

Volume 26, Issue 5 Peekskill/Cortlandt Amateur Radio Association Inc. May 2025

May the 10th be silver

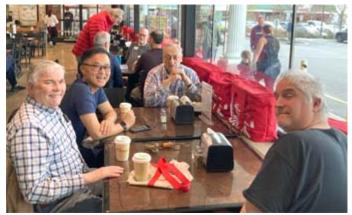
The April PCARA Membership Meeting took place on Saturday April 5th at Putnam Valley Library, with 12 members present. Discussion was centered on our upcoming **25th/Silver Anniversary** celebrations, to be held on Saturday May 10th at FDR State Park. Set-up will begin at 10:00 a.m. in Picnic Area 3BS, by the Picnic Shelter adjacent to Parking Lot #3 — as scheduled with NY State Parks by David KD2EVI. Joe WA2MCR has arranged for the station to be listed on ARRI's Special Events web site. See page 7 for further details and keep an eye on Google Group e-mails.

After the main meeting, a Laurel VEC **Test Session** took place, with two successful candidates. This was the second time that PCARA has made use of Exam-Tools for electronic administration and scoring of tests. Our thanks to Lou KD2ITZ and Joe W2BCC for encouraging this improvement to the testing procedure.

PCARA Breakfast at Uncle Giuseppe's on Saturday April 19 was enjoyed by 12 members, at the same time as many people were busy with their Easter shopping.

Thanks to our neighbors across the River Hudson, PCARA will have a club table at the upcoming **Orange County Amateur Radio Club Hamfest** on Sunday May 4th. This event takes place for the third time at Black Rock Fish and Game Club, Mountainville, NY, with the site opening to visitors at 8:00 a.m. Feel free to bring along any equipment you wish to sell at the PCARA club table.

In view of the 25th Anniversary celebrations, there will be no *separate* monthly meeting in May — instead,



Breakfast on Saturday April 19 was held at a busy Uncle Giuseppe's.

please come along to the Anniversary on May 10.

The next major event on the horizon will be ARRL Field Day, scheduled this year for Saturday-Sunday

June 28-29. There will be a planning meeting in June at George Washington Elementary School, timing to be announced.

If your PCARA membership is about to expire,



David KD2EVI will be sending out renewal e-mails in the run-up to Field Day. See page 2 and keep an eye open for David's e-mail.

Please mark your calendar with these upcoming dates.

- Sunday May 4 at 8:00 a.m.: Orange County Amateur Radio Club (OCARC) Hamfest at the Black Rock Fish & Game Club, 5 Pleasant Hill Road, Mountainville, NY. For more information, see the OCARC website at https://ocarcny.org/. PCARA will have a club table at this event.
- Saturday May 10: rain or shine: PCARA 25th (Silver) Anniversary of Incorporation, FDR State Park, Picnic Shelter by Parking Lot #3, Yorktown Heights. Setup starts at 10:00 a.m., operation will be 11:00 a.m. 4:00 p.m. See page 7.
- Saturday May 24 at 9:00 a.m.: PCARA Breakfast at Uncle Giuseppe's Marketplace, 327 Downing Dr., Yorktown Heights, NY.

Reminder — our next meeting will be combined with the 25th Anniversary at FDR Park on May 10.

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Dues for the upcoming year - KD2EVI

As you know, the PCARA membership year runs from June to May. I will be sending an email to the membership after you receive this issue of the *PCARA Update* asking you to please renew your club membership. Some members have already paid their 2025-2026 dues and will not receive the email.

We still can only accept cash or checks for your dues.

Our dues have not changed: \$25.00 for full membership, \$10.00 for senior (age 65+) membership, \$30.00 for family, and student membership is free. You can send a check made out to PCARA to:

> PCARA PO Box 146 Crompond NY 10517

— or I will take cash and checks at club meetings and events such as our May 10 meeting and Special Event at FDR State Park or at Field Day.

- 73 de David, KD2EVI

PCARA Board

President:

Greg Appleyard, KB2CQE; kb2cqe 'at' arrl.net Vice President:

Bob Tarsio, N2CBH; bob 'at' broadcast-devices.com Secretary:

Lou Cassetta, KD2ITZ; radiocassetta 'at' gmail.com Treasurer:

David Fredsall KD2EVI; joanndavidss88 'at' verizon.net Director:

Mike Dvorozniak, W2IG

Vice President Emeritus: Joe Calabrese, WA2MCR.

Net night

Peekskill/Cortlandt Amateur Radio Association holds a roundtable net on Tuesday evenings at 8:00 p.m. and a directed 'Old Goats' net on Thursday evenings at 8:00 p.m. Both events take place on the 146.67 MHz W2NYW repeater, offset -0.600, PL 156.7 Hz.

Join the roundtable to find out what members have been doing or join the Old Goats with net control Karl N2KZ for news and neighborly information.

VE Test Session

PCARA's latest VE test session took place on Saturday April 5 at Putnam Valley Library, following the monthly meeting. This was a Laurel VEC test session (no test fee). Team Leader Dave KF2BD was unavailable so Lou KD2ITZ was in charge of registering candidates and assigning volunteer examiners.

There were two candidates for the test session. Philip KC2DGF of Hopewell Junction, NY had previously upgraded from Technician to General at PCARA's March 1 session. On April 5 he passed the Element 4 examination and upgraded from General to Extra. The FCC processed his upgrade on April 7 and assigned new call sign **AD2KD**. Zenen Martin of Beacon, NY was successful in the Technician test and received his new call **KE2FRX** from the FCC on April 9. Well done to both!



Candidates used tablet computers with ExamTools to answer their questions during the April 5 VE Test Session.

Volunteer Examiners who took part in this session included Lou KD2ITZ, Joe W2BCC, Rob AD2CT and NM9J. Lynn KV2J (Poughkeepsie) was also observing events. This was PCARA's second test session using the ExamTools online system for administering, scoring and signing forms electronically. Our previous session in March had relied on paper tests and answer sheets that were scored using "Scan with GradeCam™". This time, questions, answering and scoring all took place on 10-inch tablet PCs supplied by Joe W2BCC — with not a sheet of paper in sight.

Apart from operator error on the NM9J notebook, the ExamTools system and transfer of results to the Laurel VEC system went smoothly for the second time.

PCARA's next VE Test Session may be scheduled during Field Day in June. Keep an eye on the web site and Google groups list server for details.

- NM9J

Adventures in DXing

Simple Things

Here are some little projects that anyone could do. They might actually be useful, too.

I have the most basic and classic AM/FM radio

that is still in production: A Panasonic RF-2400. The price was right: I received it as part of a 'goody bag' package given to attendees at a banquet. A new version, the RF-2400D, is now offered featuring a tuner using digital processing and other upgrades. Both versions can operate on



Panasonic RF-2400 analog AM/FM receiver.

AC power or four AA sized batteries. Battery drain is at a minimum. You could swear it will play nearly forever!

The radio has served me well over the years. It had one slight flaw. It had a 'touchy' volume control possibly because the potentiometer was standard instead of audio-taper? I will never know. In time, the control became 'dirty' and it was hard to get just the right amount of audio to my preference. I didn't have the time or interest to spend with the problem. I just used another radio.

As rudimentary as it might sound, I have never been a fan of potentiometer cleaning sprays. In the old days, spraying scratchy 'pots' for aural relief produced only temporary results. The old formulations would be greasy and attracted dust and other debris in time. They may even cause deterioration of the carbon pad the slider would ride on causing complete failure. It might be easier just to find an OEM or other identical part and swap it out.

In my retirement, I have had time to visit with old electronics that I have stored for years but never got around to repairing. My good friend Bob, N2CBH, acquainted me with a product that has become the 'gold standard' of control cleaners. It is a familiar friend to anyone who dabbles in electronics repair: Caig Laboratories *DeoxIT*[®] *D-series*. I tried the spray version during a restoration of an old stereo with Bob's help and I was awakened to its quality and results.

I returned to my Panasonic RF-2400 and gave the volume control



Caig DeoxIT D5 spray improves electronic connections.

a 'spritz' and also gave the band switch a little for good measure. Bingo! The radio operated like new again. Great news, via a very easy and simple solution.

I was fascinated by the simplistic design found inside the RF-2400. Many of the radio's essential parts are incorporated into a single Sony CXA1619BS chip. I was also delighted to see two ceramic filters — one for AM and one for FM — to narrow the received bandwidth. Fancy stuff! Just a few screws later, the radio was back together and the enjoyment returned. Everything can be improved! How about its antenna?

I have never been a big fan of delicate telescopic whip antennas, especially those that include a swivel mount — or even worse — a swivel mount that only goes in one direction. These antennas are just dying to be bent, fall apart or otherwise sadly broken.

I live right near the New York/Connecticut border in the most eastern part of Northern Westchester. Some local FM stations just don't come in that well due to a combination of distance, terrain or electrical noise. With the built-in antenna fully collapsed and in place on the back of the radio, only the strongest stations would be heard without static or breakup — indoors or outdoors. There must be an easy way to bring reception alive!

Remember the project I was telling you about? This is where my highly sophisticated *and improved* antenna design comes into play! For the low end of the FM radio band — about 90 MHz — I calculated a quarter wavelength to be about 32 inches long. (I did not add the exposed length of the retracted whip antenna or wire lead-in inside the plastic chassis so that the antenna would be applicable to any radio needing a signal boost.)

But how do you keep the antenna wire aloft and not flat on the ground? If you limited yourself to just the 32 inches of wire, your choices of anchoring the far end would be very limited and impractical.

Instructions: I cut a piece of wire to 32 inches long

and attached one end of the wire to an alligator clip. Fold over a tiny bit of wire at the other end to form a little loop. Find a long length shoelace, string or light rope and attach an alligator clip to one end of that, too. The other end of the shoelace gets



Karl connected 32" of blue wire to an alligator clip. The other end was extended with a shoelace. [N2KZ pics.]

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tied to the very end of the wire at the loop creating a convenient extension of length. A meeting held to-

gether in a mutual knot. Fly the shoelace to a more distant anchoring spot. Use the



Shoelace was connected to the loop at the end of 32" of wire. [N2KZ pic.]

alligator clip at the end of the shoelace to hold your support line in place. Attach the wire alligator clip to the end of your radio's folded down whip antenna. Antenna attached!

Look for a nearby place where you can wrap the shoelace around something (maybe a curtain edge, a

window lock or a low nearby branch) — or farther away where the shoelace can stretch all the way out and use the alligator clip to anchor it (a curtain. a valance, a doorknob?) Use your imagination! It makes for an agile system that will fit most any application and bring you the added signal you need *instantly*! On my first



32" of wire connected to RF-2400 receiver's telescopic antenna by alligator clip and supported by shoelace attached to a window lock. [N2KZ pic.]

trial, the difference in reception was profound and much better than the provided telescoping whip. The signal from very local WHUD 100.7 MHz FM really flooded the front-end of the set producing noticeable images on several places on the dial. Still, the added signal brought the world of FM radio to an all-time high for this little set. Many stations that were not even heard before were now ready for listening.

Operating note: Simple as it might be, the wire does have some directional properties. I hear a very local, but low power, NPR station on 88.9 — WWES Mt. Kisco — that is short-spaced to another 88.9 station — WFRS from Smithtown, Long Island. One morning I discovered that my wire was in a null for Mt. Kisco. Where did WWES go? I moved the wire just a couple of feet and restored reception. I felt like I was dealing with a sharp-nosed Yagi array. Not quite, Karl!

This antenna may sound very primitive to you but it has its applications. If a stiff whip antenna cannot be extended or hidden, this might be your answer. If you are outside where reception may be inadequate, you might be able to loop your shoelace around a low branch or bush — anything that is even a little elevated off the ground. Fool around with it and have fun!

Another tip: Are you in a high signal environment? If you use a 'Walkman' type radio that uses the wired earbud cords for reception, and your radio does not have a signal hi/low switch, you can try folding the earbud wires over and back into a little bundle (essentially shortening the physical length of the cord) to at-

tenuate the overpowering signals. The shorter you physically make the earbud's cord, the less signal will get into the radio — possibly making your noisy reception become



Folding the earbud cable back on itself may reduce signal overload. [N2KZ pic.]

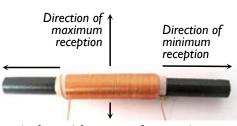
listenable. Hold the earbud leads in the little bundle with a wire twist-tie or other similar solution.

Get In The Loop

There are simple ways to maximize AM broadcast signals, too. Portable AM radios usually have ferrite loop antennas built inside their cases, eliminating the need (or possibility) to string out wire antennas for good reception. Older radios actually have wire loop antennas, usually strung in a box-like pattern on the rear panel of the set, that double as the back door to the radio and its tubes.

There are two ways to improve broadcast AM reception to household radios. Ferrite loop antennas,

common to most portable radios, have a bi-directional pickup pattern. Rotate your radio or simply walk around until rec you find a good pickup point.



Ferrite loopstick antenna has maximum reception broadside to the ferrite rod.

If you want to supercharge your reception, just use an inductive loop! To serve the needs of modern portable radios, you can easily make a loop using a short length of small gauge *white* PVC pipe. (Colored PVC pipe may be partly conductive, reducing coil efficiency.)

Wind the coil with small gauge wire. The amount of turns and length is not critical. Drill two little holes,

one on each side of the length, to hold your wires in place — or anchor the wires with small screws for easy connection to alligator clips.

Attach a long piece of antenna wire to one side of the coil. For an extra boost, attach a good ground to

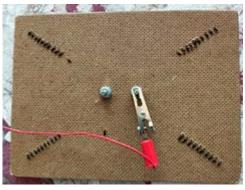
the other end. Bring the coil, with attached antenna and ground wires, towards your portable radio and hear the received signals rise up from the noise.



Coupling an external wire antenna to a portable AM radio using a coil of wire wound on PVC pipe. [N2KZ pic.]

For the older tube sets, cut a piece of Masonite® or similar material to the size of the back of your radio.

The loop is a spiraling-in multiple circle of wire. Drill two holes for screws in the middle of the board to terminate the start and finish point of the wires. This is attach your



Insulating board drilled for wire loop and where you will external antenna/ground. [N2KZ pic.]

outboard antenna and ground. Drill sets of holes away from the four corners for the amount of turns you wish to create. Loop the wire around and around and attach

the wires to the screws. Now you have your inductive loop!

Experiment with the orientation of the loop with your set. Does it work better placed horizontally in back of the radio - or - vertically? You will probably find a 'sweet spot' where the signals will peak. Are the



Spiral loop of wire wound on insulating board couples an external wire antenna to built-in antenna of a Motorola vacuum tube radio. [N2KZ pic.]

signals too strong? Move your loop away from your radio until you like what you hear. Think of moving it around as a physical RF gain control!

You might even notice that you can peak and null your inductive loop in concert with the built-in ferrite loop. In essence, you have two antennas addressing one receiver. With some experimentation, you can null a strong co-channel station to hear a weaker signal below it. The results of peaking and nulling thrill seasoned medium wave DXers.



Move your loop closer or further away from the radio for the right amount of coupling. The radio here is a Motorola 59B11. [N2KZ pic.]

This is only the beginning! These inductive loop antennas are the most basic designs. The loops can be made to considerable sizes for superior pickup and rotation. You can build fully tuned designs or those that include active powered amplification. A remarkable list of many other more advanced designs can be found on the website of the International Radio Club America's website: https://www.ircaonline.org/editor upload/File/ reprints/irca-reprint-index.pdf (pdf file). Have fun with this concept. Get in the loop!

Congratulations to the Peekskill/ Cortlandt Amateur Radio Association on their 25th year anniversary. It has been a sweet ride! Here's to many, many more years of fraternity and fun!

73s and dit dit de N2KZ 'The Old Goat.'



NY QSO Party 2024

The latest New York QSO Party took place on Saturday October 19, 2024. Results were published by the organizers, Rus K2UA, Ken N2ZN, and Mike N2MG on April 7, 2025. Their full report is available on the New York QSO Party web site, https://nyqp.org.

There were two entries from PCARA members. Joe WA2MCR was operating from his basement shack using the club's W2NYW call sign. Joe had skipped PCARA Breakfast to be ready at the QSO Party's 10:00 a.m. start time. I paid several visits to Joe's basement shack during the contest and added CW and SSB contacts to the score. See the November 2024 *PCARA Update* for details. The other member making an individual entry was Scott KE2CNS.

To quote the NYQP report: "In the High Power Multi-Single category, WA2MCR and NM9J returned to activate W2NYW from the Peekskill/Cortlandt ARA club station in Westchester County and won the category with a 51k score, more than twice their 2023 entry. Nice job!"

High Power, Multi-Single

Call	PH Qs	CW Qs	Total Qs	Mult	Score
W2NYW	410	59	469	97	51,216



Joe WA2MCR operates with club call W2NYW in the October 2024 New York QSO Party.

David K2WPM had been planning to operate from Trump State Park and Fahnestock State Park, but a work emergency prevented any operation. The second entry from a PCARA member was by Scott KE2CNS. He made 37 contacts on phone and CW, with a multiplier of 25 Counties/State/Provinces resulting in an actual score of 950 points. This placed Scott 25th out of 26 entries in the Low Power- Mixed category and 4th out of 6 in the Rookie Overlay category.

Club competition

Joe WA2MCR's entry and Scott KE2CNS' entry were added together for the **Club Competition**. The combined score of 52,166 points placed PCARA 11th out of 87 club entries.

Club Scores

Club Name	Score	Leaders
Niagara Frontier Radiosport	1,420,293	In-State Winner
Hudson Valley Contesters and DXers	1,103,090	
Rochester DX ASSN*	1,006,734	
Frankford Radio Club	643,508	
Yankee Clipper Contest Club	376,452	
Order of Boiled Owls of New York	261,339	
Society of Midwest Contesters	135,677	Out of State Winner
Minnesota Wireless Association	126,885	
Potomac Valley Radio Club	117,762	
GKCC	88,527	
Peekskill/Cortlandt ARA	52,166	
Contest Club Ontario	46,158	
Central Texas DX and Contest Club	45,936	

Scott KE2CNS commented: "Joe is an impressive radio operator. I sat next to him at last year's Field Day, so I've seen it first-hand. For my part, the NY QSO Party was my high-water mark for contacts made in a day. It's much more common for me to make only a few contacts in a session. Maybe we can encourage more PCARA members to participate in a club effort for the 2025 QSO party."

Plaques for 2024

From correspondence between David KD2EVI and NYQP, PCARA sponsored the same two plaques as the previous year — 'Non-NY SSB Low Power' and 'NY Mixed Mode QRP'.

Non-NY SSB Low Power was won by Art N3AAA (PA) for the fifth time in a row with a score of 10,812 points from 204 QSOs. NY Mixed Mode QRP was won by Mark WA2NYY from Hopewell Junction, with a score of 35,046 from 253 CW and 25 phone QSOs.

Next time

The next New York QSO Party takes place on Saturday October 18th, 2025 for 12 hours starting at 10:00 a.m. Eastern. Why not join in — and make sure your entry is aggregated toward the Club Score for Peekskill/Cortlandt Amateur Radio Association. There may be some changes to the rules, so keep an eye on the NYQP web site, https://nyqp.org, nearer the time.

PCARA 25thAnniversary

Peekskill/Cortlandt Amateur Radio Association (PCARA) was originally established to promote amateur radio in the City of Peekskill and the surrounding area of Cortlandt, NY. This followed installation in September 1999 by Bob, N2CBH of a 2 meter repeater on the hilltop site already used by the KB2CQE/R UHF repeater. PCARA members are drawn from all the nearby towns of Westchester and Putnam Counties.

PCARA was incorporated as a non-profit community service organization in the State of New York on April 19, 2000. Activities undertaken in the Association's first year included ARRL Affiliation, website establishment, club call, repeater autopatch, participation in Kids' Day, Jamboree on the Air, and Boy Scout Trekoree.

This year, 2025, is the **25th Anniversary of the Incorporation of PCARA**. The event is being celebrated in May, rather than April in the hope of better weather outdoors. The Picnic Shelter adjacent to Park-



ing Lot 3 in FDR State Park has been reserved by David KD2EVI for PCARA's celebrations on Saturday May 10, 2025.

Franklin D. Roosevelt State Park can be reached from the Taconic State Parkway (Exit 16) or from Route 202, at street address 2957 Crompond Road, Yorktown Heights, NY 10598. Parking Lot #3 is at the northwest corner of the



Park, facing the Taconic State Parkway.

The intention is to set up a Special Event Station on the HF bands using Club Call W2NYW. Setup will commence at 10:00 a.m. and operation will take place (rain or shine) from 11:00 a.m. to 4:00 p.m. Joe WA2MCR has registered the event with the ARRL web site, where the following information is available (see



Picnic Shelter 3B near Parking Lot 3 in FDR State Park.

screen shot).

05/10/2025 | PCARA's Silver Anniversary

May 10, 1500Z-2000Z, W2NYW, Yorktown Heights, NY. Peekskill/ Cortlandt Amateur Radio Association. 7.245 14.245 21.245 28.445. Certificate & QSL. PCARA, PO Box 146, Crompond, NY 10517. Peekskill/Cortlandt Amateur Radio Association is celebrating 25 years since its date of incorporation in April 2000 with a Special Event Station in Franklin D. Roosevelt State Park, Yorktown Heights, NY. Parks on the Air Number US-2056." pcara.org

Please note that there will be other events taking place in FDR State Park on May 10. This includes the BluePath Service Dogs 9th Annual Walkathon from 10:00 a.m. to 1:00 p.m., starting from FDR Parking Lot #4, just around the corner from PCARA. They will have a Mobile DJ, photos, bouncy houses, sports and food trucks. See: https://bluepathservicedogs.org/events. There may also be activity on the "Ace Place" 9-hole Disc Golf course — which is located in the woods between Parking Lots #4 and #3. - NM9J

Food for 25th Anniversary – KD2EVI

It has been decided to order sandwiches from Sansotta Deli for our event at FDR State Park on May 10. We approved spending club funds for this event at our last meeting.

I will email a copy of the sandwich menu to the club membership a week prior to the event. I ask that you select your sandwich (or wrap or salad) and respond to me. I will put a list together and order the sandwiches from the deli ahead of time. One of us will pick up the sandwiches and bring the food to the park. We will be ordering only cold sandwiches. I will also order potato salad to go with the sandwiches. If you want to look at the menu, the web address is http://sansottadeli.com/. The club will also buy bottles of water and soda for the event.

If anyone wants pizza instead of a sandwich, let me know and we can order pizza that day.

- 73 de David, KD2EVI

Jay strikes again – follow up

In the previous issue of *PCARA Update*, mention was made of an article by PCARA member Jay NE2Q, published in *QST* for April 2025, entitled "Turn Your Vertical Antenna into a Rotatable Beam". Jay described

the use of carbon fiber tubing with a VHF antenna and an HF antenna. Jay brought his length of "carbon fiber slotted sleeve" to the PCARA Breakfast on Saturday March 15 for a show and tell.

At the next breakfast, Jay mentioned that there has been a great deal of interest in the QST article and he has received a large number of



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email messages seeking further information. Here are some of the messages, courtesy of Jay.

"Are you running aluminum tubing or a wire inside the carbon fiber tube? What was the diameter and wall thickness that you used? Was it pultruded or wrapped?"

"Would you expect a metal pipe with a slot in it to give the same result? Or what about a section of coax with a narrow longitudinal slice in it?"

"Is there any reason your carbon fiber sleeve installation would not work on a Hustler 4BTV vertical trap antenna with the same results that you have described in your article? Also, where did you purchase your carbon fiber tube?"

"What luck have you had so far in a motorized version of the tube? I guess I could use a fixed tube and rotate the vertical with a light-weight TV rotor."

"How did you cut the slit in the carbon fiber?"

"I have noticed that purchasing a carbon fiber tube will cost anywhere from \$29.99 to \$200 so my question is — is there a particular carbon fiber that we need? The one we are looking at on Amazon is '3K Carbon Fiber Tube ID 48mm x OD 50mm x 500mm Glossy Surface Roll Wrapped' for \$29.99." "I really liked your vertical antenna article in the new QST. I would really like to know if the carbon fiber tube, or its diameter had any effect on the VSWR/reflected power seen by the transmitter. It would seem to me that could be a problem? I can't wait to try this concept as it could be a real breakthrough for temporary or HOA antennas!"

"The first thing that caught my eye was the "carbon fiber" pipe with the slit cut in it. It looked suspiciously like an ABS sewer pipe, but I was wanting to believe that I could shield my vertical and so read on."

"Your QST article on the Loof Lirpa Slot in the April issue was great. I built four of them for 20 meters and arranged them in a 4 square array. Using 1kW on FT8, my signal is now nothing to sneeze at."

"Recently I read the 'Turn Your Vertical Antenna into a Rotatable Beam' article in the April 2025 issue. I found it very interesting but wondered if this wasn't the April Fools' article for the year? Others I've talked with on our ham net wondered the same thing. So can you please answer the question, is this article for real or an April Fools' joke?"

All comments have been anonymized to protect the originators.

Anytone[®] information

In the *PCARA Update* for April 2022 there is an article "Anytone® AT-578UVIII review – DMR/FM transceiver". This describes initial experiences with a mobile FM/DMR transceiver which is still in use in the NM9J shack.

One item in the article reads:

"There is much good advice on setting hold times for scanning and many other topics from Jason Reilly, VK7ZJA at his web site: http://members.optuszoo.com.au/ jason.reilly1/578mods.htm"

A recent message from John KE2DTY points out that the link to Jason VK7JZA's information is no longer functioning. I found that, sadly, Jason had passed away in January 2023. (https://forums.qrz.com/index.php?threads/silent-key-jason-reilly-vk7zja.847538/)

Fortunately Norman M6NBP reports that Jason's excellent information regarding Anytone AT-578 and AT-868/878 transceivers is preserved at the following web locations:

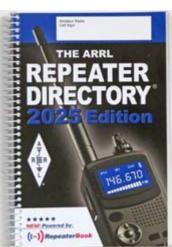
http://anytonetechzone.byethost7.com/578techmods.htm http://anytonetechzone.byethost7.com/878techmods.htm

There is a huge amount of information on Anytone DMR transceivers on these pages. Good news that it is still available.

ARRL Repeater Directory

The ARRL Repeater Directory 2025 Edition was published in mid-March 2025 at a price of \$19.95. My copy arrived at the end of March and revealed some interesting changes compared to previous editions.

The very first ARRL Repeater Directory appeared in 1971 and occupied seven sheets of letter-size paper. It changed to a booklet in 1972. I came across the ARRL Repeater Directory in the



ARRL Repeater Directory 2025 Edition.

On this side of the pond, the first *Repeater*

Directory that I purchased

was the 1985-1986 edi-

tion, published by ARRL

in 1985. By then, it had

grown to 178 pages and

ture depicts the book's

editor, Jim Clary

MHz.

cost \$3.00. The cover pic-

WB9IHH checking anten-

nas for W1AW repeaters

The antennas in the

1985-86 cover picture are

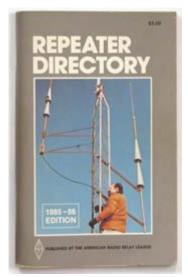
AEA Isopoles for 146

and 220 MHz. The AEA

Isopole was a vertically

on 2 meters and 220

U.K. in the early 1980s when my local radio club, Bury Radio Society, was publishing modifications to UK 27 MHz FM CB transceivers, for operation on amateur frequencies — 29.5 - 29.7 MHz FM.

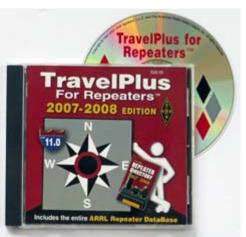


ARRL Repeater Directory, 1985-1986 Edition.

polarized omnidirectional antenna with two conical sleeves, clamped to a 1¼" TV mast. The lower sleeve decouples RF from the lower part of the mast. Although AEA (Advanced Electronic Applications Inc.) closed in the late 1990s, Isopole antennas are still available from Spectral Engineering of Mission Viejo, CA. (http://isopole.com).

A new edition of the ARRL Repeater Directory appeared each subsequent year — with publication timed for the Dayton Hamvention in mid-May. For 2011-2012, the pocket size booklet was joined by a $6" \times 9"$ spiral-bound desktop edition. From 1997, ARRL also

produced a "TravelPlus for **Repeaters**TM CD-ROM that contained the ARRL's repeater database, capable of generating maps and repeater lists on a Windows PC. TravelPlus was discontinued in 2016, when ARRL partnered with



ARRL TravelPlus for Repeaters CD-ROM could locate repeaters along a travel route.

RFinder. ARRL stated at the time:

"ARRL has established an agreement with RFinder, the creator of a web and app-based directory of Amateur Radio repeaters worldwide, to be its preferred online resource of repeater frequencies..."

"ARRL will discontinue its own products that had supported digital listings of repeater data including the TravelPlus for Repeaters[™] software and its own apps. ARRL is working with RFinder on a plan to migrate existing ARRL app users to RFinder, in order to support remaining subscription terms."

RFinder was a subscription-based website with a \$14.99 annual fee and listings of 55,000 worldwide repeaters. RFinder also sold the RFinder B1 Android smartphone with digital/analog transceiver covering 144 and 440 MHz DMR and FM.

In August 2024, RFinder was on the point of being acquired by Statavest Holdings LLC and ComJoT LLC, but the deal fell through. In October 2024, RFinder announced that it was now using the new Unified Radios Repeater Database. See: https://rfinder.wiki/doku.php?id=update-status. Browsing to http://rfinder.net will lead you to a "Unified Radios" web page which states:



RFinder B1 phone.

"Following RFinder's default and transfer of assets to avoid litigation, Unified Radios has taken over management of the RFinder Software and Worldwide Repeater Directory. **Important Information**: Service Status: Unified Radios is providing continued service as a courtesy. We may implement charges or discontinue these services in the future."

The *ARRL Repeater Directory 2025 Edition* changed its online affiliation and is now "Powered by Repeater-Book".

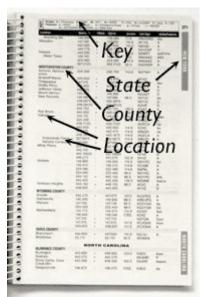
RepeaterBook[™] (https://www.repeaterbook.com) is a free online repeater database with apps for iOS and Android. ARRL states that it does not curate these listings, instead frequency coordinators and repeater owners

are advised to submit corrections directly to Repeater-Book.

The printed Repeater Directory 2025 Edition has some changes compared to previous editions. The 2025

repeater list is now grouped by state, then county within each state, then by location within each county. For example, our local repeaters are listed under New York \rightarrow Putnam County \rightarrow Lake Peekskill. This is better than the 2024 edition, which grouped by State then by location.

Another improvement in the 2025 edition is a key to the abbreviations at the top of each odd-numbered ARRL Repeater Directory 2025 page. These abbreviations indicate the type of repeater (analog



Edition lists repeaters by State, County and Location.

FM, DMR, M17, NXDN, P25, D-Star, Yaesu System Fusion etc.) and other useful information.

One item from previous editions of the Repeater Directory that is missing from the 2025 edition is the "Coordinator" column, naming the frequency coordinator.

RepeaterBook

RepeaterBook.com began in 2006 as NWHam.com. It was developed by Garrett Dow, KD6KPC (Gresham, OR), as a database-driven website focusing on the Pacific Northwest. The NWHam.com site grew to cover the entire United States plus Canada and the name was

changed to Repeater-Book.com. The database contains over 32,000 repeaters with



more than 4,500 visitors to the site each day. Nicholas Pike M1HOG of ZBM2 Software created the apps for Android and iOS, including 'BlueCAT' Bluetooth programming of certain Icom and Yaesu transceivers. (See: https://www.zbm2.com/).

RepeaterBook.com depends on 95 local administrators who research public information and manage repeater entries — plus local users who can also contribute information to the database. Anyone who visits the site is encouraged to contribute, building a community of information.

If you need more detail about the repeaters listed in ARRI's 2025 directory, it is well worth browsing to

the RepeaterBook web site, https://www.repeaterbook.com. For example, once you have a list of New York re-

peaters for the 2 meter band on-screen, you can click on the appropriate column header to sort by County. If you then click on the call sign of an individual repeater, a new page appears with extensive



RepeaterBook web site lists repeaters on 2 meters in New York State. Click on column heading to sort by county.

information about sponsor, nets, frequency coordinator, location, coverage map, operational status etc.

Data can be exported from the RepeaterBook web site for use with radio programming software such as CHIRP, RT Systems and from well-known transceiver manufacturers. Export requires a valid call sign and registration with the web site. CHIRP can also import data directly from RepeaterBook.

- NM9J

Visit to Southington – N2EAB

A photo of us at the March 30, 2025 Southington hamfest. Mike KD2PYS and I bumped into Lovii, N2CKD at the very well attended event. I mentioned to Lovii that he should come to our 25th anniversary special event. He said he would like to but needed to check with his XYL.



L to R: Mike KD2PYS, Lovji N2CKD and Mike N2EAB.

- Mike N2EAB

Icom ID-880H installation in Audi A3-KD2EVI

Last August I attended a talk on portable radio operation given by Charlie "Smitty" Smith, KC1IKA at the New England HamXposition[™] in Marlborough, Massachusetts. This talk encompassed mobile operation and KC1IKA described how he put together and powers his portable and mobile equipment.

I was very impressed by the description of the mobile installation and decided to do something similar in my Audi. Up until this point I have been using my TYT TH-8600 in a Go-Box, which I described in an earlier issue of the *Update*. [September 2023, p8 -*Ed*.] Thanks are owed to Jared, KD2HXZ for the Go-Box idea. The biggest drawbacks of the Go-Box are not being able to see the display nor reach the controls while driving. If I have a passenger, the box needs to be moved to the rear, and with multiple passengers, into the trunk.

I bought an Icom ID-880H from club member Rich

W2ZP at the Bring & Buy Auction earlier this year and decided that the ID-880H would make a better mobile radio due to, among other things, its detachable control head. I am not unhappy with the TYT



Icom ID-880H dual-band FM and D-Star transceiver.

recharged by a West

Mountain Radio

ISOpwr+. This ar-

rangement isolates the

auxiliary battery from

the car's electrical sys-

tem, will not deplete

the main vehicle bat-

tery while using the

radio with the engine

off and recharges the

TH-8600, but Icom, and other Japanese manufacturers make nicer radios, in my opinion. The A3 is a small car and it is difficult to find a spot to mount a mobile radio. Keeping the main body of the radio in the trunk solves the space problem and makes the entire installation less noticeable to passers-by when parked.

The 14 amp current requirement of a 50 watt mobile radio is beyond what the typical vehicle 12 V power outlet can provide. KC1IKA powers his mobile radio with a 35 amp•hour (Ah) lead acid battery that is



West Mountain Radio ISOpwr+ auxiliary battery isolator.

the car is running. Unfortunately the ISOpwr+ has been unavailable since at least last August. On the West Mountain Radio website it was recently being shown as available at the end of June, but I decided not to wait and take a chance on it remaining on back-order. Instead, I will be using a 12 Ah Bioenno Power LiFePO₄

battery. The 4.5 Ah battery in my Go-Box will power the TYT for over 10 hours of mobile use (mostly listening) and the larger battery should be more than sufficient for most purposes, even given the higher power requirements of the 50 watt output Icom.



Go-Box on floor with TYT TH-6800 25 watt dual-band transceiver and Bioenno 4.5 Ah lithium iron phosphate (LiFePO4) battery. [KD2EVI pic.]

This may not be as robust a power solution as KC1IKA's method, but I can use the radio now and not wait on a product to come back into stock. The Audi has a very complex electrical system and I am very reluctant to tap into a fuse block or another power source for fear of causing problems.

Bioenno Power recently had a two-for-one sale on its 12 Ah batteries and I took advantage of it. Two

12 Ah batteries will fit inside a plastic Harbor Freight .30 caliber ammo can, giving me more battery power. If the battery had not been on-sale I would have only used one. The



Harbor Freight polypropylene ammo box. [KD2EVI pics.]

Dakota 10 Ah battery (lower priced) that I bought for my Yaesu FT-817 was listed as out-of-stock when I was searching online and does not come with Anderson



Powerpole[®] connections. The batteries are not connected or switched together, switching batteries will mean stopping the

10 Ah Dakota Lithium battery (left) and 12 Ah Bioenno Power LiFePO4 battery.

car and moving the Powerpole connection. There is a

power outlet in the trunk, and if I were to find myself in a situation where the two batteries were insufficient, I could use the radio at reduced power as long as the engine was running. 12 volt LiFePO₄ batteries cannot be directly recharged from a vehicle's 12 volt electrical system as they require over 14.6 volts.

I had originally planned to use a remote mount from Lido, either a seat bolt mount as I use in my truck or a cup-holder mount, to hold the control head, but a recent visit with Ray, W2CH showed me a better way. Ray uses Velcro to secure the control head of his mobile radio to the vehicle's dash. This method keeps the display in the driver's line of sight and allows easy access to the controls. The ID-880H has a small, light control head and should be ideal for a Velcro mount.



ID-880H control head secured to the Audi dashboard using Velcro sticky-back squares. [KD2EVI pic.]

The main body of the radio is attached to the metal on the underside of the rear package shelf. I ordered a mobile mount from eBay and used sheet metal

screws to secure the mount, as I could not access the upper side or the package shelf support to fasten the mount with nuts and bolts. eBay was also the source for a microphone extension cord



Mobile bracket installed under the rear package shelf. [KD2EVI pic.]

and a vendor on Walmart's site supplied an RJ12 cable to connect the control head to the radio.

The microphone and control head cables are tucked under the interior trim using plastic trim tools that I purchased when the TYT was installed in my Subaru Forester. The Forester was traded in on the



Icom ID-880H transceiver body mounted in the mobile bracket. [KD2EVI pic.]

Audi and the TYT moved to the Go-Box. I use tape to secure the interior cables when they cannot be hidden under trim or carpet. Zip ties hold cables in the trunk. A computer speaker is 'Velcroed' behind a rear seat rest and connected to the speaker port of the radio. The speaker is light-beige in color and is very noticeable from outside the car. I will need to address this issue.



Plastic trim removal tools, Velcro, adhesive tape, zip-ties and other supplies used to install the ID-880H. [KD2EVI pic.]

The entire installation process took a few hours, but I now have an improved mobile radio arrangement and also a Go-Box for portable VHF/UHF operation. I owe thanks to KD2HXZ, W2CH, and KC1IKA for use of their ideas.

- 73 de David KD2EVI

Peekskill / Cortlandt Amateur Radio Association

Mail: PCARA, PO Box 146, Crompond, NY 10517 E-Mail: mail 'at' pcara.org Web site: http://www.pcara.org PCARA on Facebook: https://www.facebook.com/pcararadio YouTube Channel: https://www.youtube.com/ @peekskillcortlandtamateurr7670

PCARA Update Editor: Malcolm Pritchard, NM9J

E-mail: NM9J 'at' arrl.net Newsletter contributions are always very welcome! Archive: http://nm9j.com/pcara/newslett.htm

PCARA Information

PCARA is a Non-Profit Community Service

Organization. PCARA meetings take place every month (apart from July/August break). See http://www.pcara.org for current details.

PCARA Repeaters

W2NYW: 146.67 MHz -0.6, PL 156.7Hz **KB2CQE:** 449.925MHz -5.0, PL 179.9Hz **N2CBH:** 448.725MHz -5.0, PL 107.2Hz

PCARA Calendar

Sat May 10: PCARA 25th Anniversary Celebration, FDR State Park, by Parking Lot #3, Yorktown Heights, NY. 10:00 a.m. - 4:00 p.m, rain or shine. **Sat May 24:** PCARA Breakfast, 9:00 a.m., Uncle

Giuseppe's, 327 Downing Dr. Yorktown Heights, NY.

Hamfests

Check with organizers before leaving.

Sun May 4: Orange County ARC Hamfest, Black Rock Fish and Game Club, 5 Pleasant Hill Rd., Mountainville, NY. 8:00 a.m. **Club Table.**

Sat May 17: S. Berkshire ARC Hamfest, Goshen Fairgrounds, 116 Old Middle St., Goshen, CT. 8:00 a.m.

Sun May 18: Splitrock ARA Tailgate Hamfest, Landing Park Recreation Complex, 165 Landing Rd., Landing NJ. 8:00 a.m.
Sat May 24: BARA Spring Hamfest, Westwood Regional High School, 701 Ridgewood Rd, Township of Washington NJ.8:00 a.m.

VE Test Sessions

Check with the contact before leaving.

May 4: Orange County ARC Hamfest, Mountainville NY, 9:30 a.m. Contact VE w2bcc'at'arrl.net.
May 15: WECA, Westch Cnty Fire Trg Center, 4 Dana Rd Valhalla NY. 7:00 p.m. Contact VE, N2GDY'at'weca.org.
May 16: Orange County ARC, Munger Cottage, 40
Munger Dr., Cornwall NY. Contact VE Joseph DeLorenzo, w2bcc'at'arrl.net.



Peekskill / Cortlandt Amateur Radio Association Inc. PO Box 146 Crompond, NY 10517