Using the Automation Calculator

Evaluate the cost savings associated with automated processes
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Abstract

This guide shows how to use the Automation Calculator to evaluate how automation is deployed across your environments and the savings associated with it. The Automation Calculator produces a total savings based on default values, and allows you to tune your cost analysis based on real numbers.
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CHAPTER 1. ABOUT AUTOMATION CALCULATOR

The automation calculator provides graphs, metrics and calculations that help you determine the total savings on your investment in automated processes.

Automation savings

Automation savings is produced by an analysis of the time and cost of performing a task manually, such as deploying a server, versus the time and cost associated with automating the same task. Automation savings calculations extend across all organizations, clusters, hosts and templates in an environment. Include your own estimated costs to produce a more accurate calculation.

NOTE

The initial total savings is based on default values for each variable.

Variables

Several variables are used in evaluating costs:

- **Manual cost of automation** - the approximate cost for a mid-level resource to perform a task or series of tasks.
- **Cost of automation** - costs associated with automating tasks as job templates.
- **Automation time** - the time required to run a job template.
- **Number of hosts** - the number of hosts in inventory the template runs on.

Automation formula

Automation savings is based on the following formulas:

- **Manual cost per template** = (time for a manual run on one host * (sum of all hosts across job runs)) * cost per hour.
- **Automation cost per template** = cost of automation per hour * sum of total elapsed hours for a template.
- **Savings** = sum of (manual cost - automation costs) across all templates.

1.1. CALCULATING YOUR AUTOMATION SAVINGS

The Automation Calculator produces its default total savings figure based on estimates for each variable.

You can tune this calculation by providing more specific organizational cost information, as well as adjusting the time values for each of the top templates. The total savings will update dynamically as each field is edited.

NOTE

Automation savings calculations are not saved in Red Hat Automation Analytics.

To calculate your automation savings:
1. Under **Calculate your automation** enter cost information for:
   a. Manual process cost
   b. Automated process cost
2. Under **Top templates**:
   a. Adjust time values for top templates to provide time to manually perform each task that the template automates.

**Total savings** will update based on the information you provide in each field.

### 1.2. TOP TEMPLATES

**Top templates** lists the 25 most frequently run templates across all hosts in your environment. Templates are listed in descending order starting with the highest run count. You can enter the time it takes to perform tasks manually that are automated by templates in the field adjacent to the run totals to produce a more accurate total savings. The default value is set to **60** minutes.

#### 1.2.1. Curating top templates

You can use the toggle switch for each template to show or hide it in the bar graph to compare performance and savings based on specific templates.

- Click the toggle switch for each template to display or hide it.

The bar graph on the **Automation Calculator** will update to display those top templates selected and **Total savings** will calculate based on those templates.

#### 1.2.2. Viewing template details

You can view detailed information for each template in **Top templates** to learn more about the template’s context in the calculation of automation savings.

- Click the **Info** icon for a job template to view template details.

**Top template information is provided for the following:**

- **Total elapsed sum** - total run time of the template
- **Success elapsed sum** - total run time for successful template runs
- **Failed elapsed sum** - total run time for failed template runs
- **Automation percentage** - template accounts for this percentage of automation in your organization.
- **Associated organizations** - template runs against these organizations
- **Associated clusters** - Ansible Tower clusters the template runs on.