

# Capstone Project :

{ **WhatNext Vision Motors: Shaping the Future of Mobility with Innovation and Excellence** }

**Name:** Karanam Jayanth (II MCA)  
**College:** Gates Institute of Technology

# 1. INTRODUCTION

## 1.1 Overview : A brief description about your project

WhatsNext Vision Motors, a pioneering force in the automotive industry, is dedicated to transforming the mobility sector with innovative technology and solutions that prioritize customer needs. The company has embarked on an ambitious Salesforce project with the core objective of enhancing the customer experience and streamlining its operational processes.

At the heart of this project is the improvement of the customer ordering process. The system is designed to automatically suggest the nearest dealer location to customers based on their address. This feature is intended to significantly enhance the convenience and efficiency of the ordering experience, making it more customer-friendly and reducing the time and effort required from the customer's end.

The project also addresses a common issue in the automotive industry: stock availability. The system includes a mechanism that prevents customers from placing orders for vehicles that are out of stock. This proactive approach ensures that customers can only create orders for vehicles that are currently available, thus avoiding potential confusion and disappointment that may arise from stock unavailability. This feature not only enhances customer satisfaction but also improves the accuracy of the company's order fulfillment process.

Furthermore, the project incorporates a scheduled process for updating the status of bulk order records. This automated process is designed to update the order status based on stock availability. If a vehicle is out of stock at the time of order placement, the system will update the order status to 'Pending.' On the other hand, if the vehicle is in stock, the system will update the status to 'Confirmed.' This ensures that all orders are accurately reflected in terms

of their fulfillment status, providing clear and transparent communication to customers regarding the status of their orders.

The implementation of this Salesforce project at WhatsNext Vision Motors is expected to yield several benefits. It aims to create a more efficient ordering system that reduces the potential for errors and improves the overall service provided to customers. By streamlining the ordering process and ensuring accurate stock availability, the company can enhance customer satisfaction and loyalty.

Moreover, the project is expected to contribute to operational efficiency by reducing the administrative burden on staff. By automating certain processes, employees can focus on more strategic tasks that require human intervention and expertise. This not only improves the overall productivity of the company but also allows for a more agile response to market demands and customer needs.

## 2. Purpose (The use of this project. What can be achieved)

The primary purpose of this Salesforce implementation project at **WhatsNext Vision Motors** is to enhance the overall customer experience and streamline the company's operational processes through intelligent automation and data-driven decision-making. By leveraging Salesforce's powerful CRM capabilities, the project aims to achieve the following outcomes:

- **Improve Order Efficiency:** Automate the customer vehicle ordering process, reducing manual errors and delays.
- **Stock Validation:** Prevent customers from placing orders for vehicles that are out of stock, improving accuracy and avoiding disappointment.
- **Dealer Assignment Automation:** Automatically assign the nearest authorized dealer to a customer based on their address, reducing customer

effort and improving service speed.

- **Bulk Order Status Updates:** Use scheduled batch jobs to automatically update the status of orders (e.g., from "Pending" to "Confirmed") based on stock availability.
- **Enhance Customer Communication:** Provide timely and transparent updates to customers regarding the status of their vehicle orders.
- **Operational Efficiency:** Reduce the workload on employees by automating repetitive tasks such as stock checks and order routing, allowing staff to focus on strategic responsibilities.
- **Customer Satisfaction and Loyalty:** Deliver a smoother, more personalized experience that encourages repeat business and builds trust with the brand.

Overall, this project supports **scalable growth, process standardization, and a more agile response to market demand** in the automotive sector.

## 2. LITERATURE SURVEY

### 2.1 Existing Problem (Existing approaches or method to solve this problem)

In the traditional automotive dealership ecosystem, several operational challenges hinder the efficiency and customer satisfaction levels:

- 
- **Manual Dealer Selection:** Customers are often required to manually select a dealer without guidance, leading to confusion and suboptimal experiences due to distance or dealer availability.
  - **Stock Visibility Issues:** Customers are allowed to place orders even when the selected vehicle is out of stock. This results in order cancellations, delays, and loss of customer trust.
  - **Inefficient Communication:** Updates on order status are either delayed or handled manually by staff, which creates information gaps and frustration for customers.
  - **Lack of Automation in Order Processing:** Without automation, staff must validate stock, update order statuses, and notify customers manually. This consumes significant time and is prone to human error.
  - **Scattered Data:** Vehicle, dealer, and customer data are often stored in disconnected systems, making it difficult to provide personalized service or accurate reporting.

## Existing Methods:

- 
- Some companies use basic ERP or dealership management systems, but these often lack customer-centric automation and are not integrated with CRM platforms like Salesforce.
  - Manual spreadsheets and email chains are still common, especially in smaller dealerships, but they are not scalable or efficient.

These limitations highlight the need for a centralized, intelligent, and automated solution to streamline the vehicle ordering process and improve customer experience — a gap that this project aims to address.

## 2.2 Proposed Solution (What is the method or solution suggested by you?)

To address the limitations of the existing system, WhatsNext Vision Motors has implemented a Salesforce-based CRM solution that introduces intelligent automation, improved data management, and customer-centric features. The proposed solution includes the following key components:

- Automated Dealer Assignment  
The system uses customer address data to auto-suggest and assign the nearest available dealer using geolocation or predefined territory logic. This enhances convenience for

customers and ensures faster processing.

- **Stock Validation at Order Time**

**When a customer places an order, the system checks real-time vehicle availability. If a vehicle is out of stock, the system prevents the order from proceeding, thereby reducing failed orders and miscommunication.**

- **Order Status Automation via Batch Apex**

**A scheduled Apex batch job runs periodically to update the status of bulk vehicle orders.**

- **If a vehicle is in stock → Status = "Confirmed"**

- **If out of stock → Status = "Pending"**

**This ensures data accuracy without manual intervention.**

- **Trigger-Based Flow Logic**

**Apex triggers and flows manage real-time validations and updates during vehicle order creation, such as assigning default values, setting relationships, or triggering notifications.**



- **Improved Customer Communication**

**The system is configured to send automatic notifications (email/SMS) to customers about test drives, service updates, and order confirmations. This enhances transparency and trust.**

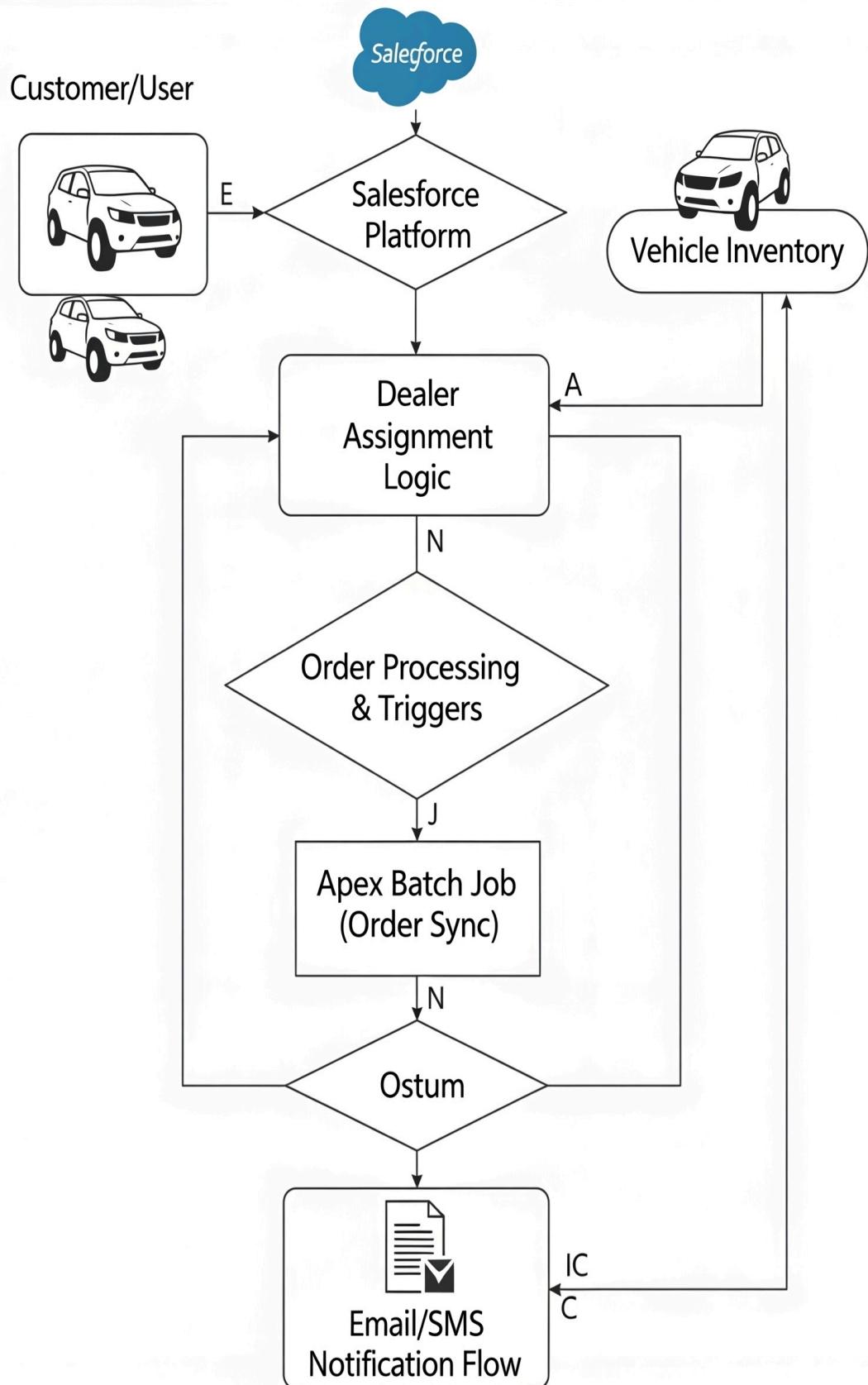
- **Scalable & Centralized CRM**

**All customer, vehicle, dealer, and order data is stored in Salesforce CRM, enabling centralized reporting, analysis, and future integration with other business systems.**

**This solution significantly reduces manual workload, eliminates errors, and provides a seamless experience to both customers and internal teams, aligning the organization with modern, digital-first practices.**

### **3. THEORETICAL ANALYSIS**

#### **3.1 Block Diagram**



### **3.2 Hardware / Software designing**

#### **System Requirements:**

##### **1. Supported Browsers**

**Google Chrome (Latest stable version, recommended)**

**Mozilla Firefox (Latest stable version)**

**Microsoft Edge (Latest stable version)**

**Safari (Latest stable version, Mac only)**

**Internet Explorer 11 (Limited support, not recommended)**

**Note : Atleast 2 browsers installed in the system.**

##### **2. Operating System Compatibility**

**Windows 10/11**

**macOS (Latest versions)**

**Linux (Limited support, browser-dependent)**

**ChromeOS (Browser-based usage)**

##### **3. Hardware Requirements**

**Processor: Intel Core i3 or higher (or equivalent)**

**RAM: Minimum 4GB RAM (8GB or more recommended for better performance)**

**Storage: At least 10GB free disk space**

**Display Resolution: Minimum 1366 x 768 (1920 x 1080 recommended)**

## 4. Network Requirements

**Stable internet connection (Broadband, minimum 3 Mbps recommended)**

**No VPN restrictions that block Salesforce access**

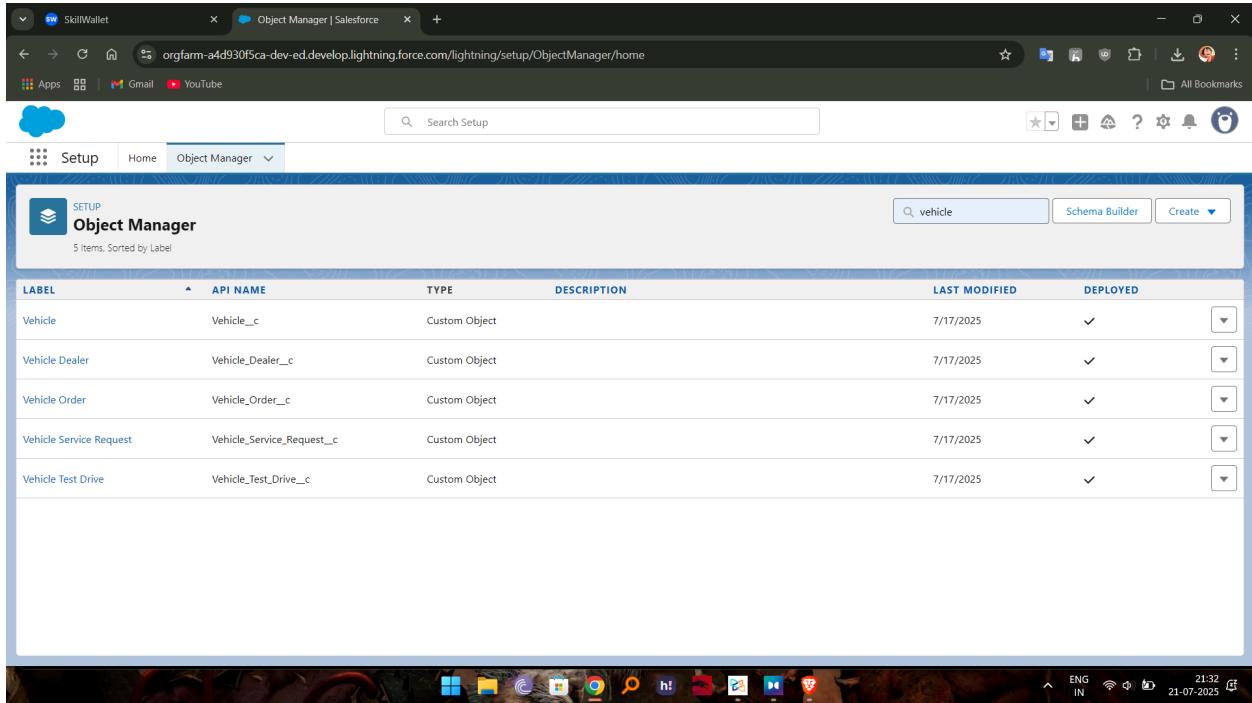
**Allow Salesforce domains in firewall settings (e.g., .salesforce.com, .force.com)**

## 4. RESULT

### i. Data Management-Objects

#### Objects & Relationships

Object Name	Purpose	Relationships
<b>Vehicle__c</b>	Stores vehicle details	Related to Dealer & Orders
<b>Vehicle_Dealer__c</b>	Stores authorized dealer info	Related to Orders
<b>Vehicle_Customer__c</b>	Stores customer details	Related to Orders & Test Drives
<b>Vehicle_Order__c</b>	Tracks vehicle purchases	Related to Customer & Vehicle
<b>Vehicle_Test_Drive__c</b>	Tracks test drive bookings	Related to Customer & Vehicle
<b>Vehicle_Service_Request__c</b>	Tracks vehicle servicing requests	Related to Customer & Vehicle



## Fields & Relationships

### Key Fields for Each Object

#### 1. Vehicle\_c (Custom Object)

**Vehicle\_Name\_c (Text)**

**Vehicle\_Model\_c (Picklist: Sedan, SUV, EV, etc.)**

**Stock\_Quantity\_c (Number)**

**Price\_c (Currency)**

**Dealer\_c (Lookup to Dealer\_c)**

**Status\_c (Picklist: Available, Out of Stock, Discontinued)**



## **2. Vehicle\_Dealer\_c (Custom Object)**

**Dealer\_Name\_c (Text)**

**Dealer\_Location\_c (Text)**

**Dealer\_Code\_c (Auto Number)**

**Phone\_c (Phone)**

**Email\_c (Email)**

## **3. Vehicle\_Order\_c (Custom Object)**

**Customer\_c (Lookup to Customer\_c)**

**Vehicle\_c (Lookup to Vehicle\_c)**

**Order\_Date\_c (Date)**

**Status\_c (Picklist: Pending, Confirmed, Delivered, Canceled)**

## **4. Vehicle\_Customer\_c (Custom Object)**

**Customer\_Name\_c (Text)**

**Email\_c (Email)**

**Phone\_c (Phone)**

**Address\_c (Text)**

**Preferred\_Vehicle\_Type\_c (Picklist: Sedan, SUV, EV, etc.)**

## **5. Vehicle\_Test\_Drive\_c (Custom Object)**

**Customer\_c (Lookup to Customer\_c)**

**Vehicle\_c (Lookup to Vehicle\_c)**

**Test\_Drive\_Date\_c (Date)**

**Status\_c (Picklist: Scheduled, Completed, Canceled)**

## **6. Vehicle\_Service\_Request\_c (Custom Object)**

**Customer\_c (Lookup to Customer\_c)**

**Vehicle\_c (Lookup to Vehicle\_c)**

**Service\_Date\_c (Date)**

**Issue\_Description\_c (Text)**

**Status\_c (Picklist: Requested, In Progress, Completed)**

The screenshot shows the Salesforce Object Manager interface. The top navigation bar includes tabs for 'SkillWallet', 'Object Manager | Salesforce', 'Vehicle Service Request | Salesforce', and 'Vehicle Test Drive | Salesforce'. Below the navigation is a toolbar with icons for Apps, Gmail, YouTube, and other bookmarks. The main content area is titled 'SETUP > OBJECT MANAGER' and 'Vehicle Service Request'. On the left, a sidebar lists various setup options under 'Fields & Relationships'. The main table displays nine fields, each with its label, name, data type, controlling field, and indexed status. The fields listed are:

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Created By	CreatedBy	Lookup(User)		
Customer	Customer__c	Lookup(Customer Full Name)		✓
Issue Description	Issue_Description__c	Text(255)		
Last Modified By	LastModifiedBy	Lookup(User)		✓
Owner	OwnerId	Lookup(User,Group)		✓
Service Date	Service_Date__c	Date		
Status	Status__c	Picklist		
Vehicle	Vehicle__c	Lookup(Vehicle)		✓
Vehicle Service Request Name	Name	Text(30)		✓

Vehicle | Salesforce

SETUP > OBJECT MANAGER

### Vehicle

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Created By	CreatedById	Lookup(User)		
Last Modified By	LastModifiedById	Lookup(User)		
Owner	OwnerId	Lookup(User,Group)		✓
Price	Price__c	Currency(18, 0)		
Status	Status__c	Picklist		
Stock Quality	Stock_Quality__c	Number(18, 0)		
Vehicle Dealer	Vehicle_Dealer__c	Lookup(Vehicle Dealer)		✓
Vehicle Model	Vehicle_Model__c	Picklist		
Vehicle Name	Name	Text(80)		✓

Object Manager | Salesforce

Vehicle Dealer | Salesforce

Vehicle Order | Salesforce

Vehicle Service Request | S

Vehicle Test Drive | Salesfo

SETUP > OBJECT MANAGER

### Vehicle Dealer

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Created By	CreatedById	Lookup(User)		
Dealer Code	Dealer_Code__c	Auto Number		
Dealer Location	Dealer_Location__c	Text(18)		
Dealer Name	Dealer_Name__c	Text(18)		
Dealer Name	Name	Text(80)		✓
Email	Email__c	Email		
Last Modified By	LastModifiedById	Lookup(User)		
Owner	OwnerId	Lookup(User,Group)		✓
Phone	Phone__c	Phone		

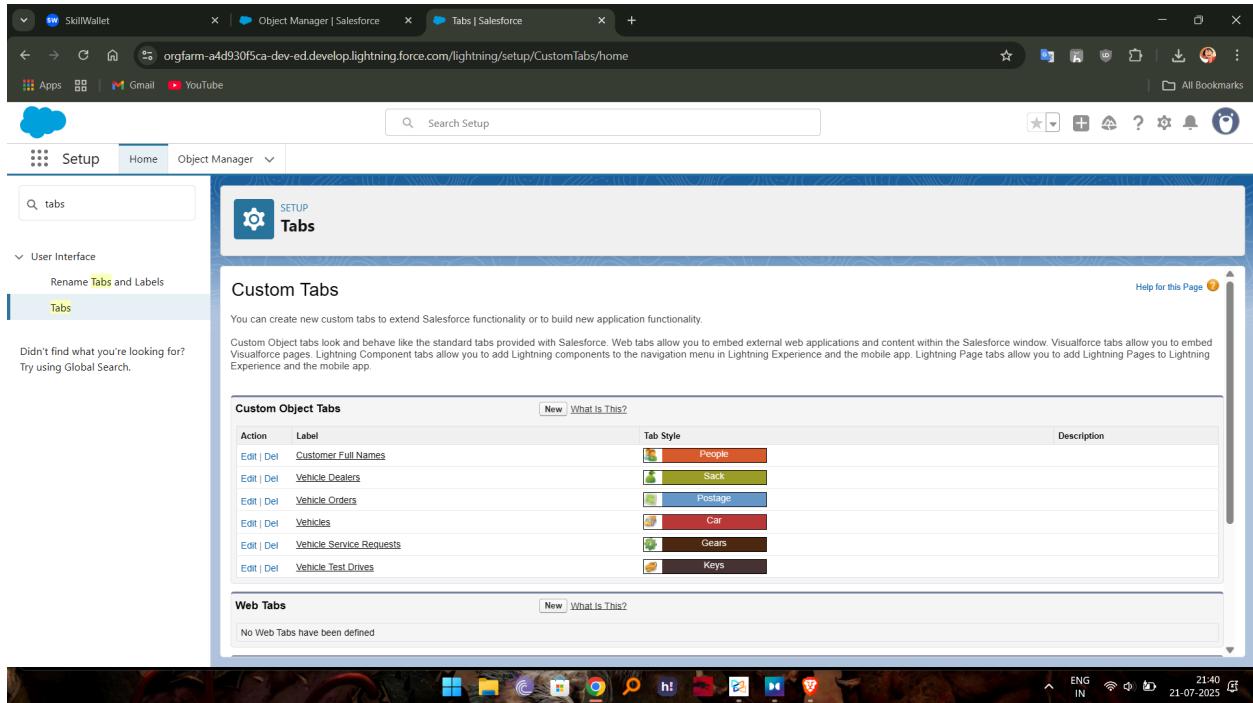
The screenshot shows the Salesforce Object Manager interface for the 'Vehicle Order' object. The left sidebar lists various setup options like Page Layouts, Lightning Record Pages, and Field Sets. The main content area is titled 'Fields & Relationships' and displays a table of fields:

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Created By	CreatedBy	Lookup(User)		
Customer	Customer__c	Lookup(Customer Full Name)		
Last Modified By	LastModifiedBy	Lookup(User)		
Order Date	Order_Date__c	Date		
Owner	OwnerId	Lookup(User,Group)		
Status	Status__c	Picklist		
Vehicle	Vehicle__c	Lookup(Vehicle)		
Vehicle Order Name	Name	Text(80)		

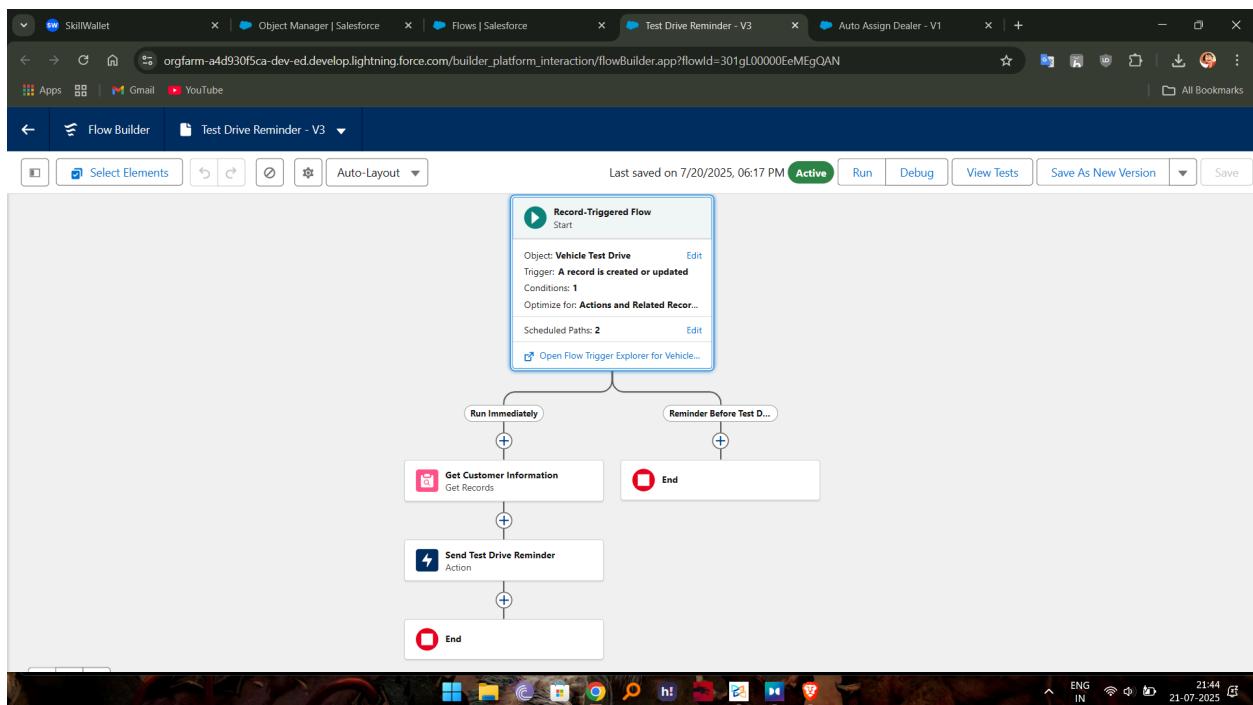
The screenshot shows the Salesforce Object Manager interface for the 'Vehicle Test Drive' object. The left sidebar lists various setup options. The main content area is titled 'Fields & Relationships' and displays a table of fields:

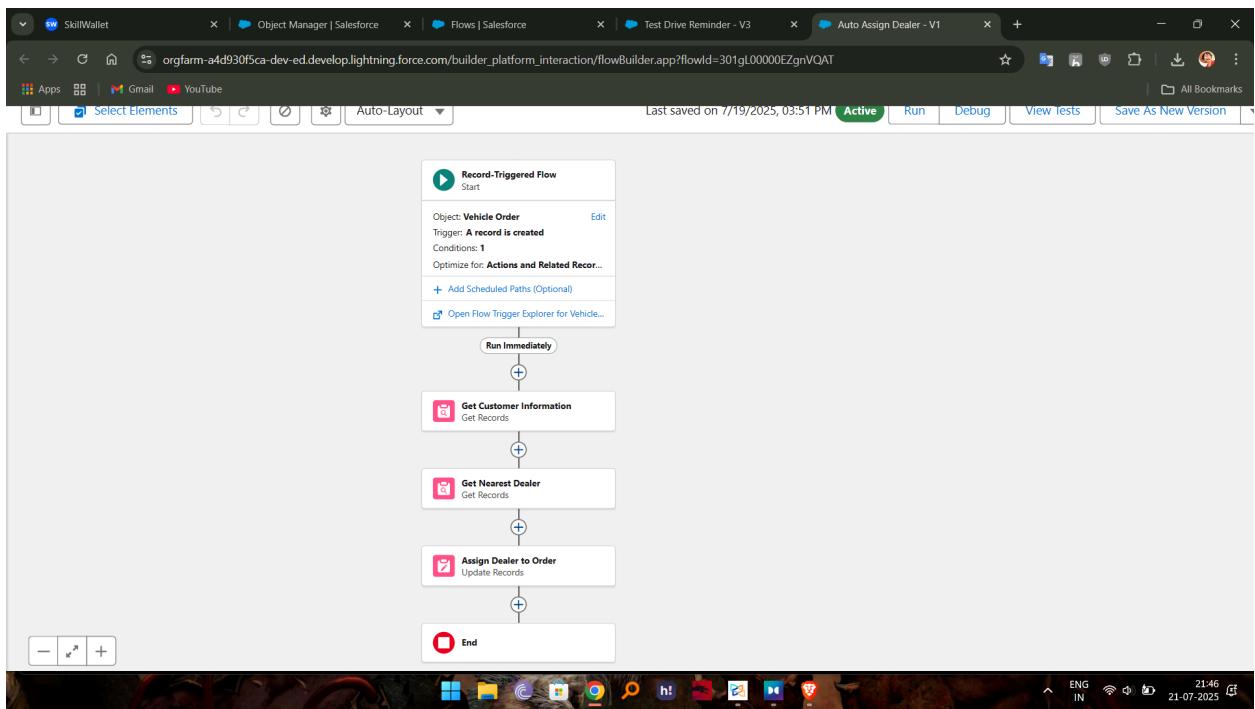
FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Created By	CreatedBy	Lookup(User)		
Customer	Customer__c	Lookup(Customer Full Name)		
Last Modified By	LastModifiedBy	Lookup(User)		
Owner	OwnerId	Lookup(User,Group)		
Status	Status__c	Picklist		
Test Drive Date	Test_Drive_Date__c	Date		
Vehicle	Vehicle__c	Lookup(Vehicle)		
Vehicle Test Drive Name	Name	Text(80)		

# Data Management-Tabs



# Flow Creation





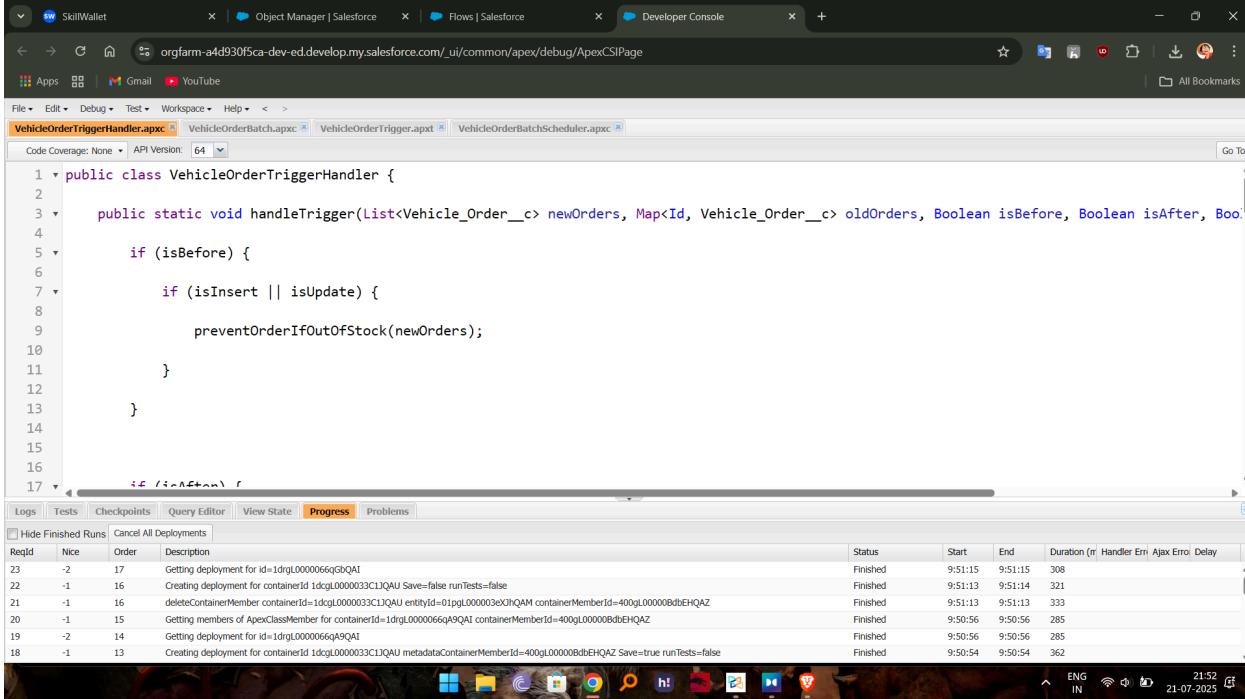
## Apex and Batch Class

**Creating the Automation, helps to run the business workflow automated using Codes.**

- ✓ **VehicleOrderTriggerHandler** – handles logic during DML
- ✓ **VehicleOrderBatch** – batch class to process pending orders
- ✓ **VehicleOrderTrigger** – trigger wired to handler
- ✓ **VehicleOrderBatchScheduler** – a scheduled job that runs the batch

## End Result

- Any pending vehicle orders are processed automatically.
- Orders get confirmed if stock is available.
- Vehicle inventory is reduced accurately.
- No manual effort needed.



```

1  public class VehicleOrderTriggerHandler {
2
3     public static void handleTrigger(List<Vehicle_Order__c> newOrders, Map<Id, Vehicle_Order__c> oldOrders, Boolean isBefore, Boolean isAfter, Boolean
4
5         if (isBefore) {
6
7             if (isInsert || isUpdate) {
8
9                 preventOrderIfOutOfStock(newOrders);
10
11         }
12
13     }
14
15
16
17     private void preventOrderIfOutOfStock(List<Vehicle_Order__c> newOrders) {
18
19         for (Vehicle_Order__c order : newOrders) {
20
21             if (order.getQuantity() > order.getAvailableQuantity()) {
22
23                 order.setQuantity(0);
24
25                 ApexPages.addMessage(new ApexPages.Message(ApexPages.Severity.Error, 'Insufficient stock for order ' + order.getId()));
26
27             }
28
29         }
30
31     }
32
33 }

```

LogId	Nice	Order	Description	Status	Start	End	Duration (m)	Handler Err	Ajax Err	Delay
23	-2	17	Getting deployment for id=1drgl0000066qCQAI	Finished	9:51:15	9:51:15	308			
22	-1	16	Creating deployment for containerId 1dcpL0000033C1JQAU Save=false runTests=false	Finished	9:51:13	9:51:14	321			
21	-1	16	deleteContainerMember containerId=1dcpL0000033C1JQAU entityId=01pgL000003e0JhQAM containerMemberId=400gL000008dbEHQAZ	Finished	9:51:13	9:51:13	333			
20	-1	15	Getting members of ApexClassMember for containerId=1drgl0000066qA9QAI containerMemberId=400gL000008dbEHQAZ	Finished	9:50:56	9:50:56	285			
19	-2	14	Getting deployment for id=1drgl0000066qA9QAI	Finished	9:50:56	9:50:56	285			
18	-1	13	Creating deployment for containerId 1dcpL0000033C1JQAU metadataContainerMemberId=400gL000008dbEHQAZ Save=true runTests=false	Finished	9:50:54	9:50:54	362			

The screenshot shows a browser window with several tabs open, all related to Salesforce development:

- SkilWallet
- Object Manager | Salesforce
- Flows | Salesforce
- Developer Console

The main content area is a code editor for the `VehicleOrderBatch.apxc` file. The code implements a `Database.Batchable<sObject>` interface:global class VehicleOrderBatch implements Database.Batchable<sObject> {  
 global Database.QueryLocator start(Database.BatchableContext bc) {  
 return Database.getQueryLocator([  
 SELECT Id, Status\_\_c, Vehicle\_\_c  
 FROM Vehicle\_Order\_\_c  
 WHERE Status\_\_c = 'Pending'  
 ]);  
 }  
 global void execute(Database.BatchableContext bc, List<Vehicle\_Order\_\_c> orderList) {  
 Set<Id> vehicleIds = new Set<Id>();  
 for (Vehicle\_Order\_\_c order : orderList) {  
 if (order.Vehicle\_\_c != null) {  
 vehicleIds.add(order.Vehicle\_\_c);  
 }  
 }  
 }  
}

Below the code editor is a table titled "Logs" showing deployment history:| ReqId | Nice | Order | Description | Status | Start | End | Duration (m) | Handler Err! | Ajax Err! | Delay |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 23 | -2 | 17 | Getting deployment for id=1drgl0000066gQaQ1 | Finished | 9:51:15 | 9:51:15 | 308 |  |  |  |
| 22 | -1 | 16 | Creating deployment for containerId=1dkglo0000033C1jQAU Save=false runTests=false | Finished | 9:51:13 | 9:51:14 | 321 |  |  |  |
| 21 | -1 | 16 | deleteContainerMember containerId=1dkglo0000033C1jQAU entityId=01ngl000003e0hQAM containerMemberId=400gl00000BdbEHQAZ | Finished | 9:51:13 | 9:51:13 | 333 |  |  |  |
| 20 | -1 | 15 | Getting members of ApexClassMember for containerId=1drgl0000066gQaQ1 containerMemberId=400gl00000BdbEHQAZ | Finished | 9:50:56 | 9:50:56 | 285 |  |  |  |
| 19 | -2 | 14 | Getting deployment for id=1drgl0000066gQaQ1 | Finished | 9:50:56 | 9:50:56 | 285 |  |  |  |
| 18 | -1 | 13 | Creating deployment for containerId=1dkglo0000033C1jQAU metadataContainerMemberId=400gl00000BdbEHQAZ Save=true runTests=false | Finished | 9:50:54 | 9:50:54 | 362 |  |  |  |

The screenshot shows a browser window with several tabs open, including 'SkillWallet', 'Object Manager | Salesforce', 'Flows | Salesforce', and 'Developer Console'. The 'Developer Console' tab is active, displaying the code for 'VehicleOrderTrigger.apxt'. The code is as follows:

```
trigger VehicleOrderTrigger on Vehicle_Order__c (before insert,before update, after insert, after update) {
    VehicleOrderTriggerHandler.handleTrigger(Trigger.new, Trigger.oldMap, Trigger.isBefore,Trigger.isAfter, Trigger.isInsert, Trigger.isUpdate);
}
```

Below the code editor, there is a 'Logs' section with tabs for 'Tests', 'Checkpoints', 'Query Editor', 'View State', 'Progress', and 'Problems'. The 'Progress' tab is selected, showing a table of deployment logs:

ReqId	Nice	Order	Description	Status	Start	End	Duration (m)	Handler	Ajax	Errors	Delay
23	-2	17	Getting deployment for id=1drgl0000066gQ9AQ1	Finished	9:51:15	9:51:15	308				
22	-1	16	Creating deployment for containerId=1dcp00000033C1jQAU Save=false runTests=false	Finished	9:51:13	9:51:14	321				
21	-1	16	deleteContainerMember containerId=1dcp00000033C1jQAU entityId=01pgl000003e0lhHQAM containerMemberId=400gl00000BdbEHQAZ	Finished	9:51:13	9:51:13	333				
20	-1	15	Getting members of ApexClassMember for containerId=1drgl0000066gQ9AQ1 containerMemberId=400gl00000BdbEHQAZ	Finished	9:50:56	9:50:56	285				
19	-2	14	Getting deployment for id=1drgl0000066gQ9AQ1	Finished	9:50:56	9:50:56	285				
18	-1	13	Creating deployment for containerId=1dcp00000033C1jQAU metadataContainerMemberId=400gl00000BdbEHQAZ Save=true runTests=false	Finished	9:50:54	9:50:54	362				

```

1  global class VehicleOrderBatchScheduler implements Schedulable {
2
3     global void execute(SchedulableContext sc) {
4
5         VehicleOrderBatch batchJob = new VehicleOrderBatch();
6
7         Database.executeBatch(batchJob, 50); // 50 is the batch size
8
9     }
10
11 }

```

ReqId	Nice	Order	Description	Status	Start	End	Duration (rr)	Handler Err	Ajax Err	Delay
23	-2	17	Getting deployment for id=1drgL0000066gQbQAI	Finished	9:51:15	9:51:15	308			
22	-1	16	Creating deployment for containerId=1dgl0000033C1JQAU Save=false runTests=false	Finished	9:51:13	9:51:14	321			
21	-1	16	deleteContainerMember containerId=1dgl0000033C1JQAU entityId=01pgL000003eXlHQAM containerMemberId=400gL00000BdbEHQAZ	Finished	9:51:13	9:51:13	333			
20	-1	15	Getting members of ApexClassMember for containerId=1drgL0000066gA9QAI containerMemberId=400gL00000BdbEHQAZ	Finished	9:50:56	9:50:56	285			
19	-2	14	Getting deployment for id=1drgL0000066gA9QAI	Finished	9:50:56	9:50:56	285			
18	-1	13	Creating deployment for containerId=1dgl0000033C1JQAU metadataContainerMemberId=400gL00000BdbEHQAZ Save=true runTests=false	Finished	9:50:54	9:50:54	362			

## You Can Check where this Schedule Job is Running

All Scheduled Jobs

The All Scheduled Jobs page lists all of the jobs scheduled by your users. Multiple job types may display on this page. You can delete scheduled jobs if you have the permission to do so.

Percentage of Scheduled Jobs Used: 2%  
You have currently used 2 scheduled Apex jobs out of an allowed organization limit of 100 active or scheduled jobs. To learn about how this limit is calculated and what contributes to it see the [Lightning Platform Apex Limits](#) topic.

Action Job Name ↑ Submitted By Submitted Started Next Scheduled Run Type Cron Trigger ID

Manage   Del   Pause Job	Daily Inventory Sync Job	Jayanth_Karanam	7/21/2025, 5:59 AM	7/22/2025, 2:00 AM	Scheduled Apex	08egL000008FZSI
Manage   Del   Pause Job	Daily Vehicle Order Processing	Jayanth_Karanam	7/19/2025, 9:40 AM	7/20/2025, 12:01 PM	Scheduled Apex	08egL000008T72I
Del	Metalytics Data Loader Job for Org : 00DgL000006zWHF	User_Integration	7/9/2025, 10:45 PM	7/20/2025, 9:32 AM	Autonomous Data Loader Job	08egL000007F8XX
	Program Milestone Computation Cron Job	Process_Automated	7/9/2025, 10:45 PM	7/21/2025, 7:00 AM	Program Milestone Computation Cron Job	08egL000007F8XV
	Program Status Update Cron Job	Process_Automated	7/9/2025, 10:45 PM	7/21/2025, 5:01 AM	Program Status Update Cron Job	08egL000007F8XW

# Lightning App

This screenshot shows a list of customer names from the 'Customer Full Names' tab. The table includes columns for Customer Full Name, Phone, Record ID, and Preferred Vehicle Type. The data is sorted by Customer Full Name.

	Customer Full Name	Phone	Record ID	Preferred Vehicle Type
1	Anil Kumar	(812) 345-6784	a02gL000002tdsPQAQ	Sedan
2	Ganapathi Naidu	(912) 345-6784	a02gL000002tdpBQAQ	Crossover
3	JayaSimha Rao	(812) 345-6782	a02gL000002uGtQAE	SUV
4	Justin	(812) 345-6787	a02gL000002tUKTQA2	Crossover
5	K Ramesh Babu	(812) 345-6780	a02gL000002uGybQAE	SUV
6	K Sudhakar Rao	(812) 345-6781	a02gL000002uGvNQAU	Sedan
7	Lakshmi Narayana Sastry	(812) 345-6701	a02gL000002uHejQAM	SUV
8	Muhammad Rafi	(812) 345-6703	a02gL000002uHxtQAE	Hatchback
9	N Dhanalaxmi	(812) 345-6704	a02gL000002uI2lQAE	Hatchback
10	N Lakshmi	(812) 345-6705	a02gL000002uI7ZQAU	Sedan
11	Prathiba Reddy	(812) 345-6702	a02gL000002uD4gQAE	Hatchback
12	Ramesh	(812) 345-6788	a02gL000002tUfdQAM	SUV
13	Sanjay Ramaswamy	(812) 345-6789	a02gL000002tUCPQA2	SUV
14	Santhosh Kumar	(812) 345-6700	a02gL000002uH1pQAE	Hatchback
15	Veresha Lingam	(812) 345-6786	a02gL000002tdkLOAQ	Sedan
16	Yaskin Zooka	(812) 345-6783	a02gL000002uGqXQAU	Hatchback

This screenshot shows a list of vehicle dealers from the 'Vehicle Dealers' tab. The table includes columns for Dealer Name, Dealer Code, Phone, and Dealer Location. The data is sorted by Dealer Name.

	Dealer Name	Dealer Code	Phone	Dealer Location
1	Autowheel Motors	202507-1	(912) 345-6789	Hyderabad
2	Heritage Car Point	202507-5	(987) 654-3213	Vishakapatnam
3	Lakshmi Wheels & Motors	202507-4	(987) 654-3212	Warangal
4	MG Motors	202507-6	(987) 654-3214	Anantapur
5	Omkar Auto World	202507-3	(987) 654-3211	Bellary
6	S8 Motors	202507-7	(987) 654-3217	Tirupathi
7	Shree Sai Auto Plaza	202507-2	(987) 654-3210	Anantapur
8	Varun Motors	202507-8	(987) 654-3218	Vijayawada

Vehicle Orders All

	Vehicle Order Name	Customer	Order Date	Vehicle	Status
1	6SD	Anil Kumar	7/17/2025	Skoda Slavia	Pending
2	15CC	Ganapathi Naidu	7/1/2025	Kia Sonet	Confirmed
3	12SC	JayaSimha Rao	2/19/2025	TATA Harrier	Delivered
4	16CD	Justin	4/30/2025	Kia Sonet	Delivered
5	11SC	K Ramesh Babu	12/17/2021	Mahindra XUV 700	Delivered
6	7HC	K Sudhakar Rao	7/19/2025	Skoda Slavia	Pending
7	1SC	Lakshmi Narayana Sastry	7/21/2025	Hyundai Creta	Confirmed
8	16CC	Lakshmi Narayana Sastry	7/18/2025	Mahindra Scorpio	Confirmed
9	5HD	Muhammad Rafi	4/26/2025	TATA Altroz	Delivered
10	4HD	N Dhanalaxmi	6/25/2025	Renault Kwid	Confirmed
11	3HD	N Lakshmi	6/23/2023	Honda Amaze	Delivered
12	2HD	Prathiba Reddy	7/14/2022	Hyundai Grand i10 Nios	Delivered
13	13SD	Ramesh	5/16/2018	Toyota Fortuner	Delivered
14	14SD	Sanjay Ramaswamy	7/8/2025	TATA Safari	Confirmed
15	9HD	Santhosh Kumar	11/27/2018	Hyundai Grand i10 Nios	Delivered
16	8SC	Veresha Lingam	7/2/2025	Maruti Suzuki Swift	Confirmed
17	10HC	Yaskin Zooka	7/25/2024	TATA Tiago	Delivered

## We hit a Snag

Vehicle Orders All

Edit 16CC

\* = Required Information

	Vehicle Order Name	Customer	Vehicle	Status
1	6SD	Anil Kumar		Pending
2	15CC	Ganapathi Nai		Confirmed
3	12SC	JayaSimha Rao		Delivered
4	16CD	Justin		Delivered
5	11SC	K Ramesh Babu		Delivered
6	7HC	K Sudhakar Ra		Pending
7	1SC	Lakshmi Naray		Confirmed
8	16CC	Lakshmi Naray		Confirmed
9	5HD	Muhammad R		Delivered
10	4HD	N Dhanalaxmi		Confirmed
11	3HD	N Lakshmi		Delivered
12	2HD	Prathiba Redd		Delivered
13	13SD	Ramesh		Delivered
14	14SD	Sanjay Ramasv		Confirmed
15	9HD	Santhosh Kum		Delivered
16	8SC	Veresha Lingam		Confirmed
17	10HC	Yaskin Zooka		Delivered

**We hit a snag.**

Review the errors on this page.

- This vehicle is out of stock. Order cannot be placed.

Cancel Save & New Save

Vehicle Service Requests

All

6 items • Sorted by Vehicle Service Request Name • Updated a few seconds ago

	Vehicle Service Request Name	Customer	Vehicle	Status	Service Date
1	Depth Service	Ramesh	Toyota Fortuner	In Progress	7/21/2025
2	General Service	Yaskin Zooka	TATA Tiago	Completed	7/20/2025
3	General Service	K Ramesh Babu	Mahindra XUV 700	Requested	7/30/2025
4	General Service	N Lakshmi	Honda Amaze	Completed	7/10/2025
5	PowerWash	Prathiba Reddy	Hyundai Grand i10 Nios	Requested	8/9/2025
6	PowerWash	Muhammad Rafi	TATA Altroz	Completed	7/19/2025

Vehicle Test Drives

All

7 items • Sorted by Vehicle Test Drive Name • Updated a few seconds ago

	Vehicle Test Drive Name	Customer	Status	Test Drive Date	Vehicle
1	14SD	Sanjay Ramaswamy	Completed	6/2/2025	TATA Safari
2	15CC	Ganapathi Naidu	Canceled	7/23/2025	Kia Sonet
3	15DC	K Sudhakar Rao	Canceled	7/22/2025	Skoda Slavia
4	1SC	Lakshmi Narayana Sastry	Completed	7/10/2025	Hyundai Creta
5	4HD	N Dhanalaxmi	Completed	5/15/2025	Renault Kwid
6	6SD	Anil Kumar	Completed	6/1/2025	Skoda Slavia
7	BSC	Veresha Lingam	Canceled	7/30/2025	Maruti Suzuki Swift

	<input type="checkbox"/> Vehicle Name ↑	Vehicle Dealer	Vehicle Model	Status	Price
1	<input type="checkbox"/> Honda Amaze	Autowheel Motors	Sedan	Available	\$1,200,000
2	<input type="checkbox"/> Honda City	Autowheel Motors	Sedan	Available	\$900,000
3	<input type="checkbox"/> Hyundai Alcazar	Varun Motors	SUV	Available	\$1,800,000
4	<input type="checkbox"/> Hyundai Creta	Varun Motors	SUV	Available	\$2,100,000
5	<input type="checkbox"/> Hyundai Grand i10 Nios	Autowheel Motors	Hatchback	Available	\$1,000,000
6	<input type="checkbox"/> Hyundai i20	Autowheel Motors	Hatchback	Available	\$700,000
7	<input type="checkbox"/> Hyundai Verna	MG Motors	Sedan	Out of Stock	\$1,400,000
8	<input type="checkbox"/> Kia Sonet	Omkar Auto World	Crossover	Available	\$1,800,000
9	<input type="checkbox"/> Kia Sonet	MG Motors	Crossover	Available	\$1,800,000
10	<input type="checkbox"/> Mahindra Scorpio	SB Motors	SUV	Available	\$1,400,000
11	<input type="checkbox"/> Mahindra Scorpio	MG Motors	SUV	Available	\$1,400,000
12	<input type="checkbox"/> Mahindra Thar	SB Motors	SUV	Available	\$2,100,000
13	<input type="checkbox"/> Mahindra Thar	MG Motors	SUV	Out of Stock	\$2,100,000
14	<input type="checkbox"/> Mahindra XUV 700	SB Motors	SUV	Available	\$1,800,000
15	<input type="checkbox"/> Mahindra XUV 700	MG Motors	SUV	Available	\$1,800,000
16	<input type="checkbox"/> Maruti Suzuki DZire	Omkar Auto World	Sedan	Available	\$900,000
17	<input type="checkbox"/> Maruti Suzuki Swift	MG Motors	Hatchback	Available	\$800,000
18	<input type="checkbox"/> Maruti Suzuki Swift	Lakshmi Wheels & Motors	Hatchback	Out of Stock	\$800,000
19	<input type="checkbox"/> Renault Kwid	Shree Sai Auto Plaza	Hatchback	Available	\$400,000
20	<input type="checkbox"/> Renault Kwid	Heritage Car Point	Hatchback	Discontinued	\$400,000

## 5. APPLICATIONS

The Salesforce-based automated vehicle ordering and dealer assignment system has versatile applications, especially in sectors that require streamlined order processing, customer engagement, and real-time inventory management. Below is a detailed breakdown of its use cases:

### 1. Automotive Dealership Management

- Order Lifecycle Automation:** Automates the end-to-end order processing workflow — from vehicle selection to dealer assignment and order status tracking.

- 
- **Dealer Location Intelligence:** Suggests the nearest or most suitable dealer based on the customer's address using geolocation logic or region mapping.
  - **Stock Check Integration:** Ensures that dealers are only receiving orders for vehicles they have in stock, reducing cancellation rates.
- 

## 2. Customer Relationship Management (CRM)

- **Unified Customer Profiles:** Maintains comprehensive records of customer data including preferences, vehicle bookings, and communication history.
  - **Targeted Communication:** Automatically triggers emails, SMS alerts, or app notifications based on user actions (e.g., order confirmation, stock availability).
  - **Loyalty and Feedback Loop:** Helps build customer loyalty through proactive communication and service follow-ups.
- 

## 3. Inventory & Stock Control

- **Real-Time Inventory Validation:** Prevents booking of out-of-stock vehicles by checking inventory status at the moment of order placement.
- **Centralized Stock Management:** Enables managers to oversee stock levels across multiple dealerships or warehouses from a



single platform.

- **Restocking Insights:** Historical data helps in forecasting demand and planning procurement cycles.
- 

#### 4. Process & Workflow Automation

- **Trigger-Based Order Validation:** Validates stock, assigns dealers, and updates records automatically using Apex triggers and flows.
  - **Batch Processing for Bulk Orders:** The system uses scheduled Apex batch classes to update the status of large sets of records without manual effort.
  - **Reduced Administrative Burden:** Frees up staff from repetitive tasks like stock checking, follow-ups, and manual dealer mapping.
- 

#### 5. Sales and Marketing Insights

- **Dashboards and Reports:** Provides visual insights on vehicle orders, customer demographics, dealer performance, and inventory status.
- **Predictive Analysis:** Salesforce's analytics can be used to predict customer demand, top-selling models, and geographic buying patterns.

- 
- **Lead Conversion Tracking:** Tracks which leads convert into orders and how quickly they move through the funnel.
- 

## 6. Cloud-Based Scalability & Accessibility

- **Remote Access:** Sales and support staff can access customer and inventory data from any location via desktop or mobile.
  - **Multi-Branch Deployment:** Easily extendable to support multiple regions, dealerships, or vehicle categories.
  - **Data Security & Compliance:** Salesforce ensures enterprise-grade security, data backups, and compliance with industry regulations.
- 

## 7. Industry Adaptability

While tailored for the automotive industry, this solution can be **customized for other industries** like:

- Electronics and Appliance Retail (for large item bookings)
- Heavy Equipment Rental
- Supply Chain & Logistics
- Aviation Parts and Vehicle Fleets

## 5. CONCLUSION

The implementation of the Salesforce-based vehicle ordering and management system at WhatsNext Vision Motors marks a significant step forward in transforming customer experience and operational efficiency in the automotive industry. This project addresses long-standing challenges such as stock unavailability, manual dealer assignment, and delayed order processing by introducing automation, real-time data validation, and intelligent workflow management.

By leveraging Salesforce's robust CRM capabilities, the system ensures that customers receive accurate and timely updates about their orders, reducing confusion and increasing satisfaction. The integration of automated dealer suggestions based on customer location simplifies the buying process, making it more intuitive and efficient. Furthermore, the ability to block orders for unavailable stock prevents order errors and enhances the company's reliability in the eyes of the customer.

Internally, the use of scheduled batch processes and Apex triggers minimizes manual intervention, allowing staff to focus on strategic tasks. This not only increases productivity but also ensures that order statuses remain current and reflective of real-time inventory conditions. The centralized nature of Salesforce provides a single source of truth for customer, dealer, and vehicle data, promoting transparency and informed decision-making.

In summary, this project has successfully demonstrated digital transformation and can lead to improvements in both customer satisfaction and business operations.



***\*\* THE END \*\****