Sravan Balaji

Email: balajsra@umich.edu Phone: (248) 417 - 0955 Website: sravanbalaji.com

Education

- **University of Michigan** Ann Arbor, MI
  BSE in Mechanical Engineering and Computer Science in Progress; GPA: 3.726 *Sep. 2016 – Dec. 2020*

Work Experience

- **Hughes Network Systems** San Diego, CA
  Software Development Intern *May 2019 – Aug. 2019*
  - Designed and developed Windows GUI app in C# using .NET framework; automated mobile terminal configuration process to reduce user involvement, prevent errors, and decrease configuration time
  - Implemented location based services on terminal software written in C; used MQTT-SN protocol to provide low-cost method of sending GPS data to server

- **Rivian** Plymouth, MI
  Business Technology Intern *May 2018 – Dec. 2018*
  - Championed effort to remove Bill of Materials data inconsistencies; developed Excel macro to summarize mass and cost data, find incorrect data, and alert project managers; resulted in faster detection and resolution of issues
  - Introduced and implemented an internal website that collected and displayed data from business systems using Python and Django Web Framework; worked with APIs to present reports of issues by severity
  - Led effort to create a new service desk for IT team; worked with Jira Service Desk to create custom automation rules and workflows based on collected requirements; resulted in 70% to 95% increase in ticket resolution within SLA targets

  Vehicle Integration Intern *Jun. 2017 – Aug. 2017*
  - Developed a program in Java to summarize results of simulation; allowed users to modify inputs to see projected results of simulation to avoid additional testing and reduce costs

Research

- **Compliant Systems Design Lab** Ann Arbor, MI
  Research Assistant *Jan. 2019 – Apr. 2019*
  - Designed and conducted an experiment to investigate the applicability of digital image correlation (DIC) for analyzing strain in fiber reinforced elastomeric enclosures (FREEs)
  - Assisted in development of a C++ program to analyze creep behavior of a FREE and generate plots

Projects

- **SPARK Electric Racing at the University of Michigan** Ann Arbor, MI
  Mechanical Engineer *Oct. 2016 – Apr. 2019*
  - Manufactured parts for Spark electric motorcycle on mill based on engineering drawings; assembled parts and made adjustments when needed to ensure proper functionality without requiring additional machining
  - Designed and manufactured welding jigs, fairing mounting tabs, and frame components in CATIA; made engineering drawings of parts in SolidWorks for manufacturing

Skills

- **Programming**: C++, C#, C, Java, Python, Arduino, Excel VBA, LaTeX, HTML
- **Computer Aided Design**: SolidWorks, CATIA
- **Simulation**: MATLAB, Simulink
- **Manufacturing**: University of Michigan Wilson Center Basic I & II, Mill Training
- **Languages**: English (first language), French (conversational), Tamil (conversational)