

Nature of Work

The Senior Network Administrator works collaboratively with Information Services (IS) staff, regional partners, transit operations, and vendors to design, implement, optimize, and maintain Spokane Transit Authority's enterprise and operational network infrastructure. This position is directly responsible for ensuring high availability, network security, reliable routing/switching, and robust connectivity across all STA facilities, transit centers, maintenance depots, park-and-rides, and onboard vehicle communications.

The role focuses heavily on core networking, perimeter defense, Palo Alto firewalls, and mission-critical transit operational technology connectivity. This position requires the ability to work effectively in a deadline-driven environment while managing complex network projects, operational outages, and multiple competing priorities. Demonstrating strong organizational skills, maintaining a sense of urgency, and making sound technical decisions based on agency operational needs and industry standards are essential.

Supervision Received

Position reports to and receives general direction from the Director of Information Technology. Work is reviewed periodically to ensure conformance with established STA goals and achievement of results consistent with program objectives related to schedule adherence, cost control, and quality.

Supervision Exercised

Provides technical leadership, work coordination, subject-matter expertise, and mentoring to network administrators and other Information Services staff. May coordinate daily network activities, project tasks, vendor work, and operational response efforts, but does not exercise formal personnel supervision unless specifically assigned.

Essential Functions

Technical

- Develop, maintain, and enforce enterprise network architecture standards, design principles, and technical roadmaps to ensure consistency, scalability, security, reliability, and alignment with STA business and operational objectives.
- Lead the planning and architectural design of network infrastructure initiatives, evaluating emerging technologies and developing long-term strategies for connectivity, resiliency, cybersecurity, cloud integration, and transit operational technology systems.
- Research, evaluate, design, test, recommend, and plan implementation of enterprise and transit operational network hardware, software, routing protocols, and perimeter security architectures.
- Configure, manage, and maintain Palo Alto firewalls, including threat prevention policies, URL filtering, and IPsec VPN tunnels.
- Design, implement, and maintain robust LAN, WAN, WLAN, and Software-Defined WAN (SD-WAN) infrastructures, and network segmentation architectures to support corporate IS, fare collection (PCI-DSS compliance), and onboard transit technology.
- Manage and optimize routing and switching protocols (BGP, OSPF, EIGRP, Spanning Tree, VLANs, VXLAN) across Cisco Catalyst/Nexus switches, Cisco ISR/ASR routers, and enterprise wireless controllers.
- Support networking infrastructure for transit technology systems, Computer-Aided Dispatch / Automatic Vehicle Location (CAD/AVL), automated passenger counters (APC), and onboard cellular gateway/mobile routers.
- Identify, implement, and enforce network security procedures, network access control (NAC), including 802.1X authentication, and Zero Trust network access principles.

- Perform proactive performance tuning, bandwidth monitoring, latency analysis, and packet-level troubleshooting using Wireshark and SNMP management platforms.
- Maintain complete, detailed, and accurate network topology documentation, IP address management (IPAM), and network baseline configurations.
- Assist with network security incident response, firewall log review, threat analysis, containment activities, and coordination with internal staff, vendors, and external partners during security events.
- Support secure connectivity to cloud-hosted and SaaS platforms, including VPN, private connectivity, DNS, identity-integrated security controls, and traffic routing/security policies.

Interpersonal

- Demonstrate strong interpersonal, written, and verbal communication skills.
- Display and practice STA's Core Values in the workplace.
- Exercise a collaborative approach in working with team members, system administrators.
- Provide leadership, mentoring, and technical guidance to other network administrators and IS team members.
- Represent Spokane Transit in a professional and positive light to the public and external organizations.
- Problem-solve effectively with internal department staff, telecommunication carriers, hardware vendors, and consultants to deliver high-availability service and support for STA.

Administrative

- Provide advanced network administrative support with customer service focus, technical expertise, and timeliness.
- Secure competitive quotes and bids from networking, telecommunications, and security hardware/software vendors in compliance with public agency procurement standards.
- Participate in technology budgeting, lifecycle planning, capacity planning, and long-term infrastructure strategy development for enterprise and operational network systems.
- Plan and execute hardware refresh cycles, firmware patching schedules, and system upgrades to ensure minimal disruption to transit operations.
- Manage vendor support contracts, licensing (e.g., Palo Alto subscriptions, Cisco SMARTnet), and telecommunication circuit inventories.
- Provide excellent customer service to all customers both internally and externally.
- Display and practice STA's Core Values in the workplace.
- Must be punctual, reliable, and maintain regular attendance.
- Must be able to accurately and honestly represent STA in any legal proceedings that may result from the normal performance of the position.
- May be required to participate in after-hours maintenance windows, emergency outage response, and on-call support as necessary to maintain critical transit operations.

This job description no way implies that the duties listed here are the only ones the employee can be required to perform. The employee is expected to perform other tasks, duties, and training as dictated by their Supervisor and/or Spokane Transit.

Minimum Requirements

Training and Experience

- Five (5) to eight (8) years of progressive, hands-on experience in enterprise network administration, routing, switching, and security.
- A minimum of four (4) years of experience designing, implementing, and administering Cisco routing and switching platforms, including Cisco Identity Services Engine (ISE).
- Experience supporting high-availability, multi-site network environments (transit, municipal, or public sector environment preferred).
- Bachelor's degree in Computer Science, Information Systems, or a related field preferred; equivalent combination of education, military service, and directly related technical experience will be considered.

Certifications Required

- Cisco Certified Network Associate (CCNA).
- Cisco Certified Network Professional (CCNP Enterprise or Security) preferred. Candidates without a CCNP certification must be able to obtain certification within twelve (12) months of hire.

Certifications Preferred

- Palo Alto Certified Network Security Administrator (PCNSA).
- CompTIA Network+/Security+ or CISSP a plus.

Physical Requirements

The physical requirements of this position include the ability to communicate effectively and perform work requiring visual acuity and auditory perception, with or without reasonable accommodation. Ability to make site visits; subject to standing, walking, bending, reaching, stooping, climbing stairs/ladders. Must be able to hear well enough, with or without correction, to receive and convey detailed information through verbal communication.

Computer and Technical Skills

Required Skills

The Senior Network Administrator must have strong hands-on experience and working knowledge in the following areas:

- Enterprise network administration, including routing, switching, wireless, firewall administration, VPN connectivity, and network security.
- Cisco routing and switching platforms, including Cisco IOS/IOS-XE, Catalyst switches, ISR/ASR routers, VLANs, trunking, Spanning Tree, routing protocols, and access control lists.
- Enterprise routing protocols and network concepts, including BGP, OSPF, EIGRP, VLANs, QoS, DNS, DHCP, IP addressing, subnetting, NAT, VPN, and network segmentation.
- Enterprise wireless networking, including wireless LAN controllers, SSIDs, authentication, roaming, RF troubleshooting, and wireless security.
- Network troubleshooting and analysis using tools such as ping, traceroute, packet capture, Wireshark, SNMP monitoring platforms, syslog, and firewall/network logs.
- Network security best practices, including least-privilege access, secure remote access, firewall rule management, segmentation, and vulnerability remediation.
- Network documentation, including topology diagrams, IP address management, circuit inventories, firewall rule documentation, configuration standards, and standard operating procedures.
- Microsoft Office and Visio or similar tools for documentation, reporting, and network diagramming.

- PowerShell or similar scripting/automation tools for basic administrative tasks and troubleshooting.

Preferred Skills

- Palo Alto firewalls, including security policies, NAT, App-ID, User-ID, URL Filtering, Threat Prevention, GlobalProtect VPN, IPsec VPN, and firewall troubleshooting.
- Palo Alto Panorama centralized firewall management.
- Palo Alto WildFire, advanced threat prevention, decryption policies, log forwarding, and security profile tuning.
- Cisco NX-OS, Nexus switches, VXLAN, VRF, high-availability designs, and data center networking.
- Cisco Wireless LAN Controllers, Cisco Catalyst wireless platforms.
- Network Access Control solutions, including 802.1X, RADIUS, TACACS+, and device authentication.
- SD-WAN technologies, redundant WAN design, cellular failover, and multi-site connectivity.
- Experience supporting transit operational technology systems, including CAD/AVL, onboard cellular gateways/routers, automatic passenger counters, fare collection equipment, digital signage, and real-time passenger information systems.
- Experience supporting PCI-DSS network segmentation and security requirements for fare collection or payment environments.
- Familiarity with cloud and SaaS connectivity, including Microsoft 365, Azure, AWS, cloud-hosted applications, VPN tunnels, DNS, and secure traffic routing.
- Experience with network monitoring, configuration backup, and alerting platforms.
- Familiarity with VMware, Veeam, enterprise storage, or backup infrastructure as it relates to network connectivity and resiliency.
- Experience working in public sector, municipal, transportation, utility, or other high-availability operational environments.
- Experience with public agency procurement, vendor coordination, telecommunications carriers, circuit management, licensing, and support contract administration.

License

Must possess a valid driver's license from state of residence.

Selection Factors

- Deep knowledge of network infrastructure design, routing, switching, wireless, and perimeter security architectures.
- Proven hands-on experience configuring, troubleshooting, and maintaining Palo Alto Networks firewalls and Panorama.
- Strong working knowledge of Cisco routing/switching platforms, enterprise Wi-Fi solutions, and network segmentation.
- Understanding of network requirements for real-time transit operations (CAD/AVL, mobile routing) and PCI-DSS compliance for fare collection environments.
- Ability to troubleshoot complex network outages under pressure and maintain emergency connectivity.
- Excellent technical documentation skills, including network topology diagrams, firewall rule sets, configuration standards, and standard operating procedures.
- Strong verbal and written communication skills to articulate technical solutions to both technical staff and non-technical transit leadership.



- Demonstrated ability to develop network architecture standards, technical roadmaps, and strategic infrastructure plans that support organizational growth and operational resiliency.
- Ability to evaluate emerging technologies and provide recommendations that balance security, performance, operational requirements, risk, and cost.

Wage

In accordance with the Spokane Transit Authority's Salary and Compensation Policy.

AA/EEO Notice

All qualified applicants will receive consideration for employment and will not be discriminated against on the basis of age, disability, ethnicity/race, national origin, religion, gender, gender identity, sexual orientation or veteran status.

Acknowledgement

I acknowledge that I have read this job description, and I feel that I can perform the essential functions of the position with or without reasonable accommodation.

Employee Name Printed

Employee Signature

Date