



GUE KOK SHENG

📞 87704191 ✉ koksheng0406@gmail.com 🌐 3 years

🌐 <https://github.com/Koksheng>

📍 Currently Employed 🏢 Software Engineer 🇲🇾 Malaysian in Singapore

Education

Universiti Utara Malaysia Bachelor of Science with Honors (Information Technology) 2016 - 2019

Skills

- Familiar in developed and maintained a scalable backend using .NET Core framework and C#.
- Implemented RESTful APIs using .NET Core Web API to handle various client requests.
- Familiar with MSSQL database and table design.
- Familiar with tools like Git, Visual Studio, ChatGPT, Swagger, and Postman to enhance development collaboration efficiency.

Work Experience

ASMPT Singapore Pte Ltd Software Engineer Oct 2022 - Now

- **Project Structure:** Django, MSSQL, HTML, CSS, JavaScript, C#, Git
- **Project Description:** The system is a platform for managing product requirements, design specifications, and test lists. It supports role-based access control and version control.
- **Responsibilities:**
 - Started up the project from (0 to 1).
 - Developed the backend using Django, front-end interfaces with HTML, CSS, JavaScript, MSSQL for database management.
 - Provided APIs using ASP.NET Web API to allow downstream projects to access project and module info.
 - Created a C# application for scheduling tasks to fetch the latest project information from external sources every midnight.
 - Managed version control and collaboration through Git.

Medisys Innovation Pte Ltd Software Engineer Sept 2021 - Sept 2022

- **Project Structure:** C#, ASP.NET Web Forms, WPF, WinForms, Git
- **Project Description:** The system is a platform for managing operation room bookings and generating operation room reports for hospitals. It integrates with the hospital's centralized database to streamline patient information flow and ensure efficient booking and reporting processes
- **Responsibilities:**
 - Develop and support the existing system by using ASP.NET Web Forms, WPF, WinForms and MSSQL.
 - Provided support in bug fixes, data patches, change requests, maintenance, and deployment.
 - Familiar in maintaining and deploying code changes to windows service, task scheduler batch job and IIS.

Achievements:

- AWS Solution Architect - Associate. (Validation Code: FZ2C1XTJSFE41LWJ; Badge: [Link](#))
- AWS Cloud Practitioner. (Validation Code: XFEE0HMK9EQ1Q13P; Badge: [Link](#))
- Personal Website on S3. (Demo: <https://kokshengaws.click>)
- Picture Matching Game. (Demo: <http://my-matching-game.s3-website-ap-southeast-1.amazonaws.com>)

Project Experience

Smart BI Analytics

<https://github.com/Koksheng/kokshengbi-backend>

<https://github.com/Koksheng/kokshengbi-frontend>

- **Project Structure:**

- Backend Technologies: .NET Core, MSSQL, OpenAI API, RabbitMQ
- Frontend Technologies: React, Ant Design Pro

- **Project Description:**

- An intelligent data analysis platform that simplifies the process by letting users upload raw data and set analysis goals. The system automatically generates visual charts and conclusions, reducing time and effort while boosting efficiency.

- **Responsibilities:**

- Developed custom backend prompts to process user data and analysis goals, generating JSON for visual charts and analysis conclusions via the AIGC (OpenAI API) and returning results to the frontend.
- Converted xlsx files to CSV format to minimize input token usage for AIGC, improving performance and reducing costs.
- Validated user-uploaded data files (extension, size) to ensure system security.
- Used Redis-based rate limiting to prevent resource abuse by controlling user request frequency (limited to 2 requests per second per user).
- Enabled asynchronous AIGC processing with task queues, allowing immediate frontend responses and enhancing user experience.
- Used RabbitMQ to queue tasks and forward them to AI processing modules, ensuring tasks are not lost even if the system restarts, improving reliability.

Yuapi API Open Platform

<https://github.com/Koksheng/yuapi-backend>

<https://github.com/Koksheng/yuapi-frontend>

- **Project Structure:**

- Backend Technologies: .NET Core, MSSQL, gRPC, Ocelot
- Frontend Technologies: React, Ant Design Pro

- **Project Description:**

- Admins can publish interfaces, perform statistics and analyze the invocations of each interface. Users can register and log in to browse interfaces, get free trial of interface invocation, invoke them online, and use the client SDK to easily call interfaces in code.

- **Responsibilities:**

- The entire project backend is divided into five subsystems: web API, simulation interface, common module, client SDK, and API gateway.
- To prevent malicious invokes from users, an API signature authentication algorithm is designed to assign each user a unique access key and secret key for authentication, ensuring secure user invokes.
- Developed a client SDK based on a C# library and published it to NuGet Org, enabling quick interface invocations and improving development efficiency.
- Utilized Ocelot Gateway as the API gateway to implement routing, access control, signature verification, and interface statistics, enhancing security and facilitating system development and maintenance.
- To reduce code duplication across subsystems, extracted common business logic and used gRPC for communication between subsystems. This made the system more efficient and easier to maintain.