BEGIN

From datetime import date, timedelta

DEFINE main\_menu()

Display date.today

Display "---Who are you?--- "

Display "[1]Customer"

Display "[2]Admin"

Display " [3]Exit"

Display "Please enter your option"

Read option

DOWHILE True

If option == "1" THEN

customer\_menu()

Break

ENDIF

If option == "2" THEN

login\_admin()

Break

ENDIF

If option == "3" THEN

quit()

ENDIF

Else

Display "Please enter your option: "

read option

ENDDO

END main\_menu()

DEFINE read\_admin\_data()

admin\_data = open("admin.txt","r")

Read admin\_data

lines = admin\_data.readlines()

Read lines

admin\_id = []

admin\_pass = []

LOOP admin FROM lines[0] TO lines[-1] STEP 1

admin\_list = admin.split(" ")

admin\_id.append(admin\_list[0])

admin\_pass.append(admin\_list[1].replace("\n",""))

NEXT admin

ENDLOOP

return admin\_id, admin\_pass

END read\_admin\_data()

DEFINE read\_history\_data()

history\_data = open("history.txt","r")

Read history\_data

lines = history\_data.readlines()

Read lines

ctm\_history\_id = []

car\_history\_id = []

car\_history\_name = []

rental\_duration = []

history\_year = []

history\_month = []

history\_day = []

price\_paid = []

LOOP history FROM lines[0] TO lines[-1] STEP 1

history\_list =history.split(" ")

ctm\_history\_id.append(history\_list[0])

        car\_history\_id.append(history\_list[1])

        car\_history\_name.append(history\_list[2])

        rental\_duration.append(history\_list[3])

        history\_year.append(history\_list[4])

        history\_month.append(history\_list[5])

        history\_day.append(history\_list[6])

        price\_paid.append(history\_list[7].replace("\n", ""))

NEXT history

ENDLOOP

Return ctm\_history\_id, car\_history\_id, car\_history\_name, car\_history\_name, rental\_duration, history\_year, history\_month, history\_day, price\_paid

END read\_history\_data()

DEFINE read\_customer\_data()

customer\_data = open("customer.txt","r")

Read customer\_data

lines = customer\_data.readlines()

Read lines

customer \_id = []

customer\_pass = []

customer\_name = []

booked\_car\_name = []

customer\_payment = []

customer\_duration = []

customer\_card = []

LOOP customer FROM lines[0] TO lines[-1] STEP 1

customer\_list = customer.split(",")

        customer\_id.append(customer\_list[0])

        customer\_pass.append(customer\_list[1])

        customer\_name.append(customer\_list[2])

        booked\_car\_name.append(customer\_list[3])

        customer\_payment.append(customer\_list[4])

        customer\_duration.append(customer\_list[5])

        customer\_card.append(customer\_list[6].replace("\n", ""))

NEXT customer

ENDLOOP

return customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card

END read\_customer\_data()

DEFINE customer\_menu()

Display "-----Welcome To The Customer Menu?-----

Display "[1]Log in as a Customer"

Display "[2]Register as a New Customer"

Display "[3]View all Cars Available for rent"

Display "[4]Back to Main Menu"

Display "Please enter your option"

Read option2

DOWHILE True

IF (option2 == "1") THEN

login\_customer()

break

IF (option2 == "2") THEN

new\_customer()

break

IF (option2 == "3") THEN

view\_car\_available()

break

IF (option2 == "4") THEN

main\_menu()

break

ELSE

Display "Please Enter Your Option"

read option2

ENDIF

ENDDO

END customer\_menu()

DEFINE new\_customer()  
 customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card = read\_customer\_data()

f = open("customer.txt", "a+")

Read f

customer\_data = f.readlines()

Read customer\_data

new\_ctm\_id = ("ctm"+str(len(customer\_id)+1))

Read new\_ctm\_id

Display "Your Name: "

Read new\_ctm\_name

Display "Your Password: "

Read new\_ctm\_pass

Try

Display "Your Credit Card Number: "

Read INT(new\_ctm\_card)

Except ValueError

Display "ERROR"

Display ">>> Please enter a valid credit card number without characters or decimals"

new\_customer()

customer\_data.append(new\_ctm\_id + ",")

    customer\_data.append(new\_ctm\_pass + ",")

    customer\_data.append(new\_ctm\_name.lower() + ",")

customer data.append("none,none,none,")

customer\_data.append(str(new\_ctm\_card) + "\n")

f.writelines(customer\_data)

f.close()

Display "Your New Customer ID is", new\_ctm\_id, "\n"

Display "Register is successful! "

Display ">>>Press Enter to return to Customer Menu"

Read x

customer\_menu()

END new\_customer()

DEFINE view\_car\_available(INTEGER number)

READ number

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

Display "\n---All Record of Cars Available for Rent---\n"

LOOP i FROM 0 TO len(car\_id) STEP 1

IF (car\_available[i] == "yes") THEN

Display "Car ID: ", car\_id[I ]

Display "Car Name: ", car\_name[i])

Display "--Car Details--\n", (car\_details[i].replace(" ","\n")).title(), "\n"

ENDIF

NEXT i

ENDLOOP

IF (number == "1") THEN

Display "Records are shown above"

Display ">>>Press Enter to return to Customer Menu"

Read x

customer\_menu()

BREAK

ELIF (number == "2") THEN

Display "Records are shown above"

Display ">>>Press Enter to return to Admin Menu"

Read x

admin\_menu()

ENDIF

END view\_car\_available()

DEFINE login\_customer()

customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card = read\_customer\_data()

Display "Please enter your ID: "

Read ctm\_id\_input

LOOP i FROM 0 TO len(admin\_id) STEP 1

IF (customer\_id[i] == ctm\_id\_input) THEN

Display "Please Enter Your Password: "

Read ctm\_password\_input

IF (ctm\_password\_input == customer\_pass[i]) THEN

registered\_customer\_menu(STRING ctm\_id\_input)

BREAK

ELSE

Display "\nWrong Password Entered"

Display ">>> Press enter to return back to Customer menu . . . "

Read x

customer\_menu()

BREAK

ENDIF

ELSEIF (I == (len(customer\_id)-1) THEN

Display "\nCustomer ID Not Found"

Display ">>> Press enter to return back to Customer menu . . . "

Read x

customer\_menu()

BREAK

ENDIF

NEXT i

ENDLOOP

END login\_customer()

DEFINE registered\_customer\_menu(STRING ctm\_id)

READ ctm\_id  
 Display "-----Registered Customer Menu?-----

Display "[1]Modify Personal Details"

Display "[2]View Details of Cars for Rent, Book a Car and Pay"

Display "[3]View Personal Rental History"

Display "[4]Back to Main Menu"

Display "[5]Exit\n"

Display "Please enter your option"

Read option3

DOWHILE True

IF (option3 == "1") THEN

modify\_customer\_detail(STRING ctm\_id)

BREAK

ELSEIF (option3 == "2") THEN

view\_car\_details(STRING ctm\_id)

BREAK

ELSEIF (option3 == "3") THEN

rental\_history(STRING ctm\_id)

BREAK

ELSEIF (option3 == "4") THEN

main\_menu()

BREAK

ELSEIF (option3 == "5") THEN

quit()

BREAK

ELSE

Display "Please Enter Your Option: "

Read option3

ENDIF

ENDDO

END registered\_customer\_menu()

DEFINE rental\_history(STRING ctm\_id)

READ ctm\_id

customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card = read\_customer\_data()

ctm\_history\_id, car\_history\_id, car\_history\_name, car\_history\_name, rental\_duration, history\_year, history\_month, history\_day, price\_paid = read\_history\_data()

LOOP i FROM 0 TO len(customer\_id) STEP 1

IF (customer\_id[i] == ctm\_id) THEN

Display "Your ID:", customer\_id [i]

Display "Your Name:", customer\_name[i]

Display "\n-------------Rental History-------------"

ENDIF

LOOP index FROM 0 TO len(ctm\_history\_id) STEP 1

IF ctm\_history\_id[index] == ctm\_id THEN

Display "Car ID:", car\_history\_id[index]

Display "Car Name:", car\_history\_name[index].title()

Display "Rental Cost:RM", price\_paid[index[

Display "Duration:" + rental\_duration[index] + "days"

Display "Rented On: " + history\_day[index] + "-" + history\_month[index] "-" + history\_year[index]+ "\n"

ELSEIF ctm\_history\_id[index] != ctm\_id THEN

Display "No Rental history is found"

Display ">>>Press Enter to return to Main Menu"

Read x

registered\_customer\_menu(STRING ctm\_id)

ENDIF

NEXT index

ENDLOOP

Display "Rental history is shown above"

Display ">>>Press Enter to return to Main Menu"

Read x

registered\_customer\_menu(STRING ctm\_id)

NEXT i

ENDLOOP

END rental\_history()

DEFINE modify\_customer\_detail(STRING ctm\_id)

Read ctm\_id

customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card = read\_customer\_data()

Display "\nTo modify your detail,\n Please insert your password again: "

Read ctm\_pass\_input

LOOP i FROM 0 TO len(customer\_id) STEP 1

IF (ctm\_id == customer\_id[i]) AND (ctm\_pass\_input == customer\_pass[i]) THEN

Display "\nThis is your current detail:"

Display "ID:", customer\_id[i]

Display "Password:", customer\_pass[i]

Display "Card Number:", customer\_card[i]

Display "What would you like to modify?"

Display "\*Note that the ID is auto generated and can’t be changed"

Display "[1]Name"

Display "[2]Password"

Display "[3]Card Number"

Display "[4]Back To Menu"

Display "Please Enter Your Option: "

Read modify\_option

ENDIF

DEFINE change\_customer\_data()

customer\_data = open("customer.txt", "w")

Read customer\_data

LOOP index FROM 0 TO len(customer\_id) STEP 1

customer\_data.write(customer\_id[index]+",")

                    customer\_data.write(customer\_pass[index]+",")

                    customer\_data.write(customer\_name[index]+ ",")

                    customer\_data.write(booked\_car\_name[index]+",")

                    customer\_data.write(customer\_payment[index]+",")

                    customer\_data.write(customer\_duration[index]+",")

                    customer\_data.write(customer\_card[index]+"\n")

NEXT index

ENDLOOP

customer\_data.close()

Display "Done!"

Display ">>>Press Enter to return to Customer Menu"

Read x

registered\_customer\_menu(STRING ctm\_id)

END change\_customer\_data()

DOWHILE True

IF (modify\_option == "1") THEN

Display "\nWhat would you like to be called: "

Read new\_name

customer\_name[i] = new\_name.lower()

change\_customer\_data()

BREAK

ELIF (modify\_option == "2") THEN

Display "\nWhat is your new password: "

Read new\_password

customer\_pass[i] = new\_password

change\_customer\_data()

BREAK

ELIF (modify\_option == "3") THEN

Try

Display "\nWhat is your new card number(16 numbers): "

Read INT(new\_card)

customer\_card[i] = STR(new\_pass)

change\_customer\_data()

BREAK

Except ValueError

Display "ERROR"

Display ">>> Please enter a valid credit card number without characters or decimals"

modify\_customer\_detail(STRING ctm\_id)

BREAK

ELIF (modify\_option == "4") THEN

registered\_customer\_menu(STRING ctm\_id)

BREAK

ELSE

Display "Please Enter Your Option:  "

ENDIF

ENDDO

NEXT i

ENDLOOP

END modify\_customer\_detail()

DEFINE view\_car\_details(STRING ctm\_id)

Read ctm\_id

customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card = read\_customer\_data()

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

LOOP i FROM 0 TO len(customer\_id) STEP 1

IF (customer\_id[i] == ctm\_id) THEN

IF (booked\_car\_name[i] != "none") THEN

Display "Error: You have already rented a car"

Display ">>> if you have returned the car, please notify an admin to update your data or return the rented car. "

Display "\nPress Enter to return to menu"

Read x

registered\_customer\_menu(STRING ctm\_id)

ENDIF

ENDIF

NEXT i

ENDLOOP

Display "\n----All Details of Cars Available for Rent--- "

LOOP i FROM 0 TO len(car\_id) STEP 1

IF (car\_available[i] == "yes") THEN

Display "Car ID: ", car\_id[i]

Display "Car Name: ", car\_name[i].title()

Display "--Car Details--\n”, car\_details[i].replace(" ", "\n").title()).replace("Price:", "Price Per Day:RM")+"\n"

ENDIF

NEXT i

ENDLOOP

Display "What would you like to do? "

Display "[1]Book A Car to Rent"

Display "[2]Return to Menu"

Display "Please Enter Your Option: "

Read ctm\_option

DOWHILE true

IF (ctm\_option == "1") THEN

book\_car(STRING ctm\_id)

BREAK

ELIF (ctm\_option == "2") THEN

registered\_customer\_menu(STRING ctm\_id)

BREAK

ELSE

Display "Please Enter Your Option: "

ENDIF

ENDDO

END view\_car\_details()

DEFINE book\_car(STRING ctm\_id)

Read ctm\_id

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

Display "\n To book a car,\n Please insert the Car ID: "

Read book\_car\_id

LOOP i FROM 0 to len(car\_id) STEP 1

IF (book\_car\_id == car\_id[i]) THEN

Display "\n This is the details of the car chosen:")

Display (car\_details[i].replace(" ", "\n").title()).replace("Price:", "Price Per Day:RM")

Display "What would you like to do?"

Display "[1]Proceed To Payment"

Display "[2]Chosen Another Car to Rent"

Display "[3]View Details of Cars Available"

Display "Please Enter Your Option: "

Read booking\_option

ENDIF

DOWHILE

IF (booking\_option == "1 ") THEN

book\_payment(STRING book\_car\_id, STRING ctm\_id)

BREAK

ELIF THEN

book\_car(STRING ctm\_id)

BREAK

ELIF THEN

view\_car\_details(STRING ctm\_id)

BREAK

ELSE

Display "Please Enter Your Option: "

ENDIF

ENDDO

END book\_car()

DEFINE book\_payment(STRING book\_car\_id, STRING ctm\_id)

Read book\_car\_id, ctm\_id

customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card = read\_customer\_data()

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

Try

Display "How many days would you like to rent the car?: "

Read INT(ctm\_booking\_duration)

Except ValueError

Display "ERROR”

Display ">>> Please enter a valid or whole number"

book\_payment(STRING book\_car\_id, STRING ctm\_id)

LOOP i FROM 0 TO len(customer\_id) STEP 1

IF (ctm\_id == customer\_id[i]) THEN

LOOP index FROM 0 TO len(car\_id) STEP 1

IF (book\_car\_id == car\_id[index])

Display "\nYour Credit Card Number: ", current\_card[i]

total = ctm\_booking duration \* INT(car\_price[index])

Read total

Display "Car Name: ", car\_name[index].title()

Display "Number of Days”, ctm\_booking\_duration

Display "Total Payment: RM", total

Display "What would you like to do? "

Display "[1]Confirm Payment"

Display "[2]Change Number Of Days To Rent The Car"

Display "[3]Back To View Details Of Cars Available for Rent"

Display " Please Enter Your Option: "

Read payment\_option

DOWHILE

IF (payment\_option == "1") THEN

chosen\_car = car\_name[index]

update\_data(STRING book\_car\_id, STRING ctm\_id, STRING ctm\_booking\_duration, STR total, STRING chosen\_car)

Display "Payment Completed! "

Display ">>> RM" + total + "charged to card" + customer\_card[i]

Display "\n>>> Press Enter to return to menu"

Read x

registered\_customer\_menu(STRING ctm\_id)

BREAK

ELIF (payment\_option == "2") THEN

book\_payment(STRING book\_car\_id, STRING ctm\_id)

BREAK

ELIF (payment\_option == "3") THEN

view\_car\_details(STRING ctm\_id)

BREAK

ELSE

Display "Please Enter Your Option: "

ENDIF

ENDDO

ENDIF

NEXT index

ENDLOOP

ENDIF

ENDLOOP

END book\_payment()

DEFINE update\_data(STRING book\_car\_id, STRING ctm\_id, STRING ctm\_booking\_duration, STRING total, STRING chosen\_car)

Read book\_car\_id, ctm\_id, ctm\_booking\_duration, total, chosen\_car

customer\_id, customer\_pass, customer\_name, booked\_car\_name, customer\_payment, customer\_duration, customer\_card = read\_customer\_data()

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

year = []

month = []

day = []

date\_list = STR(date.today()).split("-")

Read date\_list

year.append(date\_list[0])

IF date\_list[1] == "10" THEN

month.append(STR(date\_list[1])

ELSE

month.append(STR(date\_list[1].replace("0","")))

ENDIF

day.append(date\_list[2])

f = open("history.txt", "a+")

Read f

history\_data = f.readlines()

Read history\_data

history\_data.append(ctm\_id + ",")

history\_data.append(book\_car\_id + ",")

history\_data.append(chosen\_car + ",")

history\_data.append(ctm\_booking\_duration + ",")

history\_data.append(year[0] + ",")

history\_data.append(month[0] + ",")

history\_data.append(day[0] + ",")

history\_data.append(total + "\n")

f.writelines(history\_data)

f.close()

LOOP i FROM 0 TO len(customer\_id) STEP 1

IF (ctm\_id == customer\_id[i]) THEN

booked\_car\_name[i] = chosen\_car

customer\_payment[i] = total

customer\_duration[i] = ctm\_booking\_duration

customer\_data = open("customer.txt", "w")

ENDIF

LOOP index FROM 0 TO len(customer\_id) STEP 1

customer\_data.write(customer\_id[index]+",")

customer\_data.write(customer\_pass[index]+",")

customer\_data.write(customer\_name[index]+ ",")

customer\_data.write(booked\_car\_name[index]+",")

customer\_data.write(customer\_payment[index]+",")

customer\_data.write(customer\_duration[index]+",")

customer\_data.write(customer\_card[index]+"\n")

NEXT index

ENDLOOP

customer\_data.close()

NEXT i

ENDLOOP

LOOP i FROM 0 TO len(car\_id) STEP 1

IF (book\_car\_id == car\_id[i]) THEN

LOOP index FROM 0 TO len(customer\_id) STEP 1

IF (ctm\_id == customer\_id[index]) THEN

booking\_customer[i] = customer\_name[index]

car\_available[i] = "no"

ctm\_key[i] = ctm\_id

booking\_payment[i] = total

booking\_duration[i] = ctm\_booking\_duration

payment\_year[i] = year[0]

payment\_month[i] = month[0]

payment\_day[i] = day[0]

cars\_data = open("car.txt", "w")

LOOP l FROM 0 TO len(car\_id) STEP 1

cars\_data.write(car\_id[l]+",")

cars\_data.write(car\_name[l]+",")

cars\_data.write(car\_price[l]+",")

cars\_data.write(car\_available[l]+",")

cars\_data.write(ctm\_key[l]+",")

cars\_data.write(booking\_customer[l]+",")

cars\_data.write(booking\_payment[l]+",")

cars\_data.write(booking\_duration[l]+",")

cars\_data.write(payment\_year[l]+",")

cars\_data.write(payment\_month[l]+",")

cars\_data.write(payment\_day[l]+",")

cars\_data.write(car\_details[l]+"\n")

NEXT l

ENDLOOP

cars\_data.close()

ENDIF

NEXT index

ENDLOOP

ENDIF

NEXT i

ENDLOOP

END update\_data()

DEFINE login\_admin()

admin\_id, admin\_pass = read\_admin\_data()

Display "Please enter your admin ID"

read id\_num1

Display "Please enter your admin password"

read password1

LOOP i FROM 0 TO len(admin\_id) STEP 1

IF id\_num1 = admin\_id[I] THEN

IF password1 == admin\_pass[I] THEN

admin\_menu()

ELSE

NEXT i

ENDIF

NEXT i

ENDLOOP

Display "Error ID or Password detected Returning back to main menu . . ."

main\_menu()

END login\_admin()

DEFINE admin\_menu()

Display "-----What would you like to do?-----

[1]Add cars to be rented out

[2]Modify car details

[3]Return a rented car

Display all records of:

[4]Cars rented out

[5]Cars available for rent

[6] Customers booking

[7]Customer Payment for a specific Booking time duration

Search Specific Record of:

[8]Customer Booking

[9]Customer Payment

[10]Back to main menu

[11]Exit "

Display “Please enter your option”

Read option3

DOWHILE True

IF option3 == "1" THEN

New\_car()

break

IF option3 == "2" THEN

Modify\_car\_detail()

break

IF option3 == "3" THEN

Return\_rented\_car()

break

IF option3 == “4” THEN

All\_rented\_car()

break

IF option3 == “5” THEN

View\_car\_available(“2”)

break

IF option3 == “6” THEN

All\_customer\_booking

Break

IF option3 == “7” THEN

Payment\_specific\_time()

break

IF option3 == “8” THEN

Specific\_booking()

break

IF option3 == “9” THEN

Specific\_payment()

break

IF option3 == “10” THEN

Main\_menu()

break

IF option3 == “11” THEN

Quit()

ELSE

Display "Please enter your option"

Read option3

ENDIF

ENDDO

END admin\_menu()

DEFINE new\_car()

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

f = open("car.txt", "a+")

car\_data = f.readlines()

new\_car\_id = ("car" + str(len(car\_id)+1))

display "New Car's Name: "

read new\_car\_name

is\_car\_available = "yes"

display "what is the color of the car?"

read color

display "What is the Horsepower of the car?:"

read horsepower

IF Value error THEN

display ">>>Value Error . . .

>>>Returning to admin menu . . ."

admin\_menu()

ENDIF

display "What is the price of the car rental?:"

read price

IF Value error THEN

display ">>>Value Error . . .

>>>Returning to admin menu . . ."

admin\_menu()

ENDIF

new\_car\_details = ("color:" + color + horsepower:" + str(horsepower) + "price:" + str(price))

car\_data.append(new\_car\_id + ",")

car\_data.append(new\_car\_name + ",")

car\_data.append(str(new\_car\_price) + ",")

car\_data.append(str(new\_car\_price) + ",")

car\_data.append("none,none,none,none,none,none,none,")

car\_data.append(new\_car\_details + "\n")

f.writelines(car\_data)

f.close()

Display "Done !

>>>Press Enter to return to admin menu"

Read x

Admin\_menu()

END new\_car()

DEFINE modify\_car\_details()

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

Display "To modify the car detail,\nPlease insert the car ID of

the car:"

Read id\_input

LOOP i FROM 0 TO len(car\_id) STEP 1

IF id\_input == car\_id[I] THEN

display car\_id[i]

display "car name: " + car\_name[i]

display "--This is the current car details !--"

display car\_details[i].replace(" ", "\n")

display "what is the color of the car?"

read color

try

display "What is the Horsepower of the car?:"

read horsepower

display "What is the price of the car rental?:"

read price

except Value error

display ">>>Value Error . . . returning to admin menu . . ."

Admin\_menu()

ELSE

new\_car\_details = ("color:" + color + "

horsepower:" + str(horsepower) + " price:" + str(price))

car\_price[i] = str(price)

car\_details[i] = new\_detail

cars\_data = open("car.txt", "w")

ELSE

ENDIF

ENDIF

LOOP l FROM 0 TO len(car\_id) STEP 1

cars\_data.write(car\_id[l]+",")

cars\_data.write(car\_name[l]+",")

cars\_data.write(car\_price[l]+",")

cars\_data.write(car\_available[l]+",")

cars\_data.write(ctm\_key[l]+",")

cars\_data.write(booking\_customer[l]+",")

cars\_data.write(booking\_payment[l]+",")

cars\_data.write(booking\_duration[l]+",")

cars\_data.write(payment\_year[l]+",")

cars\_data.write(payment\_month[l]+",")

cars\_data.write(payment\_day[l]+",")

cars\_data.write(car\_details[l]+"\n")

NEXT l

ENDLOOP

ENDLOOP

Cars\_data.close()

display "Done !

>>>Returning to admin menu"

admin\_menu()

END modify\_car\_detail()

DEFINE return\_rented\_car()

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

display "please enter the car ID of the rented car:"

read id\_input

LOOP i FROM 0 TO len(car\_id) STEP 1

IF id\_input == car\_id[i] THEN

IF car\_available[i].replace == "no" THEN

display "Please check the details of the customer to return a rented car"

display "Customer Name: ", booking\_customer[i]

display "Booking duration (Nth days) : ",booking\_duration[i]

display "Total Payment: ", booking\_payment[i]

display "[1]Back to Admin Menu Or press anything to continue . . .

read random\_input

IF random\_input == "1" THEN

admin\_menu()

ELSE

car\_available[i] = "yes"

ctm\_key[i] = "none"

booking\_customer[i]= "none"

booking\_duration[i] = "none"

booking\_payment[i] = "none"

payment\_year[i] = "none"

payment\_month[i] = "none"

payment\_day[i] = "none"

LOOP l FROM 0 TO len(car\_id) STEP 1

cars\_data.write(car\_id[l]+",")

cars\_data.write(car\_name[l]+",")

cars\_data.write(car\_price[l]+",")

cars\_data.write(car\_available[l]+",")

cars\_data.write(ctm\_key[l]+",")

cars\_data.write(booking\_customer[l]+",")

cars\_data.write(booking\_payment[l]+",")

cars\_data.write(booking\_duration[l]+",")

cars\_data.write(payment\_year[l]+",")

cars\_data.write(payment\_month[l]+",")

cars\_data.write(payment\_day[l]+",")

cars\_data.write(car\_details[l]+"\n")

NEXT l

ENDIF

ENDIF

ENDIF

NEXT i

ENDLOOP

cars\_data.close()

display "Done ! >>>Returning to admin menu"

Admin\_menu()

DEFINE all\_rented\_car()

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

LOOP i FROM 0 TO len(car\_id) STEP 1

IF car\_available[i].replace == "no" THEN

display "car ID:" + car\_id[i]

display "car name:" + car\_name[i]

display "customer name:" + booking\_customer[i]

display "Total payment:" + booking\_payment[i]

display "booking duration (Nth day):" +booking\_duration[i]

display "---Car details---" + car\_details[i]

add\_num = int(booking\_duration[i])

add\_num\_new = timedelta(add\_num)

check\_year = int(payment\_year[i])

check\_month = int(payment\_month[i])

check\_day = int(payment\_day[i])

return\_date = date(check\_year,check\_month,check\_day) + add\_num\_new

display "the date to return the car:" + str(return\_date)

NEXT i

ELSE

ENDIF

ENDLOOP

display "Returning to admin menu . . ."

admin\_menu()

END all\_rented\_car()

DEFINE all\_customer\_booking

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

LOOP i FROM 0 TO len(car\_id) STEP 1

IF car\_available[i].replace == "no" THEN

display "customer name:" + booking\_customer[i]

display "Total payment:" + booking\_payment[i]

display "booking duration (Nth day):" +booking\_duration[i]

display "Booked car's ID:" + car\_id[i]

add\_num = int(booking\_duration[i])

add\_num\_new = timedelta(add\_num)

check\_year = int(payment\_year[i])

check\_month = int(payment\_month[i])

check\_day = int(payment\_day[i])

return\_date = date(check\_year,check\_month,check\_day) + add\_num\_new

display "the date to return the car:" + str(return\_date)

ELSE

NEXT i

ENDIF

ENDLOOP

display "Returning to admin menu . . ."

admin\_menu()

END all\_customer\_booking

DEFINE payment\_specific\_time

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

display "Please Enter a specific time to view all specific payments in 2021:"

try

display "Start year:" + "Start month:" + "Start day: "

read start\_year, start\_month ,start\_day

display "end year:" + "end month:" + "end day: "

read end\_year,end\_month,end\_day

except Value error

display ">>>Value Error . . . Returning to admin menu . . ."

admin\_menu()

start\_date = date(start\_year,start\_month,start\_day)

end\_date = date(end\_year,end\_month,end\_day)

display "---All Payments between " + str(start\_date) + " and " + str(end\_date) + "---"

LOOP i FROM 0 TO len(car\_id) STEP 1

IF payment\_month[i] != "none" THEN

check\_year = int(payment\_year[i])

check\_month = int(payment\_month[i])

check\_day = int(payment\_day[i])

actual\_date = date(check\_year,check\_month,check\_day)

ELSE

IF start\_date < actual\_date < end\_date THEN

display "Customer name: " + booking\_customer[i]

display "payment date:" + str(date(actual\_date))

display "Total payment: " + booking\_payment[i]"

ELSE

NEXT i

ENDIF

ENDIF

ENDLOOP

display "Returning to admin menu . . ."

admin\_menu()

END payment\_specific\_time

DEFINE specific\_booking

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

display "customer name:"

read criteria\_customer

display "booked car ID:"

read criteria\_id

display "--Records of Customer Booking is shown below--"

LOOP i FROM 0 TO len(car\_id) STEP 1

IF booking\_customer[i].replace(" ","") == criteria\_customer THEN

IF car\_id[i].replace(" ","") == criteria\_id THEN

display "Customer name: " + booking\_customer[i]

display "booked car:" + car\_name[i]

display "Booked car ID" + car\_id[i]

display "Booking duration: " + booking\_duration[i] + "days"

add\_num = int(booking\_duration[i])

add\_num\_new = timedelta(add\_num)

check\_year = int(payment\_year[i])

check\_month = int(payment\_month[i])

check\_day = int(payment\_day[i])

return\_date = date(check\_year,check\_month,check\_day) + add\_num\_new

display "the date to return the car:" + str(return\_date)

display "Records of Matched criteria are shown above ! >>>Returning to admin menu"

admin\_menu()

ELSE

ENDIF

ELSE

ENDIF

NEXT i

ENDLOOP

display "no records are found with the given criteria >>>Returning to admin menu"

admin\_menu()

END specific\_booking

DEFINE specific\_payment

car\_id, car\_name, car\_price, car\_available, ctm\_key, booking\_customer, booking\_payment, booking\_duration, payment\_year, payment\_month, payment\_day, car\_details = read\_car\_data()

display "customer name:"

read criteria\_customer

display "booked car ID:"

read criteria\_id

display "--Records of Customer Booking is shown below--"

LOOP i FROM 0 TO len(car\_id) STEP 1

IF booking\_customer[i].replace(" ","") == criteria\_customer THEN

IF car\_id[i].replace(" ","") == criteria\_id THEN

display "Customer name: " + booking\_customer[i]

display "Total payment:" + booking\_payment[i]

check\_year = int(payment\_year[i])

check\_month = int(payment\_month[i])

check\_day = int(payment\_day[i])

payment\_date = date(check\_year,check\_month,check\_day)

display "payment done on: " + str(payment\_date)

display "Records of matched criteria are shown above ! >>>Press Enter to return to admin menu"

admin\_menu()

ELSE

ENDIF

ELSE

ENDIF

ENDLOOP

display "no records are found with the given criteria >>>Press enter to return to admin menu"

admin\_menu()

END specific\_payment

main\_menu()

#This is whole program end

END