Learn you some Accessibility for Great Good

❤️

> The power of the Web is in its universality.
> Access by everyone regardless of disability is an essential aspect.

Tim Berners-Lee (inventor of the World Wide Web)

The Web is **fundamentally designed to work for all people**, whatever their hardware, software, language, location, or ability. When the Web meets this goal, it is accessible to people with a diverse range of hearing, movement, sight, and cognitive ability.

W3.org

What Accessibility needs can people have?

type	permanent	temporary	situational
👂 auditory	deaf	ear infection	on a loud train
💭 cognitive	learning difficulties	hangover	external stimulus
💪 physical	missing a limb	broken arm	carrying a baby
👄 speech	mute	sore throat	eating
👁 visual	blind	eye infection	sunny day

Accessibility is good for everyone (and it is good for business)

- There are 13.3 million disabled people in the UK.

- 7% of children are disabled

- 18% of working age adults are disabled

- 44% of pension age adults are disabled

Source: Family Resources Survey 2015/16

Accessibility is not exlusionary.

Let's get down to business

How we should "do" accessibility

1. Follow a process (we have a spreadsheet based on WCAG AA scoring)

2. Start it early (don't try and layer it on after code has been created)

3. Repeat it often (each PR should be reviewed for accessibility)

Terms

- **A11Y** Short for Accessibility (there are 11 letters between the A and Y)
- **WCAG** Web Content Accessibility Guidelines
- **ARIA** Accessible Rich Internet Applications
- **A-AAA** A scoring system, A is the easiest to achieve AAA is the hardest

Common things to look out for

- Contrast
- Being able to navigate with a keyboard
- That copy is understandable without thought
- Things can be zoomed to 200%
- Images have descriptive or an empty alt attribute
- Headings are in hieracrhical order
- Browser page titles are unique and descriptive
- Forms correctly labelled with "for" and "id" attributes
- Page has language defined through 'lang' attribute

ARIA

Adds some semantic labels to interactive elements.

```html
<p role="alert">I am an alert</p>
```

```html
<h1 role="presentation">A nice visual header</h1>
```

Tooling

- WAVE Chrome Plugin

- VoiceOver (on OS X)

- NVDA screen reader for Windows
  (https://www.nvaccess.org/download/)

- Accessibility color contrast test
  (http://gmazzocato.altervista.org/colorwheel/wheel.php)

- Other tools on this website
  (https://www.w3.org/WAI/ER/tools/)

Questions

Extra Reading

- WCAG Checklist
- How people with disabilities use the web
- Microsoft's Inclusive Design Guide
- Great list of A11Y resources