### Rodion P.

#### SOFTWARE ENGINEER

#### Education

Computer Science and Software Engineering

#### Language proficiency

English — B2

#### **Domains**

Commerce,

SaaS.

Ad-Tech

#### Software Engineer with 5 years of experience.

Experience in designing and developing large vertically and horizontally scalable monoliths, microservices applications, writing documentation for architectural solutions, team management.
Assistance at all stages of project development.

#### **Programming languages**

Python, JavaScript, TypeScript.

#### **Backend**

Django, Django Rest Framework, Flask, Flask-RESTful, FastAPI, Alembic, Pydantic, Marshmallow, SQLAlchemy, ElasticSearch, Celery, OAuth2.

#### **Frontend**

React, React Testing Library, Redux, HTML/CSS, Webpack, axios, MUI.

#### Message brokers

Kafka, RabbitMQ, AWS SQS, GCP Pub/Sub.

#### **Databases**

MongoDB, PostgreSQL, DynamoDB, Redis.

#### Cloud

AWS(Lambda, EMR, S3, EC2, EKS, ECR, ECS, CDK, RDS, IAM, SES, SQS, Redshift, DynamoDB, CloudWatch, Cognito, API Gateway, etc.),

GCP(Cloud SQL, Cloud Storage, Pub/Sub, Cloud Functions, Kubernetes Engine, Load Balancing, Cloud Logging, etc.).

#### **DevOps**

Docker, Docker Compose, Kubernetes (k8s), Jenkins,

Terraform, AWS CDK, GitHub Actions, Bash.

**Source control system** Git, GitLab, GitHub.

### **Achievements**

#### Infrastructure optimisation

By integrating Kubernetes on the AWS cloud, the infrastructure was optimized to achieve significant cost savings while enhancing load capacity and performance. This approach led to a reduction in average infrastructure costs by approximately 30-35%, demonstrating a successful balance between scalability, efficiency, and cost-effectiveness in the cloud environment.

#### **React Performance Tuning**

Conducted comprehensive performance analysis on React application, implementing optimizations that led to a 25% improvement in frontend rendering speed. Utilized React DevTools and Chrome Lighthouse for profiling and identified critical areas for enhancement.

# Implementation of Comprehensive CI/CD Pipeline

Engineered a streamlined CI/CD pipeline for the codebase, including Python automation scripts and best practices to automate the build, test, and deployment processes. This CI/CD implementation significantly accelerated the release cadence, reducing manual intervention and minimizing deployment errors.

### **Projects**

#### LEARNING PLATFORM

A learning platform with videos related to cars, users can upload their videos there or integrate with YouTube. There is also a map with all suppliers of spare parts for this customer.

#### **Project roles**

Software Engineer

#### Period

05.2022 - Till Now

#### Responsibilities

- Design new services architecture;
- Fullstack development;
- Implementing designs and layouts as per the Figma specifications;
- Implementing designer layouts;
- Implement dynamic React components;
- Creating complex and scalable serverless computations using AWS Lambda;
- Design and implementing AWS S3 for storing documents and other media;
- Rewrite microservices communication from REST API requests to AWS SQS;
- Optimizing performance of SQL database system with indexes;
- Configure the Jenkins server;
- Configuring Jenkins for CI/CD pipelines;
- Configuring services communication with AWS SQS;
- Configure AWS SES for mail sending information and statistics gathering;
- Setting up retry mechanisms, and implementing backoff strategies for Celery tasks;
- Implementing indexes on SQL tables and optimizing existing raw queries and stored procedures;
- Rebuilding indexes on SQL tables to optimize query performance and enable faster data retrieval;

- Design build triggers, tools, integrations, and workflow;
- Writing unit tests;
- Onboarding new developers;
- Code review.

#### **Environment**

Python, JavaScript, TypeScript, Django, Django Rest Framework, Flask, Flask-RESTful, SQLAlchemy, Pydantic, Alembic, React, React Testing Library, Redux, HTML/CSS, Webpack, axios, MUI, AWS(IAM, ECR, EKS, API Gateway, Lambda, DynamoDB, S3, RDS, Cognito, SES, SNS, SQS, etc.), Jenkins, Redis, Celery, PostgreSQL, Docker, Docker Compose, Bash, Terraform, Kafka, Kubernetes(k8s), GitLab.

# BOAT MONITORING SYSTEM

Boat Monitoring System is a web-based platform designed to collect, aggregate, and visualize data from boats navigating the oceans. The system enables users to monitor real-time boat data, manage fleets, and make data-driven decisions.

#### **Project roles**

Software Engineer

#### Period

06.2020 - 04.2022

#### Responsibilities

- Backend development;
- Serverless calculations using AWS Lambda;
- Monitor and optimize AWS RDS work;
- Configuring authorization using OAuth2 involves setting up the application to use the OAuth2 protocol for user authentication and authorization;
- Configure RabbitMQ replication;
- Implementing service for interaction with 3rd-party service for retrieving data;
- Solving complex optimization problems;
- Building AWS infrastructure with Terraform;
- Rebuilding indexes on SQL tables to optimize query performance and enable faster data retrieval;
- Managing ECS cluster;

- Writing IaC on AWS CDK;
- SQL query optimization;
- Identifying and resolving performance bottlenecks:
- Writing unit and integration tests;
- Implementing security and compliance controls in CI/CD pipelines;
- Implementing CI/CD using Jenkins.

#### **Environment**

Python, Django, Django Rest Framework, FastAPI, SQLAlchemy, Alembic, Pydantic, Celery, AWS(IAM, ECR, ECS, EC2, API Gateway, Cognito, Lambda, S3, SES, SNS, etc.), RabbitMQ, ElasticSearch, OAuth2, PostgreSQL, MongoDB, PostgreSQL, GitLab, Jenkins, AWS CDK, Docker, Docker Compose, Bash.

#### SHIPPING SOFTWARE

A shipping software that simplifies the customer's shipping process. It gathers all major carriers in one place and uses smart algorithms to find the most convenient and cost-effective shipping option for customers.

#### **Project roles**

Software engineer

#### Period

04.2019 - 05.2020

#### Responsibilities

- Fullstack development;
- Implement UI development principles to ensure that the product client-side serves at scale;
- Creating adaptable web layouts;
- Streamlining development workflow and bundle size with Webpack;
- Conduct security and penetration testing on the application;
- Build serverless part using Cloud Functions;
- Setup storage for images and other required files on Cloud Storage;
- Logging with Cloud Logging;
- Solving optimization problems on the database;
- Database query optimization;
- Inspecting and optimizing stored procedures and

#### SQL queries;

- Create partitions on SQL tables;
- Implement centralized storage for collecting and processing of raw and systematized data;
- Was involved in CI/CD configuration using GitHub Actions:
- Writing technical documentation;
- Writing bash scripts.

#### **Environment**

Python, TypeScript, JavaScript, Django, Django Rest Framework, Flask, SQLAlchemy, Marshmallow, Alembic, Celery, React, React Testing Library, Redux, HTML/CSS, Webpack, axios, MUI, GCP(Cloud SQL, Cloud Storage, Pub/Sub, Cloud Functions, GKE, Load Balancing, Cloud Logging, etc.), Kafka, MongoDB, PostgreSQL, Redis, GitHub, GitHub Actions, Docker, Docker Compose, Kubernetes(k8s), Bash.

## **Professional skills**

Programming languages         Python         5         2024           JavaScript         3         2024           TypeScript         3         2024           Backend         Django         5         2024           Flask         5         2024           Flask-RESTful         2         2024           FastAPI         2         2024           Alembic         5         2024           Pydantic         4         2024           Marshmallow         1         2020           SQLAlchemy         5         2024           ElasticSearch         2         2022           Celery         5         2024           OAuth2         2         2022           Frontend         React         3         2024           Redux         3         2024           HTML/CSS         3         2024           Webpack         3         2024           axios         3         2024           MUI         3         2024	SKILLS		EXPERIENCE IN YEARS	LAST USED
TypeScript   3   2024	Programming languages	Python	5	2024
Backend   Django   5   2024     Django Rest Framework   5   2024     Flask   3   2024     Flask-RESTful   2   2022     Alembic   5   2024     Pydantic   4   2024     Marshmallow   1   2020     SQLAlchemy   5   2024     Elastic Search   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     Webpack   3   2024     Oxios   3		JavaScript	3	2024
Django Rest Framework   5   2024     Flask   3   2024     Flask-RESTful   2   2024     FastAPl   2   2022     Alembic   5   2024     Pydantic   4   2024     Marshmallow   1   2020     SQLAlchemy   5   2024     Elastic Search   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     React Testing Library   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     Webpack   3   2024     axios   3   2024     And the second sec		TypeScript	3	2024
Flask   Flask   3   2024     Flask-RESTful   2   2022     FastAPl   2   2022     Alembic   5   2024     Pydantic   4   2024     Marshmallow   1   2020     SQLAlchemy   5   2024     ElasticSearch   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     Axios   3	Backend	Django	5	2024
Flask-RESTful   2   2024     FastAPl   2   2022     Alembic   5   2024     Pydantic   4   2020     Marshmallow   1   2020     SQLAlchemy   5   2024     ElasticSearch   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     Redux   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     Webpack   3   2024     axios   3   2024     Redux   3   2024     Webpack   3   2024     Axios   3   20		Django Rest Framework	5	2024
Frontend  FastAPI  Alembic  Pydantic  Marshmallow  1 2020  SQLAlchemy  5 2024  ElasticSearch  2 2022  Celery  5 2024  OAuth2  Prontend  React  React Testing Library  Redux  HTML/CSS  Webpack  axios  3 2024  2022		Flask	3	2024
Alembic   5   2024     Pydantic   4   2024     Marshmallow   1   2020     SQLAlchemy   5   2024     ElasticSearch   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     React Testing Library   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     axios   3   2024     axios   3   2024     Company   3		Flask-RESTful	2	2024
Pydantic   4   2024     Marshmallow   1   2020     SQLAlchemy   5   2024     ElasticSearch   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     axios   3   2024     axios   3   2024     2024   3   2024     2025   3   2024     2026   3   2024     2027   3   2024     2028   3   2024     2029   3   2024     2029   3   2024     2020   3   2		FastAPI	2	2022
Marshmallow   1   2020     SQLAlchemy   5   2024     ElasticSearch   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     React Testing Library   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     axios   3   2024     axios   3   2024     2024   2025     2026   2026     2027   2027     2028   2028     2029   2029		Alembic	5	2024
SQLAlchemy   5   2024     ElasticSearch   2   2022     Celery   5   2024     OAuth2   2   2022     Frontend   React   3   2024     React Testing Library   3   2024     Redux   3   2024     HTML/CSS   3   2024     Webpack   3   2024     axios   3   2024     2024   2025     2025   2026     2026   2027     2027   2027     2028   2029     2029   2029		Pydantic	4	2024
ElasticSearch   2   2022		Marshmallow	1	2020
Celery       5       2024         OAuth2       2       2022         Frontend       React       3       2024         React Testing Library       3       2024         Redux       3       2024         HTML/CSS       3       2024         Webpack       3       2024         axios       3       2024		SQLAlchemy	5	2024
Frontend         React         3         2024           React Testing Library         3         2024           Redux         3         2024           HTML/CSS         3         2024           Webpack         3         2024           axios         3         2024		ElasticSearch	2	2022
Frontend         React         3         2024           React Testing Library         3         2024           Redux         3         2024           HTML/CSS         3         2024           Webpack         3         2024           axios         3         2024		Celery	5	2024
React Testing Library       3       2024         Redux       3       2024         HTML/CSS       3       2024         Webpack       3       2024         axios       3       2024		OAuth2	2	2022
Redux       3       2024         HTML/CSS       3       2024         Webpack       3       2024         axios       3       2024	Frontend	React	3	2024
HTML/CSS       3       2024         Webpack       3       2024         axios       3       2024		React Testing Library	3	2024
Webpack       3       2024         axios       3       2024		Redux	3	2024
axios 3 2024		HTML/CSS	3	2024
		Webpack	3	2024
MUI 3 2024		axios	3	2024
		MUI	3	2024

SKILLS		EXPERIENCE IN YEARS	LAST USED
Message brokers	Kafka	3	2024
	RabbitMQ	2	2023
	AWS SQS	2	2024
	GCP Pub/Sub	1	2020
Cloud	AWS	4	2024
	GCP	1	2020
Databases	MongoDB	3	2022
	PostgreSQL	5	2024
	DynamoDB	2	2024
	Redis	3	2024
DevOps	Docker	5	2024
	Docker Compose	5	2024
	Kubernetes (k8s)	3	2024
	Jenkins	4	2024
	Terraform	2	2024
	AWS CDK	2	2022
	GitHub Actions	1	2020
	Bash	5	2024
Source control systems	Git	5	2024
	GitLab	4	2024
	GitHub	1	2021