HP Project and Portfolio Management Center

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HP Application Portfolio Management Analyst's Guide

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Chapter 1: Getting Started

Introduction to HP Application Portfolio Management

HP Application Portfolio Management (HP APM) enables your organization to assess and prioritize its current application portfolio and determine which applications need to be modernized. Organizations use HP APM as the first step towards application transformation as they:

- Document the size of their application portfolio and the applications that support their business processes.
- Compare and analyze application information such as health, effectiveness, ownership, cost of ownership, business value, and risk.
- Identify improvement opportunities and modernize their application portfolio by making strategic
 decisions about the future of each application in the portfolio, including whether the applications
 should be kept, changed, or retired.

HP APM is a module of Project and Portfolio Management Center (PPM Center). It adds functionality to the standard PPM Center interface.

This guide is intended for HP APM analysts. It describes the tasks typically performed by analysts and provides instructions for performing the tasks—or it refers the reader to the documents that provide the necessary information.

Note: This guide describes the default interface for HP APM. Customizations made by the HP APM administrator to meet your organization's business needs and requirements are not documented in this guide.

HP APM Roles

The primary HP APM roles—user, analyst, and administrator—are described in this section.

Note: Besides being one of the HP APM roles, the term "user" is also used generically in this book to refer to HP APM users of any role.

• **User.** The most basic user of HP APM. Users perform tasks such as creating application entities, managing the applications they own, and responding to surveys and supplying information for applications when requested to do so by the analyst and other users (as a proxy). Authorized users

can view and edit some or all of the financial summary for an application entity or transformation proposal. For more information about the HP APM user role, see the HP Application Portfolio Management User's Guide.

- Analyst. The most active user of HP APM. The analyst performs many tasks, including collecting and analyzing data about the organization and its application portfolio. For more information about the role of the analyst, see "The Role of the Analyst" below.
- Administrator. The most advanced user of HP APM. The administrator has all the abilities of an
 analyst and user but is typically involved with supporting the analyst in achieving the analyst's
 goals. The administrator installs, sets up, and maintains HP APM, defines users, customizes fields
 and validations for entities, and can create customized entities, data sources, portlet definitions,
 workflows, validations, report types, and security groups. For more information about the HP APM
 administrator, see the HP Application Portfolio Management Administrator's Guide.

The Role of the Analyst

As an analyst, your goal is to collect and consolidate data about applications used by your organization and to turn it into information consumable by you and other users. You can conduct surveys, create entities, import and export entity data using the PPM Data Migrator for Microsoft Excel (Data Migrator), create portlet definitions, and analyze applications using application sets, portlets, reports, graphing, and entity groupings. You can also typically perform all the duties of a user.

You can view and edit all sections of entities that you create and entities for which you are the owner. You can also view information in the header, Business Environment, Technical Environment, and Usage & Scale sections of application entities. If you are assigned additional roles or permissions within HP APM, you are able to perform additional tasks.

If you are designated as a contact for an HP APM entity, you are able to perform additional tasks such as viewing or editing data in sections of an entity that are not typically available to an HP APM analyst. Contact roles—such as business owner, technical owner, ITO contact, and SME (subject matter expert)—are assigned in the Contacts section of an application entity. Other contact roles are assigned in the Summary or details sections of many of the entities. The respondent role is assigned when a user is requested to provide additional information for an entity.

Note: You might already be able to view or edit data in an entity if, for example, you created the entity.

For information about the contact roles that can be assigned in an application entity and descriptions of the additional functions they provide, see "Contacts" on page 105. For descriptions of other roles that can be assigned to an analyst in an entity, see "Entities" on page 101 and the HP Application Portfolio Management Administrator's Guide. If you are an application owner or a survey respondent, see the HP Application Portfolio Management User's Guide for information about responding to surveys and requests for additional information.

Guidelines for Building Your Application Portfolio

Your application portfolio consists of applications and their relationships to the business objectives and processes used by your organization.

Follow these guidelines to build an application portfolio:

- Learn about the relationships in—and collect basic information about—your organization and its business objectives and processes. This information assists you with understanding and determining the necessity and value of the applications in your application portfolio.
- Ask the HP APM administrator to create the users who are to serve as points of reference for the
 entities that you create. These users could be business owners, technical owners, IT contacts,
 budget or benefits managers, subject matter experts, reviewers, respondents, resources, and
 sponsors of an entity.
- 3. Start building the application portfolio inventory, including related entities such as the location and process entities.
- 4. If organization units and business objectives have not been provided for you, create them as necessary. You create business objectives and organization units in PPM Center.

Note: Before you can create and manage organization units and business objectives, the HP APM administrator must create a security group that allows you to do this and assign it to you. For more information, see the HP APM for PPM *Release Notes*. For instructions for creating and managing business objectives, see the *HP Program Management User's Guide*. For instructions for creating and managing organization units, see the *HP Resource Management User's Guide*.

- 5. Create workstreams to monitor the progress of your analysis.
- 6. Collect information about your applications, and then create application entities and add them to your application portfolio inventory.

Note: You can create entities one at a time or you can import multiple entities at one time into HP APM from a Microsoft Excel spreadsheet using the PPM Data Migrator for Microsoft Excel. For instructions, see "Using the PPM Data Migrator for Microsoft Excel" on page 20.

Information that you collect about applications includes system information, names used, versions, and contact information. It should also includes details about the business and technical environments, budget and resources, service and support, usage and scale, and relationships with processes, organizations, and other applications.

To fill gaps in your knowledge about an application, you can use the "Need More Info" workflow step to invite another user to access an application entity and update the information about it.

- 7. Determine the type of data you want to analyze (business-related, technical, or general) and send out surveys to application owners and users to have them rate the applications.
- 8. Create application sets and use shared or configurable portlets to represent the data in a meaningful manner.
- 9. Use dynamic graphing to graphically view application sets, applications, and process relationships and to develop application sets for analysis.
- 10. Generate reports to analyze the completeness of data and, when you are satisfied with the amount of data you have collected, start your analysis. Use portlets to analyze the most important qualities about each application or application set and share this data with other users.
- 11. Create an improvement transformation proposal based on your findings.

HP APM Features and Components

The standard user interface for HP APM is a collection of specialized Web pages in PPM Center that offer you a customized view into HP APM. You use these Web pages to perform the tasks that you are responsible for as an analyst.

Note: If you have a pop-up blocker or download blocker active on your Web browser, you might have difficulties using the Web pages.

HP APM features available for analysts include the following:

- HP APM-specific entities. See "Managing HP APM Entities" on page 15 and "Entities" on page 101.
- HP APM reports. See "Reports" on page 76 and "Reports" on page 187.
- The PPM Data Migrator for Microsoft Excel (for importing, exporting, and updating entity data and for exporting and updating validation values in HP APM). See "Using the PPM Data Migrator for Microsoft Excel" on page 20.
- Dynamic graphing (for viewing graphical relationships between applications and between processes). See "Dynamic Graphing" on page 76.
- Surveys (for collecting rating information from application users) and other options for requesting additional information. See "Surveys and Additional Application Data Collection" on page 62.

HP APM components available for analysts include the following:

- HP APM-specific pages that the analyst accesses from the following PPM Center menu bar options:
 - Open > Application Portfolio. Used to access the options the analyst selects to create
 entities of all types, search for and open entities, access saved searches, analyze data from
 grouped entities and with dynamic graphing, view reports, and download the add-in for the PPM
 Data Migrator for Microsoft Excel.
 - Create > Application. A shortcut to the page the analyst uses to create application entities.
 - Create > Survey Request. A shortcut to the page the analyst uses to create survey registrations.
 - **Create > Transformation Proposal.** A shortcut to the page the analyst uses to create transformation proposal entities.
 - Search > Entities. A shortcut to the page the analyst uses to search for and open HP APM entities of all types.

For more information, see "Managing Entities" on page 16; "Using the PPM Data Migrator for Microsoft Excel" on page 20; and "Application Analysis" on page 73.

- PPM Dashboard pages and portlets that contain information of value to an analyst. For information about PPM Dashboard pages and portlets, see "PPM Dashboard and PPM Dashboard Pages" on page 73, "Portlets" on page 75, and "PPM Dashboard Pages and Portlets" on page 160.
- The Browse Entities page—the preliminary page in the Request Browser from which you can group entities for data analysis. For more information, see "Request Browser" on page 96.

For descriptions of the components and features of the standard PPM Center interface, and instructions for changing your password, resetting the display of warning messages, and configuring other interface settings, see the PPM Center *Getting Started* guide.

Guidelines for Using the PPM Center Documentation

This guide describes features and components of HP APM available to you as an HP APM analyst. It also provides instructions about how to perform tasks specific to HP APM.

Note the following:

- This guide documents the default user interface for HP APM. Your HP APM administrator might have customized the HP APM fields, pages and entities to best suit your business needs and requirements. These customizations are not documented in this guide.
- Entities are a type of PPM Center request. They are unique to HP APM.
- On some PPM Center and HP APM pages, you will see the HP APM entities divided into three categories: Entities, Activities, and Grouping. In this guide, the term entity applies to all types of HP

APM entities, regardless of the categories in which they are located. For example, if the instructions tell you to select an entity from the Entities area of the Search Entities page, you might instead find the entity in the Activities or Grouping area.

Throughout this guide, you are referred to PPM Center documents for instructions or additional information because many HP APM tasks can also be performed from PPM Center menu bar options. Because of this, you might need to make minor adjustments to the instructions given in the PPM Center documents.

Be aware of the following:

- Since an entity is a type of PPM Center request, in many cases you will need to use the *PPM Center request* instructions in the PPM Center documents for performing the necessary task. For example, to perform a basic *entity* search, you follow the instructions for performing a basic *request* search. These terms are usually interchangeable.
- When the instructions tell you to select an option from the Open menu on the menu bar, you might need to substitute Application Portfolio for the name of the submenu. For example, in the PPM Center Getting Started guide, the instructions for running a saved search tell you to select Open > Demand Management > Saved Searches > Manage Saved Searches. To run a saved search in HP APM, you must substitute Application Portfolio for Demand Management—this means you select Open > Application Portfolio > Saved Searches > Manage Saved Searches to run a saved search.
- When you are following the PPM Center instructions, an additional page might open. For example, when you create an application entity from the Open > Application Portfolio > Create Entities option, the Create New Entity page opens. This is an HP APM—specific page, so it is not mentioned in the PPM Center instructions. In this case, you should select Application from the Entities area and then continue following the instructions as written in the PPM Center document. If the Create New Request page opens, select Application from the Request Type drop-down list, and then continue following the instructions as written.
- You do not have access to all the menus and options described in the referenced PPM Center documents. Your view of PPM Center and HP APM is determined by the implementation of your PPM Center, your HP APM role, and the level of access to features and data you are given by the HP APM administrator.

Getting Help Online

You can easily access descriptions of many of the fields you see in HP APM portlets and Web pages. When a help icon is displayed on a portlet or Web page, click the icon to display descriptions of the fields in the area in which the icon is located.

Related Documents

The following HP APM and PPM Center documents are referenced in this guide. They provide additional information related to tasks performed by HP APM analysts:

- Creating Portlets and Modules
- · Getting Started
- · Application Portfolio Management Analyst's Guide
- Application Portfolio Management User's Guide
- · HP Demand Management User's Guide
- HP Program Management User's Guide
- HP Resource Management User's Guide
- Reports Guide and Reference

For important information about this release of HP APM, see the HP APM for PPM *Release Notes*.

These documents are available from the HP Software Product Manuals Web site at h20230.www2.hp.com/selfsolve/manuals.

Chapter 2: Managing HP APM Entities

Entity Overview

In HP Application Portfolio Management (HP APM), entities are the means by which actions and processes are initiated and tracked. They are the building blocks of your application portfolio. Entities contain all of the information necessary to take a series of actions and move through a workflow. They are used to identify objects and designate the relationships and interactions within an organization. An HP APM entity is a type of Project and Portfolio Management Center (PPM Center) request.

The following entities can be part of the application portfolio:

- **Application.** A software application or program that implements a business process or function in your organization. An application entity can be made up of one or more distinct services.
- Application set. A user-defined grouping of application entities.
- Location. A distinct and unambiguous location of an application, server, or a grouping of locations.
- Process. A standard set of actions or operations performed by the business.
- **Roadmap.** A roadmap for an individual application/service, or a group of applications/services, including lifecycle statuses (roadmap phases) and milestones.
- Server. A physical or virtual machine.
- Survey registration. A query sent to users that requests data about applications to help with their analysis.
- Transformation proposal. A consolidation of information used to make a decision about a proposed project.
- Workstream. A collection of resources working towards a common goal on a portion of the application or process portfolio.

Additionally, business objectives and organization units, created in PPM Center, can be part of your application portfolio.

- **Business objective.** The result that the organization intends to achieve. For more information about business objectives, see the *HP Program Management User's Guide*.
- **Organization unit.** A business unit, department, or group within an organization. For more information about organization units, see the *HP Resource Management User's Guide*.

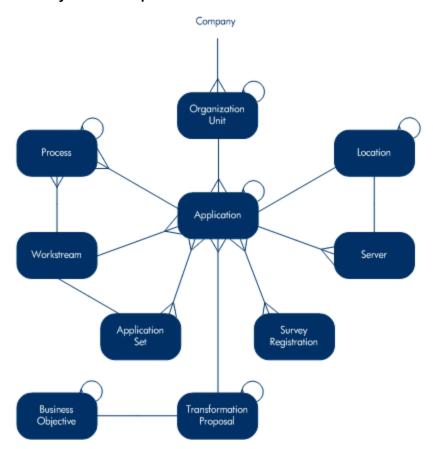
For detailed descriptions of each of the HP APM entities, see "Entities" on page 101.

To interact with an entity, you use the associated detail page. The detail page for an entity contains all of the information about the entity. Also, the detail page is where decisions and actions that pertain to the entity are executed. For information about the application entity detail page, see the *HP Application Portfolio Management User's Guide*. The entity detail page for an application entity is similar to the detail page for a request. For descriptions of the main sections on a request detail page, see the *HP Demand Management User's Guide*.

Entity Relationships

"Figure 2-1. Entity Relationships" below shows the relationships that can exist between entities in an application portfolio.

Figure 2-1. Entity Relationships



Managing Entities

Because an HP APM entity is a type of PPM Center request, managing an entity is typically the same as managing a request.

For instructions for viewing, processing, and managing entities, see the *HP Demand Management User's Guide*. For additional information about entities, see the *HP Application Portfolio Management*

User's Guide. For guidelines for using the instructions in the PPM Center documentation for performing HP APM tasks, see "Guidelines for Using the PPM Center Documentation" on page 12.

Creating Entities

The first step in building your application portfolio is to create the entities that make up the portfolio. While it is possible to build your portfolio from just applications, designating relationships with organization units, processes, workstreams, locations, and servers provides you with the ability to conduct a more detailed and quantifiable analysis of an application or application set.

You can create a new entity from one of the following locations:

- The Open > Application Portfolio > Create Entities option on the menu bar
- The Create > <Application, Survey Request, or Transformation Proposal> option on the menu bar (a shortcut for creating three of the entity types)
- The References section on an entity detail page
- The Make a Copy button on an entity detail page

You can also create entities by importing them into HP APM with the PPM Data Migrator for Microsoft Excel (Data Migrator). For instructions, see "Using the PPM Data Migrator for Microsoft Excel" on page 20.

When you create an entity, the entity is automatically assigned a unique number and tracked from start to finish. This ensures completion and accountability for all steps within the entity's workflow.

For instructions for creating an entity, see the instructions for creating a request in the *HP Demand Management User's Guide*.

For descriptions of the fields in the HP APM entities, see "Entities" on page 101 of this guide and the online help available from each section of the entity page.

Opening Entities

You can open an entity from the result of a search, from a portlet, from an email notification, or from the search box. For more information, see and the *HP Demand Management User's Guide.*

Searching Entities

There are several ways you can search for entities. You can perform a basic entity search or use the query builder to create a custom search query that uses comparison and logical operators. You can use the results of a search you perform with the Request Browser to create entity groups that you can use to display and track information.

Tip: You can also perform a simple search using the search box that is located in the upper-right

corner of the PPM Center interface. Use the search box to quickly access an entity (by typing the entity—or request—number) or a menu item (by typing any part of the menu name to display a list of corresponding menu items).

After you have performed a search, you can save it and run it again.

For instructions for searching entities and using the query builder, see the PPM Center *Getting Started* guide and the *HP Demand Management User's Guide*. For information about using a Request Browser search to create entity groups, see "Request Browser" on page 96 and the *HP Demand Management User's Guide*.

Tip: You can also search for entities from the **Search > Entities** and **Open > Application Portfolio > Search Entities** options on the menu bar.

Editing Entities

You can make changes to an entity if you created the entity or if you are assigned a role that allows you to do so.

There are several ways you can update an entity. You can perform a basic edit, perform a quick edit to edit multiple entities at the same time, or perform a mass update to make the same edit to multiple entities at the same time. For instructions, see the *HP Demand Management User's Guide*.

If two users edit the same entity at the same time and both click **Save**, HP APM attempts to save the changes made by both users. If a change cannot be saved, HP APM advises the user who made the change to make the change again, and then attempt to save it again. For examples that demonstrate how HP APM handles simultaneous users, see the *HP Application Portfolio Management User's Guide*.

Monitoring Entities

Use the following HP APM features to monitor and locate entities that require attention:

- Searches. If you want to locate a specific entity or group of entities (based on filters you define), you can search for the entity. For information about searches, see "Searching Entities" on the previous page and the HP Demand Management User's Guide.
- Reports. HP APM provides a predefined set of reports that allow you to view the current status of your data. For information about reports, see "Reports" on page 76, "Reports" on page 187, and PPM Center Getting Started guide.
- Portlets. Portlets provide you with real-time views into your HP APM—based activities. They
 provide information such as a list of workstreams assigned to you or the health of applications by
 business owner. You can customize portlets to track and assess the data that is meaningful to you.
 For information about portlets, see "Portlets" on page 75, "PPM Dashboard Pages and Portlets" on

page 160, and the Creating Portlets and Modules guide.

Notifications. Some workflow steps are configured to send email notifications upon activation. As
an entity proceeds through its workflow steps, email notifications might be sent to notify you of
pending actions. The notification might include a link that you can click to open the referenced
entity. For more information, see the HP Demand Management User's Guide.

Chapter 3: Using the PPM Data Migrator for Microsoft Excel

Data Migrator Overview

If you have large amounts of entity data to enter in HP Application Portfolio Management (HP APM), you can import it using the PPM Data Migrator for Microsoft Excel (Data Migrator). The Data Migrator is an add-in for Microsoft Excel that HP provides with HP APM. HP also provides a spreadsheet template for the Data Migrator that you can download.

The HP APM analyst and administrator can use the Data Migrator to create new entities in HP APM, update entity data and validation values in HP APM, and download entity and validation data from HP APM to a Microsoft Excel spreadsheet as described in the following topics:

- · "Before You Start" on the next page
- "Installing the Data Migrator" on the next page
- "Configuring the Connection to a PPM Server" on page 22
- "Creating an Import Spreadsheet" on page 24
- "Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)" on page 29
- "Creating, Updating, and Downloading Entity Data" on page 31
- "Cancelling a Download, Create, or Update Process" on page 46
- "Creating New Entities with the Migrate Option" on page 47
- "Viewing the Detail Log and Fixing Logged Errors" on page 48
- "Downloading and Updating Validation Values" on page 50
- "Connecting to the PPM Center Server using the Data Migrator Wizard (for Validation-Related Tasks)" on page 50
- "Viewing, Exporting, and Importing Mapping Relationships" on page 57
- "Reinstalling the Data Migrator" on page 60

Before You Start

Before you start using the Data Migrator, be aware of the following:

- You must install the Data Migrator add-in and other components required for its use. See the HP
 APM for PPM Release Notes for the latest software requirements. For the installation instructions,
 see "Installing the Data Migrator" below.
- You should make note of the full URL for the PPM Server on which you will use the Data Migrator to
 create new entities and to update and download entity and validation data. The URL must start with
 http:// or https://. You will need this information when you configure the connection to the
 PPM Server. (For instructions, see "Configuring the Connection to a PPM Server" on the next
 page.)
- If you will be creating or updating entities or updating validation values, you must prepare the
 spreadsheets that contain the data you want to import. You can add data to an entity-specific or
 validation-specific spreadsheet template that you download from the Data Migrator or use an
 existing spreadsheet. See "Creating an Import Spreadsheet" on page 24.
- If you will be creating new entities, make sure all of the data used by the entities has been first
 created in Project and Portfolio Management Center (PPM Center). For example, all users listed as
 contacts in application entities must be created before the application entities can be created.

Installing the Data Migrator

You install the Data Migrator from PPM Center. If the required software for the Data Migrator is not already installed on the computer you are using, the software is installed automatically when you start the installation. For a list of the software requirements, see the client-side requirements in the HP APM for PPM *Release Notes*.

Note: Depending on the software that is installed, you might be asked to restart your computer during the installation process.

To install the Data Migrator:

- Connect to PPM Center as an analyst or administrator.
- From the menu bar, select Open > Application Portfolio > Download Data Migrator Add-In.

The installation begins.

Note: If the Microsoft Office Customization Installer dialog box displays the message Publisher cannot be verified during the installation of the Data Migrator add-in, ignore

the message and click Install.

- 3. Follow the prompts in the dialog boxes that open to complete the installation.
- 4. If you are asked to reboot your computer, click Yes to restart it now.

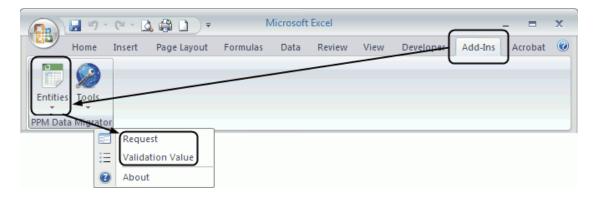
The installation continues automatically after you restart your computer.

Configuring the Connection to a PPM Server

Follow the instructions in this section to configure the connection to the PPM Server on which you will use the Data Migrator to create new entities and to update and download entity and validation data.

To configure the connection to a PPM Server:

- 1. Start Microsoft Excel.
- On the Add-Ins tab, select Entities > Request or Entities > Validation Value from the PPM
 Data Migrator group.



The Data Migrator wizard opens.

- From the Select Server drop-down list, select [New Connection] if it is not already selected.
- 4. Click Connect to create a new connection.

The Logon to PPM Server dialog box opens.

5. Complete the fields in the **Logon to PPM Server** dialog box.

Field	Description
Server URL	Type the full URL for the PPM Server. The URL must start with http://or https://.
User Name	Type your PPM Center logon name.
Password	Type your PPM Center password.
Save the Connection	Select this checkbox to save this information so you do not need to enter it again.
	If you do not save the connection, you will need to configure the PPM Server every time you want to access it.
Name	Type a name that describes the PPM Server you are configuring. This is the name that is displayed in the Select Server drop-down list.

6. Click Logon.

You are connected to the PPM Server.

 If you chose to save the connection, the name you assigned to the PPM Server is displayed in the Select Server drop-down list.

Note: Up to ten of the most recent connections to the PPM Server are saved and appear in the Select Server drop-down list. After ten connections, the oldest connection is deleted when a new connection is made.

If you did not choose to save the connection, the name of the PPM Server is not displayed in the Select Server drop-down list. You will need to configure the PPM Server the next time you want to access it.

7. Do one of the following:

- If you are creating entities or updating entity data and you have not prepared the spreadsheet, go to "Creating an Import Spreadsheet" on the next page.
- If you are creating entities or updating entity data and you have prepared the spreadsheet containing the entity data, go to "Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)" on page 29.
- If you are downloading entity data from HP APM, go to "Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)" on page 29.
- If you are downloading or updating validation values, go to "Downloading and Updating Validation Values" on page 50.

Creating an Import Spreadsheet

You can use the Data Migrator to prepare a specially configured Microsoft Excel spreadsheet that you can use to create new entities or update entity data. Before importing new entities or updated entity data into HP APM with the Data Migrator, you must have prepared the special spreadsheet that contains the data you want to import.

The easiest way to prepare the import spreadsheet is to paste or type the entity data into a Microsoft Excel spreadsheet template that you download using the Data Migrator. For instructions, see "Creating an Import Spreadsheet from a Template" below.

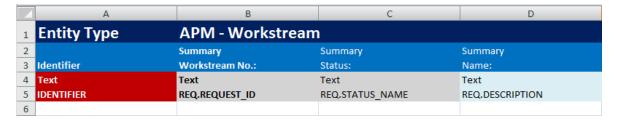
Alternatively, you can use an existing Microsoft Excel spreadsheet or you can create a new spreadsheet. For instructions, see "Creating Your Own Spreadsheet" on page 28.

Creating an Import Spreadsheet from a Template

When you download a spreadsheet template from the Data Migrator, the template includes all the necessary columns and rows for the type of entity you are creating. After you download the template, you manually type the entity data into the template or copy and paste the data into the template from another file. You then customize the template and import the data into HP APM with the Data Migrator.

"Figure 3-1. Default rows and first four columns of the workstream entity template" below shows the first four columns and the five default rows included in the spreadsheet template for a workstream entity.

Figure 3-1. Default rows and first four columns of the workstream entity template

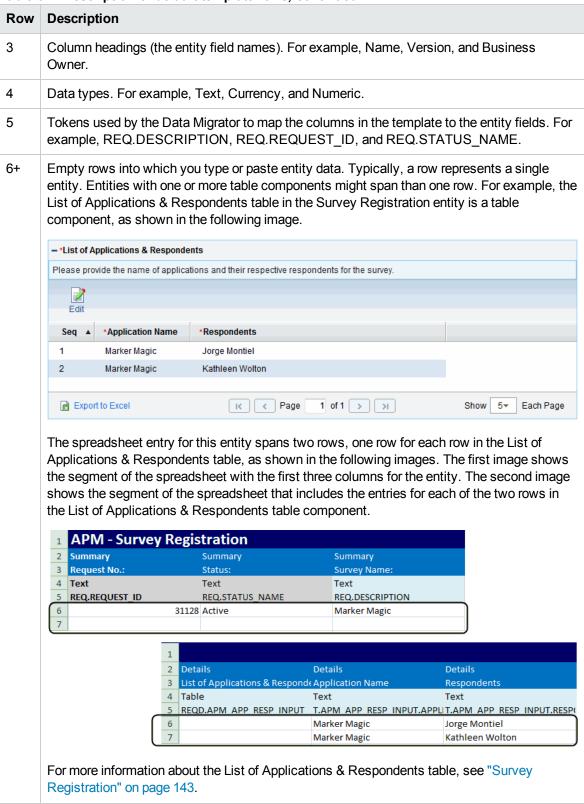


"Table 3-1. Description of default template rows" below describes the default rows included in an entity template. You can provide or update entity values for fields in which rows 4 and 5 are colored blue. Values found in the columns in which rows 4 and 5 are colored gray are read-only. You can only provide values in the first column (where rows 4 and 5 are colored red) when you are adding an entity or entities. This column is read-only when you download and update entities.

Table 3-1. Description of default template rows

Row	Description
1	Type of entity. For example, Application, Location, and Workstream.
2	Sections of the entity in which the entity fields are located. For example, Summary, Identity, and Contacts.

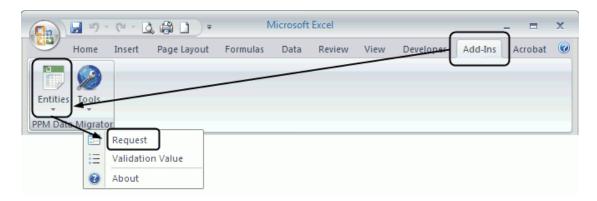
Table 3-1. Description of default template rows, continued



Creating the Spreadsheet Template

To create a spreadsheet template with the Data Migrator:

- 1. Start Microsoft Excel.
- 2. Open a blank spreadsheet.
- 3. On the Add-Ins tab, select Entities > Request from the PPM Data Migrator group.



- 4. From the Select Server drop-down list, select the name of the PPM Server to which you want to connect. If the drop-down list does not contain the PPM Server to which you want to connect or if the list is empty, see "Configuring the Connection to a PPM Server" on page 22.
- 5. Click Connect.

The Select Entity Type drop-down list becomes available.

6. From the **Select Entity Type** drop-down list, select the type of entity for which you want to create a template and click **Next**.

The Select an Action to Perform dialog box opens.

7. Click the Download Records icon.

The Download Options dialog box opens.

- 8. In the **Download Options** dialog box, select or clear the checkboxes as necessary so only the fields you want to include in the template are selected. To select all of the fields, click **Check All.**To clear the checkboxes for all of the fields, click **Uncheck All.**
- 9. If necessary, click **Advanced Options** to configure additional settings.

Note: Typically, you do not need to configure the Advanced Options settings when you create a spreadsheet template. For instructions for configuring the Advanced Options settings, see

step 12.

10. Click **Next** to create the template.

Caution: If you click Cancel while the template is being created, only some of the data might be downloaded. For more information, see "Cancelling a Download, Create, or Update Process" on page 46.

One of the following occurs:

- If there are no existing entities of the type for which you are creating the template, a message tells you there are no requests to download. A template containing only the default rows described in "Table 3-1. Description of default template rows" on page 24 is created.
- If there are existing entities of the type for which you are creating the template, several status messages are displayed. The final message says Downloading Requests... Done! and shows the number of downloaded entities. A template containing the default rows described in "Table 3-1. Description of default template rows" on page 24 is created. The template also contains one or more additional rows for each existing entity.
- 11. Click Finish to close the Data Migrator wizard
- 12. If the template is populated with data for existing entities and you want to use this spreadsheet as a template, remove data from all the rows except rows 1–5.
- 13. Save the template.
- 14. Go to "Preparing the Spreadsheet Template for Importing" below.

Preparing the Spreadsheet Template for Importing

After you create the template, you use it to prepare the spreadsheet that contains the entity data you want to import into HP APM with the Data Migrator.

To prepare a downloaded spreadsheet for importing:

- 1. Start Microsoft Excel.
- Open a spreadsheet template. (See "Creating the Spreadsheet Template" on the previous page.)
- 3. If necessary, customize the entity field names in row 3.
 - *Do not* make any changes to row 5. This row is used by the Data Migrator to map the spreadsheet columns to the fields in the entity.
- 4. Remove any columns you do not need.

Although the column containing the REQ.REQUEST_ID token is optional, consider leaving it in your spreadsheet. This column is populated by the Data Migrator with a unique request number for each entity it creates when you import new entities. Request numbers are required if you update the entity data later using the Data Migrator.

Note: The column containing the REQ.REQUEST_ID token must be left blank when you are importing entities.

5. Copy and paste the entity data into the spreadsheet from another file or manually type it into the spreadsheet.

Note: Your spreadsheet must include a column that contains a unique identifier for each entity you are importing. You can enter the identifier in the Identifier column (column A) in the template or, when you configure the Data Migrator to import the data from the spreadsheet, you can designate a column with a different title as the column that contains the unique ID or name. For example, if all of your entities have unique names, you can designate the column that contains the entity names as the identifier column.

- 6. Save the spreadsheet.
- 7. To create entities using this spreadsheet, go to "Creating New Entities" on page 32.

Creating Your Own Spreadsheet

You can create your own spreadsheet in Microsoft Excel or use an existing spreadsheet that you have modified to meet the Data Migrator requirements. Create the spreadsheet following these guidelines. The spreadsheet must contain:

- Information about a single entity type. For example, if you want to import application, location, and workstream entities, you must create three spreadsheets, one for each entity type.
- A row of column headings. Although this can be any row, it should be a row that contains a brief
 description or name for the type of information the column contains. You will map the column
 headings to entity fields later.
- Your spreadsheet must include a column that contains a unique identifier for each entity you are
 importing. When you configure the Data Migrator to import the data from the spreadsheet, you
 designate a column as the column that contains the unique ID or name for each entity. For example,
 if all of your entities have unique names, you can designate the column that contains the entity
 names as the identifier column.
- (Optional) When the Data Migrator creates an entity, it assigns the entity a unique PPM Center request number. If you include a column that contains only a column heading, the Data Migrator

enters the request number in this column when the entity is created—this column must be blank except for the column heading. Make note of the name you give this column. You will map it later to the field identified in "Table 3-2. Field, by entity type, to be mapped to the request number column" on page 35.

Note: Although the request number column is optional, consider including it in your spreadsheet. The request numbers that the Data Migrator adds to this column are required if you update the entities later using the Data Migrator.

(Optional) A row that contains tokens that correspond to each of the column headings. (Tokens are
unique identifiers assigned by PPM Center to each of the fields in an HP APM entity.) If you include
a row of PPM Center tokens in your spreadsheet, the Data Migrator automatically maps the
spreadsheet columns that have tokens to the fields in the HP APM entity during the mapping
process. If you create your spreadsheet using a template that you download from the Data Migrator,
the token row is populated for you. (For instructions, see "Creating an Import Spreadsheet from a
Template" on page 24.)

Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)

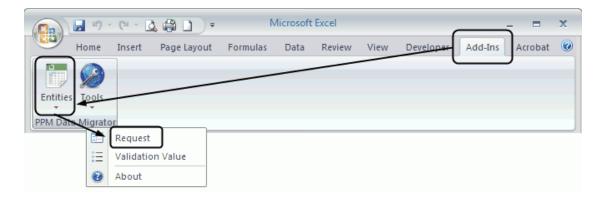
You select the options you use to create new entities, update existing entities, and download entity data from the Select an Action to Perform dialog box. This dialog box opens after you connect to the PPM Server using the Data Migrator wizard.

To open the Data Migrator wizard, connect to the PPM Server, and access the Select an Action to Perform dialog box for entity-related tasks:

- 1. In Microsoft Excel, do one of the following:
 - If you are creating or updating entity data, open the spreadsheet containing the entity data. (For
 instructions for creating the spreadsheet, see "Creating an Import Spreadsheet" on page 24.)

Caution: If the spreadsheet you are using to create entities contains entities that already have request numbers assigned to them, the entities with request numbers are skipped. (See "Table 3-2. Field, by entity type, to be mapped to the request number column" on page 35.) If the spreadsheet contains identifiers that match identifiers used for existing entities in the PPM Server, the entities are skipped.

- If you are downloading data, open a blank spreadsheet or the spreadsheet you prepared for the download. (For instructions, see "Downloading Entity Data to a Spreadsheet" on page 42.)
- On the Add-Ins tab, select Entities > Request from the PPM Data Migrator group.



The Data Migrator wizard opens.

 From the Select Server drop-down list, select the name of the PPM Server on which you want to create, update, or download entity data, and click Connect. If the list is empty, see "Configuring the Connection to a PPM Server" on page 22.

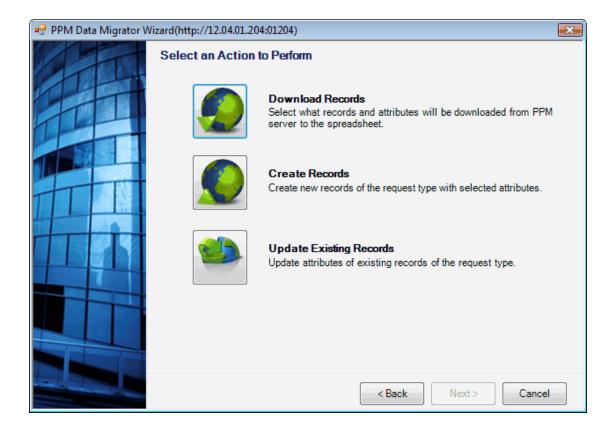
Note: The **Select Server** drop-down list contains the names of the last ten PPM Servers that you accessed and for which you saved the connection information.

When you are connected to the PPM Server, the message Get request type list... Done is displayed at the bottom of the dialog box, and the Select Entity Type drop-down list becomes available.

4. From the **Select Entity Type** drop-down list, select the type of entity you want to create, update, or download, and click **Next.**

Tip: In this list, HP APM entity names start with APM.

The Select an Action to Perform dialog box opens.



Note: Users with additional access privileges also see the **Migrate Records** option. For information about using the Migrate Records option, see "Creating New Entities with the Migrate Option" on page 47.

- 5. For instructions for performing the tasks you can perform from the options in this dialog box, see one of the following sections:
 - "Creating New Entities" on the next page (the Create Records option)
 - "Updating Entity Data" on page 38 (the Update Existing Records option)
 - "Downloading Entity Data to a Spreadsheet" on page 42 (the Download Records option)
 - "Creating New Entities with the Migrate Option" on page 47 (the Migrate Records option available only to users with additional access privileges)

Creating, Updating, and Downloading Entity Data

You can create, update, and download entity data using the Data Migrator. This section contains the steps you need to follow to perform these tasks.

Caution: When you are creating entities, import the different entity types in the order of their dependencies. That is, if entity type A has a dependency on entity type B, import entity type B first. For example, server entities might have dependencies on location entities. Therefore, import location entities before importing server entities.

The recommended order for importing the different entity types is: location, server, process, application, application set, transformation proposal, workstream, and survey registration.

You cannot use the Data Migrator to delete entity data that you import into HP APM using the Data Migrator.

Creating New Entities

To create new entities:

- 1. Access the Select an Action to Perform dialog box. For instructions, see "Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)" on page 29.
- 2. Click the **Create Records** icon to create entities of the type you selected when you connected to the PPM Server.

The Map Attributes to Columns dialog box opens.

Note: In this context, attributes are the entity fields.

- 3. Do one of the following:
 - If you are working with a spreadsheet that was created from a Data Migrator template, review the preconfigured entries in the Map Attributes to Columns dialog box. If you need to make changes, go to the next step. If the default settings are correct, go to step 10.
 - If you are working with a spreadsheet that you created, go to the next step.
- 4. To the right of the Column Header Row field, click the selection icon (12).

The Select a Row dialog box opens.

5. In the spreadsheet, click a cell in the row that contains the column headings.

The identifier for the cell you clicked is entered in the **Please select the row for field headers** field in the Select a Row dialog box.

6. Click OK.

The Select a Row dialog box closes, and the number of the selected row is displayed in the Column Header Row field in the Map Attributes to Columns dialog box. The headings from the row

you selected—with the letter identifying the column they are in as the prefix—are added to the options available in the **Unique record identifier** drop-down list. The headings are also displayed in the **Spreadsheet** list.

- 7. If the spreadsheet contains a row of tokens, do the following:
 - a. Select the (Optional) Token Row checkbox.
 - b. To the right of the **(Optional) Token Row** field, click the selection icon ().

The Select a Row dialog box opens.

c. In the spreadsheet, click a cell in the row that contains the tokens.

The identifier for the cell you clicked is entered in the **Please select the row for field tokens** field in the Select a Row dialog box.

d. Click OK.

The Select a Row dialog box closes, and the number of the selected row is displayed in the (Optional) Token Row field. The Data Migrator automatically attempts to map the spreadsheet columns to the fields in the Entity Type list. Successfully mapped columns and fields are displayed in blue text.

"Figure 3-2. Map Attributes to Columns dialog box after the Token Row is selected" on the next page shows the Map Attributes to Columns dialog box after the token row is selected.

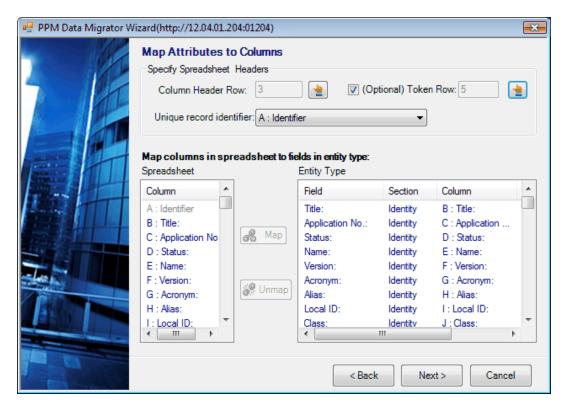


Figure 3-2. Map Attributes to Columns dialog box after the Token Row is selected

- 8. From the **Unique record identifier** drop-down list, select the heading of the column that contains a unique identifier for each entity listed in the spreadsheet. For example, select the column that contains a unique identification number or name for each entity.
- 9. Manually map any unmapped columns in the **Spreadsheet** list to the fields in the **Entity Type** list following the guidelines and instructions in this step. The list of fields is displayed in the same order—and in the same sections—as the fields appear in the entity. For descriptions of entity fields in the sections and order in which they appear, see "Entities" on page 101.

Note the following:

- The color of a column in the Spreadsheet list determines if it has been mapped. Mapped columns are displayed in blue text. Unmapped columns are displayed in gray text.
- To see additional information about a field such as its data type and token, scroll to the right in the Entity Type list. If necessary, you can expand a column by dragging the column divider to the right.
- Not all columns need to be mapped. Unmapped columns are ignored.
- To view a mapped relationship, click a blue column heading or field to highlight its corresponding column or field.

(Optional) If you created an empty column for the request number, you must map it to the field listed in "Table 3-2. Field, by entity type, to be mapped to the request number column" below for the type of entity you are creating.

Note: A request number is the same as an entity number.

Table 3-2. Field, by entity type, to be mapped to the request number column

Entity Type	Field
Application	Application No.
Application Set	Set No.
Business Survey	Survey No.
General Survey	Survey No.
Location	Location No.
Process	Process No.
Server	Server No.
Survey Registration	Request No.
Technical Survey	Survey No.
Transformation Proposal	Proposal No.
Workstream	Workstream No.

To map the spreadsheet columns to entity fields:

- a. Click a column in the Spreadsheet list, and then click its corresponding field in the Entity
 Type list.
- b. Click Map.

The column name is added to the **Column** column in the **Entity Type** list and the mapped column and field are colored blue.

c. Repeat step a and step b until all the necessary columns are mapped.

10. Click Next.

The Create New Requests in PPM dialog box opens showing the mapped fields and their corresponding sections, tokens, and columns. The field containing the request number and fields designated as being read-only by gray column headings in the template spreadsheet are not included in this list.

- 11. Select or clear the checkboxes as necessary so only the fields for which you want to include values are selected. To clear all the selected checkboxes, click Uncheck All. To select the checkboxes for all the fields, click Check All.
- 12. Click **Advanced Options** to configure additional settings. To cancel any changes you make to the Advanced Options dialog box, click **Cancel**.
 - On the **General** tab, configure the following settings:
 - In the Coloring box, select the colors from the Highlight Success and Highlight Failed fields that the Data Migrator uses in the spreadsheet to show the status of the entities after the import is completed. To change a color, click the Color button and select a new color.
 To define custom colors, click Define Custom Colors in the Color dialog box.

By default, entities that are created successfully are highlighted in light green and entities that were not created are highlighted in light red.

In the Concurrency box, select the maximum number of concurrent threads—up to 20—from the Maximum Threads drop-down list. When you configure this field, consider the performance objectives for your environment. Setting this field to a higher number could improve throughput but might also put more of a load on your PPM Server. The default value is 5.

Note: The **Ignore attributes with empty values** setting in the **Pre-processing** box is ignored when you create entities.

 In the Post-processing box, select the Reload all attributes from server checkbox to allow the Data Migrator to update fields in the original spreadsheet when the fields have a new value after the entities are created.

Some of the field values in entities that are uploaded to the PPM Server could change because of rules that run on the PPM Server. When this occurs, the results of the rules are downloaded to the original spreadsheet if you selected the Reload all attributes from server checkbox. For example, an application entity that contains ratings is uploaded to the PPM Server. The PPM Server applies rules to the ratings and calculates a score. Because you selected the Reload all attributes from server checkbox, the scores are then downloaded to the spreadsheet.

Note: The column mapped to the request number is always updated, whether or not this checkbox is selected.

By default, the Reload all attributes from server checkbox is not selected.

• On the **Data** tab, define the delimiters for fields that can have more than one value. For

example, if you have more than one person listed as a subject matter expert (SME) and have separated the users names with commas, you would select the checkbox for **SMEs** and enter a comma (,) in the **Set Delimiter** field. The default delimiter is a semicolon (;).

- i. In the **Set Delimiter** field, type the delimiter.
- ii. Select the checkbox for each field in which this delimiter is used.
- iii. Click Apply.

The delimiter is displayed in the Delimiter column for each of the selected fields.

- iv. Clear the selected checkboxes and repeat step i through step iii to define delimiters for additional fields.
- On the **Dependencies** tab, specify one or more fields to be ignored during the first pass at creating entities. Do this when one or more fields in the entities you are creating require other entities or fields to be created before the fields can be populated successfully. When you select a field on this tab, it is ignored during the first pass. The entity is created but the value of this field is empty. After the first pass is complete, the Data Migrator automatically makes a second pass at populating the selected fields.

To configure the Dependencies tab:

- i. Select the **Enable multi-pass to handle attribute dependencies between records** checkbox to run two passes at importing the data.
- ii. Select the checkboxes for the fields that are to be left empty the first time the Data Migrator imports the spreadsheet.

Note: If you specify dependencies on this tab and later cancel the create process while the entities are being created, the second pass might not complete successfully. For more information, see "Cancelling a Download, Create, or Update Process" on page 46.

When you are finished, click **OK** to save your changes and close the Advanced Options dialog box.

13. Click Next.

Caution: If you click Cancel before the process is completed, only some of the entities might be created. For more information, see "Cancelling a Download, Create, or Update Process" on page 46.

The Data Migrator attempts to validate and create the selected entities. This could take several minutes. When the process is complete, a summary of the results of the import is displayed.

14. Review the summary information. Towards the top of the dialog box, <*N*> of <*N*> is displayed (where <*N*> represents the number of entities). This indicates the number of entities—out of the total number of entities in the spreadsheet—that were processed (successfully or not).

Statements such as the following could be included at the bottom of the dialog box.

- <N> requests pass pre-validation. <N> entities were validated.
- <N> requests do not pass pre-validation. <N> entities contained errors and were not validated. You will need to fix these errors before attempting to create the entities again.
- <N> requests successfully created. <N> entities were created successfully.
- <N> requests failed to create. <N> entities were not created.
- <N> requests have been skipped. <N> entities were skipped because the entities with the same identifier already existed in the PPM Server.
- 15. If the import was not successful, click **View Log** to view information about any errors that were reported. For instructions for saving the Detail Log and for using the information in the log file to fix the errors, see "Viewing the Detail Log and Fixing Logged Errors" on page 48.
- 16. When all of the entities are created successfully, click Finish.

The Data Migrator closes.

17. Save the spreadsheet.

Updating Entity Data

If you need to update entity data, you can use the Data Migrator to import the updates into HP APM from a spreadsheet.

You can prepare the spreadsheet with your updates in several ways:

- Modify the data in your original import spreadsheet.
- · Prepare a new spreadsheet.
- Download a spreadsheet populated with information about the entities, and make changes to the
 entity data as necessary. (For instructions for downloading entity data, see "Downloading Entity
 Data to a Spreadsheet" on page 42.)

Regardless of which type of spreadsheet you use, the spreadsheet must have at the very minimum, a header row, a row for each entity you are updating, and two columns. One column must contain the request number assigned by the Data Migrator to each of the entities for which you are making a change, and the second column—and additional columns, if necessary—must contain the updated values. The spreadsheet can also contain columns with data that does not need to be updated.

To update entity data:

- 1. Access the Select an Action to Perform dialog box. For instructions, see "Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)" on page 29.
- Click the **Update Existing Records** icon to update entities of the type you selected when you connected to the PPM Server.

The Map Attributes to Columns dialog box opens.

- 3. Do one of the following:
 - If you are working with a spreadsheet that was created from a Data Migrator template, review the preconfigured entries in this dialog box. If you need to make changes, go to the next step. If the default settings are correct, go to step 10.
 - If you are working with a spreadsheet that you created, go to step 4.
- 4. To the right of the **Column Header Row** field, click the selection icon ().

The Select a Row dialog box opens.

5. In the spreadsheet, click a cell in the row that contains the column headings.

The identifier for the cell you clicked is entered in the **Please select the row for field headers** field in the Select a Row dialog box.

6. Click OK.

The Select a Row dialog box closes, and the number of the selected row is displayed in the Column Header Row field. The headings from the row you selected—with the letter identifying the column they are in as the prefix—are added to the options available in the Unique record identifier drop-down list. The headings are also displayed in the Spreadsheet list.

- 7. If the spreadsheet contains a row of tokens, do the following:
 - a. Select the (Optional) Token Row checkbox.
 - b. To the right of the **(Optional) Token Row** field, click the selection icon (🖹).

The Select a Row dialog box opens.

c. In the spreadsheet, click a cell in the row that contains the tokens.

The identifier for the cell you clicked is entered in the **Please select the row for field tokens** field in the Select a Row dialog box.

d. Click OK.

The Select a Row dialog box closes, and the number of the selected row is displayed in the (Optional) Token Row field. The Data Migrator uses the tokens in this row to attempt to map

the fields in the Spreadsheet list to the fields in the Entity Type list. Successfully mapped columns and fields are displayed in blue text.

- 8. From the **Unique record identifier** drop-down list, select the column that contains the request numbers that were assigned to the entities by the Data Migrator when they were created.
- Manually map any unmapped columns in the Spreadsheet list to the fields in the Entity Type list.
 The list of fields is displayed in the same order—and in the same sections—as the fields appear in the entity. For descriptions of entity fields in the sections and order in which they appear, see "Entities" on page 101.

Note the following:

- You must map the column that contains the request number to the field listed in "Table 3-2. Field, by entity type, to be mapped to the request number column" on page 35 for the type of entity you are updating.
- You are only required to map the columns in which the values have changed.

For additional information about mapping columns to fields and instructions, see the notes and instructions in step 9.

10. Click Next.

The Update Requests in PPM dialog box opens showing the mapped fields and their corresponding sections, tokens, and columns. The field containing the request number and fields designated as being read-only by gray column headings in the template spreadsheet are not included in this list.

- Select or clear the checkboxes as necessary so only the fields you want to update are selected.
 To clear the selected checkboxes, click Uncheck All. To select the checkboxes for all the fields, click Check All. By default, all fields are selected.
- 12. Click **Advanced Options** to configure additional settings. To cancel any changes you make to the Advanced Options dialog box, click **Cancel**.
 - On the **General** tab, configure the following settings:
 - In the Coloring box, select the colors from the Highlight Success and Highlight Failed fields that the Data Migrator uses in the spreadsheet to show the status of the entities after the import is completed. To change a color, click the Color button and select a new color.
 To define custom colors, click Define Custom Colors in the Color dialog box.
 - By default, entities that are updated successfully are highlighted in light green and entities that were not updated are highlighted in light red.
 - In the Concurrency box, select the maximum number of concurrent threads—up to 20—from the Maximum Threads drop-down list. When you configure this field, consider the

performance objectives for your environment. Setting this field to a higher number could improve throughput but might also put more of a load on your PPM Server. The default value is 5.

- In the Pre-processing box, select the Ignore attributes with empty values checkbox to ignore fields in the spreadsheet that do not contain a value. For example, if a spreadsheet field is empty and the corresponding field in the entity you are updating contains a value, the empty field in the spreadsheet is ignored and the value of the field in the entity remains unchanged. By default, this checkbox is not selected.
- In the Post-processing box, select the Reload all attributes from server checkbox to allow the update Data Migrator to update fields in the original spreadsheet when the fields have a new value after the entities are updated.

Some of the field values in entities that are uploaded to the PPM Server could change because of rules that run on the PPM Server. When this occurs, the results of the rules are downloaded to the original spreadsheet if you selected the **Reload all attributes from server** checkbox. For example, updates to an application entity that contains ratings are uploaded to the PPM Server. The PPM Server applies rules to the ratings and calculates a score. Because you selected the **Reload all attributes from server** checkbox, the scores are then downloaded to the spreadsheet.

By default, this checkbox is not selected.

- On the **Data** tab, define the delimiters for fields that have more than one value. The default delimiter is a semicolon (;).
 - i. In the **Set Delimiter** field, type the delimiter.
 - ii. Select the checkbox for each field in which this delimiter is used.
 - iii. Click Apply.

The delimiter is displayed in the Delimiter column for each of the selected fields.

iv. Clear the selected checkboxes and repeat step i through step iii to define delimiters for additional fields.

Note: The **Dependencies** tab is not used when updating entities.

When you are finished, click **OK** to save your changes and close the dialog box.

13. Click Next.

Caution: If you click Cancel before the process is completed, only some of the data might be

updated. For more information, see "Cancelling a Download, Create, or Update Process" on page 46.

The Data Migrator attempts to validate and update the selected entities. This could take several minutes. When the process is complete, the message Update Request... Done! and a summary of the results of the import are displayed.

14. Review the summary information. Towards the top of the dialog box, <*N*> of <*N*> is displayed (where <*N*> represents the number of entities). This indicates the number of entities—out of the total number of entities in the spreadsheet—that were processed (successfully or not).

Statements such as the following might also be displayed:

- <N> requests pass pre-validation. <N> entities were validated.
- <N> requests do not pass pre-validation. <N> entities contained errors and were not validated. You will need to fix these errors before attempting to update the entities again.
- <*N*> requests successfully updated. <*N*> entities were updated successfully.
- <N> requests failed to update. <N> entities were not updated.
- 15. If the update was not successful, click **View Log** to view information about any errors that were reported. For instructions for using the information in the log file to fix the errors, see "Viewing the Detail Log and Fixing Logged Errors" on page 48.
- 16. When all of the entities are updated successfully, click **Finish**.

The Data Migrator closes.

17. Save the spreadsheet.

Downloading Entity Data to a Spreadsheet

You can download entity data from HP APM to a Microsoft Excel spreadsheet. This data can be *all* data for *all* entities of a specific entity type or specific data such as data for only the types of entities, or specific entities or fields you want.

Caution: If the spreadsheet you use for the download already contains data, some or all of the data might be overwritten during the download process. The data that might be overwritten is located beneath the header or token row (whichever row is last). Any data in the rows or columns that are needed to hold the downloaded data is overwritten with new entity data. If the spreadsheet contains data in more rows or columns than are needed for new data, those rows or columns are not overwritten.

Note the following:

- To download all data for all entities of a specific entity type, you can start with a blank spreadsheet.
- To download data for specific fields or entities, you do one or more of the following:
 - You can select the fields and entities for which you want to download data when you configure the entity type you are going to download (this option is described later in this section).
 - You can prepare a spreadsheet that contains, at the minimum, a header row with the names of only the fields for which you want to download data.
 - You can prepare a spreadsheet from a template you created with the Data Migrator.

To download entity data:

- 1. Access the Select an Action to Perform dialog box. For instructions, see "Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)" on page 29.
- 2. Click the **Download Records** icon to download entity data of the type you selected when you connected to the PPM Server.

One of the following occurs:

- If the spreadsheet is blank, the Download Options dialog box opens. Go to step 11.
- If the spreadsheet is not blank, the Map Attributes to Columns dialog box opens. Go to the next step.
- 3. Do one of the following:
 - If you are working with a spreadsheet that was created from a Data Migrator template, review the preconfigured entries in this dialog box. If you need to make changes, go to the next step. If the default settings are correct, go to step 10.
 - If you are working with a spreadsheet that you created, go to step 4.
- To the right of the Column Header Row field, click the selection icon (

The Select a Row dialog box opens.

5. In the spreadsheet, click a cell in the row that contains the column headings.

The identifier for the cell you clicked is entered in the **Please select the row for field headers** field in the Select a Row dialog box.

6. Click OK.

The Select a Row dialog box closes, and the number of the selected row is displayed in the Column Header Row field. The headings from the row you selected—with the letter identifying the

column they are in as the prefix—are added to the options available in the Unique record identifier drop-down list. The headings are also displayed in the Spreadsheet list.

- 7. If the spreadsheet contains a row of tokens, do the following:
 - a. Select the (Optional) Token Row checkbox.
 - b. To the right of the **(Optional) Token Row** field, click the selection icon (1).

The Select a Row dialog box opens.

c. In the spreadsheet, click a cell in the row that contains the tokens.

The identifier for the cell you clicked is entered in the **Please select the row for field tokens** field in the Select a Row dialog box.

d. Click OK.

The Select a Row dialog box closes, and the number of the selected row is displayed in the (Optional) Token Row field. The Data Migrator automatically attempts to map the spreadsheet columns to the fields in the Entity Type list. Successfully mapped columns and fields are displayed in blue text.

If you do not want to download data for all of the fields, select the checkboxes for each field you do not want to include and click **Unmap.**

- 8. From the **Unique record identifier** drop-down list, select the column that contains the request numbers that were assigned to the entities by the Data Migrator when they were created.
- 9. Manually map any unmapped columns to fields for which you want to download data. Map the columns in the **Spreadsheet** list to the fields in the **Entity Type** list. The list of fields is displayed in the same order—and in the same sections—as the fields appear in the entity. For descriptions of entity fields in the sections and order they appear, see "Entities" on page 101.

Note: You are only required to map the columns for the fields you want to download.

For additional information about mapping columns to fields and instructions, see the notes and instructions in step 9.

10. Click Next.

The Download Options dialog box opens.

11. In the **Download Options** dialog box, select or clear the checkboxes as necessary so only the fields for which you want to download data are selected. The Download Options dialog box shows the mapped fields and their corresponding sections, columns, headers, and data types. The field containing the request number and fields designated as being read-only by gray column headings

in the template spreadsheet are not included in this list.

To clear all of the selected checkboxes, click **Uncheck All**. To select all the checkboxes, click **Check All**.

- 12. Click **Advanced Options** to configure download settings. To cancel any changes you make to the Advanced Options dialog box, click **Cancel**.
 - On the **General** tab, configure the following settings:
 - In the Highlight Success field in the Coloring box, select the color that the Data Migrator uses in the spreadsheet to show the entities that were downloaded successfully. To change the color, click the Color button and select a new color. To define custom colors, click Define Custom Colors in the Color dialog box.

By default, entities that downloaded successfully are *not* highlighted.

- In the Concurrency box, select the maximum number of concurrent threads—up to 20—from the Maximum Threads drop-down list. When you configure this field, consider the performance objectives for your environment. Setting this field to a higher number could improve throughput but might also put more of a load on your PPM Server. The default value is 5.
- On the **Data** tab, define the delimiters for fields that have more than one value. The default delimiter is a semicolon (;).
 - i. In the **Set Delimiter** field, type the delimiter.
 - ii. Select the checkbox for each field in which this delimiter is used.
 - iii. Click Apply.

The delimiter is displayed in the Delimiter column for each of the selected fields.

- iv. Clear the selected checkboxes and repeat step i through step iii to define delimiters for additional fields.
- On the Filters tab, configure the filters that determine the entities to be downloaded.
 - i. If you want to limit the number of entities that are downloaded, select the **Enable filtering of records to be downloaded** checkbox.
 - ii. To limit the entities that are downloaded to those containing a specific word in their description, type the word by which the entities are to be filtered in the <Name> contains field.
 - iii. To display a list from which you can select the entities to be downloaded, select the

Manually pick requests to download checkbox. This is a filtered list if you entered a word in the **<Name> contains** field.

When you are finished configuring the advanced options, click **OK** to save your changes and close the dialog box.

13. Click Next.

Caution: If you click Cancel before the process is completed, only some of the data might be downloaded. For more information, see "Cancelling a Download, Create, or Update Process" below.

- If you selected the Manually pick requests to download checkbox on the Filters tab, the Select Records dialog box opens.
 - i. Select or clear the checkboxes as necessary so only the entities you want to download are selected. To clear all the selected checkboxes, click **Uncheck All**. To select all the checkboxes, click **Check All**.
 - ii. Click Next.

The Data Migrator downloads the selected entities and fields.

If you did not select the Manually pick requests to download checkbox, the Data Migrator immediately downloads the selected entities and fields.

The download could take several minutes. When the process is complete, the message <*N*> of <*N*> is displayed (where <*N*> represents the number of entities). This indicates the number of entities—out of the total number of entities that you selected for downloading—that were downloaded.

14. Click Finish.

The Data Migrator closes.

15. Save the spreadsheet.

Cancelling a Download, Create, or Update Process

If you click the Cancel button to stop a download, create, or update process, the Data Migrator continues to run as it completes any active threads before aborting the process. What you need to do next is determined by the process the Data Migrator was performing:

• **Downloading entities or validations.** View the spreadsheet to see which entities or validations (if any) were downloaded. If you want to download all entities or validations, repeat the download.

- Creating entities. Do one of the following:
 - If you did not specify dependencies on the Dependencies tab, repeat the steps to create the entities again. Entities that were created successfully before the process was stopped are ignored when you repeat the create process.

Note: For entities that were created successfully, the spreadsheet shows the request number assigned by the Data Migrator in the request number column.

- If you specified dependencies on the Dependencies tab, do one of the following:
 - If the status message says Create Request... Abort!, repeat the steps to create the entities again.
 - If the status message says Create Request (2nd Pass)... Abort!, view the Detail Log
 to learn if the second pass completed successfully for all entities. If it did not, follow the
 instructions to update the entities in "Updating Entity Data" on page 38 to complete the
 processing of the dependencies.
- **Updating entities or validation values.** If the status message says Update Request... Abort!, click **View Log** to view the Detail Log file to learn the status of the update. If any of the entities do not show they were updated successfully or if the details cell is empty for any entities, repeat the update process. For information about the Detail Log file, see "Viewing the Detail Log and Fixing Logged Errors" on the next page.

Creating New Entities with the Migrate Option

Users whose configuration includes the Sys Admin: Migrate PPM Objects access grant see an additional option in the Select an Action to Perform dialog box—the option to Migrate Records. This option is typically used by an HP APM administrator who administers multiple PPM Center instances (for example, a development, test, and production system), and wants to migrate HP APM entity data from one instance to another without losing original information.

The Created By (token REQ.CREATED_BY) and Created On (token REQ.CREATION_DATE) fields are normally read-only and populated automatically by HP APM. When the Migrate option is available to you, you are able to provide data for these fields. This option is useful when you want your data to include original information about who created the entity and when it was created.

To create entities that include original data in the Created By and Created On fields:

 Prepare a spreadsheet that includes the values you want to appear in the Created By and Created On fields. For instructions for creating a spreadsheet, see "Creating an Import Spreadsheet" on page 24.

Note: If you do not provide values for these fields, they are populated with the default values.

- Access the Select an Action to Perform dialog box following the instructions for creating entities in "Connecting to the PPM Server using the Data Migrator Wizard (for Entity-Related Tasks)" on page 29.
- 3. Follow the instructions in "Creating New Entities" on page 32 to create new entities with the exception that, in step 2, click the **Migrate Records** icon instead of Create Records.

Viewing the Detail Log and Fixing Logged Errors

If all the entities were not created, updated, or downloaded successfully, see the Detail Log for information about the errors that occurred and suggestions for correcting them.

To view the Detail Log and fix any errors it includes:

1. On the page that shows the upload summary, click **View Log.**

The Detail Log opens. The summary information from the previous page is copied to the top of the log. Messages are identified by the row in the spreadsheet to which they apply. The icons used in the log are described in "Table 3-3. Descriptions of icons used in the Detail Log" below. The background of the selected cell is highlighted in blue.

Table 3-3. Descriptions of icons used in the Detail Log

Icon	Description
×	The action failed.
✓	The entity or validation was created or updated successfully.
1	The record was skipped during processing. This is informational only.
No icon	The action was not processed. For example, the action was cancelled.

2. You can save the summary information and log messages to the spreadsheet. Before you do this, review the following notes, and then click **Write Log Into Worksheet (last column).**

Note the following before saving the error messages:

- When you click Write Log Into Worksheet (last column), the log messages are added to the first empty column at the end of the spreadsheet and highlighted in yellow.
- You must save the spreadsheet containing the log messages if you want to be able to refer to them again. When you close the Detail Log page, the information is no longer available.
- If the Detail Log page shows that entities that had errors during an earlier import were now processed successfully, any error messages about these entities that you saved previously to the spreadsheet are deleted if you again click **Write Log Into Worksheet (last column).**

3. To attempt to fix a listed error, click a cell in the row with the error on the Detail Log page, and then click **Fix it**.

Note: The cells you selected in the Detail Log are highlighted in blue.

The Log Details dialog box opens.

- 4. Click a cell in the spreadsheet to display information in the Log Details dialog box about the error or errors the row in which the cell is located contains.
- Modify the spreadsheet to fix the error, save the spreadsheet, and click Retry in the Log Details dialog box. If the Retry button is not available, click another cell within the row that you made the change to enable it.

Note: You must retry the fix to each row individually. For example, if there are errors in four rows, click in the first row in which you fixed an error and click **Retry.** Repeat for each of the remaining rows that had errors you fixed.

The Data Migrator attempts to again process the entity data, and one of the following occurs:

- If the error was fixed, the message in the Log Details dialog box shows the retry was successful. The highlighting in the spreadsheet changes from yellow to green, although the log message in the spreadsheet is still highlighted in yellow and still shows the error.
- If the error was not fixed, the error description remains in the Log Details dialog box. Do one of the following:
 - Try again to fix the error.
 - Attempt to fix a different error.
 - Go to the next step.
- 6. To return to the Detail Log to review the list of outstanding errors, confirm that all errors have been fixed, or exit the Data Migrator wizard, click **Cancel** on the Log Details page.

The Detail Log reopens.

- 7. Do one or more of the following:
 - Review the list of outstanding errors and continue to attempt to fix them.
 - Click Write Log Into Worksheet (last column) to update the log entries in the spreadsheet.
 - Click Finish to exit the Data Migrator wizard.
- 8. Save the spreadsheet if you want to save the changes.

Downloading and Updating Validation Values

When a user is providing information for an entity, many of the fields the user must complete offer a selection of values from which the user must choose. These values are validation values.

The analyst and administrator can use the Data Migrator to download and update the validation values used by HP APM entities.

Tip: Validations are created by the HP APM instance administrator.

To download and update validation values, do the following:

- 1. Open the Data Migrator wizard and connect to the PPM Server. For instructions, see "Connecting to the PPM Center Server using the Data Migrator Wizard (for Validation-Related Tasks)" below.
- 2. Download all the validation values, a selection of validation values, or only the validation values you need to update. For instructions, see "Downloading Validation Values" on page 52.
- 3. If necessary, use the Data Migrator to update the downloaded validation values. For instructions, see "Updating Validation Values" on page 54.

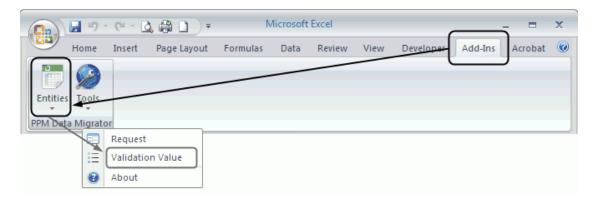
Connecting to the PPM Center Server using the Data Migrator Wizard (for Validation-Related Tasks)

You select the options you use to download and update validation values from the Select an Action to Perform dialog box that opens after you have connected to the PPM Server using the Data Migrator wizard.

To open the Data Migrator wizard, connect to the PPM Server, and access the Select an Action to Perform dialog box for validation-related tasks:

- 1. In Microsoft Excel, do one of the following:
 - If you are downloading validation values, open a blank spreadsheet or create your own spreadsheet. To do this, you follow the instructions for creating a spreadsheet for downloading entities in "Creating an Import Spreadsheet" on page 24 with the following exceptions:
 - The spreadsheet template for validations has only one default row, the row of column headings.
 - Instead of selecting Request from the Entities menu, you select Validation Value (see step 2 in this section).
 - Only a subset of the Advanced Options fields are available for validation values.

- If you are updating validation values, open the spreadsheet containing the data you are updating. (For information about this spreadsheet, see "Updating Validation Values" on page 54.)
- On the Add-Ins tab, select Entities > Validation Value from the PPM Data Migrator group.



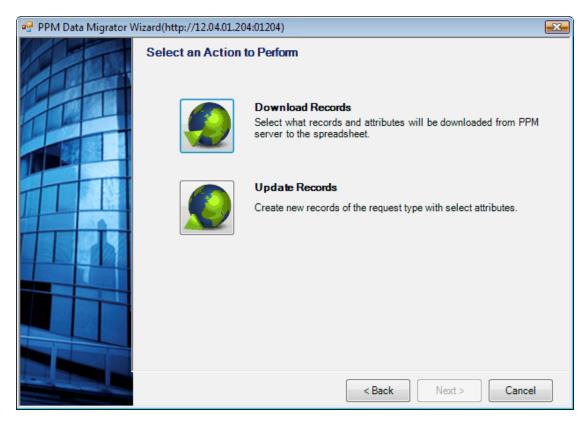
The Data Migrator wizard opens.

3. From the Select Server drop-down list, select the name of the PPM Server that contains the validation data you want to download or update. If the list is empty, see "Configuring the Connection to a PPM Server" on page 22.

Note: The **Select Server** drop-down list contains the names of the last ten PPM Servers that you accessed and for which you saved the connection information.

- 4. Click Connect.
- 5. When the PPM Server is connected, the message Connected is displayed at the bottom of the dialog box, and the Next button becomes available.
- 6. Click Next.

The Select an Action to Perform dialog box opens.



- 7. For instructions for performing the tasks you can perform from the options in this dialog box, see one of the following sections:
 - "Downloading Validation Values" below (the Download Records option)
 - "Updating Validation Values" on page 54 (the Update Records option)

Downloading Validation Values

If you want a record of the validation values used by HP APM or if you want to create a spreadsheet of validation values that you can update and import with the Data Migrator, you need to download the validations and their values.

Note: If your PPM Center instance supports multiple languages, the validation values you download will include a pair of Meaning and Description columns for each language supported by your system. For example, columns for a PPM Center instance that supports English and Spanish will include columns titled Meaning (English), Description (English), Meaning (Spanish), and Description (Spanish). All other columns are language independent.

To download validation values:

Connect to the PPM Server using the Data Migrator wizard. For instructions, see "Connecting
to the PPM Center Server using the Data Migrator Wizard (for Validation-Related Tasks)" on
page 50.

The Select an Action to Perform dialog box opens.

2. In the Select an Action to Perform dialog box, select Download Records.

The Download Options dialog box opens.

- 3. In the **Download Options** dialog box, click **Advanced Options** to configure the download settings. To cancel any changes you make to the Advanced Options dialog box, click **Cancel**.
 - In the **Highlight Success** field in the **Coloring** box, select the color that the Data Migrator uses in the spreadsheet to highlight the validations that were downloaded successfully.
 - To change the color, click the **Color** button and select a new color.
 - To define custom colors, click **Define Custom Colors** in the **Color** dialog box.

By default, validations that downloaded successfully are not highlighted.

- In the **Concurrency** box, select the maximum number of concurrent threads—up to 20—from the **Maximum Threads** drop-down list. When you configure this field, consider the performance objectives for your environment. Setting this field to a higher number could improve throughput but might also put more of a load on your PPM Server. The default value is 5.
- In the Data Filtering box, you can limit the validations that are displayed in the Download Options dialog box. To do so, type the word by which the validations are to be filtered in the Show validations when name contains field. For example, type APM to display only the validations that contain APM in their name.

When you are finished configuring the advanced options, click **OK** to save your changes and close the dialog box.

4. In the **Download Options** dialog box, select or clear the checkboxes as necessary so only the validations you want to download are selected. The Download Options dialog box lists all the validations configured for your implementation of HP APM or a filtered list of validations, if you configured the Data Filtering setting in the previous step.

To sort the list, click the heading of the column you want to sort by. To clear all the selected checkboxes, click **Uncheck All.** To select all the checkboxes, click **Check All.**

5. Click Next.

Caution: If you click Cancel before the process is completed, only some of the data might be

downloaded. For more information, see "Cancelling a Download, Create, or Update Process" on page 46.

The Data Migrator downloads the selected validations and their values. This could take several minutes. When the process is complete, the message < N > of < N > is displayed (where < N > represents the number of validations). This indicates the number of validations—out of the total number of validations that you selected for download—that were downloaded.

6. Click Finish.

The Data Migrator closes.

7. Save the spreadsheet.

Updating Validation Values

If you need to update validation values, you start by making your changes to a spreadsheet of validation values that you download using the Data Migrator, and then you import the updates into HP APM with the Data Migrator. You can use the Data Migrator to update changes to validation values that include the following:

- · Changing the values in a validation
- · Changing the sequence of values within a validation
- · Adding values to a validation
- Disabling and enabling values

Caution: When making changes to validation values, do not change the values in the Validation ID and Validation Name fields. These values are used by the Data Migrator to identify the validation.

Tip: Validations are created by the HP APM instance administrator.

To update validation values:

- 1. Download the validations containing the values you want to update. For instructions for downloading validation values, see "Downloading Validation Values" on page 52.
- 2. Make the necessary changes to the spreadsheet, save it, and leave it open.
- 3. Access the Select an Action to Perform dialog box. For instructions, see "Connecting to the PPM Center Server using the Data Migrator Wizard (for Validation-Related Tasks)" on page 50.

4. Click the **Update Records** icon to update validation values.

The Map Attributes to Columns dialog box opens.

- 5. Review the preconfigured entries in this dialog box. If you need to make changes, go to the next step. If the default settings are correct, go to step 12.
- 6. To the right of the Column Header Row field, click the selection icon (🖹).

The Select a Row dialog box opens.

7. In the spreadsheet, click a cell in the row that contains the column headings.

The identifier for the cell you clicked is entered in the **Please select the row for field headers** field in the Select a Row dialog box.

8. Click OK.

The Select a Row dialog box closes, and the number of the selected row is displayed in the Column Header Row field. The headings from the row you selected—with the letter identifying the column they are in as the prefix—are added to the options available in the Validation ID list. The headings are also displayed in the Validation Name list and the Attribute Mapping Spreadsheet list.

- 9. From the **Validation ID** list, select the column that contains the IDs that were assigned to the validations by PPM Center when they were created.
- 10. From the Validation Name list, select the column that contains the names of the validations.
- 11. Manually map any unmapped columns in the **Attribute Mapping Spreadsheet** list to the attributes in the **User Data** list.

You are only required to map the columns in which the values have changed.

For additional information about mapping columns to attributes, see step 9.

12. Click Next.

The Upload Options dialog box opens showing the first row number of each validation in the spreadsheet, the validation name, validation ID, and whether or not the validation is valid.

- 13. Select or clear the checkboxes as necessary so only the validations that you want to update are selected. To clear the selected checkboxes, click Uncheck All. To select the checkboxes for all the fields, click Check All.
- 14. Click **Advanced Options** to configure additional settings. To cancel any changes you make to the Advanced Options dialog box, click **Cancel**.

- In the Coloring box, select the colors from the Highlight Success and Highlight Failed fields that the Data Migrator uses in the spreadsheet to show the status of the entities after the update is completed.
 - To change a color, click the **Color** button and select a new color.
 - To define custom colors, click **Define Custom Colors** in the **Color** dialog box.

By default, validations that are updated successfully are highlighted in light green and validations that were not updated are highlighted in light red.

■ In the **Concurrency** box, select the maximum number of concurrent threads—up to 20—from the **Maximum Threads** drop-down list. When you configure this field, consider the performance objectives for your environment. Setting this field to a higher number could improve throughput but might also put more of a load on your PPM Server. The default value is 5.

Note: The settings in the **Data Handling** box are ignored when you update validations.

When you are finished, click **OK** to save your changes and close the dialog box.

15. Click Next.

Caution: If you click Cancel before the process is completed, only some of the data might be updated. For more information, see "Cancelling a Download, Create, or Update Process" on page 46.

The Data Migrator attempts to validate and update the selected validations. This could take several minutes. When the process is complete, the message Update Validations... Done! and a summary of the results of the update are displayed.

16. Review the summary information. Towards the top of the dialog box, <N> of <N> is displayed (where <N> represents the number of validations). This indicates the number of validations—out of the total number of validations you selected for updating—that were processed (successfully or not).

Statements such as the following might also be displayed:

- <N> records successfully updated. <N> validations were updated successfully.
- <N> records failed to update. <N> validations were not updated.
- <N> records pass pre-validation. <N> validations were validated.
- <N> records do not pass pre-validation. <N> validations contained errors and were not validated.

- 17. If the update was not successful, click **View Log** to view information about any errors that were reported. For instructions for using the information in the log file to fix the errors, see "Viewing the Detail Log and Fixing Logged Errors" on page 48.
- 18. When all of the validations are updated successfully, click **Finish**.

The Data Migrator closes.

19. Save the spreadsheet.

Viewing, Exporting, and Importing Mapping Relationships

You can use the Data Migrator mapping tools to import column-to-field or attribute mapping relationships from one spreadsheet to another and to view the mapping in a spreadsheet in XML code.

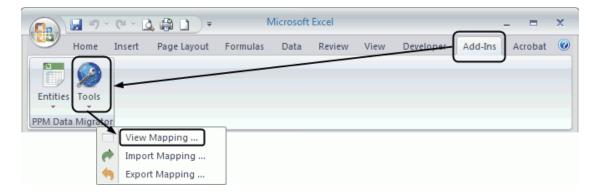
Viewing Mapping Relationships

You can view the column-to-field or attribute mapping relationships configured for spreadsheets that you downloaded using Data Migrator and spreadsheets you used to create or update entity data or update validation values. The mapping relationships are displayed in XML format.

Tip: To save or print the XML, use the Export Mapping option to create an XML file. (See "Exporting and Importing Mapping Relationships" on the next page.)

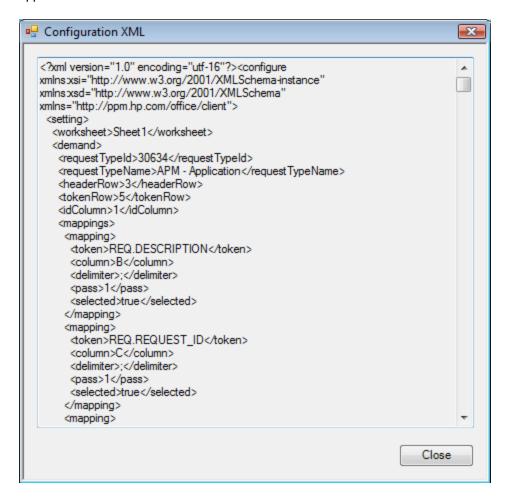
To view the mapping relationships in a spreadsheet:

- 1. Start Microsoft Excel.
- 2. Open the spreadsheet for which you want to view the mapping relationships.
- On the Add-Ins tab, select Tools > View Mapping from the PPM Data Migrator group.



A window opens showing the XML.

The following figure shows the first page of XML for the mapping of a spreadsheet created for application entities.



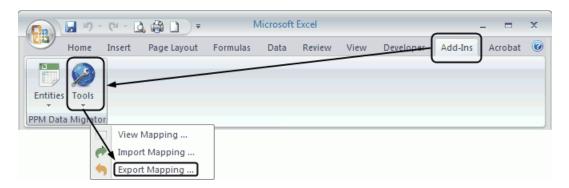
Exporting and Importing Mapping Relationships

You can reuse column-to-field or attribute mapping relationships from spreadsheets that you downloaded using Data Migrator or spreadsheets that you used to create or update entity data or to update validation values. You do this by exporting the mapping relationships from a "used" spreadsheet—a spreadsheet in which the mapping relationships were already configured—into a new spreadsheet.

To export mapping relationships and import them into a new spreadsheet:

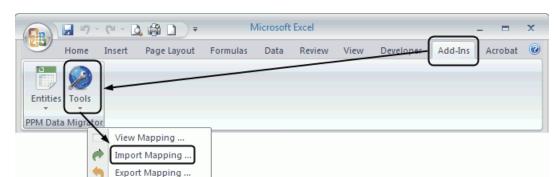
- Start Microsoft Excel.
- Export the mapping file:

- a. Open the spreadsheet that contains the mappings you want to export.
- b. On the Add-Ins tab, select Tools > Export Mapping from the PPM Data Migrator group.



The Save current setting to file dialog box opens.

- c. Configure the settings in the **Save current setting to file** dialog box:
 - i. Browse to the folder in which you want to save the exported data file.
 - ii. In the **File name** field, enter a name for the file into which the data is to be exported.
 - iii. Make note of the folder and file name.
 - iv. Click Save.
- 3. Create the new spreadsheet:
 - a. In Microsoft Excel, open a new spreadsheet.
 - b. From the original spreadsheet, copy the rows that contain the column headings (for entities and validation values) and tokens (for entities only)—and any other rows you want to reuse and paste them into the new spreadsheet.
 - c. Save the new spreadsheet.
- 4. With the new spreadsheet still open, import the exported mappings:



a. On the Add-Ins tab, select Tools > Import Mapping from the PPM Data Migrator group.

- b. Click **Yes** to acknowledge the message that is displayed.
- c. In the **Load setting from file** dialog box, locate and select the file containing the exported data.
- d. Click Open.

A message confirming that the mapping information was loaded successfully is displayed.

- e. Click OK.
- f. Save the new spreadsheet.
- To see the imported mappings, view the mappings following the instructions in "Viewing Mapping Relationships" on page 57.

Reinstalling the Data Migrator

If you attempt to install the Data Migrator and the installation fails or if you need to reinstall the Data Migrator, follow the steps in the following sections sequentially:

- 1. "Uninstalling the Data Migrator" on the next page
- 2. "Reinstalling the Data Migrator" on the next page
- 3. "Clearing the Cache" on the next page

Note: If you are installing a *new version* of the Data Migrator, follow the instructions in "Installing the Data Migrator" on page 21. You do not need to uninstall it first.

Uninstalling the Data Migrator

To remove the current installation of the Data Migrator, use the remove programs option in the Control Panel to uninstall **PPMDataMigrator**.

Reinstalling the Data Migrator

After uninstalling the Data Migrator, follow the instructions in "Installing the Data Migrator" on page 21 to reinstall it.

- If the installation is successful, return to earlier sections of this chapter to perform any necessary tasks.
- If the installation fails, go to "Clearing the Cache" below.

Clearing the Cache

To clear the cache and reinstall the Data Migrator:

- 1. Launch the command window (cmd.exe).
- 2. Change the directory in the command prompt to one of the following directories.
 - C:\Program Files\Microsoft SDKs\Windows\v7.0A\bin
 - C:\Program Files\Microsoft SDKs\Windows\v6.0A\bin
 - C:\Program Files\Microsoft Visual Studio 8\SDK\v2.0\bin

Note: The SDK-related directory you have on your computer depends on your computer's configuration. The version of the SDK software might vary from the version noted here.

If you do not have any of these directories on your computer, download and install the .NET Framework Software Development Kit (SDK) from the Microsoft Download Center at http://www.microsoft.com/download/.

3. At the command prompt for the bin directory noted in step 2, type the following command to clear the cache:

mage -cc

A message telling you the cache was cleared is displayed.

4. Reinstall the Data Migrator following the instructions in "Installing the Data Migrator" on page 21.

Chapter 4: Surveys and Additional Application Data Collection

Overview of Surveys and Application Data Collection

After you have collected and entered your application information, you might need to conduct a survey for the application and collect ratings from its users—or you might need to collect additional information about the application itself.

Conducting Surveys

You can use surveys to collect ratings data about an application from one or more users. Rather than entering arbitrary data, you can send a survey to an application's users and base the application ratings on the survey responses.

Complete the following tasks to collect and enter ratings data for an application:

- 1. Generate the survey registration and send invitations to its respondents. For instructions, see "Generating a Survey" below.
- 2. Monitor the individual survey responses. For instructions, see "Monitoring Individual Survey Responses" on page 65.
- 3. View the Survey Results report to evaluate the cumulative survey responses. For instructions, see "Viewing the Survey Results Report" on page 66.
- 4. Enter the results of the survey into the application entity. For instructions, see "Entering Survey Response Data into the Application Entity" on page 66.
- 5. Identify the applications that require additional information. For instructions, see "Identifying the Applications that Require Additional Information" on page 69.
- Send requests when more information is needed. For instructions, see "Sending a Request for More Information" on page 71.

Generating a Survey

Before you send out surveys, you create the survey registration entity and select the type of ratings for which you want to collect data. You then send the survey to the designated respondents.

Note: Each invitation sent from a survey registration is a survey with its own request number.

To create the survey registration:

- 1. From the menu bar, select **Open > Application Portfolio > Create Entities.**
- 2. In the Activities area, click Survey Registration.

The Create New APM - Survey Registration page opens.

3. In the **Summary** section, type a name for the survey in the **Survey Name** field.

Tip: Make note of the name you assigned to the survey registration. You will need it later.

- 4. In the **Details** section, type or select the type of survey that you want to send from the **Survey Template** list. The survey template determines the type of ratings data that is collected.
 - Business Survey. Business-related ratings for the application, data, vendor, value, and risk.
 - General Survey (Full). Application-related ratings for the application, data, vendor, value, and risk.
 - **Technical Survey.** Technical-related ratings for the application, data, vendor, and risk.

Tip: To view the specific fields for which data can be collected, select a survey template and click **(click here)** in the **View Preview** field.

For descriptions of the fields in the templates, see the descriptions of the application entity fields in "Application" on page 101.

- 5. In the **Target Completion Date** field, type or select the date by which the survey must be completed.
- 6. In the List of Applications & Respondents table, click Edit.

The label on the Edit button changes to View and additional buttons are displayed.

7. Add the applications to be surveyed and the users you want to designate as respondents. Refer to the following instructions and "Table 4-1. Table icons" on the next page for more information.

Table 4-1. Table icons

Button or Icon	Description
View	Click to view the completed table.
Export to Excel	Click to export the table to a Microsoft Excel spreadsheet.
4 Add Row	Click to add a row to the table.
★ Delete Rows	Click to delete the selected rows.
П Сору	Click to copy the selected rows.
Paste	Click to paste the copied rows beneath the selected row.
	Click to move the selected row up.
- Move Down	Click to move the selected row down.

Tip: To select a row, click a cell within the row. To select multiple rows, press and hold the Shift key as you click in additional cells.

a. Click the **Add Row** icon (Add Row).

A row with empty Application Name and Respondents cells is added to the table.

b. In the empty cell in the **Application Name** column, type or select the name of the application for which you are conducting the survey.

Tip: As you add each application, make note of the application's ID number. You will need this information later.

- c. In the empty cell in the **Respondents** column, type or select the name of one or more survey respondents (HP APM users you want to complete the survey).
- d. Repeat step a through step c as necessary.
- 8. To save the survey registration, click Submit.

The Request Creation Confirmed page opens, and the request number assigned to the survey registration is displayed in the Request # field.

Tip: Make note of the request number assigned to the survey registration. You will need it later.

To send the survey invitation to the respondents:

1. In the **Request #** field on the Request Creation Confirmed page, click the request number assigned to the survey that you just created.

The APM - Survey Registration - < Request_Number > page opens.

2. From the toobar, click Send Surveys.

The **List of Surveys** section is generated from the **List of Applications & Respondents** section and the surveys configured for this survey registration are listed.

An email is sent to each of the respondents inviting them to participate in the survey.

Note: By default, every three days an email is resent to remind the survey respondents to complete the survey. If a Target Completion Date is set for the survey, the reminder is sent every three days until that date is met.

Monitoring Individual Survey Responses

After you send the invitations to the survey respondents, you can view the status of the survey registration and the completion percentage by respondent.

- 1. Open the survey registration entity.
 - a. From the menu bar, select **Dashboard > Shared > APM Analyst > Front Page.**

The Front Page PPM Dashboard page opens.

b. In the **My Survey Requests** portlet, click the name of the survey registration entity you want to view.

The APM - Survey Registration - < Reguest Number > page opens.

2. Open the **References** > **Requests** section towards the bottom of the page.

Each respondent from whom a response was requested is listed as a separate survey by the survey request number (Req #). The list also includes the name of the survey respondent (Assigned User), the name of the survey (Description), the type of survey (Request Type), the status of the survey (Status), the percentage of the survey that has been completed (% Complete), the relationship of the survey request to the survey registration (Relationship), and the description of the survey registration with request numbers (Relationship Details).

- 3. From the list of surveys in the **Requests** section, you can do the following:
 - Click a request number to display a survey. If the respondent has saved answers to any of the questions, you can view the responses. While you can view a summary of rating responses in the Survey Results report (see "Viewing the Survey Results Report" below), you can see a respondent's comments when you view the surveys individually.
 - Change the relationship between a survey and the survey registration to which it is related.

Viewing the Survey Results Report

To monitor the overall response rate to the survey and to view a summary of the current responses, generate the Survey Results report:

- 1. From the menu bar, select Open > Application Portfolio > Reports > Survey Results.
 - The Submit Report: APM Survey Results Report page opens.
- 2. In the **Survey Request** list, type or select the name of the survey registration entity for which you want to view current responses.
- Configure additional report parameters as necessary. For descriptions of the other report parameters you can configure, see "Table C-3. Survey Results report filter fields" on page 192.
- 4. In the Scheduling and Output Options section, select Run Report Immediately.
- 5. Click Submit.
 - The Survey Results report is generated and opens.
- 6. Analyze the results of the report to determine if the number of responses is satisfactory or if you need to wait for more responses.

For more information about the Survey Results report, see "Survey Results Report" on page 191.

Entering Survey Response Data into the Application Entity

If you are satisfied with the response rate to the survey based on individual survey completion percentages or on the results shown in the Survey Results report, enter comments and notes from each survey into the **Notes** section of the application entity and enter the ratings data into the **Ratings** section of the application entity. For instructions, see:

- "Collecting and Entering Comments and Notes" on the next page
- "Collecting and Entering Ratings Data" on page 68

Collecting and Entering Comments and Notes

To collect and enter comments and notes:

- 1. Open an application entity for which you generated a survey:
 - a. From the menu bar, select **Open > Application Portfolio > Search Entities.**

The Search Entities page opens.

b. In the **Entities** area, click **Application**.

The Search: APM - Application page opens.

- c. Do one of the following:
 - In the View Details for Entity # field, type the entity number and click Go.
 - In the Search Information section, enter search criteria for the application and click
 Search. The Request Search Results page opens.

In the **Application No** column, click the number of the application for which you need more data.

The APM - Application - < Entity Number > page opens.

d. On the **Request Search Results** page, click the number assigned to the application entity to open it.

The APM - Application - < Entity Number > page opens.

- 2. In a window separate from the application entity, open the survey registration from which you sent the surveys:
 - a. From the menu bar, display the following path: Dashboard > Shared > APM Analyst >
 Front Page.
 - b. In the displayed path, right click **Front Page** and select **Open in New Window** from the menu that is displayed.

The Front Page PPM Dashboard page opens in a new window.

c. In the **My Survey Requests** portlet, click the name of the survey registration entity for which you want to collect and enter comments.

The APM - Survey Registration -< Request_Number > page opens.

3. In the **References** section towards the bottom of the page, open the **Requests** section.

4. Click the request number of a survey.

The survey opens in a new window.

- 5. Open the **Comments** section (a subsection of the details section) and the **Notes** section.
- 6. Copy any comments and notes from the survey to the **Notes** section of the application.

Tip: Instead of copying the comments and notes directly into the application entity, you can copy the comments and notes from one or all surveys to a file and attach the file as a reference to the application.

- 7. Repeat step 4 through step 6 for each survey.
- 8. In the application entity, click **Save.**

Collecting and Entering Ratings Data

To collect and enter ratings data:

- 1. Open the **Survey Results** report for the application for which you want to collect ratings data.
 - a. From the menu bar, select **Open > Reports > View Reports.**
 - b. Enter search criteria to filter the number of reports returned by the search and click **Search**.
 - c. In the **Report #** column in the **Search Results: Reports** table, click the number of the report to open.

The selected report opens.

- 2. From the **Survey Results** report, determine how you want to calculate the aggregated values for each rating field. For example, you could average the values for each field or use the median value of each field.
- 3. Open the application entity for which you generated the Survey Results report and enter values in the rating fields.
 - a. From the menu bar, select **Open > Application Portfolio > Search Entities.**
 - b. In the **Entities** area, click **Application**.
 - c. Enter search criteria to filter the number of applications returned by the search and click **Search.**
 - d. In the **Application No** column in the **Request Search Results** table, click the number of the application entity for which you want to enter ratings data.

- e. In the application entity, go to the **Rating** section, enter the calculated values from step 2.
- f. Click Save.

Requesting Additional Application Information

If you need to collect additional information about an application, you can send a request to a different user (called a respondent) to enter the information. You might want to do this if, for example, the owner of the application went on vacation before responding to the survey invitation or the owner needed more time for investigation.

The following sections describe the tasks you perform to identify the applications that need more data and to send a request for the data:

- "Identifying the Applications that Require Additional Information" below
- "Sending a Request for More Information" on page 71

Identifying the Applications that Require Additional Information

If you already know the applications for which you want to collect additional information, you can skip this task.

To identify the applications that require additional information, you create an application set that contains the applications you want to investigate, and then run two reports on those applications.

- 1. Identify the applications to include in the application set:
 - a. From the menu bar, select Open > Application Portfolio > Search Entities.
 - b. In the **Entities** area, click **Application**.

The Search: APM - Application page opens.

- c. Enter the filter criteria. For example, in the **Contacts** section, type or select the name of a user from the **Technical Owner** list to find all applications for which the user has technical authority.
- d. Click Search.

The Request Search Results page opens.

Make note of the application numbers from the Application No column and names from the
Title column that matched the filter criteria or export the results to a Microsoft Excel
spreadsheet.

2. Create an application set that contains an application or group of applications you are investigating. You use this application set later to view a report that shows how complete the data entry is for the set of applications. For example, you might want to view data entered for the applications owned by a specific technical owner. You can create the application set using the dynamic graphing feature or from the menu bar.

To create an application set using dynamic graphing, see "Dynamic Graphing" on page 76.

To create an application set from the menu bar:

a. From the menu bar, select **Open > Application Portfolio > Create Entities.**

The Create New Entity page opens.

b. In the Grouping area, click Application Set.

The Create New APM - Application Set page opens.

- c. In the **Set Name** field in the **Summary** section, type a name for the application set.
- d. In the **Scope** section, open the **List of Applications** section and click **Edit.**

The label on the Edit button changes to View and additional buttons are displayed.

- e. Add applications to the application set. For more information, refer to the following steps and "Table 4-1. Table icons" on page 64 for descriptions of the icons.
 - i. Click the Add Row icon (Add Row).

A row with an empty cell in the Name column is added to the table.

- ii. In the empty cell, type or select the name of an application you want to add to the application set.
- iii. Repeat step i and step ii as necessary to add additional applications to the set.
- f. Click **Submit** to save the application set.
- 3. Run the **Entity Coverage Summary** report for the application set you created in step 2. The Entity Coverage Summary report shows a summary of attributes and how complete the data entry is for the select applications or application set.
 - a. From the menu bar, select Open > Application Portfolio > Reports > Coverage Summary.

The Submit Report: APM Entity Coverage Summary Report page opens.

b. From the **Entity Type** list, select **Application**.

- c. In the **Application Set** list, type or select the application set you created in step 2.
- d. Configure additional report parameters as necessary. For descriptions of the report parameters, see "Table C-1. Entity Coverage Summary report filter fields" on page 188.
- e. In the Scheduling and Output Options section, select Run Report Immediately.
- f. Click Submit.

The Entity Coverage Summary report is generated and opens.

- 4. Analyze the results in the Entity Coverage Summary report to determine if the set of applications it covers require additional data. For example, view the Coverage % column for each attribute and determine if the amount of data entered is satisfactory. If the Coverage % is too low, run the Entity Detail report as described in step 5 to determine which applications are missing data.
- 5. If necessary, run the **Entity Detail** report on the applications in the application set (using the application numbers you noted in step 1). The Entity Detail report shows selected information about one or more applications.
 - a. From the menu bar, select Open > Application Portfolio > Reports > Entity Detail.

The Submit Report: APM Entity Detail Report dialog opens.

- b. In the **Entity Request Type** list, type or select **Application.**
- c. In the **Entity Numbers** list, type or select the application numbers you noted in step 1.
- d. Configure additional report parameters as necessary. For descriptions of the report parameters, see "Table C-1. Entity Coverage Summary report filter fields" on page 188.

Note: You might want to select **No** for the **Hide Prompts for Empty Fields** option so you can visually verify in the report that an attribute contains no data.

- e. In the Scheduling and Output Options section, select Run Report Immediately.
- f. Click Submit.

The Entity Detail report is generated and opens.

6. Analyze the results in the Entity Detail report to identify the applications that are missing data.

Sending a Request for More Information

After determining the applications for which additional data is necessary, send requests for more information:

- 1. Open an application entity for which additional data is needed. For instructions for opening an application entity, see step 1 in "Collecting and Entering Comments and Notes" on page 67.
- 2. From the toobar, click Need More Info.

The APM - Application < Request_Number >: Need More Info page opens.

3. In the **Respondent** list, select or type the name of the user from whom you want to collect additional data about the application.

Caution: By assigning a user as a respondent, you are giving that user the ability to view and edit all sections of the application.

- 4. In the **Respondent Note** field, type a message to be included in the email that is automatically sent to the respondent. For example, you might want to specify the fields in the application entity that you need completed.
- 5. Click Continue Workflow Action.

The application entity opens, and an email that requests more information about the application is sent to the respondent.

6. For each application that requires additional information, repeat step 1 through step 5.

Chapter 5: Application Analysis

Application Analysis Overview

After data has been collected and entered for applications and other entities in your application portfolio, you can analyze and assess your application portfolio using the following tools:

- "Application Sets" below. Group applications for comparative analysis in portlets, reports, dynamic graphing, and the Request Browser.
- "PPM Dashboard and PPM Dashboard Pages" below. Group and display portlets for a real-time view of important information about your application portfolio.
- "Portlets" on page 75. Display and define standard and customizable real-time views of your application portfolio data.
- "Reports" on page 76. Display status and statistics based on your application portfolio data.
- "Dynamic Graphing" on page 76. Displays graphical relationships between applications and between processes.
- "Request Browser" on page 96. Hierarchically groups and displays information for a real-time view of selected entity information.

Application Sets

When you want to compare a specific set of applications, you can first configure an application set containing the necessary applications. You can use application sets in workstream entities, the Entity Coverage report, the Request Browser, dynamic graphing, and in the following portlets: Application Health Breakdown, Application Portfolio Size, Application Value Assessment, List of Applications (Analyst), and TCO Summary. For more information about application sets, see "Application Set" on page 130.

PPM Dashboard and PPM Dashboard Pages

The PPM Dashboard, located on the menu bar, provides the core of the standard user interface. It is a real-time Web page view into your application portfolio. By viewing pages on the PPM Dashboard, you can obtain accurate, up-to-the-minute status information about your applications and deliverables. With the PPM Dashboard, teams always know their current status. Managers gain real-time insight into the applications they manage. Executives can view transformation proposals from an IT value perspective at a high level, which helps to ensure alignment with the organization's overall strategic direction.

PPM Dashboard pages, accessed from the PPM Dashboard, organize application data. You can devote one PPM Dashboard page to transformation proposal information and another to application-related data. How you organize the data is entirely up to you.

The following sections provide information about the PPM Dashboard and PPM Dashboard pages:

- "Types of PPM Dashboard Pages" below
- "Personalizing and Managing the PPM Dashboard and PPM Dashboard Pages" on the next page

Types of PPM Dashboard Pages

The following PPM Dashboard pages are available with HP Application Portfolio Management (HP APM):

Shared PPM Dashboard pages. Shared PPM Dashboard pages are preconfigured PPM
Dashboard pages provided by HP APM or configured by the HP APM administrator. They are made
available to one or many users. You cannot edit a shared PPM Dashboard page or the portlets it
contains.

HP APM supplies several shared PPM Dashboard pages for analysts: Front Page, Portfolio View, and Applications. These pages contain portlets that provide the type of information that is typically used by an analyst.

Note: Shared PPM Dashboard pages are also known as HP-supplied PPM Dashboard pages.

Private PPM Dashboard pages. You create and configure your private PPM Dashboard pages.
 You can add configurable portlets to a private page, move the pages up or down in the list of pages, and delete them. You can also configure the information displayed in the portlets that you add to private pages.

The default PPM Dashboard page is the first PPM Dashboard page you see when you log on to HP APM. For users who have personalized their PPM Dashboard, it is the first private page on the list; for new users, it is the first shared page on the list.

For descriptions of the PPM Dashboard pages and portlets provided for analysts and for descriptions of the configurable portlets that you can add to a private PPM Dashboard page, see "PPM Dashboard Pages and Portlets" on page 160.

If you are also assigned the user role, HP APM provides you with the shared PPM Dashboard pages for users. For descriptions of the shared PPM Dashboard pages for users, see the *HP Application Portfolio Management User's Guide*.

Personalizing and Managing the PPM Dashboard and PPM Dashboard Pages

You can personalize the PPM Dashboard by adding PPM Dashboard pages with configurable portlets to it and then configuring the order in which the portlets are displayed and the types of information they provide. For instructions for creating and maintaining PPM Dashboard pages, see the *Creating Portlets and Modules* guide. For information about personalizing the PPM Dashboard, see the Project and Portfolio Management Center (PPM Center) *Getting Started* guide.

You can navigate between the different PPM Dashboard pages, export PPM Dashboard pages to PDF files, and create a list of frequently visited PPM Dashboard pages in the My Links list. For instructions, see the PPM Center *Getting Started* guide.

Portlets

Portlets are displayed on PPM Dashboard pages. They display real-time information relevant to your role as an analyst.

Two types of portlets are available in HP APM: shared and configurable.

 Shared portlets. Shared portlets are preconfigured portlets provided by HP APM or configured by an HP APM analyst or administrator. They are predefined versions of the configurable portlets. Shared portlets are displayed on the shared PPM Dashboard pages. You can edit shared portlets only if you first add them to a private Dashboard page.

Shared portlets for analysts contain information related to application portfolio data, workstreams, transformation proposals, and survey requests.

Note: Shared portlets are also known as HP-supplied portlets.

Configurable portlets. HP APM provides several configurable portlets that you can add to your
private PPM Dashboard pages and personalize. Configurable portlets are highly customizable—by
setting filters, you can configure the data that is displayed.

Configurable portlets for analysts contain information related to application portfolio data, applications, workstreams, transformation proposals, survey requests, and surveys to which the analyst has been asked to respond.

For descriptions of the shared and configurable portlets provided for an analyst, see the online help and "PPM Dashboard Pages and Portlets" on page 160.

If you are also assigned the user role, HP APM also provides you with the shared and configurable portlets for users. For descriptions of the shared and configurable portlets for users, see the *HP Application Portfolio Management User's Guide*.

For instructions for personalizing the configurable portlets, see the PPM Center Getting Started guide.

Portlet Definitions

HP APM analysts and administrators can create portlet definitions. Portlet definitions define the look and feel of a portlet. Portlet definitions can include such information as the type of portlet, its data source, display options such as which labels and columns to display, its layout, which users and groups have access to the portlet, and definitions of the filter fields. You can create multiple portlets based on a single portlet definition.

Note: When you create a portlet definition, you must assign it a data source. If you need a *new* data source, request it from the HP APM administrator.

For instructions for creating and maintaining portlet definitions and portlets, see the *Creating Portlets* and *Modules* guide.

Reports

HP APM provides several predefined reports that allow you to view the current status of your application portfolio data in a Web browser. After you select a report to view, you can set filters that determine the data that is to be included in the report.

For a list of the HP APM reports and their descriptions, see "Reports" on page 187.

Tip: View the HP APM reports from the Open > Application Portfolio > Reports menu.

For instructions for running and managing reports, see the Reports Guide and Reference.

Dynamic Graphing

Dynamic graphing provides the ability to view graphical relationships between applications and between processes. Dynamic graphing also allows you to transform a graph of processes into a graph of applications that support the processes and to create an application set from a group of displayed applications.

Installing Dynamic Graphing

The first time you start dynamic graphing, you are prompted to install the Microsoft Silverlight add-on for Microsoft Internet Explorer or the Silverlight Plug-In for Mozilla Firefox. Follow the prompts in the dialog boxes that are displayed to complete the installation.

Starting Dynamic Graphing

The way you start dynamic graphing depends on the entity relationships you want to view.

Do one of the following to start dynamic graphing:

- To view the graphical relationships between the applications in an application set or between related processes:
 - a. From the menu bar, select Open > Application Portfolio > Analyze > Dynamic Graphing.
 The dynamic graphing page opens.
 - b. Do one of the following:
 - To view the relationships between the applications in an application set, see "Viewing Application Relationships" on the next page.
 - To view the relationships between related processes, see "Viewing Process Relationships" on page 81.
 - To use dynamic graphing to perform additional procedures, see the procedures described in other "Dynamic Graphing" on the previous page sections.
- To start dynamic graphing so you can view graphical relationships between the entities you select from the results of a search or between the entities you select from an entity group:
 - a. Do one of the following:
 - Search for all application or process entities or only the specific application or process entities you want to view. For information about searching for entities, see "Searching Entities" on page 17.
 - Create a group of application or process entities. For information about using the Request Browser to create an entity group, see "Request Browser" on page 96.
 - From the results displayed on the Request Search Results page or in the Request Browse
 Results section on the Browse < Entity_Type > Requests page, select one or more application
 or process entities.

Note: If you select entities of more than one type, all entities are ignored unless one of the entity types is application—then only the application entities are displayed. If you select entities of a type other than application or process, nothing is displayed.

The Dynamic Graphing button is enabled.

c. Click Dynamic Graphing.

The dynamic graphing page opens and the selected entities are displayed.

Tip: To quickly zoom in and out of a displayed graph, use the scroll wheel on the mouse.

To reposition the graph, drag the cursor on the graph and move it to the desired position.

Viewing Application Relationships

Use dynamic graphing to view application relationships. You can view the following relationships:

- The applications in an application set.
- · The number of processes an application supports.
- The dependencies between applications.
- The dependencies an application set has between all applications, including applications not included in the application set.
- A combination of the number of processes supported and application dependencies (either for the applications in an application set or for all applications).

Opening an Application Set

To open an application set in dynamic graphing and view the applications it contains:

Note: The application set must be created before it can be opened in dynamic graphing.

- Start dynamic graphing. For instructions, see "Starting Dynamic Graphing" on the previous page.
- 2. Click the **Open** icon ().
- 3. Click Open Application Set.

The application set selection menu displays the eight most recently created application sets. If the application set you want to open is not displayed, select **More** to view additional applications sets.

4. Select an application set and click **OK**.

Applications are represented by rounded blue rectangles in the graph.

Figure 5-1. View of applications in an application set



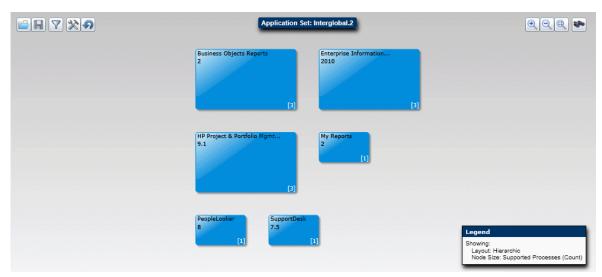
Viewing the Number of Processes an Application Supports

To view the number of processes supported by an application:

- 1. Open an application set or one or more applications in dynamic graphing. For instructions, see "Starting Dynamic Graphing" on page 77.
- 2. Click the **Graph Options** icon (2).
- Select Load Supported Processes.

The size of the rounded rectangles change proportionally, based on the number of processes supported. The number of processes supported is displayed in the lower right corner of the rounded rectangle.

Figure 5-2. View of an application set with dependent processes



Viewing Application Dependencies

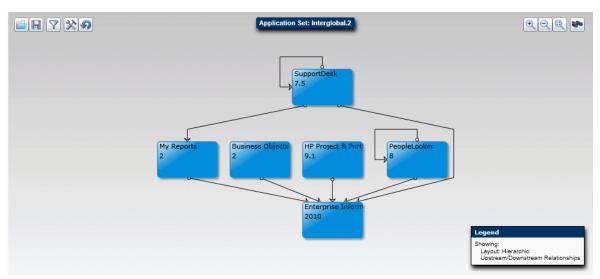
You can view application dependencies between the displayed applications or you can view all directly related application dependencies of an application set (this includes dependencies to applications that are not part of the application set).

Viewing Dependencies Between Applications

To view dependencies between applications:

- 1. Open an application set or more than one application in dynamic graphing. For instructions, see "Starting Dynamic Graphing" on page 77.
- 2. Click the **Graph Options** icon ()
- 3. Select Show Upstream/Downstream.

Figure 5-3. Hierarchical view of an application set with upstream/downstream dependencies



Viewing Dependencies Between Directly Related Applications

You can view dependencies that applications have between directly related applications in the application portfolio. For example, if an application set contains application A, application A depends on application B, and application B depends on application C, showing the direct dependencies of the application set displays application A and B; application C is not directly related to application A.

To view dependencies that applications have between directly related applications in the application portfolio:

1. Open an application set or more than one application. For instructions, see "Starting Dynamic Graphing" on page 77.

- 2. Click the **Graph Options** icon ()
- 3. Select Show Direct Dependencies.

The original applications are represented by rounded blue rectangles. Applications that have a direct dependency on one or more of the original applications—and were not part of the applications that were displayed originally—are represented by teal green rectangles.

Caution: In dynamic graphing, all applications displayed are considered part of an application set. If you open an application set and view its direct application dependencies, all applications displayed in the graph are considered part of the application set. If you then save your application set, all applications, including the direct dependent applications, are saved to the application set.

For example, in "Figure 5-4. Hierarchical view of an application set with direct dependencies" below, applications that are both blue (original applications in the application set) and teal green (applications that have a direct dependency on the original applications in the application set) are considered part of the application set and, when saved, are saved as part of the application set. When this saved application set is reopened, all applications are represented by rounded blue rectangles.

For instructions for saving an application set in dynamic graphing, see "Saving Displayed Applications in an Application Set" on page 95.

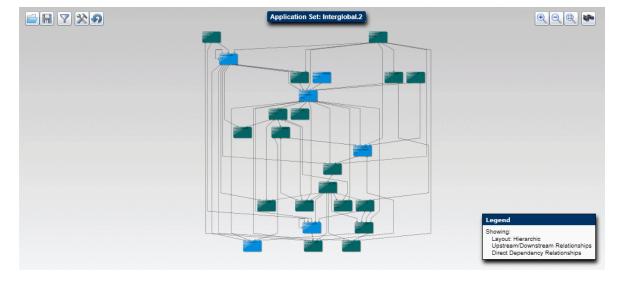


Figure 5-4. Hierarchical view of an application set with direct dependencies

Viewing Process Relationships

Use dynamic graphing to view process relationships. You can view the following relationships:

- The selected process and its child processes, if any.
- The number of applications supporting the process.
- The applications that support the process.

Opening a Process

To open a process and view its child processes:

- 1. Start dynamic graphing. For instructions, see "Starting Dynamic Graphing" on page 77.
- 2. Click the **Open** icon ()
- 3. Select Open Process Tree.

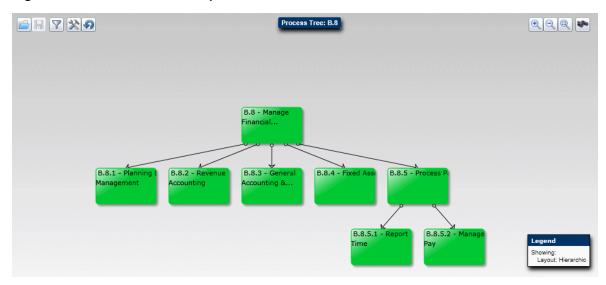
Note: If no processes have been created, the **Open Process Tree** menu item is not selectable.

The process selection menu displays the eight most recently created top-level processes (processes with no parent). If the process you want to open is not displayed, select **More** to view additional processes.

4. Select the process from the process hierarchy or type the name of the process in the **Process** field and click **OK**.

Processes are represented by rounded bright green rectangles in the graph.

Figure 5-5. Hierarchical view of process tree



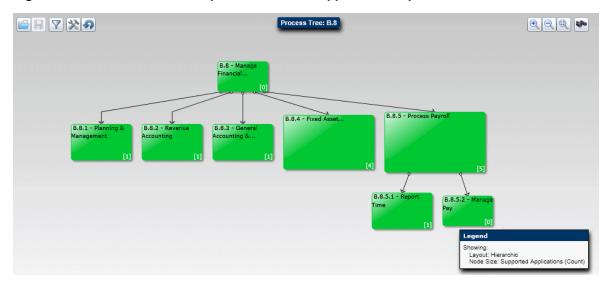
Viewing the Number of Applications that Support a Process

To view the number of applications supporting a process:

- 1. Open a process.
- 2. Click the **Graph Options** icon ()
- 3. Select Load Related Applications.

The size of the rounded rectangles change proportionally, based on the number of applications that support the process. The number of applications supporting the process is displayed in the lower right corner of the rounded rectangle.

Figure 5-6. Hierarchical view of process tree with application dependencies



Viewing the Applications that Support a Process

You can transform the process graph into a graph showing the applications that support the process and its child processes:

- 1. Open a process.
- 2. Click the **Graph Options** icon ()
- 3. Select **Load Related Applications.** (You must load related applications before you can transform it into an application graph).

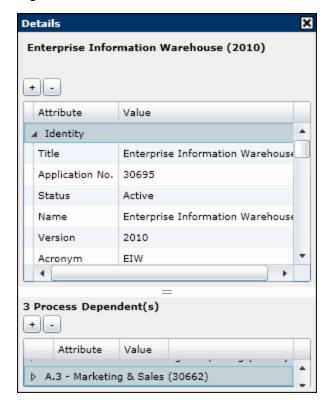
- 4. Click the **Graph Options** icon (2008).
- 5. Select Transform to Application Graph.

All applications that support the processes are represented by rounded rectangles. Use the graph options to view the number of processes each application supports and to show the dependencies between applications. You can also save this set of applications as an application set. (For instructions, see "Saving Displayed Applications in an Application Set" on page 95.)

Viewing Application and Process Details

You can view detailed information about an application or process shown in a graph. Click on the application or process and the information is displayed in the Details table. The information is structured by sections and fields based on the entity type (application or process). For example, "Figure 5-7. Details table" below shows the Identity section for an application entity and some of its fields.

Figure 5-7. Details table



If you have loaded the supported processes of the displayed applications, an additional table is displayed in the Details table. The second table displays a list of the dependent processes (processes that are supported by the applications in the application set).

If you have loaded the related applications of a process, a Virtual Attributes section and an additional table are added to the original table displayed in the Details table.

- The Virtual Attributes section contains the Supporting Applications virtual attribute, which contains a list of the dependent applications. You can filter the graph using this virtual attribute.
- The additional table lists the dependent applications (applications that support the process).

Filtering Applications and Processes

You can filter the graph to highlight only those applications or processes that meet a certain criteria:

- 1. In dynamic graphing, open an application set or one or more applications or processes. For instructions, see "Starting Dynamic Graphing" on page 77.
- 2. Transform the graph as necessary. For instructions, see "Viewing the Applications that Support a Process" on page 83.
- 3. Click the **Filter Graph** icon (\(\bigcap\)).

The Filters table opens.

4. Select the attribute on which you want to filter and type the value in the Criteria column. You can use wildcards or operators. For descriptions and examples of the wildcards and operators you can use, see "Table 5-1. Wildcard/Operator descriptions and examples" on the next page. Filter criteria are not case-sensitive.

Note: To configure attributes (fields) that had selectable "yes" or "no" values when the entity was created (such as the Compliant attribute of a process entity, the Under Maintenance attribute of an application entity, and the Disaster Recovery Plan in Place attribute of an application entity), type **y** or **n** (not **yes** or **no**) as the filter criteria value.

5. Click Apply.

Applications or processes that *do not* meet the filter criteria are changed to rounded gray rectangles in the graph.

You might need to move the graph or zoom out to view the entire graph.

Table 5-1. Wildcard/Operator descriptions and examples

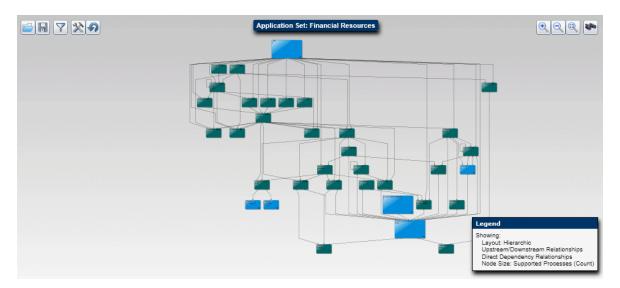
Data Type	Wildcard/Operator	Description/Examples	
Text	*	(Asterisk) Matches zero or more characters.	
		m*	Match values that starts with "m" or "M" such as "Michael" and "Michele"
		*e	Match values that ends with "e" or "E" such as "Michele" or "Frederiche"
	?	(Question Mark) Matches any one character.	
		?ich	Match four-letter values that end with "ich" such as "Rich"
		?ich*	Match values that have "ich" as their second, third, and fourth letters such as "Michelle" and "Rich" ("Frederiche" would NOT match)
	=	(Equals Sign) Explicit match.	
		=m*	Match values that starts with "m" or "M" such as "Michael" and "Michele"
	,	(Comma) Acts as the OR boolean operator.	
		m*, *e	Match values that starts with "m" or "M" and ends with "e" or "E" such as "Michael" or "Michele" or "Frederiche"
	1111	(Quotation Marks) Match all characters inside the quotation marks literally and exactly. Wildcards or operators inside of the quotation marks are not interpreted as wildcards or operators.	
		"rich"	Exactly match the value of "rich" (not case-sensitive) such as "Rich ("Frederiche" would NOT match)
		"*ich*"	Exactly match the value of "*ich"" (not case-sensitive) such as "*IcH*" ("Michele" and "Rich" and "Frederiche" would NOT match)

Table 5-1. Wildcard/Operator descriptions and examples, continued

Data Type	Wildcard/Operator	Description/Examples	·
Number	>	(Greater Than) Match all values greater than the given value.	
		>25	Match values that are greater than 25 such as "26" or ""27"
	>=	(Greater Than or Equal) Match all values that are greater than or equal to the given value.	
		>=25	Match values that are greater than or equal to 25 such as "25" or "26" or "27"
	<	(Less Than) Match all values less than the given value.	
		<25	Match all values that are less than 25 such as "24" or "23"
	<=	(Less Than or Equal) Match all values less than or equal to the given value.	
		<=25	Match all values that are less than or equal to 25 such as "25" or "24" or "23"
	=	(Equals Sign) Explicit match.	
		=25	Match the value of 25
	,	(Comma) Acts as the OR boolean operator.	
		24, 25	Match values of "24" or "25"
	-	(Dash) Match any value in the given range of numbers.	
		23-25	Match values of "23" or "24" or "25"

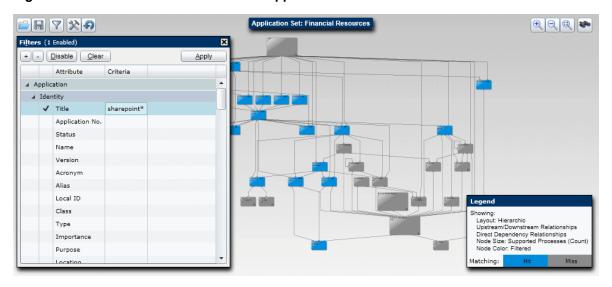
[&]quot;Figure 5-8. Hierarchical view of an application set" below shows an application set that shows upstream/downstream relationships, direct dependencies, and dependent processes.

Figure 5-8. Hierarchical view of an application set



"Figure 5-9. Hierarchical view of a filtered application set" below shows the same application set in "Figure 5-8. Hierarchical view of an application set" on the previous page after a filter was applied to highlight all applications with a Title that starts with "sharepoint."

Figure 5-9. Hierarchical view of a filtered application set



Changing the Dynamic Graphing Display of Applications

The graph of applications can be varied by changing the color or size of the nodes using the graph's visual options. The color or size of the nodes represents the number or value of a selected application attribute.

Color-coding displays up to four colors, with up to three colors based on specified percentiles:

- **Red.** The application falls into the high percentile range.
- **Orange.** The application falls into the middle or medium percentile range.
- Light Blue. The application falls into the low percentile range.
- **Gray.** The application does not have a number or value specified for the selected attribute.

Color percentiles are used with color-coding to specify the range of quantities or values a color represents.

Note: Percentiles are based on the highest configured value or number of the selected attribute (in the **Color Nodes By** field) for the applications in the graph. For example, an application score can range from 0 (zero) to 5. However, if the highest application score of all applications in the graph is 4, the percentiles are based on the value of 4 (not 5).

"Table 5-2. Examples of percentiles based on highest attribute value" below shows an example of percentile values for application scores. The highest attribute value is the highest application score of all applications in the graph (each row represents a separate graph) and the high percentile is set to 80% and the low percentile is set to 20%.

Table 5-2. Examples of percentiles based on highest attribute value

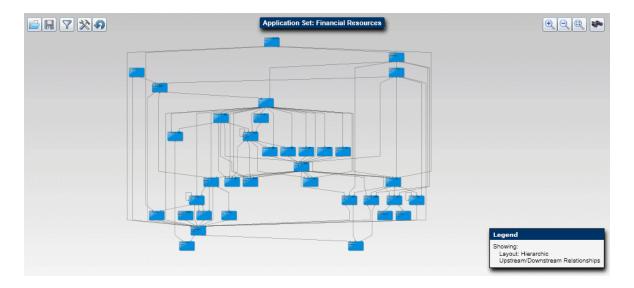
	Values for Percentile Ranges of 80% and 20%		
Highest Attribute Value	100% >= Red >= 80%	80% > Orange >= 20%	20% > Light Blue
5	5 >= Red >= 4	4 > Orange >= 1	1 > Light Blue
4	4 >= Red >= 3.2	3.2 > Orange >= .8	.8 > Light Blue
3.5	3.5 >= Red >= 2.8	2.8 > Orange >= .7	.7 > Light Blue

Sizing displays nodes of different sizes based on the number or value. The larger the node, the larger the number or value.

The examples in this section show how to color-code the nodes by application score and size the nodes by the number of processes supported by an application (the larger the node, the more processes that are supported)

"Figure 5-10. Hierarchical view of application set" below shows an application set with upstream and downstream relationships. No visual options have been set.

Figure 5-10. Hierarchical view of application set



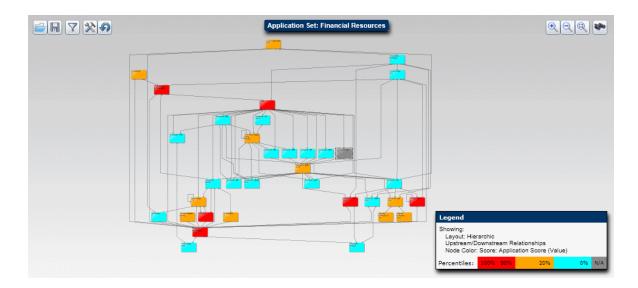
Color-coding Nodes by Application Score Values

To color-code the nodes by application score values:

- 1. Click the **Graph Options** icon (2008).
- 2. Select Visual Options.
- 3. From the Color Nodes By drop-down list, select Score: Application Score (Value).
- 4. Adjust the Color Percentiles by typing in the percentile ranges or using the slidebars. If you want to represent only high and low quantities or values, set percentile ranges to successive numbers (such as 51 and 50). In this example, the default values are used.
- 5. Click OK.

"Figure 5-11. Hierarchical view of application set that is color-coded" below shows the same application set that is shown in "Figure 5-10. Hierarchical view of application set" on the previous page, but the graph is color-coded to differentiate the applications by application score percentiles. In this example, the highest application score for any node is 4, therefore red nodes represent applications that have application scores in the 3.2–4 range, orange nodes represent applications that have application scores in the .8–3.2 range, and light blue nodes represent applications that have application scores less than .8.

Figure 5-11. Hierarchical view of application set that is color-coded



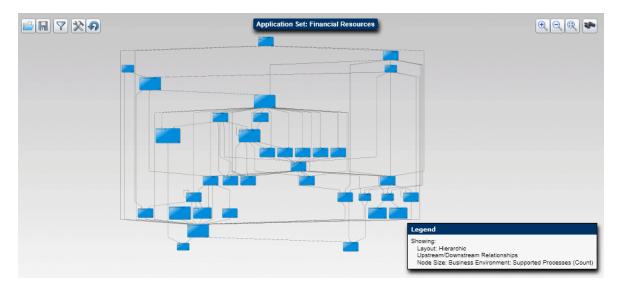
Changing the Size of Nodes to Represent the Number of Supported Processes

To change the size of nodes to represent the number of processes supported by an application,

- 1. Click the **Graph Options** icon ().
- 2. Select Visual Options.
- 3. From the Size Nodes By drop-down list, select Business Environment: Supported Processes (Count).
- 4. Click OK.

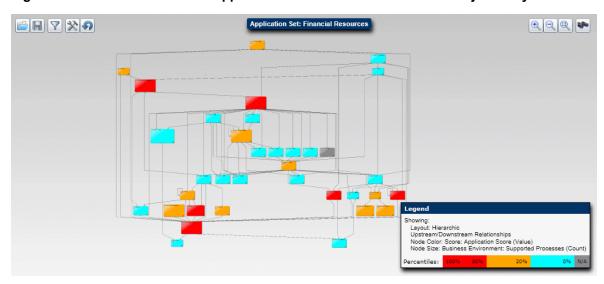
"Figure 5-12. Hierarchical view of application set that is adjusted by size" below shows the application set in "Figure 5-10. Hierarchical view of application set" on page 89, but the graph's node size represents the number of processes that are supported by the application. The larger the node, the more processes that are supported

Figure 5-12. Hierarchical view of application set that is adjusted by size



"Figure 5-13. Hierarchical view of application set that is color-coded and adjusted by size" below shows the application set that has both the color-coding and sizing visual options applied where color represents the application score and node size represents the number of processes that are supported by the application.

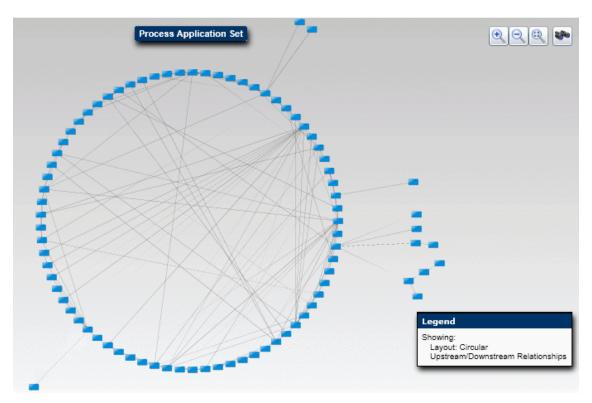
Figure 5-13. Hierarchical view of application set that is color-coded and adjusted by size



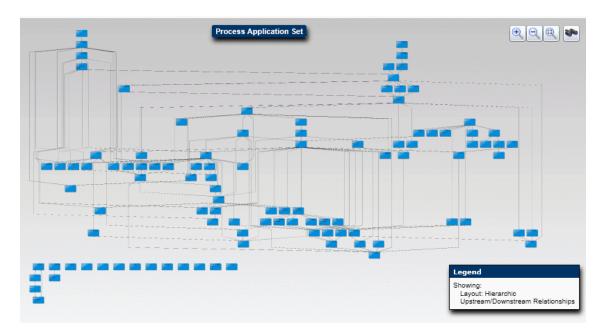
Changing the Dynamic Graphing Layout of Applications and Processes

You can vary the graphs of applications and processes by changing the layout of the nodes. Choose from the following layouts:

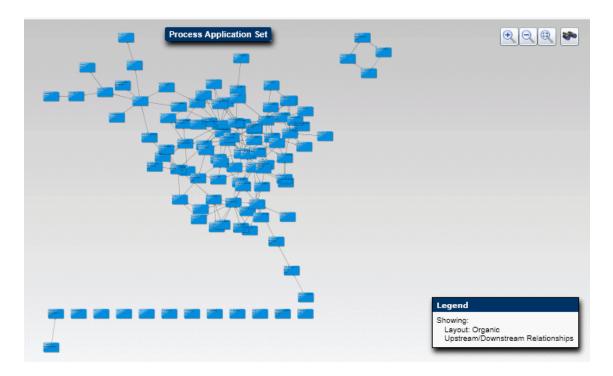
• Circular. Shows interconnected rings and star topologies.



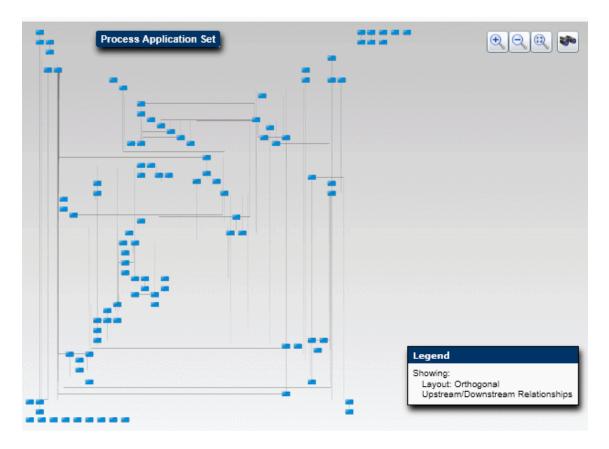
• Hierarchical. Default. Shows a top-to-bottom directed graph.



• Organic. Shows symmetrical or balanced distribution.



• Orthogonal. Minimizes the number of overlapping and bends in connectors.



To change the layout of the graph,



- 2. Select Layout Options.
- 3. Select one of the layouts.

Saving Displayed Applications in an Application Set

Note the following behavior in dynamic graphing when you save the displayed applications as an application set:

All applications displayed are considered part of an application set. If you open an application set
and view its direct application dependencies, all applications displayed in the graph are considered
part of the application set. If you then save your application set, all applications, including the direct
dependent applications, are saved to the application set.

For example, in "Figure 5-4. Hierarchical view of an application set with direct dependencies" on page 81, applications that are both blue (original applications in the application set) and teal green (applications that have a direct dependency on the original applications in the application set) are considered part of the application set and, when saved, are saved as part of the application set. When this saved application set is reopened, all applications are represented by rounded blue rectangles.

• Using the **Save As Application Set** option to save an application set as an existing application set does not replace the existing application set. Instead, an application set with the same name is created, but this newly created application set is not active.

For example, if you have two existing application sets (AppSet1 and AppSet2), open AppSet1 in dynamic graphing, select **Save As Application Set**, type in AppSet2 as the **Name**, and click **Submit**. A Progress dialog opens and does not close unless you click **Cancel**.

When you view a list of your applications sets, you have two application sets named AppSet2. The status of the original application set is Active. The status of the newly created application set is Change Pending. You cannot activate the newly created application set unless its name is changed to a unique name (the name is case-sensitive).

To save the applications displayed in dynamic graphing in an application set:

- 1. Click the **Save** icon ()
- 2. Select Save As Application Set.
- 3. Type a name and optional description and click **OK**.

Saving an Image of a Dynamic Graph

You can save a dynamic graph as a JPEG (.jpg) or Portable Network Graphics (.png) file.

Caution: Only the portion of the graph that is visible in your Web browser is saved (along with the legend and graph title). You may need to adjust the size of your Web browser or minimize the size of the graph in order to save the complete graph.

To save an image of the graph:

- 1. Click the **Save** icon ()
- 2. Select Save Image SnapShot.
- 3. Select the directory in which you want to save the image, type a filename, and select a format of the file.
- Click Save.

Request Browser

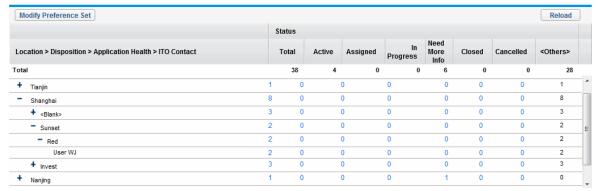
You can use the Request Browser to display and track entity information that is hierarchically grouped by specified entity fields. This information includes the total number of entities in each hierarchical entity group. With the Request Browser, you can create hierarchical entity groups of up to five levels deep, and you can break down the totals into a selected set of subtotals. You can also save the hierarchical entity group and selected entity information, allowing you to track the information over a period of time.

When you create an entity group with the Request Browser, you can use dynamic graphing to view the graphical relationships between applications or between processes in the group. (For instructions, see "Dynamic Graphing" on page 76.)

"Figure 5-14. Example of hierarchical grouping of applications and application totals and subtotals in the Request Browser" below shows a hierarchical grouping of applications, broken down by location, disposition, application health, and ITO contact. The total number of applications in each group is broken into subtotals by selected Status values.

Figure 5-14. Example of hierarchical grouping of applications and application totals and subtotals in the Request Browser

Browse APM - Application Requests



For instructions for using the Request Browser to search entities (requests), see the *HP Demand Management User's Guide*. While you follow the instructions in the *HP Demand Management User's Guide*, refer to the following example for the options you need to select from the HP APM menus to get to the Browse Entities and Request Browser pages.

Example: Using the Request Browser to Display Grouped Entities

The following example displays the Application Health by Customer Visibility of an organization's applications and, specifically, allows the organization's analyst to track the applications that are red for customer-facing applications in Beijing, Bangalore, and Los Angeles:

From the menu bar, select Open > Application Portfolio > Analyze > Groups > Group
 Entities.

The Browse Entities page opens.

2. In the Entities area, click Application.

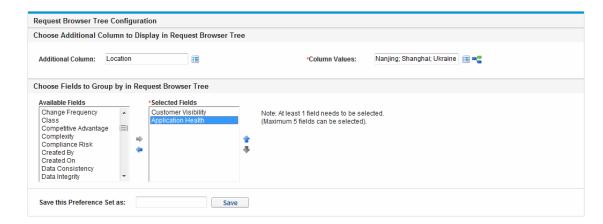
The Request Browser: APM - Application page opens.

- In the Request Browser Tree Configuration section towards the bottom of the page, do the following:
 - a. In the Additional Column list, select or type Location.

The Column Values list is displayed to the right of the Additional Column field.

- b. In the Column Values list, select Nanjing, Shanghai, and Ukraine and click OK.
- In the Choose Fields to Group by in Request Browser Tree section, select Customer
 Visibility and Application Health from the Available Fields list. Click the right arrow to move
 them to the Selected Fields list.

Note: The order in which you list the fields in this section determines the results that are displayed.

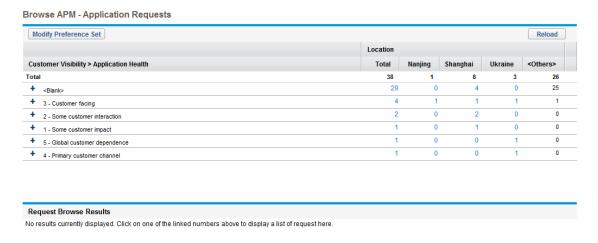


5. In the Choose Columns for Request List section (above the Request Browser Tree Configuration section), select the fields of the application that are to be tracked from the Available Columns list: Title, Status, Business Owner, Active Users, Total Score, and Location. Click the right arrow to move them to the Selected Columns list.



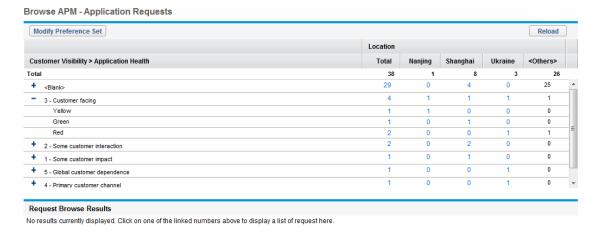
6. Click Browse.

The Browse APM - Application Requests page opens.



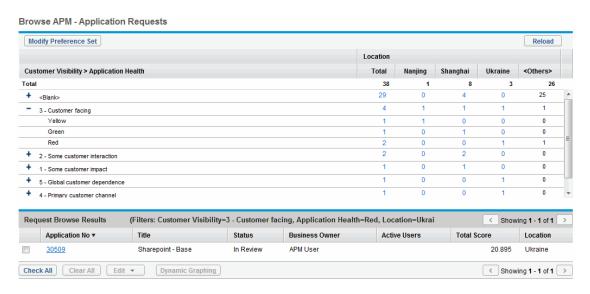
7. In the list of entities, expand the **3 - Customer facing** group to show the totals by Application Health.

There are two applications that are customer-facing and whose health is red. There is one application of this type in Ukraine and no applications of this type in Nanjing and Shanghai.



8. Click on the number **1** that represents the number of customer-facing applications located in **Ukraine** whose health is **Red.**

The application that belongs to this group is displayed in the Request Browse Results section at the bottom of the page.



Tip: You can use dynamic graphing to view the graphical relationships between the applications or processes listed in the Request Browse Results section. For instructions, see "Dynamic Graphing" on page 76.

9. To save the results as a Microsoft Excel file, click **Export to Excel.**

Saving an Entity Group

You can save an entity group to reuse later.

To save an entity group:

- 1. Create an entity group. For instructions, see "Request Browser" on page 96.
- 2. On the Browse < Entity_Type> Requests page, click Modify Preference Set.

The Request Browser: < Entity_Type > page opens.

- 3. Type a name for this entity group in the **Save this Preference Set as** field at the bottom of the page.
- 4. Click Save.

The window that opens displays the results of the save operation.

5. Click Return to Browse Requests.

The Request Browser: < Entity_Type > page opens.

To view this group at a later time, from the menu bar, select **Open > Application Portfolio > Analyze > Groups > Saved Group Criteria > <Name_of_Saved_Group>.**

Appendix A: Entities

Entities Overview

This appendix provides descriptions and screenshots of the entities that HP Application Portfolio Management (HP APM) provides for the analyst.

Refer to this appendix and the online help for field-level information when you are creating, searching for, or updating an entity. For additional information about entities, see "Managing HP APM Entities" on page 15.

Note: Most entities also have Notes, Status, and References sections. For descriptions of these sections, see the description of the *request details* page in the *HP Demand Management User's Guide.*

The HP APM administrator might choose to remove or add entities to your organization's implementation of HP APM. Any entities added by your HP APM administrator are not documented in this guide.

HP APM provides the following entities for analysts:

- "Application" below
- "Application Set" on page 130
- "Location" on page 132
- "Process" on page 134
- "Roadmap" on page 137
- "Server" on page 142
- "Survey Registration" on page 143
- "Transformation Proposal" on page 146
- "Workstream" on page 155

Application

An application entity is a software application or program that implements a business process or function in your organization. An application entity can be made up of one or more distinct services.

When creating, searching for, or editing an application entity, enter or update information in the following sections:

- "Identity" below. The fundamental information that identifies the application.
- "Contacts" on page 105. The key contacts and stakeholders of the application.
- "Business Environment" on page 107. The critical business properties of the application.
- "Technical Environment" on page 109. The technologies used in the construction of the application, connectivity to other systems, and planned disposition.
- "Budget & Resources" on page 112. The nominal return, total cost of ownership, direct and indirect annual revenue, and average headcount supporting the application.
- "Service & Support" on page 113. The supporting environment and quality issues.
- "Usage & Scale" on page 115. The usage-based size measurements.
- "Rating" on page 116. The subjective measurements that reflect the business view of the application. These measurements are relative to the overall enterprise application portfolio.
- "Score" on page 129. The computed scores and adjustment factor for the total score.

Identity

In the Identity section, enter the fundamental information that identifies the application.

Note: The Identity section is a subsection of the header section.

All users can view the data in this section. Users assigned one or more of the following roles can edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Figure A-1. Application Identity section

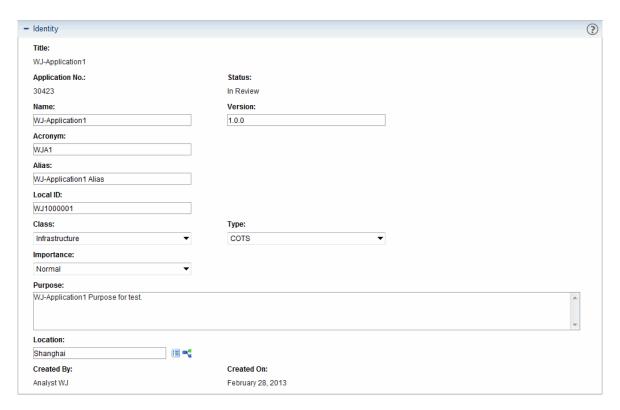


Table A-1. Application Identity fields

Field (*Required)	Description
Title	Read-only. The Title is automatically set to the application Name.
Application No.	Read-only. A unique numeric identifier of the application.

Table A-1. Application Identity fields, continued

Field (*Required)	Description
Status	Read-only. The status of the application.
	New - The application is being defined but has not been submitted.
	• In Review - The application details are currently under review as part of an assessment or data collection process.
	Need More Info - Additional information has been requested from the named respondent for the application.
	Active - The application is active and currently being managed by its owners.
	Snapshot - This is a static copy of the application information captured on a specific date.
	Retired - The application is no longer active. It has been decommissioned or has reached end-of-life and assessment is no longer needed.
	Cancelled - The application entity has been cancelled and its information is no longer valid.
*Name	A name given to the application that distinguishes it from other applications. The name must be unique in order to transition the application from In Review to Active status.
Version	The version information associated with the application.
Acronym	The acronym assigned to the application. Typically, this is defined by the organization most involved with the application.
Alias	An additional name assigned to the application.
Local ID	A unique identifier for the application from a client-operated inventory system, if applicable.
Class	The high-level purpose of the application.
	Infrastructure - An application that is used to support a system, such as a database, scheduler, or security monitor.
	Informational - An application that is used to store, communicate, or manipulate data, such as data storage or reporting.
	Transactional - An application that requires an act or process to be completed, such as order entry and payments.

Table A-1. Application Identity fields, continued

Field (*Required)	Description
Туре	 ASP - Application Service Provider. An application that is hosted and supported by an external organization and accessed over a network. Custom - An application that has been designed specifically for the organization. COTS - Commercial, Off-the-Shelf. An application that is developed by an ISV and customized for the organization. Composite - COTS and Custom. An application that consists of heterogeneous systems (COTS and/or custom) that are integrated together.
Importance	 Low - The application is rarely used and does not affect the performance and functioning of the organization. Normal - The application is used averagely and may or may not affect the performance and functioning of the organization. High - The application is widely used and may affect the performance and functioning of the organization. Critical - The application is required for the performance and functioning of the organization.
Purpose	The business or technical objective or function of the application.
Location	The physical location of the production application.
Created By	Read-only. The full name of the user who created the application entity.
Created On	Read-only. The date on which the application entity was created.

Contacts

In the Contacts section, enter the key contacts and stakeholders of the application.

Note: The Contacts section is a subsection of the header section.

All users can view the data in this section. Users assigned one or more of the following roles can edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Note: The application entity fields that users can view and edit are based on the roles to which the users are assigned in this section. For additional information about roles, see "The Role of the Analyst" on page 9.

Figure A-2. Application Contacts section

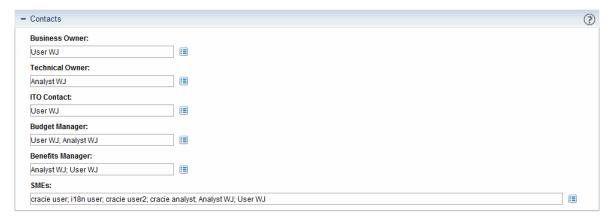


Table A-2. Application Contacts fields

Field	Description
Business Owner	The full name of the primary person with business authority for the application. If the user does not already have this ability, the Business Owner can view and edit application information in all sections.
Technical Owner	The full name of the primary person with technical authority for the application. If the user does not already have this ability, the Technical Owner can view and edit application information in the header, Business Environment, Technical Environment, Service & Support, Usage & Scale, Rating, and Score sections.
ITO Contact	The full name of the primary person to contact regarding the infrastructure supporting the application. No additional abilities are added for this role. (All users, regardless of whether they are assigned a role, can view application information in the header, Business Environment, Technical Environment, and Usage & Scale sections.)
Budget Manager	The full name of the person who is authorized to record the forecasted and actual costs for the application. If the user does not already have this ability, the Budget Manager can view application information in the header, Business Environment, Technical Environment, Budget & Resources, and Usage & Scale sections. The Budget Manager can also view and edit budget information that is accessed from the Financial Summary link in the Budget & Resources section.

Table A-2. Application Contacts fields, continued

Field	Description
Benefits Manager	The full name of the person who is authorized to record the financial benefits of the application. If the user does not already have this ability, the Benefits Manager can view application information in the header, Business Environment, Technical Environment, Budget & Resources, and Usage & Scale sections. The Benefits Manager can also view and edit benefits information that is accessed from the Financial Summary link in the Budget & Resources section.
Respondent	The full name of the user asked to supply additional information about this application. If the user does not already have this ability, the Respondent can view and edit application information in all sections. This field is required when more information is requested for an entity. This field is displayed after a request for more information is sent.
Respondent Note	Comments sent by email to the respondent when additional information about the application is requested. This field is displayed after a request for more information is sent.
SMEs	Zero, one, or more full names of the subject matter experts (SMEs)—or acknowledged specialists—for the application. If the user does not already have this ability, the SME can view application information in the header, Business Environment, Technical Environment, Usage & Scale, Rating, and Score sections.

Business Environment

In the Business Environment section, enter the critical business properties of the application.

All users can view the data in this section. Users assigned one or more of the following roles can edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Figure A-3. Application Business Environment section



Table A-3. Application Business Environment fields

Field	Description
Supported Processes	Zero, one, or more business processes that are supported by the application.
Owning Organization	The name of the organization unit with business ownership of the application. Organization units are created in Project and Portfolio Management Center (PPM Center). (For instructions for creating organization units, see the HP Resource Management User's Guide.)
Regulatory Requirement	Zero, one, or more compliance requirements for the application.
	SOX - Sarbanes-Oxley Act. United States regulations for corporate financial accounting.
	FERC - Federal Energy Regulatory Commission. United States regulations for energy transmission.
	NERC - North American Electric Reliability Corporation. North American regulations for energy transmission.
	CPCU - Chartered Property Casualty Underwriter. Professional designation in the insurance industry.
	CAISO - California Independent System Operator. Regulations for California's power grid.
	HIPAA - Health Insurance Portability and Accountability Act. Regulations for privacy of personal information.
	PCI - Payment Card Industry Data Security Standard. Standards for the payment card industry.

Table A-3. Application Business Environment fields, continued

Field	Description
Security Classification	The highest security level designated for the components of this application. That is, if the components of this application have different security classifications, select the highest classification.
	Open - Contains information with no access constraints. Unusual in a business context unless providing support for open source development.
	Internal - Contains information for which access is restricted to users within an organization.
	Limited - Contains information for which access is restricted to a defined set of users.
	Confidential - Contains sensitive corporate information.
	SECRET - Contains information for which improper release may damage the organization.
	Top Secret - In a military or government context, contains information for which access is strictly controlled.
	Above Top Secret - Contains extremely sensitive information.

Technical Environment

In the Technical Environment section, enter the technologies used in the construction of the application, connectivity to other systems, and planned disposition.

All users can view the data in this section. Users assigned one or more of the following roles can edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Figure A-4. Application Technical Environment section

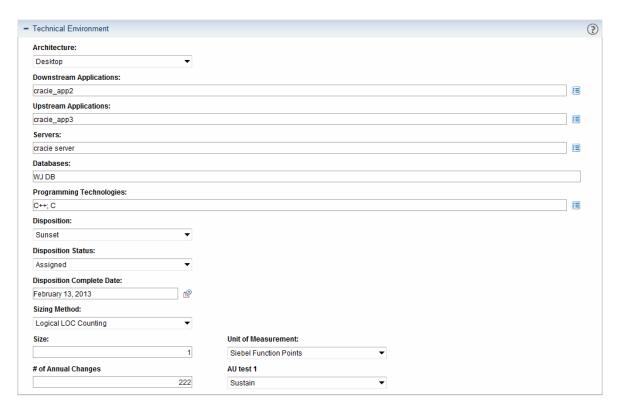


Table A-4. Application Technical Environment fields

Field	Description
Architecture	The type of system on which the application is deployed.
	Mainframe
	Distributed
	Desktop
	Other
Downstream Applications ^a	Zero, one, or more applications that depend on this application's output or updates.
Upstream Applications ^a	Zero, one, or more applications that produce output or updates on which this application depends.
Servers	The names of the servers on which the application is deployed.
Databases	The names of the databases that the application uses.
Programming Technologies	Zero, one, or more programming, scripting, or descriptive languages or technologies that are used to construct the application.

Table A-4. Application Technical Environment fields, continued

Field	Description
Disposition	The next planned step in the lifecycle of the application.
	Invest - Keep and enhance.
	Sustain - Keep and maintain.
	Sunset - Keep but plan for replacement.
	Decommission - Retire.
Disposition Status	The progress of the selected disposition.
	Proposed - The disposition of the application needs review.
	Assigned - The disposition of the application has been assigned an owner.
	In-Progress - The disposition of the application is currently ongoing.
	Complete - The disposition of the application has been concluded.
Disposition Complete Date	The date on which the disposition of the application is planned to be completed.
Sizing Method	Methodology used to compute the size of the application.
	IFPUG Counting - International Function Point Users Group function point counting.
	Backfired - Function point counting based on lines of code.
	Use Case Point Counting - Function point counting based on use cases.
	Logical LOC Counting - Lines of code.
	Custom Method - Other method to compute the size of the application.
Size	The measurement based on the sizing method.

Table A-4. Application Technical Environment fields, continued

Field	Description
Unit of Measurement	The unit of measurement for the sizing method.
	Number of Pages
	Kilo Lines of Code
	Unadjusted Function Points
	ABAP Feature Points
	Siebel Function Points
	Adjusted Use Case Point
	Number of Test Cases
# of Annual Changes	The number of change requests submitted per year.

a. When you configure an upstream or downstream relationship in an entity, you cannot see the relationship between the entities when you view the second entity. Make sure you also configure the relationship in the second entity so the relationship is visible in both entities. For example, if you configure entity B as a downstream entity in entity A, also configure entity A as an upstream entity in entity B. (This is not necessary for viewing relationships in dynamic graphing. Both relationships are visible when you view them in dynamic graphing regardless of whether they are configured in both entities.)

Budget & Resources

In the Budget & Resources section, enter the nominal return, total cost of ownership, direct and indirect annual revenue, and the average headcount supporting the application.

The owner of the entity and users assigned one or more of the following roles can view the data in this section: Business Owner, Budget Manager, Benefits Manager, and Respondent (when more information is requested). Users assigned one or more of the following roles can edit the data in this section: Business Owner and Respondent (when more information is requested).

Authorized users can access and edit the application's financial summary by clicking the link in the Financial Summary field. For additional information about the financial summary, see the description of the Financial Summary field in "Table A-5. Application Budget & Resources fields" on the next page.

Figure A-5. Application Budget & Resources section



Table A-5. Application Budget & Resources fields

Field	Description
Financial Summary	A link to the financial summary of the application. The financial summary captures monthly forecast and actual costs and benefits.
	This link is available only to users designated as the application entity's Business Owner, Budget Manager, Benefits Manager, Respondent (when more information is requested), or owner.
	Only application entities and transformation proposals have financial summaries. Each application entity and transformation proposals has its own financial summary.
	For more information about financial summaries, see the <i>HP Financial Management User's Guide</i> .
Nominal Return (ROI)	The difference between total planned benefits (revenue) and total planned costs.
	Nominal Return = Total Planned Benefits – Total Planned Costs
Total Cost of Ownership	The total cost to own and operate the application, including direct and indirect costs.
Direct Annual Revenue	The amount of annual revenue the application contributes to the enterprise.
Indirect Annual Revenue	The amount of annual revenue that can be attributed to the application through a sharing function.
Resource Count (#)	The average number of resources supporting the application at any one time.

Service & Support

In the Service & Support section, enter the supporting environment and quality issues.

Users assigned one or more of the following roles can view and edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Figure A-6. Application Service & Support section

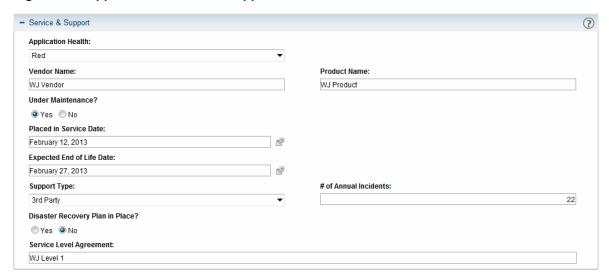


Table A-6. Application Service & Support fields

Field	Description
Application Health	A color-coded indicator of the application's health. Red - Risks identified that may have adverse impact Yellow - Issues identified, but being managed Green - No issues exist
Vendor Name	The vendor of the application.
Product Name	The product name of the application.
Under Maintenance?	Indicates if the application has a current maintenance contract.
Placed in Service Date	The deployment date of the application to production.
Expected End of Life Date	The expected retirement date of the application. Typically this does not apply to a specific version of the application but to the application itself.
Support Type	 In-House - Maintenance is provided by the organization. Vendor - Maintenance is provided by the vendor of the application. 3rd Party - Maintenance is provided by another source that is not inhouse nor the vendor (for example, a contractor). None - No maintenance is provide.
# of Annual Incidents	The number of incidents for the application tracked in a year.

Table A-6. Application Service & Support fields, continued

Field	Description
Disaster Recovery Plan in Place?	Indicates if the application has a disaster recovery plan.
Service Level Agreement	The service level specified in the application's service contract. For example, guaranteed uptime, performance periods (24 hours for five days a week), or percentage of dropped calls.

Usage & Scale

In the Usage & Scale section, enter the usage-based size measurements.

All users can view the data in this section. Users assigned one or more of the following roles can edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Figure A-7. Application Usage & Scale section

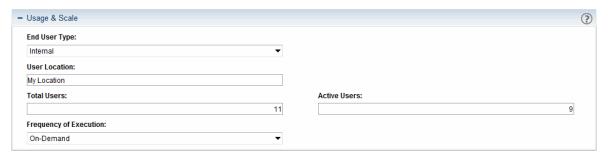


Table A-7. Application Usage & Scale fields

Field	Description
End User Type	The class of the user that operates the application.
	Internal - Employees
	External - Clients
	All - Both employees and clients
User Location	The geographical or organizational distribution of users. For example, North America or Marketing.
Total Users	The size of the user community of the application.
Active Users	The average number of active users during standard operation of the application.

Table A-7. Application Usage & Scale fields, continued

Field	Description
Frequency of Execution	How often the application is run or is accessible.
	Online - Application is online 24x7, and may be accessed at anytime.
	Asynchronous - Application is run or accessed based on an asynchronous event or activity.
	On-Demand - Application is run and accessed only when needed.
	 Nightly - Application is run on a nightly basis, generally as a batch process.
	Weekly - Application is run on a weekly basis.
	Monthly - Application is run on a monthly basis.
	Quarterly - Application is run once a quarter.
	Yearly - Application is run once a year.

Rating

In the Rating section, enter subjective measurements that reflect the business view of the application. These measurements are relative to the overall enterprise application portfolio.

Users assigned one or more of the following roles can view the data in this section: Business Owner, Technical Owner, Respondent (when more information is requested), or SME. Users assigned one or more of the following roles can edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Figure A-8. Application Rating section

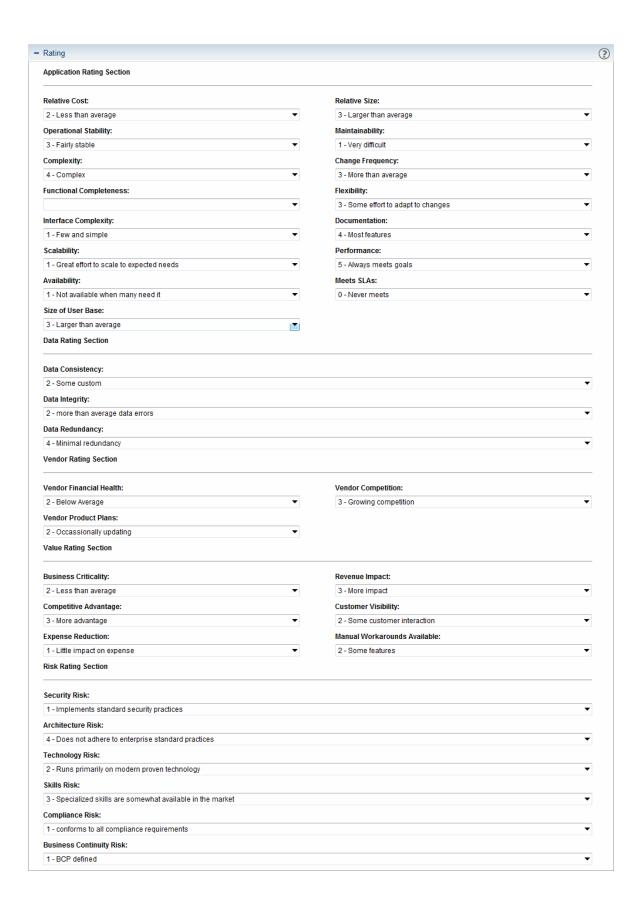


Table A-8. Application Rating fields

Field	Description
Relative Cost	The total cost of the application compared to other applications in the portfolio (including licenses, underlying hardware costs, minor enhancements, and support).
	0 - Least expensive
	• 1 - Inexpensive
	• 2 - Less than average
	• 3 - More than average
	• 4 - Expensive
	5 - Most expensive
Relative Size	The size of the application compared to the size of the typical application in the portfolio.
	0 - Extra small
	• 1 - Small
	2 - Smaller than average
	3 - Larger than average
	• 4 - Large
	5 - Extra large
Operational Stability	The reliability and dependability of the application during required operational hours at required locations.
	0 - Most unstable
	1 - Very unstable
	• 2 - Slightly unstable
	3 - Fairly stable
	• 4 - Very stable
	5 - Always stable

Table A-8. Application Rating fields, continued

Field	Description
Maintainability	The upkeep of the application compared to other applications in the portfolio. • 0 - Impossible to maintain • 1 - Very difficult • 2 - Some difficulty • 3 - Occasional difficulties • 4 - Easy to maintain • 5 - Simple to maintain
Complexity	The complicatedness and intricacy of the application compared to other applications in the portfolio. Complexity may be related to objective measurements such as the size of the application or the number of connections to other applications. • 0 - Extra simple • 1 - Simple • 2 - Simpler than average • 3 - More complex than average • 4 - Complex • 5 - Extra complex
Change Frequency	The number of times the system changes relative to the amount of change requests and incidents. • 0 - Very rarely • 1 - Infrequently • 2 - Less than average • 3 - More than average • 4 - Frequently • 5 - Excessively

Table A-8. Application Rating fields, continued

Field	Description
Functional Completeness	The satisfaction of business requirements.
	0 - Needs the most work
	1 - Needs some work
	2 - Needs a little work
	3 - Has many features
	4 - Has most needed features
	5 - Has all needed features
Flexibility	The ability to modify the application when requirements change (for example, changes to standards, compliance, or regulations).
	• 0 - Rigid
	1 - Great effort to adapt to changes
	2 - Significant effort to adapt to changes
	3 - Some effort to adapt to changes
	4 - Little effort to adapt to changes
	5 - Adapts to changes through configuration
Interface Complexity	The changes needed to integrate the application with other applications.
	0 - Self contained (standalone)
	• 1 - Few and simple
	2 - Some with average complexity
	3 - Some more complex
	• 4 - Many
	5 - Many or most complex

Table A-8. Application Rating fields, continued

Field	Description
Documentation	The completeness of the user documentation.
	• 0 - None
	• 1 - Little
	2 - Some features
	3 - More features
	4 - Most features
	• 5 - Complete
Scalability	The ability of the application to support fluctuations in demand.
	0 - Cannot scale to expected needs
	1 - Great effort to scale to expected needs
	2 - Some effort to scale to expected needs
	3 - Little effort to scale to expected needs
	4 - Scales to expected needs
	5 - Meets expected needs
Performance	The ability of the application to meet performance goals (for example, response time under maximum load or time to completion).
	0 - Never meets goals
	1 - Seldom meets
	2 - Meets less than average
	3 - Meets more than average
	4 - Usually meets
	5 - Always meets goals

Table A-8. Application Rating fields, continued

Field	Description
Availability	User accessibility of the application during required operational hours.
	0 - Not available when needed
	1 - Not available when many need it
	2 - Not available when some need it
	3 - Available when some need it
	4 - Available when many need it
	5 - Available when needed
Meets SLAs	The ability to meet service level agreements or implicit expectations and needs.
	0 - Never meets
	1 - Seldom meets
	2 - Meets less than average
	3 - Meets more than average
	4 - Usually meets
	5 - Always meets
Size of User Base	The number of users compared to the number of applications in the enterprise.
	0 - Extra small
	• 1 - Small
	2 - Smaller than average
	3 - Larger than average
	• 4 - Large
	• 5 - Extra large

Table A-8. Application Rating fields, continued

Field	Description
Data Consistency	The alignment of the application's data model with enterprise and industry standards. • 0 - Uses custom data formats and definitions • 1 - Mostly custom • 2 - Some custom • 3 - Some standard • 4 - Mostly standard • 5 - Uses enterprise standard data formats and definitions
Data Integrity	The validity and consistency of data contained in the application. For
Data integrity	example, are all dates entered in a mm/dd/yy format and does each date include all attributes?
	0 - Data errors and inconsistencies permeate the system
	1 - Many data errors enter the system
	2 - More than average data errors
	3 - Few data errors enter the system
	4 - Seldom data errors enter the system
	5 - edits and validations ensure consistent data values throughout
Data Redundancy	The profusion of the same data in multiple data sources distributed across the enterprise.
	0 - Highly redundant with other data sources
	1 - Many redundant elements
	2 - Some redundancy
	3 - Few redundant elements
	4 - Minimal redundancy
	5 - No redundancy with other data sources

Table A-8. Application Rating fields, continued

Field	Description
Vendor Financial Health	The financial soundness of the vendor. • 0 - Bankrupt
	1 - Questionable
	2 - Below average
	3 - Above average
	• 4 - Strong
	• 5 - Rock solid
Vendor Competition	The maturity of the competitive landscape and the availability of alternate vendors.
	0 - No competitors
	1 - Emerging competitors
	• 2 - Some competition
	3 - Growing competition
	4 - Alternatives widely available
	• 5 - Commodity
Vendor Product Plans	The maturity of the application and if the enterprise affects the design process.
	0 - Off maintenance
	1 - Maintenance only
	2 - Occasionally updating
	3 - Actively updating
	4 - Plans aligned to needs
	• 5 - Design partner

Table A-8. Application Rating fields, continued

Field	Description
Business Criticality	The importance of the application to the success and survivability of the business.
	0 - Least critical
	1 - Slightly critical
	• 2 - Less than average
	3 - More than average
	• 4 - Critical
	5 - Highly critical
Revenue Impact	The effect of the application, either directly or indirectly, on revenue.
	• 0 - None
	• 1 - Little
	2 - Some impact
	• 3 - More impact
	4 - Great impact
	5 - Highest impact
Competitive Advantage	The gain this application provides compared to other vendor's similar applications.
	• 0 - None
	• 1 - Little
	2 - Some advantage
	3 - More advantage
	4 - Great advantage
	• 5 - Dominance

Table A-8. Application Rating fields, continued

Field	Description
Customer Visibility	The accessibility of the application to the customer.
	0 - Internal facing
	1 - Some customer impact
	2 - Some customer interaction
	3 - Customer facing
	4 - Primary customer channel
	5 - Global customer dependence
Expense Reduction	The decrease in costs when the application is used.
	0 - No impact on expense
	1 - Little impact on expense
	2 - Some impact on expense
	3 - More impact on expense
	4 - Expense containment
	5 - Major expense reduction
Manual Workarounds Available	The availability of manual processes to accomplish the same business function.
	• 0 - No
	1 - Few features
	2 - Some features
	• 3 - Many features
	• 4-Yes
	5 - Yes and tested

Table A-8. Application Rating fields, continued

Field	Description
Security Risk	The liability of the application in regards to access and security.
	0 - Conforms to security best practices
	1 - Implements standard security practices
	2 - Provides some degree of access and data security
	3 - Provides some degree of access or data security
	4 - Provides little security protections
	5 - No security protections
Architecture Risk	The liability of the application in regards to the architecture defined by the organization.
	0 - Conforms to architecture best practices
	1 - Adheres to enterprise standard practices
	2 - Partially adheres to enterprise standard practices
	3 - Minimally adheres to enterprise standard practices
	4 - Does not adhere to enterprise standard practices
	5 - No architecture standards defined
Technology Risk	The liability of the application based on the technology it utilizes.
	0 - Runs on modern, proven, standard technology
	1 - Runs on standard technology
	2 - Runs primarily on modern, proven technology
	3 - Utilizes some non-standard technology
	4 - Utilizes some obsolete, non-standard technology
	5 - Runs entirely on obsolete technology

Table A-8. Application Rating fields, continued

Field	Description
Skills Risk	The liability of the application in regards to the availability of users with the ability to run the application.
	0 - Skills exist in-house
	1 - Skills are readily available in the market
	2 - Skills are specialized but available in-house
	3 - Specialized skills are somewhat available in the market
	4 - Specialized skills are in limited supply
	5 - Highly specialized skills are scarcely available in the market
Compliance Risk	The liability of the application based on regulatory requirements and compliance validation.
	0 - No requirements or independently audited compliance with all requirements
	1 - Conforms to all compliance requirements
	2 - Non-compliance identified and correction plans in place
	3 - Non-compliance identified but no correction plans in place
	4 - Unknown compliance requirements
	5 -Non-compliance identified that cannot be corrected
Business Continuity Risk	The liability of the application based on data backups and the availability of a business continuity plan (BCP). The liability may be affected by the criticality of the application to the enterprise.
	0 - BCP defined, tested, and operational
	• 1 - BCP defined
	2 - Data securely backed up and manual workarounds in place
	3 - Data backed up regularly
	4 - Data backed up irregularly
	5 - No BCP or manual workarounds defined

Score

In the Score section, view the computed scores and enter an adjustment factor for the total score.

Users assigned one or more of the following roles can view the data in this section: Business Owner, Technical Owner, Respondent (when more information is requested), or SME. Users assigned one or more of the following roles can edit the data in this section: Business Owner, Technical Owner, or Respondent (when more information is requested).

Figure A-9. Application Score section



Table A-9. Application Score fields

Field	Description
Application Score	Read-only. The rating of the application, from zero to five (zero being the worst and five being the best).
	By default, the application score is calculated from non-empty individual ratings defined in the Application Rating Section. The formula for the application score may be customized.
	Application Score = [(5 – Relative Cost) + (5 – Relative Size) + Operational Stability + Maintainability + (5 – Change Frequency) + Functional Completeness + Flexibility + (5 – Interface Complexity) + Documentation + Performance + Availability + Meets SLAs + Size of User Base] / (number of non-empty ratings)
Data Score	Read-only. The rating of the data provided by the application, from zero to five (zero being the worst and five being the best).
	By default, the data score is the average of non-empty individual ratings in the Data Rating Section. The formula for the data score may be customized.
	Data Score = (Data Consistency + Data Integrity + Data Redundancy) / (number of non-empty ratings)

Table A-9. Application Score fields, continued

Field	Description
Vendor Score	Read-only. The rating of the vendor of the application, from zero to five (zero being the worst and five being the best).
	By default, the vendor score is the average of non-empty individual ratings in the Vendor Rating Section. The formula for vendor score may be customized.
	Vendor Score = (Vendor Financial Health + Vendor Competition + Vendor Product Plans) / (number of non-empty ratings)
Value Rating	Read-only. The qualitative measure of the business value of the application, from zero to five (zero being the worst and five being the best).
	By default, the value rating is the average of non-empty individual ratings in the Value Rating Section. The formula for value rating may be customized.
	Value Rating = (Business Criticality + Revenue Impact + Competitive Advantage + Customer Visibility + Expense Reduction + Manual Workarounds Available) / (number of non-empty ratings)
Risk Rating	Read-only. The qualitative measure of the technical debt of the application, from zero to five (zero being the worst and five being the best). The risk rating is calculated from values defined in the Risk Rating Section of the Rating section.
	By default, the risk rating is the average of non-empty individual ratings in the Risk Rating Section. The formula for risk rating may be customized.
	Risk Rating = (Security Risk + Architecture Risk + Technology Risk + Skills Risk + Compliance Risk + Business Continuity Risk) / (number of non-empty ratings)
Score Adjustment (%)	Percentage adjustment (positive or negative) made to the total score.
Total Score	Read-only. The sum of all ratings and scores with the Score Adjustment applied.
	Total Score = [Application Score + Data Score + Vendor Score + Value Rating + (5 – Risk Rating)] * [1 + (Score Adjustment / 100)]

Application Set

An application set entity is a user-defined grouping of applications.

When creating, searching for, or editing an application set, enter or update information in the following sections:

- "Summary" below. The fundamental information about the application set.
- "Scope" below. The applications in the application set.

Summary

In the Summary section, enter the fundamental information about the application set.

Figure A-10. Application set Summary section



Table A-10. Application set Summary fields

Field (*Required)	Description
Set No.	Read-only. A unique numeric identifier of the application set.
Status	Read-only. The status of the application set.
	New - The application set is being defined but has not been submitted.
	Active - The application set is active.
	Change Pending - The application set is being modified.
	Cancelled - The application set has been cancelled and its information is no longer valid.
*Set Name	A descriptive, distinct, and unambiguous name for the application set.
Description	Information that describes the need and function of the application set.
Created By	Read-only. The full name of the user who created the application set.
Created On	Read-only. The date on which the application set was created.

Scope

In the Scope section, enter the applications that are part of the application set.

Figure A-11. Application set Scope section



Table A-11. Application set Scope fields

Field (*Required)	Description
Seq	The sequence number of the application.
*Name	The name of the application in the application set. This field is required when you add a row to the table.

Location

A location entity is a distinct and unambiguous location of an application, server, or a grouping of locations.

When creating, searching for, or editing a location, enter or update information in the following sections:

- "Summary" below. The fundamental information about the location.
- "Address" on the next page. Information about the address and other geographical attributes.

Summary

In the Summary section, enter the fundamental information about the location.

Figure A-12. Location Summary section



Table A-12. Location Summary fields

Field (*Required)	Description
Location No.	Read-only. A unique numeric identifier of the location.
Status	 Read-only. The status of the location. New - The location is being defined but has not been submitted. Active - The location is active and currently being managed by its owner. Change Pending - The location is being modified. Cancelled - The location has been cancelled and its information is no
*Location Name	longer valid. A distinct and unambiguous name for the location.
Description	Information that describes the important attributes of the location from a business or IT point of view.
Parent Location	The Location Name of the location of which this location, hierarchically, is a child.
Owner	The full name of the person in the organization responsible for ensuring that this location is up-to-date. The owner is allowed to edit information about this location.
Created By	Read-only. The full name of the user who created the location entity.
Created On	Read-only. The date on which the location entity was created.

Address

In the Address section, enter information about the location address and other geographical attributes.

Figure A-13. Location Address section



Table A-13. Location Address fields

Field	Description
Address	Street number and street name of the location.
City	City name of the location.
State/Province	State name (U.S.) or province name (Canada).
Postal Code	Postal code, postcode, ZIP code, or PIN code of the location.
Country	Country name of the location.
Region	Geographic area of the location.
	Americas
	EMEA (Europe, Middle East, Africa)
	Asia Pacific
Longitude	Longitudinal geographic coordinate of the location.
Latitude	Latitudinal geographic coordinate of the location.

Process

A process entity is a standard set of actions or operations that moves the organization towards achieving a business objective.

When creating, searching for, or editing a process, enter or update information in the following sections:

- "Summary" on the next page. The fundamental information about the process.
- "Compliance" on page 136. The information about compliance requirements and if they are met.

Summary

In the Summary section, enter the fundamental information about the process.

Figure A-14. Process Summary section



Table A-14. Process Summary fields

Field (*Required)	Description
Process No.	Read-only. A unique numeric identifier of the process.
Status	Read-only. The status of the process.
	New - The process is being defined but has not been submitted.
	Active - The process is active and currently being managed by its owner.
	Change Pending - The process is being modified.
	Cancelled - The process has been cancelled and its information is no longer valid.
*Process Name	A distinct and unambiguous name for the process that corresponds to standard industry usage.
Description	Information that describes the need and function of the process.
Parent Process	The Process Name of the process of which this process, hierarchically, is a child.

Table A-14. Process Summary fields, continued

Field (*Required)	Description
*Process Type	A definition of where the process is completed. Each process must be associated with a process type on creation.
	Direct - A process completed explicitly by the organization.
	Indirect - A process completed by a client or third party.
Owner	The full name of the person in the organization responsible for ensuring that this process is carried out. The owner is allowed to edit information about this process.
Created By	Read-only. The full name of the user who created the process entity.
Created On	Read-only. The date on which the process entity was created.

Compliance

In the Compliance section, enter information about compliance requirements and if they are met.

Figure A-15. Process Compliance section



Table A-15. Process Compliance fields

Field	Description
Compliance	Zero, one, or more compliance requirements for the process.
Requirements	SOX - Sarbanes-Oxley Act. United States regulations for corporate financial accounting.
	• FERC - Federal Energy Regulatory Commission. United States regulations for energy transmission.
	NERC - North American Electric Reliability Corporation. North American regulations for energy transmission.
	CPCU - Chartered Property Casualty Underwriter. Professional designation in the insurance industry.
	CAISO - California Independent System Operator. Regulations for California's power grid.
	HIPAA - Health Insurance Portability and Accountability Act. Regulations for privacy of personal information.
	PCI - Payment Card Industry Data Security Standard. Standards for the payment card industry.
Compliant	Indicates if the process conforms with the selected Compliance Requirements.

Roadmap

A Roadmap entity is a roadmap for an individual application/service, or a group of applications/services, including lifecycle statuses (roadmap phases) and milestones. You can create a roadmap entity for any other existing APM entity.

When creating, searching for, or editing a location, enter or update information in the following sections:

- "Identity" below
- "Phases" on the next page
- "Milestones" on page 140

Identity

In the Identity section, enter the fundamental information that identifies the roadmap.

Note: The Identity section is a subsection of the header section.

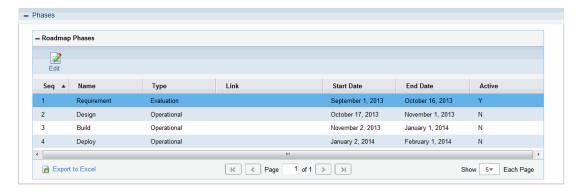


The table below describes the Identity fields.

Field (*Required)	Description
Roadmap ID	ID of the roadmap
Roadmap Status	 New - The roadmap is created but not submitted. Draft - The roadmap is submitted but not finalized. Proposed - The roadmap is finalized but not activated. Active - The roadmap is activated but not archived. Cancelled - The roadmap is cancelled. Archived - The roadmap is archived.
Roadmap Type*	Available roadmap types include: Application Portfolio Note: These two types are available by default. Customized roadmap types can be created in the PPM Workbench by the APM administrator to meet your organization's business needs and requirements.
Created On	Read-only. The date on which the roadmap was created
Created By	Read-only. The full name of the user who created the roadmap
Entity*	The entity for which the roadmap is created Note: If an entity has a roadmap that is in "Active" status, you are not able to create another roadmap for this entity.

Phases

In the Phases section, enter the information of the phases the roadmap would go through.



The table below describes the Roadmap Phases fields.

Field (*Required)	Description
Seq	Sequence of the roadmap phase
Name	Name of the roadmap phase
Туре	Type of the roadmap phase. Available values include: Evaluation Planned Operational Archived Planned Decommissioned Note: These five types are available by default. APM administrator can create customized types of roadmap phases in the PPM Workbench to meet your organization's business needs and requirements.
Link	URL or any other kind of link of the roadmap phase
Start Date	Start date of the roadmap phase
End Date	End date of the roadmap phase
Active	Indicates whether or not the roadmap phase is active

Edit Roadmap Phases

To edit Roadmap Phases, click Edit. The Roadmap Phases section changes into the Edit view.

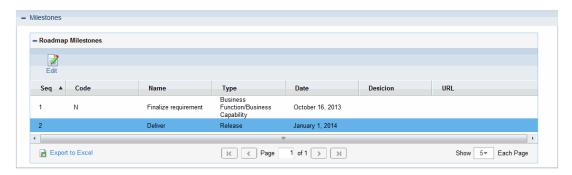


Under the Edit view, you can do the followings to edit the phases:

- Edit the existing phases information
- Add a new phase by clicking Add Row
- Delete a phase by clicking Delete Row after selecting the phase you want to delete
- Create a phase based on an existing phase by selecting the existing phase and then clicking Copy and Paste
- Adjust the phases sequence by clicking Move Up or Move Down after selecting the desired phase

Milestones

In the Milestones section, enter the information of the milestones you set for the roadmap.



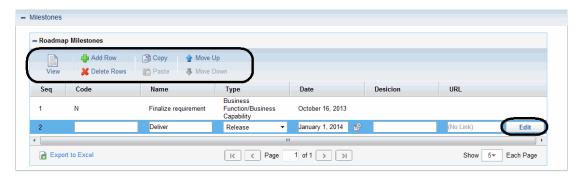
The table below describes the Roadmap Milestone fields.

Field (*Required)	Description
Seq	Sequence of the roadmap milestone
Code	Code of the roadmap milestone
Name	Name of the roadmap milestone

Туре	Type of the roadmap milestone. Available values include: Major Decision Point Minor Decision Point Release De-Investment Business Function/Business Capability Technology Capability
	Note: These six types are available by default. Customized types of roadmap milestones can be created in the PPM Workbench by the APM administrator to meet your organization's business needs and requirements.
Date	Date of the roadmap milestone
Decision	Decision that has been made in this milestone
URL	URL of the milestone information

Edit Roadmap Milestones

To edit Roadmap Milestones, click Edit. The Roadmap Milestones section changes into the Edit view.



Under the Edit view, you can do the followings to edit the milestones:

- Edit the existing milestones information
- Add a new milestone by clicking Add Row
- Delete a milestone by clicking Delete Row after selecting the milestone you want to delete
- Create a milestone based on an existing milestone by selecting the existing milestone and then clicking **Copy** and **Paste**
- Adjust the milestones sequence by clicking Move Up or Move Down after selecting the desired milestone

Note: If you want to edit the URL field of a milestone, you may have to click **Edit** at the end of the milestone line to open the Link Properties window.

Server

A server entity is a physical or virtual machine.

When creating, searching for, or editing a server, enter or update information in the following section:

• "Summary" below. The fundamental information about the server.

Summary

In the Summary section, enter the fundamental information about the server.

Figure A-16. Server Summary section

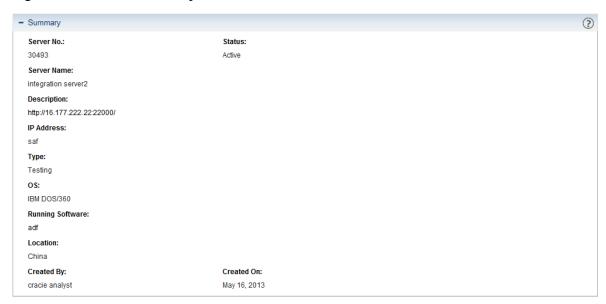


Table A-16. Server Summary fields

Field (*Required)	Description
Server No.	Read-only. A unique numeric identifier of the server.

Table A-16. Server Summary fields, continued

Field (*Required)	Description
Status	Read-only. The status of the server.
	New - The server is being defined but has not been submitted.
	Active - The server is active.
	Change Pending - The server is being modified.
	Cancelled - The server has been cancelled and its information is no longer valid.
*Server Name	A distinct and unambiguous name for the server.
Description	Information that describes the important attributes of the server, from a business or IT point of view.
IP Address	Internet Protocol address of the server.
Туре	Function of the server.
	Development
	Testing
	• Production
OS	The operating system on which the server is running.
Running Software	List of major software packages or applications running on the server. The list is comma-delimited. Do not include operating system utilities.
Location	Physical location of the server.
Created By	Read-only. The full name of the user who created the server entity.
Created On	Read-only. The date on which the server entity was created.

Survey Registration

A survey registration entity is a query to collect data about an application to help with its analysis.

When creating, searching for, or editing a survey, enter or update information in the following sections:

- "Summary" on the next page. The fundamental information about the survey.
- "Details" on the next page. The information about the type of survey and the expected completion date.

Summary

In the Summary section, enter the fundamental information about the survey.

Figure A-17. Survey registration Summary section



Table A-17. Survey registration Summary fields

Field (*Required)	Description
Request No.	Read-only. A unique numeric identifier of the survey.
Status	Read-only. The status of the survey.
	New - The survey is being defined but has not been submitted.
	In Design - The survey is being scoped and has not been sent.
	Active - Surveys have been sent to the target audience for responses.
	Closed - The survey is not active and is no longer accepting responses.
	Cancelled - The survey has been cancelled and its information is no longer valid.
*Survey Name	A distinct, unambiguous, and descriptive name for the survey.
Created By	Read-only. The full name of the user who created the survey registration entity.
Created On	Read-only. The date on which the survey registration entity was created.

Details

In the Details section, enter information about the type of survey, the expected completion date, the applications it includes, and the respondents needed for the applications.

Figure A-18. Survey registration Details section

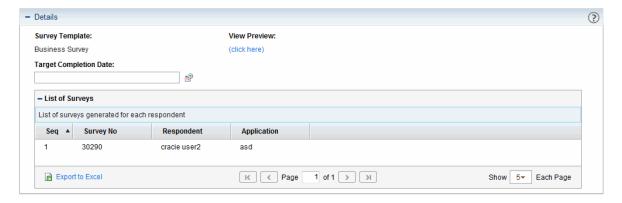


Table A-18. Survey registration Details fields

Field (*Required)	Description
*Survey Template	 Business Survey. Business-related ratings for the application, data, vendor, value, and risk. General Survey (Full). Application-related ratings for the
	 application, data, vendor, value, and risk. Technical Survey. Technical-related ratings for the application, data, vendor, and risk.
View Preview	A link to view the survey.
Target Completion Date	The date on which the survey closes. By default, every three days an email is sent to remind the survey respondent to complete the survey until this date is met.
*List of Applications & Respondents	A table containing the list of applications and respondents for the survey. After the survey registration entity is created, the fields in this table must be completed before the survey can be submitted. For descriptions of the icons in this table, see "Table 4-1. Table icons" on page 64.
	This table is named List of Surveys after the survey registration is submitted.
List of Surveys	Read-only. A table containing the list of surveys that were sent. Includes the survey number, and name of the application, and the respondent for each survey sent.
	This table is named List of Applications & Respondents before the survey registration is submitted.

Transformation Proposal

A transformation proposal entity is a consolidation of information used to make a decision about a proposed project. Transformation proposals may be imported as proposals into PPM Center for additional analysis.

When creating, searching for, or editing a transformation proposal, enter or update information in the following sections:

- "Summary" below. The fundamental information about the transformation proposal.
- "Proposal Details" on the next page. The information about the basic effort implication for the transformation proposal.
- "Business Case Details" on page 149. The information used to understand the transformation proposal and its expectations.
- "Value & Risk Assessment" on page 150. The information about the initial evaluation of risks and rewards.

Summary

In the Summary section, enter the fundamental information about the transformation proposal.

Figure A-19. Transformation proposal Summary section

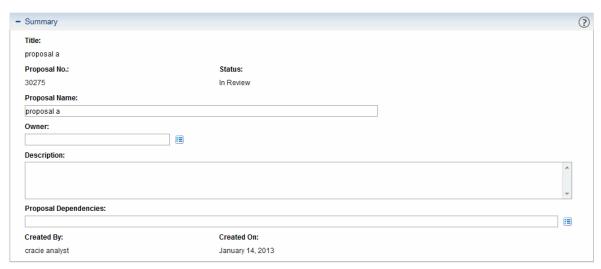


Table A-19. Transformation proposal Summary fields

Field (*Required)	Description
Title	Read-only. The description assigned to the transformation proposal when the transformation proposal is created.
Proposal No.	Read-only. A unique numeric identifier of the transformation proposal.
Status	Read-only. The status of the transformation proposal.
	 New - The transformation proposal is being defined but has not been submitted.
	In Review - The transformation proposal is currently under review.
	Approved - The transformation proposal has been approved for execution.
	Rejected - The transformation proposal has been rejected.
	Cancelled - The transformation proposal entity has been cancelled and its information is no longer valid.
*Proposal Name	A name given to the transformation proposal that distinguishes it from other transformation proposals. Although the name is not validated for uniqueness during initial creation, it must be unique in order to transition the transformation proposal from In Review to Active status.
Owner	The full name of the user who is proposing the transformation proposal. The owner is allowed to edit information about this transformation proposal.
Description	Information that describes the business value and applications affected by the transformation proposal.
Proposal Dependencies	Existing transformation proposals that must be completed successfully before this transformation proposal can be executed.
Created By	Read-only. The full name of the user who created the transformation proposal entity.
Created On	Read-only. The date on which the transformation proposal entity was created.

Proposal Details

In the Proposal Details section, enter information about the basic effort implication for the transformation proposal.

Figure A-20. Transformation proposal Proposal Details section

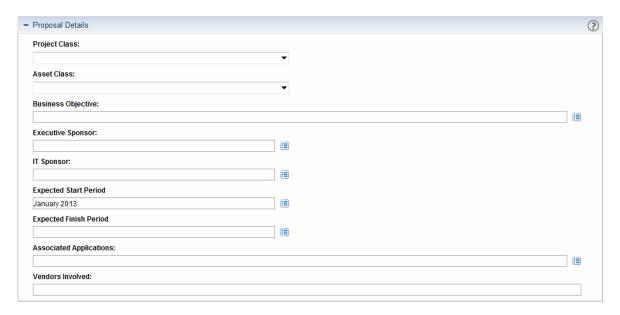


Table A-20. Transformation proposal Proposal Details fields

Field	Description
Project Class	The fundamental type of the project, used to determine business rules or policies that help manage the project. Innovation Growth Efficiency Core (Keep the Lights On)
Asset Class	The type of asset that is affected by the transformation proposal.
	 Infrastructure - Investments that provide a shared and standardized base of capability for the enterprise. Informational - Systems that provide information for managing an organization. Transactional - Transformation proposals that process and automate the basic transactions of an organization.
Business Objective	The result that the enterprise intends to achieve by completing the transformation proposal.
Executive Sponsor	The full name of the executive sponsor of the transformation proposal.
IT Sponsor	The full name of the IT leader of the group that is responsible for executing the transformation proposal.

Table A-20. Transformation proposal Proposal Details fields, continued

Field	Description
Expected Start Period	The month and year in which the project is expected to start.
Expected Finish Period	The month and year in which the project is expected to finish.
Associated Applications	The applications impacted by the transformation proposal.
Vendors Involved	The vendors of the associated applications who may be involved with the transformation proposal.

Business Case Details

In the Business Case Details section, enter information used to understand the transformation proposal and its expectations.

Authorized users can access and edit a transformation proposal's financial summary by clicking the link in the Financial Summary field. For additional information about the financial summary, see the description of the Financial Summary field in "Table A-21. Transformation proposal Business Case Details fields" below.

Figure A-21. Transformation proposal Business Case Details section

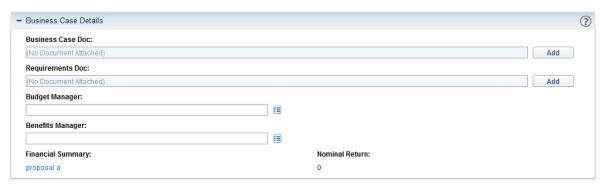


Table A-21. Transformation proposal Business Case Details fields

Field	Description
Business Case Doc	An attachment that explains the business case of the transformation proposal.
Requirements Doc	An attachment that explains the requirements of the transformation proposal.
Budget Manager	The full name of the person who is authorized to record the forecasted and actual costs for the application.
Benefits Manager	The full name of the person who is authorized to record the financial benefits of the application.

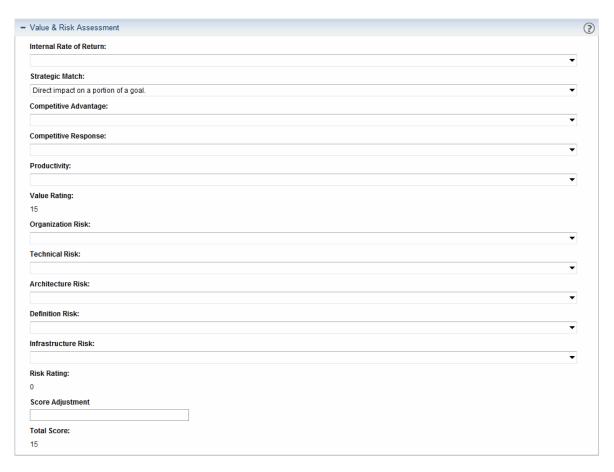
Table A-21. Transformation proposal Business Case Details fields, continued

Field	Description
Financial Summary	A link to the financial summary of the transformation proposal. The financial summary captures monthly forecast and actual costs and benefits.
	This link is available only to the owner of the transformation proposal and to users designated as the transformation proposal's Budget Manager or Benefits Manager.
	Only application entities and transformation proposals have financial summaries. Each application entity and transformation proposal has its own financial summary.
	For more information about financial summaries, see the HP Financial Management User's Guide.
Nominal Return	The difference between total planned benefits (revenue) and total planned costs.
	Nominal Return = Total Planned Benefits – Total Planned Costs

Value & Risk Assessment

In the Value & Risk Assessment section, enter information about the initial evaluation of risks and rewards.

Figure A-22. Transformation proposal Value & Risk Assessment section



In the Description column of "Table A-22. Transformation proposal Value & Risk Assessment fields" below, the numbers in parentheses are the values that are assigned to the list items when they are selected.

Table A-22. Transformation proposal Value & Risk Assessment fields

Field	Description
Internal Rate of Return	The profitability of the transformation proposal.
	• Zero or less (0)
	• 1 - 5.99% (10)
	• 6 - 9.99% (20)
	• 10 - 14.99% (30)
	• 15% and above (40)

Table A-22. Transformation proposal Value & Risk Assessment fields, continued

Field	Description
Strategic Match	How the transformation proposal affects the business objectives.
	No impacted business goals. (0)
	No impacted goal. Increases operational efficiency. (5)
	No direct impact of goal, but prerequisite. (10)
	Direct impact on a portion of a goal. (15)
	Direct achievement of a goal. (20)
	Direct achievement of multiple goals. (25)
Competitive Advantage	The impact the transformation proposal has on competitive positioning.
	No client or market impact. (0)
	 Improves operating efficiencies that affect competitive position. (5)
	Improves operating efficiencies in strategic area. (10)
	Provides some degree of outside access. (15)
	Provides moderate degree of outside access. (20)
	Provides high level of outside access. (25)
Competitive Response	The urgency of the transformation proposal relative to competitive positioning.
	Can be postponed for 12 months with no effect to competitive positioning. (0)
	Can be postponed for 12 months with minimal effect to competitive positioning. (2)
	 Can be postponed for 12 months with significant effect to competitive positioning. (4)
	Postponement will result in loss of competitive positioning. (6)
	 Postponement will result in complete loss of competitive positioning. (10)

Table A-22. Transformation proposal Value & Risk Assessment fields, continued

Field	Description
Productivity	The expected increase or decrease of productivity when the transformation proposal is completed. Decreased productivity (0) Less than 10% increase (2) 11 - 30% increase (4) 30 - 50% increase (6) 51% or more increase (10)
Value Rating	Read-only. The qualitative measure of the business value of the transformation proposal. By default, the value rating is the sum of non-empty individual ratings listed above the Value Rating field. The formula for value rating may be customized. Value Rating = Internal Rate of Return + Strategic Match + Competitive Advantage + Competitive Response + Productivity
Organization Risk	The liability of the transformation proposal based on its impact to the organization. No risk (0) Low risk (1) Medium low risk (2) Medium risk (3) High risk (4) Extreme risk (5)

Table A-22. Transformation proposal Value & Risk Assessment fields, continued

Field	Description
Technical Risk	The liability of the transformation proposal based on the technology it utilizes and the skills required to use the technology.
	No uncertainty (0)
	Very low uncertainty (3)
	Low uncertainty (6)
	Medium uncertainty (9)
	High uncertainty (12)
	Unknown (15)
Architecture Risk	The liability of the transformation proposal in regards to the architecture defined by the organization.
	Utilizes standard architecture (0)
	Minor change to standard architecture (2)
	Medium change to standard architecture (4)
	Major change to standard architecture (6)
	No leverage of standard architecture (10)
Definition Risk	How well the requirements are defined for the transformation proposal.
	Requirements are firm. No changes. (0)
	 Requirements are moderately firm. Low probability of changes. (2)
	 Requirements are moderately firm. Medium probability of changes. (4)
	• Requirements are moderately firm. High probability of changes. (6)
	Requirements are not firm (8)

Table A-22. Transformation proposal Value & Risk Assessment fields, continued

Field	Description
Infrastructure Risk	The liability of the transformation proposal in regards to the infrastructure of the organization.
	Uses existing systems and services (0)
	Small changes to existing infrastructure (1)
	Small changes and additions are expected (2)
	Moderate changes are expected (3)
	Moderate changes to multiple systems are expected (4)
	Substantial change to infrastructure are expected (5)
Risk Rating	Read-only. The qualitative measure of the risk of the transformation proposal to successfully complete. The risk rating is calculated from values defined in the Risk Rating Section of the Rating section.
	By default, the risk rating is the sum of non-empty individual ratings for all risks in the Value & Risk Assessment section. The formula for risk rating may be customized.
	Risk Rating = Organization Risk + Technical Risk + Architecture Risk + Definition Risk + Infrastructure Risk
Score Adjustment	Adjustment (positive or negative) made to the total score.
Total Score	Read-only. The difference between the Value Rating and Risk Rating with the Score Adjustment applied.
	Total Score = Value Rating – Risk Rating + Score Adjustment

Workstream

A workstream entity is a collection of resources working towards a common goal on a portion of the application or process portfolio.

When creating, searching for, or editing a workstream, enter or update information in the following sections:

- "Summary" on the next page. The fundamental information about the workstream.
- "Schedule" on page 157. The planned and actual start dates, finish dates, duration, and effort.
- "Staffing" on page 158. The users assigned to the workstream.
- "Scope" on page 158. The processes and applications impacted by the workstream.

Summary

In the Summary section, enter the fundamental information about the workstream.

Figure A-23. Workstream Summary section

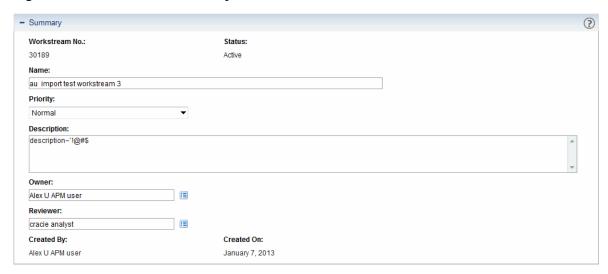


Table A-23. Workstream Summary fields

Field (*Required)	Description
Workstream No.	Read-only. A unique numeric identifier of the workstream.
Status	Read-only. The status of the workstream.
	New - The workstream is being defined but has not been submitted.
	Active - The workstream is active and currently being managed by its owner.
	In Review - The workstream is currently under review.
	Closed - The workstream is completed.
	Cancelled - The workstream has been cancelled and its information is no longer valid.
*Name	A distinct and unambiguous name for the workstream that reflects its intention.

Table A-23. Workstream Summary fields, continued

Field (*Required)	Description
Priority	 The importance of the workstream to the enterprise relative to other workstreams. Low - The workstream does not affect the performance and functioning of the enterprise and is of less importance compared to other workstreams within the enterprise. Normal - The workstream may or may not affect the performance and functioning of the enterprise and is of average importance compared to other workstreams within the enterprise. High - The workstream may affect the performance and functioning of the enterprise and is of more importance compared to other workstreams within the enterprise. Critical - The workstream is required for the performance and functioning of the enterprise.
Description	Information that describes the scope, effort, and timeline of the workstream.
Owner	The full name of the person who is responsible for executing the workstream. The owner is allowed to edit information about this workstream.
Reviewer	The full name of the person who is responsible for reviewing the workstream and verifying that the deliverables are met.
Created By	Read-only. The full name of the user who created the workstream entity.
Created On	Read-only. The date on which the workstream entity was created.

Schedule

In the Schedule section, enter the planned and actual start dates, finish dates, duration, and effort.

Figure A-24. Workstream Schedule section

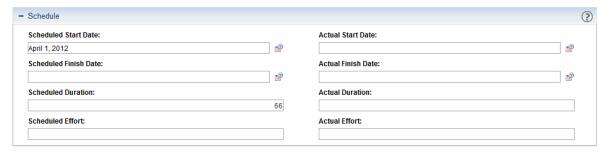


Table A-24. Workstream Schedule fields

Field	Description
Scheduled Start Date	The day on which the workstream is planned to start.
Actual Start Date	The day on which the workstream actually started.
Scheduled Finish Date	The day on which the workstream is planned to finish.
Actual Finish Date	The day on which the workstream actually finished.
Scheduled Duration	The planned number of work days needed to complete the workstream.
Actual Duration	The actual number of work days needed to complete the workstream.
Scheduled Effort	The planned number of working hours needed to complete the workstream.
Actual Effort	The actual number of working hours needed to complete the workstream.

Staffing

In the Staffing section, enter the users assigned to the workstream.

Figure A-25. Workstream Staffing section

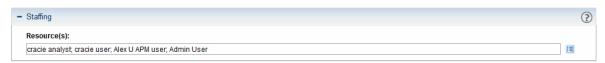


Table A-25. Workstream Staffing fields

Field	Description
Resource(s)	List of users, by full name, assigned to the workstream.

Scope

In the Scope section, enter the processes and applications impacted by the workstream.

Figure A-26. Workstream Scope section

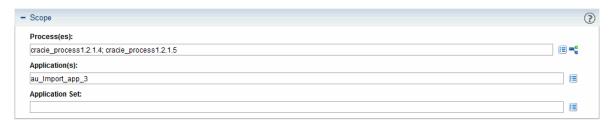


Table A-26. Workstream Scope fields

Field	Description
Process(es)	Zero, one, or more processes impacted by the workstream.
Application(s)	Zero, one, or more applications impacted by the workstream.
Application Set	The set of applications impacted by the workstream.

Appendix B: PPM Dashboard Pages and Portlets

Overview

The shared PPM Dashboard pages and shared and configurable portlets that HP Application Portfolio Management (HP APM) provides for HP APM analysts are described in the following sections:

- "Shared PPM Dashboard Pages and Portlets" below
- "Configurable Portlets" on page 166

Note: The PPM Dashboard pages and portlets available to you might be different from the PPM Dashboard pages and portlets described in this appendix. This could be because of your configuration or the roles that you are assigned or because of your organization's implementation of HP APM. Any PPM Dashboard pages and portlets added by an analyst or administrator are not documented in this guide.

Because HP APM is a part of Project and Portfolio Management Center (PPM Center), PPM Dashboard pages and portlets unrelated to HP APM might also be available to you. This guide addresses only the HP APM pages and portlets

For additional information about PPM Dashboard pages and portlets, see "PPM Dashboard and PPM Dashboard Pages" on page 73 and "Portlets" on page 75.

For descriptions of additional PPM Dashboard pages and portlets that might be available to you, see the *HP Application Portfolio Management User's Guide* for descriptions of the PPM Dashboard pages and portlets provided for HP APM users.

Shared PPM Dashboard Pages and Portlets

HP APM provides several shared PPM Dashboard pages and portlets for HP APM analysts. You cannot edit or delete shared PPM Dashboard pages and portlets.

This section provides a screenshot and description of each of the portlets included on the following shared PPM Dashboard pages:

- "Front Page" on the next page
- "Portfolio View" on page 162
- "Applications" on page 164

For more information about shared portlets, see the online help. For information about how to use the PPM Dashboard pages, see "PPM Dashboard and PPM Dashboard Pages" on page 73.

Front Page

The Front Page shared PPM Dashboard page for HP APM analysts displays portlets that contain information that you might want to track regularly. These portlets include information about the applications in the portfolio, workstreams you manage, transformation proposals you have defined, surveys being conducted, and applications that are not mapped to processes.

Figure B-1. Example of the Front Page page

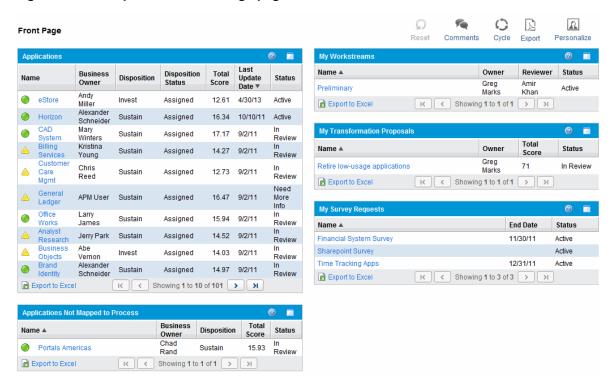


Table B-1. Shared portlets on Front Page page

Portlet Name	Description
Applications	This portlet displays a list of all applications in your organization's portfolio. Use this portlet to track basic information about an application. The following columns are displayed: Name, Business Owner, Disposition, Disposition Status, Total Score, Last Update Date, and Status.
	By default, applications are listed by the date they were last updated, with the most recently updated applications shown first.

Table B-1. Shared portlets on Front Page page, continued

Portlet Name	Description
Applications Not Mapped to Process	This portlet displays a list of all applications in your organization's portfolio that are not assigned to a business process. Use this portlet to view all applications that do not contribute to any business process. The following columns are displayed: Name, Business Owner, Disposition, Total Score, and Status. By default, applications are listed alphabetically by name.
	, , , ,
My Workstreams	This portlet displays a list of all the workstreams you created, own, have been asked to review, or for which you are a resource. Use this portlet to view the workstreams that you manage. The following columns are displayed: Name, Owner, Reviewer, and Status.
	By default, workstreams are listed alphabetically by name.
My Transformation Proposals	This portlets displays all active and approved transformation proposals that you created or own. Use this portlet to view transformation proposals that can be developed as projects. The following columns are displayed: Name, Owner, Total Score, and Status.
	By default, transformation proposals are listed alphabetically by name.
My Survey Requests	This portlet displays all active survey requests crated by you or other HP APM users. Use this portlet to keep track of the surveys conducted by HP APM users. The following columns are displayed: Name, End Date, and Status.
	By default, survey requests are listed alphabetically by name.

Portfolio View

The Portfolio View shared PPM Dashboard page for HP APM analysts displays portlets that provide application portfolio information you might want to track regularly. This includes an assessment of an application's value, transformation proposal ratings, the number of applications in the portfolio, and an application's total cost of ownership.

Figure B-2. Example of shared portlets on the Portfolio View PPM Dashboard page



Table B-2. Shared portlets on Portfolio View PPM Dashboard page

Portlet Name	Description
Application Value Assessment	This portlet displays an application's quality, health, value rating, and total cost of ownership. This portlet can be displayed as a bubble chart (default) or list. Use the information to determine if an application needs to be assessed (for example, for modernization).

Table B-2. Shared portlets on Portfolio View PPM Dashboard page, continued

Portlet Name	Description
Application Transformation Proposal Ratings	This portlet displays the total score, value rating, and risk rating by transformation proposal. This portlet can be displayed as a clustered bar chart (default), stacked bar chart, or list. Use this portlet to view how transformation proposals are ranked based on their total score. In the clustered bar chart and stacked bar chart, by default, applications are listed numerically (highest to lowest) by total score.
Application Portfolio Size over Time	This portlet displays the number of applications in the portfolio over a period of time. This portlet can be displayed as a line chart (default), XY chart, radar chart, or list. Use this portlet to track how many applications are in the portfolio over a specified period of time. By default, Period Type is set to Quarter.
Total Cost of Ownership (TCO) Summary	This portlet displays the total cost of ownership by applications in the portfolio. This portlet can be displayed as a bar chart (default), pie chart, or list. Use this portlet to determine the total cost to own and operate an application. In the bar chart and pie chart, by default, applications are listed numerically (highest to lowest) by cost.

Applications

The Applications shared PPM Dashboard page for HP APM analysts displays portlets with application information that the you might want to track regularly. This includes an application's health by owner, the number of applications that support a process, and a list of all applications in the portfolio.

Figure B-3. Example of the shared Applications page



Table B-3. Shared portlets on Applications page

Portlet Name	Description
Application Health Breakdown by Owner	This portlet displays the number of applications by health for each business owner. This portlet can be displayed as a stacked bar chart (default), clustered bar chart, or list. Use this portlet to track how many applications are owned by each business owner and the health of each application.
	From this portlet, you can drill down to display, for the selected application, the application's health, name, business owner, technical owner, disposition, disposition status, total score, and status.
Application to Process Coverage Summary	This portlet displays the number of applications that support each business process and the health of the applications. Use this portlet to determine how many applications support a business process and the health of each application. The following columns are displayed: Business Process, Applications (#), and Health Breakdown.
Application List	This portlet displays a list of all applications in your organization's portfolio. Use this portlet to view basic information about an application. The following columns are displayed: Name, Business Owner, Technical Owner, Disposition, Disposition Status, Total Score, and Status. By default, applications are listed alphabetically by name.

Configurable Portlets

You can add configurable portlets to your PPM Dashboard pages, and then customize the portlets to suit your information needs.

This section provides a screenshot and description of each of the following configurable portlets provided for HP APM analysts:

- "Application Health Breakdown" on the next page
- "Application Portfolio Size" on page 169
- "Application to Process Coverage" on page 170
- "Application Value Assessment" on page 172
- "List of Applications (Analyst)" on page 173
- "My Applications" on page 176
- "My Survey Requests" on page 177
- "My Transformation Proposals" on page 178

- "My Workstreams" on page 180
- "Rating of Transformation Proposals" on page 181
- "TCO Summary" on page 183

Note: You can find these portlets in the **Application Portfolio** category when you add portlets to a private PPM Dashboard page.

For more information about each portlet, see the online help. For additional information about portlets, see "Portlets" on page 75.

Application Health Breakdown

The Application Health Breakdown portlet displays the number of applications by health for each business owner. This portlet can be displayed as a stacked bar chart (default), clustered bar chart, or list. Use this portlet to track how many applications are owned by each business owner and the health of each application.

From this portlet, you can drill down to display, for the selected application, the application's health, name, business owner, technical owner, disposition, disposition status, total score, and status.

Figure B-4. Example of the Application Health Breakdown portlet

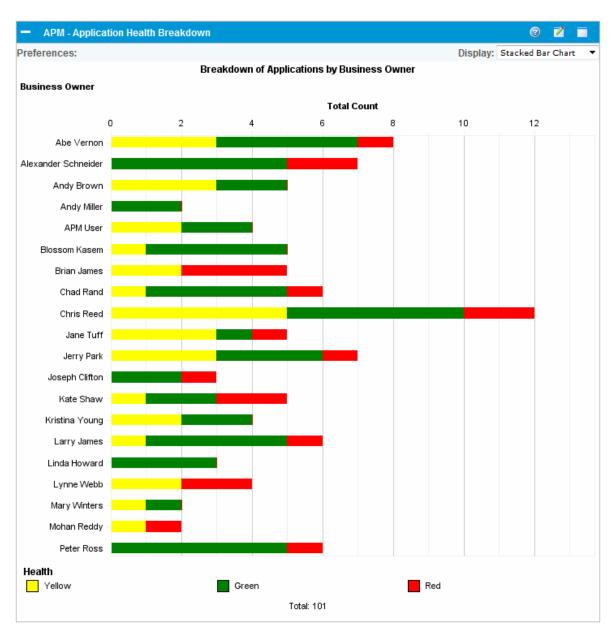


Table B-4. Preference settings and filters for Application Health Breakdown portlet

Field	Description
Application Set	Select an application set to display in the portlet. The portlet displays the number and health of applications from the application set for each business owner who owns an application in the application set. By default, the number and health of all applications for all business owners are displayed.
Display preferences summary on portlet	Display the preferences you have selected at the top of the portlet.

Application Portfolio Size

The Application Portfolio Size portlet displays the number of applications in the portfolio over a period of time. This portlet can be displayed as a line chart (default), XY chart, radar chart, or list. Use this portlet to track how many applications were in the portfolio over a specified period of time.

You must specify the start and end period before data is displayed in this portlet. By default, Period Type is set to Quarter.

APM - Application Portfolio Size ② 7 Preferences: Display: Line Chart Period Finish: Q4 2014; Period Start:... Application Portfolio Sizing # of Applications 99 -98 97 96 95 94 93 92 91 Period 90 Q2 12 Q3 12 Q4 12 Q1 13 Q2 13 Q3 13 Q2 14 Label Applications (#)

Figure B-5. Example of the Application Portfolio Size portlet

Table B-5. Preference settings and filters for Application Portfolio Size portlet

Field (*Required)	Description
Application Set	Select an application set to display in the portlet. The portlet displays the number of applications from the application set for the specified time period. By default, all applications in the application portfolio are counted.

Table B-5. Preference settings and filters for Application Portfolio Size portlet, continued

Field (*Required)	Description
*Period Type	Default: Quarter
	The time period by which the number of applications is displayed.
	Month
	Quarter
	Half Year
	• Year
*Period Start	Select the starting time period from which you want to display the number of applications.
*Period Finish	Select the ending time period to which you want to display the number of applications.
Display preferences summary on portlet	Display the preferences you have selected at the top of the portlet.

Application to Process Coverage

The Application to Process Coverage portlet displays the number of applications that support a business process and the health of the applications. This portlet is displayed as a list. Use this portlet to determine how many applications support a business process and the health of the applications.

Figure B-6. Example of the Application to Process Coverage portlet



Table B-6. Preference settings and filters for Application to Process Coverage portlet

Field (*Required)	Description
Applications	Specify one or more applications for which you want to display the business processes supported by application health. If no applications are specified, all applications for which data is available are counted.
Application Set	Select an application set to display in the portlet. The portlet displays the business processes supported by application health. By default, all applications in the application portfolio are displayed.
Business Processes	Specify a business process to display the number of applications that support it by application health. If you do not specify a business process, all business processes for which data is available are displayed.
Sort By	Select the column used to sort the data.
Ascending/Descending	Indicate the sorting sequence.
*Rows Displayed	Default: 10
	Specify the number of applications displayed in the normal portlet view.
	Type any integer greater than zero.

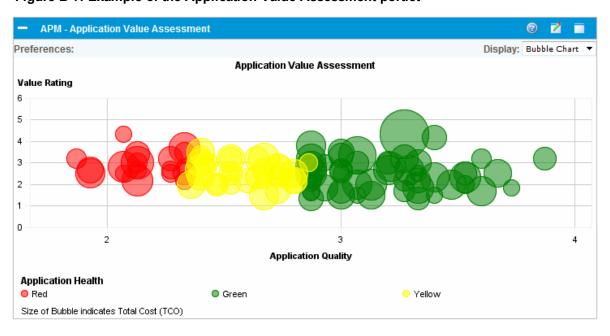
Table B-6. Preference settings and filters for Application to Process Coverage portlet, continued

Field (*Required)	Description
*Rows Displayed in Maximized View	Default: 50
	Specify the number of applications displayed in a maximized portlet.
	Type any integer greater than zero.
Available Columns	The names of columns that can be displayed in the portlet but are currently not displayed. See the online portlet help for a description of each column.
Displayed Columns	Select the names of the columns to display in the portlet and the order in which they are displayed.
Additional Columns Displayed in Maximized View	Select the names of the columns to display in a maximized portlet and the order in which they are displayed.

Application Value Assessment

The Application Value Assessment portlet displays an application's quality, health, value rating, and total cost of ownership. This portlet can be displayed as a bubble chart (default) or list. Use the information in this portlet to determine how or if an application needs to be assessed. For example, an application that scores low on quality but high on value rating might need to be assessed for improvement opportunities.

Figure B-7. Example of the Application Value Assessment portlet



To select the type of data that is displayed in this portlet and how the data is displayed, set the preference settings and filters.

Table B-7. Preference settings and filters for Application Value Assessment portlet

Field	Description
Application	Select zero, one, or more applications to display the quality, health, value rating, and total cost of ownership. If no applications are specified, all applications for which data is available are displayed.
Application Set	Select an application set to display in the portlet. The portlet displays the quality, health, value rating, and total cost of ownership of applications from the application set. By default, the quality, health, value rating, and total cost of ownership of all applications for all business owners are displayed.
Contact	Select a person who is the primary contact regarding the infrastructure supporting the application. Only applications that have this person listed as its contact are displayed.
Business Owner	Select a person who has the primary business authority for the application. Only applications that have this person listed as its business owner are displayed.
Status	Select a status of the applications to display. Only applications that have this status are displayed.
Health	Select zero, one, or more color-coded indicators of the application's health to display. Only applications that have this health are displayed. If no health is specified, all applications for which data is available are displayed.
Process	Select a business process supported by the application. Only applications that support this business process are displayed. If no business process is specified, all applications for which data is available are displayed.
Is Orphan?	Select applications that do or do not support a business process.
	No - Select applications that support a business process
	Yes - Select applications that do not support a business process
	Blank - Select all applications
Display preferences summary on portlet	Display the preferences you have selected at the top of the portlet.

List of Applications (Analyst)

The List of Applications (Analyst) portlet displays a list of all applications in your organization's portfolio. By default, this portlet displays an application's name, business owner, technical owner, disposition, disposition status, total score, and status. Use this portlet to view basic information about an application. Create a customized version of the portlet to track and assess data meaningful to you.

By default, applications are listed alphabetically by name.

Figure B-8. Example of the List of Applications (Analyst) portlet



Table B-8. Preference settings and filters for List of Applications (Analyst) portlet

Field (*Required)	Description
Application	Select zero, one, or more applications to display the quality, health, value rating, and total cost of ownership. If no applications are specified, all applications for which data is available are displayed.
Application Set	Select an application set to display in the portlet. The portlet displays the quality, health, value rating, and total cost of ownership of applications from the application set. By default, the quality, health, value rating, and total cost of ownership of all applications for all business owners are displayed.
Contact	Select a person who is the primary contact regarding the infrastructure supporting the application. Only applications that have this person listed as its contact are displayed.
Business Owner	Select a person who has the primary business authority for the application. Only applications that have this person listed as its business owner are displayed.

Table B-8. Preference settings and filters for List of Applications (Analyst) portlet, continued

Field (*Required)	Description
Health	Select zero, one, or more color-coded indicators of the application's health to display. Only applications that have this health are displayed. If no health is specified, all applications for which data is available are displayed.
Status	Select a status of the applications to display. Only applications that have this status are displayed.
Process	Select a business process supported by the application. Only applications that support this business process are displayed. If no business process is specified, all applications for which data is available are displayed.
Is Orphan?	Select applications that do or do not support a business process.
	No - Select applications that support a business process
	Yes - Select applications that do not support a business process
	Blank - Select all applications
Delegate	Select a person who is asked to supply additional information about the application. Only applications that have this person listed as its delegate are displayed.
Display preferences summary on portlet	Display the preferences you have selected at the top of the portlet.
Sort By	Select the column used to sort the data.
Ascending/Descending	Indicate the sorting sequence.
*Rows Displayed	Default: 10
	Specify the number of applications displayed in the normal portlet view.
	Type any integer greater than zero.
*Rows Displayed in	Default: 50
Maximized View	Specify the number of applications displayed in a maximized portlet.
	Type any integer greater than zero.
Available Columns	The names of columns that can be displayed in the portlet but are currently not displayed. See the online portlet help for a description of each column.
Displayed Columns	Select the names of the columns to display in the portlet and the order in which they are displayed.

Table B-8. Preference settings and filters for List of Applications (Analyst) portlet, continued

Field (*Required)	Description
Additional Columns Displayed in Maximized View	Select the names of the columns to display in a maximized portlet and the order in which they are displayed.

My Applications

The My Applications portlet displays a list of applications that you created or own. You can create a customized version of the portlet to track and assess data meaningful to you.

By default, applications are listed alphabetically by name.

Figure B-9. Example of the My Applications portlet



Table B-9. Preference settings and filters for My Applications portlet

Field (*Required)	Description
Application(s)	Select zero, one, or more applications that you own to display. If no applications are specified, all applications you own are displayed.
Health	Select zero, one, or more color-coded indicators of the application's health to display. Only applications that have this health are displayed. If no health is specified, all applications for which data is available are displayed.
Status	Select a status of the applications to display. Only applications that have this status are displayed.
Supported Process	Select a business process supported by the application. Only applications that support this business process are displayed. If no business process is specified, all applications for which data is available are displayed.

Table B-9. Preference settings and filters for My Applications portlet, continued

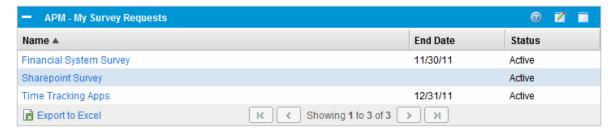
Field (*Required)	Description
Is Orphan?	Select applications that do or do not support a business process. No - Select applications that support a business process Yes - Select applications that do not support a business process
	Blank - Select all applications
Display preferences summary on portlet	Display the preferences you have selected at the top of the portlet.
Sort By	Select the column used to sort the data.
Ascending/Descending	Indicate the sorting sequence.
*Rows Displayed	Default: 5
	Specify the number of applications displayed in the normal portlet view.
	Type any integer greater than zero.
*Rows Displayed in	Default: 50
Maximized View	Specify the number of applications displayed in a maximized portlet.
	Type any integer greater than zero.
Available Columns	The names of columns that can be displayed in the portlet but are currently not displayed. See the online portlet help for a description of each column.
Displayed Columns	Select the names of the columns to display in the portlet and the order in which they are displayed.
Additional Columns Displayed in Maximized View	Select the names of the columns to display in a maximized portlet and the order in which they are displayed.

My Survey Requests

The My Survey Requests portlet displays all active survey requests created by you and other HP APM users.

By default, survey requests are listed alphabetically by name.

Figure B-10. Example of the My Survey Requests portlet



To select the type of data that is displayed in this portlet and how the data is displayed, set the preference settings and filters.

Table B-10. Preference settings and filters for My Survey Requests portlet

Field (*Required)	Description
Include Closed?	Include or do not include surveys that are not active.
	Yes - Include surveys that are not active
	No - Include active surveys only
Sort By	Select the column used to sort the data.
Ascending/Descending	Indicate the sorting sequence.
*Rows Displayed	Default: 5
	Specify the number of surveys displayed in the normal portlet view.
	Type any integer greater than zero.
*Rows Displayed in	Default: 50
Maximized View	Specify the number of surveys displayed in a maximized portlet.
	Type any integer greater than zero.
Available Columns	The names of columns that can be displayed in the portlet but are currently not displayed. See the online portlet help for a description of each column.
Displayed Columns	Select the names of the columns to display in the portlet and the order in which they are displayed.
Additional Columns Displayed in Maximized View	Select the names of the columns to display in a maximized portlet and the order in which they are displayed.

My Transformation Proposals

The My Transformation Proposals portlet displays all active and approved transformation proposals that you created or own. Use this portlet to view transformation proposals that can be developed as projects.

By default, transformation proposals are listed alphabetically by name.

Figure B-11. Example of the My Transformations Proposals portlet



Table B-11. Preference settings and filters for My Transformation Proposals portlet

Field (*Required)	Description
Include Closed?	Include or do not include transformation proposals that are completed.
	Yes - Include transformation proposals that are closed
	No - Do not include transformation proposals that are closed
Sort By	Select the column used to sort the data.
Ascending/Descending	Indicate the sorting sequence.
*Rows Displayed	Default: 5
	Specify the number of transformation proposals displayed in the normal portlet view.
	Type any integer greater than zero.
*Rows Displayed in	Default: 50
Maximized View	Specify the number of transformation proposals displayed in a maximized portlet.
	Type any integer greater than zero.
Available Columns	The names of columns that can be displayed in the portlet but are currently not displayed. See the online portlet help for a description of each column.
Displayed Columns	Select the names of the columns to display in the portlet and the order in which they are displayed.
Additional Columns Displayed in Maximized View	Select the names of the columns to display in a maximized portlet and the order in which they are displayed.

My Workstreams

The My Workstreams portlet displays a list of all workstreams you created, own, or have reviewed. Use this portlet to view the workstreams that you manage.

By default, workstreams are listed numerically (lowest to highest) by ID.

Figure B-12. Example of the My Workstreams portlet



Table B-12. Preference settings and filters for My Workstreams portlet

Field (*Required)	Description
Include Closed?	Include or do not include workstreams that are completed.
	Yes - Include workstreams that are closed
	No - Do not include workstreams that are closed
Sort By	Select the column used to sort the data.
Ascending/Descending	Indicate the sorting sequence.
*Rows Displayed	Default: 5
	Specify the number of workstreams displayed in the normal portlet view.
	Type any integer greater than zero.
*Rows Displayed in	Default: 50
Maximized View	Specify the number of workstreams displayed in a maximized portlet.
	Type any integer greater than zero.
Available Columns	The names of columns that can be displayed in the portlet but are currently not displayed. See the online portlet help for a description of each column.
Displayed Columns	Select the names of the columns to display in the portlet and the order in which they are displayed.

Table B-12. Preference settings and filters for My Workstreams portlet, continued

Field (*Required)	Description
Additional Columns Displayed in Maximized View	Select the names of the columns to display in a maximized portlet and the order in which they are displayed.

Rating of Transformation Proposals

The Rating of Transformation Proposals portlet displays the total score, value rating, and risk rating by transformation proposal. This portlet can be displayed as a clustered bar chart (default), stacked bar chart, or list. Use this portlet to view how transformation proposals are ranked based on their total score.

In the clustered bar chart and stacked bar chart, by default, applications are listed numerically (highest to lowest) by total score.

Figure B-13. Example of the Rating of Transformation Proposals portlet

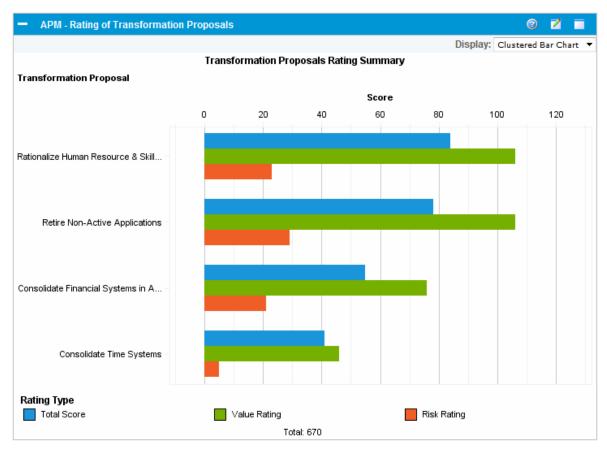


Table B-13. Rating of Transformation Proposals portlet rating types

Rating Type	Description
Total Score	The difference between the Value Rating and Risk Rating with the Score Adjustment applied.
	Total Score = Value Rating - Risk Rating + Score Adjustment
Value Rating	The business value of the transformation proposal.
	By default, the value rating is the sum of non-empty individual ratings listed above the Value Rating field Value & Risk Assessment section of the transformation proposal.
	Value Rating = Internal Rate of Return + Strategic Match + Competitive Advantage + Competitive Response + Productivity
Risk Rating	The risk of the transformation proposal to successfully complete. The risk rating is calculated from values defined in the Value & Risk Assessment section of the transformation proposal.
	By default, the risk rating is the sum of non-empty individual ratings for all risks in the Value & Risk Assessment section of the transformation proposal.
	Risk Rating = Organization Risk + Technical Risk + Architecture Risk + Definition Risk + Infrastructure Risk

To select the type of data that is displayed in this portlet and how the data is displayed, set the preference settings and filters.

Table B-14. Preference settings and filters for Rating of Transformation Proposals portlet

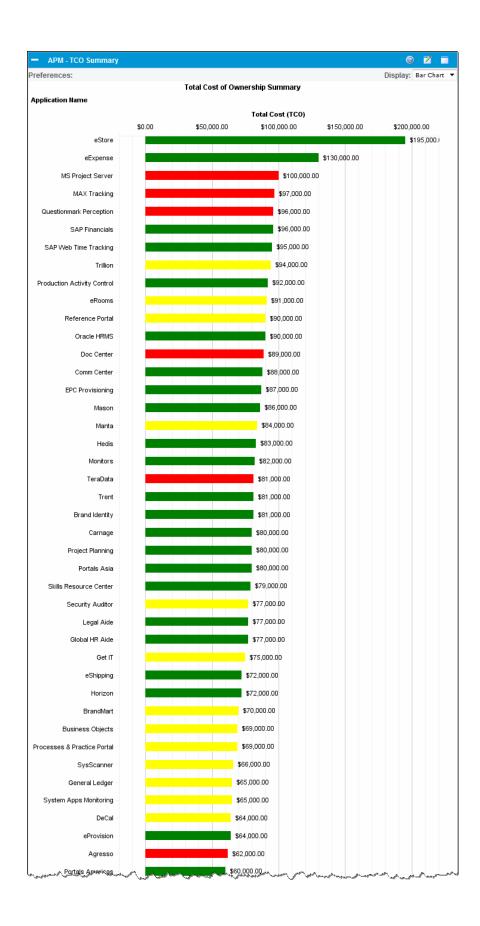
Field	Description
Transformation Proposals	Select zero, one, or more transformation proposals to display the total score, value rating, and risk rating. If no transformation proposals are specified, all transformation proposals for which data is available are displayed.
Business Objective	Select a business objective. Only transformation proposals that support this business objective are displayed. If no business objective is specified, all transformation proposals for which data is available are displayed.
Owner	Select a person who has proposed a transformation proposal. Only transformation proposals that have been proposed by this person are displayed. If no owner is specified, all transformation proposals for which data is available are displayed.
Executive Sponsor	Select a person who is an executive sponsor. Only transformation proposals that have this person listed as its executive sponsor are displayed. If no executive sponsor is specified, all transformation proposals for which data is available are displayed.

TCO Summary

The TCO Summary portlet displays the total cost of ownership by application. This portlet can be displayed as a bar chart (default), pie chart, or list. Use this portlet to determine the total cost to own and operate an application.

In the bar chart and pie chart, by default, applications are listed numerically (highest to lowest) by cost.

Figure B-14. Example of the TCO Summary portlet



To select the type of data that is displayed in this portlet and how the data is displayed, set the preference settings and filters.

Table B-15. Preference settings and filters for TCO Summary portlet

Field	Description
Application Set	Select an application set to display in the portlet. The portlet displays the cost of ownership by applications in the application set. By default, the cost of ownership of all applications are displayed.
Display preferences summary on portlet	Display the preferences you have selected at the top of the portlet.

Appendix C: Reports

Reports Overview

HP Application Portfolio Management (HP APM) provides several predefined reports that allow you to view the current status of your application portfolio data in a Web browser:

- "Entity Coverage Summary Report" below. Shows a summary of attributes and completeness of data entry for an entity.
- "Entity Detail Report" on the next page. Shows selected information about one or more entities.
 Use the filters to display only the entities and fields you want to view in the report. By default, the report includes non-empty header and detail information, notes, status, and references for each entity.
- "Survey Results Report" on page 191. Shows survey results from survey requests.

This appendix provides descriptions of the fields in each of the HP APM reports.

Note: View the HP APM reports from the **Open > Application Portfolio > Reports** menu.

For instructions for running and managing reports, see the Reports Guide and Reference.

Entity Coverage Summary Report

The Entity Coverage Summary report provides a summary of attributes and completeness of data entry provided for an entity.

Report Parameters

Use the filter fields in the Report Parameters section to define the results of your report. You can choose to display a report for a selected entity type or for an application set. The threshold filters color-code how often a field is completed by the data coverage percentage (for example, for applications, the Version field may be completed 80% of the time). Use the color coding to visually distinguish the acceptable, borderline, and unacceptable completeness of data coverage.

Table C-1. Entity Coverage Summary report filter fields

Filter Field (*Required)	Description
*Entity Type	Select the type of entity for which to generate a report. If you want to limit the report to applications in a specific application set, select Application and enter the name of the application set in the Application Set field.
Application Set	Enter the name of the application set for which to generate a report. This field is available only when you select Application as the Entity Type.
*High Threshold	Default: 80%. Denotes the fields that have the most complete data coverage. That is, the percentage of data entered for this field is at or above the threshold. In addition to displaying the percentage completed, the cell is color-coded in green.
*Medium Threshold	Default: 50%. Denotes the fields that have fairly complete data coverage. That is, the percentage of data entered for this field is at or above the threshold but below the high threshold. In addition to displaying the percentage completed, the cell is color-coded in yellow.
*Low Threshold	Default: 0%. Denotes the fields that have the least complete data coverage. That is, the percentage of data entered for this field is at or above the threshold but below the medium threshold. In addition to displaying the percentage completed, the cell is color-coded in red.

Analyzing the Entity Coverage Summary Report

The Entity Coverage Summary report provides a snapshot of the completeness of information provided for an entity. It shows the fields in the selected entity type, the number of times the fields were completed (Count), the percentage of times the field was filled in, and, when field data is measurable, the lowest value, highest value, and the average value for the field.

Use the Entity Coverage Summary report to:

- Determine if enough data is provided for the entity. At the bottom of the report, the grand total summarizes the total number of fields and the percentage of fields that were filled in.
- Determine the information that is provided most often for the entity. Where information is lacking, you could send an email to the entity owner asking the owner to provide more data.
- Determine threshold values for fields where statistical information is available.

Entity Detail Report

The Entity Detail report provides selected information about one or more entities. Use the filters to display only the entities and fields you want to view in the report. By default, the report includes non-empty header and detail information, notes, status, and references for each entity.

Report Parameters

Use the filter fields in the Report Parameters section to define the results of your report.

Table C-2. Entity Detail report filter fields

Filter Field (*Required)	Description
*Entity Request Type	Select the type of entity for which you want to run the report. The entity type determines the selectable values in certain filter fields.
*Include Closed Requests	Select Yes to include entities whose status is Closed. Select No to exclude entities whose status is Closed. Only survey and workstream entities can have the status of Closed.
Entity Numbers	Select zero, one, or more entity numbers for which you want to create a report. All entities with the selected number(s) are included in the report. Leave this field blank if you want to display all entities of the selected type.
Status	Select zero, one, or more statuses for which you want to create a report. All entities of the selected status(es) are included in the report. Leave this field blank if you do not want to filter by status. Status selections are determined by the entity type you selected in the Entity Request Type field.
Owner	Select zero, one, or more owners for which you want to create a report. All entities owned by the named persons are included in the report. Leave this field blank if you do not want to filter by entity owner.
Created By	Select zero, one, or more creators for which you want to create a report. All entities created by the named persons are included in the report. Leave this field blank if you do not want to filter by an entity's creator.
Creation Date From	Select a date after which the creation of the entity falls. All entities created after the selected date are included in the report. Leave this field blank if you do not want to filter by creation date.
Creation Date To	Select a date before which the creation of the entity falls. All entities created before the selected date are included in the report. Leave this field blank if you do not want to filter by creation date.
Last Update Date From	Select a date after which the last modification of the entity falls. All entities modified after the selected date are included in the report. Leave this field blank if you do not want to filter by modification date.
Last Update Date To	Select a date before which the last modification of the entity falls. All entities modified before the selected date are included in the report. Leave this field blank if you do not want to filter by modification date.

Table C-2. Entity Detail report filter fields, continued

Filter Field (*Required)	Description
Description Contains	Enter alphanumeric words or phrases that are part of the entity's description. All entities that include the word or phrase in the description are included in the report. Leave this field blank if you do not want to filter by description.
Field Prompt 1–4	Select an attribute of the entity type on which to filter. The value of the attribute is determined by the Field Value field. Leave this field blank if you do not want to filter by a specific entity attribute. Field attribute selections are determined by the entity type you selected in the Entity Request Type field. Up to four field prompts may be specified.
Field Value 1–4	Enter a value for the attribute of the entity type on which to filter. The attribute is determined by the Field Prompt field. Leave this field blank if you do not want to filter by a specific entity attribute.
Report Title	Enter a name for this report.
*Order By	Order of the results within the report. Results are ordered by request number (entity number). This field cannot be modified.
*Show Header Fields	Select Yes to include all information in an entity's header section in the report. Select No to exclude information from an entity's header section from the report.
*Show Detail Fields	Select Yes to include all information from an entity's details section in the report. Select No to exclude information from an entity's details section from the report.
*Hide Prompts for Empty Fields	Select Yes to exclude attribute fields with no values from the report. Select No to include attribute fields with no values in the report.
*Show Contents of Table Fields	Select Yes to include all information from an entity's table fields in the report. Select No to exclude information from an entity's table fields from the report.
*Show Field Audit History	Select Yes to include all information from an entity's audit history in the report. Select No to exclude information from an entity's audit history from the report.
*Show Notes	Select Yes to include all information from an entity's Notes section in the report. Select No to exclude information from an entity's Notes section from the report.

Table C-2. Entity Detail report filter fields, continued

Filter Field (*Required)	Description
*Filter Notes	Select the types of notes to include in the report, if notes are included in the report.
	Show all notes - Include all notes entered by administrators, analysts, and users.
	Show only user notes - Include notes only entered by users.
*Show Status	Select Yes to include all information from an entity's Status section in the report. Select No to exclude information from an entity's Status section from the report.
*Show References	Select Yes to include all information from an entity's References section in the report. Select No to exclude information from an entity's Reference section from the report.

Analyzing the Entity Detail Report

The Entity Detail report provides a snapshot of selected information for the selected entity type. It shows selected sections of information and selected fields (up to four) for a filtered set of the selected entity type.

Use the Entity Detail report to:

- Track information between the same type of entities. For example, you could create a report for an
 application set that displays the owners of each application.
- Compare information between entities of the same type.
- Create a list of entities with similar attributes.
- Keep a log of selected information.

Survey Results Report

The Survey Results report shows the results from a specified survey request.

Report Parameters

Use the filter fields in the Report Parameters section to define the results of the report. The threshold filters color-code the number of responses by the response rate percentage. Use the color coding to visually distinguish the number of acceptable, borderline, and unacceptable responses.

Table C-3. Survey Results report filter fields

Filter Field (*Required)	Description
*Survey Request	Select the survey for which to generate the report.
Applications	Select one or more applications that are part of the selected survey on which to report. If you want to view a report for all applications in the survey, leave this field blank.
High Threshold	Default: 80%. Denotes the fields that have the most complete data coverage. That is, the percentage of data entered for this field is at or above the threshold. In addition to displaying the percentage completed, the cell is color-coded in green.
Medium Threshold	Default: 50%. Denotes the fields that have fairly complete data coverage. That is, the percentage of data entered for this field is at or above the threshold but below the high threshold. In addition to displaying the percentage completed, the cell is color-coded in yellow.
Low Threshold	Default: 0%. Denotes the fields that have the least complete data coverage. That is, the percentage of data entered for this field is at or above the threshold but below the medium threshold. In addition to displaying the percentage completed, the cell is color-coded in red.
Show Blanks in Distribution?	Distribution shows the number of responses in a given rating category. If Yes is selected, the distribution includes the number of non-responses. If No is selected, only the distribution of actual responses is shown.

Analyzing the Survey Results Report

When you send out a survey, you ask the respondents to rate specific areas of one or more applications. The Survey Results report is a snapshot of the current responses to the survey.

The Survey Results report shows the areas that were rated, the number of responses for the areas, the percentage of responses for the areas, and the distribution of the responses among the ratings. If you selected **Yes** for the **Show Blanks in Distribution?** field, the number of non-responses are included in the distribution.

Use the Survey Results report to:

- Determine the overall response rate to the survey. At the bottom of the report is a summary of the
 total number of responses and percentage of completed responses. If you have enough responses,
 you may choose to close the survey.
- Determine if you are satisfied with the number of responses you have received for any given area by looking at the number of responses, number of non-responses, and the response rate percentage. If the number of responses is low for a specific area, you may choose to send an email to the respondents asking them for more information in the specific area.
- Analyze the current ratings for a given area. You can see what areas of the application your

respondents liked or disliked the most. You can determine the strengths and weaknesses of the application based on the responses.

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