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Caltech Financials

Data Warehouse

OBI Introduction

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Agenda

- What is OBI?
- Data Warehouse Design
- Data Concepts
- Financial Subject Areas
- OBI Security
- Accessing Reports
- Tips, Hints, and Frequently Asked Questions
- Demo

What is OBI?

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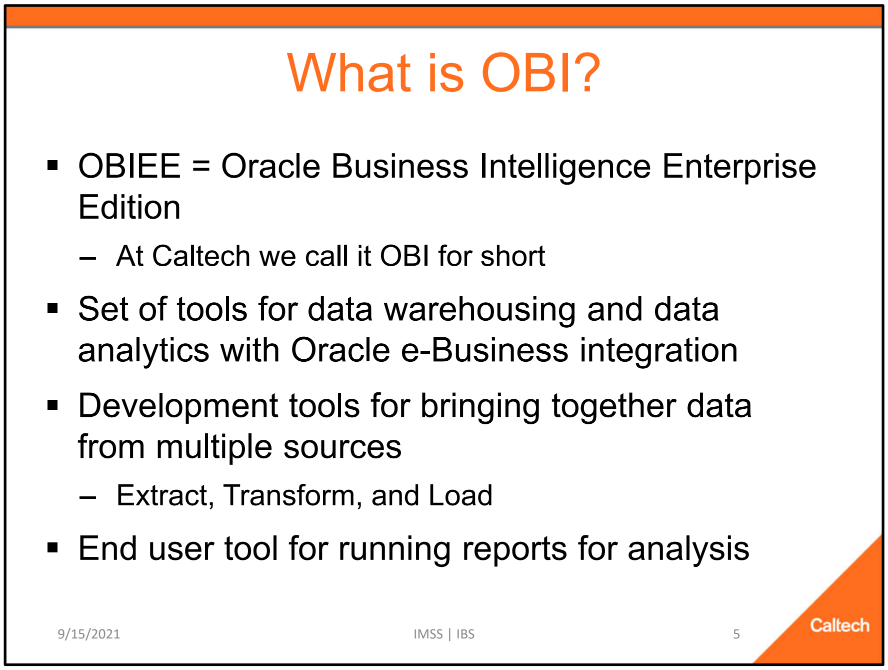

OBIEE = Oracle Business Intelligence Enterprise Edition. We generally refer to it by the shorter acronym, OBI.

OBIEE is simply a set or a group of tools that are used for data warehousing and data analytics.

Most of the tools are used for bringing together the data from multiple sources, i.e., extracting, transforming, and loading the data into the data warehouse.

The end user tool in the browser is the tool that you will use for running reports for data analysis.

Data Warehouse Design

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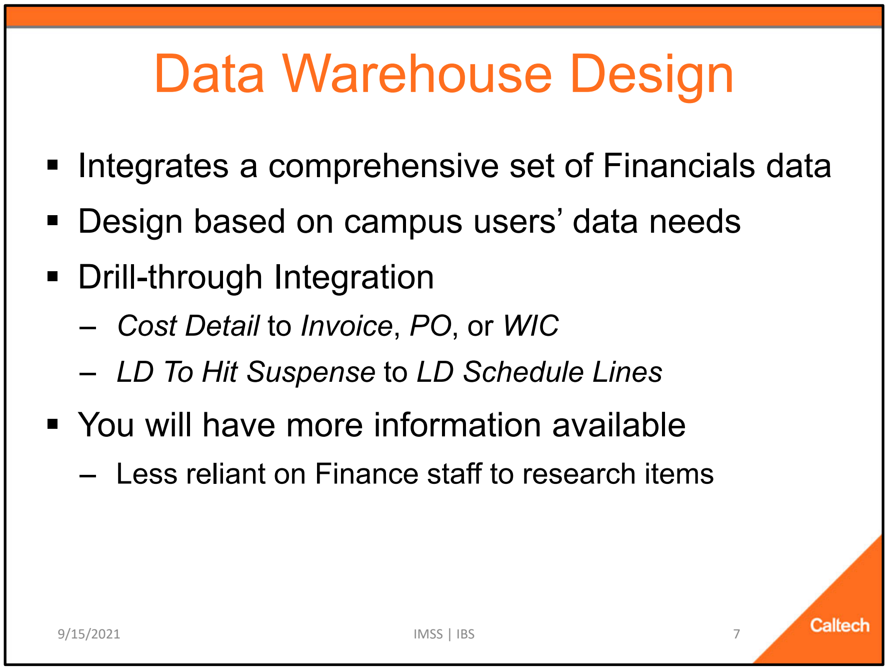
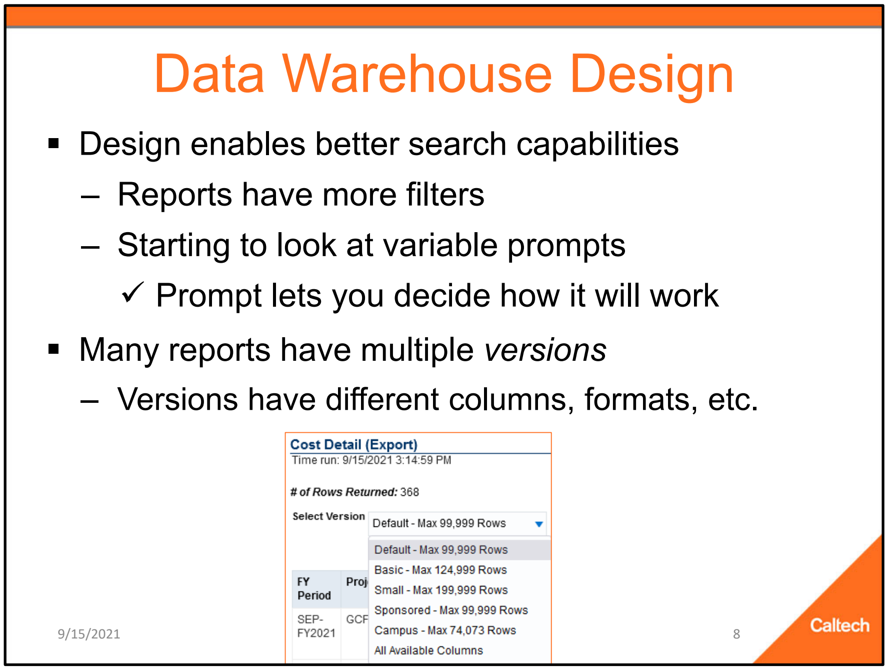
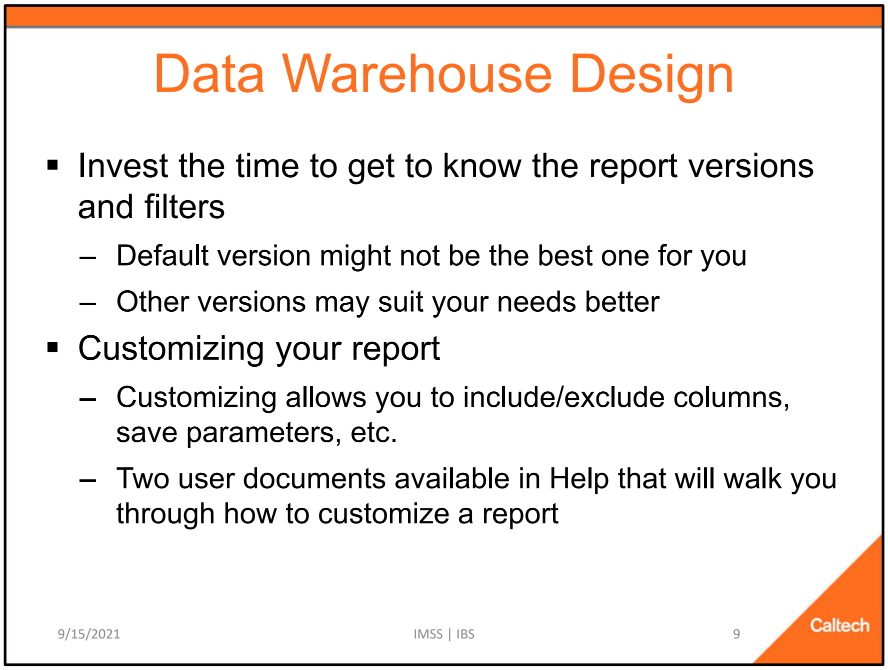


- OBI integrates a comprehensive set of Financials data.
    - ✓ There is now the ability to connect a cost to the Procurement invoice, see the payment date, and look at details about the PO.
- Design is based on campus users' data needs.
- Design enables the ability to drill through from one report to another for additional information.
- With all this additional available information in an easy-to-use format you will be less reliant on Finance staff to research questions you might have about a cost.



- The new design enables better search capabilities, e.g., the reports have several filters available.
- Most of the non-drill or *Export* reports have multiple *versions* available within the one report.
  - ✓ These versions have different columns available, formats, etc.
  - ✓ They can also be *customized* to add (include) and remove (exclude) columns, etc.



- We highly recommend that you invest the time to get to know the report versions and filters.
  - ✓ The default version, i.e., the version that first returns when you run the report, might not fit your business practices.
  - ✓ However, other versions that you can select in the report may suit your needs far better.
- Customizing allows you to take the version that best suits your needs, and then make it even better.
  - ✓ For example, you can include/exclude (i.e., add or remove) columns, save your parameters, etc.
  - ✓ For more information on Customization see the Quick Guide *Saving Prompts and Customizing Reports* which is available on the *Help* tab.
  - ✓ Before you start, see the Tips of the Day document, *Customizing Your Report* for ideas to make the customization process be as efficient as possible.

Data Concepts

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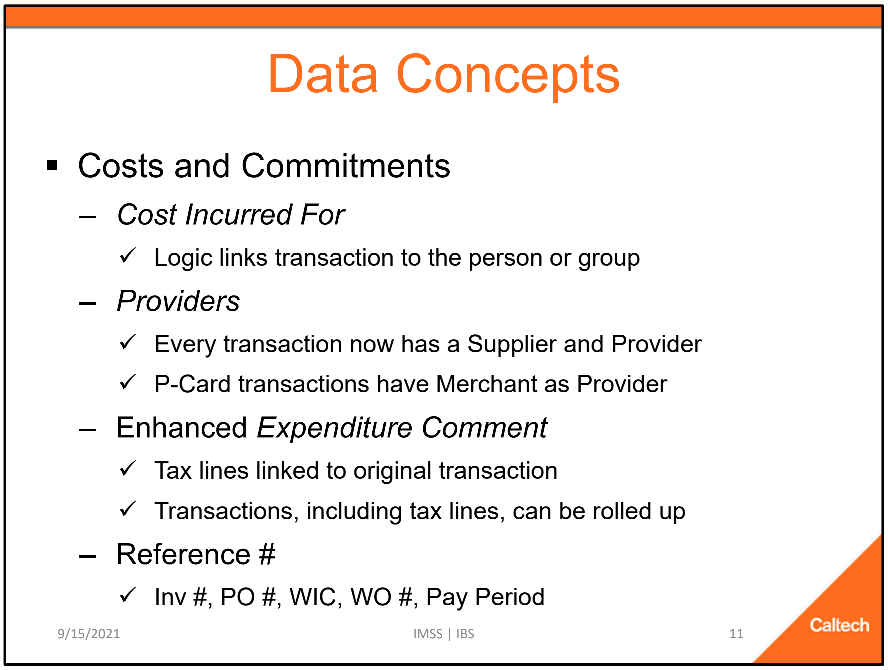


For more information about the data concepts within Costs and Commitments, please attend the Costs and Commitments Training

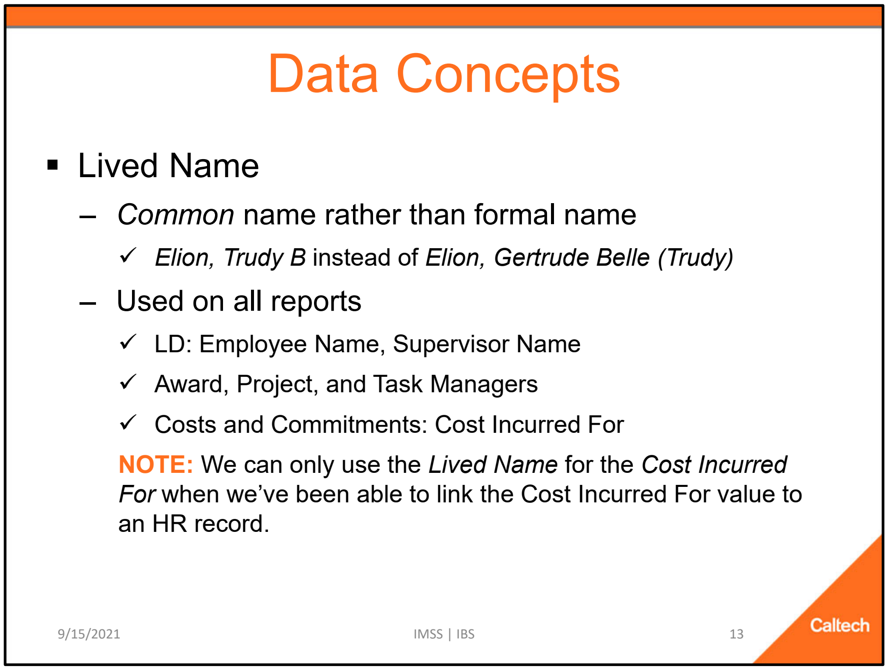
- Cost Incurred For (CIF)
  - ✓ Who was that cost for? Logic links the transaction to the person or a group.
- Providers.
  - ✓ Who *provided* the cost, e.g., who was the supplier or merchant or IC service organization?
- An expenditure comment that:
  - ✓ Doesn't include all the "noise" of the full expenditure comment that is in Oracle (and in OBI).
    - ➢ Focuses, for example, just on the comment about an internal charge, and not on all the other items like service organization, customer, who to contact, etc.
  - ✓ Enables the roll-up of the item's cost and its tax lines into a single line.
- Reference # can be the Invoice #, PO #, WIC, Work Order #, the Pay Period

For more information about the logic used for OBI, see the Data Logic Guides available both on the Help tabs in the OBI Report Listings and on the IMSS website.

Data Concepts

- Labor Distribution
  - *Pay Period* more in line with Costs and Commitments
  - *Pay Period Sort* is YYYY – Payroll – Period # to aid with sorting on the field
  - LDA information available in *LD Query (Export)*

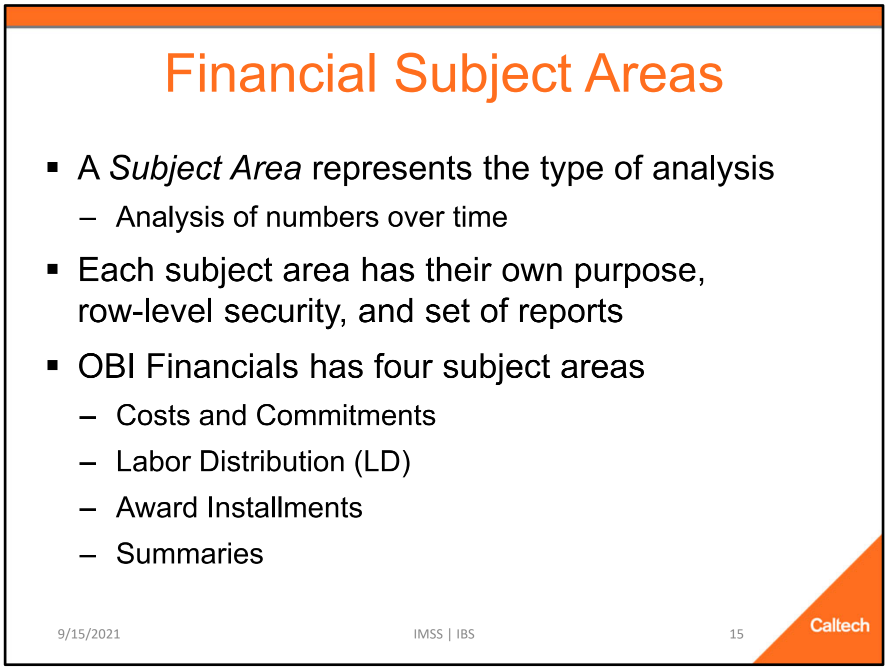
For more information about the data concepts for the Labor Distribution, please attend the Labor Distribution Training



For more information about the data concepts within Costs and Commitments, please attend the Costs and Commitments Training

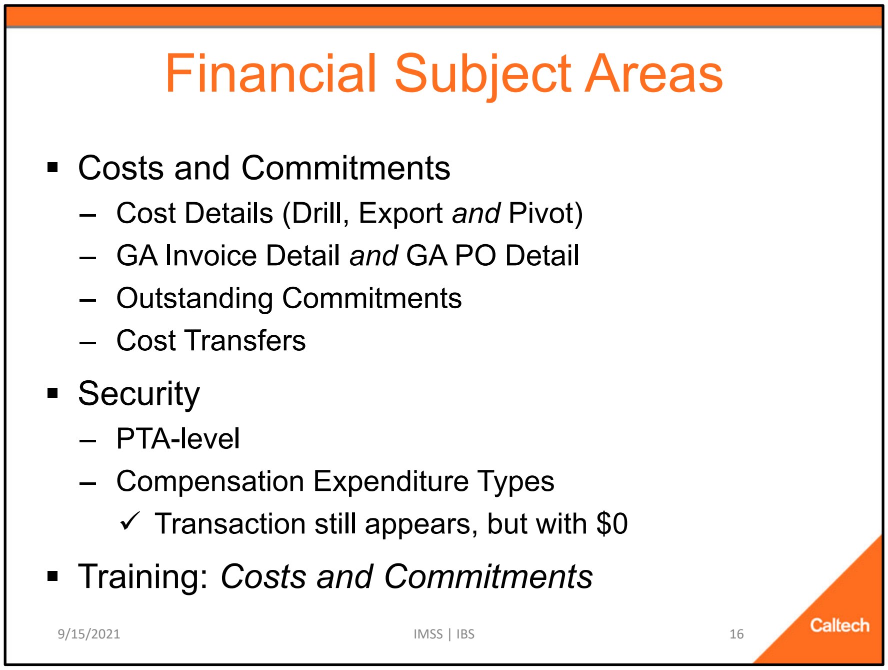
For more information about the data concepts for the Labor Distribution, please attend the Labor Distribution Training

Financial Subject Areas



Financial Subject Areas

- A *Subject Area* represents the type of analysis that the user intends to do.
    - ✓ This is analysis is on numbers, for example costs or pay distributions, over time.
- Each subject area has their own purpose, row-level security, and set of reports.
- OBI Financials has four subject areas:
    - ✓ Costs and Commitments
    - ✓ Labor Distribution (LD)
    - ✓ Award Installments
    - ✓ Summaries



The first Subject Area is *Costs and Commitments*.

Costs and Commitments

- Cost Detail (Drill), which allows you to *drill* to more information about a cost.
- Cost Detail (Export), which is designed for ease of export, six different *views* of the data, and alternative prompts for more flexible searches.
- Cost Detail (Pivot), which is brand new and this report pivots costs over time.
- Outstanding Commitments, which quickly lists active commitments based on a variety of search prompts.
- Cost Transfers (both Campus and Finance), which are used as part of the Cost Transfer application process.

Security

- PTA-level combined with *Salary or No Salary*, which is based on the Expenditure Types setup.
  - ✓ The Exp Type setup has a Compensation? flag, which indicates if the expenditure type is related to payroll or not.
  - ✓ If a user does not have access to the Exp Types flagged as compensation, then the transaction still appears on the report, but the Cost will equal $0.

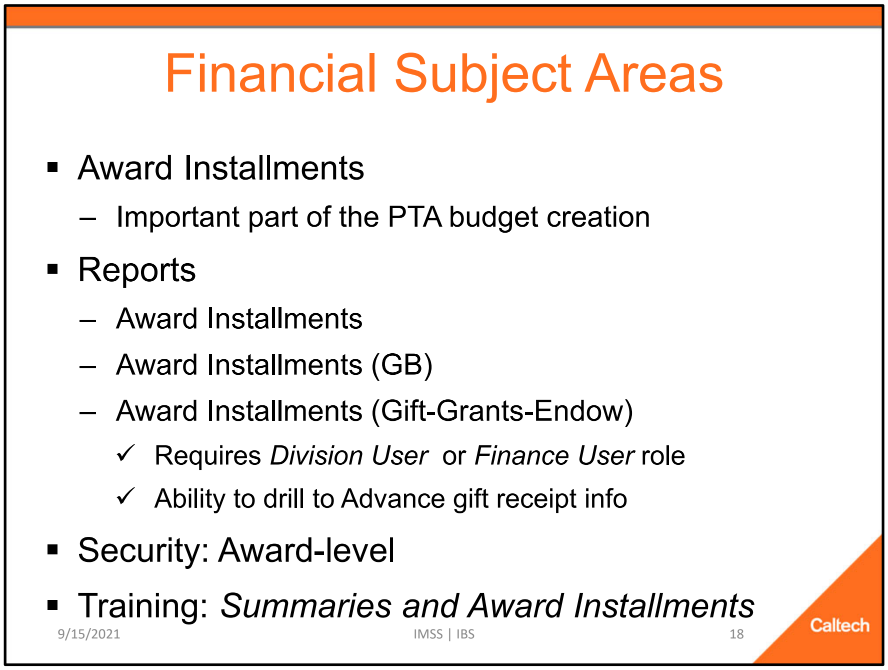
For more info about Costs and Commitments, see the Training schedule for times for *Costs & Commitments.*

Labor Distribution

- LD Query (Export): Similar to the report in Cognos, but has more parameters and columns available, including Batch Name and Comments
- LD Schedule Lines: Information about the schedule lines that determine the percentage of the total assignment or element pay to which PTA.
- LD That May Hit Suspense: Let's you know which pay distributions that may hit suspense if the payroll were to be run today.
- NIH Salary Cap Detail and Campus: Both reports were designed to assist with maintaining compliance with the NIH Salary Cap.
  - ✓ Detail version includes salary and distribution amounts and uses the Oracle LD security for row-level security.
  - ✓ Campus version does NOT include salary and distribution amounts and uses the PTA-level security.

Row-level Security for Labor Distribution is based on the Oracle LD security and must be given via Oracle LD Security.

For more information about Labor Distributions, please see the Training schedule for times for *Labor Distribution.*



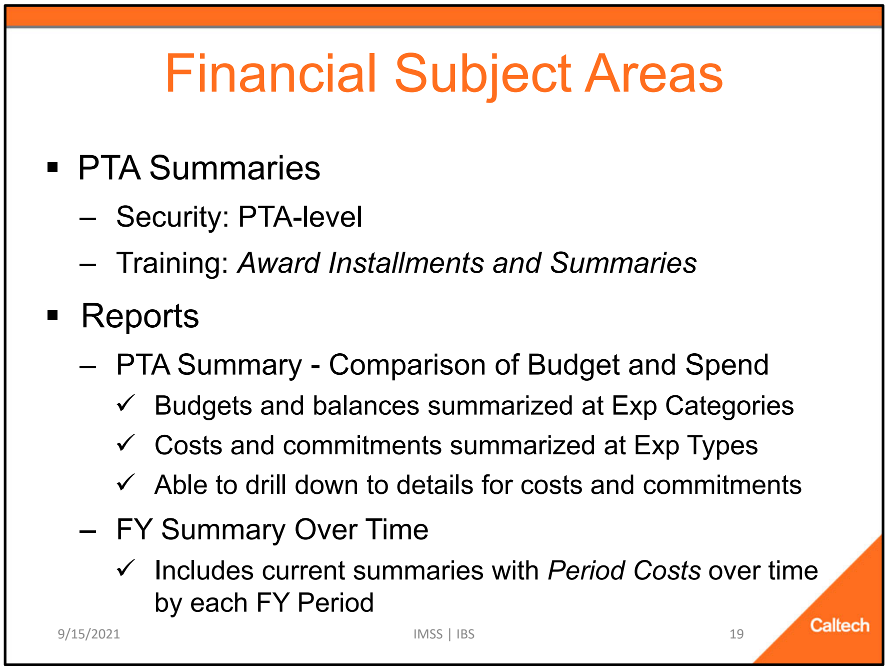
Award Installments

- A set of reports based on Award Installments, which is the first step in budgeting your PTA in Oracle.
- These reports include:

- Award Installments
  - ✓ Basic report.
  - ✓ Can be used for all funding types.

- Award Installments (GB)
  - ✓ Designed only for GB Awards.
  - ✓ Includes the ability to search by Award Division.

- Award Installments (Gift-Grants-Endow)
  - ✓ Only available for *Division* and *Finance* user roles
  - ✓ Includes the ability to drill to Gift Receipt information loaded from the *Advance* system



PTA Summaries

- Security is at the PTA-level
- Training: *Award Installments and Summaries*
- PTA Summary - Comparison of Budget and Spend
  - ✓ Budgets and balances summarized at the Expenditure Categories
    - ➢ This is because budgets are entered in Oracle at the Exp Category
  - ✓ Costs and commitments summarized at the Expenditure Types
- FY Summary Over Time
  - ✓ Includes the current summaries with the *Period Costs* over time by each FY Period.

Financial Subject Areas

- PTA Summaries Reports (cont.)
  - ITD Summaries and FY Summaries (Export)
    - ✓ ITD version only includes awards managed on ITD basis
    - ✓ FY version only includes awards managed on FY basis
  - PTA Summary - ITD (Drill) *and* - FY (Drill)
    - ✓ Able to drill to costs for the period
    - ✓ Both reports include all awards regardless of basis
  - Awards for Consideration
    - ✓ Returns list of awards that meet the criteria in the prompts
    - ✓ Excellent for finding awards with balances < $###

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PTA Summaries Reports (Cont.)

- ITD Summaries (Export) *and* FY Summaries (Export)
  - ✓ Both reports are designed for ease of export.
  - ✓ Both reports include several versions for *viewing* the results.
  - ✓ ITD version only includes awards that are managed on an Inception to Date (ITD) basis.
  - ✓ FY version only includes awards that are managed on a Fiscal Year (FY) basis, e.g., General Budget PTAs.
- PTA Summary - ITD (Drill) *and* PTA Summary - FY (Drill)
  - ✓ Both reports enable you to drill to costs for the period.
  - ✓ Both reports include all awards, regardless of the type of ITD or FY basis.
- Awards for Consideration
  - ✓ Returns list of awards that meet the criteria in the prompts
  - ✓ Excellent for finding awards with balances < $###

OBI Security

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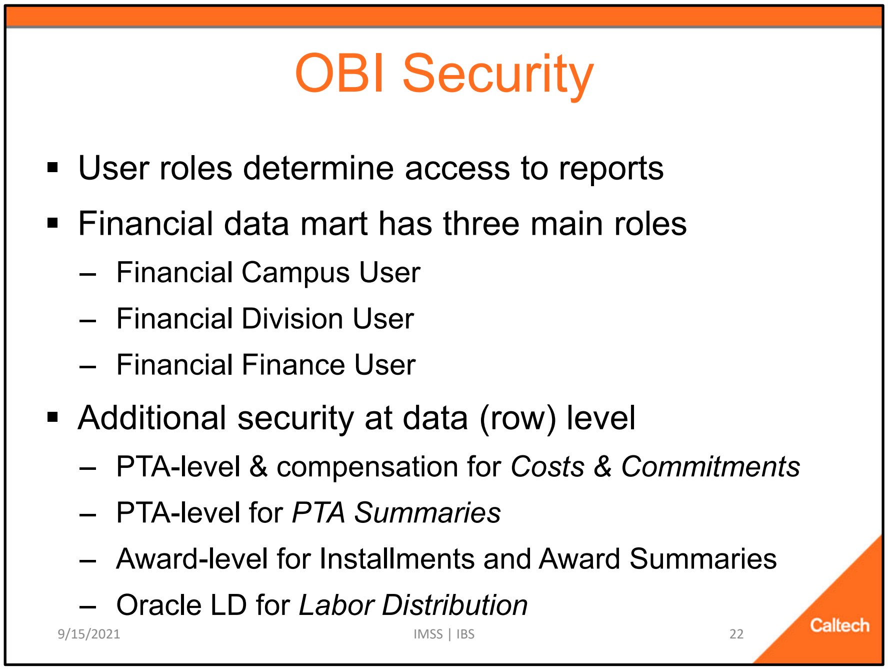
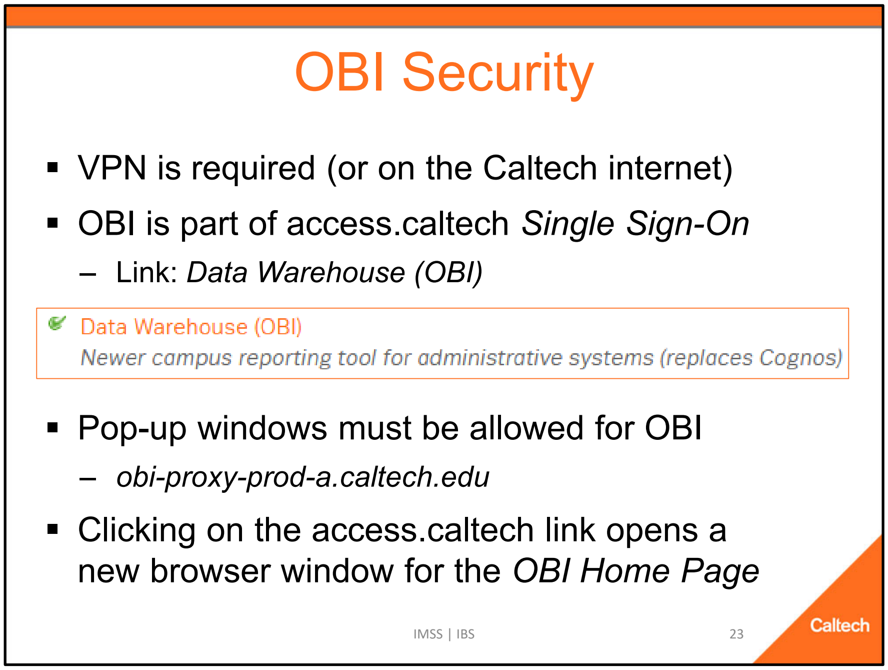


There is three “types” of security combined that makes up your OBI user security.

The first is your access.caltech security (see next slide). This is what gives you the access to the OBI home page.

The second is your user role, which determines which *Report Listing* you see. The Report Listing controls your access to individual reports.

The third is the row-level security. This determines the rows to which you have access.
- The row-level security is different for each of the subject areas, as mentioned in previous slides.



To access OBI go to access.caltech, login, scroll down to *Data Warehouse (OBI)*, and click on the link, which will open a new browser tab.

NOTE: In order to use OBI you must either be on the Caltech internet OR use VPN.

In addition, your browser must allow pop-up windows for OBI, i.e., for *obi-proxy-prod-a.caltech.edu*.

Accessing Reports

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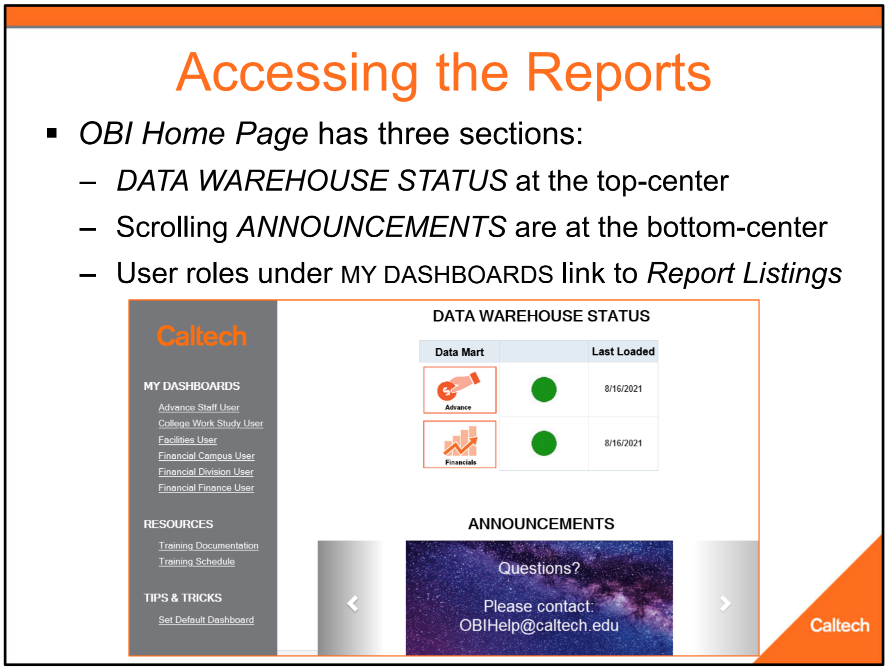
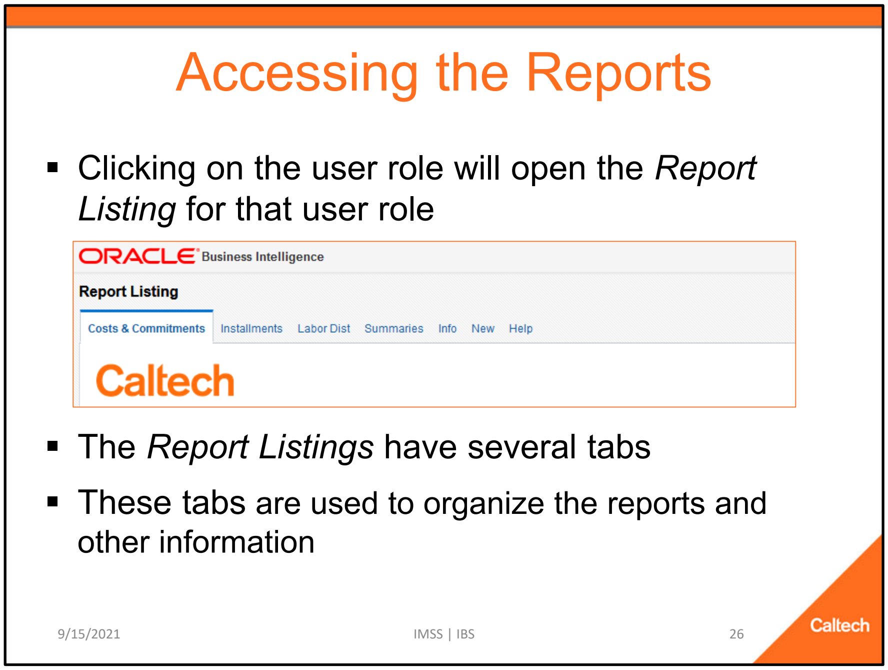


The status of the Data Warehouse loads is in the top-center of the OBI home page.

The bottom-center has scrolling Announcements.

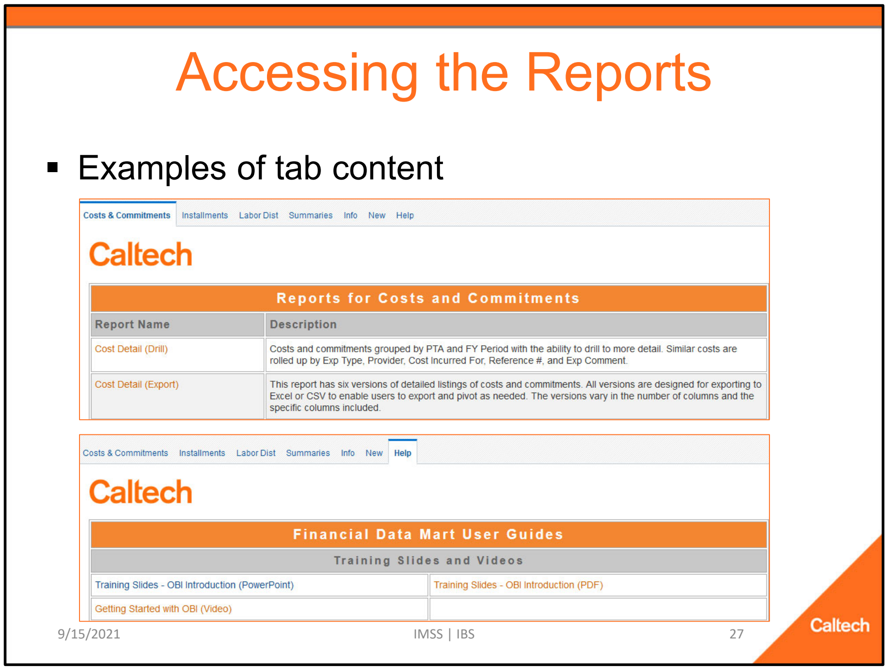
In the gray section on the left are links to the dashboards containing the Report Listings to which you have access.

Our email address for any questions is OBIHelp@caltech.edu



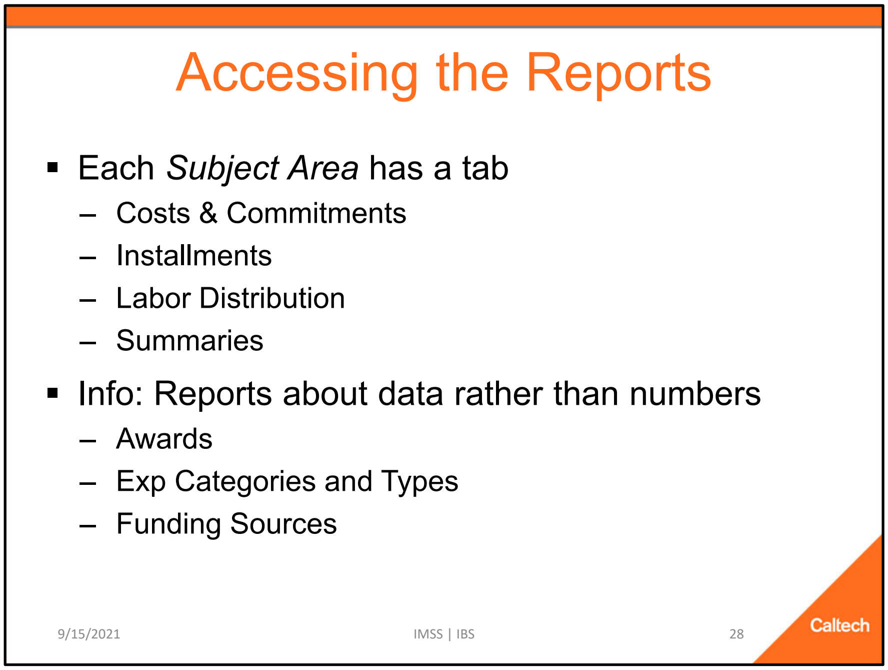
Clicking on a User Role under My Dashboards will open with the *Report Listing* dashboard for that user role.

The Report Listings have a series of tabs that are used to organize the reports and other information



These are just example screenshots of a couple of the tabs:

- Costs & Commitments: Notice the report names and the descriptions of each.
- Help: Contains links to all the available documentation, which is also on the IMSS web site.



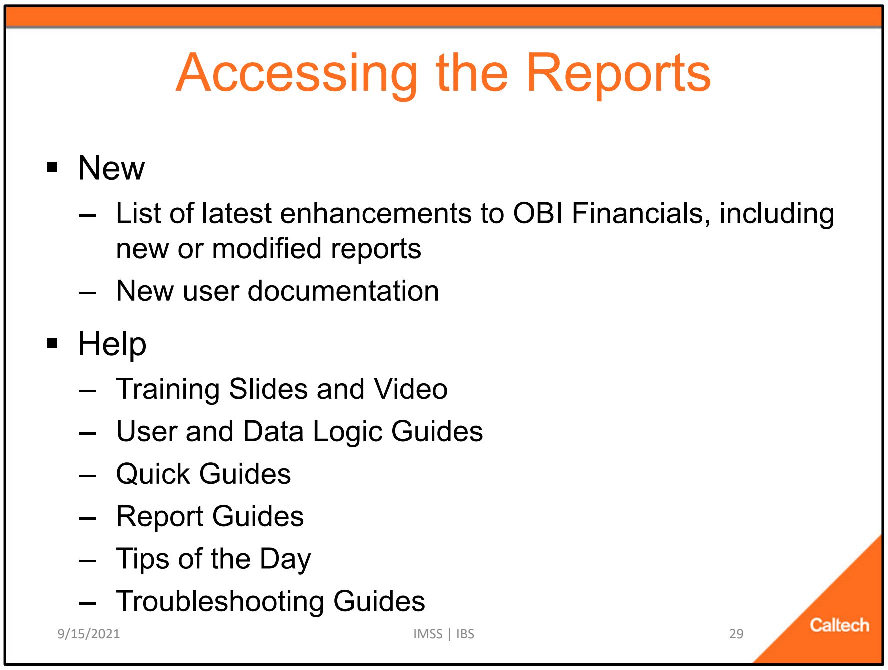
Each of the first few tabs represent a Financials *Subject Area.* These subject areas include:

- Costs & Commitments: A list of reports that are based upon the *Costs and Commitments* detail.
- Installments: A list of reports based upon *Award Installments* detail.
- Labor Distribution: A list of reports based upon *Labor Distribution* information, e.g., Schedule Lines and Pay Distributions
- Summaries: A list of reports based upon PTA financial *Budget* and *Cost* information.

The remaining tabs are for other reports and information not specifically for one of the *Subject Areas*

The Info tab lists reports that are about data not specific to each of the Subject Areas, for example, information about:

- Awards
- Exp Categories and Types
- Funding Sources

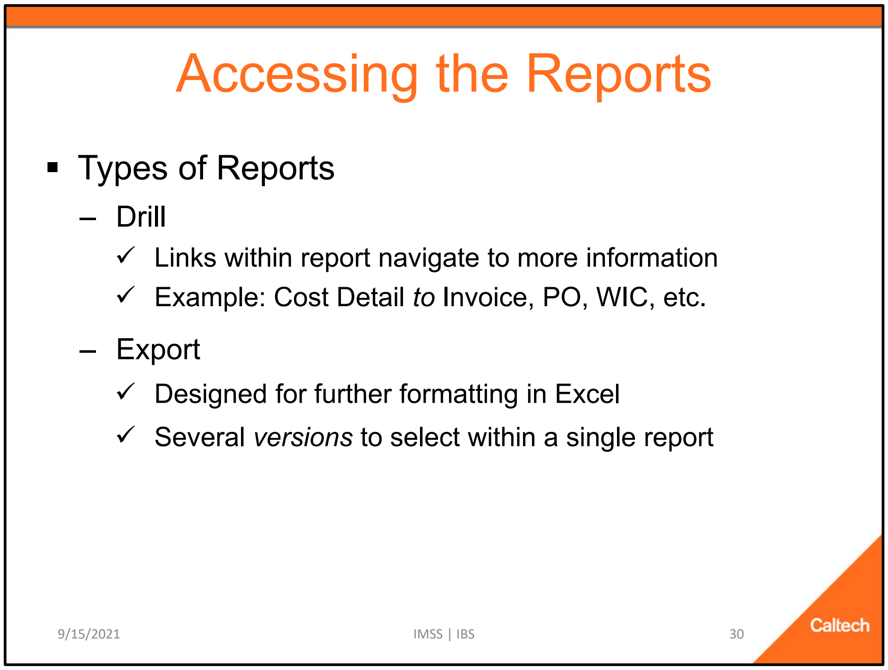


The *New* tab lists recent enhancements made to OBI Financials.

- The enhancements are listed by date
- Tip: Click on this tab each week or so to see if there have been new enhancements made since the last time you checked.

The last tab, *Help,* has a list of user guides including:

- *Training Slides and Video:* Includes the slides used for today, complete with notes.
- *User and Data Logic Guides:* Financial User Guide and documents detailing the logic used for transforming the Financial Data Mart data values.
- *Quick Guides:* Short documents on specific topics, many of which are included in the *Financial Data Mart User Guide*.
- *Report Guides:* Documents specific to individual reports.
- *Troubleshooting Guides:* Documents to assist with common issues that users may run into

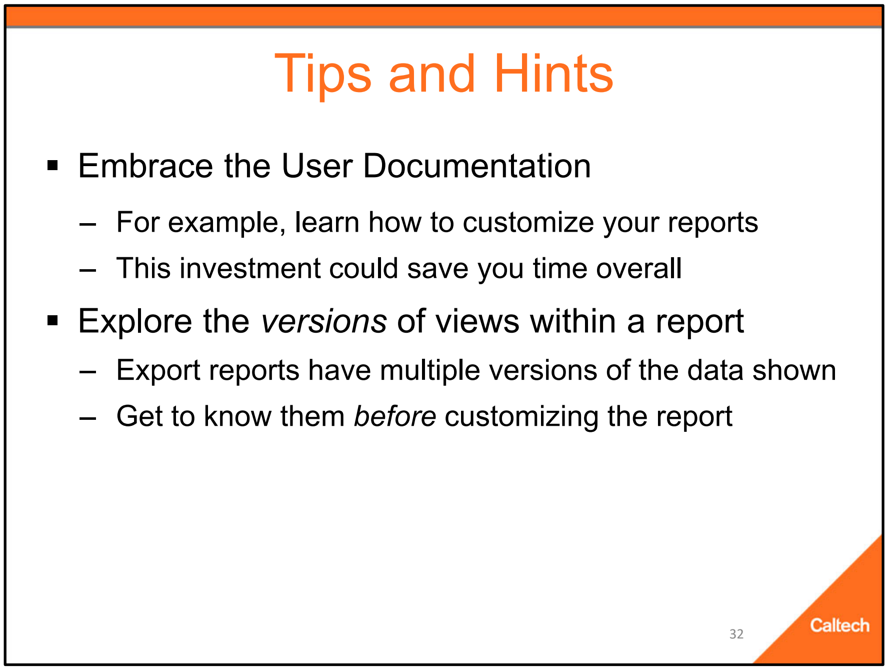


There are two types of reports:

- **Drill**
  - ✓ Links within the report to navigate to more information in a new browser tab
  - ✓ Example: Cost Detail to Invoice or PO or WIC, etc.

- **Export**
  - ✓ These reports are designed to export to Excel where you can add further formatting, pivot on the data, etc.
  - ✓ These reports typically have more than one version to select from with each version having different columns, orders, etc.

Tips, Hints, and Frequently Asked Questions



Tips and Hints

Embrace the User Documentation

- Challenge your assumptions about the data
- Learn how to customize reports
    - ✓ This investment could seriously save you time

Explore the *versions* of views within a report

- The reports designed for export to Excel have multiple versions each with different columns included, ordered, etc.
- Get to know them *BEFORE* customizing the report

Tips and Hints

- Using Prompts
  - Sometimes Less is More
    - ✓ Searching for a specific PTA? Don't also enter Project #.
    - ✓ Too many prompts can decrease performance with no benefit
  - Use *Search* for the Prompts
- Exporting
  - Stick to Excel or CSV
  - Excel: 2,000,000 cells (# of columns X # of rows)
  - CSV: 500,000 rows

33

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Using Prompts: Sometimes Less is More

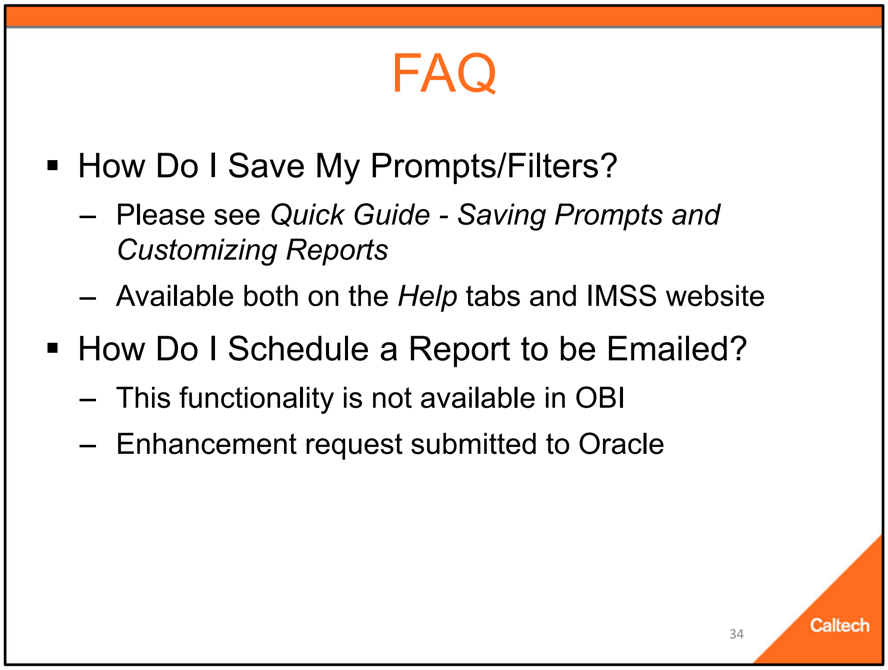
- If you are searching for a single PTA there is no reason to enter the Project # or Award # as well
- Entering too much could lead to data entry errors

Using Prompts: Use Search for the Prompts

- The search offers freedom on character case as well as automatically applying a wildcard at the beginning and end
- However, the prompt entered when running the report must be exact, e.g., the correct case, etc.
- You'll also be able to discover alternative versions of values, e.g., BOON P or Boon, Priscilla or Boone Precilla or Preiscilla Boon or Pboon or P Boon, etc.

Exporting

- **Stick to Excel or CSV** because OBI exports the *pixel* size rather than *font* size, which means it will be much smaller than expected
- *Excel:* Max output is 2,000,000 cells (e.g., 200,000 rows with 10 columns)
  - ✓ The nice thing is that exporting to Excel keeps all the formatting
- *CSV:* Max output is 500,000 rows, regardless of number of columns
  - ✓ This type of export includes ALL of the columns in the report – even those that are hidden or excluded



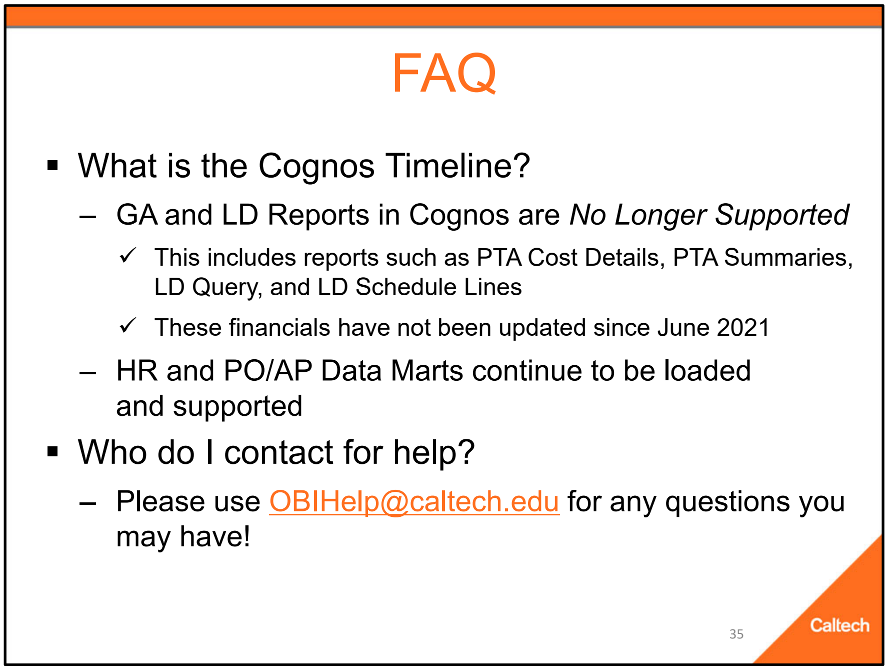
Frequently Asked Questions (FAQ)

How Do I Save My Prompts/Filters?

- Please see the *Quick Guide – Saving Prompts and Customizing Reports*
    - ✓ Available on the *Help* tab as well as the IMSS website at http://www.imss.caltech.edu/services/administrative-applications/data-warehouse-obi/obi-userguides
    - ✓ Tip: Before you start customizing see the Tip of the Day, *Customizing Your Report* on the *Help* tab as well as the IMSS web site at http://www.imss.caltech.edu/documents/17895/TOTD-Customizations.pdf

How Do I Schedule a Report to be Emailed?

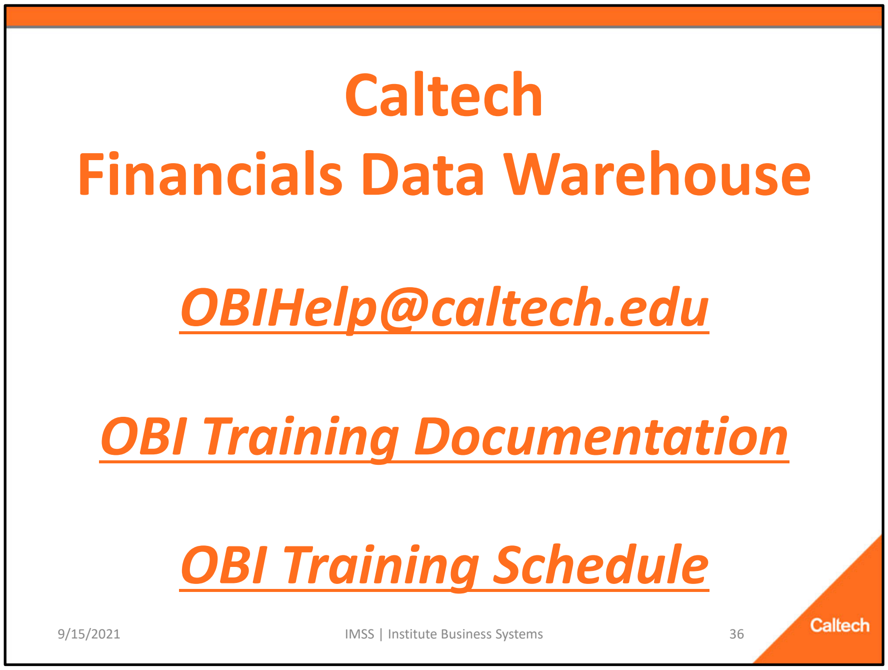
- This functionality is not available in OBI
- Enhancement request has been submitted to Oracle, but not likely to happen



Frequently Asked Questions (FAQ)

What is the Cognos Timeline?

- Reports in the Cognos Grants Accounting (GA) and Labor Distribution data marts are no longer supported
    - This includes reports such as the PTA Cost Details, PTA Summaries, LD Query, and LD Schedule Lines
- HR and PO/AP data marts in Cognos continue to be supported



For more information about OBI please see the user documentation on the *Help* tabs *or* go to:

Questions, issues, and requests for enhancements may be sent to *OBIHelp@caltech.edu*

OBI User Documentation: *http://imss.caltech.edu/services/administrative-applications/data-warehouse-obi/obi-userguides*

OBI Training: *http://www.imss.caltech.edu/services/administrative-applications/data-warehouse-obi/obi-training-schedule* caltech.edu

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