Release Notes for the Ultra Cloud Serving Gateway Control Plane Function Version 2023.01.3

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Introduction

This Release Notes identifies changes and issues related to this software release.

Release Lifecycle Milestones

Release Lifecycle Milestone	Milestone	Date
First Customer Ship	FCS	31-Jan-2023
End of Life	EoL	31-Jan-2023
End of Software Maintenance	EoSM	31-Jul-2024
End of Vulnerability and Security Support	EoVSS	31-Jul-2024
Last Date of Support	LDoS	31-Jul-2025

These milestones and the intervals between them are defined in the Cisco Ultra Cloud Core (UCC) Software Release Lifecycle Product Bulletin available on cisco.com.

Release Package Version Information

Software Packages	Version
ccg.2023.01.3.SPA.tgz	2023.01.3

Descriptions for the various packages provided with this release are available in the Release Package Descriptions section.

NOTE: The ccg.*<version>*.SPA.tgz software package is common to both the cnSGWc and SMF 5G Network Functions (NF). The deployment and configuration procedure determines the NF deployment.

Verified Compatibility

Products	Version
Ultra Cloud Core SMI	2023.01.1.18
Ultra Cloud Core SMF	2023.01.0

Related Documentation

For the complete list of documentation available for this release, go to:

https://www.cisco.com/c/en/us/support/wireless/ultra-cloud-core-serving-gateway-function/products-installation-and-configuration-guides-list.html

Installation and Upgrade Notes

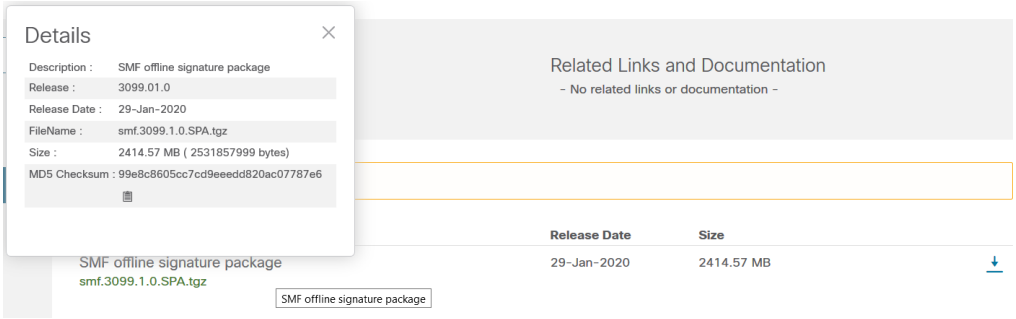
This Release Notes does not contain general installation and upgrade instructions. Refer to the existing installation documentation for specific installation and upgrade considerations.

NOTE: In this software release, you must deploy SMF in merged mode only. For more information on this mode, see the *UCC SMF Configuration and Administration Guide* and *UCC cnSGWc Configuration and Administration Guide*.

Software Integrity Verification

To verify the integrity of the software image you have from Cisco, you can validate the SHA512 checksum information against the checksum identified by Cisco for the software.

Image checksum information is available through **Cisco.com Software Download Details.** To find the checksum, hover the mouse pointer over the software image you have downloaded.



At the bottom you find the SHA512 checksum, if you do not see the whole checksum you can expand it by pressing the "..." at the end.

To validate the information, calculate a SHA512 checksum using the information in Table 1 and verify that it matches the one provided on the software download page.

To calculate a SHA512 checksum on your local desktop please see the table below.

Table 1 – Checksum Calculations per Operating System

Operating System	SHA512 checksum calculation command examples
Microsoft Windows	Open a command line window and type the following command > certutil.exe -hashfile *<filename>.<extension>* SHA512
Apple MAC	Open a terminal window and type the following command $ shasum -a 512 <filename>.<extension>

Linux	Open a terminal window and type the following command
	
	$ sha512sum <filename>.<extension>
	
	Or
	
	$ shasum -a 512 <filename>.<extension>

NOTES: *<filename>* is the name of the file. *<extension>* is the file extension (e.g. .zip or .tgz).	

If the SHA512 checksum matches, you can be sure that no one has tampered with the software image or the image has not been corrupted during download.

If the SHA512 checksum does not match, we advise you to not attempt upgrading any systems with the corrupted software image. Download the software again and verify the SHA512 checksum again. If there is a constant mismatch, please open a case with the Cisco Technical Assistance Center.

Certificate Validation

The software images are signed via x509 certificates. For information and instructions on how to validate the certificates, refer to the .README file packaged with the software.

Open Bugs for this Release

There are no open bugs in this software release.

Resolved Bugs for this Release

There are no resolved defects in this specific software release. However, the cnSGW integrates the new SMI Ops Center in this release. For more information on the Ops Center changes, refer to CSCwe78485.

Cloud Native Product Version Numbering System

The **show helm list** command displays detailed information about the version of the cloud native product currently deployed.

Versioning: Format & Field Description

YYYY.RN.MN[.TTN] [.dN] [.MR][.iBN]

Where,

YYYY → 4 Digit year.
- *Mandatory Field*
- *Starts with 2020.*
- *Incremented after the last planned release of year.*

RN → Major Release Number.
- *Mandatory Field*
- *Starts with 1.*
- *Support preceding 0.*
- *Reset to 1 after the last planned release of a year(YYYY)*

MN → Maintenance Number.
- *Mandatory Field*
- *Starts with 0.*
- *Does not support preceding 0.*
- *Reset to 0 at the beginning of every major release for that release.*
- *Incremented for every maintenance release.*
- *Preceded by 'm' for builds from main branch.*

TTN → Throttle of Throttle Number.
- *Optional Field, Starts with 1.*
- *Precedes with "**t**" which represents the word "**throttle of throttle**".*
- *Applicable only in "Throttle of Throttle" cases.*
- *Reset to 1 at the beginning of every major release for that release.*

DN → DEV branch Number.
- *Same as TTN, except Used for DEV branches*
- *Precedes with "**d**" which represents "**dev branch**".*

MR → Major Release for TOT and DEV branches
- *Only applicable for TOT and DEV Branches.*
- *Starts with 0 for every new TOT and DEV branch .*

BN → Build Number
- *Optional Field, Starts with 1.*
- *Precedes with "**i**" which represents the word "**interim**".*
- *Does not support preceding 0.*
- *Reset at the beginning of every major release for that release*
- *Reset for every throttle of throttle.*

The appropriate version number field increments after a version has been released. The new version numbering format is a contiguous sequential number that represents incremental changes between releases. This format facilitates identifying the changes between releases when using Bug Search Tool to research software releases.

Release Package Descriptions

Table 2 lists provide descriptions for the packages that are available with this release.

Table 2 - Release Package Information

Software Packages	Description
ccg.<version>.SPA.tgz	The offline release signature package. This package contains the deployment software as well as the release signature, certificate, and verification information.

NOTE: The ccg.*<version>*.SPA.tgz software package is common to both the cnSGWc and SMF 5G Network Functions (NF). The deployment and configuration procedure determines the NF deployment.

Obtaining Documentation and Submitting a Service Request

For information on obtaining documentation, using the Cisco Bug Search Tool (BST), submitting a service request, and gathering additional information, refer to https://www.cisco.com/c/en/us/support/index.html.

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