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Senior Design Assignment 3, Individual Capstone Assessment

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9/15/2021

To me, our senior design project is all about taking the skills and concepts that I've learned over my college career and applying them to a project that we start basically from scratch. This includes both technical skills and non-technical skills that I've learned and developed through both course curriculum and co-op experiences. It is also about working effectively in a group to develop the final product. Working with different people who may disagree with you is not only part of school and work, but overall just a part of life. Not everyone will agree with you on a certain way of doing things, how something should look, or how something should behave. Sometimes you just have to agree to disagree and do what needs to be done to accomplish your goals. It should also go without saying that senior design is also about accomplishing the ultimate goal of receiving my degree at the end of my final school year.

From my college curriculum, there are several things that will be useful for my senior design project. Starting with even the most basic, CS2028C (Data Structures) will most definitely be applicable, as developing any sort of application requires using at least some of the data structures I learned in that class. This includes arrays, linked lists, abstract data types, template classes, etc. Looking ahead in the current semester, I also expect CS5127 (Requirements Engineering) to help immensely in the context of this project as well. Currently in the class we are learning about the importance of requirements, how to elicit requirements, and what good requirements look like. We have also touched on the use of user stories, which will also be beneficial. For more non-technical skills, I have worked with a group at least once in essentially every CS course I have taken, so teamwork is definitely a skill that I have had continuous improvement on from my college experience.

From my co-op experiences, I have also picked up several technical and non-technical skills. All my co-op rotations have been with London Computer Systems, though my role changed a few times with them. For my first semester, I was a quality assurance co-op. In that role I learned a lot about manually testing software, writing test plans, and things that work and don't work when testing software. This will be useful when we start developing and testing our project. For my other rotations, I was a developer on either the desktop or web product. Both of these roles taught me a lot about navigating large software solutions and understanding code that I didn't write myself. This will be useful since all three members of my group will be sharing responsibility of coding. If we need to do some pair programming or help each other debug, my experience with working with others' code on co-op will definitely come in handy. Over my co-op I also worked on a team each rotation, and each team was diverse in both personalities and culture. This has definitely bolstered my skills with working in a diverse group/setting and learning to put differences aside and understand each other's point of view. This will surely come in handy when working on a group project for as long as senior design will take.

There are several reasons I am excited and motivated to work on this project. For one, it should be fun! Working in groups has always been an enjoyable experience for me and working on a project that we get a lot of creative freedom on should make it even better. Another reason is that it will be a

great opportunity to use the skills I've acquired over my college career. It may seem a bit redundant from the previous two paragraphs, but I truly believe I've picked up a lot of things that I will be able to apply to this project and I'm excited to see the culmination of both my own skills and my education. Finally, the prospect of having an actual finished product that we could use at the end of it all is very exciting. Throughout college courses, most of the coding work (if there is any) ends up just being "cookie cutter" labs or things of that nature, because that's all the time allows for in courses. But having an entire school year to plan out and develop an actual finished product from scratch is a whole different ball game. It's a little daunting at first, but that's even more reason to be motivated and excited to do it.

From preliminary discussions with my team, our initial approach to designing a solution will be specifying what goals we have for the project. What we want our application to do, overall design and feel from a UI standpoint, core functionalities, how we're going to make it different from existing software, etc. will all be part of the initial design process. Our expected results are a finished app that looks and feels as good (if not better) than the typical app you could find on Google Play or the App Store. I will self-evaluate my contributions based on the goals I am able to fulfill in the overall project. When my team divides out the work, as long as I accomplish what I'm tasked to do I will feel that I'm done as an individual. I will also feel like I have done a good job if I am able to easily integrate my parts of the project with my teammates parts and bring them all together into the finished product.