

THE HAMSTER

February 2024

Official Monthly Newsletter of the Rochester Amateur Radio Club

Founded In 1932 - 50+ Years Of ARRL Affiliation



- ◆ **President's Message** - page 2
- ◆ **RARC Training Program** - page 3
- ◆ **ZOOM Online Meeting Login Info** - page 4
- ◆ **ARES** - page 5
- ◆ **Hamster Hints** - pages -6-7
- ◆ **Contest Corner** - pages 8-10
- ◆ **Technical Committee Report** - pages 11-13
- ◆ **Education** - page 14
- ◆ **JM *Rocket* Radio Club** - pages 15-18
- ◆ **Updated 125Live Ham Radio Club** - page 19
- ◆ **Updated RARC Buy & Sell** - page 20
- ◆ **Winter POTA** - page -21
- ◆ **Local Ham Radio Nets** - page 22
- ◆ **Join ARRL** - page 23
- ◆ **Contact RARC** - page 24



PRESIDENT'S MESSAGE

Pat (KE0WWG) - President - pat@theewok.net

Happy February (which lately feels like March) to the RARC members!

Last month's RARC Holiday Party at Forager Brewery went well and I hope everyone enjoyed it. **Thank you to Steve (W0STV)** for putting that together for us to enjoy along with your service as the President for the past two years.

This year I am embarking on a new journey being the club President. I appreciate the support I've received so far and look forward to the time ahead to see what we can do.

In the relatively short amount of time that I've been licensed, I've really come to realize how this hobby has so many diverse avenues with many aspects that impact everyone differently. Last year I caught the POTA bug and want to increase my POTA activations in 2024.

Thinking about 2024, it made me think of a couple of questions:

- **Have you thought about what you want to do with Amateur Radio this year?**
- **What can the club do to help accomplish that?**

These are things that I want people to think about over the next month or two and I will come back and solicit feedback from the group on this topic.

If you would like to get in touch with me directly, please call or text 507.461.6008 or e-mail pat@theewok.net.



RARC TRAINING PROGRAMS

Dan Stroh (N0SPN) Vice-President - dstroh57@yahoo.com



Hello all. As the new VP for 2024 I will have some programs for the group that I hope are informative and enjoyable for most of you.

In February please bring your hand held radios with attached antenna. I have built a simple test stand where you can test your HT for actual frequency transmitting (compared to what your HT screen says), actual power in watts. Plus, it will test your antenna for SWR and % transmitting efficiency. The test stand can handle BNC, male SMA and female SMA fittings, so it should work for all newer and older HT radios. It would be fun to see your old HT radios and fun to test them. Bring as many as you would like to test. For me, I was quite surprised how low the SWR was on my cheap Baofeng stock antenna and how high the SWR was on a supposedly much better antenna "brand name" was that I purchased.

In **March** I plan to do an actual **Parks On The Air activation at the EOC** (I have approval for demo purposes) and also show any who are interested how to do Parks On The Air Hunting. Fun and easy stuff!!



February 2024 RARC ZOOM Online Login Info

OPTIONAL FOR THOSE NOT ABLE TO ATTEND IN-PERSON



Below is the ZOOM login information for the **February 13, 2024, 6:30 PM CDT RARC meeting** . The ZOOM login info is also posted via the [RARC email reflector](#) prior to the meeting.

- ◆ **When:** February 13, 2024 @ 06:30 PM CDT (US and Canada)
- ◆ **Join Zoom Meeting (click on the link below):**
<https://us06web.zoom.us/j/9876548873?pwd=T0JBWEFzSCtBYzhiazA1NTdDb2Rkdz09>
- ◆ **Meeting ID:** 987 654 8873
- ◆ **Passcode:** : #####

- **For audio only from a mobile phone:**

Call: (312) 626-6799 US (Chicago) **Meeting ID:** 987 654 8873 **Passcode:** #####



ARES

AMATEUR RADIO EMERGENCY SERVICE

Steve (WØSTV) w0stv@yahoo.com
Olmsted County ARES-EC

The Olmsted January 13th ARES meeting reviewed and discussed how to handle and store ham equipment to get the maximum useful life from it. We discussed GOP with prearranged deployment strategies. We studied the use of pro-words for radio communications. Olmsted ARES members will need to fill out a new member registration form for 2024. We will have the previous applications. We need to update your radio licensing information, communications capabilities, and contact information. A picture of your drivers license will be added to the form. This will make it faster for our served agencies to ID you for deployments. This will gauge our membership training, response capabilities and active status. Orders were taken for ARES vest and magnetic vehicle signs to be distribute out at the February ARES meeting.

The February ARES meeting will be an interactive session in the Rochester EOC building that will require you have your HT with the Minnesota ARES simplex frequencies programed correctly. This will be a hybrid training session to see how well we can handle issues that could happen during an activation using our GOP and the communications tools at our disposal. Check the YouTube videos for amateur radio information on ARES and other amateur radio topics. The more you know!

Check into the Thursday evening Olmsted ARES digital and voice nets at 6:30 PM on the 147.255 or 146.820 repeaters to listen how we communicate between computers using radios. If you have a computer, a smart phone and a VHF radio you have the equipment to participate, just add an app to your phone, or download the program to your computer.

We will help you set up for digital operating during the nets. The more you know!

If you are interested in joining Olmsted or an ARES in your county contact Steve WØSTV at 507-254-3993 or at w0stv@yahoo.com for information.

Olmsted ARES Mission Statement:

To be so effective that you are able to help others.



HAMSTER HINTS

Bob (KEØEXE) gettuit@charter.net

"Ee-eww! What is that *smell?!?*"

If you've ever heard words like this from your spouse, you might be suffering a form of verbal "abuse" that is often directed at hams and other lovers of vintage radio and electronic equipment. You know: it is often difficult for others to appreciate the nostalgic, comforting smells given off by decades-old plastics, as they mingle with the musty odors of cloth wire-insulation, paper speaker cones, and the various chemicals used in ancient resistors, capacitors, and transformers. Here is what I did, to mitigate the situation just a bit...

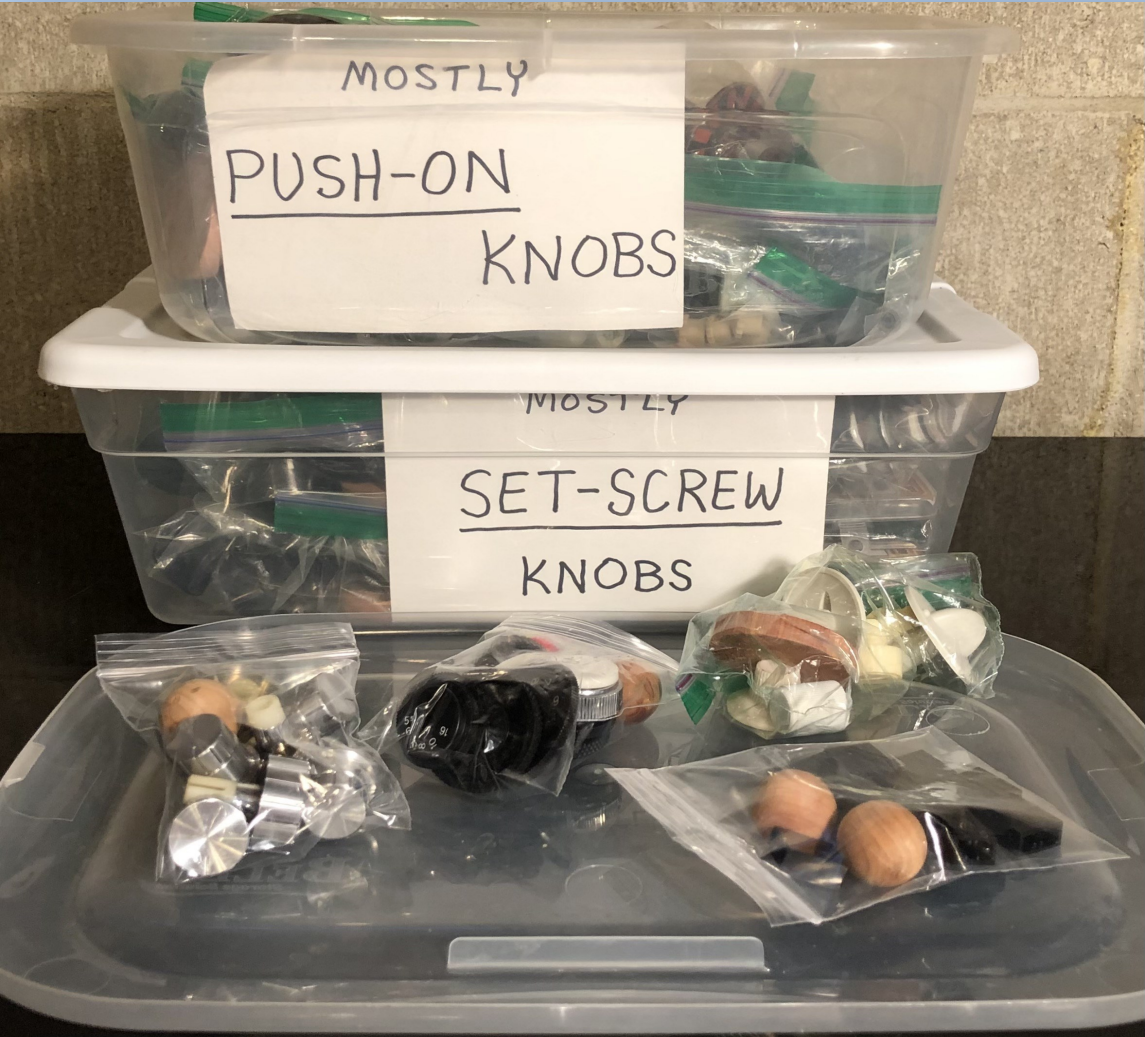
Plastics especially, it seems, tend to absorb, retain, and slowly release odors. One of the most-common categories of plastic parts, in my inventory of old parts, is my collection of "mostly vintage" knobs. In the past, I stored these all together, loose in a box. (...Open the lid and draw a breath, anytime I longed for childhood memories of sitting at my workbench and taking-apart an old radio, or soldering-together a new creation from some scavenged parts.) It did occur to me, however, that I could probably "replace" some of those smells with another smell that I happen to like: the smell of cedar-wood. To do this, I first used a toothbrush, with soap and water, to scrub *all parts of all knobs* (yes, this was the painstaking part of the process). The knobs were then well-rinsed and carefully dried, by setting them next to a dehumidifier or on a hot-air vent in the house. I then sorted my knobs, by type and color, and grouped them into packages of "similar items," using small, clear, sandwich bags (and the like). Into each bag, I placed a cedar-ball or a cedar-ring (first refreshed, if necessary, with a squirt of concentrated cedar, essential-oil). All the bags were then placed in one of two clear-plastic storage-boxes (one for "push-on" knobs, and one for "set-screw" knobs). The rest is easy: let it age some more! Over time, this method of storage gives the knobs a different smell, one more-pleasing to the house's other, very important occupant!

Continued on next page



HAMSTER HINTS

Bob (KEØEXE) gettuit@charter.net



Storing plastic knobs with cedar-wood, to rectify vintage odors



CONTEST CORNER

Fred (K4IU) k4iu@me.com

It may be bone cracking cold in Minnesota but the *Bands Are Hot*. Last month the SFI hit a persistent 192 and led to some of the best band conditions for the RTTY RU contest, CW and SSB NAQPs in recent years. Even the VHFers had a big weekend!

For a short month, February has a lot going on beginning with our very own **Minnesota QSO party**. Many of our RARC contesters already have had a heads up on this major event. This will be the 26th running of the MNQP since it returned in 1999. Olmsted county may not be rare, but the national and international popularity of this QSO party will keep everyone busy on the bands.

- **3 February [Minnesota QSO Party](#):** There are lots of resources here to include activity schedules, rover routes and a list of certificates and plaques.
- **10 February [CQWW WPX RTTY Contest](#):** This is a very popular RTTY event and there are several RTTY contests in February to include the [NAQP RTTY](#) on the last Saturday of the month. These should keep the local "diddlers" happy.
- **17 February [ARRL International DX Contest](#):** This is the CW version. New for 2024 is a limited antenna category which will even the playing field for many hams in HOAs or constraining suburban lots. Also remember that since this is an ARRL sponsored contest you can take advantage of self spotting. This is now built into the contest logger N1MM. Use {SpotMe} macro on a function or band map button. You must be in run mode. You can only spot yourself on the same frequency every 10 minutes. The details are [here](#).
- **23 February [CQ WW 160 meter SSB](#):** This is the phone version of last month's CW test.



CONTEST CORNER

Fred (K4IU) k4iu@me.com

There's much more in February including the OMISS QSO party, RTTY Sprints, Straight Key night and several digital contests. You can find all the details right here on the [WA7BNM calendar](#) website!

-...- -...- -...- -...- -...- -...- -...- -...- -...- -...- -...- -...-

By design or circumstance many suburban hams are limited to wire antennas. If you have 90 minutes for a podcast you can take a deep dive into this subject. *All about wire antennas*, AJ8B, Bill DX mentor episode 23 explores this subject with a panel of experts which include Mike, WØVTT, from St. Charles, Minnesota.

<https://www.youtube.com/watch?v=GsjmTY2SPJo>



We haven't really covered Digital contesting resources in any recent contest updates. But there are several local hams who are very active in the PSK and FT8/4 digital contests. Coming up this month is the [Russian PSK contest](#). There are many more other popular and monthly contests that involve PSK31 and FT8 modes.

To participate and potentially win these contests, as with the traditional CW, SSB and RTTY modes, focus on three key aspects: *preparation, technique, and persistence.*

1. **Preparation:**

- **Familiarize yourself with the contest rules and regulations.** Each contest may have specific rules concerning frequencies, operating periods, and exchange information.
- **Ensure your station is set up properly.** This includes having the necessary equipment, such as a transceiver and computer, with the right, up to date software, for PSK31 or FT8 modes.
- **Antenna setup is important and contesting is a good way to decide on improvements.** (check out Bill's DX Mentor episode 23 from above)



CONTEST CORNER

Fred (K4IU) k4iu@me.com

2. *Technique:*

- **Accuracy and speed are essential.** Develop proficient operational skills in either PSK31 or FT8/4 modes to maximize your chances of making successful contacts during the contest.
- **Do your homework.** Monitor the published contest frequencies to find stations to work. Properly decode incoming signals using the right software and respond using the correct exchange information for the contest.
- **Employ effective contesting techniques,** such as search and pounce or running multiple frequencies, depending on the contest strategy you choose. Practice in some of the weekly [FT4 sprints](#)

3. *Persistence:*

- **Continuously operate during the contest period to maximize your QSO count.** Dedicate a significant portion of time to actively participate in the contest, especially during peak propagation hours.
- **Maintain a competitive spirit and consistently look for opportunities to make contacts.** Use tools like [PSK reporter](#) and [RBN](#) to see how you're being heard. Stay alert in seeking out stations to work and responding quickly to their transmissions.

Remember, winning a contest involves a combination of skill, technical knowledge, and a bit of luck from the propagation gods! Engaging in contests provides an opportunity to refine your operating skills, increase your knowledge, and enjoy the friendship of fellow amateur radio operators.

CU on the bands,
73 Fred K4IU@me.com



TECHNICAL COMMITTEE

Eric (KF0S) - kf0s@yahoo.com

Tech Committee - Next Meeting In February

December 2023 Meeting Notes:

Attendees: 7 - Eric, Mark, George, Taylor, Steve, Dave, John D.

Post meeting and RARC meeting comments in italics

146.625 Fusion repeater:

- We should apply repeater and HRI-200 updates (plus update the Windows software).

443.85 D-Star repeater:

- We still haven't gotten the Gateway Server back at Mayo.
- Waiting on Mayo internet discussion as this may reflect what we need to install. Also base OS Icom requires goes End Of Life next summer. What is their plan?
- Discussion on main reflector: 30C was decided back in March.
- g2_link software to allow access to XRFxxxX and DCSxxxX reflectors was asked. I think I found someone who can send us the instructions. Still relies on GatewayServer install above.
- David, N3ZUK, volunteered to also help with getting things setup.
- Contest or something next year to try and get more usage on UHF, determine things like coverage, etc?

146.82 repeater:

- Steve completed battery backup check.
- Discussion on 12/10 net relative to poor signal, but I don't think the issue relates to the repeater.



TECHNICAL COMMITTEE

Eric (KF0S) - kf0s@yahoo.com

147.255 repeater:

What to do about Mayo repeater site:

- John Scott has site availability for another week.
- Taylor working on getting a badge and key for access.
- No change. Andy and Taylor are busy. Trying to determine where to send the request?
- Andy can provide access.
- Another person has also been identified.
- DSL internet connection from Ozmun. Work being done to reroute. *DSL connection rerouted on 12/16.*
- ~~Move to a cellular based internet on hold.~~

125 Live:

- Met with Program Director and established a time on their calendar: 3rd Tuesdays of the month from 3:00-4:00pm. 125 Live member or \$10. In January, try to get people into the Maple Grove Tech Class which starts in February. Present 5-6 charts, YouTube video, etc. Additional topics for later include elmering, station intro, etc.
- How many RARC members are 125 Live members?

Rochester EOC facility and computers:

Donation of W0IBM equipment:

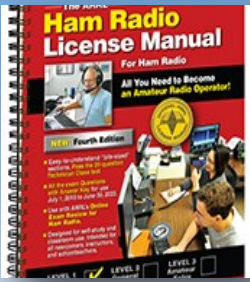
- IBM has said we can remove antennas from the courtyard at a later date, but not sure of an end date, but now IBM seems to have forgotten they said we could remove the items from the tower.
- *Pat is talking with a contact in IRG (site owners).*



TECHNICAL COMMITTEE

Eric (KF0S) - kf0s@yahoo.com

- Beam rotated north-south and tower lowered before we lost access to shack.
- Try and remove what we can as soon as possible, preferably before April 2024.
- TA-33 tri-band (with WARC), 6m beam, 2 2m beams (1 each H and V polarization), and 2m vertical. All are old, but the tri-band might be a replacement for the club's other beams for Field Day.
- There are also some satellite antennas and a vertical on the roof, but hadn't asked about getting those as of yet.



EDUCATION

Dave (KØVH) dcnaatz@gmail.com

Bill (K0RGR) k0rgr@arrl.net

One of the first steps needed to really get into Amateur Radio is to get your Amateur Radio License. This license is required in order to transmit on any of the Amateur Radio frequencies – however, listening does not. Listening is only part of the fun, so we encourage you to get your license so you can get the full experience!

Online **ZOOM Technician Class Starting 2/5/2024
Register Soon!**

RARC has an agreement with the **Maple Grove Radio Club that prospective new Hams can take Monday classes on ZOOM starting on February 5, 2024 to get their Technician Class license: sign up at:**

https://k0lrc.org/tech_license_class/

Sign up soon as time is short to register for the class!



JM ROCKET RADIO CLUB

Melissa (KE0WNH) - Mentor melissa.ke0wnh@gmail.com

JM Radio Club Update from Student President Muniba Hassan

This month, the ham radio club students are delving into the world of electronics as they learn to solder. Soldering is a crucial aspect of electronic circuit assembly and learning this skill has given the students opportunities to problem solve. They started off with small handheld radios, went on to FM-TV, and are currently working on designing their own circuit board for a telegraph key. This make it on your own telegraph was graciously presented by a **Rochester Ham Radio Club** member who instructed them about key parts and gave tips [**W0BM – Pat Cahill**].

The current plan is to graph out the design for their circuit boards, have it looked over, and start soldering to see if they can successfully problem solve. Creating a telegraph key establishes a stronger bond between these students and morse code, which leads to a deeper understanding of communication techniques.

The club continues to grow and thrive as two new members have joined and have dedicated time outside of the club during other hours to continue soldering. The club continues to foster a passion for radio communication and related electronics. It serves as a beacon for cultivating a new generation of radio enthusiasts, equipped with both theoretical knowledge and practical skills to navigate the vast world of amateur radio.

Photos on following pages are of some projects we are working on: FM/AM/Tv Tuner and new CW board from W0BM. We are certainly learning a lot by doing!

From KE0WNH: Next month is ARRL School Club Roundup, and KC0P (Mel Larson) will be back in the building to help us make contacts with schools on the air! Students in my classes and the club are getting excited!



JM ROCKET RADIO CLUB

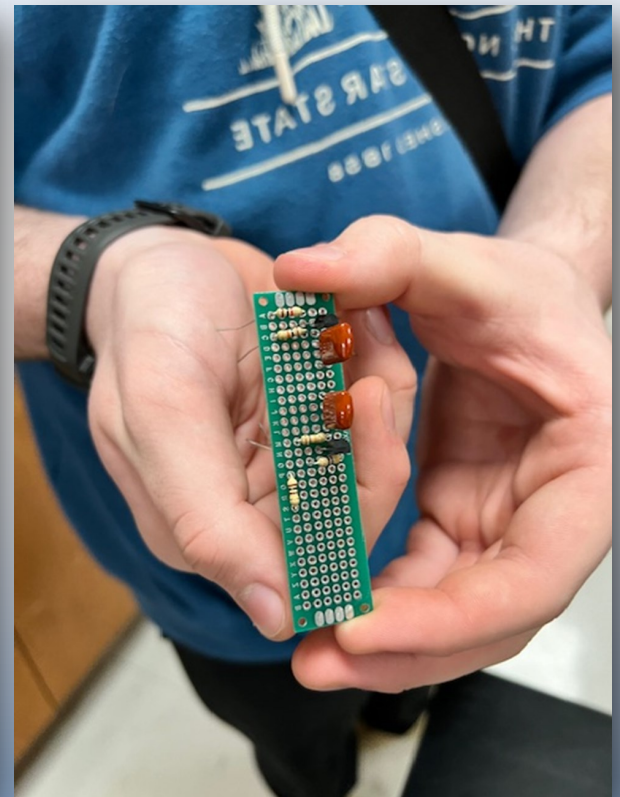
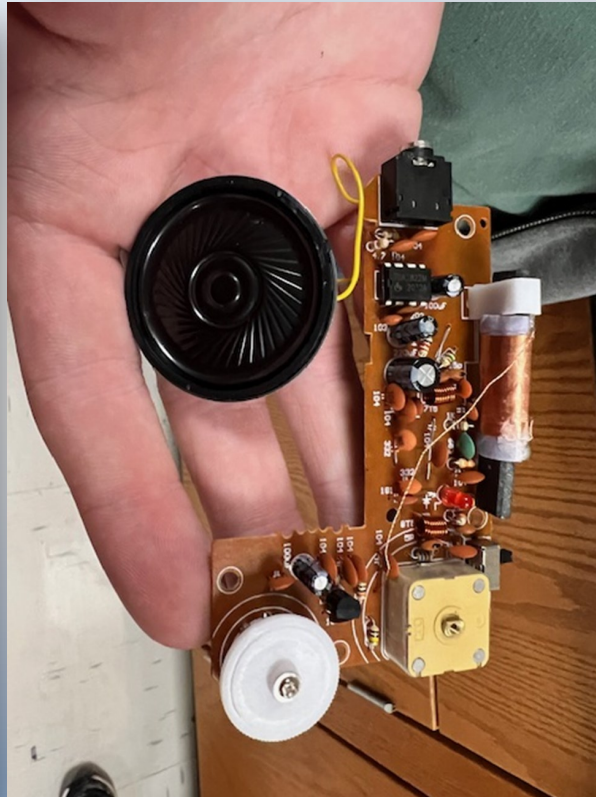
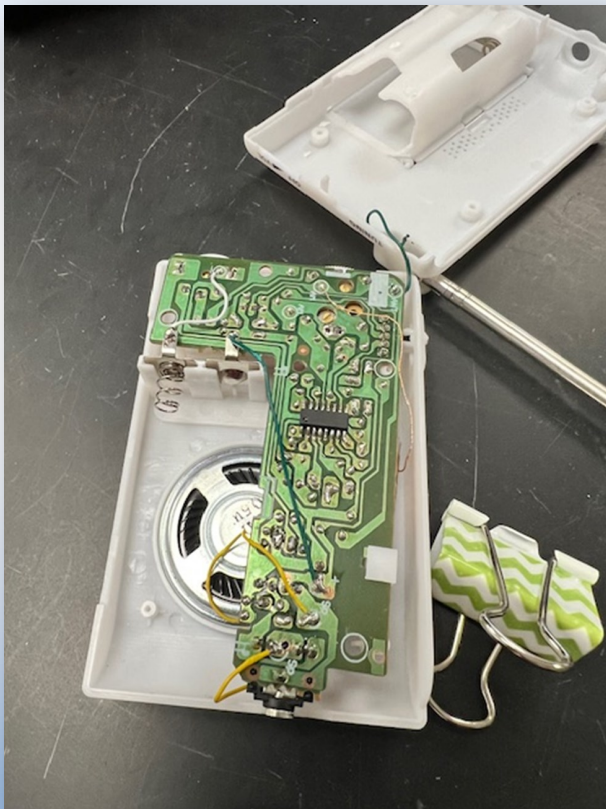
Melissa (KE0WNH) - Mentor melissa.ke0wnh@gmail.com





JM ROCKET RADIO CLUB

Melissa (KE0WNH) - Mentor melissa.ke0wnh@gmail.com





JM **ROCKET** RADIO CLUB

Melissa (KE0WNH) - Mentor melissa.ke0wnh@gmail.com

Elmers Needed To Help with the

JM **Rocket** Radio Club

- *Kit Building*
- *Soldering*
- *Antenna Building*
- *Radio Operation*
 - *QSOs*
- *Mentoring*



Contact [Melissa](mailto:melissa.ke0wnh@gmail.com) (KE0WNH) for more information or how to volunteer.



125LIVE HAM RADIO CLUB



Steve Wiebke (W0STV) w0stv@yahoo.com

The 125Live Ham Radio Club First Meeting!



**NOMGY at the 125Live Ham Radio Club HF/
VHF Station**



The next meeting of the 125Live Ham Radio Club sponsored by RARC will be February 20th at 125Live at 2:00 PM. Attendance is free to 125Live members and the general public. For more information please contact(W0STV) at: w0stv@yahoo.com



RARC BUY OR SELL



FT-991A All-Band, Multimode Portable Transceiver The FT-991A is the next generation in all mode, all band MF/HF/VHF/UHF transceiver with **C4FM (System Fusion) Digital capability**. The FT-991A includes multi-mode operation on CW, AM, FM, SSB, and Digital Modes (Packet, PSK31, RTTY and C4FM), with 100 Watts of HF/50mhz Capability (50 Watts VHF/UHF). This transceiver is owned by a ham radio friend of mine. Please contact me directly. **Price: \$975.00** Bob Dubke (K0SIR) red@bobdubke.com (507) 398-5964



ST-5000 Step Up Step Down Transformer 110V 220V Step Up Voltage Converter Transformer, 5kw rating, used once / no longer need, like-new condition, **\$100 firm** (\$129.99 on Amazon). See Bob, (KE0EXE), gettuit@charter.net



Price Reduced! Icom ic-756Pro2 HF/60 MHz Transceiver

160m-6m. 100 watts full power. Comes with **Icom mic and original printed user manual**. Includes a **SignalLink USB (Icom plug 'n play jumper module installed)** with cable for digital modes. **Valley Enterprises FTDI CAT cable** and rig power cable Excellent condition. Mark (K0GMK) gmkelm@charter.net 507-269-5254, **Price: \$600.00 (was \$900.00)**

If you have any Ham related items that you want to sell or are looking for locally, email the Hamster at [RARC Buy or Sell](#) or Trade.



Parks On The Air® (POTA)

Mark (K0GMK) gmkelm@charter.net Hamster Editor

It's Winter POTA Time!

Perhaps you've heard talk on the repeaters or on one of the Nets about [Parks On The Air \(POTA\)](#). You might be interested and think that it could be **fun to operate your rig and antenna remotely in a beautiful outdoor setting.**

In a nutshell it's all about operating in a state or national park, state trail, national monument, historical location or battlefield and making at least 10 QSOs to "activate" the entity. It's as simple as that, but there are a few [rules](#).

Take a look at the [Parks On The Air](#) website, view the [FAQ page](#), the [Help/Getting Started](#) section and perhaps view some of the getting started [videos](#) by seasoned POTA operators. If you are interested in becoming an Activator fill out the [sign-up](#) to become a member and get started.

Do you know that there is a [POTA entity in Rochester](#)?

Take a look at the [map of entities](#) to see the wealth of places to activate close to Rochester as well.

POTA is a great way to enjoy Ham radio and enjoy the bonus of operating remotely or out of your vehicle!





WEEKLY NETS

- ◆ **Monday 8 p.m. Elmers' Net** 146.820 repeater (PL Tone 100)
- ◆ **Tuesday 7 p.m.** (except on Club Meeting Nights) **RARC 10 Meter Net** meets on 28.325 Mhz. USB. The Net is cancelled without notice if lightning in the area or SkyWarn activation.
- ◆ **Thursday 6:30 p.m.** 146.820 Repeater. The first Net of each month is a voice net, and it's the **SE MN District ARES 2 Meter Digital Net**. The other weeks, it is an informal digital net, using the digital protocol announced for the week on the Net and NBEMS.

Most use [FLDIGI](#) and the rest of the [NBEMS](#) suite of programs, all of which are free. MT63 is a very forgiving mode. You can do MT63 on VHF without a soundcard modem - 'acoustic coupling' works fine. meaning you can hold your HT up to the mic on your computer and copy it very well and do the reverse to transmit.

- ◆ **Thursday 8 p.m. ARES 80 Meter HF Digital Net**, 3583.5 kHz, Olivia 8/500
- ◆ **Daily M-F about 11:30 a.m.** - Repeater Of The Week - **Very Informal Morning Net** - If you show up and there is no net control, become one! The object of this net is to encourage more on-air activity.
- ◆ **Saturday 8:30 p.m. Iowa D-Star Net** on D-Star Reflector XLS632A
- ◆ **Sunday 7:30 p.m. Minnesota D-Star Net** on D-Star Reflector XLS632A
- ◆ **Sunday 8:30 p.m. Dodge County ARES Net** on the 146.820 (PL Tone 100) Repeater at 8:30 p.m.
- ◆ **Sunday 9:00 p.m. RARC/ARES Net:** 147.255 repeater (PL Tone 100) Odd numbered Sundays
146.820 repeater (PL Tone 100) Even Numbered Sundays



- ◆ Are you a member of the [ARRL](#)?
- ◆ Are you new to Ham Radio?
- ◆ Have you been licensed for a while but not active?
- ◆ Are you active but never explored the [ARRL](#)?

RARC has been an ARRL affiliated club for the past 50+ years. RARC wants all members to know about the benefit of being a member of the ARRL and how the ARRL promotes amateur radio and represents and supports Hams throughout the year.

Here are two links you can explore to see what the [ARRL](#) offers Hams. Take a look:

- ◆ [ARRL Benefits](#)
- ◆ [The Value of ARRL Membership](#)



CONTACT RARC

RARC meets the second Tuesday of each month at 6:30 PM in the lower level of Rochester Fire Station #2 in the EOC at 2185 Wheelock Drive NE, Rochester, MN

- ◆ **Online:** <http://www.rarchams.org/>
- ◆ **Mail:** RARC , P.O. Box 1, Rochester, MN 55903
- ◆ **Groups.io:** [Register](#) and a Moderator will respond shortly
- ◆ **Weekly Net:** Sundays at 9:00 PM: 147.255 repeater (PL Tone 100) Odd numbered Sundays
146.820 repeater (PL Tone 100) Even Numbered Sundays
- ◆ **Facebook:** [Rochester Amateur Radio Club](#)

If you haven't done so already, please [register](#) for the RARC groups.io email reflector so you can keep abreast of club activities, official club notices and of course the monthly Hamster emailing. Click on [register](#) and you will be taken to the RARC registration page. Once you have [registered](#) go to your account settings and choose how you would like to receive email from RARC.

Newsletter articles or questions: Mark (KØGMK) - Editor gmkelm@charter.net