MIS 2502 Extra Credit Assignment

The topic I chose to research and write about is big data in healthcare, specifically the use of electronic health records. Data analytics can improve healthcare in various ways such as: reducing treatment costs, predicts outbreaks of epidemics, and generally improve quality of life for people (2). Healthcare costs have become a major issue in the United States, according to McKinsey research, “after more than 20 years of steady increases, health-care expenses now represent 17.6 percent of GDP—nearly $600 billion more than the expected benchmark for a nation of the United States’ size and wealth,” (1). One of the most simple and effective ways analytics has reduced healthcare cost is the transition from physical paper records to the use of electronic health records. Every patient has their own digital record which includes patient information such as demographics, medical history, test results and more (2). Records are easily shared through various providers and changes can be made to these records over time without the issue of having redundant data. Electronic health records have been growing rapidly in their use in the United States where according to HITECH research, 94% of hospitals adopting the use of them (2). An example of the use of electronic health records from the insurer Kaiser Permanente, which has fully implemented a computer system called HealthConnect which ensures data exchange across various medical facilities. The integrated system has achieved an estimated $1 billion in savings from reduced office visits and lab tests (2). The use of electronic health records can save money in all levels of health care. In MIS2502 we learned all about the use transactional and analytical data and how to model a functioning database schema. All of this is relevant to electronic health records as there are so many different health care facilities which lead to a lot of redundant data; creating a database that can support all different kinds of data can be challenging. By utilizing a functioning database through electronic health records, we can achieve organization and efficiency in healthcare that has never been seen before.

Works Cited

1. Kayyali, Basel, et al. "The big-data revolution in US health care: Accelerating value and innovation." *www.Mckinsey.com*, Apr. 2013, www.mckinsey.com/industries/healthcare-systems-and-services/our-insights/the-big-data-revolution-in-us-health-care. Accessed 26 Apr. 2019.
2. Lebied, Mona. "12 Examples of Big Data Analytics In Healthcare That Can Save People." *www.Datapine.com*, 18 July 2018, www.datapine.com/blog/big-data-examples-in-healthcare/. Accessed 26 Apr. 2019.