

Affordable Car Rental System with Car Sharing

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Abstract: The car rental business is a multi-billion-dollar industry with ever-increasing competitiveness. Car rental companies must adapt dynamic pricing strategies to maximize revenues and operational efficiency. The aim of this study is to understand what pricing strategies work best for rental companies so as to achieve higher revenue for same-location pick-up and drop-off of rentals. With this goal in mind, we have modified a simulation model from a previous study to incorporate the logic for the current analysis. The analysis has been conducted with realistic customer demand inputs and a design of experiments consisting of 195 scenarios. The results show that with our improved pricing strategy, it is possible to increase revenues by more than 20 percent. It includes MYSQL and for database purpose, SQLite version 3 is used, while for the front-end HTML version-5, CSS version-3, JavaScript is used.

Keywords: Authentication ,java; JavaScript; J2ee; Jdk1.8; Eclipse j2ee; MySQL; Xampp, Security, Verifiability

INTRODUCTION

We developed this project to book a car on rent at the fare charges. In present system all booking work done manually and it takes very hard work to maintain the information of booking and cars. If you want to find which vehicle is available for booking then it takes a lot of time. It only makes the process more difficult and hard. This aim of the project is to automate the work performed in the car rental management system like generating daily bookings, records of car or cab available for booking, record of routes available, rental charges for cars for every rout, store record of the customer.

Car rental management system is a car booking software that provides a complete solution to all your day-to-day car booking office running needs. This system helps you to keep the information of Customer online. You can check your customer information any time by using this system. Cab rental management system is a unique and innovative product. Using this this you can also keep the information of number of bookings in current month or in last 6 month or in last year. This helps you to track your business and you earning in particular month or in any year. Based on this information you can take decision regarding your business development.

The car rental industry is becoming more and more important in today's society. To increase the operational profitability and availability of each class of cars at each rental location, companies employ different pricing strategies to deal with and adjust the demand. Our simulation tool enables car rental companies to input their historical data into the system and analyze the effects of different pricing policies for each car class for their specific operations. This will ultimately allow the companies to better understand their operations, so as to increase their operational efficiency and the availability of cars at each location while maintaining high customer satisfaction levels.

1. METHODOLOGIES OF PROBLEM SOLVING

- Problem Solving Methods are concerned with efficient realization of functionality. This is an important characteristics of Problem Solving Methods and should be deal with it explicitly.
- Problem Solving Methods achieve this efficiency by making assumptions about resources provided by their context (such as domain knowledge) and by assumptions about the precise definition of the task. It is important to make these assumptions explicit as it give the reason about Problem Solving Methods.
- The process of constructing Problem Solving Methods is assumption based. During this process assumptions are added that facilitate efficient operationalization of the desired functionality

LITERATURE SURVEY

Yazao Yang; Wenzhou Jin; Xiaoni Hao , In This System Large scale and networked car rental companies are emerging continuously along with the rapid development of car rental industry. In order to improve the efficiency of logistics management, it is imperative to find a method which can implement the pool segmentation assignment. According to the developing mode of car rental enterprises and distribution of car rental locations, proposed a three-tier tower structure for enterprise logistics management. A method was obtained to solve the problem of pool segmentation and regional management center choice synchronously based on the study of car rental industry development and its logistics operation characteristic. The results of a case study show that the proposed method can achieve objectives effectively.

1. SYSTEM ARCHITECTURE

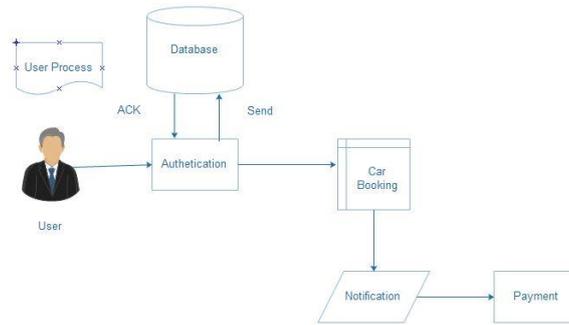


Fig -1: System Architecture Diagram

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DFD DIAGRAMS:

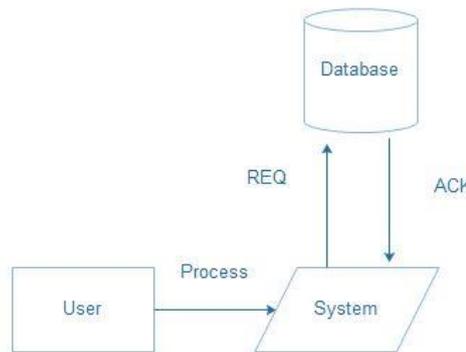


FiG: DFD Level 0

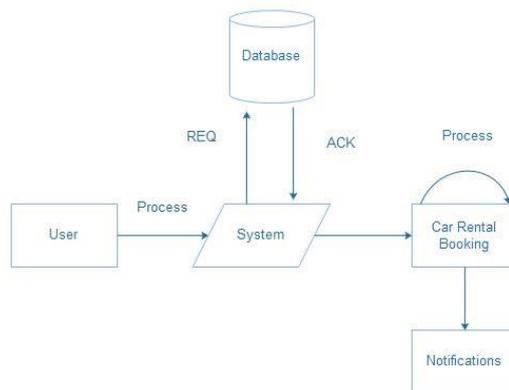
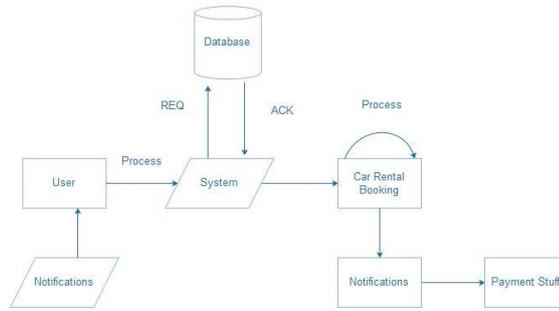


Fig: DFD Level 1

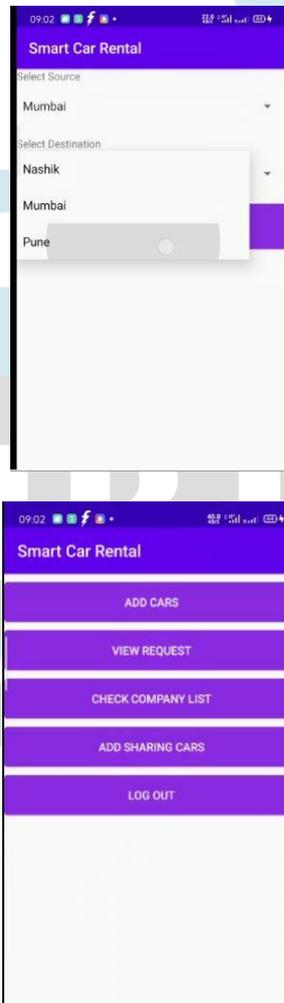


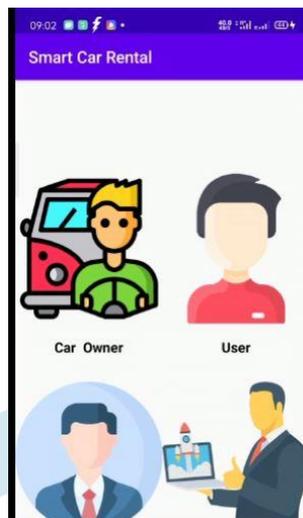
DFD Level 2

FUTURE SCOPE

1. Growth of smartphone and telecommunication system is also the reason for the growth of car rental system.
2. Money sharing options and exclusive ways to choose their car.
3. Exclusive offers, cashback, free rides and more offers make the people to turn back to the distance voice.
4. Ready To Take Risk For Customer Satisfaction.
5. Exciting Offers & Safety
6. Handy Booking System

RESULTS:





4. CONCLUSION

- Our system can be maintained for life-long purpose as the data can be edited, deleted and added if required.
- It basically aims low cost, most durable, secure, and reliable user experience.
- It is done as efficient as possible.
- Easy implementation environment.
- New effective modules can be added time to time.

REFERENCES

- [1] Y. Chen, J.S. Chou, H.M. Sun, M.H. Cho, "A novel electronic cash system with trustee-based anonymity revocation from pairing," *Electronic Commerce Research and Applications*, Jun. 2010D. Meffert,
- [2] "Bilinear Pairings in Cryptography," in Master thesis, Radboud Universiteit Nijmegen, 2009.
- [3] A. Shamir, "Identity-based cryptosystems and signature schemes," *Advances in Cryptology-Crypto '84, Lecture Notes in Computer Science*, Vol. 196, Springer-Verlag, pp. 47-53, 1984.
- [4] N. Koblitz, "Elliptic Curve Cryptosystems," *Math. Computation*, Vol. 48, pp. 203-209, 1987.
- [5] V. Miller, "Use of Elliptic Curves in Cryptography," *Advances in Cryptology-Crypto '85*, pp. 417-426, 1986.

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