### **BHARAD (BHARADWAJ) PARTHASARATHY**

San Francisco, CA I (612) 860-0504 I star@bharad.net

### **OVERVIEW**

- Proficient in developing architecture for global scale applications with focus on scalability and efficiency.
- Experience collaborating across organization as a technical lead to deliver products from concept to launch.

## **EXPERIENCE**

## Google, San Bruno, CA

Jan 2016 - Current

## **Software Engineer** (YouTube Infrastructure)

- Spearheaded the YouTube Offline API migration (from Python to C++ micro service) from design to launch. Offline is a cross functional feature (Kids, Music, Go, Offline, Player) and this migration reduced latency by 6x and CPU usage by 6x.
- Improved efficiency of YouTube application processes by reducing memory by 30% (saved 140TB RAM).
- Built profiling tools to visualize RPC wait time to help triage performance regressions & request latency.
- Primary point of contact for crypto key support for YouTube API teams and primary author of crypto libraries.
- Added multiple capabilities to the dark launch migration platform which was used for migrating 70+ YouTube APIs to the new API platform.
- Served as a consultant from the Youtube platform infrastructure team for API owners to help with their migration efforts.
- Provided on-call support for a critical YouTube API serving X00,000 QPS.

# Path, San Francisco, CA

Nov 2013 - Dec 2015

# **Software Engineer**

- Owned all search backends for the Path iOS and Android apps. Rearchitected the search engine (3 billion docs) to perform real time indexing and reduced the storage by 80%.
- Shipped 10+ key features in Path API that handled millions of DAUs serving a few billion API calls/day.
- Added several features on Path Web (Node and Backbone) working with product and design teams.
- Built critical micro services (e.g. user API) and used distributed caching and queuing systems to help scale.
- Improved API performance (reducing CPU, memory, IO, latency, API calls) while DAU doubled.

# BrightScope, San Diego, CA

Jul 2011 - Aug 2013

## **Software Engineer**

- Shipped several search projects surfacing financial data in an enterprise SAAS product (ARR > \$3M/year).
- Developed the financial advisors listing and Q&A platform.
- Proactively built software tools to improve performance (5x) in data analysis and customer support teams.

# IBM, Bangalore, India

May 2006 - Sep 2008

### **Software Engineer**

• Built web services with focus on high availability in J2EE/Oracle for a leading telecom giant in US.

## **PROJECTS**

[More projects at bharad.net/projects]

• **AskFriends** – A Facebook application to ask your friends shopping questions and recommendations.

# **SKILLS**

- Languages: Python, C, C++, PHP, Java, JavaScript, Ruby, Go. Beginner in Lisp, Rust, Obj-C.
- MySQL, Mongo, Redis, Elasticsearch, Solr, Django, Flask, J2EE, Node, AWS, Google Cloud Platform.

### **EDUCATION**

## University of Minnesota, Twin Cities, MN

Sep 2009 - May 2011

Master of Science, Computer Science

### Coimbatore Institute of Technology, Coimbatore, India

Jul 2002 - May 2006

Bachelor of Engineering, Electrical & Electronics

#### **INTERESTS**

Hackathons, cubing, stock trading, cooking, playing ultimate frisbee, ping pong, and pool.