

Sarthak Jain

sarthak.jain@sjsu.edu | 669-699-8555 | <https://www.linkedin.com/in/sarthakssj>.

EDUCATION

SAN JOSÉ STATE UNIVERSITY | COLLEGE OF ENGINEERING
MASTERS | SOFTWARE ENGINEERING | (3.85/4.0)

Relevant Coursework: Cloud Technologies, Enterprise Software Platform, Enterprise Distributed Systems(*), Virtualization Technologies(*), Software Systems Engineering(*) (*Spring 2020)

SAN JOSE, CA
AUGUST 2019 - MAY 2021

NATIONAL INSTITUTE OF TECHNOLOGY JAIPUR

B.TECH. IN ELECTRONICS & COMMUNICATION ENGINEERING | CGPA: 8.95/10

Relevant Coursework: Data Structures & Algorithms, Database Systems, Operating Systems, Introduction to Machine Learning, Artificial Intelligence & Expert Systems, Neural Networks, Computer Architecture, Probability & Statistics

JAIPUR, INDIA
JULY 2013 - MAY 2017

PROFESSIONAL EXPERIENCE

TEKSYSTEMS GLOBAL SERVICES PVT. LTD

Associate Software Engineer | Hyderabad, India | July 2017 - May 2018

- **Automated** the task of resource allocation and weekly status reporting, increasing the productivity by at least **10%**.
- **Automated** physical monitoring of servers by deploying **shell scripts** that email health reports every morning.
- Built **Tableau reports** providing geospatial analysis of stores highlighting defaulters who did not submit their sales data.
- Revamped company's skill portal website using **Oracle APEX** providing sophisticated means of resource allocation, reports highlighting company's areas of expertise & portal accessibility to entire organization spanning geographies.

UNIVERSITY OF NEW BRUNSWICK

Research Assistant | Fredericton, Canada | May 2016 - August 2016

- Filtered the data using high dimensional data visualization & reduction techniques such as **PCA, TSNE** & observing the movement w.r.t. time & space.
- Developed **adaptation algorithm** to automatically change **classifier boundaries** based on the variations in new data thus obviating the need of manual re-training of classifiers.
- Use of **classifier and user independent metric** in adaptation eased its integration with the indigenously developed pattern recognition algorithm.

RELEVANT PROJECTS

CROWD-SOURCED MOBILE TESTING PLATFORM AS A SERVICE

San Jose State University | September 2019 - January 2020

- Developed a **Mobile Application Testing Platform as a Service** connecting Project Managers to crowdsourced Testers providing on-demand elastically scalable testing services. ([Project link](#))
- Test Runner using **AWS Device Farm**, Custom Bug Tracker, Discussion forum, Project file directory & personalised reports let users **monitor their project resource consumption & cost incurred**.
- Using **AWS ELB & Auto Scaling** to support load traffic with **MongoDB & S3** for storage, **ECS** for containerized application deployment & **React and Nodejs** for frontend and backend server respectively.

SMART LOAD SCHEDULING

San Jose State University | September 2019 - December 2019

- Developed a **SaaS** application that provides a **Smart Schedule** for home appliances considering ToU pricing, solar energy & user defined operating hours as input to **flask computing server**.
- **Dashboard reports** on daily savings, each appliance's operating cost, total monthly savings & units sold back to grid encourages users to shift their usage to non peak hours of the day.
- Implemented distributed service using **Kafka** & deployed on IBM Cloud using its **Kubernetes service**. ([Project link](#))

IOT BASED APPLICATION: SMART DOOR LOCKS

Electronics & Communication Department, NIT Jaipur, India | Spring 2017

- Manifested voice samples over raspberry-pi enabling voice controlling of locks via developed android application from anywhere on the campus, reducing the physical labor. Attached keypad & lcd provides for network failures.

MULTILINGUAL INFORMATION RETRIEVAL

Zine Research Lab, NIT Jaipur, India | Fall 2015

- Awarded **2nd** place in a shared task organized by **Microsoft Research** for identifying languages and named entities from words in multilingual sentences found on social media. **Publication accepted** and presented in conference ([link](#)).

SKILLS

Proficient Languages: Java, SQL, C++, JavaScript (Learning), Python

Technologies: AWS EC2, ECS, S3, DeviceFarm CloudWatch, Google App Engine, Kafka, Docker, MongoDB Atlas, IBM Cloud Kubernetes Service, IBM Watson Assistant, Unix, Node.js, React.js, Oracle SQL Developer, GIT, Informatica, Tableau

Volunteer: Emergency blood donor at Blood Connect

AWARDS

2016	Patent	'ORTHO-DAER', low cost setup for detection and analysis of Osteoarthritis
2015	2 nd /10	Microsoft shared task, FIRE Conference
2014	1 st /20	RoboArm, TechExpo, NIT Jaipur, Techfest
2014	top 10/100	Transporter, IIT Kharagpur Techfest