

Course Outline:

1. Course Introduction
2. Introduction to Junos Security
 - Traditional Routing and Security
 - Architecture Overview of Junos Security Devices
 - Logical Packet Flow through Junos Security Devices
 - J-Web Overview
3. Zones and Screen Options
 - Zones Overview
 - Zone Configuration
 - Monitoring Security Zones
 - Configuring Screen Options
 - Screen Options Case Study
4. Security Policies
 - Security Policy Overview
 - Policy Components
 - Security Policy Configuration in J-Web
 - Policy Case Study (CLI)
 - Policy Case Study (J-Web)
5. Advanced Security Policy
 - Session Management
 - Junos ALGs
 - Policy Scheduling
 - Logging
 - Advanced Security Policy
6. Troubleshooting Zones and Policies
 - General Troubleshooting for Junos Devices
 - Troubleshooting Tools
 - Troubleshooting Zones and Policies
 - Zone and Policy Case Studies
7. Network Address Translation
 - NAT Overview
 - Source NAT
 - Destination NAT
 - Static NAT
 - Proxy ARP
8. Advanced NAT

- Persistent NAT
 - DNS Doctoring
 - IPv6 with NAT
 - Advanced NAT Scenarios
 - Troubleshooting NAT
9. IPsec VPN Concepts
- VPN Types
 - Secure VPN Requirements
 - IPsec Tunnel Establishment
 - IPsec Traffic Processing
10. IPsec VPN Implementation
- IPsec VPN Configuration
 - IPsec VPN Case Study
 - Proxy IDs and Traffic Selectors
 - Monitoring IPsec VPNs
11. Hub-and-Spoke VPNs
- Hub-and-Spoke VPN Overview
 - Hub-and-Spoke Configuration and Monitoring
12. Group VPNs
- Group VPN Overview
 - Group VPN Configuration and Monitoring
13. PKI and ADVPNs
- Public Key Infrastructure Overview
 - PKI Configuration
 - ADVPN Overview
 - ADVPN Configuration and Monitoring
14. Advanced IPsec
- NAT with IPsec
 - Class of Service with IPsec
 - Best Practices
 - Routing OSPF over IPsec
 - IPsec with Overlapping Addresses
 - IPsec with Dynamic Gateway IP Addresses
15. Troubleshooting IPsec
- IPsec Troubleshooting Overview
 - Troubleshooting IKE Phase 1 and 2
 - IPsec Logging

- IPsec Case Studies
- 16. Chassis Cluster Concepts
 - Chassis Clustering Overview
 - Chassis Cluster Components
 - Chassis Cluster Operation
- 17. Chassis Clutter Implementation
 - Chassis Cluster Configuration
 - Advanced Chassis Cluster Options
- 18. Troubleshooting Chassis Clusters
 - Troubleshooting Chassis Clusters
 - Chassis Cluster Case Studies
- A. SRX Series Hardware
 - Branch SRX Platform Overview
 - Mid-Range SRX Platform Overview
 - High-End SRX Platform Overview
 - SRX Traffic Flow and Distribution
 - SRX Interfaces
- B. Virtual SRX
 - Virtualization Overview
 - Network Virtualization and SDN
 - Overview of the Virtual SRX
 - Deployment Scenarios
 - Integration with AWS

Labs Included:

- Zones and Screen Options
- Security Policies
- Advanced Policy Options
- Troubleshooting Security Zones and Policies
- Network Address Translation
- Advanced NAT
- Implementing IPsec VPNs
- Hub-and-Spoke VPNs
- Group VPNs

- PKI and ADVPNs
- Advanced IPsec VPN Solutions
- Troubleshooting IPsec
- Implementing Chassis Clusters
- Troubleshooting Chassis Clusters