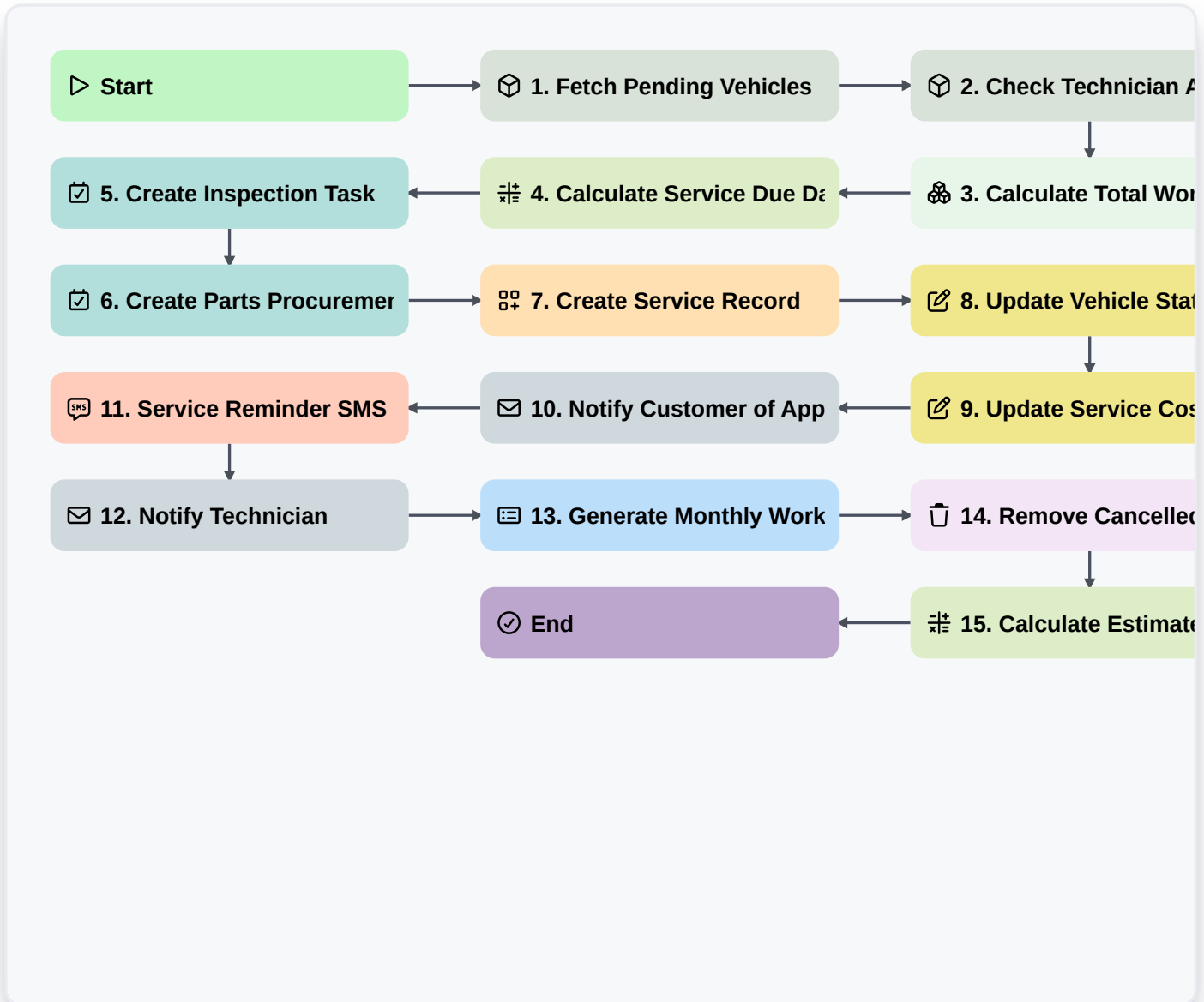


# Automotive Workshop Maintenance Scheduling



## Start

Start of the Workflow/Process.

## 1. Fetch Pending Vehicles

Retrieve all vehicle entries from the Data Model that are flagged as 'Due for Service' or 'Overdue'.

## 2. Check Technician Availability

Retrieve technician schedules and workload from the Staff Data Model.

## 3. Calculate Total Workshop Load

Sum the estimated service hours of all scheduled tasks to check against daily workshop capacity.

## 4. Calculate Service Due Date

Calculate the next maintenance date by adding the service interval (months) to the last service date.

## 5. Create Inspection Task

Generate a task for a technician to perform the physical vehicle inspection and diagnostic check.

## 6. Create Parts Procurement Task

Generate a task for the parts manager to order necessary components identified during inspection.



## **7. Create Service Record**

Create a new entry in the Maintenance History Data Model once the service is scheduled.

## **8. Update Vehicle Status**

Change the status of the vehicle entry from 'In Workshop' to 'Completed' or 'Awaiting Parts'.

## **9. Update Service Cost**

Update the total cost field in the Service Record with the final labor and parts totals.

## **10. Notify Customer of Appointment**

Send an automated email to the customer with the scheduled date, time, and estimated cost.

## **11. Service Reminder SMS**

Send an SMS reminder to the customer 24 hours before the scheduled maintenance appointment.

## **12. Notify Technician**

Send an email to the assigned technician containing the job details and vehicle information.

## **13. Generate Monthly Workshop Utilization Report**

Create a report summarizing completed services, revenue, and technician efficiency for the month.

## **14. Remove Cancelled Appointments**

Delete the temporary appointment entry if the customer cancels the scheduled service.

## **15. Calculate Estimated Invoice Total**

Calculate the total price by summing parts cost, labor rates, and applicable taxes.

## **End**

End of the Workflow/Process.