Venkat Ramana Madhavan

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 venkatr95 Venkat Ramana Madhavan

Education

MS in Communications Engineering
FAU Erlangen-Nuremberg
10/2017 - 03/2020 | Erlangen,
Germany

B.Tech in Electrical Engineering
JNTU Hyderabad
07/2012 - 05/2016 | Hyderabad, India

Publications

RadarConf'20, Florence, Italy
Worked on **IEEE Paper** for detection of
multiple targets in a radar scene with
single stage approach. It was part of
master thesis and involves the usage of
deep learning.

Fields of Expertise

Programming
Back-end
C++ • Node.js • Python

Front-end/Mobile
React • Flutter • Typescript

Databases
Matlab • Figma

Databases
MongoDB • PostgreSQL • MySQL

DevOps
Jenkins • Docker • Kubernetes • Redis

API Design
REST • gRPC

Testing
Chai+Mocha • GoogleTest

Cloud & OS
AWS • Linux/Windows

Messaging System
Kafka • ZeroMQ

Professional Experience

Development Engineer | *Rohde & Schwarz*
09/2020 – present | Munich, Germany

Project Review: Code Review for the Web UI and Design Review for the platform
approval
- Design Review of implemented web components for a new product platform
- Active involvement in the design and code review of Web User Interface

Application development of new platform on measurements
- Development of robust back-end firmware to support real-time measurements
- Active involvement in the design of web interface for the application
- DevOps and application integration. Enabling of cross-platform support

Application Upkeep with the platform on spectrum analyzers and other supporting
instruments
- Solving bug-fixes and implementation of key customer features from
  on-customer-demand
- Succesfully migrated an instrument platform and shifted to a new work area
- Handling critical breaks in the application. Monitoring the confidence tests in the
  application test-suite. Enhancement of the SCPI tests for the newly implemented
  features

Application development of WLAN Measurements on CMx Mobile Radio Tester
- Backend firmware measurments of WLAN Standard 11ax
- Implementation of WebUI framework for the CMP Instrument
- Worked in Agile based environment with interdisciplinary team of engineers
- DevOps and Integration of software into platform. Time-based release of
  different builds under Windows and Linux

Working Student | *Siemens AG*
09/2019 – 08/2020 | Nuremberg, Germany

Augmented reality development for 3D models under AWS Cloud Services.
D**Development of cloud applications** on AWS platforms. Testing, error analysis
and optimization of 3D models
- Web based application with Angular 8 with Auth0 (Web JS library)
- Implementation of IT automation with Ansible (Bash and Python)
- Cross-Platform support (Windows and Linux) with Setup and creation of AWS
  services (EC2, S3), Network (load balancer, VPC, firewall handling)

Internship | *e.solutions GmbH*
01/2019 - 05/2019 | Erlangen, Germany

Tool development for analysis of video streams with Cmake (C++ 11) and GUI
development with Qt. Responsible for work in the field of infotainment in the
automotive environment. Cross-platform integration and unit testing of the video
analysis tool.

Interests

- Playing Table tennis, cycling
- Travelling and cooking new recipes