JOB DESCRIPTION

Coachella Valley Water District

February 2008

TITLE: Chemist

SECTION: Laboratory

DEPARTMENT: Engineering

REPORTING RELATIONSHIP:

Reports to: Laboratory Director

Supervises the following positions: Not Applicable

DEFINITION: Under general direction of the Laboratory Director, to perform standardized and nonstandardized chemical, instrumental, physical and biological analyses of potable water, sewage system water, irrigation water and other sources of water to determine quality, safety and suitability of water for a variety of uses. Assists in the development and maintenance of laboratory information management systems. Assists with the direction and training of laboratory staff; and performs related work as required.

ESSENTIAL FUNCTIONS:

1. Capable of performing all of the analyses for which the laboratory has certification in an efficient, safe, and accurate manner, from the most complex instrumental analysis to the most basic of analysis.

2. Prepares written reports on analyses. Responds to questions from other District personnel about analyses of water samples and chemical procedures. Helps maintain the laboratory computer database. Meets schedules and deadlines such as sample holding times.

3. Assist in the development of the annual engineering department budget as it relates to the water quality laboratory.

4. Train other laboratory personnel as needed on any of the analyses for which the laboratory has certification.

5. Complete first level of review of all laboratory data for quality assurance.

6. Responsible for accurate and complete documentation of all laboratory functions.

7. Assist the Chief Chemist with the Quality Assurance functions using knowledge of all QA/QC requirements.

8. Receive samples into the laboratory and assure sample integrity.
ESSENTIAL FUNCTIONS (Cont.):

9. Help Chief Chemist in the data management of the analyses and flow control of samples in the laboratory. Must be fully versed in CVWD’s Laboratory Information Management System (LIMS) operations.

10. Responsible for keeping inventories up to date, specialty standards, and discarding outdated chemicals.

MINIMUM QUALIFICATIONS:

License or Certificates: Possession of an appropriate California operator’s license issued by the State Department of Motor Vehicles. Department of Motor Vehicles driving record may influence employment or classification. An American Water Works Association (AWWA) or Water Environment Federation (WEF) Water Quality Analyst Grade 1 is desired, a Grade 2 certification or higher from the AWWA or WEF is strongly recommended.

Education: A Baccalaureate degree in chemistry, biochemistry, biology, zoology, microbiology or a closely related science with at least eight semester units in bacteriology and 32 semester units in organic chemistry, inorganic chemistry and biochemistry required. Graduate courses and/or degree preferred.

Experience: At least ten years of current laboratory bench experience of which five years of included work in a water laboratory or environmental analysis laboratory performing wet chemical and instrumental analysis and bacteriological analyses, including quality control applications.

Knowledge of:
- Basic chemical and biological testing procedures.
- Laboratory safety procedures.
- Equipment and material care and maintenance.
- Basic computer operation.
- Logbook maintenance.
- Data handling in each test the laboratory performs.
- QA/QC procedures.

Abilities:
- Perform fundamental laboratory analyses efficiently, safely, and accurately.
- Learn complex analytical procedures.
- Communicate effectively using English, both verbally and in writing.
- Keep clear and concise records.
- Work cooperatively with others.
- Operate a computer workstation.
- Work safely and follow established safety procedures.
- Work cooperatively and without close supervision.
PHYSICAL REQUIREMENTS:

1. Ability to sit or stand at laboratory benches and computer screens for extended periods of time, and tolerate the extended use of standard laboratory safety equipment,

2. Must be able to work safely in a hazardous environment with potential exposure to and presence of toxic, carcinogenic, mutagenic, radioactive and other tissue destructive chemicals, bacterial cultures, raw sewage and physical hazards. May work in areas containing dust, exhausts, fumes, and vapors.

3. Ability to move light to medium weights including 1-gallon bottles, small ice chests and sample-laden carts.

4. Dexterity and agility to handle and wash fragile glassware.

5. Uses personal computer, keyboard, mouse and monitor for long periods.

6. Must tolerate the District immunization program.

See Human Resources for physical assessment form.