

TECH TOOLS

Professional users are always searching for an edge.

Whether you work with Linux as a webmaster, programmer, system administrator, or security consultant, you know the best solution depends on finding the right tool for the job. We thought you might be interested in the following new products and updates.

Broadcom Offers 802.11 Linux STA Driver

Broadcom Corporation announced the release of their IEEE 802.11a/b/g/n hybrid Linux device driver for use on Broadcom's BCM4311-, BCM4312-, BCM4321-, and BCM4322-based hardware. Tar files are available for both 32-bit and 64-bit architectures. The hybrid binary driver files are designed to work with multiple versions of the Linux operating system kernel with the use of operating system-specific files and an operating system abstraction layer file.

To find out more and to download the tar file for your system, go to http://www.broadcom.com/support/802.11/linux_sta.php.

Flash Your Router Tomato

If you own a Linksys WRT54G family router or something similar and are disappointed in its performance, consider flashing it with Tomato. No joke or punch line is intended. Tomato, produced by Polar Cloud, is a simple, small, lean, and worthy firmware replacement for many Broadcom-based routers, in-

cluding the Linksys WRT54G/GL/GS. The most recent release of Tomato features a GUI administrative interface, bandwidth use monitor, and advanced QOS and access restrictions.

Why use Tomato? The standard firmware produced by the manufacturers of this class of router usually provides only basic configuration, administration, and management features. Updates for stock firmware are infrequent and results can be unsatisfactory. Tomato is designed to be a more robust and fully featured firmware replacement. Once you flash your router with Tomato, you should see an increase in your router's output power and broader wireless coverage. The admin interface lets you create rules to discriminate different kinds of network traffic and to monitor bandwidth.

Before downloading Tomato, review the *README.txt* file because not all versions will work on all router hardware platforms. Tomato is available for download in 7-Zip or TAR file formats. See <http://www.polarcloud.com/tomato> for more information or to download Tomato.

AMD's MultiView Technology on Linux

AMD's MultiView technology, which uses multiple GPUs on the same system for driving multiple display heads, was first introduced in the Catalyst 8.8 Linux driver and later refined in Catalyst 8.9. This allows you to drive multiple screens

– theoretically, up to 32 screens, although somewhere between two and six might be more reasonable – on a single Linux computer. This assumes, of course, that the hardware running Linux has sufficient graphics card and PCI Express slots. However, MultiView will only run on systems that possess two identical FireGL graphics cards belonging to a limited set of the FireGL series. If your Linux box holds a Radeon, don't expect to be able to use MultiView. Although this limitation is an issue, it should be resolved in future releases.

Visit <http://www.amd.com/us-en/> for additional details.

Linux Mini-Machine Protects Mac

Many people who fear the plethora of Internet threats on the prowl for vulnerable Windows machines have turned to Linux as a safer alternative. Of course, Mac, a distant cousin of Linux, also provides a safer surfing platform. That said, "safer" doesn't mean "invulnerable."

Compromising a Mac is still possible, if not overwhelmingly likely. If you're a Mac user and you want to add an edge to your online security, you might want to consider the Gatekeeper Pico for the Mac by Yoggie Security Systems. This security comes in the form of 12 small security tools housed in either a USB drive or card.

Actually, Gatekeeper Pico is a single, Linux-based mini-computer rather than 12 independent utilities. When plugged into a Mac, the device acts as an adjunct se-

curity tool, providing services such as a stateful inspection firewall, anti-virus, anti-spam, and Snort intrusion detection. All Internet traffic must go through the Gatekeeper before getting to the Mac, so any potential threat never gets the chance to compromise your system.

The Gatekeeper Pico comes in a card and USB versions. Find out more at <http://www.yoggie.com/>.

Enlightenment Window Manager for Mobiles

Carsten "Rasterman" Haitzler, developer of the Enlightenment window manager, has adapted his creation for the small screen. Enlightenment's new incarnation is called E17. It comes as a pared-down widget set with Treo 650 and Neo Free-Runner ports and seems to be a subset of the Enlightenment Foundation Libraries (EFL). The new Illume plugin adds small-screen support, and the entire windows system is supposed to run on just 32MB of RAM on an ARM9 processor clocked at 317MHz.

To learn more, visit <http://www.rasterman.com/>.

Dillo Unveils Version 2.0

Although you think that the browser wars are dominated by Firefox, Internet Explorer, and Google's Chrome, another face – albeit a smaller one – is emerging from the crowd. The eight-year-old Dillo, a super-lightweight HTML browser, is

making its mark in the world of embedded Linux systems, legacy hardware devices, and just about any other older hardware that runs on barely more power than Edison's first light bulb.

Did I say small and lightweight? Don't forget fast – Dillo is the speedy kid on the block, able to download pages quickly with little power use while supporting a subset of HTML, CGI forms, SSL, and cookies. Lack of support for JavaScript, frames, and https has been its downfall in the past, but with CGI forms support as its saving grace, Dillo thrives in environments such as survey kiosks and other closed worlds.

Dillo has also found a home on the various small Linux distros, including Antix (a MEPIS derivative), Damn Small Linux, Mustang Linux (Buffalo Linux fork), and VectorLinux.

To learn more, go to <http://www.dillo.org/>.

"FUEL" Language Standardization via Collaboration

Started by Red Hat, FUEL (Frequently Used Entries for Localization) is designed to cure the problems associated with inconsistency and lack of standardization in computer software translation. What does this mean to you? Imagine that your desktop experience – originally designed in English and translated to the language you speak and read – is not

providing a consistent method of naming tools, controls, and menus. For example, you are supposed to access a particular menu by clicking *Open* on one screen, but the same option for displaying the same menu is called *File* on another screen. Through collaboration with the very communities and localizers who are having standardization problems in translation, FUEL attempts to solve this desktop localization puzzle by devising the most appropriate and acceptable translations.

Instead of operating as a simple glossary project, FUEL organizes the localization task as an overarching journey comprising four broad areas that encompass all of the major desktop-related entries.

FUEL is community driven, and although anyone can volunteer for a language project, contributors must announce their intent via a mailing list. Any of the points in the previously mentioned journey – be it evaluation, bug reporting, or finalization – are scrutinized and approved by the community rather than separate individuals or teams. Any given language community that wants to work with FUEL should begin by sending information about using FUEL to their community mailing lists and the FUEL mailing list.

To learn more or to volunteer, visit <https://fedorahosted.org/fuel>.

Seagate Releases 500GB Momentum

Seagate announced the release of its 500GB Momentum 5400.6, which is said to be the fastest available in the notebook drive space. In addition to being fast, the new Momentum hard drive is said to be extremely quiet and able to withstand 1,000 gs of non-operating shock thanks to a free-fall sensor that can detect a drop and park the heads in less time than it takes to fall 8 inches (20cm).

Seagate's news coincides with Acer's announcement that it is using the 500GB Momentum 5400.6 drive in its new TravelMate notebook computers. Coupled with Seagate's 500GB Momentum hard drive, Acer's TravelMate is supposed to deliver a rich multimedia experience in a compact and robust package.

See the latest on this Seagate news at <http://www.seagate.com/www/en-us/>.