

Everything that happens inside javascript , happens inside "Execution context".

As soon as the program is written , global execution context is created and "this" is assigned to global.

After which code is executed in two phases :

1. Memory Phase
2. Code execution Phase

```
js 14_js_execution.js > ...
1 let val1=10;
2 let val2=15;
3
4 function addNumber(val1, val2){
5   let result = val1+val2;
6   return result;
7 }
8
9 let result1=addNumber(val1, val2);
10 let result2=addNumber(50,60);
11
12 console.log(result1);
13 console.log(result2);
14
```

## ① Memory phase

val 1 → undefined  
val 2 → undefined  
addNum → function definition  
result 1 → ~~undefined~~ 25  
result 2 → ~~undefined~~ 110

## ② Code Exec. phase

val 1 → 10      result 1 → 25  
val 2 → 15      result 2 → 110  
addNum → new Exec. context  
          new variable env  
          +  
          execution thread

②a) Memory phase	②b) Code Exec. Phase
val 1 → undefined	val 1 → 10
val 2 → undefined	val 2 → 15
result → undefined	result → 25
	this value is passed to global exec. context

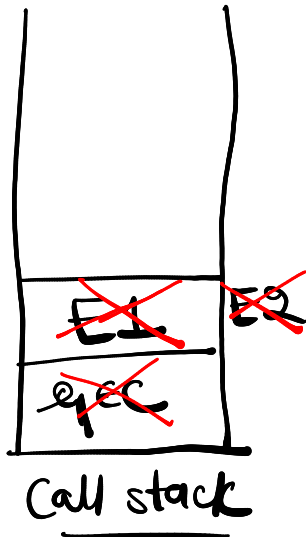
addNum → { new variable environment  
                  +  
                  Execution thread }

See from  
function's  
perspective  
(see fn. body)

Memory phase →	Code Exec. Phase →
val 1 → undefined	val 1 → 50
val 2 → undefined	val 2 → 60
result → undefined	result → 110
	this value is passed to global exec. context.

Note: — After returning value to global execution context,  
new execution context gets deleted from  
"Call stack".

How the things are working inside Call stack ?



- Inside the call stack is where the execution context are maintained , Firstly the global execution context is created , and after that vexecution context 1 is pushed, after the execution of `addNumber(val1,val2)` , it is deleted from callstack and execution context 2 is pushed into the stack and after its completion , it is also deleted from stack and after all the lines are executed , global execution context also gets removed .