



WASHRAG™



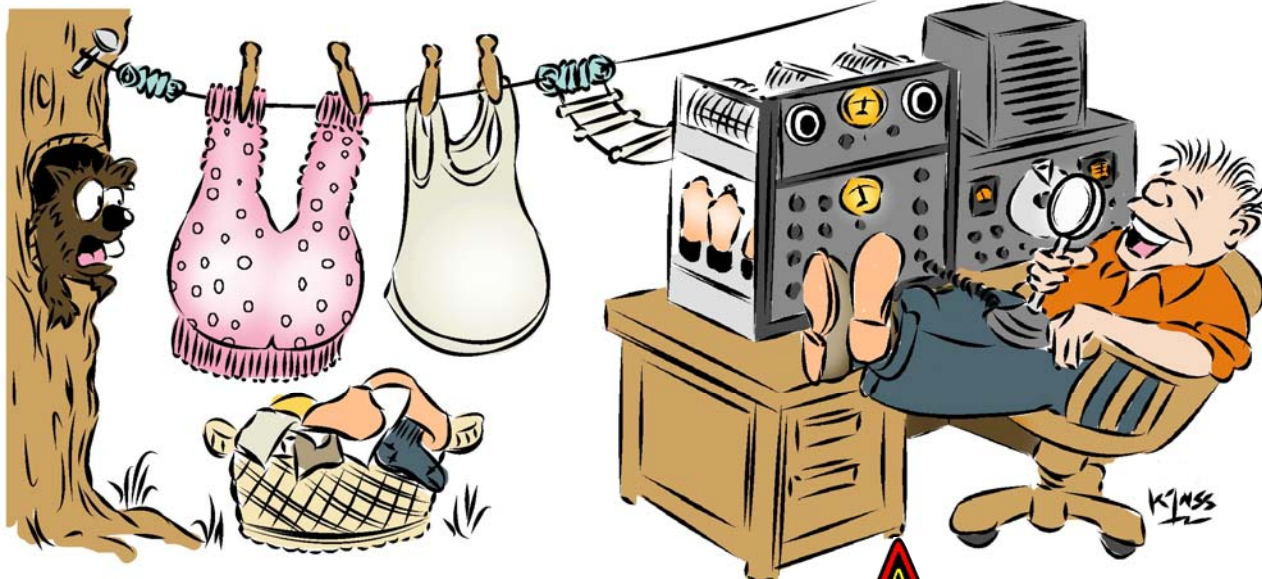
Wireless Association of South Hills

VOLUME 19 ISSUE 02
FEBRUARY 2017

WASHFest 2017 Coming Up!

N3SH WA3SH NP2SH/B

www.n3sh.org www.washarc.org



WASHRAG™



VOLUME 19 ISSUE 02

FEBRUARY 2017

Next Monthly Meeting: Thursday, February 2nd, 2017

The next meeting of the **WIRELESS ASSOCIATION OF SOUTH HILLS, INC.** will be on **Thursday, February 2nd 2017**, in the Conference Room at the **St. Clair Hospital Outpatient Center, 2000 Oxford Drive, Bethel Park, by South Hills Village & Village Square** (map on the back page). The room is available at 6:30 PM. The meeting will be starting at 7:00 PM.

Meeting topics will be the 2017 **WASH 2 meter simplex contest**, **WASHFest 2017** planning and updates, Dayton Field Day, and more plans for the coming year. See you there!

Cover Photo: Scenes from past **WASHFests**. Will we see you there this month, in our new venue?

Photos courtesy of & © Copyright 2014, 2016, 2017 Ron Notarius W3WN

WASH 2017 OFFICERS

EXECUTIVE COMMITTEE:

President	Glen Roberts KE7FD
VP / Secretary	Harold Rosenberger K3HCR
VP / Treasurer	Mark Stabryla N3RDV

AND WE COULDN'T DO IT WITHOUT:

N3SH Trustee	Larry Comden K3VX
WA3SH Trustee	Rich Danko N3SBF
NP2SH Trustee	Paul Jordan NP2JF
N3SH WA3SH NP2SH/B QSL Manager	Ron Notarius W3WN
NP2SH 2009 QSL Manager	Carl Schroeder K9CS
VE Team Liaison	Ron Notarius W3WN
Webmaster	Sean Sleeman N3NWR
Asst. Webmaster	Ben Williams KB3ERQ
Quartermaster	Harold Rosenberger K3HCR
WASH FM Net Manager	Chuck Bihun KC3ELA
WASHFest 2016 Committee	Carol Danko KB3GMN, Chairman
	Bill Hill W3WH, Co-Chair
Activities & Operating Events	Rick Bell KB3IAC
Ways & Means	Carol Danko KB3GMN
WASH 2M Contest Chair	Jim Sanford WB4GCS
Field Day 2017 Coordinators	Rick Bell KB3IAC
	Bill Hill W3WH

CLUB-AFFILIATED REPEATERS, BEACONS, & DIGIPEATERS:

Mt. Lebanon	N3SH / R	146.955 MHz (-)	PL 131.8
North Side	N3SH / R	442.550 MHz (+)	PL 131.8
Canonsburg	N3FB / R	443.650 MHz (+)	PL 131.8
St. Johns, VI	NP2SH / B	28.276 MHz	Propagation Beacon
Canonsburg	N3SH	144.390 MHz	APRS Digipeater

N3SH / WA3SH WASHNet, the weekly on-air net of WASH, meets every **Monday** Night, 8:00 PM ET, on the 146.955 & 443.650 repeaters. All radio amateurs, WASH members or not, are welcome to join in!

THE LEGAL STUFF

"The WASHRag™" (formerly "The Mariner™") is the Official Newsletter of the **WIRELESS ASSOCIATION OF SOUTH HILLS, INC. (WASH)**, a 501.C.3 not for profit organization.

Published Monthly with occasional Special Editions as warranted.

This issue is © Copyright 2016 by the **WIRELESS ASSOCIATION OF SOUTH HILLS, INC.**

Editor & Publisher: Ron Notarius W3WN

Permission is granted to other Amateur Radio publications to reprint articles in this issue, provided the original author and "The WASHRag™" are given credit. Comments, articles, and requests for copies of or information about "The WASHRag™" should be mailed to the editor:

Ron Notarius W3WN
3395 Rosewood Drive, Castle Shannon, PA 15234-2546
e-mail: newsletter@n3sh.org or w3wn@arrl.net

"The WASHRag", "The Mariner", **SHARCfest**, **South Hills Hamfest**, **WASHfest**, **WASHfest 2017**, **N3SH Net**, **WA3SH Net** and **WASHNet** are trademarks of the **WIRELESS ASSOCIATION OF SOUTH HILLS, INC.**

The **WIRELESS ASSOCIATION OF SOUTH HILLS, INC.** was founded on August 23rd, 1993, as the original **SOUTH HILLS AMATEUR RADIO CLUB**, and operated under that name through 1998. WASH was also known briefly in late 1998 as the **N3SH AMATEUR RADIO CLUB**. It is not in any way affiliated with the "South Hills Amateur Radio Club, Inc." and is not responsible for that group, it's members, or it's actions in any way, shape, or form.

As always, special thanks to the owners & operators of both the N3SH/R Repeaters and the N3FB/R Repeater System for permitting the **WIRELESS ASSOCIATION OF SOUTH HILLS, INC.** and it's members to use their repeaters for club purposes.

WASH Amateur Radio Club News Briefs

Next WASH VE Test February 26th

The Next WASH VE exam sessions will be **Sunday, February 26th, 2017, 10:00 AM**, at **WASHFEST 2017**, 3735 Buffalo Drive (Home Economics Building), South Park PA 15129. Talk-in on the 146.955 MHz and 443.650 MHz repeaters. All examiners are ARRL VEC affiliated.

Pre-registration is not required. Walk-ins welcome!

But if you plan on attending the test session, please contact VE Team Liason Ron Notarius W3WN:

Telephone (412) 572-6723 or E-Mail: w3wn@n3sh dot org

Please bring the following to your test session:

Picture ID or other suitable identification (2 forms of ID required)

Pen / Pencil / Calculator

Original FCC license plus a copy of license (if upgrading)

Original CSCE plus a copy of CSCE (if upgrading)

Check or Cash in the amount of **\$15.00** (payable to: ARRL VEC)

2017 test dates: Remaining Dates TBA

Glen's Musings



Greetings and felicitous salutations! Wow, what a warm winter so far (with scattered exceptions), warm enough for some antenna work. Keep an eye on the forecast and get those dipoles back into the trees. Even with poor propagation, folks are still earning certificates and working DX. Something that's not very far away is **WASHfest 2017**. We've included a QR code elsewhere in this newsletter for you smartphone savvy folks of the **WASHfest** location. In any case however, after about a million years **WASHfest** has moved to South Park, to the Home Economics Building. Worst case, just follow the people carrying radio gear to/from their cars. While we love to get the shiny toys in the mail and from the FedEx guy, please patronize the **WASHfest** vendors who are the backbone of any hamfest. What's that sound off in the distance? It's the smokin' deals at **WASHfest**.

Looking ahead at some contests, the Breezeshooters GroundWave CW contest is February 11th and the ARRL DX CW contest is on February 18th-19th, with the SSB versions of each in March.

What's cookin' at the WASH meetings? Looking ahead we have:

Continued on Page 10

Central Intelligence Agency reports about Amateur Radio in the former Soviet Union and Warsaw Pact member countries have been declassified, and can be found in a [new searchable online database](#), the 'CIA Freedom of Information Act Electronic Reading Room'. Documents include translations and assessments of Amateur Radio Clubs, training, technology, equipment, and even QSL cards!

Saturday, January 28th didn't feel quite cold enough to be a January morning, not that anyone was complaining. But it was still a fine time for the faithful of the **WASH Breakfast Gang** to gather once again at **Suzie B's**, 950 South Central Avenue (Route 910 at the intersection of Route 519 at US 19) in Canonsburg... if they could find parking, as the State Police were in full occupation of a corner booth this time around. Regardless, the gang this month consisted of N3FB, KB3GMU, WB4GCS, W3WH, KB3JHR, K3HCR, N3IDH and W3WN. Topics of the morning covered some repeater work today, the **WASH 2 meter contest** — entries, tickets, and power levels of the ops, working DX on 2 meter SSB and the recent TU4 DXpedition, a 1 Watt QRP rig for \$3 on eBay (yes, that's for real), PA QSO Party certificates and records, diabetic cats, cell phone issues, reforming electrolytics, paid parking in Canonsburg and Washington business districts, **WASHFEST** preparations, VE testing, the venerable IC-751 and V/UHF transverters, and more,

Because of **WASHFEST** setup, the gang WILL meet on Saturday, February 25th as usual at **Suzie B's**, 950 South Central Avenue (Route 910 at the intersection of Route 519 at US 19), Canonsburg — but a , so that we get done in time to head to South Park for setup. Our "usual" tables will be reserved, but please let Jim WB4GCS know ahead of time, so that Suzie & her crew will have enough space available for us. (We really don't want to fight the State Police for seats... we'd lose!) See you there?

Some of us will also try to gather at the South Park Eat 'n Park on Route 88 (across the street from South Park shops) at 8 AM, again so that we can head straight over for setup right after.

With **WASHFEST** almost upon us, a couple of house keeping notes. The additional **tables will be delivered** sometime at or shortly after 9:30 AM on Saturday, so we need as many hands as possible to unload, arrange, and set them up. (That's why the early start time and split breakfast). We are expecting some vendors to start showing up for early setup Saturday afternoon and into the evening, so we will need a few people around to help. Arrangements are being made to permit someone to be in the building all night, just in case, so a few hands will be needed to stick around and help "keep an eye out" overnight.

The **VE Testing** will be in it's own room, small but certainly better than dodging empty beer barrels in the back room. As always, we need some volunteers from the club's VE Team to help; as we've done the last two years, we want to have enough examiners so that no one is away from the action in the main hall for too long. Please contact W3WN and let him know if you can help out, and about when. Testing 'officially' starts at 10 AM, so we'll need VE's starting at 9:30 to handle paperwork and such, the usual.

We have permission from the Castle Shannon VFD to **post someone at the CSVFD Memorial Hall** for a few hours Sunday morning to redirect traffic; you know there's always someone who hasn't looked at a flyer in years, they "know where it is." Any volunteers for this task, please contact Carol KB3GMN.

And in general, **we need help from everyone** to, well, help out. Be it helping vendors unload, selling tickets, operating talk-in and giving directions, aiding in the kitchen, passing out coffee... if you've been to any hamfest the last few years, you know that there's all sorts of things that come up. Every little bit of help, well, helps. If we all pitch in, everything goes smoothly and no one misses out. Again, please contact Carol.

Oh, and **after the February meeting**, Carol will need help 'sorting' tickets — basically making the 3 / 7 / 15 ticket bundles up ahead of time, so if someone hands a ticket seller a \$20, a set of 15 tickets is ready to hand to them.

Check into **WASHNET** lately? Things have been picking up. Chuck KC3ELA should have the updated NCS roster available soon, so keep an eye on the N3SH web site for the latest updates.

WASHNet NCS Schedule

02/06/2017	TBA	04/03/2017	TBA
02/13/2017	Digital Net	04/10/2017	Digital Net
02/20/2017	TBA	04/17/2017	TBA
02/27/2017	TBA	04/24/2017	TBA
03/06/2017	TBA	05/01/2017	TBA
03/13/2017	Digital Net	05/08/2017	Digital Net
03/20/2017	TBA	05/15/2017	TBA
03/27/2017	TBA	05/22/2017	TBA

Indicates Swap Net After the Regular Net

Join WASH or Renew your Membership Today! Membership Application on Page 19

Minutes, January 5th Meeting

Harold Rosenberger K3HCR, Vice President / Secretary, **WASH**

Glen KE7FD, called the meeting to order at 19:07 hours. 12 members were in attendance.

A moment of silence was observed for recent silent keys & others deserving, followed by introductions.

Motion to waive reading of the minutes based on the minutes printed in the newsletter by Bill W3WH, second by Carol KB3GMN, passed unanimously.

Committee reports:

Treasurer (N3RDV): A balance on the bank account was read. Motion by Ron W3WN, second by Carol KB3GMN to accept. Passed unanimously.

Secretary (KB3ERQ): No Report

VE (W3WN): Next VE Exam will be in February at **WASHFest**, rest of 2017 exams to be scheduled.

Repeaters (N3FB): "Working"

WASHNet (KC3ELA): The new NCS schedule is late, but is due out shortly.

N3SH.ORG (N3NWR): No report

Contests (K3VX): **WASH 2** Meter Simplex contest coming up on January 14th, a week from Saturday. Short discussion on the contest followed.

Public Service (N3RDV): No report

WASHFest 2017 (KB3GMN):

- + Carol talked with the South Park police, there should not be an issue with having someone "on duty" overnight at the building.
- + She and Rick will be on January 14th to inspect the building and start determining where to place tables.
- + We will need "a lot of guys" Saturday morning to set up the tables and chairs. Table delivery due at approximately 9:30 AM or shortly thereafter.
- + Chuck KC3ELA offered to get the PA System set up and to help run it.
- + Main prizes are bought & paid for.
- + Door prizes are almost finished
- + Ticket sorting will be done at the next meeting
- + Table rental cost will be \$340, Carol will need a total of \$500 to cover table rental, coffee, doughnuts, etc.
- + Motion by Bill W3WH, second by Chuck KC3ELA, to allocate a total of \$500 to Carol & Rick to cover table rental and related misc. hamfest expenses as just outlined. Motion carried unanimously.
- + Short discussion on behalf of Rick KB3IAC about the planned menu choices for the **WASHFest** kitchen.
- + Misc. general discussion on help, parking locations and availability, and the building.
- + One of the small rooms will be used for the VE Testing.
- + We need to figure out how we're going to run a PA system in the new building.

Ways & Means (KB3GMN): Membership Contributions will be accepted tonight at the end of the meeting.

Newsletter (W3WN): Out.

President (KE7FD): Glen thanked Carol, Richie and Ben for all of their hard work over the last few years. (applause) He hopes he can keep everyone motivated & having fun.

Old Business: Motion by Carol KB3GMN, second by Bill W3WH, to reimburse Carol \$9 to replace the PO Box key for the Brentwood USPS PO Box. Passed unanimously. Noted that Carol has one key, Glen now has control of the second key, which he delegated to Larry K3VX

New Business: None

Good of the Order: Chuck KC3ELA would like to borrow the club's antenna analyzer. A reminder that 2017 Club Dues are now due.

Motion to Adjourn by Bill W3WH, second by Chuck KC3ELA and carried unanimously.

Meeting adjourned at 19:48.



WASH Spotlight: Winner!

A rare moment in history...

Bill W3WH accepting his winnings for the 50/50 drawing.

As everyone knows, Bill (almost) never wins anything, in over 50 years as a ham! (Just ask him)

Photo courtesy of and © Copyright 2017 Ron Notarius W3WN



Every month we're going to feature a **WASH** club member, something about them, something they're involved in or a club-related activity that we're involved in, in the **WASH Spotlight**. Submissions for the Spotlight should be sent to Ron W3WN at [newsletter at n3sh dot org](mailto:newsletter@n3sh.org)

Monthly WASH Breakfast

Please join us for the next **WASH** Breakfast! We usually get together on the LAST Saturday of every month for a chance to informally sit down, shoot the breeze, compare notes, drink lots of coffee, and just have a good time!



Join us this month at **Suzy B's**, Route 910 at the intersection of Route 519 at US 19, 1 mile North of Downtown Canonsburg. Start time is about 8 AM until ????. Monitor 146.955 & 443.650 for talk-in or any last minute changes. All are welcome, **WASH** members or not, amateurs or not!

Wireless Association of South Hills Membership

2017	2016	N3KFD	WASH FL	WASH TN	Silent Keys
AA3GM	AE3DL	N3RDV	KA3UPY/M	K3OL	AB3KA
AB3ED	K3HCR	N3RHT	W4ZE	KE3XB	K3EED
AB3NM	KB3IAC	NU3Q	WASH NE	N3YPB	K3LIE
K3SGT	KB3IVX	W3KTW	N0PEU	WASH TX	KA3NMG
K3VX	KB3JHR	W3LE	WASH OR	NB3C	KB3ENX
KA3VXM	KB3ORO	W3VFA	N0VLR	K3LGM	KB3FNM
KB3DCO	KB3RVI	W3WN	N0WVP	KB3JX	KB3FQT
KB3GMN	KC3HIK	W4CKR	KB3NVL	Jane Wagner	KB3JHQ
KB3GMU	KC3HNU	WB4GCS	KB3NVM	WASH VI	N3CZZ
KC3DOF	KC4WTT	WO3Z	WASH OH	NP2JF	N3FZ
KC3ELA	KI5ZT		N8DPW		N3HKQ
KE7FD	N3DFK				N3KEH
N1NCZ	N3IDH				N3OBD
N3FB					N3RNX
N3SBF					N3SKR
W3WH					N3SRC
WA3PYU					N3ZEL
WA3VSS					N3XFE
					W3ZLK
					WA3JPP

If your call should be listed here & isn't, please contact Mark N3RDV

Through January 30th, 2017
List compiled by
Mark Stabryla N3RDV, Vice President/Treasurer

2016 / 17 WASH Upcoming Events Calendar

Club Meetings & Other Significant Events — Subject to Change

February 2 nd	<i>WASH</i> Meeting	St. Clair Hospital Outpatient Center, 2000 Oxford Drive, Bethel Park
February 13 th -17 th	ARRL School Club Roundup	http://www.arrl.org
February 18 th	Breezeshooter's Groundwave CW	http://www.breezeshooters.net
February 18 th -19 th	ARRL DX Contest CW	http://www.arrl.org
February 24 th -26 th	CQ WW 160 Contest SSB	http://www.cq160.com/
February 26 th	<i>WASHFest 2017</i>	New Location! Home Economics Building, 3735 Buffalo Drive, South Park
February 26 th	<i>WASH</i> VE Exam	
March 2 nd	<i>WASH</i> Meeting / Pizza Night!	St. Clair Hospital Outpatient Center, 2000 Oxford Drive, Bethel Park
March 4 th -5 th	ARRL DX Contest SSB	http://www.arrl.org
March 18 th	Breezeshooter's Groundwave SSB	http://www.breezeshooters.net
March 25 th — 26 th	CQ WPX Contest SSB	http://www.cqwpix.org
April 6 th	<i>WASH</i> Meeting	St. Clair Hospital Outpatient Center, 2000 Oxford Drive, Bethel Park
April 23 rd	Two Rivers ARC Hamfest	The Spectrum, Boston PA
May 4 th	<i>WASH</i> Meeting	St. Clair Hospital Outpatient Center, 2000 Oxford Drive, Bethel Park
May 19 th — 21 st	DAYTON HAMVENTION ®	Greene County Fairgrounds, Xenia OH
May 27 th — 28 th	CQ WPX Contest CW	http://www.cqwpix.org
June 1 st	<i>WASH</i> Meeting	St. Clair Hospital Outpatient Center, 2000 Oxford Drive, Bethel Park
June 4 th	Breezeshooter's Hamfest	Big Butler Fair Grounds, Prospect PA
June 10 th — 12 th	ARRL June VHF Contest	http://www.arrl.org
June 18 th	ARRL Kid's Day	http://www.arrl.org
June 24 th — 25 th	ARRL Field Day	http://www.arrl.org
July 8 th — 9 th	IARU HF World Championship	http://www.iaru.org

"Seen" at the January Meeting

Photos Courtesy of and © Copyright 2017 Ron Notarius W3WN



902 & 1296 MHz Antenna Measurements

Jim Sanford WB4GCS

Initiation Date: 23 October 2016.

Participants: Frank N3FB, Jim WB4GCS.

Initial Symptoms: Unknown array of 902 & 1296 MHz antennas to be characterized.

Actions:

Test Setup

- 1) In order to have the antennas as much in the clear as possible, relocate the Network Analyzer to the Barn – a non-trivial exercise for a sensitive piece of heavy test equipment. We did this by placing the Analyzer on a piece of 2-inch insulating foam on a “shop cart” from Harbor Freight. We then gingerly walked this down the drive and into the barn.
- 2) In order to not have to worry about frequency accuracy, I set up my second Meinberg 10 MHz GPS Disciplined Oscillator (GPSDO) as a 10 MHz reference for the Network Analyzer. Supposedly this is accurate to one part in 10^9 or 10^{10} , or 1 Hz at 10 GHz – good enough for 1 GHz!
- 3) How to connect the Analyzer inside to the antenna outside? I had some very high quality cables custom made when I acquired the analyzer. To protect them, they are wrapped with the spiral plastic tubing you see in automotive wiring harnesses. To minimize losses, I had a 35' piece of 3/4-inch hardline fabricated. To prevent stress on the Analyzer N-connector (which could wreck the instrument), a 4' N-male to N-female cable connects the Analyzer to the 3/4-inch hardline, which is clamped to the cart so that it cannot move and overstress the coax or analyzer. At the other end of the hardline, a 4' N-female to N-male cable and N-elbow connect to the Antenna to not stress the antenna.

Photo 1 shows the setup in the barn and the Photo 2 the connection to the antenna. (Yes, that's an adult beverage on the router table . . .)

An aside: Conventional wisdom says that the antenna should be up in the air and free and clear, but many have speculated that pointing a directional antenna UP is equivalent. Quite some years ago, a couple of folks tested that theory and found it valid. Hence my setup with the antennas pointing up. More on this later.

Our next act was to calibrate the Analyzer for return loss at the end of the cable. Purists will point out that impedance (reflection loss) measurements of a device connected by a long cable will be influenced by the length and velocity factor of the cable, making your measurements meaningless. Quite a few years ago there were a couple of articles in the literature about how to correct for this. Basically, you measure the impedance of a known load (like a short) and another known load (like 50 Ohms) and with some ugly algebra solving 2 equations in 2 unknowns, the effects of the cable can be normalized out. One of those authors developed a couple of Excel spreadsheets which I have.

HP went a step further in their analyzer design. You tell it you want to calibrate for transmission loss and/or reflection loss, and the analyzer will tell you to connect an open to the load end of the line. It then makes some measurements. Next, you connect a short to the load end of the line, and more measurements. Finally, connect a 50 Ohm precision load and make a third set of measurements. The Analyzer does the algebra, and now displays measurements of what is at the end of the line, correcting out any effects of the line(s). Frank and I have validated this procedure multiple times and it works well. You may see this referred to as OSL (open-short-load) calibration.

To only have to do this once, we did the calibration with the following parameters:

F_{start} 850 MHz

F_{stop} 1350 MHz

We were now ready to measure the antennas.

Observations

The four 902 MHz antennas measured as to the SWR charts on the right:

Return loss of 10 db is not very satisfying, it corresponds to an SWR of 1.92. To be fair, in microwave work, often an SWR under 3 is (or used to be) considered “good”. Worse, the variation in the four antennas does not bode well for their performance in a stacked array.

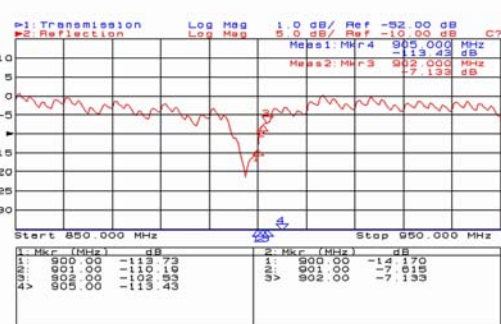
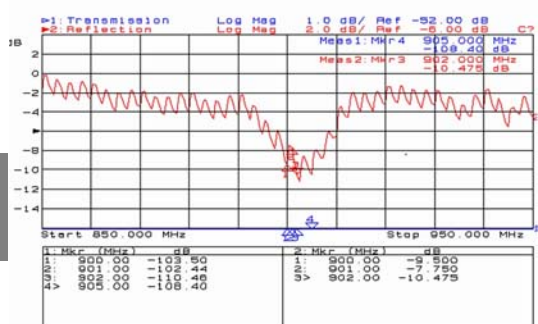
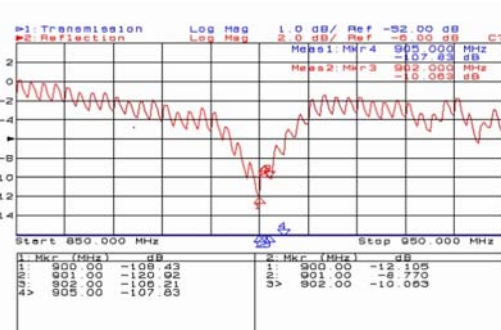
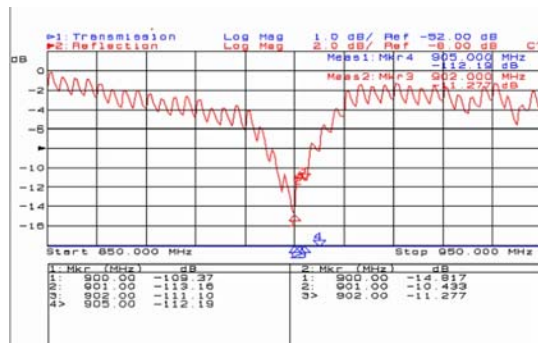
The four 1296 MHz antennas are shown on the next page.



Photo 1



Photo 2



Continued on Page 8

All photos & graphics in this article (on pages 7 & 8) are courtesy of and © Copyright 2017 Jim Sanford WB4GCS

902 & 1296 MHz Antenna Measurements

continued from Page 7

The four 1296 MHz antennas (right):

Again, not so good, especially for a stacked array.

Analysis:

These antennas are highly regarded, high-performance arrays. They need to be tuned.

The driven element is fed with a T-match, which is also highly regarded. There are three degrees of freedom – adjusting the location of the “jumpers” which connect the T-arm to the driven element, the length of the T-arm beyond the “jumpers”, and the spacing of the T-arm to the driven element beyond the “jumper”.

These antennas were factory tuned, so the third degree of freedom is the most variable, easiest to adjust, and most likely to have been changed. It is worth trying some adjustments.

Hypothesis:

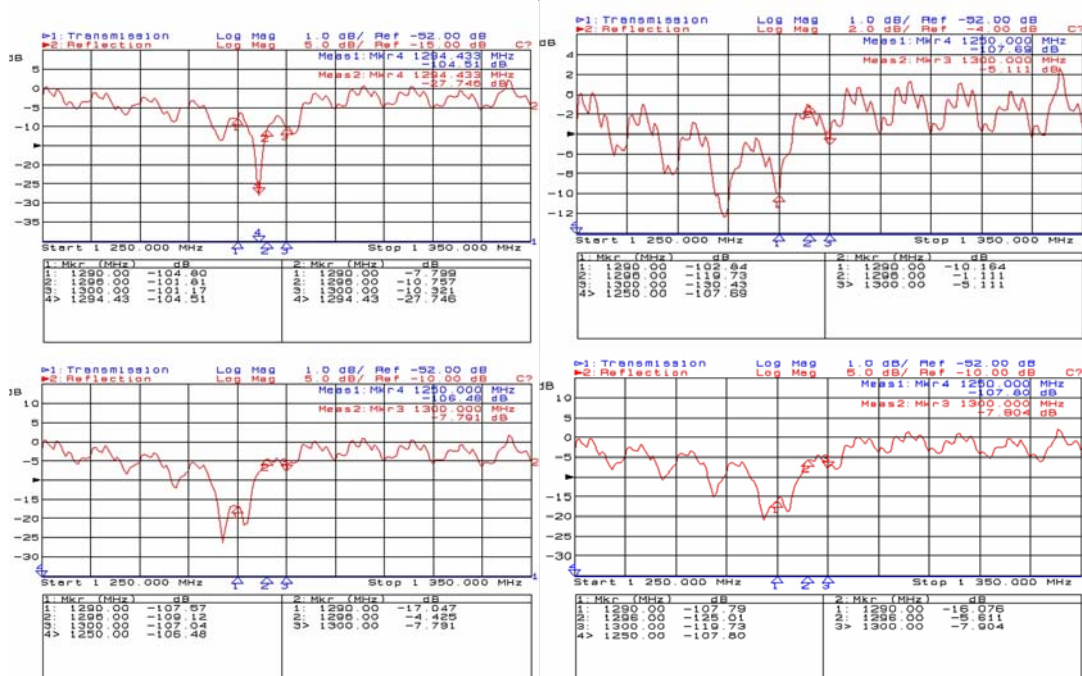
Although the “point to the sky” algorithm has been validated many times, it is possible that the reflectors and driven elements of these antennas are too close (a couple of inches) to the ground and there really is some interaction or de-tuning.

Before tuning, repeat the measurements with the reflectors of the antennas a foot or more (several wavelengths) from the ground. Then adjust.

Plan:

- ♦ Build a new mount, elevating the antennas at least a foot higher.
- ♦ Repeat measurements.
- ♦ Tune and measure.

Results & Conclusion: TBD



FCC Dismisses Two Petitions

American Radio Relay League

Newington, CT, January 5th, 2017 The FCC has turned down two petitions filed in 2016, each seeking similar changes in the Part 97 Amateur Service rules.

- ♦ James Edwin Whedbee NØECN, of Gladstone, Missouri, had asked the Commission to amend the rules to reduce the number of Amateur Radio operator classes to Technician, General, and Amateur Extra by merging remaining Novice class licensees into the Technician class and all Advanced class licensees into the Amateur Extra class.
- ♦ In a somewhat related petition, Jeffrey H. Siegel WB2YRL, of Burke, Virginia, had requested that the FCC grant Advanced class license holders Morse code operating privileges equivalent to those enjoyed by Amateur Extra class licensees.

“Thus, Mr. Siegel’s proposed rule change is subsumed within the changes Mr. Whedbee requests, so our analysis is the same for both proposals,” the FCC [said](#) in dismissing the two petitions on January 5th.

The FCC streamlined the Amateur Radio licensing system into three classes — Technician, General, and Amateur Extra — in 1999. While it no longer issues new Novice or Advanced class licenses, existing licenses can be renewed, and Novice and Advanced licensees retained their operating privileges.



“The Commission concluded that the three-class structure would streamline the licensing process, while still providing an incentive for licensees to advance their communication and technical skills,” the FCC recounted in its dismissal letter to Whedbee and Siegel. It specifically rejected suggestions that Novice and Advanced class licensees be automatically

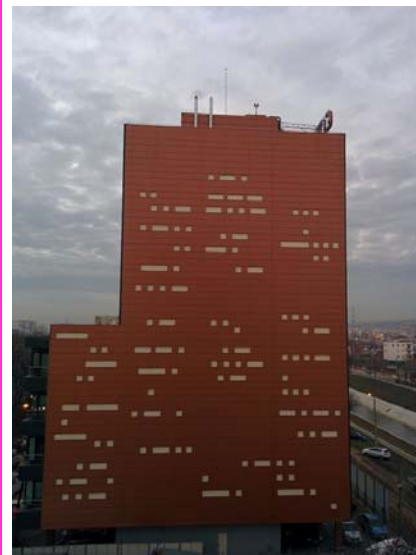
upgraded to a higher class, concluding that it would be inappropriate for these licensees to “receive additional privileges without passing the required examination elements.” The FCC cited the same reason in 2005, when it denied requests to automatically upgrade Technician licensees to General class and Advanced licensees to Amateur Extra class, as part of a wide-ranging proceeding.

The FCC said the two petitions “do not demonstrate, or even suggest, that any relevant circumstances have changed that would merit reconsideration of those decisions.”

Whedbee had argued that automatically upgrading current Novice and Advanced classes would simplify the rules and reduce the Commission’s costs and administrative burden, but the FCC said Whedbee provided no evidence that an administrative problem exists. “Moreover, such benefits would not outweigh the public interest in ensuring that amateur operators have the requisite incentive to advance their skill and technical knowledge in order to contribute to the advancement of the radio art and improvement of the Amateur Radio Service,” the FCC said.

“The Commission has already concluded that it will not automatically grant additional privileges to the discontinued license classes,” the FCC said. “Consequently, we conclude that the above-referenced petitions for rulemaking do not warrant further consideration at this time.”

Know Code?



Well, then you know what this building says... right?
(Give up? See Page 11)

Product Review: "Easy Digi" Sound Card Interface

Ron Notarius W3WN

Like many Amateur Radio operators who have been... well, let's not say around a while, let's say well seasoned... I've had an interest lately in the exploding interest in various forms of digital modes on the HF bands over the last decade or so. From the early days of limited options, namely Baudot RTTY, and later ASCII RTTY, to PSK-31 and a host of more exotic-sounding modes, there are more options available for communications than ever before. Each with their own benefits and hindrances, and with their own proponents and detractors. Figuring out where to start can be mind boggling in and of itself.

Almost as important is selecting exactly how the rig-to-computer interface is going to take place. Since the vast majority of the modes are software driven, the interface method is becoming of prime importance. But then comes the question, does one fabricate a simple cable or two for a few dollars, or spend \$150 or more for a commercial brand?

In my recent search, I came across a series of options collectively known as the "Easy Digi" sound card interface that is being marketed on eBay by Chris Wareham KF5INZ. The interface is billed as a "convenient, single board, isolated digital interface that works for almost all of the digital modes on HF and VHF/UHF". It is listed as compatible with multiple software applications, including FLDIGI and DigiPan, and over a half dozen digital modes.

Essentially, the interface very simply acts a coupler between rig and computer, to provide isolation and to eliminate ground loops or AC hum on the transmitted or received signal.

As you can see from the picture of the board and the parts list (both pulled from one of the eBay listings), there really isn't much to it. So what could go wrong?

The Easy Digi interface is available in multiple forms, from the "bare bones" kit of a circuit board and parts, all the way up to a pre-assembled unit in a case with cabling. Considering the "rusty" state of my soldering skills at present, I opted to purchase the unit pre-assembled, in a case, with the wiring for my primary HF rig, a Ten Tec Omni VII. The ordering information for this version of the unit does request that you specify which radio you intend to use with the unit.

I bought my unit on eBay on a Friday evening. It arrived from Texas the following Tuesday; not bad, considering there was a federal holiday that weekend. As you can see (third photo), it came with simple instructions, and three short cables with 1/8" to 1/8" stereo jacks on them. The instructions are straightforward, and basically mimic what you see on the web site. They also included a schematic.

One small surprise was that the cable for the microphone adapter was soldered onto the board (the blue cable to the left of the unit). I had expected it to be a separate item; but that assumption was my fault, as a careful reading of the eBay ad doesn't mention this either way. In other words, I should have asked first. This is a minor quibble, though, and it's in part my own fault. I also noted that the instructions at first appeared to indicate that there was a second mike connector included; this is actually a copy of the appropriate page from the Omni VII manual, showing the mike wiring. So this could be potentially misleading to someone who doesn't carefully note the source of the page. Again, a minor quibble.

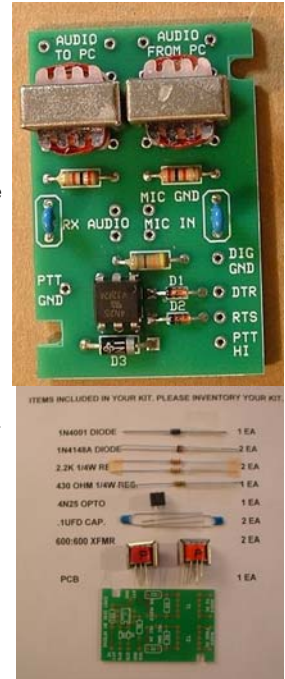
How hard is it to hook up? Connect to the mike jack on the front panel. Connect one cable from the interface to the speaker output (in my case, required a 1/8 to 1/4" adapter, which I already had). Connect the remaining two cables to the sound card mike and speaker connections. Set the power level. Adjust so that on keying, the ALC light is blinking (showing maximum modulation without overdriving). That's it. Yes, it is just that simple.

For testing purposes, I dug out an old Dell laptop running Windows XP (don't worry security fans, it is NOT connected to the internet!) that already had DigiPan installed on it. I was able to start decoding PSK 31 traffic immediately. (One caution, though. To key the rig, the rig has to be set on VOX. Don't turn VOX on until AFTER the computer boots, or you'll be transmitting Windows Startup music on the air!)

Transmitting has been a little trickier. Turn off the speech processor! Beyond that, getting the mike settings on the rig, and the volume (speaker) settings on the laptop, have been tricky. But I have managed a few QSO's.

Bottom line: Would I buy another one? Yes. Next time, though, I'll opt for wiring the mike connector myself!

You can find the Easy Digi interface on eBay, starting at \$9.95 (plus shipping) for the kit, \$15.95 for an assembled board (no case), and up from there with case, with a USB input, or many other options. (Just search on "Easy Digi" in Radio Communications)



BSA Radio Merit Badge Requirements To Include Amateur Radio Direction Finding Option

American Radio Relay League



Newington, CT, January 7th, 2017 — The Boy Scouts of America (BSA) have [updated the requirements](#) for the Radio Merit Badge for 2017. A new option for the Radio Merit Badge is Amateur Radio Direction Finding (ARDF). ARRL ARDF Coordinator Joe Moell KØOV, said he's "really excited" about the move, and he credited Jamboree on the Air Coordinator (JOTA) and K2BSA trustee Jim Wilson K5ND, with being the "spark plug" behind the ARDF addition.

"Jim visited a training session at the USA ARDF Championships in Texas last April and realized what an excellent activity that on-foot hidden transmitter hunting can be for Scouts," Moell recounted. "Working with Brian Coleman KBØMAP, Jim authored the new ARDF Radio Merit Badge syllabus, which was then reviewed by several leaders of US ARDF community."

A first draft of the new merit badge pamphlet is anticipated later this month or in early February, with formal publication expected late this year. Moell said the new merit badge requirements, effective on January 1st, come in time for the July 2017 National Scout Jamboree in West Virginia, where an ARDF course and equipment will be available to Scouts of all ages. ARDF already has a role in JOTA. The Radio Merit Badge ARDF option combines orienteering and foxhunting and opens a new interactive component to this program.

New Radio Merit Badge requirements include cellular telephones and different types of radio modulation. Key requirement being dropped from the Radio Merit Badge include open, closed, and short circuits, as well as schematic symbols and components, because these are covered in the Electricity and Electronics Merit Badges. The BSA also made some minor editorial changes and reordered requirements for the Amateur Radio option. The radio broadcasting option now includes Internet streaming, regulations and power levels. A medium-wave and shortwave listening option includes both types of listening, as well as listening via streaming services on a smart phone.

The BSA has posted a list of Frequently Asked Questions at <http://www.k2bsa.net/radio-merit-badge-2/>

WPA Section News: Radio Activity All Over!

Joe Shupienis W3BC, ARRL Western Pennsylvania Section Manager

Falls Creek, PA, January 22nd, 2017 -- Phew! I have been tapping at the keyboard and clicking the mouse in a frantic effort to keep up with all the activities going on all over this section. It seems that every time we finish one, two more upcoming events magically appear in my inbox! I'm not complaining -- in fact I want to encourage even more of these reports. Bring 'em on!

I just got back from the excellent Go-Kit Workshop conducted by the Washington Amateur Communications (WACOM) group in Washington PA. Many thanks to Brad KC3EDQ, the event host, and to everyone who brought their Go-Kits and other equipment to demonstrate to the group of around 20. We all learned a lot, and picked up many good ideas to help us improve our readiness for service when called up by our served agencies.

The positive comments about the Go-Kit workshop are still coming in, and there is new interest in presenting it in other parts of the Section. Perhaps this would be something interesting to include as part of our Section Convention, ARES Workshop or Leadership Clinic later this year. It's also a great idea for club presentations!



Cory Sickles WA3UVV, New WPA PIC

We welcome Cory Sickles WA3UVV of Uniontown, our new Public Information Coordinator. Cory is a regular columnist for CQ Magazine, and is active on our Section website and Facebook Group. He has an abiding interest in Public Service Communication, and is well-versed in all the popular and emerging Digital Voice technologies. When living in New Jersey, he was the PIC for his section, and has now brought his skills to his home section of WPA. You may contact him with information about your local activities, and to request Public Relations support for your Affiliated Club or group.

Help Wanted

We are still looking for a few good hams to lead several key areas of service the Section provides. Contact me for more details, application packages, or ideas you may have.

- + Section Youth Coordinator
- + Affiliated Club Coordinator
- + South 2 District Emergency Coordinator

These leadership jobs are a great opportunity to help your fellow amateurs all over the section. We are looking for enthusiastic, responsible people who are willing to give back to our favorite hobby by providing these important services. It doesn't hurt to ask -- you will not be "railroaded" into anything you can't handle. Get in touch with me and we'll talk.

The WPA Section Needs YOU!

WPA Section In The News!

The January 18th edition of the ARRL E-Letter (weekly emergency communications news email) featured an article about the Cumberland Valley ARC Winter Field Day activities in Franklin County. I forwarded the information I received from the club to League HQ (as required by my Job Description) and, Voila! WPA got recognition! That warm feeling you sense is the glow of Fame!

I encourage everybody to send in your reports every month, so they can be collected together and reported here, on our Internet sites, and to ARRL HQ. All reports are welcome, from the required Monthly Staff Reports, to interesting things from your club or your own hamshack.

Required reports should be filed with the appropriate official (DEC, SEC, PIC, STM, OOC or SM) during the last week of the month, so they may be processed in time for inclusion in QST and other League publications. Non required reports should be filed with our new PIC, your Assistant Section Manager or with me.

Section Traffic Manager Scores Clean Sweep

Congratulations to Herb Gilliland W3YNX of Sarver, our Section Traffic Manager, for a 2016 clean sweep of all 12 monthly reports being filed in time with ARRL HQ. Great Job Herb! Keep up the good work!

The Final Final

That's about all for this week. Don't forget Winter Field Day this weekend, from 2:00 pm Saturday to 2:00 pm Sunday. You can work other stations from the comfort of your own home, or if you're feeling the need for adventure, go set up outdoors, or visit one of the groups that has a site. In any case, let us all know how you did. I'm awaiting your reports!

73!

February: **WASHFest** final

preparations

March: **WASHFest** wrap-up

Pizza Night!

Laurel and Hardy (K3VX and W3WH) present on "Inverted L's"

April: PRB1 Discussion by ARRL WPA Section Volunteer Counsel

Mike Lazaroff K3AIR

May: Dayton Plans

DXpedition videos (tentative)

June: Field Day discussion

Also beginning at the February meeting, we'll start a new tradition of giving a door prize to youth visitors looking to get into ham radio. Invite your neighbors!

We look forward to seeing you in person and talking to you on the air!

— 73, Glen Roberts KE7FD

President, Wireless Association of South Hills, Inc.

N3SH / WA3SH / NP2SH/b

KE7FD Continued from Page 3



Will I be seeing you at WASHFest 2017?

New Hotel Owner Says: Remove Repeater American Radio Relay League

Newington, CT, January 18th, 2017 — A controversy has erupted on New York's Long Island, where the owner of the Islandia Marriott — soon to become a casino — wants two Amateur Radio repeaters and antennas removed from the roof of the hotel that's been their home for nearly 30 years. Town of Babylon ARES Emergency Coordinator and RACES Radio Officer John Melfi W2HCB, said removing the repeaters would severely hamper the ability of Long Island radio amateurs to support communication in the event of a disaster or emergency. The repeaters, which can take advantage of emergency power at the building, serve the towns of Islip, Babylon, Brookhaven, and Smithtown as well as the American Red Cross.

"People don't understand what these [repeaters] mean to the community," Melfi told ARRL. An ARRL Hudson Division Assistant Director, Melfi is also the president of the Great South Bay Amateur Radio Club ([GSBARC](#)), and club members pressed the two repeaters into service a year ago after a major snowstorm shut down Greater New York City. The club said removing them will be a "devastating blow" to Amateur Radio emergency communications. The WR2UHF repeater is part of the Internet Radio Linking Project (IRLP), Melfi said, while WD2NY is a D-STAR machine. Owned by Preston Waterman W2PW, both are affiliated with GSBARC. Melfi said that Waterman had an agreement in place with Marriott to use the site.

The hotel's new owner, Delaware North, has expressed concerns about safety and security at the casino and said it wants the equipment off the hotel roof sooner rather than later. It's also offered to help with the relocation.

Melfi said it would be "almost impossible" to find another, comparable location, and that, in any event, relocating the repeaters would prove costly and difficult. The equipment is expected to be moved in February, but the club has begun an [online petition drive](#) that has already collected some 350 signatures.

Melfi told ARRL that he's hoping that the GSBARC and Delaware North will be able to reach a formal memorandum of understanding that spells out access guidelines, so the repeaters and antenna can remain in place atop the soon-to-be casino. He said local hams would even be willing to obtain criminal background checks, if that would help to salve Delaware North's concerns.

In a statement, Delaware North [told](#) Long Island News 12, "We are not aware of any agreement that the previous hotel owner had in place to allow the antenna to be housed on the property and we will no longer permit the use of the equipment or access to the roof. The area needs to be secure due to safety and security concerns, so we have taken steps to limit access. We asked the leader of the Amateur Radio group who approached us to find another location for the antenna, and we offered our assistance in moving the equipment."



ARRL Asks FCC To Allocate New 5 MHz Band, Retain Channels & Current Power Limit American Radio Relay League

Newington, CT, January 12th, 2017 — ARRL has asked the FCC to allocate a new, secondary contiguous band at 5 MHz to the Amateur Service, while also retaining four of the current five 60-meter channels and current operating rules, including the 100 W PEP effective radiated power (ERP) limit. The federal government is the primary user of the 5 MHz spectrum. The proposed action would implement a portion of the *Final Acts* of World Radiocommunication Conference 2015 (WRC-15) that provided for a secondary international allocation of 5,351.5 to 5,366.5 kHz to the Amateur Service; that band includes 5,358.5 KHz, one of the existing 5 MHz channels in the US.

"Such implementation will allow radio amateurs engaged in emergency and disaster relief communications, and especially those between the United States and the Caribbean basin, to more reliably, more flexibly and more capably conduct those communications [and preparedness exercises], before the next hurricane season in the summer of 2017," ARRL said in a January 12th [Petition for Rule Making](#). The FCC has not yet acted to implement other portions of the WRC-15 *Final Acts*.

The League said that 14 years of Amateur Radio experience using the five discrete 5-MHz channels have shown that hams can get along well with primary users at 5 MHz, while complying with the regulations established for their use. "Neither ARRL, nor, apparently, NTIA is aware of a single reported instance of interference to a federal user by a radio amateur operating at 5 MHz to date," ARRL said in its petition. NTIA — the National Telecommunications and Information Administration, which regulates federal spectrum — initially proposed the five channels for Amateur Radio use. In recent years, Amateur Radio has cooperated with federal users such as FEMA in conducting communication interoperability exercises.

"While the Amateur Radio community is grateful to the Commission and to NTIA for the accommodation over the past 14 years of *some* access to the 5-MHz band, the five channels are, simply stated, completely inadequate to accommodate the emergency preparedness needs of the Amateur Service in this HF frequency range," ARRL said, adding that the five 2.8-kHz wide channels "have not provided sufficient capacity to enable competent emergency preparedness and disaster relief capability."

Access even to the tiny 15-kHz wide band adopted at WRC-15 would "radically improve the current, very limited capacity of the Amateur Service in the United States to address emergencies and disaster relief," ARRL said. "This is most notably true in the Caribbean Basin, but the same effect will be realized elsewhere as well, at all times of the day and night, and at all times of the sunspot cycle."

In its *Petition*, ARRL also called upon the FCC to retain the same service rules now governing the five channels for the new band. The WRC-15 *Final Acts* stipulated a power limit of 15 W effective isotropic radiated power (EIRP), which the League said "completely defeats the entire premise for the allocation in the first place."

"For precisely the same reasons that the Commission consented to a power increase on the five channels as recently as 2011 [from 50 W PEP ERP to 100 W PEP ERP], the Commission should permit a power level of 100 W PEP ERP, assuming use of a 0 dBd gain antenna, in the contiguous 60-meter band," ARRL said. "To impose the power limit adopted at WRC-15 for the contiguous band would render the band unsuitable for emergency and public service communications."

ARRL pointed out that the ITU *Radio Regulations* permit assignments that are at variance with the *International Table of Allocations*, provided a non-interference condition is attached, limiting the use of such an assignment relative to stations operating in accordance with the *Table*.

The League asked that General class or higher licensees be permitted to use the band. The FCC will not invite comments on the League's *Petition* until it puts it on public notice and assigns a Rule Making (RM) number.

Know Code? (from Page 8)

OK, so that was a bit of a "trick" visual question. The building is real; the location for computer security service Comodo Romaina, it's located in Iasi, Romania. You can find it on [Google Maps](#). You'll also notice that several sides of the building have International Morse embedded in them.

Read the code vertically, not horizontally. They're all names. (Probably of staff members at the time it was built!) See <https://imgur.com/sjY0MM5>

Thanks to Carl Maniscalco K6BSO for the initial picture.



An Open Letter To Our Customers

Dr. Michael Carper WA9PIE, Co-Owner, HRD Software LLC

Prosper, TX, January 7th, 2017 — Valued customers:

I've received many questions from our customers and dealers about what recent events here at HRD Software. Most want to know, "What really happened and what did I know about it?" In this letter, I will address those questions and clear up some misinformation.

First and foremost, **we wish to apologize to any and all of our customers or prospective customers who have been treated poorly**. For the events that happened, I find them deplorable. I will not defend them. I will make no excuses. We're sorry.

Strong steps have been taken to ensure that our customers will not have these experiences in the future:

- Co-founder, Rick Ruhl has resigned his ownership in the company as of 31-DEC-2016. A transition is underway. While we were not involved in day-to-day operations in the past, Randy Gawtry and I will be providing more over-sight in the future.
- The capabilities to disable software upgrades based on call-sign were removed from the software.
- Customers were given refunds and free software license keys.
- Policies have been communicated to the staff to protect the interests of our customers and prospective customers.
- The End User License Agreement (EULA) is being revised retroactively to ensure that it's clear that the licensee owns a perpetual right-to-use the software purchased.

I believe these things are strong actions that were necessary to correct what has happened, prevent it from happening again, and establish a position where we can rebuild trust with our customers.

As I said, I make no attempts to defend what happened or make excuses. No matter what happened, it was wrong. But it's useful to understand the facts surrounding this event. Here's the full story about what really happened:

Sometime prior to September 2016, capabilities were created within the software that prevented customers – by call-sign – from running future versions of software. It had no ability to disable software that was already installed.

It seems that the rationale for creating this capability was to prevent customers from using software upgrades when they were abusive to the staff. Similar to when someone goes into a place of business and harasses or threatens employees, we had cases where people sexual harassed women on our team, physically threatened our staff, or called our staff by racial slurs. We had language in the EULA that was designed to protect our staff from such abuse.

Neither Randy nor I knew that this capability existed. What we did know is that we have industry standard digital rights management (DRM) or license management capabilities to protect our intellectual property from software piracy. This provides the ability to disable license keys, but used at the request of a customer when requesting a refund.

On September 2nd, 2015, our customer wrote a negative review of our product on a ham radio website.

In the second week of September, the managing partner of our company placed that customer's call-sign into the software to prevent him from installing and running any versions of software released beyond that point.

The customer continued to use the version of software that they purchased, without incident, until after the following events happened in early December.

The customer created an online trouble ticket on December 4th, 2016, described a problem he was having with the software that was running on his system, and very cordially asked for support. [*Twelve months of free Software Maintenance and Support is included with the original purchase of software. Optional twelve month extensions are offered at 50% of the product's purchase price. The standard procedure is that our technician would look up the customer's call-sign in our customer database to verify that the customer is covered by current Software Maintenance and Support. The technician would offer support options based on this information.*]

The technician responded to the ticket on December 5th without looking up the status of the customer's Software Maintenance and Support period. Because about 50% of our releases are for fixing software defects and 50% is the introduction of new features, a common trouble-shooting procedure among software makers is to have the customer install the most recent version of the software to determine whether or not the reported problem had been fixed in a release that followed the installed version. Therefore, with good intentions, the technician asked the customer to install the latest release.

The customer did as requested. But because their call-sign had been added to the list of call-signs that were prevented from using software versions released after September, the software would not run.

The customer responded back and told the technician that the software would not run.

By then, the technician had looked up the call-sign and found that the customer was beyond their Software Maintenance and Support period. Thus, the technician told the customer that they were beyond their support period, that they could not further assist the customer, and that their call had been "blacklisted". This would require that the customer revert back to the software version he had installed previously.

What followed was an interaction that escalated on December 6th and 7th. Along the way, the customer was told that he was "blacklisted" – in the software – for writing a negative product review in the previous September. The customer was told that he would be removed from this list if he removed the negative product review.

On December 15th, the customer posted a thread on a popular ham radio website titled, "[Ham Radio Deluxe Support hacked my computer](#)." I can fully understand why the customer could have gotten that impression. But with all due respect, it's not what happened.

This thread continued for over 100 pages and received considerable attention around the world. Various bloggers picked up this story and published quite a bit of invalid assumptions and misinformation.

ABOUT HRD SOFTWARE, LLC.:

HRD Software, LLC. was created in early 2012 after the acquisition of software intellectual property from a European software developer who was giving the software away for free and had about 100,000 users world-wide. Dr. Michael Carper negotiated the deal with the European developer. But (a) he is not a software developer and (b) did not have the time or desire to run this business on a daily basis. So Carper brought in Rick Ruhl, and he brought in Randy Gawtry. The three equally contributed to the initial investment. As such, they were equal owners, with Ruhl managing the business on a day-to-day basis as managing partner.

Continued on page 12

If It Seems To Good To Be True... It Probably Is

Eddy Rojas WY4J courtesy of eHam.net

Miami, FL, January 6th —Just a few tips to avoid getting scammed on the ham swap sites.

My first job out college almost 40 years ago was finding those who wished not to be found because they owed money to the bank I worked for. I was what they called a "skip tracer." I looked for those who had skipped town on their debts. Well, although I have not earned a living skip tracing anyone in the last 35 years. Lessons learned in the late 1970's are just as useful today. Actually, with the onset of technology it's much easier to find someone now that it was in 1978 when you basically had to scam family members, the phone company, other banks and businesses out of information.

With all the price information available on the Internet nobody gives things away anymore.

I see more and more ham complaining that they have been scammed by another ham. Yes, they have been scammed but not by a ham. Not everyone has a built in "honesty gene." Ham to ham scams do happen but is not as prevalent as getting scammed by someone in Easter Europe or Africa.

For at least a dozen years I have been noticing that 99.9% of the hijacked calls are always those calls where the owner did not list their email address on their QRZ.COM information page. This first began with amateur calls from the UK where some ham would contact you trying to sell you a piece of equipment you had advertised that you wanted to buy. The price was always unbelievable inexpensive but the English and grammar of the message was not. They always requested a Western Union money transfer. Through the years, this scam has morphed from the UK to U.S. calls. But always, those calls with no email address listed on QRZ.COM seemed to be in question. Save yourself the embarrassment and take a couple of minutes and list your email and possibly your call might not be hijacked.

If the call does not have an email address attached to it on QRZ.COM; walk away or better yet, run away from that deal as fast as you can.

I have seen QRZ.COM records hacked where the scammer actually entered a bogus email address but I believe this is very rare. There was also an incident where the boyfriend got access to his ex- girlfriend's QRZ.COM account, changed the email address and began listing ham equipment at garage sale prices. Obviously the prices listed got the attention of many who reported him and his listings were removed. But you would not believe the dozens and dozens of hams who tried to send him money thinking that they had found a patsy.

Their key to not be fooled out of your hard earned money is:

Research, research, research...

Google the call, Google the name, Google the email, Google the telephone number, Google the XYL, Google the grandmother, Google the dog. Together with the call and name use words like scam, rip off, or problem on your Google search. See how long the seller has been a ham and how many QRZ look ups he/she has. Read his/hers QRZ profile. Leopards don't change their stripes. Once a crook and a deadbeat always a crook and a deadbeat.

Google the item image. You would be surprised how many crooks will steal a picture on the internet and try to pass the image as his/her own. Some will steal the image and the entire ad word for word. I even had a legitimate ham try to use my equipment pictures for his ads because he was too lazy to take his own pictures. This man even got highly insulted when I called him out on it.

You can go to the extreme or just stop when you feel comfortable:

- + Google search the seller's full name, ham call, telephone number (if you have one).
- + Do a property search by going to their county property appraiser and entering their home address. This is public information so you should be able to find it. If they rent, no such luck.
- + Google map their listed or given address to make sure is not an open field in the middle of nowhere.
- + Google their call and full name and include the words; problems, complaints, scam in the search.
- + Always get a phone number and call them. Although this is not definitive proof of identity at least you will have a number and a way to trace it back to a specific location. You should initiate the call and don't allow the seller to call you as he/she might be using a pay phone.
- + Make sure their phone and internet IP address matches their FCC listed address. You can do this on-line but most of the swap sites already have this feature available.
- + Buying from a non-ham selling ham gear should always be done very carefully as we are always proud of our call so I would be a bit hesitant as to why a person is selling ham equipment but is not a ham or does not want to disclose their call.

Lastly, does the sale make sense? Is he/she a novice or tech with no look ups selling a ton of HF equipment at garage sale prices? Close the deal on the phone not via email. Not the safest but PayPal is better than personal checks, cashier's checks or money orders. Western Union money transfers are a "BIG" no no. Although nothing is 100% safe, I usually walk away if the seller will not accept PayPal which adds another ledger of inconvenience to a scammer or thief.

Finally, used lot's of common sense and go with your gut feeling.

Just my two cents worth



An Open Letter

continued from Page 11

As a company, we employ 2 tech support folks, 1 part-time developer, and 2 sales/business support staff. Financially, we break-even each year. Neither Randy or I have received regular income from this company or dividends. What we take in, we invest back into development, support, and product marketing.

We sell two things.

One - we sell a perpetual license for Ham Radio Deluxe. That license is a "right to use" the software and is valid for a lifetime. During that period of time, you're welcome to upgrades that include fixes. Included in your initial purchase is 12 months of Software Maintenance and Support. During that first 12 months, you are entitled to all feature enhancements added to the software during that period. Additionally, you have access to our tech support team directly and may obtain support from them at no additional charge. Most of the time, 12 months is sufficient in order to ensure that the software is installed and is working with no major problems.

Beyond that first 12 months... two - we sell optional 12 month renewals for Software Maintenance and Support for customers who need our direct assistance beyond the first 12 months that were included with the initial purchase. We also offer support on a per-incident basis for those who do not wish to renew Software Maintenance and Support at a cost of \$20 per incident.

Effective on December 31st, 2016, Ruhl resigned and forfeited his ownership in the company to retire from the amateur radio industry.

Preliminary Results: WASH 2 Meter Simplex Contest as of January 30th, 2017

Jim Sanford WB4GCS, Contest Chair

Comments:

- 1) I sensed more participation than last year, not that I saw it all.
- 2) Several notes, "Thanks for doing the contest!"
- 3) All SASE's filled and mailed on January 28th -- should be received in plenty of time for **WASHFest**.
- 4) Rules issue:
One operator worked multiple modes at various power levels. He segregated and claimed multipliers for each different power level. Since the rules don't address, I gave him the benefit of the doubt. I sense that the intent is multiplier based on *highest* power level. We should discuss/decide one way or the other and then adjust/publish in rules.

2017 Amateur Radio Parity Act Speeds to US House Passage, Heads to US Senate

American Radio Relay League

Newington, CT, January 18th, 2017 — Just 10 days after being introduced, the 2017 Amateur Radio Parity Act legislation, [H.R. 555](#), passed the U.S. House of Representatives this week on unanimous consent under a suspension of House rules.

The bill's language is identical to that of the 2015 measure, H.R. 1301, which won House approval late last summer after attracting 126 co-sponsors, but failed to clear the U.S. Senate last fall as the 114th Congress wound down. The new bill, again sponsored by Rep. Adam Kinzinger (R-IL), was introduced on January 13th with initial co-sponsorship by Rep. Joe Courtney (D-CT) and Rep. Greg Walden W7EQI (R-OR), who chairs the influential House Committee on Energy and Commerce.

"The grassroots effort of Amateur Radio operators across this nation in support of the Amateur Radio Parity Act has been remarkable, nothing like we have ever seen before," ARRL President Rick Roderick K5UR, said. "To all hams, keep going! Now is the time to charge forward with that same momentum to the Senate. We can do it!" The bill arrives in the U.S. Senate with ample time in which to garner its approval through an education campaign.

"We're very encouraged by the speed with which this bill made it through the House. It's amazing that this happened," said ARRL Hudson Division Director Mike Lisenco N2YBB, who has been at the forefront of the legislative initiative. "With the help of ARRL members, we believe we can get this done," Lisenco continued. "We came within a hair's breadth last time, with 110,000 e-mails to members of both houses of Congress, as well as letters and telephone calls. Member participation in this final push is critical."

H.R. 555 calls on the FCC to establish rules prohibiting the application of deed restrictions that preclude Amateur Radio communications on their face or as applied. Deed restrictions would have to impose the minimum practicable restriction on Amateur Radio communications to accomplish the lawful purposes of homeowners association seeking to enforce the restriction.



Hamvention® is ready to deal with the anticipated heavy traffic flow when the event opens on May 19th at its new location, the Greene County Fairgrounds and Expo Center in Xenia, Ohio. Mike Kalter W8CI, said the all-volunteer Hamvention organizers have turned to professionals to address this aspect of the event. Kalter, who is treasurer of the sponsoring Dayton Amateur Radio Association ([DARA](#)), was [interviewed](#) mid January by DX Engineering's Tim Duffy K3LR.

"We recognized that we needed to reach out to a professional engineering firm that does this all over the country to help us to work with the local government officials, so that we can have a good solid plan to keep the people flowing in," Kalter told Duffy.

Kalter said arrangements have been made to have staging areas for those needing to either offload or load equipment from the indoor exhibit areas or the flea market.

He also pointed out that on-site parking would be free, and that no one will have to park in the mud. Kalter said areas set aside for parking are well drained, and he doesn't anticipate any problems, even if it rains during Hamvention. That goes for the flea market area as well, he said, noting that the arena infield area gets used events in good and bad weather alike.

Kalter said Hamvention expects to be able to post the plan for flea market spaces on its website soon. The layout for indoor vendor and exhibitor booths is already available on the Hamvention website. Kalter said that if everyone who attended Hamvention 2016 at Hara Arena shows up again this year, they will find plenty of room at the new venue. Maps are available on the website.

Turning to traffic of a different sort, Kalter noted that Greene County has brought in a high-speed Internet "pipe" to the new venue, and AT&T will drop telephone lines wherever they're needed.

Duffy asked whether the new venue would have an area similar to that outside Hara Arena, where those attending Hamvention could sit down with friends for a bite to eat or a drink. Kalter said there will be plenty of picnic tables as well as a temporary structure dedicated for socializing. He also promised that Hamvention 2017 will offer "a wide variety of great things to eat." That will include food vendors and food trucks.

Kalter said some 600 volunteers in all are required to make Hamvention happen each year, and the leadership team consists of 86 individuals.

Reflecting its new venue, "Hamvention — Same Friends, New Home" will be the theme for the 2017 event. Last summer's closure of Hara Arena forced the move to the new location more than 20 miles to the southeast.

The price of admission to Hamvention has gone up slightly; tickets will now cost \$22 for all 3 days (\$27 at the door). Accompanied minors 12 or younger may attend free. Online ordering is not yet available, but those planning to attend can [order tickets by mail](#). Hamvention runs from Friday, May 19th, until Sunday, May 21st.



Aerial View of Greene County Fairgrounds
Courtesy of W8WWV (from his video)

SAQ Christmas Transmission

"Successful"

American Radio Relay League

Newington, CT, January 16th — The old Alexanderson alternator SAQ at World Heritage Grimeton Radio Station in Sweden was heard by more than 400 listeners on December 24th, 2016, setting a new record.

SAQ traditionally broadcasts at Christmas with the 1920s-era electro-mechanical transmitter that operates on 17.2 kHz. SAQ has released a [report](#) that summarizes the success and a [map](#) that shows the locations of those who heard SAQ. The vast majority of reports came from listeners — many of them radio amateurs — in Europe, but several hams in the US and Canada were among those able to hear the 17.2 kHz transmission.

"Excellent reception," reported LF enthusiast Joe Craig VO1NA, in Newfoundland. "I look forward to visiting SAQ someday." Dave Riley AA1A, at historic Brant Rock in Massachusetts reported "very good" copy, with the SAQ signal at 10 dB above the noise. SAQ was even heard in Alaska, by Laurence Howell KL7L, in Wasilla, who gave SAQ a 449 signal report.



ARRL LoTW/IT staff announce an update release containing additions and changes made since the release of config.xml 10.4

The changes in config.xml 10.5 are:

In the Satellite enumeration, added entries for:

- + "BY70-1": Bayi Kepu Weixing 1
- + "IO-86": Indonesia-OSCAR 86 (LAPAN-ORARI)
- + "SAREX" for 2-way contacts made using the Shuttle Amateur Radio Experiment (SAREX) packet digipeater
- + "MIREX": for 2-way contacts made using the Mir packet digipeater

— Sean Kutzko KX9X & AMSAT News Service

"The **3Y0G** callsign was assigned to be two years ago by the Norwegian Communications Agency. I have no intentions to activate Bouvet this season, contrary to what some sources indicate" — ON4WW

Dear DX friends,

There has been some confusion about what amateur radio calls have been licensed for use from the Bouvet Island (2nd Most Wanted DXCC Entity; IOTA AN-002) for the year to come.

The Norwegian Communications Authority informs me that the following licenses are valid as of 25 January 2017:

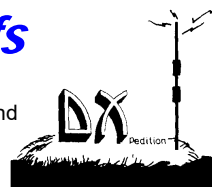
- + **3Y0G** Granted to ON4WW, valid from 1 January 2017 to 30 April 2017.
- + **3Y0Z** Granted to LA6VM, valid from 1 December 2017 to 30 April 2018.
- + **3Y0H** Granted to RA9USU, valid from 1 January 2018 to 28 February 2018.
- + **3Y0I** Granted to 3Z9DX, valid from 13 January 2017 to 31 December 2017

— Tom Victor Segalstad LA4LN
HF Traffic Manager, Norwegian Radio Relay League

XF2L will be QRV from NA-224/MEX-070 during American Lighthouse Weekend 17 – 19 March. They are restricted to "sunlight operation" 1500 to 2200 UTC.

They also note that Isla Sacrificios has been closed to the public for the last 34 years. Additional operation from Isla de Lobos NA-221/MEX-035 is planned for March & May. More information at <https://www.qrz.com/lookup/XF2L>. QSL via XE1SOV — XF2L QRZ page

DX News Briefs



Vlad UA4WHX reports that the **ARA** (Amateur Radio Algeriens) is in debt and in danger of being evicted and disbanding. DX-World has set up a donation fund for any amateur radio operator who wishes to help them reach their goal of approximately 2720 Euros (at current exchange rates), which will wipe out the debt and help the ARA continue to exist. Donations can be made via PayPal at dxworldnews@gmail.com; please stipulate that "you are donating to help Amateur Radio in Algeria" when donating via PayPal.

UA4WHX and RA4WHX assisted members of the ARA to operate from Djebel Chelia Mountain as **7W0A** 26 – 28 January. This was initially billed as a SOTA operation, but after strenuous objections from SOTA officials, all SOTA indications were removed from the 7W0A web site. — DX World

G8AFC will be QRV as **3B8HE** 1 February to 5 April, 40 – 6 meters. QSL via G8AFC – G8AFC

HA5AO will be QRV as **7P8EUDXF** 10 – 26 February, during his free time while overseeing work at a local orphanage. More information at <http://ha5ao.com/index.php/dx-peditions/lesotho/lesotho-2010/103-news-from-lesotho-again>. QSL via OQRS only – K5GS

Look for **XX9D** 13 – 26 February, running three 500 Watt stations CW SSB & RTTY "around the clock", along with a 4th station running JT65. They will have an online log on their website. More information at <http://xx9d.mydx.de/> or xx9d@mydx.de QSL via DL4VSA – XX9D web site

JA7HMZ has cancelled his planned op at **V63DX**, that was to take place 17 – 24 February – DX World

A team of 6 UK ops will be QRV as **9G5X** 7 – 21 March "for the fun element", running three 500 watt stations 160 – 10, SSB CW & RTTY. They will be using the ClubLog Leader Board facility, and want to encourage everyone to work them on as many bands and modes as possible. More information at <http://www.ossett.net/9G5X/index.html> QSL via MØOXO – 9G5X web site

W2APF will be QRV as **V47JR** 18 March – 1 April, 80 – 10, CW & SSB. QSL via W2APF – W2APF

G4SGX will be QRV as **V31GX** 11 – 12 March during the BERU/ Commonwealth Contest. QSL via G4SGX – G4SGX

JH7IPR will be QRV as **T88UW** 14 – 21 April, with a focus on digital modes and 6 meters. QSL via JH7IPR – JH7IPR

Members of the GMDX group and the Stirling District ARS (GM6NX) will be QRV as **HBØ/GM4UYE** 1 – 6 June. They will be seeking to raise donations for the Yorkhill Children's Charity / Glasgow Children's Hospital Charity in Scotland. QSL via MØOXO – DX World

A team of a dozen operators led by YT1AD plan to be QRV as **9MØW** from the **Spraty Islands** in early December 2017. They plan to be QRV for 8 to 10 days. More information to follow – YT3W

QSL Routes

5T5TI via NI5DX – W3AWU	T88UW via JH7IPR — KB8NW
8R1/AG6UT VIA DJ9RR – JA1HGY	TX2AH via DL2AH – JA1HGY
8P9JH via JH4IFF – JA1HGY	TX8F via NI5DX – JA1HGY
9N7XW via SP6AXW — JA1HGY	TZ4AM via WØSA – JA1HGY
GX4JBC/A via G3XOU — KB8N2	V44KAI via W5TFW – W5TFW
HR5/F2JD via F6AJA — KB8NW	V63AJ via DF8AN -- JAQHG
JWØGB via WB4ZBI – W4QNW	VK9LX via VK1AA – JA1HGY
KP2A/KP5 via N6CW – KS7S	VP6AH via DL2AH – JA1HGY
MX1SWL via G3XOU — KB8NW	Y43GO via DL2RUM – W4QNW
PZ5W via NØAT — KØBBC	ZA/ZA1P via SP6QJK – JA1HGY
R15TRTRN via R7AA – W3UR	ZD8W via W6NV – AA5AM
S9WL via EA3BT – LU2DKN	ZF9CW via KØDEQ – JA1HGY
S9YY via DH7WW – JA1HGY	ZL7G via G3TXF – LU2DKN
T3ØCOW via KCØW – JA1HGY	ZZ5FI via PY2AE — KB8NW

Thanks to the NJDXA DX News Reflector, the DX-QSL Reflector, 425 DX News, OPDX News, DX Coffee, DX World.Net, ICPO Bulletin, & ARRL DX Bulletin for our **DX News** information. Thanks also to the ARRL DXCC Desk, & Bernie McClenny W3UR / The Daily DX for confirmations & additional information.



WASH Classifieds

Information shown here is as supplied to the **WASHRag**. Condition as stated, and all sales should be considered "as-is" unless otherwise noted. All subject to prior sale or withdrawal from sale at the owner's discretion. All responsibility for this information lies with the source and not the **WASHRag** or the **WIRELESS ASSOCIATION OF SOUTH HILLS, INC.**

HAM RADIO INSURANCE ASSOCIATES, INC.

P.O. Box 201
Canonsburg, PA 15317-0201
Toll-Free 1-800-545-8881

Fax: (412) 746-5944

bill.hill@hamradioinsurance.com

"All-Risk" Amateur Radio Equipment Insurance Plan for:

Radio Equipment	Computer Equipment
Antennas Rotors & Towers	Computer Media & Software
Mechanical Breakdown & Electrical Damage Coverage	



Antenna Zoning or PRB-1 Issues?

Contact: **Michael S. Lazaroff K3AIR, Attorney at Law**

The Cingolani Building
300 North McKean Street, Butler PA 16001
Phone: 724-283-0653

The **WASHRag** Masthead is courtesy of Jeff Murray K1NSS creator of DASHToons & Dash the Dog Faced Ham!!

Find the online cartoons and stories of Dash the Dogfaced Ham & more at www.dashtoons.com!

Shop for Dash items at his online store on Café Press, www.cafepress.com/shopdash



For Sale:

"I had bought these (for use on) the motorcycle but never got around to using them. Both are in immaculate condition. Best Offer"



Ed Wolf N3UE [ewolf at wolfesplace dot use](mailto:ewolf@wolfesplace.net)

Several CubeSats carrying Amateur Radio payloads were placed into orbit on January 16th from the International Space Station (ISS). Six CubeSats delivered to the ISS in December were deployed from the Kibo airlock using the new JEM Small Satellite Orbital Deployer (**J-SSOD**).

Satellites carrying Amateur Radio payloads included ITF-2, Waseda-Sat-3, AOBA-Velox-3, and TuPOD (including Tancredo-1). University of Tsukuba designed and built ITF-2, with a downlink of 437.525 MHz. Waseda-Sat-3, a project of Waseda University, downlinks CW and FM telemetry on 437.29 MHz. AOBA-Velox-3 downlinks GMSK telemetry on 437.225 MHz. Tancredo-1, a Brazil middle school project, will transmit AFSK on 437.200 MHz.

The Japan Aerospace Exploration Agency (**JAXA**) has posted a [video](#) on the launches and related activities.

FCC FCC News

Courtesy of the American Radio Relay League

Newington, CT, January 12th, 2017 — In what it calls an "**extremely urgent complaint**" to the FCC, ARRL has targeted the interference potential of a series of audio/video transmitters used on unmanned aircraft and marketed as Amateur Radio equipment. In a January 10 letter to the FCC Spectrum Enforcement Division, ARRL General Counsel Chris Imlay W3KD, said the transmitters use frequencies intended for navigational aids, air traffic control radar, air route surveillance radars, and global positioning systems.

"This is, in ARRL's view, a potentially very serious interference problem, and it is respectfully requested that the products referenced...be investigated and removed from the marketplace immediately and that the importers be subjected to normal sanctions," ARRL's letter said. Some of the transmitters operate on frequencies between 1010 and 1280 MHz. "These video transmitters are being marketed ostensibly as Amateur Radio equipment," the League said, "but of the listed frequencies on which the devices operate, only one, 1280 MHz, would be within the Amateur Radio allocation at 1240-1300 MHz." Even then, ARRL said, operation there would conflict with a channel used for radio location.

ARRL said the use of 1040 and 1080 MHz, which would directly conflict with air traffic control transponder frequencies, represented the greatest threat to the safety of flight. The use of 1010 MHz, employed for aeronautical guidance, could also be problematic.

ARRL cited the Lawmate transmitter and companion 6 W amplifier as examples of problematic devices being marketed in the US. Each costs less than \$100 via the Internet. The device carries no FCC identification number.

"[T]he target market for these devices is the drone hobbyist, not licensed radio amateurs. The device, due to the channel configuration, has no valid Amateur Radio application," ARRL told the FCC. "While these transmitters are marked as appropriate for amateur use, they cannot be used legally for Amateur Radio communications." In the hands of unlicensed individuals, the transmitters could also cause interference to Amateur Radio communication in the 1.2 GHz band, ARRL contended.

The League said it's obvious that the devices at issue lack proper FCC equipment authorization under FCC Part 15 rules, which require such low-power intentional radiators to be certified.

"Of most concern is the capability of the devices to cripple the operation of the [air traffic control] secondary target/transponder systems," ARRL said. "These illegal transmitters represent a significant hazard to public safety in general and the safety of flight specifically."

The surge in sales of drones has been dramatic. The FAA has predicted that combined commercial and hobby sales will increase from 2.5 million in 2016 to 7 million by 2020.

In Exhibit A of the January 10th letter, "Illegal Drones Threaten Public Safety," the League noted that some of the drones and associated equipment it has come across "are blatantly illegal at multiple levels," with some drone TV transmitters described as "particularly alarming."

"Rated at six times over the legal power limit, and on critical air navigation transponder frequencies, these devices represent a real and dangerous threat to the safety of flight, especially when operated from a drone platform that can be hundreds of feet in the air," the exhibit narrative asserted.

In what might be a "first," the **December edition** of the IARU Region 1 (**IARU-R1**) Monitoring System newsletter includes a report of an apparent pirate station transmitting Slow Scan TV (SSTV) on 28.001.5 MHz. The station has been transmitting latitude and longitude coordinates as part of the image, which would put the offender in northeast Italy, although it's not certain if these indicate the station's actual location.

Other intruders on 10 meters include a radar facility in Iran, transmitting on 28.500 MHz using frequency modulation on pulse (FMOP) with 225 and 334 sweeps per second and covering about 36 kHz with many spurious emissions. On 15 meters, Moroccan military traffic has been observed on USB on 21.000 MHz. Fishing crews also are said to be gravitating to the new 15 kHz 60-meter band, now becoming available in many countries.

If you've downloaded the **WASHRag** from the N3SH web site, or picked up a copy from a friend... you can sign up to have the PDF copy sent directly to your email. You **do NOT** have to be a member of **WASH**!

Just send an email to wa3sh-subscribe@yahoogroups.com and the automation should take care of the rest!

Has Roadway found the tower yet?

The Radio Adventures of Carl & Quinn:

The Drones

Lynn Richards AAA2ZZ

(The following account was given in the third person as originally conveyed by one of the participants, whom shall remain nameless.)

January 21st would be the warmest on record when the guys thought there would be ideal weather conditions to fix Quinn's GR5V antenna, which had come down when the giant candy cane supporting the center was melted by the lightning strike. In an effort to prevent a similar "loss of signal" he found the perfect solution in a lightweight telescopic fiberglass mast from DX Engineering. The unit was ordered on Tuesday and arrived the next day, giving the guys one day to borrow the antenna launcher from W3WH, in order to raise each end of the dipole into the trees. Bill was aware of Quinn's propensity to encounter anomalies (meaning he was accident prone) and because of his professional background in the field of radio insurance, Bill offered to operate the launcher but Quinn assured him he had familiarity and skills to use the pneumatic contraption. Hearing this, Bill quickly pronounced that he recalled the launcher had ingested a small animal and had been taken to the Humane Society for extraction of the critter, and thus the launcher was not available. Needless to say, Quinn needed to find another solution...

Thanks to Amazon Prime, Quinn was able to have not one but *two* drones (cheap ones, of course) delivered along with a spool of the world's strongest braided 350 lb fishing line, "Neptoon Lasso" all delivered by Thursday. This gave the guys enough time to charge the batteries of the drones, set each drone transceiver frequency the same, stack and lock them vertically (for added lift). Friday evening they laid out the GR5V and attached 200 feet of line to each end of the dipole, and connected the antenna center to the fiberglass mast as it lay on the ground. Everything was set for the next morning. DXCC, here Quinn comes!

With all the preparations to the mast and the antenna made the evening before, the weatherman certainly earned his pay Saturday morning as the weather was beyond perfect for the 21st of January. Temps headed for the low 60's and nary a cloud in the sky. The boys set the base of the lightweight mast into a pocket dug next to a fence post that would serve to anchor the mast but for now the mast just leaned against a tree limb about 15 feet above the ground. Connecting one of the fishing lines to the bottom center of the lower drones chassis, Carl took the double-layered drones in one hand, turned both "on" then held them over his head. Quinn began to increase the power of the aircraft using the remote control and it began to ascend into the morning sky, exactly as planned.

"Now that's a beautiful sight Quinn!" Carl shouted, clearly excited to see cutting edge tech being used to hang a dipole.

"Yeah, this is great! Look here on the screen, you can see exactly where we need to guide the drones to carry the line. So what about that spot there? We can bring it down in the gap right there. See it?" asked Quinn.

"Better give it a bit more altitude to clear those limbs." Said Carl pointing to the screen.

With that, Carl cranked the throttle, and the craft jolted up into the air. What the boys had not considered was the amount of noise being generated by not four but eight motors interfering with the receivers on the craft. As the drones continued to climb higher into the air one side of the dipole was now completely airborne.

"Quinn, lower it, lower it! It's like two...fift... carry the one... 280 feet up" Shouted Carl.

"I can't it's not responding, it's not responding!" Responded Quinn, equally panicked.

As the two look helplessly on, an unfamiliar sound they hadn't noticed before was now roaring towards them. Almost on queue they both wheeled around just in time to see the Channel 11 chopper racing overhead on its way to a Breaking News story. The landing skids of the chopper snagged the drone in such a way that the world's strongest braided 350 lb fishing line, "Neptoon Lasso", did just that. The drone did in fact lasso a helicopter.

There was no mention of the drone, the antenna or the fiberglass mast on the evening news. Only one question remains and it is this:

"If an antenna mast falls in a forest and no one is around to hear it, does it make a sound?"



Two Rivers ARC 46th Annual Hamfest

Sunday, April 23rd, 2017, 8:00 AM—2:00 PM

The Spectrum

6001 Smithfield Street, Boston PA 15135

(Off of PA Route 48 near the city of McKeesport)

Talk-in on 146.730 — Mobile Check In 146.52

Admission \$5

More Information at <http://www.trarc.net>





WASHfest 2017

The South Hills Hamfest — Now in our **TWENTY SECOND** big year!

Sponsored by the WIRELESS ASSOCIATION OF SOUTH HILLS AMATEUR RADIO CLUB, INC.

Sunday, February 26th, 2017

8:00 AM until 3:00 PM Rain or Shine (or Snow!)

Home Economics Building, South Park

3735 Buffalo Drive, South Park Township, PA 15129

Talk-In on 146.955(-) and 443.650(+) 131.8 PL

Donation \$5



**Breakfast & Lunch
will be available!**



*FREE Coffee for the entire Hamfest
courtesy of HAM RADIO INSURANCE ASSOCIATES
of Canonsburg, PA*



(800) 545-8881

MAIN PRIZES — You've Got to Play to WIN!



- First Prize:** ICOM IC-7300
100 W HF+6 M Transceiver
- Second Prize:** Comet CAA-Mark 2
Antenna Analyzer
- Third Prize:** Clear Speech DSP Noise
Reduction Speaker

**NEW
LOCATION!**

Due to scheduled major renovations, we regret that the Castle Shannon VFD Memorial Hall will not be available to us in 2017

Please Note: Early Table Reservations must be paid in full on or before January 31st, 2017. Reservations received after February 1st, 2017 must include payment in full. Reserve now... we have sold out in advance seven years running!

Additional Hourly Door Prizes! Special Black Box Prize (Separate Drawing)!

Main Prize tickets are \$2.00 each, 3 for \$5.00, 7 for \$10, 15 for \$20

All Prizes Subject to last-minute changes

For Table Reservations, or More Information, Please Contact:

Carol Danko KB3GMN at (412) 884-1466 n3sbf@comcast.net

Check out our website too! www.n3sh.org

Hamfest Table Reservation Form—Please PRINT LEGIBLY ALL INFORMATION

Name: _____ Email: _____

Address: _____ Phone: () _____ - _____

City: _____ State: _____ Zip: _____

Call Sign: _____

Tables WITH Electricity: _____ X \$15.00 = _____

Tables WITHOUT Electricity: _____ X \$12.00 = _____

5 Or More Tables w/o: _____ X \$10.00 = _____

Please make all checks payable to:
WIRELESS ASSOCIATION OF SOUTH HILLS
PLEASE MAIL RESERVATION TO:
WASHFEST 2017
c/o CAROL DANKO KB3GMN
4246 Seton Drive
Pittsburgh, PA 15227-1244

We reserve the right to resell any tables not occupied by 8 AM, unless prior arrangements have been made!



WIRELESS ASSOCIATION OF SOUTH HILLS, INC.

Membership Application, New or Renewal



I would like to join WASH! I am interested in the following type of membership: ☐ **New Membership** ☐ **Membership Renewal**

(check quarter _____) →

(check one)

	<input type="checkbox"/> 1st Qtr Jan-Mar	<input type="checkbox"/> 2nd Qtr Apr-Jun	<input type="checkbox"/> 3rd Qtr Jul-Sept	<input type="checkbox"/> 4th Qtr Oct-Dec
<input type="checkbox"/> (F1) Full Membership:	\$20.00	\$15.00	\$10.00	\$5.00
<input type="checkbox"/> (F2) Full Membership < 18 or > 65 yrs of age:	\$10.00	\$7.50	\$5.00	\$2.50
<input type="checkbox"/> (A1) Associate Membership:	\$10.00	\$7.50	\$5.00	\$2.50

☐ (FM1) Family Membership (\$3.00 x No. of household family members): \$ _____

Name(s): _____

Name: _____

Address: _____

City, State: _____

Home Phone: _____

Email Address: _____

New Members Only:

☐ I do NOT want to be added to the Club E-Mail Reflector

☐ I do NOT want to be added to the Electronic Newsletter Mailing List

[If you have an Email address, you Will be added to both lists UNLESS you choose to Opt-Out]

Signature: _____

Call Sign: _____

License Class: _____

Expires On: _____

Work Phone: _____

Birthday: _____

ARRL Member? ☐ Yes ☐ No Family ARRL Member? ☐ Yes ☐ No

Date: _____

Amount Enclosed: \$ _____

N3RDV has requested that all membership requests and renewals include an application so that his information is up to date

Please make your check or money order payable to the club treasurer, Mark Stabryla.
The Wireless Association of South Hills, Inc. reserves the right to accept or reject new memberships or renewals.
Please return completed membership form along with check/money order to the club treasurer or mail to:

WIRELESS ASSOCIATION OF SOUTH HILLS, INC.
c/o Mark Stabryla N3RDV, VP/Treasurer
1120 McKnight Drive
Bethel Park, PA 15102-2456



DXers have a choice!

Get a free two week trial of The Daily DX and The Weekly DX and decide for yourself which one best fits your needs for informing you of all the DX news!



Send an email to bernie@dailydx.com or go to www.dailydx.com

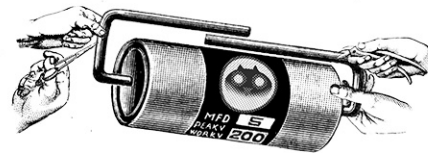
The Daily DX, 3025 Hobbs Road,
Glenwood, MD 21738 Phone: 301-854-5650



Arhhh!
What Mightst We Draw For Ye, Matey?



HANDMADE BY GNOMES.



Hamfest Talk-in on
146.955 MHz (131.8 PL)
Call N3SH for Directions



Directions to WASHFest

Buffalo Drive can be reached from the intersection of Brownsville Road and Corrigan Drive, adjacent to the South Park fairgrounds and the Allegheny County Policy station. Signs are posted. Brownsville Road can be accessed from State Route 51, and Corrigan Drive can be accessed from State Route 88.

The WASHRag

Wireless Association of South Hills, Inc.

Ron Notarius W3WN, Editor

3395 Rosewood Drive

Castle Shannon, PA 15234-2546



N3SH / WA3SH
NP2SH/B

www.n3sh.org
www.washarc.org



Now... you ARE
planning to be at
WASHFest 2017,
Aren't you?

