**Task 1 – Distance converter**

Write a program that prompts the user for a measurement in meters and then converts it into miles, feet and inches. Use the following factors:

* 1 mile = 1610 meters
* 1 feet = 0.3048 meters
* 1 inch = 0.0254 meters

The program should accept the amount of meters to convert via TextBox control. You should provide three Button controls (“Convert to miles”, “Convert to feet” and “Convert to inches”).

When user clicks on a button your program should perform the conversion and display result in form of “N meters = M miles” etc. via MessageBox.

User input should be validated. In case of invalid input user should be notified with a friendly message. **40 marks**

**Task 2 – Expression evaluation**

Your task is to develop an expression processor, which should evaluate text containing simple arithmetic expressions. You should only support two operations – addition and subtraction.

You should only process input in form of {Number}{Operand}{Number}{Operand}{Number}… where numbers are whole positive single digit numbers only (0 to 9) and no spaces between numbers and operands. The amount of numbers and operands is not limited. For example, all of the following is valid input:

* 3+5-9+8-1+2
* 1+0
* 1+2+3+4+5-1-2-3-4-5

User input should be obtained via Textbox control. After processing, you should display result in a Label control. User input should be validated. In case of invalid input user should be notified with a friendly message.

## 60 marks