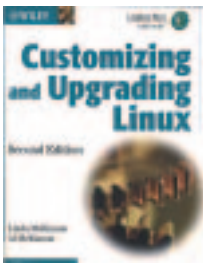
Book Reviews

If you are looking to set up a professional system, in need of a reference manual or a kernel hacker – we have the book for you. BY ALISON DAVIES



Customizing and Upgrading Linux

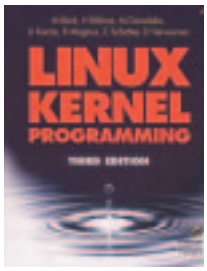
The book aims at being a quick reference for you to customize and perform a Linux upgrade on a network system. This is the second edition with new information on the 2.4 kernel and an expanded RAID SCSI section. It is based around Red Hat 7.1 Server installation but older 6.2 is covered as many datacenters still run with this.

The style of the book is an easy to follow text that does not patronize the reader. This is due to the McKinnons' previous experience as professional IT trainers. At first glance the book might seem a rewrite of so many installation guides that have gone before. What is different is the depth of information with which each topic is covered.

An example would be the notes about placing a swap partition onto another drive so it does not interfere with production read and writes of a data drive or the explanation of video interlacing for monitors. Printers and NFS installs are covered, as well as how to optimise or build from a source tree a new kernel. Overall this answers all the questions about your system where in the past you may have just installed with the default options. ■

L McKinnon, A McKinnon
Wiley Computer Publishing
ISBN 0-471-20885-X
£29.95

Linux Kernel Programming



This third edition has been revised to focus on the 2.4 kernel. The book aims at giving people information on how the Linux kernel works. It is the leading reference for those wishing to write modules or code for the kernel. Starting with compiling the kernel the text starts describing the different data structures and algorithms. By chapter four we are deep into the memory management system covering block device caching and paging. The file system chapter covers only ext2 but goes into detail explaining inode operations and structures.

The largest section of the book deals with device drivers and explains concepts from polling to dynamic drivers. There is a working example of a speaker driver within the section. After covering network implementation and module debugging the final part covers multiprocessing and atomic operations. A third of the book is taken up by appendices for procedure calls.

The CD which accompanied the book was not mentioned or referred to in the text. On examination this held the 2.4.4 kernel along with a host of documents from the Linux Documentation Project. On the whole, if you want information on the kernel then this book will become a well thumbed friend. ■

Beck, Bohme, Dziadzka, Kunitz, Magnus, Schroter & Verworner
Addison-Wesley
ISBN 0-201-71975-4
£34.95

Linux Administration Handbook

This book takes a practical approach to administrative needs of a Linux system. Working from the ground up it informs the reader of the fundamental basics for the various parts of a system – like system initialisation or managing devices – before going into comprehensive detail on how to administer those systems. Because Linux comes in different distributions, each of which can be configured in unique ways, books have, usually, had to decide on which flavour to follow. This book deals with Red Hat, SuSE and Debian.

The book runs to 890 pages, 18 of which make a full index. 29 chapters break the whole subject up into manageable chunks and stand on their own as sources of information to be plundered.

These chapters are broken in 3 sections, 'Basics', 'Networking' – which takes up more than half the book – and 'Bunch O' Stuff' that includes details on running a Linux system that 'Co-operates with Windows' and 'Policies and Politics' of using Linux.

A brief set of exercises follow each chapter, so the reader can confirm they are learning the subject, but thanks to the complete index, this will also form a useful reference work. ■

Evi Nemeth, Garth Snyder, Trent R. Hein
Prentice Hall
ISBN 0-13-008466-2
£39.99