DC21002 Team Abstract

Our team selected the HINTS dataset. This dataset includes over 3800 responses from Americans about a range of health questions centered around their perceptions and knowledge of cancer. The version we are using is HINTS 5 Cycle 4, which includes data collected from February to June 2020. After reviewing the provided dataset information and conducting some initial analyses, we decided to focus our analyses on determining if there is a correlation between a chronic disease diagnosis and other health data. These data include cancer diagnoses and trust in sources of cancer information.

We conducted our analysis in SAS due to the survey's design, which according to the dataset documentation, contains complex weights that cannot be analyzed using Excel. We altered code found in the dataset documentation to create a series of weighted frequency tables for each of the variables we were interested in and used a SQL script to remove answers with invalid responses. After completing our analyses, we determined that a correlation exists between a diagnosis of certain chronic conditions and a person's ability to take care of their own health. In particular, a strong correlation exists for diabetes and high blood pressure.

After uncovering the fact that there is a significant difference between how people with and without certain chronic illnesses report their feelings on their quality of healthcare and self care they recieve, our team analyzed how these groups were internalizing information about cancer. Perhaps unsurprisingly, people with certain chronic illnesses were seen to have been tested for different types of cancer at higher rates. Understanding how people with and without chronic illnesses both perceive their ability to obtain quality healthcare and practice the basic aspects of quality healthcare is vital to optimizing wellness in the healthcare system.