

Node js is javascript library, which is open source and handles non-blocking code

It has

Callstacks, heap, event loop and waiting queue, when any asynchronous function is over, then the event loop will keep the callback function in waiting queue, till gets the entry in main stack.

blocking code will work

```

→ f1(){
  f2()
  f3()
}
f2(){
}
f3(){
}
f4(){
  return data
}
f5(x){
  //dependent on f4
}

f1()
s=f4()
f5()
  
```

1. f1() X
f2() X
f3() X

2. f4() X

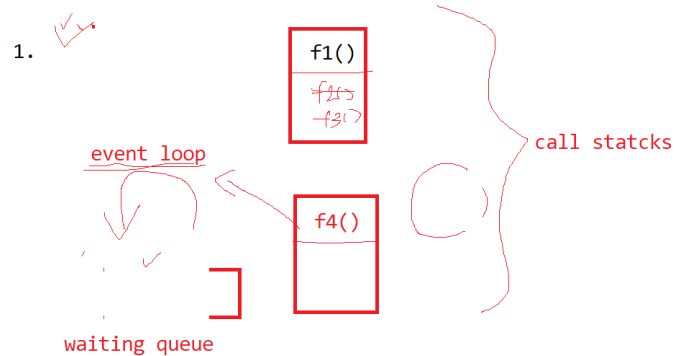
3. f5() X

Non-blocking code

```

async f1(){
  f2()
  f3()
}
f2(){
}
f3(){
}
async f4( f ){
  f(data )
}
f5(x){
  //dependent on f4
}

f1()
s=f4( f5 )
f5()
  
```



To use nodejs

1. Install the nodejs
<https://nodejs.org/en/download>
2. To check the nodejs is installed or not
Open cmd prompt
Node -version
3. There are builtin objects available.
global, process, console
4. REPL --→ read evaluate print loop--→ to execute and test output of one of the statements.

Built in modules in nodejs

1. Buffer--→ allocate the buffer, copy data from one buffer to another buffer
2. fs--→ read data from file, write data into file, stream data from file, pipe data from i/p stream to o/p stream, check file exists, open, close, status check
3. http

to import built-in module use only module name, but to import user defined module use path

data streaming--→ use streams when the size of the file is bigger than RAM size

