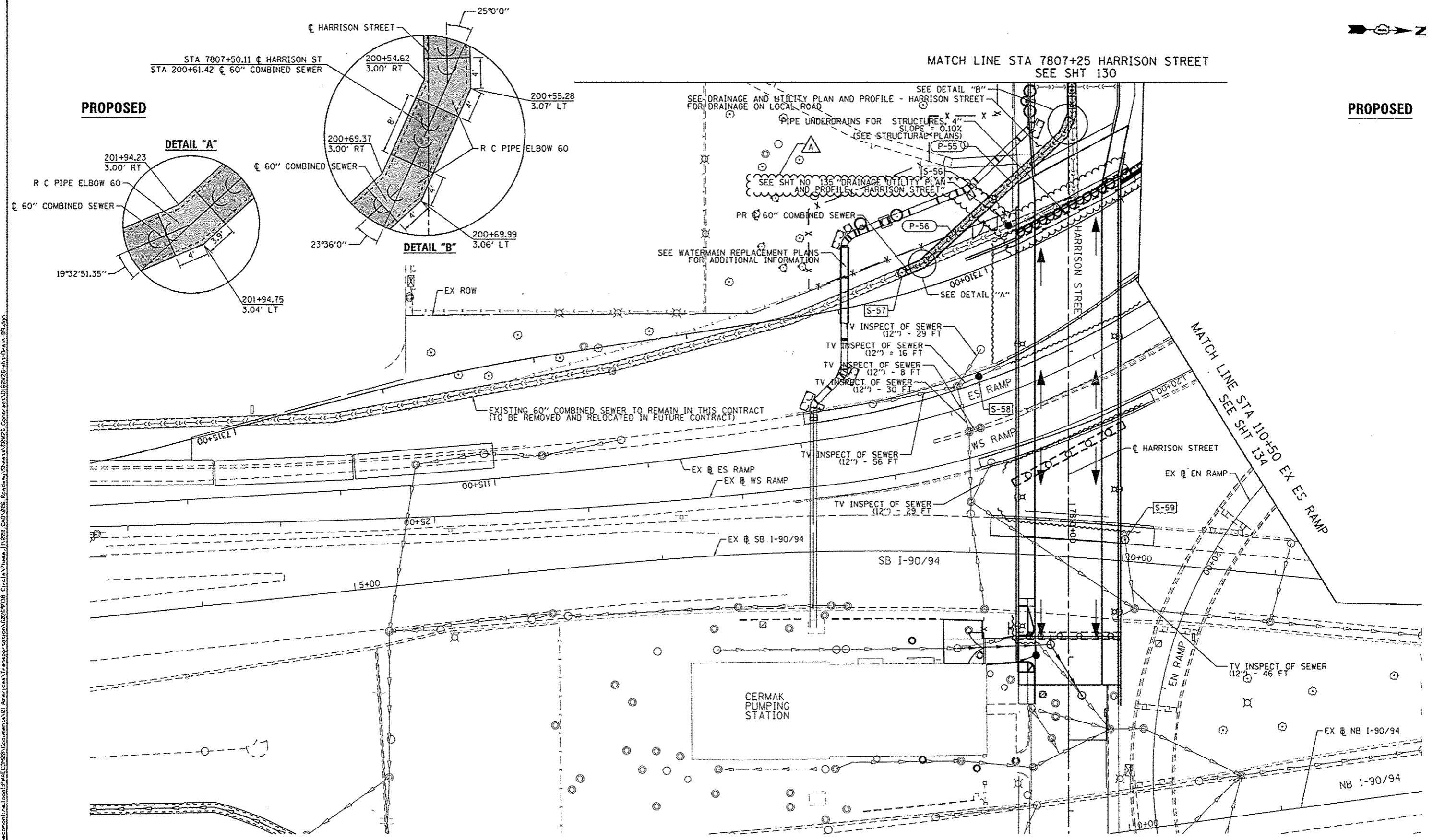


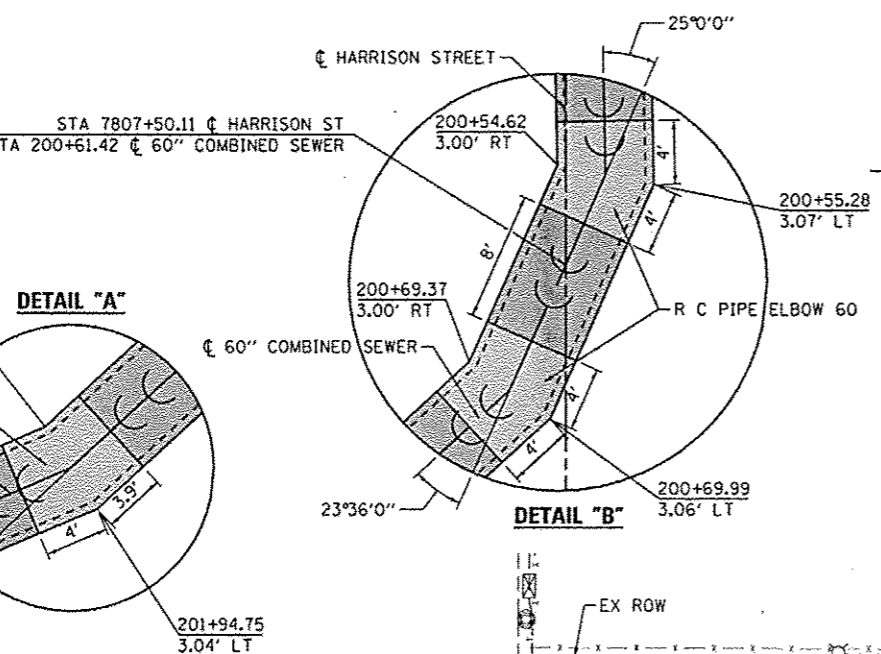
PROPOSED



GRAPHIC SCALE



PROPOSED



MATCH LINE STA 7807+25 HARRISON STREET
SEE SHT 130

MATCH LINE STA 110+50 EX ES RAMP
SEE SHT 134

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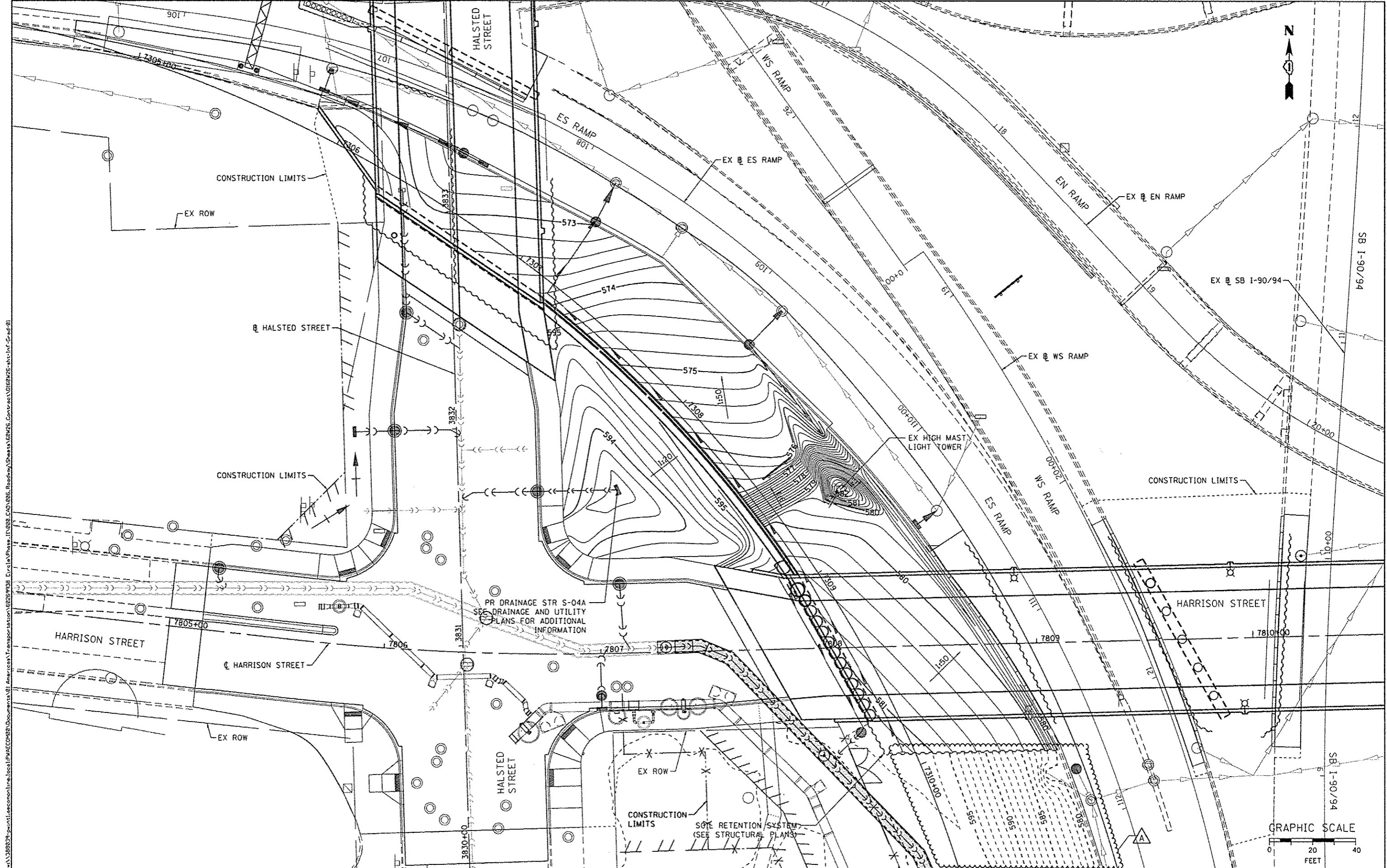
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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

DRAINAGE AND UTILITY PLAN
RAMP ES AND SB I-90/94

SCALE: 1"=30' SHEET 9 OF 10 SHEETS STA. TO STA.

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	138
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				



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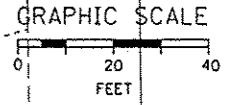
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DATE - 10/15/13	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

INFIELD GRADING PLAN

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

F.A.I. RTE. 90/94/290	SECTION 2013-D08R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 139A
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				



WATER MAIN GENERAL NOTES:

- LOCATION OF UTILITIES AND PROPERTY LINES ARE FROM THE BEST INFORMATION AVAILABLE. EXACT LOCATION AND COMPLETENESS ARE NOT GUARANTEED.
- THE CONTRACTOR MUST VERIFY THE LOCATION OF UNDERGROUND UTILITIES WITH THE UTILITY OWNERS PRIOR TO DOING ANY WORK IN THE VICINITY. THE CONTRACTOR MUST COMPLY WITH REQUIREMENTS OF UTILITY OWNERS REGARDING NOTICE OF WORK AND PROTECTION OF UTILITIES. THE CONTRACTOR MUST COMPLY WITH THE CITY OF CHICAGO, DEPARTMENT OF TRANSPORTATION DAMAGE PREVENTION PROTOCOL CITY INFRASTRUCTURE DEPARTMENTS. ALL UTILITIES MUST BE NOTIFIED AT LEAST 48 HOURS BEFORE CONSTRUCTION. (CALL DIGGER 312-744-7000)
- IF ANY PUBLIC OR PRIVATE UTILITIES CROSS THE WATER MAIN TRENCH AND MUST REMAIN IN PLACE, THE CONTRACTOR MUST PROTECT SAID UTILITY IN CONFORMANCE WITH THE SPECIFICATIONS OR AS DIRECTED BY THE CHICAGO DEPARTMENT OF WATER MANAGEMENT BUREAU OF ENGINEERING SERVICES.
- TEST PITS MUST BE EXCAVATED IN ADVANCE OF PIPELINE CONSTRUCTION IN ORDER TO CONFIRM DEPTH AND LOCATION OF EXISTING UTILITIES AND WHEN DIRECTED BY THE ENGINEER. NO ADDITIONAL PAYMENT WILL BE MADE FOR TEST PIT EXCAVATION.
- WORK INDICATED ON THE PLANS AND NOT REFERENCED TO A BID ITEM IS CONSIDERED INCIDENTAL TO THE WORK TO WHICH IT APPLIES AND NO ADDITIONAL COMPENSATION WILL BE ALLOWED.
- WATER MAIN AND FITTINGS LOCATIONS SHOWN ON THE DRAWINGS FOR THE NEW WATER MAINS AND APPURTENANCES MAY BE CHANGED BY THE ENGINEER DUE TO FIELD CONDITIONS. NO ADDITIONAL COMPENSATION WILL BE ALLOWED FOR SUCH CHANGES, UNLESS PREVIOUSLY APPROVED BY THE ENGINEER.
- THE OPERATION OF ALL VALVES REQUIRED FOR SHUTDOWN MUST BE PERFORMED BY CDWM FORCES PURSUANT TO A 72 HOUR ADVANCE NOTIFICATION TO THE DEPARTMENT. ANY VALVE FOUND NOT OPERABLE WILL BE REPAIRED OR REPLACED BY CDWM.
- REMOVE AND PROPERLY DISPOSE OF ALL WATER ENTERING ANY EXCAVATION INCLUDING LEAKAGE FROM EXISTING WATER MAINS. ALL EXCAVATIONS ASSOCIATED WITH THE WATER MAIN WORK MUST BE KEPT DRY.
- ALL OPENINGS IN EXISTING WATER MAINS MUST BE PLUGGED OR CAPPED WITH DUCTILE IRON FITTINGS UNTIL THE MAIN IS ABANDONED.
- ALL VALVE BASINS MUST BE CONSTRUCTED OF PRE-CAST REINFORCED CONCRETE UNLESS DIRECTED OTHERWISE BY THE ENGINEER.
- NOTES INDICATING S.N.L., E.W.L., ETC. MEAN SOUTH OF THE NORTH PROPERTY LINE, EAST OF THE WEST PROPERTY LINE, ETC. AND ARE MEASURED FROM THE NEAREST STREET.
- IF A STANDARD MECHANICAL JOINT SLEEVE DOES NOT FIT TO MAKE CONNECTION OF THE NEW PIPE TO THE EXISTING PIPE, A TRANSITION SLEEVE MUST BE USED. NO GRINDING OF THE EXISTING PIPE IS PERMITTED.
- THE CONTRACTOR SHALL CONSULT AND FOLLOW RESTRAINED JOINT PIPE MANUFACTURER'S GUIDELINES AS TO EXTENSION OF THE JOINT AFTER ASSEMBLY IN ORDER TO LIMIT THE JOINT TAKE-UP UNDER PRESSURE TEST OR SERVICE CONDITIONS.
- USE FILLER PIECES OF PIPE TO FILL THE AREA BETWEEN PIPE ENDS WHEN INSTALLING SLEEVE FITTINGS.
- ON CONNECTIONS TO EXISTING CAST IRON PIPES, USE CAUTION WHEN INSTALLING MJ SLEEVES. SET SCREW TYPE RESTRAINT GLANDS (E.G. RETAINER GLANDS) ARE NOT ACCEPTABLE. CONSULT THE SPECIFICATIONS FOR JOINT RESTRAINT REQUIREMENTS.
- ABANDON EXISTING WATER MAINS IN ACCORDANCE WITH THE SPECIFICATIONS.
- SWAB ALL PIPE AND FITTINGS WITH CHLORINE SOLUTION DURING INSTALLATION AND USE EXTRA PRECAUTION TO PREVENT SOIL AND DEBRIS FROM ENTERING THE PIPE. COMPLY WITH ALL STANDARDS AND REQUIREMENTS OF THE CDWM BUREAU OF WATER QUALITY, (312) 744-8190
- DE-CHLORINATION OF HEAVILY CHLORINATED WATER IS REQUIRED. THE CONTRACTOR OR SUBCONTRACTED CHLORINATOR SHALL DE-CHLORINATE AS LISTED FOR "INFORMATIONAL PURPOSES ONLY" IN APPENDIX C OF THE ANSI/AWWA STANDARD C-651-05, JUNE 1, 2005. THE CHLORINE LEVEL MUST BE BROUGHT TO POTABLE WATER LEVELS.
- ELEVATIONS ARE SHOWN IN THE CITY OF CHICAGO DATUM AND NAVD 88. THE CONVERSION FACTOR FROM CCD TO NAVD88 IS: NAVD 88 ELEVATION = CCD + 579.19.
- CONTRACTOR SHALL CONSTRUCT THE IMPROVEMENTS ONLY WITHIN THE RIGHT-OF-WAY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY AND ALL DAMAGE TO PRIVATE PROPERTY AND SHALL REPAIR SAID DAMAGE AT OWN EXPENSE TO THE SATISFACTION OF THE ENGINEER.
- ALL CASING PIPES MUST BE SMOOTH WELDED STEEL PIPE MEETING THE REQUIREMENTS OF ASTM A139, GRADE B. THE EXTERIOR OF THE CASING PIPE MUST HAVE COAL-TAR ENAMEL IN ACCORDANCE WITH AWWA C203 AND HAVE A THICKNESS OF 1.000 INCHES AND AN OUTSIDE DIAMETER OF 72 INCHES.
- SPACERS FOR CARRIER PIPES MUST BE EITHER THE TWO-PIECE METAL BAND TYPE WITH 2-INCH WIDE NON-METALLIC RUNNERS OR UNITS MANUFACTURED ENTIRELY OUT OF HIGH-DENSITY POLYETHYLENE. ON TWO-PIECE METAL BAND TYPE SPACERS, BANDS AND FASTENERS MUST BE OF CORROSION RESISTANT MATERIAL. ALL SPACERS MUST BE RATED FOR HEAVY DUTY SERVICE, MANUFACTURED BY (PSI) PIPELINE SEAL AND INSULATOR, INCORPORATED; CASCADE WATERWORKS MANUFACTURING COMPANY OR RACI SPACERS NORTH AMERICA.
- PRIOR TO INSERTION IN THE CASING, EACH LENGTH OF PIPE MUST BE SUPPORTED ON CASING SPACERS IN SUCH A MANNER THAT AT NO TIME WILL THE WEIGHT OF THE PIPE BEAR ON THE BELL OR ANY PART OF THE PIPE TOUCH THE CASING.
- ALL PIPES MUST BE JOINTED PRIOR TO BEING PUSHED OR PULLED THROUGH THE CASING PIPE. AFTER PLACEMENT OF THE CARRIER PIPE THROUGH THE CASING, THE ENDS OF THE CASING ARE TO BE SEALED WITH BRICK AND MORTAR OR RUBBER END SEAL OR OTHER APPROVED METHOD AND MUST BE COMPLETELY LEAK-TIGHT.

BILL OF MATERIALS:

NOTE: ALL PIPE AND FITTINGS INCLUDED BELOW WILL BE SUPPLIED TO THE CONTRACTOR AND WILL BE AVAILABLE AS IDENTIFIED IN THE SPECIAL PROVISIONS. ALL OTHER ITEMS REQUIRED TO PERFORM WORK AS SHOWN ARE THE RESPONSIBILITY OF THE CONTRACTOR.

- 420' OF 48" DI RESTRAINED JOINT PIPE
- 140' OF 24" DI RESTRAINED JOINT PIPE
- 50' OF 72" STEEL CASING PIPE
- 3-48"x24" 3BRJ TEE
- 1-48"x12" 3BRJ TEE
- 2-48" 2BRJ 1/4 BENDS
- 1-48" MJ SLEEVE
- 1-48" MJ TRANSITION SLEEVE
- 1-24" MJ TRANSITION SLEEVE
- 5-48" 2BRJ 1/8TH BEND
- 2-48" 2BRJ 1/16TH BEND
- 1-54" R&S SPIGOT X MJ SPIGOT TRANSITION COUPLING
- 1-54"x48" 2BRJ REDUCER
- 2-24"x16" 2BRJ REDUCER
- 7-24" 2BRJ 1/8TH BEND
- 48" RESTRAINED JOINT PLUG
- 48" RESTRAINED JOINT CAP
- 2-48" BUTTERFLY VALVE
- 1-16" MECHANICAL JOINT GATE VALVE



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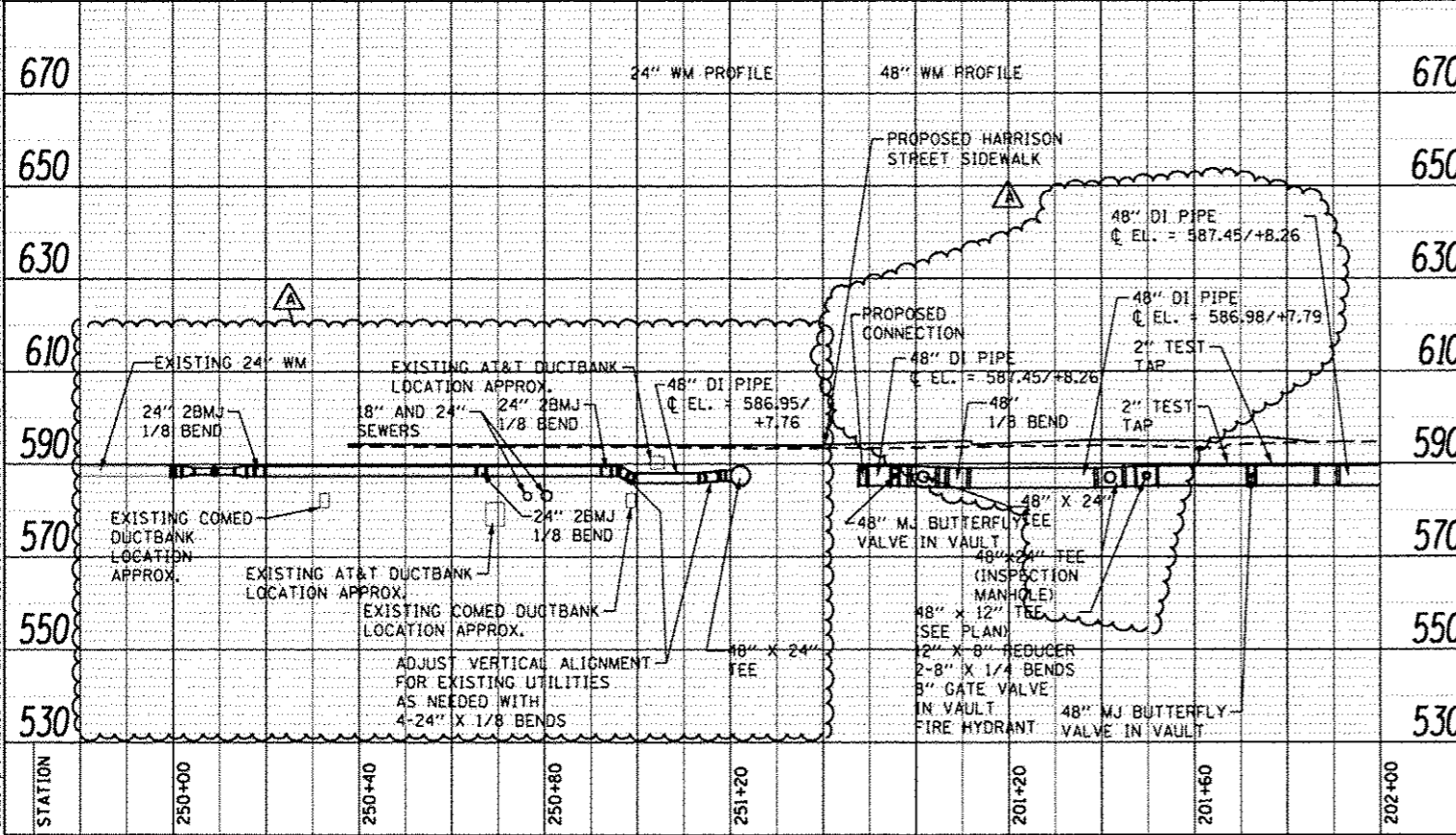
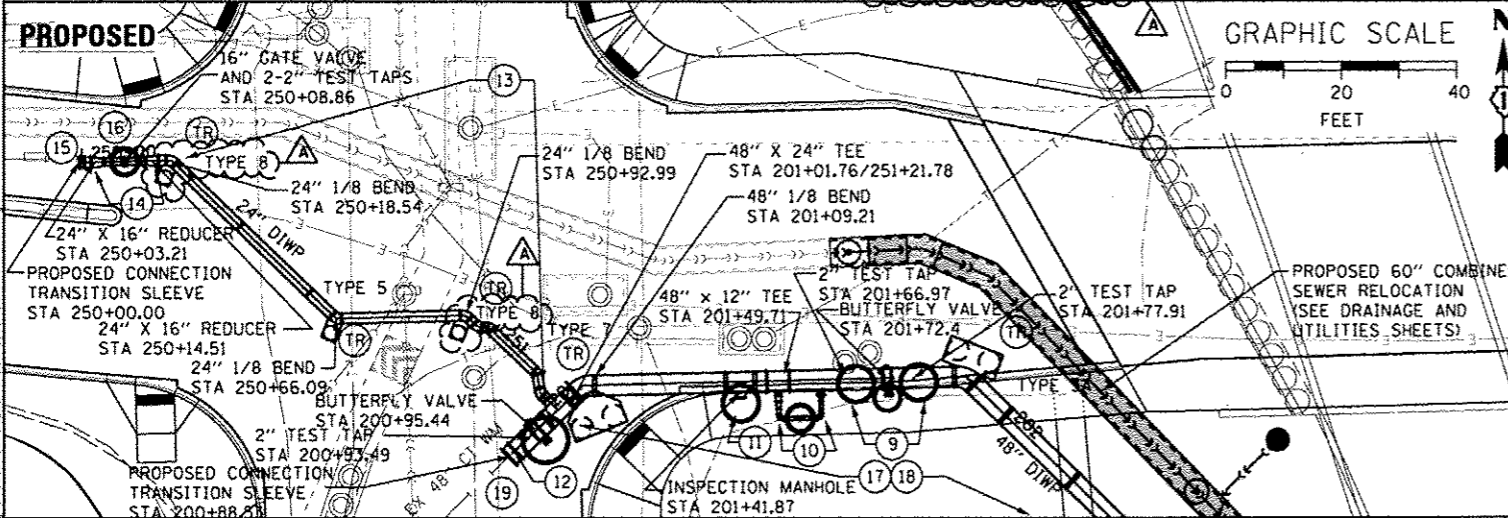
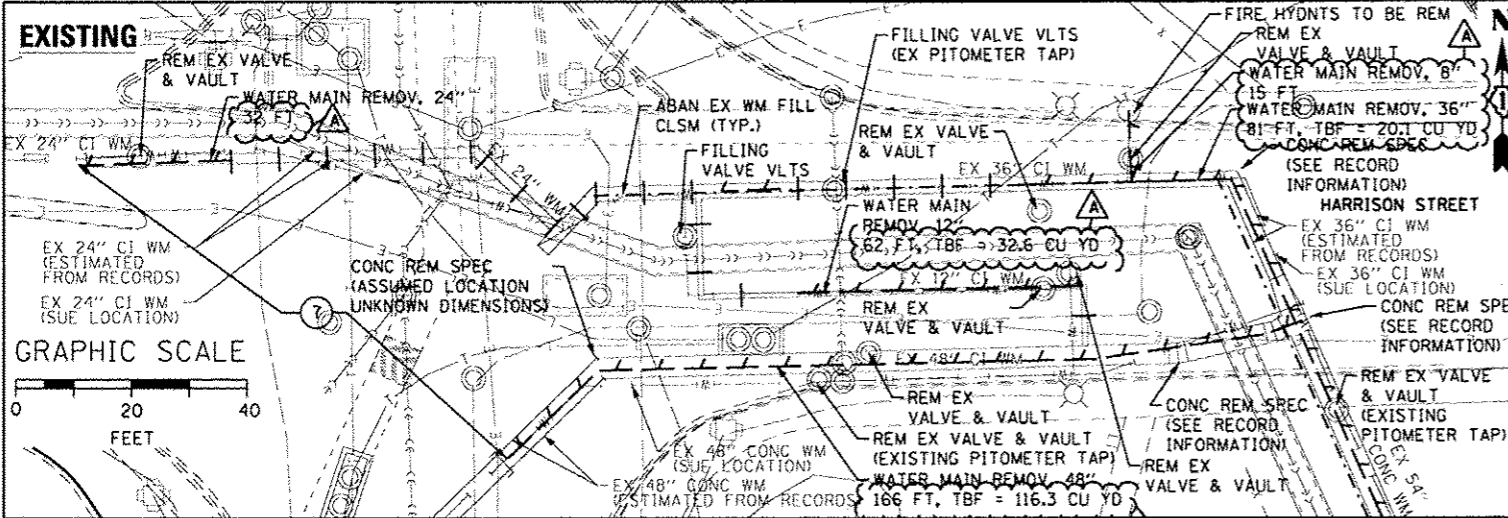
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CHECKED - RBB	REVISED -
DATE - 9/15/13	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

WATER MAIN GENERAL NOTES			
SCALE:	SHEET	OF	SHEETS
STA.	TO	STA.	

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	140
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				



CONSTRUCTION/SEQUENCING NOTES:

THE LIMITS FOR REMOVAL AND ABANDONMENT OF EXISTING WATER MAIN PIPES MUST BE DETERMINED AS PART OF STAGING REQUIREMENTS AND CONSTRUCTION LIMITS FOR SEWER, WATER MAIN, BRIDGE AND UTILITY CONSTRUCTION.

EXISTING THRUST RESTRAINTS NOT SHOWN FOR CLARITY. SEE RECORD INFORMATION FOR ANTICIPATED THRUST RESTRAINT LOCATIONS AND DIMENSIONS.

SEE SHEETS 141 & 142 FOR ADDITIONAL NOTES

7. CUT AND TEMPORARILY CAP EXISTING 48" AND 24" CAST IRON WATER MAINS TO THE WEST. REMOVE PORTIONS OF EXISTING WATER MAINS AS NECESSARY TO FACILITATE THE WORK.

SEE SHEETS 141 & 142 FOR ADDITIONAL NOTES

9. INSTALL 1-48" BUTTERFLY VALVE, 2-2" TEST TAPS IN BASINS. VALVE AND TAP BASINS FRAME AND LIDS MUST BE LOCATED SO THAT THEY DO NOT CONFLICT WITH PROPOSED CURB AND GUTTER.

10. INSTALL 1-48" X 12" TEE, 1-12" X 8" REDUCER, 2-8" X 1/4 BENDS, 1-8" GATE VALVE AND 1 FIRE HYDRANT.

11. INSTALL 1-48" X 24" TEE WITH MJ PLUG FOR INSPECTION MANHOLE. INSPECTION MANHOLE FRAME AND LID MUST BE LOCATED SO THAT IT DOES NOT CONFLICT WITH PROPOSED CURB AND GUTTER.

12. INSTALL 48" PIPE, 1-48" X 1/8 BEND, 1-48" X 24" TEE, 1-48" BUTTERFLY VALVE AND 1-2" TEST TAP IN BASIN. TEMPORARILY PLUG OR CAP THE 48" PIPE WEST OF BUTTERFLY VALVE.

13. INSTALL 24" PIPE AND 7-24" X 1/8 BENDS.

14. INSTALL 2-24" X 16" REDUCERS AND 1-16" MECHANICAL JOINT GATE VALVE WITH 2-2" TEST TAPS IN BASIN.

15. CONNECT TO EXISTING 24" CAST IRON WATER MAIN WITH 24" TRANSITION SLEEVE.

16. FILL NEW WATER MAIN THROUGH 24" CONNECTION. FLUSH ALL AIR FROM THE SYSTEM.

17. CLOSE 48" BUTTERFLY VALVE (STA. 200+95.44) AND 16" GATE VALVE (STA. 250+08.86) AND PRESSURE TEST NEW 48" AND 24" WATER MAIN SEGMENTS TO 100 PSI IN ACCORDANCE WITH THE CONTRACT DOCUMENTS.

18. AFTER APPROVAL OF PRESSURE TEST, DEWATER THE NEW WATER MAIN IN PREPARATION FOR MAKING THE FINAL CONNECTIONS.

19. REMOVE TEMPORARY PLUG OR TAP FROM 48" PIPE AND CONNECT TO EXISTING 48" CAST IRON WATER MAIN WITH 48" PIPE AND 48" TRANSITION SLEEVE.

SEE SHEETS 141 & 142 FOR ADDITIONAL NOTES

(TR) = THRUST RESTRAINT PER THRUST RESTRAINT DETAIL SHEETS FOR THRUST RESTRAINT TYPES AND DETAILS, SEE SHEETS 147 THROUGH 149.

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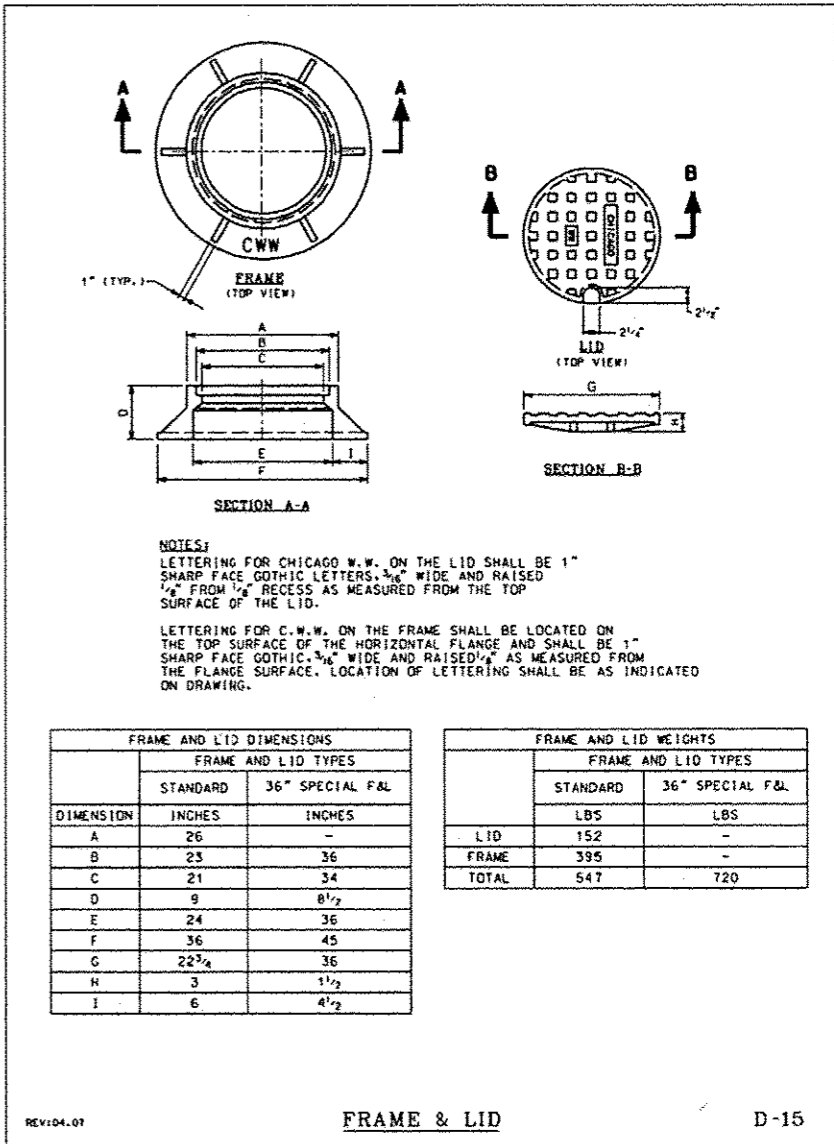
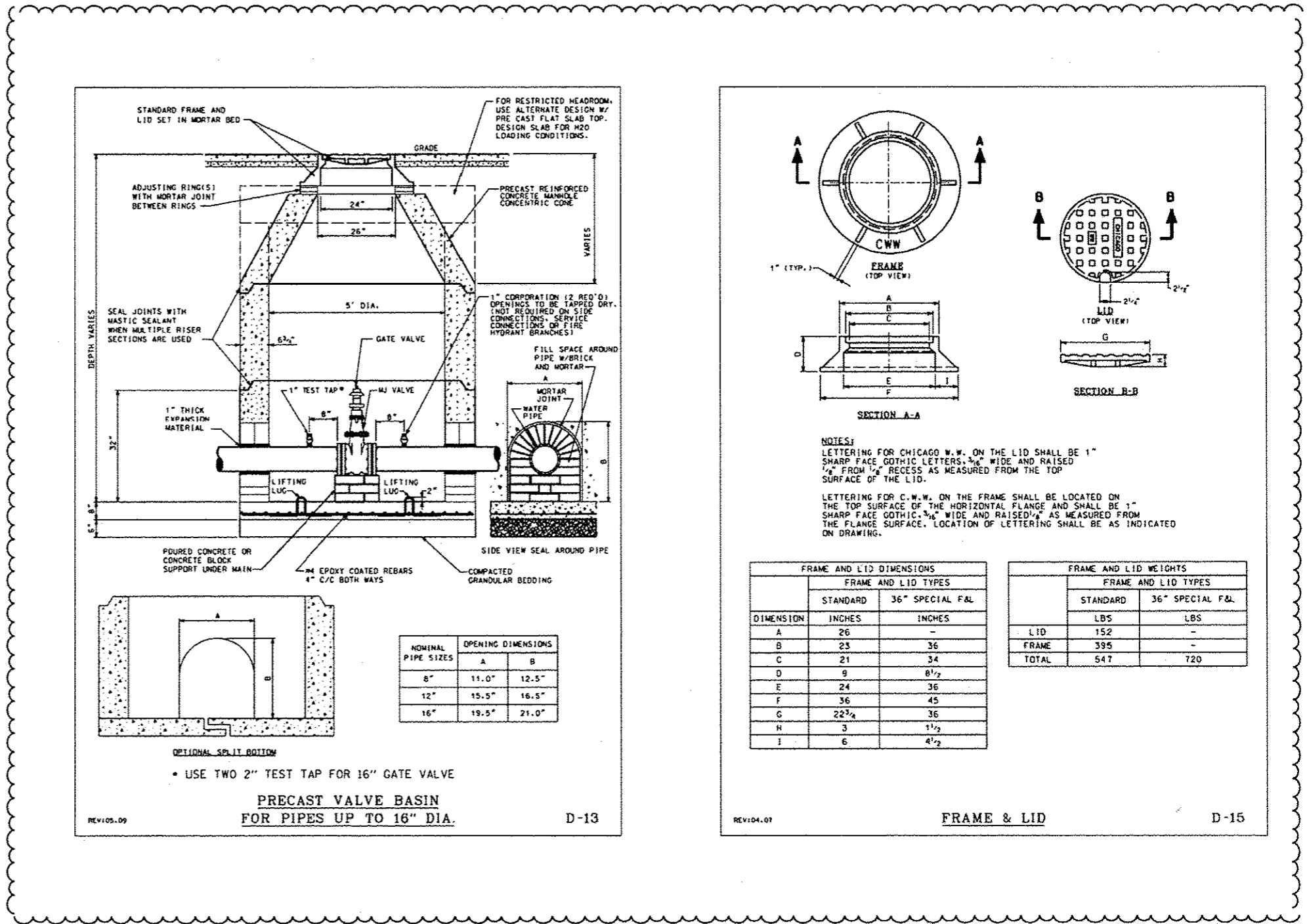
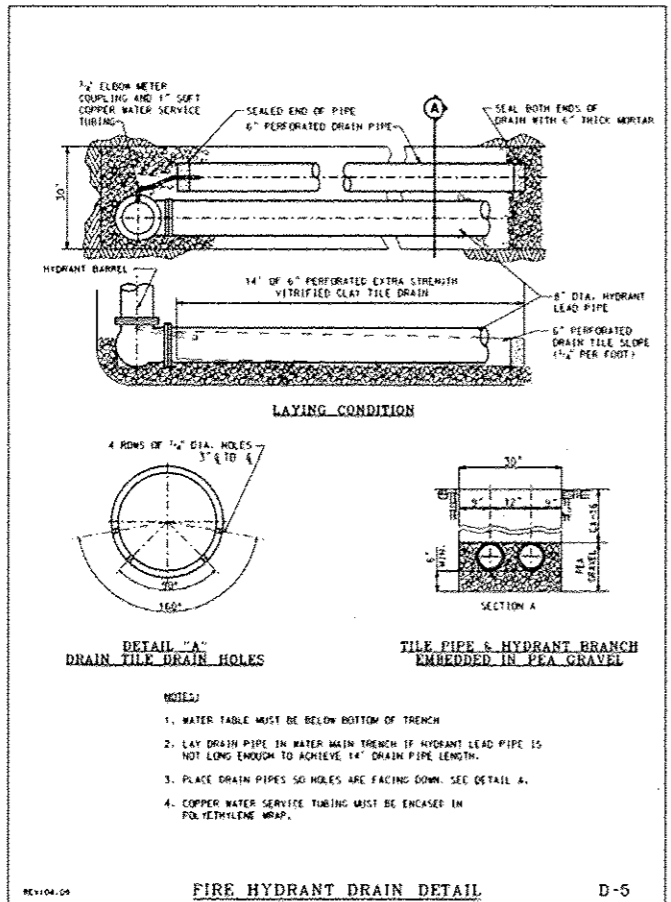
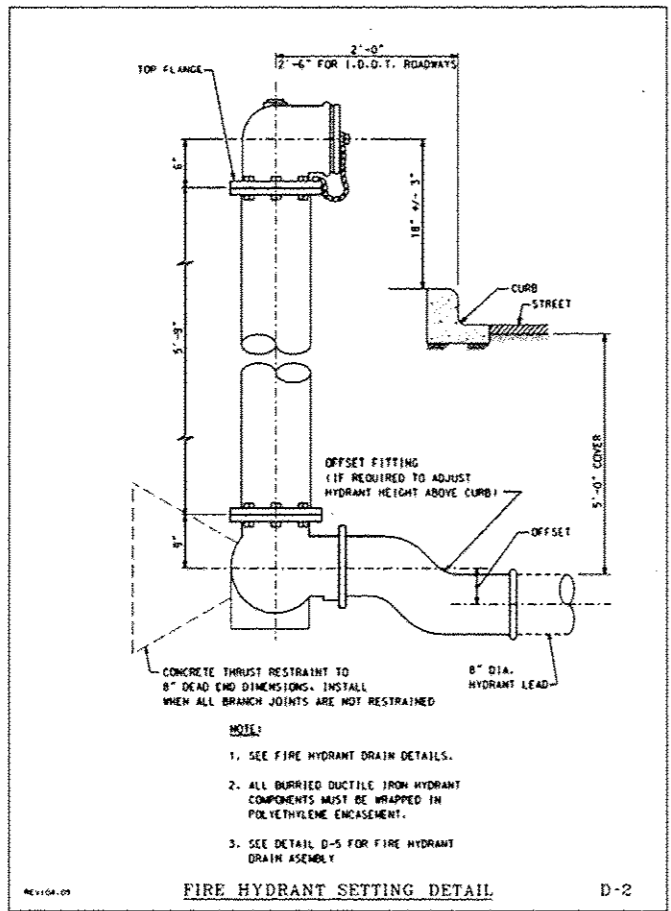
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STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

SCALE:		SHEET OF SHEETS		STA.	TO STA.
		WATER MAIN PLAN AND PROFILE			

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-00TR	COOK	559	143
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				



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 303 EAST WACKER DRIVE, SUITE 1400 CHICAGO, IL 60601-3076 PHONE: (312) 312-7700 FAX: (312) 373-4400



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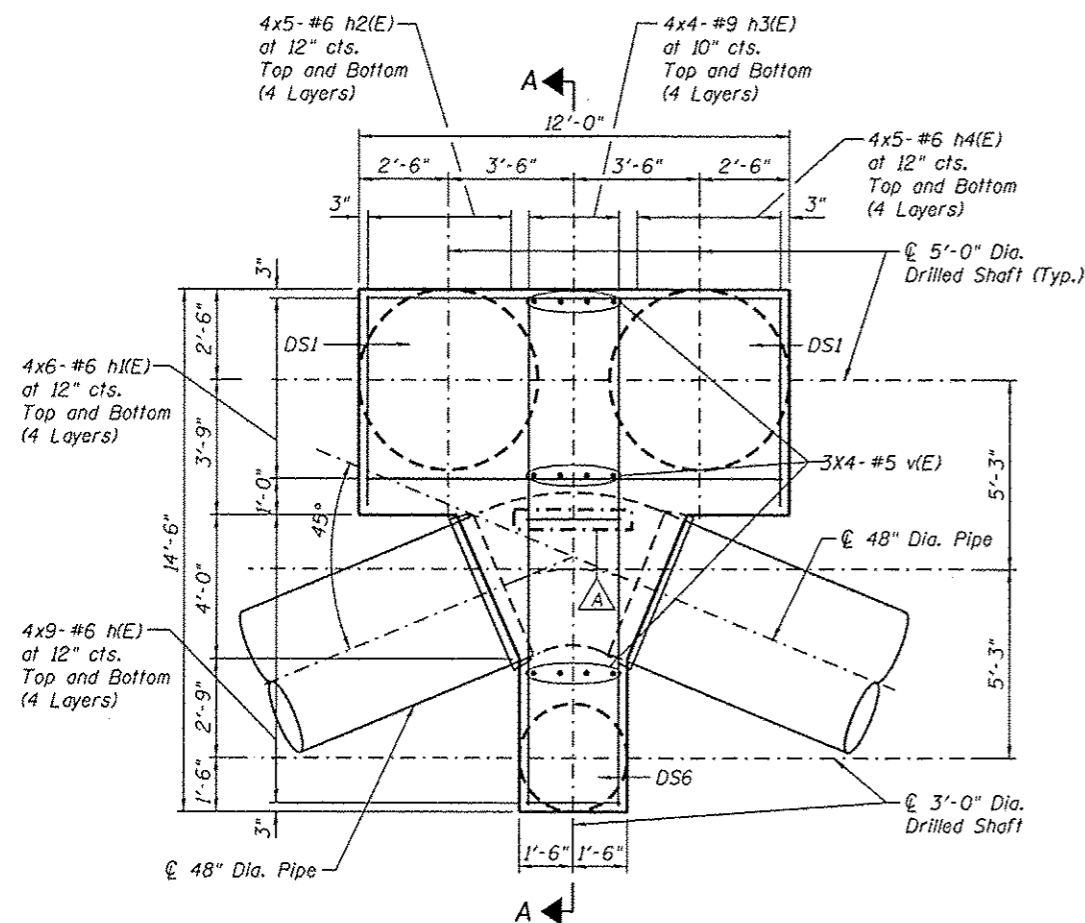
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STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

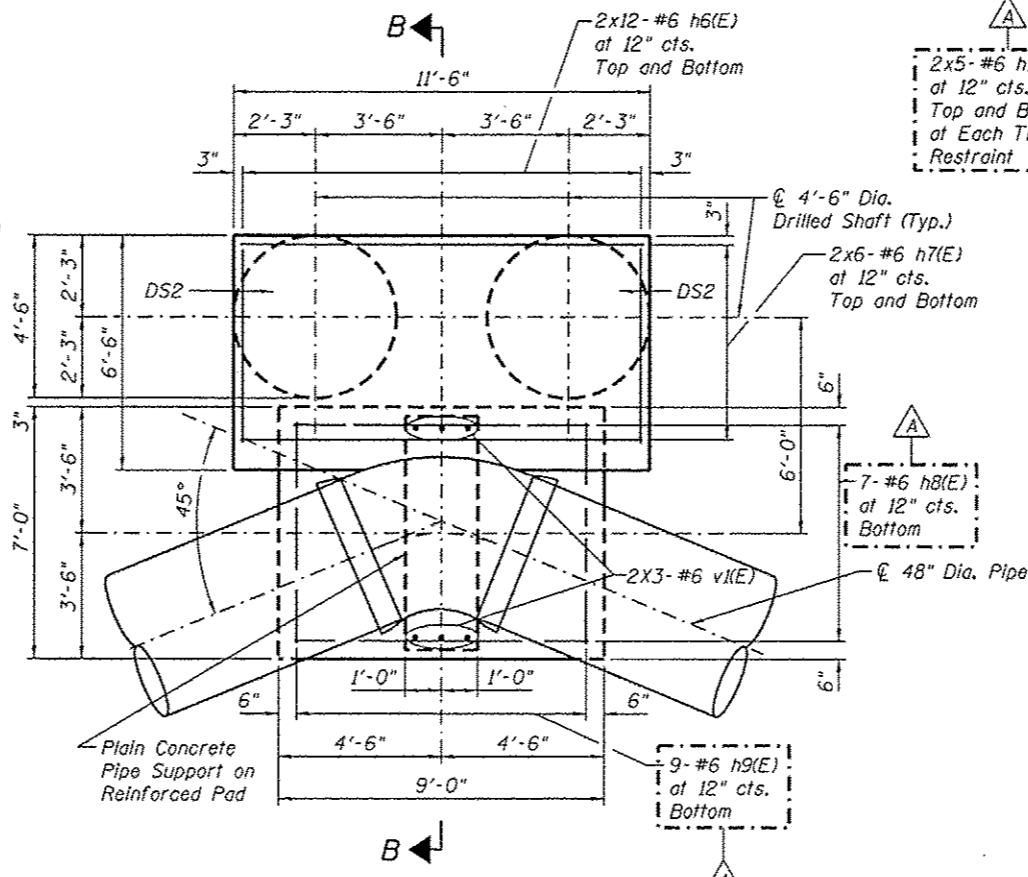
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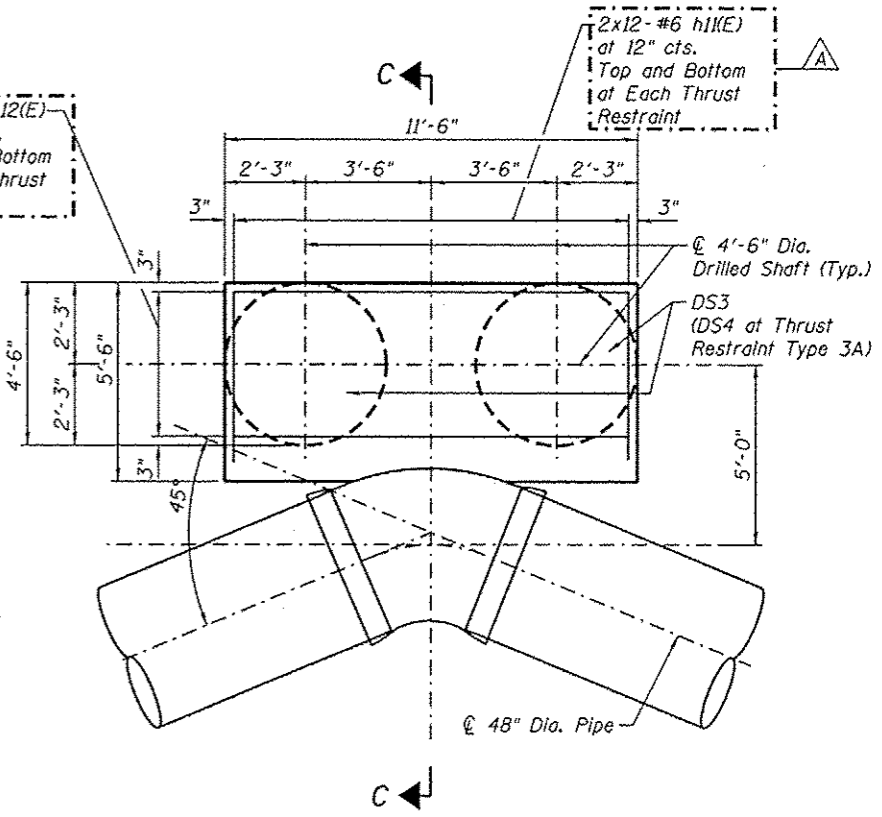
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90/94/290	2013-008R	COOK	559	146A
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				



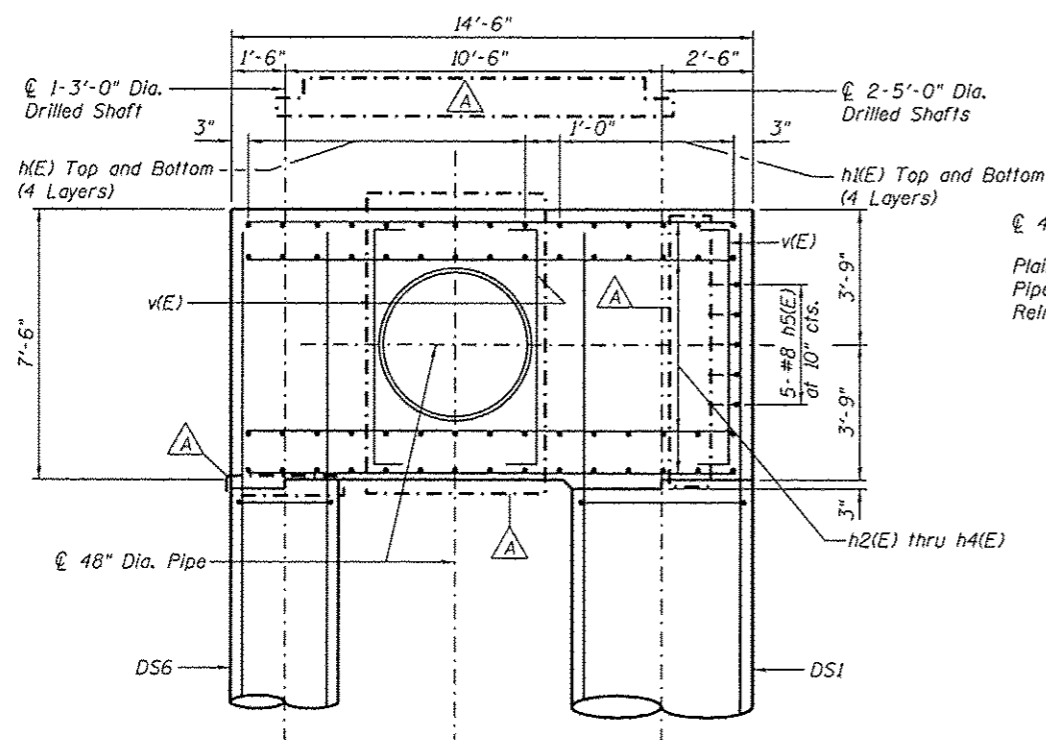
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THRUST RESTRAINT - TYPE 1**



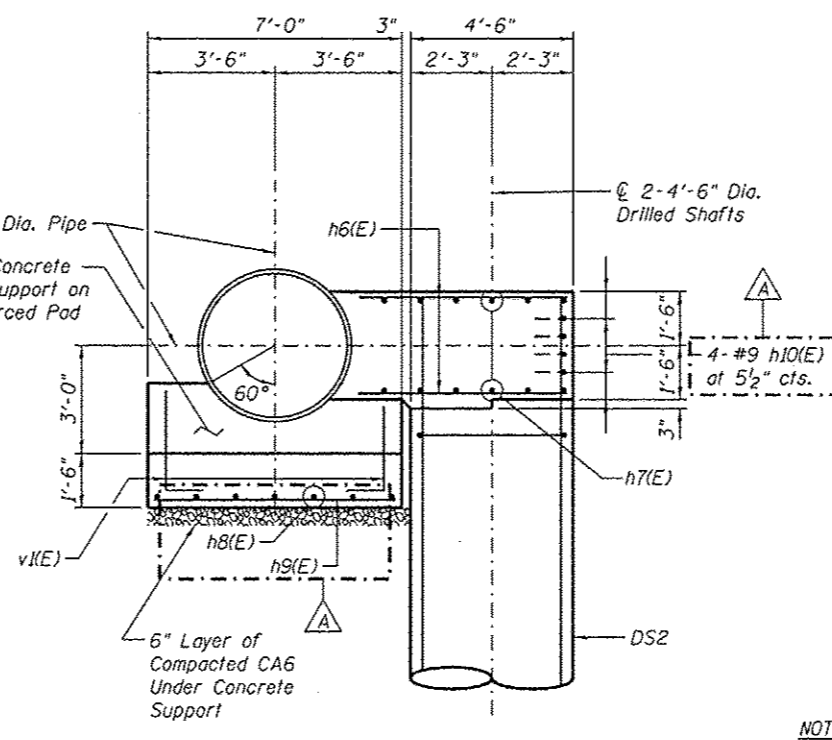
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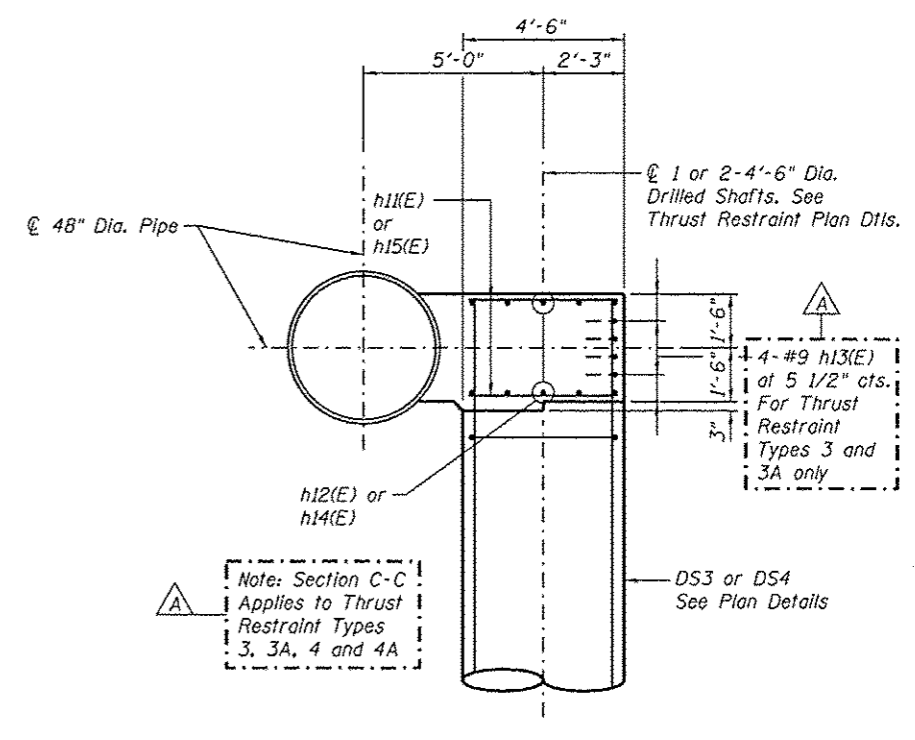
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THRUST RESTRAINT - TYPE 3 (1 THUS)
THRUST RESTRAINT - TYPE 3A (1 THUS)**



SECTION A-A



SECTION B-B



SECTION C-C

NOTES
1. Work this Sheet with Sheets 148 and 149

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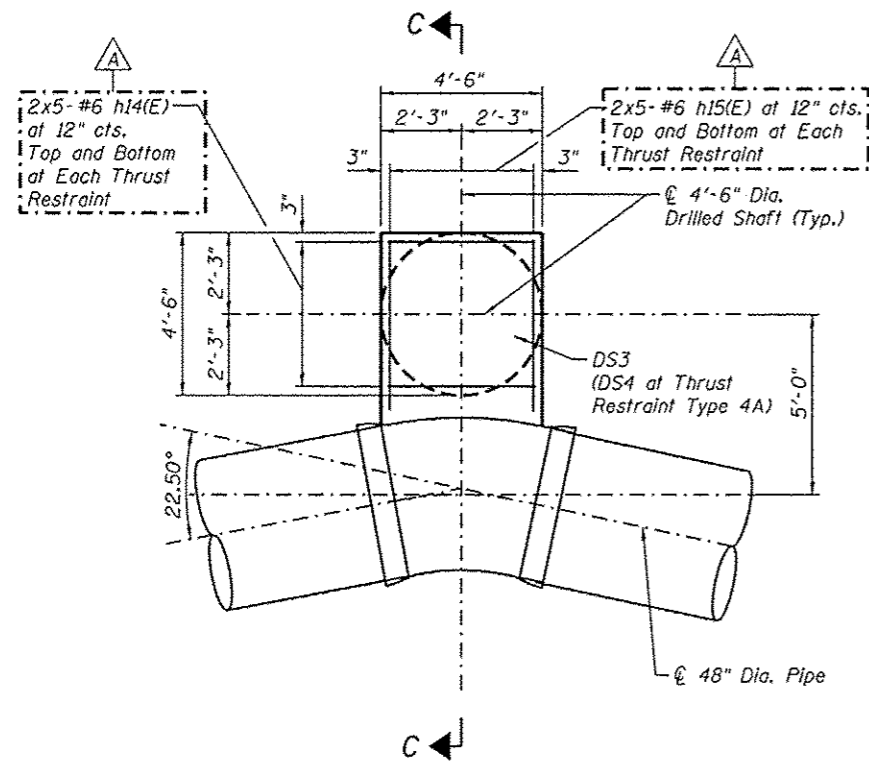
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**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

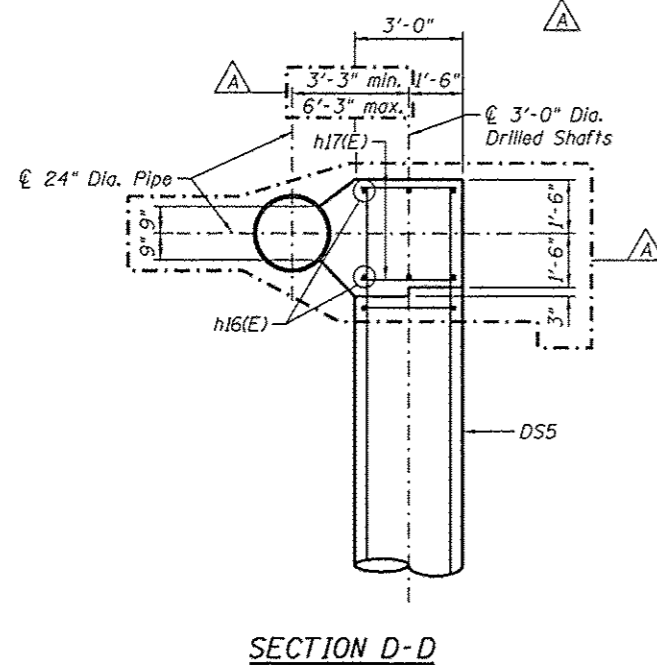
**WATER MAIN THRUST RESTRAINTS
PLAN DETAILS AND SECTIONS**

SHEET NO. 1 OF 4 SHEETS

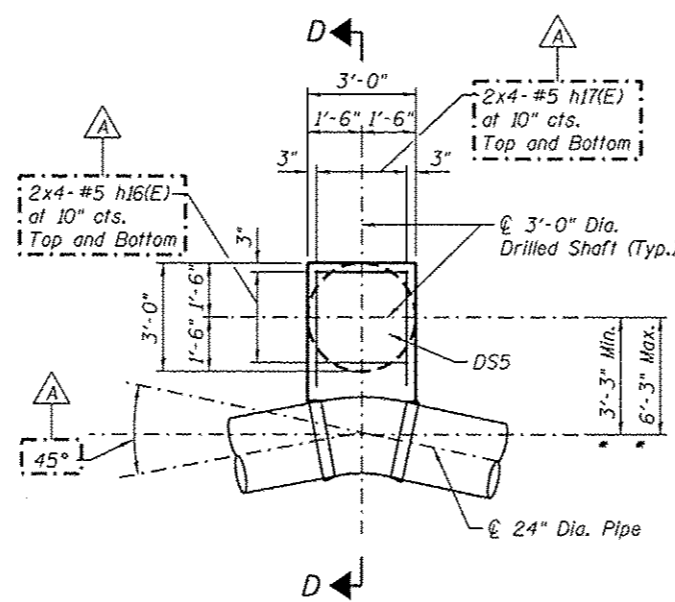
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CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



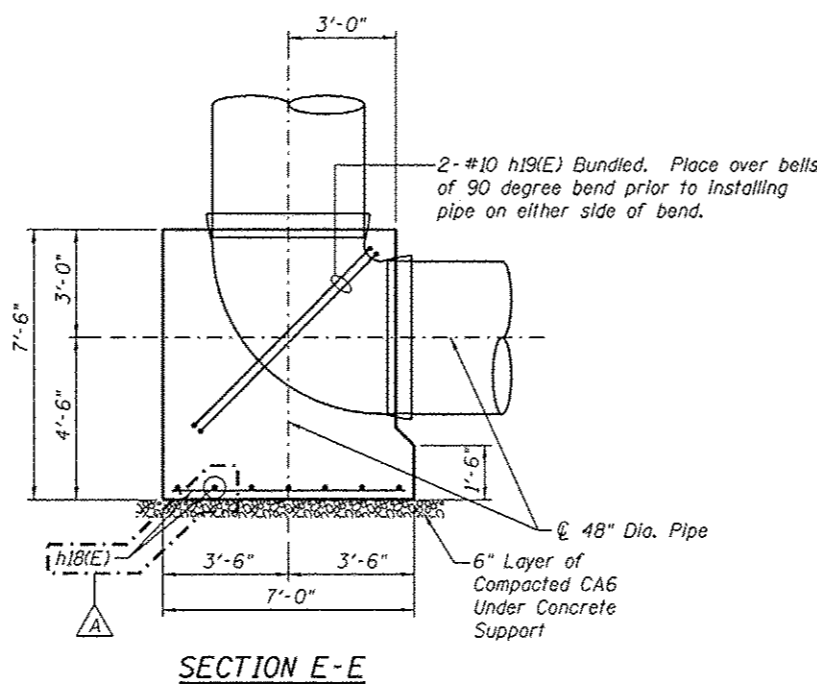
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THRUST RESTRAINT - TYPE 4 (1 THUS)
THRUST RESTRAINT - TYPE 4A (1 THUS)**



SECTION D-D

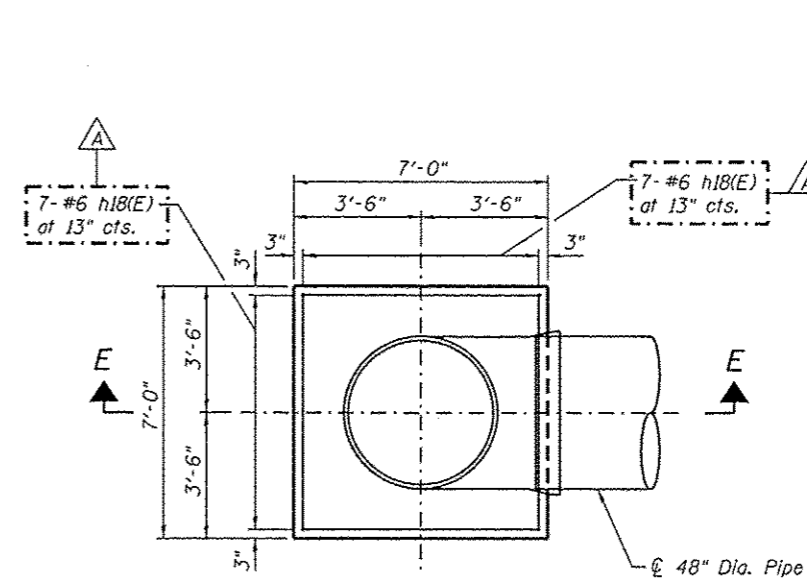


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THRUST RESTRAINT - TYPE 5**

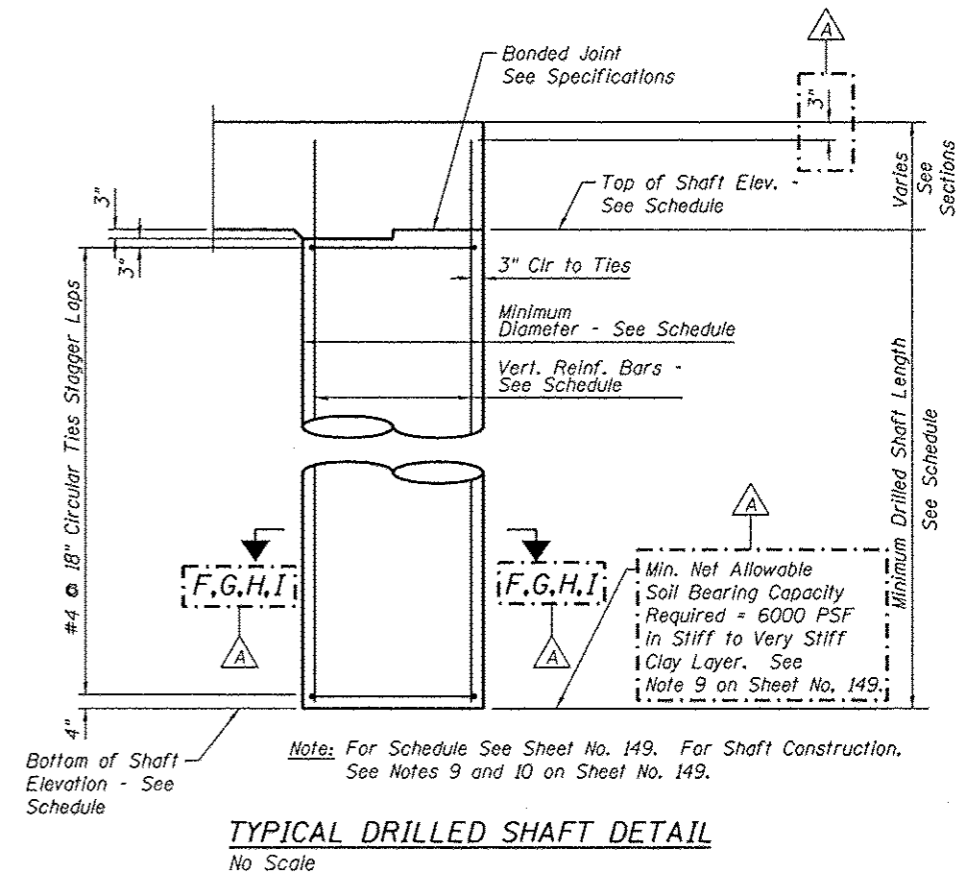


SECTION E-E

* Centerline of drilled shaft location in the field may vary from 3'-3" to 6'-3" from centerline of 24" dia. pipe depending on field verified existing conditions. Where location of shaft centerline exceeds 3'-6" from centerline of pipe provide additional #5 at 10" centers top and bottom epoxy coated reinforcing bars each way to lap 3'-0" with #5 at 10" in drilled shaft cap. Cost shall be incidental to concrete structures and reinforcement bars, epoxy coated.



**PLAN DETAIL
PIPE SUPPORT - TYPE 6**



**TYPICAL DRILLED SHAFT DETAIL
No Scale**

NOTES:
1. Work this Sheet with Sheet 149

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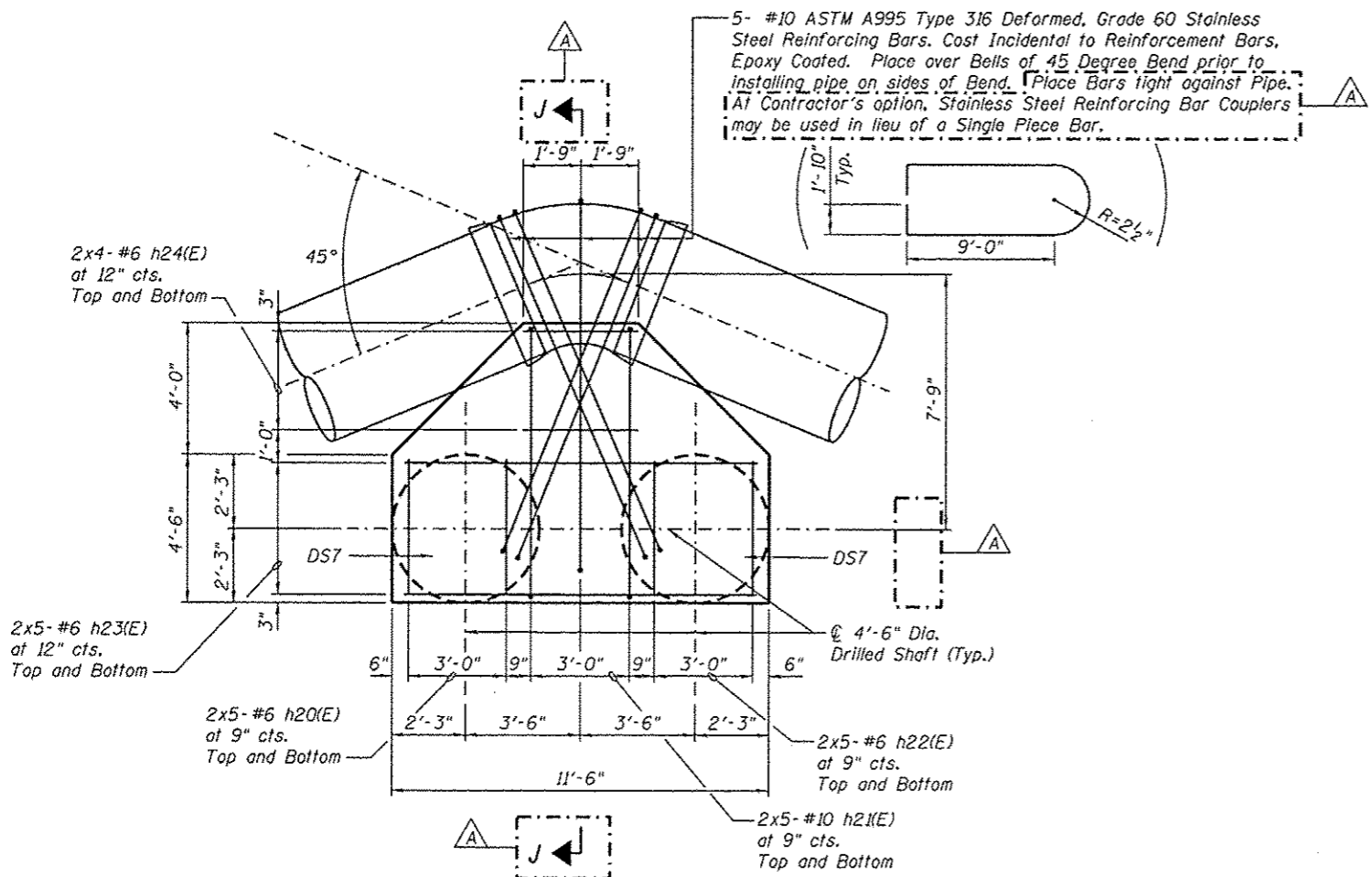
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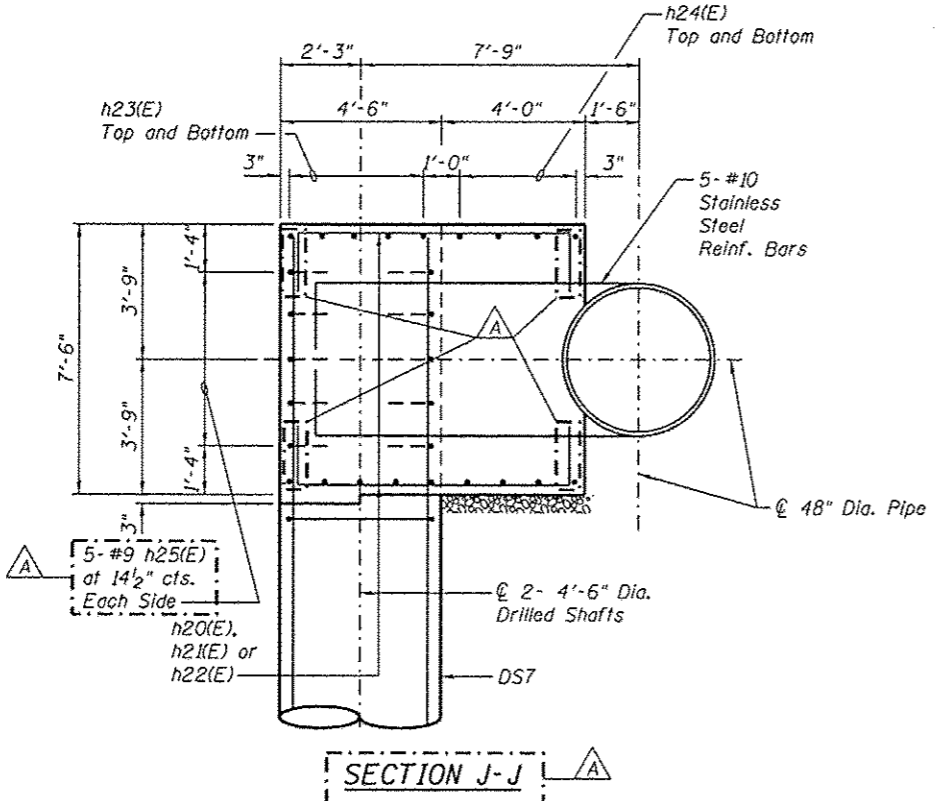
**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**WATER MAIN THRUST RESTRAINTS
PLAN DETAILS, SECTIONS AND DETAILS**
SHEET NO. 2 OF 4 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
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CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

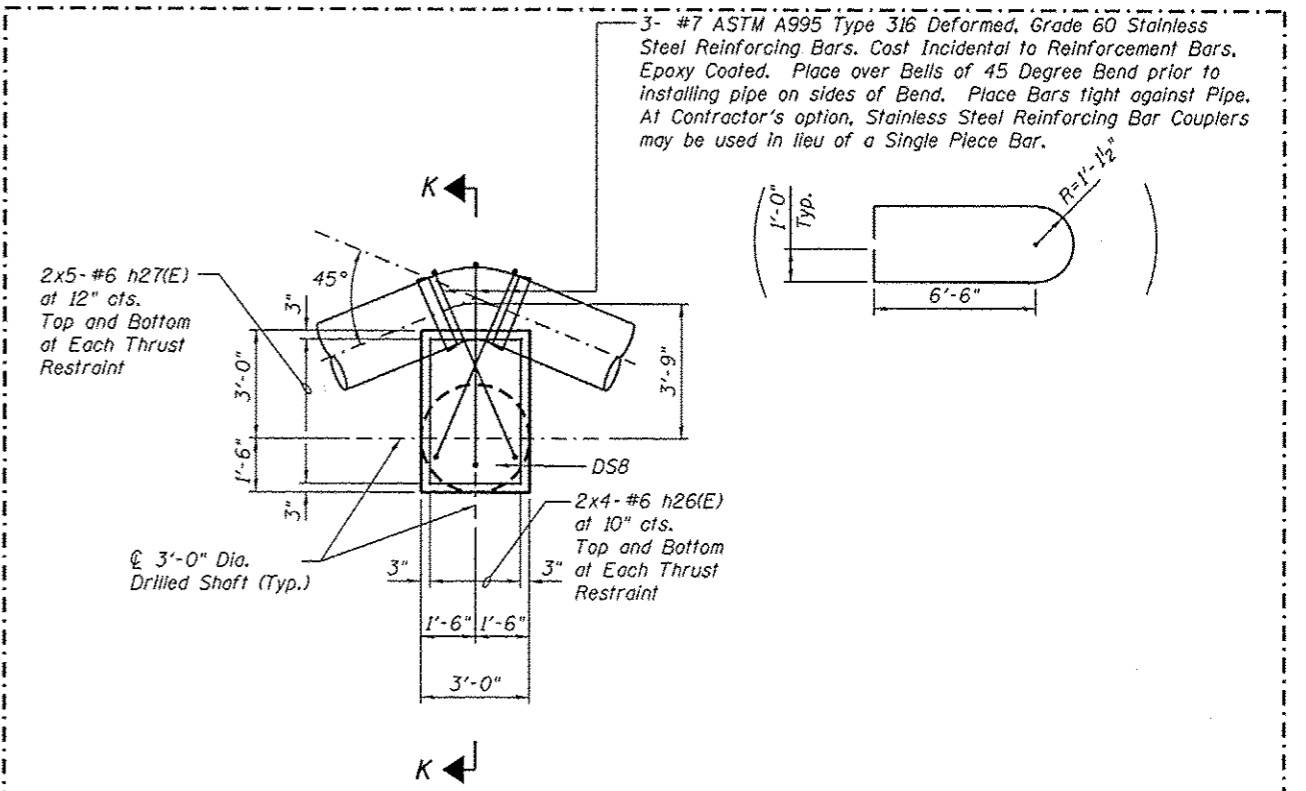
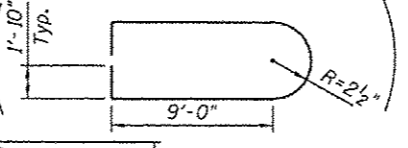


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THRUST RESTRAINT - TYPE 7

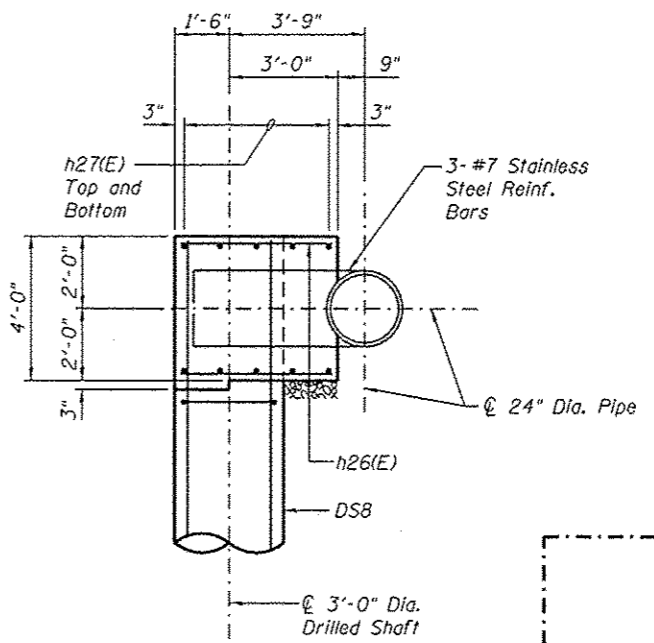


SECTION J-J

5- #10 ASTM A995 Type 316 Deformed, Grade 60 Stainless Steel Reinforcing Bars. Cost Incidental to Reinforcement Bars, Epoxy Coated. Place over Bells of 45 Degree Bend prior to installing pipe on sides of Bend. Place Bars tight against Pipe. At Contractor's option, Stainless Steel Reinforcing Bar Couplers may be used in lieu of a Single Piece Bar.

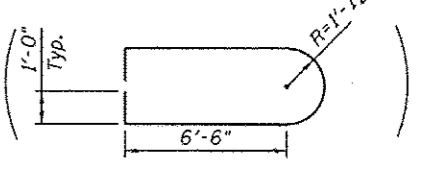


PLAN DETAIL
THRUST RESTRAINT - TYPE 8 (2 THUS)



SECTION K-K

3- #7 ASTM A995 Type 316 Deformed, Grade 60 Stainless Steel Reinforcing Bars. Cost Incidental to Reinforcement Bars, Epoxy Coated. Place over Bells of 45 Degree Bend prior to installing pipe on sides of Bend. Place Bars tight against Pipe. At Contractor's option, Stainless Steel Reinforcing Bar Couplers may be used in lieu of a Single Piece Bar.



NOTES:
1. Work this Sheet with Sheets 148 and 149

D:\EOW\26-srt+mm-09A.dgn



USER NAME = cloord
PLOT SCALE = N.T.S.
PLOT DATE = 9/15/2013

DESIGNED - AAG
CHECKED - WWC
DRAWN - DLC
CHECKED - AAG, WWC

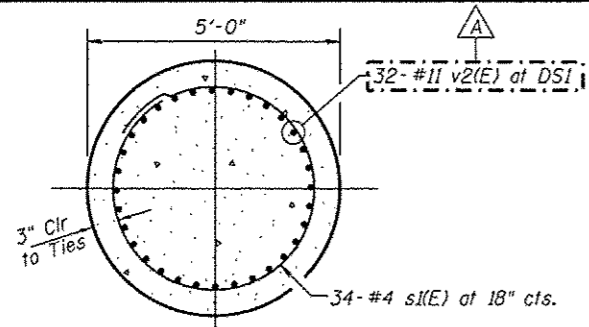
REVISED 10/15/2013 A.A.G.
REVISED
REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

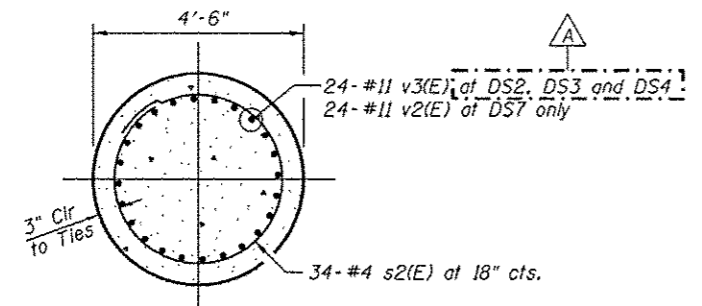
WATER MAIN THRUST RESTRAINTS
PLAN DETAILS AND SECTIONS

SHEET NO. 3 OF 4 SHEETS

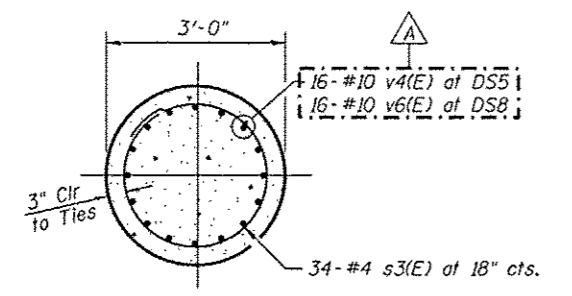
F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	148A
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



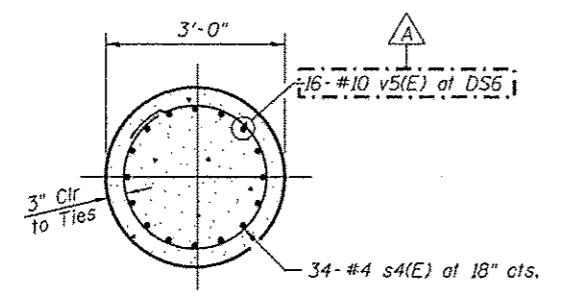
SECTION F



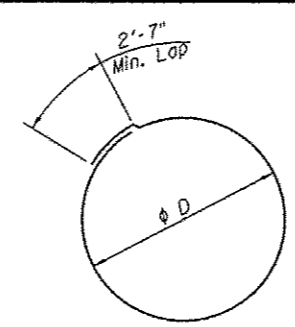
SECTION G



SECTION H

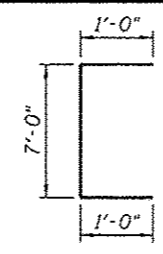


SECTION I

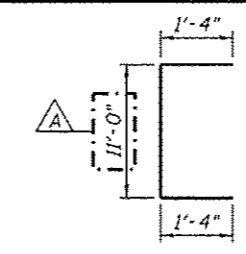


BAR	phi D
s1(E)	4'-6"
s2(E)	4'-0"
s3(E)	2'-6"
s4(E)	2'-6"

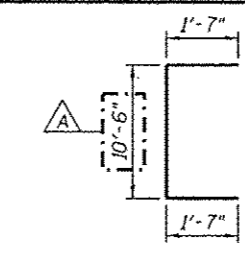
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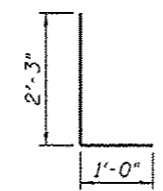
BAR v(E)



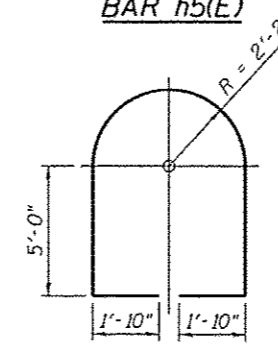
BAR h5(E)



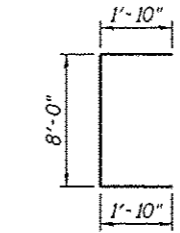
BAR h10(E), h13(E), h25(E)



BAR v(E)



BAR h19(E)



BAR h21(E)

NOTES:

- For water main general notes, location plans, profiles, details and thrust restraint locations and types see Sheet Nos. 140 through 146. For existing water main reference drawings, see Sheet Nos. 150 through 153.
- Exact locations of existing water mains, existing concrete thrust blocks and existing below grade structures and utilities shall be determined in the field prior to excavation for water mains and drilling shafts for new reinforced concrete thrust restraints and pipe supports. Any conflicts with existing structures and utilities due to field conditions encountered that will impact construction shall be brought to the attention of the Engineer, so as not to delay construction, along with detailed locations of conflicting structures and utilities and suggested solutions to resolve the conflict for Engineer review and approval. Any changes required as a result of field conditions encountered shall be considered incidental to the cost of the respective pay item.
- Contractor shall protect existing buried and above ground structures and utilities that are to remain during construction of the water main and thrust restraints. The cost of such protection shall be incidental to the cost of the 54-inch water main relocation pay item.
- New permanent concrete thrust restraints shall have been in place for a minimum of 28 days and shall have achieved a minimum 28 day compressive strength of 4000 psi prior to pressure testing pipe with water.
- Maximum test pressure for water mains = 100 psi.
- Fitting bends shall not be encased in concrete unless otherwise noted on the drawings. Minor adjustments to concrete dimensions and reinforcing bars shown may be required in the field and shall be considered incidental to the cost of the respective pay item.
- Trench excavation and backfill for thrust restraint is incidental to the cost of the 54-inch water main relocation pay item.
- Mechanical reinforcing bar splices, where shown or required, and stainless steel reinforcing bars shall be considered incidental to Reinforcement Bars, Epoxy Coated pay item.
- Soft clays occur in the soil profile for the borings in this area. Contractor shall review Geotechnical Report and boring logs in his selection of methods to support the excavation in the various stages of shaft drilling, cleaning and concrete placement dependent on the boring logs and site conditions encountered. Surface water shall not be permitted to enter the hole. The Contractor shall comply with the requirements of the Illinois Department of Transportation (IDOT) and the various infrastructure departments of the City of Chicago, including, but not limited to, the Chicago Department of Transportation (CDOT), the Office of Underground Coordination (OUC) and the Department of Water Management (DWM).
- Shafts must be drilled into stiff to very stiff clay layer with a minimum net allowable soil bearing capacity of 6000 PSF, however, the drilled shaft shall not be less than 50 feet in length.
- Concrete Cover:
 - Concrete placed against earth - 3"
 - Concrete in contact with earth - 2"
- All work to conform to IDOT Standard Specifications for Road and Bridge Construction, latest edition.
- Work this sheet with Sheet Nos. 147, 148 and 148A.

THRUST RESTRAINTS
BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h1(E)	36	#6	2'-6"	—
h1(E)	24	#6	11'-6"	—
h2(E)	20	#6	5'-9"	—
h3(E)	16	#9	14'-0"	—
h4(E)	20	#6	5'-9"	—
h5(E)	5	#8	13'-8"	—
h6(E)	24	#6	5'-6"	—
h7(E)	12	#6	11'-0"	—
h8(E)	7	#6	8'-6"	—
h9(E)	9	#6	6'-6"	—
h10(E)	4	#9	13'-8"	—
h11(E)	48	#6	4'-6"	—
h12(E)	20	#6	11'-0"	—
h13(E)	8	#9	13'-8"	—
h14(E)	20	#6	4'-0"	—
h15(E)	20	#6	4'-6"	—
h16(E)	8	#5	2'-6"	—
h17(E)	8	#5	3'-0"	—
h18(E)	14	#6	6'-6"	—
h19(E)	2	#10	17'-1"	—
h20(E)	10	#6	4'-0"	—
h21(E)	10	#10	11'-8"	—
h22(E)	10	#6	4'-0"	—
h23(E)	10	#6	11'-0"	—
h24(E)	8	#6	3'-0"	—
h25(E)	10	#9	13'-8"	—
h26(E)	16	#6	4'-0"	—
h27(E)	20	#6	2'-6"	—
v(E)	12	#6	9'-0"	—
v1(E)	6	#6	3'-3"	—
v2(E)	112	#11	57'-3"	—
v3(E)	192	#11	52'-9"	—
v4(E)	16	#10	52'-9"	—
v5(E)	16	#10	57'-3"	—
v6(E)	32	#10	53'-9"	—
s1(E)	68	#4	16'-9"	○
s2(E)	340	#4	15'-2"	○
s3(E)	34	#4	10'-6"	○
s4(E)	102	#4	10'-6"	○
Item	Unit	Quantity		
Concrete Structures	Cu. Yd.	100		
Reinforcement Bars, Epoxy Coated	Pound	113,880		
Drilled Shaft In Soil	Cu. Yd.	421		

LEGEND
DS - Drilled Shaft

MARK	TOTAL QUANTITY	ELEV. @ WATERMAIN (FEET)	ELEV. TOP OF DRILLED SHAFT (FEET)	ELEV. BOTTOM OF DRILLED SHAFT (FEET)	MINIMUM DRILLED SHAFT LENGTH (FEET)	MINIMUM DRILLED SHAFT DIAMETER (FEET)	VERTICAL REINFORCEMENT BARS AT EACH SHAFT	CIRCULAR TIES AT EACH SHAFT	SECTION	THRUST RESTRAINT TYPE
DS1	2	571.43	567.68	517.68	50	5'-0"	32- #11 v2(E)	34- #4 s1(E) at 18"	F	1
DS2	2	569.07	567.57	517.57	50	4'-6"	24- #11 v3(E)	34- #4 s2(E) at 18"	G	2
DS3	3	569.07	567.57	517.57	50	4'-6"	24- #11 v3(E)	34- #4 s2(E) at 18"	G	3 and 4
DS4	3	587.45	585.95	535.95	50	4'-6"	24- #11 v3(E)	34- #4 s2(E) at 18"	G	3A and 4A
DS5	1	588.45	586.95	536.95	50	3'-0"	16- #10 v4(E)	34- #4 s3(E) at 18"	H	5
DS6	1	571.43	567.68	517.68	50	3'-0"	16- #10 v5(E)	34- #4 s4(E) at 18"	I	1
DS7	2	587.45	583.70	533.70	50	4'-6"	24- #11 v2(E)	34- #4 s2(E) at 18"	G	7
DS8	2	588.45	587.70	537.70	50	3'-0"	16- #10 v6(E)	34- #4 s3(E) at 18"	H	8



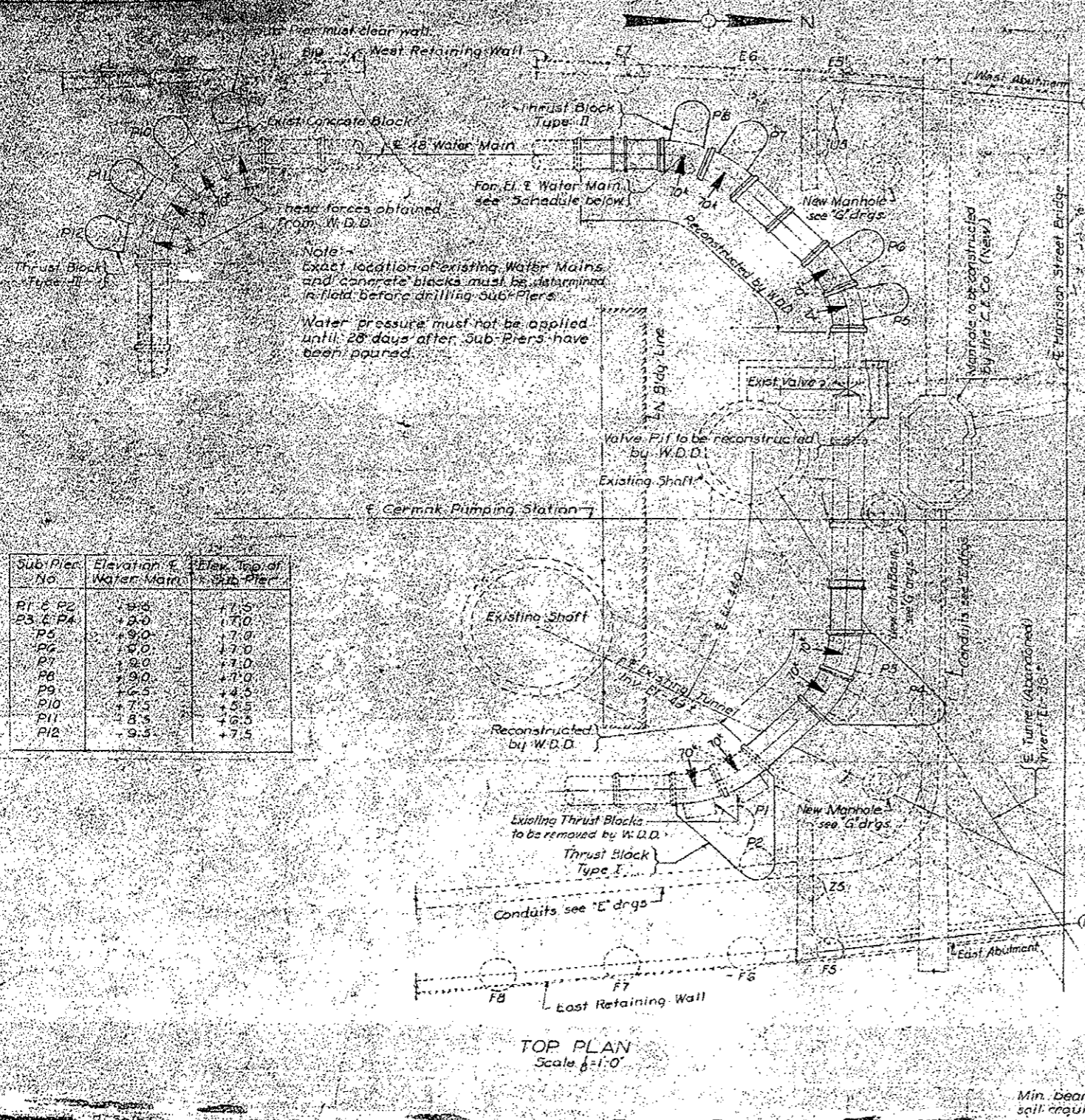
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PLT SCALE = N.T.S.	CHECKED - WWC	REVISED
PLT DATE = 9/15/2013	DRAWN - DLC	REVISED
	CHECKED - AAC, WWC	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

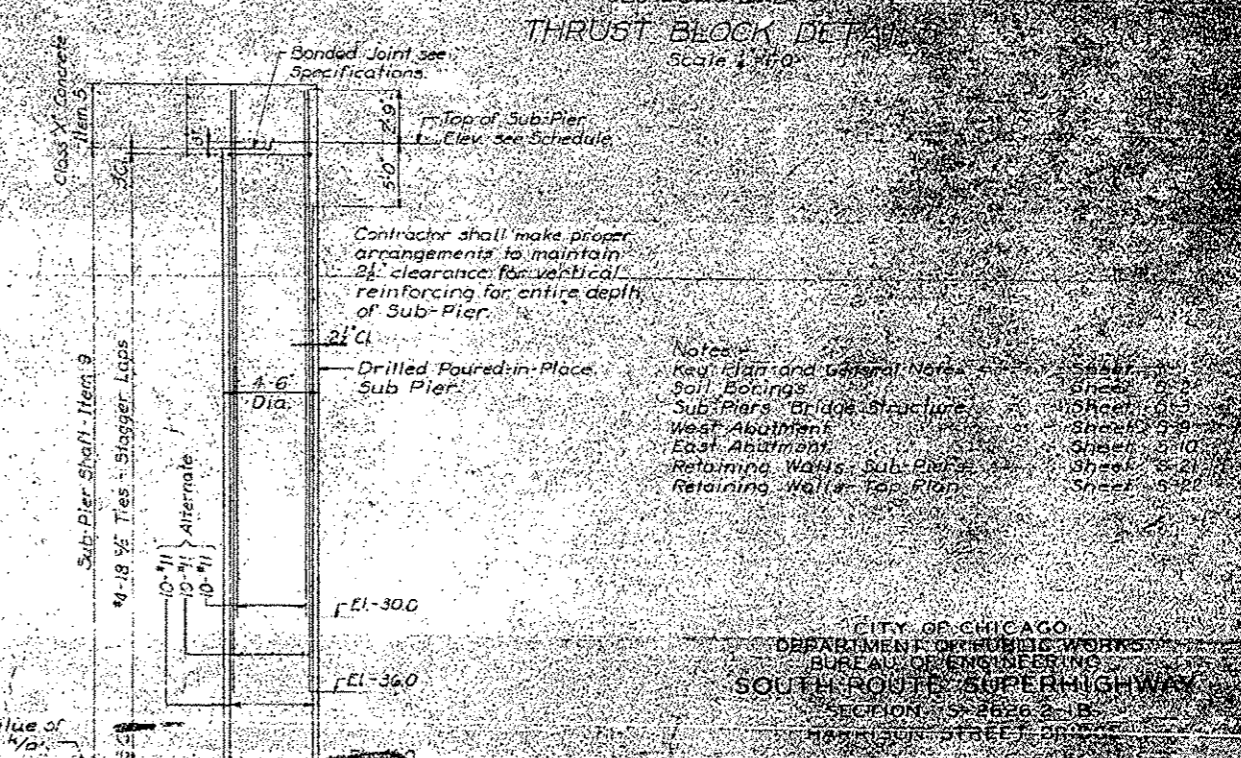
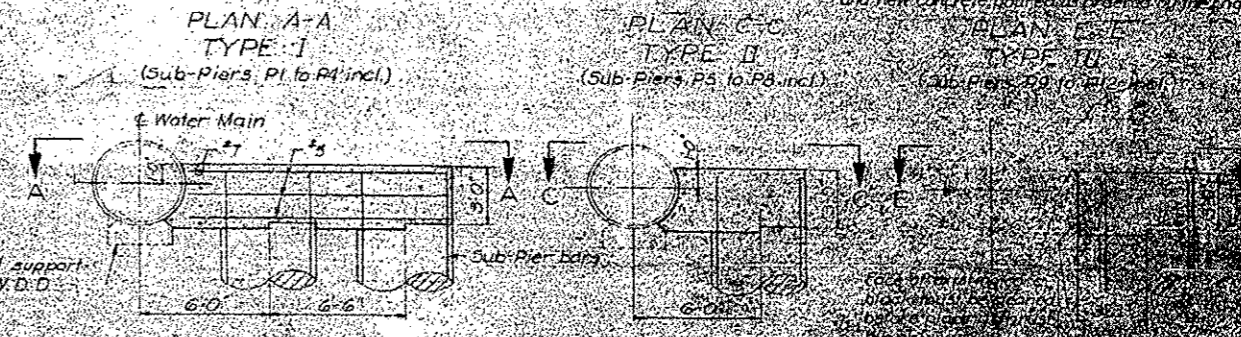
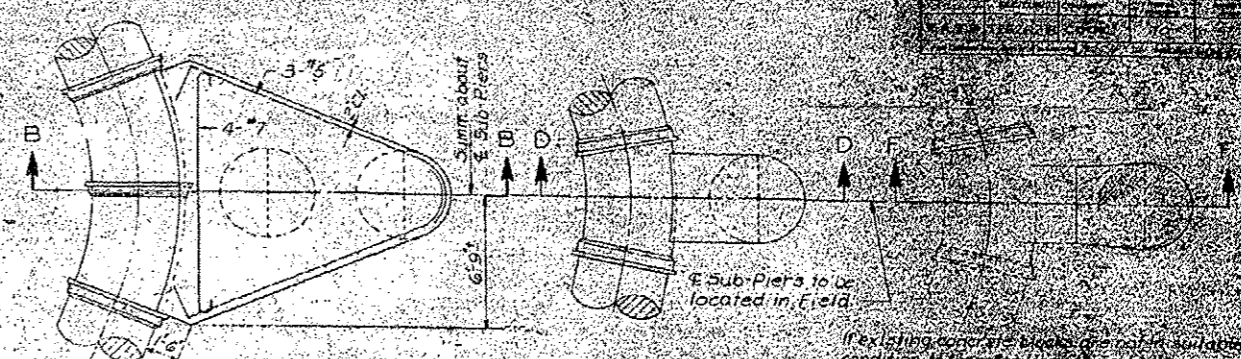
WATER MAIN THRUST RESTRAINTS
SECTIONS, SCHEDULES AND NOTES
SHEET NO. 4 OF 4 SHEETS

F.A.I. RTE. 90/94/290	SECTION 2013-00BR	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 149
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

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Sub Pier No.	Elevation of Water Main	Elev. Top of Sub Pier
P1 & P2	+9.0	+7.5
P3 & P4	+8.0	+7.0
P5	+9.0	+7.0
P6	+9.0	+7.0
P7	+9.0	+7.0
P8	+9.0	+7.0
P9	+6.5	+4.5
P10	+7.5	+5.5
P11	+8.5	+6.5
P12	+9.5	+7.5



- Notes:
- Key Plan and General Notes
 - Soil Borings
 - Sub-Piers Bridge Structure
 - West Abutment
 - East Abutment
 - Retaining Walls Sub-Piers
 - Retaining Walls Top Plan

CITY OF CHICAGO
 DEPARTMENT OF PUBLIC WORKS
 BUREAU OF ENGINEERING
 SOUTH ROUTE SUPERHIGHWAY
 SECTION 5-2526 & B
 HARD SURFACE DRIVE BRIDGE

LATERAL SUPPORTS FOR
 SUB-PIERS
 P1 TO P12 INCL.
 SCALE AS NOTED
 SHEET NO. 21 OF 20 SHEETS

CHECKED BY: [Signature]
 APPROVED BY: [Signature]

AECOM
 303 EAST WACKER DRIVE, SUITE 1400
 CHICAGO, IL 60601-3278
 PHONE (312) 373-7700 FAX (312) 373-6800

DESIGNED - HHC
 DRAWN - HHC
 CHECKED - RBB
 DATE - 9/15/13

REVISED - 10/24/2013
 REVISED -
 REVISED -
 REVISED -

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

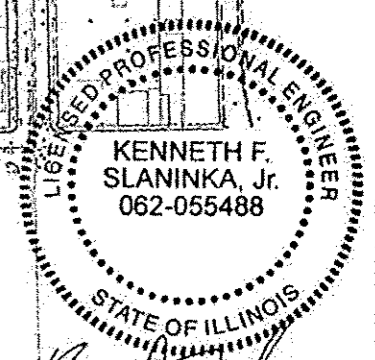
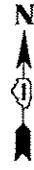
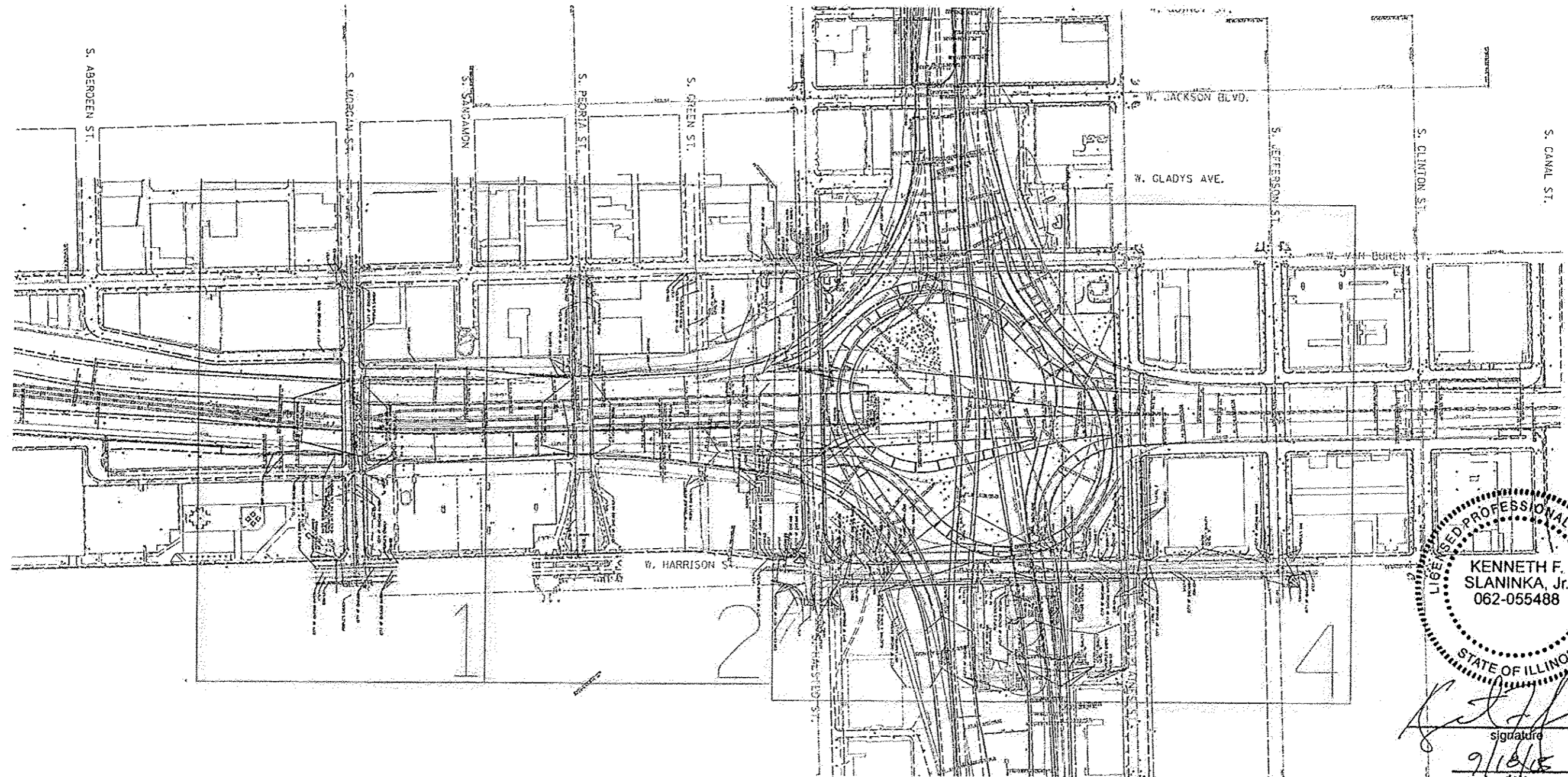
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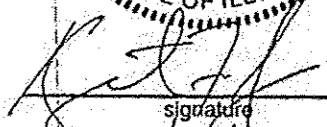
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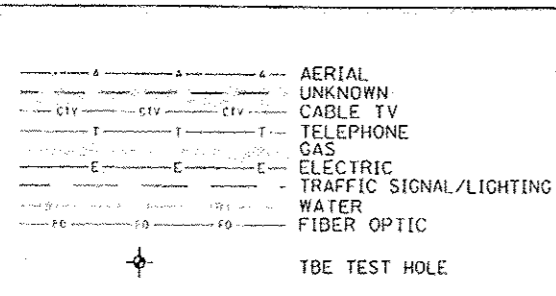
F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	153A

CONTRACT NO. 60W26
 ILLINOIS FED. AID PROJECT

FOR INFORMATION ONLY
 NOT TO SCALE




 signature
 9/16/13
 date
 license expires 11-30-15



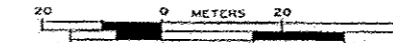
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AT&T = TELEPHONE	COM-ED = ELECTRIC
CITY OF CHICAGO = ELECTRIC	CITY OF CHICAGO WATER = WATER
IDOT LIGHTING = ELECTRIC	LEVEL 3 = FIBER OPTIC
MCI = FIBER OPTIC	PEOPLE'S ENERGY = GAS

NOTE: ALL ELECTRONIC DEPTHS MARKED AS (ED) WERE OBTAINED UTILIZING A SONDE DEVICE. DEPTHS ON THE AT&T DUCT WERE RECORDED FROM AN AT&T CONTRACTOR. DEPTHS ON THE COMED DUCT WERE RECORDED BY A CARDNO CREW. CARDNO CAN NOT VERIFY THE ACCURACY OF THESE DEPTHS AND SHOULD BE USED AS APPROXIMATE AND AS INFORMATION ONLY.

UTILITIES SHOWN ON THESE PLANS AS DEPICTED IN THE LEGEND HAVE BEEN INVESTIGATED BY CARDNO IN ACCORDANCE WITH SUE INDUSTRY STANDARDS. ALL OTHER INFORMATION SHOWN HAS BEEN PROVIDED TO CARDNO BY OTHERS. CARDNO SUE FIELD INVESTIGATION WAS PERFORMED 3/14/13 THROUGH 9/13/13. CHANGES TO UTILITIES MAY HAVE BEEN MADE AND THEREFORE MAY RESULT IN VARIANCES FROM THIS PLAN. CONSIDERATION SHOULD BE GIVEN TO UPDATING THIS PLAN IF DEEMED ADVISABLE PRIOR TO FINAL DESIGN AND CONSTRUCTION.

PRELIMINARY DATA FOR DELIVERY 9/16/2013

ALL UTILITIES SHOWN QUALITY LEVEL "B" UNLESS NOTED OTHERWISE.





Utility Quality Level "A": Visually Verified Test Hole
 Utility Quality Level "B": Designating/non Visually Verified Test Hole
 Utility Quality Level "C": Research with Survey
 Utility Quality Level "D": Records Research

DESIGNED	E.G.	REVISED	10/15/2013
DRAWN	SRK	REVISED	
CHECKED	KFS	REVISED	
DATE	9/16/13	REVISED	

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

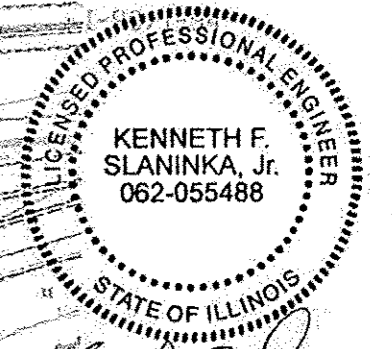
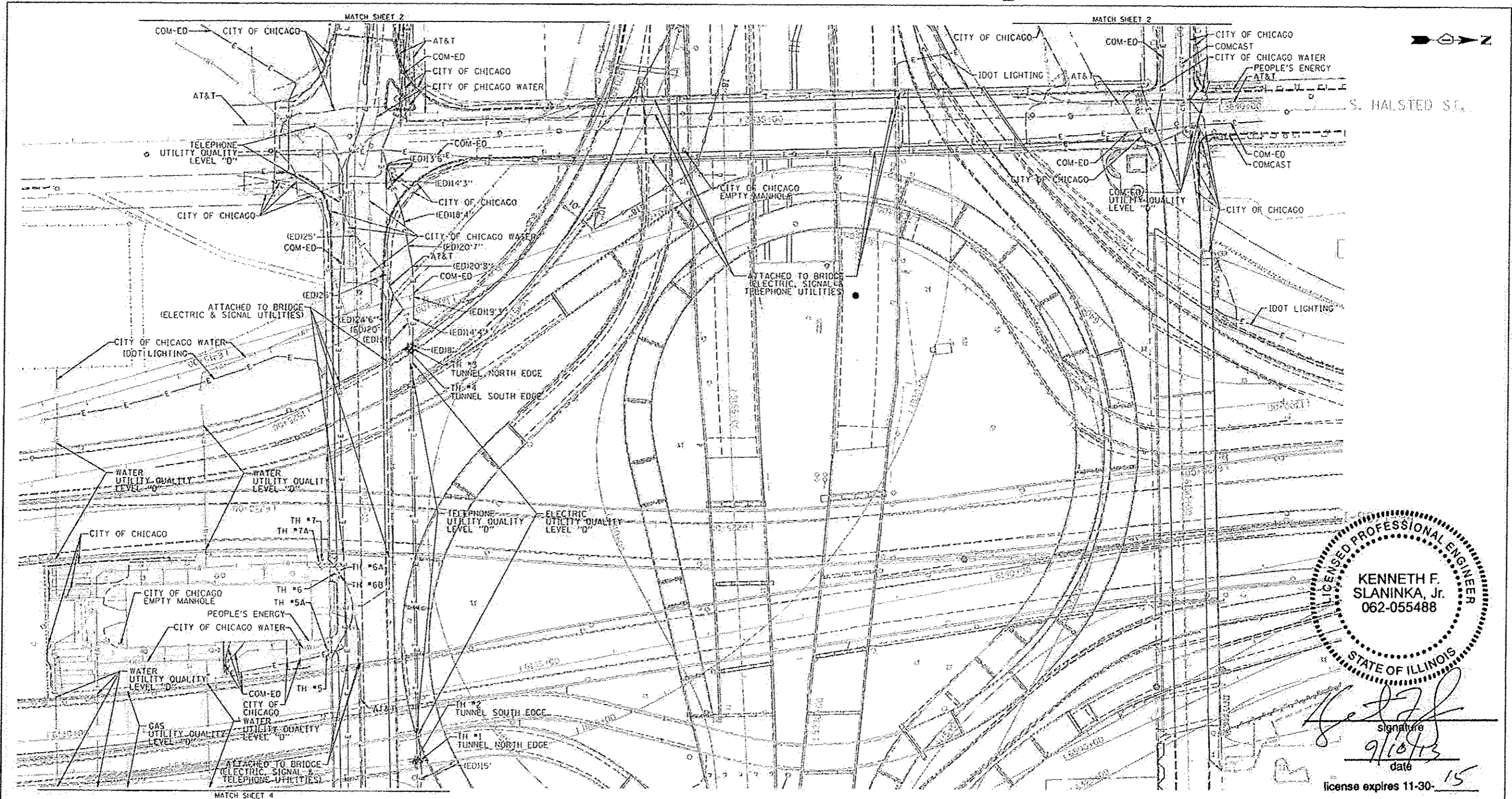
I-941-901-290 (Circle Interchange)
 Chicago, Illinois

TBE Job No. IL09510531
 SUE Plan Page: Cover

F.A. R/E.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
	N/A	Cook	559	156
Contract No. N/A				

FED. ROAD DIST. NO. [ILL1015] 1001 Project No. P-91-259-12



Signature: *[Signature]*
 date: 9/16/13
 license expires 11-30-15

<p>Utility Quality Level "A": Visually Verified Test Hole Utility Quality Level "B": Designating/non Visually Verified Test Hole Utility Quality Level "C": Research with Survey Utility Quality Level "D": Records Research</p>	<p>DESIGNED EG DRAWN SRK CHECKED KFS DATE 9/16/13</p>	<p>REVISED 10/15/2013 REVISED REVISED REVISED</p>
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UTILITY OWNERS	
AT&T = TELEPHONE	COM-ED = ELECTRIC
CITY OF CHICAGO = ELECTRIC	CITY OF CHICAGO WATER = WATER
IDOT LIGHTING = ELECTRIC	PEOPLE'S ENERGY = GAS

NOTE: ALL ELECTRONIC DEPTHS MARKED AS (ED) WERE OBTAINED UTILIZING A SONDE DEVICE. DEPTHS ON THE AT&T DUCT WERE RECORDED FROM AN AT&T CONTRACTOR. DEPTHS ON THE COMED DUCT WERE RECORDED BY A CARDNO CREW. CARDNO CAN NOT VERIFY THE ACCURACY OF THESE DEPTHS AND SHOULD BE USED AS APPROXIMATE AND AS INFORMATION ONLY.

UTILITIES SHOWN ON THESE PLANS AS DEPICTED IN THE LEGEND HAVE BEEN INVESTIGATED BY CARDNO IN ACCORDANCE WITH SUE INDUSTRY STANDARDS. ALL OTHER INFORMATION SHOWN HAS BEEN PROVIDED TO CARDNO BY OTHERS. CARDNO SUE FIELD INVESTIGATION WAS PERFORMED 3/14/13 THROUGH 9/13/13. CHANGES TO UTILITIES MAY HAVE BEEN MADE AND THEREFORE MAY RESULT IN VARIANCES FROM THIS PLAN. CONSIDERATION SHOULD BE GIVEN TO UPDATING THIS PLAN IF DEEMED ADVISABLE PRIOR TO FINAL DESIGN AND CONSTRUCTION.

PRELIMINARY DATA FOR DELIVERY 9/16/2013

ALL UTILITIES SHOWN QUALITY LEVEL "B" UNLESS NOTED OTHERWISE.

20 0 METERS 20 40
 50 0 FEET 50 100

Cardno TBE

Dynasty Group
 Engineers & Surveyors

TBE Job No. IL09510531
 SUE Plan Page: 3 of 4

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS NO.
	N/A	Cook	559 158

Contract No. N/A
 FED. ROAD DIST. NO. ILLINOIS IDOT Project No. P-91-259-12

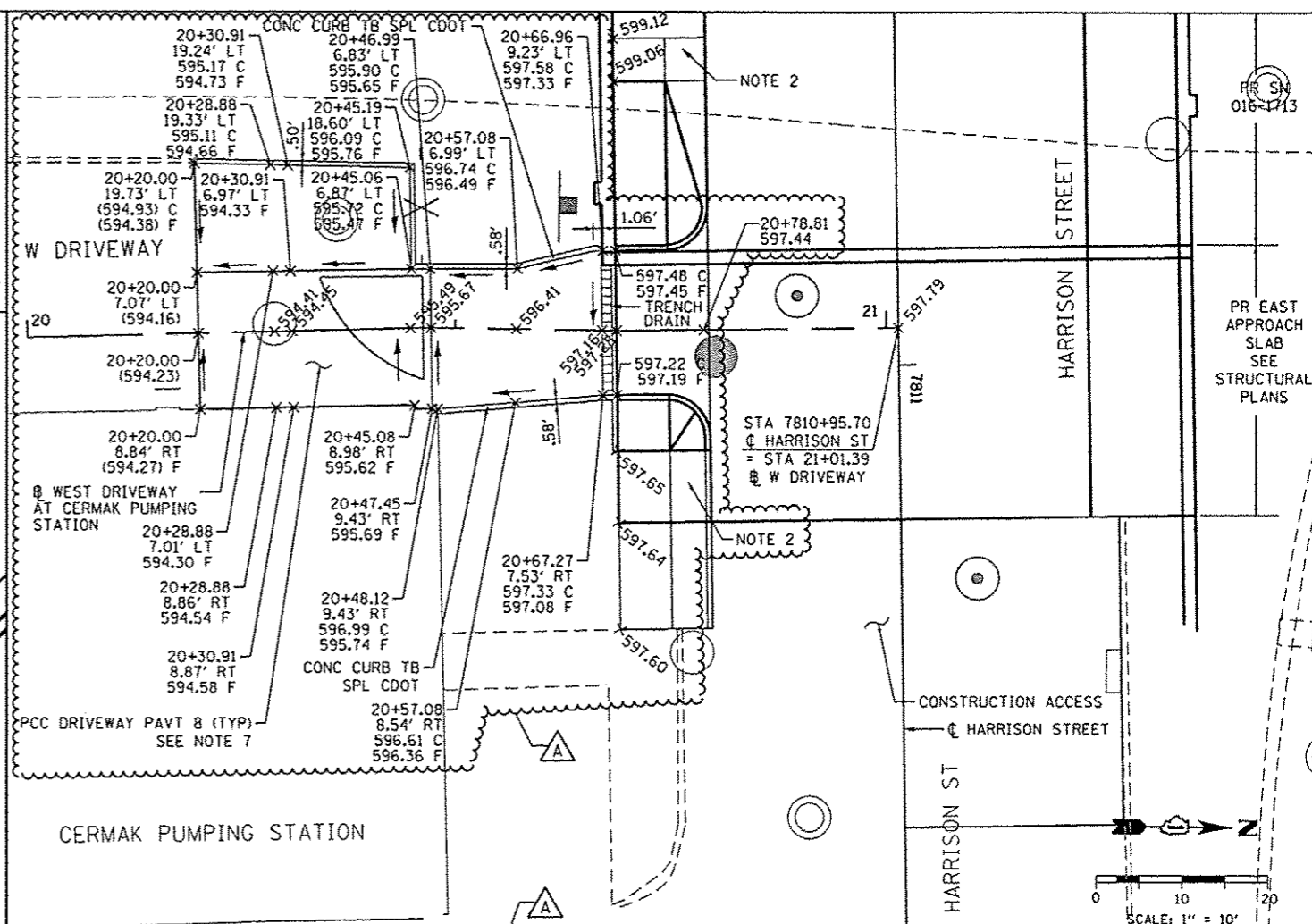
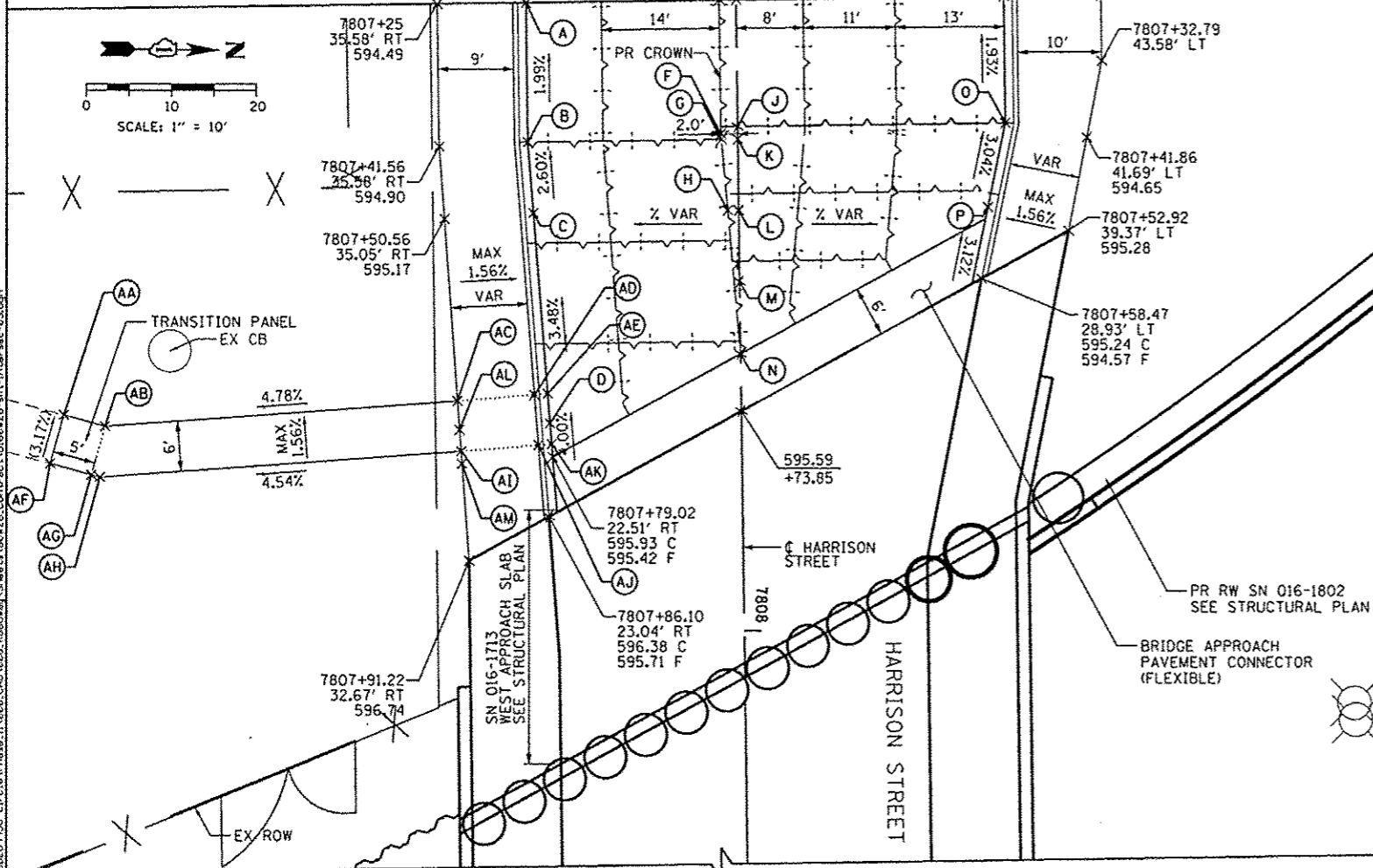
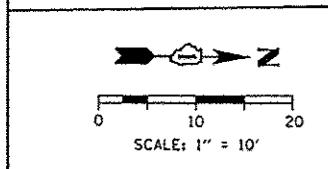
STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

1-941-901-290 (Circle Interchange)
 Chicago, Illinois

NOTES:

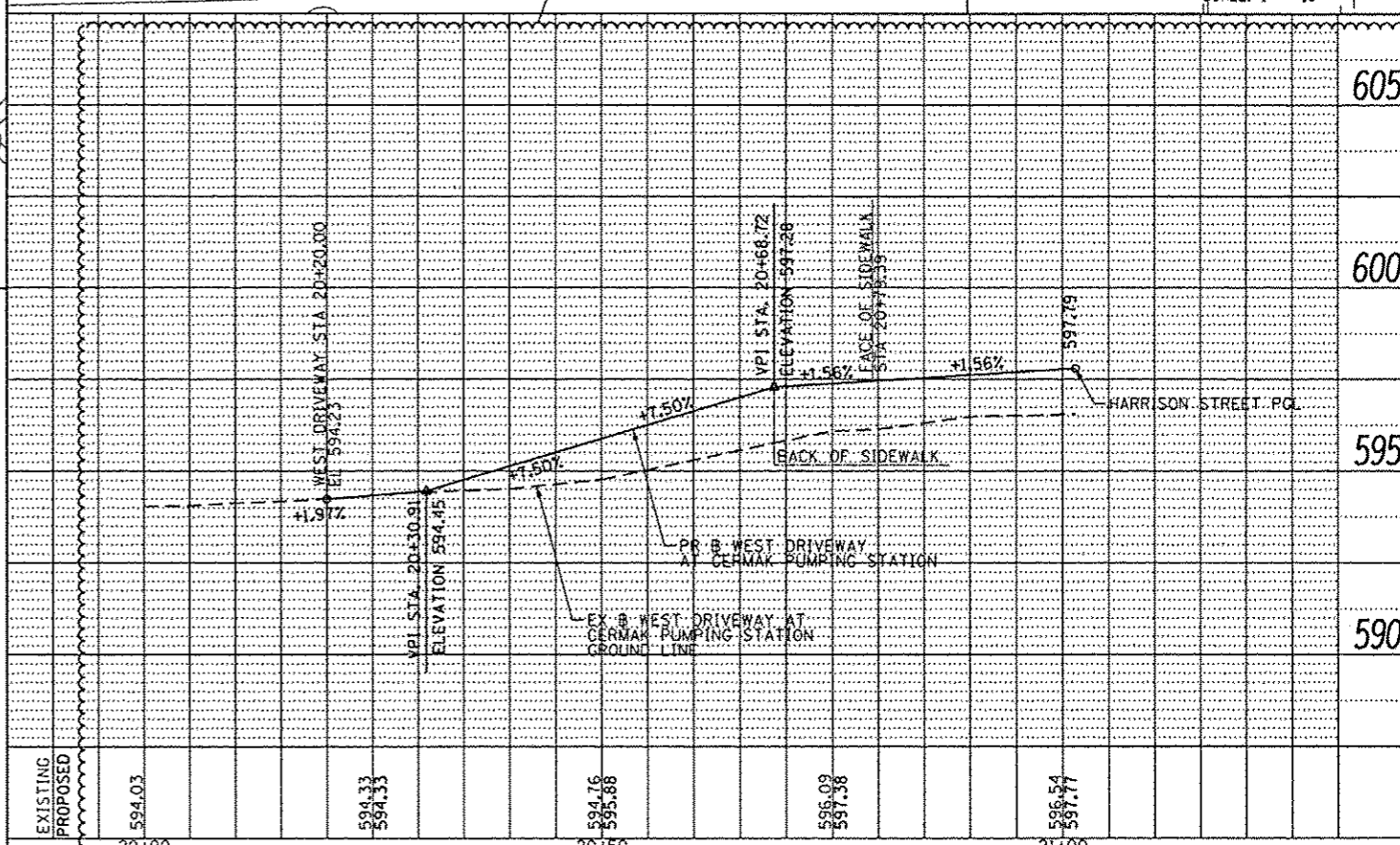
- SEE DRAINAGE SCHEDULE AND PLANS FOR STRUCTURE INFORMATION.
- SEE CURB RAMP DETAILS FOR ADA RAMP INFORMATION.
- CURB HEIGHT IS 6" UNLESS OTHERWISE NOTED OR INDICATED ON THE CURB RAMP DETAILS.
- ALL ELEVATIONS AND GRADES NOT SHOWN SHALL FOLLOW THE TYPICAL SECTIONS AND PROFILES.
- ALL INTERSECTION PAVEMENT ELEVATIONS INSIDE OF THE HARRISON STREET EDGES OF PAVEMENT ARE CONTROLLED BY PROFILE AND CROSS SLOPES OF HARRISON STREET.
- ELEVATIONS ARE PROVIDED AT THE BACK OF CURB (C) AND FLOW LINE (F).

7. DRIVEWAY LATERAL GROOVING SHALL BE APPLIED AT THE DRIVEWAY TO IMPROVE TRACTION. THIS WORK SHALL BE INCLUDED IN THE COST OF THE PCC PAVEMENT PAVT 8 PAY ITEM. NO ADDITIONAL COMPENSATION WILL BE ALLOWED.



STATION	OFFSET	ELEVATION	NOTES
A	7807+25.00 25.00' RT	594.35 (C) 593.85 (F)	
B	7807+41.56 25.00' RT	594.76 (C) 594.18 (F)	
C	7807+50.00 24.44' RT	595.03 (C) 594.40 (F)	
D	7807+75.00 22.78' RT	595.83 (C) 595.27 (F)	
E	7807+25.00 2.00' RT	594.21	CROWN EL
F	7807+40.93 2.00' RT	594.54	BEGIN TAPER
G	7807+41.56 1.95' RT	594.56	CROWN EL
H	7807+50.00 1.31' RT	594.78	CROWN EL
I	7807+25.00 0.00' RT	594.18	PGL EL
J	7807+40.05 0.00' RT	594.49	PGL EL
K	7807+41.56 0.00' RT	594.53	PGL EL
L	7807+50.00 0.00' RT	594.76	PGL EL
M	7807+58.47 0.00' RT	595.02	PGL EL
N	7807+67.06 0.00' RT	595.33	END TAPER
O	7807+40.05 32.00' LT	594.52 (C) 593.97 (F)	
P	7807+50.00 29.79' LT	594.95 (C) 594.28 (F)	

STATION	OFFSET	ELEVATION	NOTES
AA	7807+73.23 80.35' RT	593.68	MEET EX EL
AB	7807+74.64 75.55' RT	593.92	
AC	7807+72.19 33.78' RT	595.92	
AD	7807+71.58 24.59' RT	595.78 (C)	
AE	7807+71.47 23.01' RT	595.13 (F)	
AF	7807+78.99 82.04' RT	593.87	MEET EX EL
AG	7807+80.40 77.25' RT	594.01	
AH	7807+80.69 76.25' RT	594.06	
AI	7807+78.18 33.41' RT	596.01	
AJ	7807+77.57 24.19' RT	595.87 (C)	
AK	7807+77.46 22.61' RT	595.37 (F)	
AL	7807+75.54 33.59' RT	595.97	
AM	7807+79.56 33.35' RT	596.04	



0168W26-ah-interacc-83.dgn
 USER NAME = chuiw
 PLOT SCALE = 10.0000' / in.
 PLOT DATE = 10/13/2013

DESIGNED - JWM
 DRAWN - JWM
 CHECKED - DBM
 DATE - 9/15/13

REVISED - 10/15/2013
 REVISED -
 REVISED -
 REVISED -

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

ROADWAY AND GRADING PLAN DETAILS
 HARRISON STREET

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

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	163
CONTRACT NO. 60W26				

ILLINOIS FED. AID PROJECT

SIGNING SCHEDULE

LOCATION	SIGN NO.	LEGEND / DESCRIPTION	CODE	ACTION	LOCATION (STATION / OFFSET)		EXISTING PANEL DIMENSIONS		PROPOSED PANEL DIMENSIONS		NUMBER OF POSTS	REMOVE SIGN PANEL - TYPE 1 (SQ FT)	REMOVE SIGN PANEL - TYPE 2 (SQ FT)	REMOVE SIGN PANEL ASSEMBLY - TYPE A (EACH)	REMOVE SIGN PANEL - TYPE 3 (SQ FT)	RELOCATE SIGN PANEL - TYPE 3 (SQ FT)	SIGN PANEL - TYPE 1 (SQ FT)	SIGN PANEL - TYPE 2 (SQ FT)	SIGN PANEL - TYPE 3 (SQ FT)	SIGN PANEL - TYPE 1 (SPECIAL) (SQ FT)	
					EXISTING	PROPOSED	WIDTH (FT)	HEIGHT (FT)	WIDTH (FT)	HEIGHT (FT)											
EB I-290	IKE-01-BM	HALSTED STREET 800 W	CUSTOM	REMOVE AND REPLACE SIGN	351+81.16	40.1' RT	351+81.45	45.4' RT	6.50	2.00	7.00	2.00	2	13.00					14.00		
	IKE-02-TS	SPEED LIMIT	R2-1	REMOVE AND REPLACE SIGN	351+35.03	40.3' RT	351+35.03	40.3' RT	3.00	4.00	3.00	4.00	1	12.00					12.00		
WB I-290	IKE-03-BM	HALSTED STREET 800 W	CUSTOM	REMOVE AND REPLACE SIGN	352+46.58	39.5' LT	352+50.83	36.2' LT	6.50	2.00	7.00	2.00	2	13.00					14.00		
SOUTHWEST RAMP	SW-01-BS	UNIVERSITY OF ILLINOIS AT CHICAGO NEXT 2 EXITS	CUSTOM	RELOCATED ON NEW POSTS	19+70.95	33.9' RT	19+75.92	33.0' RT	12.00	9.00	12.00	9.00	2			108.00	108.00				
EASTSOUTH RAMP	ES-03-TM	RAMP SPEED LIMIT 30	W13-3	REMOVE AND REPLACE SIGN	106+51.75	49.9' LT	106+37.41	46.8' LT	3.00	4.00	3.00	4.00		12.00						12.00	
	ES-04-BM	DOUBLE ARROWS	W12-1	REMOVE AND REPLACE SIGN	106+85.82	18.9' LT	106+80.99	16.0' LT	4.00	4.00	4.00	4.00	2	16.00							16.00
TAYLOR EXIT RAMP	EXIT NO.	EXIT 52A	CUSTOM	PROPOSED SIGN	-	-	7308+51.00	148.3' LT	-	-	11.50	2.50	-							28.75	
	ES-01-GM	TAYLOR STREET/ROOSEVELT ROAD 1/4 MILE	CUSTOM	PROPOSED SIGN	-	-	7308+50.00	148.3' LT	-	-	16.00	11.00	2							176.00	
	-	EXIT 52A - TAYLOR STREET/ROOSEVELT ROAD 1/4 MILE	CUSTOM	RELOCATE SIGN	7809+00.00	33.0' LT	7308+50.00	12.7' LT	16.50	11.00	-	-	2				181.50				
NORTHWEST RAMP	NW-01-BM	ADDED LANE	W4-3R	REMOVE AND REPLACE SIGN	21+78.14	16.1' RT	21+79.19	15.9' RT	4.00	4.00	4.00	4.00	2	16.00						16.00	
ROUNDED SUBTOTAL												0	82	0	108	290	0	84	205	0	
TOTAL												85	82	1	108	290	59	84	205	46	

LOCATION	SIGN NO.	LEGEND / DESCRIPTION	CODE	ACTION	LOCATION (STATION / OFFSET)		EXISTING PANEL DIMENSIONS		PROPOSED PANEL DIMENSIONS		NUMBER OF POSTS	TELESCOPING STEEL SIGN SUPPORT (FT)	STRUCTURAL STEEL SIGN SUPPORT - BREAKAWAY (LBS)	STEEL POST, SPECIAL (EACH)	REMOVE GROUND MOUNTED SIGN SUPPORT (EACH)	REMOVE CONCRETE FOUNDATION - GROUND MOUNT (EACH)	CONCRETE FOUNDATIONS (CU YDS)	WOOD SIGN SUPPORT (FT)		
					EXISTING	PROPOSED	WIDTH (FT)	HEIGHT (FT)	WIDTH (FT)	HEIGHT (FT)										
EB I-290	IKE-01-BM	HALSTED STREET 800 W	CUSTOM	REMOVE AND REPLACE SIGN	351+81.16	40.1' RT	351+81.45	45.4' RT	6.50	2.00	7.00	2.00	2	28.00						
	IKE-02-TS	SPEED LIMIT	R2-1	REMOVE AND REPLACE SIGN	351+35.03	40.3' RT	351+35.03	40.3' RT	3.00	4.00	3.00	4.00	1	16.00			1			
WB I-290	IKE-03-BM	HALSTED STREET 800 W	CUSTOM	REMOVE AND REPLACE SIGN	352+46.58	39.5' LT	352+50.83	36.2' LT	6.50	2.00	7.00	2.00	2	28.00						
SOUTHWEST RAMP	SW-01-BS	UNIVERSITY OF ILLINOIS AT CHICAGO NEXT 2 EXITS	CUSTOM	RELOCATED ON NEW POSTS	19+70.95	33.9' RT	19+75.92	33.0' RT	12.00	9.00	12.00	9.00	2				2	2	0.3	35.60
EASTSOUTH RAMP	ES-03-TM	RAMP SPEED LIMIT 30	W13-3	REMOVE AND REPLACE SIGN	106+51.75	49.9' LT	106+37.41	46.8' LT	3.00	4.00	3.00	4.00								
	ES-04-BM	DOUBLE ARROWS	W12-1	REMOVE AND REPLACE SIGN	106+85.82	18.9' LT	106+80.99	16.0' LT	4.00	4.00	4.00	4.00	2	32.00						
TAYLOR EXIT RAMP	EXIT NO.	EXIT 52A	CUSTOM	PROPOSED SIGN	-	-	7308+51.00	148.3' LT	-	-	11.50	2.50	-							
	ES-01-GM	TAYLOR STREET/ROOSEVELT ROAD 1/4 MILE	CUSTOM	PROPOSED SIGN	-	-	7308+50.00	148.3' LT	-	-	16.00	11.00	2		1170.00				2.54	
	-	EXIT 52A - TAYLOR STREET/ROOSEVELT ROAD 1/4 MILE	CUSTOM	RELOCATE SIGN	7809+00.00	33.0' LT	7308+50.00	12.7' LT	16.50	11.00	-	-	2		1144.00				2.54	
NORTHWEST RAMP	NW-01-BM	ADDED LANE	W4-3R	REMOVE AND REPLACE SIGN	21+78.14	16.1' RT	21+79.19	15.9' RT	4.00	4.00	4.00	4.00	2	32.00						
ROUNDED SUBTOTAL												136	2314	0	3	2	5.4	36		
TOTAL												151	2314	4	5	2	5.4	36		



D168W26-shr-Sign-Schedule-824
 USER NAME = pimsarno
 PLOT SCALE = 50.0000' / 1" =
 PLOT DATE = 10/13/2013

DESIGNED - OPS
 DRAWN - OPS
 CHECKED - DBM
 DATE - 9/15/13

REVISED - 10/15/2013
 REVISED -
 REVISED -
 REVISED -

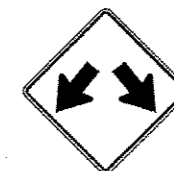
**STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION**

SIGNING SCHEDULE

SCALE: SHEET 2A OF 6 SHEETS STA. TO STA.

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	184A
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				

**W Harrison St
600 S**



**SPEED
LIMIT
45**

D3-2D/F
SEE NOTE 1
DOUBLE SIDED
REFLECTIVE: YES
MOUNT: FLAG
(66"x18")

NB-02-SA
SB-01-SA

R3-17
REFLECTIVE: YES
MOUNT: CENTER
(24"x18")

NB-04B-LP
NB-08-SP
SB-11-SP

R7-207-1/3
SEE NOTE 1
DOUBLE SIDED
REFLECTIVE: NO
MOUNT: FLAG
(18"x18")

NB-05-LP
NB-06-LP

R3-8R
REFLECTIVE: YES
MOUNT: CENTER
(30"x36")

NB-07-ST

R7-201-4
SEE NOTE 1
DOUBLE SIDED
REFLECTIVE: NO
MOUNT: FLAG
(18"x18")

SB-03-LP
SB-08-LP
WB-100-LP
EB-100-LP

R7-207-4
SEE NOTE 1
DOUBLE SIDED
REFLECTIVE: NO
MOUNT: FLAG
(18"x18")

SB-06-LP

W12-1
REFLECTIVE: YES
MOUNT: CENTER
(36"x36")

ES-04-BM

R2-1
REFLECTIVE: YES
MOUNT: CENTER
(36"x48")

IKE-02-TS

**RIGHT LANE
MUST
TURN RIGHT**

TO



AHEAD

ENDS

R3-7
REFLECTIVE: YES
MOUNT: CENTER
(36"x36")

EB-01-ST

M4-5
REFLECTIVE: YES
MOUNT: CENTER
(24"x12")

EB-03-LP

M1-1
REFLECTIVE: YES
MOUNT: CENTER
(24"x24")

EB-04-LP

M1-1
REFLECTIVE: YES
MOUNT: CENTER
(24"x24")

EB-05-LP

M6-1
REFLECTIVE: YES
MOUNT: CENTER
(21"x15")

EB-06-LP

R3-5R
REFLECTIVE: YES
MOUNT: CENTER
(30"x36")

EB-07-LP

W4-3R
REFLECTIVE: YES
MOUNT: CENTER
(48"x48")

NW-01-BM

R3-17oP
REFLECTIVE: YES
MOUNT: CENTER
(24"x8")

SB-12-SP

R3-17bP
REFLECTIVE: YES
MOUNT: CENTER
(24"x8")

NB-09-SP

**HONORARY
JANE ADDAMS HULL-HOUSE ST**

**HONORARY
FRANK REED HORTON WAY**

**S Halsted St
800 W**



**RAMP
30
MPH**

STOP

D3-3
(SEE NOTE 1)
DOUBLE SIDED
REFLECTIVE: NO
MOUNT: FLAG
(36"x6")

EB-08-SP

D3-3
(SEE NOTE 1)
DOUBLE SIDED
REFLECTIVE: NO
MOUNT: FLAG
(36"x6")

EB-09-SP

D3-2D/F
SEE NOTE 1
DOUBLE SIDED
REFLECTIVE: YES
MOUNT: FLAG
(60"x18")

EB-10-SA
WB-02-SA

R7-203-3
SEE NOTE 1
DOUBLE SIDED
REFLECTIVE: NO
MOUNT: FLAG
(18"x18")

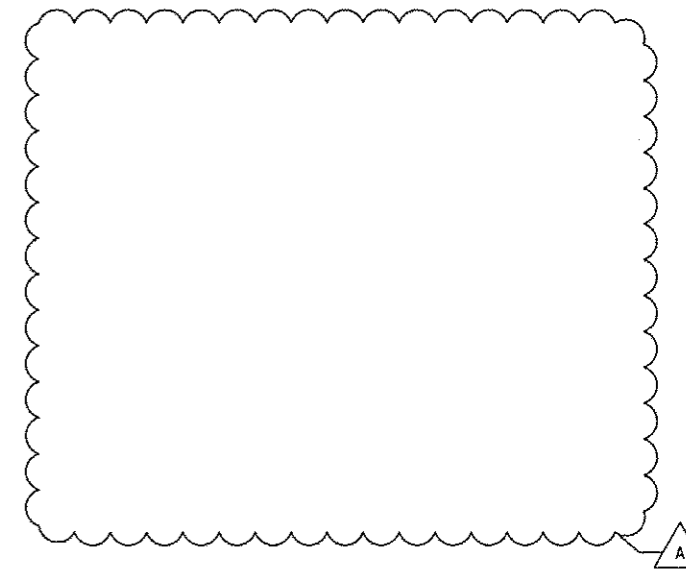
WB-01-LP

W13-3
REFLECTIVE: YES
MOUNT: CENTER
(36"x48")

ES-03-TM

R1-1
REFLECTIVE: YES
MOUNT: CENTER
(30"x30")

EB-101-TS



NOTE:

1. FOR CDOT SIGN PANEL DETAILS SEE THE MOST CURRENT EDITION OF "THE FIELD MANUAL FOR SIGN INSTALLATION GUIDE" AND "SIGN FABRICATION AND INSTALLATIONS" MANUALS.

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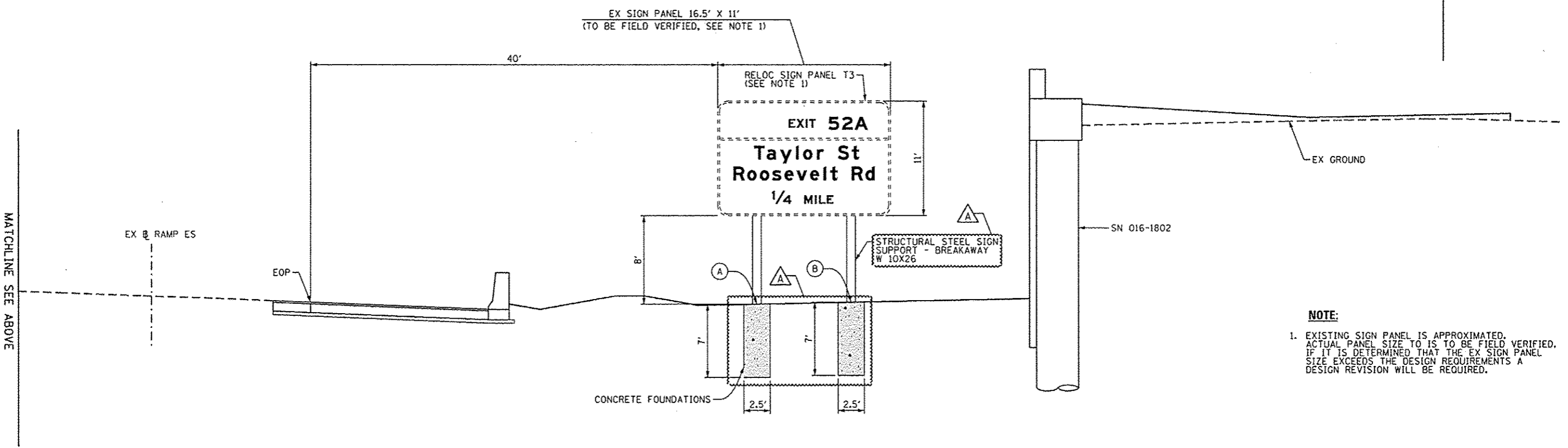
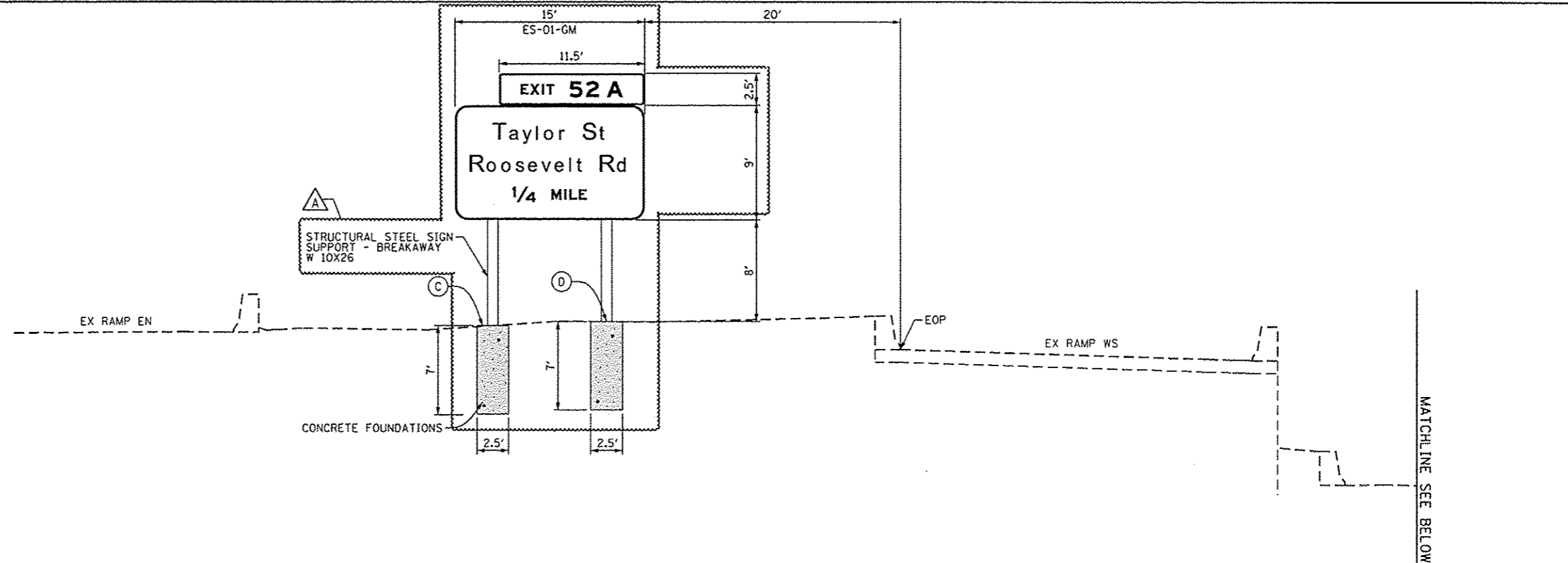


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USER NAME: BAW\jort	DRAWN - BAW	REVISED -
PLOT SCALE: 10.0000' / 1"	CHECKED - JLV	REVISED -
PLOT DATE: 10/14/2013	DATE - 9/15/13	REVISED -

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

SIGNING PLAN SIGN PANEL DETAILS			
SCALE: NONE	SHEET 3	OF 6 SHEETS	STA. TO STA.

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	185
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				



GROUND MOUNTED SIGN
STA 7308 + 50 (PR BL TAYLOR EXIT RAMP)
LOOKING SOUTH

NOTE:
 1. EXISTING SIGN PANEL IS APPROXIMATED. ACTUAL PANEL SIZE TO IS TO BE FIELD VERIFIED. IF IT IS DETERMINED THAT THE EX SIGN PANEL SIZE EXCEEDS THE DESIGN REQUIREMENTS A DESIGN REVISION WILL BE REQUIRED.

LOCATION	TOP OF FOUNDATION ELEVATION
A	576.12
B	576.30
C	589.93
D	590.30

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0160W26-Exit-Sign-Det-03.dgn
 USER NAME = PIMSARNO
 PLOT SCALE = 5.0000' / 1"
 PLOT DATE = 10/10/2013

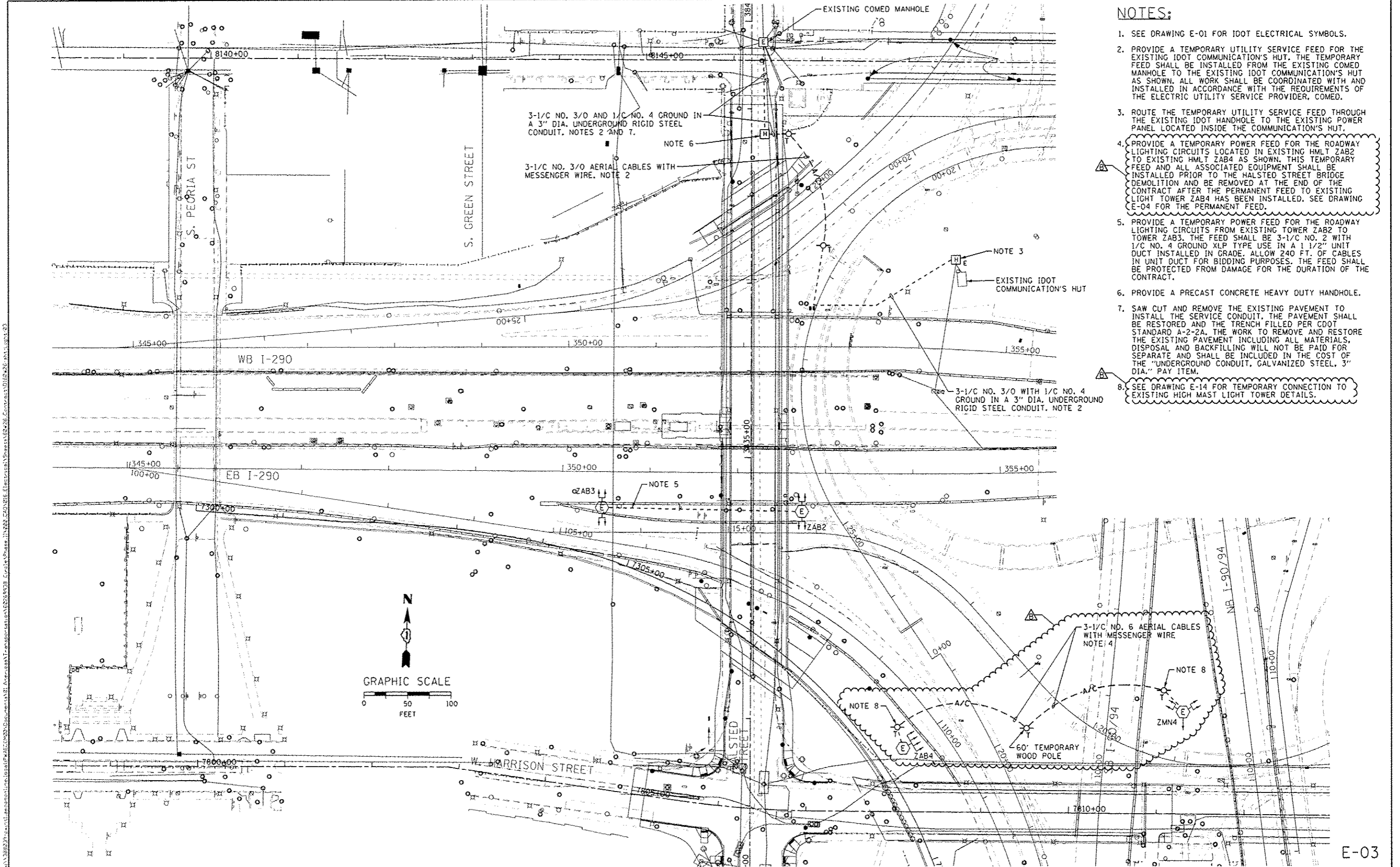
DESIGNED - JSS/OPS	REVISED - 10/15/2013
DRAWN - OPS	REVISED -
CHECKED - DBM	REVISED -
DATE - 9/15/13	REVISED -

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

SIGNING DETAILS

SCALE: NONE SHEET 3 OF 4 SHEETS STA. TO STA.

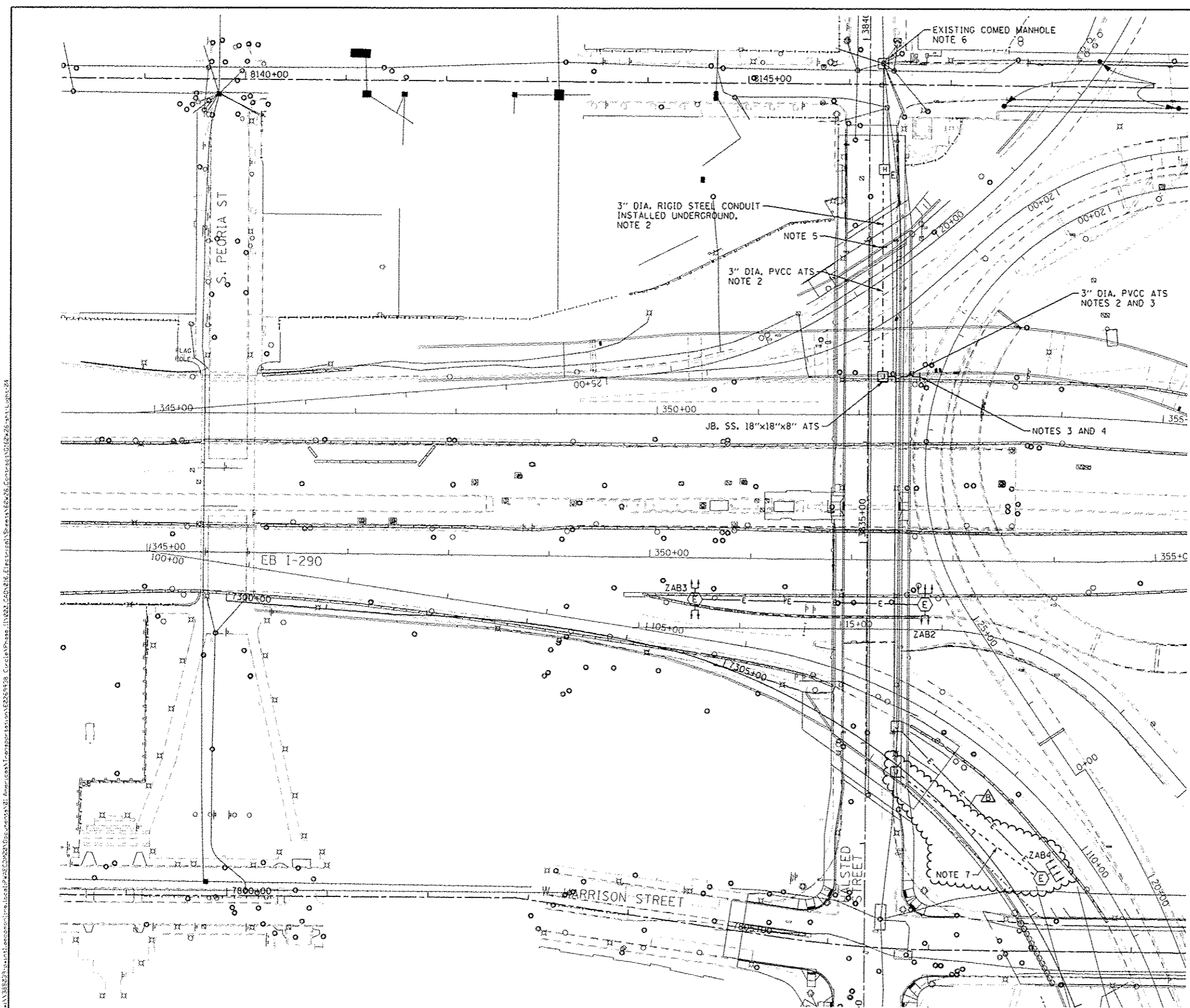
F.A.T. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	202
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				



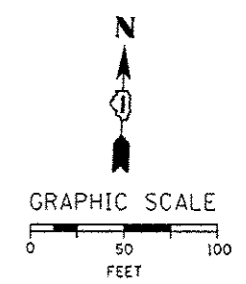
- NOTES:**
- SEE DRAWING E-01 FOR IDOT ELECTRICAL SYMBOLS.
 - PROVIDE A TEMPORARY UTILITY SERVICE FEED FOR THE EXISTING IDOT COMMUNICATIONS HUT. THE TEMPORARY FEED SHALL BE INSTALLED FROM THE EXISTING COMED MANHOLE TO THE EXISTING IDOT COMMUNICATIONS HUT AS SHOWN. ALL WORK SHALL BE COORDINATED WITH AND INSTALLED IN ACCORDANCE WITH THE REQUIREMENTS OF THE ELECTRIC UTILITY SERVICE PROVIDER, COMED.
 - ROUTE THE TEMPORARY UTILITY SERVICE FEED THROUGH THE EXISTING IDOT HANDHOLE TO THE EXISTING POWER PANEL LOCATED INSIDE THE COMMUNICATIONS HUT.
 - PROVIDE A TEMPORARY POWER FEED FOR THE ROADWAY LIGHTING CIRCUITS LOCATED IN EXISTING HMLT ZAB2 TO EXISTING HMLT ZAB4 AS SHOWN. THIS TEMPORARY FEED AND ALL ASSOCIATED EQUIPMENT SHALL BE INSTALLED PRIOR TO THE HALSTED STREET BRIDGE DEMOLITION AND BE REMOVED AT THE END OF THE CONTRACT AFTER THE PERMANENT FEED TO EXISTING LIGHT TOWER ZAB4 HAS BEEN INSTALLED. SEE DRAWING E-04 FOR THE PERMANENT FEED.
 - PROVIDE A TEMPORARY POWER FEED FOR THE ROADWAY LIGHTING CIRCUITS FROM EXISTING TOWER ZAB2 TO TOWER ZAB3. THE FEED SHALL BE 3-1/C NO. 2 WITH 1/C NO. 4 GROUND XLP TYPE USE IN A 1 1/2" UNIT DUCT INSTALLED IN GRADE. ALLOW 240 FT. OF CABLES IN UNIT DUCT FOR BIDDING PURPOSES. THE FEED SHALL BE PROTECTED FROM DAMAGE FOR THE DURATION OF THE CONTRACT.
 - PROVIDE A PRECAST CONCRETE HEAVY DUTY HANDHOLE.
 - SAW CUT AND REMOVE THE EXISTING PAVEMENT TO INSTALL THE SERVICE CONDUIT. THE PAVEMENT SHALL BE RESTORED AND THE TRENCH FILLED PER CDOT STANDARD A-2-2A. THE WORK TO REMOVE AND RESTORE THE EXISTING PAVEMENT INCLUDING ALL MATERIALS, DISPOSAL AND BACKFILLING WILL NOT BE PAID FOR SEPARATE AND SHALL BE INCLUDED IN THE COST OF THE "UNDERGROUND CONDUIT, GALVANIZED STEEL, 3" DIA." PAY ITEM.
 - SEE DRAWING E-14 FOR TEMPORARY CONNECTION TO EXISTING HIGH MAST LIGHT TOWER DETAILS.

E-03

AECOM <small>303 EAST WACKER DRIVE, SUITE 1400 CHICAGO, IL 60601-2516 PHONE: (312) 315-7700 FAX: (312) 315-4900</small>	DIB#W26-sh1-Light-03 USER NAME: mjw PLOT SCALE: 1/8"=20' PLOT DATE: 10/24/2013	DESIGNED - WDS DRAWN - CAM CHECKED - WDS DATE - 9/15/13	REVISED - 10/24/13 REVISED - REVISED - REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	I-290 TEMPORARY POWER PLAN SCALE: 1"=50' SHEET 3 OF 22 SHEETS STA. TO STA.	F.A.I. RTE. 90/94/290 SECTION 2013-008R COUNTY COOK TOTAL SHEETS 599 SHEET NO. 226 CONTRACT NO. 60W26 ILLINOIS FED. AID PROJECT
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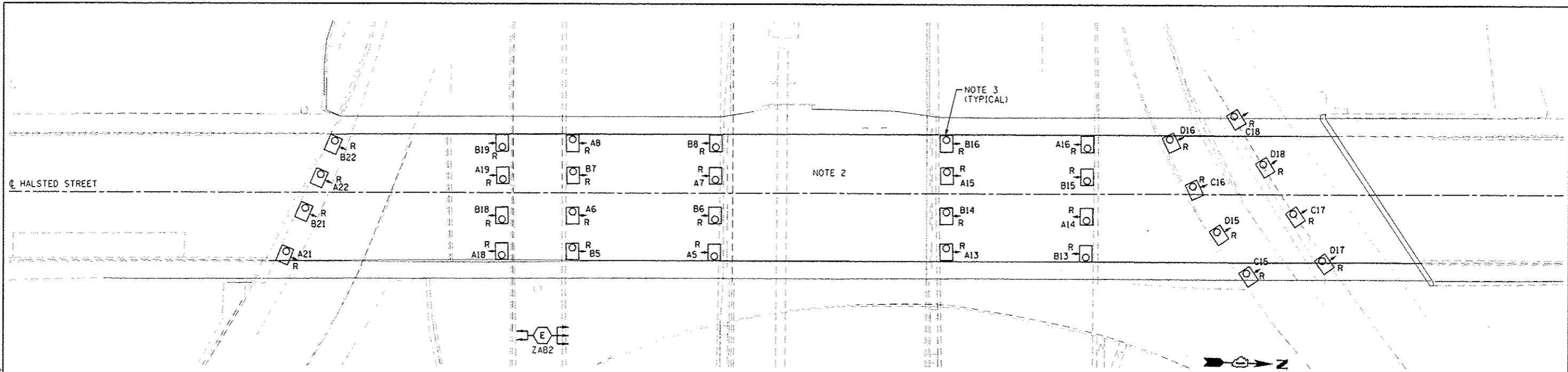


- NOTES:**
- SEE DRAWING E-01 FOR IDOT ELECTRICAL SYMBOLS.
 - PROVIDE AN EMPTY CONDUIT RUN FOR FUTURE USE.
 - ROUTE THE CONDUIT RUN DOWN THE BRIDGE PIER AND TERMINATE BELOW GRADE WITH PVC ELBOW ENCASED IN NON-REINFORCED CONCRETE AS SHOWN ON IDOT STANDARD DRAWING BE-902. THE CONDUIT SHALL BE STUBBED OUT OF THE ENCASEMENT AND CAPPED FOR FUTURE USE. THE CONCRETE ENCASED CONDUIT TRANSITION SHALL BE INCLUDED IN THE COST OF THE GALVANIZED RIGID STEEL CONDUIT PAY ITEMS.
 - ALL VERTICAL CONDUIT RUNS ROUTED DOWN THE PIERS SHALL BE INSTALLED ON THE INSIDE OF THE PIER FACING AWAY FROM TRAFFIC.
 - DEMARCATON POINT FOR TRANSITION FROM RIGID STEEL CONDUIT INSTALLED UNDERGROUND TO PVC COATED RIGID STEEL CONDUIT ATTACHED TO STRUCTURE SHALL BE AT THE BRIDGE ABUTMENT. SEE STRUCTURAL PLANS FOR LOCATION OF CONDUIT SLEEVES IN ABUTMENT WALL.
 - ALL WORK SHALL BE COORDINATED AND COMPLY WITH THE ELECTRIC UTILITY (COMED) STANDARDS.
 - PROVIDE A PERMANENT POWER FEED FOR THE ROADWAY LIGHTING CIRCUITS FOR EXISTING HIGH MAST LIGHT TOWER ZAB4. THE FEED SHALL BE 3-1/2" NO. 2 WITH 1/2" NO. 4 GROUND XLP TYPE USE CABLES IN A 1 1/2" UNIT DUCT INSTALLED IN GRADE. ALLOW 175 FT. OF CABLES IN UNIT DUCT FOR BIDDING PURPOSES. SEE DRAWING E-05 FOR CONTINUATION OF THIS PERMANENT FEED.

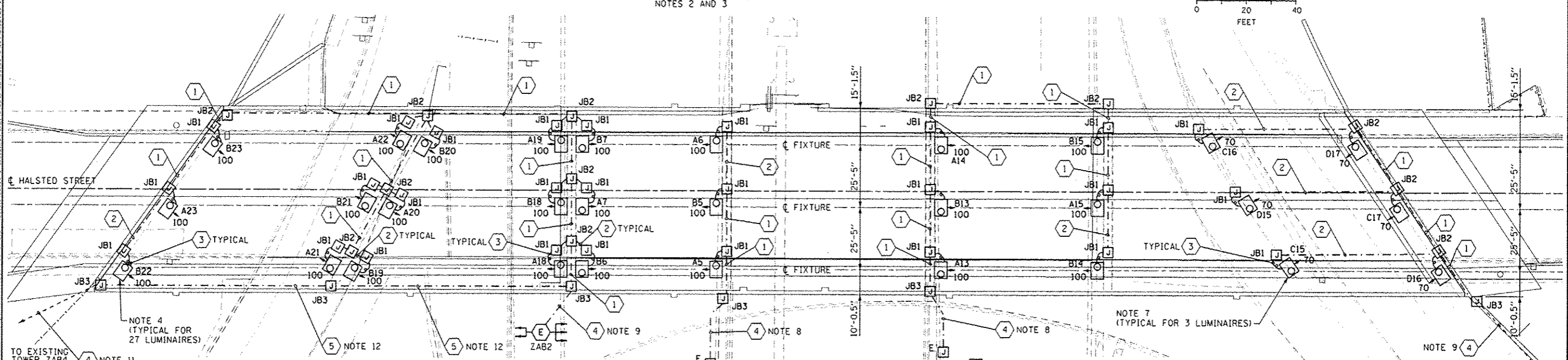


E-04

AECOM 303 EAST WACKER DRIVE, SUITE 1400 CHICAGO, IL 60601-5476 PHONE (312) 373-1100 FAX (312) 373-4800	0162W26-shs-light-04 USER NAME: mjymnd PLOT SCALE: 1/8"=1'-0" PLOT DATE: 10/24/2013	DESIGNED - WDS DRAWN - CAM CHECKED - WDS DATE - 9/15/13	REVISED - 10/24/13 REVISED - REVISED - REVISED -	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	I-290 PROPOSED LIGHTING PLAN SCALE: 1"=50' SHEET 4 OF 22 SHEETS STA. TO STA.	<table border="1"> <tr> <th>F.A.I. RTE.</th> <th>SECTION</th> <th>COUNTY</th> <th>TOTAL SHEETS</th> <th>SHEET NO.</th> </tr> <tr> <td>90/94/290</td> <td>2013-008R</td> <td>COOK</td> <td>559</td> <td>227</td> </tr> </table>	F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.	90/94/290	2013-008R	COOK	559	227
	F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.											
90/94/290	2013-008R	COOK	559	227												
				CONTRACT NO. 60W26 ILLINOIS FED. AID PROJECT												



EXISTING UNDERPASS LIGHTING PLAN
NOTES 2 AND 3



PROPOSED UNDERPASS LIGHTING PLAN

NOTES:

- SEE DRAWING E-01 FOR 100T ELECTRICAL SYMBOLS AND ABBREVIATIONS.
- LOCATIONS OF EXISTING ELECTRICAL EQUIPMENT SHOWN ON THIS DRAWING ARE APPROXIMATIONS AND MUST BE VERIFIED IN THE FIELD BY THE CONTRACTOR.
- THE REMOVAL OF EXISTING UNDERPASS LUMINAIRES MUST INCLUDE THE REMOVAL OF ALL CABLES, CONDUIT, JUNCTION BOXES, AND HARDWARE ASSOCIATED WITH THE EXISTING UNDERPASS LIGHTING. COST FOR THIS WORK WILL NOT BE PAID FOR SEPARATELY BUT WILL BE INCLUDED AS PART OF THE "REMOVAL OF LIGHTING UNIT, SALVAGE" PAY ITEM.
- SEE IDOT STANDARD DRAWING BE-902 FOR ADDITIONAL INSTALLATION DETAILS FOR PROPOSED PIER/ABUTMENT WALL MOUNTED UNDERPASS LUMINAIRES.
- SEE IDOT STANDARD DRAWING BE-900 FOR ADDITIONAL INSTALLATION DETAILS FOR PROPOSED SUSPENDED MOUNT UNDERPASS LUMINAIRES.
- ALL PROPOSED UNDERPASS LIGHTING UNITS SHOWN ON THIS DRAWING WILL BE FED FROM EXISTING IDOT LIGHTING CONTROLLER "Z".
- SUSPENDED MOUNT UNDERPASS LUMINAIRES SETBACK FROM THE EDGE OF PAVEMENT SHALL BE 2 FEET.
- ROUTE NEW CABLES IN UNIT DUCT FROM THE PROPOSED JUNCTION BOX ON HALSTED ST. BRIDGE TO THE EXISTING LIGHTING CIRCUITS LOCATED IN THE EXISTING JUNCTION BOX ATTACHED TO THE RAMP STRUCTURE PIER. ATTACH THE NEW UNIT DUCT TO THE BACKSIDE OF THE MEDIAN BARRIER WALL.

- ROUTE NEW CABLES IN UNIT DUCT FROM PROPOSED JUNCTION BOX ON HALSTED ST. BRIDGE TO THE EXISTING LIGHTING CIRCUITS LOCATED IN THE EXISTING LIGHT TOWER TO PROVIDE A TEMPORARY POWER CONNECTION FOR THE UNDERPASS LIGHTING SYSTEM AS SHOWN.
- PROVIDE A TEMPORARY POWER CONNECTION FOR THE UNDERPASS LIGHTING SYSTEM FROM EXISTING LIGHT TOWER ZC02. ALLOW 200 FEET OF CABLES IN UNIT DUCT FOR BIDDING PURPOSES.
- ROUTE NEW CABLES IN UNIT DUCT FROM PROPOSED JUNCTION BOX ON HALSTED ST. BRIDGE TO THE EXISTING LIGHTING CIRCUITS LOCATED IN THE LIGHT TOWER ZAB4 TO PROVIDE A TEMPORARY POWER CONNECTION AS SHOWN. SEE DRAWING E-04 FOR CONTINUATION.
- TEMPORARY ROADWAY LIGHTING POWER FEED FROM TOWER ZAB2 TO TOWER ZAB4.

- 70 WATT, HPS UNDERPASS LUMINAIRE WITH TYPE 3 DISTRIBUTION
- 100 WATT, HPS UNDERPASS LUMINAIRE WITH TYPE 4 DISTRIBUTION

JUNCTION BOX SCHEDULE		
NO.	SIZE	DESCRIPTION
JB1	6"X6"X4"	STAINLESS STEEL, ATTACHED TO STRUCTURE, UNDERPASS LIGHTING
JB2	12"X10"X6"	STAINLESS STEEL, ATTACHED TO STRUCTURE, UNDERPASS LIGHTING
JB3	18"X18"X8"	STAINLESS STEEL, ATTACHED TO STRUCTURE, UNDERPASS LIGHTING

CABLE / CONDUIT SCHEDULE	
1	3-1/2"Ø, 1-1/2"Ø GND IN 1" DIA PVCC RGC ATTACHED TO STRUCTURE (CKTS AS INDICATED ON THIS DRAWING)
2	2-1/2"Ø, 1-1/2"Ø GND IN 1" DIA PVCC RGC ATTACHED TO STRUCTURE (CKTS AS INDICATED ON THIS DRAWING)
3	2-1/2"Ø, 1-1/2"Ø GND IN 1" DIA LIQUID TIGHT FLEXIBLE CONDUIT (CKTS AS INDICATED ON THIS DRAWING)
4	3-1/2"Ø, 1-1/2"Ø GND XLP TYPE USE CABLES IN A 1 1/2" DIA. PVCC RGC ATTACHED TO STRUCTURE (CKTS AS INDICATED ON THIS DRAWING)
5	3-1/2"Ø, 1-1/2"Ø GND XLP TYPE USE CABLES IN A 3" DIA. PVCC RGC ATTACHED TO STRUCTURE (CKTS AS INDICATED ON THIS DRAWING)



0160W26-shs-light-05
USER NAME: myerko
PLOT SCALE: 1/8"=1'-0"
PLOT DATE: 10/24/2013

DESIGNED - WDS
DRAWN - CAM
CHECKED - WDS
DATE - 9/15/13

REVISED - 10/24/13
REVISED -
REVISED -
REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

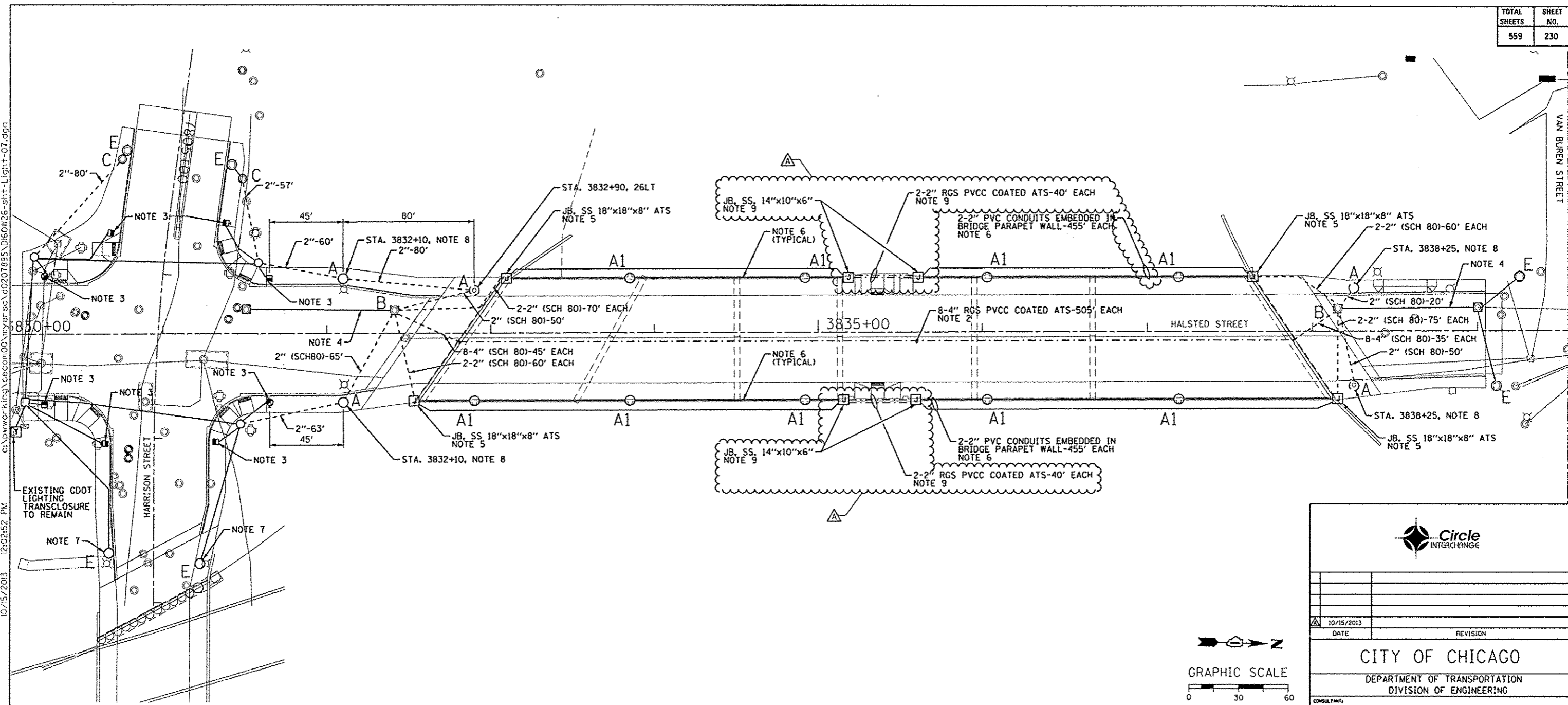
HALSTED STREET UNDERPASS LIGHTING PLAN

SCALE: 1"=20' SHEET 5 OF 22 SHEETS STA. TO STA.

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	228
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				

E-05

c:\pwworking\decem00\myr\sc\0207855\Di01026-sht-Light-07.dgn 10/15/2013 12:02:52 PM



"A" PROVIDE 28"x7", 1-1/4" A.R., 15" B.C. FOUNDATION FOR LIGHT POLE, PER DWG. NOS. 953 AND 837.

"A1" LIGHT POLE FOUNDATION IS INTEGRAL TO THE BRIDGE STRUCTURE PARAPET WALL. SEE STRUCTURAL PLANS FOR DETAILS AND FINAL LOCATION OF FOUNDATION.

"B" PROVIDE 3'x4'x4' CONCRETE MANHOLE PER DWG. NO. 730 WITH 24" FRAME AND COVER.

"C" DRILL EXISTING MANHOLE/HANDHOLE.

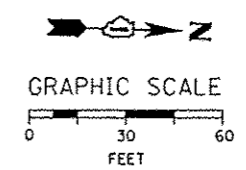
"E" EXISTING TO REMAIN.

NOTES:

- INTERCEPT EXISTING LIGHTING CONDUIT TO EXISTING LIGHT POLE. CUT CONDUIT AND EXTEND END OF EXISTING CONDUIT TO NEW FOUNDATION.
- PROVIDE EIGHT 4-INCH RIGID GALVANIZED STEEL PVC COATED CONDUITS ATTACHED TO STRUCTURE. THE CONDUITS SHALL BE MOUNTED UNDER THE BRIDGE DECK. SEE STRUCTURAL PLANS FOR LOCATION OF CONDUITS.
- SEE THE TRAFFIC SIGNAL PLANS FOR LOCATION OF COMBINATION TRAFFIC SIGNAL/LIGHT POLE FOUNDATION. COORDINATE ALL WORK WITH TRAFFIC SIGNAL WORK.
- INTERCEPT EXISTING CONDUITS AND CONNECT TO PROPOSED MANHOLE.
- SEE DRAWING NO. E-13 FOR EMBEDDED CONDUIT EXITING PARAPET WALL DETAILS.
- PROVIDE TWO 2-INCH SCHEDULE 40 PVC CONDUITS IN BOTH BRIDGE PARAPET WALLS; ONE FOR THE LIGHTING CIRCUITS AND ONE SPARE. SEE STRUCTURAL PLANS FOR LOCATIONS, DETAILS AND INSTALLATION OF CONDUITS.
- SEE DRAWING E-10 FOR CONTINUATION OF CONDUIT RUN TO THE NEXT LIGHT POLE FOUNDATION ON HARRISON STREET.
- INSTALL LIGHT POLE FOUNDATION IN THE SIDEWALK 3 FEET FROM THE FACE OF CURB TO CENTER OF FOUNDATION.

9. SEE DRAWING NO. E-14 FOR EMBEDDED BRIDGE CONDUIT DETAIL-B.

FOR LIGHTING CABLE AND EQUIPMENT INSTALLATION PLANS SEE DRAWING NO. E-08.
FOR LIGHTING REMOVAL PLANS SEE DRAWING NO. E-09.



DATE: 10/15/2013	REVISION:
CITY OF CHICAGO DEPARTMENT OF TRANSPORTATION DIVISION OF ENGINEERING	
AECOM	
WORK ORDER NO. _____	DATE _____
COST ALLOCATION ACCOUNT _____	
APPROPRIATION ACCOUNT (MATERIAL _____ LABOR _____)	
HALSTED STREET LIGHTING CONDUIT AND FOUNDATION PLAN	
CITY OF CHICAGO DEPT. OF TRANSPORTATION DIVISION OF ELECTRICAL OPERATIONS	
DRAFTSMAN: CAM	CHIEF DRAFTSMAN: _____
SUPERVISING ENGINEER: ELEC. DESIGN ENGR. WDS	ENGINEER: WDS
ENGINEER OF ELECTRICITY: _____	E-07
GEN'L SUPT. OF ELECTRICITY: _____	
DEPUTY COMMISSIONER: _____	
SIZE: 22" 34" SCALE: 1" = 30'	DATE: 9/15/13
C.D.O.T. PROJECT NO. _____	DWG. NO. _____

NOTES

1. PULL FIBER OPTIC AND COPPER COMMUNICATION CABLES FROM THE COMMUNICATIONS HUT AND MCD CROSS CONNECT CABINET NEAR HALSTED ST. BACK TO THIS JUNCTION BOX. PROVIDE ACCESS TO THE EXISTING JUNCTION BOX THROUGH THE BACK OF THE CTA WALL. SEE THE ITS DETAIL SHEET FOR ACCESS DETAILS.

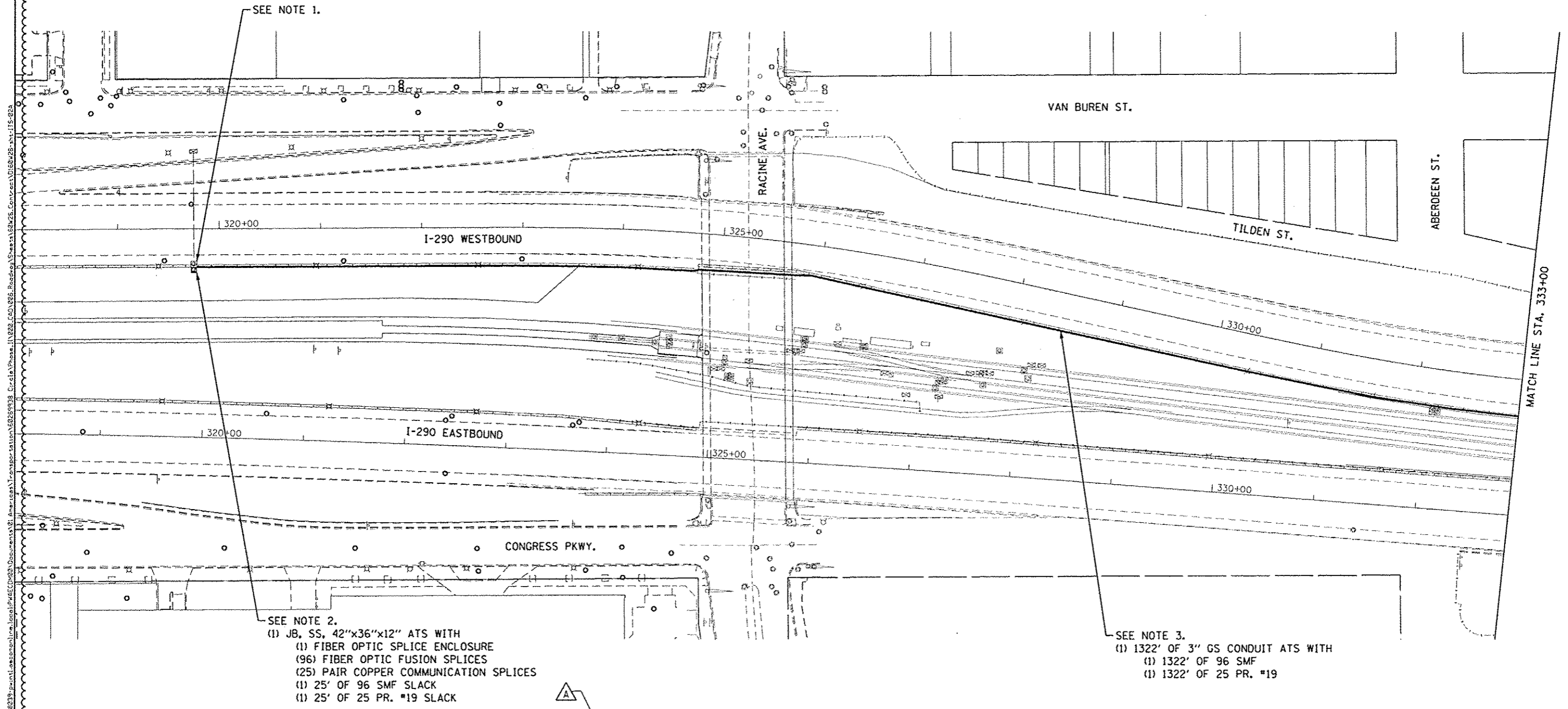
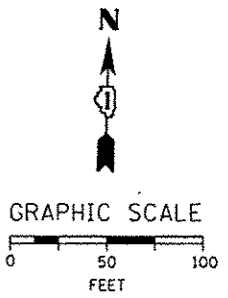
2. PULL EXISTING CABLES THROUGH THE BACK OF THE EXISTING JUNCTION BOX. SPLICE EXISTING AND PROPOSED 96 SMF AND 25 PR. #19 IN PROPOSED JUNCTION BOX ON CTA SIDE OF MEDIAN BARRIER. COIL 25 FT. MINIMUM OF SLACK OF EACH COMMUNICATION CABLE IN THE JUNCTION BOX.

3. ATTACH CONDUIT TO THE CTA SIDE OF THE MEDIAN BARRIER, THE PIERS, OR RETAINING WALLS, AS NECESSARY. UTILIZE SCREWS OR ANOTHER APPROPRIATE ATTACHMENT METHOD THAT WILL ALLOW FOR THE CONDUIT TO BE UNATTACHED AND REATTACHED TO THE STRUCTURE AS NEEDED TO FACILITATE PIER REMOVAL AND CONSTRUCTION.

4. ALL WORK REQUIRED TO MAINTAIN AND RELOCATE ITS INFRASTRUCTURE AS DEPICTED IN THESE PLANS OR OTHERWISE NECESSARY SHALL BE PAID FOR UNDER THE MAINTAINING AND RELOCATION OF ITS INFRASTRUCTURE DURING CONSTRUCTION PAY ITEM. SEE THE ASSOCIATED SPECIAL PROVISION FOR ADDITIONAL INFORMATION.

5. WORK OVER CTA TRACKS WILL REQUIRE A PROCESS PLAN AND FLAGGERS TO PROTECT THE WORK ZONE. CTA REQUESTS THE CONTRACTOR PROVIDE THIS INFORMATION AT LEAST 3 WEEKS PRIOR TO THE START OF WORK. WORK SHALL BE COORDINATED AND EXECUTED PER THE CTA FLAGGING AND COORDINATION SPECIAL PROVISION.

6. WORK SHALL NOT OBSTRUCT OR ALTER ANY CTA SIGNAGE OR EQUIPMENT WITHIN CTA RIGHT OF WAY.



SEE NOTE 1.

SEE NOTE 2.
 (1) JB, SS, 42"x36"x12" ATS WITH
 (1) FIBER OPTIC SPLICE ENCLOSURE
 (96) FIBER OPTIC FUSION SPLICES
 (25) PAIR COPPER COMMUNICATION SPLICES
 (1) 25' OF 96 SMF SLACK
 (1) 25' OF 25 PR. #19 SLACK

SEE NOTE 3.
 (1) 1322' OF 3" GS CONDUIT ATS WITH
 (1) 1322' OF 96 SMF
 (1) 1322' OF 25 PR. #19



DWG NO	0160W26-sh1-ITS-026
USER NAME	lacherj
PLOT SCALE	50.0000 1/ in.
PLOT DATE	10/15/2013

DESIGNED	JML	REVISED	10/15/2013
DRAWN	JML	REVISED	
CHECKED	WDS	REVISED	
DATE	9/15/13	REVISED	

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

ITS PLANS - HALSTED STREET AND HARRISON STREET ITS REROUTING	
SCALE: 1" = 50'	SHEET 2 OF 5 SHEETS STA. 318+00 TO STA. 333+00

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	247
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				

NOTES

1. ATTACH CONDUIT TO THE CTA SIDE OF THE MEDIAN BARRIER, THE PIERS, OR RETAINING WALLS, AS NECESSARY. UTILIZE SCREWS OR ANOTHER APPROPRIATE ATTACHMENT METHOD THAT WILL ALLOW FOR THE CONDUIT TO BE UNATTACHED AND REATTACHED TO THE STRUCTURE AS NEEDED TO FACILITATE PIER REMOVAL AND CONSTRUCTION.

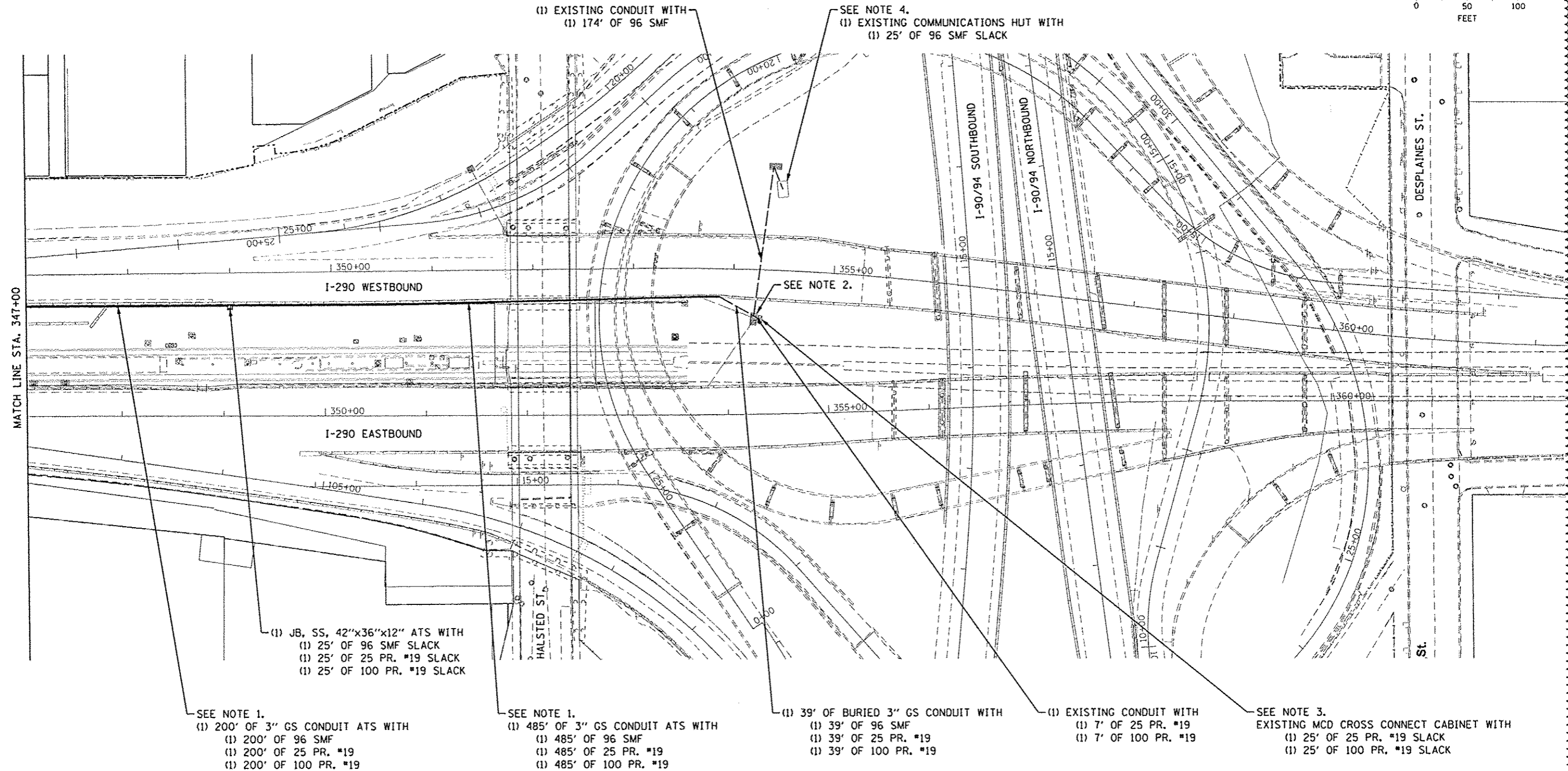
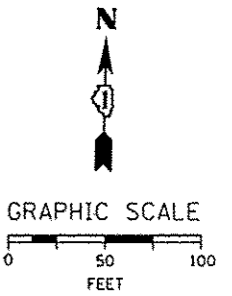
2. CONNECT NEW CONDUIT TO EXISTING HANDHOLE. PULL 25 PR. #19 AND 100 PR. #19 CABLES THROUGH EXISTING HANDHOLE AND CONDUIT TO THE MCD CROSS CONNECT CABINET. PULL 96 SMF THROUGH EXISTING HAND HOLE AND CONDUITS TO THE EXISTING COMMUNICATION HUT.

3. CONNECT 25 PR. #19 AND 100 PR. #19 TO EXISTING EQUIPMENT IN THE MCD CROSS CONNECT CABINET.

4. CONNECT 96 SMF TO EXISTING EQUIPMENT IN THE COMMUNICATION HUT.

5. ALL WORK REQUIRED TO MAINTAIN AND RELOCATE ITS INFRASTRUCTURE AS DEPICTED IN THESE PLANS OR OTHERWISE NECESSARY SHALL BE PAID FOR UNDER THE MAINTAINING AND RELOCATION OF ITS INFRASTRUCTURE DURING CONSTRUCTION PAY ITEM. SEE THE ASSOCIATED SPECIAL PROVISION FOR ADDITIONAL INFORMATION.

6. WORK SHALL NOT OBSTRUCT OR ALTER ANY CTA SIGNAGE OR EQUIPMENT WITHIN CTA RIGHT OF WAY.



SEE NOTE 1.
 (1) 200' OF 3" GS CONDUIT ATS WITH
 (1) 200' OF 96 SMF
 (1) 200' OF 25 PR. #19
 (1) 200' OF 100 PR. #19

(1) JB, SS, 42"x36"x12" ATS WITH
 (1) 25' OF 96 SMF SLACK
 (1) 25' OF 25 PR. #19 SLACK
 (1) 25' OF 100 PR. #19 SLACK

SEE NOTE 1.
 (1) 485' OF 3" GS CONDUIT ATS WITH
 (1) 485' OF 96 SMF
 (1) 485' OF 25 PR. #19
 (1) 485' OF 100 PR. #19

(1) EXISTING CONDUIT WITH
 (1) 174' OF 96 SMF

(1) 39' OF BURIED 3" GS CONDUIT WITH
 (1) 39' OF 96 SMF
 (1) 39' OF 25 PR. #19
 (1) 39' OF 100 PR. #19

SEE NOTE 4.
 (1) EXISTING COMMUNICATIONS HUT WITH
 (1) 25' OF 96 SMF SLACK

(1) EXISTING CONDUIT WITH
 (1) 7' OF 25 PR. #19
 (1) 7' OF 100 PR. #19

SEE NOTE 3.
 EXISTING MCD CROSS CONNECT CABINET WITH
 (1) 25' OF 25 PR. #19 SLACK
 (1) 25' OF 100 PR. #19 SLACK

FILE PATH: c:\p\1288203\main\aeconline\load\p\45500000\Documents\2013\Illinois\Transportation\6269938_CirclePhase\11\2013_CAD\206_Roadway\Sheets\6269938.ctb



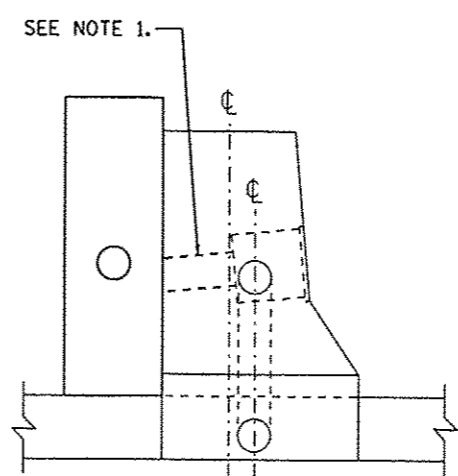
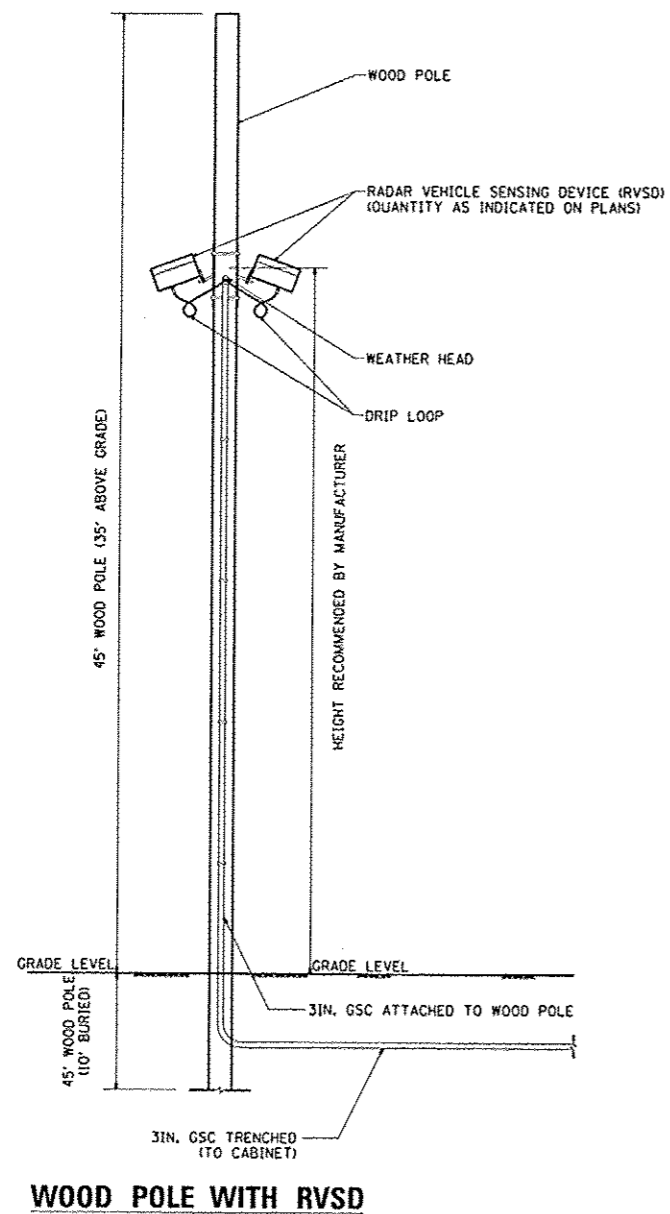
DIGEST: 6269938-11-115-02C	DESIGNED - JML	REVISED - 10/15/2013
USER NAME: jacob.j	DRAWN - JML	REVISED -
PLOT SCALE: 50:8488 1" = 100'	CHECKED - WDS	REVISED -
PLOT DATE: 10/15/2013	DATE - 9/15/13	REVISED -

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

ITS PLANS - HALSTED STREET AND HARRISON STREET
 ITS REROUTING

SCALE: 1" = 50' SHEET 2B OF 5 SHEETS STA. 347+00 TO STA. 362+41

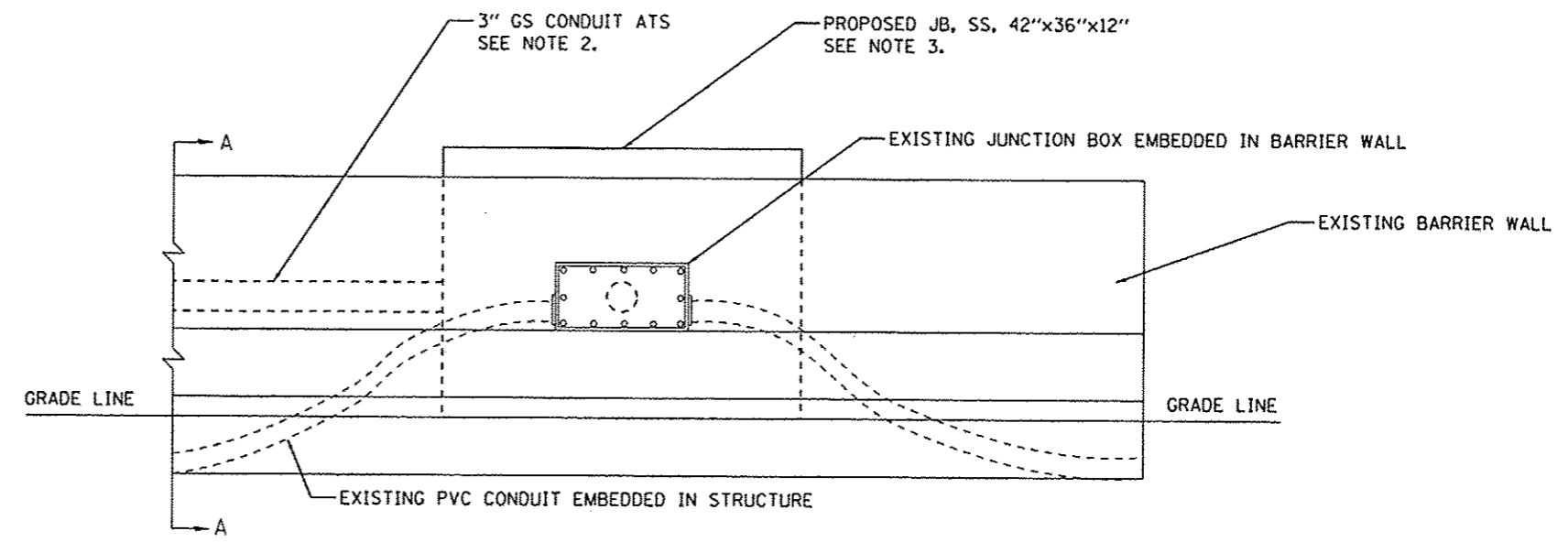
P.A.I. RTE. 90/94/290	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 247B
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



NOTES

1. DRILL THROUGH THE MEDIAN BARRIER AND BACK OF THE EXISTING JUNCTION BOX TO ACCESS THE COMMUNICATION CABLES FOR REROUTING. MAINTAIN A WATER TIGHT SEAL.
2. ATTACH CONDUIT TO THE CTA SIDE OF THE MEDIAN BARRIER, THE PIERS, OR RETAINING WALLS, AS NECESSARY. UTILIZE SCREWS OR ANOTHER APPROPRIATE ATTACHMENT METHOD THAT WILL ALLOW FOR THE CONDUIT TO BE UNATTACHED AND REATTACHED TO THE STRUCTURE, AS NEEDED, TO FACILITATE PIER REMOVAL AND RECONSTRUCTION.
3. PROPOSED JUNCTION BOX TO STORE 25' OF SLACK FOR EACH ITS COMMUNICATION CABLE.

SECTION A-A



ELEVATION

ACCESS TO JUNCTION BOX EMBEDDED IN BARRIER WALL FOR ITS ROUTING

FILE PATH = P:\11\2013\115-85\115-85.dwg
 PLOT SCALE = 5.0000 1/16"
 PLOT DATE = 10/15/2013
 PROJECT = 115-85
 SHEET = 5 OF 5
 CONTRACT NO. 60W26



016R26-115-85	DESIGNED - JML	REVISED - 10/15/2013
USER NAME = lacherj	DRAWN - JML	REVISED -
PLOT SCALE = 5.0000 1/16"	CHECKED - WDS	REVISED -
PLOT DATE = 10/15/2013	DATE - 9/15/13	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

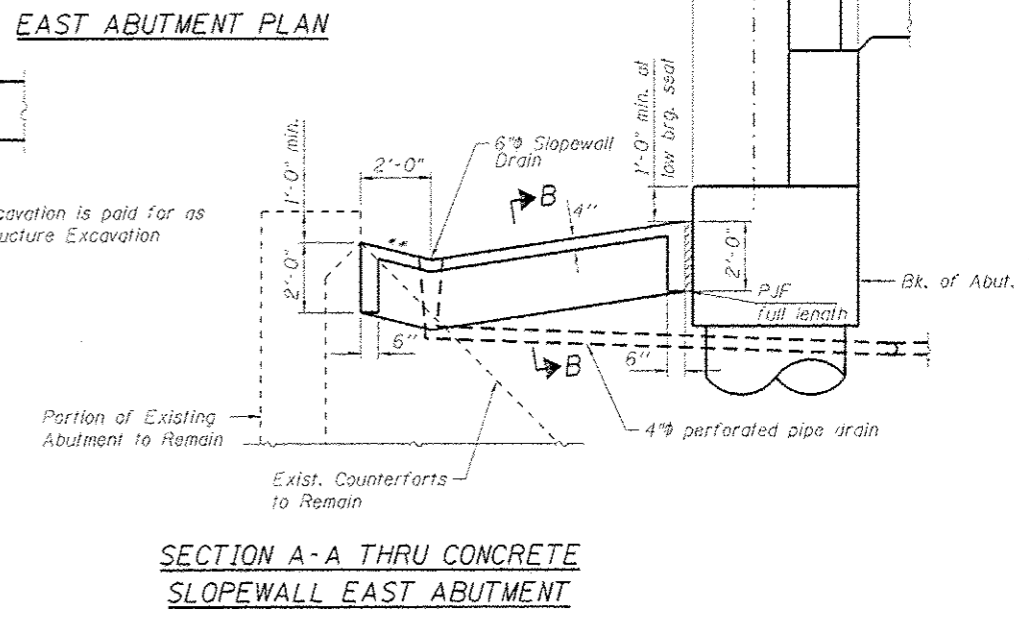
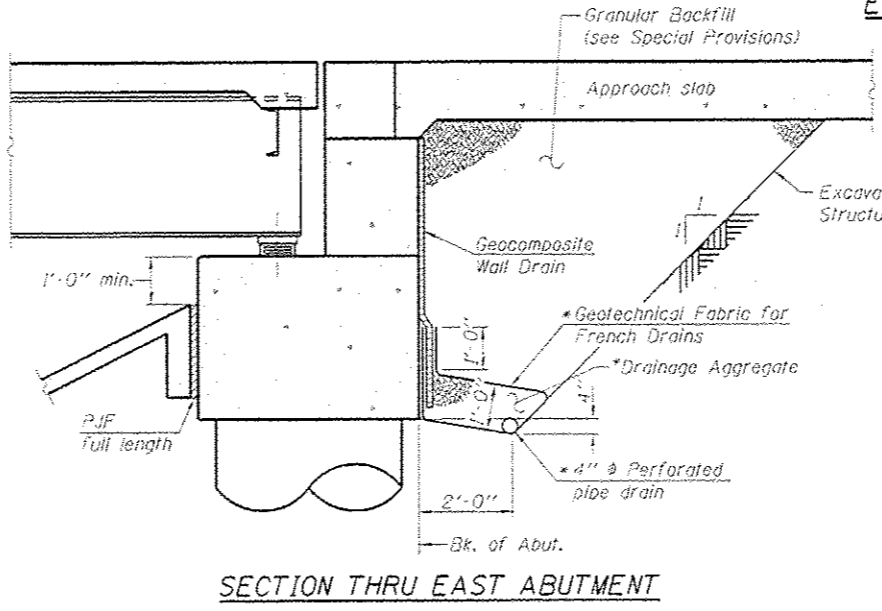
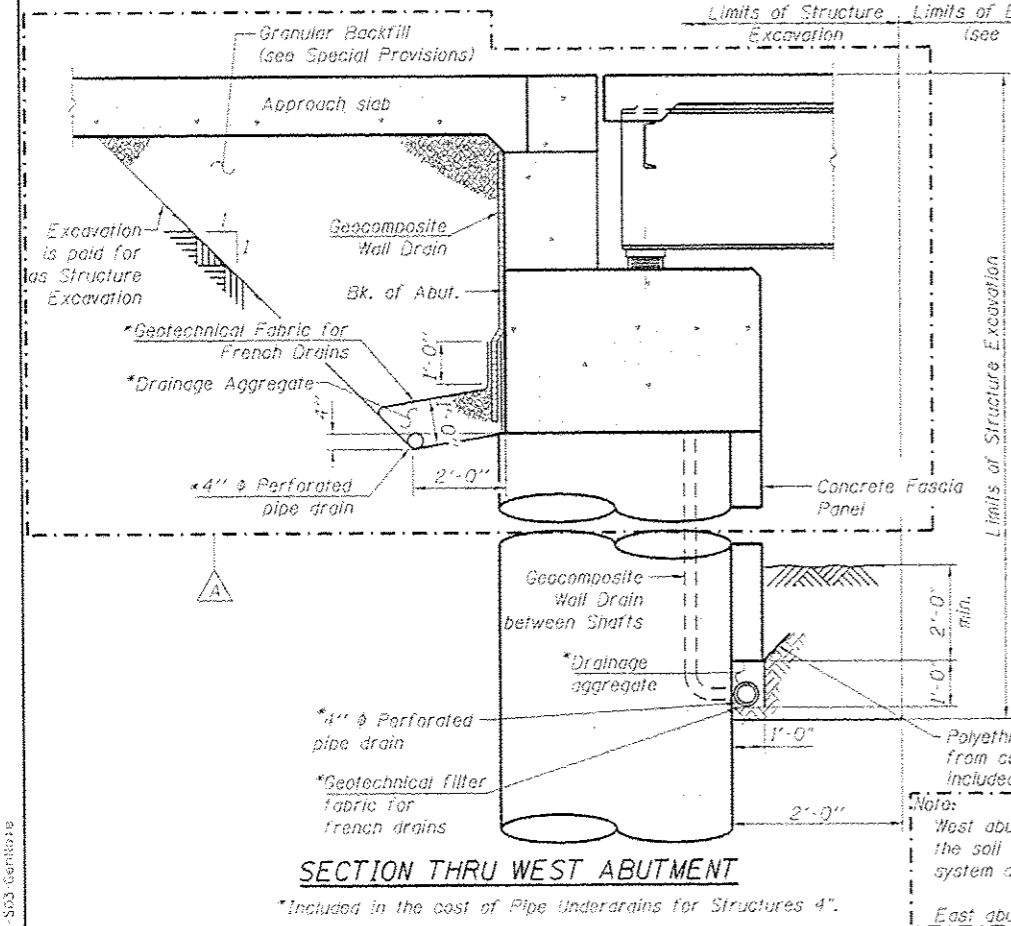
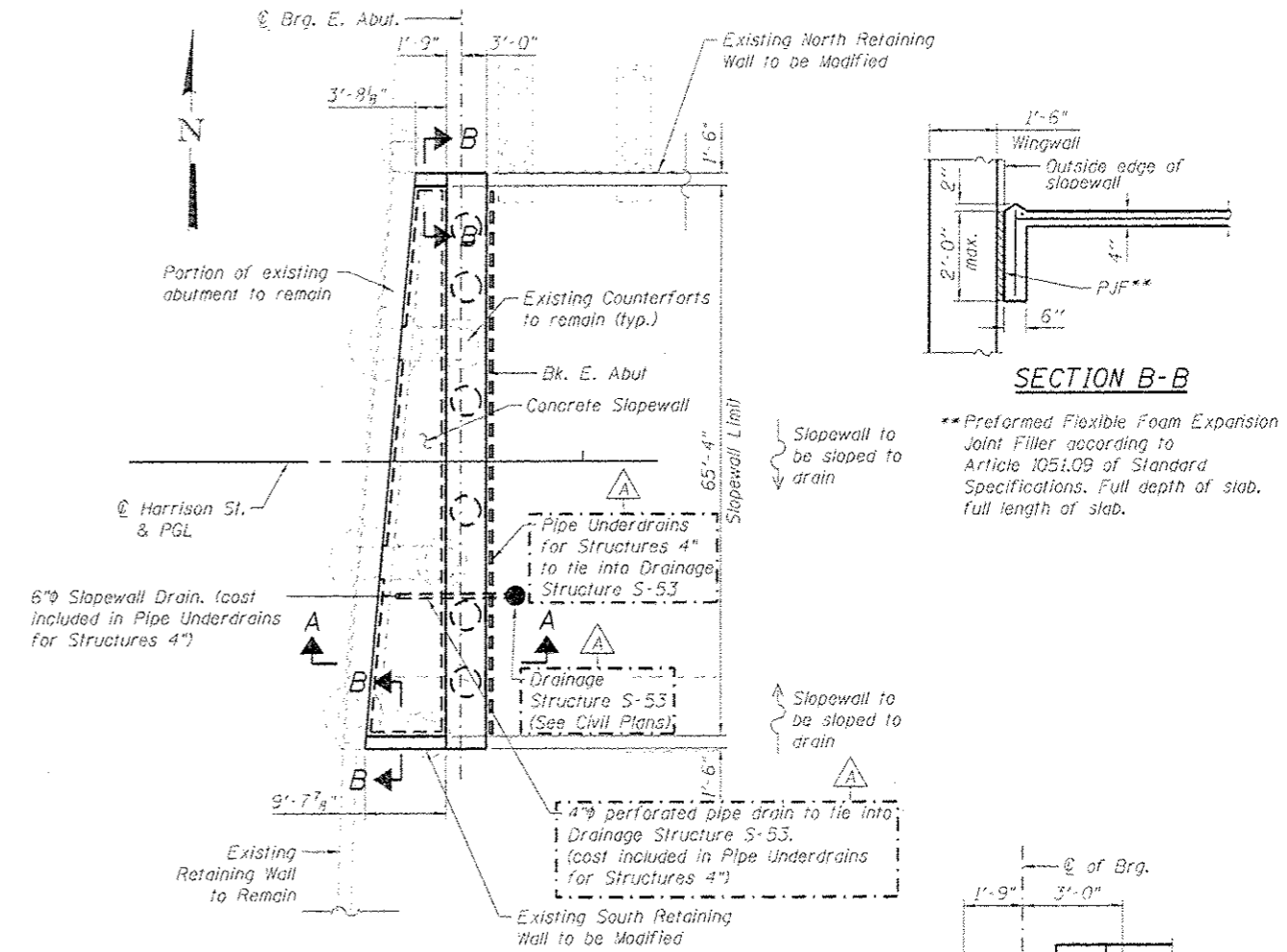
HALSTED STREET AND HARRISON STREET - ITS PLANS
ITS DETAILS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	250
CONTRACT NO. 60W26				
ILLINOIS FED. AID PROJECT				

SCALE: NO SCALE SHEET 5 OF 5 SHEETS STA. TO STA.

TOTAL BILL OF MATERIALS

DESCRIPTION	UNIT	S.N. 016-1713		TOTAL
		SUPER	SUB	
GRANULAR BACKFILL FOR STRUCTURES	CU. YD.		381	381
REMOVAL OF EXISTING STRUCTURES, NO. 1	EACH	1		1
PROTECTIVE SHIELD	SQ. YD.	1431		1431
STRUCTURE EXCAVATION	CU. YD.		1529	1529
CONCRETE STRUCTURES	CU. YD.		426	426
CONCRETE SUPERSTRUCTURE	CU. YD.	1076		1076
BRIDGE DECK GROOVING	SQ. YD.	1643		1643
FORMLINER TEXTURED SURFACE	SQ. FT.		1244	1244
PROTECTIVE COAT	SQ. YD.	3079		3079
FURNISHING AND ERECTING STRUCTURAL STEEL	L. SUM	0.51		0.51
STUD SHEAR CONNECTORS	EACH	8622		8622
REINFORCEMENT BARS	POUND		566610	566610
REINFORCEMENT BARS, EPOXY COATED	POUND	194730	111930	306660
BAR SPLICERS	EACH	144		144
MECHANICAL SPLICERS	EACH		456	456
SLOPE WALL 4 INCH	SQ. YD.		50	50
NAME PLATES	EACH	1		1
PERMANENT CASING	FOOT		460	460
DRILLED SHAFT IN SOIL	CU. YD.		1403	1403
DRILLED SHAFT IN ROCK	CU. YD.		12	12
PREFORMED JOINT STRIP SEAL	FOOT	143		143
ELASTOMERIC BEARING ASSEMBLY, TYPE 1	EACH	24		24
ANCHOR BOLTS, 1 1/4"	EACH	48		48
ANCHOR BOLTS, 1 1/2"	EACH	24		24
CONCRETE SEALER	SQ. FT.		7472	7472
EPOXY CRACK INJECTION	FOOT		14	14
GEOCOMPOSITE WALL DRAIN	SQ. YD.		139	139
CHAIN LINK FENCE, 4"	FOOT		99	99
STRUCTURAL REPAIR OF CONCRETE (Depth equal or less than 5")	SQ. FT.		154	154
PIPE UNDERDRAINS FOR STRUCTURES 4"	FOOT		276	276
CLASS SI CONCRETE MISCELLANEOUS	CU. YD.		41	41
DECORATIVE RAILING (PARAPET MOUNTED)	FOOT	620		620
SOIL RETENTION SYSTEM	SQ. FT.		2297	2297
TEMPORARY SOIL RETENTION SYSTEM	SQ. FT.		2828	2828
CROSSHOLE SONIC LOGGING	EACH		3	3

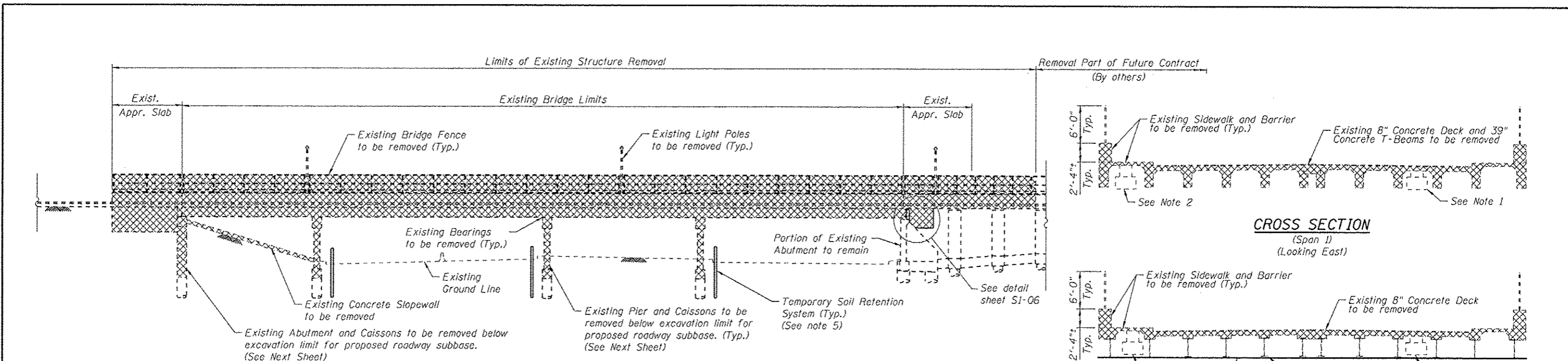


- NOTES:**
- Slope wall shall be reinforced with welded wire fabric, 6 in. x 6 in. - W4.0 x W4.0, weighing 58 lbs. per 100 sq. ft. Cost included in Slope Wall 4 Inch pay item.
 - Work this sheet with sheets S1-38 and S1-39.
- ** 1/4" (V.H)

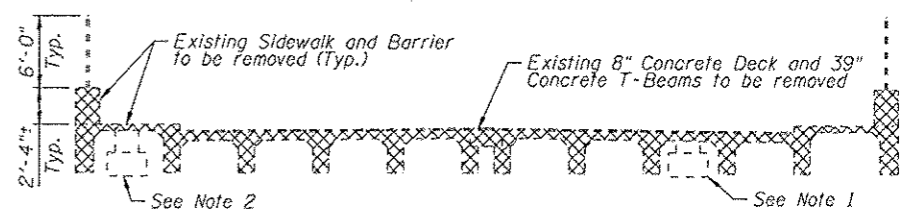
*Included in the cost of Pipe Underdrains for Structures 4".

Note:
West abutment drainage system components under the concrete fascia panel along the EB Taylor Exit shall extend to the soil retention system to the south and tie into the retaining wall (SN 016-1802) underdrain to the north. The drainage system components behind the abutment shall extend the full width of the abutment and tie into Drainage Structure S-56A.
East abutment drainage system components shall extend the full width of the abutment and tie to drainage structure S-53.

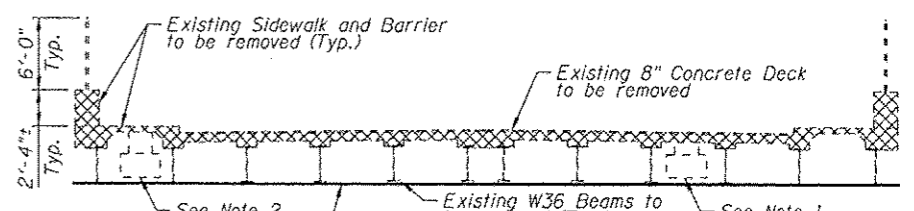
S161713-60W26-S53-GenIssue



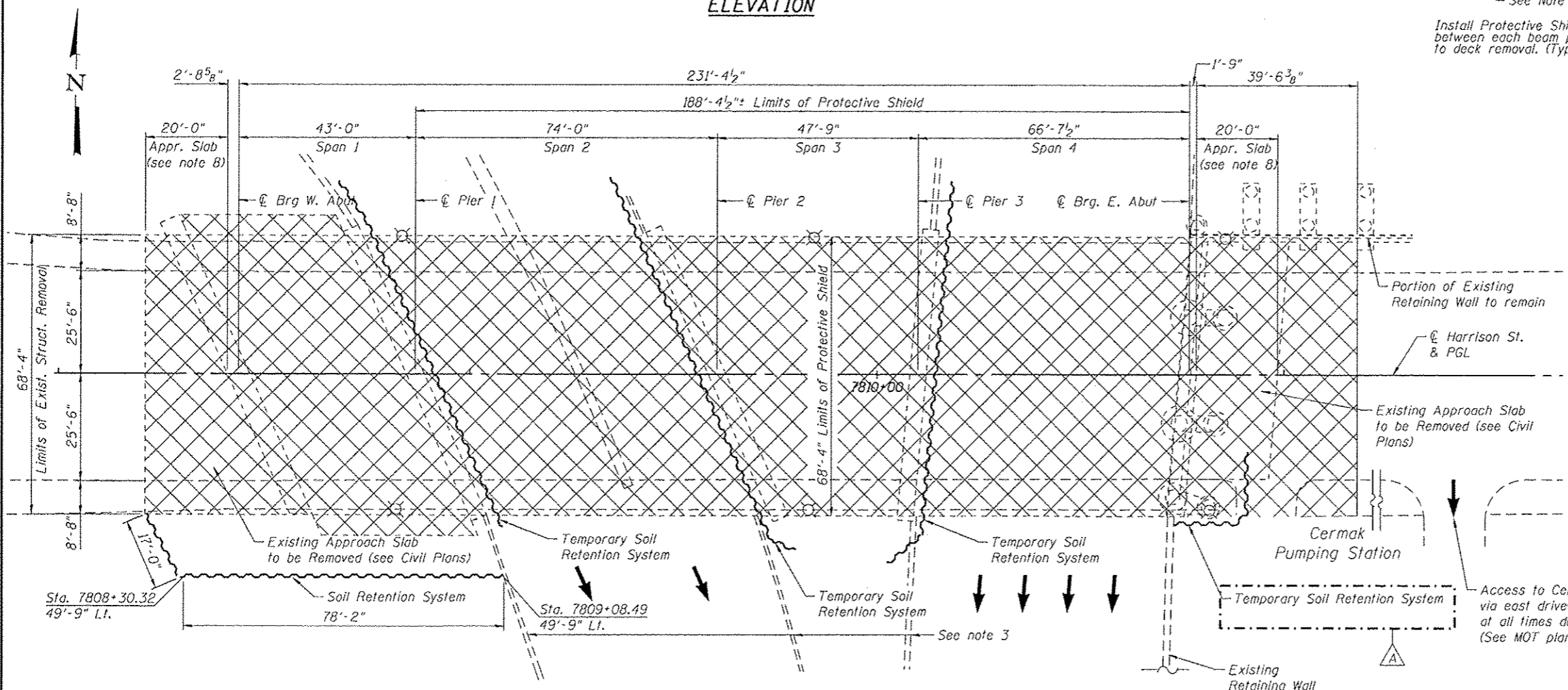
ELEVATION



CROSS SECTION
(Span 1)
(Looking East)



CROSS SECTION
(Spans 2 thru 4)
(Looking East)

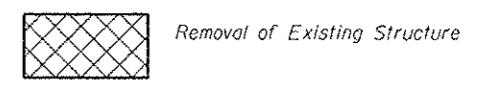


PLAN

NOTES:

- Existing Utility between girders to be relocated (By Others) prior to bridge demolition. Utility to be placed back on proposed bridge (By Others).
- Existing Utility to be removed and replaced as part of this contract. (See Electrical Plans for details)
- See Civil Plans for roadway barrier removal under the structure, along ramps and I-90/94.
- Work this sheet with sheets S1-05 and S1-06.
- For Temporary Soil Retention and Soil Retention System limits see sheet S1-07.
- Reference sheets AS-1 thru AS-62 for existing bridge dimensions and details.
- The Contractor shall take precautions to protect existing utilities and foundations during construction of the bridge. The utilities were located based on SUE and utility supplier information available at design.
- The approach slab removal will be included in civil pay item "Pavement Removal", see Civil Plans for details.

LEGEND:



0161713-60W26-S04-Removal



USER NAME - krltzm	DESIGNED - EJO	REVISED - 10/15/2013 EJO, BRD
PLLOT SCALE - N.T.S.	CHECKED - ATB	REVISED
PLLOT DATE - 9/15/2013	DRAWN - MRK	REVISED
	CHECKED - EJO	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

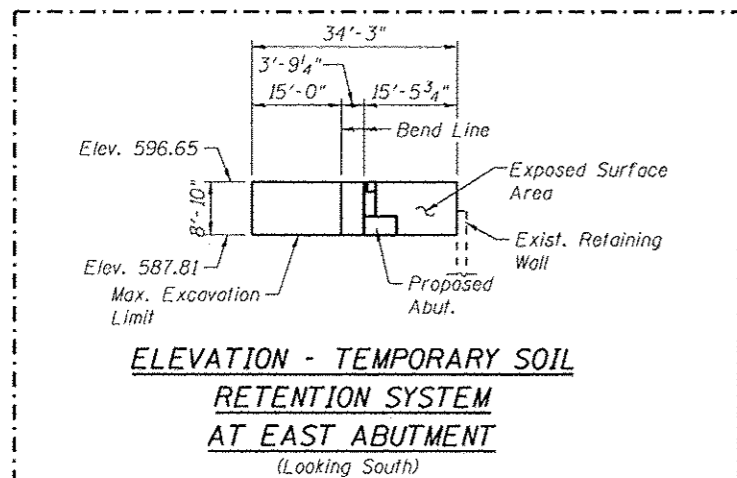
EXISTING STRUCTURAL REMOVAL (1 OF 3)
STRUCTURE NO. 016-1713

SHEET NO. S1-04 OF S1-48 SHEETS

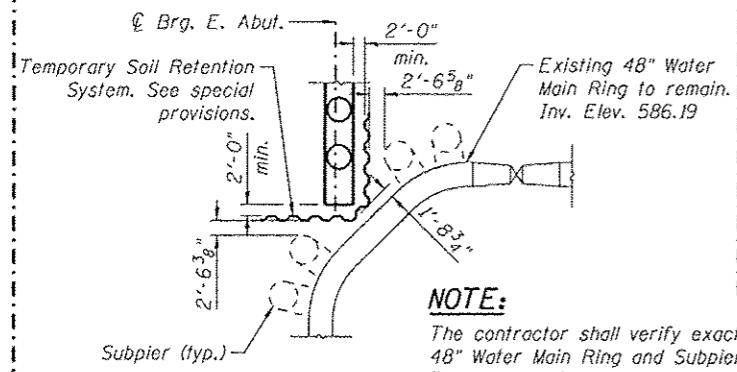
F.A.I. RTE. 90/94/290	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 254
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

NOTES:

1. Work this sheet with sheets S1-04 and S1-05.
2. V.I.F. Indicates Verify in Field.
3. A cantilever sheet piling design does not appear feasible and additional members or other retention systems may be necessary. The Contractor shall submit a temporary soil retention system design including plan details and calculations for review and acceptance by the Engineer.

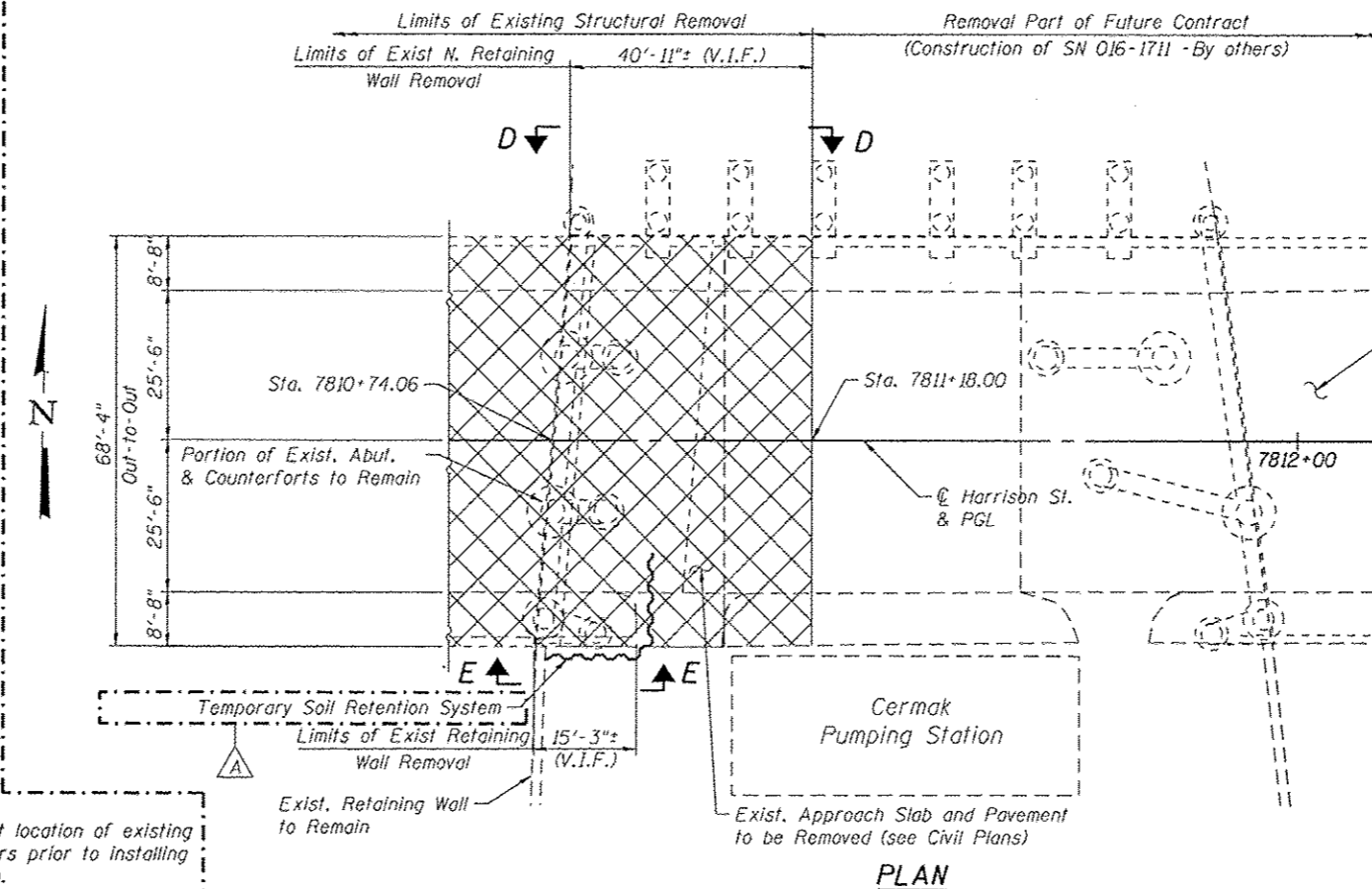


ELEVATION - TEMPORARY SOIL RETENTION SYSTEM AT EAST ABUTMENT (Looking South)



PLAN - TEMPORARY SOIL RETENTION SYSTEM AT EAST ABUTMENT

NOTE:
The contractor shall verify exact location of existing 48" Water Main Ring and Subpiers prior to installing Temporary Soil Retention System.

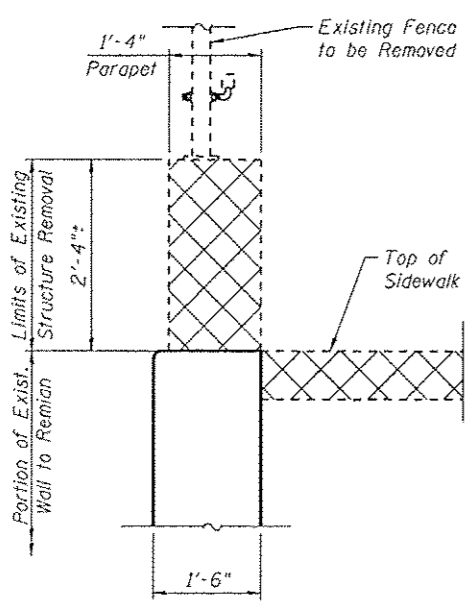


PLAN

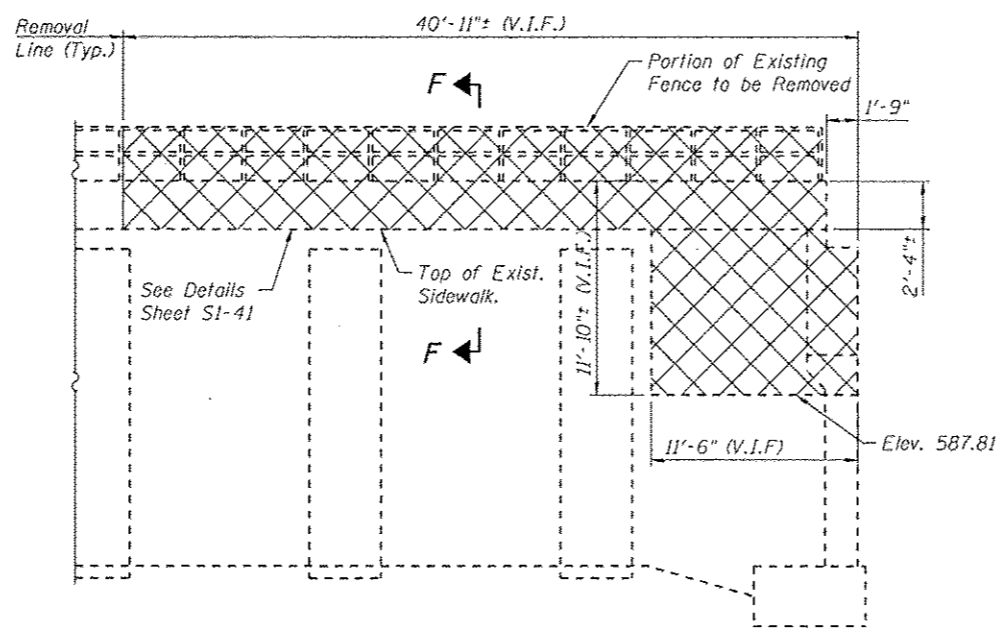
BILL OF MATERIAL

Item	Unit	Total
Removal of Existing Structures, No. 1	Each	1
Protective Shield	Sq. Yd.	1431

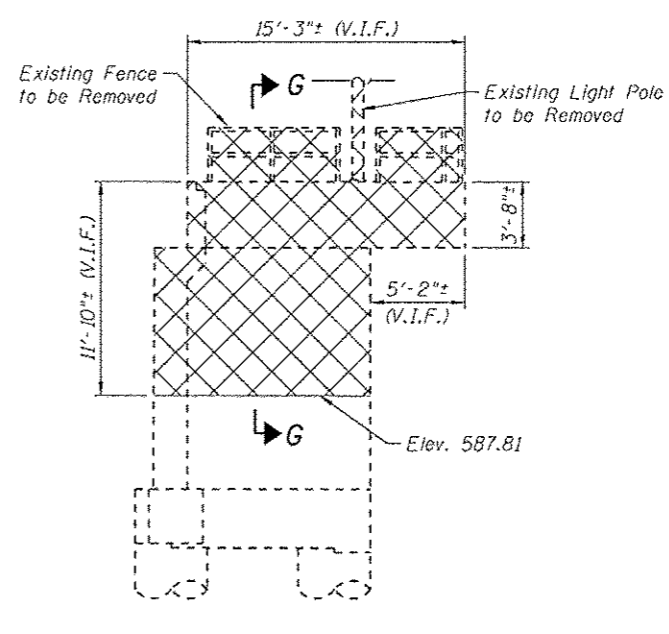
LEGEND:
 Removal of Existing Structure



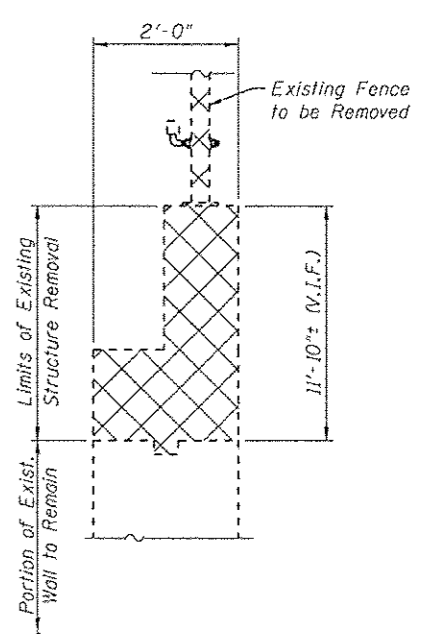
SECTION F-F



SECTION D-D



SECTION E-E



SECTION G-G

016173-60N26-506-Removal

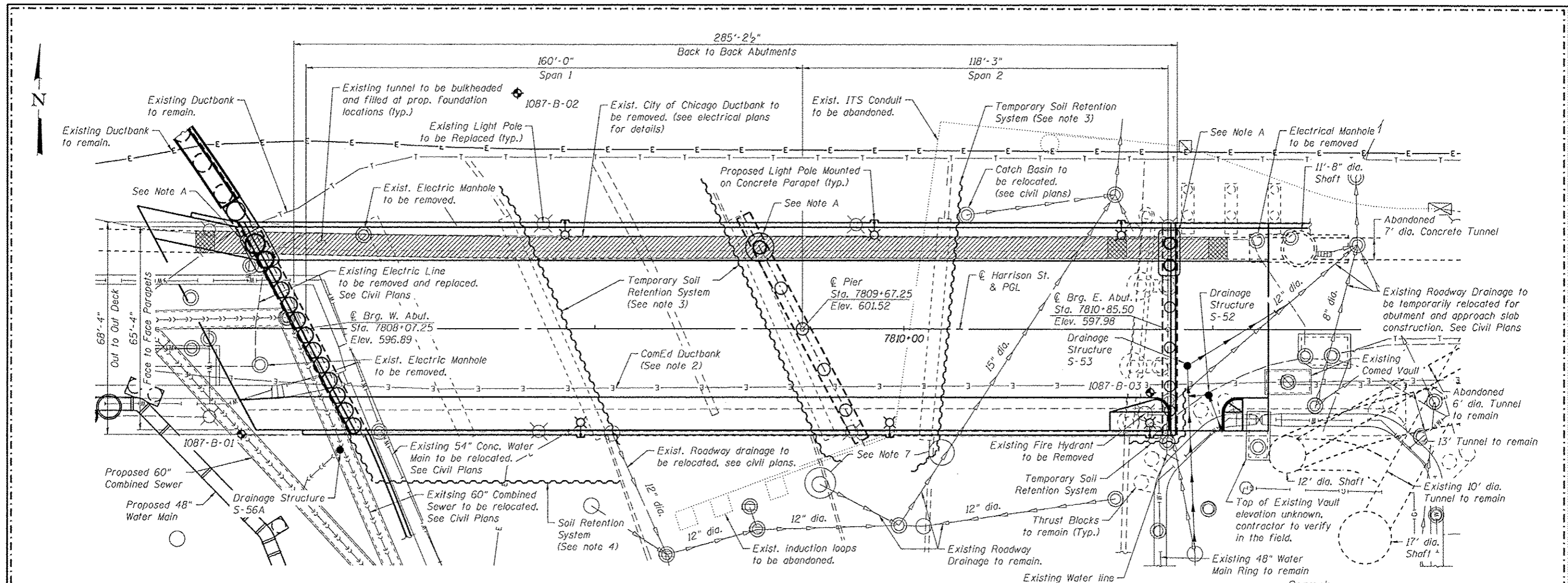


USER NAME = krltzm	DESIGNED - EJO	REVISED 10/15/2013 EJO, BRD
PLLOT SCALE = N.T.S.	CHECKED - ATB	REVISED
PLLOT DATE = 9/15/2013	DRAWN - MRK	REVISED
	CHECKED - EJO	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EXISTING STRUCTURAL REMOVAL (3 OF 3)
STRUCTURE NO. 016-1713
SHEET NO. S1-06 OF S1-48 SHEETS

F.A.I. RTE. 90/94/290	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 256
CONTRACT NO. 60W26				ILLINOIS FED. AID PROJECT



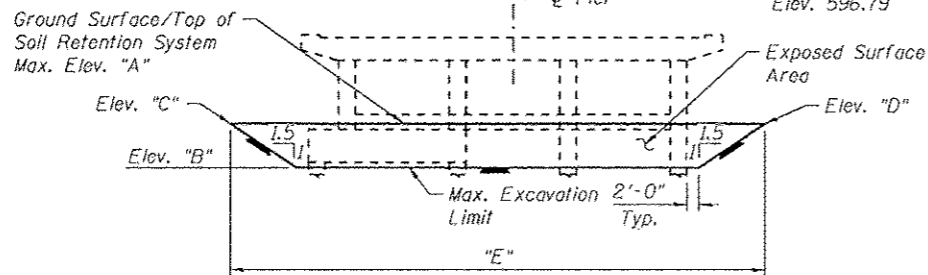
SUBSTRUCTURE LAYOUT PLAN

NOTE A:

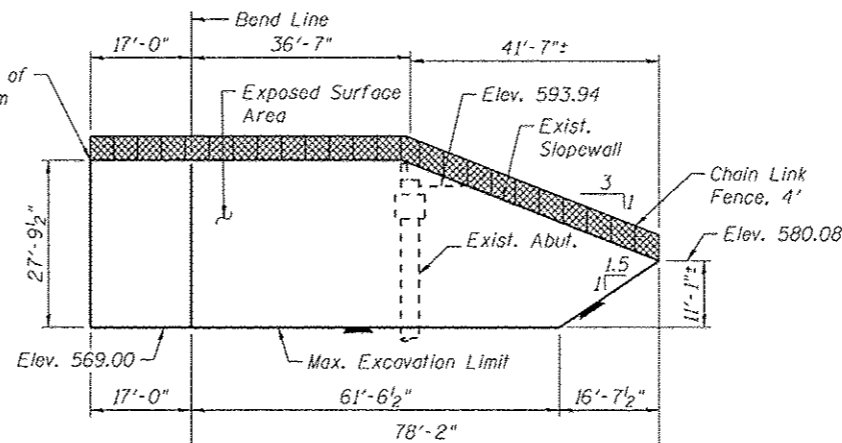
The Drilled Shafts to be installed thru Existing Abandoned Tunnel require Permanent Casing, (see substructure sheets for details). (Drilling thru tunnel included in pay item Drilled Shaft In Soil. See Note B.)

LEGEND:

- Combined Sewer
- Electric
- Fiber Optic
- Telephone
- Storm Sewer
- Water Line
- Fire Hydrant
- Light Pole
- Soil Boring
- Bulkhead
- Area filled with Grout



ELEVATION - TEMPORARY SOIL RETENTION SYSTEM AT EXISTING PIERS
(Looking West)
(See Note 5)



ELEVATION - SOIL RETENTION SYSTEM AT WEST ABUTMENT
(Looking North)
(See Note 5)

NOTES:

1. Bulkhead and area to be filled with grout shall be complete prior to construction of SN 016-1713 as part of advanced contract (By Others).
2. Existing Utility between girders to be relocated (By Others) prior to bridge demolition. Utility to be placed back on proposed bridge (By Others).
3. Temporary Soil Retention System required for existing pier removal. See sheets S1-04 thru S1-06.
4. Soil Retention System to be left in place. Required for proposed abutment construction. To be removed in future contract (By Others).
5. A cantilever sheet piling design does not appear feasible and additional members or other retention systems may be necessary. The Contractor shall submit a temporary soil retention system and soil retention system design including plan details and calculations for review and acceptance by the Engineer.
6. The Contractor shall take precautions to protect existing utilities and foundations during construction of the bridge. The utilities were located based on SUE and utility supplier information available at design.
7. Temporary soil retention system to avoid existing roadway drainage.
8. Contractor shall provide equipment, labor, and materials as required to install drilled shafts thru existing abandoned tunnel at locations shown. The costs incurred by installation thru tunnel shall not be measured separately but shall be included in the respective Drilled Shaft pay item.

BILL OF MATERIAL

Item	Unit	Total
Temporary Soil Retention System	Sq. Ft.	2828
Soil Retention System	Sq. Ft.	2297
Chain Link Fence, 4'	Foot	99

Location	Elev. "A"	Elev. "B"	Elev. "C"	Elev. "D"	Length "E"
Pier 1	577.33	570.69	577.17	577.33	96'-6"
Pier 2	581.46	571.69	580.96	581.46	105'-5"
Pier 3	580.29	571.18	577.88	579.94	93'-9"



USER NAME: krltzm
DESIGNED: EJO
CHECKED: ATB
DRAWN: BRD
PLOT DATE: 9/15/2013

DESIGNED: EJO
CHECKED: ATB
DRAWN: BRD
CHECKED: EJO

REVISED: 10/15/2013 EJO, BRD
REVISED: BRD
REVISED: EJO

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUBSTRUCTURE LAYOUT
STRUCTURE NO. 016-1713

SHEET NO. S1-07 OF S1-48 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	257

CONTRACT NO. 60W26
ILLINOIS FED. AID PROJECT

0161713-60W26-S07-Substructure

PROFILE GRADE LINE
CENTERLINE OF ROADWAY

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. W. Abut.	7808+03.3	0	596.74	596.74
☉Brg. W. Abut.	7808+07.25	0	596.89	596.89
A	7808+17.25	0	597.28	597.36
B	7808+27.25	0	597.67	597.81
C	7808+37.25	0	598.06	598.26
D	7808+47.25	0	598.45	598.70
E	7808+57.25	0	598.84	599.13
F	7808+67.25	0	599.23	599.54
G	7808+77.25	0	599.62	599.94
H	7808+87.25	0	600.01	600.32
I	7808+97.25	0	600.40	600.69
J	7809+07.25	0	600.78	601.03
K	7809+17.25	0	601.09	601.30
L	7809+27.25	0	601.32	601.49
M	7809+37.25	0	601.48	601.60
N	7809+47.25	0	601.57	601.64
O	7809+57.25	0	601.58	601.61
☉ Pier	7809+67.25	0	601.52	601.52
P	7809+77.25	0	601.38	601.36
Q	7809+87.25	0	601.17	601.15
R	7809+97.25	0	600.89	600.88
S	7810+07.25	0	600.54	600.54
T	7810+17.25	0	600.19	600.20
U	7810+27.25	0	599.84	599.86
V	7810+37.25	0	599.49	599.51
W	7810+47.25	0	599.14	599.17
X	7810+57.25	0	598.79	598.82
Y	7810+67.25	0	598.45	598.47
Z	7810+77.25	0	598.17	598.18
☉ Brg. E. Abut.	7810+85.50	0	597.98	597.98
Bk. E. Abut.	7810+88.50	0	597.92	597.92

GIRDER 7

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. W. Abut.	7808+01.77	-2.875	596.64	596.64
☉Brg. W. Abut.	7808+05.72	-2.875	596.79	596.79
A	7808+15.72	-2.875	597.18	597.25
B	7808+25.72	-2.875	597.57	597.71
C	7808+35.72	-2.875	597.96	598.16
D	7808+45.72	-2.875	598.35	598.59
E	7808+55.72	-2.875	598.74	599.02
F	7808+65.72	-2.875	599.13	599.43
G	7808+75.72	-2.875	599.52	599.83
H	7808+85.72	-2.875	599.91	600.21
I	7808+95.72	-2.875	600.30	600.58
J	7809+05.72	-2.875	600.69	600.94
K	7809+15.72	-2.875	601.01	601.22
L	7809+25.72	-2.875	601.25	601.41
M	7809+35.72	-2.875	601.42	601.53
N	7809+45.72	-2.875	601.52	601.58
O	7809+55.72	-2.875	601.54	601.56
☉ Pier	7809+65.72	-2.875	601.49	601.49
P	7809+75.72	-2.875	601.37	601.35
Q	7809+85.72	-2.875	601.17	601.15
R	7809+95.72	-2.875	600.89	600.87
S	7810+05.72	-2.875	600.55	600.55
T	7810+15.72	-2.875	600.20	600.21
U	7810+25.72	-2.875	599.85	599.87
V	7810+35.72	-2.875	599.50	599.53
W	7810+45.72	-2.875	599.15	599.18
X	7810+55.72	-2.875	598.80	598.83
Y	7810+65.72	-2.875	598.46	598.48
Z	7810+75.72	-2.875	598.17	598.18
☉ Brg. E. Abut.	7810+85.50	-2.875	597.94	597.94
Bk. E. Abut.	7810+88.50	-2.875	597.88	597.88

GIRDER 8

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. W. Abut.	7807+98.71	-8.625	596.43	596.43
☉Brg. W. Abut.	7808+02.66	-8.625	596.58	596.58
A	7808+12.66	-8.625	596.97	597.04
B	7808+22.66	-8.625	597.36	597.50
C	7808+32.66	-8.625	597.75	597.95
D	7808+42.66	-8.625	598.14	598.38
E	7808+52.66	-8.625	598.53	598.81
F	7808+62.66	-8.625	598.92	599.22
G	7808+72.66	-8.625	599.31	599.62
H	7808+82.66	-8.625	599.70	600.00
I	7808+92.66	-8.625	600.09	600.37
J	7809+02.66	-8.625	600.48	600.73
K	7809+12.66	-8.625	600.83	601.03
L	7809+22.66	-8.625	601.10	601.26
M	7809+32.66	-8.625	601.29	601.40
N	7809+42.66	-8.625	601.41	601.47
O	7809+52.66	-8.625	601.45	601.47
☉ Pier	7809+62.66	-8.625	601.43	601.43
P	7809+72.66	-8.625	601.32	601.30
Q	7809+82.66	-8.625	601.15	601.13
R	7809+92.66	-8.625	600.90	600.89
S	7810+02.66	-8.625	600.57	600.57
T	7810+12.66	-8.625	600.22	600.23
U	7810+22.66	-8.625	599.87	599.89
V	7810+32.66	-8.625	599.52	599.55
W	7810+42.66	-8.625	599.17	599.21
X	7810+52.66	-8.625	598.82	598.85
Y	7810+62.66	-8.625	598.47	598.50
Z	7810+72.66	-8.625	598.16	598.17
☉ Brg. E. Abut.	7810+85.50	-8.625	597.85	597.85
Bk. E. Abut.	7810+88.50	-8.625	597.79	597.79

0161713-e0kx6-s11-Top500



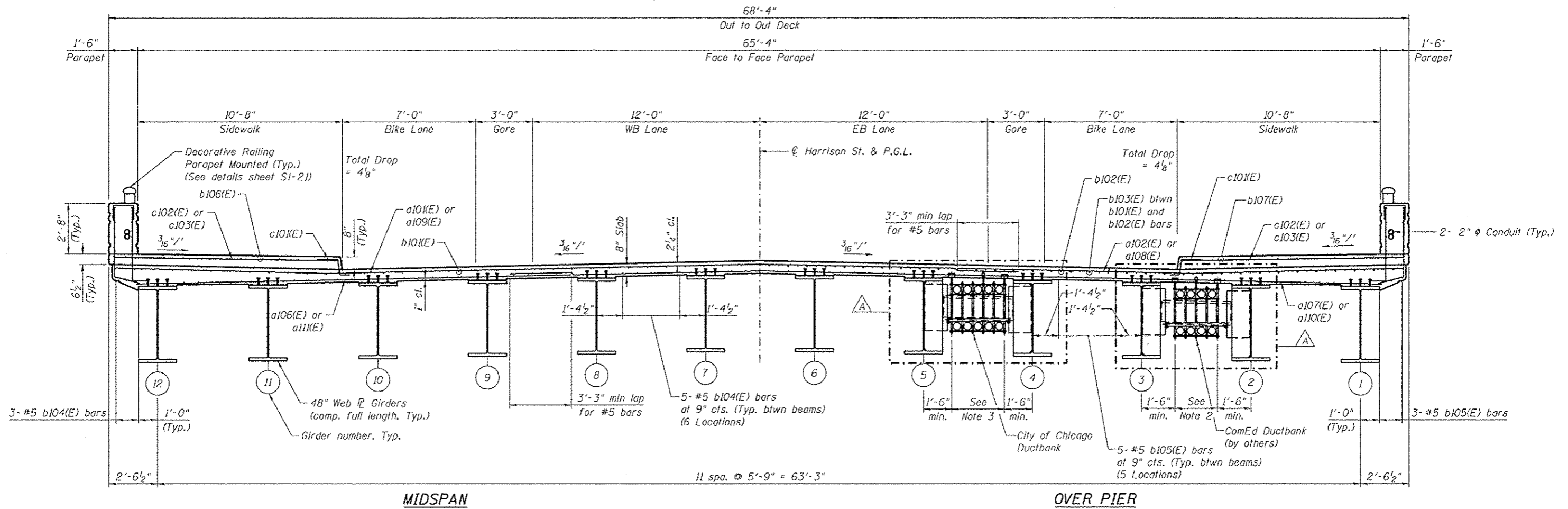
USER NAME : dunkorioyb	DESIGNED - EJO	REVISED
	CHECKED - ATB	REVISED
PLOT SCALE : N.T.S.	DRAWN - BRD	REVISED
PLOT DATE : 9/15/2013	CHECKED - EJO	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

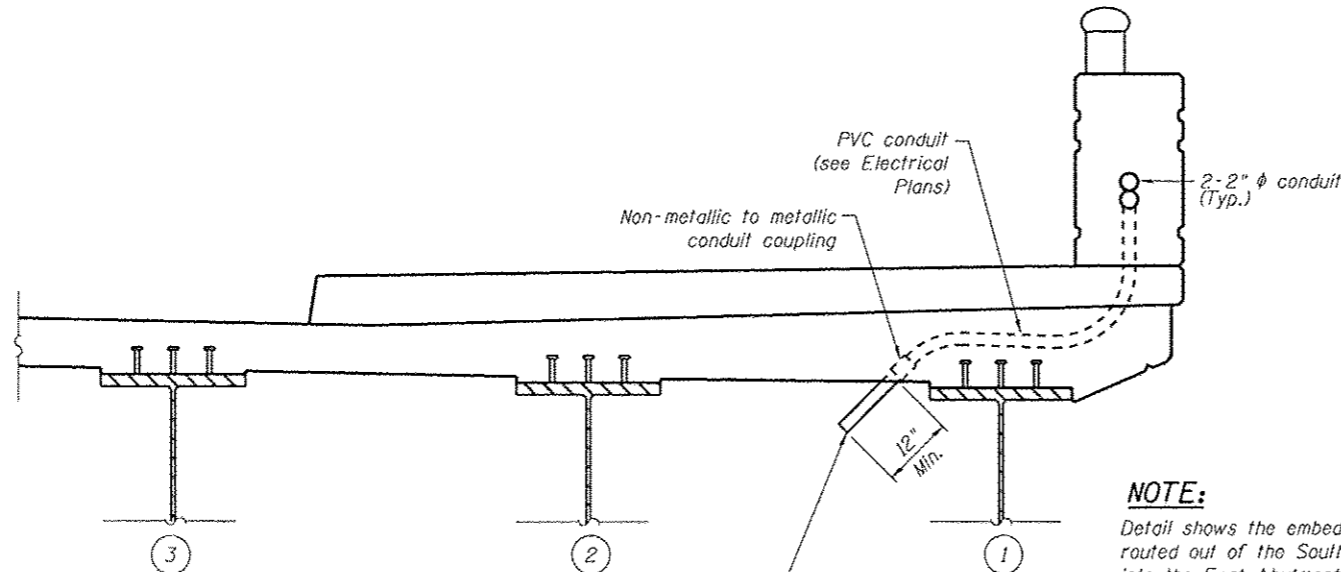
TOP OF SLAB ELEVATIONS - III
STRUCTURE NO. 016-1713

SHEET NO. S1-11 OF S1-48 SHEETS

F.A.I. RTE. : 90/94/290	SECTION : 2013-00BR	COUNTY : COOK	TOTAL SHEETS : 599	SHEET NO. : 261
CONTRACT NO. : 60W26			ILLINOIS FED. AID PROJECT	



DECK CROSS SECTION
(Looking East)



NOTE:

Detail shows the embedded conduits routed out of the South Parapet into the East Abutment. See sheet S1-19 for other locations of conduit embedded in parapet.

NOTES:

1. Work this sheet with sheet S1-16.
2. Proposed conduit support system is shown for information only on sheets 298A thru 298C. The concrete inserts will be provided to the Contractor by ComEd. The Contractor is responsible for placing inserts per layout details and ComEd direction. ComEd may elect to provide support to Contractor for final insert placement in advance of pouring concrete. There is no separate payment for the placement of inserts. The work involved in placing inserts is included within Concrete Superstructure.
3. Space inserts at 10'-0" cts max longitudinally, full length of bridge (see framing plans). Cost of inserts included in Concrete Superstructure. See electrical plans for conduit support and insert details.

0161713-60W26-S18-Deck



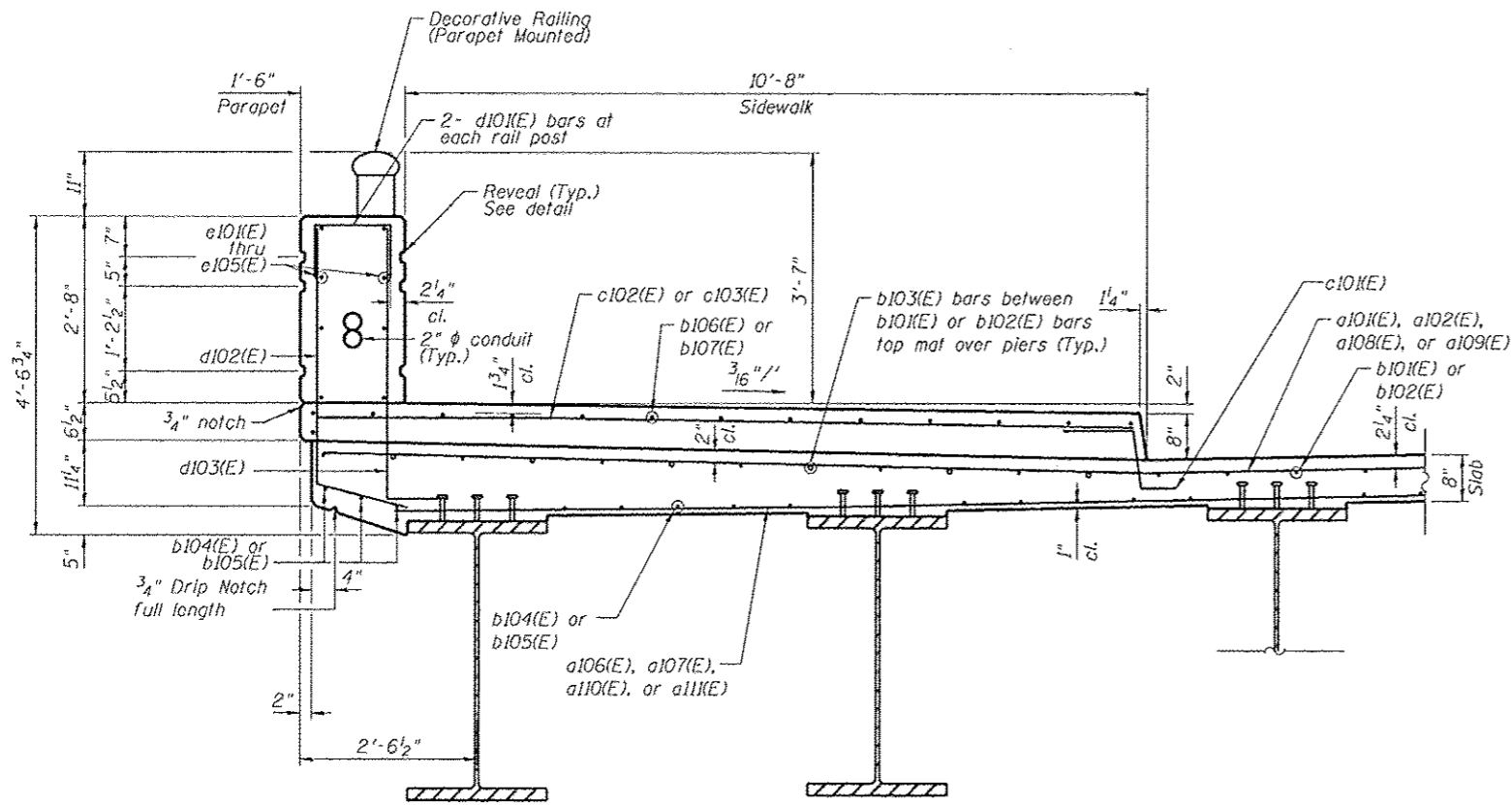
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PLOT SCALE = N.T.S.	CHECKED - ATB	REVISED
PLOT DATE = 9/15/2013	DRAWN - BRD	REVISED
	CHECKED - EJO	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

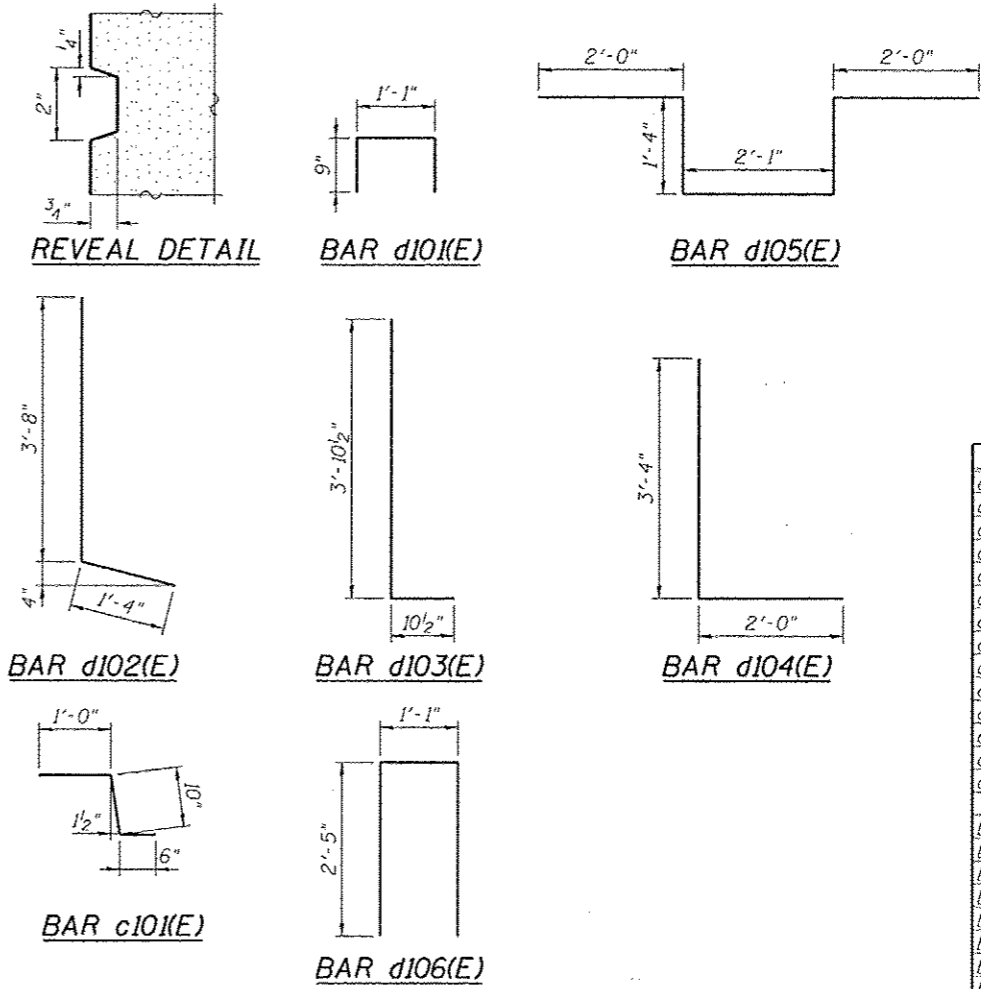
DECK CROSS SECTION
STRUCTURE NO. 016-1713

SHEET NO. S1-18 OF S1-48 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	268
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



SECTION THRU SIDEWALK
(Typ. both sidewalks)

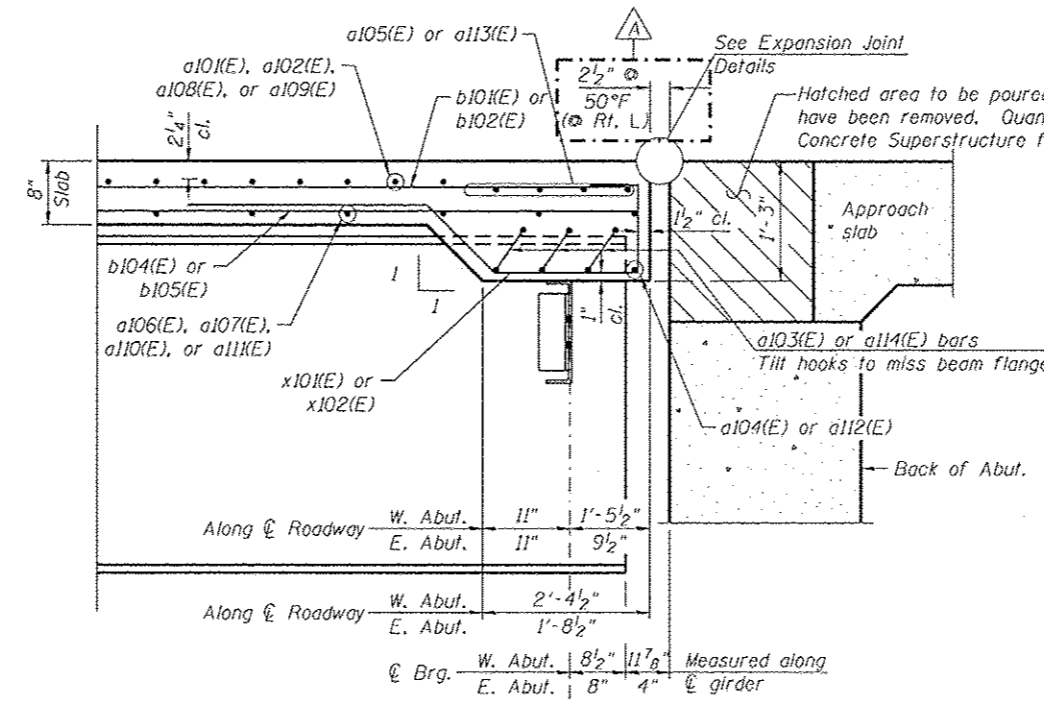
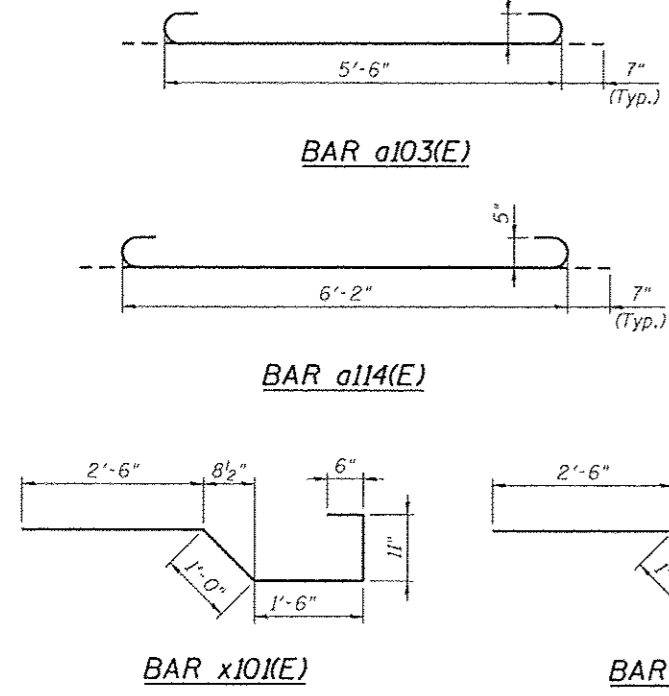


BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a101(E)	402	#5	47'-4"	—
a102(E)	390	#5	23'-7"	—
a103(E)	33	#5	6'-8"	—
a104(E)	3	#5	25'-11"	—
a105(E)	12	#5	27'-9"	—
a106(E)	343	#5	22'-5"	—
a107(E)	315	#5	46'-1"	—
a108(E)	6	#5	26'-2"	—
a109(E)	18	#5	49'-1"	—
a110(E)	14	#5	50'-7"	—
a111(E)	8	#5	24'-9"	—
a112(E)	3	#5	23'-2"	—
a113(E)	12	#5	24'-9"	—
a114(E)	33	#5	7'-4"	—
b101(E)	385	#5	30'-1"	—
b102(E)	374	#5	28'-5"	—
b103(E)	204	#6	26'-11"	—
b104(E)	396	#5	27'-10"	—
b105(E)	336	#5	26'-4"	—
b106(E)	154	#5	30'-1"	—
b107(E)	154	#5	26'-6"	—
b108(E)	3	#5	13'-2"	—
b109(E)	2	#5	8'-8"	—
c101(E)	551	#5	2'-4"	—
c102(E)	551	#5	11'-8"	—
c103(E)	14	#5	13'-5"	—
d101(E)	116	#4	2'-7"	—
d102(E)	614	#4	5'-0"	—
d103(E)	614	#6	4'-9"	—
d104(E)	18	#6	5'-4"	—
d105(E)	30	#6	8'-9"	—
d106(E)	4	#4	5'-11"	—
e101(E)	192	#4	19'-7"	—
e102(E)	8	#4	16'-10"	—
e103(E)	16	#4	11'-1"	—
e104(E)	8	#4	10'-6"	—
e105(E)	24	#4	9'-7"	—
e106(E)	4	#4	2'-2"	—
x101(E)	55	#5	6'-5"	—
x102(E)	55	#5	7'-1"	—
Reinforcement Bars, Epoxy Coated		Pound	136,350	
Concrete Superstructure		Cu. Yd.	818	
Bridge Deck Grooving		Sq. Yd.	1324	
Protective Coat		Sq. Yd.	2588	

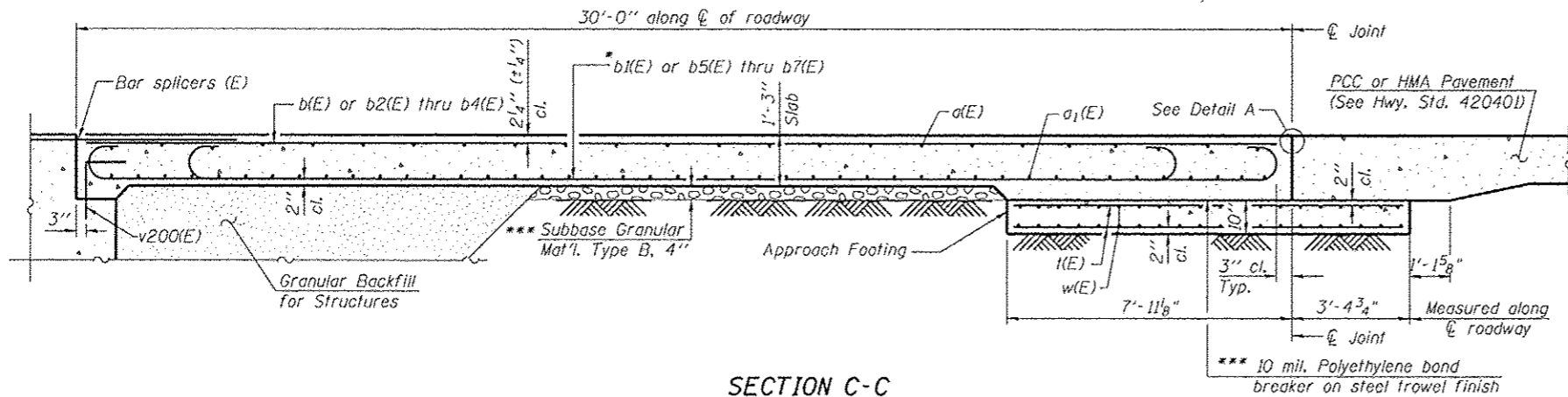
NOTES:

- Bars indicated thus: 4x3-#5 etc. indicates 4 lines of bars with 3 lengths per line.
- 1/2" clear cover unless noted otherwise.
- x102(E) bars are placed parallel to beams. a114(E), a104(E), and a105(E) bars are placed parallel to skew.
- See sheet SI-21 for Decorative Railing details.
- See sheet SI-27 for Expansion Joint details.



SECTION A-A AT EXPANSION JOINT
(Typ. both ends of deck)

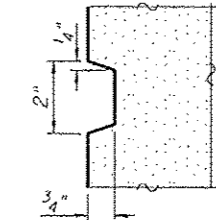
0161713-60W26-S20-Deck



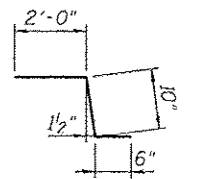
SECTION C-C

NOTES:

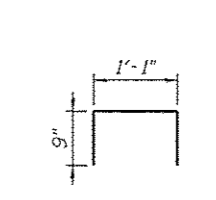
See sheet S1-23 of S1-48 for Detail A.
 Approach slab and parapet concrete shall be paid for as Concrete Superstructure.
 Approach footing concrete shall be paid for as Concrete Structures.
 Reinforcement shall be paid for as Reinforcement Bars, Epoxy Coated.
 For v200(E) bar details, see sheet S1-36.
 The approach footing maximum applied service bearing pressure (Q_{max}) = 2.0 ksf.
 Cost of excavation for approach footing included with Concrete Structures.
 For bar splicer details, see sheet S1-45.
 For Granular Backfill for Structures details, see sheet S1-03.



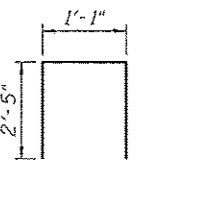
REVEAL DETAIL



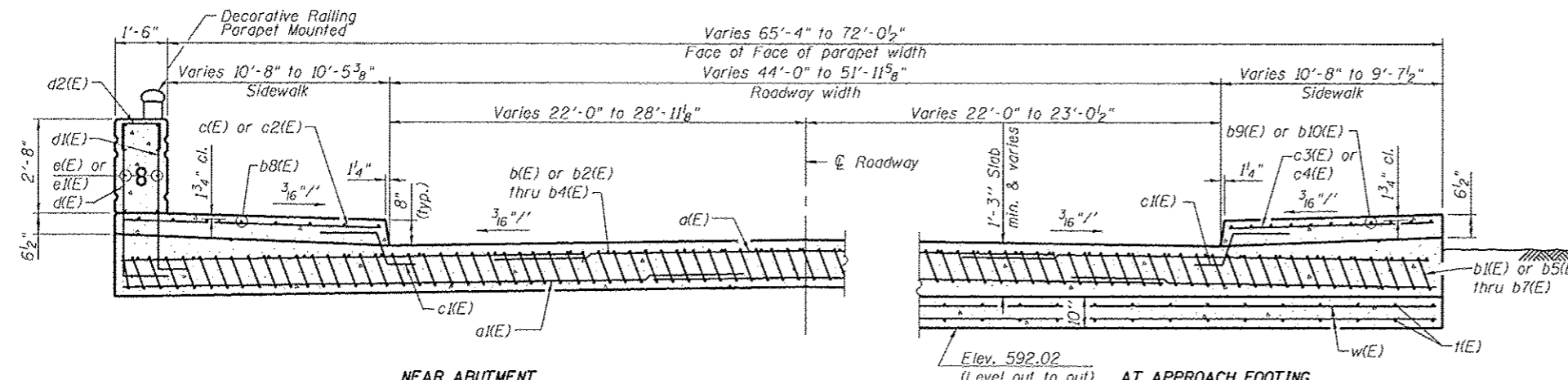
BAR c(E)



BAR d2(E)



BAR d3(E)

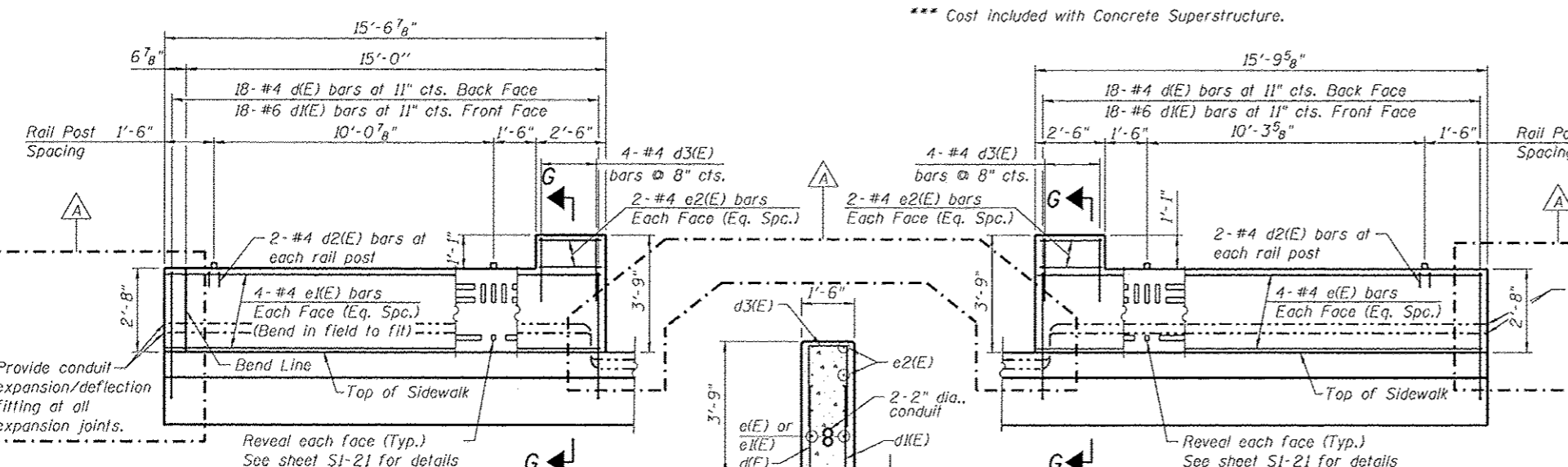


SECTION D-D

(See Plan for dimensions not shown)

* Till #9 b1(E) or b5(E) thru b7(E) bars as required to maintain clearance.

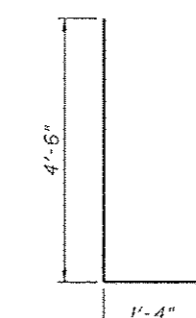
*** Cost included with Concrete Superstructure.



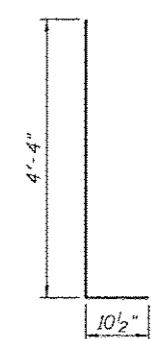
VIEW E-E

VIEW F-F

SECTION G-G



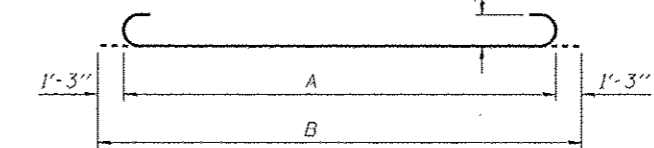
BAR d(E)



BAR d1(E)

A & B Dimensions

Bar	A	B
b1(E)	27'-3"	29'-9"
b5(E)	30'-7"	33'-1"
b6(E)	12'-2"	14'-8"
b7(E)	13'-3"	15'-9"



BARS

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a(E)	66	#4	30'-2"	—
a1(E)	123	#5	30'-7"	—
b(E)	53	#4	29'-8"	—
b1(E)	157	#9	29'-9"	U
b2(E)	2	#4	15'-2"	—
b3(E)	2	#4	15'-5"	—
b4(E)	5	#4	33'-1"	—
b5(E)	13	#9	33'-1"	U
b6(E)	4	#9	14'-8"	U
b7(E)	4	#9	15'-9"	U
b8(E)	8	#5	33'-2"	—
b9(E)	10	#5	30'-5"	—
b10(E)	1	#5	18'-0"	—
c(E)	18	#5	11'-5"	—
c1(E)	64	#5	3'-4"	—
c2(E)	15	#5	13'-5"	—
c3(E)	16	#5	12'-5"	—
c4(E)	15	#5	10'-6"	—
d(E)	36	#4	5'-10"	—
d1(E)	36	#6	5'-2 1/2"	—
d2(E)	8	#4	2'-7"	—
d3(E)	8	#4	5'-11"	—
e(E)	8	#4	15'-5"	—
e1(E)	8	#4	15'-2"	—
e2(E)	8	#4	2'-2"	—
k(E)	176	#4	9'-8"	—
w(E)	120	#5	31'-4"	—
Concrete Superstructure	Cu. Yd.		129	
Concrete Structures	Cu. Yd.		28	
Reinforcement Bars, Epoxy Coated	Pound		31550	
Protective Coat	Sq. Yd.		286	
Bridge Deck Grooving	Sq. Yd.		160	

0161713-50126-S24-ApprSlab



USER NAME = kritzm
 DESIGNED = EJO
 CHECKED = ATB
 DRAWN = BRD
 CHECKED = EJO
 PLOT SCALE = N.T.S.
 PLOT DATE = 9/15/2013

DESIGNED - EJO
 CHECKED - ATB
 DRAWN - BRD
 CHECKED - EJO

REVISED 10/15/2013 EJO, BRD
 REVISED
 REVISED
 REVISED

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

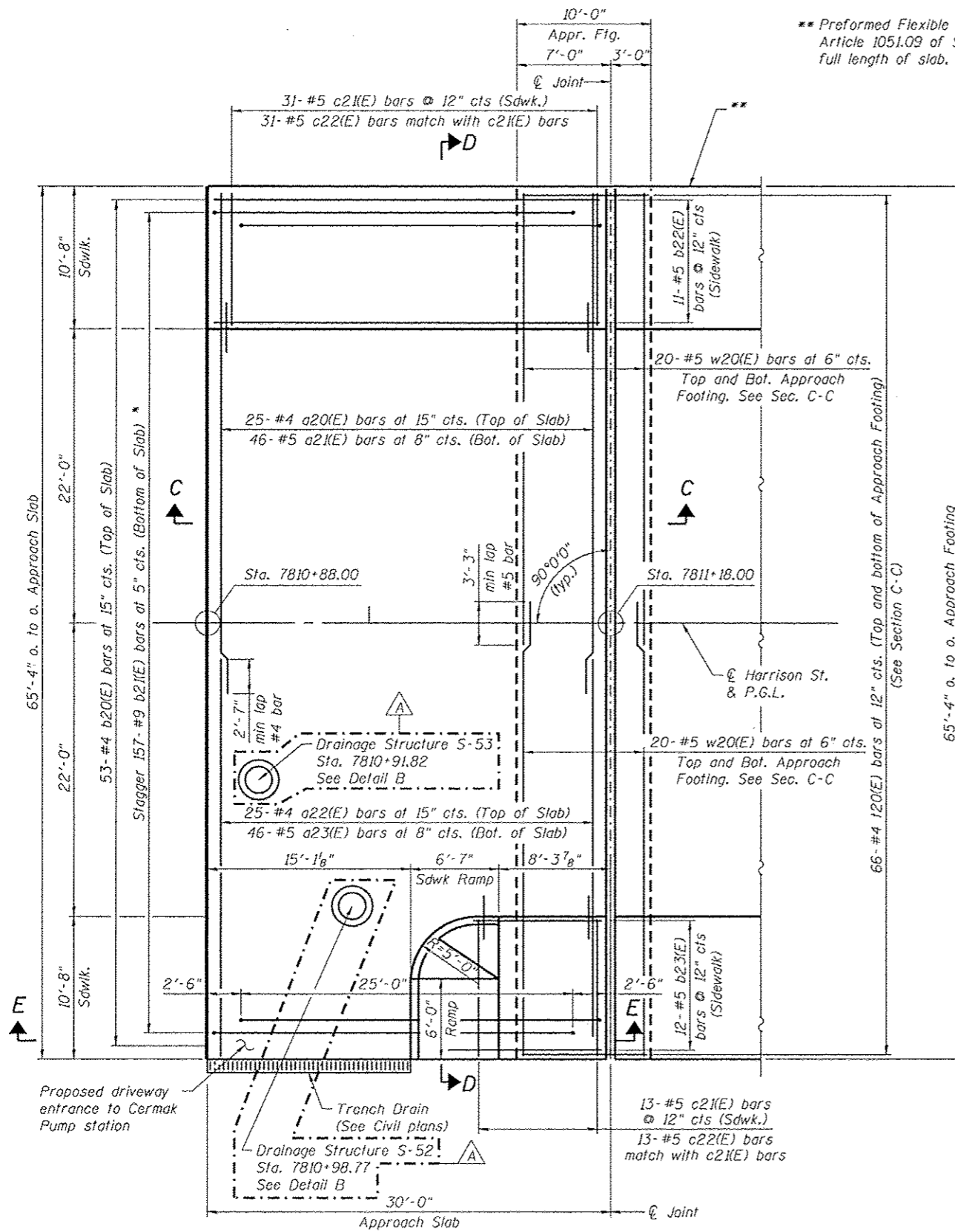
WEST APPROACH SLAB DETAILS
 STRUCTURE NO. 016-1713

SHEET NO. S1-24 OF S1-48 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-00BR	COOK	559	274
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

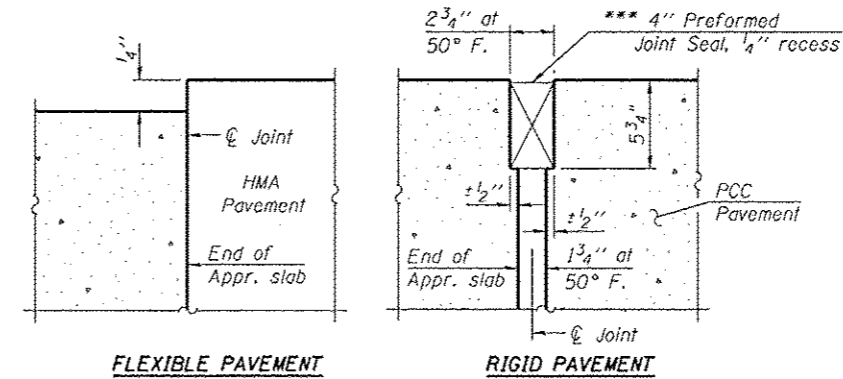
** Preformed Flexible Foam Expansion Joint Filler according to Article 1051.09 of Standard Specifications. Full depth of slab, full length of slab.

*** Cost included with Concrete Superstructure.

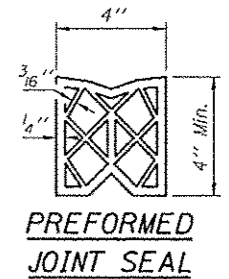


PLAN

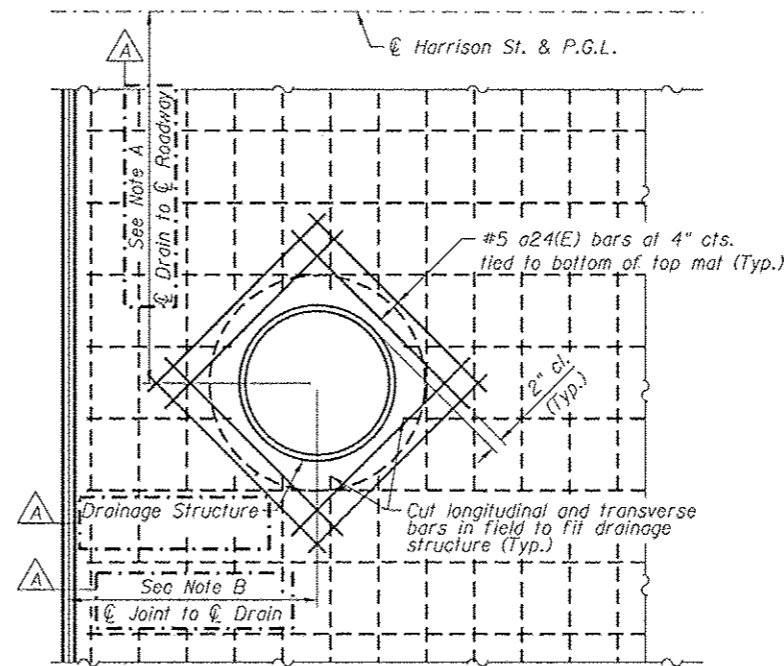
* T111 #9 b21(E) bars as required to maintain clearance.



DETAIL A

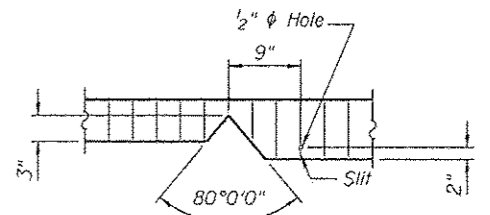


Note: Dimensions are at right angles.



DETAIL B

Cost of cutting bars included in Reinforcement Bars, Epoxy Coated



SEAL CUT-OUT AT CURB

NOTES:

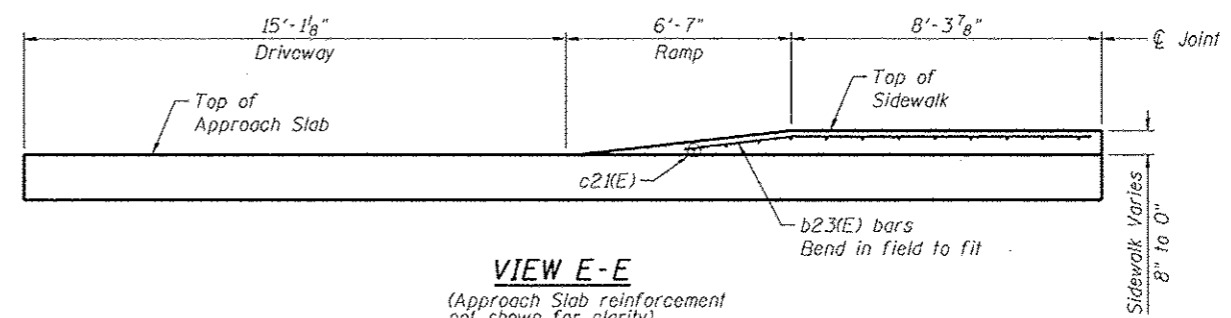
1. See sheet S1-26 of S1-48 for Sections C-C & D-D.
2. See Civil plans for driveway flare details.
3. See Civil plans for drainage structure details.

NOTE A:

For Drainage Structure S-52 = 21'-2 1/2"
For Drainage Structure S-53 = 11'-9"

NOTE B:

For Drainage Structure S-52 = 10'-10 1/2"
For Drainage Structure S-53 = 3'-11 1/8"



VIEW E-E

(Approach Slab reinforcement not shown for clarity)

0161713-60W26-S25-Appr Slab



USER NAME = krifzm	DESIGNED - EJO	REVISION 10/15/2013 EJO, MRK
PLOT SCALE = N.T.S.	CHECKED - ATB	REVISION
PLOT DATE = 9/15/2013	DRAWN - BRD	REVISION
	CHECKED - EJO	REVISION

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

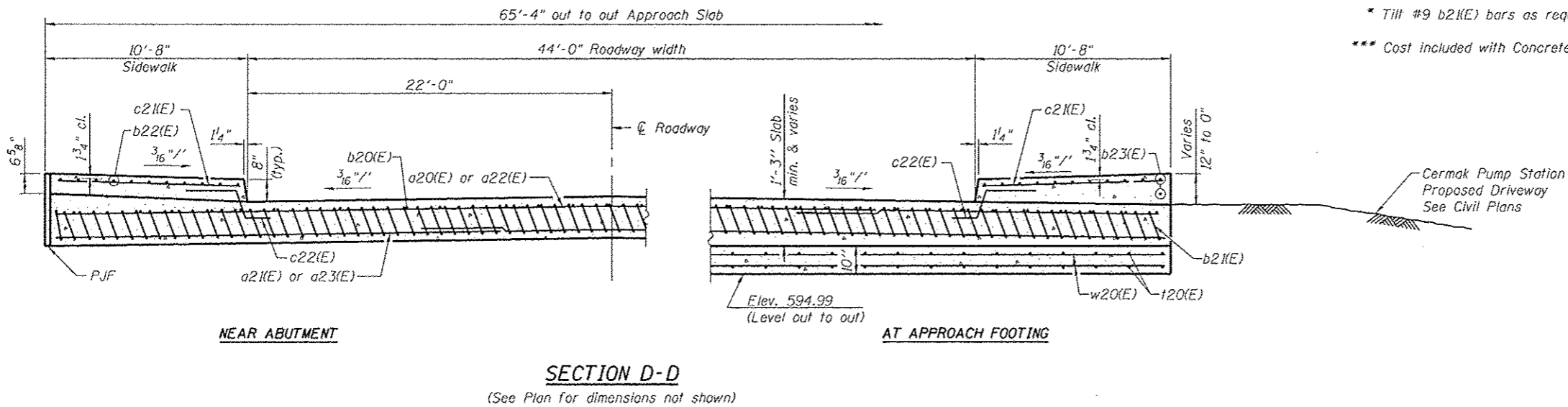
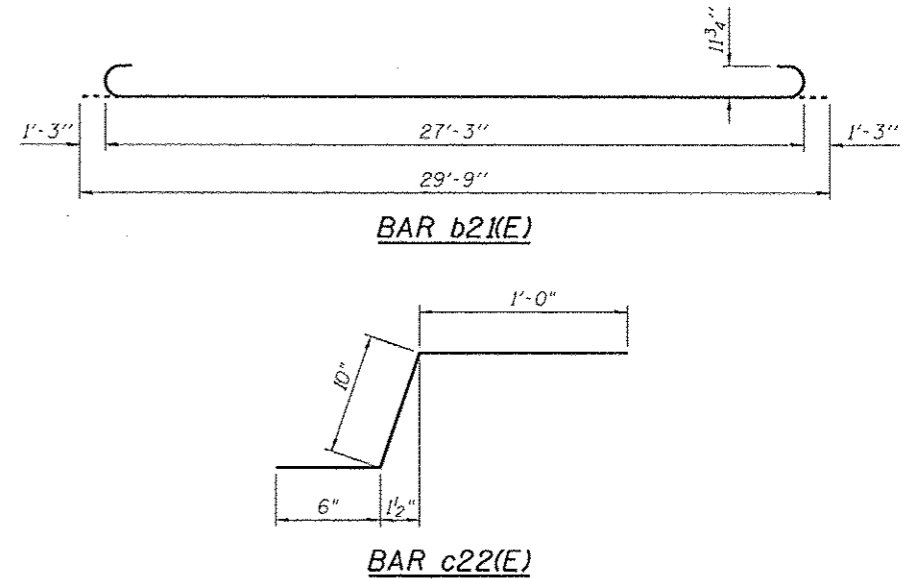
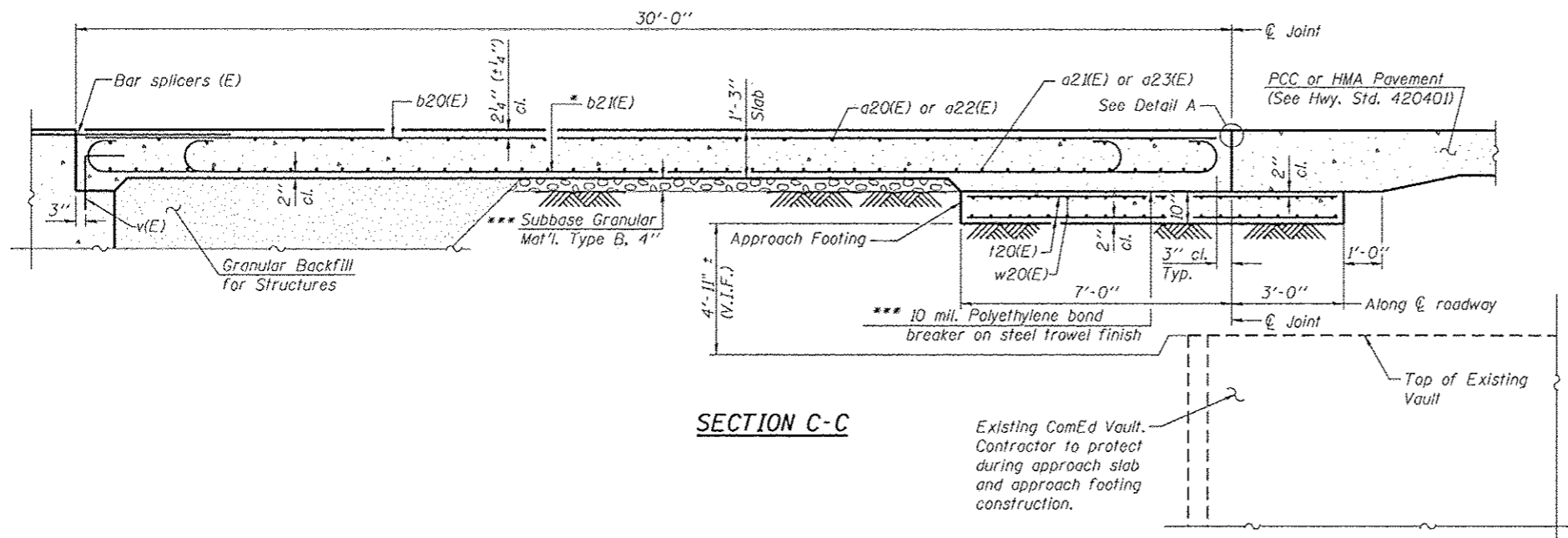
EAST APPROACH SLAB PLAN
STRUCTURE NO. 016-1713

SHEET NO. S1-25 OF S1-48 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	275
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

NOTES:

See sheet S1-25 of S1-48 for Detail A.
 Approach slab concrete shall be paid for as Concrete Superstructure.
 Approach footing concrete shall be paid for as Concrete Structures.
 Reinforcement shall be paid for as Reinforcement Bars, Epoxy Coated.
 For v(E) bar details, see sheet S1-39.
 The approach footing maximum applied service bearing pressure (Qmax) = 2.0 ksf.
 For bar splicer details, see sheet S1-45.
 Cost of excavation for approach footing included with Concrete Structures.
 For Granular Backfill for Structures details, see sheet S1-03.
 V.I.F. = Contractor to verify in field.



* Till #9 b21(E) bars as required to maintain clearance.
 *** Cost included with Concrete Superstructure.

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a20(E)	25	#4	40'-0"	—
a21(E)	46	#5	28'-3"	—
a22(E)	25	#4	27'-7"	—
a23(E)	46	#5	40'-0"	—
a24(E)	16	#5	3'-6"	—
b20(E)	53	#4	29'-8"	—
b21(E)	157	#9	29'-9"	U
b22(E)	11	#5	29'-8"	—
b23(E)	12	#5	11'-5"	—
c21(E)	44	#5	10'-4"	—
c22(E)	44	#5	2'-4"	J
120(E)	132	#4	9'-8"	—
w20(E)	80	#5	34'-2"	—
Concrete Superstructure		Cu. Yd.	103	
Concrete Structures		Cu. Yd.	21	
Reinforcement Bars, Epoxy Coated		Pound	26170	
Protective Coat		Sq. Yd.	205	
Bridge Deck Grooving		Sq. Yd.	159	

0161713-60W26-526-Appr-S1cb



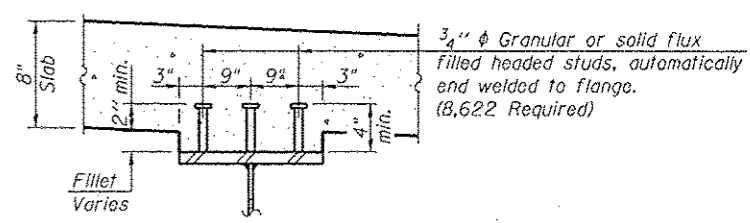
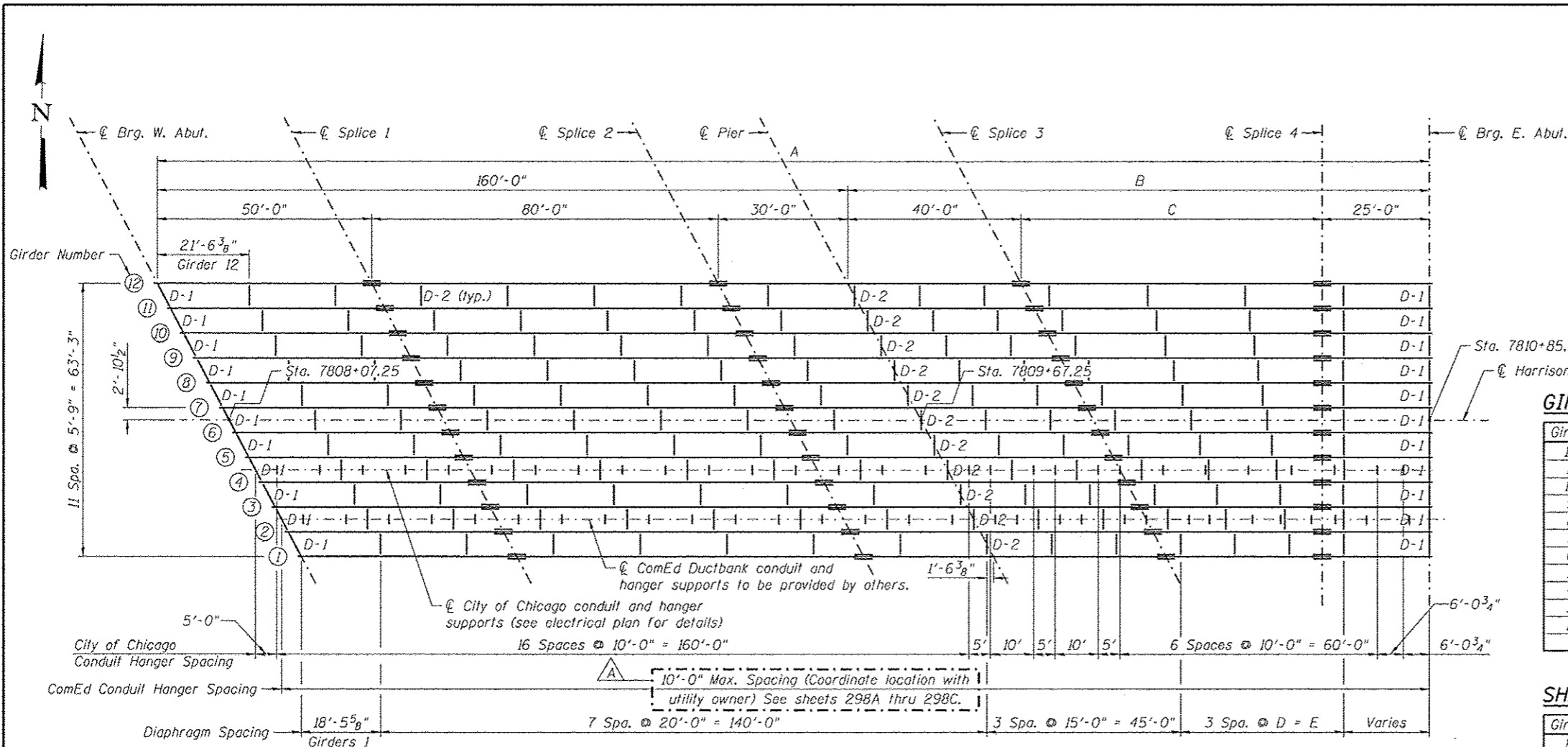
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PLOT SCALE = N.T.S.	CHECKED - ATB	REVISED
PLOT DATE = 9/15/2013	DRAWN - BRD	REVISED
	CHECKED - EJO	REVISED

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

EAST APPROACH SLAB DETAILS
 STRUCTURE NO. 016-1713

SHEET NO. S1-26 OF S1-48 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-00BR	COOK	559	276
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



GIRDER DIMENSIONS

Girder	A	B	C
12	295'-0 ¹ / ₁₆ "	135'-0 ¹⁵ / ₁₆ "	70'-0 ¹ / ₁₆ "
11	292'-0 ⁰ / ₈ "	132'-0 ⁰ / ₈ "	67'-0 ⁰ / ₈ "
10	288'-11 ¹ / ₁₆ "	128'-11 ¹ / ₁₆ "	63'-11 ¹ / ₁₆ "
9	285'-10 ³ / ₄ "	125'-10 ³ / ₄ "	60'-10 ³ / ₄ "
8	282'-10 ¹ / ₁₆ "	122'-10 ¹ / ₁₆ "	57'-10 ¹ / ₁₆ "
7	279'-9 ³ / ₈ "	119'-9 ³ / ₈ "	54'-9 ³ / ₈ "
6	276'-8 ⁵ / ₈ "	116'-8 ⁵ / ₈ "	51'-8 ⁵ / ₈ "
5	273'-7 ⁷ / ₁₆ "	113'-7 ⁷ / ₁₆ "	48'-7 ⁷ / ₁₆ "
4	270'-7 ¹ / ₄ "	110'-7 ¹ / ₄ "	45'-7 ¹ / ₄ "
3	267'-6 ³ / ₁₆ "	107'-6 ³ / ₁₆ "	42'-6 ³ / ₁₆ "
2	264'-5 ⁵ / ₁₆ "	104'-5 ⁵ / ₁₆ "	39'-5 ⁵ / ₁₆ "
1	261'-5 ³ / ₁₆ "	101'-5 ³ / ₁₆ "	36'-5 ³ / ₁₆ "

DIAPHRAGM SPACING

Girder	D	E
11-12	22'-10"	68'-6"
10-11	21'-10"	65'-6"
9-10	20'-10"	62'-6"
8-9	19'-9"	59'-3"
7-8	18'-9"	56'-3"
6-7	17'-9"	53'-3"
5-6	16'-9"	50'-3"
4-5	15'-9"	47'-3"
3-4	14'-8"	44'-0"
2-3	13'-8"	41'-0"
1-2	12'-8"	38'-0"

SHEAR CONNECTOR SCHEDULE

Girder	CI
12	65 Spa. @ 12" (±) = 64'-8 ¹⁵ / ₁₆ "
11	62 Spa. @ 12" (±) = 61'-8 ¹ / ₈ "
10	59 Spa. @ 12" (±) = 58'-7 ⁷ / ₁₆ "
9	56 Spa. @ 12" (±) = 55'-6 ³ / ₄ "
8	53 Spa. @ 12" (±) = 52'-6 ¹ / ₁₆ "
7	50 Spa. @ 12" (±) = 49'-5 ³ / ₈ "
6	47 Spa. @ 12" (±) = 46'-4 ² / ₈ "
5	44 Spa. @ 12" (±) = 43'-3 ¹⁵ / ₁₆ "
4	41 Spa. @ 12" (±) = 40'-3 ¹ / ₄ "
3	38 Spa. @ 12" (±) = 37'-2 ⁹ / ₁₆ "
2	35 Spa. @ 12" (±) = 34'-1 ⁹ / ₈ "
1	32 Spa. @ 12" (±) = 31'-1 ³ / ₁₆ "

* = 2'-8"

NOTES:

- All structural steel shall be AASHTO M270 Grade 50 - galvanized.
- Load carrying components designated "NTR" shall conform to the Impact Testing Requirement, Zone 2.
- Girders have bearing stiffeners and connection plates as required by design. Additional stiffeners may be added at the Contractor's expense as necessary to prevent distortion of the girders during galvanizing. The Contractor shall coordinate with the fabricator and the galvanizer to determine if additional stiffeners are necessary, and where these should be placed. Any proposed changes shall be submitted to the Engineer for approval prior to making any changes.
- Temporary stiffener angles shall be bolted to each side of the splice ends of each girder segment to prevent distortion during galvanizing. Temporary stiffener angles shall bolt or fit tight against top & bottom flanges and include spacer tubes to minimize damage to galvanizing during removal. Cost included with Furnishing and Erecting Structural Steel.
- E.S. = Each Side
- Work this sheet with sheets S1-29 thru S1-31.

FRAMING PLAN

GIRDER ELEVATION



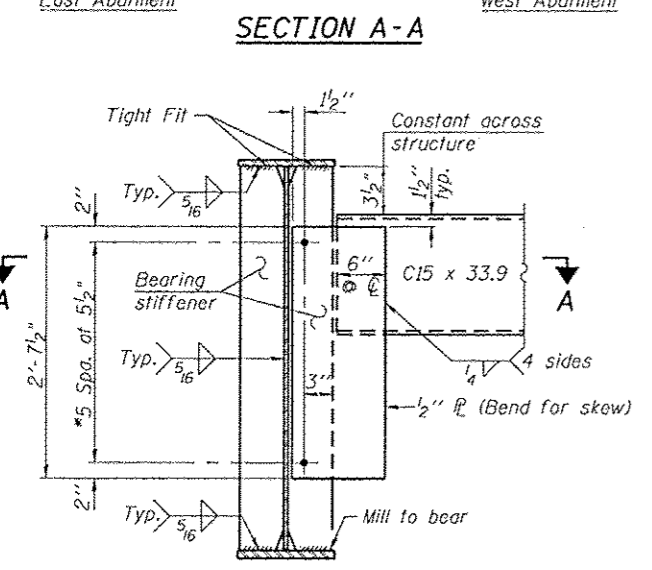
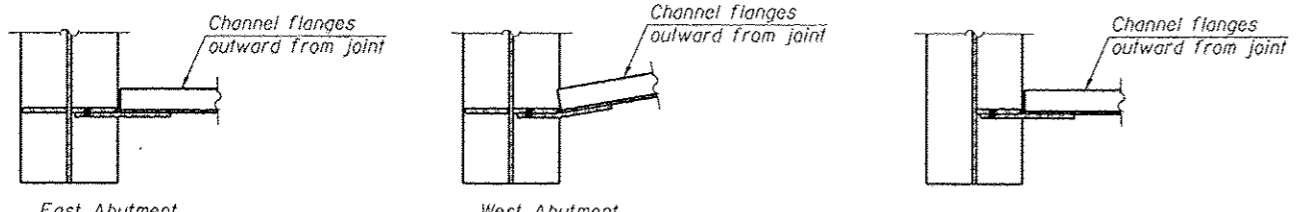
USER NAME: krutzm	DESIGNED: EJO	REVISED: 10/15/2013 EJO, BRD
PLOT SCALE: N.T.S.	CHECKED: ATB	REVISED:
PLOT DATE: 9/15/2013	DRAWN: BRD	REVISED:
	CHECKED: EJO	REVISED:

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

GIRDER FRAMING PLAN
STRUCTURE NO. 016-1713
SHEET NO. S1-28 OF S1-48 SHEETS

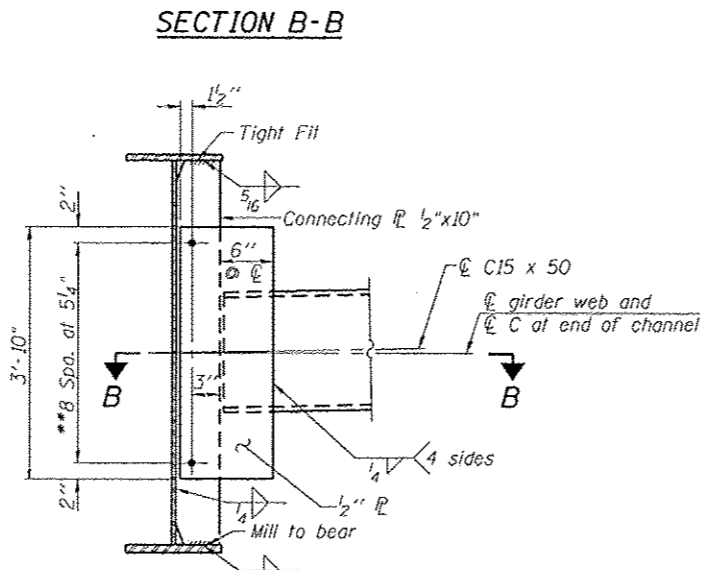
F.A.I. RTE. 90/94/290	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 278
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

0161713-60W26-S28-FramingPlan



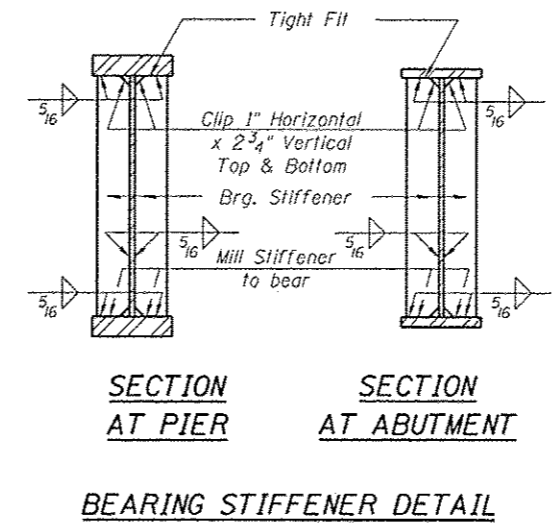
END DIAPHRAGM - D-1
(22 Required)

*7/8" HS Bolts, 1 1/16" holes



INTERIOR DIAPHRAGM - D-2
(154 Required)

**7/8" HS bolts, 1 1/16" holes



BEARING STIFFENER DETAIL

	0.4 Sp. 1	Pier	0.6 Sp. 2
I_s (in ⁴)	61,574	82,330	61,574
$I_c(n)$ (in ⁴)	106,081	-	106,081
$I_c(3n)$ (in ⁴)	80,858	-	80,858
$I_c(cr)$ (in ⁴)	-	87,346	-
S_s (in ³)	2,492	3,107	2,492
$S_c(n)$ (in ³)	2,945	-	2,945
$S_c(3n)$ (in ³)	2,730	-	2,730
$S_c(cr)$ (in ³)	-	3,433	-
DC1 (k/')	1.22	1.30	1.22
M _{DC1} (k)	2,281	3,652	1,104
DC2 (k/')	0.57	0.57	0.57
M _{DC2} (k)	1,093	1,670	526
DW (k/')	0.27	0.27	0.27
M _{DW} (k)	522	796	250
M _{k + IM} (k)	1,851	1,923	1,512
M _u (Strength I) (k)	8,240	11,212	5,059
φ _r M _n (k)	11,325	-	11,514
f _s DC1 (ksi)	10.98	14.10	5.32
f _s DC2 (ksi)	4.80	5.84	2.31
f _s DW (ksi)	2.29	2.78	1.10
f _s (k + IM) (ksi)	7.54	6.72	6.16
f _s (Service II) (ksi)	27.89	31.46	16.74
0.95R _n F _{yr} (ksi)	47.50	47.50	47.50
f _s (Total)(Strength I) (ksi)	36.38	40.86	21.97
φ _r F _n (ksi)	-	50.00	-
V _r (k)	22.40	24.10	22.10

	W. Abut.	Pier	E. Abut.
R _{DC1} (k)	76	234	54
R _{DC2} (k)	36	107	25
R _{DW} (k)	17	51	12
R _{k + IM} (k)	66	127	63
R _{Total} (k)	195	519	154

	0.4 Sp. 1	Pier	0.6 Sp. 2
I_s (in ⁴)	61,574	82,330	61,574
$I_c(n)$ (in ⁴)	104,358	-	104,358
$I_c(3n)$ (in ⁴)	79,900	-	79,900
$I_c(cr)$ (in ⁴)	-	87,065	-
S_s (in ³)	2,492	3,107	2,492
$S_c(n)$ (in ³)	2,932	-	2,932
$S_c(3n)$ (in ³)	2,720	-	2,720
$S_c(cr)$ (in ³)	-	3,414	-
DC1 (k/')	1.18	1.26	1.18
M _{DC1} (k)	2,235	3,612	1,170
DC2 (k/')	0.57	0.57	0.57
M _{DC2} (k)	1,082	1,682	563
DW (k/')	0.27	0.27	0.27
M _{DW} (k)	516	802	268
M _{k + IM} (k)	2,102	2,257	1,753
M _u (Strength I) (k)	8,599	11,770	5,636
φ _r M _n (k)	11,348	-	11,514
f _s DC1 (ksi)	10.76	13.95	5.63
f _s DC2 (ksi)	4.77	5.91	2.48
f _s DW (ksi)	2.28	2.82	1.18
f _s (k + IM) (ksi)	8.60	7.93	7.17
f _s (Service II) (ksi)	29.00	32.99	18.63
0.95R _n F _{yr} (ksi)	47.50	47.50	47.50
f _s (Total)(Strength I) (ksi)	37.89	42.94	24.48
φ _r F _n (ksi)	-	50.00	-
V _r (k)	23.00	26.70	24.10

	W. Abut.	Pier	E. Abut.
R _{DC1} (k)	74	228	55
R _{DC2} (k)	35	107	26
R _{DW} (k)	17	51	12
R _{k + IM} (k)	67	144	65
R _{Total} (k)	193	530	158

	0.4 Sp. 1	Pier	0.6 Sp. 2
I_s (in ⁴)	61,574	82,330	61,574
$I_c(n)$ (in ⁴)	106,081	-	106,081
$I_c(3n)$ (in ⁴)	80,858	-	80,858
$I_c(cr)$ (in ⁴)	-	87,346	-
S_s (in ³)	2,492	3,107	2,492
$S_c(n)$ (in ³)	2,945	-	2,945
$S_c(3n)$ (in ³)	2,730	-	2,730
$S_c(cr)$ (in ³)	-	3,433	-
DC1 (k/')	1.22	1.30	1.22
M _{DC1} (k)	2,409	3,322	302
DC2 (k/')	0.62	0.62	0.62
M _{DC2} (k)	1,224	1,622	161
DW (k/')	0.27	0.27	0.27
M _{DW} (k)	548	723	70
M _{k + IM} (k)	2,284	2,327	1,459
M _u (Strength I) (k)	9,360	11,337	3,237
φ _r M _n (k)	11,380	-	11,779
f _s DC1 (ksi)	11.60	12.83	1.45
f _s DC2 (ksi)	5.38	5.67	0.71
f _s DW (ksi)	2.41	2.53	0.31
f _s (k + IM) (ksi)	9.31	8.13	5.94
f _s (Service II) (ksi)	31.49	31.60	10.20
0.95R _n F _{yr} (ksi)	47.50	47.50	47.50
f _s (Total)(Strength I) (ksi)	41.13	41.15	13.57
φ _r F _n (ksi)	-	50.00	-
V _r (k)	21.40	22.60	21.60

	W. Abut.	Pier	E. Abut.
R _{DC1} (k)	78	219	34
R _{DC2} (k)	39	108	17
R _{DW} (k)	17	48	7
R _{k + IM} (k)	93	177	78
R _{Total} (k)	227	552	136

I_s, S_s : Non-composite moment of inertia and section modulus of the steel section used for computing f_s (Total-Strength I, and Service II) due to non-composite dead loads (in.4 and in.3).

$I_c(n), S_c(n)$: Composite moment of inertia and section modulus of the steel and deck based upon the modular ratio, "n", used for computing f_s (Total-Strength I, and Service II) in uncracked sections due to short-term composite live loads (in.4 and in.3).

$I_c(3n), S_c(3n)$: Composite moment of inertia and section modulus of the steel and deck based upon 3 times the modular ratio, "3n", used for computing f_s (Total-Strength I, and Service II) in uncracked sections, due to long-term composite (superimposed) dead loads (in.4 and in.3).

$I_c(cr), S_c(cr)$: Composite moment of inertia and section modulus of the steel and longitudinal deck reinforcement, used for computing f_s (Total-Strength I and Service II) in cracked sections, due to both short-term composite live loads and long-term composite (superimposed) dead loads (in.4 and 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.).

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

M_u (Strength I): Factored design moment (kip-ft.).
1.25 (M_{DC1} + M_{DC2}) + 1.5 M_{DW} + 1.75 M_{k + IM}

φ_rM_n: Compact composite positive moment capacity computed according to Article 6.10.7.1 or non-slender negative moment capacity according to Article A6.1.1 or A6.1.2 (kip-ft.).

f_s DC1: Un-factored stress at edge of flange for controlling steel flange due to vertical non-composite dead loads as calculated below (ksi).

Δ f_s DC2: Un-factored stress at edge of flange for controlling steel flange due to vertical composite dead loads as calculated below (ksi).
M_{DC1} / S_s

f_s DC2: Un-factored stress at edge of flange for controlling steel flange due to vertical composite dead loads as calculated below (ksi).
M_{DC2} / S_{c(3n)} or M_{DC2} / S_{c(cr)} as applicable.

f_s DW: Un-factored stress at edge of flange for controlling steel flange due to vertical composite future wearing surface loads as calculated below (ksi).
M_{DW} / S_{c(3n)} or M_{DW} / S_{c(cr)} as applicable.

f_s (k + IM): Un-factored stress at edge of flange for controlling steel flange due to vertical composite live load plus impact loads as calculated below (ksi).
M_{k + IM} / S_{c(n)} or M_{k + IM} / S_{c(cr)} as applicable.

f_s (Service II): Sum of stresses as computed below (ksi).
f_s DC1 + f_s DC2 + f_s DW + 1.3 f_s (k + IM)

0.95R_nF_{yr}: Composite stress capacity for Service II loading according to Article 6.10.4.2 (ksi).

f_s (Total)(Strength I): Sum of stresses as computed below on non-compact section (ksi).
1.25 (f_s DC1 + f_s DC2) + 1.5 f_s DW + 1.75 f_s (k + IM)

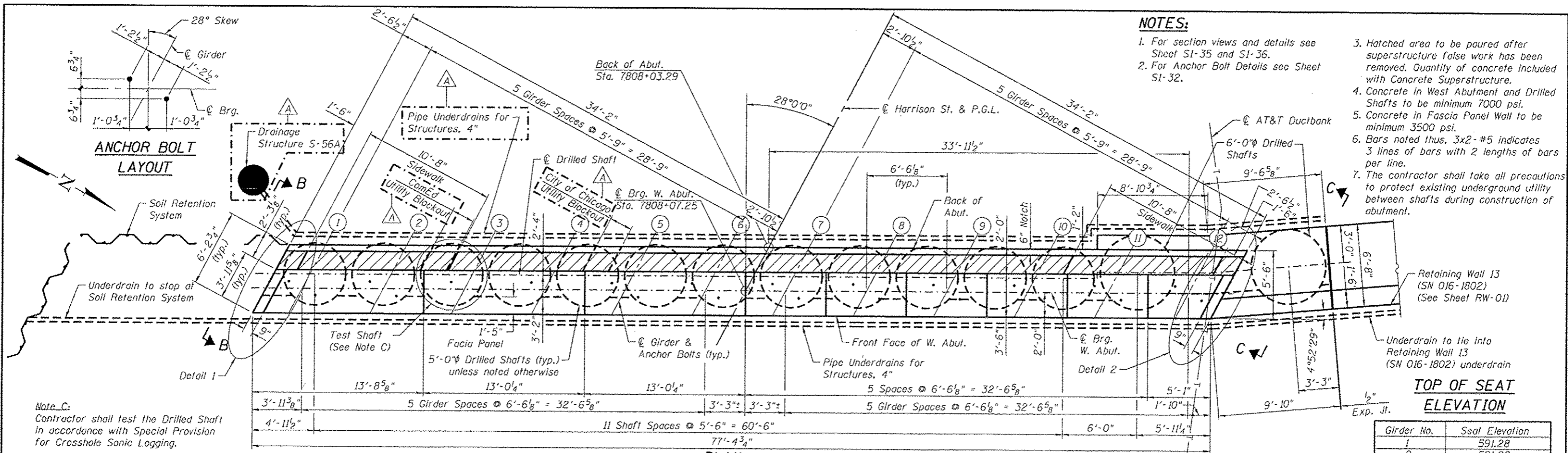
φ_rF_n: Non-Compact composite positive or negative stress capacity for Strength I loading according to Article 6.10.7 or 6.10.8 (ksi).

V_r: Maximum factored shear range in span computed according to Article 6.10.10.

*** For Girders 2 and 3, the load due to ComEd ductbank is 43 pounds per linear foot per girder.
For Girders 4 and 5, the load due to City of Chicago ductbank is 53 pounds per linear foot per girder.

NOTES:

- All structural steel shall be AASHTO M270 Grade 50 - galvanized.
- All diaphragms shall be installed as steel is erected and secured with erection pins and bolts except as otherwise noted. Individual diaphragms at supports may be temporarily disconnected to install bearing anchor rods.
- Two hardened washers required for each set of oversized holes.



NOTES:

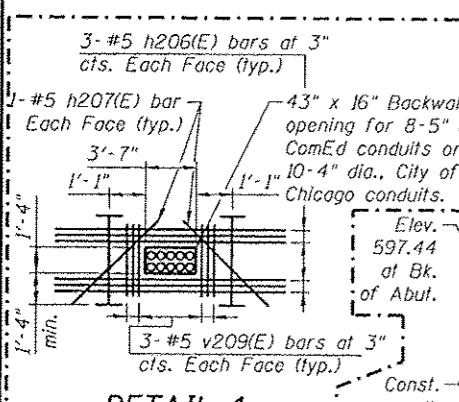
1. For section views and details see Sheet S1-35 and S1-36.
2. For Anchor Bolt Details see Sheet S1-32.
3. Hatched area to be poured after superstructure false work has been removed. Quantity of concrete included with Concrete Superstructure.
4. Concrete in West Abutment and Drilled Shafts to be minimum 7000 psi.
5. Concrete in Fascia Panel Wall to be minimum 3500 psi.
6. Bars noted thus, 3x2-#5 indicates 3 lines of bars with 2 lengths of bars per line.
7. The contractor shall take all precautions to protect existing underground utility between shafts during construction of abutment.

Note C:
Contractor shall test the Drilled Shaft in accordance with Special Provision for Crosshole Sonic Logging.

PLAN

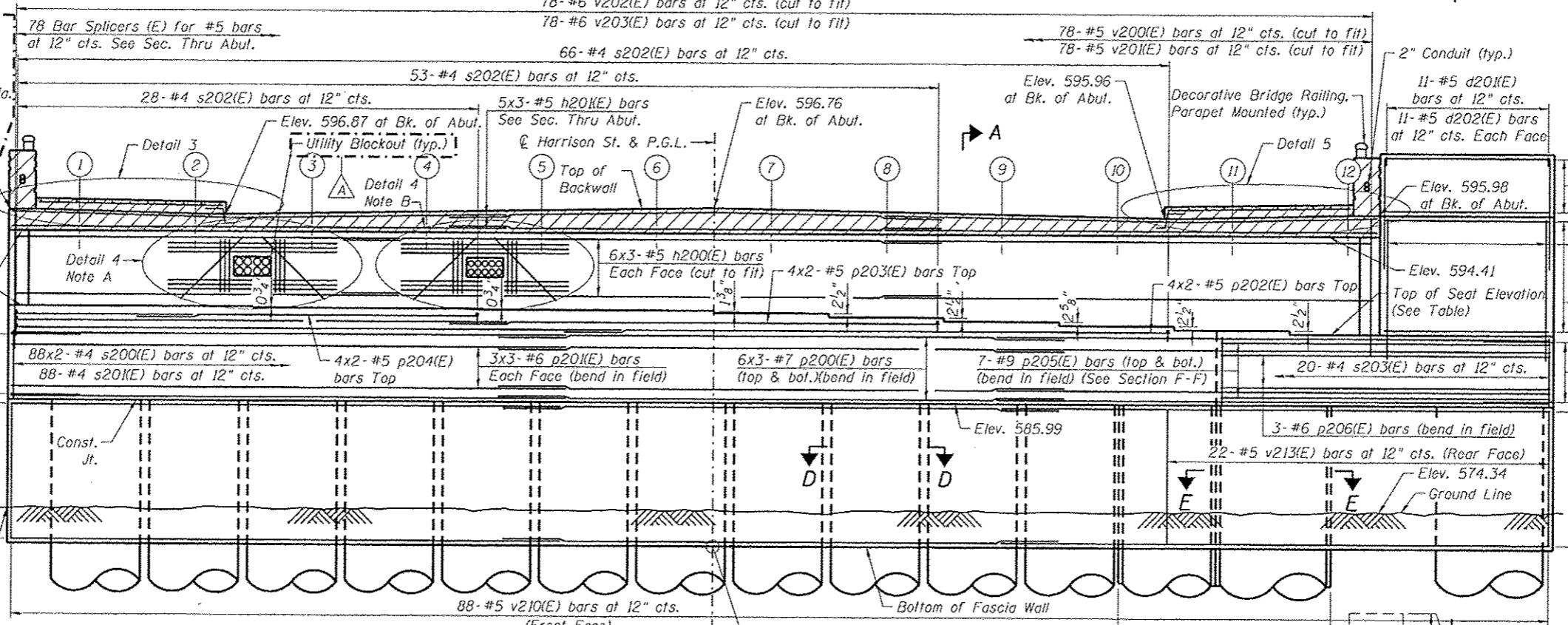
TOP OF SEAT ELEVATION

Girder No.	Seat Elevation
1	591.28
2	591.28
3	591.22
4	591.22
5	591.16
6	591.16
7	591.04
8	590.83
9	590.62
10	590.41
11	590.20
12	589.99



Note A:
Conduit provided by others. Contractor to coordinate with utility owner for location and size of the utility blockouts. Cost of utility blockouts included in Concrete Structures. (see electrical plans)

Note B:
Cost of utility blockouts included in Concrete Structures. (see electrical plans)



ELEVATION

(Looking West, Cheekwall and Barrier Reinforcement not shown for clarity)

TYP. MIN. BAR LAP

- (Unless Noted Otherwise)
- #5 bar = 3'-3"
 - #6 bar = 3'-10"
 - #7 bar = 5'-2"
 - #9 bar = 8'-7"
 - #10 bar = 10'-10"

0161713-60W26-S34-Abutment



USER NAME: krltzm
DESIGNED: EJO
CHECKED: ATB
DRAWN: BRD
PLOT DATE: 9/15/2013

DESIGNED: EJO
CHECKED: ATB
DRAWN: BRD
PLOT DATE: 9/15/2013

REVISED: 10/15/2013 EJO, BRD

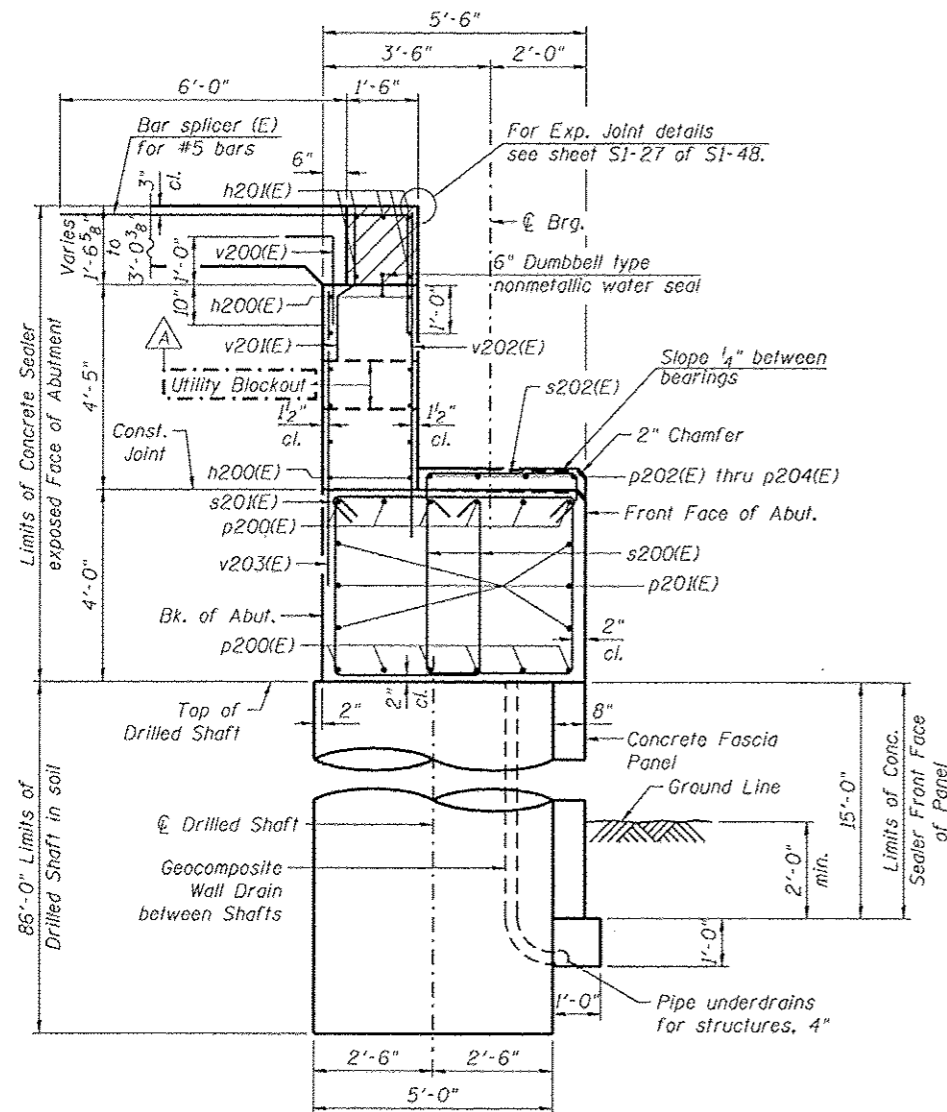
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

WEST ABUTMENT PLAN AND ELEVATION
STRUCTURE NO. 016-1713

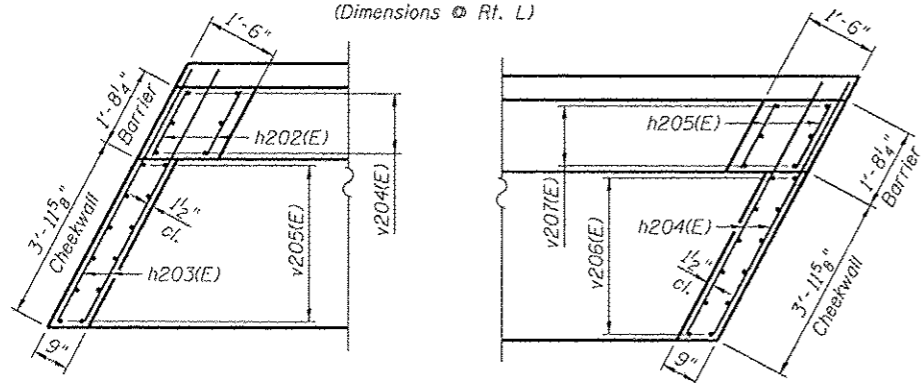
SHEET NO. S1-34 OF S1-48 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	284

CONTRACT NO. GOW26
ILLINOIS FED. AID PROJECT

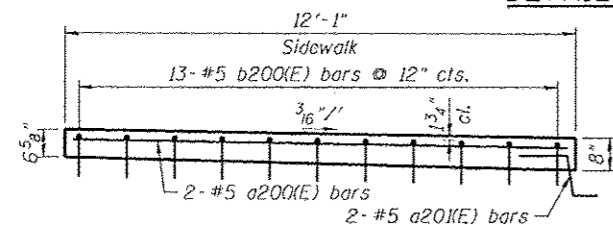


SECTION A-A
(Dimensions @ Rt. L.)

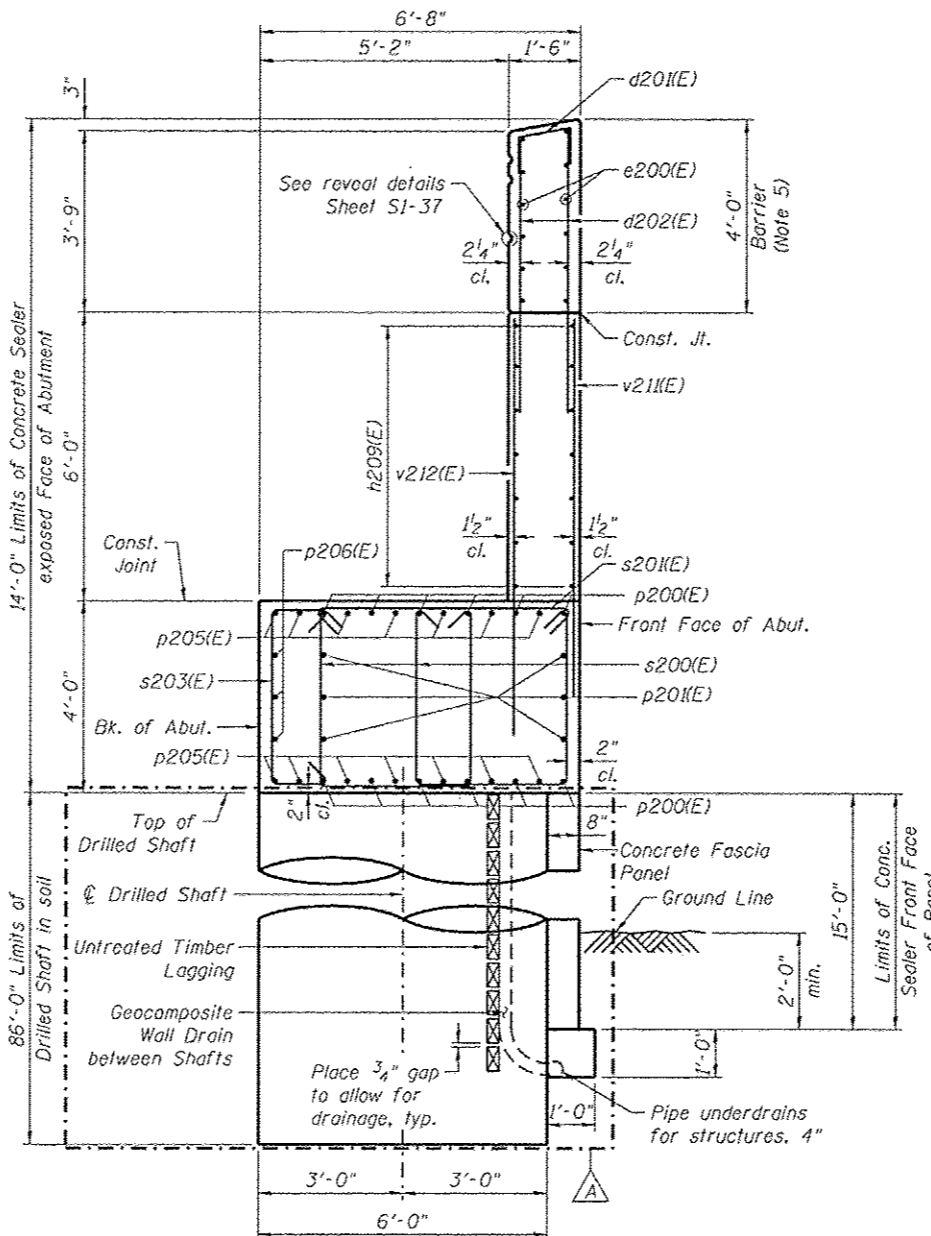


DETAIL 1

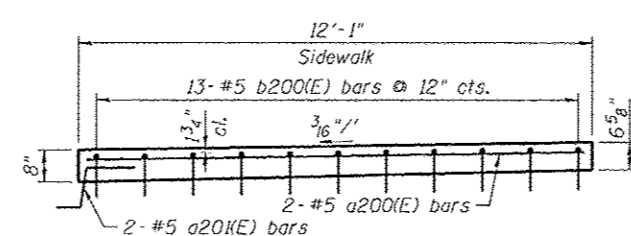
DETAIL 2



DETAIL 3



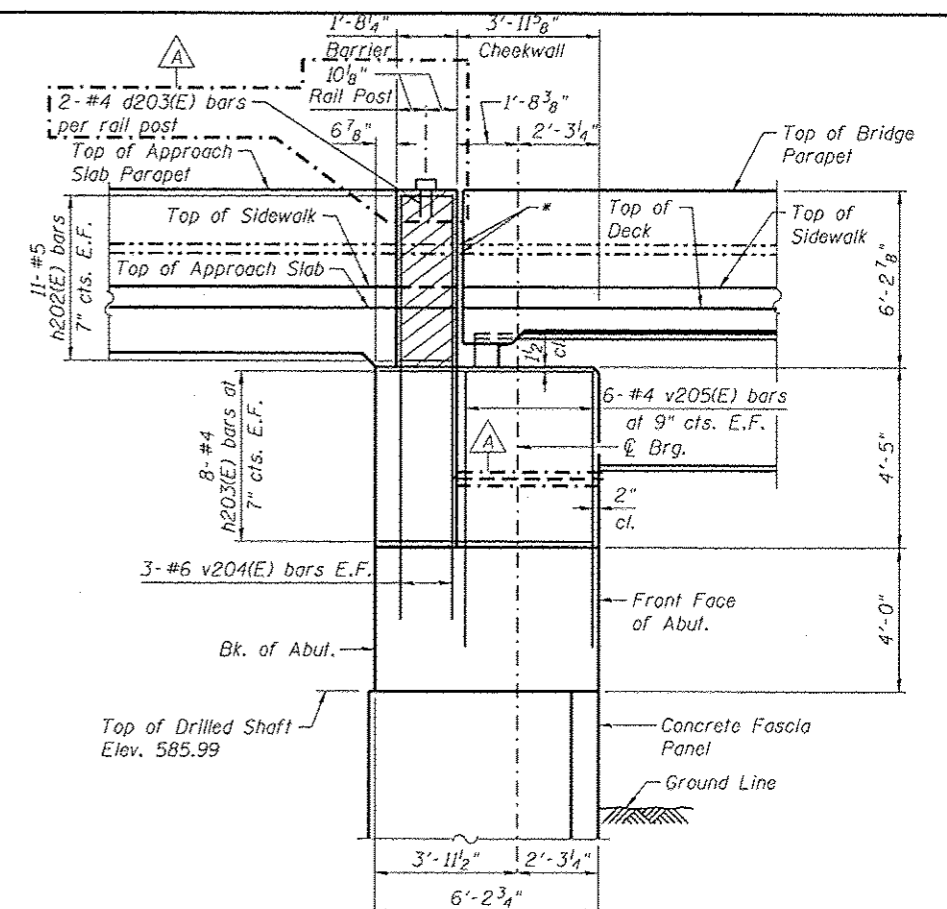
SECTION F-F
(Dimensions @ Rt. L.)



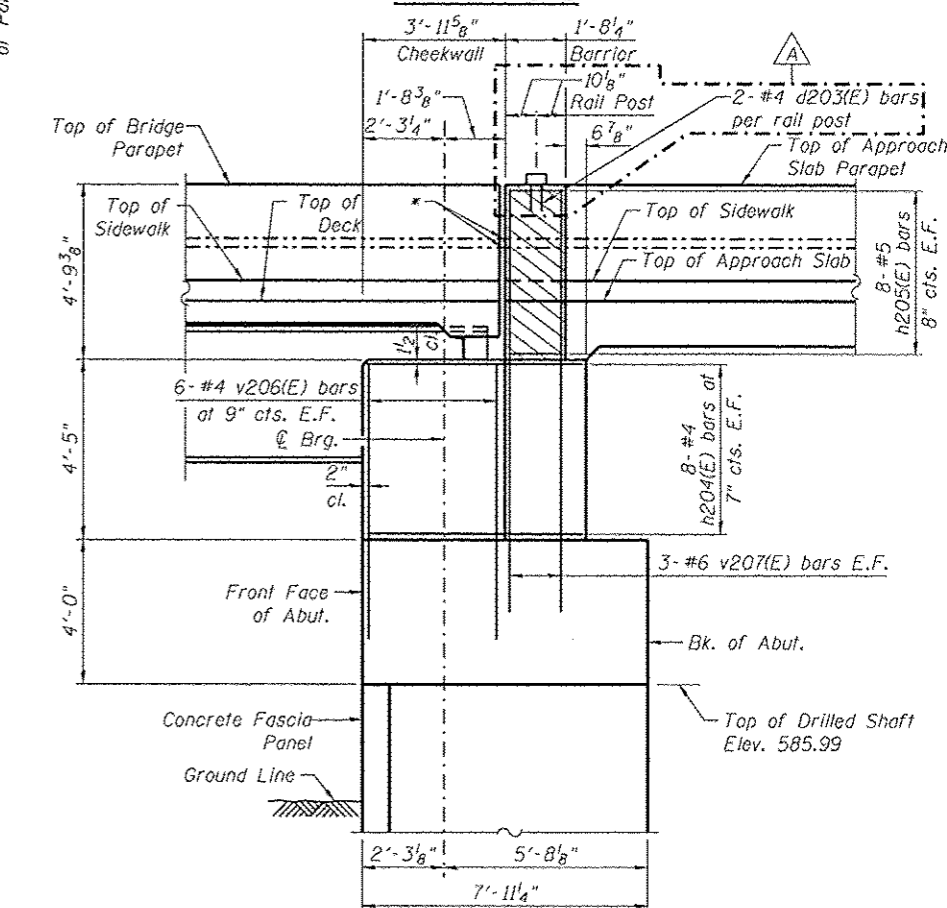
DETAIL 5

NOTES:

- Hatched area to be poured after superstructure false work has been removed. Quantity of concrete included with Concrete Superstructure.
- Concrete Sealer shall be applied to abutment backwall, bearing seats and exposed faces of abutment cap, cheekwalls and fascia panel.
- E.F. = Each Face
- Bars noted thus, 3x2-#5 indicates 3 lines of bars with 2 lengths of bars per line.
- Barrier concrete included with pay item Concrete Superstructure.



SECTION B-B



SECTION C-C

*Provide conduit expansion/deflection fitting at all expansion joints.

0161713-60W26-S35-Abutment



USER NAME	kr1tzm
PLOT SCALE	N.T.S.
PLOT DATE	9/15/2013

DESIGNED	EJO
CHECKED	ATB
DRAWN	BRD
CHECKED	EJO

REVISED	10/15/2013 EJO, BRD
REVISED	
REVISED	
REVISED	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

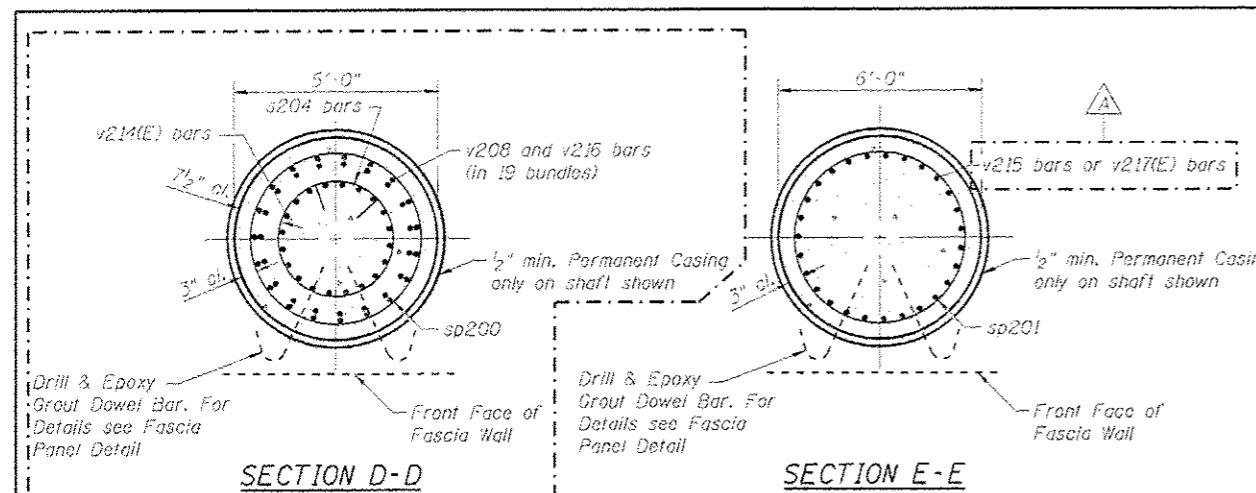
WEST ABUTMENT SECTION
STRUCTURE NO. 016-1713

SHEET NO. S1-35 OF S1-48 SHEETS

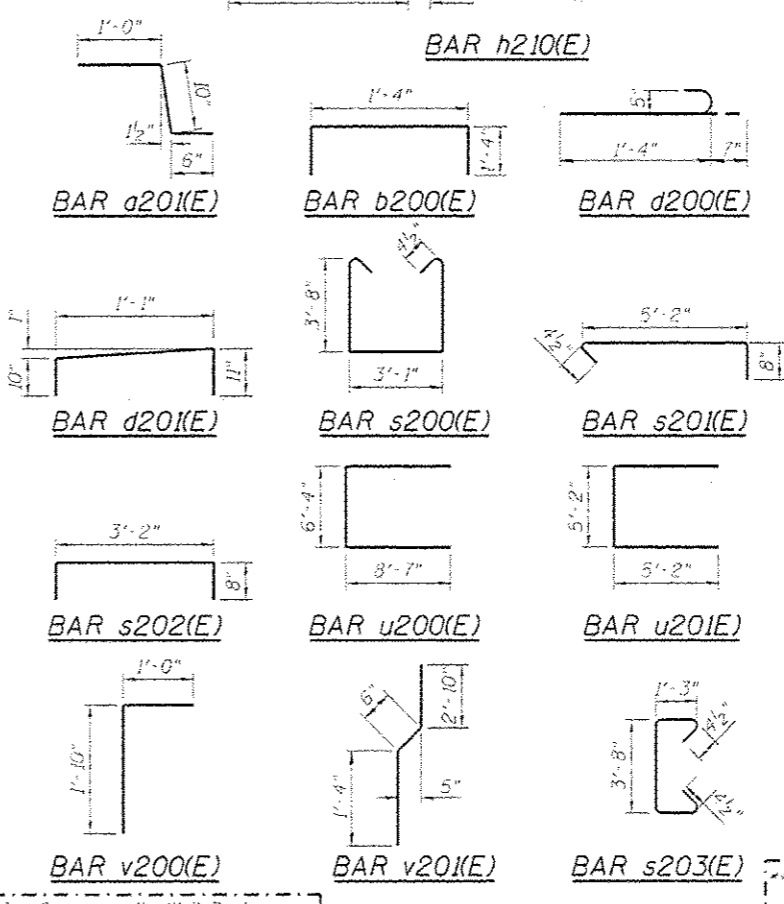
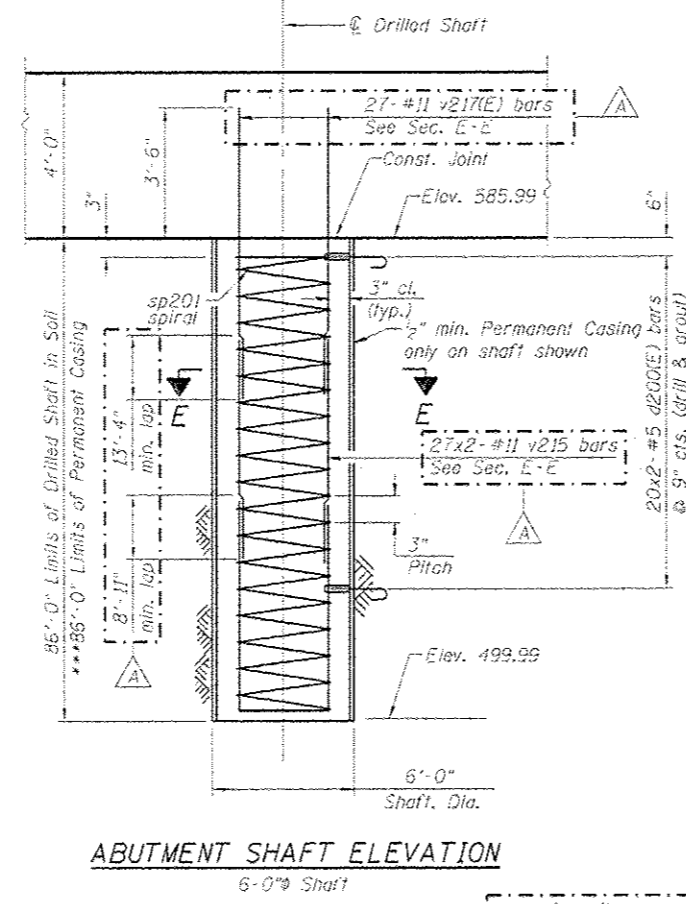
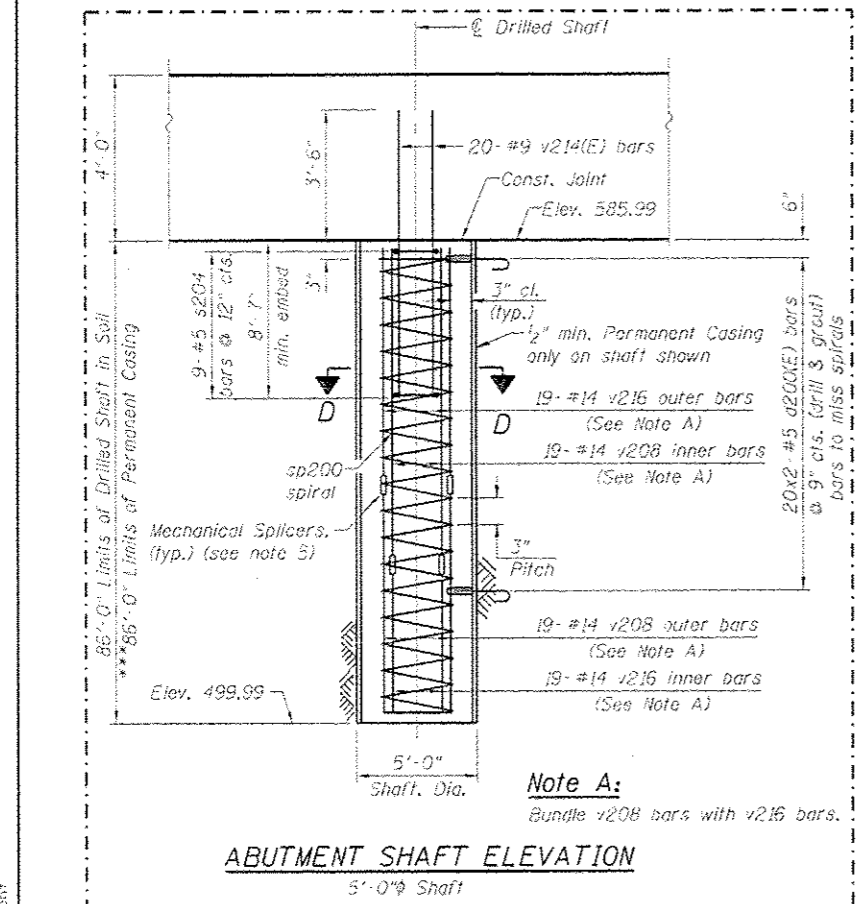
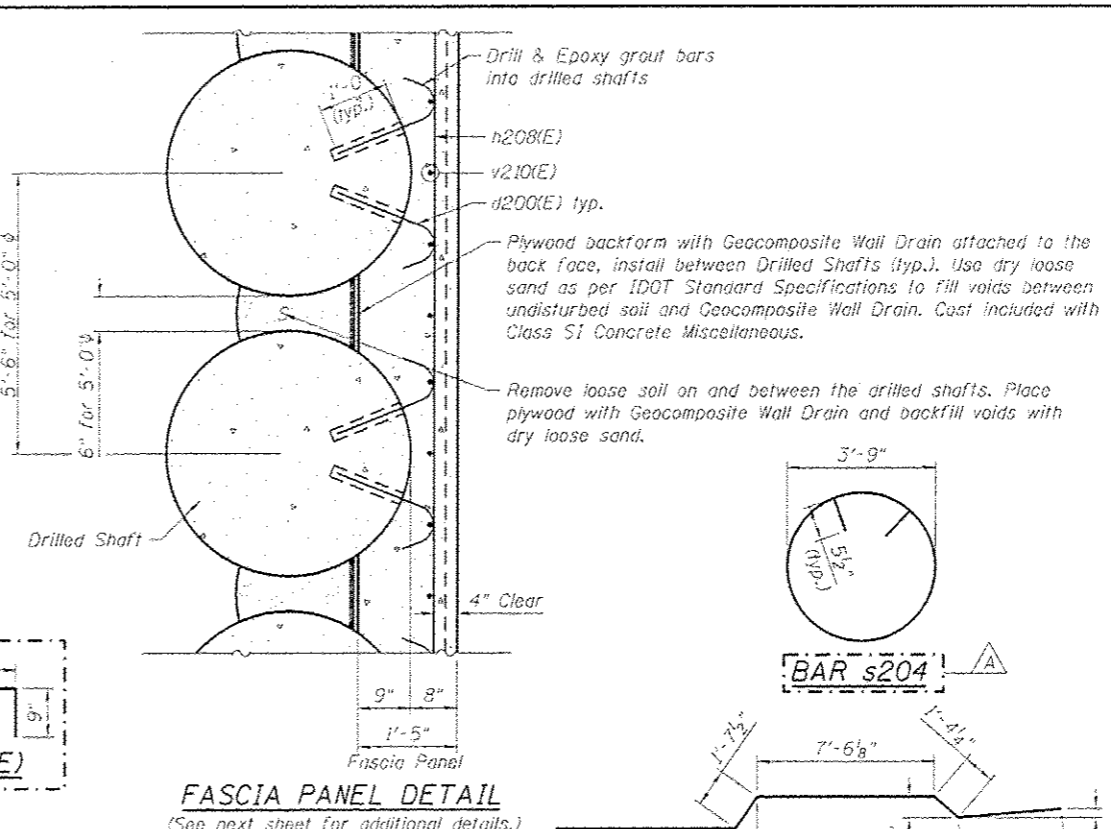
F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	285
CONTRACT NO.			60W26	
ILLINOIS FED. AID PROJECT				

WEST ABUTMENT BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a200(E)	4	#5	11'-9"	
a201(E)	4	#5	2'-4"	
b200(E)	25	#5	4'-0"	
d200(E)	560	#5	1'-11"	
d201(E)	11	#5	2'-10"	
d202(E)	22	#5	7'-7"	
d203(E)	4	#4	2'-7"	
s200(E)	12	#5	9'-5"	
h200(E)	36	#5	27'-10"	
h201(E)	15	#5	27'-10"	
h202(E)	22	#5	1'-4"	
h203(E)	16	#4	5'-10"	
h204(E)	16	#4	5'-10"	
h205(E)	16	#5	1'-4"	
h206(E)	24	#5	9'-6"	
h207(E)	8	#5	5'-0"	
h208(E)	93	#5	31'-2"	
h209(E)	16	#5	9'-5"	
h210(E)	31	#5	22'-7"	
p200(E)	36	#7	32'-5"	
p201(E)	18	#6	31'-5"	
p202(E)	8	#5	34'-4"	
p203(E)	8	#5	27'-10"	
p204(E)	8	#5	14'-10"	
p205(E)	14	#9	18'-2"	
p206(E)	3	#6	18'-2"	
s200(E)	176	#4	11'-2"	
s201(E)	88	#4	6'-2 1/2"	
s202(E)	147	#4	4'-6"	
s203(E)	20	#4	5'-11"	
s204	108	#5	12'-8 3/8"	
sp200	12	#6	85'-9"	
sp201	2	#6	85'-9"	
u200(E)	5	#6	23'-6"	
u201(E)	5	#6	15'-6"	
v200(E)	78	#5	2'-10"	
v201(E)	78	#5	4'-8"	
v202(E)	78	#6	9'-6"	
v203(E)	78	#6	7'-0"	
v204(E)	5	#6	13'-0"	
v205(E)	12	#4	6'-0"	
v206(E)	12	#4	6'-0"	
v207(E)	5	#6	11'-7"	
v208	456	#14	45'-0"	
v209(E)	22	#5	7'-1"	
v210(E)	88	#5	14'-8"	
v211(E)	11	#6	8'-0"	
v212(E)	22	#6	9'-0"	
v213(E)	22	#5	14'-8"	
v214(E)	240	#9	12'-1"	
v215	108	#11	36'-9"	
v216	456	#14	41'-0"	
v217(E)	54	#11	38'-3"	
Granular Backfill for Structures		Cu. Yd.	236	
Structure Excavation		Cu. Yd.	712	
Concrete Structures		Cu. Yd.	112	
Concrete Superstructure		Cu. Yd.	13	
Reinforcement Bars		Pound	427540	
Reinforcement Bars, Epoxy Coated		Pound	38990	
Permanent Casing		Foot	172	
Drilled Shaft In Soil		Cu. Yd.	931	
Concrete Sealer		Sq. Ft.	2499	
Geocomposite Wall Drain		Sq. Yd.	77	
Pipe Underdrain for Structures 4"		Foot	199	
Class SI Concrete Miscellaneous		Cu. Yd.	41	
Crosshole Sonic Logging		Each	1	



- NOTES:**
- When splicing spiral reinforcement is necessary, the spiral shall be provided with 1/2 extra turns at the ends to be spliced. These additional turns shall either be welded together according to AWS D1.4 or shall both terminate with a 135° standard hook.
 - Drilling and grouting of d200(E) bars included with Class SI Concrete Miscellaneous pay item.
 - Bars noted thus, 3x2-#5 indicates 3 lines of bars with 2 lengths of bars per line.
 - For details of Bar Splicers see sheet SI-45.
 - Contractor to use Mechanical Splicers in drilled shafts that will fit between spirals.



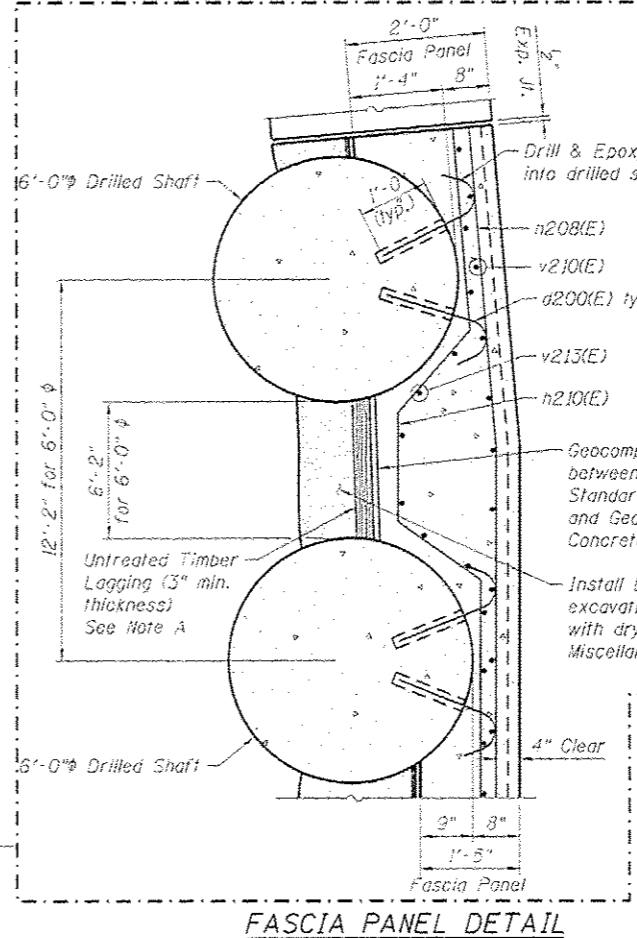
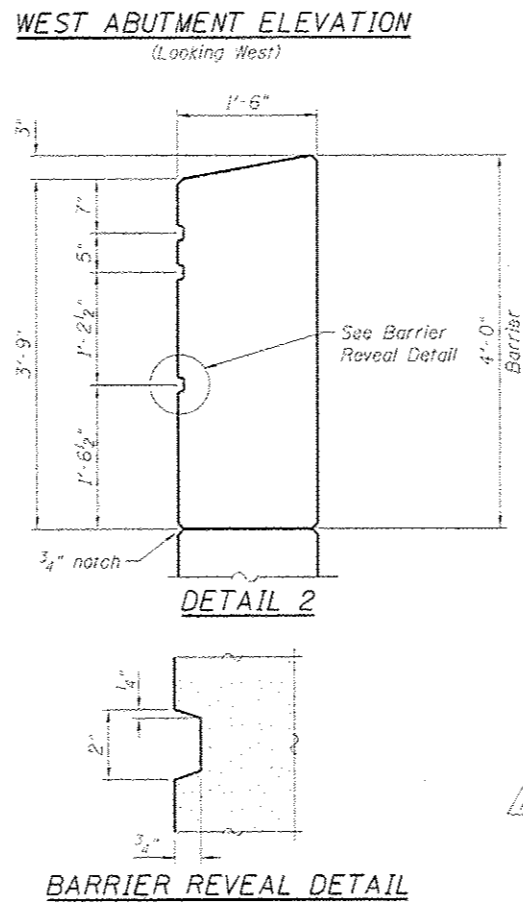
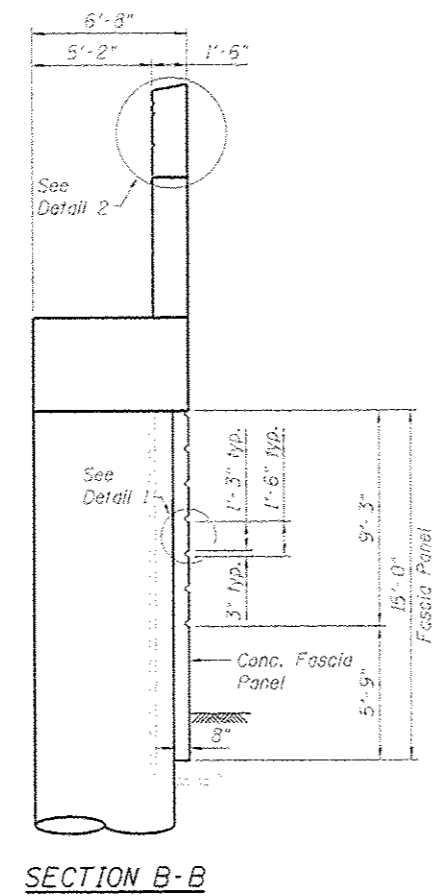
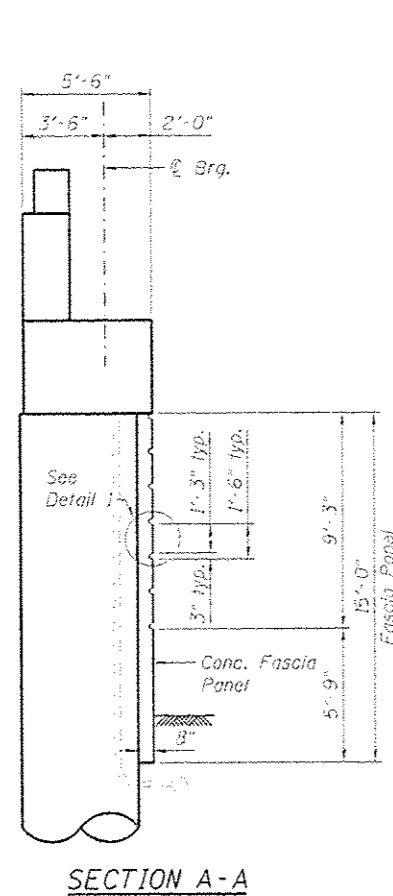
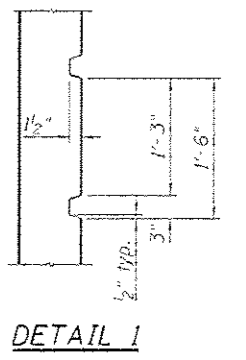
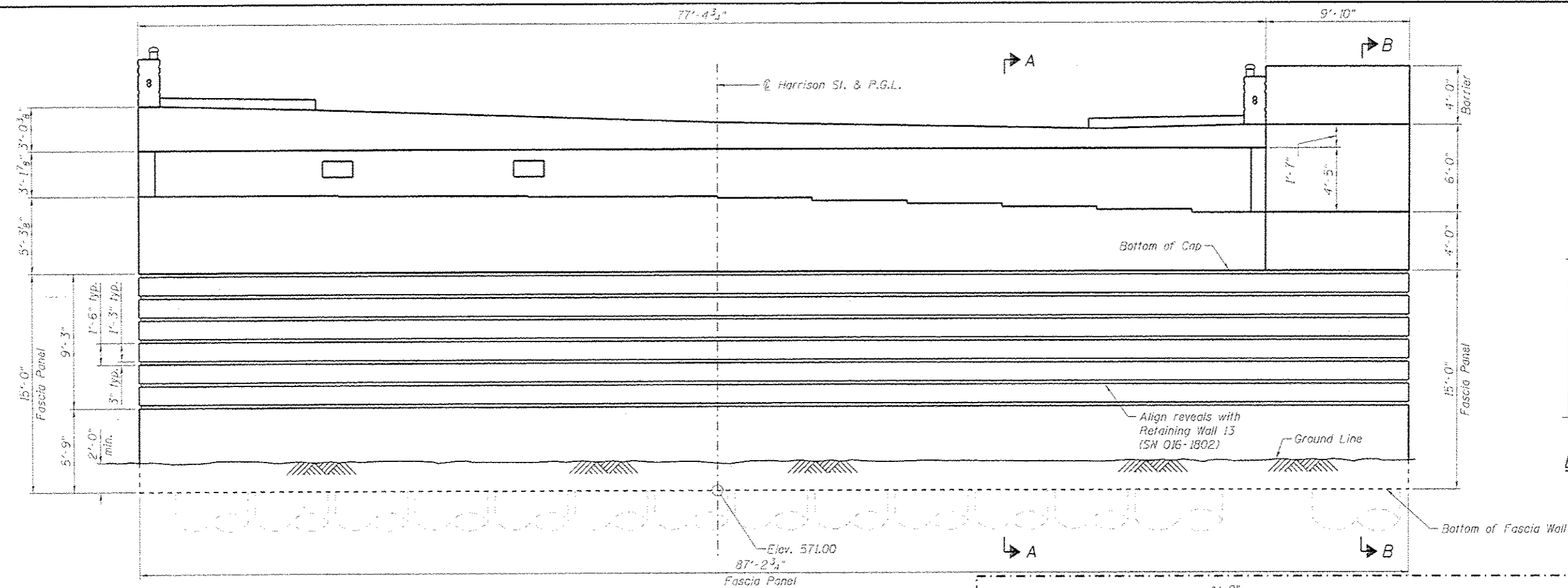
Note A:
Bundle v208 bars with v216 bars.

*** Contractor may need to increase the casing thickness to withstand the installation process. See Article 516.06(a) of the Standard Specifications.

**** Quantity shown is for Geocomposite Wall Drain behind W. Abut. Geocomposite Wall Drain between shafts shall be included with Class SI Concrete Miscellaneous. Estimated Quantity = 31 Sq. Yd.

* Length is height of spiral
** Shown for information only. Cost included with Class SI Concrete Miscellaneous

0161713-60R26-S35-Abutment



Note A:
The Contractor is responsible for the design and performance of the lagging system, using no less than a 3 in. nominal rough-sawn thickness and timber with a minimum allowable bending stress of 1,000 psi, until the concrete facing is installed. The Contractor shall submit design calculations and details prepared by an Illinois Licensed Structural Engineer for the attachment of the lagging to the shaft for approval by the Engineer. Cost Included with Class SI Concrete Miscellaneous.

Geocomposite Wall Drain attached to the back face, install between Drilled Shafts (typ.). Use dry loose sand as per IDOT Standard Specifications to fill voids between undisturbed soil and Geocomposite Wall Drain. Cost Included with Class SI Concrete Miscellaneous.

Install Lagging and Geocomposite Wall Drain from top down as excavation proceeds. Minimize over excavation and backfill voids with dry loose sand. Cost Included with Class SI Concrete Miscellaneous.

- NOTES:**
1. The 3" x 1 1/2" reveal in the fascia panel will not be paid separately and shall be included in the cost of the pay item Class SI Concrete Miscellaneous.
 2. The 2" x 3/4" reveal in the barrier will not be paid for separately and shall be included in the cost of the pay item Concrete Superstructure.
 3. For West Abutment Bill of Material, see sheet SI-36.

WEST ABUTMENT ELEVATION
(Looking West)

SECTION A-A

SECTION B-B

BARRIER REVEAL DETAIL

FASCIA PANEL DETAIL



USER NAME: dunkerlayb	DESIGNED: EJO	REVISION: 10/15/2013 EJO, BRD
PLT SCALE: N.T.S.	CHECKED: ATB	REVISION:
PLT DATE: 9/15/2013	DRAWN: BRD	REVISION:
	CHECKED: EJO	REVISION:

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

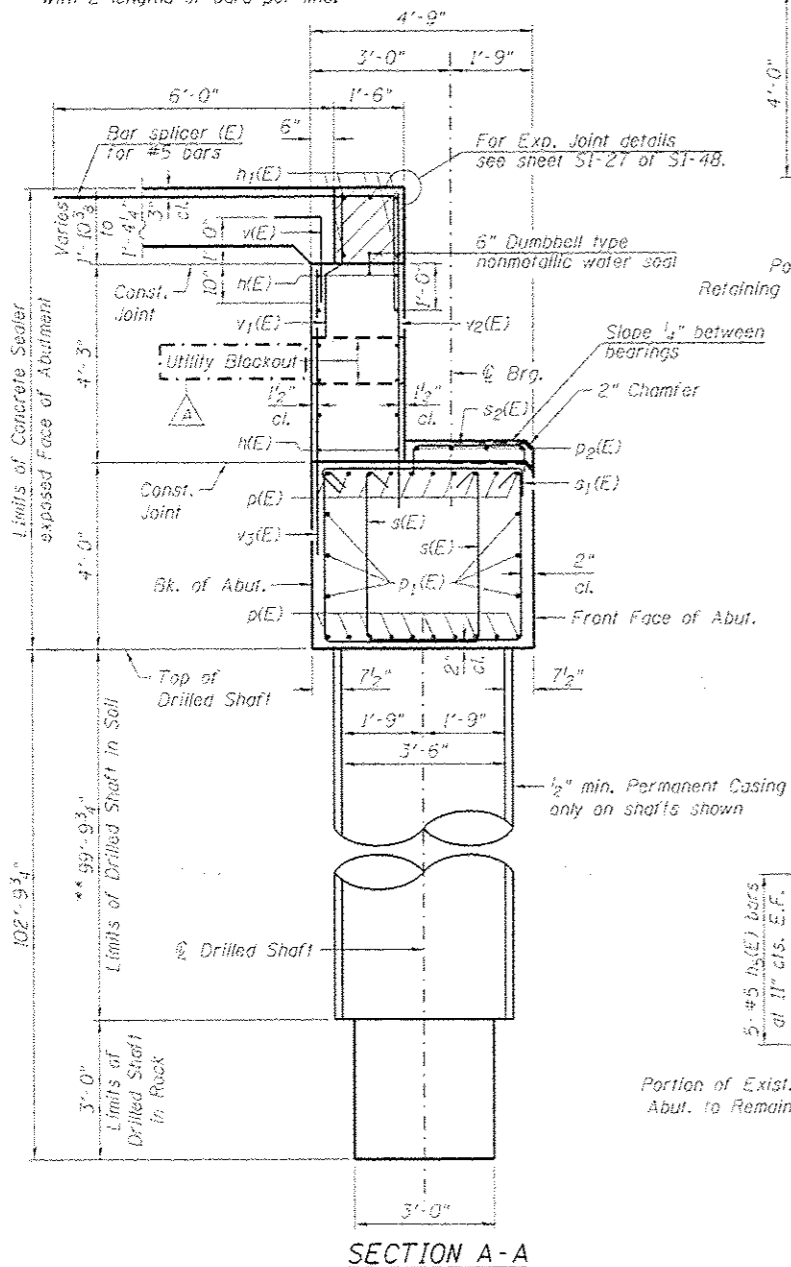
WEST ABUTMENT ARCHITECTURAL DETAILS
STRUCTURE NO. 016-1713

SHEET NO. SI-37 OF SI-40 SHEETS

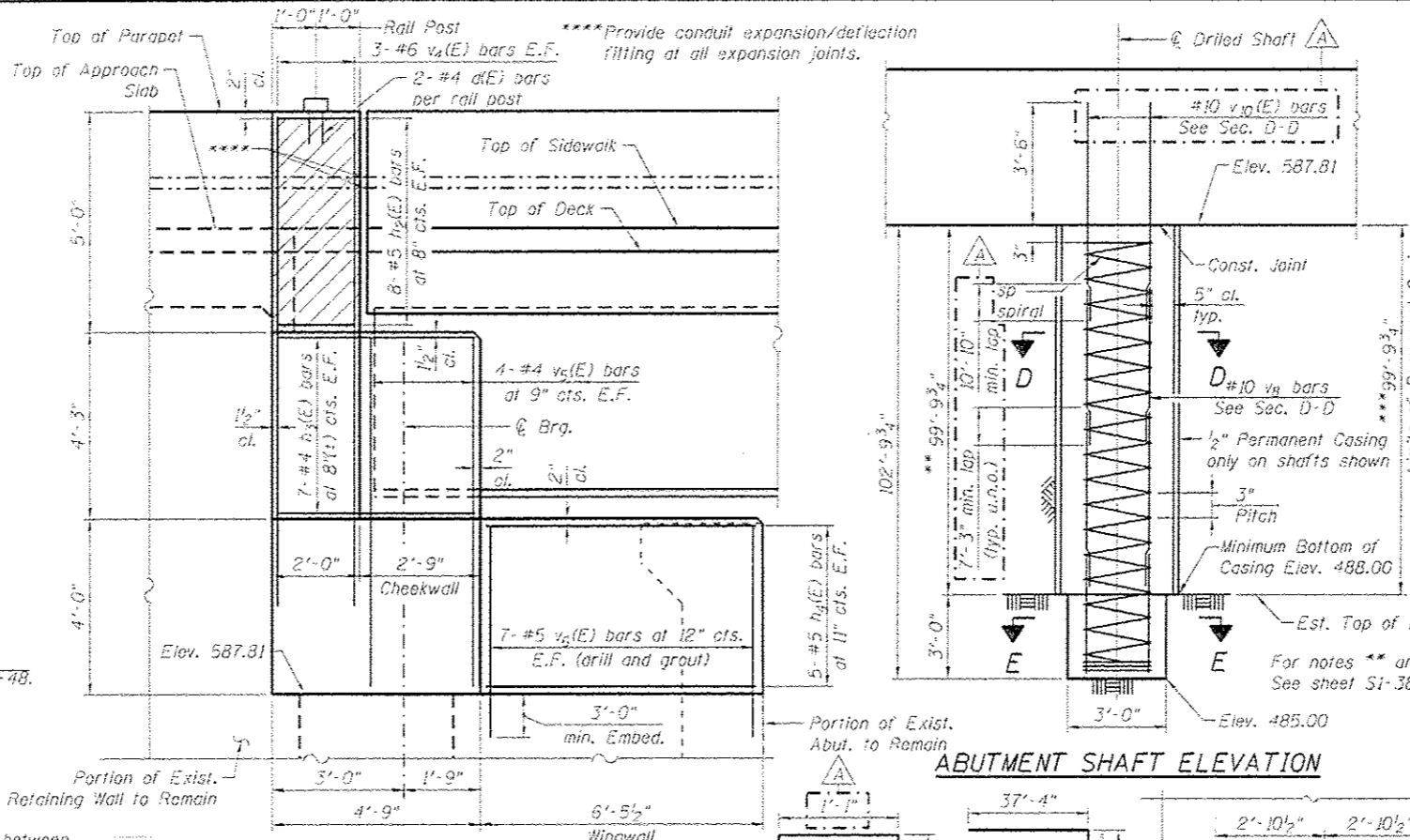
F.A.I. RTE. 90/94/2901	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 569	SHEET NO. 287
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

NOTES:

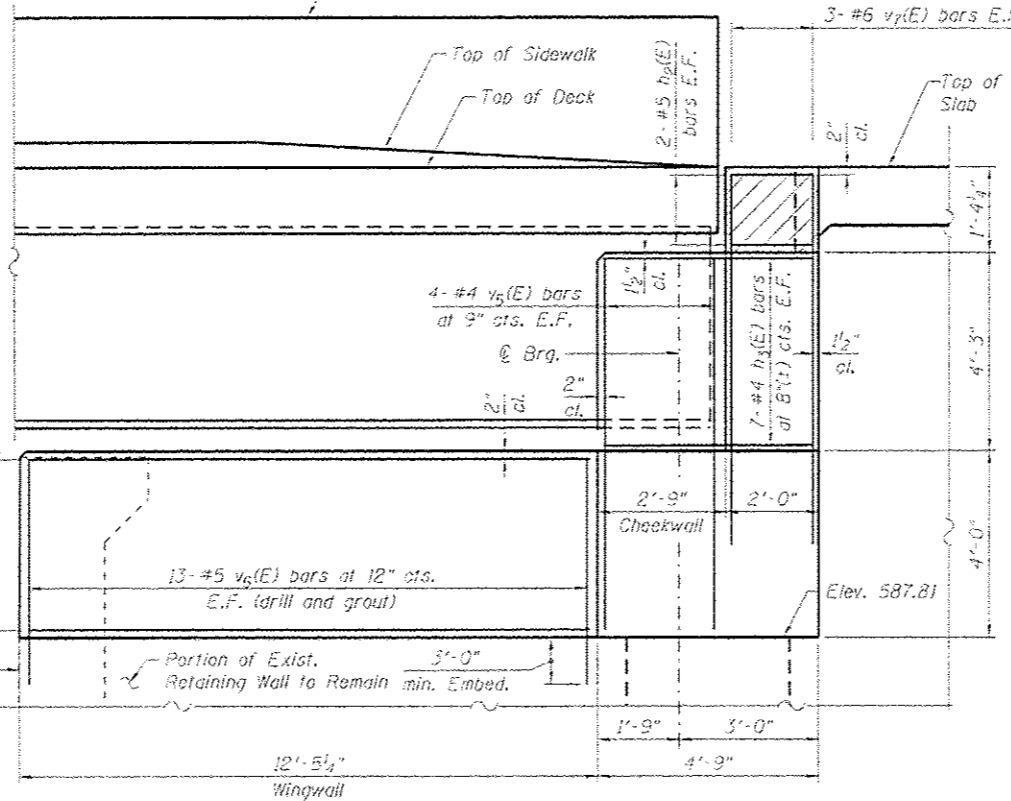
- Hatched area to be poured after superstructure false work has been removed. Quantity of concrete included with Concrete Superstructure.
- Concrete Sealer shall be applied to abutment backwall, bearing seats and exposed faces of abutment cap, cheekwalls and wingwalls.
- When splicing spiral reinforcement is necessary, the spiral shall be provided with 1/2 extra turns at the ends to be spliced. These additional turns shall either be welded together according to AWS D1.4 or shall both terminate with a 135° standard hook.
- E.F. = Each Face
- Drilling and grouting of v6(E) bars are included with Reinforcement Bars, Epoxy Coated pay item.
- For Pipe Underdrain detail see sheet S1-03.
- Bars noted thus, 3x2-#5 indicates 3 lines of bars with 2 lengths of bars per line.



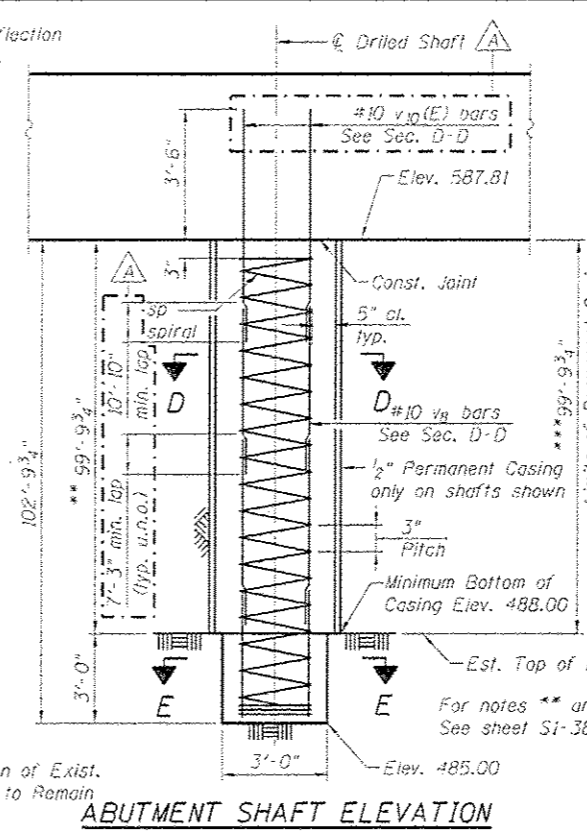
SECTION A-A



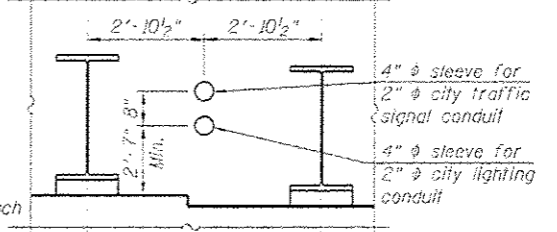
SECTION B-B



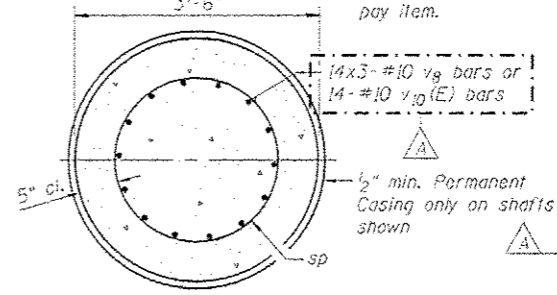
SECTION C-C



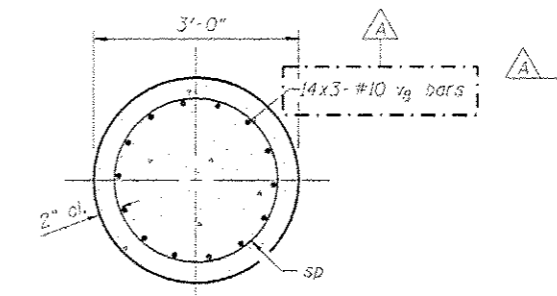
ABUTMENT SHAFT ELEVATION



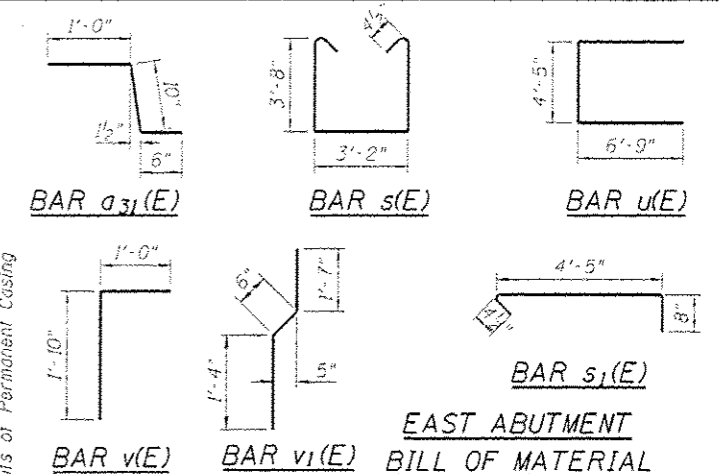
DETAIL 5



SECTION D-D

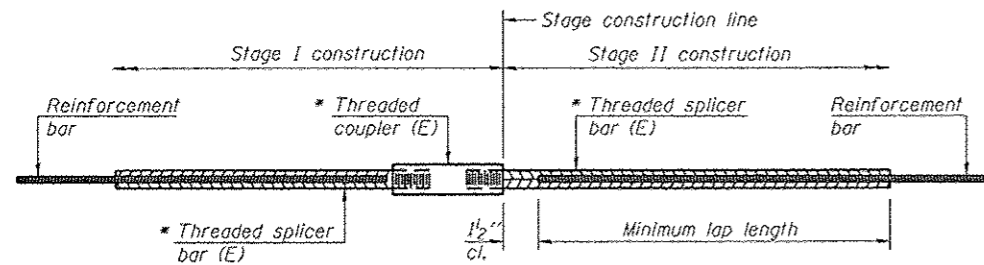


SECTION E-E



Bar	No.	Size	Length	Shape
a30(E)	2	#5	10'-4"	
a31(E)	2	#5	2'-4"	
b30(E)	11	#5	3'-10"	
d(E)	2	#4	2'-7"	
h(E)	36	#5	24'-10"	
h1(E)	10	#6	35'-11"	
h2(E)	20	#5	1'-8"	
h3(E)	28	#4	4'-5"	
h4(E)	10	#5	6'-1"	
h5(E)	10	#5	12'-1"	
h6(E)	24	#5	9'-6"	
h7(E)	8	#5	5'-0"	
p(E)	40	#8	38'-8"	
p1(E)	12	#8	37'-5"	
p2(E)	4	#5	22'-8"	
s(E)	178	#4	11'-3"	
s1(E)	89	#4	5'-5 1/2"	
s2(E)	23	#4	3'-9"	
sp	6	#5	102'-6"	
u(E)	10	#8	17'-11"	
v(E)	66	#5	2'-10"	
v1(E)	66	#5	3'-5"	
v2(E)	66	#6	7'-1"	
v3(E)	66	#6	6'-3"	
v4(E)	6	#6	11'-2"	
v5(E)	16	#4	7'-11"	
v6(E)	40	#5	7'-0"	
v7(E)	5	#6	7'-6"	
v8	252	#10	32'-1"	
v9(E)	24	#5	3'-0"	
v10(E)	84	#10	35'-8"	
Granular Backfill for Structures		Cu. Yd.	145	
Structure Excavation		Cu. Yd.	492	
Concrete Structures		Cu. Yd.	78	
Concrete Superstructure		Cu. Yd.	6	
Reinforcement Bars		Pound	65690	
Reinforcement Bars, Epoxy Coated		Pound	25020	
Permanent Casing		Foot	200	
Drilled Shaft in Soil		Cu. Yd.	214	
Drilled Shaft in Rock		Cu. Yd.	5	
Concrete Sealer		Sq. Ft.	817	
Geocomposite Wall Drain		Sq. Yd.	62	
Pipe Underdrain for Structures 4"		Foot	77	
Crosshole Sonic Logging		Each	1	

For details of Bar Splicers, see sheet S1-45.
* Length is height of spiral.



STANDARD BAR SPLICER ASSEMBLY

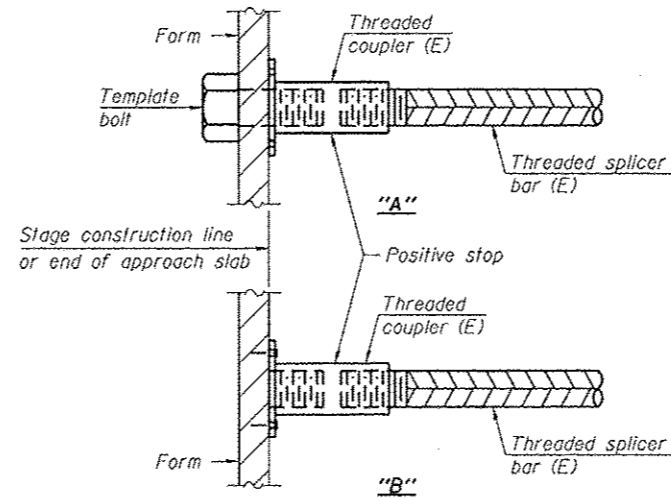
Bar size to be spliced	Minimum Lap Lengths					
	Table 1	Table 2	Table 3	Table 4	Table 5	Table 6
3, 4	1'-5"	1'-11"	2'-1"	2'-4"	2'-7"	2'-11"
5	1'-9"	2'-5"	2'-7"	2'-11"	3'-3"	3'-8"
6	2'-1"	2'-11"	3'-1"	3'-6"	3'-10"	4'-5"
7	2'-9"	3'-10"	4'-2"	4'-8"	5'-2"	5'-10"
8	3'-8"	5'-1"	5'-5"	6'-2"	6'-9"	7'-8"
9	4'-7"	6'-5"	6'-10"	7'-9"	8'-7"	9'-8"

- Table 1: Black bar, 0.8 Class C
- Table 2: Black bar, Top bar lap, 0.8 Class C
- Table 3: Epoxy bar, 0.8 Class C
- Table 4: Epoxy bar, Top bar lap, 0.8 Class C
- Table 5: Epoxy bar, Class C
- Table 6: Epoxy bar, Top bar top, Class C

Threaded splicer bar length = min. lap length + 1 1/2" + thread length

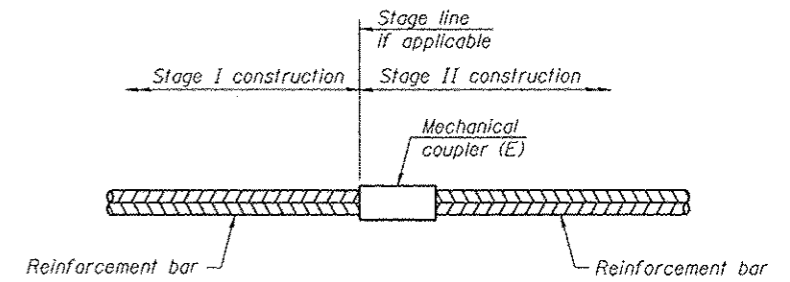
* Epoxy not required on Bar Splicer Assembly components used in conjunction with black bars.

Location	Bar size	No. assemblies required	Table for minimum lap length



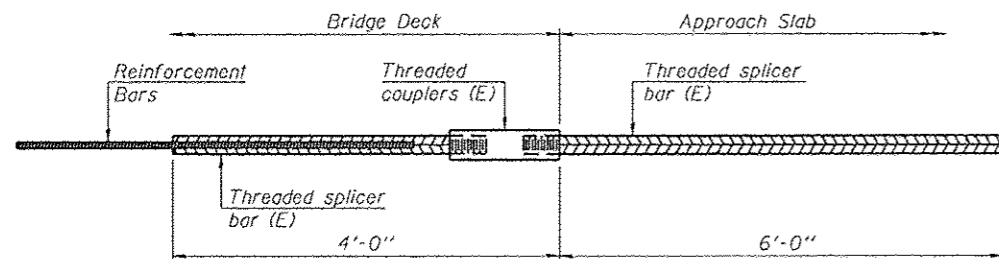
INSTALLATION AND SETTING METHODS

"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.



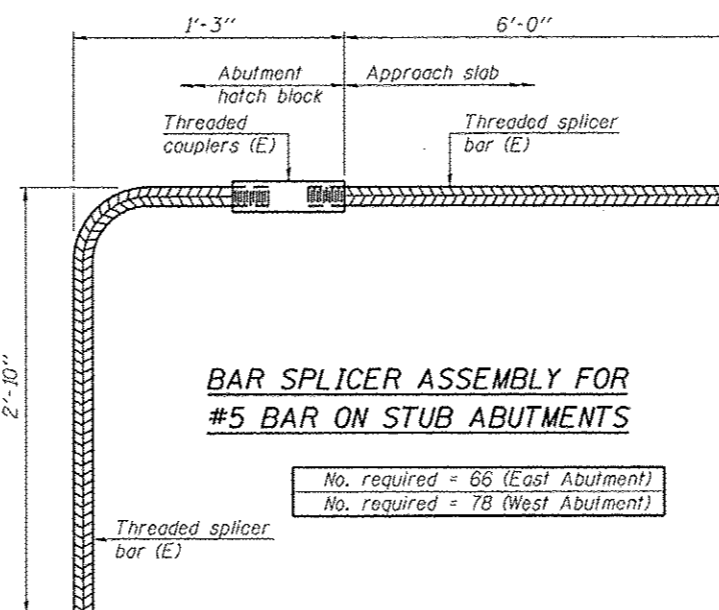
STANDARD MECHANICAL SPLICER

Location	Bar size	No. assemblies required
West Abutment	#14	456



BAR SPLICER ASSEMBLY FOR #5 BAR ON INTEGRAL OR SEMI-INTEGRAL ABUTMENTS

No. required =



BAR SPLICER ASSEMBLY FOR #5 BAR ON STUB ABUTMENTS

No. required = 66 (East Abutment)
 No. required = 78 (West Abutment)

NOTES:

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

016113-60W26-S45-Bar Splice



USER NAME = KRITZM
 PLOT SCALE = N.T.S.
 PLOT DATE = 9/15/2013

DESIGNED - EJO
 CHECKED - ATB
 DRAWN - BRD
 CHECKED - EJO

REVISED Δ 10/15/2013 EJO, BRD
 REVISED
 REVISED
 REVISED

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

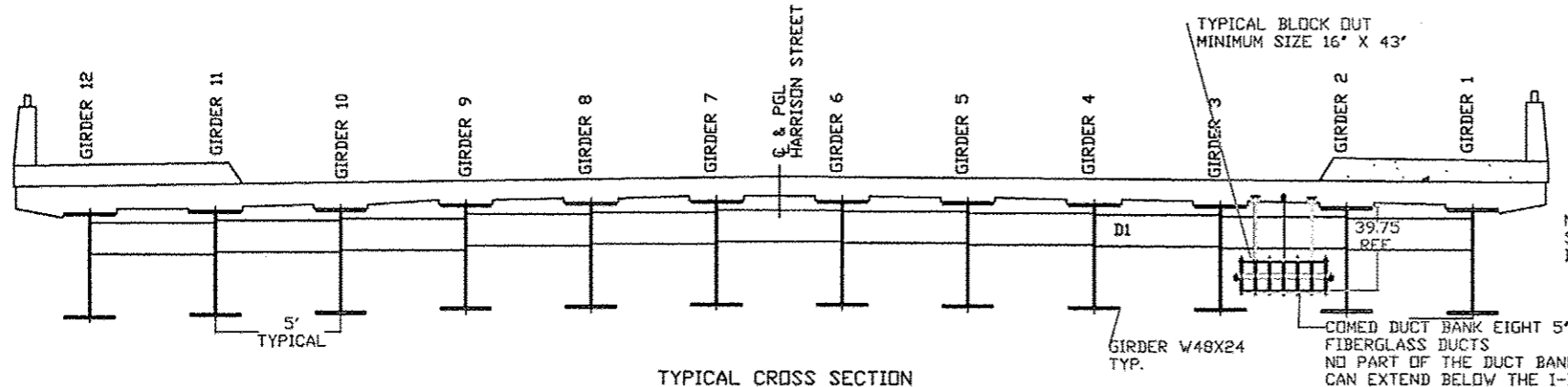
BAR SPLICER ASSEMBLY
 STRUCTURE NO. 016-1713

SHEET NO. 51-45 OF 51-48 SHEETS

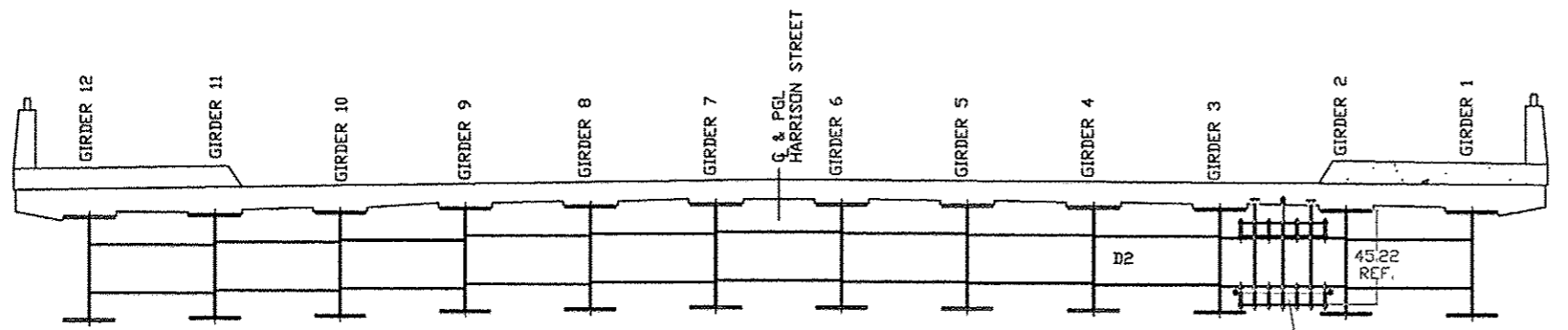
F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	295

CONTRACT NO. 60W26
 ILLINOIS FED. AID PROJECT

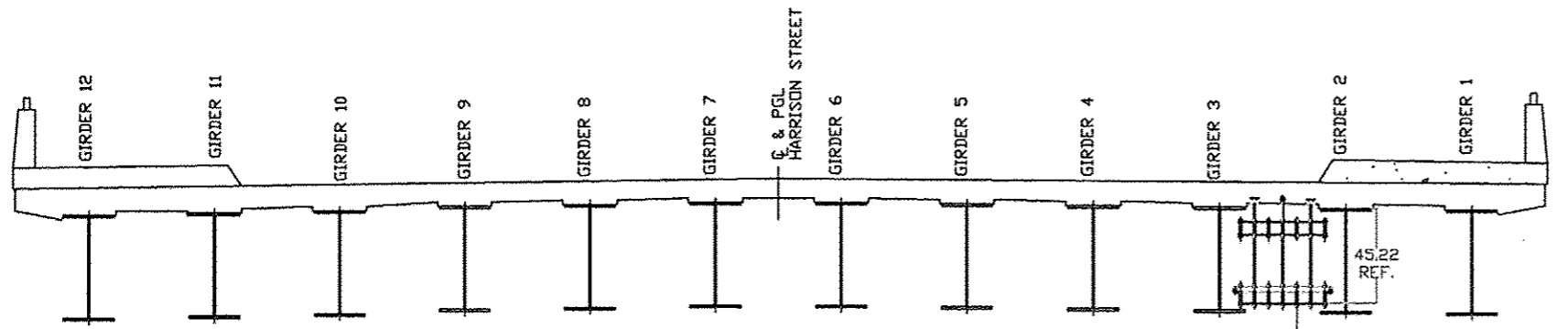
REVISIONS				
ZONE	REV	DESCRIPTION	DATE	APPROVED
	1.0	ADDENDUM A	10/15/2013	BRIAN BB



TYPICAL CROSS SECTION
DIAPHRAGM D1
LOOKING UP STATION
AT NORTH ABUTMENT



TYPICAL CROSS SECTION
DIAPHRAGM D2
LOOKING UP STATION



TYPICAL CROSS SECTION
LOOKING UP STATION

NOTE
SEAL AROUND DUCTS AFTER
INSTALLED THROUGH WALL

COMED DUCT BANK EIGHT 5'
FIBERGLASS DUCTS
NO PART OF THE DUCT BANK
CAN EXTEND BELOW THE I-BEAMS

COMED DUCT BANK EIGHT 5'
FIBERGLASS DUCTS
NO PART OF THE DUCT BANK
CAN EXTEND BELOW THE I-BEAMS

FOR INFORMATION ONLY
WORK TO BE PERFORMED BY OTHERS
WITH THE EXCEPTION OF PLACEMENT
OF INSERTS INTO SUPERSTRUCTURE

NOTE
NO PART OF THE CONDUIT SUPPORT HANGER CAN
EXTEND BELOW THE BRIDGE DECK GIRDER
EXTENDED RODS MAY NEED TO BE ALTERED

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and the information thereon is
to be treated as confidential.
It is not to be used, copied
or disclosed to outside
parties without our written
consent

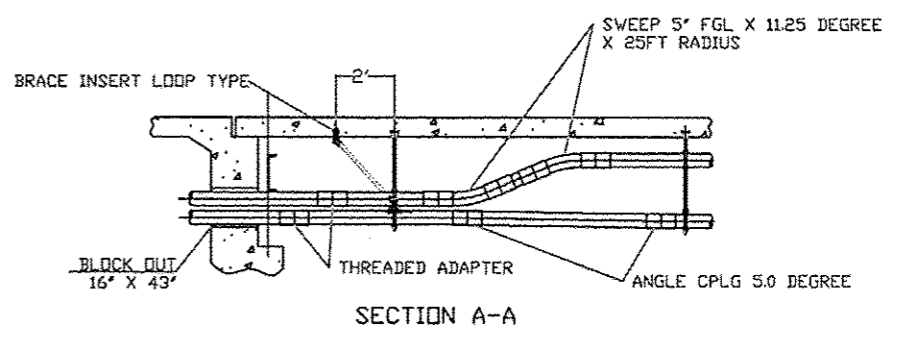
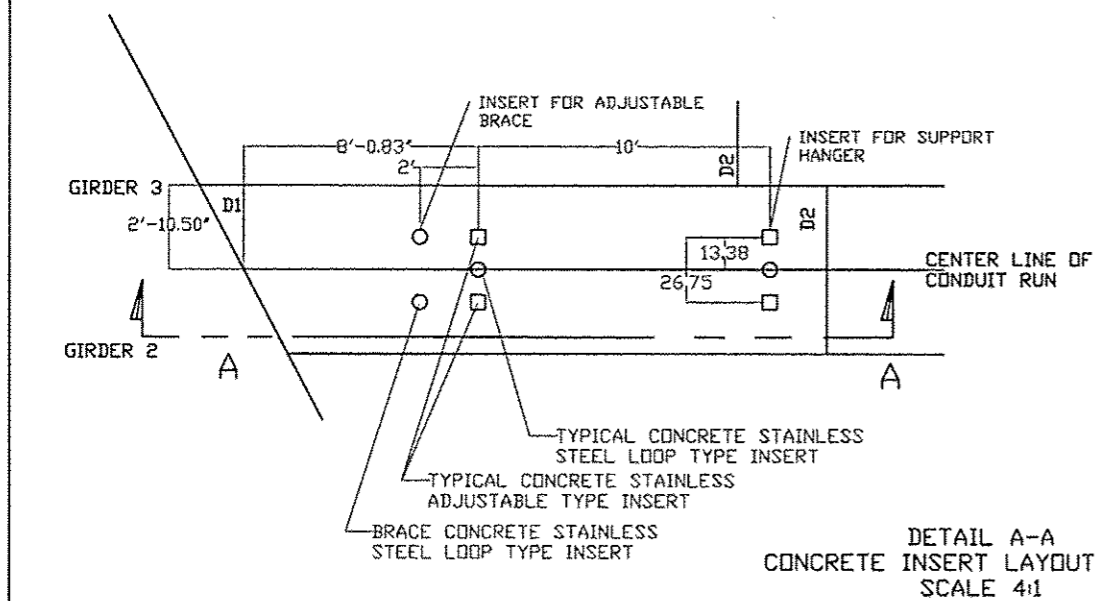
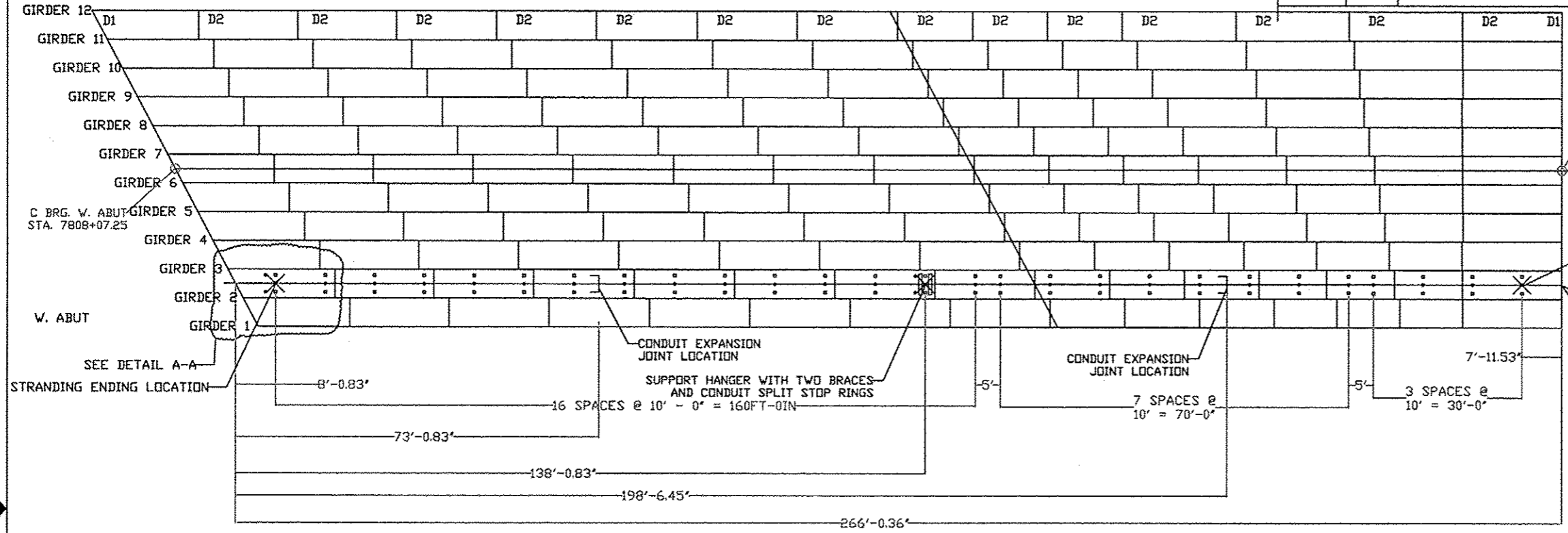
Note:
ALL MEASUREMENTS ARE IN INCHES UNLESS
NOTED OTHERWISE

DRAWING APPROVAL
I APPROVE THIS DRAWING FOR MANUFACTURING
DATE: _____

Bridge Deck Cross Section	CONDUX INTERNATIONAL, INC. MANKATO MN PH. 800-533-2077			
	Project: ComEd Harrison Street Bridge over F.A.I. RTE SB 90/94 Dan Ryan Expressway, Cook County Illinois			
WEIGHT: 0.0 LBS EA	SIZE	FSCM NO.	DWG NO.	REV
QUOTE NO. 3985214498	SCALE 1/2	DATE: 09-11-2013	TBA	1.0
			SHEET: CONDUX 1 OF 6	
			SHEET 298A OF 559	

A

REVISIONS				
ZONE	REV	DESCRIPTION	DATE	APPROVED
	1.0	ADDENDUM A	10/15/2013	BRIAN BB



FOR INFORMATION ONLY
 WORK TO BE PERFORMED BY OTHERS
 WITH THE EXCEPTION OF PLACEMENT
 OF INSERTS INTO SUPERSTRUCTURE

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DETAIL A-A
 CONCRETE INSERT LAYOUT DETAIL
 SCALE 4:1

Note:
 ALL MEASUREMENTS ARE IN INCHES UNLESS NOTED OTHERWISE

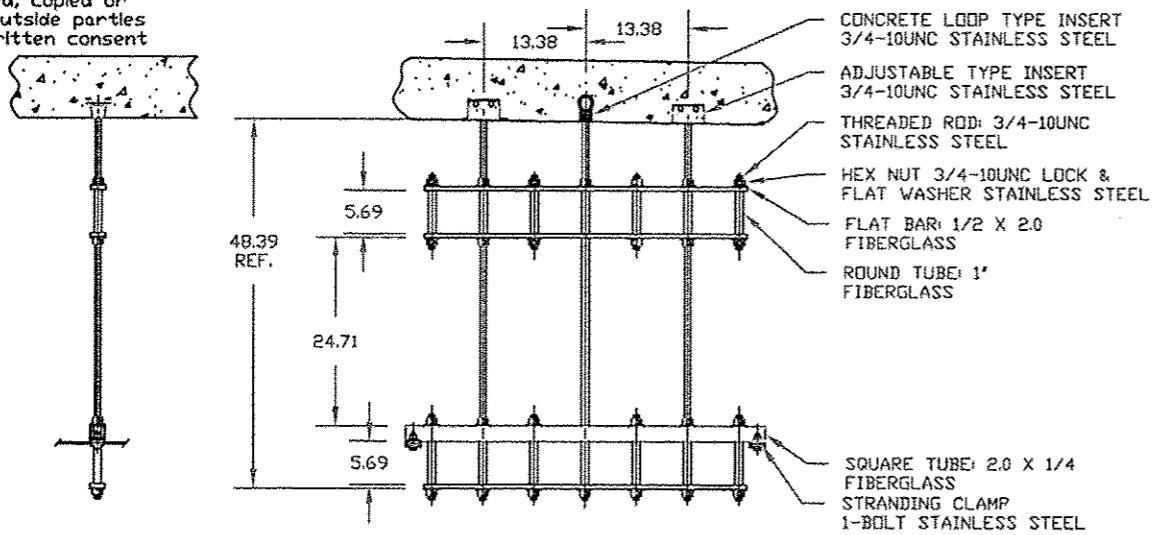
DRAWING APPROVAL
 I APPROVE THIS DRAWING FOR MANUFACTURING
 DATE: _____

CONDUIT SUPPORT AND CONDUIT LAYOUT		CONDUX INTERNATIONAL, INC. MANKATO MN PH. 800-533-2077		
		Project: ComEd Harrison Street Bridge over F.A.I. RTE SB 90/94 Dan Ryan Expressway, Cook County Illinois		
WEIGHT: 0.0 LBS EA	SIZE	FSCM NO.	DWG NO. TBA	REV 1.0
QUOTE NO. 3985214498	SCALE 1/2	DATE: 09-11-2013	SHEET: CONDUX 2 OF 6 SHEET 298B OF 559	

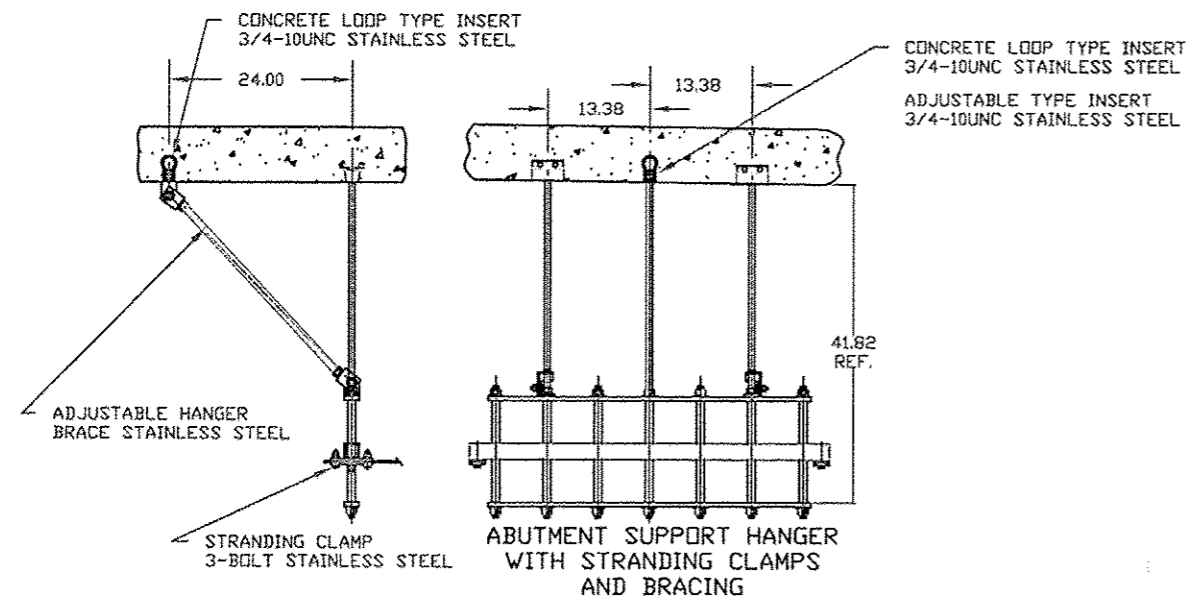
This drawing is the property of Condux International, Inc. and the information thereon is to be treated as confidential. It is not to be used, copied or disclosed to outside parties without our written consent.

REVISIONS

ZONE	REV	DESCRIPTION	DATE	APPROVED
	1.0	ADDENDUM A	10/15/2013	BRIAN BB



STANDARD SUPPORT HANGER WITH STRANDING CLAMPS



ABUTMENT SUPPORT HANGER WITH STRANDING CLAMPS AND BRACING

Condux International, Inc. Support hanger meet the following specifications
 Fiberglass Items
 Flat Bar: 1/2 x 2.0
 Round Tube: 1.0" O.D. .105 wall
 Square Tube: 2 x 2 x 1/4
 Fiberglass reinforced with polyester resin with surface veil for better weathering, resin shall contain u.v. inhibitor. Fiberglass is made with continuous strand mat and uni-directional roving, gray in color
 Tensile Strength (ASTM D 638) 30,000 PSI
 Tensile Modulus (ASTM D 638) 2.3E6 PSI
 Flexural Strength (ASTM D 790) 30,000 PSI
 Flexural Modulus (ASTM D 790) 2.3E6 PSI
 Compressive Strength (ASTM D 695) 20,000 PSI
 Compressive Modulus 1.4E6 PSI
 Yield shear strength 2000 PSI
 Barcol hardness 50
 Dielectric strength (ASTM D 149) 200 VPM Min.

Stainless steel Hardware Items
 Threaded Rod
 Threaded rod meets (ASTM/ASME B1.1) (ASTM A307 Grade A) (Tensile Strength 60,000 PSI)
 Hexnut
 Hexnut meets (ANSI/ASME B18.2.2)
 Material: 316 Stainless steel (ASTM F594)
 Flatwasher
 Flatwasher meets (ANSI/ASME B18.22.1)
 Material: 316 stainless steel (ASTM F436)
 Lockwasher
 Lockwasher meets (ANSI/ASME B18.21.1)
 Material: 316 Stainless steel (ASTM F436)
 Stranding Items
 Stranding Clamps (1-Bolt & 3-Bolt)
 Material: 1/4 x 1.5 (316 Stainless Steel)
 Stranding Wire
 Cable: 1/4" Dia (7 X 19 Steel Aircraft)
 304 Stainless Steel
 Bracing
 Adjustable hanger attachment brackets
 Material: angle 2.5 x 2.5 x .25 (316 Stainless steel)

FOR INFORMATION ONLY
 WORK TO BE PERFORMED BY OTHERS
 WITH THE EXCEPTION OF PLACEMENT
 OF INSERTS INTO SUPERSTRUCTURE

NOTE
 NO PART OF THE CONDUIT SUPPORT HANGER
 CAN EXTEND BELOW THE BRIDGE DECK
 GIRDER
 EXTENDED RODS MAY NEED TO BE ALTERED

CURRENT BILL OF MATERIAL

ITEM NO.	PART NO.	DESCRIPTION	QTY	UNIT
1	26125F3524	ABUTMENT CONDUIT SUPPORT HANGER: 2 HIGH X 6 WIDE FIBERGLASS AND STAINLESS STEEL, OPENING FOR EIGHT 5" FGL DUCTS THREADED RODS THREE @ 3/4-10UNC X 54.00 LONG	2	EA.
2	TBA	STANDARD CONDUIT SUPPORT HANGER: 2 HIGH X 6 WIDE FIBERGLASS AND STAINLESS STEEL, OPENING FOR EIGHT 5" FGL DUCTS THREADED RODS THREE @ 3/4-10UNC X 54.00 LONG	26	EA.
3	08610236	HANGER BRACE ADJUSTABLE: 36 INCH STAINLESS STEEL	6	EA.
4	08409990	CONCRETE INSERT: 3/4-10 LOOP TYPE, STAINLESS STEEL	34	EA.
5	08558300	CONCRETE INSERT SETTING PLUG: 3/4-10	34	EA.
6	TBA	CONCRETE INSERT ADJUSTABLE: 3/4-10 STAINLESS STEEL	36	EA.
7	08408950	STRANDING WIRE: 1/4 X 500 FT., STAINLESS STEEL	2	EA.
8	08409404	GUY STRAND CLAMP: 3-BOLT, STAINLESS STEEL	6	EA.
9	08409504	GUY STRAND CLAMP: 1-BOLT, STAINLESS STEEL	32	EA.
10	08460053	CONDUIT FIBERGLASS: 5" IPS, MW (.557 O.D. X .096 WALL) MEETING NEMA TC-14A	2240	FT.
11	08460153	CONDUIT STOP COUPLING: 5" IPS MW	40	EA.
12	08460453	CONDUIT EXPANSION JOINT O-RING TYPE: 5" IPS MW	16	EA.
13	08460953	CONDUIT SPLIT STOP RING: 5" IPS MW	16	EA.
14	08461553	CONDUIT ADAPTER: 5" IPS MW TO 5" GRC	16	EA.
15	TBA	CONDUIT SWEEP: 5" IPS MW 1125 DEGREE X 25FT RADIUS	16	EA.
16	08460253	CONDUIT 5 DEG. ANGLE COUPLING: 5" IPS MW	16	EA.
17	08463402	CONDUIT EPOXY ADHESIVE CARTRIDGE	25	EA.
18	02288990	CONDUIT EPOXY ADHESIVE GUN	1	EA.

General Construction, Hanger and Conduit Notes
 1.0 Recommended spacing between Support is 10 foot.
 2.0 Support Hanger Material shall be manufactured using 316 stainless steel and fiberglass components.
 3.0 Conduit is 5 inch Fiberglass with minimum wall thickness of .096 inch meeting NEMA TC-14A Specs.
 4.0 Conduit joints shall be positive locking adhesive bonded bell and spigot.
 5.0 Conduit expansion joints shall be sliding sleeve with provision for 8 inch of travel.
 6.0 Bridge abutments must have a block out or be sleeved to allow the fiberglass conduit to pass through. After conduit is placed through abutment seal up opening with state approved sealant.
 7.0 Place concrete inserts for future support system. Hangers will be installed at a later date.
 8.0 Conduit support hangers weight 2525 LBS total
 Fiberglass conduit weight 2807 LBS total
 cable weight weight 18,047 LBS total
 Grand total being placed on the bridge is 22,059 LBS.

DRAWING APPROVAL
 I APPROVE THIS DRAWING FOR MANUFACTURING
 DATE: _____
 Note:
 ALL MEASUREMENTS ARE IN INCHES UNLESS NOTED OTHERWISE

CONDUIT SUPPORT HANGER DETAIL AND BILL OF MATERIALS	CONDEX INTERNATIONAL, INC. MANKATO MN PH. 800-533-2077			
	Project: ComEd Harrison Street Bridge over F.A.I. RTE SB 90/94 Dan Ryan Expressway, Cook County Illinois			
WEIGHT: 0.0 LBS EA	SIZE	FSCM NO.	DWG NO.	REV
QUOTE NO. 3985214498			TBA	1.0
SCALE 1/2	DATE: 06-06-2013	SHEET: CONDEX 3 OF 6		
		SHEET 298C OF 559		

Bench Mark: A "T" cut in the SE anchor bolt at the 11th street light N. of Roosevelt on the W. side of Halsted Elev. = 594.06

Existing Structure: SN 016-2081. Constructed in 1950 under F.A. Route 131, Section 2525.1-2B. The bridge was extended to the south and north in 1958 under Section 2525.2-3B. Seven span bridge that measures 436'-11 1/8" from back to back of abutments. Out-to-out width of 69'-4". The spans are supported by 36" wide flange steel I-beams. Substructure is reinforced concrete closed abutments and multi-column piers founded on timber piles or drilled shafts. The existing bridge is to be removed and replaced.

Traffic to be maintained utilizing Staged Construction.

No Salvage.

Construction of Pier 3 is adjacent to the EB CTA Blue Line track. Construction activities required on the EB CTA Blue Line track will be allowed during track closures only. Overnight track closures are allowed between 22:00 hours and 04:00 hours. Weekend track closures are allowed from 22:00 hours Friday to 04:00 hours on Monday. See Special Provision

LOADING HL-93

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

DESIGN SPECIFICATIONS

2012 AASHTO LRFD Bridge Design Specifications
6th Edition, with 2013 Interim Revisions

DESIGN STRESSES

FIELD UNITS

f'c = 3,500 psi
fy = 60,000 psi (Reinforcement)
fy = 50,000 psi (M270 Grade 50)
fy = 36,000 psi (M270 Grade 36)

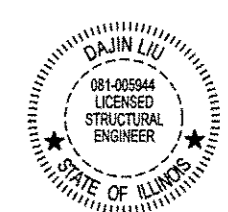
SEISMIC DATA

Seismic Performance Zone (SPZ) = 1
Design Spectral Acceleration at 1.0 sec. (S_{D1}) = 0.085g
Design Spectral Acceleration at 0.2 sec. (S_{D5}) = 0.144g
Soil Site Class = D

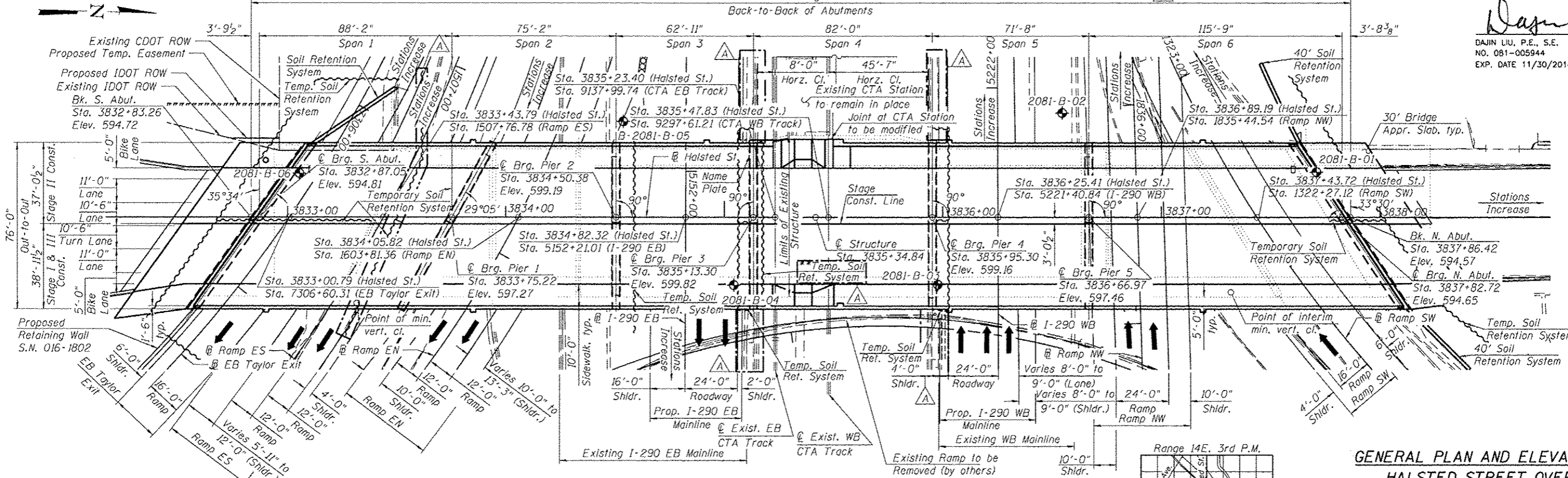
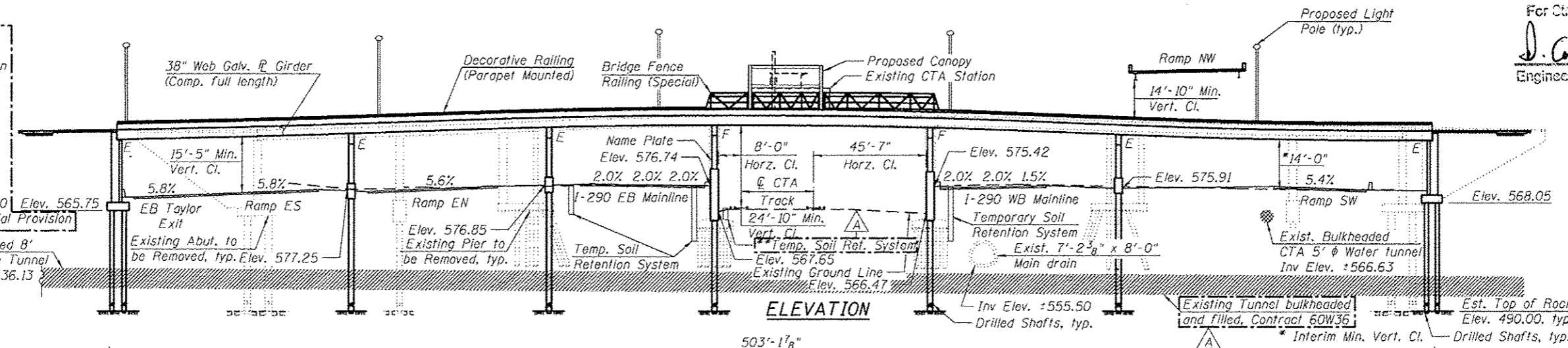
APPROVED

For Structural Adequacy Only

J. Cal Perry
Engineer of Bridges & Structures



Dajin Liu
DAJIN LIU, P.E., S.E.
NO. 081-005944
EXP. DATE 11/30/2014
8/20/13



PLAN



GENERAL PLAN AND ELEVATION
HALSTED STREET OVER
F.A.I. RTE. 290
(EISENHOWER EXPRESSWAY) AND CTA
F.A.U. RTE. 3730 - SECTION 2013-008R
COOK COUNTY
STATION 3835+34.84
STRUCTURE NO. 016-1716

Note:
For Limits of Protective Shield, see Sheet S2-12 of S2-81.

10:43:00 AM 0161716-60W26-S001-CPE



USER NAME: BAWHort	DESIGNED: KAH	REVISED: 10/15/2013 KAH
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PLOT DATE:	DRAWN: RLS/MTS	REVISED:
	CHECKED: DL	REVISED:

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SHEET NO. S2-01 OF S2-81 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	361
CONTRACT NO.			60W26	
ILLINOIS FED. AID PROJECT				

GENERAL NOTES:

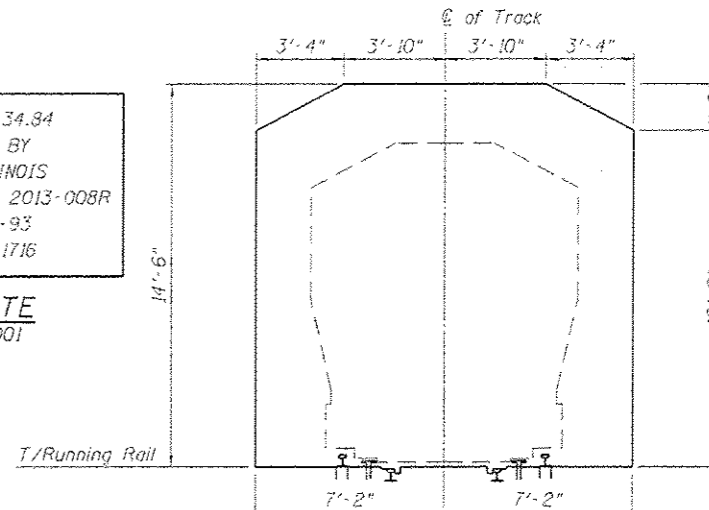
- Fasteners shall be ASTM A325 Type 3, hot dip galvanized bolts. Bolts 7/8 in. ϕ , holes 15/16 in. ϕ , unless otherwise noted (See special provision for Hot Dip Galvanizing for Structural Steel).
- Calculated weight of Structural Steel = 1,409,180 pounds (AASHTO M270 Grade 50).
Calculated weight of Structural Steel = 160,150 pounds (AASHTO M270 Grade 36).
- All structural steel shall be hot dip galvanized. See special provision for Hot Dip Galvanizing For Structural Steel.
- Expansion joint plates and attached bars shall be shop painted with the inorganic zinc rich primer.
- Girders have bearing stiffeners and connection plates as required design. Additional stiffeners may be added at the Contractor's expense as necessary to prevent distortion of the girders during galvanizing. The Contractor shall coordinate with the fabricator and the galvanizer to determine if additional stiffeners are necessary, and where these should be placed. Any proposed changes shall be submitted to the Engineer for approval prior to making any changes.
- Temporary stiffener angles shall be bolted to each side of the splice ends of each girder segment to prevent distortion during galvanizing. Temporary stiffener angles shall bolt or fit tight against the top and bottom flanges and shall include spacer tubes to minimize damage to galvanizing during removal. Cost included with "Furnishing and Erecting Structural Steel".
- No field welding is permitted except as specified in the contract documents.
- Reinforcement bars designated (E) shall be epoxy coated.
- Plan dimension and details relative to existing plans are subject to nominal construction variation. The Contractor shall field verify existing dimensions and details affecting new construction or ordering of material. Such variation shall not be cause for additional compensation for a change in scope of work, however, the Contractor will be paid for the quantity actually furnished at the unit price bid for the work.
- Bearing seat surfaces shall be constructed or adjusted to the designated elevations within a tolerance of 1/8 inch (0.01 ft.). Adjustment shall be made either by grinding the surface or by shimming the bearings.
- Concrete Sealer shall be applied to the designated areas of the Piers and Abutments.
- The existing structural steel coating contains lead. The Contractor shall take appropriate precautions to deal with the presence of lead on this project.
- For Conduit Attached to Structure quantities and details, see Electrical Plans.
- The contractor shall exercise extreme caution during construction to make certain that construction activities, live load surcharge and other loads applied to the structures will not have detrimental effects on the adjacent building foundations and the existing 7'-2 3/4" x 8'-0" main drain. Any damage to the main drain during construction shall be repaired by the contractor at his expense and no charge to the department. Driving piles and temporary sheet piling is not allowed.
- For light pole support system, see Electrical Plans.
- Abandoned 8' diameter CTA Water Tunnel shall be filled prior to the start of drilled shaft construction in a previous contract. The Contractor shall verify with the Engineer that the tunnel has been filled prior to the start of drilled shaft construction. A number of the drilled shaft foundations will be placed through this tunnel. Drilling operations must account for the presence of debris, brick material, CLSM and bedding material in addition to soil and other expected materials to be encountered.
- Slipforming of parapets is not allowed.

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- S2-03 General Data 2
- S2-04 Foundation Layout
- S2-05 Temporary Excavation Support 1
- S2-06 Temporary Excavation Support 2
- S2-07 Temporary Excavation Support 3
- S2-08 Soil Retention System
- S2-09 Slage Construction Details 1
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- S2-78 Boring Logs 4
- S2-79 Boring Logs 5
- S2-80 Boring Logs 6
- S2-81 Boring Logs 7

STATION 3835+34.84
BUILT 20-- BY
STATE OF ILLINOIS
F.A.U. RT. 3730 SEC. 2013-008R
LOADING HL-93
STR. NO. 016-1716

NAME PLATE
See Sid. 515001



MINIMUM CTA CONSTRUCTION CLEARANCES

TOTAL BILL OF MATERIAL

Item	Unit	Super	Sub	Total Quantity
Removal of Existing Structures No. 2	Each			1
Protective Shield	Sa. Yd.	3478		3478
Structure Excavation	Cu. Yd.		3699	3699
Concrete Structures	Cu. Yd.		2081.9	2081.9
Concrete Superstructure	Cu. Yd.	1699.8		1699.8
Bridge Deck Grooving	Sq. Yd.	3479		3479
Form Liner Textured Surface	Sq. Ft.		2980	2980
Protective Coat	Sa. Yd.	5172		5172
Furnishing and Erecting Structural Steel	L. Sum	0.49		0.49
Stud Shear Connectors	Each	29,379		29,379
Reinforcement Bars	Pound		545,430	545,430
Reinforcement Bars, Epoxy Coated	Pound	322,980	251,570	574,550
Bar Splicers	Each	1354	777	2131
Name Plates	Each		1	1
Permanent Casing	Foot		1914	1914
Drilled Shaft in Soil	Cu. Yd.		2277.7	2277.7
Drilled Shaft in Rock	Cu. Yd.		64.5	64.5
Preformed Joint Strip Seal	Foot	213		213
Elastomeric Bearing Assembly, Type I	Each	30		30
Elastomeric Bearing Assembly, Type II	Each	45		45
Anchor Bolts, 3/8"	Each	30		30
Anchor Bolts, 1"	Each	90		90
Anchor Bolts, 1 1/4"	Each	90		90
Concrete Sealer	Sa. Ft.		23,951	23,951
Geocomposite Wall Drain	Sa. Yd.		469	469
Chain Link Fence, 4'	Foot	131		131
Pile Extraction	Each		133	133
Decorative Railing (Parapet Mounted)	Foot	980		980
Crosshole Sonic Logging	Each	7		7
Bridge Fence Railing (Special)	Foot	145		145
Granular Backfill for Structures	Cu. Yd.	625		625
Temporary Bridge	L. Sum	1		1
Drainage Scuppers, DS-II	Each	2		2
Drainage System	L. Sum	1		1
Pipe Underdrains for Structures 4"	Foot		326	326
Temporary Soil Retention System	Sa. Ft.		17,297	17,297
Temporary Shoring	Each		3	3
Soil Retention System	Sa. Ft.		2106	2106
Temporary Drainage System No. 1	L. Sum	1		1

For information only
Part of future contract

CURVE DATA	CURVE DATA	CURVE DATA	CURVE DATA
P-TAY-ES-3	P-CIR-ES-2	P-CIR-EN-1	P-CIR-SW-3
P.I. Sta. = 7306+04.16	P.I. Sta. = 1510+49.08	P.I. Sta. = 1603+43.61	P.I. Sta. = 1322+16.98
$\Delta = 17^\circ 09' 09''$ (RT)	$\Delta = 63^\circ 26' 03''$ (RT)	$\Delta = 35^\circ 33' 30''$ (RT)	$\Delta = 83^\circ 35' 08''$ (RT)
D = 8° 57' 09"	D = 8° 37' 44"	D = 11° 38' 44"	D = 10° 03' 07"
R = 640.00'	R = 664.00'	R = 492.00'	R = 570.00'
T = 96.57'	T = 410.37'	T = 157.77'	T = 59.51'
L = 191.69'	L = 735.14'	L = 305.34'	L = 831.54'
E = 7.24'	E = 116.58'	E = 24.68'	E = 194.53'
e = 5.80%	e = 5.80%	e = 5.40%	e = 5.40%
T.R. = NA	T.R. = 41'	T.R. = NA	T.R. = NA
S.E. Run = NA	S.E. Run = 120'	S.E. Run = 108'	S.E. Run = 101'
P.C. Sta. = 7305+07.59	P.C. Sta. = 1506+38.71	P.C. Sta. = 1601+85.84	P.C. Sta. = 1317+07.47
P.T. Sta. = 7306+99.28	P.T. Sta. = 1513+73.85	P.T. Sta. = 1604+91.18	P.T. Sta. = 1325+39.01



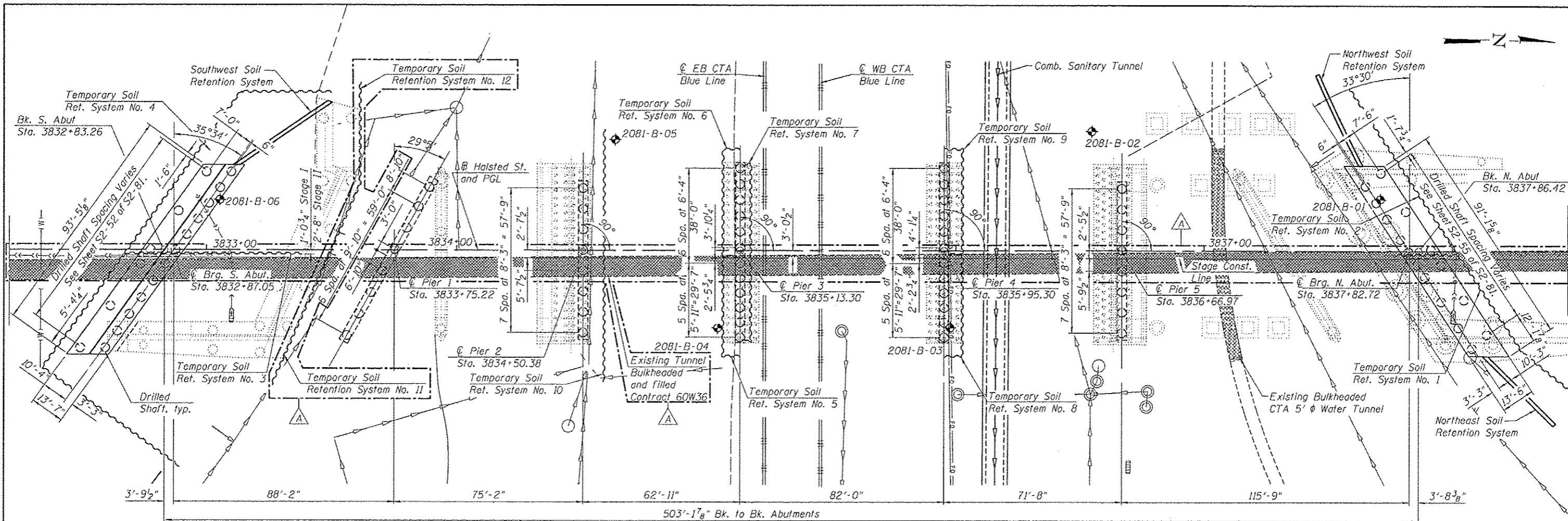
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	CHECKED = KAH	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

GENERAL DATA 1
STRUCTURE NO. 016-1716

F.A.U. RT. = 3730	SECTION = 2013-008R	COUNTY = COOK	TOTAL SHEETS = 559	SHEET NO. = 362
CONTRACT NO. = 60W26			ILLINOIS FED. AID PROJECT	

SHEET NO. S2-02 OF 82-01 SHEETS

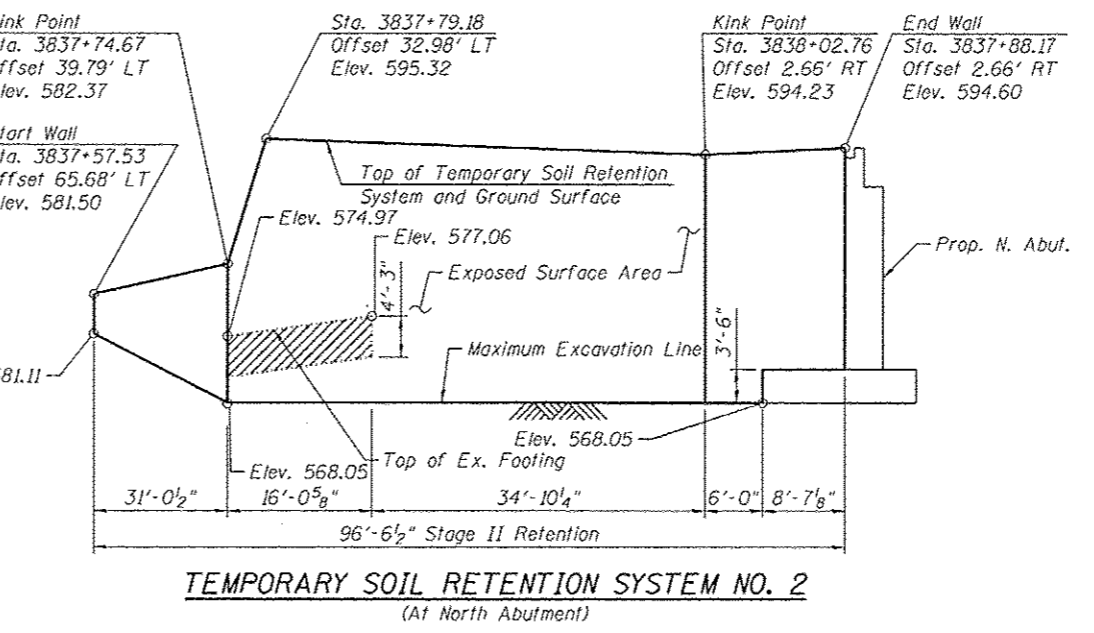
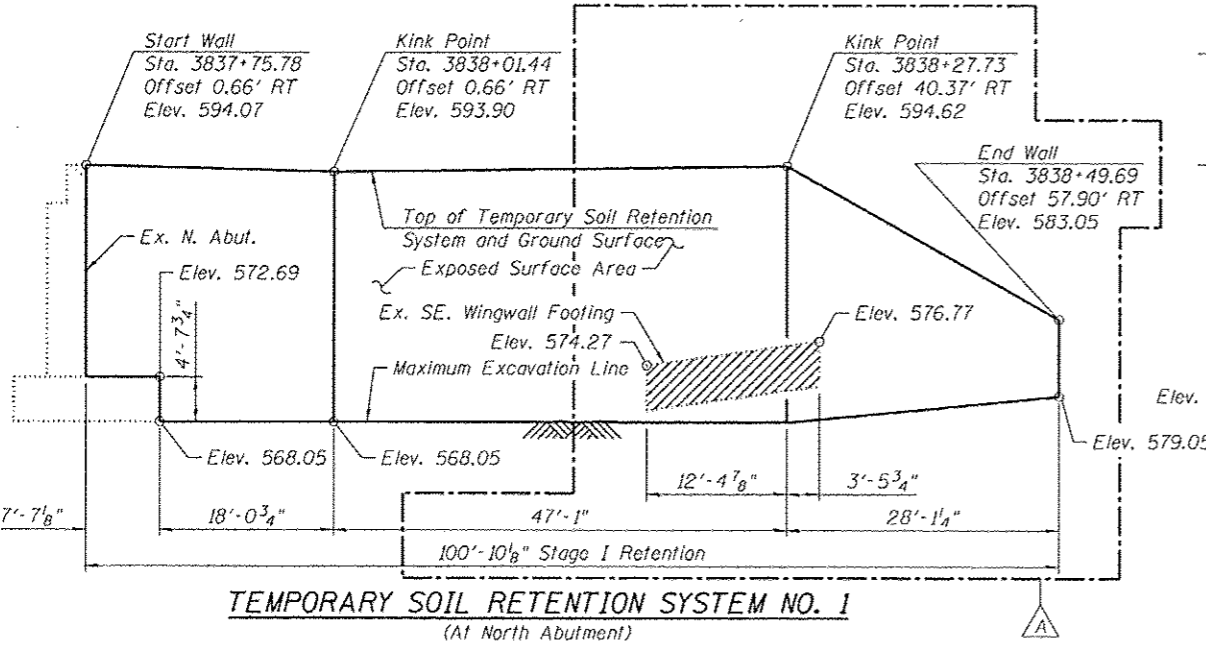


FOUNDATION LAYOUT

LEGEND:

- Combined Sewer
- Storm Sewer
- ITS Fiber Optic
- Water Line
- Soil Boring
- Bulkhead and area filled with grout

Notes:
 Removal of existing structures shall be in accordance with Section 501 of the Standard Specifications. This item shall include complete removal of the concrete bridge rails, concrete deck and superstructure. This item also includes partial removal of the abutment wall and wingwall down to a minimum of 1'-0" below proposed finished grade or specified depth indicated on plans.
 Driving piles and temporary sheet piling is not allowed. A cantilevered sheet piling design does not appear feasible and additional members or other retention systems may be necessary.
 The Contractor shall submit a temporary soil retention system design including plan details and calculations for review and acceptance by the Engineer.
 See the Utility Plan on sheet S2-03 of S2-81 for existing utilities. The maximum allowable excavation slope is 1:2 (V:H).
 For additional Temporary Soil Retention System details see sheets S2-05 thru S2-07 of S2-81.
 For Soil Retention System details see sheet S2-08 of S2-81.



BILL OF MATERIAL

Item	Unit	Quantity
Temporary Soil Retention System	Sq. Ft.	4246

12/11/04 PM 05:17:15 - 60W26-S004-SubStruct-Foundation.dgn

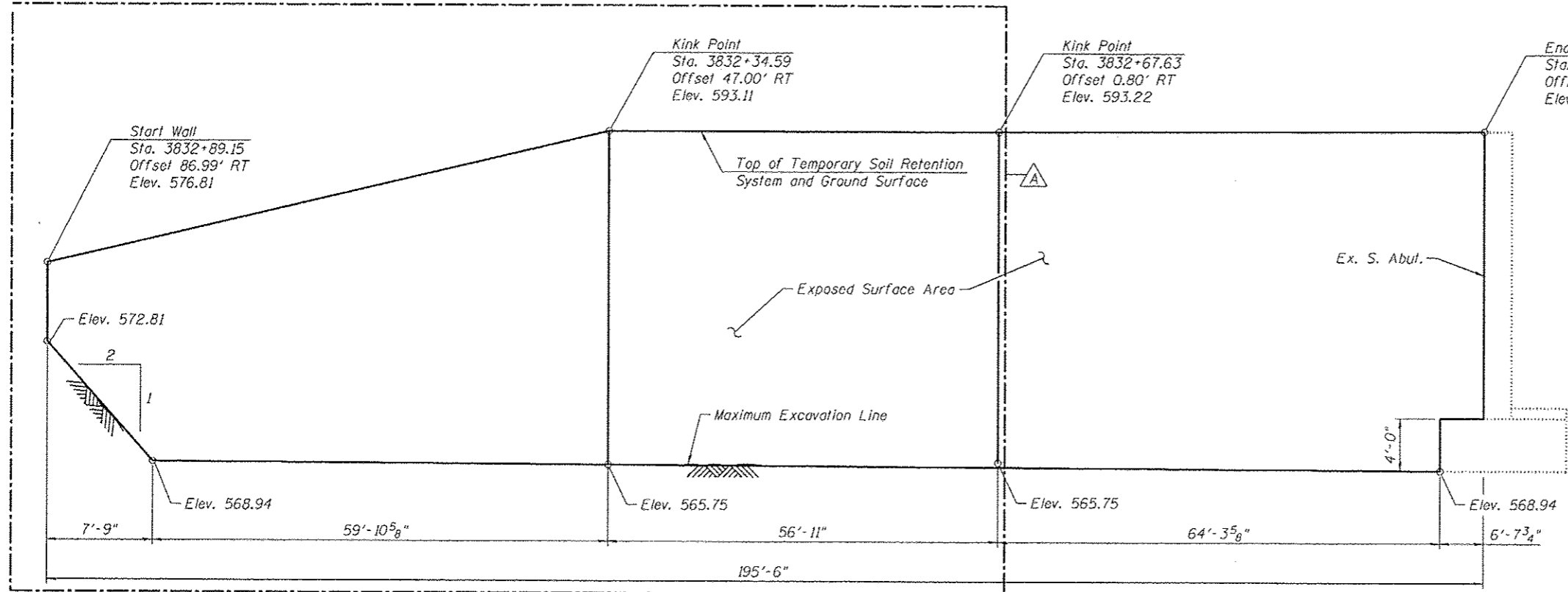


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PLOT DATE = 10/14/2013	DRAWN - RLS	REVISION
	CHECKED - MDS	REVISION

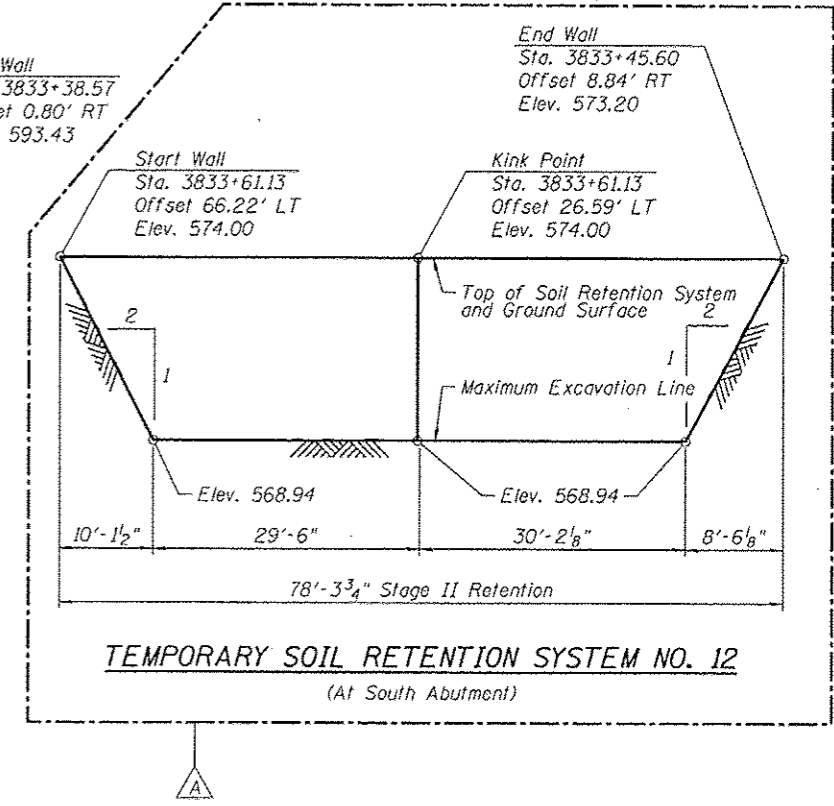
**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**FOUNDATION LAYOUT
STRUCTURE NO. 016-1716**
SHEET NO. S2-04 OF S2-81 SHEETS

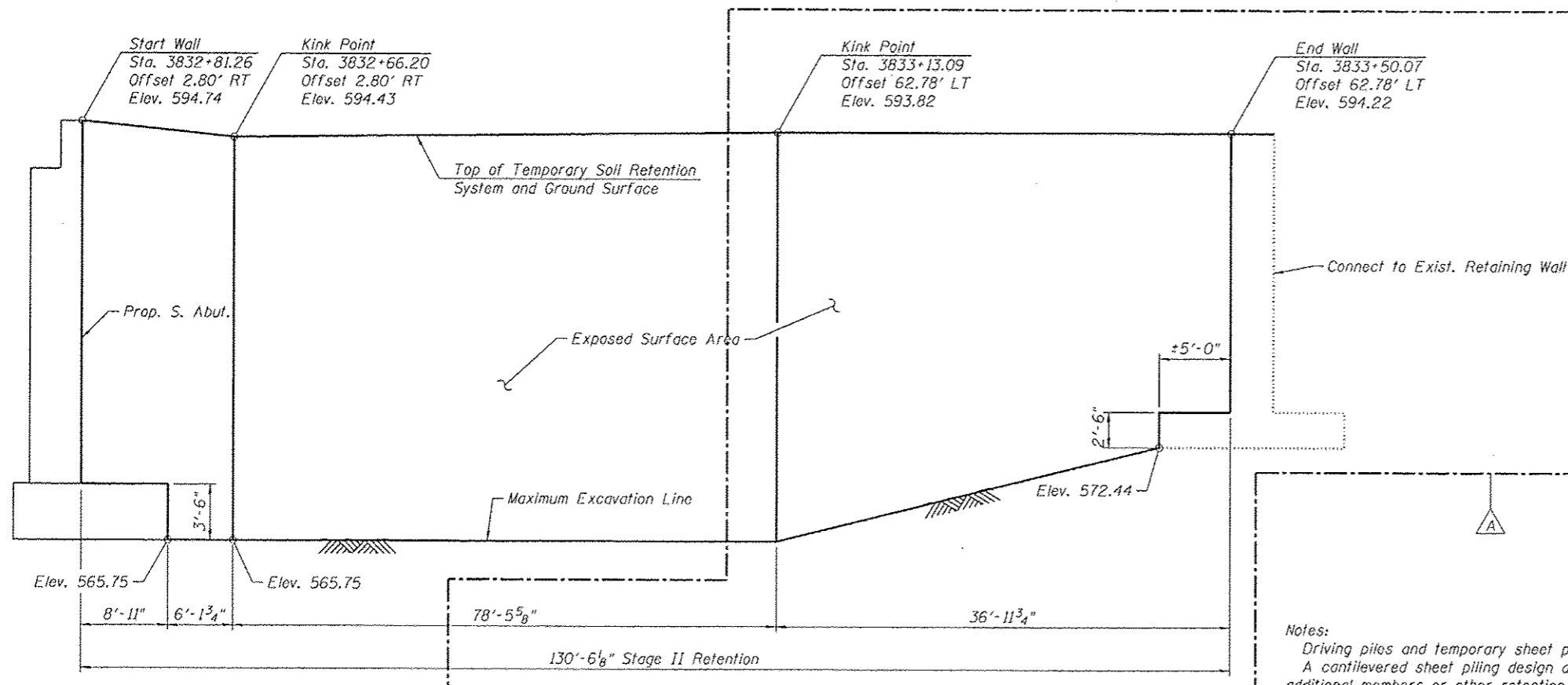
F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	364
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



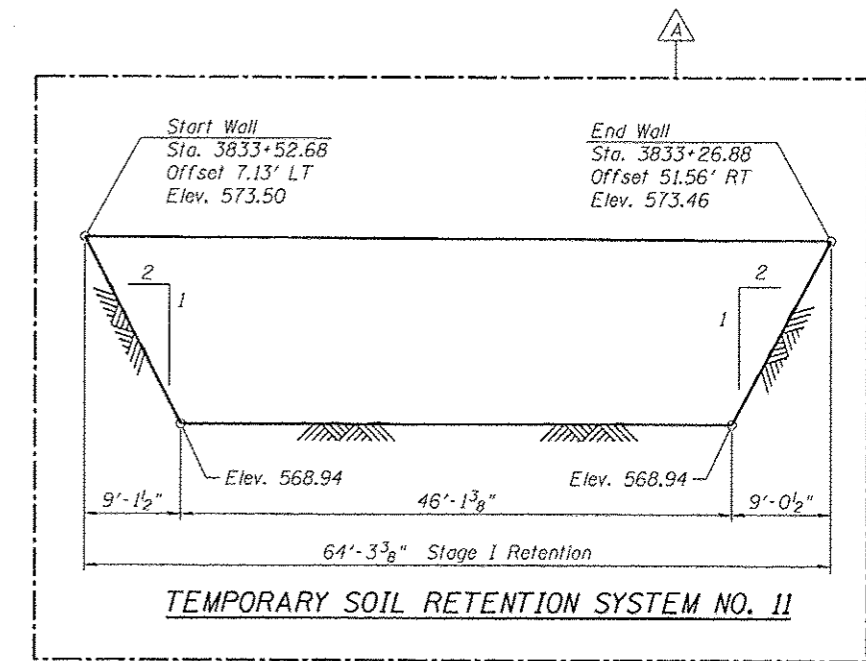
TEMPORARY SOIL RETENTION SYSTEM NO. 3
(At South Abutment)



TEMPORARY SOIL RETENTION SYSTEM NO. 12
(At South Abutment)



TEMPORARY SOIL RETENTION SYSTEM NO. 4
(At South Abutment)



TEMPORARY SOIL RETENTION SYSTEM NO. 11

Notes:
Driving piles and temporary sheet piling is not allowed.
A cantilevered sheet piling design does not appear feasible and additional members or other retention systems may be necessary.
The Contractor shall submit a soil retention system design including plan details and calculations for review and acceptance by The Engineer.
The maximum allowable excavation slope is 1:2 (V:H).

BILL OF MATERIAL

Item	Unit	Quantity
Temporary Soil Retention System	Sq. Ft.	8907

12/11/05 PM 0161716-60W26-S005-SubStruct-TempExc.dgn



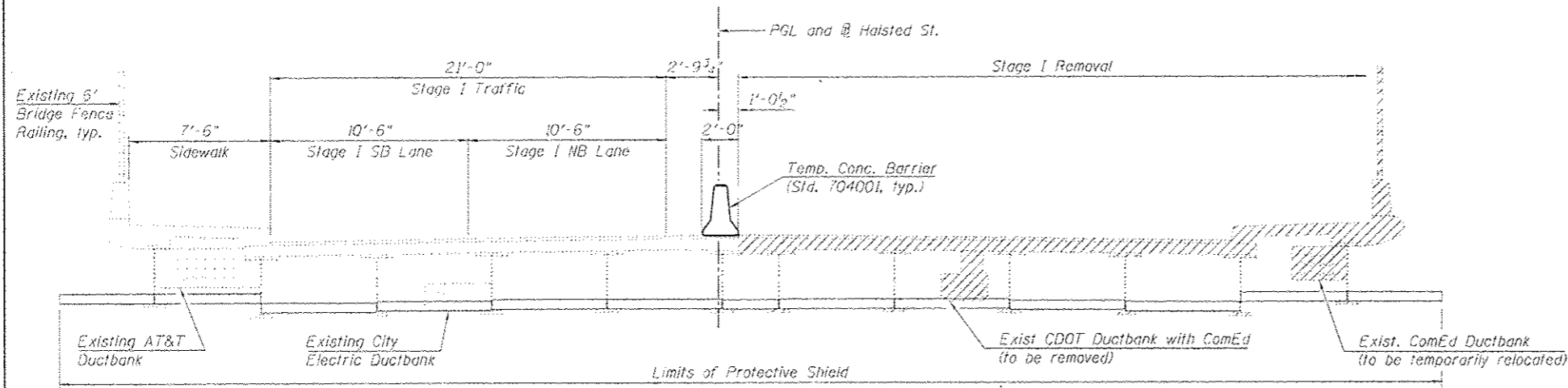
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	CHECKED = MDS	REVISED

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**TEMPORARY EXCAVATION SUPPORT 1
STRUCTURE NO. 016-1716**

SHEET NO. S2-05 OF S2-81 SHEETS

F.A.I. RTE. 3730	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 365
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



STAGE I REMOVAL

STAGE I REMOVAL

1. Install temporary concrete barrier as shown to locate construction work area on the east side of the existing structure.
2. Remove the existing CDOT ductbank with ComEd between existing girders 8 and 9 and remove the existing ComEd ductbank between existing girders 11 and 12. See Lighting and ITS plans. Utilities to be located to west portion of the existing bridge.
3. Install Temporary Soil Retention System at the abutments and Piers 2, 3 and 4.
4. Remove the existing structure as indicated.

STAGE I CONSTRUCTION

The following construction items will be performed within the limits of Stage I Construction:

1. Drill and cast drilled shafts for abutments and piers as shown in Foundation Layout.
2. Construct abutments, piers and soil retention systems.
3. Erect Girders 8 through 15.
4. Construct reinforced concrete deck and approach slab. Set reinforcement bars for east parapet. Set reinforcement expansion anchor or Ferrule Loop Slab insert for east sidewalk.
5. Perform bridge deck grooving for the bridge deck.
6. Apply protective coat for the bridge deck.
7. Erect ComEd ductbank.
8. Place temporary pavement markings on the top of deck for staged traffic.
9. Provide a temporary drainage system. Connection of formwork to girder must be designed to withstand additional loading.

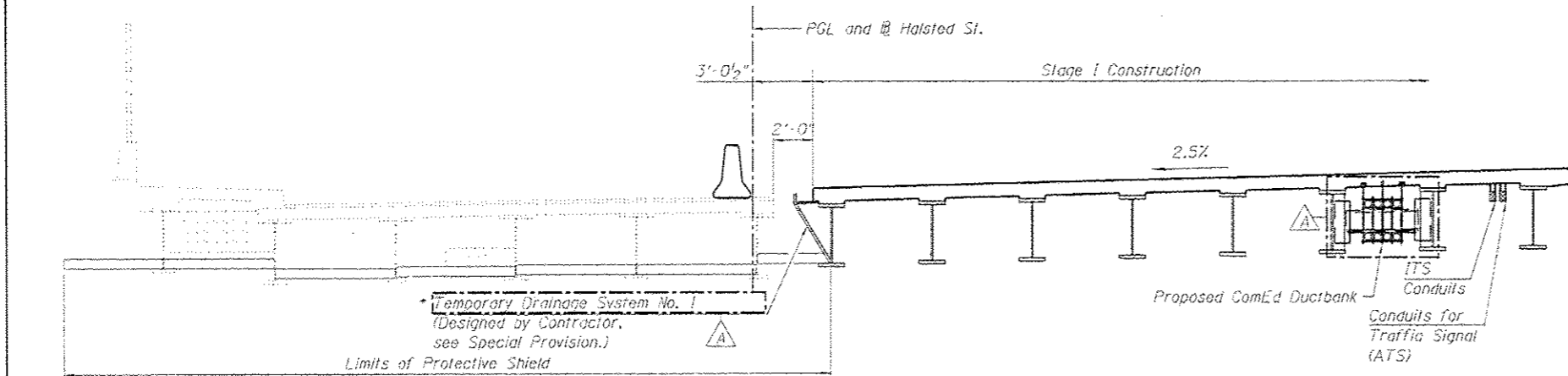
STAGE II REMOVAL

1. Install temporary concrete barriers as shown to locate Stage II traffic, pedestrian access to CTA Station and construction work area on the Stage I Constructed portion of the bridge.
2. Relocate the existing ductbank to the Stage I constructed portion of the bridge. See Lighting, Utility, and ITS plans.
3. Remove the existing structure as indicated.
4. Construct temporary bridge for pedestrian access to the CTA station.

Notes:
 All staging cross sections are looking North. For quantity of Temporary Concrete Barrier, see roadway plans.
 Hatched area indicates Removal of Existing Structures, No. 2.
 Stage removal and stage construction lines are different for the superstructure and substructure.
 Place conduits below diaphragm.

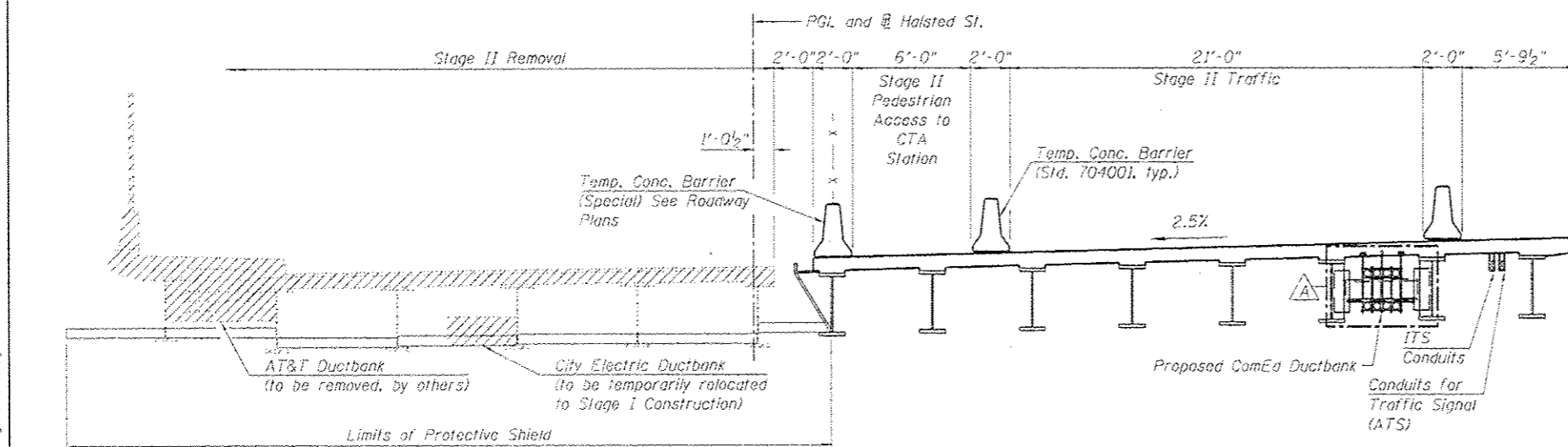
BILL OF MATERIAL

ITEM	UNIT	QUANTITY
Temporary Drainage System No. 1	L. Sum	1



STAGE I CONSTRUCTION

*For Temporary Drainage System No. 1 details of the bridge, see Drainage Plan. Minimum cross-sectional area of Temporary Drainage System = 0.56 Sq. Ft.



STAGE II REMOVAL

10/15/2013 10:53:25 AM 0161716-60W26-509-Straging_Det.rvt.dgn



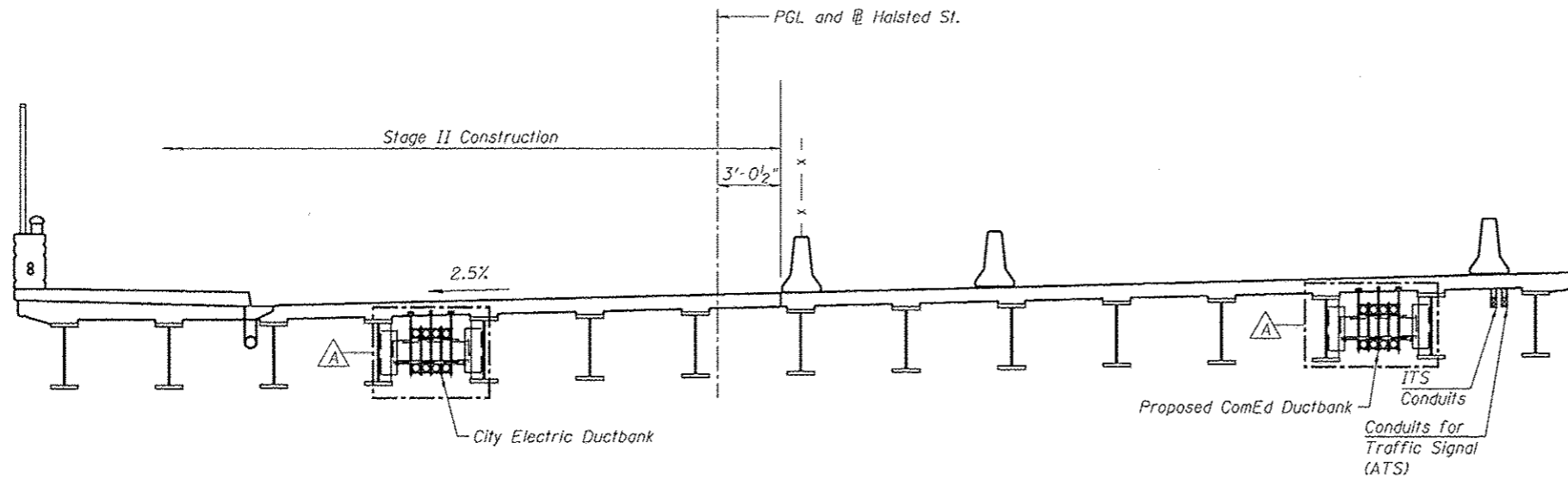
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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

STAGE CONSTRUCTION 1
STRUCTURE NO. 016-1716

SHEET NO. 52-09 OF 52-81 SHEETS

F.A.D. RITE:	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	169
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

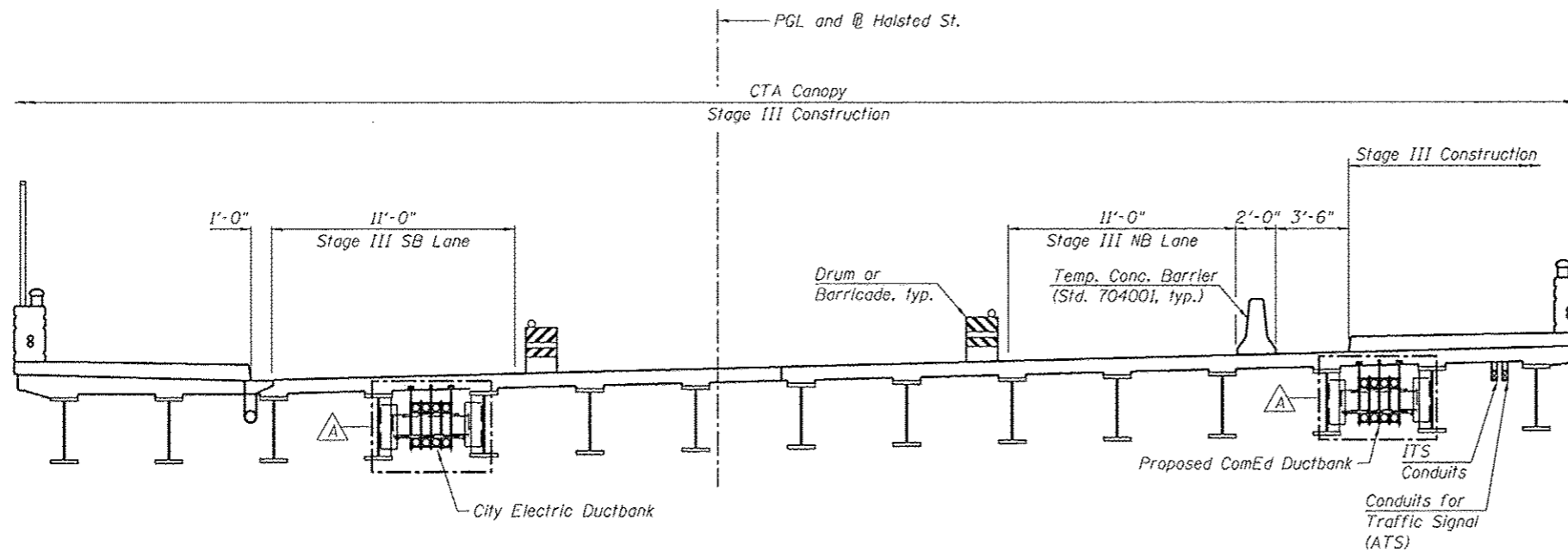


STAGE II CONSTRUCTION

STAGE II CONSTRUCTION

The following construction items will be performed within the limits of Stage II Construction:

1. Drill and cast drilled shafts for abutments and piers as shown in Foundation Layout.
2. Construct remaining portions of abutments, piers and soil retention systems.
3. Erect Girders 1 through 7.
4. Remove temporary bridge during girder erection and deck construction.
5. Construct reinforced concrete deck, sidewalk, parapet, railing, decorative fence and approach slab.
6. Perform bridge deck grooving for the bridge deck.
7. Utilities will be relocated to final locations.
8. Apply protective coat for the bridge deck and top and inside faces of parapets.
9. Place temporary pavement markings on the top of deck for staged traffic.



STAGE III CONSTRUCTION

STAGE III CONSTRUCTION

The following construction items will be performed within the limits of Stage III Construction:

1. Install temporary concrete barriers as shown to locate construction work area on the Stage III Construction.
2. Construct east sidewalk, parapet, railing, and decorative fence.
3. Apply protective coat for top and inside faces of east sidewalk and parapet.
4. Erect CTA canopy.

Notes:
 All staging cross sections are looking North.
 For quantity of Temporary Concrete Barrier, see roadway plans.
 Stage removal and stage construction lines are different for the superstructure and substructure.
 Place conduits below diaphragm.

12:11:11 PM 0161716-60W26-5010-Stageing_Details2.dgn



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	CHECKED - MDS	REVISED
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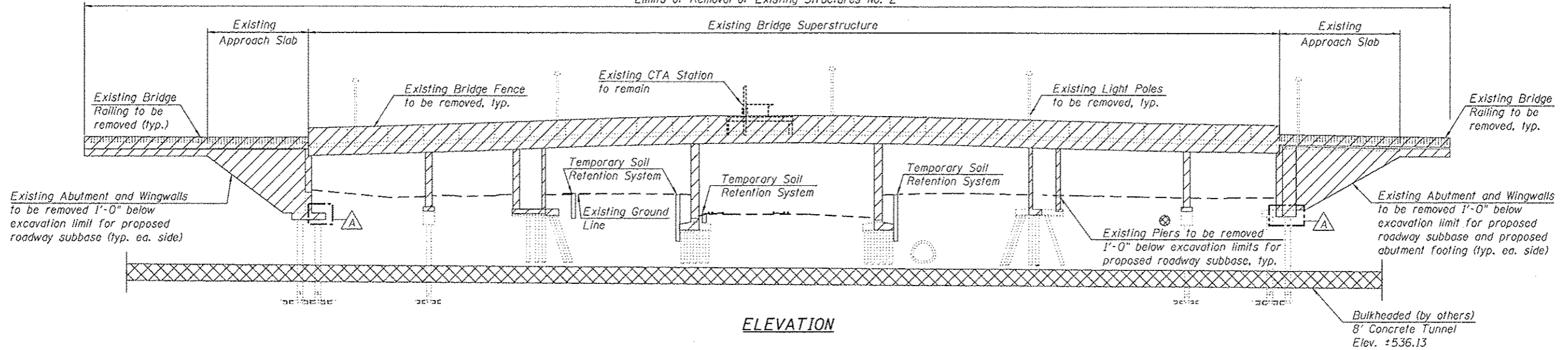
STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

STAGE CONSTRUCTION DETAILS 2
 STRUCTURE NO. 016-1716

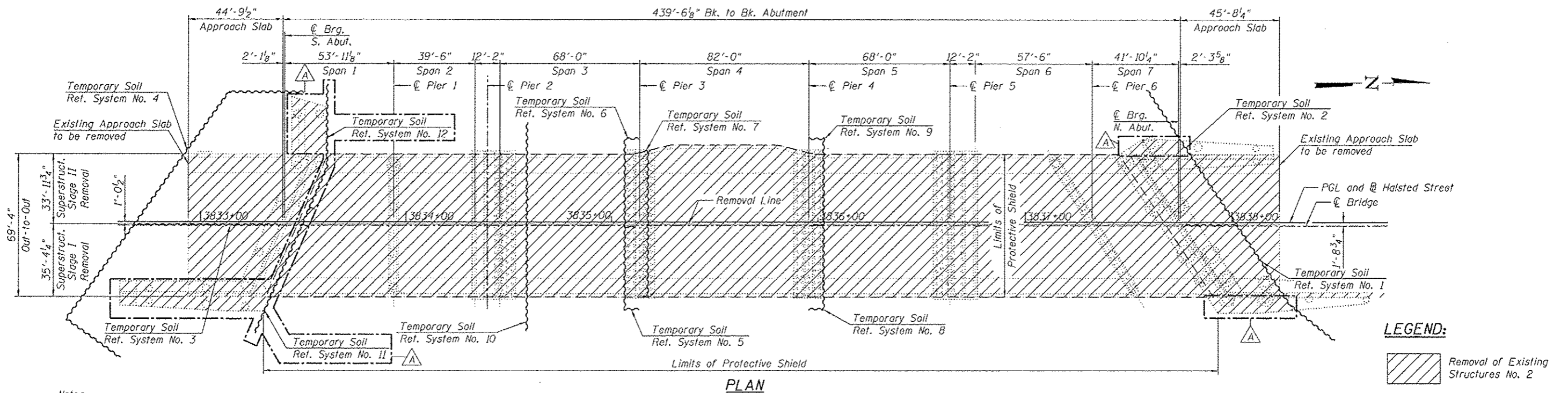
SHEET NO. 52-10 OF 52-81 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	370
CONTRACT NO. 60W26			ILLINOIS/FED. AID PROJECT	

Limits of Removal of Existing Structures No. 2



ELEVATION



PLAN

Notes:

- For substructure removal, pile extraction and temporary shoring details, see Sheets S2-13 thru S2-15.
- Existing utilities between girders will be relocated to provide uninterrupted service during construction (by others). Utilities to be incorporated into new structure (by others).
- The Contractor is responsible to protect the CTA tracks from falling objects and debris during removal of the superstructure and substructure elements.
- For existing approach slabs removal quantities, see Roadway plans.
- The Stage Removal and Stage Construction lines for the superstructure does not match the Stage Removal and Stage Construction line for the substructure.

BILL OF MATERIAL

Item	Unit	Quantity
Removal of Existing Structures No. 2	Each	1
Protective Shield	Sq Yd	3478
Pile Extraction	Each	133

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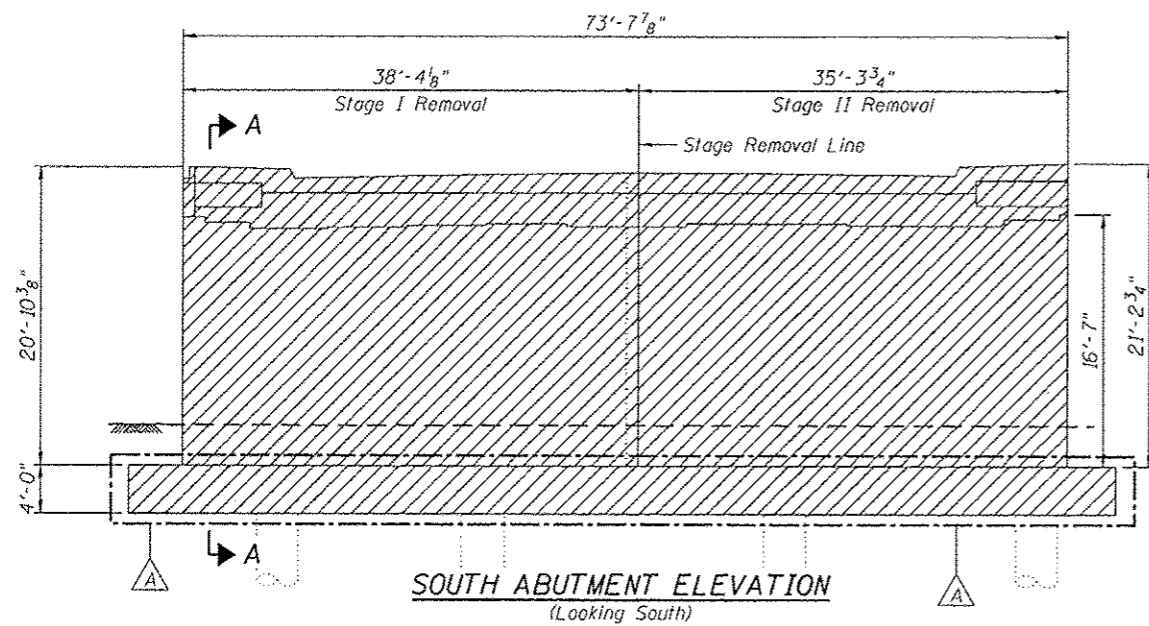
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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

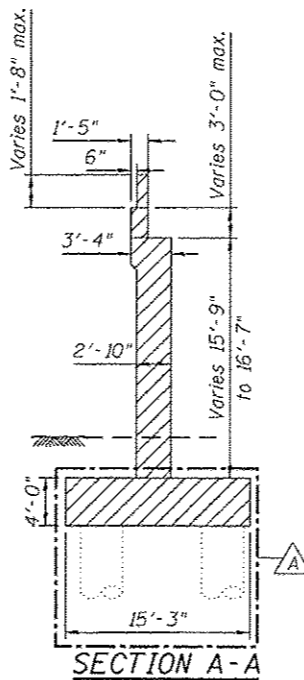
EXISTING STRUCTURE REMOVAL DETAILS 1
STRUCTURE NO. 016-1716

SHEET NO. S2-12 OF S2-81 SHEETS

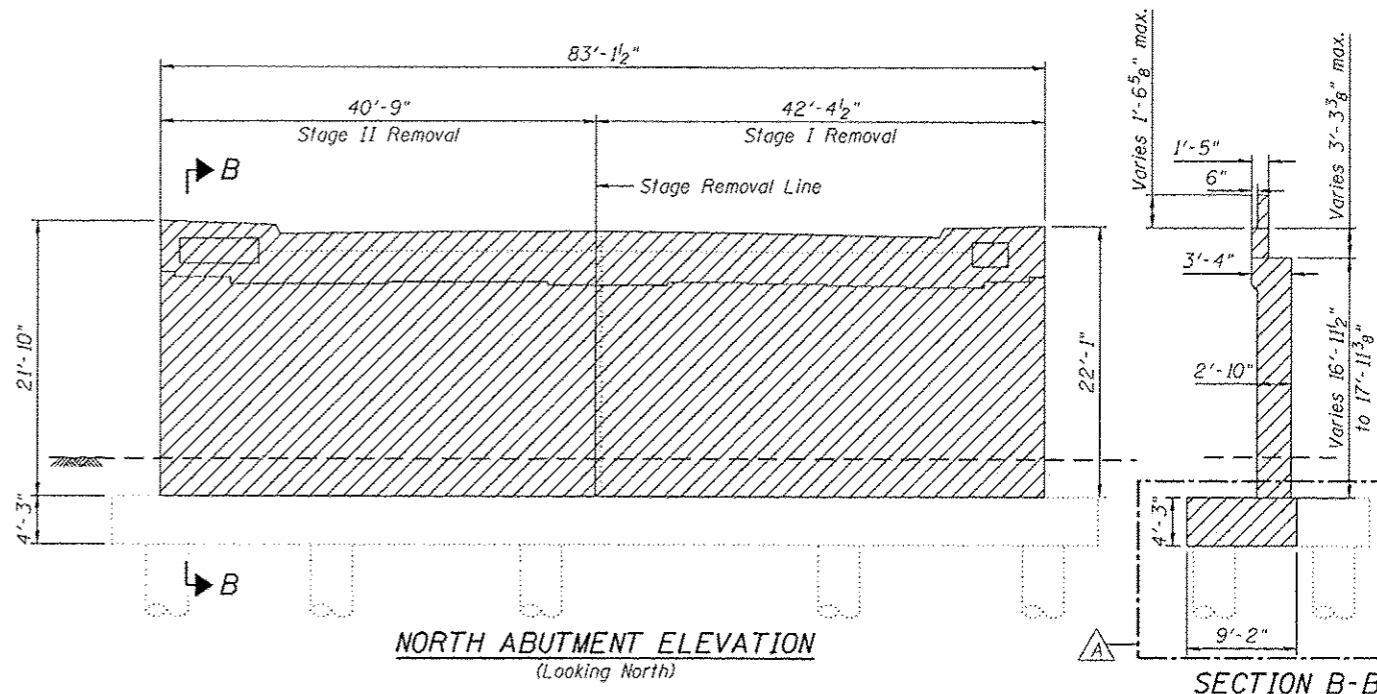
F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	372
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



SOUTH ABUTMENT ELEVATION
(Looking South)

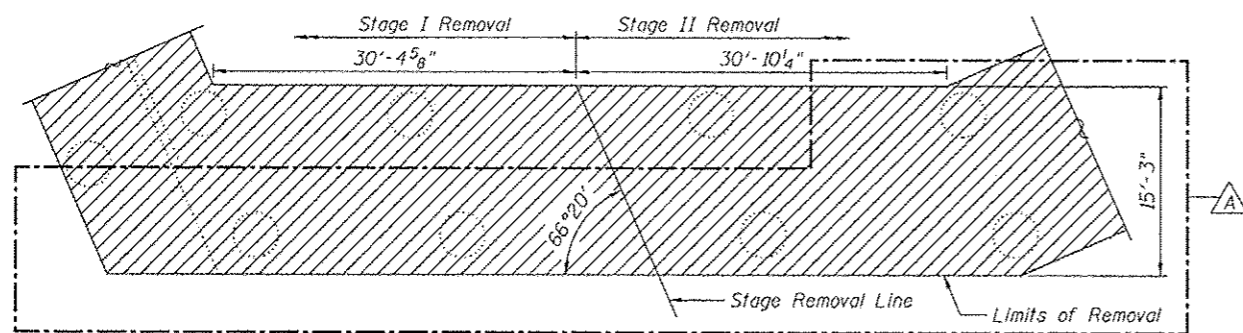


SECTION A-A

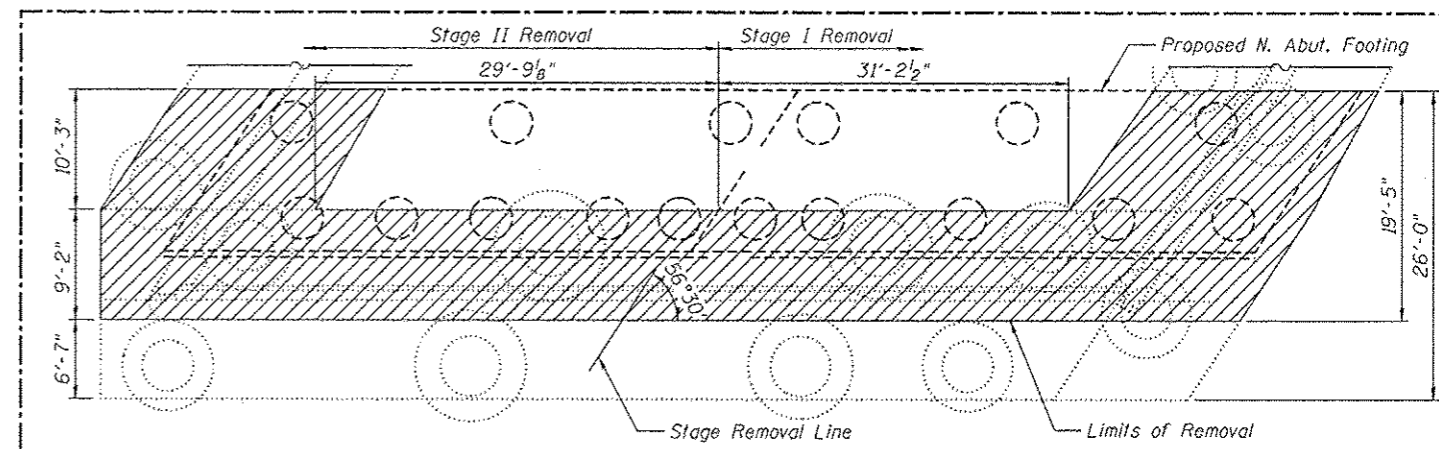


NORTH ABUTMENT ELEVATION
(Looking North)

SECTION B-B



SOUTH ABUTMENT FOUNDATION PLAN



NORTH ABUTMENT FOUNDATION PLAN

LEGEND:

Removal of Existing Structures No. 2

0161716-60W26-S013-Removal_Detail2.dgn



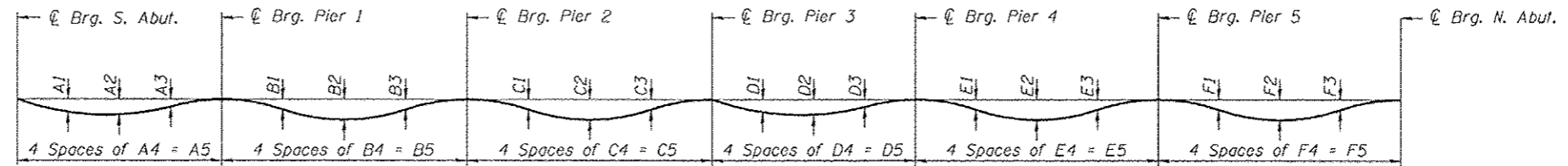
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PLOT DATE = 10/14/2013	DRAWN - KAH	REVISED
	CHECKED - JRM/MDS	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EXISTING STRUCTURE REMOVAL DETAILS 2
STRUCTURE NO. 016-1716

SHEET NO. S2-13 OF S2-81 SHEETS

F.A.J. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	373
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



DEAD LOAD DEFLECTION DIAGRAM

(Includes weight of concrete only.)

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 below.

DEAD LOAD DEFLECTIONS															
Girder	Span 1					Span 2					Span 3				
	A1	A2	A3	A4	A5	B1	B2	B3	B4	B5	C1	C2	C3	C4	C5
1	7/8"	1 1/8"	5/8"	20'-9 7/16"	83'-11 13/16"	-1/8"	0"	0"	14'-4 13/16"	57'-7 3/16"	1/8"	0"	0"	15'-8 3/4"	62'-11"
2	1"	1 1/8"	5/8"	20'-11 7/8"	83'-11 1/2"	-1/8"	0"	0"	15'-1 1/4"	60'-5 1/8"	0"	0"	0"	15'-8 3/4"	62'-11"
3	1"	1 1/4"	5/8"	21'-2 5/16"	84'-9 3/16"	-1/8"	0"	0"	15'-9 3/4"	63'-3 1/16"	0"	0"	0"	15'-8 3/4"	62'-11"
4	1"	1 1/4"	5/8"	21'-4 11/16"	85'-5 7/8"	-1/8"	0"	0"	16'-6 1/4"	66'-1"	0"	1/8"	0"	15'-8 3/4"	62'-11"
5	1"	1 1/4"	3/4"	21'-7 7/8"	85'-4 9/16"	-1/8"	0"	1/8"	17'-2 3/4"	68'-10 15/16"	0"	0"	0"	15'-8 3/4"	62'-11"
6	1 1/8"	1 3/8"	3/4"	21'-9 9/16"	87'-2 1/4"	0"	1/8"	1/8"	17'-11 3/16"	71'-8 13/16"	0"	0"	0"	15'-8 3/4"	62'-11"
7	1 1/8"	1 3/8"	3/4"	22'-0"	87'-11 15/16"	0"	1/8"	1/8"	18'-7 7/16"	74'-6 3/4"	0"	0"	0"	15'-8 3/4"	62'-11"
8	1 1/4"	1 1/2"	3/4"	22'-2 3/8"	88'-9 5/8"	0"	1/4"	1/8"	19'-4 3/16"	77'-4 1/16"	0"	0"	0"	15'-8 3/4"	62'-11"
9	1 1/4"	1 1/2"	7/8"	22'-4 13/16"	89'-7 5/8"	0"	1/4"	1/4"	20'-0 1/16"	80'-2 5/8"	0"	0"	0"	15'-8 3/4"	62'-11"
10	1 1/4"	1 5/8"	7/8"	22'-7 1/4"	90'-5"	0"	3/8"	1/4"	20'-9 1/8"	83'-0 9/16"	0"	0"	0"	15'-8 3/4"	62'-11"
11	1 1/4"	1 5/8"	7/8"	22'-9 11/16"	91'-2 1/2"	1/8"	3/8"	3/8"	21'-5 5/8"	85'-10 1/2"	0"	0"	-1/8"	15'-8 3/4"	62'-11"
12	1 3/8"	1 5/8"	7/8"	23'-0 1/8"	92'-0 3/8"	1/8"	1/2"	3/8"	22'-2 1/8"	88'-8 7/16"	-1/8"	-1/8"	-1/8"	15'-8 3/4"	62'-11"
13	1 3/8"	1 5/8"	7/8"	23'-2 1/2"	92'-10 1/16"	1/4"	5/8"	1/2"	22'-10 9/16"	91'-6 5/16"	-1/8"	-1/8"	-1/8"	15'-8 3/4"	62'-11"
14	1 3/8"	1 5/8"	7/8"	23'-4 15/16"	93'-7 3/4"	1/4"	3/4"	5/8"	23'-7 1/16"	94'-4 1/4"	-1/8"	-1/4"	-1/4"	15'-8 3/4"	62'-11"
15	1 1/4"	1 5/8"	3/4"	23'-7 3/8"	94'-5 7/16"	3/8"	7/8"	3/4"	24'-3 9/16"	97'-2 3/16"	-1/4"	-1/4"	-1/4"	15'-8 3/4"	62'-11"

DEAD LOAD DEFLECTIONS															
Girder	Span 4					Span 5					Span 6				
	D1	D2	D3	D4	D5	E1	E2	E3	E4	E5	F1	F2	F3	F4	F5
1	1/2"	7/8"	5/8"	20'-6"	82'-0"	-1/4"	-1/4"	-1/4"	17'-11"	71'-8"	5/8"	1 1/8"	7/8"	23'-8 9/16"	94'-10 1/8"
2	1/2"	7/8"	5/8"	20'-6"	82'-0"	-1/4"	-1/4"	-1/4"	17'-11"	71'-8"	3/4"	1 3/8"	1"	24'-6 5/8"	98'-2 1/2"
3	1/2"	7/8"	5/8"	20'-6"	82'-0"	-1/4"	-1/4"	-1/4"	17'-11"	71'-8"	7/8"	1 5/8"	1 1/4"	25'-4 3/4"	101'-6 7/8"
4	1/2"	3/4"	1/2"	20'-6"	82'-0"	-1/4"	-1/4"	-1/4"	17'-11"	71'-8"	1"	1 3/4"	1 3/8"	26'-2 13/16"	104'-11 1/4"
5	1/2"	3/4"	1/2"	20'-6"	82'-0"	-1/4"	-3/8"	-1/4"	17'-11"	71'-8"	1 1/8"	2"	1 5/8"	27'-0 15/16"	108'-3 5/8"
6	1/2"	3/4"	1/2"	20'-6"	82'-0"	-1/4"	-3/8"	-3/8"	17'-11"	71'-8"	1 3/8"	2 1/4"	1 3/4"	27'-11"	111'-8"
7	1/2"	3/4"	1/2"	20'-6"	82'-0"	-1/4"	-3/8"	-3/8"	17'-11"	71'-8"	1 1/2"	2 1/2"	2"	28'-9 9/8"	115'-0 3/8"
8	1/2"	3/4"	1/2"	20'-6"	82'-0"	-1/4"	-3/8"	-3/8"	17'-11"	71'-8"	1 5/8"	2 7/8"	2 1/4"	29'-7 3/16"	118'-4 3/4"
9	1/2"	3/4"	1/2"	20'-6"	82'-0"	-1/4"	-1/2"	-3/8"	17'-11"	71'-8"	1 7/8"	3 1/4"	2 1/2"	30'-5 5/16"	121'-9 9/8"
10	1/2"	3/4"	5/8"	20'-6"	82'-0"	-3/8"	-1/2"	-1/2"	17'-11"	71'-8"	2 1/8"	3 5/8"	2 3/4"	31'-3 3/8"	125'-1 1/2"
11	1/2"	7/8"	5/8"	20'-6"	82'-0"	-3/8"	-5/8"	-1/2"	17'-11"	71'-8"	2 1/4"	4"	3 1/8"	32'-1 1/2"	128'-5 7/8"
12	1/2"	7/8"	5/8"	20'-6"	82'-0"	-3/8"	-5/8"	-1/2"	17'-11"	71'-8"	2 1/2"	4 3/8"	3 3/8"	32'-11 9/16"	131'-10 1/4"
13	5/8"	1"	3/4"	20'-6"	82'-0"	-1/2"	-3/4"	-5/8"	17'-11"	71'-8"	2 3/4"	4 7/8"	3 3/4"	33'-9 11/16"	135'-2 5/8"
14	3/4"	1 1/8"	3/4"	20'-6"	82'-0"	-1/2"	-3/4"	-5/8"	17'-11"	71'-8"	3"	5 1/4"	4 1/8"	34'-7 3/4"	138'-7"
15	7/8"	1 3/8"	1"	20'-6"	82'-0"	-5/8"	-7/8"	-3/4"	17'-11"	71'-8"	3 1/4"	5 5/8"	4 3/8"	35'-5 7/8"	141'-11 3/8"

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**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**TOP OF SLAB ELEVATIONS 3
STRUCTURE NO. 016-1716**

SHEET NO. S2-18 OF S2-81 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	378
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

GIRDER 7

PGL & @ ROADWAY

STAGE CONSTRUCTION LINE

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. S. Abut.	3832+84.03	-1.08	594.71	594.71
CL Brg. S. Abut.	3832+87.83	-1.08	594.80	594.80
1A	3832+97.83	-1.08	595.07	595.12
1B	3833+07.83	-1.08	595.35	595.44
1C	3833+17.83	-1.08	595.63	595.74
1D	3833+27.83	-1.08	595.91	596.03
1E	3833+37.83	-1.08	596.20	596.30
1F	3833+47.83	-1.08	596.48	596.56
1G	3833+57.83	-1.08	596.76	596.81
1H	3833+67.83	-1.08	597.04	597.06
CL Pier 1	3833+75.82	-1.08	597.27	597.26
2A	3833+85.82	-1.08	597.55	597.54
2B	3833+95.82	-1.08	597.83	597.83
2C	3834+05.82	-1.08	598.11	598.12
2D	3834+15.82	-1.08	598.39	598.40
2E	3834+25.82	-1.08	598.65	598.66
2F	3834+35.82	-1.08	598.88	598.88
CL Pier 2	3834+50.38	-1.08	599.17	599.16
3A	3834+60.38	-1.08	599.33	599.33
3B	3834+70.38	-1.08	599.48	599.48
3C	3834+80.38	-1.08	599.59	599.59
3D	3834+90.38	-1.08	599.69	599.68
3E	3835+00.38	-1.08	599.75	599.75
CL Pier 3	3835+13.30	-1.08	599.80	599.80
4A	3835+23.30	-1.08	599.81	599.82
4B	3835+33.30	-1.08	599.79	599.83
4C	3835+43.30	-1.08	599.75	599.80
4D	3835+53.30	-1.08	599.69	599.75
4E	3835+63.30	-1.08	599.60	599.65
4F	3835+73.30	-1.08	599.48	599.52
4G	3835+83.30	-1.08	599.34	599.36
CL Pier 4	3835+95.30	-1.08	599.13	599.13
5A	3836+05.30	-1.08	598.94	598.92
5B	3836+15.30	-1.08	598.71	598.69
5C	3836+25.30	-1.08	598.47	598.44
5D	3836+35.30	-1.08	598.22	598.19
5E	3836+45.30	-1.08	597.98	597.94
5F	3836+55.30	-1.08	597.73	597.70
CL Pier 5	3836+66.97	-1.08	597.44	597.44
6A	3836+76.97	-1.08	597.19	597.23
6B	3836+86.97	-1.08	596.94	597.03
6C	3836+96.97	-1.08	596.69	596.83
6D	3837+06.97	-1.08	596.45	596.62
6E	3837+16.97	-1.08	596.20	596.40
6F	3837+26.97	-1.08	595.95	596.17
6G	3837+36.97	-1.08	595.70	595.92
6H	3837+46.97	-1.08	595.46	595.65
6I	3837+56.97	-1.08	595.21	595.36
6J	3837+66.97	-1.08	594.97	595.07
6K	3837+76.97	-1.08	594.74	594.78
CL Brg. N. Abut.	3837+82.01	-1.08	594.63	594.63
Bk. N. Abut.	3837+85.70	-1.08	594.55	594.55

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. S. Abut.	3832+83.26	0.00	594.72	594.72
CL Brg. S. Abut.	3832+87.05	0.00	594.81	594.81
1A	3832+97.05	0.00	595.07	595.12
1B	3833+07.05	0.00	595.35	595.44
1C	3833+17.05	0.00	595.64	595.75
1D	3833+27.05	0.00	595.92	596.04
1E	3833+37.05	0.00	596.20	596.31
1F	3833+47.05	0.00	596.48	596.56
1G	3833+57.05	0.00	596.76	596.81
1H	3833+67.05	0.00	597.05	597.06
CL Pier 1	3833+75.22	0.00	597.28	597.28
2A	3833+85.22	0.00	597.56	597.55
2B	3833+95.22	0.00	597.84	597.84
2C	3834+05.22	0.00	598.12	598.13
2D	3834+15.22	0.00	598.40	598.41
2E	3834+25.22	0.00	598.66	598.67
2F	3834+35.22	0.00	598.89	598.90
2G	3834+45.22	0.00	599.10	599.10
CL Pier 2	3834+50.38	0.00	599.19	599.19
3A	3834+60.38	0.00	599.36	599.36
3B	3834+70.38	0.00	599.50	599.50
3C	3834+80.38	0.00	599.62	599.62
3D	3834+90.38	0.00	599.71	599.71
3E	3835+00.38	0.00	599.78	599.77
CL Pier 3	3835+13.30	0.00	599.83	599.83
4A	3835+23.30	0.00	599.84	599.85
4B	3835+33.30	0.00	599.82	599.86
4C	3835+43.30	0.00	599.78	599.83
4D	3835+53.30	0.00	599.71	599.77
4E	3835+63.30	0.00	599.62	599.68
4F	3835+73.30	0.00	599.51	599.55
4G	3835+83.30	0.00	599.36	599.39
CL Pier 4	3835+95.30	0.00	599.16	599.16
5A	3836+05.30	0.00	598.96	598.95
5B	3836+15.30	0.00	598.74	598.71
5C	3836+25.30	0.00	598.50	598.46
5D	3836+35.30	0.00	598.25	598.21
5E	3836+45.30	0.00	598.00	597.97
5F	3836+55.30	0.00	597.76	597.73
CL Pier 5	3836+66.97	0.00	597.47	597.46
6A	3836+76.97	0.00	597.21	597.25
6B	3836+86.97	0.00	596.97	597.05
6C	3836+96.97	0.00	596.72	596.85
6D	3837+06.97	0.00	596.47	596.65
6E	3837+16.97	0.00	596.23	596.43
6F	3837+26.97	0.00	595.98	596.20
6G	3837+36.97	0.00	595.73	595.95
6H	3837+46.97	0.00	595.48	595.68
6I	3837+56.97	0.00	595.24	595.40
6J	3837+66.97	0.00	594.99	595.10
6K	3837+76.97	0.00	594.77	594.81
CL Brg. N. Abut.	3837+82.72	0.00	594.64	594.65
Bk. N. Abut.	3837+86.42	0.00	594.57	594.57

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. S. Abut.	3832+81.08	3.04	594.74	594.74
CL Brg. S. Abut.	3832+84.88	3.04	594.83	594.83
1A	3832+94.88	3.04	595.09	595.14
1B	3833+04.88	3.04	595.37	595.46
1C	3833+14.88	3.04	595.65	595.77
1D	3833+24.88	3.04	595.93	596.06
1E	3833+34.88	3.04	596.22	596.33
1F	3833+44.88	3.04	596.50	596.58
1G	3833+54.88	3.04	596.78	596.83
1H	3833+64.88	3.04	597.06	597.08
CL Pier 1	3833+73.53	3.04	597.31	597.30
2A	3833+83.52	3.04	597.59	597.58
2B	3833+93.52	3.04	597.87	597.87
2C	3834+03.52	3.04	598.15	598.16
2D	3834+13.52	3.04	598.43	598.45
2E	3834+23.52	3.04	598.69	598.71
2F	3834+33.52	3.04	598.93	598.94
2G	3834+43.52	3.04	599.14	599.14
CL Pier 2	3834+50.38	3.04	599.27	599.27
3A	3834+60.38	3.04	599.44	599.43
3B	3834+70.38	3.04	599.58	599.58
3C	3834+80.38	3.04	599.70	599.69
3D	3834+90.38	3.04	599.79	599.78
3E	3835+00.38	3.04	599.86	599.85
CL Pier 3	3835+13.30	3.04	599.90	599.90
4A	3835+23.30	3.04	599.91	599.93
4B	3835+33.30	3.04	599.90	599.93
4C	3835+43.30	3.04	599.86	599.91
4D	3835+53.30	3.04	599.79	599.85
4E	3835+63.30	3.04	599.70	599.76
4F	3835+73.30	3.04	599.58	599.63
4G	3835+83.30	3.04	599.44	599.46
CL Pier 4	3835+95.30	3.04	599.24	599.23
5A	3836+05.30	3.04	599.04	599.02
5B	3836+15.30	3.04	598.82	598.79
5C	3836+25.30	3.04	598.57	598.54
5D	3836+35.30	3.04	598.33	598.29
5E	3836+45.30	3.04	598.08	598.04
5F	3836+55.30	3.04	597.83	597.80
CL Pier 5	3836+66.97	3.04	597.54	597.54
6A	3836+76.97	3.04	597.29	597.33
6B	3836+86.97	0.00	597.04	597.13
6C	3836+96.97	3.04	596.80	596.94
6D	3837+06.97	0.00	596.55	596.73
6E	3837+16.97	3.04	596.30	596.52
6F	3837+26.97	0.00	596.05	596.29
6G	3837+36.97	3.04	595.81	596.04
6H	3837+46.97	0.00	595.56	595.78
6I	3837+56.97	3.04	595.31	595.49
6J	3837+66.97	0.00	595.07	595.20
6K	3837+76.97	3.04	594.84	594.90
CL Brg. N. Abut.	3837+84.74	3.04	594.68	594.68
Bk. N. Abut.	3837+88.43	3.04	594.60	594.60

597.58
597.87
598.16
598.45
598.71
598.94
599.14



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DESIGNED - DL
 CHECKED - WJC
 DRAWN - MTS
 CHECKED - DL/WJC

REVISED 10/15/2013 DL
 REVISED
 REVISED

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

TOP OF SLAB ELEVATIONS 6
 STRUCTURE NO. 016-1716
 SHEET NO. S2-21 OF S2-81 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	381
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

GIRDER 14

GIRDER 15

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. S. Abut.	3832+58.59	34.50	595.03	595.03
CL Brg. S. Abut.	3832+62.38	34.50	595.10	595.10
1A	3832+72.38	34.50	595.30	595.35
1B	3832+82.38	34.50	595.52	595.62
1C	3832+92.38	34.50	595.77	595.90
1D	3833+02.38	34.50	596.05	596.19
1E	3833+12.38	34.50	596.33	596.46
1F	3833+22.38	34.50	596.61	596.72
1G	3833+32.38	34.50	596.89	596.96
1H	3833+42.38	34.50	597.18	597.21
CL Pier 1	3833+56.03	34.50	597.56	597.56
2A	3833+66.03	34.50	597.84	597.84
2B	3833+76.03	34.50	598.13	598.14
2C	3833+86.03	34.50	598.41	598.44
2D	3833+96.03	34.50	598.69	598.74
2E	3834+06.03	34.50	598.97	599.04
2F	3834+16.03	34.50	599.25	599.31
2G	3834+26.03	34.50	599.50	599.55
2H	3834+36.03	34.50	599.73	599.76
CL Pier 2	3834+50.38	34.50	600.02	600.01
3A	3834+60.38	34.50	600.19	600.17
3B	3834+70.38	34.50	600.33	600.31
3C	3834+80.38	34.50	600.45	600.43
3D	3834+90.38	34.50	600.54	600.52
3E	3835+00.38	34.50	600.60	600.59
CL Pier 3	3835+13.30	34.50	600.65	600.65
4A	3835+23.30	34.50	600.66	600.69
4B	3835+33.30	34.50	600.65	600.70
4C	3835+43.30	34.50	600.61	600.68
4D	3835+53.30	34.50	600.54	600.63
4E	3835+63.30	34.50	600.45	600.54
4F	3835+73.30	34.50	600.33	600.40
4G	3835+83.30	34.50	600.19	600.23
CL Pier 4	3835+95.30	34.50	599.99	599.98
5A	3836+05.30	34.50	599.79	599.76
5B	3836+15.30	34.50	599.57	599.52
5C	3836+25.30	34.50	599.32	599.26
5D	3836+35.30	34.50	599.07	599.01
5E	3836+45.30	34.50	598.83	598.76
5F	3836+55.30	34.50	598.58	598.53
CL Pier 5	3836+66.97	34.50	598.29	598.29
6A	3836+76.97	34.50	598.04	598.11
6B	3836+86.97	34.50	597.79	597.93
6C	3836+96.97	34.50	597.54	597.76
6D	3837+06.97	34.50	597.30	597.60
6E	3837+16.97	34.50	597.05	597.41
6F	3837+26.97	34.50	596.80	597.22
6G	3837+36.97	34.50	596.56	597.00
6H	3837+46.97	34.50	596.31	596.75
6I	3837+56.97	34.50	596.06	596.48
6J	3837+66.97	34.50	595.82	596.19
6K	3837+76.97	34.50	595.59	595.90
6L	3837+86.97	34.50	595.38	595.59
6M	3837+96.97	34.50	595.19	595.29
CL Brg. N. Abut.	3838+05.56	34.50	595.03	595.04
Bk. N. Abut.	3838+09.26	34.50	594.97	594.97

A

A

A

A

A

Location	Station	Offset	Theoretical Grade Elevations	Theoretical Grade Elevations Adjusted For Dead Load Deflection
Bk. S. Abut.	3832+54.96	39.58	595.05	595.05
CL Brg. S. Abut.	3832+58.75	39.58	595.11	595.11
1A	3832+68.75	39.58	595.30	595.36
1B	3832+78.75	39.58	595.52	595.61
1C	3832+88.75	39.58	595.76	595.88
1D	3832+98.75	39.58	596.02	596.16
1E	3833+08.75	39.58	596.31	596.43
1F	3833+18.75	39.58	596.59	596.69
1G	3833+28.75	39.58	596.87	596.94
1H	3833+38.75	39.58	597.15	597.19
CL Pier 1	3833+53.20	39.58	597.56	597.56
2A	3833+63.20	39.58	597.84	597.84
2B	3833+73.20	39.58	598.13	598.14
2C	3833+83.20	39.58	598.41	598.44
2D	3833+93.20	39.58	598.69	598.75
2E	3834+03.20	39.58	598.97	599.04
2F	3834+13.20	39.58	599.25	599.33
2G	3834+23.20	39.58	599.51	599.58
2H	3834+33.20	39.58	599.75	599.79
2I	3834+43.20	39.58	599.96	599.98
CL Pier 2	3834+50.38	39.58	600.10	600.09
3A	3834+60.38	39.58	600.26	600.25
3B	3834+70.38	39.58	600.41	600.38
3C	3834+80.38	39.58	600.52	600.50
3D	3834+90.38	39.58	600.62	600.59
3E	3835+00.38	39.58	600.68	600.66
CL Pier 3	3835+13.30	39.58	600.73	600.73
4A	3835+23.30	39.58	600.74	600.77
4B	3835+33.30	39.58	600.73	600.80
4C	3835+43.30	39.58	600.68	600.78
4D	3835+53.30	39.58	600.62	600.73
4E	3835+63.30	39.58	600.53	600.63
4F	3835+73.30	39.58	600.41	600.49
4G	3835+83.30	39.58	600.27	600.31
CL Pier 4	3835+95.30	39.58	600.06	600.06
5A	3836+05.30	39.58	599.87	599.83
5B	3836+15.30	39.58	599.64	599.59
5C	3836+25.30	39.58	599.40	599.33
5D	3836+35.30	39.58	599.15	599.08
5E	3836+45.30	39.58	598.91	598.84
5F	3836+55.30	39.58	598.66	598.61
CL Pier 5	3836+66.97	39.58	598.37	598.37
6A	3836+76.97	39.58	598.12	598.19
6B	3836+86.97	39.58	597.87	598.02
6C	3836+96.97	39.58	597.62	597.86
6D	3837+06.97	39.58	597.38	597.69
6E	3837+16.97	39.58	597.13	597.51
6F	3837+26.97	39.58	596.88	597.32
6G	3837+36.97	39.58	596.64	597.11
6H	3837+46.97	39.58	596.39	596.86
6I	3837+56.97	39.58	596.14	596.60
6J	3837+66.97	39.58	595.90	596.32
6K	3837+76.97	39.58	595.67	596.02
6L	3837+86.97	39.58	595.46	595.71
6M	3837+96.97	39.58	595.27	595.41
CL Brg. N. Abut.	3838+08.92	39.58	595.05	595.06
Bk. N. Abut.	3838+12.62	39.58	594.99	594.99

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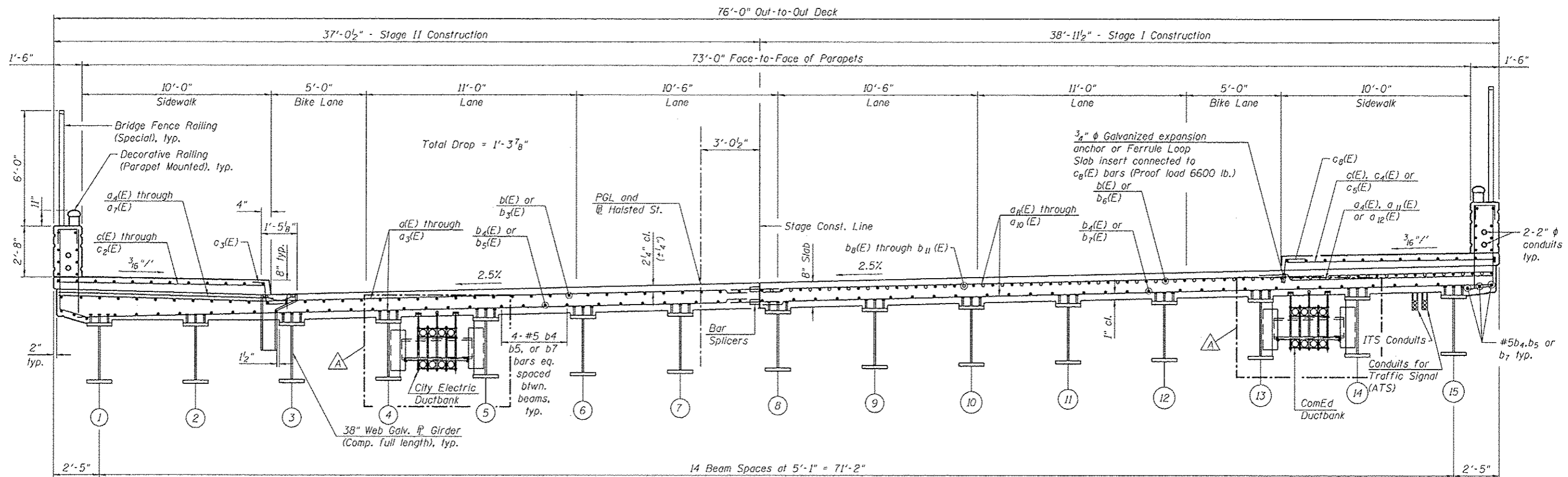
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STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

TOP OF SLAB ELEVATIONS 9
 STRUCTURE NO. 016-1716

SHEET NO. 52-24 OF 52-81 SHEETS

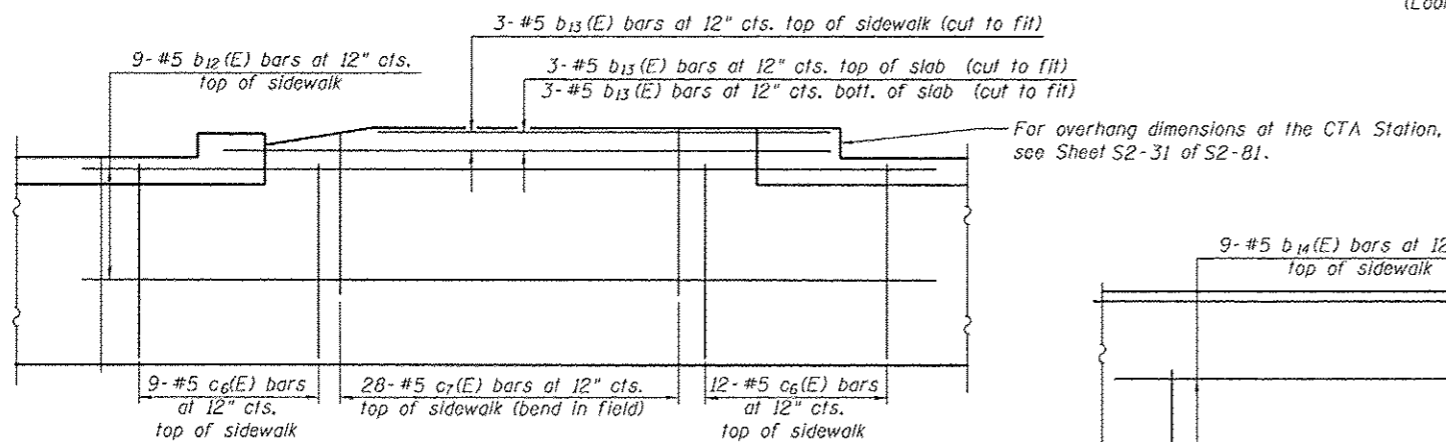
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3730	2013-008R	COOK	559	384
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



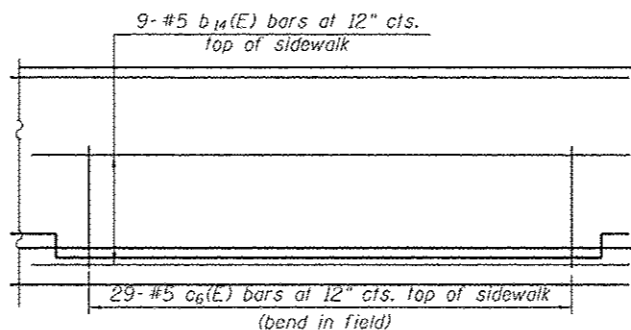
NEAR MIDSPAN

CROSS SECTION
(Looking North)

NEAR PIER

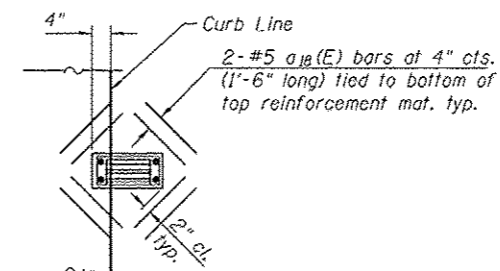


* WEST ADA RAMP DETAIL



* EAST ADA RAMP DETAIL

* See Roadway Plans for ADA Ramp slope and ADA Ramp layout



SCUPPER PLAN

Note:
Cut longitudinal reinforcement to clear drainage scuppers.

Notes:
See Sheet S2-30 of S2-81 for Bill of Material.
See Sheet S2-32 of S2-81 for parapet reinforcement.
For Scupper locations see Sheet S2-03 of S2-81.
Proposed conduit support system is shown for information only on sheets 441A thru 441C. The concrete inserts will be provided to the Contractor by ComEd. The Contractor is responsible for placing inserts per layout details and ComEd direction. ComEd may elect to provide support to Contractor for final insert placement in advance of pouring concrete. There is no separate payment for the placement of inserts. The work involved in placing inserts is included within Concrete Superstructure. The cost of expansion anchors/inserts at the east sidewalk is included in the cost of Reinforcement Bars, Epoxy Coated.
For ITS conduit layout, see ITS Plans.
For traffic signal conduit layout, see ATS Plans.

02/13/14 PM 0181116-00R26-S029-Deck-Section3.dgn



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DRAWN -	RLS
PLT DATE =	10/14/2013
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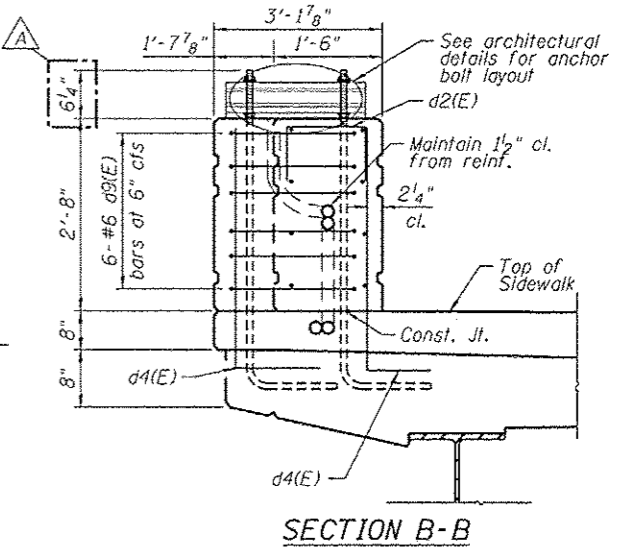
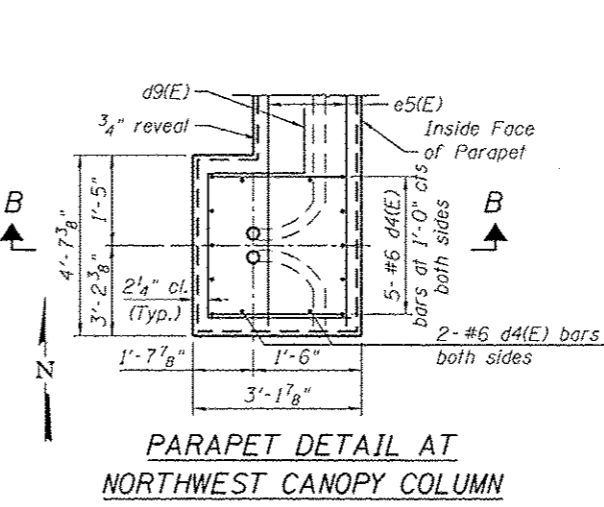
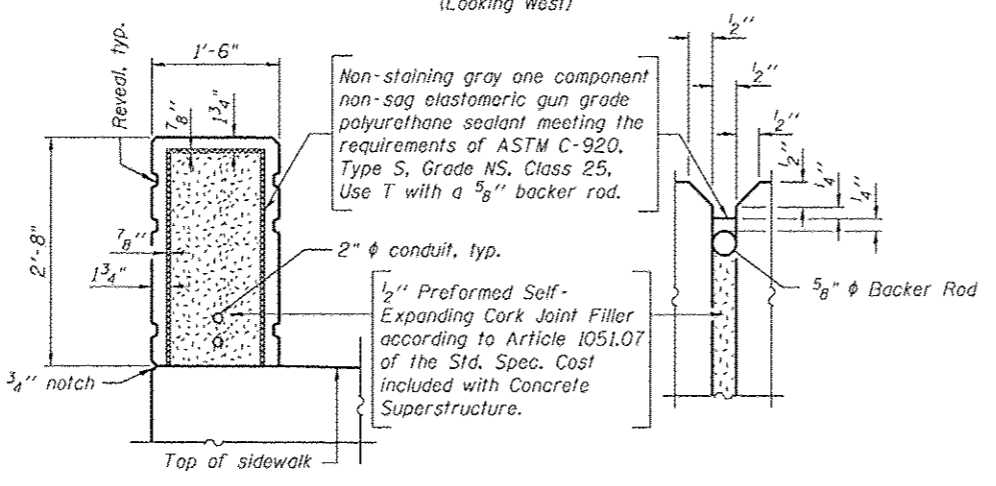
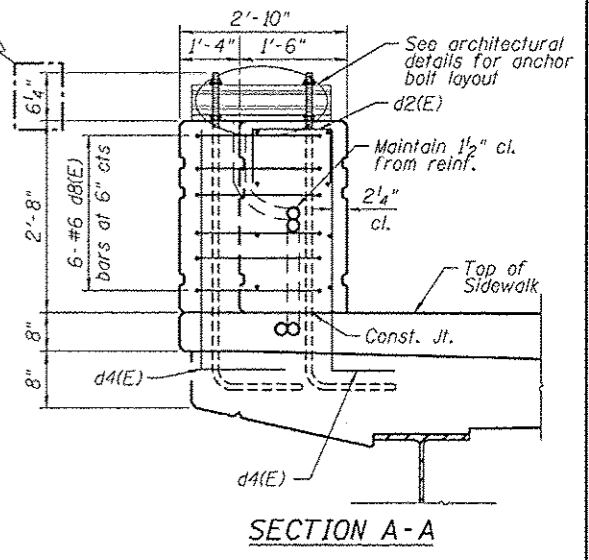
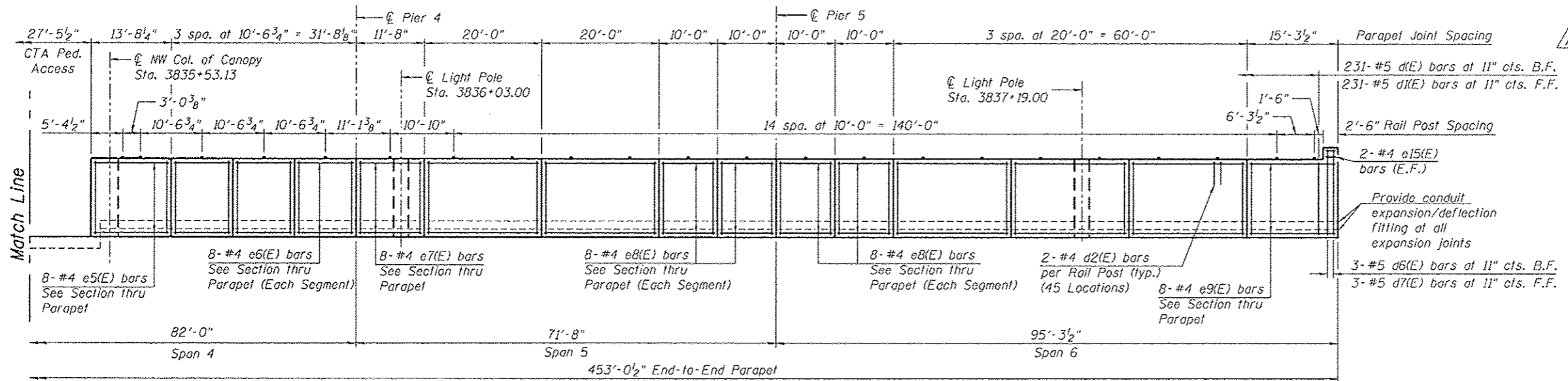
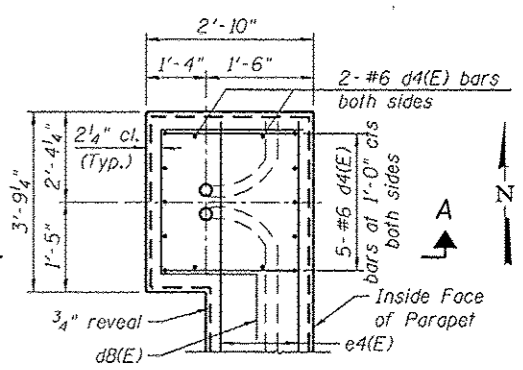
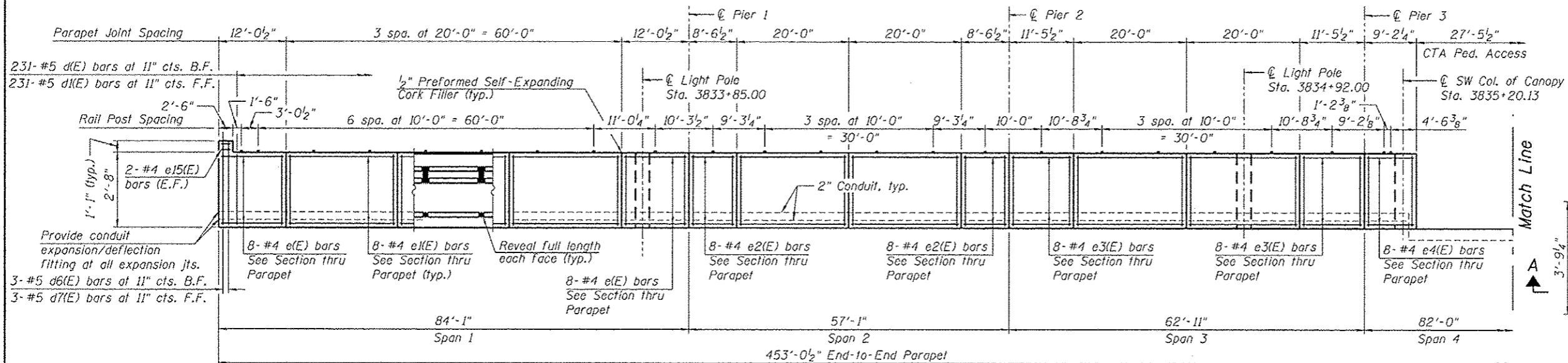
DESIGNED -	DJG	REVISED Δ	10/15/2013 WJC
CHECKED -	NVW	REVISED	
DRAWN -	RLS	REVISED	
CHECKED -	DJG/WJC	REVISED	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

DECK PLAN AND CROSS SECTION 3
STRUCTURE NO. 016-1716

SHEET NO. S2-29 OF S2-81 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	389
CONTRACT NO. 60W26				ILLINOIS FED. AID PROJECT



Notes:
 For notes, bar diagrams, section through parapet and bill of material, see Sheet S2-30 of S2-81.
 All edges shall be chamfered 3/4".
 For architectural details on the parapets and Decorative Railing (Parapet Mounted) details, see Sheet S2-36 of S2-81.
 For Bridge Fence Railing (Special) details, see Sheet S2-37 of S2-81.
 For Bridge Fence Railing (Special) layout and post spacing, see Sheet S2-38 of S2-81.
 For parapet detail at lightpole and anchor rod details, see Sheet S2-33 of S2-81.
 The cost of reveal is included in cost of Concrete Superstructure.

12:11:08 PM 0161716-60W26-S032-Parapet-west.dgn

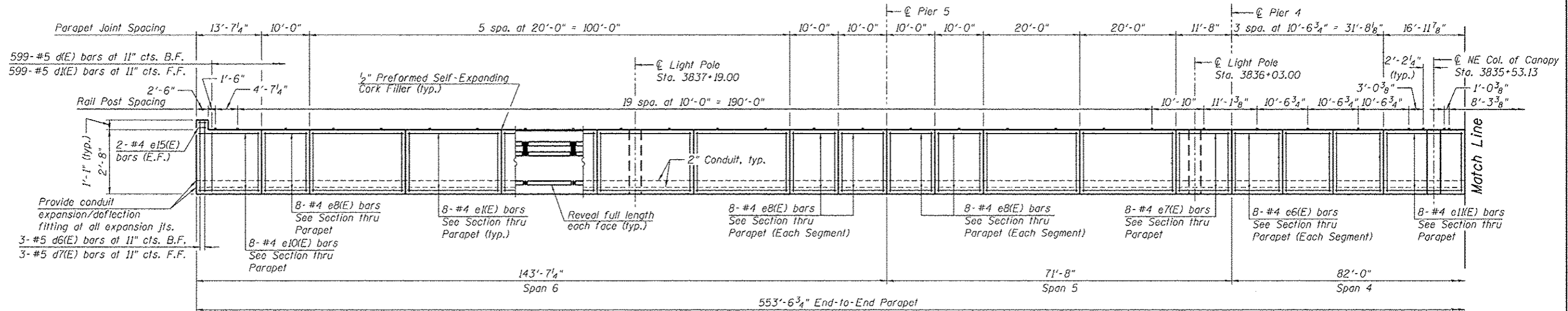


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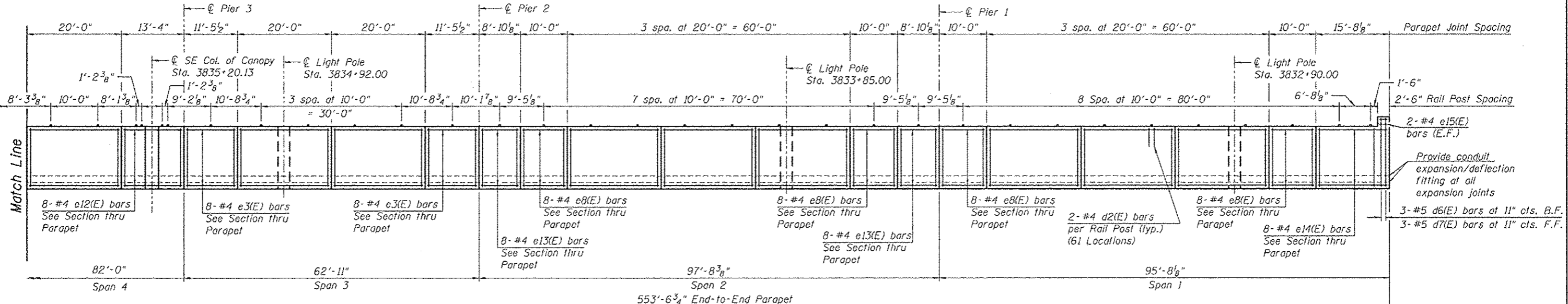
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

WEST PARAPET ELEVATION AND DETAILS
STRUCTURE NO. 016-1716
SHEET NO. S2-32 OF S2-81 SHEETS

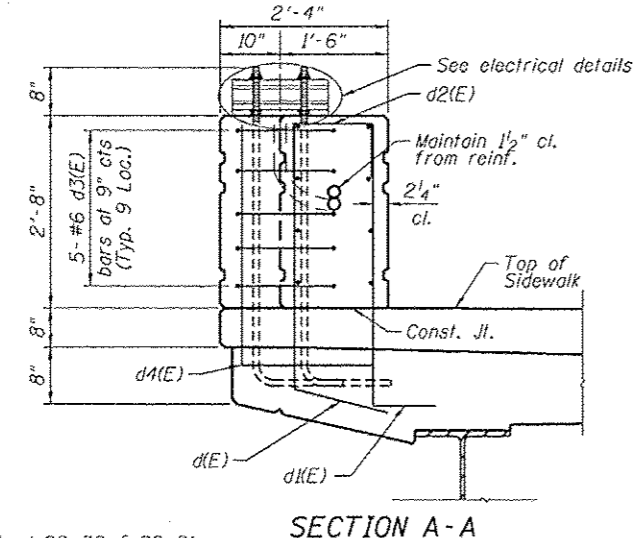
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CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



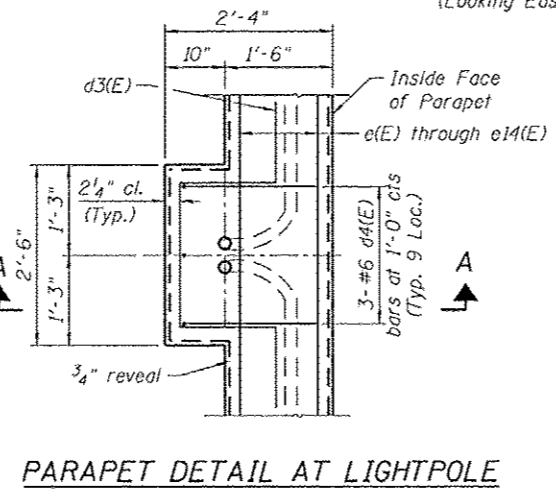
INSIDE ELEVATION OF EAST PARAPET
(Looking East)



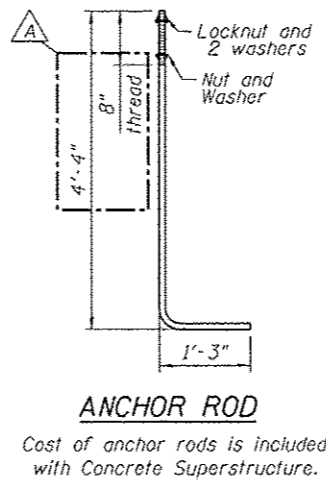
INSIDE ELEVATION OF EAST PARAPET
(Looking East)



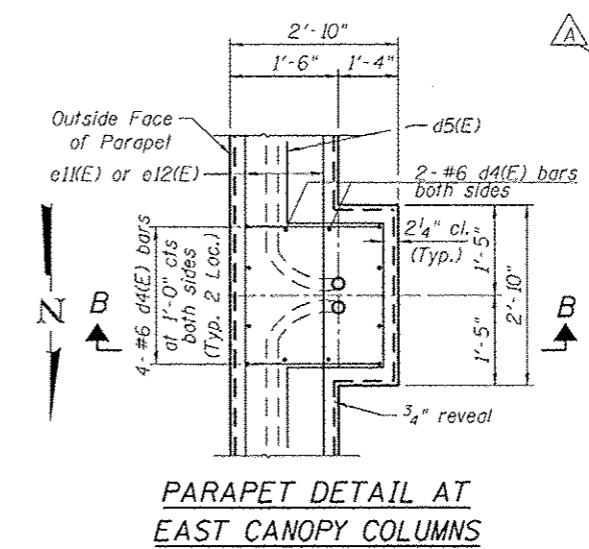
SECTION A-A



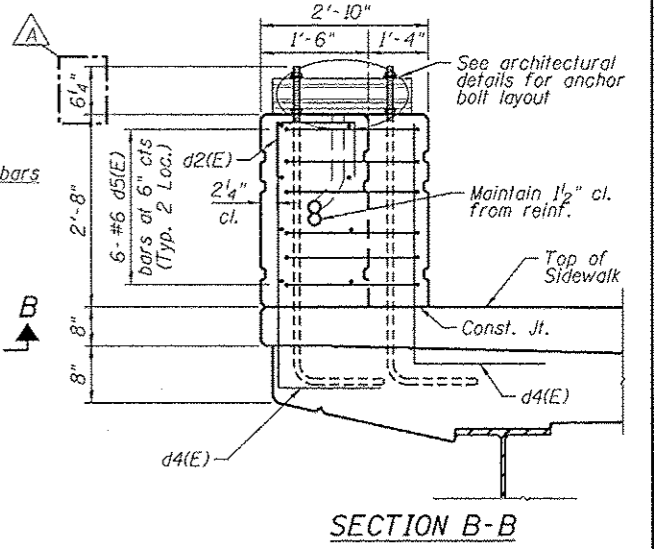
PARAPET DETAIL AT LIGHTPOLE



ANCHOR ROD



PARAPET DETAIL AT EAST CANOPY COLUMNS



SECTION B-B

Notes:
For notes, see Sheet S2-32 of S2-81.

12:10:39 PM 0161718-10126-5033-Parapet-East.dgn

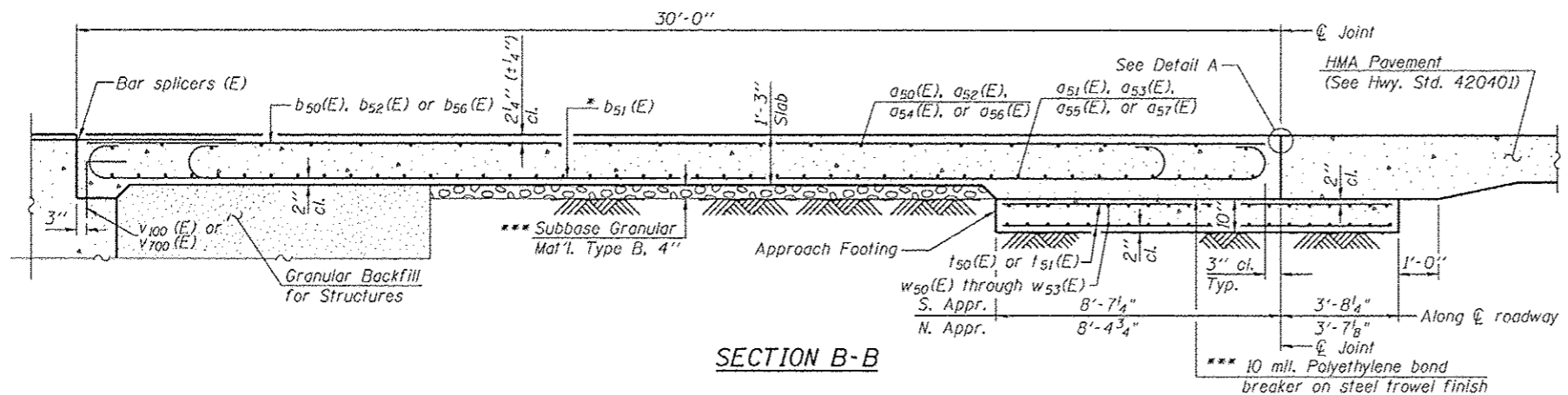


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PLOT DATE = 10/14/2013	DRAWN - WJC	REVISED
	CHECKED - DL	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EAST PARAPET ELEVATION AND DETAILS
STRUCTURE NO. 016-1716
SHEET NO. S2-33 OF S2-81 SHEETS

F.A.U. RTE. 3730	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 393
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

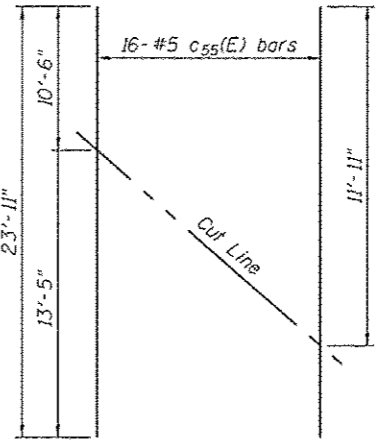


Notes:
 Approach slab and sidewalk concrete shall be paid for as Concrete Superstructure.
 Approach footing concrete shall be paid for as Concrete Structures.
 Reinforcement shall be paid for as Reinforcement Bars, Epoxy Coated.
 For v_{100} (E) and v_{700} (E) bar details and for Granular Embankment for Structures, see Sheet S2-53 and S2-56 of S2-81.
 For drainage treatment details, see sheets S2-54 and S2-57 of S2-81.
 The approach footing maximum applied service bearing pressure (Q_{max}) = 2.0 ksf.
 For bar splicer details, see sheet S2-73 of S2-81.
 Cost of excavation for approach footing included with Concrete Structures.
 The cost of expansion anchors/inserts is included in the cost of Reinforcement Bars, Epoxy Coated.
 For lightpole foundation details, see Lighting Plans.

Minimum Bar Laps	
Bar	Lap
#4	2'-7"
#5	3'-3"
#6	3'-10"
#7	5'-2"
#8	6'-9"

**SOUTH APPROACH
BILL OF MATERIAL**

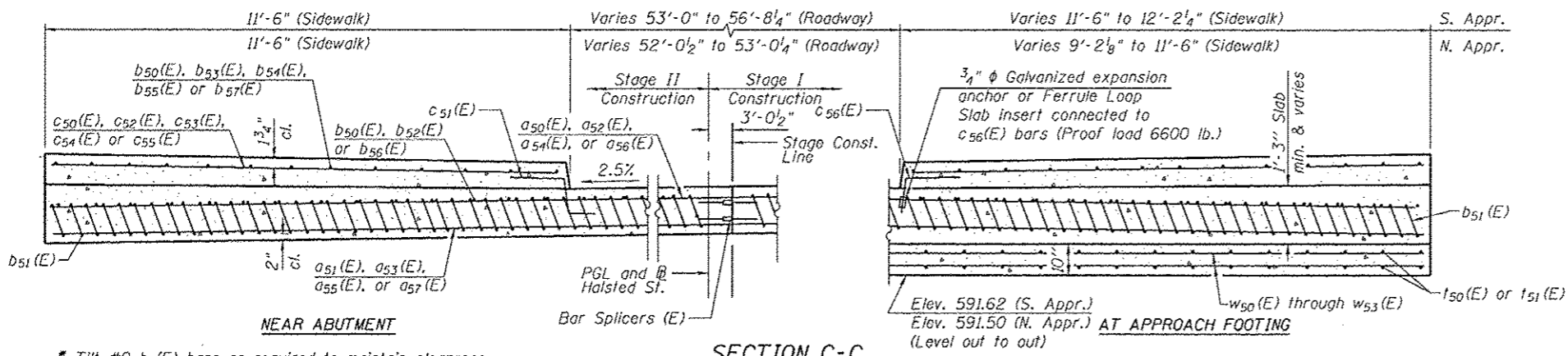
Bar	No.	Size	Length	Shape	
a50(E)	50	#4	23'-11"	—	
a51(E)	92	#5	24'-3"	—	
a52(E)	50	#4	27'-8"	—	
a53(E)	92	#5	28'-1"	—	
a58(E)	8	#5	3'-8"	—	
b50(E)	62	#4	29'-9"	—	
b51(E)	194	#9	29'-9"	—	
b52(E)	5	#4	32'-11"	—	
b53(E)	1	#5	32'-7"	—	
b54(E)	13	#5	29'-9"	—	
b55(E)	11	#5	32'-9"	—	
c50(E)	31	#5	13'-9"	—	
c51(E)	31	#5	2'-4"	—	
c52(E)	21	#5	15'-2"	—	
c53(E)	10	#5	15'-0"	—	
c56(E)	31	#5	2'-1"	—	
t50(E)	164	#4	11'-10"	—	
w50(E)	80	#5	24'-3"	—	
w51(E)	80	#5	28'-1"	—	
Concrete Superstructure				Cu. Yd.	128.7
Concrete Structures				Cu. Yd.	30.5
Reinforcement Bars, Epoxy Coated				Pound	35,300



FIELD CUTTING DIAGRAM
Order c55(E) bars full length

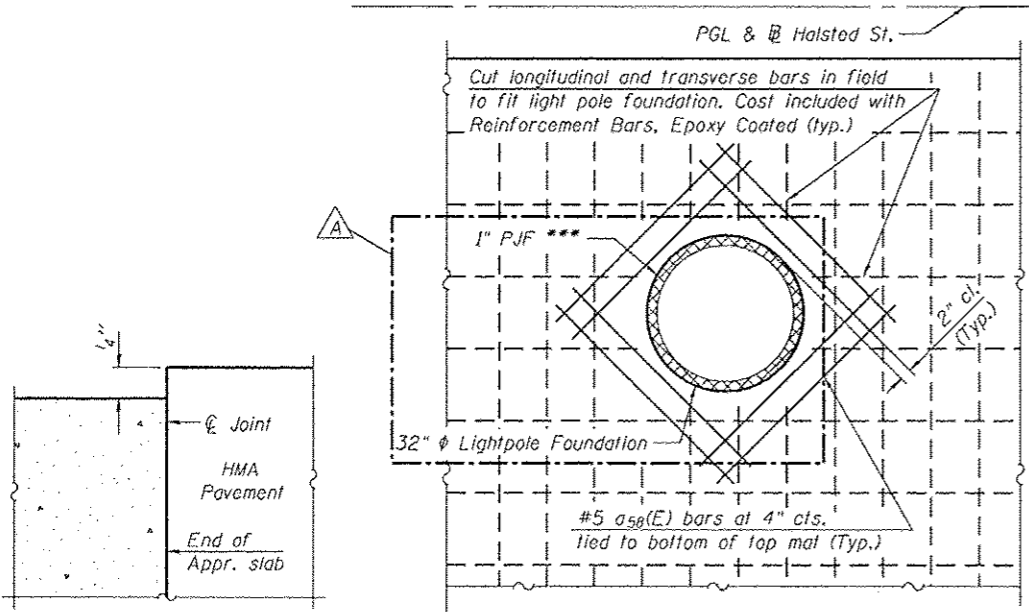
**NORTH APPROACH
BILL OF MATERIAL**

Bar	No.	Size	Length	Shape	
a54(E)	50	#4	23'-5"	—	
a55(E)	92	#5	23'-9"	—	
a56(E)	50	#4	24'-6"	—	
a57(E)	92	#5	24'-10"	—	
a58(E)	8	#5	3'-8"	—	
b50(E)	59	#4	29'-9"	—	
b51(E)	183	#9	29'-9"	—	
b54(E)	12	#5	29'-9"	—	
b56(E)	4	#4	29'-2"	—	
b58(E)	15	#5	29'-0"	—	
c51(E)	31	#5	2'-4"	—	
c54(E)	31	#5	12'-5"	—	
c55(E)	16	#5	23'-11"	—	
c56(E)	31	#5	2'-1"	—	
t51(E)	150	#4	11'-9"	—	
w52(E)	80	#5	23'-9"	—	
w53(E)	80	#5	22'-11"	—	
Concrete Superstructure				Cu. Yd.	121.7
Concrete Structures				Cu. Yd.	26.9
Reinforcement Bars, Epoxy Coated				Pound	32,900



SECTION C-C
(See Plan for dimensions not shown)

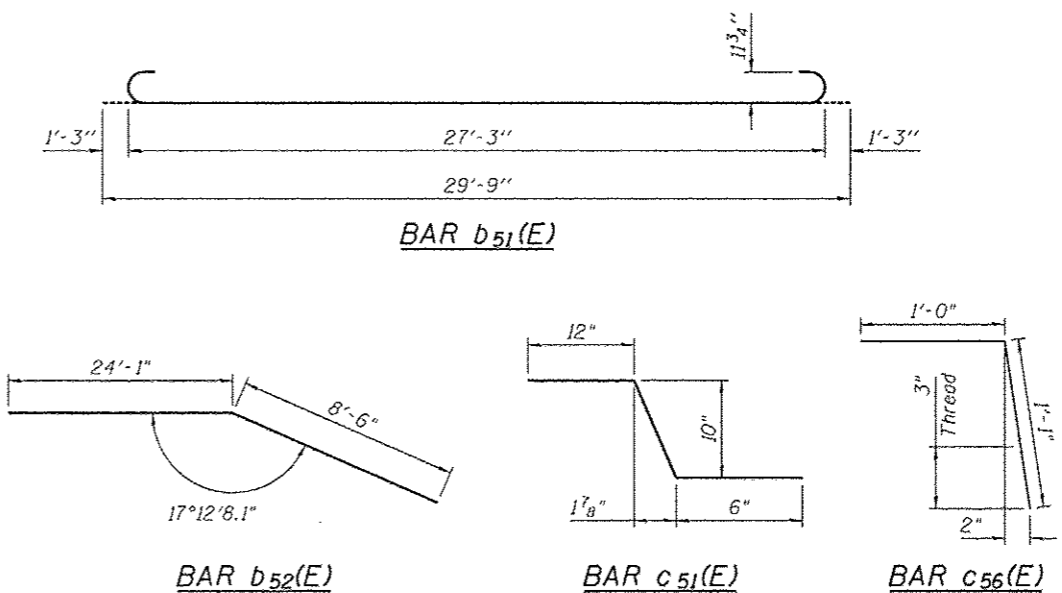
* Till #9 b1(E) bars as required to maintain clearance.
 *** Cost included with Concrete Superstructure.



DETAIL A

DETAIL D

Detail shown for lightpole foundation at Station 3838+25.
 Lightpole foundation at Station 3832+90 similar.



BAR b51(E)

BAR b52(E)

BAR c51(E)

BAR c56(E)

12:41:41 PM 0161716-60126-5035-Appr-Slab-Details2.dgn

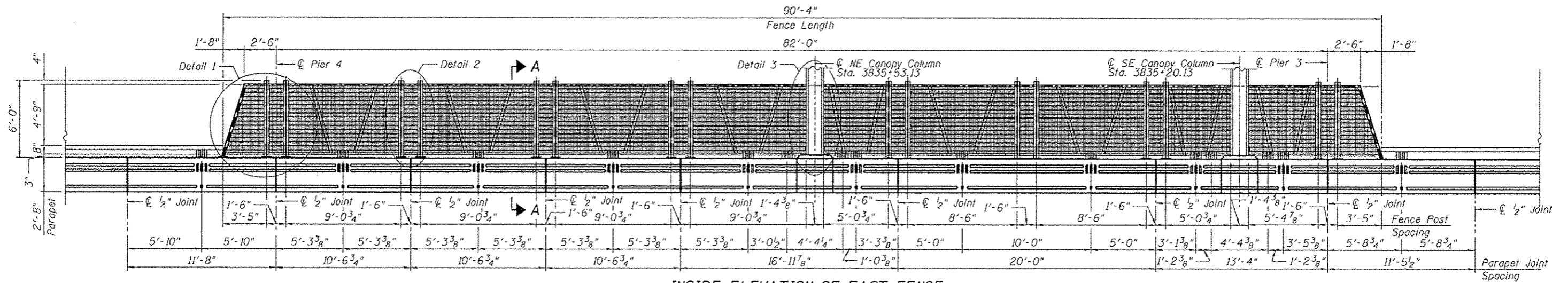


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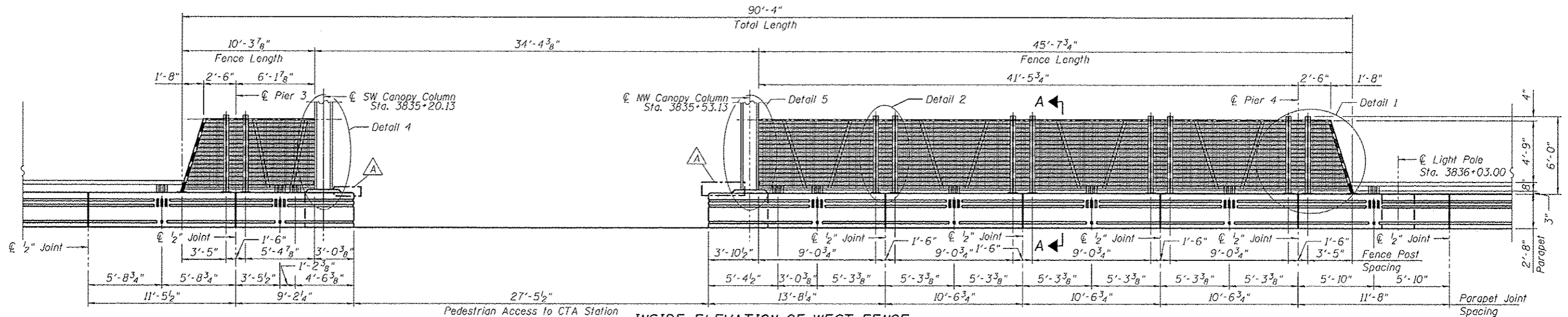
**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**BRIDGE APPROACH SLAB DETAILS 2
STRUCTURE NO. 016-1716
SHEET NO. S2-35 OF S2-81 SHEETS**

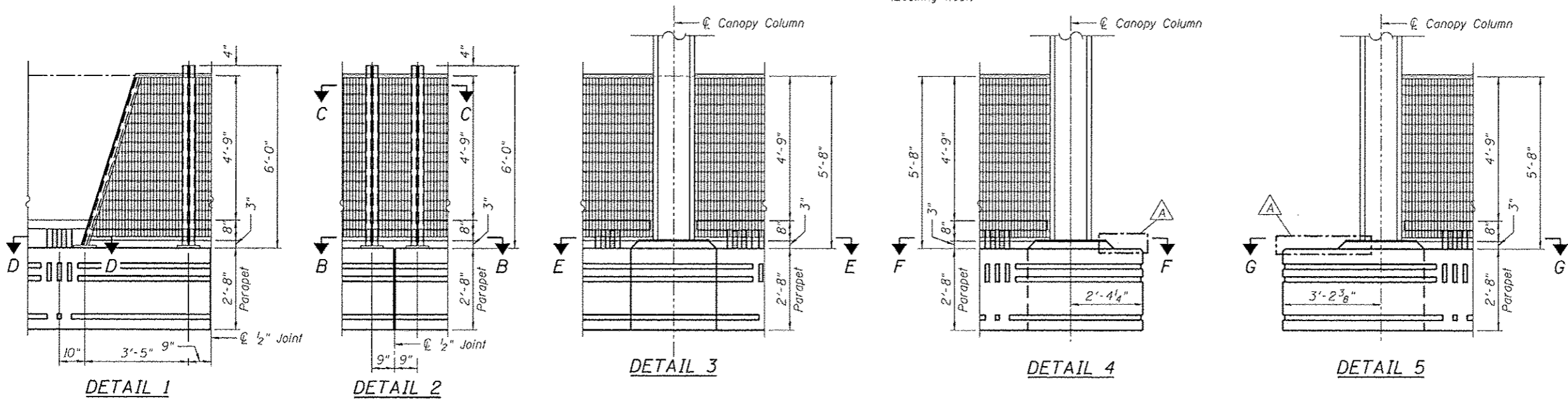
F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	395
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



INSIDE ELEVATION OF EAST FENCE
(Looking East)



INSIDE ELEVATION OF WEST FENCE
(Looking West)



Note:
For Section A-A thru G-G,
see Sheet S2-37 of S2-81.

01/11/16 PM 08:11:16 60W26-S03B-Rolling_FenceElevations.dgn



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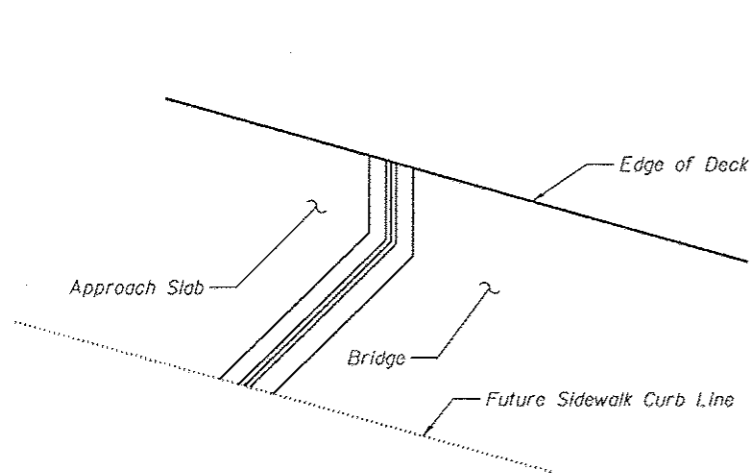
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REVISED 10/15/2013 WJC
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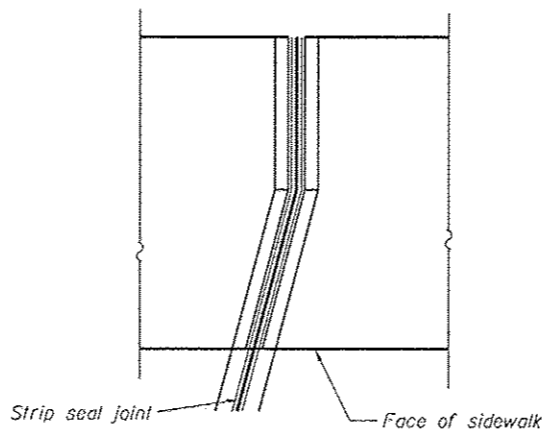
STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

BRIDGE FENCE RAILING ELEVATIONS
 STRUCTURE NO. 016-1716
 SHEET NO. S2-36 OF S2-81 SHEETS

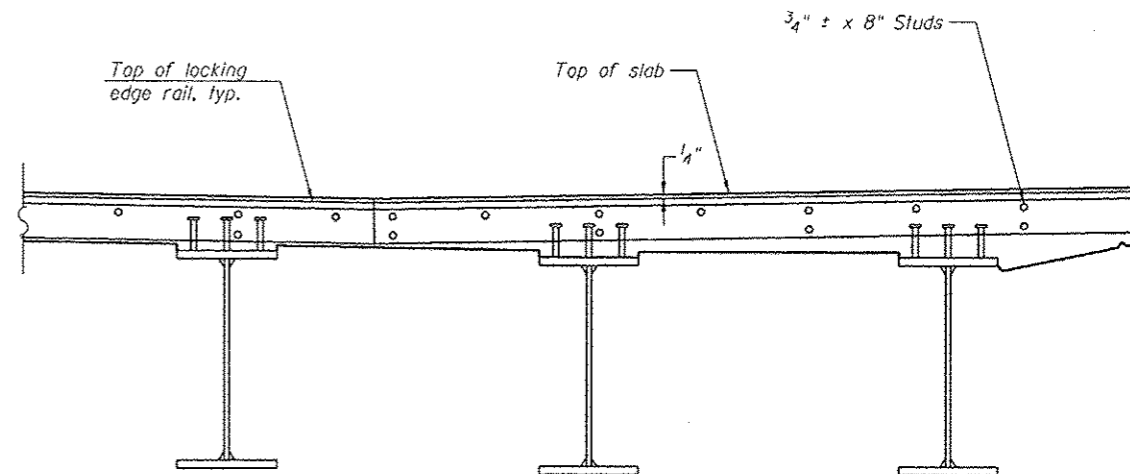
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TRIMETRIC VIEW - STAGE I AND II EAST SIDEWALK

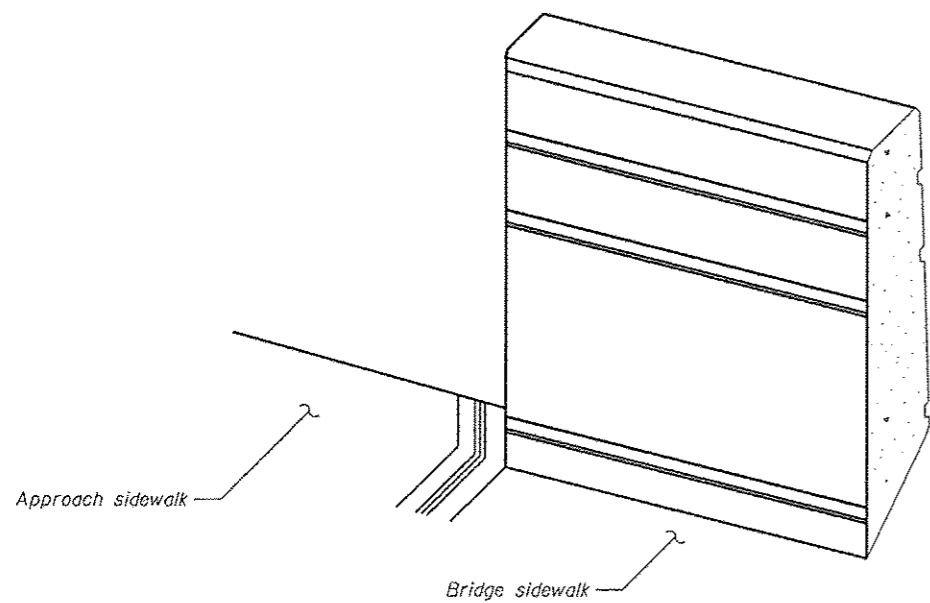


PLAN - STAGE I AND II AT EAST SIDEWALK

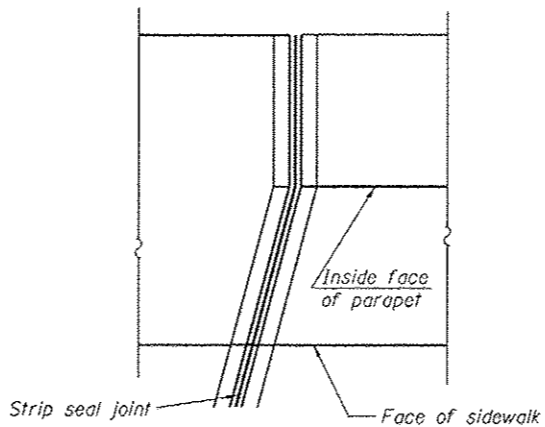


STAGE I AND II TYPICAL END TREATMENT AT EAST SIDEWALK

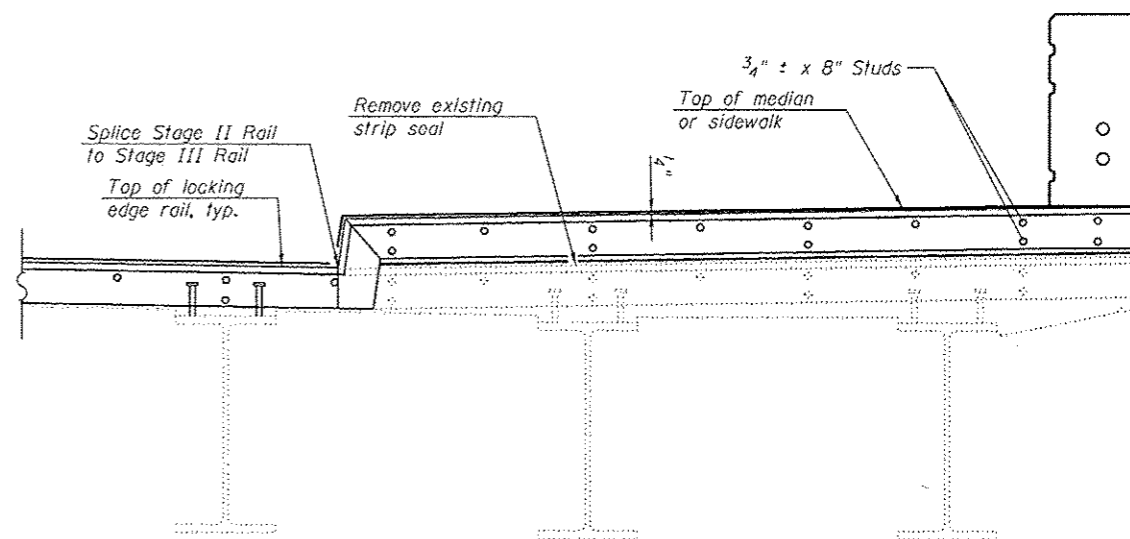
Shorter plates with a single row of studs at 12" cts. may be necessary on sidewalks which are shallower than 9". See manufacturer's recommendation.



TRIMETRIC VIEW - STAGE III AT EAST SIDEWALK

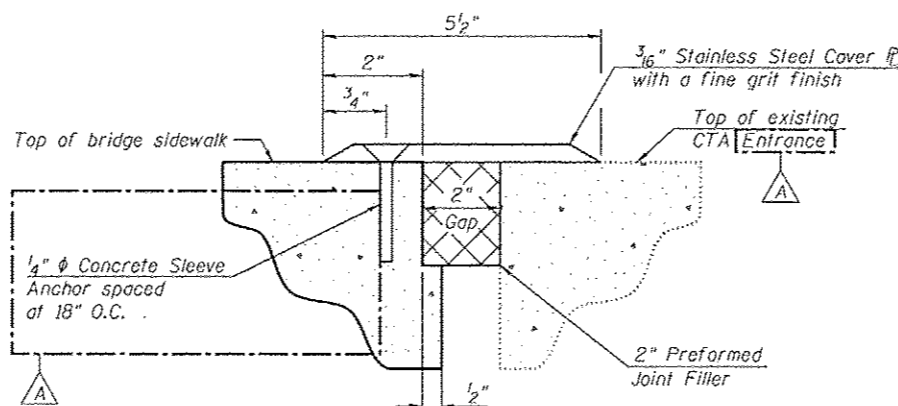


PLAN - STAGE III AT EAST SIDEWALK



STAGE III TYPICAL END TREATMENT AT EAST SIDEWALK

Shorter plates with a single row of studs at 12" cts. may be necessary on sidewalks which are shallower than 9". See manufacturer's recommendation.



CTA STATION EXPANSION JOINT DETAIL

(To be confirmed by the CTA. Cost to be included with Concrete Superstructure)

13:11:52 PM 0161715-60W26-SD42-Exp.Joint_Details2.dgn



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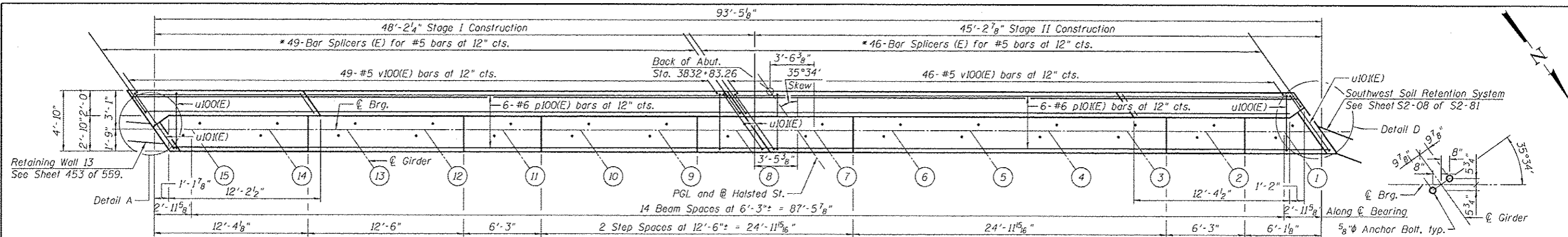
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REVISED		
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REVISED		

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

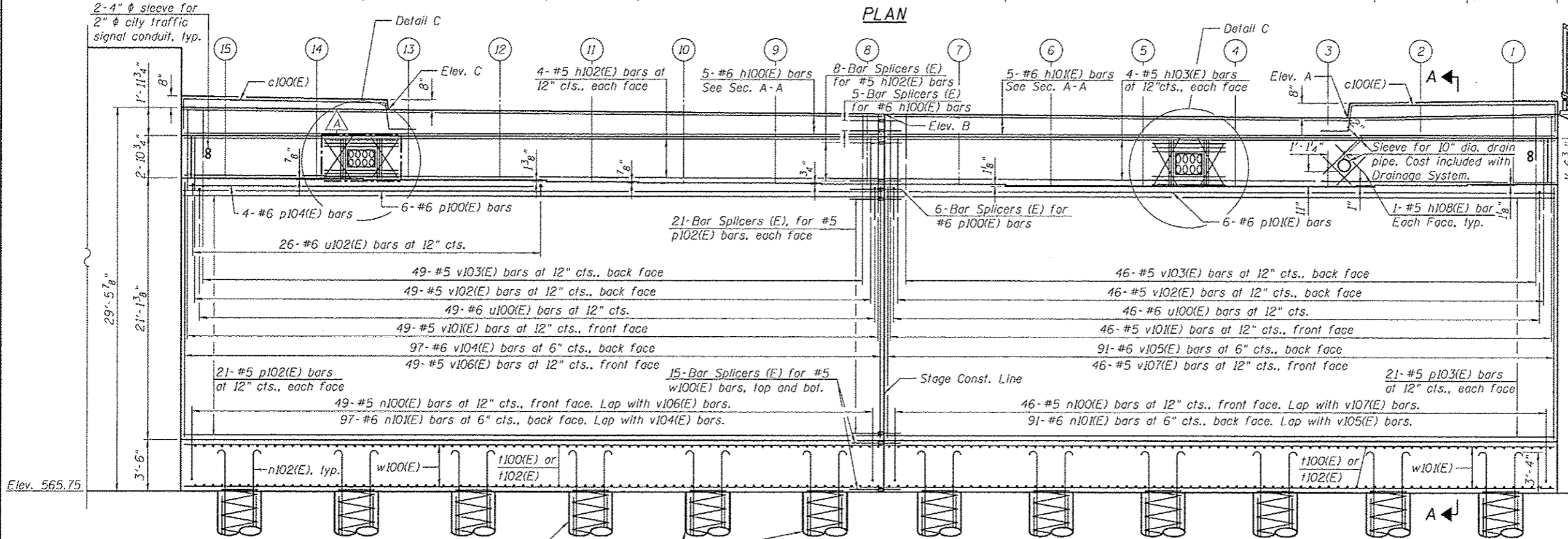
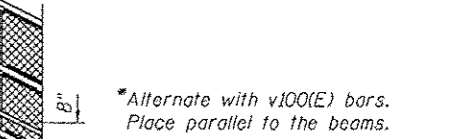
EXPANSION JOINT DETAILS 2
STRUCTURE NO. 016-1716

SHEET NO. S2-42 OF S2-81 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-00BR	COOK	559	402
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



ANCHOR BOLT LAYOUT

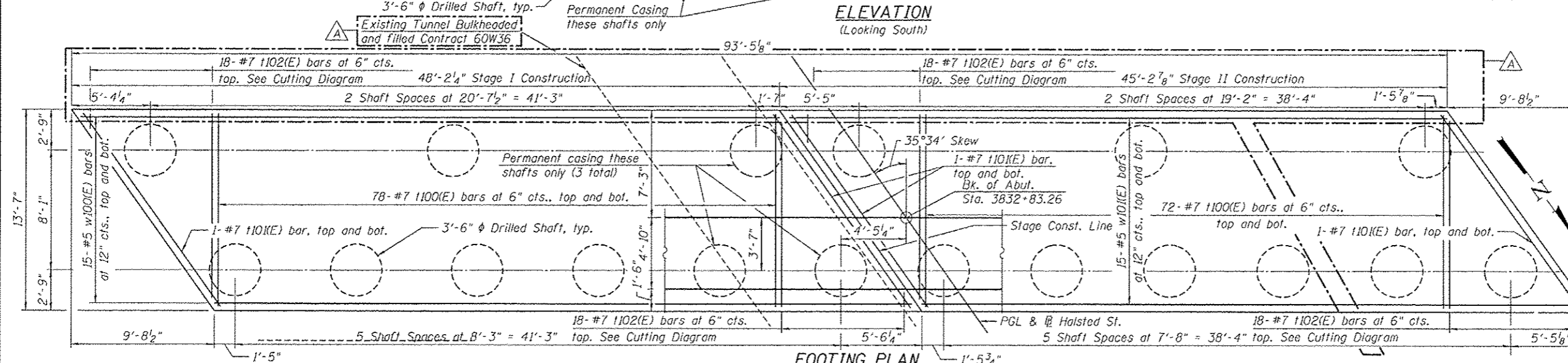


TOP OF SEAT ELEVATIONS

Girder No.	Seat Elevation
1	590.13
2	590.03
3	589.95
4	589.95
5	589.95
6	589.95
7	590.05
8	590.05
9	590.11
10	590.11
11	590.18
12	590.29
13	590.29
14	590.36
15	590.36

TOP OF BACK WALL ELEVATIONS

POINTS	FRONT FACE	BACK FACE
A - West Curb Line	594.64	594.59
B - Stage Const. Line	594.80	594.75
C - East Curb Line	595.06	595.03



Notes:
 For Section A-A and Detail C, see Sheet S2-53.
 For Detail A and Detail D, see Sheet S2-54.

12/16/11 PM 01617116-60126-Subment_SouthP&E.dgn



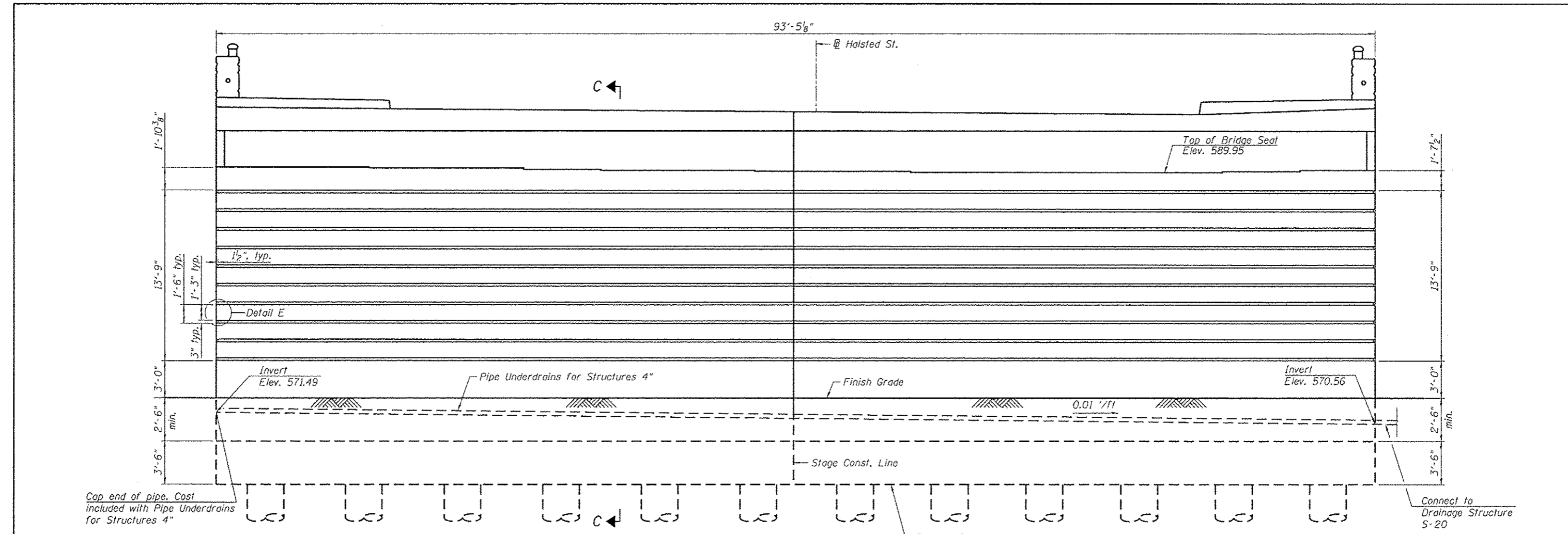
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STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

SOUTH ABUTMENT PLAN AND ELEVATION
 STRUCTURE NO. 016-1716

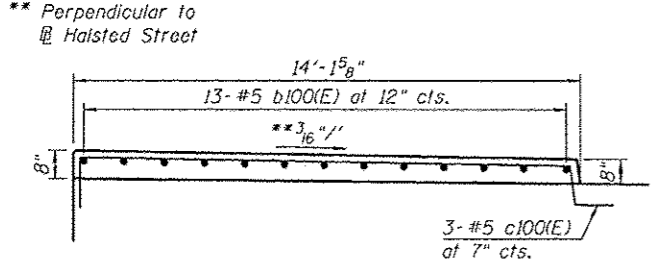
F.A.U. RTE. 3730	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 412
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

SHEET NO. S2-52 OF S2-81 SHEETS

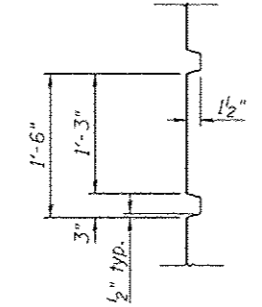


SOUTH ABUTMENT ELEVATION - ARCHITECTURAL DETAILS
(Looking South)

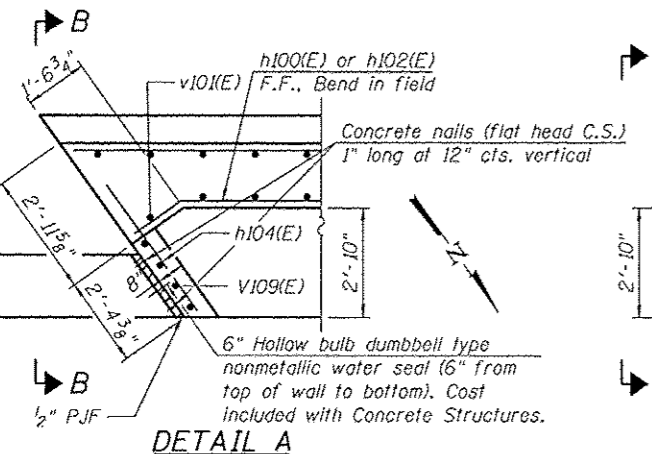
Note:
The 3" x 1/2" reveal will not be paid separately and shall be included in the cost of the pay item "Concrete Structures".



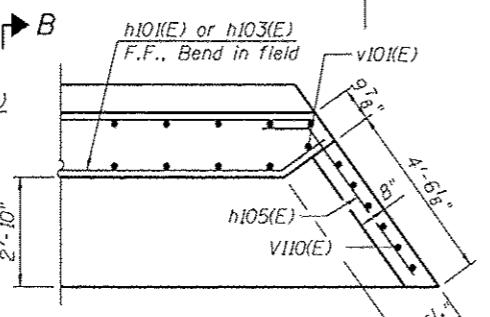
SIDEWALK DETAIL
(East sidewalk shown, West sidewalk similar, opp. hand)



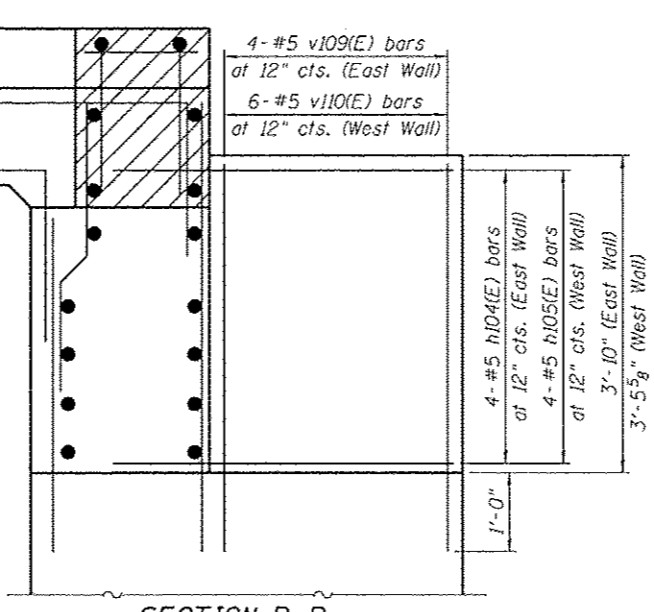
DETAIL E
(Typical Reveal Detail)



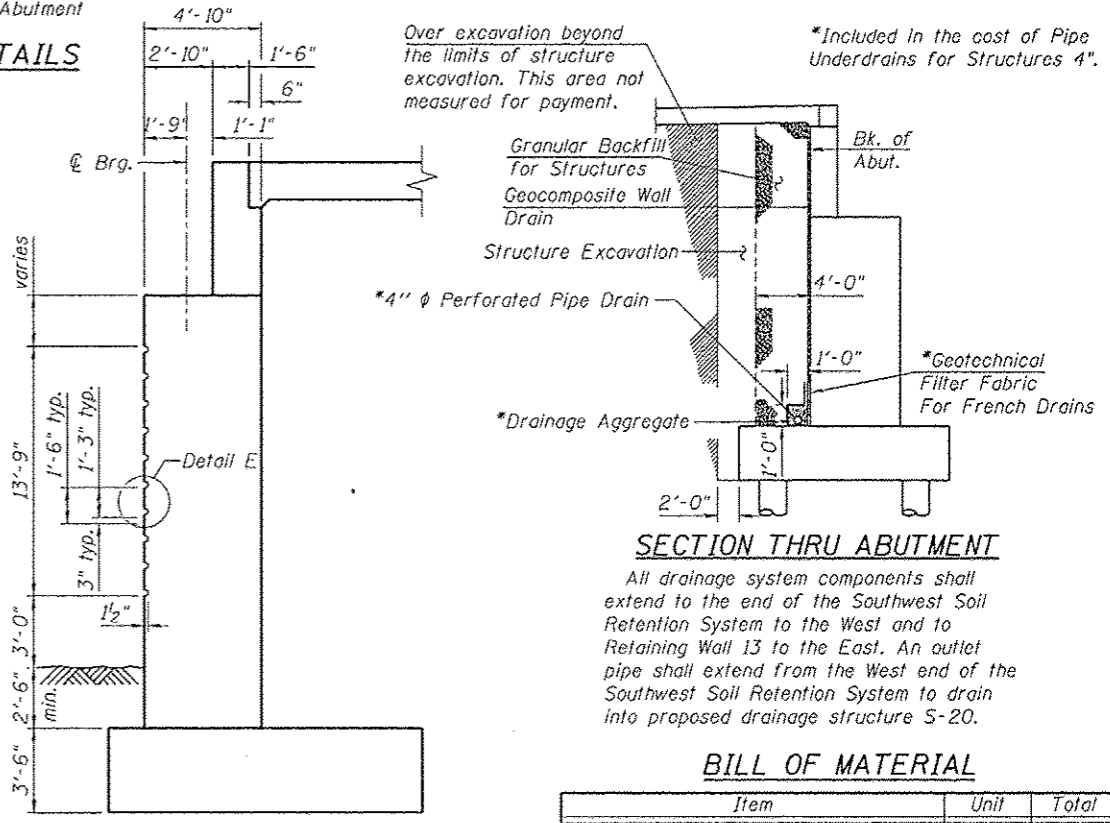
DETAIL A
(East Wall)



DETAIL D
(West Wall)



SECTION B-B



SECTION THRU ABUTMENT

All drainage system components shall extend to the end of the Southwest Soil Retention System to the West and to Retaining Wall 13 to the East. An outlet pipe shall extend from the West end of the Southwest Soil Retention System to drain into proposed drainage structure S-20.

BILL OF MATERIAL

Item	Unit	Total
Pipe Underdrains for Structures 4"	Foot	151

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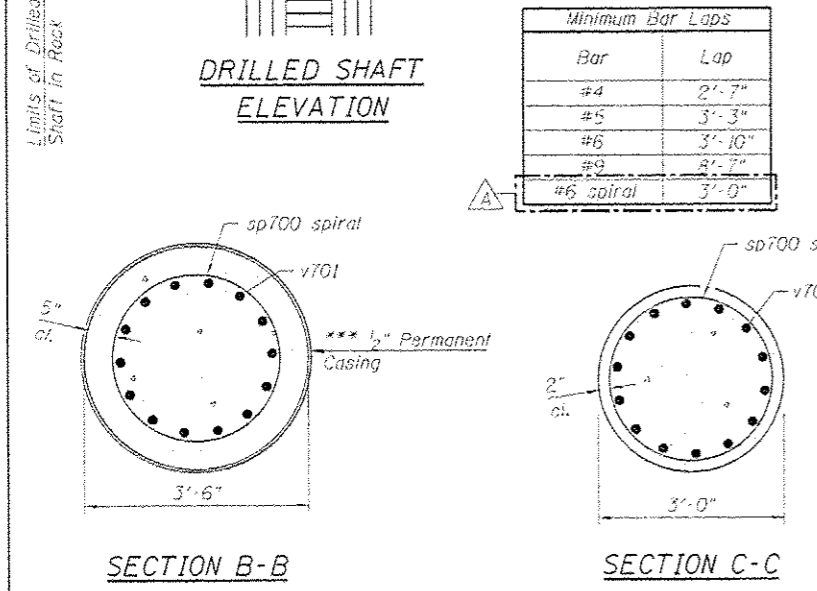
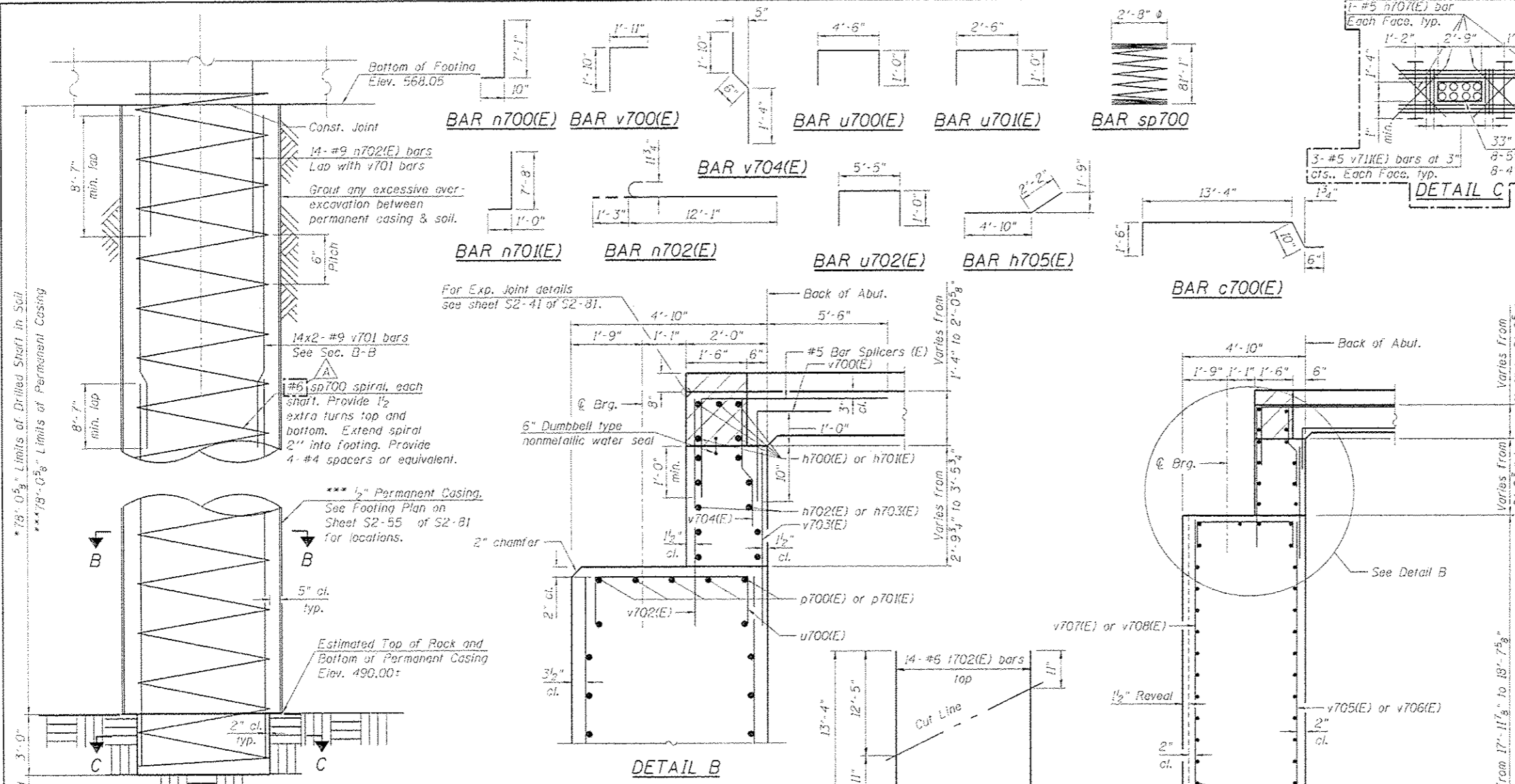
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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

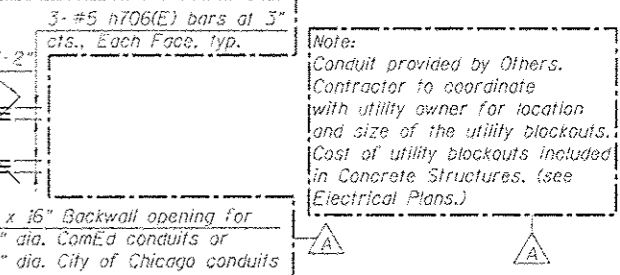
SOUTH ABUTMENT DETAILS 2
STRUCTURE NO. 016-1716
SHEET NO. S2-54 OF S2-81 SHEETS

F.A.U. RTE. 3730	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 414
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

Limits of Drilled Shaft in Soil
Limits of Drilled Shaft in Rock



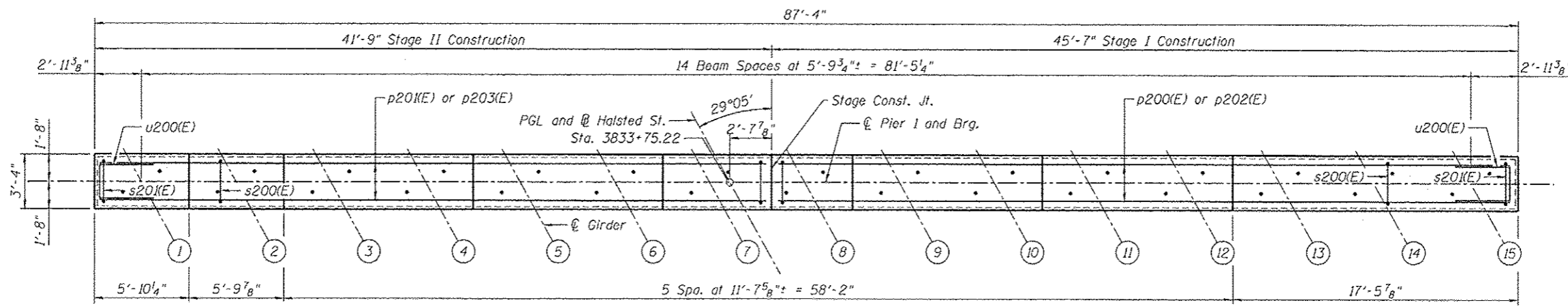
Notes:
 Apply Concrete Sealer to all exposed concrete surfaces of the abutment. Pour steps monolithically with cap.
 Hatched area to be poured after superstructure false work has been removed. Quantity of concrete included with Concrete Superstructure.
 Space u700(E), p700(E) and p701(E) bars to miss anchor bolts.
 * The quantities and detailing are based on the estimated elevations shown on the plans. The actual elevations may differ at each shaft and corresponding adjustments shall be made to the drilled shaft and reinforcement quantities and payment limits.
 *** Contractor may need to increase the casing thickness to withstand the installation process. The Estimated Top of Rock/Bottom of Permanent Casing Elevation is shown. The limits of the casing shall be adjusted as necessary, and as approved, such that the actual installed casing length extends to the as-encountered top of rock at each shaft. See Article 516.06(d) of the Standard Specifications.
 When Contractor's means and methods include initiating drilling for shafts at elevations higher than the final top of shaft elevation (e.g. Existing Ground Elevation, the costs for drilling, disposing of excavation, providing casing and backfilling of drilled shafts or other appurtenant work activities in the areas between the elevation where drilling is initiated and the proposed elevation of the top of shaft shall not be paid for separately but shall be included in the cost of Drilled Shaft in Soil.



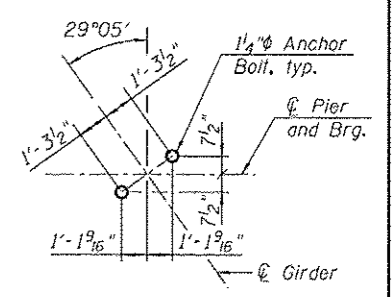
Bar	No.	Size	Length	Shape
b700(E)	26	#5	1'-6"	—
c700(E)	6	#5	16'-2"	—
h700(E)	5	#6	46'-10"	—
h701(E)	5	#6	43'-7"	—
h702(E)	8	#5	46'-10"	—
h703(E)	8	#5	43'-7"	—
h704(E)	4	#5	3'-5"	—
h705(E)	4	#5	7'-0"	—
h706(E)	24	#5	9'-5"	—
h707(E)	16	#5	4'-0"	—
h708(E)	8	#5	2'-10"	—
n700(E)	93	#5	7'-11"	—
n701(E)	158	#6	8'-8"	—
n702(E)	224	#9	13'-4"	—
p700(E)	6	#6	46'-10"	—
p701(E)	6	#6	43'-7"	—
p702(E)	38	#5	46'-10"	—
p703(E)	38	#5	43'-7"	—
p704(E)	4	#6	36'-1"	—
sp700	16	#6	81'-1"	—
v700(E)	256	#7	13'-2"	—
v701(E)	8	#7	15'-9"	—
v702(E)	56	#7	13'-4"	—
u700(E)	93	#6	8'-6"	—
u701(E)	37	#6	4'-6"	—
u702(E)	4	#6	7'-5"	—
v700(E)	93	#5	3'-9"	—
v701	448	#9	44'-10"	—
v702(E)	93	#5	5'-9"	—
v703(E)	93	#5	4'-1"	—
v704(E)	93	#5	3'-8"	—
v705(E)	82	#6	17'-11"	—
v706(E)	76	#6	17'-8"	—
v707(E)	48	#5	17'-11"	—
v708(E)	45	#5	17'-8"	—
v709(E)	4	#5	3'-0"	—
v710(E)	6	#5	3'-2"	—
v711(E)	24	#5	2'-5"	—
w700(E)	30	#5	46'-10"	—
w701(E)	30	#5	43'-7"	—

Structure Excavation	Cu. Yd.	1470
Concrete Structures	Cu. Yd.	480.2
Concrete Superstructure	Cu. Yd.	9.7
Reinforcement Bars	Pound	101,000
Reinforcement Bars, Epoxy Coated	Pound	39,980
Permanent Casing	Foot	313
Drilled Shaft in Soil	Cu. Yd.	445.1
Drilled Shaft in Rock	Cu. Yd.	12.6
Concrete Sealer	Sq. Ft.	1747
Geocomposite Wall Drain	Sq. Yd.	218
Granular Backfill for Structures	Cu. Yd.	291

Bars indicated thus. 1x15-#5 etc., indicates 1 line of bars with 15 lengths per line.
 ** Length is height of spiral.

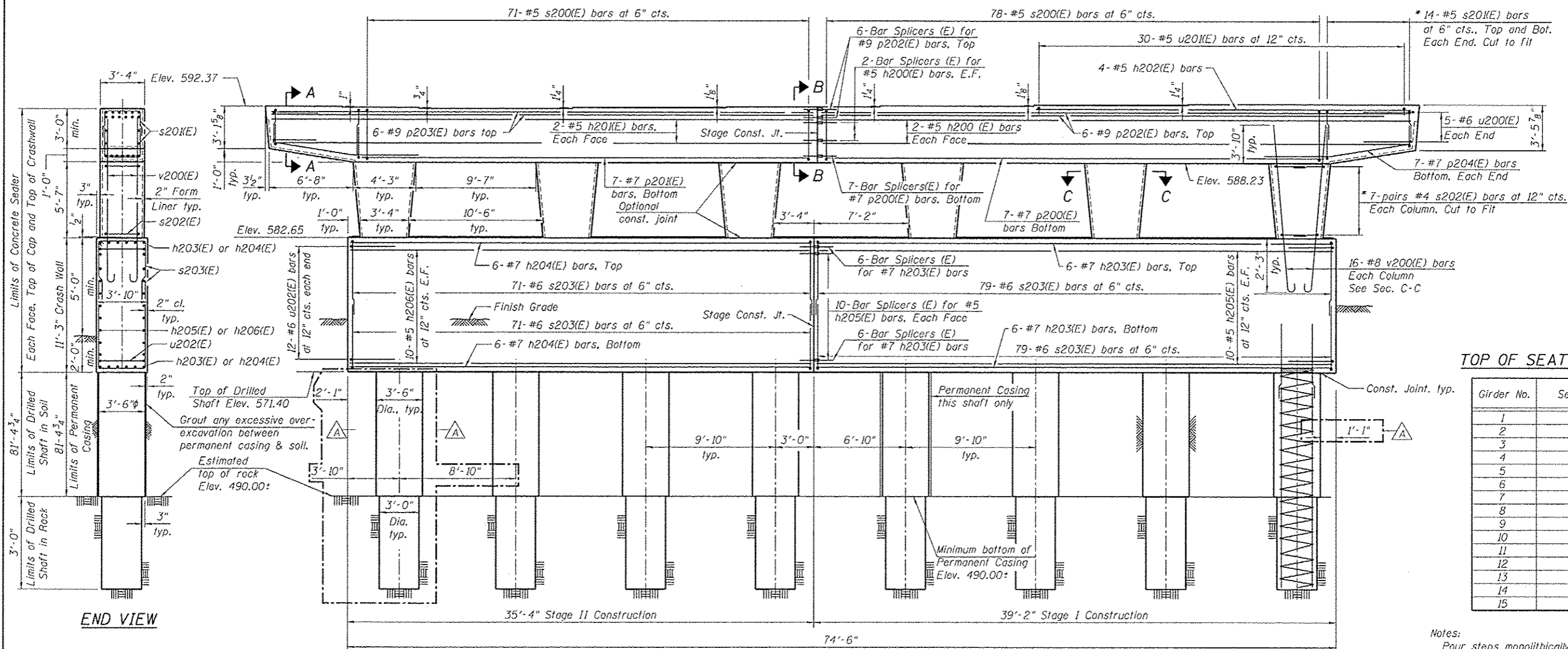


TOP PLAN



ANCHOR BOLT LAYOUT

*Cut vertical legs of bar to fit.



ELEVATION
(Looking North)

TOP OF SEAT ELEVATION

Girder No.	Seat Elevation
1	592.37
2	592.29
3	592.23
4	592.23
5	592.34
6	592.34
7	592.43
8	592.43
9	592.53
10	592.53
11	592.62
12	592.62
13	592.72
14	592.72
15	592.72

Notes:
 Pour steps monolithically with cap.
 Space reinforcement in cap to miss anchor bolts.
 For Sections A-A, B-B and C-C, see sheet S2-59 of S2-81.

12/19/2013 PM 06:17:16 - 60W26-S058-Pier 1, P&E.dgn



USER NAME = BAWtorf	DESIGNED - JRM	REVISED - 10/15/2013 MDS
PLT SCALE = 40.0005 '1' / In.	CHECKED - MDS	REVISED
PLT DATE = 10/14/2013	DRAWN - RLS	REVISED
	CHECKED - JRM	REVISED

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

PIER 1 PLAN AND ELEVATION
STRUCTURE NO. 016-1716

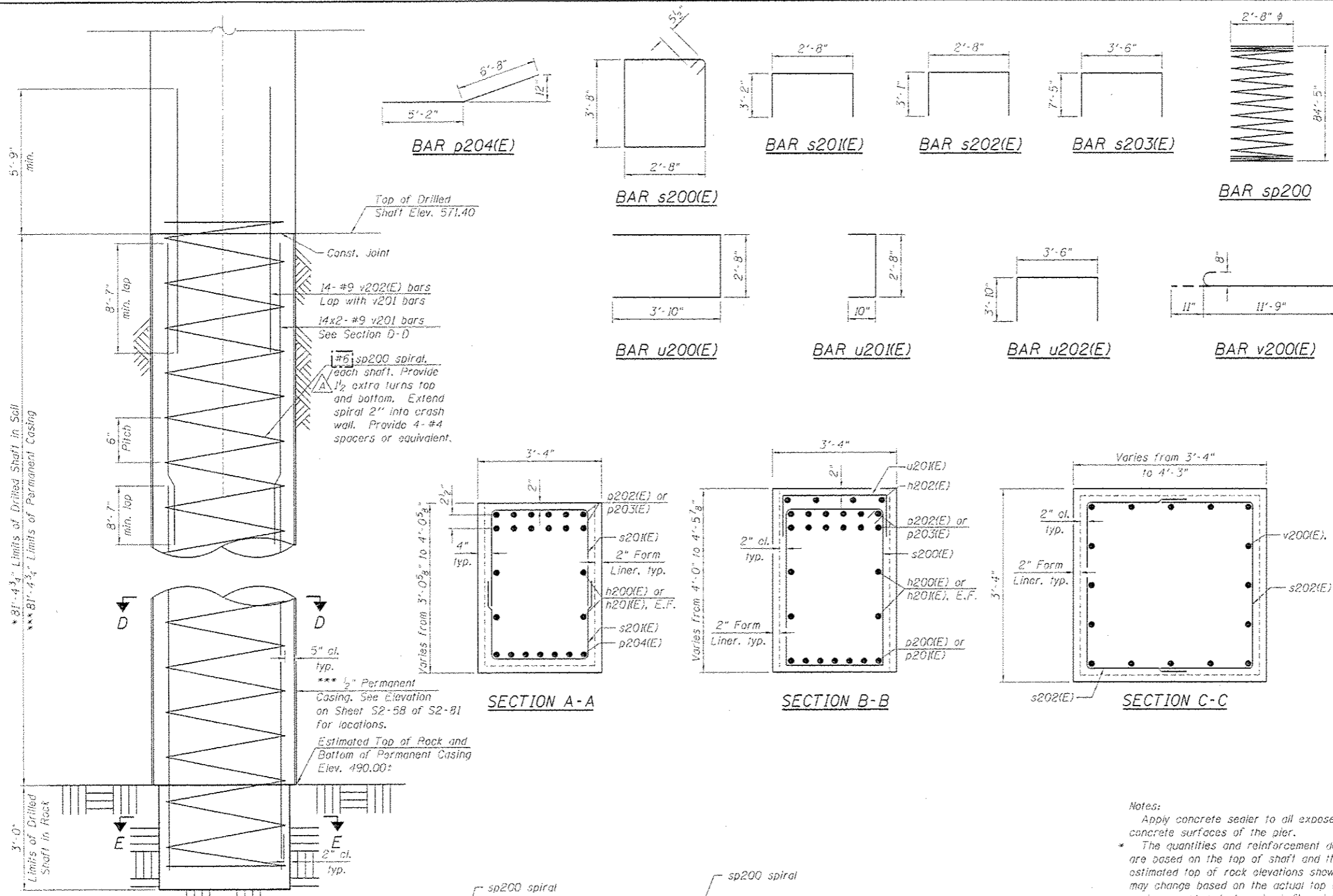
SHEET NO. S2-58 OF S2-81 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	418
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h200(E)	4	#5	44'-10"	—
h201(E)	4	#5	41'-0"	—
h202(E)	4	#5	28'-7"	—
h203(E)	12	#7	38'-10"	—
h204(E)	12	#7	35'-0"	—
h205(E)	20	#5	38'-10"	—
h206(E)	20	#5	35'-0"	—
p200(E)	7	#7	38'-2"	—
p201(E)	7	#7	34'-4"	—
p202(E)	12	#9	45'-1"	—
p203(E)	12	#9	41'-3"	—
p204(E)	14	#7	11'-10"	—
s200(E)	149	#5	13'-7"	□
s201(E)	56	#5	9'-0"	□
s202(E)	84	#4	8'-10"	□
s203(E)	300	#6	18'-4"	□
sp200	8	#6	84'-5"	—
u200(E)	10	#6	10'-4"	□
u201(E)	30	#5	4'-4"	□
u202(E)	24	#6	11'-2"	□
v200(E)	96	#8	12'-8"	—
v201	224	#9	46'-4"	—
v202(E)	112	#9	14'-5"	—
Structure Excavation		Cu. Yd.	68	
Concrete Structures		Cu. Yd.	179.7	
Reinforcement Bars		Pound	52,320	
Reinforcement Bars, Epoxy Coated		Pound	29,590	
Permanent Casing		Foot	82	
Drilled Shaft in Soil		Cu. Yd.	232.1	
Drilled Shaft in Rock		Cu. Yd.	6.3	
Concrete Sealer		Sq. Ft.	3773	

Bars indicated thus 1x15 etc., indicates 1 line of bars with 15 lengths per line.



Minimum Bar Laps

Bar	Lap
#4	2'-7"
#5	3'-3"
#6	3'-10"
#7	5'-2"
#8	6'-9"
#9	2'-7"
#6 spiral	3'-0"

Notes:

Apply concrete sealer to all exposed concrete surfaces of the pier.

* The quantities and reinforcement detailing are based on the top of shaft and the estimated top of rock elevations shown and may change based on the actual top of rock encountered at each shaft and the final top of shaft elevation.

** Length is height of spiral.

*** Contractor may need to increase the casing thickness to withstand the installation process. The Estimated Top of Rock/Bottom of Permanent Casing Elevation is shown. The limits of casing shall be adjusted as necessary, and as approved, such that the actual installed casing length extends to the as-encountered top of rock at each shaft. See Article 516.06(d) of the Standard Specifications.

When Contractor's means and methods include initiating drilling for shafts at elevations higher than the final top of shaft elevation (e.g. Existing Ground Elevation), the costs for drilling, disposing of excavation, providing casing and backfilling of drilled shafts or other appurtenant work activities in the areas between the elevation where drilling is initiated and the proposed elevation of the top of shaft shall not be paid for separately but shall be included in the cost of Drilled Shaft in Soil.

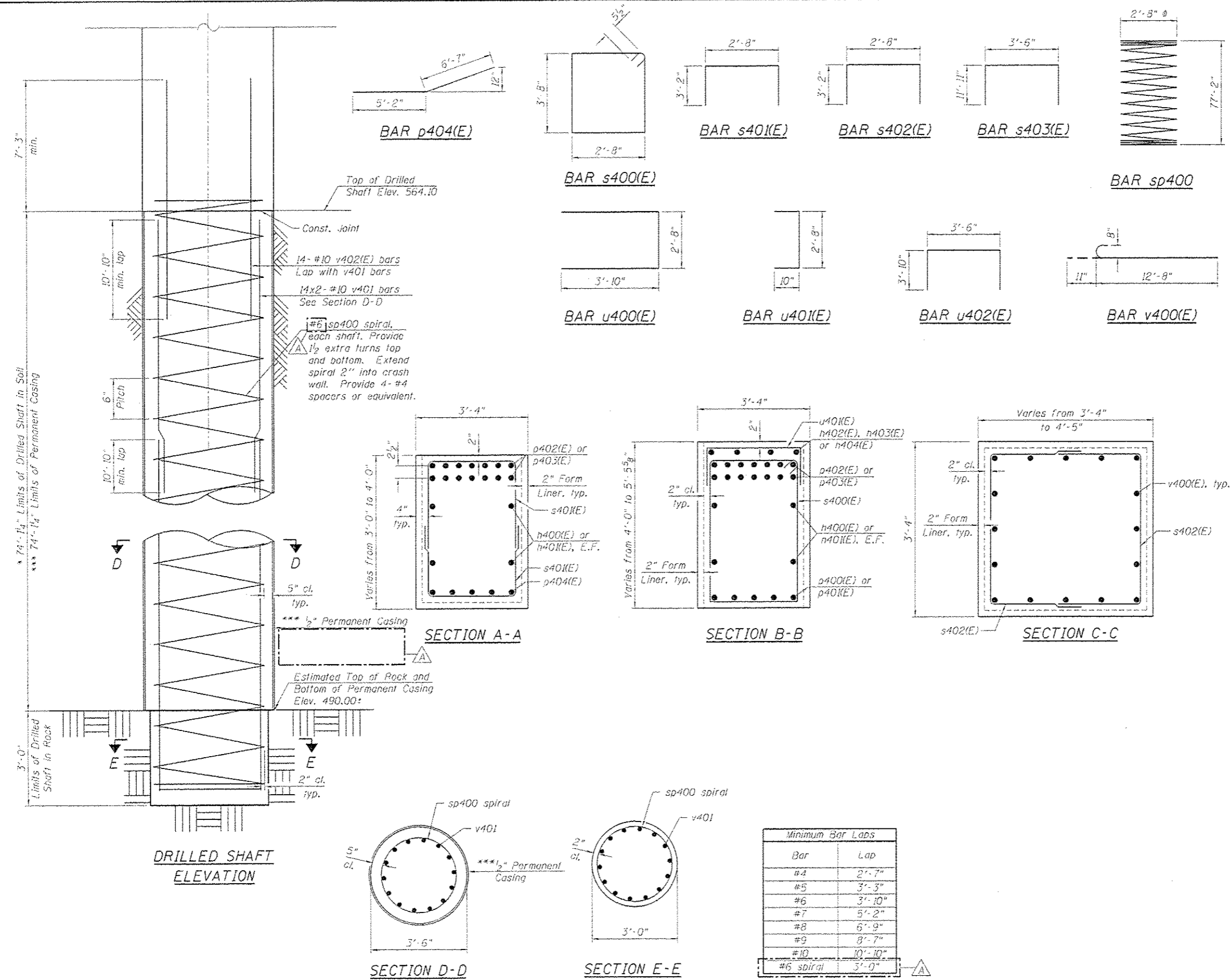
231141.P1 06/17/16 06W26-S059-Pier 1.Dwg (16/16).dgn

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h400(E)	4	#5	38'-7"	—
h401(E)	4	#5	35'-11"	—
h402(E)	8	#5	19'-8"	—
h403(E)	4	#5	7'-1"	—
h404(E)	4	#5	11'-0"	—
h405(E)	13	#6	33'-10"	—
h406(E)	13	#6	37'-5"	—
h407(E)	38	#5	33'-10"	—
h408(E)	38	#5	37'-5"	—
p400(E)	5	#7	32'-2"	—
p401(E)	5	#7	29'-6"	—
p402(E)	14	#9	38'-10"	—
p403(E)	14	#9	36'-2"	—
p404(E)	10	#7	11'-9"	—
s400(E)	127	#5	13'-7"	□
s401(E)	56	#5	9'-0"	□
s402(E)	96	#4	9'-0"	□
s403(E)	290	#5	27'-4"	□
sp400	12	#6	77'-2"	⊘
u400(E)	10	#6	10'-4"	□
u401(E)	61	#5	4'-4"	□
u402(E)	42	#6	11'-2"	□
v400(E)	96	#8	13'-7"	⊘
v401	336	#10	43'-10"	—
v402(E)	168	#10	18'-3"	—
Structure Excavation Cu. Yd. 199				
Concrete Structures Cu. Yd. 268.7				
Reinforcement Bars Pound 86,730				
Reinforcement Bars, Epoxy Coated Pound 38,190				
Permanent Casing Foot 890				
Drilled Shaft in Soil Cu. Yd. 316.9				
Drilled Shaft in Rock Cu. Yd. 9.4				
Concrete Sealer Sq. Ft. 5095				

Bars indicated thus 1x15 etc., indicates 1 line of bars with 15 lengths per line.

Notes:
 Apply concrete sealer to all exposed concrete surfaces of the pier.
 * The quantities and reinforcement detailing are based on the top of shaft and the estimated top of rock elevations shown and may change based on the actual top of rock encountered at each shaft and the final top of shaft elevation.
 ** Length is height of spiral.
 *** Contractor may need to increase the casing thickness to withstand the installation process. The Estimated Top of Rock/Bottom of Permanent Casing Elevation is shown. The limits of casing shall be adjusted as necessary, and as approved, such that the actual installed casing length extends to the as-encountered top of rock at each shaft. See Article 316.06(d) of the Standard Specifications.



USER NAME: jrmickow	DESIGNED: JRM	REVISION: 10/15/2013 JRM
PROJECT SCALE: 0=2.0000' = 1" / 16'	CHECKED: MOS	REVISION:
PLUT DATE: 10/24/2013	DRAWN: RLS	REVISION:
	CHECKED: JRM	REVISION:

**STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION**

**PIER 3 DETAILS
 STRUCTURE NO. 016-1716**

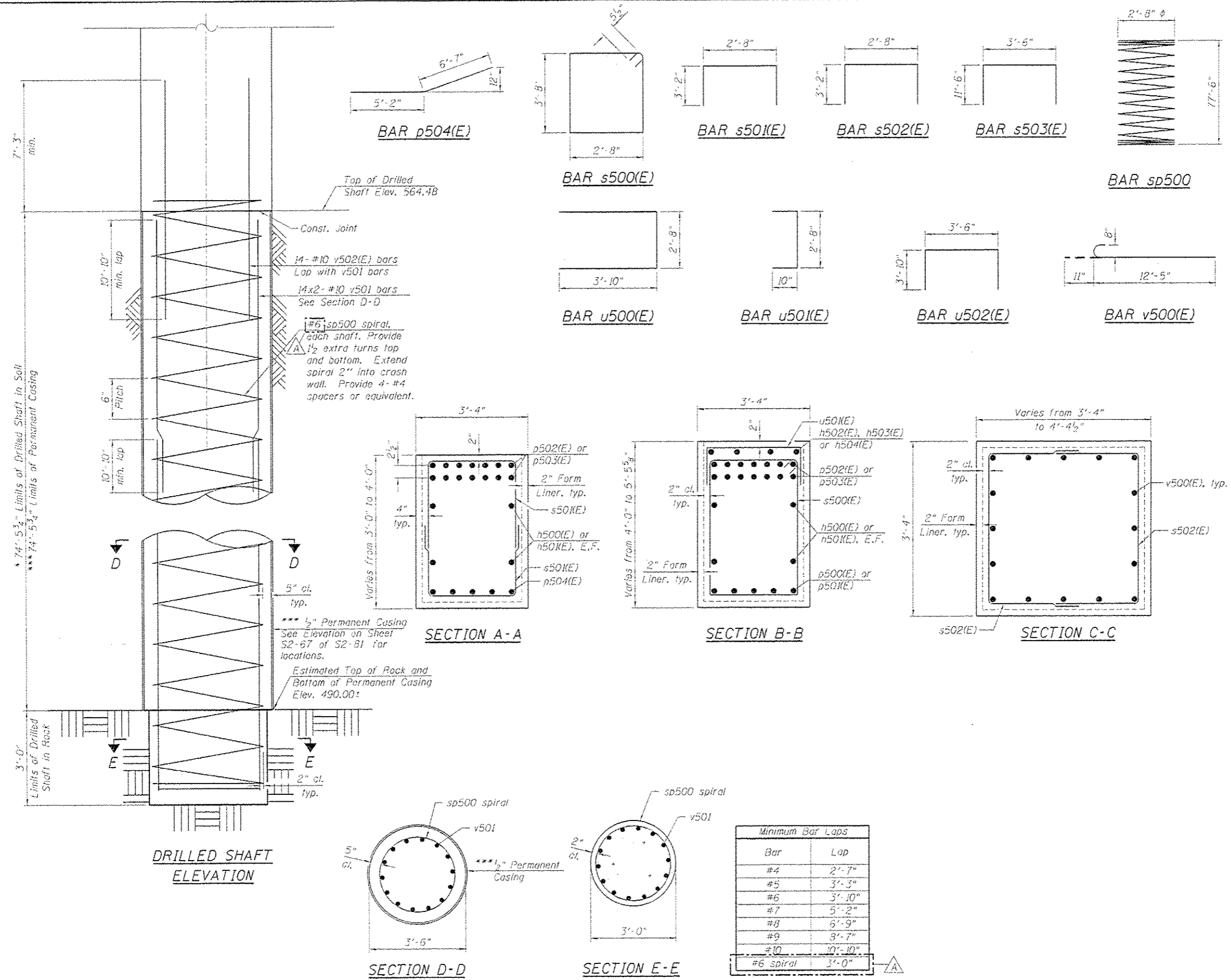
F.A.U. RTE. 3720	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 425
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT

BILL OF MATERIAL

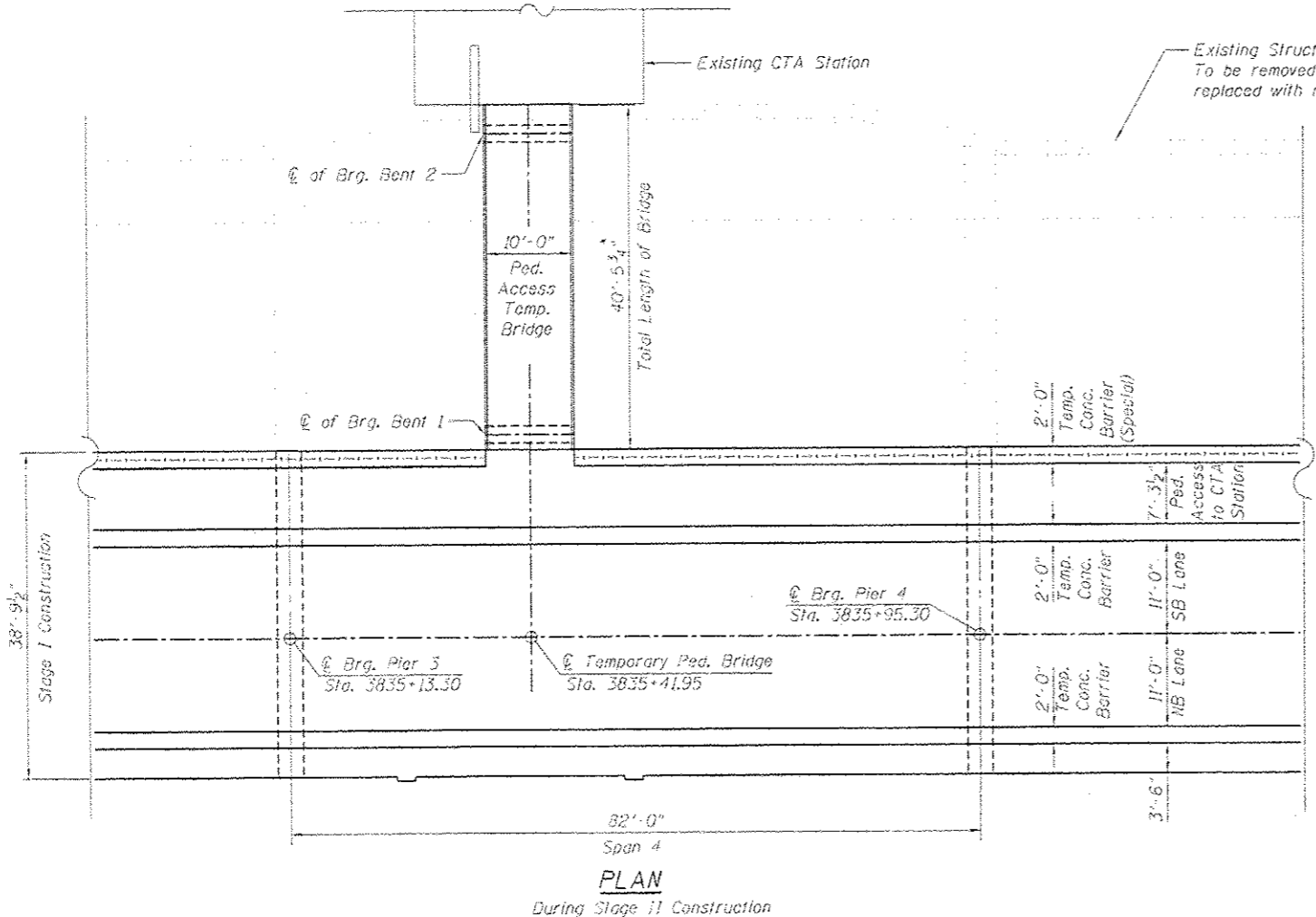
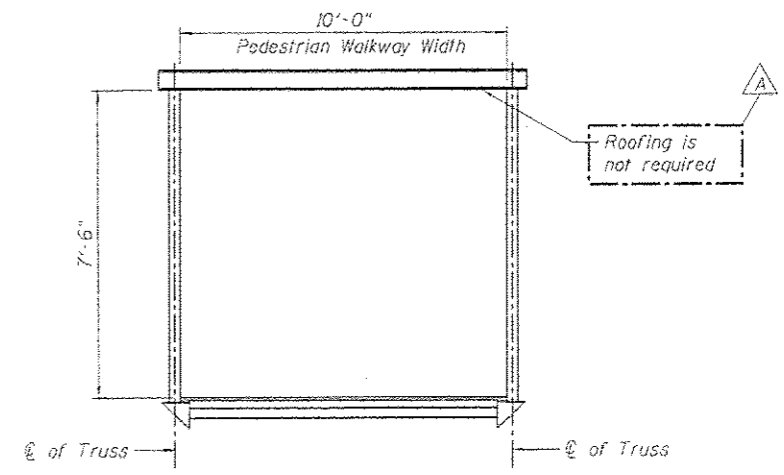
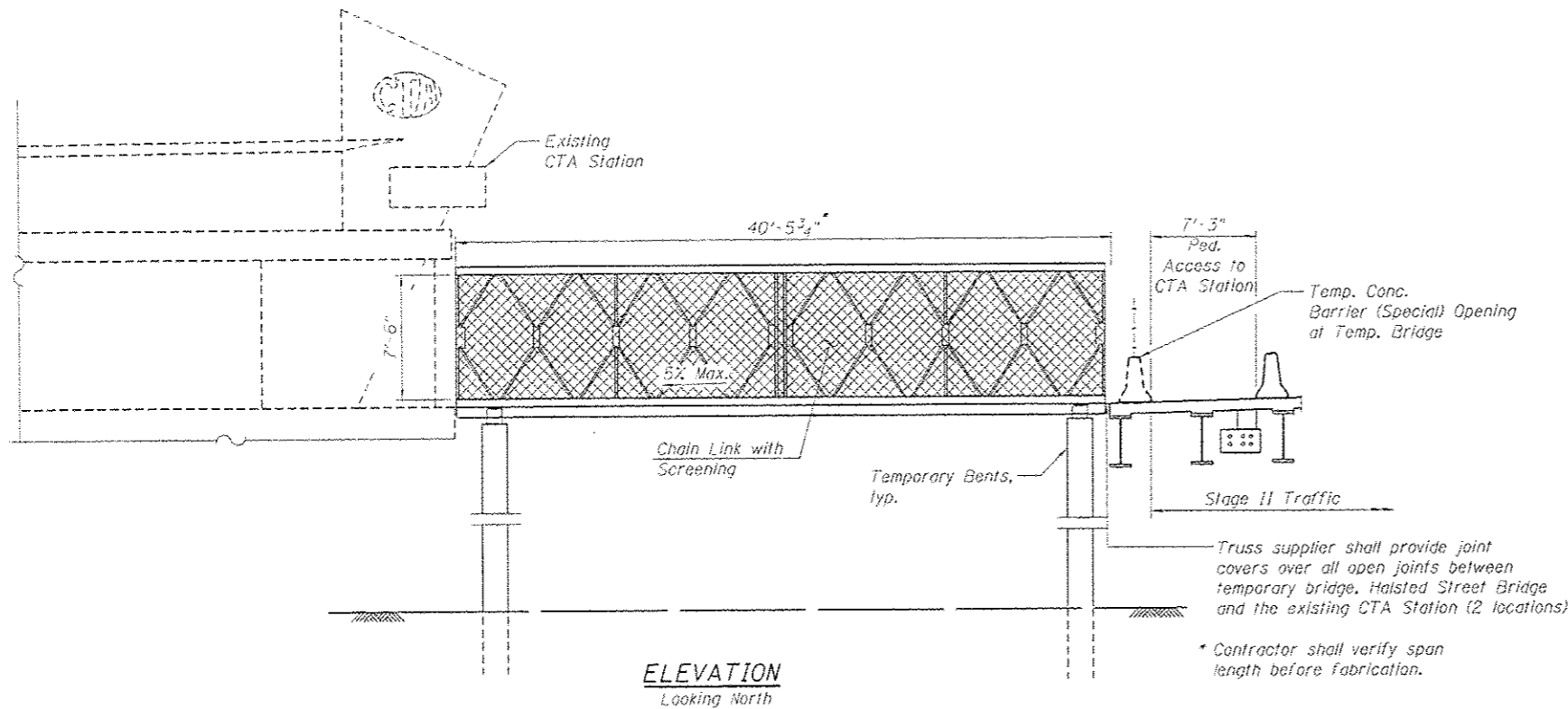
Bar	No.	Size	Length	Shape
h500(E)	4	#5	38'-4"	—
h501(E)	4	#5	36'-2"	—
h502(E)	8	#5	19'-8"	—
h503(E)	4	#5	6'-10"	—
h504(E)	4	#5	11'-3"	—
h505(E)	13	#6	33'-7"	—
h506(E)	13	#6	37'-8"	—
h507(E)	38	#5	33'-7"	—
h508(E)	38	#5	37'-8"	—
p500(E)	5	#7	31'-11"	—
p501(E)	5	#7	29'-9"	—
p502(E)	14	#9	38'-7"	—
p503(E)	14	#9	36'-5"	—
p504(E)	10	#7	11'-9"	—
s500(E)	127	#5	13'-7"	□
s501(E)	56	#5	9'-0"	□
s502(E)	84	#4	9'-0"	□
s503(E)	292	#6	26'-6"	□
sp500	12	#6	77'-6"	—
u500(E)	10	#6	10'-4"	□
u501(E)	61	#5	4'-4"	□
u502(E)	42	#6	11'-2"	□
v500(E)	96	#8	13'-4"	—
v501	336	#10	44'-0"	—
v502(E)	168	#10	18'-3"	—
Structure Excavation		Cu. Yd.	182	
Concrete Structures		Cu. Yd.	260.3	
Reinforcement Bars		Pound	87,070	
Reinforcement Bars, Epoxy Coated		Pound	41,410	
Permanent Casing		Foot	149	
Drilled Shaft in Soil		Cu. Yd.	318.5	
Drilled Shaft in Rock		Cu. Yd.	9.4	
Concrete Sealer		Sq. Ft.	4957	

Bars indicated thus 1x15 etc., indicates 1 line of bars with 15 lengths per line.

Notes:
 Apply concrete sealer to all exposed concrete surfaces of the pier.
 * The quantities and reinforcement detailing are based on the top of shaft and the estimated top of rock elevations shown and may change based on the actual top of rock encountered at each shaft and the final top of shaft elevation.
 ** Length is height of spiral.
 *** Contractor may need to increase the casing thickness to withstand the installation process. The Estimated Top of Rock/Bottom of Permanent Casing Elevation is shown. The limits of casing shall be adjusted as necessary, and as approved, such that the actual installed casing length extends to the as-encountered top of rock at each shaft. See Article 516.06(d) of the Standard Specifications.



S:\2013\11-11-13\11-11-13-Sub-Plan 4 Details.dgn



- CONSTRUCTION SEQUENCE**
1. Remove existing superstructure.
 2. Erect temporary bents.
 3. Place prefabricated superstructure.
 4. Remove and re-erect as necessary to permit construction of the Stage II bridge. See Special Provisions.
 5. Remove temporary bridge.

BILL OF MATERIAL

Item	Unit	Quantity
Temporary Bridge	L. Sum	1



USER NAME: rishnultz	DESIGNED: KAH	REVISED: 10/15/2013 DL
PLAT SCALE: 20:0 1/4\"/>		
POST DATE: 10/24/2013	CHECKED: DL	REVISED:

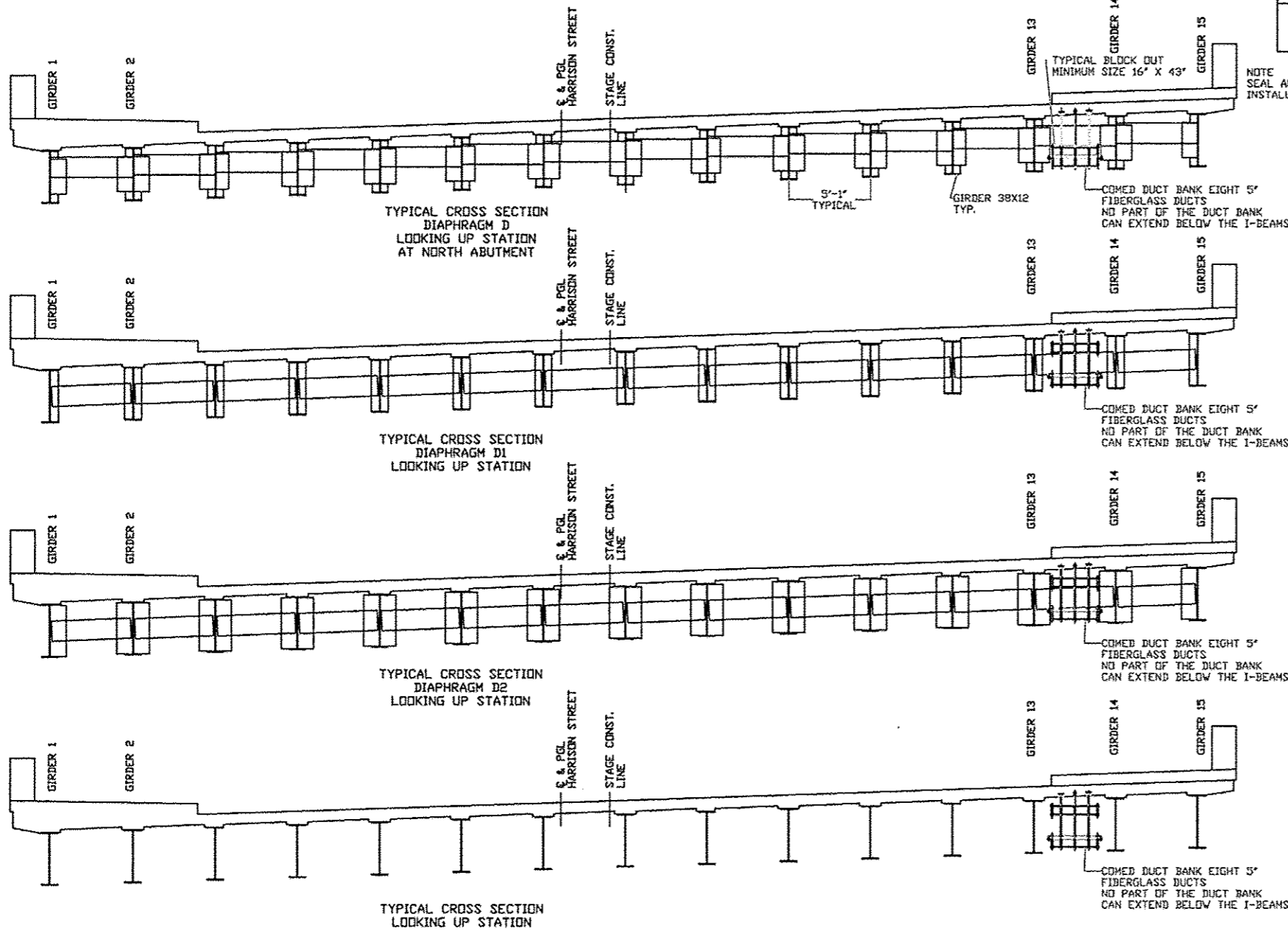
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TEMPORARY PEDESTRIAN BRIDGE PLAN AND ELEVATION
STRUCTURE NO. 016-1716

SHEET NO. 52-74 OF 52-91 SHEETS

F.A.U. RTE. 3720	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 434
CONTRACT NO. 60W26				ILLINOIS FED. AID PROJECT

REVISIONS				
ZONE	REV	DESCRIPTION	DATE	APPROVED
	2.0	ADDENDUM A	10/15/2013	BRIAN BB



FOR INFORMATION ONLY
 WORK TO BE PERFORMED BY OTHERS
 WITH THE EXCEPTION OF PLACEMENT
 OF INSERTS INTO SUPERSTRUCTURE

NOTE
 NO PART OF THE CONDUIT SUPPORT HANGER CAN
 EXTEND BELOW THE BRIDGE DECK GIRDER
 EXTENDED RODS MAY NEED TO BE ALTERED

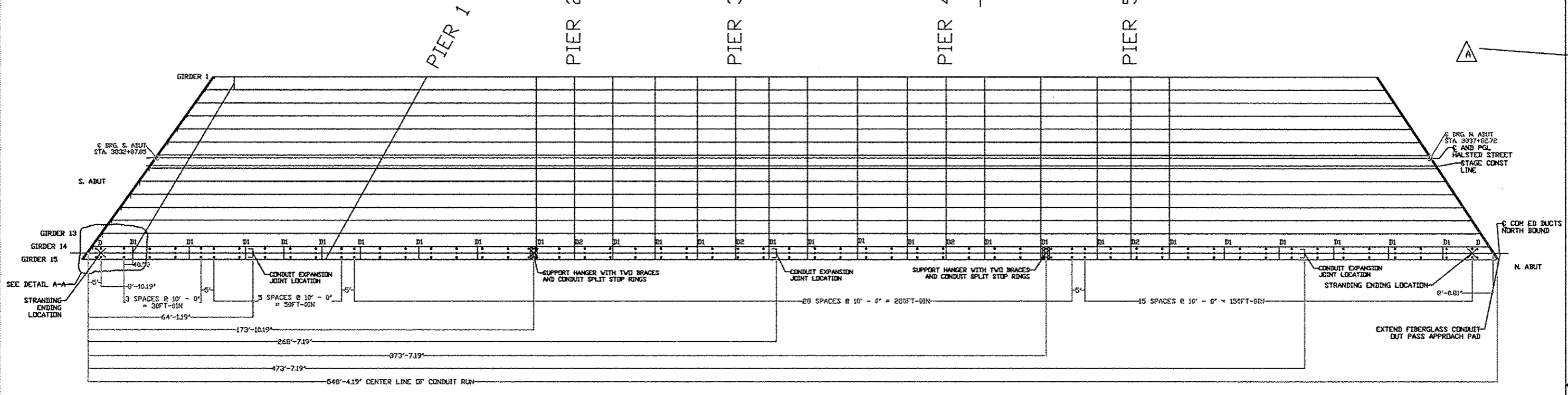
This drawing is the property of Condux International, Inc. and the information thereon is to be treated as confidential. It is not to be used, copied or disclosed to outside parties without our written consent.

Note:
 ALL MEASUREMENTS ARE IN INCHES UNLESS NOTED OTHERWISE

DRAWING APPROVAL
 I APPROVE THIS DRAWING FOR MANUFACTURING DATE: _____

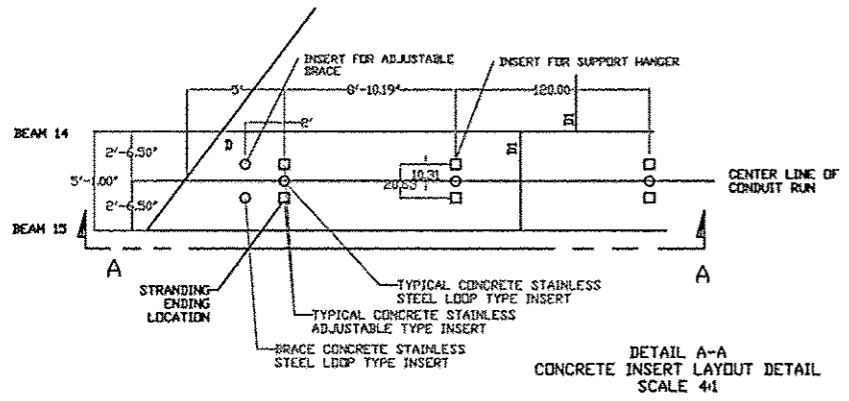
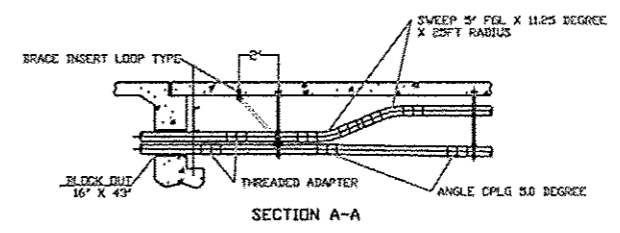
Bridge Deck Cross Section	CONDUX INTERNATIONAL, INC. MANKATO MN PH. 800-533-2077			
	Project: ComEd Halsted Street Bridge over F.A.I. RTE 290 Eisenhower Expressway, Cook County Illinois			
WEIGHT: 0.0 LBS EA	SIZE	FSCM NO.	DWG NO. TBA	REV 2.0
QUOTE NO. 3985214499	SCALE 1/2	DATE: 09-27-2013	SHEET 441A OF 559	

REVISIONS				
ZONE	REV	DESCRIPTION	DATE	APPROVED
	2.0	ADDENDUM A	10/15/2013	BRIAN BB



SUPPORT HANGER AND CONDUIT LAYOUT

FOR INFORMATION ONLY
 WORK TO BE PERFORMED BY OTHERS
 WITH THE EXCEPTION OF PLACEMENT
 OF INSERTS INTO SUPERSTRUCTURE



DETAIL A-A
 CONCRETE INSERT LAYOUT DETAIL
 SCALE 4/1

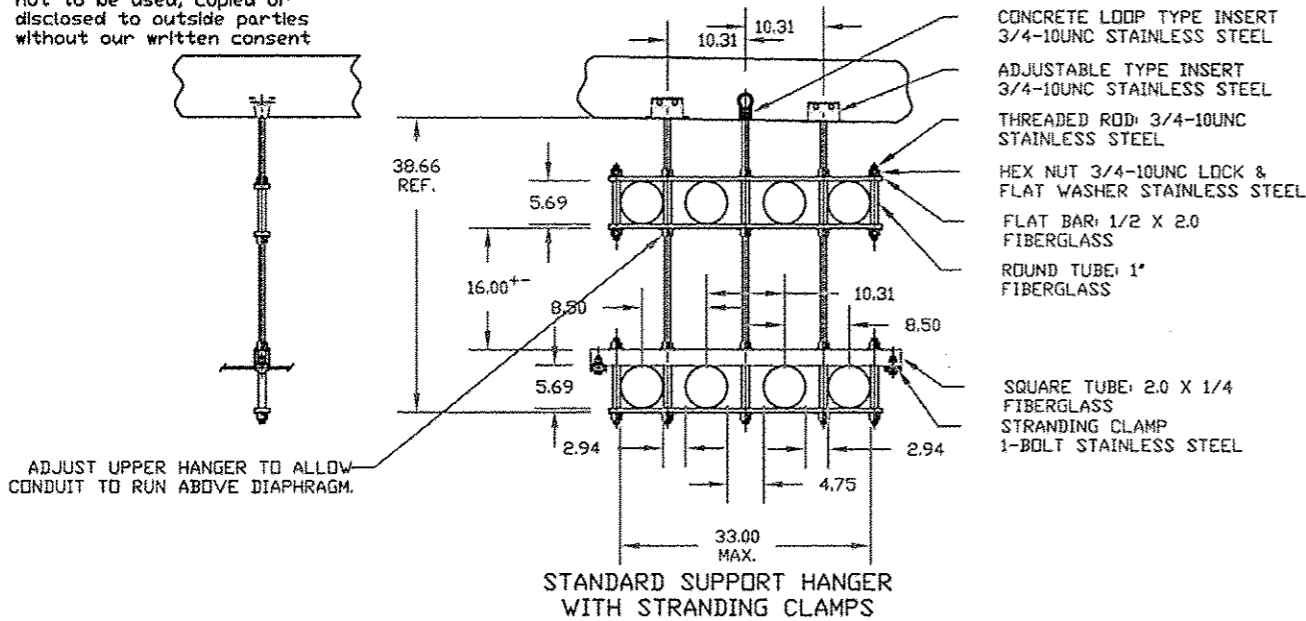
This drawing is the property of Condux International, Inc. and the information thereon is to be treated as confidential. It is not to be used, copied or disclosed to outside parties without our written consent.

Note:
 ALL MEASUREMENTS ARE IN INCHES UNLESS NOTED OTHERWISE

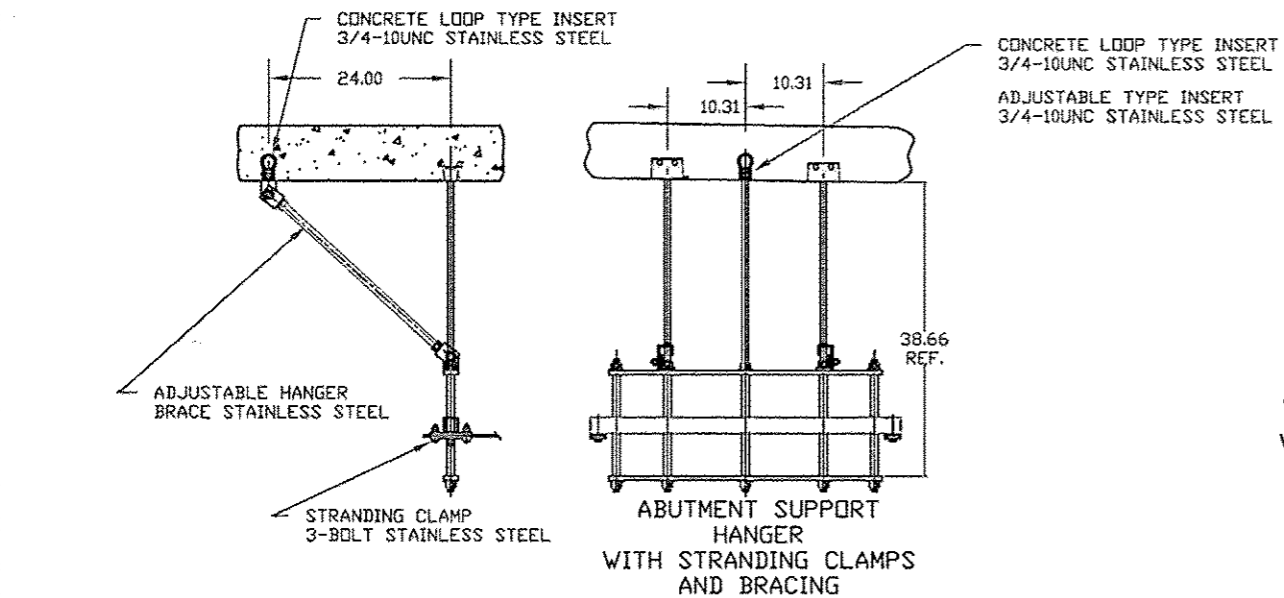
DRAWING APPROVAL
 I _____
 APPROVE THIS DRAWING FOR MANUFACTURING DATE: _____

CONDUIT SUPPORT AND CONDUIT LAYOUT		CONDUX INTERNATIONAL, INC. MANKATO MN PH. 800-533-2077		
		Project: ComEd Halsted Street Bridge over F.A.I. RTE 290 Eisenhower Expressway, Cook County Illinois		
WEIGHT: 0.0 LBS EA	SIZE	FSCM NO.	DWG NO.	REV
QUOTE NO. 3985214499	SCALE 1/2		TBA	2.0
		DATE: 09-27-2013	SHEET: CONDUX 5 OF 6	
			SHEET 441B OF 559	

This drawing is the property of Condux International, Inc. and the information thereon is to be treated as confidential. It is not to be used, copied or disclosed to outside parties without our written consent



ADJUST UPPER HANGER TO ALLOW CONDUIT TO RUN ABOVE DIAPHRAGM.



FOR INFORMATION ONLY
WORK TO BE PERFORMED BY OTHERS
WITH THE EXCEPTION OF PLACEMENT
OF INSERTS INTO SUPERSTRUCTURE

NOTE
NO PART OF THE CONDUIT SUPPORT HANGER
CAN EXTEND BELOW THE BRIDGE DECK
GIRDER
EXTENDED RODS MAY NEED TO BE ALTERED

Condux International, Inc. Support hanger meet the following specifications
Fiberglass Items
Flat Bar: 1/2 x 2.0
Round Tube: 1.0" O.D. .105 wall
Square Tube: 2 x 2 x 1/4
Fiberglass reinforced with polyester resin with surface veil for better weathering, resin shall contain u.v. inhibitor. Fiberglass is made with continuous strand mat and uni-directional roving.
gray in color
Tensile Strength (ASTM D 638) 30,000 PSI
Tensile Modulus (ASTM D 638) 2.3E6 PSI
Flexural Strength (ASTM D 790) 30,000 PSI
Flexural Modulus (ASTM D 790) 2.3E6 PSI
Compressive Strength (ASTM D 695) 20,000 PSI
Compressive Modulus 1.4E6 PSI
Yield shear strength 2000 PSI
Barcol hardness 50
Dielectric strength (ASTM D 149) 200 VPM Min.

Stainless steel Hardware Items
Threaded Rod
Threaded rod meets (ASTM/ASME B1.1) (ASTM A307 Grade A) (Tensile Strength 60,000 PSI)
Hexnut
Hexnut meets (ANSI/ASME B18.2.2) Material: 316 Stainless steel (ASTM F594)
Flatwasher
Flatwasher meets (ANSI/ASME B18.22.1) Material: 316 stainless steel (ASTM F436)
Lockwasher
Lockwasher meets (ANSI/ASME B18.21.1) Material: 316 Stainless steel (ASTM F436)
Stranding Items
Stranding Clamps (1-Bolt & 3-Bolt)
Material: 1/4 x 1.5 (316 Stainless Steel)
Stranding Wire
Cable: 1/4" Dia (7 X 19 Steel Aircraft)
304 Stainless Steel
Bracing
Adjustable hanger attachment brackets
Material: angle 2.5 x 2.5 x .25 (316 Stainless steel)

DRAWING APPROVAL
I
APPROVE THIS DRAWING FOR MANUFACTURING
DATE: _____
Note:
ALL MEASUREMENTS ARE IN INCHES UNLESS NOTED OTHERWISE

REVISIONS				
ZONE	REV	DESCRIPTION	DATE	APPROVED
	2.0	ADDENDUM A	10/15/2013	BRIAN



CURRENT BILL OF MATERIAL

ITEM NO.	PART NO.	DESCRIPTION	QTY	UNIT
1	26125F3S24	ABUTMENT CONDUIT SUPPORT HANGER: 2 HIGH X 6 WIDE FIBERGLASS AND STAINLESS STEEL, OPENING FOR EIGHT 5" FGL DUCTS THREADED RODS THREE @ 3/4-10UNC X 42.00 LONG	2	EA.
2	TBA	STANDARD CONDUIT SUPPORT HANGER: 2 HIGH X 6 WIDE FIBERGLASS AND STAINLESS STEEL, OPENING FOR EIGHT 5" FGL DUCTS THREADED RODS THREE @ 3/4-10UNC X 42.00 LONG	54	EA.
3	08610236	HANGER BRACE ADJUSTABLE: 36 INCH STAINLESS STEEL	8	EA.
4	08409990	CONCRETE INSERT: 3/4-10 LOOP TYPE, STAINLESS STEEL	64	EA.
5	08558300	CONCRETE INSERT SETTING PLUG: 3/4-10	64	EA.
6	TBA	CONCRETE INSERT ADJUSTABLE: 3/4-10 STAINLESS STEEL	112	EA.
7	08408951	STRANDING WIRE: 1/4 X 1000 FT., STAINLESS STEEL	2	EA.
8	08409404	GUY STRAND CLAMP: 3-BOLT, STAINLESS STEEL	8	EA.
9	08409504	GUY STRAND CLAMP: 1-BOLT, STAINLESS STEEL	104	EA.
10	08460053	CONDUIT FIBERGLASS: 5" IPS, MW (.57 O.D. X .096 WALL) MEETING NEMA TC-14A	4480	FT.
11	08460153	CONDUIT STOP COUPLING: 5" IPS MW	40	EA.
12	08460453	CONDUIT EXPANSION JOINT O-RING TYPE: 5" IPS MW	24	EA.
13	08460953	CONDUIT SPLIT STOP RING: 5" IPS MW	32	EA.
14	08461553	CONDUIT ADAPTER: 5" IPS MW TO 5" GRC	16	EA.
15	TBA	CONDUIT SWEEP: 5" IPS MW 11.25 DEGREE X 25FT RADIUS	16	EA.
16	08460253	CONDUIT 5 DEG. ANGLE COUPLING: 5" IPS MW	16	EA.
17	08463402	CONDUIT EPOXY ADHESIVE CARTRIDGE	35	EA.
18	02288990	CONDUIT EPOXY ADHESIVE GUN	1	EA.

General Construction, Hanger and Conduit Notes
1.0 Recommended spacing between Support is 10 foot.
2.0 Support Hanger Material shall be manufactured using 316 stainless steel and fiberglass components.
3.0 Conduit is 5 inch Fiberglass with minimum wall thickness of .096 inch meeting NEMA TC- 14A Specs.
4.0 Conduit joints shall be positive locking adhesive bonded bell and spigot.
5.0 Conduit expansion joints shall be sliding sleeve with provision for 8 inch of travel.
6.0 Bridge abutments must have a block out or be sleeved to allow the fiberglass conduit to pass through. After conduit is placed through abutment seal up opening with state approved sealant.
7.0 Place concrete inserts for future support system. Hangers will be installed at a later date.
8.0 Conduit support hangers weight 2325 LBS total
Fiberglass conduit weight 5600 LBS total
cable weight weight 37884 LBS total

Grand total being placed on the bridge is 45809.00 LBS. OR 199.00 LBS/FT.

CONDUIT SUPPORT HANGER DETAIL AND BILL OF MATERIALS		CONDUX INTERNATIONAL, INC. MANKATO MN PH. 800-533-2077		
Project: ComEd Halsted Street Bridge over F.A.I. RTE 290 Eisenhower Expressway, Cook County Illinois		SIZE	FSCM NO.	DWG NO.
WEIGHT: 0.0 LBS EA				TBA
QUOTE NO. 3985214499	SCALE 1/2	DATE: 09-27-2013	SHEET 441C OF 559	
			SHEET: CONDUX 6 OF 6	REV 1.0

DESIGN CRITERIA

Building Codes and Specifications:

- A. Chicago Building Code (CBC), 2012 Edition
 - 1. Type of Construction: Type II - Non-Combustible per Section 6 (13-60-030)
- B. American Institute of Steel Construction (AISC), LRFD, 13th Edition
- C. American Concrete Institute (ACI), Building Code Requirements for Structural Concrete, ACI 318-08

Design Loads Criteria:

- A. Dead Loads
 - 1. UV Resistant Polycarbonate Glazing Panels 2.5 PSF
 - 2. 12" Polycarbonate Traffic Signal 24 LB
- B. Snow Loads
 - 1. Roof Snow Load (Pf) 25 PSF
- C. Wind Loads
 - 1. MWFRS Wind Pressure 20 PSF

Materials:

All structural steel materials shall be as follows unless noted otherwise:

- A. Steel:
 - 1. Structural Steel Wide Flange ASTM A992
 - 2. Structural Plates ASTM A572, Grade 50
 - 3. Hollow Structural Sections ASTM A500, Grade B
 - 4. High Strength Bolts ASTM A325-N or SC
 - 5. Anchor Rods ASTM F1554, Grade 55
 - 6. Welding Electrode AWS A5.1 or A5.5 E70XX

GENERAL NOTES

1. Field verify all existing dimensions and elevations for conformance with the drawings. All discrepancies shall be immediately brought to the attention of the Engineer.
2. Shop drawings prepared by suppliers, subcontractors, etc. shall be reviewed and coordinated by the Contractor prior to submitting to the Engineer.
3. Shop drawings prepared by the subcontractors, suppliers, etc. shall be reviewed by the Engineer for conformance with design concept only.
4. Unless otherwise noted, all details, sections and notes on the drawings are intended to be typical for similar situations elsewhere.
5. The Contractor is to refer to the architectural drawings for dimensions and details not provided.
6. Comply with all applicable city, county, state and federal laws, including the Occupational Safety and Health Act (OSHA) and regulations adopted pursuant thereto.
7. The contract structural drawings and specifications represent the finished structure. Unless otherwise indicated, they do not indicate the means or method of construction. Provide all measures necessary for construction including, but not limited to, bracing, shoring for construction equipment, shoring for the building, forms, scaffolding, planking, safety nets, support and bracing for cranes and gin poles, etc.
8. Supervise and direct the work so as to maintain sole responsibility for all construction means, methods, techniques, sequences and procedures. As a part of this responsibility, retain the services of a licensed Structural Engineer to design and supervise any scaffolding for working personnel, and all shoring of forms and elements of construction.
9. Verify elevations prior to fabrication. All Structural Steel is to be galvanized and painted.

STRUCTURAL STEEL

1. Structural steel details, fabrication, and erection shall conform to the latest edition of the AISC Manual of Steel Construction unless otherwise shown or specified.
2. Estimated weight of Structural Steel = 67,910 pounds (ASTM A992)
Estimated weight of Structural Steel = 32,950 pounds (ASTM A572, Grade 50)
Estimated weight of Structural Steel = 43,930 pounds (ASTM A500, Grade B)
3. Field connections shall be bolted or welded. High strength bolts shall be installed in accordance with AISC Specifications. Bolts shall be ASTM A325, 3/4" diameter unless noted otherwise. Use Type N for framed connections and Type SC (Slip Critical) at wind moment connections. All welding to be done by certified welders. All welds to be E70XX electrodes.
4. Shop connections may be welded unless otherwise indicated. Welds shall be designed to be fully equivalent in strength to bolted connections.
5. Unless otherwise noted, all welds shall be continuous 1/4" fillet welds.
6. Provide welded moment connections where shown and as detailed on the drawings using full penetration welds, unless noted otherwise.
7. All full penetration welds shall be provided with backup bars unless noted otherwise.
8. Fabricator shall select AISC simple shear connections for steel beams capable of carrying either the reaction force when indicated or 50% of the total uniform load for the given size, span, and grade of the beam, as tabulated in the AISC tables for allowable loads.
9. Other connections shall be standard double angle shear connections, unless noted otherwise.
 - A. The minimum number of bolts per vertical row shall be as follows, unless noted otherwise.

Beam Size	Min. No. of Bolts
WB, W10	2
W12, W14, W16	3
W18	4
W21	5
W24	6
W27	7
W30	8
W33	9
W36	10

10. Cuts, holes (openings), etc., required in structural steel members for the work of other trades shall be shown on the shop drawings. Burning of holes and cuts in structural steel members in the field shall not be allowed, except by written permission from the Engineer.
11. Erect and maintain temporary bracing to ensure the alignment and stability of the structure during erection until permanent connections have been completed.
12. Fabricate and install beams with natural camber up.
13. All exposed structural steel shall be hot-dip galvanized per ASTM A123.
14. All structural bolts, nuts, and washers shall be hot-dip galvanized per ASTM A123.
15. Repair of damaged and uncoated areas of galvanized steel shall conform to ASTM A780. Submit to the Illinois Department of Transportation for approval of all proposed repair work.

MASONRY

1. Grout under column base plates shall attain a minimum 28-day compressive strength of 6000 psi and shall conform to ASTM C1107 standards. Grout shall also contain inhibitors.

INDEX OF SHEETS

- 1 Pedestrian Canopy General Notes
- 2 Pedestrian Canopy Framing Plan
- 3 Pedestrian Canopy Elevation and Section
- 4 Pedestrian Canopy Details
- 5 Pedestrian Canopy Floor Plan
- 6 Pedestrian Canopy Roof Plan
- 7 Pedestrian Canopy Sections
- 8 Pedestrian Canopy Roof Details
- 9 Pedestrian Canopy Drainage Plan
- 10 Pedestrian Canopy Heat Trace Plan
- 11 Pedestrian Canopy Lighting Plan

TOTAL BILL OF MATERIAL

Item	Unit	Total Quantity
Structural Steel (CTA)	L. Sum	1
Canopy Roof (CTA)	Sq Ft	1,662
Flashing, Gutters And Sheet Metal (CTA)	L. Sum	1
Plumbing - Downspouts (CTA)	L. Sum	1
Electrical Work For Canopy Lighting And Heat Trace (CTA)	L. Sum	1
LED Light Source Fixture For Canopy Lighting (CTA)	Each	36

11/27/26 AM 01:17:16 60W26-A001-CanopyGenNotes.dgn



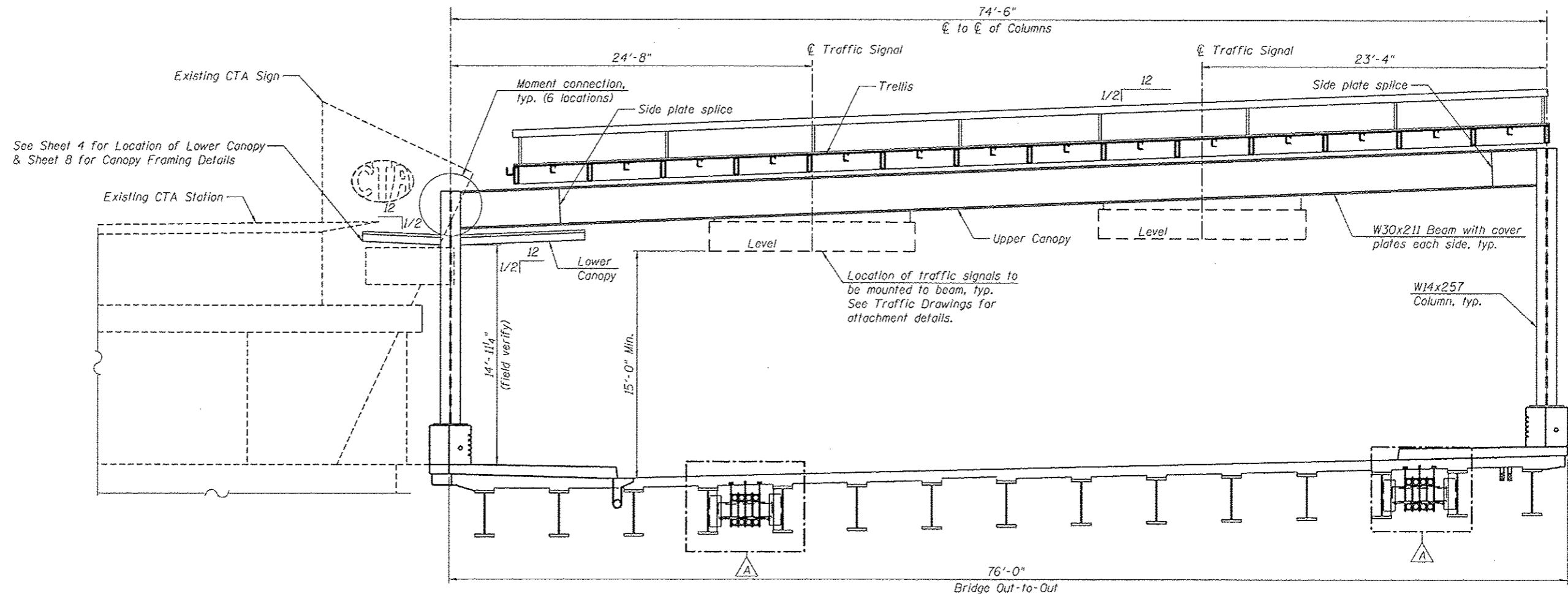
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	CHECKED - HKB	REVISED

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

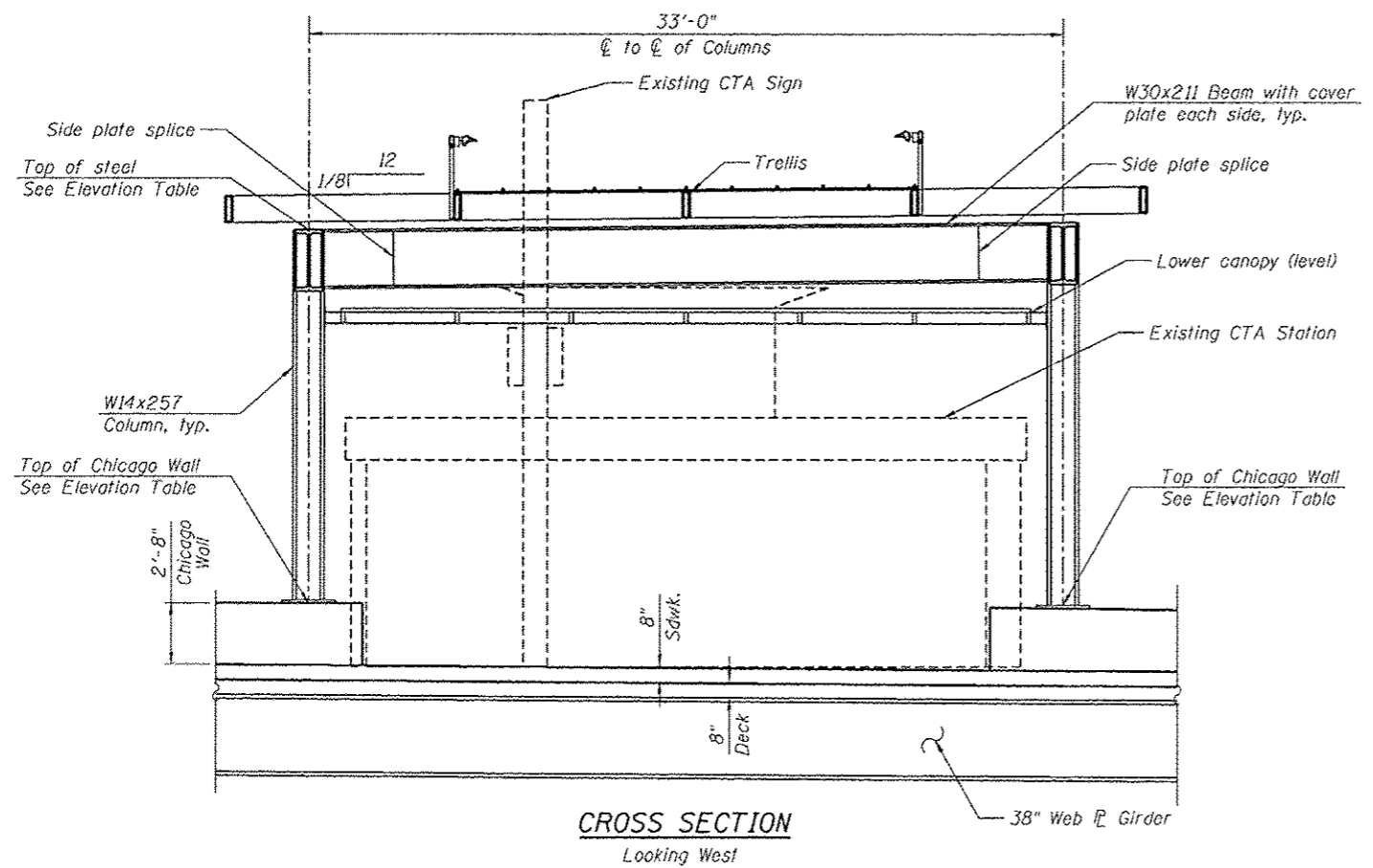
**PEDESTRIAN CANOPY GENERAL NOTES
STRUCTURE NO. 016-1716**

SHEET NO. 1 OF 11 SHEETS

F.A.U. RTE. 3730	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 442
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



CANOPY ELEVATION
Looking North



CROSS SECTION
Looking West

BILL OF MATERIAL

Item	Unit	Total
Structural Steel (CTA)	L. Sum	1

ELEVATION TABLE

LOCATION	TOP OF CHICAGO WALL	TOP OF STEEL
NE	604.09	623.75
SE	604.05	623.37
SW	602.70	618.91
NW	602.69	619.24

Notes:
Verify elevations prior to fabrication.
All Structural Steel is to be galvanized and painted.

11/23/26 NX 0161716-60W26-A003-CanopySuperStruct-01.dgn



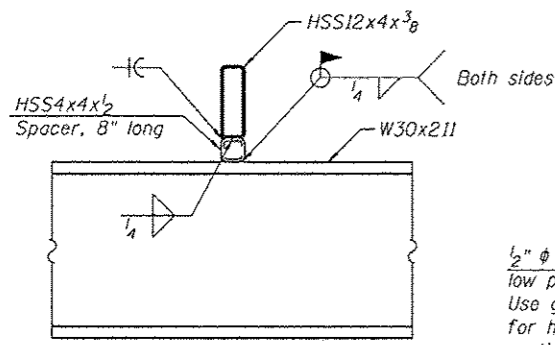
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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

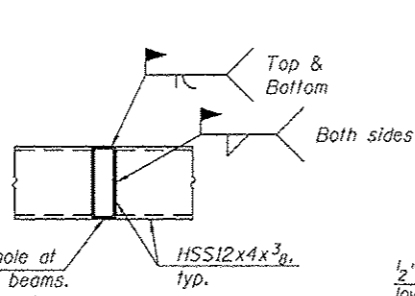
PEDESTRIAN CANOPY ELEVATION AND SECTION
STRUCTURE NO. 016-1716

SHEET NO. 3 OF 11 SHEETS

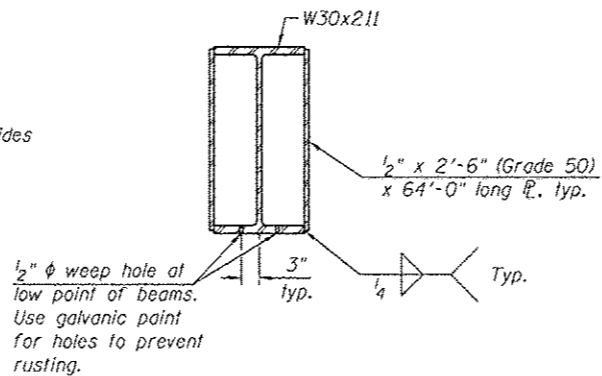
F.A.U. RTE. 3730	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 444
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	



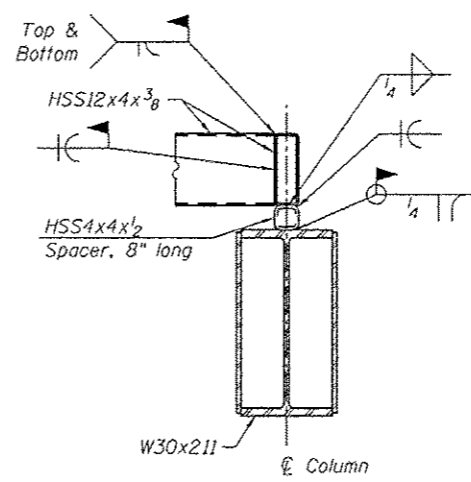
SECTION A-A



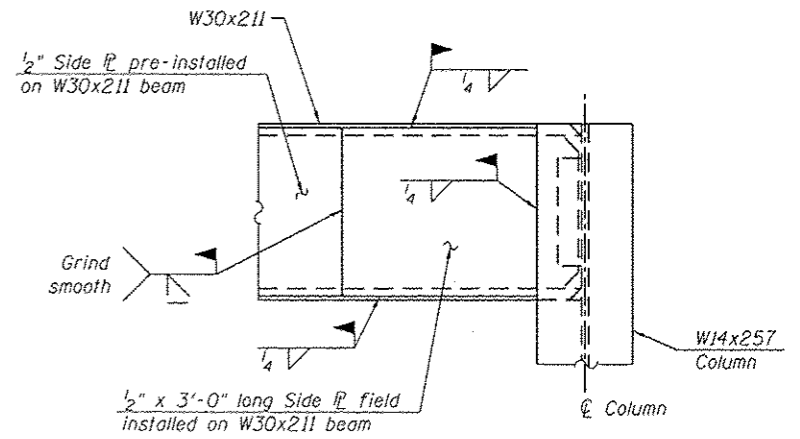
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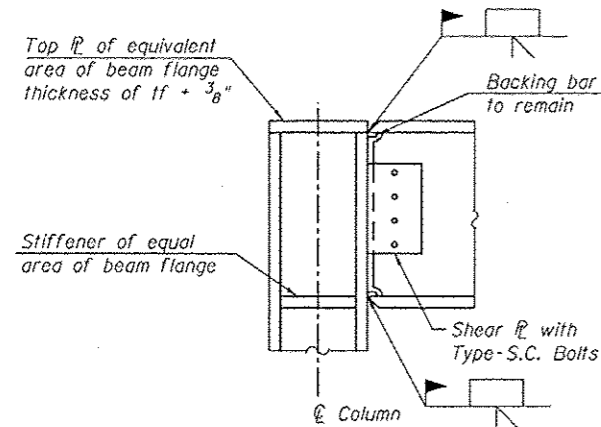
SECTION C-C



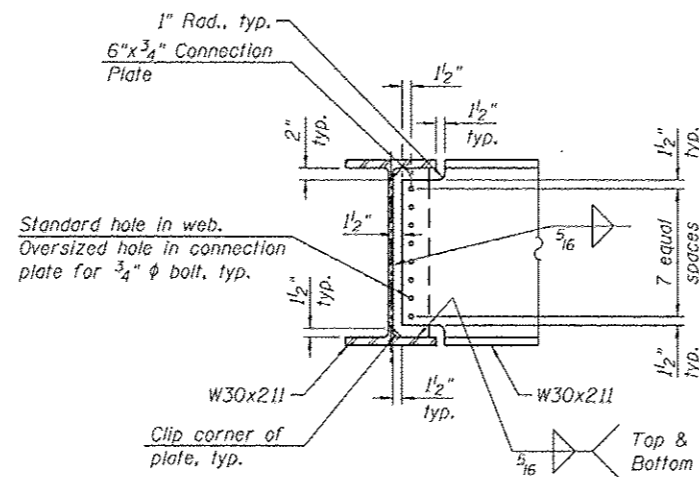
SECTION D-D



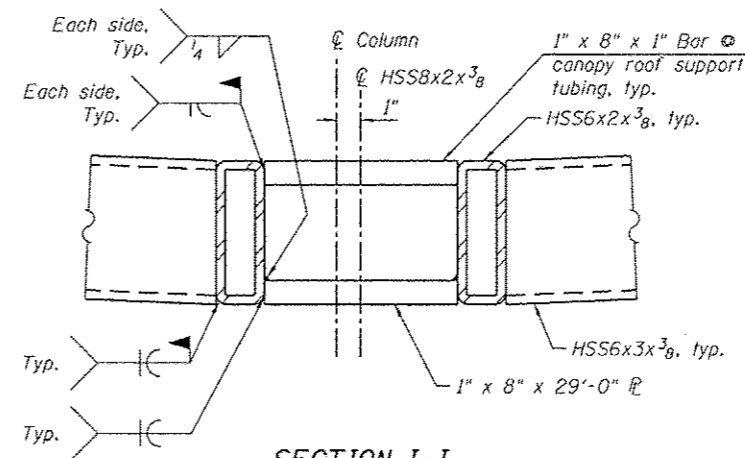
SECTION E-E



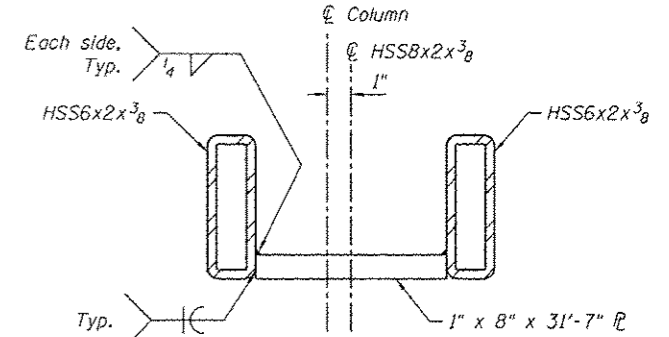
SECTION F-F



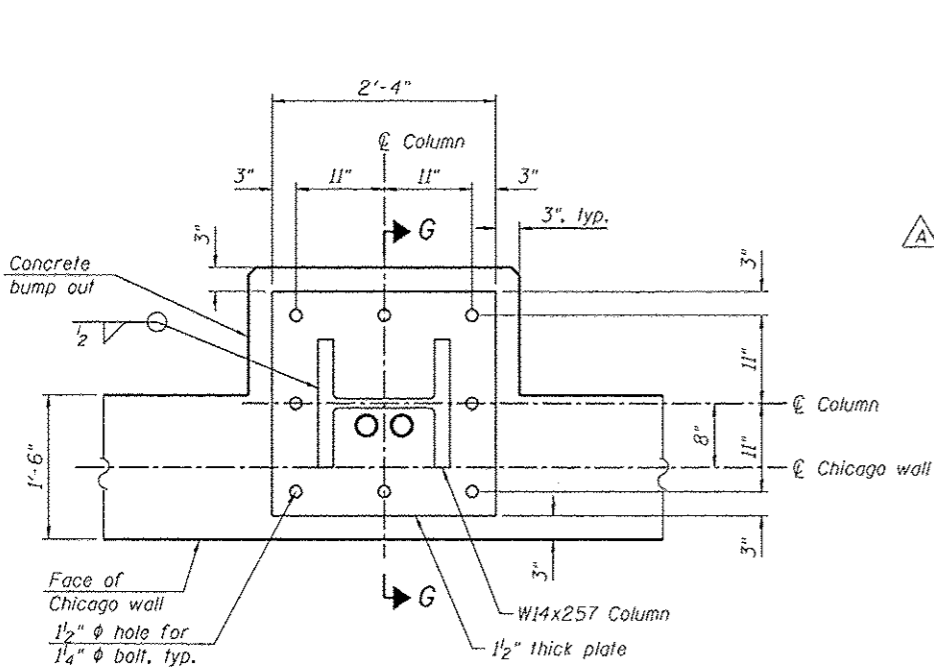
SECTION H-H



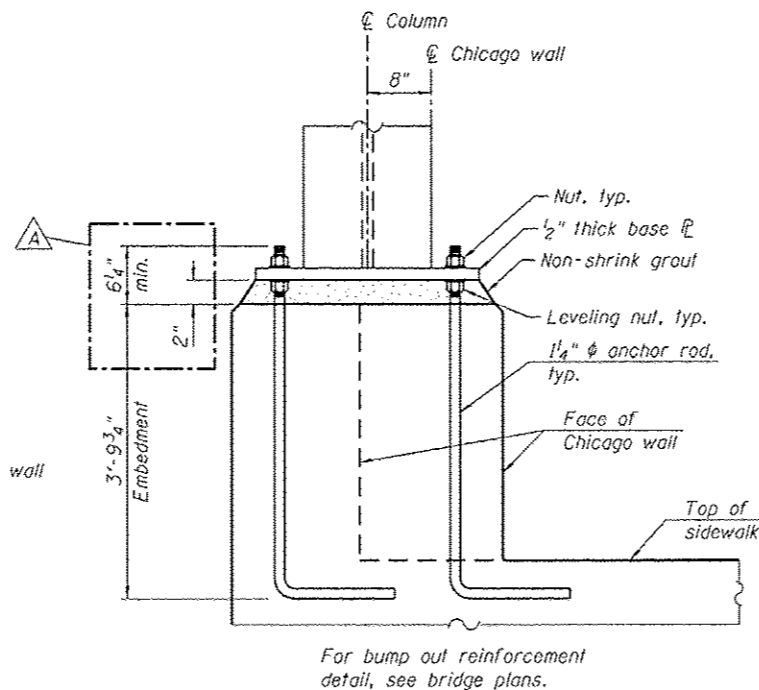
SECTION I-I



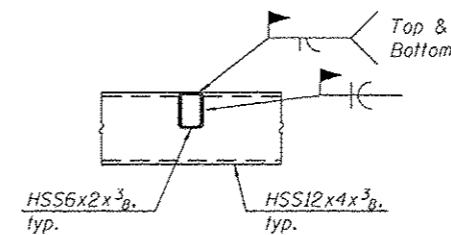
SECTION J-J



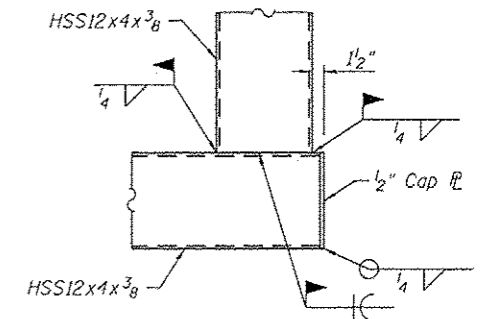
BASE PLATE DETAIL



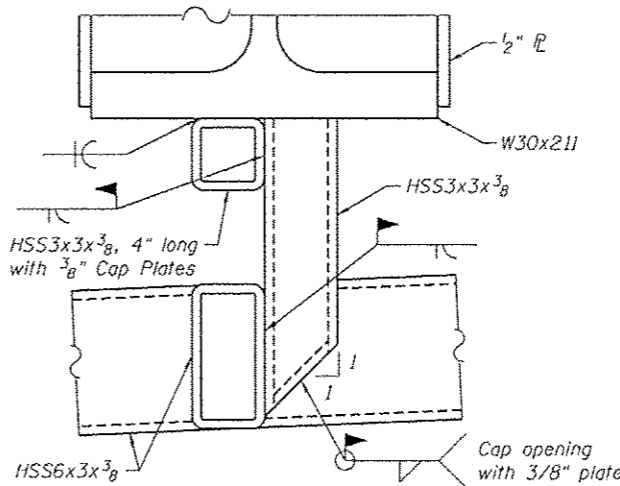
SECTION G-G



SECTION N-N



DETAIL I



SECTION M-M

11/21/13, M. 0161716-60W26-A004-CanopySuperStruct-02.dgn



USER NAME * BAWifort
 PLOT SCALE * 0:1 1/4" / 1"
 PLOT DATE * 10/14/2013

DESIGNED - ENH
 CHECKED - HKB
 DRAWN - CD
 CHECKED - HKB

REVISED 10/15/2013 WJC
 REVISED
 REVISED
 REVISED

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

PEDESTRIAN CANOPY DETAILS
 STRUCTURE NO. 016-1716

SHEET NO. 4 OF 11 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
3730	2013-008R	COOK	559	445
CONTRACT NO.			60W26	
ILLINOIS FED. AID PROJECT				

Bench Mark: Cut square on southwest parapet wall over I-90 on west end, ±2.5 A/G. Elevation 598.65.

Existing Structure: None.

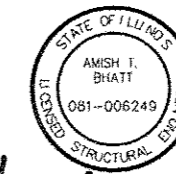
DESIGN SPECIFICATIONS
2012 AASHTO LRFD Bridge Design Specifications,
6th Edition with 2013 Interim Revisions

APPROVED
For Structural Adequacy Only

D. Carl Runey, P.E.
Engineer of Bridges & Structures

DESIGN STRESSES

FIELD UNITS
f'c = 3,500 psi
f'c = 7,000 psi (Drilled Shaft - see Gen. Note 7)
fy = 60,000 psi (Reinforcement)



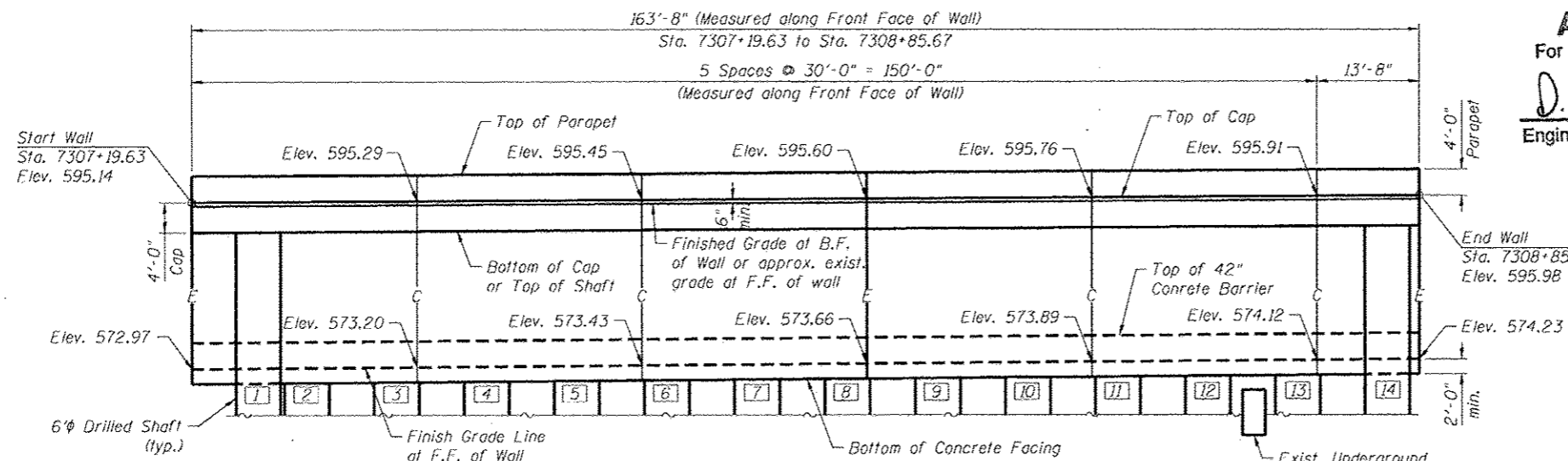
Amish T. Bhatt
AMISH T. BHATT
LICENSE EXPIRES 11/30/2014

LEGEND:

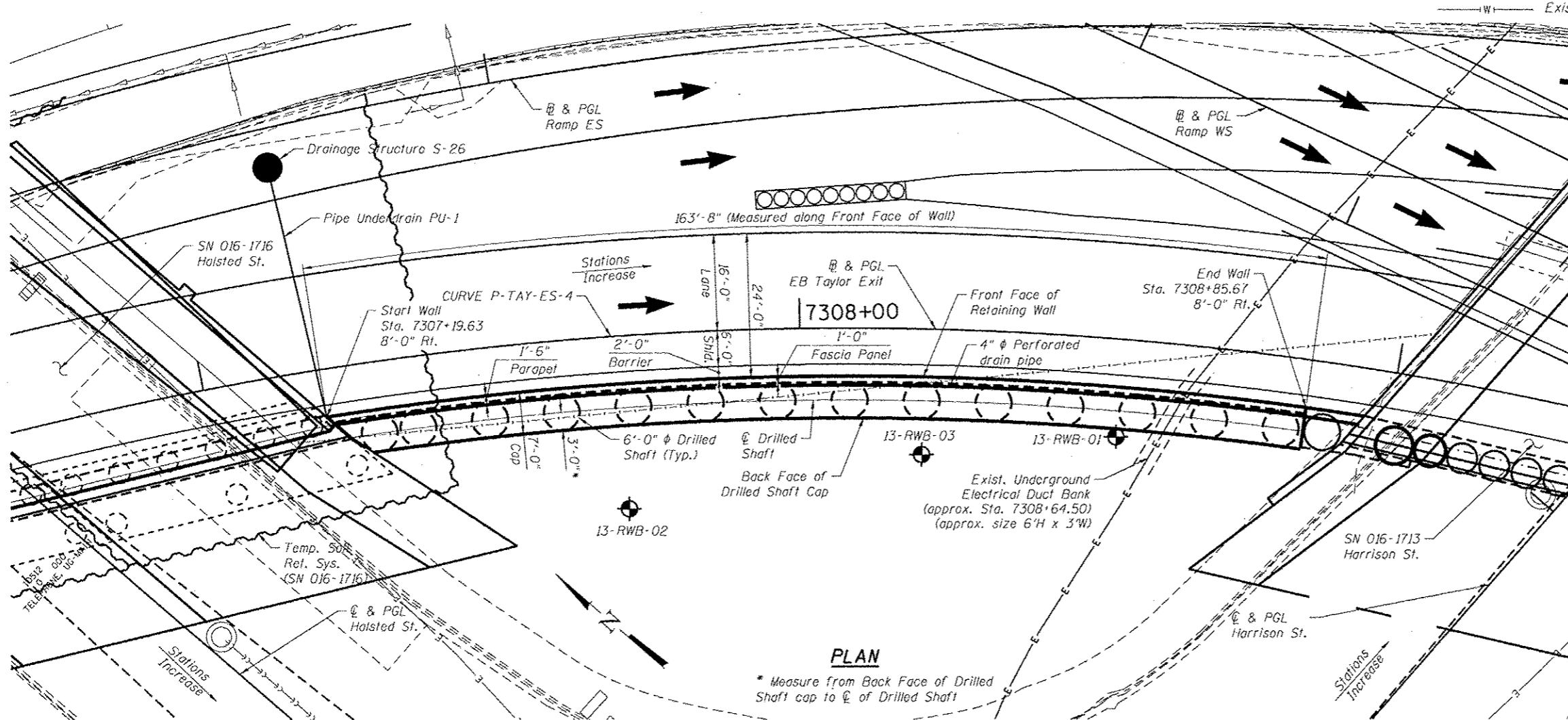
- C = Construction Joint
- E = Expansion Joint
- F.F. = Front Face
- B.F. = Back Face
- = Drilled Shaft Number
- ⊕ = Soil Boring Locations
- E— = Exist. Underground Electric
- W— = Exist. Underground Water

CURVE DATA

(EB Taylor Exit)
Prop. Curve P-TAY-ES-4
P.I. Sta. = 7309+22.03
Δ = 43° 22' 59" (RT)
D = 10° 13' 53"
R = 560.00'
T = 222.76'
L = 424.02'
E = 42.68'
e = 5.8%
T.R. = NA
S.E. Run = 150'
P.C. Sta. = 7306+99.28
P.T. Sta. = 7311+23.30

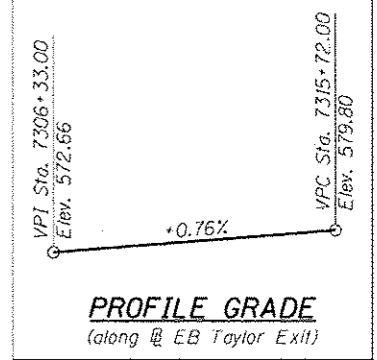


ELEVATION
(Looking East)



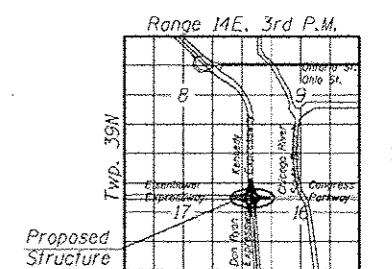
PLAN

* Measure from Back Face of Drilled Shaft cap to ⌀ of Drilled Shaft



PROFILE GRADE
(along EB Taylor Exit)

For Information Only
Part of Future Contract



LOCATION SKETCH

GENERAL PLAN & ELEVATION
F.A.I. RTE. SB 90/94
(DAN RYAN EXPRESSWAY)
F.A.I. RTE. 90/94 - SECTION 2013-008R
COOK COUNTY
STATION 7307+19.63 TO STATION 7308+85.67
STRUCTURE NO. 016-1802

Entire Sheet Revised



USER NAME = dunkerloyb
DESIGNED - DD
CHECKED - ATB
DRAWN - BRD
CHECKED - ATB
PLOT SCALE = N.T.S.
PLOT DATE = 9/15/2013

REVISIONS
10/15/2013 A.T.B.
REVISIONS
REVISIONS
REVISIONS

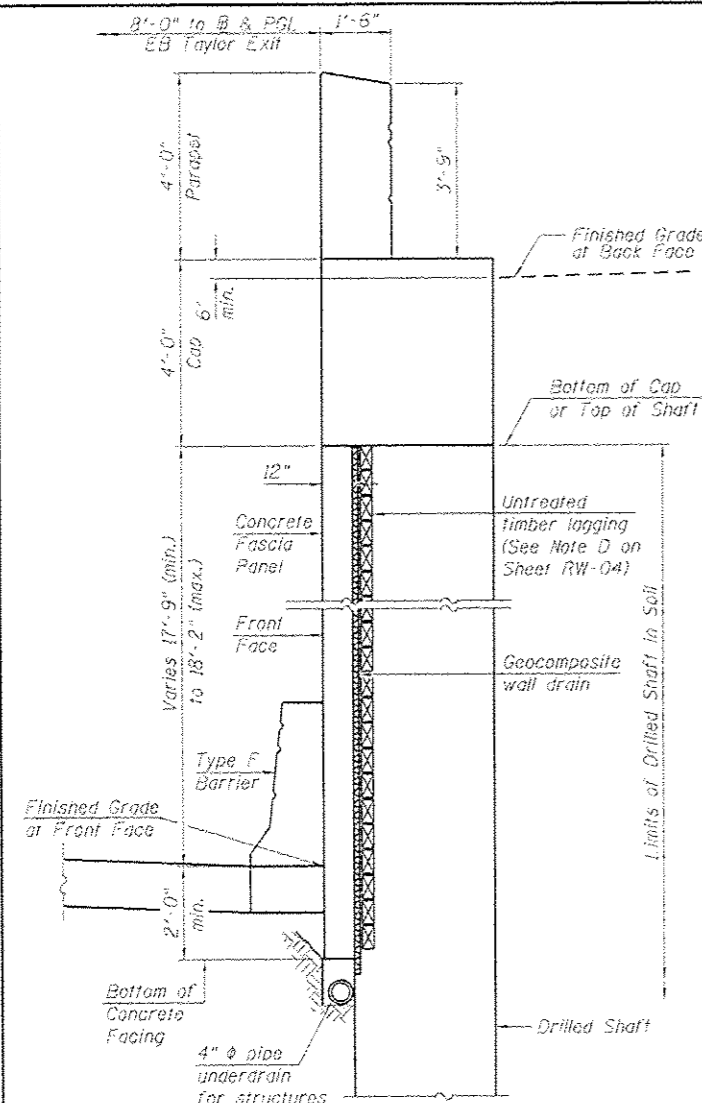
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

GENERAL PLAN AND ELEVATION
STRUCTURE NO. 016-1802

SHEET NO. RW-01 OF RW-08 SHEETS

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	453
CONTRACT NO.			60W26	
ILLINOIS FED. AID PROJECT				

0161802-60W26-SCI-CPE



TYPICAL CROSS-SECTION
(Looking upstation)

GENERAL NOTES

1. Reinforcement bars designated (E) shall be epoxy coated.
2. Bars noted thus, 3x2-#5 indicates 3 lines of bars with 2 lengths per line.
3. Concrete Sealer shall be applied to the designated areas of the wall.
4. Slipforming of the parapets is not allowed.
5. The Contractor shall field verify location of existing underground electrical duct bank and shall take all precautions to protect existing underground electrical duct bank during the construction of the wall. Any damage to the existing utilities shall be responsibility of the Contractor.
6. Wall to be built along straight chords between construction joints.
7. Concrete for the Drilled Shafts shall be in accordance with Section 516 of Standard Specifications, except that the mix design of concrete shall attain a compressive strength of 7,000 psi at 14 days.
8. The Contractor shall coordinate construction of the retaining wall with the construction of South Abut. & Temp. Soil Ret. Sys. of S.M. 016-1716 & West Abut. of S.M. 016-1713.
9. Concrete Fascia Panel shall be paid for as Class SI Concrete Miscellaneous.

TOTAL BILL OF MATERIAL

DESCRIPTION	UNIT	TOTAL
STRUCTURE EXCAVATION	CU. YD.	467
CONCRETE STRUCTURES	CU. YD.	170
CONCRETE SUPERSTRUCTURE	CU. YD.	36
REINFORCEMENT BARS, EPOXY COATED	POUND	14,200
REINFORCEMENT BARS	POUND	457,210
NAME PLATES	EACH	1
DRILLED SHAFT IN SOIL	CU. YD.	1,173
CONCRETE SEALER	SQ. FT.	6,418
PIPE UNDERDRAIN FOR STRUCTURES 4"	FOOT	170
CLASS SI CONCRETE MISCELLANEOUS	CU. YD.	167
MECHANICAL SPlicERS	EACH	544
CROSSHOLE SONIC LOGGING	EACH	1

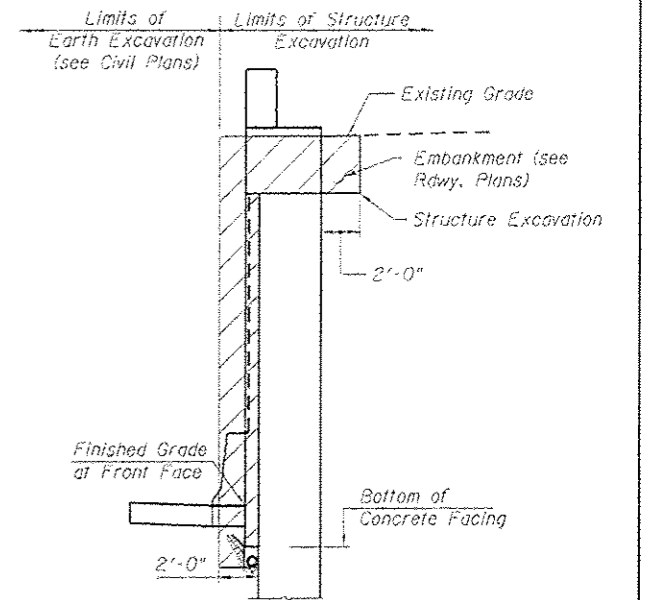
INDEX OF SHEETS

- RW-01 General Plan and Elevation
- RW-02 Total Bill of Material and General Notes
- RW-03 Wall Elevation Detail
- RW-04 Wall Sections and Details
- RW-05 Architectural Details
- RW-06 Boring Logs I
- RW-07 Boring Logs II
- RW-08 Boring Logs III
- RW-09 Boring Logs IV

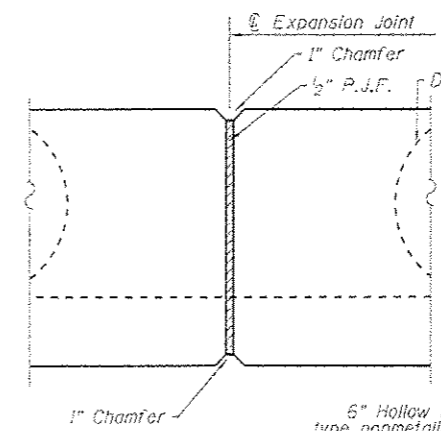
STATION T307-19.63
BUILT BY
STATE OF ILLINOIS
F.A.I. RTE. 90/94-SEC. 2013-008R
LOADING HL-93
STRUCTURE NO. 016-1802

NAME PLATE

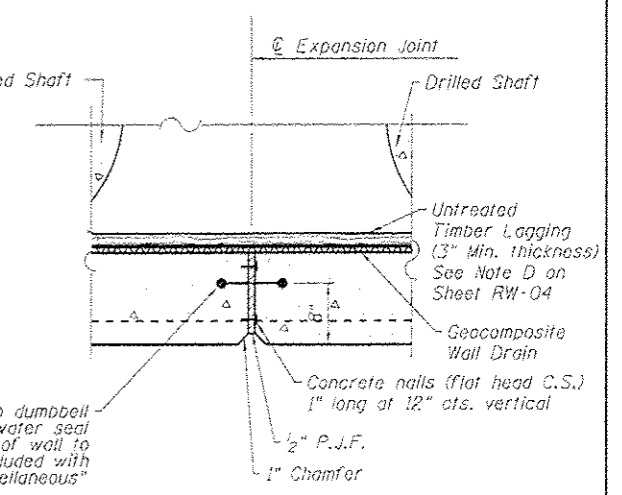
See Sta. 515001
(For location of Name Plate, see Sheet RW-05)



STRUCTURE EXCAVATION



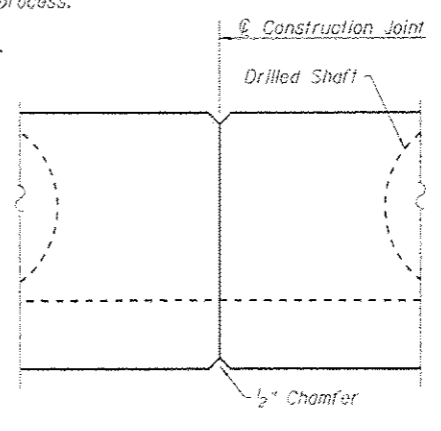
PLAN
(Cap)



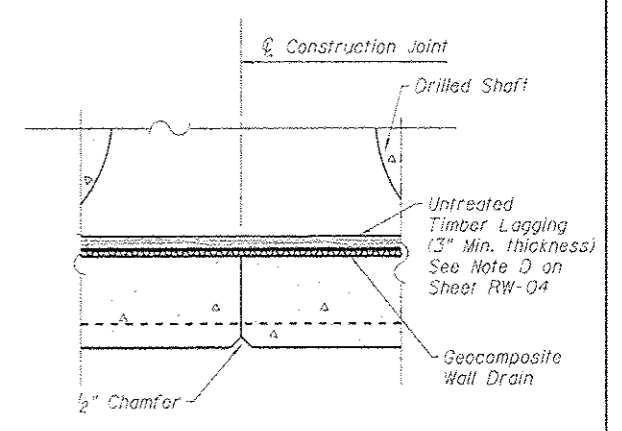
SECTION THRU WALL

Suggested Construction Sequence

1. Construct drilled shaft 1 thru 1A.
2. Construct drilled shaft cap & parapet.
3. Excavate in front of shafts to finish grade, installing lagging system in the process.
4. Construct concrete fascia panel.



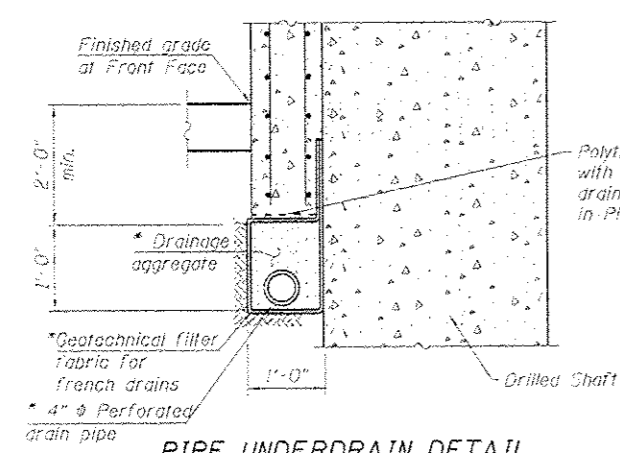
PLAN
(Cap)



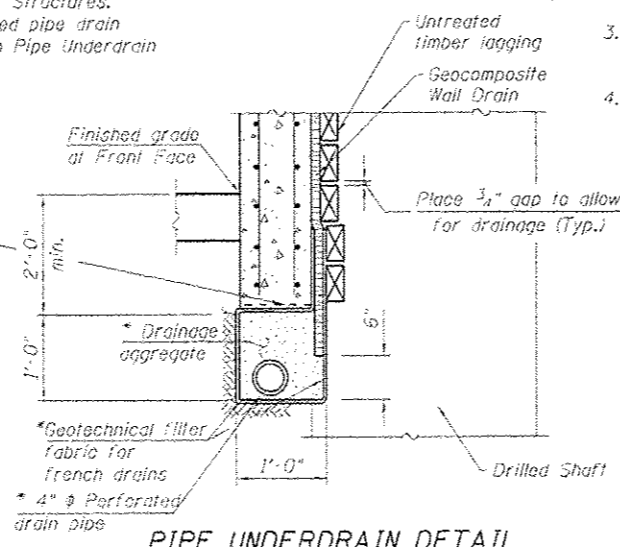
SECTION THRU WALL

CONSTRUCTION JOINT DETAILS

*Included in the cost of Pipe Underdrains for Structures. The pipe shall connect into the 4" ϕ Perforated pipe drain of the West Abutment (S.M. 016-1713) and into Pipe Underdrain PU-1 at the South Abutment (S.M. 016-1716).

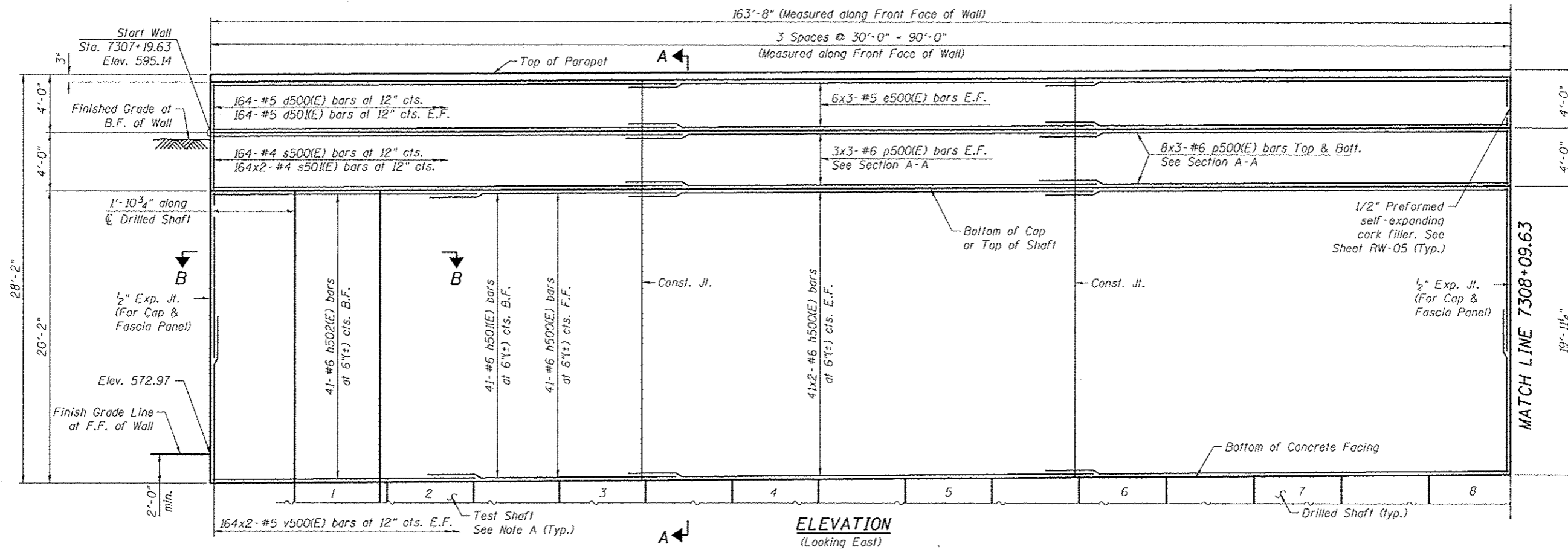


PIPE UNDERDRAIN DETAIL
(At Drilled Shaft)
(Type F barrier not shown for clarity)

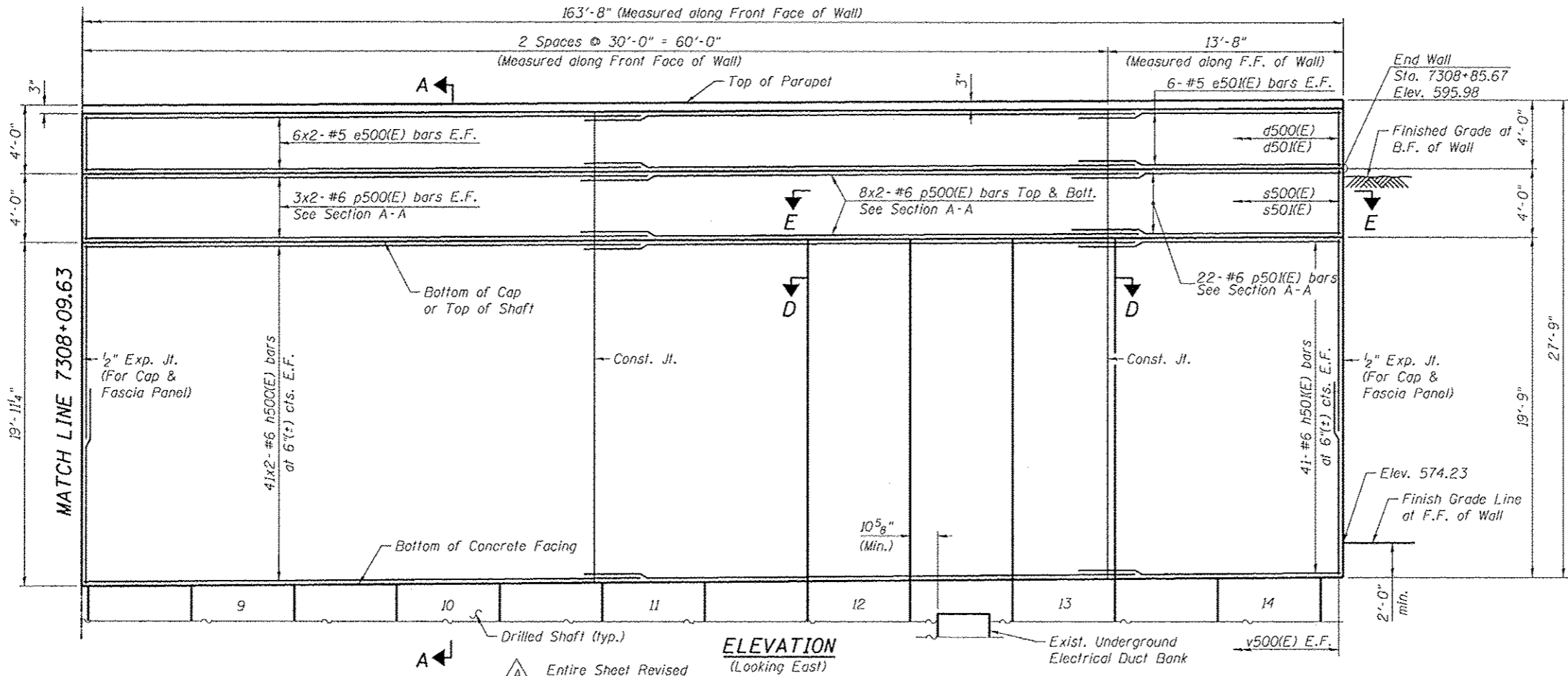


PIPE UNDERDRAIN DETAIL
(Between Drilled Shaft)
(Type F barrier not shown for clarity)

Entire Sheet Revised



ELEVATION
(Looking East)



ELEVATION
(Looking East)

- NOTE A:**
Contractor shall test the Drilled Shaft in accordance with Special Provision for Crosshole Sonic Logging.
- NOTES:**
1. Work this sheet with Sheet RW-04 & RW-05.
 2. Parapet concrete shall be paid for as Concrete Superstructure.
 3. Shaft Cap concrete shall be paid for as Concrete Structures.
 4. B.F. = Back Face
F.F. = Front Face
E.F. = Each Face

0161802-60W26-503-Super Struct



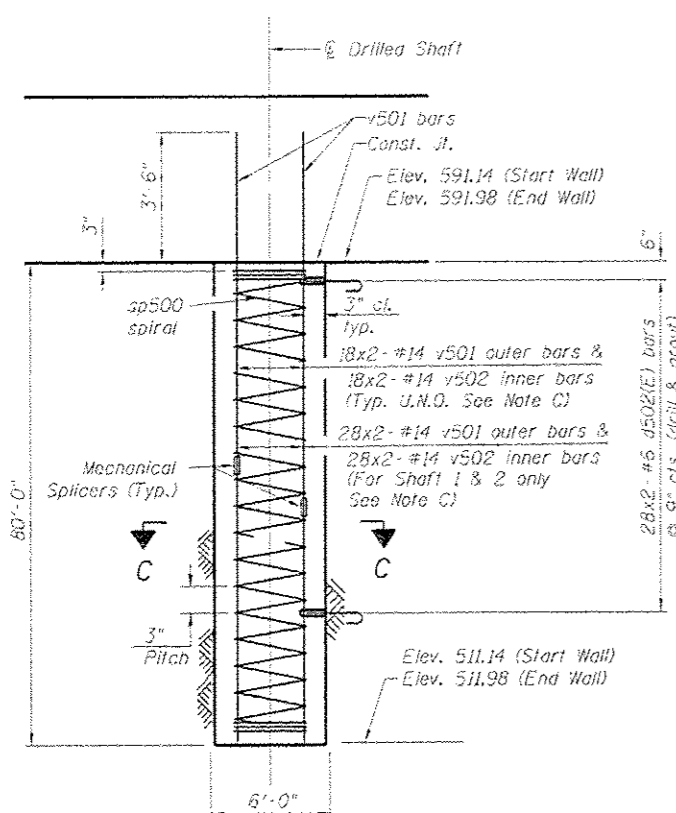
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PLOT DATE * 9/15/2013	DRAWN - BRD	REVISOR
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STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

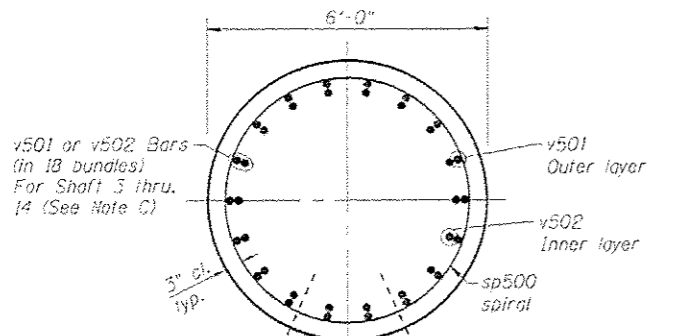
WALL ELEVATION DETAIL
STRUCTURE NO. 016-1802

F.A.I. RTE. 90/94/290	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 455
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

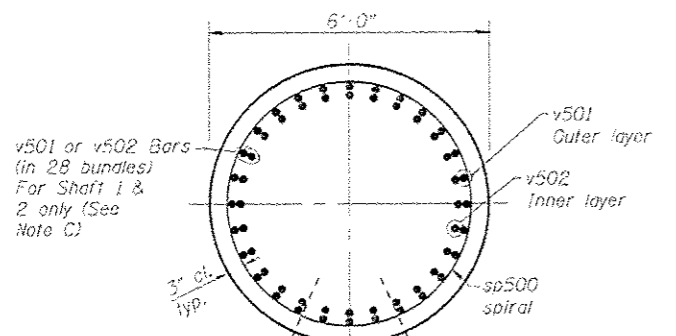
SHEET NO. RW-03 OF RW-08 SHEETS



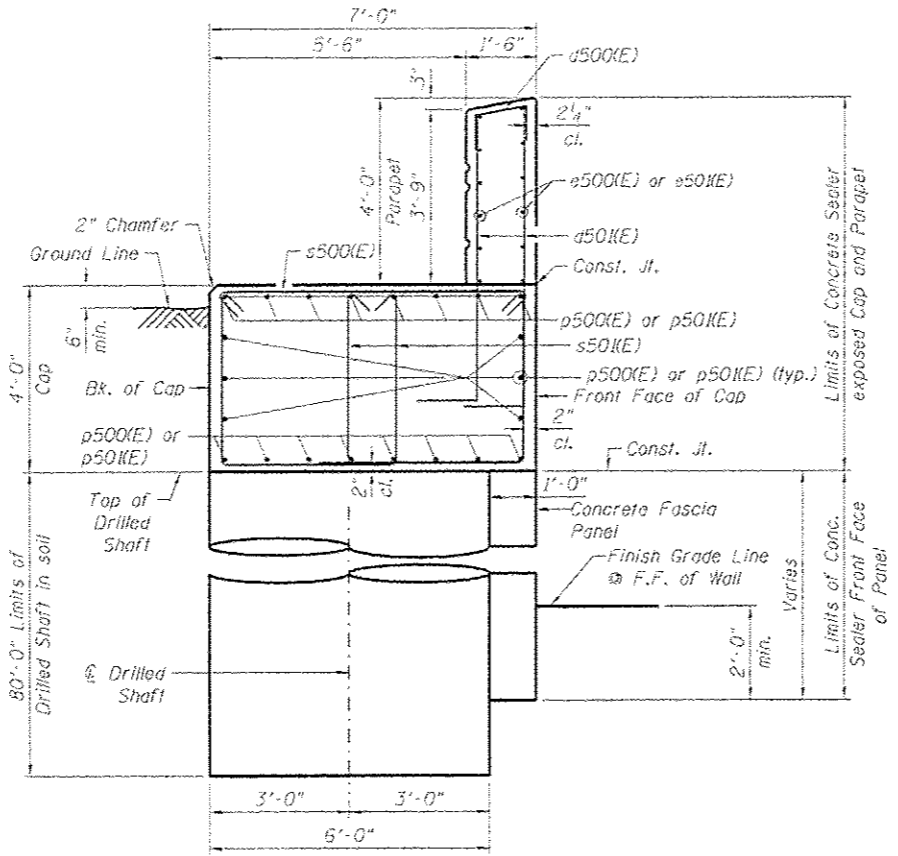
TYPICAL SHAFT ELEVATION



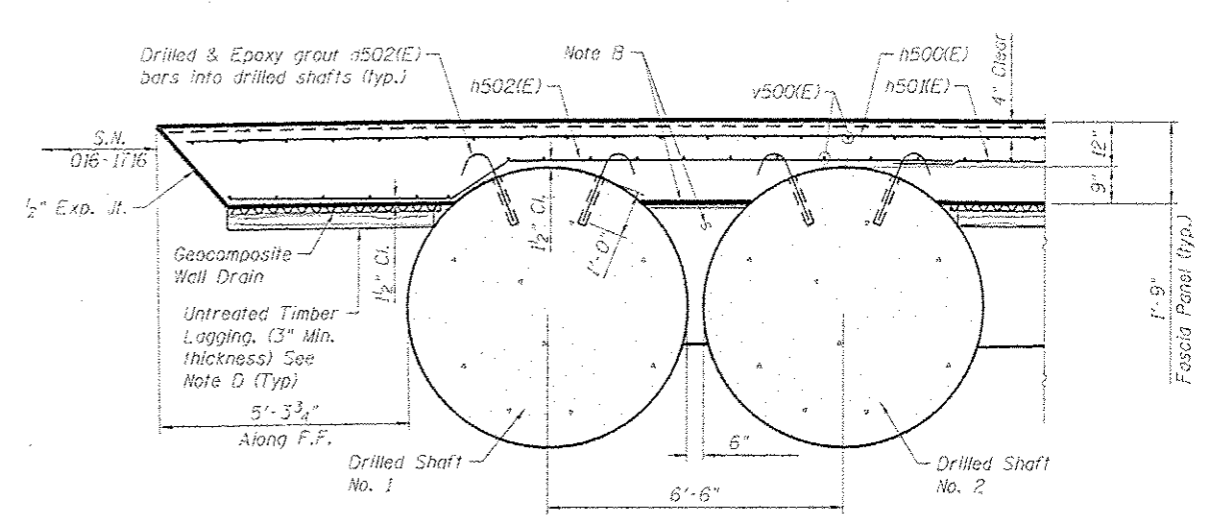
SECTION C-C



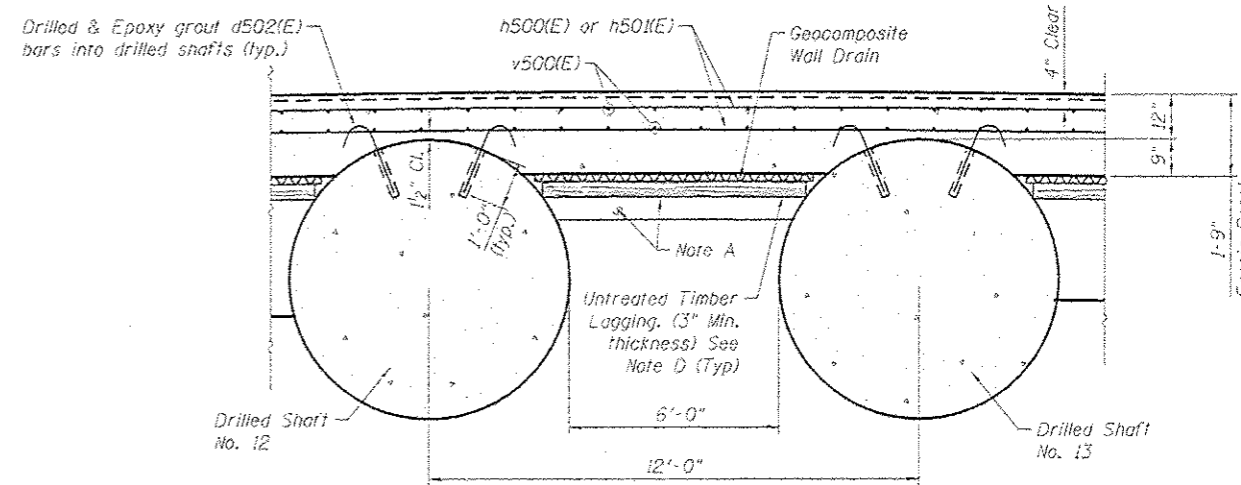
SECTION C-C



SECTION A-A

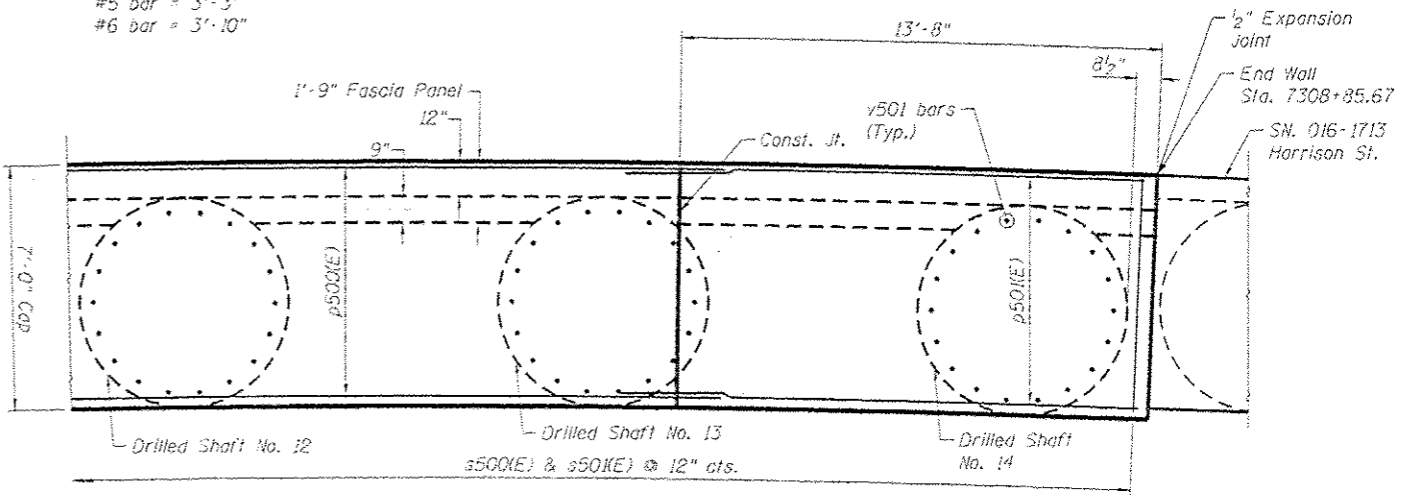


SECTION B-B
(Typical for Shaft 1 & 2)
(Shaft rebars are not shown for clarity)



SECTION D-D
(Typical for shafts 2 thru 14)
(Shaft rebars are not shown for clarity)

TYP. MIN. BAR LAP
(Unless Noted Otherwise)
#5 bar = 3'-3"
#6 bar = 3'-10"



SECTION E-E

- Note A
Install lagging and Geocomposite Wall Drain from top down as excavation proceeds. Minimize over-excavation and backfill voids with dry loose sand. Cast included with Class SI Concrete Miscellaneous.
- Note B
Remove loose soil on and between the drilled shafts. Place plywood backform with Geocomposite Wall Drain attached to the back face. Install between Drilled Shaft No. 1 & 2. Use dry loose sand as per IDOT Standard Specifications to fill voids between undisturbed soil and Geocomposite Wall Drain. Cast included with Class SI Concrete Miscellaneous.
- Note C
Bundle v501 bars in outer layer with v502 bars in inner layer.
- Note D
The Contractor is responsible for the design and performance of the lagging system, using no less than a 3 in. nominal rough-sawn thickness and timber with a minimum allowable bending stress of 1000 psi, until the concrete facing is installed. The Contractor shall submit design calculations and details prepared by an Illinois Licensed Structural Engineer for the attachment of the lagging to the shaft for approval by the Engineer. Alternative equivalent systems may be submitted for approval by the Engineer. Cast included with Class SI Concrete Miscellaneous.

- NOTES
- When splicing spiral reinforcement is necessary, the spiral shall be provided with 1/2 extra turns at the ends to be spliced. These additional turns shall either be welded together according to AWS D1.4 or shall both terminate with a 135° standard hook.
 - Work this sheet with Sheet RW-03 & RW-05.

Entire Sheet Revised



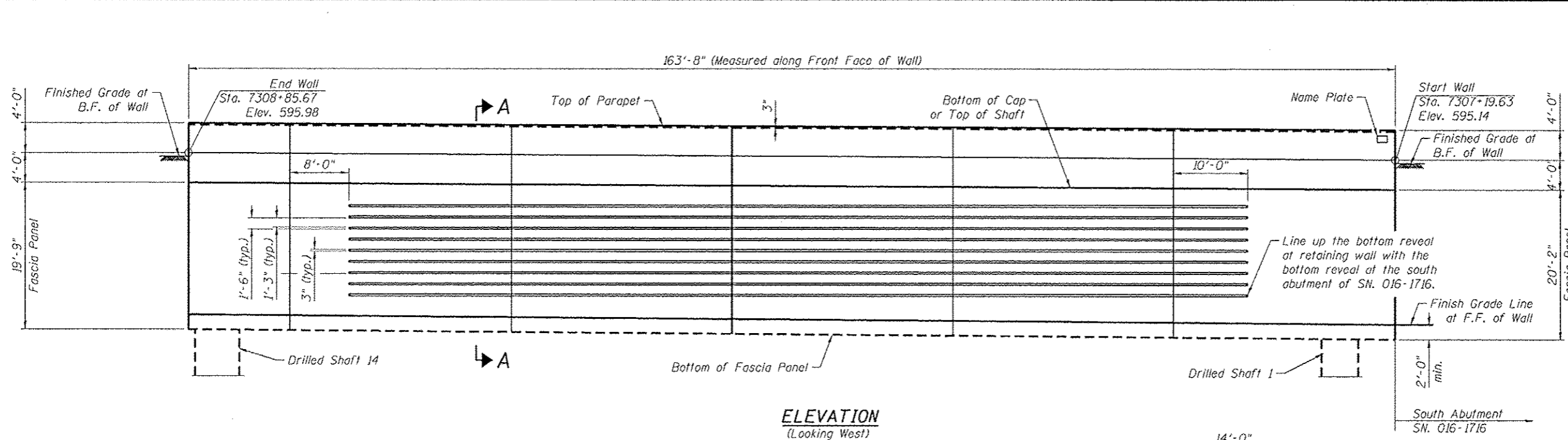
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	CHECKED: ATB	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

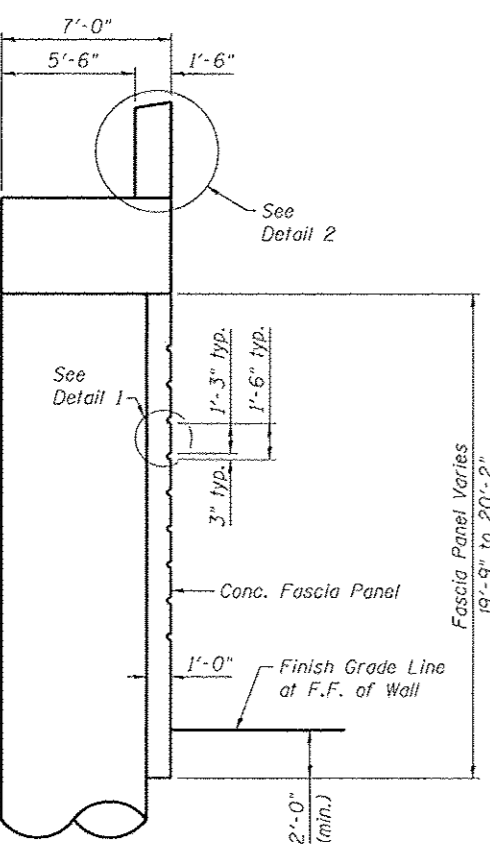
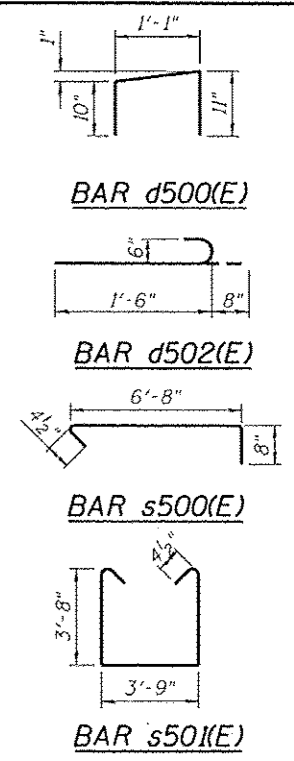
WALL SECTIONS AND DETAILS
STRUCTURE NO. 016-1802

SHEET NO. RW-04 OF RW-08 SHEETS

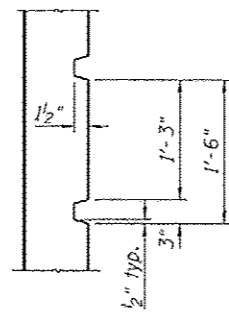
F.A.I. RTE. 90/94/290	SECTION 2013-00BR	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 456
CONTRACT NO. 60W26			ILLINOISFCO. AID PROJECT	



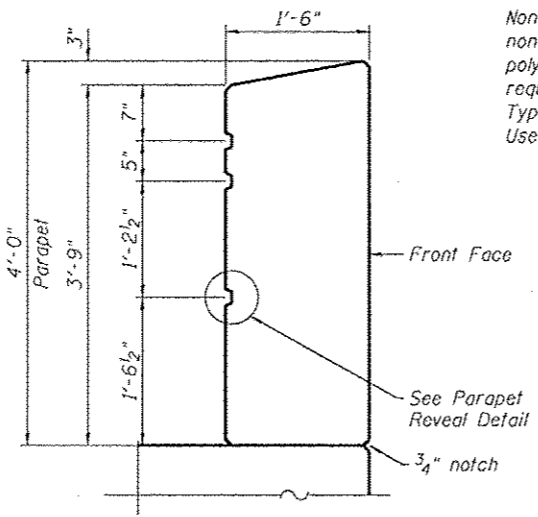
ELEVATION
(Looking West)



SECTION A-A

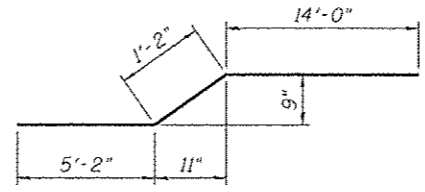


DETAIL 1

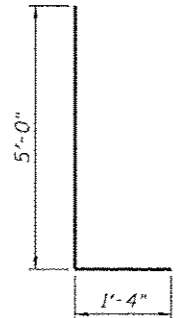


DETAIL 2

Non-staining gray one component non-sag elastomeric gun grade polyurethane sealant meeting the requirements of ASTM C-920, Type S, Grade NS, Class 25, Use T with a 5/8" backer rod.

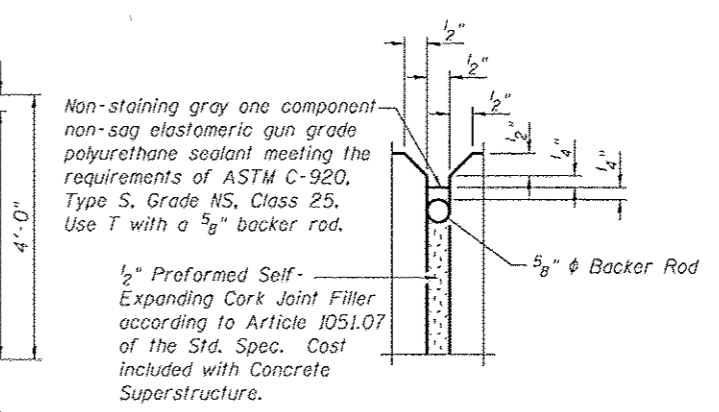


BAR h502(E)



BAR d501(E)

PARAPET REVEAL DETAIL



PARAPET JOINT DETAILS

NOTES:

- The 3" x 1/2" reveal in the fascia wall will not be paid separately and shall be included in the cost of the pay item Class SI Concrete Miscellaneous.
- Parapet reveal will not be paid separately and shall be included in the cost of pay item Concrete Superstructures.
- Prior to fascia panel construction the Contractor shall submit retaining wall and abutments elevations showing reveal spacing and location to the Engineer for review and approval.
- Work this sheet with Sheet RW-03 & RW-04.

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
d500(E)	164	#5	2'-10"	[U]
d501(E)	328	#5	6'-4"	[U]
d502(E)	784	#6	2'-2"	[U]
e500(E)	60	#5	32'-1"	[—]
e501(E)	12	#5	16'-0"	[—]
h500(E)	369	#6	32'-1"	[—]
h501(E)	123	#6	17'-6"	[—]
h502(E)	41	#6	20'-4"	[—]
p500(E)	110	#6	32'-6"	[—]
p501(E)	22	#6	16'-2"	[—]
s500(E)	164	#4	7'-8 1/2"	[U]
s501(E)	328	#4	11'-10"	[U]
sp500	14	#6	79'-9"	[W]
v500(E)	656	#5	11'-7"	[—]
v501	544	#14	41'-9"	[—]
v502	544	#14	40'-0"	[—]
Structure Excavation		Cu. Yd.	467	
Concrete Structures		Cu. Yd.	170	
Concrete Superstructure		Cu. Yd.	36	
Reinforcement Bars, Epoxy Coated		Pound	14,200	
Drilled Shaft In Soil		Cu. Yd.	1,173	
Concrete Sealer		Sq. Ft.	6,418	
Geocomposite Wall Drain		Sq. Yd.	44	
Pipe Underdrain For Structures 4"		Foot	170	
Class SI Concrete Miscellaneous		Cu. Yd.	167	
Crosshole Sonic Logging		Each	1	
Reinforcement Bars		Pound	457,210	
Mechanical Splicers		Each	544	

* Length is height of spiral
** Shown for information only. Cost included with Class SI Concrete Special (Fascia Wall).

Entire Sheet Revised



USER NAME = dunkerloyb	DESIGNED - DD	REVISION 10/15/2013 A.T.B.
CHECKED - ATB	DRAWN - BRD	REVISION
PLOT SCALE = N.T.S.	CHECKED - ATB	REVISION
PLOT DATE = 9/15/2013		REVISION

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

ARCHITECTURAL DETAILS
STRUCTURE NO. 016-1802

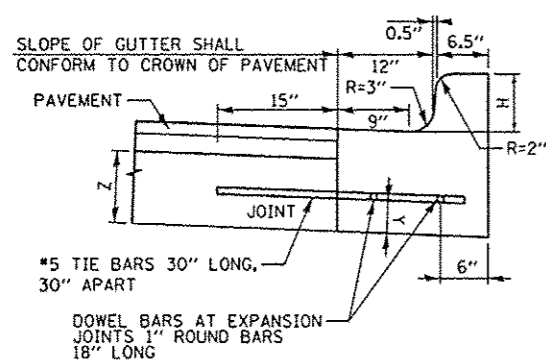
F.A.I. RTE. 90/94/290	SECTION 2013-008R	COUNTY COOK	TOTAL SHEETS 559	SHEET NO. 457
CONTRACT NO. 60W26			ILLINOIS FED. AID PROJECT	

0161802-50126-505-Super-Struct

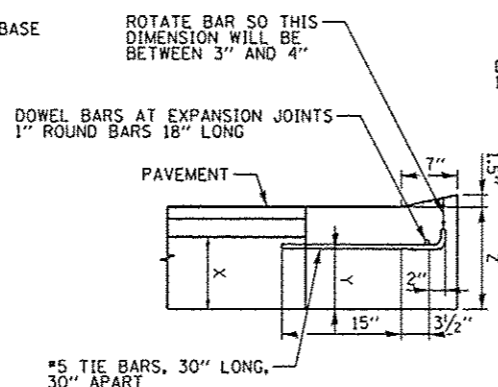
**COMBINATION CURB AND GUTTER
TYPE B V.12 (CDOT) AND
CONCRETE CURB, TYPE B (SPECIAL) (CDOT)**

NOTE:

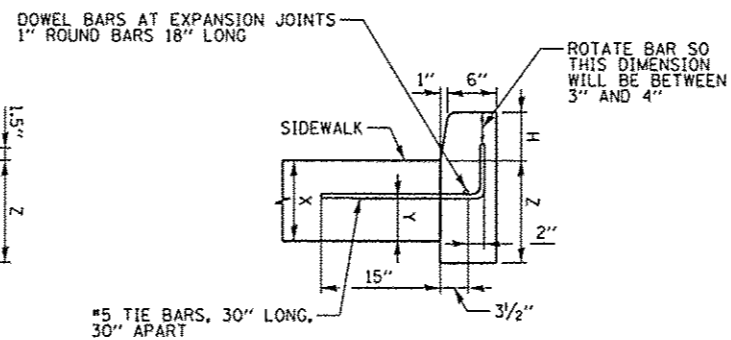
H = VARIABLE, MINIMUM 3" AND NOT TO EXCEED 9" (SEE PLANS)
X = THICKNESS OF PAVEMENT
Y = ONE HALF THE THICKNESS OF CONCRETE PAVEMENT OR CONCRETE BASE
Z = 10" OR THICKNESS OF PAVEMENT - WHICHEVER IS GREATER



**COMBINATION CURB AND GUTTER
TYPE B V.12 (CDOT)**
(USED AT HARRISON AND HALSTED STREETS)



DEPRESSED CURB
(USED AT DRIVEWAY AND ADA RAMP)



CONCRETE CURB, TYPE B (SPECIAL) (CDOT)
BARRIER CURB
(USED NEXT TO ADA RAMP AND DRIVEWAY PAVEMENT WHEN NEEDED)

DEPRESSED CURB & GUTTER

DEPRESSED CURB AND GUTTER AND TRANSITIONS BETWEEN BARRIER CURB WILL BE PAID FOR UNDER THE ADJACENT CURB ITEM. DEPRESSED CURB AND MOUNTABLE GUTTER MUST MEET CDOT ADA STANDARDS.

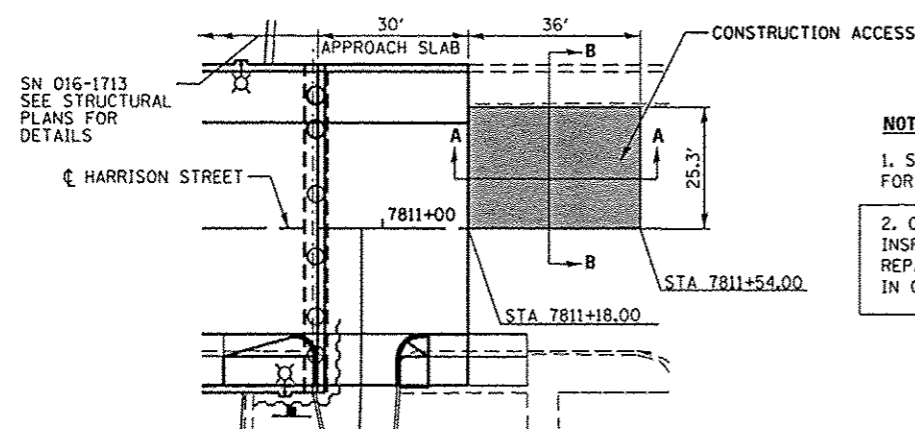
JOINTS IN CURB, COMBINED CURB AND GUTTER

TRANSVERSE JOINTS OF A TYPE SIMILAR TO THAT USED IN THE ADJACENT PAVEMENT SHALL BE INSTALLED IN THE CURB, GUTTER AND COMBINED CURB & GUTTER IN PROLONGATION WITH THE JOINTS IN THE PAVEMENT. THE DETAILS OF THE TRANSVERSE JOINTS IN THE CURB, GUTTER AND COMBINED CURB & GUTTER SHALL BE APPROVED BY THE ENGINEER. CURB, GUTTER OR COMBINED CURB AND GUTTER IS CONSTRUCTED ADJACENT TO A FLEXIBLE BASE PAVEMENT, 1" THICK EXPANSION JOINTS COMPOSED OF BITUMINOUS PREFORMED JOINT FILLER SHALL BE INSTALLED IN THE CURB AND/OR GUTTER AT POINTS OF CURVATURE AND AT CONSTRUCTION JOINTS. CONTRACTION JOINTS SHALL ALSO BE PLACED BETWEEN THESE EXPANSION JOINTS AT DISTANCES NOT EXCEEDING 20 FEET. ALL TIE BARS SHALL BE DEFORMED - ALL DOWEL BARS SHALL BE SMOOTH. ALL TIE BARS AND DOWEL BARS TO BE EPOXY COATED.

JOINTS IN CURB, COMBINED CURB AND GUTTER

THE COST OF ALL JOINTS, INCLUDING LABOR, FURNISH AND PLACING OF STEEL, JOINT FILLER, SEALANT, AND ALL OTHER INCIDENTALS SHALL BE INCLUDED IN THE UNIT PRICE BID FOR CONCRETE CURB, TYPE B (SPECIAL) (CDOT), AND COMBINATION CURB AND GUTTER TYPE B V.12 (CDOT) ITEMS. SAWCUTTING AND FURNISHING AND INSTALLING CURB ANCHORS, DOWELS, AND TIE BARS SHALL ALSO BE INCIDENTAL TO THESE ITEMS.

**DETAILS OF CONCRETE CURB, TYPE B (SPECIAL) (CDOT) AND
COMBINATION CURB AND GUTTER TYPE B V.12 (CDOT)**

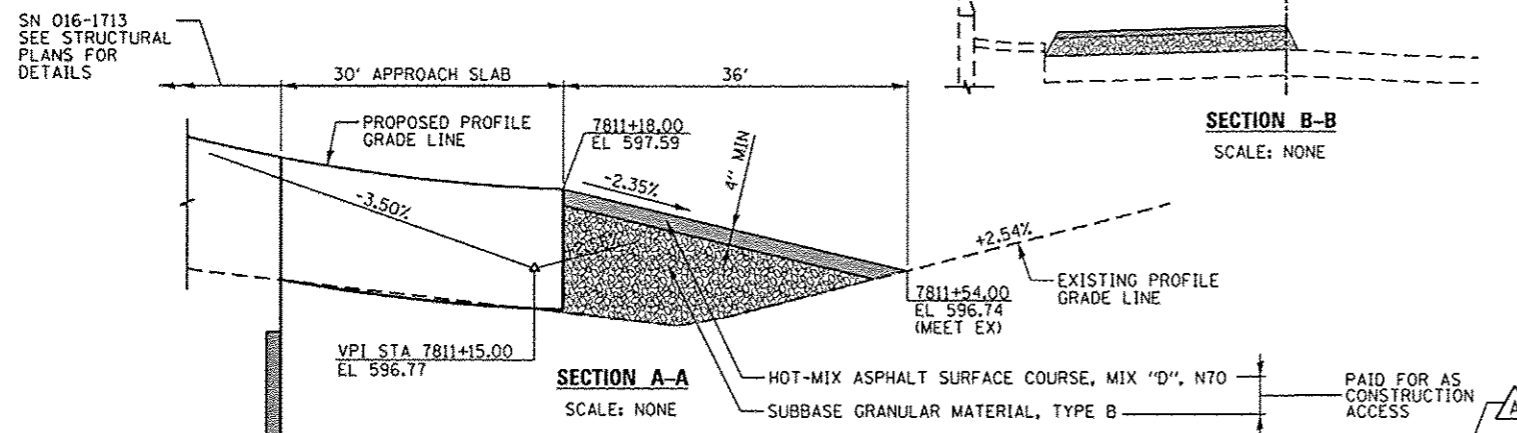


DETAILS OF CONSTRUCTION ACCESS

NOTES:

1. SEE CONSTRUCTION ACCESS SPECIAL PROVISION FOR ADDITIONAL INFORMATION.
2. CONSTRUCTION ACCESS MAY REQUIRE PERIODIC INSPECTION AND NEEDED MAINTENANCE. ACCESS REPAIR AND/OR MAINTENANCE SHALL BE INCLUDED IN COST OF CONSTRUCTION ACCESS.

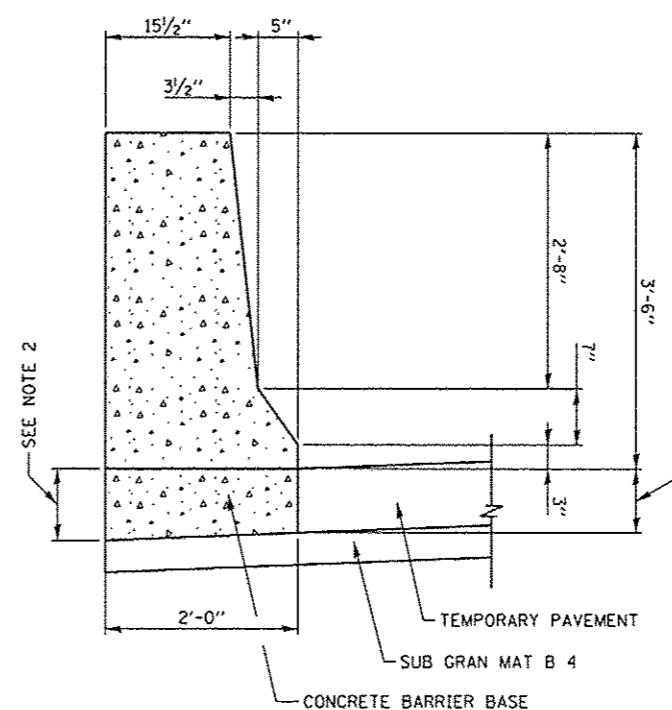
CONSTRUCTION ACCESS



SECTION A-A
SCALE: NONE

SECTION B-B
SCALE: NONE

**CONCRETE BARRIER, SINGLE FACE
42 INCH HEIGHT DETAILS**



**DETAILS OF CONCRETE BARRIER, SINGLE FACE
42 INCH HEIGHT**

NOTES:

1. SEE ROADWAY DETAILS SHEETS 2, 10, 11 AND 12 FOR ADDITIONAL DETAILS.
2. CONCRETE BARRIER BASE THICKNESS TO MATCH TEMPORARY PAVEMENT THICKNESS.
3. SEE TYPICAL SECTION SHEET 6 FOR TEMPORARY PAVEMENT DETAILS.



D168W26-sh1-Detail-B1
USER NAME = pjmarrino
PLOT SCALE = 10.0000' / 1"
PLOT DATE = 10/11/2013

DESIGNED - AFC
DRAWN - AFC
CHECKED - DBM
DATE - 9/15/13
REVISED - 10/15/2013
REVISED -
REVISED -
REVISED -

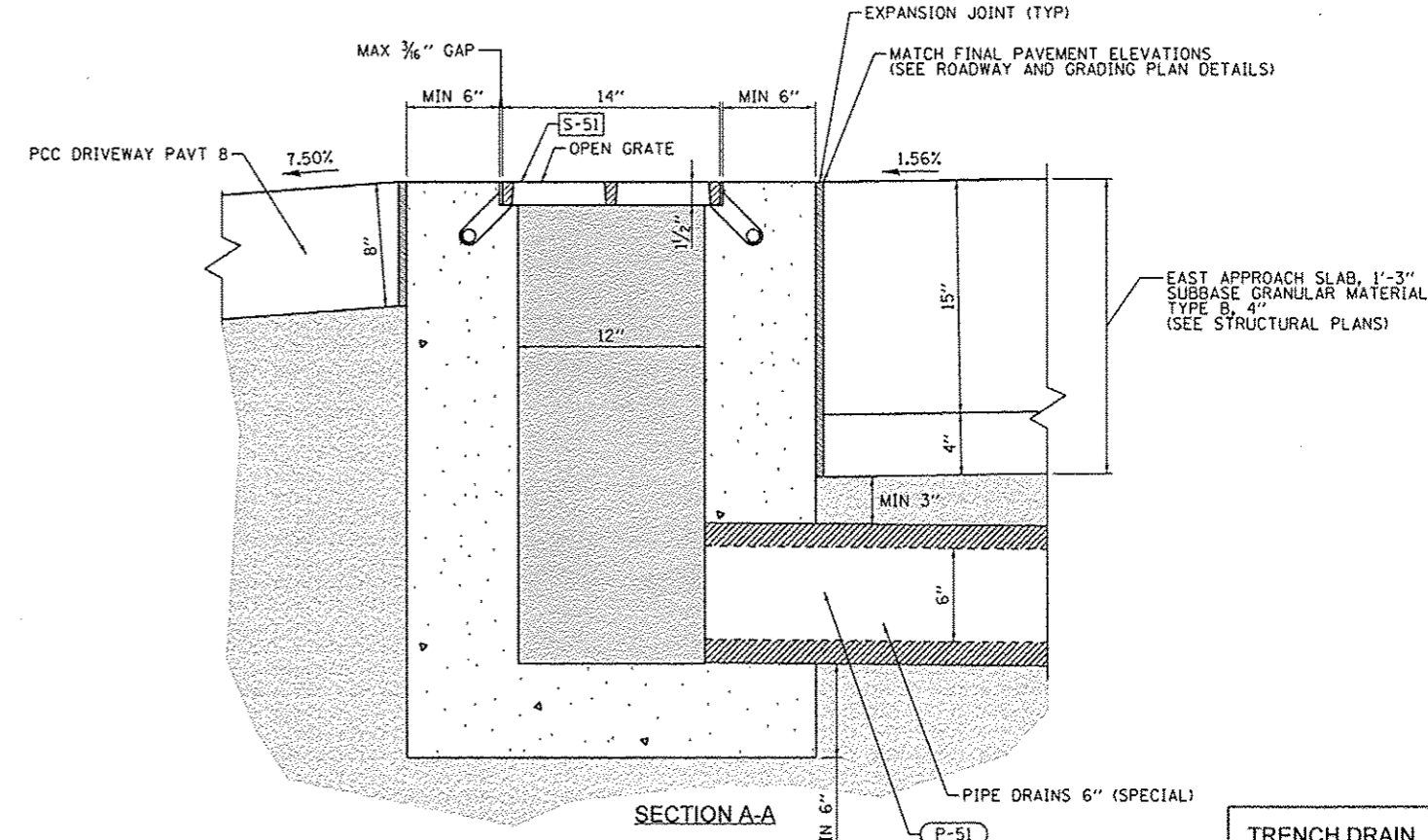
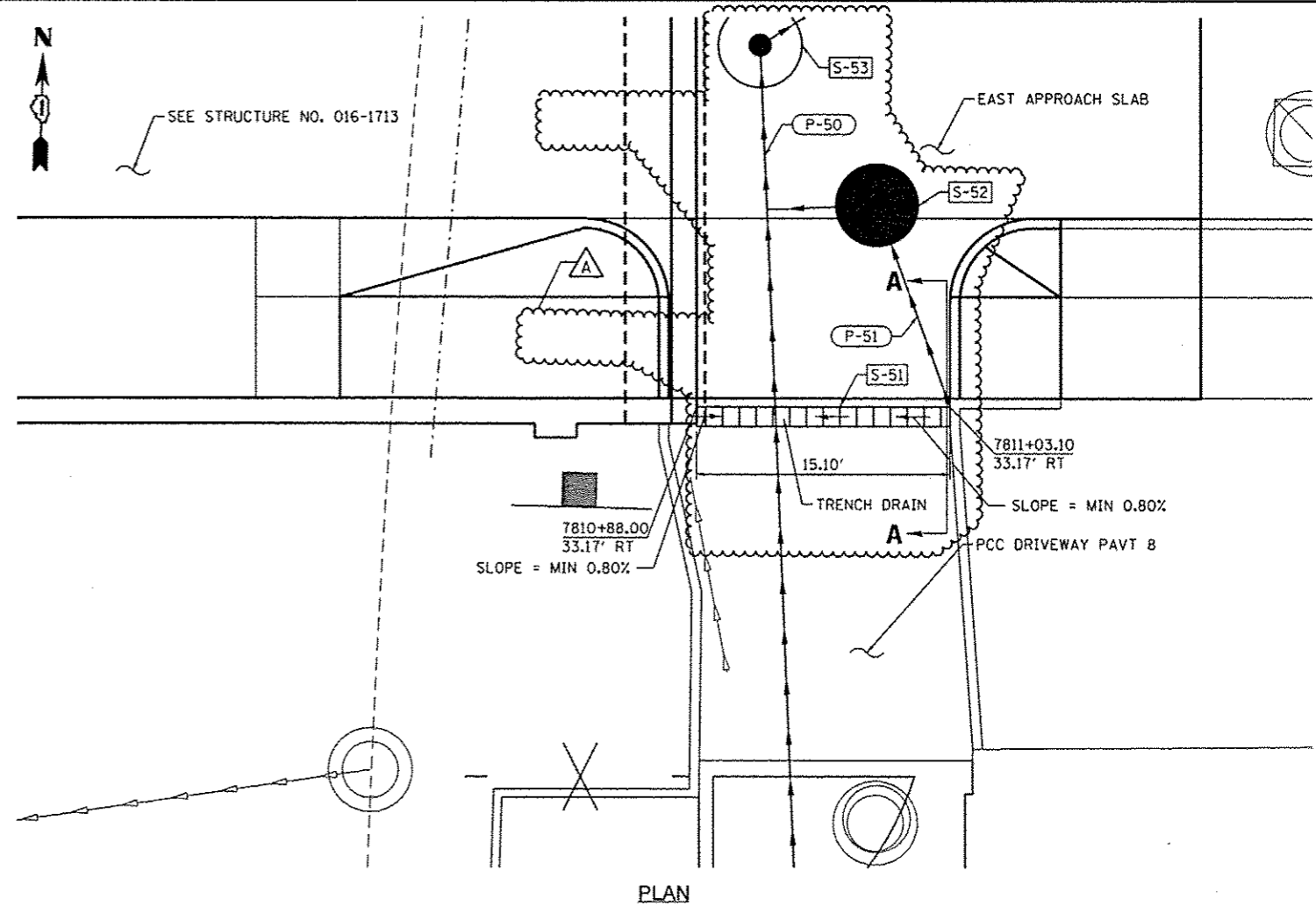
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

ROADWAY DETAILS
CONC CURB TB SPL CDOT, COMB C&G B V.12(CDOT),
CONSTRUCTION ACCESS AND CONC BAR 1F 42HT

SCALE: N.T.S. SHEET 1 OF 12 SHEETS STA. TO STA.

F.A.J. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	491
CONTRACT NO. 60W26				
[ILLINOIS] FED. AID PROJECT				

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- NOTES:**
1. SEE DRAINAGE SCHEDULES FOR RIM AND INVERT ELEVATIONS.
 2. THE GRATE USED FOR THE TRENCH DRAIN WILL BE INCLUDED IN THE COST OF TRENCH DRAIN.
 3. OUTLET PIPES AND PREFORMED CHANNEL INVERTS SHALL BE SLOPED AT 0.80% OR STEEPER TOWARD OUTLET REGARDLESS OF THE SURFACE SLOPE.
 4. TRENCH EXCAVATION MUST ALLOW FOR A MINIMUM OF 6 INCHES OF CONCRETE TO BE PLACED UNDER AND ALONGSIDE THE TRENCH DRAIN SYSTEM.
 5. TRENCH DRAINS SHALL BE IN ACCORDANCE WITH THE MANUFACTURERS DETAILS AND SPECIFICATIONS.
 6. PROVIDE 1/2" EXPANSION JOINT WITH PREFORMED JOINT FILLER BETWEEN PAVEMENT AND TRENCH DRAIN ENCASMENT.



DIG8W26-ht-Drain-Detail-81
 USER NAME = chiuo
 PLOT SCALE = 5.0000' / 1"
 PLOT DATE = 10/9/2013

DESIGNED - AFC
 DRAWN - AFC
 CHECKED - DBM
 DATE - 9/15/13

REVISED - Δ 10/15/2013
 REVISED -
 REVISED -
 REVISED -

STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION

DRAINAGE DETAILS
 TRENCH DRAIN

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

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-008R	COOK	559	518

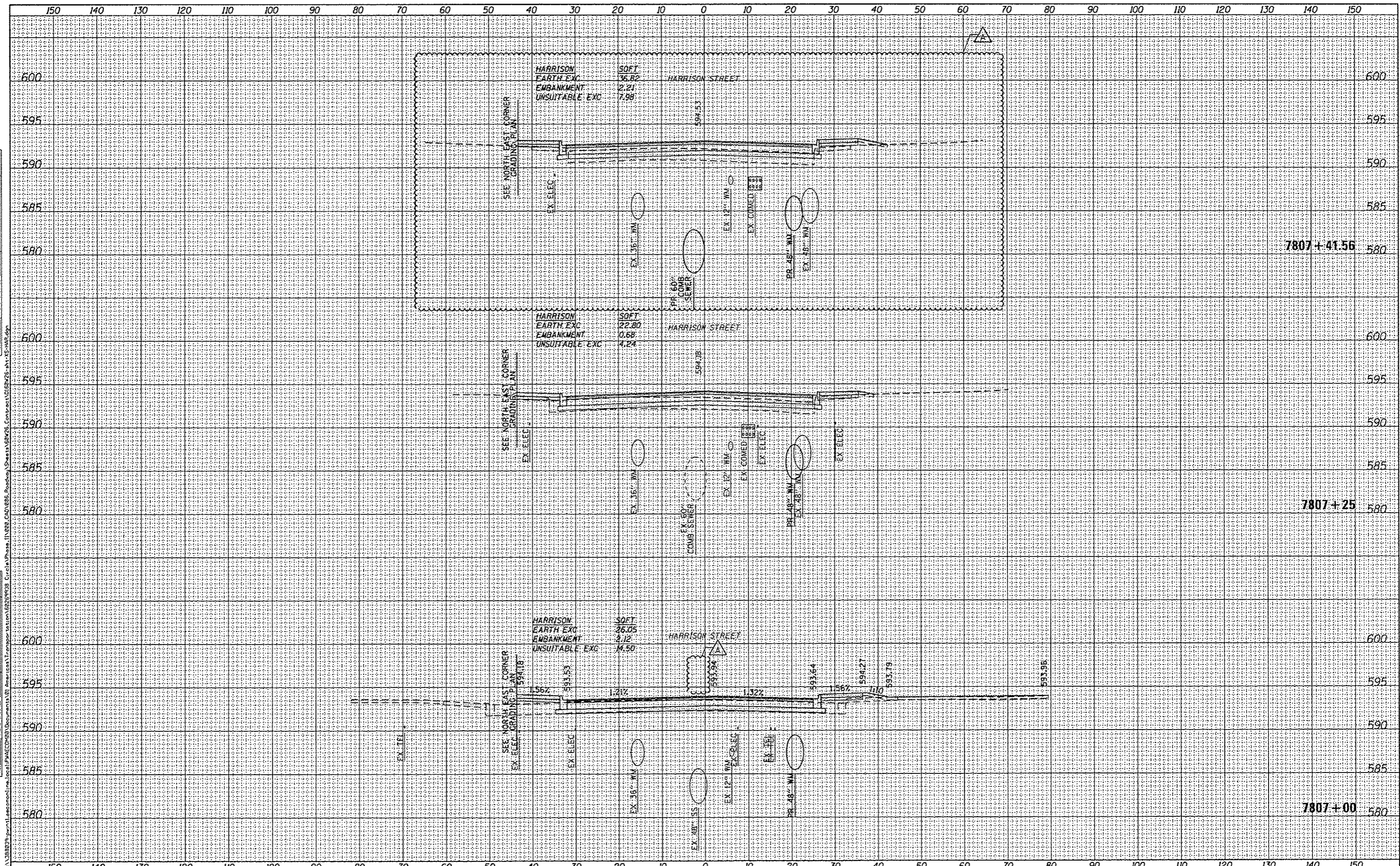
CONTRACT NO. 60W26

ILLINOIS FED. AID PROJECT

TRENCH DRAIN

DATE	
BY	
APPROVED	
SURVEY	
PLOTTED	
NOTED	
AREAS	
AREAS	
CHECKED	
NO.	

DATE	
BY	
APPROVED	
SURVEY	
PLOTTED	
NOTED	
AREAS	
AREAS	
CHECKED	
NO.	



AECOM
 303 EAST WACKER DRIVE, SUITE 1400
 CHICAGO, IL 60601-4238
 PHONE (312) 373-1700 FAX (312) 373-6000

DIGW26-sh1-KS-HAR.dgn	DESIGNED - OPS	REVISED - 10/15/2013
USER NAME = pimorino	DRAWN - OPS	REVISED -
PLOT SCALE = 10.0000' / 1"	CHECKED - DBM	REVISED -
PLOT DATE = 10/11/2013	DATE - 09/15/13	REVISED -

**STATE OF ILLINOIS
 DEPARTMENT OF TRANSPORTATION**

HARRISON STREET CROSS SECTION

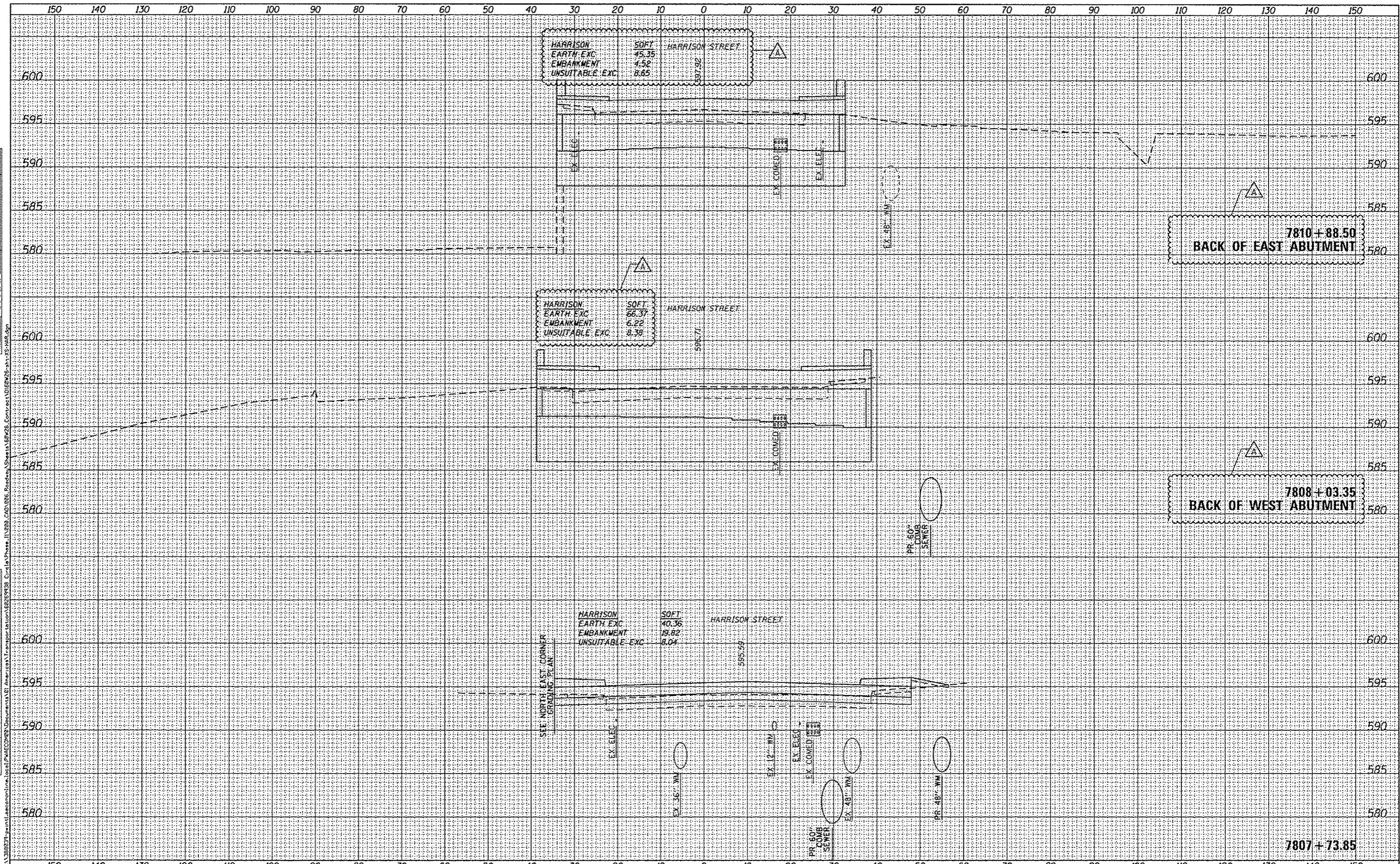
SCALE: 1:5V, 1:10H SHEET 29 OF 41 SHEETS STA. 7807+00.00 TO STA. 7807+41.56

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-007R	COOK	559	547
CONTRACT NO. 60W25			ILLINOIS FED. AID PROJECT	

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DATE	
BY	
FINAL SURVEY	
REVISIONS	
NOTE BOOK	
AREAS CHECKED	

DATE	
BY	
ORIGINAL SURVEY	
REVISIONS	
NOTE BOOK	
AREAS CHECKED	



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USER NAME = pimorris	DRAWN - OPS	REVISED -
PLOT SCALE = 1/8" = 1' - 0"	CHECKED - DBM	REVISED -
PLOT DATE = 10/11/2013	DATE - 09/15/13	REVISED -

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

HARRISON STREET CROSS SECTION

SCALE: 1:5V, 1:10H SHEET 30 OF 41 SHEETS STA. 7807+73.85 TO STA. 7810+88.50

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
90/94/290	2013-007R	COOK	559	548
CONTRACT NO. 60W25			ILLINOIS FED. AID PROJECT	

