**Description**  
Imagine the team is conducting a field experiment to assess the effectiveness of different Facebook ad campaigns in increasing COVID-19 vaccine uptake. The experiment involves two distinct ad strategies appealing to reason and emotions, respectively.  
  
Total participants: 5,000 across the US.  
Random assignment: 1/3 receive the first ad (reason), 1/3 the second ad (emotions), and 1/3 none (control group).  
Baseline survey completed by all participants; endline survey completed by 4,500 participants.  
  
**Task Description:  
Data Simulation:**  
Write a script to simulate the raw data:

* One dataset for the baseline survey (e.g., with a unique identifier, some basic demographic information, and related questions)
* One dataset that contains information on the random assignment
* One dataset for the endline survey

**Analysis and Reporting:**  
Merge the simulated datasets  
Produce tables or figures to evaluate the effectiveness of each campaign  
  
**Documentation**:  
Provide comprehensive documentation in a README file. This should include how to run the pipeline, any dependencies, and an overview of the logic and methodologies used.  
  
**Code Quality:**  
The code should be well-organized, commented, and follow best coding practices.  
  
**Evaluation Criteria:**  
Realism and sophistication of the data simulation.  
Insightfulness and clarity of the analysis and reporting.  
Adherence to coding standards and quality documentation.

<https://arxiv.org/pdf/1708.08522>