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

Note. Refer to the Project Manual for detailed instructions for IAR submissions.

## Individual Accountability Report (IAR) Template

The following questions MUST be included and answered completely for each submitted IAR.

## IAR must be submitted one of the following file formats: text or PDF.

Q1. Student Name: Jennifer Lithgow

Q2. Student ID: 1134108

Q3. Associated Team Deliverable: Sprint 0 – Initial System Design and Product Backlog Creation

Q4. Team #: 5 (section 2)

- 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. coop, group project, etc.) from your Software Engineering degree did you draw on for these KSAs? (bulleted list is preferred):
  - From software design courses:
    - Class Diagrams
    - Object-Oriented principles
  - From CIS\*3760
    - Backlog creation
      - User story creation
      - Prioritisation (also from coop)
      - Weight estimation (also from coop)
  - Minimal experience:
    - Professional documentation and formatting
  - While one software design course (CIS\*3260) involved some creation of class diagrams based on pre-existing games, they were physical board games and not existing code:
    - o Reverse engineering an existing system/application
    - Analysis of an existing system/application

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

My existing level of experience is rather variable. While I had a good amount of experience with creating class diagrams from requirements and following object-oriented

principles, my skills in reverse engineering from an existing system/application and professional documentation are limited.

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?

- Class diagrams and object-oriented principles
  - Since my group has decided to refactor the code of our chosen application, I will have the opportunity to ensure it is following object-oriented principles. We might also create artifacts in the form of class diagrams for this redesign.
- Backlog creation
  - We will be continuing to work on our prioritisation and re-estimate the weights of stories in our backlog as we work through every sprint.
- Professional Documentation
  - A majority of documentation I have created during both courses and coop placements have been more informal, focused on information over appearance. I'm not sure that there are any examples or templates I could find to analyse and follow, so the best I can do is continue trying to make documentation for every sprint as professional as possible.
- Reverse engineering and analysis of an existing system/application
  - While there will be minimal further work of this type on our chosen application, keeping an analytical mind will likely help with refactoring the code.

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

- In the initial design of the system, excluding the class diagram, a majority of the work was shared equally.
  - Most of the work comes from our previous deliverable
  - o In section 2.4 of our deliverable, I worked on adding explanations/justifications to each
- Class diagram Analysing code to come up with accurate classes
  - After the group agreed on a diagram with the most accuracy we could make, I added explanations in section 3.1 for each of our "pseudo-classes" in the diagram.
  - For our analysis in section 4.0, I converted bullet point analysis into a more coherent paragraph format.
  - In section 5.0, I added connections to previous sections and explanations to justify each of our design recommendations noted.
- Product backlog creation
  - I created a few tickets and refined the details and information on others to ensure each user story followed a user story format.
  - For section 6.0, I added more columns to the backlog table to provide further detail in the deliverable outside of GitLab. Those were the story, type of story, and related to issue/proposed redesign columns. This included connecting each issue to an aforementioned issue and design recommendation (mentioned in sections 2 and 5).

• I helped with reviewing most sections of our document, to ensure everything made sense and enough clarity was put into the final product.

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)?

- Sara reformatted our work into something much cleaner and more professional
- In revising section 1, primarily written by Emily and Sara, I made some minor edits to section 1.5
- In revising section 2, Emily & I elaborated on the contents of the 'solution' column in section 2.4
- In section 4.0,
  - Sara, Emily, and I worked on the analysis. Ben & Jeremy also added some bullet points of their observations
  - o I converted bullet points of group members' thoughts into paragraphs
  - o Emily created connections to other sections in the overall document
- In section 5.0,
  - Most improvements come from either group discussion (all members) or our previous deliverable. Sara transferred information from the previous deliverable into the current documentation.
  - o I added most connections to other sections in the document, and explanations to justify each improvement. Ben also helped with refining some of the explanations.
- For the product backlog (section 6.0),
  - o Related issues/redesigns started by Jeremy, I added more detail
  - Actual work on tickets
    - Ben worked on a majority of the tickets, whether creation, refining, or weight estimation.
    - I helped with creating and refining a number of tickets.
    - Jeremy, Emily, and Sara all helped create some tickets.
    - As a group, we revised all issue weights to confirm we agreed with the estimations.

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 believe I managed my time well. While a majority of the work I did happened during or after our meetings, I believe I contributed quite well. Upon realising we hadn't gone as in-depth as expected, though, it seems our group underestimated the amount of work we would have to do and ended up working until close to the deadline.