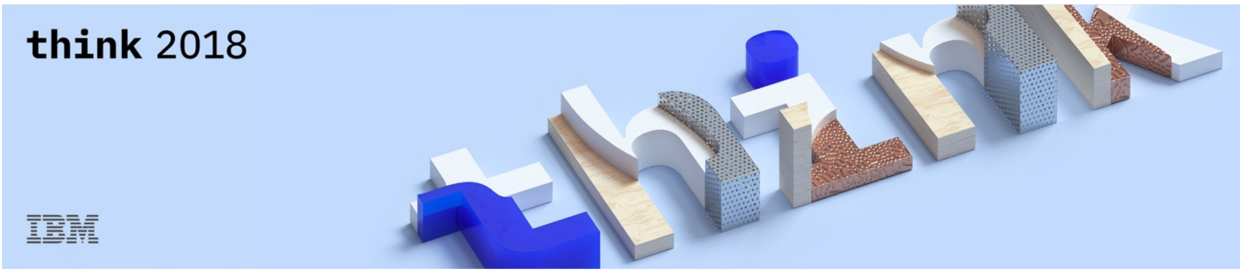

Lab Center – Hands-on Lab

Session: 8606

Session Title: Reporting Reimagined: Introduction to Cognos Analytics Reporting

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Introduction: Getting Started

Introduction to Cognos Analytics

Cognos Analytics is Modern Self-Service Business Intelligence Platform that provides a sleek and intuitive User Interface. Whether Users are looking for Personal Data Discovery, or to leverage their full enterprise data platform for analysis, IBM Cognos Analytics provides the capabilities to empower everyone in the organization with the insights needed to positively impact decision making.

This workshop designed to give you an opportunity to discover the ease of use of IBM Cognos Analytics V11, IBM's Modern Business Intelligence solution that enhances the efficiency and capabilities of business users, report authors, and administrators alike.

During the workshop you will be shown some of the newest capabilities included in IBM Cognos Analytics, and you will be able to try out some of this functionality for yourself. The new interface was designed in collaboration with existing analytics users and reflects both their experience and expectations for the future. Consumers now have access to interactive reports, dashboard creation is as easy as dragging-and-dropping and power users can perform lightweight data modelling online.

After this workshop you will have a sense of the way in which IBM Cognos Analytics empowers business users to perform data discovery and to create dashboards.

In this workshop, you will experience the following capabilities in IBM Cognos Analytics:

- Cognos Analytics Navigation
- Interact with existing content
- Use the graduated user interface for deeper analysis
- Find Insights in the Information
- Work with Advanced Report Capabilities

Objectives:

Explore the basic capabilities you anticipate your end users will require to create and schedule their own reports. Also investigate methods of testing the performance or ease certain repetitive requirements the users may encounter.

A secondary objective is to better understand how the Cognos Analytics reporting capabilities and UI compare to the familiar Report Studio interface of the prior version of the Cognos report authoring environment.

This scenario takes place in our fictitious outdoors equipment reseller operation named The Great Outdoors. Great Outdoors has used prior versions of the Cognos BI reporting environment for their production reporting needs, but recently upgraded to Cognos Analytics.

You are the lead programmer and have been tasked with evaluating the newly upgraded version of the Cognos reporting environment, Cognos Analytics, and to evaluate its suitability for power users at the departmental level to produce their own reports. The users have already started to use dashboards they created themselves, but certain situations require reports to be run and updated on a scheduled basis, and potentially distributed widely throughout the organization.

Any report written by end users will be vetted for quality before being widely distributed throughout the enterprise, but if the users can create simple personal reports themselves, it will lead to greater satisfaction for them and less overhead on an already overworked IT department.

Workshop 1 Navigation and Consumption

Cognos Analytics provides the User with a single self-service interface for all their needs. Users can view and consume their reports, interact with their reports, augment existing reports with additional data and manage subscriptions to content. This same User Interface allows the User to create new content. Users do not need to toggle between multiple applications to build reports. The Graduated Interface unique to Cognos Analytics utilizes Intent Driven Authoring. Users simply identify their intent of what type of object they need to build, and the UI will automatically bring up the capabilities needed to do so. By keeping the User in the same consistent interface, it eliminates the confusion around what tools to use.

Workshop Duration: *20 minutes*

Audience: Consumers and Report Author

Capabilities: Report Authoring Interface

Prerequisite Workshop(s): None

In this Workshop, you will:

- Interact with existing content
- Use the Graduated Interface for deeper analysis
- Managing Subscriptions

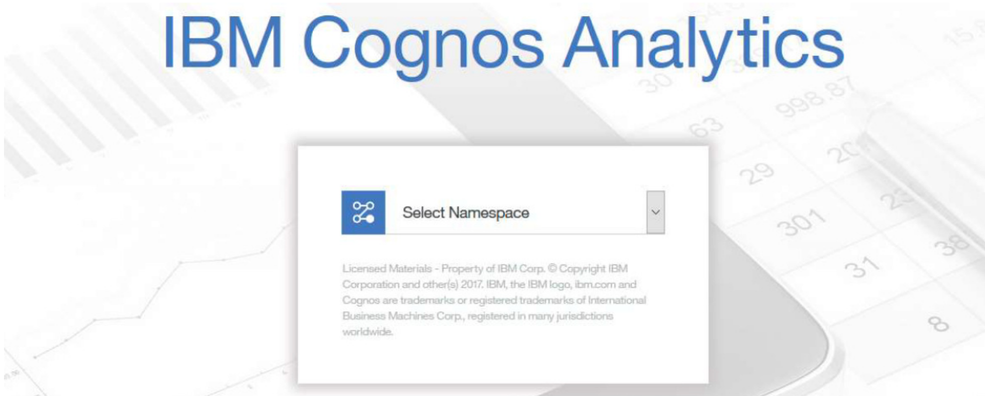
There are several basic capabilities users must have before actually authoring of reports. The users must easily find and run existing production reports, interact with them in a straight-forward and reasonably intuitive manner, and (depending on their authority) even modify them to make unique, personal versions.

Users have complained that is it sometimes hard to find specific reports amongst the large number in the enterprise system. They have also expressed a desire to be able to schedule their own reports so they are not dependent on schedules set by IT.

We'll test these capabilities using some existing reports provided by IT.

1.1 Getting Started with IBM Cognos Analytics

__1. Open Chrome (preferred) or FireFox to launch IBM Cognos Analytics and bring up the login page.

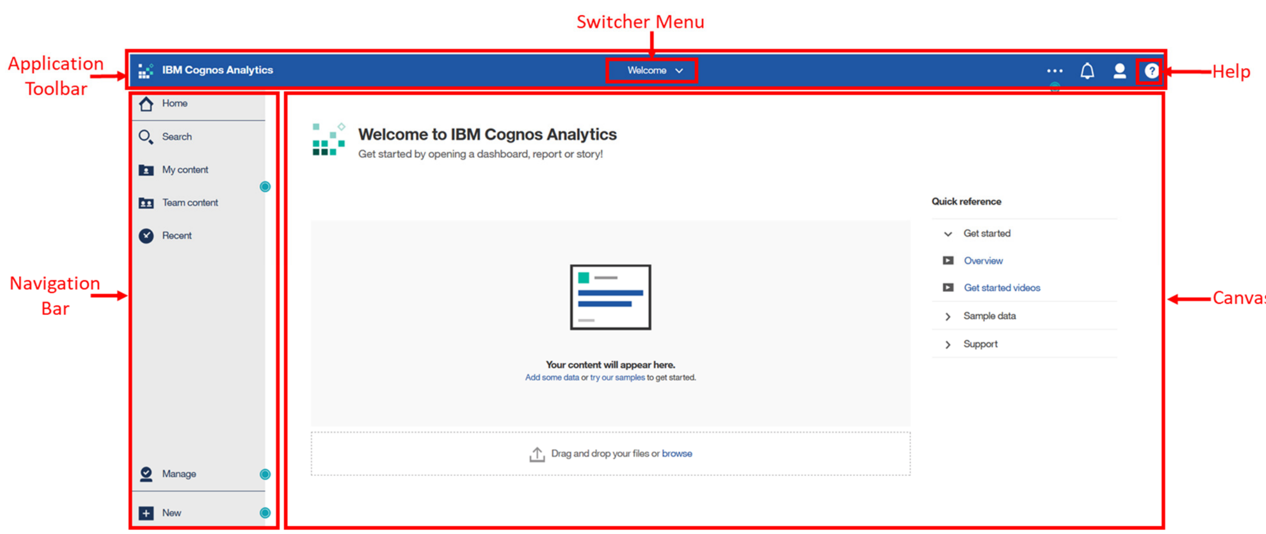


__2. Use the pull-down arrow next to "**Select Namespace**" to select **IBMDemo**.

__3. User ID: **administrator**

__4. Password: **IBMDem0s**

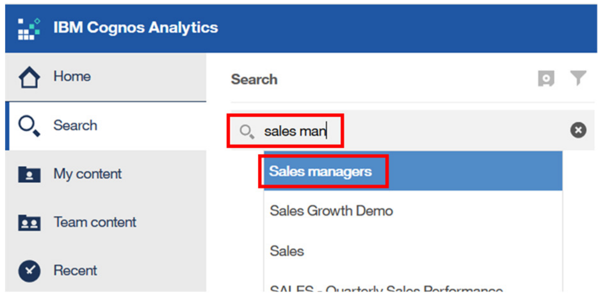
__5. The User Experience brings you directly into the completely new Cognos Analytics User Interface (UI). All Cognos Analytics Users begin their navigation here.



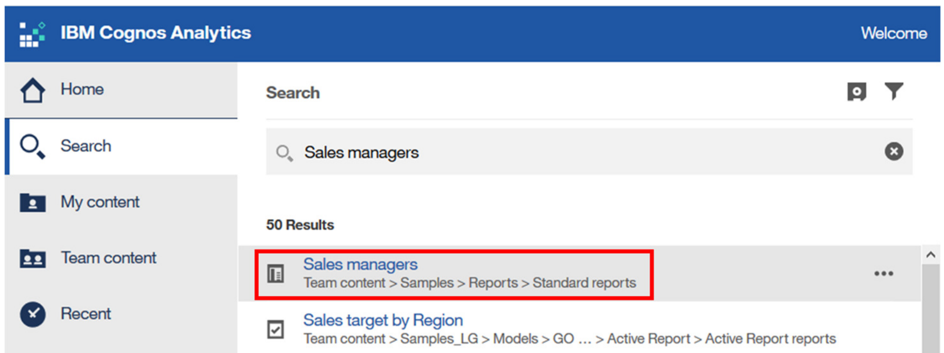
__6. Once you begin working with content, the canvas will update with your recently used items. In your workshop instance, you may see recent content in the canvas.

__7. From the navigation panel, **click** on "**Search**" to open the search menu.

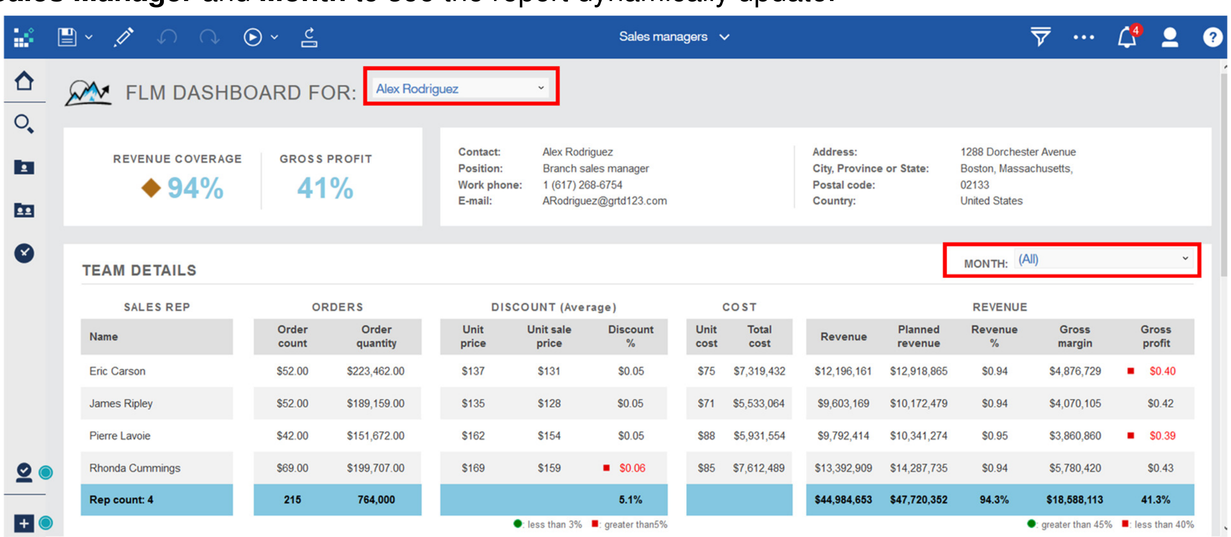
__8. Begin to type "***Sales Managers***" in the **Search** field.



__9. **Click** on "**Sales Managers**" to open a listing of all matching results. **Click** on the "**Sales managers**" report shown in the path below to open.



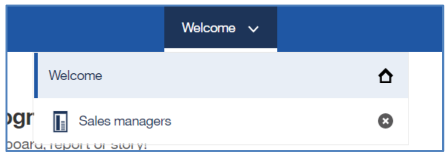
__10. Once the report renders, notice that the **Navigation panel** on the left side has minimized to provide more space for the report to expand and maximize size to fit the canvas. This report is a sample of a typical standard enterprise report. It is highly formatted and uses prompt pull-downs for the User to select how they wish to filter the report. Use the **pull down** menus to change the **Sales Manager** and **Month** to see the report dynamically update.



1.2 Interacting with Existing Reports

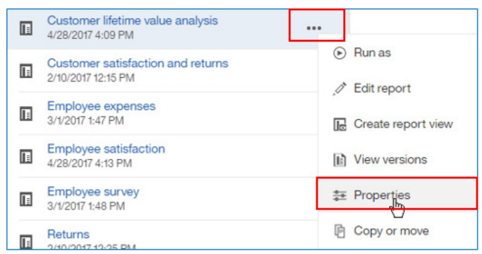
Now that we know how to search for content, let's go a little deeper to learn more by performing some analysis.

__11. **Return** to the Home Page if you are not already there by selecting **Welcome** from the **Navigation menu** (top center of application toolbar):

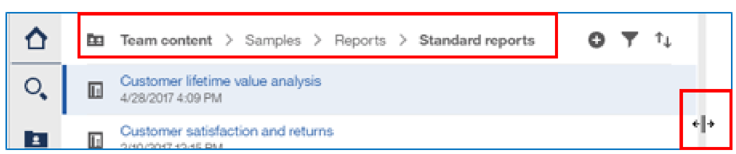


__12. **Click** on **Team content** to open the panel to view content.

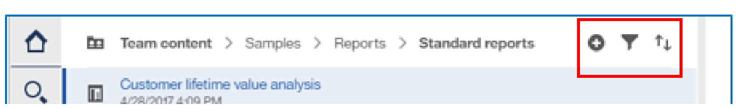
__13. **Navigate** to **Samples>Reports>Standard reports**. The User may now see the list of reports available. From here, the User can get more information on the reports listed by right-clicking on a report name or clicking on the ellipse (**…**) and opening **Properties**, which shows details such as the owner of the report, data last modified etc.



__14. Notice the breadcrumb at the top to preserve the file path reference for the User. If you cannot see the complete breadcrumb trail, slide the **splitter bar** to make it wider.

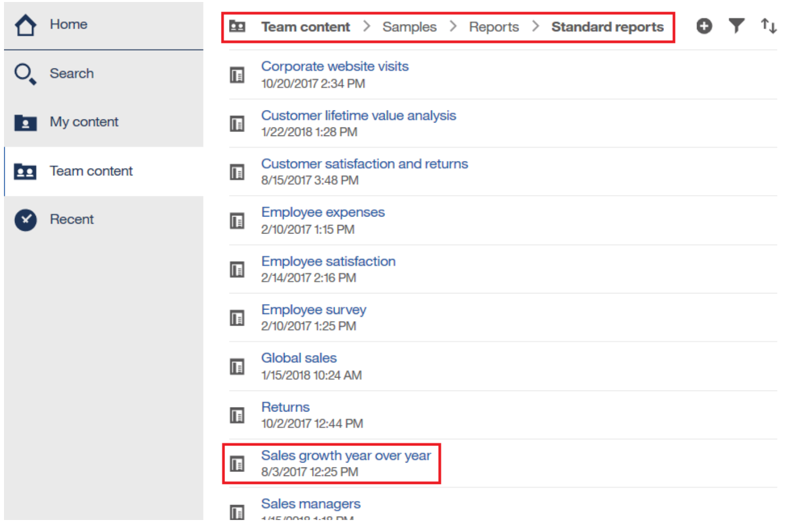


__15. Besides the breadcrumb the user can also create new folders, filter the objects listed to narrow down the results based on the object type, or change the sort order of the list.

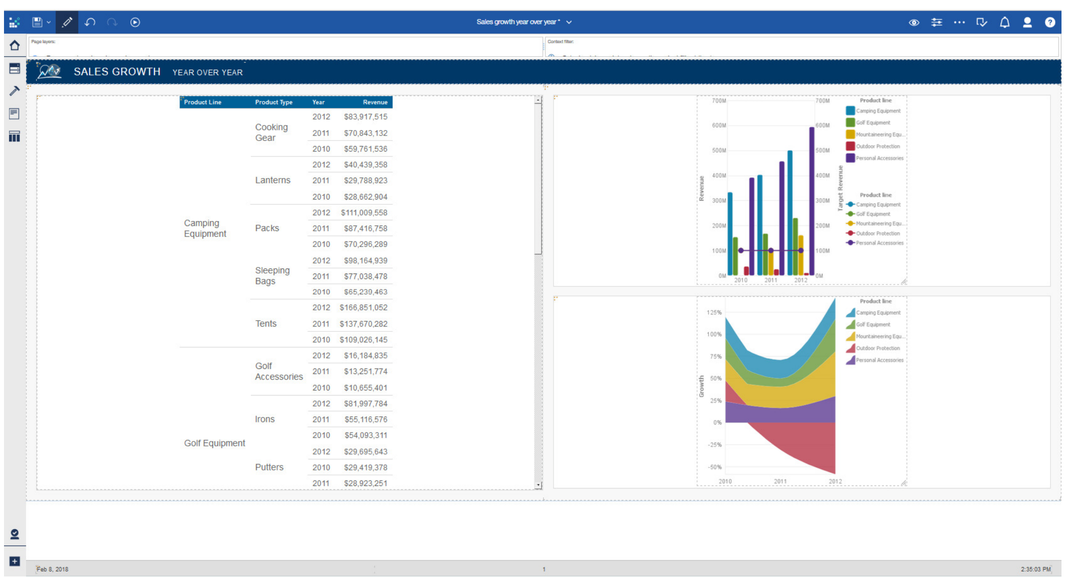


The goal of this NEW Cognos Analytics User Experience is to eliminate separation of the consumption and authoring experience, which previously required Users to toggle between multiple interfaces. Cognos Analytics provides the User with a single UI for all capabilities. This is a paradigm shift from other BI tools in that the User does not begin their interaction based by determining the application they need to work in, but rather, they begin based on their intent of what they are working to accomplish.

__16. From **Standard Reports, click** on “**Sales growth year over year**” report to open.



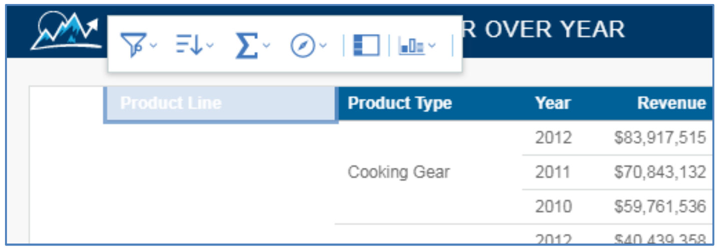
*The report opens in the interactive report viewer on the **canvas** where Users may now interact with, and make modifications to, reports and then save those changes for more personalized content.*



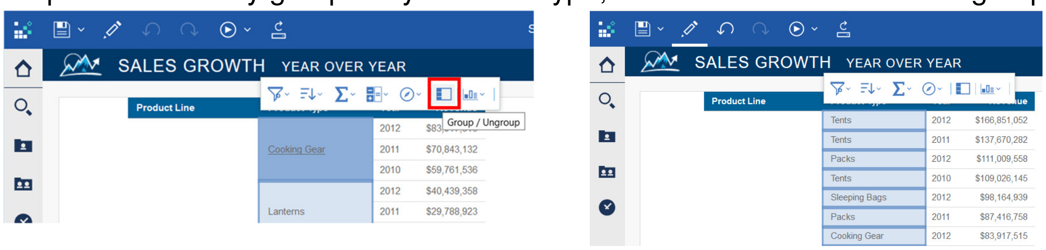
Dedicated Professional Report Authors are no longer responsible for defining and building out the User Interaction capabilities within a report. Nor do they need to build and maintain multiple report versions to support varying User preferences. In the NEW Cognos Analytics UI, all reports become interactive and utilize On Demand Toolbars to expose capabilities to the User directly from where they are in the report.

This Guided Analytics approach was developed to provide Users the capabilities they need when and where they need them.

__17. Let's start with a review of the list report on the left. **Click** on the column header "**Product Line**". Users are now presented with an **On-Demand Toolbar** which provides a variety of interactions available to interact with this report object. This on-demand toolbar provides the capabilities to filter, sort, summarize, explore, group/ungroup, or even change the report chart type. These On-Demand toolbars are context specific and available to the User in every section of the report.



__18. **Click** within the list on the "**Product Type**" to expose the **On Demand Toolbar**. Then **Click** the **group/ungroup** icon. The report will update based on the selections made. Since the original report was already grouped by Product Type, this causes it to become ungrouped.

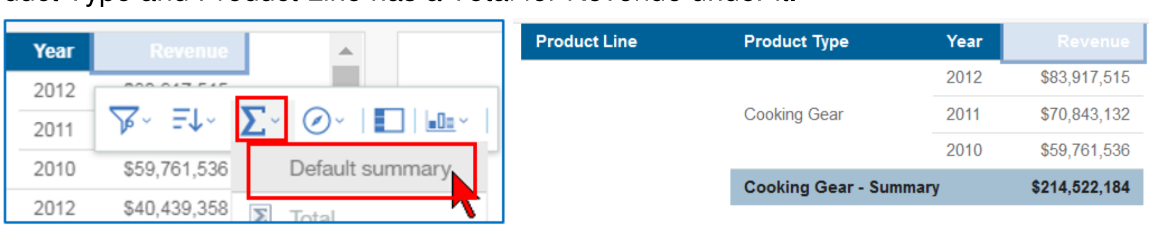


__19. It is much easier to read with both the product types and product lines are grouped**,** so click on **Undo** in the Application toolbar.

TECH TIP: IF YOU CLICK THE GROUP/UNGROUP ICON AGAIN, IT WILL ALSO RE-GROUP BY PRODUCT TYPE, BUT IT WILL ALSO, BY DEFAULT, ADD A DEFAULT SUMMARY AT THE BOTTOM OF EACH PRODUCT LINE AND TYPE.

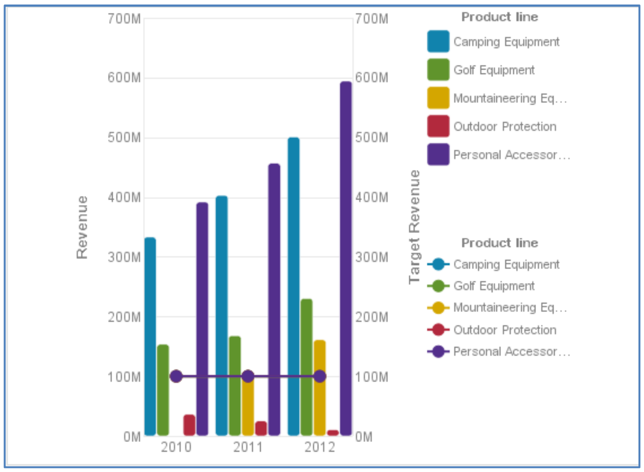
__20. **Click** on the "**Year**" column header on the report and choose **Sort** from the On Demand Toolbar. **Sort Ascending or Descending** based on your preference**.**

__21. **Click** on the **Revenue** column header and select **Summarize > Default Summary**. Now each Product Type and Product Line has a Total for Revenue under it.



__22. The report now is in an easy to consume format where the User can easily Scan the report and identify the revenue trends. As we analyze this report, is there anything that immediately surfaces as interesting, or causes concern? Think about the following:

__a. Which product line generated the most revenue in 2011? In 2012?



Answer:____

__b. Which product line appears to be the newest addition for the company?

Answer:____

__c. What is the general trend of revenues overall?

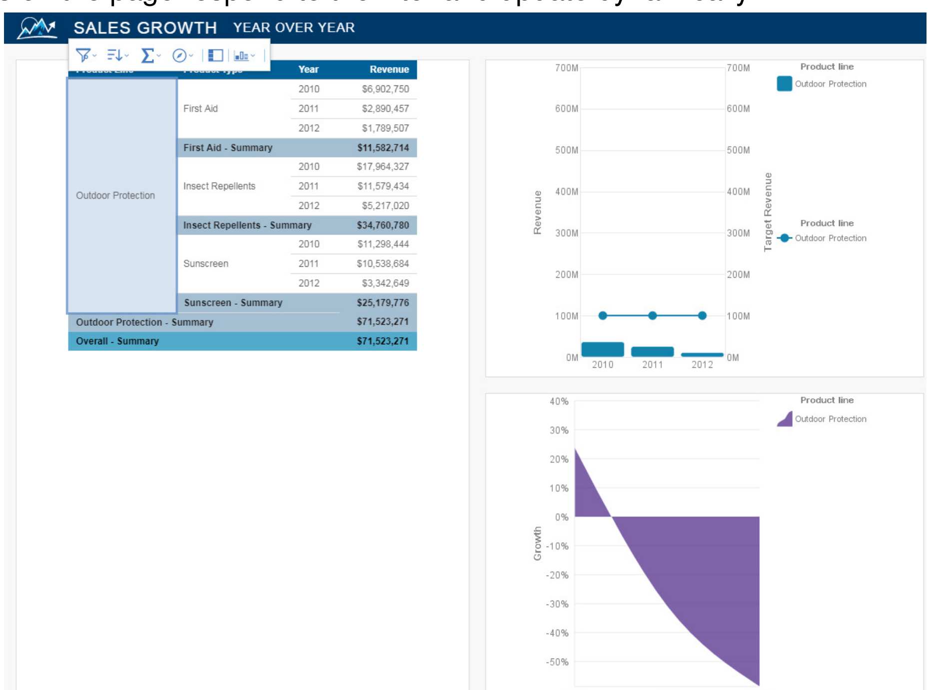
Answer:____

__d. What product lines/product types may be cause for concern based on revenue performance?

Answer:____

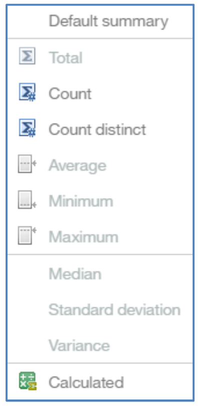
__23. Based on our analysis of the revenue information, it appears that the Outdoor Protection product line has been trending downward for all product types for the last three years. As such, let's focus in on that product line. **Click** on "**Outdoor Protection**" in the list to bring up the On-Demand Toolbar. (If you don't see it, look toward the bottom of the list.)

__24. **Click** on the **Filter** Icon and select "**Include Outdoor Protection**". Notice how all the report objects on the page respond to the filter and update dynamically.

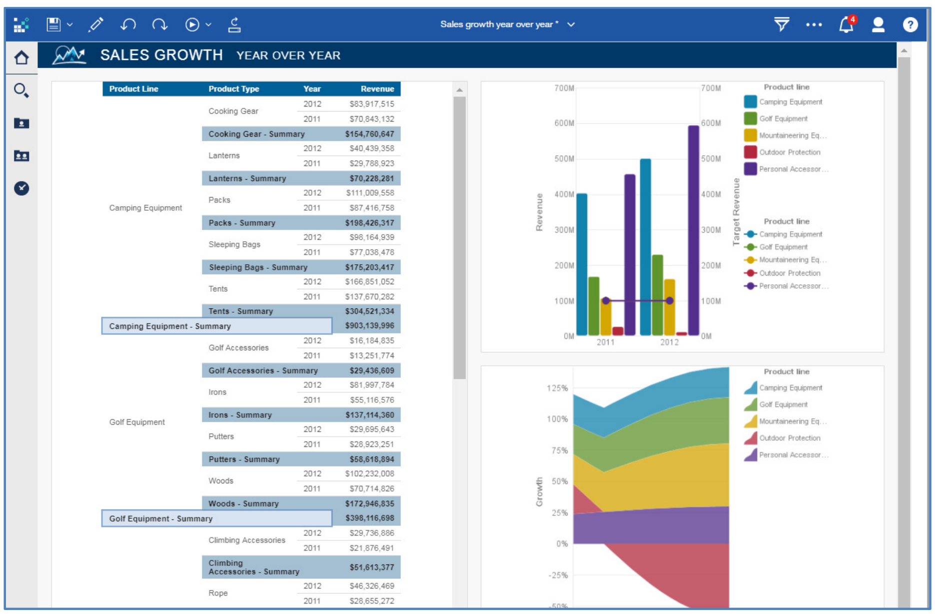


__25. **Click** the **Undo** button  on the toolbar to return to the full report. **Filter** on **another Product Line** to see how the Revenue and Growth charts dynamically update. **Click Undo** to again show all Product Line data.

__26. **Click** on **Revenue** column header. **Click** on the **dropdown** next to the summary icon Σ. The On-Demand Toolbar offers the user several choices on summarization as well as the option to create calculations.



__27. Earlier in our analysis, we found that Mountaineering Equipment had only two years of history, 2011 and 2012, indicating that perhaps it was a newer addition to the product line. In order to make the reporting consistent for all Product Lines, you can remove 2010 from the report. **Click** on "**2010"** in the list report. From **the On-Demand Toolbar**, **Click** on **Filter** and select "**Exclude 2010**". Notice that the charts also updated and responded to the filter.



So far, we have walked through consuming reports as well as interacting with them. And we have seen that our interaction is no longer constrained by the report's design. This self-service interface allows Users to become self-sufficient. And this allows us to empower more Users, thereby extending Analytics further into the organization. But what happens if the User still needs to do more for their analysis? To dig deeper? To investigate even further? The Graduated Interface of Cognos Analytics allows Users to seamlessly transition to have more advanced capabilities as they need them at the click of a single button.

1.3 Progressive Interaction through Graduated Interface

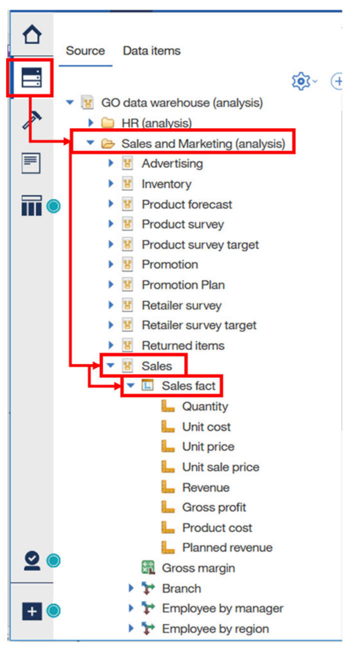
__28. You may have noticed that once you opened the report, the **application toolbar** changed to offer more capabilities. Once a User is interacting with a report, the additional capabilities are presented to allow the user options to Save, Edit, Undo, Redo, Run and Refresh.

__29. Select the Edit icon . This takes the User into Authoring mode where they can now interact further with their report including augmenting the data, adding additional items from the toolbox and work with the report objects, pages and queries, all from the updated icons now on the left navigation panel. Note that the Edit icon is highlighted (dark blue) to identify to the User that they are in Authoring mode.

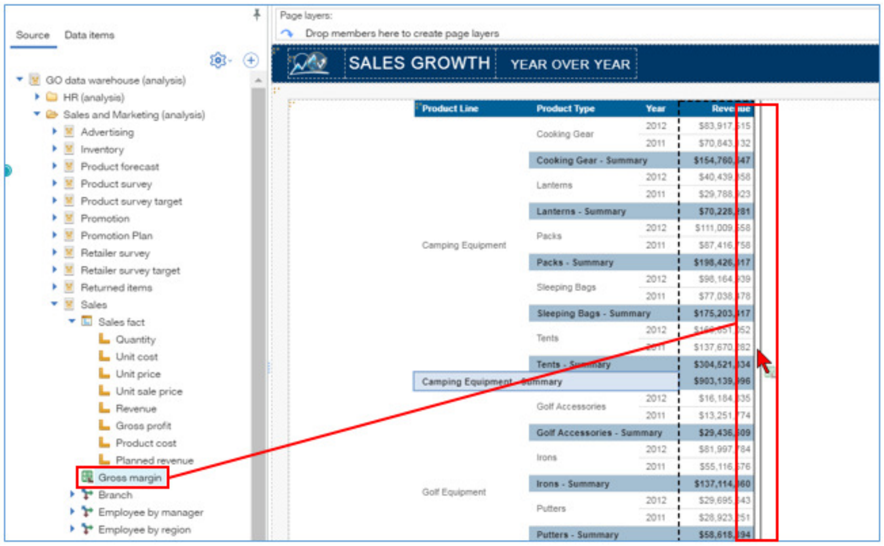
TECH TIP: *THE EDIT CAPABILITIES ARE GOVERNED BY USER PERMISSIONS THAT HAVE BEEN GRANTED BY THE ADMINISTRATOR. THEREFORE, NOT ALL USERS MAY HAVE AUTHORING CAPABILITIES. IF YOU DO NOT SEE THESE CAPABILITIES IN YOUR ENVIRONMENT, CONTACT YOUR ADMINISTRATOR FOR ASSISTANCE.*

__30. Once in Authoring mode, we can now interact directly with the data sources and augment the report to customize it to our needs. To do so, **click** on the **Data** icon  on the navigation panel.

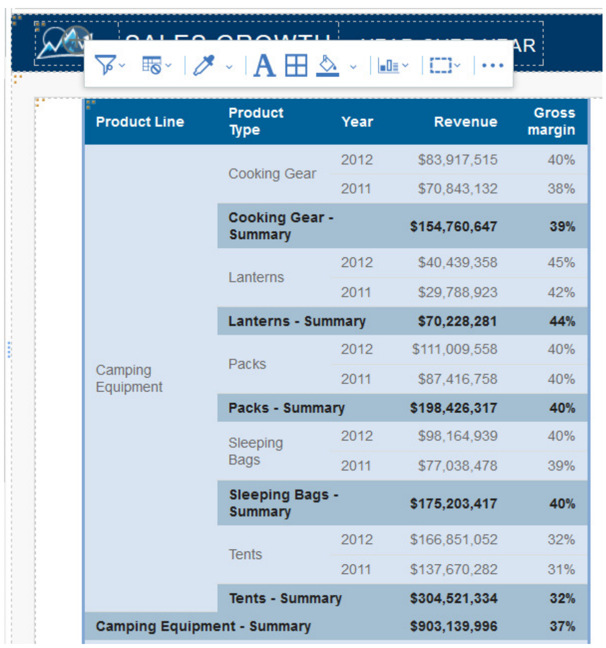
__31. The data source is now rendered in the left panel. This allows us to use all the data elements. **Click** on **arrows** to expand the data source list and navigate down to **Sales and Marketing (analysis)>Sales>Sales Fact**. All the measures are now listed. You may now augment the report with any of these additional measures.



__32. **Left Click** and **hold** to select **"Gross Margin". Drag** it to the list report just **to the right** of the "**Revenue**" column. A **flashing vertical line** will appear as you hover over the appropriate drop zone.

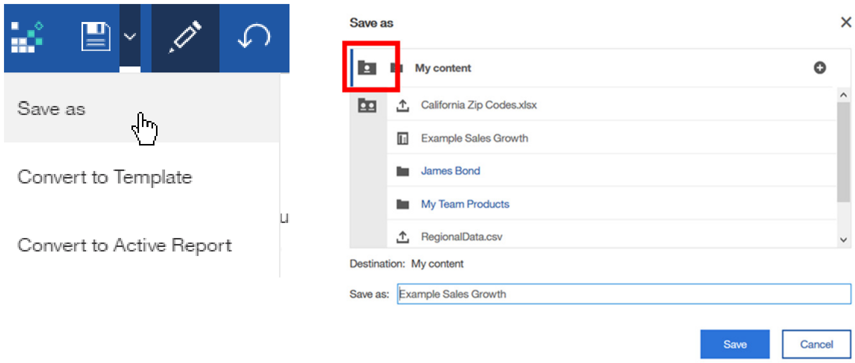


__33. **Release the left mouse button** and the data item will be inserted into place on the report. The report updates and you will also see the On-Demand Toolbar appear with an expanded set of context specific tools.



Users may augment their reports using any of the data available in the data source panel. Additionally, they may also add report objects and visualizations to further enhance their reports. Through the Report Authoring Interface, the graduated capabilities for all professional report development properties may be exposed to Users with those permissions. We will go into these capabilities further in the Report Authoring Workshop.

__34. Now that the report has been augmented with additional data, its time to save the report. **Click** on the **down arrow** next to the **Save** icon on the toolbar and **Select** "**Save as**". Navigate to **My Content**. Save as **"[Your Last Name] Sales Growth"**. **Click Save.**

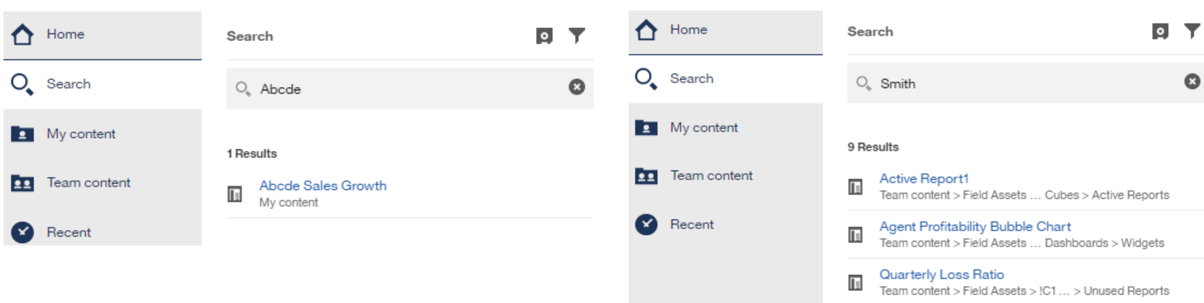


__35. **Click** on the **Edit** icon to exit Authoring mode and return to the **canvas**. The **Edit** icon is no longer highlighted indicating to the User they are no longer on **Authoring** mode. Notice that the Navigation menu at the top center of the screen now reflects your report name.

__36. Navigate back to the **Home Page** by using the **Navigation menu** and selecting **Welcome**.

__37. **Click** on the **My Content** button to open the Panel. You will now see your saved report. It also appears as the first "recent" tile on the Welcome screen.

__38. **Click** on the **Search** button to open the Search Pane. **Search** on **your last name** used when you saved your report. You will see that your report is now listed. If you have a name that is also used in our sample data, you will see all other reports that contain that name.



TECH TIP: *SAVED REPORTS ARE IMMEDIATELY AVAILABLE IN THE NEW COGNOS ANALYTICS SMART SEARCH AS THERE IS NO SEPARATE JOB REQUIRED TO CREATE AN INDEX. ALL CONTENT IS IMMEDIATELY AVAILABLE FOR SEARCH UPON SAVE.*

Workshop 2 Authoring Reports

In the last exercise, we interacted with an existing report. But what if the report did not already exist? How would we build it? Using Cognos Analytics Authoring a User's have self-service access to quickly and easily build out new content.

Workshop Duration: *45 minutes*

Audience: Consumers and Report Author

Capabilities: Report Authoring Interface

Prerequisite Workshop(s): None

In this Workshop, you will:

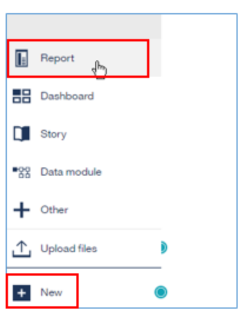
- Author a new report
- Customize the Toolbox
- Work with Visualizations
- Add a Map to the Report
- Work with Report Properties

Now that we've reviewed some basic use and scheduling capabilities, we will move on to see how easy it is to author a report. We will create a simple report using some basic lists, charts, and a map.

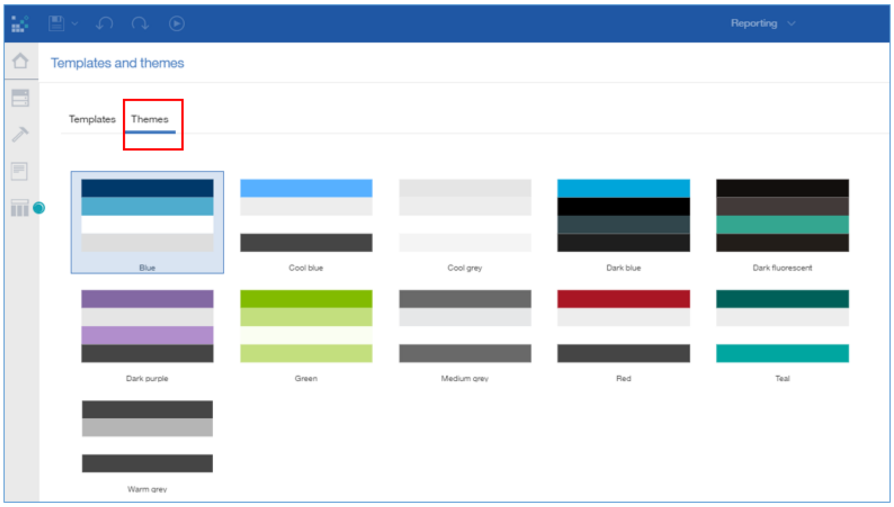
2.1 Authoring New Content

__1. Using the **Navigation Menu**, go to the **Welcome** page.

__2. From the lower left of the **Navigation Panel**, **select** "**New**". This opens up the intent-driven authoring options of Report, Dashboard, Story, and Data Module. **Select** "**Report**" to open the Report Authoring Interface.

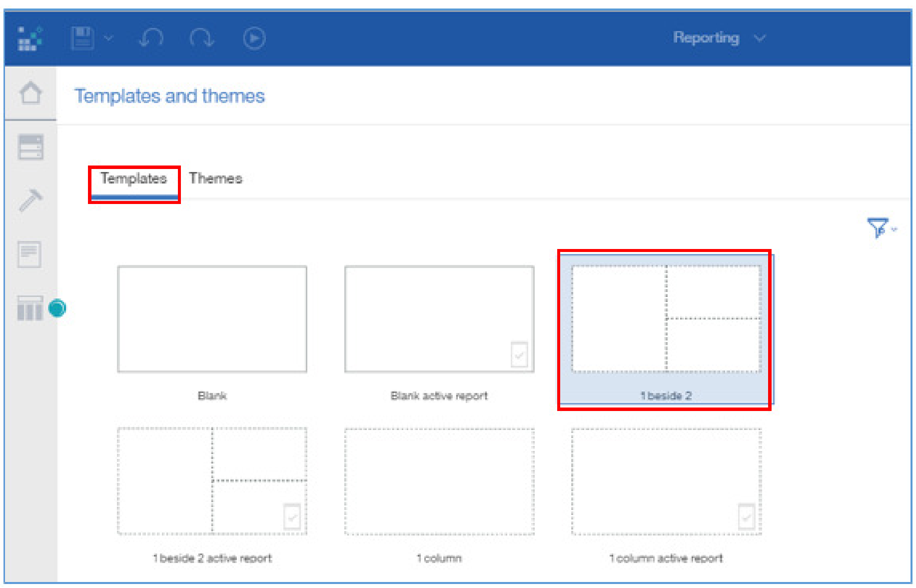


__3. The User is brought to the Templates and Themes panel. **Select** the **Themes tab**. There are several "out of the box" color schemes for Users to choose from. **Select** the "**Blue**" theme and Return to the **Templates** tab.



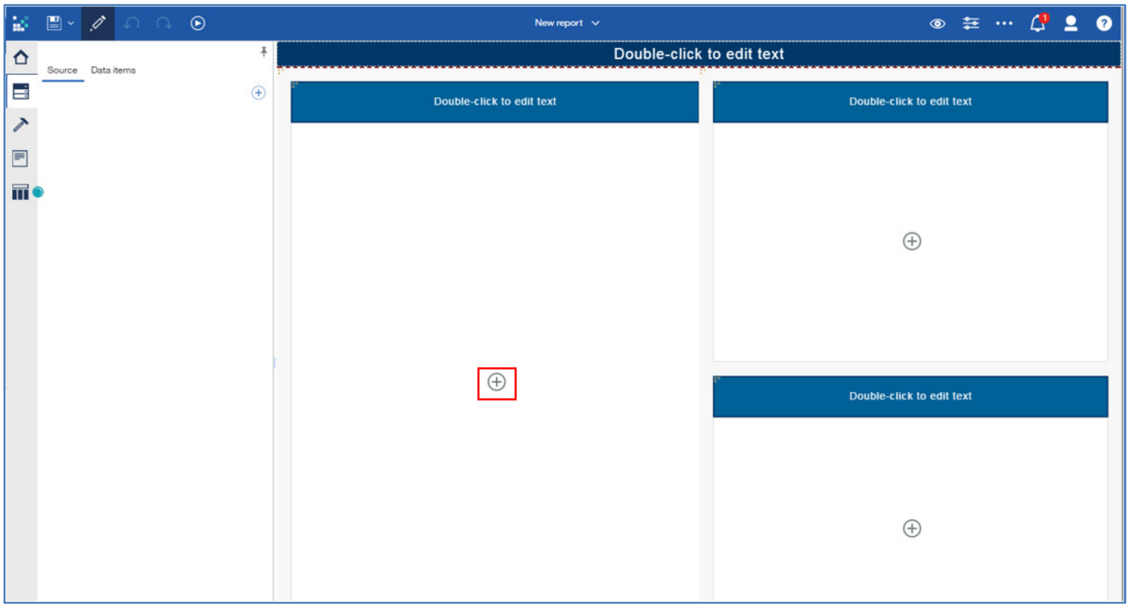
***TECH TIP**: CUSTOM THEMES MAY BE CREATED TO ALLOW USERS TO LEVERAGE THEIR CORPORATE COLOR SCHEMES.*

__4. Templates simplify the Report build by allowing Users to quickly assemble content into layouts based on best practices. **Select** the "**1 beside 2**" template and **click OK**.

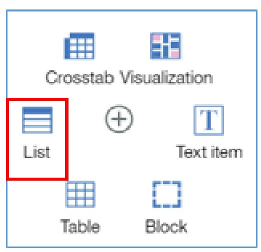


The report template with the selected theme renders in the authoring interface. The User now has a jumpstart on creating a visually appealing report and just needs to add the content to complete.

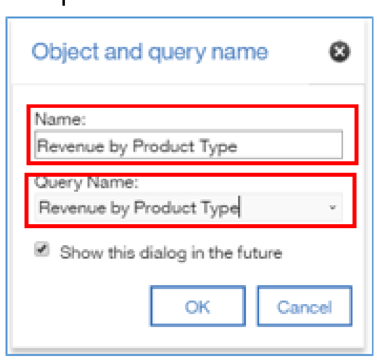
__5. Notice that each of the report objects has an Add button. **Click** on the button in the left report object.



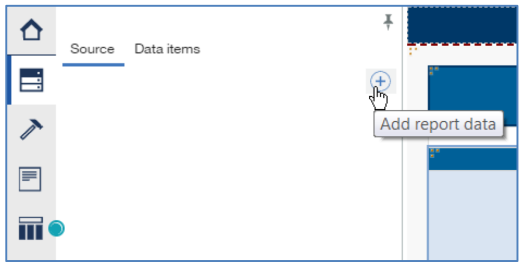
__6. This button is used as a shortcut to quickly add objects to the report. Additional objects are available, but these represent the most commonly used objects and provide the User an easy starting point in building report objects by selecting the object type from where it will be placed in the report. For this report you will start with adding a list object. **Select List**.



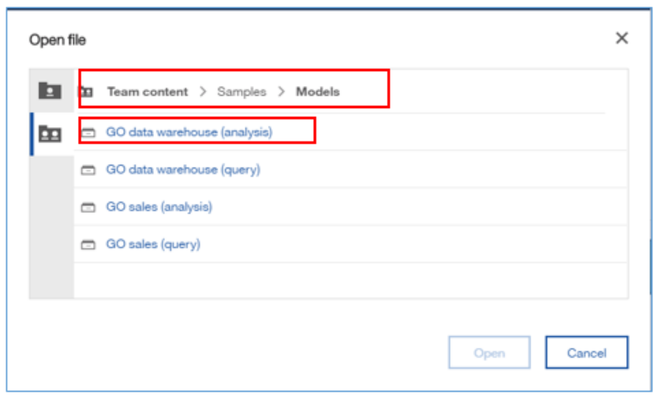
__7. The Object and Query Name window will appear. Best practices state that relevant and identifiable names be given to all objects. **Change** both the **Name** and **Query Name** to “**Revenue by Product Type**”. This will make it easier for the User to identify the related objects should they need to go back to reference the report object specifications at a later date, or if other Users are working with the report.



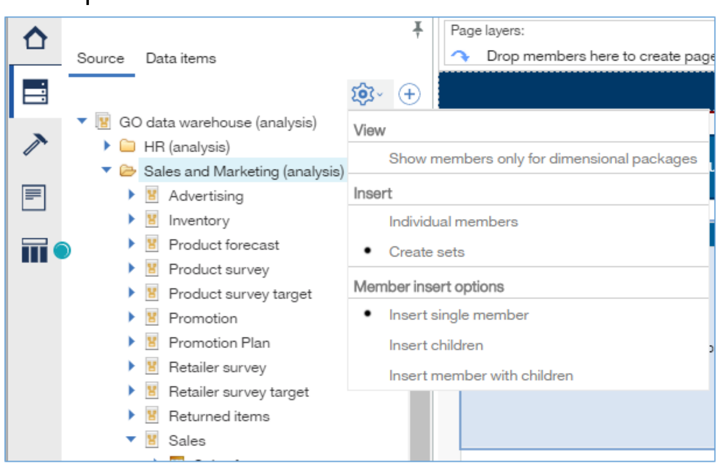
__8. Now that we are in the Authoring mode, notice that the navigation panel has minimized to provide more space for the User to work with the Authoring Interface. The Data Panel has also been exposed so the User may select their desired data source. **Click** on **Add report data** ⊕ to select the data source to be used.



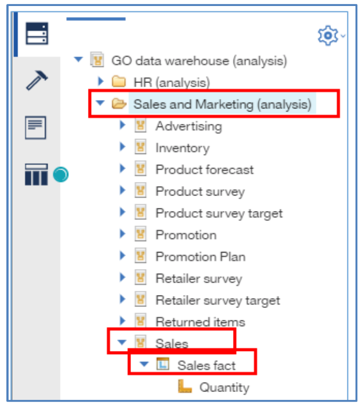
__9. **Click** on **Team content** folder. Navigate to **Team Content>Samples>Models>GO data warehouse (analysis)**. Notice that as you click through the folder structures, a breadcrumb appears at the top. After selecting **GO data warehouse (analysis)**, **click Open**.



__10. The data panel now lists the data from the data source selected. The default view is the Metadata Tree. This allows the user to see the hierarchy levels since this is a dimensional data source. The user also has the option to view the actual data members (data values). **Click** on the **drop down arrow** beside the '**gear'** icon at the top of the data source panel to familiarize yourself with the options. **Click** on the 'gear' again to return to the Metadata Tree view as we will use this view to build our report



__11. The user may now navigate through the contents of the data source. For our report, we will be focused on Sales information. Using the expand arrows, **navigate to Sales and marketing (analysis) > Sales**. The individual dimensions are now in view. **Expand Sales Fact** and you will now see the **Sales** measures available.



__12. Navigate into the data to add the items listed below. To add, **drag** each data member into the report object body and **drop** where it indicates “**Drag Items here to create new columns**”. As you add each column, drop it just to the right of the previous column in the drop zone (when the flashing vertical column appears).

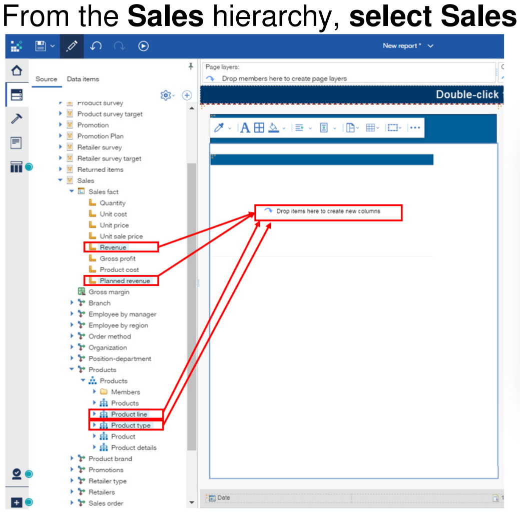
__13. Add the following columns to the report:

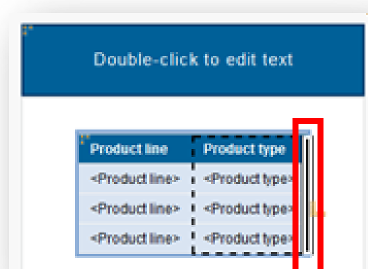
__a. From the **Product** hierarchy, **select Products→Product Line**

__b. From the **Product** hierarchy, **select Products→Product Type**

__c. From the **Sales** hierarchy, **select Sales fact→Revenue**

__d. From the **Sales** hierarchy, **select Sales fact→Planned Revenue**





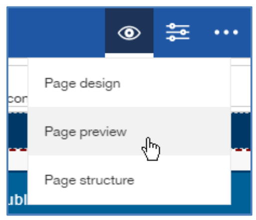
TECH TIP: *YOU MAY ALSO CTRL+CLICK ON THE DATA MEMBERS AND DRAG THEM ALL OVER SIMULTANEOUSLY. THIS METHOD WILL DROP THE DATA MEMBERS IN THE ORDER THEY WERE SELECTED.*

__14. Notice that the report shows the data selections, but not the values. This indicates that Authoring is currently in the **Page Design** mode. This allows the User to build out the report content without interactively running/rendering the report as it is built.

Product line	Product type	Revenue	Planned revenue
<Product line>	<Product type>	<Revenue>	<Planned revenue>
<Product line>	<Product type>	<Revenue>	<Planned revenue>
<Product line>	<Product type>	<Revenue>	<Planned revenue>
Overall - Summary		<Summary(Revenue)>	<Summary(Planned revenue)>

__15. To change to **Page Preview** mode, click on the **Page Views** icon in the upper right of the application toolbar.

__16. **Select Page Preview** mode. The report's query will run and return the data into the report. While in Preview mode, the query will continue to interactively run and update the data as we continue to build out the report.



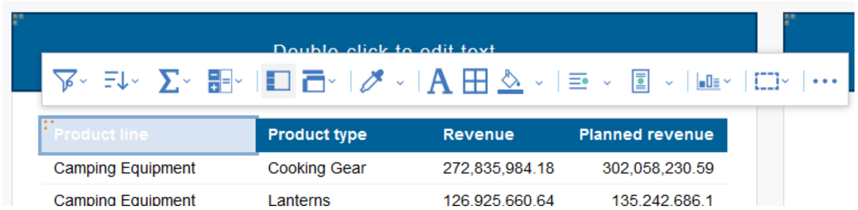
TECH TIP: *THE MODE USED IS BASED ON USER PREFERENCE. PREVIEW MODE IS USEFUL WHEN THE USER WANTS TO SEE THE DATA AS THE REPORT IS BUILT. DESIGN MODE IS HELPFUL WHEN THE USER WANTS TO QUICKLY ASSEMBLE THE FORMAT OF THE REPORT WITHOUT HAVING THE REPORT RUN INTERACTIVELY WHICH UPDATES THE DATA THROUGHOUT THE BUILD. IT MAY ALSO BE MORE EFFICIENT WHEN THE REPORT IS BEING RUN AGAINST LARGE DATA SETS AND/OR BEFORE FILTERS ARE APPLIED TO NARROW DOWN THE AMOUNT OF DATA RETURNED. DESIGN MODE AND PREVIEW MODE MAY BE USED INTERCHANGEABLY ON ALL OBJECT TYPES.*

__17. We now see that the report object is rendering with the data values.

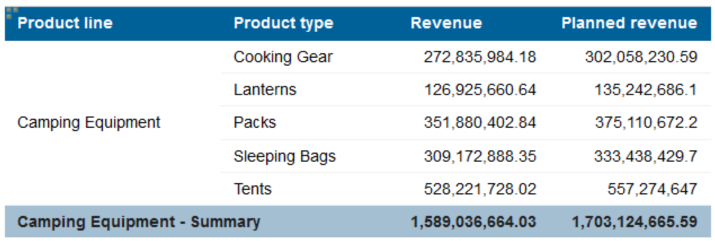
Double-click to edit text

Product line	Product type	Revenue	Planned revenue
Camping Equipment	Cooking Gear	272,835,984.18	302,058,230.59
Camping Equipment	Lanterns	126,925,660.64	135,242,686.1
Camping Equipment	Packs	351,880,402.84	375,110,672.2
Camping Equipment	Sleeping Bags	309,172,888.35	333,438,429.7
Camping Equipment	Tents	528,221,728.02	557,274,647
Golf Equipment	Golf Accessories	51,514,343.88	57,447,817.34
Golf Equipment	Irons	254,814,337.99	273,337,322.37
Golf Equipment	Putters	106,184,271.37	124,789,301.4
Golf Equipment	Woods	313,898,414.65	334,686,523
Mountaineering Equipment	Climbing Accessories	81,096,582.48	84,589,657.16
Mountaineering Equipment	Rope	114,426,644.73	120,761,636.12
Mountaineering Equipment	Safety	83,236,883.98	88,099,404

__18. Currently the list report is rather long and difficult to consume so grouping and subtotals would be helpful. We can do this using the **On-Demand toolbars. Select** the **Product Line** column. Notice that in Authoring, the **On-Demand toolbar** has an expanded set of report functions to help with the build.



__19. **Select** the **Group/Ungroup** icon to group the report on Product Line.



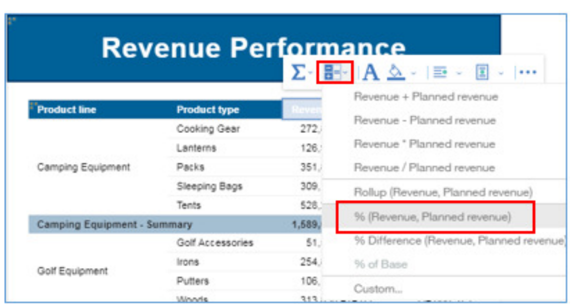
Product line	Product type	Revenue	Planned revenue
	Cooking Gear	272,835,984.18	302,058,230.59
	Lanterns	126,925,660.64	135,242,686.1
Camping Equipment	Packs	351,880,402.84	375,110,672.2
	Sleeping Bags	309,172,888.35	333,438,429.7
	Tents	528,221,728.02	557,274,647
Camping Equipment - Summary		**1,589,036,664.03**	**1,703,124,665.59**

__20. Since we used a prebuilt report template, we already have a section to easily add a report header. **Double-click** on where it says "**Double-Click to edit text"** in the report header section to edit. **Name** the section "**Revenue Performance".**

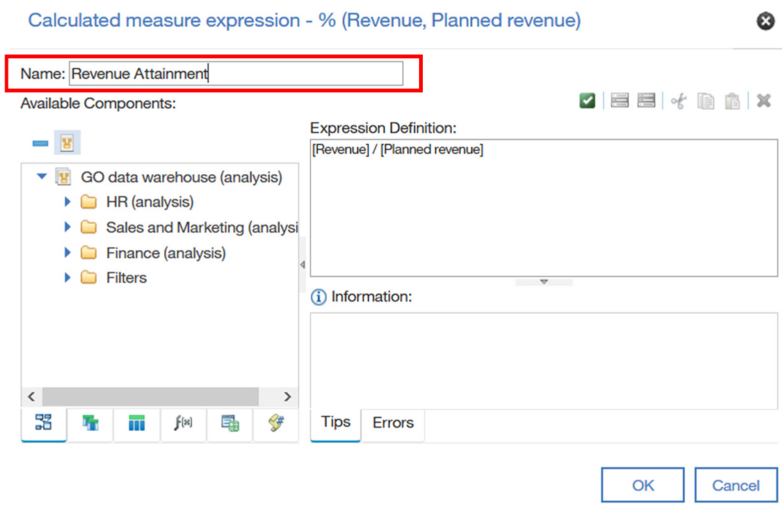
__21. Notice that the Report Header has its own **On-Demand** toolbar. Use this **On Demand** toolbar to **format** your **report headers** to your liking (example shows Arial,18pt, bold font).

The report is looking good, but you still need a bit more information. One other piece of information you are interested in is to see how Revenue is tracking against Planned Revenue. Since this is not a calculation provided in the data source, you can quickly add a calculation directly in the report.

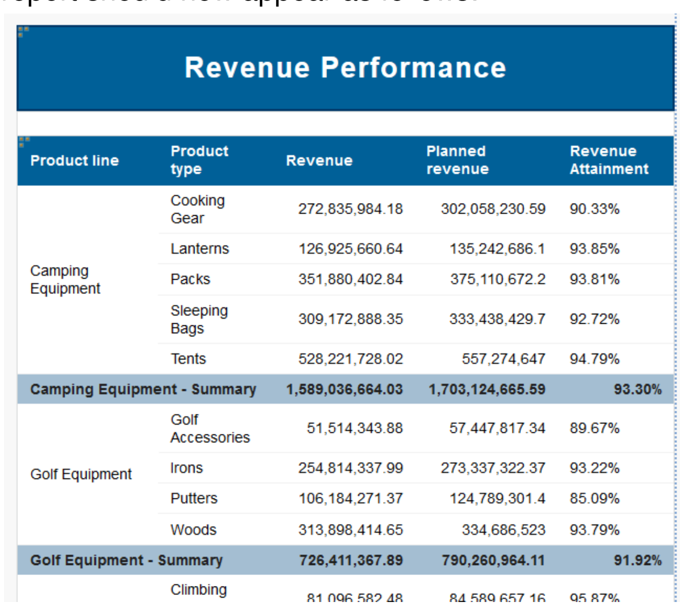
__22. **Select Revenue** and hold down the **control** key while you then click **Planned Revenue**. Both will be highlighted and the **On-Demand** Toolbar will appear. **Click** on the **Insert Calculation icon** . **Select %(Revenue, Planned Revenue).**



__23. A new column has been inserted into the report with the calculated attainment rate of Revenue as a percentage of Planned Revenue. To change the column name, **double-click** on the **column header** to open the **Calculated measure eExpression window**. From here, the User may change the column name and build complex calculations. **Change** the **Name** to "**Revenue Attainment**".



__24. **Click OK**. Your report should now appear as follows:



Revenue Performance

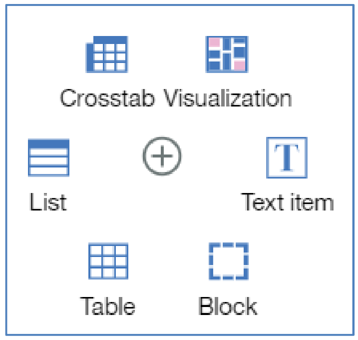
Product line	Product type	Revenue	Planned revenue	Revenue Attainment
Camping Equipment	Cooking Gear	272,835,984.18	302,058,230.59	90.33%
	Lanterns	126,925,660.64	135,242,686.1	93.85%
	Packs	351,880,402.84	375,110,672.2	93.81%
	Sleeping Bags	309,172,888.35	333,438,429.7	92.72%
	Tents	528,221,728.02	557,274,647	94.79%
Camping Equipment - Summary		**1,589,036,664.03**	**1,703,124,665.59**	**93.30%**
Golf Equipment	Golf Accessories	51,514,343.88	57,447,817.34	89.67%
	Irons	254,814,337.99	273,337,322.37	93.22%
	Putters	106,184,271.37	124,789,301.4	85.09%
	Woods	313,898,414.65	334,686,523	93.79%
Golf Equipment - Summary		**726,411,367.89**	**790,260,964.11**	**91.92%**
	Climbing	81,096,582.48	84,589,657.16	95.87%

__25. **Click** on **dropdown arrow** on **Save** icon on the **Main toolbar**. **Click Save As**. Navigate to **My Content** and save the report as **"[your last name] - Cognos Analytics Report"**. You will now see the name of the report rendering in the Navigation Menu.

By using the Graduated Interface of Cognos Analytics, in just minutes we were able to very quickly and easily build the same type of report object as we worked with before. And, we were able to augment it even further with calculations for measures that we needed for our analysis. The best part is that we did this without having to open multiple applications; it was all available to us through a single User Interface.

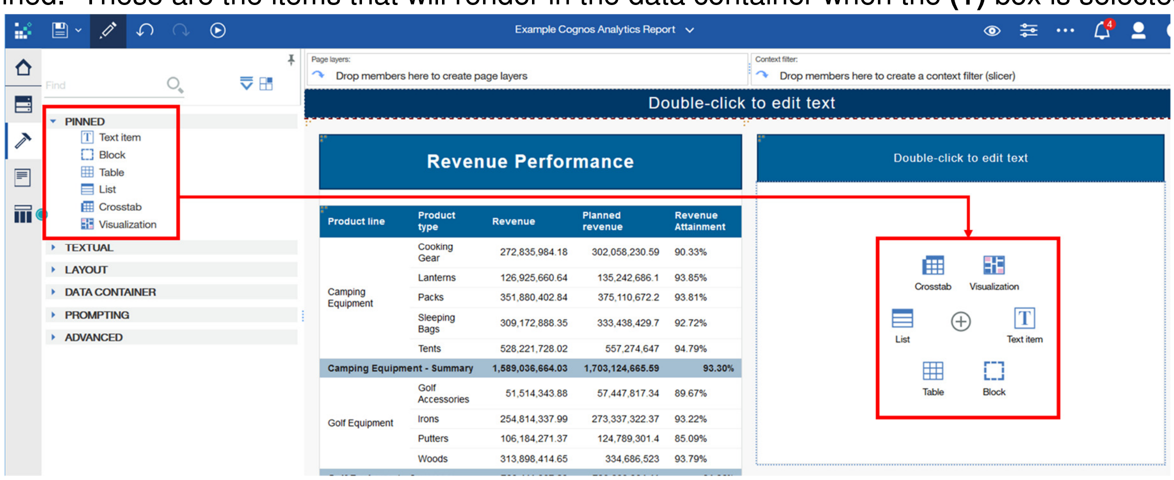
2.2 Customizing the Toolbox

__26. Let's build out the remaining two report objects on our template. Go to the data container in the Upper right report section, **click** on the **Add button** ⊕ in the data container. Notice the six (6) choices provided from the toolbox for report object types.



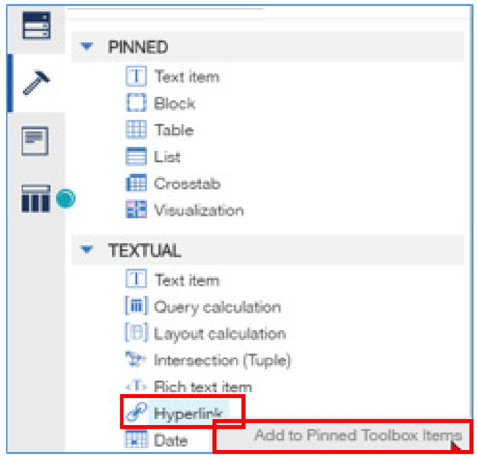
__27. The report objects shown come from the **Pinned toolbox** items. To view the **Toolbox** items, **click** on the **toolbox** icon from the **Navigation panel** on the left.

__28. **Click** on the **arrow** next to **PINNED** to expand and show the **toolbox items** that have been pinned. These are the items that will render in the data container when the **(+)** box is selected.

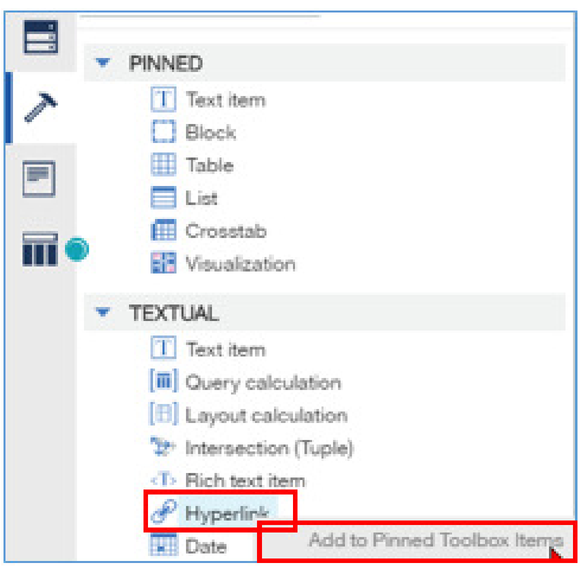


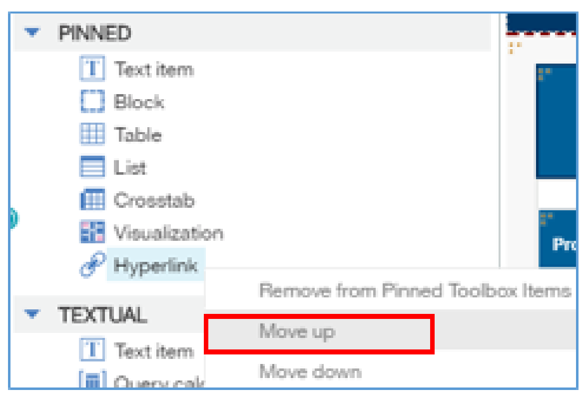
*The **toolbox items** in the **PINNED** section are the commonly used report items; somewhat like a favorites list. However, there are many more toolbox options available for use. The toolbox items have been organized into groups based on type. Any toolbox item may be added to the PINNED toolbox items.*

__29. **Expand Textual** tools then **right click** on **Hyperlink** and **click "Add to Pinned Toolbox items"**. Notice that it is now added to the bottom of the list of PINNED items.

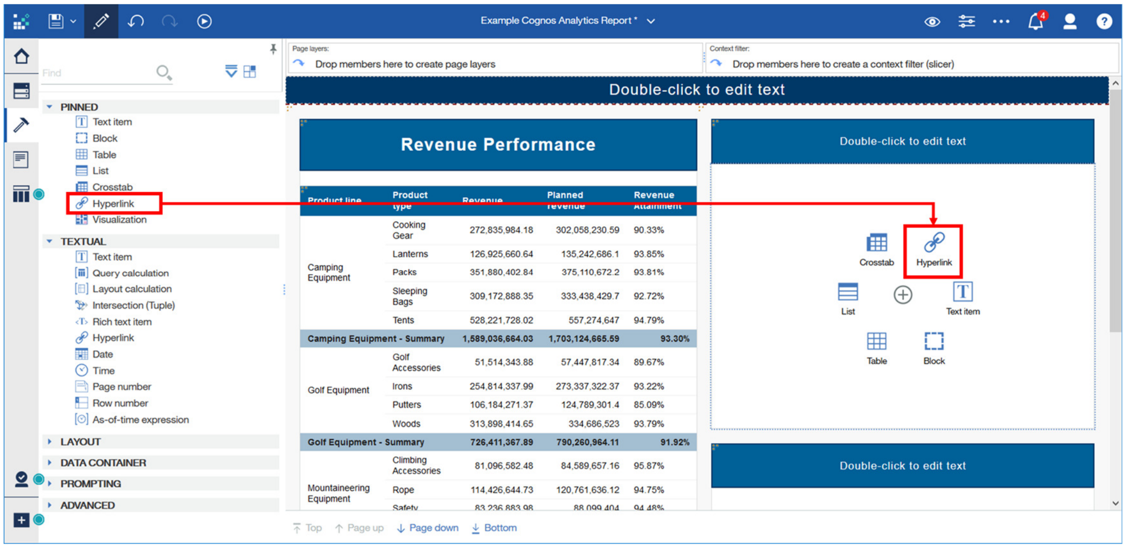


__30. **Click** on the ⊕ sign of the data container on the upper right. Notice that the same six toolbox items appear; that it did not add the newly PINNED visualization toolbox item. This is because the selections shown are generated from the **first six (6) toolbox items** listed in **PINNED**. Users may reorder their Pinned toolbox items so that their favorite Top 6 items are in the first six toolbox items in the list. These may be updated by the User at any time. To change the order of the PINNED toolbox items, simply right click on an item and choose to either move it up or down in the list, or remove it from the list.





__31. **Right click** on **Hyperlink** and **select Move Up**. The list is reordered to reflect the change. **Click** on the ⊕ sign in the data container and notice that Hyperlink is now an option to select.

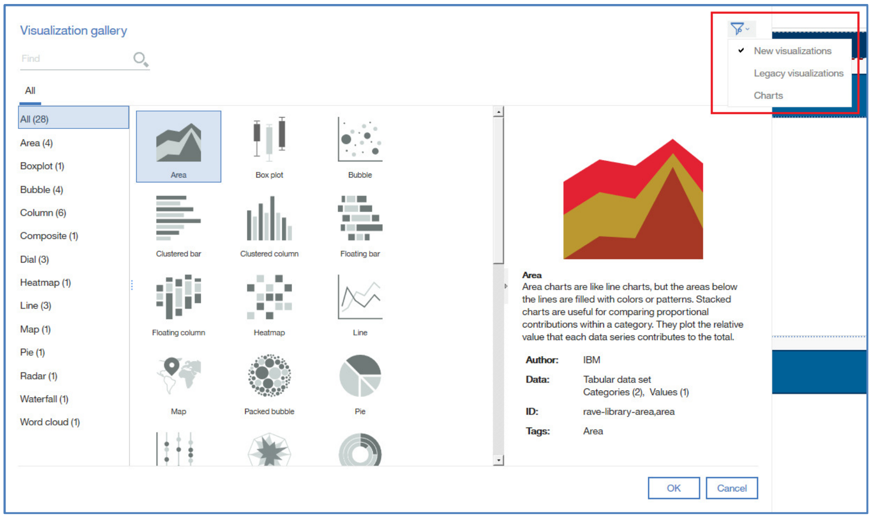


__32. We will not be working with hyperlinks but we will be working with Visualizations, so **right-click** on **Hyperlink** in the PINNED section and **select Move Down.** This allows us to keep it as a pinned favorite, but it will not currently render in our Top 6 options.

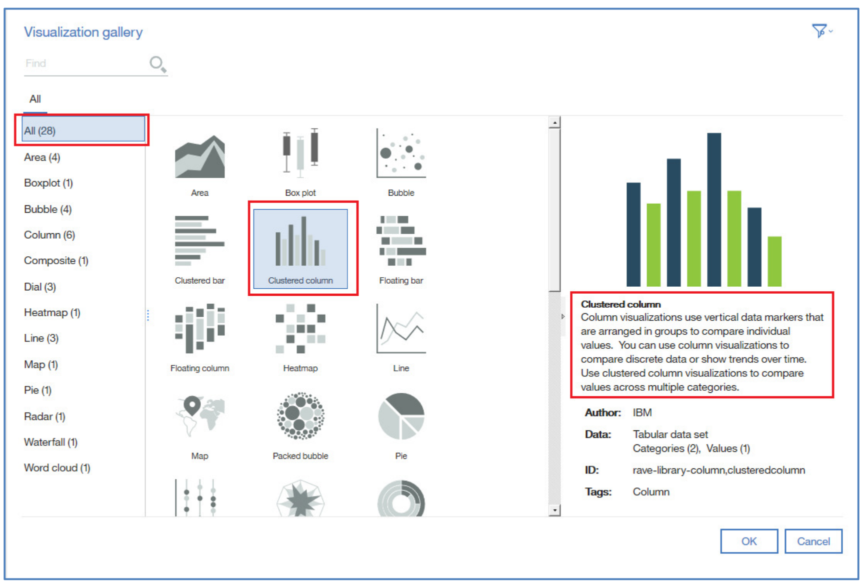
This customization of the Cognos Analytics' Authoring Interface makes it even easier for Users to create content quickly as it puts the functions they need where they need it and allows them to personalize it for their personal preferences.

2.3 Working with Visualizations

__33. Use the **Add button** ⊕ in the data container **Select Visualization**. The **Visualization Gallery** appears and the User may choose from hundreds of Visualizations. Different types of visualizations are available by using the filter icon in the upper right corner. **Select New Visualizations** (may be selected by default).

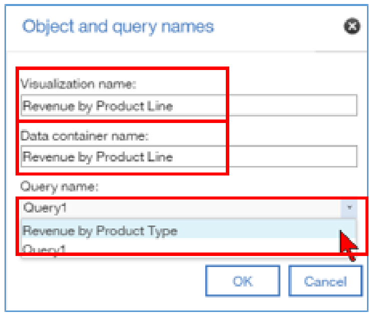


__34. With New visualizations selected, **scroll through** the **Visualization Gallery** and **click** on some that appeal to you. To narrow down your search, use the check boxes to choose types of visualizations. As you select the various visualizations, the panel on the right updates to show a larger sample of the visualization along with an explanation and suggested use cases for each. **Select Clustered column** and **click OK**.



__35. **Change** the **Visualization Name** and the **Data container name** to **"Revenue by Product Line**".

__36. Use the **pull-down arrow** under **Query name** to select the same query we used for the List report, "**Revenue by Product Type**". **Click OK.**



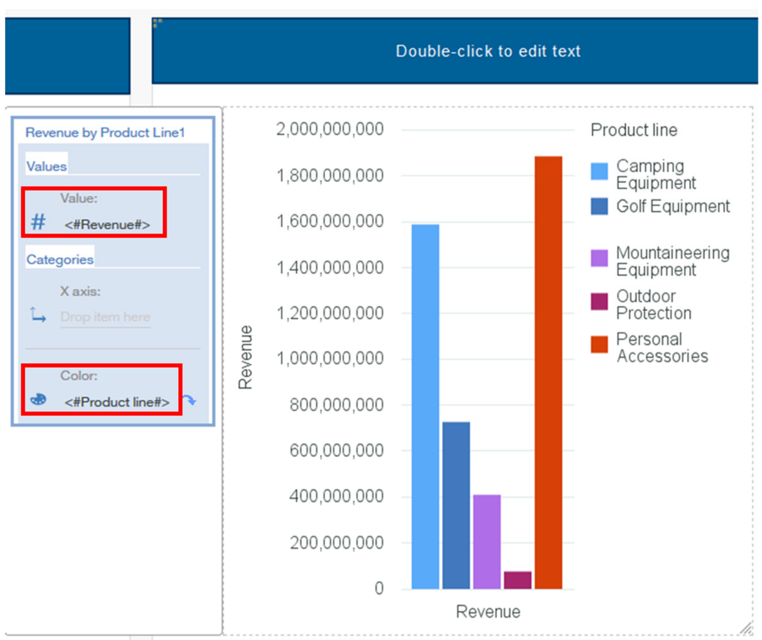
__37. **Click** on the **Data icon** from the **Navigation panel** on the left to open the **Data Source Panel**.

__38. **Click** on **Data Items** to view the data items in the current query.

__39. **Drag and drop** the **Data Items** into the data slots as follows:

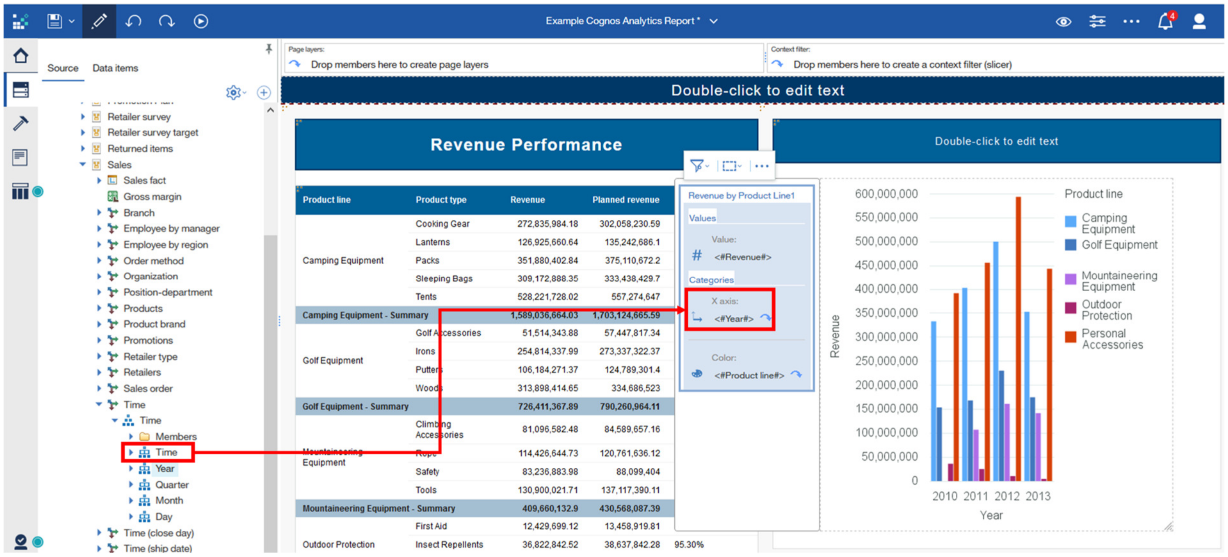
__a. **Revenue,** into **Value**

__b. **Product line** into **Color**

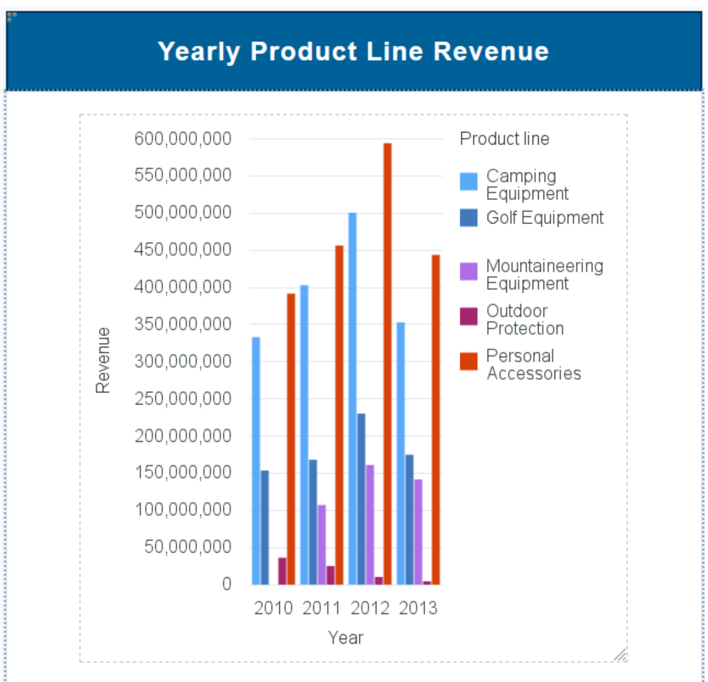


As the data items are entered into the data slots, the visualization renders. For this analysis you would like to add in years as a dimension. This data can easily be added to the existing query.

__40. **Click** on the **Source** tab in the data panel. **Expand Sales & Marketing Analysis>Sales>Time.** From **Time** dimension, drag **Year** into the **X-axis data slot.**

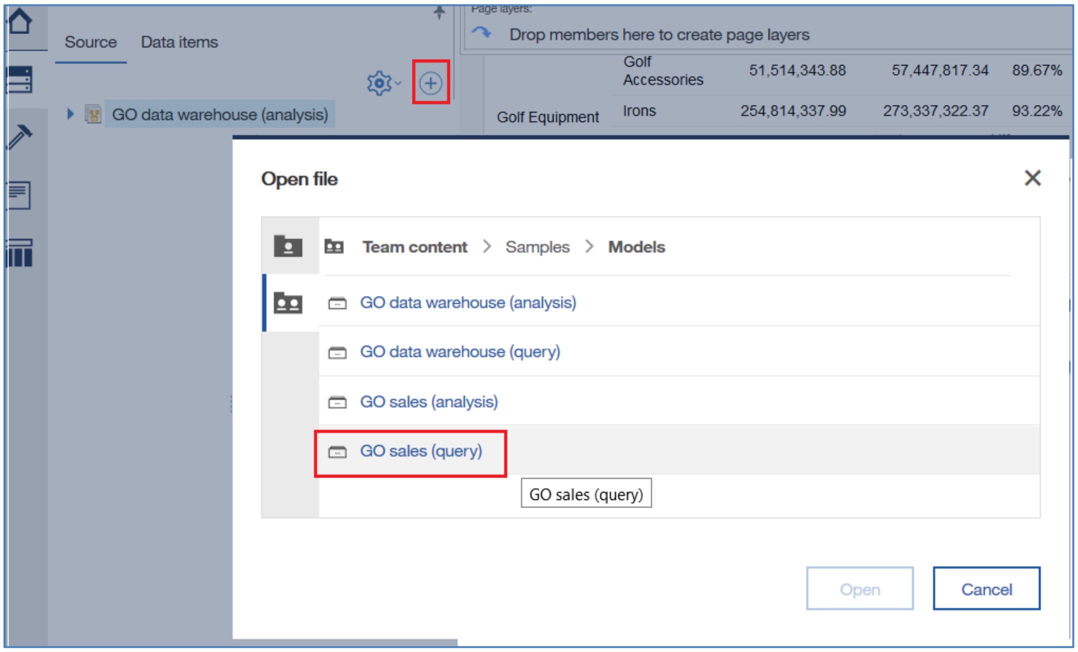


__41. **Change** the **name** in the heading to "**Yearly Product Line Revenue**" and format it to match our first data container (Arial, 18pt font, bold). Your report object will now appear as follows:



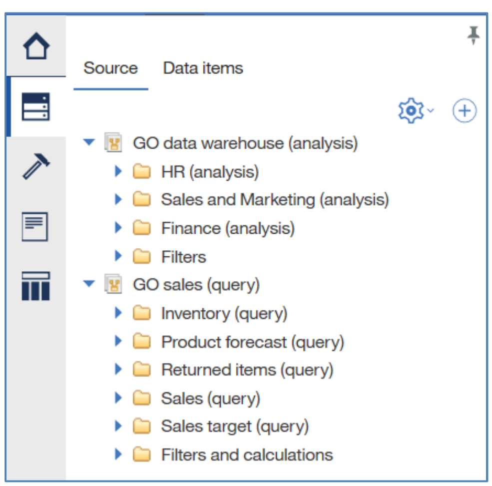
2.4 Adding a map to the report

__42. For the last report object, we'd like to add a map visualization using a relational FM package. **Click** the **Add Report data** button ⊕ on the data source panel to add another data source. **Navigate** to **Team Content>Samples>Models** and **select** the **Go Sales (Query)** FM package. **Click Open**.

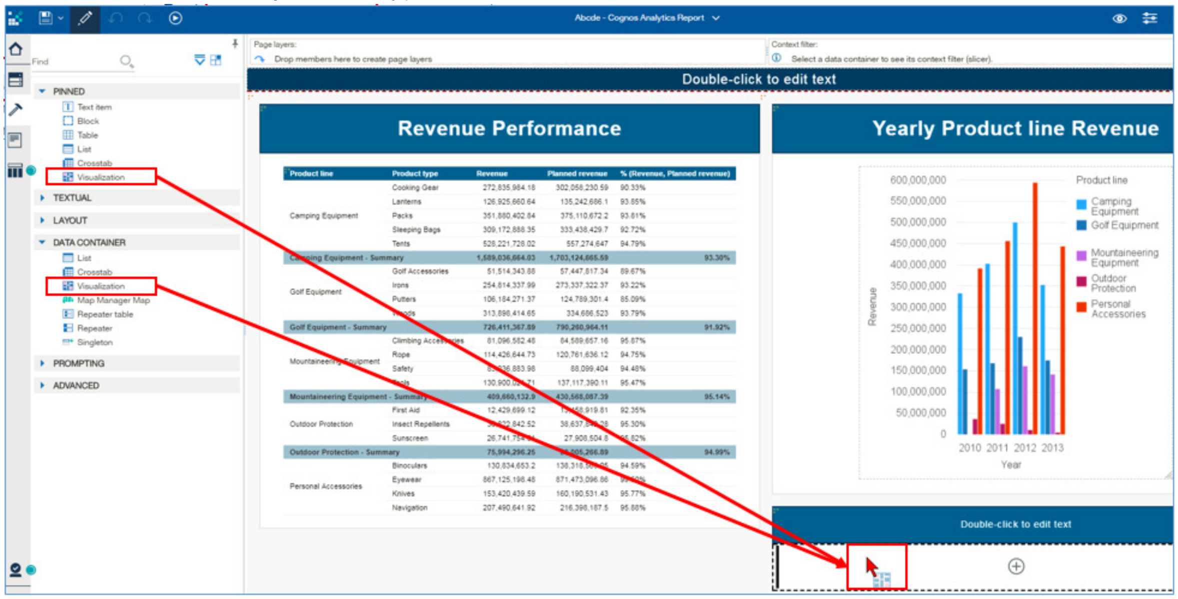


__43. When you bring a new data source into an existing report, Cognos Analytics will verify that the report will still be valid with that data source. **Click OK**

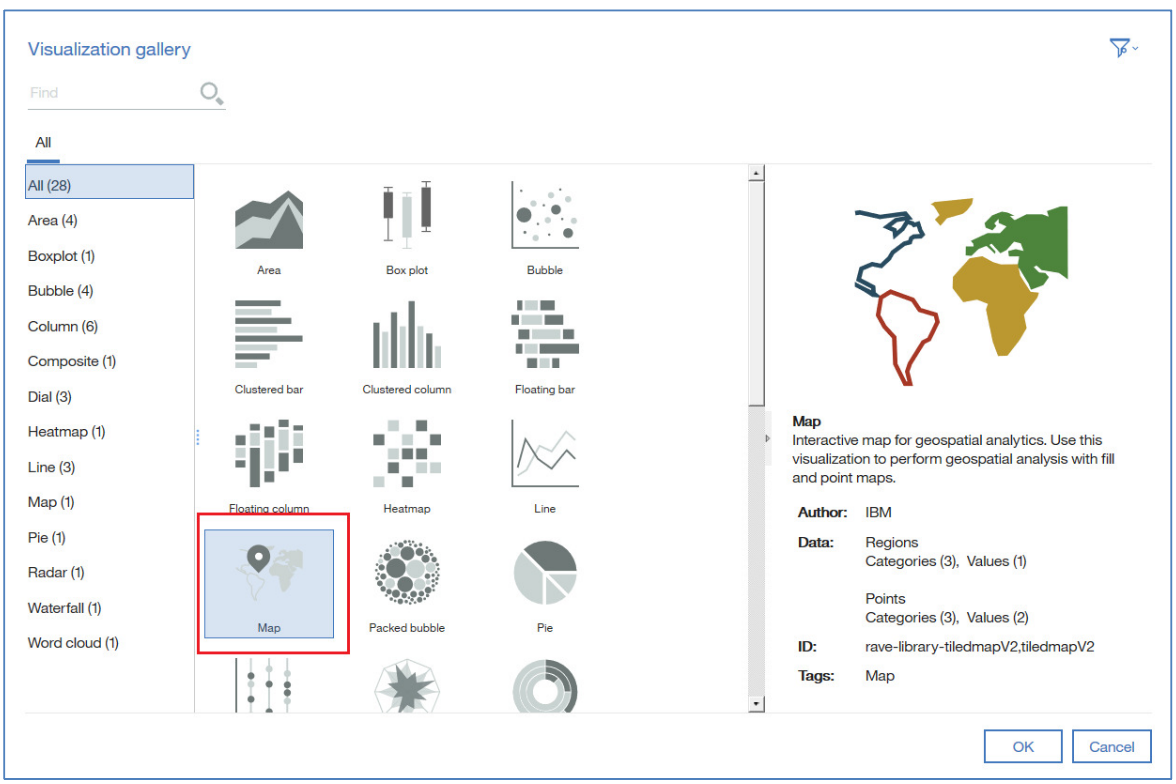
__44. Both packages are now listed under the source panel.



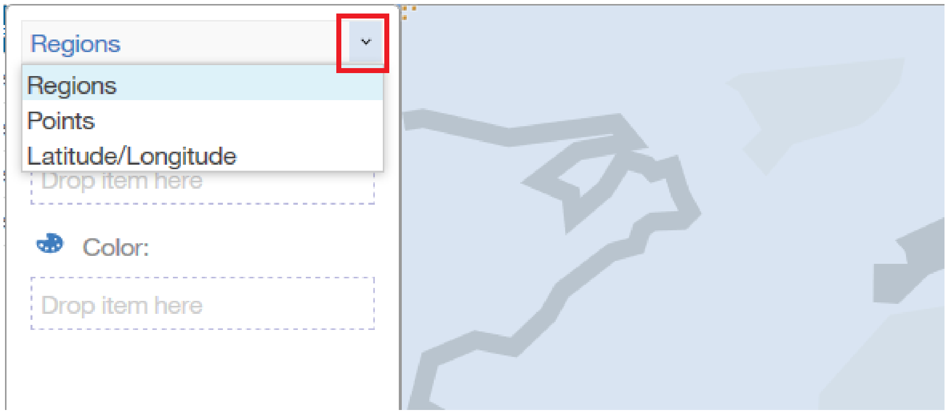
__45. From the **Tools** palette, under **Pinned** or **Data Container**, **select Visualization** and **drag** it into the last available template space on the page. (You may also use the ⊕ icon and select Visualization as we did previously).



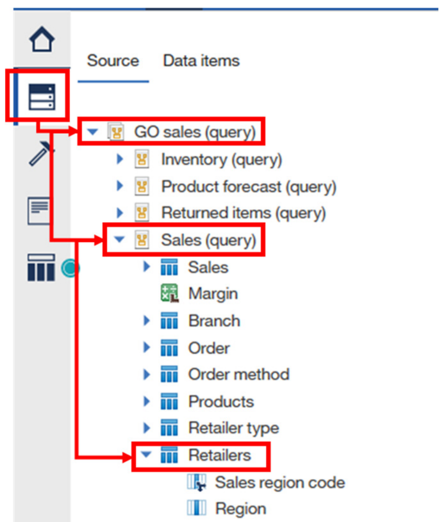
__46. **Select Map** then **click OK**



__47. You can create three layers when authoring maps in reporting: **Regions** layer, **Points** layer and **Lat**/**Long** layer. First, we'll work with Regions. **Select** the **Regions** layer using the drop-down arrow at the top of the visualization pane.



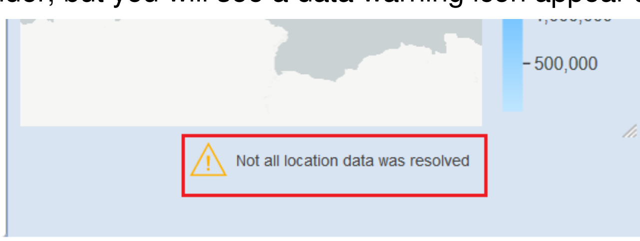
__48. **Return** to the **Data** panel. From the **Source** tab, **expand** the newly added **GO sales (query)** package, **then expand Sales (query)>Retailers**.



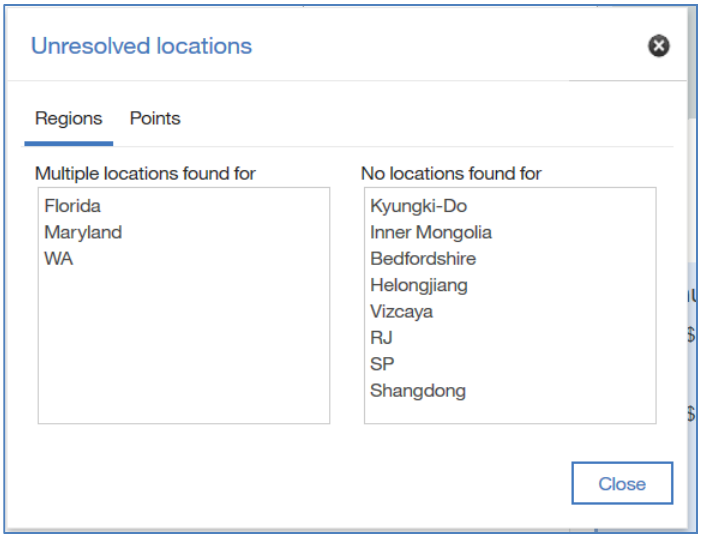
__49. **Drag Retailer Province-State** into the **Location** slot.

__50. **Expand Sales** and **drag Quantity** to **Color**.

__51. The map will render, but you will see a data warning icon appear at the bottom of the map.

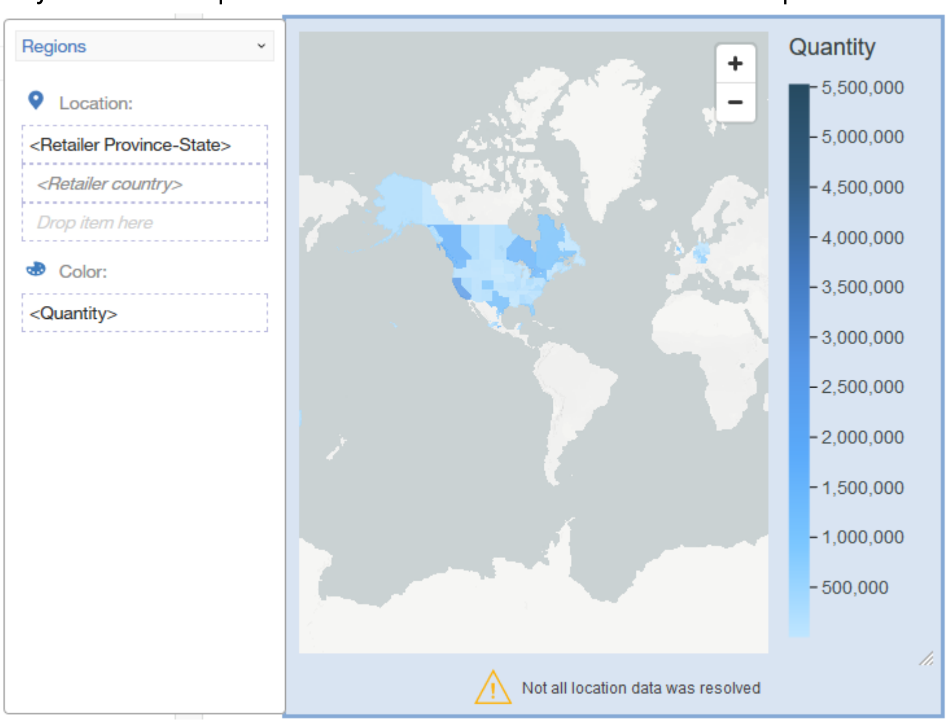


__52. **Click** on the warning icon . A dialog appears to advise users if there are locations with ambiguity (multiple locations found) and/or if there are locations not matching to known to the mapping polygons (no locations found). In this example, we see there are three data points that appear in multiple locations.

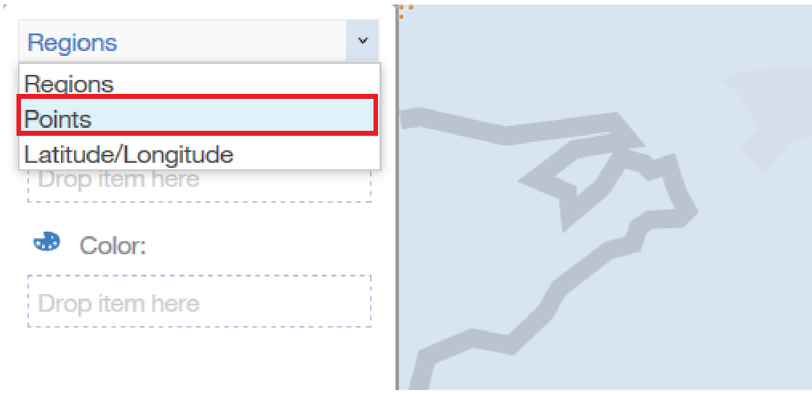


__53. **Click Close**

__54. Cognos Analytics can help resolve location ambiguity by including a clarification item in the slot next to location. **Drag Retailor country** under **Retailer Province-State** into the first clarification slot. Note you can use up to two locations as clarification items. Map slots should look like this:

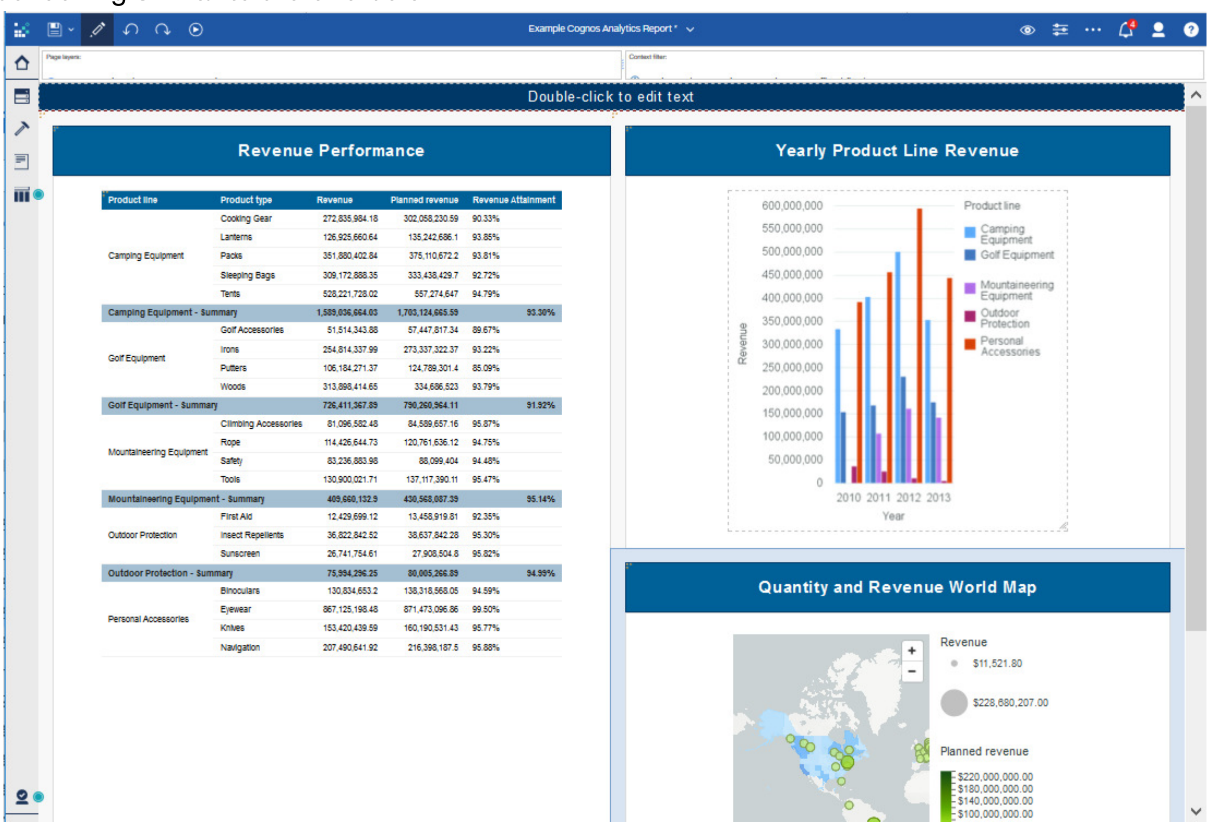


__55. Next, let's author the Points layer. From the drop-down arrow at the top of the visualization, **select Points**.

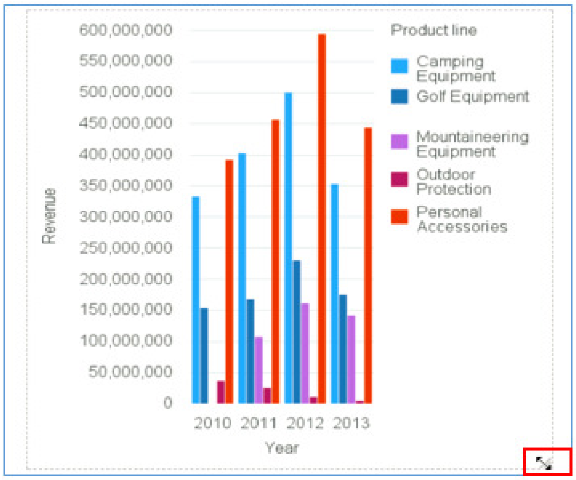


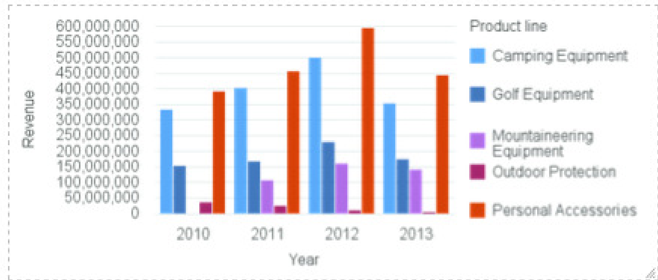
__56. From **Retailers table,** drag **Retailer site** to the **Location** slot. From the **Sales** fact table, **drag Revenue** to **Size slot** and **Planned Revenue** to **Color slot.**

__57. **Change** the **title** of the map to "**Quantity and Revenue World Map**". Your report should now be looking similar to the one below:



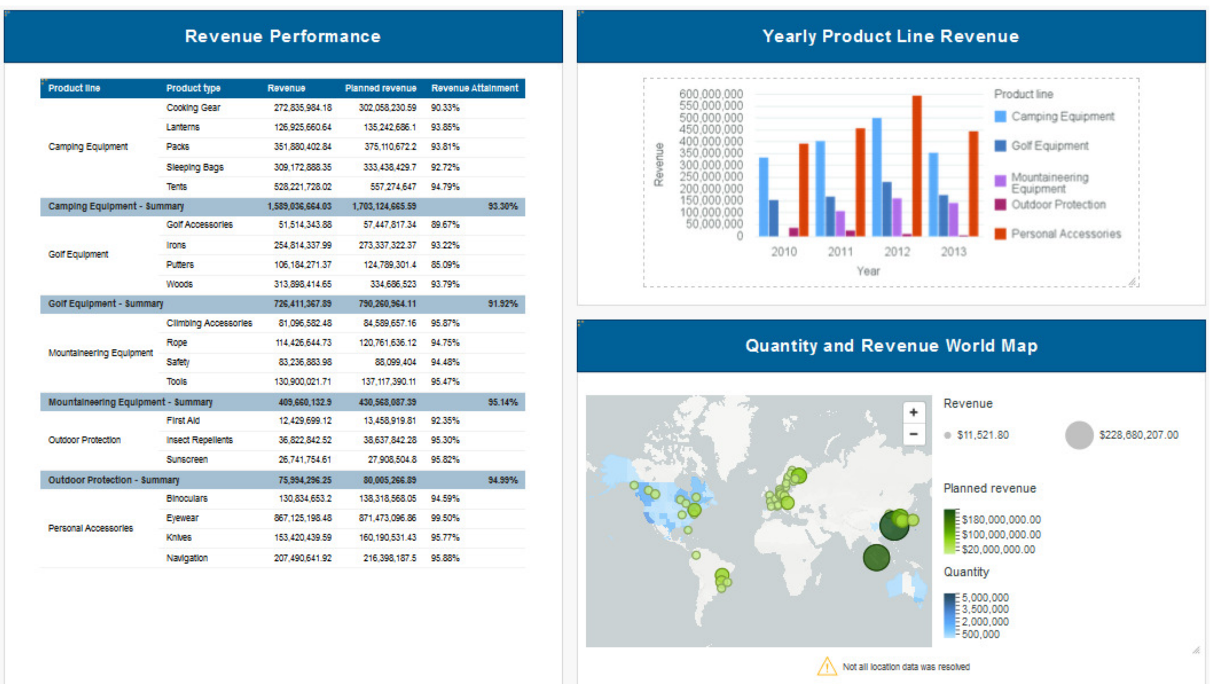
__58. We can make some adjustments by resizing the charts by dragging them into our desired position. On the clustered bar chart, place your cursor over the lower right corner. It will change to ↖↘ indicating you can drag to resize the chart. **Resize** the **chart** to reduce the height and increase the width.





__59. **Resize** the **Map** to reduce height and increase width.

__60. Your report should look similar to this:



Product line	Product type	Revenue	Planned revenue	Revenue Attainment
Camping Equipment	Cooking Gear	272,835,984.18	302,058,230.59	90.33%
	Lanterns	126,925,660.64	135,242,686.1	93.85%
	Packs	351,880,402.84	375,110,672.2	93.81%
	Sleeping Bags	309,172,888.35	333,438,429.7	92.72%
	Tents	528,221,728.02	557,274,647	94.79%
Camping Equipment - Summary		1,589,036,664.03	1,703,124,665.59	93.30%
Golf Equipment	Golf Accessories	51,514,343.88	57,447,817.34	89.67%
	Irons	254,814,337.99	273,337,322.37	93.22%
	Putters	106,184,271.37	124,789,301.4	85.09%
	Woods	313,898,414.65	334,686,523	93.79%
Golf Equipment - Summary		726,411,367.89	790,260,964.11	91.92%
Mountaineering Equipment	Climbing Accessories	81,096,582.48	84,589,657.16	95.87%
	Rope	114,426,644.73	120,761,636.12	94.75%
	Safety	83,236,883.98	88,099,404	94.48%
	Tools	130,900,021.71	137,117,390.11	95.47%
Mountaineering Equipment - Summary		409,660,132.9	430,568,087.39	95.14%
Outdoor Protection	First Aid	12,429,699.12	13,458,919.81	92.35%
	Insect Repellents	36,822,842.52	38,637,842.28	95.30%
	Sunscreen	26,741,754.61	27,908,504.8	95.82%
Outdoor Protection - Summary		75,994,296.25	80,005,266.89	94.99%
Personal Accessories	Binoculars	130,834,653.2	138,318,568.05	94.59%
	Eyewear	867,125,198.48	871,473,096.86	99.50%
	Knives	153,420,439.59	160,190,531.43	95.77%
	Navigation	207,490,641.92	216,398,187.5	95.88%

Dragging objects make approximate adjustments. For pixel perfect adjustments we can modify values in the ***Properties*** *pane. We'll look at those in the next section.*

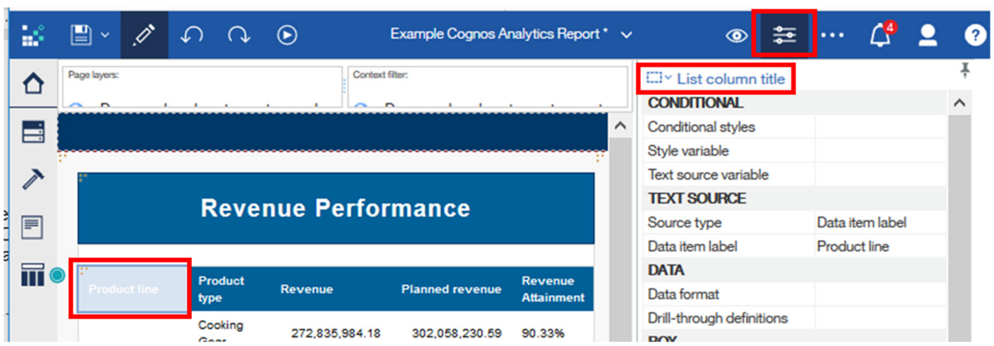
__61. Notice on the **Navigation menu** that your report name has an **asterisk (*)** behind the name. This indicates that there are unsaved changes to the report. **Click Save**.

The Authoring experience in Cognos Analytics is graduated in nature as it allows Users to quickly create self-service reports while also providing professional authors the advanced capabilities to develop pixel perfect standardized reports.

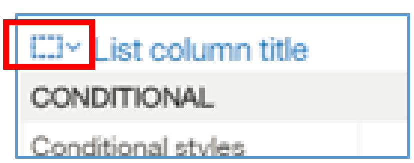
2.5 Working with Report Properties

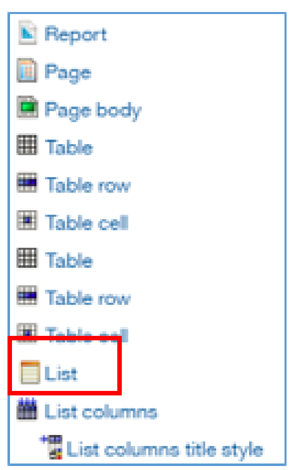
__62. Click on the **Properties** icon  on the upper right of the application toolbar. The Properties section allows the report author to create advanced, pixel perfect reports. **Click** on various sections, objects or field on the report. Notice how the Properties section updates based on the exact location you have selected on an object.

__63. Click on the **Product Line header** in the list. Notice, in the Properties pane, you have selected a List column title.

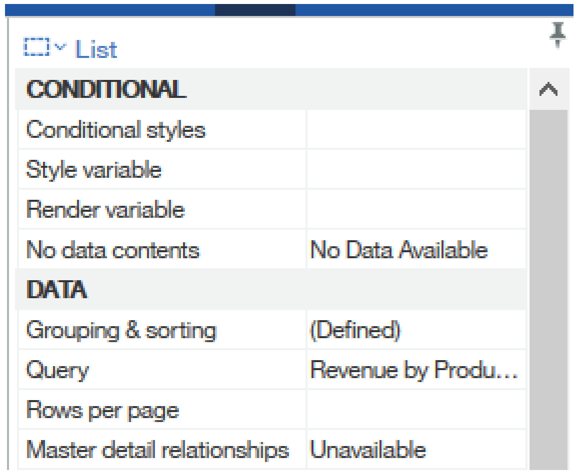


__64. In reports, objects can contain other objects. You have selected a List column title, but you want to modify the properties of the List. **Select** the **drop-down** arrow and then **select List**. This is a convenient way to select a parent container of another object on the report.

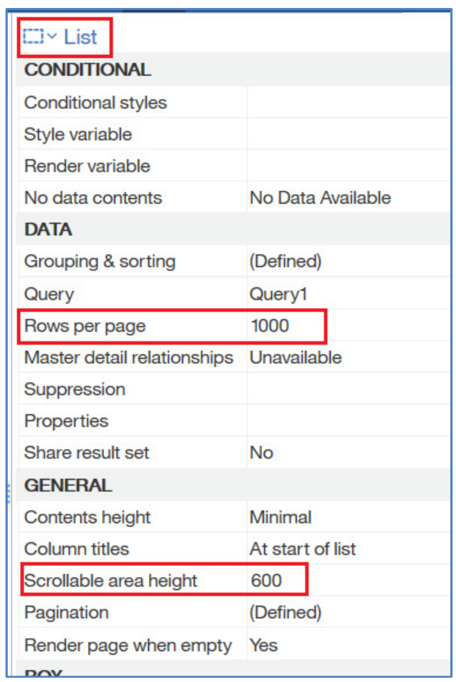




__65. The display changes to indicate you have selected the **List** object. (You could have also selected the List directly by clicking in a white space of the list).

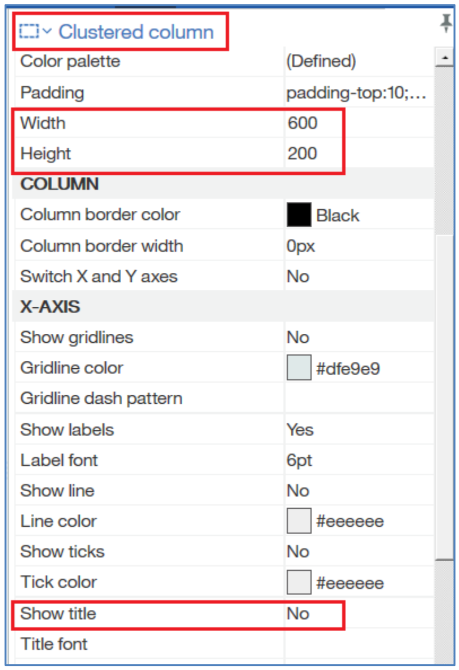


__66. **Rows per page** property will ensure all rows are returned on the same page from the database. **Scrollable area height** property freezes list column headings and fix the total height of the list object. **Scroll** down the properties list to find and modify these properties as follows:

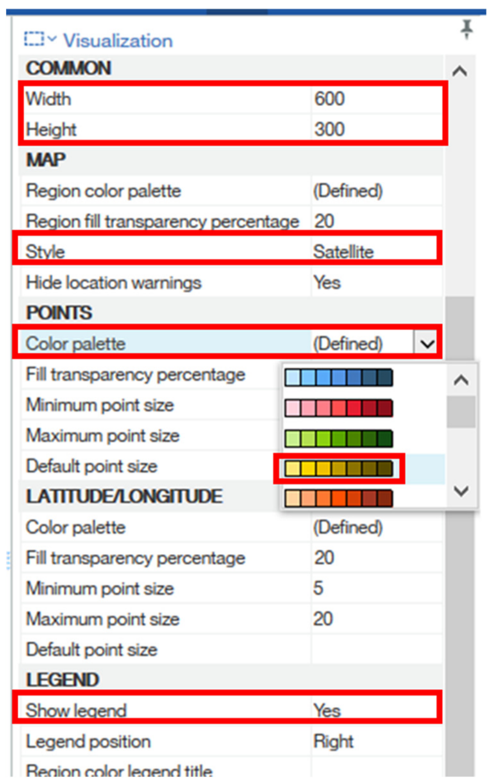


TECH TIP: *IF ALL ROWS APPEAR ON YOUR PAGE WITHOUT SCROLLING, CHANGE SCROLLABLE AREA HEIGHT TO A SMALLER VALUE TO EXPERIMENT WITH SCROLLING THE DATA.*

__**67.** **Click** on the **Column chart** to select it. Scroll down the **properties** list to find and modify the following entries:



__**68.** **Click** on the **map** to select it. Scroll down the **properties** list to find and modify the **Width, Height, Style, Show Legend**, and **set the points color palette** to use the **yellow** color palette.



__69. **Click**  to close the properties pane.

__70. Your report should look similar to the following:

Revenue Performance

Product line	Product type	Revenue	Planned revenue	Revenue Attainment
Camping Equipment	Cooking Gear	272,835,984.18	302,058,230.59	90.33%
	Lanterns	126,925,660.64	135,242,686.1	93.85%
	Packs	351,880,402.84	375,110,672.2	93.81%
	Sleeping Bags	309,172,888.35	333,438,429.7	92.72%
	Tents	528,221,728.02	557,274,647	94.79%
Camping Equipment - Summary		1,589,036,664.03	1,703,124,665.59	93.30%
Golf Equipment	Golf Accessories	51,514,343.88	57,447,817.34	89.67%
	Irons	254,814,337.99	273,337,322.37	93.22%
	Putters	106,184,271.37	124,789,301.4	85.09%
	Woods	313,898,414.65	334,686,523	93.79%
Golf Equipment - Summary		726,411,367.89	790,260,964.11	91.92%
Mountaineering Equipment	Climbing Accessories	81,096,582.48	84,589,657.16	95.87%
	Rope	114,426,644.73	120,761,636.12	94.75%
	Safety	83,236,883.98	88,099,404	94.48%
	Tools	130,900,021.71	137,117,390.11	95.47%
Mountaineering Equipment - Summary		409,660,132.9	430,568,087.39	95.14%
Outdoor Protection	First Aid	12,429,699.12	13,458,919.81	92.35%
	Insect Repellents	36,822,842.52	38,637,842.28	95.30%
	Sunscreen	26,741,754.61	27,908,504.8	95.82%
Outdoor Protection - Summary		75,994,296.25	80,005,266.89	94.99%
	Binoculars	130,834,653.2	138,318,568.05	94.59%
Overall - Summary		4,686,775,768.85	4,919,342,361.94	95.27%

__71. **Click** the **Edit** icon  to exit authoring mode.

__72. **Hover** your mouse over the map. Use the **scroll button** on your mouse to **zoom in** and **out** on map. You may also use the **+/-** buttons on the map to zoom.

__73. **Save** your report.

With Cognos Analytics, Users are no longer selecting tools in which to build content. This eliminates the confusion around which tool is best for report building. The new Cognos Analytics Authoring experience may be made available to all users as governed by the User's Permissions set by your Administrator.

Workshop 3 Advanced Report Settings

Workshop Duration: *25 minutes*

Audience: Consumers and Report Author

Capabilities: Report Authoring Interface

Prerequisite Workshop(s): None

In this Workshop, you will:

- Work with My Parameters
- Use the Interactive Filtering Panel
- Use the Interactive Performance Assistant

Now that you're satisfied that Users should be able to create reports themselves, you need to address some issues that concern the IT staff. When we create reports for the Users, we often include prompts, for example, for Product Line or Years. This makes it easier for a generalized report to be used by many different groups to focus in on the areas they support.

However, in other reporting solutions there is no way for Users to easily pre-set filters for their personal needs. They complain that they either have to re-enter their prompt values every time they run a report, or save a separate version of a report just for themselves. This creates massive numbers of reports on the system which quickly get out of date. Cognos Analytics lets the IT staff pre-set standardized report prompts, which Users can then set once and have them automatically apply.

Additionally, when Users run reports and filter them dynamically, they've complained they have to look in several areas to see what filters they've dynamically applied. The new Interactive Filtering Pane, addresses that complaint.

Another issue IT has to deal with on a regular is reports that seem to run very slowly, especially if end-users are writing them, since they often don't understand how the queries run. Figuring out which report part is running slowly is often a tedious task. Cognos Analytics Performance Assistant will let you easily run a report that identifies how long each portion of the report takes to execute the query and render the output. This makes it much easier and faster to isolate problem report sections so that you can examine and correct any performance issues.

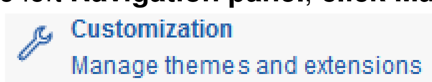
3.1 My Parameters

A global parameter is specified at the ***system*** *level, and can be applied across all reports within the application that use the data it refers to. For example, if most of your company's reports are filtered by Department, you can create a global parameter for Department. Taking it one step further, you can assign specific values (e.g. Finance, Accounting, HR, etc.) to the Department global parameter to specific user Roles. In this way, your users will automatically generate reports that are relevant to them.*

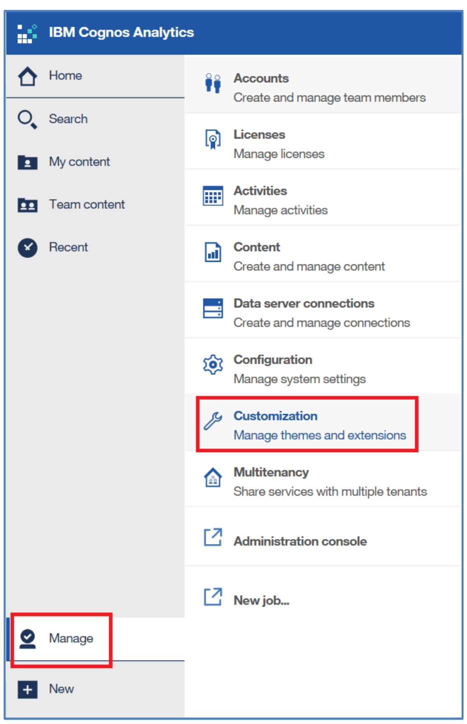
You can add prompts to a report to add interactivity for users. Prompts act as questions that help users to customize the information in a report to suit their own needs. For example, you create a prompt so that users can select a product type. Only products belonging to the selected product type are retrieved and shown in the report.

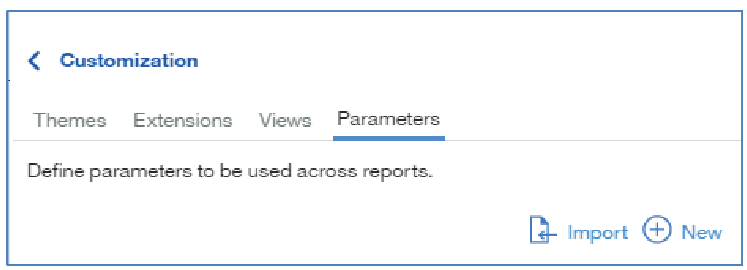
Prompts are composed of three interrelated components: ***parameters***, ***prompt controls***, *and* ***parameter values***. *Parameters are based on parameterized filters and form the questions to ask users. Prompt controls provide the user interface in which the questions are asked. Parameter values provide the answers to the questions.*

__1. First you will need to create at least one global parameter for your IBM Cognos Analytics environment. From the left **Navigation panel**, **click Manage** and select **Customization.**



__2. **Click** the **Parameters** tab.



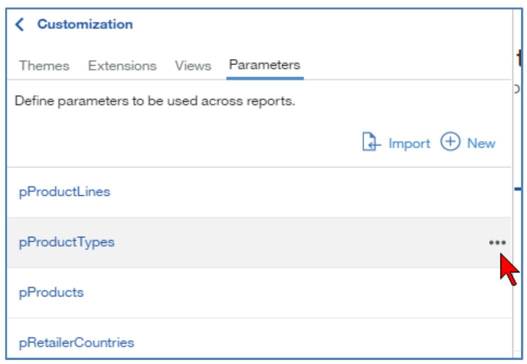


TECH TIP: YOU CAN DIRECTLY IMPORT THE PARAMETERS CONTAINED IN AN EXISTING REPORT BY CLICKING. Import *YOU CAN ALSO CREATE PARAMETERS MANUALLY USING* New *BUT A PARAMETER REPORT IS RECOMMENDED AS MULTIPLE PARAMETERS MAY BE CREATING IN A SINGLE REPORT AND BROUGHT IN SIMULTANEOUSLY.*

__3. **Click Import** Import .

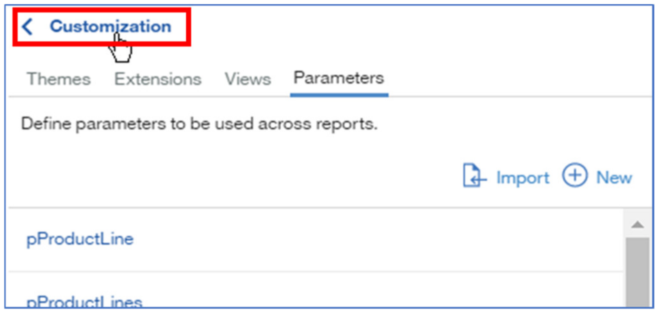
__4. Navigate to the report called **Parameter Library (Team Content>Samples>Reports)** that contains the parameters you are interested in and **click Select.** All the parameters in the report will be imported and shown in the list.

TECH TIP: *VIEW OR EDIT THE PROPERTIES OF ANY OF THE GLOBAL PARAMETERS BY CLICKING THE MORE ICON* ••• *AND SELECTING PROPERTIES.*

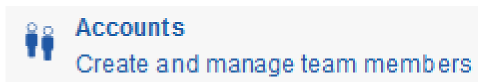


*Once you have created at least one global parameter for your Cognos environment, you can assign default values for these parameters to specific **user roles**. This way, your users within that role will not be prompted to provide values each time the report is run.*

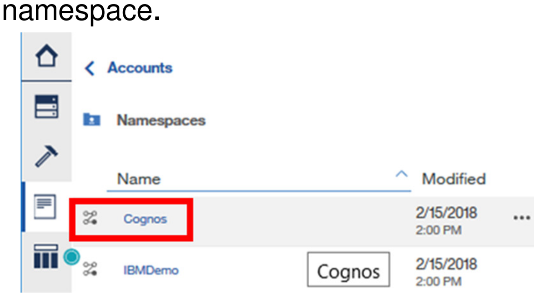
__5. **Click Customization** to return to the main **Manage** panel.



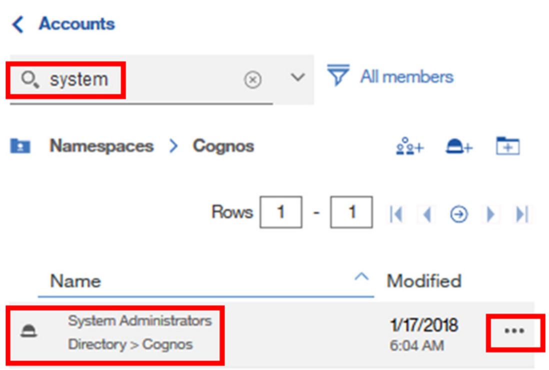
__6. **Select Accounts:**



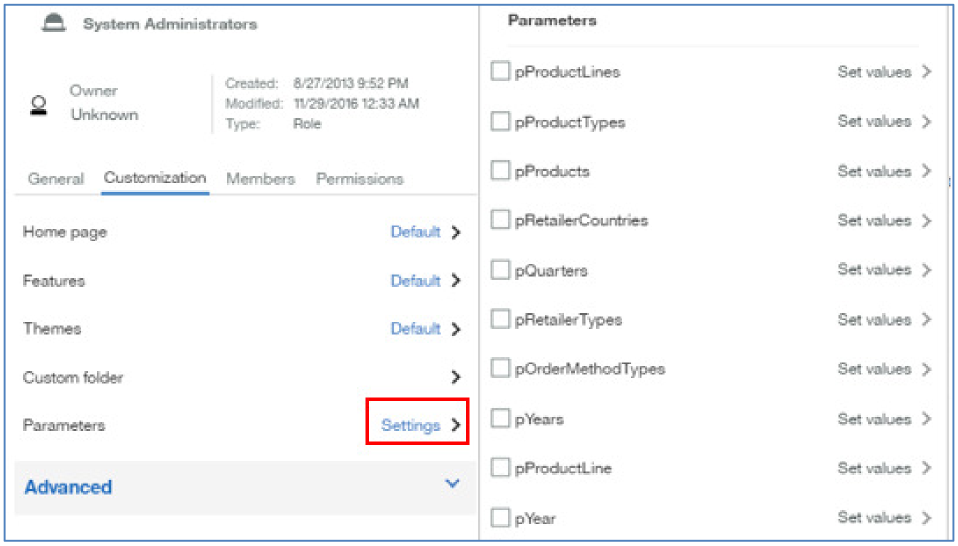
__7. **Select** the **Cognos** namespace.



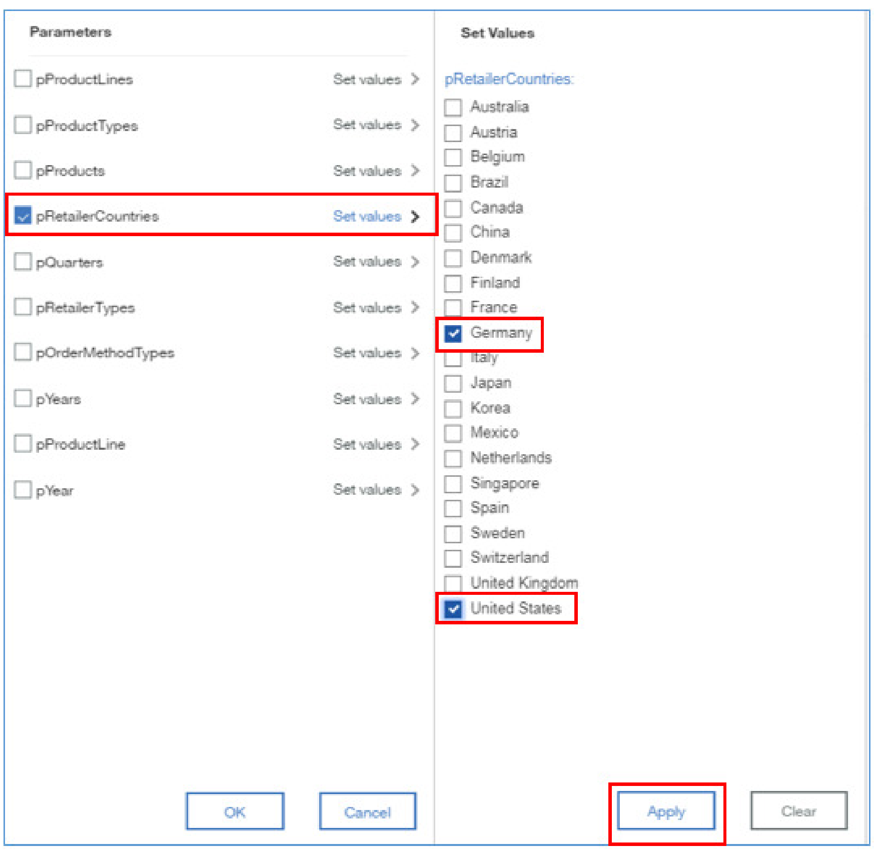
__8. **Select** the **System Administrators** role. (**Type** "**System**" in the search area to quickly find System Administrators role.) **Click** the **More** (3 ellipses) button ••• and **open Properties**.



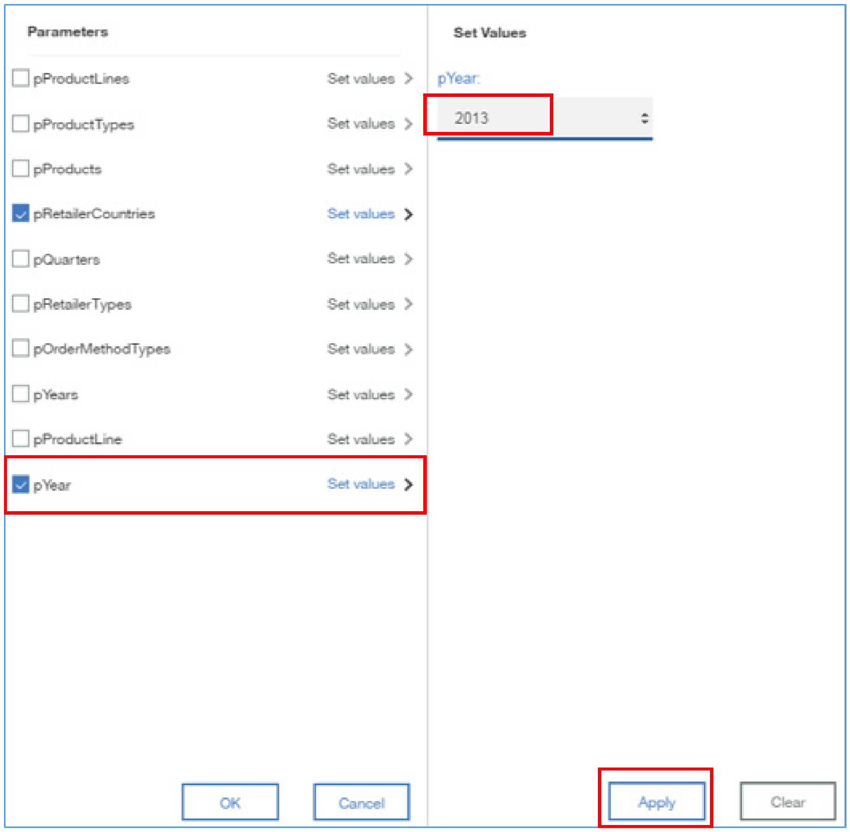
__9. **Click** the **Customization** tab. Under **Parameters**, click **Settings**.



__10. **Check** the **checkbox** beside the parameter **pRetailerCountries** and **click Set values.** Cognos Analytics automatically runs the prompt defined in the Parameter Library report to fetch the available values. **Select Germany** and **United States** then **click Apply.**

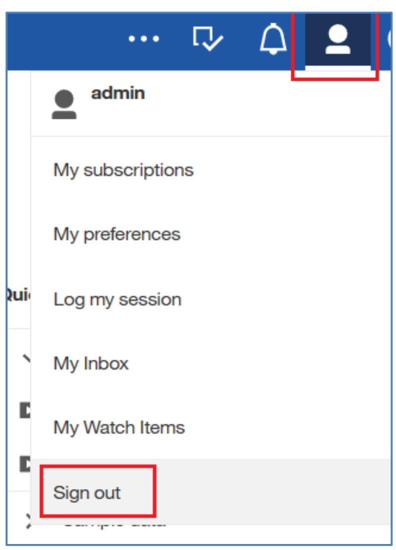


__11. **Check** the **checkbox** beside the parameter **pYear** and click **Set values**. Enter **2013** and click **Apply.**



__12. **Click OK** under the **parameter list** to save changes.

__13. **Sign out** of the system.



__39. When the login screen reappears, use the pull-down arrow next to “**Select Namespace**”. **Select IBM Demo**.

- **__a. User ID:** administrator
- __b. **Password:** IBMDem0s

__14. Now, let’s create a report using the global parameters you just imported. **Click** the **New** button on the navigation panel to **create a new report using** the default **blank template** and **Blue theme**.

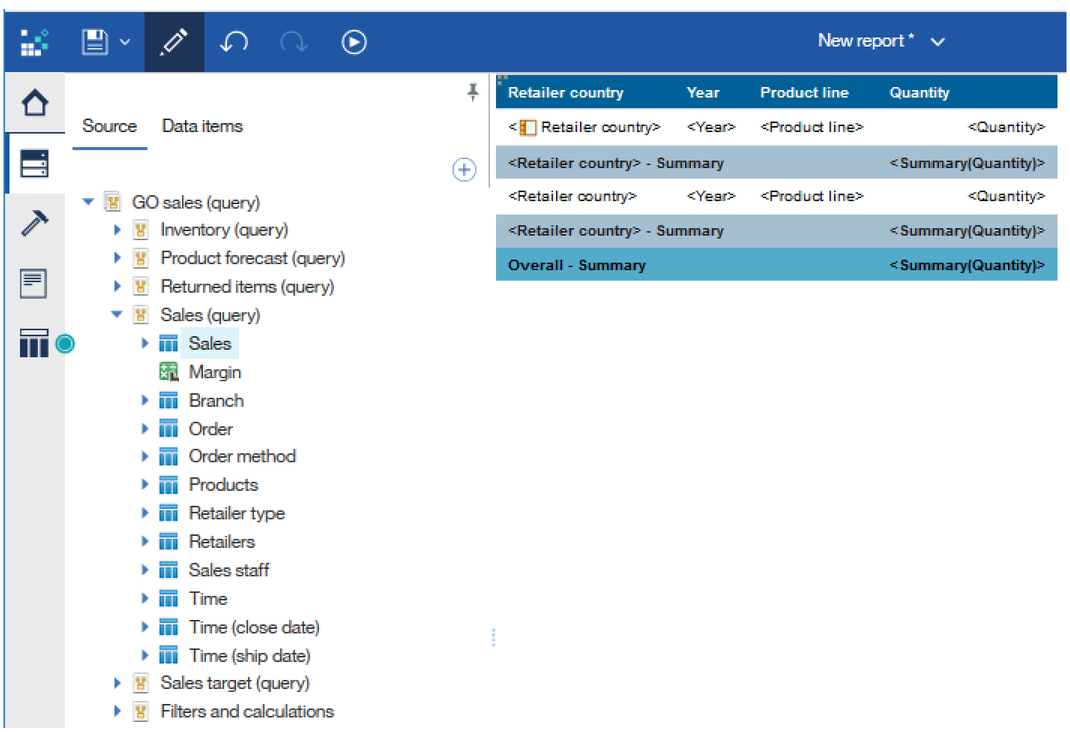
__15. **Add** the **Go sales (query)** package as the data source (**Team Content>Samples>Models**).

__16. **Use** the **Add** button to **select** a **List** report. **Set** the **name** and **query name** to “**Product Line Sales by Country**”. **Click OK.**

__17. **Create** the List report using the following data items from **Sales(query)**:

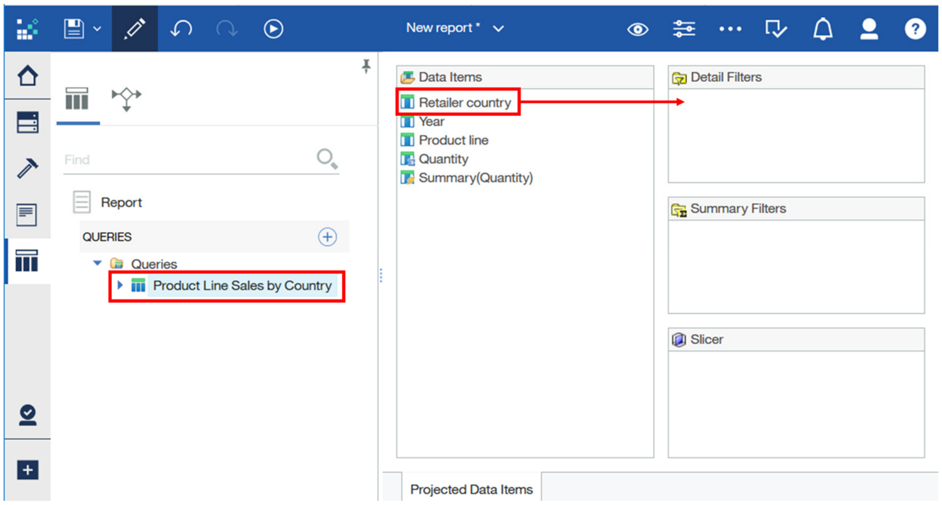
- **__a. Retailers>Retailer country**
- **__b. Time>Year**
- **__c. Products>Product Line**
- **__d. Sales>Quantity**

__18. Use the on-demand toolbar to **Group** on **Retailer country** column. (*Refer to section “2.1 Authoring New Content” in this workshop to review steps, as needed.*)

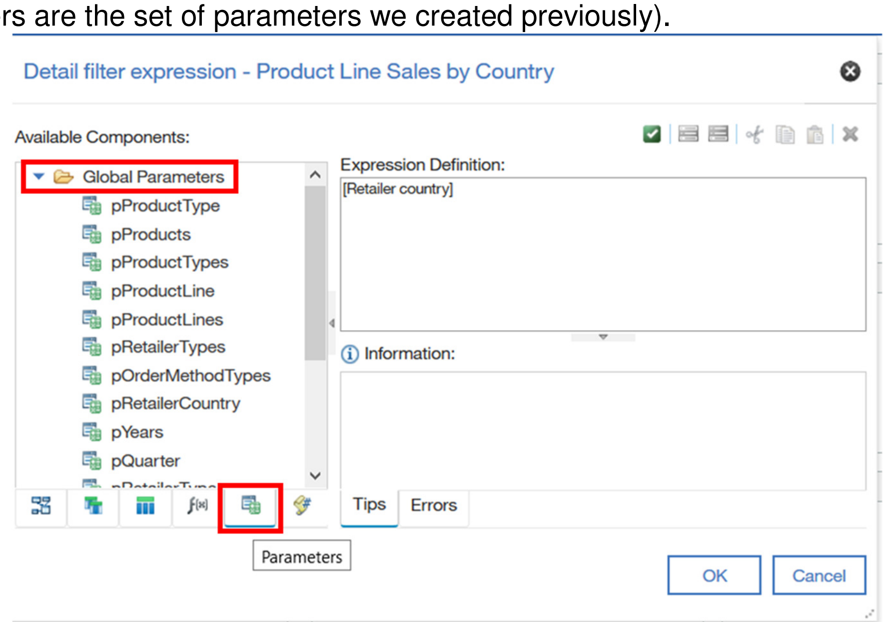


__19. **Click** the **Queries** tab in the navigation panel. **Click** on **Product Line Sales by Country**.

__20. **Drag Retailer country** to the **Detailed Filters** area to create a new filter.

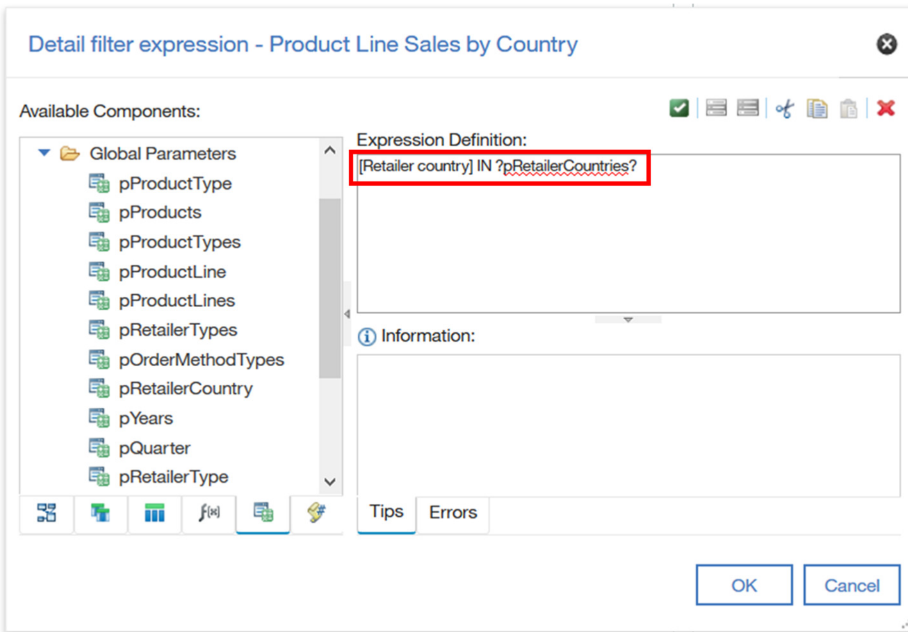


__21. A **Detail filter expression** dialog box will appear. **Select** the **Parameters** tab (second from the right) at the bottom of the dialog box and **expand** the **Global Parameters** folder. (The Global Parameters are the set of parameters we created previously).



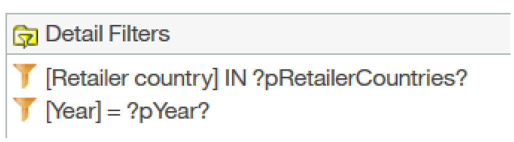
__22. In the expression dialog box, **type** "**IN** " after [Retailer country].

__23. Find **pRetailerCountries** (*not* pRetailerCountry which is also an option) under **Global Parameters** folder, and drag that after the word "IN". This creates the following expression: **[Retailer country] IN $pRetailerCountries.**



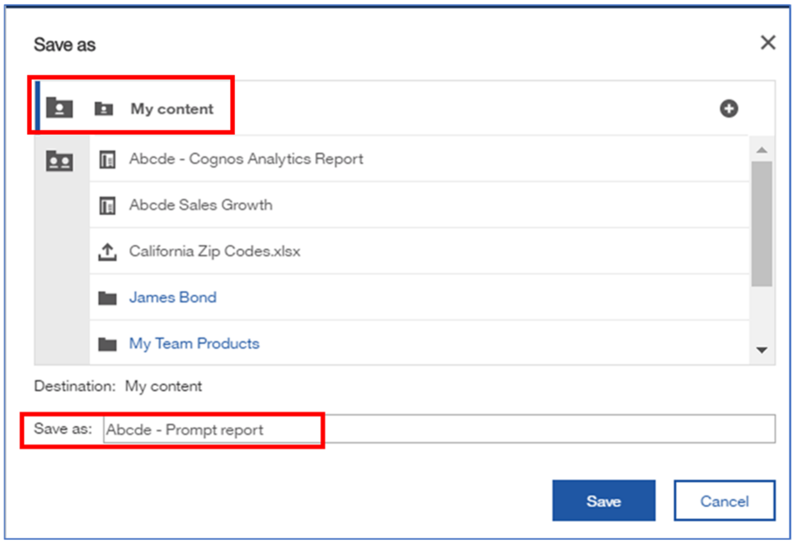
__24. **Click OK** to save the prompt filter.

__25. Repeat the preceding steps to create a **Year** filter using **pYear** (*not* pYears which is also an option) found under the **Global Parameters** folder, except use **"="** instead of "IN" in the expression. **Click OK** to save the prompt filter. Your final list of **Detail Filters** should read as follows:

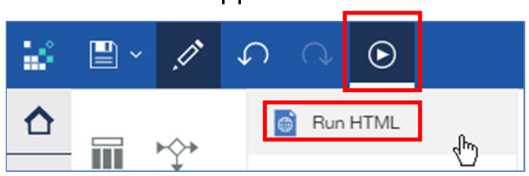


TECH TIP: USING "IN" IN THE EXPRESSION WILL PROMPT FOR MULTIPLE VALUES. USING "=" WILL ONLY ACCEPT A SINGLE VALUE. THE "IN" EXPRESSION IS NOT CASE SENSITIVE.

__26. **Save** the report to **My Content** as **"[Your Last Name] - Prompt report**".



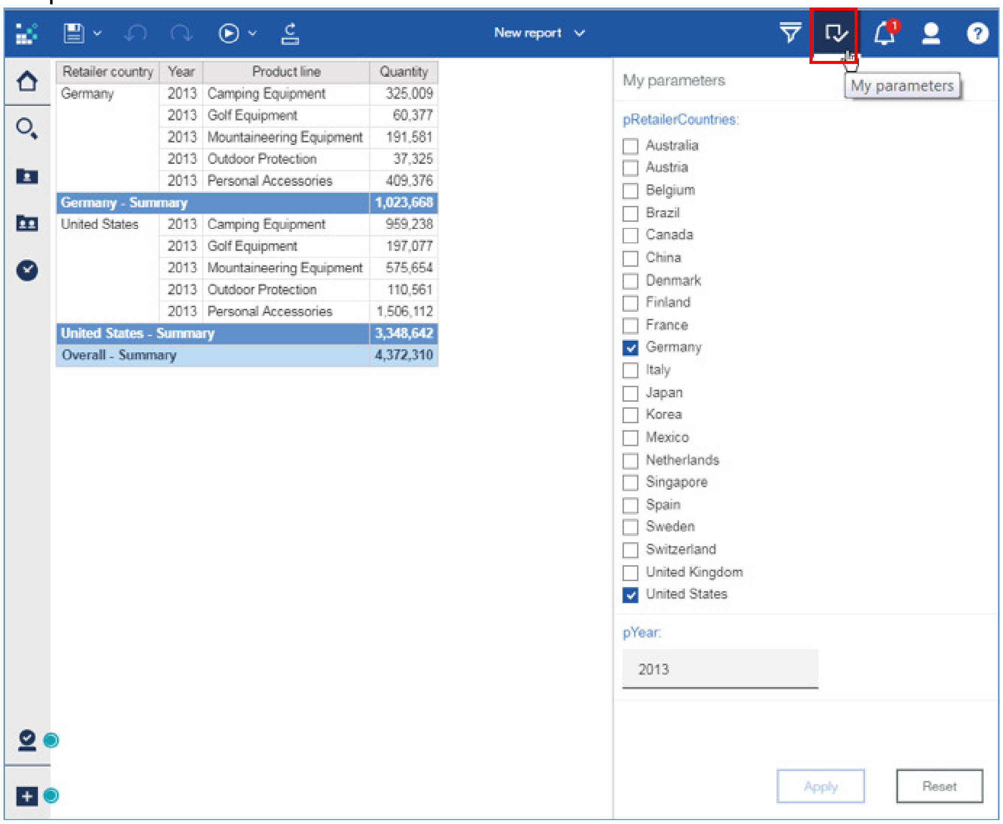
__27. Use the **Run Options** button from the application toolbar to run the report. **Select** "**Run HTML**".



__28. The report will render with the defined parameter values being applied automatically.

Retailer country	Year	Product line	Quantity
Germany	2013	Camping Equipment	325,009
	2013	Golf Equipment	60,377
	2013	Mountaineering Equipment	191,581
	2013	Outdoor Protection	37,325
	2013	Personal Accessories	409,376
Germany - Summary			**1,023,668**
United States	2013	Camping Equipment	959,238
	2013	Golf Equipment	197,077
	2013	Mountaineering Equipment	575,654
	2013	Outdoor Protection	110,561
	2013	Personal Accessories	1,506,112
United States - Summary			**3,348,642**
Overall - Summary			**4,372,310**

__29. Report users can modify the default parameter values and have the report reflect changes by using the My parameter panel. **Click** on the **My Parameters** icon to open. If the User (in this case Admin) changes any of the My Parameter values, they only change for the User making the change and will be retained across sessions. If the User wants to reset the parameter values back to those assigned to the System Administrator role, they may **click Reset** to restore the original parameters set for their role.



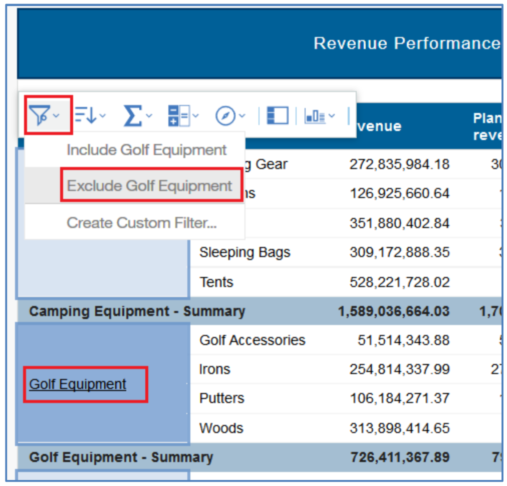
__30. **Click** on **My Parameters** icon again to close the panel.

3.2 Interactive Filtering Panel

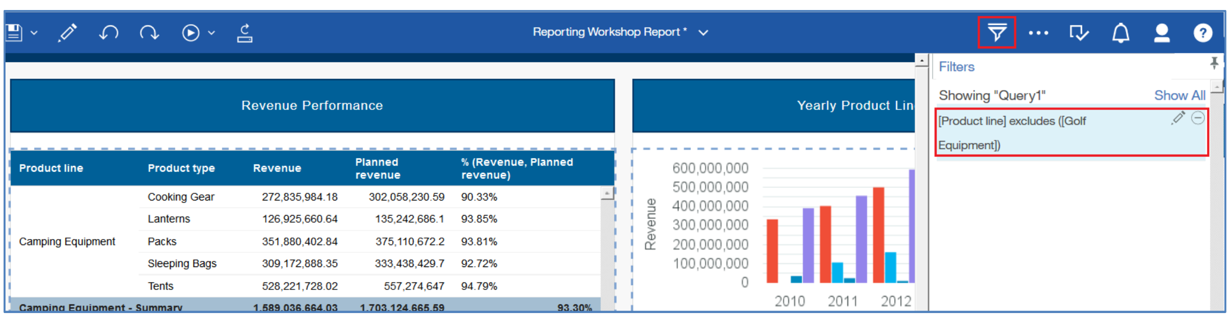
The Filter panel helps report users to manage all filters applied to a report interactively. This also helps users to better understand the report context and modify views accordingly

__31. **Click** on the **My Content** icon  on the Navigation bar on the left. **Open** the report you created from Workshop 2 (**[Last Name] Cognos Analytics Report**).

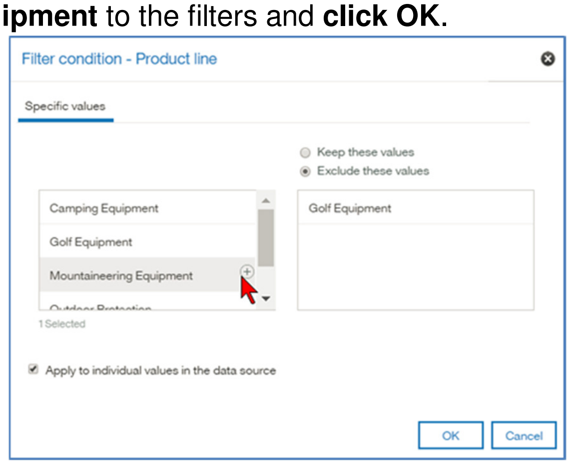
__32. **Click** on **Golf Equipment** in the **List** column to select it. From the on-demand toolbar, use the **Filter** icon's drop down menu to create a filter to exclude **Golf Equipment**.



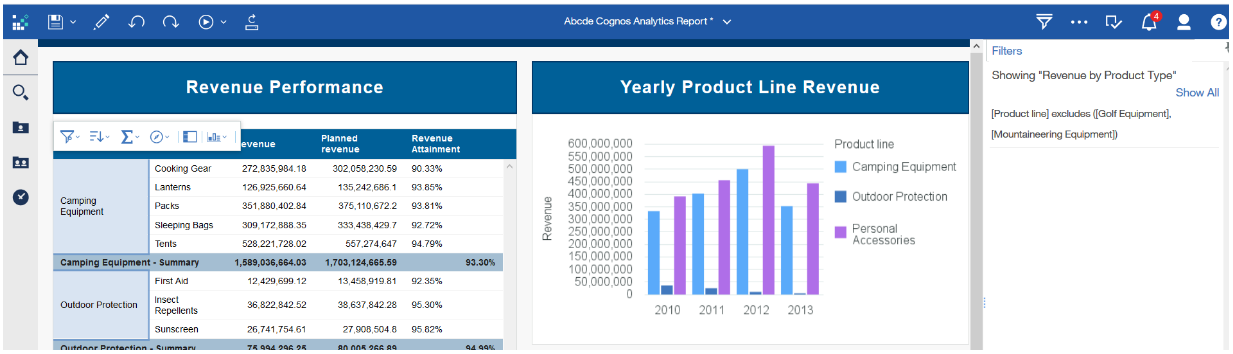
__33. The report will update no longer showing Golf Equipment. **Click** the **Filter** icon on the upper right of the application bar to open interactive filter panel. You will find the filter we just created from the step above listed here. **Click** on the **filter** in this panel. The report automatically highlights both List and Column charts with dotted blue lines. This indicates both objects are applying this filter.



__34. **Click** on the **Pencil** icon beside the filter to launch filter dialog and **select** another value to exclude by clicking the Add button. You can also click the **Remove** icon to delete this filter. **Add Mountaineering Equipment** to the filters and **click OK**.



__35. Your report will rerun and now excludes both Product Line filters applied. Both show in the filters panel.



__36. **Click** on the **filter** icon again to close the panel.

__37. **Click** the **Undo** icon on the application toolbar, and the last filter (Mountaineering Equipment) will be removed.

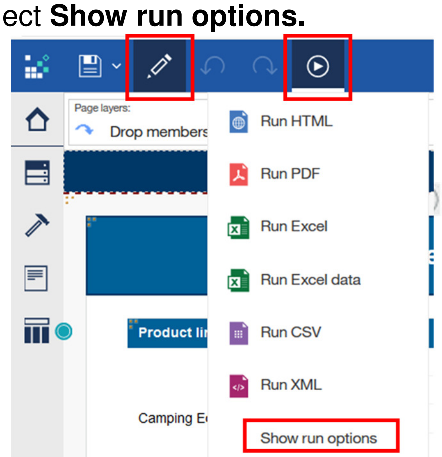
__38. **Save** the report.

3.3 Interactive Performance Assistant

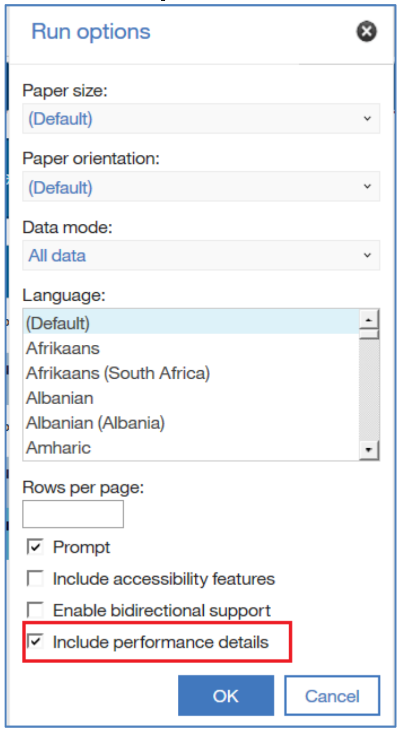
The Interactive Performance Assistant (IPA) feature in Cognos Analytics is designed for authors who wish to interactively view the performance of their reports. You can set up Performance Assistant to show querying/rendering performance on report objects.

__39. Click on **Edit** to open report in Edit mode.

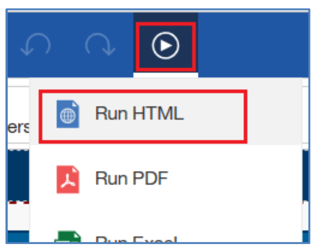
__40. **Click** the **Run** icon and select **Show run options.**



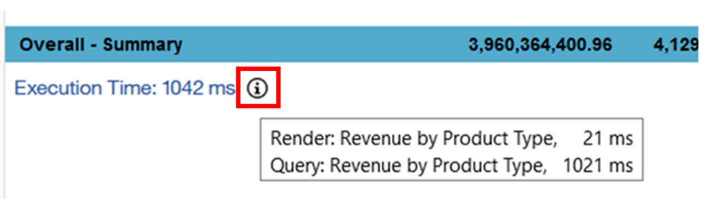
__41. **Check** the **checkbox** to enable '**Include performance details**' and **click OK.**



__42. **Click** the **Run** icon and **select Run HTML** format.



__43. The report will run and render a separate browser tab. Notice that the report now has an "Execution Time" below each report object. **Hover** over the ⓘ under the **List** object to example Rendering and Query time. Do the same for the **Column** chart.



__44. Write down the times for each. We will use these as a comparison point in the next step.

TECH TIP:* *MAPBOX® MAPS DO NOT SHOW RENDERING AND QUERY TIME.

__45. **Click** the **run** button again to re-execute the report.

__46. **Compare** the performance information for the **List** and the **Column** chart against the previous run times you noted. Query time has reduced significantly.

TECH TIP: THIS IS A GOOD WAY TO CONFIRM IF QUERY REUSE IS IN PLACE. WHEN QUERY REUSE IS TURNED ON AND YOU RUN A REPORT FOR THE FIRST TIME, THE QUERY IS STORED IN THE CACHE OF YOUR CURRENT SESSION AND REUSED THE NEXT TIME YOU RUN THE REPORT. THE QUERIES ARE KEPT IN THE CACHE FOR EACH USER. THE CACHE IS CLEARED WHEN THE REPORT CONSUMER EXITS THE REPORTING TOOL AND RETURNS TO THE PORTAL OR WHEN THE REPORT SERVER TIMES OUT THE SESSION, TYPICALLY AFTER FIVE MINUTES OF INACTIVITY.

THE FIRST TIME THE REPORT IS RUN AND THE CACHE IS CREATED, THE RESPONSE TIME MAY BE SLIGHTLY NEGATIVELY IMPACTED. THE PERFORMANCE IMPROVEMENT IS REALIZED BY THE REPORT CONSUMER ON EACH SUBSEQUENT REPORT EXECUTION, WHEN THE RESPONSE TIME IS IMPROVED BY AS MUCH AS 80%. THIS PERFORMANCE IMPROVEMENT OCCURS BECAUSE THE REPORT DOES NOT HAVE TO RE-QUERY THE DATABASE. IN ADDITION TO THIS, REDUCED QUERIES TO THE DATABASE YIELDS IMPROVED OVERALL SYSTEM PERFORMANCE, WHICH POSITIVELY IMPACTS ALL USERS.

This has been a very exciting exercise. You've been able to successfully complete all evaluations for end users and advanced authors' ability to write reports in Cognos Analytics. You may see that many users will develop dashboards for their personal use, but on those occasions when they find insight they want to share widely and regularly across their departments, reporting provides them with all the capabilities to do so. Additionally, your IT staff will be able to monitor, test, and improve their reports if they need to go enterprise wide.

Cognos Analytics will also address those ease of use complaints you've had in the past regarding filtering and customizing. And, Users don't have to open several different applications to perform that work, it is all in one central interface, the same they use for creating their dashboards. Excellent!

Thank you for attending this Cognos Analytics Workshop!!

We hope you enjoyed your time with us today and are excited to continue working with Cognos Analytics.

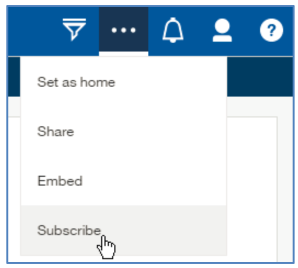
If you are interested in additional workshops and formal training, please reach out to your IBM Sales or Tech Sales Representative or your IBM Business Partners.

Appendix A: Managing Subscriptions

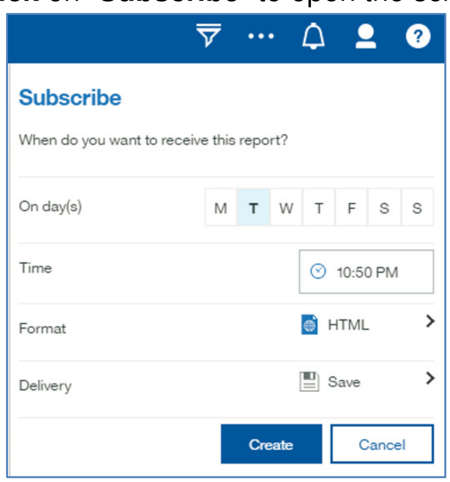
__1. **Open** your saved report **"[Last Name] Sales Growth**".

__2. With the report open on the canvas, the **More** button presents options to set that the report as home or to subscribe to the report.

__3. The "**Set as Home**" capability allows the User to select the current report to render on their home page when they sign in to Cognos Analytics. It replaces the white welcome screen you see in the workshop environment we are using today. Both Reports and dashboards may be set as home pages.



__4. Users have the ability to subscribe to content and personalize the delivery schedule, frequency and format of subscriptions. **Click** on "**Subscribe**" to open the scheduler.

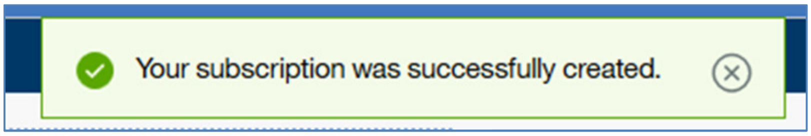


__5. In the subscribe window, the User may set up their scheduling preferences for Days, Time, Delivery Format and Delivery method. **For "On Day(s)" select** all **weekdays**. For **Time**, **Set** to **2-3 minutes ahead** of the time shown. (It renders the time that the window was opened. For this environment, it uses the Cloud server time so it will not reflect our current time zone).

__6. **Click** the **arrow** to the right of **Format** to see the output options available. **Select HTML** and **Click Done**.

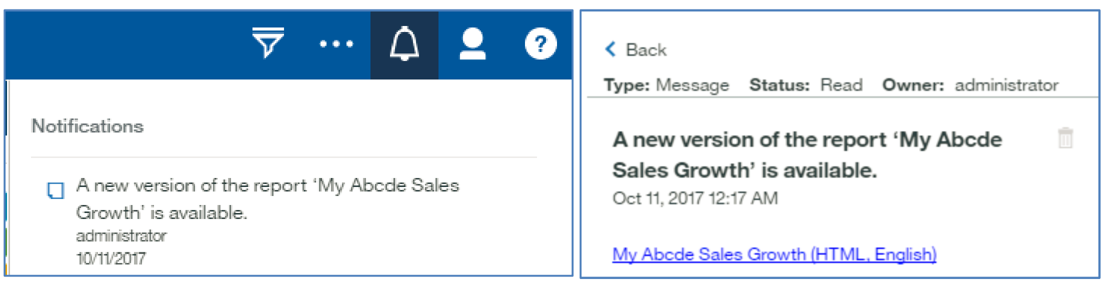
__7. **Click** the **arrow** to the right of **Delivery** to select your delivery option. You may either have the report sent to you via email, print the report or save the report on the system**. Select "Save the report**". **Click Done.**

__8. **Click Create**. You will receive a confirmation message of the subscription just below the navigation menu.

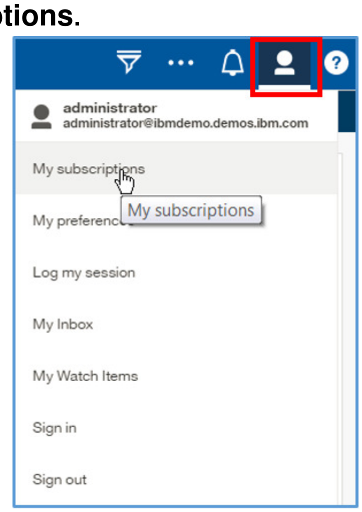


__9. Once subscribed, Cognos Analytics will alert the User under **Notifications** as each subscription is available. The number of Alerts on the Notifications button indicates the number of unread notifications. (Yours will appear shortly since we set it for just a few minutes in the future.)

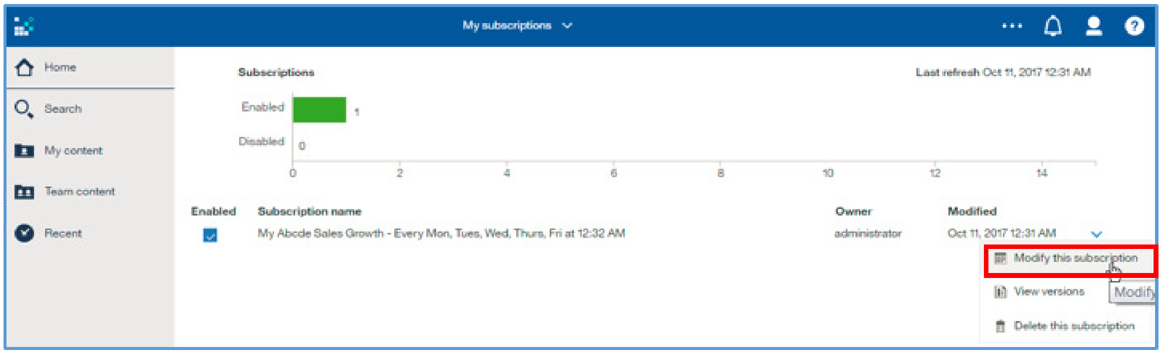
__10. Once you see the alert appear on your Notifications**, Click** on the **Notifications** button to open the **Notifications panel.** You will now see your report at the top of the list. **Click** on the report to open the detail. Click outside the panel to close.



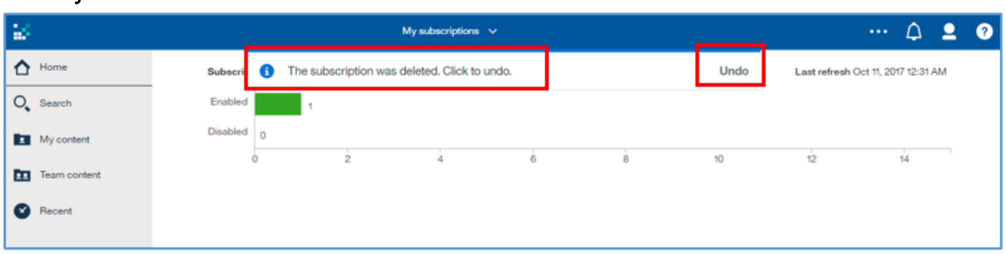
__11. Over time, Users may wish to modify their subscriptions. To do so, **click** on your **Personal Menu** and select **My Subscriptions**.



__12. The **My Subscriptions Panel** Opens and shows a complete listing of all subscriptions belonging to the User. The User may now see a list of subscriptions, whether or not they are enabled, the Owner and when it was last modified. **Click** on the **down arrow** next to a subscription to see additional capabilities. **Click** on the “**Modify this subscription**” and “**View Versions**” to open the panels.



__13. Users may easily enable/disable subscription schedules by using the check boxes next to each subscription. If a User no longer needs a subscription, it may be deleted. **Click** on the **down arrow** next you’re your report and select “**Delete this subscription**”. A confirmation message will appear under the navigation menu at the top center of the screen. You have a few seconds, while the message appears to Undo your deletion, after that, the subscription is deleted permanently.



CAUTION: BE VERY CAREFUL WHEN DELETING SUBSCRIPTIONS AS THERE IS NO WARNING MESSAGE CONFIRMING THE REQUEST FOR DELETION.

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