

Final Exam CTS2451 Dr. Lee

Identify a dataset that speaks to your passion. The dataset must be reputable and include a data dictionary. Sources include:

https://kaggle.com

https://ernesto.net/datasets/

https://opendata.dc.gov/

https://data.gov/

https://www1.nyc.gov/site/nypd/stats/reports-analysis/stopfrisk.page

Or ANY DATASET THAT IS REPUTABLE.

You are to create a 2-4 page paper with APA citations and a PowerBI Dashboard. Identify a dataset and propose a business problem, hypothesis and assumptions. Follow the steps below and have your paper describe each of the steps with at least a paragraph. Feel free to include visuals, however, they do not count towards the 2-4 page required length. You are to submit your paper as well as the associated .pbix.

- 1. Clean transform and load your data (can be done in Excel or Power BI)
- 2. Generate at least 1 calculated column and measure (DAX).
- 3. Design a data model (either Star Schema or Snowflake Schema)
- 4. Perform an Exploratory Data Analysis on your dataset. Generate at least 2 insights from:
 - a. Univariate Analysis
 - b. Bivariate Analsysis
 - Multivariate Analysis
 These insights should be the showcase of your report and dashboard and should address your business questions, hypothesis and assumptions.
- 5. Create reports and a single Dashboard based on your data model and analysis that makes a compelling and effective case that your analysis answers your business question. (More is not always better.)