Dear CSE Students:

Welcome to the second newsletter of the spring 2014 semester.

**News from the Undergraduate Program:** Mentoring will be here soon. Watch your e-mail for more information.

**News from the Graduate Program:** For those of you planning to defend this semester, the important deadlines are as follows. College Full Draft Format Review: Thesis: February 22; Dissertation: March 7 – Catherine Burton; Defense: Thesis: by March 21; Dissertation: by March 25; College Final Manuscript: Thesis: March 21; Dissertation: April 4 – Catherine Burton; Graduate School Final Submission: Thesis: March 18; Dissertation: April 11. Please check the CSE Calendar of Events on a regular basis for all deadlines and events.

Attached are announcements for the following (please note that this listing does not imply University or Department endorsement in any way):

- iWINLAB MS Candidate (Dr. Gitlin’s lab in Electrical Engineering)
- An NSF-Funded Summer REU in Interdisciplinary Mathematics (June 9 – July 18, 2014)
- Engineer – Intern at Clever
- Buffer.net intern
- SiteWit C# or Java Developer Co-op
- Tutors needed for Jenkins Program
- MindSumo – Contest/Internship Opportunity for CS Students
- Geico Achievement Award

Regards,

Ken Christensen
Director of the Undergraduate Program (and Newsletter Editor)
Email: christen@csee.usf.edu
Overview

We are looking for a MS-level team member to participate in research on *in vivo* medical wireless devices. The team is currently involved in the design of a Miniature Anchored Robotic Videoscope for Laparoscopic surgery (MARVEL) and other embedded devices that are expected to revolutionize the field of minimally invasive surgery. Additional research is beginning on novel Electrocardiogram [ECG] systems.

Responsibilities

You will be responsible for researching new features, writing the firmware, and designing PCBs for the embedded hardware architecture. You will work closely with Dr. Gitlin, post-docs, PhD and MS students in the design, testing, and prototyping of the device.

Candidates should have proven experience in the following areas:

- C/C++ programming and Object Oriented Programming
- Software development on embedded platforms
- Working independently and in small teams on new feature development, including feasibility analysis, requirements capture, design, implementation, test, and maintenance
- Producing high-quality requirements and design documentation, and collaborating with others on design and implementation activities

Candidates with experience in following areas are preferred:

- GUI application on Labview
- JTAG debugging
- PCB CAD design
- I2C and MIPI Hardware interface
- VHDL coding
- Familiar with a synthesis tool (Altera, Xilinx, or other)
- Familiar with at least one RTOS
- Device driver and BSP software
- MATLAB/Simulink simulation
- Algorithms and data structures

Contact: richgitlin@usf.edu
An NSF-Funded Summer REU in Interdisciplinary Mathematics

June 9 – July 18, 2014

MAXIMA is an intensive six-week summer REU in interdisciplinary mathematics, run jointly by the Macalester Department of Mathematics, Statistics, and Computer Science (MSCS) and the Institute for Mathematics and its Applications (IMA). The program will be hosted at the IMA, located on the Twin Cities campus of the University of Minnesota (UMN).

Twelve students will work in teams of four on an open research problem in applied mathematics. The topics for summer 2014 are smartphone activity tracking, computer vision, and online communities. These problems have been posed by UMN researchers from biostatistics and computer science and engineering. Each team will be advised by an MSCS faculty member and will also be mentored by an IMA postdoctoral fellow.

The application process is now open. The program is open to full-time undergraduates majoring in mathematics or a related field at a U.S. college or university as well as international students studying in the United States. A $3,000 stipend, travel expenses, and room and board are provided.

All materials must be received by February 21, 2014.

www.ima.umn.edu/reu
reu@ima.umn.edu
Engineer – Intern at Clever

https://getclever.com/about/jobs

The Problem
At its core, education has a fundamental data problem: schools run on legacy infrastructure that is impossible for hackers to build on top of. We’re on a mission to replace the terrible things that developers have to do to build classroom software (think nightly CSV FTP transfers) with APIs that feel more like Facebook’s or Stripe’s. E.g. https://getclever.com/developers/docs.

When we started a year ago, four schools used Clever. Today, Clever is used by over 15,000 schools, making it the fastest-growing company in education. We’re looking for talented hackers who want to help us build Clever into something every school, student, and teacher relies on.

A Day in the Life
Interns at Clever work alongside full-time engineers, improving existing products and creating apps that live on top of Clever. Our very first intern wrote an iPhone app on the Clever platform that spread to over a 1,000 schools on the day it was released. Another intern wrote an app that let schools provision Google accounts, which now manages over 300,000 student and teacher accounts.

Clever is mostly written in Javascript, Python, and Go.

Requirements
- Must be a current college junior.
- Relevant coursework in computer science.
- Past projects demonstrating strong coding ability.
- A desire to grow as an engineer through collaboration, code reviews, and learning new languages/technologies.
- Excellent communication skills.
Buffer Inc, located in Riverview Florida, is currently seeking an intern to assist in a development of a software products.

- Earn money and learn how to use your programming skills to build products from top industry professionals and USF alumni.

- Part-time position 10 to 20 hours a week. Project based design so hours will vary. Most of the work can be performed off-site depending on experience level.

- Looking for a motivated self-starter with a desire to build a career in software development.

- Proficiency with C programming language is required. Experience with Python, Ruby or Perl is a plus. Will train the right person.

- Interest and/or experience with website development or data mining is a plus.

- Position available immediately for a qualified candidate.

Email resume and a brief personal bio related to this position to: elizabeth.horton@buffer.net
SiteWit is a technology company located here in Tampa Bay that focuses on online marketing. We’re growing faster than ever and we need some fresh faces to join our development team! Read below to see if you’re a good match to join the SiteWit family. Good luck!

Organization: SiteWit Corp (www.sitewit.com)
Job Title: C# or Java Developer Co-op
Hours: 20-40 per week
Wage: $12-17 hourly rate
Classification: Junior or Senior. Bachelor’s & Masters Students are eligible.

Job Description: We need a driven software developer who is passionate about software and is obsessed with beautiful code, OOP and optimization to develop web services and web code.
- You will be responsible for back-end development and optimization of a large scale pay-per-click optimization and management tool.
- You will work on server-side services and objects/functions/controls for a web-based front-end.

Qualifications: - C#, Java and/or VB
- Familiar with SQL
- Familiar with REST, JSON, SOAP
- Ability to work in a fast-paced environment
- Strong debugging/testing skills
- Ability to refine loose requirements into solid, efficient code and processes
- Ability to communicate clearly and work in alone or in a team
- Sense of humor

Preferred Skills: - Proficiency in CSS2/3 and HTML 4/5 (web standards, cross-browser)
- Work in open-source/personal projects (able to show code & collaboration ability)
- Work in distributed applications
- Active in development community

Applicants must be able to legally work in the U.S. and have a minimum GPA of 3.0.
Please send resume to chris.lord@sitewit.com
Tutors Needed!

The Jenkins Scholars Program is looking for tutors for the spring 2014 semester.

This is a paid tutoring position.

Applicants MUST have an overall 3.3 GPA, taken the respective course at USF, and received an A in the course.

Applications should be submitted by following the link provided: https://honors.usf.edu/TutorAPP_Verify.html

Courses are:  
- COT 4210 (Automata Theory & Formal Languages)  
- CDA 4205 (Computer Archit)  
- CIS 4930 (Low Power VLSI)

Contact Information: Katie Negron, Jenkins GA. Email: negronc@usf.edu
Contest/Internship Opportunity for CS Students

Hi Kenneth,

Happy new year! School is back in session and so is MindSumo! We have an amazing new challenge sponsored by Capital One for CS students with three job positions and iPad minis for top-performing students.

Could you forward the message below to your students? Please let me know if you have any questions!

Best,
Aaron Weiss

Dear Students,

Capital One has recently launched an exciting new challenge: Use population data to identify promising markets. Prizes include 3 jobs, 5 iPad Minis, and $500.

MindSumo challenges are a great opportunity to use the skills you're learning in classes, win cash prizes, and prove yourself to potential employers. To learn more, watch the 45 second video on the about page.

Any questions can be directed to aaron@mindsumo.com

Direct Links:
https://www.mindsumo.com
http://www.mindsumo.com/student_about
GEICO offers $1,000 Achievement Awards to exceptional college students

To be eligible for this program, students will:

• Be currently enrolled at an accredited four-year school
• Be a college sophomore or junior
• Have at least a 3.0 overall GPA
• Be majoring in business, IT, math or a related field
• Be a leader on campus and in the community

Applications must be postmarked by February 22.

Interested students are required to submit an application, resume, unofficial transcript, letter of recommendation and a short essay.

Questions? Email us at achievement@geico.com.

Applications must be postmarked by February 22. Learn more & download an application at geico.jobs/achievement.