ALEXANDER TRAPEZNIKOV

avtrapeznikov212@gmail.com / +7 9166571902 / +381 658108776 / Belgrade / Remote / Hybrid / On Site

Summary

My business card page - <u>www.atrapeznikov.me</u>

Bachelors degree in Computer Science at HSE University at Moscow. Passionate about Big Data, Distributed Systems and System Programming. Experienced in Architecture, Highload Services (100k RPS) and Management at Russian BigTechs: Yandex (Cloud & Selfdriving) and Ozon (eCommerce). Former Engineering Teamlead, who temporarily switched back to an IC position.

Programming since 14 years old. Commercial programmer since 2018 year.

Github Profile

Old pet project Zapp - persistent and durable kv-storage engine in Golang.

Experience

Principal Software Engineer

Playrix (GameDev)

07/2024 - Present

Stack: Golang, Python, AWS stack: SQS, DynamoDB, etc.; PostgreSQL, HashiCorp Nomad, Kubernetes, Open Telemetry + Sentry, Grafana + Prometheus, Teamcity.

Developing Golang and Python Platform microservices for Playrix Mobile Games and internal business processes with thousands of RPS.

Feature owning development and integration of a new general purpose platform Matchmaking service for all Playrix games.

Owning and developing internal Golang platform and CI/CD pipelines for improving developers' experience.

Golang Mentor | SWE Mentor

Self Employed

10/2023 - Present

Conducting mock Golang interviews, algorithms interviews and system design interviews. Personal Golang lessons with 50+ lessons and mock interviews.

My mentees successfully pass algorithmic and system design/architecture interviews to Big Tech Companies.

Topics:

- Computer Science basics & Algorithms and Data Structures
- Concurrency and Parallel Computations
- Golang and Golang Tooling: Unit Testing, Profiling, and Execution Tracing
- Linux basics, POSIX APIs, ASM, Hardware
- HTTP, TCP/UDP Stack, GRPC
- DevOps: Docker, Kubernetes, CI/CD
- Database Transactions, ACID, Indexes
- Distributed Systems Theory: Replication Mechanisms, Partitioning, Sharding, and the CAP Theorem
- Distributed Lock Services: ZooKeeper and ETCD, Raft and Paxos Replicated State Machine Consensus Algorithms.

Lead Software Engineer

Yandex Cloud (Russian biggest IT Company) 04/2024 - 07/2024 Stack: Golang, Python, GRPC, Yandex Cloud, Kubernetes, PostgreSQL, Airflow, Apache Hadoop, Apache Airflow, Apache Metastore, Teraform. A lot of infrastructure tasks.

Developing platform for Managed and Serverless Data Processing: Kafka, Hadoop, Airflow, Metastore

Launched public version of managed version of Airflow, which is considered to improve user experience for processing BigData on Yandex Cloud platform and increase conversion into other managed products: MDB, compute, etc.

Engineering Team lead

Yandex (Russian biggest IT Company) 06/2023 - 04/2024 Stack: Python, Django, DRF, Golang, PostgreSQL, Logbroker, Yandex Cloud, Yandex Deploy, Systemd

I joined Startup inside Yandex, which is trying to use self-driving technology to make real products. Our current products include Robo Delivery and Robo Taxi. I am developing the Fleet Management System for these self-driving products, as well as other internal services to support all internal operations and research and development (R&D) processes. These include platforms for managing inventory of rovers and hardware, booking and scheduling, and workforce management.

I lead a team of 4 backend developers.

- In addition to technical management and people management, I also take on the role of product owner. For 6 months, I have combined the roles of **Tech Lead**, **Team Lead**, and **Product Owner**.
- I created a technical and product roadmap for the team for 2024.
- I reviewed the architecture and identified the most significant tech debt tasks that needed to be addressed. Additionally, I helped split the monolith Python microservice and its database into two separate components.
- Set up communications with all internal customers and collected and prioritized projects.
- Set up the Scrum process, including sprints, planning, grooming, and more.
- Introduced new processes for **Observability** and **Stability** monitoring to the team. I set up duty and on-call procedures. Led the implementation process of Yandex's 9999 standard observability and stability monitoring framework.
- The number of incidents has dramatically decreased since I joined the team.
- Implemented processes for Product Documentation creation.
- Hired two Python software engineers (SWEs) to strengthen the team, and split the team into two parts with specific responsibilities.
- Developed a plan to expand the team and hire new SWEs in 2024.

Engineering Team Lead

Ozon (Russian 2nd biggest eCommerce) 11/2021 - 06/2023 Stack: Python, Golang, PostgreSQL, Kafka, and Kubernetes.

Microservices with 30 to 60 thousand RPS (approximately 100K max)

I was rotated to my previous project at Ozon - the Catalog service, where I was responsible for processing requests from client applications and performing full-text and faceted searches in our internal search engine, "O2."

I led a group consisting of **9 backend devs** in total.

- My performance review scores: 1 top performer, 2 meets expectations
- I was responsible for SERPs (Search Engine Results Pages) stability and performance. I conducted special meetings with customers and product managers, where I presented status reports and discussed priorities. I was responsible for the Delivery of new features
- Set up the Scrum process: sprints, planning, grooming, and retrospectives
- Hired 4 juniors, 4 mid-level, and 3 seniors, and split the team into two separate teams with their own specific responsibilities. Conducted performance reviews for all my direct and indirect peers. Introduced processes for incident management and performance degradation management.

Senior Software Engineer

Ozon (Russian 2nd biggest eCommerce) 09/2019 - 11/2021 Stack: Python, Golang, PostgreSQL, Kafka, Kubernetes

Microservices with 30-60 thousand RPS (up to 100k maximum)

Joined the Catalog team and developed the backend for the SERPs (Search Engine Results Pages). Responsibilities include processing frontend requests and building proper queries for the search engine. I also prepared data for backend-driven frontend widgets for web and mobile apps.

- I started at Junior level and became a Senior in two years.
- My performance review scores, as an individual contributor, include 2 "Top Performer" scores and 2 "Exceeds Expectations" scores.

Software Engineer

Smartdec (Cybersecurity) 10/2018 - 09/2019 Stack: Java, Kotlin, Python, PostgreSQL, RabbitMQ, Redis, Protobuf

Joined RnD team, which developed JVM bytecode Static Analyzer "Justice"

Later switched to the project DigitEx Crypto Exchange. A custom crypto currency exchange for DigitEx token.

Freelancing

Self Employed (Gamedev) 05/2016 - 06/2019 Stack: C++, SQF, Real Virtuality game engine, MySQL

Developing game mods for fun and money. Used SQF scripting language to make client-side and server-side logic. Developed C++ extensions for server side logic and database interractions

University Teacher

Higher School of Economics 03/2018 - 06/2018 Stack: Python, Unreal Engine 4

Teaching a group of 20+ HSE students Python programming: Syntax, Conditions and for loops

Skills

Communication, Conflict Resolution, People Management, Leadership, Go, Java/Kotlin, Python, C/C++, PostgreSQL, Kafka, Algorithms and Data Structures, Distributed Systems, System Design, Highload, Project Management, Low Level Programming and Linux, Classical Machine Learning, a little bit of Deep Learning

Education

Computer Science Higher School of Economics • Moscow 06/2020 Specialization in distributed and parallel systems