Linus Kipkoech

510-7017121| kipkoechlinuss@berkeley.edu

www.kipkoechlinuss.com/http://www.linkedin.com/in/linuskipkoech

EDUCATION

University of California, Berkeley – Berkeley, CA

December 2018

Bachelor of Science, Electrical Engineering and Computer Science (EECS)

Relevant coursework:

Operating Systems, Computer Security, Databases, Data Structures & Algorithms, Computer Architecture, Discrete Mathematics and Probability Theory and Structure and Interpretation of Computer Programs

RELEVANT SKILLS

Programming: Python, Java, C, SQL, HTML.

Other: Web design, iOS Development, Elastic Search, TCP/IP, Unix/Linux administration

EXPERIENCE

Software Engineering Intern | Walmart Labs –San Bruno

June - August 2017

- Worked on ELK (Elastic search, Logstash and Kibana) as a solution to replace manual querying of the database for Walmart's 1 billion plus customer records.
- Used Logstash with JDBC to pull the data from an oracle database into the Elastic search.
- Executed SQL queries using Cron.
- Set up and configured Elastic search with Logstash in a POC test environment to ingest over a billion records from an Oracle DB
- Refactored Elastic indices to optimize stored data which facilitated useable visualizations.
- Defined and created common visualization sets that could be reused in productions (used Kibana).
- Created pre-configured custom OneOps (Walmart's cloud) images rapid environment for development, test and production environments.

Full Stack Developer | California Statewide Database & Election Administration Research Center

January 2018 – now

- Develops new website for the organization using PHP, HTML, JavaScript and CSS. The website serves thousands of clients.
- Works with IT environments consisting of various Linux servers and cloud based website and server. Assisted in migrating a local server to Amazon Web Services EC2
- Provides Linux support to staff and manages all the machines used in the office. Also assisted in implementation of a new website.
- Worked with other members of IT team to develop effective server data recovery plan by configuring raid 5 and raid 0 on the servers
- Collaborates with a team of more than five people to design a road map technology and infrastructure of the organization.

Student Assistant | Berkeley International Office

May - Aug 2016

Worked SEVIS Coordinator in updating and managing international students' data on a daily basis. Also served as front-desk
customer service giving feedback and scheduling appointments for the clients.

COURSE PROJECTS

- Pintos. Developed a simple operating system framework for the x86 instruction set architecture that supports kernel threads, loading and running user programs, and file systems.
- BearMaps. Wrote the backend of a web mapping application using Java that loads XML and images from Open Street Map and renders the maps in a browser. Implemented the image rastering using Quad tree which, allowed for zooming in and out. Implement A star algorithm to determine shortest paths between two points on a map.
- **Firewall.** Investigated multiple aspects of the Great Firewall of China by examining and crafting raw network traffic and sending TCP packets that would normally trigger the firewall. I sent a sequence of packets so that the Great Firewall does NOT censor the request but the server will reassemble the request uncensored.