Mahoning Valley Amateur Radio Association
Voice Coil

January 2026	mvara.w8qly@gmail.com	The Voice Coil - Volume 26-1

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President's Corner

Hello everyone! For those that don't know me, I'm Ralph Streb - K8TCP, the new President of the MVARA. First, I'd like to thank Scott for his years of service. He's done a great job, and I've got some pretty big shoes to fill! That being said, I'm looking forward to serving the club and working with all of you for the years to come. This being my first article, I figured I'd tell you all a little about myself! I've been a ham since 2018, and have been involved in the MVARA for a few years now. I am a Systems Administrator working at Astro Shapes in Struthers, and have worked there since December of 2020. Aside from being a ham, I'm also involved in running an internet radio station and running a few side businesses. To say I'm generally working with a packed schedule is an understatement! My first event that I was involved in with the MVARA was a Summer Field Day, and funny enough, the first one I helped to orchestrate was this past January's Winter Field Day! A quick note to wrap up, we have Winter Field Day approaching quick this year! It will happen on January 24-25th, shortly after this newsletter will drop! So if you're interested in helping, please toss me an email

And I'll add you to the email list of volunteers! If you'd like to pop in, then we welcome the visit! We're planning on using the Jim Marter Yard on Poland Avenue in Youngstown, right past the Center Street Bridge. Right, well I think that's enough rambling for my first article, there's time for that in future newsletters!
73's and take care!

Ralph Streb - K8TCP President

Upcoming MVARA Events

Date	Event	Location
January 8, 2026	MVARA Meeting	Boardman
January 24/25 2026	Winter Field Day	Youngstown

January Club Program

Our program for the January club meeting is our annual State of the Club presentation by the Officers, Trustees, and Committees. During this meeting we will take a brief look at what we did in 2025 and talk about our plans for 2026. This is your yearly chance to talk to the club leadership, get your ideas in front of the members, and ask questions.

Groups.io

This is a reminder that MVARA has a groups.io page we use to make announcements and discuss upcoming events and such. The page is available to all members of the club and can be found here: https://groups.io/g/mvara and there is a subscribe link about midway down the page.

MVARA Goes Back to School

Over the week of December 8 to December 12, members of MVARA spent each day interacting with the 500 Elementary School Students of Hilltop Elementary in Canfield. Each day we demonstrated Ham Radio to the students with displays of Morse Code, a 2M connection to Santa, a 2M game of Name the Animal, a graphic display of the path of the ISS, how sound is transmitted and how it looks on an Oscilloscope, and a HF station making contacts throughout the country and overseas.

To cover the roughly 30 hours of in class time, we had a rotating crew of members in the class and working from home to be the "other end of the Radio", as shown in the schedule below and the photos from class.

During the week the school did video of us working with the students and Mike PRR has the video running on the clubs Facebook Page here: https://www.facebook.com/mahvalradio/ Scroll down a little on the page and look for Santa on the right side to find the video.

Rich GAE has a great slide show of photos from the week running on the club website here: https://mvara.org/ Be sure to check it out.

As you can see in the photos here, we were proudly displaying the DX Engineering banner in appreciation for the support they offered while we gearing up for a live ARISS contact. In

the end the contact was changed to a TeleBridge event and we won't be operating radios at the event, but if it had gone through, DXE had pledged an incredible amount of equipment for us.

We would particularly like to thank all our members that did an incredible job of helping us get ready for all aspects of the ARISS event. And check out the glowing recommendation we received from Stephanie Palumbo, our contact at Hilltop Elementary. It follows the schedule.

Time	Mon	Tue	Wed	Thur	Fri
8:50 4th	Guess Animal, CW, Equip Frank YHD CW Debbie VQK CW Rich GAE Equip Mike PRR Animal Don DPG Animal Danielle YMU Radio Animal	Guess Animal, CW, Equip Mark ZIP CW Debbie VQK CW Danielle YMU Radio Animal Mark MSH Equip Mike PRR Animal	Guess Animal, CW, Equip Rich GAE CW Mark MSH Equip Mike PRR Equip Scott UHC Animal David BFD Radio Animal	Guess Animal, CW, Equip Mike PRR Animal Mark MSH Equip Roy EWQ Radio Animal David BFD CW	No Class
10:00 2nd	Santa, CW, Equip Frank YHD CW Debbie CW Rich GAE Equip Mike PRR Equip Mark MSH Equip Roy EWQ Radio Santa Ron TNW Santa Don DPG Santa	Santa, CW, Equip Frank YHD CW Mark ZIP CW DebbieVQK CW Scott UHC Radio Santa Mike PRR Equip Mark MSH Equip David BFD Santa	Santa, CW, Equip Rich GAE CW Roy EWQ Radio Santa Mark MSH Equip Scott UHC Santa Don DPG Equip	Santa, CW, Equip Mark MSH Equip Mark MSH Equip Ron TNW Santa Scott UHC Radio Santa David BFD CW Don DPG CW	No Class
11:10 3rd	No Class	Guess Animal, CW, Equip Danielle YMU Radio Animal Mark ZIP CW Debbie VQK CW Mark MSH Equip Mike PRR Animal	Guess Animal, CW, Equip Danielle YMU Rad Animal Rich GAE CW Mike PRR Animal Mark MSH Equip Don DPG Equip	Guess Animal, CW, Equip Mike PRR Equip Mark MSH Equip Andy ZLK Equip Ron TNW Animal Roy EWQ Radio Animal David BFD CW	Guess Animal, CW, Equi Mark ZIP CW Mike PRR Animal Mark MSH Equip Andy ZLK Equip Roy EWQ Radio Animal
12:15 Lunch	Lunch	Lunch	Lunch	Don DPG Equip	Lunch
12:45 K	Santa, CW, Equip Frank YHD CW Debbie VQK CW Rich GAE Equip Mark MSH Equip Roy EWQ Radio Santa Ron TNW Santa Don DPG Santa	No Class	Santa, CW, Equip Rich GAE CW Roy EWQ Radio Santa Mark MSH Equip Scott UHC Santa Don DPG Equip	Santa, CW, Equip Frank YHD CW Don DPG CW Mark MSH Equip Andy ZLK Equip Ron TNW Santa Scott UHC Radio Santa	Santa, CW, Equip Mark ZIP CW Scott UHC Radio Santa Mark MSH Equip Andy ZLK Equip Mike PRR Santa
1:55 1st	Santa, CW, Equip Frank YHD CW Debbie VQK CW Rich GAE Equip Mark MSH Equip Roy EWQ Radio Santa Ron TNW Santa Don DPG Santa	Santa, CW, Equip Mark ZIP CW Debbie VQK CW Scott UHC Radio Santa Mark MSH Equip Mike PRR Santa	No Class	Santa, CW, Equip Frank YHD CW Don DPG CW Mark MSH Equip Andy ZLK Equip Ron TNW Santa Scott UHC Radio Santa	Santa, CW, Equip Mark ZIP CW Scott UHC Radio Santa Mark MSH Equip Andy ZLK Equip Mike PRR Santa

Dear MVARA Team,

I am truly at a loss for words to express my gratitude for the amazing support you provided at our school this week. Your dedication, enthusiasm, and generosity made an unforgettable impact on our nearly 500 students!

From staffing and preparing four incredible stations to teaching a total of 20 classes, amounting to 80 presentations of your stations, you gave our students experiences they will remember for years to come. Your hands-

on activities, from talking to Santa on the radio, guessing animals from clues, connecting via radio and marking it on a map, tracking the ISS, exploring how sounds vibrate and travel, learning and practicing Morse code, to guiding students through the Mission Control station, were engaging, educational, and inspiring.

It was evident that each of you poured your hearts into this week, and your passion for sharing knowledge shone through in every interaction. Our students left with excitement in their eyes, curiosity sparked, and memories made that will last a lifetime. We feel so fortunate to have had the MVARA team dedicate their time, energy, and expertise to our school community.

I also created a Google Drive folder for everyone to add pictures and videos from the week, and I've already added some of my own. I can't wait to see what memories you captured on camera too.

On behalf of all of us, students, staff, and myself, thank you from the bottom of our hearts for your incredible generosity and commitment. Your work truly made a difference, and we are so grateful for all that you do.

Please also let this serve as a letter of recommendation for your club to work with any schools in the area. I would be more than happy to tell anyone how amazing your club has been and the incredible experiences you bring to students.

I hope that every time you see a ripped tablecloth, you think of me and all of the students at Hilltop. :)
Enjoy your well earned weekend!

Stephanie Palumbo

Meet Our New Member Ray Difelice

From a very young age, I've always had an interest in amateur radio. My interest began when a friend gave me an old shortwave radio many years ago. I was fascinated listening to broadcasts from all over the world and in different languages. When I became a little older and started to work, I purchased a better shortwave radio which I still have today. As time went on, I always entertained the thought of obtaining my amateur radio license so that I too, could broadcast. The decades passed and work and family matters took priority. Then one day (about a year ago), while visiting the Mahoning County library website, I noticed that amateur radio classes were being offered for the Technician Class license. I finally decided that it was time. I took the class, passed the test, and received my Technician class license. Shortly thereafter and again while visiting the library website, I noticed that classes were being offered for the General Class license. I immediately signed up, took the class, and passed. Some day I may decide to try for my Amateur Extra license but for now, I'm very happy to be included in the company of others who enjoy this fascinating hobby. Since I am new to amateur radio, I'm obviously still learning and unfamiliar with the terminology and how things work from a practical standpoint. I hope to benefit from the knowledge and experience of members of the MVARA club.

Mahoning County ARES Update

ARES Update

Depending on when this article is published and when you read it a new year is either just about to start or has just begun. In either case it's a good time to look at what our Mahoning County ARES Group did in 2025 and what we think we'll be doing in 2026.

January of 2025 saw the debut of the Mahoning County ARES Task Book. Your ARES Leadership Team has been working to bring that training tool to our members for over 3 years. Our members now have a simple to understand and simple to use tool for their self-directed and self-paced training.

Canfield Fair was a larger ARES effort this year. Our ARES Members manned Fair Communications Central for the entire run of the event. This was a major activation by EMA and the Fair Board. They were both very happy with the results. Our members worked well in numerous ways to assist in making the Fair a great experience for tens of thousands of people.

This year's ARRL Simulated Emergency Test (SET) was a very successful "test" of Mahoning County ARES. For over two hours on October 4th ARES Members participated in a mock disaster drill that covered many situations. This SET was different from previous drills in that it was not announced ahead of time. Our members performed very well.

During the SET our members experienced a new tool. At 10:20 am members received a text message, an email message and a phone call alerting them to beginning of the drill. All

participants received all those messages at the same time. That is very useful technology. The ARES Leadership Team saw how well that system worked and decided to standardize it as our notification system for drills or real ARES emergency activation.

As it turns out, that same system was used less than two months later for the Phoenix House Explosion. ARES members received a notification saying, "this is not a drill" and it wasn't. November 22nd was a full ARES activation and ran for over 8 hours as our members assisted first responders, the Red Cross and Community relief agencies helping over 140 individuals that were impacted by that explosion. ARES was also activated the following Tuesday and Wednesday just prior to the Thanksgiving Holiday to assist in helping Phoenix House residents recover some of their needed items. We want to thank all ARES members who participated in this activation.

The past year was a year of growth and unique experiences for our Mahoning County ARES. Everyone did a great job. Thank you.

Looking forward to 2026 training will continue to be a primary issue. If you haven't already, download your ARES Task Book from the Website and work on it at your own pace. It's your Task Book and your training. We can see from the ways County EMA used ARES in 2025 that next year we will have even more to do. ARES will be activated by the County for additional major events in 2026. Canfield Fair will be an even larger activation next year. EMA has a new communications van that ARES members will be working on and qualifying to operate. That's just what we can see coming.

If you're interested in joining Mahoning County ARES please visit our website http://mahoning-ares.org/ or email mahoning.ares@gmail.com

Thank you to all ARES members for a great 2025. Happy New Year and we look forward to working with you all in 2026.

Your ARES Leadership Team

Guide to Choosing the Right Mobile VHF/UHF Antennas and Mounts

by Mark, K8MSH

You've got a mobile radio and separation kit. You're ready to begin installation. Now comes the most important question—where do I mount the antenna? Sometimes I think it's a conspiracy among automakers. Every year, it gets more challenging to find a good mounting location on a vehicle. But with a bit of imagination and planning, you can get the most out of a mobile antenna.

Where Do I Put It?

On a vehicle, antennas can be installed in several locations: the roof, fenders, trunk, and window glass. A high mounting position is better for performance, and having as much metal mass under the antenna as possible is also beneficial. Another important thing to consider is keeping the antenna clear of roof pillars and hatch doors whenever possible.

Specific locations considered best for VHF/UHF antennas are (in order of preference): roof center, center of the trunk lid, fenders, trunk/hood grooves, and on-glass mounting. This ranking is determined by the amount of ground plane provided by the position and clearance from obstructions. As you consider locations, also determine where your feedline will enter the vehicle. You don't want to have a large run lying on the car body or mash it in a door frame.

If you've seen police, fire, and commercial vehicles, you'll notice their antennas are mounted directly to the body, improving the ground connection. This is the preferred method, but some of us get squeamish about drilling holes in the sheet metal, especially if it's a leased vehicle. For many, direct mounting isn't an option. But several other antenna mounting alternatives will provide good performance.

Antenna Mounts

One of the simplest and easy to install mounts is the magnet mount. It's convenient, removable, but is generally intended as a temporary antenna, though many hams leave them on indefinitely. It's grounded through capacitive coupling between that magnet and the metal under it. This grounding method is adequate for VHF/UHF frequencies, and I've found these to be a good solution to getting the antenna on the center of the roof without having to drill a hole. The downside is that they can collect crud on the bottom of the magnet and scratch paint if removed carelessly.

Mirror and roof rack mounts are other easy-to-install alternatives. However, mirror brackets and roof racks aren't always electrically grounded to the body. If you choose this route, you should consider a ½-wave no-ground-plane (NGP) antenna.

Trunk lip/universal lip mounts are popular because they're easy to place on most vehicles. They'll fit on the edge of a trunk, hood, door or the rear hatch on an SUV. A popular bracket, the Diamond K400, pivots so the antenna can be adjusted to an upright position. Once placed, lip mounts attach with set screws which are tightened into the bottom edge of the metal. To make a ground connection, scrape away paint directly under the set screws to expose bare metal. A little dielectric grease on the exposed metal will help prevent corrosion.

One way to assure a reasonably good ground is to use fender/bracket mounting. Comet No-Hole Fender Brackets use existing fender bolts on trucks and SUVs to support the antenna and provide ground. Angle brackets can be attached with stainless sheet metal screws inside doors, rear hatches, and trunk groove, but check to make sure the gap is large enough to easily open and close without striking the bracket.

Glass mount antennas come as a kit with mount and a ½ wave antenna. They're designed for tempered automobile glass with a nominal thickness of 5/32″. Due to changes in glass designs in newer cars, there are some restrictions as to where they mount. They can't be installed over embedded AM/FM antennas, on areas with aftermarket tinting film, or on glass with metallic content, such as solar coat or solar-cool.

Choosing Your Antenna

Antennas and mounts are usually sold separately. This is a good thing because you can mix and match according to your needs. Be sure that the antenna base matches your mount. For example, an NMO mount requires an NMO antenna. Other types of mounts include UHF, N, and 3/8″ threaded stud.

There are three basic types of mobile antennas: 1/4 wave, 1/2 wave, 5/8 wave, etc. Each has its own characteristics. For example, the signal radiating from a 1/4 wave antenna is directed at higher angles, making it ideal in urban environments. The design of a 5/8 wave antenna is designed to direct the signal more toward the horizon, ideal for flat terrain where signal coverage is sparse. Half-wave antennas are used when there is poor or nonexistent ground, such as on vehicles with fiberglass/composite bodies.

Size matters. If you park in a garage and use an antenna that extends over the roof line, you'll want to consider a short antenna or one with a fold-over feature to avoid scraping the overhead door frame. A trunk lid or fender mounting lets you use up to a 40″ antenna, which will improve radiating efficiency.

Look for high antenna gain figures, but take them with a grain of salt. Antenna gain is a relative measurement, and values can be misleading if the reference point isn't disclosed. Antenna manufacturers often state gain figures in dBi or dBd, which are referenced to an isotropic (dipole) radiator. Be sure you're not comparing apples to oranges.

(Originally appeared in *On All Bands*, June 2019)

Amateur License Refresher

It's probably been a while since you took your Amateur License exam. Here are a few sample questions from the current question pools just to keep those synapses firing.

Extra Pool

E4C01
What is an effect of excessive phase noise in an SDR receiver's master clock oscillator?
A. It limits the receiver's ability to receive strong signals
B. It can affect the receiver's frequency calibration
C. It decreases the receiver's third-order intercept point
D. It can combine with strong signals on nearby frequencies to generate interference

E4C02
Which of the following receiver circuits can be effective in eliminating interference from strong out-of-band signals?
A. A front-end filter or preselector
B. A narrow IF filter
C. A notch filter
D. A properly adjusted product detector

E4C03
What is the term for the suppression in an FM receiver of one signal by another stronger signal on the same frequency?
A. Desensitization
B. Cross-modulation interference

C. Capture effect
D. Frequency discrimination

General Pool

G8C01
On what band do amateurs share channels with the unlicensed Wi-Fi service?
A. 432 MHz
B. 902 MHz
C. 2.4 GHz
D. 10.7 GHz

G8C02
Which digital mode is used as a low-power beacon for assessing HF propagation?
A. WSPR
B. MFSK16
C. PSK31
D. SSB-SC

G8C03
What part of a packet radio frame contains the routing and handling information?
A. Directory
B. Preamble
C. Header
D. Trailer

E4C01 (D)
E4C02 (A)
E4C03 (C)
G8C01 (C)
G8C02 (A)
G8C03 (C)

Upcoming Contests and QSO Parties

Dave Fairbanks N8NB

Source is www.contestcalendar.com

+ Marconi Club ARI Loano QSO Party Day	0700Z-2100Z, Jan 3
+ ARRL RTTY Roundup	1800Z, Jan 3 to 2359Z, Jan 4
+ ARRL Kids Day	1800Z-2359Z, Jan 3
+ ARS Spartan Sprint	0100Z-0300Z, Jan 6
+ SKCC Weekend Sprintathon	1200Z, Jan 10 to 2359Z, Jan 11
+ North American QSO Party, CW	1800Z, Jan 10 to 0559Z, Jan 11
+ 4 States QRP Group Second Sunday Sprint	0100Z-0300Z, Jan 12
+ North American QSO Party, SSB	1800Z, Jan 17 to 0559Z, Jan 18
+ ARRL January VHF Contest	1900Z, Jan 17 to 0359Z, Jan 19
+ CQ 160-Meter Contest, CW	2200Z, Jan 23 to 2200Z, Jan 25
+ REF Contest, CW	0600Z, Jan 24 to 1800Z, Jan 25
+ Winter Field Day	1600Z, Jan 24 to 2159Z, Jan 25
+ SKCC Sprint	0000Z-0200Z, Jan 28

DX Information

Source is www.ng3k.com

January					
2026 Jan01	2026 Feb16	Grenada	J38WG	LoTW	OPDX 20251025
2026 Jan02	2026 Jan06	French Polynesia	FO NEW	LoTW	OPDX 20251229
2026 Jan06	2026 Feb06	Benin	TY5GG	LoTW	OPDX 20251004

2026 Jan07	2026 Jan15	Palau	T8	Home Call	DXW.Net 20251215
2026 Jan10	2026 Jan22	Lakshadweep Is	VU7RS	M0OXO	DXW.Net 20251006
2026 Jan11	2026 Jan29	Aruba	P40AA	LoTW	DL4MM 20251220
2026 Jan12	2026 Feb15	San Felix & Ambrosio	3G0XQ	M0URX	W2OR 20251023
2026 Jan13	2026 Jan21	Sint Maarten	PJ7	LoTW	OPDX 20251022
2026 Jan13	2026 Feb10	Desecheo I	KP5 NEW	LoTW	DXW.Net 20251226
2026 Jan15	2026 Feb28	Kenya	5Z4	LoTW	OPDX 20251223
2026 Jan18	2026 Jan24	Maldives	8Q7JI	LoTW	DXW.Net 20251105
2026 Jan18	2026 Jan30	Barbados	8P9CB	LoTW	OPDX 20251101
2026 Jan19	2026 Jan26	Maldives	8Q7EL	IW5ELA	DXW.Net 20251222
2026 Jan20	2026 Feb10	Guadeloupe	FG4KH	LoTW	OPDX 20250915
2026 Jan22	2026 Jan28	Micronesia	V6	Club Log OQRS	DXW.Net 20250912
2026 Jan22	2026 Mar31	Curacao	PJ2	LoTW	OPDX 20250908
2026 Jan30	2026 Feb03	St Kitts & Nevis	V47JA	LoTW	W5JON 20251207

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Website: The MVARA is on the web at www.mvara.org. It is the place to go for club events, classes, newsletters, VE exams, swap and shop, repeaters, history, documents, and contact information.

24/7 Club Connection: The MVARA is on groups.io at https://groups.io/g/mvara. Members are invited to hang out with us there and discuss any ham related topic that interest them such as, Club Activities, Parks on the Air, Solar Cycle 25, EmComm, Special Event Stations, Contesting, Public Service, and Swap and Shop. There is video on our website at **https://mvara.org/videos.html** that shows how to use and join the 24/7 Club Connection.

The ***VOICE COIL*** is the monthly publication of the Mahoning Valley Amateur Radio Association, Inc. (MVARA) and is intended to present news, issues and opinions of interest to MVARA members and the Amateur Radio Community. We encourage contributions of articles, letters to the editor, etc. and welcome newsletter exchanges with other clubs from around the country and around the world. Permission is granted to reprint material contained herein as long as proper credit is given to this newsletter and the author. Ideas for and contributions to the VOICE COIL should be submitted to: **mvara.w8qly@gmail.com**

Submissions must be received **no later than the 24th** of the month prior to the month of issue, unless otherwise specified. **Submissions should be in MS Word format or ASCII text—no PDF, please!** Material received after the deadline will be used in the next month's VOICE COIL if it is still current and /or newsworthy.

Swap and Shop Policies
Swap and Shop listings are open to all licensed Mahoning Valley Hams--you don't need to be an MVARA member. You can include a picture for your listing. Please submit your list to mvara.w8qly@gmail.com for placement in both *Voice Coil* and website. MVARA assumes no responsibility for transactions made or inaccuracies in ads. You are responsible for checking your ad and notifying us of any corrections. Ads will run for two consecutive issues unless we are notified otherwise.

The Mahoning Valley Amateur Radio Association, Inc, meets the second Thursday of every month. Location and time are subject to change. Dues are $20.00 per year, $10.00 each for additional family members. Contact Nancy, nanceanne34@gmail.com for details.

The club call is **W8QLY**; equipment operated under this call includes a two-meter voice repeater at 146.745 (-600, 110.9 PL).

Club email: mvara.w8qly@gmail.com

MONDAY NIGHT NET operates every Monday at 9:00. PM on 146.745 MHz.
SKYWARN NET - On 146.745 MHz as weather warrants.
ARES NET- First and third Mondays of each month at 8:30 PM on 146.745 MHz; prior to the Monday Night Net.

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