



**TRIBHUVAN UNIVERSITY
INSTITUTE OF ENGINEERING
PULCHOWK CAMPUS**

LOGTRACKER

**A COURSE PROJECT SUBMITTED TO THE DEPARTMENT OF
ELECTRONICS AND COMPUTER ENGINEERING IN PARTIAL
FULFILLMENT OF THE REQUIREMENTS FOR THE PRACTICAL
COURSE ON SOFTWARE ENGINEERING [CT 601]**

Submitted by:

Sandhya Baral (PUL077BCT076)

Sujan Kapali (PUL077BCT086)

Surav Krishna Shrestha (PUL077BCT089)

Submitted to:

Department of Electronics and Computer Engineering

Pulchowk Campus, Institute of Engineering,

Tribhuvan University

Lalitpur, Nepal

August, 2023

Contents

1	Introduction	2
1.1	Admin Mode	2
1.2	Student Mode	2
1.3	Teacher Mode	3
2	Features	3
2.1	Admin Mode Features	3
2.2	Student Mode Features	3
2.3	Teacher Mode Features	3
3	Tech Stack	4
3.1	Frontend	4
3.2	Backend	4
3.3	Database	4
3.4	Testing and other development tools	4
4	Local usage	5
5	Team Members	5

1 Introduction

Log Tracker is a web application designed to track projects and thesis updates. It was built as the Software Engineering Project in 5th semester, Computer Engineering.

Project URL: <http://kvpnlvizbwcpjgz.bct.itclub.pp.ua/>

It offers three distinct modes catering to different user roles:

1.1 Admin Mode

An admin

- Can synchronize the student database from the API provided by CIT, Pulchowk Campus
- Can create/edit a new project
- Can assign/edit students and supervisors associated with the project
- Can read the minutes, comments and download related attachments from each meeting
- Can call students for mid-term defense and final defense

Admin credentials:

- **Email:** admin@ioe.edu.np
- **Password:** Admin@IOEAdmin

1.2 Student Mode

A student

- Can add/edit minutes, comments and related attachments for each meeting
- Can create upcoming events
- Can ask approval from supervisor(teacher) for mid-term and final defense

Student credentials format:

- **Email:** <CAMPUS-ROLL-NO>.<FIRSTNAME>@pcampus.edu.np
- **Password (case sensitive):** <CAMPUS-ROLL-NO>

Example:

- **Name:** Surav Krishna Shrestha
- **Email:** 077bct089.surav@pcampus.edu.np

- **Password:** 077bct089

For master students' credentials, view this Excel file.

1.3 Teacher Mode

A teacher

- Can verify the minutes and related attachments written by students and add comments
- Can create upcoming events
- Can approve a project for mid-term and final defense

For teachers' credentials, view this Excel file.

Note:

For security reasons, users have the privilege of changing their password on their initial login.

2 Features

2.1 Admin Mode Features

- Synchronise student database (add new students if they don't have an account in the system)
- Create and manage projects.
- Assign students and supervisors to projects.
- View minutes, comments, and download meeting attachments.
- Initiate mid-term and final defense processes.

2.2 Student Mode Features

- Add and edit meeting minutes and comments.
- Attach and manage related documents.
- Create and track upcoming events.
- Request supervisor approval for defense.

2.3 Teacher Mode Features

- Review student-submitted minutes and attachments.
- Provide comments and feedback.

- Create and manage upcoming events.
- Approve projects for defense.

3 Tech Stack

3.1 Frontend

- HTML - Used for structuring web pages.
- CSS - Used for styling and layout design.
- JavaScript (JS) - Used for dynamic and interactive web functionality.
- Bootstrap - A CSS framework for responsive web design.
- ejs - A template engine for generating dynamic HTML content.

3.2 Backend

- Node.js - A runtime environment for executing JavaScript on the server.
- Express.js - A web application framework for Node.js.

3.3 Database

- MongoDB - A NoSQL database used for storing project and user data.

3.4 Testing and other development tools

- Jest - A JavaScript testing framework used for unit and integration testing.
- ESLint - A static code analysis tool for JavaScript.
- Prettier - A code formatter for maintaining consistent code style.

4 Local usage

1. Clone the repository:

```
git clone https://github.com/suravshrestha/logtracker.git
```

2. Navigate to the repository:

```
cd logtracker
```

3. Install the dependencies:

```
npm install
```

This might take a while to complete.

4. Create a '.env' file in the root of the project and set the following credentials:

```
#.env
SECRET=

# Admin credentials
ADMIN_NAME=
ADMIN_USERNAME=
ADMIN_EMAIL=
ADMIN_PASSWORD=
```

Note: For admin email, use 'ioe.edu.np' domain.

5. Start the development server:

```
npm run dev
```

You can view the application at <http://localhost:3000/>.

Note: When the development server is first run, it will populate the faculties using the data from config/faculties.json.

5 Team Members

- Sandhya Baral (077BCT076)
- Sujan Kapali (077BCT086)
- Surav Krishna Shrestha (077BCT089)