

FIRE ENGINEER

DEFINITION

To operate and maintain fire pumping engines, apparatus, rescue and other firefighting equipment; to drive and position fire apparatus and other equipment at proper locations to facilitate firefighting efforts; to engage in fire suppression and respond to medical emergencies; to perform fire prevention and inspection work; and to perform related duties and responsibilities as required.

SUPERVISION RECEIVED AND EXERCISED

Receives direction from the Fire Captains and Chief Officers.

EXAMPLES OF ESSENTIAL FUNCTIONS - *Essential functions may include, but are not limited to, the following:*

Responds to fire alarms and other emergency calls.

Selects route to be taken to the fire; drives and positions fire apparatus and other fire vehicles in proper location for efficient operation; selects hose nozzle; lays hose line and directs stream of water or chemicals onto fire; performs overhaul activities.

Operates fire pumping engines and other fire suppression equipment; positions and climbs ladder to gain access to upper levels of buildings or to assist individuals from burning structures; creates openings in buildings for ventilation or entrance.

Responds to and provides emergency assistance for other emergency calls, including but not limited to hazardous materials incidents, traffic accidents, water rescue, confined space rescue, etc.

Administers first aid, CPR, basic life support and other emergency assistance at the EMT level.

Responds to calls for non-emergency public service as appropriate.

Maintains contact with superior officer during emergency operations.

Maintains, tests, cleans and ensures the constant readiness of apparatus, trucks and equipment for emergency operations; loads equipment onto trucks; participates in building and grounds maintenance duties.

Participates in fire suppression training and drills.

May assist with fire investigation duties as assigned.

May participate in fire prevention, business occupancy and other inspections; enforces all fire and safety codes, ordinances and regulations and issues citations as necessary; performs follow-up inspections to ensure that deficiencies are corrected.

May participate in the installation, inspection and servicing of fire hydrants; tests hoses and hydrants for proper flow and operation.

Issues burning permits to the public.

May present fire prevention and educational programs to school, civic and community groups; represents the department at meetings with other departments, agencies and organizations as required.

Receives and responds to inquiries, requests for assistance, concerns and complaints from the public regarding fire service and safety matters.

Maintains detailed records and prepares required reports.

May assist in special projects or assignments as required.

Works 24-hour shifts as assigned.

May serve as acting Fire Captain in the absence of the Captain.

MINIMUM QUALIFICATIONS

Knowledge of:

Pertinent federal, state and local laws, regulations and ordinances.

Fire codes, building codes and appropriate health / safety codes pertaining to fire suppression/prevention operations.

Basic firefighting methods and equipment.

Specialized rescue technology and hazardous materials issues.

Principles and techniques of modern first aid, rescue, resuscitation and emergency medical services.

Principles of water hydraulics.

Principles of combustion as related to the various types of building and construction materials.

The layout of local roads and the locations of various neighborhoods and fire hydrants.

Modern office practices and technology, including the use of computers for word and data processing.

Methods of report preparation.

Safe work practices.

Public / community relations techniques.

Ability to:

Understand and apply federal, state and local laws, rules and regulations, as well as departmental policies and procedures, related to fire suppression/prevention operations.

Analyze problems, identify alternative solutions, determine consequences of proposed actions and implement recommendations in support of goals.

Work under stressful or dangerous conditions, often involving considerable personal risk or risk to others.

React quickly and calmly in emergency situations.

Appraise situations and people accurately and quickly, and adopt an effective course of action.

Deal courteously, yet firmly and effectively with the public in emergency situations.

Properly use and maintain fire suppression, emergency medical and other work-related equipment.

Perform routine building and grounds maintenance duties at fire station.

Learn standard emergency radio procedures and codes.

Maintain detailed records and prepare required reports.

Perform mathematical computations with accuracy.

Make effective public presentations.

Communicate clearly and concisely, both orally and in writing.

Establish and maintain effective working relationships with those contacted in the course of work.

Meet the physical requirements necessary for successful job performance.

Experience:

Two years of full-time, paid experience in fire suppression.

Education:

Graduation from high school or GED equivalent.

Substitution:

An Associate's degree or higher from an accredited college or university may be

substituted for one year of the required experience.

Additional Requirements:

Possession of a valid California Class “B” Operator’s License with appropriate endorsements.

Possession of California Firefighter I and II certification or completion of course work at a California Certified College Firefighter I Academy.

Possession of valid EMT-I certification.

TYPICAL WORKING CONDITIONS

Work is performed in an indoor and field environment. Incumbent drives on surface streets and may be exposed to traffic and equipment hazards, fire hazards, electrical currents, air contaminants, adverse weather conditions, temperature and noise extremes, wetness, violence, explosives, fumes, dusts, odors, toxic or caustic chemicals, pathogenic substances, vibration, radiation. The employee frequently works in high, precarious places. Worker is subject to unusual fatigue from irregular working hours / incident call activity.

TYPICAL PHYSICAL REQUIREMENTS

Requires the mobility to work in an indoor and field environment. Requires the ability to stand for long periods of time, and intermittently walk, run, climb, balance, bend, kneel, squat, crawl, twist and reach while performing duties. Must regularly lift and/or move up to 50 pounds frequently and up to 100 pounds occasionally. Must be able to use hands for fingering, handling or feeling objects, tools or controls. Requires the strength and stamina to perform fire suppression duties, including staying on feet for long periods of time. Must stay hydrated. climbing stairs, handling hoses, operating equipment, and driving a motor vehicle. Must be able to maintain effective audio-visual discrimination and perception needed for making observations, communicating with others, reading and writing, and operating office and fire suppression equipment. Must be able to use a telephone to communicate verbally and a keyboard to communicate through written means, to review information and enter/retrieve data, to see and read characters on a computer screen.

This class specification lists the major duties and requirements of the job and is not all-inclusive. Incumbents may be expected to perform job-related duties other than those contained in this document.