THE CITY OF LOS ANGELES

CIVIL SERVICE COMMISSION

CLASS SPECIFICATION

04/24/25 **INDUSTRIAL ENGINEERING ASSOCIATE, 7231**

Summary of Duties: Performs professional industrial engineering work in process assessment and improvement, production planning and control, quality control and assurance, cost reduction and resource optimization, data collection and assessment, project management, workplace and equipment design, training and support, and technology integration; applies engineering methods and scientific principles to improve systems, system integration, and operations; designs and redesigns systems and processes, flows, and quality assurance; conducts computer aided simulations, assesses quantitative data, and observes problems to create and implement efficiencies and reduce waste; and does related work.

Class Characteristics: Industrial Engineering Associate I is the normal entry level to the class. Employees at this level usually have little, if any, experience or special training. They initially perform the less complex professional industrial engineering work under close supervision while learning and assisting in a variety of routine duties. As employees become more experienced, they may work independently and may be responsible for one or more large projects. Positions at this level are designated as three-year temporary training positions under Civil Service Rule 5.30. Employees with two years of full-time City experience as an Industrial Engineering Associate I and an Engineer-in-Training (EIT) Certificate, would automatically move to the Industrial Engineering Associate II level.

Employees at the Industrial Engineering Associate II level perform journey level industrial engineering work requiring a broad knowledge of industrial engineering skills. Individuals at this level usually work independently, receiving instructions in general terms, and may be responsible for one or more major projects having a wide impact and significant cost. Employees may serve as a lead over a small group of lower-level employees.

Employees at the Industrial Engineering Associate III level may supervise or may serve as a lead over a small group of employees, or as a project manager or project engineer involved in work that is technically complex and requires considerable experience, skill and engineering knowledge. Two years of full-time paid, professional experience at the level of Industrial Engineering Associate II and registration as a professional engineer with the California State Board of Registration for Professional Engineers is required for advancement to this level.

Employees at the Industrial Engineering Associate IV level are non-supervisory technical experts, who shall maintain the skills and expertise necessary to remain at the higher paygrade level. They may conduct extensive research into new technical developments and evaluate their suitability for use, may prepare standards for technical design, may develop and conduct training for other employees about new procedures and techniques, or may act as an internal consultant to other employees or on very difficult issues. These positions are designated by Department Management according to the Department's needs. Some positions require registration as a

professional engineer with the California State Board of Registration for Professional Engineers, as determined by department management.

Example of Duties: An Industrial Engineering Associate:

- Assesses existing processes and workflows to identify inefficiencies or areas for improvement;
- Develops and implements process improvements to increase productivity, reduce waste, and streamline operations;
- Uses tools like Six Sigma Lean Methodology to assess and optimize processes.
- Plans and controls processes to ensure efficient use of resources (labor, materials, and equipment);
- Designs layouts for facilities to optimize space and ensures a smooth workflow.
- Works with production teams to establish production schedules and ensures timely delivery;
- Assesses inefficiencies and quality issues and then develops corrective actions to minimize errors;
- Conducts root-cause assessment for process related problems and collaborates with teams to implement solutions;
- Develops methods to reduce costs and optimizes resource use, including labor, materials, and energy;
- Assesses cost structures and recommends changes to reduce expenses without compromising quality;
- Collects and assesses data on production metrics, such as cycle times, work rates, and equipment performance;
- Uses statistical assessment and simulation software to interpret data and model potential improvements;
- Reports on performance metrics to track efficiency gains and areas needing further development;
- Leads or participates in projects to improve efficiency or introduce new processes, equipment, or technologies;
- Coordinates with cross-functional teams to ensure project success.
- Develops project plans, sets milestones, and tracks progress to ensure projects stay on time and within budget;
- Designs ergonomically optimized workstations and equipment layouts that maximize safety and comfort;
- Ensures that equipment and workplace designs comply with safety standards and regulations;
- Develops training materials and trains staff on new processes, equipment, or software;
- Provides ongoing support to ensure all personnel are using tools and processes correctly and efficiently;
- Evaluates and recommends new technologies or equipment that can improve processes or product quality;
- Works on automation initiatives to reduce manual labor and improve precision;

May occasionally be assigned to other duties for training purposes or to meet technological changes or emergencies.

Minimum Requirements:

1. A Bachelor's or Master's degree in engineering from an accredited college or university, which includes at least 24 semester units or 36 quarter units of core courses in industrial engineering; **or**
2. An Engineer-In-Training certification recognized by the California Board of Professional Engineers, Land Surveyors, and Geologists; **or**
3. A valid license as a Professional Engineer with the California Board of Professional Engineers, Land Surveyors, and Geologists.

License: A valid Class C driver's license issued by the California Department of Motor Vehicles (DMV) is required at the time of appointment. Candidates will not be eligible for appointment if their DMV record within the last 36 months reflects three or more moving violations and/or at-fault accidents, or a conviction of a major moving violation such as DUI.

Persons with disabilities may be able to perform the essential duties of this class with reasonable accommodation. Reasonable accommodation will be evaluated on an individual basis and depend, in part, on the specific requirements for the job, the limitations related to the disability, and the ability of the hiring department to accommodate the limitation.

As provided in Civil Service Commission Rule 2.5 and Section 4.55 of the Administrative Code, this specification is descriptive, explanatory and not restrictive. It is not intended to declare what all of the duties, responsibilities, and required qualifications of any position shall be.