# Java Programming @ The department of Computer Science



# **Quote Item**

## **Requirements**

Customers provide a landscape gardening company with a plan detailing lawns, concrete patios and water features. Unit material costs and installation times are as shown in the table. Create a Java class that can be used to store unit material costs and installation times.

Work to be done	Unit cost of materials	Unit time to install
Laying a lawn	£15.50 per m <sup>2</sup>	20 mins per m <sup>2</sup>
Laying a concrete patio	£20.99 per m <sup>2</sup>	20 mins per m <sup>2</sup>
Installing a water feature (e.g. a fountain)	£150.00 each	60 mins each

### Note

This exercise builds up to the solution of AQA HCSE Specimen Controlled Assessment. We will be revisiting it.

#### **Modifiers**

Three categories of membership are identified indicated by three different "modifiers":

1. public

Members which can be accessed from anywhere in a program.

2. private

Members which can only be accessed from within an object (to access such members from outside the object we must use a public member method).

3. protected

Private members which are inherited by instances of classes derived from the current class.

Note that, since one of the principals of OOP is data hiding, field members are normally categorised as private members of a class. This means that if we wish to access these fields from outside of the class we need to create a public method to do so,

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