Software Requirements Specification

for

Internship Management System

Version 1.0

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1. Introduction

This section provides a general review of the entire Software Requirements Specifications document (SRS) including the purpose, scope, definitions, acronyms, abbreviations, references and overview.

1.1 Purpose

The purpose of this SRS document is to provide a detailed overview of the product and its goals based on IEEE Std 830-1993.

This document is provided to give a detailed description of the requirements for the “Internship Management System” (IMS) which is a module of the “SMU Portal” application.

It is primarily intended to be proposed to a committee for their approval and a reference for designing then developing the first version of the system for the development team.

Hence, this SRS will be the parent (main) document providing the guidelines necessary to design and implement software that fulfills all the requirements given, focusing mainly on the end requirements that the final software must achieve.

1.2 Project Scope

This part of SMU Portal application (IMS) aims to centralize all internship opportunities in different domains sent by the career center (CC) in a single platform instead of receiving them via emails and risk losing track of them.

As for students (MSB and MedTech), the software will allow:

- Direct access to opportunities posted by CC.
- Access to company profiles.
- Applying to internships online through the application.
- Tracking the status of internship applications on dashboard.
- Easy search and filtering, making the information more accessible.
- Customizable experience by starring interesting opportunities, which gives a higher chance of applying in the student’s dream internship.

For the CC members, the software will:

- Highlight and put to more use the efforts of the CC.
- Make internship opportunities easier to manage.

1.3 Definition, acronyms, and abbreviations

Term	Definition
SMU	South Mediterranean University
MedTech	Mediterranean Institute of Technology
MSB	Mediterranean School of Business
CC	Career Center
User	Someone who interacts with the mobile phone application
Stakeholder	Any person who has interaction with the system: customer, user and developer
IMS	Internship Management System
MEAN	MongoDB, Express.js, AngularJS, and Node.js

1.4 References

[1] IEEE Software Engineering Standards Committee, "IEEE Std 830-1998, IEEE Recommended Practice for Software Requirements Specifications", October 20, 1998.

1.5 Overview

The remainder of this document includes two sections:

Section 2 contains a more in-depth analysis of the product's features; functions and its working environment thus providing an overview of the system functionality and introducing different types of stakeholders and their interactions with the system. Further, the chapter also mentions the system constraints and assumptions about the product.

Section 3 contains the requirements specification in detailed terms and a description of the different system interfaces. Different specification techniques are used in order to specify the requirements more precisely for different audiences (use case diagrams, use case scenarios).

2. Overall Description

2.1 Product Perspective

The Internship Management System (IMS) is a product built for the South Mediterranean University to make the interaction between the career center and the students an online experience. The IMS gathers the internship requirements in one platform to simplify and accelerate the process.

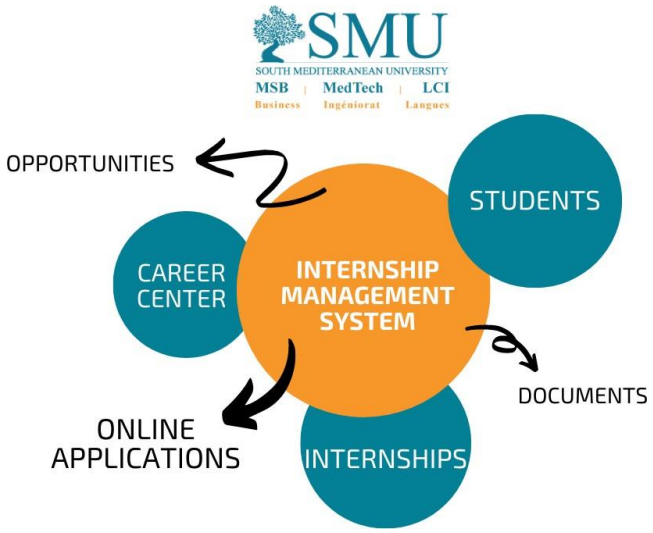

Figure 1: Illustration of the overall product perspective

2.2 Product Functions

Functional Requirements for Students:

Priority	Requirements	Description
1	Req 1:	The system shall enable the students to log in with their SMU email accounts
1	Req 2:	The student shall be able to access internship opportunities in a dashboard
4	Req 3:	The student shall be able to access internship documents in a dashboard
2	Req 4:	The student shall be able to filter (due date, location, domain, duration, etc.)
1	Req 5:	The student shall be able to apply to the internship either by having access to the website of the company or by submitting files on our platform
3	Req 6:	The student shall be able to access the status of the application on our website
3	Req 7:	When the career centre validates the submission, the student shall receive a notification by email

Figure 2: Priorities and descriptions of student requirements

Functional Requirements for the career center:

Priority	Requirements	Description
1	Req 1:	The system shall enable the cc staff to log in with their SMU email accounts
3	Req 2:	The cc staff shall be able to access students internship applications in a list (3)
1	Req 3:	The cc staff shall be able to upload and edit internship opportunities' descriptions
4	Req 4:	The cc staff shall be able to upload internship documents in a dashboard
3	Req 5:	The cc staff student shall be able to update the status of the student's application on our website
2	Req 6:	When the student submits their files, the cc staff shall validate the submission

Figure 3: Priorities and descriptions of the students' functional requirements

Overall non-functional requirements of the system:

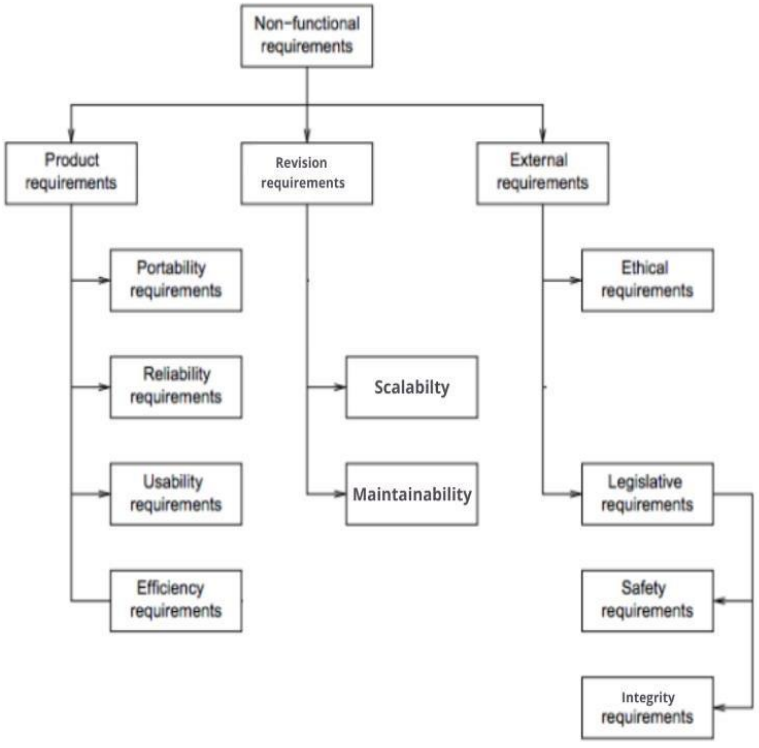

Figure 4: Diagram summarizing the non-functional requirements of our system

Product requirements:

Portability: Our software can be transferred to other software enviornments.

Reliability: Our software's probability of failure shall be 1 out of 1000 when a student submits their application.

Usability: Students shall have the option to download internship documents when viewing the documentation section.

Efficiency: The submission process takes 5s .

Figure 5: Product requirements specifications

External requirements:

Ethical: Students' information and documents are only accessed by the cc team. Other students and the admin cannot acess them.

Legislative: Our software respects SMU regulations.

Safety: Our software does not bring any damage to the SMU community.

Integrity: Student and cc profiles shall be backed up at least once per month to prevent data corruption.

Figure 6: External requirements specifications

Revision requirements:

Scalablity:

Our software is scalable since we can bring new features in the future such us a section for Alumni students where they can find job opportunities.

Maintainability:

Check bugs and apply updates in less than 3 hours every two weeks.

Figure 7: Revision requirements specifications

2.3 User characteristics:

This system supports two types of users: Students and Career center staff. All users should be studying in SMU or part of the career center staff. All users should be Internet literate and familiar with the basic tools of internet (Search bar, selection etc..).

Students should be able to:

- Surf between internship opportunities.
- Apply for internships.

Career center staff should be able to:

- Upload internship opportunities.
- Modify existing internship opportunities.

2.4 Constraints:

Our team will be using MEAN stack as recommended by the instructors.

Final product should work on both computer and phone browsers. It should also be running smoothly.

2.5 Assumptions:

No assumptions made.

3. Specific Requirements

Use Case Scenario 1: Student

Log in

Req1: The system shall enable the students to log in with their SMU email accounts. High priority.

The risk is high since the students provide their personal information (8).

Actor	Student
Pre-condition	Database has availability of email addresses and passwords Valid email address is available
Post condition	The student is logged in and validated
Main path	Student is in the log in page Student enters their email address and password Student clicks log in System directs the student to the home page
Alternative	Error in the email or the password The system will allow the student to re-enter their information The scenario starts at step 2

Internship Opportunities

Req2: The student shall be able to access internship opportunities in a dashboard.

High priority.

Req4: The student shall be able to filter (due date, location, domain, duration, etc.) the internship opportunities.

Medium priority.

Actor	Student
Pre-condition	Database contains available internship opportunities Student is logged in and validated
Post condition	The student has access to the internship opportunities.
Main path	Student views the internship dashboard Student clicks search Student filters the internships (due date, location, domain, duration, etc.) The system displays the desired internships
Alternative	The student's filter choices do not match any available internships. The system will allow the student to choose different filters The scenario starts at step 3

Internship Application

Req5: The student shall be able to apply to the internship either by having access to the website of the company or by submitting files on our platform.

Risk of having the students' information leaked (8)

High Priority.

Req7: When the career centre validates the submission, the student shall receive a notification by email. Low Priority.

Actor	Student
Pre-condition	Student selected the desired internship
Post condition	The student files has been submitted to the platform The student has been directed to the company's website
Main path	Student clicks on the internship opportunity Student views the information A: Student clicks the company's website link Student continues the application on their website B: Student clicks on the application button The system directs the student to the application page The student uploads the necessary files The student submits the uploaded files The student receives a confirmation email when the career center validates the application
Alternative	The student files' size exceeds the maximum capacity The system will allow the student to re-upload the files The scenario starts at step 5 scenario B.

Application status

Req6: The student shall be able to access the status of the application on our website.

Low priority.

Actor	Student
Pre-condition	Student has chosen an internship on our platform Student has submitted their application on our platform
Post condition	The system notifies the student about the status of their application
Main path	Student now views in the home page the internships they applied to in our website Student clicks on the internship to check status System displays the application status on top of the page
Alternative	None

Internship Documents

Req3: The student shall be able to access internship documents in a dashboard.

Very Low priority.

Actor	Student
Pre-condition	Student has logged in The documents have been uploaded on the website by the career center
Post condition	The student downloads the needed files
Main path	Student clicks on the files button System directs student to the documents page Student views the documents Student downloads needed documents
Alternative	None

Use Case Scenario 2: Career Center (cc)

Log in

Req1: The system shall enable the cc staff to log in with their SMU email accounts.

High priority.

The risk is high since the students provide their personal information (8).

Actor	Cc
Pre-condition	Database has availability of email addresses and passwords Valid email address is available
Post condition	The cc is logged in and validated
Main path	Cc is in the log in page Cc enters their email address and password Cc clicks log in System directs cc to the home page
Alternative	Error in the email or the password The system will allow the cc to re-enter their information The scenario starts at step 2

Internship Descriptions

Req3: The cc staff shall be able to upload and edit internship opportunities' descriptions.

High priority.

Actor	Cc
Pre-condition	Cc is logged in and validated
Post condition	The internship opportunities appear on the dashboard
Main path	Cc views the internship dashboard A: Cc clicks on “create new description” Cc writes the description Cc adds image to the description Cc clicks on save B: Cc clicks “edit” Cc enters modifications to the description Cc clicks on “save changes”
Alternative	Cc does not click on save Cc is redirected to the internship dashboard The scenario starts at step 1

Internship Application

Req2: The cc staff shall be able to access students’ internship applications in a list.

Risk of having the students’ information leaked (8)

Low Priority.

Req6: When the student submits their files, the cc staff shall validate the submission.

Medium Priority.

Actor	Cc
Pre-condition	Student applied to an internship
Post condition	The student files have been retrieved The submission has been validated
Main path	Cc views the applications list with the name, date and files of students Cc retrieves (downloads) the student's application Cc clicks on "done" to validate the submission of the student's application The system moves the validated submissions from the list of applications to the list of submitted applications Cc views the updated applications list
Alternative	A: Cc could not retrieve the student's application The system will redirect the cc to the applications list The scenario starts at step 1 B: Cc does not click on "done" Cc views the downloaded file as downloaded but invalidated The scenario starts at step 3

Application status

Req5: The cc staff student shall be able to update the status of the student's application on our website.

Medium priority.

Actor	Cc
Pre-condition	Student has submitted their application on our platform Cc validated the student's submission
Post condition	The system notifies the student about the status of their application
Main path	Cc now views the list of submitted applications Cc can check one level of progress (Level 1: file submitted to the company, Level 2: company has well received the file, Level 3: company's HR are examining the file) System displays the application status in front of student's name
Alternative	None

Internship Documents

Req4: The cc staff shall be able to upload internship documents in a dashboard.

Very Low priority.

Actor	Cc
Pre-condition	Cc has logged in
Post condition	The cc uploaded the needed documents
Main path	Cc clicks on the documents button System directs cc to the documents page Cc clicks on upload documents Cc uploads needed documents Cc clicks on “save”
Alternative	Cc clicks on “save” without uploading any documents The system displays an error message and directs the cc to upload files