Troubleshoot Smart Licensing with Policy on Catalyst 9K after Upgrade to 17.3.2 and Later

Contents

Introduction **Prerequisites Requirements Components Used Background Information** Topology **Overview of SLP Issue Observed Remediation Steps Topology Steps Involved** Step 1. Verify Reachability to CSSM Step 2. Configure the Smart Transport on the Switch Step 3. Obtain a Token from the CSSM Portal Step 4. Establish Trust with CSSM Step 5. Trigger a License Usage Report Troubleshoot Steps for CSSM Not Reachable After Policy Updates on 17.3.2 Onwards For Older Version **Recommended Actions** Conclusion **Related Information**

Introduction

This document describes an issue related to Catalyst Platforms from the Cat9k family after upgrading to the latest Cisco IOS® XE 17.3.2.

Prerequisites

Requirements

Cisco recommends that you have knowledge of Smart Licensing operations on Cisco IOS XE devices.

Components Used

The information in this document is based on Cisco IOS XE devices starting 17.3.2 and later.

The information in this document was created from the devices in a specific lab environment. All of the devices used in this document started with a cleared (default) configuration. If your network is live, ensure that you understand the potential impact of any command.

Background Information

The issue involves the failure of Smart Licensing communication with Cisco Smart Software Manager (CSSM), Cisco Smart License Utility (CSLU), or Cisco Smart Software Manager (SSM) On-Prem. Smart Licensing Using Policy (SLP) is an enhanced version of Smart Licensing. It aims to provide a licensing solution that does not disrupt network operations while ensuring compliance with hardware and software licenses. SLP is supported starting with Cisco IOS XE Amsterdam 17.3.2.

Topology

Connected to CSSM Through CSLU



Connected to CSSM Through CSLU

Overview of SLP

SLP eliminates the earlier concepts of Evaluation mode, Registration, and Reservation. Instead, it focuses on reporting license usage. The licenses are unenforced, and licensing levels remain the same. The primary change with SLP is in the reporting and tracking of license usage. This section discusses the terminologies, the reasons for changes, and the new components introduced with SLP.

Issue Observed

After upgrading Cat9k switches to the latest Cisco IOS 17.3.2 or later, Smart Licensing communication with CSSM, CSLU, or SSM On-Prem fails.

Error Message: %SMART_LIC-3-COMM_FAILED: Communications failure with the [chars]: [chars]

Possible Reason: The failure could be due to network reachability issues or the CSSM server being down.

Remediation Steps

Topology



Review routing rules and firewall settings if all else fails.

Conclusion

In this document, an overview of the SLP is provided, and the issue faced by users after upgrading Catalyst 9300 switches to Cisco IOS XE 17.3.2 is addressed. Troubleshooting steps for CSSM, CSLU, and SSM On-Prem communication failures are offered, along with recommended actions to resolve the issue.

With the recommended actions and troubleshooting steps, users can resolve the Smart Licensing registration failure and establish successful communication with CSSM, CSLU, or SSM On-Prem.

Related Information

- Smart Licensing Using Policy Update
- <u>Cisco Technical Support & Downloads</u>