

Monitoring Cisco Unified Computing System (UCS) Standalone Rack Servers

Cisco: UCS Standalone Rack Server PowerPack Version 103

Table of Contents

Introduction	
What Are Cisco UCS Standalone Rack Servers?	3
What Does the Cisco: UCS Standalone Rack Server PowerPack Monitor?	
Installing the Cisco: UCS Standalone Rack Server PowerPack	
Configuration and Discovery	
Prerequisites for Monitoring Cisco UCS Standalone Rack Servers	
Configuring a SOAP/XML Credential	
Discovering a UCS Rack Server	8

Chapter

Introduction

Overview

This manual describes how to monitor Cisco Unified Computing System (UCS) standalone rack servers in SL1 using the Cisco: UCS Standalone Rack Server PowerPack.

The following sections provide an overview of Cisco UCS standalone rack servers and the Cisco: UCS Standalone Rack Server PowerPack:

What Are Cisco UCS Standalone Rack Servers?	3
What Does the Cisco: UCS Standalone Rack Server PowerPack Monitor?	4
Installing the Cisco: UCS Standalone Rack Server PowerPack	4

NOTE: ScienceLogic provides this documentation for the convenience of ScienceLogic customers. Some of the configuration information contained herein pertains to third-party vendor software that is subject to change without notice to ScienceLogic. ScienceLogic makes every attempt to maintain accurate technical information and cannot be held responsible for defects or changes in third-party vendor software. There is no written or implied guarantee that information contained herein will work for all third-party variants. See the End User License Agreement (EULA) for more information.

What Are Cisco UCS Standalone Rack Servers?

Cisco UCS standalone rack servers are rack-mounted Cisco UCS servers that are managed by the Cisco Integrated Management Controller (CIMC) rather than the Cisco UCS Manager. This currently includes Cisco UCS C-Series and E-Series servers.

What Does the Cisco: UCS Standalone Rack Server PowerPack Monitor?

To monitor Cisco UCS standalone rack servers using SL1, you must install the Cisco: UCS Standalone Rack Server PowerPack. This PowerPack includes:

- An example Credential that you can use as a template to create SOAP/XML credentials to connect to the Cisco UCS standalone rack servers that you want to monitor
- Dynamic Applications to discover, model, and monitor performance metrics and collect configuration data for Cisco UCS standalone rack servers
- Device Classes for each type of Cisco UCS rack server that SL1 monitors
- Event Policies and corresponding alerts that are triggered when Cisco UCS standalone rack servers meet certain status criteria
- A Device Template that you can apply during discovery
- A Device Dashboard that displays information about Cisco UCS standalone rack servers
- A Run Book Action/Policy that assigns Cisco UCS rack servers to the correct Device Classes when they are discovered

NOTE: The CIMC XML API provides inconsistent data to the *Cisco: UCS Standalone Rack Server* PowerPack for servers with firmware versions prior to 2.0(8d). Similarly, the PowerPack cannot collect server utilization metrics for servers with M3 architecture, but it can collect this information for M4 models.

Installing the Cisco: UCS Standalone Rack Server PowerPack

Before completing the steps in this manual, you must import and install the latest version of the Cisco: UCS Standalone Rack Server PowerPack.

TIP: By default, installing a new version of a PowerPack overwrites all content from a previous version of that PowerPack that has already been installed on the target system. You can use the Enable Selective PowerPack Field Protection setting in the Behavior Settings page (System > Settings > Behavior) to prevent new PowerPacks from overwriting local changes for some commonly customized fields. (For more information, see the System Administration manual.)

To download and install a PowerPack:

- 1. Download the PowerPack from the ScienceLogic Customer Portal.
- 2. Go to the **PowerPack Manager** page (System > Manage > PowerPacks).
- 3. In the **PowerPack Manager** page, click the **[Actions]** button, then select Import PowerPack.

4. The Import PowerPack dialog box appears:

Imp	rt PowerPack™	×
	Browse for file Browse License: Import	

- 5. Click the [Browse] button and navigate to the PowerPack file.
- 6. When the **PowerPack Installer** modal appears, click the **[Install]** button to install the PowerPack.

NOTE: If you exit the **PowerPack Installer** modal without installing the imported PowerPack, the imported PowerPack will not appear in the **PowerPack Manager** page. However, the imported PowerPack will appear in the **Imported PowerPacks** modal. This page appears when you click the **[Actions]** menu and select *Install PowerPack*.

Chapter

2

Configuration and Discovery

Overview

The following sections describe how to configure and discover a Cisco Unified Computing System (UCS) Rack Server for monitoring by SL1 using the Cisco: UCS Standalone Rack Server PowerPack:

Prerequisites for Monitoring Cisco UCS Standalone Rack Servers	6
Configuring a SOAP/XML Credential	6
Discovering a UCS Rack Server	8

Prerequisites for Monitoring Cisco UCS Standalone Rack Servers

In order to monitor Cisco UCS standalone rack servers in SL1 using the Cisco: UCS Standalone Rack Server PowerPack, you must know the username and password for a web service user on the rack servers you want to monitor.

Configuring a SOAP/XML Credential

To monitor Cisco UCS rack servers, you must configure a SOAP/XML credential for the UCS web service. This credential enables the Dynamic Applications in the Cisco: UCS Standalone Rack Server PowerPack to automatically discover and align to your UCS rack servers.

The PowerPack includes an example SOAP/XML credential that you can edit for your own use.

To do so:

1. Go to the Credential Management page (System > Manage > Credentials).

2. Locate the UCS Standalone - Example credential and click its wrench icon (*P*). The Edit SOAP/XML Credential modal page appears.

Edit SOAP/XML Credential #11 New Reset Basic Settings Profile Name Content Encoding Method HTTP Version Embedded Password [%P] UCS Standalone - Example [application/soap+xml] [POST] [HTTP/1.1] URL [https://%D/nuova Image: Content Encoding Method HTTP / Image: Content Encoding Embedded Password [%P] HTTP Auth Dst: Port/Path [%D = Aligned Device Address %N = Aligned Device Host Name] Embed Value [%1] Embed Value [%2] HTTP Auth User HTTP Auth Password Timeout (seconds) Embed Value [%3] Embed Value [%4] Proxy Settings [0 [HTTP Headers HOTP Options [CAINFO [CAINFO [CONKIECTIMECOUT [COOKIELIAR [COOKIELIAR [COOKIELIAF [COOKIELIAF [COOKIELIST [CRIF [@ [@	Credential Editor [11]	×
Profile Name Content Encoding Method HTTP Version UCS Standalone - Example [application/soap+xml] • [POST] • [HTTP/1.1] • Image: Content Encoding Embedded Password [%P] URL [https://%D/Inuova Image: Content Encoding Image: Content Encoding Embed Value [%1] Embed Value [%2] HTTP Auth User HTTP Auth Password Timeout (seconds) Embed Value [%3] Embed Value [%4] Proxy Settings 60 Image: Califier of Content Encoding Image: Califier of Cal	Edit SOAP/XML Credential #11	New Reset
Hostname/IP Port User CURL Options CAINFO CAPATH CLOSEPOLICY CONNECTTIMEOUT COOKIEFILE COOKIEFILE COOKIEFILE COOKIEFILE COOKIELIST	Profile Name Content Encoding Method HTTP Version [UCS Standalone - Example [[application/soap+xml]] * [[POST] * [[HTTP/1.1] * URL [https://Host:Port/Path %D = Aligned Device Address %N = Aligned Device Host Name] [https://%D/nuova [https://%D/nuova HTTP Auth User HTTP Auth Password Timeout (seconds)	Embedded Password [%P] Embed Value [%1] Embed Value [%2] USER>
CAINFO CAPATH CLOSEPOLICY CONNECTTIMEOUT COOKIE COOKIEFILE COOKIEFILR COOKIELIST	Hostname/IP Port User	
CUSTOMREQUEST DNSCACHETIMEOUT	CAINFO CAPATH CLOSEPOLICY CONNECTTIMEOUT COOKIEFILE COOKIELIST COCKIELIST CRLF CUSTOMREOUEST DNSCACHETIMEOUT	

- 3. Supply values in the following fields:
 - **Profile Name**. Type a name for the credential.
 - URL. Type "https://%D/nuova".
 - Embed Value [%1]. Type the username for a web service user on your UCS rack server.
 - Embedded Password [%P]. Type the password for the user account on your UCS rack server.
- 4. Click the **[Save As]** button.

Discovering a UCS Rack Server

To create and run a discovery session that will discover a UCS Rack Server, perform the following steps:

- 1. Go to the **Discovery Control Panel** page (System > Manage > Discovery).
- 2. Click the **[Create]** button to create a new discovery session. The **Discovery Session Editor** window appears:

Identification Information	Descript	ion			
P and Credentials IP Address/Hostname Discovery List	•	Detection and Scanning Initial Scan Level System Default (recommended)			-
Upload File Browse for file Browse	0	Port Scan All IPs System Default (recommended)	2	Device Model Cache TTL (h)	
SNMP Credentials	۱ 🕢	Port Scan Timeout System Default (recommended)	ayoung-dist-cu-2	Collection Server PID: 51	~
SMMP C0Sm0s Cisco SNMPv2 - Example Cisco: CSP SNMP Port 161 Example Cisco: CSP SNMP Port 161 Example Demo Lab EM7 Default V2 EM7 Default V3 IPSLA Example Other Credentials) 3	Detection Method & Port	[System] Ad None Servers	Organization	s)
Basic/Snippet Cisco CUCM Example Cisco CUC Mexter Status Cisco VOS M&P Cluster Status Cisco: ACI Sample Credential 1 Cisco: ACI Sample Credential 2 Cisco: CSP Example CUCM Lab EMC SMI-S Example EMC VMAX Example V		TCP: 18 - msp TCP: 19 - chargen TCP: 20 - ftp-data Interface Inventory Timeout (ms) 600000 Maximum Allowed Interfaces 10000 Bypass Interface Inventory	[Choose a Templ	Apply Device Template ate]	Ŷ

- 3. Supply values in the following fields:
 - IP Address Discovery List. Type the IP address for the UCS Rack Server.
 - Other Credentials. Select the SOAP/XML credential that you created for the UCS Rack Server.
 - Initial Scan Level. Select 5. Deep Discovery.
 - Detection Method & Port. Select 443 HTTPS. You can select additional ports, but you must include port 443 HTTPS.
 - Discover Non-SNMP. Select this checkbox.
- 4. Optionally, you can supply values in the other fields on this page. For more information about the other fields on this page, see the **Discovery & Credentials** manual.
- 5. Click the [Save] button and then close the Discovery Session Editor window.

- 6. The discovery session you created displays at the top of the **Discovery Control Panel** page. Click its lightning-bolt icon (*F*) to run the discovery session.
- 7. The **Discovery Session** window appears. After several minutes, the UCS Rack Server should be discovered with the appropriate Dynamic Applications aligned to it. Click its device icon (**W**) to view the **Device Properties** page for the UCS Rack Server server.

© 2003 - 2020, ScienceLogic, Inc.

All rights reserved.

LIMITATION OF LIABILITY AND GENERAL DISCLAIMER

ALL INFORMATION AVAILABLE IN THIS GUIDE IS PROVIDED "AS IS," WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED. SCIENCELOGIC [™] AND ITS SUPPLIERS DISCLAIM ALL WARRANTIES, EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR NON-INFRINGEMENT.

Although ScienceLogic[™] has attempted to provide accurate information on this Site, information on this Site may contain inadvertent technical inaccuracies or typographical errors, and ScienceLogic[™] assumes no responsibility for the accuracy of the information. Information may be changed or updated without notice. ScienceLogic[™] may also make improvements and / or changes in the products or services described in this Site at any time without notice.

Copyrights and Trademarks

ScienceLogic, the ScienceLogic logo, and EM7 are trademarks of ScienceLogic, Inc. in the United States, other countries, or both.

Below is a list of trademarks and service marks that should be credited to ScienceLogic, Inc. The ® and ™ symbols reflect the trademark registration status in the U.S. Patent and Trademark Office and may not be appropriate for materials to be distributed outside the United States.

- ScienceLogic[™]
- EM7[™] and em7[™]
- Simplify IT™
- Dynamic Application™
- Relational Infrastructure Management[™]

The absence of a product or service name, slogan or logo from this list does not constitute a waiver of ScienceLogic's trademark or other intellectual property rights concerning that name, slogan, or logo.

Please note that laws concerning use of trademarks or product names vary by country. Always consult a local attorney for additional guidance.

Other

If any provision of this agreement shall be unlawful, void, or for any reason unenforceable, then that provision shall be deemed severable from this agreement and shall not affect the validity and enforceability of any remaining provisions. This is the entire agreement between the parties relating to the matters contained herein.

In the U.S. and other jurisdictions, trademark owners have a duty to police the use of their marks. Therefore, if you become aware of any improper use of ScienceLogic Trademarks, including infringement or counterfeiting by third parties, report them to Science Logic's legal department immediately. Report as much detail as possible about the misuse, including the name of the party, contact information, and copies or photographs of the potential misuse to: legal@sciencelogic.com



800-SCI-LOGIC (1-800-724-5644)

International: +1-703-354-1010