Antonio Papa

Personal Summary

I am a talented graduate developer with a strong academic background and a proven ability to think critically and solve problems with well thought-out solutions. Currently, I am looking for a software developer opportunity which will allow me to work alongside an expert team of developers. Thereby, creating a synergy of driving my career progression to more senior roles in the future and advancing the interests of my employer. I decided to come the UK to improve my level of English, which I see as integral to my career as a software programmer.

Personal Information

Address	121 Sturgess Avenue, London NW4 3TY
Email	antoniopapa83@gmail.com
Telephone	(+44) 7754307736
Nationality	Italian
GitHub	https://github.com/engantoniopapa

Education

February 2014	Master's degree in Computer Science Score: 110/110 with honors (U.K. Grade Equivalent: 1st)
Organisation	Tor Vergata, Rome University, Italy
Thesis project	Data Transfers between User and Kernel Memory via Dedicated DMA Engine
Main subjects	Computer Security, Distributed Systems, Advanced Linux, System Embedded and Real Time, Mobile computing

February 2009	Bachelor's degree in Computer Science
Organisation	Tor Vergata, Rome University, Italy
Thesis project	Development of an Epidemic Protocol for Pure Decentralized P2P System
Main subjects	Foundations of Computer Science 1 & 2, Algorithms and Data Structures, Object Oriented Programming, Computers Architectures 1 & 2, Operating Systems

Projects

Title	Data Transfers between User and Kernel Memory via Dedicated DMA Engine
GitHub	https://github.com/engantoniopapa/Dmacftu
Description	Kernel extension that adds to original kernel the functionalities and information needed to manage a DMA engine that performs memory-to-memory transfers. The extension provides an interface for DMA transfers and a set of policies used to manage the DMA channels. One of these policies can also be used to manage the transfers of real-time applications, in fact it assigns exclusively the bus of the DMA engine, for a certain time interval, to the channels that handle high-priority tasks. The system that use this extension can improve the performance related to copy memory operation and can reduce the cache pollution up to 80%. The entire project exceeds 10K lines of code and was developed in C language.

Title	Epidemic Protocol for Pure Decentralized P2P System
GitHub	https://github.com/engantoniopapa/2Rounds
Description	Epidemic protocol that limits the data flooding produced by membership information and requests for resources localisation. This protocol provides a set of messages and routing rules that allows the peers to communicate in a system completely decentralized. The network applications that use this protocol can improve the network coverage, i.e. in a network with 500K nodes the network coverage is about 90% (with Gnutella protocol 20%), and control the data flooding. The entire project was developed in C language.

Title	Replicated Transactional File System for Distributed Systems
GitHub	https://github.com/engantoniopapa/pacu
Description	Applicative network file system with Client-Server architecture, that uses the replication protocol *primary-backup*. The file system space is divided into domains and every server has to manage one or more domains (primary) and has to be the replica of the other. The systems that use this file system are tolerant regard: omission failure (client side), fail-stop failure(client and server side) and Byzantine failure (client side). The entire project was developed in C language and uses the SQLite DBMS to manage the configuration and the log of the system. Furthermore, the system is tested on virtual network created by Netkit.

Work Experience

09/2016 to present	Barista, Lexington Catering Ltd (1 Old Jewry, London EC2R 8DN)
05/2016 to 09/2016	Barista, Sweet N Savoury (237 Kilburn High Rd, London NW6 7JN)
08/2015 to 05/2016	Barista, Costa (Tilling Road, London NW2 1LZ)
02/2015 to 07/2015	Korean Chef, Kimchee (106 New Oxford St, London WC1A 1HB)
09/2014 to 12/2014	Team Member, Burger King (Tottenham Court Rd, London W1T 1BA)

Computer Skills

Programming Language	C, C++
Kernel Hacking	• Knowledge of kernel Linux • Development of device drivers • Development of Profiling/Trace Systems • Development of Micro-Benchmarks
Operating System	GNU/Linux, Windows(XP, Vista, 7)
Office Automation	OpenOffice, Microsoft Office, LaTEX, Gnuplot
Version Control	Git, GitHub, Subversion

Languages

Italian, English