SACRAMENTO MUNICIPAL UTILITY DISTRICT

JOB SPECIFICATION

JOB TITLE: JOB CODE: REP CODE:

SR SURV ENGRG TECH-COP 50099177 OSE

JOB PURPOSE:

Performs technical surveying duties for property, construction, precise

surveys (including engineering, deformation and as-built surveys), and

topographical survey functions.

DEFINITION OF LEVEL:

OTHER

NATURE AND SCOPE:

This series is assigned to distribution services. This is the lead

and/or journey level job class in the Survey Engineering Technician

series. Incumbents may serve in a lead capacity and direct the work of

an assigned field crew, and/or may serve as specialists who work

independently and deal with the most complex and technical analysis of

survey data in an office setting.

ESSENTIAL FUNCTIONS/DUTIES AND EXPECTED RESULTS:

Work includes but is not limited to the following: (Note: While in

general all functions/duties are essential, individual positions within

this class may not require all.) This list is not intended to be

complete or exhaustive.

1. Provides lead direction to an assigned field survey crew; plans,

assigns, directs, and reviews the daily activities of a field survey

crew in conducting preliminary, location, construction, property,

precise, topographic, or other engineering surveys.

2. Performs the more difficult survey calculations using trigonometry,

coordinate geometry, algebra, and statistics.

3. Prepares complex survey drawings such as topographical, right-of-way,

and profile, using AutoCAD and SoftDesk civil engineering software.

4. Interprets legal descriptions, construction plans, and recorded maps;

prepares computerized legal descriptions.

5. Researches and compiles recorded documents and maps; resolves

discrepancies between recorded and surveyed data.

6. Maintains records of instrument readings, landmarks, reference

points, land descriptions, sketches, computations, and construction

data.

7. Reviews maps, deeds, plans, and related data to determine the most

efficient method of conducting assigned survey projects; briefs

crewmembers on survey objectives and procedures.

8. Locates and identifies monuments, benchmarks, property markers, and

other reference points required for survey control.

9. Trains and instructs crewmembers in surveying methods, procedures and

practices, and in the proper use and care of survey instruments and

equipment.

MINIMUM QUALIFICATIONS:

KNOWLEDGE OF:

Basic supervisory principles and practices; complex land,

topographic, and construction surveying principles and practices;

boundary control and legal principles of land surveying; District

policies for writing accurate right-of-way legal descriptions; computer

software applications for surveying work including AutoCAD/Softdesk,

TINs, and DTMs; hand held calculators with SMI survey software; Global

Positioning System (GPS) systems and software surveying applications;

mathematics through trigonometry as applied to geodetic and plane

surveying; proper English usage, grammar, punctuation, vocabulary, and

spelling; primary program objectives and functions of assigned area;

mandated workplace/field safety training; relevant SAP modules.

SKILL TO:

Plan, direct, and review the work of others on a project or

day-to-day basis; organize, prioritize, and coordinate multiple work

activities and meet critical deadlines; accurately calculate and

interpret maps and construction plans; set up, operate, clean, and

adjust survey instruments; prepare clear and concise survey drawings and

property descriptions; recognize discrepancies and use sound judgment in

resolving survey related issues; prepare legal descriptions for real

property, easements, and rights-of-way; understand and follow complex or

brief oral and written instructions; communicate effectively and clearly

in English in person and by telephone with other staff; establish and

maintain effective office procedures, records, sketches, note keeping,

and associated files; work in a safe and effective manner; meet and deal

tactfully with contractors, estimator's representatives, regulators,

property owners and other employees; operate personal computers and

use/modify designated software programs and databases; use and use a

variety of business office equipment.

EDUCATION and EXPERIENCE:

AA degree in Surveying or related field, or two (2) years surveying experience comparable to or higher than the Survey Engineering Technician; and three (3) years land surveying experience. Equivalent to completion of sufficient formal and/or informal education to provide the necessary knowledge and skills.

LICENSES OR CERTIFICATIONS:

Possession of a valid California driver's license (Class C).

DESIRABLE QUALIFICATIONS:

Certificate of Registration as a Land Surveyor-in-Training highly

desirable.

PHYSICAL REQUIREMENTS:

Applicants must be able to perform the essential job functions with or

without a reasonable accommodation. This description is incomplete

without the Physical Requirements document obtained from the District S

drive.

This description is incomplete without the physical requirements

document that must be printed and attached. It is located on

[\\Server01\SMUD\Physical\_Job\_Descriptions](file:///\\Server01\SMUD\Physical_Job_Descriptions).