Lab/Project Assignment Report

Only for course Teacher						
		Needs Improvement	Developing	Sufficient	Above Average	Total Mark
Allocate mark & Percentage		25%	50%	75%	100%	5
Creativity	1					
Content Development	2					
Problem solving	1					
Organization and Formatting	1					
					Total obtained mark	
Comments						

Semester: Spring ……….. / Fall …2023……

Student Name: Abid Hasan

Student ID: 221-35-1047

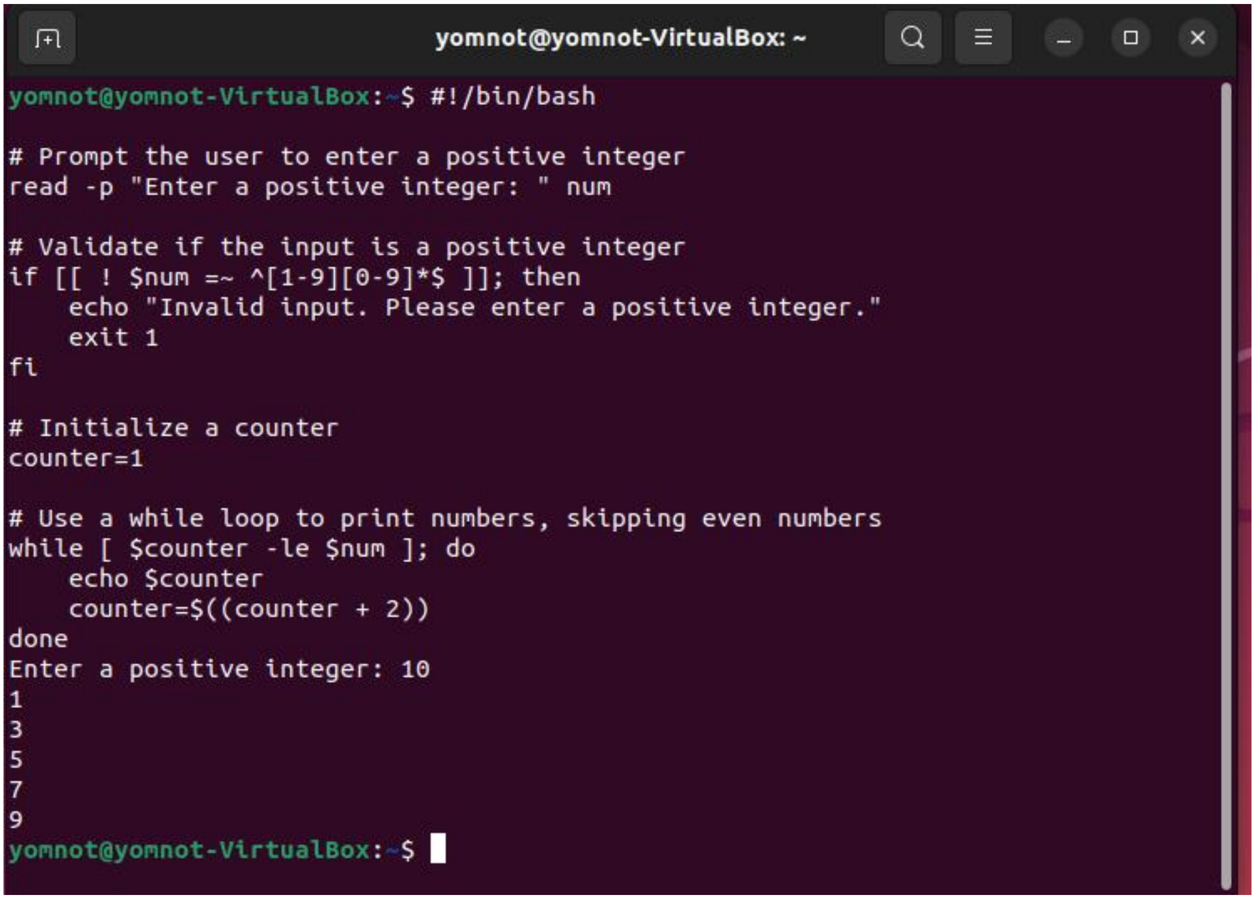
Batch: 37 Section: E

Course Code: SE 233 Course Name: Operating System and System Programming Lab

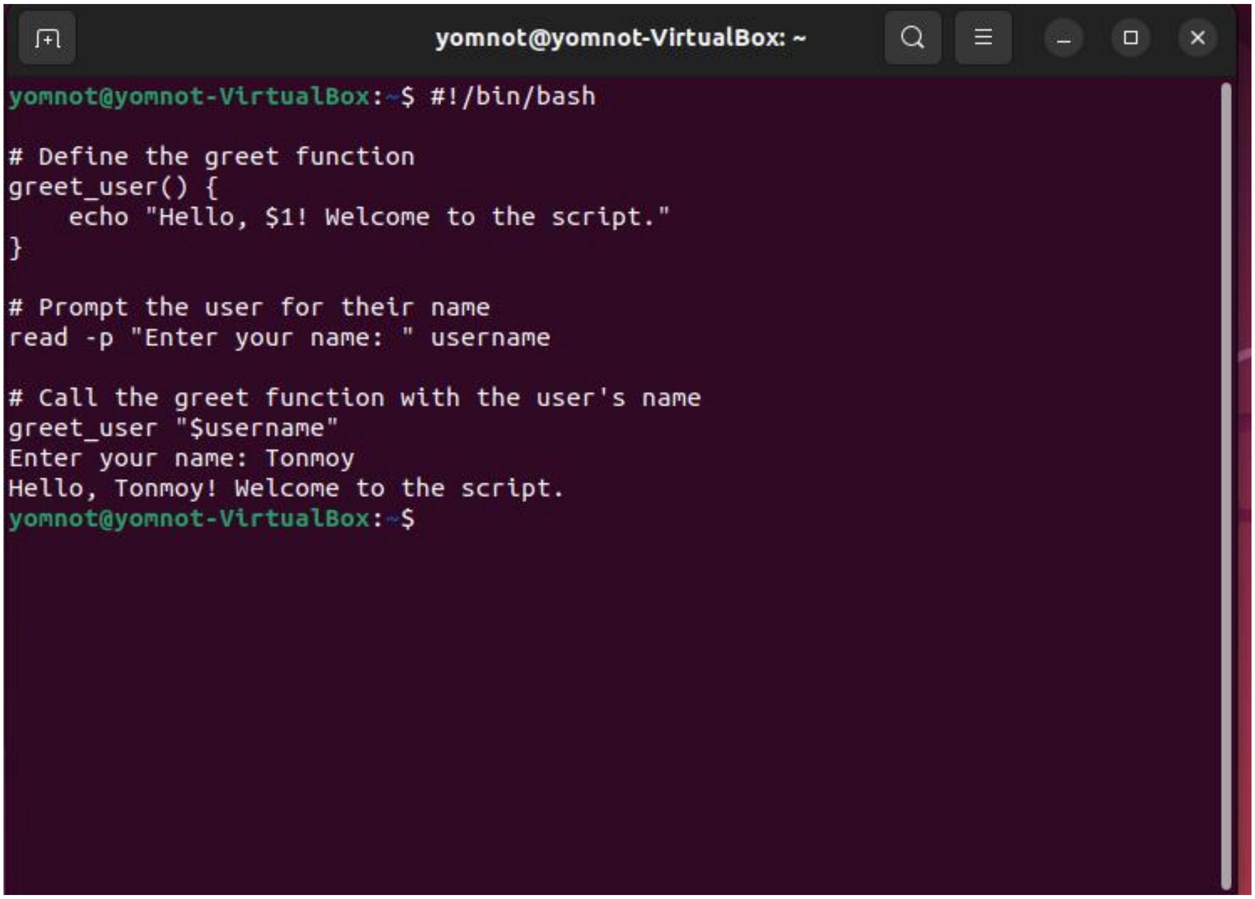
Course Teacher Name: Ishrat Sultana

Designation: Lecturer Department of Software Engineering

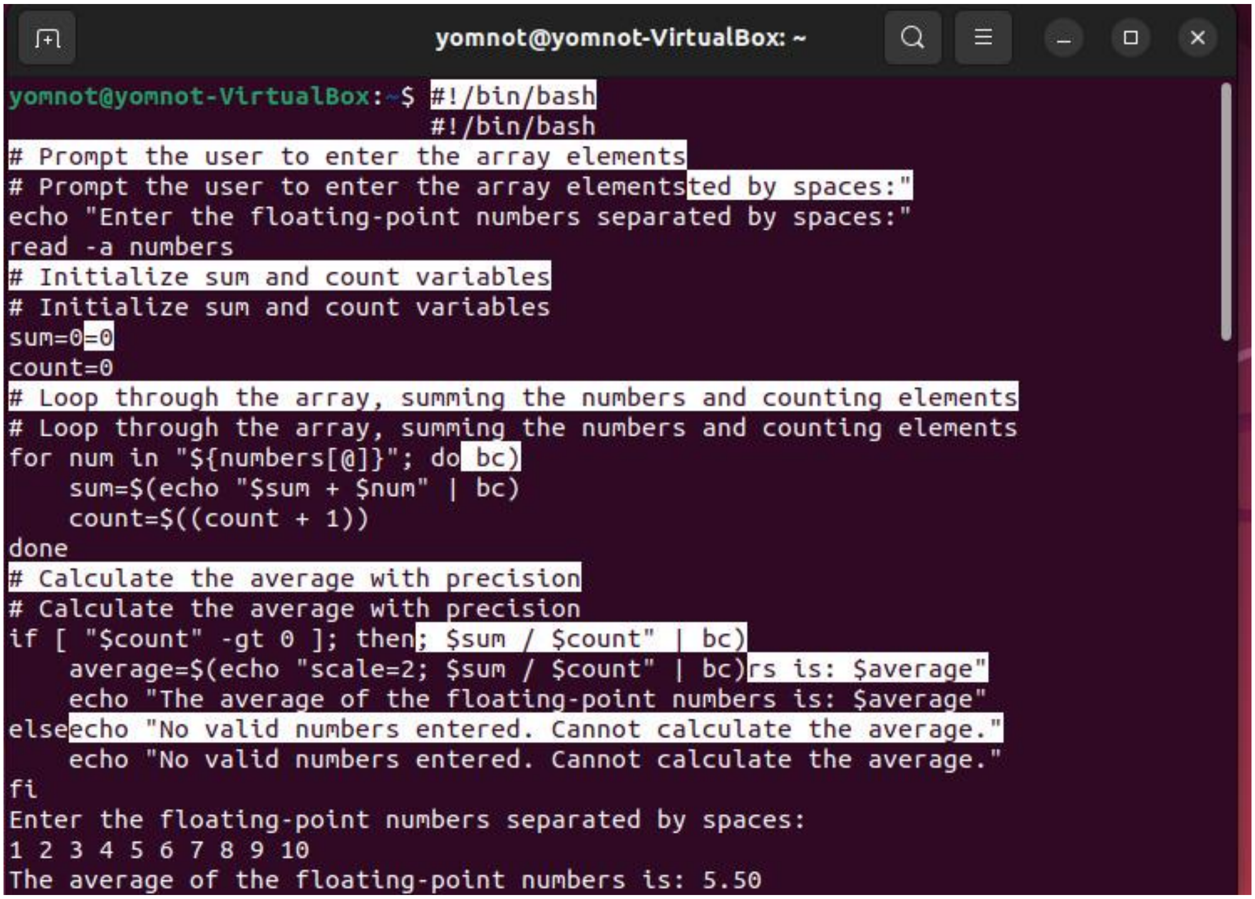
Lab Task 02



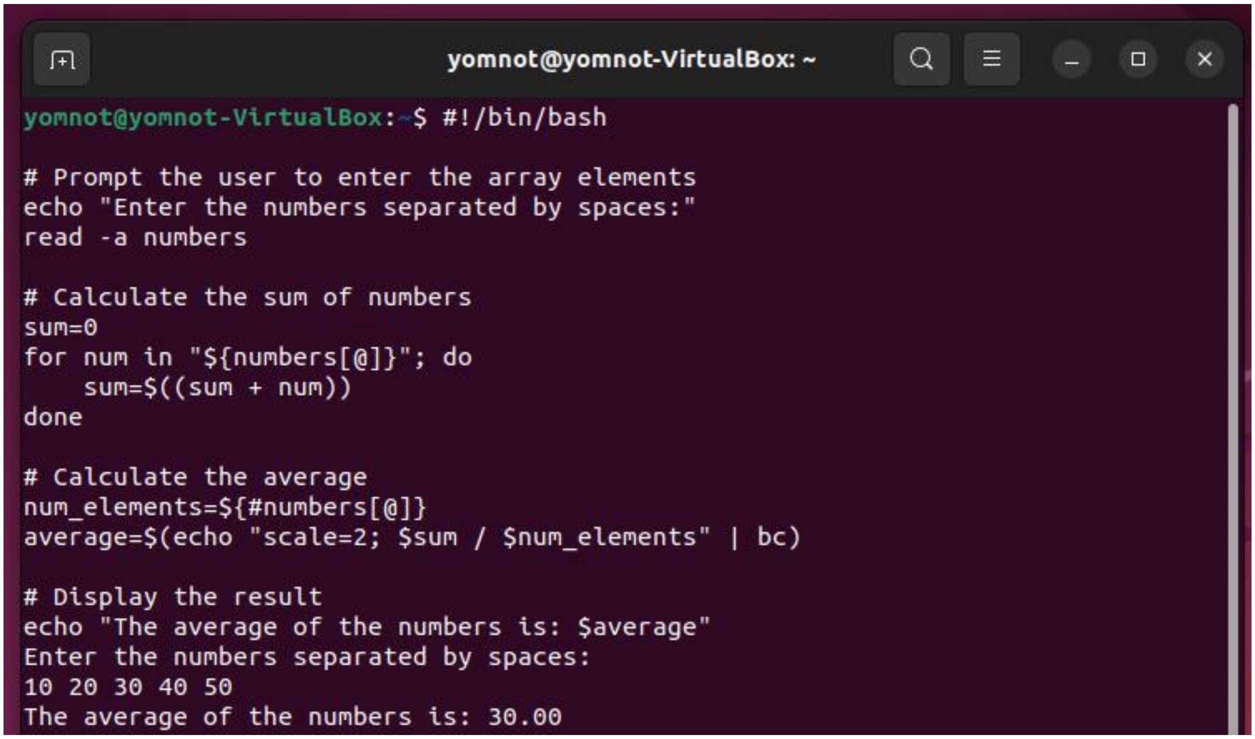
```
yomnot@yomnot-VirtualBox:~$ #!/bin/bash

# Prompt the user to enter a positive integer
read -p "Enter a positive integer: " num

# Validate if the input is a positive integer
if [[ ! $num =~ ^[1-9][0-9]*$ ]]; then
    echo "Invalid input. Please enter a positive integer."
    exit 1
fi

# Initialize a counter
counter=1

# Use a while loop to print numbers, skipping even numbers
while [ $counter -le $num ]; do
    echo $counter
    counter=$((counter + 2))
done
Enter a positive integer: 10
1
3
5
7
9
yomnot@yomnot-VirtualBox:~$ 
```



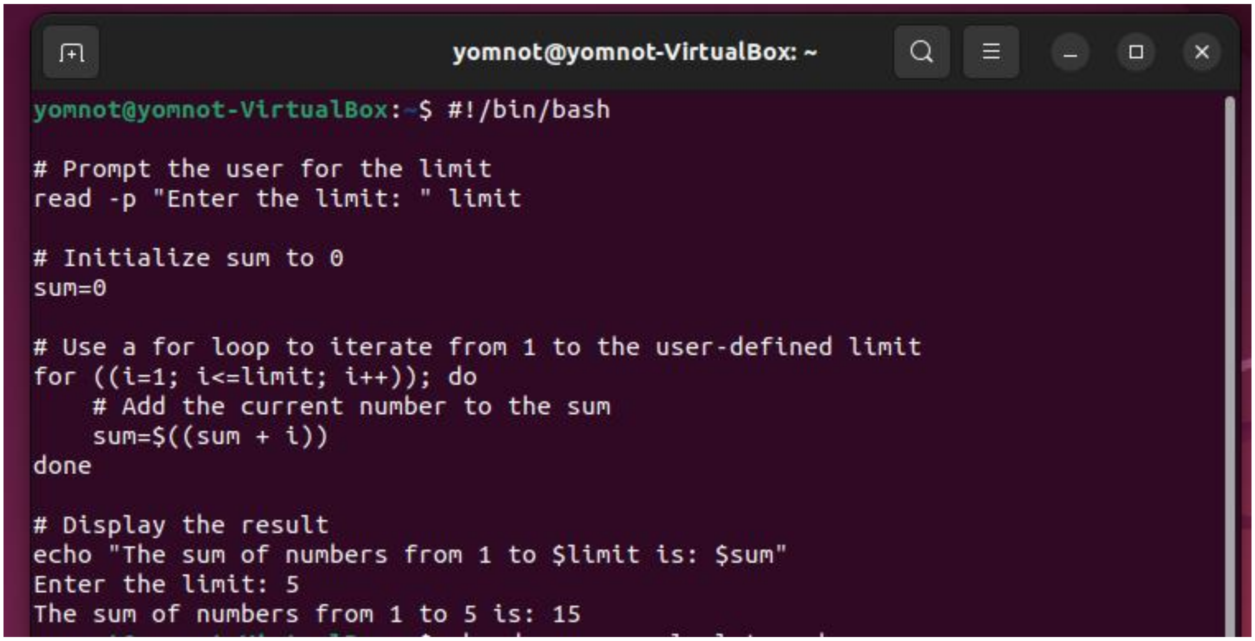
```
yomnot@yomnot-VirtualBox:~$ #!/bin/bash

# Define the greet function
greet_user() {
    echo "Hello, $1! Welcome to the script."
}

# Prompt the user for their name
read -p "Enter your name: " username

# Call the greet function with the user's name
greet_user "$username"
Enter your name: Tonmoy
Hello, Tonmoy! Welcome to the script.
yomnot@yomnot-VirtualBox:~$
```



```
yomnot@yomnot-VirtualBox:~$ #!/bin/bash
                            #!/bin/bash
# Prompt the user to enter the array elements
# Prompt the user to enter the array elementsted by spaces:"
echo "Enter the floating-point numbers separated by spaces:"
read -a numbers
# Initialize sum and count variables
# Initialize sum and count variables
sum=0=0
count=0
# Loop through the array, summing the numbers and counting elements
# Loop through the array, summing the numbers and counting elements
for num in "${numbers[@]}"; do bc)
    sum=$(echo "$sum + $num" | bc)
    count=$((count + 1))
done
# Calculate the average with precision
# Calculate the average with precision
if [ "$count" -gt 0 ]; then; $sum / $count" | bc)
    average=$(echo "scale=2; $sum / $count" | bc)rs is: $average"
    echo "The average of the floating-point numbers is: $average"
elseecho "No valid numbers entered. Cannot calculate the average."
    echo "No valid numbers entered. Cannot calculate the average."
fi
Enter the floating-point numbers separated by spaces:
1 2 3 4 5 6 7 8 9 10
The average of the floating-point numbers is: 5.50
```



```
yomnot@yomnot-VirtualBox:~$ #!/bin/bash

# Prompt the user to enter the array elements
echo "Enter the numbers separated by spaces:"
read -a numbers

# Calculate the sum of numbers
sum=0
for num in "${numbers[@]}"; do
    sum=$((sum + num))
done

# Calculate the average
num_elements=${#numbers[@]}
average=$(echo "scale=2; $sum / $num_elements" | bc)

# Display the result
echo "The average of the numbers is: $average"
Enter the numbers separated by spaces:
10 20 30 40 50
The average of the numbers is: 30.00
```



```
yomnot@yomnot-VirtualBox:~$ #!/bin/bash

# Prompt the user for the limit
read -p "Enter the limit: " limit

# Initialize sum to 0
sum=0

# Use a for loop to iterate from 1 to the user-defined limit
for ((i=1; i<=limit; i++)); do
    # Add the current number to the sum
    sum=$((sum + i))
done

# Display the result
echo "The sum of numbers from 1 to $limit is: $sum"
Enter the limit: 5
The sum of numbers from 1 to 5 is: 15
```