Started on	Monday, 28 October 2024, 2:25 PM
State	Finished
Completed on	Monday, 28 October 2024, 2:47 PM
Time taken	21 mins 31 secs
Marks	4.00/5.00
Grade	**80.00** out of 100.00

Question **1**

Correct

Mark 1.00 out of 1.00

A 75m long train is running at 54 km/hr. Write a python program to find the time taken to cross an electric pole? [Distance = speed*time]

Hint : Convert km/hr to m/sec by multiplying with (5/18)

Answer: (penalty regime: 0 %)

```
distance=75
speed=15
time=distance/speed
print(time)
```

	Expected	Got	
✔	5.0	5.0	✔

Passed all tests! ✔

Correct

Marks for this submission: 1.00/1.00.

Question **2**

Correct

Mark 1.00 out of 1.00

Consider a empty list . You can perform the following commands:

1. Insert integer e at position i.
2. Print the list.
3. Delete the first occurrence of integer e.
4. Insert integer e at the end of the list.
5. Sort the list.
6. Pop the last element from the list.
7. Reverse the list.

Initialize your list and read in the value of n followed by n lines of commands where each command will be of the 7 types listed above. Iterate through each command in order and perform the corresponding operation on your list.

Example

$N = 4$
append 1
append 2
insert 3 1
print

- **append 1**: Append 1 to the list, $arr = [1]$.
- **append 2**: Append 2 to the list, $arr = [1, 2]$.
- **insert 3 1**: Insert 3 at index 1, $arr = [1, 3, 2]$.
- **print**: Print the array.
  Output:

```
[1, 3, 2]
```

Input Format

The first line contains an integer, n, denoting the number of commands.
Each line i of the n subsequent lines contains one of the commands described above.

Constraints

- The elements added to the list must be *integers*.

Output Format

For each command of type `print`, print the list on a new line.

For example:

Input	Result
12 insert 0 5 insert 1 10 insert 0 6 print remove 6 append 9 append 1 sort print pop reverse print	[6, 5, 10] [1, 5, 9, 10] [9, 5, 1]

Answer: (penalty regime: 0 %)

```
N=int(input())
l=[]
for i in range(N):
    s=input().split()
    if s[0]=='insert':
        l.insert(int(s[1]),int(s[2]))
    elif s[0]=='remove':
        l.remove(int(s[1]))
    elif s[0]=='append':
        l.append(int(s[1]))
    elif s[0]=='pop':
        l.pop()
    elif s[0]=='sort':
        l.sort()
    elif s[0]=='reverse':
        l.reverse()
    elif s[0]=='print':
        print(l)
```

	Input	Expected	Got	
✔	12 insert 0 5 insert 1 10 insert 0 6 print remove 6 append 9 append 1 sort print pop reverse print	[6, 5, 10] [1, 5, 9, 10] [9, 5, 1]	[6, 5, 10] [1, 5, 9, 10] [9, 5, 1]	✔

Passed all tests! ✔

Correct

Marks for this submission: 1.00/1.00.

Question **3**

Correct

Mark 1.00 out of 1.00

The included code stub will read an integer, n, from STDIN.

Without using any build-in methods, try to print the numbers in reverse order

Example

n= 1234

Print the string 4321

Input Format

The first line contains an integer n.

Constraints

$1 \leq n \leq 150$

Output Format

Print the list of integers from 1 through n as a string, without spaces.

For example:

Input	Result
321	123

Answer: (penalty regime: 0 %)

```
a=input().split()
for i in a:
    print(i[::-1],end="")

```

	Input	Expected	Got	
✔	321	123	123	✔

Passed all tests! ✔

Correct

Marks for this submission: 1.00/1.00.

Question **4**

Not answered

Mark 0.00 out of 1.00

Write a Python program to Get the employee and doctor details & display it using Hierarchical inheritance.

Note: create a parent (base) class name **Details** and two child (derived) classes named **Employee** and **Doctor**.

For example:

Input	Result
1 sharma male Tata pharma 12 revathi female aims ENT	Employee Object Id: 1 Name: sharma Gender: male Company: Tata Department: pharma Doctor Object Id: 12 Name: revathi Gender: female Hospital: aims Department: ENT

Answer: (penalty regime: 0 %)

```
1
```

Question **5**

Correct

Mark 1.00 out of 1.00

Let's dive into the interesting topic of regular expressions! You are given some input, and you are required to check whether they are valid mobile numbers.

A valid mobile number is a ten digit number starting with a $7, 8$ or 9.

Concept

A valid mobile number is a ten digit number starting with a $7, 8$ or 9.

Regular expressions are a key concept in any programming language. A quick explanation with Python examples is available here. You could also go through the link below to read more about regular expressions in Python.

Input Format

The first line contains an integer N, the number of inputs.
N lines follow, each containing some string.

Constraints

$1 \leq N \leq 10$

$2 \leq len(Number) \leq 15$

Output Format

For every string listed, print "*YES*" if it is a valid mobile number and "*NO*" if it is not on separate lines. Do not print the quotes.

For example:

Input	Result
2 9587456281 1252478965	YES NO

Answer: (penalty regime: 0 %)

```
import re
num=int(input())
for i in range(num):
    n=input()
    p=("[7|8|9]\d{9}")
    if re.match(p,n):
        print("YES")
    else:
        print("NO")
```

	Input	Expected	Got	
✔	2 9587456281 1252478965	YES NO	YES NO	✔

Passed all tests! ✔

Correct

Marks for this submission: 1.00/1.00.