An-Najah National University
Department of Computer Engineering
Microprocessors (10636322)

Assignment # 1

Answer the following:

1- Write an 8086-assembly program that reads only vowels (a, e, i, o, u) from the keyboard (other characters are not excepted) and store them in a character array of 10 bytes long. Vowels entered after the array is full should be discarded. The program should stop reading characters when a '$' is entered. When the '$' character is entered, the program should output a new line, followed by the contents of the character array, with a space character between each vowel.

2- Write an assembly code to sort a word array of 50 numbers in ascending order.

3- The perfect number is defined as an integer which is equal to the sum of its divisors. Example: 28 is perfect number because $28 = 1 + 2 + 4 + 7 + 14$.
Write an inline assembly c function that will takes an integer number as parameter and check whether it is a perfect number or not. Use the function in complete program.

4- Write an assembly macro that implements the "srtcat" function in c language. Use the function in an assembly program

Deadline: Saturday 14/11/2020

Good Luck