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Asset DB Report Editor User Manual

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2 What is Report Editor?

Asset DB Report Editor is a software tool that has been developed to work directly with Asset DB Analyst and Architect. Within the Report Editor module, standard Asset DB system reports (including Print Assessment Summary, Moves and Changes and Future State Proposal) can be generated and edited to meet specific user requirements such as data filters, content, and visual styles.

Users can also create new reports to show text, charts and graphs depicting all aspects of the data from their project.

3 Getting Started

The starting point for running, creating or editing reports using Asset DB Report Editor is an Asset DB project representing an existing printing environment. Before continuing you should ensure you have read the Asset DB Auditor and Analyst manuals and are familiar with their contents.

3.1 Capturing and Understanding the Existing Environment

Before you are able to run or amend reports you must first capture comprehensive data for your current fleet and where possible for your solution design.

For System reports this could also include capturing average monthly volumes, running a TCO calculation and running a Green Analysis for the current state, and adding product cost data and running a Green Analysis for the future state.

For reports that you may wish to create or amend, the data you collect should reflect the data you wish to appear in your report.

Details of the above mentioned processes can be found in the Asset DB Auditor, Analyst and Architect manuals. Therefore the rest of this manual will assume a full understanding of this.

3.2 Running a System Report

The processes to run an existing System Report such as the Print Assessment Summary Report, Moves and Changes Report or Future State Proposal Report are covered in the Asset DB Analyst Manual. The rest of this manual will assume an understanding of that process.



4 Creating a New Report

To create a new report you should first open the report management window by selecting Reports>Design>Manage. Once the window is opened click the New button to create the report. This will produce the New Report window shown in Figure 1.

Here you will be able to give your new report a name, a title and select a Report Style from the drop-down. The Name of the report will be how the report is identifiable within your list of reports. This name will not appear in the final report produced. The Report Title is the name that will appear in the Header on each page of your report. The title of the report and the report's name may be different.

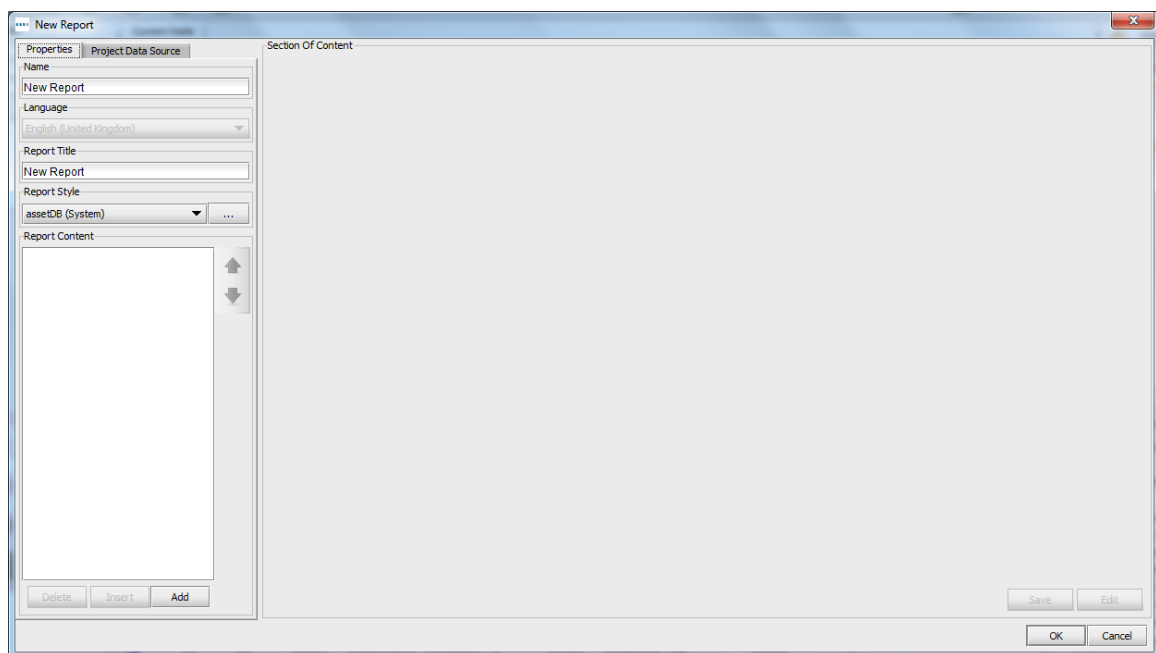


Figure 1. The New Report window

The next stage in creating a report is to select the Report Style. By default this will be set to the Asset DB (System) Style but this can be changed to a personalised Style using the drop-downs. Styles can be created or edited using the methods explained in Section 6.

The final stage in setting up a new report is to set the Project Data Source in order to filter your data and set sorting defaults. This is done by selecting the Data Source tab and then following the same method as explained in Section 7.

Once each of these has been set then the report is saved by clicking the OK button. The report is then ready to be populated with Paragraphs, Tables, Images and Charts. Section 8 will outline the steps used to create each of these objects.



5 Editing an Existing Report

As well as being able to generate pre-defined System reports, it is also possible to amend these reports to add/remove paragraphs and tables, set additional criteria or adjust the style of the report.

In order to edit a System report such as the Print Assessment Summary Report, Moves and Changes Report or Future State Proposal report you must first make a duplicate of the desired report.

A report is copied in the report management window which can be opened by selecting Reports>Design>Manage.

The report management window will then list all of the available reports. An existing report is copied by selecting the report and clicking on the Copy button as shown in Figure 2.



Figure 2. Copying an existing report

Copying a report will then open the Copy report window. Within this window you will be able to change the Name of the report (which appears in the report list) and the title of the report (which appears on each page of the report).

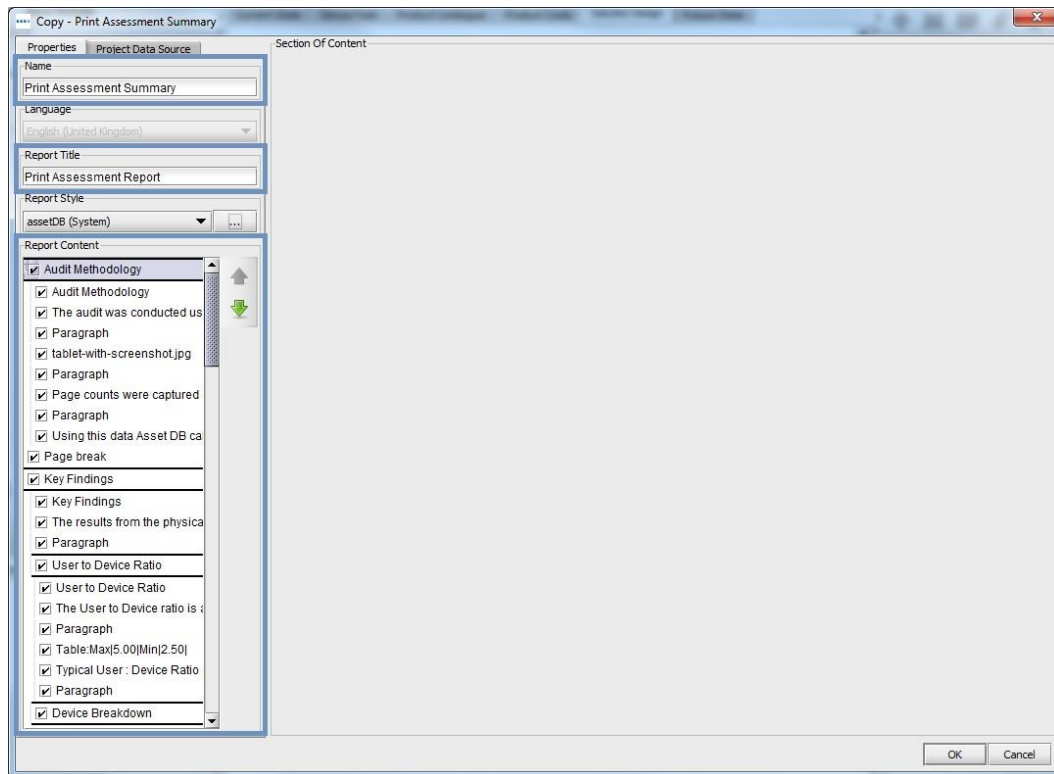


Figure 3. Copying a report

Within the Copy window it is also possible to remove sections of the original report from your copy. If your project does not contain a TCO or Green Calculation for example, you may wish to remove these sections from the Print Assessment Summary report.

This is done by unchecking the tick boxes for a particular section of the report that you wish to omit in the bottom left corner (shown in Figure 3). Highlighting the section will show a preview in the main panel which will then aid with the decision making process around which to remove.

It is also possible to remove sections from the report at a later stage and further details on this can be found in Section 8.

Finally, the style of the report (personalised colours, fonts and logos) can be selected at this stage using the Style drop down and the Data Source can be set as described in Section 7.

Once the above settings have been set, the next step is to click on the OK button to create your copied report. You are then able to edit the various Sections and objects within your report as explained in Section 8.



6 Report Styles

As well as defining the data and text to be included within a report, it is also possible to design the style of the reports. Fonts, colours, images and orientation can all be set to create custom styles. Multiple Styles can be created and then shared among users.

6.1 Creating a New Style

To create a new report style, we must first open the Report Style management window by selecting Reports>Style>Manage. You can then select the New button to create the new style. This will then present the Edit Style window shown in Figure 4.

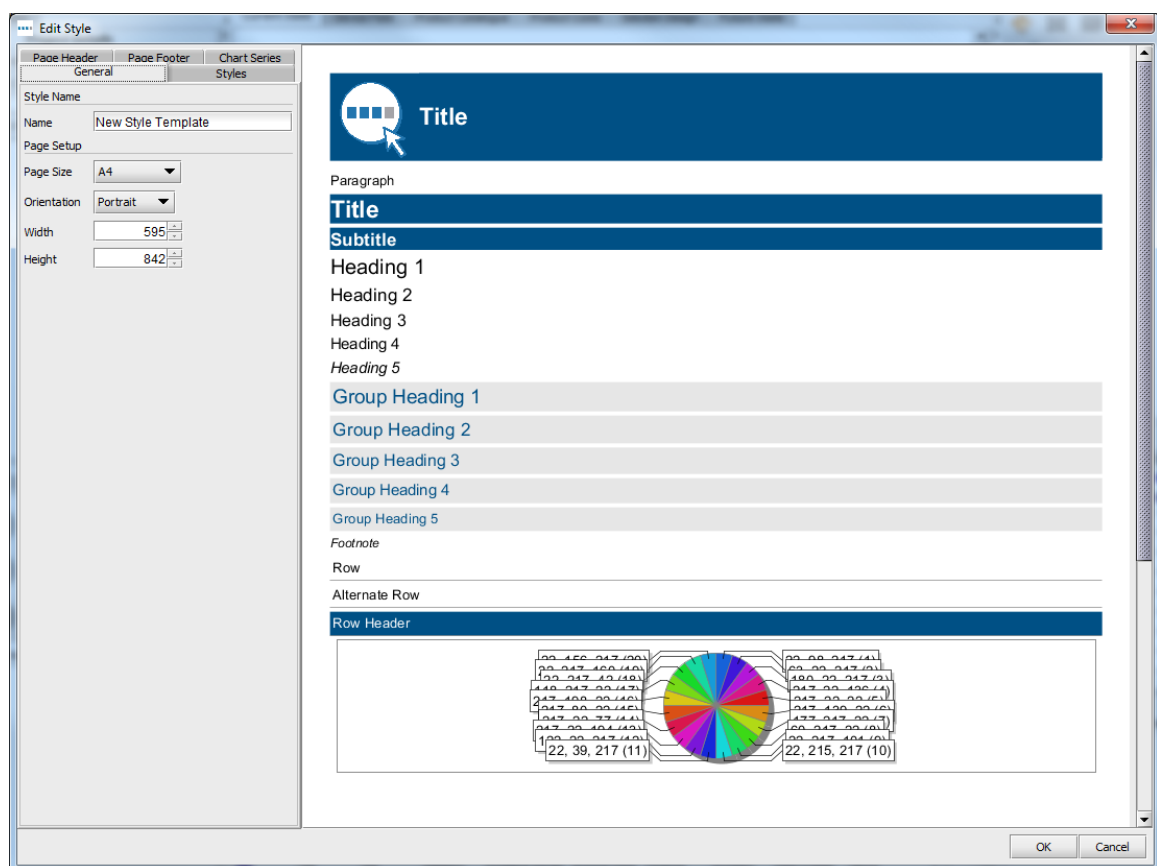


Figure 4. The Edit Style window

The first features to set for your new style are the style name, page size and page orientation. Each of these can be determined in the first General tab.

The style name will allow you to quickly identify the style when selecting it for a given report.



The page size and orientation will apply to all pages within the report. Because the report can be exported in various formats including PDF, Word and PowerPoint, it is important to decide upon the format in which you will be exporting the report when you determine these parameters. For example a PDF or Word may be best in portrait orientation whereas a PowerPoint export may be best in landscape orientation.

6.1.1 Setting Fonts and Text Colours

The next stage in setting a report style is to determine the font and text colours for the report. The first font to set is for the paragraph or main body of text within the report. This will also determine the default font for the report as a whole.

First select the Paragraph section from the top left panel of the Edit Style Window. You can then use the options in the panel below to set the font, size, style and colours for the Paragraph. You will then be able to see the change immediately in the right hand panel.

You are then able to amend each individual heading and title style in the same way by expanding each title group and setting the font styles as shown in Figure 5.

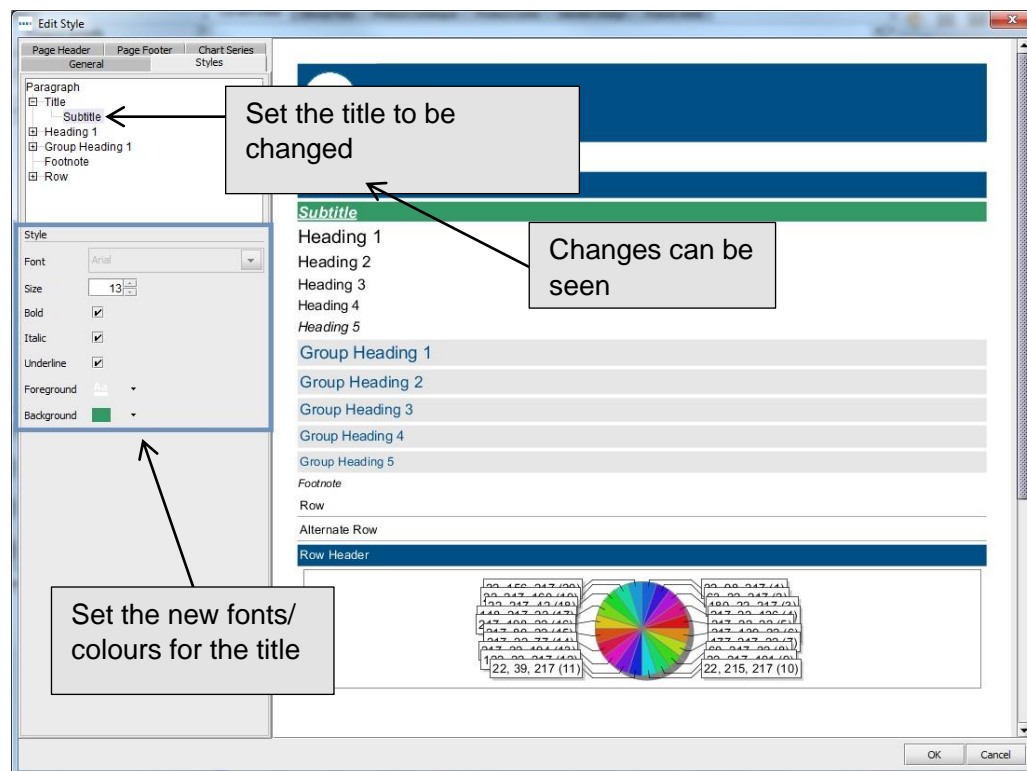


Figure 5. Changing the font of headers/titles

6.1.2 Setting Chart Colours

Once you have set the fonts and colours for your Style, you can then set the colours for charts that appear in the reports.

The first step is to select the Chart Series tab at the top left of the screen. This will then display the current colours used in the Style and the order in which they will be used.

To edit a currently used colour, double click on the relevant line item. You will then be able to either type in the exact colour numbers, or use the drop-down menu to select a pre-defined colour as shown in Figure 6.

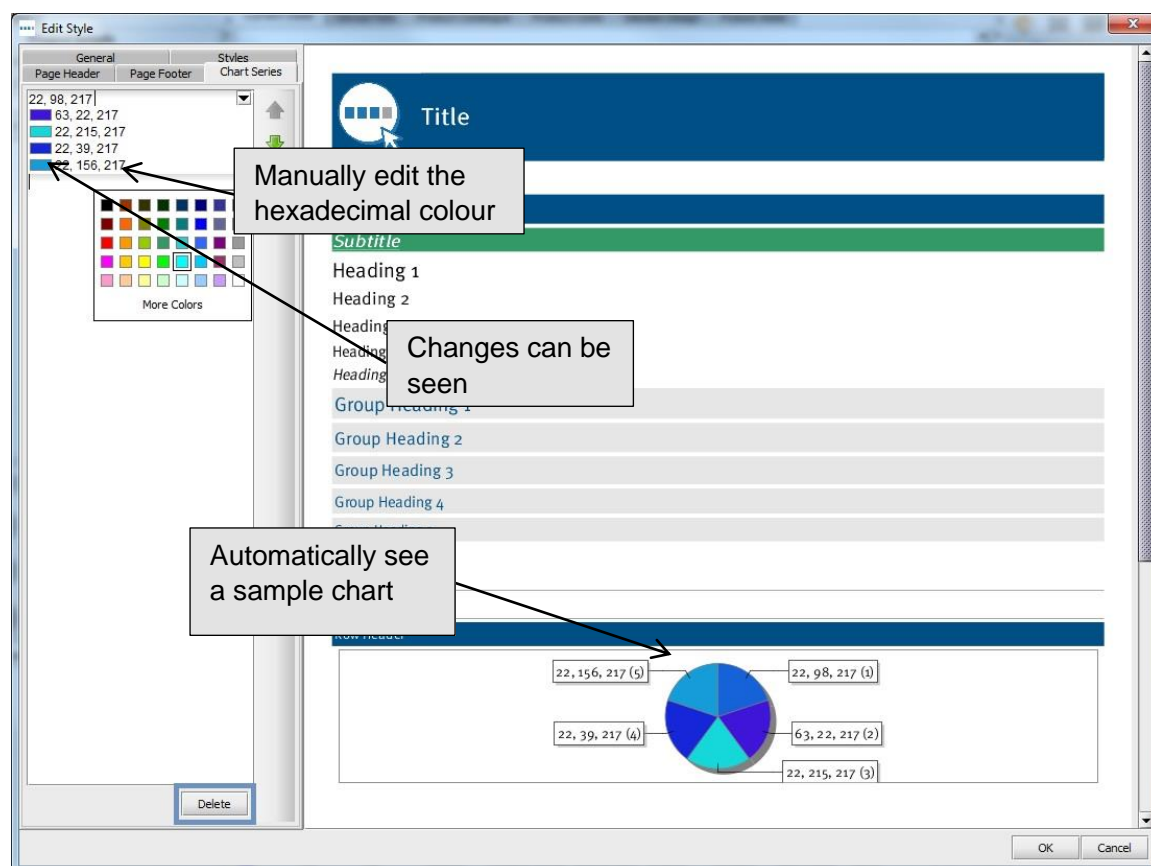


Figure 6. Changing chart colours

Colours can be deleted from the list by selecting the colour and clicking the Delete button (shown highlighted in Figure 6).

The order in which the colours are used can also be edited by selecting each line item then using the up and down arrow buttons to the right of the list.



6.1.3 Setting the Report Header and Footer

The final aspects of the Report Style that can be edited are the Header and Footer. The colour of the header is set by changing the colour of the “Title” in the Styles tab as explained in Section 6.1.1.

By selecting the Page Header tab, you can then edit the alignment of the header and amend the image displayed. The default for the report title displayed in the header is left justified and in the middle of the header bar. This can be adjusted to either the top or the bottom of the banner using the Title Align drop-down menu.

In addition to the title, the Image shown in the header can also be changed using the options shown in Figure 7.



Figure 7. Editing the Page Header

The options for the image can be set as follows:

Display: A checkbox to determine whether an image will be displayed.

Image: To change the image click the Select Image button and browse to the desired image.

Width and Height: The size of the image can be adjusted to fit the header.

Position: The image can either be positioned at the left or the right of the header.

Align: As with the text the image can be at the top, middle or bottom of the banner.

The same options can then also be set for the image in the footer by selecting the Page Footer tab. Within that tab it is also possible to change the alignment of the page numbering to the top or bottom of the banner from the default middle.

Once you have made all desired changes to the selected style, simply click OK at the bottom right of the window and your changes will be saved.

6.2 Editing an Existing Style

To edit an existing report style, we must first open the Report Style management window by selecting Reports>Style>Manage. This will show all currently created report styles. A style is deleted by selecting the line item and then clicking the Delete button.

An existing Style is edited by again selecting the line item and then clicking the Edit button. The Style can then be edited using the processes explained in Sections 6.1.1, 6.1.2 and 6.1.3.

6.3 Exporting and Importing Styles

Once Styles have been created using the above processes, as well as being able to use them for future reports within the Asset DB install in which they were created, they can also be exported to then be imported into another Asset DB install.

To export a Style navigate to Reports>Style>Export from the menu bar. This will then present a list of all available Styles. You should then select the Style you wish to export and click the Export button. This will then allow you to save the file into a desired location as a .rst file.

To import a Style, navigate to Reports>Style>Import and then navigate to the saved .rst file. This style can then be selected for any report within your system.

7 Setting the Project Data Source

Once a report has been copied, it will now appear in the report management window. To start making changes to the new report you now need to select the report from the list and click the Edit button as shown in Figure 8.



Figure 8. Editing a copied report

This will then produce the edit report window. At this stage it is not possible to rename your report but the title can still be changed in the Report Title Section in the top left hand corner.

The first stage to setting up your report is to determine the data that the report will take into consideration. This is done in the Project Data Source tab of the Edit report window shown in Figure 9.

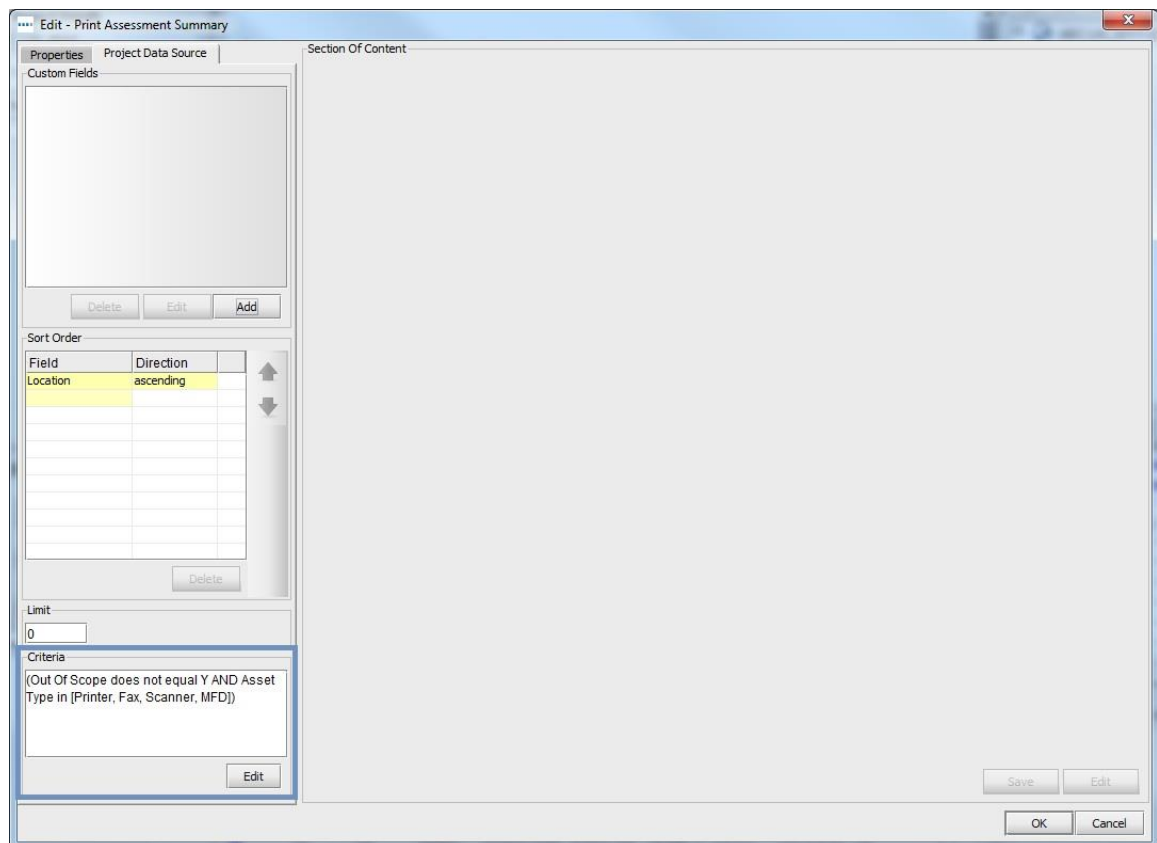


Figure 9. Project Data Source tab

Asset DB can filter the data in your project for your report based on any field from within the project's icon customisation as well as system set fields such as device type.

In order to set the criteria for these filters you would use the Criteria panel highlighted in Figure 9. For the Print Assessment Summary report, the default is set to include only Printers, MFDs, Scanners and Faxes that are In Scope. To change this default, or for other reports where you want to set the criteria, click on the Edit button in the Criteria Panel.

This will then bring the Edit Criteria window (shown in Figure 10) where you can set the distinct criteria for your data. This will allow you to show only a distinct subset of your data. For example, you may wish to show only in-scope printers in your report and the following steps will allow you to do this.

The first step is to add a criterion using the Add Criteria button (+). You can then set the details of each criterion using the options shown in Figure 10. For each individual criterion added you can use multiple filters on the selected data field using the Add Additional Path button (⌋).

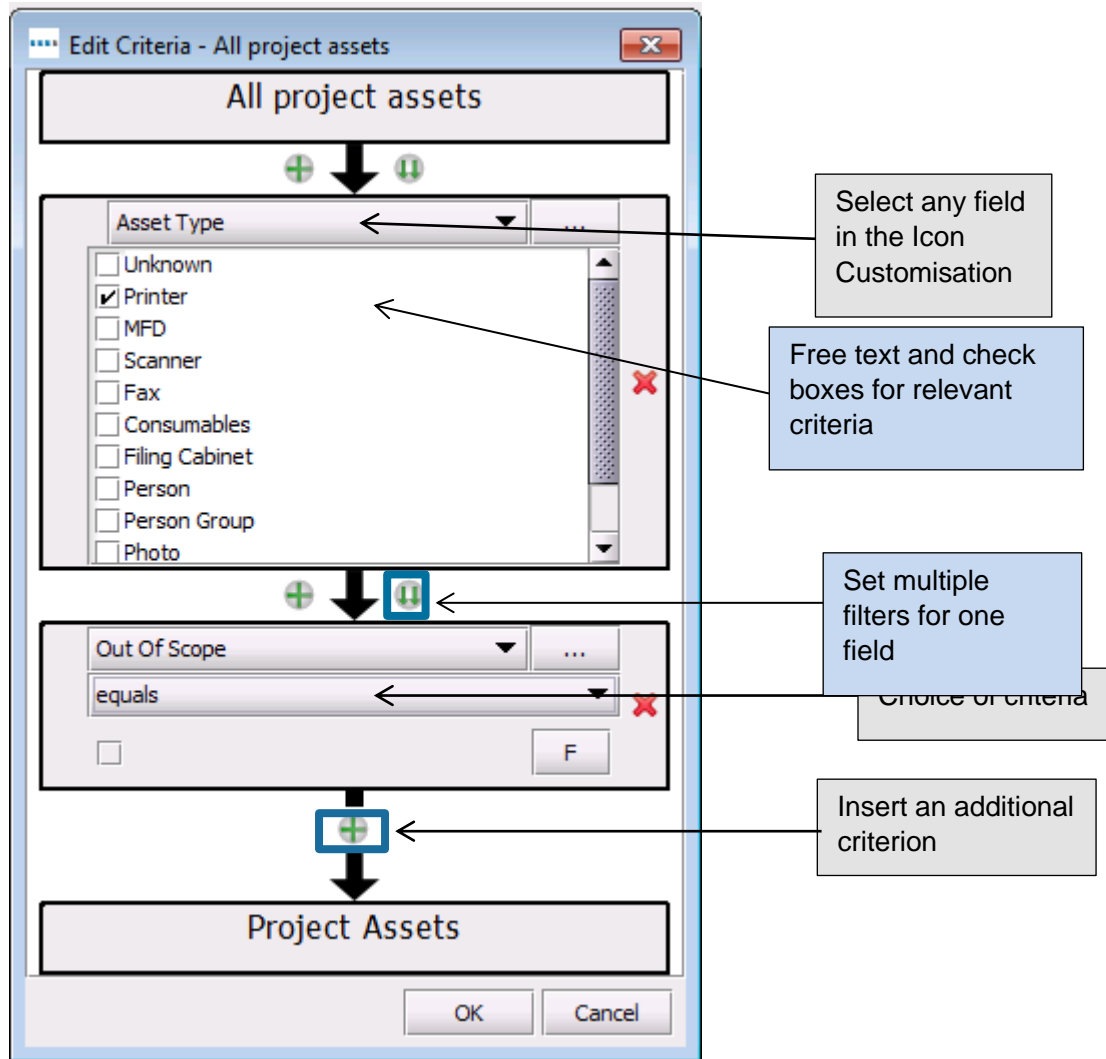


Figure 10. The Edit Criteria window

In order to create the criteria in the above mentioned example, you would first select Asset Type as the data field and then select the Printer check box (shown in Figure 10). You should then create an additional criterion choosing Out of Scope as the data field and then ensure the condition is such that the field is unchecked (equals unchecked).

Once you have created the criteria set you wish to use to filter the data in your project, this is saved by clicking the OK button. This will then update the Criteria panel to show your new settings.

7.1 Creating Custom Fields

In addition to using the standard fields in the project's Icon Customisation to filter the data for the report, it is also possible to create custom fields based on the standard fields. For example, you may wish to filter on overall cost including both the TCO cost and Electricity



cost. You could then create a custom field which would add these two fields together for you.

To create a custom field you should first click on the Add button in the Custom Fields panel shown in Figure 11.

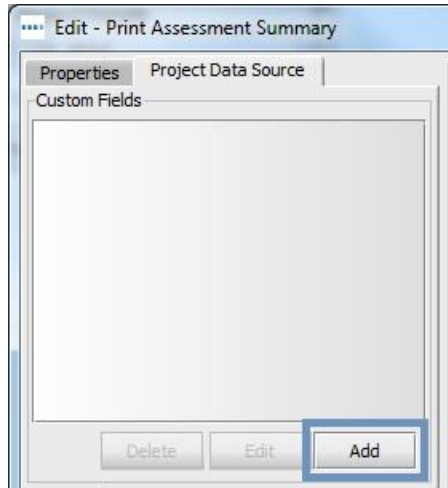


Figure 11. Creating a custom field

You will then be shown the Field Wizard window where you will determine how to create the new custom field.

The first screen will give three options for the type of field, listed below:

7.1.1 Add two or more fields together

This option would be used for the example above where you wish to filter based on the sum of multiple fields. To create such a field, first select the relevant radio button and click Next.

You then need to give your new custom field a name in the Display Name box (shown in Figure 12). This is the name that will appear in the list of fields within the Criteria windows.

The next step is to select the fields you wish to be added together. This is done by clicking on the Add button and scrolling through the current project Icon Customisation to select the relevant fields. Once you have selected all of the fields you wish to be added together they will be displayed in the Fields section as seen in Figure 12.

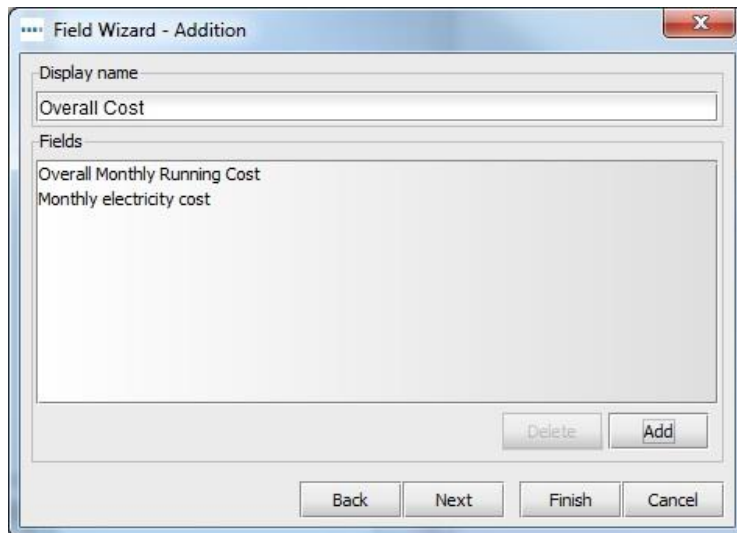


Figure 12. Field Wizard – creating a field by adding multiple existing fields

To finish the process and create the field simply click on the Finish button. Your new field will then appear in the Custom Fields panel in the top left corner of the Edit Report window.

7.1.2 Multiply a field by a value

This option would allow numeric fields to be multiplied before a filter is applied. An example of this would be a monthly value multiplied by 12 to give an annual value. To create such a field, first select the relevant radio button and click Next.

You then need to give your new custom field a name in the Display Name box as above. The next step is to select the field you wish to be multiplied using the drop down menu.

The Amount field should be populated by the value by which you wish your field to be multiplied.

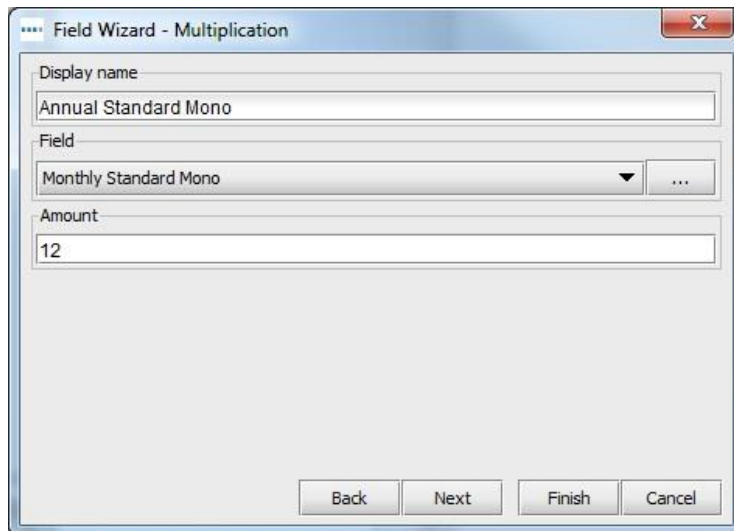


Figure 13. Field Wizard – creating a field by multiplying an existing field

To finish the process and create the field simply click on the Finish button. Your new field will then appear in the Custom Fields panel in the top left corner of the Edit Report window.

7.1.3 Display text based on criteria

This final option could be used to condense a multiple option field such as Connection Type or Asset Type. The process to create a field in this way will be to create new category options based on set criteria. Each device will then be placed into each of the new categories.

To create such a field, first select the relevant radio button and click Next.

You then need to give your new custom field a name in the Display Name box as above. The next step is to define the default category. This will be the category chosen for devices which currently do not have a value in the selected field.

The final stage is to create the new categories. For this example we will split the Connection Type field into simply Networked and Non-Networked. To create a category, first double-click in the first row in the Categories table under the Category heading. You can then type the name of the first category to be created. To define the new category you then need to double-click in the same row under the Criteria heading. This will then bring up an Edit Criteria window. The process to edit the criteria is explained in Section 7 and Figure 10. This process is then repeated to create all categories that are required.

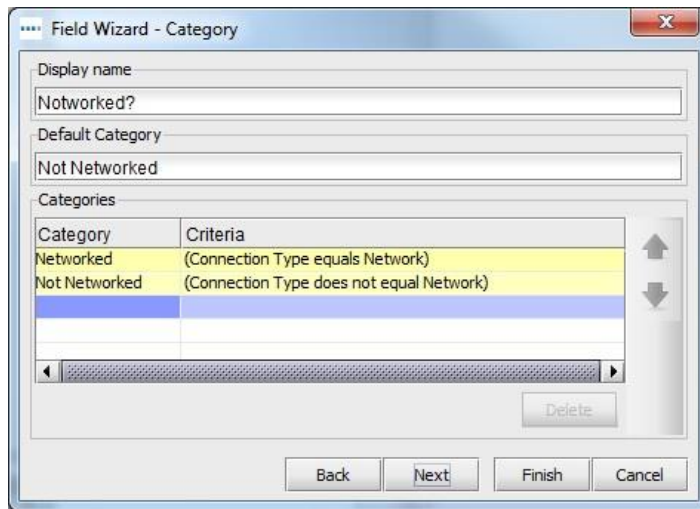


Figure 14. Field Wizard – creating a field by displaying text based on criteria

To finish the process and create the field simply click on the Finish button. Your new field will then appear in the Custom Fields panel in the top left corner of the Edit Report window.

Once you have created Custom Fields, they can then be used to set the criteria for your report as explained in Section 7. The fields will appear in a Custom section within the icon customisation.

7.2 Setting Default Sort Orders

The final default option to be defined within the Project Data Source tab is the default sorting orders for tables and graphs.

This will allow you to determine whether a list should be sorted ascending or descending for each specific field. The default for all fields will be ascending unless otherwise specified within certain tables or graphs.

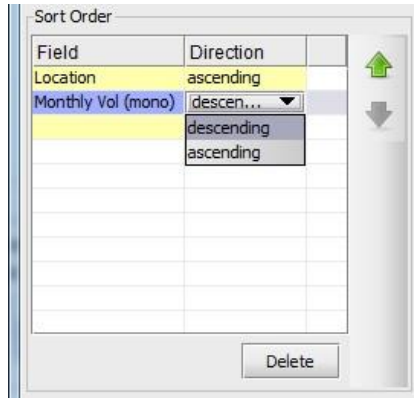


Figure 15. Setting a default sort order

To set a Sort Order, first double click in an available row under the Field heading. You will then be able to select a field from the project Icon Customisation. Once a field has been selected, you can then use the drop down in the Direction column to determine whether the sort should be ascending or descending as a default as shown in Figure 15.

These sort orders will then be used as the default in all tables and graphs throughout the selected report unless a specific sort order has been set for a certain item. A Sort Order can be deleted by selecting the relevant row in the table and selecting the Delete button.

Once you are happy with the settings of your Project Data Source, they can be saved by clicking on the OK button at the bottom right corner of the Edit Report window.

8 Managing the Report Content

Once a new report has been created or an existing report has been copied and the Project Data Source has been set, the main body of the report can now be created. This will consist of Sections and sub-sections which will then include Paragraphs, Images, Tables and Charts.

8.1 Creating Report Sections

The first step in managing the content of a report is to create the sections of the report. Sections within the report allow easier navigation through the report and programs such as Microsoft Word to identify the titles and create a navigation bar.

To add the first new Section to your report select Add<Section from the bottom of the window as shown in Figure 16.

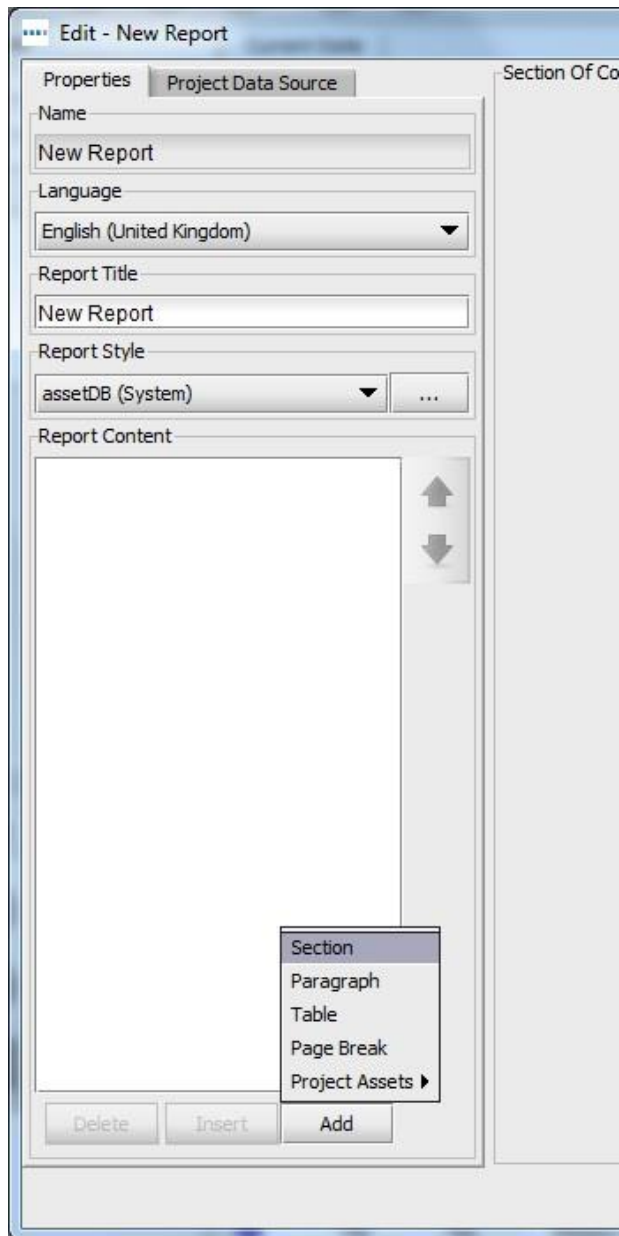


Figure 16. Adding a Section to a report

You will then be asked to name the Section in a resulting pop-up window. Once you have given the Section a name, click OK to create the section. It will then appear in the Report Content section of the Edit Report window.

Once the first Section has been added, to add additional sections you must instead use the Insert<Section> option. This will allow a new Section to be created instead of a sub-section (further explained in Section 8.1.1). The inserted section will then appear at the top of the Report Content list.

Sections can be moved within the report by selecting them from the list and using the up and down arrows to the right of the list. This is explained in more detail in Section 8.9.



8.1.1 Creating Sub-Sections

Once you have added sections to the report, it is then possible to add Sub-Sections within those Sections. To do this ensure that the Section is selected, then click on Add>Section as shown in Figure 17. You will then be able to name the new Sub-Section.

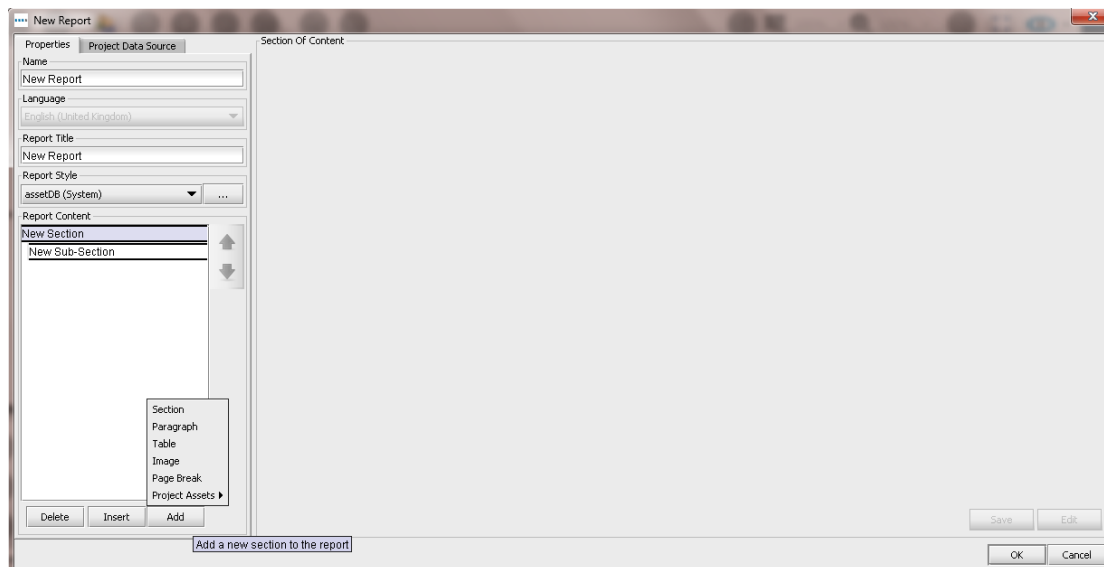


Figure 17. Creating Sub-Sections

Once the Sub-Section has been created you will see it appear in the Report Content list but it will be offset to the right from the Section under which it was created.

To add a new Sub-Section at the same level, you should then reselect the original Section and repeat the steps outlined above. To add an additional level you would then need to select the Sub-Section before clicking Add>Section.

8.2 Inserting Page Breaks

Adding a page break within a report will allow a new Section or item to appear on a new page instead of following directly from the previous object. A page break can be added at any point within the report.

There are two ways in which a page break can be added, using the Add menu or the Insert menu. Adding a page break using the Add menu (Add>Page Break) will add a new break to the bottom of the report. Using the Insert option (Insert>Page Break) will insert the break above the currently selected item from the Report Content list.



These same two Insert and Add options apply for all other new objects added to the report.

8.3 Creating/Editing Paragraphs

A Paragraph within an Asset DB report relates to either a full paragraph of text or a Section or Sub-Section title. Just like the Page Breaks, there are two ways in which a Paragraph can be added, using the Add menu (Add>Paragraph) or the Insert menu (Insert>Paragraph).

Once the Paragraph is created, select it from the Report Content list and click Edit to allow changes to be made. A paragraph that has already been created is edited in the same way.

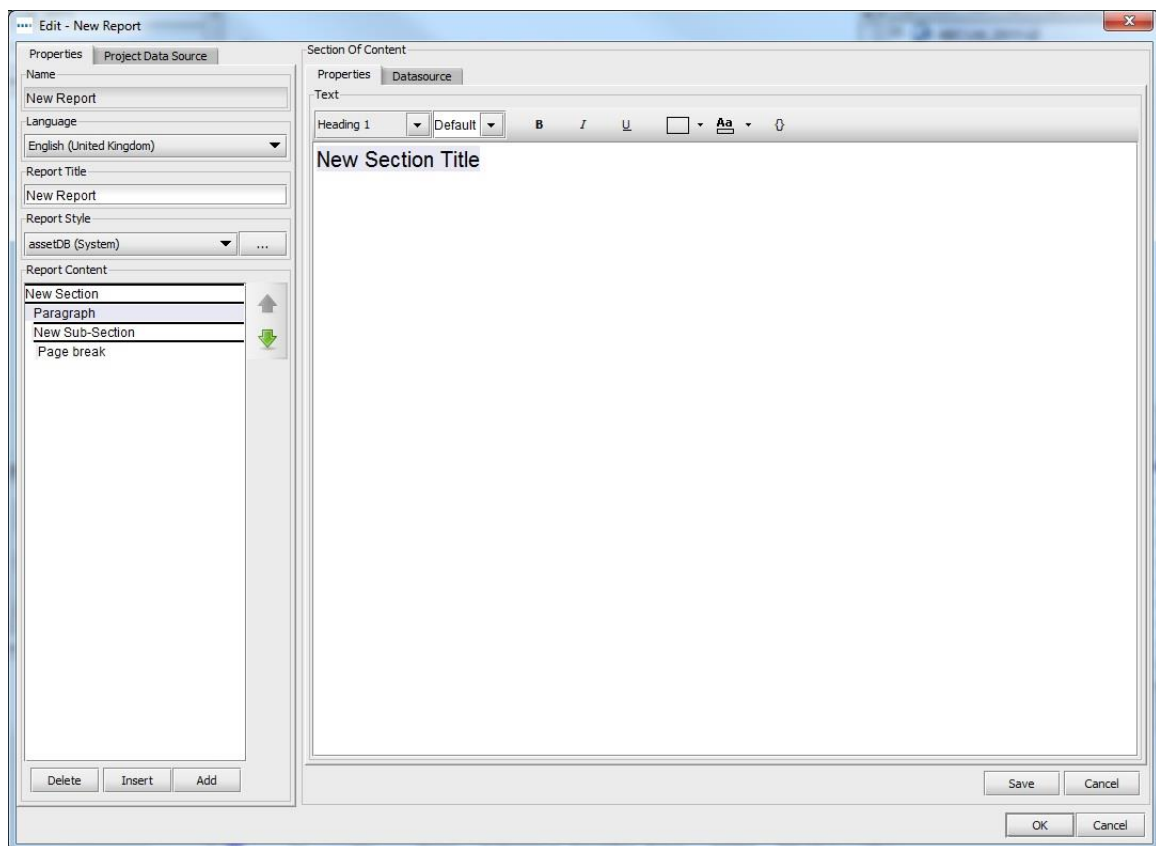


Figure 18. Creating a Paragraph

You are then able to create/edit the text that you would like to appear by typing in the white box.

The text will automatically appear in the Paragraph style. To change the appearance of the text, first highlight the section to be changed. Then you can use the buttons along the



top of the window to either select a predefined style from the drop-down, or manually make changes using the individual options.


All changes made to a Paragraph can then be saved and previewed by clicking the Save button. This will also update the name of the paragraph in the Report Content list to show the first line of the paragraph.

8.3.1 Creating Project Assets Paragraphs

A Project Assets Paragraph is a paragraph of text which can also contain parameters based on the data within the project's current state. This will allow dynamic numeric values to be included in a paragraph.

Just like a standard Paragraph, there are two ways in which a Project Assets Paragraph can be added, using the Add menu (Add>Project Assets>Paragraph) or the Insert menu (Insert>Project Assets>Paragraph).

Once the Paragraph is created, select it from the Report Content list and click Edit to allow changes to be made. The text within the Project Assets paragraph is then created and amended in the same way as a standard Paragraph.

To enhance your text with a parameter, click the 'Insert Parameter' button () which will produce the Create Parameter window. The parameter can then be created as explained in Section 8.5.1.

Within each system report there are various pieces of text such as section and chart titles and paragraphs about the data shown. Each of these is fully editable within the Edit Report window. To open the Edit Report window select Reports>Manage>Design. Select the chosen copied report from the Reports management window and click Edit.

To edit a piece of text within a report you should first select the item from the Report Content list which will appear in the home screen of the Edit Report window. You will then be shown a preview of the selected article in the Section of Content panel.

To start editing the chosen section, click on the Edit button at the bottom right corner of the Section of Content panel. This will then display the text in an editable format as seen in Figure 19.

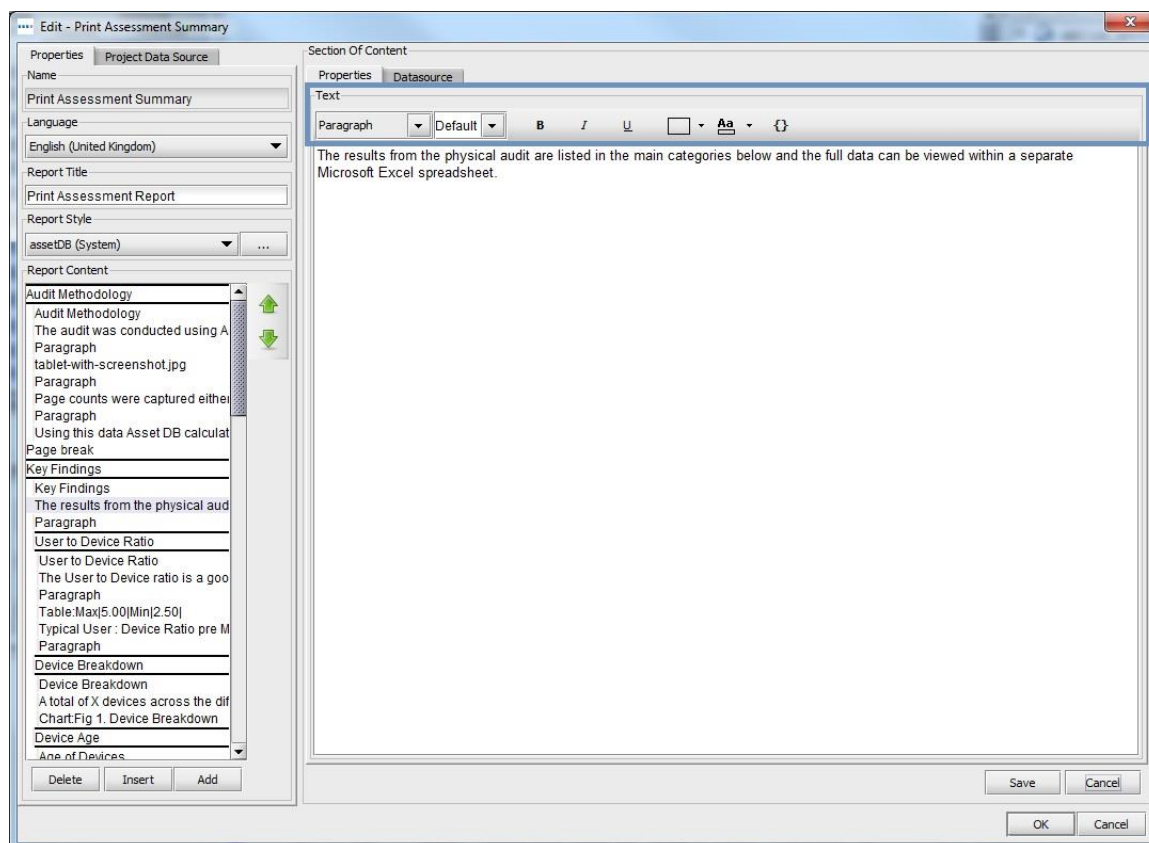


Figure 19. Editing text within a report

The body of the text can then be updated to your desired state. A preview of the new text can be seen by clicking on the Save button.

In addition, it is also possible to edit the size and colour of the text within the Section of Content panel. Selecting the Edit button again will display the text in an editable format and will also show font options at the top, highlighted in Figure 19.

The default colour and size etc. will be determined by the Style that has been chosen for the report using the Report Style drop-down. The font will also be determined by the Style and cannot be changed at this point. Details of how this can be changed can be found in Section 9.

The text appearance can be changed by first selecting the text, then either using the drop-down menu to select a pre-determined heading style, or using the individual editing options. These include bold, underlined and italic as well as text and highlighting colours.

Any changes that have been made can be saved and a preview shown by selecting the Save button.



8.3.2 Creating Virtual Assets Paragraphs

If you have also created a Solution for your project, it is then possible to create paragraphs containing parameters based on the virtual assets in that solution.

Just like a standard Paragraph, there are two ways in which a Virtual Assets Paragraph can be added, using the Add menu (Add>Virtual Assets>Paragraph) or the Insert menu (Insert>Virtual Assets>Paragraph).

The content of the paragraph can then be created as per the instructions in Section 8.3.1 and then saved by clicking Save.

8.4 Creating/Editing Report Tables

There are three types of table that could appear in a report. The first is a standard Table which consists predominantly of text with the addition of numeric parameters. The second type of table is a Dynamic Table which is made up of lists of data taken from the project. The third is a Cross Tab table which allows multiple data calculations to be shown for a single field.

8.4.1 Editing a Standard Table

A Standard table can be added or inserted into a report by selecting Add>Table or Insert>Table. Once created, a new or existing table can then be selected from the Report Content list and edited by clicking the Edit button.

This will then present you with the table in an editable format along with the settings available to be changed as shown in Figure 20.

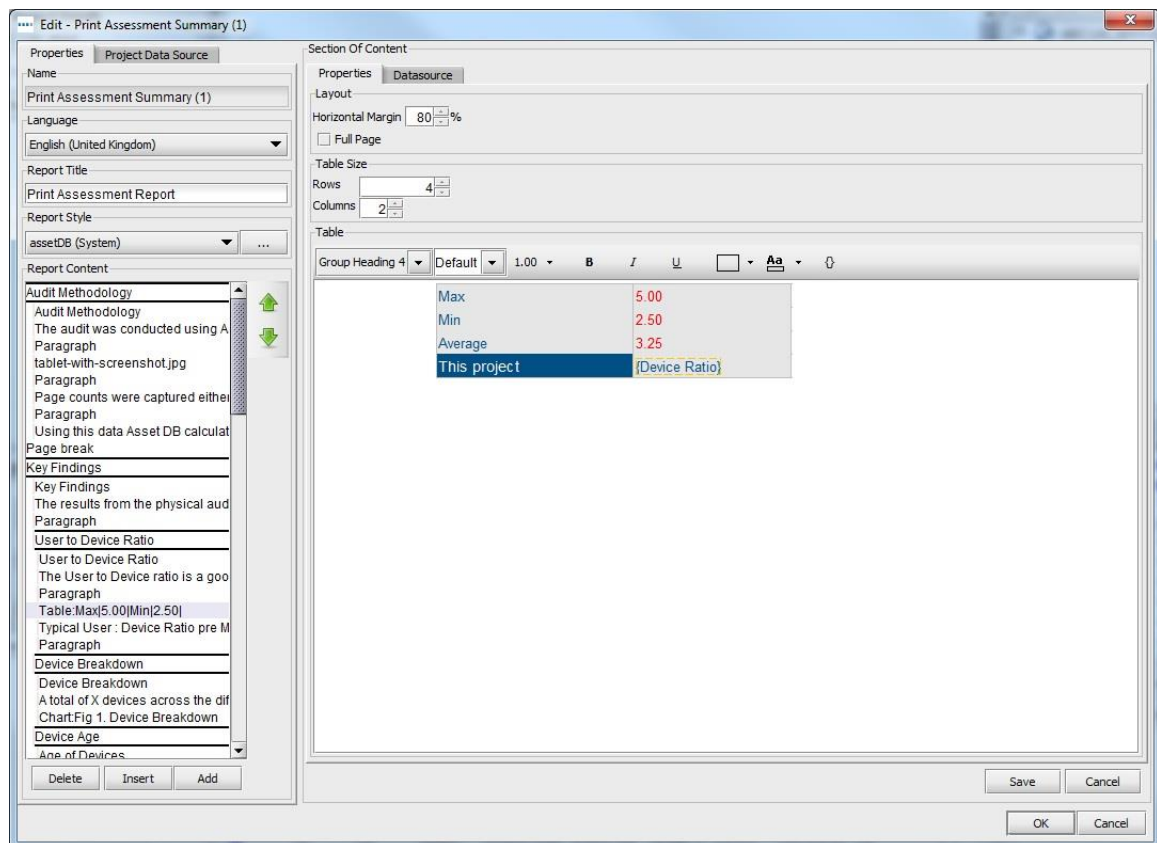


Figure 20. Editing a standard table

The first settings to be edited are for the layout of the table. The table can be embedded into a standard page along with other pieces of text and charts. Alternatively, by selecting the Full Page check-box the table can appear on a page by itself.

The additional option for the layout of the table is to set the horizontal margin at either side of the table on the page. This can be set from 0% such that the table expands to the margin of the page, up to 100% such that the size of the text within the table determines the width of the table.

The size of the table in terms of rows and columns can then be altered by increasing or decreasing the number of each in the Table Size section. Additional rows will be placed at the bottom of the table and additional columns will be added to the right as shown in Figure 21. Similarly, removed columns will be taken from the right and removed rows will be taken from the bottom.

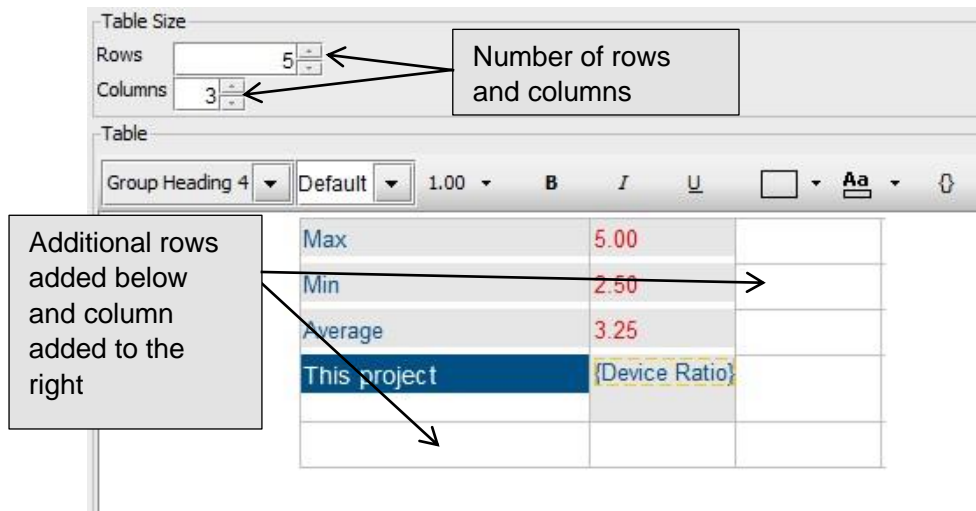


Figure 21. Adding rows and columns to an existing table

Once the physical structure of the table has been edited, the text within the table can then be added. To enter text into a cell in the table, select the cell and then type the desired text. The height of the cell's row will automatically adjust depending on the amount of text entered into the cell. The style of the added text can then be customised using the buttons along the top of the preview pane.

Once all desired changes have been made to the table, the changes can be saved and a preview shown by clicking the Save button.

8.5 Creating Project Assets Tables

As well as the standard table mentioned above, there are three additional types of Project Asset Tables that can be added or inserted into a report, a standard Project Assets Table, a Project Assets Dynamic Table and a Project Assets Cross Tab table.

8.5.1 Adding a Parameter to a Standard Project Assets Table

In addition to adding plain text to a standard table, it is also possible to add single parameters based on the data within your project. In the example table shown in Figure 20 from the Print Assessment Summary report, the table consists of text cells stating a maximum, minimum and average user:device ratio for a company which would be static figures in all reports run. There is then also a parameter which has been created to portray the actual user:device ratio for the project.

A Standard Project Assets table can be added or inserted into a report by selecting Add>Project Assets>Table>Table or Insert>Project Assets>Table>Table. The table can then be edited by selecting the report from the list and clicking Edit.




To insert a parameter into a cell first select the cell then click the 'Insert Parameter' button () which will produce the Create Parameter window shown in Figure 22.

Figure 22. The Create Parameter window

To create a parameter you must first give the parameter a name. This will then appear within the parameter brackets in the selected cell. This can be seen for the "Device Ratio" parameter used in Figure 20.

The next step is then to determine the type of parameter to be created. There are three options which are described as follows:

8.5.2 Calculation

A calculation will produce a single value based on one of the following operations:

Count: The number of values in a data field (i.e. total devices with a finisher)

Distinct Count: The number of distinct values in a data field (i.e. total distinct models)

Sum: The total of all values in a numeric field

Average: The average of all values in a numeric field

Lowest: The lowest value in a numerical field

Highest: The highest value in a numerical field

Standard Deviation: The measure of dispersal of your data

Variance: The variance between the lowest and highest value in a numeric field

First: The first item in a list of text values such as the first Asset Number

Once the calculation has been selected from the drop-down, you can then use the data field drop down to determine to which field the calculation should refer. For certain calculations there are restrictions around which fields can be chosen. Count, Distinct Count and First can be used for any field whereas all others can only be used for numeric fields.



An example of using a calculation parameter could be to show the total number of different models within a print fleet. For this, the user would give a name of “Different Models”, select Distinct Count as the calculation and then Model from the field drop-down. This would then appear in the table as a single number showing the number of models in the fleet.

8.5.3 Percentage

A percentage parameter allows the user to produce a value that represents one calculated value as a percentage of another. An example of such a calculation could be the percentage of the total volume that is colour volume.

The percentage calculation will be made up of two values, one which will be a percentage of the other. Each of these values will be determined by a calculation which will be produced using the method described above.

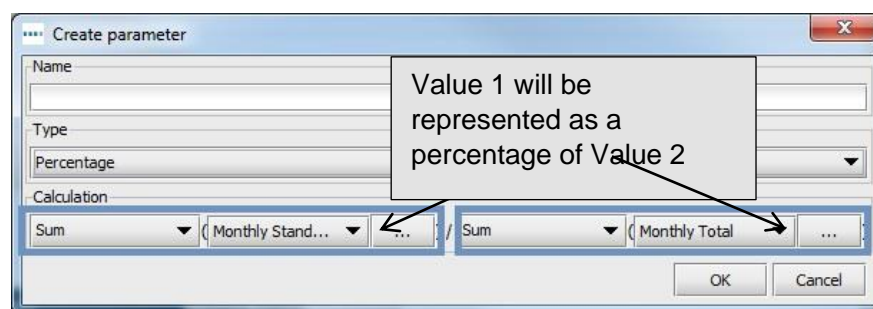


Figure 23. Creating a percentage parameter

8.5.4 Ratio

A ratio parameter is calculated similarly to a percentage parameter. Again, you would need two calculated values but the final calculation would be represented as a ratio (two values separated by a colon). These values would once again be calculated using the method described above.

An example of the usage of a ratio parameter could be to calculate the ratio of printers compared to MFDs or the user:device ratio as mentioned above.

For any of the three calculations, as well as using standard fields, it is also possible to create custom fields within the Datasource tab of the Section of Content pane. Details on how to create custom fields can be found in Section 7.1.

8.5.5 Creating a Dynamic Table

A dynamic table, as mentioned above, is made up of lists of data taken from the project. The lists created can then be limited to a certain number of values to show the top 10 or bottom 5 for example.

A Project Assets Dynamic Table can be added or inserted into a report by selecting Add>Project Assets>Table>Dynamic Table or Insert>Project Assets>Table>Dynamic Table. The table can then be edited by selecting the report from the list and clicking Edit. This will then show the characteristics of the table in an editable format as shown in Figure 24.

Figure 24 shows the 'Edit - Print Assessment Summary (1)' dialog box. The 'Properties' tab is active, showing 'Project Data Source' and 'Report Content'. The 'Report Content' list on the left includes 'Fleet Complexity', 'Paragraph', 'Cross-Tab: Colour|Mono|Models|', 'MFDs/Copiers', 'Paragraph', 'Cross-Tab: All Devices|Models|', 'Mono Printers', 'Paragraph', 'Cross-Tab: All Devices|Models|', 'Colour Printers', 'Paragraph', 'Output Volumes', 'Output Volumes', 'Total annual page volume has b', 'Paragraph', 'Dynamic Table: Make|Model|Series|', 'Paragraph', 'Dynamic Table: Make|Model|Series|', 'Paragraph', 'Dynamic Table: Make|Model|Series|', 'Paragraph', 'Colour, Duplex & A3/Tabloid', 'Colour, Duplex & A3/Tabloid', 'Only X of printers were duplex ca', 'Paragraph', and 'From an environmental perspect'. The 'Section Of Content' tab is also visible, showing 'Properties' and 'Datasource'. The 'Layout' section includes 'Horizontal Margin' set to 10% and 'Full Page' checkbox. The 'Title' section shows 'Top Devices by Total Volume'. The 'Columns' section displays a table with 4 columns: Field, Custom Heading, Weight, and an empty column. The table contains 5 rows: Make, Model, Serial No, Monthly Total, and an empty row. The 'Grouping' section has a 'Group by location' checkbox. The bottom of the dialog has 'Delete', 'Insert', 'Add', 'Save', 'Cancel', 'OK', and 'Cancel' buttons.

Figure 24. Editing a Dynamic Table

The layout of the table is set up the same as for a standard Table as described in Section 8.4.1. A Dynamic Table is then also given a Title which will appear above the table in the finished report.

Once the above features of the report are defined, the columns of the table can then be created in the Columns panel. A column is added by double clicking in the first empty cell in the Field Column. This will then allow you to select a field of data that you wish to display from the project's icon customisation.

You will then have the option to give the new column a custom Heading. If this cell is left blank then the heading will match the name of the field. To apply a custom heading simply double click in the relevant cell and then type the desired heading.

The final column to be completed is the weight. This will determine how wide the column will appear in the table (based on a ratio of 0 up to 1). The weight is also set by double clicking in the cell and typing the required figure.

The final feature of the Dynamic Table that can be edited in the Properties tab is the Grouping. Results in the table can be grouped together by location by selecting the Group by Location check-box. To group by any other field (Model for example) click on the Add button and then select the desired field from the icon customisation.

8.5.6 Editing a Dynamic Table Datasource

In addition to standard data fields, the table can also contain custom fields created using the existing fields. The custom fields are created in the Datasource tab (shown in Figure 25). Additional details on how these custom fields can be created can be found in Section 7.1.

In addition to the custom fields, a sort order can also be created in the Datasource tab. This will show the current field by which the table is sorted. This sort order can be changed using the methods described in Section 7.2.

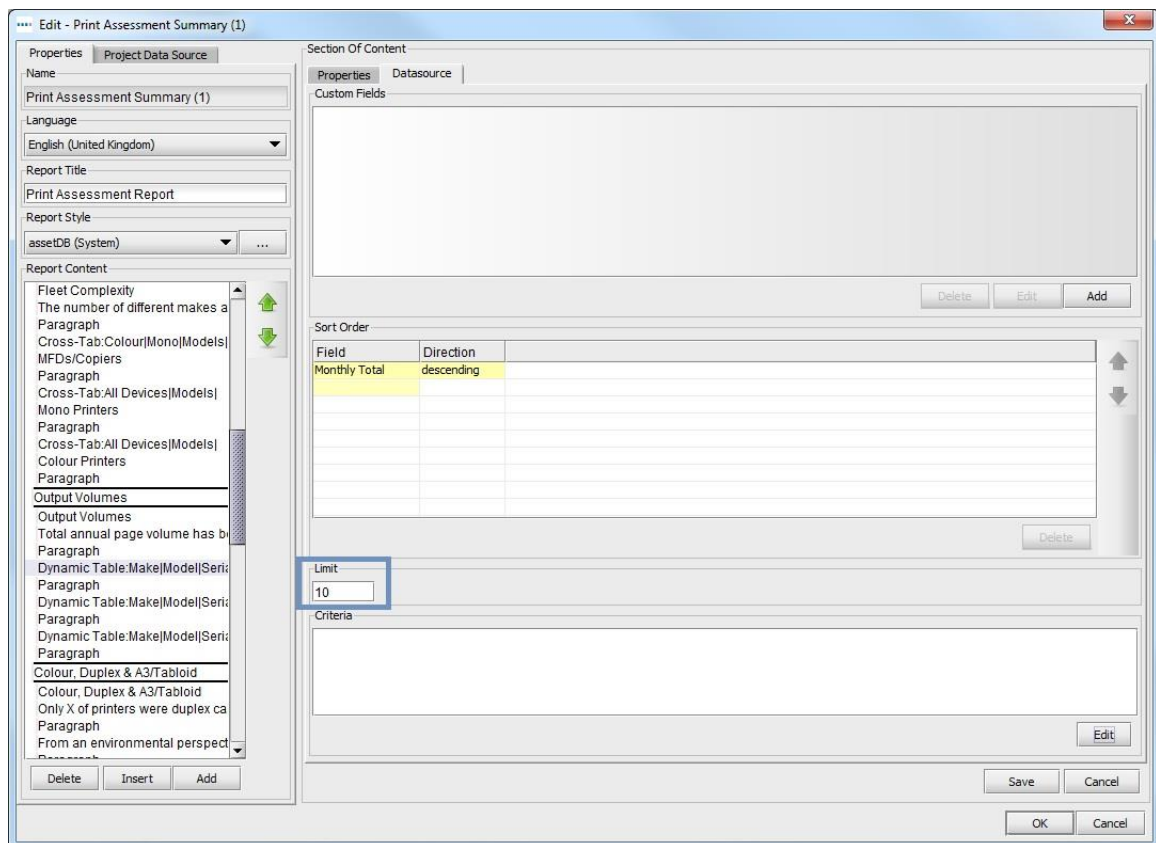


Figure 25. Editing a Dynamic Table – the Datasource tab

Criteria can also be set which will filter the data within the project before it appears in the report. The process used to set the criteria is explained in Section 7.

The final setting within the Datasource tab is the Limit. This will determine the number of results that will display in the report to show a top 10 for example. To edit the limit simply type the required limit into the field.

All changes made to a Dynamic Table can then be saved and previewed by clicking the Save button.

8.5.7 Creating a Cross Tab Table

A Cross Tab table will allow multiple pieces of information to be shown for a single field. For example, for each make of devices, a Cross Tab table could show the number of different models there are for that make as well as the number of colour devices and the number of mono devices. So compared to a Standard or Dynamic table it is possible to portray a lot more information within a Cross Tab table.

A Project Assets Cross Tab Table can be added or inserted into a report by selecting Add>Project Assets>Table>Cross Tab Table or Insert>Project Assets>Table>Cross Tab Table. The table can then be edited by selecting the report from the list and clicking Edit. This will then show the characteristics of the table in an editable format as shown in Figure 26.

Section Of Content

Properties Datasource

Layout

Horizontal Margin 30%

Full Page

Title

MFDs/Copiers

Group by

Make

Calculation Columns

Column Na...	Field	Calculation	Weight
Models	Model	Distinct Count	0.5

Count Columns

Column Na...	Criteria	Weight
Colour	(Colour Device equals N)	0.5
Mono	(Colour Device equals Y)	0.5

Report Content

Key Findings

The results from the physical aud Paragraph

User to Device Ratio

User to Device Ratio

The User to Device ratio is a goo Paragraph

Table:Max(5.00)Min(2.50) Typical User : Device Ratio pre M Paragraph

Device Breakdown

Device Breakdown

A total of X devices across the dif Chart:Fig 1. Device Breakdown

Device Age

Age of Devices

The age of the printer fleet is quit Chart:Fig 2. Age of Mono Printer f

Fleet Complexity

Fleet Complexity

The number of different makes a Paragraph

Cross-Tab: Colour|Mono|Models

MFDs/Copiers

Paragraph

Cross-Tab: All Devices|Models|

Delete Insert Add

Save Cancel

OK Cancel

Figure 26. Editing a Cross Tab Table

The Layout of the table is set up the same as for a standard Table as described in Section 8.4.1. A Cross Tab table is then also given a Title which will appear above the table in the finished report.

Once the above features of the report are defined, the project Datasource can be determined including any custom fields, filter criteria or limits for the table. This is done using the methods described in Section 7.

When the Datasource is determined, the columns of the table can then be created. The first Column to be created is the left hand title column. This will create a new row for each of the values for which the other columns will display information. In the example mentioned above, the title column will create a new row for, and show the name of each of the makes in the project. This is created using the Group By drop-down.

There are then two additional types of Columns that can be added as follows:

8.5.8 Calculation Column

A Calculation Column will show a value associated with each row of the table based on the following calculations:

Count: The number of values in a data field (i.e. total devices with a finisher)

Distinct Count: The number of distinct values in a data field (i.e. total distinct models)

Sum: The total of all values in a numeric field

Average: The average of all values in a numeric field

Lowest: The lowest value in a numerical field

Highest: The highest value in a numerical field

Standard Deviation: The measure of dispersal of your data

Variance: The variance between the lowest and highest value in a numeric field

First: The first item in a list of text values such as the first Asset Number

To edit a column, first double click in the relevant row in the Column Name column. This will then allow you to amend the name that will appear in the top title row. The next stage is to amend the field of data on which the calculation will be based. This is done by double clicking the cell and then choosing the relevant field from the pop-up.

The next stage is to select the calculation from the next column using the drop-down. As mentioned before, for certain calculations there are restrictions around which fields can be chosen. Count, Distinct Count and First can be used for any field whereas all others can only be used for numeric fields.

The final option to select for a Calculation Column is the weight of the column. This is a value from 0 to 1 and will determine the width of the column. This is again changed by double clicking in the cell and then typing a new value.

8.5.9 Count Column

The second additional type of column that can be produced is a Count Column which will produce a count of all devices for each row that satisfy defined criteria.

The first stage in editing a Count Column is to amend the name. This is done by double clicking the relevant row in the Column Name column. As for the Calculation Column this will change the name that will appear in the title row.

The next stage is then to set up the criteria on which the counts will be based. This is done by double clicking in the relevant cell in the Criteria column and then following the instructions explained in Section 7.

Finally, the weight of the Count Columns is changed by double clicking in the cell and then typing a new value from 0 to 1.

Once all of the settings for the Cross Tab table have been edited as desired they can be saved and previewed by clicking the Save button.

8.6 Creating Virtual Assets Tables

In addition to the project assets tables mentioned above, each of the three table types can be created as Virtual Assets tables to incorporate data from the project's Solution.

The three Virtual Assets tables are added or inserted into a report by selecting Add>Virtual Assets>Table>Table/Dynamic Table/Cross Tab or Insert>Virtual Assets>Table>Table/ Dynamic Table/Cross Tab.

Once created, the table can then be selected from the Report Content list and edited by clicking the Edit button. The tables can then be created using the processes explained in Section 8.5.

8.7 Creating/Editing Report Assets Charts

There are three types of chart that can be created in an Asset DB report, a Pie Chart, a Series Pie Chart and a Bar Chart. Each of these chart types will display the data from your project in a way set by the user.

8.7.1 Creating a Pie Chart

A Pie Chart in an Asset DB report is a standard pie chart where different outcomes of a data field are represented by chunks of a circular "pie" sized in relation to their proportion of the total of that data field.

A Pie Chart can be added or inserted into a report by selecting Add>Project Assets>Chart>Pie or Insert> Project Assets> Chart>Pie.

Once created, the chart can then be selected from the Report Content list and edited by clicking the Edit button.

The first aspects of the Pie Chart to be edited are the physical features including the layout and title.

Within the Layout panel, the horizontal margins at either side of the chart on the page can be set from 0% such that the table expands to the margin of the page, up to 95% which will create a very slim chart. This is adjusted using the up and down arrows next to the field.

The chart can then be set to be on its own page within the report by selecting the Full Page check-box.

The title of the chart can be edited simply by changing the text in the Title field.

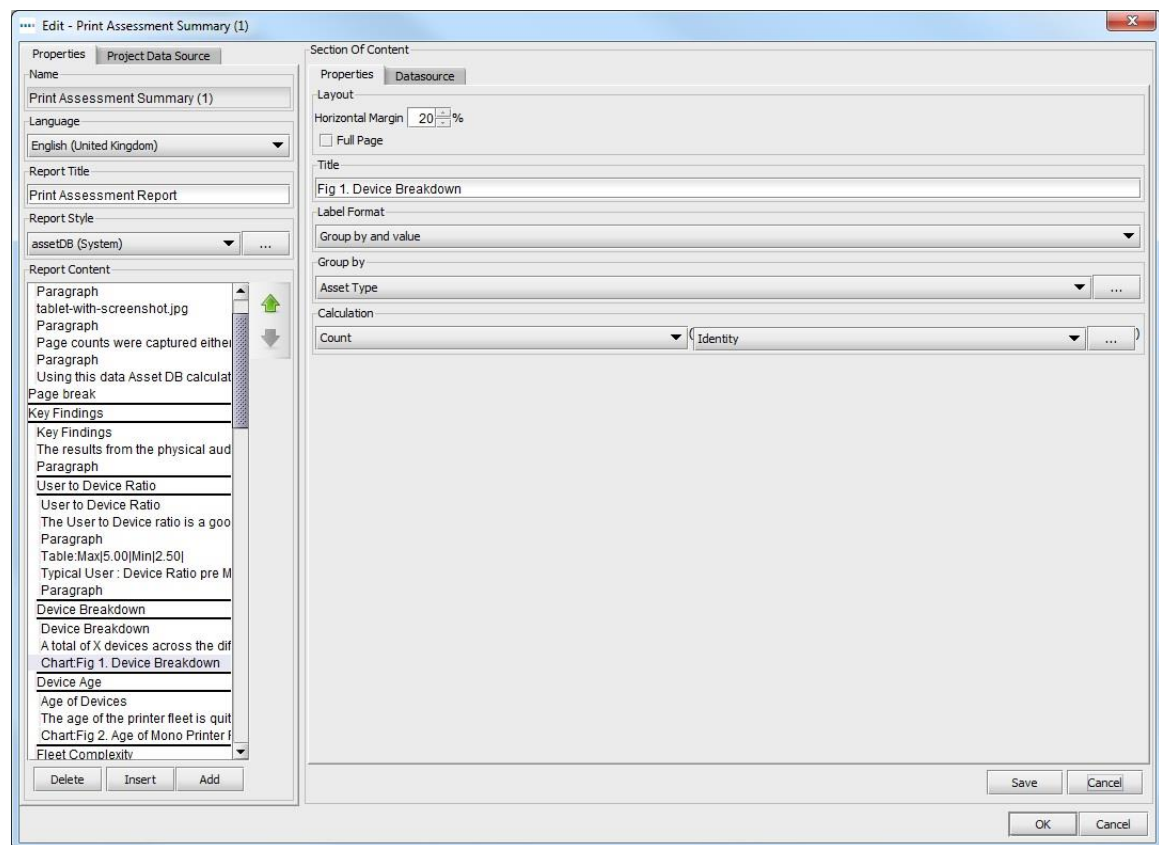


Figure 27. Editing a Pie Chart

The final physical feature of the Pie Chart to be determined before the data is edited is the label format. Within the Label Format drop down there are five options explained as follows:

Group By: The title of the data group (e.g. Printer/MFD/Fax for Asset Type)

Value: The value of the data group (e.g. the count or sum of a field)

Percentage: The percentage that each section is of the total chart

Group By and Value: The title and the value of the data group

Group By and Percentage: The title and the percentage of the data group

The label format for a chart can be changed by selecting a different option from the drop-down list.

The next option that can be edited is the data field from the icon customisation by which the data in chart will be grouped. This is selected in the Group By drop-down. The title of this field will then show on the chart label if one of the Group By options is selected.

The final stage is to set the calculation to determine the Value or Percentage associated with each group. A calculation will produce a single value per group based on one of the following operations:

Count: The number of values in a data field (i.e. total devices with a finisher)

Distinct Count: The number of distinct values in a data field (i.e. total distinct models)

Sum: The total of all values in a numeric field

Average: The average of all values in a numeric field

Lowest: The lowest value in a numerical field

Highest: The highest value in a numerical field

Standard Deviation: The measure of dispersal of your data

Variance: The variance between the lowest and highest value in a numeric field

First: The first item in a list of text values such as the first Asset Number

Once the calculation has been selected from the drop-down, you can then use the data field drop down to determine to which field the calculation should refer. For certain calculations there are restrictions around which fields can be chosen. Count, Distinct Count and First can be used for any field whereas all others can only be used for numeric fields.

These calculated values will then determine the outcome of the Pie Chart in the final report.

In addition to the above amendments that can be made to a Pie Chart, the Datasource for the chart can also be edited including filtering the data and creating custom fields. This is done using methods explained in Section 8.5.6.

8.7.2 Editing a Series Pie Chart

A Series Pie Chart in an Asset DB report allows multiple pieces of information to be displayed within the same Pie chart, each represented by its own Chunk of the pie. An example of this in the Print Assessment Summary Report is the Cost Summary by Mono/Colour. This allows two separate fields, Mono Cost and Colour Cost to be displayed as separate slices in the same pie.

A Pie Chart can be added or inserted into a report by selecting Add>Project Assets>Chart>Series Pie or Insert> Project Assets> Chart>Series Pie.

To edit the Series Pie, first select it from the Report Content list and click the Edit button. The first aspects of the Series Pie Chart to be edited are the physical features including the layout and Caption. These aspects are edited as per the method for a Pie Chart in Section 8.7.1. The Caption for a Bar chart appears below the chart but is edited just as the Title for the Pie Chart.

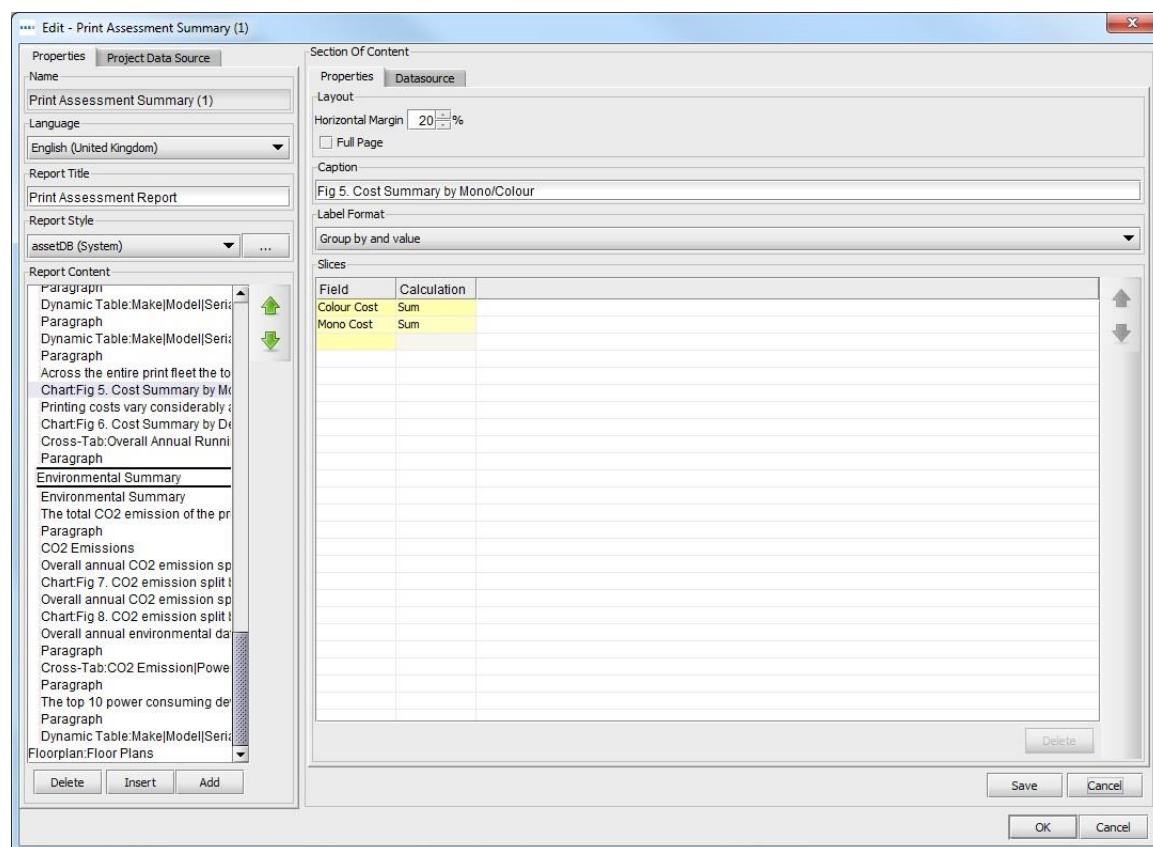


Figure 28. Editing a Series Pie Chart

The final physical feature of the Series Pie Chart to be determined before the data is edited is the label format. This is again edited as per the standard Pie Chart in Section 8.7.1.

The final stage is to amend each of the slices of the pie chart. Each slice consists of a data field from your icon customisation along with a calculation from the list below:

Count: The number of values in a data field (i.e. total devices with a finisher)

Distinct Count: The number of distinct values in a data field (i.e. total distinct models)

Sum: The total of all values in a numeric field

Average: The average of all values in a numeric field

Lowest: The lowest value in a numerical field

Highest: The highest value in a numerical field

Standard Deviation: The measure of dispersal of your data

Variance: The variance between the lowest and highest value in a numeric field

First: The first item in a list of text values such as the first Asset Number

As with the standard pie chart, certain calculations have restrictions around which fields can be chosen. Count, Distinct Count and First can be used for any field whereas all others can only be used for fields with numeric values.

First, select the required field for the slice by double clicking on the relevant cell in the Field column. You can then choose the desired field from the project's icon customisation. You can then select the calculation required to determine the value of that slice. This is done by simply selecting from the drop-down in the Calculation column.

In addition to the above amendments that can be made to a Pie Chart, the Datasource for the chart can also be edited including filtering the data and creating custom fields. This is done using methods explained in Section 8.5.6.

Once all changes have been made, they can be saved and previewed using the Save button.

8.7.3 Editing a Bar Chart

A Bar Chart within an Asset DB report is a standard bar chart where different outcomes of a data field are represented by bars in a cross axis chart with heights sized in relation to their value.

A Pie Chart can be added or inserted into a report by selecting Add>Project Assets>Chart>Bar or Insert> Project Assets> Chart>Bar.



The first aspects of the Bar Chart to be edited are the physical features including the layout and Caption. These aspects are edited as per the method for a Pie Chart in Section 8.7.1. The Caption for a Bar chart appears below the chart but is edited just as the Title for the Pie Chart.

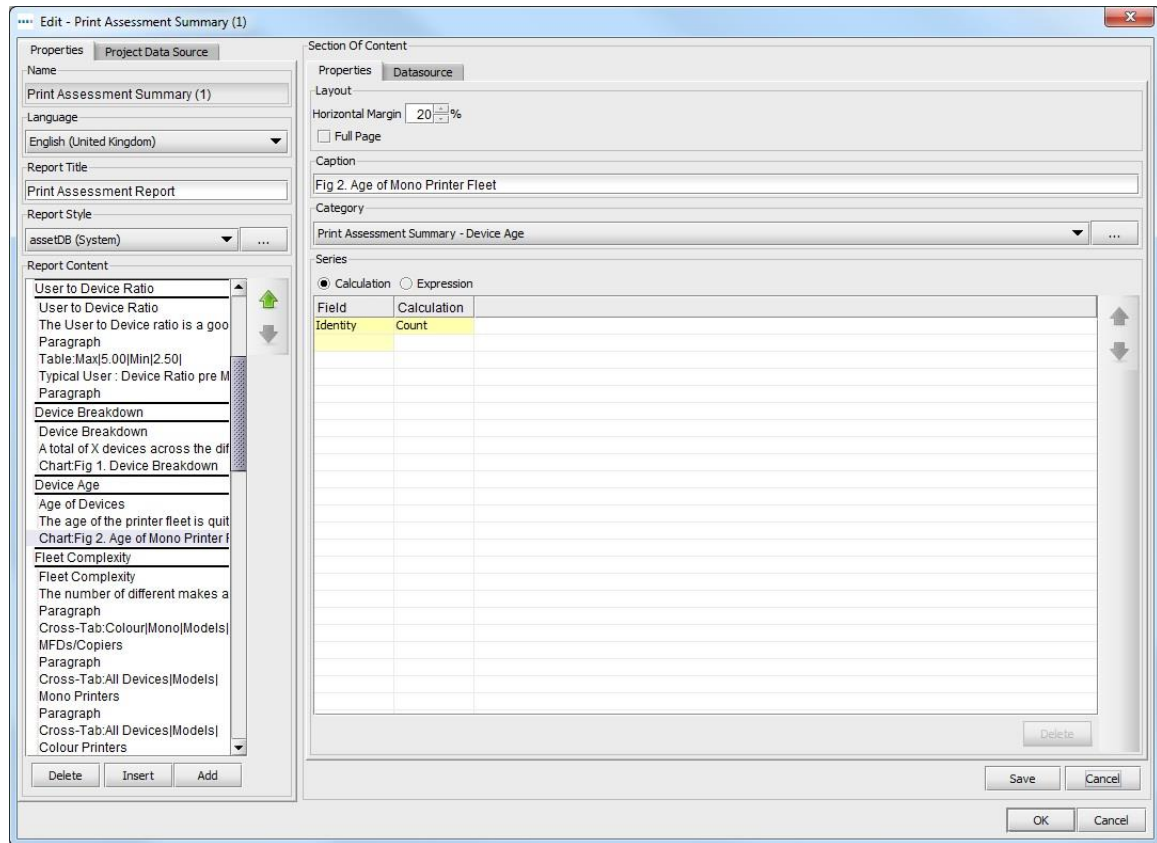


Figure 29. Editing a Bar Chart

The next aspect of the Bar Chart that can be edited is the X-axis of the chart. That is, the data field from the icon customisation by which the data in chart will be grouped. This is selected in the Category drop-down.

The final stage in editing a Bar Chart is to amend the Series. This will determine how many sets of bars the chart will contain and the data that will determine the size of each bar. There are two types of Series, Calculation and Expression. Multiple series can be created but each must be of the same type. The types of series are edited as follows:

8.7.4 Calculation

A calculation series will produce a single value per group based on one of the following operations:

Count: The number of values in a data field (i.e. total devices with a finisher)

Distinct Count: The number of distinct values in a data field (i.e. total distinct models)

Sum: The total of all values in a numeric field

Average: The average of all values in a numeric field

Lowest: The lowest value in a numerical field

Highest: The highest value in a numerical field

Standard Deviation: The measure of dispersal of your data

Variance: The variance between the lowest and highest value in a numeric field

First: The first item in a list of text values such as the first Asset Number

To edit an existing Calculation series or to add an additional series, first double click in the cell in the Field column. This will then allow you to choose a new field to which the calculation will refer. The type of calculation required from the list above can then be selected from the Calculation drop-down. For certain calculations there are restrictions around which fields can be chosen. Count, Distinct Count and First can be used for any field whereas all others can only be used for numeric fields.

8.7.5 Expression

An expression series allows the data within the project to be filtered further in order to create the bars. This will then create customised fields to show in the Bar Chart.

The first stage to edit an Expression Series is to edit the column name. This is done by double clicking the relevant cell in the Column Name column. You should then create the associated criterion/criteria. This is set using the methods explained in Section 7.

In addition to the above amendments that can be made to a Bar Chart, the Datasource for the chart can also be edited including filtering the data and creating custom fields. This is done using methods explained in Section 8.5.6.

8.8 Creating Virtual Assets Charts

In addition to the project assets charts mentioned above, each of the three chart types can be created as Virtual Assets charts to incorporate data from the project's Solution.

The three Virtual Assets charts are added or inserted into a report by selecting Add>Virtual Assets>Chart>Pie/Series Pie/Bar or Insert>Virtual Assets>Chart>Pie/Series Pie/Bar.



Once created, the chart can then be selected from the Report Content list and edited by clicking the Edit button. The charts can then be created using the processes explained in Section 8.7.

8.9 Changing the Report Order

To edit the order of a report, first select Reports>Design>Manage from the menu bar to open the report management window. Now select the desired report from the list and select Edit.

This will then produce the Edit Report window and the Properties tab (as shown in Figure 30) where we will make the changes to the report structure.

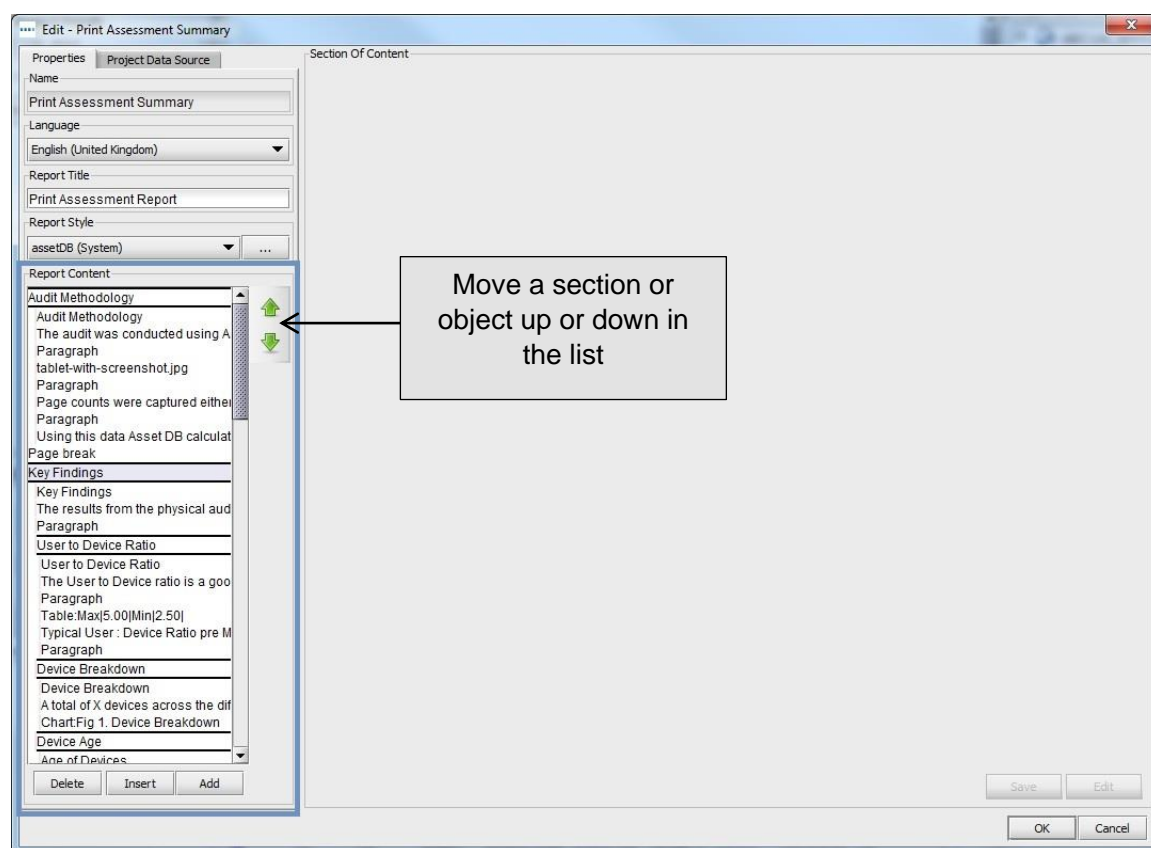


Figure 30. The Edit Project window – Properties tab

Within the properties tab you will then see the Report Content panel shown highlighted in Figure 30. This will list all of the sections of the selected report, in this case a copy of the Print Assessment Summary report. Section and sub-section names are wrapped with thick black lines and paragraphs, graphs and tables within that section are listed below.



A section can be moved to any other area within the report, a sub-section can be moved only within its section and an object (an image, paragraph, table or chart) can only be moved within its section or sub-section.

To move any item, first select the item in question from the Report content panel. For objects this will then show a preview of how that object will appear in the report and then use the up and down arrows to the right of the list to determine the new location of the item.

As well as being able to move objects around within the report, the Report Content panel will also allow us to remove a section or object from the report. This may be to avoid blank charts for missing data or to remove unwanted images or text for example.

To delete a section or object from the report, select the object from the list and then select the delete button at the bottom of the list.

Once you are happy with the new structure of your Report, your changes can be saved by clicking on the OK button at the bottom right corner of the Edit Report window.

9 Exporting/Importing Report Designs

An edited or created report structure can be exported from the Asset DB install in which it was created and hence shared with other Asset DB users. This will allow a single user within an organisation to create the report structures and all other users with an equivalent licence (full report editing capabilities) to be able to produce the same report without the need to re-run the copy/creation process.

A report structure is exported by selecting Reports>Design>Export from the menu bar. You should then select the desired report from the subsequent list and select Export which will produce a .rpt file.

To import a Report structure, navigate to Reports>Design>Import and then navigate to the saved .rpt file. This report can then be run for any project within your system.