MENDOCINO COUNTY GOVERNMENT
CLASS SPECIFICATION

CLASS TITLE: PUBLIC HEALTH MICROBIOLOGIST TRAINEE
DEPARTMENT: PUBLIC HEALTH LABORATORY
REPORTS TO: LABORATORY DIRECTOR

JOB SUMMARY:
Under close supervision, learns to perform routine microbiological, chemical, serological and other tests in the Public Health Laboratory for the detection of disease-causing microorganisms in human body fluids, food, water, and animal tissues; analyzes laboratory data, prepares reports and maintains laboratory equipment; and performs related duties as assigned.

DISTINGUISHING CHARACTERISTICS
This is the entry level in the flexibly staffed class series. Official recognition from the Laboratory Field Services Division of the California Department of Health Services as an approved Public Health Microbiologist Trainee is required. Incumbents receive training in all approved laboratory microbiological procedures and are instructed in the use and care of laboratory equipment. Incumbents in this classification must pass the state certification examination and be granted a valid certificate as a Public Health Microbiologist within eighteen months from date of hire.

SUPERVISION EXERCISED
Exercises no supervision.

ESSENTIAL JOB FUNCTIONS:
Learn to complete routine microbiological examinations by administering enzyme immunoassay and/or other testing methods to qualitatively detect and identify microbial agents to assist in the detection, definition and control of disease.

Learn to complete routine serological examinations to assist in the detection, definition and control of disease.

Learn to prepare stains, culture media and reagents used in diagnostic procedures to ensure the integrity of the diagnostic testing.

Learn to interpret laboratory data to verify the integrity of the testing procedures used, keep records and make reports.

Learn to enter and manipulate data, using a personal computer and various software programs, to produce test results, create worksheets and reports.

Learn to perform preventive maintenance of laboratory equipment including changing filters, cleaning/sterilizing instruments and calibrating temperature gauges to maintain the integrity of testing results.

MATERIAL AND EQUIPMENT USED:
- Vironostika Sample Processor
- GenProbe Leader Luminometer
- Rotator for RPRs
- ELX 800 Plate Reader
- CO₂ Measuring Device
- Pipettes and Dispensing Devices
- Dissecting Microscope
- Refrigerated Centrifuge
- Light Microscope/Fluorescent Microscope
- Incubators
- Freezers
- Biological Safety Cabinet
- Gas Bunsen Burners
- Bacti Cinerator
- Refrigerators

MINIMUM QUALIFICATIONS REQUIRED:
(Any combination of education, experience and training that would provide the same or an equivalent set of knowledge, skills, and abilities. Typical qualifying experience would be:)

Education and Experience:
A bachelor's degree from an accredited college or university in public health microbiology, biology, clinical laboratory science or a closed related field, PLUS; official recognition from the Laboratory Field Services Division of the California Department of Health Services as an approved Public Health Microbiologist Trainee.
Licenses and Certifications:
Incumbents in this classification must pass the state certification examination and be granted a valid certificate as a Public Health Microbiologist within eighteen months from date of hire.

KNOWLEDGE, SKILLS, AND ABILITIES:

Knowledge of:
Bacteriological, serological, mycological, parasitological and other microbiological principles, techniques, equipment and terminology used in the laboratory diagnosis of disease.

The chemical principles, techniques and terminology used in the examination of body fluids and water.

Applicable state, federal and local ordinances, laws, rules and regulations.

Methods and techniques of research, statistical analysis and report presentation.

Computer applications and hardware related to performance of the essential functions of the job.

Sterile techniques and the consequences of contaminations on safety and accuracy in the laboratory.

Ability and Skill to:
Learn to perform public health laboratory tests skillfully.

Learn to work cooperatively and effectively with others, observing proper safety precautions and procedures.

Apply concepts such as fractions, percentages, ratios and proportions to laboratory equipment and tools.

Speak effectively and respond to questions, tailoring the message to the target audience.

Prepare clear and concise reports, correspondence and other written materials.

Research, compile and summarize a variety of information and statistical data and materials.

Apply logical thinking to solve problems or accomplish tasks.

Understand, interpret and communicate complicated policies, procedures and protocols.

Organize work, set priorities and follow up on assignments with a minimum of direction.

Use initiative and independent judgment within established guidelines.

Communicate clearly and effectively, both orally and in writing, using tact and discretion, as circumstances require.

Establish and maintain effective working relationships with those encountered in the course of work.

Working Conditions:  (Essential duties require the following physical skills and work environment.)
While performing the duties of this position, the employee is required to regularly speak, listen, smell, exercise shape perception and discrimination, color perception, sound perception, texture perception and discrimination.

While performing the duties of this position, the employee is frequently required to sit, stand, walk, use fingers and hands, handle and/or feel objects, tools and/or controls, reach with hands and arms.

While performing the duties of this position, the employee may be required to lift and/or move objects weighing up to 50
While performing the duties of this position, the employee works indoors.

While performing the duties of this position, the employee is exposed to moving mechanical parts of equipment, tools or machinery.

While performing the duties of this position, the employee is exposed to fumes, toxic or caustic chemicals and infectious diseases.

While performing the duties of this position, the employee is exposed to fluctuating temperatures due to laboratory environment requirements.

The noise level while performing these duties is generally loud due to the variety of laboratory equipment in use.

This class specification should not be interpreted as all-inclusive. It is intended to identify the essential functions and requirements of this job. Incumbents may be requested to perform job-related responsibilities and tasks other than those stated in this specification. Any essential function or requirement of this class will be evaluated as necessary should an incumbent/applicant be unable to perform the function or requirement due to a disability as defined by the Americans with Disabilities Act (ADA). Reasonable accommodation for the specific disability will be made for the incumbent/applicant when possible.