**Computer Science Trends and Artifact Update**

Trend One: Artificial Intelligence & Machine Learning

Trend Two: Cybersecurity

1. What is the significance of each trend?

The significance of Artificial Intelligence is automating simple tasks and improving workflow efficiency. AI can help perform specific tasks to free up time for workers to focus on other tasks. Cybersecurity is significant to prevent theft, terror, and spying. With our society embracing technology for everyday tasks, there are more ways than ever for malicious attacks to perpetrate out personal information.

1. How will each trend change the field of computer science?

AI will change the field of computer science as many programmers will be needed to facilitate dataset procurement, machine learning, and operations and updates of these systems. Cybersecurity has always been a part of computer science and continues to be an important corner of every aspect of industry. Wherever a service is performed, or data is collected, there will need to be security provisions in place to protect those services or data.

1. How will each trend change the experience of consumers, workers, or citizens?

Cybersecurity protects businesses and individuals from data breaches, theft, and efficiency loss. The security of the processes that we rely on technology for everyday must be protected to ensure their usability and to protect our private and financial data. AI can help in many ways as it can improve workers’ production capabilities by delegating or streamlining important tasks to save time for tasks with bigger returns. AI can also help citizens solve problems, perform task, and provide entertainment. This will also lead to a new field in computer science where workers will operate and facilitate these programs.

1. How will each trend fit in with your career interests or aspirations?

I hope to work in cybersecurity or Information technology professions. I believe AI will lead to changes in how security checks are performed and how malicious attacks will be carried out. AI will also need its own dedicated security processes and professionals

1. Which course outcomes have you achieved so far, and which ones remain?

I believe that I have shown that I can program following the best practices, integrate testing, data structures and manipulate those structures. I plan to show that I can integrate a database into an existing program and have the two programs communicate with one another.

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| Checkpoint | Software Design and engineering | Algorithms and Data Structures | Databases |
| Name of Artifact Used | 12hr & 24hr Clock | Contract Service | Tasks & Appointments |
| Status of initial Enhancement | Done | Done | In progress |
| Submission Status | Entered | Entered | In progress |
| Status of Final Enhancement | Complete | Incomplete | Incomplete |
| Uploaded to ePortfolio | Incomplete | Incomplete | Incomplete |
| Status of Finalized ePortfolio | Incomplete | Incomplete | Incomplete |