## **James Touthang**

4408 W Norman St | Broken Arrow, OK 74012 | (918) 779-9989 | james@touthang.info

**Education** 

Oklahoma State University, Stillwater, OK Graduation: May 2017

Bachelor of Science in Computer Engineering GPA: 3.2

Oral Roberts University, Tulsa, OK

Bachelor of Arts in Biomedical Chemistry, Pre-Med GPA: 3.7

**Technical Skills** 

**Languages, Frameworks and Services:** Angular, Typescript, JavaScript, Bootstrap, HTML, CSS, .NET, C#, MySQL, Python, Azure DevOps, Jira, Node.js, R, Java, MATLAB, AWS, C++

**Programs:** Visual Studio, VS Code, InDesign, Photoshop CS6, AutoCad, Solidworks, Matlab, PSPICE, Altera Prime Edition and Xilinx, GSuite, Office 365, Modalism, Magic, Sue, IRSIM, GitHub, RedCap, PsychoPy, GitLab

Operating Systems: Windows, Mac, Linux, Unix

## **Technical Experience**

**Software Engineer IV:** FlightSafety International Inc.

June 2024 - Present

August 2012 – December 2013

- Design, building and maintaining the front-end web application in Angular for simulation control through unit tests, code reviews and software best practices.
- Writing and completing user stories related to applications out in production by fixing bugs and completing customer's needs.
- Leady monthly stakeholder's meeting with Flight Dynamics department to ensure our .NET C# quality test guide desktop application is best suited for their needs and to help simulation approval through the FAA and EASA.
- Maintain wiki documentation to install web development tools and train other groups in our department to push software out in production.

**Software Engineer III:** FlightSafety International Inc.

**August 2022 – June 2024** 

- Built the Front-End web application for starting, stopping, and monitoring full flight simulators using Angular framework, talking to a C# .NET middleware and a C++ backend with the Applications Team through Agile processes through daily scrum meetings, grooming and biweekly sprints.
- Maintain and implement features for a .NET C# desktop windows forms application that is used to validate and qualify simulators for the FAA by comparing aircraft data to simulation data through plotting and figures.

**Software Engineer:** Laureate Institute for Brain Research

June 2018 – August 2022

- Built an Online Web Application called Tulsa Life Chart in Node.js to collect PII and various relevant information regarding participants' life and mental health history.
- Wrote an object-oriented organization script in Python to automate converting MRI DICOM data into BIDS format on all new studies in the institute.
- Built a web application platform in Node.js for online psychological task paradigm using the PsychoJS framework used for local and remote online behavioral studies on Amazon Mechanical Turk.
- Setup and integrate psychological experiments to collect eye blinks, using BIOPAC system and electrostatic shock device.

Research Intern: Laureate Institute for Brain Research

**August 2017 – June 2018** 

- Extracting data from generated onsite tasks used for analyzing correlation matrix to help with decision making.
- Created plots in R from Life Chart database to show correlation between different reported events and overall life periods, along with different PROMIS and self-reported measures.
- Wrote a python script to slice Skin conductance data using a FFT over sliding window.

Student Intern: New York Genome Center

**June 2016 – August 2016** 

- Generate list of information with a python script from a PostgreSQL database to output 635 user's information.
- Gathering public information from the Personal Genome Project and pipe through an imputation pipeline through horizontal scaling using Amazon SQS service and EC2 instances to process 1.8TB of data and published the data at http://repgp.teamerlich.org for scientist to utilize the files.

## **Leadership Experience**

Peniel Baptist Church, Technical & Media Director

January 2022 - Present

- Responsible for purchasing Audio, Video and Network Equipment for the entire campus.
- Training and mentoring volunteers using audio and video equipment.
- Directing program and preparing visuals each Sunday as well as mixing the Front of House audio.

## Etta Kappa Nu, Treasurer

August – December 2016

- Filling out disbursements and submitting to the organization account
- Collaborating with other members to seek solutions for higher attendance.
- Tutoring students taking electrical science and network analysis.

Award and Memberships Bacon Family Scholarship Dean's Honor Roll