Vaikunth Sridharan

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EDUCATION

MS in Computer Science

Wright State University, OH, USA Aug 2014 - April 2018 GPA: 3.33/4.0

B.Tech in Info. Technology

Anna University, TN, INDIA Aug 2010 - May 2014 GPA: 3.15/4.0

INTERESTS

Interactive Visualizations for Data Analytics, and Decision Making, Scalable Data Processing, Wearable Technologies, Internet of Things (IoT)

COURSEWORK

Distributed Computing Algorithm Design and Analysis Advanced Wireless Networks Web Information Systems Web3.0: Next Generation Applications

SKILLS & TOOLS

Programming:

JavaScript • Java (incl. Android)

Client side:

HTML • CSS • jQuery (incl. UI) Libaries - jQuery, Lodash, High-charts

Server side:

NodeJS • Python

Frameworks - Express, and Sails

Databases:

MySQL • Elastic Search

Other Tools & Technologies

Git • Skale Engine • PM2 • Rest APIs •

NPM • AWS • Travis CI

ML Tools & Technologies

Skale-ML • Sci-kit • Weka •

Simple-Statistics JS

Command-line

Terminal for Linux & MacOS • Bash for Windows

OTHER

- Teaching Assistant | Web Information Systems CS 4800/7900 | HTML & CSS
- Master's Class Project | Tweet filtering using Active Learning | Bootstrap CSS, Socket.io, NodeJS, and Elasticsearch

LINKS

http://github.com/vaikzs http://linkedin.com/in/vaikunth-sridharan

EXPERIENCE

Northwell Health | Data Architect Intern (Wearable Tech.)

Jun 2016 - Dec 2016 | NY, USA

- Integrated IoT based application into Health Information Exchange (HIE) for risk assessment. (Third-party APIs such as Fitbit, Withings, etc, OAuth 2.0, Web service using SOAP).
- Incorporated a rule-based approach that could trigger in response to data upload from IoT devices used by patients. Simple Mail Transfer Protocol (SMTP) used to trigger emails to physicians, rules are created using HIE for healthcare providers.
- Explored and developed Amazon Alexa Skill which maps with a AWS-Lambda service designed using Node.js, capable of retrieving patient reports from Northwell server instance on doctor's query.
- Built an Interactive Clinical Decision Support tool to query Rules-engine easier for the BPM clients and summarizes better for making timely decisions.
- Managed conflicts, vulnerabilities and crashes in data transfer layer and ensuring delivering to HIE for analysis.

Kno.e.sis Research Center | Graduate Research Assistant

Jan 2015 - Apr 2018 | OH, USA

- Thesis: Engineered a real-time scalable system for kHealth which helps clinicians identify correlations from heterogeneous factors (environment, activity, etc.) causing asthma outcomes. Further info., visit LINK
- Mobile/sensor application geared toward Asthma and Bariatric patients to manage their disease. Developed sensor-android app connectivity which involved Bluetooth APIs, summarizing patient recorded readings, email background service and user interface features. Further info., visit https://knoesis.github.io/KHealth-Bariatrics
- Designed a JavaScript Plugin API for Twitris enabling JavaScript developers to leverage the NLP algorithms developed and exposed by Twitris such as sentiment, emotion, People-Content-Network analysis, etc., on tweets.

Servion Global Inc. | Software Developer Intern

Jun 2013 - Feb 2014 | TN, INDIA

- Charted a Flash Policy Java Service to maintain Web Socket compatibility for Internet Explorer 8 and 9.
- Designed a softphone by developing a Chrome Extension with HTML, jQuery and CSS. Extension enables the soft phone application (iframe) for Avaya and Sales-Force clients.

PUBLICATIONS

- [1] P. Anantharam, T. Banerjee, A. Sheth, K. Thirunarayan, S. Marupudi, **Sridharan, Vaikunth**, and S. G. Forbis. Knowledge-driven personalized contextual mhealth service for asthma management in children. In Mobile Services (MS), 2015 IEEE International Conference on, pages 284–291. IEEE, 2015.
- [2] **Sridharan, Vaikunth**, T. Banerjee, P. Anantharam, A. Sheshadri, R. Muppalla, A. P. Sheth, and K. Thirunarayan. City360: Visualizing multimodal city events for decision support. 2016. https://github.com/vaikzs/City360.
- [3] M. Kalra, A. Sheth, T. Banerjee, U. Jaimini, D. Kadariya, Sridharan, V, K. Thirunarayam, R. Venkataramanan, and H. Yip. Correlating multimodal signals with asthma control in children using khealth personalized digital health system. In A60. PEDIATRIC ALLERGY AND ASTHMA, pages A2031–A2031. American Thoracic Society, 2018.
- [4] A. Sheth, H. Yip, U. Jaimini, Sridharan, V, R. Venkataramanan, K. Thirunarayam, T. Banerjee, and M. Kalra. Feasibility of recording sleep quality and sleep duration using fitbit in children with asthma. In SLEEP, volume 41, pages A297–A297. OXFORD UNIV PRESS INC JOURNALS DEPT, 2001 EVANS RD, CARY, NC 27513 USA, 2018.