

# MOTHERBOARD

A Publication of the Computer Users Group Of Redding, CA

Volume 2014, Number 04

<http://cugr.apcug.org/>

April 2014

## YOUR C.U.G.R. PRESENTS

4th Monday, April 21, 2014, 4 - 6 PM

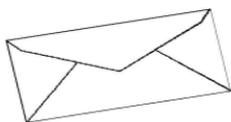
Note Change Of Day and Date This Month!

**President Ed Beaulac will show how to make a photo album using the various on-line sites and program features. Also what the companies charge, quality, time it takes, and your participation in the project.**



### Door Prizes

1. \$30 Cash Prize!
2. \$15 Cash Prize!



One free ticket to each member at the door!

### 4 pm Social & Business & 4:30 Presentation

Social time & club updates. 4:30 Presentation

Sign in at the Greeting Table and pick up your name tag and please leave it in the Tag Box when you leave. Also please stay and help reset the tables to the Library's original arrangement.

**Note: This month the General Meeting is on Monday, April 21 at 4 pm to 6 pm.**

May 27 General Meeting

Frank Tona Of Crown Camera

will speak of photo tricks & contests in Redding.



### CUGR Calendar

**CUGR Board Meeting**  
1 PM Tuesday, April 29, 2014  
at Redding Library in the  
Foundation Reading Room

#### MULTI-MEDIA

10 AM, Saturday, April 26

Jane Quinn SIG Leader  
Digital Devices, usage of  
free software for Movie  
Creation, Photo Projects,  
Music Projects, and Social  
Networking,  
and more.

See back page  
for more SIG information

**GENERAL MEETINGS ARE  
at the Redding Library**  
1100 Parkview Ave,  
off Cypress.

**OFFICIAL WEBSITE IS**  
<http://cugr.apcug.org/>

For more information  
call any Board member  
listed on Page 2.

### In This Issue ...

<b>PRESIDENT'S MESSAGE</b> Ed Beaulac .....	2
<b>MARCH MEETING</b> CUGR.....	3
<b>IN MEMORY OF LARRY OWINGS</b> Judi Ball .....	4
<b>BITS AND PIECES</b> Rush Blodgett.....	5
<b>EDITOR'S CORNER</b> Judi Ball .....	5
<b>PROTECT YOUR INFORMATION</b> Internet Protection Guide .....	5
<b>MULTI-MEDIA SIG UPDATE</b> Jane Quinn.....	6
<b>\$50/50\$ CASH RAFFLE</b> Jane Quinn.....	6
<b>10 WAYS YOUR SMARTPHONE CAMERA...</b> Guy McDowell.....	7
<b>I/O, I/O, IT'S OFF TO WORK WE GO</b> Phil Sorrentino.....	8
<b>STORAGE MEDIA, INTERFACES, BACKUPS</b> Anne Moss .....	9
<b>MY LIFE WITH DEVICES</b> Nancy DeMarte .....	10
<b>INTERESTING INTERNET FINDS</b> Steve Costello.....	10
<b>EDITOR'S NOTE TO SMARTPHONE</b> Judi Ball .....	11

Members volunteering  
to help members!

## Club Information <http://cugr.apcug.org/>

Club Website:

### Club Mentors & Sponsors

**New Users** ..... **Bob Rice**  
357-2143, ..... Anytime  
..... ricerl@snowcrest.net  
**MS Windows** ..... **Darold Wright**  
**Photo Delux** ..... 222-1781  
daroldwright@yahoo.com  
**New Users** ..... **Fred Skill**  
**Free Library PC Classes** ..... 243-3557  
**Spread Sheets** ..... Sfskill@shasta.com  
**MS Windows** ..... **Bill Ball**  
**Hardware, Software** ..... 275-4632  
**98, ME, XP, Vista, 7...** bcard9@charter.net

**DTP** ..... **Judi Ball**  
**Graphic Prgs** ..... 275-4632  
**Photo Editing** ..... jebed@charter.net  
**MS Word, PowerPoint, ..... Jane Quinn**  
**Movie Maker 2, DVD Prgs.** ..... 365-0825  
**Digital Image Pro** ... qjquinn@charter.net

### Sponsors

**Electronic Recycling For Charitable Situations:**  
**Darold Wright**  
3300 Veda Street, Rdg. 245-0500

### Board of Officers and Directors

**Ed Beaulac** ..... **President.**  
edbeaulac@gmail.com ..... 222-4654  
**Richard Marx** ..... **Vice President**  
rmarx4344@gmail.com ..... 365-7773  
**Belva Sullivent** ..... **Past President**  
belvas@charter.net ..... 241-9926  
**Fred Skill** ..... **Past President, Dir.**  
fskill@shasta.com ..... 524-0774  
**Mario Quinn** ..... **Treasurer**  
gaucho7427@msn.com ..... 365-0825  
**Jeanie Richardson** ..... **Secretary, Dir.**  
Jeanier1954@ATT.net ..... 347-5839  
**Jan Brockett** ..... **Membership, Dir.**  
jbrockett444@yahoo.com ..... 246-4721  
**Anna Lee Horton** ..... **Mail Manager, Dir.**  
alhorton@sbcglobal.net ..... 222-5521

**Jane Quinn** ..... **SIG Lder, Vendor, Dir.**  
qjquinn7427@gmail.com ..... 365-0825  
**Bill Ball** ..... **Dir.**  
bcard9@charter.net ..... 275-4632  
**Judi Ball** ..... **Editor, Dir.**  
jebed@charter.net ..... 275-4632  
**Lyle VanNorman** ..... **Dir.**  
bbcreelmx@yahoo.com ..... 242-0925  
**Margaret Martinovich** ..... **Dir.**  
mjmartin56@sbcglobal.net ..... 241-6378  
**Colly Lord** ..... **Website Manager**  
johnclord@charter.net ..... 224-1633  
**Ginny Wall** ..... **Name Tag Manager**  
Tootseylou@aol.com ..... 547-5104

### Motherboard Newsletter Staff

**Judith E. Ball** ..... **Editor**  
jebed@charter.net ..... 275-4632  
**Rush Blodget** ..... **Bits And Pieces**  
rblodget2@yahoo.com ..... 241-4754

**Mary Montague** ..... **Proofreader**  
mcmontague228@gmail.com ..... 338-2405  
**Anna Lee Horton** ..... **Proofreader**  
alhorton@sbcglobal.net ..... 222-5521

### Motherboard Newsletter Policies and Deadlines

The *Motherboard* newsletter is published monthly by the Computer Users Group of Redding, PO Box 494778, Redding, CA 96049-4778. The CUG is a 501(c)(3) non-profit corporation. Subscriptions are included in the \$25 annual membership fee. The purpose of the newsletter is to inform members of upcoming events and provide information about the use of IBM compatible computers.

**Disclaimer:** Neither the CUG, its Officers, the Editor, nor the newsletter contributors assume any liability for damages incurred due to the use of information provided in this publication.

**Reprints:** Articles from this newsletter may be reprinted by other user groups if credit is given to both the author, CUG and the *Motherboard*. Mail a copy of the newsletter where the article is reprinted

to the Editor at the address in the first paragraph of this text.

#### Personal Ads For Members:

Requirements are:

1. Advertiser must be a member.
2. The item must be computer-related.
3. The ad must be received by editor J. Ball by the *monthly date of the board meeting*. Sorry, no exceptions.

Other terms must be approved by the club's Board of Officers and Directors.

**Article Submissions:** All articles and reviews must be submitted to J. Ball by the *Monday of the monthly Board meeting* (see Page 1 for date.) Sorry, no exceptions.

**Motherboard Editor** reserves the right to make corrections and deletions in all articles in the interest of grammar, style, and space.

## President's Message

I imagine we have all seen those articles in the AARP magazines and elsewhere about seniors needing to use mind-expanding games and mental exercises to keep their brains working and not getting "rusty." Well, I believe that if you have a computer and use it often, the darn thing will keep your mind active. I'm not sure what it will do for your emotional life.



Take for example, the simple act of installing a new printer for the computer. It used to be such an easy thing. Just slap the CD into the computer, and there you were. Well, it does not seem to be so easy these days. My previous HP Photosmart Printer just bit the dust. It would not take a new factory inkjet cartridge, and was making all kinds of strange noises, like plastic gears grinding. So I replaced it with a HP Officejet.

I installed the new printer, printed a test page, and all looked just fine. I then went on Google Chrome and opened my gmail account. I was unable to print an email. Mind you, it was no problem with the previous printer. After all efforts to fix the problem failed, I asked my neighbor for help. He's a very smart guy when it comes to computers. He came over and was unable to make it print the email. He went on the Blog Site for gmail and he found a number of others had the exact same problem.

He had me open Internet Explorer (IE), then open my gmail account from IE, and low and behold, I was able to print the email in question. Now how strange is that?



The next day, I installed the HP software on my laptop computer, an old hand-me-down from my daughter.

I was able to communicate with the printer wirelessly and print a test page with no problem.

Continued on Page 4

# March Meeting



Tickets! Tickets! Get Your Tickets Here!

Fun social time before and during the meeting.



Smart Phone Round-Table Discussion For This Meeting.



## Congratulations To Our Winners!



Jeanie  
Richardson  
Won the  
\$30  
Cash Prize



Bill Ball  
Won the  
\$15  
Cash Prize



Welcome Renewals  
 Dean & Diana  
 Ellison  
 Gordon Dawson  
 Jan Brockett

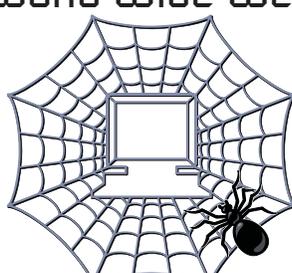
**PRESIDENT'S MESSAGE**

*Continued From Page 2*

Then, I opened Chrome on the laptop, opened my gmail, and was able to print the email in question. Mind you, both my desktop and laptop computers use the Vista Operating System (yes, you can live without Windows 7 or 8). Why did one computer print and not the other? Big mystery. I even set up the desktop to print wirelessly. Still no luck. I'll let you know if I solve this riddle. If anyone has a solution, please let me know. In the meantime, I use IE to print. You would think Google with all the money they have could fix this problem. I tried to send Google an email but as far as I could tell, they are hiding their email address. I can see why.

Ed Beaulac

WWW  
 World Wide Web



Something to ponder as the worldly internet webbing continues to close in around us.

**CUGR  
 MEMBER WEBSITES**

**MEXICAN-TOURS**  
[www.mexican-tours.com](http://www.mexican-tours.com)  
 Lyle VanNorman  
 bbcreelmx@yahoo.com

**Publicize Your Website  
 Here for FREE!**  
*(Members Only Please)*



*In Memory Of  
 Larry Owings*

*July 13, 1936 - March 24, 2014*

Larry, 77, suffered several years with cancerous tumors in his sinuses and other places about his face, until this past year when the cancer became too invasive and he died after a month-long stay in the hospital. His memorial was on May 3, and he was buried at the Veteran's Cemetery in Igo.

He is survived by his wife, Esther, their son, and two daughters.

Larry served 20 years in the Navy and retired as First Class Aviation Boatswain Mate. Larry's job was one of the most dangerous job in the Navy. He directed planes on takeoff and landing on aircraft carrier decks and he served on several such ships.

After retiring from the Navy, Larry worked for Livermore Laboratories for another 20 years.

He and Esther moved to Redding with their family in 1995. And here he belonged to the Mustang Club and owned a 1966 Mustang, which he cruised in during all of the old car events, such as Cool April Nights.

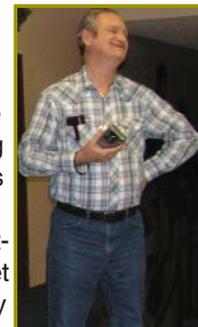
Larry also made model ships. He was very detailed and precise in his ship replicas and has many beautifully finished models of schooners, ect.

He belonged to our club for many years, attended all the meetings he could, and belonged to two SIGs for years, participating and using many techniques from the classes. One project in particular in my DTP class was the Microsoft PowerPoint Presentation he was making of his and his family's life. If he hadn't become sick, he would have eventually produced a DVD video that he could have shown Esther, their children, and friends through a television set. We in class very much enjoyed watching the photos and storyline come together page by page, and was sorry not to see it finished. He made the storyline humorous with cartoon graphics and included music like *Anchors Away* when he showed the photo of his new Navy uniform in the 1950s, and Elvis' *Hawaiian Wedding Song* for his and Esther's wedding photo.

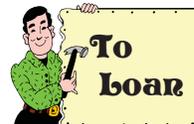
Larry was always generous with our club, and there was a time when Anna Lee was unable to take the photos for a club meeting for our newsletter and so Larry volunteered and Bill Ball got this photo of him laughing about being caught on another photo.

During the past few years Larry was very involved with the Veteran's museum at the Redding Airport. He was on the board and set up many of the exhibits. Sadly the museum is closed, but hopefully it will reopen in the future.

Larry was a great guy and will be missed by so many as well as those of us who knew him in the club.



**Member's Personal Ad Space**



**NECESSARY NEWSLETTER INSTRUCTIONS:**

Having an ad space for something you would like to sell, borrow, loan, give away, etc. will be available to all members.

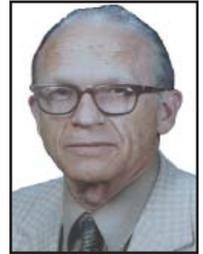
The article about your item(s) must be in file (txt or doc) form sent to the editor via email, (nothing hardcopy will be accepted).

All pictures must be jpg format and enough resolution (180 - 200 dpi) to be seen clearly in the newsletter. No thumbnail pics.

It must be received by the editor no later than the first Monday of any month in order to be placed in the newsletter in time for that month's issue. jebed@charter.net.

# Bits And Pieces

by Rush Blodget; IMB/PCUG of Redding, [rmaxtwo@charter.net](mailto:rmaxtwo@charter.net)



## CYBERCRIME AND CYBERSECURITY

Professor Paul Rosenzweig, J.D. a former deputy assistant secretary of Homeland Security, has written several books on cybercrime and its consequences. He states that it is almost impossible to detect because of the nature of the internet and the difficulty in identifying the source and the perpetrators. He says that China, and island nations, like Australia and New Zealand, have been able to restrict attacks better than Germany, France, and the United States because of the many access points in the latter countries and the fact that China has only three main underwater cables — Australia and New Zealand have limited access by cable.

He states that we still do not have a good defense against cyber-attack. The attacks are divided into the following categories:

### DISTRIBUTED DENIAL OF SERVICE ATTACK (DDoS ATTACK)

This type of attack is a direct frontal attack on the internet in which the attacker floods a website with a great bandwidth of attack software so that the site attacked cannot function. A DDoS attack is aided by a network of helpers who download a program known as a Low Orbit Ion Canon (LOIC). The attacker enters the web address of the server to be attacked and pushes start and the website will be

flooded with requests to connect.

Many such attacks are carried out by botnets, which is short for robot network, a network of controlled computers. Botnets rely on robot computers innocently infected with the malware that awaits commands from the controlling site. The controlling site may send out a command to attack a certain site at a given hour — at that time, the site will be flooded with logon attempts.

Scammers use botnets to send out their data to email addresses that have been harvested by automated programs called “web crawlers” or “spiders.” A botnet can vary in size up to tens of thousands of computers sending out spam constantly.

A Trojan is a piece of code that looks like an innocent piece of software, but contains a malicious code that can be implanted in one’s computer.

Attacks usually begin targeting a specific individual or recipient with a simple email; this is called “spear-phishing.” These e-mails look innocent enough but they are quite malicious. When the email or its attachment is opened or when the recipient clicks on the attachment, it opens up to download a controller program which in turn allows outside individuals to access the programs that control the targeted individuals system. Some of the attacks create access to all available data, or they may just remove all the financial data and log in codes for use later.

## ADVANCED PERSISTENT THREAT OR AN APT

This type of malware takes up residence in the computer and makes the computer available to continuous monitoring from the hackers. Most commonly they turn on a downloaded key logger to capture the key strokes from the keyboard to record the individual’s account or brokerage account passwords.

Mr. Rosenzweig states that there is still another type of dangerous malware called a logic bomb that remains undetectable in a computer until a set time in the future when it takes action. A security analyst stated that we don’t really know if there are logic bombs in our networks and there is no way to find out.

## ZERO DAY MALWARE

This is a newly developed piece of malware that the developer knows will work, but it has never been used, so no patch or defense has been developed against it. It is called zero day because there is zero time between its use and the time available to develop a defense.

I am sure that I have some malware in my computer despite a complete scan nightly with a top of the line anti-viral and anti-malware program.

## Editor’s Corner

Bill and I are driving to Fort Lauderdale, Florida then on to Ohio and relatives, before heading back home between the middle of May to about the middle of June, so I will not be able to do a newsletter for the months of June and July. Therefore I am going to submit a May, June, and July Motherboard issue in May.

Anna Lee Horton will then put out a reminder (as she always does) each month for the club meeting and the date. So please keep this May issue handy and an extra eye out for Anna Lee’s email club postings.

We will be back in time for the July Ice Cream Social.

Judi Ball

## Protect Your Information

*Internet Protection Guide*

Protect yourself. Internet scams are all too common these days – don’t jeopardize your security. Please follow these simple guidelines to minimize your risk.

- “Phishing” is the use of fraudulent emails, copy-cat websites, or pop-ups to trick you into revealing personal information — such as account numbers, credit accounts, and social security numbers. Legitimate companies don’t ask for this information via email – don’t supply it. To make sure you’re on the website you want, look at the URL to verify it’s the correct one; beware of potentially confusing or misleading site identifications, such as subtle misspellings in the URL.
- Report it — If you suspect you have received a phishing email, DON’T re-

spond to it. Simply forward the email to us at [abuse@walmart.com](mailto:abuse@walmart.com). To help us investigate, please don’t cut and paste the email, change the subject line, or forward it as an attachment. You can also report it to Homeland Security at [phishing-report@us-cert.gov](mailto:phishing-report@us-cert.gov), or to the FTC at [www.ftccomplaintassistant.gov](http://www.ftccomplaintassistant.gov) if you think you’ve been a victim.

- Security software packages (with anti-virus, anti-spam, and spyware detection) are useful for those who engage in online financial transactions. Look for encryption via Secure Sockets Layer (SSL) technology, commonly shown by a closed padlock in the lower right corner of your screen. Do not click on links or attachments unless you trust the source.

# Multi-Media SIG UpDate

by SIG Leader Jane Quinn, [jqquinn7427@gmail.com](mailto:jqquinn7427@gmail.com)



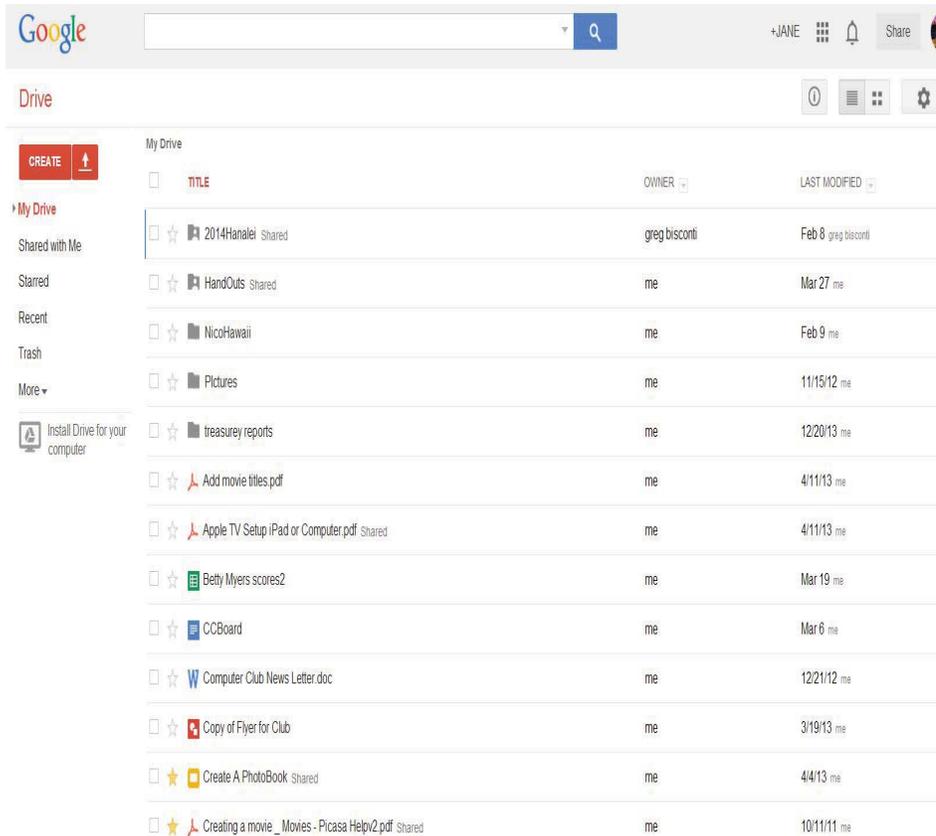
Thursdays, 1-3 pm, you're invited to join us at the Senior Center in Anderson for a computer session in the classroom. For special projects I will give individual help at 3 pm. Contact me before to ensure I set aside time to devote to your project. *You can also connect to the classroom at high speed internet through SKYPE. ID is AAASCO2009.*

*Our next monthly Multi-Media SIG is Saturday, April 26, 10 AM to Noon. For directions contact me via e-mail above or phone, 365-0825.*

This month our SIG group is studying Cloud Software. Ironically, it's the same time period Microsoft has just launched Office (\$99 yearly fee ) for the iPad that has a similar feature as the Google Drive we're learning. Google Drive is FREE. You can create documents, spreadsheets, presentations, etc., for no cost.

There are some areas I have read that MS Office for the iPad and Tablet fall behind Google Drive, such as collaborating. I have used this feature to collaborate with colleagues. And I find it so effective. During class we successfully started up-

loading Documents and learning which features are best to use in the Cloud. For example, through my own efforts I have learned to upload a PDF file as is. And not to allow Google Drive to alter them to Google type documents. Because Google Drive does some strange things. In particular, to imbedded pictures. And I have stayed away from the Drive software that was installed when I activated Google Drive, because I also found it useless to have a duplicate version on my hard drive when I am certain it's safely in the Cloud and I can access it.



I want to sing some praises about our club member Fred Skills. I'm so grateful he's a member of our club. Recently I was handed a large project that requires one to use a spreadsheet. In this instance, I needed more than summaries, I needed it to behave similar to a database program. I needed data from

one sheet to flow to another just by reference. It's been YEARS since I've needed to use a spreadsheet with complicated formulas and reporting. So asking a few questions, Fred promptly responded with a model for me to start with. He saved me so much time! Just wanted to note one of the special benefits to belonging

## \$\$ 50/50 \$\$ Cash Raffle! This is The Next CUGR Drawing On April 21

"50-50 Raffle" stands for whatever cash is raised. The winner will get half of the cash!

Tickets will sell for \$5 each, or 3 tickets for \$10. And you need not be present to win. So be certain that you print your name and phone number on the part of the ticket(s) that Jane will use for the drawing.

Tickets may be bought during the April meeting up to the time of the drawing, or during any of Jane Quinn's classes, or by mailing a check to Jane Quinn. If you mail the money to her, she will assign a ticket(s) and hold it for you until the drawing on April 21, 2014.

[jqquinn7427@gmail.com](mailto:jqquinn7427@gmail.com)  
phone: 365-0825

*(By the way, the Quinns are not participating in the drawing.)*

**Good luck to all!**

to such a special group as ours. We have many people who gladly give up their knowledge and time to help out. I just love being a part of this club.

Here's another tease to make you attend Thursday's class in Anderson. We can show you how to re-organize any picture folder in your desktop with the free version of Picasa. So if you suffer from having pictures out of order, and want them to be re-arranged so you can quickly launch a Slide-Show, come to class, I'll show you how. See you there.

April 26th is the next Saturday SIG. Hope to see you at our house from 10 am to noon also.

# 10 Ways Your Smartphone Camera Can Make Life Easier

by Guy McDowell, Writer, MakeUseOf.Com, February 22, 2013,

<http://www.makeuseof.com/tag/10-ways-your-smartphone-camera-can-make-life-easier/http://goo.gl/LB6u1>



"Does your phone have a camera on it?" said no one since 2005. Nobody even asks how many megapixels your phone's camera has anymore. With the ubiquity of smartphones today and the resolution of the cameras they have in them, why does anyone even sell a point-and-shoot digital camera anymore? All you need is a decent smartphone to take your vacation pictures and click a button to upload them to Facebook, Pinterest, Tumblr, wherever.

## 1. TAKE A PICTURE OF YOUR KIDS

Yes, those of us blessed with the fun-sized versions of ourselves take pictures of our kids constantly. We do this so we can see them grow, and remember those moments that we seem to only cherish after the fact. Those pictures are almost priceless.

However, it is your children that are priceless. If you are going to a big outing, perhaps an amusement park, or even the mall, take a picture of them. Don't say you did this in case they get lost or abducted — that would just create unnecessary fear. Take the photo as if you were just capturing the moment they arrived at your recreation destination. Now you have a photo of exactly how they look and what they are wearing on that day. Even if they should just happen to wander to the toy section in the store, you can share that photo with store workers or security guards to help find them. This tip alone will make your life easier and less stressful.

## 2. WHERE DID THESE COME FROM?

If you need to take something apart to try to repair it, use your phone camera to take a picture of the item BEFORE you get after it with a butter knife. Take pictures at every stage of the disassembly. Now you have something to guide your reassembly efforts and jog your memory as to where each part belongs. Plus, should you feel the desire to share your handiness on the Internet, you have documentation of what you did. You never know, you might be the first person to find an easy way to fix something and help someone else.

## 3. WHY I WAS LATE FOR WORK

Recently, where I live was hit by a winter storm named Nemo. Which was a good name for it, because after all the snow fell and the winds drifted

over anything that stood still, you would have a hard time finding anything. Our one car sat through the storm, dutifully waiting to be driven until today. When I went out to the car, I knew I would have to shovel around it and maybe put some traction sand down. That went all fine and dandy, but backing out over the rest of the driveway proved difficult. The car slid on the ice and ended up in a bit of a snow bank. So, I took pictures. Yes, that's my car in the picture. I got to work on time, but had someone questioned me, I could show them what I was up against.

## 4. CAN YOU TELL ME WHAT YOUR COMPUTER IS DOING?

Many of us are familiar with the Print Screen button and using screen capture software, and may have even used them to document a computer issue. Those tools are fine for systems that are functioning properly. Then there are those systems that just won't let you do anything. Take a picture of the screen and e-mail it from your smartphone to whoever is trying to help you with your computer. Instantly, they will see what you see. (Yes, that's my computer screen.) With that information, the rate at which they can fix the problem has just increased rapidly. This tip applies to just about any malfunctioning device really.

## 5. NICE LAYOUT. TOO BAD ABOUT THE LIGHTING.

If you're a budding photographer, use your phone to take pictures of potential subjects at different times during the day, or even the year. Take pictures of your subject from different angles and different distances or viewpoints. This will help you to understand how the natural lighting and environment affects your subject.

## 6. BUT MARK AND SPENCER HAS THIS ITEM FOR 5P LESS!

People are finally getting a little smarter about their shopping habits and not willing to just pay whatever the store wants. Your smartphone camera can go a long way in helping you to negotiate a lesser price. Of course, there are the fancy apps that allow you to use the camera to scan barcodes or QR codes and compare prices at different retailers. Unfortunately, those only work on items with codes that actually have in-

formation in the application's database. But if you can take a picture of the item showing its price, you now have proof you can use with that store's competitor to get the price that you want.

## 7. WHAT WAS THE PHONE NUMBER FOR THAT CAR FOR SALE?

Most people buy used cars, and many buy them from someone who just wants to sell his car. So when you're out and about looking at cars, take pictures of it with the cellphone. Take pictures of the 'for sale' sign so you have the name and number to call and any other information written on it. Take pictures of as much of the car as you can including dents and dings. That will help you in negotiations. You might come to a tentative deal on the phone, then show up later and the car has a new ding. Now you can prove that it does and push lower.

## 8. IT WASN'T LIKE THAT WHEN I SENT IT

Recently we shipped a friend's car out west. The shippers broke the spoiler on the car. Had we thought to take a picture of the car before they loaded it, we could have made our friend's life easier. They could have easily shown that the car was fine before it went on the truck. This little trick can apply to ANYTHING that you ship. As another example, some manufacturers now take pictures of each shipment before it goes out the door. You can see the waybill, bill of goods and the items in the shipment. This protects them, and you, from things going missing.

## 9. IBID

Are you a college or university student? Are you doing lots of research in the reserved or special collections? Whip out the cell phone, take pictures of the relevant pages as well as the ISBN, Cover and the Library of Congress Cataloging-in-Publication page. Now you can use that information to properly annotate and document your research, at your leisure. The book called, "Wireless Networking in the Developing World" is a good read, look it up. Man, I wish I had had that when I was in school. Back then photocopies were sometimes as much as 50 cents a piece and you can't photocopy a lot of the ancient texts that I used.

*Continued on Page 11*

# I/O, I/O, It's Off To Work We Go

by Phil Sorrentino, Past President, Sarasota PCUG, Florida, Nov. 2013 issue, PC Monitor, [www.spcug.org](http://www.spcug.org), [philsorr \(at\) yahoo.com](mailto:philsorr@yahoo.com)

The work I'm talking about here is computer data transfer. I/O or Input/Output is a term used to collect all the ways you can move data into and/or out of a computer. (This may be a review for some, but there are a few new ideas that might make it worth the time.) For all of those that have been with computers from the beginning, circa 1980, the only way into or out of your computer, then, was through the serial and parallel ports (the keyboard, mouse, and display interfaces were really internal and were only used for their intended purposes). Fortunately, the serial and parallel interfaces have been replaced with interfaces that are much faster and much more flexible and easier to use. Today, most of the I/O is conducted over the Universal Serial Bus (USB) interface. However, there are a few special purpose interfaces that have become basic to computer use.

Early on, audio was included in the computer's bag of tricks so we now typically have an audio-in for a microphone and an audio-out for speakers. Many computers also have another audio-in, usually tagged as line-in. Audio-out is typically used to drive external speakers and line-in is typically used to input a stereo analog signal for use by audio processing software. Also added early on was an Ethernet connection which has become the computers on-ramp to the Internet. Yes, and Wi-Fi (Wireless-Fidelity) has certainly become the mechanism for all, laptops, netbooks, tablets, and smartphones to get on to the Internet. Wi-Fi is a wireless I/O and therefore needs no connectors or wires. It is all accomplished by the transmitter and receiver hardware and software, within the computer. There are two other wireless interfaces, Bluetooth and NFC. Bluetooth is becoming very popular as a way to easily connect various Bluetooth compatible devices to the computer with no wires cluttering up the computer area. Bluetooth sets up a PAN (Personal Area Network) around the computer, usually within 10 meters. Bluetooth is also finding its way into many places like the living room entertainment center and the automobile. NFC (Near Field Communications) is a very short range (less than 4 inches) wireless interface that may or may not be used on a computer but will

probably be used with smartphones to help make the electronic wallet possible in the future.

Not so early on, around the time laptops became portable, rather than luggable, a video display output port started to appear. This became the very popular VGA (Video Graphics Array) output port (a.k.a. the RGB port because it provided Red, Green, and Blue analog video signals). The VGA port was typically used with an external display device like a larger display or a projector. For a brief time, the DVI (Digital Video Interface) began to take over the job of moving digital video information from the computer to an external display device, but it was soon overtaken by a more comprehensive and versatile interface. Today, the VGA and the DVI port, is being replaced by a digital multi-media port, the HDMI (High-Definition Multimedia Interface) port. The HDMI port carries both digital video and digital audio signals from the computer to a digital display device. (HDMI is also used in most new digital entertainment centers and digital televisions. Many new digital TVs even provide multiple HDMI input ports, so you can connect cable boxes and DVD players to the TV.) HDMI is also being used on small devices such as smartphones and camcorders and as such is being made available in mini and micro sizes.

So besides audio and video, most of the digital data that is transferred to and from the computer is done via the USB ports. Modern computers usually have multiple USB connectors (laptops maybe 2 to 4, and desktops may have 2 to many). The USB port is a rectangular plug that is keyed so you cannot plug the connector in incorrectly. The USB connector also provides a limited amount of power to the device connected to it, which can be used to charge a battery or even power the device. Because the USB connector provides power to the connecting device, many smartphones and media players charge their batteries through the USB connector. Currently USB is at version 3.0. (Early versions were 1.0 which was little used, 1.1 which was very popular but slow at only 12 Mbps, and 2.0 which was ubiquitous, and fast at up to 480 Mbps.) USB 3.0 devices began to appear in

January 2010. USB 3.0 has a maximum data rate of 5 Gbps. Yes that's 5 thousand Mega bits per second. That is a maximum and most data transfers will probably not be near 5 Gbps, but they will be very fast. Fortunately, USB 3.0 is backward compatible with both 1.1 and 2.0. Backward compatibility means that devices at any USB version can operate together, although the data transfer will only be at the speed of the lowest USB version. USB 3.0 connectors usually have a blue center post to identify them as 3.0. Because USB is used on so many small devices, like smartphones and tablets, USB connectors come in Mini and Micro sizes. USB has become so fast and ubiquitous that it has just about eclipsed the other, almost popular, serial bus, IEEE1394 (a.k.a. FireWire).

There are a few other interfaces that may show up on a higher-end computer. These tend to be for special purposes or are extremely fast. One interface, for the purpose of connecting external hard drives, is eSATA (external Serial Advanced Technology Attachment). This interface is not as popular as it was before USB 3.0 became available, but it is still a way to extend the computer's hard drive capability. Thunderbolt is another special purpose interface, rarely seen on typical computers, with speeds up to 10 Gbps. Thunderbolt can connect multiple compatible devices in a daisy chained configuration. DisplayPort is another special purpose Video Display interface that is very fast. It is advertised at up to 21.6 Gbps, and is designed for multiple displays. These very fast interfaces may be found on professional Display systems that require resolution and refresh rates far beyond those of HDMI. This type of display may be found in medical systems that may be used to display MRI Scans or X-Rays. DisplayPort may be found on some high-end machines, maybe gaming machines and if resolutions beyond 1080p ever find their way to the home, you may find DisplayPort driving those display devices.

The job of moving digital data around is tough work, but these interfaces seem to be up to the job, and I'm sure the ones that will come in the future will probably be faster, more versatile and even more capable.

# Storage Media, Interfaces, And Backups

Recap of December 2013 Meeting by Anne Moss, Secretary, Northern Neck Computer Users' Group, NJ  
January 2014 issue, The Computer Link, [www.nncug.org](http://www.nncug.org), [mcmillan \(at\) va.metrocast.net](mailto:mcmillan@va.metrocast.net)

Rob Mink, President NNCUG, was the speaker at the December NNCUG Meeting. Rob's discussion about storage media and interfaces was designed to pick up from Brian Riley's October discussion about the use of external hard drives for computer backup. Throughout his talk, Rob passed around examples of different storage media.

There are two basic types of storage media — Magnetic and Solid State. However, optical storage may still provide a method of relatively long term data storage.

**Magnetic Storage:** First, Rob noted that physical media, for example punch cards, is extinct for computing. The most common form of magnetic storage is found in hard drives. Soft drives (such as tapes and floppy disks) are obsolete. Currently the maximum capacity of hard drives is 4 terabytes (TB). The 4 TB limits of hard drives dictate the use of a desktop computer. A hard drive in a desktop computer can have 4 or 5 platters to store data on each surface area. Additional storage usually can be installed in a desktop computer or attached to it. A desktop will use a 3.5 inch drive and a laptop will use a 2.5 inch one. A laptop hard drive uses a lower number of data storage platters with a maximum a capacity of about 1.5 TB. Laptop capacity can be expanded by the use of a USB flash drive which functions as an external drive. In addition, an external hard drive may be attached to a laptop via a USB port. Magnetic storage devices can fail quickly or gradually. They sometimes give warning of forthcoming failure.

**Solid State Storage:** These storage devices commonly can be Solid State Drives (SSD), USB Thumb drives or "sticks", and flash memory cards. Basically, these devices are made of transistors and capacitors in the desired format and size. Data life can be from 8 years to over 100 years, depending upon the temperature in which they are used and stored. The greater the capacity, the higher the price! However, over time, the prices for a given size device usually drop. The drawback for these solid state devices is that they can suffer sudden and catastrophically failure.

**Solid State Technology:** This comes in single layer or multilayer forms. It is made from Floating gate MOSFET NAND FlipFlops. Floating gates keep data for a very long time — 80 years was mentioned. Even though the technology is quite difficult for the average user to understand, one sees the products everywhere — for example, tablets and memory cards. Rob was asked why sudden failures occur. Reasons can be a bad interface with a chip or sudden drop which can kill a device. The technology still is immature, so it is not good at recognizing failure. He does not trust flash drive backups considering the risk of sudden failure. (In response to a question about photograph storage, Rob indicated that, in actual practice, photos by the average home user could be stored on magnetic media. Alternatively, while photos can be stored on flash drives, Rob counseled that it is probably safest to burn a CD.)



**Optical Storage Technology:** This includes CDs (read only and read-write), DVDs (in various types such as read only, read-write, dual layer that are burned on each side), and Blu-ray disks (in similar types). Optical storage media can be normal or archival in nature, depending upon the dye material used. Best is gold or silver dyes found in the more expensive disks. Normal grade disks are other colors such as green or blue. (Rob noted that it is best to stay away from DVD's with a purple colored dye.) Expect a burned disk to last from 2 to 25 years. For critical data, Rob advised that it is wise to burn pairs of disks. Then if it is needed, recovery can be made by combining data from both disks. It is unlikely that both disks would fail in the exact same place. Optical media is cheap and comes in capacities of 650 megabytes to 125 Gigabytes. Data can be burned in a single write session or multi-write sessions depending on the media used. The former is locked after the initial write session, and the latter can be written to or erased many times. The latter method is less reliable, and somewhat less readable by devices

other than the one that was used to create the original disk.

**Interfaces:** Rob described a wide range of interface types. Internal interfaces in computers include SATA, IDE, and SCSI/SAS types. Some need a connector to the power supply to function. External interfaces include Serial Peripheral Interface (SPI), SATA, USB, and Firewire.

**Backups:** There are two major strategies for data backups. First, backups can be kept offsite using cloud storage firms such as Carbonite or Spider Oak. Costs vary, but one should estimate about \$1 per gigabyte per year. Relatively limited cloud storage may be available for free. Second, one can use onsite storage. There are a few different types of onsite storage. Onsite magnetic storage includes using RAID and NAS hard drive configurations. (Different RAID type numbers indicate different configurations of hard drive storage.) Onsite optical storage, such as CD's or DVD's is a good means of back up storage, but is labor intensive for burning the data to disks. (Burn disks in pairs and not automatically.) Tape backups have changed and now are smaller than cassettes. However, tape backups are slow, and there may be a number of failures. Rob indicated that the best approach is to have backups on two optical disks and another type of storage such as hard drives. Some computers have a removable hard drive bay and one can use several hard drives to have a rotating backup plan. This approach is useful for whole hard drive backups.

To sum up, Rob presented an extensive list of the available choices when choosing to back up data, as well as highlighting the changes in standards that have occurred over a relatively short time in computer technology.

## For PC Tips & Info

[http://www.youtube.com/watch\\_popup?v=QoT0-2vu9m4](http://www.youtube.com/watch_popup?v=QoT0-2vu9m4)

David Pogue is speaking at this site and is the tech expert for the New York Times. He has many tips and information.

You will save lots of time and wonder why you didn't know this.

# My Life With Devices

by Nancy DeMarte, 1st VP, Sarasota PCUG, FL, Dec. 2013 Issue, PC Monitor, [www.spcug.org](http://www.spcug.org), [ndemarte \(at\) Verizon.net](mailto:ndemarte@verizon.net)

It all started about six or seven years ago with my first device, an iPod Touch. This cell phone-sized device does not make phone calls, but does nearly everything else. It introduced me to the seemingly limitless iTunes store and helped me navigate through the maze of managing my music and “apps.” This little device made me realize that I could carry hundreds of photos and songs in my purse, as well as get access to the Internet and my email in any Wi-Fi hotspot. I walked the treadmill at the gym to the rhythm of my workout playlists and showed photos of my grandchildren to everyone who would look.



My second device was an original Kindle, an electronic book reader. As both a reader and a traveler, I was looking for a way of transporting the several books I'd need for one of our long cruises. Amazon's Kindle was nothing fancy, but was exactly what I wanted. It too was a Wi-Fi



only device, although the Internet was only needed for downloading books. Even now before a trip, I search for and download a number of books from the Kindle Store at Amazon, most free or very low cost.

Then I turn off the Wi-Fi to save battery power and read away. When I fall asleep at night while reading in bed, Kindle also goes to sleep in a few minutes, saving my place in the book.

When the iPad first appeared on the market in 2010, I bragged to friends that I didn't need anything that big when I could do it all on my iPod



Touch. But being the techno fan that I am, I couldn't resist jumping in when iPad 3 came out in 2012. It's amazing how much easier it is to read email or play Words with Friends on that larger screen. Over time I got smarter about apps: fewer games and more utilities. When the Florida thunderclouds appear overhead, I check the

time lapse radar with my RadarCast app. I keep in touch with my son and daughter with FaceTime or Skype. Although I still use my Kindle for reading books, I enjoy magazines on the iPad because they're in color and never get recycled. Email is easier on the iPad, too, both reading and writing. When my husband and I do the morning NYT crosswords each day, the iPad is our quickest cheating option. I have a portable stock of favorite recipes in the Recipe Book app and regularly download new ones from many of the best-known websites.

I was a late adopter of cell phones, and even then I chose a cheap, basic phone. My mother was in her 90's; I needed to be on call. About then, a friend gave me very good advice: “Have no more than one device that has a monthly fee.” The cellphone became that device. It was only this year that I recycled the basic phone in favor of an iPhone 5. And it has turned out to be the right move. Last summer we rented a cottage on a lake where there was no Wi-Fi. I found that my iPad lost about 75% of its use to me because I had no Internet access. But my iPhone could do it all – read/send email, search the Net, play music, locate restaurants, talk to me, and take better pictures than my camera. You get the idea. A smartphone makes traveling a lot easier.

You may have noticed that I haven't mentioned computers among my devices. I have both a desktop and laptop and find them invaluable. When I need to write an article or set up a budget or make a greeting card or create a presentation — in other words, when I need to produce something — nothing beats my computers. The iPad offers several word-processing apps, even a small version of Word, but I like the full power of Microsoft Office, Photoshop Elements, and other full-featured productivity applications which work best on a PC, say nothing of the large monitor and classic keyboard. I use my “little” devices, as my husband calls them, for enjoying media and gathering information.

Besides the cost, there are challenges to owning all these devices: three cords for recharging, three cases, syncing, updating, and carrying them through security at airports. But I have a feeling that we are right now in a short transitional period. I have no doubt that within the next decade or two we will be able to do it all on a device that's no bigger than a ball point pen that can project a keyboard on the table and a monitor on the wall, all in response to our verbal commands. It will let us produce, entertain us, and keep us in touch with friends and family. All our personal devices will be packed into one. For now, though, like many other people, I'm dealing with a device management challenge that I really don't mind at all.

## Interesting Internet Finds

by Steve Costello, President/Editor, Boca Raton Computer Society, Oct. 2013 issue, Boca Bits, <http://sefcug.com/>, president (at) brcs.org

In the course of going through the more than 200 news feeds, I often run across things that I think might be of interest to other user group members.

The following are some items I found interesting during the month of October 2013.

How risky will it be to keep running Windows XP?

<http://askleo.com/how-risky-will-it-be-to-keep-running-windows-xp/>

POP vs. IMAP: What Do They Mean and Which One Should You Use?

<http://www.ilovefreeware.com/31/windows/pop-vs-imap.html>

Talk to your Navigating Device: Android or iPhone

<http://geeksonatour.tv/2013/08/talk-to-your-navigating-device-android-or-iphone/>

Can You Really Be Anonymous Online?

<http://www.makeuseof.com/tag/can-you-really-be-anonymous-online/>

Why You Don't Need an Outbound Firewall On Your Laptop or Desktop PC?

*Continued on Page 11*



## Crown Camera

Imaging Experts

M-F 8:30 - 5:30  
Sat. 9 - 5

Digital Cameras  
Photo & Printer Supplies

www.crowncamerashop.com

530-243-8333 or 800-655-4256 1365 Market Street  
FAX: 530-243-4978 Redding, CA 96001

## SnowCrest Inc.

"Northern California's Finest and First Internet Provider"

**UNLIMITED INTERNET ACCESS**

DSL & Wireless Access, Web Design & Hosting Services

www.snowcrest.net / (530) 245-4698 / (530) 926-6888

### CUGR

### Membership Application

**\$24**

Dues Per Year.  
\$2 Dues Per Month  
To be paid yearly in October.

Name(s): \_\_\_\_\_

Address: \_\_\_\_\_

City: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_

Home Phone: \_\_\_\_\_ Business Phone: \_\_\_\_\_

E-mail Address: \_\_\_\_\_

Date: \_\_\_\_\_

**Be Sure To MAIL TO:**

**CUGR**

**444 Basalt Ct, Redding, CA 96003**

**(For general information call any Officer or Director listed on Page 2)**

- New
- Renewal
- Cash
- Check

Check # \_\_\_\_\_

### 10 WAYS YOUR SMARTPHONE

*Continued from Page 11*

#### 10. How Did THAT GET IN THERE?

Kids put weird things in weird places. Two of those places are the nose and ears. With the cellphone's flash on, you can use the camera function almost like a scope to see what they've done now. Of course this works for adults too, if there's maybe an ear infection or an abscessed tooth. It's your camera. Where you put it is up to you!

#### **BUT WAIT, THERE'S MORE...**

We could go on all day about different ways to use your smartphone camera to make your life easier or simpler.

- Don't have a mirror handy while trying on fab hats? Take a picture!
- See something you'd like to get your spouse, but you're not sure if he or she would like it? Take a picture!
- See someone driving a car and reading a book at the same time? Take a picture!
- Trying to lose weight and need to keep a food log? What do you think you should do? Yes, take a picture!

### Editor's Note to Smartphone Article:

Phone cameras are fun, and my son uses his for his livelihood, but when kids are involved, please beware:

I heard recently that any photos you take with your phone camera while the phone is connected to the internet will attach the date, time, and *place (by GPS in the phone), etc. that it was taken*. In other words if you were to take a picture of your child at school and immediately send it to someone, your child can be traced to that school and to whatever information was attached, including the phone number, etc. by any savvy hacker receptive to the internet. And I also worry about teenagers and the phone cameras.

However, I was also told that if the phone is *not* on line when the picture is taken, it is safe and you can reconnect to the web afterwards.

It would be wise to check this out with an authority of online safety, because I don't know the particular dangers of phone photo sending, especially for kids.

### INTERESTING INTERNET FINDS

*Continued from Page 10*

<http://www.howtogeek.com/172349/why-you-dont-need-an-outbound-fire-wall-on-your-laptop-or-desktop-pc/>

How To Use the New Google+ Photo Editing Tools

<http://www.groovypost.com/howto/google-plus-photo-editing-tools/>

Where to Donate Your Used Tech  
<http://www.wonderoftech.com/where-to-donate-your-used-tech/>

How to Keep Your Internet Usage Private [INFOGRAPHIC]

<http://socialmediatoday.com/socialbarrel/1765451/online-privacy-how-keep-your-internet-usage-private-infographic>

How to View and Work on Google Drive Files When You're Offline

<http://www.guidingtech.com/24186/google-drive-offline/>

\*\*\*\*\*

Most Fridays, more interesting finds will be posted on the Computers, Technology, and User Groups Blog: <http://ctublog.sefcug.com/>

PCUsers Group  
of Redding  
P.O. Box 494778  
Redding, CA  
96049-4778



### Why Join A Computer Group?

1. Benefit from a common interest in a personal (and costly) investment: Your business or personal computer.
2. Enjoy more of that investment by learning more about it.
3. Share tips and tricks, as well as new and old ideas.
4. Become exposed to a variety of new hardware and software without sales pressure.
5. Receive an informative monthly newsletter.
6. Have access to various club functions and all Special Interest Groups (SIGs).
7. Find out that no one needs to be alone and helpless with today's computer technology.

*4th Tuesday*

*Monthly Meetings Are At  
The Redding Library*



*1100 Parkview Ave.*

*off Cypress and to the right of City Hall.*

*We will be in the Community Room, which is inside to the  
left of the main library door.*



### **Multi-Media SIG**

Saturday, 10 AM, April 26, 2014

At Jane Quinn's Home, for information contact:

Jane Quinn, 365-0825, [jqquinn7427@gmail.com](mailto:jqquinn7427@gmail.com)

Learn about Digital Devices, usage of free software for Movie Creation, Photo Projects, Music Projects, and Social Networking. Includes Microsoft Windows 7 basic Instruction.

Jane also conducts classes at the Anderson Senior Center (Frontier Center), Thursday 1-3 pm. You can connect to the classroom via high-speed internet to SKYPE, ID # AAASCO2009.

Walk-ins welcome between 3 and 4 pm for tutoring or special projects.

