JOB DESCRIPTION: ASSISTANT INSTRUMENT AND CONTROL SYSTEMS SPECIALIST (PROVISIONAL APPOINTMENT – Must be reachable on next Civil Service Exam for title)

WHO WE ARE

Monroe County Water Authority is a not-for-profit public benefit corporation that reliably provides quality, affordable water to foster economic vitality and enhanced quality of life for Monroe County and area communities who request service. Currently serving over 800,000 people in Monroe and its five adjacent counties, MCWA produces and delivers an average of 60 million gallons of water each day.

WHAT WE OFFER

- Competitive pay based on experience and certification
- Salary range: $60,000 - $114,000
- Health insurance
- Dental insurance
- Life insurance
- Paid vacation
- 12 paid holidays per year
- Five personal days
- Deferred compensation plan
- New York State Employees Retirement System

JOB DESCRIPTION

This is a technical position at the Monroe County Water Authority responsible for assisting with the design and integration of a wide variety of instrumentation and process control systems used in the treatment and distribution of potable water. The employee assists the lead designer of the process control network (process automation and process network operations) including: hardware and software selection, topology, programming and performance monitoring. Duties include assisting with the integration of various process systems such as Supervisory Control and Data Acquisition (SCADA) equipment, Programmable Logic Controller (PLCs), Microwave Radios, Electrical Power Logic Monitors, Servers, Routers, and Switches, as well as various software systems related to the process network (Graphical User Interfaces, Applications and Databases). This position differs from Instrument and Control Systems Specialist in that the employee performs less complex and technical work and performs at a less independent level. The employee reports directly to and works under the general supervision of an Instrument and Control Systems Specialist or other higher-level staff member. Does related work as required.

JOB KNOWLEDGE

Working knowledge of electrical equipment and systems including motor controls and Adjustable Frequency Drives (AFD's); working knowledge of network technologies, hardware, and configuration including servers, routers, switches, security and user access management; working knowledge of technologies used to extend computer resources; working knowledge of databases, database management, and reporting services; working knowledge of various programming languages and techniques, including web application development, object-oriented programming and data structure development; working knowledge of the principles and practices of electronics including radio telemetry, digital communications and networking; working knowledge of instrumentation equipment including electronic, pneumatic and hydraulic systems; working knowledge of control concepts including open/close loop, proportional band, integral and derivative; working knowledge of programming concepts for SCADA systems including graphics development, historical data logging, alarm and event control, trending and reporting, and communications to field devices; ability to write technical reports; ability to communicate orally and in writing; organizational ability; analytical ability; ability to create and interpret schematic drawings; ability to establish and maintain effective working relationships; good judgment; physical condition commensurate with the demands of the position.

WORK ACTIVITIES

- Assists in the design, configuration and maintenance of the SCADA system
- Assists in the design, installation and maintenance of Control System Network equipment and systems
- Assists in the programming and maintenance of PLCs.
- Designs, creates, modifies and maintains database tables, forms and reports
- Provides technical support as required by control system users
- Monitors and reports on SCADA security and vulnerability events or activities
- Assists in the design and implementation of custom-coded software and web applications
- Assists in the integration of instrumentation equipment used to monitor and control a wide variety of processes such as temperature, pressure, level, flow, vibration, and speed into the SCADA system
- Other duties as assigned

MINIMUM QUALIFICATIONS

Graduation from high school plus EITHER

(A) Graduation from a regionally accredited or New York State registered college or university with a Bachelor's degree in Engineering, Engineering Technology, or a computer science or information technology field such as Computer Science, Information Technology, or Computer Information Systems; **OR**

(B) Graduation from a regionally accredited or New York State registered college or university with an Associate's degree in field mentioned above plus two (2) years of paid full time or its part time equivalent experience in the installation, configuration, programming and maintenance of computers and network equipment **OR**

(C) Four (4) years of experience as defined above