

JOHN SULLIVAN

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Shmeppy – Lead Software Engineer & Founder

2018 – Present

- Built a feature-rich map editor using React, TypeScript, and the Canvas API with multi-user collaboration supported via the [operational transformation](#) algorithm and WebSockets.
- Developed analytics pipelines in Python and Rust, enabling the rapid processing of over 500M log messages to support data-driven decisions.
- Optimized the onboarding funnel to attract 27K users who built 80K maps.
- Built a subscription system using [Stripe Elements](#) supporting 800 active subscribers.

Primer Learning – Principal Software Engineer (Part-Time Contract)

2022 – 2023

Built Unity simulations and editor extensions for their YouTube channel with 1.7M subscribers.

Khan Academy – Senior Software Engineer

2016 – 2018

- Led a team of five to display different content libraries to users in various locales. Onboarded other Senior Engineers and conducted end-user interviews and high-level design.
- Architected new in-house editing system for an internationally distributed team of content creators that tightly integrated [Crowdin](#) with our React, Python, Flask, and Google App Engine powered editing platform.
- Proposed, designed, and co-built a [Selenium](#) end-to-end testing system.

Khan Academy – Software Engineer

2014 – 2016

- Built the React frontend for the launch of Official SAT® Practice, led a team of four to lay a foundation for new test prep products, and was promoted shortly after.
- Championed adoption of [Flux](#) (later [Redux](#)) across the company.
- Created [Khan Academy's original engineering blog](#) and encouraged contributions to it.

Various Companies – Software Engineer (Part-Time Contracts)

2007 – 2013

Completed over 20 contracts of varying complexity using C#, WPF, and Visual Basic 6 with terms ranging from 1 to 36 months.

Additional Experience

- Interned at [Mozilla](#), [JetHead Development](#), and [Khan Academy](#).
- Taught C++ and Python as a Supplemental Instructor at the [University of California, Riverside](#).
- Co-founded [Galah Group LLC](#) and built a product with MongoDB, Flask, and OpenVZ containers.