



Title: SCADA Instrumentation Control Specialist

FLSA Status: (Non-Exempt)

BRIEF DESCRIPTION:

The purpose of this position is to perform skilled maintenance and repair of instrumentation and electrical components for all water and wastewater plants and remote sites. Persons in this position must possess extensive knowledge of complicated SCADA software and hardware systems and devices. Employees in this position are required to work in a rotating standby detail of approximately one week per month. Employees will initially be assigned to specific plants or remote sites but these assignments can and will change through the course of employment.

ESSENTIAL FUNCTIONS:

Note: This information is intended to be descriptive of the key responsibilities of the position. The list of essential functions below does not identify all duties performed by any single incumbent in this position. Additionally, please be aware of the legend below when referring to the physical demands of each essential function.

(S) Sedentary	(L) Light	(M) Medium	(H) Heavy	(V) Very Heavy
Exerting up to 10 lbs. occasionally or negligible weights frequently; sitting most of the time.	Exerting up to 20 lbs. occasionally; 10 lbs. frequently; or negligible amounts constantly; OR requires walking or standing to a significant degree.	Exerting 20-50 lbs. occasionally; 10-25 lbs. frequently; or up to 10 lbs. constantly.	Exerting 50-100 lbs. occasionally; 10-25 lbs. frequently; or up to 10-20 lbs. constantly.	Exerting over 100 lbs. occasionally; 50-100 lbs. frequently; or up to 20-50 lbs. constantly.

#	Code	Essential Functions
1	M	Performs skilled preventative maintenance and repairs on electrical and mechanical water and wastewater systems and equipment and enters information into Computerized Maintenance Management System.
2	S	Schedules preventative and corrective maintenance in Computerized Maintenance Management System.
3	L	Responds to SCADA systems user problems; identifies SCADA systems malfunctions and repairs. Refers major issues to operations personnel or vendor.
4	M	Tests, troubleshoots, locates, calibrates, repairs and performs preventive maintenance on a variety of industrial electrical and electronic systems.
5	L	Operates and administers complex systems including security, surveillance systems, close circuit televisions, chemical treatment and others as required.



JOB REQUIREMENTS:

-Description of Minimum Job Requirements

Experience	2-4 years experience. Considerable previous experience required in the same or similar previous positions. The job requires a sound knowledge of common and uncommon techniques, concepts, methods, practices, use of forms, routines, etc., of complex nature.
Education	Two year college program or equivalent combinations resulting in accumulation of similar knowledge or skills.
Technical Skill	Advanced technical skills. Work requires advanced skills, specialized knowledge, and extensive expertise in approaches and systems.
Physical Demands	Work requires heavy physical exertion and effort. Forces exerted are equivalent to lifting between 25 and 50 pounds. The need for physical stamina and endurance is great. The degree of physical strain produced on the job is high. It results in fatigue, and requires periods of rest. Job requirements for manual dexterity and physical manipulation are high. Work could involve the coordination of body movements involving various body postures.
Contacts	Contacts are necessary to perform the job as work involves internal and external contacts for the purpose of providing guidance, instruction or technical advice or for the purpose of explaining business matters by interpreting organizational policy. Improper handling would cause problems in relationships. Work involves occasional contact with people who are upset, uncooperative or have difficulty communicating their requirements and/or an occasional requirement to communicate information that people do not want to hear or may find upsetting.
Responsibility	The job requires some accountability for scheduling, assigning or coordinating work. Employees check the quality of work and provide guidance to others. Although the job does not require formal or official supervisory responsibility the incumbent serves as a lead or acts in a lead role. In addition, the employee may be expected to provide information or suggestions on others' performance.
Accountability	Decision/action situations have a significant impact on the organization. Errors are difficult to detect and result in immediate impact on resources and continuing influence on operational effectiveness. Revenue, productivity, service, quality, security of assets or external relationships may be adversely affected. Corrections may be more costly than original action.
Environment	Exposure to physical hazards, health and safety risks, adverse or otherwise undesirable characteristics in the environment such as laboratory or warehouse, machinery vibration and noise, and hazardous chemicals. Personal risks require use of safety equipment or following precautions closely.
Safety	Responsible for personal performance as a source of serious safety risk. Work involves the use of hazardous tools, equipment and/or materials OR ensuring organizational compliance with rules, procedures and legislation for safe operation of facility, safety and development of safe work procedures.
Reading	Advanced - Ability to read literature, books, reviews, scientific or technical journals, abstracts, financial reports, and/or legal documents. Ordinarily, such education is obtained in at the college level or above. However, it may be obtained from experience and self-study.
Math	Intermediate - Ability to deal with a system of real numbers; and practical application of fractions, percentages, ratios/proportions and measurement. Ordinarily, such education is obtained in high school up to college. However, it may be obtained from experience and self-study.
Writing	Intermediate - Ability to write reports, prepare business letters, expositions, and summaries with proper format, punctuation, spelling, and grammar, using all parts of speech. Ordinarily, such education is obtained in high school up to college. However, it may be obtained from experience and self-study.
Certifications & Other Requirements	Two (2) Arizona Department of Environmental Quality (ADEQ) Grade 1 Certifications within the first year of hire and current Arizona Class "D" Drivers License. Must have 2-4 years experience in advanced instrumentation and electrical controls technologies. Must have demonstrated



	knowledge of electrical safety and troubleshooting abilities for voltages up to 480VAC. Must have demonstrated ability to troubleshoot and develop control system programming including Programmable Logic Controllers (PLC) and Human-Machine Interface (HMI) software.
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OVERALL PHYSICAL STRENGTH DEMANDS:

-Physical strength for this position is indicated below with “M”-				
Sedentary	Light	Medium	Heavy	Very Heavy
Exerting up to 10 lbs. occasionally or negligible weights frequently; sitting most of the time.	Exerting up to 20 lbs. occasionally, 10 lbs. frequently, or negligible amounts constantly OR requires walking or standing to a significant degree.	Exerting 20-50 lbs. occasionally, 10-25 lbs. frequently, or up to 10 lbs. constantly.	Exerting 50-100 lbs. occasionally, 10-25 lbs. frequently, or up to 10-20 lbs. constantly.	Exerting over 100 lbs. occasionally, 50-100 lbs. frequently, or up to 20-50 lbs. constantly.

PHYSICAL DEMANDS:

C Continuously <small>2/3 or more of the time.</small>	F Frequently <small>From 1/3 to 2/3 of the time.</small>	O Occasionally <small>Up to 1/3 of the time.</small>	R Rarely <small>Less than 1 hour per week.</small>	N Never <small>Never occurs.</small>
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Note: This is intended as a description of the way the job is currently performed. It does not address the potential for accommodation.

-Physical Demand-	-Frequency-	-Brief Description-
Standing	F	Observing work site, observing work duties, communicating with co-workers
Sitting	F	Desk work, meetings, driving
Walking	F	To other departments/offices, around work site
Lifting	O	Supplies, files
Carrying	O	Supplies, files
Pushing/Pulling	F	File drawers, tables and chairs
Reaching	F	For supplies, for files
Handling	F	Paperwork
Fine Dexterity	F	Computer keyboard, telephone keypad, calculator
Kneeling	O	Filing in lower drawers, retrieving items from lower shelves/ground
Crouching	O	Filing in lower drawers, retrieving items from lower shelves/ground
Crawling	O	Under equipment
Bending	F	Filing in lower drawers, retrieving items from lower shelves/ground
Twisting	F	From computer to telephone
Climbing	F	Stairs, step stools
Balancing	O	On step stools
Vision	F	Reading, computer screen, driving
Hearing	F	Communicating via telephone/radio, to co-workers/public
Talking	F	Communicating via telephone/radio, to co-workers/public
Foot Controls	F	Driving



MACHINES, TOOLS, EQUIPMENT, SOFTWARE, AND HARDWARE:

Truck, variety of hand tools, pipe benders, instrument calibrators, standard office equipment, Microsoft Office, Internet, SCADA, laptop, GE Proficy, RS Logix, and Concept.

ENVIRONMENTAL FACTORS:

C Continuously	F Frequently	O Occasionally	R Rarely	N Never		D Daily	W Several Times per Week	M Several Times per Month	S Seasonally	N Never
-Health and Safety Factors-						-Environmental Factors-				
Mechanical Hazards			O			Respiratory Hazards		W		
Chemical Hazards			O			Extreme Temperatures		S		
Electrical Hazards			F			Noise and Vibration		W		
Fire Hazards			R			Wetness/Humidity		S		
Explosives			N			Physical Hazards		D		
Communicable Diseases			O							
Physical Danger or Abuse			N							
Other										

PROTECTIVE EQUIPMENT REQUIRED:

Arc flash suit, glasses, gloves, fire retardant clothing, face shield, hearing protection, safety footwear, and hard hat.

NON-PHYSICAL DEMANDS:

F Frequently From 1/3 to 2/3 of the time	O Occasionally Up to 1/3 of the time	R Rarely Less than 1 hour per week	N Never Never occurs
-Description of Non-Physical Demands-			-Frequency-
Time Pressure			F
Emergency Situation			O
Frequent Change of Tasks			F
Irregular Work Schedule/Overtime			F
Performing Multiple Tasks Simultaneously			F
Working Closely with Others as Part of a Team			F
Tedious or Exacting Work			F
Noisy/Distracting Environment			F
Other			

PRIMARY WORK LOCATION:

Office Environment		Vehicle	
Warehouse		Outdoors	
Shop	X	Other	
Recreation/Neighborhood Center			