CSE 114 Fall 2016

Fundamentals of Computer Programming Assignment 2

Due: 11.10.2016 at 13:00

In this assignment, you will implement a C program that will assist a user who wants to buy a car. Initially, your program should present features of the cars to the user as given in Table 1, where 4 types of features are specified for 6 different car brands. These features are **price range (p), horsepower (hp), top speed (ts)** and **DVD video system.** The last feature indicates whether the car has a built-in DVD video system or not. After displaying the table, the user will be asked to enter his/her preferences about the car s/he wants to buy. Finally, your program should display the brand and features of the car(s) suggested for the user by comparing the user's preferences against the criteria defined in Table 1. Some features might be irrelevant for the user. For such features, the user can enter a negative integer value. If specifications preferred by the user do not match with the features offered by the program, the user should be replied with a message "No matching cars". The number of if statements you incorporate will influence your grade.

Brand	Price range (p) (€)	Horsepower (hp) (RPM)	Top speed (ts) (mph)	DVD video system
Peugeot	$10000 \le p \le 15000$	$230 \le hp \le 250$	ts=130	No
Renault	$15000 \le p \le 25000$	$250 \le hp \le 300$	ts=140	No
Opel	$20000 \le p \le 25000$	$300 \le hp \le 320$	ts=155	No
<u>Audi</u>	$30000 \le p \le 40000$	$350 \le hp \le 360$	ts=180	Yes
Volvo	$35000 \le p \le 40000$	$350 \le hp \le 360$	ts=200	Yes
BMW	$41000 \le p \le 50000$	$380 \le hp \le 400$	ts=220	Yes

Table 1. Brands and features of cars