

WhatsNext Vision Motors: Shaping the Future of Mobility with Innovation and Excellence

1. Abstract

WhatNext Vision Motors' Salesforce program is a design to redefine the automotive customer journey while driving operational excellence. Centered on Automotive Cloud, the solution unifies vehicle, dealer and customer data to deliver a 360-degree view that powers personalized sales, service, and connected-car experiences. Key innovations include automatic dealer assignment based on customer location, real-time stock validation that blocks orders for out-of-stock vehicles, and scheduled processes that update bulk order statuses to "Confirmed" or "Pending" according to inventory levels. Leveraging Lightning App Builder, record-triggered flows, Apex triggers, and batch jobs, the project automates workflows, enforces critical business rules, and notifies stakeholders of test drives, stock replenishment, and order changes. Expected outcomes are shorter sales cycles, higher order accuracy, increased customer satisfaction, and reduced administrative overhead, enabling staff to focus on high-value tasks and positioning WhatNext Vision Motors at the forefront of modern mobility solutions.

2. Objective

- Enhance the customer ordering experience by automatically suggesting the nearest dealer based on the customer's address.
- Prevent customers from placing orders for vehicles that are out of stock to improve order accuracy and customer satisfaction.
- Automate the update of bulk order statuses to "Pending" or "Confirmed" based on real-time stock availability.
- Streamline operational processes and reduce manual administrative tasks through automation with Apex triggers, batch jobs, and scheduled processes.
- Provide a unified Salesforce platform to efficiently manage vehicle details, stock, dealers, customer orders, test drives, and service requests.
- Enable automated workflows such as auto-assignment of orders to the nearest dealer and sending automated email reminders for scheduled test drives.

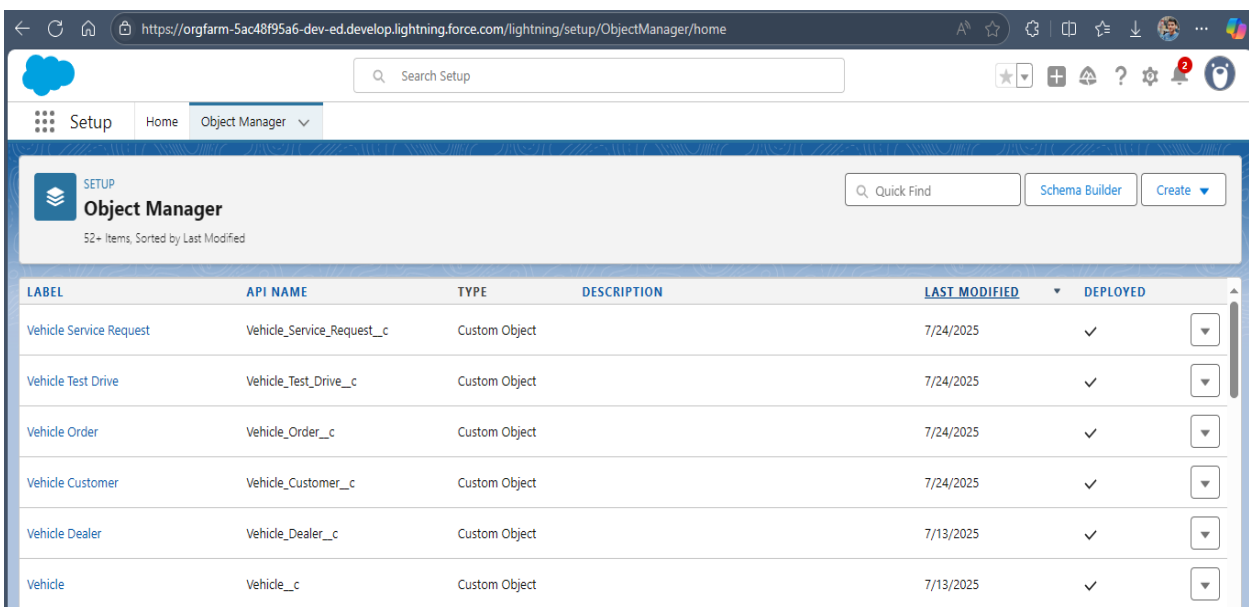
3. Data Management

3.1 Objects

The solution utilizes custom objects to model vehicle, dealer, customer, and transactional information. Key objects include :

- Vehicle (vehicle inventory)
- Vehicle_Dealer (authorized dealers)
- Vehicle_Customer (customer profiles)
- Vehicle_Order (sales orders)
- Vehicle_Test_Drive(test drive bookings)
- Vehicle_Service_Request (service requests)

Relationships are established to reflect real-world associations between vehicles, dealers, and customers, ensuring a single source of truth across the organization.



The screenshot displays the Salesforce Lightning Object Manager interface. At the top, there's a navigation bar with 'Setup', 'Home', and 'Object Manager' tabs. Below this, the 'Object Manager' section is titled '52 Items, Sorted by Last Modified'. A table lists several custom objects with columns for Label, API Name, Type, Description, Last Modified, and Deployed. The objects listed are Vehicle Service Request, Vehicle Test Drive, Vehicle Order, Vehicle Customer, Vehicle Dealer, and Vehicle.

LABEL	API NAME	TYPE	DESCRIPTION	LAST MODIFIED	DEPLOYED
Vehicle Service Request	Vehicle_Service_Request__c	Custom Object		7/24/2025	✓
Vehicle Test Drive	Vehicle_Test_Drive__c	Custom Object		7/24/2025	✓
Vehicle Order	Vehicle_Order__c	Custom Object		7/24/2025	✓
Vehicle Customer	Vehicle_Customer__c	Custom Object		7/24/2025	✓
Vehicle Dealer	Vehicle_Dealer__c	Custom Object		7/13/2025	✓
Vehicle	Vehicle__c	Custom Object		7/13/2025	✓

3.2 Tabs

Custom tabs have been created for each object to provide users with intuitive navigation and data visibility. Lightning App Builder was used to tailor the tab layouts, including related lists, report charts, and quick actions for common tasks such as creating new orders or scheduling test drives.









Custom Tabs

You can create new custom tabs to extend Salesforce functionality or to build new application functionality.

Custom Object tabs look and behave like the standard tabs provided with Salesforce. Web tabs allow you to embed external web applications and content. Visualforce tabs allow you to embed Visualforce pages. Lightning Component tabs allow you to add Lightning components to the navigation menu in Lightning Experience and the mobile app. Lightning Page tabs allow you to add Lightning Pages to Lightning Experience and the mobile app.

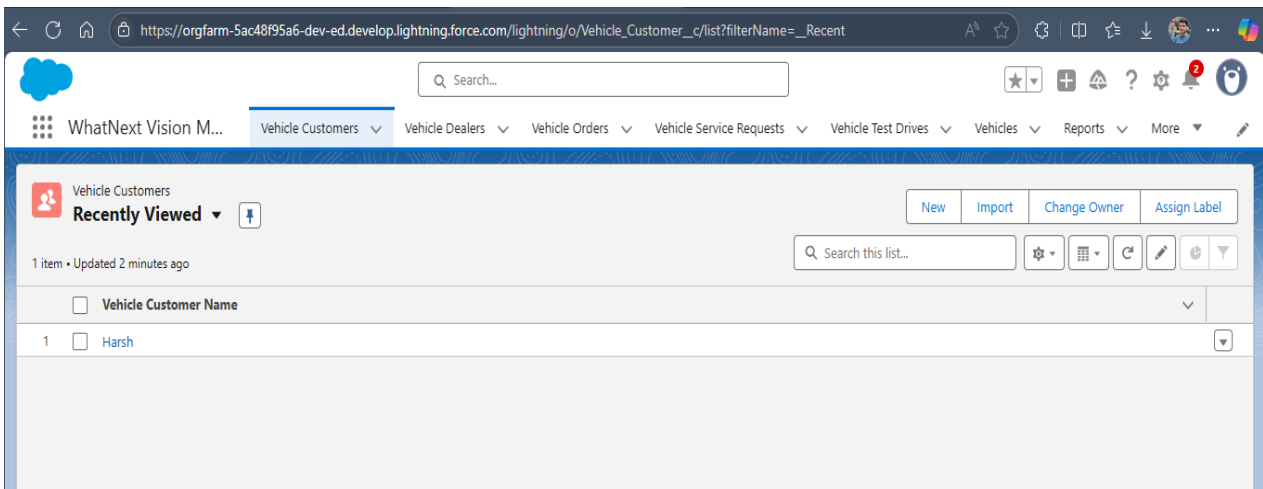
Custom Object Tabs

[New](#) [What Is This?](#)

Action	Label	Tab Style
Edit Del	Vehicle Customers	 People
Edit Del	Vehicle Dealers	 Building
Edit Del	Vehicle Orders	 Box
Edit Del	Vehicles	 Car
Edit Del	Vehicle Service Requests	 Form
Edit Del	Vehicle Test Drives	 Gears

3.3 App Manager

A dedicated Lightning App named **'WhatNext Vision Motors CRM'** consolidates all custom tabs and dashboards. Role-based navigation rules ensure sales agents, service advisors, and management teams access features relevant to their responsibilities, promoting usability and adoption.



https://orgfarm-5ac48f95a6-dev-ed.develop.lightning.force.com/lightning/o/Vehicle_Customer_c/list?filterName=_Recent

WhatNext Vision M... Vehicle Customers Vehicle Dealers Vehicle Orders Vehicle Service Requests Vehicle Test Drives Vehicles Reports More

Vehicle Customers Recently Viewed

1 item • Updated 2 minutes ago

New Import Change Owner Assign Label

Search this list...

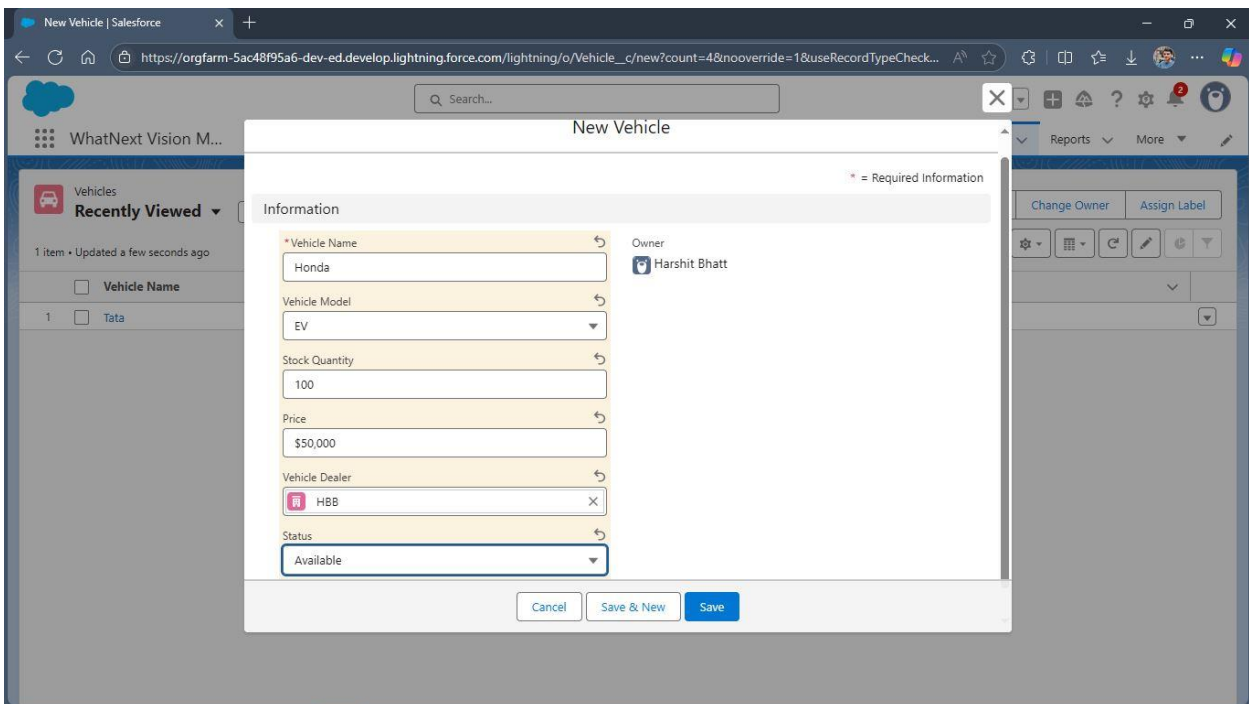
	Vehicle Customer Name
1	Harsh

3.4 Fields

Custom fields capture critical data such as :

- Stock_Level on Vehicle
- Preferred_Dealer_on Vehicle_Customer
- Estimated_Delivery_Date on Vehicle_Order.

Formula fields calculate real-time availability, while validation rules maintain data integrity—for example, preventing negative stock values or invalid VIN formats.



The screenshot displays the 'New Vehicle' form in a Salesforce browser window. The form is titled 'New Vehicle' and includes a search bar at the top. Below the title, there is a section for 'Information' with a legend indicating that fields with an asterisk (*) are required. The form contains the following fields:

- Vehicle Name** (Required): A text input field containing 'Honda'.
- Vehicle Model**: A dropdown menu with 'EV' selected.
- Stock Quantity**: A text input field containing '100'.
- Price**: A text input field containing '\$50,000'.
- Vehicle Dealer**: A dropdown menu with 'HBB' selected.
- Status**: A dropdown menu with 'Available' selected.
- Owner**: A field showing the user 'Harshit Bhatt' with a profile icon.

At the bottom of the form, there are three buttons: 'Cancel', 'Save & New', and 'Save'. The background shows a sidebar with 'Vehicles' and 'Recently Viewed' sections, and a top navigation bar with 'WhatNext Vision M...' and a search bar.

New Vehicle Registration fields

New Vehicle Test Drive | Salesforce x Reminders: Your Test Drive is Tom... x

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WhatNext Vision M...

Vehicle Test Drives

Recently Viewed

1 item • Updated 2 minutes ago

Vehicle Test Drive Name

1 Punch

New Vehicle Test Drive

* = Required Information

Information

* Vehicle Test Drive Name

punch

Vehicle Customer

Harsh

Vehicle

Tata

Test Drive Date

7/25/2025

Status

Scheduled

Owner

Harshit Bhatt

Cancel Save & New Save

Test drive Creation fields

New Vehicle Dealer | Salesforce x

https://orgfarm-5ac48f95a6-dev-ed.develop.lightning.force.com/lightning/o/Vehicle_Dealer__c/new?count=3&nooverride=1&useRecordTyp...

WhatNext Vision M...

Vehicle Dealers

Recently Viewed

2 items • Updated a few seconds ago

Dealer Name

1 SD

2 HB

New Vehicle Dealer

* = Required Information

Information

* Dealer Name

HBB

Dealer Location

Dehradun

Dealer Code

Phone

Email

Owner

Harshit Bhatt

Cancel Save & New Save

Vehicle Dealer Creation

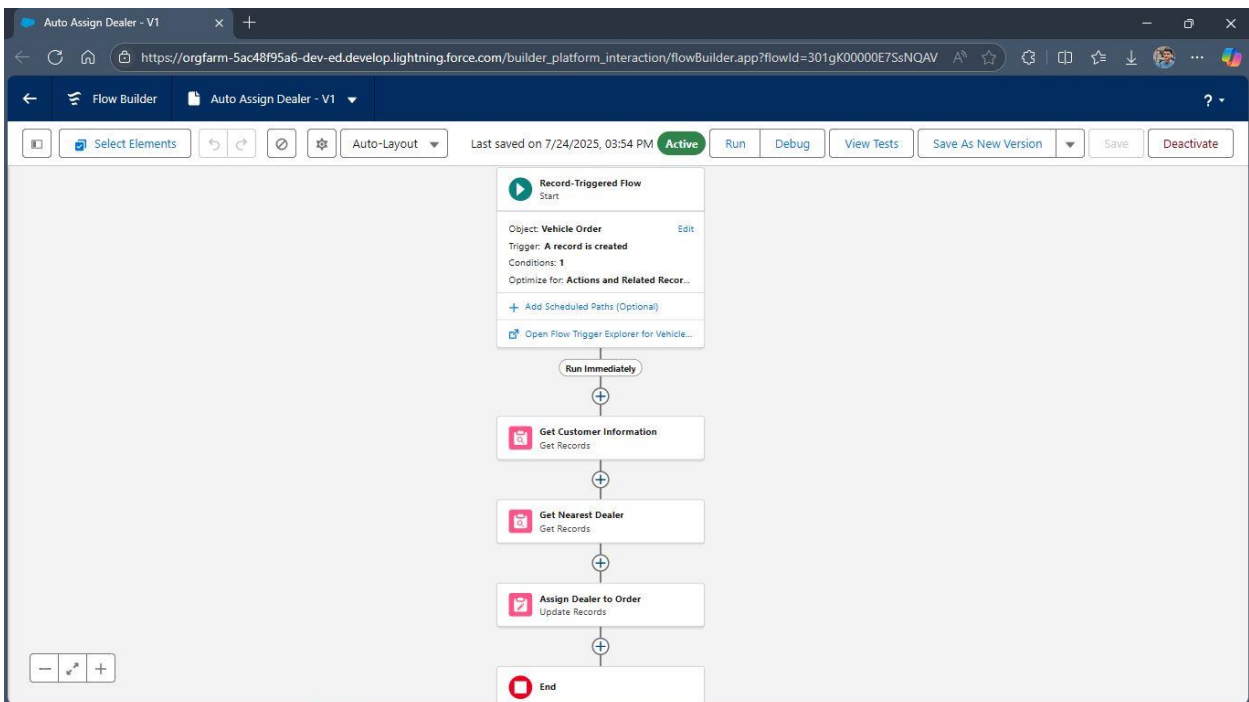
4. Automation

4.1 Flow Creation

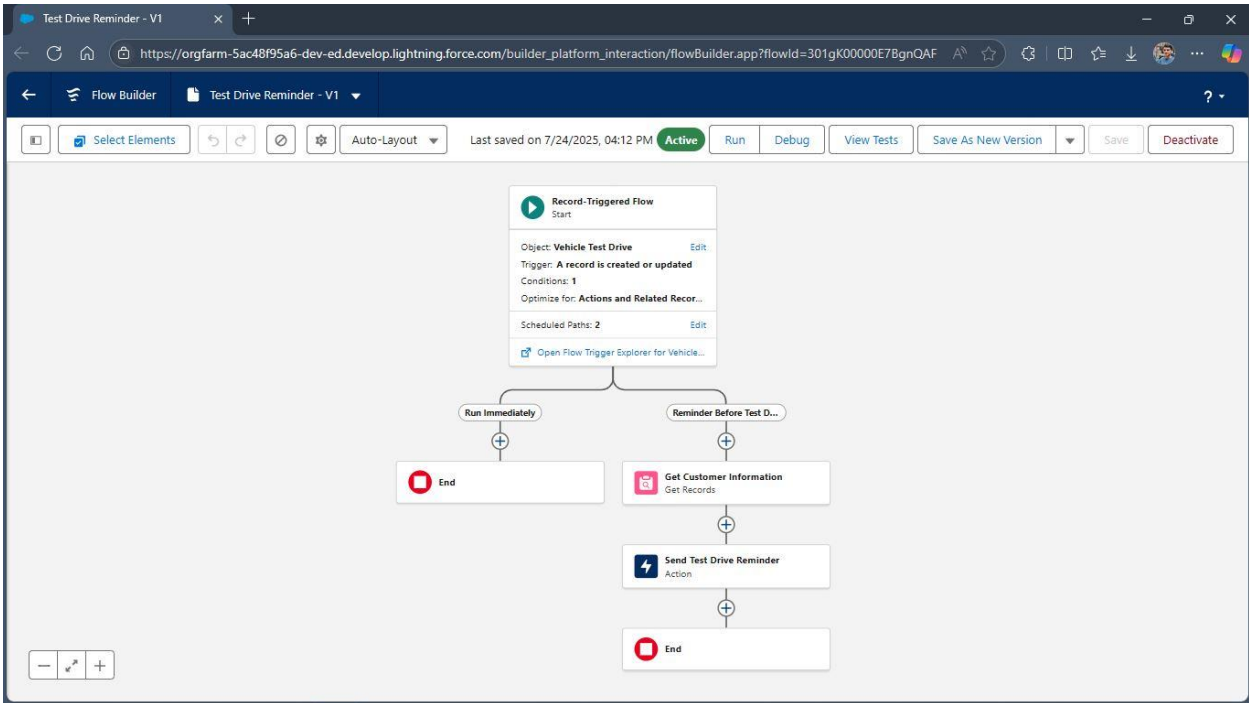
Screen flows guide sales agents through customer onboarding, capturing essential data such as address, vehicle preference, and financing options. Users are automatically prompted to confirm stock availability, select the nearest dealer, and generate quotes, reducing manual data entry and accelerating sales cycles.

4.2 Record-Triggered Flow Creation

Record-triggered flows enforce real-time automation. When a Vehicle_Order record is created, the system validates stock, auto-assigns the nearest dealer using geolocation services, and sends confirmation emails. Additional flows send reminders for upcoming test drives and service appointments, improving customer engagement.



Assign Dealer Flow



Test Drive Reminder flow

Apex and Batch Classes

4.3 Apex Triggers

Apex triggers supplement declarative automation with complex logic not feasible in flows. The **VehicleOrderTrigger** validates vehicle stock at the time of order creation, ensuring the Requested_Quantity does not exceed available stock levels. It also updates the Order_Status field to 'Confirmed' or 'Pending' based on real-time inventory checks.

4.4 Batch Apex

The **VehicleOrderBatch** class runs hourly to reconcile stock levels across dealerships. It queries recent Vehicle_Order records in bulk and adjusts Stock_Level on related Vehicle records. Exception handling ensures failed records are logged and retried, preserving data consistency at scale.

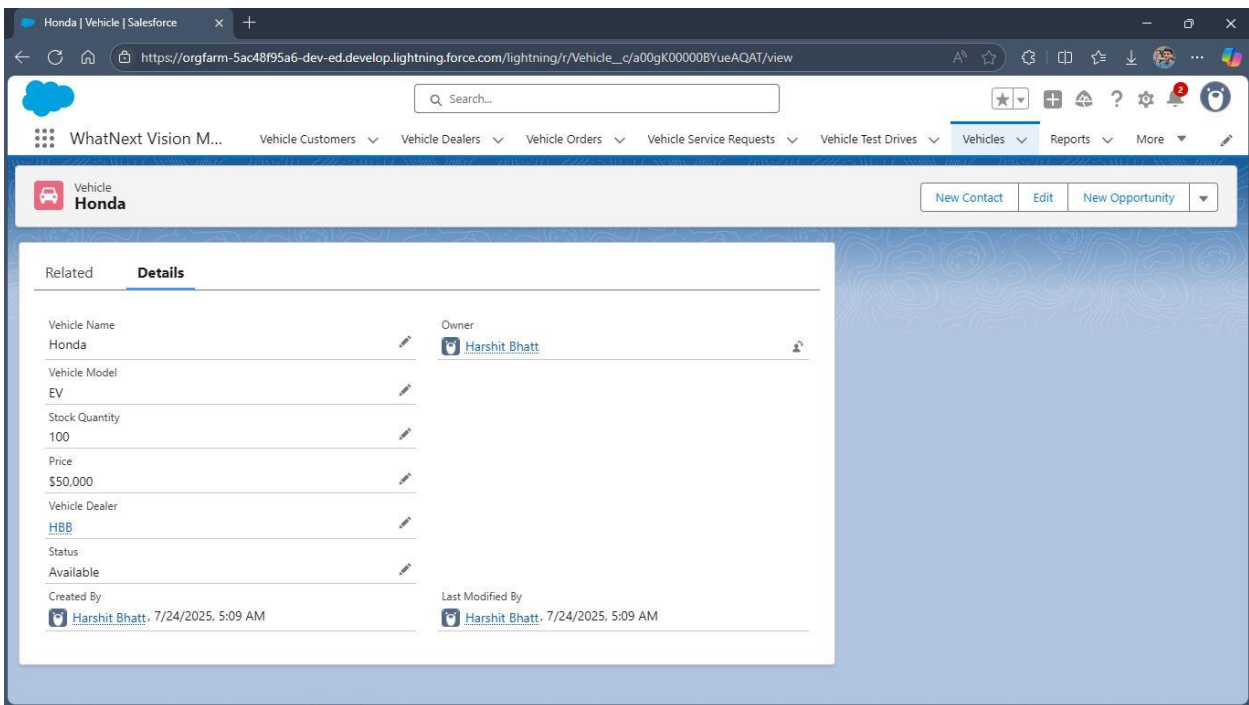
4.5 Scheduled Apex

A **VehicleOrderBatchScheduler** job executes nightly to send proactive stock replenishment notifications. The process aggregates low-inventory vehicles and emails purchasing managers with recommended reorder quantities, ensuring optimal stock availability and minimizing lost sales opportunities.

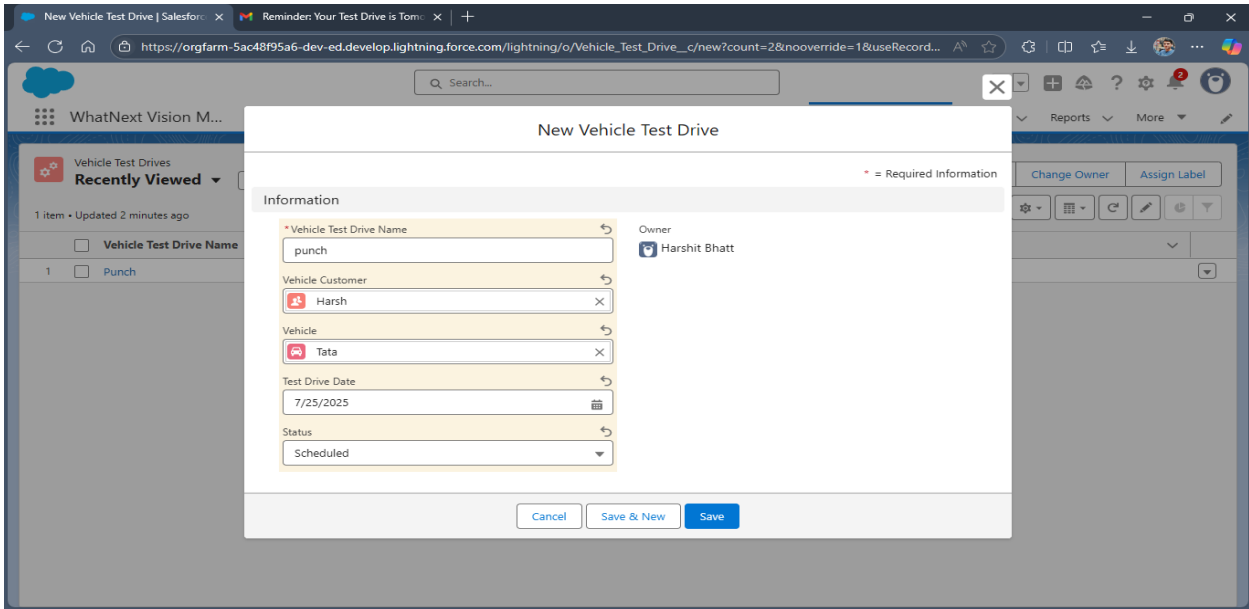
5. Operational Workflow

The end-to-end workflow begins when a customer expresses interest in a vehicle via the website or dealership. The system captures lead data, checks stock, and recommends the nearest dealer. Once an order is created, real-time validations confirm availability and assign the dealer. Customers receive order confirmations and can schedule test drives.

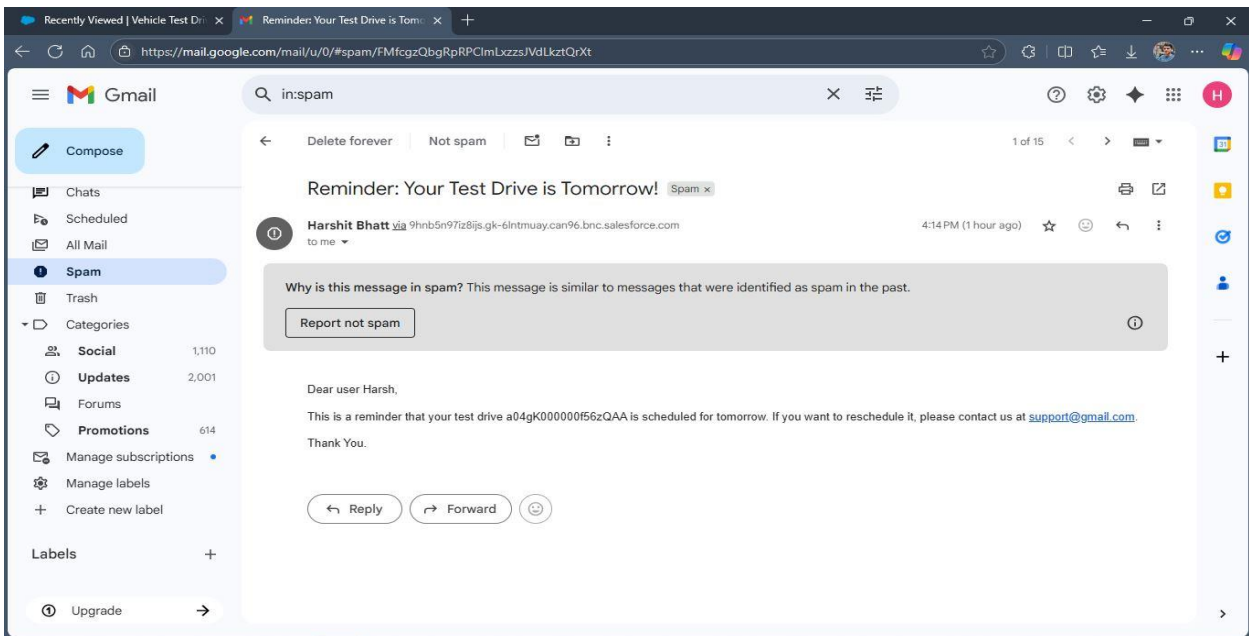
Service requests are tracked through the `Vehicle_Service_Request_c` object, with automated reminders sent based on mileage or time intervals. Dashboards provide executives with visibility into sales trends, inventory levels, and service KPIs.



Vehicle Purchase Registered



Test Drive Creation & Email Alert (24hrs before)



6. Conclusion

By combining robust data modeling, declarative automation, and scalable Apex solutions, **WhatNext Vision Motors** delivers a best-in-class customer experience while optimizing internal operations. The Salesforce platform empowers the company to adapt quickly to market changes, reduce operational costs, and maintain a competitive edge in the rapidly evolving mobility sector.