Eric Gisse

Elixir Engineer

▬▬▬▬ Profile

Experienced Elixir and DevOps Engineer with more than a decade doing both software development and operations. Current focus has been doing Elixir software engineering. I seek to continue working in the Elixir space for the forseeable future.

▬▬▬▬ Professional Experience

2022 - 2023 **Senior Elixir Software Engineer**, *Datajoin*, Provo, Utah (Remote), USA

- ○ Responsible for backend development and operations for greenfield development of Datajoin's custom technology integrations.
- ○ Wrote the primary data integration pairs that transfer business data from Adobe Analytics to Marketo as well as Adobe Analytics to Salesforce. This work was featured in the 2023 Adobe summit (See footnote #4). It also includes ensuring that code is appropriately typespecced and given quality tests.
- ○ Responsible for observability, which allowed us to understand how extremely complicated integration tasks which consume multiple different third party APIs are behaving at every step of the process. This includes ensuring OpenTelemetry instrumentation, of code, training other developers how to use it, writing internal tooling to enable the development experience. (See: "Code samples", otelwrapper.ex)
- ○ Responsible for CI/CD. Eg, making sure it works, is performant, reliable, and in sync with local development and deployments with ansible.
- ○ Responsible for Infrastructure. This means ensuring that AWS infrastructure was appropriately designed and segmented with Terraform. Also includes security and operations alerting, data lifecycle management, and appropriate secrets management.

2021 - 2022 **Elixir Software Engineer**, *Immersiva*, Los Angeles (Remote), USA

- ○ Responsible for a full greenfield product rewrite of a Node.js based prototype game engine into AWS EC2 hosted Elixir, with a LiveView frontend that functions on multiple different platforms. The game engine state machine is a pure Elixir GenServer implementation.
- ○ Custom Auth0 authenticated Content Management System for content development including media uploads into Amazon S3.
- ○ Implemented CDN functionality utilizing Cloudfront for game assets.

- Ensured LiveView functionality on multiple different hardware (Phone, PC) and browser (Chrome, Safari, Firefox) platforms.
- Full OpenTelemetry instrumentation of state machine and LiveView platform.
- Full HTML5 Media player Client <-> Server communications in Javascript & LiveView.
- Responsible for ensuring compatibility with other HTML based video players (Eg, Vimeo, Youtube, etc.).
- Built prototypes to test LiveView functionality on SmartTV platforms with TV-native applications.

2019 - Nov 2020 **Elixir Engineer**, *SafeBoda*, Kampala (Remote), Uganda

- Successfully migrated & redesigned a 50 million API call/day mobile application API from PHP to Elixir while keeping the application online for customers.
- Migrated from Heroku into Terraform-managed AWS infrastructure at a significant cost savings. Open sourced versions of the Terraform module code.
- Built NixOS & Ansible based deployments for frequent, safe, and fast Elixir deployments.
- Migrated AWS Aurora to regular RDS at a significant performance boost and cost savings.

2019 **DevOps Contractor**, *Blast Technologies (Remote)*, Austrailia

- Development of fully Puppet-managed Asterisk PBX.
- Put some of that puppet work back into open source.[Puppet Asterisk module https://github.com/jowrjowr/puppet-asterisk][Pupp

2018 **DevOps Contractor**, *coder.com*, Austin, Texas

- Deployed GCP infrastructure for coder.com.
- Oversaw migration from CircleCI to Jenkins for self-hosted CI infrastructure.

2013-2018 **DevOps Contractor**, *Upwork - Varied small & medium projects*

- Setup 50 node Chef managed cluster for a visual search engine concept, including a Ceph managed storage backend.
- Designed a Puppet-managed site deployment solution (~75 nodes) that deploys Wordpress sites as well as interfacing with associated registrar APIs to manage DNS. Hefty amount of Perl glue to accomplish this.

2012-2013 **Linux System Administrator**, *Rackspace*, San Antonio, Texas

- Was responsible for handling for RHEL, CentOS, and Debian support for Rackspace EMEA customers while simultaneously serving as an escalation point within my team for more complicated tasks.

Notable Personal Projects

○ An implementation of EVE Online Industry with an Elixir LiveView frontend. Was instrumental in my initial learning of LiveView and continues to be extremely useful for making large amounts of game currency to plan my industry activities. The project is open sourced and it is up on my github. [https://github.com/jowrjowr/eveindustry]

○ A conversion of a legacy PHP application that serves approximately a thousand users intoa Python based REST API built upon Flask. This includes a core authentication migrationinto LDAP. This application interfaces with a large number of 3rd party external APIs. The purpose of this was to teach myself modern Python and support the IT infrastructure of an entity within a game I played. Ended up open sourcing it all once everything was decomissioned.[https://github.com/jowrjowr/tri_api]

Education

2009	**Bachelor of Science in Physics**, *University of Alaska*, Fairbanks, US

Technical Skills

Programming & Scripting Languages	Elixir, Python, Bash. Will only admit to PHP or Perl upon a binding blood oath that they are read only as they are unloved.
Operating Systems	Linux. I know literally nothing of professionally managing Windows.
Cloud & Virtualization Providers	AWS, Google Cloud, VMWare.
Configuration Management	Puppet, Ansible, Chef

References

[Puppet Asterisk module https://github.com/jowrjowr/puppet-asterisk]

[https://github.com/jowrjowr/tri_api]

[https://github.com/jowrjowr/eveindustry]

[https://business.adobe.com/summit/2023/sessions/activate-beyond-adobe-solutions-integrate-adobe-ev-

[https://gist.github.com/jowrjowr/56a36a3da9a039038b8504b73bfe2461]