

Cisco Smart Software Manager On-Prem Release Notes

General Information

Smart Software Manager On-Prem is an on-premises asset manager that works in conjunction with Cisco Smart Software Manager (software.cisco.com).

It enables customers to administer products and licenses on their premises, instead of having to directly connect Smart Licensed enabled product instances to Cisco Smart Software Manager hosted on cisco.com.



NOTE:

- As of now, deployment of the SSM On-Prem on the cloud (AWS, GCP, etc.) and on physical servers (Cisco UCS M2, M3, etc.) is not supported.
- SSM On-Prem has been officially tested/supported on VMware ESXi 6.0 through 7.0 Update
 3.

Obtaining Product Artifacts

See the following sections for instructions on how to download SSM On-Prem installation files and documentation.

How to Obtain Product Software

Follow the instructions below to download the installation files for the desired version of the SSM On-Prem:

- 1. Go to https://software.cisco.com/download/home
- 2. Type "Smart Software Manager" in the browser.
- 3. Select Smart Software Manager (from the Cloud and Systems Management category).
- 4. Select **Smart Software Manager On-Prem** in from the Software Type list.
- 5. Use the dropdown menu on the left to navigate between different releases. Select the release number you want. Use the **Download** button on the right to start downloading the installation files.



How to Obtain Product Information

The following documentation items are available for Smart Software Manager On-Prem:

- Cisco Smart Software Manager On-Prem User Guide
- Cisco Smart Software Manager On-Prem Console Reference Guide
- Cisco Smart Software Manager On-Prem Installation Guide
- Cisco Smart Software Manager On-Prem Quick Start Guide

These documents can be easily accessed when downloading .iso or .zip files of a particular release. If you hover over the green .iso or .zip image, a pop-up containing links to all the relevant documentation items will become available.

Upgrade Procedure



NOTE:

- It is highly recommended that before performing an upgrade, you have a
 backup of your database (if you are using a VM). For more information, see
 the Cisco Smart Software Manager On-Prem User Guide (Appendix 1:
 Manually Backing Up and Restoring SSM On-Prem).
- Upgrading is only supported with the 5 prior releases. If the current version of SSM On-Prem is earlier than 8-202212, an upgrade to 8-202212 is required before upgrading to the latest version, 8-202308.
- If using legacy products, such as Cisco Unity Connection and Cisco HCM-F, it
 is required that you enable TLS 1.2 legacy ciphers after upgrading. This
 enables communication between SSM On-Prem and the legacy devices. For
 more information, see the Cisco Smart Software Manager On-Prem User
 Guide (Enabling TLS 1.2 Legacy Ciphers).

See the following sections for more information on SSM On-Prem system upgrade.

Upgrading a System Prior to Version 7

If you are upgrading SSM OnPrem from a version prior to 7, please see:

Cisco Smart Software Manager On-Prem Installation Guide (Appendix 2: Upgrading a System that is Prior to Version 7).

Upgrading a High Availability (HA) Cluster

For detailed instructions for upgrading a High Availability (HA) cluster, please see:

Cisco Smart Software Manager On-Prem 8 Installation Guide (Appendix 5 Upgrading a High Availability Cluster).

Getting Support with Technical Assistance Center (TAC)

Cisco provides around-the-clock, award-winning technical support services, online and over the phone to all customers, partners, resellers, and distributors who hold valid Cisco service contracts. To best meet customer's needs, TAC offers a wide variety of support options.

Opening a Case about a Product and Service

Follow these steps to open a support ticket for registering products or issues with SSM On-Prem.



NOTE:

Please have your Cisco.com User ID, Contract and Serial number(s) ready when you contact Cisco Support to prevent any delays with your support request.

| Step | Action |
|---------|---|
| Step 1 | Go to: https://mycase.cloudapps.cisco.com/case |
| Step 2 | Once in the Support Case Manager webpage, keep all the default settings and scroll down the left side of the page and click Open New Case . The Service Options pop-up opens on the left side of the screen. |
| Step 3 | Select Products and Services. |
| Step 4 | On the right section of the tab screen, click Open Case . |
| Step 5 | Make sure the Request Type is set to Diagnose and Fix , and then scroll down the screen to the Bypass Entitlement field. |
| Step 6 | In the Bypass Entitlement field, select Software Licensing Issue from the drop-down list. |
| Step 7 | Click Next. |
| Step 8 | In the Describe Problem screen, select the Ask a Question for the Severity level. |
| Step 9 | Enter the Title and Description and all pertinent information . |
| Step 10 | Review the information you entered, and then click Submit Case . You query has been submitted. |

Opening a Case about a Software Licensing Issue

To open a case for CSSM licensing (software.cisco.com), follow these steps.



NOTE:

Please have your Cisco.com User ID, Contract and Serial number(s) ready when you contact Cisco Support to prevent any delays with your support request.

| Step | Action |
|--------|---|
| Step 1 | Go to: https://mycase.cloudapps.cisco.com/case |
| Step 2 | Once in the Support Case Manager webpage, keep all the default settings and scroll down the left side of the page and click Open New Case . The Service Options pop-up opens on the left side of the screen. |
| Step 3 | Select Software Licensing . |
| Step 4 | Scroll down and select the Category that fits your needs. |
| Step 5 | Click Open Case . |
| Step 7 | Enter the Title and Description and all pertinent information in the optional fields. NOTE : You can also begin a chat using the chat screen on the right side of the screen. |
| Step 8 | Review the information you entered, and then click Submit Case . You license query has been submitted. |

Smart Software Licensing (software.cisco.com)

Go to **Smart Software Manager** to track and manage your Smart Licenses.

Under Convert to Smart Licensing, you can convert PAK-based licenses to Smart Licenses (if applicable).

Smart Accounts

Go to the **Administration** section of <u>Cisco Software Central</u> to manage existing Smart Accounts or to request a new account from the choices.

- Go to <u>Request Access to an Existing Smart Account</u> for access to your company's account.
- For training and documentation click here.

Enterprise License Agreements (ELA)

Go to the **ELA Workspace** to manage licenses from ELA.

Other self-serve licensing functions are available. Please go to our <u>Help page</u> for how-to videos and other resources.

For urgent requests, please contact us by phone.

To update your case, either send attachments or updates to attach@cisco.com and include the case number in the Subject line of your email. Please do not include licensing@cisco.com in your email with the engineer.

Release Specifications

The following sections provide information on specific release dates, new features, bug fixes, known issues, and resolved vulnerabilities.

Version 8 Release 202308

Release Date: 10/27/2023

New Features

Accessibility

Made significant accessibility improvements to color contrast, focus order, labels and instruction, information, structure, and relationships conveyed.

Fixes

Version 8 Release 202308 introduces the following critical fixes, along with a few other high and medium bugs:

- SSM On-Prem 8-202304 failed to update RENEW ID cert sn on DB https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwh66667
- SSM OnPrem: No Id cert found during AUTH RENEW https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwh03209
- SSM On-prem 8-202212 and higher version sending wrong ACK data to Rum Report requests https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwf71439
- Export usage to cisco is broken
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwf38271
- SSM On-Prem with NAT enabled CSLU setup still shows UDI as display_name for 17.9.1 running platform https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwf31838
- Unable to turn Oauth2 off
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwf18773
- SSM On-Prem cannot register to account with leading/trailing space in its name https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc21507
- Deletion of SSMS Account fails with error constraint violation on table https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb03174
- Cert issue "\xC3" from ASCII-8BIT to UTF-8
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz39919
- OnPrem API does not return correct value for "total records" in a VA https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz95905
- Licenses are transferred to VA as per alphabetical order (can be seen under Manage Virtual Accounts)
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe18578

- Cannot Transfer SLP Devices with /api/v1/device/transfer
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe21218
- Reporting entitlement tags are populated with entitlement_type:STANDARD
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe28175
- The Product Instance Usage API response now includes SLP devices
- Implemented better protection for GUI and CLI passwords
- Java agent registration fails when provided with an unresolvable IP address https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwh84585



After upgrading your SSM On-Prem server to Release 8-202308, you must synchronize your accounts with CSSM Cloud. For information about synchronizing your SSM On-Prem with the CSSM Cloud, see the *Smart Software Manager On-Prem User Guide*.

Known Issues

1. Device HA: ID Renew fails to find sudi/signature failure after switchover

Resolved Vulnerabilities and Exposures

CRITICAL

CVE-2022-30123

HIGH

- <u>CVE-2020-14372</u>
- CVE-2020-25632
- CVE-2020-25647
- CVE-2020-27779
- <u>CVE-2021-20233</u>
- CVE-2022-24903
- CVE-2022-28733
- CentOS 7 : kernel (CESA-2023:4151)

CVE-2022-3564

CentOS 7: emacs (CESA-2023:3481)

CVE-2022-48339

CentOS 7: python (CESA-2023:3555)

CVE-2023-24329

CentOS 7: bind (CESA-2023:4152)

CVE-2023-2828

CVE-2023-32233

MEDIUM

- CVE-2019-11358
- CVE-2020-27749
- CVE-2021-20225
- CVE-2022-43750

LOW

CentOS 7: open-vm-tools (CESA-2023:3944)
 CVE-2023-20867

Version 8 Release 202304

Release Date: 07/11/2023

New Features

Version 8 Release 202304 introduces the following features:

Polling

Updated Cisco SSM On-Prem polling to reduce the traffic load, which aids in managing the Cisco SSM On-Prem CPU and RAM spike issue. The updates include the following:

- Cisco SSM On-Prem now sends "COMPLETE" as a status notification in response to fulfilled device requests. This cancels the corresponding Poll Ids, which prevents devices from sending requests that have already been processed.
- Cisco SSM On-Prem now generates and uses only one Poll Id per device. Prior to Release 8-202304,
 Cisco SSM On-Prem responded with a unique Poll Id for every usage report sent from a device.
- Cisco SSM On-Prem retry intervals are now dynamically generated based on the scheduled synchronization to the CSSM Cloud. Prior to Release 8-202304, the retry interval was set to 5 minutes.
- The poll interval duration is now determined by the scheduled sync and the offset. The offset is a time period determined by how busy the Cisco SSM On-Prem is. The offset time can range from 5 minutes to 48 hours. Starting in Release 8-202304, the poll interval duration is as follows:
 - If no sync is scheduled for the next 24 hours, the poll interval is the maximum duration, which is 24 hours plus the offset.
 - If a sync is scheduled within the next 24 hours, the poll interval is the sync time plus 2 hours, for the sync to finish, plus the offset.
 - If a sync is currently active, the poll interval is 2 hours plus the offset.

Event Log Record Retention Range

Changed the number of days that event logs are retained in the **On-Prem Admin Workspace > Settings Widget > Event Log Settings** tab. The number of days must be between 7 and 30.

• Virtual Machine-Based Deployment Requirements

SSM On-Prem now supports VMware ESXi 6.0 through 7.0 Update 3. For more information, see the *Cisco Smart Software Manager On-Prem 8 Installation Guide*.

• Transport Layer Security 1.2 Legacy Ciphers

Added the **Enable TLS 1.2 legacy ciphers** option to the **On-Prem Admin Workspace > Security Widget > Account** tab. When enabled, this option allows legacy Cisco products, such as Cisco Unity Connection and Cisco HCM-F, to communicate with Cisco SSM On-Prem. This option is disabled by default post upgrade.

Instant authorization request to CSSM

Added the Instant authorization request to CSSM option to On-Prem Admin Workspace > Settings Widget > CSLU tab. When enabled, this option permits immediate communication with the Cisco Smart Software Manager Cloud (CSSM Cloud). This communication is required for newly connected devices and is only applicable when online access to the CSSM Cloud is possible. When disabled, this communication is performed only during the scheduled synchronization, which results in a delay from when a device is connected and when the configured features can function.



CSSM Cloud includes reserved licenses in the total number of licenses used. SSM On-Prem, however, does not. This causes CSSM Cloud and SSM-On Prem to show a different number of licenses in use after sending multiple SLAC requests.

Fixes

Version 8 Release 202304 introduces the following critical fixes, along with a few other high and medium bugs:

 Subject Alternative name is not added to product cert when we add or change the SAN https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe88106



If you are using ASR with a version earlier than IOS XR: 7.3.3, then to register to SSM On-Prem, you will have to register using FQDN in the hostname. In order to register using an IP address, the device will have to be upgraded to IOS XR 7.3.3 or later. And before performing the registration to SSM On-Prem, the following device configuration change must be added: crypto ca fqdn-check ip-address allow

Reference: https://www.cisco.com/c/en/us/td/docs/routers/asr9000/software/asr9k-r7-6/system-security/configuration/guide/b-system-security-cg-asr9000-76x/implementing-certification-authority-interoperability.html

- CMM device deletion failure in SSM On-Prem with internal error https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe74613
- Enable legacy TLS 1.2 ciphers on onprem https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe66222
- SSM On-Prem 8-202212 allows renew of CERTID despite of device removed from server https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe64090

 SSM OnPrem: Prevent excessive DB growth if smart-agent mis-behaves https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe63124

• Should not process ID Renew request if PI is not valid

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe84702

Vulnerabilities reported by tenable in SSM On-Prem 8-202302

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe74794

 OnPrem sending Usage response to ASAv more than the buffer size https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe55698

 Several issues in PULL mode configured using RESTAPI, NETCONF, RESTCONF https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe84703

No Validation on Syslog server address

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe39737

- SSM OnPrem: (UI) Licensing Workspace Inventory generating token visualization issue in Firefox https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe36855
- Remove Redis#exists(key) from logs

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe26829

 SSM OnPrem: Pull-Mode stores device credentials in cleartext https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe26640

• No Validation on CSLU URL

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwf01745

- SSM On-Prem crashes when receive "ENDPOINT" report requests from inactive/removed device https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe01642
- SLUP OnPrem: 9410 REST API Pull intermittently see Device operation failed https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe16847
- Forgot Password option is disabled and it still works
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa57745
- Cisco SSM /var/log directory is 100% full

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe06889

- SSM On-Prem responds with message "completed" to poll_id requests without ACK data https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd94495
- SLUP: Before real contact PI Last contact always 1901-Jan-01 00:00:00 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe12399
- Upon 'EXPORT USAGE TO CISCO', it throws an error in exporting data to offline file when there is no device added

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe17497

- OnPrem goes through all the SyncPolls even when the status is Complete resulting in a large number of duplicate SyncResponses
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe12294
- Product Instance Report not possible to run report for SLP devices
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe11850
- BULK_RUM_REPORT response message is not having signature https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe14671
- Product Instance Registration Tokens is not refreshed
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe19469
- Not able to transfer Product Instance from Product Instance dialogue popup
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe19522
- Can't able to download all event records from Event log tab
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe12297
- ON-PREM sync error with CSSM-cloud. "Synchronization Failed Error downloading data with CSSM connector API"
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe12296
- Need To Implement an Export Option Under Custom Tags https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe25173
- Export Control Fails with Invalid PID
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwf44028
- Add pagination to Activity Tab Event Log
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwf35227
- Evaluation of Smart Manager Smart Licensing for CVE-2021-25220 (BIND)
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99217
- Evaluation of Smart Manager Smart Licensing for CVE-2021-3177 (python)
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99226
- Evaluation of Smart Manager Smart Licensing for CVE-2021-26401 (redhat)
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99235
- Evaluation of Smart Manager Smart Licensing for CVE-2009-4487 (nginx)
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99241
- Evaluation of Smart Manager Smart Licensing for CVE-2022-21125 (redhat)
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99252
- Evaluation of Smart Manager Smart Licensing for CVE-2022-21166 (redhat)
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99258
- Evaluation of Smart Manager Smart Licensing for CVE-2022-21123 (redhat)
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99268

- Evaluation of Smart Manager Smart Licensing for CVE-2022-2795 (DNS)
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99286
- Evaluation of Smart Manager Smart Licensing for CVE-2023-22809 (Sudo)
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99296
- Evaluation of Smart Manager Smart Licensing for CVE-2022-2964 (redhat)
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe99304

Known Issues

| 2. | User failed to remove PI from on prem after export return keys complete. |
|-----|---|
| 3. | The REST API does not work with the Instant authorization request to CSSM feature. For more information about this feature, see <i>New Features</i> . |
| 4. | Standby Node Name is not displayed properly on Active node under Product Instance tab |
| 5. | License count displayed incorrectly under Product Instance Tab in License Modal for AppHA cluster |
| 6. | RAM spikes when exporting logs with a large number of records (150k+) |
| 7. | Missing export control alerts after upgrading to 8-202304 |
| 8. | SSM On-prem direct inline upgrade from 6.x/7.x to latest 8-202302 patch fails |
| 9. | SSM On-prem fails to complete account registration if there are 2 or more requestor mail addresses |
| 10. | SSM On-prem direct inline upgrade from 6.x/7.x to latest 8-202302 patch fails |
| 11. | SSM On-prem fails to complete account registration if there are 2 or more requestor mail addresses |
| 12. | The Syslog is not transmitted to the syslog server when HA is formed. |
| 13. | Postgres fails while running stats collector throwing continuous errors. |
| 14. | Deletion of SSM On-Prem Account fails with error constraint violation. |
| 15. | HA failure logs are missing when VM is powered off. |
| 16. | Reporting license always get moved to default VA during partial sync |
| 17. | SSM On-prem HA recovermaster resouce failed to start after primary or secondary fail under certain conditions. |
| 18. | Timestamps missing for Alerts |

| 19. | Adding ACI devices in SLP mode fails in On-Prem configured with single/dual stack HA deployment |
|-----|---|
| 20. | SSM 8-202302 send wrong DLC response data to smart agent |
| 21. | Unable to turn Oauth2 off |
| 22. | SSM On-Prem cannot register to account with leading/trailing space in its name |
| 23. | Sidekiq URL is exposed for SSM On-Prem. |
| 24. | SSM On-Prem with NAT enabled SLP setup still shows UDI as display name for 17.9.1 running platform |
| 25. | SSM On-prem 8-202212 and higher version sending wrong ACK data to Rum Report requests |
| 26. | Alert not getting changed for all the devices when do bulk sync with CSSM |
| 27. | On-prem does not honor old Poll ids after 8-202304 upgrade Workaround: Force send a report or wait for the device to send a report. On receiving a new report, SSM On-Prem will generate a new poll id and normal functioning will resume. |

Resolved Vulnerabilities and Exposures

• CentOS 7: kernel (CESA-2023:1091)

CVE-2022-42703

CVE-2022-4378

• CentOS 7: zlib (CESA-2023:1095)

CVE-2022-37434

• CentOS 7: samba (CESA-2023:1090)

CVE-2022-38023

• CentOS 7: openssl (CESA-2023:1335)

CVE-2023-0286

• CentOS 7: nss (CESA-2023:1332)

CVE-2023-0767

Version 8 Release 202303

Release Date: 16/05/2023

Release 8-202303 is a special patch release for resolved vulnerabilities. Download the image here: https://software.cisco.com/download/specialrelease/3fcebb5fe58bdb60ca3850dcfbdee30f

New Features

There are no new features in this release.

Fixes

Version 8 Release 202303 introduces the following critical fixes, along with few other high and medium bugs:

 Cisco Smart Software Manager SQL Injection Vulnerability https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe14951

Resolved Vulnerabilities and Exposures

HIGH

• CentOS 7: sudo (CESA-2023:0291)

CVE-2023-22809

CentOS 7: kernel (CESA-2023:0399)

CVE-2022-2964

MEDIUM

CentOS 7: kernel (CESA-2023:0399)

CVE-2017-5715

CVE-2021-26401

CentOS 7: bind (CESA-2023:0402)

CVE-2021-25220

CVE-2022-2795

• Cisco Smart Software Manager On-Prem SQL Injection Vulnerability

CVE-2023-20110

Version 8 Release 202302

Release Date: 02/24/2023



NOTE:

As part of SSM On-prem upgrade, stale data is cleaned up from older releases. This process might take several hours, SSM On-prem upgrade will not complete until this clean up is complete. SSH session will be timed out, you will be logged out of the terminal and On-prem won't respond (both GUI port and product port) until upgrade completes.

Fixes

Version 8 Release 202302 introduces the following critical fixes, along with few other high and medium bugs:

Purge duplicate SyncRequest

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe21127

• Duplicate sync response cleaner

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe13534

• OnPrem: SLP DLC Ack not coming back to device

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd93767

Licenses tab: Displaying Checkbox when there is no license added

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe19800

Upload CSV file function is not working in Firefox browser.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe14672

 Helios-UI: Requested Account Details model - Not able to enter message in the Message to Creator field https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe19603

 Helios-ui: Upon Export to CSV, the Banner updated logs are misaligned https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe35205

Need a break (split) between Syslog Server Address and UDP port fields of Syslog tab in Settings widget.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe42886

Could be able to create a token with number of uses as 2147483647.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwe42889

Resolved Vulnerabilities and Exposures

HIGH

CentOS 7: krb5 (CESA-2022:8640)

CVE-2022-42898

CentOS 7: device-mapper-multipath (CESA-2022:7186)

CVE-2022-41974

• libexpat before 2.4.9 has a use-after-free in the doContent function in xmlparse.c.

CVE-2022-40674

Version 8 Release 202212

Release Date: 12/20/2022



NOTE:

After performing an upgrade, the browser pages might not reflect the latest changes. Clear your browser's cache so that your browser pages are up to date.

New Features

Version 8 Release 202212 introduces the following features:

Smart Account Policy Details API

Smart Account Policy Details API will fetch the account policy details of the OnPrem application for both connected and disconnected mode.

Product Instance Removal API

Enhanced the Product Instance removal API feature to remove SLP devices consuming reporting entitlement.

Product Instance Search API

Enhanced the Product Instance Search API feature to list SLP devices along with SL devices.

Create Token API

Updated the Create Token API by including the attributes "Expire After" and "number of Users".

IPv4 TTL/IPv6 Hop Limit to 255

Increased IPv4 TTL/IPv6 Hop Limit to 255 from 64 (Linux Default value).

Subject Alternative Name

The **Subject Alternative Name** (SAN) is an extension to the Host Common Name that allows users to specify additional host names for a single SSL certificate. This provides the ability to configure SAN for the product certificate, so products can register either by using IP Address or the FQDN in the Smart Transport URL or the CSLU Transport URL.

Transport Layer Security TLS 1.3

Upgraded SSM On-prem to support TLS 1.3

Fixes

Version 8 Release 202212 introduces the following critical fixes, along with few other high and medium bugs:

- SSM On-Prem 8-202206 does not load alert despite of Alert in open status.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd08124
- Sync failure when transaction id is empty within License Transaction.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc55997
- Removing SLP device consuming REPORTING entitlement throws error.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb86202
- +if cu is using proxy, port number gets disabled while upgrading on-prem to 8-202206.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc75637
- Error opening licenses tab due to expiring licenses.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvx79548

Cisco Smart Software Manager On-Prem Improper Authentication Vulnerability.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc15916

• 8-202206 - Event log under Activity tab in On-Prem workspace doesn't display timestamp.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc93877

• Scheduled sync for SLP devices doesn't work.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa89408

SSM On-Prem takes more than 1 min to load first 10 devices in Product Instance tab.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc78195

• Evaluate Smart Software Manager On-Prem for CVE-2022-31676.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd52197

GUI time zone setting is not reflecting on the event logs.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc81826

• Cisco SSM licensing server vulnerabilities in version 8-202206.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd34116

• SLP sync issue due to an error in processing the SLP DLC data on On-prem which causes the sync to fail.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd23268

• Details to be provided: Account enumeration issue reported by VISA.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd20510

SSMS Password reset via email feature revert CN value of Product Certificate back to old value.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd08301

Delay when parsing through Product Instance list from Product Instance tab.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwd04505

• OnPrem: "backoff" scalability optimization for SL enabled devices.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc91400

SSM On-Prem account license page stops loading when Pool Entitlement Summary has charge type nil
value.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc84431

• Cannot transfer device consuming REPORTING entitlement.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc75739

Port is missing in the CSLU Configs table, but still able to receive the ACKS having proxy enabled.

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc75737

• ENH: Support for adding SAN in the Product Certificate on On-Prem

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvv04648

The OK_TRY_AGAIN

The large deployment of products run into an issue where a lot of requests are being dropped/rejected by SSM OnPrem. The load on the SSM OnPrem server leads to the unresponsiveness on SSM OnPrem resulting in returning 503 or communication failure error to the products. A new message response has been added to be sent to devices when the On-Prem is loaded with many requests and determined to be too busy in processing the device message. This response will notify the device to re-try its request at a certain time interval. As the request load increases, the interval will become longer to smooth out the request load on SSM On-Prem server.

CPU and RAM spike

In our previous releases, we have RAM and CPU spikes observed for couple of scenarios which were caused by certain processes. In this release 8-202212, we have addressed them; Couple of things that the user can perform to handle this situation is to upgrade the OnPrem application to version 8-202212 which would aid in resolving the RAM and CPU spikes. Another way to mitigate the RAM and CPU spikes is by having sufficient number of licenses in your OnPrem application so that the traditional SL devices are all in Incompliance.

Please note, for certain processes, like SL and SLP Synchronization with Cisco, it is normal for the RAM to spike for the runtime of the process, but it should go back to normal once the process is done. If you see sustained high RAM or CPU, please contact TAC.

Known Issues

| | SSM On-Prem ISO allows to deploy server without meeting minimum system requirement. |
|-----|--|
| 1. | SSMS installation completes without meeting minimum system requirement and filesystem partition is not a standard SSMS and that of CENTOS based. This would cause abnormality on SWAP memory allocation and other process ongoing. |
| 2. | Product Instance Report not possible to run report for SLP devices. |
| 3. | PI edit info is not saved in NAT enabled mode. Please make sure to add all the required SUDI (Secure Unique Device Identifier) information |
| | while creating a product. Otherwise, you would have to remove and reregister the device. |
| 4. | Make sure the devices are configured with single IP otherwise there will be unpredictable results. |
| 5. | Reservation license is not consumed on OnPrem UI; but device has the AUTH code installed. |
| 6. | SSM On-Prem CSLU module must not allow duplicate device addition with different host address. |
| 7. | SSM On-Prem CSLU module must not allow multiple devices with same host address. |
| 8. | SSM On-Prem SLUP PULL Method using Rest API call does not process license for ASR1K |
| 9. | DLC issue - device is not getting acknowledgement from On-Prem |
| 10. | OnPrem: Synchronization Failed - Error downloading data with CUSTOM connector API. |
| 11. | /var/log/ 100% disk usage causing inline upgrade failure for SSM On-Prem |

| 12. | Username and Password does not get saved on Email tab under Settings |
|-----|---|
| 13. | SSMS 8-202206 does not show device details in-use due to missing entry in sku Entitlement Map |
| 14. | Not able to transfer Product Instance from Product Instance dialogue popup |
| 15. | SSM On-Prem NAT enabled setup does consolidate all device reports into single file on manual export |
| 16. | Can't able to download all event records from Event log tab. |
| 17. | SSM On-Prem does not sync with CSSM with CCO id enabled with federated service |
| 18. | OnPrem Licenses usage increments on synchronization and causes cosmetic issue. |
| 19. | SSMSV6 deployed single stack server failed to send syslog message to dual-stack syslog server |

Resolved Vulnerabilities and Exposures

CRITICAL

Python 3.x through 3.9.1 has a buffer overflow in PyCArg_repr in _ctypes/callproc.c.

CVE-2021-3177

• This issue occurs due to the on_stream_io() function and dns_stream_complete() function in 'resolved-dns-stream.c' not incrementing the reference counting for the DnsStream object.

CVE-2022-2526

- CentOS 7: expat (CESA-2022:6834)
- OpenSSH < 9.1 Multiple Vulnerabilities

HIGH

CentOS 7: kernel (CESA-2022:0620)

CVE-2021-4155, CVE-2021-0920, CVE-2022-22942, CVE-2020-0466, CVE-2021-3573, CVE-2021-3752, CVE-2022-0330, CVE-2021-3564, CVE-2020-0465

• A vulnerability was found in the Linux kernel's cgroup_release_agent_write in the kernel/cgroup/cgroup-v1.c function.

CVE-2022-0492

• An arbitrary file write vulnerability was found in GNU gzip's zgrep utility.

CVE-2022-1271

• net/netfilter/nf_tables_api.c in the Linux kernel through 5.18.1 allows a local user (able to create user/net namespaces) to escalate privileges to root because an incorrect NFT_STATEFUL_EXPR check leads to a use-after-free.

CVE-2022-32250

• A race condition was found the Linux kernel in perf_event_open() which can be exploited by an unprivileged user to gain root privileges.

CVE-2022-1729

• http.client in Python 3.x before 3.5.10, 3.6.x before 3.6.12, 3.7.x before 3.7.9, and 3.8.x before 3.8.5 allows CRLF injection.

CVE-2020-26116

VMware Tools (12.0.0, 11.x.y and 10.x.y) contains a local privilege escalation vulnerability.

CVE-2022-31676

- CentOS Security Update for python (CESA-2022:5235)
- CentOS 7: systemd (CESA-2022:6160)
- CentOS 7 : xz (CESA-2022:5052)
- CentOS 7: bind (CESA-2022:6765)
- According to its Server response header, the installed version of nginx is 1.0.x prior to 1.22.1 or 1.1.x prior to 1.23.2.

CVE-2022-41741, CVE-2022-41742

MEDIUM

CentOS 7: openIdap (CESA-2022:0621)

CVE-2020-25710, CVE-2020-25709

• urllib3 before 1.25.9 allows CRLF injection.

CVE-2020-26137

CentOS 7: cyrus-sasl (CESA-2022:0666)

CVE-2022-24407

CentOS 7: kernel (CESA-2022:5232)

CentOS 7: gzip (CESA-2022:2191)

Version 8 Release 202206

Release Date: 07/20/2022

New Features

Version 8 Release 202206 introduces the following features:

TACACS PHASE 2

This feature allows the local Virtual account users to authenticate/authorize SSM On-prem login, after TACACS+ is configured to the TACACS server. Removed dropdown "Initial role of new user" from TACACS+ configuration tab. System role dropdown and actions menu is set to greyed out for TACACS users on the user screen of user widget, so that system role change is only possible on the server end.

• MSLA support in SLP

Incorporate MSLA usage billing functionality for SLP devices.

SLP Hostname enhancements

For SLP device having Smart Agent version less than 5.5 then UID details will be displayed in the name field, if UID details are not available then IP address will be displayed. For SLP devices having Smart Agent version greater than or equal to 5.5 only Host name will be displayed.

NOTE: For SLP devices having Smart Agent version greater than or equal to 5.5 the host name cannot be created by using any special characters and spaces.

SDWAN features vManage integration with On-Prem

This feature focuses on the requirements to integration of vManage with SSM On-Prem license, by providing necessary Application Programming Interface (API) for vManage for usage reporting purposes. vManage license summary API and vManage account details API are developed to properly handle such calls.

Future dated licenses

The Future Dated license feature is integrated into On-Prem and enables customers to have the license which has the start date in future. The Future Dated license will be processed when the start date < current date, so that Future-dated licenses will not be consumed until the start date become current. The purchase count will only be reflected based on license transactions that have a present start date.



SSM On-Prem does not support the CCO id enabled with federated service (Redirect to <u>id.cisco.com</u>) yet.

Fixes

Version 8 Release 202206 introduces the following critical fixes, other than these fixes, some other high and medium bugs have also been fixed:

- In Use Quantity not shown for selected license in on-prem graph.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa75786
- Product Instances removed from OnPrem after a year of registration.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb05285
- IPTables default policies are still in place.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu89468
- SSM OnPrem: The search function under Product Instances Inventory panel.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa92002

- SSM On-Prem license reports for UC products Export to Excel and CSV Incorrect balances. https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa75363
- SSM On-Prem: Smart license Alerts can't be dismissed.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb06331
- CSLU device consuming reporting licenses causes duplicated license entries.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb16510
- Username and Password does not get saved on Email tab under Settings.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb55507
- Sidekiq jobs get stuck in development.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb80668
- Device's renewal is failed when configuring language to Japanese on SSM.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy94330
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa42681
- SSM OnPrem: Incorrect Product Instance deletion in OnPrem inventory UI. https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa96336
- Editing CSLU product in PULL mode may result in breaking Collect Usage.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa56689
- Account users not showing in manage account section of onprem.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb32134
- Display a spinner on all the screens where data is loaded.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb23940
- License count mismatch issue in GUI SSMS and the report in the SSM.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa06345
- Unable to open PI by clicking on "In Use" licenses.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb16858
- Enabling NAT feature in OnPrem disables the proxy setting and vice-versa.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa94904
 NOTE: NAT/proxy must be turned On, which was toggled off previously due to this bug.
- SSM On-Prem: 8-202102: GUI Needs to have TACACS attributes to fully auto. https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy62936
- Send RUM reports, Licenses are not being consumed on OnPrem.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa56683
- Error when scheduling sync for customers in UTC+14 timezone.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa31053

- CSSM processing failure of accumulated un-acknowledged rum reports.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa95039
- After upgrade the proxy settings in SLP DB are not persisted.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa56684
- OnPrem: automate proxy setting flap after an upgrade.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc21609
- SLP network sync fails when proxy with DNS name is configured.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb30211
- MLSA devices receive OOC when prepaid license of same type has OOC alert.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc09667
- When On-prem is bombarded with multiple auth renew requests DB fills up.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwc12764
- Postgres version has been upgraded to 13.5.
- Cisco Smart Software Manager On-Prem version 8-202112 Privilege Escalation Vulnerability.
 - https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwb98281

Known Issues

| 1. | CSSM <==> OnPrem (8-202201) license count inconsistencies. |
|----|---|
| | SSM On-prem showing incorrect license usage counts. Upon clicking on the in-use number of licenses, even though the number shows > 0, nevertheless nothing is being populated. |
| 2. | Few of the SSM On-Prem APIs will not support for SLP enabled devices. |
| | SSM On-Prem ISO allows to deploy server without meeting minimum system requirement. |
| 3. | SSMS installation completes without meeting minimum system requirement and filesystem partition is not a standard SSMS and that of CENTOS based. This would cause abnormality on SWAP memory allocation and other process ongoing. |
| 4. | Removing SLP device consuming REPORTING entitlement throws error. |
| 5. | TGCert's expiry date not getting updated on sync with CSSM. |
| 6. | Product Instance Report not possible to run report for SLP devices. |
| 7. | LDAP Scheduled sync job does not run due to SSL certificate verify failure. The LDAP scheduled sync which runs every 24 hours, certificates uploaded are not being updated. Due to this, the scheduled sync fails with error. New groups that are added since last sync are not updated in OnPrem resulting in no access to users in that group. |

| 8. | +Self signed browser certificate is not renewed by itself. |
|-----|--|
| 9. | OnPrem: Synchronization Failed - Error downloading data with CUSTOM connector API. |
| 10. | PI edit info is not saved in NAT enabled mode. Please make sure to add all the required SUDI (Secure Unique Device Identifier) information while creating a product. Otherwise, you would have to remove and reregister the device. |
| 11. | Make sure the devices are configured with single IP otherwise there will be unpredictable results. |
| 12. | Product Instance Report not possible to run report for SLP devices |
| 13. | Reservation license is not consumed on OnPrem UI; but device has the authcode installed. |
| 14. | Incorrect Count when license borrowed to lower tiers. |
| 15. | SSM On-Prem CSLU module must not allow duplicate device addition with different host address. |
| 16. | SSM On-Prem CSLU module must not allow multiple devices with same host address. |
| 17. | Cisco Smart Software Manager On-Prem version 8-202112 Privilege Escalation Vulnerability. |

Resolved Vulnerabilities and Exposures

HIGH

CentOS 7 : samba (CESA-2021:5192)

CVE-2016-2124, CVE-2020-25717

CentOS 7: polkit (CESA-2022:0274)

CVE-2021-4034

• The request phase of the OmniAuth Ruby gem (1.9.1 and earlier)

CVE-2015-9284

• An issue was discovered in the Linux kernel before 5.10.

CVE-2020-36385

• An issue was discovered in Linux: KVM through Improper handling of VM_IO|VM_PFNMAP vmas in KVM can bypass RO checks and can lead to pages being freed while still accessible by the VMM and guest.

CVE-2021-22543

A heap out-of-bounds write affecting Linux since v2.6.19-rc1 was discovered in net/netfilter/x_tables.c.

CVE-2021-22555

 BPF JIT compilers in the Linux kernel through 5.11.12 have incorrect computation of branch displacements, allowing them to execute arbitrary code within the kernel context.

CVE-2021-29154

net/bluetooth/hci_request.c in the Linux kernel through 5.12.2 has a race condition for removal of the HCI controller.

CVE-2021-32399

Redis is an open source, in-memory database that persists on disk.

CVE-2021-32675, CVE-2021-32762

• arch/powerpc/kvm/book3s_rtas.c in the Linux kernel through 5.13.5 on the powerpc platform allows KVM guest OS users to cause host OS memory corruption via rtas_args.nargs, aka CID-f62f3c20647e.

CVE-2021-37576

MEDIUM

• OpenSSH 8.2 < 8.5

CVE-2021-28041

CentOS 7: openssl (CESA-2021:3798)

CVE-2021-23840, CVE-2021-23841

CentOS 7: rpm (CESA-2021:4785)

CVE-2021-20271

• CentOS 7: krb5 (CESA-2021:4788)

CVE-2021-37750

• CentOS 7: kernel (CESA-2022:0063)

CVE-2020-25704, CVE-2020-36322, CVE-2021-42739

• Sidekiq through 5.1.3 and 6.x through 6.2.0 allows XSS via the queue name of the live-poll feature when Internet Explorer is used.

CVE-2021-30151

• A flaw was found in the way RTAS handled memory accesses in userspace to kernel communication.

CVE-2020-27777

• An issue was discovered in the Linux kernel before 5.11.11.

CVE-2021-29650

• A flaw was found in the KVM's AMD code for supporting SVM nested virtualization.

CVE-2021-3653, CVE-2021-3656

Version 8 Release 202201

Release Date: 02/04/2022

Fixes

Version 8 Release 202201 introduces the following fixes:

Synchronization fails after upgrade to 202112

Network synchronization fails when upgrading to 202112. Scenario that causes it:

- 1. Have CSLU device which consumes LH license in version prior to 202112 i.e., 202108
- 2. Perform upgrade to 202112
- 3. Do full synchronization
- 4. Sync with fail showing "translation missing error"

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa58669

Other minor fixes

Version 8 Release 202201 introduces the following minor fixes as well:

- Unexpected Substitution Counts In Upgraded Versions < 8-202010
 <p>https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa77416
 NOTE: Please perform full sync, if there is a license count mismatch for LH items.
- Unable to save LDAP configs when multiple LDAP groups are present https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa75049
- CSLU 'EXPORT USAGE TO CISCO' FAILS IN 8-202108 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa68845
- On-Prem to CSSM synchronization failure for SLU devices ERROR_POLL_ID https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa62164
- Inline upgrade from 8-202108 to 8-202112 fails with database migration https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa60443
- On-Prem to CSSM synchronization failure for SLU devices ERROR_POLL_ID(NAT) https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa55809
- SLP device state stuck in ACK received from CSSM https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa82690

Known Issues

There has been no change in terms of the known issues, these remain the same as in version 8-202112.

Scheduled Sync for SLP:

Please make sure to perform network sync from the admin portal before scheduling the synchronization for the SLP devices on the licensing portal under "Reports".

How to perform network sync from admin portal-

- 1. Go to admin workspace.
- 2. Open "Synchronization" widget
- 3. Click on "Actions" on the right side of your On-Prem Account.
- 4. Select Full or Standard Network Synchronization.
- 5. Make sure that Synchronization is successful.

Resolved Vulnerabilities and Exposures

Nothing to report in this release.

Version 8 Release 202112

Release Date: 12/22/2021

New Features

Version 8 Release 202112 introduces the following features:

IR1610

Support for the Shared Flag has been added to the SSM On-Prem. This support was already there on the CSSM cloud but not on the SSM On-prem, hence resulting in license mismatch between SSM On-prem and CSSM Cloud.

If the Shared Flag is enabled, it will allow borrowing from any parent within the same hierarchy tree, else it will form the request as we do for linear hierarchy.

LDAP (Lightweight Directory Access Protocol) Group of Names

Current OnPrem implementation supports only hardcoded groups object class:

posixGroup for OpenLDAP group for ActiveDirectory

Support for "GroupOfNames" has been added in this release.

User has possibility to use custom Groups Object Class and Group Unique Id Attribute for OpenLDAP by two fields provided in LDAP Settings.

Groups Object Class (string) - objectClass of a group that OnPrem uses in its query when importing groups. For example: groupOfNames, posixGroup.

Group Unique Id Attribute (string) - the unique attribute to track the group identity. Only groups possessing this attribute can be imported into your OnPrem. For example: gidnumber, entryUUID.

LDAP (Lightweight Directory Access Protocol) Enhancements

In this release, multiple enhancements have been added to the LDAP functionality.

1. LDAP Users Tab: In one of our previous releases there was an ask to remove LDAP Users Tab from

Access management widget. From this point, any operations could be performed only on the LDAP groups and not on a single user. However, it has not been justified by the customers' needs and we needed to bring back the functionality. So, in this release, the customers would be able to see LDAP Users Tab under Access Management widget on the Admin Portal. The tab shows the highest system role assigned to the LDAP user.

2. System role assignment for LDAP Users: We would be able to see LDAP User in Users widget and assign

them a System Role. The widget shows individually assigned system role.

3. Accounts roles assignment for LDAP Users: We would be able to add LDAP user as "New User" in "Manage Account" view Users' tab and assign him a Role.

License Hierarchy support for products using Application High-Availability (AppHA)

High availability support for the License Hierarchy has been added in this release, it will make sure that there is no double counting when LH (License Hierarchy) is being used in a HA setup.

NOTE: The On-Prem and CSSM may show different license counts in use when using the CUBE feature on Smart License Policy enabled products. This problem does not occur with products operating in traditional Smart Licensing mode. There is no business or operational impact, and the CUBE feature is working correctly. The Smart Licensing team is working with Product teams on a fix. There is no fix required in On-Prem.

SLP Bulk Auth Code

Problem: For a Product Instance running Smart Licensing Using Policy mode tries to make a request for an authorization code for export control or enforced features to the On-Prem SSM, the Smart Licensing Authorization Code (SLAC) should be download from CSSM ahead of time. This is operationally challenging and not scalable.

Solution: In this release, feature enhancement has been added which will save the authorization requests from SLUP product instances. Once the On-Prem SSM synchronizes with cloud CSSM, the request is sent in connected or offline mode and authorization code is generated on CSSM. This authorization code is sent back to On-Prem SSM as part of the acknowledgement.

Product Image Security Scanning

To ensure the security and integrity of the SSM On-Prem license server, the product is routinely scanned for out-of-date packages as well as any know critical or high CVEs (Common Vulnerabilities and Exposures). Based on evaluating reports from various tools, several key packages have been updated. These include:

PostgreSQL Angular RubyOnRails Redis

Accessibility (VPAT)

We have added a few fixes and enhancements to the existing accessibility features, please be informed VPAT (Voluntary Product Accessibility Template) is an ongoing process, and in each release, we would keep enhancing it. If you see any issue or have an idea to improve the accessibility of the SSM On-Prem, please open a bug, it will be included in the next release.

NOTE: VPAT might not work properly on Mozilla Firefox and Internet Explorer, to use VPAT without any issues, please use Google Chrome Browser.

Fixes

Version 8 Release 202112 introduces the following critical fixes, other than these fixes, some other high and medium bugs have also been fixed:

- Unable to save LDAP Configurations.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz12806
- Clicking on SLUP Product Instance's IP Gives details of another device. https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa14135
- Partial Sync clearing Entitlement Hierarchy records.
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa15038
- On-Prem should not be non-responsive when devices bombard with auth renew requests. https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa03397

- Duplicated FTD base licenses in On-Prem licensing portal causing OOC. https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz69609
- On-Prem UI display partial UDI and missing UUID https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz43367
- Alerts status refreshes only after switching tabs https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz44481
- Labels in Smart Licensing keep changing after page refresh https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz14218
- Labels in Smart Licensing keep changing after page refresh https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz14218
- On-prem sending CSLU URL to SL (Smart Licensing) products and resulting in crashing of products https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa48579
- Manual and network synchronization fails after upgrade https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz69608
- SLP Device not getting deleted in CSSM https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz65233
- Licenses Used are always (none) in the Product Instance Report https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz02197
- Inability to synchronize accounts requested by System https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvx36137
- Unable to navigate to the next page using keyboard on the Licenses tab https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz03547
- HTTP 502 Bad Gateway when sending RUM to On-Prem https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy83324
- License Hierarchy Calculations mismatch between OnPrem and CSSM https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz45260
- CSLU empty data generated during usage report generation https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa52518
- Cannot downgrade System role to System User when User has assigned accounts https://bst.cloudapps.cisco.com/bugsearch/bug/CSCwa36717
- Schedule Sync will not work if time zone UTC offset is not an integer https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz74179

Known Issues

| 1 | Error when scheduling sync for customers in UTC+14 time zone |
|---|---|
| 2 | After upgrade the proxy settings in SLP DB are not persisted In the case of an upgrade scenario, if the proxy is already enabled before the upgrade, after an upgrade you must disable it and enable it again to use proxy with MSLA & SLP. |
| 3 | PI edit info is not saved in NAT-enabled mode |

| | Please make sure to add all the required SUDI (Secure Unique Device Identifier) information while creating a product. Otherwise, you would have to remove and reregister the device. |
|---|--|
| 4 | Send RUM reports, Licenses are not being consumed on OnPrem When adding a new PUSH Device on SSM On-Prem UI, please make sure to add all the required SUDI information (PID and SN), else there will be no license consumption. It only applies to the product added through UI (Add Single Product). To add the SUDI details, click on the PI under "SL Using Policy" on Licensing Workspace, add PID & Serial Number, and save the changes. |
| 5 | Editing CSLU product which is in PULL mode may result in breaking Collect Usage While editing an SLP PI on UI, if password was already there for that PI, please make sure to reenter the password, else it may result in "Collect Usage" failures. |
| 6 | USB Enable dropdown is not visible in installer After adding four (or more) hard drives in the installation process, the Enable USB dropdown is moved outside screen bounds and is therefore difficult to access. As a temporary workaround, navigate to the Available Disks section and hit the Tab button the number of times equal to the number of hard drives +1 (5 Tab hits for a 4-drive setup, 6 Tab hits for a 5-drive setup, etc.) This will activate the Enable USB dropdown – the options will become visible on the screen and available for selection. |
| 7 | Non-ASCII characters in the cert attributes SSM On-Prem throws an error after fetching certificates that use non-ASCII characters in the cert attributes. Until a fix is developed for this issue, please use only ASCII characters in the cert attributes while creating a certificate. |

Resolved Vulnerabilities and Exposures

Version 8 Release 202112 resolves the following security vulnerabilities:

CVE-2021-23840, CVE-2021-23841, CVE-2019-20388, CVE-2020-7595, CVE-2016-4658, CVE-2016-4658, CVE-2021-3653, CVE-2021-22543, CVE-2021-3656, CVE-2021-37576, CVE-2021-29154, CVE-2021-29650, CVE-2020-27777, CVE-2021-32399, CVE-2021-22555, CVE-2020-11668, CVE-2019-20934, CVE-2021-33909, CVE-2021-33033, CVE-2021-33034, CVE-2021-3347, CVE-2020-12364, CVE-2020-27170, CVE-2020-12363, CVE-2020-12362, CVE-2020-8648, CVE-2021-25217, CVE-2021-27219, CVE-2020-12321, CVE-2021-42574, CVE-2021-3715, CVE-2021-25214, CVE-2021-20254

Version 8 Release 202108

Release Date: 08/13/2021

New Features

Version 8 Release 202108 introduces the following features:

• Support for proxy between On-Prem and cloud CSSM (with MSLA (Managed Service License Agreement) and SLP)

Enhancements have been made to both CSLU back-end go code and OnPrem MSLA go code to get proxy settings from the configuration and send messages accordingly. This allows for using the existing On-Prem UI proxy settings for MSLA and SLP.



NOTE:

In the case of an upgrade scenario, if the proxy is already enabled before the upgrade, after an upgrade you must disable it and enable it again to use proxy with MSLA & SLP.

Deletion of SLP devices

This feature has been developed to make sure users can manually remove a product instance. The *Cisco Delete Product Instance* API has been enhanced to properly handle such calls.

Look Back

For products with the Look Back capability - when a product instance reports usage of license, CSSM On-Prem now compares the *past* usage value to the current purchased value for that license. If the Look Back balance is negative, the product instance may still be authorized, based on the Look Back balance logic.

This Look Back functionality enhancement is available through additions to the "look_back_days" attribute.

Bulk network sync for multiple accounts

For improved customer experience, this feature introduces the option to select multiple/all accounts and then trigger the network sync option for all of them. This bulk synchronization option is now available in the Admin Workspace for System Admin and System Operator roles.

Note: scheduled synchronization will take place irrespectively of the bulk sync completion.

Trigger sync from Licensing Portal

This feature has been developed with the aim of reducing dependency between users and/or business units with access to On-Prem Admin Workspace and those using On-Prem Licensing Portal. To that end, the following roles are now allowed to trigger a Standard Sync from the Licensing Portal:

- System Admin
- System Operator
- Local Account Administrator
- Local Virtual Account Administrator

Node Lock ID in the sync file

Cisco Email Security Appliance (ESA) and Cisco Web Security Appliance (WSA) products use Rest Smart agent and Node Lock ID is a part of conversion data passed from devices to CSSM/On-Prem. Node Lock ID is needed by SWIFT to identify these devices in backend for conversion of classic licenses to Smart ones.

This enhancement has been developed to ensure the **node_lock_id** sent by the product to the SSM On-Prem is passed along to SSM Cloud in the sync file.

Fixes

Version 8 Release 202108 introduces the following fixes:

- Schedule sync failing with invalid refresh token error https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz12806
- Post-upgrade failure of account sync https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy49869
- Run report under Product Instance Report makes the page content disappear https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz02208
- Vulnerabilities: broken access control, business logic bypass https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz05241
- Fixed vulnerabilities in Centos Kernel and nss https://cdetsng.cisco.com/webui/#view=CSCvy56595
- Docker vulnerability (-userns-remap option)
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy13189
- Cannot change default access until after first user logged in https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy92788
- Provide option to delete TACACS users https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy92804
- Cannot add TACACS user to Local Account https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy83782
- Cannot find TACACS user
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy83776
- TACACS user role assignment via User Widget https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy80050
- Time-out to be larger than 10sec (set 0-999 seconds) for TACACS https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy92784
- SSM On-Prem is not generating a valid CSLU Transport URL https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy50544
- Authorization renewal fails with "No id cert found" error https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvx86234
- HTTP error while loading license transaction history https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu51608
- Cancel button on Edit User issue https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz06716
- Next Page navigation with keyboard issue https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvz03547
- Next Page button in Virtual Accounts not working https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy73595
- Select time in negative values https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy95322
- Displaying different On-Prem account after page refresh https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy82973

- Alerts on Product Instance point to null page https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy22891
- Add Button in the Group Details tab issue https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvx65334
- Pagination reset after Virtual Account deletion https://cdetsng.cisco.com/webui/#view=CSCvm52997

Known Issues

| 1 | HA support for license hierarchy issue |
|---|---|
| | For devices working in High Availability Cluster, there might be an issue where devices in both "active" and "standby" modes appears in <i>pool_ent_used_summaries</i> table. |
| | As a result, <code>entitlements_to_process(pool_id)</code> method of <code>EntitlementHierarchyService</code> takes into account both consumptions. |
| | CUBE licenses being double counted in HA |
| | In High Availability cluster, there might be an issue of CUBE licenses being double counted, with a number of licenses being "in use" and "standby" at the same time. |
| | Inability to synchronize accounts requested by System Users |
| 2 | In some cases, accounts requested by System Users (and approved by System Operators or System administrators) fail to synchronize with CSSM. |
| | This is due to the fact that YAML request files (originated by the On-Prem server for the faulty accounts) do not have any ID under <i>virtual_accounts</i> . |
| | Rails upgrade vulnerabilities |
| 3 | Postgres update issues |
| | Those two known issues will be fixed with the next release. |
| | PI edit info is not saved in NAT-enabled mode |
| 4 | Please make sure to add the all the required SUDI (Secure Unique Device Identifier) information while creating a product. Otherwise, you would have to remove and reregister the device. |
| 5 | License sharing in hierarchy |
| | This capability is required by the Data Center products, but not for Collab products. It was implemented in Production CSSM but is yet to be delivered for On-Prem (expected to be implemented in the October release ETA). |
| | Until then, hierarchy should still work on OnPrem with a smaller number of borrowed |

| | licenses, and not matching the count on CSSM and OnPrem. |
|---|--|
| 6 | USB Enable dropdown is not visible in installer After adding four (or more) hard drives in the installation process, the Enable USB dropdown is moved outside screen bounds and is therefore difficult to access. As a temporary workaround, navigate to the Available Disks section and hit the Tab button the number of times equal to the number of hard drives +1 (5 Tab hits for a 4-drive setup, 6 Tab hits for a 5-drive setup, etc.) This will activate the Enable USB dropdown – the options will become visible on the screen and available for selection. |
| 7 | Non-ASCII characters in the cert attributes SSM On-Prem throws an error after fetching certificates that use non-ASCII characters in the cert attributes. Until a fix is developed for this issue, please use only ASCII characters in the cert attributes while creating a certificate. |

Resolved Vulnerabilities and Exposures

Version 8 Release 202108 resolves the following security vulnerabilities:

CRITICAL

CentOS 7: nss and nspr (CESA-2020:4076)

CVE-2019-17006, CVE-2020-6829, CVE-2019-11719, CVE-2019-11727, CVE-2020-12402, CVE-2020-12401, CVE-2020-12400, CVE-2019-17023, CVE-2020-12403, CVE-2019-11756

HIGH

kernel: use-after-free in show_numa_stats function (CVE-2019-20934)

kernel: mishandles invalid descriptors in drivers/media/usb/gspca/xirlink_cit.c (CVE-2020-11668)

kernel: use-after-free in cipso_v4_genopt in net/ipv4/cipso_ipv4.c (CVE-2021-33033)

kernel: use-after-free in net/bluetooth/hci_event.c when destroying an hci_chan (CVE-2021-33034)

kernel: size_t-to-int conversion vulnerability in the filesystem layer (CVE-2021-33909)

nginx 0.6.x < 1.20.1 1-Byte Memory Overwrite RCE (CVE-2021-23017)

Version 8 Release 202105

Release Date: 06/10/2021

New Features

Version 8 Release 202105 introduces the following features:

• Bulk AuthCode Import support for devices behind NAT

The Cisco Smart License Utility (CSLU) functionality now supports the bulk importing of authordes for devices behind a NAT operating in push mode. This method was not supported in 8-202102 and has been added new in this release.

Note: At this time, CLSU is not supported through a Proxy.

Fixes

Version 8 Release 202105 introduces the following fixes:

 UC Applications and Prime infrastructure registrations fails after upgrading to SSM On-Prem version 8-202102

https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy48103

Known Issues

The following table lists all known open issues and bugs for Version 8 Release 202105:

| 1 | SLP and MSLA are not supported through a proxy. Additional code changes are required to resolve this issue. |
|---|---|
| 2 | On-Prem SLP feature currently does not support OnPrem Account names with spaces (and other special characters). On-Prem account name doesn't affect the SA/VA names which may contain spaces and don't require any changes. There is no workaround for it. Support to be added in the next release version. |

Resolved Vulnerabilities and Exposures

Nothing to report in this release.

Version 8 Release 202102

This release covers the following new features, fixes and vulnerabilities.

New Features

Version 8 Build 202102 has the following features:

• Support for Cisco Smart Licensing using Policy.

The Cisco Smart License Utility (CSLU) functionality has been integrated into SSM On-Prem providing support for newer devices which run Smart Licensing using Policy, providing a single platform to manage all Smart Licensing and SLP enabled devices. *At this time, CLSU is not supported through a Proxy.*

- Fixes and enhancements for LDAP functionality.
 - LDAP Search fixes When adding LDAP Users and Groups a filter can be applied to the search to overcome the 1000 record limitation affecting previous releases.
 - LDAP integration now works on Group basis versus user basis. LDAP groups are assigned to resources
 on OnPrem, and users are added to the groups using organization's pre-existing access controls
 processes.
 - LDAP Support for Role-Based Access Control User privileges can now be managed with user groups using RBAC policies.
- License Hierarchy fixes

Resolved license hierarchy algorithm issues. Correct ratios are now shown when a Product Instance with a higher-level license (parent license) needs to share with lower-level license (child licenses). These changes will accommodate the count/ratio changes with the CSSM architecture.

• TACACS+ Authentication integration with SSM On-Prem

Added functionality to allow TACACS+ to be utilized for authentication to OnPrem. This feature enables integration with a TACACS+ server so that users can be authenticated for access to both the On-Prem UI and CLI console.*



*ATTENTION:

TACACS+ uses MD5 hashing algorithm which is not FIPS compliant. If FIPS compliance is a requirement of your organization, please use an alternative secondary authentication method.

Fixes

- Scheduled Sync fails with "Access Token not found" error https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvw29893
- Scheduled sync executes on different day than desired https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvw79417
- SAN field doesn't support multiple entries https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvv64369
- Can't import wildcard certificate (browser cert)
 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvv87538
- Product registrations fail if syslog server configuration is incorrect https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu32429
- Cannot transfer a license with a Subscription ID https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy24164
- Transfer Quantity Exceeds Available Quantity" error when transferring a license https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvx04389
- OnPrem UI not available after upgrade https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvy24164

Resolved Vulnerabilities and Exposures

Version 8 Release 202102 resolves the following CentOS security vulnerabilities

CRITICAL

CentOS 7: nss and nspr (CESA-2020:4076)

CVE-2019-17006, CVE-2020-6829, CVE-2019-11719, CVE-2019-11727, CVE-2020-12402, CVE-2020-12401, CVE-2020-12400, CVE-2019-17023, CVE-2020-12403, CVE-2019-11756

HIGH

CentOS 7: kernel (CESA-2020:5023) CVE-2019-20811, CVE-2020-14331 CentOS 7: kernel (CESA-2020:5437)

CVE-2020-14314, CVE-2020-25212, CVE-2020-25643, CVE-2020-14385, CVE-2019-18282, CVE-2020-24394, CVE-2020-10769

CentOS 7: samba (CESA-2020:5439)

CVE-2020-14323, CVE-2020-1472, CVE-2020-14318

CentOS 7: pacemaker (CESA-2020:5453)

CVE-2020-25654

CentOS 7: sudo (CESA-2021:0221)

CVE-2021-3156

CentOS 7: net-snmp (CESA-2020:5350)

CVE-2020-15862

CentOS 7: glibc (CESA-2021:0348)

CVE-2019-25013, CVE-2020-10029, CVE-2020-29573

CentOS 7: perl (CESA-2021:0343)

CVE-2020-10543, CVE-2020-12723, CVE-2020-10878

MEDIUM

CentOS 7: freetype (CESA-2020:4907)

CVE-2020-15999

CentOS 7: libcroco (CESA-2020:4072)

CVE-2020-12825

CentOS 7: python (CESA-2020:5009)

CVE-2019-20907

CentOS 7: bind (CESA-2020:5011)

CVE-2020-8622, CVE-2020-8623, CVE-2020-8624

CentOS 7: resource-agents (CESA-2020:5004)

CVE-2020-11078

CentOS 7: curl (CESA-2020:5002)

CVE-2020-8177

CentOS 7: python (CESA-2020:3911)

CVE-2019-16935

CentOS 7: libxml2 (CESA-2020:3996)

CVE-2019-19956, CVE-2019-20388, CVE-2020-7595

CentOS 7: openssl (CESA-2020:5566)

CVE-2020-1971

Known Issues

The following table lists all known open issues and bugs for Version 8 Release 202102:

| 1 | SLP and MSLA are not supported through a proxy. Additional code changes are required to resolve this issue. |
|---|---|
| 2 | SLP currently does not work in Pull mode when devices are behind a NAT. This is due to the |

| way that NAT functions and discovery is prevented since all devices currently have the |
|--|
| same address. |

Version 8 Release 202010

This release covers new features scheduled for this release. In addition, it covers the following severity levels: 1, 2, and 3.

New Features

Version 8 Build 202010 has the following new features:

There are no new features in this release.

Fixes

- ADFSv3 Configuration Fails Due to a Certificate Validation Issue https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu75808
- Upgrading from v8-202006 to v8-202008 Causes Synchronization to Fail https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvw11615

Resolved Vulnerabilities and Exposures

Version 8 Release 202010 resolves the following CentOS security vulnerabilities

HIGH

CentOS 7: curl (CESA-2020:3916)

CVE-2019-5482

CentOS 7: glib2 and ibus (CESA-2020:3978)

CVE-2019-12450, CVE-2019-14822C

CentOS 7: kernel (CESA-2020:4060)

CVE-2019-19537, CVE-2019-19059, CVE-2019-19534, CVE-2020-8647, CVE-2019-18808, CVE-2020-8649, CVE-2019-15917, CVE-2020-10732, CVE-2019-15217,

CVE-2020-1749, CVE-2020-14305, CVE-2018-20836, CVE-2019-16231, CVE-2019-19046, CVE-2019-19063, CVE-2019-19062, CVE-2019-20636, CVE-2019-19767,

CVE-2019-9454,CVE-2017-18551, CVE-2019-16233, CVE-2019-19447, CVE-2019-19524,CVE-2019-16994, CVE-2019-19523, CVE-2020-10942, CVE-2019-20054,

CVE-2020-10742, CVE-2019-15807, CVE-2019-20095, CVE-2019-12614, CVE-2019-19807, CVE-2020-12826, CVE-2019-9458, CVE-2020-10690, CVE-2020-12770,

CVE-2020-10751, CVE-2020-11565, CVE-2020-2732, CVE-2019-17053, CVE-2019-19055, CVE-2019-17055, CVE-2019-19058, CVE-2019-19332, CVE-2019-19530,

CVE-2020-9383

CentOS 7: libpng (CESA-2020:3901)

CVE-2017-12652

CentOS 7: libvpx (CESA-2020:3876)

CVE-2019-9232, CVE-2019-9433, CVE-2017-0393, CVE-2020-0034

MEDIUM

CentOS 7: cpio (CESA-2020:3908)

CVE-2019-14866

CentOS 7: cups (CESA-2020:3864)

CVE-2019-8696, CVE-2017-18190, CVE-2019-8675

CentOS 7: e2fsprogs (CESA-2020:4011) CVE-2019-5094, CVE-2019-5188 CentOS 7: expat (CESA-2020:3952) CVE-2018-20843, CVE-2019-15903

CentOS 7: libmspack (CESA-2020:3848)

CVE-2019-1010305

CentOS 7: libssh2 (CESA-2020:3915)

CVE-2019-17498

CentOS 7 : libtiff (CESA-2020:3902) CVE-2019-17546, CVE-2019-14973

CentOS 7: NetworkManager (CESA-2020:4003)

CVE-2020-10754

CentOS 7: openIdap (CESA-2020:4041)

CVE-2020-12243

CentOS 7: samba (CESA-2020:3981)

CVE-2019-14907

LOW

CentOS 7: dbus (CESA-2020:4032)

CVE-2019-12749

CentOS 7: glibc (CESA-2020:3861)

CVE-2019-19126

CentOS 7: systemd (CESA-2020:4007)

CVE-2019-20386

Version 8 Release 202008

This release covers these new features. In addition, it covers fixed Severity (Sev) 1 and Severity (Sev) 2 as well as resolved vulnerabilities and exposures.

New Features

Version 8 Build 202008 has the following new features:

• MSLA RUM Support

Incorporate MSLA usage billing functionality

• Endpoint Reporting Model (ERM)

Ensure that each endpoint is counted as a single license consumption

• License Hierarchy-Weights

Provide NXOS has weighting to help determine which device to substitute a higher tier license. Each license will be given a weight, and device sums all licenses used for the total wight to determine who has priority to borrow from the parent license first.

• Provide audit features for Administration Workspace

Add audit logs to each page in Administration Workspace and improve syslogs and alerts.

• Three new commands have been added to the On-Prem Console Guide

The three commands are: docker_network_config, password_policy, and tcpdump. See the Cisco Smart Software Manager *On-Prem Console Reference Guide* for more information.

Version 8 Release 202008 Includes These Important Fixes from Previous Releases

CSCvs64165 and CSCvs31532 are important fixes for access token and synchronization for Release 6.x thru Release 8

As of September 25, 2020, the new default access token life is 180 days instead of 30 days. So, when an access token is expired, you will receive an "Access Token not found Synchronization cannot proceed" notice when you synchronize an account.

When you receive an access token not found notice, you must select the Accounts tab > Actions, and then perform a standard or full network synchronization for that account. Before the synchronization process begins, you are prompted to enter you login credentials (CCO). Once you log in, the synchronization process will proceed during the next scheduled interval.

- Single Sign-On(SSO) Authentication Tokens Appear to Expire after 30 Days https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs64165
- On-Prem Scheduled Sync fails after 30 days https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs31532

Other Important Fixes from Previous Releases:

- Upgrade from 6.2 to 8-202006 Fails with Table "dlc_device_migrations" Error https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvv33868
- LCS Cert Nil Value, On-Prem Satellite Unable to Synchronize after 8-202006 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu93682
- Event Log Tables inside Atlantis DB Fills up Disk Space and Makes On-Prem Unstable https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu56089
- Unable to Change Docker Network IP (internal ip-addresses used by Satellite) https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu10501
- Browser certs do not persist after HA teardown https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvv60899
- CA Signed UI Cert Disappears on Release/8-202006 after Reload https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu83039

Resolved Common Vulnerabilities and Exposures

Version 8 Release 202008 resolves the following CentOS security vulnerabilities

CRITICAL

CVE: CVE-2020-8165

HIGH

Rails: CVE: CVE-2020-8164, CVE-2020-8162

CentOS 7: grub2 (CESA-2020:3217)

CVE-2020-14310, CVE-2020-14311, CVE-2020-15707, CVE-2020-10713, CVE-2020-14308, CVE-2020-15706, CVE-

2020-14309, CVE-2020-15705

CentOS 7: kernel (CESA-2020:3220)

CentOS 7: kernel (CESA-2020:2664)

CVE-2020-12888, CVE-2019-19527, CVE-2020-12654, CVE-2020-12653, CVE-2020-10757

CentOS 7: unbound (CESA-2020:2642) REMOVED

CentOS 7: unbound (CESA-2020:2414) REMOVED

CVE: CVE-2020-10772, CVE-2020-12662, CVE-2020-12663

MEDIUM

Rails: CVE-2020-8166

CentOS 7: bind (CESA-2020:2344)

CVE: CVE-2020-8616, CVE-2020-8617

CentOS 7: dbus (CESA-2020:2894)

CVE: CVE-2020-12049

LOW

CentOS 7: microcode ctl (CESA-2020:2432)

CVE: CVE-2020-0548, CVE-2020-0543, CVE-2020-0549

Version 8 Release 202008 Known Issues

The following table lists all known open issues and bugs for Version 8 Release 202008:

| 1 | System level SYSLOG events are not sent to the Remote Syslog server | CSCvu94867 |
|---|---|------------|
| 2 | Invalid cert in db with an extra - at the endnote | CSCvu93683 |

Version 8 Release 202004

This release covers new features scheduled for this release. In addition, it covers fixed Sev 1 and Sev 2 as well resolved vulnerabilities and exposures.

New Features

Version 8 Build 202004 has the following new features:

• Product support of up to 300,000 devices

SSM On-Prem can now support from 100,000 to 300,000 devices spread across multiple accounts (a maximum of 25,000 products with any number of licenses used for each account). Note that the total time for 300,000 products can take up to two hours.

• Provide extended life span for tokens

Provide capacity to set a maximum 27-year life span (9999 days) for tokens.

• FIPS 140-2 Compliance

The Federal Information Processing Standard (FIPS) Publication 140-2 is a U.S. government standard that defines minimum security requirements for cryptographic modules in information technology products. FIPS 14-2 Certification allows Federal customers to be FIPS compliant when deploying SSM On-Prem using a STIG Profile.

• Provide Session Limits for concurrent users

Supports STIG Security Settings and Features that limit maximum concurrent user logins for both the UI and for the On-Prem Shell.

• Capacity to utilize multiple NTP Servers and Authentication with NTP Servers

SSM On-Prem provides additional capacity to configure a backup NTP server that utilizes Chrony for authentication. Therefore, SSM On-Prem will support the configuration of two NTP servers where the second server acts as a fallback, if the first server becomes unresponsive.

• Enhanced localization capability to include French

SSM On-Prem has expanded its localization capability to include the French language.

• Capacity to use Customer Certificates on Proxy server

Increased capability for using customer certificates on a Proxy server which allows customers to upload CA used with Proxy servers.

Endpoint Reporting Model (ERM) Compatibility

Endpoint Reporting Model is an additional API to Smart Licensing used to mitigate double license count for certain controllers which provides support for Wireless LAN Controller Version 16.12.1 and later.

Version 8 Release 202004 Includes These Important Fixes from Previous Releases

- On Prem 7-202001, Proxy Does Not Work with HTTPS (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvt13065)
- Sync Credentials are Cleared after Logging Out (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs94939)
- Device HA Switchover Fails (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs91758)
- Duplicate Records for Insufficient Licenses Appear in Event Log (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs78783)
- Missing Product Details Info in On-Prem 7.2 License Page for HSEC License (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs70622)
- Licenses Not Released from Product after 90 Days of No Communication (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvo04458)
- Force Registration Does Not Cleanup License Consumption (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvt03959)
- Third Party Auth Users Cannot Generate Bearer Tokens (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvt35383)
- Cannot Access On-Prem with Chrome https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvt27571
- If the Customer Uploads a Weak Cipher Cert for UI Cert, the GUI No Longer is Available https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvt95777
- Smart Software Manager On-Prem 7 Displays Inconsistent License https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvt89461
- Failed to Set Expire Date When Attempting to Register an FP4110 https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvt29523
- On-Prem Version 7-201907 or Upgraded from 7-201907 to later Versions Count Mismatch https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu22739
- Product Registration Fails When Syslog Server Misconfigured https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvu32429

Resolved Common Vulnerabilities and Exposures

Version 8 Release 202004 resolves the following CentOS security vulnerabilities

CRITICAL

CESA-2020:0374, CESA-2020:0839, CESA-2020:1016: (CVE-2019-14895, CVE-2019-14901, CVE-2019-14898, CVE-2019-17133, CVE-2019-17666, CVE-2019-19338, CVE-2019-11487, CVE-2018-20169, CVE-2019-12382, CVE-2019-15221, CVE-2019-13233, CVE-2019-11884, CVE-2019-15916, CVE-2019-16746, CVE-2019-9503, CVE-2018-7191, CVE-2019-10207, CVE-2019-13648, CVE-2019-10639, CVE-2019-3901, CVE-2019-10638, CVE-2017-17807, CVE-2015-9289, CVE-2019-18660, CVE-2019-14283, CVE-2018-19985, CVE-2019-11190)

HIGH

CESA-2020:1113: (CVE-2019-9924) CESA-2020:1011: (CVE-2015-2716) CESA-2020:1138: (CVE-2018-18751)

CESA-2020:1180: (CVE-2019-13133, CVE-2019-14981, CVE-2019-11472, CVE-2019-13297, CVE-2019-14980, CVE-2019-11470, CVE-2019-13295, CVE-2019-11597, CVE-2019-13135, CVE-2019-13454, CVE-2019-13134, CVE-2018-10805, CVE-2019-11598, CVE-2018-10804, CVE-2018-16749, CVE-2017-11166, CVE-2018-11656, CVE-2019-17540, CVE-2018-13153, CVE-2017-18273, CVE-2019-7397, CVE-2019-7398, CVE-2019-13301, CVE-2019-17541, CVE-2019-13300, CVE-2019-12975, CVE-2019-13306, CVE-2019-12976, CVE-2019-13305, CVE-2019-13304, CVE-2019-12974, CVE-2019-12979, CVE-2019-13309, CVE-2017-18271, CVE-2019-12978, CVE-2019-13307, CVE-2017-12805, CVE-2017-12806, CVE-2018-12599, CVE-2018-10177, CVE-2018-16750, CVE-2018-8804, CVE-2019-15139, CVE-2019-13311, CVE-2019-13310, CVE-2019-16708, CVE-2019-16709, CVE-2018-12600, CVE-2018-9133, CVE-2018-16328, CVE-2019-15140, CVE-2019-15141, CVE-2018-18544, CVE-2019-7175, CVE-2017-18251, CVE-2019-16710, CVE-2017-18252, CVE-2019-16711, CVE-2018-20467, CVE-2019-16712, CVE-2017-18254, CVE-2019-10131, CVE-2019-10650, CVE-2019-9956, CVE-2019-16713, CVE-2019-19948, CVE-2019-19949, CVE-2018-15607, CVE-2017-1000476, CVE-2018-14437, CVE-2018-14434, CVE-2018-14436, CVE-2018-14435)

CESA-2020:1000: (CVE-2019-17042, CVE-2019-17041)

MEDIUM

CESA-2020:1080: (CVE-2019-3890, CVE-2018-15587)

CESA-2020:1176: (CVE-2017-6519)

CESA-2020:1061: (CVE-2019-6465, CVE-2019-6477, CVE-2018-5745)

CESA-2020:1050: (CVE-2018-4180, CVE-2018-4181, CVE-2018-4700)

CESA-2020:1020: (CVE-2019-5436)

CESA-2020:1022: (CVE-2018-10360)

CESA-2020:0897: (CVE-2020-10531)

CESA-2020:1189: (CVE-2019-12779)

CESA-2020:1021: (CVE-2019-3820)

CESA-2020:1081: (CVE-2018-18066)

CESA-2020:1131: (CVE-2018-20852, CVE-2019-16056)

CESA-2020:0227: (CVE-2019-13734)

CESA-2020:0540: (CVE-2019-18634)

CESA-2020:1181: (CVE-2019-13232)

CESA-2020:1084: (CVE-20191-0197, CVE-2019-10218)

LOW

CESA-2020:1135 (CVE-2018-1116)

ADDITIONAL CONTAINER UPDATES

CVE-2014-1912, CVE-2011-1521, CVE-2012-0845, CVE-2012-1150, CVE-2011-4940, CVE-2015-7981

CVE-2019-547

CVE-2020-5249, CVE-2020-5247, CVE-2019-16770

CVE-2019-10193, CVE-2019-10192, CVE-2018-11219, CVE-2018-12326, CVE-2018-11218

CVE-2014-10077

CVE-2019-8331, CVE-2018-20676, CVE-2018-20677, CVE-2018-1404, CVE-2016-10735

Version 7 Release 202001

This release covers new features scheduled for this release. In addition, it also covers resolved <u>vulnerabilities and exposures</u>, fixed <u>Sev 1 and Sev 2</u>, and <u>important fixes from previous releases</u>.

New Features

Version 7 Build 202001 has the following new features:

There are no new features in this release.

Version 7 Release 202001 SEV 1 and SEV 2 Fixed

- Unique DB password per installation (HA/backend) (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs42156)
- License showing out of compliance (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs43179)
- Export Control with SmartTransport not working (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs40521)
- Firepower Unable to Use Token https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs47442
- On-prem 7-201910 is generating token without line break delimiter https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs56822
- Missing product details info in On-Prem 7.2 License page for HSEC licensed product https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs70622

Resolved Common Vulnerabilities and Exposures

Version 7 Release 202001 resolves the following CentOS security vulnerabilities:

CESA-2019:3834 (CVE-2019-11135, CVE-2018-12207, CVE-2019-0154)

CESA-2019:3872 (CVE-2019-0155)

CESA-2019:3976 (CVE-2018-19519)

CESA-2019:4326 (CVE-2019-18397)

CESA-2019:3979 (CVE-2019-14821, CVE-2019-15239)

CESA-2019:4190 (CVE-2019-11729, CVE-2019-11745)

CVE-2019-5420

CVE-2019-5419

CVE-2019-5418

CVE-2019-16770

CVE-2019:10193

CVE-2019-10192

CVE-2018-12326

Version 7 Build 202001 Includes These Important Fixes from Previous Releases

CSCvr17188: Disabling IPv6 does not Disable IPv6

CSCvs40521: Do not support SmartTransport with EC

CSCvs47442: Firepower Unable to Use Token

CSCvs17220: Host Common Name in SSM On-Prem is Reset after Upgrade

CSCvr13793: SSM On-Prem HTP Missing Security Headers

CSCvs40226: Unintended r/w Access to the CSSM On-Prem Database Configured with Hard-coded Credentials

CSCvr51499: License Usage Count Increasing with Every Sync in License Hierarchy

Version 7 Release 202001 Known Issues

The following table lists all known open issues and bugs for Version 7 Release 202001:

| 1 | Username not displayed for AD users in User Widget | CSCvs44010 |
|---|--|------------|
| 2 | SSO authentication tokens appear to expire after 30 days on Scheduled synch. | CSCvs64165 |

Version 7 Release 201910

This release covers <u>new features</u> scheduled for this release. In addition, it also covers resolved <u>vulnerabilities and exposures</u> as well as fixed <u>Sev 1 and Sev 2</u>.

New Features

Version 7 Build 201910 has the following new features:

sha256 signing key

Increased patch security with the addition of sha256 signing key.

LDAP Secure

SSM On-Prem supports tls (Transport Layer Security) and plain text login. Forces correct configuration of the host, port, bind dn, and password or you get an error message assuring proper configuration and security.

ADFS: OAuth ADFS

Add OAuth Active Directory Federation Services support for LDAP.

• Active Directory (OAUTH2)Add Active Directory Federation Services support

This feature also adds Active Directory support to LDAP group import.

Browser Certs Management Install User Browser Certificate and Framework

This feature enables the customer to import their own cert through the browser) from their local directory.

- Password Management Password Strength Settings & Password reset/recovery workflow
 New tabs have been added in the Security Widget to set password expiration parameters as well as
 - specific password settings to create greater password strength.
- Account Management Account Lock Out/Management Settings

Enables an account to be locked after a specific number of incorrect login attempts. Allows System Administrator to re-set the password for the account.



In this release, for auto lock feature to function properly, you must have **secondary authentication** configured.

• Product Instance Engine (PIE) Integration with On-Prem

Replace Tomcat container with Typhan Container for increased performance and scale. The changed architecture puts in place infra that allows for future increases in scale. See PIE Instance support below.

• Product Instance Engine (PIE) Smart Transport Support

SSM On-Prem has expanded its support to include Smart by providing an endpoint to receive Smart Transport messages.

• Product Instance Engine (PIE) Registration

Basic Product Instance Registration (no authorization)

• Product Instance Engine (PIE) Third Party License

This feature provides licensing for third parties (Nuance, APNS), so they can use smart licensing to register products. It requires entitlement tags to be setup, creates "getKeys" request, all information is validated.

Security Widget Enhancement

This feature expands the Security Widget functionality to include Cert (see Browser Certs Management) and Password Enhancements (see Password Management).

• Hardware Minimum Disk Space Requirement

Upgraded minimum disk requirement is 100 Gigabytes.

Increased maximum product instance capacity

Upgraded maximum product instance capacity to 50,000 with a maximum capacity of 25,000 product instances per account.

Version 7 Release 201910 SEV 1 and SEV 2 Fixed

- When request encountered comm fail, installs 4 licenses instead of 1 (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvq99678)
- Database replication is broken in HA On-Prem (https://bst.cloudapps.cisco.com/bugsearch/bug/CSCvs17939)

Resolved Common Vulnerabilities and Exposures

Version 7 Release 201910 resolves the following CentOS security vulnerabilities:

• CESA:2019:2091 (CVE-2018-16866, CVE-2018-16888, CVE-2018-15686)

- CESA:2019:2197 (CVE-2019-9516, CVE-2019-9511, CVE-2019-9513)
- CESA:2019:2027 (CVE-2018-18520, CVE-2018-18310, CVE-2018-16062, CVE-2019-7150, CVE-2018-16402, CVE-2018-16403, CVE-2019-7664, CVE-2019-7665, CVE-2018-18521, CVE-2019-7149)
- CESA:2019:2829 (CVE-2019-14835, CVE-2019-7222, CVE-2019-3460, CVE-2019-3882, CVE-2019-5489, CVE-2019-11810, CVE-2019-11599, CVE-2019-11833, CVE-2019-3900, CVE-2018-14625, CVE-2018-8087, CVE-2018-16885, CVE-2018-7755, CVE-2018-9516, CVE-2018-9517, CVE-2018-13094, CVE-2018-13095, CVE-2018-15594, CVE-2018-13053, CVE-2018-13093, CVE-2018-18281, CVE-2018-10853, CVE-2019-3459, CVE-2018-9363, CVE-2018-14734, CVE-2018-16658)
- CESA:2019-3055 (CVE-2019-3846, CVE-2018-20856, CVE-2019-10126, CVE-2019-9506)
- CESA:2019:2077 (CVE-2018-12327)
- CESA: 2019:2046 (CVE-2018-19788)
- CESA: 2019:2057 (CVE-2018-5741)
- CESA: 2019:2075 (CVE-2018-12641, CVE-2018-12697, CVE-2018-1000876)
- CESA: 2019:2181 (CVE-2018-16842)
- CESA: 2019:2060 (CVE-2019-6470)
- CESA: 2019:2118 (CVE-2016-10739)
- CESA: 2019:2047 (CVE-2018-14348)
- CESA: 2019:2049 (CVE-2018-18585, CVE-2018-18584)
- CESA: 2019:1884 (CVE-2019-3862)
- CESA: 2019:2136 (CVE-2019-3858, CVE-2019-3861)
- CESA: 2019:2237 (CVE-2018-0495, CVE-2018-12404)
- CESA: 2019:2033 (CVE-2018-6952, CVE-2016-10713)
- CESA: 2019-2964 (CVE-2018-20969, CVE-2019-13638)
- CESA: 2019:2189 (CVE-2018-1122)
- CESA: 2019:2030 (CVE-2019-9740, CVE-2018-14647, CVE-2019-5010, CVE-2019-9948, CVE-2019-9947)
- CESA: 2019:2110 (CVE-2018-16881)
- CESA: 2019:2099 (CVE-2019-3880)
- CESA: 2019:2159 (CVE-2018-18384)
- CESA: 2019:3197 (CVE-2019-1428)
- CESA: 2019:3197 (CVE-2019-1428)
- runc (CVE-2019-5736)
- nginx (CVE-2019-9516, CVE-2019-9511, CVE-2019-9513)

Version 7 Release 201910 Known Issues

The following table lists all known open issues and bugs for Version 7 Release 201910:

| 1 | Partial Synch may does not decrement license count. Need to perform a full synchronization to correct the mismatch. | CSCvr92319 |
|---|---|------------|
| 2 | CUCM ID Renew Fails-There is a compatibility issue in this release with products that use Java Agent with version less than 3.0.13. Below is the list of products affected: | CSCvs39279 |
| | Cisco Emergency Responder (CER): Java 2.1.6 | |

- Cisco HyperFlex Systems: Java 1.3.2
- Cisco IoT Field Network Director (FND) –(No Release Number)
- Cisco Policy Suite CPS: Java 1.2
- Cisco SON Suite: Java 1.3.6
- Cisco WebEx Meeting Server (CWMS): Java 2.1.4
- Cisco Wide Area Application Services (WAAS/vWAAS): 2.0.6
- Cisco Unity Connection: Java 2.1.6
- Cisco Unity Express Virtual (vCue): Java 2.0.10
- CloudCenter Suite: Java 2.1.4
- Data Center Network Manager (DCNM): Java 2.1
- Edge and Fog Module (EFM): Java 2.0.13
- Evolved Programmable Network Manager (EPN-M): Java 1.2
- Identity Services Engine (ISE): Java 1.2
- Industrial Networking Director (IND): Java 1.2
- Prime Collaboration Provisioning (PCP) Java 1.3.6
- Prime Infrastructure: Java 1.1
- Prime Infrastructure Operations Center Java (No release number)
- Session Management Edition (SME): Java 2.1.6
- Stealthwatch Learning Network (SLN) Java 1.2
- Unified Communications Manager (CUCM) Java 2.1.6
- Video Surveillance Manager (VSM) Java jret1.8-11.9.0_192fcs.x86 64
- Cisco Unified SIP Proxy (CUSP) Java 1.0 and Java 2.0.9

Version 7 Release 201907

New Features

Version 7 has the following new Features:

- Rebrand from satellite to OnPrem
 - Changes all occurrences of "SSM satellite Enhanced Edition" to "SSM On-Prem."
- STIG OS Federal Compliance:
 - Provide STIG OS to be shipped as application capable of running on CentOS 7.
 - Provides an install option for SSM On-Prem that can be deployed and used by customers requiring STIG compliance.
- Security:
 - Forces the Administrator to update the system password during installation
 - Disallow changing the admin password back to the default password.
 - Adding/Deleting User is now recorded in Event Log
 - Automatically log users out of system when they have been idle for 10 minutes

• Migration Script:

Migration script to support satellite 4.x/5.x to 6.3.

Once you upgrade to 6.3 use the 7 Patch to upgrade to On-Prem 7.

• Platform Health:

Provides ability for Admin role to edit information about a user from the Admin Portal.

Improvements made to error handling in the process of converting PAK files licenses to Smart licenses.

Localization:

Localization for all text in UI for Japanese, Chinese, and Korean.

High Availability

General available release for active/standby High Availability.

High Availability provides protection for licensing operations through the use of dual virtual machines (VM) or physical servers. This offers a redundant server which increases network availability. The feature establishes one of the SSM On-Prem VMs as the active processor while the other VM is designated as the standby, and then synchronizing critical state information between them. Following an initial synchronization between the two VMs, High Availability dynamically maintains state information between them.

License Hierarchy

An enhanced SL Licensing model allows a higher-level license to be used to satisfy multiple lower-level licenses.

Added support to allow lower-tier licenses to be satisfied by multiple higher-tier parents.

• Smart Transport Support

Offers a new communication endpoint used by selected products. The new endpoint for Smart Transport is https://<ip.address>/SmartTransport

Resolved Common Vulnerabilities and Exposures

Version 7 201907 resolves the following CentOS security vulnerabilities:

- CESA-2019:1481
- CESA-2019:1235
- CESA-2019:1294
- CESA-2019:1619
- CESA-2019:1587

Version 7 Release 201907 Known Issues

The following table lists all known open issues and bugs for Version 7 Release 201907:

| 1 | Loading errors on Firefox | CSCvm64119 |
|---|---------------------------|------------|

Established Workarounds

Product Compatibility

Customers with products that use TLS 1.0 cannot use HTTPS to register. They must use HTTP for registration to satellite EE. This is due to Infosec not allowing TLS 1.0 to be used. This applies to Smart Agents before 1.5.

DNS Workaround

If DNS is configured incorrectly in kickstart, it cannot be corrected via Network Settings in **Administration** workspace. SSM satellite includes a text-based configuration tool called **nmtui** which can be used to edit the network interface configuration and correct IP on the interfaces that have the incorrect DNS entry.

To modify DNS please take the following steps:

1. Run nmtui with SUDO privileges.

\$ sudo nmtui

As an alternative to **nmtui**, you can edit the network scripts directly (per interface):

\$ sudo vi /etc/sysconfig/network-scripts/ifcfg-ens3

- 2. Change the DNS1="" property the correct DNS IP address.
- 3. Restart the network service to force NetworkManager to write out the new /etc/resolv conf.

\$ sudo systemctl restart network

4. Restart the cerberus service to update the system database for Atlantis.

\$ sudo systemctl restart cerberus

SSM satellite does not explicitly indicate that LibCurl should re-resolve the DNS entries, so we must restart Atlantis.

\$ sudo systemctl restart satellite