

Blythe Energy Center Transmission Line Project
Request for Staff Approved Modification
(99-AFC-08T)
Response to Data Request - Revised 2/8/11

DOCKET	
99-AFC-8C	
DATE	Feb 08 2011
RECD.	Feb 11 2011

TECHNICAL AREA: Transmission System Engineering
AUTHOR: Ajoy Guha

RESPONSE

Blythe Energy is requesting approval to return to a previously approved configuration and does not believe that it is appropriate to require additional information at this stage. We find it unusual that additional requirements are being requested beyond what was needed for the previous approval of the same scope, but are complying in the interest of expediency. The requirement for written approval from the California ISO will result in a substantial delay, as this could take over a month for a response. We have provided our request for written approval as Attachment 1 to this response. We request that the technical information supplied in response to Data Requests 1-6 be reviewed and approved, that the Staff-approved re-approval of the GIS be approved, and that the CEC require that the receipt of the California ISO letter be a condition of approval to interconnect rather than re-approval of an existing approved action.

Figures supplied in response to this request are as follows:

Figure 1: Isometric view of the overall connection between the turbines of the Blythe Energy Plant and the proposed GIS (one sheet, file 21bjhu3_1).

Figure 2: Dimensioned plan view of GIS building and adjacent interconnection (one sheet, E 1-1).

Figure 3: Dimensioned section view of GIS building and adjacent interconnection (one sheet, E1-2)

Figure 4: Detail drawings for overhead installation, including dimensioned details of foundations, poles, insulators, and conductors (17 sheets, OH Files)

Figure 5: Detail drawings of underground installation, including dimensioned details of interconnection with each turbine and an interconnection for future expansion, duct bank details, and details of the motor operated switch terminal (9 sheets, UG Files)

Figure 6: Detail drawings of GSU tap installation, including dimensioned details per Mr. Guha's e-mail request of 1-31-11. (1 sheet, E1-3).

Attachment 1: Copy of letter from Blythe Energy to the California ISO requesting approval of changed interconnection.

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DATA RESPONSES

DATA REQUEST 1: Provide respective lengths of the overhead and underground portions of the tie lines and a physical layout scaled drawing (legible) showing distinctly the routes of the proposed 230 kV lines from the BEP 230 kV switchyard to the new 230 kV GIS substation and relative spacing between the lines including Right of Way (ROW) widths, if any.

DATA RESPONSE 1: Figure 1 shows an isometric overall view of the overhead and underground portions of the line. Figure 4, sheets GO-1 and P1-1 and Figure 5, sheets P1-1 through P 1-6, are scaled drawings showing the routes of the proposed 230kV lines from each of the BEP turbines, including a future position, to the new 230kV GIS. Note that the interconnection with the substation will entirely bypass the existing Western (WAPA) substation. The interconnection between the turbines and the GIS will all be located entirely within the BEP property. No additional ROW will be needed.

Conductor lengths are as follows:

- From Turbine CT11 to the GIS Building: Conductors are underground for 105 feet and overhead for 285 feet.
- From Turbine CT12 to the GIS Building: Conductors are underground for 100 feet and overhead for 340 feet.
- From Turbine ST10 to the GIS Building: Conductors are underground the entire distance of 640 feet.
- From the GIS building to the Blythe-Julian Hinds Transmission Line Terminal, conductors are underground for 90 feet.

Dimensions indicating distance between proposed T-lines and Switchyard fence and Switchyard property lines have been added to Figure 5, P1-1 through P1-6. Dimensions from the GSUs to the Switchyard fence have also been added to these drawings.

DATA REQUEST 2: Submit Pole design diagrams for intermediate and dead-end structures of the generator overhead 230 kV tie lines showing configuration of insulators and conductors with their respective position measurements on the pole. Provide the sizes, types and ampere rating of the overhead line conductors.

DATA RESPONSE 2: Please see Figure 4, sheet L1-1 and sheets S1-1 through S1-4A for requested design diagrams. The overhead conductor being used for the generator to GIS tap is: 1033.5 kcmil ACSR 'Curlew' with an ampacity rating of 1047 amps.

Structure drawings in Figure 4, S1-1 through S1-4 have been updated to confirm phase-ground clearance and the transition from Overhead to Underground. The total height of the pole above ground and the ground clearance from the lowest phase conductor has also been added to these drawings.

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DATA REQUEST 3: Submit a design diagram showing termination of an underground 230 kV cable line to an overhead 230 kV line with respective measurements on an H-frame (or any other) structure for all three phases.

DATA RESPONSE 3: Please see Figure 3 and Figure 4, Sheets S1-5 and S1-6 for requested design diagrams, showing respective measurements for all three phases.

Figure 4, S1-6 has been updated to more clearly identify Underground cable on the front view and side view.

DATA REQUEST 4: Submit a design diagram of Duct Bank construction (or any other type) for the proposed 230 kV underground cable lines (including grounding and communication cables, if applicable). Provide the type, size and ampere rating of the 230 kV underground cables for all transmission outlets including BEP 230 kV line to Julian Hinds.

DATA RESPONSE 4: Please see Figure 5, sheets U0-1 through U0-3, for requested design diagrams of the duct bank construction for the proposed 230kV underground cable lines. The type, size, and ampere ratings are as follows:

For the interconnections from each turbine to the GIS, 1750kcmil copper conductor, carrying 457 amps, will be used. For the interconnection from the GIS to the Blythe-Julian Hinds 230kV transmission line, 5000kcmil copper conductor carrying 2058 amps will be used.

DATA REQUEST 5: Please mention whether the GIS substation would be an indoor type or outdoor type. Accordingly provide a physical layout scaled drawing (legible) of the substation showing location of 230 kV GIS switchgear, any other major equipment and termination of all four underground cable lines.

DATA RESPONSE 5: Please see Figures 2 and 3, which show the physical layout on a scaled drawing in plan and section. The GIS will be an indoor type.

DATA REQUEST 6: Provide a scaled layout diagram showing how the existing BEP 230 kV transmission line to SCE Julian Hinds substation would be re-routed and connected to the new 230 kV GIS substation. Also provide a Pole design diagram with the overhead line conductor sizes and ampere rating.

DATA RESPONSE 6: Please see Figure 2, showing the scaled arrangement of the GIS, Figure 4, sheet P1-1, and Figure 5, Sheet P1-6.)Overhead conductor being used for the generator to GIS tap is 1033.5 kcmil ACSR 'Curlew' with an ampacity rating of 1047 amps. The Blythe to Julian Hinds line conductor is triple bundled 1033.5kcmil ACSR 'Curlew' with an ampacity rating of 2008 amps.

Figure 5, P1-6 has been updated to identify the reconfiguration of the existing Julian Hinds line showing the relocation of the existing T-line deadend structure and the tap to the new GIS deadend structure.

DATA REQUEST 7: Provide a letter from the California ISO with their approval of the current scheme for modified interconnection of BEP to the new 230 kV GIS substation.

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DATA RESPONSE 7: Attached please find the request letter for written approval from the California ISO. We request that the letter for approval be required prior to energizing, not prior to initial CEC approval of this previously-approved modification.

DATA REQUEST 8: Provide detail of the GSU to A-frame taps to show the insulators with spacings on the cross arm and wire connections to the GSU transformers underneath and to the GSU tap structure/pole including ground clearances from the lowest conductor. Provide a side view and plan view of the same showing configuration of the phase wires and insulators with their spacings on the A-frame structure.

DATA RESPONSE 8: Attached please see Figure 6, drawing E1-3 which details the GSU tap configuration for STG-1, CTG-1 and CTG-2. Requested detail and dimensional information has been shown on this drawing.

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Figure 1

Isometric view of the overall connection between the turbines of the Blythe Energy Plant and the proposed GIS
(one sheet)

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Figure 2

Dimensioned plan view of GIS building and adjacent
interconnection (one sheet)



BLYTHE ENERGY CENTER	JOB NUMBER 117573	REV A
230KV GIS SUBSTATION		
PLAN	DRAWING NUMBER E1-1	

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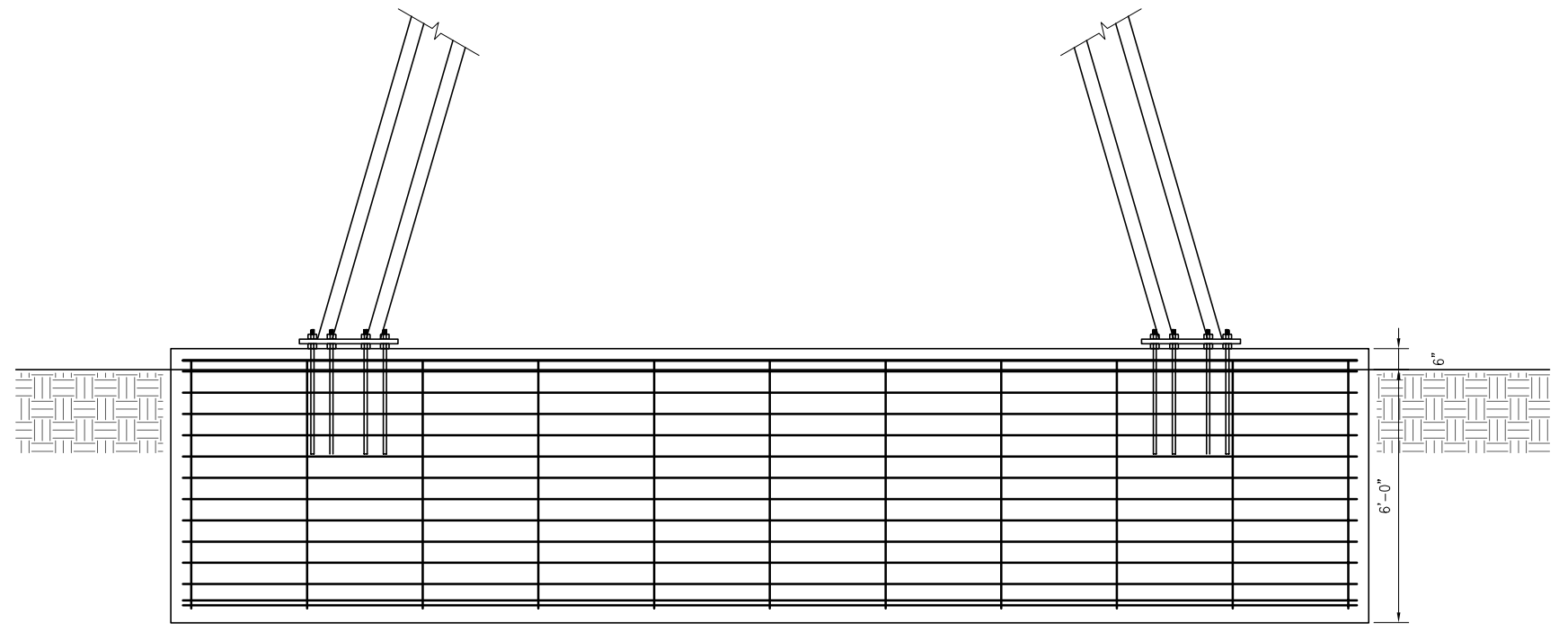
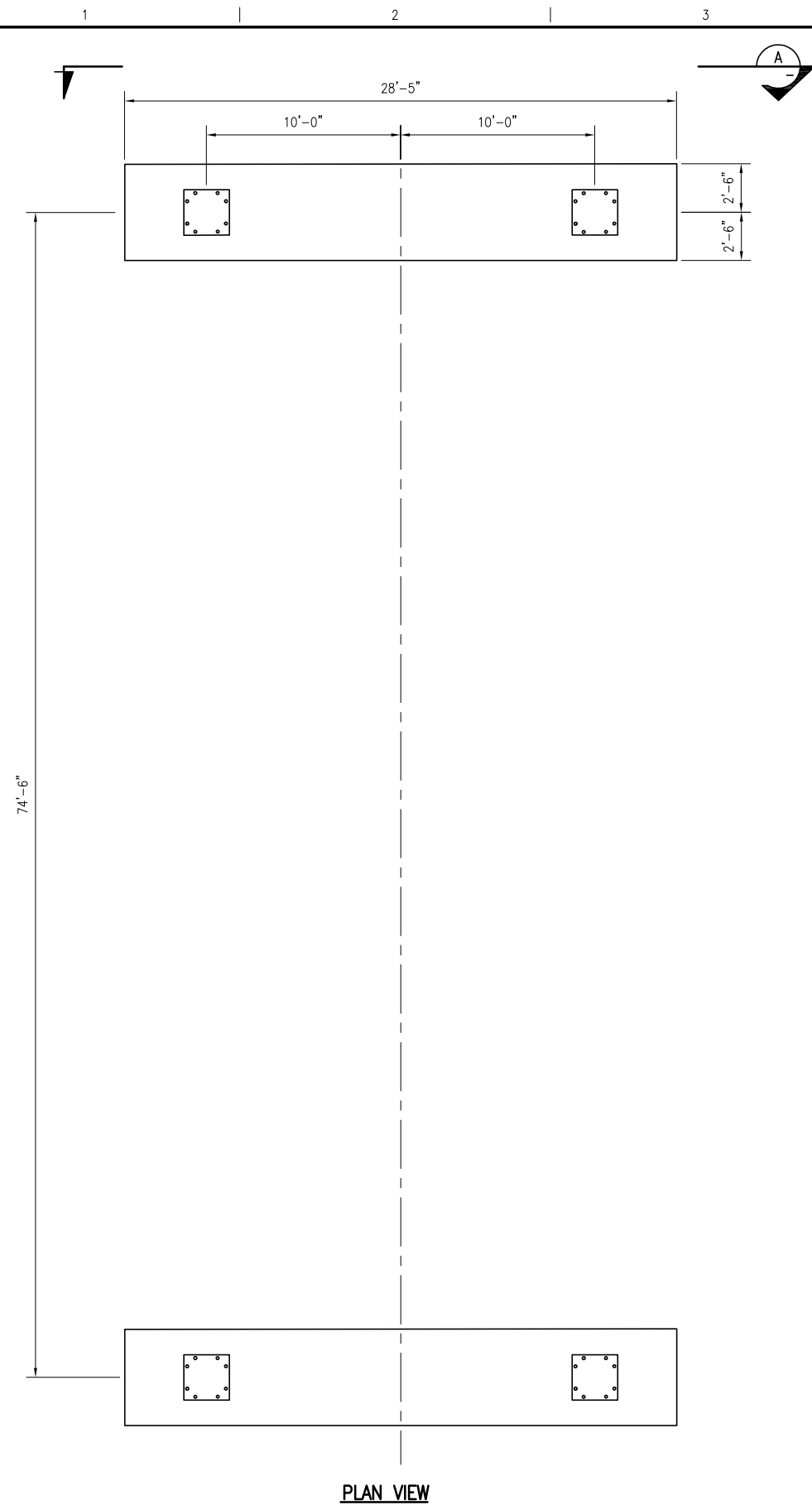
Figure 3

Dimensioned section view of GIS building and adjacent
interconnection (one sheet)

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Figure 4

Detail drawings for overhead installation, including dimensioned details of foundations, poles, insulators, and conductors (17 sheets)

SECTION A
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"NOTE-ALL FOUNDATIONS ON HOLD PENDING FINAL STRUCTURE FABRICATION DRAWINGS"

[illegible]

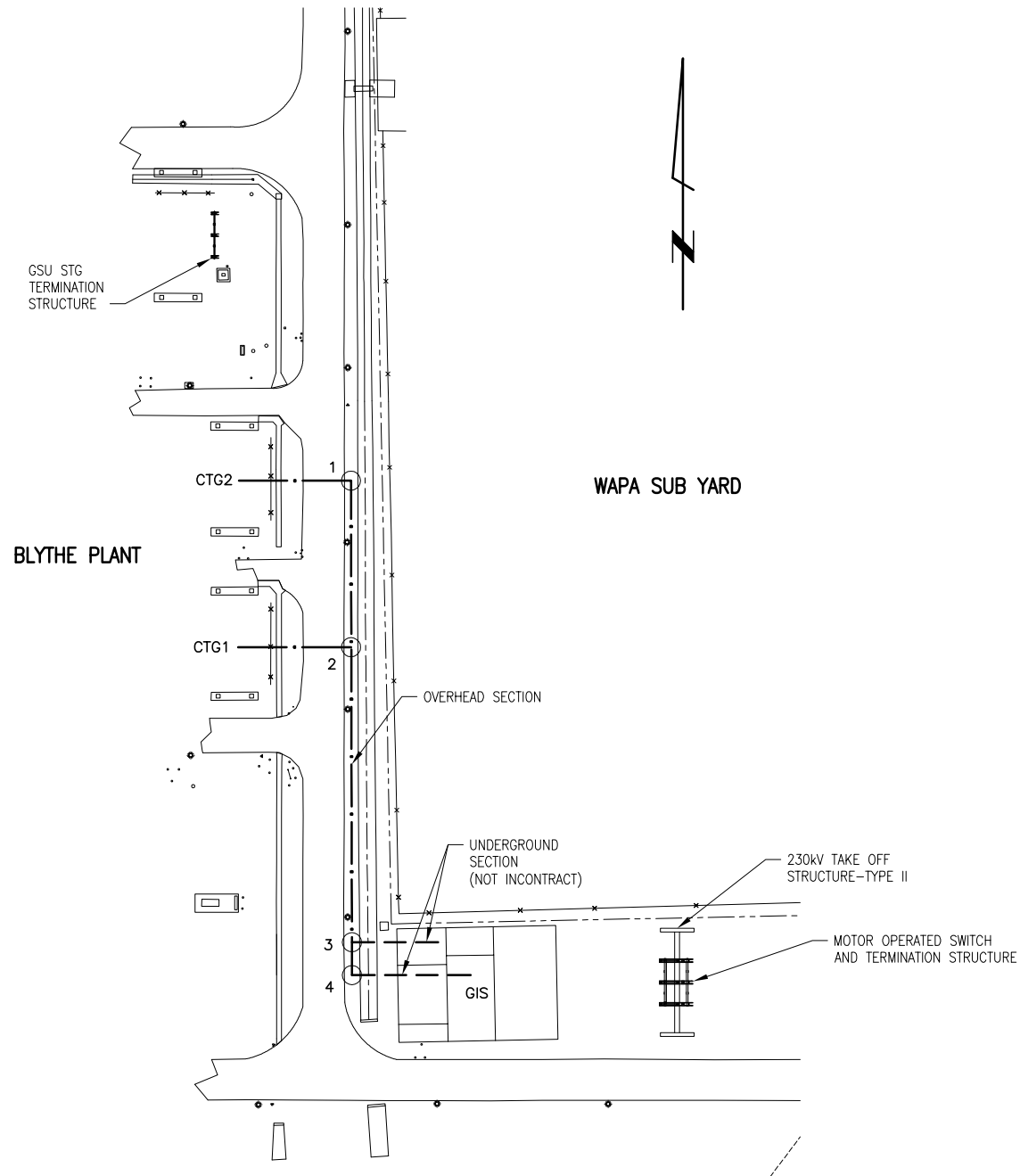
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"NOTE-ALL FOUNDATIONS ON HOLD PENDING FINAL STRUCTURE FABRICATION DRAWINGS"

[illegible]

1	2	3	4	5	6	7	8
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DRAWING INDEX


















GENERAL DRAWINGS			
DWG. NUMBER	DATE	REV	DESCRIPTION
G0-1	02/12/09	B	TITLE SHEET, VICINITY MAP, DRAWING INDEX AND LEGEND
L1-1	02/12/09	B	PHASING DIAGRAMS
PLAN AND PROFILES			
P1-1	02/12/09	B	PLAN AND PROFILE
STRUCTURE AND ASSEMBLY			
S1-1	02/12/09	B	CTG2 TAP STRUCTURE
S1-2	02/12/09	B	CTG1 TAP STRUCTURE
S1-3	02/12/09	B	RISER POLE 1
S1-3A	02/12/09	B	RISER POLE 1 DETAILS
S1-4	02/12/09	B	RISER POLE 2
S1-4A	02/12/09	B	RISER POLE 2 DETAILS
S1-5	02/12/09	A	GSU STG TERMINATION STRUCTURE
S1-6	02/12/09	A	MOTOR OPERATED SWITCH TERMINATION STRUCTURE
S1-7	02/12/09	A	TERMINATION STRUCTURE DETAILS
S1-8	02/12/09	A	230kV TAKE-OFF STRUCTURE-TYPE II
S2-1	02/12/09	B	GROUNDING DETAILS
FOUNDATION			
F0-1	02/12/09	B	FOUNDATION DETAILS
F0-2	02/12/09	A	FOUNDATION DETAILS FOR 230kV TAKE-OFF STRUCTURE-TYPE II
F1-1	02/12/09	B	FOUNDATION TABLES

LEGEND & ABBREVIATIONS

<u>ABBREVIATIONS</u>			
DE	DEADEND	E##	EMBEDMENT DEPTH
S	STEEL	EMB (#'-#")	DIAMETER OF EMBEDMENT
OPGW	OPTICAL GROUND WIRE	(#-#)	DIAMETER OF EMBEDMENT
SW	SHIELD WIRE	RA	RUNNING ANGLE
HS	HIGH STRENGTH	SRA	SMALL RUNNING ANGLE
SWD	SHIELD WIRE DEADEND	MRA	MEDIUM RUNNING ANGLE
GND	GROUND	LRA	LARGE RUNNING ANGLE
DP (#'-#\" X #\"#)	DRILLED PIER (DIAMETER X DEPTH)	XLRA	EXTRA LARGE RUNNING ANGLE
V	VERTICAL CONFIGURATION	G	GUYED
LS	LONG SPAN	GE	GUYED EMBEDDED
XLS	EXTRA LONG SPAN	SUSP	SUSPENSION
ACSR	ALUMINUM CONDUCTOR STEEL REINFORCED	SNGL	SINGLE
D	DELTA CONFIGURATION	ANCH	ANCHOR
TAN	TANGENT	LT	LEFT
C	CONCRETE	RT	RIGHT
E	EMBEDMENT	H	H-FRAME

LEGEND

	BTL STRUCTURE		D-PV2 STRUCTURE (FUTURE)		EXISTING ROADS
	BTL GEOTECHNICAL BORING		BUCK-JULIAN HINDS TRANSMISSION LINE		APN LINES
	D-PV1 STRUCTURE (EXISTING)		SCE D-PV1 TRANSMISSION LINE		SCE D-PV2 TRANSMISSION LINE
	EAGLE MOUNTAIN STRUCTURE		SCE EAGLE MOUNTAIN TRANSMISSION LINE		PROPOSED BTL STUB ROAD LOCATED WITH GPS SYSTEM
	IID-WAPA STRUCTURE		IID-WAPA TRANSMISSION LINE		PROPOSED BTL STUB ROAD LAID-OUT WITH AutoCAD SOFTWARE

THIS DRAWING WAS PREPARED BY POWER ENGINEERS, INC. FOR A SPECIFIC PROJECT, TAKING INTO CONSIDERATION THE SPECIFIC AND UNIQUE REQUIREMENTS OF THE PROJECT. REUSE OF THIS DRAWING OR ANY INFORMATION CONTAINED IN THIS DRAWING FOR ANY PURPOSE IS PROHIBITED UNLESS WRITTEN PERMISSION FROM BOTH POWER AND POWER'S CLIENT IS GRANTED.

B	ISSUED FOR APPROVAL	02/12/09	JLQ	DWN	EAR				
A	ISSUED FOR REVIEW	01/12/09	RH	DWN	AT	EAR	*	*	
REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD			REFERENCE DRAWINGS

DSGN	DWN	12/22/08
DRN	RH	12/22/08
CKD	AT	12/22/08
SCALE: VERT:		
HORIZ:		
FOR 22x34 DWG ONLY		



<div style="text-align: center;"> BLYTHE ENERGY </div> <div style="text-align: center;"> BLYTHE PLANT GSU-GIS OH 230KV TRANSMISSION LINE </div> <div style="text-align: center;"> TITLE SHEET, VICINITY MAP, DRAWING INDEX, LEGEND </div>	<div style="text-align: center;"> JOB NUMBER 115210 </div>	<div style="text-align: center;"> REV <div style="border: 1px solid black; padding: 5px; width: 30px; margin: 0 auto;"> B </div> </div>
	<div style="text-align: center;"> DRAWING NUMBER G0-1 </div>	

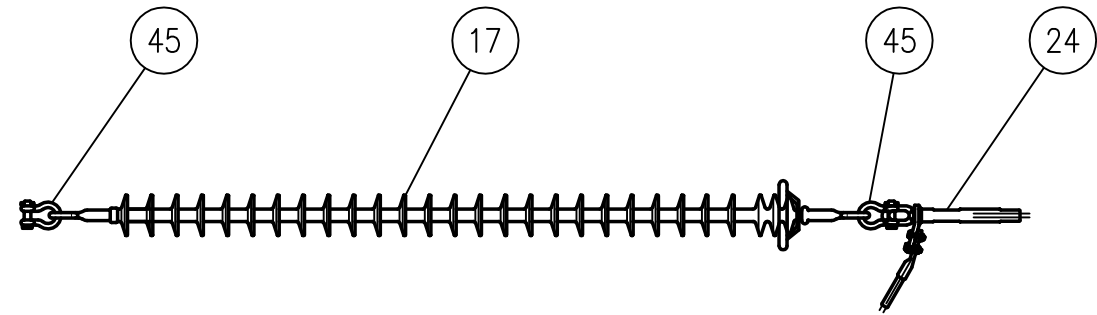
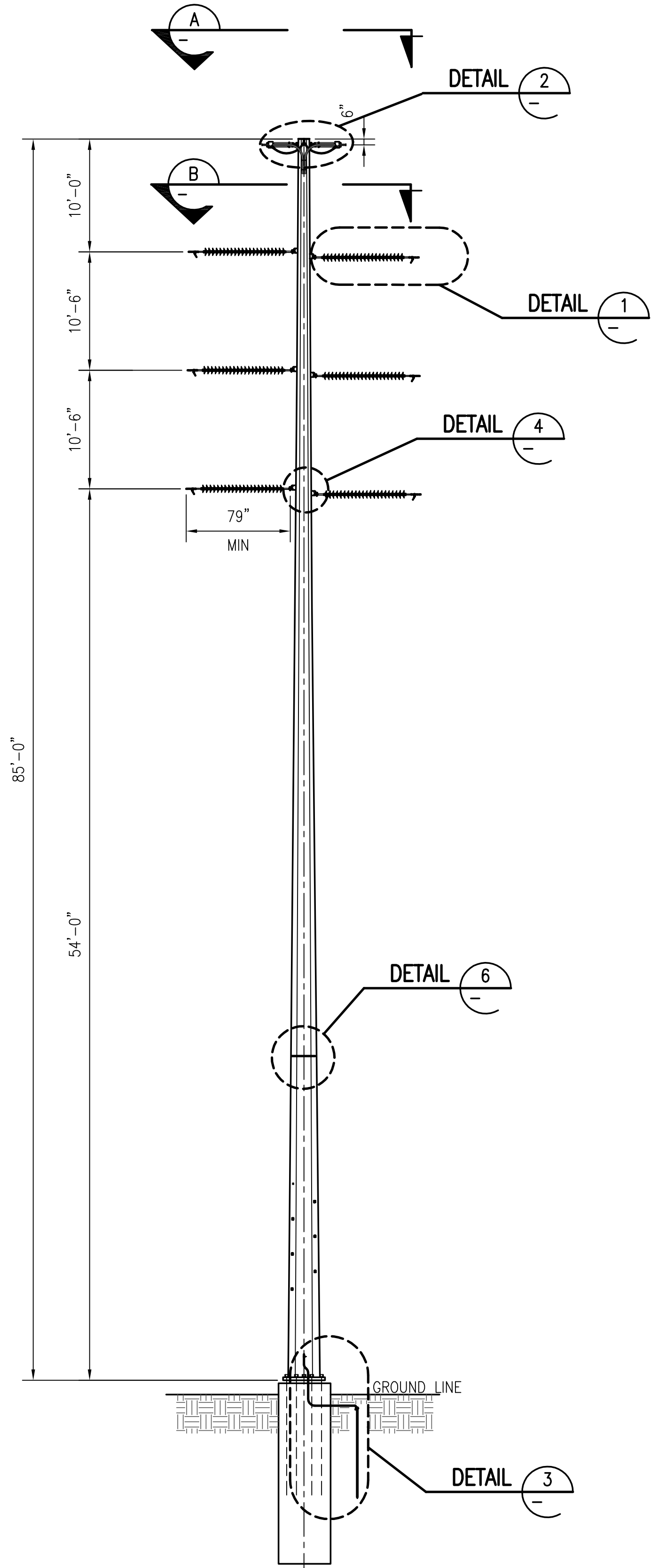
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19bpsl_1.dwg

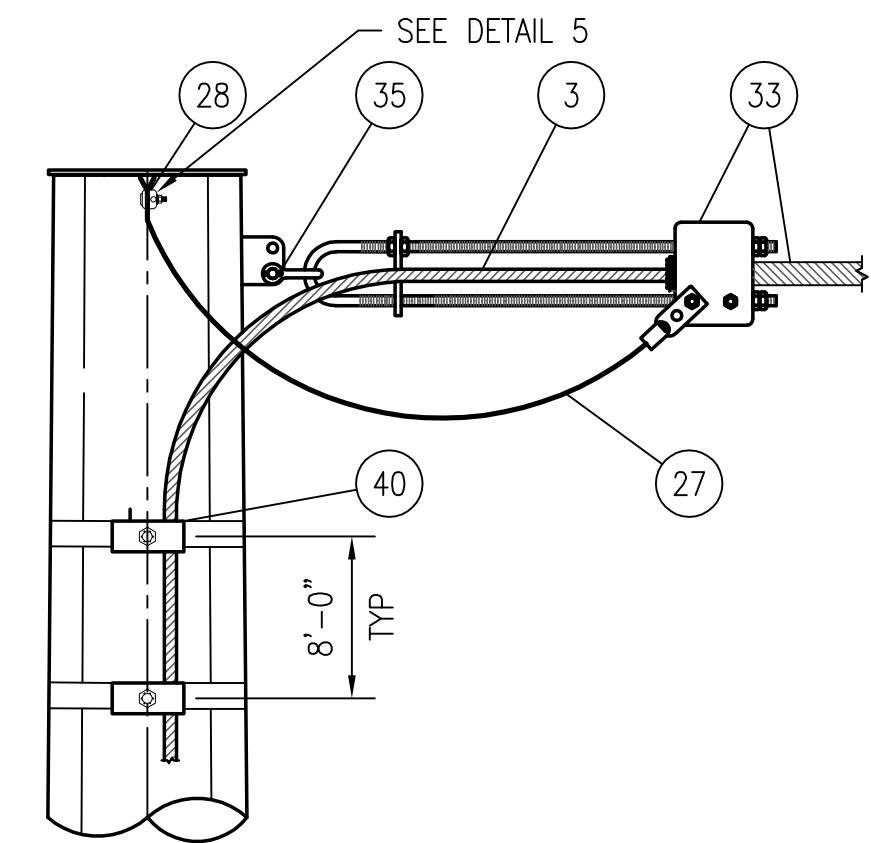
THIS DRAWING WAS PREPARED BY POWER ENGINEERS, INC. FOR A SPECIFIC PROJECT, TAKING INTO CONSIDERATION THE SPECIFIC AND UNIQUE REQUIREMENTS OF THE PROJECT. REUSE OF THIS DRAWING OR ANY INFORMATION CONTAINED IN THIS DRAWING FOR ANY PURPOSE IS PROHIBITED UNLESS WRITTEN PERMISSION FROM BOTH POWER AND POWER'S CLIENT IS GRANTED.

PROFILE
STEEL POLE



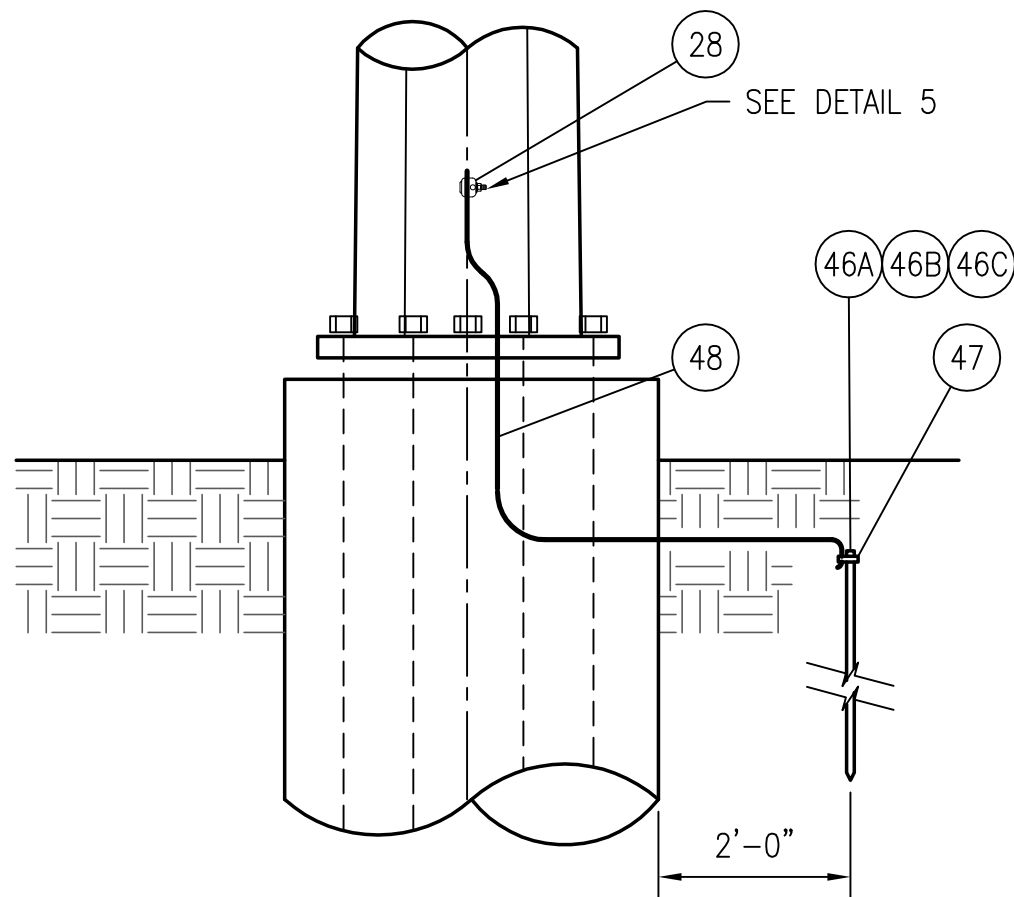
DEADEND ASSEMBLY

DETAIL 1



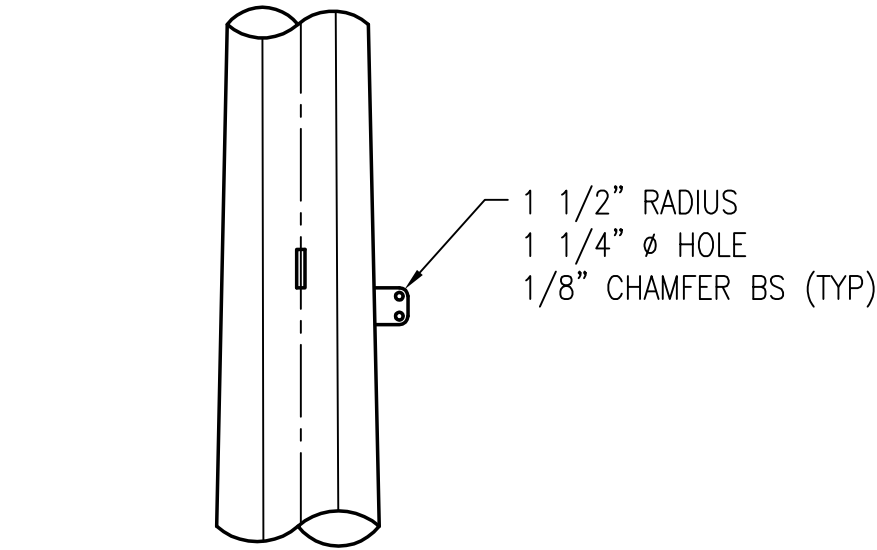
OPGW DEADEND ASSEMBLY

DETAIL 2



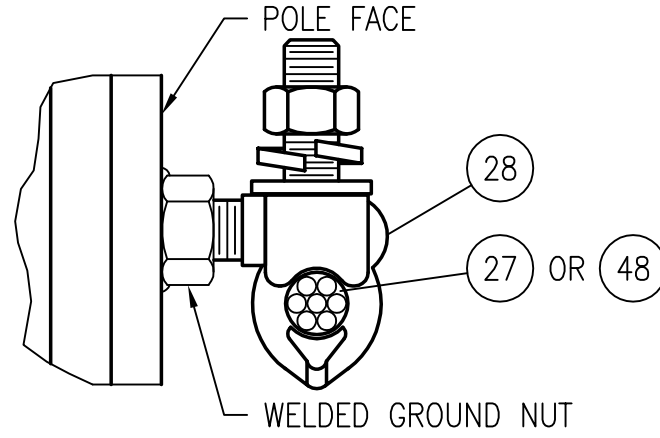
POLE GROUNDING

DETAIL 3



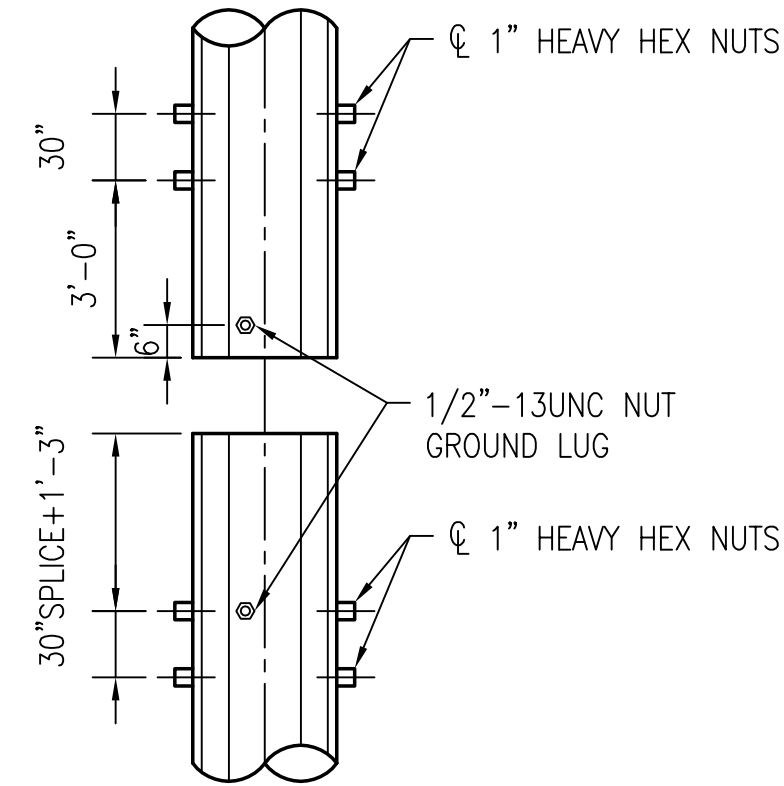
INSULATOR ATTACHMENT

DETAIL 4



TANK GROUND

DETAIL 5



JACKING NUT (TYPICAL ALL JOINTS)

DETAIL 6

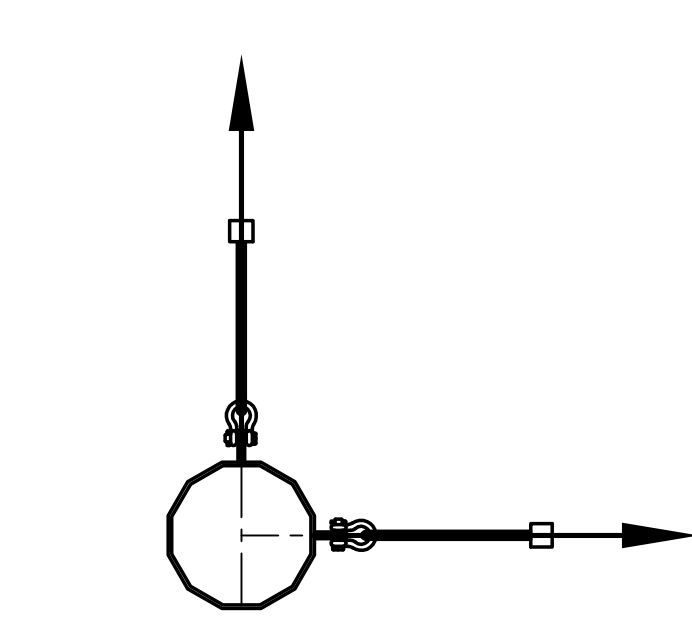
BILL OF MATERIAL

	ITEM NO	QTY	DESCRIPTION	MANUFACTURER	CATALOG NO
DEADEND DETAIL 1	17	1	INSULATOR, STRAIN, POLYMER, 230KV, EYE EYE, 8" CORONA RING, 36 KIP	MACLEAN	S699101VA02
	45	2	ANCHOR SHACKLE, 35 KIP	MACLEAN	ASH-56-BC
	24	1	DEADEND, COMPRESSION, ALUMINUM, W/ 15' TERMINAL CONNECTOR	ACA	VES-145
OPGW DEADEND DETAIL 2	3	-	OPGW, 24 FIBER COUNT	SFPOC	SFSJ-J-4517
	27	1	GROUNDING LEAD, #4 CU, 48" LONG, GROUND LUG ON ONE END	PLP	710010015
	28	1	TANK GROUND, BRONZE, 1/2"-13 UNC STUD, #10 SOL. - #1 SOL.	MACLEAN	TG-820
	33	1	CLAMP, DEADEND, OPGW, U-BOLT WEDGE TYPE, W/ RETAINING RODS	PLP	2801309
	35	1	ANCHOR SHACKLE, 25 KIP	PLP	AS-5L
POLE GROUNDING DETAIL 3	40	A/R	DOWNLEAD CLAMP, W/ BANDING ADAPTER	PLP	8003267B1
	28	1	TANK GROUND, BRONZE, 1/2"-13 UNC STUD, #10 SOL. - #1 SOL.	MACLEAN	TG-820
	46A	1	GROUND ROD, 3/4" X 10', COPPERBONDED, SECTIONAL	ERICO	633400
	46B	1	COUPLING, GROUND ROD, THREADED BRONZE, 3/4"	ERICO	CR34
	46C	1	DRIVING STUD, GROUNDING ROD, 3/4"	ERICO	DS34
	47	1	CLAMP, GROUND ROD, BRONZE, FOR 3/4" ROD	JOSLYN	J8493
	48	5 FT	GROUND WIRE, COPPERWELD, NO. 4 AWG, 7 STRAND	ACA	-

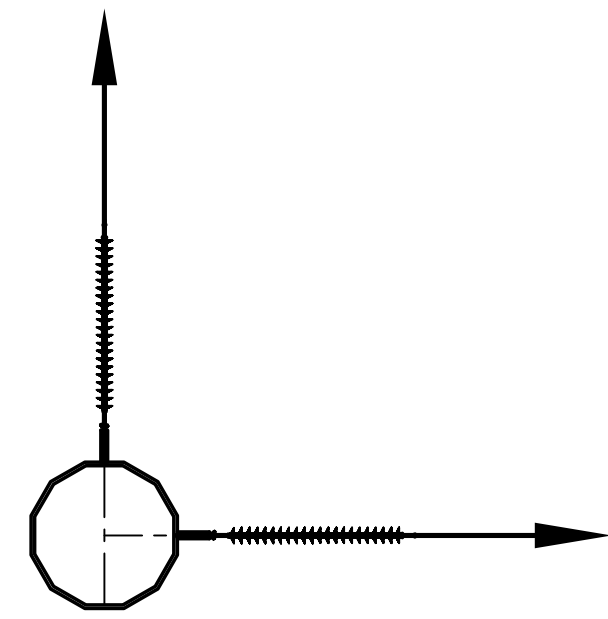
A/R = AS REQUIRED

STRUCTURE TABLE

STR TYPE	STR NO	STR HEIGHT (FT)	LINE ANGLE (DEG)	A.G. HEIGHT (FT)	QUANTITY
CTG2 TAP STR	1	85	90.15	85.0	1



SECTION A



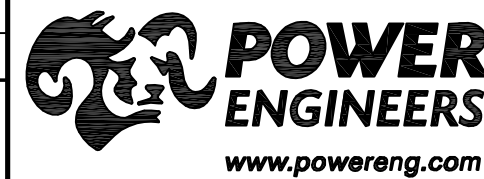
SECTION B

NOTES

- SEE MATERIAL LIST FOR MATERIALS CALLED OUT IN BUBBLES. MATERIALS ARE SUBJECT TO SUBSTITUTION. SUBSTITUTIONS SHALL BE MADE WITH ENGINEER'S APPROVAL.
- SEE FABRICATOR'S ASSEMBLY DRAWINGS FOR SPLIT JOINT CONNECTION REQUIREMENTS, HANDLING RECOMMENDATIONS AND POLE INSTALLATION INSTRUCTIONS.
- JUMPER POST INSULATOR MOUNTING HARDWARE SHALL BE PROVIDED BY POLE MANUFACTURER.

DSGN	DWN	12/31/08
DRN	RH	12/31/08
CKD	AC	12/31/08

SCALE: NTS
FOR 22x34 DWG ONLY



BLYTHE ENERGY, LLC

BLYTHE ENERGY CENTER GSU-GIS OH
230KV TRANSMISSION LINE

CTG2 TAP STRUCTURE

JOB NUMBER

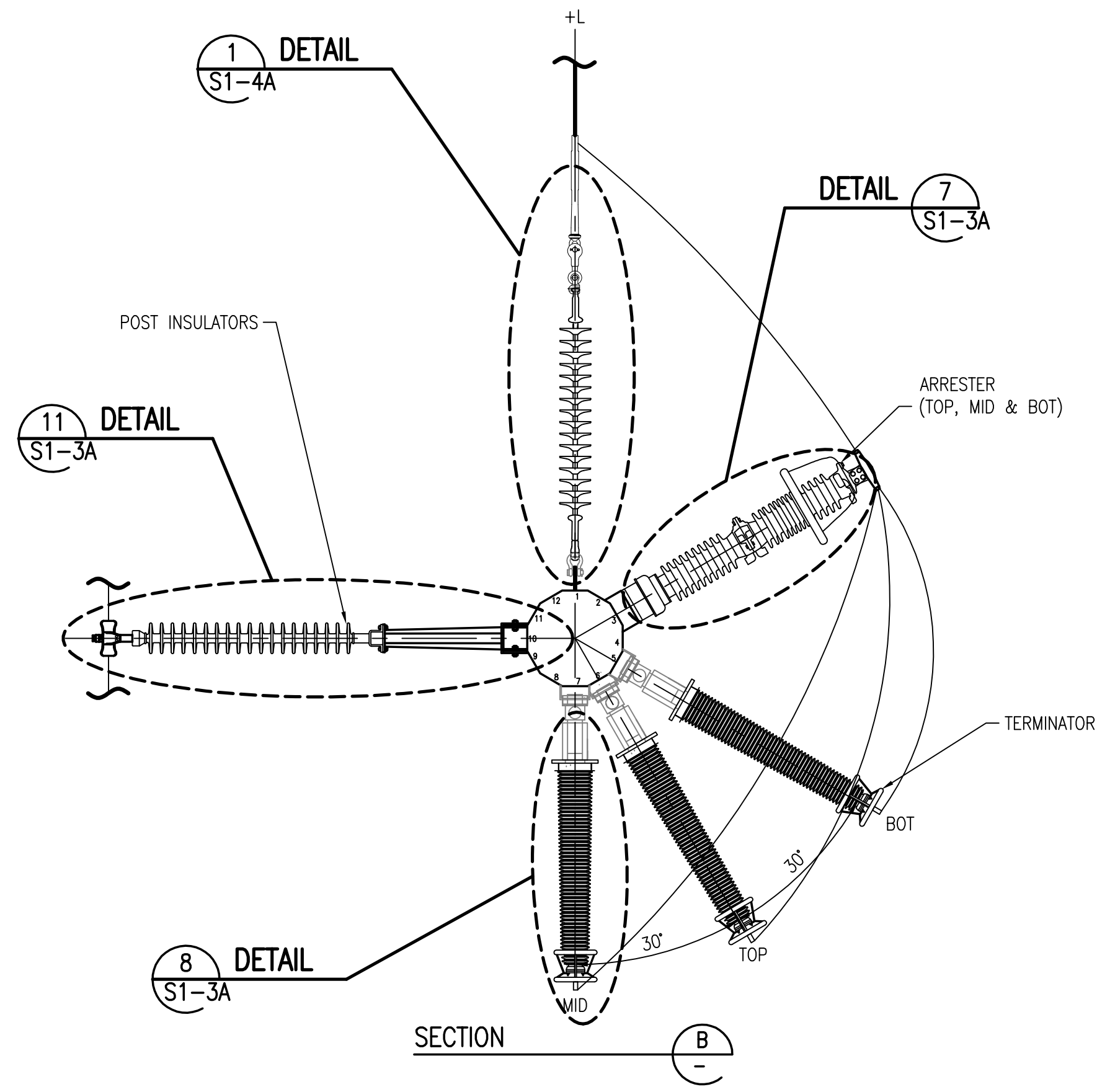
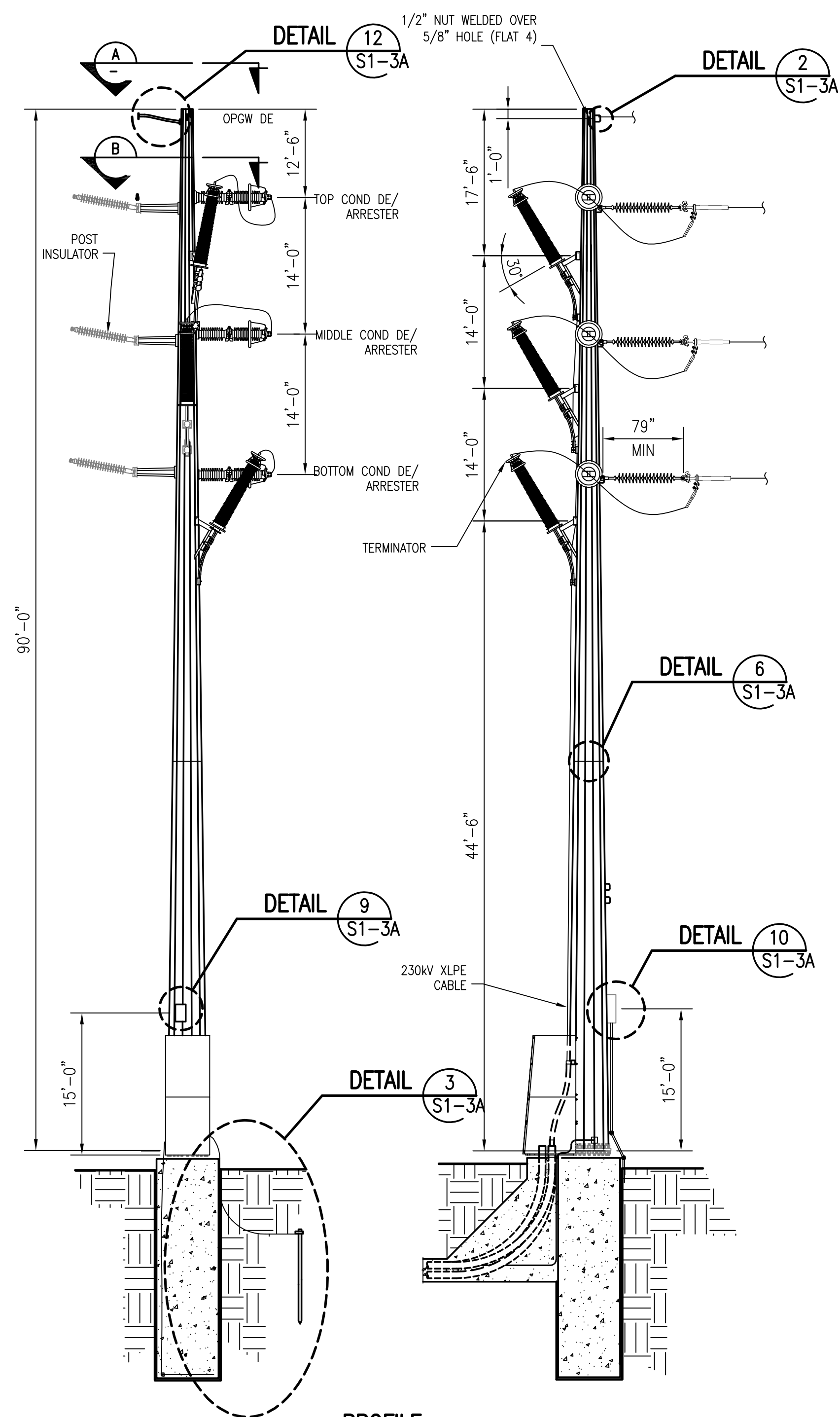
115210

REV

△

DRAWING NUMBER

S1-1



BILL OF MATERIAL					
	ITEM NO	QTY	DESCRIPTION	MANUFACTURER	CATALOG NO
DEADEND DETAIL 1	17	1	INSULATOR, STRAIN, POLYMER, 230KV, EYE EYE, 8" CORONA RING, 36 KIP	MACLEAN	S699101VA02
	45	2	ANCHOR SHACKLE, 35 KIP	MACLEAN	ASH-56-BC
	24	1	DEADEND, COMPRESSION, ALUMINUM, W/ 15' TERMINAL CONNECTOR	ACA	VES-145
OPGW DEADEND DETAIL 2	3	-	OPGW, 24 FIBER COUNT	SFPOC	SFSJ-J-4517
	27	1	GROUNDING LEAD, #4 CU, 48" LONG, GROUND LUG ON ONE END	PLP	710010015
	28	1	TANK GROUND, BRONZE, 1/2"-13 UNC STUD, #10 SOL. - #1 SOL.	MACLEAN	TG-820
	33	1	CLAMP, DEADEND, OPGW, U-BOLT WEDGE TYPE, W/ RETAINING RODS	PLP	2801309
	35	1	ANCHOR SHACKLE, 25 KIP	PLP	AS-5L
POLE GROUNDING DETAIL 3	40	A/R	DOWNLEAD CLAMP, W/ BANDING ADAPTER	PLP	8003267B1
	28	1	TANK GROUND, BRONZE, 1/2"-13 UNC STUD, #10 SOL. - #1 SOL.	MACLEAN	TG-820
	46A	1	GROUND ROD, 3/4" X 10', COPPERBONDED, SECTIONAL	ERICO	633400
	46B	1	COUPLING, GROUND ROD, THREADED BRONZE, 3/4"	ERICO	CR34
	46C	1	DRIVING STUD, GROUNDING ROD, 3/4"	ERICO	DS34
	47	1	CLAMP, GROUND ROD, BRONZE, FOR 3/4" ROD	JOSLYN	J8493
ARRESTER DETAIL 7	48	5 FT	GROUND WIRE, COPPERWELD, NO. 4 AWG, 7 STRAND	ACA	-
	69A	3	BOLT HH, 3/4" x 3" LG, W/NUT	TBD	TBD
	69B	3	SPLIT LOCK WASHER, 3/4"	TBD	TBD
	69C	3	ROUND WASHER, FLAT, 3/4"	TBD	TBD
	69D	1	POLYMER STATION CLASS ARRESTER	TBD	TBD
	69E	1	TEE-TAP CONNECTOR, COMPRESSION TERM, 1033 ACSR CURLEW	TBD	TBD
	69F	1	BRONZE, 2 CABLE TO FLAT GROUND CLAMP, 4/0 COPPER TO 4/0 COPPER	TBD	TBD
TERMINATOR DETAIL 8	69G	1	GROUND CLAMP, 4/0 COPPER, 1/2" BOLT	TBD	TBD
	70A	1	COMPOSITE OUTDOOR TERMINATOR, 230 KV	TBD	TBD
	70B	100FT	CABLE, GROUND, 4/0 AWG COPPER RHW	TBD	TBD
	70C	A/R	UNDERGROUND CABLE CLAMP, 2-BOLT	TBD	TBD
LINK BOX DETAIL 9	70D	1	CONNECTOR, COMPRESSION TERM, 1033 ACSR CURLEW	TBD	TBD
	71A	1	EARTH LINK BOX, 3-PHASE	TBD	TBD
	71B	4	WASHER, FLAT, 1/2"	TBD	TBD
	71C	4	SPLIT LOCK WASHER, 1/2"	TBD	TBD
	71D	4	BOLT, 1/2" x 1" LG., W/ NUT	TBD	TBD
OPGW SPLICE BOX DETAIL 10	71E	A/R	UNISTRUT, 1 5/8" x 1 5/8" W/ CHANNEL NUTS	TBD	TBD
	36	1	SPLICE ENCLOSURE, W/1 SPLICE TRAY	PLP	800012147
	37	1	SPLICE TRAY, 12 FIBER	PLP	80806033
	38	1	BULLET RESISTANT CANISTER, W/ VERTICAL MOUNTING BRACKET	PLP	80012162
	39	1	CABLE STORAGE RACK, DOUBLE ARM	PLP	8003569
TANGENT POST DETAIL 11	40	A/R	DOWNLEAD CLAMP, W/ BANDING ADAPTER	PLP	8003267B1
	66	1	INSULATOR, POST, 230 KV, TRUNNION CLAMP, W/ FLAT BASE	MACLEAN	H212095VA03
	68	1	CLAMP, TRUNNION, FOR 1033 ACSR W/ ARMOR ROD	MACLEAN	ACTS-230
OPGW SUSP DETAIL 12	12	1	ARMOR ROD, ALUMINUM	PLP	AR-0144
	3	-	OPGW, 24 FIBER COUNT	SFPOC	SFSJ-J-4517
	25	1	CLAMP, SUSPENSION, OPGW, CUSHION, W/ REINFORCING RODS	PLP	4700105
	26	1	Y-CLEVIS EYE, 25 KIP	MACLEAN	YCE-66-750
	27	1	GROUNDING LEAD, #4 CU, 48" LONG, GROUND LUG ON ONE END	PLP	710010015
	28	1	TANK GROUND, BRONZE, 1/2"-13 UNC STUD, #10 SOL. - #1 SOL.	MACLEAN	TG-820

STRUCTURE TABLE					
STR TYPE	STR NO	STR HEIGHT (FT)	LINE ANGLE (DEG)	A.G. HEIGHT "H" (FT)	QUANTITY
RISER POLE 1	3	90'-0"	0.0	90.0	1

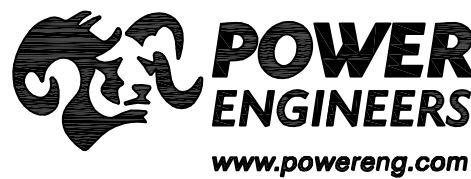
NOTES


1. SEE PLAN AND PROFILE DRAWINGS FOR POLE HEIGHT, SIZE AND LOCATION.
2. SEE DWG. L0-3 FOR STRUCTURE DESIGN LOADS.
3. SEE DWG. L1-1 FOR PHASING REQUIREMENTS.
4. 100 FT OF SPARE OPGW WILL BE COILED ON POLE.

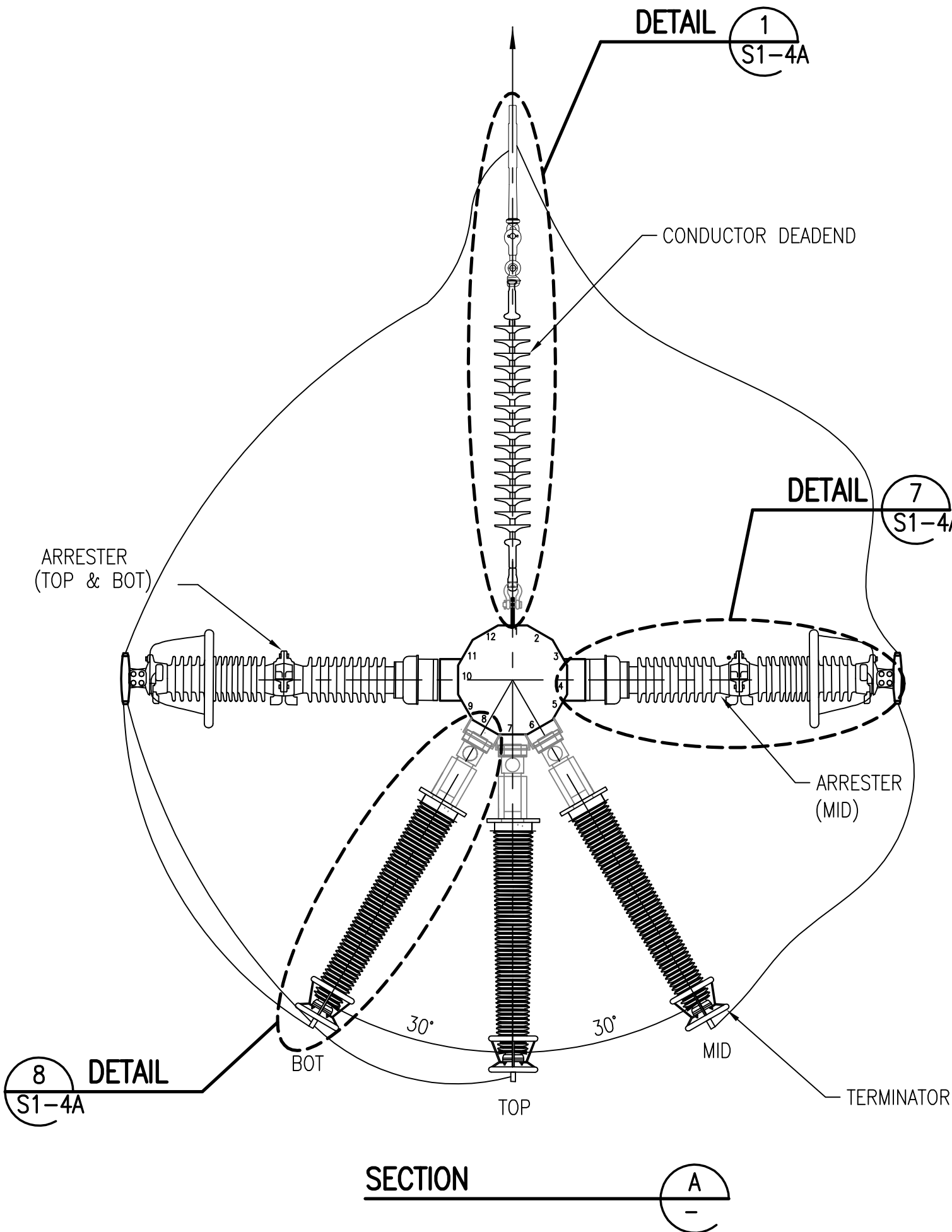
THIS DRAWING WAS PREPARED BY POWER ENGINEERS, INC. FOR A SPECIFIC PROJECT, TAKING INTO CONSIDERATION THE SPECIFIC AND UNIQUE REQUIREMENTS OF THE PROJECT. REUSE OF THIS DRAWING OR ANY INFORMATION CONTAINED IN THIS DRAWING FOR ANY PURPOSE IS PROHIBITED UNLESS WRITTEN PERMISSION FROM BOTH POWER AND POWER'S CLIENT IS GRANTED.

C	ISSUED FOR CEC PERMITTING	02/08/11	BOQ	BJH	DTL			
B	ISSUED FOR APPROVAL	02/12/09	JLK	DWN	EAR	S1-4A	RISER POLE 2 DETAILS	
A	ISSUED FOR REVIEW	01/12/09	RH	DWN	AC	EAR	S1-3A	RISER POLE 1 DETAILS
REV	REVISIONS	DATE	DRN	DSGN	KCD	APPD	REFERENCE DRAWINGS	

DSGN	DWN	12/31/08
DRN	RH	12/31/08
CKD	EAR	12/31/08
SCALE:		NTS
FOR 22x34 DWG ONLY		





BLYTHE ENERGY, LLC	JOB NUMBER	REV
BLYTHE ENERGY CENTER GSU-GIS OH 230KV TRANSMISSION LINE	115210	
RISER POLE 1	DRAWING NUMBER	
	S1-3	

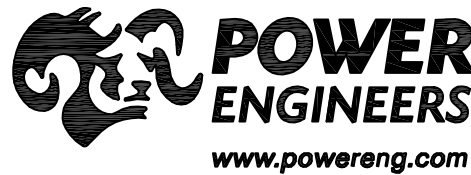


STRUCTURE TABLE					
STR TYPE	STR NO	STR HEIGHT (FT)	LINE ANGLE (DEG)	A.G. HEIGHT "H" (FT)	QUANTITY
RISER POLE 2	4	90'-0"	0.0	90.0	1

1. SEE PLAN AND PROFILE DRAWINGS FOR POLE HEIGHT, SIZE AND LOCATION.
2. SEE DWG. L0-4 FOR STRUCTURE DESIGN LOADS.
3. SEE DWG. L1-1 FOR PHASING REQUIREMENTS.
4. 100 FT OF SPARE OPGW WILL BE COILED ON POLE.

										DSGN	DWN	12/31/08	 POWER ENGINEERS <i>www.powereng.com</i>	BLYTHE ENERGY, LLC	JOB NUMBER	REV
C	ISSUED FOR CEC PERMITTING	02/08/11	BOQ	BJH	DTL				DRN	RH	12/31/08	BLYTHE ENERGY CENTER GSI-GIS OH 230KV TRANSMISSION LINE		115210		
B	ISSUED FOR APPROVAL	02/12/09	JLQ	DWN	EAR				CKD	EAR	12/31/08					
A	ISSUED FOR REVIEW	01/12/09	RH	DWN	AC	EAR	S1-4A	RISER POLE 2 DETAILS	SCALE: NTS					DRAWING NUMBER		
REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD		REFERENCE DRAWINGS	FOR 22x34 DWG ONLY			RISER POLE 2		S1-4		

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1

2

3

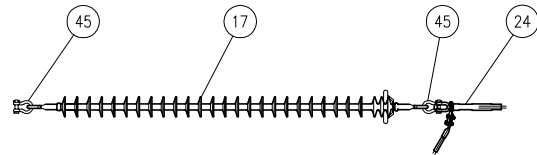
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5

6

7

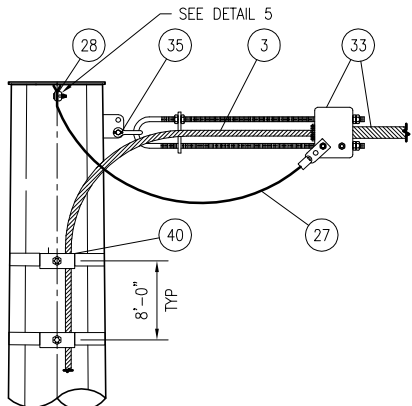
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DEADEND ASSEMBLY

DETAIL

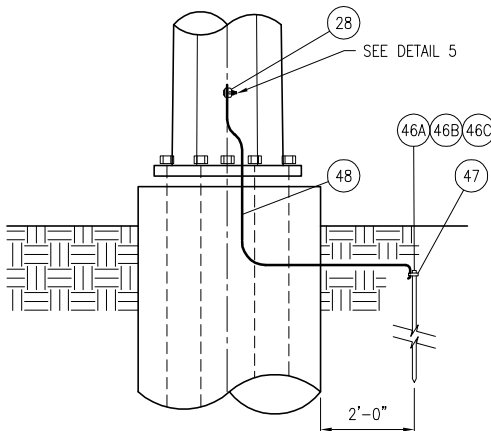
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OPGW DEADEND ASSEMBLY

DETAIL

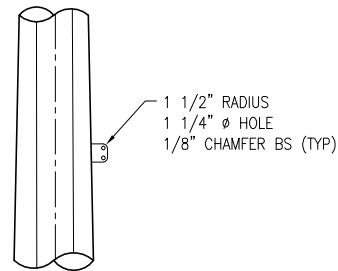
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POLE GROUNDING

DETAIL

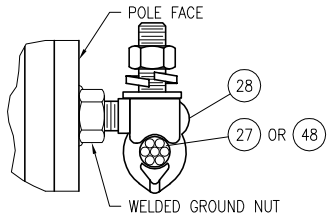
3



INSULATOR ATTACHMENT

DETAIL

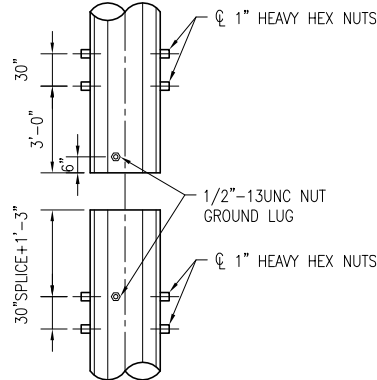
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TANK GROUND

DETAIL

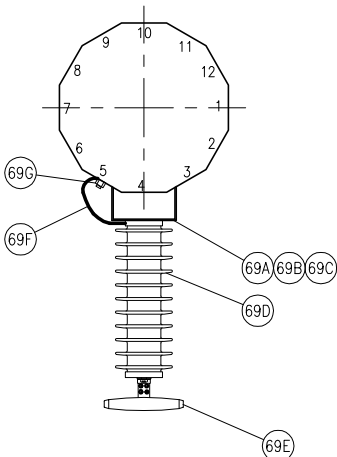
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JACKING NUT (TYPICAL ALL JOINTS)

DETAIL

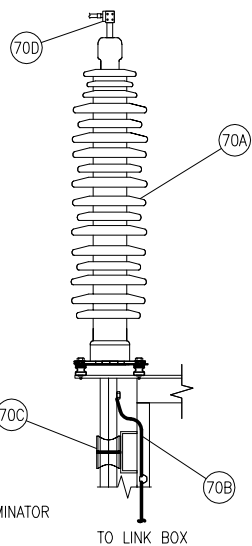
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ARRESTER

DETAIL

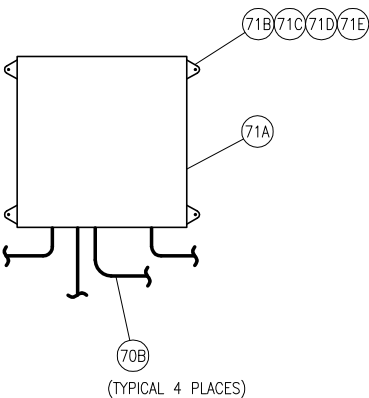
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TERMINATOR

DETAIL

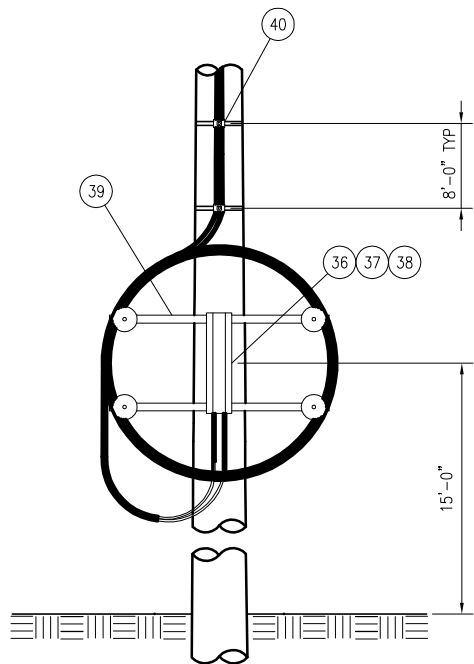
8



LINK BOX

DETAIL

9



OPGW SPLICE BOX

DETAIL

10

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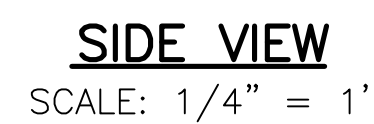
REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD	REFERENCE DRAWINGS
B	ISSUED FOR APPROVAL	02/12/09	JLQ	DWN	EAR		
A	ISSUED FOR REVIEW	01/12/09	RH	DWN	AC	EAR	

DSGN	DWN	12/31/08
DRN	RH	12/31/08
CKD	EAR	12/31/08
SCALE:		NTS
FOR 22x34 DWG ONLY		





BLYTHE ENERGY
BLYTHE PLANT GSU-GIS OH
230KV TRANSMISSION LINE
RISER POLE 2 DETAILS

JOB NUMBER	115210	REV	B
DRAWING NUMBER	S1-4A		



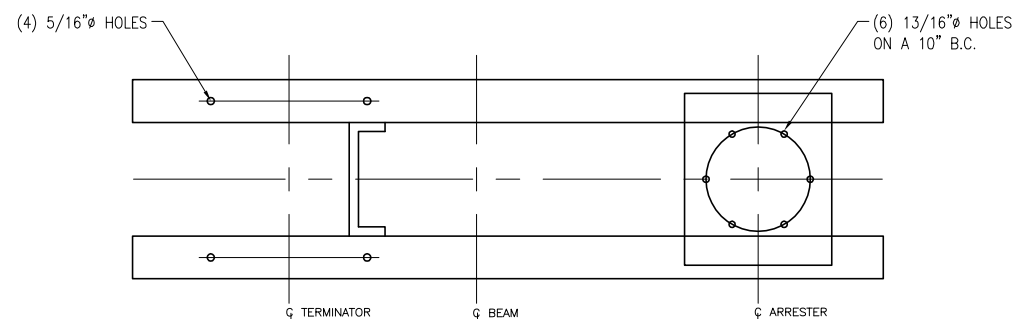
EQUIPMENT DATA		
EQUIPMENT	DESIGN WEIGHT (LBS)	SURFACE AREA (FT2)
TERMINATOR		
ARRESTOR		
SWITCH		

								DSGN	BJH	11/10/08	 POWER ENGINEERS www.powereng.com	BLYTHE ENERGY, LLC	JOB NUMBER	REV
								DRN	BOQ	11/10/08		BLYTHE ENERGY CENTER GSU-GIS OH 230KV TRANSMISSION LINE	115210	
								CKD	LRH	11/10/08				
A	ISSUED FOR CEC PERMITTING	02/08/11	BOQ	BJH	DTL			SCALE: AS SHOWN					DRAWING NUMBER	
B	ISSUED FOR APPROVAL	02/12/09	BOQ	BJH	LRH		*	*	FOR 22x34 DWG ONLY					
REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD	REFERENCE DRAWINGS							



DETAIL

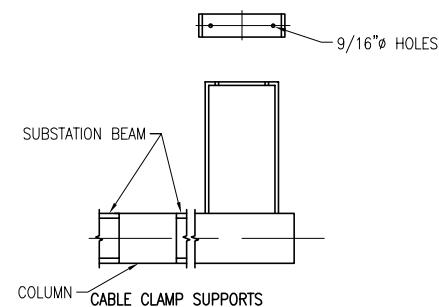
SCALE $1/2" = 1'-0"$



TERMINATOR AND ARRESTER

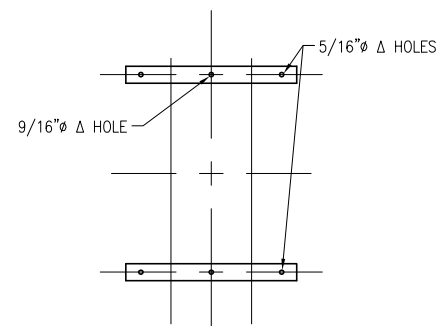
DETAIL

SCALE 1" = 1'-0"



DETAIL

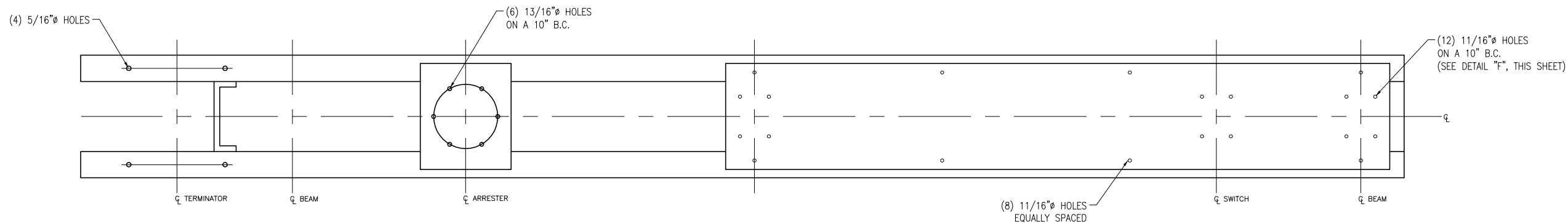
SCALE 1" = 1'-0"



LINK BOX SUPPORTS

DETAIL

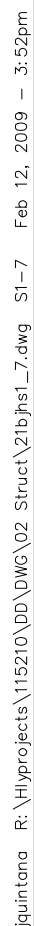
SCALE 1" = 1'-0"



TERMINATOR AND ARRESTER

DETAIL

SCALE 1" = 1'-0"



21bjhs1-4

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A	ISSUED FOR APPROVAL	02/12/09	BQO	BJH	LRH			*	*
REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD			REFERENCE DRAWINGS

DSGN	BJH	12/08/08
DRN	BOQ	12/08/08
CKD	LRH	12/08/08

SCALE: AS SHOWN

FOR 22x34 DWG ONLY



BLYTHE ENERGY, LLC

BLYTHE - JULIAN HINDS
230KV TRANSMISSION LINE

TERMINATION STRUCTURE DETAILS

JOB NUMBER	REV
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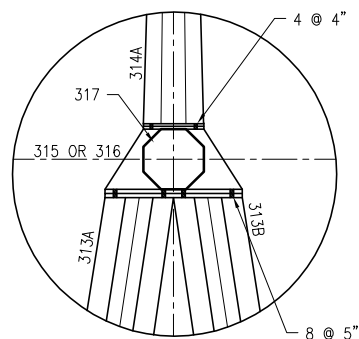
115210

REV

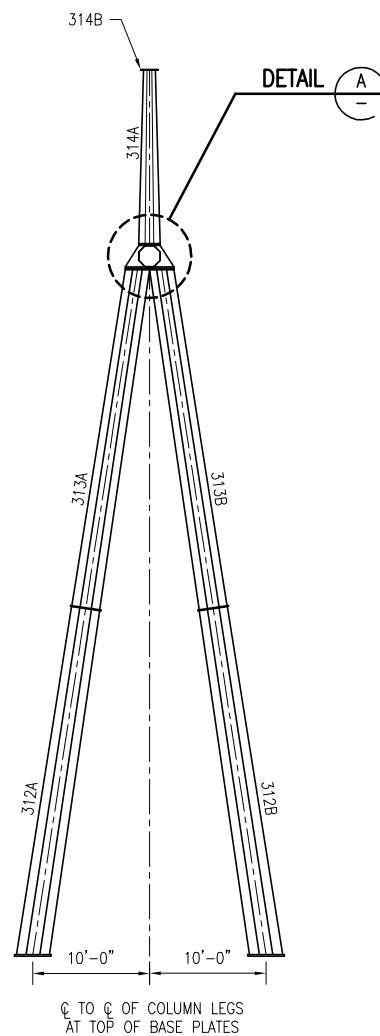
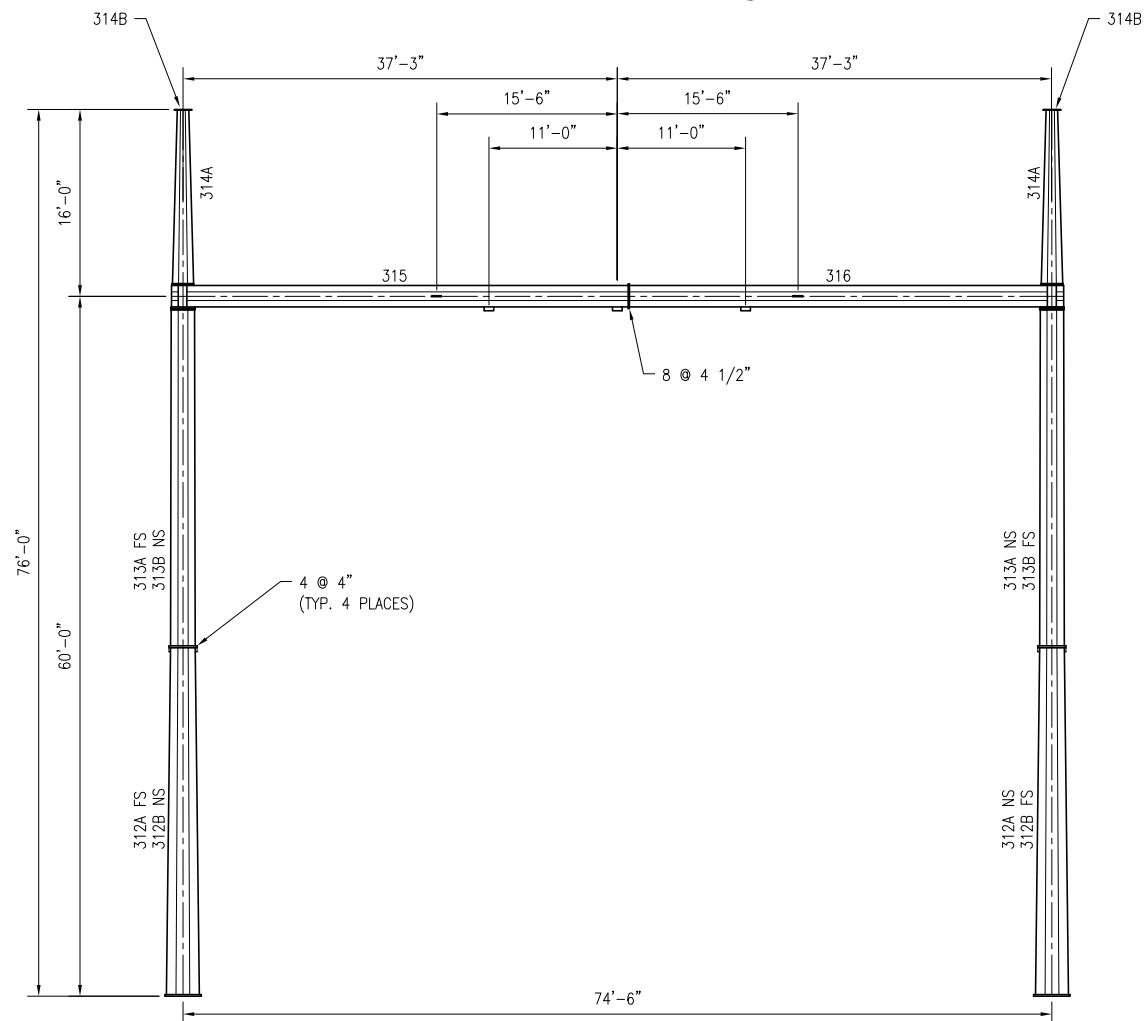


DRAWING NUMBER	
----------------	--


S1-7



DETAIL



BILL OF MATERIAL							
WELDMENTS 312A--(TYP. 2 PLACES)							
STR. QTY	MATERIAL	LENGTH		MK	REMARK	TOTAL WT	
		FT	IN				
4	BT PL 3/16 X 47 1/2 X 55 3/4	29	11 3/4	a	BENT & TPRD	3932.8	
2	PL 1 1/2 X 37 1/4	3	1 1/4	b		1181.4	
2	PL 1 X 30	2	6	c		510.0	
12	BAR 1/2 X 2	0	2	k		7.2	
2	BAR 3/16 X 1 1/2	9	3 1/2		BACKER BAR	17.8	
WELDMENTS 312B--(TYP. 2 PLACES)							
STR. QTY	MATERIAL	LENGTH		MK	REMARK	TOTAL WT	
		FT	IN				
4	BT PL 3/16 X 47 1/2 X 55 3/4	29	11 3/4	a	BENT & TPRD	3932.8	
2	PL 1 1/2 X 37 1/4	3	1 1/4	b		1181.4	
2	PL 1 X 30	2	6	c		510.0	
2	BAR 1/2 X 2	0	2	k		1.2	
2	BAR 3/16 X 1 1/2	9	3 1/2		BACKER BAR	17.8	
WELDMENTS 313A--(TYP. 2 PLACES)							
STR. QTY	MATERIAL	LENGTH		MK	REMARK	TOTAL WT	
		FT	IN				
4	BT PL 3/16 X 39 1/4 X 47 1/2	29	6 7/8	a	BENT & TPRD	3275.6	
2	PL 1 1/2 X 25	2	1	b		532.2	
2	PL 1 X 30	2	6	c		510.0	
14	BAR 1/2 X 2	0	2	k		8.4	
WELDMENTS 313B--(TYP. 2 PLACES)							
STR. QTY	MATERIAL	LENGTH		MK	REMARK	TOTAL WT	
		FT	IN				
4	BT PL 3/16 X 39 1/4 X 47 1/2	29	6 7/8	a	BENT & TPRD	3275.6	
2	PL 1 1/2 X 25	2	1	b		532.2	
2	PL 1 X 30	2	6	c		510.0	
WELDMENTS 314A--(TYP. 2 PLACES)							
STR. QTY	MATERIAL	LENGTH		MK	REMARK	TOTAL WT	
		FT	IN				
4	BT PL 3/16 X 19 1/4 X 35 3/4	14	10 1/4	a	BENT & TPRD	1043.2	
2	PL 1 X 23	0	11	b		299.8	
2	PL 3/4 X 18	1	6	c		137.8	
8	BAR 1/2 X 2	0	2	k		4.8	
2	PL 3/16 X 7	0	10	314B	SHIP LOOSE	7.6	
2	PL 3/16 X 22	1	10	317	SHIP LOOSE	51.6	
WELDMENTS 315--(TYP. 1 PLACE)							
STR. QTY	MATERIAL	LENGTH		MK	REMARK	TOTAL WT	
		FT	IN				
2	BT PL 1/4 X 35 1/2	20	0	a	BENT	1207.0	
2	BT PL 1/4 X 35 1/2	18	11 1/4	b	BENT	1143.0	
1	PL 1 1/2 X 25	4	2 1/2	c		537.5	
1	PL 1 X 23	1	11	d		149.9	
2	PL 3/8 X 22	2	2 1/2	f	ONE MAKES TWO	114.6	
2	BAR 3/16 X 2	0	2	g		0.6	
1	PL 1 1/4 X 23 1/2	1	11 1/2	h		196.0	
2	BAR 3/4 X 4	0	4 1/2	j		7.8	
2	BT PL 1/2 X 8	1	1	m		29.6	
WELDMENTS 316--(TYP. 1 PLACE)							
STR. QTY	MATERIAL	LENGTH		MK	REMARK	TOTAL WT	
		FT	IN				
2	BT PL 1/4 X 35 1/2	20	0	a	BENT	1207.0	
2	BT PL 1/4 X 35 1/2	17	5 1/4	b	BENT	1052.4	
1	PL 1 1/2 X 25	4	2 1/2	c		537.5	
1	PL 1 X 23	1	11	d		149.9	
2	PL 3/8 X 22	2	2 1/2	f	ONE MAKES TWO	114.6	
2	BAR 3/16 X 2	0	2	g		0.6	
1	PL 1 1/4 X 23 1/2	1	11 1/2	h		196.0	
1	BAR 3/4 X 4	0	4 1/2	j		3.9	
1	BT PL 1/2 X 8	1	1	m		14.8	
HARDWARE (INCLUDES 2% EXTRA)							
26	1" DIA BOLTS	0	4		A325	47.0	
9	1" DIA BOLTS	0	4 1/2		A325	17.3	
17	1" DIA BOLTS	0	5		A325	34.5	
52	1" DIA NUTS				HEAVY HEX		
104	1" DIA WASHERS				HARDENED		
52	1" DIA PALNUTS					2.1	
9	1/4" DIA SCREWS	0	3/4		SELF--TAPPING		
					SUBTOTAL	28244.8	
					3 1/2% GALV.	988.6	
					TOTAL WEIGHT PER UNIT	29233.4	

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													DRN	RH	02/03/09		115210	<div>A</div>		
													CKD	DWN	02/12/09					
													SCALE:		NTS					
		A	ISSUED FOR APPROVAL	02/12/09	RH	SJS	DWN	BH	REFERENCE DRAWINGS											
REV	REVISIONS		DATE	DRN	DSGN	CKD	APPD													
											FOR 2x34 DWG ONLY				230KV TAKE-OFF STRUCTURE TYPE II				DRAWING NUMBER S1-8	

12" NON-CULTIVATED

24" CULTIVATED

46A

47

46B

48

TO NEXT STRUCTURE


Technical drawing of a transmission line tower and its associated infrastructure. The drawing shows a cross-section of a tower with two main legs. Above the tower, a horizontal line represents the transmission line, with various dimensions and labels. Labels include "CONDUCTOR AND OPGW CKT 1", "OPGW CKT 2", "CONDUCTOR CKT 2", and "GROUND ROD". Dimensions are given in feet and inches, such as "120'-0\"", "100'-0\"", "57'-3\"", "24'-3\"", and "2'-10\"". The drawing also shows the tower's foundation and the surrounding ground area.

NOTES

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DSGN	DWN	12/22/08
DRN	RH	12/22/08
CKD	AT	12/22/08
SCALE:		NTS
FOR 22x34 DWG ONLY		



JOB NUMBER 115210	REV 
DRAWING NUMBER S2-1	

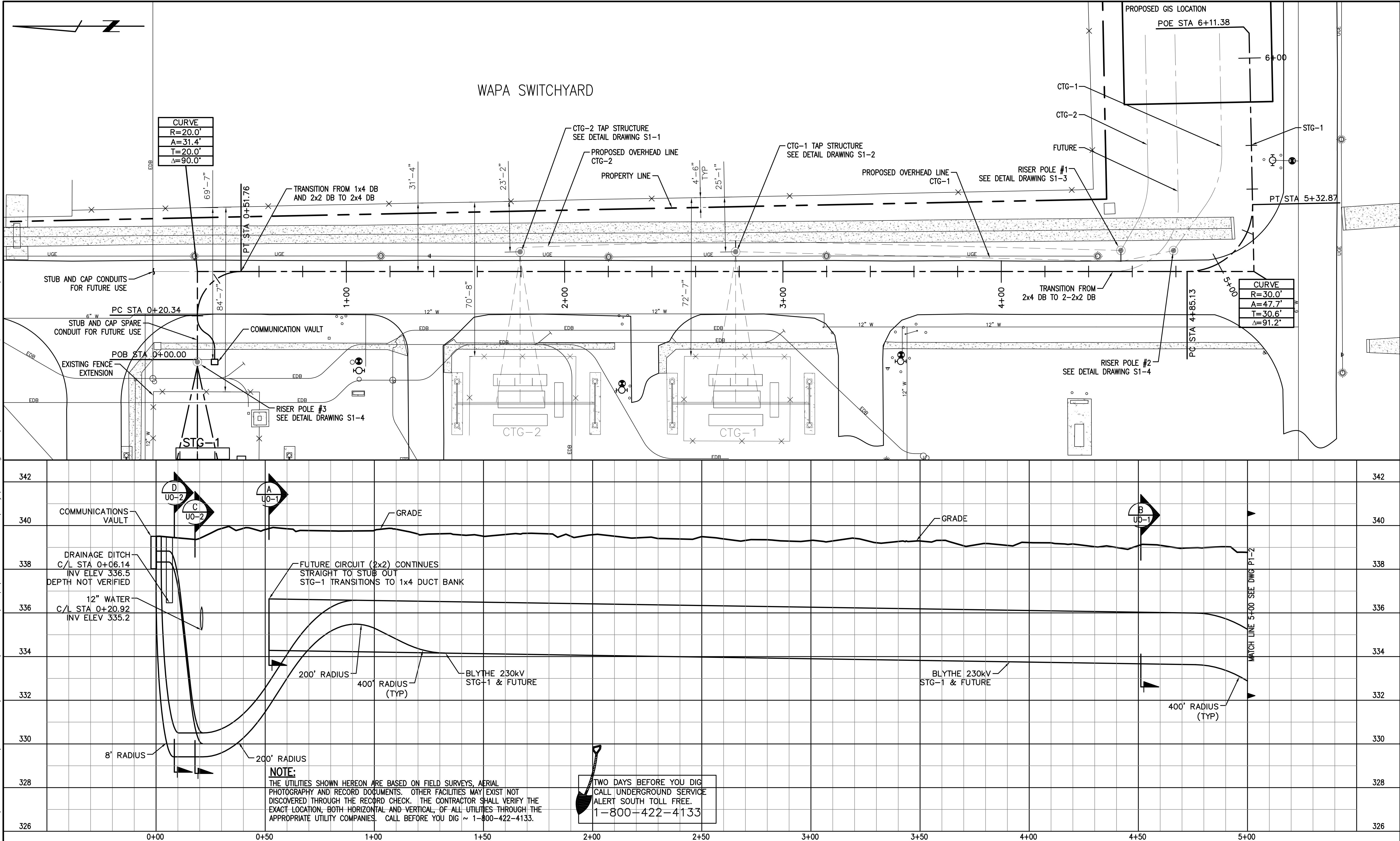
Blythe Energy Center Transmission Line Project
Request for Staff Approved Modification
(99-AFC-08T)
Response to Data Request

Figure 5

Detail drawings of underground installation, including dimensioned details of interconnection with each turbine and an interconnection for future expansion, duct bank details, and details of the motor operated switch terminal (9 sheets)

b:\projects\21b\21b1-1.dwg Feb 07, 2011 3:11pm

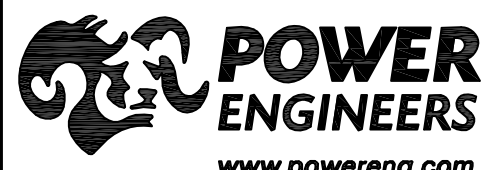
21b1-1



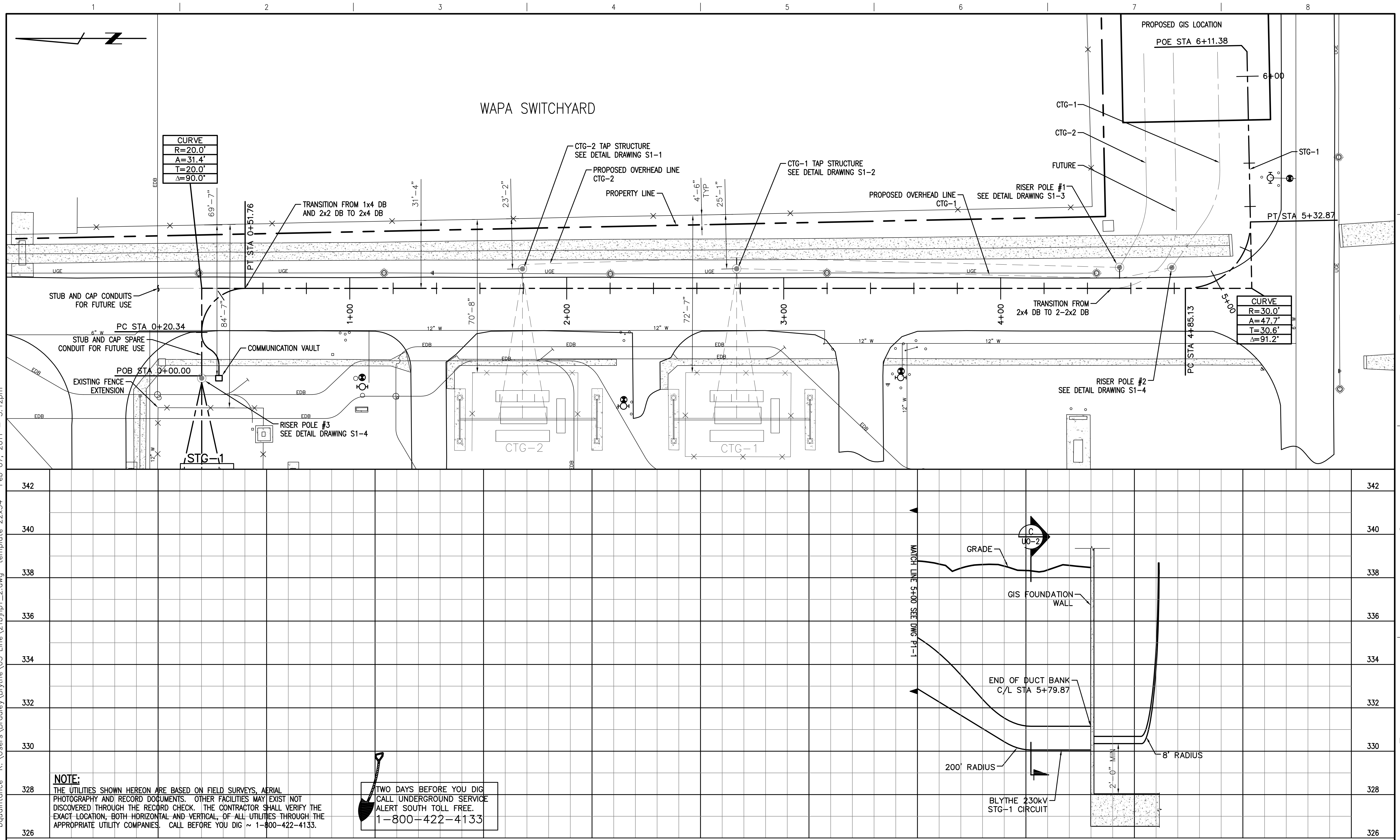
THIS DRAWING WAS PREPARED BY POWER ENGINEERS, INC. FOR A SPECIFIC PROJECT. TAKING INTO CONSIDERATION THE SPECIFIC AND UNIQUE REQUIREMENTS OF THE PROJECT, REUSE OF THIS DRAWING OR ANY INFORMATION CONTAINED IN THIS DRAWING FOR ANY PURPOSE IS PROHIBITED UNLESS WRITTEN PERMISSION FROM BOTH POWER AND POWER'S CLIENT IS GRANTED.

REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD	REFERENCE DRAWINGS
C	ISSUED FOR CEC PERMITTING	02/08/11	BOQ	BJH	DTL		
B	ISSUED FOR BID	03/11/09	BOQ	BJH	LRH		
A	ISSUED FOR APPROVAL	02/12/09	BOQ	BJH	LRH	*	*

DSGN	BJH	01/07/09
DRN	BOQ	01/07/09
CKD	LRH	01/07/09
SCALE:	1"=2'	
	1"=20'	
FOR 22x34 DWG ONLY		

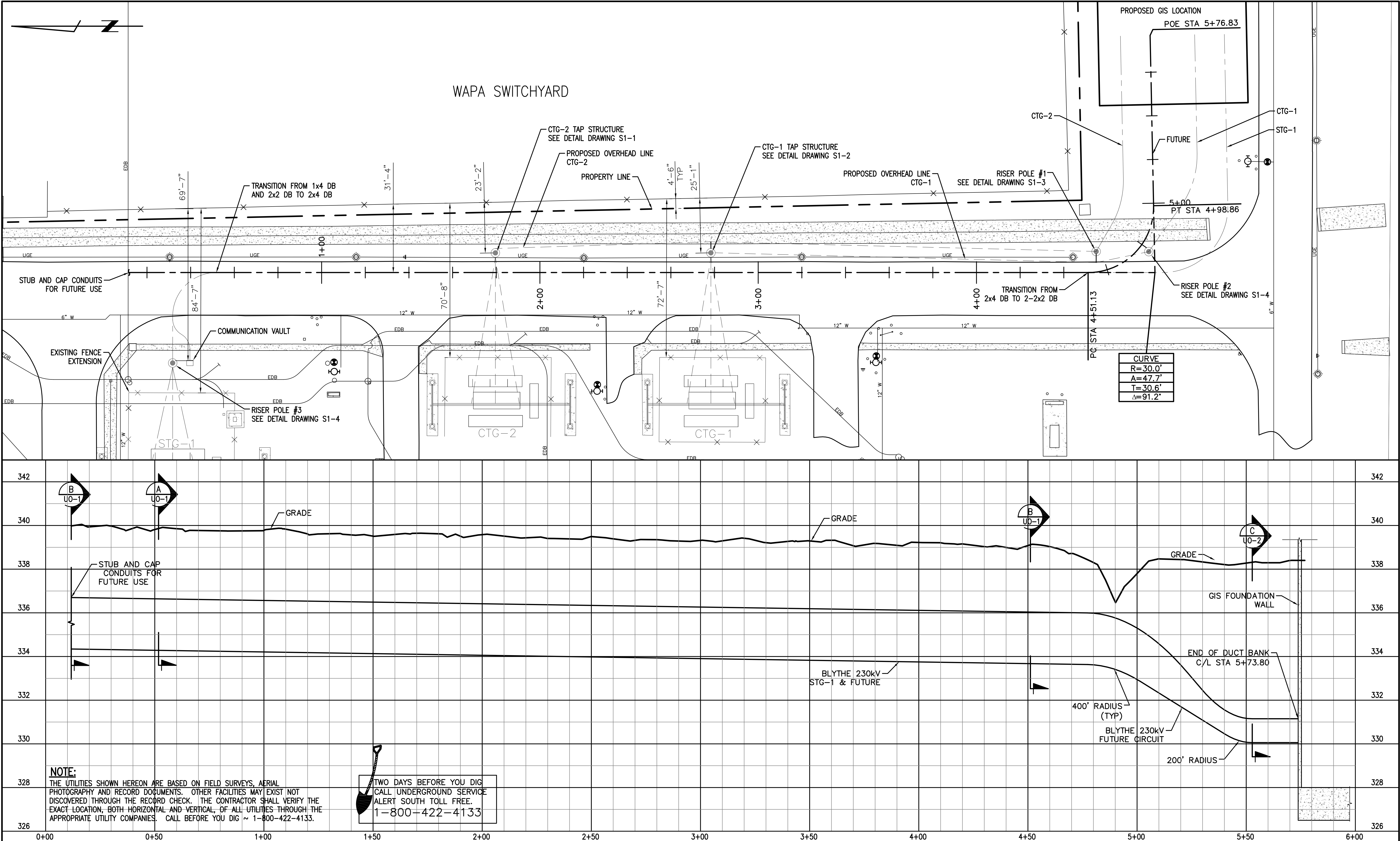


BLYTHE ENERGY, LLC		JOB NUMBER	REV
BLYTHE - JULIAN HINDS 230KV TRANSMISSION LINE		115210	△
STG-1 CIRCUIT - PLAN AND PROFILE DRAWING		DRAWING NUMBER	P1-1

[illegible]

bquntance R:\Users\Bradley\Blythe\03 Line\21b\jhp1_3.dwg template 22x34 Feb 07, 2011 - 3:12pm

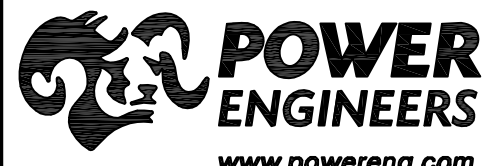
21b\jhp1-3



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REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD	REFERENCE DRAWINGS
C	ISSUED FOR CEC PERMITTING	02/08/11	BOQ	BJH	DTL		
B	ISSUED FOR BID	03/11/09	BOQ	BJH	LRH		
A	ISSUED FOR APPROVAL	02/12/09	BOQ	BJH	LRH		

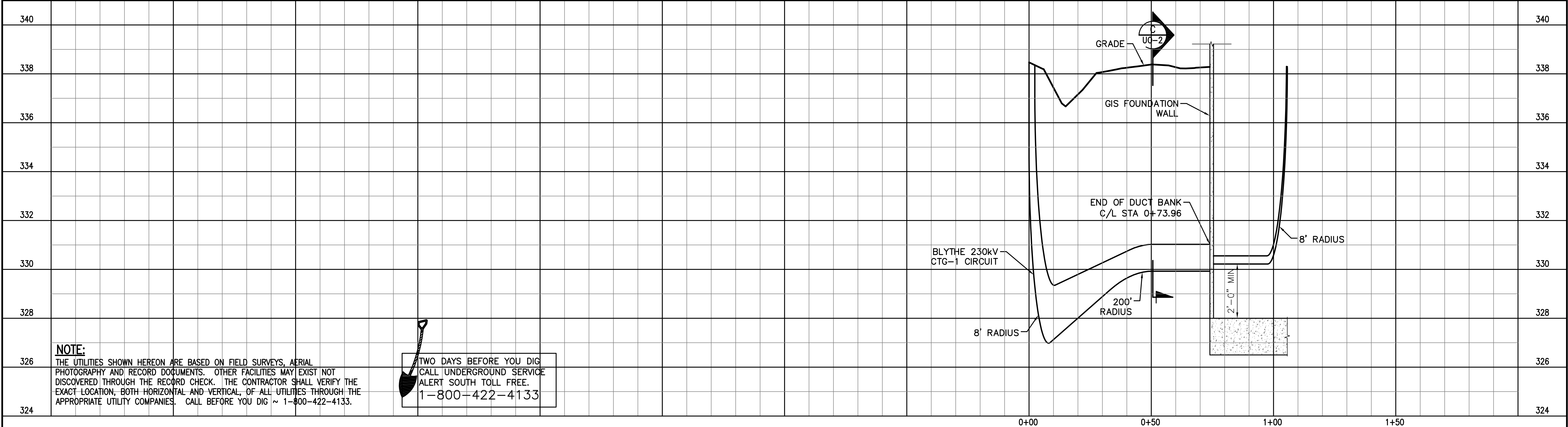
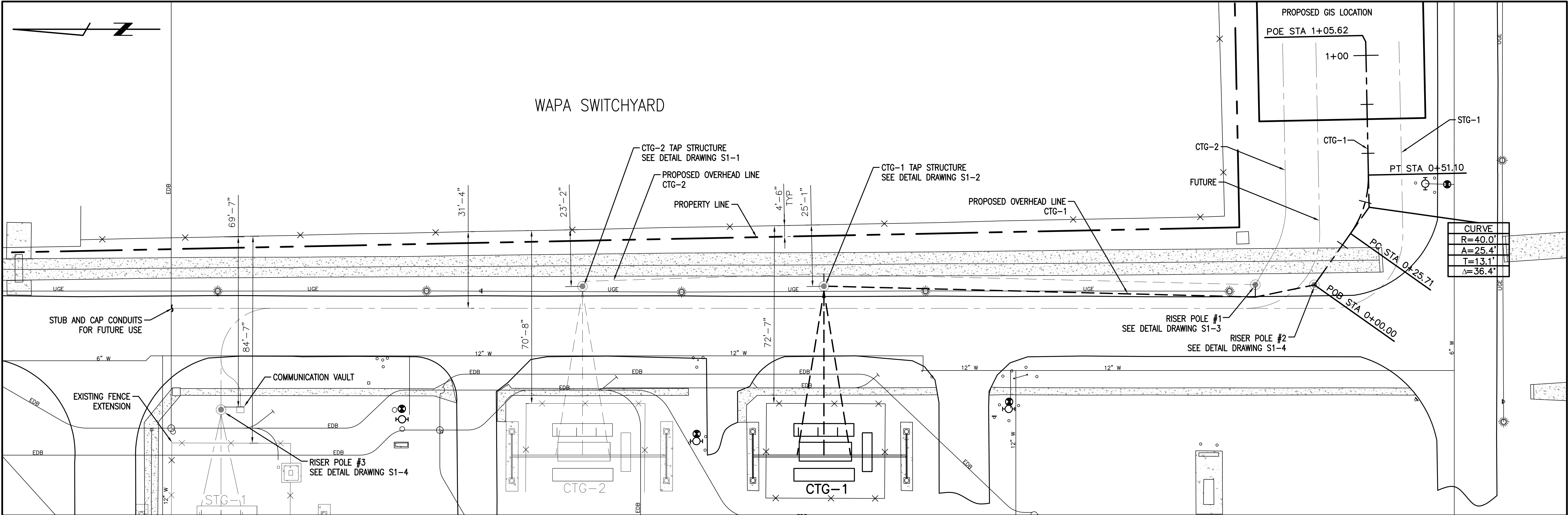
DSGN	BJH	01/07/09
DRN	BOQ	01/07/09
CKD	LRH	01/07/09
SCALE:	1"=2'	
	1"=20'	
FOR 22x34 DWG ONLY		



BLYTHE ENERGY, LLC		JOB NUMBER	REV
BLYTHE - JULIAN HINDS 230KV TRANSMISSION LINE		115210	△
FUTURE CIRCUIT - PLAN AND PROFILE DRAWING		DRAWING NUMBER	P1-3

R:\Users\Bradley\Blythe\03 Line\21bjhp1_4.dwg Feb 07, 2011 3:12pm bquaintance

21bjhp1-4



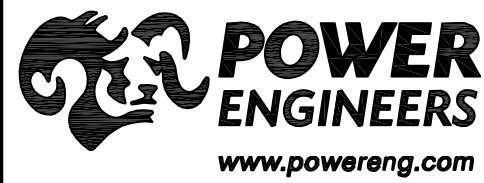
NOTE:
THE UTILITIES SHOWN HEREON ARE BASED ON FIELD SURVEYS, AERIAL PHOTOGRAPHY AND RECORD DOCUMENTS. OTHER FACILITIES MAY EXIST NOT DISCOVERED THROUGH THE RECORD CHECK. THE CONTRACTOR SHALL VERIFY THE EXACT LOCATION, BOTH HORIZONTAL AND VERTICAL, OF ALL UTILITIES THROUGH THE APPROPRIATE UTILITY COMPANIES. CALL BEFORE YOU DIG ~ 1-800-422-4133.

TWO DAYS BEFORE YOU DIG
CALL UNDERGROUND SERVICE
ALERT SOUTH TOLL FREE.
1-800-422-4133

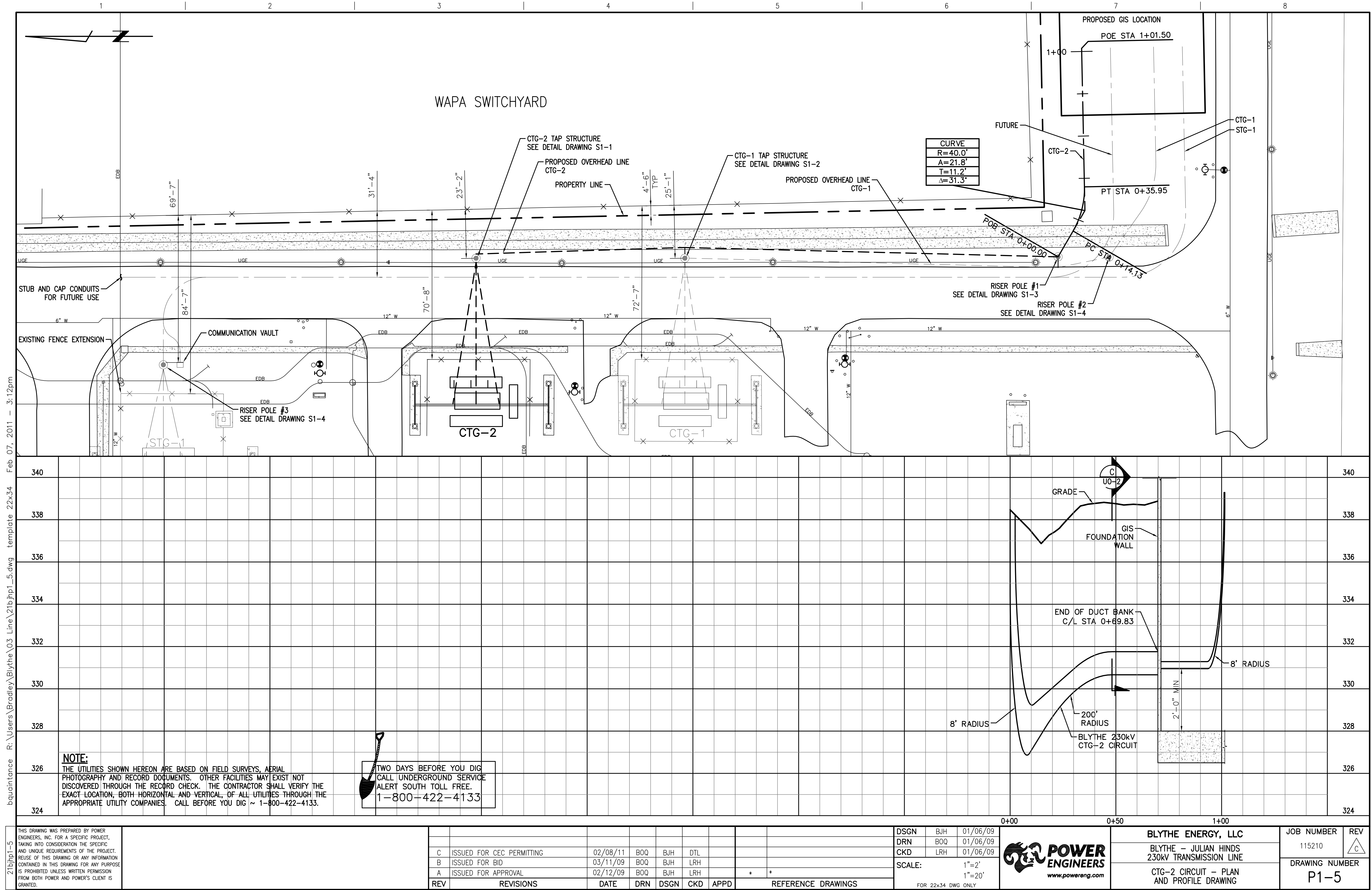
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REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD	REFERENCE DRAWINGS
C	ISSUED FOR CEC PERMITTING	02/08/11	BOQ	BJH	DTL		
B	ISSUED FOR BID	03/11/09	BOQ	BJH	LRH		
A	ISSUED FOR APPROVAL	02/12/09	BOQ	BJH	LRH		

DSGN	BJH	01/07/09
DRN	BOQ	01/07/09
CKD	LRH	01/07/09
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	1"=20'	
FOR 22x34 DWG ONLY		

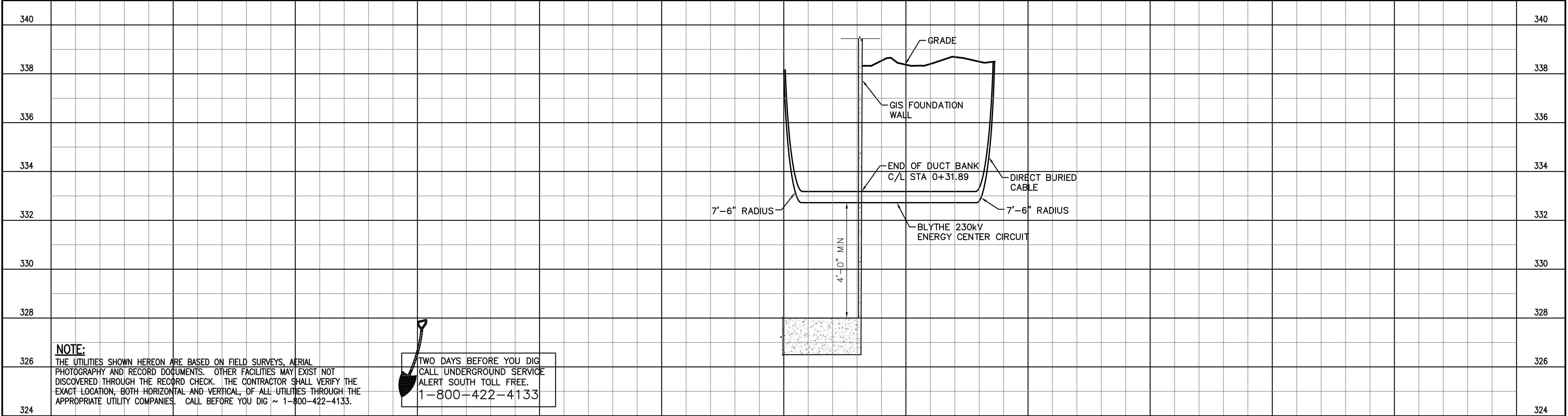
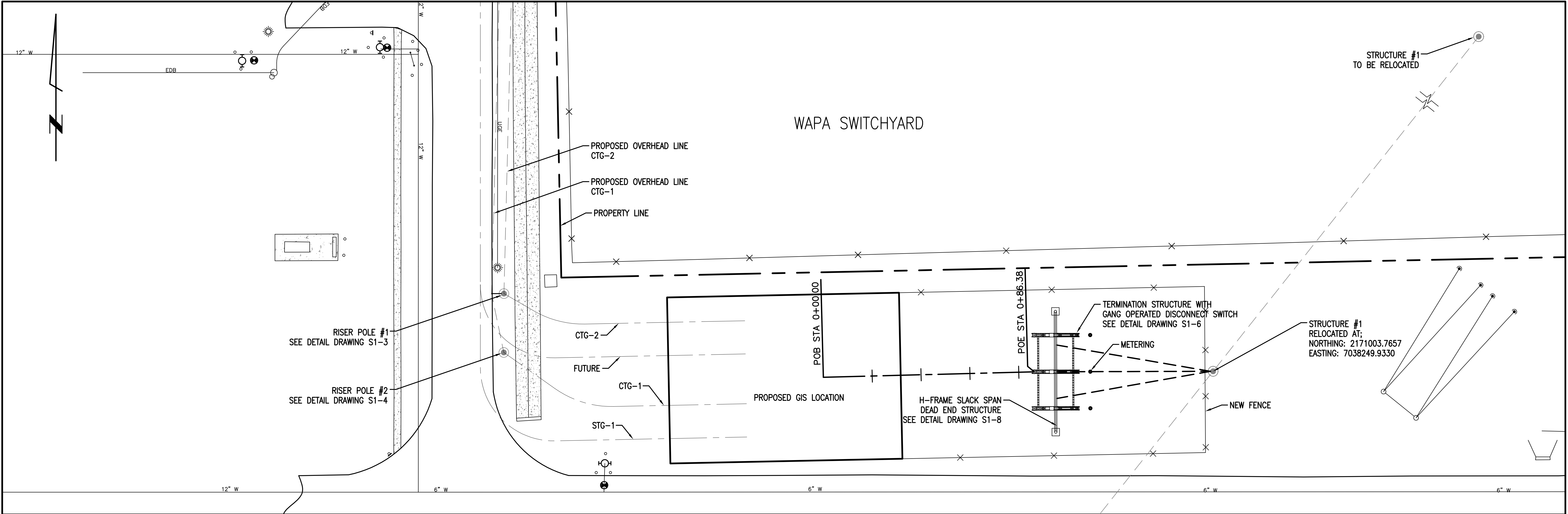


BLYTHE ENERGY, LLC		JOB NUMBER	REV
BLYTHE - JULIAN HINDS 230KV TRANSMISSION LINE		115210	△
CTG-1 CIRCUIT - PLAN AND PROFILE DRAWING		DRAWING NUMBER	P1-4



R:\Users\Bradley\Blythe\03 Line\21b\jhp1_6.dwg Feb 08, 2011 11:20am bquaintance

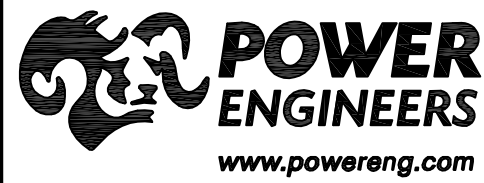
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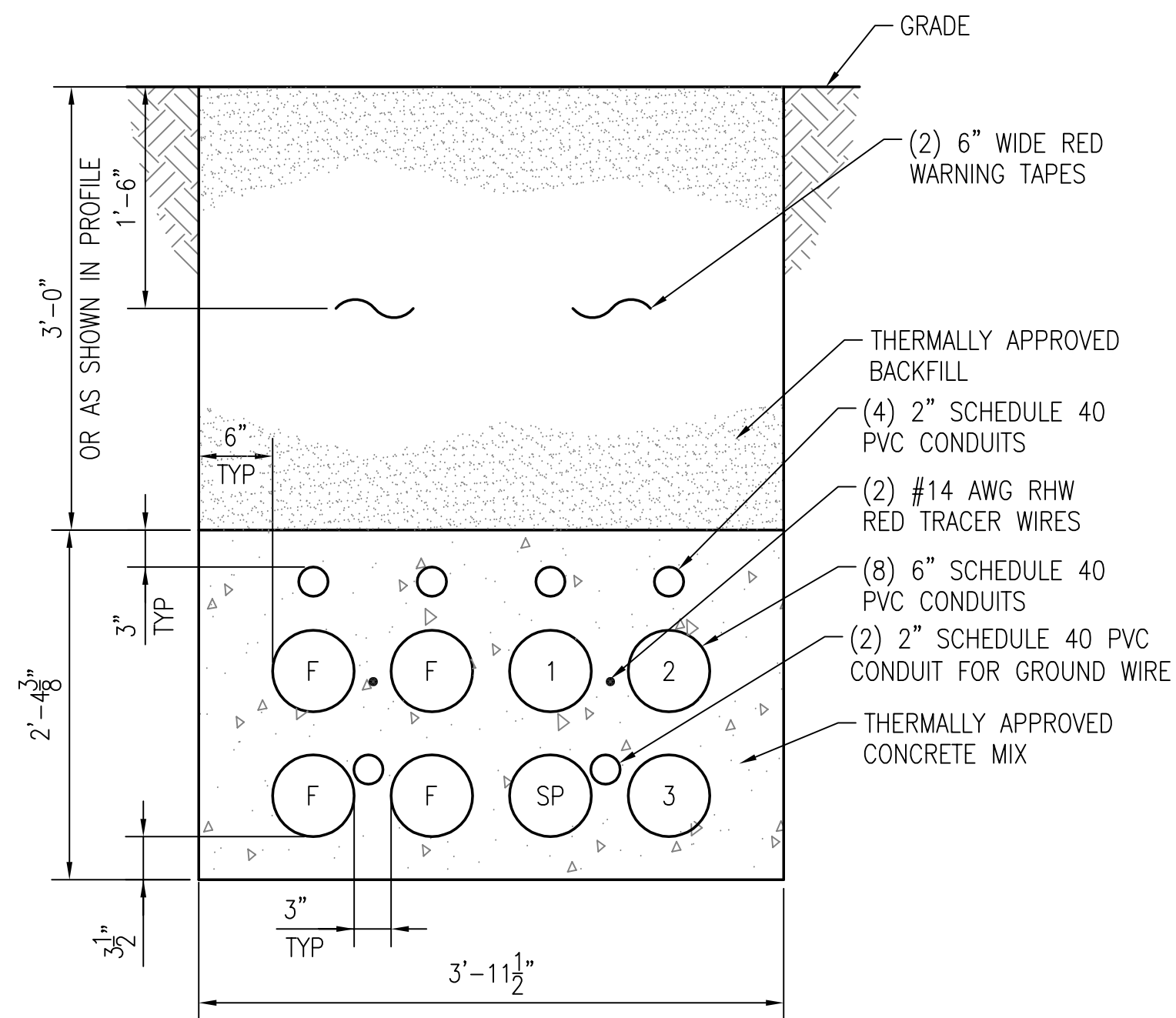
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REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD	REFERENCE DRAWINGS
C	ISSUED FOR CEC PERMITTING	02/08/11	BOQ	BJH	DTL		
B	ISSUED FOR BID	03/11/09	BOQ	BJH	LRH		
A	ISSUED FOR APPROVAL	02/12/09	BOQ	BJH	LRH	*	*

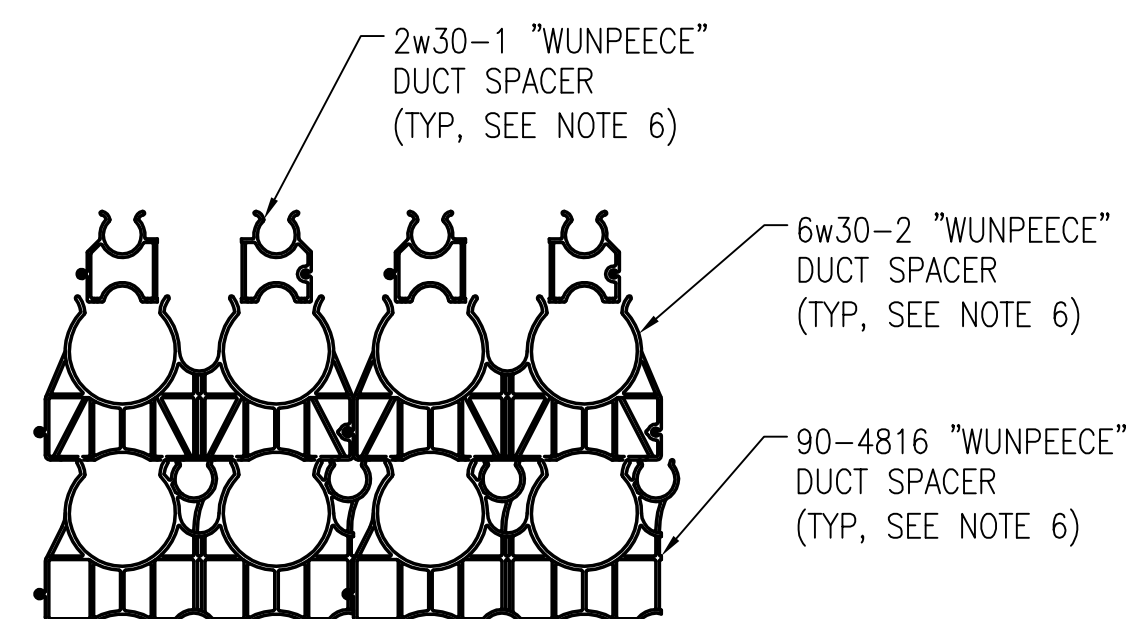
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DRN	BOQ	01/07/09
CKD	LRH	01/07/09
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FOR 22x34 DWG ONLY		



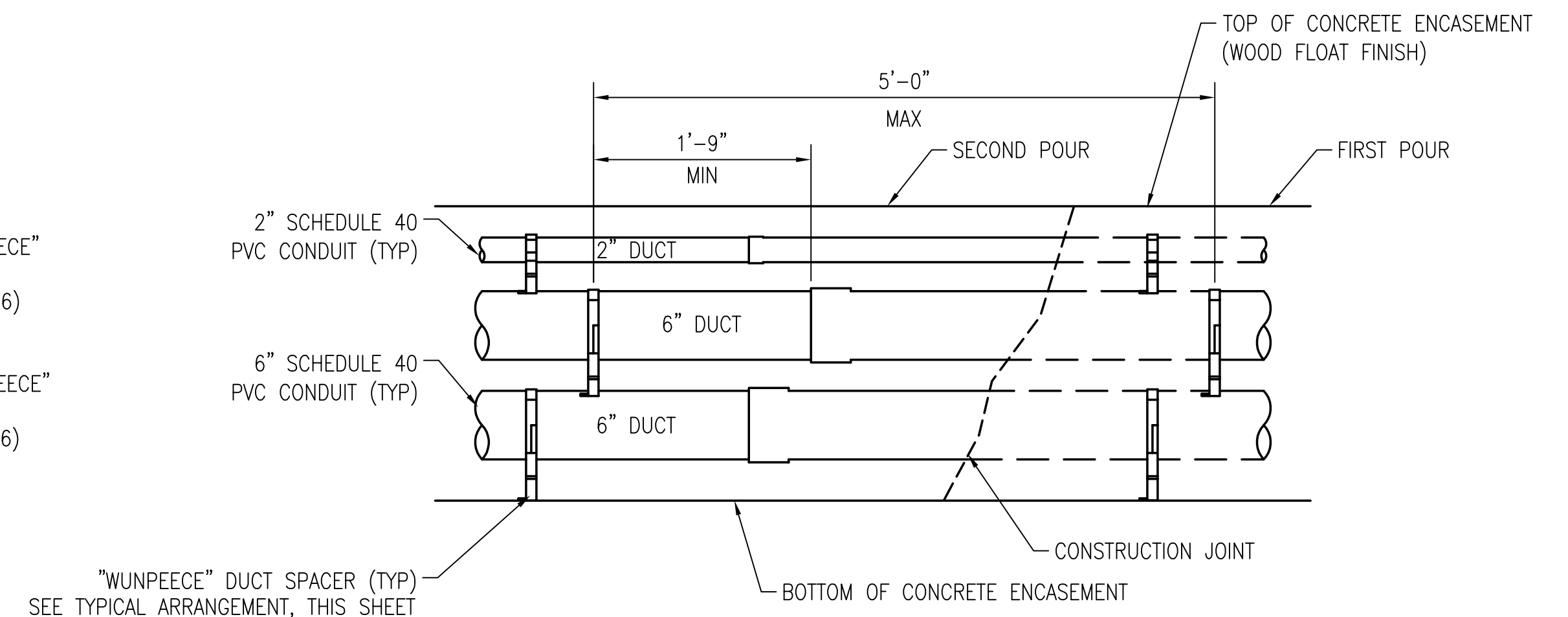
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BLYTHE - JULIAN HINDS 230kV TRANSMISSION LINE		115210	
MOTOR OPERATED SWITCH TERMINATION PLAN AND PROFILE DRAWING		DRAWING NUMBER	P1-6



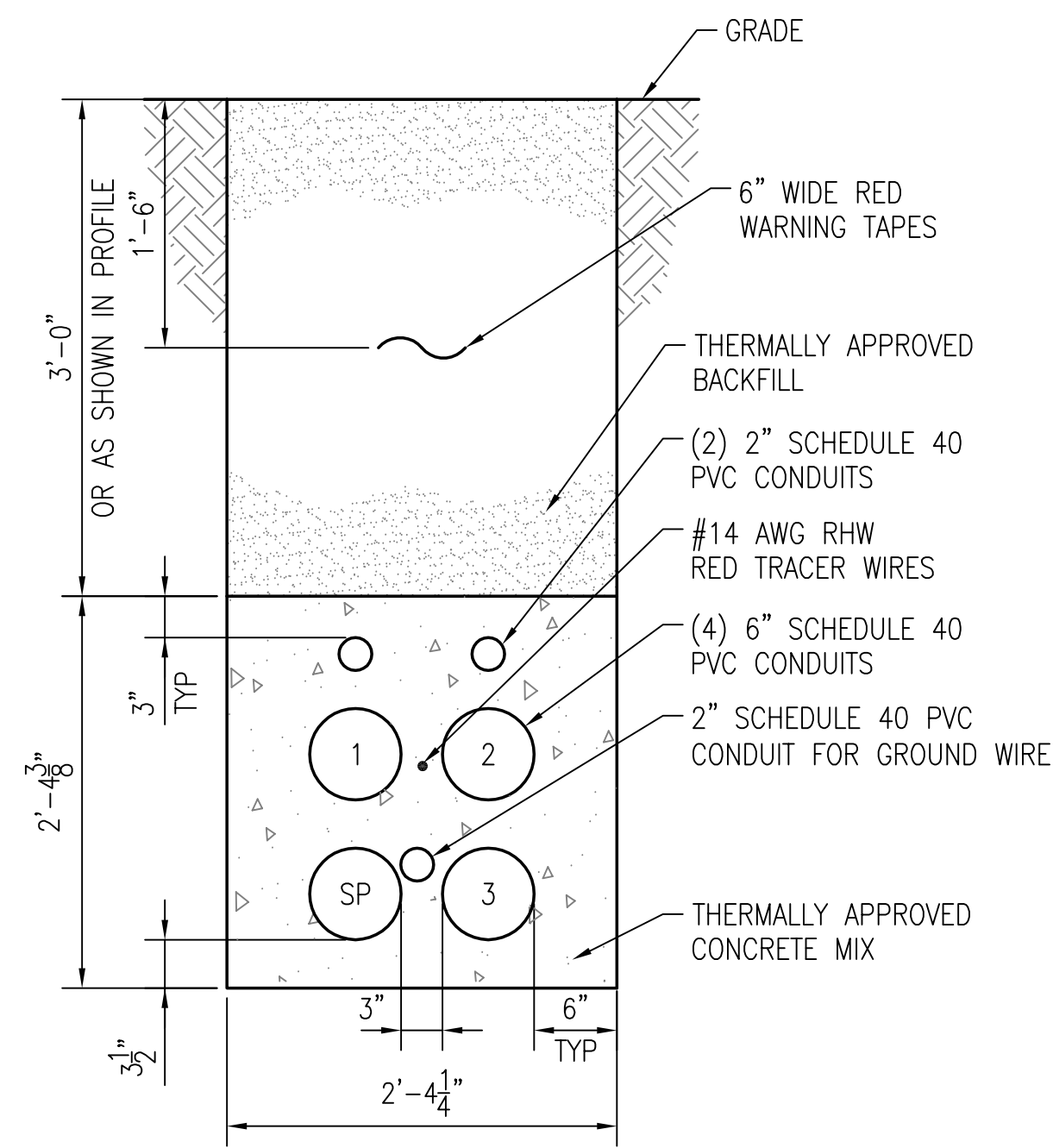
SECTION A
SCALE 1" = 1'-0" P&P's



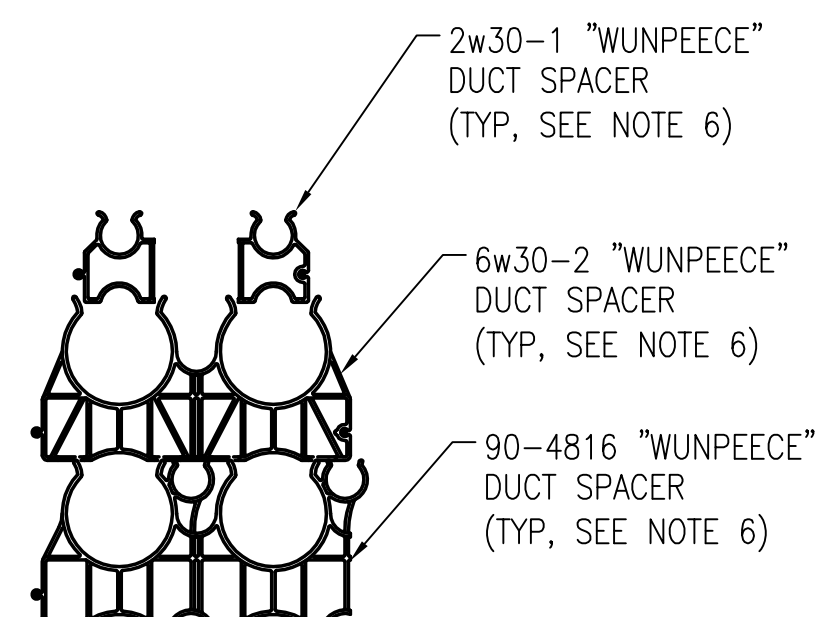
SECTION 'A' DUCT SPACER ARRANGEMENT
SCALE 1" = 1'-0"



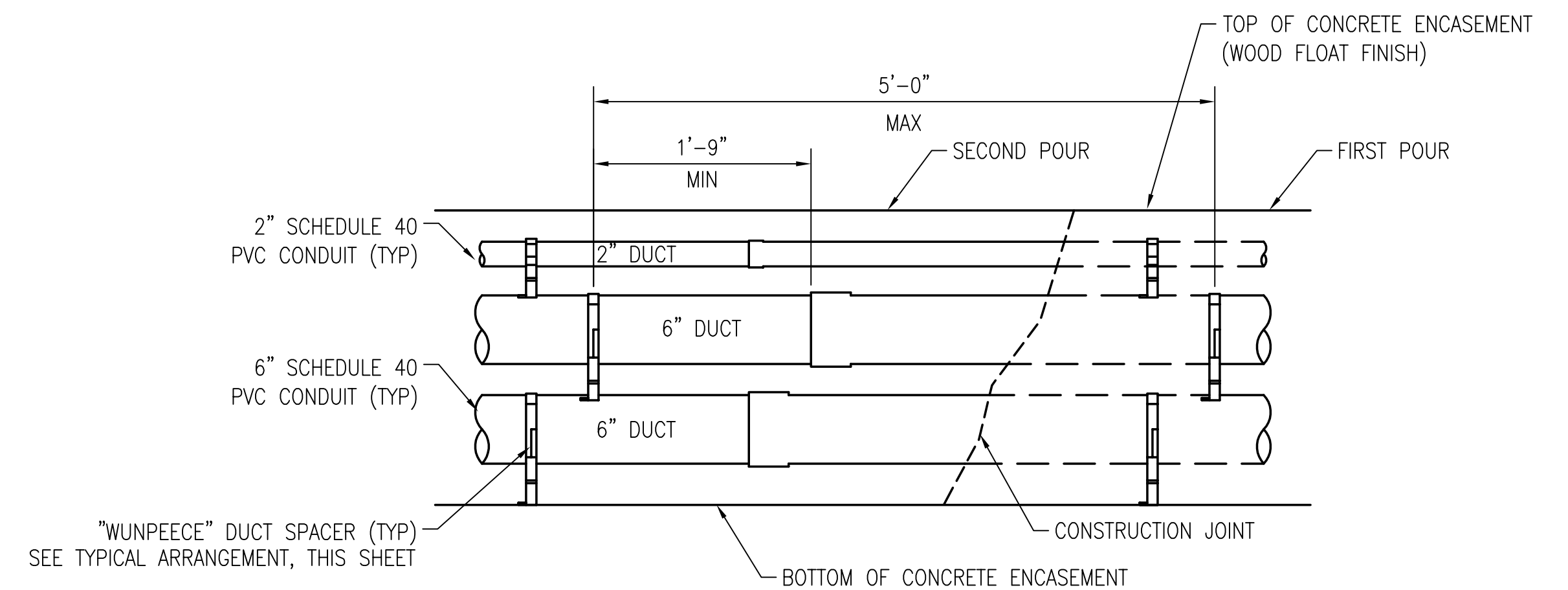
SECTION 'A' DUCT SPACER ELEVATION
SCALE 1" = 1'-0"



SECTION B
SCALE 1" = 1'-0" P&P's




SECTION 'B' DUCT SPACER ARRANGEMENT
SCALE 1" = 1'-0"




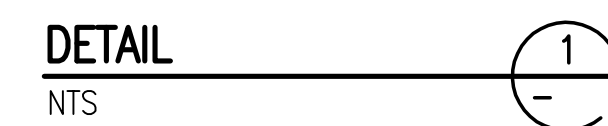
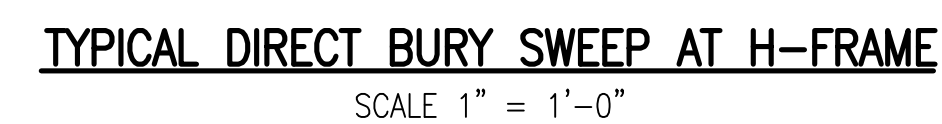
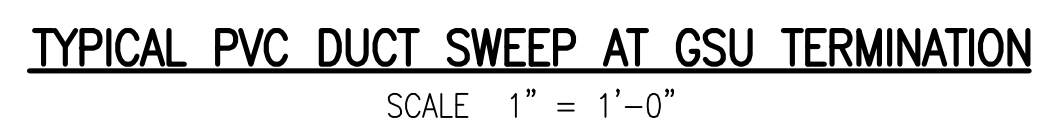
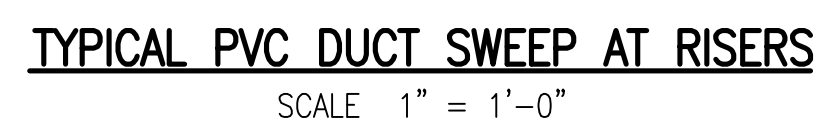
SECTION 'B' DUCT SPACER ELEVATION
SCALE 1" = 1'-0"

NOTES:

1. STAGGER BELL ENDS.
2. ANCHOR SPACERS WITH #14 STEEL TIE WIRE AND #4 REINFORCING BARS.
3. CEMENT ALL JOINTS IN ACCORDANCE WITH CONDUIT MANUFACTURER'S SPECIFICATIONS.
4. AVOID STANDING ON CONDUIT.
5. BELL ENDS SHALL BE INSTALLED ALL IN THE SAME DIRECTION.
6. ALL DUCT SPACERS ARE UNDERGROUND DEVICES "WUNPEECE" SPACERS, OR APPROVED EQUIVALENT.

									DSGN	BH	10/28/08	 POWER ENGINEERS www.powereng.com	BLYTHE ENERGY, LLC	JOB NUMBER	REV	
									DRN	BOQ	10/28/08			BLYTHE – JULIAN HINDS 230KV TRANSMISSION LINE	115210	<div>△</div> B
B	ISSUED FOR BID	03/11/09	BOQ	BJH	LRH				CKD	LH	10/28/08					
A	ISSUED FOR APPROVAL	02/12/09	BOQ	BJH	LRH		*	*	SCALE: AS SHOWN						DRAWING NUMBER	
REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD	REFERENCE DRAWINGS			FOR 22x34 DWG ONLY			DUCT BANK DETAILS	U0-1		

 POWER ENGINEERS www.powereng.com	BLYTHE ENERGY, LLC	JOB NUMBER	REV
	BLYTHE -- JULIAN HINDS 230KV TRANSMISSION LINE	115210	<div style="border: 1px solid black; width: 40px; height: 40px; display: flex; align-items: center; justify-content: center;"> <div style="border: 1px solid black; width: 20px; height: 20px; display: flex; align-items: center; justify-content: center;">B</div> </div>
	DUCT BANK DETAILS	DRAWING NUMBER	U0-2



1. STAGGER BELL ENDS.
2. ANCHOR SPACERS WITH #14 STEEL TIE WIRE AND #4 REINFORCING BARS.
3. CEMENT ALL JOINTS IN ACCORDANCE WITH CONDUIT MANUFACTURER'S SPECIFICATIONS.
4. AVOID STANDING ON CONDUIT.
5. BELL ENDS SHALL BE INSTALLED ALL IN THE SAME DIRECTION BETWEEN.

FOR 22x34 DWG ONLY



DRAWING NUMBER
U0-3

Blythe Energy Center Transmission Line Project
Request for Staff Approved Modification
(99-AFC-08T)
Response to Data Request

Attachment 1

Letter from Blythe Energy to California ISO requesting
written approval of GIS interconnection

**Blythe Energy, LLC
700 Universe Blvd.
Juno Beach, FL 33408**

December 27, 2010

Ms. Linda Wright
California Independent System Operator
151 Blue Ravine Road
Folsom, CA 95630

(via UPS overnight and LWright@CAISO.com)

Southern California Edison Company
Manager, Grid Contracts Administration and Billing (via UPS overnight)
P. O. Box 800
Rosemead, California 91770

Re: Blythe Energy, LLC
Notice pursuant to LGIA Section 5.19

Dear Ms. Wright and SCE Manager:

Blythe Energy, LLC ("Blythe") is pursuing modifications to its facilities which could impact either SCE facilities, CAISO facilities, or both. Pursuant to LGIA Section 5.19.1, Blythe is providing you with relevant data so that you may evaluate the potential impact to your respective systems.

As shown in the one-line diagram in LGIA Appendix A, Section 7, the Blythe Energy Project is connected to the CAISO at SCE's Julian Hinds substation using a 67-mile, 230kV generation tie line. The eastern terminus of the 67-mile tie line is the Buck Blvd 230kV Switchyard located adjacent to the Blythe Energy Project. This switchyard is owned by Western Area Power Administration but is currently used by Blythe pursuant to a license agreement which expires on May 31, 2013.

The proposed modification is to replace the Buck Blvd 230kV Switchyard with a 230kV gas insulated substation ("GIS") to be located immediately adjacent to the existing Buck Blvd Switchyard. Please note that the Blythe transmission line was previously studied and approved by SCE and CAISO with the GIS configuration as currently contemplated.

I have enclosed herewith two diagrams which depict the proposed modification. Please contact me at your earliest convenience to identify the specific people who will review this information, and please advise as soon as possible what additional information is needed by SCE and CAISO to effectuate a timely review of the proposed modifications. I can be reached at 561-304-5126.

Sincerely,



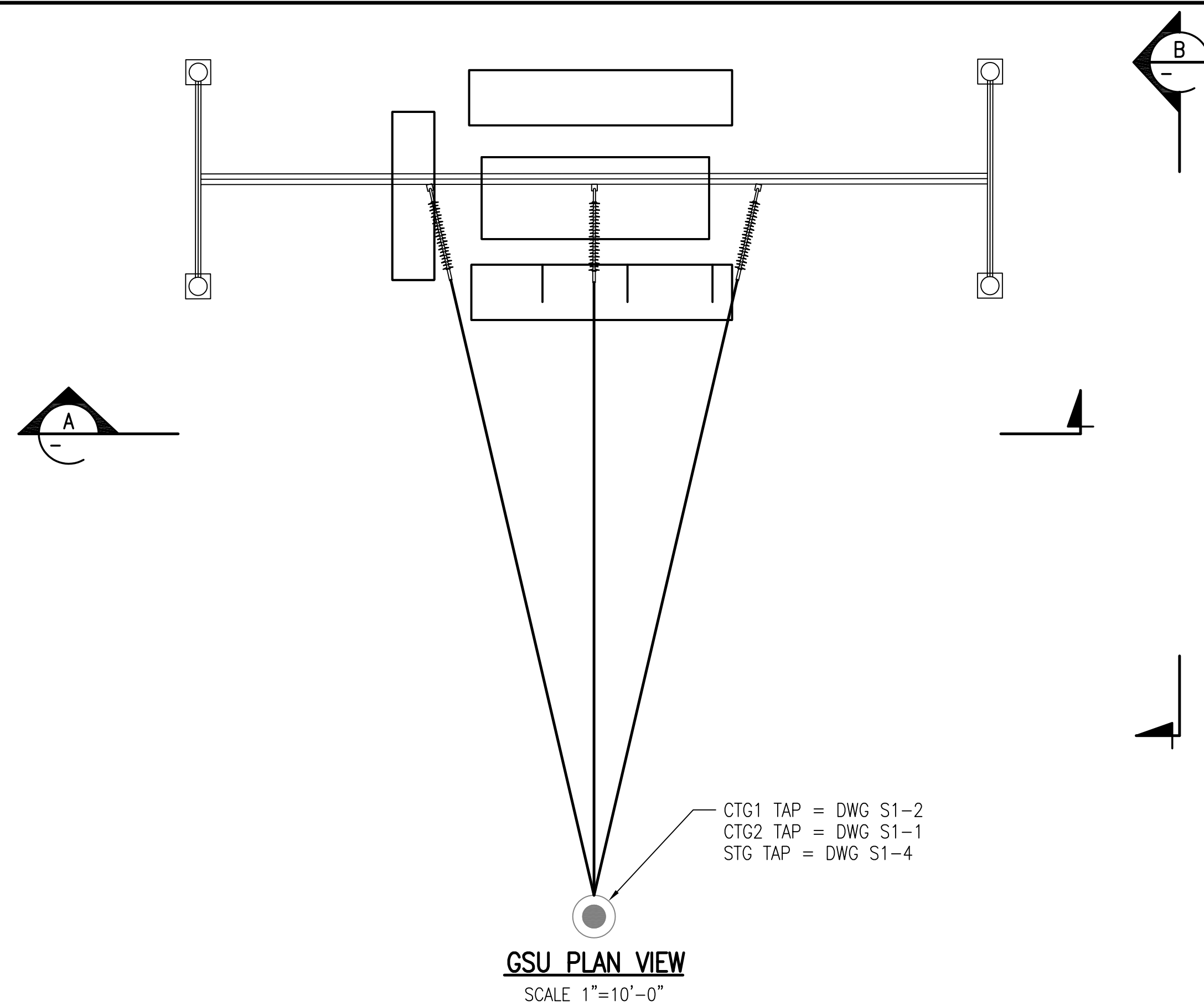
John Goodwin
Business Director
Blythe Energy, LLC

cc: Gary Hickey, NextEra Energy (gary.hickey@nexteraenergy.com)
John Tucker, SCE (john.tucker@sce.com)
Michael Boas, CAISO (mBoas@caiso.com)

Blythe Energy Center Transmission Line Project
Request for Staff Approved Modification
(99-AFC-08T)
Response to Data Request - Revised 2/8/11

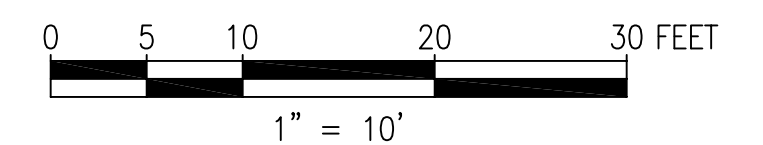
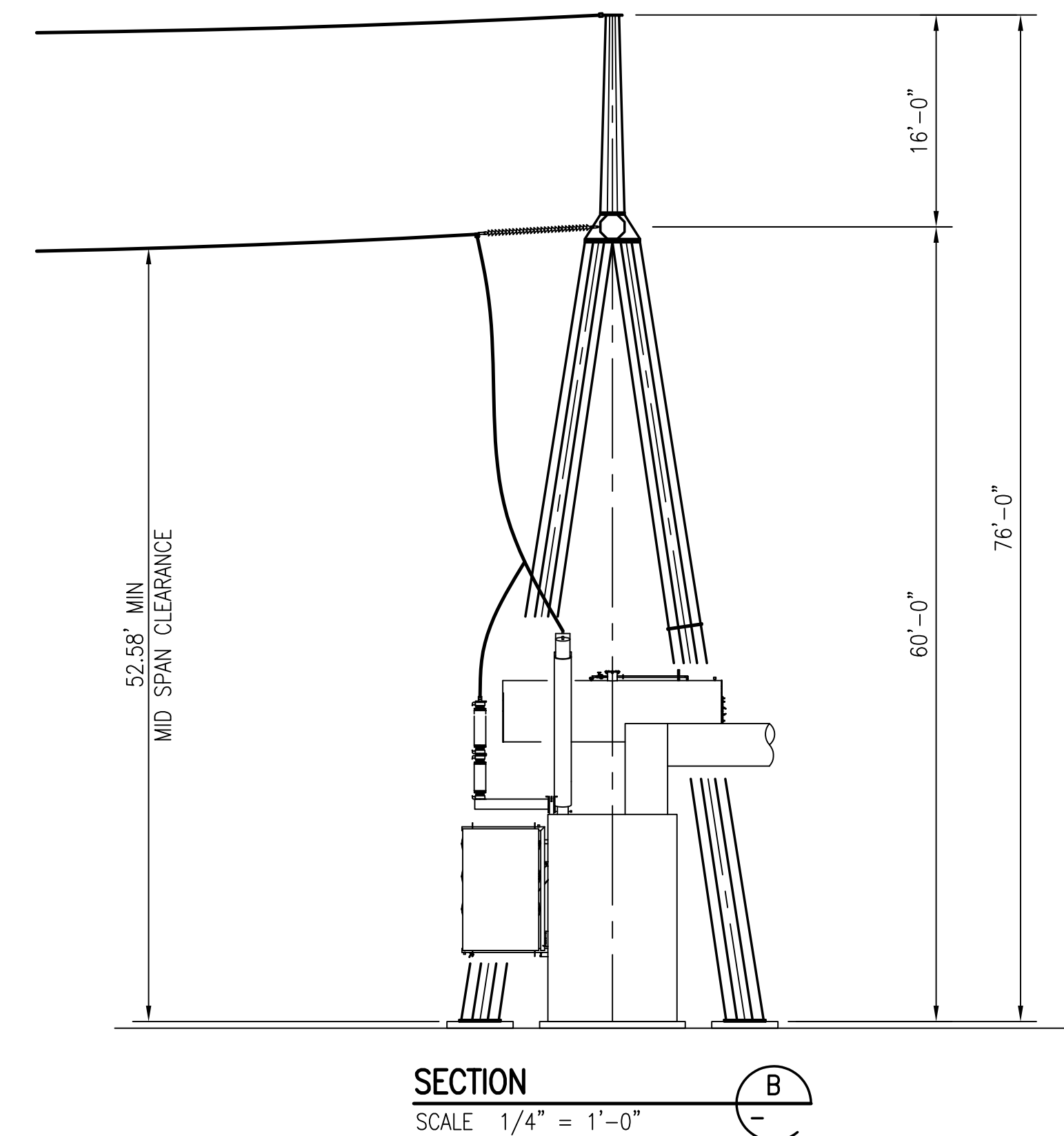
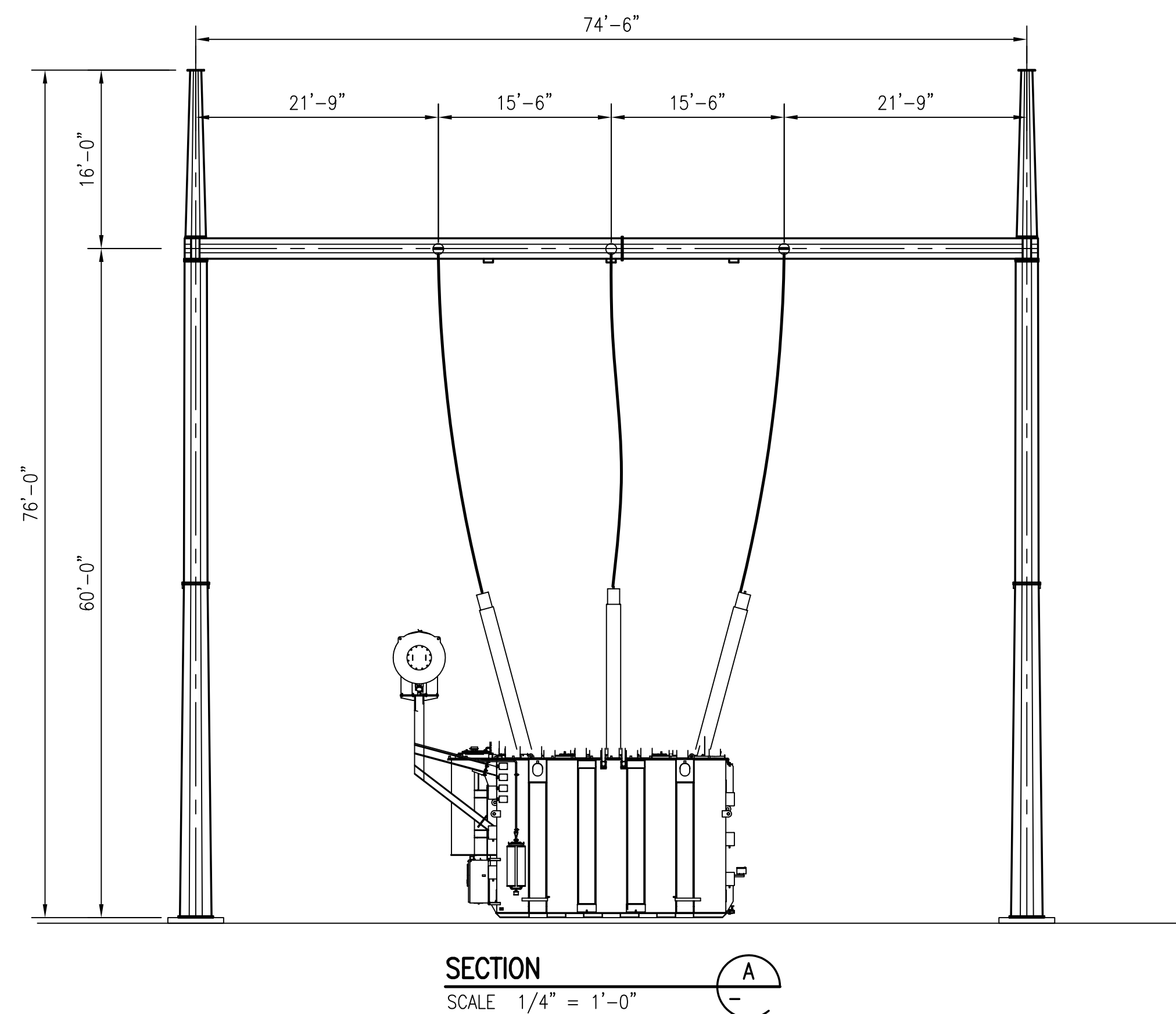
Figure 6

Dimensioned plan and section views of GSU tap
interconnection



NOTE

1. THIS ARRANGEMENT APPLIES TO CTG1, CTG2 & STG INSTALLATIONS.

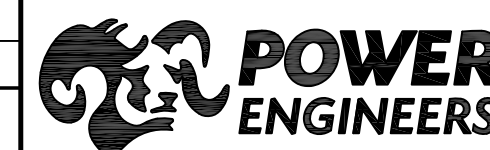


E1-3.DWG

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A	ISSUED FOR CEC PERMITTING	02/08/11	CA	DL					
REV	REVISIONS	DATE	DRN	DSGN	CKD	APPD		REFERENCE	DRAWINGS

DSGN	DL	2-8-11
DRN	CA	2-8-11
CKD		
SCALE:		1"=10'-0"
FOR 22x34 DWG ONLY		



BLYTHE ENERGY, LLC
BLYTHE PLANT GSU-GIS OH
230KV TRANSMISSION LINE

GSU PLAN & SECTIONS

JOB NUMBER 117573	REV 
DRAWING NUMBER E1-3	