## Assignment to test your understanding with 1 dimensional Arrays

Please follow the instructions:

- 1. In your main method declare 2 arrays that can each store a maximum of 20 float elements.
- 2. Prompt user to input some real numbers, read them in the first array and count the total number of input given. Stop taking input when user supplies 0.0 or exceeds 20 inputs. Please note that your program will never ask for total number of input at the beginning, it should go on counting the number of inputs given by the user.
- 3. When the input is done, using the values given by the user in the first array do the following:
  - a. Double the value of each of the elements in the input array that have even subscript (0,2,4,...) and store them in the corresponding locations of second array.
  - b. Determine the cube root of each of the values in the input array that have odd subscripts (1,3,5,...) and store those values in the corresponding locations of the second array.
  - c. Print (on the output console) the content of both the arrays in 2 right justified columns with headings (see the expected output at the bottom).
- 4. Find the sum of all the values for both of the arrays and then display them as well. You must find the sum for both the arrays using a single for loop.

To find out cube root of a number you must use cbrt function of math.h header.

## Expected output:

```
Enter maximum 20 numbers, terminate with 0.0
First number: 4.5
Next: 2.5
Next: -10.5
Next: 6.43
Next: -9.0
Next: -1.24
Next: 0.0
There are in total 6 numbers given as input
Input Array 2nd Array
    4.50000
                9.00000
               1.35721
    2.50000
  -10.50000
              -21.00000
    6.43000
                1.85953
   -9.00000 -18.00000
   -1.24000 -1.07434
Sum of the first array:
                          -7.31000
Sum of the second array: -27.85760
```

By Shibaji Paul created for Udemy "C Programming" course.