

# John Fial, Software Engineer

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in [linkedin.com/in/johnfial](https://www.linkedin.com/in/johnfial) | GitHub: [github.com/johnfial/](https://github.com/johnfial/) | Portfolio: [johnfial.github.io/](https://johnfial.github.io/)

## EXECUTIVE SUMMARY

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Self-motivated, disciplined Software Engineer / Full-Stack Developer established at learning new technologies and teaching others. Python and JavaScript, HTML/CSS. Programming and coding solutions optimizing for speed and scalability. Knowledge of algorithms and computer science fundamentals, plus security, networking, and protection. Veteran w/specialized military background.

## TECHNICAL SKILLS

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### Languages:

Python, JavaScript, CSS, HTML, Go (aka Golang, introductory)

### General Practices & Concepts:

CS Algorithms, Scalability, Big-O Notation and Runtime Analysis, DOM (Document Object Model), OOP (Object Oriented Programming), MVC (Model-View-Controller), CRUD, MVP (Minimum Viable Product), Agile, Scrum, Project Management, Risk Management, Responsive Design, Graphic Design, Security, Testing, Principles of Computer Science (general), Hardware Design, Technology Stacks, Cloud, Software Deployment, Security protocols (CSRF, XSS, SQLi), Networking & TCP/IP

### Specific Tools, Libraries, Frameworks:

Django & DRF (Django REST Framework), Vue, JSON, Konva, Cryptocurrencies, DVORAK, API and RESTs, Open-source, DVORAK Keyboard Layout

### Applications:

GitHub, git, Git Bash, pip, PowerShell, Cmdr, VS Code, Ajax, PythonAnywhere, Sync/Dropbox, Microsoft Office 365 & Windows Operating Systems, Zoom, Teams, Meet

## PROFESSIONAL EXPERIENCE

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### Software Engineer Teaching Assistant – PDX Code Guild (remote)

03/2021-11/2021

- Assists instructor in materials, syllabus, lesson planning, and curriculum.
- Assists in preparation of new programming exercises for students and helps instructor throughout lectures.
- Meets with students directly (remote) to further their understanding of concepts, high student engagement.
- Teaches and provides technical support; troubleshooted problems, and managed online questions via live-stream chat.

### Software Engineer / Developer – John Fial Coaching and Consulting

06/2015-Present

- Designed personal website, Udacity Introduction to Programming (Python/HTML/CSS) certificate; see portfolio for details.
- **Engineered and developed project #1) Childhood Canvas** ([code](#), [deployed via Heroku](#), [10-second 'wake up' time](#)). Designed and engineered a visual play sandbox for older babies and toddlers, focused on keyboard interaction. Project deployed via PythonAnywhere, uses Django (Python) on back-end, JavaScript on front-end, and Vue.js for the DOM.
- **Engineered and developed project #2) Lord of the Rings Quotes** ([code](#), [deployed](#)). Designed a web app to interact with an API using Vue.js.

### Airborne Sensor Operator – Flight Landata (government contractor)

10/2011-10/2012

- Mission planning to include review of mission and topography, flight path, timeline, flight hours, postflight regular logs of flight details (takeoff/land times, total hours, rolling hours, etc.), hardware review of all relevant sensors for specific mission prior to takeoff, initialize/termination of sensor during mapping sessions, troubleshooting of hardware/equipment during mission, upload and review of collected data to ensure integrity (unclassified duties only) Collaborated with junior and senior contractors, expert team-player aboard regular missions. Troubleshooted and solved technical equipment issues during flight, with both military and government contracted software and hardware.

### Airborne Sensor Operator / Operations Technician (1A4x1) – United States Air Force

10/2007-10/2011

- Flew combat missions aboard two military aircraft totaling over 2,000 flight hours.

- Reviewed and maintained highly technical aspects of mission and hardware/equipment, including mission geography, terrain, intelligence information, cryptographic keys, radio functionality, physical sensor equipment, voice and chat communication, sensor hardware, and emergency equipment. Collaborated with junior and senior servicemembers, expert team-player. Top-Secret government security clearance. Team member with expert collaboration.
- Troubleshooted and solved technical equipment issues during flight, with military and contracted software and hardware.
- Maintained peak physical and mental health amidst global deployments, time zones, and schedules.
- Awards & Decorations include: Air Medal x9, Air Force Achievement Medal, Meritorious Unit Award x2, AF Outstanding Unit Award, Combat Readiness Medal, AF Good Conduct Medal, Afghanistan Campaign Medal x2

## EDUCATION

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**Certificate, Full-Stack Developer Course**, PDX Code Guild **01/2021**  
(Python, JavaScript, CSS, HTML, Django, Vue, and personal projects; see “Technical Skills” above)

**Master’s, Molecular and Cellular Biology**, University of Arizona **12/2014**  
(Coursework included *Project Management*, *Law for Engineers/Scientists*, *Technical Sales and Marketing*, and *Business for Scientists*)

**Bachelor’s, Security Management**, American Public University System (remote) **11/2011**  
(Coursework included *Evaluation of Security Programs*, *Contemporary Issues in Security Management*, *IT Security: Attack & Defense*, *IT Security: Auditing*, *Cyberlaw and Privacy in a Digital Age*, and *Industrial Espionage*)

## INTERESTS AND PERSONAL SKILLS

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- Spanish Language (Est. B2 or C1, CEFR), love and passion for foreign cultures and travel.
- Successful, comfortable, and passionate public speaker, Toastmasters Advanced Bronze Award.
- Excellent written and oral communication skills, lifelong love of reading and writing. Passionate about daily learning and growth.
- Consistent, daily meditation practice and an established ability to focus. Growth-based mindset, anything is learn-able!
- Cryptocurrencies and tangent cryptography/security fields. Excellent management of personal finance.

## VOLUNTEER EXPERIENCE & COMMUNITY SERVICE

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- Primal Certified Health Coach, 2017-Present
  - Certified primal health coach and committed to healthy diet and lifestyle practices.
  - Mostly coach friends and family.
- > 10 blood donations, Red Cross
- Community Cleanup Events, Oregon, USA
- United States Air Force, Base Honor Guard:
  - Included daily use of formal Air Force dress uniform, leadership of ~5-person details for ceremonies, usually funerals, driving to/from funerals, operational planning/execution of brief military honors ceremony during funeral, coordination with both family members or funeral services organizers, extreme patience in hot and cold environments (in full formal uniform) while waiting for ceremony to proceed, folding of U.S. flag over tomb (or beside it), respective firearm 'salute' for fallen servicemember, presentation of flag to next of kin.
  - Award: Unit “Ceremonial Guardsman of the Quarter” award. During the award’s competition, which tested knowledge, poise, and execution of ceremonial movements, only outcompeted other guardsmen and scored 75/75 points. The three board members said they had never seen an airman attain a perfect score.
- Misc.: COVID-19 Vaccinated