

## CCSE-R81.x Certified Security Expert

### Who Should Attend?

Technical professionals who perform advanced deployment configurations of Check Point products.

### Course Goal

Learn basic concepts and develop skills necessary to administer IT security fundamental tasks.

### Prerequisites

Working knowledge of Windows, UNIX, networking technology, the Internet and TCP/IP.

### Course Length

3 Days

### Course Topics

- Management Upgrade and Migration
- Management High Availability
- Security Gateway Upgrades
- Advanced Check Point Maintenance
- Security Gateway Operations
- Policy Installation
- Gaia and Management APIs
- Acceleration
- Site-to-site VPN
- Remote Access VPN
- Mobile Access VPN
- Clustering
- Advanced Logs and Monitoring

### Course Objectives

- Provide an overview of the upgrade service and options available.



- Explain how to perform management upgrade and migration.
- Articulate the process using CPUSE features.
- Articulate the purpose and function of Management High Availability.
- Explain Primary vs Secondary, Active vs Standby and Synchronization.
- Explain disaster recovery steps in case the primary management server becomes unavailable.
- Provide overview of Central Deployment in SmartConsole.
- Articulate an understanding of Security Gateway cluster upgrade methods.
- Explain about Multi Version Cluster (MVC) upgrades.
- Discuss Gaia Commands and how they are used.
- Explain the main processes on s and s.
- Describe how to work with scripts and SmartTasks to configure automatic actions.
- Explain the Management Data Plane Separation (MDPS)
- Explain kernel operations and traffic flow
- Articulate Dynamic and Updatable Objects in Security Gateways
- Explain the policy installation flow and files used.
- Describe the use of policy installation history.
- Explain concurrent and accelerated install policy.
- Describe an overview of APIs and ways to use and authenticate.
- Explain how to make changes in GAIA and management configuration.
- Explain how to install policy using API.
- Explain how the SecureXL acceleration technology enhances and optimizes Security Gateway performance.
- Describe how the CoreXL acceleration technology enhances and improves Security Gateway performance.
- Articulate how utilizing multiple traffic queues can make traffic handling more efficient.
- Discuss Site-to-Site VPN basics, deployment and communities.
- Describe how to analyze and interpret VPN tunnel traffic.
- Explain Link Selection and ISP Redundancy options.
- Explain tunnel management features.
- Discuss Check Point Remote Access solutions and how they differ from each other.
- Describe how client security can be provided by Remote Access.
- Explain authentication methods including machine authentication.



- Explain Multiple Entry Point (MEP).
- Discuss the Mobile Access Software Blade and how it secures communication and data exchange during remote connections.
- Describe Mobile Access deployment options.
- Discuss various features in Mobile Access like Portals, Link Translation, running Native Applications, Reverse Proxy and more.
- Explain basic concepts of Clustering and ClusterXL.
- Explain about Cluster Control Protocol (CCP) and synchronization.
- Describe advanced ClusterXL functions and modes like Load Sharing, Active-Active, VMAC mode etc.
- Discuss Cluster Correction Layer (CCL) to provide connection stickyness.
- Advanced Logs and Monitoring
- Explain how to determine if the configuration is compliant with the best practices.
- Explain how to set action items to meet the compliance.
- Discuss how SmartEvent functions to identify critical security issues.
- Describe the components of SmartEvent and their deployment options.
- Discuss how SmartEvent can assist in reporting security threats.
- Explain how to customize event definitions and set an Event Policy

### Exercises

- Prepare for a Security Management Server Upgrade.
- Upgrade the Security Management Server.
- Deploy a Secondary Security Management Server.
- Configure a Distributed Log Server.
- Upgrade a Security Gateway from SmartConsole.
- Work with the Command Line.
- Use Scripts and SmartTasks.
- Configure Dynamic Objects.
- Monitor Traffic.
- Verify Policy Installation and Status.
- Work with Gaia and Management APIs.
- Work with Acceleration Features.
- Configure a Locally Managed Site to Site VPN.
- Configure a Site to Site VPN with an Interoperable Device.



- Configure Remote Access VPN.
- Configure Mobile Access VPN.
- Configure a High Availability Cluster.
- Work with ClusterXL.
- Configure Policy Compliance.
- Deploy SmartEvent .

### Certification Information

- Exam #156-315.81

