Hua Zhang   360-553-2393
1262 Sierra Village Pl   https://github.com/hustbill
San Jose, CA 95132   hua.zhang@wsu.edu

Technical Skills

An innovative software engineer with 8 years of development experience, and expertise in:

- C++, Java and Python programming on Windows/Mac OS/ Linux

- Database design and programming: MySQL, SQL Server, PostgreSQL and MongoDB

- Open source frameworks: ElasticSearch, Logstash, Kafka and ActiveMQ

- Hadoop-related tools and technologies: MapReduce, HDFS, HBase, Hive

- Concurrent and distributed applications with AKKA/Scala, Maven/SBT

- Automated test with JUnit and TestNG, Mocha and Chai

- SOA related standards like REST/OAuth/JSON

- Cloud computing platforms: Amazon EC2, Azure

Work Experience

AboveGEM Inc.   Santa Clara, CA
Software engineer   *June 2015 - Present*

- Back-end APIs development and maintenance for direct selling companies
  Platform: Java/ Node.js / Kafka/ PostgreSQL/ Redis
  Work closely with product manager to translate business requirements to technical design
  Created a clean design, wrote quality code with appropriate unit tests, document the APIs
  Contribute to the continuous improvement of recommendation algorithms for performance
  Used cloud infrastructure services and integrate with other 3rd party services
  Wrote scripts for Nagois to monitor web services and Redis server
  Cooperated with Front End development team for troubleshooting

- New iOS Application-OPPORTUNITY for direct selling distributors (backend service)
  Platform: Java/ Go/ ElasticSearch/ MongoDB
  Developed back-end APIs for channel service in this new iOS Application
  Analyzed and improved the efficiency, scalability and stability of system and resources
  Visualized and analyzed logs via ElasticSearch, Logstash, and Hadoop
  Wrote adequate functional, compatibility and regression test scripts
  Provided systems administration support to customers

Washington State University   Vancouver, WA
Research Leader   *Aug 2013 - May 2015*

- Resource Allocation middleware for distributed system
  Platform: Java/Scala/ Maven/SBT/ AKKA 2.3.5
  Designed a resource allocation strategy in data sensitive environment
  Built a middleware library to enable developers to allocate resource automatically

- Constraint-based job Scheduler for Hadoop YARN
  Platform: Hadoop YARN/ Python/ Virtual box
  Designed a job-scheduling algorithm to satisfy resource constraints
  Implemented a job scheduler plugin library for Hadoop
  Setup a multi-node Hadoop cluster by Virtual box and Ubuntu on lab
  Created MapReduce jobs by Python, Hive and Pig to verify scheduler

Diebold

Senior Software Engineer/ Tech Leader   *Sep 2008 - Aug 2013*

- Enhanced Operator Assistant Suite
  A turn-key maintenance solution for Bank operators on Opteva and Haibao ATMs
  - Platform: .NET framework/C#
  - Used WPF & jQuery in development to empower the operators to diagnostic ATM jams
  - Solved test issues and supported package deployment on site
  - System maintenance and technical support for China Construction Bank
- Bulk Cash Recycler Module-USB Firmware Download Feature
  - Platform: .NET framework/C++/C#
  - Project scale: Client/Server architecture, about 12,100 lines code total
  - Technical leader - controlled schedule, dealt with cross team issues
  - Implemented new features and optimized existing ones to drive maximum performance

Alcatel-Lucent

Software Engineer   *Jan 2006 - Aug 2008*

Developed data management solutions and Web applications for China Unicom and T-Mobile
- Alcatel-Lucent 8650SDM (Subscriber Data Management)
  - Platform: Unix/C++/Java/XML/MySQL Cluster
  - Responsible for complete encode/decode implementation
  - Increased call attempts per second by 60% by introducing multi-threading mechanism to achieve more efficient CPU usage
- NGHLR (Lawful Interception Feature) for T-Mobile
  Transparently intercept and extract real-time information from vast amounts of voice, data and multimedia communications
  - Platform: Unix/Java/XML/SOAP
  - High level design and low level design, develop with SOAP
  - Feature implementation through cooperation with US colleagues
- CPEMS (Customer Premise Equipment Management System)
  - Platform: .Net Remoting, ASP.NET, ADO.NET, XML and SQLServer
  - Participated in developing a Browser/Server system to manage customer-posted devices
  - Implement two features: device alarms management and batch uploading files

Leadership and Service

MESA Mobile Apps Challenge   Judge   Vancouver, WA 2015

Education

Washington State University	Vancouver, WA
M.S. of Computer Science	*May 2015*
Huazhong University of Science and Technology	
M.S. in Software Engineering	*Dec 2005*
Yangtze University	
B.S. in Mechanical Engineering	*June 2002*

Certificates and Training

Project Management Professional Certification (PMP)	*Oct 2010*
IBM Rational UCM (ClearCase and ClearQuest, Build Forge)	*June 2009*