

Analysis of revenue in sales dataset:

- i) Create a choropleth map (fill the map) to spot the special trends to show the state which has the highest revenue.
 - ii) Create a line chart to show the revenue based on the month of the year.
 - iii) Create a bin of size 10 for the age measure to create a new dimension to show the revenue.
 - iv) Create a donut chart view to show the percentage of revenue per region by creating zero access in the calculated field.
 - v) Create a butterfly chart by reversing the bar chart to compare female & male revenue based on product category.
 - vi) Create a calculated field to show the average revenue per state & display profitable & non-profitable state.
 - vii) Build a dashboard
- Sales_06FY2020-21copy.csv
Link to Download the file - https://github.com/stanley-george-joseph/Customer-Analysis-Tableau/blob/main/sales_06_FY2020-21.csv.zip
Link to U Tube Video - <https://www.youtube.com/watch?v=x0hh11v1fmU>
Link to U Tube Video - https://www.youtube.com/watch?v=_qReGTOkTK

Create a choropleth map (fill the map) to spot the special trends to show the state which has the highest revenue.

- Change State to Geographical Role by clicking on Source file
- Double click on State
- Double click on Total
- Click on to Show Me and select Map

Create a line chart to show the revenue based on the month of the year.

- Double click on Month(If it is not the Dat Data Type, convert it to Date Data Type)
- Click on Month in the row shelf and change it to Month
- Double click on Total Click on to Show Me and change it to Bar Graph
- Select Line Graph from the Marks card

Create a bin of size 10 for the age measure to create a new dimension to show the revenue.

- Create a bin , make the bin size 10 give the name as Age Bin
- Double click on Age Bin
- Double click on Total
- Place Total in the Tool Tips

Create a donut chart view to show the percentage of revenue per region by creating zero access in the calculated field.

- Double-click on region

- Double click on Total
- Click on Show Me, Make it as Pie Chart
- Create a calculated field called Min(0) , give the name as Min(0), enter the value as 0
- Place Min(0) to the Column Shelf twice
- In the Second Marks card, remove all the Fields(That is pull it out), make the size of the circle smaller
- Make it as dual Axis
- In the second circle Marks card, change the color to white
- Place Region in the first circle Marks card
- Place Total to the first circle Marks card

Create a butterfly chart by reversing the bar chart to compare female & male revenue based on product category.

- Create Two calculated Fields , one is Revenue From Males and Revenue From Females.
Revenue From Males – formula is IF [GENDER] = “M” THEN [TOTAL] END
Revenue From Feles – formula is IF [GENDER] = “F” THEN [TOTAL] END
- Double click on Category
- Place the Newly created calculated Fields is Revenue From Males and Revenue From Females in the Column Shelf
- Type MIN(0) in the column Shelf and place it in between Revenue From Males and Revenue From Females
- In the Marks card corresponding to Min(0), change it from Automatic to Text
- Place Category to the Marks card corresponding to MIN(0)
- In the first graph Un check Show Header
- Also in the Min(0) also uncheck the header
- In the second graph remove the tick marks and give the title as category
- Reverse the first chart by clicking on to Edit Axis

Create a calculated field to show the average revenue per state & display profitable & non-profitable state.

Create a calculated field to show the average revenue per state & display profitable & non-profitable state

- Right-click anywhere in the Data Pane.
- Select Create Calculated Field.
- In the Calculated Field dialog box, give the calculated field a name like Avg Revenue per State.
- Enter the following formula to calculate the average revenue per state:

AVG([Revenue])

- Click OK to save the calculated field.

Categorize States as Profitable or Non-profitable

- Create Another Calculated Field:
- Again, right-click in the Data Pane and select Create Calculated Field.
- Name this calculated field Profitability Status.
- Define the Formula for Profitability:
- In the dialog box, enter a formula to check if a state is profitable or non-profitable based on the average revenue:

IF [Avg Revenue per State] >= [Threshold Value] THEN 'Profitable'

ELSE 'Non-Profitable' END

- Replace [Threshold Value] with a numerical value that represents your profitability threshold. For example, if a state with an average revenue above 50,000 is considered profitable, you can use 50000 as the threshold value:
- Click OK to save this new calculated field.

Visualize the Data

Create a View to Display Average Revenue:

- Drag State to the Rows shelf.
- Drag your newly created Avg Revenue per State calculated field to the Columns shelf. This will display the average revenue per state.

Add Profitability Status:

- Drag your Profitability Status calculated field to Color on the Marks card to differentiate between profitable and non-profitable states.
- Optionally, drag it to Text if you want to label the states as either profitable or non-profitable.
- Enhance the Visualization
- Customize the colors to clearly distinguish between Profitable and Non-Profitable states using the Color menu.

Creation of a Dashboard,

select Dashboard, and click on New Dashboard. Increase the size of the dashboard, make it 1500X800.

Instead of Tiled, make it as Floating. Also change the background colour of the Dashboard. Drag and drop each chart.

- Format the view as needed, and add labels to show the exact average revenue per state.





