#### **EXPERIMENT-12**

AIM: Advanced visualization tools: using filters, using the detail panel, using the size panels, customizing filters, using and customizing tooltips, formatting data with colors.

Assign colors to marks

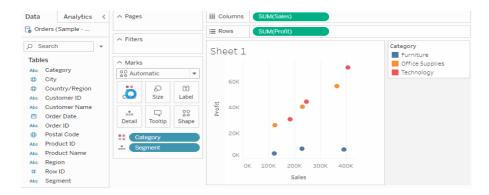
To assign a color to marks in the view, do one of the following:

• On the Marks card, click **Color**, and then select a color from the menu.

This updates all marks in the view to the color you choose. All marks have a default color, even when there are no fields on **Color** on the **Marks** card. For most marks, blue is the default color; for text, black is the default color.

• From the **Data** pane, drag a field to **Color** on the Marks card.

Tableau applies different colors to marks based on the field's values and members. For example, if you drop a discrete field (a blue field), such as Category, on Color, the marks in the view are broken out by category, and each category is assigned a color.



### Add tooltips to marks

Tooltips are details that appear when you hover over one or more marks in the view. Tooltips are also convenient for quickly filtering or removing a selection, or viewing underlying data. You can edit a tooltip to include both static and dynamic text. You can also modify which fields are included in a tooltip and whether you want to be able to use those fields to select marks in the view.

### Add a tooltip

- 1. Drag a field to **Tooltip** on the **Marks** card.
- 2. Click **Tooltip** on the **Marks** card to open the Edit Tooltip dialog box, where you can add text, rearrange the tooltip contents, and insert more fields.



## Change the size of marks

To change the size of marks in the view, do one of the following:

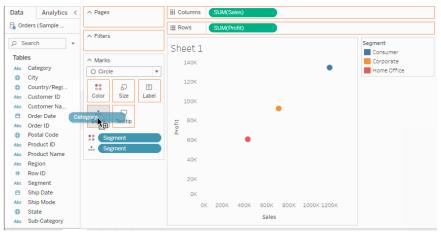
On the Marks card, click **Size**, and then move the slider to the left or right.



# Separate marks in the view by dimension members

To separate marks in the view (or add more granularity):

• From the **Data** pane, drag a dimension to **Detail** on the Marks card.



When you drop a dimension on **Detail** on the Marks card, the marks in a data view are separated according to the members of that dimension. Unlike dropping a dimension on the **Rows** or **Columns** shelf, dropping it on **Detail** on the Marks card is a way to show more data without changing the table structure.

### Filter Data from Your Views

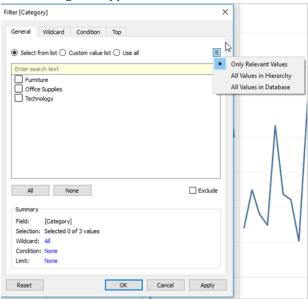
Tableau performs actions on your view in a very specific order; this is called the Order of Operations. Filters are executed in the following order:

- Extract filters
- 2. Data source filters
- 3. Context filters
- 4. Filters on dimensions (whether on the Filters shelf or in filter cards in the view)
- 5. Filters on measures (whether on the Filters shelf or in filter cards in the view)

### Filter categorical data (dimensions)

Dimensions contain discrete categorical data, so filtering this type of field generally involves selecting the values to include or exclude.

When you drag a dimension from the Data pane to the Filters shelf in Tableau Desktop, the following Filter dialog box appears:



• General: Use the General tab to select the values you want to include or exclude.

- Wildcard (Tableau Desktop only): Use the Wildcard tab to define a pattern to filter on. For example, when filtering on email addresses you might want to only include emails from a specific domain. You can define a wildcard filter that ends with "@gmail.com" to only include Google email addresses.
- Condition: Use the Condition tab in the Filter dialog box to define rules to filter by. For example, in a view showing the average Unit Price for a collection of products, you may want to only show the Products that have an average unit price that is greater than or equal to \$25. You can use the built-in controls to write a condition or you can write a custom formula.
- **Top**: Use the Top tab in the Filter dialog box to define a formula that computes the data that will be included in the view. For example, in a view that shows the average Time to Ship for a collection of products, you can decide to only show the top 15 (or bottom) products by Sales. Rather than having to define a specific range for Sales (e.g., greater than \$100,000), you can define a limit (top 15) that is relative to the other members in the field (products).