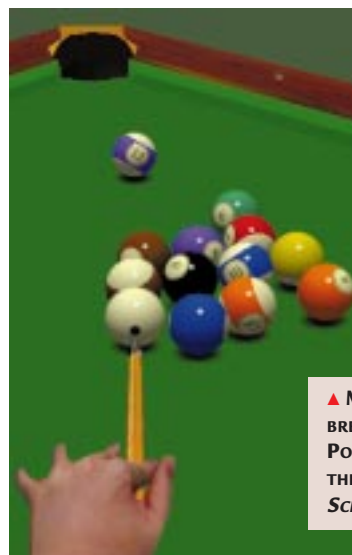# leisure lines

**A**nother month, another batch of brilliant game reviews. The delights we have for you in *Screenplay* this issue include **RESIDENT EVIL 2**, Biosys, Alpha Centauri, the new **SOUTH PARK** game, Pool:shark and Live Wire. There's variety in the *CD-ROMs* section, too. If you have green fingers or would like to increase your floral knowledge, the review of **ENCYCLOPAEDIA BOTANICA** will interest you, and Let's Get Cooking will be a great help in the kitchen. Other CD reviews include the follow-up to **DANCE eJAY**, and Flavours of Sound, software that celebrates 50 years of the modern Commonwealth. You also have a chance of winning copies of both of these CD-ROMs. In the *Kids* section we review a maths, reading and writing product called **LEARNING LADDER**, and speculate on the idea of flight simulation for children with Kid Pilot. In *Books* we explore **INFINITE LOOP**, the definitive story of Apple, and in this month's *Competition* there are seven **MITSUBISHI MONITORS** up for grabs. You could win a copy of the new Chambers dictionary if you complete our *Prize Crossword*, or if you're ready to tackle some *Brainteasers*, a book token could be on its way to you soon. And finally, in our nostalgic *Retro* column, Simon Collin explains why the **AMSTRAD PPC640D** is not the ideal travelling companion.

**ETELKA CLARK, LEISURE LINES EDITOR**
Etelka_clark@vnu.co.uk



▲ **MAKE A CLEAN BREAK WITH POOL:SHARK IN THIS MONTH'S SCREENPLAY**



**ABOVE FISHY BUSINESS IN LET'S GET COOKING INSET CHILDREN WILL ENJOY THE LEARNING LADDER**

▼**YES, KENNY GETS KILLED AGAIN, IN THE NEW SOUTH PARK GAME**

# Resident Evil 2

**Grisly goings-on in this zombie-zapper.**

**R**esident Evil 2, a third-person action game with puzzles, has just been released onto the PC after six successful months as a PlayStation title.

**Taking gory action** to a new extreme, you, rookie cop Leon S Kennedy, are new to Raccoon City, a nondescript mid-west town. The locals have all come down with a bad case of the Zombie 'lurgy', causing them to lurch to and fro and groan in a frightful fashion. Together with the only other sane person in the locality (who you can also play), it's time to sort out the mess.

Gameplay is viewed from various fixed camera angles, which change randomly but to good effect. You must blast your way from zombie to zombie, solving puzzles by interacting with people, and by using objects. It's all great fun, moving through locations armed with shotguns and flame-throwers.

Shooting the zombies is a messy affair, as they need more than one shot to sort them out good and proper.

**This game is a little tricky** to control and play isn't blisteringly fast. Compared to some of the more recent blockbusters, it hasn't aged all that well. But if you're into mutilation and flagellation, it will keep any bloodthirsty insomniac awake for hours.

JIM HARYOTT

**PCW DETAILS**

★★★★

**Price** £30
**Contact** Virgin Interactive
0171 368 2294 www.vie.co.uk
**System Specification** Windows 95/98, Pentium 166MHz processor, 24Mb of memory, 100Mb free hard-disk space, 4X CD-ROM drive, DirectX-compatible sound and graphics cards (3D card recommended.)

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# Live Wire

**Weird and wacky fun in this very crazy game.**

**T**his is one of the strangest games to land on the *PCW* games desk in quite a while. You're a bug-eyed fish-cum-dinosaur creature that hovers just above the ground, dribbling a trail of paint everywhere you go. Your mission is to zoom around a grid of squares, colouring them in before your opponents colour in too many of their own. All the time you are pestered by sharks that live under the game board, and all manner of crazies who are out to get you. Oh, and there's a thumping 'house music' soundtrack for your aural entertainment as well.

**Hope this is clear.** If not, I can put it another way. Live Wire is a dolled-up version of the classic seventies arcade game, Painter, in which you had to colour in as many squares as possible by tracing their edges with a roller. The gameplay is incredibly simple and this is why it's so very addictive.

There's more to it than just coloured squares, though: bad guys try to nobble you, and there are all sorts of bonuses to pick up. Each of the levels is a barrel of laughs: I particularly enjoyed skipping round the planet that is spinning through space. Live Wire is easy to pick up and a riot to play. What's more, it's a steal at only twenty quid.

J MARK LYTLE

**PCW DETAILS**

★★★★

**Price** £19.99
**Contact** SCI; 0171 585 3308 www.sci.co.uk
**System Specification** Windows 95/98, Pentium 133, 16Mb RAM, Windows-compatible sound and video cards, 20Mb hard-disk space, 4X CD-ROM drive, DirectX 5 or higher (supplied on the CD).

# Alpha Centauri

**The follow-up to the cracking Civilisation gives you control over some complex creation.**

**C**ivilisation is one of the all-time classic PC games, and Sid Meier's follow-up, Alpha Centauri, is an attempt to update an old favourite. A complex mix of population control and strategic planning, it places you as the leader of one of seven factions that has escaped from an apocalyptic Earth to crash-land on Planet, in Alpha Centauri.

**Gameplay** follows Civilisation's rules but updates the interface and adds more complexity. More keyboard shortcuts, increased automation and production queuing ease the repetition. The introduction of terrain elevation and

weather patterns means that base location is now a finer decision. It's difficult, however, and unless you're prepared to put in some long and patient hours, it can be frustrating. It's easy to play at novice level, stack the odds in your favour and use the auto-save for a quick fix of dictatorship, but those precious advances will only come with time.

The game's AI isn't perfect; after a while, automated units can stop doing anything useful. The people who will really get into this game will want to have control over every little detail — that's the whole point, really.

BARRY DE LA ROSA

## PCW DETAILS

★★★★

**Price** £34.99
**Contact** Electronic Arts/Firaxis Games 01753 546465 www.ea.com
**System Specification** Windows 95/98, Pentium 166MHz, 50Mb free hard-disk space, 32Mb RAM, 4X CD-ROM, DirectX-supported sound and video card.

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# Pool:shark

**Right on cue, a new, true baize-blazer.**

**A**ny true fan of Pool will tend to be wary of any claims made by the producers of software simulations. The idiosyncrasies or flawed elements of the real-life game couldn't possibly be conveyed; or could they...

**Pool:shark has 14** of the most popular rule sets to choose from, including 3 Ball, Killer, 10 Pin Bowl Pool, 8Ball US & UK, and of course Straight Pool. You can also select from various table sizes and shapes, including a diamond. Further, you can play hustlers with their own personalised styles and even enter tournaments with your friends over a network.

It certainly seems to be definitive on paper, and when it comes to actually playing, a marvellous feeling pours over you as you realise the game designers knew all that was missing in any
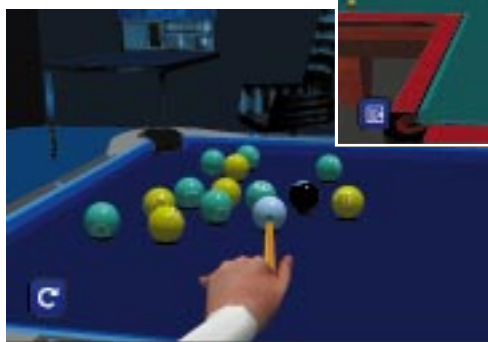
previous efforts. Full 3D physics systems allow balls to drop into pockets when the table is bumped, and they can be chipped off tables as well as generally making all the right moves. An intelligent camera always gives you the best view of the game, and an animated bridging hand allows for a fuller awareness of your positional requirements.

**There's a real level of skill** required to master these features and they're

not totally alien to the real-world environment they're attempting to simulate. Best of all is using the mouse to offer true cueing action. With the implemented force translated by the speed, you are able to ram the mouse towards your imaginary cue ball and despatch it with a great flourish.

IAN ROBSON

## PCW DETAILS

★★★★

**Price** £39.99
**Contact** Gremlin Interactive 0114 263 9900 www.gremlin.com
**System Specification** Windows 9x, Pentium 133MHz or equivalent (P200 recommended), 16Mb RAM (32Mb recommended), 4X CD-ROM, 10-90Mb free hard-disk space (depending on size of install).

# South Park: Deeply Impacted

**The game that's bigger than Cartman's fat a\*\* has some turkey tendencies.**

**A** mysterious **comet** that approaches once every 666 years is headed towards town, to cause untold mayhem. But fear not: Kyle, Cartman, Stan and Kenny are here to save the day. Armed with a host of



gadgets ranging from cow launchers to fart dolls, you'll have the opportunity to prove you're not a wuss against Mr. Garrison, Big Gay Al, Santa, Satan, Terrance & Philip and many more. You can choose the one-player story mode and endure five episodes based on the television originals, playing as one of the four stars. The first episode, 'Operation: Turkey Butt', starts off quite calmly, with you rounding up your friends. Then real fear casts its ugly shadow, as you're attacked by berserking turkeys.

There's no real playability, just the fact that you can become part of this beautifully recreated world in all its harmonious glory.

Oh, and Kenny dies.

IAN ROBSON

## PCW DETAILS

★★★

**Price** *£34.99*
**Contact** *Acclaim 0171 344 5000*
*www.acclaim.net*
**System Specification** *Windows 9x, Pentium 200MHz or equivalent with 3Dfx card, or P266, 32Mb RAM, 4X CD-ROM, 95Mb free hard-disk space.*

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# Biosys

**An ecological voyage of discovery inside a computer-controlled biosphere.**

**B**iosys is not your typical game — no guns, no fast cars, no beating up of opponents: it's a different kettle of fish altogether. As the first ecologically aware game we've come across, it's both gripping and thought provoking.

You take on the persona of Allan Russell, a scientist trapped inside his



own artificial biosphere. Your task is to discover and piece together the fragments of a conspiracy against you and your vision of the future.

**So far, so what?** Well, the extra-special ingredient comes in the form of a computer system that controls the biosphere. It's up to you to work out how to use it and get to grips with managing all aspects of the internal environment. Add a dash of amnesia and a murder or two, and you have a recipe for a thoroughly enthralling voyage of discovery.

**Your immediate surroundings** are presented in rich 3D graphics, through which you are free to roam as you explore the dome. In fact, it's entirely possible to ignore the overall object of Biosys and just become fascinated by the mechanics of the man-made world. Authentic sound effects add to the general spooky atmosphere of the deserted biosphere.

Biosys is a groundbreaking eco-simulation wrapped in a puzzle and presented with a generous helping of mysterious intertwined plotlines.

J MARK LYTLE

## PCW DETAILS

★★★★

**Price** *£35*
**Contact** *Take2; 01753 854444*
*www.take2games.com*
**System Specification** *Windows 95/98, Pentium 100 (200 recommended), 16Mb RAM (32Mb recommended), Windows-compatible sound and video cards, 123Mb free hard-disk space (375Mb recommended).*

# Dance eJay 2

**Song sung blue, or any way you like, as you sample up a storm in this musical mega-medley.**

**I**f you missed Dance eJay the first time around, the idea is that those nice eJay people supply you with over 1,300 musical snippets and sung samples, all of which are royalty free and recorded at 140bpm. These can be dragged and dropped onto one of the 16 tracks that form the upper section of the screen in whichever order you want to create an almost infinite number of songs. You can change the volume of individual samples by clicking on them and raising or lowering the individual level bar, or shorten it to crop the closing notes by dragging the right-hand border to the left.

**That's all there is to it.** For the more adventurous, there's the option of customising your tracks still further. The Groove Generator, which allows you to add a real-time drum track to your composition, can really carry your tune along, while the Effects Studio can be used to distort the bundled samples beyond recognition. The handbook is concise but comprehensive, covering everything the first-time user needs to know in an easy-to-follow way. This is an impressive, powerful and simple package, but more important than all of that, it's fun!

NIK RAWLINSON

☛ *We are giving away 5 copies of Dance eJay 2. Send your name and address on a postcard to: Neena Patel, FastTrak, 26 Greenhill Crescent, Watford Business Park, Watford, Herts WD1 8XG.*

**PCW** DETAILS
★★★★★
**Price** *£29.99*
**Contact** *FastTrak 01923 495496*
*www.fasttrak.co.uk*
**System Specification** *Pentium 66 or higher, Windows 95/98/NT 4.0, 16Mb RAM, 40Mb free hard-disk space, 4X CD-ROM, 16-bit sound card, 256-colour display.*

RECOMMENDED
PERSONAL
COMPUTER
WORLD

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# Encyclopaedia Botanica Plus

**This gardener's reference and storage database is blooming lovely.**

**S**pring is finally here, and if you haven't done so already, it's time to get your gardening mitts on. The extensive database in the Encyclopedia Botanica CD stores over 10,000 plants, and can be expanded with photographs and information on the user's own plants. The existing global plant reference includes information on maintenance, planning and growing your garden.

**You can conduct powerful searches** using three search functions, all of which allow you to list the plants in the database alphabetically, either by botanical name, family name or common name. And you can refine your search by looking for certain attributes, for example the flowering season, colour of the plants' flowers, and the type of growing soil.

The Journal feature allows you to record your own gardening, planting and weather notes, which is particularly helpful for monitoring your garden's progress. And the Create Garden Lists feature makes management easier, as you can compile lists of plants, and keep tabs on what you planted and where you planted it. You can print out your lists and labels too, so if you don't know the difference between a Venus Fly Trap and a Snapdragon, there's no need for concern.

**This is a nicely presented** CD-ROM, a comprehensive plant reference guide and a garden planner that is ideal for gardeners of all levels, interests and specialities.

HELEN FORTGANG

**PCW** DETAILS
★★★★
**Price** *£29.99*
**Contact** *FastTrak 01923 495496*
*www.fasttrak.co.uk*
**System Specification** *Windows 95/NT, 486 processor, 8Mb of RAM, 16-bit colour, 32Mb free hard-disk space, 6X CD-ROM, QuickTime for Windows 2.1 (included).*

# Flavours of Sound

**A vibrant, attractive way to get to know world music.**



**R**ather like the House of Lords, everyone knows what the Commonwealth is, but not so many of us are quite sure who's in it or what it does. This multimedia CD, celebrating 50 years of the modern Commonwealth, is designed to redress that balance.

**Following a live introduction** from the Commonwealth Secretary General, you're pitched into an attractive menu-driven environment. The vibrant colours and unusual sounds will be particularly appealing to children, making the product an ideal supplement to learning in the classroom, especially as project ideas for parents and teachers are also included. Kids will love the way that, via sub-menus and icons, they can delve deeper into those subjects that interest them. Indeed, the information supplied on the geography and culture of the countries themselves, and the way it is presented, is the equal of any multimedia encyclopaedia.

As the theme of this year's Commonwealth Day was music, you're treated to video footage of celebrations around the world and six audio tracks from a variety of world musicians, allowing you to sample the delights of stars from the African, Latin and Caribbean music worlds. There's a slight lack of interactive content, but it would be churlish to complain when the rest of the program is so lively, informative and, best of all, free.

OWEN GIBSON

☞ *We have 50 copies of this CD-ROM to give away. Send your name and address on a postcard, for the attention of:*
*Melody - Coleman Getty*
*PCW Flavours of Sound Competition*
*Carrington House*
*126-130 Regent Street*
*London W1R 57E*

## PCW DETAILS

★★★
**Price** *Free*
**Contact** *Commonwealth Society 0171 930 6733*
**System Specification** *Windows 95, Pentium 100MHz, 8Mb RAM, 4X CD-ROM drive, sound card.*

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# Let's Get Cooking

**For culinary clues, this is the plaice to start.**

**I**t's a sad fact of life that cooking can become a chore, especially if you run out of inspiration. This CD-ROM offers tips, recipes, techniques and even a pantry. There are video sequences of American star chefs, sharing their own expert techniques and advice, and answers to common questions.

**Instruction is clear,** from video help with the software, to 80 illustrated techniques. These are only drawings, however, and would be far more beneficial if they too were video sequences. The recipe section allows you to save your favourite choices, print



them out, and look at variations that use the same core ingredients. Nutritional information is displayed, and you can modify the recipe and give it your own title. The comprehensive recipe search is based on the 1,500-strong database which includes a photo-illustrated glossary of cooking terms and ingredients. Each screen display links to other parts of the program, while you can go back to any of the screens you have previously visited in that session. As well as web links to hundreds of cooking sites, a particularly useful part is the conversion of measuring methods. You can set up the program so that it displays the methods you prefer, for example American or English.

Although this isn't the best cooking program I've seen, Let's Get Cooking does give some ideas to anyone seeking culinary inspiration.

HELEN FORTGANG

## PCW DETAILS

★★★
**Price** *£26.99*
**Contact** *Prentice Hall Europe 01442 881900* www.macmillansoftware.com
**System Specification** *Windows 95/98, 16Mb RAM, VGA card (256 colours, 640 x 480 resolution), CD-ROM drive, 15Mb free hard-disk space.*

# Learning Ladder - Years 1&2

**The wonder of words, numbers and pictures, with Woody the pencil.**

**T**his series has been **designed** to complement the National Curriculum. It supports children aged from five to seven and teaches English, Maths and general knowledge. After the child has chosen his/her representative picture, Woody the skateboarding pencil takes them to the playroom. Here, the child will find scores of activities they must click on to view. Throughout the program, Woody provides clear instruction, encouragement and help for when they get stuck. Activities include painting pictures, recognising sounds, letters and shapes, and time telling, grounding the basic skills of literacy, numeracy and knowing the world around us. The presentation is lively and colourful, and Woody is a charming character who kids will love. There are plenty of fun activities to keep the child occupied for many hours and which are versatile enough for them to return to without getting bored.

The child receives further incentives to learn more, through being awarded stickers at the completion of each exercise. These coded stickers must be correctly placed within alphabetically ordered pictures to create many different scenes. There is also a report card to show the child's progress, including how many stickers they have achieved.

This production successfully communicates the essential skills to children of this age-group level. It does so in a colourful and captivating style, allowing kids to climb that ladder in a more enjoyable way.

HELEN FORTGANG

## PCW DETAILS

★★★★

**Price** *£19.99*
**Contact** *Dorling Kindersley 0171 836 5411* **www.dk.com**
**System Specification** *Windows 95/98, 486DX2/66MHz, 12/16Mb, 640 x 480 pixels, 256 colours, 2X CD-ROM, 6Mb free hard-disk space, 8-bit sound card, speakers/headphones, mouse.*

# Kid Pilot

**Not so much flying high, as a crashing bore.**

**A** flight simulator **for kids** — what a great idea! Sadly, this is a poor production. Although there are nice features to be found within the CD-ROM, it is sparsely designed, with bad graphics. Once you have set yourself up as the pilot, you have three planes from which to choose, and three levels of difficulty with which to fly them. You can choose the time of day, between dusk, dawn or midday, and pick designated areas (in America) to set the scene. It does use child-friendly controls, at least when setting up for flight. But when it actually comes to flying the plane, the child is expected to know where the throttle lever is with no prior demonstration. Also, after the initial area scene, all that is visible are coloured squares and impressions. This makes flights very boring, and you can't see where you're supposed to land. Penwick the Penguin is your aviator guide, explaining what the buttons do and giving snippets of information on each location in which you fly. However, he's the most dull and repetitive host I've met for a long time.
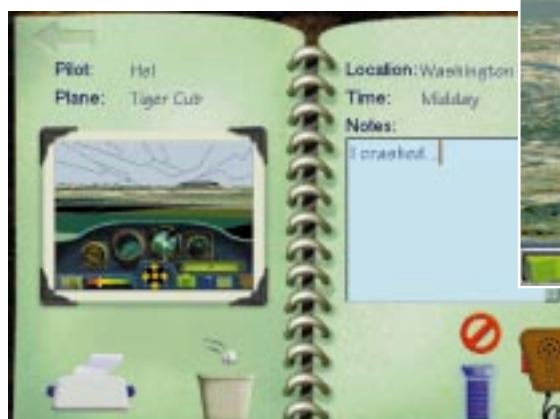
Kid Pilot has the potential to be very good, though the effort that has gone into its authenticity appears minimal — perhaps because it's aimed at children.

This production doesn't deliver what it leads you to expect, and is generally disappointing.

HELEN FORTGANG

## PCW DETAILS

★

**Price** *£14.99*
**Contact** *Knowledge Adventure 01189 920 9100*
**www.knowledgeAdventure.com**
**System Specification** *Windows 98/95, Pentium 90, 2X CD-ROM, 16Mb RAM, 30Mb free hard-disk space, 256-colour display 640x480, mouse.*

# Odd job

**A triumph of peculiar design, the Amstrad PPC640D was just too weird to work.**

**A**nother month, another dead laptop. Maybe it's the way I type that seems to knock out laptops just before I'm about to travel. Trouble is, my collection of usable machines is dwindling, and in desperation I even thought of using an old Amstrad PPC640D. Hatched in early 1988, this miracle of peculiar design was Amstrad's first laptop and, unfortunately, did not duplicate the great commercial success of the company's desktop range.

**The Amstrad was,** it's safe to say, one of the oddest-looking portage computers in the files. It had plenty of the elements of the latest laptop designs, but arranged in a rather unusual way. The main difference was Amstrad's desire to include a full-size keyboard. While other companies at the time scaled down the size of each key, removed numeric keypads and so on, Amstrad kept a full-width keyboard with numeric pad and cursor control keys just like on a desktop.

By using a standard desktop-sized keyboard, the rest of the casing had to be as wide, but this hardly helped portability. The designers took a sideways view and flipped the traditional layout on its side: the machine was wide and narrow with a handle on the short side. Flip open the dark grey casing and you reveal the full-width keyboard and a supertwist LCD panel tucked flat into one corner. The screen popped up at an angle for viewing, but won little praise for its readability. The blue-on-green text (yes, really) in those pre-backlight days was hard work.

**Although unconventional,** I rather liked this method of separating out the display from the keyboard and casing. I'm pleased to see that, after 10 years, there's a similar but updated design in the shops at the moment. The current manufacturer uses this trick to reduce overall size and still allows business travellers to sit the panel on an overhead projector. The difference is that this has a 300MHz processor and 4Gb hard disk, yet is no bigger than a hardback novel.

Enough of the display: like all



▲ AMSTRAD'S FIRST LAPTOP DAZZLED WITH ITS BLUE TEXT ON A GREEN SCREEN, AND ITS FULL-SIZE KEYBOARD DID LITTLE TO AID PORTABILITY

displays at the time, it was barely readable except with carefully placed side lighting. The real benefit of the fold-down display panel was that you could tuck it down and use a normal monitor instead. For input, the keyboard, naturally, had good action and was easy to use but rather clackity.

By current standards of 400MHz Pentium IIIs, this portable was no power

*... plenty of the elements of the latest laptop designs, but arranged in an unusual way*

beast. However, for the period, the 8MHz 8086 Intel processor provided ample power. The entry-level PPC512 had 512Kb of RAM, but the flagship PPC640 that we're covering here included 640Kb as standard — just fine for all DOS applications.

**A wonderfully silly idea** was the battery power pack. Other laptops of the period from leader Toshiba had rechargeable batteries for work on a plane or wherever. The Amstrad used standard, non-rechargeable, large C-size batteries. Actually, it used 10 of them. I remember sitting outside a pub in Richmond with a friend who was showing off his PPC640D: his briefcase had a spare set of 10 C-cells that had to be slotted in after just a couple of hours' use. To help eat up the battery power, the PPC640D included an integrated 2400bps modem, together with a copy of the CrossTalk Mirror software as part of the bundle of integrated software applications. Perhaps more limiting was the lack of hard disk. Buyers had a choice of one or two 720Kb 3.5in floppy drives. A year later, the Stratum company launched a plug-in hard-disk expansion system, optimistically called the Sprint, for those users still interested in expanding their beloved PPC.

**I didn't use the PPC** this time around: there's no way it would fit on an airplane tray and I can't afford to keep it in batteries at around five per hour. There were several neat features that have been re-used more successfully in newer laptop designs, but sadly, this unusual machine didn't last too long in the shops.

SIMON COLLIN

# Win a Mitsubishi DiamondScan monitor!



▲**THE MITSUBISHI DIAMOND-SCAN70 WORKS WELL WITH ANY PC**

**S**pring is in the air, and here at *PCW* we're going monitor mad! Mitsubishi is giving away seven monitors from its DiamondScan range — three Scan90s worth £385 each, and four Scan70s worth £195 each.

☞ **The DiamondScan90,** a 19in display, and the **DiamondScan70**, a 17in display, are easy-to-use, high-performance monitors, ideal for general business, desktop publishing and internet applications.

The DiamondScan90 offers an ultra-fine 0.25mm dot pitch and a 30-95kHz horizontal scanning range, to precisely display a maximum non-interlaced resolution of 1600 x 1200 at 75Hz or 1280 x 1024 at 85Hz.

The DiamondScan70 has a 0.28mm dot pitch combined with a flat shadow-mask tube which eliminates blur to produce clear, sharply defined images. Its true multi-scanning ability allows automatic tracking of horizontal frequencies from 30-70kHz for high-resolution, flickerless image reproduction with almost any personal computer.

☞ **Mitsubishi's extensive colour monitor line** features a full range of sizes from 14 to 40 inches. The Display Products Division markets three ranges of monitors, including:

• the value DiamondScan desktop range;
• the high-performance DiamondPro desktop monitor range; and
• large-screen plasma and CRT-based presentation monitors.

All products are sold through a network of authorised distributors, resellers and dealers across the UK.

The DiamondScan series is a cost-effective solution for all desktop applications.

☞ **To enter this competition,** answer the following question: The DiamondScan90 offers an ultra-fine dot pitch of...
**A)**       25 M
**B)**       0.25mm
**C)**       25cm

● *For details of how to enter this competition, see the panel below.*



▲**THE MITSUBISHI DIAMOND-SCAN90 IS IDEAL FOR BUSINESS AND DTP**

## How to enter the competition

1. Via the *Personal Computer World* web site at **www.pcw.co.uk**, or
2. Write your name, address and daytime telephone number on a postcard or on the back of a sealed envelope (please don't send letters). Mark your card 'PCW/Mitsubishi Competition' and send it to the following address:

**Personal Computer World
Building 960
Sittingbourne Research Centre
Sittingbourne
Kent ME9 8AG**
to arrive by 28th May 1999.
• *Please state clearly on your competition entry if you do not wish to receive promotional material from other companies.*

## Rules of entry

This competition is open to readers of *Personal Computer World*, except for employees (and their families) of VNU Business Publications and Mitsubishi. The Editor of *Personal Computer World* is the sole judge of the competition and his decision is final. No cash alternative is available in lieu of prizes.
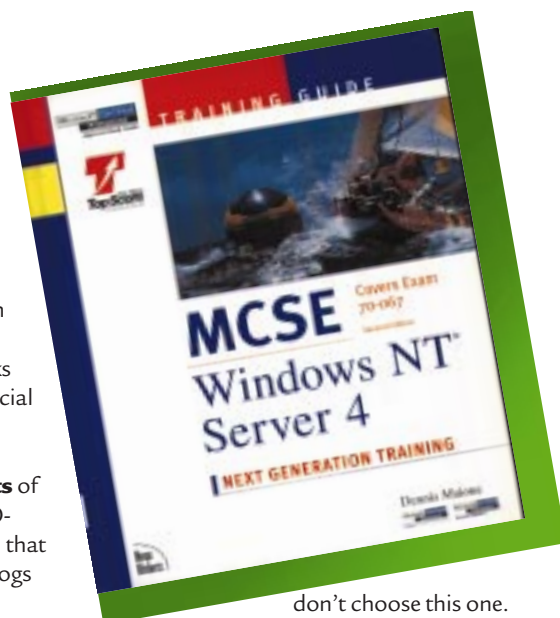
# *books*

## MCSE Windows NT Server 4

If you're thinking of becoming a Microsoft Certified Systems Engineer (MCSE), this book is aimed at helping you pass the exam. Although to the uninitiated it may seem a complex beast, anyone with a moderate amount of NT experience, even if it's only with Workstation, should find the technical content fairly easy going. But as with any exam, the devil is in the details, and it's with drilling the facts and figures into the grey matter that this book will be most helpful.

Being concerned with NT Server, it's no surprise that the book concentrates on the processes of network setup and configuration. There are nine chapters dealing with planning, installation and configuration, managing resources, connectivity,

monitoring, optimisation, and troubleshooting. The end of each chapter includes sample exam questions, and there are useful case studies going through the process of choosing and configuring appropriate networks for various hypothetical commercial situations.

**One of the most useful aspects** of the book is the accompanying CD-ROM, which as well as a program that simulates NT's configuration dialogs and options, contains an exam application similar to the real thing, complete with 201 questions and 90-minute time limit. Confidence isn't inspired by the number of typos in the questions ('True or Flase' is a common one) but it's invaluable for getting the feel of the real exam, and it doesn't let you cheat during the test, either.

**If you're looking** for a general book on how NT Server works and what it can do, don't choose this one. It's too narrow in its scope to be an everyday NT companion. If you're looking to learn how to configure the Remoteboot Service, for instance, you're out of luck. The general style is also necessarily dry, and concerned for the most part with imparting the relevant facts and figures. But if you're serious about passing the MCSE exam, this is an essential purchase.

**DAVID FEARON**

## Infinite Loop

What is striking about this new corporate biography of one of the great American success stories, is the detail that is packed into each page. Malone has spent a vast amount of his writing career covering the ever-evolving story of Apple, and presents here his conclusions on this rollercoaster ride.

**Myths are exposed** in each chapter. The Steve Jobs Reality Distortion Field is described as more of a personality disorder than a mythic element that allowed Jobs to found Apple along with his partner, Steve Wozniak. John Scully's term in office as Apple's CEO is shown to be little more than an incompetent attempt by a genius marketing man to step up into the

realms of management. Gil Amelio's attempt to make Apple grow up, and, of course, the tentative links to Microsoft and Bill Gates' protection of the Wintel alliance, all come under the spotlight. Apple is a company like no other in corporate America. From day one it ran against the trend, offering a technology that was a purchasing decision as well as a heartfelt yearning to be part of something great. Apple managed to utilise this yearning at every stage. But the gloss hid a company that was, for the most part, out of control. This book highlights the fundamental mistakes that were made
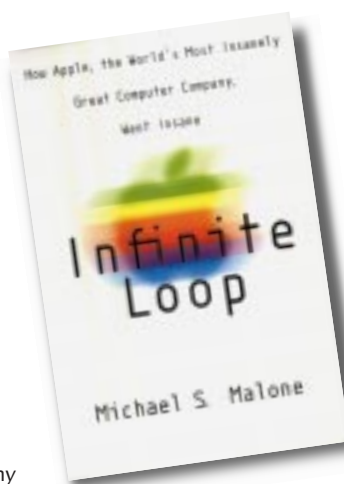
early on in Apple's history, and those that would later return to haunt it at every turn. Regis McKennia, a Silicon Valley marketing guru, pronounced, 'The mistake everyone makes is assuming that Apple is a real company. But it's not. It never has been.'

**Apple may not be a real company**, but its history is a fascinating read nonetheless. Malone has done an excellent job of assembling the facts that are Apple Computer without hyperbole and has delivered a story that is rich, informative and, above all, legitimate. With its coverage of the heady days of massive growth, to Apple's free-fall into near oblivion and its possible resurrection with Steve Jobs back at the wheel and the launch of the iMac, this is the definitive story of Apple.
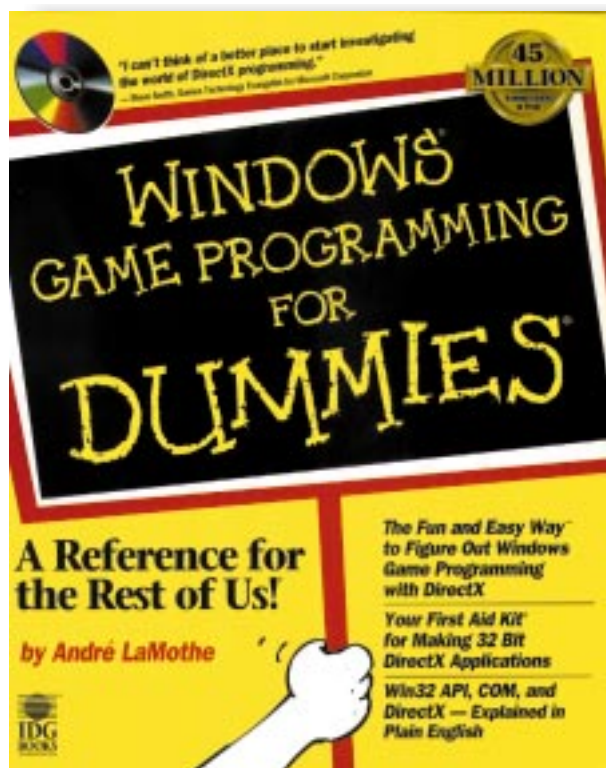
**DAVID HOWELL**

# Windows Game Programming for Dummies

**A** prerequisite for any reader of this book is a thorough understanding of C, and at least a passing understanding of C++. LaMothe explains clearly how fast 2D-game development is possible with DirectX; that it allows the seamless access of hardware-specific features, which therefore allows the game designer to concentrate on, well, designing their game. You won't be programming Quake by the end of this book, but you will be able to competently program 2D games for Windows 95.

**Split neatly into five sections**, you begin by familiarising yourself with the DirectX environment, and getting your computer ready for Windows games development. This means installing the DirectX Software Developer's Kit, and setting up your C compiler.

Part Two is more detailed, as it explains how DirectX works and its relationship with the Windows 95 API. The remaining chapters focus on specific areas of games design, such as graphics and sound, each of which have a DirectX component, such as DirectSound for audio and DirectInput for joysticks and mice.

**LaMothe's style is engaging**, and follows the now familiar Dummies format but without talking down to its readers. The author has gone to great lengths to make his book as complete as possible, including two extra chapters on the accompanying CD-ROM that cover artificial intelligence and game algorithms.

He does, however, assume quite a high level of programming knowledge in C, which could be a problem for some readers hoping to learn game programming via DirectX without the necessary foundation skills with that language.

**This book is not a comprehensive manual** for Windows game programming, but it is a concise taster of what is possible with the DirectX programming environment. Nuggets of code are supplied in each chapter which teach by practical example. If 2D sprite-based games are the limits of your current ambitions, then here is all the information you will need to create Windows games. However, if you harbour more ambitious designs, then this book is still a useful primer for a more detailed study of DirectX.

DAVID HOWELL

## PCW DETAILS

★★★★

**WINDOWS GAME PROGRAMMING FOR DUMMIES**
**Author** *André LaMothe*
**Publisher** *IDG Books*
**ISBN** *0-7645-0337-5*
**Price** *£28.99*

*Prices include VAT on disks and CD-ROMs. List supplied by The PC Bookshop, 21 Sicilian Avenue, London WC1A 2QH. Telephone: 0171 831 0022 Fax: 0171 831 0443*

# brainteasers

### ■ Quickie
Of 300 people interviewed at a disco, two-thirds said they drank, a half said they smoked, 60 said they did neither. How many both drank and smoked?

### ■ This Month's Prize Puzzle
What is the largest number, less than one million, that has exactly 50 factors (including unity and the number itself)?

Answers on a postcard or the back of a sealed envelope, to: PCW Prize Puzzle - June 1999, P.O. Box 99, Harrogate, N. Yorks HG2 0XJ, to arrive not later than 20th June 1999.

We will also accept solutions by email. Send the solution and your name and address only (no explanatory notes or program listings, etc) to:
jj.clessa@btinternet.com.

### ■ Winner of March 1999 Prize Puzzle
The first email solution we received for this problem pointed out that we had mixed the units — metres and feet. So, to simply things, we accepted either solution. 148 entries were received in all, 94 by email. The required answers were:
☛ To the problem as set, 52.75 hours approximately.
☛ To the problem with equal units, 57.5 hours.

The winning entry, drawn at random, came from Mr Peter Eldred, of Wokingham. Congratulations, Peter, your prize is on its way. To the also-rans, keep trying, it could be your turn next.

● Some readers asked how this type of problem can be solved. Some used Lagrange, some Newton-Raphson, others dynamic programming, and many other complex-sounding approaches. I used a simulation approach, as follows:
1. 'Unroll' the half cylinder to give a rectangle of width 5 metres and depth 12 feet. This represents the surface that the snail crawled across.
2. Calculate the length of the diagonal from top right to bottom left of this rectangle by Pythagoras. This gives the shortest possible route and thence the basic speed of the snail.
3. Split the rectangle into 4 smaller rectangles using horizontal lines representing the depths of the different oils — 10%, 25%, 5%, and the rest, and also calculate the snail's speeds for each of these sections from the data given.
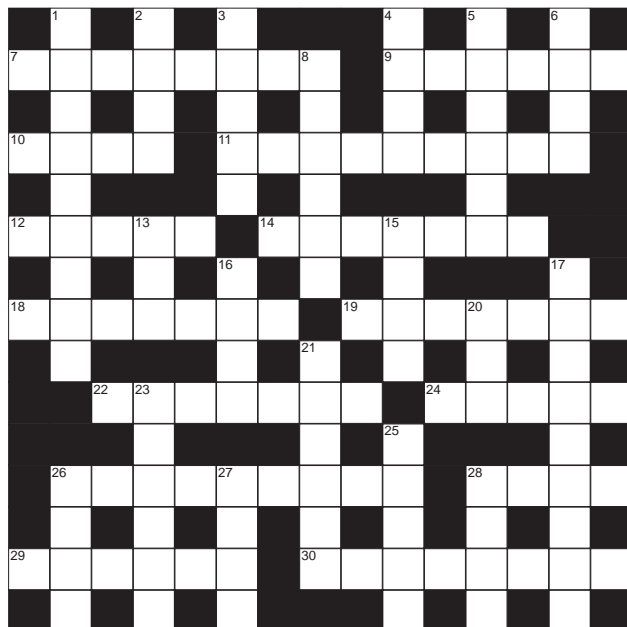4. Using four nested FOR loops (one for each section) with steps equal to one-hundredth of the width, calculate all possible paths from top right to bottom left via every combination of steps, to find the one with the shortest time.
5. When an approximate solution is found, it can be refined by reducing the interval sizes around this minimum path — i.e. effectively zooming in on it.
● *Don't forget to include your address on your email entries. I can't send a prize via email!*

**JJ CLESSA**

# prize crossword



**Each month, one lucky *PCW* Crossword entrant wins a copy of the new *Chambers Dictionary*. This time, it could be you. Send your completed crossword to 'PCW June Prize Crossword', VNU House, 32-34 Broadwick Street, London W1A 2HG, to arrive not later than 28th May, 1999.**
• *Please state clearly on your entry if you do not wish to receive promotional material from other companies.*

**Solutions to May's crossword**

ACROSS
7 Multimedia 8 Dump 9 Diskette
10 Screen 11 Tester 13 Integer 15 Prompts
17 Central 19 Optical 21 Aerial 24 Savers
26 Resident 28 Bugs 29 Fuzzy logic
DOWN
1 Quainter 2 Stakes 3 Omit 4 Adder
5 Bass 6 Impede 8 Darkest 12 Extra
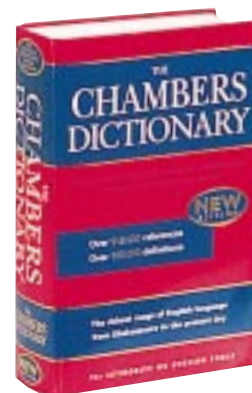14 Niece 16 Maidens 18 Atlantic 20 Plague
22 Indoor 23 Crazy 25 Sift 27 Says

### ACROSS
7 Moved to another document or application (8)
9 Processor's end result (6)
10 Magnetic storage (4)
11 Scrambled for security reasons (9)
12 Standard character encoding scheme (5)
14 Seafaring software villains? (7)
18 Parcels of personal details (7)
19 Ancient programming language (7)
22 Amount of data or activity taking place (7)
24 Surfer's phone-line device (5)
26 Module for audio capability (5, 4)
28 Click, hold and move (4)
29 Entry into a system, authorised or otherwise (6)
30 The M of IBM (8)

### DOWN
1 Enlargement (9)
2 Domicile (4)
3 Aquatic mammal (5)
4 Bloody (4)
5 Sculpted figure (6)
6 Taken to court (4)
8 Double-dealing (6)
13 Printing fluid (3)
15 Minute particle (4)
16 Piece of foliage (4)
17 Heart device (9)
20 As well (3)
21 Remove weapons from (6)
23 Ways (6)
25 Official decree (5)
26 Poorly (4)
27 Office table (4)
28 Fall in droplets (4)