

INSTRUMENTATION TECHNICIAN

DISTINGUISHING FEATURES OF THE CLASS:

This is a specialized technical position responsible for the repair of a wide variety of mechanical, electrical equipment, and instrumentation in a water treatment plant. The incumbent maintains, diagnoses and repairs various water treatment instruments, electronic and motor control devices and must be able to understand complex technical problems and perform a wide variety of non-routine tasks where only general methods of procedure are available. The incumbent must be proficient in problem analysis and/or replacement/repair of telemetry communication circuits, control wiring, circuit breakers and fuses, and other electrical motor control equipment. The work is performed under general supervision of a higher level employee with considerable leeway for planning and carrying out assignments. Supervision may be exercised over employees assigned to projects.

TYPICAL WORK ACTIVITIES:

Typical work activities for incumbents in this title include those listed below, in addition to work activities performed by lower level titles. They are indicative of the level and types of activities performed by incumbents in this title. They are not meant to be all inclusive and do not preclude a supervisor from assigning activities not listed which could reasonably be expected to be performed by an employee in this title.

1. Troubleshoots plant instrumentation and coordinates successful repairs;
2. Calibrates and/or repairs all primary sensors, pumping equipment, meters, pressure switches, flow meters, etc.;
3. Selects, specifies and coordinates purchase of instrumentation and electrical equipment for the water treatment plant;
4. Installs new instrumentation, calibrates and trains operators, maintenance and laboratory staff on equipment operation, preventative maintenance and safety;
5. Performs electrical maintenance, troubleshooting, and repair of 120 volt and 220 volt equipment;
6. Coordinates and supervises maintenance, troubleshooting and repair of high voltage equipment as performed by contractor.

FULL PERFORMANCE KNOWLEDGE, SKILLS AND ABILITIES:

Knowledge of computerized control systems as it applies to water treatment plant instrumentation in order to install, maintain and troubleshoot same;

Knowledge of electrical systems, instruments, devices and equipment in order to design, install, maintain and repair same;

Knowledge of OSHA regulations as they relate to electrical and instrumentation fields;

Skill in the application of such knowledge in order to plan, lead, coordinate and complete projects;

Ability to diagnose problems, analyze whether or not to replace or repair telemetry communications circuits, control wiring, circuit breakers and fuses, and other electric motor control equipment;

Ability to understand and carry out complex oral and written instructions;

Ability to cooperate with other employees in a team environment to plan and process improvements, troubleshoot problems and present alternative solutions to complex problems in a timely and safe manner;

Ability to communicate both orally and in writing;

Personal characteristics necessary to perform the duties of the position;

Physical condition commensurate with the demands of the position.

INSTRUMENTATION TECHNICIAN (Cont'd)

MINIMUM QUALIFICATIONS:

Four years of paid work experience in a position involving the performance of electrical and instrumentation repairs, two years of which included independent field work.

SPECIAL REQUIREMENT:

Possession of a New York State driver's license.

TR5310

ADOPTED: 12/30/98