Daniel Thengvall

San Francisco

I am a software engineer with over 14 years of professional experience, currently a Senior Software Engineer at Cruise where I focus on building secure, high-availability systems for autonomous vehicles. With deep expertise in telephony integrations, distributed systems, and compliance-driven development, I excel in designing and implementing robust services at scale. I enjoy collaborating across teams, mentoring fellow engineers, and continuously improving organizational processes.

Senior Software Engineer | GM Cruise LLC | 2019 - Present, San Francisco

- **Telephony Platform & Services:** Designed and built a Telephony Platform to separate call logic from the core backend, improving reliability and maintainability.
- Case Management & Twilio Expert: Go-to SME for Twilio call flows and debugging; led complex projects (e.g., vehicle multi-conferencing, call and cabin recording).
- **On-Call & Incident Response:** Frequently served as incident lead, conducted root-cause analyses for telephony issues, and provided postmortems to executives.
- Notable Initiatives
 - **Telephony Heartbeat:** Implemented a real-time service to monitor call health and alert vehicle riders + on-call engineers during outages.
 - Metrics & Analytics: Partnered with the Data Science teams to build pipelines for ingesting metrics into BigQuery/Looker, enabling real-time insights for the fleet.

Senior Software Engineer | Wyre Inc. | 2014 - 2019, San Francisco

Contributed to Wyre's high-volume cryptocurrency trading platform, focusing on user-facing apps and backend integrations with banks and exchanges. Developed dashboards for compliance and accounting teams, streamlining investigations and internal workflows. Onboarded new cryptocurrencies and payment rails, requiring robust API design, high security standards, and precise error handling.

Lead Developer | Rixty, Inc. | 2011 - 2014, San Francisco

Managed API integrations (Xbox, Skrill, Coinstar) enabling users without credit cards to purchase digital goods. Led localization efforts for new markets, including Brazil, and built internal support tools for an international customer base.

Skills

- Languages & Frameworks: TypeScript, Golang, Java, React, NestJS, Jest, Redux, Redux-Saga, RxJava, Node.js, Angular, Vert.x
- Cloud & Data: Google Cloud, Kubernetes, PostgreSQL, Cloud Spanner, Redis, AWS, Docker, MySQL, BigQuery, Looker, Pub/Sub, JOOQ, PagerDuty, Twilio, SIP, WebRTC
- **System Design:** Microservices, high availability, multi-region architectures, observability (metrics, logs, tracing)
- Other
 - CI/CD Pipelines: Buildkite, GitHub Actions, Terraform
 - Distributed Troubleshooting: Datadog, Stackdriver, Humio
 - Security Best Practices: Vault, JWT, RBAC/ABAC

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