



# Release Notes for the Ultra Cloud Core Policy Control Function Version 2021.02.1

**First Published:** August 19, 2021  
**Last Updated:** August 19, 2021

## Introduction

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

## Release Package Version Information

Software Packages	Version
pcf.2021.02.1.SPA.tgz	2021.02.1

Descriptions for the software packages provided with this release are available in the [Release Package Descriptions](#) section.

## Verified Compatibility

Products	Version
Ultra Cloud Core SMI	2020.02.1.i33

For information on the Ultra Cloud Core SMI release, refer to the corresponding SMI Release Notes available at:

<https://www.cisco.com/c/en/us/support/wireless/ultra-cloud-core-subscriber-microservices-infrastructure/products-release-notes-list.html>.

## 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-policy-control-function/tsd-products-support-series-home.html>

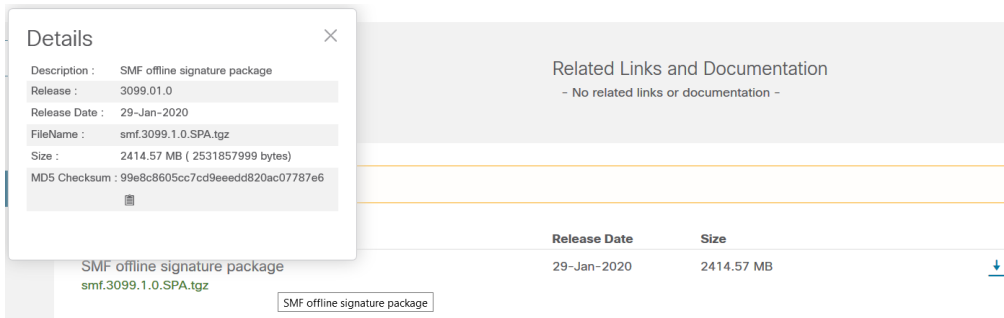
## Installation and Upgrade Notes

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

## 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  <code>&gt; certutil.exe -hashfile &lt;filename&gt;.&lt;extension&gt; SHA512</code>
Apple MAC	Open a terminal window and type the following command  <code>\$ shasum -a 512 &lt;filename&gt;.&lt;extension&gt;</code>
Linux	Open a terminal window and type the following command  <code>\$ sha512sum &lt;filename&gt;.&lt;extension&gt;</code>  Or  <code>\$ shasum -a 512 &lt;filename&gt;.&lt;extension&gt;</code>
<b>NOTES:</b>  <code>&lt;filename&gt;</code> is the name of the file.  <code>&lt;extension&gt;</code> 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

PCF 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

The following table lists the known bugs that were found in this software release and which remain open.

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

Bug ID	Headline
<a href="#">CSCvz07408</a>	Retriever for "Slice Information" present but not working
<a href="#">CSCvz24203</a>	Loggers sometime not enable & disable log for engine in consolidated -logging-0
<a href="#">CSCvz31388</a>	wps_rx_total, the command code has numeric representation
<a href="#">CSCvy95735</a>	Multiple rest-ep pods sending heartbeats to tertiary nrf

## 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	Behavior Change
<a href="#">CSCvz01095</a>	Grafana timing out after trying to fetch stats with longer duration	No
<a href="#">CSCvz06421</a>	Rx AAR message timeout instead of 5065 when corresponding N7 session is not present in PCF	No
<a href="#">CSCvy10807</a>	Need config option for ldap.request.queue.size and change default for resourceset.clear.interval	Yes
<a href="#">CSCvy27067</a>	Correction in LDAP traffic calculation expression in PCF grafana	No
<a href="#">CSCvy37563</a>	refQosData Id not same in N7 Notify of early and final Rx AAR in conf call	No

Operator Notes

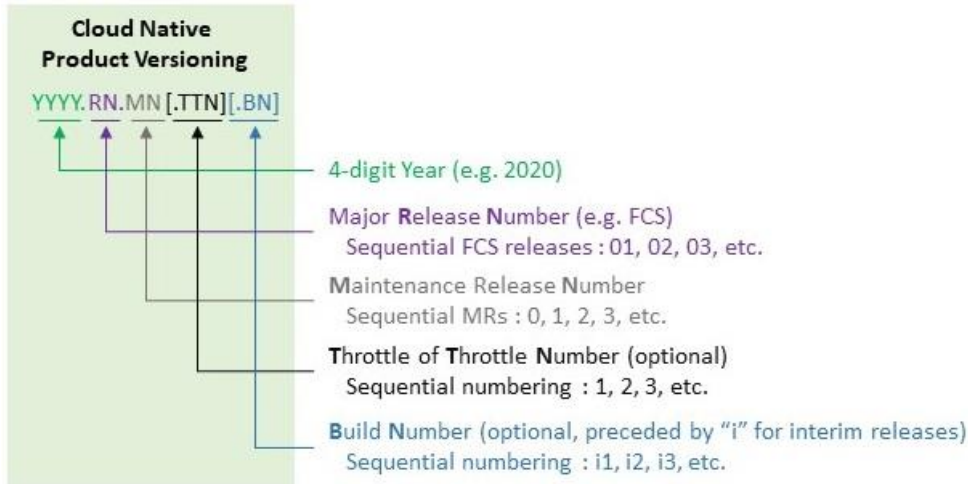
Bug ID	Headline	Behavior Change
<a href="#">CSCvy38531</a>	wps_dedicated_bearer_upgrade_total is incremented during bearer installation itself	No
<a href="#">CSCvy48651</a>	Error for Prometheus query failure in logs	No
<a href="#">CSCvy57541</a>	Zing JVM removal	No
<a href="#">CSCvy65650</a>	Add Call Failure Monitoring dashboard as part of deployment	No
<a href="#">CSCvy65653</a>	"Success Rate" KPI graph shows "Value" instead of proper names	No
<a href="#">CSCvy67594</a>	Multiple issues with "Application KPI" dashboard	No
<a href="#">CSCvy74520</a>	After throttling PCF not re-uplifting default bearer for next set of WPS calls	No
<a href="#">CSCvy89470</a>	Enable logs to analyze issue related to PCF sending messages toward lower priority CHF	No
NA	<p>SMI-5331: Unable to restore smart license after PCF upgrade</p> <p>Smart Licensing worked fine post upgrade or restart till Kubernetes versions 1.17. But in Kubernetes 1.18 onwards, a new field was introduced as <b>managedFields</b> due to which smart-agent is unable to parse Kubernetes secret after upgrade or restart leading to failure in restoring smart-agent data.</p> <p>Handling is updated to support parsing of <b>managedFields</b> so that smart-agent data can be restored successfully.</p>	NA

## 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.

Obtaining Documentation and Submitting a Service Request



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 software packages that are available with this release.

**Table 2 - Release Package Information**

Software Packages	Description
pcf.<version>.SPA.tgz	The PCF offline release signature package. This package contains the PCF deployment software 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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