Pranav Prem

360 S Market Street, San Jose, CA. 95113 | (669)235-0248
pranav.prem@sjsu.edu | https://www.linkedin.com/in/pranavprem | https://github.com/pranavprem

Technical Skills

Languages: Python, Java, C++, C, JavaScript, HTML5, CSS3, JSP, PHP, SQL, bash, XSL.
Technologies: Spring, Hibernate, JPA, Maven, REST, SOAP, Hadoop, Node.js, React.js, Angular.js, Docker, AWS, Elasticsearch, Logstash, Kibana, MongoDB, Cassandra, MySQL, DynamoDB, AWS Cloud9, AWS Lambda, Git, Selenium, Jenkins, Jira.

Education

San Jose State University, San Jose, CA   Jan 2017 - Dec 2018
Master of Science - Software Engineering   3.95 GPA
- **Completed dual specialization** in Enterprise Software Systems and Cloud Computing & Virtualization with coursework in Enterprise distributed systems and Data Mining.

Goa University, Goa, India   May 2010 - May 2014
Bachelor of Engineering - Computer Engineering   3.7 GPA
- Completed coursework in Data Structures, Artificial Intelligence, Data Mining, Web Technologies and Mobile Computing.

Experience

Nest (Google Hardware PA) – *Software Engineer Intern*   Jun 2018 - Aug 2018
- Architected and designed a performance monitoring dashboard for the Nest Web Application using **Python, Dremel and a variety of internal Google tools**.

San Jose State University - *Teaching Assistant*   Jan 2018 - May 2018
- Fabricated an automated grading system with **Docker, REST API in Python, grails and shell scripts** as Teaching Assistant under Prof Paul Nguyen for Cloud Technologies course in Spring 2018.

HSBC Software Development, Pune, India - *Software Engineer*   Aug 2014 - Jan 2017
- **Led a team of 5 developers** in an Agile environment working on email solutions using **JSP (Spring, Struts and Hibernate)** for HSBC Europe, Middle East, and North Africa.

Achievements

- Engineered a **Lean Six Sigma Certified Greenbelt** Java application to **save over 2000 hours** of effort at HSBC.
- **Reduced team's overall time to market by 25%** in HSBC, by single-handedly designing and implementing a **Continuous Integration Continuous Delivery (CI/CD) pipeline and automation testing** with GitHub, Jenkins, Jira, Selenium, and Control-M.
- Wrote and presented a **paper** titled "**A Transmission Control Tunnel for Datagrams**" at **7th IETE Conference** on reliably and securely transmitting UDP data using a specialized SSH tunnel demonstrated with a VoIP (https://github.com/pranavprem/fyp)
- **Ranked 8th in India** for 'IEEE Xtreme 7' 24-hour **Hackathon**, solving questions using **C++** and **Python**.

Projects

Dragonstone Pizzeria   https://github.com/pranavprem/DragonstonePizzeria
Formulated and developed a Pizza ordering system strictly adhering to **Agile** methodologies, with **Sockets.io, Angular.js, Node.js, Go, MongoDB** cluster and **Redis** to handle **availability and eventual consistency** during partition tolerance. **Deployed to AWS using stack files in Docker Cloud with over 40 Docker containers in 5 AWS regions**.

SpartanBot   https://github.com/pranavprem/Spartanbot
Created a Python-based **Chatbot** with an **Alexa Skill** that finds optimal replies to questions on the SJSU domain using the **Watson NLC API, Google search API**, a custom NLC algorithm with a **MongoDB** backend and **Twilio API** for SMS.

California Ultra Speed Rail   https://github.com/pranavprem/CUSR
Engineered a ticket booking system for a Rail Network with a **React front-end** deployed to **Heroku** and a **Spring boot back-end** deployed to **AWS** with an **RDS database**. Additionally, developed a reporting system with **Elasticsearch and Kibana**.

Karma Mining   https://github.com/pranavprem/karmamining
Built a **Regressor** and a **Semantic Analyzer** that **mined 2.5 billion reddit comments** to generate a "score" for any comment. Further used this as a measure **to sort comments on posts** to get good comments at the top. Made with **Python and React.**

TasKing   https://github.com/pranavprem/TasKing
Fabricated a task tracking application in **Java** that won **Above and Beyond award** for **self-initiated projects** at HSBC.