



# ZERO BEAT

## Meeting Notice

The meeting room at the Holyoke Hospital is still on hold at this time. Until this changes, meetings will continue to be held on Zoom. Meeting links are in each months "From the Presidents Shack"

## Welcome New Members

Richard Duffy — (no call)

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## Our 74th Year as a Club!

March 2022

From the editor,

As you read this issue the sun is getting warmer and the days longer, pretty soon we will all be complaining it's too HOT! After all we are New Englanders :-)

Lots to read this month including an important message in "The Presidents Shack".

Plenty of contests and special event stations out there so sitting in front of your HF radio is a great way to warm up these chilly Winter days and nights.

Bill, W1FMX and Smitty, KC1IKA both have great articles. Plus, Phil Temples, K9HI has a fantastic fiction short story, titled "O'Holy Night" and I have one that I think you will find very informative, titled "APRS, What it is and why bother?"

This month's "Show Us Your Shack" features more images of the ISS via SSTV from Bob, WA1OJN. Plus, learn what type of gear it takes to work the satellites. If you want to see your shack featured in "Share Your Shack" send me a few photo's and a brief description of your shack to [kd1ku@arrl.net](mailto:kd1ku@arrl.net).

Is there anything special that you would like to see in future issues of Zero Beat? Drop me an email at [kd1ku@arrl.net](mailto:kd1ku@arrl.net). The Holidays are in the rear view mirror and I hope to see everyone at the next regular Zoom meeting or STK presentation.

73, Ken - KD1KU

## March 4th Meeting

This month we have a very special presentation!

**All About The New England Forest Rally by Paul, W1SEX**

*Even if you're not an auto racing enthusiast you will enjoy this!*

The Zoom meeting begins at 7pm with a social rag chew 1/2 hour  
Regular Zoom meeting begins at 7:30pm on Friday, March 4th



# Upcoming Zoom Meetings and Guest Speakers



Everything you need to know to work satellites with equipment you already own by Gary, AA1UE



Fred Kemmerer, AB1OC will speak on his plans to be the next NE Director. After his presentation he'll be taking questions from you. This is your chance to ask him your questions... one on one.



November 5th 2021

How you can create and maintain your very own You Tube channel. Plus, How you can start your own POTA Activation by Rob, N1NUG



The Annual HCRA Holiday Party at The Steaming Tender Restaurant December 6th, 6:30 to 9:30pm A Night of Food and Fun! (subject to change due to Covid variant)



All About EMCOMM or Emergency Communications including Go-Boxes and several ways to power off grid operations by Charlie, KC1IKA



Ken Caruso, W01N ~ President of the Yankee Clipper Contest Club will be giving a special presentation about the YCCC and what its all about!



All About The New England Forest Rally by Paul, W1SEX



Show and Tell is back... Enter your projects and win prizes! This has always been one of the very best and most interesting meetings



All about Antenna Modeling and how it benefits you by Greg, WA1JXR



Elections, Field Day prep and more. Please consider running for a board position, HCRA is better with you involved!

# SHARE THE KNOWLEDGE MEETINGS

## STK ZOOM MEETING SCHEDULE FOR 2022

Share the Knowledge Zoom meetings have been a success and have been attracting a large audience! These presentations feature a wealth of knowledge and are geared for today's ham radio operator!

Watch the Reflector Email List, Facebook and Zero Beat for the Zoom access link prior to each Share the Knowledge Zoom meetings. Larry, W1AST has been working hard to put all of these STK meetings together for everyone's enjoyment!

**Mark the following dates on your calendar, whatever you do don't miss a single one!**  
**All STK presentations are held on Tuesday evenings at 7pm**

January 18th - 7pm	Featuring the Long Island CW Club	By Rich, K2UPS 
January 25th - 7pm	D-Star - What is it and how to use it	By Cory, KU1U 
February 8th - 7pm	Introduction to FT8 & FT4 Digital Modes	By Dom, N1DM 
February 22nd 7pm	Traffic Handling and the Radiogram	By Marcia, KW1U 
March 8th - 7pm	JS8call: What it is & what it does for you	By Aaron, KF1G 
March 22nd - 7pm	SOTA: How to activate	By Harold, N1FTP
April 5th - 7pm	The W1 QSL Bureau - What it is and what you need to know about it	By Eric, KV1J
April 19th - 7pm	Using Propagation Prediction Software	By Dennis, W1UE

**Did you miss any of the Share The Knowledge presentations? Want to watch one again?**

**Watch any of the past STK meetings by clicking or copying the link below**

[https://www.youtube.com/channel/UCNXFxFYBbWxF5BxELHHF\\_ZQ](https://www.youtube.com/channel/UCNXFxFYBbWxF5BxELHHF_ZQ)



## March 2022 - From the Presidents Shack

In the past week, two people contacted me saying they took the last HCRA Tech class on Zoom, had a great time, they thought the teacher (N1TA) was fantastic AND wanted to know when we were doing another Tech class and a General Upgrade Class?

That shows excellence and confidence in the HCRA. So much so that they want more classes.

We, the HCRA board, have been looking for someone to organize and volunteer to hold either a General Upgrade and a Tech class since last September. So far, no takers. None whatsoever!

I've had several people tell me they will help with a live and in person class, but NOT a Zoom class. I've had one person tell me they will help with any kind of classes we organize. Just one.

As we enter our third year of dealing with Covid, changed ways of doing things is the new normal. In person classes are not yet realistic. In person meetings are not yet realistic. Zoom meetings will be around for a while yet.

For the HCRA board meetings, Zoom has been fantastic and so convenient and will be how we do our board meetings for a long time.

The HCRA monthly meeting, like most other clubs across New England will be on Zoom for a while now. I'm hoping September may allow us in person meetings, but if not, more Zoom for everyone.

*Zoom classes are the new way to teach. Other clubs are doing it very successfully.*

I hate referring potential students away from the HCRA to other online classes being held elsewhere in New England.

### **Why can't the HCRA get volunteers to teach more Zoom classes? Why won't YOU volunteer?**

In pre-Covid days, we used to do one or two Share The Knowledge (STK) sessions per year. Usually, some sort of build project or something useful to learn about. But now, in these Covid times, things are different.

**We're lucky to have two Share The Knowledge sessions per month from January through April this year. The STK sessions this year** are basically mini-meetings on certain topics and last 30 to 60 minutes on average. They are here for you to learn more about all sorts of different things and ask questions.

Topics that you may be curious about, or something you want to do or maybe something to pick up more info on something you already do.

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# FROM THE PRESIDENTS SHACK CONT'D

So far, we have had STK's on the following topics: Long Island CW Club, D-Star, Intro to FT8/FT4. By the time you read this, Learning about Traffic Handling will have occurred too.

**Here are the next topics:**

- JS8Call – What is this digital mode?
- SOTA – Summits on the Air – all you want to know
- The W1 QSL Bureau
- Using Propagation Prediction Software

By the end of the last STK session, it will be much lighter and hopefully much warmer and people will be outside more. We're halting the STK sessions at the end of April and will start them up again next January.

**See page 3 for dates, times and links to the videos of past meetings on HCRA.org**

**One of the most interesting and fun meetings is the Show and Tell each April.**

I look forward to it every year. S&T is a great time to show off the project or kit you have worked on since the last S&T last year. I've already heard from a few people saying they have something to show to you all. Will you have something too? No project is too small. There will be prizes for everyone that participates this year. Will you get one?

**What are you doing at 7:00 pm on Monday nights?**

Finish your dinner, turn on your HF radio (you Tech's too) to 28.375 and join us at 7:00 pm for the HCRA 10m net. Lately we've had check-ins from the South and Midwest join us as 10m opens longer. Join the net for fun & interesting conversation. Join the rotating net controls and keep this net active.

I hope to hear you on the air.

Best 73,

Larry, W1AST

**March 4th Zoom meeting link. Pre-meeting chat at 7pm, meeting at 7:30pm**

<https://us02web.zoom.us/j/81549772727?pwd=UWhjb2gwb2lxRGdkbU9BMGo4bFVxdz09>

# SLOWING A “BUG”

HOW TO SLOW YOUR BUG DOWN IN LESS THAN TWO MINUTES!

Many years ago, when I first got my General class license, an “Elmer” lent me a Vibroplex semi-automatic code key, a “Bug”, so I could try it and learn to send more rapidly as I was operating CW most of the time. After a couple of months, I had developed some proficiency with the “Bug”, but had to return it (actually, the Bug belonged to a high school girlfriend’s father... you know how that goes :-)

Well, after longer than I could have imagined, I finally bought a Bug for myself. But I found that mastering it again has been an uphill battle, so it was mostly just collecting dust. Another issue was that using the Bug with my modern Icom transceiver produced a less than clear series of “dits”.

One solution for the Icom issue is to build a “debugging” circuit interface (I plan to do that later) then, I saw someone refer to a Vibroplex 409V Round Arm Vari-Speed attachment that could be used to slow a Bug down to 13 words per minute (WPM).

The Vari Speed arm is list priced at \$35.



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# SLOWING A “BUG” Cont’d

HOW TO SLOW YOUR BUG DOWN IN LESS THAN TWO MINUTES!

The “Vari-Speed” is added to the Bug by removing the original speed weight from the main rod and installing a new adjustable collar that slides onto the main rod. The adjustable collar is designed to support a smaller rod that can be adjusted to extend at various angles while it is used with the speed weight.

Adding the Vari-Speed is easy and takes no longer than 2 minutes.



The Vari-speed allows the user to adjust a Bug to operate at speeds that would be typical of a straight key. I have reset my Bug now, dropping it from a setting of about 20+ WPM, to about 13 WPM which allows me to use the key comfortably and without being “sloppy” to send clear sounding Morse Code “dits”.

73, Bill ~ W1FMX

## 2022 Field Day Logo





# SHOW YOUR SHACK PART II!

PART TWO OF THE ISS ON SSTV PLUS IMAGES OF HOW IT'S DONE!

This month's shack features additional images of the International Space Station captured via Slow Scan Television by Bob, WA1OJN. In this second part we will see what it takes to get such wonderful images!

Bob shared photos of his shack and some of the gear he used to capture these fantastic photos. His new satellite system, antenna array, azimuth and elevation rotors, rotor control box along with his home brew computer interface on the top, made with an Arduino. (image 1&2)

Another of the images on the following page shows Bob at his HF station in his shack where an Icom 7300 resides with a homebrew multi band dipole and a 80 meter dipole. (image 3)

The yellow rack holds two Yaesu FT-817s for satellite work along with two amps on the red rack. One for 2 meters and the other for 70cm both being fed by the FT-817's. (image 4)

Besides the dipoles, he has a three element 6 meter yagi for working DX too.

Bob's good ol' novice Heathkit receiver sits on the shelf to the right side of the photo, this classic was built way back in 1972! (image 3)

Images 5-8 show such great detail and are the direct result of Bob's hard work. You can also capture photos of the ISS with far less equipment.

Be sure to read the captions below Bob's photos and enjoy his fantastic contacts with the ISS!



1) AZ / EL Rotor and control plus Bobs interface on top



2) Dual M2 Yagi Array's for Satellite Communications

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# SHOW YOUR SHACK PART II! Cont'd

PART TWO OF THE ISS ON SSTV PLUS IMAGES OF HOW IT'S DONE!



3) Bob, WA1OJN sitting in the operators position



4) Two Yaesu FT-817s feed his two amplifiers



Want to see your shack in Zero Beat? Send a few pics with a brief description to [kd1ku@arrl.net](mailto:kd1ku@arrl.net)

# AUTOMATIC PACKET REPORTING SYSTEM

## APRS, WHAT IS IT, AND WHY BOTHER?



We've all heard about APRS, and probably have jumped to the conclusion that it's only used for sharing our location and perhaps what simplex frequency or repeater that we're monitoring. Prepare to have your mind blown if you share that misperception that I had not all that long ago.

APRS is a very handy multi-tool to perform the following tasks without direct access to the Internet.

- Share your location and status, for casual communications; and when coordinating large-scale events such as marathons, bicycle rides, search and rescue missions, etc.
- Send messages to another APRS operator or group of operators
- Send cellular SMS text messages and short emails to non-ham family and friends
- Look up nearby repeaters in an unfamiliar location
- Look up satellite and International Space Station (ISS) passes
- Retrieve the current and weather forecast
- Spot yourself for Parks On The AIR (POTA) and Summits On The Air (SOTA) activations where there is no cellular connectivity
- Get notified when there is Winlink mail waiting, and even retrieve and reply to messages

For information on how to do the above, I'm sharing an APRS Commands document that I've printed duplex (on both sides) and keep in an analog information binder which I keep with my radio in case I find myself off-grid.

But it's only VHF, and requires the Internet

One may argue that APRS is only available on 2-meters and requires an Internet connection at the node or gateway that's receiving your transmissions. That, too, is incorrect. Yes, APRS is primarily available nation-wide on the FM frequency 144.390 MHz, simplex. Some gateways are connected to the Internet, and some relay your messages to other nodes that are connected.

APRS is also available via satellites and the ISS, and the JS8CALL mode can relay APRS information from HF stations. Use of these methods are meaty topics beyond the scope of this short article, but I offer the following references:

- APRS via Satellite: <http://www.aprs.org/astars.html>
- APRS on the ISS: <https://amsat-uk.org/beginners/how-to-work-the-iss-on-aprs-packet-radio>
- APRS via HF JS8CALL by Jason KM4ACK: [https://www.youtube.com/watch?v=qP-stm\\_UF4A](https://www.youtube.com/watch?v=qP-stm_UF4A)

### How do I use it?

APRS is a digital mode that allows the transmission of plaintext data to be transmitted as audio over the airwaves. That audio is typically transmitted by FM at 1200 baud. Some experimentation is being done with FSK at 9600baud. Baud is measured in bits per second, a single character or letter requires 8 bits. A modem is required to modulate and demodulate the data to and from audio for transmission. This may be built into a radio, a separate TNC modem may be used, or a software program running on an electronic computing device, PC, tablet, cellular phone.

### Radios

A handful of radios on the market include a built-in APRS modem, allowing the operator to send and receive messages, coordinates, and information right from the radio. This is by far the simplest method.

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# AUTOMATIC PACKET REPORTING SYSTEM CONT'D

## APRS, WHAT IS IT, AND WHY BOTHER?

These include but are not limited to: the Kenwood TH-D72A handheld and the TM-D710GAmobile radio, the Yaesu FT-3DR handheld, the FTM-300DR and FTM-400XDR mobile radios, the ICOM ID-5100A mobile radio, the Anytone AT-D878UVII Plus. The Kenwood radios may also function as a TNC modem for your computer, should you want to map the coordinates of other operators or enter messages with a more convenient keyboard, or connect to packet radio nodes. Typically, a USB A-to-B cable is required, and the APRS or packet radio software configured to communicate with the radio over a serial COM port. The radio does all the modulation, sending and receiving only the data with the computer.

Some radios will offer a data port, often in the form of a 6-pin DIN port that looks like the old PS/2 keyboard connectors. This allows you to interface the radio with a TNC modem or to a soundcard-based software modem. The Yaesu FT-7800r and similar models include this port.

Other radios may be used such as commercial and emergency services surplus or simple analog handheld radios, but a custom cable would be required to get audio to and from the radio and key the PTT circuit. Many cables are available after-market or can be built from schematics by the savvy amateur radio operator. There are a few radios on the market that have a USB interface such as the Yaesu FT-991a and ICOM IC-705. These radios are much more expensive, but allow you to easily get the sound, PTT, and CAT control directly from the radio to a computer without additional hardware.

### Sound Interface equipment

For those radios with a data port or a custom cable, the simplest way to get them operational on digital modes such as APRS is with a soundcard interface. Here are some options:

- **Signalink** – This was the first sound interface I learned about. They're now one of the pricier options at \$135 and require a jumper module installed in addition to radio-specific cables to make them compatible with the various radios that you'd connect them to.
- **Mobilinkd TNC3** – This is a battery powered Bluetooth KISS TNC. It was primarily built to allow hikers to toss their handheld radios and this device in their pack and use their mobile device to operate APRS. The TNC can be connected just as easily to a mobile radio. There are many aftermarket cables on their site or available via <https://hammadeparts.com>. Connect to this device with your mobile Android phone running APRS Droid or your computer and a sound modem using Bluetooth. The extra versatility of this device has it coming in at about \$125.
- **DigiRig** – These guys popped up very recently on the market, and for the price of \$40-50 plus \$20-30 for customized cables if you wish to use them, you also get CAT control for radios that support it.
- **DINAH** – These guys initially built this affordable interface for building AllStar nodes, which allow repeater owners to connect to other repeaters over the Internet. They quickly learned that it was very handy for any digital mode that required modulation, such as APRS and packet. This is the simplest device to connect to a radio with a DIN port, as it too has a DIN port, a simple and cheap DIN cable is required.
- I would add that some advanced tinkering in Windows is required to get PTT to work at this time, but it works very well with a Raspberry Pi running Direwolf. In fact, they're building a custom attachment for the Pi Zero for the Appalachian Trail Golden Packet group. More on them later. The DINAH can be purchased as a kit for \$40 or assembled for \$50.

Remember these sound interfaces can also be used for other digital modes too, further justifying their cost!

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# AUTOMATIC PACKET REPORTING SYSTEM CONT'D

## APRS, WHAT IS IT, AND WHY BOTHER?

### Sound Modems

If you're using a mobile Android phone or tablet with APRS droid, you can skip this section: the software has a built-in sound modem. For those who want to connect a computer to the radio with one of the above sound interfaces for use with APRS or packet radio, you'll want to run one of these sound modems:

- **UZ7HO SoundModem** – This is my go-to recommendation. It is probably the simplest to get working, it runs on Windows or Linux and you can monitor the packet traffic from its window.
- **AGW Packet Engine** – This is another great graphical user interface (GUI) based sound modem. Download AGWPE, not the Packet Engine Pro shareware. I've found AGWPE worked much better.
- **Direwolf** — This is a console-based application. Setup is done by configuration files. While it's a bit more difficult to set up, it's a very solid and stable application.

### APRS Software

At this point, you have your radio connected either directly to your electronic device or computer, or you are using a sound interface that is connected between your radio and computer/device. Now you need the APRS software. As usual, there are many, many options.

For mobile operation, I must recommend APRS droid. It is simple to set up, and simple to use.

What about Apple? I'm afraid that I am not an Apple user, so I'm un-able to recommend any personal opinions on the best software or equipment for an iPhone, iPad, MacBook, iMac, etc. If an Apple user has some personal recommendations, please submit an email to Cory, KU1U at [cory.m.golob@gmail.com](mailto:cory.m.golob@gmail.com)

### But how do I set it up?

The answer to that question varies with every option, which is numerous. I may submit future articles that break down some of the methods that I have found effective.

In the meantime, I have hopefully piqued your interest!

Thank you to the author of this article, Brad ~ KC1JMH  
and  
The Editor of the Maine Telegraph, Cory ~ KU1U

*Please watch for future articles on the ARES topic and everything it can do for you in so many different applications! If you don't know anything about ARES this is your chance to learn something new.*

*73, Ken ~ KD1KU*

# WMA ARES ASEC Net Manager Update

## NET CONTROL STATION RECRUITMENT STATUS REPORT

02/06/2022 Smitty, KC1IKA

Greetings everyone!

We are continuing to make progress with operators stepping up to be trained as Net Control Stations. We now have three new Net Control Stations.

**W1AEZ, EZ** in Holyoke has done two great Sunday morning shifts and is continuing to get even better. He will be NCS on the 4th and 5th Sundays of each month.

**KC1IZC, Mike** from Agawam just did his first shift and will be NCS on the 2nd Tuesdays of each month. Thank you, Mike, for helping and taking a shift.

**W1IKW, Ian** from Southwick will be doing his first NCS shift on the 4th Tuesday in February and will be back every 4th Tuesday after.

**KC1JZR, Gary** in Holyoke is covering the rest of the Tuesday shifts on the 1st, 3rd, and 5th Tuesdays.

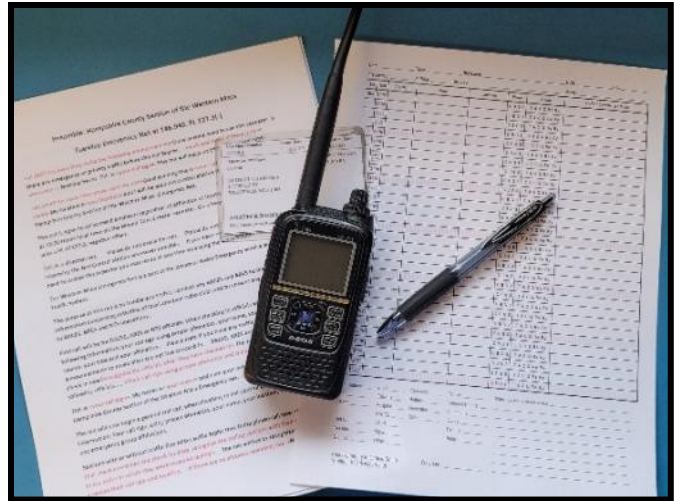
**KC1IKA, Smitty** in Westfield is covering the rest of the Sunday morning shifts on the 1st, 2nd and 3rd Sundays of the month.

We still need three more operators to complete the roster. If you sign in each week to the ARES nets please consider becoming a net control station. It will only be once a month and adds just five minutes to the time you are already spending signing into the nets. You just need to fill out a spreadsheet and send it to the net manager, Smitty, KC1IKA.

We will provide all the training and forms. The net preambles and tracking forms are on the HCRA website so you can see what is involved. Thank you Vanessa, W1IRL, for putting them on the website! This may make you a better operator when it comes to listening and writing down contest information.

New Net Control Stations are usually concerned with not being able to write as fast as it takes to fill in the log sheet. The great thing about being NCS is you get to ask the stations to repeat their information slower so you can write it down. You are in control of the pace and can ask as many times as it takes to get the information.

If you have any questions or would like to sign up for training, please contact Smitty, KC1IKA at [kc1ika@arrl.net](mailto:kc1ika@arrl.net). Smitty is the Assistant Section Emergency Coordinator and Net Manager for Western Mass ARES.



73,

Smitty, KC1IKA  
ASEC, Net Manager, WMA ARES

# WANTED

## SHOW AND TELL PROJECTS

Get your Show & Tell projects completed before the April regular meeting. Whether we will be meeting in person or via Zoom is anybody's guess but have your Show & Tell projects done!

For more info email Larry at the address below

**[HAMOP.W1AST@GMAIL.COM](mailto:HAmOp.W1AST@GMAIL.COM)**

Finish up your projects for the Show and Tell presentation at the April meeting! No matter if it's built from a kit or scratch, be sure to show it off during your presentation and all entries will have a chance at winning some fantastic prizes!

Questions or any other info you need contact Larry at [HamOp.W1AST@gmail.com](mailto:HamOp.W1AST@gmail.com)



# O' HOLY NIGHT

A FICTIONAL RADIO THEMED SHORT STORY BY PHIL TEMPLES, K9HI

My walk down a snow-clogged sidewalk in an unknown city is suddenly interrupted when I'm jolted awake by my bedside alarm. It was only a dream. The clock reads 1:53 A.M. I'll be up and occupied for at least the next two hours. This morning's quest: to try and receive radio station KXZ in Marion, Montana. It's a 5,000 watt AM broadcast station that ceases broadcasting at sunset. But tonight the station has announced that it will conduct one of its bi-annual tests beginning at midnight Mountain Time. It's the sort of thing that broadcast band DX ("distance") enthusiasts like myself get psyched over—the chance to log a rare one. Yeah, I know. I'm a total nerd but I can't help it. I have a file cabinet full of reception postcards and letters from all around the world dating back to when I was a fourteen-year-old kid.



Propagation on the medium wave AM bands is limited during the daytime to groundwave coverage, roughly line-of-sight, so the signals are received only about 50 miles away. And since I live on the east coast, station KXZ is one that I would never be able to receive during the daytime hours. At night, however, it's a different kettle of fish, signals from a 5,000 watt station can bounce off the ionosphere and listeners across the continent, perhaps even Europe, can have an opportunity to pick up the KXZ signal.

The station engineer, like many of us, is a ham radio operator. He knows that there'll be a hardcore group of us eagerly tuning in to catch some snippet of voice, music, or Morse code that we can use to positively identify the station and request a reception report.

I quickly throw on some clothes, head for my radio room and fire up my trusty T.M.C. GPR-90 receiver. The tubes from the fifties-era unit emit a gentle glow in the darkened radio shack. I attach my trusty directional wire loop antenna and aim it west. A few minutes later, I'm rewarded by the sound of an unmodulated, dead carrier on the frequency. There's some fading, it's weak, but readable. It must be KXZ!

"Hello, test... test... test... Hehhhhh-lo." The voice is followed by a steady whistle for ten seconds. Normally, engineers modulate the carrier with a signal from an audio generator but this guy is having a bit of fun. He whistles at roughly 2500 Hertz. He's doing a pretty good job as the tone is steady and pure.

"This is KXZ in Marion, Montana. Hello to all the hams and shortwave listeners out there in radio land! This is Clyde Ramsdell, KO7TAN, at the mic. We're conducting our bi-annual KXZ test as required by the Federal Communications Commission. I'd be much obliged if you send the station a reception report along with a self-addressed, stamped envelope to Post Office Box 120, Marion, Montana. Be sure to include a solid thirty seconds of copy from the Morse code I'm about to send. In exchange, I'll send you a very nice KXZ postcard along with a verification stamp. Hah. Just kidding. There's no fancy verification stamp. You think we're KFI or somethin'? But I will send you our plain jane card from the Little Print Shop."

Clyde clowns around for a few more minutes. He tells a joke or two, then he says he'll play some rock 'n roll when he's concluded his modulation tests. He plays a series of dual tones to achieve full modulation. This goes on for ten minutes. Then I hear him moving around in the background. It sounds like he's setting up a tape cassette recorder. Then he plays a pre-recorded message in Morse code at around twenty-five words per minute.

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# O' HOLY NIGHT CONT'D

A FICTIONAL RADIO THEMED SHORT STORY BY PHIL TEMPLES, K9HI

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I recognize it as text from QST Magazine, the official journal of the national association for amateur radio. I quickly jot down one minute of the text and stop. That ought to be enough. I'll stay up a bit longer to hear the rock 'n roll song he's promised to play... I must have nodded off.

The next thing I know I'm hearing classical music. My knowledge of that genre is limited but I think it's a recording of "Ombra mai fu" by Handel. It's scratchy, like Clyde is playing a record on an old fashioned wind-up Victrola or something. He seems to be quite the prankster.

"Ladies and gentlemen - my dear listeners on land and all of the ships at sea, I will now play for you Adolphe Adam's carol, "O' Holy Night'.

The voice doesn't sound like Clyde's. It's spoken in proper English and has an old-fashioned lilt. I guess Clyde must have dug up an audio recording of some ancient radio broadcast. Fascinated, I continue to listen to the solo violin performance. "And now, I would like to share with you a passage from the Gospel of Luke, Chapter 2, Verse 14: 'Glory to God in the highest and on earth peace to men of good will...'

This is getting weird now. I reach up and adjust the tuning knob on the receiver to see if I accidentally bumped the frequency to some other station. That's when I get the shock of my life, every frequency I tune to has the same signal!

After he's finished with the biblical passage, the male voice announces, "...this concludes this first transmission from Brant Rock in the Commonwealth of Massachusetts, United States of America. This has been your humble servant, Reginald A. Fessenden. I wish you a joyful Christmas in the year of our Lord, 1906, and a very Happy New Year."

Before I can pick my jaw off the floor, Clyde's voice fades back in on the frequency. "Okay, all you cool cats. That was 'Stairway to Heaven' by Led Zeppelin. I hope you enjoyed it!

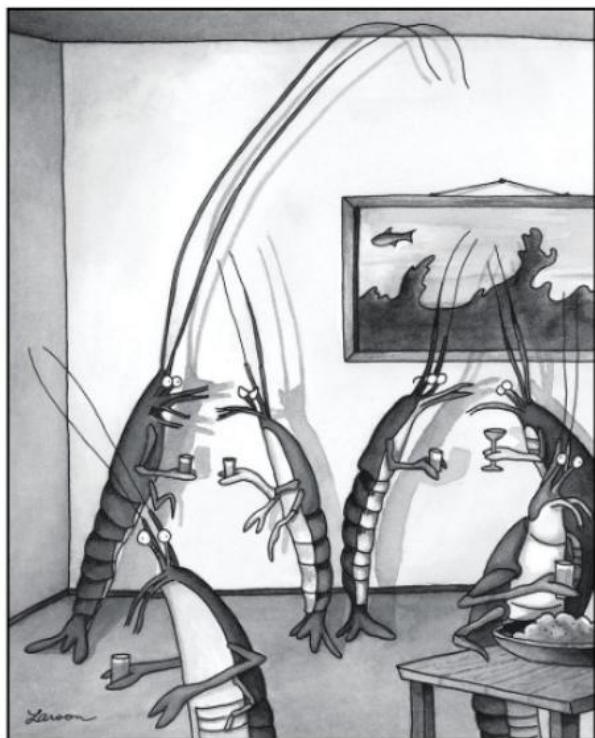
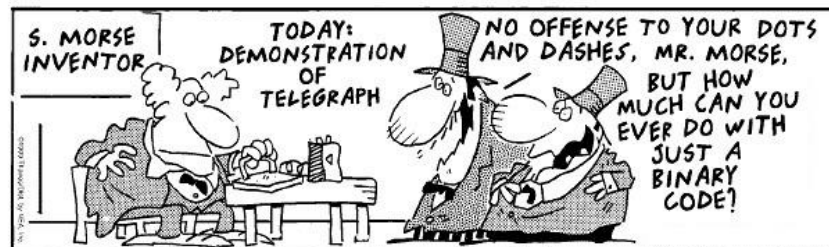
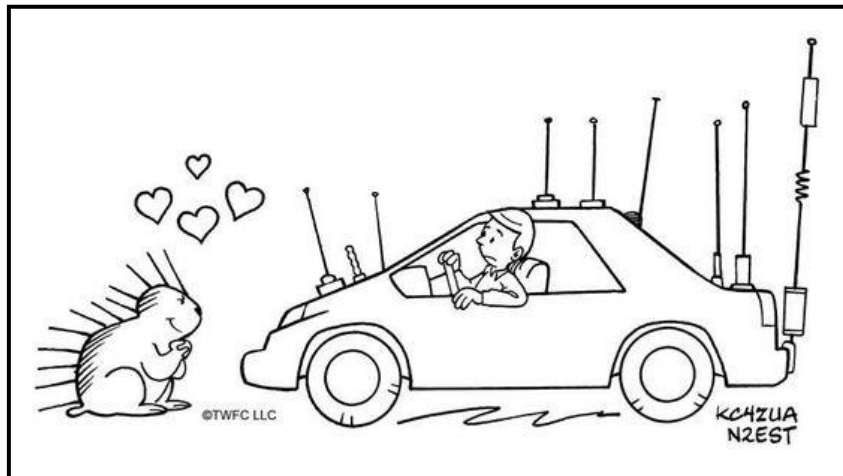
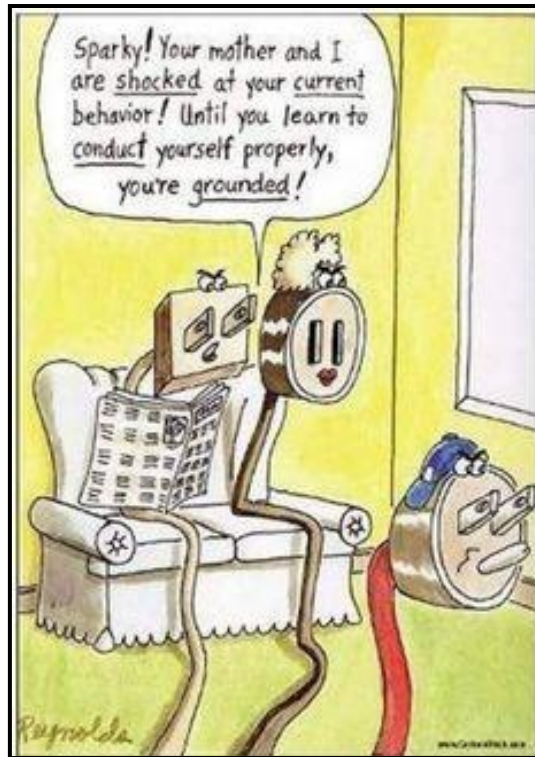
This is KXZ, signing off from our test.

73, over and out.



## Author Bio:

*Phillip Temples (K9HI) resides in Watertown, Massachusetts. He's had five mystery-thriller novels, a novella, and two short story anthologies published in addition to over 170 short stories online. Phil is a member of the New England Science Fiction Association, the Mystery Writers of America, and the Bagel Bards. You can learn more about him at <https://temples.com>*



"Listen, you want to come over to my place? I get great FM."





Things are happening in the world of Amateur Radio. ARRL is our advocate for Government, education and organization. I hope everyone that is a member of HCRA is also a member of ARRL.

Some items from the current news on the [ARRL.org](http://www.arrl.org) web page

## **New Things About ARRL Contests**

### **Some New Rules Going into Effect this Year for ARRL Field Day**

2/9/2022

After taking a few detours over the past couple of years due to the COVID-19 pandemic, **ARRL Field Day** rules are being updated on a permanent basis starting this summer. ARRL conducted a Field Day community survey with invitations propagated far and wide, and direct emails sent to more than 15,000 individuals and ARRL-affiliated clubs. After sorting through, reviewing, and discussing the survey results, the ARRL Programs and Services Committee recommended a number of rule changes for ARRL Field Day, which will take place this year over the June 25 – 26 weekend.

Starting this year, the maximum PEP output for a transmitter used by anyone submitting a Field Day log will be 100 W. The power multiplier of 2 will remain in place, and the high-power category will be removed from the rules. Until this year, the maximum low-power limit had been 150 W for most ARRL-sponsored operating events. The power multiplier will remain at 5 for QRP participants running a maximum of 5 W or less. As previously announced, 100 W (a change from 150W) is now the low-power category limit for all ARRL and IARU HF Contests, effective January 1, 2022.

A couple of changes instituted initially as accommodations for the COVID-19 pandemic will remain. Class D (Home) stations will continue to be able to earn points for contacts with other Class D stations. The club aggregate scoring change initiated in 2020 as a temporary measure will become part of the permanent rules. In the aggregate scoring plan, the scores of individual stations are combined under the score of a single club.

Another change, involving Rule 7.3.2 Media Publicity, has been modified. Rules to date have offered 100 bonus points for attempting to obtain publicity and demonstrating same. With the ease of posting via Facebook, Twitter, Instagram, and various other media websites, Field Day participants will now be required to obtain publicity, not just try to do so. Any combination of bona fide media hits would qualify for the bonus points. For example, posting the details of your upcoming or ongoing Field Day activity, or your Field Day results, on a club or news media site, on Facebook, or via Twitter and Instagram would meet the bonus criteria. Photos and videos are encouraged as part of media posts.

For more Field Day info go to <http://www.arrl.org/field-day>

**Western Massachusetts Section News:** <https://wma.arrl.org>

**ARRL New England Division:** <https://nediv.arrl.org>

**ARRL Western Massachusetts Section Manager** - Raymond P. Lajoie, AA1SE - [aa1se@arrl.org](mailto:aa1se@arrl.org)

**To learn more about an ARRL membership, and how it can help you** - <http://www.arrl.org/membership>





## HCRA STUFF

HCRA is an ARRL Special Service Club



### 10 Meter Monday Evening Net

Every Monday evening the HCRA hosts a 10 meter net at 7pm on 28.375 usb. This is a fun net where everyone is invited to participate regardless of club affiliation. Sometimes we have a topic and others are "open mic" where each participant can talk about whatever interests them. We have been having rotating net control op's and use Netlogger to keep track of participants. Netlogger is NOT required and it's up to each net participant if they want to use the free software or not. One great thing is that 28.375 is in the Tech portion of the band so all of you that are new to the hobby can also take part and learn HF operating techniques. I hope you will join us each Monday evening and bring a friend if possible!

If you have any questions regarding the 10m net please email [kd1ku@arrl.net](mailto:kd1ku@arrl.net)

### Brown Baggers are Back!

For the benefit of our newer members Brown Baggers is a friendly lunch get together that happens on the 1st and 3rd Wednesday of each month. It is held at [The Munich Haus Restaurant](#) in Chicopee Center at 12:00pm (Noon). Located at 13 Center St, Chicopee, MA. Across from City Hall or click the link above.

*Enjoy lunch, conversation and camaraderie with your fellow hams. Everyone is welcome!*

### 2022 Field Day

It might only be March but Field Day is right around the corner. In 2022 we are hoping Covid will continue to ease up allowing us a semi-normal Field Day. Your BOD has already begun planning activities that will make up for the past FD's that were abbreviated due to the pandemic. Stay tuned for more info...

### Memorial Page

All members now have the opportunity to honor club member SK's in the all new Memorial Page on [hcra.org](http://hcra.org). This can be done by sending in the SK members name and callsign along with any text, stories and can also include photo's too. Send them to our webmaster, Vanessa, W1IRL at the following email address: [webmaster@hcra.org](mailto:webmaster@hcra.org)

**Please check-out the HCRA You Tube Channel and while you're there don't forget to click subscribe!  
I hope that many members are working on their short video's for the club's You Tube channel.  
For more info see the April issue of Zero Beat. The You Tube Channel link is below**

### For Sale Items

There is a For-Sale section that is for HCRA members. Any members who have a want, something to sell or even to trade.

Send item description and photo(s) to:  
[kd1ku@arrl.net](mailto:kd1ku@arrl.net)

### HCRA Social Media Links

You Tube: <https://www.youtube.com/HampdenCountyRA>

Facebook: <https://www.facebook.com/groups/HampdenCountyRA>

Twitter: <https://twitter.com/HampdenCountyRA>

Instagram: <https://www.instagram.com/hampdencountyra>

**Clublog update:** Clublog can be accessed at <https://clublog.org/league.php> Signup is free, and there are a number of ways to lookup information. Give it a try, who knows... you might like it!

This is the clublog with open dates—basically it's a history from the start of each persons log. As you can see, many of the top members have many years on the air.

### HCRA Clublog Information ~ Updated on February 27th 2022



Your Log  
DXCC Charts  
Satellite Charts  
Timelines  
Grid Squares  
QSL Charts  
Zone Charts  
Log Inspector  
Log Matching  
League Tables  
DXCC Leagues  
Satellite Leagues  
Zone Leagues  
Club Leagues  
CDXC Challenges  
Super League  
Uniques League  
Tools  
DX Cluster  
Log Search  
Call Tester  
Most Wanted  
DXCC Analysis  
Propagation  
Great Circle Maps  
LoTW Sync  
ADIF Diff  
QSL Archive

#### DXCC Leagues

The leagues are rebuilt once per day. Only callsigns active in the last 12 months are included in the league tables. The maximum size of a league is 2000 participants.

☒ No Mode Filter
☐ CW
☐ Phone
☐ Data

☒ Rank by DXCCs
☐ Rank by slots
Rank by band: Totals ▾

☒ 160M
☒ 80M
☒ 60M
☒ 40M
☒ 30M
☒ 20M
☒ 17M
☒ 15M
☒ 12M
☒ 10M
☒ 6M

☒ Current entities
☐ Current and deleted
☒ Worked
☐ Confirmed

☒ No Date Filter
☐ 2022
☐ 2021
☐ Last 12 months

Filter by club/continent: HCRA - Hampden County Radio Association ▾

Generate DXCC League

League for HCRA - Hampden County Radio Association

Rank	Callsign	160	80	60	40	30	20	17	15	12	10	6	DXCC ▾	Slots	Range
1	W1JA	58	175	29	239	193	316	204	302	148	286	57	340	2007	45 yrs
2	W1RM+1	179	294	10	334	317	337	329	336	319	320	90	339	2865	59 yrs
3	KK1W+1	140	196	7	275	228	309	279	281	219	234	78	330	2246	46 yrs
4	NV1Q+3	27	136	0	181	111	308	257	314	232	256	2	329	1824	42 yrs
5	NF1G	0	162	0	245	258	305	267	270	205	223	78	319	2013	38 yrs
6	W1PY+1	34	118	0	201	64	248	211	244	132	205	8	292	1465	12 yrs
7	KX1X	70	133	66	188	164	208	141	216	96	198	20	256	1500	25 yrs
8	N1TA+3	111	154	27	199	104	211	108	199	33	133	0	256	1279	20 yrs
9	K1NZ+1	115	159	87	171	200	187	168	152	101	80	8	253	1428	11 yrs
10	K1VOI	5	67	2	115	64	205	141	163	72	145	3	247	982	21 yrs
		160	80	60	40	30	20	17	15	12	10	6			
11	NE1C	63	114	0	151	0	206	0	196	0	152	2	238	884	20 yrs
12	W1AST+1	5	60	9	106	30	169	123	139	24	123	7	205	795	13 yrs
13	NT1K+2	9	49	2	103	36	184	45	142	47	123	1	200	741	11 yrs
14	N1FTP	0	7	0	64	0	170	47	119	16	109	2	184	534	13 yrs
15	WD1S	49	56	0	117	33	143	30	96	11	98	2	172	635	10 yrs
16	W1NU+2	2	38	21	86	40	131	76	60	27	38	4	147	523	6 yrs
17	N1JIE	2	5	3	34	34	61	30	15	7	8	2	88	201	5 yrs
18	AB1ZJ	0	0	0	24	0	45	0	0	1	0	0	54	70	5 yrs
19	N1FJ	0	0	0	6	0	30	0	16	3	16	0	51	71	8 yrs



**Clublog update:** Clublog can be accessed at <https://clublog.org/league.php> Signup is free, and there are a number of ways to lookup information. Give it a try, who knows... you just might like it!

This is the HCRA Clublog for 2022 - you can see who has been on the air hot and heavy so far this year!



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Filter by club/continent:
HCRA - Hampden County Radio Association ▼

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League for HCRA - Hampden County Radio Association

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1	W1RM+1	33	59	0	122	11	127	22	120	10	69	1	185	574	59 yrs
2	NF1G	0	8	0	20	39	54	43	58	61	36	1	141	320	38 yrs
3	KX1X	13	52	0	79	50	81	52	97	18	51	0	127	493	25 yrs
4	KK1W+1	32	51	0	67	4	87	6	91	6	32	0	115	376	46 yrs
5	W1AST+1	1	7	0	28	4	33	16	34	10	16	1	78	150	13 yrs
6	K1VOI	0	11	0	20	15	31	3	12	1	10	0	48	103	21 yrs
7	W1PY+1	0	0	0	1	0	26	0	14	0	1	0	42	42	12 yrs
8	K1NZ+1	10	0	10	0	12	0	0	0	10	2	0	28	44	11 yrs
9	WD1S	2	2	0	16	0	8	0	7	0	0	0	23	35	10 yrs
10	N1JIE	1	2	0	9	4	4	3	1	2	1	1	17	28	5 yrs
		160	80	60	40	30	20	17	15	12	10	6			
11	NE1C	2	6	0	9	0	2	0	11	0	1	0	11	31	20 yrs
12	W1JA	0	2	3	0	0	0	0	0	0	5	2	8	12	45 yrs

**The February Meeting Can Be Viewed on You Tube! Don't forget to click subscribe!**

Miss last months HCRA meeting? Or maybe you want to re-watch all or part of any past meeting Use the following link to the last regular meeting or search You Tube for HCRA past meetings  
<https://www.youtube.com/watch?v=SbqKzO0U-NU&t=5s>

# DOTS & DASHES

THINGS THAT DON'T FIT ANYPLACE ELSE!

## MTARA Hamfest is back on for 2022!

**Be sure to stop by the HCRA booth!**

The 33rd annual MTARA Amateur Radio & Electronics Hamfest is on for 2022, Saturday March 5, 2022. Doors open at 6:30am for vendors and 8:30am for General Admission.

For all the details and vendor form visit: <https://mtara.org>

## ARRL Volunteer Examiners Serve the Community

Interested in becoming an ARRL Volunteer Examiner (VE) and serving the Amateur Radio community, it's easy. Review the VE Manual, paying special attention to Chapter 2: Becoming a VE and Supplemental Information. Complete the VE Application and open-book review. Fax, mail or email forms to this address: ARRL VEC, 225 Main St. Newington, CT 06111 | Fax: 860-594-0339 | Email: [vec@arrl.org](mailto:vec@arrl.org)  
Once accredited, you will receive a colorful laminated VE badge to wear at exam sessions plus a beautiful certificate suitable for framing. For more information visit: <http://www.arrl.org/become-an-arrl-ve>

## Contests and Special Event Stations

**Contests** - [www.arrl.org/contest-calendar](http://www.arrl.org/contest-calendar)

March 5th - 6th | International DX - Phone, 160 -10m, SSB | 0000z Saturday - 2359z Sunday

For more details visit: <http://www.arrl.org/arrl-dx>

March 12th - 13th | South America 10 Meter Contest CW & SSB | 1200z Sat - 1200z Sunday

For more details visit: <http://sa10m.com.ar/>

**Special Event Stations** - [Special Event Station Search](#)

March 22nd - 24th | 1400z - 2100z | Honoring World War II Gunners at Buckingham Airfield

For additional details visit: <https://fmarc.net/buckingham/>

**Search for more Special Event Stations at:** <http://www.arrl.org/special-event-stations>

## HCRA Member Outgoing QSL Service

*QSL's will be sent to the ARRL Outgoing QSL Bureau quarterly on the following approximate dates*

April 15th, June 15th, Sept 15th, and January 15th

See [hcra.org](http://hcra.org) for complete information

or

Contact Paul, NFIG at [NFIG@arrl.net](mailto:NFIG@arrl.net)



## Local Nets & Happenings

**Sundays: 0845** Western MA. Emergency Net on 146.94, PL 127.3 W1TOM/R

**Sundays: 0915** Western MA. Emergency Net on 443.200, PL 127.3 W1TOM/R

### 1st Monday:

RACES Drill, 1845, 146.49 Simplex

**Mondays:** 1900 7pm (Local) **HCRA 10 Meter Net 28.375 usb**

New topic each week. Have an idea for a topic? [kd1ku@arrrl.net](mailto:kd1ku@arrrl.net)

**Tuesdays:** 1930-2000: 146.94, PL 127.3 - W1TOM/R - Hampshire County Emergency Net

**Wednesdays:** 1930: MTARA Info net followed by the swap net & the N1RLX simplex net on 146.94, PL 127.3 W1TOM/R

**2000:** MTARA Swap net: 146.94, PL 127.3 - W1TOM/R

**2000:** MTARA (N1RLX) Simplex Net, Check-in's 146.94, PL 127.3, then goes to 146.42 Simplex Immediately following the swap net

**2100: Weather Net** (Roger, K1PAI), 1st Thursday of every month: 147.090 MHz, All other Thursdays: 147.000, PL 127.3 - W1TOM/R

## Join or Renew Your ARRL Membership!

ARRL members enjoy:

- QST Magazine
- Members-Only Web Services
- Technical Information Service
- Member Discounts
- Outgoing QSL Service
- Continuing Education
- ARRL as an Advocate
- Regulatory Information Branch
- Public Relations for Amateur Radio
- ARRL Field Organization
- ARRL-sponsored contests
- Operating Awards
- Local Clubs
- Amateur Radio Emergency Service
- Hamfests and Conventions
- Volunteer Examiner Coordinator Program



<http://www.arrrl.org/membership>

## Club Meetings and VE Sessions

Please contact site / organization to ensure it will meet.  
Clubs meet on Zoom, VE sessions are being developed.

**1st Friday of the month** at 7:30pm HCRA Meeting.  
Virtual meetings are held via Zoom. Meetings start with a rag chew session at 7pm followed by the regular Zoom meeting at 7:30pm. <http://www.hcra.org/>

**2nd Monday of the month** 7:00pm, Franklin County Amateur Radio Club meeting. Virtual meetings via Zoom until it is safe to meet in person at the Greenfield Community College. <http://www.fcarc.org/>

**Saturday before the FCARC meeting at 8am.** Breakfast at Dennys Pantry in Greenfield (as Covid allows)

**Event: FCARC Pioneer Valley Experimental Net**

**Location:** 10 Meters 28.354 MHz

**When:** Every Wednesday morning, 9:00 am – 10:00 am

**Organizer:** Brad Councilman [bc@councilman.com](mailto:bc@councilman.com)

## HCRA Contact List

President - Larry Krainson, W1AST

[w1ast@arrrl.net](mailto:w1ast@arrrl.net)

Vice-President - Marcel LaPierre, AA1WH

[aa1wh@arrrl.net](mailto:aa1wh@arrrl.net)

Treasurer - Duane Pray, KC1FQV

[kc1fqv@arrrl.net](mailto:kc1fqv@arrrl.net)

Secretary - Paul Kelliher, NF1G

[nf1g@arrrl.net](mailto:nf1g@arrrl.net)

Programs - Gary Thomas, AA1UE

[aa1ue@amsat.org](mailto:aa1ue@amsat.org)

Membership - John Plaster, K1VOI

[k1voi\\_jp@charter.net](mailto:k1voi_jp@charter.net)

Technical - Najm Choueiry, AB1ZA

[njc2@cox.net](mailto:njc2@cox.net)

At Large - Bob Jeffway, WA1OJN

[wa1ojn@jeffway.com](mailto:wa1ojn@jeffway.com)

Newsletter - Ken Dion, KD1KU

[kd1ku@arrrl.net](mailto:kd1ku@arrrl.net)

Website - Vanessa Oquendo, W1IRL

[webmaster@hcra.org](mailto:webmaster@hcra.org)

W1NY trustee, John, N1JIE

[n1jie@arrrl.net](mailto:n1jie@arrrl.net)

WB1Z trustee, Vanessa, W1IRL





**Here is your exciting new  
copy of Zero Beat!**

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**Hampden County Radio Association  
P.O. Box 562  
Agawam, MA 01030-0562**