

# Numbers '08

by Gary Brandt

At the November meeting we will continue with the Numbers '08 Essential Training DVD, finishing the section on working with tables. We will move on to working with formulas, functions, and charting. If time permits, we will look at some text options and how to use Address Book data in Numbers. Our meeting is scheduled for November 18th, and we hope to see you there. <sup>C</sup>

Meet us at

Gannett Fleming Gannett West Building 209 Senate Ave & Camp Hill

### Tuesday, November 18, 2008, 6:30 p.m.

Attendance is free and open to all interested persons.

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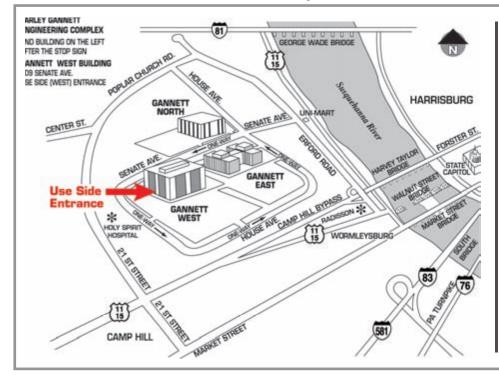
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Keystone MacCentral is a not-for-profit group of Macintosh enthusiasts who generally meet the third Tuesday of every month to exchange information, participate in question-and-answer sessions, view product demonstrations, and obtain resource materials that will help them get the most out of their computer systems. Meetings are free and open to the public. The *Keystone MacCentral Printout* is the official newsletter of Keystone MacCentral and an independent publication not affiliated or otherwise associated with or sponsored or sanctioned by any for-profit organization, including Apple Computer, Inc. Copyright © 2008, Keystone MacCentral, 305 Somerset Drive, Shiresmanstown, PA 17011.

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### Keystone MacCentral Essentials

### **Meeting Place**

Gannett West 209 Senate Avenue Camp Hill

Web Site http://www.keystonemac.com

**Mailing Address** 305 Somerset Drive Shiresmanstown, PA 17011

### printout

### by Linda J. Cober

# **President's Corner**

**Out** November meeting will be the start of our "Share the Goodies" season with all members asked to bring their leftover Halloween candy (or candy gathered by your children who don't need and probably won't miss some of the loot they lugged home) to share with the club via the candy tin passed around at the meetings. Then next month is our December meeting and Holiday Party with everyone asked to bring a favorite treat to share with the club. Once again, the club will be providing soft drinks, cups and ice; with your help a good time will be had by all.

Encouraged by a question during Q&A last month, I did some research and found this article by Kali Hilke from Small Dog which may help those of you who have Time Machine and want to change its backup schedule. "Annoyed when Time Machine kicks on ALL THE TIME? Well, maybe it's not all the time, but it is every hour you have a hard drive plugged in or Time Machine set to run. That's too often for me, so I decided to see what I could do to change it.

Here's how:

1) Go to Macintosh HD > System > Library > Launch Daemons

2) Open com.apple.backupd-auto.plist in Text Edit (or other text editor)

3) Find 3600; this represents the amount of time between backups in seconds

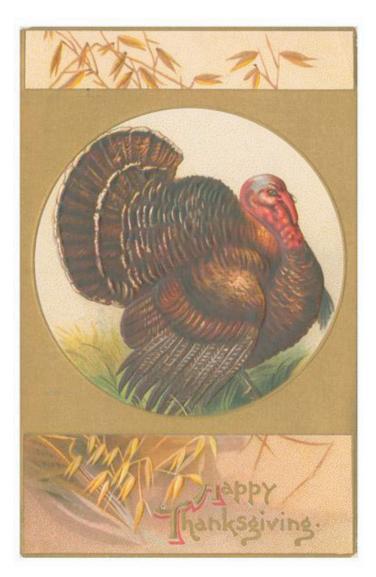
4) Change the 3600 to the number of your choice (I chose 14400 for backups every 4 hours, since on a typical day it would back up twice while I'm at work Note: You must be the system administrator of your Mac for this to work as written."

If you were at the October meeting, you got the code to receive a User Group discount from PeachPit Press. Now, InformIT is offering an exclusive User Group contest each month where members can win three print books of their choice. The URL for the contest is as follows.

http://www.informit.com/user\_groups/contest.aspx

This next piece of information comes via Tucker Hill, one of our members, whose email list offers everything from cartoons to PowerPoint tours of exotic places to helpful information. I especially liked this one so am sharing it with you. If you are like me, you like your house to be clean but don't really enjoy cleaning it. In fact, you may put cleaning at the bottom of the to-do list until you are faced with the necessity to clean because you know that people are coming to visit. Since many of you will be hosting Thanksgiving dinners, this information may come in very handy. How to Clean Stuff is a website offering a plethora of helpful cleaning tips. At the site you start by clicking on a category and then finding the item you want to clean. You will also find instructions for many hard-to-clean items like vents and mini blinds; there are also handy tips for removing stains such as indelible ink. If you are an exception and really like to clean, please help out the rest of us by posting your tips. www.howtocleanstuff.net

Hope to see you at our November 18 meeting as we continue our Numbers training!



### by Gary Brandt, Recorder

# Keystone MacCentral Minutes

## October 21, 2008

### Business Meeting

President Linda Cober welcomed members to the October meeting and KeyMac board members gave their reports. Gary Brandt mentioned a sister site of macProVideo.com, who have been giving us gift certificates for free downloadable tutorials. Their new site, designProVideo.com will focus on the Adobe creative products. Gary also informed members of the iworkcommunity.com site where additional templates for Pages, Keynote, and Numbers can be found. We navigated to the KeyMac web site to note the widget pick of the month. Widget Update is used to find updates of widgets installed on your system.

### Q&A & Comments

Jim Carey told us he was buying a MacBook Pro. Instead of buying the latest release, he was saving big bucks purchasing an older version. Generally, older models will see a significant price reduction when newer models are released.

Don Fortnum was having problems with his Epson photo printers developing the inability to print using matte paper. They could only print on plain paper because the matte paper would not advance through the printer. Don could not find any settings for paper thickness adjustments. Jim Carey thought it sounded like the printers might have a flat spot on their rollers. We had previously mentioned the fixyourownprinter.com web site that could be of help. In fact, Linda Cober solved her island friends printer problems using information gleaned from this site. They had a printer that showed an error message that its useful printing life was up although it had no prior problems. Linda found a key combination that was used to reset the print count on their printer. The printer works again and the error message is gone.

Dave Johnson asked about Time machine backups. He wanted to eliminate unnecessary backups and he asked for

guidance. We discussed several options for Time Machine and other backup ideas. SuperDuper is an option to consider. It can make a clone of your hard drive that can be moved to another drive that can serve as a boot disk.

Eric Adams reported having an intermittent problem with keyboards on his office network becoming unresponsive. Jim Carey said it might be caused by something happening over the network. Eric also had a problem with several Macs on the network experiencing phantom restarts. Jim had this problem once with a laptop and it turned out to be a bad memory chip. Eric was advised to also use Disk Utility to verify the hard disks on the computers in question. If your computer does not run overnight, the Unix cron jobs might never be run. You can use a program like MacJanitor to run these cron jobs for the daily, weekly, and monthly chores that are required. Cocktail is another maintenance program and it has been updated for Leopard.

If you cannot read PDFs in Safari, the Adobe Acrobat Reader can install a plug-in for Safari to enable this feature. Tucker Hill was having problems with Apple's Mail not always being able to send or receive email. It seems some of his settings were changing. Dumping Mail's preference files might solve the problem for a while but they came back. Someone mentioned that Mail could have problems if you have too many saved messages. Purging unused servers from Mail's preferences was suggested. There are other options for email, including web mail and Thunderbird.

Linda Cober reported a problem where her Mac sometimes thought it was running Classic even though no Classic programs were installed on the Mac. She should check her Startup Items folder to see if anything in there might be starting Classic.

Jim showed us the remote he uses for presentations. It costs about \$65 and is available from Keyspan. Jim asked about installing Windows on his MacBook. Options to consider are Boot Camp, Parallels, and VMware Fusion, depending on your particular needs. Jim showed us a list of the Apple Quick Tips podcasts he had downloaded to the club's Mac-Book. They are short podcasts offering tips for using a Mac. He played one that actually helped answer a question that was posed during September's Q & A. The latest version of Apple's Preview program can resize images. These podcasts are available from the iTunes Store.

We watched Macworld Vodcast # 70 in which Chris Breen demonstrated the features of the Kodak Zi6 pocket camcorder. It shoots in HD format and saves to cards in its SD memory card slot. It runs on removable batteries and includes a charger with its \$180 price. It lacks image stabilization but picture quality is pretty decent.

### Program Notes

In my dual roles as recorder and program director, I previewed the Numbers '08 Essential Training DVD in its entirety before we viewed portions of it at the October meeting. We skipped over some of the basic sections and started with a tour of the Numbers interface from narrator David Rivers. Numbers '08 has a template chooser with 18 templates included. As noted above, additional user created templates can be found at iworkcommunity.com for all three iWork applications.

Unlike other spreadsheets you may have used, Numbers presents a canvas upon which to work rather than one large page of columns and rows. You add and resize any tables you need and these tables work as you would expect a spreadsheet to do. You can also place charts, text boxes, and objects on the canvas to suit your needs. A Numbers document can consist of only one sheet or more than one. The Sheets pane on the left in Numbers displays the document's sheets and any tables or charts on those sheets. Below that is a Styles pane where you can change styles for the selected table. Adding a new sheet to a Numbers file will put it at the bottom of the Sheets pane. Sheets can be rearranged using the Sheets pane.

David showed how to add comments to a Numbers document, especially helpful if you are collaborating on a file with others. In demonstrating elements of the interface, he showed how the format bar is context sensitive, depending on what is selected.

David moved on to demonstrate working with sheets. A new sheet can be added to a document and it will include a table using the default style selected. Styles can be changed whenever the need arises. Sheets can also be copied for use again in the document or in another Numbers document.

David explained that when working with pages, users will often want to see how their document will print. Numbers includes a Print View option for this purpose. David showed several ways to toggle Print View off and on. Adjustments for printing were demonstrated and David showed how to add header and footer information that would appear on each printed page. Numbers can automatically number pages and page numbers, page counts, and date and time can be inserted into headers or footers.

The next section covered tables, the heart of most spreadsheets. Tables can be resized with drag and drop. For more control, the Page Inspector can be used. David demonstrated some of its controls, including the option of choosing to display the table name on the sheet.

In the next section David worked with the content of table cells. Cells can be preformatted to display information entered later in various number or date formats. Cell formatting is done with either the format bar or the Cells Inspector.

At the November meeting, we will finish the section on working with tables and start with formulas, functions, and charting. Objects and images in Numbers are used in much the same way we have previously viewed their use in Pages, so we can skip over that section.

### Raffle

We held a raffle during a pause in our program. We gave away two gift certificates for free downloads from macProVideo.com's web site. They can also be used at the designProVideo.com site. The winners were Eric Adams and Don Fortnum.







## Apple Changes App Store Customer Review Policy

Apple recently announced that in order to submit a product review of any app in the iPhone App Store, the reviewer must own the app in question, whether through free download or purchase. When you attempt to write a review for a particular product, iTunes searches your Mobile Applications folder for the app in question. If found, iTunes opens the review form for that product, and you can enter your review. If iTunes can't find the app, a dialog informs you, "You must own this item to write a Customer Review" and refuses to let you review the app.

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In order to write a Customer Review for this item you must have purchased or downloaded it.

OK

Prior to this change, many developers felt their products were being unfairly rated and reviewed by people who hadn't even tried them. Numerous reviews (often highly negative ones) were based on price, screenshots, or product descriptions alone. Since the App Store is the only place to acquire apps for the iPhone/iPod touch, it seems more than reasonable that you would be allowed to review only those apps you actually own.

Get zentre lists it does all this and is free * by snowman88668	2 out of 8 customers found this review helpful
Why would you pay for this when andia list does everything here and is f	ten. Plus you can create other lists. Sily to pay 120 for this.

While the new policy may not actually improve the depth or quality of reviews — people who have downloaded apps may still glibly trash them — it will at least assure readers that the opinions are in fact based on firsthand user experience.

Unfortunately, the new limitation may eliminate a small

portion of credible opinions. For example, if I try out an app on a friend's iPhone, I can't share my thoughts on it through the App Store — despite my opinion being based on firsthand experience. Yet such cases are certainly in the minority, and owning the product would definitely give you a better sense of it than briefly tinkering with it on someone else's phone. The tradeoff seems entirely worthy.

How does Apple's new policy situate the App Store reviews in comparison to customer reviews on other sites, like Amazon.com? (Amazon is the gold standard for customer reviews — even people who don't end up buying at Amazon use their customer reviews when evaluating possible purchases).

Apple's ownership requirement would seem to raise the bar of review quality, since sites like Amazon and VersionTracker have no way of determining whether or not a reviewer owns the product in question. However, in practice, the App Store is likely just attaining equal footing. While few sites restrict reviewing to people who have purchased or downloaded through the site, the assumption is that anyone reviewing the products has some

experience with them. For instance, books, DVDs, home goods, and other items sold through Amazon are also widely available through many other retailers, so reviews can reflect firsthand experiences no matter where the product was purchased.

Requiring commentators to own the apps being reviewed is just one more thing the App Store does to improve the quality of reviews. Most importantly, potential buyers can say whether or not a particular review is helpful, and sort reviews by those that received the most helpful votes. Unfortunately, Dan Frakes of Macworld notes that the App Store's Most Helpful sort order keys off the number of helpful votes, not the ratio of helpful to not-helpful. As a result, an older review that has a 20 (helpful) of 40 (total) ratio will sort well above a newer review that has 9 of 10 helpful votes. Obviously, it would need some threshold, since 1 of 1 helpful votes has a great ratio but not necessarily much relevance. It's also possible to sort by the reviews with the highest ratings, and to see which other products a reviewer has evaluated (since someone who writes one good review is likely to write others).

Perhaps the main thing that's missing is the way Amazon shows the most helpful reviews with low ratings; that feature makes it easy to find well-received — and likely legitimate — criticism for a generally liked product, something that's tricky on the App Store now. Amazon's

bar chart showing the distribution of different ratings is also especially welcome.

**Customer Reviews** Apple Airport Express 45 Reviews Average Customer Review 5

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The most helpful favorable review	The most helpful critical review
20 of 21 people found the following review helpful:	6 of 7 people found the following review helpful:
Airport Express Set-up Instructions The CD that comes with the Airport Express has been useless to me in setting up a Windows XP computer to work with an AE. The instructions below should get you up and running. 1. First download the latest version of both the Airport Update and Airport Express Firmware Updater from []	up your own wireless network and making decisions as to what level of security you want (with no ready explanation of what the
<ol> <li>Run the latest version of the Airport</li> <li>Update (4.1 at the</li> <li>Read the full review &gt;</li> </ol>	Read the full review > Published 3 months ago by David Haggith
Published 3 months ago by S. Monroe	> See more <u>3 star</u> , <u>2 star</u> , <u>1 star</u> review:
See more <u>5 star</u> , <u>4 star</u> reviews	

All in all, Apple's new ownership requirement is a wise move, and one that marks a subtle but important difference in the way the App Store does business. 🕁

Search Customer Reviews

### by Doug McLean

## **Netflix Mac Support News and More**

Back in January 2007, Netflix announced it would be offering "Watch Instantly" content, videos that could be streamed and viewed from the Web at no extra charge with any unlimited plan. Since that date, the Mac community has grumbled at the fact that the service is available only to Windows users, although it does work with virtualization software like VMware Fusion and Parallels Desktop. Over the last year or so, Netflix has issued several statements indicating their proximity to a Mac access solution without showing any real developments. With that in mind we take the latest notice, posted on the Netflix blog, with a grain of salt. In the blog post, Netflix spokesman Brent writes:

"And, for all of you Mac users (of which I am one) we've been busy working getting a solution that will allow you to watch instantly on your Mac. So hang in there - we'll have something for you by the end of the year."

This promising morsel of information actually came as the endnote to another major notice: Starz Play, the broadband entertainment service from the premium movie service provider Starz, has signed an agreement with Netflix that adds over 1,500 titles to the Watch Instantly catalog. Also

noted in the post is the addition of new CBS, Disney, and NBC TV episodes.

Another bit of Netflix-related news came from Roku, the maker of the popular Netflix Player that allows users to stream content from their computer to their television (this is one of the few ways to circumvent the Windows-only limitation of the Watch Instantly feature). According to Wired.com, Roku is expanding from its exclusive relationship with Netflix to open its platform to any interested content providers. This means the Roku player will soon be able to host a wide variety of video-on-demand services, though it's unclear yet who will develop them, how many there will be, and if the services will be compatible with each other.

Finally, the Roku Netflix Player will have some competition soon, from LG's \$399.95 Network Blu-ray Disc Player, which can play Blu-ray discs in full HD and stream video from Netflix's Watch Instantly feature. Judging from responses on Twitter when I asked if there were any competitors to Roku's Netflix Player, a number of video geeks are eagerly anticipating the LG player's combination of Blu-ray and Netflix support.

## On the Way Out: FireWire and Matte Screens?

Last week's introduction of the redesigned Mac-Book and MacBook Pro brought a number of welcome (or at least interesting) changes - the buttonless glass trackpad, a magnetic latch for the MacBook Pro, the capability to drive a 30-inch external display, and more.

But two seemingly small details have generated a firestorm of complaints from Mac users: the elimination of FireWire from the MacBook, and the dropping of a matte screen option from the MacBook and 15-inch MacBook Pro (the 17inch MacBook Pro retains the matte option for now). Has Apple gone too far in the quest to simplify, or are users just whining? And with the removal of FireWire - first from the MacBook Air and now with the MacBook - are we seeing the beginning of the end of the technology for Mac users?

Whither FireWire? The removal of FireWire from the MacBook is highly troubling, and many people have declared it a deal-breaker, opting instead for the previous generation of MacBook or for the FireWire 800-equipped MacBook Pro. Some have even opined that the dropping of FireWire from the MacBook is one way Apple can differentiate the more-expensive MacBook Pro from the increasingly capable MacBook.

FireWire is most commonly used to connect external hard drives and digital camcorders, but hard drives increasingly support both FireWire and USB 2.0, and in an email response to a user published on TUAW, Steve Jobs claimed that many HD camcorders now use USB 2.0 as well. So should we just learn to love our new USB 2.0 masters?

(It's ironic that Steve Jobs himself responds to user concerns while Apple simultaneously deletes forum posts from its support discussions about the controversial removal of FireWire and the matte screen option. Of course, the Apple Discussions Use Agreement specifically says, "Unless otherwise noted, do not add Submissions about nontechnical topics, including: 1. Speculations or rumors about unannounced products. 2. Discussions of Apple policies or procedures or speculation on Apple decisions." So no one should be surprised when such deletions happen.)

Unfortunately, USB 2.0 isn't a full replacement for FireWire. Despite its nominal throughput of 480 megabits per second (Mbps) versus FireWire 400's 400 Mbps, in real-world usage, USB 2.0 is significantly slower than FireWire due to increased overhead and - in theory - reliance on the Mac's CPU. (I say "in theory" because I've heard results of informal tests run on an 8-core Mac Pro that still showed USB performance suffering badly, and that's as much power

as can be thrown at the problem right now.) Of course, FireWire 800, which has a theoretical throughput of 800 Mbps, is faster yet.

So on the performance end alone, FireWire trumps USB 2.0. But the real story of the attachment Mac users have to FireWire, I believe, is with Target Disk Mode. Boot any FireWire-equipped Mac with the T key held down, and the Mac will go into Target Disk Mode and act just like an external hard drive. This proves wildly useful for trouble-shooting, since you can boot a recalcitrant Mac from a working Mac in Target Disk Mode to troubleshoot or repair a possibly troubled hard drive. You can also put a Mac with a dead screen or other problem into Target Disk Mode to work on its hard drive from a functional Mac. In particular, Target Disk Mode is a lifesaver when a Mac's optical disk is non-functional.

Apple's party line seems to be that there's no more need for Target Disk Mode. An article at the Australian site APCmag.com quotes Geoff Winder, Product Manager for Hardware at Apple Australia, as saying that Apple believes Time Machine and the Migration Assistant (which now works over USB, Ethernet, and AirPort as well as FireWire) take over for Target Disk Mode's primary features. That's either wishful thinking or missing the point - Macs do experience problems, and nothing is more useful than Target Disk Mode in resolving those problems quickly.

Personally, I use Target Disk Mode in every hard disk- or boot-related troubleshooting situation I encounter. And in enterprise situations, Target Disk Mode enables support technicians to carry a utility-equipped Mac laptop to nearly any Mac that's not working and perform all sorts of diagnostic and troubleshooting procedures, significantly reducing the cost of support, particularly in comparison with PCs, which lack a similar feature.

On the downside, the Apple-backed FireWire never achieved ubiquity, due largely to high initial licensing fees and component costs, both of which have since dropped. Only Apple and Sony ever made FireWire common in their computers, and digital camcorders were the only device that relied nearly exclusively on FireWire for a number of years (many audio interfaces also rely on FireWire, although there are PCI and USB audio interfaces as well). Intel's USB 2.0 isn't as flexible or speedy as FireWire by nearly any technical measure, but it's good enough for most purposes, and it remains cheaper to embed in computers and electronic devices. From Apple's perspective, dropping FireWire must hurt, given the company's role in creating the technology, but Apple is more interested in reducing component costs and increasing compatibility than in propping up a technically superior standard. The iPod started as a FireWire-only device, but to make it easy to connect to PCs, which seldom have FireWire, Apple added USB 2.0 support. As Macs gained USB 2.0 ports as well, Apple gradually dropped FireWire support from the iPod, which undoubtedly also reduced Apple's manufacturing costs.

Some have called for Apple to support eSATA in place of FireWire, since SATA has theoretical throughput of up to 3 Gbps (or 300 megabytes per second - MBps - in real transfers). (SATA, or Serial ATA, is the data transfer bus used by most hard drives and other mass storage devices; eSATA extends SATA to external devices, largely via different connectors.) Although eSATA can be hot-swappable and might be welcome for connecting hard drives, SATA in general is aimed at mass storage devices and likely wouldn't be appropriate to take over FireWire's role in connecting camcorders, audio interfaces, and more. (Unfortunately, eSATA isn't necessarily hot-swappable in practice, as our friend Dan Frakes wrote in Macworld.)

Instead, we should probably look for Apple to support USB 3.0, which is supposedly nearly complete and will offer 4.8 Gbps of theoretical throughput. Apple was the first major manufacturer to support USB 1.0 with the iMac back in 1998, so it's not inconceivable that Apple could be planning a major switch to USB 3.0 once it is finalized and chips start shipping in 2009 or 2010. I don't know if USB 3.0 will address the architectural limitations in USB 2.0 that prevent Target Disk Mode from working.

**Glossy or Matte?** The other major controversy about the new MacBook and 15-inch MacBook Pro is that the choice of whether you get a glossy screen or a matte screen is gone - it's all glossy, all the time.

Whereas it's easy to explain why FireWire is important, the elimination of the matte screen option is, pardon the pun, fuzzier. (In essence, fuzzing is exactly what's happening, since a screen is made matte by virtue of a polarizing film that reduces the intensity of light that's reflected directly back into the eye of the user.)

Most people seem to think the glossy screen's colors are brighter and more vibrant, with deep blacks and bright whites, and that text is crisper. Glossy demos well. Also, I've heard, but haven't been able to confirm, that the glossy screens are entirely recyclable, as opposed to matte screens.

On the downside, glossy screens show smudges more readily, and they suffer much more significantly from reflections. You can of course adjust screen angle to minimize reflections, but my experience on a glossy-screened MacBook is that there are times when it's nearly impossible to eliminate reflections while working in a brightly lit environment like an airport.

But the most violent reaction has come from professional photographers, many of whom say that they can't colorcalibrate a glossy screen accurately because the color and contrast vary too much based on viewing angle. There seems to be some debate about that question, but regardless, it's clearly a topic of significant concern to photographers.

**What to Do?** There's certainly no reason people who are upset by these changes should sit idly by. Go to Apple's Product Feedback page and tell Apple exactly what you think.

To be blunt, though, I don't see Apple changing anything in the current set of products, and almost certainly not in the next major revision either. Although there may be one, I can't think of a single situation in which Apple has brought back a dropped technology that was loudly lamented by the Mac community.

Apple has been unafraid to break with the past before, and unless sales of the new MacBook and MacBook Pro models were to drop precipitously, I fear that those of us who are unhappy will just have to live with the changes. If we're lucky, Apple or another company has other improvements in the works - such as Target Disk Mode that works over USB or anti-reflective screen films - that will alleviate our concerns.







# Importing Video from a FireWire Camcorder to an Aluminum MacBook

Apple's newest consumer laptop is a package full of shiny power, but it also lacks a FireWire port. That means no FireWire Target Disk Mode, no support for external hard drives with FireWire interfaces, and no support for digital camcorders that have FireWire (or i.Link) ports.

In an email response to a customer who asked about camcorder support, CEO Steve Jobs replied, "Actually, all of the new HD camcorders of the past few years use USB 2." And looking at Amazon's current best-selling camcorders, most of them connect via USB.

However, if you already own a perfectly good MiniDV or HDV camcorder that connects via FireWire, you may not be completely out of luck. Although I don't have one on hand to test this, in theory you can use an analog-to-digital video converter to bring your footage into the new Mac-Book. (If you own one of these devices, please let me know if I'm off the mark.)

For example, take a look at the Pinnacle Video Capture for Mac (\$100). Most camcorders include a composite AV cable that enables you to connect the camcorder directly to a television for playback. Insert the left and right audio plugs, and either composite video or S-video cable, into the Video Capture for Mac hub, which in turn connects to the MacBook via USB.

Poking around online, I also found the ADS Tech VideoExpress (\$50) and the Plextor ConvertX for Mac (PX-TV402U) (\$229), neither of which I've used.



Obviously, this approach isn't ideal. You're starting with digital footage and converting it to analog, then re-digitizing it in the computer, so I wouldn't be surprised if there's some image quality loss (though I'm guessing it would be hardly noticeable). You also lose device control, the capability to control the camcorder directly from iMovie as you're reviewing footage and importing.

I should also point out that you can also still purchase a new white MacBook with FireWire for \$999 or move up to a MacBook Pro, which includes FireWire.

I agree with many others that removing FireWire from the new MacBook is disappointing, but it's also consistent with Apple's outlook for digital video. iMovie '08 is a complete-ly new application that shares little with iMovie HD 6, and it's clearly designed as an editor for video snippets and shorter movies destined for YouTube. In Apple's view, the people who are shooting these types of movies - using Flip cameras or the movie-recording functions of digital still cameras - are the market for the new MacBook. I don't expect Apple to bring FireWire back to its consumer laptop.







### by Tim Sullivan

## **Rumors and Reality**

### **Around Apple**

•Lost and gone, probably forever: the FireWire port on the new laptops. Makes it kind of tough to move files or do troubleshooting via FireWire target disk mode. Makes it even more tough if you've got a FireWire movie camera.

And speaking of gone, so are any and all threads concerning this problem in Apple's Discussion Boards.

•LSI is short for Liquid Submersion Indicators. They are little white dots of material scattered around the inside of new laptops. If they get wet because you left your laptop out in the rain or dropped it into the bathtub, they turn red.

Soaking your laptop voids any warranty. Drying out the computer and sending it for repairs will definitely cost you.

•Joel Podolny, the dean of the Yale School of Management, will join Apple as vice president and dean of Apple University. The company declined to provide details about the University or the position.

Other corporations offer university classes. Current speculation is that the University will be for employees only. The company's existing Learning and Development program would be folded into Apple University.

• Apple announced that Mark Papermaster is joining the Company as senior vice president of Devices Hardware Engineering, reporting to Apple CEO Steve Jobs. Papermaster, who is top expert in IBM's Power microprocessor architecture., will lead Apple's iPod and iPhone hardware engineering teams. Papermaster has 25 years of product and technology experience, and was previously a vice president at IBM.

IBM is suing Papermaster and Apple over the terms of his his contractual obligation to refrain from working for an IBM competitor for one year. Since Apple and IBM don't compete in chip design, IBM's lawsuit may be a fishing expedition. What will Papermaster really be doing? California law is unfriendly, in general, to noncompete agreements.

Also of note: Apple recently purchased P. A. Semi, which is a microprocessor design firm. It is expected that the company will serve as a specialized unit that works with third party vendors like Intel to make their chips more customized, especially when this is important to industrial design.

**Flash drives** are downright cheap and hold a lot of stuff. We're talking 16Gb for \$16. If you travel, you could load a backup of your system on one and most of your current files on another. Or copy your browser and associated files – Web bookmarks, login information along with Web surfing cookies and site history – onto one. There would be no trace of my Web browsing on the computers that the flash drive plugged into.

If, heaven forbid, you should lose them, unscrupulous people could rummage through your files. There are currently available some workarounds such as Take Anywhere's Pocket Safe (\$59.95), the IronKey (\$149) and TrueCrypt, a free software program that works with any USB flash drive.

We recommend researching the various options before investing hard earned money. The devices and software use different approaches — and diffeent effectiveness — to safeguarding the data. If possible, get some user feedback.

**Time to upgrade:** As a special introductory offer, customers with earlier versions of Adobe Creative Suite, Macromedia Studio, and Adobe Production Studio software can upgrade for the same price as those moving from Creative Suite 3 — up to a \$200 savings! This offer ends on February 28, 2009, in North America

**Vista:** Microsoft introduced what it said would be a slimmer and more responsive version of its Windows operating system, while dropping the brand name Vista for the new product.

The new version will be branded Windows 7, because it is the seventh operating systems for PCs developed by the company since the 1980s. The company did not say when it would sell Windows 7 to the public.



4



# The Evolving World of Mac Backup Software

**Because** I write so much about backups, I try to keep on top of all the programs one can use to back up a Mac, and their ever-changing feature sets. While working on the recently released version 3.0 of "Take Control of Mac OS X Backups," I realized that the appendix in which I provided feature-comparison checklists was badly out of date, and that trying to update it as I'd done in the past was a lost cause - it would just be obsolete again a day later. So instead, I've put that information on a Web page, where I can update it much more quickly and easily than revising an ebook.

At the moment, this online appendix provides feature comparisons of 90 Mac OS X backup programs (not counting seven enterprise-oriented programs that I mention but don't describe in detail) - and I wouldn't be at all surprised if my list is still incomplete. Think about that for a moment. Nearly 100 different Mac programs that claim to have some type of backup capability. Incredible. To be sure, not all of them meet my criteria for a backup program, which is to say that some of them are incapable of producing either an additive incremental archive or a bootable duplicate - that makes them, essentially, "merely" synchronization programs (useful, just not the same thing as a backup). But still, when I saw that number I was truly astounded.

I'm all in favor of choice, but seriously... Mac users do not need this many backup options! Who has time to sort through them all, test them, figure out which program uses which terminology to mean what, and come up with a meaningful evaluation of what's actually useful? (Yes, I know, that's what I get paid to do, but I was speaking rhetorically.) What we need is a small number of excellent options. And yet, although my list of 90-plus programs includes some that are very good, there isn't a single one to which I'd give a perfect 10-out-of-10 rating, or even 9 out of 10. In my professional judgment, every backup program I've tried has room to improve - in some cases, significant room.

It is by no means my intention to diss all the world's Mac backup software. In fact, I can confidently say that, all things considered, the range of options available today is vastly better than what was available a year or two ago. All I'm saying is, despite the quantitative and qualitative increases we've seen recently, we haven't reached Backup Nirvana yet, and I'd rather see more work on the quality side than a greater number of so-so choices.

**Backups Redux** — Still, what strikes me more than anything else about my revised list of Mac backup programs is how much activity (new programs and updates released) has occurred since the release of Mac OS X 10.5 Leopard. When Apple announced Time Machine, a lot of people worried that it would spell the end of third-party backup software for the Mac. On the contrary, just the opposite seems to have happened. The buzz surrounding Time Machine has helped to educate Mac users about the importance of good backups, and that has increased the interest in backup software generally. Inevitably, some people discover that Time Machine isn't what they need (or isn't all they need) and search for alternatives or supplements, and developers seem happy to jump on that bandwagon.

The people who create backup software are being more creative, too. Previously, I had divided my featurecomparison list into three main sections: programs that create archives, programs that create duplicates, and programs that do both; later on I listed things like synchronization utilities, version control software, and Internet backup services, which were outside the scope of what I considered core backup options. But developers, it seems, have not made it their top priority to preserve the tidiness of my lists. With wanton disregard for my carefully considered classification system and the number of table cells that can reasonably fit on a page, they've added novel features left and right, created programs that intertwingle categories in ways I'd never imagined, and otherwise altered the rules for creating backups. As a result, I've had to do a considerable amount of extra typing, copying, and pasting, with more undoubtedly to come. Thanks a lot, guys!

**Current Trends** – It's still useful to think about archives and duplicates as separate, and essential, backup tasks. But beyond that, the range of ways in which backups can function is becoming much more interesting. I'd like to highlight a few of the recent trends I've noticed:

• Block-level incremental updates. Most backup software copies an entire set of files on its first run, and then on subsequent runs, incrementally updates your backup with just those files that have been added or changed since the last time. However, this can be a problem when the files are quite large (think of the disk images used by virtualization programs like Parallels Desktop and VMware Fusion, or Entourage's database file); because the whole file must be copied every time even a tiny bit changes, backups can take a long time and chew up tons of disk space. The effect is more serious if you're backing up over a slow network, or paying by the gigabyte for online storage. But now, a number of programs (including CrashPlan, MozyHome, and QRecall) can copy just the portions of files that have changed on subsequent runs - what's known as blocklevel updates. These can run much faster than file-level updates, and occupy far less storage space. The downside is that you absolutely, positively must be able to retrieve every single piece of a file, in perfect condition, when the time comes to restore it. If any corruption occurred during

transfer or storage, or if the backup engine is unable to correctly reassemble the pieces for any reason, you could be completely out of luck.

• **Duplicate filtering.** Retrospect has offered this for years, but now more developers are catching on. To save even more time and storage space when creating archives, some backup programs (in general, the same ones that offer block-level incremental updates) check to make sure no data is duplicated at the destination. So, if you have two copies of a file on your computer, it stores just one (but remembers where both copies were). If you back up two or more computers to the same archive, and the same file appears on more than one, again, only one is stored. Some programs take this concept even further, eliminating duplicate data not just at the file level but within files - for example, if you have two files that have a 90 percent overlap in their data, only the different 10 percent of the second one will be stored.

 Schedule-free backups. What I'm now beginning to think of as old-fashioned backup software runs only on a fixed schedule (every morning at 3:00 AM, for example). Increasingly, backup programs do their thing continuously (or at least frequently) in the background, without requiring you to set up anything, and with very little system overhead. Time Machine, of course, runs every hour. CrashPlan Pro can detect when files change and back them up immediately (or after a delay you specify, such as 15 minutes). MozyHome lets you choose automatic backups, scheduled backups, or both. NTI Shadow lets you archive files every time they change, at a fixed interval (such as every 10 minutes), or as infrequently as once a week. Retrospect has a mode (called Backup Server) in which it runs as often as needed. Numerous other programs offer variations on this theme.

• Smarter scanning. When a backup runs, actually copying the files is only part of the process. Before the copying starts, most backup programs scan all the files you want to back up, comparing them with what's already in your archive to see what's changed, how much space will be needed, and so on. That scanning can take a long time, which in turn means the backup itself takes longer. One way to avoid scanning (or at least to speed it up considerably) is to use Leopard's FSEvents (file system events) notification system to determine which files have changed recently without a full, brute-force scan. Time Machine, Synchronize Pro X, and Synkl (Backup, Standard, and Pro editions), for instance, all do this. Other programs, including Super-Duper, scan and copy in a single pass for greater efficiency.

• Hard links. Time Machine makes use of a clever Unix construct called a hard link to make a file (or folder) appear to be in many places at once without each copy taking up lots of space. With hard links, each incremental update can look and act exactly like a full copy of your files, even if only a few changed. Long before Time Machine existed, the command-line tool rsync (and its graphical variant for Mac OS X, RsyncX) could do the same thing. Now other backup

programs, such as Intego's Personal Backup X5, are joining the party too.

 Online sync. Lots of backup programs (including Crash-Plan, MozyHome, and steekUP) can send your data over the Internet to secure servers. But a new breed of programs is starting to combine online backups with multi-computer file synchronization and even online file sharing. Of course, .Mac members have always been able to use an iDisk for online storage and file sharing (albeit without the benefit of an encrypted connection), optionally adding backups using Apple's Backup or another program. Now, though, the landscape is changing even more. DropBox, still in beta testing, syncs local folders to online storage space. You can access your files - including old and deleted versions! from any other computer, using the DropBox software or a Web browser. SugarSync also offers online syncing (prices start at \$4.99 per month for 30 GB), but without storing old and deleted files. However, you could get the same end result by sharing the external disk on which your conventional archives are stored.

**Trends I'd Like to See** – As delighted as I am to see progress and innovation in the world of Mac backup software, I'd like to see still more. In particular, there are a few areas that have received too little attention, and developers of backup software would do well to give them serious consideration.

• Amazon S3 support. Amazon.com's S3 (Simple Storage Service) offers capacious, secure, and reasonably priced online storage - ideal for backups. But Amazon doesn't supply any software. Although a few Mac FTP programs (such as Cyberduck, Interarchy, and Transmit) can access S3 storage space, the only serious option at the moment for backups to S3 is JungleDisk. Not only can JungleDisk mount your S3 storage space as a volume (which, in turn, another backup program could access), it's a full-featured archiving program in its own right. And, with the optional \$1-per-month JungleDisk Plus service, it can even do blocklevel updates and resume interrupted transfers. (A program called Super Flexible File Synchronizer (SFFS), still at beta 1, also supports S3, though I can't yet tell how good it will be as a backup tool.) But whereas JungleDisk supports online backups only, I'd like to have a choice. I'd like to see existing conventional backup software upgraded to let users choose S3 as their destination as easily as they can now choose a hard disk or mounted network server.

• Better metadata support. Almost every Mac backup program can handle common pieces of metadata such as resource forks, file permissions, and Finder labels. But metadata comes in many shapes and sizes. What about access control lists (ACLs), or HFS+ extended attributes? And what about hard links, including those for folders (introduced in Leopard)? More than a dozen varieties of metadata can be set for a given file, and lots of current backup software ignores a good bit of it. The result is that what appears to be a perfect duplicate of your data might in fact be missing some important attributes. I've been using a *Continued on page* 14

### The Evolving World of Mac Backup Software

command-line tool written by Nate Gray called Backup Bouncer to automate the testing of how well various programs handle these many sorts of metadata. Backup Bouncer doesn't yet evaluate every possible type of metadata, and arguably some kinds of metadata it does check are completely irrelevant in terms of backups, but it's still been tremendously helpful to have this automated testing tool. Note that, in response to some feedback I've received, I've recently modified the way my tables present the "scores" for metadata support. A much-less-thanperfect score is not necessarily a cause for concern, though programs with an "A" or "A+" (including, as you might expect, Carbon Copy Cloner and SuperDuper) do merit increased confidence for bootable duplicates.

• Better optical media support. All things being equal, I think it's usually best to back up to a hard disk rather than to a recordable CD or DVD. But optical media can be useful in some situations, such as when you're traveling, or when your budget doesn't permit the purchase of hard drives. Most Mac backup software has only minimal support for optical media - specifically, it usually can't split a backup across more than one disc (pretty important if you have individual files that are too big to fit on a single disc) or record multiple sessions on a given disc (even if there's lots of free space). Retrospect can do both of these things; so can Data Backup 3 (though it supports multisession recording only for CDs, not DVDs). A handful of other programs (including BRU LE, Get Backup, and Personal Backup X5), support disc spanning but not multisession recording. (In some situations, you can work around the lack of multisession support using a 15 euro [about \$23] utility called BurnAgain FS that lets you add data to CD-R, CD-RW, DVD-RW, and DVD+RW discs in the Finder.) I'd love to see much more thorough and pervasive support for optical media in Mac backup software, including, naturally, full compatibility with Blu-ray drives available from FastMac and MCE.

• Better user interface. Whatever you may think of Time Machine's limited customizability or its 3-D outer space animation, it's at least clear that Apple put a great deal of thought into making a very complex process extraordinarily simple to set up and operate. At the other extreme, and without naming names, one of the most recent additions to my list has such an astonishingly complicated user interface, it makes Retrospect look like SuperDuper. The program in question is undeniably very powerful, but getting it to do anything interesting requires many highly unintuitive manual steps that almost make me feel as though I'm programming my own backup software from scratch. Far too often, a program's user interface is a mere afterthought, and in many cases, what you end up with is something that makes sense to engineers but not to ordinary folk. (That's true of all software, of course - not just backup software.)

A good backup program need not look anything like Time Machine or SuperDuper, but as a user, I deeply appreciate any and all efforts to make software self-explanatory and obvious, to provide plain-English explanations and error messages, and to limit the amount of clicking I must do to accomplish simple tasks. Developers, if UI design is not your forte, hire a good designer, and have an outside firm conduct usability tests with, say, your parents as test subjects. You'll be amazed at what you learn. (This goes double for companies with cross-platform Java software, which tends to look pretty bad under Mac OS X.)

• Better logging and feedback. Adam Engst reminded me of another issue that afflicts many otherwise good backup programs. Anyone who's used Time Machine, for example, has probably noticed that sometimes the "Preparing Backup" and "Finishing Backup" stages of each hourly run take an inordinately long time, and that sometimes a lot more data is copied than we have any recollection of changing. Why? What exactly is going on behind the scenes? And when an error occurs, what's the problem, and how can I fix it? Figuring out what your backup software is doing shouldn't require advanced forensic investigation (see Matt Neuburg's "Time Machine Exposed!", 2008-05-08). Backup programs should provide clear, unambiguous feedback as to what they are currently doing (and how long it's expected to take), and log files should be both detailed and easily human-readable.

I have no idea how long my list of Mac backup programs will eventually grow, though I truly hope not to see too many more additions. On the other hand, at the risk of sounding like I'm encouraging feature creep, I also hope very much to see some of the existing programs evolve to be more powerful and flexible under the hood, while at the same time acquiring simpler, more intuitive user interfaces. And developers: bonus points if you can do all this without messing up my tables again!







# November Software Review



### Ripit 1.1.3 http://ripitapp.com/

Requires OS X 10.5. Universal Binary. \$18.99

Rip does one thing really well. It copies DVDs to your computer. Ripit follows the K.I.S.S. (Keep It Really, Really Simple) philosophy. When you launch the program, you find two buttons: Eject and Rip. Sort of takes all of the challenge out of ripping a DVD. There is no list of multiple choice questions. Just slip in the DVD, rip it, and eject it.

The idea behind Ripit is that it is much easer on both the user and the computer to play movies stored on the computer. With disk space being abundant and cheap, this is the way to go.

The stored file can be played on DVD Player. As of this version, that's it; although rumor has it the group is working on a ripper that export to iTunes. Those copies will be able to be copied to iPods and iPhones.

## Apple Updates

## AirPort Extreme Update 2008-004 10/29/2008

System Requirements - OS X 10.5.5

This update is recommended for all Intel-based Macintosh computers running Mac OS 10.5.5 and improves the reliability of AirPort connections including improvements with roaming in large Wi-Fi networks.

### iPhoto 7.1.5

#### 10/27/2008

System Requirements

- OS X 10.4.11 or later
- iPhoto 7.1.4

This update improves the printing quality of books, cards and calendars ordered via the iPhoto printing service.

### Aperture 2.1.2

### 10/20/2008

System Requirements

- OS X 10.4.11 or later
- OS X 10.5.3 or later

The Aperture 2.1.2 update improves the printing quality of books ordered through the Aperture printing service. The update is recommended for all customers using Aperture 2.

## Migration and DVD/CD Sharing Update 10/16/2008

System Requirements

- OS X 10.4.11
- OS X 10.5.5

This update is recommended for all users and provides enhanced customization capabilities and improved performance for migration over FireWire, ethernet, and wireless networks

### MacBook, MacBook Pro Software Update 1.2 10/14/2008

System Requirements - OS X 10.5.5

This update contains software bug fixes for precision aluminum unibody enclosure MacBook and MacBook Pro notebook computers introduced in October 2008.

The update improves compatibility with external displays and includes a variety of software fixes. This update is recommended for all users of these systems.

## Security Update 2008-007 Client (PPC) 10/09/2008

System Requirements - OS X 10.4.11 Tiger

## Security Update 2008-007 Client (Intel) 10/09/2008

System Requirements - OS X 10.4.11 Tiger

## Security Update 2008-007 Server (Leopard) 10/09/2008

System Requirements - Mac OS 10.5.5

## Security Update 2008-007 Client (Leopard) 10/09/2008

System Requirements - OS X 10.5.5

Security Update 2008-007 is recommended for all users and improves the security of OS X. Previous security updates have been incorporated into this security update.

# Mac 911

### Troubleshooting Parental Controls

Flip to page 69 in the November issue of Macworld and you'll find The Kid-Safe Mac, a parent's guide for setting up OS X. Portions of that feature — Leopard's Parental Controls and Beyond Parental Controls — have recently appeared on Macworld. com. We've received a measure of feedback on those portions along the lines of "Parental Controls is terribly, horribly, broken!"

To which I reply, "Maybe. Maybe not."

I'd like to address those Maybe Nots now.

### Check the log

One concerned parent complained that his child couldn't access Gmail's webmail when, under Website Restrictions in the Content tab, he'd enabled the Try to Limit Access to Adult Websites Automatically option. Even though he'd added gmail.com as an exception, he encountered an error when attempting to access Gmail via Safari.

The issue here is that Parental Controls is getting hung up because of an address redirect. Safari doesn't go directly to www.gmail.com but rather to a Google page that redirects to gmail.com. This particular page hasn't been added as an exception and Parental Controls is careful about redirects — choosing to err on the side of safety by preventing the website from loading rather than loading it and hoping it doesn't contain inappropriate content.

So the trick here — and with any case where Parental Controls appears to capriciously deny access to a website — is for the person administering the Mac's Parental Controls to check the log files and make sure they're adding the proper addresses as exceptions. To do this, click Logs in Parental Controls and then click Websites Visited. In the Logs pane to the right you'll see a list of sites that were visited with the account set up under Parental Controls. In this case, tick the triangle next to Google, select an entry, and click the Open button. Safari launches and you see the site that was visited. You're looking for the page that redirects to Gmail. In my case that address began with http:// www. google.com/coop/cse.

This is the address you want to add as an exception. Once you do, you should be able to gain access to the page it redirects to. (You may also have to add the eventual destination page as an exception.)

(By way of sticking my nose where it may not belong, I'm not sure I see a really good reason to allow a child to have

access to webmail if you're concerned about inappropriate content. If you're going to the trouble to set up Parental Controls for your child, create a POP account for your kid and take advantage of Parental Controls' Mail restrictions.)

### Let applications run

Others have reported that even when you've allowed certain applications to run, they won't. This can happen for a couple of reasons.

The first is that some applications need to get their house in order before they can run. And that means that you have to launch them at least once in an unrestricted environment within that account before you impose Parental Controls. So, switch off Parental Controls for the account you eventually wish to control, switch to that account, and launch all the applications you're going to allow that account to use. Log out of that account, return to the administrator's account, and set up Parental Controls.

Another possibility is that the application you want to run requires a background application or outside resource the user doesn't have access to. For example, Microsoft Office applications rely on other Microsoft applications to do their job. If you haven't allowed those other applications, Word or Excel may not be able to launch. (Fortunately Parental Controls will often throw up a dialog box telling you that such and such an application hasn't been allowed and needs to be in order for things to move forward.)

#### The Think system

I'm not suggesting that Parental Controls is without quirks. At the very least it could be smarter about telling you why some action was disallowed. But before damning it as a hunk of buggy code, step back for a second and try to think about what it's doing. If it won't do something you believe it should, it's likely because it doesn't have something it needs — as I've explained above, a correct web address or resource that you haven't allowed, for example.

#### Upgrading a MacBook Pro's hard drive

I am currently using a 15" Macbook Pro 2.33GHz and I've run out of hard drive space. I came across this article at Macworld, and will attempt to swap my hard drive, following the iFixit guide. My question is, for my laptop model, is there a maximum capacity of hard drive that it can take? Would I be able to put in say, a 320GB or 500GB hard drive?

Yes. Currently your MacBook Pro (which is the same model I have) will hold up to a 500GB hard drive, but that's not

a hard limit. If someone can make a hard drive of a larger capacity that fits in your MacBook, you could use it.

The iFixit guide is very good as is the article penned by Dan Frakes that you mentioned. Allow me to suggest one other resource. OWC offers free installation videos for a variety of Macs, including your MacBook Pro. It's worth taking a look if you find it easier to learn from a video than text.

While you're on the OWC site, have a gander at its Upgrade Center page. Here you can select the model Mac you own and, by clicking through a couple of links, find any OWC upgrades available for that model. You certainly don't have to purchase from OWC, but it's nice to know just how far you can take your Mac.

### Document switching shortcuts

Reader David Utts has recently emigrated from the Land of Windows and poses a question about Macintosh windows management. He writes:

I have a hard time moving between open Microsoft Word documents on my new Mac. In the Windows environment I am used to going between open documents with a keyboard command. Can you offer any suggestions for more easily switching between documents?

Sure. Start by memorizing this keyboard shortcut: Command-` (that's the Tilde key next to the 1 key at the top of the keyboard). This is a universal Macintosh shortcut for moving through open windows within an application or the Finder. Just hold down the Command key and bang the Tilde key each time you want to move to another open document. Press Shift-Command-` and you'll move in the opposite direction through those open windows.

Or you can use your mouse. Word lists all open documents in its Window menu. Regrettably, it doesn't assign keyboard shortcuts to these open documents as does a program like Bare Bones Software's BBEdit. Still, you'll find them listed in this menu so feel free to mouse up and choose the one you want.

Or you can click and hold on the Word icon in the Dock. Do so and at the top of the contextual menu that appears you'll see a list of all the open documents. Choose the one you like and it becomes the active document.

Finally, locate the F10 key on your Mac's keyboard and give it a press (or Fn-F10 on a laptop). This invokes Exposé's Application Windows function, a handy feature that exposes all of an application's open documents (except for those you've minimized). To select a different document, just drag the cursor over the window you want. Its name will appear when the cursor moves over it. Let go of F10 and the document you were hovering over will come to the fore.

This feature is so useful that I've assigned my mouse's scroll button to invoke it. You can make that kind of assignment in the Exposé & Spaces system preference.

[Macworld Senior Editor Christopher Breen is the author of Secrets of the iPod and iTunes, fifth edition, and The iPod and iTunes Pocket Guide (both Peachpit Press, 2005).

Find Chris' books at www.amazon.com and www.peachpit.com. Get special user group pricing on Macworld Magazine! Subscribe today at http:// www.macworld.com/useroffer

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