



WHAT'S NEW AND RELEASE NOTES

Release: 2020.2

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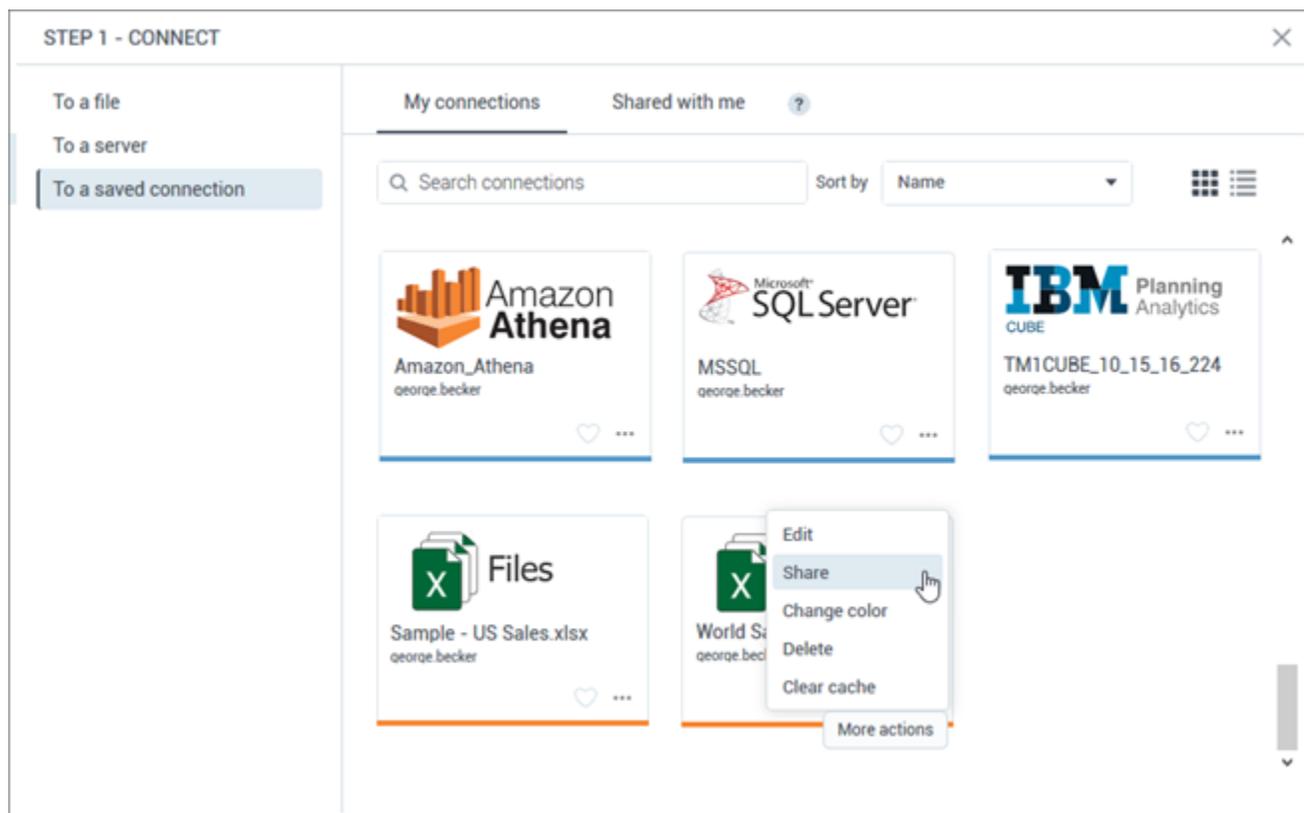
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NEW FEATURES AND IMPROVEMENTS

DATA PREPARATION

Reuse uploaded files to create multiple datasets

Now, users can reuse uploaded files as saved connections when creating new datasets. When a file is uploaded to the system, the file connection is added automatically in the **Data connections** pane. Afterwards, it can be used as any other connection. When managing a file connection, you can edit its name, share it with other users, set to cache it, clear its cache, categorize by color, or delete the connection.



Restrict the rows of data a certain user can see in a dataset

Previously, when dataset managers shared a dataset, all the data was visible to all dataset consumers. Now, a dataset modeler can use the Row Level Security (RLS) capability to add a security filter to specify which data rows any assigned consumer can access in the shared dataset. For example, if a dataset contains sales data for different regions, the row-level security (RLS) allows each manager to see only the data that is relevant to the corresponding region and not the whole dataset.

To add a row level data filter, you add one-line conditions and assign users to the corresponding subset of data. Each condition can have the same or different users or groups assigned. Only the data that matches all the conditions is visible to the assigned users.

SECURITY FILTERS ? ✕

Only the data that matches the conditions is visible to the assigned users. Each condition can have different users assigned. + CONDITION

Country ▾	is in list ▾	Canada ✕	👤 (1)
Country ▾	is in list ▾	France ✕	👤 (1)

CANCEL APPLY

Calculations: new functions for string phonetic encodings

To normalize inconsistencies between spellings for better matching (fuzzy matching between string values), users can now calculate phonetic encodings for string columns by using the following new built-in functions:

- **DOUBLEMETAPHONE(expr)** – Returns a phonetic encoding through the Double Metaphone algorithm. The algorithm removes silent letters, normalizes combinations of characters to a single formula, and removes vowels (if it is not a first letter). For example, **DOUBLEMETAPHONE('Floor Care')** will return **FLRK**.
- **METAPHONE(expr)** – Returns a phonetic encoding through the Metaphone algorithm. The algorithm removes silent letters, normalizes combinations of characters to a single formula, and removes vowels (if it is not a first letter). For example, **METAPHONE('Floor Care')** will return **FLRK**.
- **SOUNDEX(expr)** – Returns a phonetic encoding through the Soundex algorithm. The encoding is a four-character code based on the English word pronunciation. For example, **SOUNDEX('Floor Care')** returns the code **F462**.
- **REFINEDSOUNDEX(expr)** – Returns a phonetic encoding for the input string (expr) by using the Refined Soundex algorithm. The encoding is a refined Soundex code based on the English word pronunciation. For example, **REFINEDSOUNDEX('Floor Care')** returns the code **F27093090**.

The screenshot shows the 'CALCULATIONS' interface. On the left, there are two panels: 'Dimensions' with items like Location ID, Product ID, Sales Date, and Store Type ID; and 'Measures' with items like Discount, Entertainment Cost, Gross Sales, etc. The main area is for creating a calculation. It has a 'Calculation name' field, a 'Measure' dropdown, and a 'Type calculation' text area. Below that is a 'Search functions' field and a 'String' dropdown. A list of functions is shown, with 'REFINEDSOUNDEX' highlighted. Below the list, the function's description is provided: 'REFINEDSOUNDEX(expr) Returns a phonetic encoding for the input string (expr) by using the Refined Soundex algorithm. The encoding is a refined Soundex code based on the English word pronunciation. The algorithm is used to normalize inconsistencies between spellings for better matching (fuzzy matching between string values). Example: REFINEDSOUNDEX('Floor Care') = F27093090'. A 'SAVE' button is also visible.

Copying values from tabular preview

Now, users can right-click any cell on the tabular data previews and copy the respective value. This feature can be useful when adding values against which you want to filter the dataset or create security filters.

STEP 2 - REFINE ?

Sample - World Sales.xlsx

Sales Store Types Locations Products

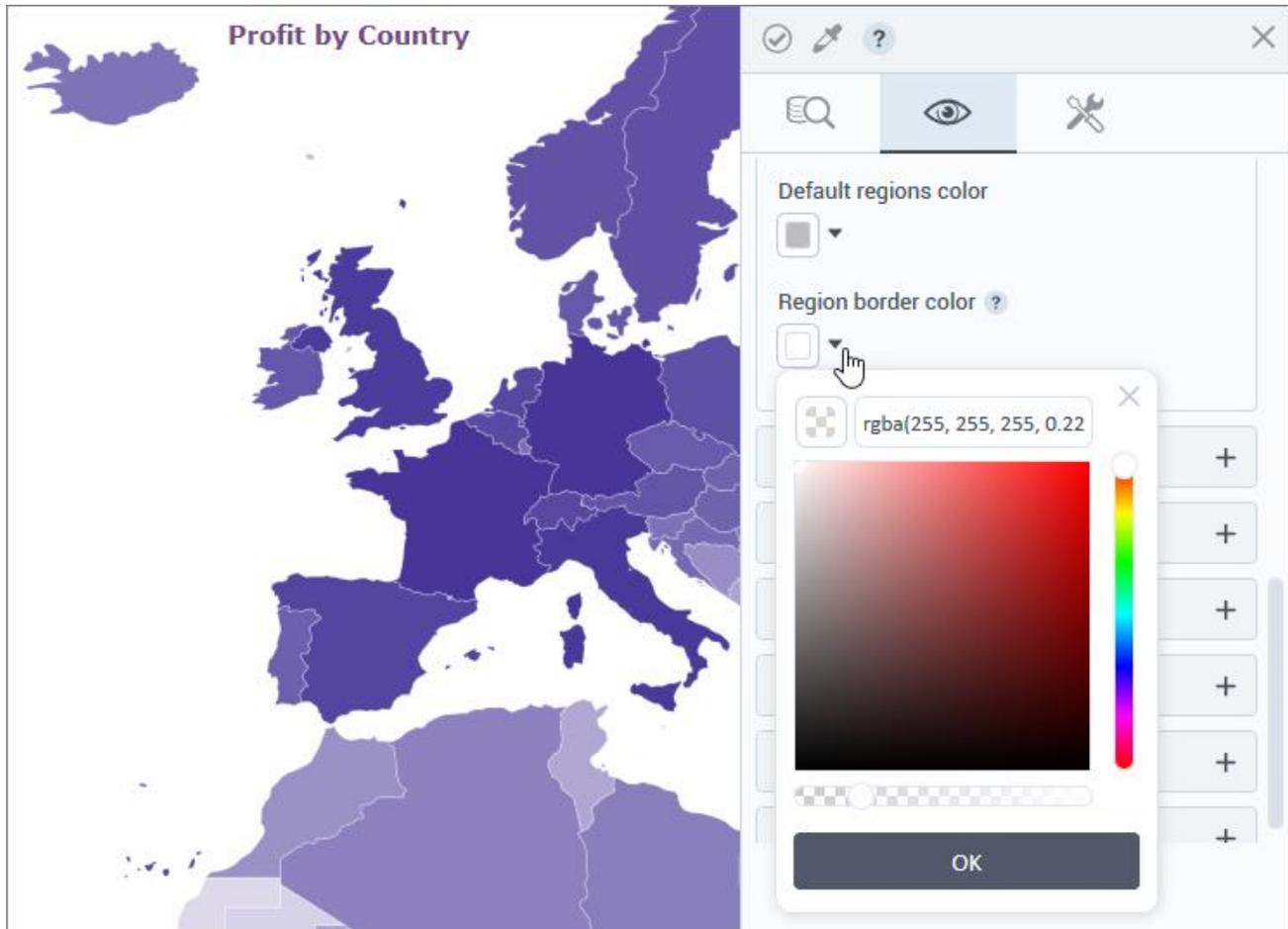
Location ID	Country	State Code	State	Region
abc		abc		
1	Mauritania	Mauritania	Mauritania	Africa
4	Mexico	Mexico	Mexico	South America
6	Azerbaijan	Azerbaijan	Azerbaijan	Asia Pacific
7	Albania	Albania	Albania	Southeastern Europe
9	Israel	Tel Aviv	Tel Aviv	Asia Pacific
10	France	Ile-de-France	Ile-de-France	Central Europe
12	Tunisia	Tunisia	Tunisia	Africa
15	Kosovo	Kosovo	Kosovo	Southeastern Europe
16	Cambodia	Cambodia	Cambodia	Asia Pacific
17	Canada	Ontario	Ontario	North America
18	India	Andhra Pradesh	Andhra Pradesh	Asia Pacific

Note: A 'Copy' tooltip is shown over the 'Ile-de-France' cell in the State Code column of the row with Location ID 10.

STORYBOARDS

Border color for regions on map visualizations

The new setting, **Region border color**, has been added to customize the borders of the regions on the geospatial visualizations. Users can set a color and the transparency level to match borders with background or visualization style.



Calculations: new functions for string phonetic encodings

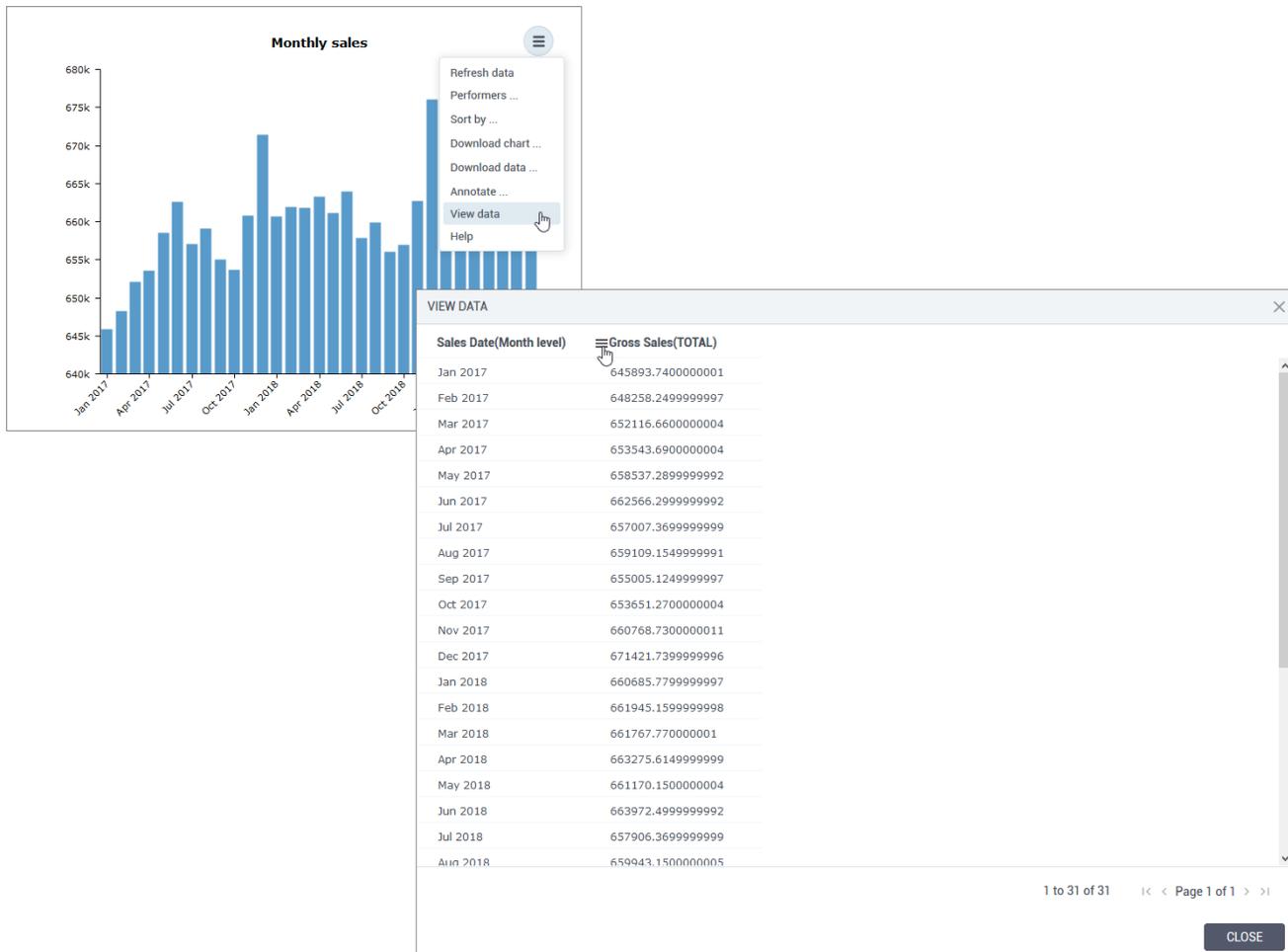
To normalize inconsistencies between spellings for better matching (fuzzy matching between string values), users can now calculate phonetic encodings for string columns by using the following new built-in functions:

- **DOUBLEMETAPHONE(expr)** – Returns a phonetic encoding through the Double Metaphone algorithm. The algorithm removes silent letters, normalizes combinations of characters to a single formula, and removes vowels (if it is not a first letter). For example, **DOUBLEMETAPHONE('Floor Care')** will return **FLRK**.
- **METAPHONE(expr)** – Returns a phonetic encoding through the Metaphone algorithm. The algorithm removes silent letters, normalizes combinations of characters to a single formula, and removes vowels (if it is not a first letter). For example, **METAPHONE('Floor Care')** will return **FLRK**.
- **SOUNDEX(expr)** – Returns a phonetic encoding through the Soundex algorithm. The encoding is a four-character code based on the English word pronunciation. For example, **SOUNDEX('Floor Care')** returns the code **F462**.
- **REFINEDSOUNDEX(expr)** – Returns a phonetic encoding for the input string (expr) by using the Refined Soundex algorithm. The encoding is a refined Soundex code based on the English word pronunciation. For example, **REFINEDSOUNDEX('Floor Care')** returns the code **F27093090**.

The screenshot shows the 'CALCULATIONS' interface. On the left, there are two panels: 'Dimensions' and 'Measures'. The 'Dimensions' panel lists 'Location ID', 'Product ID', 'Sales Date', and 'Store Type ID'. The 'Measures' panel lists various metrics like 'Discount', 'Entertainment Cost', 'Gross Sales', etc. The main area is titled 'Type calculation' and contains a search bar for functions, a dropdown for 'String', and a list of function buttons: 'POSITION', 'REFINEDSOUNDEX', 'REGEXP_LIKE', and 'REPLACE'. The 'REFINEDSOUNDEX' function is highlighted. Below the buttons, there is a description of the function: 'REFINEDSOUNDEX(expr) Returns a phonetic encoding for the input string (expr) by using the Refined Soundex algorithm. The encoding is a refined Soundex code based on the English word pronunciation. The algorithm is used to normalize inconsistencies between spellings for better matching (fuzzy matching between string values). Example: REFINEDSOUNDEX('Floor Care') = F27093090'. A 'SAVE' button is located at the bottom right of the main area.

View data displayed in a visualization

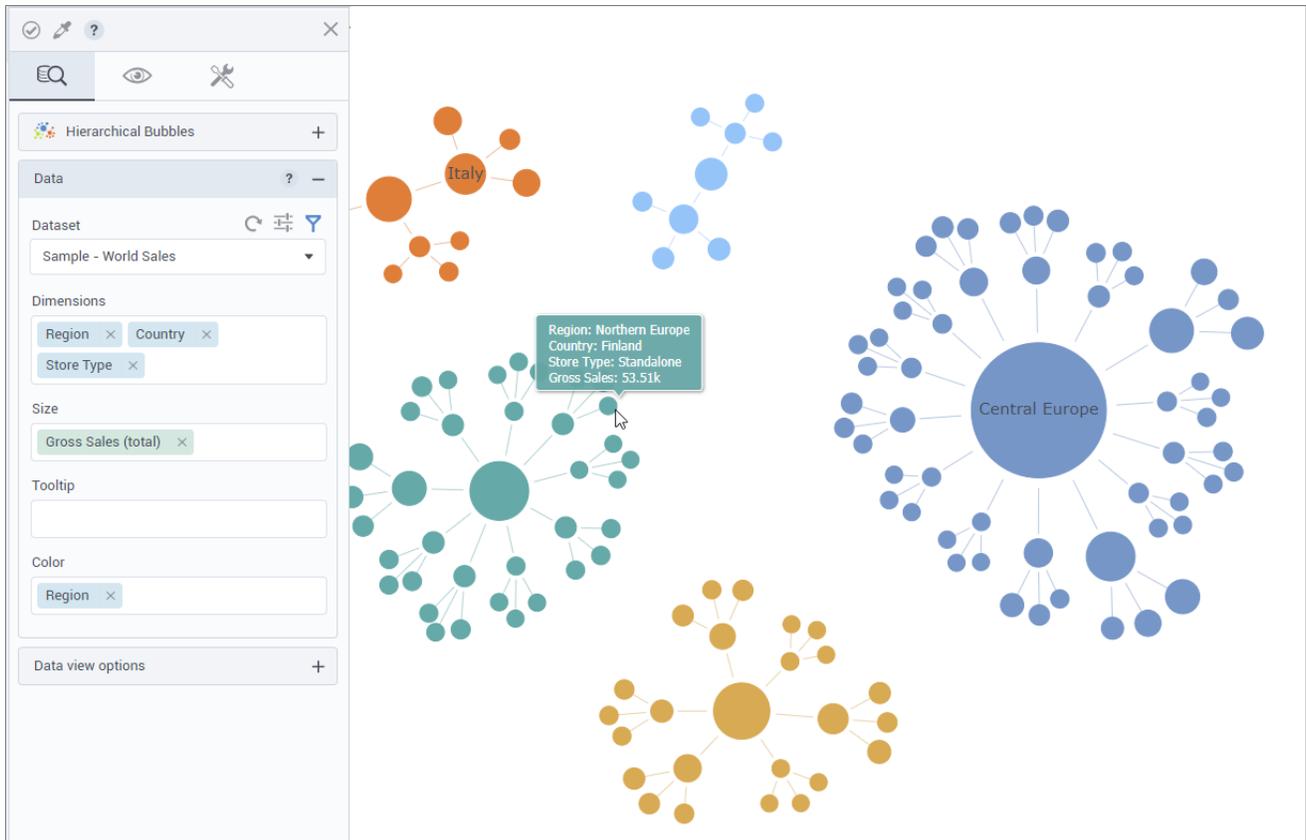
The underlying data of the generated chart has been redesigned to improve usability and interaction with the data. Clicking **View data** in the widget options will open the table with the columns selected in data fields for the visualization, on the **data** tab. Now, users can interact with the columns as in the Table widget: include and reinclude columns in the preview, search for a value in a column, filter the data in a column, and so on. If needed, users can also copy or export the table by using options of the right-click menu.



Hierarchical bubbles visualization (beta)

Now, users can benefit from the new Hierarchical bubbles visualization that shows hierarchical levels (dimensions) and the proportions (based on a selected measure) through a series of bubble nodes in a network-like structure. Also, users can color bubbles by a specified dimension.

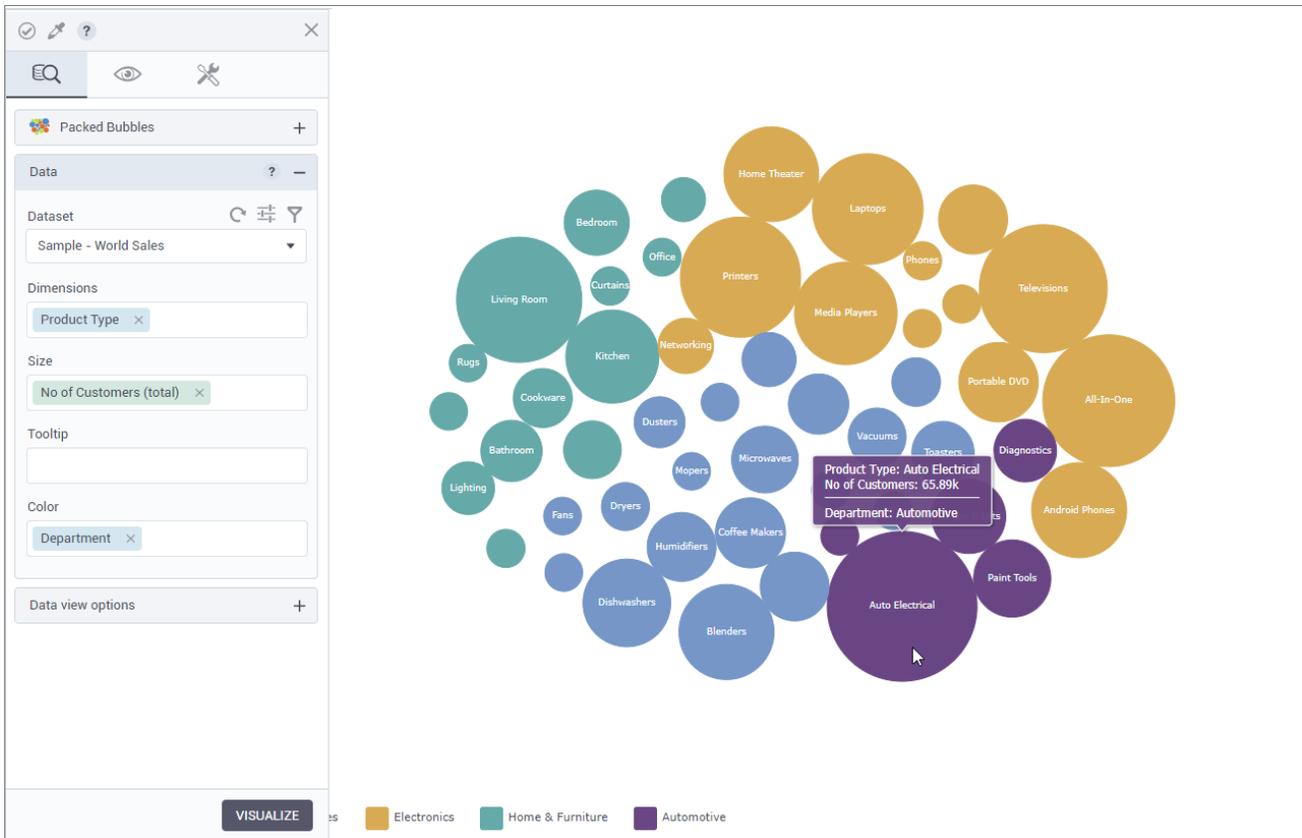
The **Hierarchical bubbles** visualization has been added under the **Network** section in the **Widgets** pane on the **Visualizations** tab.



Packed bubbles visualization (beta)

Now, users can benefit from the new Packed bubbles visualization that shows all the values of the specified dimension as bubbles, where the bubble size represents a specified measure. Also, users can color bubbles by a dimension.

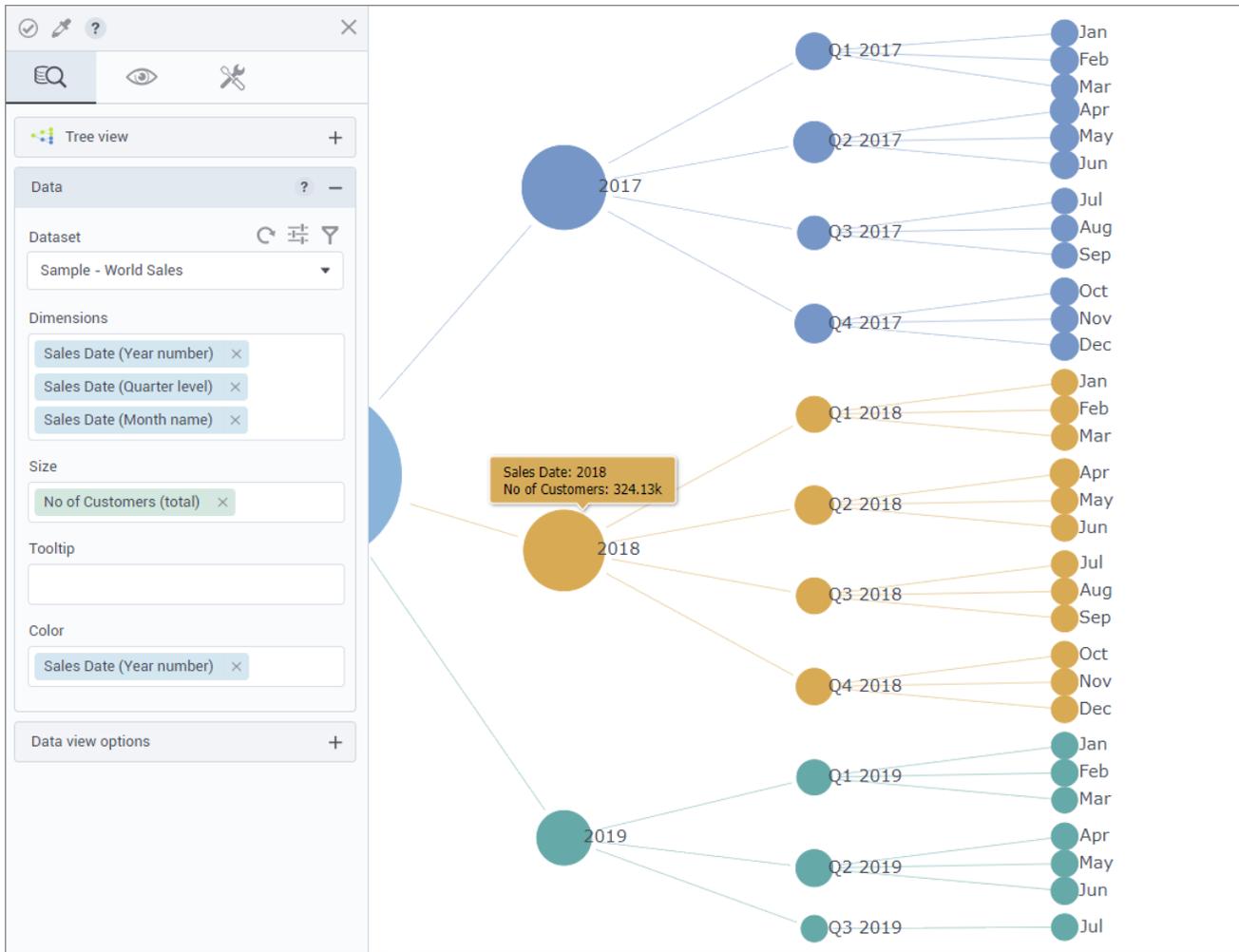
The **Packed bubbles** visualization has been added under the **Network** section in the **Widgets** pane on the **Visualizations** tab.



Tree view visualization (beta)

Now, users can benefit from the new Tree view visualization that shows hierarchical levels (dimensions) and the proportions (based on a selected measure) through a series of bubble nodes in a tree-like structure. Also, users can color bubbles by a specified dimension.

The **Tree view** visualization has been added under the **Network** section in the **Widgets** pane on the **Visualizations** tab.



Treemap visualization (beta)

Now, users can benefit from the new Treemap visualization. Treemaps are used to visualize the data in the shape of rectangles proportional in size to their value of the selected measure.

The **Treemap** visualization has been added under the **Area** section in the **Widgets** pane on the **Visualizations** tab.

