

Hotel Management System

1. User Access Flow

The application starts with a public landing page where users can view basic hotel and room information. From here, the user can either **register** as a new customer or **login** using existing credentials.

- New users register using name, email, phone number, and password.
- Existing users login using email and password.
- After login, the system checks the **user role** (Customer / Manager / Admin) and redirects the user to the respective dashboard.

2. Customer Flow

1. Customer logs into the system
2. Customer is redirected to **Customer Dashboard**
3. Customer views available rooms
4. Customer selects room, check-in date, and check-out date
5. System calculates total price
6. Booking request is sent to backend
7. Booking is saved in database
8. Customer can view **My Bookings** and booking history

3. Manager Flow

1. Manager logs into the system
2. Manager is redirected to **Manager Dashboard**
3. Manager views today's check-ins and check-outs
4. Manager manages room status (available / booked / maintenance)
5. Manager approves or cancels customer bookings

4. Admin Flow

1. Admin logs into the system
2. Admin is redirected to **Admin Dashboard**
3. Admin manages users and assigns roles
4. Admin adds, updates, or deletes rooms
5. Admin sets room pricing
6. Admin views booking statistics and revenue reports

5. Overall Application Flow (One-Line)

Frontend(HTML/CSS/JavaScript)



Backend(Python Flask REST APIs)



MySQL Database