# **UBER TRIP ANALYSIS PROJECT**

## **PROJECT REPORT - INSIGHTS**

# **Overview Insights**

#### Booking & Revenue Trends

- Total bookings show steady growth during weekends and holidays.
- Booking value is highest during evening hours (3–7 PM).
- Average booking value is higher for night trips and longer distances.
- Uber Pay is the most used payment method (~70%), followed by Cash and Amazon Pay.
- Night trips tend to have longer durations and higher values than day trips.

## Trip Efficiency & Distance

- Average trip distance: 3 Miles
- Average trip time: 16 minutes
- Farthest recorded trip: Pickup: Lowest East Side → DropOff: Crown Heights North (144.1 Miles)
- Short trips are most frequent in central business areas.

#### Vehicle Type Analysis

- UberX generates the highest average booking value
- UberX lead in total bookings, followed by Uber Comfort
- Compact cars are mostly used for short-distance, low-value trips

## **Time-Based Insights**

#### Booking Trends by Time of Day

- Peak demand observed during:
  - Morning rush (7 9 AM)
  - Evening commute (4 7 PM)
- Lowest activity between 2 4 AM

## Bookings by Day of Week

- Highest bookings on Saturdays and Sundays
- Weekdays show a regular pattern of commuter traffic
- Lowest bookings on Fridays

#### **Hourly Heatmap Observations**

- High concentration of bookings:
  - Weekdays: 7 AM 6 PM
  - Weekends: 12 PM 5 PM
- Late-night trips peak on Saturdays & Sundays

# **Location-Based Insights**

### Top 5 Pickup Locations

- Yorkville West, Sutton Place/Turtle Bay North, NV
- High traffic in business zones and airports

Suggests high rideshare demand during business hours

### Farthest Trips

• Longest distance trips tend to originate from suburbs to city centers or airports

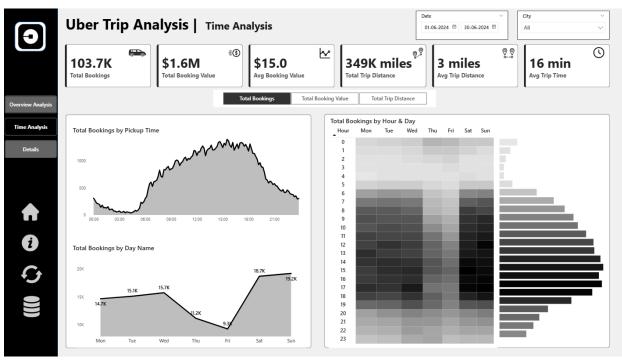
## **Strategic Recommendations**

Based on the insights, here are key action points:

- Boost driver availability in top pickup zones during peak hours
- Introduce incentives for wallet-based payments to reduce processing costs
- Allocate vehicle types based on location preferences (e.g., UberX near airports)
- Dynamic pricing models should focus on weekend evenings and weekday rush hours
- Promote underused zones with discounts to spread trip demand

#### Screenshots of the Dashboards:







# Uber Trip Analysis | Details





| Trip ID | Pickup Date  | Pickup Hour | Vehicle      | Payment_type | No. of Passengers | Trip Distance | Booking Value | Location                      | Total Bookings |
|---------|--------------|-------------|--------------|--------------|-------------------|---------------|---------------|-------------------------------|----------------|
| 1       | 1 June, 2024 | 00:42:50    | UberX        | Uber Pay     | 1                 | 5.60          | \$21.5        | East Village                  | 1.0            |
| 2       | 1 June, 2024 | 00:06:29    | Uber Black   | Cash         | 1                 | 1.72          | \$8.0         | Lincoln Square East           | 1.0            |
| 3       | 1 June, 2024 | 00:08:05    | Uber Black   | Cash         | 1                 | 3.41          | \$13.0        | Sutton Place/Turtle Bay North | 1.0            |
| 4       | 1 June, 2024 | 00:28:20    | UberX        | Cash         | 1                 | 1.81          | \$9.0         | Prospect-Lefferts Gardens     | 1.0            |
| 5       | 1 June, 2024 | 00:38:05    | Uber Black   | Cash         | 1                 | 1.89          | \$8.0         | Garment District              | 1.0            |
| 6       | 1 June, 2024 | 00:06:00    | UberX        | Cash         | 6                 | 3.29          | \$14.0        | Central Harlem                | 1.0            |
| 7       | 1 June, 2024 | 00:40:41    | UberX        | Cash         | 2                 | 2.05          | \$8.5         | Lincoln Square East           | 1.0            |
| 8       | 1 June, 2024 | 00:32:01    | Uber Comfort | Cash         | 2                 | 3.54          | \$12.5        | Clinton East                  | 1.0            |
| 9       | 1 June, 2024 | 00:20:27    | Uber Green   | Cash         | 1                 | 1.10          | \$5.5         | Clinton East                  | 1.0            |
| 10      | 1 June, 2024 | 00:54:40    | UberX        | Uber Pay     | 2                 | 1.90          | \$11.6        | Lenox Hill East               | 1.0            |
| 11      | 1 June, 2024 | 00:18:51    | UberXL       | Uber Pay     | 1                 | 6.66          | \$28.5        | Clinton East                  | 1.0            |
| 12      | 1 June, 2024 | 00:17:18    | Uber Comfort | Uber Pay     | 2                 | 13.12         | \$36.5        | Kips Bay                      | 1.0            |
| 13      | 1 June, 2024 | 00:00:31    | Uber Green   | Cash         | 1                 | 12.59         | \$37.0        | JFK Airport                   | 1.0            |
| 14      | 1 June, 2024 | 00:21:51    | UberXL       | Cash         | 1                 | 1.10          | \$5.5         | Clinton East                  | 1.0            |
| 15      | 1 June, 2024 | 00:29:31    | UberX        | Cash         | 1                 | 9.00          | \$27.0        | Morningside Heights           | 1.0            |
| 16      | 1 June, 2024 | 00:46:55    | Uber Black   | Uber Pay     | 1                 | 2.12          | \$10.4        | Kips Bay                      | 1.0            |
| 17      | 1 June, 2024 | 00:46:26    | UberXL       | Uber Pay     | 1                 | 3.00          | \$13.0        | Midtown North                 | 1.0            |
| 18      | 1 June, 2024 | 00:14:47    | Uber Comfort | Uber Pay     | 1                 | 3.10          | \$14.6        | Greenwich Village South       | 1.0            |
| 19      | 1 June, 2024 | 00:42:52    | UberXL       | Uber Pay     | 1                 | 5.63          | \$21.3        | East Williamsburg             | 1.0            |
| 20      | 1 June, 2024 | 00:20:49    | Uber Green   | Uber Pay     | 1                 | 1.53          | \$8.6         | Clinton East                  | 1.0            |
| 21      | 1 June, 2024 | 00:44:00    | Uber Comfort | Cash         | 1                 | 1.70          | \$8.5         | Fort Greene                   | 1.0            |
| 22      | 1 June, 2024 | 00:04:52    | UberXL       | Uber Pay     | 1                 | 5.80          | \$25.5        | Penn Station/Madison Sq West  | 1.0            |
| 23      | 1 June, 2024 | 00:50:26    | Uber Comfort | Uber Pay     | 1                 | 2.50          | \$10.5        | Penn Station/Madison Sq West  | 1.0            |
| 24      | 1 June, 2024 | 00:03:50    | Uber Comfort | Uber Pay     | 1                 | 4.59          | \$21.2        | Clinton East                  | 1.0            |
| 26      | 1 June, 2024 | 00:02:46    | UberX        | Cash         | 1                 | 1.08          | \$7.0         | East Village                  | 1.0            |
| Total   | I            |             |              |              | 146478            | 3,48,933,81   | \$15.53,672.8 |                               | 103728.        |