TOPIC: “OPEN SOURCE DATA VISUALIZATION”

Presented By:

TRIBE – M

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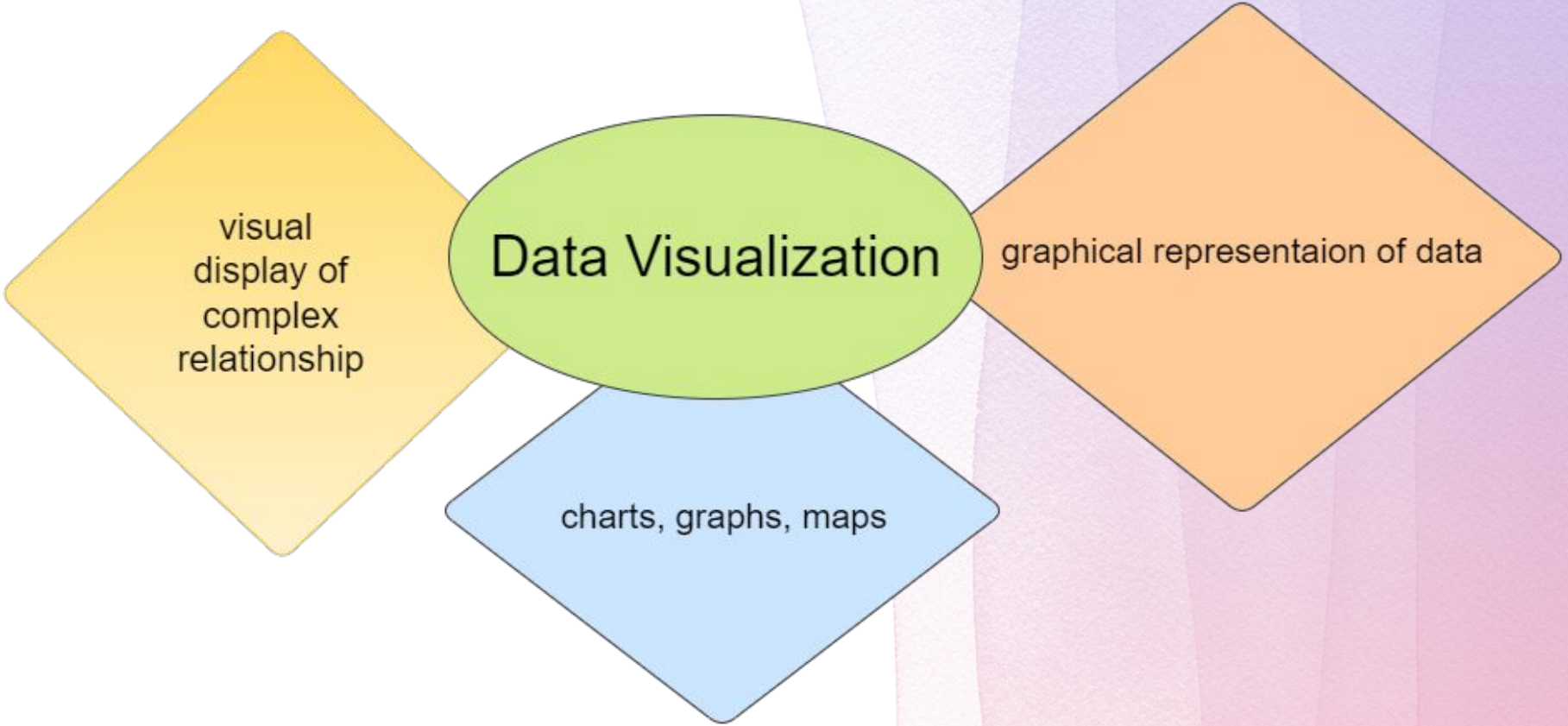
PRODEVANS

WHAT IS DATA VISUALIZATION?



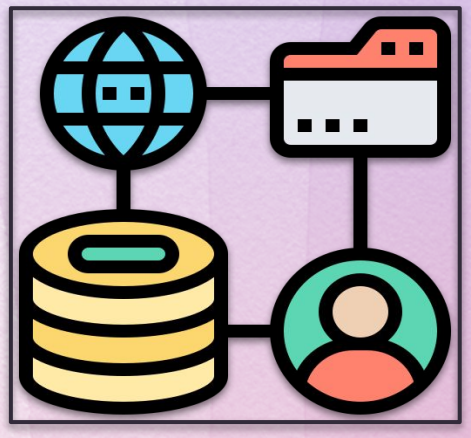
PURPOSE OF DATA VISUALIZATION

- Data visualization is essential to analyze massive amounts of information and make data driven decisions.
- Management also applies it to convey organizational structure and hierarchy.
- Data Analysts and Scientists study and explain the trends and pattern.

WHY DATA VISUALIZATION?

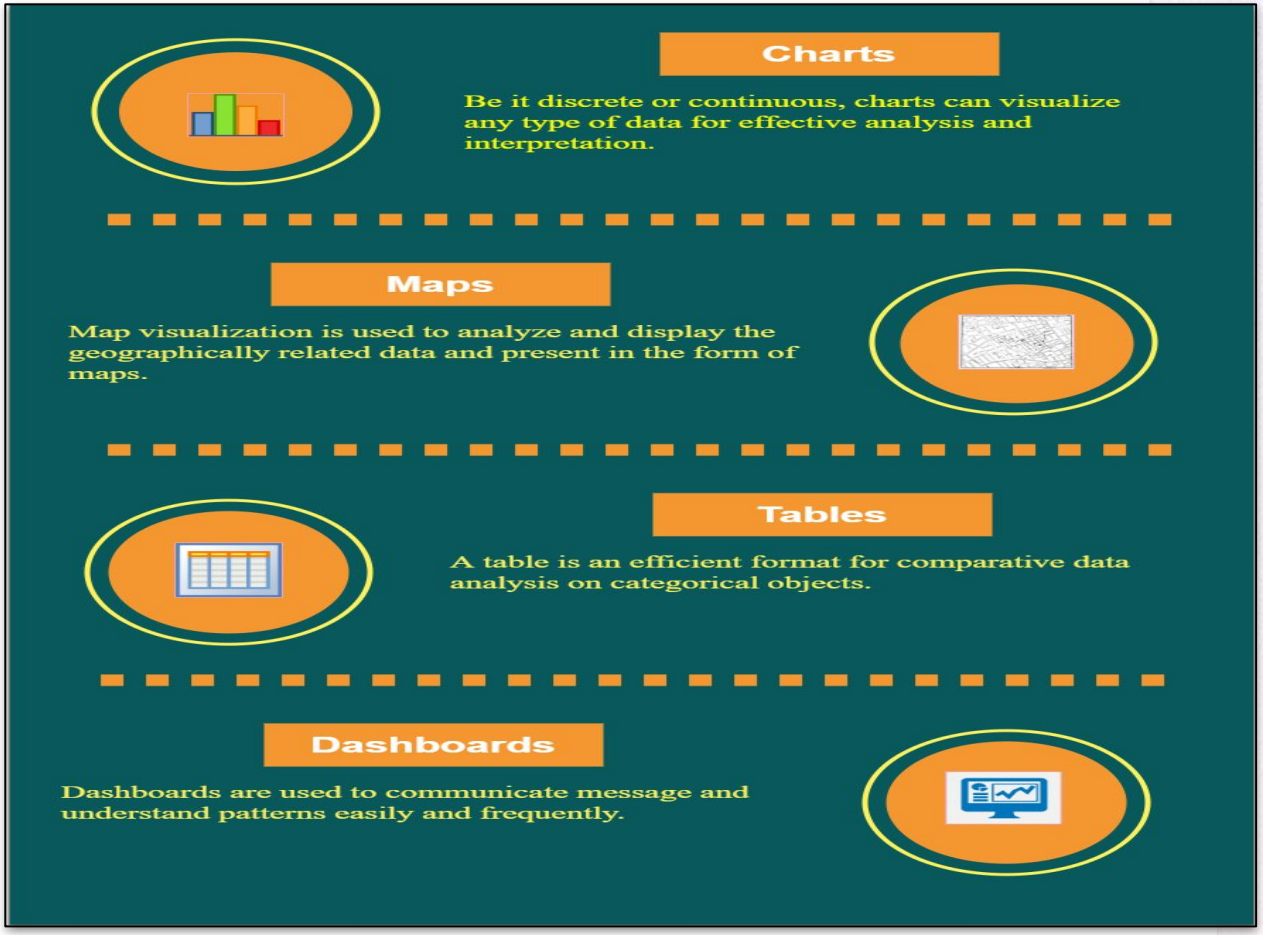
Analysis of data

Faster Decision making



Make sense of complicated data

TYPES OF DATA VISUALIZATION



Open Source Data Visualization Tools

Open source libraries provide a way for analysts to present data in an interactive way.

- **D3.js:**

  It is a javascript library producing dynamic, interactive visualization in web browsers

- **ECharts:**

  A charting library which offers an easy way to add highly interactive and customizable charts.

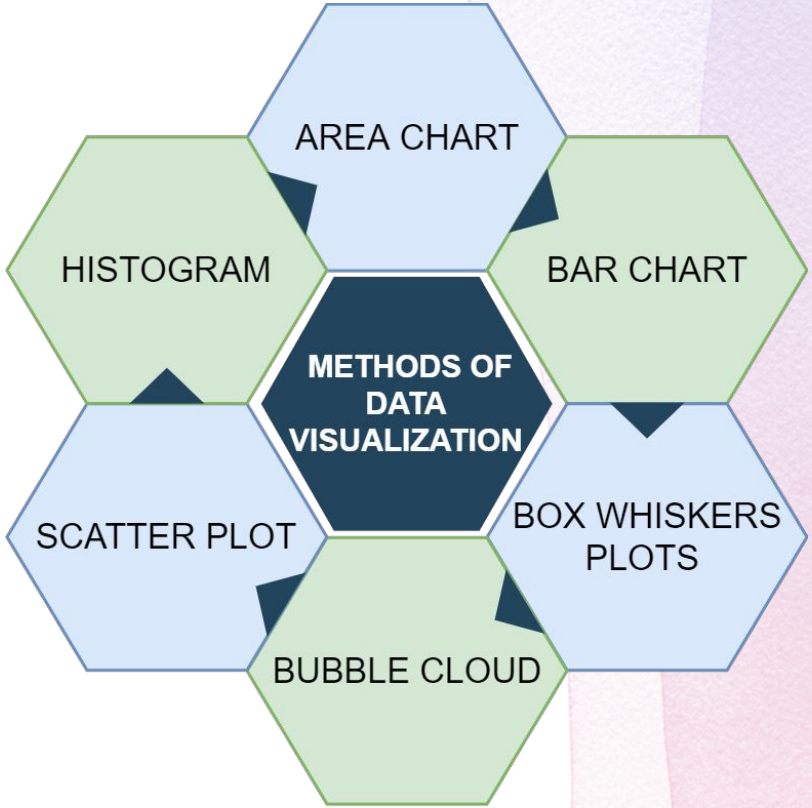
- **Vega:**

  provides support to customize visualization across large dataset which are accessible from web.

- **deck.gl:**

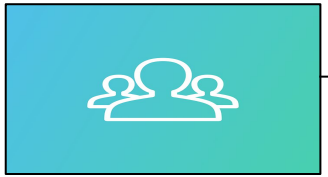
  A framework, which is used for exploratory data.

Some Specific Methods Of Data Visualization



HOW IT WORKS?

Client/User



imports a file into a tool
Eg: .csv, excel etc

Validate the file format and data set

Generate the appropriate graph on dashboards

PROBLEM STATEMENT

“ We have a client who wants to set up his own restaurant in Bangalore city. He wants to know how it can be profitable to him by setting up the restaurant.”

SOLUTION:

We visualized the given dataset and analyzed the different restaurant's ratings, total votes given, average bill for two people, availability of facilities like online_ordering, table_booking and we tried to build a dashboard so that our client can get clear idea about setting up his restaurant.

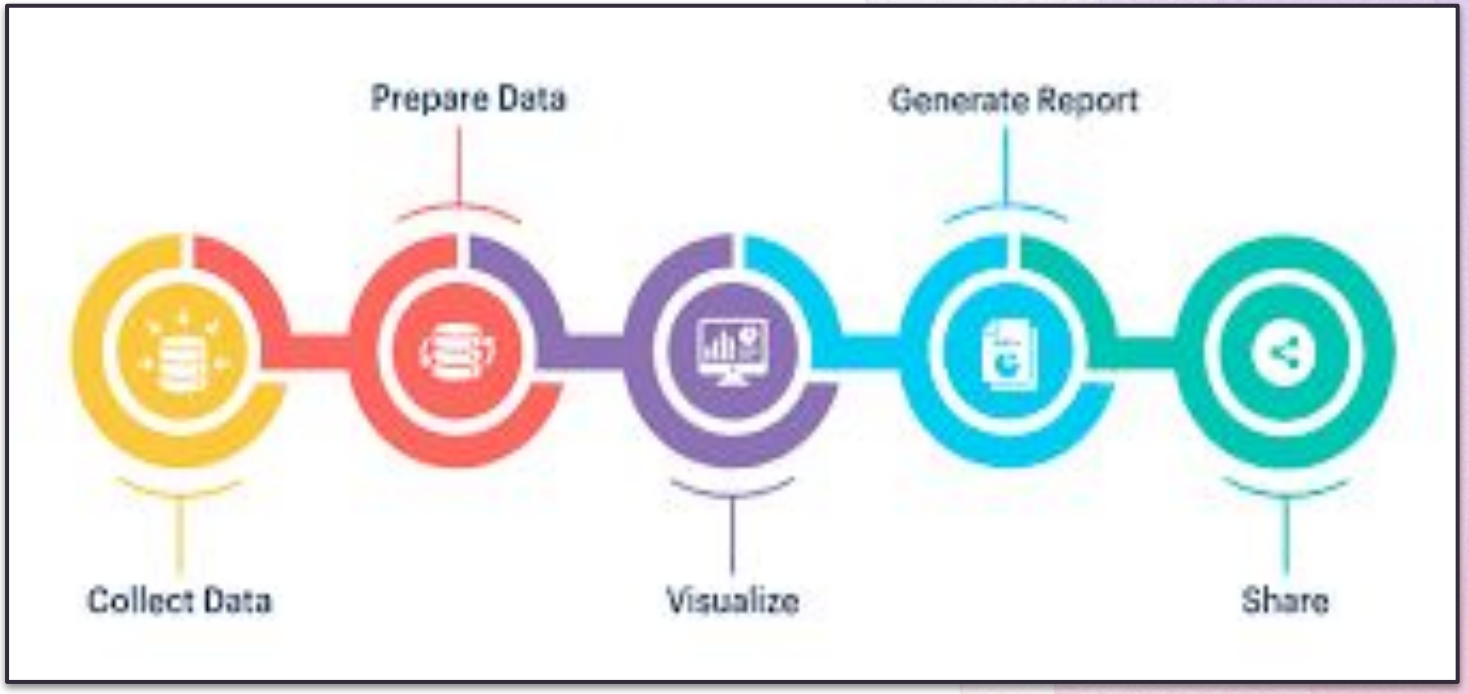
REQUIREMENTS

- Tool Used: Power BI
- Dataset Used: Zomato.csv file from Kaggle Website

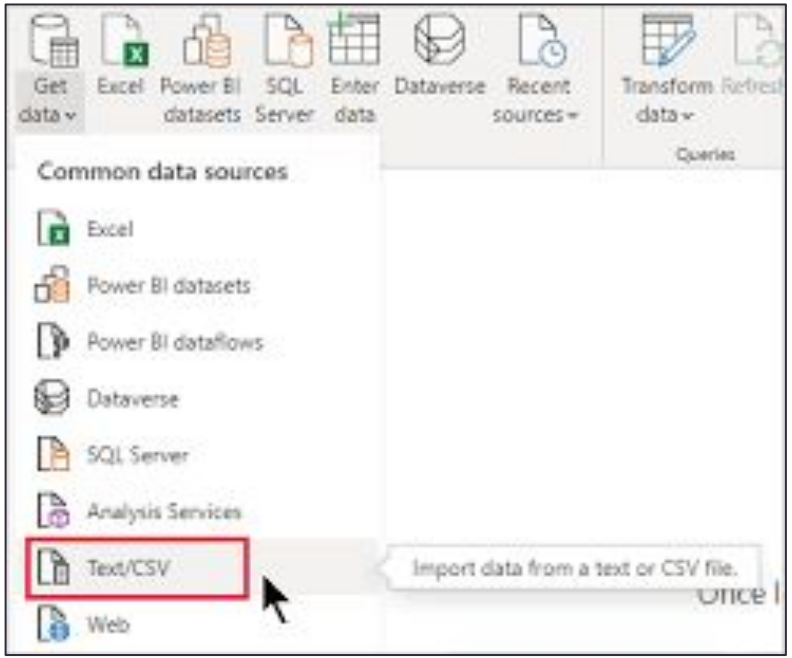
Power BI

- Power BI is a Business Intelligence and Data Visualization tool for converting data from various data sources into interactive dashboards and analysis reports.
- Power BI offers cloud-based services for interactive visualizations with a simple interface for end users to create their own reports and dashboards.

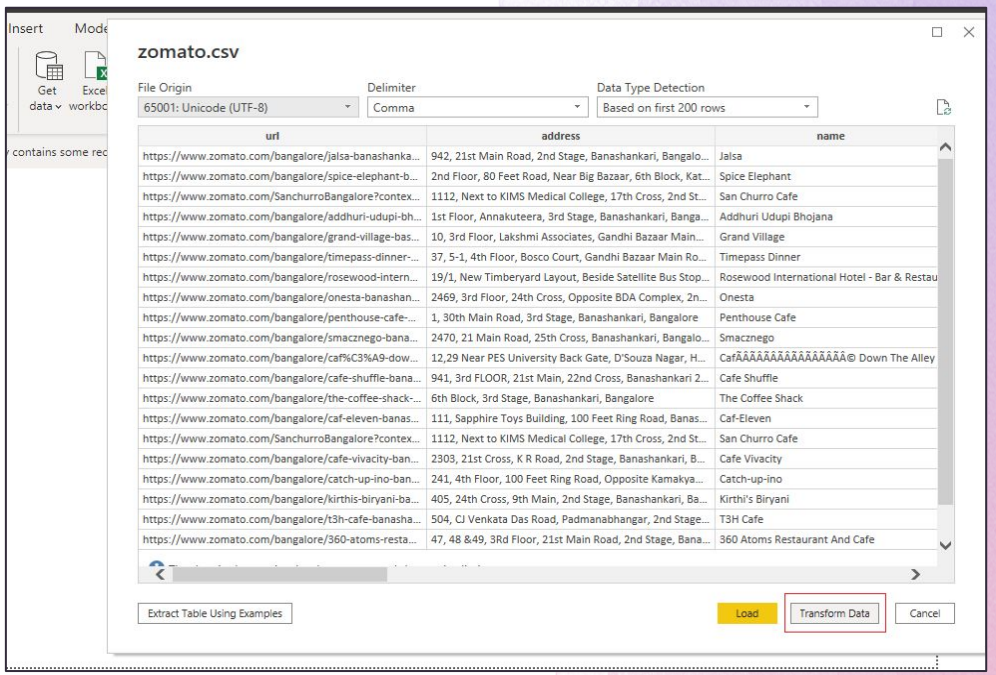
IMPLEMENTATION



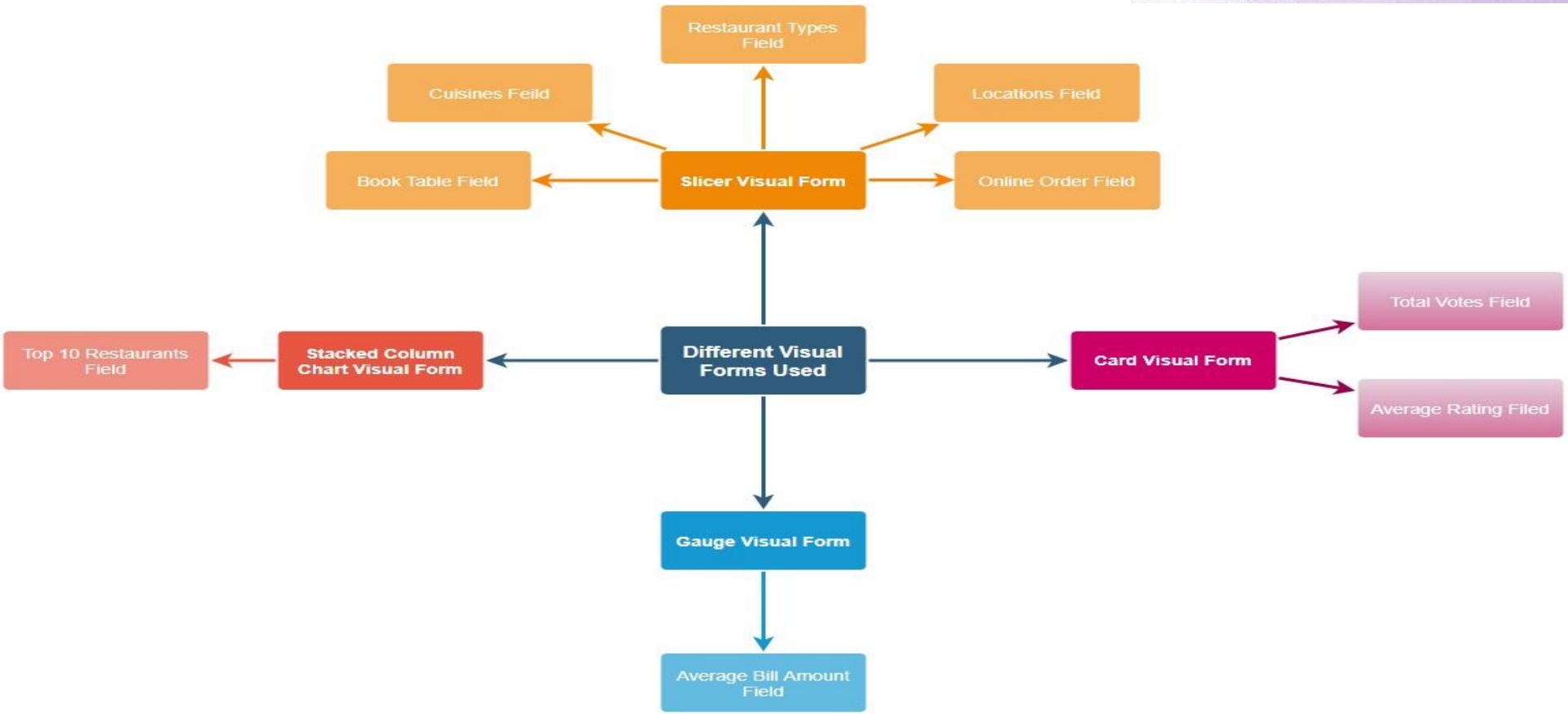
Step 1: Load file into power BI



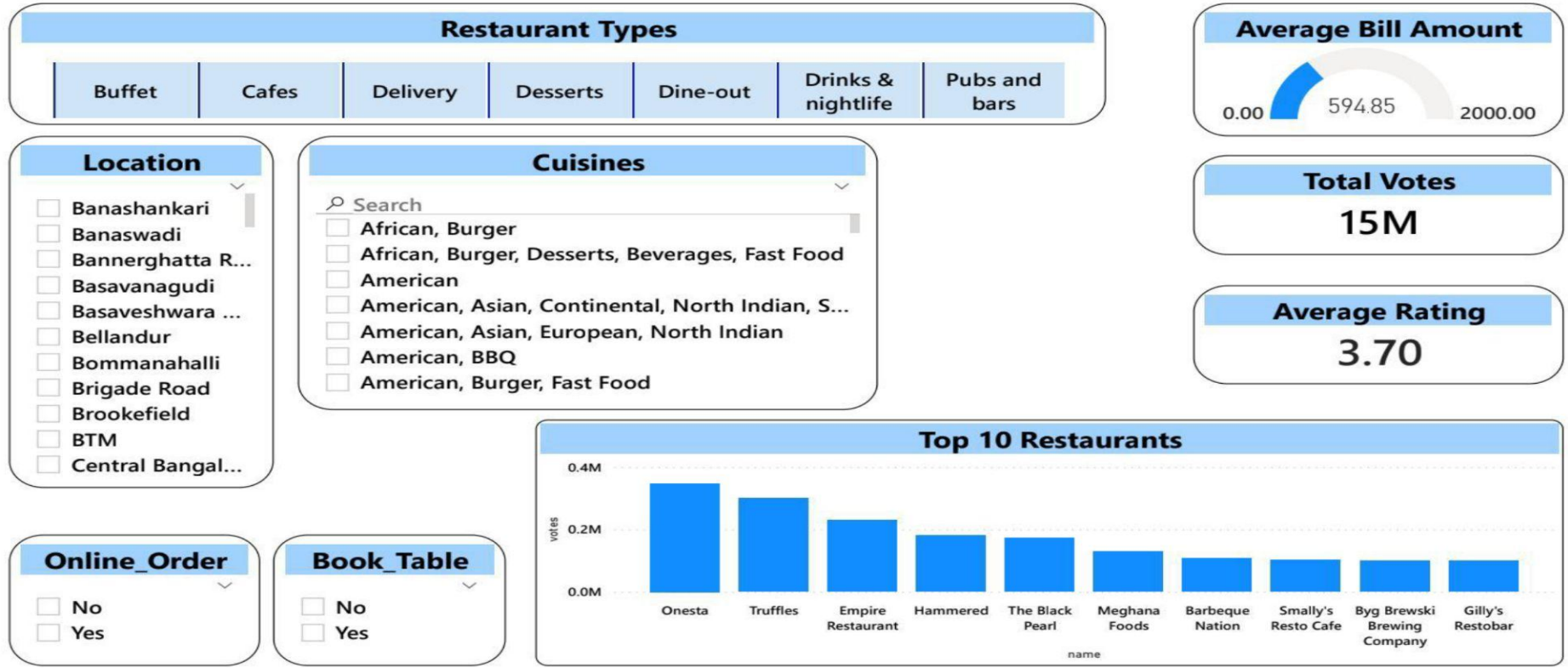
Step 2: Clean and Prepare data for visualization by selecting Transform data option



Step 3: Implementing required fields in our dashboard using appropriate visual forms.



RESULT:


Restaurant Types
Buffet
Cafes
Delivery
Desserts
Dine-out
Drinks & nightlife
Pubs and bars
Average Bill Amount
0.00
594.85
2000.00
Location
Banashankari
Banaswadi
Bannerghatta R...
Basavanagudi
Basaveshwara ...
Bellandur
Bommanahalli
Brigade Road
Brookefield
BTM
Central Bangal...
Cuisines
Search
African, Burger
African, Burger, Desserts, Beverages, Fast Food
American
American, Asian, Continental, North Indian, S...
American, Asian, European, North Indian
American, BBQ
American, Burger, Fast Food
Total Votes
15M
Average Rating
3.70
Top 10 Restaurants
0.4M
0.2M
0.0M
votes
Onesta
Truffles
Empire Restaurant
Hammered
The Black Pearl
Meghana Foods
Barbeque Nation
Smally's Resto Cafe
Byg Brewski Brewing Company
Gilly's Restobar
name
Online_Order
No
Yes
Book_Table
No
Yes

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Thank You!

Any Query?