Logistics Dashboard Project Report

# 📌 Project Overview

This project focuses on analyzing and visualizing logistics operations data using Power BI. The dataset includes weekly trip records, driver information, revenue, expenses, and fuel costs. The goal is to track performance, understand trends, and support operational decisions with a dynamic dashboard.

# 📂 Dataset Description

The dataset contains the following key columns:

- Week No. – Week of the operation.

- Pick Up & Delivery Dates – Timeframe for each trip.

- Load Type – Indicates if the trip is One-way or Round-trip.

- Driver & Load No. – Identifies the person and specific load.

- Trip, Zip, Trip\_1, Zip\_2 – Route and location info.

- Gross Pay & Driver Pay – Revenue and driver’s compensation.

- Trip Miles & DH (Deadhead) – Distance covered, including empty mileage.

- Total Trip Miles – Sum of Trip Miles and DH.

- Rate Per Mile (on GP) – Gross pay divided by trip mileage.

- Projected & Actual Fuel Cost – Estimations vs real expense.

- Repairs & Other Operational Expenses – Maintenance and miscellaneous costs.

# 🧹 Data Cleaning

The data was cleaned in Power BI using Power Query:

- Removed duplicates and nulls.

- Standardized date formats.

- Converted numeric fields for consistency.

- Ensured proper data types for analysis.

# 🧮 DAX Calculations

To support analysis, the following DAX measures were created:

- Total Expenses = SUM of actual fuel cost, repairs, and other expenses.

- Profit = Gross Pay - Total Expenses - Driver Pay.

- Rate Per Mile = Gross Pay / Total Trip Miles.

- Total Revenue = SUM of Gross Pay.

# 📊 Dashboard Design

The dashboard includes:

- Weekly revenue and expenses trends.

- Driver-specific performance.

- Comparison of projected vs actual fuel cost.

- Trip type breakdown (One-way vs Round-trip).

- Profit and Rate Per Mile visualizations.

# 📈 Insights

- Weeks with high deadhead mileage often have lower profit.

- Round trips tend to be more profitable per mile.

- Some drivers consistently generate more revenue, suggesting optimization opportunities.

- Fuel cost estimation was mostly close to actuals, showing reliable planning.

# 🧾 Project Deliverables

- ✅ Power BI dashboard (visual summary of operations).

- ✅ Word report (project documentation).

- ✅ Screenshot of dashboard for GitHub preview.

# 📎 Files in this Repository

- dashboard.png – Screenshot of Power BI dashboard.

- logistics\_report.docx – This report.

- logistics\_dashboard.pbix – Power BI file.

- logistics\_raw\_data.csv – Cleaned dataset (if included).

Created by Bolu, 2025.