Tableau Data Visualization Project

• Introduction:

This is some insights based on data collected from the U.S. Department of Transportation's (DOT) Bureau of Transportation Statistics that tracks the on-time performance of domestic flights operated by large air carriers.

• Links:

➢ Dashboard A:

https://public.tableau.com/views/DataVisualizationProject_16757380646540/Dashboard2?:language=en-US&publish=yes&:display_count=n&:origin=viz_share_link

➢ Dashboard B:

https://public.tableau.com/views/DataVisualizationProject_16757380646540/Dashboard1?:language=en-US&publish=yes&:display_count=n&:origin=viz_share_link

➢ Visualization c:

https://public.tableau.com/views/DataVisualizationProject_16757380646540/Sheet6?:language=en-US&publish=yes&:display_count=n&:origin=viz_share_link

➢ Story:

https://public.tableau.com/views/DataVisualizationProject-Story/Story1?:language=en-US&publish=yes&:display_count=n&:origin=viz_share_link

• Summary:

➢ Dashboard A:

- From these two visualizations, we can conclude that Texas had the most flight cancellations while more than half of the cancelations throughout the country happened because of the weather.

  Here you can filter by clicking either State or Cancelation reason or by clicking on a combination of both to have a look at deeper insights.

➢ Dashboard B:

- **Insight 1**: most delays happened in July and highest sum of delays happened in June we can look deeper into the insights by using the filter of the day of week
- **Insight 2**: highest delays were from Southwest Airlines Co.

- **Insight 3**: Arrival delay time by states in the U.S.
  Highest state by the sum of arrival delays is Texas

Visualization c:

- we can see from this line chart that most fight cancellations happened through the first quarter of 2015 in February, January, and March accordingly.
  you can filter this visualization more by reason of cancellation to find deeper insights.

Design:

Dashboard A:

- **Insight 1**: map was used to be highlight the cancellation number by each individual state
- **Insight 2**: bar chart was used to convey the numerical data of reasons of cancellation

Dashboard B:

- **Insight 1**: line chart was used because our data contained date formats
- **Insight 2**: bar chart was used to convey the numerical data
- **Insight 3**: map was used to be highlight the delays by each individual state

Visualization c:

- Line chart was used cause it's the most suitable to use with time data

Resources:

- **Cancellation reasons:** https://www.kaggle.com/datasets/usdot/flight-delays/discussion/35193
- **Metadata:** https://www.kaggle.com/datasets/usdot/flight-delays