#### LAB-6

The exercise involves a registration form with validation for a Library management system. The application utilizes various technologies including HTML, CSS, JavaScript, and potentially frameworks like Bootstrap and Tailwind CSS.

## Structure

- index.html: Main page of the takeoff creator support page.
- script.js: JavaScript for handling form validation and interaction.

### **Documentation**

#### index.html

Purpose: This file defines the structure and layout of the library management system's main page.

## **Key Sections:**

- Header: Contains the navigation bar with links to other pages.
- Main Content: Includes the registration form with input fields for user details.
- Footer: Contains footer information and contact details.

## Design:

- 1. HTML5 Semantics: Used HTML5 semantic elements (<header>, <nav>, <main>, <footer>) for better structure and accessibility.
- 2. Responsive Design: Applied responsive classes from Tailwind CSS and Bootstrap to ensure the layout adjusts well on different screen sizes.

# script.js

Purpose: Contains JavaScript functions to handle form validation and Submission.

# **Key Functions:**

- validateFullName: Validates the name input field.
- validateEmail: Validates the email input field.

- validatePassword(): Validates the password.
- validatePasswordMatch (): Validates the password with a confirm password input field.
- validateDob (): Validates the age input field.

## Design:

- 1. Modular Functions: Each validation function is modular to ensure separation of concerns and easier maintenance.
- 2. Real-Time Feedback: Validation is performed in real-time as the user types, enhancing the user experience.

## <u>Implementation Decisions</u>

- 1. Use of Tailwind CSS and Bootstrap:
- o **Tailwind CSS:** Provides utility-first classes that allow for rapid styling and responsive design.
- o **Rationale:** Tailwind helps to ensuring a visually appealing and functional design.
- 2. Form Validation:
- o **Real-Time Validation**: Improves user experience by providing immediate feedback.
- o **Modular Approach:** Each field's validation is handled separately to ensure clear and manageable code.