

Lab 17

Write a function called `dist` that takes two double values as parameters and returns the absolute value of the difference of the two numbers (i.e. how far apart the numbers would be on a number line). Do NOT use `cmath/math.h` for this lab.

In main ask the user to enter the two values, then print out the numbers and result in a sentence.

The function `dist` should NOT print anything or receive any input from the user (no `cin` or `cout` in the `dist` function, only within main).

Test cases (Slight rounding errors are OK):

Test case 1:

Input a number: <5.3>

Input another number: <1.7>

The distance between 5.3 and 1.7 is 3.6

Test case 2:

Input a number: <1.7>

Input another number: <5.3>

The distance between 1.7 and 5.3 is 3.6

Test case 3:

Input a number: <2.5>

Input another number: <-3.4>

The distance between 2.5 and -3.4 is 5.9

Test case 4:

Input a number: <-4.7>

Input another number: <4.7>

The distance between -4.7 and 4.7 is 9.4

Test case 5:

Input a number: <4.7>

Input another number: <4.7>

The distance between 4.7 and 4.7 is 0