

URBAN  
90% FED.  
10% STATE

CONSTRUCTION CODE

CODE NO.	ITEM	UNIT	TOTAL QUANTITY	ROADWAY RESURFACING	ROADWAY RECONSTRUCT	ROADWAY RECONSTRUCT	SN. 081-2031	SN. 081-0197 SN. 081-0198	SN. 081-0199 SN. 081-0200	SN. 037-1129	SN. 037-0179 SN. 037-0180
				0005	0004	0004	0014	0011	0011	0028	0011
				ROCK ISLAND	ROCK ISLAND	HENRY	ROCK ISLAND	ROCK ISLAND	ROCK ISLAND	HENRY	HENRY
50200300	COFFERDAM EXCAVATION	CU YD	572								572
50201121	COFFERDAM (TYPE 2) (LOCATION - 1)	EACH	1								1
50201122	COFFERDAM (TYPE 2) (LOCATION - 2)	EACH	1								1
50201123	COFFERDAM (TYPE 2) (LOCATION - 3)	EACH	1								1
50201124	COFFERDAM (TYPE 2) (LOCATION - 4)	EACH	1								1
50300100	FLOOR DRAINS	EACH	24					24			
50300225	CONCRETE STRUCTURES	CU YD	1756.6			59.5		616.4	571.5	28.7	480.5
50300255	CONCRETE SUPERSTRUCTURE	CU YD	3184.4			329.8		865.8	935.7		1053.1
50300260	BRIDGE DECK GROOVING	SQ YD	7680			626		2157	2307		2590
50300265	SEAL COAT CONCRETE	CU YD	352.2								352.2
50300300	PROTECTIVE COAT	SQ YD	9431			678		2697	2916		3140
50401005	FURNISHING AND ERECTING PRECAST PRESTRESSED CONCRETE I-BEAMS, 48 IN.	FOOT	2792								2792
50500105	FURNISHING AND ERECTING STRUCTURAL STEEL	L SUM	1					0.47	0.53		
50500505	STUD SHEAR CONNECTORS	EACH	23242					10692	12420	130	

- \* SPECIALTY ITEMS
- \*\* NON-PARTICIPATING ITEMS

Rev. 6-1-15

Rev.

**GENERAL NOTES**

Reinforcement bars designated (E) shall be epoxy coated.  
 Layout of the slope protection system may be varied to suit ground conditions in the field as directed by the Engineer.  
 Seal coat thickness design is based on the Estimated Water Surface Elevation (EWSE). Cofferdam design details and proposed changes in seal coat thickness shall be submitted to the Engineer for approval with the cofferdam design.

STATION 416+81.50  
 BUILT 20 BY  
 STATE OF ILLINOIS  
 F.A.I. RT. 80 SEC. 37-1BR-1  
 LOADING HL-93  
 STRUCTURE NO. 037-0180

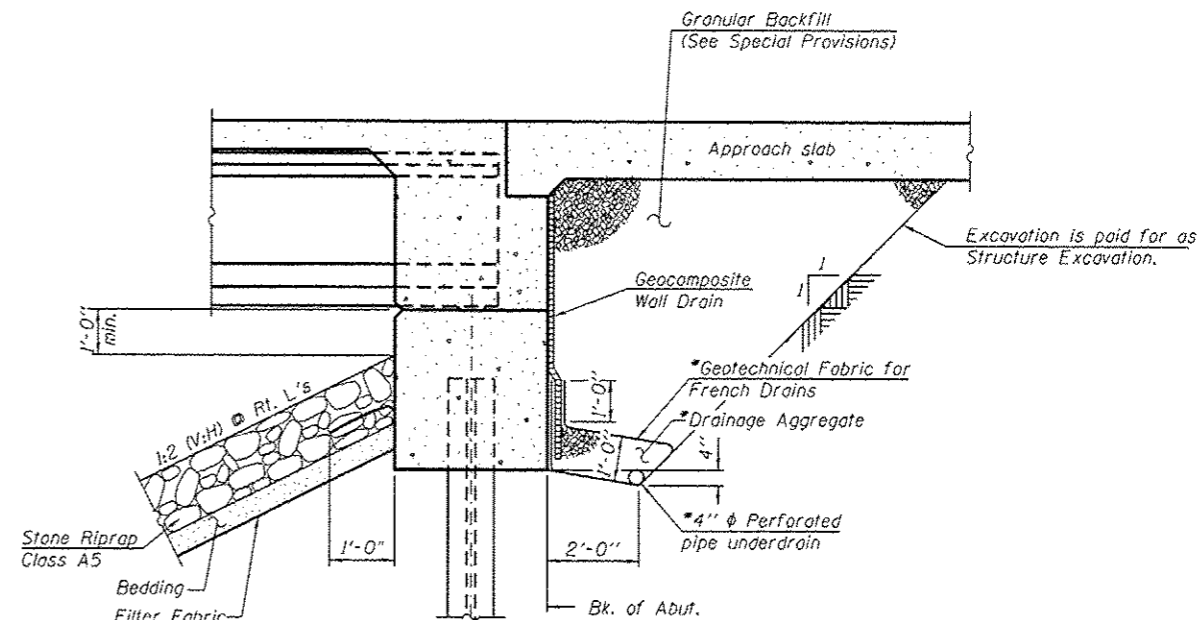
**NAME PLATE - W.B.**  
 See Std. 515001

STATION 416+81.50  
 BUILT 20 BY  
 STATE OF ILLINOIS  
 F.A.I. RT. 80 SEC. 37-1BR-1  
 LOADING HL-93  
 STRUCTURE NO. 037-0179

**NAME PLATE - E.B.**  
 See Std. 515001

**TOTAL BILL OF MATERIAL**

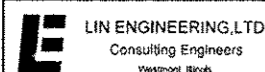
ITEM	UNIT	SUPER	SUB	TOTAL
Stone Riprap, Class A5	Sq. Yd.	-	1,787	1,787
Filter Fabric	Sq. Yd.	-	1,787	1,787
Removal of Existing Structures No. 5	Each	1	-	1
Removal of Existing Structures No. 6	Each	1	-	1
Structure Excavation	Cu. Yd.	-	638	638
Cofferdam Excavation	Cu. Yd.	-	572	572
Cofferdam (Type 2) (Location-1)	Each	-	1	1
Cofferdam (Type 2) (Location-2)	Each	-	1	1
Cofferdam (Type 2) (Location-3)	Each	-	1	1
Cofferdam (Type 2) (Location-4)	Each	-	1	1
Concrete Structures	Cu. Yd.	-	480.5	480.5
Concrete Superstructure	Cu. Yd.	1,053.1	-	1,053.1
Bridge Deck Grooving	Sq. Yd.	2,590	-	2,590
Seal Coat Concrete	Cu. Yd.	-	352.2	352.2
Protective Coat	Sq. Yd.	3,140	-	3,140
Furnishing and Erecting Precast Prestressed Concrete I-Beams, 48 in.	Foot	2,792	-	2,792
Reinforcement Bars	Pound	-	66,340	66,340
Reinforcement Bars, Epoxy Coated	Pound	235,010	84,820	319,830
Bar Splicers	Each	-	328	328
Furnishing Steel Piles HP14x89	Foot	-	731	731
Driving Piles	Foot	-	731	731
Test Pile Steel HP14x89	Each	-	4	4
Pile Shoes	Each	-	26	26
Name Plates	Each	2	-	2
Drilled Shaft in Soil	Cu. Yd.	-	93.2	93.2
Drilled Shaft in Rock	Cu. Yd.	-	123.6	123.6
Anchor Bolts, 1/2"	Each	16	-	16
Geocomposite Wall Drain	Sq. Yd.	-	105	105
Granular Backfill for Structures	Cu. Yd.	-	503	503
Drainage Scuppers, DS-II	Each	1	-	1
Pipe Underdrains for Structures 4"	Foot	-	243	243



**SECTION THRU INTEGRAL ABUTMENT**  
 (Horiz. dim. @ Rt. L's)

\*Included in the cost of Pipe Underdrains for Structures.  
 (See Special Provisions)

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



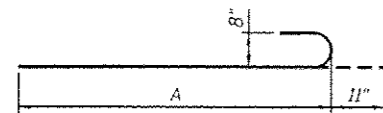
USER NAME *	DESIGNED - PSS	REVISED / 5/26/2015 AJF
FILE NAME *	CHECKED - LMS	REVISED -
PLOT SCALE *	DRAWN - AJF	REVISED -
PLOT DATE *	CHECKED - LMS	REVISED -

STATE OF ILLINOIS  
 DEPARTMENT OF TRANSPORTATION

GENERAL DATA  
 STRUCTURE NOS. 037-0179 & 037-0180

SHEET NO. 2 OF 43 SHEETS

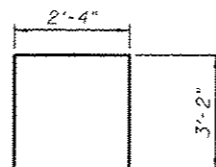
F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
80	37-1BR-1	HENRY	430	235
			CONTRACT NO. 64B78	
ILLINOIS FED. AID PROJECT				



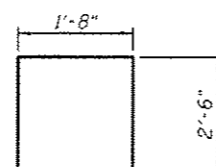
BARS v<sub>8</sub>(E) thru v<sub>11</sub>(E)

BARS v<sub>8</sub>(E) thru v<sub>11</sub>(E)

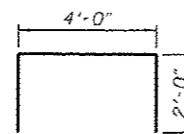
Bar	A
v <sub>8</sub> (E)	16'-4"
v <sub>9</sub> (E)	16'-10"
v <sub>10</sub> (E)	16'-0"
v <sub>11</sub> (E)	16'-6"



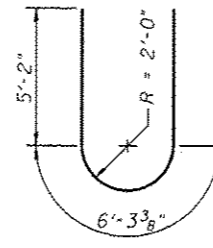
BAR s<sub>7</sub>(E)



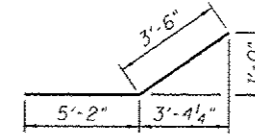
BAR s<sub>8</sub>(E)



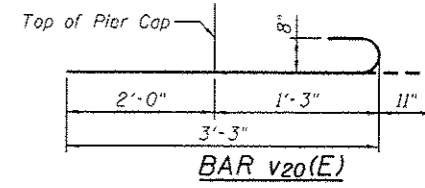
BAR s<sub>10</sub>(E)



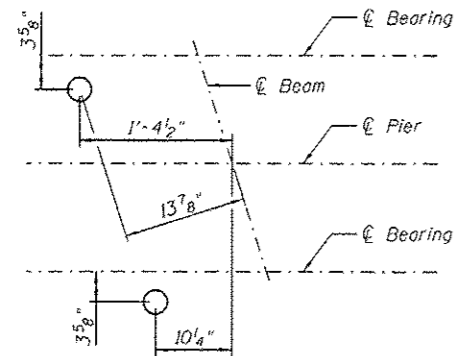
BAR u<sub>2</sub>(E)



BAR p<sub>5</sub>(E)

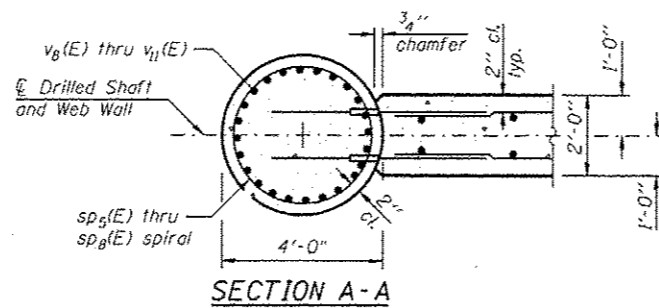


BAR v<sub>20</sub>(E)

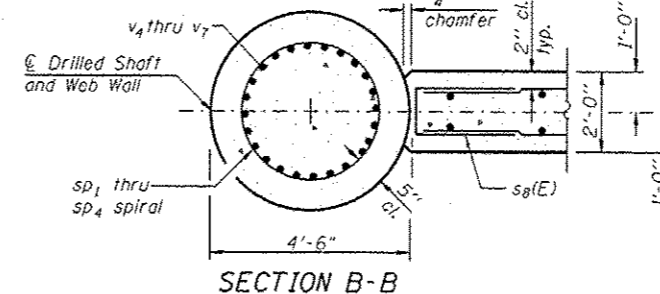


ANCHOR BOLT LAYOUT

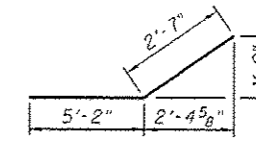
(Pier 1 and 2 EB and WB)  
(Beam 1 shown. Beam 6, 7, and 13 similar)



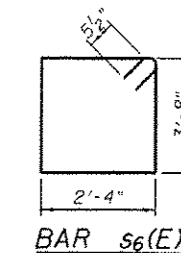
SECTION A-A



SECTION B-B



BAR p<sub>8</sub>(E)



BAR s<sub>6</sub>(E)

WB PIER 1 BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h <sub>3</sub> (E)	6	#7	37'-10"	—
h <sub>4</sub> (E)	32	#5	10'-8"	—
h <sub>5</sub> (E)	36	#5	10'-2"	—
p <sub>3</sub> (E)	8	#9	37'-10"	—
p <sub>4</sub> (E)	8	#7	35'-0"	—
p <sub>5</sub> (E)	16	#7	8'-8"	—
s <sub>6</sub> (E)	212	#5	12'-11"	□
s <sub>7</sub> (E)	32	#5	8'-8"	U
s <sub>8</sub> (E)	36	#5	6'-8"	U
sd <sub>1</sub>	3	#4	35'-8"	AAA
sd <sub>5</sub> (E)	3	#4	7'-6"	AAA
u <sub>2</sub> (E)	8	#5	16'-8"	—
v <sub>4</sub>	72	#11	35'-8"	—
v <sub>6</sub> (E)	72	#8	17'-3"	—
v <sub>20</sub> (E)	30	#8	4'-2"	—
v <sub>21</sub> (E)	48	#5	11'-8"	—
v <sub>22</sub> (E)	48	#5	7'-2"	—
Cofferdam Excavation		Cu. Yd.	128	
Seal Coat Concrete		Cu. Yd.	78.8	
Concrete Structures		Cu. Yd.	163.3	
Reinforcement Bars		Pound	15330	
Reinforcement Bars, Epoxy Coated		Pound	11630	
Drilled Shaft in Soil		Cu. Yd.	22.8	
Drilled Shaft in Rock		Cu. Yd.	23.8	
Cofferdam (Type 2) (Location-1)		Each	1	

Cast steps monolithically with cap.  
Space cap reinforcement to miss anchor bolts.  
Minimum lap for spirals = 2'-7"  
\*\* Length is height of spiral.

WB PIER 2 BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h <sub>3</sub> (E)	6	#7	37'-10"	—
h <sub>4</sub> (E)	36	#5	10'-8"	—
h <sub>5</sub> (E)	44	#5	10'-2"	—
p <sub>3</sub> (E)	8	#9	37'-10"	—
p <sub>4</sub> (E)	8	#7	35'-0"	—
p <sub>5</sub> (E)	16	#7	8'-8"	—
s <sub>6</sub> (E)	212	#5	12'-11"	□
s <sub>7</sub> (E)	32	#5	8'-8"	U
s <sub>8</sub> (E)	44	#5	6'-8"	U
sd <sub>2</sub>	3	#4	36'-6"	AAA
sd <sub>6</sub> (E)	3	#4	8'-0"	AAA
u <sub>2</sub> (E)	8	#5	16'-8"	—
v <sub>5</sub>	72	#11	36'-6"	—
v <sub>9</sub> (E)	72	#8	17'-9"	—
v <sub>20</sub> (E)	30	#8	4'-2"	—
v <sub>23</sub> (E)	48	#5	13'-1"	—
v <sub>24</sub> (E)	48	#5	7'-8"	—
Cofferdam Excavation		Cu. Yd.	128	
Seal Coat Concrete		Cu. Yd.	78.8	
Concrete Structures		Cu. Yd.	167.0	
Reinforcement Bars		Pound	15680	
Reinforcement Bars, Epoxy Coated		Pound	12030	
Drilled Shaft in Soil		Cu. Yd.	13.0	
Drilled Shaft in Rock		Cu. Yd.	30.8	
Cofferdam (Type 2) (Location-2)		Each	1	

Cast steps monolithically with cap.  
Space cap reinforcement to miss anchor bolts.  
Minimum lap for spirals = 2'-7"  
\*\* Length is height of spiral.

EB PIER 1 BILL OF MATERIAL

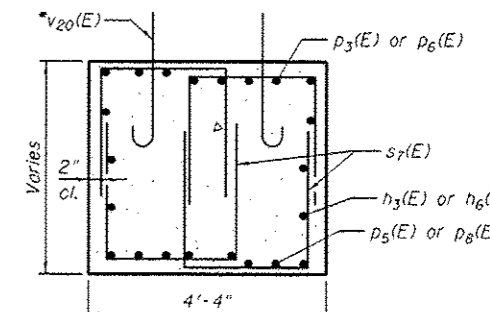
Bar	No.	Size	Length	Shape
h <sub>6</sub> (E)	6	#7	45'-10"	—
h <sub>7</sub> (E)	48	#5	9'-0"	—
h <sub>8</sub> (E)	54	#5	8'-6"	—
p <sub>2</sub> (E)	5	#5	22'-8"	—
p <sub>6</sub> (E)	8	#9	45'-10"	—
p <sub>7</sub> (E)	8	#7	45'-0"	—
p <sub>8</sub> (E)	16	#7	7'-9"	—
s <sub>6</sub> (E)	178	#5	12'-11"	□
s <sub>7</sub> (E)	16	#5	8'-8"	U
s <sub>8</sub> (E)	54	#5	6'-8"	U
s <sub>10</sub> (E)	24	#5	8'-0"	U
sd <sub>3</sub>	4	#4	37'-9"	AAA
sd <sub>7</sub> (E)	4	#4	7'-2"	AAA
u <sub>2</sub> (E)	8	#5	16'-8"	—
v <sub>6</sub>	96	#10	37'-9"	—
v <sub>10</sub> (E)	96	#8	16'-11"	—
v <sub>20</sub> (E)	36	#8	4'-2"	—
v <sub>21</sub> (E)	60	#5	11'-8"	—
v <sub>25</sub> (E)	60	#5	6'-10"	—
Cofferdam Excavation		Cu. Yd.	158	
Seal Coat Concrete		Cu. Yd.	97.3	
Concrete Structures		Cu. Yd.	179.0	
Reinforcement Bars		Pound	17960	
Reinforcement Bars, Epoxy Coated		Pound	13520	
Drilled Shaft in Soil		Cu. Yd.	40.1	
Drilled Shaft in Rock		Cu. Yd.	28.0	
Cofferdam (Type 2) (Location-3)		Each	1	

Cast steps monolithically with cap.  
Space cap reinforcement to miss anchor bolts.  
Minimum lap for spirals = 2'-7"  
\*\* Length is height of spiral.

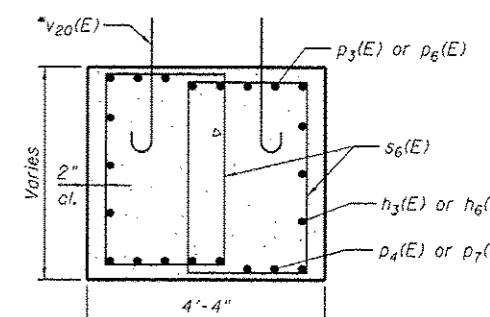
EB PIER 2 BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h <sub>6</sub> (E)	6	#7	45'-10"	—
h <sub>7</sub> (E)	48	#5	9'-0"	—
h <sub>8</sub> (E)	66	#5	8'-6"	—
p <sub>2</sub> (E)	5	#5	22'-8"	—
p <sub>6</sub> (E)	8	#9	45'-10"	—
p <sub>7</sub> (E)	8	#7	45'-0"	—
p <sub>8</sub> (E)	16	#7	7'-9"	—
s <sub>6</sub> (E)	178	#5	12'-11"	□
s <sub>7</sub> (E)	16	#5	8'-8"	U
s <sub>8</sub> (E)	66	#5	6'-8"	U
s <sub>10</sub> (E)	24	#5	8'-0"	U
sd <sub>4</sub>	4	#4	36'-6"	AAA
sd <sub>8</sub> (E)	4	#4	7'-8"	AAA
u <sub>2</sub> (E)	8	#5	16'-8"	—
v <sub>7</sub>	96	#10	36'-6"	—
v <sub>11</sub> (E)	96	#8	17'-5"	—
v <sub>20</sub> (E)	36	#8	4'-2"	—
v <sub>23</sub> (E)	60	#5	13'-1"	—
v <sub>26</sub> (E)	60	#5	7'-4"	—
Cofferdam Excavation		Cu. Yd.	158	
Seal Coat Concrete		Cu. Yd.	97.3	
Concrete Structures		Cu. Yd.	183.7	
Reinforcement Bars		Pound	17370	
Reinforcement Bars, Epoxy Coated		Pound	13990	
Drilled Shaft in Soil		Cu. Yd.	17.3	
Drilled Shaft in Rock		Cu. Yd.	41.0	
Cofferdam (Type 2) (Location-4)		Each	1	

Cast steps monolithically with cap.  
Space cap reinforcement to miss anchor bolts.  
Minimum lap for spirals = 2'-7"  
\*\* Length is height of spiral.



SECTION C-C



SECTION E-E

\*For layout of v<sub>20</sub>(E) bars, see sheet 18 of 43.  
Note:  
For locations of section A-A, B-B, C-C, and E-E see sheets 32 thru 35 of 43.