



ORACLE® ESSBASE STUDIO

RELEASE 11.1.1

NEW FEATURES

ORACLE®
ENTERPRISE PERFORMANCE
MANAGEMENT SYSTEM

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Introducing Essbase Studio

Oracle Essbase Studio simplifies cube construction by delivering a single environment for performing tasks related to data modeling, cube designing, and analytic application construction. By consolidating cube construction activities into one interface, Essbase Studio provides a consistent platform for building outlines and loading data.

With a wizard-driven user interface, Essbase Studio supports modeling various data source types from which Oracle Essbase applications are typically built, making it a single point from which all cube-related data modeling can be performed.

A common metadata repository, or catalog, captures all metadata related to all Essbase applications built in the enterprise and allows the reuse of metadata at the lowest level of granularity. The catalog gives Essbase Studio knowledge of the common metadata that is shared across the various applications enterprise-wide.

Essbase Studio supports several drill-through options: relational databases, URLs, custom SQL, and Java methods. Drill-through functionality is supported from data cells and member cells and is dynamically linked to cubes with matching metadata context.

Essbase Studio also supports lineage tracking through a rich graphical view of the metadata relationships, allowing users to follow application lineages to their metadata components and through to the data sources from which they were sourced.

From Integration Services to Essbase Studio

The functionality of Oracle Essbase Integration Services has been incorporated into Essbase Studio, and users familiar with Integration Services will transit quickly to Essbase Studio. There are some slight differences in terminology and some difference in the sequence of tasks, but the two applications have much in common.

Data Source Connections

In Integration Services, you create a data source name (ODBC DSN) to point to your source data, and Integration Services uses ODBC to connect to the database.

In Essbase Studio, you can use either ODBC or JDBC to connect to your data source during cube deployment. Cube deployment sets your load options for building an outline and loading data into an application and database. The two methods of connecting to your data source are known as “non-streaming” and “streaming.”

- If you select non-streaming, Essbase Studio requests Essbase to access the data source during cube deployment, and Essbase Server uses ODBC to query the data source.
- If you select streaming, Essbase Studio accesses the data source directly using JDBC.

You select the method during configuration by modifying a command in the `server.properties` file. Non-streaming is the default mode, and it generally offers faster performance.

Metadata Storage

Integration Services stores metadata in a relational repository called the OLAP Metadata Catalog. Essbase Studio also has its own relational catalog for metadata. In Integration Services, you provide the catalog DSN information in the Integration Services Console when you log in. In Essbase Studio, you specify the catalog location information in the Configurator, which updates the `server.properties` file.

OLAP Models and Minischemas

In Integration Services, after you connect to a data source, you create an OLAP model which consists of a star schema defining joins between tables. Essbase Studio uses minischemas to provide similar functionality. The Connection Wizard in Essbase Studio helps you create your minischemas quickly and easily. You can choose the tables you need for a minischema, and Essbase Studio automatically finds their appropriate joins. You can also add and edit joins in the minischema to fit your business needs.

Hierarchies

In Integration Services, after a star schema is defined in a model, you create an OLAP metaoutline from the star schema. The OLAP metaoutline consists of hierarchies created by dragging the columns into the metaoutline.

In Essbase Studio, creation of hierarchies is decoupled from the creation of metaoutlines. This gives you increased reusability of hierarchies across different metaoutlines.

Essbase Studio lets you create several different types of hierarchies:

- Standard
- Measure
- Calendar

Each Integration Services dimension corresponds to a hierarchy in Essbase Studio. Each attribute dimension in Integration Services is created as an alternate hierarchy in Essbase Studio. In Essbase Studio, you can also create your own user-defined siblings and children.

Cube Schemas

In Oracle Essbase Integration Services, the OLAP metaoutline describes the grouping of all hierarchies and their relationships. In Essbase Studio, this is done in a cube schema which consists of metadata elements such as measures and hierarchies representing the logical model of a cube.

Cube schemas are created in Essbase Studio with a few simple drag-and-drop operations in the Cube Schema Wizard.

Essbase Studio Features

The Essbase Studio Console is an intuitive user interface providing you with a rapid means to perform the tasks required for cube building and deployment. Among these tasks are the following:

- Establishing data source connections
- Establishing connections to Essbase as a target for cube deployment
- Viewing properties of source tables and columns
- Previewing data from source tables and columns
- Creating and populating minischemas
- Creating metadata elements including derived text measures
- Introspecting physical data sources to detect fact tables, dimension tables, hierarchies, aliases, and attributes.
- Creating and editing aliases and alias sets
- Creating and editing hierarchies
- Building Essbase models and editing their properties
- Deploying cubes to Essbase
- Generating drill-through reports

In the Data Sources tab in the Essbase Studio Console, you can readily see the physical data sources to which you have created connections, and in the Minischema tab, you can see a graphical layout of the tables that you select from your data sources.

You can also view sample data, graphically add joins, display metadata elements, and see the relationships (lineage) between the metadata elements.

Working with Data Source Connections

In addition to establishing your data source connections in Essbase Studio, you can perform several other tasks related to these connections:

- Incrementally updating existing data source connections
- Performing introspections of existing data source connections
- Editing data source connection properties
- Refreshing the connections list
- Deleting connections

Working with Minischemas

Minischemas are graphical models of the tables or text files in your data source connections. In Essbase Studio, you can use minischemas to carry out several important tasks:

- Creating metadata elements
- Adding tables
- Adding and editing joins
- Viewing sample data
- Applying color to tables

Working with Metadata Elements

Metadata elements are logical objects derived from the physical objects in your data sources and from other metadata. In Essbase Studio, you can perform many tasks related to the metadata elements in your environment:

- Creating and editing metadata elements
- Creating and editing derived text measures
- Creating date elements
- Creating and editing metadata folders
- Deleting unneeded metadata elements
- Viewing sample data
- Viewing the relationships (lineage) between metadata elements

Working with Dimension Elements

Essbase Studio uses a dimension element (a type of metadata element) to represent business entities. For example, a dimension element can be a relational column representing a country, amount, or product.

Dimension elements are used to create multidimensional artifacts such as hierarchies, cube schemas, export models, and drill-through reports. Dimension elements can be text based, numeric based, or date based. They can be edited to include a filter or a sort order.

Creating a dimension element in Essbase Studio is an easy drag-and-drop operation of moving a column from the physical tree representation to the logical tree representation.

Every dimension element has a set of properties which can be viewed and edited by double-clicking on them: These properties include but are not limited to the following:

- Caption binding
- Key binding
- Filters
- Sort order
- Alias definitions

The binding expressions (caption and key) associates each dimension element with a relational column or an expression in the database outline:

- The caption binding maps to the actual name of a member in the outline.
- The key binding maps to a unique identifier in the outline.

Working with Alias Sets

In Essbase Studio, you can perform several operations with alternate names to meet the needs of your environment:

- Creating, aliases
- Modifying and deleting aliases
- Adding the bindings which associate your aliases with columns in your data source.

Working with Essbase Model Properties

An Essbase model is a logical model (star schema) that is created from tables and columns. The Essbase model is used to generate the structure of a multidimensional database.

When you build a cube schema in Essbase Studio, you specify hierarchies, measures, and measure hierarchies to include in the cube. The Essbase model shows graphically the objects that comprise a cube schema.

Essbase Studio Console provides the means to easily perform several key tasks related to Essbase models:

- Building models
- Editing model properties
- Editing the properties of dimensions and members in a model
- Validating model properties
- Reviewing your changes to properties
- Browsing models

Deploying Cubes

The Essbase models you build in Essbase Studio are used to deploy cubes to Essbase Server.

Essbase Studio offers several load options when you deploy a cube.

- Building the outline only
- Loading the data only
- Building the outline and load the data
- Loading the members incrementally
- Deleting an existing database or clearing the members from an existing database prior to cube deployment
- Deleting the members from an existing cube prior to deployment

Working with Drill-through Reports

With drill-through reports, you create spreadsheet reports that display data retrieved directly from your data source. Drill-through reports are based on intersection levels (member sets). In a spreadsheet, users double-click the cells representing these intersection levels to view detail information that is stored in the target data source, not in the Essbase cube. When working with drill-through reports, you can perform several tasks including but not limited to the following:

- Creating and defining a drill-through report
- Customizing a drill-through report
- Specifying report intersection levels
- Associating drill-through reports with Oracle Essbase models

Installation and Configuration

The new Oracle Hyperion Enterprise Performance Management System Installer, Fusion Edition and Oracle's Hyperion Enterprise Performance Management System Configurator provide a streamlined and simplified approach to product installation, upgrade, and configuration. Oracle's Hyperion Enterprise Performance Management System Configurator uses the new Oracle's Hyperion Shared Services Registry which simplifies product configuration by storing and re-using configuration information.

Oracle's Hyperion Enterprise Performance Management System Diagnostics confirms that product components were successfully installed, configured, and are up and running.

The reorganized installation and configuration documentation set reduces the number of installation guides and makes it easier to find the information you need. Individual product installation guides are replaced by the following guides:

- *Oracle Hyperion Enterprise Performance Management System Installation Start Here*
- *Oracle Hyperion Enterprise Performance Management System Installation and Configuration Guide*
- *Oracle Hyperion Enterprise Performance Management System Security Administration Guide*

You might also need to use one or more of the following guides:

- *Oracle Hyperion Enterprise Performance Management System Manual Deployment Guide*
- *Oracle Hyperion Enterprise Performance Management System High Availability Guide*
- *Oracle Hyperion Enterprise Performance Management System Installation and Configuration Troubleshooting Guide*
- *Oracle Hyperion Enterprise Performance Management System Backup and Recovery Guide*
- *Oracle Hyperion Enterprise Performance Management System Lifecycle Management Guide*
- *Oracle Hyperion Enterprise Performance Management System SSL Configuration Guide*

Accessibility

It is our goal to make Oracle products, services, and supporting documentation accessible to the disabled community. Essbase Studio 11.1.1 supports accessibility features, which are described in Appendix A of the *Oracle Essbase Studio User's Guide*. Oracle Essbase Studio documentation is accessible in this release in HTML format.

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Essbase Studio New Features, 11.1.1

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