Resume

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Dedicated and motivated engineering graduate seeking entry level positions in software engineering.

Education

Master Of Science - Computer Engineering (3.53/4.0) May, 2017
North Carolina State University, Raleigh, NC

Bachelor of Technology - Electronics and Communication Engineering (8.62/10.0) May, 2015
National Institute of Technology Surathkal, Karnataka, India

Technical Skills

Languages: C/C++(Proficient), Python, Java(Intermediate), CUDA Programming Model
Operating Systems: Unix/Linux based OS's, Windows, Android, Version Control: Git

Projects

Ramdisk

- This project involved constructing an in-memory file system using a FUSE interface. FUSE allows for custom callbacks for linux system calls, which are used to modify the in memory file system. It supported regular linux commands like cd, mkdir, pwd, ls, rm, rmdir etc. Also supported saving/loading images. The file system was stress tested using Postmark. Languages used: C,C++.

CAWA Implementation on GPGPU-Sim

- This project showcases the CAWA(Criticality Aware Warp Accelerator) scheme on GPGPU-Sim. In order to implement CAWA, an accurate criticality predictor was built. Using the determined criticality, warp scheduling and cache prioritizing was done. A speedup of about 20% was obtained. The simulations were scripted in bash. Languages used: C,C++.

Thread Library

- This project involved designing a thread library. The library supports basic thread functions such as Join, JoinAll, Yield and Semaphores. Thread switching was done through the inbuilt uncontext.h library. Languages used: C.

Autonomous Vegetable Harvester

- This project involved constructing an autonomous robot from the ground up. It consisted of a camera that provided depth perceived inputs to a pre-calibrated robotic arm which then proceeded to collect the vegetable. The computer vision functionality was provided by the OpenCV library running on a Raspberry Pi. Languages used: C, Python.

Experience

Defense Research Organization of India— Bangalore, Karnataka
- *Summer Research Intern* Summer 2014

- Worked with RITED Department into research on Multiple Input Multiple Output Radars(MIMO)
- Comparison of MIMO Technologies to existing RADAR implementations

Honeywell— Kuwait
- *Trainee* Summer 2013

- Worked with several departments of the Company
- Test ran a basic control system with Honeywell proprietary software

Coursework

Operating Systems, Algorithms and Data Structures, Advanced Computer Architecture, Computer Design And Tech, Embedded Systems, Digital ASIC Design.