
COX

Research and Technology, Inc.

DUPLEX PUMP CONTROL PANEL GEORGE BUSH TURNPIKE

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 | 2 | |
| HP | 2.1 | |
| FLA | 3.32 | |
| TYPE OF PUMP | Submersible | (Self-Priming, Submersible) |
| MANUFACTURER | ABS | |
| CATALOG NUMBER | | |
| | | |
| CONTROL VOLTAGE | 120V | (120V, Other) |
| ENCLOSURE | NEMA 4X | (NEMA 1, NEMA 3R, NEMA 4, NEMA 4X) |
| ENCLOSURE MATERIAL | Fiberglass | (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 | | |

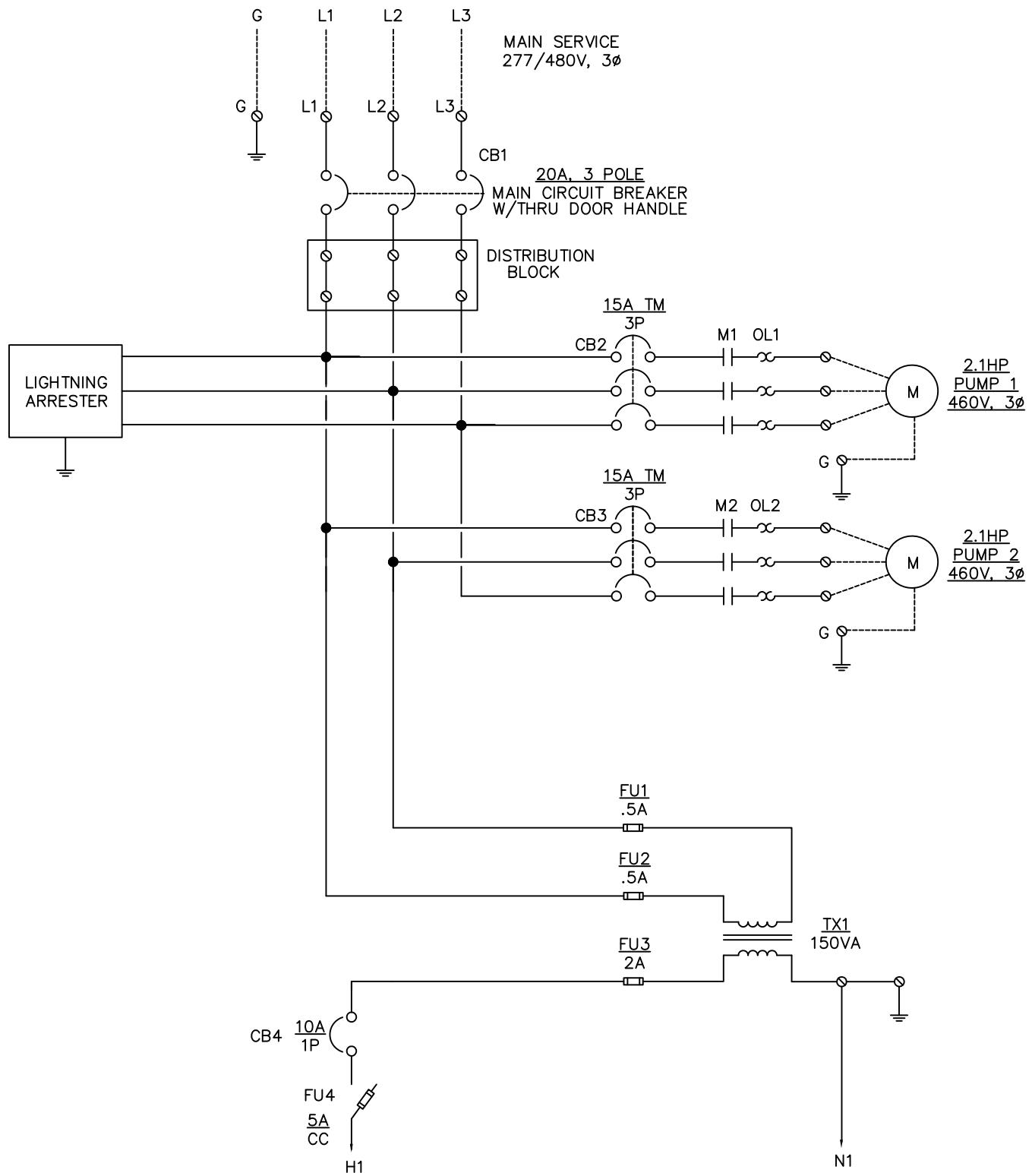
OPTIONS:

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

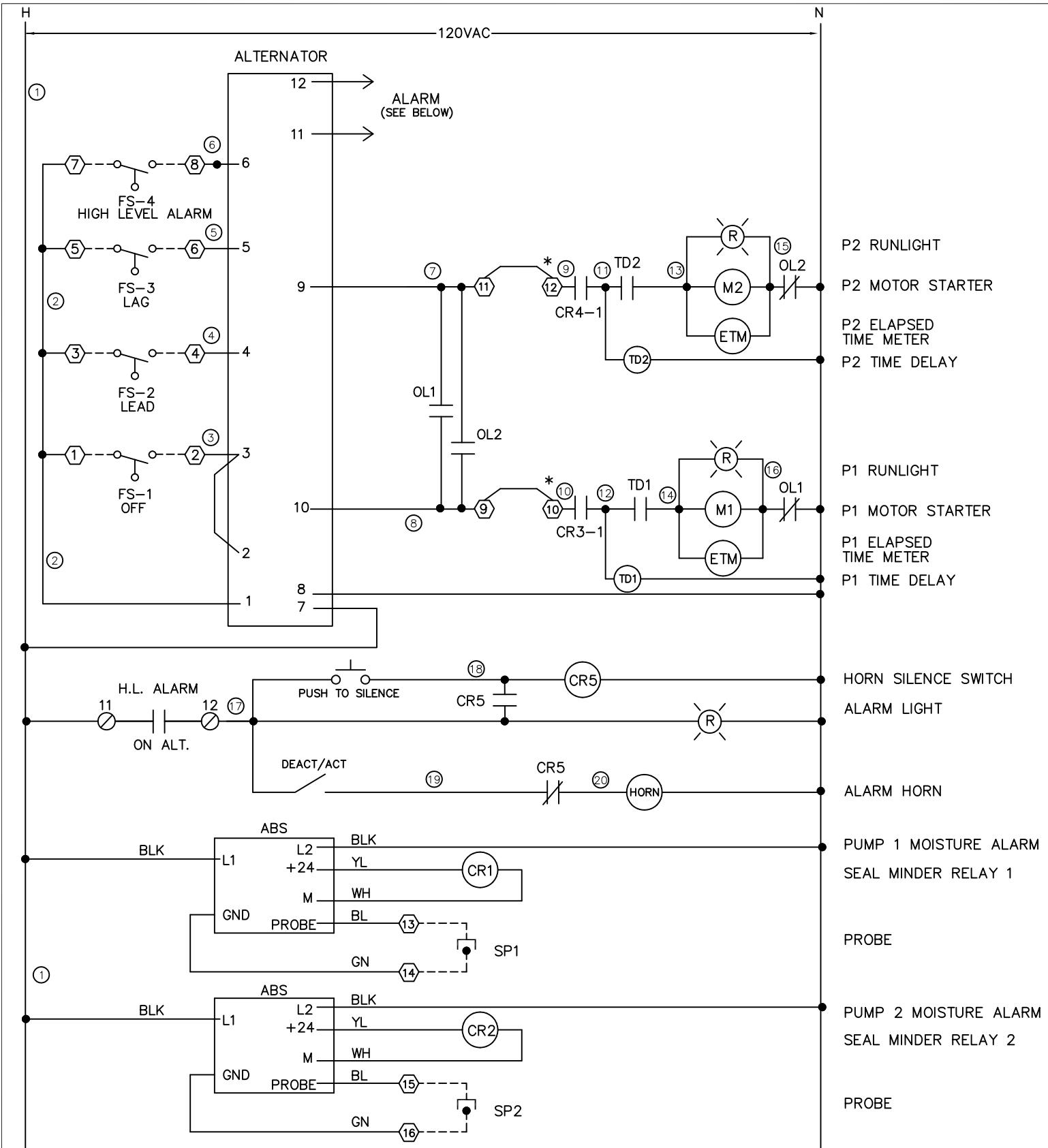
SOLD TO: CF ENGINEERED EQUIPMENT
 TAG : GEORGE BUSH TURNPIKE

SHIP TO: DALLAS, TX

| | Drawing Title | | | | | | | |
|-----------------|------------------------------|--------------------------------------|----------------------|--|-------|-----------------------|-------------------|----------|
| | PANEL DESCRIPTION | | | | | | | |
| | | | REFERENCE DRAWING | | NO. | REVISION-LOCATION | | ECN |
| DATE 6/03/03 | S/N | Sales Engineer | Application Engineer | | DRAWN | BY C. RACHAL | BY | APPROVED |
| | C.C. | | R.C. | | | | DATE | BY |
| | Project Title | COX Research and Technology, Inc. | | P.O. Box 77808 Baton Rouge, LA 70809 Ph. (225)756-3271 Fax (225)756-1030 | | PURCHASE ORDER NUMBER | | |
| | DUPLEX PUMP CONTROL PANEL | | | DRAWING NUMBER CP-1575 | | | SHEET NUMBER 1 | |

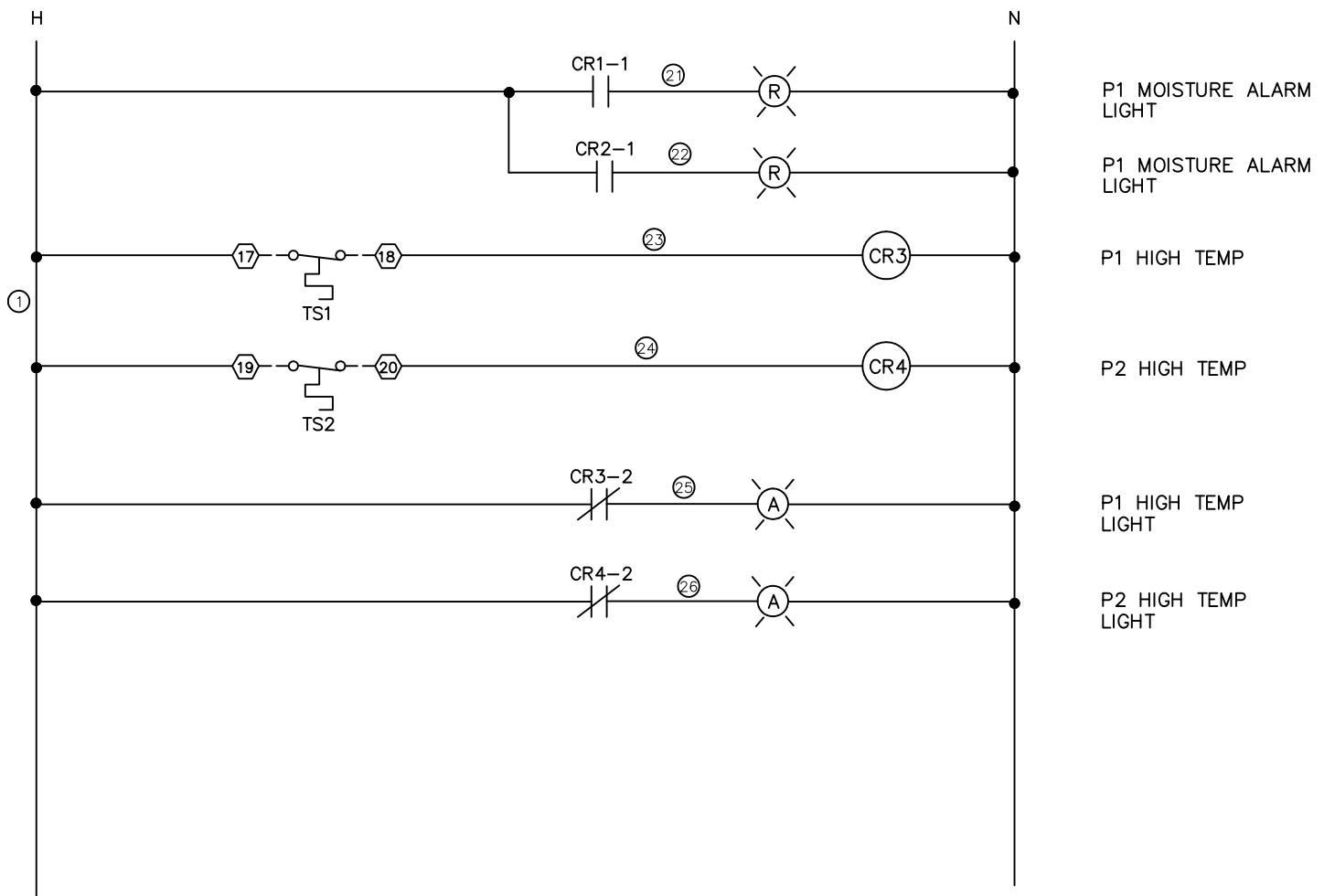


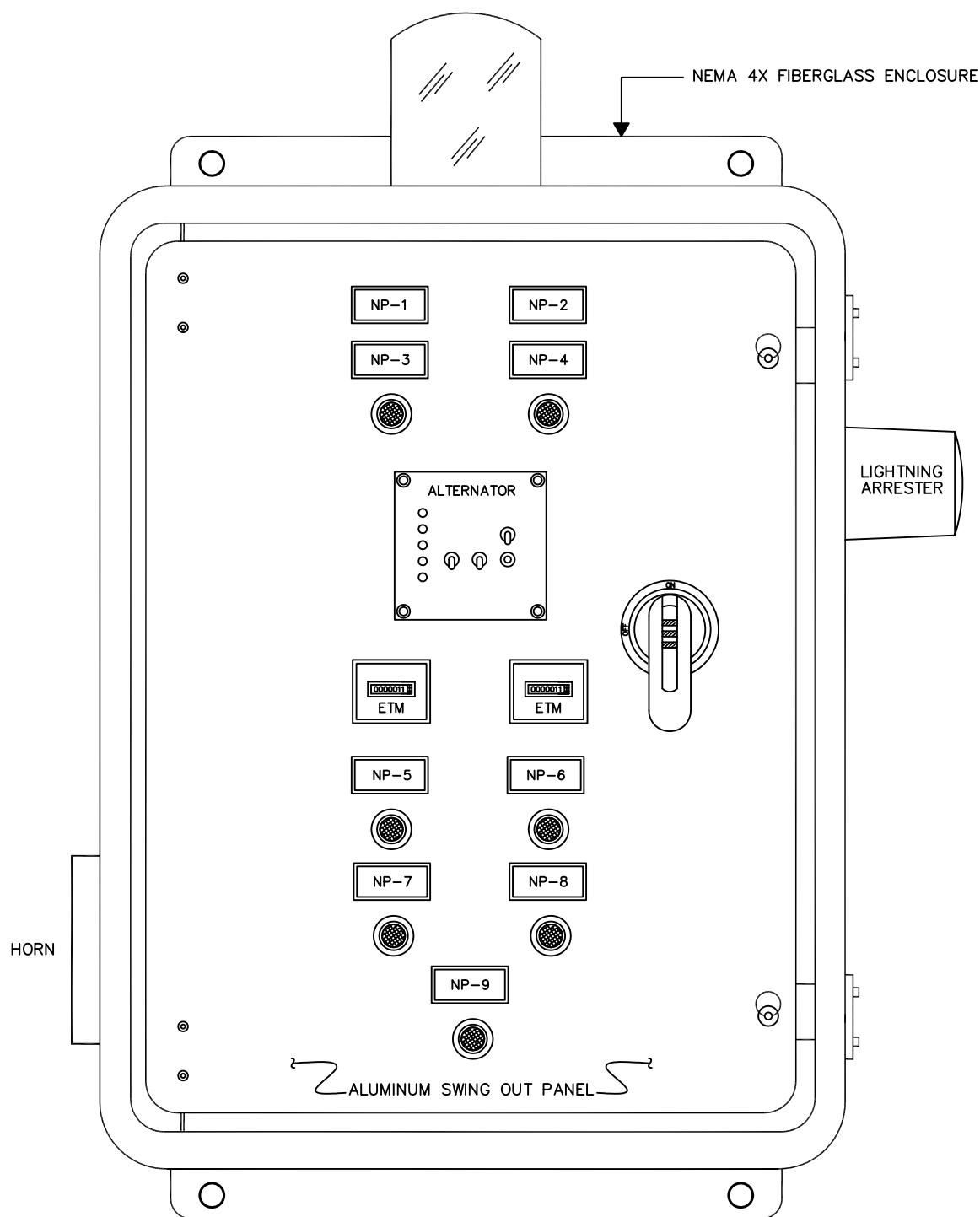
| | | | | | |
|-----------------|---|---|--|---|----------------------------|
| | Drawing Title POWER DIAGRAM | | | | |
| | | REFERENCE DRAWING S/N | NO. Sales Engineer C.C. | REVISION-LOCATION DRAWN BY C. RACHAL | ECN APPROVED BY DATE |
| DATE 6/03/03 | | Application Engineer R.C. | | | |
| | Project Title DUPLEX PUMP CONTROL PANEL | COX Research and Technology, Inc. | P.O. Box 77808 Baton Rouge, LA 70809 Ph. (225)756-3271 Fax (225)756-1030 | PURCHASE ORDER NUMBER DRAWING NUMBER CP-1575 SHEET NUMBER 2 | |



* REMOVE JUMPERS AND INSTALL LOCKOUT DEVICES IF REQUIRED

| | | | | | | | | |
|-----------------|--------------------------------------|------------------------|--|-----------------------|--|----------------|---------------------------|------|
| | Drawing Title CONTROL DIAGRAM | | | | | | | |
| | | | | | | | | |
| | | | | | | | | |
| DATE 6/03/03 | | REFERENCE DRAWING | | NO. | REVISION-LOCATION | | ECN | DATE |
| | S/N | Sales Engineer C.C. | Application Engineer R.C. | DRAWN BY C. RACHAL | | APPROVED BY | | DATE |
| | Project Title | | <hr/> <hr/> COX <hr/> <hr/> Research and Technology, Inc. | | P.O. Box 77808 Baton Rouge, LA 70809 | | PURCHASE ORDER NUMBER | |
| | DUPLEX PUMP CONTROL PANEL | | | | | | | |
| | | | | | | | DRAWING NUMBER CP-1575 | |
| | | | | | | | SHEET NUMBER 3 | |





VIEW OF SWING OUT PANEL

NAMEPLATE SCHEDULE

| | |
|------|--------------|
| NP-1 | PUMP 1 |
| NP-2 | PUMP 2 |
| NP-3 | RUN |
| NP-4 | RUN |
| NP-5 | MOISTURE |
| NP-6 | MOISTURE |
| NP-7 | HIGH TEMP |
| NP-8 | HIGH TEMP |
| NP-9 | HORN SILENCE |

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

| | Drawing Title | | | | | |
|-----------------|------------------------------|--|----------------------|-------------------|---------------------------|---------|
| | ENCLOSURE | | | | | |
| | | REFERENCE DRAWING | NO. | REVISION-LOCATION | ECN | DATE BY |
| DATE 6/03/03 | S/N | Sales Engineer | Application Engineer | DRAWN | APPROVED | |
| | | C.C. | R.C. | BY C. RACHAL | BY DATE | |
| | Project Title | <hr/> <hr/> <hr/> COX <hr/> <hr/> | | | PURCHASE ORDER NUMBER | |
| | DUPLEX PUMP CONTROL PANEL | Research and Technology, Inc. | | | DRAWING NUMBER CP-1575 | |
| | | | | | SHEET NUMBER 5 | |

BILL OF MATERIALS

| ITEM | QTY | MANUFACTURER | PART NO. | DESCRIPTION |
|------|-----|--------------|--------------|------------------------------|
| 1 | 1 | ALLIED | AM24200RL | ENCLOSURE |
| 1a | 1 | ALLIED | A2420P | BACKPLATE |
| 1b | 1 | ALLIED | A2420SP | DEAD FRONT |
| 2 | 1 | ABB | S1N020TL | CB1 |
| 3 | 2 | ABB | A16-30-10-84 | MOTOR STARTER |
| 4 | 2 | ABB | TA25DU4.0 | O.L. RELAY (2.8-4.0A) |
| 5 | 2 | ABB | S1N015TL | CB2, CB3 |
| 6 | 1 | DIVERSIFIED | ARM-120-ACEP | ALTERNATING RELAY (ISR) |
| 7 | 4 | ACI | JR22FR | RED PILOT LIGHT W/LED BULB |
| 8 | 1 | SQUARE D | 9070TF150D1 | TRANSFORMER |
| 9 | 1 | AC/DC | BL5-R-120 | ALARM LIGHT |
| 10 | 2 | REDDINGTON | 5120-2200 | ELAPSED TIME METER |
| 11 | 2 | ABS | 61240170 | SEAL FAIL RELAY |
| 12 | 2 | ACI | JR22FY | AMBER PILOT LIGHT W/LED BULB |
| 13 | 1 | SQUARE D | QOU110 | CB4 |
| 14 | 1 | DELTA | LA603 | LIGHTNING ARRESTER |
| 15 | 2 | OMRON | G2R2SAC24 | CR 1,2 |
| 16 | 3 | OMRON | G2R2SAC120 | CR 3,4,5 |
| 17 | 1 | EDWARDS | 870P-N5 | HORN |
| 18 | 1 | ACI | JR22AN11B | PUSH BUTTON |
| 19 | 1 | ABB | K2VD-M | THRU DOOR MECHANISM |
| 20 | 1 | ABB | OXP10X225 | SHAFT |
| 21 | 1 | ABB | OHB45L10 | HANDLE |
| 22 | 2 | DAYTON | 5YZ85 | TIME DELAY RELAY |
| 23 | 1 | MARATHON | 1323570 | DISTRIBUTION BLOCK |
| 24 | | | | |

| | | | | | | | |
|-----------------|---|---|-------------------------------|--|--|---------------------------|-------------------|
| | Drawing Title BILL OF MATERIALS | | | | | | |
| | | | | | | | |
| DATE 6/03/03 | | REFERENCE DRAWING S/N | NO. Sales Engineer C.C. | REVISION-LOCATION DRAWN BY C. RACHAL | ECN | DATE | BY |
| | | Application Engineer R.C. | | | | 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 | |
| | | | | | Ph. (225)756-3271 Fax (225)756-1030 | DRAWING NUMBER CP-1575 | SHEET NUMBER 6 |