Data visualizations (matplotlib and Tableau) tools -> insights:

Tableau can handle large volumes of data quickly. It is faster and provides extensive features for visualizing the data. dragging and dropping Measures and Dimensions onto these different Shelves. Rows and Columns: Represent the x and y-axis of your graphs/charts. Filter: Filters help you view a strained version of your data.

1. working with different data sources

Load data: loading the data can be done from flat files like excel, json or from data servers like Tableau server, microsoft sql, mysql, oracle etc.

1. Developing Marks cards

measures, dimensions, pages(filters), marks

When you drag and drop fields onto the visualization area, Tableau makes default graphs for you, as we shall see soon,

confused by the different colors of the fields that you see. Just remember one small trick: Blue means Discrete and Green means continuous.

And finally, there is Show Me, the brain of Tableau!

Skills learned - Publishing viz, developing,charts(line, histogram, scatter),

Dashboards,Heat maps Density Maps, Geographical Search, hierarchies, Gnatt chart, Field and chart types, calculations

Gnatt chart: as soon as you selects appropriate dimensions and measures the show me populates the gnat start its is basically to track the duration of activity

**Explain your experience with data visualization tools?**

Kingcountysales dashboard -----🡪 ATM analytics project (this project mainly foused on predicting the exact amount of money requires to withstand in an ATM’s, refilling money in ATM’s machines, lot of withstanding amout of money in ATM’S) -> heat map to see the performance of the atm’s how any highest withdrawls are happening at which ATM’S, total amount of money that is inserted into a particular ATM in a state, city,region, -> Maps

Date field considered as a string so right click and change the type to date

**Marks card (Line chart)**

Change the color of the line chart using color on the marks card, proper title and also give the sheet name and also right click on the plot to format the colors of the visualization to purple and also right click on the sheet select format and there you can remove grid lines, axis ticks also remove this.

**Maps:**

For Maps(zip code, latitude, longitude) -> Tableau is really smart it uses geocoding to plot the values on a graph -> little earth symbol besides -> double clicking on the zip code automatically generates the maps -> edit locations and set the country to US -> Map on the top of the board and select background layers to set streets -> color to be based on the price select the price and drag it to the colors in the marks pane. (color pallet – sunrise-sunset diverging) -> at the side you get a card showing the color you can hide the card for now.

**Histogram(barchart):**

You can also edit the tooltip option on the graph, edit title axes, color. In order to create a histogram, you just the variable you want to do the histogram and go to show me options it gives the histogram option to select. And also, if you want to generate similar charts you can use copy formatting option from the previous chart.

**HeatMap:**

View and condition and sort the values Manual, automatic in alphabet manner. In order to generate the heatmap first select the price variable for color indicator and the price variable also as Label in Marks pane to get the price label and also you need to select the square option in order to resemble the heatmap. (select the marks from automatic to square)

**Building Filters: (calendar widget)**

Create calendar week(date) against day(week) and then filter based on the particular month apply color based on avg price and label data based on day of the date.

**Building Dashboard:**

Select the dashboard and set the dimensions of the dashboard drag a blank object, horizontal containers and vertical containers and after that right click on them to select filters and make to fixed dimensions and also click apply to part

**Publishing Dashboard:**

**Save to tableau public if any one want to see it I can share the link you can also download the .tblx file and share it to the collaborators, if they have the same tableau license they can edit it**