# Introduction to WebXR with A-Frame

By Paul Armstrong

## **Getting started**

- 1. Clone or download our repository ter.ps/XRClubAFrame
- 2. Launch a text editor (I'm using Notepad++)
- Open up First-Scene/index.html
- 4. Useful sites you might want to have open
  - aframe.io
  - https://threejs.org/docs/#api/en/core/Object3D
  - https://raw.githubusercontent.com/jeromeetienne/AR. js/master/data/images/HIRO.jpg

## Very quick rundown of JavaScript

- Typically JavaScript runs in a browser and interacts with the HTML document hierarchy
- The syntax is very similar to Java, but JavaScript is more loosely typed
  - For example, in JavaScript you use var to define a variable instead of int or bool or String

### **A-Frame**

- WebXR Framework created by Mozilla
- Imported as a script in an HTML file
- Allows for Virtual and Augmented Reality in a web browser
  - Scenes are defined with HTML
  - Scenes are manipulated with JavaScript

#### **A-Frame**

- A-Frame features an Entity-Component System
  - Entities are objects in the HTML object hierarchy
  - Components are attributes of Entities defined with JavaScript code
- In the First-Scene/index.html the box, sphere, cylinder, sky, and camera are all Entities
- Properties like position, radius, and color are Components