DSA Innovative Assignment

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AIM: CAR RENTAL MANAGEMENT SYSTEM

Project Definition: We will be creating "Vehicle Rental Service" program, which is a menu driven c program for vehicle sellers and is intended to be used by vehicle buyers to view or find available vehicles. some of the menu options include, view all vehicles, view vehicles of specific company, view vehicle of some category, view vehicle of some color etc.

Project Description: We will be creating c language structure named "vehicle" whose fields will be model, price, manufacturing date, company, category, color etc. we plan to use linked list to store vehicle information entered by the sellers. we will be writing functions to perform specific task on the original linked list.

Output:

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Windows PowerShell
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Install the latest PowerShell for new features and improvements! https://aka.ms/PSWindows

PS D:\Code\VS Code> cd "d:\Code\VS Code\DSA\"; if ($?) { gcc DSA_Innovataive_Assignment.c -o DSA_Innovataive_Assignment }; if ($?) { .\DSA_Innovataive_Assignment }; if ($?) { .\DSA_Innovataive_Assi
```

Enter details of your car:
Insert brand of vehicle: Honda
Enter name of car: Amaze
Enter type of car: Sedan
Enter color of your car: White
Enter manufacturing year of your car: 2015
Enter rent for your car: 1500
Your car has been accepted for rental service.

1. You want to add your car to rental service:
2. Search a car:
3. Rent a car
4. See all available cars:
5. Return a car
6. exit:
Enter your choice:

Enter details of your car:
Insert brand of vehicle: Tata
Enter name of car: Nexon
Enter type of car: Sucompact
Enter color of your car: Black
Enter manufacturing year of your car: 2019
Enter rent for your car: 1000
Your car has been accepted for rental service.

1. You want to add your car to rental service:
2. Search a car:
3. Rent a car
4. See all available cars:
5. Return a car
6. exit:
Enter your choice:

Enter details of your car:
Insert brand of vehicle: Suzuki
Enter name of car: Ciaz
Enter type of car: Sedan
Enter color of your car: Blue
Enter manufacturing year of your car: 2016
Enter rent for your car: 2000
Your car has been accepted for rental service.

1. You want to add your car to rental service:
2. Search a car:
3. Rent a car
4. See all available cars:
5. Return a car
6. exit:
Enter your choice:

```
: Honda
: Amaze
: Sedan
: White
 CAR BRAND
                                                             Search car on the basis of:
MODEL NAME
CAR TYPE
                                                             1. BRAND
CAR COLOR
 CAR ID
                                                            4. YEAR
 RENT(In Rs) : 1500.00
                                                             5. Type
MANUFACTURING YEAR: 2015
                                                             6. Exit
                                                             Enter choice: 3
                                                             Enter the starting range: 1500
                                                             Enter the ending range: 2000
MODEL NAME : Nexon
CAR TYPE : Sucompact
CAR COLOR : Black
CAR ID : 2
                                                            CAR BRAND : Honda

MODEL NAME : Amaze

CAR TYPE : Sedan

CAR COLOR : White

CAR ID : 1

RENT(In Rs) : 1500.00
                                                          CAR TYPE
CAR COLOR
CAR ID : 2
RENT(In Rs) : 1000.00
MANUFACTURING YEAR: 2019
                                                             MANUFACTURING YEAR: 2015
CAR BRAND : Suzuki
MODEL NAME : Ciaz
CAR TYPE : Sedan
CAR COLOR : Blue
CAR ID
                                                            CAR BRAND : Suzuki
MODEL NAME : Ciaz
CAR TYPE : Sedan
CAR COLOR : Blue
CAR ID : 3
RENT(In Rs) : 2000.00
                                                             CAR ID : 3
RENT(In Rs) : 2000.00
                                                            CAR ID
MANUFACTURING YEAR: 2016
                                                             MANUFACTURING YEAR: 2016
                                                             Search car on the basis of:
                                                             1. BRAND

    You want to add your car to rental service:

                                                             2. COLOR
 2. Search a car:
                                                             4. YEAR
 4. See all available cars:
                                                             5. Type
 5. Return a car
                                                             6. Exit
 6. exit:
                                                             Enter choice:
 Enter your choice:
```

Do you know the id of car? yes

Enter the id of car: 3
CAR BRAND: Suzuki
MODEL NAME: Ciaz
CAR COLOR: Blue
RENT(In Rs): 2000.00
MANUFACTURING YEAR: 2016
You want to rent this car:

Enter your decision here(yes/no): yes Enter your first name: Abhishek Enter your middle name: Amitabh Enter your last name: Bacchan Enter no. of days to book car: 10

-----RECEIPT-----

NAME : Abhishek Amitabh Bacchan

No. of days : 10

AMOUNT : 10 x 2000.00

: 20000.00 : Suzuki Ciaz

CAR TYPE : Sedan

Car booked!!!

CAR

1. You want to add your car to rental service:

2. Search a car:

3. Rent a car

4. See all available cars:

5. Return a car

6. exit:

Enter your choice:

CAR BRAND : Honda
MODEL NAME : Amaze
CAR TYPE : Sedan
CAR COLOR : White
CAR ID : 1

RENT(In Rs) : 1500.00 MANUFACTURING YEAR : 2015

CAR BRAND : Tata
MODEL NAME : Nexon
CAR TYPE : Sucompact
CAR COLOR : Black
CAR ID : 2

RENT(In Rs) : 1000.00 MANUFACTURING YEAR : 2019

1. You want to add your car to rental service:

2. Search a car:

Rent a car

4. See all available cars:

5. Return a car

6. exit:

Enter your choice:

```
Enter the id of car: 3
Details of car is as follows:
             : Suzuki
: Ciaz
CAR BRAND
MODEL NAME
CAR TYPE
CAR COLOR
CAR ID
               : 2000.00
RENT(In Rs)
MANUFACTURING YEAR: 2016
1. You want to add your car to rental service:
2. Search a car:
4. See all available cars:
5. Return a car
6. exit:
Enter your choice:
 CAR BRAND
                      : Honda
 MODEL NAME
                    : Sedan
: White
: 1
CAR COLOR
 RENT(In Rs)
 MANUFACTURING YEAR: 2015
                : Tata
: Nexon
 CAR BRAND
 MODEL NAME
                     : Sucompact : Black
 CAR TYPE
 RENT(In Rs) : 1000.00
MANUFACTURING YEAR : 2019
              : Suzuki
 CAR BRAND
 MODEL NAME
 CAR TYPE
 CAR ID : 3
RENT(In Rs) : 2000.00
MANUFACTURING YEAR : 2016

    You want to add your car to rental service:
    Search a car:

 Enter your choice:
```