

SENIOR PLANT OPERATOR

This class specification indicates, in general terms, the type and level of work performed as well as the responsibilities of employees in this classification. The job functions described are not to be interpreted as being all-inclusive to any specific employee.

DEFINITION

Under direction, oversees and participates in the more complex and difficult work of staff responsible for operating, monitoring, and maintaining plant equipment to control unit processes; ensures wastewater treatment plant operates within regulatory guidelines; performs adjustments and repairs to plant equipment; collects samples for laboratory testing; performs minor maintenance such as flushing sludge lines to digesters, adding oil, and cleaning drains; and performs duties as assigned.

SUPERVISION RECEIVED AND EXERCISED

Receives direction from assigned supervisory and/or managerial staff. Exercises no direct supervision of staff. Exercises technical and functional direction over and provides training to lower-level staff.

CLASS CHARACTERISTICS

This classification is the third of four levels in the plant operator job series. Incumbents oversee the day-to-day work of staff in assigned areas of responsibility and ensure that equipment, systems, and facilities in OC San wastewater treatment plants are operated and maintained in a safe and efficient manner. Responsibilities include inspecting and attending to assigned areas in a timely manner and performing a wide variety of tasks in the operation, maintenance, and repair of assigned facilities and systems. Performance of the work requires the use of considerable independence and initiative within established guidelines. Within the requirements of a 24/7 operation, this class, as with the Lead Plant Operator, may be responsible for planning, organizing, and overseeing operations on an assigned shift and/or in a functional area within the plant. This class is distinguished from Lead Plant Operator in that the latter is responsible for performing the most complex duties assigned and serves in a lead capacity over assigned staff.

EXAMPLES OF ESSENTIAL JOB FUNCTIONS (Illustrative Only)

The following essential job functions are typical for this classification. Incumbents may not perform all of the listed job functions and/or may be required to perform additional or different job functions from those set forth below to address business needs and changing business practices.

- Leads, trains, and monitors the work of staff responsible for the operation and control of wastewater through the treatment plant; works with supervisors to formulate work plans and delegates tasks to be performed.
- Participates in overseeing the operations of an assigned functional area, including the development of goals and objectives for assigned activities.
- Ensures compliance with all local, state, and federal laws, rules, and regulations.
- Performs assigned treatment plant rounds including adjusting process controls to daily required parameters and inspecting, monitoring, and documenting plant operations by reading plant equipment gauges, dials, graphs, and other instrumentation; ensures the treatment plant operates within regulatory guidelines.

- Oversees and participates in the operation of plant equipment including engines, motors, boilers, compressors, conveyers, and pumps to control unit processes such as raw sludge pumps and primary clarifiers, digesters, centrifuges, activated sludge, dissolved air flotation, scrubbers, prime movers, and pumping facilities regulating the flow of wastewater through the treatment plant.
- Oversees and participates in the monitoring and controlling of wastewater flow and plant processes to ensure efficient and safe operation and compliance with permit requirements; performs sight and sound inspections of equipment; takes readings of meters and gauges; collects wastewater and sludge samples to perform lab tests; adjusts processes within authorized parameters, including plant flow, sludge pumping cycles, and chemical addition units.
- Oversees and participates in the general maintenance of plant facilities and work areas including cleaning grit bins, screen bins, pump rooms, dewatering area, tunnels, rolling hoses, sweeping, and removal of trash and debris; maintains security of plant facilities.
- Performs minor maintenance tasks on equipment such as flushing sludge lines to digesters, adding oil, flushing y-screens, and clearing drains; reports malfunctions to appropriate department; performs emergency repair work on plant operation equipment, as directed, or assists other divisions with repairs.
- Assists supervisors in planning and overseeing the operation of various maintenance and construction projects; responds to maintenance and construction requests to facilitate process operation equipment by performing isolations, shut-downs, tag-outs, and start-ups of plant operation equipment before and after testing, maintenance, and emergency repairs are performed.
- Records data related to plant operation processes, including digester temperatures, sludge density, blanket levels, and dissolved oxygen reading; completes daily operating logs of routine and unusual operating or maintenance conditions encountered, and any repair work performed; initiates work orders, memos, and requests for maintenance repairs as necessary.
- Reads and reviews a variety of pertinent data connected with plant operations including logs of previous shifts, lab reports, correspondence, and status and bulletin boards.
- Determines chemical ordering levels and inventory requirements; receives and stores chemicals, equipment, and parts necessary for plant operations; may be trained to operate shop mule, forklift, or stationary crane to move materials, supplies, and equipment.
- Maintains, compiles, and updates a variety of plant operations logs, reports, and lists including round sheets, spreadsheets, monthly summaries, data sheets, timesheets, overtime reports, spill reports, odor complaint reports, standby lists, emergency notification lists, shutdown lists, and equipment lists; gathers and analyzes data, prepares a variety of reports including the Monthly Summary of Operations, and submits to supervisor.
- Attends meetings and trainings as necessary; maintains current knowledge and understanding of treatment plant processes.
- May supervise staff and operations in absence of Operations Supervisors, if qualified.
- Operates a variety of equipment and tools necessary to operate and maintain the wastewater treatment plant system and equipment.
- Ensures safety and health procedures and precautions are adhered to, corrects unsafe work conditions/practices, and/or reports unsafe work conditions/practices to assigned supervisory or managerial staff.
- Performs duties as required.

QUALIFICATIONS

Knowledge of:

- Principles of providing functional direction and training.
- Operations, services, and activities of a wastewater treatment program.
- Advanced principles, practices, operating procedures, materials, chemicals, and equipment related to the operation and maintenance of a wastewater treatment plant and related facilities.
- Advanced operating principles and preventative maintenance methods and techniques related to plant

- equipment, such as valves, pumps, and motors, and facilities.
- Advanced methods and techniques of reading and interpreting gauges, recording devices, and related system monitors.
- Advanced methods and techniques of collecting samples and conducting laboratory tests and procedures related to wastewater treatment analysis.
- Emergency maintenance and repair procedures related to wastewater treatment facilities.
- Advanced principles of chemistry, biology, and mathematics.
- Confined space entry requiring the use and operation of Self Contained Breathing Apparatus (SCBA).
- Safety principles, practices, and procedures of all facilities, equipment, and materials used in wastewater treatment operations including the proper handling of chemicals.
- Principles and practices of record keeping and reporting.
- Applicable federal, state, and local laws, codes, and ordinances relevant to area(s) of responsibility.
- The structure and content of the English language, including the meaning and spelling of words, rules of composition, and grammar.
- Current equipment and communication tools used for business functions and program, project, and task coordination, including computers and software programs relevant to work performed.

Ability to:

- Organize and coordinate the work of assigned staff.
- Effectively provide staff leadership and work direction.
- Inspect the work of assigned staff and maintain established quality control standards.
- Train assigned staff in proper and safe work procedures.
- Operate, monitor, and maintain a variety of wastewater treatment plant equipment, facilities, and systems.
- Read and interpret gauges, recording devices, and related monitors and adjust plant processes.
- Collect a variety of wastewater samples and conduct appropriate tests in accordance with state and federal regulations and requirements.
- Perform complex inspections, monitor processes, diagnose complex operational problems, and perform effective maintenance of treatment plant facilities and equipment.
- Write detailed outage lock out/tag out (LOTO) procedures.
- Compile, analyze, and record complex data and material and prepare accurate and detailed reports.
- Make accurate arithmetic calculations.
- Read and interpret construction drawings and specifications.
- Safely and effectively use and operate hand tools, mechanical equipment, power tools, and equipment required for the work.
- Maintain accurate and detailed logs and records of work and laboratory tests performed.
- Enter confined space requiring the use and operation of Self Contained Breathing Apparatus (SCBA).
- Understand, interpret, apply, and ensure compliance with all pertinent laws, codes, regulations, policies and procedures, and standards relevant to work performed.
- Organize and prioritize a variety of projects and multiple tasks in an effective and timely manner; organize own work, set priorities, and meet critical time deadlines.
- Use tact, initiative, prudence, and independent judgment within general policy, procedural, and legal guidelines.
- Comply with safe work practices and procedures in the workplace.
- Provide a high level of customer service by effectively dealing with the public, vendors, contractors, and OC San staff.
- Effectively use computer systems, software applications relevant to work performed, and modern business equipment to perform a variety of work tasks.
- Communicate clearly and concisely, both orally and in writing, using appropriate English grammar and syntax.

- Establish, maintain, and foster positive and effective working relationships with those contacted in the course of work.

Employment Standards:

Any combination of education and experience that provides the required knowledge, skills, and abilities may be qualifying as determined by OC San.

1. High school diploma or G.E.D., supplemented by specialized training in wastewater treatment plant operations or a related field.
2. Three (3) years of increasingly experience in wastewater treatment plant operations.

Licenses and/or Certifications:

- Must possess a valid California Class C driver's license.
- Must possess a valid Grade III California Wastewater Treatment Plant Operator Certificate.

Disaster Service Workers:

All Orange County Sanitation District employees are designated Disaster Service Workers through state law (California Government Code Section 3100-3109). Employment with the Orange County Sanitation District requires the affirmation of a loyalty oath to this effect. Employees are required to complete all related training as assigned, and to return to work as ordered in the event of an emergency.

PHYSICAL DEMANDS

- Mobility to work the plant; to sit, stand, and walk on level, uneven, or slippery surfaces; frequently reach, twist, turn, kneel, bend, stoop, squat, crouch, grasp, and make repetitive hand movement in the performance of daily duties; to climb and descend ladders, to operate varied hand and power tools and equipment, and to operate a motor vehicle and visit various OC San sites, projects, and/or meetings.
- Perform medium to heavy physical work; to lift, carry, push, and pull materials and objects up to 51 pounds, or 75 pounds or heavier weights with the use of proper equipment and/or assistance from other staff.
- Work requires entry into confined spaces and the use of confined entry equipment and protective safety equipment.
- Vision to read printed materials, recording devices, and related monitors and to inspect and operate equipment; color vision to read gauges and identify appurtenances.
- Field work requiring frequent walking in operational areas to identify problems or hazards.
- Finger dexterity to access, enter, and retrieve data using a computer keyboard or calculator and operate tools and equipment.

ENVIRONMENTAL ELEMENTS

- Field work with exposure to loud noise levels, cold and hot temperatures, inclement weather conditions, road hazards, vibration, confining workspace, heights, chemicals, mechanical and/or electrical hazards, hazardous physical substances and fumes, dust, and air contaminants.
- Employees may interact with upset staff and/or public and private representatives in interpreting and enforcing departmental policies and procedures.

OTHER REQUIREMENTS

- Probationary Period: All OC San employees, except classifications considered "at-will", are subject to the probationary period provisions as specified in the applicable Memorandum of Understanding, policies, and/or resolutions. Employees who have not yet successfully completed their initial

probationary period serve “at-will” and may be released from employment without cause or recourse to any appeal or grievance procedures.

- Pre-Employment: All employment offers are contingent upon successful completion of OC San’s pre-employment process, which includes a background investigation, a physical examination, and a drug screen.
- Work Location Assignment: Employees will be assigned to a work location based on business needs which may be located at any/all of OC San locations; this work location may be changed at any time.