

Orange Coast IBM PC User Group

README.DOC

August 2002

Newsletter

Volume 18.8

ALL MEETINGS ARE HELD IN THE COSTA MESA SENIOR CENTER 695 WEST 19TH STREET
AT THE SOUTHEAST CORNER OF 19TH AND POMONA

IN THIS ISSUE

- Page 1
Front Page
- Page 2
Officers and Board Members
Meeting Dates
- Page 3-4
Schedules and Reports of Events
Page 4
- The DOS Path for Beginners
Page 5
- Tips for Super Smart Web Searches
Page 6-8
- Acronym Meaning
Page 8
- Interpretation of PC Messages
Page 9-11
- Backing Up Your Hard Drive
Page 12
- Old geezer/ Geezerette Test
Page 12
- Know Your CPU
Page 14
- Cool Utilities
Phillips shrinks CD
Page 15-16
- May Board Of Directors Meeting
Page 17
- Publication Guidelines

August 24, General Meeting



KaZaA

PANTONE
Where color comes from.



Orange Coast IBM PC User Group
2973 Harbor Blvd Box 621
Costa Mesa, California 92626-3934



ADDRESS SERVICE REQUESTED

*See mailing label
or email address
for membership
expiration date.*



General Meetings are held from 9:00AM to noon on:
24 August 2002
28 September 2002
26 October 2002
23 November 2002
21 December 2002
25 January 2003
 For details see inside pages of this issue, Web Page, or Information Line

Meetings of the Executive Board will be held at 7:00PM on:
26 August 2002
30 September 2002
28 October 2002
25 November 2002
21 December 2002
25 January 2003
 All OCIPUG members are welcome.

Special Interest Group (SIG) meetings are held monthly as follows:
1st Saturday 9:00 AM - New User
1st Tuesday 7:00 PM - Quicken
1st Wednesday 7:00 PM - Internet
2nd Tuesday 7:00 PM - Hardware
2nd Wednesday 7:00 PM - Windows XP
3rd Tuesday 7:00 PM - Window 98
4th Tuesday 7:00 PM - Digital Photo

President's Message

Robert Walker

With the closing of the Senior Center last month due to the plumbing overflow, we will have a very full program for the August 24 General Meeting. Chris Davison, our program chairman has a training's CD from Microsoft on the new Windows XP.

We will look at some new MP-3 sites where you can download just about any thing you are looking for, music movies etc. We will show how you how to make a CD slide show with sound and special effects.

David Wintle will show us the Pantone Color Vision Spider which sets the color of your monitor. He uses Photoshop while working on his wife's oil paintings.

Have you voted? Send in your ballot for officers by August 16th so that your vote can be counted. The new officers will be presented at our August 24th Meeting.

We have a large group of members going to San Diego for the Southwest Conference and will be lining up new programs for next year and bringing back news of all the new products and software that will be shown at the meeting.

If you have an old computer or related equipment in fair working condition, that is no longer being used, consider donating it to OCIPUG. It will be updated, if possible, and given to a charity based group that can use the equipment at a youth center or a soup kitchen for a data base for their members or cooking data. This is part of our on-going community service program.

If you have not attended a SIG group meeting, you are missing out on one of the important benefits of your user group membership. See time and dates of SIG's on page three.

President	Robert Walker	949-642-7681	rwalker820@msn.com
Vice President	Morris Fier	949-646-8292	fier@bigfoot.com
Secretary	Frank Mastroly	714-960-9472	fmastroly@earthlink.net
CFO/Treasurer	Charles Schreiber	714378-1253	cschreib@csulb.edu
Director 2002	Robert Strader	949-646-1475	rstrader@attbi.com
Director-2002	Chris Davidson	714-832-7835	ccusgo2@aol.com
Director-2002	Red Davidson	949-548-0413	red.d@juno.com
Director-2002	Sandi Tierney	714-648-2218	gadgetgoddess2002@hotmail.com
Past President	Leonard Stein	714-533-4971	leonardstn@netscape.net
Long Range Planning	Leonard Stein	714-533-4971	leonardstn@netscape.net
Readme.Doc Editor	Robert Walker	949-642-7681	rwalker820@msn.com
Newsletter Coordinator	Michael Conway	714-962-2194	mchbca@aol.com
Membership	Sandi Tierney	714-648-2218	gadgetgoddess2002@hotmail.com
SIG Coordinator	Robert Strader	949-646-1475	rstrader@attbi.com

SCHEDULES AND REPORTS OF EVENTS

SPECIAL INTEREST GROUP (SIG)



OCIPUG web site for the OCIPUG Win XPSIG

-<http://www.homestead.com/ocipughardwaresigWinXPMainPage.html>
Meeting Date: July 10, 2002

(All Special Interest Group (SIG) meetings are held at the Costa Mesa Senior Center on the southeast corner of 19th and Pomona at the times noted below.) The next SIG meeting will be:

3 August 2002

New User - 1st Saturday, 9:00 AM
John Lunsford 714-995-0947
jlunsford@gentech.com

6 August 2002

Quicken - 1st Tuesday, 7:00 PM
Dan Dickinson daniel3@cox.net

7 August 2002

Internet / Web Publishing

1st Wednesday 7:00PM
Robert Strader 949-646-1475 rstrader@attbi.com

13 August 2002

Hardware - 2nd Tuesday, 7:00 PM
Ed Leckliter eleckliter@adelphia.net

14 August 2002

WindowsXP - 2nd Wednesday 7:00 PM
Ed Leckliter eleckliter@adelphia.net

20 August 2002

Windows 98 - 3rd Tuesday 7:00 PM
Robert Strader 949-646-1475 rstrader@attbi.com

27 August 2002

Digital Cameras / Scanning - 4th Tuesday, 7:00PM
Robert Strader 949-646-1475 rstrader@attbi.com

2 September 2002

New User - 1st Saturday, 9:00 AM
John Lunsford 714-995-0947
jlunsford@gentech.com

5 September 2002

Quicken - 1st Tuesday, 7:00 PM
Dan Dickinson daniel3@cox.net

6 September 2002

Internet / Web Publishing

1st Wednesday 7:00PM
Robert Strader 949-646-1475 rstrader@attbi.com

ACP Swap Meet

September 29, 2002

ACP Computer Swap Meet
which is usually held on the
fourth Sunday of the odd
month, is held at 1319 East
Edinger in Santa Ana



There were 6 attendees (including the SIG Leader, Ed Leckliter)

The Featured Topic was: Chapter 3 in "Microsoft Windows XP Step by Step"
- "Managing Computer Security"

Random Access - none significant.

Before the end of the meeting, Ed fessed up to having reinstalled the OS because he incorrectly uninstalled SuSE Linux 8.0 (was dual booted with it). He failed to execute the reload of the original Windows XP boot sector that SuSE had saved during the Linux installation program. Since the reload has to be done from within SuSE, the fact that the uninstall proceeded without it made the system unbootable. For whatever reason, attempts to restore from the Drive Image CD image also failed. Hence the need to reinstall Windows XP from scratch (FDISK and all). To catch up the system to its prior "state", during the meeting Ed reactivated the OS, downloaded and installed the latest Norton AntiVirus .dat file, and did a complete virus scan. All done without incident.

Next Meeting: August 14, 2002

Next Meeting Featured Topic: Chapter 4 in "Microsoft Windows XP Step by Step" - "Adding Hardware and Software" [We will install a USB 2.0 adapter card, load the dedicated driver, and test with an external USB 2.0 hard drive. We will also demo the installation and removal of Adobe PageMaker 7.0.]

Following Meeting: September 11, 2002

Following Meeting Featured Topic: Chapter 5 in "Microsoft Windows XP Step by Step" - "Working with Files and Folders"

File(s) attached - presentation materials. Files are also posted on the SIG's web site.

(<http://www.homestead.com/ocipughardwaresig/WinXPMainPage.html>).

For the latest Windows XP SIG info, please check the SIG's web site or contact Ed Leckliter (SIG Leader) at eleckliter@adelphia.net.

OCIPUG Hardware SIG - Meeting Recap

Meeting Date: July 9, 2002

There were 12 attendees (including the SIG Leader, Ed Leckliter)

The Featured Topic was: Graphics Processors, Video Cards, and Monitors
Hardware Submissions - none. Random Access - none.

Next Meeting: August 13, 2002

Next Featured Topic: Sound Processors, Sound Cards, and Speakers

Following Meeting: September 10, 2002

Following Meeting Featured Topic: Other Components (Modems, NICs, Chassis, Power Supplies, HFAs, Fans, Keyboards, and Mice)

File(s) attached - also posted on the OCIPUG Hardware SIG web site
(www.homestead.com/ocipughardwaresig/index.html)

Presentation slides in Microsoft PowerPoint format (.ppt).

3 For the latest Hardware SIG info, please check the SIG's web site or contact Ed Leckliter (SIG Leader) at eleckliter@adelphia.net.



Internet

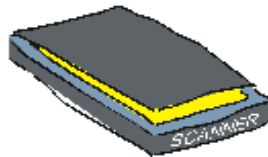
The Internet Sig August 7th, we will address email clients and adding email accounts



Windows 98

The Windows 98 Sig August 20th, we will discuss Tips and Tricks For your Windows 89 and Windows 98 SE

Digital Photography and Scanning



The Digital Photography & Scanning Sig August 27th, plan to show Flip Album 4.0 I was told that they were shipping the Flip Album 4.0 almost a month ago.
The Digital Photography & Scanning Sig August 27th, plan to show Flip Album 4.0 I was told that they were shipping the Flip Album 4.0 almost a month ago.



The DOS PATH - For Beginners

Tom Coleman

One of the fundamental things about using DOS is that (NOW REMEMBER THIS) the first thing on the command line is a command. The command line is whatever you type at the DOS prompt. If what you have typed is not recognized as a command by DOS then you will get a "Bad Command or File name" error message. This error message is telling you is there is something wrong with the first thing you typed in.

The first thing on the, command line is the first character or string of characters up to the first separator. For most purposes a separator is a space but DOS also considers /, = and a few more as being separators too. There are a few forbidden characters too. Have a look in a DOS manual to find out more about them.

OK, so what are the DOS commands? It helps to know that there

are two types of DOS command. One type is loaded into the computer when you start up; they are loaded into the computer's electronic memory and the computer just knows them, always. Well always at the DOS prompt, anyway. This type of command is called an internal Command. Many of the frequently used commands are internal. For example, COPY, DEL, CD, DIR and a bunch of others are always understood when you enter them.

Mind you, just typing COPY and pressing <Enter> is a bit like jumping into a taxi and saying "GO" to the driver. The COPY command requires more information to know what to copy and where. This extra information appended to a command is called a parameter and there is a whole bundle of them. This implies that you need to have some idea of what you want to accomplish when using the command.

Let's take a diversion and give the pot a stir.

Regardless of whether you are using the DOS interface or the Windows interface you still need to have some idea of what you want to accomplish. DOS does not tempt you with things to click on. Either you know the appropriate command or you look it up in the manual - or you just can't do it. When using Windows you can get sucked into clicking here and there without really knowing what you are doing, often being given choices you do not understand. On the other hand Windows enables you to do all sorts of things when DOS cannot. eg. you cannot tag files in DOS. Generally you should use the right tool for the right job and both DOS and Windows have their strengths. DOS is still the fastest kid on the block but most programs these days are written to run in Windows and that is what you should use when the occasion demands.

Back onto course now and this business of commands. We have mentioned the internal commands, so pretty obviously the other type of command is going to be the external command. The external command is also typed at the DOS prompt, but it actually runs a program file. There are a swag of these programs that come with DOS. FORMAT.COM is one and FDISK.EXE is another (both extremely dangerous in the wrong hands). There are plenty of these external commands. You can look them up in the \DOS directory if you are using pure DOS (6.22 or earlier). In Windows they are shared between the \Windows and the \Windows\Command folders. To execute these commands means to run the programs. You type the name of the program file and it will be run. Quite reasonably the computer must be able to find the file in order to run it and that's where the DOS PATH comes into play. Another thing to note; not all files are executable. That is, not all files are program files.

Let's Do Another Sidetrack

Broadly speaking there are three categories of file on your computer. They are files that contain:

- INSTRUCTIONS TO THE COMPUTER
- INFORMATION FOR USE BY A PROGRAM
- DATA CREATED AND/OR STORED BY A PROGRAM.

The first category is what concerns us here. Not all instructions are DOS instructions. Your word processor, your games, any application program (ie. one written for a specific purpose) can and will give instructions to the computer. However, regardless of whether it is an application program or a DOS program, there are only three varieties of file in the first category that contain INSTRUCTIONS TO THE COMPUTER. They are files with a COM or an EXE or a BAT extension. No others contain instructions.

Whilst DOS will execute the instructions contained in a batch file, there are no .BAT files that are part of DOS. The other two, the COM and the EXE files you can regard as being essentially the same. In fact the way the operating system uses them is very different, but the differences do not show at the user level. About the only difference as far as the user is concerned, is the priority given to each.

When you enter something on the command line, say ABC, and press <Enter> the computer looks first for a file with a .COM extension (ABC.COM) in the current directory. Then it looks for a file with an .EXE extension (ABC.EXE) and finally one with a BAT extension (ABC.BAT). As soon as it finds a match it stops looking and starts to execute the file. If you think about that you will realize that if you have two files with the same filenames but different extensions (COM, EXE or BAT), then only the highest in the sequence will ever be executed. Anyway, if it fails to find a match in the current directory it then goes off and searches elsewhere. It searches through every directory listed in the DOS PATH, and that's a variable stored in an area of memory known as the DOS Environment.

Never mind about Environment and variables; you can either look it up or ignore it for now because we are interested in only one of them, and that is the PATH variable.

If you want to know what's in the PATH variable then go to the DOS prompt and type in PATH and press <Enter>.

A quick recap:

- PATH was the first thing you typed on the command line, so it must be a command.
- You will not find a PATH.COM, PATH.EXE or a PATH.BAT so it must be an internal command.

The output of the PATH command will vary from one computer to another but it might look like Figure 1 below.

```
Path=C:\Windows;C:\Windows\Command;C:\Vet
```

Figure 1. A typical DOS PATH

The parts or elements of the line are separated by semicolons (;) so that the first element of the Path is C:\Windows and the next is C:\Windows\Command with the last element being C:\Vet.

I will be talking about Folders and Directories soon. Remember these two terms mean the same thing and are interchangeable. In DOS we usually talk about Directories and in Windows we call them Folders.

If DOS cannot find ABC anything in the current directory then it goes to the first element in the Path (C:\Windows) and it starts to look there for the same files in the same order. If it fails to find what it's looking for then it looks in the second element (C:\Windows\Command) and if that does not produce any result then it looks in the next element and the next, and the next, until it has looked in all of the elements in the Path variable. It then gives up and issues a "Bad Command or File name" error message.

Now I must confess that I have not told all of the truth. You see, before DOS goes off looking for COM, EXE and BAT files it checks to see if the command is either a DOSKEY macro or a regular internal command. Don't worry about DOSKEY macros, they will

come later, unless you get curious then you can look them up in the manual. Sometimes the DOS tips and tricks books are better than the manuals.

Generally books come as either reference works or tutorials. Once you know the subject you do not need a tutorial but they are usually terrible references. Buy what you need. References are not much use until you know the subject.

Do not bother trying to learn DOS as a theoretical subject. You will not learn much. Have a use for it. Computing is a practical skill; like sex, the theory is interesting and some people can talk up a storm about it, but it is the practical that determines whether you are any good at it.

Reprinted from the July 2002 issue of PC Update, the magazine of Melbourne PC User Group, Australia

Tips for Super Smart Web Searches

Steve Bass

"You know any Google tricks?" It was my plumber, his hands wrist deep in the wall, wrangling the pipes in the bathroom. A Web searching plumber—that's all I need. I pretended not to hear him over the sound of the water splashing on the floor. "Or maybe a good Web searching program," he hollered, like he was reading my mind.

"The Google Bar," I yelled back, watching him stop work and hoping his \$60 per hour clock had also stopped.

Web Searching Like a Pro

I'm going to share the tips I shared with my plumber—free of cost. The Google Toolbar is something I always recommend—and find indispensable—because it has so many useful features. You can learn more about Google and other search tips in my Home Office column, "The Skinny on Web Searching."

You might want to just take my word for it and grab the Google Toolbar. It's a quick download, absolutely free, and works with all versions of Windows. (Okay, not Win 3.1. So sue me.) And fair warning, Netscape users: You're out in the cold. Google's representative said they may have a Netscape version sometime, but don't hold your breath.

Google Bar Speedup Tips

If you've installed the Google Toolbar onto Internet Explorer, click on the drop-down Google menu and choose Toolbar Options. Under General Options, mark the box that makes Google open a new window to display the results each time you search. Closing a new window is lots easier than spending most of your time hitting IE's Back button.

Next, check the "highlight button" box. That button on Google's menu bar lets you highlight the words you're looking for on the search results page. Clicking the highlight button toggles the highlighting on and off. Finally, if you want to search newsgroups, click the box marked "Search Usenet button."

Dig this: The sheer exuberance of this site will make you want to jump on your desk and dance along. Please don't. (Warning: The Flash may take a few minutes to load if you're on dial-up. And if you choose to have the guy on the site do his number to music, turn down your speakers first.)

Like Searching? Here Are More Tips Oh, you say you need more

searching tricks? Cool, because we have plenty. We have an eight-part masterpiece (okay, hyperbole aside, it's a meaty article) entitled "Find Everything Faster." In it, Contributing Editor Scott "search me, buddy" Spanbauer and writer Michael Gowan reveal the best tools for tracking down facts, news, people, music, and the ubiquitous more. Really, it's worth the read.

PCW's Harry "I can find it faster and better than you" McCracken tells us his tricks for Web browsing in "Smarter Ways to Search." Back to Google for one more gem. Go to Google's home page and type this into Google's search field (make sure to include the quotes and spaces): "steve bass" site:pcworld.com. You'll see everything on PC World's site with my name. Interested in finding just my online newsletters? Type: "steve bass" +newsletter site:pcworld.com.

If you want to see my articles about e-mail—but not my newsletters on the subject, enter: "steve bass" -newsletter +e-mail site:pcworld.com. Don't kid me; you're impressed, right? Searching for items on some of the more popular auction sites? We have shortcuts for scouring Amazon, eBay, and Yahoo auctions. They're in "Hone Your Auction Searches."

Dig this: Oh, so you say Dancing Paul in the blurb above wasn't intriguing enough? Fine. I have another, something that will make your day (and the deadlines) pass more quickly. (Warning: Definitely turn down you speakers.) Here's a search tip for finding what you want on PCWorld.com. The site has a cool, albeit bass-ackwards, trick to find more articles about the topic in the story you're reading. Say you're reading my e-mail column. Now you want more details about e-mail programs. Click the "E-mail Clients" link at the top of the page to get a "related topics" box as well as a list of topics. Hey, wait, I have one more "dig this." In the "The Skinny on Web Searching" article, I talked about trying to find a way to thwart squirrels at my birdfeeder. Many readers sent solutions, but by far the most elegant? (No, it's not my backyard, and no again, I really love squirrels.)

Acronym Meaning

3GL Third Generation Language
 ABR Available Bit Rate Service
 ACR Actual Cell Rate
 ACTS Advanced Communication Technology Satellite
 ADC Analogue to Digital Converter
 ADCCP Advanced Communication Control Procedure
 ADSL Asymmetric Digital Subscriber Line
 AGP Advanced Graphics Port
 AMPS Advanced Mobile Phone System
 ANSI American National Standards Institute
 AOL America On-Line
 ARP Address Resolution Protocol
 ARQ Automatic Repeat Request
 ASCII American Standard Code for Information Interchange
 ATAPI Advanced Technology Attachment Programmed Interface
 ATM Asynchronous Transfer Mode
 AVI Audio/Video Interleaved

BBS Bulletin Board Service
 BGP Border Gateway Protocol
 B-ISDN Broadband ISDN
 BOC Bell Operating Company
 BUS Broadcast / Unknown Server

CBR Constant Bit Rate Services
 CD Compact Disc
 CDF Channel Definition Format
 CDMA Code Division Multiple Access
 CDPD Cellular Digital Packet Data
 CDV Cell Delay Variation
 CER Call Error Rate
 CGI Common Gateway Interface
 CHAP Challenge Authentication Protocol
 CIDR Classless Interdomain Routing
 CLR Cell Loss Ratio
 CLUT Colour Lookup Table
 CMR Cell Mis-insertion Rate
 CPU Central Processing Unit
 CSMA Carrier Sense Multiple Access
 CSS Cascading Style Sheet
 CTD Cell Transfer Delay
 CVDT Cell Variation Delay Tolerance

DAC Digital to Analogue Converter
 DCE Data Circuit Terminating Equipment
 DDE Dynamic Data Exchange
 DHCP Dynamic Host Control Protocol
 DHTML Dynamic Hypertext Mark-up Language
 DIMM Dual In-Line Memory Module
 DMSP Distributed Mail System Protocol
 DNS Domain Name Server
 DNS Domain Name System
 DQDB Distributed Queue Dual Bus
 DRAM Dynamic Random Access Memory
 DSMA Digital Sense Multiple Access
 DSS Digital Signature Standard
 DSSSL Document Style Semantics and Specification Language
 DTD Document Type Definition
 DTE Data Terminating Equipment
 DVD Digital Versatile Disc
 DVMRP Distance Vector Multicast Routing Protocol

EAPROM Electronically Alterable Programmable Read Only Memory
 ECP Enhanced Communication Port
 EDO Extended Data Out
 EEPROM Electronically Erasable Programmable Read Only Memory
 EGA Enhanced Graphics Adaptor
 EGA Enhanced Graphics Adaptor
 EGP Exterior Gateway Protocol
 EIDE Enhanced Integrated Drive Electronics
 EISA Extended Industry Standard Architecture
 EMS Error Management System
 EPA Environmental Protection Agency
 ER Explicit Rate
 EUVL Extreme Ultraviolet Lithography

FAQ Frequently Asked Questions
 FCC Federal Communications Commission
 FDDI Fibre Distributed Data Interface
 FDM Frequency Division Multiplexing
 FIFO First In First Out
 FILO First In Last Out
 FORTAN Formula Translation
 FTP File Transfer Protocol
 FTP File Transfer Protocol
 FTTC Fibre To The Curb

FTTH Fibre To The Home

GB Gigabyte
GCRA Generic Cell Rate Algorithm
GIF Graphic Interchange Format
GPF Generalised Patch Format
GPU Graphics Processing Unit
GSM Global System for Mobile Communications
GUI Graphical User Interface

HDD High Density Disk
HDLC High-Level Data Link Control
HDTV High Definition Television
HEC Header Error Control
HFC Hybrid Fibre Coax
HIPPI High-Performance Parallel Interface
HTML HyperText Mark-up Language
HTTP HyperText Transfer Protocols

IAB Internet Architecture Board
ICMP Internet Control Message Protocol
IDE Integrated Drive Electronics
IDEA International Data Encryption Algorithm
IDU Interface Data Unit
IETF Internet Engineering Task Force
IGMP Internet Group Management Protocol
IMAP Interactive Mail Access Protocol
IMP Interface Data Unit
IMTS Improved Mobile Telephone Service
IP Internet Protocol
IPRA Internet Policy Registration Authority
IPX Inernetwork Packet Exchange
ISA Industry Standard Architecture
ISDN Integrated Services Digital Network
ISM Industrial/Scientific/Medical
ISO International Standards Organisation
ISP Internet Service Provider
ITU International Telecommunication Union
IXC Interexchange Carrier

JPEG Joint Photographic Equipment Group
JS JavaScript

KB Kilobyte
KDC Key Distribution Centre

LAN Local Area Network
LAP Link Access Procedure
LASER Light Amplification By Stimulated Emission of Radiation
LATA Local Access and Transport Layer
LCP Link Control Protocol
LDAP Lightweight Development Action Plan
LDCM LANdesk Client Manager
LEC Local Exchange Carrier
LES LAN Emulation Server
LIFO Last In First Out
LILO Last In Last Out
LIS Logical IP Subnet
LLC Logical Link Control
LPT Line Print Terminal
LRU Least Recently Used

MAC Medium Access Control
MACA Multiple Access with Collision Avoidance

MAN Metropolitan Area Network
MB Megabyte
Mbone Multicast Backbone
MCR Minimum Cell Rate
MHz MegaHertz
MIB Management Information Base
MIDI Musical Instruments Digital Interface
MIME Multipurpose Internet Mail Extensions
MMX Multimedia Extensions
MODEM Modulator Demodulator
MOSPF Multicast OSPF
MPEG Motion Pictures Experts Group
MS Microsoft
MSC Mobile Switching Centre
MTSO Mobile Telephone Switching Office
MTU Maximum Transfer Unit

NAK Negative Acknowledgement
NAP Network Access Point
NCP Network Control Protocol
NCP Network Core Protocol
NIC Network Information Centre
N-ISDN Narrowband ISDN
NIST National Institute of Standards and Technology
NNTP Network News Transfer Protocol
NSA National Security Agency
NSAP Network Service Access Point
NVRAM Non-Volatile Random Access Memory

OAM Operation and Maintenance
OC Optical Carrier
OLE Object Linking and Embedding
ONU Optical Network Unit
OOP Object Orientated Programming
OSPF Open Shortest Path First

PAD Packet Assembler Disassembler
PAL Phase Alternating Line
PBX Private Branch Exchange
PCA Policy Certification Authority
PCI Peripheral Component Interface
PCM Pulse Code Modulation
PCMCIA Personal Computer Memory Card International Association
PCN Personal Communications Network
PCR Peak Cell Rate
PCS Personal Communications Services
PDU Protocol Data Unit
PEM Privacy Enhanced Mail
PES Packetised Elementary Stream
PGP Pretty Good Privacy
PIM Protocol Independent Multicast
PNP Plug and Play
POP Point of Presence
POP3 Post Office Protocol-3
POTS Plain Old Telephone Service
PPP Point to Point Protocol
PROM Programmable Read Only Memory
PSTN Public Switched Telephone Network
PTT Post, Telegraph and Telephone
PVC Permanent Virtual Circuit

QAM Quadrature Amplitude Modulation
QOS Quality of Service

RAID Redundant Array of Inexpensive Disks
RAM Random Access Memory
RARP Reverse Address Resolution Protocol

RFC Request For Comment
RIMM RAMBUS In-line Memory Module
RM Resource Management
ROM Read Only Memory
RPG Report Program Generator
RSVP Resource Reservation Protocol

SABME Set Asynchronous Balanced Mode Extended
SAP Service Access Point
SCR Sustained Cell Rate
SCSI Small Computer Interface
SDH Synchronous Digital Hierarchy
SDLC Synchronous Data Link Control
SDRAM Synchronous Dynamic Random Access Memory
SDU Service Data Unit
SEAL Simple Efficient Adaptation Layer
SECAM Sequential Couleur Avec Memoire
SECBR Severely Errored Cell Block Ratio
SGML Standard Generalised Mark-up Language
SHA Secure Hash Algorithm
SHTML Static Hypertext Mark-up Language
SIMM Single In-Line Memory Module
SIPP Simple Internet Protocol Plus
SLIP Serial Line Internet Protocol
SMDS Switched Multimegabit Data Service
SMI Structure of Management Information
SMS Short Message Service
SNA Simple Network Architecture
SNMP Simple Network Management Protocol
SNRME Set Normal Response Mode Extended
SONET Synchronous Optical Network
SPE Synchronous Payload Envelope
SPX Sequenced Packet Exchange
SQL Structured Query Language
SSCOP Service Specific Connection Orientated Protocol
STS Synchronous Transport Signal
SVGA Super Video Graphics Adaptor

TCP Transmission Control Protocol
TDC Tabular Data Control
TDM Time Division Multiplexing
TIP Terminal Interface Processor
TPDU Transport Protocol Data Unit
TSAP Transport Service Access Point

UBR Un-Specified Bit Rate Service
UDP User Datagram Protocol
URI Uniform Resource Identifier
URL Uniform Resource Locator
USB Universal Serial Bus
UTP Unshielded Twisted Pair

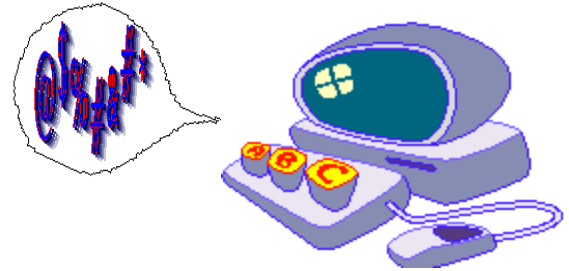
VB Visual Basic
VBR Variable Bit Rate
VGA Video Graphics Adaptors
VHF Very High Frequency
VLF Very Low Frequency
VSAT Very Small Aperture Technology

WAN Wide Area Network
WAP Wireless Application Protocol
WDM Wavelength Division Multiplexing
WDMA Wavelength Division Multiple Access
WWW World Wide Web
WYSIWYG What You See Is What You Get

XGA Extended Graphics Adaptor
XML Extensible Mark-up Language
XP Extreme Programming
XQL XML Query Language
XSL Extensible Stylesheet Language

Y2K Year 2000
YBK Year Book

■ ■ ■ ■ ■ ■ ■ ■ ■ ■
**A Realistic Interpretation
of your PC's Messages**



- **It says: "Press Any Key"**
It means: "Press any key you like but I'm not moving."
- **It says: "Press A Key"**
(This one's a programmer's joke. Nothing happens unless you press the "A" key.)
- **It says: "Fatal Error. Please contact technical support quoting error no. 1A4-2546512430E"**
It means: "... where you will be kept on hold for 10 minutes, only to be told that it's a hardware problem."
- **It says: "Installing program to C:\<Directory>...."**
It means: "... And I'll also be writing a few files into c:\windows and c:\windows\system where you'll NEVER find them."
- **It says: "Please insert disk 11"**
It means: "Because I know darn well there are only 10 disks."
- **It says: "Not enough memory"**
It means: "I don't CARE if you've got 64MB of RAM, I want to use the bit below 640K."
- **It says: "Cannot read from drive D:...."**
It means: ".However, if you put the CD in right side up.
- **It says: "Please Wait...."**
It means: "... Indefinitely."
- **It says: "Directory does not exist...."**
It means: ".... any more. Whoops."
- **It says: "The application caused an error. Choose Ignore or Close."**
It means: "....Makes no difference to me, you're still not getting your work back."



Backing Up Your Hard Drive

Gene Barlow

Your computer's hard drive is very important: Your hard drive is the heart of your computer system. It contains your operating system, which is the master control program of your computer. It also contains all of your application programs that help you do productive things with your computer. But, most importantly, it contains all the data files that you create using your application programs. These data files are the most valuable part of your computer and the hardest to replace if something should happen to your hard drive.

Yes, your hard drive will fail on you someday: Your hard drive is a mechanical device that spins constantly and is certain to wear out. The life of a hard drive is only 2-3 years. If you are lucky, your drive may last you 4 or 5 years, but it could go out in just 6 months. It is not a question of if your hard drive will fail, but it's a question of when it will fail. All you can do is to be ready when it does fail by having a copy of all of the files on your hard drive saved away from your computer. Then you can replace the failed drive with an empty new drive and put all of the files on the new hard drive. This enables you to be back up and running in a matter of minutes instead of days or weeks rebuilding your drive. This process is called backing up and restoring your hard drive and is the topic of this article.

Since this article was written, PowerQuest has introduced a new version of its backup utility, Drive Image 2002. This new version can now backup partitions that do not contain any open files, entirely in Windows, and does not need to boot out to DOS like earlier versions. Because the C: partition always has open files for the operating system, backing up the C: partition will still need to be done in DOS. The DataKeeper file backup utility that was included with earlier versions is not included in Drive Image 2002 because it does not work with Windows XP. Drive Image 2002 can backup all FAT, FAT32, NTFS, and EXT2 partitions as well as the Linux Swap partition. The HPFS files system used by OS/2 is no longer supported by Drive Image.

What Files Should You Backup?

One of the first decisions you must make is what files need to be backed up to adequately protect you. I consider your data files as the most important ones to backup. Your data files are those files that you create using your application programs. If you use Quicken for example, then the data file that needs to be backed up contains all of your financial records entered into Quicken. If you research your genealogy, then the database of your ancestors that you've collected for years is the important data file that must be backed up. If you correspond extensively using e-mail, then the folders of your e-mail correspondence need to be backed up. You should plan on backing up your data files at least daily.

The second most important thing to backup is your entire hard drive and all of the files on it. This includes your operating system (perhaps Windows) as well as all of your application programs. By backing up the entire hard drive, you will not have to rebuild your system from scratch, but will be able to quickly get your system back up and running again. Some would suggest that you really don't need to backup your operating system and application programs because you can always reload them from the CDs they came on. While this is mostly true, you need to consider how much time this will take you to reinstall and set up the operating system and all of the applications you own.

"Well, Bill," said God, "I'm really confused on this one. I'm not sure whether to send you to Heaven or Hell.

After all, you enormously helped society by putting a computer in almost every home in the world, and yet you created that ghastly Windows.

I'm going to do something I've never done before. I'm going to let you decide where you want to go.

Mr. Gates replied, "Well, thanks, God. What's the difference between the two?"

God said, "You can take a peek at both places briefly if it will help you decide. Shall we look at Hell first?" "Sure!" said Bill,

"Let's go!"

Bill was amazed! He saw a clean, white sandy beach with clear waters. There were thousands of beautiful men and women running around playing in the water, laughing and frolicking about. The sun was shining and the temperature was perfect!

Bill said, "This is great! If this is Hell, I can't wait to see heaven." To which God replied, "Let's go!" and off they went.

Bill saw puffy white clouds in a beautiful blue sky with angels drifting about playing harps and singing. It was nice, but surely not as enticing as Hell. Mr. Gates thought for only a brief moment and rendered his decision.

"God, I do believe I would like to go to Hell."

"As you desire," said God.

Two weeks later, God decided to check up on the late billionaire to see how things were going. He found Bill shackled to a wall, screaming amongst the hot flames in a dark cave. He was being burned and tortured by demons

"How ya doin', Bill?" asked God?

Bill responded with anguish and despair, "This is awful! This is not what I expected at all! What happened to the beach and the beautiful women playing in the water?"

"Oh THAT!" said God. "That was the screen saver."

Then, how long will it take you to download all of the software patches and add-ons that you have added to your system. Finally, how long will it take you to enter all of the special settings that you must do to have your system work exactly as you like it to. To this lengthy time, consider how you can recover the many programs and files for which you do not have a CD. I think when you consider all of these factors, you'll agree that having a backup of your entire hard drive is a wise investment of your time. You should plan on backing up your entire hard drive on a monthly basis.

What Media Is Best?

The next question you need to consider is what is the best media to backup your files from your hard drive. A few years ago, tape backup systems were the most popular backup media. The only problem with these tape systems was that they were very slow. Backing up a 1-2 GB hard drive in a couple of hours was reasonable, but backing up today's 40 GB hard drives to tape would take too long. You would not do it often enough to be usable. The next popular backup media to come along were the removable disk cartridge drives.

These were much faster than tape, but the cartridges tended to be expensive. For example, a 40 GB hard drive would need 10-20 Jazz (2 GB) cartridges to backup the entire drive. At A\$200 or more, each, you would need to invest over \$2,000 in cartridges to backup your entire drive. Writing to blank CDs promises to be one of the best backup media today, but even the fastest drives are slow and it takes many blank CDs to backup a large hard drive.

So, what is the best media to backup a 40 GB hard drive today? Another 40 GB hard drive! Hard drives are much faster than tape and are even faster than the disk cartridge systems. You can backup an entire 40 GB hard drive in less than an hour or so. Since it is fast, you'll tend to backup your system more often and this means better protection for you. Hard drives are also very inexpensive to purchase. If you watch prices carefully, you can get a 40 GB hard drive for less than A\$200. I would plan on having an extra hard drive for backup purposes for each hard drive on which you save data.

The Software

What type of backup software is available? There are two very different backup utilities on the market today - File backup utilities and Partition backup utilities. File backup utilities are by far the most common. These utilities backup individual files, one at a time. They can also be used to restore individual files to your hard drive. A good feature of File backup utilities is that they can select individual files from all parts of your hard drive. This is great for picking and choosing your important data files to backup. On the other hand, File backup utilities tend to be quite slow in backing up your entire hard drive and you would need to take many extra steps in rebuilding your hard drive partitions in case of a total failure. This is where Partition backup utilities have the advantage. Partition backup utilities backup entire partitions and all the files contained in them. Some of these Partition backup utilities work at the lowest hardware level and are very fast. Restoring a partition to an empty hard drive using a partition backup utility will create and format partitions as it restores the partition backup file.

PowerQuest Corporation has an excellent backup software package that contains both a File backup utility and a Partition backup utility combined in one product. This product is called Drive Image and can be purchased for around A\$139.00.

The File backup utility in this product is called DataKeeper and is designed to backup your individual data files on a frequent basis. The Partition backup utility in the product is designed to backup your entire hard drive every month or so. Let's take a look at how these two utilities can be used to backup your system.

Backing Up Your Important Data Files

As mentioned earlier, the data files on your system are the most important files on your computer. They are also the hardest to replace if something should happen to your hard drive. Backing up your data files should be your first objective in establishing a good backup plan for your system. Data files change daily and need to be backed up on a daily basis.

Using PowerQuest's DataKeeper utility, you can select all of your important data files from various parts of your hard drive. If you have spent a little preparation in organizing your hard drive, you may already have all of your data files collected together in the same partition. This makes it easier to identify and backup these important data files. DataKeeper will let you backup all of your data files or backup only those that have changed since the last backup. You can also compress the backup files to about half their original size when you save them, to conserve space. You can backup an individual file up to 99 times without replacing an earlier backup copy of that file. This gives you the ability to keep multiple backup versions of a data file as it is being developed. If you need to see the file, as it was several versions ago, you can do so with DataKeeper. It will backup these files to any device having a standard drive letter, such as a special backup partition on a hard drive or a removable cartridge drive. If you create your data file backups on a hard drive, try to place them on another hard drive than the one the original data files are stored on. Also, you should copy these backup files to a blank CD every month so that you will have some removable media that you can store away from your computer.

One of the best features of DataKeeper is its ability to monitor the important data files that you select and to automatically backup a file as soon as it is changed. Using this monitoring approach, you never have to think about backing your data files since this is done for you automatically. It also assures that you have a backup of these important files that is current to the last minute or so. This is a powerful feature of DataKeeper and one that I would highly recommend using.

Backing Up Your Entire Hard Drive

The second most important part of your backup plan is to backup your entire hard drive at least once a month. Having this backup in place will protect you from a major failure of your entire hard drive. Using PowerQuest's Drive Image to backup your entire hard drive you have two approaches to select from. Let's look at each of these approaches separately.

A Dedicated Backup Drive

The first full-drive backup approach is to use Drive Image to copy all of the partitions from your main hard drive to a backup hard drive. Both hard drives must be installed on the same computer system to do this approach. Using Drive Image's Disk-to-Disk Copying facility, you copy the partitions from your main drive to the backup drive, one at a time. When Drive Image copies a partition, it creates a new partition on the backup drive, so the drive can be empty of partitions before you start the process.

Also, copying a partition copies not only the partition, but also all of the hidden files, system files, and other files contained in the partition to the backup hard drive. So, when you finish copying all of the partitions from your main drive to the backup drive, you have an exact duplicate of your main drive that could be used if your main drive failed.

After copying all of the partitions to your backup hard drive, you need to disconnect the backup drive and remove it from your computer system (Figure 1). You should store the drive away from your computer, so that if anything happens to your computer, your backup drive will not be affected, too. Once a month, you'll need to retrieve this backup hard drive and insert and connect it back into your computer and repeat the backing up of all of your partitions, then remove it again from your computer. If something should happen to your main hard drive, simply get your backup hard drive and replace your main hard drive with the backup drive, setting it as a master drive, and you should be able to immediately start your computer and have it run. To simplify the frequent removal and replacement of your backup hard drive, you can purchase a hard drive rack mounting system (cradle) from your computer store at prices ranging from A\$25 to A\$70 that will let you remove and insert the drives without removing the covers from your computer.

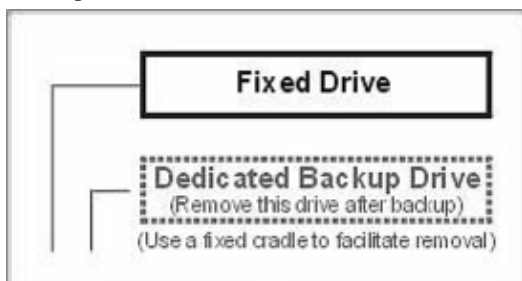


Figure 1. Using a dedicated backup drive,

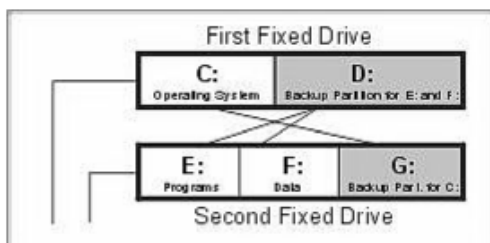


Figure 2. The cross backup approach using two fixed hard drives.

The Cross Backup Approach

which is stored out of the computer

The second full-drive backup approach is to use Drive Image to cross backup one hard drive to another. With this approach, you install and leave both hard drives in your computer all the time. For this approach to work, you'll need to setup a large backup partition at the end of each of the two hard drives. PowerQuest's PartitionMagic utility is the best way to create these backup partitions on your hard drives. Once the two drives are in place with a large backup partition on each of them, you can use Drive Image to create condensed image files of entire partitions and store them on the backup partition of the other hard drive.

Let's look at a simple example (Figure 2). You have two hard drives and the following partitions on each of the two hard drives:

- First Hard Drive (Drive 0)**
- C: partition (Contains your Operating System)
- D: partition (A backup partition)
- Second Hard Drive (Drive 1)**
- E: partition (Contains your Application Programs)
- F: partition (Contains your Data Files)
- G: partition (A backup partition)

Using Drive Image, create an image file of your entire C: partition and all of its contents onto your G: backup partition. Then, using Drive Image, create an image file of your E: and F: partitions on your D: backup partition. These image files represent the entire partitions and all of their active content. These image files can be condensed by 40-50% to save space on your backup partition. Notice that we save the images from one hard drive to the other hard drive's backup partition and vice versa. Hence, we call this the cross backup approach.

Once a month, you'd repeat this cross backup approach from one drive to the other until you fill up the backup partition. Then you'd delete the oldest image file to make room for the new image file to be stored in your backup partition. If either of your hard drives should fail on you, all you have to do is to remove the failed drive and place an empty new drive in its place. Then using Drive Image, you find the latest condensed image of the partitions on the failed drive on the other drive's backup partition and restore that image to recreate the partitions and all of their content on the empty drive. This lets you be up and running in a matter of minutes instead of days or weeks rebuilding your system. If the drive that failed was your first drive containing your operating system, that is no problem. You can boot Drive Image from a DOS diskette and quickly rebuild your operating system partitions from the second drive's backup partition.

What if both hard drives fail together? While it is rare, it is possible for both of your hard drives to fail at the same time, thus leaving you without either of your backup partitions to use to rebuild the other hard drive. For example, your computer could be burned in a fire or taken by a thief. In these cases, you'd lose not only your main drive, but your backup images as well. So, you need to make some special provisions to guard against these situations. I'd recommend that every three months, after you have backed up your partitions using the cross backup approach, you use Drive Image's ImageExplorer to split your condensed image file into multiple segments that will fit on blank CDs. Drive Image will burn these image segments on multiple CDs for you or you can use the CD burning utility that came with your CD-R/RW drive. While this may take a while to do, it will give you an inexpensive removable backup of your entire hard drive that you can store away from your computer. I would repeat this process of creating backup CDs of your entire hard drive every three months or so.

Summary

If you follow the suggestions in this article, then you will have a comprehensive backup plan that will protect both your important data files and your entire hard drive. You must make sure that you follow the suggested time intervals, or in a very busy environment do it more frequently, so that your backups are current enough to be usable. PowerQuest's Drive Image product, a second hard drive, and a CD-R/RW drive are all the software and hardware you need to run this backup plan. A second hard drive and a CD-R/RW drive can both be purchased for under A\$200 each if you shop wisely. I wish you success in setting up your backup plan.

About the Author

Gene Barlow started working for IBM right after he obtained his college degree in Mathematics. In the 34 years he worked for IBM, he held various technical marketing and management positions in many locations around the USA. The last 14 years with

OLD GEEZER / GEEZERETTE TEST

1. Where did car headlight dimmer switches used to be located?

- a. On the floor shift knob
- b. On the floor, left of the clutch
- c. Next to the horn

2. The bottle top of a Royal Crown Cola bottle has holes in it. For what was it used?

- a. Capture lightning bugs.
- b. To sprinkle clothes before ironing
- c. Large salt shaker

3. Why was having milk delivered a problem in northern winters?

- a. Cows got cold and wouldn't produce
- b. Ice on highways forced delivery by dog sled
- c. Milkmen left deliveries outside doors and milk would freeze, expanding and pushing up the cardboard bottle top.

4. What was the popular chewing gum named for a game of chance?

- a. Blackjack
- b. Gin
- c. Craps

5. What method did women adapt to look as if they were wearing stockings when none was available due to rationing during W.W.II?

- a. Get a suntan
- b. Leg painting
- c. Wearing slacks

6. What postwar car turned automotive design on its ear when you couldn't tell whether it was coming or going?

- a. Studebaker
- b. Nash Metro
- c. Tucker

7. Which was a popular candy when you were a kid?

- a. Strips of dried peanut butter
- b. Chocolate-licorice bars
- c. Wax coke-shaped bottles with colored sugar water inside

8. How was Butch wax used?

- a. To stiffen hair cut into a flattop so it stood up
- b. To make floors shiny and prevent scuffing
- c. On the wheels of roller skates to prevent rust

9. Before inline skates, how did you keep your roller skates attached to your shoes?

- a. With clamps, tightened by a skate key
- b. Woven straps that crossed the foot
- c. Long pieces of string or twine

10. As a kid, what was considered the best way to reach a decision?

- a. Consider all the facts
- b. Ask Mom
- c. Eeny-meeny-miney-mo

11. What was the worst thing you could catch from the opposite sex?

- a. A cold
- b. VD
- c. Cooties

12. "I'll be down to get you in a _____, Honey?"

- a. SUV
- b. Taxi
- c. Streetcar

13. What was the name of Caroline Kennedy's pet pony?

- a. Old Blue
- b. Paint
- c. Macaroni

14. What was a Duck-and-Cover Drill?

- a. Part of the game of hide and seek
- b. What you did when your mom called you in to do chores
- c. Hiding under your desk, covering your head with your arms in an A bomb drill

15. What was the name of the Indian Princess on the Howdy Doody show?

- a. Princess Summerfallwinterspring
- b. Princess Sacajewea
- c. Princess Moonshadow

16. What did all really savvy students do when mimeographed tests were handed out in school?

- a. Immediately sniffed the purple ink, as this was believed to get you "high"
- b. Made paper airplanes to see who could sail theirs out the window
- c. Wrote another pupils name on the top, to avoid failure

17. Why did your mom shop in stores that gave Green Stamps with purchases?

- a. To keep you out of mischief licking the backs, which tasted like bubble gum
- b. They could be put in special books and re deemed for various household items
- c. They were given to the kids to be used as stick on tattoos

18. "Praise the Lord, and pass the _____?"

- a. Meatballs
- b. Dames
- c. Ammunition

19. What was the name of the group who made the song "Cabdriver" a hit?

- a. The Mills Brothers
- b. The Supremes
- c. The Esquires

20. Who left his heart in San Francisco?

- a. Tony Bennett
- b. Xavier Cugat
- c. George Gershwin



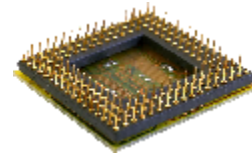
ANSWERS

1. b) On the floor, left of the clutch. Hand controls, popular in Europe, took till the '60s to catch on..
2. b) To sprinkle clothes before ironing. Who had a steam iron?
3. c) Cold weather caused the milk to freeze and expand, popping the bottle top.
4. a) Blackjack Gum.
5. b) Special makeup was applied followed by drawing a seam down the back of the leg with eyebrow pencil.
6. a) 1946 Studebaker.
7. c) Wax coke bottles containing super-sweet colored water.
8. a) Wax for your flat top (butch) haircut.
9. a) With clamps, tightened by a skate key, which you wore on a shoestring around your neck.
10. c) Eeny-meeny-miney-mo.
11. c) Cooties.
12. b) Taxi. Better be ready by half-past eight!
13. c) Macaroni.
14. c) Hiding under your desk, covering your head with your arms in an A-bomb drill.
15. a) Princess Summerfallwinterspring. She was an other puppet, when the show first aired.
16. a) Immediately sniffed the purple ink to get "high."
17. b) Put in a special stamp book, they could be traded for household items at the Green Stamp store.
18. c) Ammunition, and we'll all be free.
19. a) The all male, all black group, The Mills Brothers
20. a) Tony Bennett and he sounds just as good today.

SCORING

- 17 - 20 correct: You are not only older than dirt, but obviously gifted with mind bloat. Now if you could only find your glasses.
- 12 - 16 correct: Not quite dirt yet, but your mind is definitely muddy.
- 0 - 11 correct: You are a sad excuse for a geezer.

Know Your CPU



Intel's Test Programs

Do you need to upgrade or troubleshoot your system, but are unsure of the processor that you're using? The Intel Processor Frequency ID Utility enables you to identify and, in some circumstances, determine if your Intel processor is operating at the correct and rated frequency intended by Intel Corporation. In addition, supported processors can utilize the Frequency Test feature of the utility to help determine if a processor has been overclocked. There are two versions of the utility available. The Windows version can be used with systems that support the Windows operating system environment. The "Bootable" version of the utility does not require an operating system. By installing the tool on a bootable device (e.g., a floppy drive, the tool is run as the system is booted, but before the PC's operating system is loaded. This is normally done from a PC's floppy "A:" drive. If you're a Windows user, download the first link below (fidenu14.exe). If you want to avoid using your operating system and boot from a floppy disk, download the second file below (bfid_e14.exe). Get these files at this Web address: http://www.pcworld.com/downloads/file_description/0,fid,15320,00.asp

My Cpu

Are you considering upgrading your PC's processor, but you want to verify what you have to begin with? MyCPU is a utility that helps you to determine the type and features of your installed CPU. It displays your processor's vendor, description, family, model, stepping, and speed. A CPU Feature button adds more information, including cache, 3DNow status, FPU status, and many other flags that reflect the CPU capability. The Copy button lets you copy the found information onto the Clipboard, so you can paste it into another program. Get this file here: http://www.pcworld.com/downloads/file_description/0,fid,20041,00.asp

SysID

You can find plenty of system information by delving into the BIOS and System folders, but this free application puts it all in one place. Sysid provides detailed information on your system such as CPU type, CPU clock, Front Side Bus clock, as well as cache and RAM info. It can change the L2 speed on an Athlon (Classic), to help when you're overclocking your computer. These changes can also be set to apply to Windows start up, so that you don't have to change the settings every time Windows starts. You can even check out a picture of your CPU, and the date that it was introduced. Get it here: http://www.pcworld.com/downloads/file_description/0,fid,19820,00.asp

Active CPU

Feeling beleaguered by programs that are hogging CPU resources and slowing down your computer? This tool lets you monitor your processor. The program draws two diagrams that show your processor's usage history and current state. It also shows a miniature usage gauge on the taskbar that, when you touch it with the mouse pointer, shows the percentage of processor use. You can use this program to diagnose and troubleshoot problems or simply find out if you're getting your money's worth for that expensive hardware you purchased. Get it here: http://www.pcworld.com/downloads/file_description/0,fid,7714,00.as

OCIPUG Board Of Directors Meeting,

July 29, 2002

The July Executive Board of Directors Meeting of the Orange Coast IBM PC User Group (OCIPUG) was conducted on July 29, 2002. President Bob Walker called the meeting to order at 7:05pm, with all officers and directors present except Director Chris Davidson who had other engagements. Members Kevin Moser and Dave Wintle were also present. The board welcomed back Vice President Morris Fier who is recovering well from his recent illness. The minutes of the June Executive Board of Directors Meeting were approved as published in the July 2002 Readme. Doc.

President's Report:

President Bob Walker reported that because the Senior Center was closed due to plumbing problems, there was no General meeting for July. However, we did receive six member Yibership renewals, some of which were from individuals who were not current members. Former Webmaster Michael Moore sent an e-mail to the board saying that he had shown up at around 10:00am but that by then we had all left. He intends to join Bob, Vice President Morris Fier, Secretary Frank Mastroly, Past President Leonard Stein, and Director Sandi Tiemey at the APCUG Southwest Regional User Group (SWUG) Conference in San Diego the weekend of Friday, August 9 through August 11, 2002. Bob also reported that he had found two sites of interest to digital photograph/video and MP3 fans. One is Megatrax (www.megatrax.com), which provides (on a fee basis) background music tracks, while the other is Grokster

(www.grokster.com), which is a free peer-to-peer file-sharing site similar to Napster. The Grokster software can be downloaded for free from the Grokster website or from CNET. For additional information on either program, go to the individual website. Because of the Labor Day holiday, the August General meeting will be on Saturday, August 24, 2002. Secretary's Report: None.

Treasurer's Report: There was no formal report. Rather, the current checking account balance was reported because we no longer mail the Readme. Doc to all members, the financial situation has improved since the start of the fiscal year.

Activities Report: For the July General meeting, Director Chris Davidson had planned a presentation on Windows XP, while Member Dave Wintle had planned a demonstration using Adobe Photoshop Elements to process scanned photos of his wife's oil paintings and produce a final product as good as the original. In addition,

PC Club to attend and perhaps help us in getting vendor representatives to give presentations. All of these are now tentatively planned for the August general meeting on Saturday, August 24, 2002. In September, a representative from Intuit is currently scheduled to give a presentation on Quicken, while Member Cheryl Wester is currently scheduled to give a presentation on Pocket PCs in October. President Bob Walker requested those attending the APCUG SWUG conference in San Diego to contact various vendors about future presentations.

SIG Report:

Director Bob Strader reported that the situation was "status quo." At the Digital Photo SIG in July, Member Dave Wintle presented a very informative demonstration using Adobe Photoshop Elements to take scanned photos of his wife's oil paintings to make a final product as good as the original. Once again President Bob Walker requested all SIG leaders to provide him with summaries of what was discussed at the most recent SIG and the plans for the forthcoming SIG for inclusion in the Readme.Doc. Bob Strader will contact John Lunsford to ensure that he is still hosting the New Users SIG on the first Saturday of each month. Suggestions for new SIGs are requested, along with volunteers to lead them. In particular, if a member wants a SIG on a particular new software product, he/she should contact Bob Strader about requesting a free copy from the supplier.

SeniorNet Report:

Secretary Frank Mastroly reported that the schedule for the next session of classes, which starts Monday September 9, 2002, is as follows:

- .. Internet Monday morning
- .. E-Mail, Monday afternoon
- .. Digital Photo, Tuesday afternoon
- .. Quicken, Wednesday morning,
- .. Print Shop, Wednesday afternoon
- .. Intro to Computers, Thursday morning
- .. Windows 98 Part 2, Thursday afternoon
- .. Windows 98 Part 1, Friday morning
- .. Word Processing, Friday afternoon

During August, the E-Machine will be connected to the TV with both Windows 98SE and Windows XP installed in a dual boot configuration. Also, time permitting, one of the class computers will also be set-up likewise using the new 20gb hard drive, with the "old" 6gb drive used for miscellaneous data storage. Frank also distributed a copy of the handout he gives to all of his students publicizing OCIPUG. Member Kevin Moser wondered what response we were getting, and Frank stated that over the past three years we have had at least three or four students join OCIPUG, and others have attended both General meetings and the SIGs. Kevin suggested that we have applications in the computer room.

Community Service Report: Member Kevin Moser reported that parts for “old” computers are becoming hard to come by, and so old computers may have new life.

Election Committee Report:

Members Vic Olcott and Dan Dickinson will collect and count the election ballots and report the election results at the August General meeting. The new officers will assume office on September 1, 2002. Facilities Report: The TV used in the SeniorNet classes belongs to OCIPUG, but the Senior Center has expressed interest in purchasing it. No new developments in this area, as we are awaiting Senior Center action.

Maintenance And Improvement:

All seems to be working OK. Director Bob Strader is pursuing updating our update subscription for Norton Anti-Virus. Director Red Davidson noted that in the past there has not been any item in the budget for computer maintenance or upgrade, and feels that there should be.

Publications Report:

President Bob Walker checked with Microsoft, and they felt the problems we were having in e-mailing the Readme.Doc was that it was done in one mass mailing. In particular, some members received it as a DAT file and not as a PDF file, but this problem goes away with individual mailings. The August Readme.Doc will be published as soon as all inputs are received. The membership was encouraged to write an article for publication so as to get a press pass at Comdex, which permits one access to computers and to some of the exhibits off limits to the general public, as well as greater attention from the vendor representatives. We will require 50 copies of the Readme.Doc for distribution at the APCUGSWUG conference. After some brief discussion about the cost, in a motion by Director Red Davidson, seconded by Director Sandi Tierney, and carried, President Bob Walker was authorized to spend \$60- to print the 50 copies.

Advertisinas and Public Relations

Report: No report, as Vice President Morris Fier is still recovering from his recent illness.

Membership Report:

President Bob Walker and Director Red Davidson are continuing to update the membership roster and e-mail addresses of all members (get your inputs in ASAP) It was noted that several members flagged as not current had in fact recently renewed. As indicated earlier, several “lapsed” members have rejoined, saying that the atmosphere is friendlier this time. President Bob Walker is mailing renewal reminder notices to those members who memberships are about to expire.

OCIPUG Web page Update Status Report:

President bob Walker is continuing his efforts to redesign the web page to include more graphics, and had planned to present some of his ideas at the July general meeting. The effort remains a “work-in-progress,” and a status report will be presented at the August general meeting. We are still looking for a permanent replacement for Webmaster Michael Moore, on the assumption that he will not be able to reassume this position.

New Business:

APCUG General Conference/Comdex Exhibition:

There will be an APCUG conference in Las Vegas starting November 16, 2002, in conjunction with Comdex which starts the following Monday. Currently, President Bob Walker, Past President Leonard Stein, Vice President Morris Fier, Secretary Frank Mastroly, and Director Sandi Tierney plan to attend. SIG Reports For Readme.Doc: Once again President Bob Walker repeated his request that SIG leaders provide both a summary of the most recent SIG and a brief synopsis of what is planned for the next SIG for inclusion in the Readme. Doc.

New Officers:

The new officers will be sworn in at the August Board meeting, which will be on August 26, 2002. After the meeting it is planned to go to a local restaurant for an informal get together.

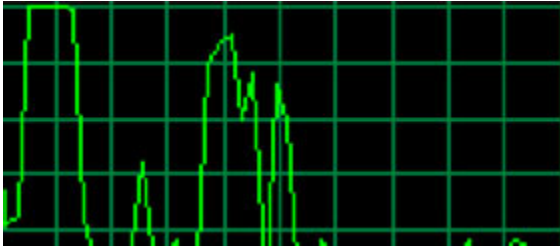
New Budget:

The budget for the fiscal year starting September 1, 2002, will be presented and discussed at the August board meeting. All board members are requested to submit their budget requests to Treasurer Charles Schreiber as soon as possible.

Long Ranae Planning:

President Bob Walker will present a long-range plan for discussion at the September board meeting, along with a detailed day-by-day schedule for the year beginning September 1, 2002. Miscellaneous: The proposed computer classes for high school students would be mostly a SeniorNet effort. However, most SeniorNet team members are also members of OCIPUG. It is tentatively planned to have a potluck function in lieu of the December general meeting. Adjournment: Moved by Director Red Davidson, seconded by Treasurer Charles Schreiber, and carried. The meeting was adjourned at 8:00pm. The next board meeting will be on Monday, August 26, 2002, at 8:00 pm

Respectfully submitted,
Frank Mastroly, Secretary



Cool Beans System Info

Are you curious about what goes on behind the scenes as you compute throughout the day? Cool Beans System Info is freeware that monitors your computer's CPU, physical memory, and swap memory usage. The resizable main window displays these three properties in small graphs, each of which can be turned on or off. You can also open a screen that displays other information, such as the amount of time the computer has been on and presently installed extensions (MMX, 3DNOW, and so on). For users with Windows 2000 or Windows XP, Cool Beans System Info also supports the alpha blending "transparent" look.. Get it here: http://www.pcworld.com/downloads/file_description/0,fid,19920,00.asp One thing is for sure about all of these proggies: they are free and they work well.. Try them out and let me know what you think!

"...they are free and they work well. Try them out and let me know what you think"



Some Cool Utilities to Try

Audio Conversion Wizard 1.35

From the developer: "You want to convert your digital audio easily from one format to another, but you feel yourself not very experienced with computer? You are professional and you want perform conversion from one format to another with maximum speed and minimum of hard drive space required? Audio Conversion Wizard helps you to convert audio files of supported audio format from one format to another with all possible settings, using easy step-by-step interface. MP3, WMA 8 (Windows Media Audio), OGG Vorbis and WAV PCM formats are supported, with ID3v2 copying and creation. You can use Single mode for easy one-file conversion and Batch mode for fast converting of several files. All you need to do is simply reading explicative texts, making some clicks with your mouse's buttons and pressing 'Next' button. Get it at <http://downloads-zdnet.com.com/3000-2140-10113045.html>

EasyMTU 3.0

EasyMTU is a free Windows 95 program that optimizes your TCP/IP settings for your dial-up adapter (MaxMTU, MaxMSS, DefaultTTL, and more). EasyMTU searches for the TCP/IP protocol bound to your dial-up adapter and changes the right settings, and other elements of your Registry (such as your network adapter) are unaltered. It has a simple automatic calculating option and the possibility to add your own Registry keys. This version offers a new benchmark utility that allows you to compare different settings, a Find-MTU feature, and improved routines. Get it at <http://downloads-zdnet.com.com/3000-2155-911196.html>.

Measure Your Internet Connect Speed

NetPerSec measures the real-time speed of your Internet connection. Different types of connections promise different communication speeds, but what are you actually getting?

Due to network traffic, actual speeds are often slower than what is promised. Cable modems are fast unless many of your neighbors are sharing the line; such modems can slow down considerably with a heavy load.

How do you know when it's time to switch to DSL? NetPerSec lets you check your connection speed in real time. It monitors all TCP/IP activity to and from the Internet or other networks, and graphs the communication speed. Its dynamic tray icon shows send and receive activity with a bar graph or a histogram.

For details, open the program's main window to view current and average send and receive speeds in a configurable, graphical display. You can adjust the sampling rate and the amount of data used to compute the average.

You can download this handy little utility program at the following [http://downloads: Zdnet.com.com/3000-21353930322.html](http://downloads.Zdnet.com.com/3000-21353930322.html)

Philips Shrinks CD to 1.2 Inches



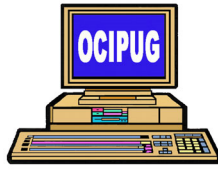
Blue laser technology supports tiny drive for use in phones, PDAs. Kuriko Miyake, IDG News Service Tuesday, June 18, 2002

In the ongoing effort to squeeze the size of a CD drive to fit into small, portable devices, Koninklijke Philips Electronics reports it is using blue laser technology to miniaturize a drive for an optical disc measuring 1.2 inches in diameter and capable of storing a gigabyte of data

The company demonstrated Tuesday what it claims is the world's first fully functional prototype optical drive to measure only 2.24 by 1.36 by .3 inches. It can replay audio data on a 1.2-inch optical disc, according to Philips. The disc's data capacity is 50 percent greater than that of current CD-ROMs, said Koen Joosse, a Philips spokesperson. It was made possible using a blue laser, which has a shorter wavelength than the red lasers used in current optical disc technology.

A shorter wavelength means the laser beam can create smaller dots on optical discs, which means more data can fit on a disc. CDs currently cost less than the flash storage media used in conventional mobile devices such as digital still cameras, phones, and PDAs. Therefore, Philips hopes the small discs will be widely distributed as portable rewritable media, at lower cost than flash media, Joosse said. Refinements Remain However, Philips faces "a number of challenges to get optical discs into small devices," said Wolfgang Schlichting, a research manager of removal storage at IDC. For one thing, optical drives are still costly to install in handheld devices, Schlichting said. The optical drives, which must be larger than the discs themselves, are larger and less convenient to use than flash memory cards. And because optical discs rotate, they consume more power than flash media, he added.

"The technology is still at an early stage, and we cannot determine when this will be commercialized," Philips' Joosse said. The company hopes to shrink the .3-inch height of the drive; the optical disc's 1.2-inch diameter is already small enough for mobile devices, he said. *PCWorld*



OCIPUG
 Orange Coast IBM
 PC User Group
 (OCIPUG)©

Mailing Address
 2973 Harbor Blvd, Box 621
 Costa Mesa, CA 92626-3934

Meetings Location
 Costa Mesa Senior Center
 Southeast Corner of 19th and Pomona

OCIPUG, founded in 1985, is an independent California nonprofit (IRC 501-c-3) corporation, and is not affiliated in any way with IBM, any vendor, equipment manufacturer, or other organization.

Publication Copyright © 2001
 A newsletter, *Readme.Doc*, is published monthly. A subscription of \$12 per year is included with all paid memberships. Address all inquiries, address changes, and material for publication to the above address marked "ATTN: Editor".

Opinions expressed by the authors are not necessarily those of this newsletter, its staff or OCIPUG. Mention of products does not constitute endorsement by OCIPUG. Omission of trademarks does not imply that the products or names are not so protected. *Readme.Doc*, its contributors, and staff assume no liability for damages arising out of the publication or non-publication of any advertisement, article, or any other item in this newsletter.

Permission is granted to other user groups to reprint herein material, not specifically copyrighted, for non-commercial use only, provided credit is given to *Readme.Doc* and to the author.

Publication Deadline

Material for the **September** issue must be received on or before **August 27, 2002**
rwalker820@msn.com

Publication Guidelines

All material submitted will be published *exactly* as submitted, but may be subject to editing at the *Editor's* discretion. We reserve the right to refuse any material submitted for publication. Send all submissions as follows:

1. Send via Internet e-mail to: editor Robert Walker
 rwalker820@msn.com and newsletter coordinator
 Michael Conway 714-962-2194 mchbca@aol.com
2. Mail a 3.5" disk so as to be received by the deadline by the Newsletter Coordinator at the OCIPUG mailing address above.
3. Hard copy to Editor at the OCIPUG mailing address above.

Membership

Benefits of OCIPUG Membership include, but by no means are limited to:

- * Subscription to OCIPUG's monthly newsletter, *Readme.Doc*, with up-to-date information on meeting schedules as well as the newest software and hardware.
- * Free monthly General Meetings with speakers from industry and academia describing advances in technology.
- * Free Special Interest Group (SIG) meetings/seminars to exchange tips and tricks and to solve problems.
- * Free technical support from knowledgeable fellow members via telephone and/or e-mail.
- * Pleasure in helping your fellow member solve their problems.
- * Camaraderie with those of similar interests.
- * Discounts from vendors on software, hardware, and other items.

Orange Coast IBM PC User Group
 2973 Harbor Blvd Box 621
 Costa Mesa, CA 92626-3934

Membership status: New Renewal - Member # _____ Membership type: Individual Family

Title: Mr. Mrs. Ms. Dr. Prof. Hon. () (Circle one)

First Name: _____ Last Name: _____

Street Address: _____ City: _____ State: _____ Zip: _____

Home Phone: () _____ Work Phone: () _____ Fax: () _____

E-mail address: _____

Profession/Trade: _____ [] Retired [] Current Occupation: _____

Family Member(s) Names: _____ Company: _____

Annual Dues:

Make check payable to OCIPUG and mail to the above address or bring to the General Meeting.

Individual	\$30.00	\$ _____
Family	\$35.00	\$ _____
*Full-time student	\$20.00	\$ _____
Donation		\$ _____

I consider my skill level to be:
 Beginner Novice Intermediate Advanced

Total Amount Paid \$ _____
 *(U-grad 12 units; grad 6 units)

I learned about OCIPUG from: _____

Today's Date : _____