO BE POST MOUNTED AS SHOWN ELSEWHERE IN THE PLANS.

COST OF SUPPLYING, INSTALLING, MAINTAINING AND REMOVING WIDTH RESTRICTION SIGNS SHALL BE INCLUDED IN THE COST OF THE TRAFFIC CONTROL AND PROTECTION PAY ITEMS.

WIDTH RESTRICTION SIGNING DETAILS



NOTE:
WHEN MILLING OPERATIONS PRODUCE A ROUNDED EDGE, THEN A SAW CUT SHALL BE USED TO MANUFACTURE A PERPENDICULAR EDGE AS SHOWN IN THE DETAIL. THE ENGINEER SHALL BE THE SOLE JUDGE CONCERNING THE USE OF THIS DETAIL

HMA DETAIL AT BUTT JOINTS

Wight	USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	ROADWAY DETAILS
		DRAWN - TJB	REVISED -		
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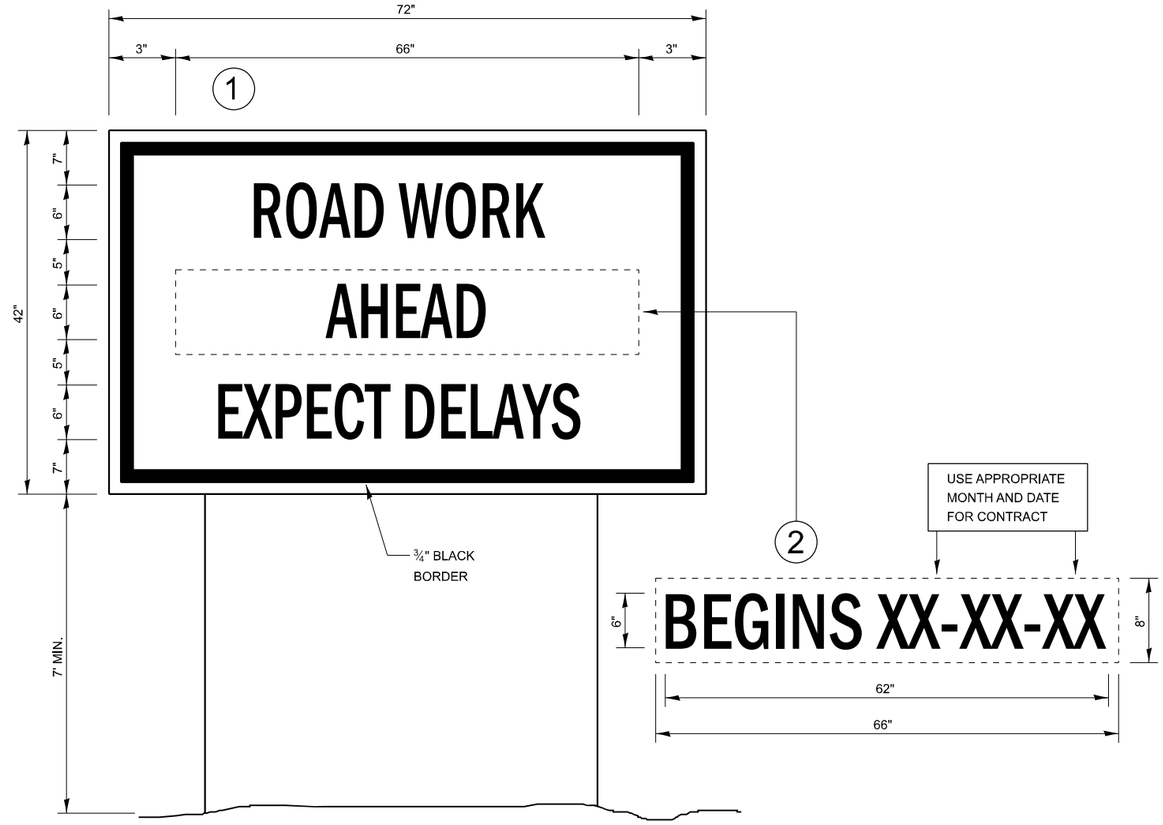
	PLOT DATE = 3/13/2024	DATE -	REVISED -		

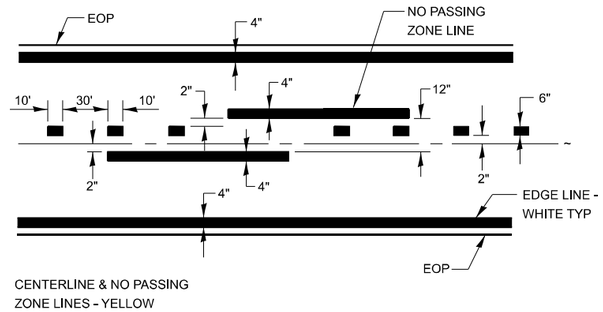
F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	65
		CONTRACT NO. 66L10		
	ILLINOIS FED. AID PROJECT			



TEMPORARY INFORMATION SIGNING

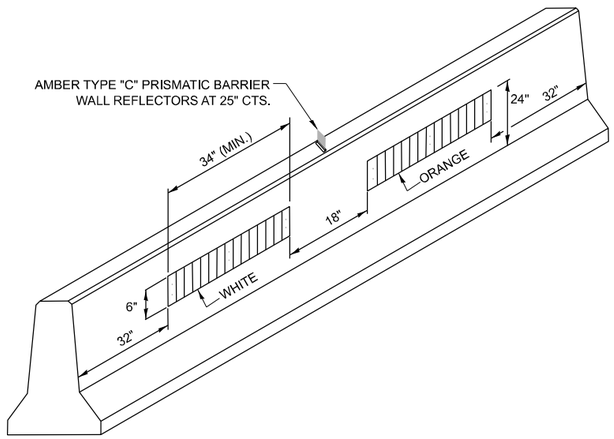
NOTES:

1. USE 6" D BLACK LETTERING ON FLUORESCENT ORANGE BACKGROUND.
2. ERECT SIGNS AT LOCATIONS IN ADVANCE OF THE "ROAD CONSTRUCTION AHEAD" SIGNS AS DIRECTED BY THE ENGINEER.
3. ERECT SIGN①WITH INSTALLED PANEL②A MINIMUM OF ONE WEEK PRIOR TO THE START OF THE LANE CLOSURE.
4. REMOVE PANEL②ON THAT DATE.
5. SEE SPECIAL PROVISION "TEMPORARY INFORMATION SIGNING" FOR ADDITIONAL INFORMATION.
6. WILL BE PAID FOR PER SQ FT AS "TEMPORARY INFORMATION SIGNING". EACH SIGN = 21 SQ FT AND THE DATE PANEL②WILL NOT BE MEASURED SEPARATELY FOR PAYMENT.



CENTERLINE & NO PASSING ZONE LINES - YELLOW

PAVEMENT MARKING



LINEAR DELINEATOR PANELS FOR TEMPORARY CONCRETE BARRIER

Wight

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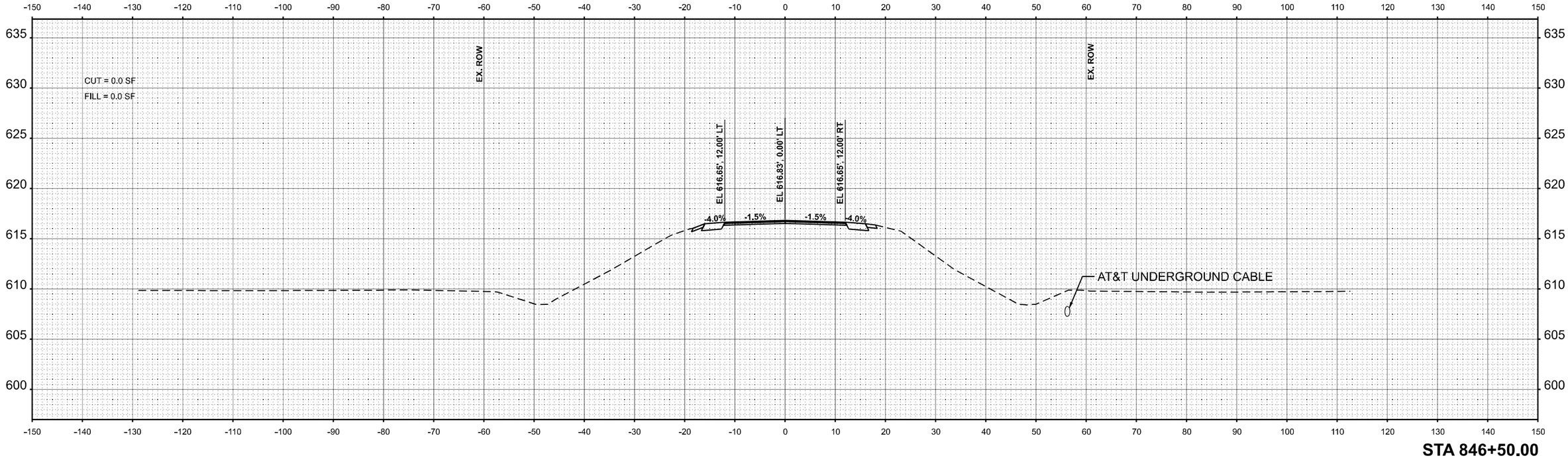
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

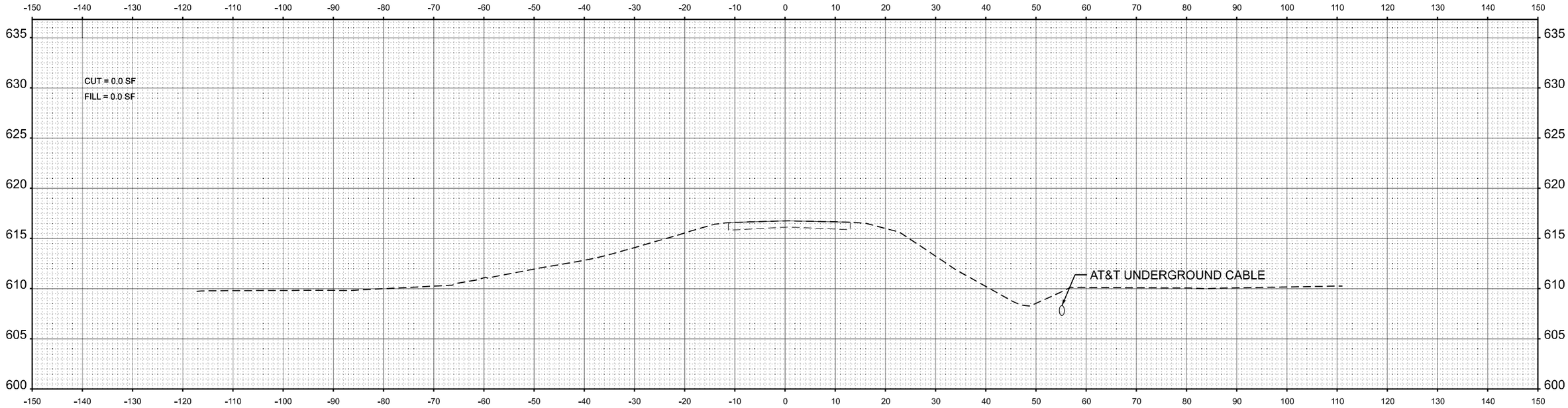
ROADWAY DETAILS

SCALE: NTS | SHEET 2 OF 2 SHEETS | STA. | TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	66
		CONTRACT NO. 66L10		
		ILLINOIS	FED. AID PROJECT	



STA 846+50.00



STA 846+00.00

Wight	USER NAME = tbarker	DESIGNED - TJB	REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	CROSS SECTIONS IL 17 OVER HORSE CREEK
		DRAWN - TJB	REVISED -		
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	PLOT DATE = 3/19/2024	DATE - _____	REVISED -		

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	67
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

FINAL SURVEY — NOTE BOOK — NO. — SURVEYED — PLOTTED — TEMPLATE — AREAS — AREAS CHECKED — BY — DATE

ORIGINAL SURVEY — NOTE BOOK — NO. — SURVEYED — PLOTTED — TEMPLATE — AREAS — AREAS CHECKED — BY — DATE

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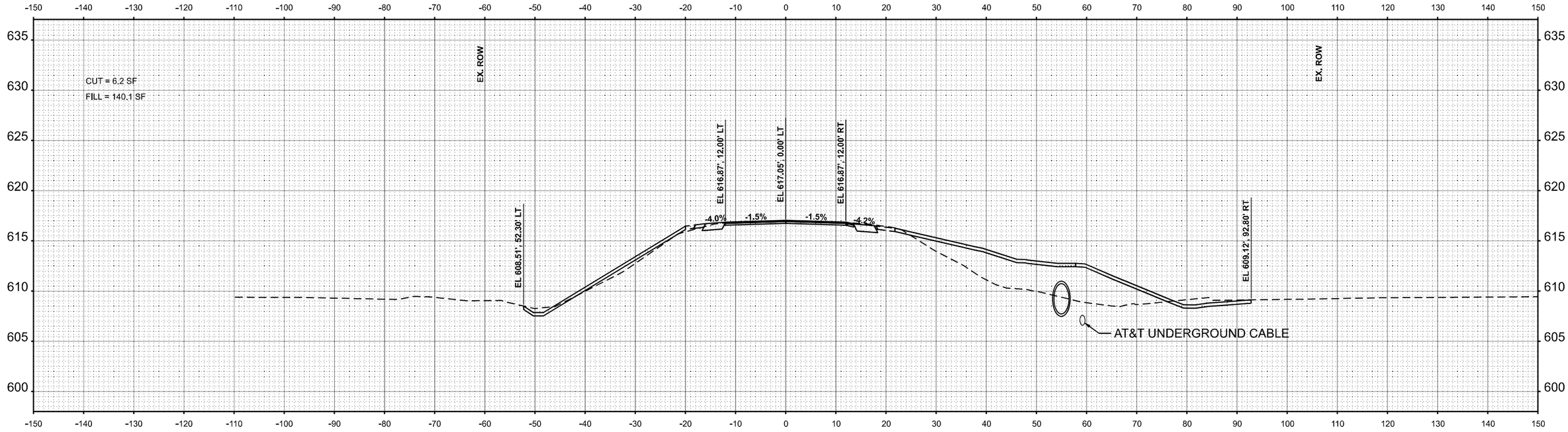

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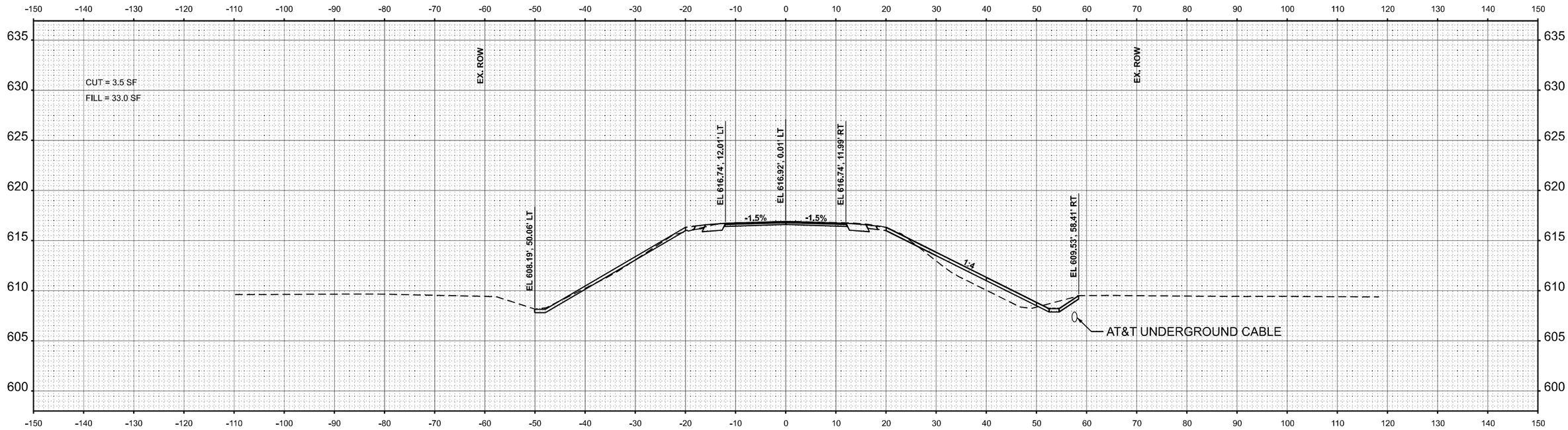

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	BY	DATE
SURVEYED		
PLOTTED		
TEMPLATE		
AREAS		
AREAS CHECKED		
NOTE BOOK		
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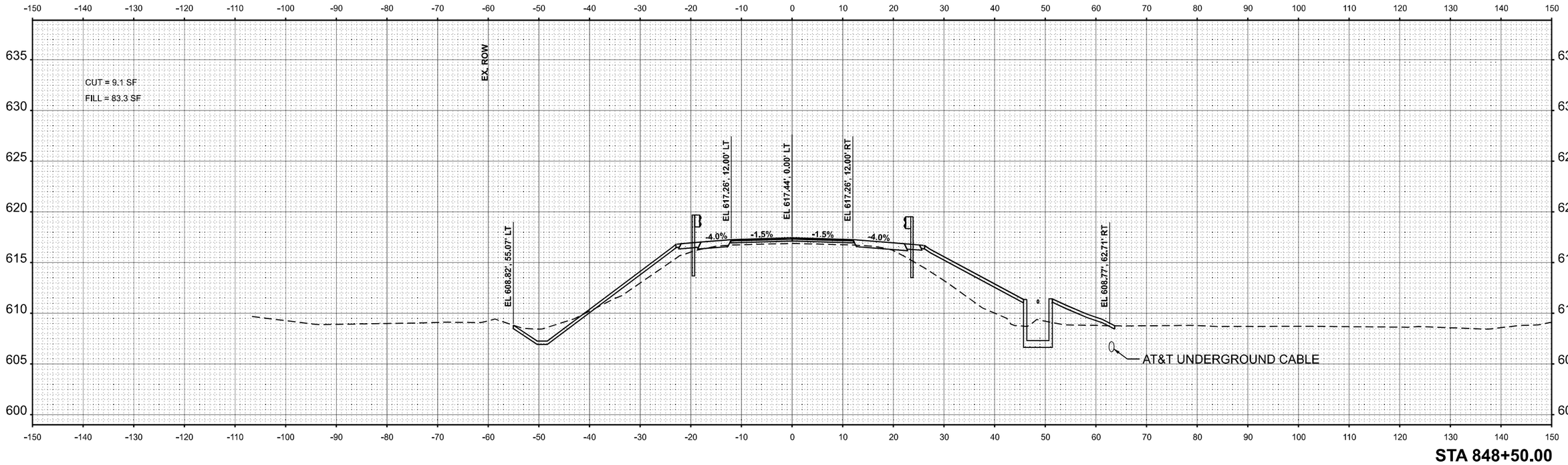
PLOT DATE = 3/19/2024	DATE - ____	REVISED - ____	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

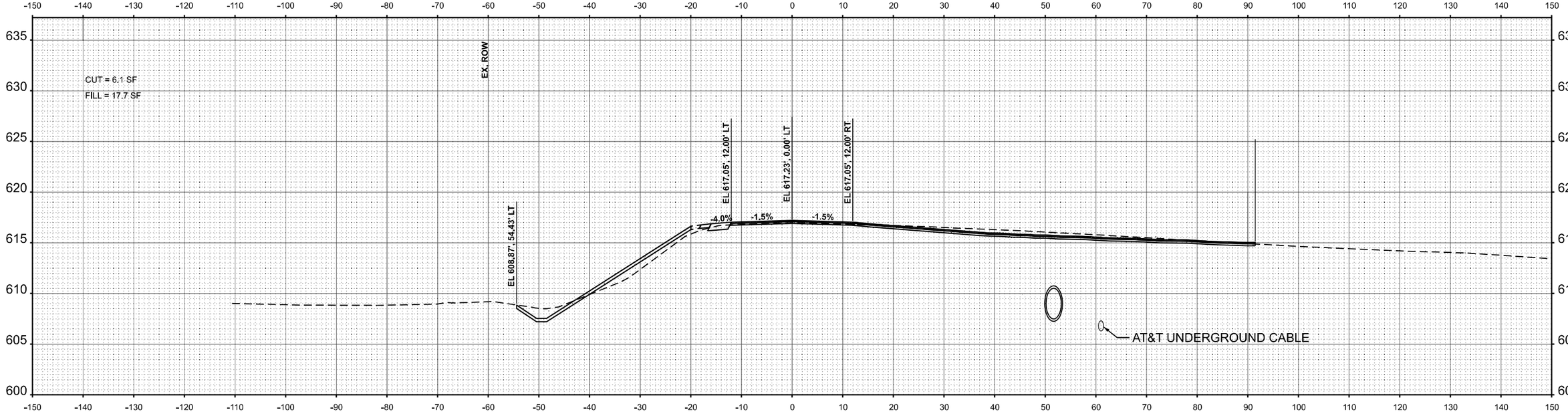
CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 2 OF 11 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	68
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



STA 848+50.00



STA 848+00.00

FINAL SURVEY / ORIGINAL SURVEY
NOTE BOOK
NO.
SURVEYED
PLOTTED
TEMPLATE
AREAS
AREAS CHECKED
BY
DATE

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PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 3 OF 11 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	69
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

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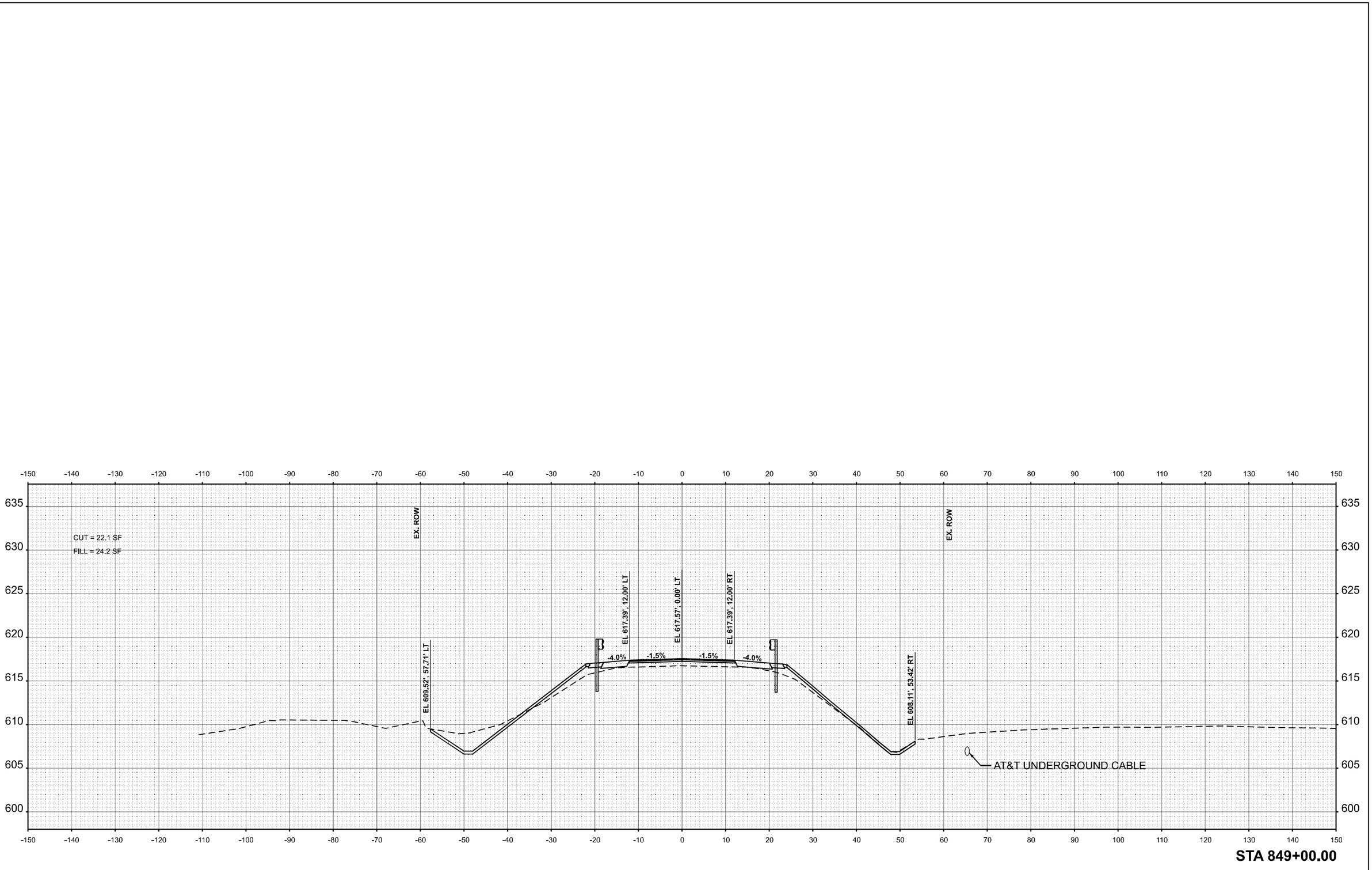
	PLOTTED		
NOTE BOOK	TEMPLATE		
	AREAS		
NO.	AREAS CHECKED		



STA 849+00.00

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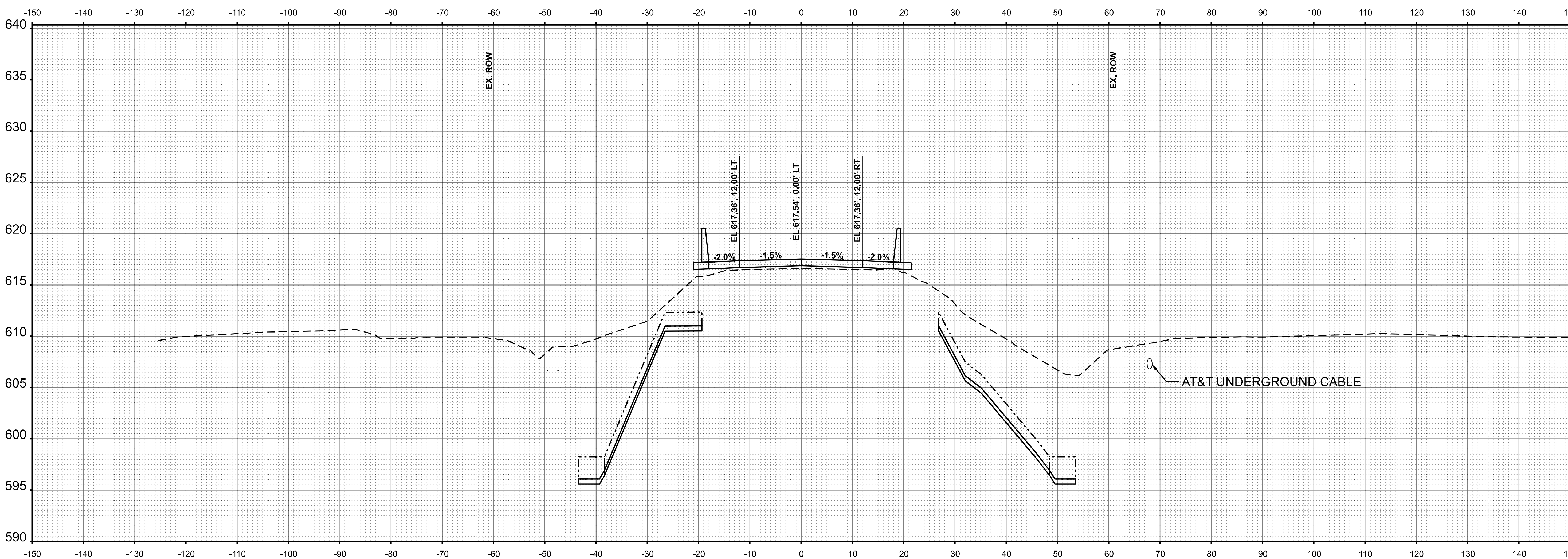
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 4 OF 11 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	70
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



STA 849+50.00

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PLOTTED		
TEMPLATE		
AREAS		
AREAS CHECKED		
NOTE BOOK NO.		

ORIGINAL SURVEY	BY	DATE
SURVEYED		
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AREAS		
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NOTE BOOK NO.		

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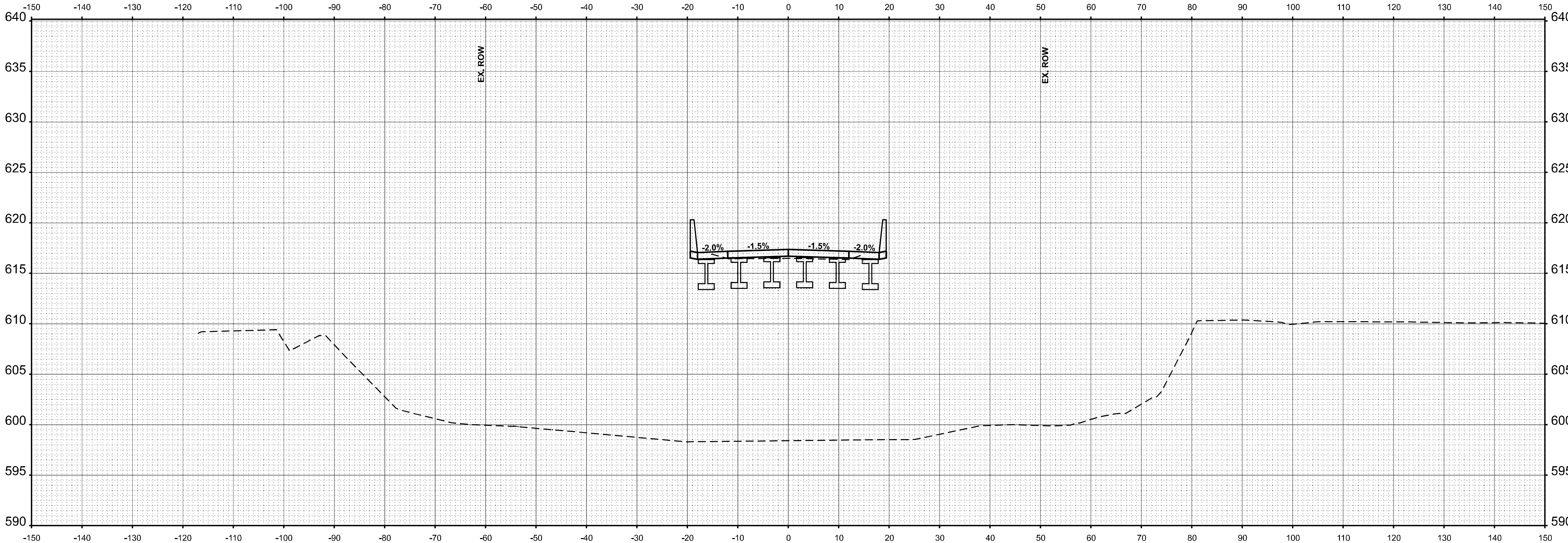
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 5 OF 11 SHEETS | STA. ____ TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	71
		CONTRACT NO. 66L10		
		ILLINOIS FED. AID PROJECT		



STA 850+00.00

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PLOT DATE = 3/19/2024	DATE -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 6 OF 11 SHEETS | STA. ____ TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	72
		CONTRACT NO. 66L10		

ILLINOIS FED. AID PROJECT

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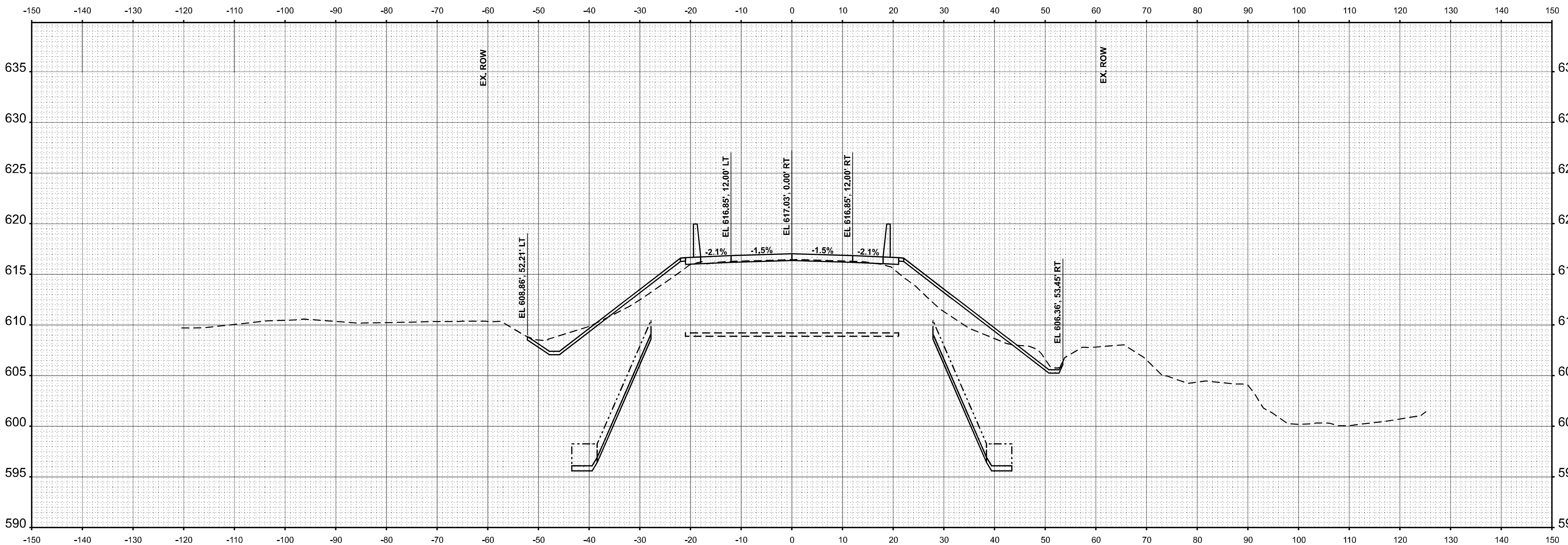

STA 850+50.00

FINAL SURVEY	BY	DATE
NOTE BOOK NO. ___		
SURVEYED		
PLOTTED		
TEMPLATE		
AREAS		
AREAS CHECKED		

ORIGINAL SURVEY	BY	DATE
NOTE BOOK NO. ___		
SURVEYED		
PLOTTED		
TEMPLATE		
AREAS		
AREAS CHECKED		

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PLOT DATE = 3/19/2024	DATE - ____	REVISED - ____

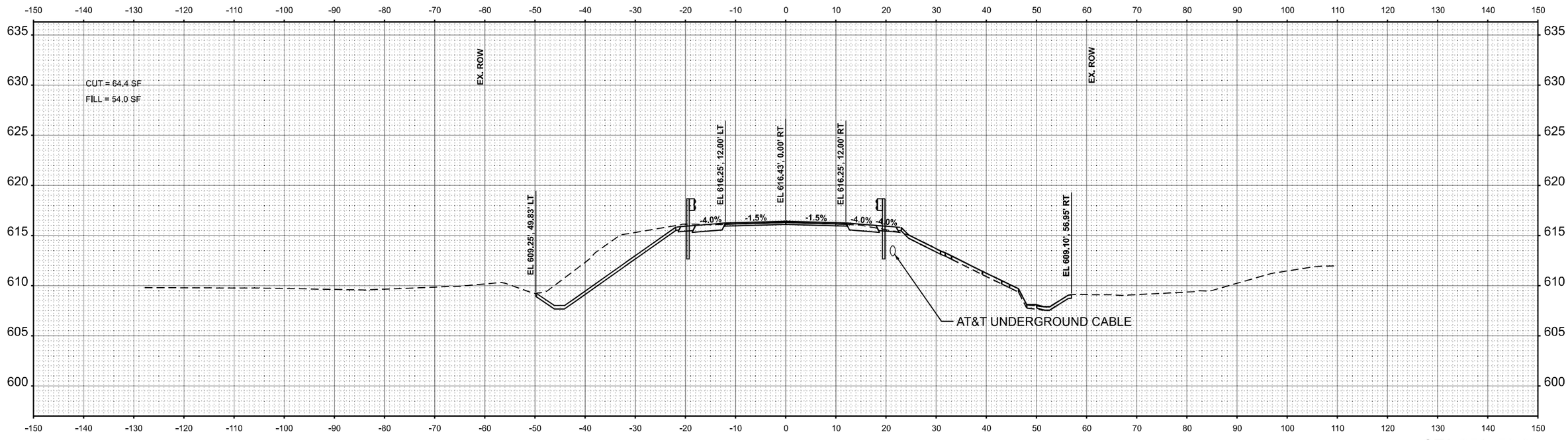
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
IL 17 OVER HORSE CREEK

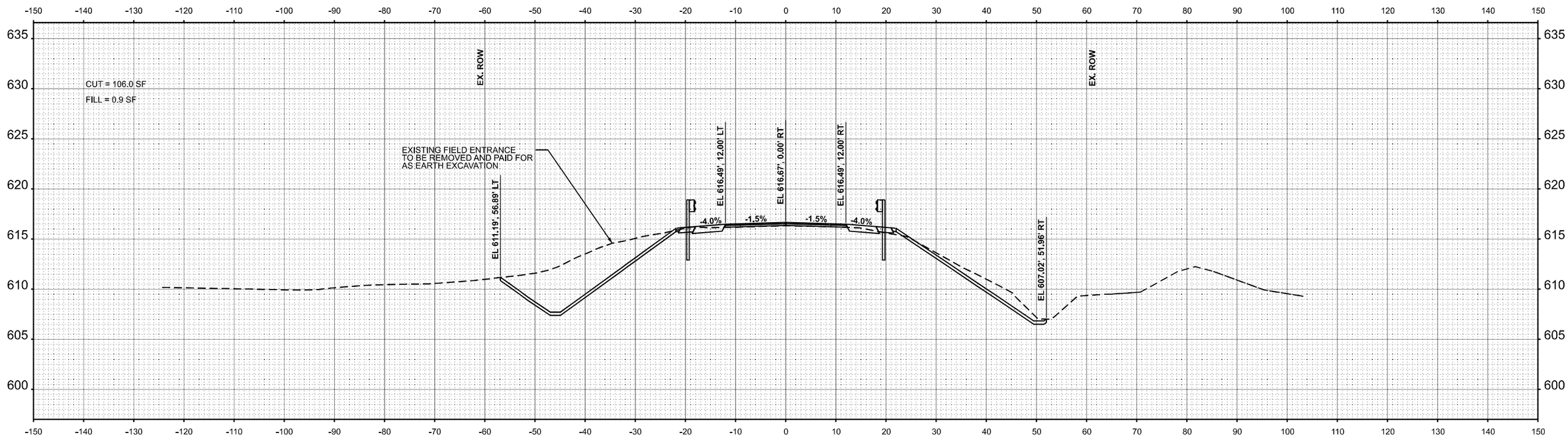
SCALE: 1"=10' | SHEET 7 OF 11 SHEETS | STA. ____ TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	73
		CONTRACT NO. 66L10		

ILLINOIS | FED. AID PROJECT



STA 851+50.00



STA 851+00.00

FINAL SURVEY | NOTE BOOK | NO. | SURVEYED | PLOTTED | TEMPLATE | AREAS | AREAS CHECKED | BY | DATE

ORIGINAL SURVEY | NOTE BOOK | NO. | SURVEYED | PLOTTED | TEMPLATE | AREAS | AREAS CHECKED | BY | DATE

MODEL: IL 17 Cross Sections - 851+00.00 [Sheet]
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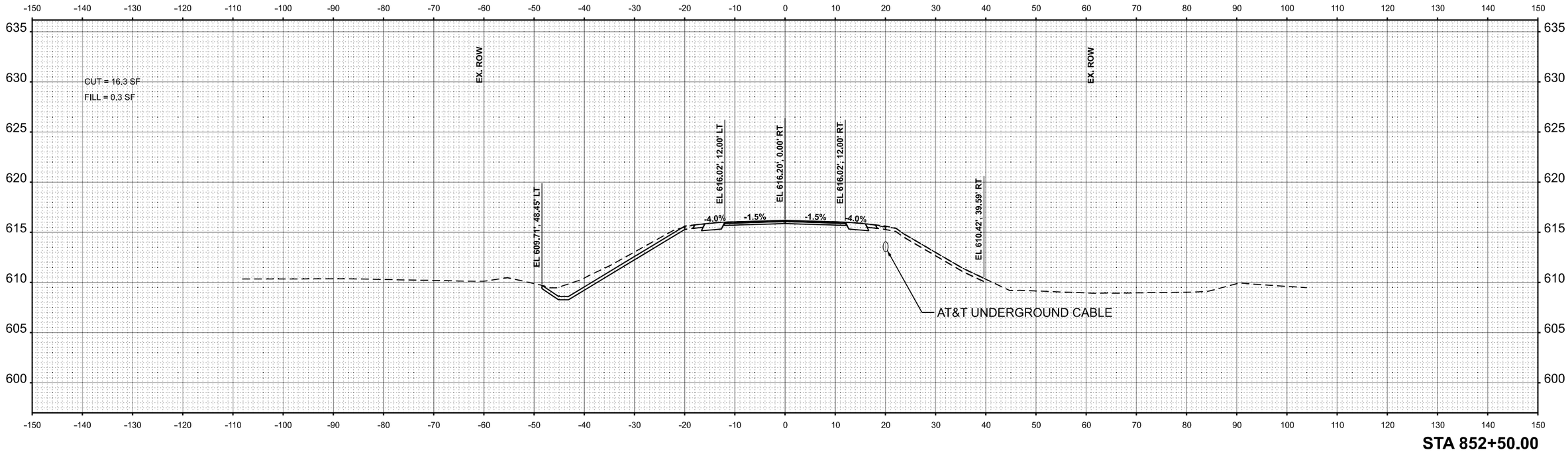
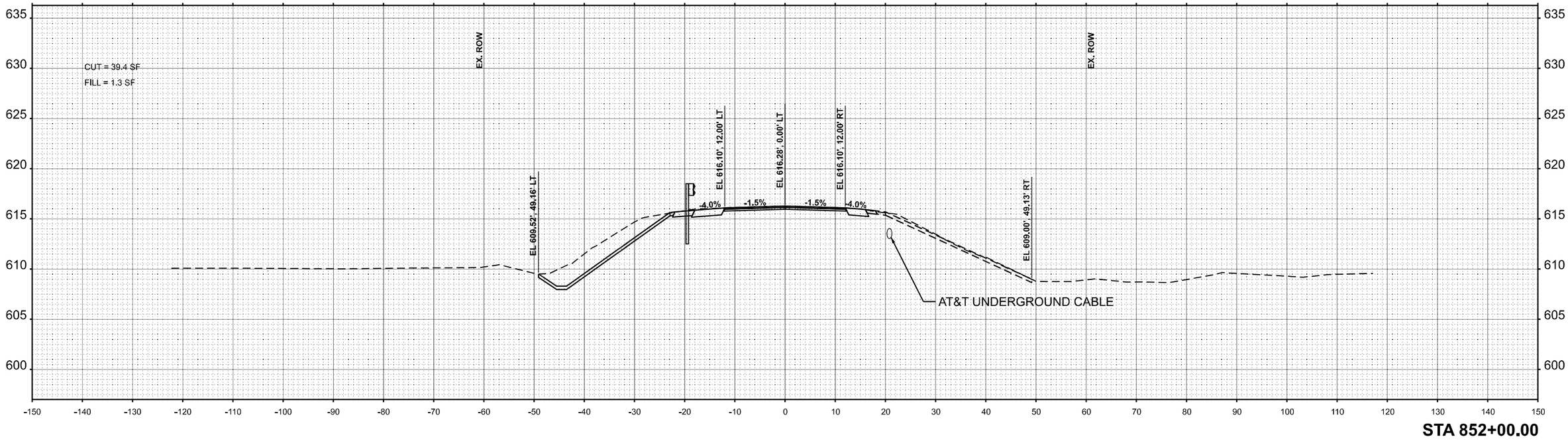
Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED - ____	**STATE OF ILLINOIS**	**CROSS SECTIONS**
	DRAWN - TJB	REVISED - ____	**DEPARTMENT OF TRANSPORTATION**	**IL 17 OVER HORSE CREEK**
PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED - ____		SCALE: 1"=10' | SHEET 8 OF 11 SHEETS | STA. ____ | TO STA. ____
PLOT DATE = 3/19/2024	DATE - ____	REVISED - ____		

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	74
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



STA 852+50.00



STA 852+00.00

FINAL SURVEY	SURVEYED	BY	DATE
	PLOTTED		
NOTE BOOK	TEMPLATE		
NO.	AREAS		
	AREAS CHECKED		

ORIGINAL SURVEY	SURVEYED	BY	DATE
	PLOTTED		
NOTE BOOK	TEMPLATE		
NO.	AREAS		
	AREAS CHECKED		

MODEL: IL 17 Cross Sections - 852+00.00 [Sheet]
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Wight

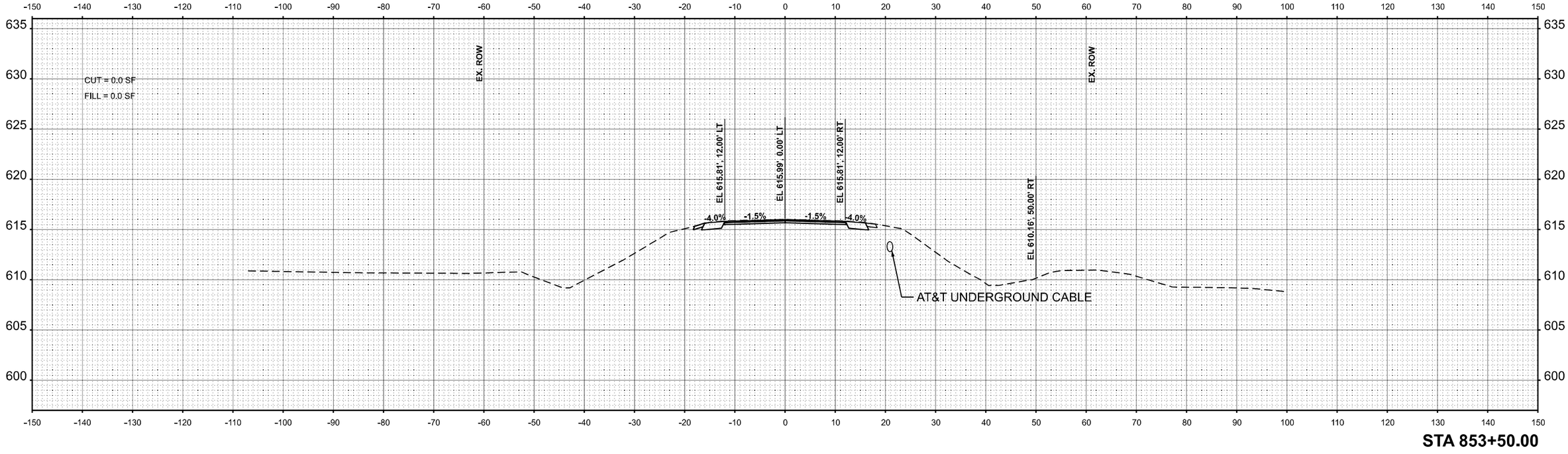
USER NAME = tbarker	DESIGNED - TJB	REVISED -	
	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

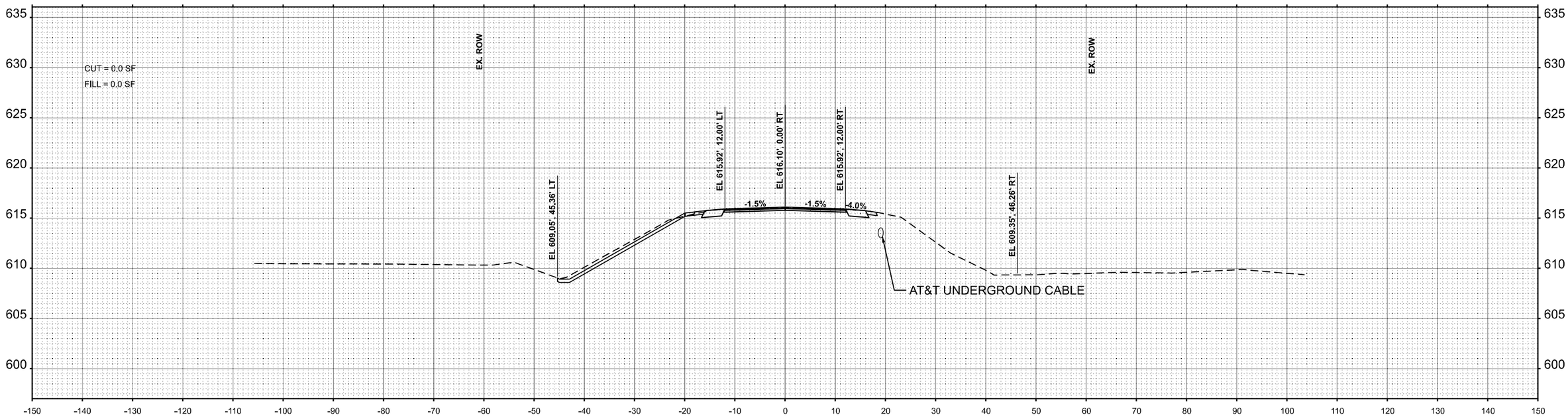
CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 9 OF 11 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	75
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



STA 853+50.00



STA 853+00.00

FINAL SURVEY / ORIGINAL SURVEY
NOTE BOOK
NO.
SURVEYED
PLOTTED
TEMPLATE
AREAS
AREAS CHECKED
BY
DATE

MODEL: IL 17 Cross Sections +853+00.00 [Sheet]
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Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED - ____	
	DRAWN - TJB	REVISED - ____	
PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED - ____	
PLOT DATE = 3/19/2024	DATE - ____	REVISED - ____	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

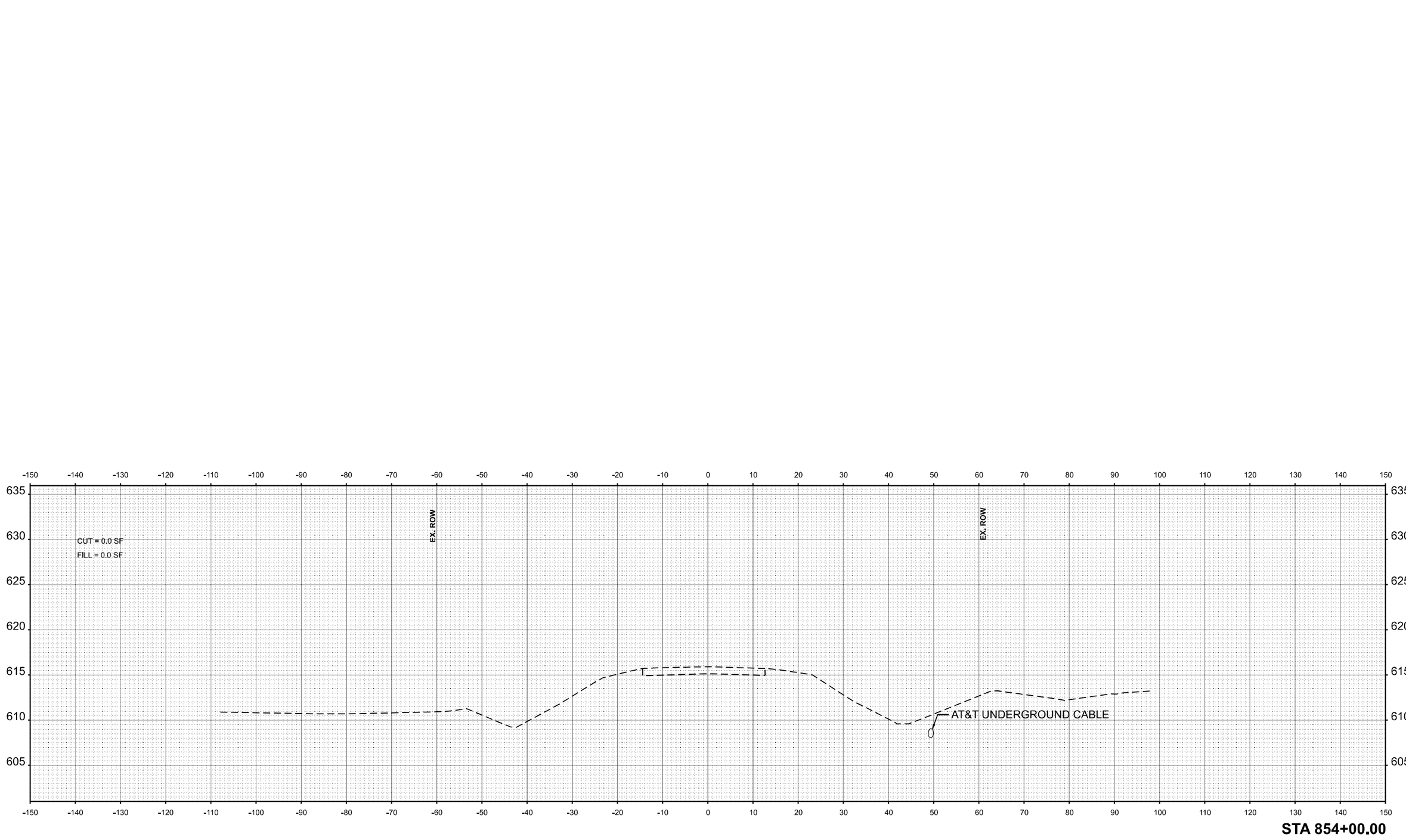
CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 10 OF 11 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	76
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

FINAL SURVEY		BY	DATE
NOTE BOOK	SURVEYED		
NO.	PLOTTED		
	TEMPLATE		
	AREAS		
	AREAS CHECKED		

ORIGINAL SURVEY		BY	DATE
NOTE BOOK	SURVEYED		
NO.	PLOTTED		
	TEMPLATE		
	AREAS		
	AREAS CHECKED		



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Wight

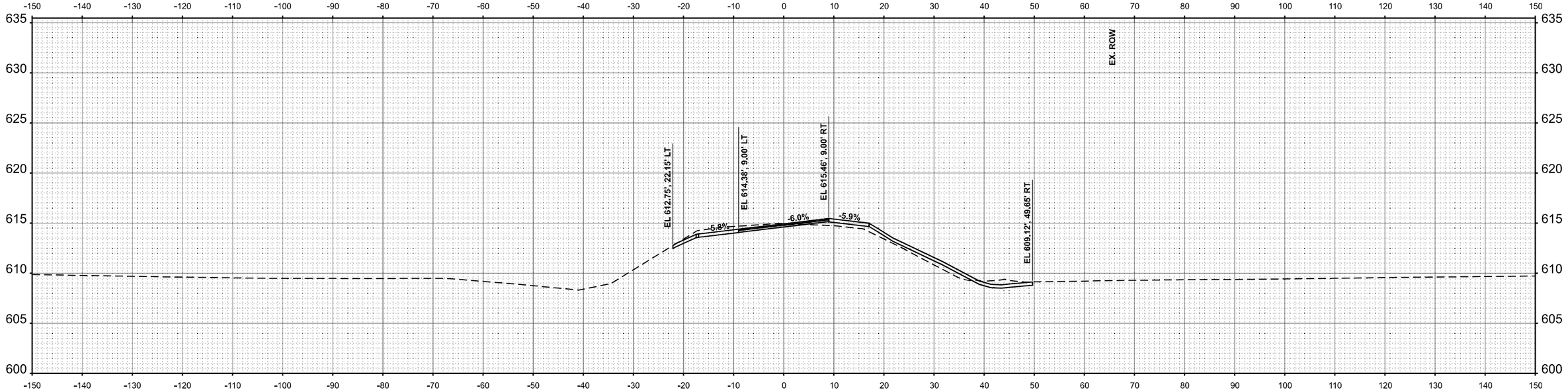
USER NAME = tbarker	DESIGNED - TJB	REVISED -	
	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

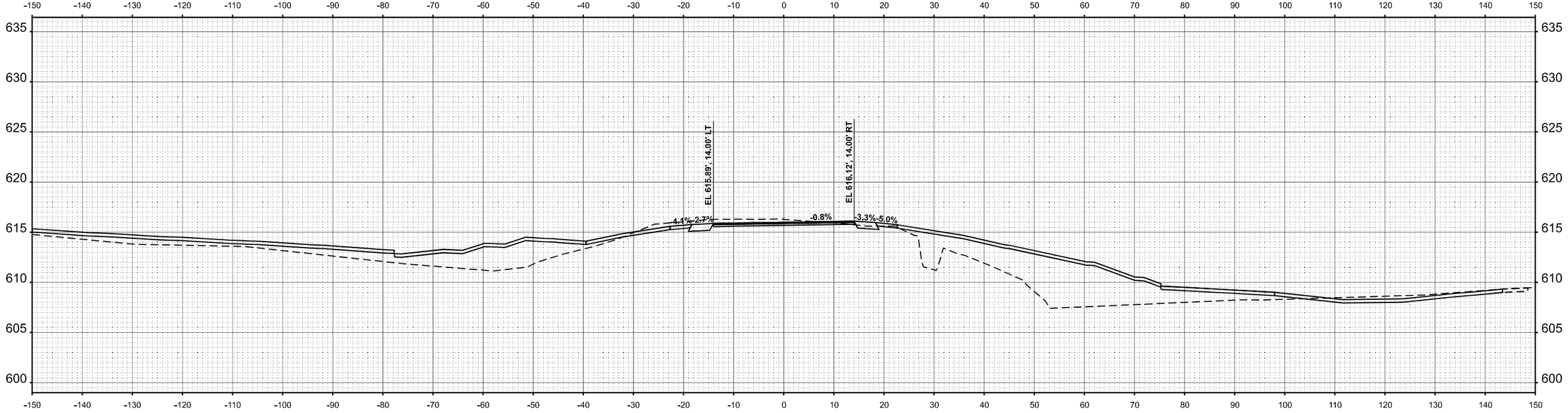
CROSS SECTIONS
IL 17 OVER HORSE CREEK

SCALE: 1"=10' | SHEET 11 OF 11 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	77
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		



STA 0+91.65



STA 0+40.00

ORIGINAL SURVEY		FINAL SURVEY
SURVEYED		
PLOTTED		
TEMPLATE		
AREAS		
AREAS CHECKED		
NOTE BOOK		
NO.		
BY		
DATE		

MODEL: TR 32 Cross Sections - 0+40.00 [Sheet]
FILE NAME: G:\CAD\IDOT\CAD_ORD_V10.10.02\Configuration\WorkSpaces\IDOT\CAD CONNECT Work Space\21029-IDOT D3 Work Order 8\CADD Data\Sheets\D396L10-xsc.dgn

Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED -	
	DRAWN - TJB	REVISED -	
PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED -	
PLOT DATE = 3/19/2024	DATE -	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

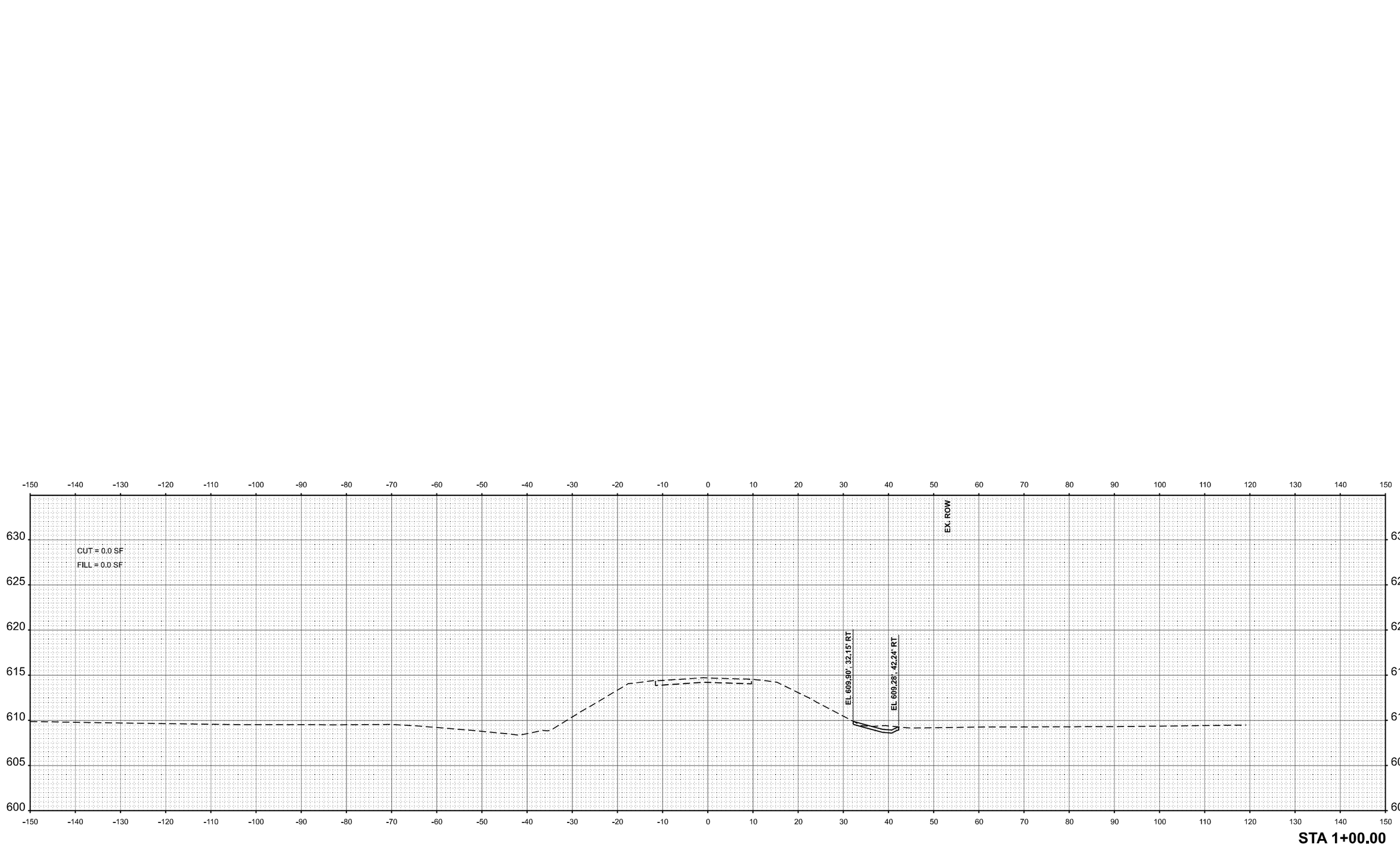
CROSS SECTIONS
S1400W RD. (TR 32)

SCALE: 1"=10' | SHEET 12 OF 13 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	78
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		

FINAL SURVEY		BY	DATE
NOTE BOOK	SURVEYED		
NO.	PLOTTED		
	TEMPLATE		
	AREAS		
	AREAS CHECKED		

ORIGINAL SURVEY		BY	DATE
NOTE BOOK	SURVEYED		
NO.	PLOTTED		
	TEMPLATE		
	AREAS		
	AREAS CHECKED		



STA 1+00.00

MODEL: TR 32 Cross Sections - 1+00.00 [Sheet]
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Wight

USER NAME = tbarker	DESIGNED - TJB	REVISED - ____	
	DRAWN - TJB	REVISED - ____	
PLOT SCALE = 0.16666633 ' / In.	CHECKED - JNH	REVISED - ____	
PLOT DATE = 3/19/2024	DATE - ____	REVISED - ____	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
S1400W RD. (TR 32)

SCALE: 1"=10' | SHEET 13 OF 13 SHEETS | STA. ____ | TO STA. ____

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
41	(13)BR-2	KANKAKEE	79	79
		CONTRACT NO. 66L10		
	ILLINOIS	FED. AID PROJECT		