

CIS 4250 – Software Design V
Instructor: Prof. S. Scott
Individual Accountability Report (IAR)

Q1. Student Name: Anthony Vidovic

Q2. Student ID: 1130891

Q3. Associated Team Deliverable: Initial System Design and Product Backlog Creation

Q4. Team #: 8

Q5. What were the main technical or methodological knowledge, skills and/or abilities (KSAs) that were required to complete this team deliverable? What prior courses or experiences (e.g. co-op, group project, etc.) from your Software Engineering degree did you draw on for these KSAs? (bulleted list is preferred):

Skills and Abilities

- Reverse engineering the software to create system design models
- Creating UML Diagrams to represent system components and their relationships for both high-level overview and detailed client package
- Writing clear documentation on the modules in the system
- Collaboration and communication to distribute work efficiently among team members
- Creating and prioritizing a product backlog with user stories and technical tasks
- Analyzing the software architecture for maintainability, extensibility, and usability

Prior Courses & Experiences

- Software Architecture and Design (UML diagrams, system modeling) were learned in my previous software design classes
- Human-computer interaction (UI/UX analysis and usability improvements) were learned in my previous HCI class
- Co-op experience with project planning, backlog creation, and system analysis
- Group projects requiring software documentation and reverse engineering
- Agile development methodologies learned in prior coursework

Q6. What was your existing level of experience with these topics/skills before your team began working on this deliverable? (1-2 sentences):

I have a lot of background in these areas, having worked on multiple front-end co-ops where I contributed to software design and documentation. My experience with creating component libraries and improving existing systems has given me confidence in my ability to reverse engineer software and analyze usability aspects. Additionally, my coursework in software design and Agile methodologies provided foundational knowledge in backlog creation and system modelling.

Q7. Comment on your individual KSAs learning during this deliverable, and what additional learning may be needed to understand or be more competent with these topics / tasks in the future?

During this deliverable, I applied my knowledge of system architecture and modelling to contribute to the team's design decisions. I did a deep dive into the software and learnt how it works. Based on that I came up with my system architecture UML diagrams for both a high-level overview of the whole system and a more details diagram for the client-facing application. Additional learning on the system may be needed to understand how the system works at a lower level.

Q8. What specific contributions did you make to this team deliverable? This should include technical or project management contributions.

- Created the UML Diagrams to document the existing system structure for both the overall system and the client-facing app
- Conducted system analysis to identify key pain points and areas for improvement
- Assisted in defining user stories and tech stories for the product backlog
- Wrote sections of the documentation, including the analysis of the existing system and proposed improvements
- Helped prioritize backlog items based on project goals and feasibility

Q9. With whom did you collaborate for any of the above contributions (be specific – saying “all team members” is not sufficient. State which parts you worked on with whom)?

I collaborated with Tony on the system design

I collaborated with Andrew and Tony on the analysis

Q10. Comment on how well you managed your time over the time period allocated in the Course timetable to this team deliverable (i.e. the time between the prior team deliverable to this team deliverable).

I managed my time well by completing research on the existing system early, allowing for good discussions on design improvements. I allocated time to refine UML diagrams and backlog items rather than leaving them to the last minute. Effective team communication helped our workflow, ensuring that all components were completed on time and met the required quality standards.