



## Red Hat Insights 2020-10

# Ensuring Approved Packages Are Installed Across System Profiles Using System Comparison

How to validate approved packages are installed across system profiles and generate reports



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Red Hat Customer Content Services

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## Abstract

This workflow example demonstrates how to validate approved RPM packages are installed across system profiles and generate CSV reports for analysis. Providing Feedback: If you have a suggestion to improve this document or find an error, submit a Bugzilla report at <http://bugzilla.redhat.com> against Cloud Software Services (cloud.redhat.com) for the System Comparison component.

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## CHAPTER 1. OVERVIEW

As an IT operator, use System Comparison to ensure approved security tools and RPM packages are installed on each system:

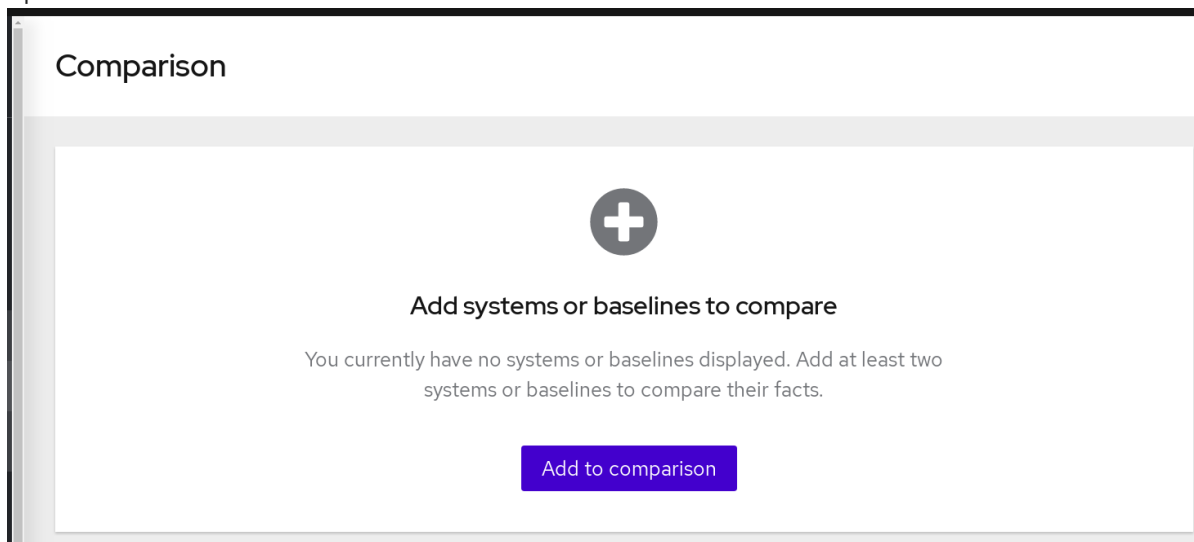
1. Access the System Comparison service.
2. Add systems manually within the System Comparison service.
3. Filter system configuration data by installed packages.
4. Export the filtered data to a CSV file for analysis.

## CHAPTER 2. ACCESSING THE SYSTEM AND BASELINES COMPARISON SERVICE

The System Comparison service is part of Red Hat Insights. Access this service via <https://cloud.redhat.com>.

### Procedure

1. On <https://cloud.redhat.com>, in the Red Hat Insights panel, click **Drift**. The Comparison screen opens.



2. Click **Add to comparison**. The Add to comparison screen opens, where you can add systems or baselines to compare.

### Add to comparison

Systems Baselines

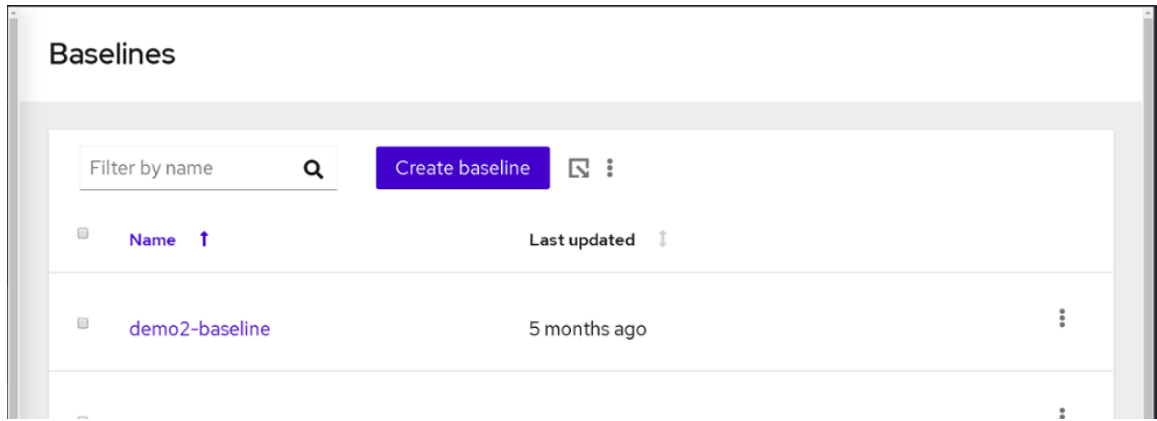
▼ Name Filter by name 🔍

Status Fresh × Stale × Source Insights × Clear filters

Submit

- On the **Systems** tab, you can add any systems you want to compare. This screen also lists any baselines that already exist in your Insights inventory.
- On the **Baselines** tab, you can create baselines. This screen also lists any baselines that already exist in your inventory.





3. Click **Submit** to add your systems or baselines for comparison.

Once you add them, you can start comparing the facts of systems and baselines in your Insights inventory.

## CHAPTER 3. ADDING SYSTEMS MANUALLY WITHIN SYSTEM COMPARISON

Within the System Comparison service, you can add systems registered in your Insights inventory.


Add systems registered in your Insights inventory within the {ServiceName} service.

### Procedure

1. On the Insights user interface, click **Drift** → **Comparison** in the left-side navigation menu. The Comparison service opens to the Comparison screen.
2. Click **Add to comparison**.
3. Select the systems to compare from the list. Alternatively, enter the system name in the search box to find by name, and then select the system.
4. Click **Submit**.



### NOTE

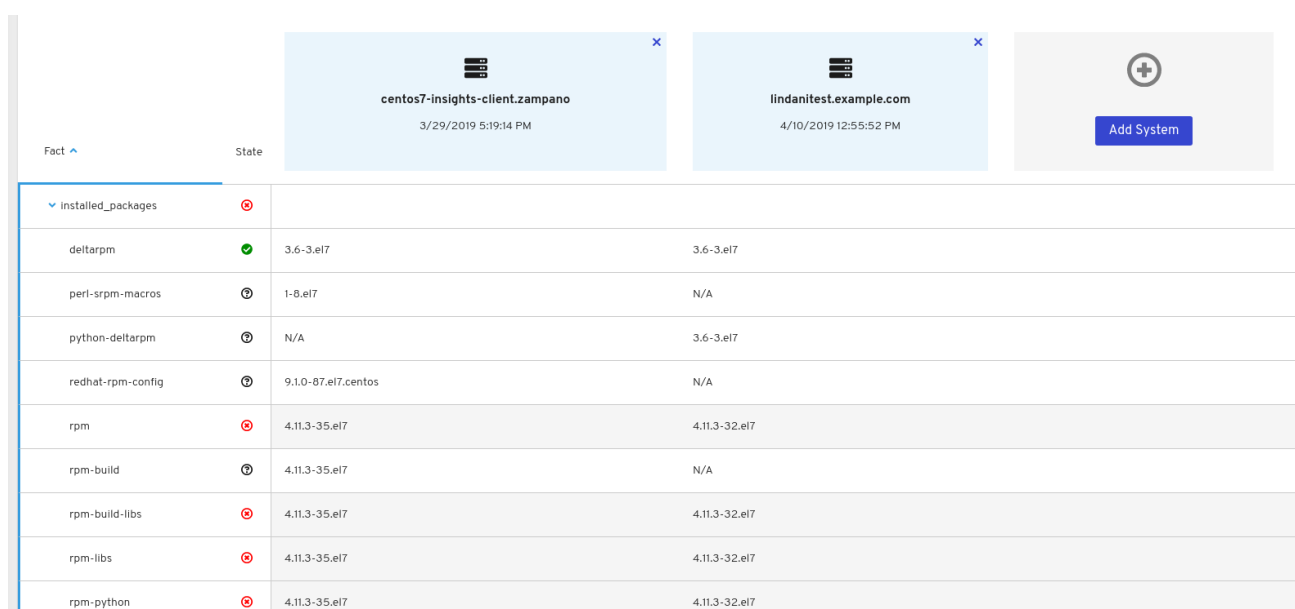
- At any time, you can add more systems by clicking the **Add to comparison** button near the top of the Comparison screen.
- Similarly, you can remove a particular system under comparison by clicking the **X** symbol on the upper-right corner of the individual system name, or you can remove all systems under comparison by clicking the options menu  located at the top, then clicking **Clear all comparisons** to start again.

## CHAPTER 4. FILTERING SYSTEM FACTS BY INSTALLED PACKAGES

Filter the system facts by installed packages.

1. Enter the required package name in the search box at the top, or enter **installed\_packages** to view the list of all packages installed.
2. In the **View** drop-down list, ensure you are viewing the result for all comparison states, by selecting the check boxes for **Same**, **Different**, and **Incomplete data**. For all installed packages, the System Comparison service lists installed packages and their versions, indicating whether they are the same, different, and where information is missing across systems.

In the example screen capture below, facts are filtered by installed RPM packages for which you can see a subset of the list. Note that for package **deltarpm** there is no difference in its version between the two systems, however, packages **rpm**, **rpm-build**, **rpm-build-libs**, **rpm-libs**, and **rpm-python** show a difference. Also, data is missing for some of the other packages. This is a discrepancy as systems were not consistently upgraded with approved packages.



Fact	State	System 1	System 2
installed_packages	⊙		
deltarpm	✔	3.6-3.el7	3.6-3.el7
perl-srpm-macros	⊙	1-8.el7	N/A
python-deltarpm	⊙	N/A	3.6-3.el7
redhat-rpm-config	⊙	9.1.0-87.el7.centos	N/A
rpm	⊙	4.11.3-35.el7	4.11.3-32.el7
rpm-build	⊙	4.11.3-35.el7	N/A
rpm-build-libs	⊙	4.11.3-35.el7	4.11.3-32.el7
rpm-libs	⊙	4.11.3-35.el7	4.11.3-32.el7
rpm-python	⊙	4.11.3-35.el7	4.11.3-32.el7

## CHAPTER 5. EXPORTING SYSTEM COMPARISON OUTPUT

You can export a comma-separated-values (CSV) file of the system profiles you previously filtered. The report captures, by installed packages, where RPM versions are the same, different, and where information is missing.




### NOTE

The exported CSV report preserves all your current selections on the system comparison output, including any filters applied. That is, it follows the WYSIWYG (What You See Is What You Get) paradigm. Therefore, you will need to expand any nested fact categories (**installed\_packages**, for example) to be exported in the report.

### Procedure

1. At the top of the system comparison output screen for two or more systems, click the Export to

CSV button  .

2. Click **Export as CSV**.

Open the CSV file with the tool of your choice so that you can easily analyze discrepancies in installed RPM packages.