

PERSONNEL COMMISSION

Class Code: 5119 Salary Range: 42 (C1)

## NETWORK SPECIALIST

#### JOB SUMMARY

Under general supervision, perform a variety of specialized duties in the installation, configuration, maintenance and operation of the District's Local (LAN),Wide (WAN) and Wireless (WLAN) Area networks and equipment; monitor and evaluate network systems to assure proper operation; provide assistance to network users and technical support staff; perform related duties as assigned.

## EXAMPLES OF DUTIES

The classification specification does not describe all duties performed by all incumbents within the class. This summary provides examples of typical tasks performed in this classification.

- Perform a variety of specialized duties in the installation, configuration, maintenance and operation of the District's Local (LAN), Wide (WAN), and Wireless (WLAN) Area networks and related equipment; assure compliance with applicable laws, codes, rules and regulations. *E*
- Install, configure and maintain network servers using software such as VMware, Novell OES, Apple, Microsoft Windows or LINUX; design and implement server upgrades. *E*
- Monitor and evaluate the performance of networking equipment, firewalls and servers through troubleshooting and use of diagnostic programs; resolve wired and wireless network performance and connectivity issues; adjust network efficiency to provide the best possible performance. *E*
- Install and configure computer hardware and software to assure network access; make adjustments as necessary; integrate new hardware and software to enhance performance; deploy and support network applications. *E*
- Perform a variety of network administration activities including establishing user accounts, passwords, e-mail accounts, internet connectivity, back-ups and directories; troubleshoot and resolve password issues in multiple directory based environments on premise and in the Cloud; maintain confidentiality of sensitive and privileged information. *E*
- Receive and resolve escalated service tickets; assist and train technical support staff by troubleshooting and resolving the more complex network issues; respond to inquiries and provide information concerning network system operations, malfunctions, upgrades and software to technical support staff and end users. *E*
- Monitor and maintain network system security, servers, backup libraries and databases; upgrade anti-virus software; perform preventative maintenance on network hardware and equipment; create utilities or scripts. *E*

- Participate in researching, designing and implementing new network systems, configurations and applications; test and evaluate hardware and software to determine efficiency, reliability and compatibility with existing operating environment and configuration requirements. *E*
- Communicate with administrators, vendors and District staff to coordinate activities, exchange information and resolve issues and concerns; provide advice regarding proper placement and infrastructure needs for new equipment installation and movement of existing equipment. *E*
- Develop procedures for training technical staff in the installation and configuration of network systems and equipment. *E*
- Attend and participate in meetings, conferences and seminars related to network technology to maintain current knowledge of technological advances in the field. *E*
- Prepare and maintain records of assigned work orders and work performed; update computerized service tickets; prepare routine reports related to assigned activities. *E*
- Operate a variety of equipment and hand tools used in the maintenance, diagnosis and repair of network equipment. *E*
- Drive a District-issued or personal vehicle to various District sites to conduct work; transport equipment from site to site as necessary; respond to after-hours emergency calls as assigned. *E*

Note: At the end of some of the duty statements there is an italicized *E*, which identifies essential duties, required of the classification. This is strictly for use in compliance with the Americans with Disabilities Act.

# **DISTINGUISHING CHARACTERISTICS**

A Network Specialist performs a variety of specialized duties in the installation, configuration, maintenance and operation of District Local (LAN), Wide (WAN), and Wireless (WLAN) Area networks and related equipment. Incumbents in this classification are expected to maintain a level of expertise in evolving technologies via ongoing training.

# **EMPLOYMENT STANDARDS**

# Knowledge of:

Technical aspects of network installation, maintenance, operation, troubleshooting and repair.

Technical aspects of networking standards for wired and wireless networks including cabling systems, heat maps and RF propagation, switching and VLANs and Power over Ethernet (PoE).

Principles and techniques of systems and network design and analysis.

TCP/IP and BGP/IGRP network protocols in a routed environment.

Network server systems such as VMware, Novell/OES, Apple, Microsoft Windows or LINUX.

Configuration of servers and communications equipment.

## **Network Specialist – Continued**

Configuration of operating systems, applications software and networking of Windows or Macintosh computers.

Components and capabilities of Access Points, switches, routers, firewalls, servers and cabling.

Record-keeping techniques.

Oral and written communication skills.

Interpersonal skills using tact, patience and courtesy.

## Ability to:

Install, configure and maintain LAN, WAN, and WLAN software, hardware, cabling and peripheral equipment.

Monitor and evaluate the performance of wired and wireless networking equipment, firewalls and servers through troubleshooting and use of diagnostic programs.

Resolve network performance and connectivity issues.

Maintain network servers and security.

Analyze complex technical problems accurately, logically and quickly.

Evaluate user needs and advise on appropriate hardware and software configurations. Support end-users and field support staff via telephone and remote access tools.

Communicate effectively both orally and in writing.

Maintain records and prepare reports.

Operate a variety of tools and equipment utilized in the operation and repair of computer and network systems.

Plan and organize work.

Work independently with little direction.

Maintain current knowledge of technological advances in the field.

Train and provide work direction to technical support staff.

Establish and maintain cooperative and effective working relationships with others.

### Education and Training:

Bachelor's degree in computer science or a closely related field.

Professional certifications by major vendors such as Novell, Cisco or Microsoft are highly preferred.

### Experience:

Three years of experience installing and maintaining local, wide or wireless networks and related equipment for an organization with multiple locations and a minimum of 500 users.

Two years of additional experience may be substituted for two years of the higher education.

#### **Network Specialist – Continued**

Any other combination of training and experience that could likely provide the desired skills, knowledge or abilities may be considered.

#### SPECIAL REQUIREMENTS

Positions in this class require the use of personal automobile and possession of a valid California class C driver's license.

Applicants for this classification will be required to obtain and submit, at his/her own expense, his/her current motor vehicle driving record at the time of appointment. The record must meet and be maintained at the District's safe driving standard. Failure to meet this requirement will result in the disqualification and/or rejection of the applicant regardless of any other standing.

#### WORKING ENVIRONMENT

Offices and school sites. Driving a vehicle to conduct work. Occasional evening and variable hours.

#### PHYSICAL DEMANDS

Dexterity of hands and fingers to operate a computer keyboard. Seeing to read a variety of materials. Sitting or standing for extended periods of time. Hearing and speaking to exchange information in person and on the telephone. Bending at the waist, kneeling or crouching. Climbing ladders and working at heights. Reaching overhead, above the shoulders and horizontally. Lifting and carrying objects weighing up to 25 pounds.

### AMERICANS WITH DISABILITIES ACT

Persons with certain disabilities may be capable of performing the essential duties of this class with or without reasonable accommodation, depending on the nature of the disability.

#### **APPOINTMENT**

In accordance with Education Code Section 45301, an employee appointed to this class must serve a probationary period of six months during which time an employee must demonstrate at least an overall satisfactory performance. Failure to do so shall result in the employee's termination.

PCA: 6/14/2007 Revised: 10/31/2013 Revised: 10/12/2017