PANEL EQUIPMENT

BILL OF MATERIAL					
ITEM	QUANTITY	DESCRIPTION			
A	1	MAIN CIRCUIT BREAKER, 2 POLE, 600 VOLT 100 AMP. FRAME, 100 AMP. NON-INTERCHANGEABLE TRIP INTERRUPTING RATING NEMA-22000 AMP. AT 480 VOLT.			
В	1	REMOTE CONTROL SWITCH, ELECTRICALLY OPERATED, MECHANICALLY HELD, 2 POLE, SINGLE THROW, 100 AMP., 600 VOLTS CONTROL CIRCUIT 240 VOLT.			
С	8	CIRCUIT BREAKERS, 1 POLE, 100AMP. FRAME, 50 AMP. NON-INTERCHANGEABLE TRIP INTERRUPTING RATING NEMA-10,000 AMP. AT 240 V.			
D	2	CONTROL CIRCUIT-CIRCUIT BREAKER. 1 POLE, 240 V., 100 AMP. FRAME, 15 AMP. NON-INTERCHANGEABLE TRIP INTERRUPTING RATING NEMA-5000 AMP. AT 240 V.			
Ε	1	ASTRONOMIC MICROPROCESSOR-BASED 2-CHANNEL CONTROLLER [TIME SWITCH].			
F	1	20 A., 120 V. FUSE.			
G	1	1.5 KVA, SINGLE PHASE, ENCAPSULATED TRANSFORMER 240 X 480 / 120 X 240 VOLT, 60 Hz.			
Н	1	SPST 20A SWITCH ON DOOR, TO TURN LIGHT ON WHEN DOOR IS OPEN,			
I	1	INCANDESCENT LIGHTING FIXTURE ENCLOSED AND GASKETED WITH 60 WATT, 120 V. LAMP.			
J	1	20 A., 120 V., DUPLEX RECEPTACLE, GFCI.			
К	1	COPPER GROUND BUS $\frac{1}{4}$ " (6.35) X 1" (25.4) X 12" (304.8 mm) LONG MOUNTED ON PANEL WITH LUGS AND 4 SPARE LUGS			
L	1	TOGGLE SWITCHES MOUNTED IN 4" (101.6) X 4" (101.6 mm) BOX.			
М	1	COPPER GROUND BUS $\frac{1}{4}$ " (6.35) X 1" (25.4) X 12" (304.8 mm) LONG MOUNTED ON PANEL WITH LUGS AND SPARE LUGS			

NOTES:

- 1. ALL DIMENSIONS ARE IN INCHES (MILLIMETERS) UNLESS OTHERWISE SHOWN.
- 2. FOUNDATION SIZE SHALL BE COORDINATED WITH CABINET SIZE AND MFR.
- 3. IN FRONT OF CONTROL CABINET DOOR, REMOVE VEGETATION AND 2" (50.8 mm) TOP SOIL, LEVEL THE 12. ALL WIRING WITHIN THE CABINET SHALL BE TO CONTROL CABINET, A CONCRETE PAD 36" (914.4 mm) x 60" (18.288 m) x 4" (101 mm) MIN. SIZE. THE COST OF LABOR AND MATERIALS ARE INCLUDED IN THE COST OF THE CONTROLLER.
- 4. DOOR SHALL BE CONSTRUCTED FROM SAME TYPE OF MATERIAL AND THICKNESS AS CABINET.
- 5. DOOR SHALL BE EQUIPPED WITH THREE POINT LATCHING MECHANISM WITH NYLON ROLLERS AT TOP THE BOTTOM.
- 6. DOOR HINGE SHALL BE A HEAVY GAUGE CONTINUOUS HINGE WITH A 1/4" (6.35 mm) DIA. STAINLESS STEEL HINGE PIN.
- 7. ALL EXTERNAL HARDWARE SHALL BE STAINLESS STEEL.
- 8. CONTROL WIRING TO BE #12 AWG, 600V, TYPE "SIS" GRAY SWITCH BOARD WIRE, STRANDED COPPER.
- 9. METER BOX SHALL BE MOUNTED ON THE SIDE OF CONTROL CABINET, NEAR TO THE SERVICE POLE.

- 10. CABINETS SHALL BE PRIMED AND PAINTED AS SPECIFIED.
- 11. THE HEADS OF CONNECTORS SCREWS SHALL BE PAINTED WHITE FOR NEUTRAL BAR CONNECTION AND GREEN FOR GROUND BAR CONNECTORS.
- COLOR CODED AS INDICATED.

 R = RED BL = BLUE W = WHITE B = BLACK Y = YELLOW G = GREEN
- 13. PROVIDE SEALING GROMMETS FOR ALL OPEN WIRING EXTENDED FROM DEVICES IN BOXES OR CABINETS WITHIN THE CONTROL CABINET.
- 14. ALL WIRING SHALL BE NEATLY DRESSED AND SUPPORTED.
- 15. THE CONTROLLER SHALL BE CONSTRUCTED TO U.L. STD. 508 AND BEAR THE U.L. LABEL "ENCLOSED INDUSTRIAL CONTROL PANEL".
- 16. 12" (304.8) X 16" (406.4 mm) STAINLESS STEEL EXTERIOR NAMEPLATE SHALL BE ENGRAVED TO "STATE OF ILLINOIS LIGHTING CONTROLS" UNLESS OTHERWISE SPECIFIED.

FOR INFORMATION ONLY

NEMA 3R	/- METER AND BASE	<u> </u>	
ENCLOUSERE NIM OG OG OG OG OG OG OG OG OG O		3 POINT LOCKING HANDLE WITH PAD LOCK PROVISION	
CABINET ALUMINUM	2½" (63.5) GALV. STEEL CONDUIT	CONCRETE	ANCHOR RODS, 4 MIN. COORD, WITH CABINET MFR. REOUIREMENTS
ALLOY SHEET	GROUND LINE 7	CONCRETE WORK PAD SEE NOTE 3	12. II
1" (25) DIA.	4" (101) DIA. PVC RACEWAYS 6-MIN. COORD. WITH CKT	60" (1,52 m)	
	REQUIREMENTS		30,,
GROUND ROD		<u> </u>	21" MIN. (533,4)

FILE NAME =	USER NAME = gaglianobt	DESIGNED -	REVISED - 08-20-04			
W:\diststd\22x34\be215.dgn		DRAWN -	REVISED -	STATE OF ILLINOIS		
	PLOT SCALE = 50.0000 '/ IN.	CHECKED -	REVISED -	DEPARTMENT OF TRANSPORTATION		
	PLOT DATE = 1/4/2008	DATE -	REVISED -		SCALE: NON	

AUXILIARY CIRCUIT BREAKER

(H)

¼" (6.35) MINIMUM

MOUNTING PANEL.

NON-ASBESTOS INORGANIC NONCONDUCTING MATERIAL

-CABINET ENCLOSURE

3-1/C SERVICE ENTRANCE

UTILITY METER BOX

240/480 VOLT, 10,3

WIRES, 60 CYCLES.

GROUNDING CONDUCTOR #2 AWG.

SCREENED AIR VENT-

MAIN BREAKER

(C)

(POWER)

,-----

AUXILIARY -

CONTROL RELAY (IF NECESSARY)

(K)

BONDING JUMPER —

GROUND ROD 5/8" (15.875)

DIA. × 10' (3.048 m) LONG

PANEL WIRING DIAGRAM

■6 AWG. 600V

0

TWO POSITION TOGGLE SWITCH

TOGGLE SWITCH MOMENTARY CONTACT TYPE SPDT 20 A. 240V AC AND TOGGLE SWITCH 20A, 240V, TYPE SPDT

LIGHTING CONTROLLER SINGLE DOOR				F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.	
					•	2013-038B-R	COOK	821	238
				BE-215		CONTRACT	NO.	60J16	
SHEET NO. 1	OF 1	SHEETS	STA.	TO STA.	FED. RO	DAD DIST. NO. 1 ILLINOIS FED. AL	D PROJECT		