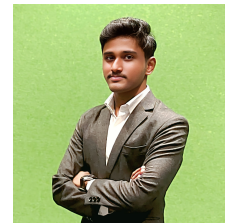# Balaji S

✉ balaji12.work@gmail.com || 🏢 Coimbatore, Tamil Nadu || 📞 9360201078

in balajiselvaraj0211 || ⚙ github.com/Balaji021 || 💻 Portfolio

HackerRank || LeetCode

Career Objective

To secure a position in a forward-thinking organization where I can apply my fundamental knowledge of Java, C, and full-stack development, while gaining practical experience and growing professionally. I am passionate about solving real-world problems, adapting to emerging technologies, and working collaboratively in team environments. With a strong commitment to continuous learning, I aim to contribute positively to the organization's goals through dedication, creativity, and a proactive mindset.

Education

Dr. N.G.P. Institute of Technology   **Tamil Nadu, India**
Bachelor of Technology - Information Technology   November 2022 - Present
CGPA: 8.59 (till 6th semester)

R.J. Matriculation Higher Secondary School   **Tamil Nadu, India**
Higher Secondary Certificate (HSC)   March 2022
Percentage: 88.3%

R.J. Matriculation Higher Secondary School   **Tamil Nadu, India**
Secondary School Leaving Certificate (SSLC)   May 2020
Percentage: 94.2%

Skills Summary

- **Programming Languages**: C, Java
- **Web Technologies**: HTML, CSS, JavaScript
- **Databases**: MySQL, XAMPP, Supabase(tool)
- **Frameworks & Libraries**: Spring, Spring Boot
- **Methodologies**: SDLC
- **Development Tools**: VS Code, Eclipse, Android Studio, IntelliJ IDEA, Postman
- **Technical Skills**: Problem-solving

Projects

- **Course-Registration System** : Developed a scalable Course Registration System using Spring Boot to manage course availability, student enrollment, and registration through RESTful APIs. The system ensures efficient data handling and quick retrieval of course and student records. It automates academic workflows, improves registration accuracy, and provides secure, modular access for users.   **Aug 2025 - Sept 2025**

  Tech: Java
  Tools: IntelliJ IDEA, Git, Postman
  Framework: Spring, Spring MVC, Spring Boot

- **File Encryption and Decryption using ECC**: Created a secure multi-layered authentication system using Quantum Key Distribution (QKD), facial recognition, and passwords for medical data. The integration of ECC and QKD enables quantum key exchange and encryption. At **35–40%** CPU usage, a 10 MB file was encrypted in **3.2 seconds**, ensuring high efficiency. The technology meets healthcare regulations, enhances data privacy, and protects against quantum threats.   **Jan 2025 - Apr 2025**

  Tech: Dart
  Tools: Android Studio, Git
  Framework: Flutter

- **Brain Tumor Classification (Machine Learning)**: This project focused on studying brain tumors using X-ray images. It uses ensemble techniques along with data augmentation. This approach raised the accuracy to **93%** and strengthened the results. **May 2024 - Aug 2024**
  Tech: Python
  Tools: Jupyter Notebook

- **Smart Parking System using IoT**: Developed a Smart Parking System to locate available parking spots. This was done using sensors and an Arduinoz 'd UNO. **Aug 2023 - Feb 2024**
  Tech: Embedded C
  Tools: Arduino UNO

INTERNSHIPS

- **Summer Intern at National Institute of Technology, Tiruchirapalli**: Created and published a dataset on Kaggle with labeled images of **Cowrie Shells** for classification tasks. This dataset offers useful resources for researchers and practitioners working on machine learning models in the field of object recognition and classification tasks. View

- **Internship at KrishTec, Coimbatore**: Completed a 7-day internship focused on the basics of IoT. Gained hands-on experience in creating responsive IoT applications and integrating key features.

Area of Interest

Software Programming, Business Intelligence, Full stack development, Database Management Systems

Technical & Industrial Exposure

- Workshop on **Artificial Intelligence** at **Bannari Amman Institute of Technology** in 2024
- Workshop on **Quantum Computing** at **IIT Madras** in 2022

Certifications

- Java Programming
- Problem Solving through Programming in C
- Introduction to Industry 4.0 and Industrial Internet of Things
- Completed the DSA-Trainers course by Finest Coder, gaining hands-on experience in data structures and algorithms.

Honors and Awards

- **Academic Rank :** Rank 5 in B.Tech program
- Winner in Paper Presentation
- Winner in Competitive Coding
- Worked on over 100 problems that focused on data structures and algorithms on LeetCode.
- Second Runner-Up at Anna University Sports Board (Karate) – December 2023

Extra-Curricular Activities

- **Karate**: Secured **First Place** in a **National-Level Karate Championship** and participated in multiple international championships.
- **Karate Journey**: Earned **Second-Degree Black Belt**, showcasing dedication and discipline in martial arts.
- **Skating**: Secured **Two Championship Titles** in an **Intra-Academy Skating Competition**.

Personal Details

Date of Birth: 2nd November 2004

Linguistic Skills: English, Tamil, Hindi (Read & Write only)

Personal Qualities: Creative Thinker, Quick Learner, Patience