EXPLOSION PROOF ABOVE GROUND LIFT STATION

FAYETTEVILLE PUBLIC WORKS COMMISSION
FAYETTEVILLE, N.C.

WATER RESOURCES ENGINEERING DEPARTMENT

NOTE:
THESE COMPONENTS ARE OF FIBERGLASS CONSTRUCTION:
1. STATION BASE
2. SERVICE COWL
3. END PANEL
4. SUPPORT BEAM

NOTE:
WET WELL (BY OTHERS) THE DIAMETER OF THE WET WELL AND THE DISTANCE FROM THE INVERT OF THE INFLUENT LINE TO THE CONCRETE PAD SHOULD BE PROPERLY DESIGNED TO ALLOW AT LEAST THREE TO FIVE MINUTES LAPPED TIME BETWEEN SUCCESSIVE STARTS OF A PUMP TO PREVENT SHORT CYCLING OF ELECTRIC MOTOR AND CONTROL.
1. CONCRETE SHALL BE 4,000PSI COMPRESSION STRENGTH.
2. MANHOLE SHALL MEET REQUIREMENTS OF ASTM C-478.
3. ALL ELECTRICAL MATERIAL AND INSTALLATION SHALL BE BY A LICENSED ELECTRICIAN AND IN ACCORDANCE WITH THE NATIONAL ELECTRICAL CODE, AND RULES AND REGULATIONS OF LOCAL AUTHORITIES HAVING JURISDICTION. MATERIALS SHALL BE LISTED OR LABELED BY THE UNDERWRITERS LABORATORIES STANDARDS.
4. LIFT STATION MANHOLE CONCRETE SLAB AND HATCH SHALL BE MANUFACTURED TO WITHSTAND H-20 LOADING CONDITIONS.
5. MANUFACTURER SHALL BE REQUIRED TO SUBMIT DESIGN CALCULATIONS SIGNED AND SEALED BY A PROFESSIONAL ENGINEER WITH SHOP DRAWINGS AND REVIEW SUBMITTAL.
6. SHOP DRAWINGS AND WIRING DIAGRAMS SHALL BE PROVIDED FOR ALL ELECTRICAL EQUIPMENT.
7. ENGINEER TO APPROVE FOUNDATION BED BEFORE SETTING MANHOLES. FOUNDATION SHALL BE 9'-0" DIA. AND 12" DEPTH NO. 57 STONE BEDDING.
8. CONTRACTOR IS TO PROVIDE DE-WATERING EQUIPMENT AS REQUIRED FOR CONSTRUCTION AT NO ADDITIONAL COST TO THE OWNER.
9. HATCH DOORS AND CONTROL PANEL BOX SHALL BE LOCKABLE AND KEYED TO FAYPWC MASTER LOCK SYSTEM. CONTRACTOR SHALL FURNISH 3 LOCKS AND KEYS.
10. CONTRACTOR SHALL INSTALL ALL OWNER FURNISHED EQUIPMENT AND PROVIDE START UP SERVICE (MINIMUM 2 DAYS).
11. CONTRACTOR SHALL FURNISH AND INSTALL ALL EQUIPMENT, MATERIALS, AND INCIDENTALS REQUIRED TO MAKE THE LIFT STATION FULLY OPERATIONAL AND IN ACCORDANCE WITH FAYPWC STANDARDS.
12. RECESSED LIFTING HOOKS SHALL BE PLACED IN CONCRETE WET WELL COVER. CONTROL PANEL BOX SHALL BE ANCHORED IN 12"x24" DEEP CONCRETE FOOTING.
13. CONTRACTOR SHALL PROVIDE ALL NECESSARY LUBRICANTS FOR STARTUP AND SHALL ASSIST THE EQUIPMENT MANUFACTURER AND OWNER WITH INITIAL STARTUP (MINIMUM 2 DAYS).
14. PIPEWORK SHALL BE ASSEMBLED, INSTALLED, AND FULLY SUPPORTED SO AS NOT TO PUT A STRAIN ON THE PUMPING EQUIPMENT, PIPE FITTINGS AND ELBOWS.
15. ALL THRU-THE-WALL SLEEVES AND CARRIER PIPES INTO THE WET WELL SHALL BE INSTALLED ABSOLUTELY WATERTIGHT WITH NO SIGNS OF SEEPAGE OR INFILTRATION.
16. ENTIRE SITE SHALL BE FENCED FOR SECURITY. CONTRACTOR SHALL PROVIDE LOCKS FOR GATE OPENING.
17. ALL HANGERS, CLAMPS, FLANGE BOLTS, AND CONNECTIONS SHALL BE STAINLESS STEEL UNLESS OTHERWISE SPECIFIED. THESE ITEMS TO BE FURNISHED AND INSTALLED BY THE CONTRACTOR.
18. ALL DIMENSIONS SHALL BE VERIFIED BY CONTRACTOR AND SHALL BE ADJUSTED TO ACCOMMODATE DIMENSIONS OF MATERIALS SUPPLIED BY CONTRACTOR AND OWNER.
19. FLANGE FACES SHALL BE SERRATED.