INSTITUTE FOR ADVANCED COMPUTING AND SOFTWARE DEVELOPMENT, AKURDI, PUNE

Dial100.com
Crime Reporting Portal

PG-DAC Mar 2024

Submitted By:
Group No: 59

Roll No.	Name.
243120	Ajith Appi Naik
243166	Mayuri Jire

Mrs. Manjiri Deshpande
Project Guide

Mr. Rohit Pauranik
Centre Coordinator

ABSTRACT

The Dial-100 portal is an innovative web-based service designed to simplify the reporting and management of crime incidents, aiming to bolster public safety and strengthen community-law enforcement relations. This user-friendly platform allows individuals to effortlessly register, report crimes—either anonymously or with identification—and monitor the progress of their reports. By providing streamlined tools for case management, the portal enhances efficiency for law enforcement agencies.

Future enhancements will focus on optimizing the reporting process further and offering valuable insights to law enforcement for proactive crime prevention. The ultimate goal of Dial-100 is to create a comprehensive system that not only improves the efficiency and effectiveness of crime reporting but also fosters a closer connection between the community and those responsible for their safety.

ACKNOWLEDGEMENT

I take this occasion to thank God, almighty for blessing us with his grace and taking our endeavour to a successful culmination. I extend my sincere and heartfelt thanks to our esteemed guide, Mrs. Manjiri Deshpande for providing me with the right guidance and advice at the crucial juncture sand for showing me the right way. I extend my sincere thanks to our respected Centre Co-Ordinator Mr. Rohit Puranik, for allowing us to use the facilities available. I would like to thank the other faculty members also, at this occasion. Last but not the least, I would like to thank my friends and family for the support and encouragement they have given me during the course of our work.

Ajith Appi Naik
(240341220013)

Mayuri Jire
(240341220101)

Table of Contents

Sr.No	Description	Page No.
1	Introduction	1
2	SRS	2
3	Software and Hardware requirements	6
4	Diagrams	7
4.1	ER Diagram	7
4.2	Data Flow Diagram	9
5	UML Diagrams	11
5.1	Use Case Diagram	11
5.2	Activity Diagram	12
5.3	Class Diagram	14
5.4	Sequence Diagram	15
6	Table Structure	16
7	Snapshots	19
8	References	28
9	Conclusion	29
9.1	Future Scope	30

1. INTRODUCTION

In today's digital age, effective communication and efficient management systems are critical in enhancing public safety and fostering strong community ties. The traditional methods of reporting and managing crime incidents often involve lengthy processes and can be challenging for both the public and law enforcement agencies. Recognizing these challenges, our Dial-100 portal emerges as a ground breaking solution designed to revolutionize crime reporting and case management.

Dial-100 is a user-friendly web service that simplifies the process of reporting crime incidents. The platform allows users to easily register, report incidents—either anonymously or with their identity—and track the status of their reports. This streamlined approach not only facilitates easier access for the public but also equips law enforcement authorities with powerful tools for efficient case management.

As technology continues to advance, Dial-100 stands ready to evolve alongside these changes. Future enhancements will focus on further optimizing the reporting process and providing law enforcement agencies with valuable insights to drive proactive crime prevention strategies. By bridging the gap between citizens and authorities, Dial-100 aims to enhance public safety and build stronger, more engaged communities.

2. SOFTWARE REQUIREMENT SPECIFICATION

2.1 Purpose

The purpose of this document is to provide a detailed specification of the features and functionalities of the Dial-100 portal. It outlines the requirements, system architecture, and user interactions to facilitate efficient crime reporting and management.

2.2 Scope

The Dial-100 portal is designed to manage crime incident reporting and tracking. It supports user registration, anonymous incident reporting, progress tracking, and provides case management tools for law enforcement authorities. Future enhancements will focus on optimizing the reporting process and offering insights for proactive crime prevention.

2.3 Objective of Project on Dial100.com :

The Dial-100 project is designed with clear objectives to enhance crime reporting and management. The primary goal is to provide a user-friendly platform that simplifies the reporting of crime incidents and allows users to track their progress from anywhere.

Key objectives include creating an intuitive interface for users and law enforcement, ensuring options for anonymous reporting, and offering robust case management tools. The system focuses on improving public safety, enhancing data accuracy and integrity, and fostering stronger connections between communities and law enforcement agencies.

By leveraging advanced technology and a forward-thinking approach, the project aims to create a reliable, transparent, and efficient platform that benefits all stakeholders involved in crime management.

2.4 Functionalities provided by Dial100.com are as follows:

The Dial-100 portal offers a range of functionalities designed to streamline crime reporting and management. Key functionalities include:

1. User Registration and Authentication: Users can create accounts and securely log in, with robust authentication mechanisms ensuring the protection of personal data.

2. Incident Reporting: Users can report crime incidents easily, with options for anonymous reporting if desired, ensuring privacy and accessibility.

3. Progress Tracking: The platform allows users to track the status of their reports in real time, providing updates on the investigation process.

4. Case Management Tools: Law enforcement authorities have access to efficient tools for managing and prioritizing cases, improving response times and coordination.

5. Data Integrity: The system maintains accurate and consistent data across the platform, reducing errors and ensuring reliable information.

6. Future Enhancements: Plans to further streamline the reporting process and provide actionable insights for proactive crime prevention.

In summary, the Dial-100 portal combines user-friendly features and advanced tools to enhance the crime reporting process, improve public safety, and strengthen community-law enforcement connections.

Functional Requirements

FR 1. User Registration and Authentication:

- Users can register by providing necessary details.
- User authentication is required to access the system.

FR 2. Crime Reporting Application:

- Plaintiff can easily register complaint and check for the updates.
- Authority can Investigate the complaint and provide the updates.

FR 3. Plaintiff and Authority Profiles:

- Both users can view and update their profiles.
- User profiles store personal information, contact details.

FR 4. Error Handling and Reporting:

- The system handles errors gracefully and provides appropriate error messages.

Non-Functional Requirements:

NFR 1. Security:

- User passwords are securely stored using encryption techniques.
- Access controls ensure that users can only access authorized features.

NFR 2. Performance:

- The system should handle a large number of simultaneous users without significant lowdowns.
- Image loading and retrieval should be efficient for a smooth user experience.

NFR 3. Scalability:

- The system should be designed to accommodate future growth and increased user activity.

NFR 4. Usability:

- The user interface should be intuitive and user-friendly for both Plaintiff and Authority.
- Clear and concise error messages should guide users through any issues.

NFR 5. Reliability:

- The system should be available and operational 24/7 with minimal downtime.

NFR 6. Data Integrity:

- Data integrity and consistency are maintained through proper validation and database design.

NFR 7. Data Privacy:

- User data, especially personal and sensitive information, should be stored securely.

3. SOFTWARE AND HARDWARE REQUIREMENTS:

Hardware and Network Interfaces:

Back-end Server Configuration:

- Intel Pentium-IV Processor
- 128 MB RAM

Front-end Client Configuration:

- Intel Pentium-III @ 650 MHz Processor
- 128 MB SDRAM
- 10 GB Hard Disk Drive
- 104 Keys Keyboard
- PS2 Mouse with pad

Software Interfaces:

Software configuration for back-end Services:

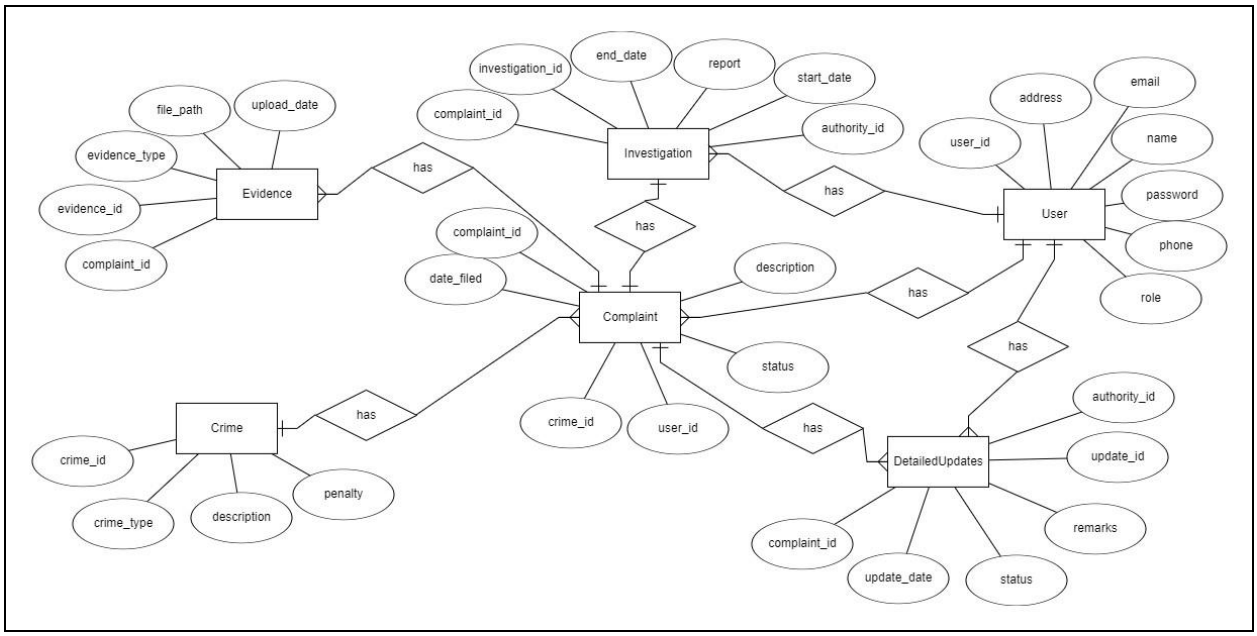
- Java EE
- Spring Boot, JPA
- MySQL
- STS 3.9.18

Software configuration for front-end Services:

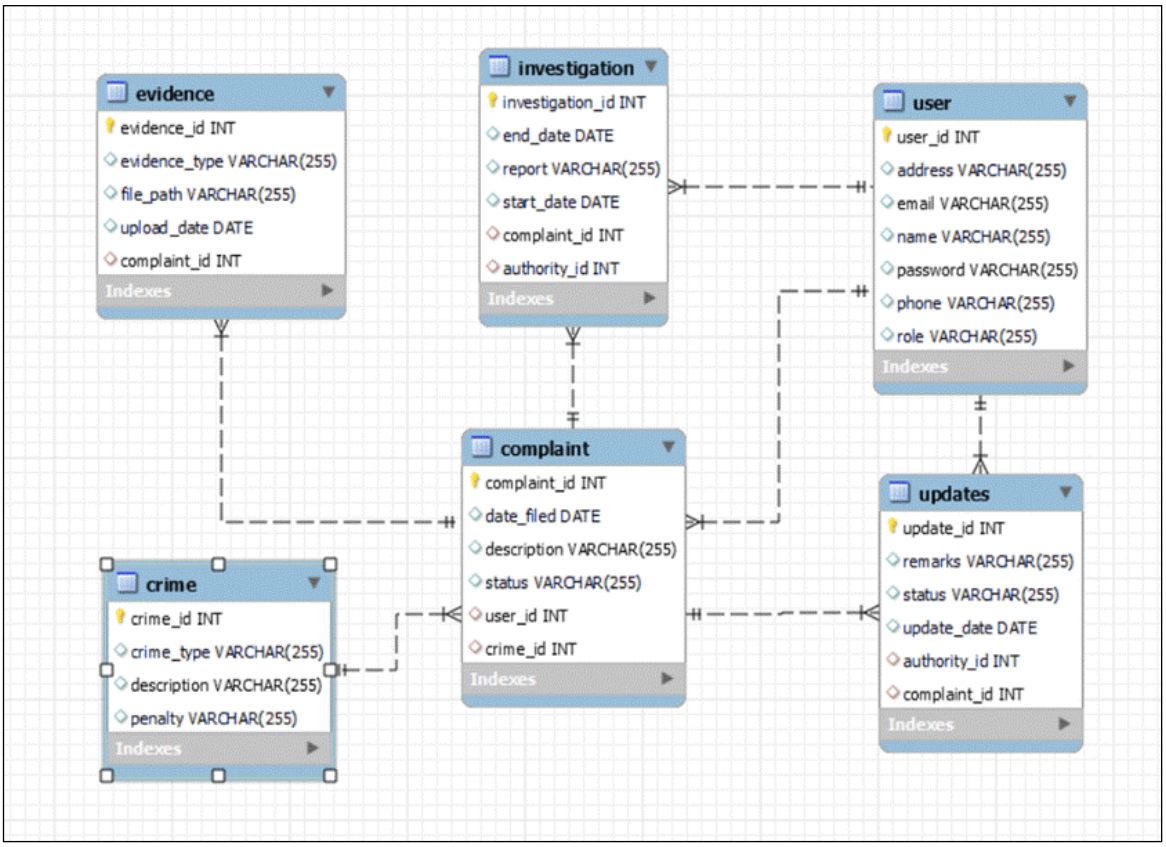
- ReactJS
- HTML, CSS, JS
- Bootstrap
- VS Code

4. DIAGRAMS

4.1 ER DIAGRAM:

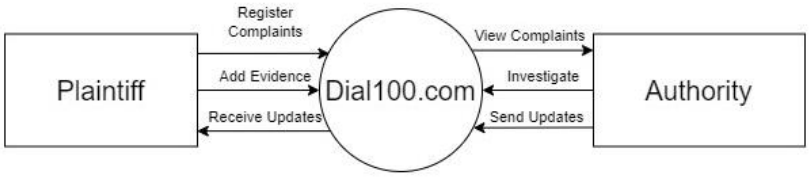


ER DIAGRAM:

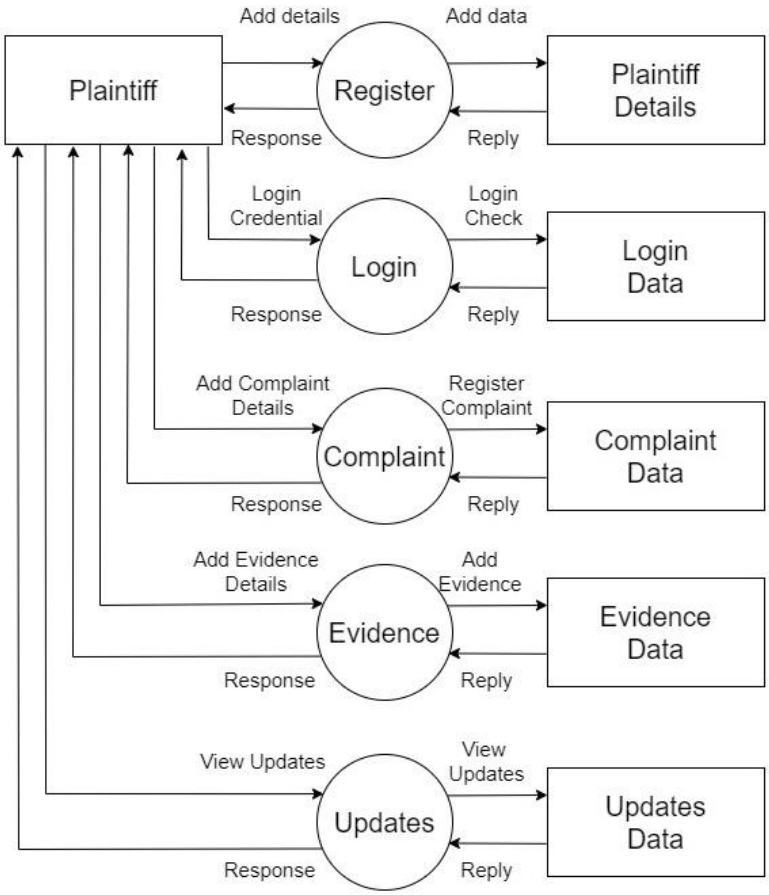

evidence
evidence_id INT
evidence_type VARCHAR(255)
file_path VARCHAR(255)
upload_date DATE
complaint_id INT
Indexes
investigation
investigation_id INT
end_date DATE
report VARCHAR(255)
start_date DATE
complaint_id INT
authority_id INT
Indexes
user
user_id INT
address VARCHAR(255)
email VARCHAR(255)
name VARCHAR(255)
password VARCHAR(255)
phone VARCHAR(255)
role VARCHAR(255)
Indexes
complaint
complaint_id INT
date_filed DATE
description VARCHAR(255)
status VARCHAR(255)
user_id INT
crime_id INT
Indexes
updates
update_id INT
remarks VARCHAR(255)
status VARCHAR(255)
update_date DATE
authority_id INT
complaint_id INT
Indexes
crime
crime_id INT
crime_type VARCHAR(255)
description VARCHAR(255)
penalty VARCHAR(255)
Indexes

4.2 DATA FLOW DIAGRAM:

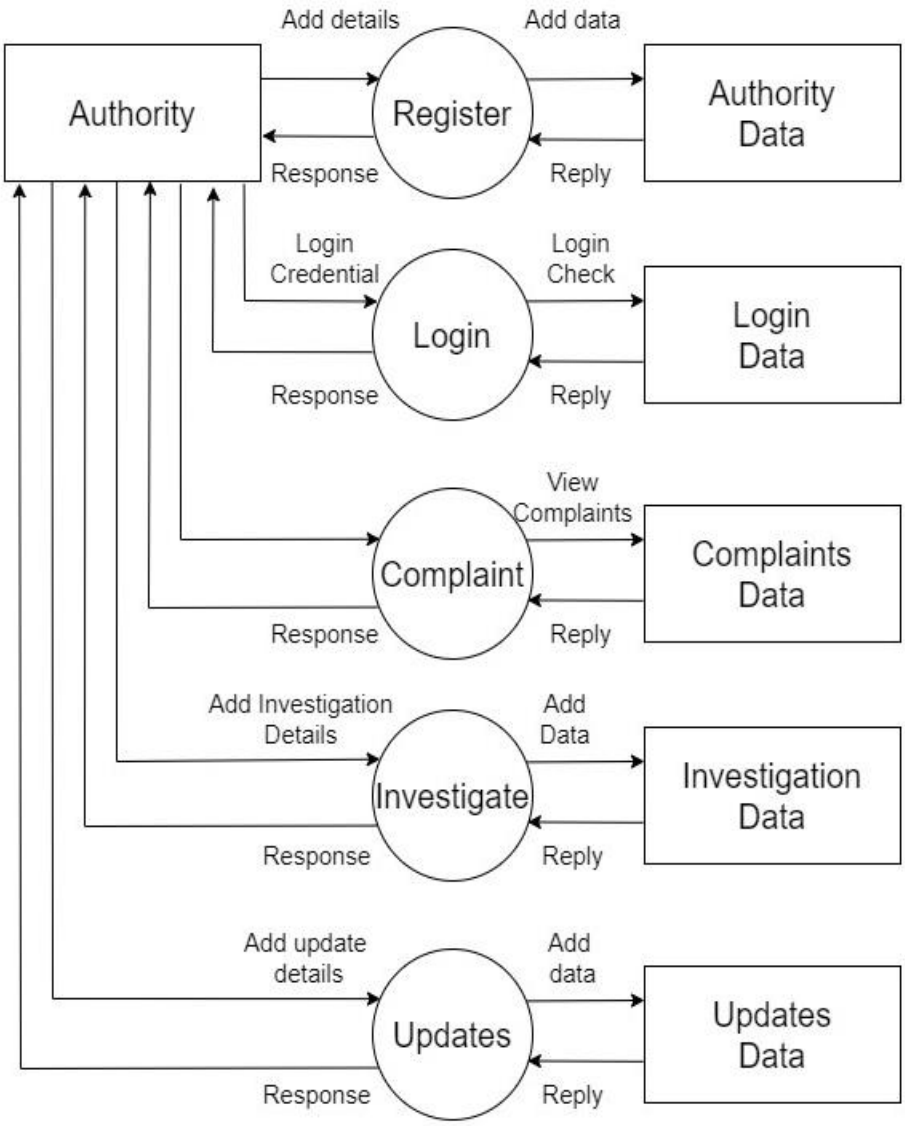
Level 0:



Plaintiff side DFD Level 1:

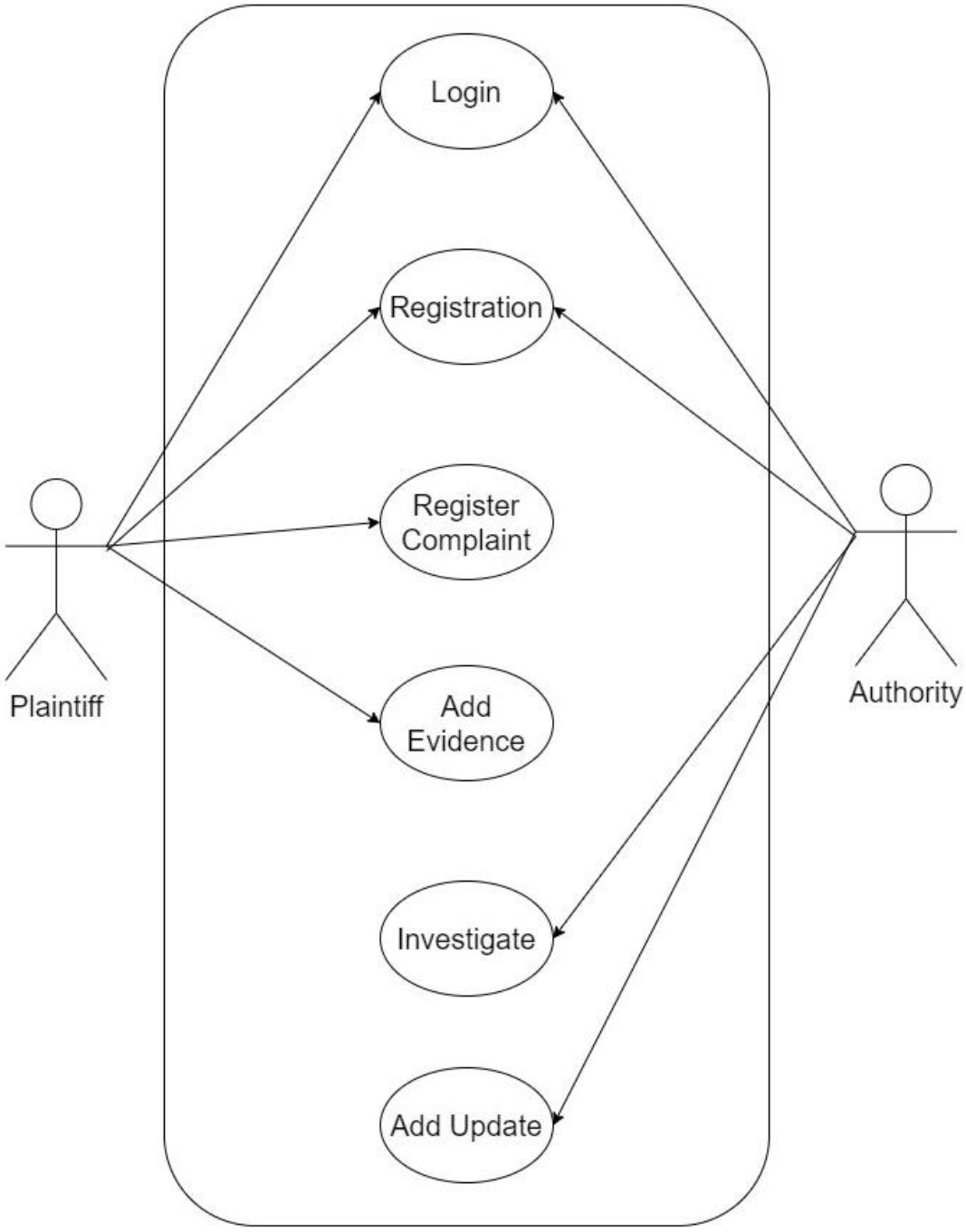


Authoritry side DFD Level 1:



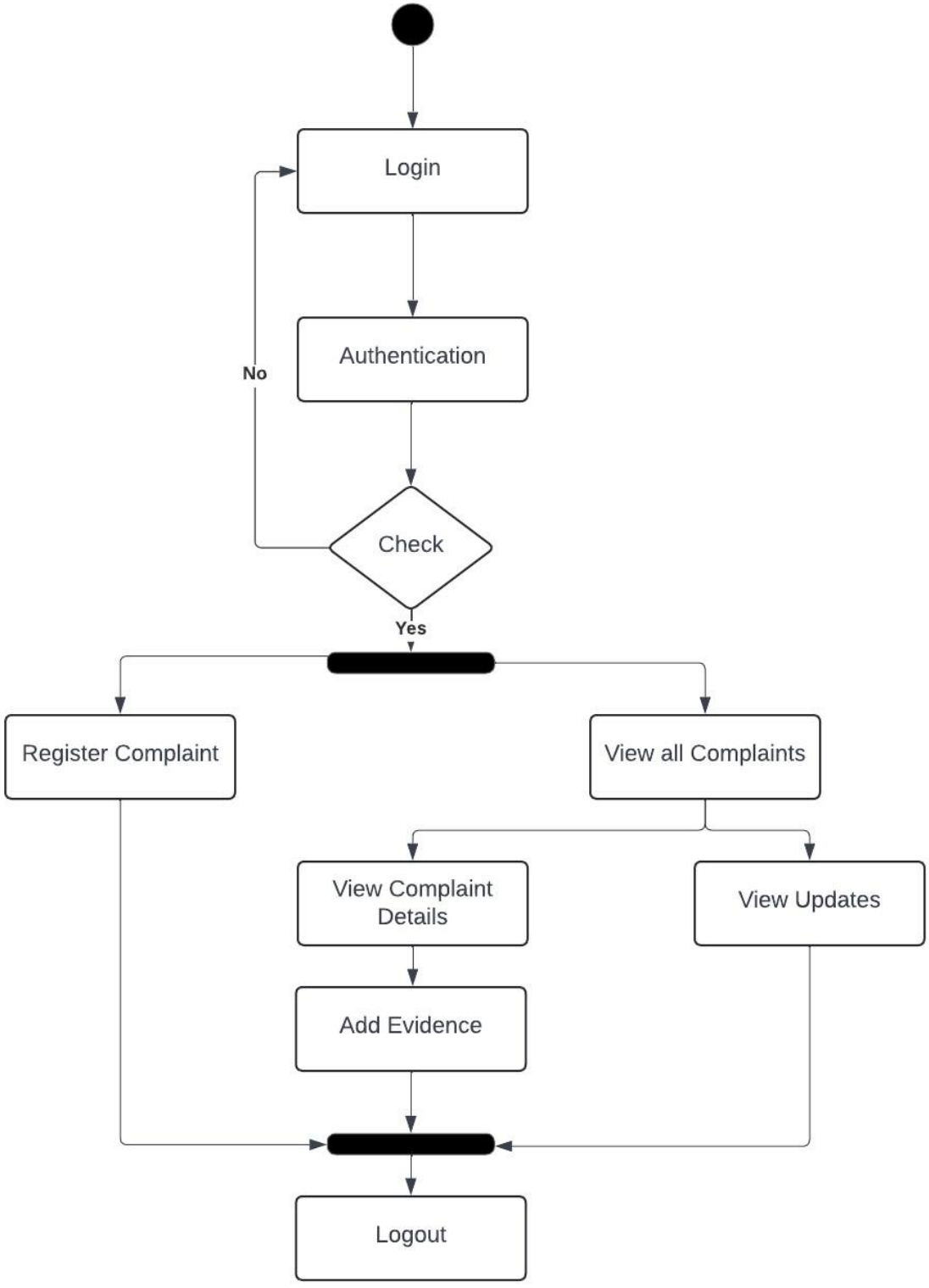
5. UML DIAGRAM:

5.1 USE CASE DIAGRAM:

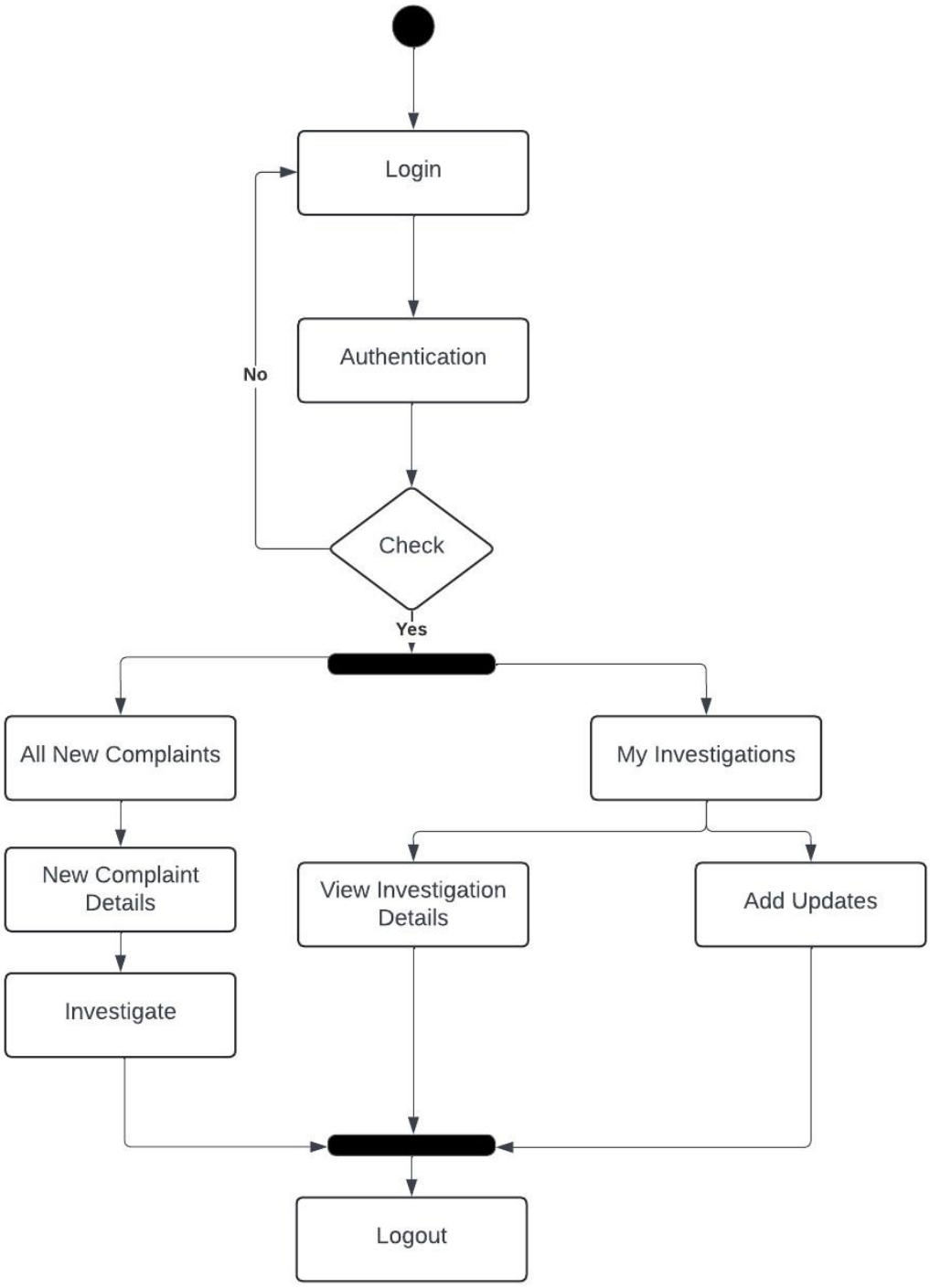


5.2 ACTIVITY DIAGRAM

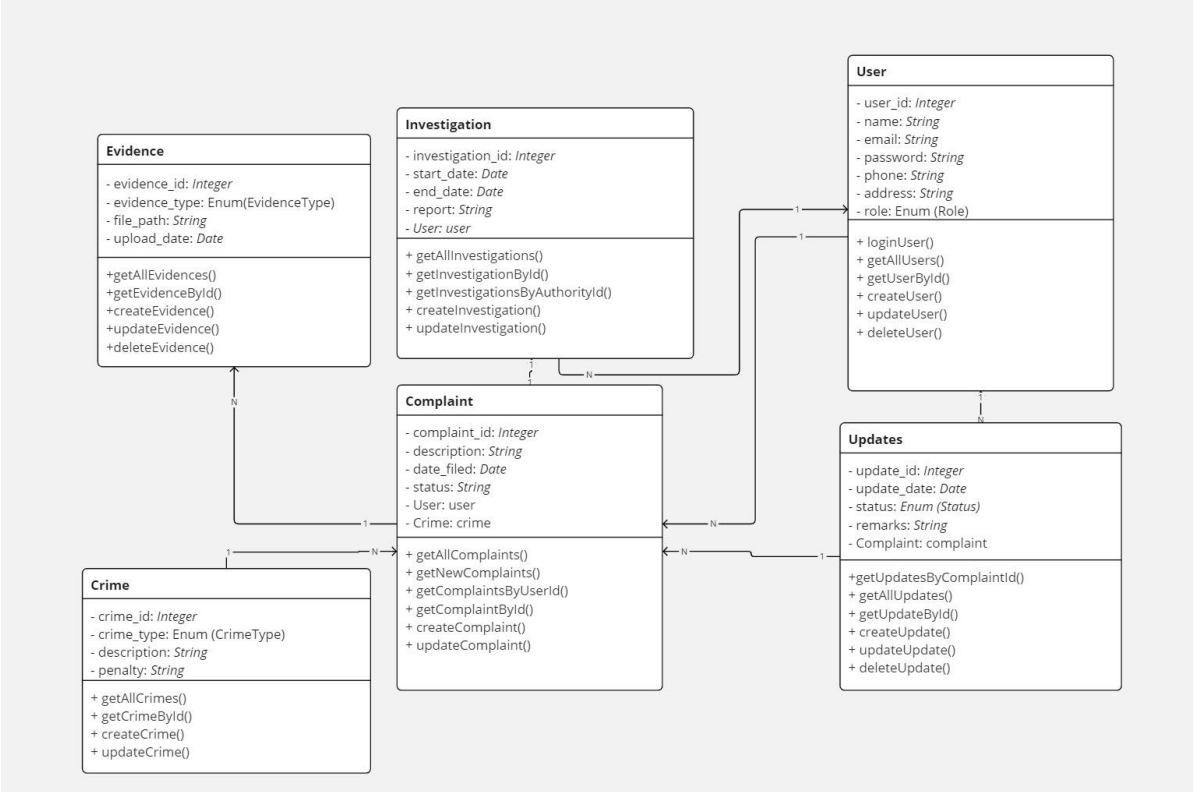
Plaintiff Activity Diagram:



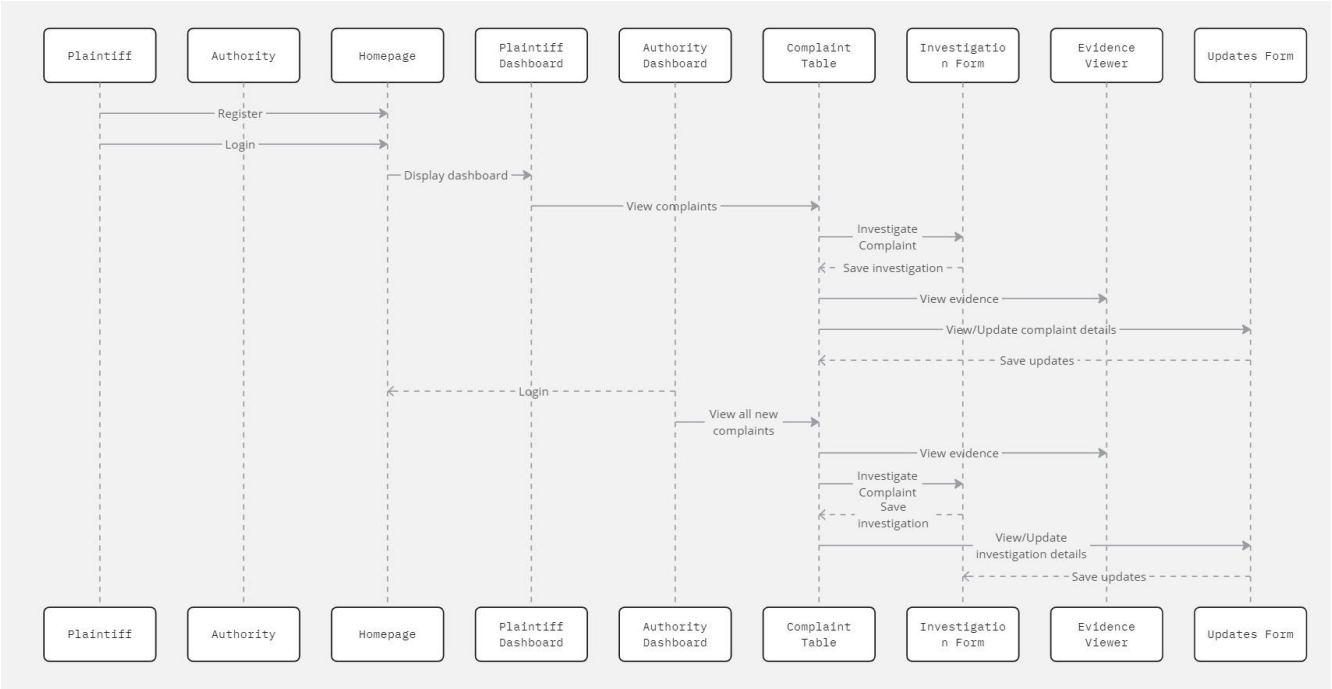
Authority Activity Diagram:



5.3 CLASS DIAGRAM



5.4 SEQUENCE DIAGRAM:



6. TABLE STRUCTURE

Database Design

The following table structures depict the database design.

Table 1: user:

```
mysql> desc user;
+----------+--------------+------+-----+---------+----------------+
| Field    | Type         | Null | Key | Default | Extra          |
+----------+--------------+------+-----+---------+----------------+
| user_id  | int          | NO   | PRI | NULL    | auto_increment |
| address  | varchar(255) | YES  |     | NULL    |                |
| email    | varchar(255) | YES  |     | NULL    |                |
| name     | varchar(255) | YES  |     | NULL    |                |
| password | varchar(255) | YES  |     | NULL    |                |
| phone    | varchar(255) | YES  |     | NULL    |                |
| role     | varchar(255) | YES  |     | NULL    |                |
+----------+--------------+------+-----+---------+----------------+
7 rows in set (0.01 sec)
```

Table 2: complaint:

```
mysql> desc complaint;
+--------------+--------------+------+-----+---------+----------------+
| Field        | Type         | Null | Key | Default | Extra          |
+--------------+--------------+------+-----+---------+----------------+
| complaint_id | int          | NO   | PRI | NULL    | auto_increment |
| date_filed   | date         | YES  |     | NULL    |                |
| description  | varchar(255) | YES  |     | NULL    |                |
| status       | varchar(255) | YES  |     | NULL    |                |
| user_id      | int          | YES  | MUL | NULL    |                |
| crime_id     | int          | YES  | MUL | NULL    |                |
+--------------+--------------+------+-----+---------+----------------+
6 rows in set (0.00 sec)
```

Table 3: crime:

```
mysql> desc crime;
+-------------+--------------+------+-----+---------+----------------+
| Field       | Type         | Null | Key | Default | Extra          |
+-------------+--------------+------+-----+---------+----------------+
| crime_id    | int          | NO   | PRI | NULL    | auto_increment |
| crime_type  | varchar(255) | YES  |     | NULL    |                |
| description | varchar(255) | YES  |     | NULL    |                |
| penalty     | varchar(255) | YES  |     | NULL    |                |
+-------------+--------------+------+-----+---------+----------------+
4 rows in set (0.00 sec)
```

Table 4: evidence:

```
mysql> desc evidence;
+---------------+--------------+------+-----+---------+----------------+
| Field         | Type         | Null | Key | Default | Extra          |
+---------------+--------------+------+-----+---------+----------------+
| evidence_id   | int          | NO   | PRI | NULL    | auto_increment |
| evidence_type | varchar(255) | YES  |     | NULL    |                |
| file_path     | varchar(255) | YES  |     | NULL    |                |
| upload_date   | date         | YES  |     | NULL    |                |
| complaint_id  | int          | YES  | MUL | NULL    |                |
+---------------+--------------+------+-----+---------+----------------+
5 rows in set (0.00 sec)
```

Table 5: investigaton:

```
mysql> desc investigation;
+------------------+--------------+------+-----+---------+----------------+
| Field            | Type         | Null | Key | Default | Extra          |
+------------------+--------------+------+-----+---------+----------------+
| investigation_id | int          | NO   | PRI | NULL    | auto_increment |
| end_date         | date         | YES  |     | NULL    |                |
| report           | varchar(255) | YES  |     | NULL    |                |
| start_date       | date         | YES  |     | NULL    |                |
| complaint_id     | int          | YES  | UNI | NULL    |                |
| authority_id     | int          | YES  | MUL | NULL    |                |
+------------------+--------------+------+-----+---------+----------------+
6 rows in set (0.01 sec)
```

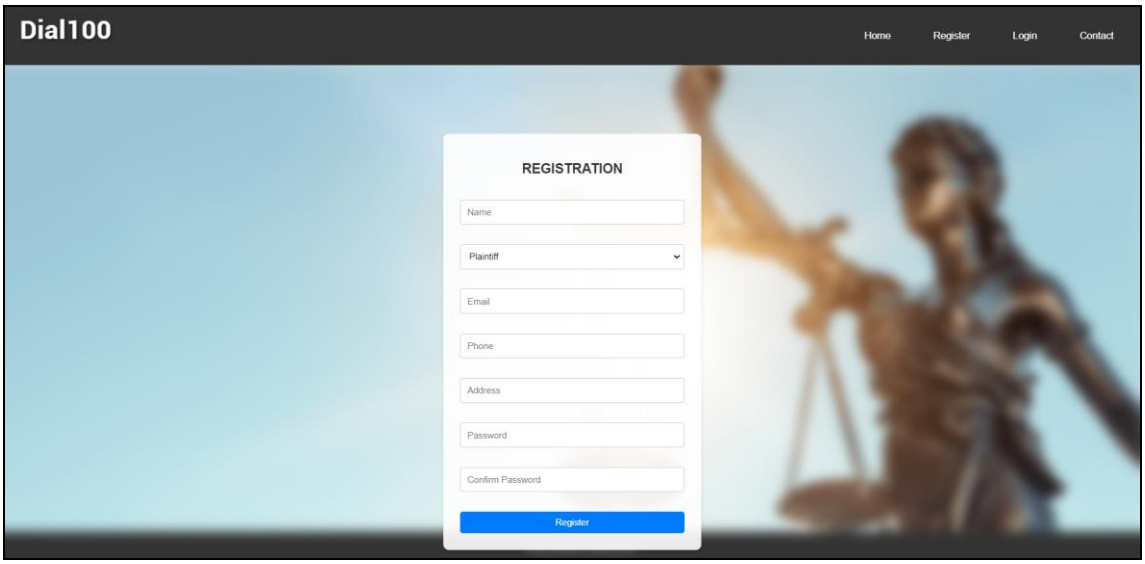
Table 6: updates:

```
mysql> desc updates;
+--------------+--------------+------+-----+---------+----------------+
| Field        | Type         | Null | Key | Default | Extra          |
+--------------+--------------+------+-----+---------+----------------+
| update_id    | int          | NO   | PRI | NULL    | auto_increment |
| remarks      | varchar(255) | YES  |     | NULL    |                |
| status       | varchar(255) | YES  |     | NULL    |                |
| update_date  | date         | YES  |     | NULL    |                |
| authority_id | int          | YES  | MUL | NULL    |                |
| complaint_id | int          | YES  | MUL | NULL    |                |
+--------------+--------------+------+-----+---------+----------------+
6 rows in set (0.00 sec)
```

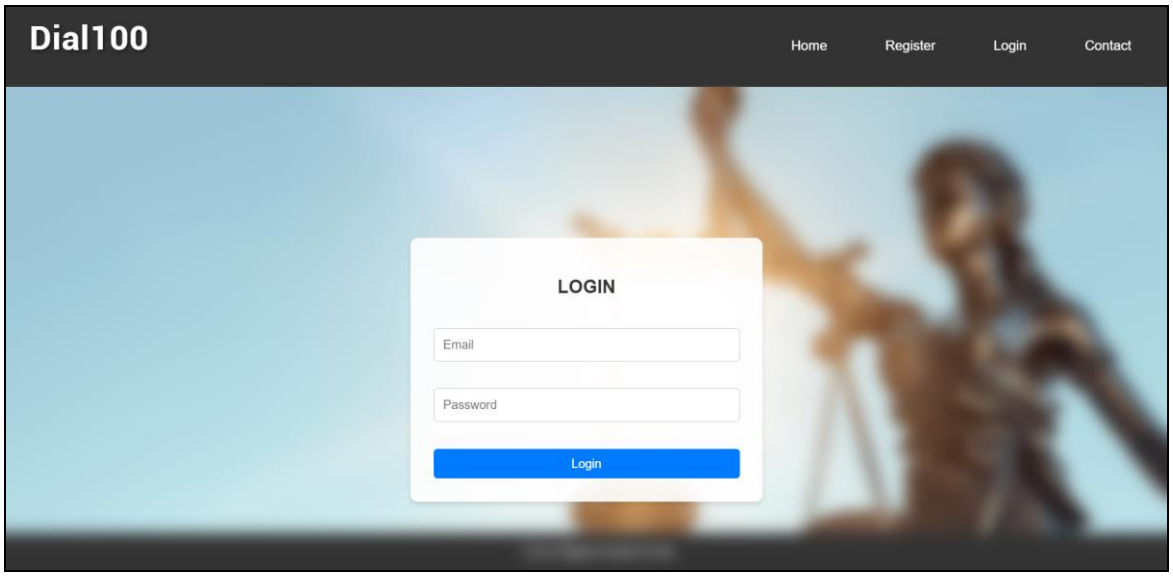
7. SNAPSHOTS

1. Home Page:

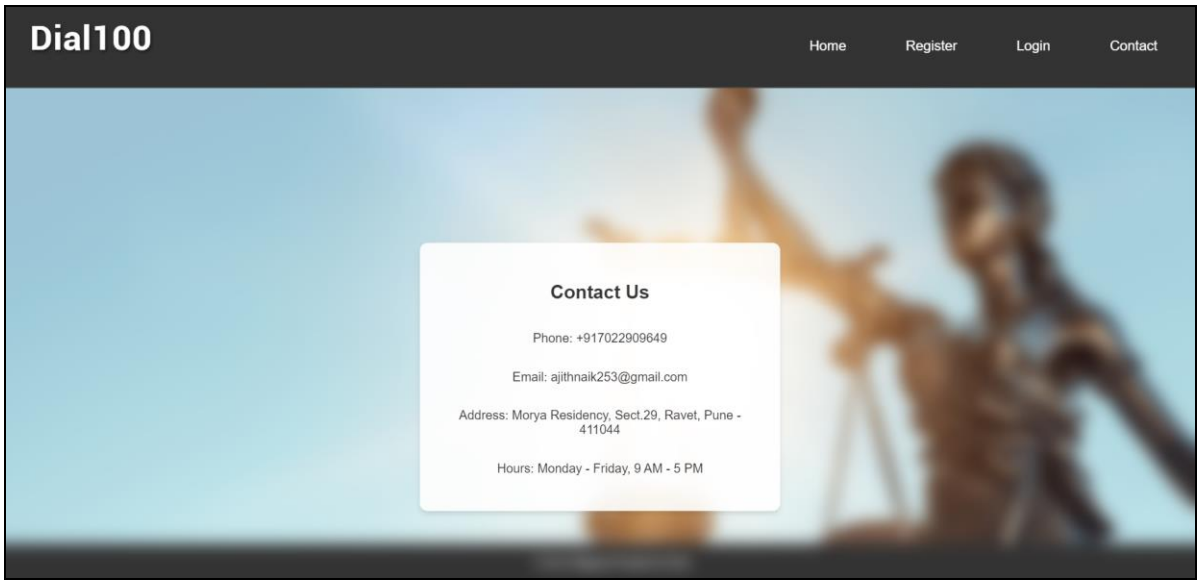
2. Registration Page:



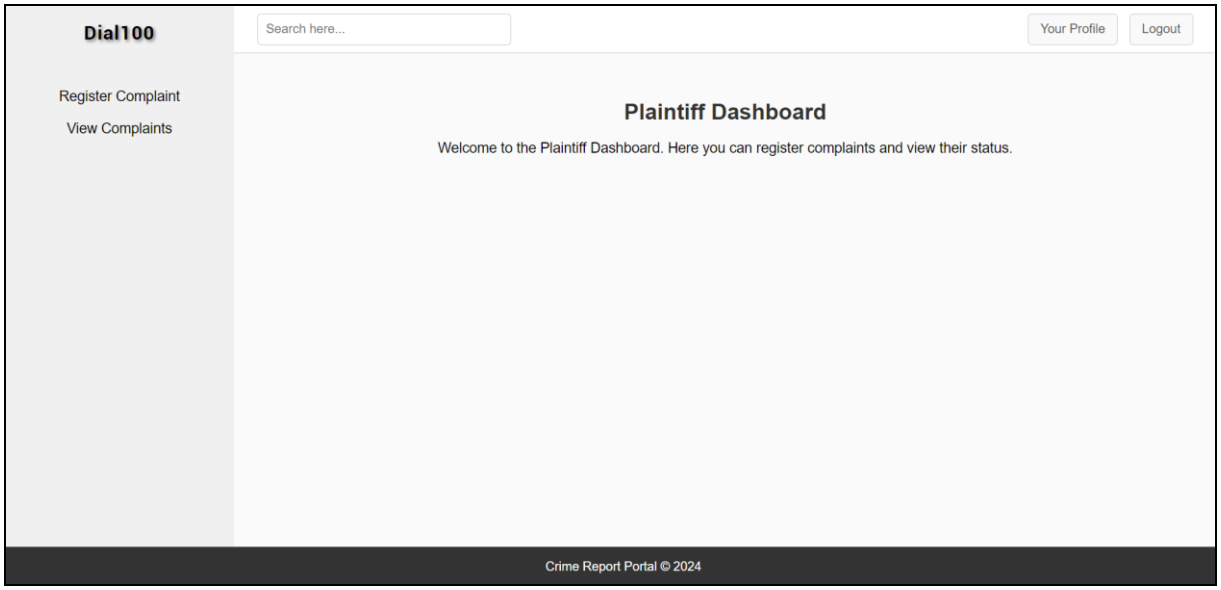
3. Login Page:



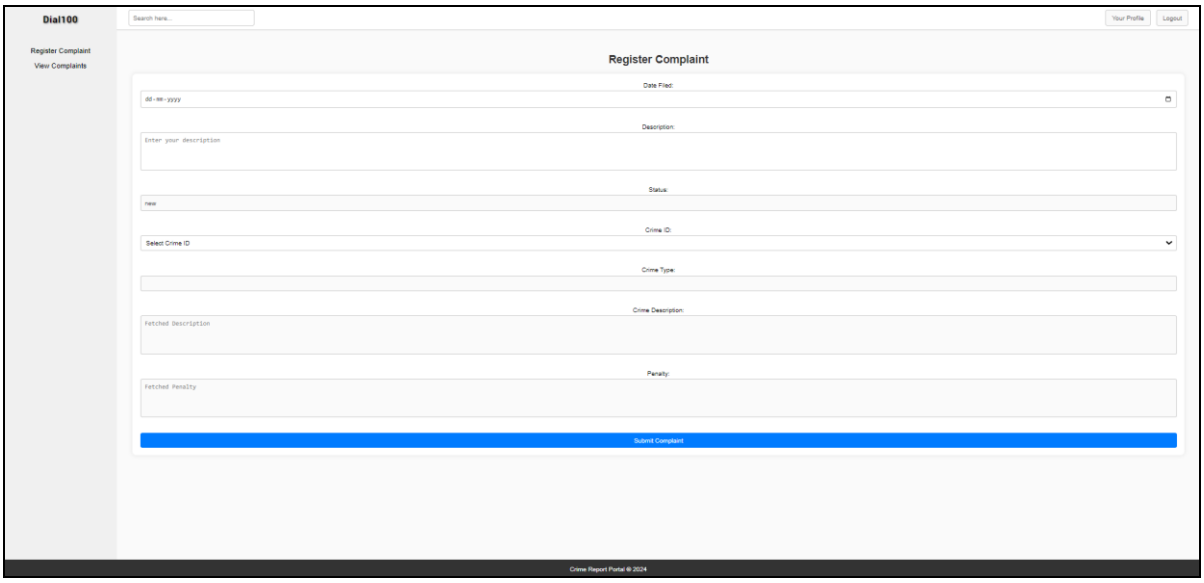
4. Contact Page:



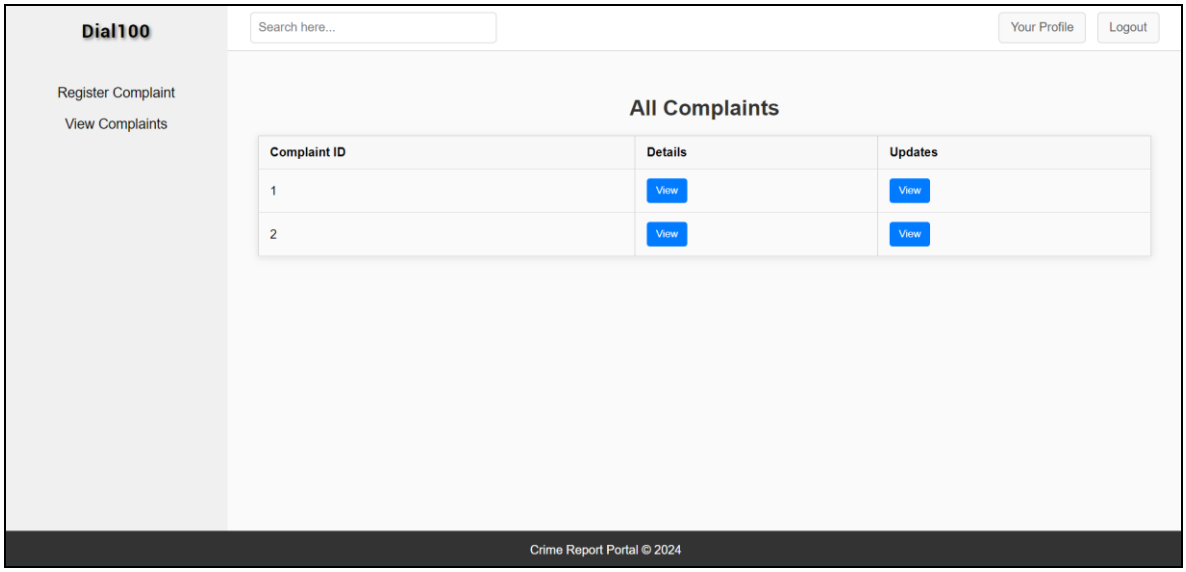
5. Plaintiff Dashboard Page:



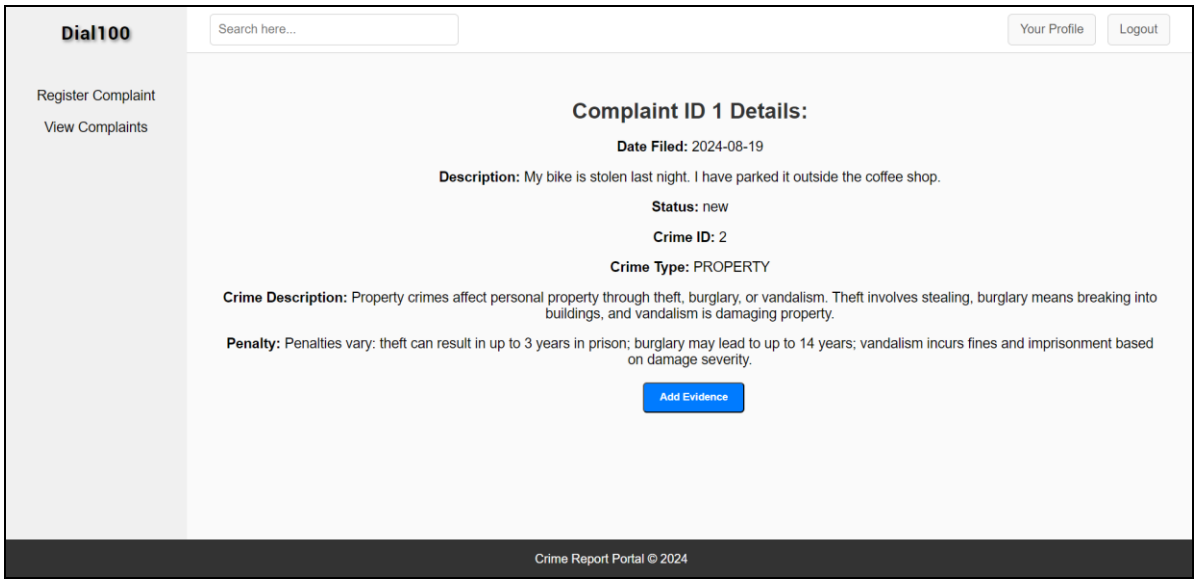
6. Register complaint page:



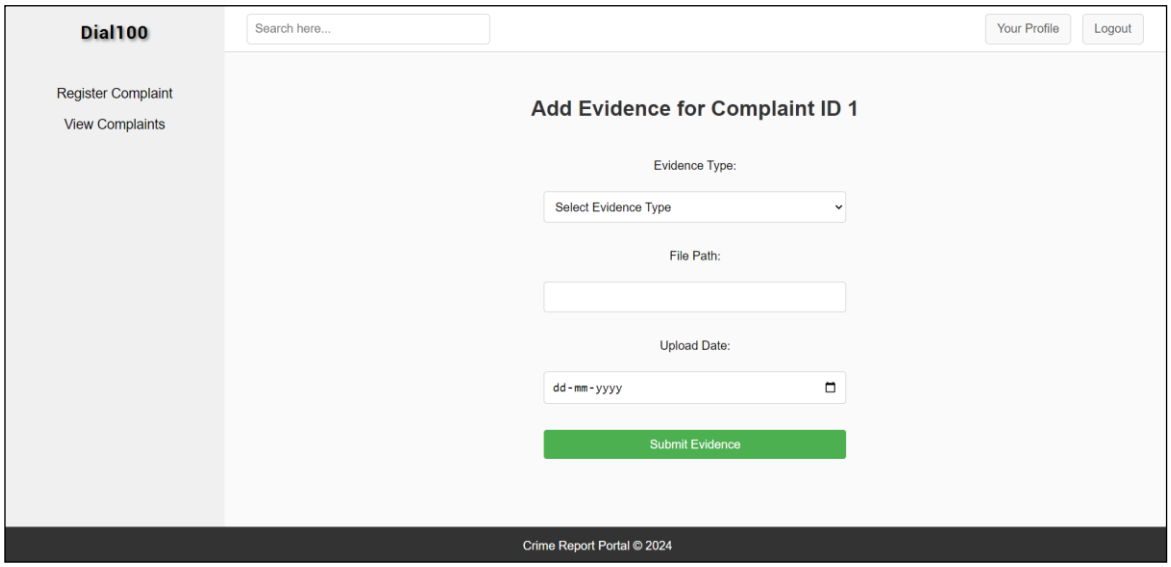
7. View Complaints Page:



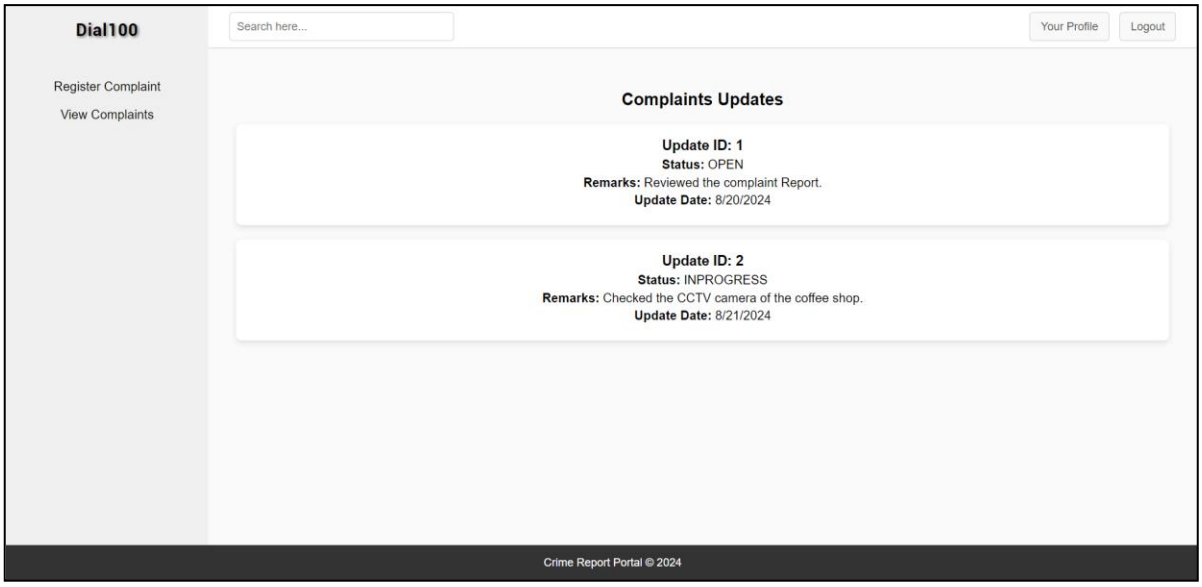
8. Plaintiff Complaint Details Page:



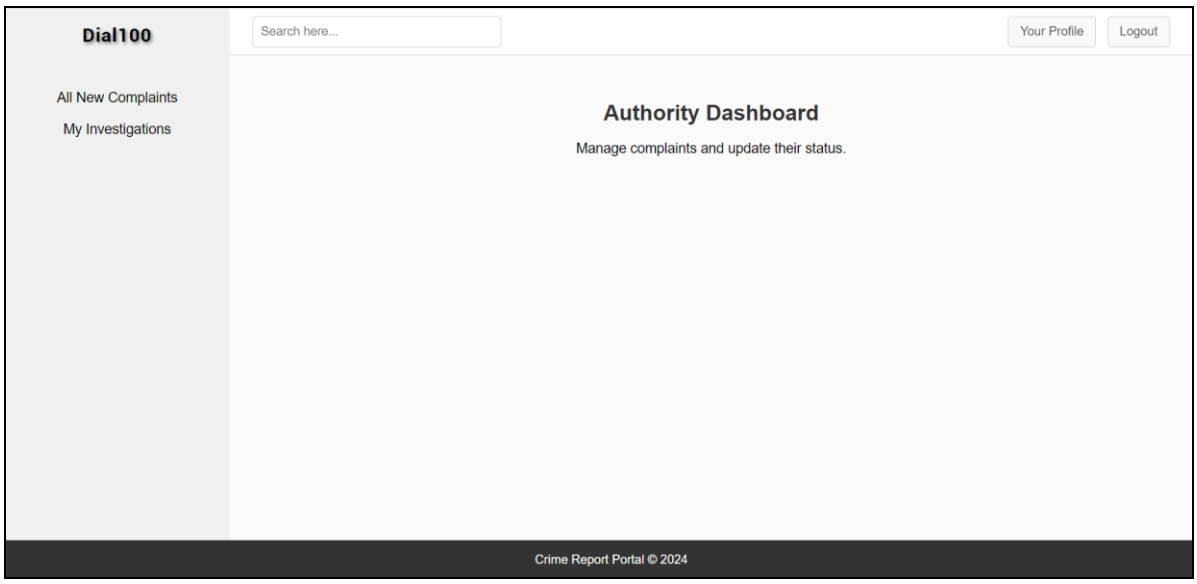
9. Add Evidence Page:



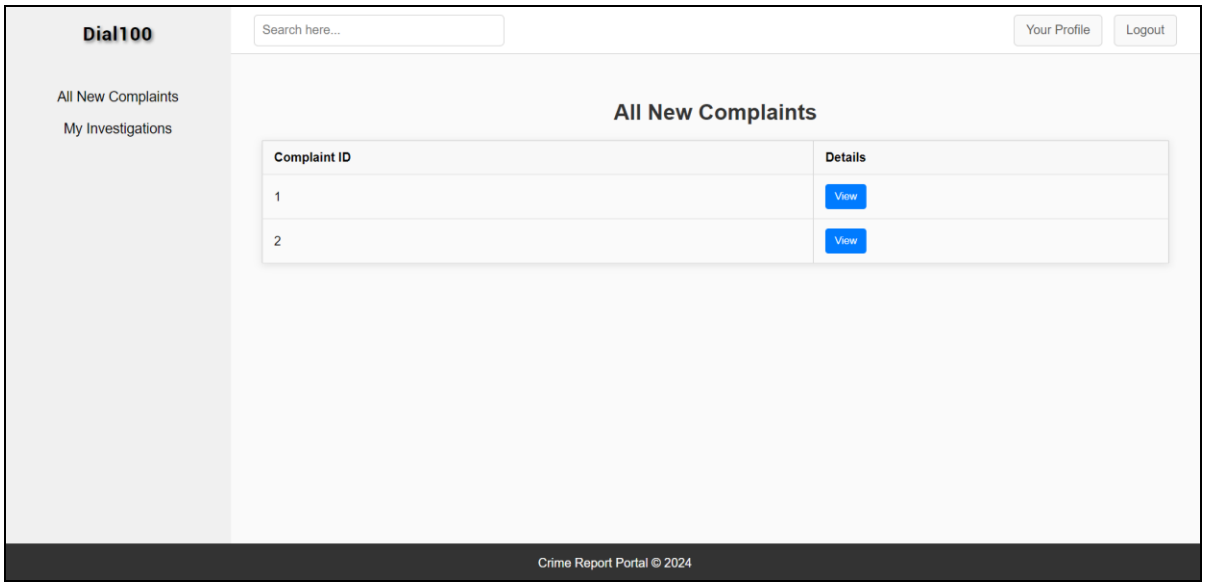
10. Plaintiff Updates Detail Page:



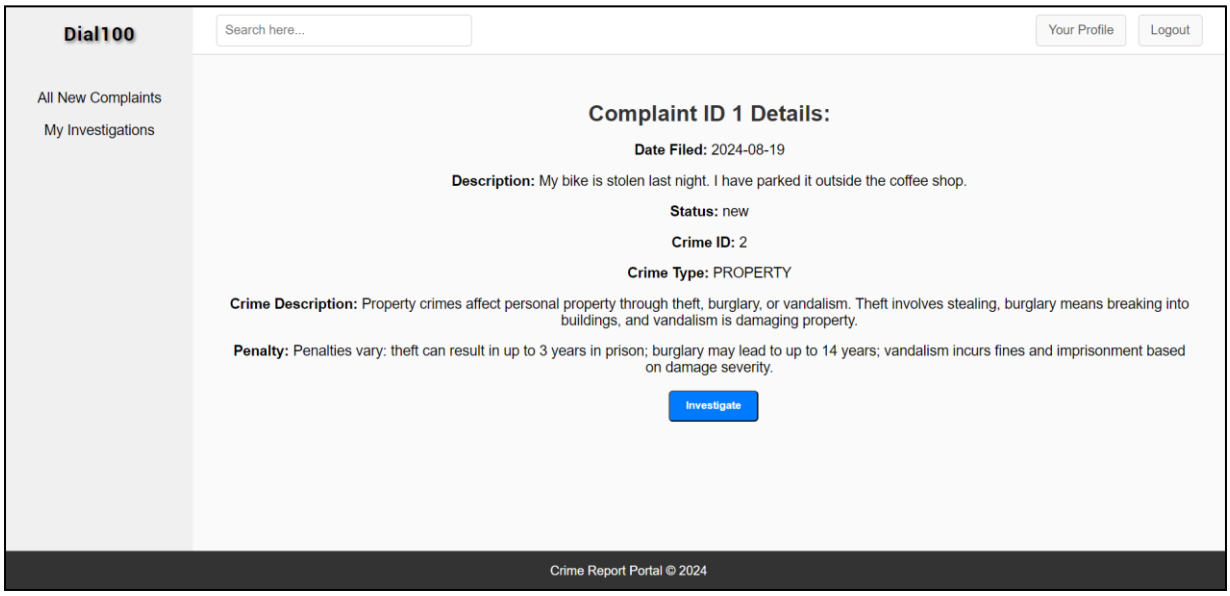
11. Authority Dashboard Page:



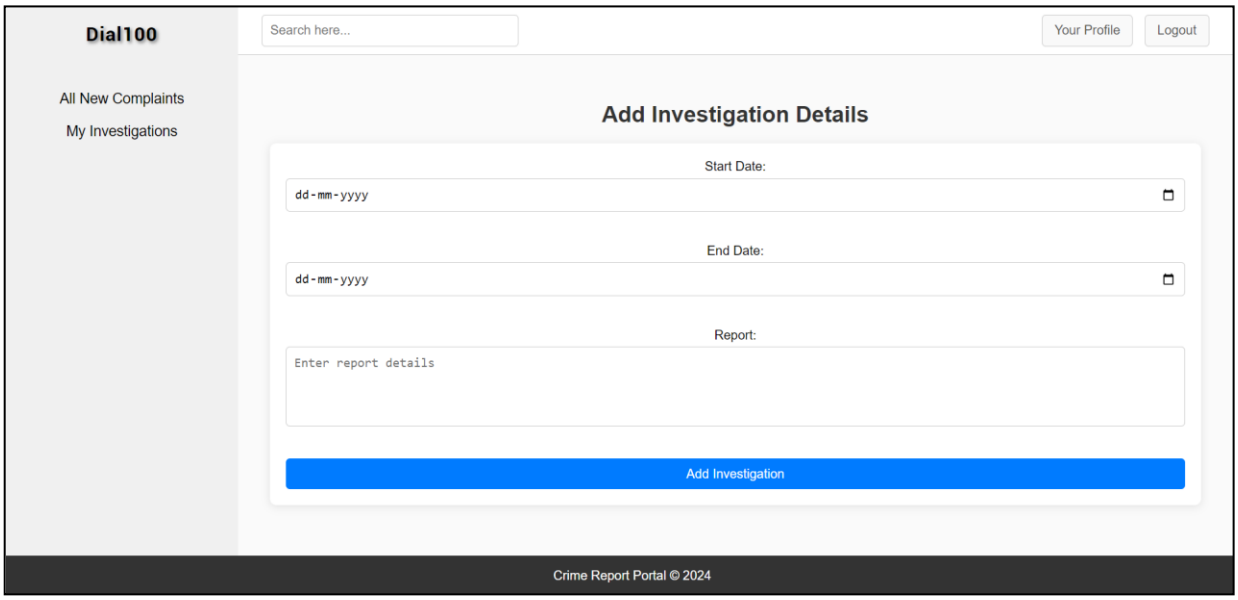
12. All New Complaints Page:



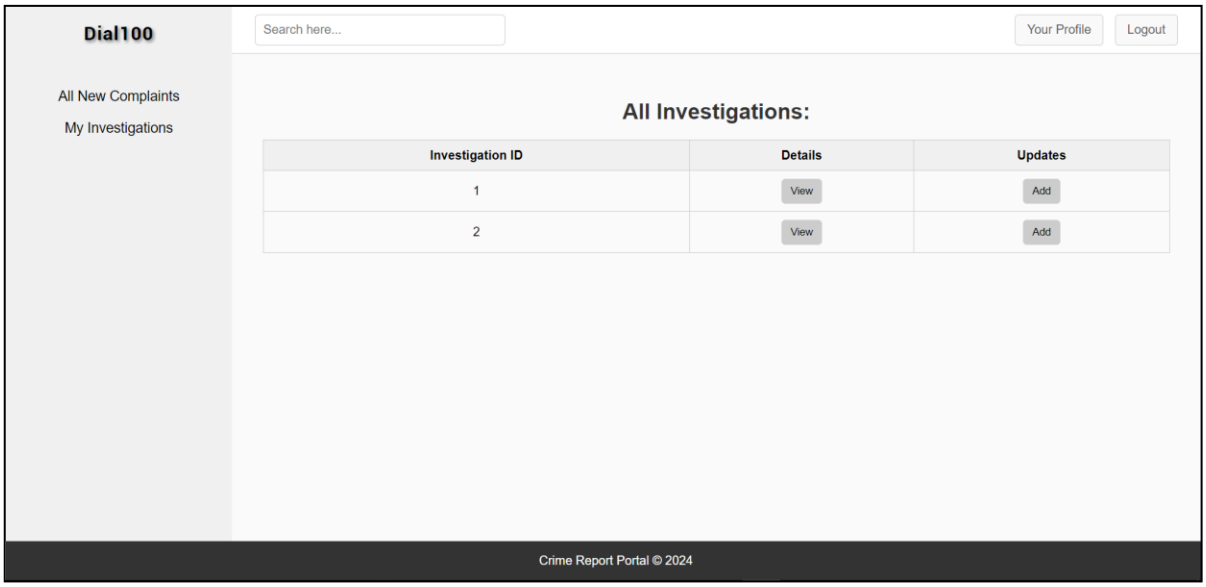
13. Authority Complaint Details Page:



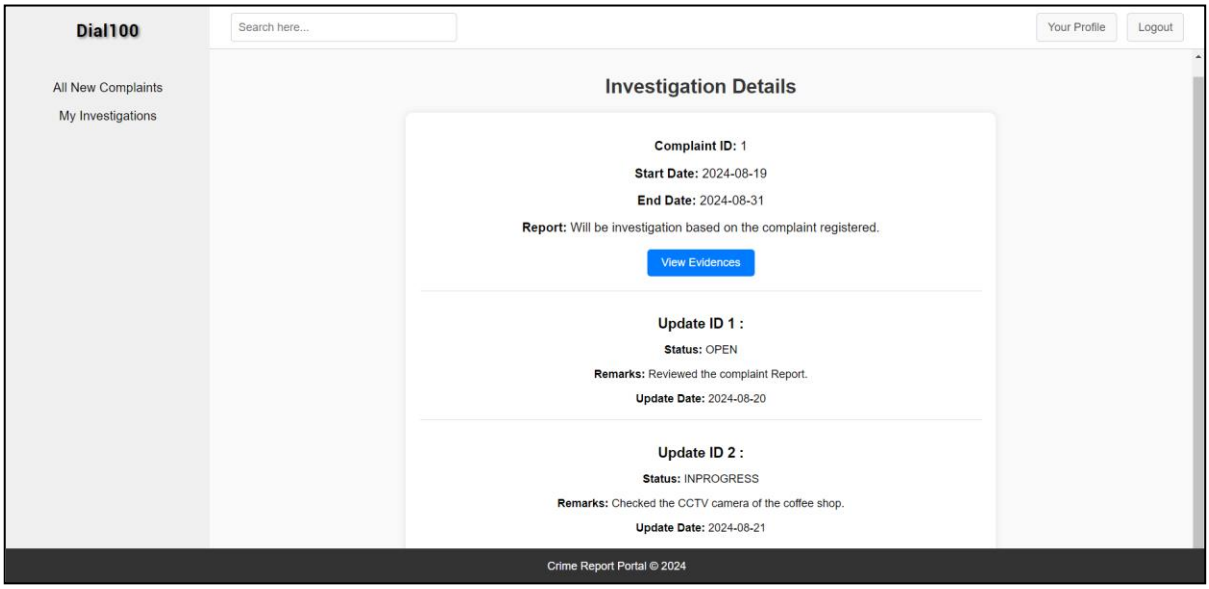
14. Investigate Form Page:



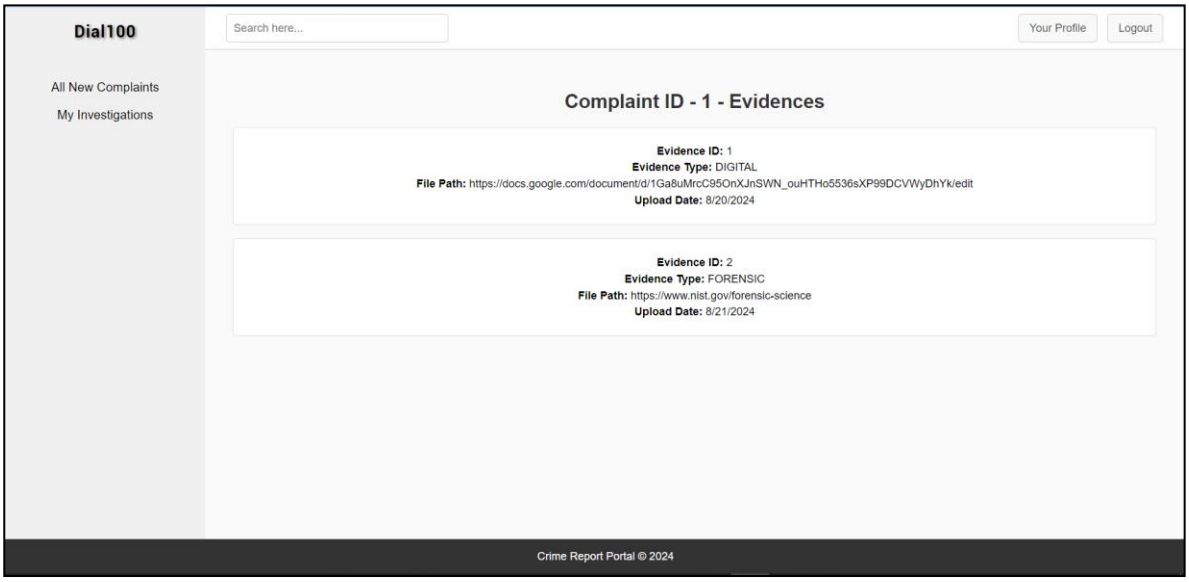
15. My Investigations Page:



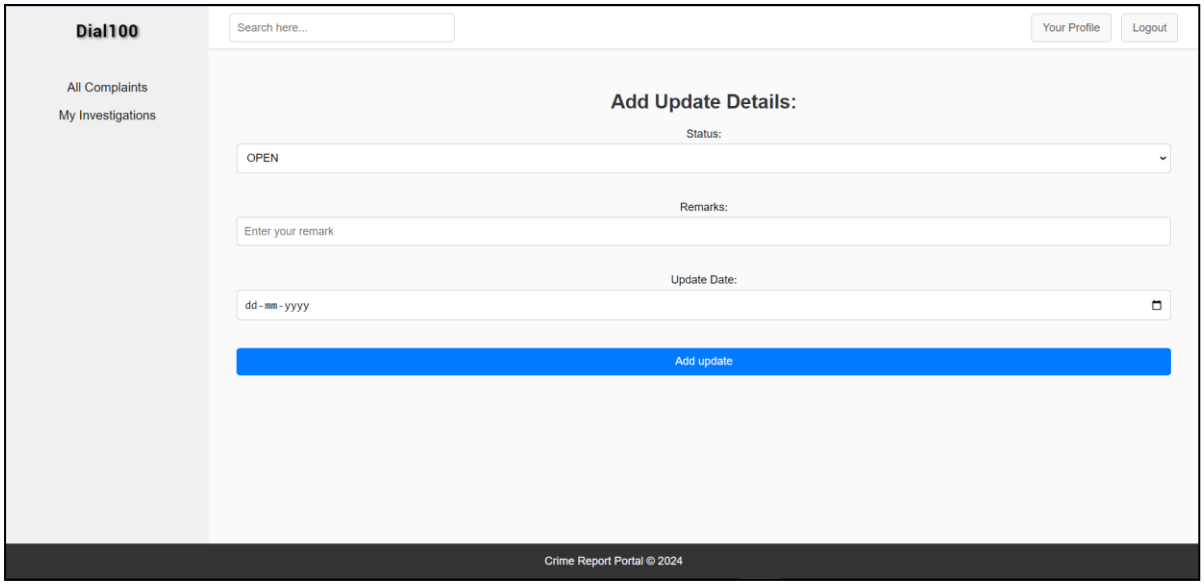
16. Investigation Details Page:



17. View Evidences Page:



18. Add Updates Form Page:



23

8. REFERENCES

http://www.javatpoint.com/java-

tutorial http://www.w3.org

http://www.wikipedia.org

https://www.tutorialspoint.com/java

9. CONCLUSION

The Dial100.com Crime Report Portal effectively establishes a streamlined, user-friendly, and transparent platform that enables citizens to report crimes and actively interact with law enforcement agencies. By harnessing the power of technology, the portal significantly enhances the speed and efficiency of emergency responses, strengthens community safety measures, and builds trust between the public and law enforcement. This innovative solution not only simplifies the crime reporting process but also ensures that citizens are kept informed throughout the investigation, fostering a more engaged and secure community.

9.1. FUTURE SCOPE

The future scope of the Dial100 project includes several key enhancements. One of the primary goals is the development of a mobile app to facilitate easier and faster crime reporting. Additionally, the platform aims to include multilingual support to better serve a diverse population. Plans for integration with social media platforms will allow for the quick dissemination of alerts and updates, ensuring broader awareness. Enhanced security features, such as improved encryption and data protection, will further safeguard user privacy and system integrity. Finally, ongoing public awareness campaigns will be implemented to educate citizens about the platform and encourage its widespread use.