

**Assignment Deadline:** Check Brightspace and course schedule.

**Assignment Type:** Individual Effort and Individual Submission. **While this assignment relates to the application being developed in the group project, you must complete this assignment individually.** The results of this individual assignment (Assignment 1) will play a role in shaping the overall delivery of your team project delivery 2, which will be a team Submission. Further details regarding the connection between Assignment 1 and Project Delivery 2 will be discussed in class. **But it is important to emphasize that Assignment 1 constitutes individual effort work.**

**Submission Method:** Your submission for this assignment should be in PDF format, following the provided template below. You will submit your work to Brightspace. Ensure that your document is well-structured, with each section clearly addressing its respective task and providing necessary details as outlined in the assignment instructions. Please refer to the template below.

**Assignment Evaluation and Weight:** The assignment will be graded out of 100 points and is worth 7% of your final course grade.

**Assignment Overview:** Your individual assignment, Assignment 1, focuses on the system or application chosen by your team for the project. The primary goal of this assignment is to provide you with (your own) practical experience in applying requirements elicitation, analysis and documentation techniques for the system that is currently under development for your project. Specifically, you will work individually on the following tasks:

- Identify the stakeholders involved in your project and rank their significance as HIGH, MEDIUM, or LOW.
- Research and identify any relevant regulations, guidelines, standards, or laws that apply to the proposed application. Similarly, rank their importance as HIGH, MEDIUM, LOW.
- Utilize a combination of elicitation techniques (**a minimum of three**) to start gathering requirements for your system. Note that while we have not covered all the listed elicitation techniques on the slides, you are welcome and encouraged to learn about them all and select any techniques from the list. It is essential to provide evidence of each activity associated with the chosen elicitation techniques. For instance, if you choose the interview technique, you should provide your interview questions and mention who you interviewed. If you opt for the goal-based elicitation technique, you should furnish the mission statement and derive goals from it... and so on.
- Document the captured requirements in the format of "The system shall..." statements, while adhering to the best practices discussed in class. Each requirement should also be ranked a HIGH, MEDIUM, LOW.

- Select five functional requirements from the list and transform them into "use case" format. Use the use case specification format discussed in class, while adhering to the best practices for writing effective use cases.

### **Assignment 1 Template (You need to follow this template to structure your submission):**

#### ***Section 1: Introduction (10 points):***

- 1.1 Purpose: Define the reasons for developing the system.
- 1.2 Scope and Perspective:
  - Identify the system to be produced by name.
  - Define the system's relationship to other related products, including elements of a larger system or interactions with other products.
  - Clearly specify what is within the scope of your system and what is outside its scope.

#### ***Section 2: Stakeholders (10 points):***

- In this section, you will list all stakeholders of the system.
- Use the stakeholder identification questions that we covered in the class as guidance to compile the list.
- Rank stakeholders using HIGH-MEDIUM-LOW ranking system.

#### ***Section 3: Regulations, Guidelines, Standards, Laws (5 points):***

- Identify applicable regulations, standards, guidelines, etc., related to the application (domain).
- Research and provide information on these regulations.
- Rank them using the HIGH-MEDIUM-LOW ranking system.

#### ***Section 4: Requirements Elicitation Used (at least 3 elicitation techniques) (15 points):***

You must use at least **3 elicitation techniques to capture requirements**. You are encouraged to use more than 3 if you want. For each elicitation technique used, provide:

- 4.1 Name of the elicitation technique.
- 4.2 Rationale for using the technique for the system (Why did you select this technique?).
- 4.3 Proof of using the technique (e.g., mission statement and derived goals for goal-based elicitation, set of survey questions for survey technique, etc.).

#### ***Section 5: Requirements (20 points):***

- List the requirements generated using the chosen elicitation techniques.
- Present the requirements in "The System shall..." statements format. We expect at least 20 requirements.
- Rank each requirement using HIGH-MEDIUM-LOW as the ranking system.

***Section 6: Use Cases (25 points)***

Select FIVE functional requirements from the list and write the full use case specifications for each following the use case specification template discussed in class.

- 6.1 Use Case 1
- 6.2 Use Case 2
- 6.3 Use Case 3
- 6.4 Use Case 4
- 6.5 Use Case 5

***Section 7: Use case Diagram (15 points)***

Create a UML Use Case diagram illustrating the five use cases outlined in Section 6, while showing any relationships between them.