

Solution Proposal Document

Third-Party Ride Booking Fare Transparency Enhancement

1. Project Overview

Project Title: Third-Party Ride Booking Transparency and Payment Safeguard Enhancement

Domain: Ride-Hailing / Mobility Platform

Project Type: Customer Experience Optimization and Payment Transparency Improvement

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2. Background

Ride-hailing platforms frequently offer promotional discounts to attract users. However, when rides are booked for another passenger, communication gaps arise regarding fare visibility and payment responsibility.

In such cases, passengers may remain unaware of the discounted fare while drivers may rely on base fare values, leading to payment disputes, customer dissatisfaction, and increased refund requests.

This document proposes a comprehensive solution to improve fare transparency, stakeholder communication, and payment validation during third-party ride bookings.

3. Problem Statement

When a booking user schedules a ride for another passenger and applies promotional discounts:

- Fare information is visible only to the booking user
- Passenger lacks clarity regarding payable amount
- Drivers may collect incorrect fare
- Cash payment increases risk of manual payment override
- Platform experiences increased customer complaints and operational costs.

4. Business Objectives

The proposed solution aims to:

- Improve fare transparency across stakeholders
- Reduce payment disputes and refund requests
- Increase customer trust and platform reliability
- Improve payment accuracy
- Enhance user experience in third-party bookings

5. Proposed Solution Overview

Introduce a **Third-Party Ride Transparency Module** that standardizes passenger verification, enables real-time fare visibility across stakeholders, and enforces payment accountability in third-party ride bookings. The end-to-end workflow of the proposed module is illustrated in Section 7.7.

6. Solution Scope

In Scope:

- Passenger verification system
- Multi-party fare visibility
- Notification redundancy system
- Payment safeguard mechanism
- Fare confirmation workflow

Out of Scope:

- Payment gateway infrastructure redesign
- Driver compensation policy modification

7. Functional Solution Design

7.1 Booking Type Selection

When initiating a ride booking, users will be provided with:

- "Book Ride for Myself"
- "Book Ride for Someone Else"

Selecting third-party booking triggers the Passenger Verification and Multi-Stakeholder Fare Transparency workflow described in Sections 7.2 through 7.5.

7.2 Passenger Information Capture

Mandatory Passenger Details:

- Passenger Name
- Phone Number
- Optional Email Address
- OTP Verification

Additional Capability:

Passenger profiles will be stored for future bookings to reduce user effort and improve booking speed.

7.2.1 Passenger Detail Entry Interface (UX Specification)

This interface is triggered when a booking user selects the "Book Ride for Someone Else" option during ride initiation. The screen acts as the primary passenger verification and communication enablement layer.

The Passenger Detail Entry Screen enables the booking user to provide verified passenger information when selecting the third-party ride booking option. This screen ensures accurate communication, fare transparency, and payment accountability throughout the ride lifecycle.

Screen Objectives:

- Capture verified passenger identity
- Enable direct communication between platform and passenger
- Reduce fare communication gaps
- Support OTP-based passenger authentication
- Allow reusable passenger profile storage

Proposed UI Components:

Booking Type Selection Trigger: when the user selects "**Book Ride for Someone Else**", the system redirects to Passenger Detail Entry Screen.

Input Fields:

Field	Type	Mandatory	Purpose
Passenger Name	Text Field	Yes	Identifies rider
Phone Number	Numeric Input	Yes	Enables notification & OTP verification
Email Address	Text Field	Optional	Enables ride receipt & backup communication
Save Passenger Profile	Toggle Checkbox	Optional	Stores details for future bookings

Verification Mechanism

- OTP sent to passenger phone number
- Ride booking proceeds only after successful OTP validation
- Prevents incorrect passenger entry and misuse

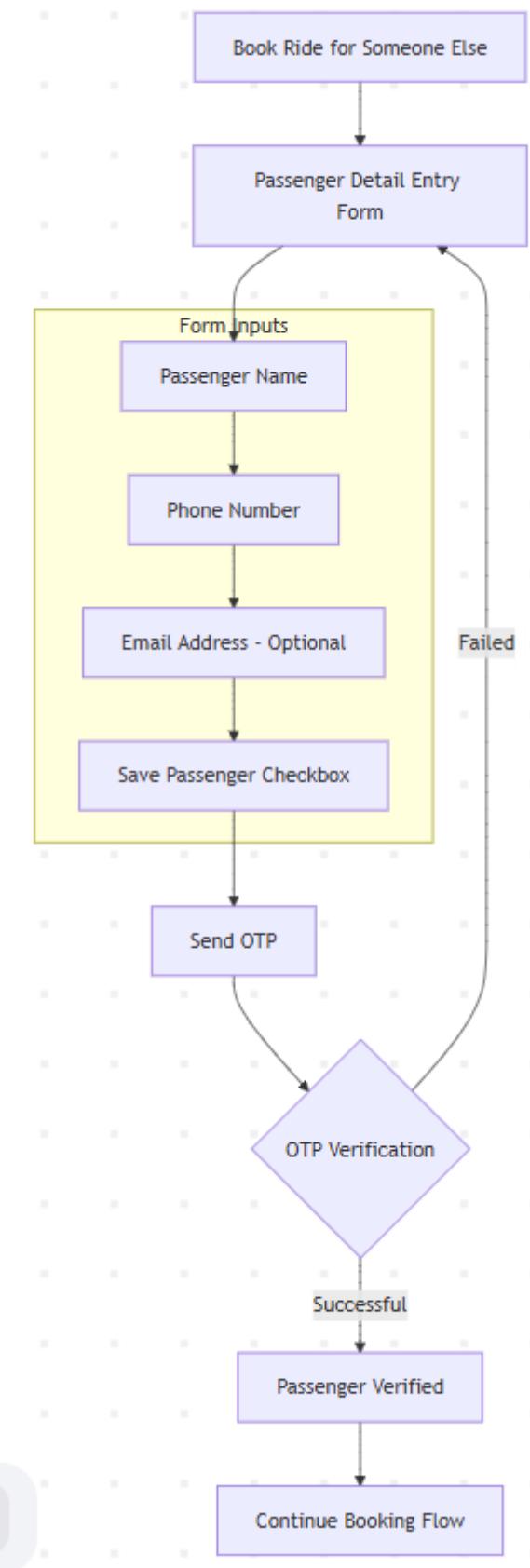
UX Enhancements

- Auto-suggestion of previously saved passengers
- Contact list integration (optional future enhancement)
- Clear messaging explaining why passenger details are required

Expected System Behaviour

1. Booking user enters passenger details
2. OTP is triggered to passenger phone number
3. Passenger confirms OTP
4. Passenger profile stored (if enabled)
5. Booking flow proceeds to fare calculation

Sample Wireframe:



7.3 Fare Transparency Mechanism

The platform will display complete fare details to all stakeholders.

Booker Receives:

- Final payable fare
- Promotional discount breakdown
- Ride tracking updates
- Payment confirmation alerts

Passenger Receives:

- Final payable fare
- Ride tracking notifications
- Payment reminder notifications

Driver Receives:

- Base fare
- Discount applied
- Final payable fare
- Payment confirmation instructions

7.4 Notification Redundancy System

To ensure communication reliability:

Primary Notification:

- In-App Notification

Secondary Notification:

- SMS Notification fallback for passengers without app access or internet connectivity

7.5 Payment Safeguard Mechanism

Primary Payment Flow:

Passenger completes ride payment through confirmed fare.

Backup Payment Flow:

If passenger fails or refuses payment:

- Booker receives payment backup option
- Platform ensures ride closure without revenue loss

7.6 Ride Completion Confirmation

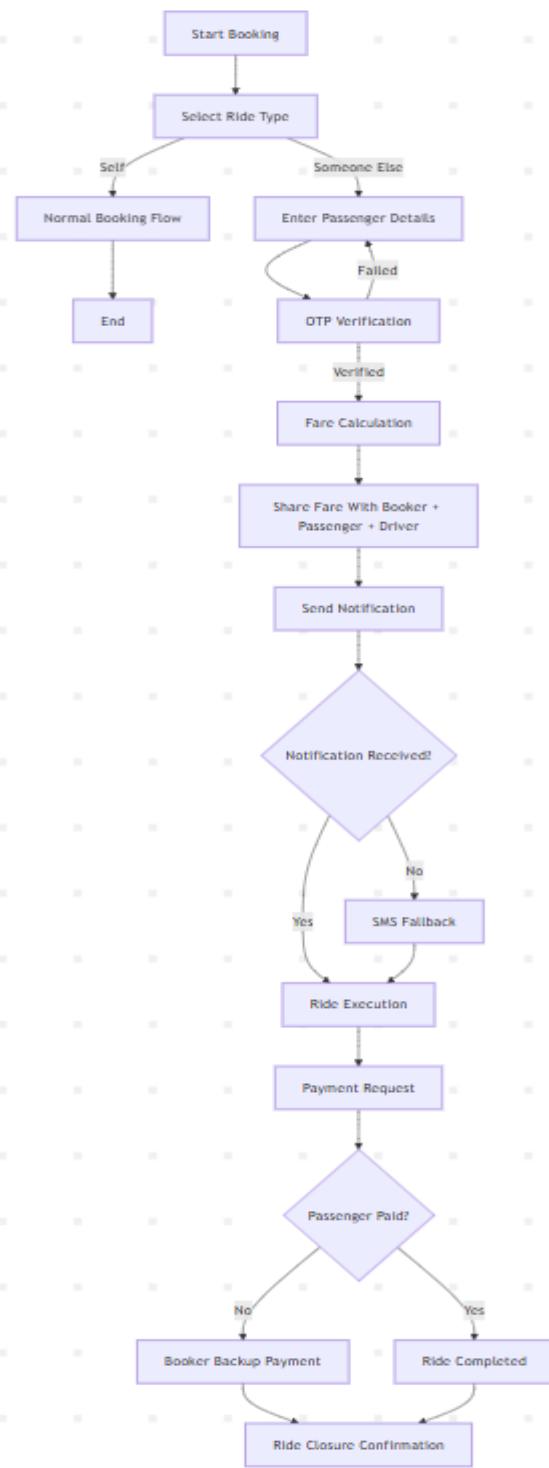
Upon ride completion:

- Payment confirmation sent to both booker and passenger
- System verifies payment completion before ride closure

7.7 Booking & Payment Workflow Diagram

This workflow diagram illustrates the complete lifecycle of third-party ride booking, including passenger verification, multi-stakeholder fare visibility, notification fallback handling, and payment safeguard implementation.

The diagram demonstrates how the platform ensures transparency, communication reliability, and payment accountability across booking user, passenger, and driver interactions.



Workflow Highlights

- Differentiates between self-booking and third-party booking flows
- Introduces mandatory passenger verification
- Ensures fare transparency across all stakeholders

- Implements notification redundancy through SMS fallback
- Provides payment safeguard through booker backup payment option
- Confirms ride closure only after successful payment verification

8. Fare Breakdown Transparency

The platform will display detailed fare structure to build trust:

- Base Fare
- Promotional Discount
- Final Payable Fare

Providing fare clarity reduces driver confusion and customer disputes.

9. Cross-Platform Benchmark Reference

This solution draws inspiration from food delivery platforms such as Swiggy, which successfully implements:

- Multi-recipient delivery tracking
- Receiver information capture
- Shared order and delivery notifications

Adopting similar design patterns improves user trust and communication efficiency.

10. Edge Case Handling

Scenario	System Response
Passenger lacks smartphone access	SMS notification fallback
Incorrect passenger details	OTP verification required
Passenger refuses payment	Booker backup payment enabled
Driver disputes promotional discount	Driver app displays complete fare breakdown
Notification delivery failure	Automated retry notification mechanism

11. Business Benefits

Implementation of the proposed solution is expected to:

- Reduce fare disputes
- Lower refund processing cost
- Improve customer trust
- Increase repeat platform usage
- Improve third-party booking reliability
- Reduce customer support workload

12. Operational Benefits

- Improved payment compliance

- Reduced manual payment negotiations
- Better driver-passenger coordination
- Increased service reliability

13. Success Metrics

KPI	Expected Outcome
Fare dispute rate	Reduction
Refund request volume	Reduction
Payment accuracy	Improvement
Customer satisfaction rating	Improvement
Third-party booking success rate	Increase

14. Implementation Considerations

Technical Dependencies:

- Driver application update deployment
- SMS service provider reliability
- Notification infrastructure stability

Operational Dependencies:

- Driver training and awareness programs
- Customer communication campaigns

15. Non-Functional Requirements

Performance Requirements

- OTP delivery latency should not exceed 5 seconds
- Fare display synchronization across stakeholders should occur in real time

Reliability Requirements

- Notification delivery success rate target: 98%
- SMS fallback must trigger automatically after app notification failure

Security Requirements

- Passenger data must comply with data privacy regulations
- OTP authentication must prevent unauthorized ride booking misuse

Usability Requirements

- Passenger detail entry should be completable within 30 seconds
- Saved passenger profile retrieval should reduce booking friction

16. Risk Analysis

Risk	Impact	Mitigation
Driver resistance to system control	Medium	Training and communication programs
Notification failure	Medium	Retry and fallback notification system
Increased booking friction	Low	Passenger profile storage to reduce repeated data entry

17. Assumptions

- Passengers have access to mobile communication channels
- Drivers follow platform fare guidelines
- Users prefer transparent pricing mechanisms

18. Strategic Business Value

The proposed feature strengthens platform trust, improves transaction transparency, and reduces operational costs, contributing to long-term customer retention and service reliability.

19. Conclusion

Introducing a Third-Party Ride Transparency Module enhances fare communication, reduces payment disputes, and improves overall user experience. By integrating passenger verification, notification redundancy, and payment safeguards, the platform can significantly improve operational efficiency and customer satisfaction.