Westcon™ | Academy

Blue Coat AUTHORIZED TRAINING CENTER

Blue Coat Certified ProxySG Professional UPGRADE

Code: ACBE-BLC-BCCPRECERTIFY

Days: 2

Course Description:

In order to fit this course in 2 days, only chapters which have changed significantly or contain new features and handled in full, includes a selection of significantly changed lab exercises.

Chapter Summaries

Module 1: SGOS Architecture
SGOS is the operating system that the ProxySG uses. The architecture of SGOS is complex and evolves continually to support new and better features. This module discusses, at a high level, the details of how SGOS handles transactions, analyzes and processes policy, and caches content.

Module 2: Caching Architecture
This module introduces the concept of caching, where copies of pages and files requested from the web are saved to reduce the time it takes to re-request them. This can reduce latency, provide bandwidth management, and prevent high loads on servers. The module also explains how caching is implemented in the ProxySG.

Module 3: Introduction to CPL
You can create policy rules on the ProxySG using either the Visual Policy Manager, which is accessible through the Management Console, or by composing Content Policy Language. CPL is a proprietary programming language specific to the ProxySG. It allows you to express the policy rules that are enforced by the ProxySG. CPL is a powerful but complex language that requires considerable experience to master. This module is the first in a series of modules that introduces you to CPL and shows you how to write, analyze, and troubleshoot CPL.

Module 4: Basic CPL
This module introduces the basic concepts of CPL programming. You will explore how the language is structured, as well as some of the key language constructs that you are most likely to use. CPL contains hundreds of components, not all of which are presented in this course.

Module 5: Intermediate CPL
This module presents additional elements of CPL. As discussed in previous modules, CPL is complex and powerful and contains hundreds of elements, many of which serve specialized purposes. The concepts presented
in this module will help you write your own CPL code to implement many common security policies.

Module 6: Policy Tracing
Tracing allows you to examine how the ProxySG policy is applied to a particular request. To configure tracing in a policy file, you can use several policy language properties to enable tracing, set the verbosity level, and specify the path for output. Using appropriate conditions to guard the tracing rules, you can be specific about the requests for which you gather tracing information. This module presents a brief introduction to policy tracing and then uses a series of in-depth lab exercises to give you experience.

Module 7: CPL Best Practices
Administrators often want to know the best way to achieve a particular policy or set of policies. Blue Coat has developed several recommended best practices to follow when writing policy, and this

module presents many of those recommendations. While optimization and performance are generally a concern for administrators who have extensive policy or have a ProxySG that is heavily used, the recommended practices provided are also useful for making policy of any size more manageable and easier to understand.

Module 8: Managing Downloads

In this module, you will learn how HTTP is used to send data over the web. HTTP content types are based on Multipurpose Internet Mail Extension (MIME) types, but MIME types are not unique to HTTP. They originally were developed to deliver non-text email attachments but now are used in many other applications as well. Content types are important because they can be used to identify the content and block a download if necessary. The CPL programming skills that you have learned so far in this course will help you write policy to detect and block malicious content.

Module 9: Managing Flash Traffic

This module teaches the features and functionalities that are available in SGOS to better manage Flash traffic.

The two main concepts that the student needs to understand are delivery methods used for multimedia streaming, and protocol handoff from HTTP to a streaming proxy.

Module 10: Advanced Authentication Concepts

The ProxySG provides an extensive, powerful feature set to authenticate users and monitor and control their activities on the network. This module is the first in a series that covers additional topics related to authentication.

In this module, you will learn about the high-level authentication architecture of the ProxySG, how the ProxySG uses surrogate credentials to optimize use of authentication resources, and how the ProxySG determines the identity of the users that have logged in.

Module 11: Authentication with Transparent Proxy

Authentication in transparent proxy deployments is a challenge. This module discusses how the ProxySG authenticates users in a scenario where HTTP 407 is not available, without the user receiving multiple authentication requests.

Module 12: Guest Authentication and Error Handling

This module describes how the ProxySG provides administrators with a mechanism to specify that a user transaction should be allowed to proceed instead of being terminated. The chapter also details how administrators can specify that users be authenticated as guest users and be assigned to default groups without having to set up guest accounts in their realms and having users explicitly enter guest credentials.

Module 13: Authentication with BCAAA

For deployments where the ProxySG cannot be allowed to join a Windows authentication domain, the ProxySG uses the Blue Coat Authentication and Authorization Agent (BCAAA) to communicate in a way that is invisible to a client. This module provides experience in configuring an IWA realm that uses BCAAA instead of a direct connection.

Module 14: Kerberos Authentication

Configuring an IWA authentication realm on the ProxySG to support Kerberos credentials is a simple process.

However, additional configuration is required on your domain controller. This module focuses on the ProxySG configuration steps that are needed to support Kerberos, and gives you pointers on how to configure the rest of your network if necessary.

Module 15: Authentication Troubleshooting

The ProxySG provides several diagnostic tools that can help you determine whether an authentication issue is being caused entirely or in part by the ProxySG. This module reviews the available tools and concludes with an exercise in which you will be given a real-world authentication scenario and directed to diagnose and resolve it.

Module 16: Forwarding
Forwarding is the ability to forward web requests to other appliances before sending the request to an origin content server. This module describes how forwarding can be used to provide administrators with the flexibility to define scalable proxy-hierarchy designs.

Module 17: SSL Advanced Topics
This module presents an assortment of SSL-related topics that expand upon the material presented in the BCCPA course. Many of the features presented in this module — client certificate authentication, downloadable trust packages, and preserving untrusted issuer status — were introduced in SGOS version 6.3.1.

Module 18: ProxySG Performance Monitoring
Even after you have installed one or more ProxySG appliances, it is important to continue monitoring ProxySG performance because network conditions change over time. The ProxySG provides many tools that can be used to monitor its performance. In addition, the ProxySG can communicate via Simple Network Management Protocol (SNMP) to an external network management system that monitors your entire network. This module presents an overview of ProxySG performance monitoring and introduces you to the Management Information Bases (MIBs) that are provided for the ProxySG in an SNMP environment.

Module 19: ProxySG Integration
The ProxySG is a key component of Blue Coat's security solutions. However, the ProxySG also works in cooperation with many other Blue Coat products to provide complete web security to organizations of all sizes.
This module focuses on how to configure the ProxySG to work with other Blue Coat products including the ProxyAV, ProxyClient, Blue Coat Director, Blue Coat Reporter, and the Blue Coat Cloud Service. This module does not train you on the use or administration of these other products; BlueTouch Training Services offers additional training courses that can be selected and combined to match your organization's needs.