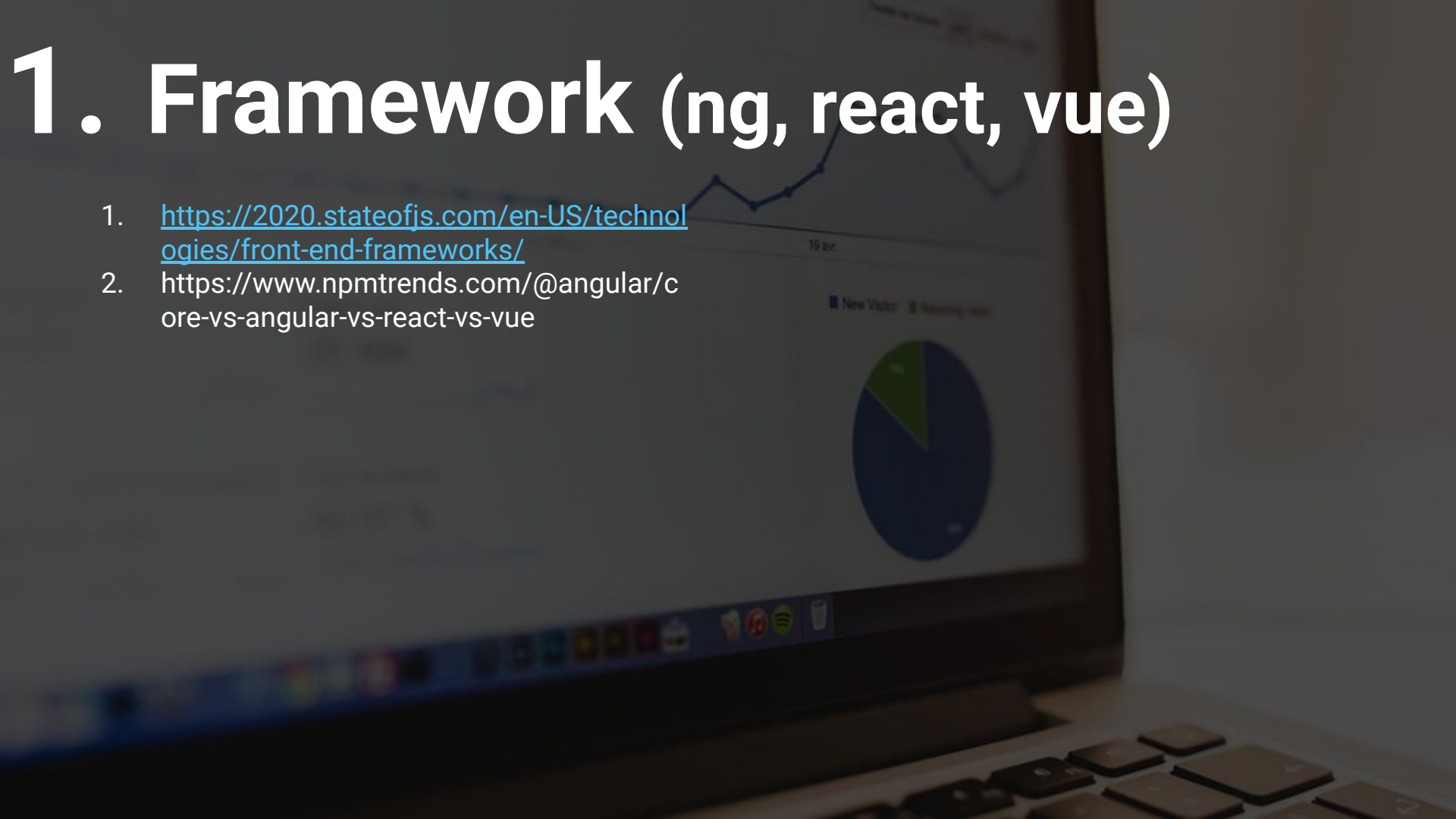


Overview of Current Frontend ecosystem



1. Framework (ng, react, vue)

1. <https://2020.stateofjs.com/en-US/technologies/front-end-frameworks/>
2. <https://www.npmtrends.com/@angular/core-vs-angular-vs-react-vs-vue>



React are half as JQuery



R. Alex Anderson 🚀

@ralex1993

Want to feel old? ReactJS was released May 29, 2013, or 2468 days ago.

JQuery was released August 26, 2006, or 2468 days before React was released.

That's right. React has been around as long as JQuery was when React came out. 🤖

<https://twitter.com/ralex1993/status/1234165541805281280>

Complexity

```
import React, { useState } from 'react';

export default function() {
  const [count, setCount] = useState(0);

  return (
    <button onClick={() => setCount(count + 1)}>
      You clicked {count} times
    </button>
  );
}
```

```
<script>
  let count = 0;
</script>

<button on:click={() => count++}>
  You clicked {count} times
</button>
```

Perf

<https://krausest.github.io/js-framework-benchmark/index.html>

Size

<https://medium.com/dev-channel/a-netflix-web-performance-case-study-c0bcde26a9d9>

Ecosystem

DX: JSX vs template

<https://reactjs.org/docs/components-and-props.html>

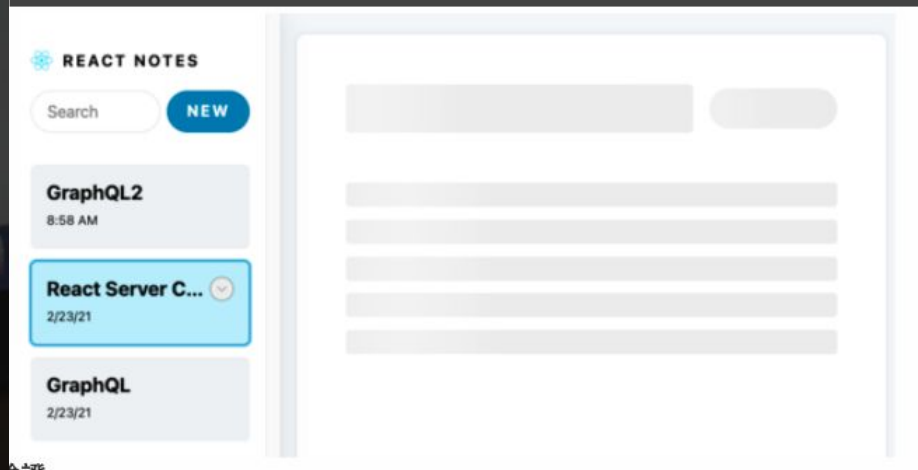
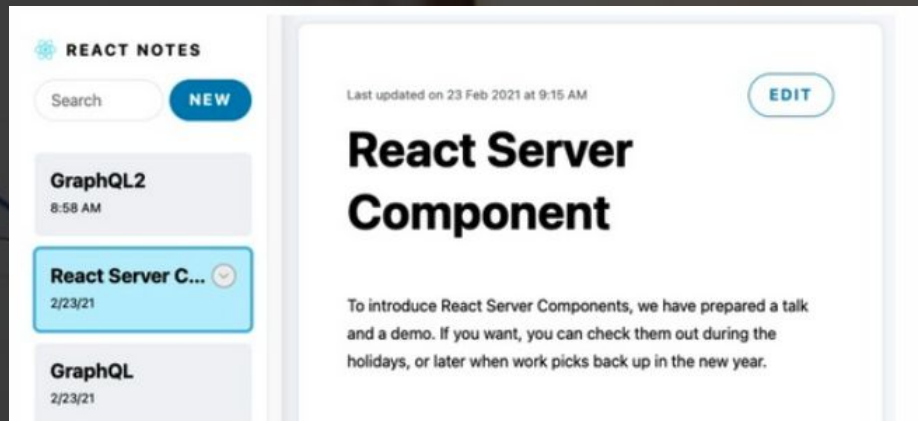
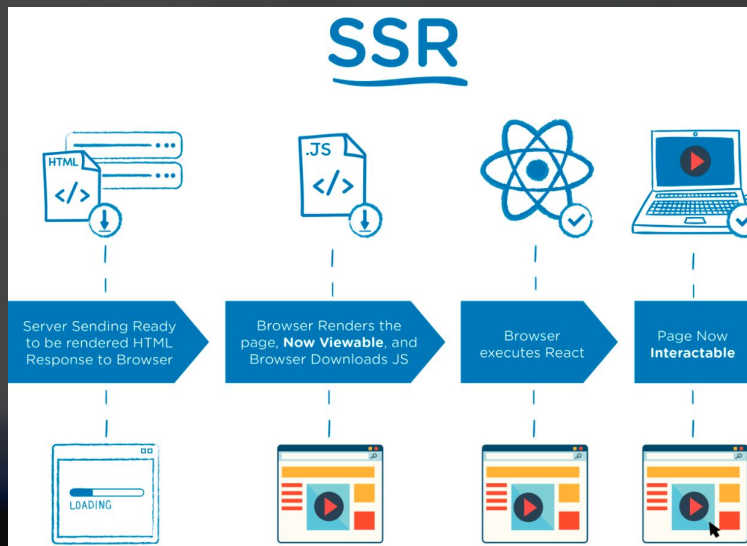
<https://github.com/gothinkster/vue-realworld-example-app/blob/master/src/components/VPagination.vue>

Timing

<https://www.npmtrends.com/express-vs-koa-vs-fastify>

What's news

1. Pre-compile framework: svelte, solidjs
Svelte: <https://svelte.dev/>
Solidjs: <https://www.solidjs.com/>
2. Streaming



2. CSS

1. - PostCSS: SASS, LESS
2. - CSS-in-JS: Styled-Components, Emotions
3. - Utility: Tailwind CSS

Scope, DX, type check, tree shaking

<https://2021.stateofcss.com/en-US/technologies>

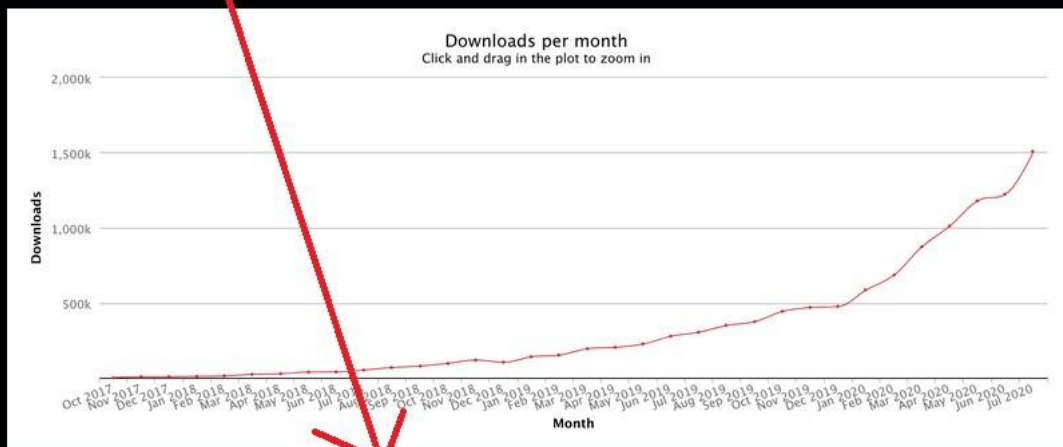
Tailwind: <https://tailwindcss.com/>

AUGUST 2, 2020

Tailwind CSS: From Side-Project Byproduct to Multi-Million Dollar Business

This was originally posted as a thread on Twitter, but I thought I'd republish it here to give it a proper home.

So about a month or so ago, Tailwind cracked 10 million total installs, which given its humble beginnings, completely blows my mind.



We're also about to cross **\$2 million in revenue from Tailwind UI**, our first **commercial Tailwind CSS** product which was released about 5 months ago — a

How to choose ?

■ New Visitor ■ Returning Visitor



3. package manager

1. - npm
2. - yarn
3. - pnpm

<https://www.npmtrends.com/npm-vs-yarn-vs-pnpm>

Project structure

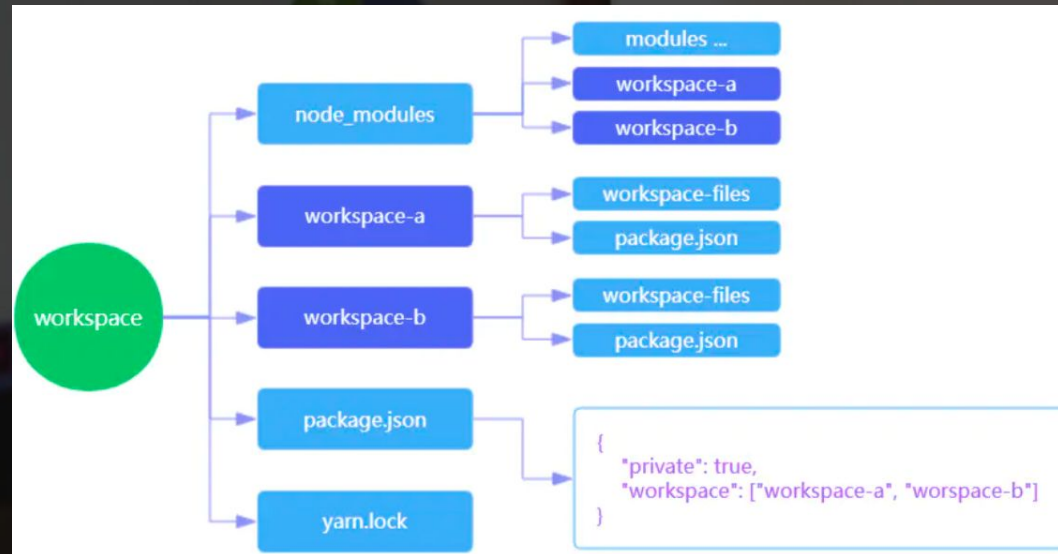
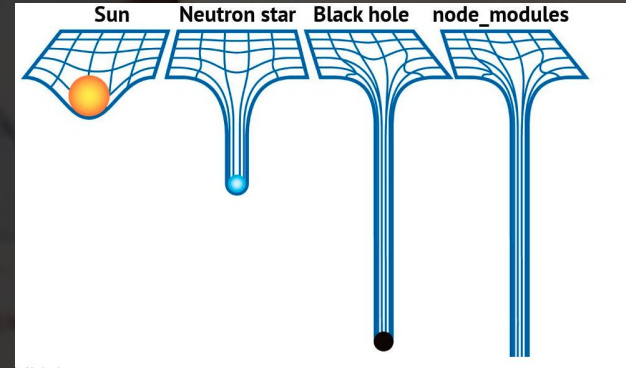
- Work space

Web Team repos:

- web-client
- rolo-conference
- rolo-ui
- icons



corepack

- <https://nodejs.org/api/corepack.html>



Behind the scenes of 1Password for Linux

- <https://dteare.medium.com/behind-the-scenes-of-1password-for-linux-d59b19143a23>

- File stats: **7,528** files, **1,038,929** lines total, **813,514** lines of code, **161,095** comments
- Start date: ~18 months ago for Linux; Rust experiments started earlier
- Date of first commit that mentions Linux: **Dec 17, 2019**
- Total commits since Dec 17: **40,575**
- Merge requests: **7,365**
- Issues created: **7,529** (assume each and every one was fixed and closed 😊)
- CI/CD: **183,905** pipelines, **1,74**   **5%** success ratio)
- How many Node package managers does it take to create an app? **3.5!** **During development we switched from npm to yarn to yarn 2 and then to pnpm.** 😂
- Usability testing: **39** 1-on-1 sessions with both new and long-time users

4. Bundler

- Webpack
- Parcel
- esbuild, vite,

DX, Perf



A blurred laptop screen displaying a data dashboard. The top half of the screen features a line chart with two data series: 'New Visitor' (dark blue) and 'Returning Visitor' (light green). The 'New Visitor' line shows a general upward trend with some fluctuations, while the 'Returning Visitor' line is less distinct. Below the line chart is a pie chart, also with dark blue and light green segments. The bottom of the screen shows a taskbar with various application icons. The overall image is dimly lit and out of focus, with the text '5. Progressive Web App (PWA)' overlaid in the center.

5. Progressive Web App (PWA)

Gap

PWA SUMMIT 2021



Capable



Reliable



Installable

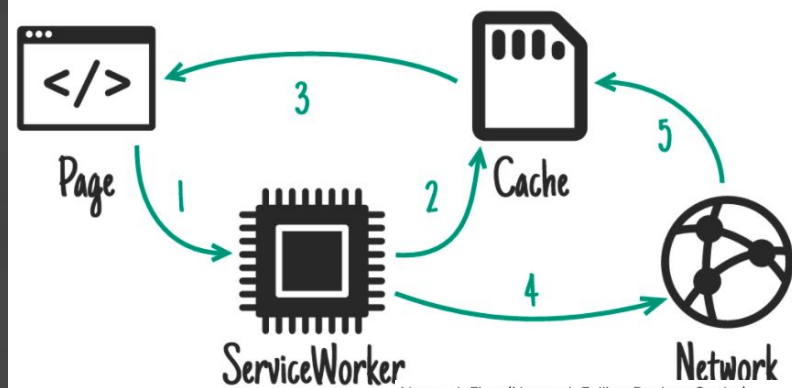


- File System Access
- Service worker

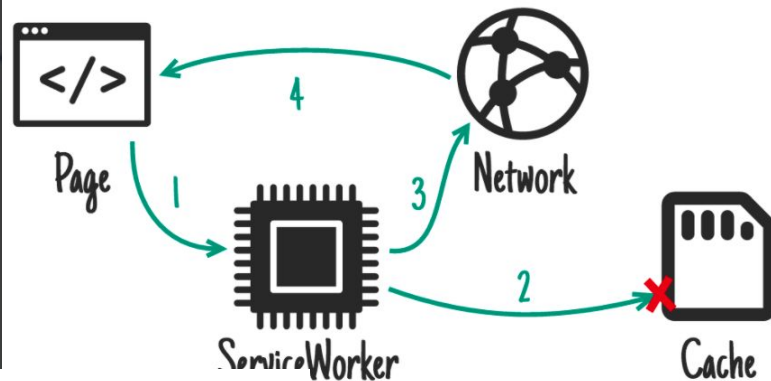
<https://www.youtube.com/watch?v=VI1BUNbPKqA>

Service worker, strategy

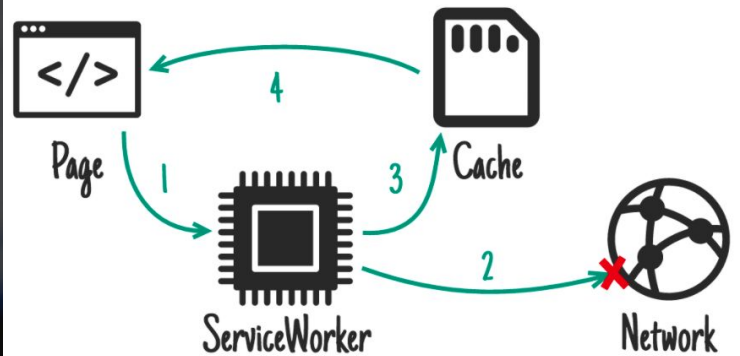
Stale-While-Revalidate



Cache First (Cache Falling Back to Network)



Network First (Network Falling Back to Cache)



<https://developers.google.com/web/tools/workbox/modules/workbox-strategies>

<https://squoosh.app/>

https://twitter.com/search?q=webpack%20after&src=typed_query&f=image

Installable

<https://squoosh.app/>
<https://www.youtube.com/>



Furthermore

- Google Store: Trusted Web Activity
- PWA in the Microsoft Store

6. Webassembly

Myth1: Webassembly is for Web

Myth2: Webassembly will replace JS



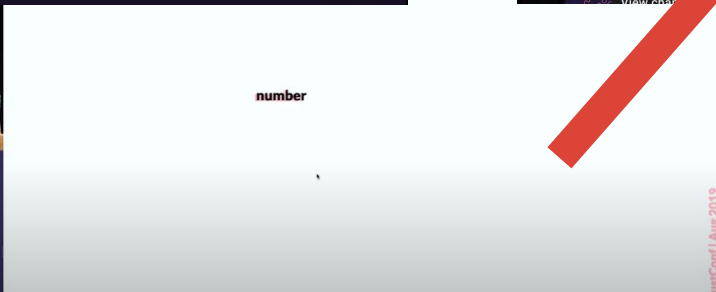
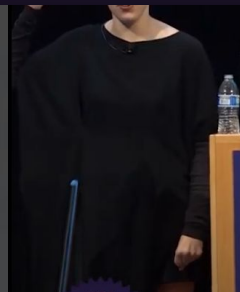
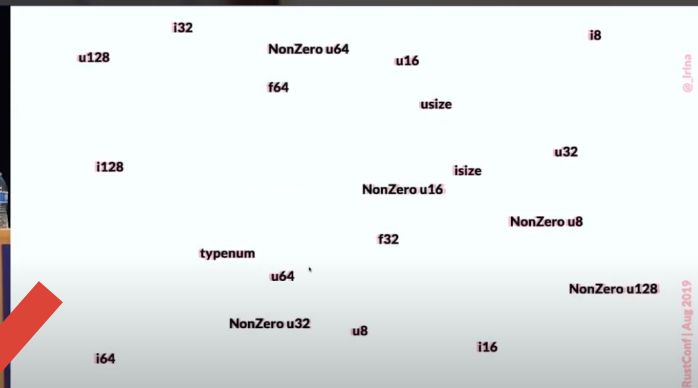
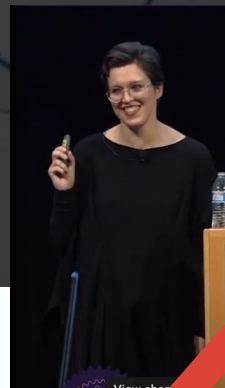
Solomon Hykes

@solomonstre

If WASM+WASI existed in 2008, we wouldn't have needed to create Docker. That's how important it is. Webassembly on the server is the future of computing. A standardized system interface was the missing link. Let's hope WASI is up to the task!

For JS Develop

- RustConf 2019 - From Electron, to Wasm, to Rust (Aaand Back to Electron) by Irina Shestak
 - https://www.youtube.com/watch?v=Yo83yhRN_Ss



- AssemblyScript: <https://www.assemblyscript.org/>
- <https://github.com/GoogleChromeLabs/squoosh>

- Cloudflare - workers
 - <https://developers.cloudflare.com/workers>
 - <https://developers.cloudflare.com/workers/learning/how-workers-works>
 - [https://en.wikipedia.org/wiki/V8_\(JavaScript_engine\)](https://en.wikipedia.org/wiki/V8_(JavaScript_engine))