City of Carson City Engineer

CITY OF CARSON City Council Reso. No:

Class Specification Bargaining Unit: AME

FLSA: Exempt

CITY ENGINEER

Responsible for professional engineering work, providing complex administrative support to the Department Director. Manages, plans and directs the Engineering Division of the Public Works Department. Responsibility encompasses all aspects of engineering, project management, development review, and surveying, overseeing the design, construction of the City's infrastructure system as well as the processing of entitlements for all private development. Ensures City's compliance with all applicable engineering standards, regulations and codes. Under general direction of the Director of Public Works, manages and performs complex and technical engineering duties in the design, coordination and direction of Public Works civil engineering projects including capital improvement; trains, manages, assigns and reviews the work of assigned personnel or consultant(s); performs the land development functions of the department. This position also serves as the City Engineer and is responsible for overseeing the design, construction of the City's infrastructure system as well as the processing of entitlements for all private development.

Essential Duties and Responsibilities:

(The City reserves the right to add, modify, change, or rescind related duties and work assignments.)

- 1. Serves as the City's primary representative for engineering matters.
- 2. Approves construction bid documents prior to advertise the project for construction bid.
- Approves and signs appropriate subdivision parcel maps and tract maps.
- 4. Approves lot line adjustments, lot mergers, and certificate of compliance with the Subdivision Map Act.
- 5. Reviews and approves City Standard drawings with the Director of Public Works.
- 6. Approves Street Improvement Plans, Sewer Area Study, Drainage and Hydrology Study, and other related engineering construction plans.
- 7. Reviews a variety of construction, excavation and other permits issued by Public Works to developers.
- 8. Reviews construction plans and ensures compliance with all applicable codes, regulations and professional practices.
- 9. Develops repair and construction strategies and schedules to effectively maintain the City's road system and stormwater facilities networks.
- 10. Manages Public Works civil engineering projects including building and maintenance facilities, parks and recreation facilities, and other related projects.
- 11. Assists the Director establish priorities for all projects and assignment of departmental resources to be allocated for specific projects. Serves as technical advisor to engineers, technicians and support personnel.

- 12. Supervises and participates in the preparation and review of complex civil engineering designs, plans, contracts, specifications and cost estimates.
- 13. Oversees Engineering Services Division functions, programs, and operations including engineering design, surveying, field inspection, and related operations, functions, and program areas.
- 14. Manages bids and selection of outside contractors for engineering services and participates in troubleshooting to solve engineering problems; reviews the work of engineering and project consultants; schedules and assigns work to ensure completion of projects according to established timelines.
- 15. Develops accurate cost estimates and suggests alternate pathways for accomplishing tasks to deliver projects on time and on budget.
- 16. Selects, trains, manages and evaluates subordinate staff; plans, directs, and coordinates the Engineering Services Division's work plan; assigns projects and programmatic areas of responsibility; reviews and evaluates work methods and procedures; meets with key staff to identify and resolve problems.
- 17. Supervises Traffic Engineer and oversees Traffic Engineering Division.
- 18. Assists the Director of Public Works in the development and administration of the Division's budget; approves the forecast of funds needed for staffing, equipment, materials, and supplies; approves expenditures and implements budgetary adjustments as appropriate and necessary.
- 19. Assists with identifying funds for engineering projects; establishes and manages the City's Capital Improvement Program ("CIP"); identifies and recommends all engineering related CIP funding. projects.
- 20. Represents the Engineering Services Division to other departments, elected officials, the community and outside agencies; coordinates assigned activities with those of other departments and outside agencies and organizations.
- 21. coordinates projects with other City departments, governmental and private agencies, consultants, architects, contractors, vendors and the general public.
- 22. Responds to questions and complaints from the public concerning assigned engineering functions.
- 23. Provides staff assistance to the Department Director, Assistant City Manager and City Manager; prepares and reviews staff reports; prepares and/or reviews written correspondence on a variety of City programs and projects and represents the City/department at meetings with staff, outside agencies, City commissions and committees.
- 24. Attends and participates in professional group meetings; stays abreast of new trends and innovations in the field of engineering.
- 25. Maintains an enthusiastic, self-reliant and self-starting approach to meet job responsibilities and accountabilities. Strives to anticipate work to be done and initiates proper and acceptable direction for the completion of work with a minimum or no supervision and instructions.
- 26. Assists in identifying alternative solutions to routine problems or situations. Implements decisions in accordance with prescribed and effective policies and procedures.
- 27. Plans and directs the completion of engineering projects from the inception of an idea to the final acceptance of the product.
- 28. Performs related duties as required.

City of Carson Page 2 of 3 City Engineer

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 from an accredited four-year college or university in civil engineering and ten (10) years of full-time, paid licensed professional civil engineering experience including five (5) years in a supervisory capacity. Experience and/or education in a related field may be substituted on a year for year basis.

Knowledge of:

- Principles and practices of civil engineering as related to the preparation of plans and specifications of various Public Works projects and subdivision ordinances, design, construction, inspection and maintenance.
- Topographical and construction surveying.
- Excavation, construction and encroachment permit issuance procedures.
- Materials, tools and methodology of street, bridges construction and improvements.
- Principles and practices of management, supervision and training.
- Technical aspects of field of engineering specialty.
- Applicable laws, codes, regulations, policies and procedures.
- Rules and regulations of Federal, State and local funding sources for capital projects.
- City organization, operations, policies and objectives.
- General record keeping practices.
- Budgeting practices and procedures.
- Basic purchasing practices and contract administration.
- Research and analytical methods.
- Personal computer software and hardware.
- Office practices and procedures.
- Effective methods of report writing and presentation.
- Cost analysis.
- Negotiation techniques.
- Project management principles.
- Knowledge of the technical terminology, standard tools, materials and practices used within the industry.
- Knowledge of audit processes for various types of funding sources.
- Knowledge of the occupational hazards and safety precautions of the trade.

Skill and/or Ability to:

- Manage and perform complex technical and professional engineering duties in the design, coordination and direction of Public Works civil engineering projects.
- Prepare plans and specifications and review engineering project cost estimates.
- Adapt approved engineering methods and standards to the design and construction of a variety of municipal Public Works projects.
- Read, interpret, apply and explain codes, rules, regulations, policies and procedures.
- Analyze situations accurately and adopt an effective course of action.

- Work from blueprints, shop drawings and sketches.
- Supervise, direct and evaluate staff.
- Identify and analyze problems and take effective corrective action.
- Effectively communicate orally and in writing.
- Maintain accurate records and prepare clear and concise reports.
- Establish and maintain effective working relationship with others.
- Make effective oral presentations.
- · Conduct research and engineering studies.
- Performs scheduled and unscheduled field inspections of construction work.
- Use independent judgment in performing routine tasks.
- Reads and interprets work orders, policy and procedure manuals and other materials pertaining to the responsibilities of the job.

City of Carson Page 3 of 3 Principal Civil Engineer/City Engineer

License and Certificates:

Possession of a valid California Class C driver's license is required. 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.

Physical Requirements and Working Conditions:

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

- Require vision (which may be corrected) to read small print.
- Perform work which is primarily sedentary.
- Require the mobility to stand, stoop, reach and bend.
- Require mobility of arms to reach and dexterity of hands to grasp and manipulate small objects.
- May operate a personal computer and other office equipment for prolonged periods of time.
- Perform lifting, pushing and/or pulling which does not exceed 50 pounds and is an infrequent aspect of the job.
- Is subject to inside and outside environmental conditions.
- May be required to use City and/or personal vehicle in the course of employment.
- May be required to attend periodic evening meetings and/or travel within and out of City boundaries to attend meetings.
- Respond to emergency situations.