

Combine Hard Dollar Project Cost Management software with the SAP business suite to create a best-in-class solution that provides complete project visibility and control across the entire project lifecycle.

HD PCM integration is an SAP-certified PI and ABAP add-on for SAP ECC. The integration virtually eliminates redundant data entry, speeding processes and minimizing risk of error.

Typical Workflow

1. HD PCM is used to develop a detailed estimate for a project, leveraging templates, crews, assemblies, productivities, historical data and standardized resource rates, including material and vendor master data imported from SAP.
2. For projects that move into execution, the HD PCM estimate can be sent into SAP to create the project's initial WBS and current budget.
3. As-built values processed in SAP can be sent back to HD PCM in order to leverage the system's robust forecasting capability, as well as to collect historical information that can be visualized and analyzed through HD PCM's benchmarking solution.
4. Updated forecasts can be sent from HD PCM into SAP to provide visibility to expected costs at completion.
5. Changes in project scope can be estimated and approved in HD PCM, with the ability to send the revised budget back into SAP to reflect approved changes.

Integration Components

HD PCM Client Plugin:

- Extends the HD PCM user interface with menu commands to initiate the integration
- Implements HD PCM client-side integration rules, e.g., preventing deletion of cost items that have been sent to SAP

HD PCM Server Plugin:

- Handles and routes client-side commands to the HD PCM / SAP integration service

HD PCM / SAP Integration Service:

- Implement the SAP interface, manage request queuing, and process state

SAP PI Configuration (data and logic):

- Controls data mapping for each implemented interface

SAP ABAP Extensions:

- Implement SAP specific business logic for each interface



Functional Touchpoints

Increase visibility by creating direct access to operational project information. No matter the direction of the data flow, there are many opportunities to increase accuracy and efficiency.

SAP to HD PCM

Actuals

- As-built costs by cost category, by CBS/WBS
- As-built man-hours and equipment hours by CBS/WBS
- As-built quantities completed by CBS/WBS

Master Data

- Material masters from SAP into HD PCM resource library
- Vendor masters from SAP into HD PCM resource library

HD PCM to SAP

Budget Setup

- SAP WBS structure created from HD PCM's CBS structure
- Planned quantities by WBS/CBS
- Budgeted costs by cost category, by WBS/CBS
- Budgeted man hours and equipment hours by WBS/CBS

Contract / Sales Order Setup

- Pay Items and quantities
- Pay item prices

Billing and Pay Requests

- Earned (billable) revenue by pay item

Technical Architecture Overview

Initiation and Control

Data exchange between HD PCM and SAP is user initiated from the HD PCM client menu system, or from change triggers in SAP.

Data Exchange Methodology

HD PCM SAP integration service exchanges data with SAP NetWeaver PI through XML documents.

Data Exchange Mapping and Logic

Data mapping is implemented in SAP PI and can be customized. SAP business logic rules are implemented in SAP ECC ABAP extensions and can be customized.

Logging

SAP logging service extended to maintain and expose integration status to both HD PCM and SAP screens.

