**Seminar 2**

**Familiarize yourself with the purpose, problem, objective or research question of each paper. Are they in line with your experience or thoughts on the topic, contributing to the collective body of knowledge in this area?**

Nelson et al. (2020) conducted a qualitative study on the applications of artificial intelligence in cancer screening. On the other hand, Chen et al. (2018) conducted a quantitative study on the applications of artificial intelligence in electronic health records. Their objectives, purpose, and research problem are consistent with my experience and thoughts on the topic. For example, they reinforce my opinion that AI applications in health records increase the accuracy of clinical decisions. Similarly, they reinforce my belief that AI tools can classify skin lesions and increase the accuracy of screening.

**Is the research methodology utilized in each paper appropriate for the stated purpose or question?**

The qualitative method applied by Nelson et al. (2020) is appropriate because the grounded theory approach and the interviews allow them to interact with the patients and gather their perspectives on the use of AI tools in cancer screening to increase the scope of their research. Similarly, the quantitative method applied by Chen et al. (2018) aligns with the purpose because it allows them to compare how AI tools have been used in electronic records by statistically comparing research articles published between 2008 and 2017 from WoS and PubMed databases.

**In terms of data collection and analysis, is this also appropriate for the stated purpose or question? (We will discuss this further in upcoming units.)**

The interview data collection method used by Nelson et al. (2020) is appropriate because it allows them to gather the perspectives of patients on AI applications in cancer screening directly from them. The coded interview analysis method is also appropriate because it allows them to categorize the responses of the patients to make conclusive inferences. Furthermore, the use of WoS and PubMed databases was an appropriate data collection because it allowed Chen et al. (2018) to compare published research findings and determine how AI tools have been used in electronic health records.

**Does each paper support its claims and conclusions with explicit arguments or evidence?**

The papers also provide explicit arguments and evidence to support their claims and conclusions. For instance, Nelson et al. (2020) utilize percentages to demonstrate the numbers of patients that perceive the utilization of AI tools in skin cancer screening as beneficial and those that perceive it as harmful. They also integrate evidence from published literature to demonstrate the accuracy of AI tools in classifying skin lesions and the accuracy of skin cancer screening. On the other hand, Chen et al. (2018) compare publications on AI utilization in health records to outline the AI tools' effectiveness and shortcomings based on the similarities and differences in the compared publications.

**How would you enhance the work/paper?**

I can improve Nelson et al. (2020)’s paper by increasing the sample because the researchers’ sample of 48 patients was too small to generate reliable findings. I can also improve their research by interviewing individuals with knowledge of the research topic to increase the accuracy of the results. On the other hand, I would improve Chen et al. (2018)'s study by conducting a qualitative analysis of AI tools' application in healthcare records across four continents instead of focusing on China and the U.S. to increase the generalizability of the findings.