Nguyễn Quang Hiếu

BACKEND DEVELOPER

PROFILE

0369253286

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Thụy Khuê, Tây Hồ, Hà Nội

SKILLS

PROGRAMMING LANGUAGES: PYTHON, JAVASCRIPT, REACTJS.
DATA ANALYSIS AND VISUALIZATION: PANDAS, NUMPY, MATPLOTLIB.
DEVELOPMENT TOOLS: GIT, JUPYTER NOTEBOOK
CLOUD PLATFORMS: MICROSOFT AZURE (AZURE FUNCTION, AZURE BATCH, AZURE MONITOR), AWS (EC2, S3)
OTHER SKILL: AGILE DEVELOPMENT, LINUX, OOP, SOLID.

REFERENCES

Bùi Ngọc Trâm
Team Leader of Toshiba Software Development of Vietnam
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Nguyễn Thị Tươi
Subgroup Leader of Toshiba Software
Development of Vietnam
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OBJECTIVE

I am a software engineer with over 5 years of experience in software and application development. I am looking forward to joining your company to build applications and services that will truly bring value to both the company and the community through my skills, experience, high level of commitment, and passion for technology.

WORK EXPERIENCE

BACKEND DEVELOPER **8-2024 - Now**

Med-Aid Co., Ltd.

As a backend developer, I am responsible for designing, developing, and maintaining core server-side logic for a cultivation management system. I work closely with cross-functional teams to implement scalable APIs, ensure data integrity, and optimize performance for agricultural operations.

SOFTWARE ENGINEER **08-2019 - 06-2024**

Toshiba Software Development (Vietnam) Co., Ltd.

As a software engineer, my responsibility is to modify, update, refactor, and debug code, create design and test documents. Program software according to the project plan. Design and deploy high-performance computing software in Azure. Develop and test quantum computing algorithms. Perform software testing to ensure the software runs well and is free of errors.

PROJECTS

BACKEND DEVELOPER

CMS - CULTIVATION MANAGEMENT SYSTEM **8-2024 - Now**

Team size 9

Our project aimed to develop an application to support agricultural operations in managing crop lifecycles, resource allocation, and production planning. The system enables users to track cultivation activities in real time, schedule tasks, and analyze yields for performance optimization.
Main responsibilities:

- Building scalable and secure RESTful APIs.
- Designed relational database schemas.
- Discussion with customer for requirements.
- Set up a development environment using Docker.
- Simplify customer deployment by creating debian package.

Achievements:

- Successfully build a cultivation application and already applied to the real customer agriculture environment.
- Optimized development and production deployment process.

Technologies:

- Python FastAPI, Docker, Redis.
- Database: Cassandra, PostgreSQL.

SOFTWARE ENGINEER

SBM-SIMULATED BIFURCATION MACHINE **8-2020 - 6-2024**

Team size 5

Our project aimed to deploy the Simulated Quantum Bifurcation Machine on Azure Quantum, based on its Simulated Bifurcation Machine, which is an Ising model solver that can solve complex and large-scale combinatorial optimization problems with up to 100,000 variables at high speed. Users can utilize these algorithms with Azure Quantum Workspace, or via AWS marketplace.

Main responsibilities:

- Provide ideas to improve system architecture.
- Perform source code development, bug fixing, and system testing.
- Develop an automatic self-testing system for the system.
- Develop systems to automatically deploy systems to Azure or AWS.
- Set up a development environment.

Achievements:

- Successfully deployed Simulated Quantum Bifurcation Machine to Azure Quantum.
- Complete the automated testing process.
- Complete the process of automatically deploying the system to Azure, AWS.
- Best team at Toshiba Software Development Vietnam.

Technologies:

- Python, Javacript, Ansible, Azure, AWS.
- Testing framework: unittest for Python, Jest for Javascript.
- Database: PostgreSQL

SOFTWARE ENGINEER

STV MOBILE **1-2024 - 6-2024**

Team size 4

Our project aimed to develop a web application based on the customer's mobile application which gathers factory coordinates and information and saves it to the Database. The purpose of the project is to investigate the feasibility of ReactJS for the application.

Main responsibilities:

- Provide ideas to improve the source code, and choose the technology used in the project.
- Develop an automatic self-testing system for the system.
- Set up a development environment.
- Create a guide for using investigated technology.
- Perform source code development, bug fixing, and system testing.

Achievements:

- Successfully build a web application based on the mobile version.
- Complete the automated testing process.
- Successfully create a technical guideline for customers.

Technologies:

- ReactJS.
- Testing frameworks: Jest, Playwright.

AI ENGINEER

CAR TYPE RECOGNIZE **8-2019 - 7-2020**

Team size 3

Our project aimed to develop a deep learning model based on the shape of the vehicle to detect which model the vehicle belongs to, thereby automatically collecting tolls at toll stations in Japan.
Main responsibilities:

- Provide ideas to improve deep learning models for accurately detecting vehicle models
- Preprocess, generate data, and improve input data quality for deep learning models.
- Train a deep learning model to detect car types using TensorFlow
- Create weekly reports on project results and progress
- Set up a development environment

Achievements:

- We have achieved improved accuracy on customer data sets, reaching up to 96.5%.
- Special effort team at Toshiba Software Development Vietnam.

Technologies: Python, C++,VGG19

EDUCATION

ENGINEERING DEGREE OF ELECTRONICS AND TELECOMMUNICATIONS **2013 - 2019**

Hanoi University of Science and Technology