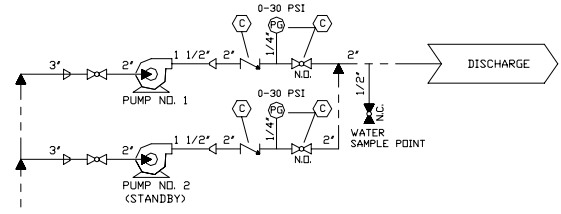


NOTES:

- CRITICAL HEIGHTS:**
 1. CENTERLINE OF SOIL LINE TRAP INLET TO BE NOT LESS THAN 12 INCHES HIGHER THAN CENTERLINE OF MEDIA TANK INLET FLANGE.
- GRAVITY FLOW PIPING:**
 2. GRAVITY SOIL PIPING LEADING TO MEDIA TANK TO SLOPE NOT LESS THAN 1/4 INCH PER 12 INCHES AND BE EQUIPPED WITH PROPERLY VENTED TRAP AS SHOWN.
 3. TRAP DEPTH AND TRAP VENT SHOWN FOR 4 INCH SOIL PIPE AND 2 INCH VENT PIPE.
- MEDIA TANK VENT PIPING:**
 4. DO NOT COMBINE MEDIA TANK VENT WITH ANY OTHER VENT.
 5. VENT TO TERMINATE NOT LESS THAN 10 FEET ABOVE WEATHER DECK, FROM ANY SOURCE OF IGNITION AND FROM ANY VENTILATION AIR INLET.
 6. VENT TO TERMINATE HIGH RATHER THAN LOW, SINCE VENTED AIR IS WARMER THAN SURROUNDING AIR AND WILL RISE.
 7. HORIZONTAL OFFSETS IN MEDIA TANK VENT MUST BE SLOPED NOT LESS THAN 1/2 INCH PER 12 INCHES SO THAT CONDENSATE WILL DRAIN TO MEDIA TANK.
 8. FLAME SCREEN IS NOT RECOMMENDED, IT WILL PLUG WITH LINT AND REQUIRE FREQUENT CLEANING. IF A FLAME SCREEN MUST BE USED, SCREEN TO BE TWO PIPE SIZES LARGER THAN VENT PIPE.
- EMERGENCY BYPASS DISCHARGE:**
 9. AN EMERGENCY BYPASS DISCHARGE IS REQUIRED TO PROVIDE THE USE OF SANITARY FACILITIES IN CASE OF EQUIPMENT MALFUNCTION.
 10. MOUNT SEWAGE INLET AND EMERGENCY BYPASS GATE VALVES WITH STEMS IN AN UPRIGHT VERTICAL POSITION.
- MAINTENANCE AND CLEARANCE REQUIREMENTS:**
 11. ALLOW AT LEAST 30 INCHES CLEARANCE ABOVE MEDIA TANK COVER TO VENT SPOLL FLANGED CONNECTION TO PERMIT REMOVAL OF COVER FOR INTERNAL REPAIR.
 12. ALLOW AT LEAST 12 INCHES CLEARANCE ABOVE CHLORINE TABLET REFILL TUBES FOR TUBE REMOVAL.
- GENERAL PIPING REQUIREMENTS:**
 13. CONNECTING PIPING AND INSTALLATION SHALL BE IN ACCORDANCE WITH REQUIREMENTS OF APPLICABLE REGULATORY BODIES.
 14. RECOMMENDED MATERIAL IS SCHEDULE 40 STEEL.



LEGEND:

- CUSTOMER PIPING
- SCIENCO/FAST PIPING
- INSTRUMENT AIR
- NORMALLY OPEN
- NORMALLY CLOSED
- FLANGED CONNECTION
- REDUCER
- PRESSURE GAUGE
- AIR FILTER
- POUNDS PER SQUARE INCH
- CUSTOMER SUPPLIED VALVE
- LEVEL GAUGE
- GATE VALVE- FLANGED
- BALL VALVE- SCREWED
- SWING CHECK VALVE
- BUTTERFLY VALVE
- 3 STATION LEVEL SENSOR
- BASKET STRAINER

NOTE: DRAWING DEPICTS SYSTEM IN NORMAL RUN POSITION.

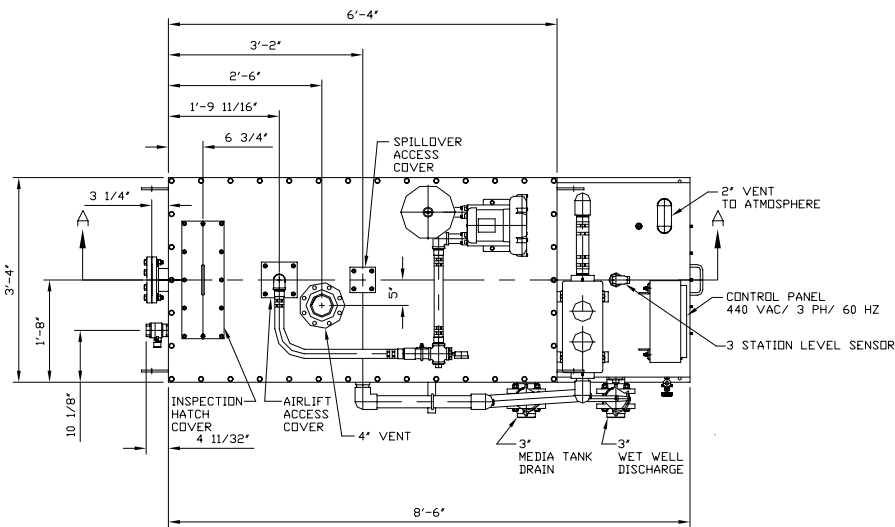
MANUAL VALVE POSITION CHART

| VALVE NO. | VALVE FUNCTION | OPERATING POSITION | | |
|-----------|--------------------|--------------------|--------|--------|
| | | RUN | SCOUR | DRAIN |
| V1 | AIR SCOUR | CLOSED | OPEN | CLOSED |
| V2 | MEDIA TANK DRAIN | CLOSED | OPEN | |
| V3 | WET WELL DISCHARGE | OPEN | CLOSED | |
| V4 | STRAINER DRAIN | | CLOSED | |

BLOWER & PUMP OPERATION CHART

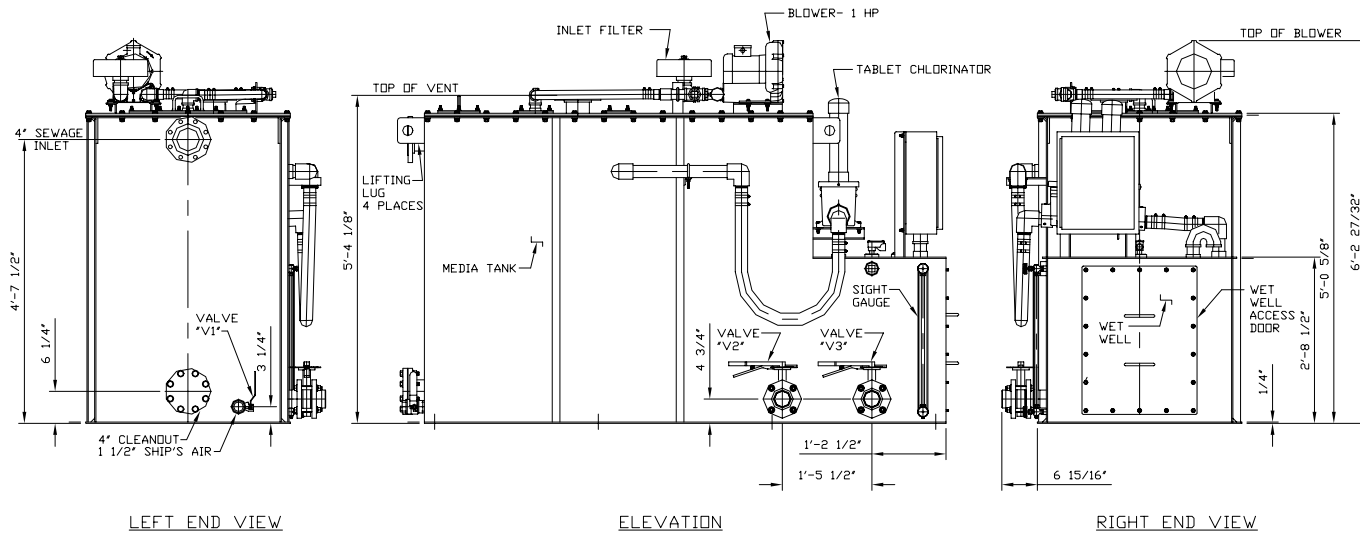
| MOTOR CALLOUT | HP | OPERATING POSITION | | |
|---------------|----|--------------------|-------|---------|
| | | RUN | SCOUR | DRAIN |
| BLOWER | 1 | ON | OFF | |
| PUMP NO. 1 | 2 | ON | OFF | ON |
| PUMP NO. 2 | 2 | STANDBY | OFF | STANDBY |


| REV | DESCRIPTION | BY | DATE |
|--|-------------|-----------------------|-----------|
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| SYSTEM | | FAST SEWAGE TREATMENT | |
| CUSTOMER | | | |
| TITLE SYSTEM PIPING DIAGRAM & INSTALLATION DATA | | | |
| SCALE | DRAWN | CHECKED | APPROVED |
| SCALE | P.F.E. | PLOT SCALE | DATE |
| SIZE | PREV. ASSY. | 1:1 | 1/7/00 |
| CONTRACT NO. | MODEL NO. | DRAWING NO. | SHEET NO. |
| | MX5 | CU000 | 1 of 1 |
| | | | 0 |

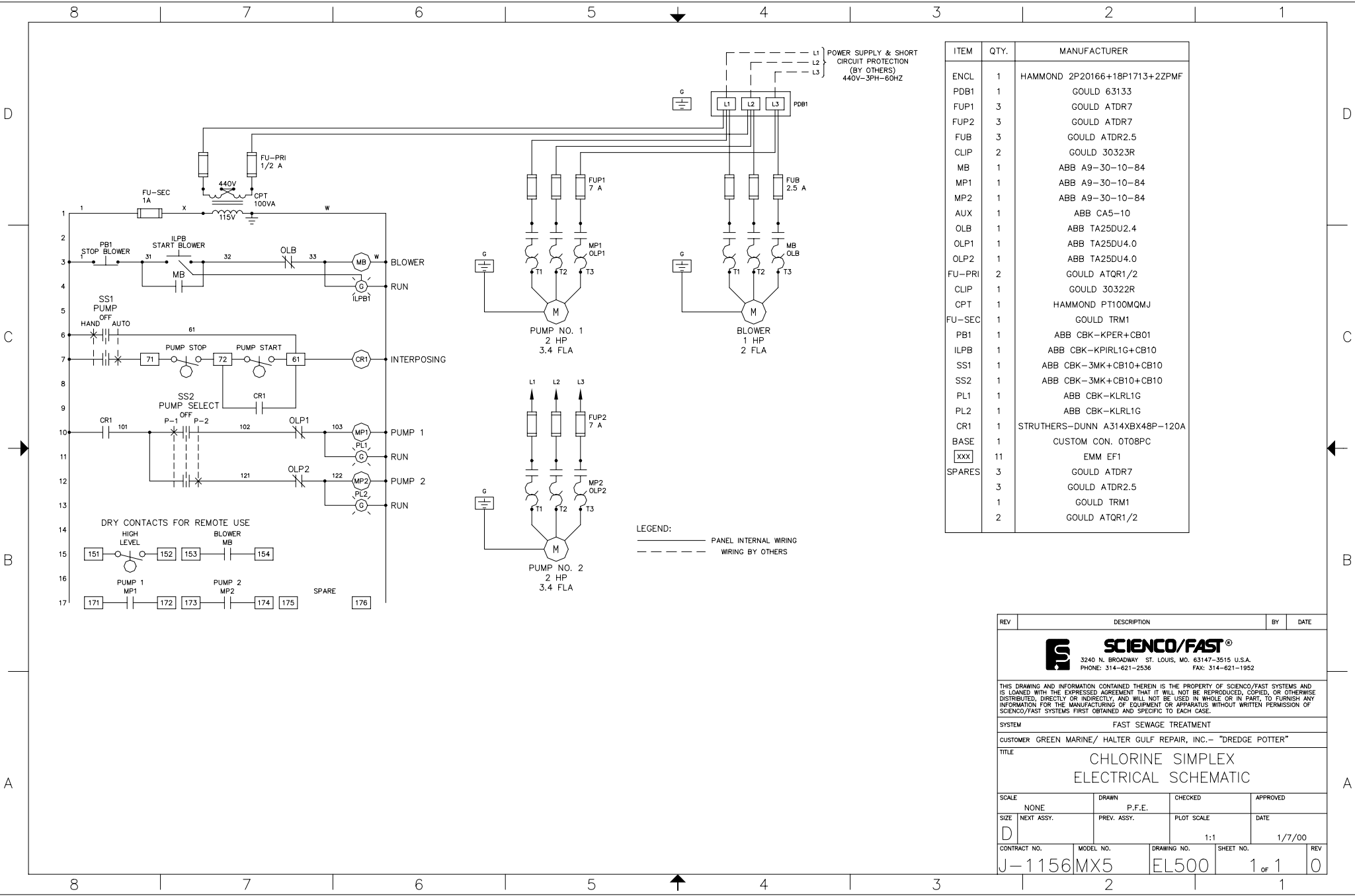


NOTES:


- TANK MAY BE INSTALLED EITHER FORE AND AFT OR ATHWARTSHIPS.
- SUPPORT TANK BEDPLATE ALL AROUND ON FLAT SUPPORTING SURFACES NOT LESS THAN 3 INCHES WIDE. SECURE IN PLACE WITH 3/16 INCH FILLET WELDS ALL AROUND, 3 INCHES ON 12 INCHES PER ABS REQUIREMENTS.
- ESTIMATED WEIGHTS:
SHIPPING: 2,840 LBS.
OPERATING: 9,500 LBS.
- ALL FLANGED CONNECTIONS ARE 150 LB., RAISED FACED, FORGED STEEL, ASTM A-105.
- SEE DRAWING MX5-CU000 FOR ADDITIONAL INSTALLATION REQUIREMENTS.
- SEE DRAWING MX5-CU002 FOR ADDITIONAL COMPONENTS SUPPLIED.
- SEE DRAWING MX5-CU003 FOR TANK SECTIONAL VIEW A-A.



| REV | DESCRIPTION | BY | DATE |
|---|-------------|-----------------------|-----------|
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| SYSTEM | | FAST SEWAGE TREATMENT | |
| CUSTOMER | | | |
| TITLE | | | |
| MX5 TANK INSTALLATION | | | |
| SCALE | DRAWN | CHECKED | APPROVED |
| 1"=1'-0" | P.F.E. | | |
| SIZE NEXT ASSY. | PREV. ASSY. | PLOT SCALE | DATE |
| D | | 1:1 | 1/7/00 |
| CONTRACT NO. | MODEL NO. | DRAWING NO. | SHEET NO. |
| | MX5 | CU001 | 1 of 1 |
| | | | REV |
| | | | 0 |



| ITEM | QTY. | MANUFACTURER |
|--------|------|-------------------------------|
| ENCL | 1 | HAMMOND 2P20166+18P1713+2ZPMF |
| PDB1 | 1 | GOULD 63133 |
| FUP1 | 3 | GOULD ATDR7 |
| FUP2 | 3 | GOULD ATDR7 |
| FUB | 3 | GOULD ATDR2.5 |
| CLIP | 2 | GOULD 30323R |
| MB | 1 | ABB A9-30-10-84 |
| MP1 | 1 | ABB A9-30-10-84 |
| MP2 | 1 | ABB A9-30-10-84 |
| AUX | 1 | ABB CA5-10 |
| OLB | 1 | ABB TA25DU2.4 |
| OLP1 | 1 | ABB TA25DU4.0 |
| OLP2 | 1 | ABB TA25DU4.0 |
| FU-PRI | 2 | GOULD ATQR1/2 |
| CLIP | 1 | GOULD 30322R |
| CPT | 1 | HAMMOND PT100MQMJ |
| FU-SEC | 1 | GOULD TRM1 |
| PB1 | 1 | ABB CBK-KPER+CB01 |
| ILPB | 1 | ABB CBK-KPIRL1G+CB10 |
| SS1 | 1 | ABB CBK-3MK+CB10+CB10 |
| SS2 | 1 | ABB CBK-3MK+CB10+CB10 |
| PL1 | 1 | ABB CBK-KLRL1G |
| PL2 | 1 | ABB CBK-KLRL1G |
| CR1 | 1 | STRUTHERS-DUNN A314XB48P-120A |
| BASE | 11 | CUSTOM CON. 0T08PC |
| xxx | 1 | EMM EF1 |
| SPARES | 3 | GOULD ATDR7 |
| | 3 | GOULD ATDR2.5 |
| | 1 | GOULD TRM1 |
| | 2 | GOULD ATQR1/2 |

| REV | DESCRIPTION | BY | DATE |
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| SYSTEM FAST SEWAGE TREATMENT | | | |
| CUSTOMER GREEN MARINE/ HALTER GULF REPAIR, INC.- "DREDGE POTTER" | | | |
| TITLE CHLORINE SIMPLEX ELECTRICAL SCHEMATIC | | | |
| SCALE NONE | DRAWN P.F.E. | CHECKED | APPROVED |
| SIZE NEXT ASSY. | PREV. ASSY. | PLOT SCALE | DATE |
| CONTRACT NO. J-1156MX5 | | MODEL NO. EL500 | |
| DRAWING NO. 1 of 1 | | SHEET NO. 0 | |
| | | DATE 1/7/00 | |

8 7 6 5 4 3 2 1

| CABLE DESCRIPTION CHART | | | | | |
|-------------------------|--|-----------|---------------------------|-----------|--|
| DESIGNATION | DESCRIPTION | AWG. SIZE | NO. STRANDS PER CONDUCTOR | MAX. DIA. | TYPE |
| DTNIB-6 | DOUBLE CONDUCTOR, FLAMERETARDANT THERMOPLASTIC & NYLON INSULATED, MOISTURE RESISTANT & FLAMERETARDANT THERMOPLASTIC JACKETED, BRONZE ARMORED | 12 | 2 | 1.270mm | 600 VOLT POWER CABLE 90°C/94°F RATED |
| TTNIB-4 | THREE CONDUCTOR, FLAMERETARDANT THERMOPLASTIC & NYLON INSULATED, MOISTURE RESISTANT & FLAMERETARDANT THERMOPLASTIC JACKETED, BRONZE ARMORED | 14 | 3 | 1.292mm | 600 VOLT POWER CABLE 90°C/94°F RATED |
| MTNIB-7 | MULTIPLE CONDUCTOR, FLAMERETARDANT THERMOPLASTIC & NYLON INSULATED, MOISTURE RESISTANT & FLAMERETARDANT THERMOPLASTIC JACKETED, BRONZE ARMORED | 16 | 7 | 1.351mm | 600 VOLT CONTROL CABLE 90°C/94°F RATED |

LEGEND

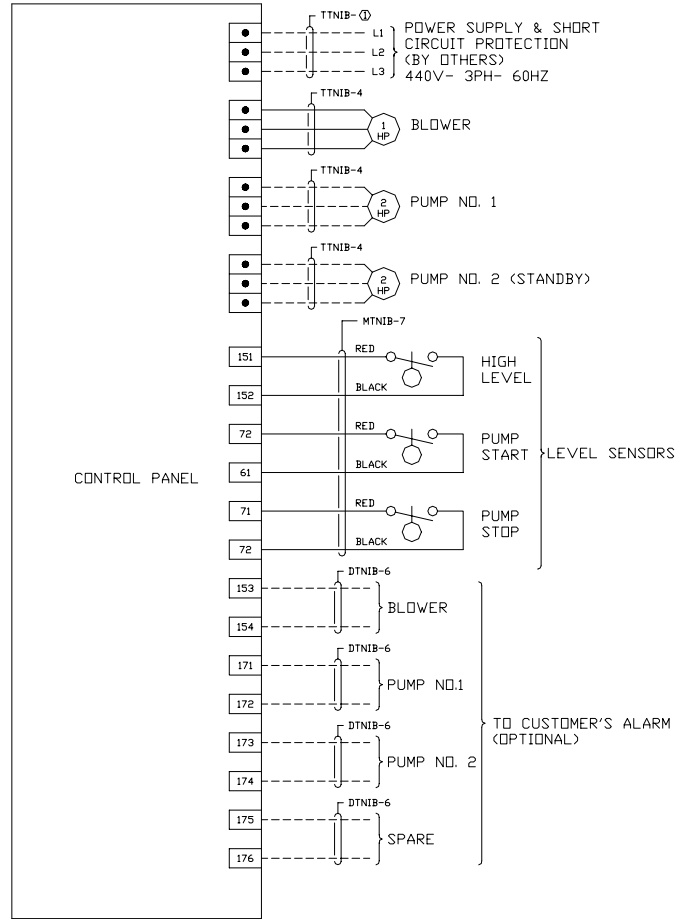
----- WIRING BY OTHERS
 ————— SCIENCO/FAST WIRING

PANEL CONSTRUCTION DATA:

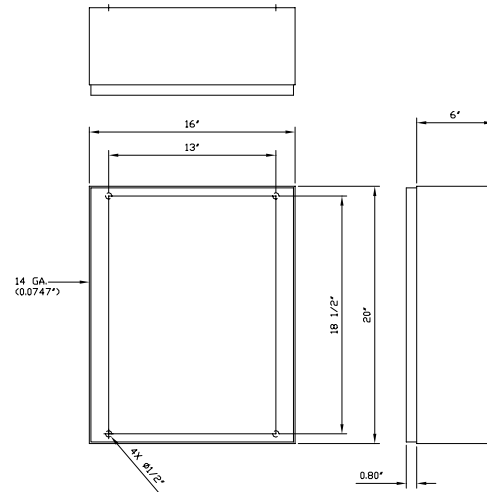
1. THE CONSTRUCTION OF CONTROLLING APPARATUS AND THEIR ENCLOSURES SHALL CONFORM TO THE REQUIREMENTS OF 'UNDERWRITER'S LABORATORIES, INC.' 'STANDARD FOR INDUSTRIAL CONTROL EQUIPMENT', AND APPLICABLE REQUIREMENTS OF NEC AND NEMA.
2. CONTROL PANEL DOOR SHALL BE HINGED.
3. EQUIPMENT MOUNTED ON HINGED DOOR SHALL BE CONSTRUCTED OR SHIELDED IN SUCH A MANNER THAT NO LIVE PARTS OF THE DOOR MOUNTED EQUIPMENT WILL BE EXPOSED TO ACCIDENTAL CONTACT BY A PERSON WITH THE DOOR OPEN AND THE CIRCUIT ENERGIZED.
4. CABLE ENTRANCE PLATES SHALL BE AT LEAST 1/8" (3mm) THICK AND FITTED WITH GASKETS.
5. ENCLOSURE SHALL BE CONSTRUCTED FROM STEEL WITH SUITABLE CORROSION RESISTANT FINISH.
6. ENCLOSURE AND PILOT DEVICES SHALL BE NEMA 4 WATER TIGHT.
7. A HEAT RESISTANT DURABLE TYPE WIRING DIAGRAM SHALL BE PERMANENTLY ATTACHED TO THE INSIDE OF THE CONTROL PANEL DOOR.
8. TERMINAL BLOCKS FOR EXTERNAL CONNECTIONS SHALL BE PRESSURE TYPE AND BE EQUIPPED WITH PUSHER PLATES.
9. PILOT CIRCUIT WIRES SHALL BE AWG. SIZE NO. 16.
10. HINGED DOOR WITH A HEIGHT GREATER THAN 45"/1143mm OR WIDTH GREATER THAN 24"/610mm MUST HAVE DOOR POSITIONERS AND STOPS.

INSTALLATION DATA:


1. FEEDER CABLE, OVERCURRENT PROTECTION AND WIRING OF REMOTE DEVICES BY OTHERS TO BE IN ACCORDANCE WITH THE REQUIREMENTS OF APPLICABLE REGULATORY BODIES.
2. CABLE DESIGNATIONS SPECIFIED ARE PER IEEE-45.
3. MAXIMUM SPACING BETWEEN CABLE CLAMPS TO BE 12"/305mm PER HORIZONTAL AND VERTICAL RUNS.



CABLE DIAGRAM



ENCLOSURE MOUNTING DETAIL

| REV | DESCRIPTION | BY | DATE |
|--|-------------|-----------------------|-------------|
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| SYSTEM | | FAST SEWAGE TREATMENT | |
| CUSTOMER GREEN MARINE/ HALTER GULF REPAIR, INC.- "DREDGE POTTER" | | | |
| TITLE | | | |
| CABLE WIRING DIAGRAM & ENCLOSURE MOUNTING DETAIL | | | |
| SCALE | NONE | DRAWN | P.F.E. |
| SIZE | NEXT ASSY. | PREV. ASSY. | PLOT SCALE |
| D | | DATE | |
| CONTRACT NO. | | MODEL NO. | DRAWING NO. |
| J-1156MX5 | | EL501 | 1 of 1 |
| SHEET NO. | | REV | |
| 1 | | 0 | |

8 7 6 5 4 3 2 1