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# COX

Research and Technology, Inc.

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## DUPLEX PUMP CONTROL PANEL GAINSVILLE

Cox Research and Technology, Inc.  
14697 S. Harrells Ferry Road  
Baton Rouge, LA. 70816  
(225) 756-3271 Fax (225) 755-1030

VOLTAGE	277/480V	(480V, 277/480V, 240V, 120/240V, 208V, 120/208V)
PHASE/HZ	3/60	
NO. MOTORS		
HP		
FLA		
TYPE OF PUMP		(Self-Priming, Submersible)
MANUFACTURER		
CATALOG NUMBER		
CONTROL VOLTAGE	120V	(120V, Other)
ENCLOSURE	NEMA 4X	(NEMA 1, NEMA 3R, NEMA 4, NEMA 4X)
ENCLOSURE MATERIAL	Stainless Steel	(Painted Steel, Stainless Steel, Fiberglass)
CONTROL SENSOR	Floats	(Floats, Bubbler, Other)
CAPACITORS	No	(Yes, No)
CAPACITOR WIRING FIGURE	N/A	
THERM. & SEAL FAIL WIRING FIGURE		

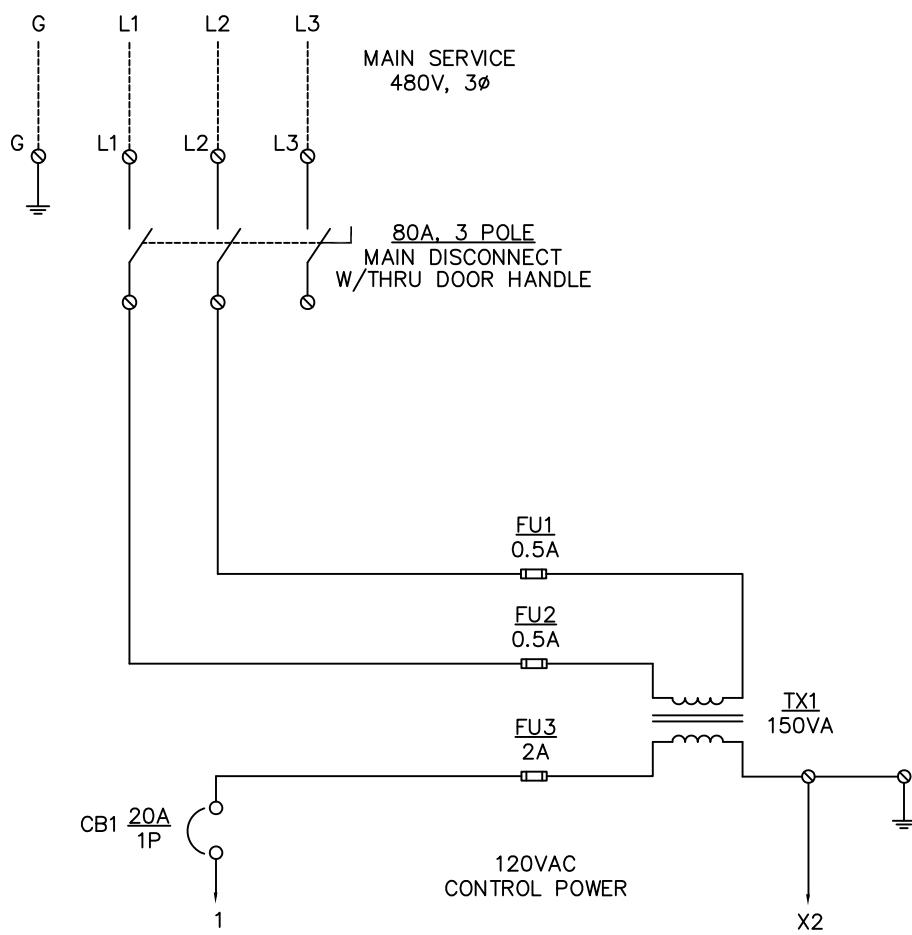
OPTIONS:

SEAL FAIL LIGHTS		(Submersible Only)
SEAL FAIL RELAYS		(Submersible Only)
SEAL FAIL PUMP SHUTDOWN		(Submersible Only)
HT PUMP SHUTDOWN		(Self-Primer, Submersible)
ALARM HORN		
ALARM LIGHT		
LIGHT PANEL MTD		
LIGHT REMOTE MTD		
LIGHT FLASHER		
LIGHTNING ARRESTER		
ELAPSED TIME METER		
PHASE MONITOR		
NEMA RATED STARTERS		
GROUND FAULT RECPT.		
GREEN RUN LIGHTS VS. RED		
POLE, BOX, SEAL		
INTRINSICALLY SAFE RELAYS		
HIGH TEMP. LOCKOUT, MANUAL RESET		
ECONOMY VERSION		

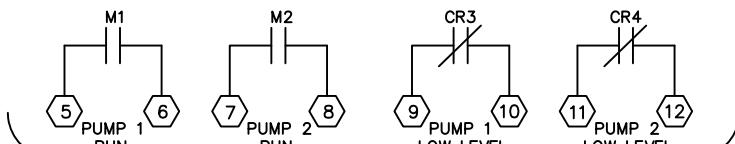
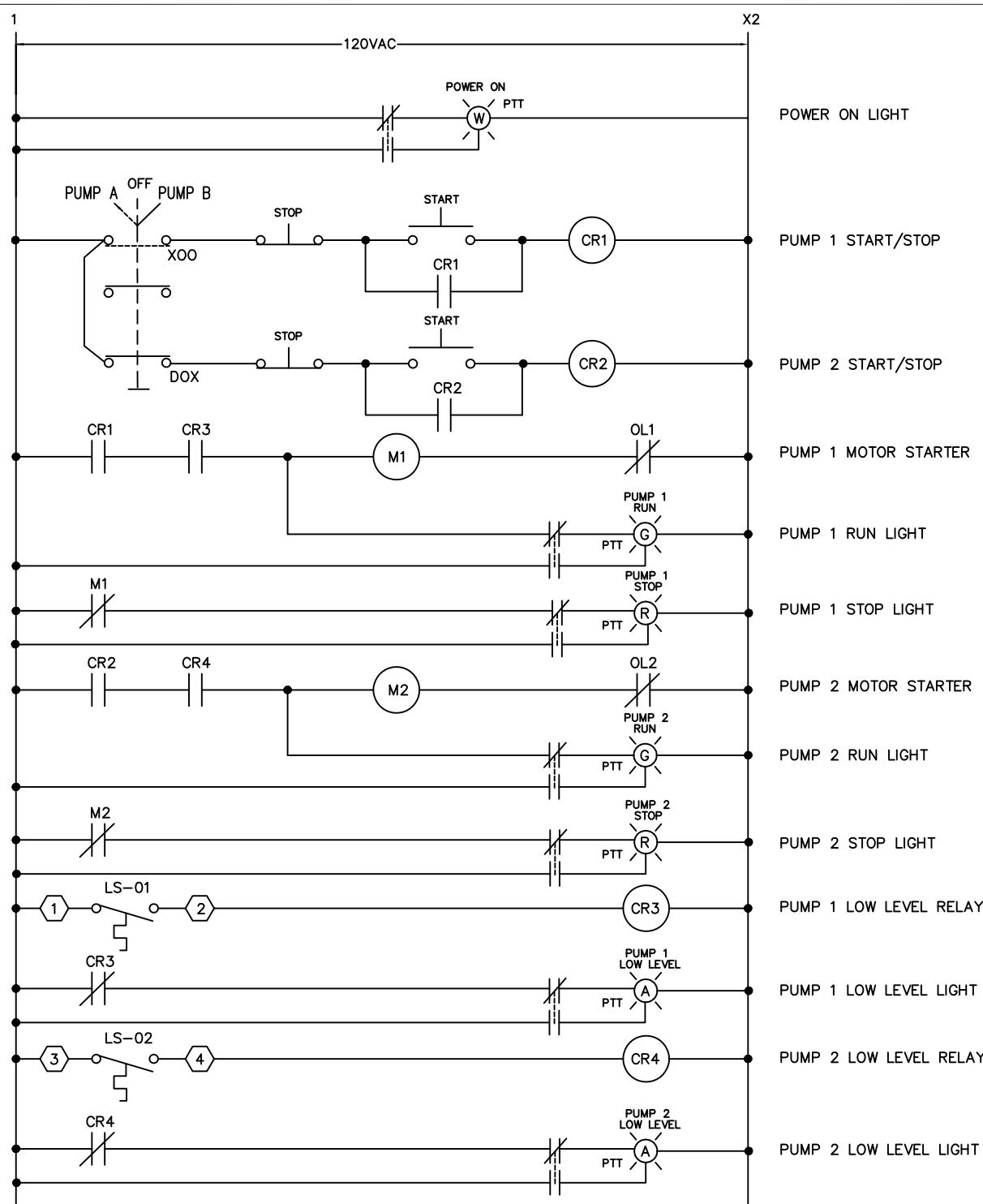
SOLD TO: CF ENGINEERED EQUIPMENT - DALLAS, TX  
TAG : GAINSVILLE

SHIP TO: CF ENGINEERED EQUIPMENT - DALLAS, TX

DATE 6/19/03	Drawing Title  PANEL DESCRIPTION								
		REFERENCE DRAWING		NO.	REVISION-LOCATION		ECN	DATE	BY
S/N	Sales Engineer C.C.	Application Engineer R.C.	DRAWN BY C. RACHAL	APPROVED BY					
					P.O. Box 77808 Baton Rouge, LA 70809			PURCHASE ORDER NUMBER	
					Ph. (225)756-3271 Fax (225)756-1030			DRAWING NUMBER	
								CP-1588	
								SHEET NUMBER	
								1	



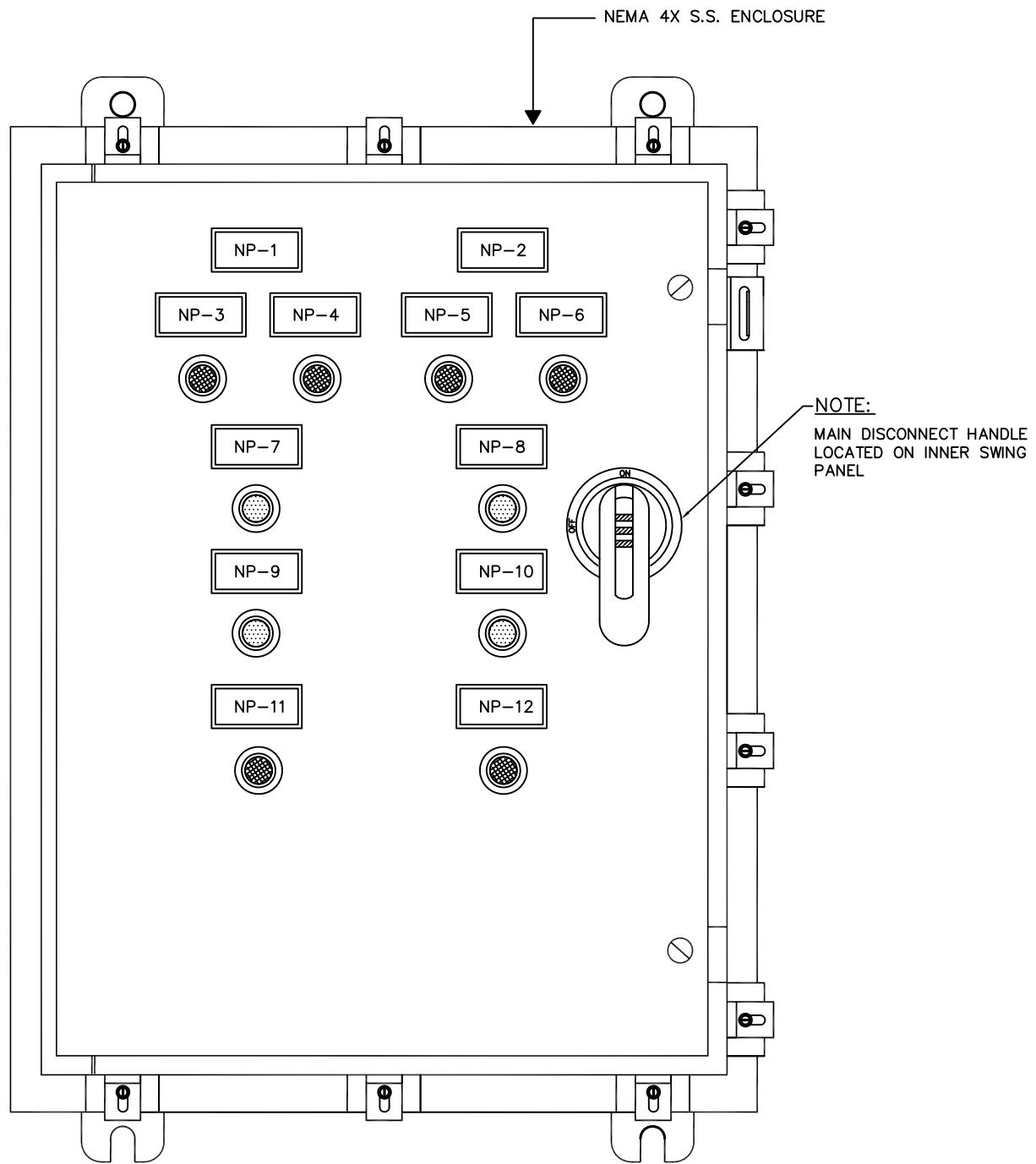
	Drawing Title  <b>POWER DIAGRAM</b>				
DATE 6/19/03	REFERENCE DRAWING S/N	NO. Sales Engineer C.C.	REVISION-LOCATION DRAWN Application Engineer R.C.	ECN	DATE APPROVED BY
Project Title  <b>DUPLEX PUMP CONTROL PANEL</b>	<b>COX</b> Research and Technology, Inc.	P.O. Box 77808 Baton Rouge, LA 70809	PURCHASE ORDER NUMBER		
		Ph. (225)756-3271 Fax (225)756-1030	DRAWING NUMBER CP-1588		
			SHEET NUMBER 2		



- \* ALL CONTROL WIRING TO BE MTW (SEE ATTACHED CUT SHEET)
- \* WIRE CHASES TO BE USED
- \* EACH WIRE LABELED WITH HEAT SHRINK LABELS

TO FUTURE SCADA

	Drawing Title  CONTROL DIAGRAM							
DATE 6/19/03	REFERENCE DRAWING		NO.	REVISION-LOCATION		ECN	DATE	BY
	S/N	Sales Engineer C.C.	Application Engineer R.C.	DRAWN BY C. RACHAL		APPROVED BY	DATE	
	Project Title  DUPLEX PUMP CONTROL PANEL		<hr/> <hr/> <b>COX</b> <hr/> <hr/> Research and Technology, Inc. <hr/> <hr/>		P.O. Box 77808 Baton Rouge, LA 70809	PURCHASE ORDER NUMBER		
					Ph. (225)756-3271 Fax (225)756-1030	DRAWING NUMBER CP-1588		
						SHEET NUMBER 3		



### VIEW OF SWING OUT PANEL

\* PLASTIC DRAWING POCKET  
TO BE INSTALLED ON DOOR

\* U.L. LABEL INSTALLED ON DOOR

**NOTE:**  
SEWER GASES WILL DESTROY COMPONENTS IN PANEL.  
PROPER SEALS MUST BE INSTALLED EXTERNAL TO THE  
PANEL TO PREVENT ENTRY OF GASES.

### NAMEPLATE SCHEDULE

NP-1	PUMP 1
NP-2	PUMP 2
NP-3	OFF
NP-4	ON
NP-5	OFF
NP-6	ON
NP-7	START
NP-8	START
NP-9	STOP
NP-10	STOP
NP-11	LOW LEVEL
NP-12	LOW LEVEL

	Drawing Title					
	ENCLOSURE					
		REFERENCE DRAWING	NO.	REVISION-LOCATION	ECN	DATE BY
DATE 6/19/03	S/N	Sales Engineer	Application Engineer	DRAWN BY C. RACHAL	APPROVED BY	DATE
	C.C.	R.C.				
	Project Title	<hr/> <hr/> <hr/> <b>COX</b> <hr/> <hr/>			PURCHASE ORDER NUMBER	
	DUPLEX PUMP CONTROL PANEL	Research and Technology, Inc.			DRAWING NUMBER	CP-1588
					SHEET NUMBER	4

# BILL OF MATERIALS

ITEM	QTY	MANUFACTURER	PART NO.	DESCRIPTION
1	1	EBE	S201610N4X	ENCLOSURE STAINLESS 4X
1a	1	EBE	A2016P	BACKPLATE
1b	1	EBE	A2016SP	INNER SWING PANEL
2	1	ABB	OT63E3	MAIN DISC. SWITCH
3	1	TIMEMARK	261DT120	ALTERNATING RELAY
4	2	ACI	JR22BL11R	RED PILOT LIGHT
5	4	ACI	JR22AN11B	PUSH BUTTONS
6	1	SQUARE D	9070TF150D1	TRANSFORMER
7	1	AC/DC	BL5-R-120	ALARM LIGHT
8	2	ACI	JR22BL11Y	AMBER PILOT LIGHT PTT
9	1	ACI	JR22BL11W	WHITE PILOT LIGHT PTT
10	2	ACI	JR22BL11G	GREEN PILOT LIGHT PTT
11	4	OMRON	MK3PN5SAC120	CR1-4
12	1	SQUARE D	QOU120	CB3
13	1	ABB	OHB65L5	THRU DOOR HANDLE
14	1	ABB	OXP5X265	SHAFT
15				
16				
17				
18				
19				
20				
21				
22				
23				
24				

	Drawing Title						
	BILL OF MATERIALS						
DATE 6/19/03	REFERENCE DRAWING S/N	NO. C.C.	REVISION-LOCATION DRAWN BY C. RACHAL	ECN	DATE APPROVED BY DATE		
Project Title DUPLEX PUMP CONTROL PANEL	COX Research and Technology, Inc.			P.O. Box 77808 Baton Rouge, LA 70809	PURCHASE ORDER NUMBER DRAWING NUMBER CP-1588 SHEET NUMBER 5		