

# User Features

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## Practical 4.1

### Team Members:

**21BCE166 - Nikunj Jayvin Mahida**

**21BCE168 - Niti Chirag Patel**

**21BCE237 - Prisha Tushar Shah**

**21BCE253 - Richa Anilkumar Yadav**

**AIM:** To list out all the features and its targeted users.

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### Users Of e-Challan System:

1. Driver / Vehicle Owners
2. Police Officers

### Key features of e-Challans:

#### 1. User Authentication:

- The system incorporates a robust user authentication mechanism, distinguishing between two primary user roles: regular users and drivers. Each user type has its distinct login process, ensuring secure access to the platform's features and functionalities tailored to their respective needs. This authentication framework safeguards sensitive user data and ensures that only authorized individuals can access the system's resources.
- Targeted users: Driver, police, user

## **2. Document Management:**

- Document management within the system is a critical aspect, particularly concerning driver identification and documentation related to violations and transactions. The police department is responsible for maintaining the database of driver IDs and ensuring accurate and up-to-date records for law enforcement purposes. Additionally, various documents such as fine slips, late slips, and receipts are stored both centrally by the police and locally by the drivers. This dual-storage approach facilitates efficient record-keeping and retrieval while maintaining data integrity and accessibility.
- Targeted users: Driver, police

## **3. Fine Management:**

- The system streamlines fine management processes through an automated payment calculator, overseen by the police department. This calculator utilizes predefined algorithms to determine fines corresponding to specific violations, ensuring consistency and fairness in penalty enforcement. By automating fine calculations, the system minimizes administrative overhead and expedites the resolution of violations, promoting compliance with regulatory requirements and enhancing overall efficiency in law enforcement operations.
- Targeted users: Police

## **4. Penalty Time Management:**

- Effective time management is essential in enforcing fines and penalties promptly and fairly. The police department establishes clear time limits for the payment of fines and penalties, ensuring timely resolution of infractions and adherence to legal deadlines. These predefined timeframes serve as guidelines for both law enforcement agencies and individuals involved, promoting accountability and compliance with regulatory mandates while avoiding unnecessary delays or disputes.
- Targeted users: Police

## 5. Payment Processing:

- To facilitate seamless payment transactions, drivers can access a secure payment gateway integrated into the system. This gateway employs advanced encryption protocols and security measures to safeguard financial transactions and sensitive user information against unauthorized access or fraudulent activities. By offering a secure and convenient payment platform, the system enhances user experience, fosters trust, and promotes timely resolution of fines and penalties.
- Targeted users: Driver

## 6. Notifications:

- Timely communication is crucial in keeping users informed about fines, penalties, complaints, and receipts. The system employs a comprehensive notification system that delivers relevant updates and alerts to drivers and law enforcement authorities. Drivers receive notifications regarding fines, penalties, complaints, and receipts, enabling them to stay informed and take necessary actions promptly. Similarly, police officers receive notifications to facilitate effective monitoring and management of enforcement activities, ensuring transparency and accountability throughout the process.
- Targeted users: Driver, police

## 7. Complaint Handling:

- A structured mechanism for handling complaints is integrated into the system, allowing drivers to lodge complaints and report discrepancies or issues related to fines or penalties. Upon receiving a complaint, the police department conducts thorough verification to assess its validity and address any potential mistakes or discrepancies. This proactive approach to complaint handling promotes fairness, transparency, and trust in the enforcement process, fostering positive relationships between law enforcement agencies and the community.
- Targeted users: Driver, police

# User Stories

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## Practical 4.2

### Team Members:

**21BCE166 - Nikunj Jayvin Mahida**

**21BCE168 - Niti Chirag Patel**

**21BCE237 - Prisha Tushar Shah**

**21BCE253 - Richa Anilkumar Yadav**

**AIM:** Creating user stories for the entire project and using the SCRUM Project Management tool to create and store those in the repository of the tool.

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### User Stories:

#### 1. User Authentication

- As a driver, I want to be able to log in securely, so that I can access the eChallan system account.
- As a police officer, I want to be able to log in securely, so that I can access my account.

#### 2. Document Access

- As a police officer, I want to be able to save driver identification documents securely, so that I have access to user records.

### 3. Fine Slips

- As a police officer, I want to generate fine slips, so that I can keep a record.
- As a police officer, I want to send fine slips, so that they are made available to the driver.
- As a driver, I want to be able to be notified of any fines, so that I can pay them accordingly.

### 4. Queries and Updation Of Slips

- As a driver, I want to send a query about my violation, so that I am not wrongly charged.
- As a police officer, I want to receive notifications of complaints, so that I can respond to them as soon as possible.
- As a police officer, I want to reply to the query so that the user can get notified about any changes.
- As a police officer, I want to be able to update slips so that the user can get the updated slips.
- As a driver, I want to receive notifications for updated slips so that I can pay them accordingly.

### 5. Payment Processing

- As a driver, I want a secure payment gateway integrated into the system so that I can ensure the safety of my payment transactions.

## **6. Receipts**

- As a police officer, I want to download receipts of payments so that they can be recorded.
- As a driver, I want to be able to access and view receipts for payments made, so that I can keep track.

## **7. Time Limit for Fine and Penalty**

- As a police officer, I want to set overall time limits for paying fines, so that penalty slips can be generated.
- As a driver, I want to be notified of any penalty slips generated, so that I can pay them accordingly.