Experiment 2

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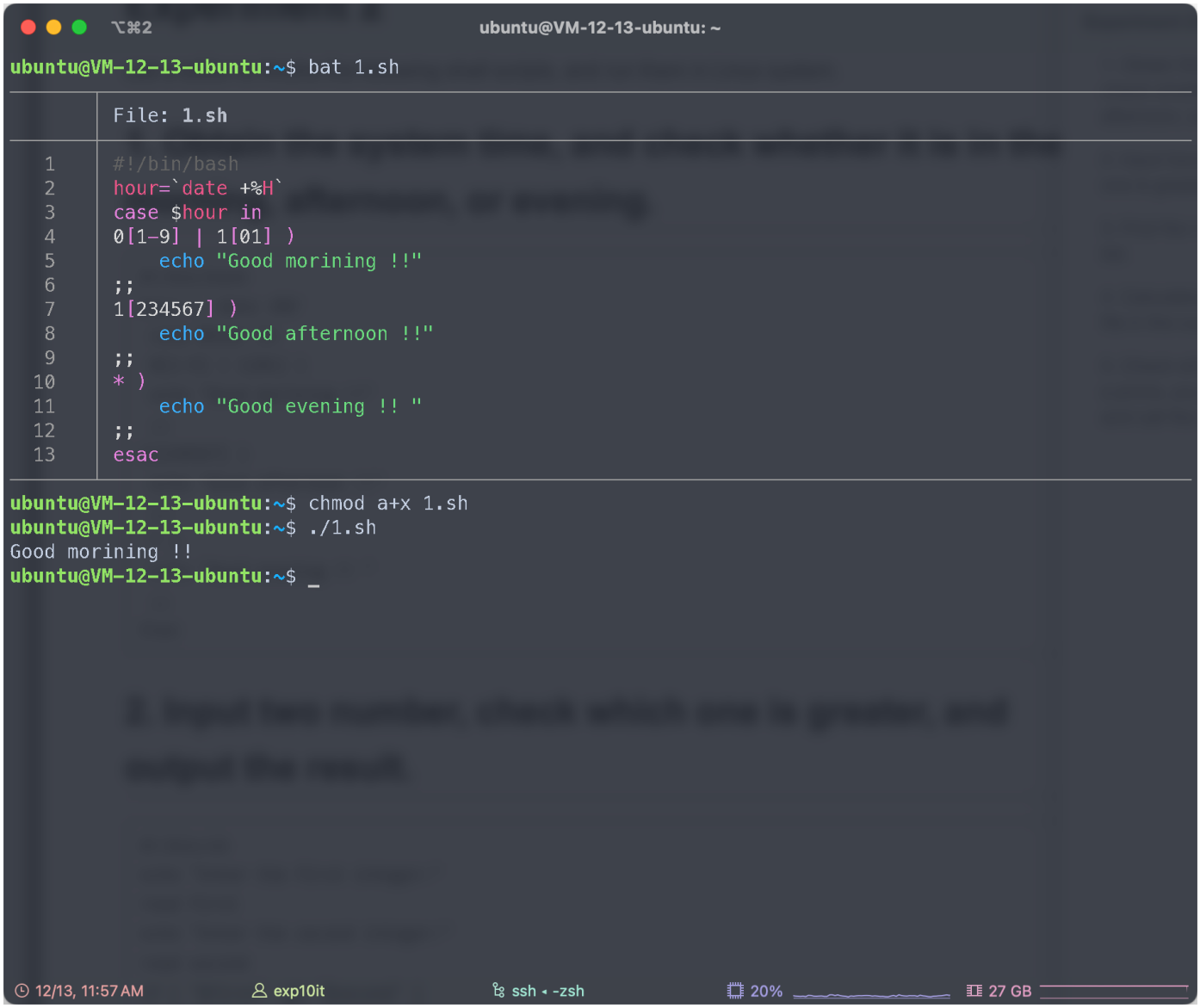
1. Obtain the system time, and check whether it is in the morning, afternoon, or evening.

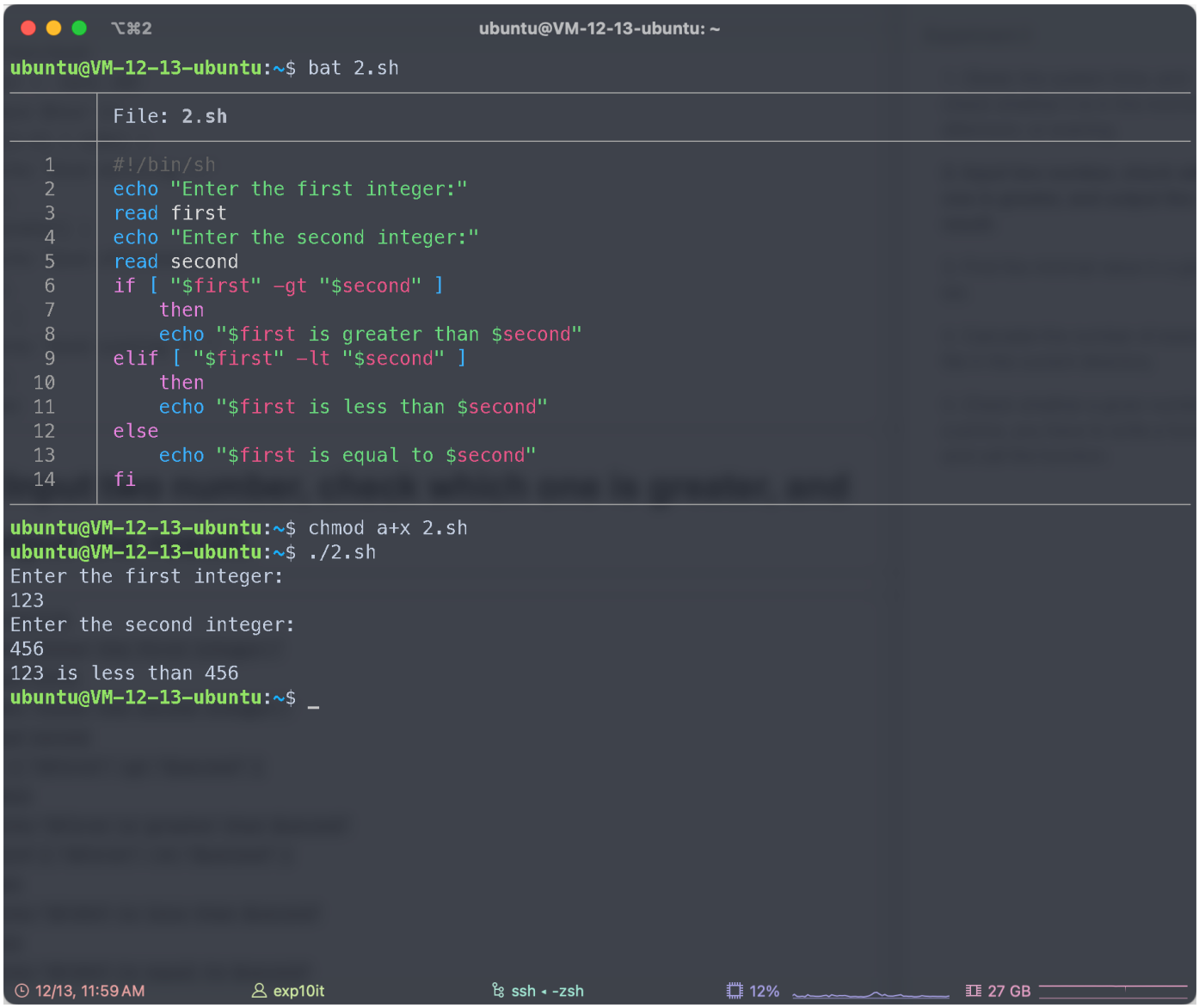
```
#!/bin/bash
hour=`date +%H`
case $hour in
0[1-9] | 1[01] )
    echo "Good morining !!"
;;
1[234567] )
    echo "Good afternoon !!"
;;
* )
    echo "Good evening !! "
;;
esac
```



2. Input two number, check which one is greater, and output the result.

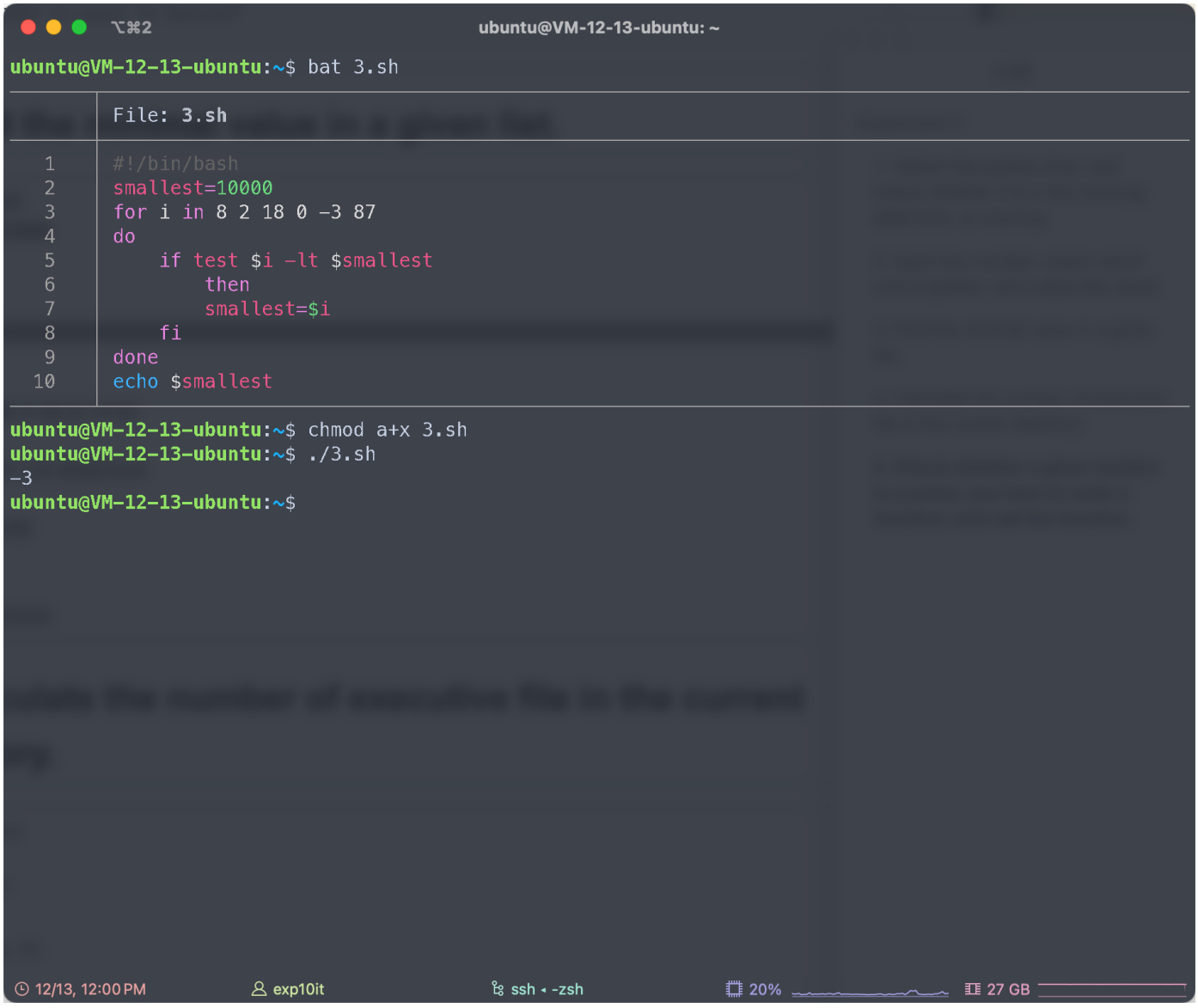
```
#!/bin/sh
echo "Enter the first integer:"
read first
echo "Enter the second integer:"
read second
if [ "$first" -gt "$second" ]
    then
    echo "$first is greater than $second"
elif [ "$first" -lt "$second" ]
    then
```

```
    echo "$first is less than $second"
else
    echo "$first is equal to $second"
fi
```



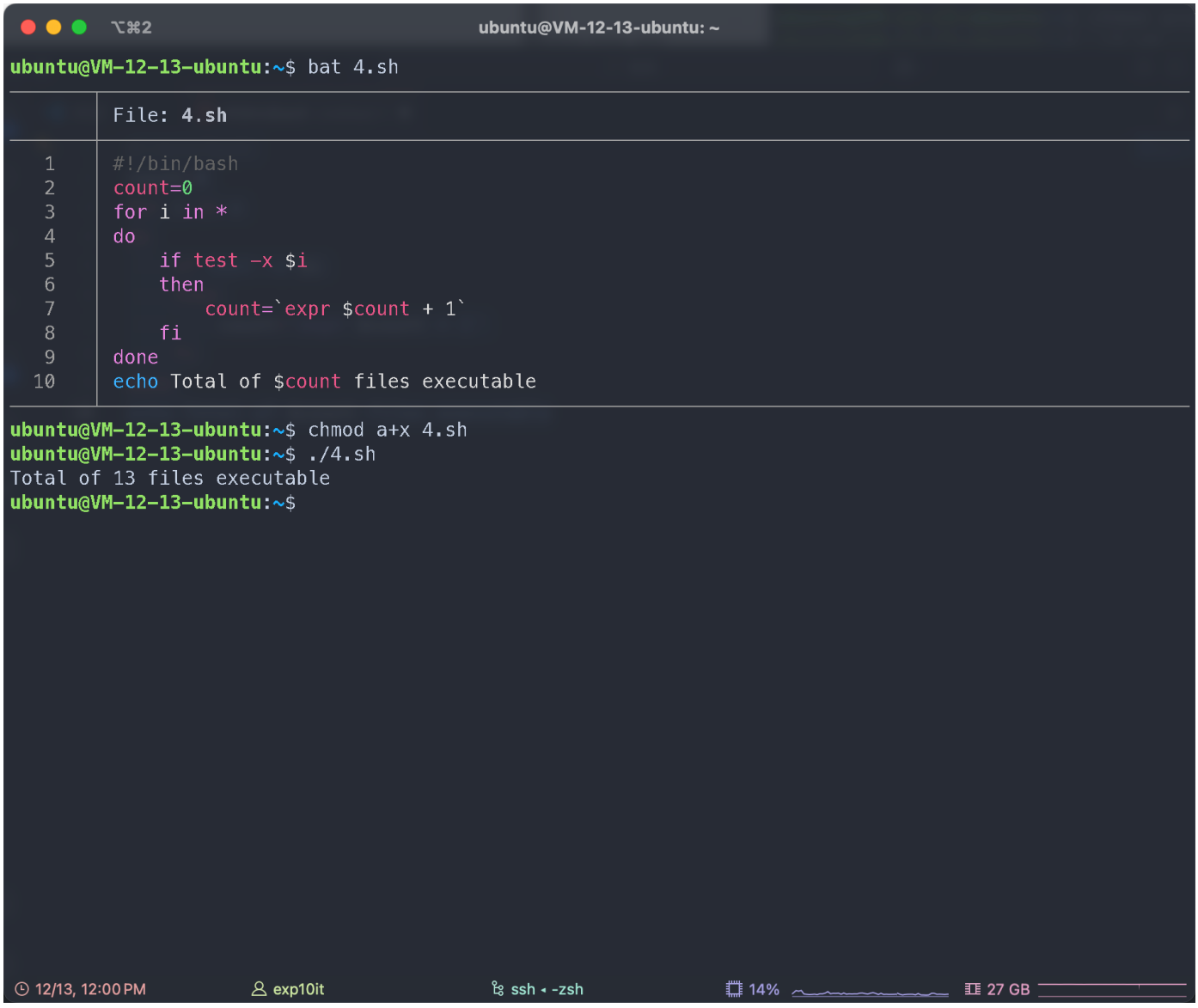
3. Find the minimal value in a given list.

```bash
#!/bin/bash
smallest=10000
for i in 8 2 18 0 -3 87
do
    if test $i -lt $smallest
        then
        smallest=$i
    fi
done
echo $smallest
```



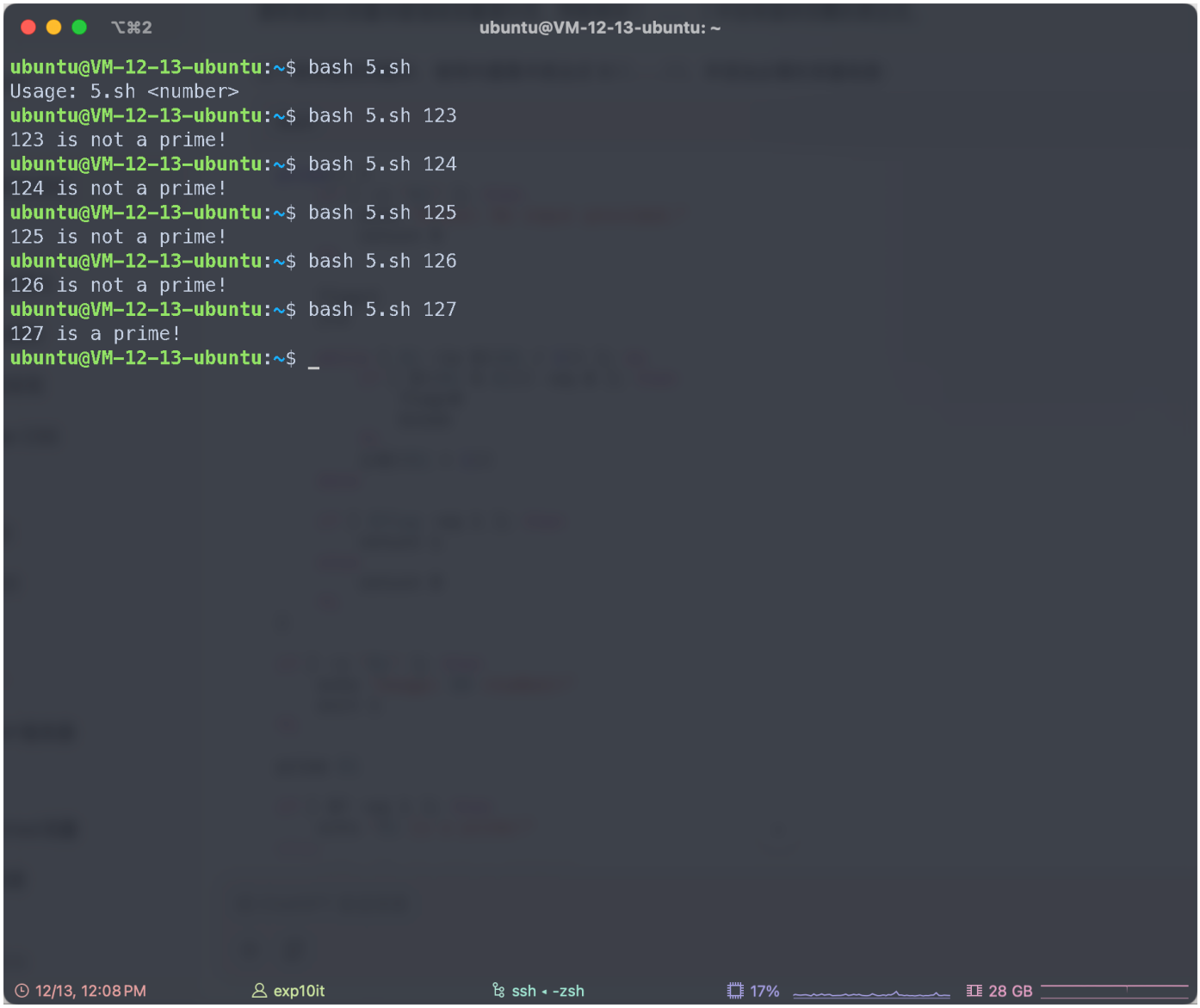
4. Calculate the number of executive file in the current directory.

```
#!/bin/bash
count=0
for i in *
do
    if test -x $i
    then
        count=`expr $count + 1`
    fi
done
echo Total of $count files executable
```



5. Check whether a given number is a prime, you have to write a function, and call the function.

```
prime() {
    if [ -z "$1" ]; then
        echo "Error: No input provided."
        return 0
    fi

    flag=1
    j=2

    while [ $j -le $(($1 / 2)) ]; do
        if [ $(($1 % $j)) -eq 0 ]; then
            flag=0
            break
        fi
        j=$(($j + 1))
    done

    if [ $flag -eq 1 ]; then
        return 1
    else
        return 0
    fi
}

if [ -z "$1" ]; then
    echo "Usage: $0 <number>"
    exit 1
fi

prime $1

if [ $? -eq 1 ]; then
    echo "$1 is a prime!"
else
    echo "$1 is not a prime!"
fi
```


⌥⌘2
ubuntu@VM-12-13-ubuntu: ~
ubuntu@VM-12-13-ubuntu:~$ bash 5.sh
Usage: 5.sh <number>
ubuntu@VM-12-13-ubuntu:~$ bash 5.sh 123
123 is not a prime!
ubuntu@VM-12-13-ubuntu:~$ bash 5.sh 124
124 is not a prime!
ubuntu@VM-12-13-ubuntu:~$ bash 5.sh 125
125 is not a prime!
ubuntu@VM-12-13-ubuntu:~$ bash 5.sh 126
126 is not a prime!
ubuntu@VM-12-13-ubuntu:~$ bash 5.sh 127
127 is a prime!
ubuntu@VM-12-13-ubuntu:~$ _
12/13, 12:08 PM
exp10it
ssh • -zsh
17%
28 GB