Julien BLACHE
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PROFILE

As a computer engineer, I enjoy working on innovative and challenging projects, finding the best possible solutions to complex issues and putting new technology to the test.

EDUCATION

- **M.Eng.** in Computer Engineering. INSA Lyon, France, 2007
- **B.Eng.** in Computer Engineering. IUT de Belfort, France, 2004

EXPERIENCE

Aug. 2009 – Nov. 2011   **INTM**   Lyon

OpenSource systems engineer   http://www.intm.fr

- Developed and maintained a custom Debian-based Linux distribution aimed at scientific computing, for workstations and large-scale HPC clusters
- Selected, adapted and maintained IT management tools (Pulse2) and assisted other teams on infrastructure projects (storage, authentication, printing, virtualization)
- Developed new features for FAI, a fully automatic installer, enhancing the automated partitioning & filesystem setup tool

Feb. – Aug. 2008   **BT Infrastructures Critiques**   Lyon

Datacenter tooling engineer   http://www.bt.com/france

- Developed and integrated custom, large-scale, multi-NOC monitoring tools (Nagios-based) including asset management integration for host and network topology information
- Rewrote part of the central event handling and event correlation code (SEC)

2005 – 2007   **Linbox FAS**   Metz

Product manager   http://www.linbox.com

- Designed the LIPS IP telephony solution, based on Asterisk and SIP (multi-sites, redundant)
- Developed the configuration agent and GUI module integrating the LIPS solution into Linbox' centralized, web-based management console
- Designed scalable/fault-tolerant VPN solutions, with OpenVPN and OSPF
- Researched and wrote a migration tool for the FirstClass groupware, reverse-engineering the on-disk data store

2004   **Sirius Technologies**   Metz

Software development engineer   http://www.siriustech.org

- Architected an all-in-one, turn-key, Linux-based workgroup server solution for SMBs, including automatic deployment platform and datacenter-hosted solution

OpenSource projects and activities

- Wrote an event-based DAAP multimedia sharing server (forked-daapd) as a better alternative to FireFly Media Server. Designed from the ground up to be Unix-portable, all the while making use of platform-specific optimizations when possible (epoll, eventfd, timerfd, signalfd). Initially built on top of libevent and ported over to Grand Central Dispatch
- Wrote the pommed daemon to handle various hardware features of the Mac laptops on Linux

and worked on the rEFIt boot menu and EFI runtime in Debian
- Ported TiLP and its low-level communication libraries to Mac OS X 10.1 to 10.3. Developed a Cocoa GUI and an IOKit-based USB driver – before the release of the official Texas Instruments solution. Also worked on the Linux port to improve the architecture and implementation (including Linux kernel drivers)
- Contributed to the Debian MIPS port: Linux kernel patches, ARCS bootloader maintenance
- Contributed to the SANE project: Linux integration (hotplug, udev, ConsoleKit), system and networking code, introduced mDNS support in the saned server
- Member of the Debian Project, producer of the eponymous Linux distribution

SKILLS

Systems	More than 10 years of experience with Unix-like operating systems (esp. Debian), storage & backup systems, monitoring, SSO
Networks	Advanced network architectures with BGP and/or OSPF, load balancers, failover switches, firewalls, VPN gateways, QoS
Services	Standard Internet services, VoIP (SIP, Asterisk), PostgreSQL, PgCluster, Oracle, MySQL
Development	On Unix-like and embedded platforms (VxWorks, …) using low-level and high-level languages (assembly language, C, C++, Objective-C, Perl, PHP, Java, SQL, PL/SQL, Shell, …). Git, Subversion and CVS version control systems. C code with both gcc and Clang. Wrote device drivers and kernel code.

LANGUAGES

- French (mother tongue)
- English (fluent, scored 955/990 on the TOEIC test)

MISCELLANEOUS

- (2006 – 2010) President, founding member, Association Debian France
- Contributing member, Software in the Public Interest, Inc.

REFERENCES

Available upon request.