Brainstorming Document

Project Title: A CRM Application for Public Transport Management

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Platform: Salesforce

6 1. Objective

To develop a Salesforce-based CRM system for public transport that enables passengers to view routes, check fares, and book trips efficiently, while maintaining backend records for buses, trips, employees, and fare details.

2. Key Problems to Solve (User POV)

- Passengers can't easily explore available bus routes and timings.
- Ticket fares are not transparent or standardized across routes.
- Booking and managing trips is not streamlined or digitized.
- Manual data entry is error-prone for trip and fare details.

3. Ideas & Feature Concepts

Idea	Notes
Route browsing and search	User should be able to view source, destination, arrival, and departure.
Automated ticket fare retrieval	Based on route name and bus model, the fare is auto-filled using Flow.
Trip booking system	Lookup fields for choosing bus, route, and assigning driver/
Booking history and cancellation	Users can view and cancel their past/future bookings.
User-friendly mobile interface	Add support for Salesforce Mobile App usage.
Validation via Apex triggers	Ensure driver/conductor roles are validated before saving trip
Dashboard with trip stats	Track passenger count, routes used most, fare collections.

🌉 4. Custom Objects Needed

Object	Purpose
Bus Station	Stores details about physical bus stations

Bus	Stores bus registration, model, capacity, station link
Trip	Stores booking info, route, bus, employees, fare
Ticket Fare	Stores route-wise fare for various bus models
Employee	Stores employee details (driver, conductor, etc.)

5. Technical Tools to Use

- Salesforce Flows: For fetching ticket fare based on route and model
- Validation Rules: For ensuring required fields are entered
- **Apex Trigger**: To validate roles of employees (Driver/Conductor)
- Reports and Dashboards: For management-level insights
- Lightning App Builder: For a unified experience

6. Expected Outcomes

Goal	How It's Achieved
Automate ticket fare logic	Record-triggered flow based on route and bus model
Validate employee roles	Apex trigger with separate handler class
Improve user booking experience	Custom objects with page layouts and app navigation
Track and manage trips easily	Dashboards, reports, and accessible records via tabs