ECE 3223
Homework 12

Fall 1997 Dr. Havlicek

Develop an Intel assembly language program to find the sum and product of two unsigned two-digit hexadecimal numbers. You may wish to begin by modifying the sample program given out in class.
Here is a description of how program execution should proceed:

- First, the program outputs a question mark (?) to the screen.
- Next, the user types two hex digits. As the digits are typed, they are echoed on the screen. The program reads these two digits and converts them into a two-digit hexadecimal number.
- The program then outputs a carriage return, a linefeed, and another question mark to the screen.
- The user then types two more hex digits which are echoed to the screen and read in as the second two-digit hexadecimal number.
- The program outputs another CR/LF pair to the screen.
- The program prints the sum of the two numbers on the screen in hex using three digits.
- The program outputs another CR/LF pair to the screen.
- The program prints out the product of the two numbers on the screen in hex using four digits.
- The program outputs another CR/LF pair to the screen followed by another question mark.

Execution continues in a loop until the user enters an "at" sign (@), which terminates the program.

Here is a sample run:

```
?12
?34
046
03A8
?@
```

Each group should turn in a printed assembler listing and a 3.5 inch floppy disk. The disk should have only two files on it:

1. hw12.asm: the assembler source code for the program.
2. hw12.exe: the executable module for the program.

DUE: 12/8/97.