

Venkat Ramana Madhavan

Application Engineer

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Munich, Germany



SUMMARY

With five+ years in application and product development, I specialize in creating reliable products that enhance business skills for end-users and vendors. Interested in product portfolio with aim to lead cross-functional teams.

EXPERIENCE

Application Engineer

Rohde & Schwarz

09/2020 - Present Munich, Germany

- Develop robust back-end firmware in C++ for real-time radar measurements and implement a web interface platform using React, achieving 50% time savings through effective code and design reviews
- Led cross-platform application integration using Kubernetes and DevOps, contribute to successful migrations and enhancing efficiency by 60% for spectrum analyzers
- Delivered customer-driven features, supervised testing, and handled critical breaks to ensure high-quality releases and efficient test processes
- Software Engineer** - Development of Mobile Radio Tester - 09/2020 - 06/2022
- Developed backend firmware for WLAN 11ax measurements and implemented the Web UI framework for CMX Mobile Radio Tester, collaborating with an 8-engineer Agile team to enhance measurement reliability
- DevOps integration and deployed software using C++, Python, Angular, Docker, and SCPI across Windows and Linux platforms, improving cross-platform efficiency by 25%
- Tech Stack*: C++, Python, React, Kubernetes, SCPI, VISA

Intern

e.solutions GmbH | Siemens AG

01/2019 - 08/2020 Nuremberg, Germany

- Developed video stream analysis tools using C++11 and CMake, contributing 50% to an automotive infotainment project. Led GUI development with Qt and ensured cross-platform integration. Conducted unit testing to improve tool reliability and performance with Audi Partner e.solutions
- Developed and deployed augmented reality cloud applications on AWS, optimizing 3D models and reducing errors by 20%. Realized web-based applications using Angular with cross-platform support, improving scalability by 25%. Conducted thorough testing and error analysis, enhancing overall performance and reliability at Siemens Large Industrial Drives
- Tech Stack*: C++, Python, Angular, Qt, Docker, AWS

Senior Associate Consultant

NTT DATA

07/2016 - 08/2017 Bangalore, India

- Developed a banking and investment platform using Java, enhancing transaction processing efficiency by 30%. Contributed in development of secure financial features and optimized backend performance, resulting in a 25% reduction in system latency
- Improved efficiency by {30%} using Java, SQL, and Python for backend optimization

EDUCATION

MS in Communications and Signal Processing

FAU Erlangen-Nürnberg

10/2017 - 03/2020 Erlangen, Germany

Bachelor of Technology in Electrical Engineering

Jawaharlal Nehru Technological University

07/2012 - 05/2016 Hyderabad, India

LANGUAGES

Kannada

English

German

Hindi

Telugu

Tamil

PUBLICATIONS

RadarConf'20, Florence, Italy

<https://ieeexplore.ieee.org/document/9266434>

Contributed 70% on IEEE Paper for detection of multiple targets in a radar scene with single stage approach using artificial intelligence techniques

KEY ACHIEVEMENTS



Cost Optimization in DevOps

Pioneered an DevOps cost cutting project, leading to a 30% improvement in usage and performance



Successful Project Area Transition

80% Active Contribution to migrate project to operate with given regulations and efficiency boost.



Improved Firmware Quality

Increased measurement accuracy by 3% in WLAN 11ax firmware.

SKILLS

C++

Python

Node.js

Flutter

React

TypeScript

REST

gRPC

MongoDB

SQL

Matlab

Figma

Chai+Mocha

PyTest

SCPI

Playwright

Jenkins

Docker

Kubernetes

Redis

COURSES

Udemy

React

Udacity

Nanodegree in AWS Cloud Developer, Deep learning

PASSIONS



Interests

Playing Badminton, Table Tennis
Photography, Travelling, Cooking



Skills

Polyglot (Kannada, English, German, Hindi, Tamil, Telugu). Written and verbal communication skills to articulate complex technical concepts to clients enhancing project understanding and efficiency

DAY OF MY LIFE

Fuse creativity with technical skills to craft innovative solutions and streamline complex challenges into seamless user experiences. Well done, is better than well said!