Web Site k3dn.org

Warminster Amateur Radio Club

March 2020

Next Meeting March 5th - Homebrew Night

President's Message

First I would like to thank everyone for making last month's auction a huge success. This month's meeting is a chance to show off the projects you've built and there has never been a better time for kit building than now. There are numerous companies that provide great kits for builders of every level of experience and I've built many kits from the companies listed below. The most satisfying contacts that I've made are the ones that I've made with a radio that I've built.

There are a ton of resources on the web and you should take advantage of them. If you want to learn how to do anything from soldering a PL-259 on coax or how to be a better contester there is a video on YouTube.com for it. I just watched Chris, K2CJB, activate Neshaminy State Park as a Park on the Air (POTA). Another resource is Facebook where there are several ham radio related groups including but not limited to Ham Radio, Ham Radio Elmers, VHF/UHF Amateur Radio and groups for every radio made including mine a Kenwood TS-590SG. If you don't want to give your info to Facebook then there are many mailing lists on Groups.IO and like Facebook they have a group for every aspect of the hobby. WARCTalk is on Groups.IO so if you're on the email list just search for other groups.

Another great source of information is Podcasts. What is a Podcast? It is like a radio show that you can download and listen to when you want. I listen to several and enjoy Hamnation, Ham Radio Workbench, SmokeSolder, Ham Talk Live and QSO Today. The ARRL has several that have just started. One is to complement their new online magazine, On The Air and the other is Eclectic Tech which is a new column in QST.

Finally I would highly recommend creating a profile on QRZ. Whenever I make a contact I look up the person on QRZ to see what they are interested in and what kind of station they have. I also sync my logs on QRZ which allows me to qualify for various awards that QRZ offers. Remember the club is here to help you get the most out of this hobby so please ask questions and/or help and enjoy Ham Radio.

73, Marty NR3Z

List of kit companies

QRPLabs.com - QCX QRPKits.com - KD1JV Tri-Band QRPGuys.com - Various kits QRPme.com - Rex is the king of Buildathons

> WARC General Meeting Minutes February 6, 2020

Welcome / Pass the Mic

Minutes from last Board Meeting

Additions / Corrections - Minutes approved as written.

Committee Reports

Treasurer's Report: Herb KB3VMN
As reported at meeting
Programs: Tony N3YNH
February - Auction
March - Home Brew
April - Chris Trotter - Civil Air Patrol
Membership Norm - AB3ZZ
122 Active members

1 Pending

(Continued on page 2)

Page 2 FEEDBACK

(Continued from page 1)

50 - 55 paid - Please pay your dues

Public Service: George N3HBT

Parks and Rec - golf outing in June

Parks and Rec - Memorial Day Parade in May

Classes: George KA3WXV

Second week of March

Tech / Gen&Extra

VE: Larry WA3ELQ

4 Attempts, 3 successful

2 Techs, 1 General

Repeater - Brian N3EXA

Interference removed

Hilltown Fusion is working

Hilltown amp has been replaced

New solid state amp acquired.

Good and Welfare - Jim K9KJL

One card to member for loss of father.

Other Committees

Hamfest: Tony W3FLH

We have been named host of EPA Section convention for 2020

College and Tables have been secured.

Info has been submitted to ARRL

Setup on Saturday, time to be determined.

Field Day - Tony W3FLH

Field day Chairman is needed.

Suggestion

Old Business

Constitutional Review

Tabled

New Business

Appointed Directors

Second director nominations

House Bill 37

Intended to prevent distracted driving

There may be an exemption for Ham Radio re-introduced.

The K7RA Solar Update



Tad Cook, K7RA, Seattle, reports: Except for the first day of the month, we've seen no sunspots through the rest February. I keep <u>watching</u> for possible sunspot activity over the solar horizon. Recently I noticed a promising white area, and, in the past few days, <u>Spaceweather.com</u> pointed out two promising areas just over the horizon.

Average daily solar flux changed slightly from 70.9 to 70.5 over the recent week, and geomagnetic indicators remained quiet.

Predicted solar flux over the next 45 days is 70 on February 27 - March 3, and 71 on March 4 - April 11. Predicted planetary A index is 5 on February 27 - March 3; 12, 12, and 8 on March 4 - 6; 5 on March 7 - 14; 10, 8, 10, 8, 5, 10, and 8 on March 15 - 21; 5, 8, 12, and 10 on March 22 - 25; 5 on March 26 - 30; 20, 15, and 8 on March 31 - April 2, and 5 on April 3 - 11.

Sunspot numbers for February 20 - 26 were 0, 0, 0, 0, 0, 0, and 0, with a mean of 0. The 10.7-centimeter flux was 70.8, 71.2, 70.2, 70.1, 70.2, 70.6, and 70.1, with a mean of 70.5. Estimated planetary A indices were 8, 14, 9, 5, 4, 3, and 4, with a mean of 6.7. Middle latitude A index was 5, 10, 7, 4, 3, 3, and 3, with a mean of 5.

A comprehensive K7RA Solar Update is posted Fridays on the ARRL website. For more information concerning radio propagation, visit the ARRL Technical Information Service, read "What the Numbers Mean...," and check out K9LA's Propagation Page.

(Continued on page 3)

(Continued from page 2)

FOR SALE

Nine (9) aluminum military mast sections sold by the MAST COMPANY, high quality aluminum, each section about 3.75 feet once overlapped on each other for a total height of approximately 34 feet. Brand new in shipping carton. I can bring them to one of the meetings if you are interested. Contact, Bob, K3SRO at dlrwild1@verizon.net

267-535-9189 cell ASKING: \$110 cash or check

Kenwood TS-570D HF Transceiver. 10-160 meters. Automatic Antenna Tuner. SSB and CW (500hz) filters. Includes hand mic, power cord, and original box. PS-40 Power supply for the radio.

Asking \$550.00 for both.

Marty NR3Z Skitch@SkitchFamily.net NR3Z@ARRL.net

A propagation bulletin <u>archive</u> is available. <u>Monthly charts</u> offer propagation projections between the US and a dozen DX locations.

Share your reports and observations.

Courtesy of the ARRL Newsletter

So, you've got yourself a license,

or it's coming but you're waiting for the regulator to get the administration done and for your payment to go through. The excitement is building, you're itching to get started and you've told your family and friends what your new callsign is.

Then the day arrives. Your callsign is allocated, it's paid for and you're allowed to call yourself a licensed radio amateur, a member of the community, a part of history, the next thing in radio.

Now what?

Where do you start on this adventure of a thousand hobbies in one?

The truth is that you already did. Look behind you. You have a license, a callsign and you've found the community, well, at least some of it. How do I know that you found the community? Amateur Radio is a secret, known only to those who bounce into it. That bounce is where you found the community.

Like any community you'll find people you like and people you don't. People who share your interest and people who are doing things that make your head explode.

That said, is there any sage advice that I can share with you on your journey?

I do, but, you're not going to like it. In fact until you've been an amateur for a little while you're possibly even going to hate my advice. I know, hate is a strong word. If it's not all black and white for you, you're going to think I'm chickening

(Continued on page 4)

(Continued from page 3)

out in giving you advice.

Wanna hear it?

Start somewhere, anywhere.

Let me say that again.

Start somewhere, anywhere.

One of the most fundamental aspects of this hobby is that it's driven by your personal exploration, your journey, your imagination and your adventure. It's entirely up to you to decide what you like and what you don't.

I know that there are those who think that advice should come in the form of buying a radio, erecting an antenna and getting on-air. For many that's a journey worth doing. For others that's the beginning of the end of the hobby for them. If you're unsure which of the thousands of activities you'd like to do, since you don't know what they are, I'll tell you a secret.

Neither do we.

Seriously. There are so many things to do in this hobby that not a day goes by that I find a new thing to do and look at. A new toy to play with, or a new adventure to embark on. This morning I realised that the antenna design and build I've been working on represents roughly 600 million different variations. If I did those manually, taking a generous 10 minutes per set -up, I'll be here for nearly 35 years, 8 hours a day, trying another set-up. Clearly my hobby now includes automating antenna modelling.

My point is that there are so many different aspects of life, the universe, and everything that intersect in some way with the hobby of amateur radio that there's bound to be several that you can think of right off the top of your head. You might immediately be dismissing them as foolish, but if we all did that, nothing would ever happen.

If you're looking for ideas, that's a whole different thing. Of course the nearest search engine is a possibility, but I do have to confess, it's a dogs breakfast. Another is to visit your local club and see what others are up to. You could watch YouTube videos or listen to podcasts or read articles. All these are options to get suggestions.

Ultimately, the whole point of this hobby is that you embark on your own adventure, start on your own journey, down your own yellow brick road. If you think what you're proposing intersects with amateur radio, you're right!

That's not to say that there's no benefit to be had from engaging with others, far from it, just that you are the chief architect of your destiny. You're in charge.

So get to it. Go do something, anything. While you're at it, document the adventure. One day you'll be glad you did.

I'm Onno VK6FLAB

ARRL Podcasts Schedule



The February 13 episode of the On the Air podcast focuses on building the hands-free soldering tool from the article, "Extend Your Handheld's Range with a Simple Ground-Plane Antenna," seen in the January/ February 2020 issue of On the Air magazine; a discussion of open-wire feed lines, Ecectic Tech and an interview with a public service volunteer. New On the Air podcast episodes are available monthly.

> The new episode of *Eclectic Tech* podcast goes live February 27. Episode 2 touches on these topics: Most expensive home PC ever; Alexa and amateur radio; solar activity's influence on whales, and a HamSCI update from Ward Silver, N0AX.

Both podcasts are available on iTunes (iOS) and Stitcher (Android) as well as on Blubrry -- On the Air Eclectic Tech.



(Continued on page 5)

Coronavirus Outbreak Postpones Swains Island W8S DXpedition

The <u>W8S DXpedition</u> to Swains Island in the Pacific, set to take place in mid-March, has been postponed until September as a result of travel restrictions imposed on individuals entering American Samoa, stemming from the recent coronavirus outbreak. The Department of Health allows non-residents to enter American Samoa only via Hawaii after a 14-day mandatory quarantine, and the DXpedition was unable to accommodate that requirement.

"Everything is prepared for our DXpedition, and we are eager to go, but unfortunately the coronavirus outbreak is out of our control," the DXpedition team said in announcing the delay. "Although this is a disappointment for everyone, the W8S DXpedition is not cancelled, just postponed for later this year."

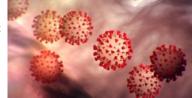
The DX pedition said it would alert the DX community as soon as it has new firm dates for the trip.

Courtesy of the ARRL Newsletter



Alex Gromme, 5B4ALX, has postponed his March 18 - April 2 T30ET DXpedition to Tarawa (West Kiribati) because of the coronavirus (COVID-19) outbreak.

The Kiribati Ministry of Health told Gromme that he would need to be quarantined for 14 days in Honiara, Solomon Islands, before getting medical approval to continue on to Kiribati. "T30ET is currently postponed, *not deleted*," Gromme said on his website. He's now looking at October 2020, assuming the COVID-19 situation is resolved by then. Last week, travel restrictions imposed on individuals entering American Samoa as a result of the coronavirus outbreak caused Swains Island W8S DXpedition organizers to postpone that DXpedition until later in the year. The team members were unable to comply with a 14-day mandatory quarantine in Hawaii. The DXpedition announced tentative dates of September 23 - October 6.



Courtesy of the ARRL Newsletter

It's Never Too Late to Upgrade

George "Buck" Miner, K6RFE, of Sun City, Arizona, has been an active ham since earning his first license in 1956, upgrading to a General-class license 10 months later. It wasn't until January 26, however, that he upgraded to Amateur Extra -- at the age of 94.

Miner began losing his sight at a young age and became totally blind when he was 27. That never slowed him down, however. Over the intervening years, he repaired TVs and sold, repaired, and installed two-way radios. He even managed a 200-acre ranch on the northern California coast, where he fished and dived for abalone.

Miner was a local celebrity, too, producing and hosting a live radio show in Eureka, California -- "Chuck Star and his Rambling Guitar" -- on which he told stories, sang, and played guitar. To facilitate living alone, he learned to cook for himself and has

produced several "Buck's Miracle Kitchen" YouTube videos that humorously demonstrate how he cooks without sight.

Miner has written several books, including an autobiography, My Darkness under the Sun. He's also composed hundreds of songs, including "CQ Boogie," and he continues to play his guitar and sing for fun and profit. -- Thanks to Bob Ringwald, K6YBV

Courtesy of the ARRL Newsletter

Page 6 FEEDBACK

ARRL HF Band Planning Committee Seeks Comments on Recommendations

The ARRL HF Band Planning Committee is <u>seeking comments and suggestions</u> from the amateur radio community on its <u>report</u> to the ARRL Board of Directors. At the Board's January meeting, the committee presented its <u>specific recommendations</u> in graphical form for each HF band and each US license class, with the goal of increasing harmony on the HF bands, particularly between CW and digital users.

"In general, the committee is of the opinion that there is justification for additional space to become available for digital modes, as well as for the operation of digital stations under automatic control," the committee told the Board. "The very changes in spectrum usage that have required our committee's resurgence indicate that digital modes of communication are already increasing in popularity, and the trend is expected to continue or even accelerate. To this end, we have tried to ensure that digital allocations are sufficient for at least a modicum of growth."

The committee also anticipates an increase in automatically controlled digital stations (ACDS). The report further points to "significant use" of modern data modes in emergency communication and said its recommendations provide significant support for the evolution and continued relevance of amateur radio. "Our failure to adapt to these needs could consign amateur radio to the technological scrap heap," the report said.

The committee was revived last summer to consider conflicts between FT and JT modes and other modes. The panel's approach has been to designate distinct assignments for CW, narrowband (NB) data <500 Hz, wideband (WB) data <2800 Hz, and ACDS. For its work, the committee presumed approval of three ARRL petitions to the FCC: RM-11708 (WT Docket WT 16-239 -- "symbol rate" proceeding), RM-11759 (80/75 meter allocations), and RM-11828 (enhanced Technician privileges). The committee also assumed that users can agree to sharing arrangements within a given allocation -- narrow-



band versus wideband sharing within the ACDS allocation, for example. It also took into consideration how mode usage is regulated or planned elsewhere in the world.

In terms of mode classes, the committee agreed on CW, NB data, WB data, NB with ACDS, and WB with ACDS. The committee said it considered these mode classes incompatible and that they should not have overlapping allocations, with the exception of CW, which is authorized within any amateur radio allocation. The committee's approach would maintain the existing low-end 25 kHz CW -only sub-bands for exclusive use by Amateur Extra-class licensees.

The panel encouraged CW identification and a listen-before-transmitting protocol for ACDS, if feasible. It also decided that a single allocation for ACDS without regard to bandwidth would be the best approach. "We note that this will put responsibility on the digital community to hold an effective dialog on the issue and to then self-regulate the users of this segment to adhere to the eventual agreement." A need for flexibility in allocations is desirable, the committee said, and considered whether allocations might be time-of-day or time-of-week dependent, for example.

"Modern amateurs must expect to adapt to this kind of fluid assignment of spectrum to incompatible uses, using time-based sharing, rather than only a single assignment," the committee said, expressing the hope that as band plan/sharing agreements are reached that they consider the advantage of "non-simultaneous sharing possibilities."

Reiterating the position ARRL has taken in recent FCC filings, the committee said it sees encryption and open-source enforcement matters as being outside the scope of the Band Planning Committee.

Courtesy of the ARRL Newsletter

ARRL Creates New HF Band Planning Discussion Group

ARRL has created a new <u>HF Band Planning Discussion Group</u>. HF Band Planning Committee Chair Mike Raisbeck, K1TWF, will moderate the group, which will focus on the ARRL HF Band Planning Committee's recommendations and other band-planning activities. Earlier this month, the ARRL HF Band Planning Committee <u>invited comments and suggestions</u> from the amateur radio community on its <u>report</u> to the ARRL Board.

At the Board's January meeting, the committee presented its <u>specific recommendations</u> in graphical form for each HF band and US license class, with the goal of increasing harmony on the HF bands, particularly between CW and digital users.

Those responding to the initial call for comments and suggestions are encouraged to cross-post their remarks to the new HF Band Planning Discussion Group.

Courtesy of the ARRL Newsletter



Undersea Expedition Planned to Retrieve Titanic's Radio Gear

The company with sole rights to salvage artifacts from the RMS *Titanic* has gone to court to gain permission to carry out a "surgical removal and retrieval" of the Marconi radio equipment on the ship, a *Washington Post* article reports. The *Titanic* sank in 1912 on its maiden voyage after striking an iceberg in the North Atlantic. As the radio room filled with water, radio operator Jack Phillips transmitted, "Come at once. We have struck a berg. It's a CQD, old man," and other frantic messages for help, using the spark transmitter on board. CQD was ultimately replaced with SOS -- which Phillips also used -- as the universal distress call. The passenger liner RMS *Carpathia* responded and rescued 705 of the passengers.



As might be expected, the deteriorating Marconi equipment is in poor shape after more than a century under water. The undersea retrieval would mark the first time an artifact was collected from within the *Titanic*, which many believe should remain undisturbed as the final resting place of some 1,500 victims of the maritime disaster, including Phillips. The wreck sits on the ocean floor some 2 1/2 miles beneath the surface, remaining undiscovered until 1985.

A just-signed treaty between the UK and the US grants both countries authority to allow or deny access to the wreck and to remove items found outside the vessel. "This momentous agreement with the United States to preserve the wreck means it will be treated with the sensitivity and respect owed to the final resting place of more than 1,500 lives," British Transport and Maritime Minister Nusrat Ghani said in a statement.

The request to enter the rapidly disintegrating wreck was filed in US District Court in Eastern Virginia by RMS Titanic, Inc. of Atlanta, Georgia, which said that it hopes to restore the *Titanic* radio transmitter to operating condition, if it is allowed to go forward.

The company plans to use a manned submarine to reach the wreck and then deploy a remotely controlled sub that would perforate the hull and retrieve the radio equipment.

Courtesy of the ARRL Newsletter

FAA's Proposed Remote Identification Rules Would Affect Drones, Hobby Planes

The Federal Aviation Administration (<u>FAA</u>) is proposing to require remote identification of so-called "unmanned aircraft systems" (UAS), which include drones and hobby aircraft. A growing number of radio amateurs utilize camera-equipped drones for aerial photography purposes, to examine antenna systems, and to operate hobby aircraft remotely on amateur radio frequencies. Comments on the *Notice of Proposed Rule Making (NPRM)* in <u>Docket FAA-2019-11</u>, are due by March 2.

"The remote identification of unmanned aircraft systems in the airspace of the United States would address safety, national security, and law enforcement concerns regarding the further integration of these aircraft into the airspace of the United States while also enabling greater operational capabilities," the FAA said in proposing the new requirements.

The FAA defines remote identification, or Remote ID, as the ability of an in-flight unmanned aircraft "to provide certain identification and location information that people on the ground and other airspace users can receive." The FAA called the move "an important building block in the unmanned traffic management ecosystem."

"For example, the ability to identify and locate UAS operating in the airspace of the United States provides additional situational awareness to manned and unmanned aircraft," the FAA said. "This will become even more important as the number of UAS operations in all classes of airspace increases. In addition, the ability to identify and locate UAS provides critical information to law enforcement and other officials charged with ensuring public safety."

The FAA said it envisions that the remote identification network "will form the foundation for the development of other technologies that can enable expanded operations."

With few exceptions, all UAS operating in US airspace would be subject to the rule's requirements and would have to comply, "regardless of whether they conduct recreational or commercial operations, except those flying UAS that are not otherwise required to be registered under the FAA's existing rules."

Courtesy of the ARRL Newsletter

Page 8 FEEDBACK

CLUB INFO

PUBLIC SERVICE

CLUB STATION

The WARC club station is open to anyone with an interest, on the first Thursday of the month (meeting night) between the hours of 6:30 and 7:30 pm. with the exception of the December dinner meeting For further information, call George Brechmann N3HBT at 215-443-5656.

WARC ALUMNI MEMBERSHIP

An Alumni membership category is available for WARC members who are unable to attend meetings and club activities on a regular basis because of health considerations, travel impediments, or other hardships. Dues for the Alumni membership are \$10.00 annually and are approved by the Board. Please contact the Membership Committee for more information if interested."

ATTENTION MEMBERS

The Membership Committee can provide Club badges. Two types are available: an engraved plastic callsign and name badge for \$8 or a free, laminated plastic, photo ID badge/card. The photo id badge is included with your membership. Pictures for the club badge will be taken before club meetings on even numbered months. If you do not have at least a Warminster Amateur Radio Club badge with your picture on it, please contact your Membership Chairs at the WARC monthly meetings. Otherwise, please contact Membership by email at: membership@k3dn.org.

If you want to have your picture taken to be placed on the 'Members' Photos' section of the www.k3dn.org website, please contact Membership with your interest. When we get enough people who are interested we will post a notice in Feedback and have a camera ready at the following club meeting.

PROGRAMS 2020

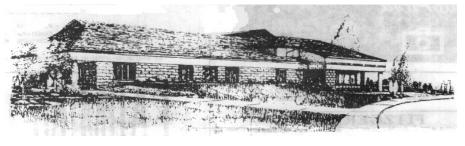
March 5 - Homebrew Night

April 2 - Civil Air Patrol, Chris Trotter KB3CET and Hamfest Preparations

May 7 - Hamfest Debriefing

June 4 - Pizza Night

The Club Station - K3DN - is located at the Benjamin Wilson Senior Center, Delmont Avenue, Warminster, PA. The station is open for club members and the interested general public on the first Thursday of the month (meeting night) between the hours of 6:30 and 7:30 pm. with the exception of the December dinner meeting . The station is fully operational on HF (80 meters through 10 meters) both phone and CW. There is an assortment of amateur radio shareware which may be copied under the shareware licensing agreement.



For additional information on the Club Station please call the Station Manager N3HBT - George at 215-443-5656.

WARC Meetings are held the first Thursday of each month at 7:30 pm at the Benjamin Wilson Senior Center, Delmont Avenue, Warminster, PA. Talk in is available on the 147.09 & 443.950 repeaters.

2020 Contest Calendar

March

7-8 International DX- Phone

0000 UTC Saturday; ends 2359 UTC Sunday

April

19 Rookie Roundup - Phone

1800 to 2359 UTC

June

13-15 June VHF

1800 UTC Saturday, runs through 0259 UTC Monday

20 Kids Day

1800 UTC through 2359 UTC

27-28 Field Day

800 UTC Saturday and running through 2059 UTC Sunday

OSO Parties

Oklahoma 1500Z, Mar 14 to 0200Z, Mar 15 and 1400Z-2100Z, Mar 15

Idaho 1900Z, Mar 14 to 1900Z, Mar 15 Wisconsin 1800Z, Mar 15 to 0100Z, Mar 16

Virginia 1400Z, Mar 21 to 0400Z, Mar 22 and 1200Z-2400Z, Mar 22

> ATLANTIC DIV. HAMFESTS > 2020

March 21

Fredfest 2020

Independent Hose Company 300 Baughmans Lane Frederick, MD 21701 http://frederickarc.org

April 18

DELMARVA Amateur Radio and Electronics EXPO, ARRL Delaware State Convention CHEER Community Center 20520 Sand Hill Road Georgetown, DE 19947 http://www.radioelectronicsexpo.com

April 25

York Hamfest

ELICKER'S GROVE PARK 511 Roth Church Road Spring Grove, PA 17362 http://www.yorkhamfest.org/

May 3

Eastern Pennsylvania Section Convention (Warminster ARC Hamfest)

Bucks County Community College - Lower Bucks Campus 1304 Veteran Highway Bristol, PA 19007

http://www.k3dn.org/hamfest/

May 24

Memorial Weekend Hamfest

Howard County Fair Grounds 2210 Fairgrounds Road West Friendship, MD 21794 http://www.marylandfm.org

V.E. TEST LOCATIONS

Confirm all information, in advance, with the contact person. Licensed applicants must bring the original, and one photocopy of their license. All applicants, including children, must bring two forms of positive ID. Also bring the original, and a copy, of any Certificate of Successful Completion needed to prove current status. The ARRL VEC'S 2020 test fee is \$15.00.

Warminster Amateur Radio Club, Monthly, Last Mon. 7:00 pm at the Wilson Senior Community Center 580 Delmont Avenue Warminster, PA 18974

son Senior Community Center 580 Delmont Avenue Warminster, PA 18974 George Brechmann (215) 443-5656.

Atco, NJ, The fourth (4th) Tuesday of each month, at 7 p.m. Winslow Township Senior Center, 33 Cooper Folly Road, 08004-2603.

Mark (K2AX) jtra@comcast.net

Levittown, PA, Monthly, 3rd Monday at 6:30. Falls Township Building - Ben Johns, K3JQH, 215-657-5994

Telford, PA, RF Hill ARC. Indian Valley Library. Held the third Monday of odd months (January, March, May, July, September, November)
Contact: Jim Soete 215-723-7294
wa3ylq@arrl.net.

Philadelphia, PA, Testing is done on the 4th, non holiday Thursday of the month at the, Community Ambulance Association of Ambler, 1414 E Butler Pike, Ambler PA 19002 at 7:00 PM We also are testing on Saturdays at least once per quarter at 9:00 AM. For further information contact James McCloskey at jmccloskey@msn.com and by phone 215 -275-2979.

Lansdale, PA Testing on the fourth non-holiday Thursday of the month starting at 7:00 PM. The Lansdale Library Community Room Vine St. and Susquehanna Ave. Lansdale, Pa. Registration is required 48 hrs. or more before the scheduled exam date. If there are no registrations the scheduled exam date will be canceled. NO WALK-INS. You can register by contacting:

Olaf N. Markert - Phone (610) 517-5074, E-mail w3pa@arrl.net
Alt Contact: Jim, 610-287-5630

Page 10 FEEDBACK

SKYWARN INFORMATION

Bucks County SKYWARN Weather Spotter PRIMARY FRE-QUENCY: 147.300MHZ (+ 131.8)

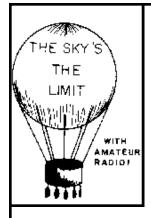
Fairless Hills, PA (many remote access locations throughout Bucks County)

Mount Holly NWSFO SKYWARN Homepage:

https://www.weather.gov/phi/Info

SKYWARN Basic Weather Spotter Educational Programs URL:

https://www.weather.gov/phi/classes



The Warminster Amateur Radio Club Announces Free Ham Radio Instructional Classes

If you're interested in Ham Radio, or think you might be, this is your opportunity. Perhaps you'd like to learn about digital communications, VHF, UHF, satellite, or perhaps you'd rather sit down and chat with someone in South Africa, Russia, Great Britain or in the space station.

Start second Monday of March at 7:00 Technician, General & Extra

For further information contact George Brechmann, N3HBT at 215-443-5656.

Bucks County Amateur Radio Emergency Service (BCARES)

www.bucksares.org

Bucks County ARES will be on the air Wednesdays, at 9:00 PM. We will be using Warminster Amateur Radio Club's repeater on 147.090, pl 131.8. This net is linked as shown in the Net Schedule box for the Wednesday night net. It may also be linked to 147.300.

Winlink Gateway Stations:

Lower Bucks NY3J-10 145.530 Bensalem

	N	Net Schedules	
Sunday Wednesday	2000 2000	10 Meter Net 28.445 MHz 2 Meter Net 147.09 Rptr.	
Wednesday	2000	Linked w/ 2 Meter Net 443.95	
Rptr.Wednesday Sunday	2000 2030	Linked w/ 2 Meter Net 53.230 Rptr. Informal Net 223.5 Simple	ex
Thursday	1900	Mont. Cnty RACES Net 146.835 Rptr.	

CLUB EQUIPMENT

WARC has 2 Baofeng UV-5R dual band HT's and a Yaesu FT-2900 2M mobile that are available for use by members of the club. The radios are available on a month-by-month basis and have been purchased primarily to help new hams get on the air. However, they may also be used by any club member who is in need of a temporary 2-meter radio. They are also available for use by participants in WARC's public service activities. DE, Tony Simek N3YNH

Area Repeaters

VHF

145.310 R.F. Hill

145.350 Doylestown R.C.

146.790 Penn Wireless

145.330 Hilltown

146.670 DVRA

146.685 Holmesburg

146.925 Willingboro

147.000 Ham Buergers

147.030 Phil-Mont

147.090 Warminster 147.270 Frankford

147.300 BEARS

147.390 CBRA

220

224.580 PackRats

223.76 K3NAL

UHF

442.650 DVRA

443.250 TAG

443.050 Metro-Comm

443.950 Warminster

444.200 BEARS

447.475 WR3B

448.225 Penn Wireless

444.759 RF Hill Analog/ Fusion

D-STAR

146.61000 K3PDR DV 445.18125 K3PDR DV 445.01875 AA3E Montco RACES

6 Mtr

53.030 WA3BXW 53.230 N3DQZ 53.320 K3MFI

Are you submitting an article for the Feedback?

Contributions of articles to be published are always accepted for consideration. Please follow these guidelines:

- E-Mail to:
 - wa4ywm@comcast.net Or via snail mail to: FEEDBACK EDITOR

Warminster Amateur Radio Club Box 113

Warminster, Pa 18974

- Use both upper and lower case letters.
- Use your program's spell check.
- If you don't have a computer, then typewritten sheets are o.k, but please use both upper and lower case,
- Put your name and call at the beginning or end of the article, and show credits if you are using material from another source.
- Deadline for articles is the Saturday before the regular meeting.

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The annual dues rate structure is as follows:

Full Member: \$ 20.00 2nd FamilyMember: \$ 10.00 Student: \$ 10.00 Alumni: \$ 10.00

> Are your dues current?

2020 Officers

Executive Officers

President	Marty Squicciarini	NR3Z	215-872-9644
Vice-President	Tony Simek	N3YNH	
Secretary	Norm Miles	AB3ZZ	267-625-9117
Treasurer	Herb Hickmott	KB3VMN	267-718-3601
Director (A)	Doug Becker	KC3MNQ	
Director (E)	Larry Abbott	WA3ELQ	215-704-3282
Director (A)	Brandon Penglase	N3UO	215-259-7255
Director (E)	George Brechmann	N3HBT	215-443-5656
Past President	Tony Cuttone	W3FLH	267-679-9297

Committee Chairpersons

ARES/RACES Liason	n Karl Harris	K3KH	215-264-1855					
ARRL Liason	Irwin Darack	KD3TB	215-343-8170					
Awards Manager	Vince Pironti	KD3TC	215-674-0446					
Classes	George Altemus	KA3WXV	215-855-3856					
Digital and APRS	Ron Wenig	NY3J	215-638-9257					
Feedback Editor	Jim Elmore	WA4YWN	1215-538-1889					
Field Day 20	Doc Whitticar	W3GAD	215-968-6397					
Hamfest 20	Michael Shanblatt	W3MAS	267-491-5773					
Hamfest 20	Tony Cuttone	W3FLH	267-679-9297					
Hamwear	Kathy Acker	KC3FBY	215-815-7978					
Holiday Dinner	George Brechmann	N3HBT	215-443-5656					
Membership	Mary Miles	KC3KJZ	267-625-8538					
Net Manager	George Brechmann	N3HBT	215-443-5656					
Publicity	Bernice Kraut	KB3PCX	215-884-8195					
Refreshments	Brandon Penglase	N3UO	215-259-7255					
RF Interference	Andy Vavra	KD3RF	610-287-3295					
RF Interference	Bill Ballantine	K3FMQ	215-766-0764					
Repeater Coordinator	Brian Taylor	N3EXA	215-257-6303					
Safety Officer	Mike Malone	W3MJM	215-639-2175					
Station Trustee	George Brechmann	N3HBT	215-443-5656					
Sunshine Club	Ken Lichtenstein	K9KJL	847-697-1188					
Township Liason	George Brechmann	N3HBT	215-443-5656					
VE License Testing	Larry Abbott	WA3ELQ	215-704-3282					
VHF/UHF/MW	George Altemus	KA3WXV	215-855-3856					
Website Coordinator	Al Konschak	WI3Z	215-491-9941					
Youth Programs	Steve Larson	WW3Y	215-822-1511					