

SAVI Controls, LLC :: Web-based A/V control platform

Role: Web Developer

July 2015 - December 2016

<http://www.savicontrols.com>

A Node.js application which interacts with the Control4 platform to bring home automation into corporate and large-scale build-outs.

Main Features

1. Admin panel
2. Custom user screens
3. Embedded video feed preview
4. Fully responsive

Stack | ES6, MongoDB, React.js, Meteor

Tools | Babel, Mantra, Hapi, Joi, Fibers/Futures, Stylus, ESLint

Projects

- Building new landing pages for company and its sister company
- Writing hardware drivers
- Figuring out novel means of interoperating with hardware which was not designed to be controlled through a web app.
- Built new Shopify store for products and dealers
- Built webhook endpoints for Shopify backend to connect with our custom CMS
- Work with product designer to maintain brand identity

Greenfinity Farms Aquaponics ::

Role: In-house Developer / Research Lead

Jan 2015 - Present

<http://greenfinityfarms.com>

Extensible IoT solution for automated growing of aquaponic microgreens

Our intent is to provide an open-source, modular, non-cloud-based internet-of-things interface for the automation of growing high quality, high protein foods. After trying a bunch of different platforms, we attempted to solve the problem of live-updating, reactive sensor data with Node.js. This is an on-going project with a lot of people working around the globe using many different technology stacks. The idea is to one day soon be able to automate any IoT device in your house, even to fly a drone.

Hardware | Embedded temperature, humidity, pH and light sensors

Stack | BeagleBone MCU, Python, Node.js, Xively, Meteor, MongoDB, all major OS's

Tools | Bonescript.js, Cylon.js, Sock.js, Material.css, Universal Meteor (a fork which can run on ARM architecture), Cloud9 IDE

Rent By Numbers :: Property management app

Role: Developer

Jan - April, 2014

<http://www.rentbynumbers.com>

Description: Multi-platform app with a broad scope of functionality.

Main features

1. a descriptive walk-through for first-timer users
2. multi-page sign up form with sticky sessions
3. publish-with-relations database that stored info regarding:
 - type, description and availability of rental property
 - variety of image types, attached to property
 - pertinent documents, including .pdf encoding and parsing to .csv
 - searchable tags and categories
4. variety of user roles incl. bill pay for tenants
5. displaying location via Google Maps API

Admin and tenant CMS

1. All data editable via CRUD-like forms & operations
2. Change/reset password
3. Login form with redirects and user-type directed landing pages
4. Custom API

Occupancy and tenant calendar

1. Push notifications when a bill was upcoming
2. Responsive design

Stack | Javascript, Meteor framework, MongoDB, CSS, HTML, jQuery, MailChimp

Tools | CollectionFS, GridFS, publish-composite

Physmodo :: physical therapy app and website

Role: Developer

May - July, 2014

<http://physmodo.com>

Description: Worked with local branding and web consulting agency Square205 (square205.com) to

design and create a web application. This would allow doctors and therapists to create a curriculum of videos and instructions for their clients, and allow the clients to interact by viewing, rating and marking completed as well as full search of all videos in the archive.

Main features: - Custom CMS from scratch - Embedding of Vimeo - Fetching of all meta data thru Vimeo's API - Assigning users to video - Rating system - Feedback to the therapist

Stack | Meteor, MongoDB, CSS, jQuery, HTML, Vimeo

Tools | Bootstrap3, Less

Additionally my team created a website (<http://physmodo.com>) alongside Square205 featuring a cascade of animated images; for the animations we used GreenSock (GSAP).

Additional skills

- Git
- Atom
- ES2016 and 2017 features
- Unit and Integration testing
- Accessibility
- CSS animation
- CSS preprocessors (Sass, Less, Stylus)
- Famo.us 3D DOM & physics engine
- CoffeeScript, Elm, Flow
- SVG & SVG animation
- Full Text Search
- Regex
- Amazon AWS
- SEO, phantomJS
- Grunt, Gulp, Yeoman
- Test-driven development
- RWD best practices, FlexBox
- Familiar with much of NPM ecosystem
- Package-oriented application structure
- DDP data flows via WebSockets