

## Set 2: Recursion with Statements *Before* Recursive Calls (Winding Phase)

Focus: Understanding top-down processing (pre-order behavior)

### MCQ 1: Print Before Recursion

```
function display(n):  
    if n == 0:  
        return  
    print(n)  
    display(n - 1)  
  
display(3)
```

**Output?**

- A) 3 2 1
- B) 1 2 3
- C) 3 2
- D) 2 1 3

### MCQ 2: Countdown with Two Recursive Calls

```
function call(n):  
    if n == 0:  
        return  
    print(n)  
    call(n - 1)  
    call(n - 1)  
  
call(2)
```

**Output?**

- A) 2 1 1
- B) 2 2 1
- C) 2 1 2
- D) 1 2 1

### MCQ 3: Array Forward Print

```
arr = [10, 20, 30]  
function printArr(i):  
    if i == length(arr):  
        return  
    print(arr[i])  
    printArr(i + 1)  
  
printArr(0)
```

**Output?**

- A) 10 20 30
- B) 30 20 10

- C) 10 30 20
- D) 20 10 30

#### MCQ 4: Fibonacci Pre-Call Printing

```
function fib(n):  
    if n <= 1:  
        return n  
    print(n)  
    return fib(n - 1) + fib(n - 2)  
  
fib(3)
```

##### Output?

- A) 3 2 1
- B) 3 2
- C) 2 3
- D) 3 3

#### MCQ 5: Even Index Print

```
function evenPrint(n):  
    if n > 5:  
        return  
    if n % 2 == 0:  
        print(n)  
    evenPrint(n + 1)  
  
evenPrint(0)
```

##### Output?

- A) 0 2 4
- B) 0 2 4 6
- C) 2 4 6
- D) 0 2 4 6 8