

CSCE 740 - Project 1 - Draft Requirements

Due Date: Sunday, September 18th, 11:59 PM (in PDF format, via Moodle)

Problem Statement

Everybody hates meetings, yet they are necessary to operate a modern business. Organizing meetings is complex, and requires coordination of conference rooms and all of the people who are supposed to be present for those meetings. Life is no simpler for the attendees, who must keep track of their schedule and remember all of these meetings. However, a centralized meeting management system can relieve the burden on both the meeting organizers and the attendees.

Your new software development firm has been contacted by the University of South Carolina Computer Science & Engineering Department to build a system that allows schedule and room coordination, meeting booking, vacation reporting, and all of the other necessary functionality to support their organizational needs.

Overall Project Description - the Meeting Engagement and Tracking System (MEAT)

Your mission, should you choose not to fail the assignment(s), is to create a meeting organization system, known as MEAT. Here you will get a set of informal “user requests” of what this system shall do. Note that this is purposely incomplete and vague, and that it is your job to sort it all out (i.e., by eliciting requirements). Other features may emerge as part of the online elicitation session.

1. The system shall have an interactive interface. It should be intuitive and easy to use.
2. To support automation, the system shall also be able to accept “scripts” through the command line. A script shall be a list of actions, each action paired with necessary input.
3. The system shall allow users to check the schedule for a person or room, or display a universal schedule.
4. The system shall allow users to look up open rooms.
5. The system shall allow users to book and edit meetings.
6. The system shall allow users to remove or add people to existing meetings.
7. The system shall allow users to book vacation time.
8. The system shall allow users to manage the company calendar.

Later in the semester, you will be given further interface guidelines, the database abstractions (data that can be loaded into your system), and a description of the inputs to the system.

Your Task

Your task in this assignment, as outlined above is to develop use-cases to help you elicit the requirements, and then to develop a requirements document for MEAT. You may choose any organization of your document, but always keep in mind that it must be readable, changeable, and capture all the essential information we have discussed in class. The same applies to your requirements - your requirements must be detailed, consistent, complete, and testable.

Remember, you will build this system later, and if you have a poor requirements document, you will run into problems. You will be graded on what the system ought to do (as opposed to what you think it should do).

A requirements document template will be made available on the web page for the class. In addition, a template for individual requirements and examples will also be made available on this page. You may adjust the templates to fit your needs, as long as necessary information is delivered clearly. There are also some examples of use-case diagrams and scenarios in the slides and a use case template will be available on the same page. Finally, several checklists will be made available that you can use to determine if your requirements are up to professional standards.

The Requirements Elicitation

On Tuesday, September 6, a digital elicitation session will be opened on Moodle. This will be your opportunity to ask questions directly to the “customers” and formulate your requirements. Before this date, be sure to come up with questions to ask (and start coming up with requirements).

Helpful Hints

Do not invent many unneeded requirements. Focus on the core functionality of MEAT and do not add “things that would be nice to have”. “Gold plating” the requirements by adding all kinds of nice, but unneeded, functionality and checks will lead to an excessively large and complex document.

Focus on the features asked for in this document and in the elicitation session. You must write detailed requirement specifications that capture what the behavior of the final system should be, including defining functionality, specifying properties that the output of the system must follow to be considered correct, and posing non-functional requirements that govern how the system operates with regard to performance, security, etc.

Deliverables

You are required to turn in the requirements document, your use-cases, and a use-case diagram. You can put your use-cases and diagram as a chapter in your requirements document, or you can submit it as a separate document. All documents must be in PDF format.

Note that the first deliverable is worth a relatively small portion of your grade, and is intended for you to get feedback so you can prepare suitable document for the second deliverable. That said, take this assignment seriously, ensure you have time to complete the assignment, and focus on demonstrating that you can write good requirements.