



Reimbursement Portal

By Gaurav Shrivastava

Introduction

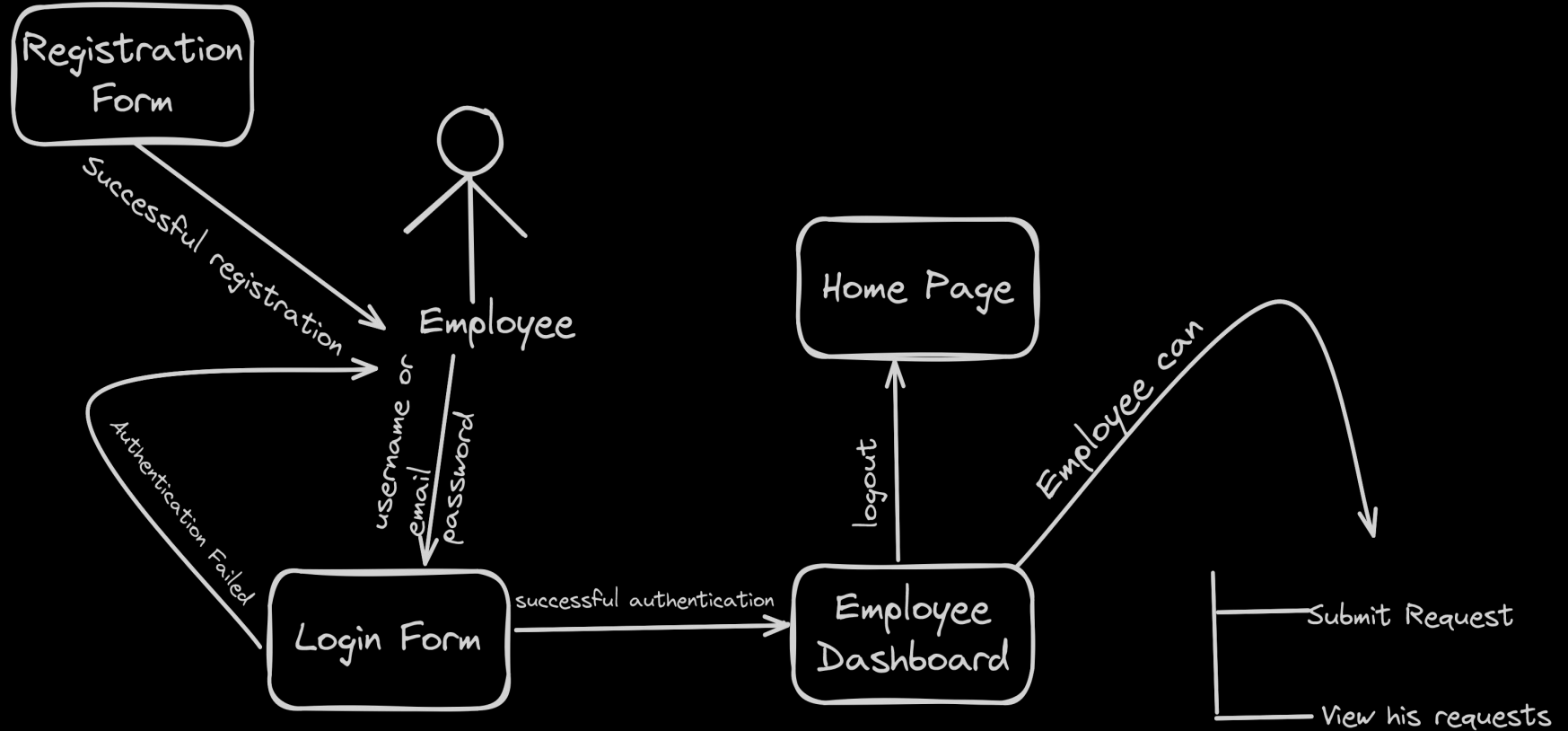
- Reimbursement Portal is an online portal where an employee can submit reimbursement claims related to relocation, medical, and office supplies and the assigned manager can approve/reject the claims.
- If you're an employee, you can submit reimbursement requests and if you are Managers, log in to review and manage reimbursement requests from your team.

Functional Requirements

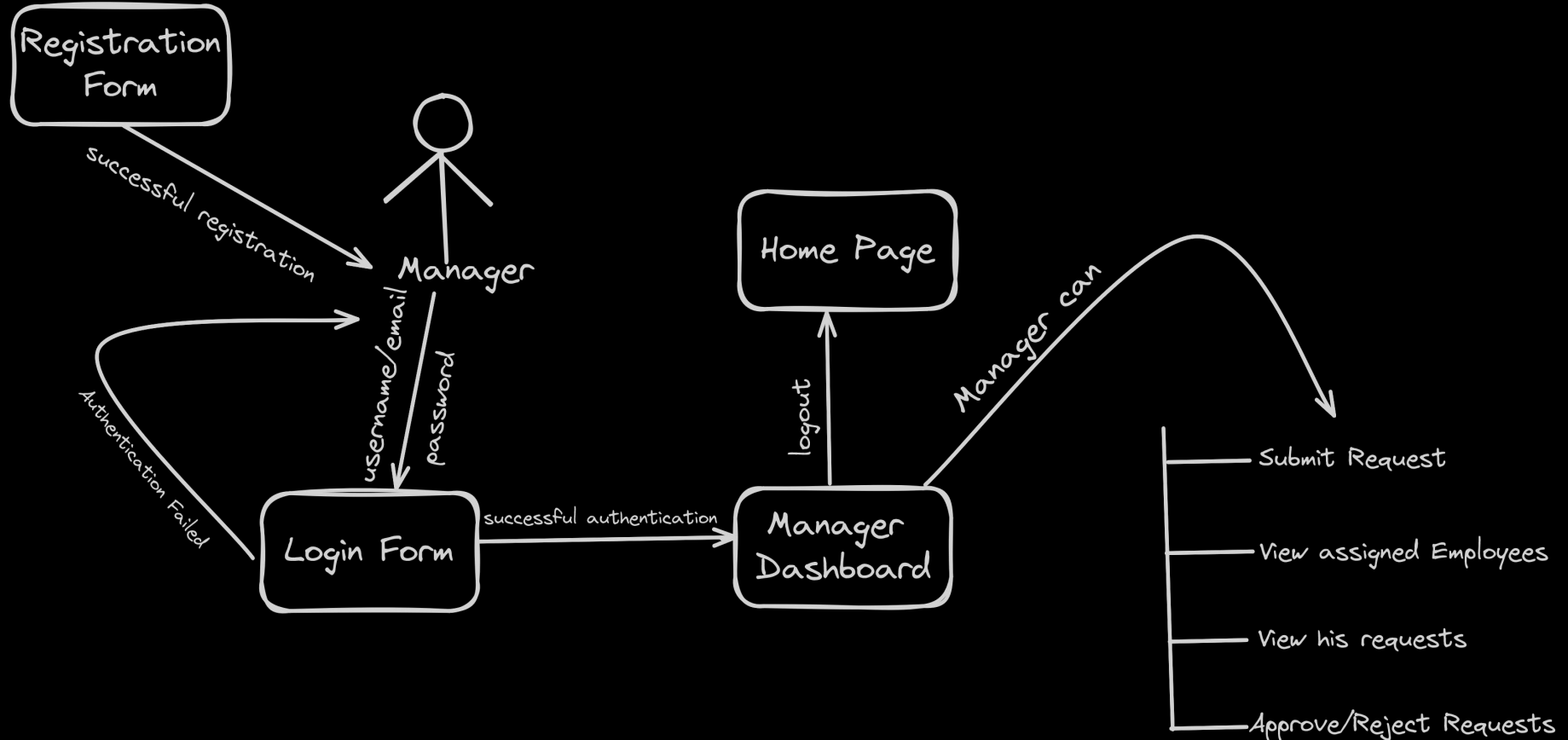
- Three user types: Admin, Manager, Employee.
- Managers and Employees register and login before any operations.
- Only company emails are valid for registration.
- Users must sign in before any operations.
- Employees submit reimbursement requests.
- Requests include expense type, amount, date, and one image receipt.
- Managers approve/reject requests with comments.
- Policy categories: Traveling (15k), Relocation (20k), Tech assets (5k).
- Admin assigns managers to employees.

- Admin is the default manager until reassigned.
- Admin can delete employees and managers no longer in the organization.
- Admin can add or delete departments.
- New departments appear in the registration dropdown.
- One or more managers per department.
- Multiple employees under one manager.
- Requests directed to managers based on employee's department.
- Employees can view their requests, statuses, comments, and history.
- Comprehensive audit trail for each request.
- Users can upload jpg documents as supporting evidence.

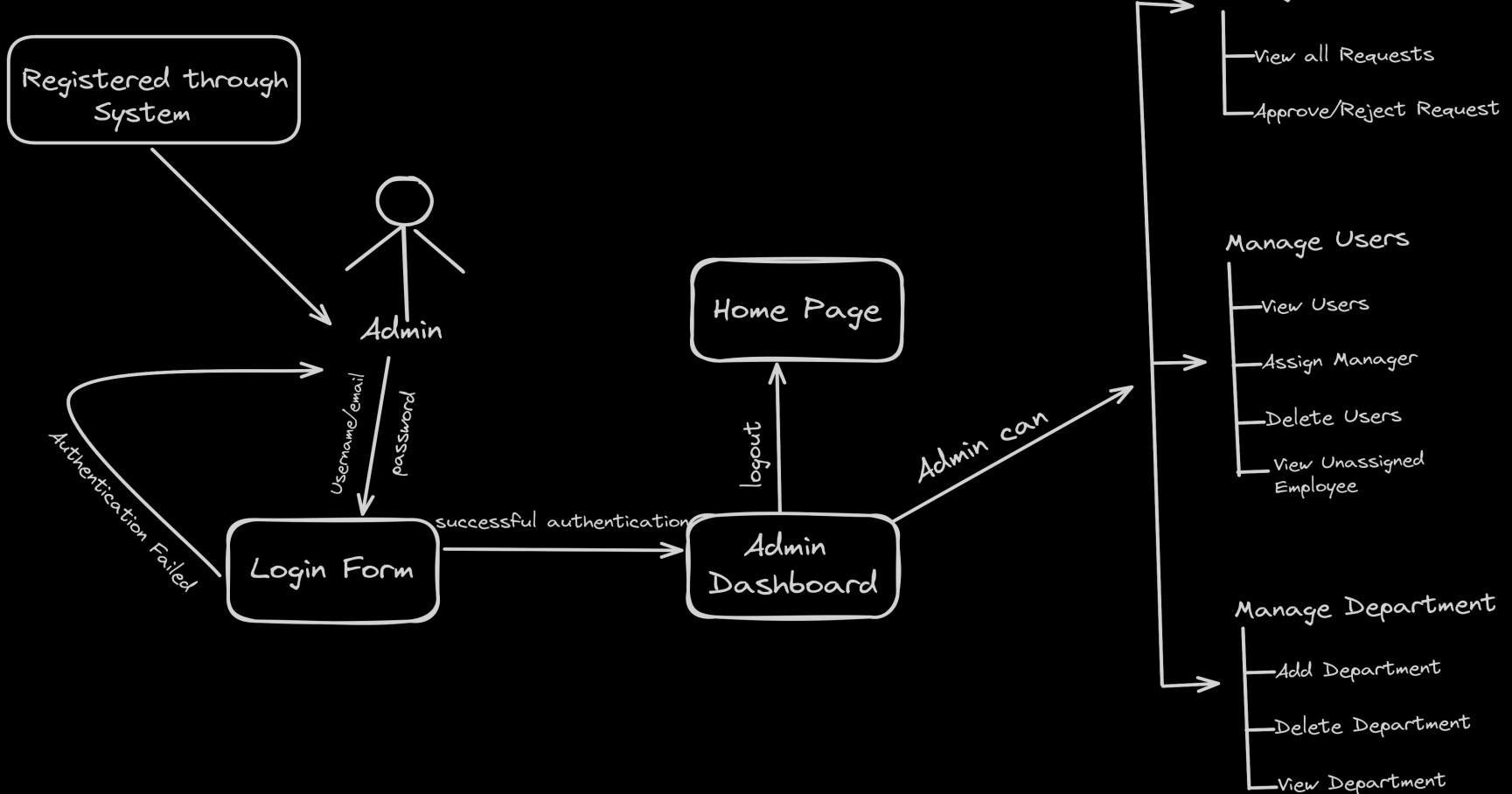
Employee Dashboard



Manager Dashboard



Admin Dashboard



Session Management

after successful login

Set Session

```
session['user'] = {  
    'id': user.id,  
    'username': user.username,  
    'email': user.email,  
    'role': user.role.value  
    .....  
}
```

Serialization

convert data(object)
into a string
format (JSON).

Signing/encoding

creates a cryptographic
signature using
'SECRET_KEY'

Clear the session

```
def logout():  
    session.clear()
```

Usage

```
user = session.get('user')  
if user and user['role'] == 'Admin'  
    return render_template(  
        'admin_dashboard.html', user=user)
```

Retrieving and Verifying

Upon a subsequent request,
Flask retrieves and verifies
the session data from the
cookie using the SECRET_KEY

Session Storage

serialized & signed session
data is stored in cookie
on the client(browser).

User Model

USER			
int	id	PK	Primary Key
string	username		Unique, Not Null
string	email		Unique, Not Null
enum	role		Admin, Manager, Employee
string	password_hash		
int	department_id	FK	Foreign Key
int	manager_id	FK	Foreign Key, Self-referential
string	first_name		
string	last_name		
bool	is_active		Default True

Reimbursement_request Model

REIMBURSEMENTREQUEST			
int	id	PK	Primary Key
float	amount		
datetime	date		
string	description		
enum	category		Travelling, Relocation, TechAssets
enum	status		Pending, Approved, Rejected, Default Pending
int	employee_id	FK	Foreign Key
int	manager_id		
string	manager_comment		
string	receipt_path		
bool	is_active		Default True

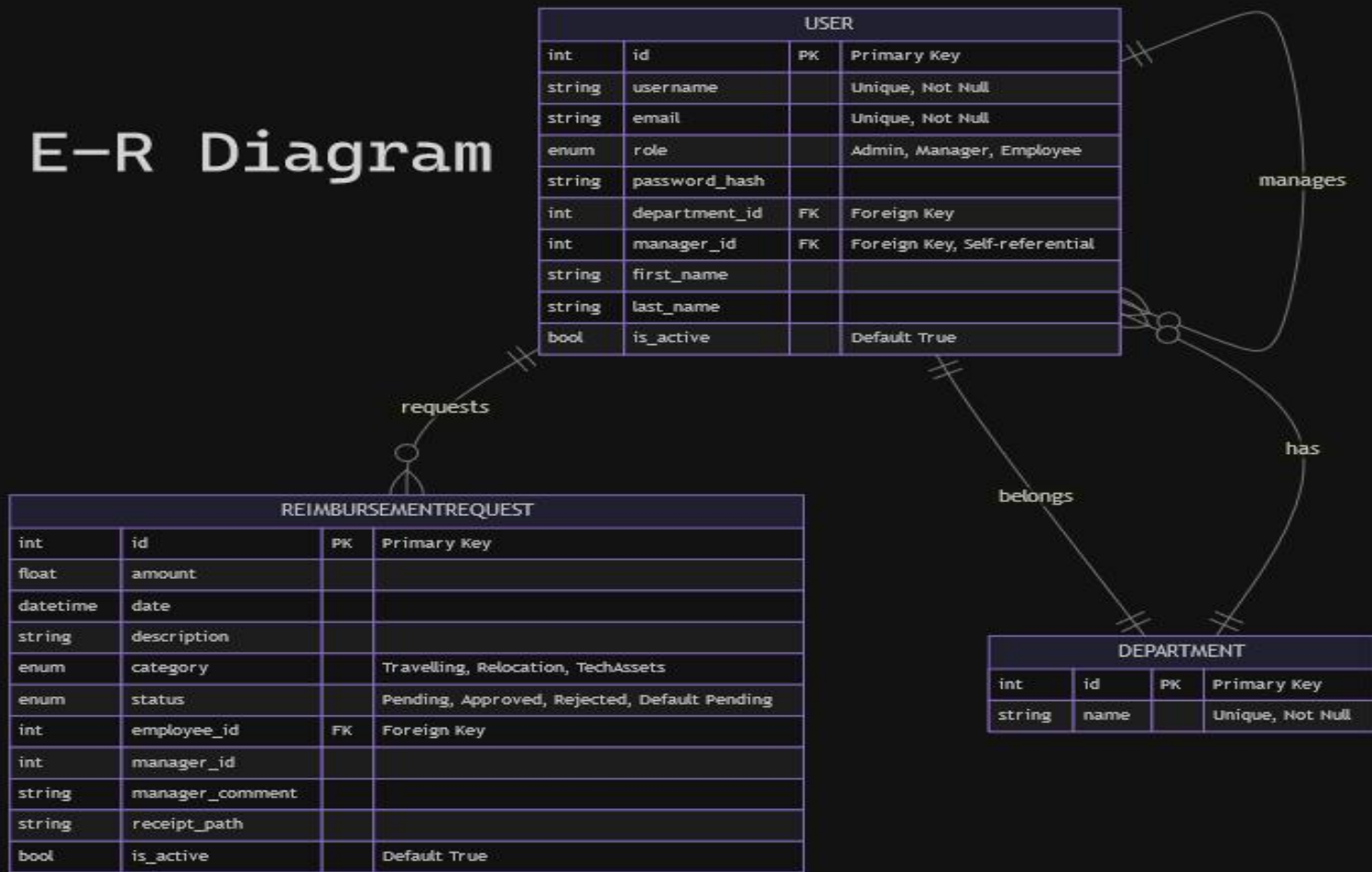
Department Model

DEPARTMENT			
int	id	PK	Primary Key
string	name		Unique, Not Null

Relationships

- **User to Department: One-to-Many**
 - A department can have many users, but a user belongs to only one department.
- **User to User (Manager): One-to-Many (Self-referential)**
 - A user (Manager) can manage many users (Employees), but an employee has only one manager.
- **User to ReimbursementRequest: One-to-Many**
 - A user (Employee) can have many reimbursement requests, but a reimbursement request is linked to only one user.

E-R Diagram



Technical Specification

Technologies Used:

- Backend: Flask, SQLAlchemy, MySQL
- Frontend: HTML, CSS, JavaScript
- Tools: VSCode, UnitTest for testing
- Logging module for generating application logs

Architecture:

- REST API developed in Flask
- Database: MySQL

Future Enhancements

- Store images in the cloud instead of the local file system.
- Deployment of the project.
- Make UI more attractive.

Snapshot of Home Page

Reimbursement Portal

[Home](#) [Login](#) [Register](#)

Welcome to Reimbursement Portal

Reimbursement Portal is an online platform where employees can submit reimbursement claims for various expenses such as relocation, medical, and office supplies. These claims are then reviewed and approved/rejected by their respective managers.

How It Works

Employees can easily submit reimbursement requests for various expenses such as travel, relocation, and tech assets.

Managers can review and approve/reject these requests, ensuring compliance with company policies.

Get Started

If you're an employee, submit your reimbursement requests now.

Managers, log in to review and manage reimbursement requests from your team.

Policy Details

Category	Maximum Amount
Traveling	\$15,000
Relocation	\$20,000
Tech Assets	\$5,000

Have Questions?

Check out our FAQ section for answers to common queries.

Snapshot of Registration Page

Registration

Username:

Email:

Password:

Confirm Password:

Role:

First Name:

Last Name:

Department:

Register

Have an account? [Login](#)

Snapshot of Login Page

Reimbursement Portal

[Home](#) [Login](#) [Register](#)

Login

Username or Email:

Password:



Login

Don't have an account? [Register Here](#)

Snapshot of Employee Dashboard

Reimbursement Portal

Welcome to the Employee Dashboard

Username: pranjal

Full Name: pranjal Verma

Email: pranjal@nucleusteq.com

Role: Employee

Department ID: 27

Department Name: marketing

Logout

Edit

Submit Reimbursement Request

Show my all requests

Snapshot of Manager Dashboard

Reimbursement Portal

Welcome to the Manager Dashboard

Username: priya

Full Name: Priya Nanwani

Email: priya@nucleusteq.com

Role: Manager

Department ID: 27

Department Name: marketing

Logout

Edit

Submit Reimbursement Request

See My Employees

Show my all requests

Show Requests for Updation

Snapshot of Admin Dashboard

Reimbursement Portal

Welcome to the Admin Dashboard!

Username: gaurav

Full Name: Gaurav Shrivastava

Email: gaurav@nucleusteq.com

Role: Admin

Logout

Edit

Add a New Department

See Department List

See User List

See Requests List

Show Requests for Updation

List of Unassigned Employees

Assign Manager

Thank You