**CAR RENTAL SYSTEM PROBLEM STATEMENT**

The company Car Rental Solutions (CRS) aims to offer its car rental services over the Internet. Consequently, we need to develop a web platform where customers can rent cars online. CRS offers a diverse range of cars, from compact cars to luxury sedans to SUVs and vans.

Currently, CRS offers their services through a physical presence at airports, train stations, and city centers, hoping that with an online platform, they can increase the number of customers, the number of rentals and improve the efficiency of the business process.

It is crucial that the online platform is highly user-friendly. It should be effortless for customers to find cars or browse through the different categories of cars. For instance, it should be possible to first select the category "Sedan," and then we should see all subcategories of Sedan cars. We can then select the subcategory "Luxury Sedans," and then we should see all the available Luxury Sedans. If we have chosen a car, then we can add it to the rental cart. We should then be able to view the contents of the rental cart. Customer should be logged in, in order to successfully complete the checkout. On checkout, customer should specify the pickup station for the car.

Checking out the rental cart should also be very user-friendly. The system should store the customer data so that customers have to enter their personal data and payment information only once. When a customer confirms a booking, the system will automatically send a booking confirmation by email to the customer. All bookings must be paid by credit or debit card.

Customers should be able to place a "car review" for a car that they rented. These car reviews should be displayed in the detailed description of a particular car.

Customer should be able to cancel a car reservation before the car is checked out. The customer will be charges a cancellation fee which is 20% of the car rental fee. This means the customer will be refunded 80% of the rental fee.

The platform should be managed by CRS Manager, who can add and remove cars, update car availability, manage pickup locations, and perform all the standard management functions. Car reservations, check-in and check-outs should be managed by the CRS Customer support staff.  
  
In addition, the application should generate reports for management support, including reports on car reservations, check-ins and check-outs, cars inventory, financial reports, customer reports.