



City of Irving Job Description

I.T. Infrastructure Engineer

FLSA Status:	EXEMPT	Job Department:	Information Technology
Job Code:	I141	Reports To (Job Title):	I.T. Infrastructure Manager

PURPOSE

To provide vision and oversight for the design, security, implementation and maintenance of network-related software and hardware, systems administration and network system support.

ESSENTIAL DUTIES AND RESPONSIBILITIES

To perform this job successfully, an individual must be able to perform each essential duty satisfactorily.*

- Maintain and install new and upgraded operating systems for servers, routers and switches.
- Maintain and establish guidelines for system and network back up.
- Provide technical support for end users.
- Administer network installation and updates of production software.
- Support Citrix Metaframe environment.
- Coordinate network security issues with the Network Systems Manager.
- Install and (re-)configure computer network hardware and network/communications software.
- Design and maintain the e-commerce, wireless, local area network, storage area network, and internet/intranet systems.
- Design network segments.
- Work with hardware and software vendors on installation, project coordination, maintenance, and emergency response.
- Act as I.T. Infrastructure Manager in his/her absence.
- Maintain, upgrade, and support firewalls.
- Maintain, upgrade, and support all Cisco network switching.
- Perform related duties as assigned.

OTHER DUTIES AND RESPONSIBILITIES

- Install and assign security for Internet accounts.
- Provide network support after-hours and on weekends as necessary.
- Provide support assistance with trouble escalations for network team.

SUPERVISORY RESPONSIBILITIES

Functional and Technical Supervision - Regular responsibility for giving direction and guidance to employees as a lead worker, project manager or internal advisor. As an ongoing part of the position, the employee can expect to supervise approximately 2 employees.

FINANCIAL / BUDGETARY RESPONSIBILITY

Awareness of financial needs and deadlines to maintain, upgrade, and perform potential enhancements to system, as well as legal/regulatory licensing requirements, so recommendations can be made to management for budgeting and payment approval.

QUALIFICATIONS:

The requirements listed below are representative of the knowledge, skill, and/or ability required.*

EDUCATION

- Equivalent to a Bachelor's Degree from an accredited college or university with major course work in Computer Science, Information Systems or a closely related field.
- Alternatively, with two (2) years of additional, relevant experience, equivalent to an Associate's degree from an accredited college or university with major course work in Information Technology or a closely related field.

EXPERIENCE

- At least three (3) years of networking and computer support experience.

CERTIFICATES, LICENSES, REGISTRATIONS

- Appropriate, valid state-issued driver's license.
- CJIS qualified (A conviction for Class B misdemeanor and above is disqualifying.)
- Appropriate hardware and software certifications as required by specific job duties.

KNOWLEDGE OF

- Computers and Electronics: Electric circuit boards, processors, chips, and computer hardware and software.
- Customer Service: Principles and processes for providing customer and personal services including a desire to help customers regardless of their circumstance.
- English Language: The structure and content of the English language, including the meaning of words and grammar.
- Advanced Math: Mathematical calculations including geometry, trigonometry, algebra, statistics, and calculus.

- Programming Methodology: Necessary computer languages, basic principles, formulas, syntax, and documentation practices.
- Computer Networks: Various hardware and software necessary to build a functional network, including routers, switches, firewalls, hubs, wiring, and how TCP/IP packets flow through the system.

SKILLS AND ABILITIES IN

- Accuracy: Paying attention to detail in dealing with numbers, words, and ideas.
- Information Organization: Finding ways to structure or classify multiple pieces of information.
- Critical Thinking: Using logic and analysis to identify the strengths and weaknesses of different approaches.
- Reading Comprehension: Understanding written sentences and paragraphs in work documents.
- Service Orientation: Actively looking for ways to help people.
- Operations Analysis: Analyzing needs and product requirements to create a design.
- Active Learning: Working with new material or information to grasp its implications.
- Functional Supervision: Motivating, developing, and directing people as they work.
- Active Listening: Listening to what others are saying and asking questions as appropriate.
- Complex Problem Solving: Identifying problems and reviewing related information to develop and evaluate options and implement solutions.
- Cooperation: Establishing and maintaining positive working relationships with those contacted in the course of work.
- Written Expression: Communicating information and ideas in writing so others will understand.
- Database Development: Programming the indexing, storing, and retrieving documents.
- Teaching: Conveying new concepts and confirming comprehension by listener.
- Technical Reasoning: Interpreting an extensive variety of technical instructions in mathematical or diagram form.
- Judgment & Decision-Making: Weighing the relative costs / benefits of a potential action.
- System Perception: Discerning when important changes have occurred or likely will in a system.
- System Evaluation: Identifying measures or indicators of system performance and the actions needed to improve or correct performance, relative to the goals of the system.
- Systems Analysis: Determining how a system should work and how changes in conditions, operations, and the environment will affect outcomes.
- Computer and Wireless Device Support: Knowing and demonstrating enough hands-on customer data tools support to effectively provide additional support and lead a technical support team.
- Management of Personnel Resources: Motivating, developing, and directing people as they work, identifying the best people for the job.
- Management of Material Resources: Obtaining and seeing to the appropriate use of equipment, facilities, and materials needed to do certain work.
- Social Perceptiveness: Being aware of the reactions of others and understanding why they react the way they do.
- Negotiation: Bringing others together and trying to reconcile differences.
- Hands-on Technical Support: Performing basic hands on computer, peripherals and wireless device diagnostic work for executive management team and City Council.

GUIDANCE RECEIVED

Priorities and Policies

Organizational priorities and policies, along with professional standards and best practices, guide decisions and direction or advice given to others. Typically makes recommendations to superiors after considering various alternatives. Proactively addresses needed changes to policies, methods and procedures and obtains approval.

CONTACTS

Interacts with multiple City departments' staff, generally key administrative support up through the director level across multiple departments when troubleshooting network issues, installing network systems or services, and providing end users with training and support.

Externally, interacts with Vendors, related to network and software systems for the purpose of receiving technical support, best practices, upgrade information, technical advancements and consulting services. Also, engages with staff from other organizations for the purpose of establishing relationships, knowledge transfer, and general industry networking for the benefit of the city.

EQUIPMENT AND PROPERTY

Personal computers, iPads, cell phones, laptops, printers/copiers, multiple software programs, and IT vehicles.

PHYSICAL DEMANDS

The physical demands described here are representative of those that must be met by an employee to successfully perform the essential functions of this job.*

The employee constantly is required to carry, grasp, handle, feel, lift up to 10 pounds, listen, reach, see, sit, stand, talk, and/or walk. Frequently, s/he is required to kneel, drive a vehicle, lift up to 25 pounds, and/or stoop. Occasionally, s/he is required to balance, crawl, push, pull, and/or lift up to 50 pounds. Rarely, s/he is required to lift more than 100 pounds.

WORK ENVIRONMENT

The work environment characteristics described here are representative of those an employee encounters while performing the essential functions of this job.*

The noise level in the work environment is usually quiet.

* Reasonable accommodations may be made to enable individuals with disabilities to perform the essential functions.

Note: A class specification is a general listing of duties, responsibilities, knowledge, skills, and abilities required of an incumbent assigned to a particular class of work. There may be one or multiple positions assigned to a single classification; therefore, the class specification lists those work attributes that are common to every incumbent in the class.