Lab Tasks

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BSCS SEMESTER – 5

RIPHAH INTERNATIONAL UNIVERSITY

ISLAMABAD, PAKIST

Lab Tasks:

Exercise 1:

Put this code in a file and executes with two arguments.

echo “The following is the output of $0 script:”
echo “The total number of command line argument:$#”
echo “The first parameter:$1”
echo “The second parameter:$2”

Solution:

```
#!/bin/bash
echo "The following is the output of $0 script:"
echo "The total number of command line argument:$#"
echo "The first parameter is:$1"
echo "The Second parameter is:$2"

~
```

```
~
"Task.sh" [New] 6L, 181B written
[root@localhost ~]# chmod 777 Task.sh
```

```
[root@localhost ~]# ./Task.sh argument1 argument2
The following is the output of ./Task.sh script:
The total number of command line argument:2
The first parameter is:argument1
The Second parameter is:argument2
[root@localhost ~]#
```

Exercise 2:

Write a program to take value from user between 1 to 5.and display result like this:

1. …you pressed 1
2. …you pressed 2

Above 5….invalid

Solution:

```
#!/bin/bash
echo "Please enter a number between 1and 5:"
read number
case $number in
1) echo "...you pressed 1";;
2) echo "...you pressed 2";;
3) echo "...you pressed 3";;
4) echo "...you pressed 4";;
5) echo "...you pressed 5";;
*) echo "Above 5... invalid";;
esac
```

```
"Task2.sh" [New] 11L, 266B written
[root@localhost ~]# chmod 777 Task2.sh
[root@localhost ~]# ./Task2.sh
Please enter a number between 1and 5:
6
Above 5... invalid
```

Exercise 3:

There are three semesters in an academic year i.e. Fall (Aug-Jan), Spring (Feb-May) and Summer (Jun-July). Write a script which read current month from the user and determine running semester. For example if user enters current month either 1 or January or Jan the script should display “Fall Semester”.

Solution:

```
#!/bin/bash
echo "Please Enter the current month (e.g 1, January, Jan):"
read month
#conver input to lowercase for easy matching
month=$(echo "$month" | tr '[:upper:]' '[:lower:]')
case $month in
1|jan|january|8|aug|august|9|sep|september|10|oct|october|11|nov|november|12|dec
|december)
echo "Fall Semester";;
2|feb|february|3|mar|march|4|apr|april|5|may)
echo "Spring Semester";;
6|jun|june|7|jul|july)
echo "Summer Semester";;
*) echo "Invalid Output. Please Enter a Valid month";;
esac
~
```

```
"semester.sh" [New] 14L, 490B written
[root@localhost ~]# chmod 777 semester.sh
[root@localhost ~]# ./semester.sh
Please Enter the current month (e.g 1, January, Jan):
oct
Fall Semester
```

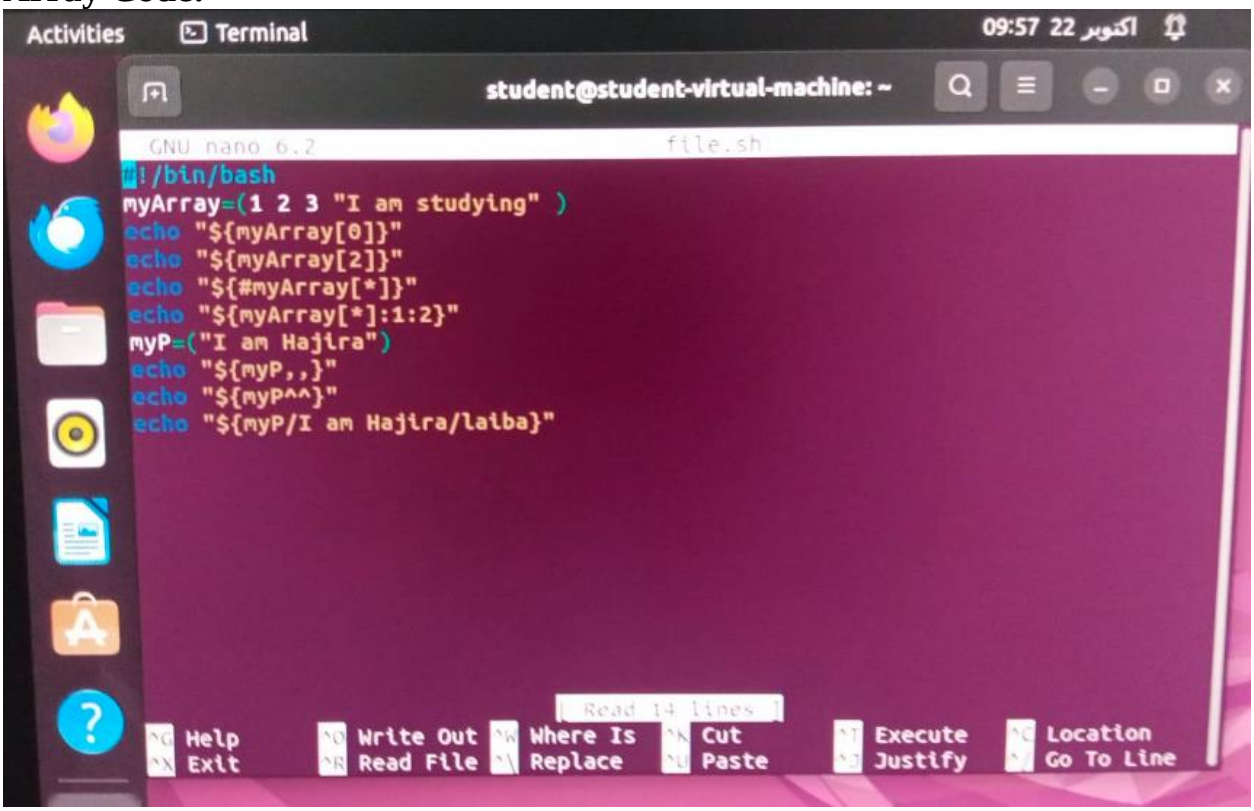
Exercise 4:

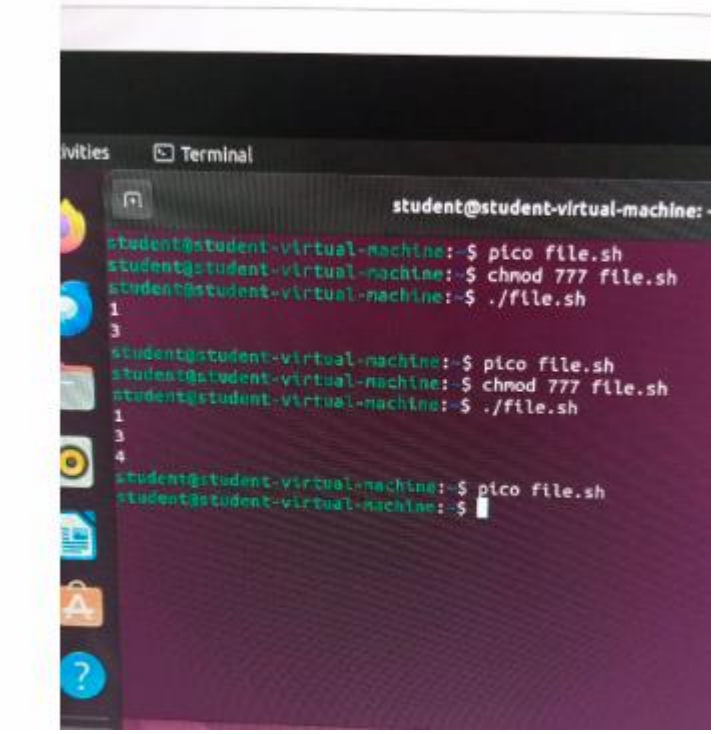
Write a program in shell scripting and attached screenshots with explanations

1. Perform array and string code in shell scripting
2. Perform If Else code in Shell Scripting
3. Perform Case related code in shell scripting

Hhhhh

Array Code:





String code:

```
#!/bin/bash
str1="Hello"
str2="World"
if [ "$str1" = "$str2" ];
then
echo "Strings are equal"
else
echo "Strings are not equal"
fi
~
```

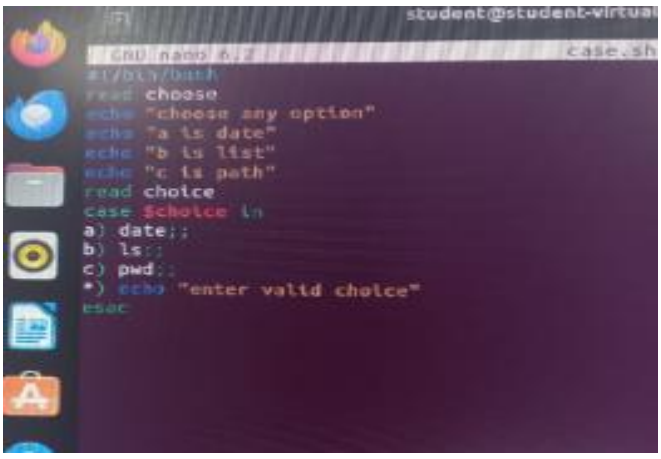
```
"string.sh" [New] 9L, 133B written
[root@localhost ~]# chmod 777 string.sh
[root@localhost ~]# ./string.sh
Strings are not equal
[root@localhost ~]#
```

IF Else Code:

```
#!/bin/bash
str1="Hello"
str2="World"
if [ "$str1" = "$str2" ];
then
echo "Strings are equal"
else
echo "Strings are not equal"
fi
~
```

```
"string.sh" [New] 9L, 133B written
[root@localhost ~]# chmod 777 string.sh
[root@localhost ~]# ./string.sh
Strings are not equal
[root@localhost ~]#
```

3. Case Related:




```
student@student-virtual-machine:~$ pico case.sh
student@student-virtual-machine:~$
student@student-virtual-machine:~$ chmod 777 case.sh
student@student-virtual-machine:~$ ./case.sh
choose any option
a is date
b is list
c is path
a
10:16:44 و PKT 2024 اكتوبر 22 ت
student@student-virtual-machine:~$
```