

Ideation Phase

Define the Problem Statements

Date	01 November 2025
Team ID	NM2025TMID04024
Project Name	Garage Management System
Maximum Marks	2 Marks

Customer Problem Statement Template:

Customers managing vehicle service operations often face difficulties in tracking jobs, assigning mechanics, and maintaining accurate service records within the **Garage Management System**. When service tasks, inventory, and billing are not properly synchronized, it leads to confusion, missed deadlines, and inefficient workflow management. Mechanics may be double-booked or unassigned, spare parts may be misplaced, and customer service delays can affect satisfaction and trust.

They need a centralized system that streamlines **job scheduling, mechanic assignment, inventory control, and billing management** while ensuring real-time data updates and accuracy. Automated notifications, role-based access, and integrated reporting tools can help reduce errors and improve coordination. This solution will enhance operational efficiency, improve customer experience, and provide greater transparency and control over daily garage activities.

Problem	Solution
<p>Customers managing vehicle service operations often face difficulties in tracking jobs, assigning mechanics, and maintaining accurate service records within the Garage Management System.</p>	<p>They need a centralized system that streamlines job scheduling, mechanic assignment, inventory control, and billing management while ensuring real-time data updates and accuracy</p>

Example:

Problem Statement (PS)	I am (Customer)	I'm trying to	But	Because	Which makes me feel
PS-1	an Admin	Delete a user	the system doesn't allow it	the user is still assigned to active incidents	stuck and confused
PS-2	A Team Manager	Manage incident ownership	users get deleted without warnings	there's no alert or automatic check for active incident assignments	Frustrated and worried

Problem Statement PS 1:

As a garage administrator, I am trying to remove a mechanic who is no longer employed in the garage, but the system prevents me from completing this action because the mechanic is still assigned to active service jobs. This limitation makes me feel stuck and uncertain, as I cannot maintain accurate records or reassign pending repair tasks efficiently.

It disrupts daily operations and delays vehicle servicing, especially during busy hours. I need a better way to identify and resolve ongoing service assignments before proceeding with mechanic removal.

Problem Statement PS 2:

As a service manager, I want to ensure that all ongoing repair tasks are properly reassigned when a mechanic is removed from the system. However, the current system allows removal without any warning or summary of assigned jobs.

This results in incomplete service tasks and confusion among the staff, affecting overall productivity and customer satisfaction. A built-in alert or automatic job reassignment feature would minimize errors, maintain workflow continuity, and ensure smooth garage operations.