Objetivos

After taking this course, you should be able to:

- Describe Cisco ISE deployments, including core deployment components and how they interact to create a cohesive security architecture. Describe the advantages of such a deployment and how each Cisco ISE capability contributes to these advantages.
- Describe concepts and configure components related to 802.1X and MAC Authentication Bypass (MAB) authentication, identity management, and certificate services.
- Describe how Cisco ISE policy sets are used to implement authentication and authorization, and how to leverage this capability to meet the needs of your organization.
- Describe third-party Network Access Devices (NADs), Cisco TrustSec®, and Easy Connect.
- Describe and configure web authentication, processes, operation, and guest services, including guest access components and various guest access scenarios.
- Describe and configure Cisco ISE profiling services, and understand how to monitor these services to enhance your situational awareness about network-connected endpoints. Describe best practices for deploying this profiler service in your specific environment.
- Describe BYOD challenges, solutions, processes, and portals. Configure a BYOD solution, and describe the relationship between BYOD processes and their related configuration components. Describe and configure various certificates related to a BYOD solution.
- Describe the value of the My Devices portal and how to configure this portal.
- Describe endpoint compliance, compliance components, posture agents, posture deployment and licensing, and the posture service in Cisco ISE.
- Describe and configure TACACS+ device administration using Cisco ISE, including command sets, profiles, and policy sets. Understand the role of TACACS+ within the Authentication, Authentication, and Accounting (AAA) framework and the differences between the RADIUS and TACACS+ protocols.
- Migrate TACACS+ functionality from Cisco Secure Access Control System (ACS) to Cisco ISE, using a migration tool.

Pre-requisitos

To fully benefit from this course, you should have the following knowledge:

- Familiarity with the Cisco IOS® Software Command-Line Interface (CLI)
- Familiarity with Cisco AnyConnect® Secure Mobility Client
- Familiarity with Microsoft Windows operating systems
- Familiarity with 802.1X

Recommended Cisco learning offerings that may help you meet these prerequisites:

- Cisco CCNP® Security Certification training
- Introduction to 802.1X Operations for Cisco Security Professionals (802.1X)

Contenido

- Introducing Cisco ISE Architecture and Deployment
  - Using Cisco ISE as a Network Access Policy Engine
  - Cisco ISE Use Cases
  - Describing Cisco ISE Functions
  - Cisco ISE Deployment Models
  - Context Visibility
- Cisco ISE Policy Enforcement
  - Using 802.1X for Wired and Wireless Access
  - Using MAC Authentication Bypass for Wired and Wireless Access
  - Introducing Identity Management
  - Configuring Certificate Services
  - Introducing Cisco ISE Policy
  - Implementing Third-Party Network Access Device Support
  - Introducing Cisco TrustSec
  - Cisco TrustSec Configuration
  - Easy Connect
- Web Authentication and Guest Services
  - Introducing Web Access with Cisco ISE
  - Introducing Guest Access Components
  - Configuring Guest Access Settings
  - Configuring Sponsor and Guest Portals
- Cisco ISE Profiler
  - Introducing Cisco ISE Profiler
  - Profiling Deployment and Best Practices
- Cisco ISE BYOD
  - Introducing the Cisco ISE BYOD Process
  - Describing BYOD Flow
  - Configuring the My Devices Portal

  - Configuring Certificates in BYOD Scenarios
- Cisco ISE Endpoint Compliance Services
  - Introducing Endpoint Compliance Services
  - Configuring Client Posture Services and Provisioning in Cisco ISE
- Working with Network Access Devices
  - Review TACACS+
  - Cisco ISE TACACS+ Device Administration
  - Configure TACACS+ Device Administration
  - TACACS+ Device Administration Guidelines and Best Practices
  - Migrating from Cisco ACS to Cisco ISE

Laboratorio

- Access the SISE Lab and Install ISE 2.4
- Configure Initial Cisco ISE Setup, GUI Familiarization, and System Certificate Usage
- Integrate Cisco ISE with Active Directory
- Configure Basic Policy on Cisco ISE
- Configure Policy Sets
- Configure Access Policy for Easy Connect
- Configure Guest Access
- Configure Guest Access Operations
- Create Guest Reports
- Configure Profiling
- Customize the Cisco ISE Profiling Configuration
- Create Cisco ISE Profiling Reports
- Configure BYOD
- Blacklisting a Device
- Configure Cisco ISE Compliance Services
- Configure Client Provisioning
- Configure Posture Policies
- Test and Monitor Compliance-Based Access
- Test Compliance Policy
- Configure Cisco ISE for Basic Device Administration
- Configure TACACS+ Command Authorization