



# Release Notes for the Ultra Cloud Core Redundancy Configuration Manager Version 2022.01.0

**First Published:** February 14, 2022

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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	9-Feb-2022
End of Life	EoL	9-Feb-2022
End of Software Maintenance	EoSM	10-Aug-2023
End of Vulnerability and Security Support	EoVSS	10-Aug-2023
Last Date of Support	LDoS	31-Aug-2024

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
rcm.2022.01.0.SPA.tgz	2022.01.0

## Verified Compatibility

Products	Version
Ultra Cloud Core SMI	2020.02.2.i47
Ultra Cloud Core UPF	2022.01.0

## Related Documentation

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

<https://www.cisco.com/c/en/us/support/wireless/ultra-cloud-core-user-plane-function/tsd-products-support-series-home.html>

## Installation and Upgrade Notes

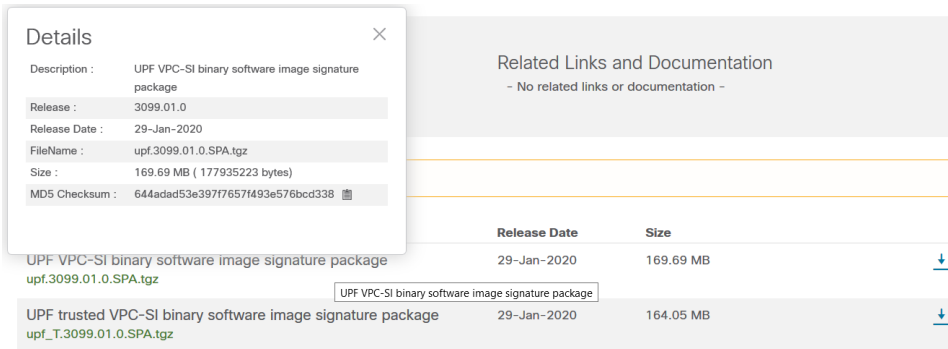
This Release Notes does not contain general installation and upgrade instructions. Refer to the existing installation documentation for specific installation and upgrade considerations.

**NOTE:** For CN deployments, RCM rolling upgrade to 2022.01.0.i6 fails as there is a change from previous versions in specification of checkpoint manager. In CN, cluster manager does cluster sync to do in-service upgrade of the RCM. In doing so, upgrade fails for rcm-checkpoint-manager. As a workaround remedy, execute "**system mode shutdown**" and then perform cluster sync.

## 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 either 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>

Operating System	SHA512 checksum calculation command examples
Linux	Open a terminal window and type the following command  \$ sha512sum <filename>.<extension>  Or  \$ shasum -a 512 <filename>.<extension>
<b>NOTES:</b>  <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.

## MD5 Checksum Details

Software Packages	MD5 Checksum
rcm.2022.01.0.SPA.tgz	29f35dd6b7b419112fe0449daeff7342

## Certificate Validation

RCM software images are signed via x509 certificates. Please view the .README file packaged with the software for information and instructions on how to validate the certificates.

## Open Bugs for this Release

None in this release.

## Resolved Bugs for this Release

The following table lists the known bugs that are resolved in this specific software release.

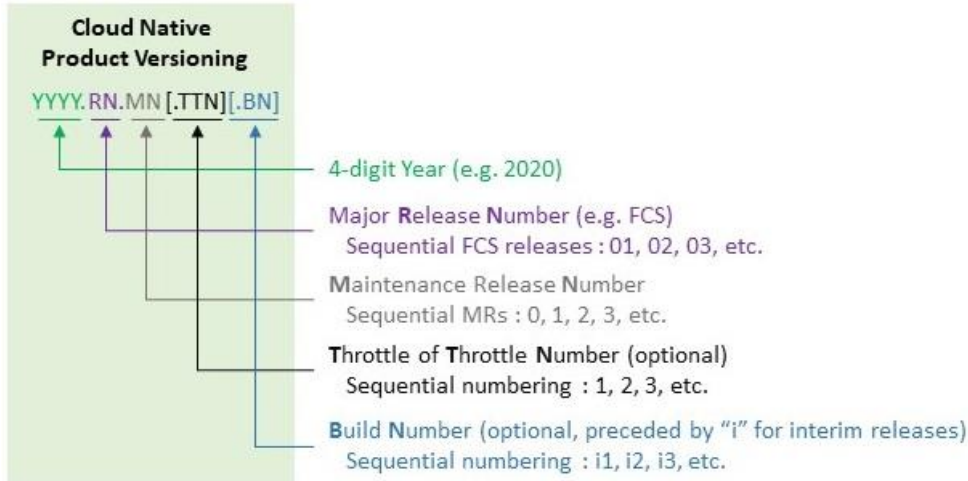
**NOTE:** This software release may contain bug fixes first introduced in other releases. Additional information for all resolved bugs for this release are available in the [Cisco Bug Search Tool](#).

Bug ID	Headline	Product	Behavior Change
<a href="#">CSCwa81196</a>	Externally exposed HTTP ports on RCM	RCM	No

## Operator Notes

### Cloud Native Product Version Numbering System

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



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 provides descriptions for the software packages that are available with this release.

**Table 2 - Release Package Information**

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

### 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>.

## Obtaining Documentation and Submitting a Service Request

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