

CS6308- JAVA PROGRAMMING

WEEK 2 (21-08-2020)

Total marks (25)

Level 1: (10 marks)

1. What will be the type and value of the following?
 - a. $(7 / 2) * 2.0$
 - b. $(7 / 2.0) * 2$
 - c. $"2" + 2$
 - d. $2.0 + "2"$
2. Write an application that takes radius as float and find the Circumference, area and diameter of a circle
3. A mail order company charges Rs. 3.00 for handling, free shipping for orders 10 Rupees or less, plus Rs 1.00 for each Rupee over 10. Write a program that repeatedly asks the user for the weight of an order, and then writes out the shipping charge. The program stops when a weight of zero or less is entered.

Level 2: (15 marks)

1. Write an application that inputs one number consisting of five digits from the user, separates the number into its individual digits and prints the digits separated from one another by three spaces each. For example, if the user types in the number 42339, the program should print 4 2 3 3 9 .
2. Create an application that calculates your daily driving cost, so that you can estimate how much money could be saved by car pooling, which also has other advantages such as reducing carbon emissions and reducing traffic congestion. The application should input the following information and display the user's cost per day of driving to work:
 - a) Total km driven per day
 - b) Cost per litre of fuel.
 - c) Average km per litre.
 - d) Parking fees per day.
 - e) Tolls per day.
3. An online retailer sells five products whose retail prices are as follows: Product 1, Rs2.98; product 2, Rs4.50; product 3, Rs 9.98; product 4, Rs4.49 and product 5, Rs6.87. Write an application that reads a series of pairs of numbers as follows:

- a) product number
- b) quantity sold

Constraints:

Your program should use SWITCH statement to determine the retail price for each product. It should calculate and display the total retail value of all products sold. Use a sentinel-controlled loop to determine when the program should stop looping and display the final results.

4. Write a program that handles the entry and display of your homework score. Name the file as HomeWorkScore. Obtain score from user and give grades. The grades are A,B,C,D,E.

5. You get 5 subject scores from the user through args. Find overall average and grade the student. If someone enters 0 or negative notify user and get correct value.