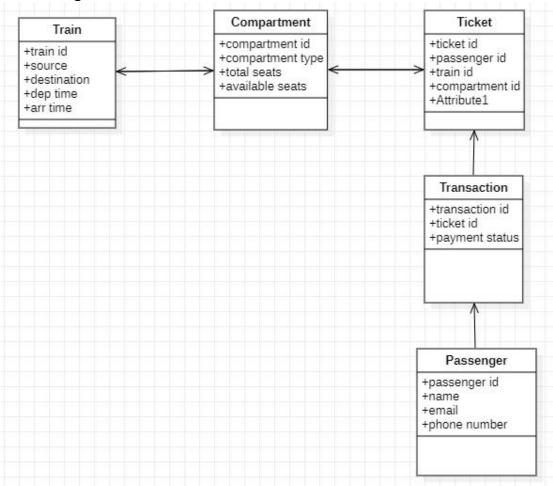
Software Engineering

Name: Kaustubh Rane Roll No.: CS23037

Practical No. 10

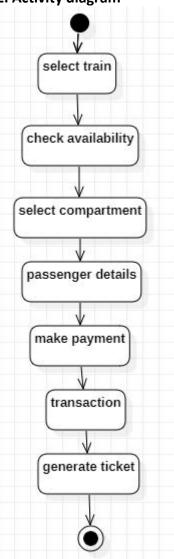
AIM: Indian Railways provide three different types of compartments for long distance trains, general, AC2 and AC3. The schedule of the train has details such as source and destination, departure time, arrival time, and the station codes the train halts at. For booking the tickets, passengers can choose the train he want to reserve a ticket for, date of departure and source and destination station code and should be able to see the availability of tickets of the respective compartment. When passengers book tickets, transactions must be recorded. For the above case study, draw

1. Class diagram



Name: Kaustubh Rane Roll No.: CS23037

2. Activity diagram



Name: Kaustubh Rane Software Engineering

Roll No.: CS23037

3. List use cases

1. Search Train: The passenger searches for available trains by entering source, destination, and departure date.

- 2. Check Ticket Availability: The system shows the available seats in different compartments for the selected train.
- 3. Select Compartment: The passenger selects a compartment (General, AC2, or AC3) based on availability and preference.
- 4. Enter Passenger Details: The passenger enters their personal information for ticket booking.
- 5. Book Ticket: The passenger books the ticket for a chosen train and compartment.
- 6. Make Payment: The passenger makes the payment for the ticket.
- 7. Payment Confirmation: The system verifies the payment and confirms the ticket booking.
- 8. Generate Ticket: After successful payment, the system generates the ticket with details of the passenger, train, compartment, and journey.
- 9. Transaction Record: A transaction record is created, including details of the payment, ticket, and status.
- 10. Cancel Ticket: If necessary, the passenger may cancel the ticket, which affects the availability of the seat in the compartment.
- 11. View Ticket Details: The passenger can view the details of their booked ticket, including the train, compartment, and seat number.