

Started on	Saturday, 10 May 2025, 1:22 PM
State	Finished
Completed on	Saturday, 10 May 2025, 1:41 PM
Time taken	18 mins 36 secs
Grade	80.00 out of 100.00

Question 1

Correct

Mark 20.00 out of 20.00

Create a Dynamic Programming python Implementation of Coin Change Problem.

For example:

Test	Input	Result
count(arr, m, n)	3	4
	4	
	1	
	2	
	3	

Answer: (penalty regime: 0 %)

Reset answer

```

1 def count(S, m, n):
2     table = [[0 for x in range(m)] for x in range(n+1)]
3     for i in range(m):
4         table[0][i] = 1
5     for i in range(1, n+1):
6         for j in range(m):
7             x=table[i-S[j]][j] if i-S[j]>=0 else 0
8             y=table[i][j-1] if j>=1 else 0
9             table[i][j]=x+y
10    return table[n][m-1]
11
12 arr = []
13 m = int(input())
14 n = int(input())
15 for i in range(m):
16     arr.append(int(input()))
17 print(count(arr, m, n))

```

	Test	Input	Expected	Got	
✓	count(arr, m, n)	3	4	4	✓
		4			
		1			
		2			
		3			
✓	count(arr, m, n)	3	20	20	✓
		16			
		1			
		2			
		5			

Passed all tests! ✓

Correct

Marks for this submission: 20.00/20.00.

Question 2

Incorrect

Mark 0.00 out of 20.00

Print All Paths With Minimum Jumps

1. You are given a number N representing number of elements.
2. You are given N space separated numbers (ELE : elements).
3. Your task is to find & print
 - 3.1) "MINIMUM JUMPS" need from 0th step to (n-1)th step.
 - 3.2) all configurations of "MINIMUM JUMPS".

NOTE: Checkout sample question/solution video inorder to have more insight.

For example:

Test	Input	Result
minJumps(arr)	10	0 -> 3 -> 5 -> 6 -> 9
	3	0 -> 3 -> 5 -> 7 -> 9
	3	
	0	
	2	
	1	
	2	
	4	
	2	
	0	
	0	

Answer: (penalty regime: 0 %)

Reset answer

```

1 from queue import Queue
2 import sys
3 class Pair(object):
4     idx = 0
5     psf = ""
6     jmps = 0
7     def __init__(self, idx, psf, jmps):
8
9         self.idx = idx
10        self.psf = psf
11        self.jmps = jmps
12 def minJumps(arr):
13
14     ##### Add your Code here.
15
16
17
18 def possiblePath(arr, dp):
19
20     queue = Queue(maxsize = 0)
21     p1 = Pair(0, "0", dp[0])
22     queue.put(p1)

```

Syntax Error(s)

Sorry: IndentationError: expected an indented block (__tester__.python3, line 18)

Incorrect

Marks for this submission: 0.00/20.00.

Question 3

Correct

Mark 20.00 out of 20.00

Write a python program to find the maximum contiguous subarray.

For example:

Test	Input	Result
maxSubArraySum(a,n)	8 -2 -3 4 -1 -2 1 5 -3	Maximum contiguous sum is 7

Answer: (penalty regime: 0 %)

Reset answer

```

1 def maxSubArraySum(a,size):
2     max=a[0]
3     sum=0
4     for i in range(0,n):
5         sum=sum+a[i]
6         if(sum<0):
7             sum=0
8         elif(sum>max):
9             max=sum
10    return max
11
12 n=int(input())
13 a =[] #[-2, -3, 4, -1, -2, 1, 5, -3]
14 for i in range(n):
15     a.append(int(input()))
16
17 print("Maximum contiguous sum is", maxSubArraySum(a,n))

```

	Test	Input	Expected	Got	
✓	maxSubArraySum(a,n)	8 -2 -3 4 -1 -2 1 5 -3	Maximum contiguous sum is 7	Maximum contiguous sum is 7	✓

	Test	Input	Expected	Got	
✓	maxSubArraySum(a,n)	5 1 -2 -3 4 5	Maximum contiguous sum is 9	Maximum contiguous sum is 9	✓

Passed all tests! ✓



Marks for this submission: 20.00/20.00.

Question 4

Correct

Mark 20.00 out of 20.00

LONGEST COMMON SUBSTRING PROBLEM

Given two strings 'X' and 'Y', find the length of the longest common substring.

Answer: (penalty regime: 0 %)

```
1 def lcs(x,y,m,n):
2     if(m==0 or n==0):
3         return 0
4     elif(x[m-1]==y[n-1]):
5         return 1+lcs(x,y,m-1,n-1)
6     else:
7         return max(lcs(x,y,m,n-1),lcs(x,y,m-1,n))
8 x=input()
9 y=input()
10 m=len(x)
11 n=len(y)
12 print("Length of Longest Common Substring is",lcs(x,y,m,n))
```

	Input	Expected	Got	
✓	ABC BABA	Length of Longest Common Substring is 2	Length of Longest Common Substring is 2	✓
✓	abcdxyz xyzabcd	Length of Longest Common Substring is 4	Length of Longest Common Substring is 4	✓

Passed all tests! ✓

Correct

Marks for this submission: 20.00/20.00.

Question 5

Correct

Mark 20.00 out of 20.00

Write a Python Program for printing Minimum Cost Simple Path between two given nodes in a directed and weighted graph

For example:

Test	Result
minimumCostSimplePath(s, t, visited, graph)	-3

Answer: (penalty regime: 0 %)

Reset answer

```

1 import sys
2 V = 5
3 INF = sys.maxsize
4 def minimumCostSimplePath(u, destination,
5     visited, graph):
6     if(u==destination):
7         return 0
8     visited[u]=1
9     ans=INF
10    for i in range(V):
11        if(graph[u][i]!=INF and not visited[i]):
12            curr=minimumCostSimplePath(i,destination,visited,graph)
13            if(curr<INF):
14                ans=min(ans,graph[u][i]+curr)
15    visited[u]=0
16    return ans
17
18 if __name__=="__main__":
19     graph = [[INF for j in range(V)]
20             for i in range(V)]
21     visited = [0 for i in range(V)]
22     graph[0][1] = -1

```

	Test	Expected	Got	
✓	minimumCostSimplePath(s, t, visited, graph)	-3	-3	✓

Passed all tests! ✓

Correct

Marks for this submission: 20.00/20.00.