Speed Haul Logistics Dashboard

Total Delivery ID

100

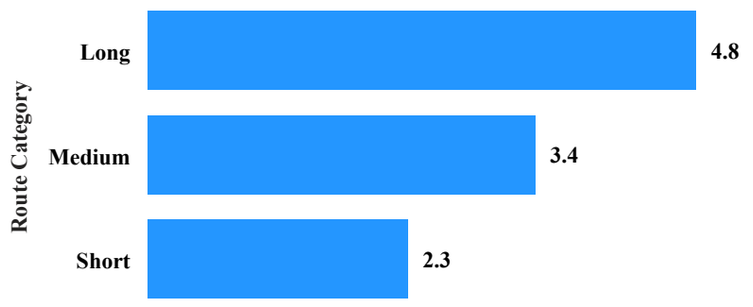
Total On-Time Deliveries

59

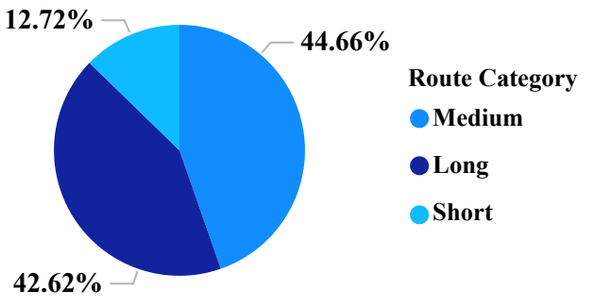
Average Delivery Time

3.59

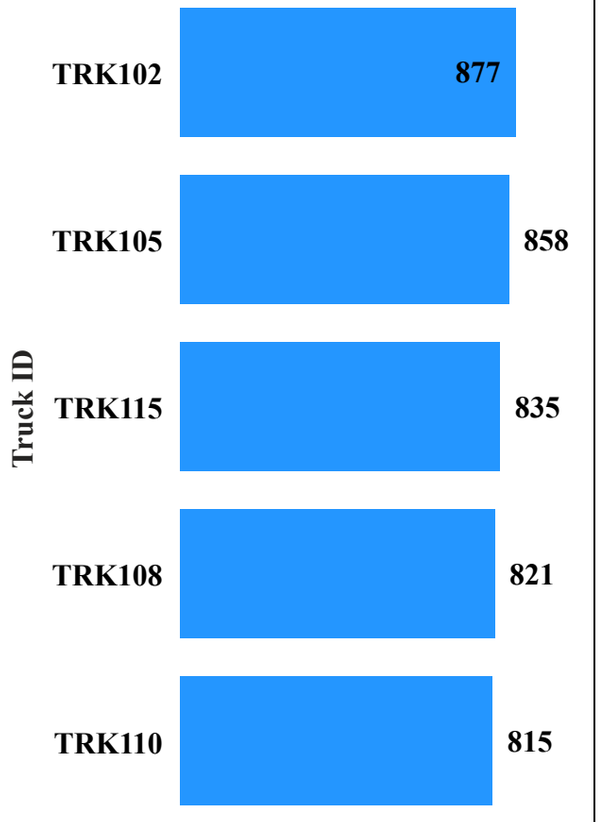
AvgDeliveryTime_Hrs by Route Category



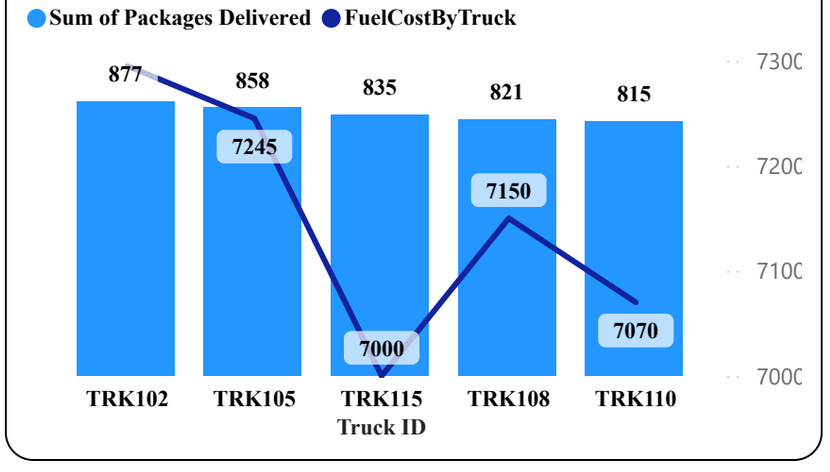
Sum of Fuel Cost (GHS) by Route Category



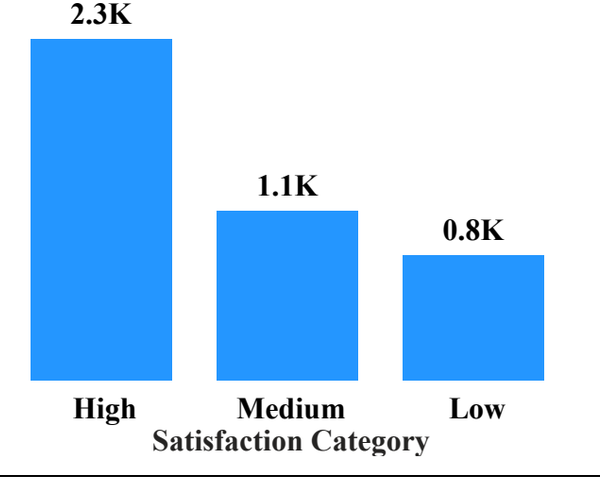
Sum of Packages Delivered by Truck ID



Sum of Packages Delivered and FuelCostByTruck by Truck ID



Sum of Packages Delivered by Satisfaction Category

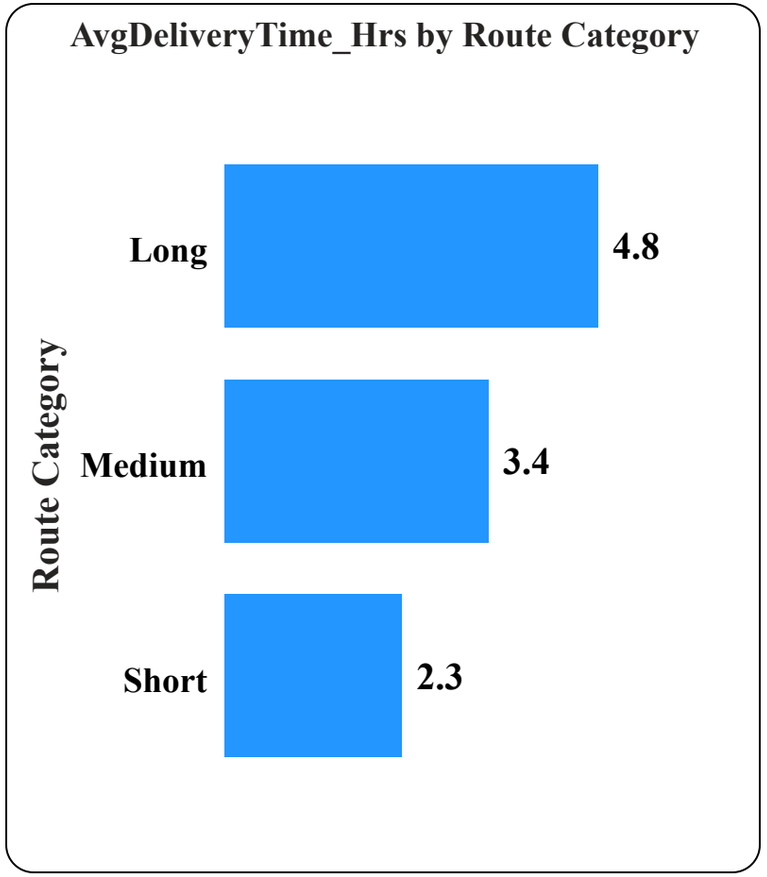


PROBLEM STATEMENT

The project aims to use data to improve delivery efficiency, optimize fleet usage, and enhance customer experience

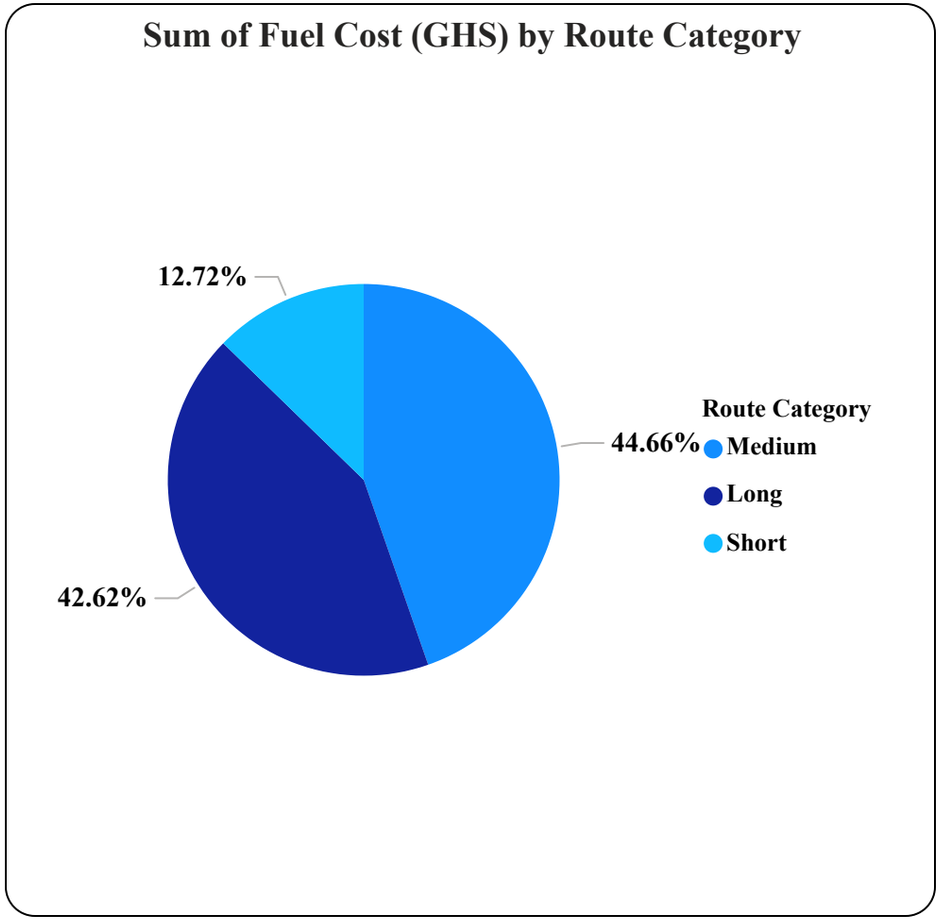
CHALLENGES

- Late deliveries
- Underutilized fleet
- Customer tracking complaints



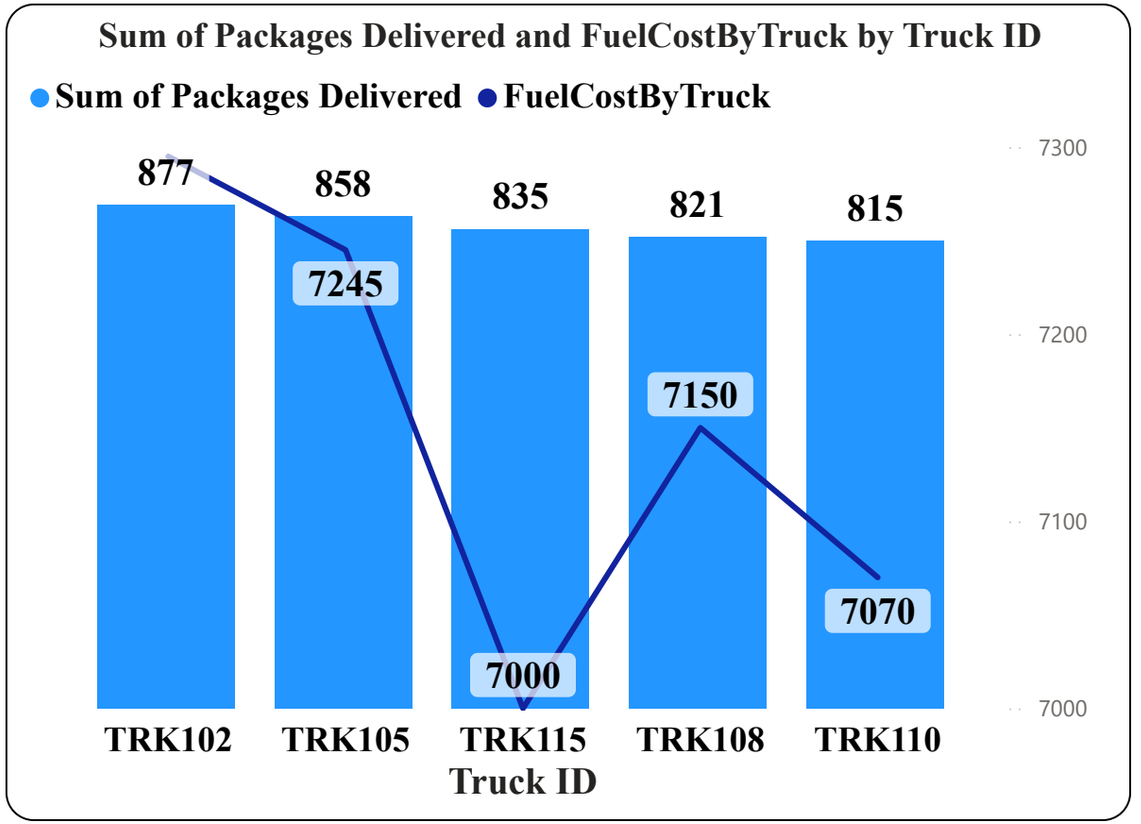
Key Insight

This chart clearly shows Long routes take more than double the time (4.8 hours) compared to Short routes (2.3 hours).



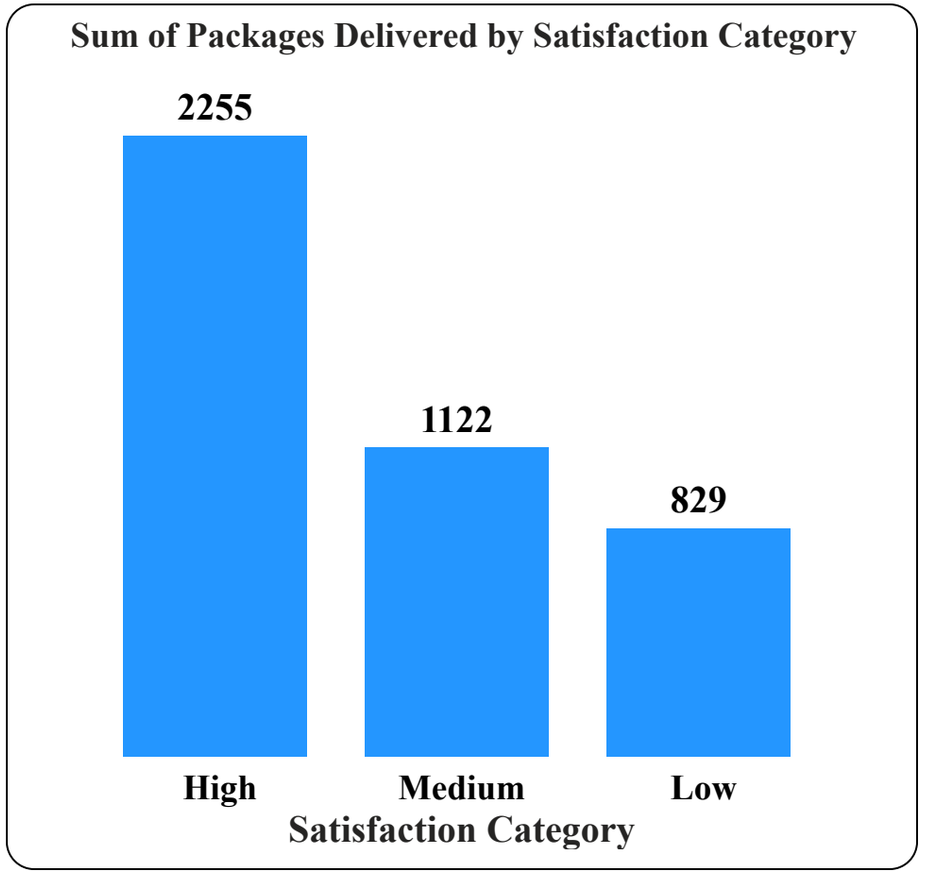
Key Insight

Medium routes consume the highest percentage of the total fuel budget (44.66%), slightly more than Long routes (42.62%). Since Medium routes take less time than Long routes, this disproportionate fuel cost suggests they can involve less efficient roads, more stop-and-go traffic, or poor route optimization compared to Long routes.



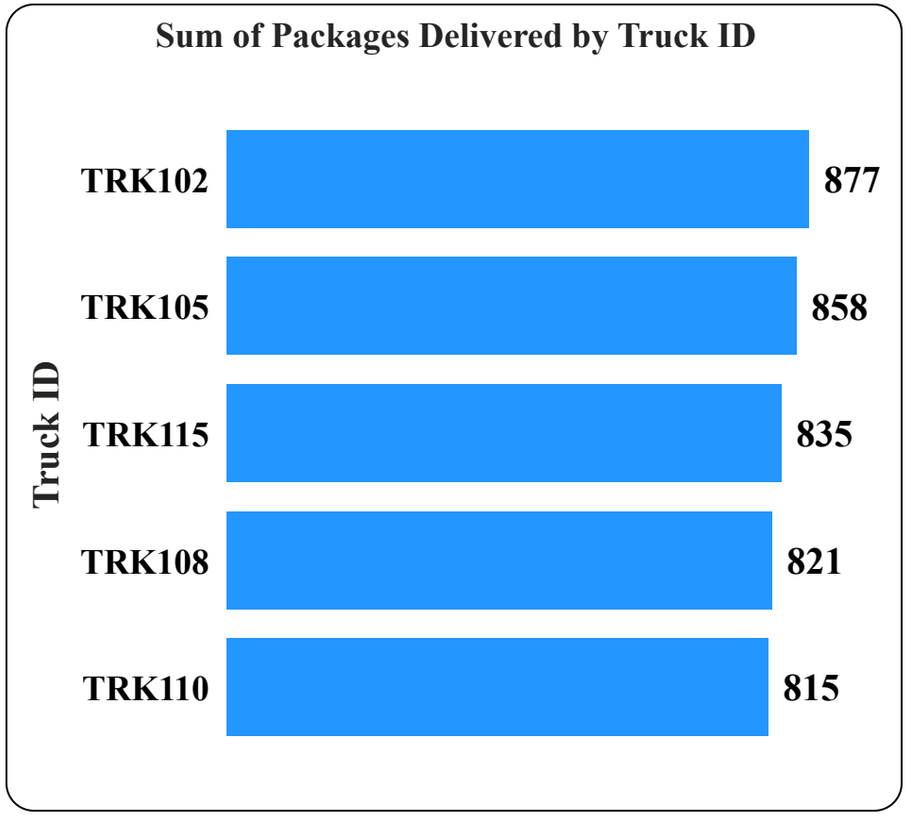
Key Insight

TRK115 shows the best fuel cost efficiency ratio. It delivers a high number of packages (835) for one of the lowest fuel costs of 7000. Conversely, TRK108 delivers slightly fewer packages (821) but consumes a high amount of fuel (7150), making it the least fuel-efficient by volume.



Key Insight

Customer satisfaction is strongly polarized towards the "High" category (2.3K packages). The packages delivered with High satisfaction are more than the combined total of the Medium (1.1K) and Low (0.8K) categories, suggesting the company is effectively satisfying the majority of its volume. However there is still a significant number of people who are not satisfied.



Key Insight

The workload is evenly distributed among the top trucks, with TRK102 delivering the most packages (877). The difference between the highest and lowest-performing truck is relatively small (62 packages), indicating a balanced operational plan.

RECOMMENDATION

Optimization Delivery Scheduling

- **Action: Prioritize and Redesign Long Routes.** Analyze these routes for optimization opportunities and schedule them during off-peak traffic hours to reduce time and fuel burn.
- **Tool Suggestion: Google Cloud Fleet Routing API**

Fleet Utilization

- **Action: Balance Cost, Not Just Volume.** Assign trucks based on their fuel cost per KM. The most efficient trucks should be prioritized for the expensive Long Routes.
- **Tool Suggestion: Samsara**, **or Geotab**.

Enhancement of Customer Experience with Tracking

- **Action: Implement Proactive, Tiered Tracking.** For Long Routes, send more frequent, automated update. This manages expectations and reduces anxiety.