**Project Title**

The correlation between the reduction of drink driving incidents and ride-sharing apps.

**Team Members**

Jonathan Rico, Nicholas Dao, Ronnie Khatib, Stephanie Tran, Robert Hascall

**Project Description**

To research and determine the effectiveness of ride-sharing apps in reducing drunk-driving incidents in relation to the research questions below.

1. Data details
   1. Date ranges to be compared
      1. 2013 – 2019 🡪 Ride-sharing app usage
      2. 2002 – 2008 🡪 Before ride-sharing app usage
   2. NHTSA Site
      1. Alcohol induced fatal crashes by county by year
         1. Fatalities at range BAC .08+
   3. Google Trends ride-sharing app popularity
      1. Ride-sharing app search popularity
         1. <https://trends.google.com/trends/explore?date=2013-01-01%202013-12-31&geo=US-CA-803&q=uber,lyft>

**Research Questions**

* Has the release of ride-sharing apps/services reduced drunk-driving related incidents?
* Is there a seasonal correlation between drunk-driving incidents and the use of ride-sharing app/services?
* Is there a metro vs. rural correlation between increased or reduced drunk driving incidents (based on ride-sharing service availability).
* Other
  + Total number of car crashes
  + Fatality crashes by vehicle type

**Datasets to Be Used**

* Uber, Lyft
* <https://www-fars.nhtsa.dot.gov/Main/index.aspx>
* <https://jamanetwork.com/journals/jamasurgery/fullarticle/2780664?guestAccessKey=811639fe-398b-4277-b59c-54d303ef9233&utm_source=For_The_Media&utm_medium=referral&utm_campaign=ftm_links&utm_content=tfl&utm_term=060921>
* <https://www.usnews.com/news/health-news/articles/2022-06-28/more-evidence-uber-lyft-are-reducing-drunk-driving-crashes>
* <https://crashstats.nhtsa.dot.gov/Api/Public/ViewPublication/811523>

|  |  |
| --- | --- |
| **Tasks** | |
| Github setup (Team) | Group Presentation (Team) |
| Visualizations (Team) | Slide Deck (Team) |
| Analysis and Conclusion (Team) |  |