

# Hernando Castano

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## PROGRAMMING

### Experienced In:

C · Lua · Javascript  
Java · Node.js

### Familiar With:

Solidity · Python  
web3.js · ethjs · Express.js

## TOOLS

### Experienced In:

MetaMask · Truffle · Git  
Infura · Geth · Vim

### Familiar With:

Jenkins · VirtualBox

## OPERATING SYSTEMS

### Experienced In:

Linux · macOS · Windows

## EDUCATION

### University of Waterloo

B.A.Sc in Mechanical Engineering  
Expected April 2020

## INTERESTS

### Blockchain Technology

Co-Organizer of Ethereum  
Developers Waterloo Meetups

### Electric Vehicles

Closely follow consumer and  
performance projects in the space

### Space

Avid reader of /r/SpaceX, watched  
majority of '16 & '17 launches live

## WORK EXPERIENCE

### FleetCarma | *Firmware Developer*

September - December 2017

- Worked with a PIC32MX microcontroller running FreeRTOS
- Updated firmware to communicate with our servers using TLS-PSK, leading to a 15x reduction in connection failures
- Implemented a feature to manage sensitive driving behaviours that can be tracked, such as GPS and acceleration profiles
- Effectively worked in a team with two other developers to deliver features and meet company deadlines
- Halloween costume contest & ugly Christmas sweater contest winner

### ORBCOMM | *Embedded Software Developer*

January - April 2017

- Ported Lua applications from legacy hardware to a next generation product, refactoring and fixing issues as necessary
- Implemented a Jenkins server for build and test automation
- Worked with C to implement a remote firmware upgrade feature using a FRDM-K66F board as an embedded web server

### University Health Network | *Bioinformatics Research Assistant*

May - August 2016

- Developed web applications using the MEAN stack to assist in bioinformatics research
- Independently developed a system used by labs to share confidential files, using an OpenID Connect server I deployed and maintained

## PROJECTS

### Electrify, EV Charger Sharing on the Blockchain | *Personal Project*

November 2017

- Created smart contracts in Solidity to handle payments between charging stations and vehicles
- Wrote an Express.js API to simulate a *ChargePoint* charging station
- Developed a frontend to interact with the smart contract using React.js and ethjs

### ClevR, Content Curation Platform | *ETHWaterloo Hackathon Project*

October 2017

- Designed a social media site which incentivized original content
- Responsible for the Solidity smart contract that managed user rewards
- Added IPFS support to web3.js application in order to store user created content in a decentralized fashion