

Exam2_EditStr Practice Test

Note: everything in this PDF is also in the comments in the project files

This practice test has three functions that you must implement. Two of them are in Assembly and one of them is in C. You will edit the Exam2.C file and the Exam2.asm file. You should write the code, and then debug your functions until the grader displayed in UART1 shows a score of 100.

Part1: strLen (in Exam2asm.s): Function finds the length of a char string

TESTCASES: (there are 6 testcases for strLen)

```
""           Should Return: 0
"hi!"       Should Return: 3
"@!#$%^&*()" Should Return: 10
"trick 0 you" Should Return: 11
"funny/b/b /n" Should Return: 13
"This is a long string of words to test your strLen function :)" Should Return: 62
```

Part2: Check (in Exam2asm.s): Function checks if two char strings are equal

TESTCASES: (there are 7 testcases for Check)

For each test, row one has the first string and row two has the second string

```
(1) Should Output: 1   ""
                        ""

(2) Should Output: 1   "The University of Texas at Austin"
                        "The University of Texas at Austin"

(3) Should Output: 1   "123456789"
                        "123456789"

(4) Should Output: 0   "this is same"
                        "this is not same"

(5) Should Output: 0   "what if there is no space"
                        "whatifthereisnospace"

(6) Should Output: 0   "how about a space at the end"
                        "how about a space at the end "

(7) Should Output: 1   "!@#$%^ ^ &*()__--"
                        "!@#$%^ ^ &*()__--"
```

Part3: fix (in Exam2.c): Removes all instances of the remove string from the words string
(reference Sentence struct in Exam2.h)

TESTCASES: (there are 7 testcases for fix)

For each test, row one is the struct at input

row two is what the struct should look like when you return

```
(1) {"Alice was not here."}, {"not "}, -1}
    {"Alice was here."}, {"not "}, 1}

(2) {"Winter Summer is coming."}, {"Winter "}, -1}
    {"Summer is coming."}, {"Winter "}, 1}

(3) {"Oatmeal raisin cookies are the bestest."}, {"est."}, -1}
```

```
    {"Oatmeal raisin cookies are the best"},    {"est."}, 1}
(4) {"Vvickie ivs mvakinvg mvore vvvtest cvvasvvesv..v."}, {"v"}, -1}
    {"Vickie is making more test cases..."},    {"v"}, 14}
(5) {"Puppies"}, {""}, -1}
    {"Puppies"}, {""}, 0}
(6) {""}, {"a"}, -1}
    {""}, {"a"}, 0}
(7) {"SOSOk SO SOSThiSOSs iS SOSthe laSOst oneSOS!SOS"}, {"SOS"}, -1}
    {"Ok SO this iS the laSOst oneSOS!"},    {"SOS"}, 5}
```