



Hewlett Packard
Enterprise

HPE Operations Analytics

Software Version: 2.32

HPE Operations Analytics - BSM and OMi Integration Guide

Document Release Date: June 2016
Software Release Date: June 2016

Legal Notices

Warranty

The only warranties for Hewlett Packard Enterprise products and services are set forth in the express warranty statements accompanying such products and services. Nothing herein should be construed as constituting an additional warranty. HPE shall not be liable for technical or editorial errors or omissions contained herein.

The information contained herein is subject to change without notice.

Restricted Rights Legend

Confidential computer software. Valid license from HPE required for possession, use or copying. Consistent with FAR 12.211 and 12.212, Commercial Computer Software, Computer Software Documentation, and Technical Data for Commercial Items are licensed to the U.S. Government under vendor's standard commercial license.

Copyright Notice

© Copyright 2015-2016 Hewlett Packard Enterprise Development LP

Trademark Notices

Microsoft, Windows, and Windows NT are U.S. registered trademarks of the Microsoft group of companies.

Oracle and Java are registered trademarks of Oracle and/or its affiliates.

UNIX® is a registered trademark of The Open Group.

Documentation Updates

The title page of this document contains the following identifying information:

- Software Version number, which indicates the software version.
- Document Release Date, which changes each time the document is updated.
- Software Release Date, which indicates the release date of this version of the software.

To check for recent updates or to verify that you are using the most recent edition of a document, go to:
<https://softwaresupport.hpe.com/group/softwaresupport/search-result?keyword=>

This site requires an HPE Passport account. If you do not have one, click the **Create an account** button on the HPE Passport Sign in page.

Support

Visit the HPE Software Support website at: <https://softwaresupport.hpe.com>

This website provides contact information and details about the products, services, and support that HPE Software offers.

HPE Software Support provides customer self-solve capabilities. It provides a fast and efficient way to access interactive technical support tools needed to manage your business. As a valued support customer, you can benefit by using the support website to:

- Search for knowledge documents of interest
- Submit and track support cases and enhancement requests
- Download software patches
- Manage support contracts
- Look up HPE support contacts
- Review information about available services
- Enter into discussions with other software customers
- Research and register for software training

Most of the support areas require that you register as an HPE Passport user and sign in. Many also require a support contract. To register for an HPE Passport ID, go to <https://softwaresupport.hpe.com> and click **Register**.

To find more information about access levels, go to:

<https://softwaresupport.hpe.com/web/softwaresupport/access-levels>

HPE Software Integrations, Solutions and Best Practices

Access the Hewlett Packard Enterprise Software Support site (**<https://softwaresupport.hpe.com/manuals>**) to search for a wide variety of best practice documents and materials.

Contents

Chapter 1: Introduction/Overview	5
Chapter 2: Prerequisites	6
Chapter 3: Cross Launch Integrations	7
How to Set Up a Cross Launch Integration for OMi Events	7
How to Use a Cross Launch Integration from OMi	8
How to Set Up a Cross Launch Integration for Anomalies in SHA	8
How to Use the Cross-Launch Integration from SHA	8
Chapter 4: Dashboard Integration	9
Chapter 5: Sending Events to HPE Operations Manager i (OMi)	14
Chapter 6: URL Syntax	15
Send Documentation Feedback	17

Chapter 1: Introduction/Overview

This guide describes the details of the types of integrations between HPE Business Service Management (BSM), Operations Manager i (OMi), and HPE Operations Analytics (OpsA).

This integration can enable the following features:

- **Cross-Launch Integration:** Drill down from BSM to Operations Analytics in the context of a specific CI, event, or SHA anomaly.
- **Dashboard Integration:** Display the Operations Analytics user interface inside a dashboard in MyBSM or OMi.

Both of these integrations allow you to use the forensic root cause analysis tools in Operations Analytics in conjunction with BSM and OMi monitoring tools.

Chapter 2: Prerequisites

The integration between BSM and Operations Analytics can only be performed on the following versions:

- BSM 9.23 or later
- Operations Analytics 2.10 or later. The integration with OMi is only supported starting from version 2.30.
- OMi 10 or later

Chapter 3: Cross Launch Integrations

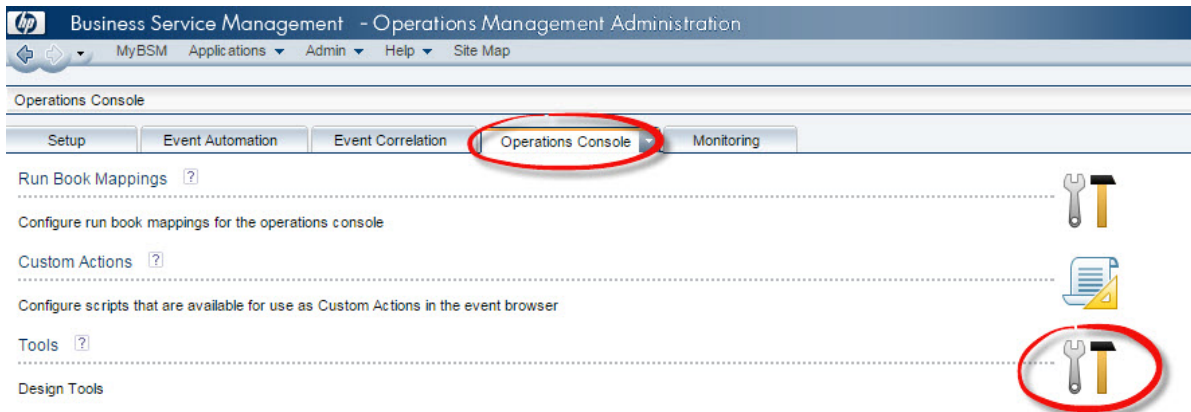
You can configure an integration that allows you to open Operations Analytics directly from BSM in the context of a specific event or host. This allows you to open analysis tools from Operations Analytics such as log analytics and predictive analytics quickly and easily in the appropriate context.

How to Set Up a Cross Launch Integration for OMi Events

Note: This procedure is the same for OMi whether it is a part of BSM or a standalone product. The screen shots have been taken for OMi as a part of BSM.

You can configure a cross launch for individual CI types from the Operations Management Administration console. This is done using OMi's **User Tools** feature.

1. From the BSM or OMi user interface, go to **Admin > Operations Management**.
2. Go to the **Operations Console** Tab and select **Tools**.



3. Select the CI type for which you want to enable the cross launch.
4. Select **New Item**.



5. Complete the **General** Page. Specify the default category.
6. On the **Type** page, select **URL**.
7. Specify a URL as seen in the following example:

```
http://<my opsa_server_
URL>:8080/opsa/#!/dashboard&search=host%20withkey%20%22${event.node.dnsName}%22&st
art=${event.timeReceived.seconds}&end=~0h&selectedTimeRange=CUSTOM_TIME
```

How to Use a Cross Launch Integration from OMi

1. Go to **Applications > Operations Management > Events Perspective** and right click the desired event.

Note: The cross launch functionality is defined as a tool and must be defined for each CI type.

2. Select **Launch > Tools**
3. Select the name of the URL you would like to launch.

How to Set Up a Cross Launch Integration for Anomalies in SHA

1. In **Platform Administration > Setup and Maintenance > Infrastructure Settings**, select **Service Health Analyzer** in the **Applications** context.
2. In the **Service Health Analyzer - User Interface** table, locate the **Operations Analytics URL** setting.
3. Specify the Operations Analytics server in the URL as follows:
http://<your opsa server>:8080/opsa
4. Click **Save** to enable the integration.

How to Use the Cross-Launch Integration from SHA

1. Go to **Applications > Service Health Analyzer > CI Analytics Data** tab.
2. Select the relevant Business Service and click **topology view**. Right click any node that is a host.
3. Select **drilldown** and **Operations Analytics**.
An Operations Analytics dashboard focusing on the host opens in a new window.

Chapter 4: Dashboard Integration

You can display the Operations Analytics user interface within the user interface of a dashboard in OMi or MyBSM.

To Configure a BSM MyBSM Integration

This procedure explains how to configure a MyBSM page that displays the event browser and the Operations Analytics user interface.

1. Prerequisite: You must configure LWSSO on the Operations Analytics environment. This procedure can be found in the HPE Operations Analytics Configuration Guide.
2. Set up an Operations Analytics user that has the same user name and password as an administrative user in BSM.
3. In Operations Analytics, locate **/opt/HP/opsa/jboss/standalone/deployments/opsa-ui-web.war/WEB-INF/web.xml**.

Modify the following section from:

```
<init-param>
<param-name>X-Frame-Options</param-name>
<param-value>SAMEORIGIN</param-value>
</init-param>
```

to:

```
<init-param>
<param-name>X-Frame-Options</param-name>
<param-value>Allow-From http://<BSM URL>/topaz</param-value>
```

4. Restart Operations Analytics by running the command **opsa-server restart**.
5. We recommend adding a mapping of the Operations Analytics IP and the Operations Analytics FQDN in the windows host file in every client machine that will be used to access Operations Analytics.
6. Delete the cookies of all browsers used to access BSM.
7. Log in to BSM with a user that exists in both BSM and Operations Analytics.
8. Add Operations Analytics to the list of trusted hosts:
 - a. In the BSM JMX console, locate the **Topaz** section and select **service=LW-SSO Configuration**.
 - b. Locate the **addDNSDomainToTrustedHosts** element.
 - c. Add the Operations Analytics domain and select **Invoke**.
 - d. Verify that the domain has been added by going to **Administration > Platform > Users and**

Permissions > Authentication Management. In the **Single Sign-On Configuration** table, verify that the domain you just added is visible under **Trusted Hosts/Domains**.

9. In BSM, go to **Applications > MyBSM**.

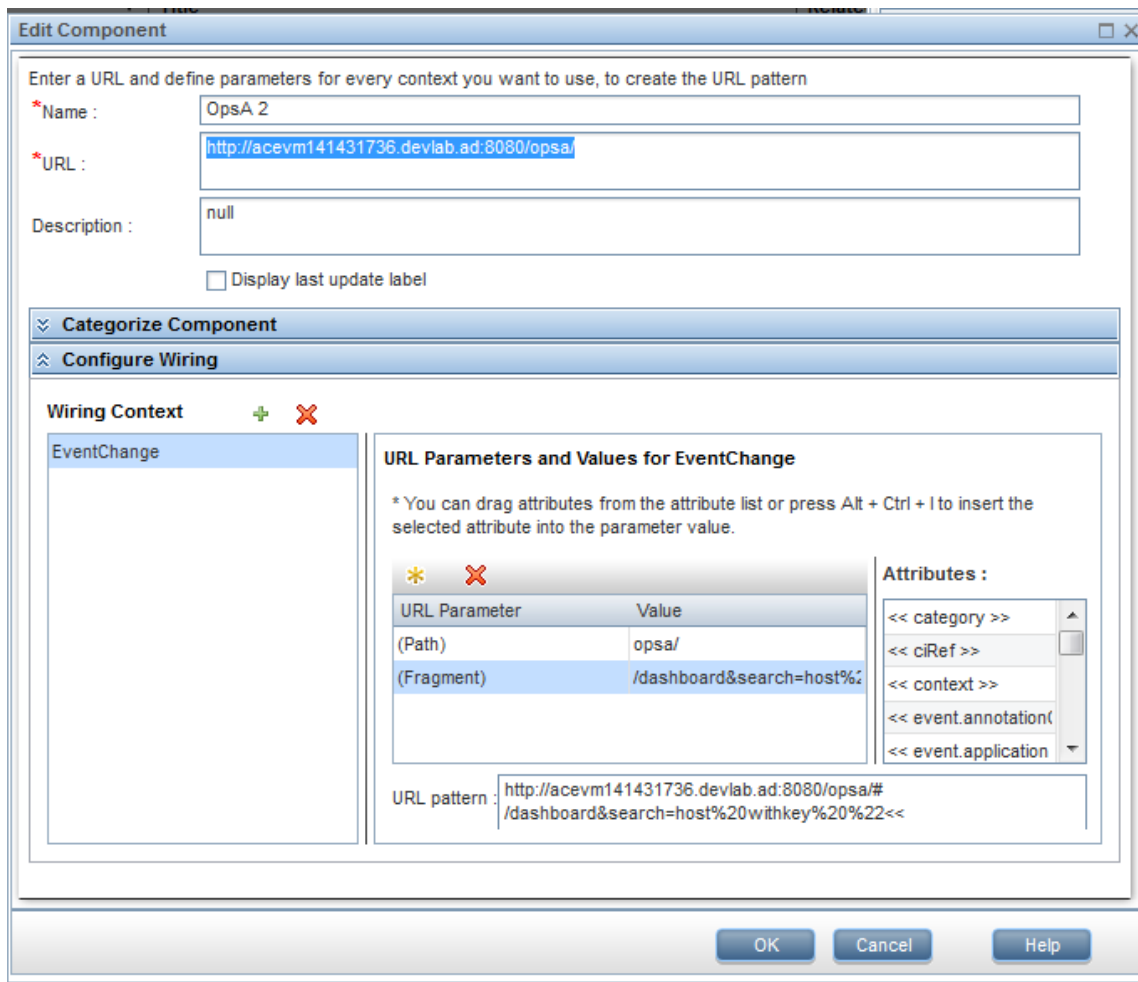
- a. Create a new page.
- b. Add a new component, specify a name and the Operations Analytics URL.

Example: `http://<OpsaURL>:8080/opsa/`

- c. In the **Configure Wiring** section, specify the **EventChange** context and add a Path and Fragment parameter as seen below. Specify the value as desired.

For Example: `/dashboard&search=host%20withkey%20%22<< event.node.dnsName >>`

For additional example URLs, see ["URL Syntax " on page 15](#)



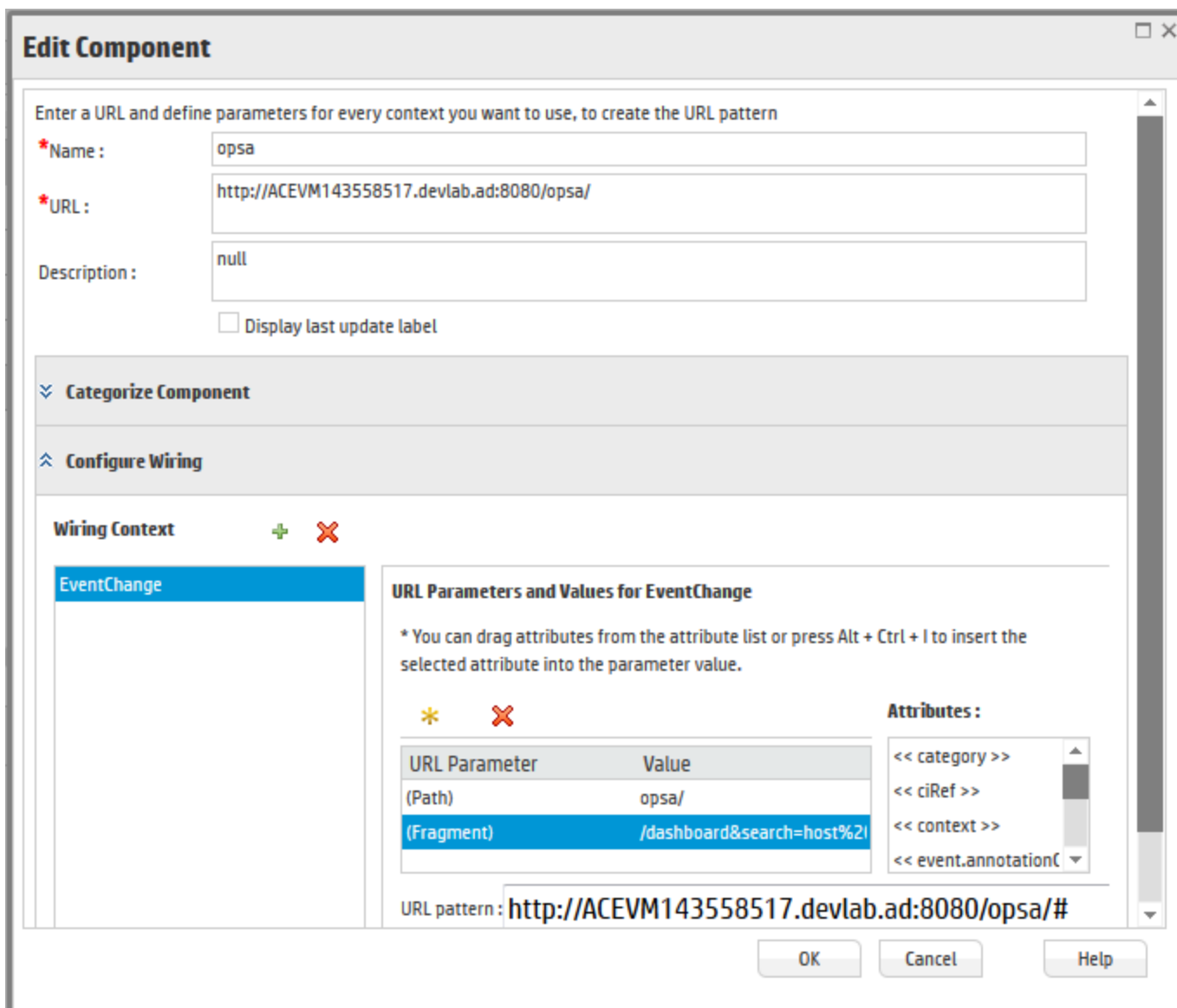
- 10. After you have saved your component you can add it to any page that contains an event browser.

To Configure an OMi Dashboard Integration

This procedure explains how to configure a dashboard that displays the event browser and the Operations Analytics user interface.

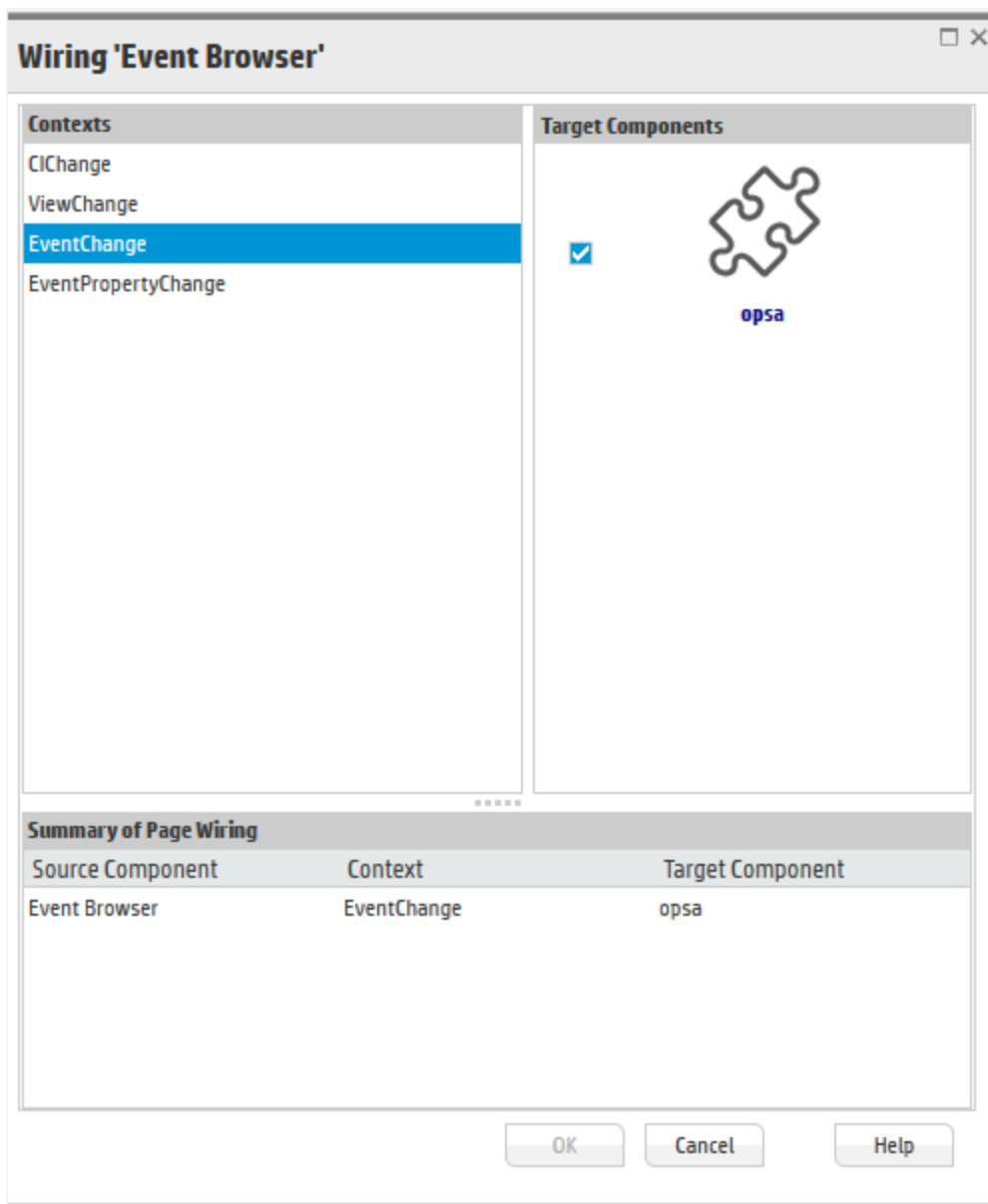
1. Prerequisite: You must configure LWSSO on the Operations Analytics environment. This procedure can be found in the HPE Operations Analytics Configuration Guide.
2. In OMi, create a new component with the name **opsa** and the url **opsa server FQDN:8080/opsa**.

Use the Configure Wiring section to append the URL you want to use when opening Operations Analytics. For example, the fragment **/dashboard&search=host%20withkey%20%22<<relatedCi.name >>%22** opens a dashboard focusing on a CI.



3. Create a new page, and add the component you just created, as well as the Event Browser component to the page.

4. Verify the wiring configuration for the page are as follows:



5. Save the page.
6. In Operations Analytics, locate **/opt/HP/opsa/jboss/standalone/deployments/opsa-ui-web.war/WEB-INF/web.xml**.

Modify the following section from:

```
<init-param>  
<param-name>X-Frame-Options</param-name>  
<param-value>SAMEORIGIN</param-value>  
</init-param>
```

to:

```
<init-param>  
<param-name>X-Frame-Options</param-name>  
<param-value>Allow-From http://<OMi URL>/opr-web</param-value>
```

7. Restart Operations Analytics by running the command **opsa-server restart**.
8. We recommend adding a mapping of the Operations Analytics IP and the Operations Analytics FQDN in the windows host file in every client machine that will be used to access Operations Analytics.
9. Delete the cookies of all browsers used to access OMi.
10. Add the FQDN of the Operations Analytics environment to the list of trusted hosts in OMi from the **Authentication Management** section.

Chapter 5: Sending Events to HPE Operations Manager i (OMi)

You can configure an OMi Agent to retrieve alerts from Operations Analytics and create events from the alerts. This allows you to use the power of Operations Analytics to identify events using analytic tools while benefiting from OMi's advanced event management capabilities.

Note: Details about procedures below that are performed in OMi and Operations Agent can be found in the OMi and Operations Agent documentation.

1. Install an Operations Agent on the Operations Analytics server. This is typically handled by the OMi administrator.
2. Connect the Operations Agent to your OMi server.
3. Import the content pack from the following location on the Operations Analytics server to OMi:

- **For OMi 9.2x**

- `/opt/HP/opsa/omi_content_pack/OMi_092x_Content_Pack-OPSA.zip`

- **For OMi 10**

- `/opt/HP/opsa/omi_content_pack/OMi_Content_Pack-OPSA.zip`

This makes the management templates and aspect area available in the OMi user interface.

4. Assign and Deploy the management templates and aspects to the node where the Operations Agent was installed earlier in this step.

All Operations Analytics alerts will now be retrieved by OMi.

Chapter 6: URL Syntax

The following section contains syntax examples that can be used when creating URLs to Operations Analytics servers.

Note: These examples are for illustration purposes to help you construct your own URLs. They have not been tested with every possible integration.

Time	Symbol	Examples
Hours	h	1h, 2h, 3h
Days	d	1d, 2d, 3d
Weeks	w	1w, 2w, 3w
Months	m	1m, 2m, 3m

Using start and end to specify the time window



URL examples:

URL	Use Case
Display main dashboard focused on the relevant event focused on the last 1 hour.	<code>http://<opsa_server>:8080/opsa/#!/dashboard&search=withkey "\${event.node.dnsName}"&start=1h</code>

URL	Use Case
Display main dashboard focused on the relevant event focused on 8 hours before and after the current time.	<code>http://<opsa_server>:8080/opsa/#/dashboard&search=withkey "\${event.node.dnsName}"&start= \${event.timeCreated.seconds}&end=~8h~</code>
Display main dashboard focused on the relevant event focused on the last two days.	<code>http://<opsa_server>:8080/opsa/#/dashboard&search=withkey "\${event.node.dnsName}"&start= \${event.timeCreated.seconds}&end=~2d</code>
Display the OAEEnvironment dashboard, which displays a performance overview, focusing on the last hour.	<code>http://<opsa_server>:8080/opsa/#/dashboard&search=OAEEnvironmentOverview&start=1h RTSM</code>
Display the RTSM overview dashboard focusing on the last week.	<code>http://<opsa_server>:8080/opsa/#/dashboard&search=RTSMOverview&start=1w</code>
Display the main dashboard focused on more than one host.	<code>http://<opsa_server>:8080/opsa/#/dashboard&search= Multiple Hosts ("host1", "host2", "hostN") dashboard &start=1436088226634&end=1436091826634&selectedTimeRange=ONE_HOUR</code>

Send Documentation Feedback

If you have comments about this document, you can [contact the documentation team](#) by email. If an email client is configured on this system, click the link above and an email window opens with the following information in the subject line:

Feedback on HPE Operations Analytics - BSM and OMi Integration Guide (Operations Analytics 2.32)

Just add your feedback to the email and click send.

If no email client is available, copy the information above to a new message in a web mail client, and send your feedback to sw-doc@hpe.com.

We appreciate your feedback!