Software Requirements Specification

| **Student Name** | Chandru R |
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| **Seat No** | 183 |
| **Project ID** | 23 |
| **Project Title** | Approval of On-duty for the students |

Technical Components

| **Components** | **Tech Stack** |
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| **Frontend** | React |
| **Backend** | Node Js |
| **Backend Framework** | Express Js |
| **Database** | MongoDB |

# Module Description:

Build a portal/app for approving the On-duty for our students. The condition to approve on-duty 1. Both academic and placement FA should be above 50% 2. Mentor has to provide permission after receiving acknowledgement from the parent. 3 The special lab incharge should approve the permission after verifying event details.

# **Introduction:**

## 1.1 Project Purpose:

The purpose of this project is to streamline the process of approving On-Duty (OD) requests for students by developing a centralized portal or app. The aim is to automate the existing manual process, reducing time and energy spent by students while ensuring proper verification and approval steps are maintained.

## 1.2 Document Conventions:

This document follows standard software requirement specification (SRS) conventions, including clear headings, subsections, and language to describe the project requirements.

## 1.3 Project Scope:

The project scope includes developing a portal or app for students to request ODs based on specific criteria. It involves integrating various stakeholders such as students, mentors, special lab incharges, and parents into the approval workflow. Additionally, the scope covers implementing dashboards for administrators to monitor OD requests and upcoming events.

## 1.4 Glossary and References:

Glossary:

- OD: On-Duty

- SRS: Software Requirement Specification

References:

- College website (name: CAMPS): The existing platform used by students to raise OD requests.

# **2. Overall Description:**

## 2.1 Product Perspective:

The product will serve as a standalone portal or app, interacting with existing systems such as the college website for student authentication and event registration. It will integrate with IVR systems for parental acknowledgment and utilize event calendars for scheduling.

## 2.2 Product Features:

- Student authentication via existing college website credentials.

- OD request submission with event details.

- Verification by special lab incharge.

- Parental acknowledgment via IVR.

- Mentor approval based on parental acknowledgment.

- Dashboards for administrators to monitor OD requests and upcoming events.

## 2.3 Users Class and Characteristics:

Users include students, mentors, special lab incharges, parents, and administrators.

| *Student* | Initiate OD requests |
| --- | --- |
| *Mentors* | Approve based on Parental acknowledgment |
| *Special lab Incharges* | Verify event details |
| *Parents* | Provide acknowledgment via IVR |
| *Administrators* | Monitor the system |

## 2.4 Assumptions and Dependencies:

Assumptions:

- Students have access to the internet for portal/app usage.

- IVR system integration is feasible for parental acknowledgment.

Dependencies:

- Integration with existing college website for user authentication.

- Integration with the IVR system for parental acknowledgment.

# 3. System Features and Requirements:

## 3.1 Functional Requirements:

| User Authentication | The system must authenticate students using existing college website credentials. |
| --- | --- |
| OD Request Submission | Students should be able to submit OD requests with event details through the portal/app |
| Verification Process | Special lab incharges must verify OD requests for event details. |
| Parental Acknowledgement | Parents must provide acknowledgment via IVR for OD requests. |
| Mentor Approval: | Mentors should approve OD requests only after parental acknowledgment is received. |
| Dashboard | Administrators require dashboards to monitor OD requests and upcoming events. |

## 3.2 Non-Functional Requirements:

| *Security* | The system must ensure data privacy and integrity, especially regarding student information. |
| --- | --- |
| *Usability* | The portal/app should have an intuitive interface for easy navigation by students and other users |
| *Performance* | The system should handle concurrent user requests efficiently without significant delays. |
| *Reliability* | The system should be available and reliable for use during critical times, such as event registrations. |
| *Scalability* | The system should be scalable to accommodate a growing number of users and events over time. |

## 3.3 External Requirements:

- Integration with College Website and Database:

The system must integrate with the college website and Database for user authentication and ease of use.

- IVR Integration:

Integration with an IVR system is required for parental acknowledgment of OD requests.

# Project Flow:

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