“Week 1”

Challenge 1: *Team Contribution Multiplier*

```
"F:\project 2.0\.venv\Scripts\python.exe" "D:\PythonProject\Winter Activity 2025\Challenge _1__Team_Contribution_Multiplier.py"
Input: contributions = [1, 2, 3, 4]
Output: impact = [24, 12, 8, 6]

Input: contributions = [-1, 1, 0, -3, 3]
Output: impact = [0, 0, 9, 0, 0]

Process finished with exit code 0
```

Challenge 4: *The Deep Storage Inventory Search*

```
"F:\project 2.0\.venv\Scripts\python.exe" "D:\PythonProject\Winter Activity 2025\Challenge_4__The_Deep_Storage_Inventory_Search.py"
matrix =  [[1, 5, 9],
        [10, 11, 13],
        [12, 13, 15]]
k = 8
Output = 13

matrix =  [[1, 5, 9],
        [10, 11, 13],
        [12, 13, 15]]
k = 6
Output = 12

Process finished with exit code 0
```

Challenge 5: *Fix the Broken Expression*

```
"F:\project 2.0\.venv\Scripts\python.exe" "D:\PythonProject\Winter Activity 2025\Challenge_5__Fix_the_Broken_Expression.py"
Input:  "()())()"
Output: ['(())()', '()()()']

Input:  "(a())()"
Output: ['(a())()', '(a)()()']

Input:  ")("
Output: []

Input:  "abc"
Output: ['abc']

Input:  "((("
Output: []

Process finished with exit code 0
```

Challenge 6: *Tower of Hanoi Algorithm*

```
"F:\project 2.0\.venv\Scripts\python.exe" "D:\PythonProject\Winter Activity 2025\Challenge_6__Tower_of_Hanoi_Algorithm.py"
Input : 2
Output:
Disk 1 moved from A to B
Disk 2 moved from A to C
Disk 1 moved from B to C

Process finished with exit code 0
```

```
"F:\project 2.0\.venv\Scripts\python.exe" "D:\PythonProject\Winter Activity 2025\Challenge_6__Tower_of_Hanoi_Algorithm.py"
Input : 3
Output:
Disk 1 moved from A to C
Disk 2 moved from A to B
Disk 1 moved from C to B
Disk 3 moved from A to C
Disk 1 moved from B to A
Disk 2 moved from B to C
Disk 1 moved from A to C

Process finished with exit code 0
```

```
"F:\project 2.0\.venv\Scripts\python.exe" "D:\PythonProject\Winter Activity 2025\Challenge_6__Tower_of_Hanoi_Algorithm.py"
Input : 4
Output:
Disk 1 moved from A to B
Disk 2 moved from A to C
Disk 1 moved from B to C
Disk 3 moved from A to B
Disk 1 moved from C to A
Disk 2 moved from C to B
Disk 1 moved from A to B
Disk 4 moved from A to C
Disk 1 moved from B to C
Disk 2 moved from B to A
Disk 1 moved from C to A
Disk 3 moved from B to C
Disk 1 moved from A to B
Disk 2 moved from A to C
Disk 1 moved from B to C

Process finished with exit code 0
```