Final Project

Interactive Sales dashboard on sales_06_FY2020-21.csv (download from Kaggle)

AS I proposed before in assignment#8, I selected this sales file to create a dashboard in Tableau which I did not have any experience before. I explain step by step:

1-First of all, I uploaded simply CSV file in Tableau and data is seen on **data source tab**, before starting design any diagram, I just explored the data and came to these graphs to create, but I understood in Tableau, the diagrams should be created first and after that put on the dashboard page.

Besides the data source tab, can create worksheets for each diagram (like excel) and at the end, I can have dashboard page, anyway, my diagrams are:

1. Revenue per State - -> bar | map

2. Revenue based on Month of the year --> Line chart

3. Revenue based on Age --> Histogram Bar

4. Quantity - Discount Percentage Correlation --> heat map | scatter

5. Percentage of Revenue per Region --> Pie chart

6. Revenue per Category per Gender --> pyramid | butterfly chart

7• Create the dashboard

First diagram: Revenue per State, I just mention the steps in a row:

1-Rows -> State, Columns -> Total

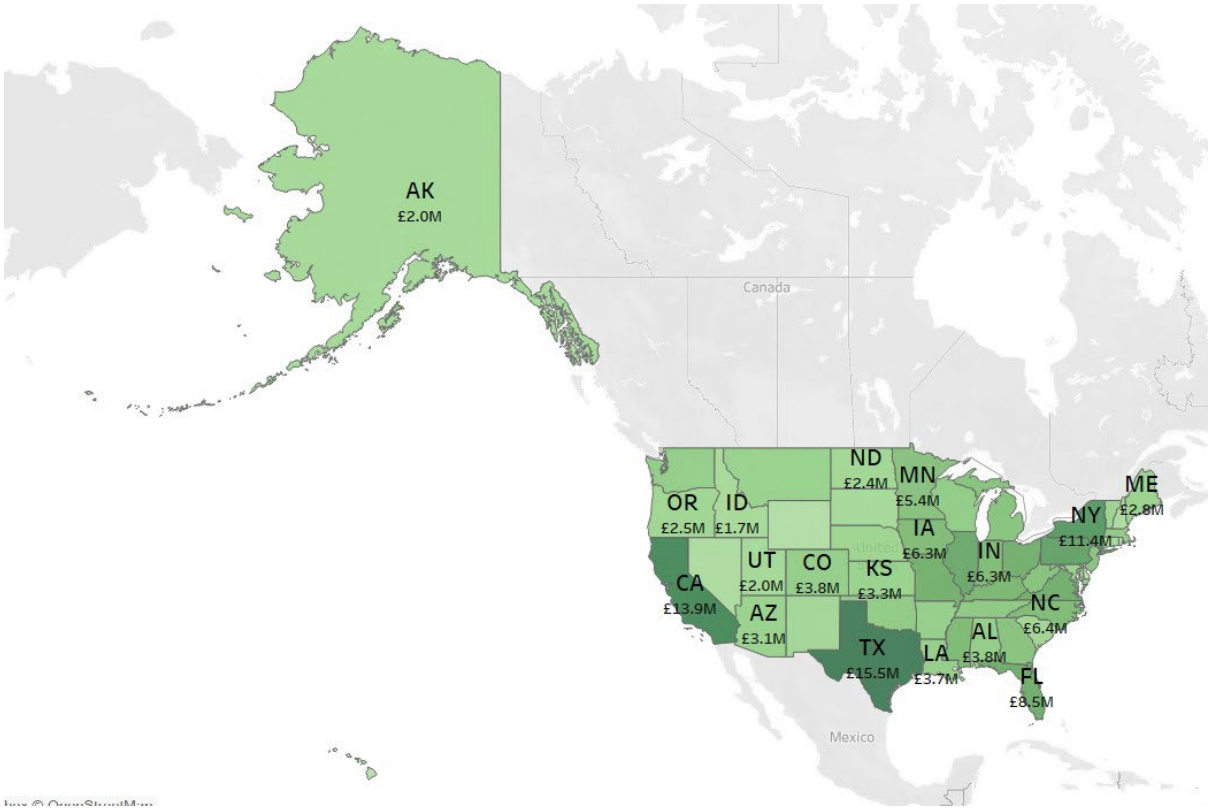
2- Automatically created bar chart horizontal, use swap on the menu to convert to vertical.

3-Use map chart on the right.

4-Keep CTRL key and drag the State and sum (Total) to Labels to have label on the map

5-Using format to change showing sum (total)

6-Use colour and change it to Green



The colour and numbers show the place and amount of revenue.

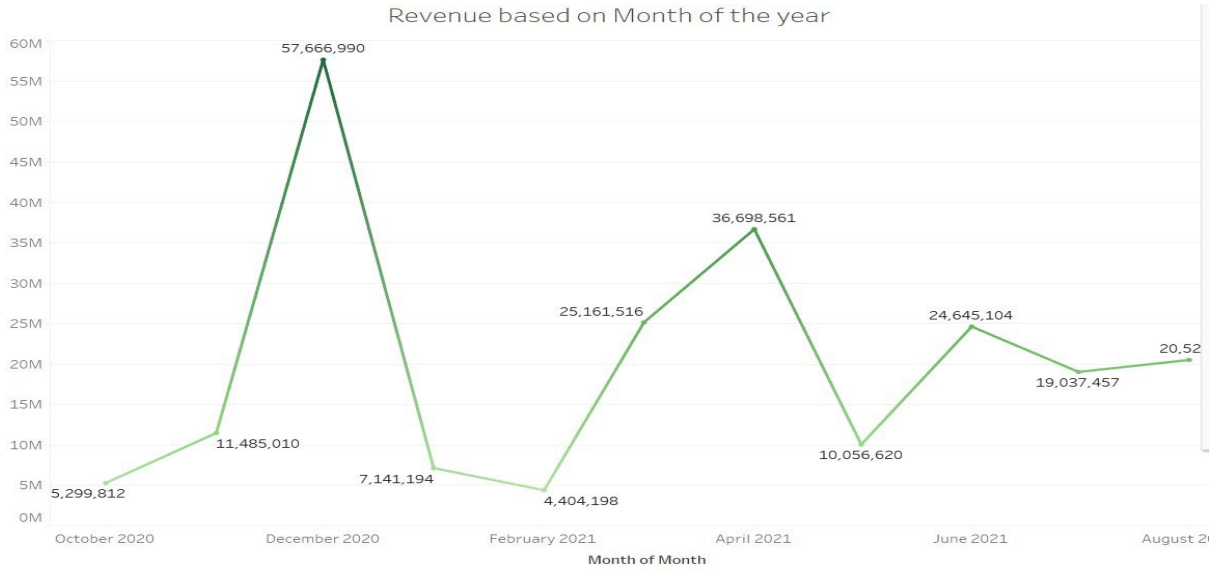
Second Diagram: Revenue based on Month of the year

1-Drag Year in columns and Total in rows.

2-Some changes on Year to have month.

3-Use line chart

4-Drag sum (Total) to label and colour to have labels and changing colour according to top and down prices.



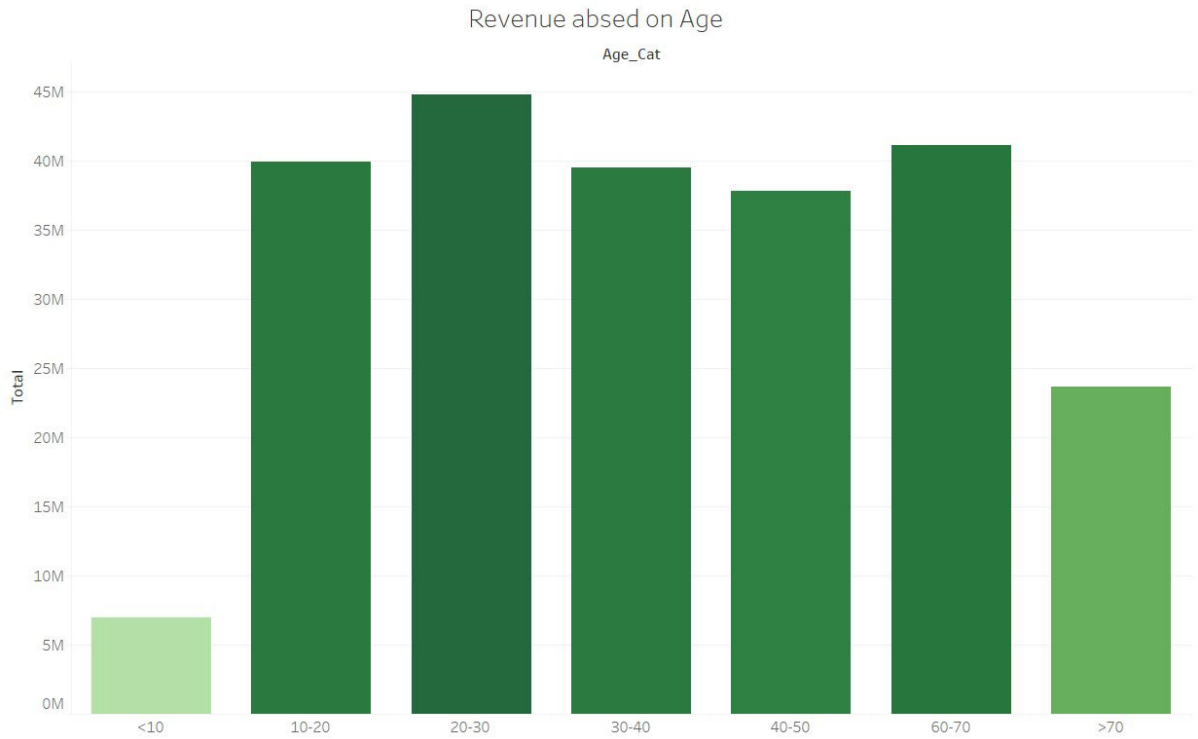
The colour and numbers show amount of revenue and max and min.

Third diagram: Revenue based on Age

1-Drag Age and Total on rows and columns, but variety of age makes something wrong because use aggregation function on Age.

2-Select Age on the left panel and try to create bins and set it with Edit Alias to have categories. When I created Age_Cat, it was placed on table section and not in measures and used it.

3-Keep Ctrl key and drag sum (Total) to colours and have colours according of frequency of age and sale.



The colour and numbers(yaxis) show amount of revenue in each category of age.

Forth diagram: Quantity - Discount Percentage Correlation

1-Drag Quantity and Discount Percentage on the rows and columns and show nothing!

2-Right-click on the measures(both) and select Convert to Dimension.

Dimensions contain qualitative values (such as names, dates, or geographical data). I can use dimensions to categorize, segment, and reveal the details in my data. Dimensions affect the level of detail in the view. Measures contain numeric, quantitative values that you can measure.

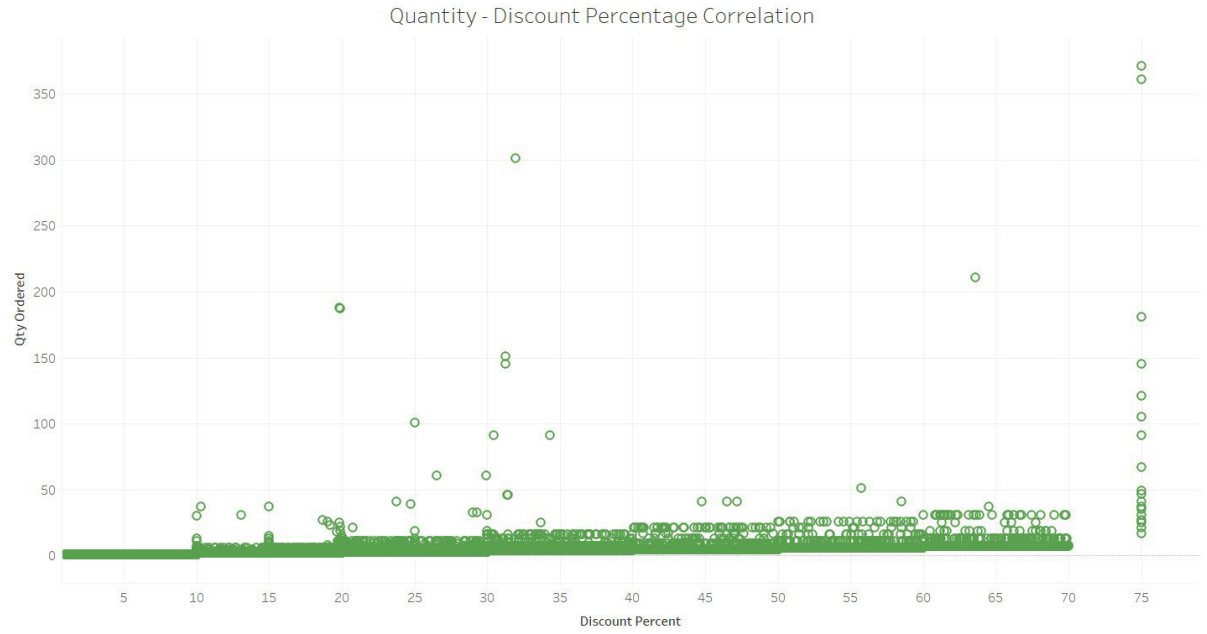
3- Now it is seen the diagram.

4-Swap rows and columns to show a clear diagram

5-Discount value 0 is meaningless, so keep CTRL key and drag discount on the filter and set starting from 1.

6-**More discount, more sale is shown in the diagram.**

7-Set selected colour



Fifth diagram: Percentage of Revenue per Region

1-Drag Region and Total on the columns and rows.

2-Showing bar chart, change from right hand to Pie Chart and select Entire View from the top menu.

3-Keep CTRL key and drag the both Region and Total to the labels and with using format I changed the prices format.

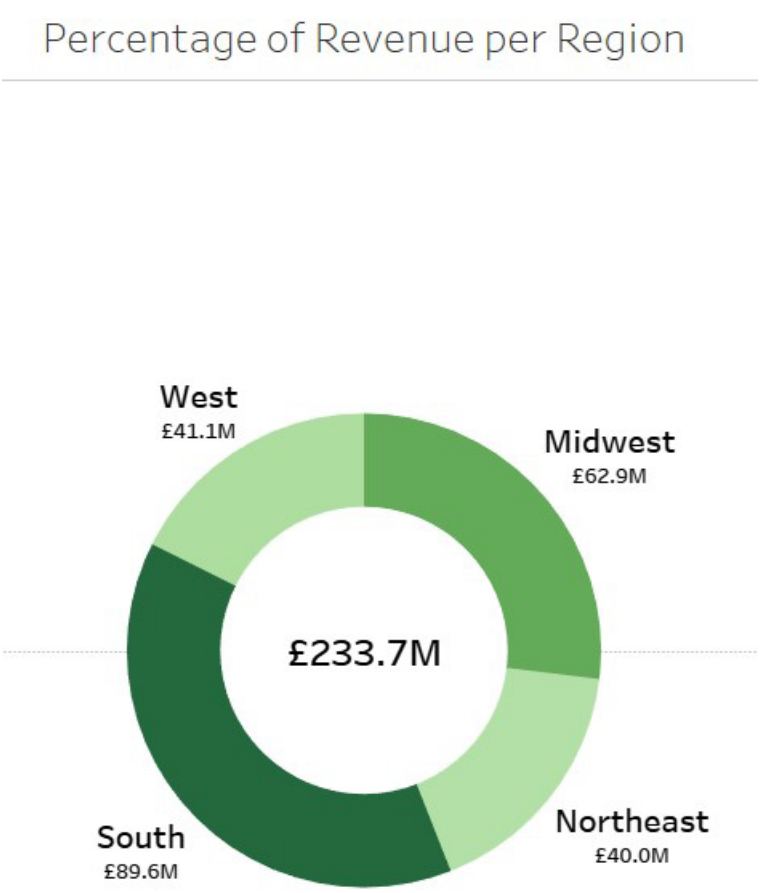
4-To have Doughnut Chart, Tableau does not have it, create a calculated field and set name Zero_Axis and just put 0 in formula part.

5-Drag Zero_Axis to rows, copy and duplicates on the row and now are shown two Pie Charts.

6-In below graph drag all the filters out, now it is seen a grey circle, now make top Pie Chart bigger.

7-On the below section, click on the axis and select dual axis, now we have Doughnut Chart and can set white colour on it to have white in the middle.

8-Set the Total on the middle, drag Total to the label on below graph and format.



The colour and numbers show amount of revenue in each region.

Sixth Diagram: Revenue per Category per Gender

1-Drag Gender and Category to rows and Total on columns.

2-Create 2 calculated field with the name of **Female Revenue and Male Revenue** with this formula

IF [Gender]='F' THEN [Total] END

IF [Gender]='M' THEN [Total] END

3-Take the Gender from rows and put these 2 calculated fields on the columns.

4-Now using again Zero_Axis and drag between Female Revenue and Male revenue in columns.

5-Drag Category to the label of Zero_Axis and select text item.

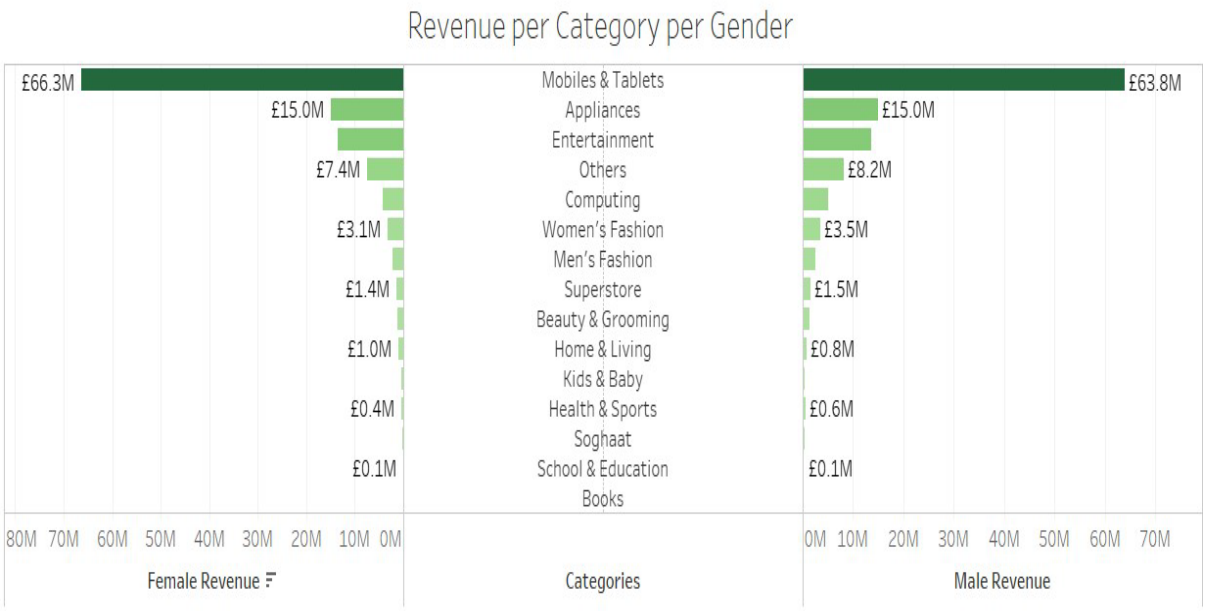
6-Right click on category on the left hand and untick show header.

7-Right click on the axis of Female Revenue and select revers.

8-Select sort on the top menu for both section Female and Male.

9-Keep CTRL and drag **Female Revenue and Male Revenue** to colours buttom

10- Entire view selection from top menu



The colour and numbers show amount of revenue in genders.

Design Dashboard

1-Select size on the left side 1300 * 800

2-Tick Show Dashboard Title on the left, down side and select colour and setting header.

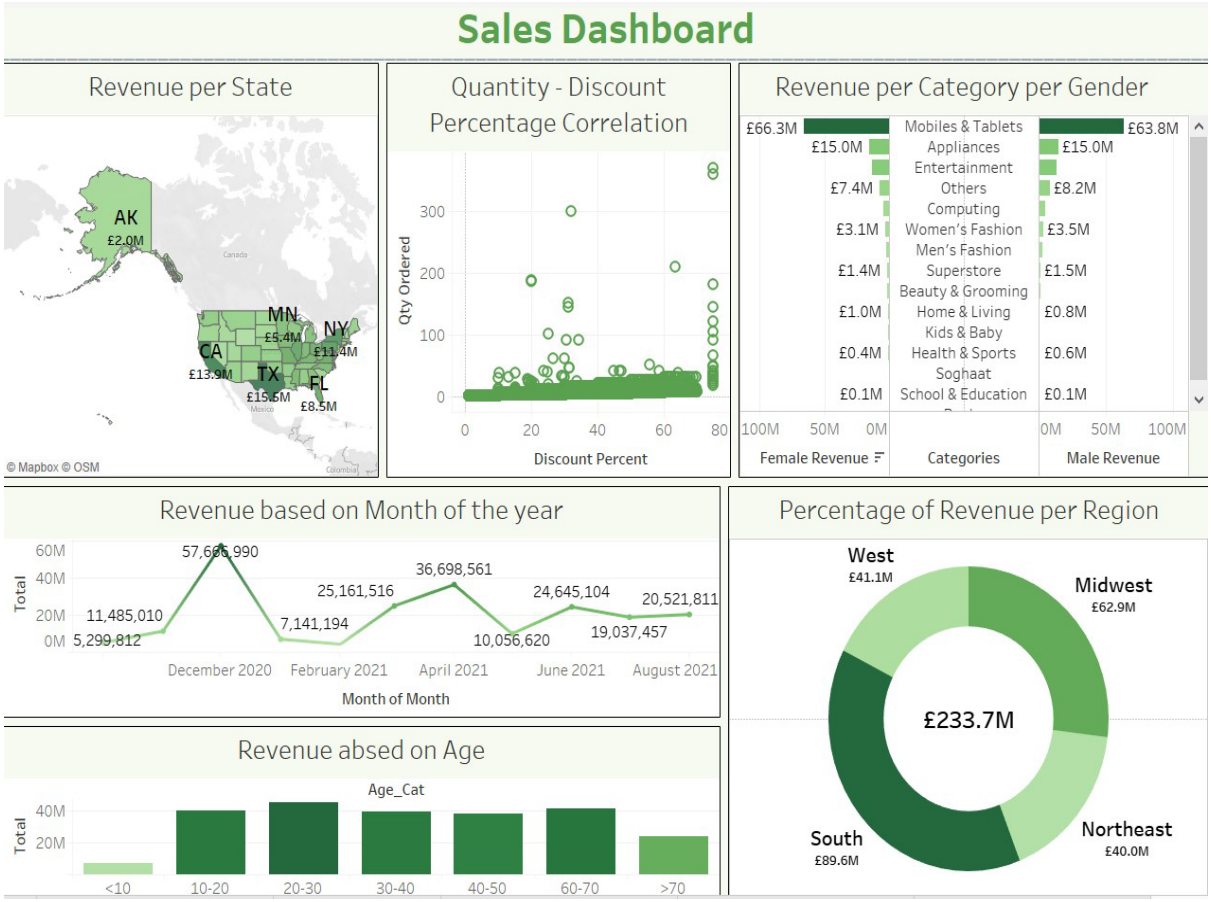
3-Put a vertical container on page and after that some horizontal containers.

4-Put the diagrams on the dashboard.

5-Change the title and set centre alignment for them and border (Divider) to separation.

6-Each diagram on the right hand, select the filter (Do not use as a filter) to be interactive with other diagrams.

7-Now we have Dashboard and interactive.


Sales Dashboard
Revenue per State
AK
£2.0M
MN
£5.4M
NY
£11.4M
CA
£13.9M
TX
£15.6M
FL
£8.5M
© Mapbox © OSM
Quantity - Discount Percentage Correlation
Qty Ordered
Discount Percent
Revenue per Category per Gender
£66.3M
£15.0M
£7.4M
£3.1M
£1.4M
£1.0M
£0.4M
£0.1M
Mobiles & Tablets
Appliances
Entertainment
Others
Computing
Women's Fashion
Men's Fashion
Superstore
Beauty & Grooming
Home & Living
Kids & Baby
Health & Sports
Soghaat
School & Education
£63.8M
£15.0M
£8.2M
£3.5M
£1.5M
£0.8M
£0.6M
£0.1M
Female Revenue
Categories
Male Revenue
Revenue based on Month of the year
Total
11,485,010
57,666,990
5,299,812
7,141,194
25,161,516
36,698,561
10,056,620
24,645,104
19,037,457
20,521,811
December 2020
February 2021
April 2021
June 2021
August 2021
Month of Month
Percentage of Revenue per Region
West
£41.1M
Midwest
£62.9M
£233.7M
South
£89.6M
Northeast
£40.0M
Revenue absed on Age
Age_Cat
Total
<10
10-20
20-30
30-40
40-50
60-70
>70