JOB DESCRIPTION
Mapping Technician I (Flex)
Mapping Technician II
Code Number: 24006, 24005

GENERAL PURPOSE

Under general supervision, performs a variety of routine to difficult computer workstation operations to maintain and produce accurate land-base and/or facilities maps for EMWD; and performs related duties as assigned.

DISTINGUISHING CHARACTERISTICS

Mapping Technician I is the entry level class in the Mapping Technician series. Initially under close supervision, incumbents perform the more routine duties while learning District policies and procedures and becoming familiar with the variety of departmental systems and practices. As experience is gained, duties become more diversified and are performed under more general supervision. This class is alternately staffed with Mapping Technician II, and incumbents may advance to the higher level after gaining experience and demonstrating proficiency which meet the qualifications of the higher level.

Mapping Technician II is the experienced/journey level class in the series, fully competent to independently perform duties. This class is distinguished from the lower classification of Mapping Technician I by the relative independence with which duties are performed.

Mapping Technician II is further distinguished from Senior Mapping Technician in that the latter serves as either a lead or advanced-journey level in the series.

ESSENTIAL DUTIES AND RESPONSIBILITIES

*The duties listed below are intended only as illustrations of the various types of work that may be performed. The omission of specific statements of duties does not exclude them from the position if the work is similar, related or a logical assignment to the class.*

- Inputs new land and facility plans into the GIS, including both graphics and database attributes; updates information upon receipt of as-built plans.

- Updates originally recorded engineering drawings and plans with new as-built data obtained from District units utilizing manual and CAD techniques.
Creates maps, drawings and designs such as site plans, grading and drainage plans, pump and piping plans, conceptual route maps for construction projects, and pressure zone maps utilizing the CAD system.

Prepares detailed automated drawings of existing facilities; prepares prints of various original plans and District records for internal and external agency use; provides complete and accurate record drawings and other information to departments and to other public and private agencies and organizations.

Processes letters for facility location requests and assists field personnel requests for location.

Assists customers in person, via mail and over the phone providing information from maps and plan and profile drawings of water and sewer lines, and making prints of plans as requested.

Obtains record information from other utilities; researches files, drawings and maps for water line locations, depth and other relative information; checks assessor’s maps, survey maps and parcel information for various data.

Plots easements for District right-of-way; plots recorded parcel and subdivision maps on District record maps and inputs to the GIS.

Checks quality and accuracy of completed maps and records prepared by others.

May assist in field studies and other special projects.

May interpret field survey notes and prepare design drawings.

Performs related duties as assigned.

DESIREMINIMUM QUALIFICATIONS

Knowledge of:

Terminology, methods, practices, techniques and nomenclature of civil, mechanical and/or electrical engineering drafting by hand and using computers; GIS and CAD system and drafting media; COGO software and modern drafting and mapping procedures; algebra, geometry and trigonometry as applied to mapping processes; District operating policies and departmental work procedures and quality standards; District files and locations and the means for retrieving information.
**Ability to:**

Work on a variety of computer-aided drafting and GIS applications; follow and apply written and oral instructions; perform detailed work thoroughly, neatly, accurately and efficiently; properly use and care for drafting equipment, instruments and personal computers; read and interpret field notes and engineering and construction drawings; perform basic engineering computations; prepare maps, plans and records; communicate effectively, orally and in writing; follow and apply oral and written work instructions; establish and maintain effective working relationships with those contacted in the course of work.

**Training and Experience:**

A typical way of obtaining the knowledge, skills and abilities outlined above is graduation from high school or G.E.D. equivalent, supplemented by courses in mechanical drawing, engineering drafting, CAD or GIS; and one year of experience performing sub professional, technical civil engineering work, including six months of operating a personal computer using GIS or CAD software; or an equivalent combination of training and experience.

A Mapping Technician I may be considered for advancement to Mapping Technician II after demonstrating proficiency to perform the major duties assigned to the class.

Typically, a Mapping Technician I is expected to be capable of meeting the proficiency criteria within a 6-24 month period, depending on an individual’s prior experience and progression in performing the full range of Mapping Technician II duties as described in the established performance criteria.

**Licenses; Certificates; Special Requirements:**

Some positions may require a valid California driver’s license and the ability to maintain insurability under the District’s Vehicle Insurance Policy.

**PHYSICAL AND MENTAL DEMANDS**

*The physical and mental demands described here are representative of those that must be met by an employee to successfully perform the essential functions of this class. Reasonable accommodations may be made to enable individuals with disabilities to perform the essential functions.*
Physical Demands

While performing the duties of this job, the employee is regularly required to walk, stand and sit; talk and hear, both in person and by telephone; use hands to finger, handle, feel or operate standard office equipment; and reach with hands and arms. The employee is occasionally required to lift objects weighing up to 25 pounds.

Specific vision abilities required by this job include close vision, color vision and the ability to adjust focus.

Mental Demands

While performing the duties of this class, the employee is regularly required to use oral communication skills; read and interpret information and documents; analyze and solve problems; observe and interpret situations; use math/mathematical reasoning; learn and apply new information and skills; perform detailed work on multiple tasks, and be able to handle many interruptions during the day and get right back on task after each one.

WORK ENVIRONMENT

The work environment characteristics described here are representative of those an employee encounters while performing the essential functions of this class. Reasonable accommodations may be made to enable individuals with disabilities to perform the essential functions.

The employee usually works under typical office conditions where the noise level is generally quiet. Employees may infrequently be required to work in outside conditions, exposed to hot or cold conditions, where the noise level may be loud.

FLSA DETERMINATION: Non-exempt.
FLEX REQUIREMENTS
Mapping Technician II
Mapping Technician I (Flex)

LENGTH OF TIME REQUIRED

A Mapping Technician I may advance or “flex” to the Mapping Technician II class after 6-24 months of experience in the Mapping Technician I class.

PERFORMANCE RATING

The incumbents must receive an overall performance rating of “good” or better on their most recent annual performance evaluation in order to flex to the higher class.

COMMENTS

The Mapping Technician I must also demonstrate proficiency to perform the full range of duties as described in the Mapping Technician I/II job description. This includes demonstrating proficiency in the utilization of GIS and CAD applications, and an understanding of the procedures for processing facility and land-base information from Engineering, Operations, and Customer Service into the GIS environment.