

Chemist 3

I. KIND AND LEVEL OF WORK

Third-level professional work performing chemical analysis in a laboratory setting. Under limited supervision, an employee in this class is responsible for leading chemical analysis and may specialize in the use or operation of a specific complex analytical system. This position operates as a lead worker by providing training, guidance, and technical expertise to other chemists. The employee has responsibility for evaluating outcomes of analysis and testing and methods and procedures used, ensuring that results meet established criteria. May develop and/or modify methods and procedures to ensure accuracy of results is obtained.

II. DISTINGUISHING CHARACTERISTICS

This class differs from a Chemist 2 in that it provides training and operates as a lead worker for other chemists. It differs from the class of Chemist Supervisor in that it does not formally supervise staff.

III. EXAMPLES OF WORK/DUTIES

(A position may not include all the work examples given, nor does the list include all that may be assigned.)

- Perform complex chemical quantitative, qualitative, and physical analysis of various materials to provide composition information and to determine compliance with product specifications.
- Review completed data analysis package, evaluate results and review associated quality assurance data to determine if data meets established criteria.
- Develop and/or modify methods and procedures to respond to regulatory situations, emergency events, or to enhance lab capacity and capability.
- Resolve instrument and equipment issues including troubleshooting, consulting with service techs, requesting and scheduling repair, and verifying equipment prior to return-to-use in accordance with lab procedures, manufacturers manuals and current software upgrades.
- Advise and provide training to other professional chemists and technical laboratory personnel in chemical analysis and safety procedures.
- Participate in audits which may include performing test demonstrations, making requested records available, answering questions, etc. Lead analysts and lab personnel in implementing audit recommendations.
- Investigate new technologies, methods and validate new analytes to develop or improve methods.

IV. KNOWLEDGE, SKILLS, AND ABILITIES

Knowledge of:

- *Principles, practices, procedures and techniques of analytical chemistry sufficient to advise and train others on techniques and procedures to use.*
- *Chemical laboratory test equipment sufficient to choose, operate, and maintain equipment for use in assigned chemical analysis and act as expert in the use of one or more complex laboratory apparatus.*
- *Databases sufficient to use non- standard or advanced software features as research tools and generate a variety of reports.*
- *Leadership skills sufficient to constructively manage a scientific team, project, or study.*

Ability to:

- *Assemble, draft and finalize research material.*
- *Perform specialized chemical analysis.*
- *Direct staff in the preparation and analysis of samples.*
- *Follow approved scientific laboratory methods sufficient to ensure the accuracy, validity, and completeness of test results.*

LICENSURE/CERTIFICATION/STATUTORY REFERENCES

SPECIAL WORK CONDITIONS

REFERENCES

Former title(s): Analytical Laboratory Specialist, 12/23

REVISION HISTORY

Established 6/81

Revised 12/23