

A gentle guide to Functional Javascript

THE WHY'S AND HOW'S



"In addition to it being useful, it is also cursed and the curse of the monad is that once you understand it, you lose the ability to explain it to anybody."

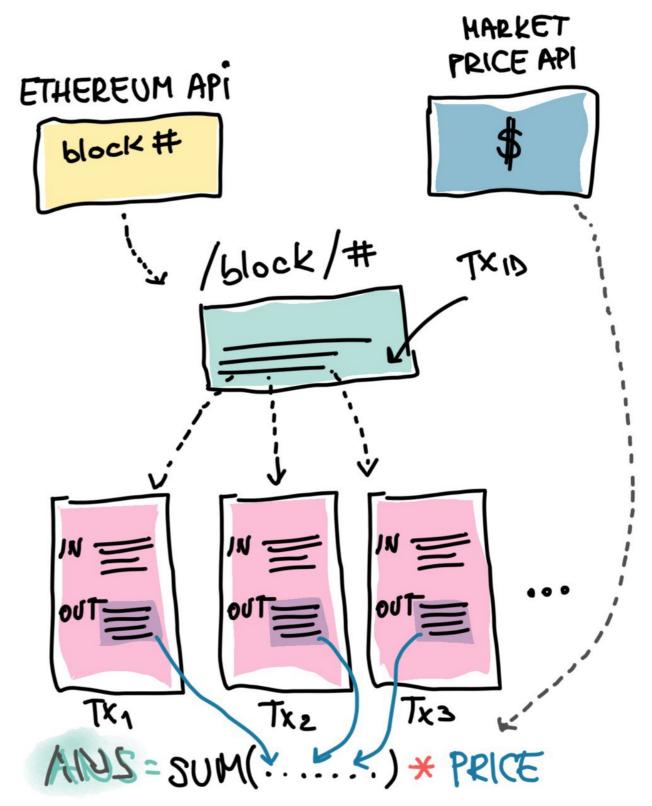
DOUGLAS CROCKFORD, YUICONF 2012



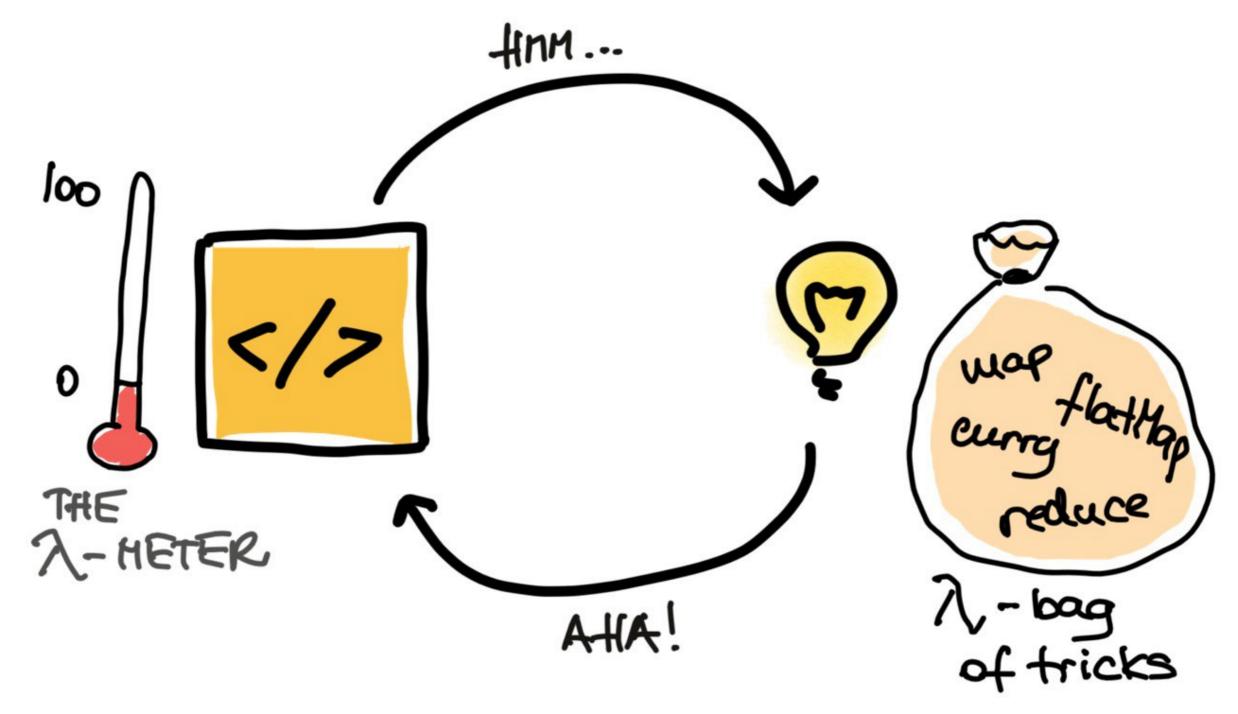
THE PROBLEM

Get the latest Ethereum block volume in US dollars.

No frameworks please!

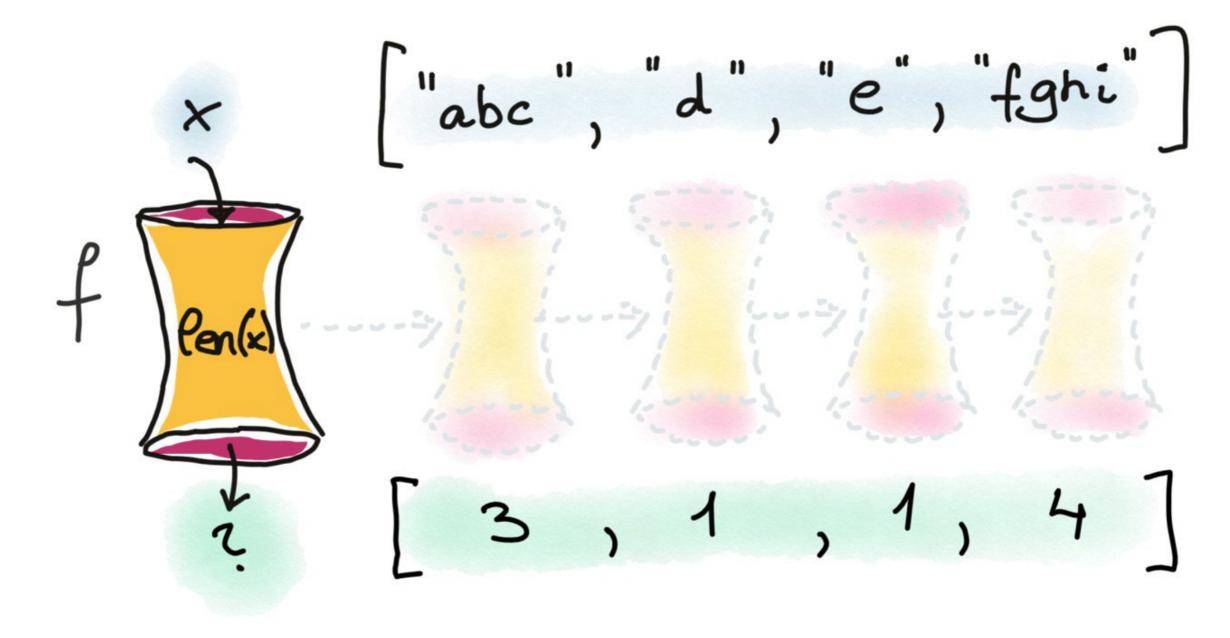


THE \(\) PLAN



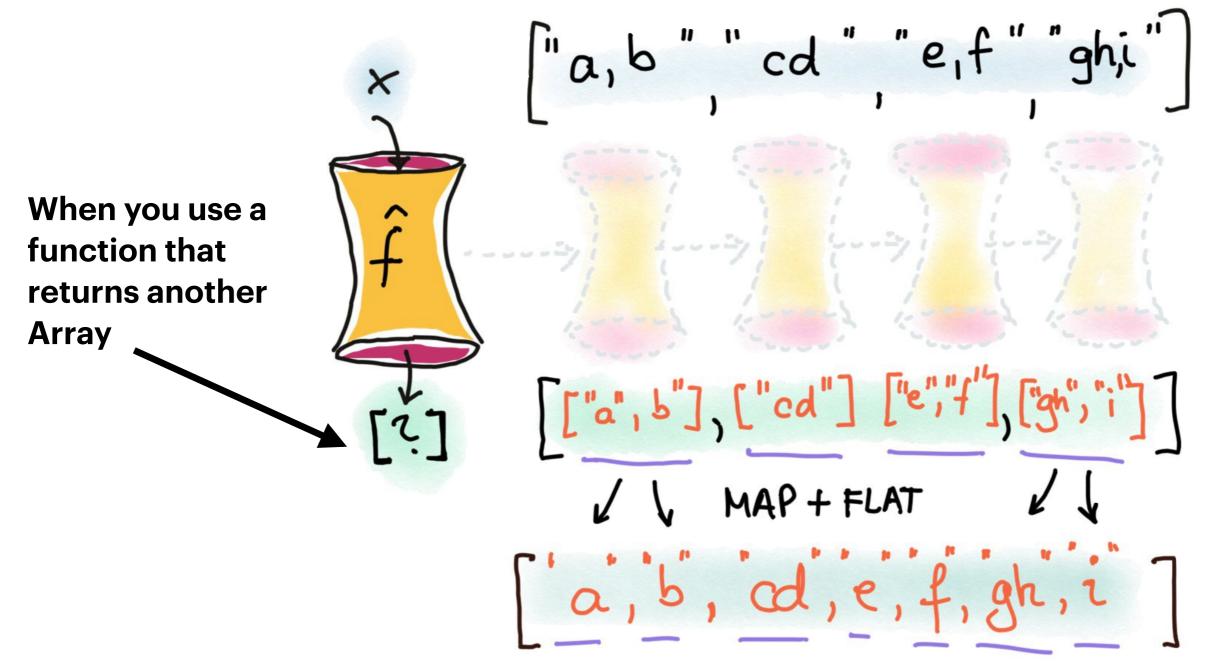


MAP



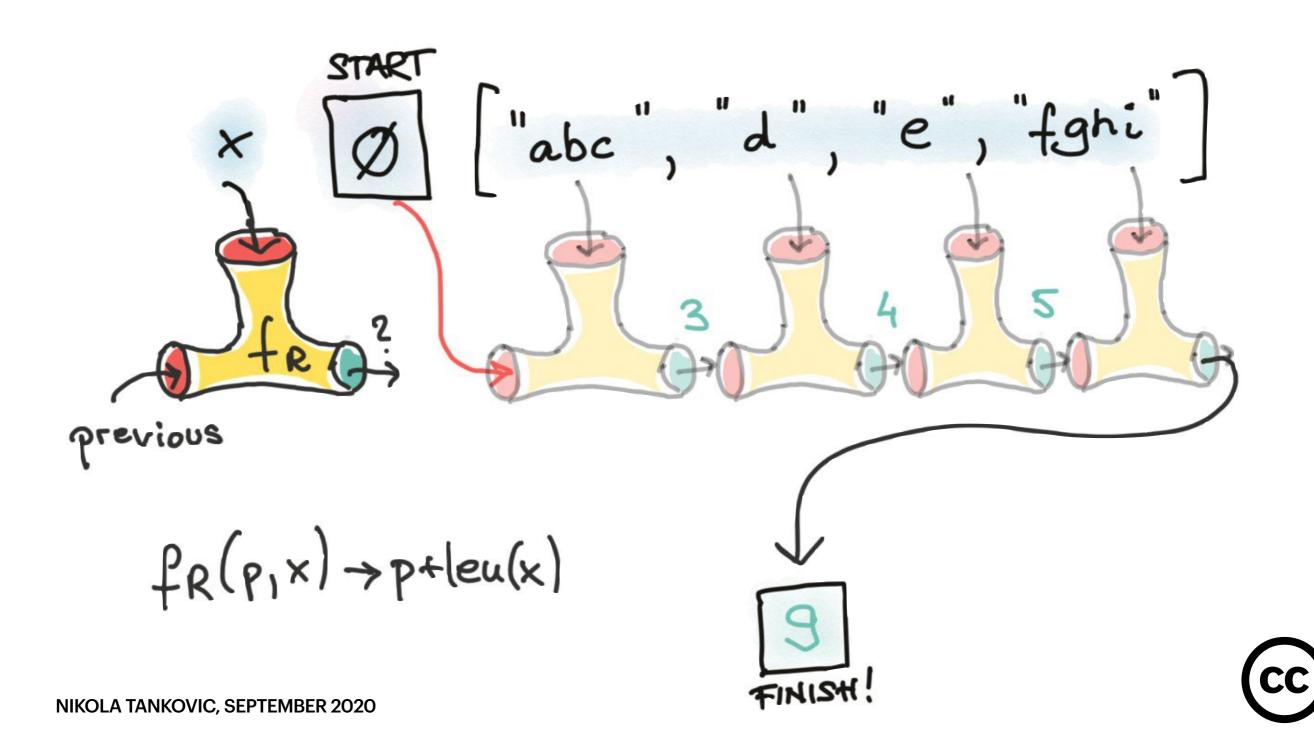


FLATMAP





REDUCE (AKA. FOLD > CATAMORPHISM)

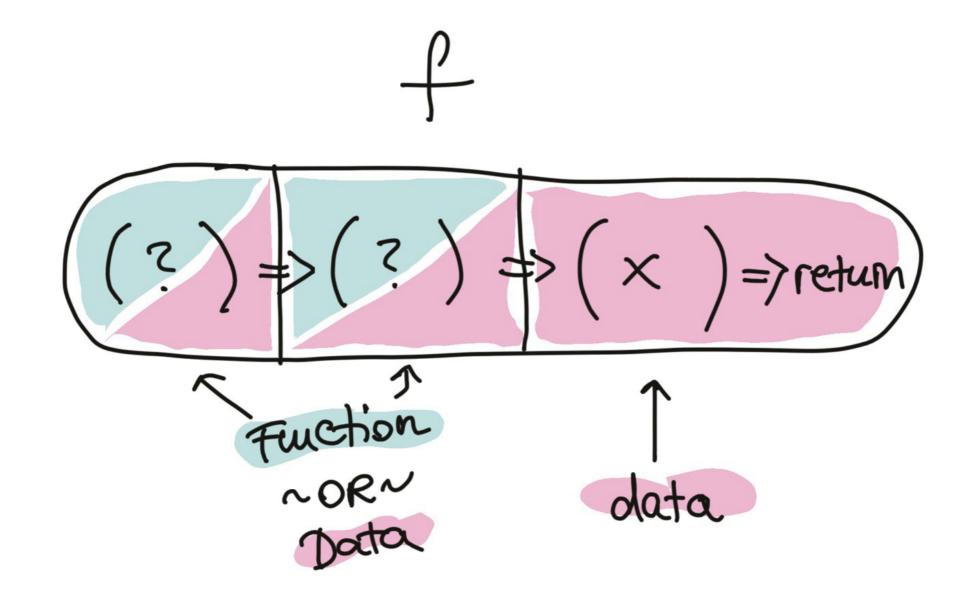


CLOSURES

Javascript uses LEXICAL SCOPING

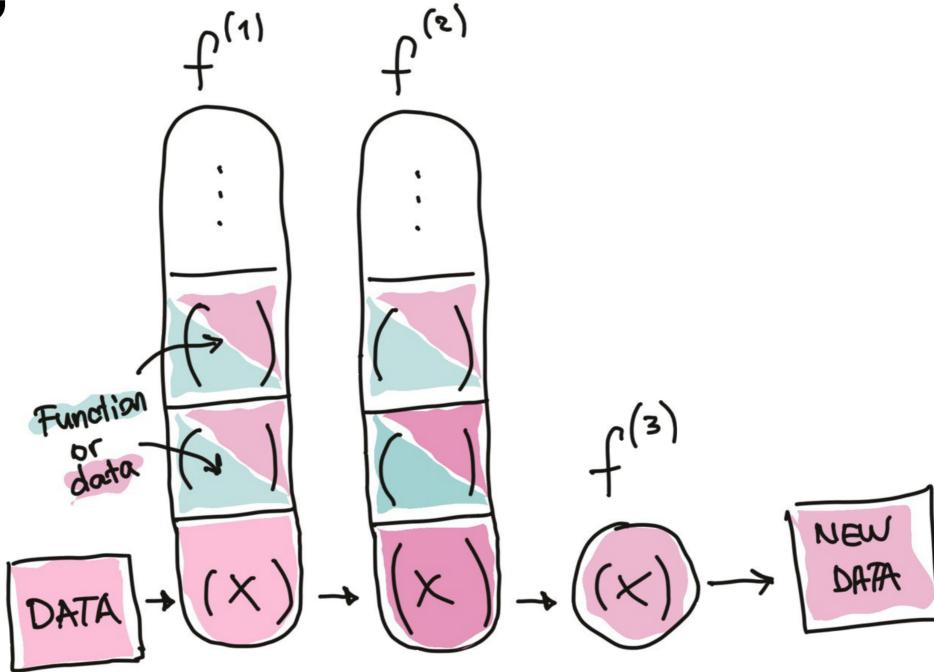
```
function api (baseUrl) {
  function do (method) {
         function what (resource) {
         3 // ... I can see all above
              ~ OR.~
let api= (base Url)=> (method)=> (resource)=> {
        11 111
```

HIGHER-ORDER FUNCTIONS CURRYING





COMPOSITION / PIPING





WHERE TO GO...

- YT: Fun Fun Function series on FP in JS
- Thinking in Ramda (short course)
- Rambda lighter Ramda
- Immutable data structures:
 Immutable.js
- Want stricter then Ramda? https://github.com/sanctuary-js/ sanctuary

- Bartosz Milewski: <u>Chategory</u> theory for programmers
- Monads:
 - Three useful Monads
 - On Functors, Monads and Applicatives in JS

