

@codecentric

## **Beyond Javascript**

### **Writing a Web Application Full Stack with Rust**

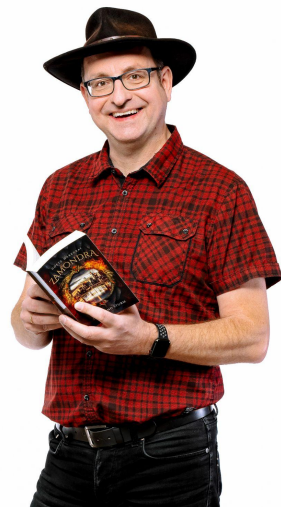


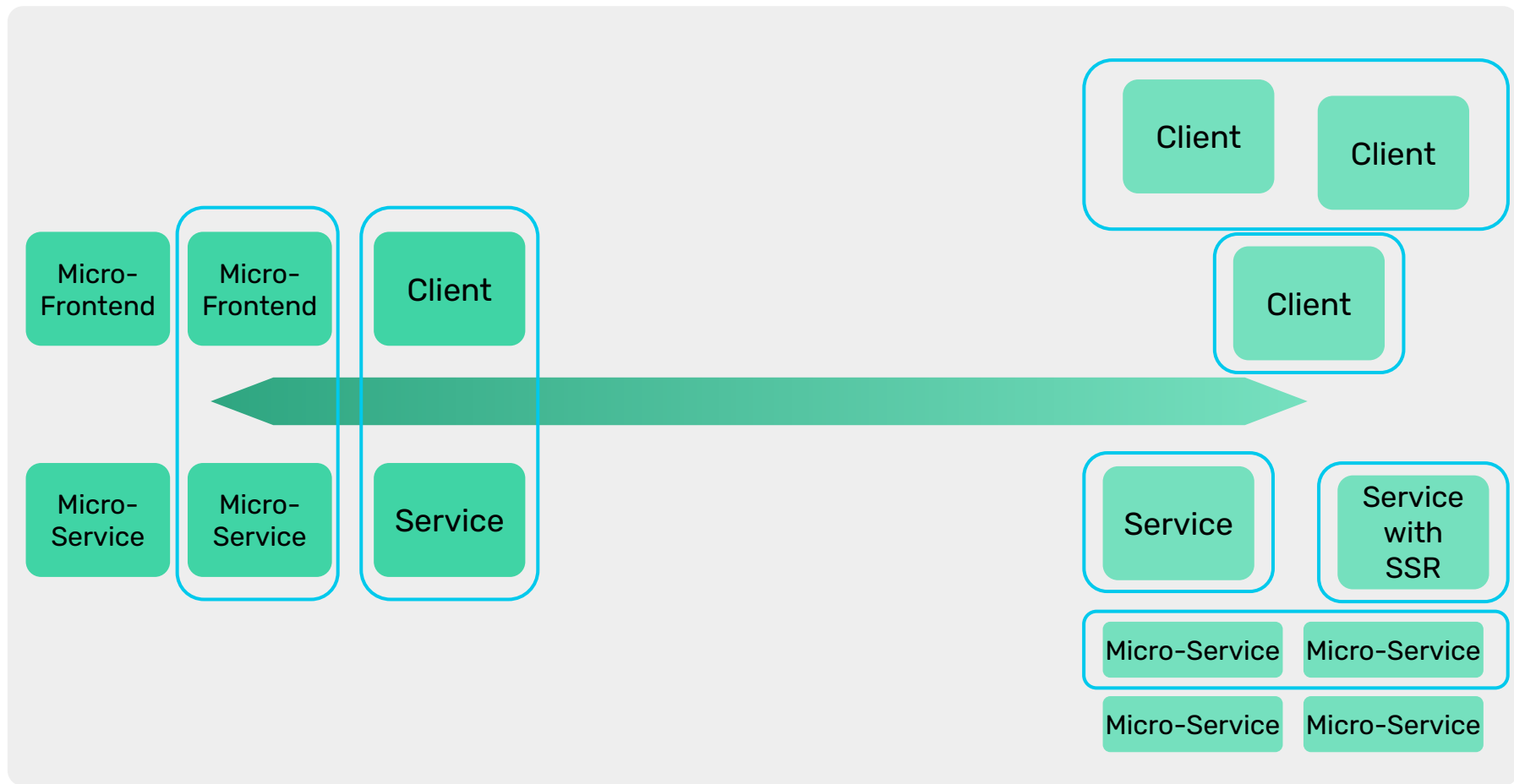
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## Swapping your brain



## Typescript

`string`

```
interface {  
  name: string;  
  ... }
```

```
list.map(each⇒each * 2)
```

`enum`

```
it("should test", () ⇒ {  
  ... });
```

## Kotlin

`String`

```
data class(  
  val name: String,  
  ... )
```

```
list.map{it * 2}
```

`enum class`

```
@Test  
fun `should test` () {  
  ... }
```

All libraries and tools

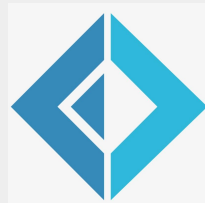


## **Looking for Full Stack Alternatives**



**JavaScript**

maybe not approved  
personally, I don't like JS



**F#**  
**Fable**

rare language



**Clojure**  
**ClojureScript**

even more rare  
personally, don't like  
dynamically typed  
languages



**Kotlin**  
**Kotlin/JS**

support is not great  
build tools not totally  
integrated

**Enter: Rust**



**Rust**



# run anywhere



# What is WebAssembly?

**binary format for a virtual machine**

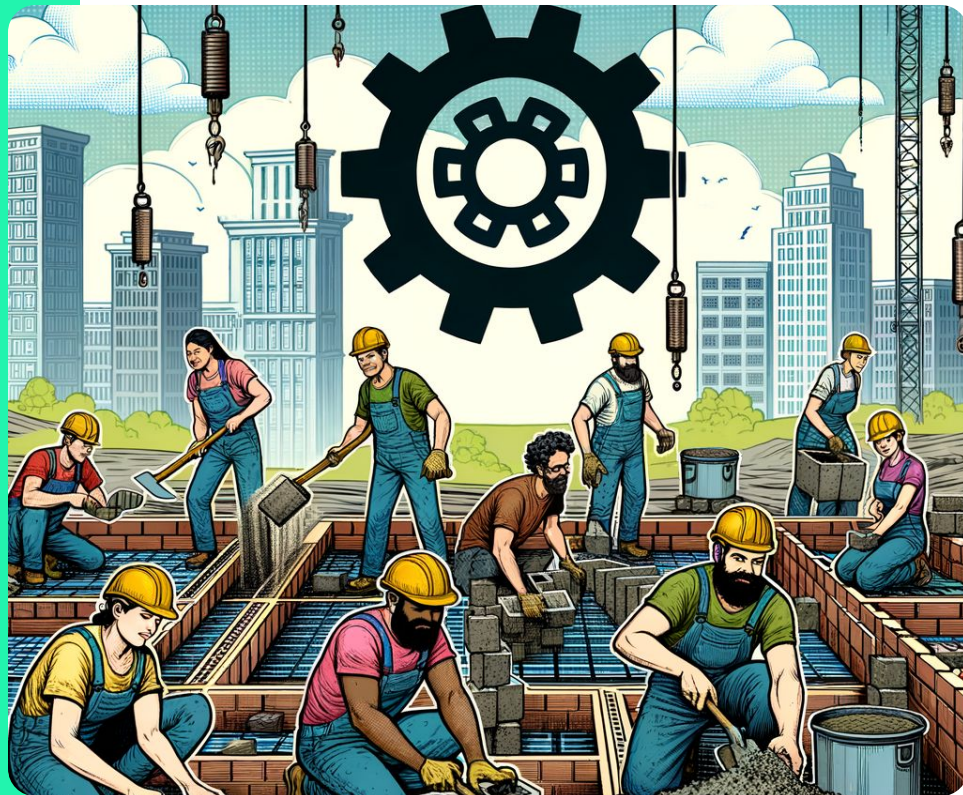
**no object orientation  
no garbage collection**

**much faster than JavaScript**

**no direct access to the DOM**

**there is a standard bridge**

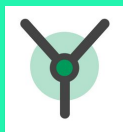
**build tool and dev server: Trunk**



Enough talk!

Let's see some code!

# Project Examples: The TODO App!



## **Rocket and Yew**

**A backend and a frontend project, share some code**

**rocket.rs**

**yew.rs**



## **Dioxus Fullstack**

**Multi platform component library for the web, the desktop and mobile**

**dioxuslabs.com**

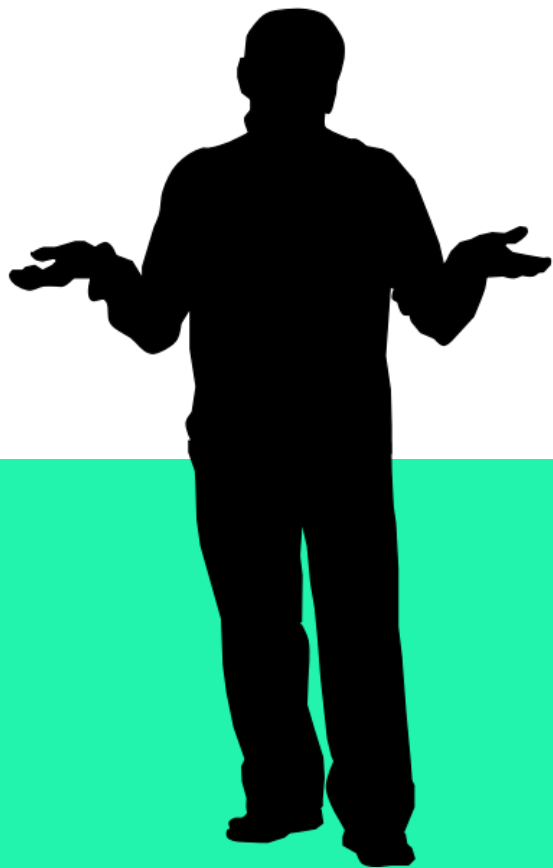
## To Wrap Up

🎉 It really works!

Maturity is a spectrum

🕒 Give it some time





**Would I recommend?**

Well, it depends ...

*Thank You*



<https://github.com/goetz-markgraf/rust-fullstack>

@codecentric

**Creating the digital future together.**



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