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**Car Rental System**

**Functional Requirements (MoSCoW)**

1. Q1-CRS-Customer Registration

Q1-The **CRS** shall have a service for customers to create an account with their personal information.(Must have)

**Justification:** Customers must be able to create an account if they don’t have an existing one.

1. Q2-CRS-Login

Q2-The **CRS** shall have a secure login for their individual accounts. (Must have)

**Justification:** Customers need a means of logging in to access their data and account securely.

1. Q3-CRS-Booking Vehicle

Q3-The **CRS** shall have the ability to reserve a vehicle for the customer’s preferred date and time. (Must have)

**Justification:** Customers need a reliable means of booking a vehicle as that is the primary purpose of the system.

1. Q4-CRS-Vehicle management

Q4-The **CRS** shall have the ability to monitor vehicle inventory and the availability of its fleet. (Must have)

**Justification:** To keep track of available cars to assign vehicles to customers bookings accordingly.

1. Q5-CRS-Payment Service

Q5-The **CRS** shall have a payment service to pay online through a third-party service. (Must have)

**Justification:** For ease of payment simplifying the booking process.

1. Q6-CRS-Vehicle Search

Q6-The **CRS** shall have an option where the customer can search for a vehicle of the available ones. (Must have)

**Justification:** Customers need to be able to pick the vehicle they want for comfort and suitable cost.

1. Q7-CRS-Insurance Status

Q7-The **CRS** shall have the ability to track the status of each customer’s insurance (Must have)

**Justification:** Invoices will be dependent on the status of a customer's insurance.

1. Q8-CRS-Trip Package

Q8-The **CRS** shall have a variety of packages for a set number of trips of cars of a specific category. (Must have)

**Justification:** Instead of paying for each individual trip, customers can buy a large package once to save on their total cost.

1. Q9-CRS-GPS Tracking

Q9-The **CRS** shall have location tracking of all vehicles. (Must have)

**Justification:** To ensure safety of customers and minimize fraudulent activity.

1. Q10-CRS-API Incorporation

Q10-The **CRS** shall have a variety of APIs implemented. (Should have)

**Justification:** Using third party services for insurance, inventory, auditing etc.. making our system widely functional.

1. Q11-CRS-Wallet

Q11-The **CRS** shall have an electronic wallet of application specific credit. (Should have)

**Justification:** For credit unavailability, having funds in the application’s wallet will allow the continuous use of our services.

1. Q12-CRS-Maintenanance Schedules

Q12-The **CRS** shall have a maintenance schedule which customers whom have rented a specific vehicle can access. (Should have)

**Justification:** For customers to fit in their schedule for a replacement vehicle, and to return their rented car to fit the maintenance schedule.

1. Q13-CRS-Referral Program

Q13-The **CRS** shall have a referral program that rewards customers for referring others.(Could have)

**Justification:** Provides incentive for word of mouth marketing.

1. Q14-CRS-Cancel Order

Q14-The **CRS** shall have a cancel order option. (Could have)

**Justification:** Allows the user to not feel obligated and cancel their booking at any time.

1. Q15-CRS-Car Pooling

Q15-The **CRS** shall have an option where customer’s can share a vehicle with one another. (Could have)

**Justification:** Makes renting a vehicle more affordable by splitting the cost two ways.

1. Q16-CRS-Feedback

Q16-The **CRS** shall have a customer feedback option. (Could have)

**Justification:** Allows the user to leave feedback for further improvement of our system.

1. Q17-CRS-Physical Booking

Q17-The **CRS** shall have physical bookings for rental services. (Won’t have)

**Justification:** Our system is purely electronic for ease.

1. Q18-CRS-Social Media Integration

Q18-The **CRS** shall have social media integration of customers to their CRS account. (Won’t have)

**Justification:** There is no relevance for customers to link their social media accounts and their CRS account.

1. Q19-CRS-Multiple Languages

Q19-The **CRS** shall have multiple languages. (Won’t have)

**Justification:** Our system will only be in English

1. Q20-CRS-Multiple Currencies

Q20-The **CRS** shall have the option to accept multiple currencies. (Won’t have)

**Justification:** Our system will only accept EGP for payment due to economic constraints.

**Non Functional Requirements (MoSCoW)**

1. Convenience:

NF1-The **CRS** shall use a mobile application or web browser as its user interface. (Must have)

**Justification:** To allows users access from any device

1. Security:

NF2-The **CRS** shall have two factor authentication and CloudFlare management.(Must have)

**Justification:** To protect user data and website security

1. Maintainability:

NF3-The **CRS** shall employ DevOps practices.(Should have)

**Justification:** Ensure the consistent operation and improvement of our system.

1. Accessibility:

NF4: The **CRS** shall have Bluetooth availability.(Won’t have)

**Justification:** No reason for Bluetooth connection in our system

1. Locality:

NF5: The **CRS** shall have a local web-server. (Could have)

**Justification:** Could have an extra server for reduced costs.