

York University
Lassonde school of Engineering
Dept. of Electrical Engineering and Computer Science
EECS2032
Introduction to Embedded Systems
Fall 2021

EECS2032

Test 1 makeup

Thursday Nov 15, 2021

Time 12:30-1:30

SUBMISSION submit 2032E LABTEST1MU filename

Problem 1 5 points

Write a shell script that reads (reads not a command line argument) an integer. Then it prints YES or NO if the integer is a perfect square or not. A perfect square is an integer that is made by squaring another integer (4, 36, 49, 100, ...)

File name Labtest1mu_1.sh

Problem 2. 5 points

Read 4 words (a word is terminated by a white space) from the standard input. Display YES or NO depends on is there a repeated word in these 4 words, or not?

File name: labtest1mu_2.sh

Problem 3. 5 points

A small business keeps its record in a plain text file. Fields are separated by an exclamation mark '!'

The first file is "names.txt" the fields are name, location, phone number.

The second file "salary.txt" with fields names, salary (floating point number).

Write a shell script that reads a location and prints the names of all the employees in this location and their salaries.

The data are printed each employee and salary on a separate line.

EX:

names.txt

```
Paul Allen!LAS 120!555-1212
Susan Sieg!BRG!555-6547
Wilma Flintstone!BRG!555-1234
Fred Flintstone!LAS120!555-0101
Alan Turning!BRG!555-2323
```

salary.txt

```
Paul Allen!3412.23
Susan Sieg!2899.66
Wilma Flintstone!1925.00
Fred Flintstone!4182.33
Alan Turning!2256.50
```

If the input is BRG

The output is

```
Susan Sieg 2899.66
Wilma Flintstone 1925.00
Alan Turning 2256.50
```

Filename: labtest1mu_3.sh

Problem 4. 5 points

Write a sed command/expression/file to delete all lines that contains 2 or more capital letters (not necessarily consecutive).

By command/expression/file, I mean what you will put in a file for example labtest1mu_4.sed

Then the command

```
sed -f labtest1mu_4.sed my input text file
```

It displays on the screen all the lines that does not contains two capital letters

File name labtest1mu_4.sh