

# **CITY OF CHATTANOOGA**

## **Classification Specification Title: Traffic Signal Systems Engineer**

**Department: Technology Services**

**Pay Grade: GS.12**

**Supervision Received From: Smart Cities Director**

**FLSA Status: Exempt**

**Supervisory Responsibility For: None**

**Established: 5/15/12**

**Revision Dates: 4/4/25;**

**10/20/23; 8/02/22**

### **CLASSIFICATION SUMMARY:**

Incumbents in this classification oversee and manage the planning, grants, design, construction, maintenance, and operation of elements of Chattanooga's Intelligent Transportation System. Additionally, given the City's commitment to the recently launched Smart City Challenge, candidates for this classification will be positioned to lead some or all of Chattanooga's "Smart City" initiatives. Because this position works within the Chattanooga Department of Transportation (CDOT), it includes primarily those activities that relate to the safety and dynamics of our street and public space network. However, because the core of a Smart City approach is innovation and integration, incumbents in this classification must not only be comfortable with, but embrace, and actively pursue, broader notions of the prototype modern city, to include developing Chattanooga-centered solutions for future mobility and public space problems.

**SERIES LEVEL:** The Traffic Signal Systems Engineer is a stand-alone position.

### **ESSENTIAL FUNCTIONS:**

*(The following duties ARE NOT intended to serve as a comprehensive list of all duties performed by all employees in this classification, only a representative summary of the primary duties and responsibilities. Incumbent(s) may not be required to perform all duties listed and may be required to perform additional, position-specific duties.)*

Ensures Chattanooga's streets work safely and efficiently daily. To do this, incumbent will optimize traffic signal timing; manage vendors working with the City's transportation network; oversee and manage planning, grants, design, construction, maintenance and operation of the transportation system; direct and manage the Intelligent Transportation System (ITS); support telecommunications-related programs of the City; and manage internal staff to include ensuring staff training, performance reviews, hiring, termination and ensuring City, State, and Federal regulations are followed.

Implements projects to improve transportation operations and expand ITS functionality. To do this, the incumbent will work to grow the transit signal prioritization program; pursue Advanced Transportation Management Systems (ATMS); oversee and improve the City's Closed Circuit TV (CCTV" and signal detection programs; manage the street lights; supervise any contracted vendors for implementation of this program, and manage the implementation of these programs.

Develops solutions to mobility and public space problems and helps transform Chattanooga into a 'Smart City'. To do this, incumbent will strategize and lead the Department of Transportation in

its understanding of technology and cultural shifts in transportation, transit, and/or public space; understand how people and goods move throughout the City to include: the ability to ensure accurate data collection for transportation modeling and studies; actively pursue ways to advance Chattanooga's ability to integrate technology and communications capabilities with the transportation network.

Builds partnerships to influence transportation choices by residents and visitors to Chattanooga. To do this, incumbent will support and engage with transit providers and transit advocates; find opportunities to allow Chattanooga to act as a laboratory for transit and transportation technology and work with companies and nonprofits to develop solutions; engage Chattanooga residents, businesses and visitors to understand and shape transportation demand management; manage partnerships with other transportation-oriented organizations; and act as a liaison to the telecommunications and technology community.

Must meet regular attendance requirements.

Must be able to maintain good interpersonal relationships with staff, co-workers, managers, and citizens.

Must accomplish the essential functions of the job, with or without reasonable accommodations, in a timely manner.

Performs other duties as assigned.

DEPARTMENT SPECIFIC DUTIES (if any):

MINIMUM QUALIFICATIONS:

Bachelor's Degree in a related field and six (6) years experience that includes progressively responsible work assignments in Smart City approaches, traffic signal operations, traffic signal network design, communication, and/or technology-based activities associated with transportation or traffic engineering; and/or project management using Tennessee Department of Transportation (TDOT) Local Program guidelines, Federal Highway Administration processes for Information Technology Service (ITS) implementation and funding mechanisms, demonstrating knowledge of the application of U.S. DOT's Notice of Funding Availability (NOFA) guidelines; or any combination of equivalent experience and education.

LICENSING AND CERTIFICATIONS:

Valid Driver's License

SUPPLEMENTAL INFORMATION

Knowledge of current transportation demand management tools, Intelligent Transportation Systems, traffic engineering principles, procurement procedures, management and leadership tools, relationship building, GIS applications, computer systems and network design, and applicable Federal, State, and Local laws, ordinances, codes, rules, regulations, standards, policies, and procedures. Skill in implementing technology, overseeing and ensuring quality work from staff and vendors for design, analysis, and implementation (interpreting and ensuring accuracy of technical information), communicating clearly and effectively (written and verbal), and interpersonal skills. Working with stakeholders and other City government offices to vision

and brainstorm ideas for the future of how Chattanooga could implement Smart City techniques. Ability to put ideas and theories into practice.

#### PHYSICAL DEMANDS:

Positions in this class typically require: climbing or balancing; stooping, kneeling, crouching, or crawling; reaching, standing, walking; pushing, pulling, or lifting; fingering, grasping, or feeling; talking, hearing, and seeing.

#### WORK ENVIRONMENT:

Light Work: Exerting up to 20 pounds of force occasionally, and/or up-to 10 pounds of force frequently, and/or a negligible amount of force constantly to move objects. If the use of arm and/or leg controls requires exertion of forces greater than that for Sedentary Work and the worker sits most of the time, the job is rated for Light Work. Incumbents may be subjected to moving mechanical parts, and electrical currents.

#### SPECIAL REQUIREMENTS:

Safety Sensitive: N

Department of Transportation - CDL: N

Child Sensitive: N

The City of Chattanooga, Tennessee is an Equal Opportunity Employer. In compliance with the Americans with Disabilities Act, the City will provide reasonable accommodations to qualified individuals with disabilities and encourage both prospective and current employees to discuss potential accommodations with the employer.