

# LAKSHMANAN S

+91-7305304806 | [sivalakshmansivan@gmail.com](mailto:sivalakshmansivan@gmail.com) | [LinkedIn](#) | [GitHub](#) | Chennai, Tamil Nadu

## ABOUT

ECE student with a solid foundation in Software Development. Gained strong expertise in image processing through a project at NIOT with hands-on experience in real-time applications. Known for innovative thinking and proactive problem-solving skills in the software field. Dedicated to contributing effectively in IT domains.

## EXPERIENCE

### **INTERN - National Institute of Ocean Technology (NIOT)**

June 2025 – July 2025

- Developed a real-time application for transmitting and receiving image frames.
- Gained hands-on experience in image processing and communication systems.
- **Tools:** Python, OpenCV, Socket Programming (TCP/IP), Tkinter (GUI)

### **WORK - Saint-Gobain Glass India Pvt. Ltd - Apprentice Trainee**

July 2022 – July 2023

- Oversaw production line operations and ensured smooth workflow. Chennai, Tamil Nadu
- Performed quality checks on laminated window frames for durability and compliance.

## PROJECTS

### • **Frame-Based Image Transmission Application**

*Python, OpenCV, Socket Programming (TCP/IP), Tkinter (GUI)*

- Built a frame-based image transmission system by segmenting images into structured data frames for efficient transfer. Implemented metadata-driven frame transmission and accurate image reconstruction with loss handling over TCP/IP communication.

### • **Smart App-Controlled Cleaning Robot**

*Python, Bluetooth module, Arduino Uno, Sensors*

- Developed a Bluetooth-enabled smart cleaning robot with mobile app control for automated operation, enabling real-time communication between the robot and the application to improve control accuracy and overall system efficiency.

### • **Responsive Restaurant Website**

*HTML, CSS, JavaScript*

- Developed a responsive website with sections including menu, about page, gallery, and contact form.
- Ensured seamless performance across devices with smooth navigation and improved user engagement.

### • **Personal Expense Tracker with Analytics Dashboard**

*Python, Streamlit, SQLite, Matplotlib*

- Developed an expense tracker for managing and categorizing transactions.
- Visualized spending trends using interactive dashboards, enhancing financial tracking and analysis.

## EDUCATION

### **Madras Institute of Technology, Anna University**

*B.E. Electronics and Communication Engineering*

Sep 2023 - May 2026

Chennai, Tamil Nadu

## TECHNICAL SKILL

- **Languages:** Python, SQL, HTML, CSS
- **Tools/Frameworks:** Git, GitHub, VS Code, Google Cloud, Figma
- **Concepts:** Data Structures and Algorithms (DSA), Object-Oriented Programming (Python)

## CERTIFICATIONS / COURSES

- **Python for Beginners** - Infosys | Springboard - Completed with certification
- **Basics Of Data Structures And Algorithms** - Simplilearn | SkillUP
- **Introduction To Generative AI** - Google Cloud | Simplilearn
- **Internet of Things (IoT)** – NPTEL (IIT Kharagpur): - Score: 79% (Jan – Apr 2025)

## AREA OF INTEREST

- Backend Development
- Python Development
- Web Application Development