

# Senior Engineer

# Purpose of the role:

Under direction, provides lead supervision to assigned staff; leads, oversees and participates in the conduct of complex engineering projects, including research, design and review for a variety of public works and utility capital improvements, construction development, and/or maintenance programs; performs a variety of technical tasks relative to assigned areas of responsibility; and performs related duties as assigned.

# Distinguishing Characteristics:

This is the advanced journey level class in the Engineer series. Positions at this level are distinguished from other classes within the series by the level of responsibility assumed and the complexity of duties assigned including providing lead supervision to assigned professional and technical staff. Assignments are general and of a continuing nature, requiring the exercise of independent judgment and initiative in scheduling, assigning and coordinating the work with that of other units. Employees perform the most difficult and responsible types of duties assigned to classes within this series including administration of the most complex professional engineering work requiring a substantial level of professional training and experience. Employees at this level are required to be fully trained in all procedures related to assigned area of responsibility.

The following duties are typical for this classification. Incumbents may not perform all of the listed duties and/or may be required to perform additional or different duties from those set forth below to address business needs and changing business practices.

# Essential Duties and Responsibilities:

- Leads, plans, trains, and reviews the work of staff responsible for the
  conduct of complex engineering projects, including research, design
  and review, for a variety of public works and utility capital
  improvements, construction, development and/or maintenance
  programs; participates in performing the most complex work of the
  unit including administration of the most complex professional
  engineering work.
- Trains assigned employees in their areas of work including complex civil engineering and public works construction methods, procedures, and techniques.
- Verifies the work of assigned employees for accuracy, proper work methods, techniques, and compliance with applicable standards and specifications; ensures adherence to safe work practices and procedures.
- Assists in the development, implementation and achievement of goals, objectives, policies, engineering standards and priorities; researches and identifies funding sources for division projects.

- Prepares and administers the capital improvement or development plan and budget in assigned area of responsibility.
- Prepares conditions of approval for land development entitlement applications; meets and confers with applicants to discuss development conditions.
- Participates in the development of plans, specifications, estimates and work orders for the construction of public works and wastewater and water utility projects; participates in the development of capital improvement plan projects, including the selection and supervision of consultants and the preparation of plans, specifications and cost estimates.
- Reviews improvement plans for development projects to ensure compliance with City standards; checks computations and specified materials for accuracy and conformance with regulations.
- Reviews and approves construction plans prepared by private engineers, including the checking of hydrology calculations and hydraulic reports.
- Inspects project sites to assist in the solution of difficult problems; interprets specifications and City policies, and initiates and reviews change orders.
- Serves as staff to the City Council, Planning Commission and various committees on public works, water, wastewater utility, or building construction matters.
- Initiates and conducts engineering planning studies to identify public works and wastewater and water utility facility needs; revises design and construction standards to improve methods, procedures and practices.
- Coordinates public works, water, wastewater utility, or building construction activities with other departments and outside agencies.
- Investigates and responds to concerns regarding traffic engineering operations including parking, traffic calming, school zone safety and traffic control plans for construction work zones.
- Provides project management of traffic signal construction and maintenance projects; administers maintenance contracts; works with signal technicians to resolve timing and operation concerns.
- Responds verbally and in writing to inquiries from developers, contractors and the public; provides information within the area of assignment; resolves complaints in an efficient and timely manner.
- Prepares memos and reports related to area of assignment; makes presentations to Council, Commission, and other groups as necessary.
- Estimates time, materials, and equipment required for jobs assigned; requisitions materials as required.
- Provides lead supervision, trains and assists with the evaluation of professional, technical and inspection personnel.
- Performs related duties as required.

The following generally describes the knowledge and ability required to enter the job and/or be learned within a short period of time in order to successfully perform the assigned duties.

#### Knowledge of:

- Operations, services, and activities of a municipal civil and/or traffic engineering program related to public works construction.
- Principles of supervision, training, and/or performance evaluation.
- Methods and techniques of engineering project management and administration.
- Principles and practices of civil engineering as applied to the public works, water, wastewater, building construction and/or traffic engineering methods.
- Modern methods and techniques used in the design, construction, and maintenance of a wide variety of public works or water and wastewater utility projects.
- Principles and practices of contract administration and project management and evaluation.
- Modern developments, current literature, and sources of information regarding the assigned area of engineering.
- Occupational hazards and standard safety practices.
- Pertinent federal, state, and local laws, codes, and regulations.

#### Ability to:

### Desired Minimum Qualifications:

- Supervise, organize, and evaluate the work of staff.
- Understand the organization and operation of the City and of outside agencies as necessary to assume assigned responsibilities.
- Interpret, explain, and enforce department policies and procedures.
- Understand, interpret, explain, and apply applicable federal, state, and local policies, laws, and regulations.
- Independently perform the most difficult professional engineering work.
- Make complex engineering computations and check, design and supervise the construction of a wide variety of public and private facilities
- Develop plans, specifications, estimates and work orders for the construction of public works, wastewater and water utility and traffic engineering projects.
- Read and interpret a variety of complex engineering and construction designs, specifications and plans.
- Independently manage assigned engineering projects and oversee consulting contracts.
- Ensure project adherence to established engineering and construction plans and specifications.
- Identify needs and assignments and exercise judgment in carrying them out.
- Utilize standard office equipment including computers and related software applications.
- Prepare clear and concise reports.
- Work independently in the absence of supervision.
- Understand and follow oral and written instructions.
- Communicate clearly and concisely, both orally and in writing.
- Establish and maintain effective working relationships with those contacted in the course of work.

- Respond and perform assigned duties in the event of a Citydeclared emergency.
  - Effective Communicator
  - Team Builder
  - Strategic Thinker
  - Politically Astute
  - Results Oriented
  - Technically Knowledgeable

Any combination of education and experience that would likely provide the required knowledge and abilities is qualifying. A typical way to obtain the knowledge and abilities would be:

#### Education:

A Bachelor's Degree from an accredited college or university with major course work in civil engineering or a related field.

## Experience:

### Education and Experience Guidelines:

Competencies:

Five years of responsible professional engineering experience related to area of assignment including two years of experience comparable to an Associate Engineer with the City of Thousand Oaks.

## <u>Licenses; Certificates; Special Requirements</u>:

A valid Class C California driver's license is required.

A valid certificate of registration as a Professional Engineer issued by the California Board for Professional Engineers and Land Surveyors.

Except for the Traffic Division, a Civil Engineering registration is required. Positions in the Traffic Division may require registration as a Traffic Engineer or Civil Engineer.

The conditions herein are representative of those that must be met by an employee to successfully perform the essential functions of this job. Reasonable accommodations may be made to enable individuals with disabilities to perform the essential job functions.

## Physical and Environmental Conditions:

<u>Physical</u>: Sufficient physical ability to work in an office setting; sit, stand, walk, reach, twist, turn, kneel, bend, squat, and/or stoop for prolonged periods of time; perform duties requiring grasping, repetitive hand movement, and fine coordination; and operate office equipment. **Vision:** See in the normal visual range with or without correction; vision sufficient to read computer screens and printed documents and to operate office equipment. **Hearing:** Hear in the normal audio range with or without correction.

**Environment**: Standard office setting; occasionally required to work outside, with exposure to inclement weather conditions or elevated noise levels; regular interaction with officials and the public.

Class specifications are only intended to present a descriptive summary of the range of duties and responsibilities associated with specified positions. Therefore, specifications <u>may not include all</u> duties performed by individuals within a classification. In addition, specifications are intended to outline the <u>minimum</u> qualifications necessary for entry into the class and do not necessarily convey the final qualifications of incumbents within the position.

Pursuant to California Government Code Section 3100, all public employees are required to serve as disaster service workers subject to such disaster service activities as may be assigned to them by their supervisor or by law.

Date Adopted: 7/5/03 Date Revised: 5/1/06

# <u>05/01/06</u>:

- Formerly Senior Civil Engineer.
- Incorporated language to include more specific information on traffic engineering, including registration requirements.