



CITY OF OMAHA CLASS SPECIFICATION

CLASSIFICATION TITLE: PROCESS CONTROL SYSTEMS TECHNICIAN I

BARGAINING UNIT: [CIV MANAGEMENT](#)

CODE NUMBER: 1680

PAY RANGE CODE: [15.3 MC](#)

REVISION DATE: 9/24/15

NATURE OF WORK:

This is technical work in the operation and maintenance of the computerized control system used in the operation of the Wastewater Treatment Plants of the Public Works department. Work involves assisting in the calibration and maintenance of instrumentation and controls in the plant. An employee in this classification works with considerable independence, receiving general guidance from a superior.

ESSENTIAL FUNCTIONS: *(Any one position may not perform all the duties listed, nor do the listed examples include all the duties that may be performed in positions allocated to this class.)*

Maintains the database of the process control computer, adding or deleting data points as needed or as directed by the Plant Manager or Engineer.

Maintains the data collection system, periodically checking and calibrating or supervising the calibration of all relevant sensors to ensure accuracy of data transmissions.

Explains procedures of the system to plant personnel.

Informs shift supervisors when problems in plant operations occur.

Maintains process control loops and instrumentation feedback systems, checking sensors and circuits when possible, and contracting for maintenance when necessary.

Inspects electronic control systems and pneumatic systems for potential malfunctions.

Identifies and locates maintenance problems, oversees and reviews maintenance and repair work performed by the vendor, and recommends approval or rejection of the work.

Oversees the installation of new process control equipment.

Reports on the status of plant equipment and makes recommendations for preventive maintenance measures.

Maintains a computerized inventory system of parts and equipment.

Maintains regular job attendance in accordance with a schedule established for the position by the supervisor.

Performs other related duties as assigned or as the situation dictates within the scope of this classification.

REQUIRED KNOWLEDGE, SKILLS, AND ABILITIES:

Knowledge of and ability to operate a computer or other technology using standard or customized computer or systems software applications appropriate to the assigned tasks.

Knowledge of the methods and techniques involved in preventive maintenance of the database of a control computer.

Knowledge of electronics as related to process control systems, sensors, and pneumatic and associated transmission systems.

Knowledge of control system instrumentation operation and maintenance.

Knowledge of ladder logic programming as it pertains to programmable logic controllers.

Ability to learn and adapt to advances in computer and electronics device technology and software.

Ability to add or delete data points from the database of the process control computer.

Ability to apply problem solving techniques to locate, analyze, and solve complex computer equipment or software malfunctions.

Ability to learn wastewater treatment principles and practices.

Ability to understand written or oral instructions.

Ability to adhere to safety policies, procedures, and guidelines.

Ability to stand, walk, or sit from 51 to 75% of the time; to reach, push, or pull from 26 to 50% of the time; and to climb, balance, bend, stoop, squat, kneel, crouch, crawl, lift, or type from 0 to 25% of the time.

Ability to use up to twenty (20) pounds of force to move objects up to 33% of the time, to use up to ten (10) pounds of force to move objects from 34 to 66% of the time, and to use lesser amounts of force to move objects from 67 to 100% of the time.

EDUCATION AND EXPERIENCE: *(The knowledge, skills, and abilities above may be acquired through, but are not limited to, the following combination of education and/or experience.)*

College level coursework in Electrical/Electronic Engineering or a related field

AND

Six months of experience in a related area such as installation and maintenance of process control system instrumentation and controls.

WORKING CONDITIONS: *(The conditions herein are representative of those that must be met by the employee to successfully perform the essential functions of the job. Reasonable accommodations may be made to enable individuals with disabilities to perform the essential job functions.)*

Work is performed primarily in an industrial building setting at one of the City's wastewater treatment plants, indoors and out in all weather conditions, near or with electrical currents and mechanical parts, vibrating machinery, at times in confined spaces or at heights of up to twenty feet, in conditions of fumes, odors, dusts, mists, gases, and at noise levels requiring shouting to be heard.

EQUIPMENT OPERATION: *(Any one position may not use all of the tools and equipment listed nor do the listed examples comprise all of the tools and equipment that may be used in positions allocated to this classification.)*

Computer
Telephone
Test and Calibration Equipment
Instrumentation Testing Equipment
High Voltage Variable Frequency Drives

Previous Revision Date(s):
6/24/93