

SENIOR CIVIL ENGINEER

Job Summary:

Under general direction, performs advanced professional civil engineering work such as performing complex and technical engineering plan and systems reviews; provides project leadership and technical guidance to engineering staff, consultants, work groups and/or other staff.

Essential Duties and Responsibilities:

(These functions are representative and may not be present in all positions in the class. Management reserves the right to add, modify, change or rescind related duties and work assignments.)

1. Provides leadership and technical oversight to other engineers. May also assist in the supervision of section staff and activities, including budget development/monitoring and employee performance assessment.
2. Performs highly advanced technical reviews of plans, specifications studies, and reports for the construction, alteration and/or maintenance of roads, storm drainage systems, sidewalks, bikeways, traffic intersections, signing/stripping, traffic signalization, or other related projects.
3. Administers and manages multiple construction and design contracts for various capital improvement projects.
4. Prepares and/or reviews the computation of engineering calculations for various construction design features in order to detect potential problems and determine appropriate solutions.
5. Prepares and monitors project budgets and expenditures.
6. Prepares Council agenda items, city ordinances, resolutions and engineering manuals.
7. Reviews public and private improvement plans such as street and capital improvement plans for compliance with City ordinances and for overall integrity.
8. Processes final subdivision maps, including lot line adjustments and lot mergers.
9. Directs or prepares final project reports and technical advisory reports; monitors and provides recommendations on plan check processing fees.
10. Prepares cost estimates and develops engineering plan and design criteria. Prepares contract documents, proposal specifications and verifies plans and specifications for accuracy.
11. Responds to telephone and in-person inquiries from developers, builders, contractors, and other individuals as needed.
12. Provides engineering assistance to citizen committees and commissions. Provides technical assistance to other agencies or departments.
13. Performs related duties as required.

Qualification Guidelines:

A typical way to obtain the requisite qualifications to perform the duties of this class is as follows:

Education and/or Experience:

Bachelor's degree in Civil Engineering or related field and five (5) years of full-time, paid, professional civil engineering experience. Experience and/or education in a related field may be substituted on a year for year basis.

License and Certificates:

Possession of a valid California Class C driver's license. Employees in this classification will be enrolled in the Department of Motor Vehicles (DMV) Government Employer Pull Notice Program which confirms possession of a valid driver's license and reflects driving record. Possession of a valid certificate of registration as a professional civil engineer in the State of California is required at the time of application.

Knowledge of:

- Design principles, construction techniques, scheduling, phasing and contract administration of public works projects.
- Methods of working in field conditions.
- Safety practices.
- Government processes and regulations.
- Project management techniques.
- Computer aided design (CAD).
- Basic budgeting practices and procedures.
- Basic purchasing practices and contract administration.
- City organization, operations, policies and objectives.
- Supervision and training principles.
- Personal computer software and hardware.
- Office practices and procedures.
- General record keeping practices.
- Research, statistical and analytical methods.
- Cost analysis.
- Effective methods of report presentation.

Skill and Ability to:

- Design and oversee the construction of complex public works facilities.
- Read, interpret and check engineering drawings and designs, including specifications and cost estimates.
- Apply advanced mathematical concepts and perform a full range of engineering calculations to support engineering designs in accordance with applicable codes.
- Identify the need for change orders and evaluate the financial status of projects.
- Prepare traffic control, construction phasing plans, and recovery schedules.
- Utilize consulting and advisory data and information, as well as reference, descriptive and/or design data and information.
- Supervise, direct and evaluate staff.
- Maintain accurate records and prepare clear and concise reports.
- Identify and analyze problems and take effective corrective action.
- Compile, analyze and evaluate data.

- Effectively communicate orally and in writing.
- Establish and maintain effective working relationships with others.
- Make effective oral presentations.
- Operate computers and related software.

Physical Requirements and Working Conditions:

Employee accommodations for physical or mental disabilities will be considered on a case-by-case basis. Positions in this class normally:

- Require vision (which may be corrected) to read small print.
- Perform work which is primarily sedentary.
- Require mobility of arms to reach and dexterity of hands to grasp and manipulate small objects.
- Require the mobility to stand, stoop, reach and bend.
- Is subject to inside environmental conditions.
- May be required to work at a computer terminal for prolonged periods.
- May be required to attend periodic evening meetings and/or to travel within and out of city boundaries to attend meetings.
- May be required to use city and/or personal vehicle in the course of employment.
- May be required to respond to emergency situations.