

THE eQRM

THE HISTORY OF THE BVARA

THE EARLY 21ST CENTURY

BY RICH SOLTESZ, K3SOM

THE eQRM

DECEMBER 2013 / JANUARY 2014



5 THE HISTORY OF THE BVARA, PART 9: THE EARLY 21st CENTURY

We conclude our journey through the BVARA's past. By Rich Soltesz, K3SOM

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CHECK INTO THE NETS

Wednesday 2 Meter
8:30PM on 145.310 MHz

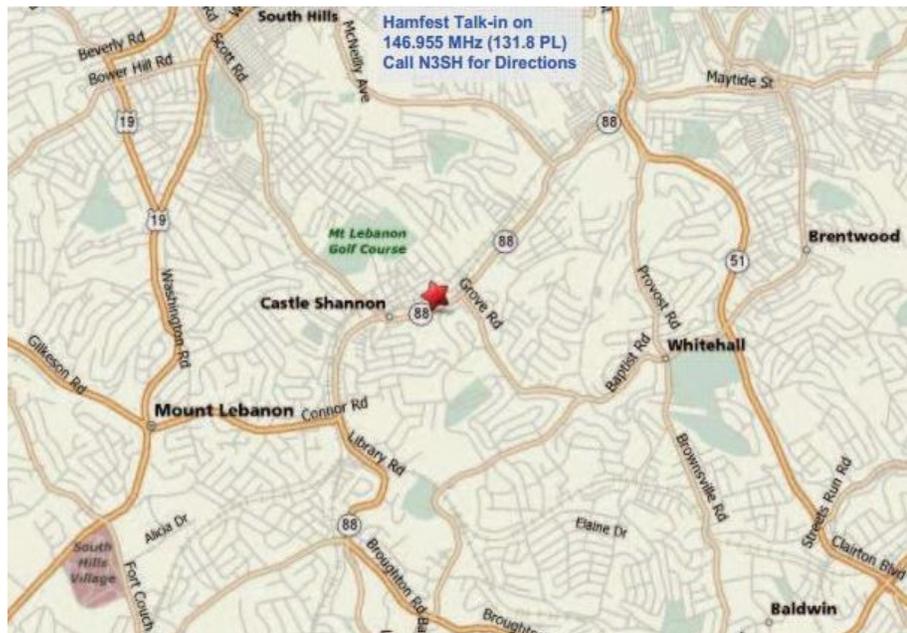
Wednesday 10 Meter
9:00PM on 28.470 MHz

Bulletins

HAMFESTS / ANNOUNCEMENTS / CLUB NEWS

Hamfest/ WASHFest 2014

Sunday, February 23, 2014. 8AM - 3PM.



The Facts:

Date:

Sunday, February 23, 2014.

8AM - 3PM, rain or shine (or snow!)

Location:

Castle Shannon VFD Memorial Hall
3600 Library Road (State Route 88)
Castle Shannon, PA

Talk-in:

146.955 (-) and 443.650 (+)

131.8 PL

Top Prizes:

Yaesu FTDX-1200 HF+6M
Comet CMX 2300 (HF/VHF
SWR/Power Meter)
Clear Speech Speaker

Sponsored By:

Wireless Assoc. of South Hills ARC

Announcement/ Radios for Sale

From Dick Hanna, K3VYY

I am trying to clean out the shack, and have some VHF/UHF radios that I would like to sell. All are working fine and come with mounting brackets, mics, manuals, etc. Also have the electronic manuals which I can email. (I think!)

IC2710H 50W 144 Mhz, 35W 440 Mhz. Asking \$200.

IC2350H 50W 144Mhz 35W 440 Mhz. Asking \$200.

IC229H 50W 144 Mhz only. Has a Heil handheld microphone which was made for the ICOM radios. Asking \$150.

Maybe some of the new hams are looking for a good radio, of course they are as is, with no warranty, but they are working, and I can demonstrate them prior to sale. They can contact me at k3vyy@arrl.net, or k3vyy@verizon.net - Dick, K3VYY

The Month Ahead

Contest Information, VE Testing and Presentation Series

CONTEST



North American QSO Party

CW: Jan. 11 - 12, 2014

SSB: Jan. 18 - 19, 2014

RTTY: Feb. 22 - 23, 2014

OBJECTIVE: To work as many North American stations as possible during the contest period.

BANDS: 160, 80, 40, 20, 15, 10 meters only, except no 160 meters for the RTTY contest.

CONTEST PERIODS:

CW: 1800 UTC Jan. 11 to 0559 UTC Jan. 12, 2014

SSB: 1800 UTC Jan. 18 to 0559 UTC Jan. 19, 2014

RTTY: 1800 UTC Feb. 22 to 0559 UTC Feb. 23, 2014

Log Submission: Must be submitted no longer than 7 days after the contest ending.

For more information on this contest, please visit ncjweb.com/NAQP-Rules.pdf

VE TEST SESSION

The next test session will be at the Beaver County Emergency Operations Center
351 14th Street
Ambridge, PA 15003

Time: 5:00 P.M.
(walk-ins allowed)

Date: Thursday, Jan. 9

All candidates wishing to take the test should bring ALL of the following:

1. Two (2) forms of identification. One should be a Photo ID.
2. A pencil and a blue or black pen.
3. Your original AND a photocopy of your current license (if any).
4. Your original AND a photocopy of any C.S.C.E's (if any).
5. The test fee of \$15.00.

All classes of amateur radio license tests will be administered.

Note: No question pool updates or releases will take place in 2013.

For more information, please contact our VE Test Coordinator:

Chris Moratis, W3OUF
1199 Highland Avenue
Ambridge, PA 15003
PHONE: 724-266-2866
cjmoratis@gmail.com

MONTHLY

Presentation Series

The BVARA Presentation Series provides a vast array of topics and discussions, with a new topic every month at our club meetings.



January 9, 2014 @ 6:30PM

At Beaver County 911 Center, 351 14th Street, Ambridge PA

Speaker: Rich Soltesz, K3SOM

Topic: JT-65 and JT-9: "Like Shooting Fish in a Barrel!"

Including: Continuing with our BVARA Presentation Series this New Year, our topic this month is about a new digital mode that is rapidly gaining in popularity. We'll begin with a brief history followed by some definitions and a discussion of various characteristics. Then we'll look at how to set up your transceiver to receive these digital modes. But wait, there's more: we'll look at the some key parameters to enable you to communicate effectively. This is one presentation you won't want to miss!

Rich's Background: Extra Class Ham, licensed since 1962; Volunteer Examiner (VE); B.S. Electrical Engineering

WEEKLY

Thursday Morning Breakfast

The BVARA meets every Thursday at Steak n Shake in Center Township, by the Beaver Valley Mall, at **10:00 AM**. All area amateurs are invited and encouraged to attend the Thursday Morning Breakfast. See you at Steak n Shake!



THE EARLY 21ST CENTURY

The first 13 years of the early 21st Century witnessed continuing social activities within the BVARA.

The growing impact of technology on amateur radio permeated all modes of operation resulting in increased station automation and a noticeable increase in the rapid availability of global information, propagation data, logging data, and improved emergency capabilities.

GLOBAL AND US EVENTS IN THE EARLY 21st CENTURY

The beginnings of the 21st Century generally continued the technological and socioeconomic changes that started in the 1980s and accelerated in the 1990s. Globalization had accelerated in the 1990s after the fall of Communism and continued to be a force in the 2000s. Geopolitically, the century opened with the United States enjoying an economic peak that bestowed hegemonic political and military preeminence.

The growth of the Internet was one of the prime contributors to globalization during the decade, making it possible for people to interact with other people, express ideas, introduce others to different cultures and backgrounds, use goods and services, sell and buy online, and research and learn.

The economic growth of the 2000s had considerable environmental consequences, raised demand for



President Barack Obama

diminishing energy resources, and was still shown to be vulnerable as demonstrated during the Global Financial Crisis of the late 2000s.

The War on Terror and War in Afghanistan began after the September 11 attacks on US soil by terrorists in 2001. The International Criminal Court was formed in 2002. A United States-led coalition invaded Iraq, and the Iraq war led to the end of Saddam Hussein's rule as Iraqi President and the Ba'ath Party in Iraq. Al-Qaeda and affiliated Islamist militant groups performed terrorist acts throughout the decade. The War on Terror generated extreme controversy around the world, with questions regarding the justification for U.S. actions leading to a loss of support for the American government, both in and outside the United States.

George W. Bush was sworn in as the 43rd President of the United States on January 20, 2001 following a sharply contested

election win over Al Gore. Barack Obama was sworn in as the 44th President of the United States in 2009, becoming the nation's first biracial president.

The most prominent natural disasters in the US in the early 21st Century included several hurricanes that resulted in extreme destruction, especially in 2005 (the most active in recorded history) with Hurricane Katrina nearly destroying New Orleans, killing at least 1,833 people in the hurricane and subsequent floods, making it the deadliest U.S. hurricane since the 1928 Okeechobee hurricane; total property damage was estimated at \$81 billion. That same year Hurricane Rita wreaked destruction along the U.S. Gulf Coast.

In 2003 the Human Genome Project was completed. Two robotic Rovers landed on Mars in 2004. Pluto was demoted to a "dwarf planet" in 2006. Google became



President George W. Bush



Flooding in New Orleans from Hurricane Katrina (2005)

the Internet's most visited website. Wireless Internet and Internet access via mobile devices became prominent by the end of the 1st decade of the 21st Century. USB flash drives replaced floppy discs for low-capacity mobile data storage. Blogs, portals, and wikis became common disseminator methods for knowledge management. By the year 2010 Facebook became the most popular social networking site. Voyager 1 entered interstellar space in August 2012 after a very successful earlier mission. Flat panel LCD and LED displays replaced bulky CRT devices. In June 2009, analog TV transmissions were terminated and replaced by HD television in the US. Apple made significant advances with introductions of iPod, iPhone, and iPad products.



Steve Jobs, co-founder of Apple, with the iPad

BEAVER COUNTY IN THE EARLY 21st CENTURY

In 2000, the US Census reported a total of 181,412 people in Beaver

County for a declining rate of 2.5 percent over the 1990 US Census. Most of the decline of the steel industry had taken its toll in the previous decade on the population of the county.

In January 2001 many Pirates and Steelers fans gathered a piece of history for themselves when Three Rivers Stadium was scheduled for destruction. In November 2003 Chi-Chi's Restaurant at the Beaver Valley Mall experienced the misfortune of being the source of a serious Hepatitis A outbreak. The restaurant was subsequently closed.

HAM EQUIPMENT AND THE INTERNET

The Internet became a source of considerable information for ham radio operators. The emergence of sites such as QRZ.com enabled all licensed hams to create personalized individual information where each operator had an assigned web page devoted to the information that they wished to share with others about themselves, their families, their equipment, their accomplishments, their operating philosophy, their QSL practices and requirements, and other standard information. User-selected pictures could easily be incorporated with user-provided text further increasing the value of this resource. Computer Assisted Tuning (CAT) became an important way to link software programs to ham radio equipment. DX Cluster spots became commonplace.

In the July/August 2002 issue of QEX Magazine, Gerald Youngblood - K5SDR began a four-part series that described "A Software-Defined Radio for the Masses" that would begin a paradigm shift in ham radio transceiver design. The following year Gerald founded Flex-Radio Systems and has developed a complete line of both ham radio transceivers and commercial radios. Not since the introduction of the KWM-1 transceiver in 1957 has the ham radio transceiver undergone such a major architectural change. Performance of subsequent models was nothing short of spectacular. By comparison, this change was akin to moving from vinyl records to CD recordings or from VHS-recorded movies to Blu-Ray HD movies. Combined with software



Various Apple iPods

products like CW Skimmer, a CW operator, for example, could now visually see the identity of hundreds of CW stations beside an

BVARA EVENTS IN THE 2000s

The BVARA holds quite a few events each year. On the following pages are photos from the last decade of club events.



Images from top:
The 2011 BVARA Christmas Party;
Herb Lawrence KT3HC awarded 2013 BVARA Ham of the Year

interactive panadapter interface of an entire band during a contest! Virtual audio cables, digital audio exchanges, CAT (Computer Assisted Tuning), direct digital signal paths with no IF mixers or distortion-causing roofing and passband filters, graphic equalizers, and other features ensured quality transmitted and received audio. The 6000-series transceivers supported CW QSK speeds of over 100 wpm when separate transmit and receive antennas were deployed.

Contesting, now called Radiosport, with these new integrated technologies and concepts of time, workflow, efficiency, and fast information access reached new levels of performance. Scores began to climb significantly from the previous decade. DXing also benefited with these and other technologies. Specialized propagation prediction programs allowed DXpeditions to identify on which bands to operate and at what times of the day to maximize their global coverage or to favor a particular continent. Contacts on multiple bands and with multiple modes together with favorable propagation conditions and enough operators practically guaranteed totals over 100,000. Satellite phones and/or Internet availability ensured very prompt verification of contacts on specific bands and modes. Electronic QSL systems such as LOTW and eQSL attempted to further automate the QSL process. Outgoing and



incoming QSL bureaus continued to function for many who preferred a physical card for verification or, to the chagrin of many, garnered income from requirements of money before a QSL card was sent.

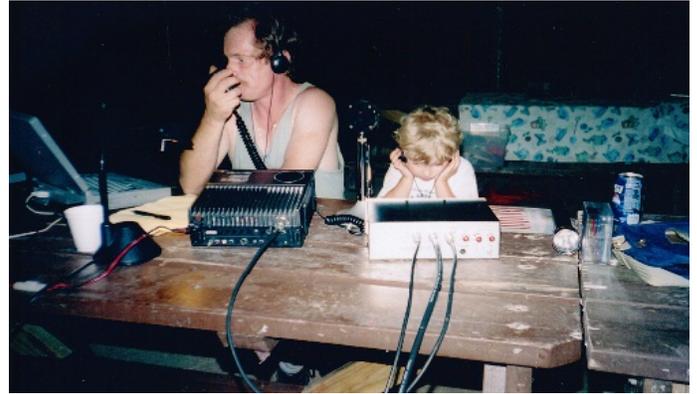
Construction projects by hams faced new challenges when SMT devices became available. Many older hams gave up this aspect of the hobby for physical reasons. Some savvy kit suppliers began to offer boards with the SMT devices already installed but with connectors and controls still requiring placement, soldering, and inter-connection. Hams had to learn new techniques to deal with these components. ARRL-sponsored design and construction competitions with cost constraints created a sub-culture of talented hams with creative and innovative designs at a very affordable cost. The winning designs were tested and then published in QST Magazine. Antenna modeling programs during this period finally enabled individual hams to evaluate actual performance versus marketing "hype" for commercial products. Further, they were valuable learning tools to indicate potential performance (or non-performance) prior to buying any wire or aluminum. Some very high performance beam antennas were created during this period with outstanding results when properly installed.



Images from top:
Don Cripe KE3MM and XYL at the 2013 BVARA Corn Roast;
Al Belardia WA3GFM at Field Day 2001

HAM CLUB AND MEMBER ACTIVITIES

The BVARA during the early 21st



From top, clockwise from left:
 Field Day 2004 - John Gurgacz KC3OW, Tom Merz N4KRA, and Chris Moratis W3OUF;
 Field Day 2004 - Bob N3SUM and Ryan;
 Field Day 2008 - Don Cripe KE3MM and Wes Morar N3ALS; Field Day 2011 - Bob Croft KB3RHN watches satellite comms with Adam Horniak KG3L; Field Day 2010 - Grant Miller KB3QFQ and Josh Bosh KB3TAD hang our sign; Field Day 2008 - Clyde Gump N3AK and Norm Trunick K3NJT

Century continued to be socially active with Field Day, the Corn Roast, the PA QSO Party, the Christmas Dinner and other activities. Members could get together each Thursday for breakfast at King's in Center

Township and at various other locations. Annual BVARA dues were now \$20 with lower rates for other situations. Club membership at the beginning of the 21st Century had dwindled down to less than 50 members and continued to

decline.

Monthly club presentations included many varied topics from satellite work, autopatch topics, home-made antennas, and various

construction projects. VE testing was regularly held at CCBC's Aviation Science Building in Chippewa Township. Club t-shirts, hats, golf shirts, and even jackets

were available to order. High-power jamming on 40 meters of Iranian broadcasts was routinely committed by Iraqi transmitters. As the Iranian broadcasts shifted frequency, the 10 KHz-wide jamming signals would follow thus causing havoc to many hams. On February 23, 2007 the FCC dropped the licensing requirement for Morse code. This was a boon to individuals who avoided ham radio because of the code requirement. This also meant that hams who now took their Extra-Class exam would be considered "Extra Lights" by the old timers who had to pass the now-dropped 20 wpm code requirement. In spite of the code test being dropped as a requirement, CW operation continued to flourish. Operating habits die slowly. But because of the narrow bandwidth and these personal preferences, CW continued in popularity because of its effectiveness in making contacts under difficult conditions. Newer digital modes were created later that could effectively "dig out" signals buried in the noise for which even CW was ineffective.

The Special Event Station that was activated on April 13th, 2013 at the home of Rich Soltesz – K3SOM was busy with five stations for nine hours – one hour for each decade of club service. Nearly 500 contacts were made that day by the 20+ club members who participated. A special commemorative QSL card was sent out to all hams that sent in a QSL card. In addition, a special certificate was created for those



Images from top:
Field Day 2011 - Portable Yagi Antenna;
Field Day 2012 - Jack Spencer KZ3Z, Sheriff David, and Mark Kavic KB3LED

who confirmed contacts on two or more bands or two or more modes. A great time was had by all in attendance. Now there are only 10 more years until the 100th Special Event Station gets activated!

Many of the BVARA social

events were documented with photographs. These events included Field Day, the Corn Roast, the PA QSO Party, and the Christmas Dinner. These photos capture the club spirit that continues to sustain the club as

new generations join the club and have fun with the hobby.

From the Chinese philosopher, Confucius: "Study the past if you would divine the future." What are the lessons to be learned from the 90-year history of the Beaver Valley Amateur Radio Association? We have survived through two world wars, conflicts in Korea, Iraq, and Pakistan. Terrorists attacked us on our own land on September 11th, 2001. We have survived unpleasant internal conflicts with animosity and with power struggles. Our history has been one of adversity and change, inevitably followed by struggle, success and growth. As each of the nine previous decades has shown, a new era in communication technology is upon us. Our path forward is clear: our club must ensure that Amateur Radio not only survives, but flourishes in this young century.



Images from top:

Field Day 2012 - Rich Soltész K3SOM launches the balloon up to 180 feet;
Field Day 2013 - Chris Moratis W3OUF, Al Belardía WA3GFM, and Jeff Waite K3SLK

EPILOGUE

This club history would not have been possible without the help of many people including: Al Belardía – WA3GFM, George Caffro – N3HOJ, Frank Cole – N3TN, Bob Croft – KB3RHN, Bob DeMarco – WA3ZRM, Dick Hanna – K3VYY, Paul Hecker, Sr. – W3PZC, Paul Hecker – K3ZW, Denny Herbuth – KR3DX, Adam Horniak – KG3L, George Hostovichak – NN3J, Herb Lawrence – KT3HC, Bob McClain, SK – W3VRZ, Tom Merz – N4KRA, Grant Miller, Jr. – KB3QFQ, Chris Moratis – W3OUF, Thom Peluso – KF3V, Thomas W.

Roney, SK – W3SGJ, Jack Spencer – KZ3Z, Pam Spencer – W3PMS, Norm Trunick – K3NJT, Bob Winkle – N3AZZ and many others. A special thanks to the silent keys of the past for their enthusiasm, contributions, encouragement, and accomplishments. Another special thanks goes out to Bob Green – W8JYZ for providing images of early QSL cards of club

members and others from the 1930s, 1940s, and 1950s including the W8SGJ card of Thomas Roney prior to World War II. Please visit his web site and/or send him a donation for his work at oldQSLcards.com and his preservation efforts. These cards really helped to understand what the "average" ham was using in the way of equipment in those early

days. The antique store just west of Clarion, PA was also a great source of local QSL cards from these bygone days.

Wikipedia provided significant background information and photographs for each decade as did the information from About.com, Infoplease.com, and many ARRL articles and stories published in QST Magazine. Some of these QST stories were about BVARA members and their activities and station setups. Special thanks to Maty Weinberg – KB1EIB for finding QST articles about BVARA members in those early years and for her permission to print them in our history journal. Field Day results of the club, when submitted and published, were also from the pages of QST Magazine. Livinghistoryfarm.org provided an interesting perspective on life on the farm. Local newspaper articles from the Beaver County Times, the Beaver Valley Times, and the Daily Times filled in several loose ends within the county.

My sincere apologies to the many other people with whom I spoke but did not include above. Your contributions were very helpful. Thank you very much.

These nine chapters took considerably more effort than was initially anticipated. But in the process, the ability to tie together global, national, and county happenings with the activities of the BVARA was an activity well worth the effort. I hope you have enjoyed these nine chapters as much as I have! ▀



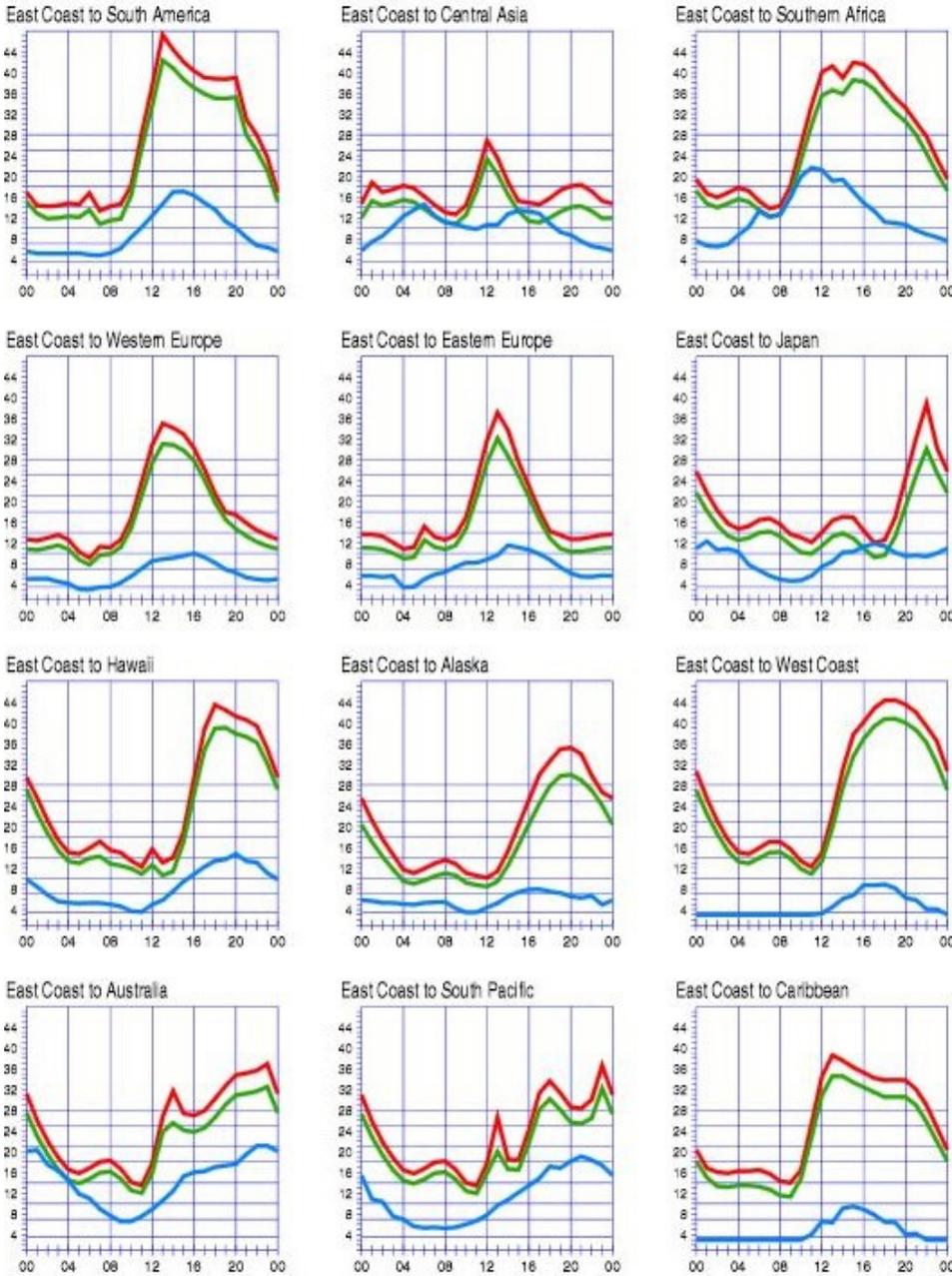
Images from top:
Rich Soltesz K3SOM at Field Day 2013;
PA QSO Party 2002 - Tom Merz N4KRA



From top, clockwise from left:
 Field Day 2013 - Jeff Waite K3SLK, Jack Spencer KZ3Z, and Pam Spencer W3PMS; Boy Scouts at Fern Hollow Nature Center for Jamboree on the Air 2010;
 Special Event Station 2013 - raising the Yagi Antenna; Special Event Station 2013 - operating the event;
 Rich Soltesz K3SOM and Jack Spencer KZ3Z with the BVARA's new repeater in 2010; Pam Spencer W3PMS baked this 2008 Field Day cake

Propagation Charts

From the ARRL



PROPAGATION

The East Coast propagation chart listed above is for January 2014.

If you would like more information on how to read these charts, or for more information on propagation in general, please visit <http://arrl.org/propagation>

RACES / ARES

eQRM Urges All County Hams to Participate

As a matter of editorial opinion, the eQRM urges all Beaver County licensed amateurs to participate in the County's RACES and ARES programs. Any Beaver County Amateur that is interested in participating in the RACES/ARES programs can do so by checking into the Beaver County Public Service Net which meets every Monday evening at 8:30 PM local time on the N3TN 146.850 MHz repeater (131.8 PL)



Who We Are

Membership Information and Club Officers

BY BECOMING A MEMBER OF THE BVARA, YOU CAN HELP SECURE THE FUTURE OF AMATEUR RADIO IN BEAVER COUNTY. ADDITIONALLY, THE BVARA RECEIVES A PORTION OF EACH ARRL AND/OR WORLD RADIO SUBSCRIPTION YOU PURCHASE!

Join the BVARA, ARRL and World Radio

Sign up for:	Price	Quantity
<input type="checkbox"/> BVARA FULL MEMBERSHIP	20.00	
<input type="checkbox"/> BVARA STUDENT MEMBERSHIP	15.00	
<input type="checkbox"/> BVARA ASSOCIATE MEMBERSHIP	10.00	
<input type="checkbox"/> CHILD UNDER 21 IN HOME	5.00	
<input type="checkbox"/> ONE YEAR ARRL MEMBERSHIP	39.00	

ARRL MEMBER? YES NO Subtotal: _____
 Donation: _____
 Total: _____

Your License Class (if any):

<input type="checkbox"/> Novice	Name _____
<input type="checkbox"/> Technician	Address _____
<input type="checkbox"/> General	_____
<input type="checkbox"/> Advanced	Email Address _____
<input type="checkbox"/> Extra	Phone _____

Your Call Sign: _____ Exp. date _____

Signature _____

Make Check or Money order payable to:
 The Beaver Valley Amateur Radio Association, P.O. Box 424
 South Heights, PA 15081

2014 BVARA OFFICERS

- President:** Jack Spencer, KZ3Z
Vice President: Jeff Waite, K3SLK
Second Vice Pres.: Mark Kavic, KB3LED
Treasurer: Pam Spencer, W3PMS
Secretary: Norm Trunick, K3NJT
Director: Adam Horniak, KG3L
Director: Denny Herbuth, KR3DX
Trustee: Rich Soltesz, K3SOM
Newsletter Editor: Grant Miller, KB3QFO

MONTHLY MEETINGS

E-Board meetings are now held the Saturday before the monthly club meeting. VE testing begins at 5:00. Regular meetings are at 6:30.

All meetings are held at
 Beaver County
 Emergency Operations Center
 351 14th Street
 Ambridge, PA 15003
 on the second Thursday of every month (unless otherwise stated).

MEETING DATES

- 2014
 January 9
 February 13
 March 13
 April 10
 May 8
 June 12
 July 10
 August - No meeting (Corn Roast, Date TBA)
 September 11
 October 9
 November 13
 December - No meeting (Christmas Party)

QSL CARD
 Special 90th Anniversary Edition

