

SHOPHINE SIVARAJA

Atlanta, GA • [+1\(706\)202-8305](tel:+17062028305) • shophine@gmail.com • shophine.dev • linkedin.com/in/shophine • github.com/shophine

EDUCATION

UNIVERSITY OF GEORGIA, **Master of Science in Computer Science**

August 2019 – May 2021

Coursework: Data Science Practicum, Algorithms, Computer Networks, Software Security Cyber Forensics, Cloud Computing

GPA: 3.94 / 4.0

ANNA UNIVERSITY, COLLEGE OF ENGINEERING GUINDY, **Bachelor of Engineering in Computer Science**

August 2015 – April 2019

Coursework: Data Structures, Algorithms, Machine Learning, Security, Networks, Operating System, Software Engineering

GPA: 3.74 / 4.0

TECHNICAL SKILLS

Programming Languages: JAVA, C, C++, SQL, NodeJS, PHP, Python, JavaScript, Ruby

Databases: MySQL, MongoDB, Postgres SQL, SQLite

Frameworks: Express, Spring, MVC, React, Jekyll, .NET, GIS

Mobile Development: Android, Flutter, Firebase, Ionic

PROFESSIONAL EXPERIENCE

UNIVERSITY OF GEORGIA, UGA INFORMATION TECHNOLOGY OUTREACH SERVICES

Athens, GA

Software Developer (Research Assistant)

January 2021 – Present

- Working with a team of three, writing controllers in ASP.NET MVC framework and performing LINQ queries in C# for SQL Server database.
- Creating a map interface using QGIS from the spatial data and migrating the vector tiles from local server to Amazon S3 buckets.

Technologies Used: .NET | MVC | AWS | GIS | Git | Apache Subversion | LINQ | C#

UNIVERSITY OF GEORGIA, COMPLEX CARBOHYDRATE RESEARCH CENTRE

Athens, GA

Web Application Developer (Research Assistant)

September 2020 – December 2020

- Developed and designed a user-friendly website in Jekyll by creating layouts for every category of the webpages and writing methods in Ruby to generate contents from data files.
- Worked on Python scripts to grab content for the website's publication page from external sources.

Technologies Used: Jekyll | Ruby | Python | MySQL | Git

UNIVERSITY OF GEORGIA, WARNELL SCHOOL OF FORESTRY AND NATURAL RESOURCES

Athens, GA

Full Stack Developer (Graduate Assistant)

February 2020 – June 2020

- Collaborated with the researchers to develop a statistical data model from various sensor data of river and designed an enhanced dashboard.
- Reduced the researcher's workload by 40% by improving the process of generating reports with a statistical data model.

Technologies Used: NodeJS | MongoDB | PHP | HTML | CSS | JS | Git

SOFTLOGIC INFOSYSTEMS PRIVATE LIMITED

Chennai, India

Software Developer Intern

April 2017 – May 2017

- Implemented the UI design in React for the coursework module for premium users in an eLearning system.
- Worked on the payment module and authenticated the user endpoints in Node.js for an eLearning system.
- Developed an android application for the eLearning system and integrated it with backend services by REST API.

Technologies Used: React | Android | MySQL | NodeJS | REST | Git

PROJECT EXPERIENCE

Estimating end-end performance of Google Cloud Serverless Function

September 2020 – Present

- Working on performance analysis of APIs in Google Serverless Function to provide performance factors in Service Level Agreements.

Dynamic Memory Overflow Detection using Taint Analysis

January 2020 – March 2020

- Detected the memory overflow attacks with 90% accuracy and tracked the program instruction and data propagation via library calls in PIN.

TCP Traceroute Analysis

October 2019 – December 2019

- Computed overall time for all packet hops from client-side using the TCP dump trace of traffic generated by the traceroute.

HTTP Downloading with Range Requests

August 2019 – September 2019

- Implemented a mechanism that requests an object in various range via HTTP calls, reconstructed it back to the original object, and verified the correctness using SHA256 checksum.

Unobtrusive Authentication of smartphone users by context-aware behavioral biometrics

January 2019 – April 2019

- Created an android application to build a multi-modal (Gait, Geospatial) behavioral biometrics and used location-based data modeling using Geofence to improve the accuracy of the system to 95%. Implemented Access Level Service Provider based on the outcome of the model.

Harvest Crop Price Prediction System for Farmers

January 2018 – March 2018

- Developed an android application and implemented a sowing date prediction model by Linear Regression approach in Microsoft Azure.

CERTIFICATION

- AWS Fundamentals: Going Cloud-Native**, Coursera
- Node.js: A complete developer**, Udemy

LEADERSHIP

Workshop Organizer, CEG Tech Forum, Anna University

September 2017 – February 2018