DATE: 2006-09-26

ESTIMATE OF MATERIAL AND FORCE ACCOUNT WORK
BY THE
UNION PACIFIC RAILROAD

THIS ESTIMATE GOOD FOR 6 MONTHS EXPIRATION DATE IS :2007-03-26

DESCRIPTION OF WORK:
INSTALL LED FL SIGNALS W/GATES AND CWT IN NEW CABIN AT TR-126A IN
GRAND TOWER, IL. M.P. 94.20 ON THE CHESTER SUB.
SIGNAL PROJECT MANAGER: GAIL NELSON 252-6233
RAILROAD TO PERFORM ALL WORK / COST DISTRIBUTED AS FOLLOWS:
SIGNAL - STATE OF IL. 90% - UPRR 10%

PID: 55262 ANO: 56968 MP,SUBDIV: 94.20, CHESTER
SERVICE UNIT: 04 CITY: GRAND TOWER STATE: IL

DESCRIPTION	QTY	UNIT	LABOR	MATERIAL	RECOLL	UPRR	TOTAL
ENGINEERING WORK							
ENGINEERING			2683		2414	269	2683
LABOR ADDITIVE 174%			12002		10802	1200	12002
SIG-HWY XNG			4215		3793	422	4215
TOTAL ENGINEERING			18900		17009	1891	18900
SIGNAL WORK							
BILL PREP			900		810	90	900
CONTRACT				7378	6640	738	7378
EARTH FILL/ROCK				4000	3600	400	4000
LABOR ADDITIVE 174%			38453		34607	3846	38453
METER SERVICE				10000	9000	1000	10000
OTM INSTALL			92		82	10	92
PERSONAL EXPENSES				18000	16200	1800	18000
RETAINING WALL				15000	13500	1500	15000
SALES TAX				4067	3659	408	4067
SIGNAL			21415	63394	76328	8481	84809
TRANSPORTATION CHARGES				4182	3763	419	4182
WZ TRAFFIC CONTROL				3712	3340	372	3712
CONTINGENCIES				21197	19077	2120	21197
TOTAL SIGNAL			60860	150930	190606	21184	211790
TRACK & SURFACE WORK							
FIELD WELD			27		24	3	27
LABOR ADDITIVE 232%			64		57	7	64
OTM			421	1684	1894	211	2105
SALES TAX				16	15	1	16
WELD				267	240	27	267
TOTAL TRACK & SURFACE			512	1967	2230	249	2479
LABOR/MATERIAL EXPENSE			80272	152897			
RECOLLECTIBLE/UPRR EXPENSE					209845	23324	
ESTIMATED PROJECT COST							233169
EXISTING REUSEABLE MATERIAL CREDIT					0		
SALVAGE NONUSEABLE MATERIAL CREDIT					0		
RECOLLECTIBLE LESS CREDITS							

THE ABOVE FIGURES ARE ESTIMATES ONLY AND SUBJECT TO FLUCTUATION. IN THE EVENT OF AN INCREASE OR DECREASE IN THE COST OR QUANTITY OF MATERIAL OR LABOR REQUIRED, UPRR WILL BILL FOR ACTUAL CONSTRUCTION COSTS AT THE CURRENT EFFECTIVE RATE.

FORM 30-1 PAGE 04 MORE

WORK ORDER AUTHORIZATION-DETAIL OF ESTIMATED EXPENDITURES

PROJ NO: 55262
A.W.O. NO: 56968
W.O. NO:
B.I. NO: 06EN10
STATE: IL
VAL SEC: 1101E

RAILROAD: UPER CO.
LOCATION: GRAND TOWER,IL,TR-126A,CHESTER SUB.
DEPARTMENT: ENGINEERING SERVICES

---------- STOCK MATERIAL PLAN ----------

ITEM NUMBER	ITEM DESCRIPTION	UNIT COST	QTY	UM	DIRECT MATL $
02040660	BATTERY,GNB, 75A23 OR 50A27	298.71	13	EA	3883
09011240	CABLE TIE, NYLON 1 1/8" MAX. DIA	0.02	200	EA	4
09011980	CABLE TIE, NYLON 3 1/2" MAX. DIA	0.12	20	EA	2
09014950	CIRCUIT BRKR,120/240V 20A 2 POLE	14.55	2	EA	29
09054360	RELAY, GEN.PURPOSE 120V. TAB 856	5.08	1	EA	5
09057650	SOCKET,P-B 27E122 TAB 836A & 856	1.83	1	EA	2
09065700	TAPE, ELECTRICAL PLASTIC	2.68	2	RL	5
09066900	TERMINAL,SPADE,10-12 WIRE,#8 STUD	0.14	10	EA	1
09137100	TERM.LUG 3/16 CABLE-1/4 POST 2412	0.49	30	EA	15
09215100	33466 TERMINAL, RING TONGUE AMP	0.19	44	EA	8
09260350	TERMINAL,#16-14 #8 SPADE	0.06	35	EA	2
09261420	321524-1 TERMINAL,TEST 16-22 A	1.61	4	EA	6
09261570	321827-1 TERMINAL, TEST	1.58	15	EA	24
09401140	ADAPTER, 4 INCH CARLON PLASTIC	3.28	2	EA	7
09409820	BUSHING, 4" PLASTIC,INSULATING	0.80	2	EA	2
09424920	CONDUIT, 4", PVC, TYPE 40	2.30	50	LF	115
09467930	LOCKNUT, 4 INCH, GALVANIZED	5.17	2	EA	10
09844170	GROUND ROD, 5/8 INCH X 8 FEET	6.41	9	EA	58
09846750	GRND.ROD CONN. 4WAY ONESHOT.	4.82	9	EA	43
09908640	WIRE,#6 AWG.1 COND.COPPER,SOLID	0.43	225	LF	97
09912200	WIRE #6 AWG 2 CND 500'ROLL SHIELD	1.65	500	LF	825
09913200	WIRE,#6, 5 COND 500'ROLL SHIELDED	2.97	500	LF	1485
09915610	WIRE #6 AWG 1 COND COPPER, STRAN	0.49	145	LF	71
09930550	WIRE #10 AWG 1 COND COPPER, STRAN	0.20	780	LF	156
09932310	WIRE #10 AWG 1 COND COPPER, TWIST	0.41	120	LF	49
09946100	WIRE #14, 7 CND 500' ROLL SHIELDE	1.30	500	LF	650
09960090	WIRE #16 AWG 1 COND COPPER, STRAN	0.30	650	LF	195
09976180	WIRE,#22,TW,PR. BELDEN #8761	0.07	20	LF	1
13547870	SHEET METAL SCREW, #10 X 1 INCH	1.36	1	BX	1
13552450	SHEET METAL SCREW,#12 X 3/4"	1.92	2	BX	4
13553150	SHEET METAL SCREW #12 X 1"	3.00	2	BX	6
17061400	PADLOCK,SIGNAL,WITHOUT KEY,AMERIC	14.48	6	EA	87
28033210	CARTON, 39 1/8"L X 23 1/4"W X 17	4.07	1	EA	4
28033230	CARTON, 47 3/8"L X 39 1/2"W X 18"	10.38	1	EA	10
28041880	PALLET, 48 X 40 INCH 2/WAY	8.32	2	EA	17
35040010	PLASTER OF PARIS, DENTAL GRADE	0.89	25	LB	22
39340220	SIGN, HIGHWAY CROSSING	50.00	2	EA	100
41276600	ADHESIVE, WELD TAGS, RTV SILICON	3.86	2	EA	8
52000920	SURGE PROTECTOR SP19-2A TAB 586	65.33	1	EA	65
52001370	SURGE PROTECTOR SP20-2A TAB 585	66.80	2	EA	134

FORM 30-1 PAGE 05 MORE

WORK ORDER AUTHORIZATION-DETAIL OF ESTIMATED EXPENDITURES

PROJ NO: 55262
A.W.O. NO: 56968
W.O. NO:
B.I. NO: 06EN10
STATE: IL
VAL SEC: 1101E

RAILROAD: UPRR CO.
LOCATION: GRAND TOWER,IL,TR-126A,CHESTER SUB.
DEPARTMENT: ENGINEERING SERVICES

52003630	EXTENSION CORD - 12'	67.36	1	EA	67
52005630	TRK CIR.CHASSIS,ECODE 5. TAB 503	4089.31	1	EA	4089
52005700	BOND WIRE,7 STRANDS 100 LF. ROLL	0.78	300	LF	234
52016830	WIRE DUCT, 2X3	8.44	9	EA	76
52016940	WIRE DUCT, 3X3	9.82	6	EA	59
52017510	WIRE DUCT COVER 2"X6'	1.84	9	EA	17
52017620	WIRE DUCT COVER 3"X6'	2.63	6	EA	16
52019530	ENCLOSURE,SHUNT,POLE MOUNTED.24X2	162.24	2	EA	324
52019560	EQUALIZER, H.D. TAB 583	8.89	15	EA	133
52021550	FOUNDATION,4',STEEL,FOR FLSHR/GAT	195.48	2	EA	391
52025240	HOUSE, 6X6, SIGNAL XING	4900.06	1	EA	4900
52027350	CLIP BOARD - FOR SIGNAL PRINTS	8.02	1	EA	8
52027430	STEP BOX	16.22	1	EA	16
52028420	LIGHTNING ARRESTOR,CLR-COMM TAB 3	6.75	28	EA	189
52029780	LIGHTNING ARR,HD TAB 582 W/O BASE	9.50	8	EA	76
52030010	LIGHTNING ARRESTOR CONN.STRIP	3.96	4	EA	16
52039210	RECTIFIER,20EC,12V.TAB575	273.85	1	EA	274
52039390	RECTIFIER, 40EC, 12V. TAB577	373.08	1	EA	373
52042650	POST, MOUNTING, FOR SHUNT HOUSING	11.72	4	EA	47
52068650	TERMINAL, #6 - 5 WIRE - RING TYPE	0.16	55	EA	9
52070010	TERMINAL,#12-10 WIRE,RING TONGUE	0.08	300	EA	24
52071600	TERMINAL,#20-16 WIRE,RING TONGUE	0.07	150	EA	11
52072280	TERMINAL BLOCK, SIGNAL 2 POST BAK	2.25	64	EA	144
52072740	TERMINAL BLOCK, SIGNAL 12 POST 6	8.95	1	EA	9
52072960	TERMINAL BLOCK, SIGNAL 12 POST	6.93	4	EA	28
52074550	TEST LINK, INSULATED ASSEMBLY TAB	0.66	15	EA	10
52074660	SWITCH, MCKEEN TAB 82	13.90	1	EA	14
52079550	WIRE TAG, PLASTIC - WHITE	0.12	100	EA	12
52079560	MARKING PEN(FOR WHITE TAG)	1.95	1	EA	2
52108120	LED FL/GATE ASSY.2 WAY LIGHTS	7382.42	2	EA	14765
52109370	GATE ARM, ADJ.16-32'	481.57	2	EA	963
52122140	HIGH WIND BRACKET 5"OR 4"	63.99	2	EA	128
52136470	SHEAR PIN, SK-1000-1	5.50	2	EA	11
52207100	GRD XING PREDICTR GCP 4000 2TK.MA	15768.00	1	EA	15768
52258980	NBS, TAB 640, 62775-8621	468.30	2	EA	937
52263600	SURGE ARRESTOR,METER LOOP.	28.46	1	EA	28
52263690	SURGE PANEL - TAB 619	129.37	1	EA	129
52264040	SURGE PANEL - TAB 618	194.08	1	EA	194
52264560	TRACK FILTER - TF 156	206.35	4	EA	825
52267200	TRANSCEIVER MODULE. FOR GCP 4000	2975.98	2	EA	5952
52276150	SS XING CONTROLLER MODULE FOR GCP	1681.90	2	EA	3364
53648010	INSULATING CAP & SHIELD ASSY.	1.98	4	EA	8
53903460	EFD 120/240TDFL SURGE PROTECTOR	267.95	1	EA	268
53954500	180429-000 BOOTLEG KIT	47.47	6	EA	285
55016500	RAIL ANCHOR 6" INCH BASE UNIT	1.04	480	EA	499
55255260	FIELD WELD KIT, 133# ONE SHOT	60.04	4	EA	240

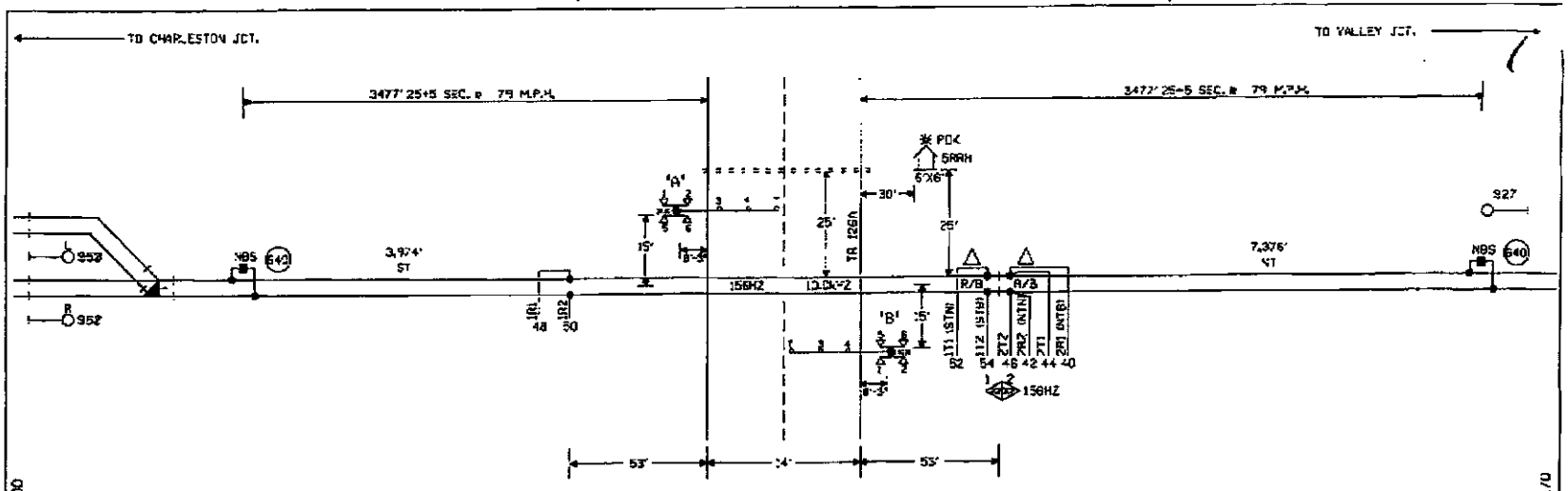
FORM 30-1

WORK ORDER AUTHORIZATION-DETAIL OF ESTIMATED EXPENDITURES

PROJ NO: 55262
A.W.O. NO: 56968
W.O. NO:
B.I. NO: 06EN10
STATE: IL
VAL SEC: 1101E

RAILROAD: UPRR CO.
LOCATION: GRAND TOWER, IL, TR-126A, CHESTER SUB.
DEPARTMENT: ENGINEERING SERVICES

55264570 PACKING SAND, PRE-MIXED (PER SACK	22.46	0	CA	18
55264930 REFRACTORY PASTE	1.83	1	EA	2
55317160 133# INS JT PLUG HH LH ANGCUT 15-	592.52	1	EA	593
55317180 133# INS JT PLUG HH RH ANGCUT 15-	592.50	1	EA	593
TOTAL				65,346



CONNECTS TO DRAWING 95.00

CONNECTS TO DRAWING 92.70

NOTES:

⊗ = TWISTED WIRES INSULATED 1 TWIST PER FT. ALL TRACK WIRES 20 #5

TRANSMITTER AND RECEIVER LEADS TO BE SEPARATED BY AT LEAST 12" IN TRENCH. LENGTHS SHOULD NOT EXCEED MANUFACTURES RECOMMENDATION.

TOP OF FOUNDATION TO BE AT SAME ELEVATION AS THE SURFACE OF THE TRAVELED WAY & NO MORE THAN 4" ABOVE THE SURFACE OF THE GROUND.

ALL BUNGALOW WIRING TO BE #18 AWG FLEX UNLESS OTHERWISE SPECIFIED EXCEPT ALL GROUND WIRE TO BE #6 AWG FLEX OR LARGER.

ALL WIRING IN GATE MECHANISM TO BE "10 AWG FLEX".

REFER TO UP STANDARD DWG FOR BUNGALOW GROUNDING.

ALL LIGHTS TO BE 12" ROUNDELS.

x x x x x x 4"X 30' CONDUIT

LIGHTS: LED LIGHTS

GATE A: 15'
GATE B: 15'

xx = BELL

△ = FIELD VERIFY POLARITY

CONSTRUCTION NOTES:

1. INSTALL ELECTROCODE 5 REPEATER BOX (TAB 503) WITH PROGRAM 5RRH IN NEW HOUSE WITH 156 HZ TRACK FILTERS (TAB 729) FOR BOTH THE NT AND ST TRACKS.
2. INSTALL 156 HZ TRACK FILTER (TAB 729) FOR THE NT TRACK AT M.P. 95.00 AND ST TRACK AT M.P. 92.70.
3. INSTALL 2-133LB I-BONDS 53' NORTH OF X'NG.
4. INSTALL ALUMINUM CHANNEL LOCK RETAINING WALL FOR HOUSE AND GATES.

S ← 0 → N

GRAND TOWER, ILLINOIS
TA 126A
M.P. 94.20
CHESTER SUBDIVISION
D.O.T.#415 805B

NEW SHEET

03-30-06 INSTALL GATES AND FLASHERS WITH CWT M.P. 94.20 W.O. 59969 RLT 800/080	MODIFICATION LEVEL		UNION PACIFIC	DES: DSD	UNION PACIFIC RAILROAD	DATE 03-30-06
	G.A. LAST LEVEL CHECKED	DN		DIG: DSD	VALLEY JCT., ILLINOIS TO CHARLESTON JCT., MISSOURI C.T.C. CIRCUITS	SHEET 1
	LAST LEVEL MOD THIS TYPICAL	DN		CHK: RLT		SWC 94.20
	LAST LEVEL BY DESIGNER	DN		W.F.E. 56969		S-1275
	CHANGED FROM TYPICAL?	Y	SIGNAL DESIGN	ID= 12759420.IX	Office of the Engineering - Omaha, Nebraska	

Exhibit B1, page 5

ILLINOIS COMMERCE COMMISSION
STIPULATED AGREEMENT
CROSSING DATA FORM

GENERAL INFORMATION: See Location Sketch

RAILROAD	Union Pacific Railroad Company
USDOT#, MILEPOST	445 807P, milepost 92.59-A
STREET, CITY, COUNTY	Kings Ferry Road, near Gorham, Jackson County
JURISDICTION (RDWY)	Big Muddy Township Road District
LOCATION	Rural/Residential
STREET SURFACE	Aggregate (East Appr.), Oil/Chip (West Appr.); 15';Fair - East, Good - West

CROSSING DATA: See Location Sketch for roadway profile and track centers

TRACK (W-E or N-S)	SURFACE TYPE	SURFACE WIDTH	SURFACE CONDITION
Main (N/S)	Full Depth Timber	24'	Good

ROADWAY DATA: See Location Sketch

INTERSECTING ROADS:	Pvt. Rd - 100'; Priv. Rd - 200'
TRAFFIC CONTROL	None
ADT & SPEED	50 Vehicles Per Day @ 55 MPH (1% Trucks)
TRAFFIC TYPE	Passenger, School Buses, Hazardous Materials
ADVANCE WARNING	Yes
PAVEMENT MARKING	No

RAILROAD DATA: See Location Sketch

FREIGHT TRAFFIC	50 Per day @ 70 MPH, Day & Night
PASSENGER TRAFFIC	None
WARNING DEVICES	Crossbucks & YIELD Signs

NOTES:

VISIBILITY STUDY: See Location Sketch

Train Speed		**70 MPH**
Roadway Speed		**55 MPH**
Required Stopping Sight Distance (SSD)		
Along Roadway		**520 FEET**
Along Tracks		**755 FEET**
Required Clearing Sight Distance (CSD) (Along Tracks)		**1,321 FEET**

Distances calculated per American Association of State Highway and Transportation Officials (AASHTO), A Policy on Geometric Design of Highways and Streets, 2001, Fourth Edition.

QUADRANT	CSD (FT)	OBSTRUCTION	SSD (FT)	OBSTRUCTION
NE	OK	N/A	500'	Tree Line
NW	OK	N/A	OK	N/A
SE	300'	RR Bridge	50'	Tree Line
SW	OK	N/A	OK	N/A

*Note: The installation of automatic flashing light signals and gates (AFLS&G) eliminates the need to satisfy minimum Sight Distance criteria.

APPROACH GRADES: See Location Sketch

DIRECTION: WEST			DIRECTION: EAST		
DISTANCE (FT)	ELEVATION (FT)	GRADE (%)	DISTANCE (FT)	ELEVATION (FT)	GRADE (%)
[1]			[1]		
[1]			[1]		

Distance measured from outermost rail.

[1] The existing grades of the highway approaches do not meet the requirements of 92 Ill. Adm. Code 1535.204.

COMMENTS: See Page 3 for Location Sketch (Aerial View) of the Crossing.
Steep slope (roadway to ditch) along the north side of the roadway on both approaches to the crossing. A drive way to a private residence is in the SE quadrant. Drainage and the private driveway will impact highway approach grade improvements.

A new Advance Warning Sign is required for the east highway approach to the crossing.

DATE: 2006-09-26

ESTIMATE OF MATERIAL AND FORCE ACCOUNT WORK
BY THE
UNION PACIFIC RAILROAD

THIS ESTIMATE GOOD FOR 6 MONTHS EXPIRATION DATE IS :2007-03-26

DESCRIPTION OF WORK:
INSTALL LED FL SIGNALS W/GATES AND CWT IN NEW CABIN AT TR-395 IN GRAND TOWER, IL. M.P. 92.59 ON THE CHESTER SUB.
SIGNAL PROJECT MANAGER: GAIL NELSON 252-6233
RAILROAD TO PERFORM ALL WORK / COST DISTRIBUTED AS FOLLOWS:
SIGNAL - STATE OF IL. 90% - UPRR 10%

PID: 55264 AWO: 56970 MP,SUBDIV: 92.59, CHESTER
SERVICE UNIT: 04 CITY: GRAND TOWER STATE: IL

DESCRIPTION	QTY	UNIT	LABOR	MATERIAL	RECOLL	UPRR	TOTAL
ENGINEERING WORK							
ENGINEERING			1788		1609	179	1788
LABOR ADDITIVE 174%			10445		9400	1045	10445
SIG-HWY XNG			4215		3793	422	4215
TOTAL ENGINEERING			16448		14802	1646	16448
SIGNAL WORK							
BILL PREP			900		810	90	900
CONTRACT				7253	6527	726	7253
CONTINGENCIES				19912	17921	1991	19912
EARTH FILL/ROCK				6000	5400	600	6000
LABOR ADDITIVE 174%			44249		39824	4425	44249
PERSONAL EXPENSES				21375	19237	2138	21375
RETAINING WALL				1500	1350	150	1500
SALES TAX				3930	3537	393	3930
SIGNAL			25430	62891	79488	8833	88321
TRANSPORTATION CHARGES				4025	3622	403	4025
WZ TRAFFIC CONTROL				5120	4608	512	5120
TOTAL SIGNAL			70579	132006	182327	20262	182673
LABOR/MATERIAL EXPENSE			87027	132006			
RECOLLECTIBLE/UPRR EXPENSE					197125	21908	
ESTIMATED PROJECT COST							219033
EXISTING REUSEABLE MATERIAL CREDIT					0		
SALVAGE NONUSEABLE MATERIAL CREDIT					0		
RECOLLECTIBLE LESS CREDITS							

THE ABOVE FIGURES ARE ESTIMATES ONLY AND SUBJECT TO FLUCTUATION. IN THE EVENT OF AN INCREASE OR DECREASE IN THE COST OR QUANTITY OF MATERIAL OR LABOR REQUIRED, UPRR WILL BILL FOR ACTUAL CONSTRUCTION COSTS AT THE CURRENT EFFECTIVE RATE.

FORM 30-1 PAGE 04 MORE

WORK ORDER AUTHORIZATION-DETAIL OF ESTIMATED EXPENDITURES

PROJ NO: 55264
A.W.O. NO: 56970
W.O. NO:
B.I. NO: 06EN10
STATE: IL
VAL SEC: 1101E

RAILROAD: UPRR CO.
LOCATION: GRAND TOWER,IL,TR-395,CHESTER SUB.
DEPARTMENT: ENGINEERING SERVICES

---------- STOCK MATERIAL PLAN ----------

ITEM NUMBER	ITEM DESCRIPTION	UNIT COST	QTY	UM	DIRECT MATL $
02040540	BATTERY,GNB, 75A13 OR 50A19	224.91	6	EA	1349
02040660	BATTERY,GNB, 75A23 OR 50A27	298.71	7	EA	2091
09010800	CABLE SPLICING KIT. N-2	27.98	1	EA	28
09011240	CABLE TIE, NYLON 1 1/8" MAX. DIA	0.02	200	EA	4
09011980	CABLE TIE, NYLON 3 1/2" MAX. DIA	0.12	20	EA	2
09014950	CIRCUIT BRKR,120/240V 20A 2 POLE	14.55	2	EA	29
09054360	RELAY, GEN.PURPOSE 120V. TAB 856	5.08	1	EA	5
09057650	SOCKET,P-B 27E122 TAB 836A & 856	1.83	1	EA	2
09065700	TAPE, ELECTRICAL PLASTIC	2.68	2	RL	5
09066900	TERMINAL,SPADE,10-12 WIRE,#8 STUD	0.14	10	EA	1
09137100	TERM.LUG 3/16 CABLE-1/4 POST 2412	0.49	30	EA	15
09215100	33466 TERMINAL, RING TONGUE AMP	0.19	44	EA	8
09260350	TERMINAL,#16-14 #8 SPADE	0.06	35	EA	2
09261420	321524-1 TERMINAL,TEST 16-22 A	1.61	4	EA	6
09261570	321527-1 TERMINAL, TEST	1.58	15	EA	24
09401140	ADAPTER, 4 INCH CARLON PLASTIC	3.28	2	EA	7
09409820	BUSHING, 4" PLASTIC,INSULATING	0.80	2	EA	2
09424920	CONDUIT, 4", PVC, TYPE 40	2.30	50	LF	115
09467930	LOCKNUT, 4 INCH, GALVANIZED	5.17	2	EA	10
09844170	GROUND ROD, 5/8 INCH X 8 FEET	6.41	10	EA	64
09846750	GRND.ROD CONN. 4WAY ONESHOT.	4.82	10	EA	48
09908640	WIRE,#6 AWG.1 COND.COPPER,SOLID	0.43	250	LF	108
09912200	WIRE #6 AWG 2 CND 500'ROLL SHIELD	1.65	500	LF	825
09912350	WIRE #6 AWG 2 COND 1000 LF.SHIELD	1.57	2000	LF	3140
09913200	WIRE,#6, 5 COND 500'ROLL SHIELDED	2.97	500	LF	1485
09915610	WIRE #6 AWG 1 COND COPPER, STRAN	0.49	145	LF	71
09930550	WIRE #10 AWG 1 COND COPPER, STRAN	0.20	780	LF	156
09932310	WIRE #10 AWG 1 COND COPPER, TWIST	0.41	120	LF	49
09946100	WIRE #14, 7 CND 500' ROLL SHIELDE	1.30	500	LF	650
09960890	WIRE #16 AWG 1 COND COPPER, STRAN	0.30	650	LF	195
09976180	WIRE,#22,TW.PR. BELDEN #8761	0.07	20	LF	1
13547870	SHEET METAL SCREW, #10 X 1 INCH	1.38	1	BX	1
13552450	SHEET METAL SCREW,#12 X 3/4"	1.92	2	BX	4
13553150	SHEET METAL SCREW #12 X 1"	3.00	2	BX	6
17061400	PADLOCK,SIGNAL,WITHOUT KEY,AMERIC	14.48	7	EA	101
28033210	CARTON, 39 1/8"L X 23 1/4"W X 17	4.07	1	EA	4
28033230	CARTON, 47 3/8"L X 39 1/2"W X 18"	10.38	1	EA	10
28041880	PALLET, 48 X 40 INCH 2/WAY	8.32	2	EA	17
35040010	PLASTER OF PARIS, DENTAL GRADE	0.89	25	LB	22
39340220	SIGN, HIGHWAY CROSSING	50.00	2	EA	100

FORM 30-1 PAGE 05 MORE

WORK ORDER AUTHORIZATION-DETAIL OF ESTIMATED EXPENDITURES

PROJ NO: 55264
A.W.O. NO: 56970
W.O. NO:
B.I. NO: 06EN10
STATE: IL
VAL SEC: 1101E

RAILROAD: UPRR CO.
LOCATION: GRAND TOWER,IL,TR-395,CHESTER SUB.
DEPARTMENT: ENGINEERING SERVICES

52001370	SURGE PROTECTOR SP20-2A TAB 585	66.80	2 EA	134
52003630	EXTENSION CORD - 12'	67.36	1 EA	67
52005700	BOND WIRE,7 STRANDS 100 LF. ROLL	0.78	400 LF	312
52016830	WIRE DUCT, 2X3	8.44	9 EA	76
52016940	WIRE DUCT, 3X3	9.82	6 EA	59
52017510	WIRE DUCT COVER 2"X6'	1.84	9 EA	17
52017620	WIRE DUCT COVER 3"X6'	2.63	6 EA	16
52019530	ENCLOSURE,SHUNT,POLE MOUNTED.24X2	162.24	3 EA	487
52019560	EQUALIZER, N.D. TAB 583	8.89	17 EA	151
52021550	FOUNDATION,4',STEEL,FOR FLSHR/GAT	195.48	2 EA	391
52025240	HOUSE, 6X6, SIGNAL XING	4900.06	1 EA	4900
52027350	CLIP BOARD - FOR SIGNAL PRINTS	8.02	1 EA	8
52027430	STEP BOX	16.22	1 EA	16
52028420	LIGHTNING ARRESTOR,CLR-COMM TAB 3	6.75	33 EA	223
52029780	LIGHTNING ARR,HD TAB 582 W/O BASE	9.50	8 EA	76
52030010	LIGHTNING ARRESTOR CONN.STRIP	3.96	4 EA	16
52039210	RECTIFIER,20EC,12V.TAB575	273.85	1 EA	274
52039390	RECTIFIER, 40EC, 12V. TAB577	373.08	1 EA	373
52042650	POST, MOUNTING, FOR SHUNT HOUSING	11.72	6 EA	70
52068650	TERMINAL, #6 - 5 WIRE - RING TYPE	0.16	55 EA	9
52070010	TERMINAL,#12-10 WIRE,RING TONGUE	0.08	300 EA	24
52071600	TERMINAL,#20-16 WIRE,RING TONGUE	0.07	160 EA	11
52072280	TERMINAL BLOCK, SIGNAL 2 POST BAK	2.25	60 EA	135
52072740	TERMINAL BLOCK, SIGNAL 12 POST 6	8.95	1 EA	9
52072960	TERMINAL BLOCK, SIGNAL 12 POST	6.93	4 EA	28
52074550	TEST LINK, INSULATED ASSEMBLY TAB	0.66	15 EA	10
52074660	SWITCH, MCKERN TAB 82	13.90	1 EA	14
52079550	WIRE TAG, PLASTIC - WHITE	0.12	100 EA	12
52079560	MARKING PEN(FOR WHITE TAG)	1.95	1 EA	2
52108120	LED PL/GATE ASSY.2 WAY LIGHTS	7382.42	1 EA	7382
52108200	LED-PL/GATE ASSY.2WMM1W45FL	8422.67	1 EA	8423
52109370	GATE ARM, ADJ.16-32'	481.57	2 EA	963
52122140	HIGH WIND BRACKET 5"OR 4"	63.99	2 EA	128
52136470	SHEAR PIN, SX-1000-1	5.50	2 EA	11
52207100	GRD XING PREDICTR GCP 4000 2TK.MA	15768.00	1 EA	15768
52258590	NBS, TAB 641, 62775-1543	376.02	3 EA	1128
52263600	SURGE ARRESTOR,METER LOOP.	28.46	1 EA	28
52263690	SURGE PANEL - TAB 619	129.37	2 EA	259
52264040	SURGE PANEL - TAB 618	194.08	1 EA	194
52267200	TRANSCEIVER MODULE. FOR GCP 4000	2975.98	2 EA	5952
52276150	SS XING CONTROLLER MODULE FOR GCP	1681.90	2 EA	3364
53648010	INSULATING CAP & SHIELD ASSY.	1.98	4 EA	8
53903460	EPD 120/240TDFL SURGE PROTECTOR	267.95	1 EA	268
53954500	180429-000 BOOTLEG KIT	47.47	7 EA	332
	TOTAL			62,890

E # 8897

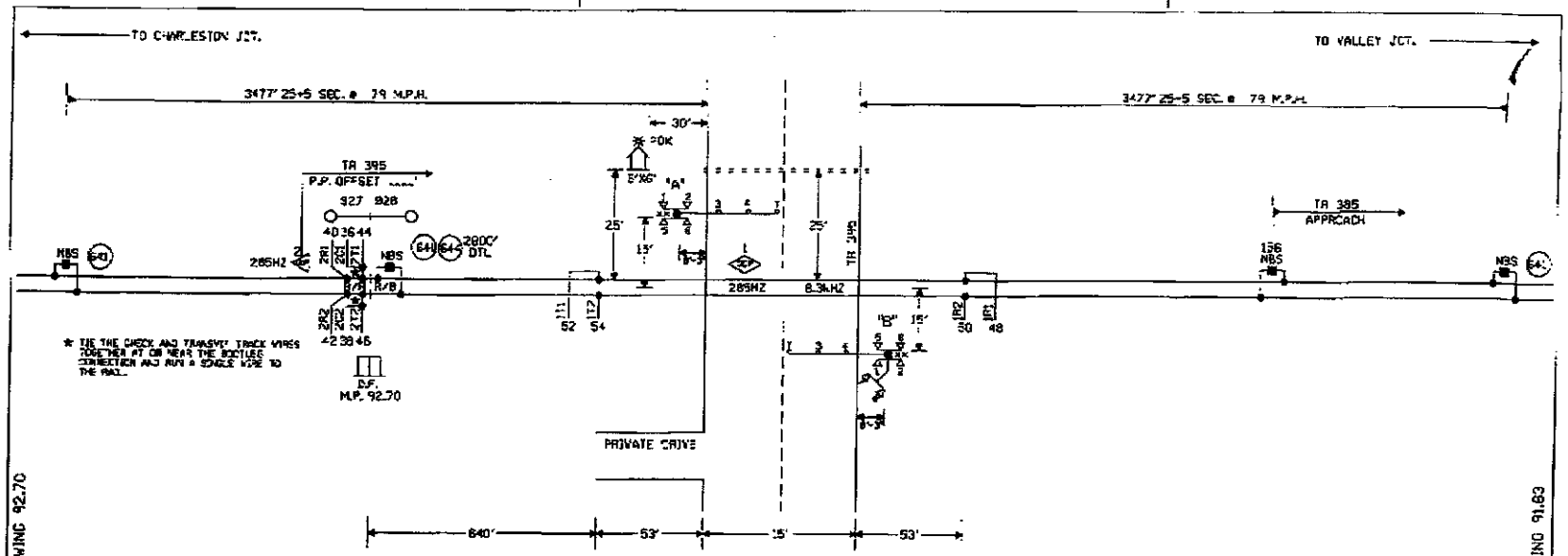
J.T. BLANKINSHIP & ASSOCIATES
Consulting Engineers and Land Surveyors
401 SOUTH 17TH STREET • P.O. BOX 40 - MURPHYSBORO, ILLINOIS 62966
1946 - CELEBRATING 60 YEARS OF SERVICE - 2006

WATER AND SEWERAGE IMPROVEMENTS
STREET AND HIGHWAY IMPROVEMENTS
AIRPORTS - EVALUATION SURVEYS - SUBDIVISIONS
TELEPHONE 618-687-1771
FAX 618-687-1773

GRAND TOWER TOWNSHIP
ESTIMATE OF COST - KINGS FERRY ROAD (TR 395)
SECTION 06-07109-00-RR

QUANTITY	UNIT	ITEM	UNIT PRICE	TOTAL COST
500	TON	AGGREGATE SURFACE COURSE, TYPE B	20.00	10,000.00
60	TON	BALLAST STONE	20.00	1,200.00
58	FOOT	18" CMP	40.00	2,320.00
2	EACH	18" END SECTION	250.00	500.00
48	FOOT	24" CMP	50.00	2,400.00
2	EACH	24" END SECTION	300.00	600.00
500	CU YD	EARTH EXCAVATION	10.00	5,000.00
1,800	CU YD	FURNISHED EXCAVATION	20.00	36,000.00
0.65	ACRE	SEEDING, CLASS 1 (SPECIAL)	3,000.00	1,950.00
1	L SUM	TRAFFIC CONTROL AND PROTECTION	1,500.00	1,500.00
36	UNIT DIA	TREE REMOVAL	28.00	1,008.00
70	CU YD	TRENCH BACKFILL	30.00	2,100.00
1	L SUM	RAILROAD PROTECTIVE LIABILITY INSURANCE	1,500.00	1,500.00
		DESIGN ENGINEERING		12,350.00
		RESIDENT ENGINEERING		4,940.00
		R.O.W. & EASEMENTS		11,000.00
		TOTAL ESTIMATED COST OF WORK INCLUDING ALL LABOR, MATERIALS AND PROFITS.		$94,368.00

Exhibit C2, Page 1



* TIE THE CHECK AND TRANSVY TRACK WIRES TOGETHER AT OR NEAR THE BOOTLEG CONNECTION AND RUN A SINGLE WIRE TO THE RAIL.

NOTES:

⊗ = TWISTED WIRES
INSULATED ; TWIST PER FT.
ALL TRACK WIRES 20 #S

TRANSMITTER AND RECEIVER LEADS TO BE SEPARATED BY A" LEAST 12" IN TRENCH. LENGTHS SHOULD NOT EXCEED MANUFACTURES RECOMMENDATION.

TOP OF FOUNDATION TO BE AT SAME ELEVATION AS THE SURFACE OF THE TRAVELED WAY & NO MORE THAN 4" ABOVE THE SURFACE OF THE GROUND.

ALL BUNGALOW WIRING TO BE #18 AWG FLEX UNLESS OTHERWISE SPECIFIED EXCEPT ALL GROUND WIRE TO BE #6 AWG FLEX OR LARGER.

ALL WIRING IN GATE MECHANISM TO BE #10 AWG FLEX.

REFER TO UP STANDARD DWG FOR BUNGALOW GROUNDING.

ALL LIGHTS TO BE 12" ROUNDELS.

= = = = = = 4"X 30' CONDUIT

LIGHTS: LED LIGHTS

GATE A: 15'
GATE B: 15'

»» = BELL

CONSTRUCTION NOTES:

1. INSTALL ALUMINUM CHANNEL LOCK RETAINING WALL FOR HOUSE AND GATES.

S ←—○—→ N

GRAND TOWER, ILLINOIS
TR 385
M.P. 92.59
CHESTER SUBDIVISION
D.O.T.#445 807P

NEW SHEET

03-30-06 INSTALL GATES AND FLASHERS WITH CKT M.P. 92.59 W.O. 58970 ALT RDG/DSD	MODIFICATION LEVEL		UNION PACIFIC	DRN: DSD	UNION PACIFIC RAILROAD	DATE 03-30-06
	D.A. LAST LEVEL CHECKER	IN	SAFETY SIGNAL DESIGN	DES: DSD	VALLEY JCT., ILLINOIS TO CHARLESTON JCT., MISSOURI	SHEET 1
	LAST LEVEL MOD THIS TYPICAL	IN		CHK: RLT	C.T.C. CIRCUITS	BMP 92.59
	LAST LEVEL BY DESIGNER	IN		APP: 58970		S-1275
	CHANGED FROM TYPICAL	Y				