

JS Code

Global execution context

Once it runs it creates this

Functional execution context

Stored in

this

this is different for browser, node, bun & so on ....

For eg: Browser stores window object in 'this'

How JS executes code ???

→ Memory creation phase

→ Execution phase

```
let val1 = 10
let val2 = 20

function addNums(num1, num2){
  total = num1 + num2
  return total
}

let result1 = addNums(val1, val2)
let result2 = addNums(30, 40)
```

Step 1: Global execution → this

Step 2: Memory allocation

val1 → undefined

val2 → undefined

addNums → func<sup>n</sup> def<sup>n</sup>

result1 → undefined

result2 → undefined

Step 3: Execution phase

val1 → 10

val2 → 20

addNums →

result1 → 30

result2 → 70

New variable env  
+  
Execution thread

→ This will again make one memory phase & execution phase for every func<sup>n</sup>

## Memory phase

val1  $\rightarrow$  undefined  
val2  $\rightarrow$  undefined  
total  $\rightarrow$  undefined

## Execution phase

num1  $\rightarrow$  10

num2  $\rightarrow$  20

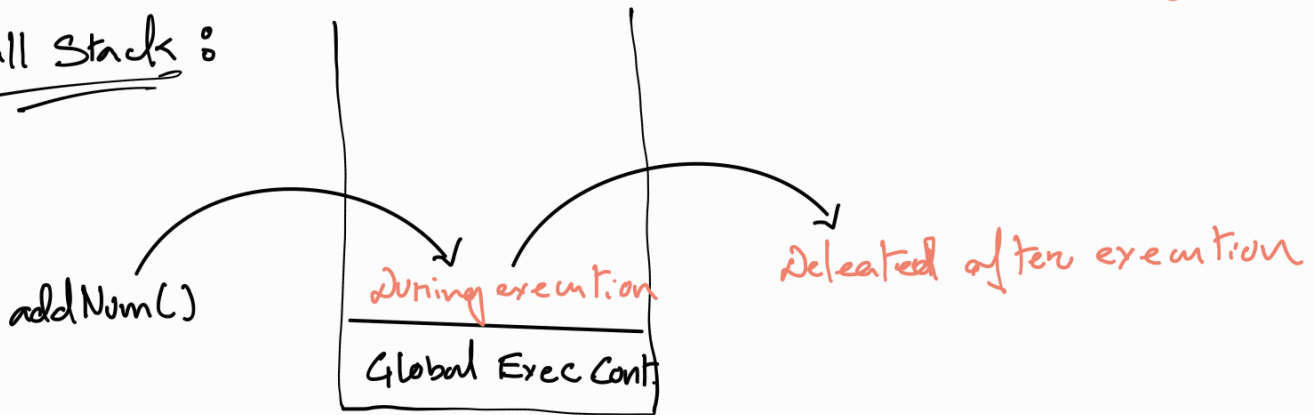
total  $\rightarrow$  30

this goes back to the global execution phase

AND

$\rightarrow$  This box gets deleted & a new box is created for the second call of addNums()

## call stack :



If one function calls another function, then they follow LIFO method in order to get deleted.