Oracle® Project Portfolio Management Integration Pack for Primavera P6 and Oracle® E-Business Suite 2.5 - Implementation Guide

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# Chapter 1 - Oracle Project Portfolio Management Integration Pack for Primavera P6 and Oracle E-Business Suite Projects 2.5 Implementation Guide Preface

This preface discusses the following:

- Oracle Application Integration Architecture Foundation Pack: Core Infrastructure Components Guide
- Oracle Application Integration Architecture Foundation Pack: Concepts and Technologies Guide
- Oracle Application Integration Architecture Foundation Pack: Integration Developer's Guide
- Oracle Application Integration Architecture Process Integration Packs
- Additional resources

# Oracle Application Integration Architecture - Foundation Pack: Core Infrastructure Components Guide

The Oracle Application Integration Architecture - Foundation Pack: Core Infrastructure Components Guide provides conceptual, setup, and usage information for the following core infrastructure components:

- Business Service Repository (BSR)
- Composite Application Validation System (CAVS)
- Error Handling and Logging
- Diagnostics Framework

# Oracle Application Integration Architecture Foundation Pack Concepts and Technologies Guide

The Oracle Application Integration Architecture - Foundation Pack: Concepts and Technologies Guide is a companion volume to the Oracle Application Integration Architecture - Foundation Pack: Core Infrastructure Components Guide and Oracle Application Integration Architecture - Foundation Pack: Integration Developer's Guide. It provides definitions of fundamental Oracle Application Integration Architecture (AIA) concepts and discusses the following:

- Oracle AIA
- Enterprise business objects and enterprise business messages
- · Enterprise business services
- Application business connector services
- Interaction patterns
- Extensibility
- Versioning
- Business processes
- Batch processing
- Infrastructure services
- Security

# Oracle Application Integration Architecture - Foundation Pack: Integration Developer's Guide

The Oracle Application Integration Architecture - Foundation Pack: Integration Developer's Guide is a companion volume to Oracle Application Integration Architecture - Foundation Pack: Concepts and Technologies Guide and Oracle Application Integration Architecture - Foundation Pack: Core Infrastructure Components Guide.

The Oracle Application Integration Architecture - Foundation Pack: Integration Developer's Guide discusses how to do the following:

- Create an integration scenario
- Define business service patterns
- Design and develop enterprise business services
- Design and develop enterprise business flows
- Design and construct application business connector services
- · Work with message transformation, enrichment, and configuration

- Develop custom xpath functions
- · Design and construct JMS Adapter services
- Work with enterprise message headers
- Work with message routing
- Work with transactions
- Develop Oracle AIA services to work with the Composite Application Validation System (CAVS)
- Configure Oracle AIA processes to be eligible for error handling and logging
- Extend enterprise business objects

In addition, this guide describes the Application Integration Architecture naming standards.

# Oracle Application Integration Architecture Process Integration Packs

A process integration pack (PIP) is a prebuilt set of integrated orchestration flows, application integration logic, and extensible enterprise business objects and services required to manage the state and execution of a defined set of activities or tasks between specific Oracle applications associated with a given process. A PIP provides everything you need to deploy a selected integrated business process area. The PIP product offering is suited to customers seeking rapid implementation of a discrete business process.

This guide discusses the Oracle Project Portfolio Management Integration Pack for Primavera P6 and Oracle E-Business Suite Projects. Through the remainder of this documentation, this PIP is referred to as the Project Portfolio Management: Primavera P6-EBS Projects PIP.

### **Additional Resources**

The following resources are available to help with the Project Portfolio Management: Primavera P6-EBS Projects PIP:

Resource	Location
Installation Guide	My Oracle Support
	https://metalink.oracle.com/
Documentation Updates	My Oracle Support
	https://metalink.oracle.com/
Release Notes	Oracle Technology Network
	http://www.oracle.com/technology/

Known issues, workarounds, and current list of patches	See document 889732.1 on My Oracle Support <a href="https://metalink.oracle.com/">https://metalink.oracle.com/</a>
Oracle Projects Documentation	Documentation CD <a href="http://download.oracle.com/docs/cd/B53825_02/current/html/docset.html">http://download.oracle.com/docs/cd/B53825_02/current/html/docset.html</a>
Primavera P6 Documentation	Primavera P6 Online Help can be accessed from the application

# **Common Terms Used in this Guide**

The following table lists the common terms used in the Project Portfolio Management: Primavera P6-EBS Projects PIP:

Term	Definition
Activity	An activity is the fundamental work element of a project for Primavera P6. It is the lowest level of a work breakdown structure (WBS). An activity's primary resource is responsible for managing and tracking the progress of an activity's steps, while the project manager is responsible for managing and tracking the progress of the overall activity.
ABCS	Application Business Connector Service
ABM	Application Business Message
AIA	Application Integration Architecture
BPEL	Business Process Execution Language
EBM	Enterprise Business Message. This is an AIA artifact.
EBO	Enterprise Business Object. This is an AIA artifact.
EBS Enterprise Business Service. This is an AIA artifact.	
EPS	Enterprise Project Structure, a hierarchy created by the enterprise to organize its projects. It provides functionality to view project priorities, scope, budget, and resource information across the enterprise. Primavera P6 projects are created and stored in EPS.
Financial Structure	A hierarchical arrangement of financial tasks in a project. Financial structure is used to track billing, costs, budgets, and other financial information for a project.
Planning Resource	A resource used for planning work, budget, and forecast for a project. A planning resource is defined in the context of resource format and resource class.
Planning Resource List	A combination of planning resource formats and planning resources. A planning resource list enables you to plan the cost and effort of a project.
Resource	A user-defined group of employees, organizations, jobs, suppliers, expenditure categories, revenue categories, expenditure types, or event types for purposes of defining budgets or summarizing actuals.
Role	A project role describes a user relationship (for example, project manager) and grants view or update access to project information.

Task	A subdivision of project work. Each project can have a set of top tasks and a hierarchy of subtasks. This maps to a WBS for Primavera P6.
Workplan Structure	A hierarchical structure of workplan tasks and deliverables in a project. Workplan structure enables you to plan project work and collect progress information for projects and tasks.
WBS	This is a P6 term. A Work Breakdown Structure (WBS) is a hierarchy of work that must be accomplished to complete a project and defines a product or service. The WBS is structured in levels of work detail, beginning with the deliverable and is then separated into identifiable work elements.

# Chapter 2 - Understanding the Oracle Project Management Integration Pack for Primavera P6 and Oracle E-Business Suite 2.5

This chapter discusses the following:

- Overview of the PIP
- Installation and implementation of the PIP
- Solutions assumptions and constraints

# Overview of the Project Portfolio Management: Primavera P6-EBS Projects PIP

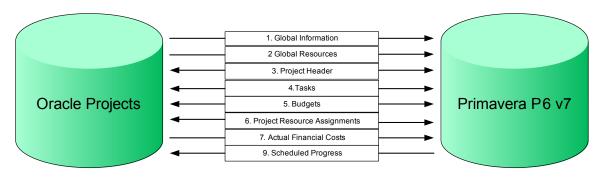
The Project Portfolio Management: Primavera P6-EBS Projects PIP links Oracle Projects and Primavera P6, so that you can work with global objects and projects in both the applications. You can use Oracle Projects for Enterprise Project Management and Primavera P6 for scheduling. The two applications utilize Oracle's Applications Integration Architecture to create an integration that benefits customers who are using both applications or are using just one and would be interested in leveraging their investment by integrating the other.

This PIP enables users to enter and maintain global entities, such as planning resources in the Oracle Projects application, and then allow Primavera P6 to reuse these items without any additional manual effort or one-off integrations. In addition, this PIP enables users to create projects in either of the applications and synchronize the necessary data.

Integrating Oracle Projects with Primavera P6 provides a comprehensive **Enterprise Project Portfolio Management solution** and performs the following features:

- Brings together complex scheduling and industry-specific PPM processes with project financial management, skills and inventory management, and other enterprise solutions
- Provides end-to-end visibility and control for improved decision making, coordination, and collaboration
- Provides consolidated view of enterprise and project portfolio for an accurate, up-to-date view of project, resources, and financial performance
- Creates coherent and complete solution for Enterprise PPM with ERP, database, middleware, and analytics

The following graphic illustrates a high-level integration of the business processes between Oracle Projects and Primavera P6:



High-level overview of business processes

# Installation and Implementation of the Project Portfolio Management: Primavera P6-EBS Projects PIP

You must install all the participating applications, ensure that each system meets the minimum technical requirements to support the AIA Foundation Pack and the PIP, and then utilize any of the integration processes that are included with this PIP.

**For more information** about installing AIA Foundation Pack and the Project Portfolio Management: Primavera P6-EBS Projects PIP, see *Oracle Application Integration Architecture – Installation and Upgrade Guide.* 

After installing the PIP, you must complete the implementation steps for this PIP.

**For more information** about implementing the Project Portfolio Management: Primavera P6 – Oracle Projects PIP, see chapter *Implementing the Oracle Project Management Integration Pack for Primavera P6 and Oracle E-Business Suite 2.5.* 

### **Core AIA Components**

The Project Portfolio Management: Primavera P6-EBS Projects PIP uses the following core AIA components:

EBO (.xsd) (Enterprise Business Object)	EBM (.xsd) (Enterprise Business Message)	EBS (.wsdl) (Enterprise Business Service)
ProjectResourceSetEBO	SyncProjectResourceSetListEBM	ProjectResourceSetEBS
ProjectResourceRateScheduleEBO	SyncProjectResourceRateScheduleListEBM	ProjectResourceRateScheduleEBS
ProjectEBO	SyncProjectListEBM	ProjectEBS
ProjectFinancialPlanListEBO	SyncProjectFinancialPlanListEBM	ProjectFinancialPlanEBS

The core EBO and EBM XSD files can be located by EBO within this parent folder: http://[HOST:PORT]/AIAComponents/EnterpriseObjectLibrary/Core/EBO/.

The core EBS WSDL files can be located by EBO within this parent folder: http://[HOST:PORT]/AIAComponents/EnterpriseBusinessServiceLibrary/Core/EBO/.

For detailed documentation of individual EBOs, click the EBO Name link on the Integration Scenario Summary page in the Oracle AIA console. You can also use the Integration Scenario Summary page to search for and view integration scenarios that use a particular EBO or EBS.

**For more information,** see *Oracle Application Integration Architecture - Foundation Pack: Core Infrastructure Components Guide*, "Using the BSR," "Using the BSR UI to View Integration Scenarios," Viewing Integration Scenarios

EBOs can be extended, for instance, to add new data elements. These extensions are protected and remain intact after a patch or an upgrade.

**For more information,** see Oracle Application Integration Architecture – Foundation Pack: Integration Developer's Guide, "Extensibility for Oracle AIA Artifacts," Extending EBOs

# **Solution Assumptions and Constraints**

This section discusses the following assumptions and constraints that are associated with the Project Portfolio Management: Primavera P6-EBS Projects PIP:

- 1. This PIP is limited to a new Primavera P6 v7 PPM installation and an existing or new Oracle Projects installation.
- 2. Each Primavera P6 installation supports only one base currency.

**Note.** Every chapter in this guide contains a detailed assumptions and constraints section.

# **Chapter 3 - Synchronizing Global Objects**

This chapter discusses the following:

- Overview of global objects
- Solution assumptions and constraints
- Synchronize planning resources, roles, and expense category
- Synchronize planning resource rates or role rates

# **Overview of Global Objects**

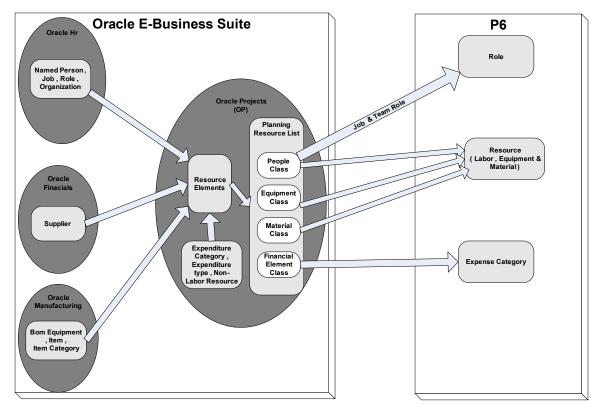
Global objects represent data elements that are shared between two applications. For example, global objects can be planning resources, roles, rates, and expense category. The data originates in Oracle Projects and Primavera P6 receives the updates.

The following table discusses the mapping of global objects between Oracle Projects and Primavera P6:

Oracle Projects	Primavera P6
All planning resources and rates with resource class as People, Material Items, and Equipment except for planning resources with resource format as Team Role and Job	Resources
Planning resources and rates with resource format as Team Role or Job, and resource class as People	Role
Planning resources and rates with resource class as Financial Element	Expense Category

#### **Process Flow**

The following graphic illustrates the process flow of global data between Oracle Projects and Primavera P6:



### Synchronizing global objects process flow

The Integration Options page controls which projects and global data are synchronized. Project managers and administrators are responsible for setting up the global data, such as, defining the planning resources in a planning resource list. The system administrator is responsible for synchronizing the global data from Oracle Projects to Primavera P6.

# Pages Used to Synchronize Global Objects

Page Name	Navigation	Usage
Integration Options	Log in to the application using the <i>Projects Super User</i> responsibility. From the Projects: Setup menu, click the <i>Integration Options</i> link.	Select and configure setup steps for a third-party application.
Third Party Application	On the Integration Options page, click the <i>Create/Update</i> button.	Assign planning resource list, rate schedules for employees, jobs, nonlabor resources, operating units, and organization.  Currency – Represents the base currency in Primavera P6. The Rate Type and Rate Date Type fields are used for sending planning rates in this currency.

### **Prerequisites for Synchronization of Global Objects**

Before synchronizing data between Oracle Projects and Primavera P6, you must:

- 1. Define Primavera P6 as a third-party application on the Integration Options page.
- 2. Assign a planning resource list to the third-party application.
- 3. Assign rate schedules for sending the global resource rates to Primavera P6.

# **Solution Assumptions and Constraints**

This section discusses the following assumptions and constraints that are associated with synchronizing global objects:

- 1. Oracle Projects owns the global objects. Any changes to global objects in Primavera P6 are overwritten by Oracle Projects information in the subsequent synchronization.
- 2. Specify one or more operating units on the Integration Options page. Every P6 installation is associated with one or more operating units. Projects belonging to these operating units must be transferred to the corresponding P6 installation.
- 3. A single global planning resource list that is centrally controlled is used for one P6 instance.
- 4. A single global planning resource list is assigned to all the projects belonging to the operating unit that is being integrated. The project workplan and budgeting are done by the planning resources.
- 5. National Language Support is available for this Project Portfolio Management: Primavera P6-EBS Projects PIP.

# Synchronize Planning Resources, Roles, and Expense Category from Oracle Projects to Primavera P6

A planning resource list is associated with a third-party application on the Integration Options page. Planning resources and roles of a planning resource list are synchronized to Primavera P6. Once synchronized, the planning resource list cannot be changed. However, you can add planning resources and synchronize the updates to the planning resource list.

Primavera P6 supports one planning resource list per Primavera P6 installation. Since only one planning resource list is synchronized between Oracle Projects and Primavera P6, you can combine all or some of the project's planning resource lists into one global list for integration.

**Note.** Any planning resource that is not included in the synchronized planning resource list is not available to be assigned to activities in Primavera P6.

Planning resources can be added at any time to the planning resource list in Oracle Projects. While it is possible to delete a planning resource from a planning resource list, best practice suggests that a planning resource should be disabled rather than deleted. If you still want to delete a planning resource from a planning resource list in Oracle Projects, you must delete the same resource from Primavera P6 manually.

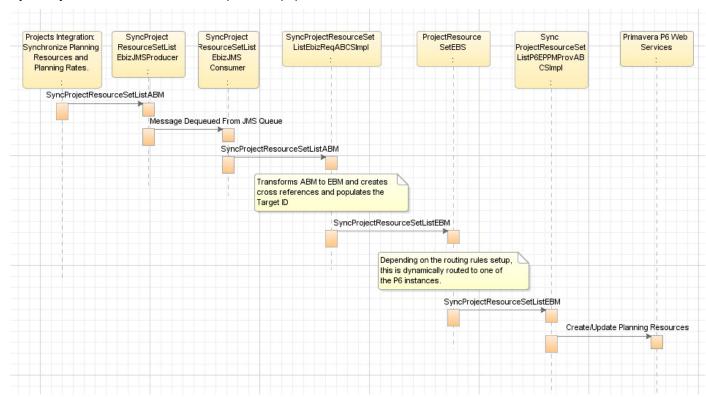
For more information about planning resources and planning resource lists, see Oracle Projects Implementation Guide.

ProjectResourceSetEBO is used to synchronize planning resources, roles, and expense categories.

### **Integration Flow**

The SyncProjectResourceSetListEbizReqABCSImpl integration flow is used to synchronize the planning resources and roles between Oracle Projects and Primavera P6.

The following graphic illustrates the sequence diagram for the SyncProjectResourceSetListEbizReqABCSImpl process.



Synchronization of Resources, Roles, and Expense Categories integration flow sequence diagram

Create and Update Planning Resources in Oracle Projects and synchronize to Primavera P6

To create or update a planning resource in Oracle Projects:

- In the Projects Setup page click the *Planning Resource List* link. Create the planning resource list that
  you want to associate with the third-party application. Add planning resources and associate rates with
  these planning resources.
- 2. Access the Integration Options page. Click the Create or Update button.
- 3. In the Planning Resources tab you can also select Rate Schedules.

### To synchronize the planning resources in Oracle Projects with Primavera P6:

- Enter a host name for the PA: Integration Server Host Name profile option. For example, http://sdc60007sems.us.oracle.com:7863.
- 2. Execute the Projects Integration: Synchronize Planning Resources and Rates concurrent program. Select Planning Resources from the Synchronize list. This concurrent program calls the Requester Application Business Connector Service (ABCS) type and sends it to the planning resource list ABM. Requester ABCS populates the XREF information and transforms ABM to EBM using the XformSyncResourceListABM\_to\_SyncProjectResourceSetListListEBM.xsl file. This in turn initiates the ProjectResourceEBS service. The SyncProjectResourceSetP6ProvABCSImpl service connects the data with Primavera P6.

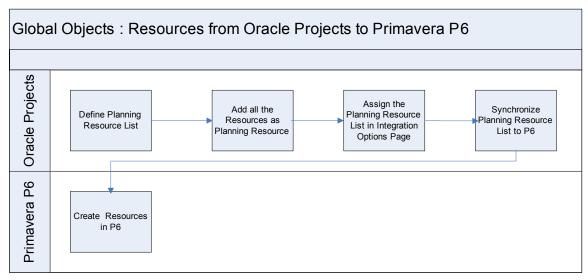
### Concurrent program used for synchronizing global objects

The **Projects Integration: Synchronize Planning Resources and Planning Rates** concurrent program is used to synchronize planning resources and rates from Oracle Projects to Primavera P6. It has the following parameters:

Parameter Name	Description
Synchronize	Enables you to select a global object for synchronization. The values are <i>Planning Resources</i> and <i>Planning Rates</i> . The default value is Planning Resources.
Third Party Application	Select the third-party application with which Oracle Projects is synchronized. This parameter contains a list of the third-party applications defined in the Third Party Applications page.
Resource Class	List of values containing the resource classes: <i>People</i> , <i>Equipment</i> , <i>Material Items</i> , and <i>Financial Elements</i> . Resource classes in Oracle Projects map to Resource Types in Primavera P6. The mapping of resource class to resource type is as follows:
	People – Labor (except Team Role and Job, which map to Role in Primavera P6)
	Equipment – Nonlabor
	Material Items – Material

	Financial Elements – Expense Category
Resource Format	Resource formats are available based on the resource class that is selected. For example, if the resource class is People, available resource formats include: Person Type, Organization, Supplier, or Job – Financial Category.
Resource From/To	Enter planning resource names for the selected planning resource list. This parameter is case sensitive.
Type of Resources	Select All Planning Resources or Disabled Planning Resources.

The following graphic illustrates the process flow of resources between Primavera P6 and Oracle Projects:



Planning resources created in Oracle Projects and synchronized as resources to Primavera P6

# **Synchronize Planning Resource Rates or Role Rates from Oracle Projects to Primavera P6**

Synchronization of planning resource rates from Oracle Projects to Primavera P6 enables you to manage projects based on planning resource and role rates.

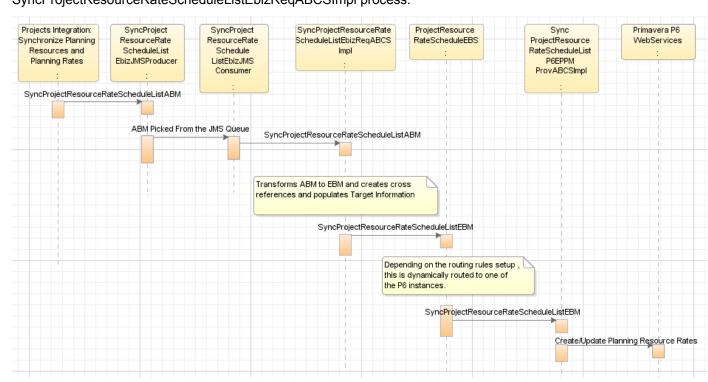
For more information about rates, see *Oracle Projects Fundamentals* guide, "Rates," Using Rates for Workplan and Financial Planning.

**Important!** Planning resources and roles must be synchronized before their rates are synchronized.

ProjectResourceRateScheduleEBO is used to synchronize planning resource rates and role rates.

### Integration Flow

The SyncProjectResourceRateScheduleListEbizReqABCSImpl integration flow is used to synchronize the planning resource rates between Oracle Projects and Primavera P6. The following graphic illustrates the sequence diagram for the SyncProjectResourceRateScheduleListEbizRegABCSImpl process.



Synchronization of Planning Resource Rates or Role Rates integration flow sequence diagram

# **Create Rates for Planning Resources and Roles in Oracle Projects and synchronize to Primavera P6**

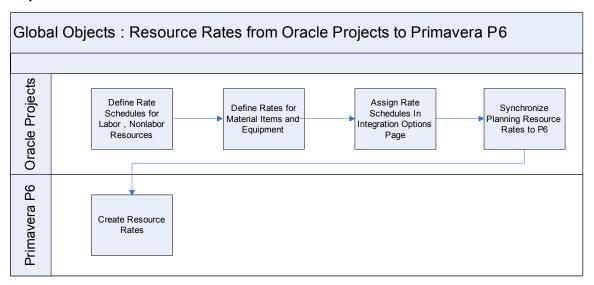
To create rates for planning resources and roles in Oracle Projects:

- 1. Perform all the three steps as specified in the To Create or Update a Planning Resource in Oracle Projects section.
- 2. Associate each planning resource: Employee, Job, and Nonlabor with suitable rate schedules.

To synchronize the planning resource and role rates in Oracle Projects with Primavera P6:

- Enter a host name for the PA: Integration Server Host Name profile option. For example, http://sdc60007sems.us.oracle.com:7863.
- 2. Execute the Projects Integration: Synchronize Planning Resources and Planning Rates concurrent program. Select *Planning Rates* from the *Synchronize* list. This concurrent program calls the Requester Application Business Connector Service (ABCS) type and sends this to the resource rate schedule list ABM. Requester ABCS populates the XREF information and transforms the object SyncResourceRateScheduleListABM to SyncProjectResourceRateScheduleListEBM using the XformSyncResourceRateScheduleListABM\_to\_SyncProjectResourceRateScheduleListEBM.xsl file. This in turn initiates the ProjectResourceRateScheduleEBS service. The SyncProjectResourceRateScheduleListP6ProvABCSImpl service connects the data with Primavera P6.

The following graphic illustrates the process flow of resources between Primavera P6 and Oracle Projects:



Planning resource rates created in Oracle Projects and synchronized as resource rates to Primavera P6

# **Chapter 4 - Process Integration for Project Data between Oracle Projects and Primavera P6**

This chapter provides information about project data synchronization process and prerequisites in the integration between Oracle Projects and Primavera P6. This chapter discusses the following:

- Overview of process integration
- · Solution assumptions and constraints
- Integrating Oracle Projects with Primavera P6 Workplan-Enabled Project Integration
- Integrating Oracle Projects with Primavera P6 Project Integration With Workplan Not Enabled
- AIA Components

# **Overview of Process Integration**

The synchronization of project data from Oracle Projects to Primavera P6 and vice-versa supports the following process flows:

- Creating project data in Oracle Projects and synchronizing to Primavera P6
- Updating project data in Oracle Projects and synchronizing to Primavera P6
- Creating project data in Primavera P6 and synchronizing to Oracle Projects
- Updating project data in Primavera P6 and synchronizing to Oracle Projects

Synchronization of project data between Oracle Projects and Primavera P6 includes the following components:

- Project header
- WBS
- Resource assignments
- Budgets
- Actual Cost

Synchronize project from Oracle Projects to Primavera P6

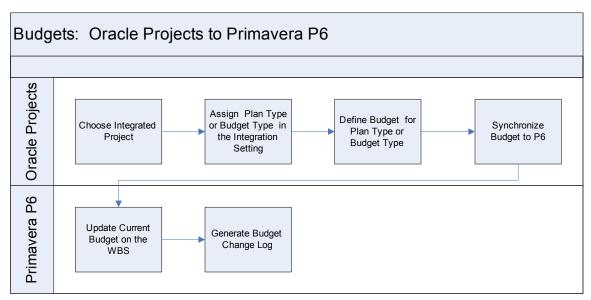
Create a project in Oracle Projects, enable integration, and mark this project to be created in Primavera P6. The integration process creates this project in Primavera P6 and transfers all the project data. The ProjectEBO object is used to transfer the project header, project WBS, actual cost and project resource assignments. Once integrated, any change that you make to the Projects project is reflected in the Primavera project.

#### Synchronize project from Primavera P6 to Oracle Projects

Create project templates in Oracle Projects and synchronize the templates to Primavera P6. The templates are created as project codes in Primavera P6. Create a project in Primavera P6, assign the project template related code and mark the project to be created in Oracle Projects. The integration process creates this project in Oracle Projects and transfers all the project data. ProjectEBO is used to transfer the project header, project WBS, and project resource assignments. Primavera P6 forecast units and costs can also be integrated with Oracle Projects. You can update and maintain project execution in Primavera P6.

### Synchronize budgets between Oracle Projects to Primavera P6

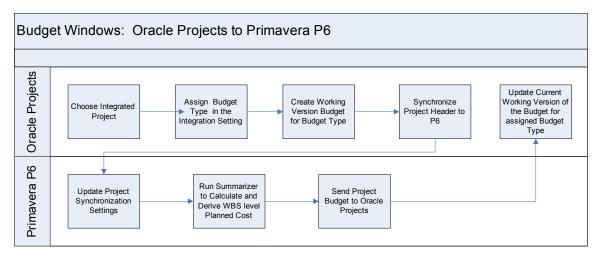
The following graphic illustrates the process flow of budgets between Oracle Projects and Primavera P6:



#### Budgets created in Oracle Projects and synchronized to Primavera P6

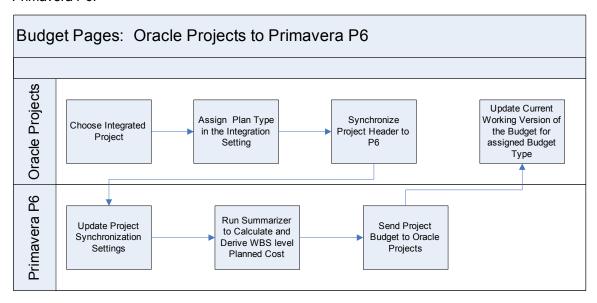
The budget flow is slightly different for budget windows and budget pages.

The following graphic illustrates the process flow for budget windows between Oracle Projects and Primavera P6:



### Budgets created in Oracle Projects and synchronized to Primavera P6

The following graphic illustrates the process flow for budget pages between Oracle Projects and Primavera P6:



Budgets created in Oracle Projects and synchronized to Primavera P6

# **Solution Assumptions and Constraints**

This section discusses the following assumptions and constraints that are associated with synchronizing project data:

- 1. Projects can be created in Oracle Projects or Primavera P6.
- 2. Project execution and scheduling aspects occur in Primavera P6.
- 3. Project managers or integration administrators select the projects that must be synchronized. Changes in Oracle Projects or Primavera P6 projects are synchronized at particular intervals of time. For example, projects in some industries may need to be synchronized once a day. Typically, synchronization of active projects occurs weekly or biweekly. Such structured synchronizations help balance the load demands on integration applications.

- 4. Oracle Projects owns the financial aspects of all projects.
- 5. A project's budget data can be updated in Oracle Projects. Planned cost of the WBS, activities, and resource assignments comprises of budget data in Oracle Projects. The budgeted cost from Oracle Projects is sent to Primavera P6 as current budget attribute of the Primavera P6 WBS node. Any change in the current budget amount from the previous value from Oracle Projects is created as budget change log in Primavera P6. The source application from which the synchronization is initiated overwrites the existing budget data. For example, if changes to Primavera P6 budget data are done on 01-May-2010 and the Projects Integration: Synchronize Projects, Structures, Budgets and Actuals concurrent program is executed on 02-May-2010, then Oracle Projects budget data takes precedence. You can use the working versions feature in Oracle Projects and the budget change log feature in Primavera P6 to save budget information.
- 6. WBS and Activity Short Name or Code in Primavera P6 is mapped to Task Number in Oracle Projects. In Oracle Projects, task number is unique for a project and for all the WBS levels. However, in Primavera P6 this is unique only for a given level. You must provide a unique Activity Short Name or Code in Primavera P6.
- 7. In Oracle Projects, for the project templates you must select the following quick entry fields only: Project Name, Project Number, Project Start Date, and Project Finish Date.

**For more information** on project level fields that are transferred to Primavera P6, see the Describing the Transfer of Attributes section.

### **Prerequisites**

- 1. You must synchronize the global objects before attempting to synchronize projects between Oracle Projects and Primavera P6.
- 2. To integrate with Primavera P6, projects in Oracle Projects require some setup. The setup steps are as follows:
  - a. Create planning resource lists and planning rates schedules.
  - b. Setup integration options for the third-party application.
  - c. Assign planning resource list and rate schedule to third-party application definition. Select the operating units that you want to integrate to Primavera P6.
  - d. To integrate projects, WBS, and budgets, you must select the *Enable Integration* check box on the Integration Settings page.

Note. By default, the *Enable Integration* check box for a project is not selected.

e. You can synchronize projects by either marking them individually or adding the project to a batch scheduled run.

To mark a single project, open your project; select **Synchronize** from the **Shortcuts** list and then, click the **Go** button. The Synchronize option is available only for those projects for which Enable Integration check box is selected on the Integration Settings page.

**Note.** Select **Desynchronize** from the Shortcuts list to disable a project from synchronization.

To mark a project by adding to a batch scheduled run, execute the **Projects Integration:** Synchronize Projects, Structures, Budgets and Actuals concurrent program with Synchronize value as *All*.

**Note.** The **Synchronize** option is available only for those projects for which on the Projects Setup page, in the Integration Settings section the Enable check box is selected.

# Pages Used to Integrate Project Data between Oracle Projects and Primavera P6

### **Integration Settings**

The Integration Settings page is used to integrate project data between Oracle Projects and Primavera P6. This page defines the settings that allow a project or template to be enabled for integration.

### **Navigation**

Use the *Projects Super User* responsibility to navigate to the **Integration Settings** page either from a project template or from a project as follows:

- From Project Template From the Projects: Setup menu select the Project Templates link. On the Project Templates page for your project template, click the Update button. In the Setup Options section click Expand All. In the Setup list of attributes, under Project, for Integration Settings, click the Update button.
- From Project Click Create Project for new projects or Project List for existing projects as follows:
  - a. From the **Projects: Delivery** menu select the **Create Project** link. Select the **Create Project from Template** option. Enter project details and click the **Finish** button. On the project's home page select the **Setup** tab, then click the **Integration Settings** link in the **Other Project Setup** set of links.
  - b. From the Projects: Delivery menu select the Project List link. To open a project of your choice click the Project Name link. On the Setup tab click the Integration Settings link.

#### **Integration Settings Page**

This page has the following fields:

Field Name	Description
Enable Integration	Select this to enable integration of the project with the third-party application.
Integrate	Enables you to integrate a workplan structure or a financial structure. You can select a financial structure only for projects for which the workplan structure is not enabled. However, for Non-Shared: Mapped and Non-Shared: Non-Mapped structures, you can select financial structure even when workplan is enabled at

the project or template level.

**Note.** 1. The workplan structure and financial structure for a project are enabled at the project template level. 2. When creating a project, if you enabled both the workplan structure and the financial structure, you can integrate only the workplan structure.

# **Integrate** Option of Workplan Structure

The following fields are displayed when you select the Workplan Structure option:

- a. Send Actual Cost: Select a value to send the actual cost incurred in Oracle Projects to Primavera P6. You can select to send actual cost only if you have enabled financial structure. For fully shared structures Actual Cost is sent at resource assignment level and for other structures it is sent at the WBS level.
- Send Task: Select this to send the WBS from Oracle Projects to Primavera P6.

**Receive Task:** Select this to receive the WBS from Primavera P6 to Oracle Projects. For workplan structure WBS and activities are received; for financial structures only WBS is received.

Send Task and Receive Task fields govern the application that owns the WBS. Oracle Projects owns the WBS if you select the *Send Task* check box. Primavera P6 owns the WBS if you select the *Receive Task* check box. When you select both the check boxes, then both the applications can update or maintain the WBS. However, it is recommended that one application owns the WBS.

You can select the *Enable Workplan Versioning* check box on the Workplan Structure Information page to create working and published workplan versions. If you enable workplan versions and select the *Send Task* check box, the following fields are displayed:

- Current Published Version
- Current Working Version

Send Budget and Receive Budget fields are independent of selecting current working or published workplan version. You can send or receive budget only if you have enabled financial structure. However, for a fully shared structure you can send budget even if the workplan structure is enabled.

- **Send Budget** Select this to send financial plans to Primavera P6.
- Receive Budget Select this to receive financial plans from Primavera P6.

When sending financial plans or budgets to Primavera P6, you must also define the following financial plan attributes.

Plan Type – Select a plan type to synchronize and integrate the financial plan of

a project between Oracle Projects and Primavera P6. Select **Cost Only** plan type to receive budget.

**Budget Type** – Select a budget type to synchronize and integrate budgets between the participating applications. This option is useful for customers who do not want to implement Oracle Project Management but want to integrate with Oracle Project Costing. Budget or Financial Type has the following fields:

#### Current Baselined Version

### Current Working Version

You must select either plan type or budget type. If you select both, only plan type is considered for integration.

# **Integrate** Option of Financial Structure

All the fields are the same as mentioned for Integrate option of workplan structure, except that the fields for sending published and current workplan version fields are not available.

For a project containing a financial structure, if you select the **Send Task** check box, the **Structure Level** field is displayed.

**Structure Level** – Enter the number of WBS levels that Oracle Projects receives from Primavera P6. The default value is '0' indicating all levels.

**Note.** Oracle Project Costing customers who do not want to implement Oracle Project Management, can use the *Structure Level* field to integrate at summary level with Primavera P6 for scheduling and managing progress. For example, In Primavera P6, you can create a project with 8 levels in the WBS. If you specify the Structure Level as 4 in Oracle Projects then, only four levels of WBS is integrated from Primavera P6.

# Integrating Oracle Projects with Primavera P6 – Workplan-Enabled Project Integration

In Primavera P6 you create a project, define a WBS, define activities, and assign resources to activities. When you synchronize the WBS, activities, and assigned resources, Oracle Projects creates a workplan. This workplan is used to perform financial planning, collect cost, and bill customers. Actual cost is sent to Primavera P6 to manage the progress of a project, such as calculating percent complete and ETC.

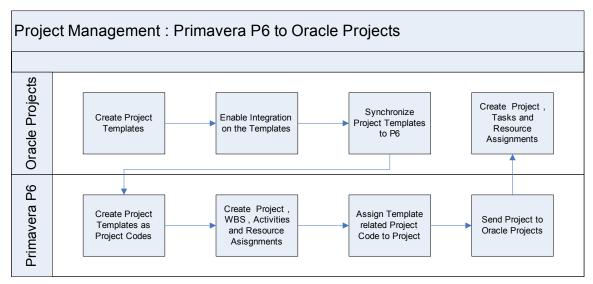
**Important!** You must select the *Enable Workplan Structure* check box for a project for workplan-enabled project integration.

### **Creating and Synchronizing a Project**

To create a project in Primavera P6 and send a copy of the project to Oracle Projects:

- Create a project template in Oracle Projects. Enable integration for the project and select Workplan Structure.
- 2. In Oracle Projects, execute the Projects Integration: Synchronize Projects, Structures, Budgets and Actuals concurrent program. Select Project Template Header from the Synchronize list. This adds the template name as a project code and saves the integration settings in Primavera P6.
- 3. In Primavera P6 create a project, create WBS and activities, assign resources to project, and associate a project template, using a project code, with the project.
- 4. In Primavera P6, execute the project status synchronization process using the Send to ERP link from the Primavera P6 Web application. Based on the integration settings, this process sends project, WBS, activities, and resource assignments to Oracle Projects.
- 5. Oracle Projects creates a project using the project template that is sent as an attribute from Primavera P6. It creates a workplan from the Primavera P6 WBS; defining P6 activities as tasks and P6 resource assignments as task assignments.

The following graphic illustrates the process flow of project data between Primavera P6 and Oracle Projects:



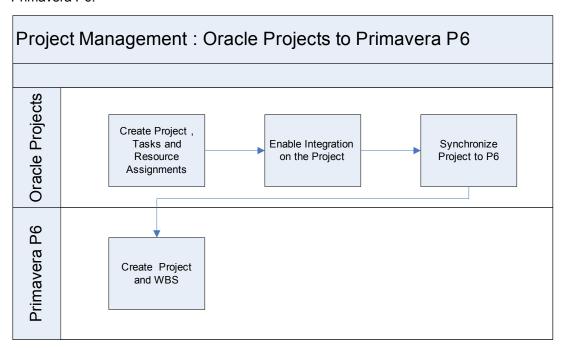
Project created in Primavera P6 and synchronized to Oracle Projects

To create a project in Oracle Projects and send a copy of the project to Primavera P6:

- In Oracle Projects, create a project from an existing project or a template. Select the *Enable Integration* check box for the project. Create a workplan for the project without assigning any resources to it.
   Resource assignments created in Oracle Projects are not synchronized to Primavera P6. However, the actual cost associated with the resource assignments that are sent from Primavera P6 are synchronized back to Primavera P6.
- 2. Execute the **Projects Integration: Synchronize Projects, Structures, Budgets and Actuals** concurrent program to send the project and WBS to Primavera P6.

Primavera P6 creates the project and WBS.

The following graphic illustrates the process flow of project data between Oracle Projects and Primavera P6:



Project created in Oracle Projects and synchronized to Primavera P6

### **Assigning and Synchronizing Resources to the Project**

When you create a project in Primavera P6, you assign resources to the project.

When you create a project in Oracle Projects, first synchronize the project and WBS with Primavera P6 by executing the Projects Integration: Synchronize Projects, Structures, Budgets and Actuals concurrent program. Then, in the Primavera P6 project schedule, expand the WBS, create activities, and assign resources to the project.

# **Creating a Financial Plan in Oracle Projects**

In Oracle Projects, you can generate a financial plan based on a workplan or create one manually.

For more information about workplan and financial plan, see *Oracle Projects Fundamentals* and *Oracle Projects Implementation Guide*.

### **Collecting and Synchronizing Cost**

### To collect cost in Oracle Projects and send the actual cost to Primavera P6:

- 1. In Oracle Projects use the financial structure to collect cost for the project. Execute the Project Performance related concurrent programs to map actual costs to the workplan structure.
- 2. Execute the Projects Integration: Synchronize Projects, Structures, Budgets and Actuals concurrent program with the *Synchronize* value as *Actuals* to send actual costs to Primavera P6. The actual costs are sent at project, WBS, and resource assignment levels.

Primavera P6 receives the actual cost for the project.

### **Managing and Synchronizing Progress**

### To manage progress information in Primavera P6 and send it to Oracle Projects:

- 1. In Primavera P6 execute the **Summarizer** process, to calculate and derive the progress management attributes such as ETC and EAC.
- 2. In Primavera P6 execute the **Project Status** synchronization process, to send project, WBS, activities, resource assignments, and physical percent complete to Oracle Projects.
- **3.** Oracle Projects updates the project, workplan, and resource assignments with the received progress management data.

## **Changing and Synchronizing Workplan**

In a WBS, you can change the dates, tasks, or structure. The changes can be performed in Oracle Projects or Primavera P6. To synchronize the changes between both the applications execute the **Project Status** synchronization program in Primavera P6 or the **Projects Integration: Synchronize Projects, Structures, Budgets and Actuals** concurrent program in Oracle Projects. This program updates, creates, and deletes the WBS in the participating applications.

## **Changing and Synchronizing the Financial Plan**

To change a financial plan in Oracle Projects and send the information to Primavera P6:

1. In Oracle Projects, change the financial plan and baseline the changes.

In Oracle Projects execute the Projects Integration: Synchronize Projects, Structures, Budgets
and Actuals concurrent program. Select Synchronize value as Budgets to send financial plan changes
to Primavera P6.

Primavera P6 receives the changes as the current budget. A budget change log is created in Primavera P6 to track the change in budget amount between past and present synchronizations.

## **Closing and Synchronizing a Project**

To close or deactivate a project in Oracle Projects and synchronize it with Primavera P6:

- 1. In Oracle Projects, set the status of the project to *Closed*.
- In Oracle Projects execute the Projects Integration: Synchronize Projects, Structures, Budgets
  and Actuals concurrent program. Select Synchronize value as Project Header to send project header
  changes to Primavera P6.

**System Status** attribute sends the changes to Primavera P6, which in turn renders the project inactive in Primavera P6.

**Note.** You must define and map the relevant values between Oracle Projects and Primavera P6 in the PROJECT\_STATUSCODE DVM to send the status change from Oracle Projects to Primavera P6.

To close or deactivate a project in Primavera P6 and synchronize it with Oracle Projects:

- 1. In Primavera P6, set the status of the project to *Inactive*.
- **2.** Change the financial status of the project to render the project inactive by synchronizing from Primavera P6.

# Integrating Oracle Projects with Primavera P6 – Project Integration with Workplan Not Enabled

In Primavera P6 you create a project, define WBS, define activities and assign resources to the activities. Enable summarized level or complete WBS level integration in Oracle Projects. After you synchronize the summarized level or complete WBS to Oracle Projects as financial structure, Oracle Projects uses the financial structure to perform financial planning, collect cost, and bill customers. Actual cost is sent to Primavera P6 to manage the progress of a project, such as calculating percent complete and ETC.

**Important!** You must select the *Enable Financial Structure* check box for a project for project integration with workplan not enabled.

## **Creating and Synchronizing Project**

To create a project in Primavera P6 and send a copy of the project to Oracle Projects:

- 1. Create a project template in Oracle Projects. Select the *Enable Integration* check box for the project template.
- 2. Select the *Financial Structure* option on the Integration Settings page in Oracle Projects. Enter Structure Level to create a financial structure up to the specified WBS level when receiving it from Primavera P6. This ensures that any task created under this level of the setup is not considered for integration with Primavera P6.
- 3. In Oracle Projects, execute the Projects Integration: Synchronize Projects, Structures, Budgets and Actuals concurrent program. Select Project Template Header from the Synchronize list. This adds the template name as a project code and saves the integration settings in Primavera P6.
- **4.** In Primavera P6 create a project, create WBS and activities, assign resources to the project, and associate a project template, using project codes, with the project.
- 5. In Primavera P6, execute the Project Status synchronization process. Based on the integration settings for a financial structure enabled project template, the process sends project, detailed or higher level WBS to Oracle Projects.

Oracle Projects creates a project by using the project template that is sent as an attribute from Primavera P6. Oracle Projects creates financial tasks using the P6 WBS.

To create a project in Oracle Projects and send a copy of the project to Primavera P6:

- 1. In Oracle Projects, create a project from an existing project or a template. Select the *Enable Integration* check box for the project and specify the WBS level for integration.
- 2. Select the *Financial Structure* option on the **Integration Settings** page. Enter *Structure Level* to create a financial structure up to the specified WBS level. This ensures that any task created under this level of the setup is not considered for the integration with Primavera P6.
- 3. Execute the **Projects Integration: Synchronize Projects, Structures, Budgets and Actuals** concurrent program to send the project and WBS to Primavera P6.

Primavera P6 creates the project and WBS.

## Assigning and Synchronizing Resources to the Project

When you create a project in Primavera P6, you assign resources to the project.

When you create a project in Oracle Projects, first synchronize the project and WBS with Primavera P6 by executing the Projects Integration: Synchronize Projects, Structures, Budgets and Actuals concurrent program. Then, in the Primavera P6 project schedule, expand the WBS, create activities, and assign resources to the project.

### **Creating a Financial Plan in Oracle Projects**

In Oracle Projects, you can

- Create a financial plan manually.
- Synchronize the project to Primavera P6. Primavera P6 expands the project schedule, assigns resources and generates an initial version of the detailed cost plan. In Primavera P6, execute the **Budget Synchronization** process to obtain the planned cost as the initial cost financial plan.

For more information about workplan and financial plan, see *Oracle Projects Fundamentals* and *Oracle Projects Implementation Guide*.

### **Collecting and Synchronizing Cost**

To collect cost in Oracle Projects and send the actual cost to Primavera P6:

- 1. In Oracle Projects use the financial structure to collect cost for the project. Execute the Project Performance related concurrent programs to map actual costs to the financial structure.
- Execute the Projects Integration: Synchronize Projects, Structures, Budgets and Actuals
  concurrent program with Synchronize value as Actuals to send actual costs to Primavera P6. The actual
  costs are sent at project, WBS, and resource assignment levels.

Primavera P6 receives the actual cost for the project. Actual cost is received at the WBS level and stored in the UDF fields.

# **Managing Progress**

### To manage progress information in Primavera P6:

1. In Primavera P6 execute the **Summarizer** process, to calculate and derive progress attributes, such as ETC and EAC.

# **Changing and Synchronizing WBS**

To change WBS in Primavera P6 and send the information to Oracle Projects:

- 1. In Primavera P6 for a project WBS, you can change the dates, tasks, or structure.
- 2. In Primavera P6 execute the **Project Status** synchronization process, to send the changes to Oracle Projects.

Oracle Projects updates the WBS with the changes. While receiving task details, Oracle Projects identifies the missing tasks, which are later considered for deletion.

#### To change WBS in Oracle Projects and send information to Primavera P6:

- 1. In Oracle Projects for a project WBS, you can change the dates, tasks, or structure.
- 2. Execute the **Projects Integration: Synchronize Projects, Structures, Budgets and Actuals** concurrent program in Oracle Projects to send the changes to Primavera P6.

Primavera P6 updates the WBS with the changes. While receiving task details, Primavera P6 identifies the missing tasks, which are later considered for deletion.

### **Changing and Synchronizing Financial Plan**

To change a financial plan in Oracle Projects and send the information to Primavera P6:

- 1. In Oracle Projects, change the financial plan and optionally baseline the changes.
- 2. In Oracle Projects execute the **Projects Integration: Synchronize Projects, Structures, Budgets** and **Actuals** concurrent program with **Synchronize** value as **Budgets** to send financial plan changes to Primavera P6. Based on the integration settings a working or baselined version of the budget is sent to Primavera P6.

Primavera P6 receives the changes as the current budget. A budget change log is created to track the changes in budget amounts between previous and current synchronizations.

# Changing the Project Plan in Primavera P6 and Bringing the Changes as a Cost Budget into Oracle Projects

To make changes to the Project Plan in Primavera P6 and bring them as Cost Budget to Oracle Projects:

- 1. Change the project plan in Primavera P6.
- 2. In Primavera P6, execute the **Budget** synchronization process to send the changes to Oracle Projects.
- 3. Oracle Projects receives the project plan changes as the Current Working Budget.

## Closing and Synchronizing a Project

To close or inactivate a project in Oracle Projects and synchronize it with Primavera P6:

1. In Oracle Projects, set the status of the project to *Closed*.

2. In Oracle Projects execute the **Projects Integration: Synchronize Projects, Structures, Budgets** and **Actuals** concurrent program with **Synchronize** value as **Project Header** to send the project header changes to Primavera P6.

**System Status** attribute sends the changes to Primavera P6, which in turn renders the project inactive in Primavera P6.

To close or inactivate a project in Primavera P6 and synchronize it with Oracle Projects:

- 1. In Primavera P6, set the status of the project to *Inactive*.
- 2. In Oracle Projects, change the financial status of the project to render the project inactive.

# **AIA Components**

The following AIA components are used to synchronize projects between Oracle Projects and Primavera P6.

#### **Adapter**

- SyncProjectListEbizAdapter Used to call the synchronizing projects API to create or update projects in Oracle Projects.
- GetOperatingUnitEbizAdapter Used to obtain the operating unit for the project or project template in Oracle Projects.
- SyncProjectFinancialListEbizAdapter Used to call the synchronizing budgets API to create or update budgets in Oracle Projects.

#### **Requester ABCS**

- SyncProjectListEbizReqABCSImpl
- SyncProjectListP6EPPMRegABCSImpl
- SyncProjectFinancialListEbizRegABCSImpl
- SyncProjectFinancialPlanListP6EPPMReqABCSImpl

#### **Provider ABCS**

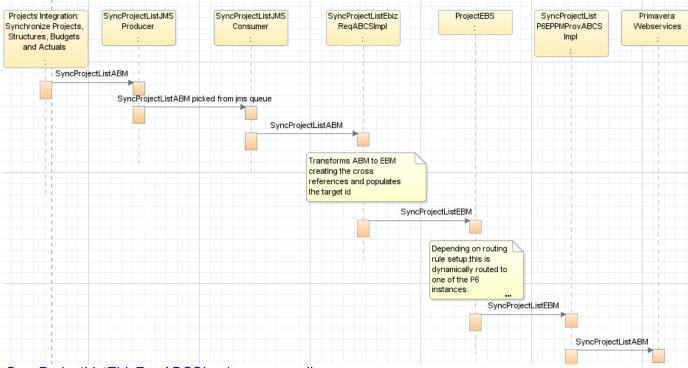
- SyncProjectListEbizProvABCSImpl
- SyncProjectListP6EPPMProvABCSImpl
- SyncProjectFinancialListEbizProvABCSImpl
- SyncProjectFinancialPlanListP6EPPMProvABCSImpl

### SyncProjectListEbizReqABCSImpl

SyncProjectListEbizReqABCSImpl process is used to synchronize projects from Oracle Projects with Primavera P6. The **Projects Integration: Synchronize Projects, Structures, Budgets and Actuals** concurrent program uses this BPEL process. Requester ABCS populates the XREF information and transforms **SynProjectListABM** to **SynProjectListEBM** using the **XformSyncProjectListABM\_to\_SyncProjectListEBM.xsI** file. This in turn initiates the **ProjectEBS** service. The SyncProjectListEbizReqABCSImpl service connects project data with Primavera P6.

#### Integration Flow

The following graphic illustrates the sequence diagram for the SyncProjectListEbizReqABCSImpl process:



SyncProjectListEbizRegABCSImpl sequence diagram

# Sync Project List Ebiz Prov ABC SImpl

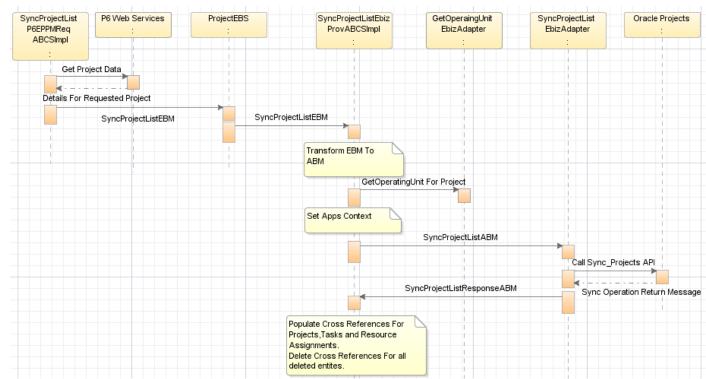
SyncProjectListEbizProvABCSImpl process is used to synchronize projects from Primavera P6 with Oracle Projects. This BPEL process calls the **SyncProjects** API to create or update projects in Oracle Projects and populate the XREF tables.

The XFormSyncProjectListEBM\_To\_SyncProjectListABM.xsI file transforms SyncProjectListEBM to SyncProjectListABM object.

XformSyncProjectListResponseABM\_To\_SyncProjectListResponseEBM.xsI transforms SyncProjectListResponseABM to SyncProjectListResponseEBM object and updates the cross-reference information.

#### Integration Flow

The following graphic illustrates the sequence diagram for the SyncProjectListEbizProvABCSImpl process:



SyncProjectListEbizProvABCSImpl sequence diagram

# Sync Project Financial List Ebiz Prov ABCS Implement the property of the pro

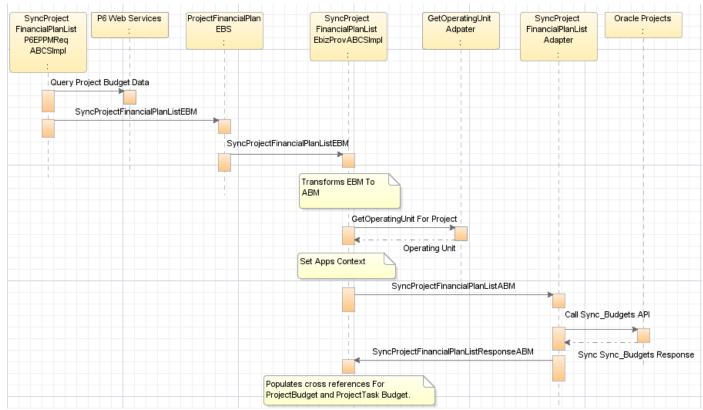
SyncProjectFinancialListEbizProvABCSImpl process is used to synchronize the project financial plan list from Primavera P6 to Oracle Projects. This BPEL process calls the **SyncBudgets** API to create or update budgets in Oracle Projects and populate the XREF tables.

The XFormSyncProjectFinancialListEBM\_To\_ SyncProjectFinancialList ABM.xsl file transforms SyncProjectFinancialListEBM to SyncProjectFinancialListABM object.

The XformSyncProjectFinancialListResponseABM\_To\_SyncProjectFinancialList ResponseEBM.xsI file transforms SyncProjectFinancialListResponseABM to SyncProjectFinancialListResponseEBM object and updates the cross-reference information.

#### Integration Flow

The following graphic illustrates the sequence diagram for the SyncProjectFinancialListEbizProvABCSImpl process:



SyncProjectFinancialListEbizProvABCSImpl sequence diagram

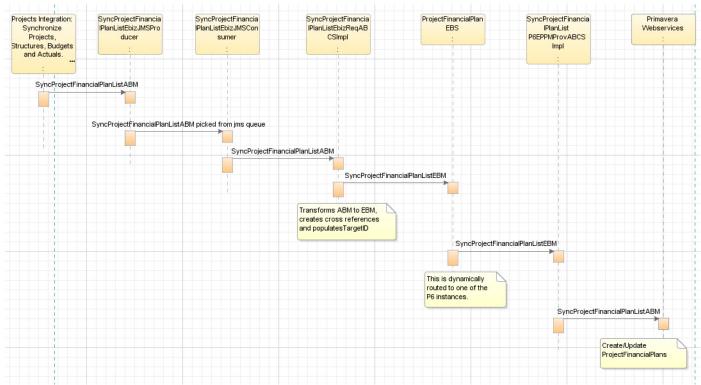
### SyncProjectFinancialListEbizReqABCSImpl

SyncProjectFinancialListEbizReqABCSImpl process is used to synchronize a project budget from Oracle Projects to Primavera P6. The Projects Integration: Synchronize Projects, Structures, Budgets and Actuals concurrent program calls this BPEL process and passes it to ProjectFinancialListABM.

The XformSyncProjectFinancialListABM\_to\_SyncProjectFinancialListEBM.xsI file transforms SyncProjectFinancialListABM to SyncProjectFinancialListEBM object.

### **Integration Flow**

The following graphic illustrates the sequence diagram for the SyncProjectFinancialListEbizRegABCSImpl process:



SyncProjectFinancialListEbizReqABCSImpl sequence diagram

# Chapter 5 - Implementing the Oracle Project Management Integration Pack for Primavera P6 and Oracle E-Business Suite 2.5

Before using the Project Portfolio Management: Primavera P6-EBS Projects PIP, you must complete all the necessary implementation and configuration tasks. Complete these tasks after you have installed the appropriate AIA foundation pack and the PIP.

This chapter discusses the following:

- Overview of the implementation process
- Setting up the Oracle Projects application
- Setting up the Primavera P6 application
- Describing the transfer of attributes
- Loading cross reference data
- Configuring the PIP
- Describing domain value maps
- Reviewing default routing rules
- Viewing EBO Implementation Maps

# **Overview of the Implementation Process**

Deployment of the Project Portfolio Management: Primavera P6-EBS Projects PIP is carried out by AIA Installer. However, for conducive functioning, this requires certain settings and configurations in the participating applications and AIA configuration properties files.

The following applications should be set before installing the PIP:

- SOA 10.1.3.4 should be installed and MLR8 patch 8372150 is to be applied.
- AIA Foundation Pack P2.5 should be installed with relevant patches applied, if any.
- Primavera P6 v7 must be installed and configured accordingly.
- One of the following from Oracle Projects:
  - 11.5.10 CU2
  - 11i.PJ PF.M.RUP4 patch 5644830

# **Setting Up the Oracle Projects Application**

You must perform the following before you can send any data from Oracle Projects to Primavera P6 or vice-versa, you must perform the following:

- Set up the application
- Execute the concurrent programs
- Set the profile option

### **Setting the Setup Steps**

The setup steps for Oracle Projects are as follows:

Setup Step	Requir ed/Opt	Setup Level	Responsibil ity	Comments
	ional	Level	ity	
Define Planning Resource List	Optional	OU or Site	Projects Implementation Super User	Single global planning resource list is used for one P6 instance. All the planning resources that are integrated must be defined in the planning resource list. The list must be centrally controlled and enabled for workplan.
Define Rate Schedule for Employees, Job, Nonlabor Resources	Optional	OU or Site	Projects Implementation Super User	Select the <b>Share Across Operating Units</b> check box for all rate schedules.
Define Third-Party Application	Required	Site	Projects Implementation Super User	Name must be the same as the Primavera P6 instance's third-party application name.
				<b>Currency</b> must be the same as the base currency of Primavera P6.
				The following conversion attributes are available only for the planning resource rates: rate type, rate date type, and rate.
Assign Planning Resource List to Third-Party Application	Optional	Site	Projects Implementation Super User	You must perform this step to synchronize resource assignment and planning resource-based budget information from Primavera P6 to Oracle Projects.
Assign Rate Schedule to Third- Party Application.	Optional	Site	Projects Implementation Super User	You must perform this step to synchronize resource assignment and planning resource-based budget

				information from Primavera P6 to Oracle Projects.
Assign Operating Units to Third-Party Application	Required	Site	Projects Implementation Super User	Select the <i>All Operating Units</i> check box for selecting all operating units.
Define Project Template and Enable Integration	Required	OU (set at the responsibilit y level )	System Administrator	To select the <i>Enable Integration</i> check box for a project template, from the Projects: Setup menu select the <i>Integration Settings</i> link.
Define Project and Enable Integration	Optional	OU	System Administrator	To select the <i>Enable Integration</i> check box for a project, from the Projects: Home page, on the Setup tab, select the <i>Integration Settings</i> link.

### **Integration Settings**

- You must enable a Structure for the project that is going to be integrated. Based on the project structure, select either the *Enable Workplan Structure* or *Enable Financial Structure* check boxes on the Structures page.
- 2. You must select the *Enable Integration* check box to enable integration of a project.

### **Executing the Concurrent Programs**

The following concurrent programs are used to synchronize data from Oracle Projects to Primavera P6:

Step	Concurrent Program	Responsibility
Synchronize/Send Planning Resource to Primavera P6	Projects Integration: Synchronize Planning Resources and Rates	Projects Implementation Super User
Synchronize/Send Project Templates to Primavera P6	Projects Integration: Synchronize Projects, Structures, Budgets and Actuals	System Administrator
Synchronize/Send Project to Primavera P6	Projects Integration: Synchronize Projects, Structures, Budgets and Actuals	System Administrator
Synchronize/Send Budgets to Primavera P6	Projects Integration: Synchronize Projects, Structures, Budgets and Actuals	System Administrator
Synchronize/Send Actual Cost to Primavera P6	Projects Integration: Synchronize Projects, Structures, Budgets and Actuals	System Administrator

# **Setting the Profile Option**

Set the following profile option in Oracle Projects to connect to the integration server:

Profile	Value	Setup	Required/	Navigation
Option		Level	Optional	
PA: Integration	<soa host<="" server="" td=""><td>Site or User</td><td>Required</td><td>3. Login as <b>sysadmin/sysadmin</b></td></soa>	Site or User	Required	3. Login as <b>sysadmin/sysadmin</b>
Server Host Name	name/port/end point> For example:			<ol> <li>Go to System Administrator/ Responsibility</li> </ol>
	http://sdc60007sems. us.oracle.com;7863.			5. Under Profile /Menu click <b>System</b> / <b>Link</b>
	us.oracle.com.7005.			<ol> <li>Search for the PA: Integration Server         Host Name profile option and set the         appropriate value</li> </ol>

# **Setting Up the Primavera P6 Application**

Before you can send any data from Primavera P6 to Oracle Projects, you must set up Primavera P6 to work with Oracle Projects.

Setting up Primavera P6 includes:

- Defining the Configuration Settings
- Authorizing Users to Send Data to ERP systems
- Running the Primavera P6 Setup Utility
- Understanding Primavera P6 Role Name and Resource Rate Data

## **Defining the Configuration Settings**

You use configuration settings to specify how Primavera P6 integrates with ERP applications. This PIP utilizes the values that are entered in the configuration settings that begin with **Database/Instance/AIA**.

This PIP is configured to use the standard default configuration settings. However, if you choose to change any of the values in the AIAConfigurationProperties.xml file, ensure that you update the value in the corresponding configuration property in Primavera P6.

**Warning!** Only an experienced Primavera P6 administrator should use the P6 Administration application to modify configuration settings.

**For more information** about Primavera P6 configuration settings, see *Oracle's Primavera P6 Administrator's Guide, "Installing P6 Web Access", <u>Configuration Settings for P6 Web Access.</u>* 

### **Authorizing Users to Send Data to ERP Systems**

To initiate the integration processes from Primavera P6 to Oracle Projects, users must access the Send to ERP option from the Primavera P6 menu. In order to access this menu option, users must have authorization. A Primavera P6 administrator can set up specific user security profiles with the appropriate privileges to access this menu option and application.

In the Primavera P6 Project Management client, administrators follow these steps to set the appropriate security privileges:

7. Select Admin, and then Security Profiles.

In the Security Profiles dialog box, select Project Profiles.

Select the Allow Integration with ERP System option in the Privilege table.

After the administrator has set these privileges, the user who has been granted the privilege can view the Send to ERP command from the Open Projects menu on the Activities page of Web Access.

**For more information** about Primavera P6 security settings, see *Oracle's Primavera P6 Administrator's Guide*, "Application Administration", Defining Project Profiles.

### Running the Primavera P6 Setup Utility

You must run the AIAP6EPPMSetupUtility.bat utility before using the PIP. This utility does the following:

- Maximizes the data limits on ID fields
- Creates and validates UDF fields for AIA integrations
- Creates and validates project code that is required for the integration
- Creates and validates EPS node that is required for the integration

The utility and detailed instructions are located in the AIAP6EPPMSetupUtility.zip file. This file is present at the following location on <AIA Home>:

/PIPS/Core/PrimaveraP6/Utilities/AIAP6EPPMSetupUtility/AIAP6EPPMSetupUtility.zip

### **UDF** Information

When you run the utility several UDFs are created in Primavera P6. Each UDF corresponds to a setting in the AIAConfigurationProperties.xml file. If you update any of the UDFs that this utility creates, you must also update the associated tag in the AIAConfigurationProperties.xml file.

The following table provides information about the UDFs for this PIP:

UDF Name	UDF	AIA Configuration Property Tag	UDF
	Subject Area		Data Type

ERP Description	Project	Project.Description.Field.Name	Text
ERP Description	WBS	WBS.Description.Field.Name	Text
ERP Description	Activity	Activity.Description.Field.Name	Text
ERP Actual Raw Total Cost Amount	WBS	WBS.ActualRawTotalCostAmount.Field.Name	Cost
ERP Actual Raw Total Cost Amount	Activity	Activity.ActualRawTotalCostAmount.Field.Name	Cost
ERP Actual Burdened Total Cost Amount	WBS	WBS.ActualBurdenedTotalCostAmount.Field.Name	Cost
ERP Actual Burdened Total Cost Amount	Activity	Activity.ActualBurdenedTotalCostAmount.Field.Name	Cost
ERP Total Raw Cost Amount	WBS	WBS.TotalRawCostAmount.Field.Name	Cost
ERP Total Burdened Cost Amount	WBS	WBS.TotalBurdenedCostAmount.Field.Name	Cost
ERP Actual Burdened Cost Amount	Resource Assignment	ResAssignment.ActualBurdenedCostAmount.Field.Name	Cost
ERP Total Burdened Cost Amount	Resource Assignment	ResAssignment.TotalBurdenedCostAmount.Field.Name	Cost

#### **Enterprise Project Structure**

When you create projects in Primavera P6, the system must know what Enterprise Project Structure (EPS) to use so that the project is at the correct hierarchical level. The utility defines the EPS for this PIP as *Imported Projects*.

If you change the EPS for this PIP, you must update the EPS.Default.ID tag in the AIAConfigurationProperties.xml file.

### **ERP Project Template Field**

The utility creates the project code ERP Project Template, which is used when creating a new project in Primavera P6. You must enter a project template in this field so that the Oracle Projects application knows which template to use as the model when creating a new project.

# **Understanding Primavera P6 Role Name and Resource Rate Data**

Some of the Primavera P6 data is handled differently in this PIP than in other applications. To accommodate the differences in each system, some of the items in Primavera P6 are handled differently so that this PIP functions properly.

#### **Role Name**

Role Name in Primavera P6 can have a maximum of 100 characters and must be unique. Other applications may not have unique names for roles. Therefore, to ensure that role names are unique, this PIP utilizes this formula when inserting a role name into Primavera P6, using attributes from the ProjectResourceSetEBO:

```
Role name + space + [AlternateObjectKey (if exists) OR Application
Object key.]
```

#### **Resource Rate Unit of Measure**

Primavera P6 supports only *Hourly* as a unit of measure for labor and nonlabor resources. Therefore, Primavera P6 can support only those unit codes [UOM] that can be converted into the hourly unit code. The supported UOM codes are: Daily, Weekly, and Monthly. If a UOM code is not supported, it is ignored during processing.

Primavera P6 uses standard conversion rates for the following incoming unit codes when converting to hourly units:

- Hourly = 1 hour
- Daily = 8 hours
- Weekly = 40 hours
- Monthly = 160 hours

# **Describing the Transfer of Attributes**

The following tables list the workplan and financial plan attributes transferred between Oracle Projects and Primavera P6, the direction of data transfer, the Oracle Projects fields, and the corresponding fields in Primavera P6.

The following table lists the Oracle Projects fields, Primavera P6 fields, and direction of data transfer for the **integration** attributes:

Workplan-	Project with	Primavera P6	Direction of Data
Enabled Project	Workplan not enabled		Transfer
Planning Resource List	Planning Resource List	Resources, Roles, Expense Category	Oracle Projects to Primavera P6
Rates Schedule	Rates Schedule	Resources and Role	Oracle Projects to Primavera P6

		Rates	
Project	Project	Project	Both ways
Workplan Task	Financial Task	WBS Node	Both ways
Workplan Task	No Integration	Activities	Both ways
Workplan Resource	No Integration	Resource Assignments,	Primavera P6 to Oracle Projects
Assignment		Activity Expenses, and Role Assignments	Oracle Projects to Primavera P6: Workplan resource assignments created from Primavera P6 are sent to Primavera P6 for synchronizing updates
			Workplan resource assignments created in Oracle Projects are not sent to Primavera P6
No Integration	Financial Plan / Budget Resource Assignments	Summarized WBS Node Level Planned Cost and Summarized Resource Assignments Level Planned Cost	Primavera P6 to Oracle Projects
Budget Amounts	Budget Amounts	Project and WBS Node Level Current Budget and Original Budget	Oracle Projects to Primavera P6

The following table lists the Oracle Projects fields, Primavera P6 fields, and direction of data transfer for the **project** attributes:

Oracle Projects Field	Primavera P6 Field	Direction of Data Transfer
Number	Project ID	Both ways
Name	Project Name	Both ways
Description	UDF: ERP Description	Both ways
Start Date	Start	Both ways
Completion Date	Finish	Both ways
Early Start Date	Early Start Date	Primavera P6 to Oracle Projects
Early Finish Date	Early Finish Date	Primavera P6 to Oracle Projects
Actual Start Date	Actual Start Date	Primavera P6 to Oracle Projects
Actual Finish Date	Actual Finish Date	Primavera P6 to Oracle Projects
Currency Code	P6 Currency	Primavera P6 to Oracle Projects
Source Project Number	Project Code	Primavera P6 to Oracle Projects
System Status	Status	Oracle Projects to Primavera P6

The following table lists the Oracle Projects fields, Primavera P6 fields, and direction of data transfer for the **task** attributes:

Oracle Projects Field	Primavera P6 Field	Direction of Data Transfer
Number	WBS Code / Activity ID	Both ways
Name	WBS Name / Activity Name	Both ways
Description	UDF: ERP Description	Both ways
Start Date	Planned Start Date	Both ways
Completion Date	Planned End Date	Both ways
Early Start Date	Early Start for Activities	Primavera P6 to Oracle Projects
	Remaining Early Start for WBS	
Early Finish Date	Early Finish for Activities	Primavera P6 to Oracle Projects
	Remaining Early Finish for WBS	
Late Start Date	Late Start for Activities	Primavera P6 to Oracle Projects
Late Finish Date	Early Finish for Activities	Primavera P6 to Oracle Projects
Scheduled Start date	Planned Start Date	Both ways
Scheduled Finish date	Planned Completion Date	Both ways
Baseline Start Date	Baseline Start Date	Primavera P6 to Oracle Projects
		For Oracle Projects to Primavera P6, data transfer is accepted only at the activity level
Baseline Finish Date	Baseline Finish Date	Primavera P6 to Oracle Projects
		For Oracle Projects to Primavera P6, data transfer is accepted only at the activity level
External Actual Duration	Planned Duration	Primavera P6 to Oracle Projects
External Remaining Duration	Remaining Duration	Primavera P6 to Oracle Projects
ETC Effort	ETC Labor Quantity	Primavera P6 to Oracle Projects
Physical Performance Complete	Performance Percent Complete	Primavera P6 to Oracle Projects
Actual Raw Cost	WBS Node and Activity level UDF: Actual Raw Total Cost Amount	Oracle Projects to Primavera P6
Actual Burden Cost	WBS Node and Activity level UDF: Actual Raw Total Cost Amount	Oracle Projects to Primavera P6

The following table lists the Oracle Projects fields, Primavera P6 fields, and direction of data transfer for the **resource assignment** attributes:

Oracle Projects Field	Primavera P6 Field	Direction of Data Transfer

Planning Resource Name	Resource Name, Role Name, Expense Category	Create: from Primavera P6 to Oracle Projects
		Updates: Both ways; only for reference
Name	Resource Assignment Name	Both ways
Start Date	Planned Start Date	Both ways
Completion Date	Planned End Date	Both ways
Quantity	Planned Quantity	Both ways
Raw Cost	Planned Cost	Both ways
Actual Raw Cost	Actual Cost	Oracle Projects to Primavera P6
Actual Burden Cost	UDF: ERP Actual Burdened Cost Amount	Oracle Projects to Primavera P6
Current Period Actual Raw Cost	UDF: Actual This Period Cost	Oracle Projects to Primavera P6
	UDF: ERP Total Burdened Cost Amount	

# **Describing Cross-References**

Cross-references map and connect the records within the application network and enable these applications to communicate in the same language. The integration server stores the relationships in a consistent way so that others can refer to it.

**For more information**, see Oracle Application Integration Architecture – Foundation Pack - Integration Developer's Guide and the Oracle Cross Reference User Guide.

# **Cross-Reference Tables for Project Portfolio Management: Primavera P6-EBS Projects PIP**

This table lists the cross-references for the PIP:

XREF_TABLE_NAME	XREF_COLU MN_NAME	Description	Usage
PROJECTRESOURCESET_ID	EBIZ_01	Unique identifier of the planning resource list in Oracle Projects	Populate the value or lookup for the corresponding common value
	COMMON	System generated project identifier	Lookup/display during project resource set flow
PROJECTRESOURCESET_R ESOURCEID	EBIZ_01	Unique identifier of the planning resource in a	Populate the value or lookup for the corresponding common value

XREF_TABLE_NAME	XREF_COLU MN_NAME	Description	Usage
		planning resource list	
	COMMON	System generated project structure identifier	Lookup/display during project resource set flow
	P6EPPM_01	Resource, expense category, and role object identifiers	Lookup/display during project resource set flow
		For resources the data is prefixed with RESOURCE::	
		For expense category the data is prefixed with NON_SCHEDULABLE::	
		For roles the data is prefixed with ROLE::	
PROJECTRESOURCERATES CHEDULE_ID	EBIZ_01	Unique identifier of the resource rate schedule	Populate the value or lookup for the corresponding common value
	COMMON	System generated resource rate identifier	Lookup/display during project resource rate schedule flow
PROJECTRESOURCERATES CHEDULE_LINEID	EBIZ_01	Unique identifier of the resource rate schedule lines	Populate the value or lookup for the corresponding common value
	COMMON	System generated resource rate identifier	Lookup/display during project resource rate schedule flow
	P6EPPM_01	Resource rate and role rate object identifiers	Lookup/display during project resource rate schedule flow
		For resource rate the data is prefixed with RESOURCERATE::	
		For role rate the data is prefixed with ROLERATE::	
PROJECT_ID	EBIZ_01	Unique identifier of the project	Populate the value or lookup for the corresponding common value
	COMMON	System generated project identifier	Lookup/display during project flow
	P6EPPM_01	Project identifier	Lookup/display during project flow

XREF_TABLE_NAME	XREF_COLU MN_NAME	Description	Usage
RESOURCE_ASSIGNMENT_I D	EBIZ_01	Identifier of a resource assignment for a project	Populate the value or lookup for the corresponding common value
	COMMON	System generated resource assignment identifier	Lookup/display during project or task flow
	P6EPPM_01	Resource assignment identifier	Lookup/display during project or task flow
PROJECT_TASK_ID	EBIZ_01	Unique identifier of the project tasks	Populate the value or lookup for the corresponding common value
	COMMON	System generated project task identifier	Lookup/display during project task flow
	P6EPPM_01	WBS and activity object identifiers	Lookup/display during project task flow
		For WBS the data is prefixed with WBS::	
		For activity the data is prefixed with ACTIVITY::	
PROJECTFINANCIALPLAN_I D	EBIZ_01	Unique identifier of the financial plan or budget for a project	Populate the value or lookup for the corresponding common value
	COMMON	System generated financial plan identifier	Lookup/display during budget flow
	P6EPPM_01	Unique project identifier	Lookup/display during budget flow
PROJECTFINANCIALPLAN_T ASK_ID	EBIZ_01	Unique identifier of the budget for a task	Populate the value or lookup for the corresponding common value
	COMMON	System generated financial plan task identifier	Lookup/display during financial task flow
	P6EPPM_01	Unique identifier of the task or WBS for which the budget is allocated	Lookup/display during financial task flow
PROJECTFINANCIALPLAN_T ASKLINE_ID	EBIZ_01	Unique identifier of the budget for resource assignments	Populate the value or lookup for the corresponding common value
	COMMON	System generated financial plan task identifier	Lookup/display during financial task flow

# **Describing the Domain Value Maps**

Domain value maps (DVMs) are a standard feature of the Oracle SOA Suite and enable you to equate lookup codes and other static values across applications. For example, FOOT and FT, or US and USA.

DVMs are static in nature, though administrators can add additional maps as needed. Transactional business processes never update DVMs; they only read from them. They are stored in XML files and cached in memory at runtime.

DVM types are predefined for the Project Portfolio Management: Primavera P6-Oracle Projects PIP flows, and administrators can extend the list of mapped values by adding more maps. The DVM data should be in sync with what the participating applications use. This sync-up should be done prior to running any initial loads, or initiating any incremental transactional flows.

**Note:** DVMs are not automatically synchronized. Therefore, if new UDC values are added in Oracle Projects or new values are added in Primavera P6, those values must be manually added to the appropriate DVM, if applicable.

This section contains the DVMs for the Project Portfolio Management: Primavera P6-Oracle Projects PIP.

**For more information**, see Oracle Application Integration Architecture – Foundation Pack: Integration Developer's Guide, "Developing Custom XPath Functions."

DVM	DVM Column Name	Description of mapping
		between Oracle Projects and Primavera P6
PROJECTRESOURCERATESCHEDULE_TYPEC ODE	EBIZ_01, COMMON	Project resource rate schedule type code
PROJECTRESOURCE_CLASSIFICATION_COD E	EBIZ_01, COMMON, P6EPPM_01	Resource class code
PROJECTRESOURCESET_RESRC_TYPE_COM B_FRMT_CODE	EBIZ_01, COMMON	Resource format combinations
PHONENUMBER_TYPE	EBIZ_01, COMMON, P6EPPM_01	Phone number type
PROJECTRESOURCESET_ENABLED_INDICAT OR	EBIZ_01, COMMON, P6EPPM_01	Resource set indicator
CURRENCY_CODE	Existing DVM for EBS, COMMON, P6EPPM_01	Currency code

DVM	DVM Column Name	Description of mapping
		between Oracle Projects and Primavera P6
PROJECT_STATUSCODE	EBIZ_01, COMMON, P6EPPM_01	Project statuses
UNIT_OF_MEASURE	EBS_PROJECTS_01_UNIT_OF_ME ASURE, COMMON, P6EPPM_01, RATECODE	Unit in which the resource rate is applied
PROJECTRESOURCEASSIGNMENT_TRACKIN GLEVELCODE	EBIZ_01, COMMON, P6EPPM_01	Project resource assignment tracking levels
PROJECTSYNCBUDGET_LEVELCODE	EBIZ_01, COMMON, P6EPPM_01	Project budget levels for synchronization
PROJECTFINANCIALPLAN_TYPECODE	EBIZ_01, COMMON	Financial plan type
PROJECTBUDGET_PLANCLASSCODE	EBIZ_01, COMMON	Budget plan code
EBIZ_P6_APPS_USER	APPS_USER, LANG_CODE	EBS application user name to implementation language
EBS_PROJECTS_OU_RESP	RESPONSIBILITY, OPERATING_UNIT	Operating unit to EBS responsibility
PROJECTBUDGET_STATUSCODE	COMMON, EBIZ_01	Budget status codes
PROJECT_SUB_STATUSCODE	COMMON, EBIZ_01	Project sub status
LANGUAGE_CODE	COMMON, EBIZ_01	Language codes

### **Mapping Details**

The following tables represent examples of the DVMs that reside in the AIA layer to synchronize data between Oracle Projects and Primavera P6:

The **PROJECTSYNCBUDGET\_LEVELCODE** DVM maps the project budget levels for synchronization between the participating applications.

COMMON	EBIZ_01	P6EPPM_01
NONE	NONE	NONE
TOP_TASK	TOP_TASK	Toplevel
LOWEST_TASK	LOWEST_TASK	Lowest
PROJECT	PROJECT	Project

The **PROJECT\_RESOURCE\_CLASSIFICATION\_CODE** DVM maps the resource class codes between the participating applications.

COMMON	EBIZ_01	P6EPPM_01
LABOR	PEOPLE	LABOR
NON_LABOR	EQUIPMENT	NON_LABOR

The **PROJECTRESOURCESET\_RESRC\_TYPE\_COMB\_FRMT\_CODE** DVM maps the resource format combinations between AIA and Oracle Projects.

COMMON	EBIZ_01	
JOB	JOB	
PROJECT_ROLE	PROJECT_ROLE	

The **PROJECTRESOURCESET\_ENABLED\_INDICATOR** DVM maps the resource set options between the participating applications.

COMMON	EBIZ_01	P6EPPM_01
TRUE	Υ	TRUE
FALSE	N	FALSE

The **PROJECTRESOURCERATESCHEDULE\_TYPECODE** DVM maps the resource rate schedule type codes between AIA and Oracle Projects.

COMMON	EBIZ_01
EMPLOYEE	EMPLOYEE
JOB	JOB

The **PROJECTRESOURCEASSIGNMENT\_TRACKINGLEVELCODE** DVM maps the resource assignment tracking levels between the participating applications.

COMMON	EBIZ_01	P6EPPM_01
_		

ALL	ALL	ALL
NONE	NONE	NONE
TOP_TASK	TOP_TASK	Toplevel
LOWEST_TASK	LOWEST_TASK	Lowest
PROJECT	PROJECT	Project

The **PHONENUMBER\_TYPE** DVM maps the phone number type values between the participating applications.

COMMON	EBIZ_01	P6EPPM_01
WORK	GEN	WORK

The **PROJECT\_STATUSCODE** maps the project statuses between the participating applications.

COMMON	EBIZ_01	P6EPPM_01
PLANNED		PLANNED
APPROVED	APPROVED	

The **CURRENCY\_CODE** DVM maps the currency code values between the participating applications.

COMMON	EBIZ_01	P6EPPM_01
EUR	EUR	EUR

The **EBIZ\_P6\_APPS\_USER** DVM maps the Oracle Projects user name to implementation language.

APPS_USER	LANG_CODE
SERVICES	AMERICAN

The EBS\_PROJECTS\_OU\_RESP DVM maps an operating unit to Oracle Projects responsibility.

OPERATING_UNIT	RESPONSIBILITY	
Vision Services	Projects SU, Vision Services (USA)	
Vision Project Mfg	Projects SU, Vision Project Mfg (EUR)	
Vision Operations	Projects SU, Vision Operations (USA)	

The **UNIT\_OF\_MEASURE** DVM maps the unit in which the resource rate is applied between the participating applications.

COMMON	EBS_PROJECTS_01_UNIT_OF_MEASURE	P6EPPM_01
DAY		8
DAT		0
WEEKS		40
ANN		2000
Per Month		160
HUR	HOURS	1

The **LANGUAGE\_CODE** DVM maps the language codes between the participating applications.

COMMON	EBIZ_01
Arabic	Arabic
English	AMERICAN

# **Setting Configuration Properties**

You must set up configuration properties in the AIAConfigurationProperties.xml file for using the Project Portfolio Management: Primavera P6-EBS Projects PIP. The file is located in <aia.home>/config/.

**Note:** When you update the AIAConfigurationProperties.xml file, you must reload the file for the updates to be reflected in the applications or services that use the updated properties. To perform this reload click the Reload button on the Configuration page in the Oracle AIA Console. Alternatively, you can perform the reload by rebooting the server.

**For more information**, see Oracle Application Integration Architecture Core Components Guide, "Working with the BSR," Loading Oracle AIA Configuration Properties File Updates.

### SyncProjectResourceSetListEbizReqABCSImpl

The following table lists the properties for the SyncProjectResourceSetListEbizReqABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	EBIZ_01	System identifier for the Oracle Projects instance
OnExceptionWaitTime	PT2S	Controls the time lag before retrying in case of a concurrent XREF insert error

Property Name	Values/Default Value	Description and Values
		Note. This property is for internal use and must not be modified.
Routing.ProjectResourceSetEBS.SyncPr ojectResourceSetList.RouteToCAVS	false	Decides if the request must be sent to the CAVS simulator or the Primavera P6 application
Routing.ProjectResourceSetEBS.SyncPr ojectResourceSetList.CAVS.EndpointUR I	http://sdc60007sems.us.oracle.com:7863 /event/AIASystem/ValidationSystem/Asy ncResponseSimulator	
Custom.Transformations.Abm_To_Ebm	false	
ABCSExtension.PreProcessABM	false	Decides if the user exit for the pre- process ABM should be called or not
ABCSExtension.PreProcessEBM	false	Decides if the user exit for the pre- process EBM should be called or not

# SyncProjectResourceRateScheduleListEbizReqABCSImpl

The following table lists the properties for the SyncProjectResourceRateScheduleListEbizReqABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	EBIZ_01	System identifier for the Oracle Projects instance
Routing.ProjectResourceRateScheduleE BS.SyncProjectResourceRateScheduleL ist.RouteToCAVS	false	Decides if the request must be sent to the CAVS simulator or the Primavera P6 application
Routing.ProjectResourceRateScheduleE BS.SyncProjectResourceRateScheduleL ist.CAVS.EndpointURI	http://sdc60007sems.us.oracle.com:7863 /event/AIASystem/ValidationSystem/Asy ncResponseSimulator	
ABCSExtension.PreProcessABM	false	Decides if the user exit for the pre- process ABM should be called or not
ABCSExtension.PreProcessEBM	false	Decides if the user exit for the pre- process EBM should be called or not
Custom.Transformations.Abm_To_Ebm	false	

# SyncProjectListEbizReqABCSImpl

The following table lists the properties for the SyncProjectListEbizReqABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	EBIZ_01	System identifier for the Oracle Projects instance
Routing.ProjectEBSV1.SyncProjectList. RouteToCAVS	false	Decides if the request must be sent to the CAVS simulator or the Primavera P6 application
Routing.ProjectEBSV1.SyncProjectList. CAVS.EndpointURI	http://sdc60007sems.us.oracle.com:7863 /event/AIASystem/ValidationSystem/Asy ncResponseSimulator <td></td>	
ABCSExtension.PreProcessABM	false	Decides if the user exit for the pre- process ABM should be called or not
ABCSExtension.PreProcessEBM	false	Decides if the user exit for the pre- process EBM should be called or not
Custom.Transformations.Abm_To_Ebm	false	

# SyncProjectListEbizProvABCSImpl

The following table lists the properties for the SyncProjectListEbizProvABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	EBIZ_01	System identifier for the Oracle Projects instance
Routing.SyncProjectListEbizAdapter.Rou teToCAVS	false	Decides if the request must be sent to the CAVS simulator or the EBS adapter
Routing.GetOperatingUnitEbizAdapter.R outeToCAVS	false	
Routing.SyncProjectListEbizAdapter.EBI Z_01.ServiceName	{http://xmlns.oracle.com/pcbpel/adapter/a pps/SyncProjectListEbizAdapter/}SyncPr ojectListEbizAdapter	
Routing.SyncProjectListEbizAdapter.CA VS.ServiceName	{http://xmlns.oracle.com/pcbpel/adapter/a pps/SyncProjectListEbizAdapter/}CAVSS ervice	
ABCSExtension.PreProcessABM	false	Decides if the user exit for the pre- process ABM should be called or not
ABCSExtension.PreProcessEBM	false	Decides if the user exit for the pre- process EBM should be called or not
ABCSExtension.PostProcessEBM	false	Decides if the user exit for the post-

Property Name	Values/Default Value	Description and Values
		process EBM should be called or not
ABCSExtension.PostProcessABM	false	Decides if the user exit for the post- process ABM should be called or not
Routing.SyncProjectListEbizAdapter.CA VS.EndpointURI	http://sdc60007sems.us.oracle.com:7863 /AIAValidationSystemServlet/syncrespon sesimulator	
Routing.GetOperatingUnitEbizAdapter.E BIZ_01.ServiceName	{http://xmlns.oracle.com/pcbpel/adapter/a pps/GetOperatingUnitEbizAdapter/}GetO peratingUnitEbizAdapter	
Routing.GetOperatingUnitEbizAdapter.C AVS.ServiceName	">{http://xmlns.oracle.com/pcbpel/adapte r/apps/GetOperatingUnitEbizAdapter/}CA VSService	
Routing.GetOperatingUnitEbizAdapter.C AVS.EndpointURI	http://sdc60007sems.us.oracle.com:7863 /AIAValidationSystemServlet/syncrespon sesimulator	
Custom.Transformations.Abm_To_Ebm	false	
Custom.Transformations.Ebm_To_Abm	false	
Custom.Transformations.AppsContext. Default Value	false	Decides if the base or custom transformation must be used for populating APPS_HEADER. Example: <property name="Custom.Transformations.AppsContext">False</property>
Custom.Transformations.GetOUInput		Decides if the base or custom transformation must be used for populating input to the GET_ORG_NAME API. Example: <property name="Custom.Transformations.GetOUI nput">false</property>

# SyncProjectFinancialListEbizProvABCSImpl

The following table lists the properties for the SyncProjectFinancialListEbizProvABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	EBIZ_01	System identifier for the Oracle Projects instance

Property Name	Values/Default Value	Description and Values
Routing.SyncProjectFinancialListEbizAd apter.RouteToCAVS	false	Decides if the request must be sent to the CAVS simulator or the EBS adapter
Routing.GetOperatingUnitEbizAdapter.R outeToCAVS	false	
Routing.SyncProjectFinancialPlanListEbi zAdapter.EBIZ_01.ServiceName	{http://xmlns.oracle.com/pcbpel/adapter/a pps/SyncProjectFinancialPlanListEbizAd apter/}SyncProjectFinancialPlanListEbiz Adapter	
Routing.SyncProjectFinancialPlanListEbi zAdapter.CAVS.ServiceName	{http://xmlns.oracle.com/pcbpel/adapter/a pps/SyncProjectFinancialPlanListEbizAd apter/}CAVSService	
Routing.SyncProjectFinancialPlanListEbi zAdapter.CAVS.EndpointURI	http://sdc60007sems.us.oracle.com:7863 /AIAValidationSystemServlet/syncrespon sesimulator	
Routing.GetOperatingUnitEbizAdapter.E BIZ_01.ServiceName	{http://xmlns.oracle.com/pcbpel/adapter/a pps/GetOperatingUnitEbizAdapter/}GetO peratingUnitEbizAdapter	
Routing.GetOperatingUnitEbizAdapter.C AVS.ServiceName	{http://xmlns.oracle.com/pcbpel/adapter/a pps/GetOperatingUnitEbizAdapter/}CAV SService	
Routing.GetOperatingUnitEbizAdapter.C AVS.EndpointURI	http://sdc60007sems.us.oracle.com:7863 /AIAValidationSystemServlet/syncrespon sesimulator	
ABCSExtension.PreProcessABM	false	Decides if the user exit for the pre- process ABM should be called or not
ABCSExtension.PreProcessEBM	false	Decides if the user exit for the pre- process EBM should be called or not
ABCSExtension.PostProcessEBM	false	Decides if the user exit for the post- process EBM should be called or not
ABCSExtension.PostProcessABM	false	Decides if the user exit for the post- process ABM should be called or not
Routing.SyncProjectFinancialListEbizAd apter.EBIZ_01.EndpointURI		Sets the end point for the adapter service to be called if multiple instances of EBS are used
Custom.Transformations.Abm_To_Ebm	false	
Custom.Transformations.Ebm_To_Abm	false	

# SyncProjectFinancialListEbizReqABCSImpl

The following table lists the properties for the SyncProjectFinancialListEbizReqABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	EBIZ_01	System identifier for the Oracle Projects instance
Routing.ProjectFinancialListEBS.RouteT oCAVS		Decides if the request must be sent to the CAVS simulator or the Primavera P6 application
ABCSExtension.PreProcessABM	false	Decides if the user exit for the pre- process ABM should be called or not
ABCSExtension.PreProcessEBM	false	Decides if the user exit for the pre- process EBM should be called or not
Custom.Transformations.Abm_To_Ebm	false	

# SyncProjectListP6EPPMReqABCSImpl

The following table lists the properties for the SyncProjectListP6EPPMReqABCSImpl service:

Property Name	Values/Default Value	Description and Values
ABCSExtension.PreXformABMtoEBM	True/false  Default value = false	Use this property to specify whether preprocess extensions exist for the service. If set to true, the ABCS calls the extension service before processing the ABM.
ABCSExtension.PreInvokeEBS	True/false  Default value = false	Use this property to specify whether to call an extension service before sending the EBM to the EBS.
Default.SystemID	P6EPPM_01	System code defined in BSR from which requests originate for this process.
System.P6EPPM_01.TimezoneOffset	No default value	Use this property to specify the time zone that the service uses.
System.P6EPPM_01.CurrencyCode	Entered through installation UI	Use this property to specify the default system currency of P6 installation.
Description.Field.Name	ERP Description	Use this property to specify the name of the field that contains the EBO description.
Routing.ProjectEBSV1.CAVS.EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.

Property Name	Values/Default Value	Description and Values
Routing.ProjectEBSV1.RouteToCAVS	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.
Routing.ProjectEBSV1.SyncProject.Rout eToDSL	True/false Default value = false	Use this property to specify whether to route the EBM to internal DSL testing tool.
Routing.ProjectEBSV1.SyncProject.DSL. Endpoint	No default value	DSL Endpoint URL, when DSL testing tool routing is enabled.
Routing.SyncPortType.CAVS.EndpointU RI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.SyncPortType.P6EPPM_01.End pointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
Routing.SyncPortType.RouteToCAVS	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.
Routing.UDFTypePortType.CAVS.Endp ointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.UDFTypePortType.RouteToCA VS	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.

Property Name	Values/Default Value	Description and Values
Routing.UDFTypePortType.P6EPPM_01 .EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.

# SyncProjectFinancialPlanListP6EPPMReqABCSImpl

The following table lists the properties for the SyncProjectFinancialPlanListP6EPPMReqABCSImpl service:

Property Name	Values/Default Value	Description and Values
ABCSExtension.PreXformABMtoEBM	True/false  Default value = false	Use this property to specify whether preprocess extensions exist for the service. If set to true, the ABCS calls the extension service before processing the ABM.
ABCSExtension.PreInvokeEBS	True/false  Default value = false	Use this property to specify whether to call an extension service before sending the EBM to the EBS.
Default.SystemID	P6EPPM_01	System code defined in BSR from which requests originate for this process.
System.P6EPPM_01.TimezoneOffset	No default value	Use this property to specify the time zone that the service uses.
System.P6EPPM_01.CurrencyCode	Entered through installation UI	Use this property to specify the default system currency of P6 installation.
Routing.ProjectFinancialPlanEBSV1.CA VS.EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.ProjectFinancialPlanEBSV1.Rou teToCAVS	True/false Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.
Routing.ProjectFinancialPlanEBSV1.Syn cProject.RouteToDSL	True/false Default value = false	Use this property to specify whether to route the EBM to internal DSL testing tool.

Property Name	Values/Default Value	Description and Values
Routing.ProjectFinancialPlanEBSV1.Syn cProject.DSL.Endpoint	No default value	DSL Endpoint URL, when DSL testing tool routing is enabled.
Routing.SyncPortType.CAVS.EndpointU RI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.SyncPortType.P6EPPM_01.End pointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.

# SyncProjectFinancialPlanListP6EPPMProvABCSImpl

The following table lists the properties for the SyncProjectFinancialPlanListP6EPPMProvABCSImpl service:

Property Name	Values/Default Value	<b>Description and Values</b>
Default.SystemID	P6EPPM_01	System code defined in BSR from which requests originate for this process.
ABCSExtension.PreXformEBMtoABM	True/false  Default value = false	Use this property to specify whether preprocess extensions exist for the service. If set to true, the ABCS calls the extension service before processing the EBM.
ABCSExtension.PreInvokeABS	True/false  Default value = false	Use this property to specify whether to call an extension service after before the ABM to the P6 application.
ABCSExtension.PostInvokeABS	True/false  Default value = false	Use this property to specify whether to call an extension service after sending the ABM to the P6 application.
Routing.SyncPortType.RouteToCAVS	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.

Property Name	Values/Default Value	<b>Description and Values</b>
Routing.SyncPortType.CAVS.EndpointURI		CAVS Endpoint URL, when CAVS is enabled.
Routing.SyncPortType.P6EPPM_01.EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
System.P6EPPM_01.CurrencyCode	Entered through installation UI	Use this property to specify the default system currency of P6 installation.

# SyncProjectListP6EPPMProvABCSImpl

The following table lists the properties for the SyncProjectListP6EPPMProvABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	P6EPPM_01	System code defined in BSR from which requests originate for this process.
ABCSExtension.PreXformEBMtoABM	True/false  Default value = false	Use this property to specify whether preprocess extensions exist for the service. If set to true, the ABCS calls the extension service before processing the EBM.
ABCSExtension.PostInvokeABS	True/false  Default value = false	Use this property to specify whether to call an extension service after sending the ABM to the P6 application.
Routing.SyncPortType.CAVS.EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.SyncPortType.P6EPPM_01.End pointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
Routing.SyncPortType.RouteToCAVS	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.

Property Name	Values/Default Value	Description and Values
Routing.EPSPortType.RouteToCAVS	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.
Routing.EPSPortType.CAVS.EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.EPSPortType.P6EPPM_01.End pointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
EPS.Default.ID	Imported Projects	Name of the default EPS to create the projects under.
Project.Description.Field.Name	ERP Description	Stores the description from project EBO in this UDF in Primavera P6.
Project.Description.Field.Type	Text	Type of the Description UDF in Primavera P6.
WBS.Description.Field.Name	ERP Description	Stores the description from WBS EBO in this UDF in Primavera P6.
WBS.Description.Field.Type	Text	Type of the WBS Description UDF in Primavera P6.
WBS.ChargeableIndicator.Field.Name	ERP Chargeable Indicator	Chargeable indicator in P6.
WBS.ChargeableIndicator.Field.Type	Text	Chargeable indicator in P6.
WBS.ActualRawTotalCostAmount.Field. Name	ERP Actual Raw Total Cost Amount	Actual Raw Total Cost Amount in P6.
WBS.ActualRawTotalCostAmount.Field. Type	Cost	Actual Raw Total Cost Amount in P6.

Property Name	Values/Default Value	Description and Values
WBS.ActualBurdenedTotalCostAmount. Field.Name	ERP Actual Burdened Total Cost Amount	Actual Burdened Total Cost Amount in P6.
WBS.ActualBurdenedTotalCostAmount. Field.Type	Cost	Actual Burdened Total Cost Amount in P6.
WBS.TotalRawCostAmount.Field.Name	ERP Total Raw Cost Amount Amount	Total Raw Cost Amount Amount in P6.
WBS.TotalRawCostAmount.Field.Type	Cost	Actual Raw Total Cost Amount in P6.
WBS.TotalBurdenedCostAmount.Field.N ame	ERP Total Burdened Cost Amount	Total Burdened Cost Amount in P6.
WBS.TotalBurdenedCostAmount.Field.T ype	Cost	Total Burdened Cost Amount in P6.
WBS.PlannedLaborQuantity.Field.Name	ERP Planned Labor Quantity	Planned Labor Quantity in P6
WBS.PlannedLaborQuantity.Field.Type	Double	Planned Labor Quantity in P6.
WBS.PlannedNonLaborQuantity.Field.N ame	ERP Planned Non Labor Quantity	Planned Non Labor Quantity in P6
WBS.PlannedNonLaborQuantity.Field.Ty pe	Double	Planned Non Labor Quantity in P6.
WBS.ActualLaborQuantity.Field.Name	ERP Actual Labor Quantity	Actual Labor Quantity in P6
WBS.ActualLaborQuantity.Field.Type	Double	Actual Labor Quantity in P6.
WBS.ActualNonLaborQuantity.Field.Na me	ERP Actual Non Labor Quantity	Actual Non Labor Quantity in P6

Property Name	Values/Default Value	Description and Values
WBS.ActualNonLaborQuantity.Field.Typ e	Double	Actual Non Labor Quantity in P6.
WBS.EstimateAtCompletionLaborQuanti ty.Field.Name	ERP EAC Labor Quantity	EAC Labor Quantity in P6
WBS.EstimateAtCompletionLaborQuanti ty.Field.Type	Double	EAC Labor Quantity in P6.
WBS.EstimateAtCompletionCostAmount .Field.Name	ERP EAC Cost Amount	EAC Cost Amount in P6
WBS.EstimateAtCompletionCostAmount .Field.Type	Double	EAC Cost Amount in P6.
WBS.PhysicalPercentComplete.Field.Na me	ERP Physical Percent Complete	Physical Percent Complete in P6
WBS.PhysicalPercentComplete.Field.Ty pe	Double	Physical Percent Complete in P6.
Activity.Description.Field.Name	ERP Description	Stores the description from Activity EBO in this UDF in Primavera P6.
Activity.Description.Field.Type	Text	Type of the Activity Description UDF in Primavera P6.
Activity.ActualRawTotalCostAmount.Fiel d.Name	ERP Actual Raw Total Cost Amount	Actual Raw Total Cost Amount in P6.
Activity.ActualRawTotalCostAmount.Fiel d.Type	Cost	Actual Raw Total Cost Amount in P6.
Activity.ActualBurdenedTotalCostAmoun t.Field.Name	ERP Actual Burdened Total Cost Amount	Actual Burdened Total Cost Amount in P6.
Activity.ActualBurdenedTotalCostAmoun t.Field.Type	Cost	Actual Burdened Total Cost Amount in P6.
ResAssignment.ActualBurdenedCostAm ount.Field.Name	ERP Actual Burdened Cost Amount	Actual Burdened Cost Amount in P6.

Property Name	Values/Default Value	Description and Values
ResAssignment.ActualBurdenedCostAm ount.Field.Type	Cost	Actual Burdened Cost Amount in P6.
ResAssignment.TotalBurdenedCostAmo unt.Field.Name	ERP Total Burdened Cost Amount	Total Burdened Cost Amount in P6.
ResAssignment.TotalBurdenedCostAmo unt.Field.Type	Cost	Total Burdened Cost Amount in P6.
Delete.WBS.Activity.Support	True/false Default value = true	This determines whether the ABCS deletes the WBS's/Activities if only present in P6 application but not in incoming project structure through EBM.
TimezoneOffset	-08:00	Use this property to specify the time zone that the service uses.
Calendar.StartTime	08:00:00	Calendar start time when the date doesn't contain time in incoming start date.
Calendar.EndTime	16:00:00	Calendar end time when the date doesn't contain time in incoming end date.

# SyncProjectResourceSetListP6EPPMProvABCSImpl

The following table lists the properties for the SyncProjectResourceSetListP6EPPMProvABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	P6EPPM_01	System code defined in BSR from which requests originate for this process.
ABCSExtension.PreXformEBMtoABM	True/false Default value = false	Use this property to specify whether preprocess extensions exist for the service. If set to true, the ABCS calls the extension service before processing the EBM.
ABCSExtension.PostInvokeABS	True/false  Default value = false	Use this property to specify whether to call an extension service after sending the ABM to the P6 application.
Routing.ResourcePortType.RouteToCA VS	True/false Default value = false	Use this property to specify whether to route the EBM to CAVS.

Property Name	Values/Default Value	Description and Values
Routing.ResourcePortType.CAVS.Endp ointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.ResourcePortType.P6EPPM_01 .EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
Routing.RolePortType.RouteToCAVS	True/false	Use this property to specify whether to
	Default value = false	route the EBM to CAVS.
Routing.RolePortType.CAVS.Endpoint URI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.RolePortType.P6EPPM_01.End pointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
Routing.ExpenseCategoryPortType.Rou	True/false	Use this property to specify whether to
teToCAVS	Default value = false	route the EBM to CAVS.
Routing.ExpenseCategoryPortType.CA VS.EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.ExpenseCategoryPortType.P6E PPM_01.EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
Routing.WBSCategoryPortType.RouteT	True/false	Use this property to specify whether to
oCAVS	Default value = false	route the EBM to CAVS.
Routing.WBSCategoryPortType.CAVS. EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.WBSCategoryPortType.P6EPP M_01.EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
Routing.UnitOfMeasurePortType.Route	True/false	Use this property to specify whether to
ToCAVS	Default value = false	route the EBM to CAVS.
Routing.UnitOfMeasurePortType.CAVS. EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.UnitOfMeasurePortType.P6EPP M_01.EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
Routing.ResourceRatePortType.RouteT	True/false	Use this property to specify whether to
oCAVS	Default value = false	route the EBM to CAVS.

Property Name	Values/Default Value	Description and Values
Routing.ResourceRatePortType.CAVS. EndpointURI	No default value	CAVS Endpoint URL, when CAVS is enabled.
Routing.ResourceRatePortType.P6EPP M_01.EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
WBSCategoryPrefix	GL-	Prefix used by Chart type being synced as wbs category.

# SyncProjectResourceRateScheduleListP6EPPMProvABCSImpl

The following table lists the properties for the SyncProjectResourceRateScheduleListP6EPPMProvABCSImpl service:

Property Name	Values/Default Value	Description and Values
Default.SystemID	P6EPPM_01	System code defined in BSR from which requests originate for this process.
ABCSExtension.PreXformEBMtoABM	True/false Default value = false	Use this property to specify whether preprocess extensions exist for the service. If set to true, the ABCS calls the extension service before processing the EBM.
ABCSExtension.PostInvokeABS	True/false Default value = false	Use this property to specify whether to call an extension service after sending the ABM to the P6 application.
Routing.ResourceRatePortType.RouteT oCAVS	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.
Routing.ResourceRatePortType.CAVS.E ndpointURI		CAVS Endpoint URL, when CAVS is enabled.
Routing.ResourceRatePortType.P6EPP M_01.EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.

Property Name	Values/Default Value	Description and Values
Routing.RoleRatePortType.RouteToCAV S	True/false  Default value = false	Property to govern whether the service should route the message to the CAVS endpoint. Default value is false, which does not route to CAVS. If set to true, it routes to CAVS using the endpoint specified in the CAVS. Endpoint URI property. Values are true and false.
Routing.RoleRatePortType.CAVS.Endpo intURI		CAVS Endpoint URL, when CAVS is enabled.
Routing.RoleRatePortType.P6EPPM_01 .EndpointURI	Entered through installation UI	Endpoint URL of Primavera P6 service.
System.P6EPPM_01.CurrencyCode	Entered through installation UI	Use this property to specify the default system currency of P6 installation.
P6.MULTIRATE.EFFECTIVEDATE.FILT ER1	No default value	This is used to filter the rates if there are more than one rate for a given effective date
P6.MULTIRATE.EFFECTIVEDATE.FILT ER2	No default value	This is used to filter the rates if there are more than one rate for a given effective date

### GetSession

The following table lists the properties for the GetSession service:

Property Name	Values/Default Value	Description and Values
Server.P6EPPM_01.URL	Entered through installation UI	The P6 web application server url.
User.P6EPPM_01.Name	Entered through installation UI	The username to login to P6 web application
User.P6EPPM_01.pwd	Entered through installation UI	The password to login to P6 web applicataion
User.P6EPPM_01.Session.Timeout	600	This indicates the time after which the session times out (in seconds)

### **ProjectTemplateUtility**

The following table lists the properties for the ProjectTemplateUtility service:

Property Name	Values/Default Value	Description and Values
TemplateNameProjectCode	ERP Project Template	The project code used to store the names of templates/model jobs coming from ERP system
TemplateOptionsUDF	ERP Project Template Parameters	The UDF is set on the project to store the default integration options attached to a template.
DefaultMaximumWBSLevel	0	Default maximum WBS level upto which the integration happens between two systems.
DefaultActivityTrackingIndicator	True	Does the integration include Activities in P6 system or not.
DefaultResourceAssignmentTrackingLev el	All	Does the integration include resource assignments in P6 system or not.
DefaultBudgetSyncLevel	Lowest	When the budget/financial plan sync happens, whats the WBS level upto which the budget data is summarized.
TemplateFileLocation	Aia_home/config	The template parameters are stored in a file under same location as AIAConfigurationProperties.xml file.

### **Multi-Instance Configuration**

When you are setting up the integration options, if multiple Primavera P6 instances are integrated, then the third-party application name and the Primavera P6 instance's names must be the same. For example, if Primavera P6 instance names are P6EPPM\_01 and P6EPPM\_02 then, the third-party application names in Oracle Projects must be the same.

8. Modify the **AIAConfigurationProperties.xml** file available at <aia\_home>/config.

viceConfiguration xmlns:abc="http://xmlns.oracle.com/aia/core/config/V1" serviceName="{http://xmlns.oracle.com/ABCSImpl/P6EPPM/Core/SyncP:Property name="Default.SystemID">P6EPPM 01</Property>

- <Property name="Currency">USD</Property>
- <Property name="Routing.ResourceRatePortType.P6EPPM\_01.EndpointURI">http://p6aia04.us.oracle.com:7001/p6ws/services/ResourceRateService
  <Property name="Routing.RoleRatePortType.P6EPPM\_01.EndpointURI">http://p6aia04.us.oracle.com:7001/p6ws/services/RoleRateService</Proper
  :rviceConfiguration>

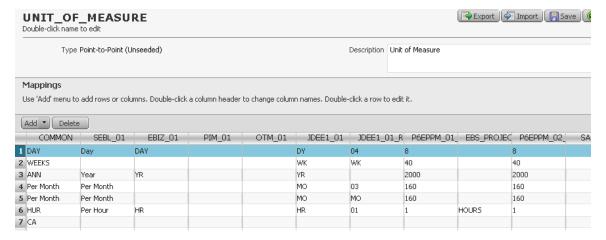
riceConfiguration xmlns:abc="http://xmlns.oracle.com/aia/core/config/V1" serviceName="{http://xmlns.oracle.com/ABCSImp1/P6EPPM/Core/SyncPr Property name="Default.SystemID">P6EPPM 01</Property>

- <Property name="Currency">USD</Property>
- <Property name="Routing.ResourceRatePortType.P6EPPM\_01.EndpointURI">http://p6aia04.us.oracle.com:7001/p6ws/services/ResourceRateService
  <Property name="Routing.RoleRatePortType.P6EPPM\_01.EndpointURI">http://p6aia04.us.oracle.com:7001/p6ws/services/RoleRateService</Proper
  <Property name="Routing.ResourceRatePortType.P6EPPM\_02.EndpointURI">http://p6aia05.us.oracle.com:7001/p6ws/services/ResourceRateService
  <Property name="Routing.RoleRatePortType.P6EPPM\_02.EndpointURI">http://p6aia05.us.oracle.com:7001/p6ws/services/RoleRateService</Proper
  :rviceConfiguration>

#### AIA configuration properties file

Add an additional property for every end point location present in the configuration file. Change the name and the value to the corresponding Primavera P6 values. This must be done for all the Primavera P6 services deployed in the server.

Add new columns to the DVMs present in the server to denote the new Primavera P6 application. Enter values in the columns.



#### Unit of Measure DVM

The graphic illustrates an example of the UNIT\_OF\_MEASURE DVM. A new column for P6EPPM 02 is added.

Add the corresponding XREF columns using the following commands:

c. Telnet to the FMW server.

d. To login to the XREF shell execute the following command:

```
-bash-3.00$ export OC4J_USERNAME=oc4jadmin
-bash-3.00$ export OC4J_PASSWORD=welcome1
-bash-3.00$ cd product/10.1.3.1/OracleAS_1/integration/esb/bin
-bash-3.00$ ./xreftool.sh -shell
```

### XREF shell log in command

e. Add columns to all the necessary tables.

Update the EBS routing rules to account for the new instance. You can route to an instance based on your business requirements. To modify the routing rules, you need to add additional rules and redeploy the process. The required files are present at this location: <AIA HOME>/PIPS/Core/Setup/EbizToP6EPPM/EBS/Project/ProjectEBSV1.

# **Reviewing Default Routing Rules**

Each PIP is delivered with a default set of routing rules. Routing rules are used to control where messages are sent in the system. In some instances, you might choose to update the default routing rules to better suit your business needs.

You can review the default routing rules for the PIP in this location:

<AIA HOME>\PIPS\Core\Setup\EbizToP6EPPM \EBS\

# **Viewing EBO Implementation Maps (EIMs)**

**For more information** about how services are mapped, see the My Oracle Support document: EBO Implementation Maps (EIMs) 881022.1.

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