Introduction

The purpose of this exercise is to enable the candidate to demonstrate knowledge and understanding of the following concepts in object oriented programming.

a) Inheritance
b) Reusability of components
c) Encapsulation
d) Coding commenting practices

The programming language to be used can be freely chosen depending on your expertise.

The source code and the executable file should be delivered in a zip format with the candidate name as a file name. In addition, candidate should specify (in the mail body or in an attachment)

a) the programming language that was used
b) any other remarks that enable the loading and execution of the application

The case:

You are asked to design and implement a small application for an e-shop that sells

a) PC Towers
b) PC screens
c) Personal Computers
d) Workstations

You should take into consideration that

a) The PC tower is composed by 2 components i.e.
    a. Memory in GB
    b. CPU in GHz
b) The PC screen is in inches.
c) The personal computer is composed by
    a. 1 PC Tower,
    b. 1 PC screen
    c. 1 hard disk drive (in GB) – It should be noted that the hard disk drive is not sold separately.
d) The workstation is composed by a Personal computer as well as an operating system (Windows or Linux) – The operating system is not sold separately.

The application should

a) Enable the user to select one of the following choices
    a. PC tower
    b. PC screen
    c. Personal Computer
    d. Workstation
b) Enter the data for each choice depending on the attributes defined above. The data input in all fields / attributes is mandatory and only numeric values should be allowed.
c) Print the order of the customer (on screen) showing all the details of the chosen component.

Extra notes

a) The visual components of the user interface can be freely chosen

b) The user interface should be composed by 3 steps

    a. First step should show the available choices regarding the products sold by the e-shop.

    b. The second step should

        i. Display in detail the components of the chosen product

        ii. Enable the user to enter the attributes of each of the chosen components

    c. The last step should print the order to the customer (on screen).

If you have any questions related to the understanding of the exercise, please contact us on +302107216236 or nikos.chalaris@improvit.gr

Extra notes