

Software News

■ P4V Running at LinuxTag

While Windows users have been able to use a graphical user interface to the Perforce version-control system for quite a while, a Linux GUI was not available before the LinuxTag expo (see p85). There, Perforce Software presented P4V, the Perforce Visual Client for Linux and MacOS X.

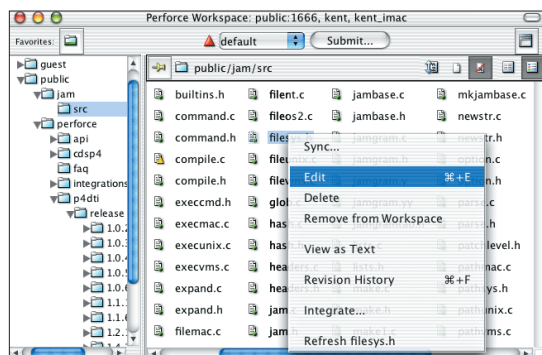
Having a standard graphical interface across a range of Operating System platforms means that developers can easily switch from one to another without the need to retrain. The new P4V allows developers to access file states and change their history more easily, thus reducing the number of errors usually made in this area. Workspace operations such as updating files and carrying out mergers are handled by the new interface which also allows three way mergings and combines built in differencing of development code.

To operate the P4V requires the use of a Perforce server to hold the code.

P4V can be downloaded free for use with a licensed or two-user Perforce Server for RedHat Linux (7.2 or 7.3) or Mac OS X (10.1 or higher).

As P4V is an end-user application designed for software developers, it does not support operations that require Perforce superuser, admin, or review privileges. This means that you can't use P4V to create new user specifications explicitly. However you can open a connection as a new user and then edit the specification for that user. ■

<http://www.perforce.com/perforce/products/p4v.html>



■ Mandrake in a Cluster

Mandrakesoft is now producing its own cluster-oriented distribution to allow it a foothold in the ever-expanding market of supercomputing, especially in research and development laboratories. MandrakeClustering has been put to use in risk analysis, seismic modeling and crash simulations making the most out of AMD Opteron processors, with support for IA-64 later in the year.

Much use is made of Wizards, like Clusterautosetup and kdeploy. These allow complete deployment of a cluster system in just a few minutes, thanks to technology provided by PXE. The system is kept up to date by calling on the services of URPMI, which has been parallelized to allow automated software updating of all nodes simultaneously.

Graphical tools help out with the configuration of the cluster, with most tasks

being just a click or two away, including jobs like adding and removing nodes from the cluster and creating virtual partitions. There is a graphical monitoring tool, which goes by the name Ganglia.

Two networks occupy the system, one for the administration chores, the other for the much more worthwhile job of passing the actual data around the cluster. This helps to avoid bottlenecks.

Mandrake has always been able to boast about its role in hardware recognition and that knowledge has been transferred into this solution. Each node in the cluster can adapt itself to its hardware, meaning that clusters could be built out of mixed hardware. Support for 16GB of RAM is available to those machines running Opterons. ■

<http://www.mandrakesoft.com/products/clustering>

■ Komodo Becomes Easier

ActiveState Komodo is the professional integrated development environment (IDE) for open source languages, providing a powerful workspace for editing, debugging and testing applications. Komodo is optimized for Perl, PHP, Python, Tcl, and XSLT.

The new version 2.3 adds improved usability, performance, and easier PHP configuration to the IDE.

The aim of Komodo is to produce higher quality code faster. This is achieved by using editing and debugging features to save you time and effort. With broad language support and cross-platform implementation you can standardize on a single IDE for all open source language development, thus simplifying IT development strategies.

The Komodo IDE allows for team cooperation by using Source Code Control integration (CVS and Perforce) to let you safely and securely control your development. It includes a visual interface for almost effortless creation and debugging of regular expressions.

The new version uses the cutting-edge XSLT debugging technology, making it simple to find problems in both input data and code. ■

<http://www.activestate.com/Products/Komodo/>

■ DTP on Linux

Wondering why even Linux Magazine is produced using non-Linux (that is: MacOS) software? There simply is no professional Desktop Publishing software around on the Linux platform. A first step has been made however with the release of Scribus 1.0, a Qt-based layout-software, at present sufficient to create newsletters, corporate stationery and other smaller documents.

It supports Unicode, manual kerning, CMYK color, EPS and PDF export (fonts – version 1.0 makes use of TrueType and PostScript Type 1 – can be embedded), and color separation. Using a plug-in, tasks can be automated with Python scripts. In addition to major languages, the software “speaks” Russian, Norwegian, Polish, Czech and a couple of others. ■

<http://web2.altmuehlnet.de/fschmid/>

■ SGI Training for Irix and Linux

SGI has launched their new training program, designed to ensure customers are able to use SGI products to their full potential and achieve the highest return on their investment. The courses, also available to prospective customers, will increase knowledge and understanding of current Linux based SGI technology.

Held at SGI's European Headquarters in Theale, the schedule covers IRIX, Altix and Open GL products. Courses will assist system administrators, system maintainers and graphics programmers to gain knowledge about SGI systems, including training on the IRIX and Linux system architecture, system network

administration and software development. Customers can learn about troubleshooting system problems, how to configure and verify system operations, gather status information and trace the flow of data.

By providing this training, SGI will be able to increase the number of technical users for its Altix 3000 computers and so provide a larger pool of knowledge to increase customer potential. It should also allow SGI to have greater insight on the needs and requirements of its customers so they can develop products more tailored to their exact needs. ■

<http://www.sgi.co.uk/custeducation>

■ Zeus with Optimum Opteron

The task of load balancing a group of servers is a vital job, one process too far and you could see your system go down. Zeus Technology has been forefront in the field of mission-critical hosting and Web infrastructure solutions. They have recently announced that their Zeus web Server and Load Balancer products will both be optimized for the 64-bit technology in the AMD Opteron processor.

Using a 4p 4-way AMD Opteron processor-based server, Zeus Web Server scored a SPECweb99_SSL score of 3,498. This is shown to provide better performance than six four-processor UltraSparc III-based servers.

The Zeus Load Balancer is a powerful traffic management tool, and as such, is complimented by the scalability now being shown by using Opteron processors. The conclusion of Ben Williams, the director of the server/workstation business segment, is that with commodity hardware running at these speeds there is no longer the need for people to purchase dedicated hardware load balancing solutions.

Zeus runs in a request-aware traffic management mode, which optimizes the movement of data through a network regardless of the servers it contains. ■

<http://www.zeus.com/>

■ Learning Perl Objects, References & Modules

O'Reilly has released a new tome on Perl.

One slogan of Perl is that it makes easy things easy and hard things possible. Learning Perl Objects, References & Modules is aimed at making the leap from the easy things to the hard ones.

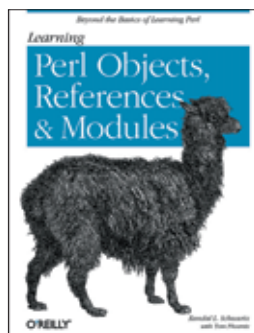
Topics include:

- Packages and namespaces
- References and scoping
- Manipulating complex data structures
- Object-oriented programming
- Writing and using modules
- Contributing to CPAN

Each chapter in the book is designed to be small enough to

be read in just an hour or two, ending with a series of exercises to help you practice what you've learned.

Learning Perl Objects, References & Modules is about learning to use Perl as a programming language, and not just a scripting language. This is the book that separates the Perl dabbler from the Perl programmer. ■



Learning Perl Objects, References & Modules
By Randal L. Schwartz
With Tom Phoenix
0-596-00478-8
205 pages
US \$34.95, £24.95

■ Mathematica 5

Available for Linux x86 and Alpha, Mathematica 5 introduces new functionality, much of which is based on algorithms that are not found in other products or that cost much more. Key new technologies enable Mathematica 5 to outperform dedicated numerical systems in raw computational speed.



Over 100 new algorithms for symbolic and numeric computation have been implemented by in-house developers, including major new algorithms for solving equations and inequalities symbolically over complex numbers, reals, and integers. ■

<http://www.wolfram.com/mathematica>

■ WebSphere Upgrade

The Linux version of IBM's WebSphere Software Development Kit has now moved to version 5.0.1. With it you will be able to create and test web services developed from an integrated package, which includes a simple Web application server, along with the tools needed to make it tick. Documentation and sample applications will show you how to make the most of the package. The samples will show you how to create a secure web service that meets the WS-Security specifications. The tools are designed to help create and test your Java-based web services efficiently.

The development kit will give you access to an embedded version of the IBM WebSphere Application Server, which has support for Orb and EJBs. In addition, you get an entry-level JDBC database to provide you with enough data while developing your services. ■

<http://www.ibm.com/>