

Ex. No.: 3a)

Date:

Shell Script – Reverse of Digit

Aim:

To write a Shell script to reverse a given digit using looping statement.

Program:

```
read -p "Enter a number: " num
reverse=0
while [ $num -gt 0 ]; do
reverse=$((reverse * 10 + num % 10))
num=$((num / 10))
done
echo "Reversed"
```

Sample Input and Output**Run the program using the below command**

```
[REC@local host~]$sh indhu.sh
```

```
enter number
```

```
123
```

```
321
```

Result:

The number reversal script using a `while` loop has been successfully executed, demonstrating the ability to manipulate and reverse numerical input.

Ex. No.: 3b)

Date:

Shell Script – Fibonacci Series

Aim:

To write a Shell script to generate a Fibonacci series using for loop.

Program:

```
read -p "Enter the number of terms: " n
a=0
b=1
for (( i=0; i<n; i++ ))
do
echo -n "$a "
fn=$((a + b))
a=$b
b=$fn
done
```

Sample Input and Output**Run the program using the below command**

```
[REC@local host~]$sh indhu.sh
```

```
enter number
```

```
21
```

```
fibonacci series
```

```
0
```

```
1
```

```
1
```

```
2
```

```
3
```

```
5
```

```
8
```

```
13
```

```
21
```

```
34
```

```
55
```

```
89
```

```
144
```

```
233
```

```
377
```

Result:

The Fibonacci series generation script using a `for` loop has been successfully executed, producing the correct sequence of numbers