OBJECTIVES

1. Learn to handle simple user input/output using basic C functions.
2. Learn the keywords if and else.

GENERAL INFORMATION

A simple calculator will be designed. Calculator will ask the user to enter two numbers and an operator in the format 2.65*3.14 (example) and print out the result of the calculation. Operator can be any of *, /, + and -. Operands are two doubles.

EXPERIMENT

1. Write the simple calculator program (with main() function only). Program should display an error message if an unknown operator or an invalid expression is entered.

2. Change the code to handle "division by zero" when user enters 12.4/0, for example.

3. Change the code to display the integer part of the first operand in hexadecimal format when the operator is 'h' regardless of the second number. Example: 1893930h1 gives 1CE62A.

QUESTIONS:

1. How would you handle complex numbers entered like 4.2+i2.9 and the operations between them, for example (4.2+i2.9)*(1.8+i3.7)?

2. How would you manage expressions with 2 operators, like 5.1*6.4+1.75?