



Cleveland Chapter One NEWSLETTER Established 1951

Summer Quarter 2022

W8LYD 146.850 PL 110.9

<http://qcwa-cleveland-1.org>

PICNIC LUNCHEON JOIN OUR SUMMER LUNCHEON ON SATURDAY, 9 JULY 2022 AT NOON ! Metroparks Forest Picnic Area North Chagrin Reservation



NOTE: The chapter will provide hamburgers, hot dogs, buns, soda pop, water and the grill. Please bring side dishes such as potato salad, cole slaw, and chips.

YOU MUST RSVP to W2THU (w2thu(at)arrl.net) so we know how much food to buy! If you come without a reservation, then please bring your own food.

DIRECTIONS: Only 8 minutes from the I-90 exit at SOM Center Road (SR-91) is the beautiful Forest Picnic Area. Travel south on SOM for 4.6 miles and turn left at Sunset Lane which is a well marked entrance to North Chagrin. Follow Sunset to its end and bear right onto Buttermilk Falls Parkway to the Forest Picnic Area.

SURPRISE DEMONSTRATION !

In This Issue

2. People
3. Treasurer's Report
3. Chapter 1 Assists at Hamvention (con't)
4. FT-8 by K8IG (Part 1)
5. President's Perspective
6. 6 Meter Radios by George Mistic, KE8RN
7. 6 Meter Radios (continued)

CHAPTER 1 ASSISTS AT DAYTON HAMVENTION



Chapter 1 Members, George Harizal, K8HLJ and Bob Winston, W2THU, working the QCWA table at Dayton Hamvention

Shortly after Hamcation our chapter president Bob, W2THU, spoke with QCWA president, Ken, VE6AFO who commented that QCWA would not participate at Hamvention this year. Ken explained that QCWA office manager Roberta Cohen, (Please turn to page 3)

Future Luncheon Dates
October 8, 2022, January 14, 2023
April 8, 2023, July 8, 2023



Cleveland Chapter One Newsletter

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Roster changes: Notify Secretary Marc Barnett, KA8CPB <wirelessmike(at)gmail.com>

Meetings: Second Saturday of January, April, July, and October at: *Varies*

Dues: \$10.00 per year if you want this Newsletter mailed to you via USPS. Dues are free if you are 80 or older or accept this Newsletter via email only. **Copyright © 2022** by Cleveland Chapter One QCWA. All rights reserved.

Chapter One Officers

President: Robert M. Winston, W2THU; (216) 924-3314, <w2thu(at)arrrl.net.>

Vice President: Fred Freer, K8IG; (440)446-8000, <k8ig(at)arrrl.net>

Secretary: Marc Barnett, KA8CPB; (440) 476-8800, <wireless.marc(at)gmail.com>

Treasurer: Jim Arcaro, WD8PFB; PO Box 324, Wickliffe, OH 44092; (216) 337-2793 <jgarcaro(at)juno.com>

Operational Group

Membership reporter: Open

Net controls: N8ZT, KC8UIQ

QCWA Journal reporter: K8IG

License trustee: N8ZT

Awards chair: Open

Chief radio officer: K8QOT

Chapter musicians: WB8ADF

Webmaster: K8ZGW

Sunshine reporter: Open

PEOPLE

New Members:

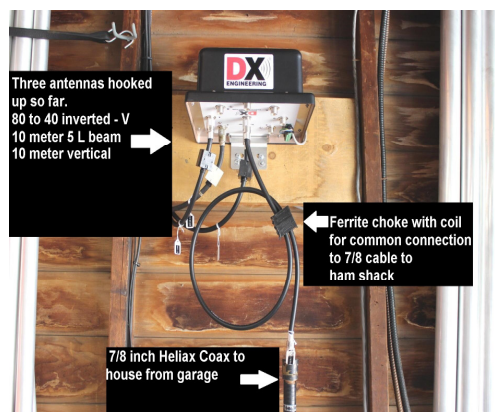
Mark Studer, KC8FQV of Aurora recently joined QCWA and our chapter.

Susan Harizal, WA8WPV of Vermilion also joined QCWA and our chapter.

Welcome Mark and Sue!

Happenings:

Jeff Covelli, WA8SAJ, is thrilled to have his Elecraft K-4 in the shack, after a long wait. He also installed a remote coax switch from the shack to multiple antennas.



Greg Smith, N9AGC, reported on the net that he completed a 6 week tour of the Southwest in May and that he is putting up a tower this summer.

David Kazdan, AD8Y, operated Field Day with the Case Amateur Radio Club, W8EDU, from the CWRU Farm in Hunting Valley.

Pete Harmon, W1BKZ, reported on our net that he used to sing *Peggy Sue* at ski resorts in Vermont. Presently, Pete and other hams, including **Sally Dawson, N1BCF** are jamming Tuesday nights at their QTH. They call themselves *The Ham Band!*

Bob Winston, W2THU, participated in Field Day with the Lake County Amateur Radio Association at the Lake County History Center.

TREASURER'S REPORT

Jim Arcaro, WD8PFK

Members and Friends,

I am pleased to report that the QCWA Ch 1 Treasury is in good shape, with the balance at \$4,506.20, as I write this on the evening of June 30, 2022.

As usual I ask that you keep us informed of any changes to your Email, or physical address.



Several members have switched from their ARRL E mail address to their actual E mail address, due to problems with that system. Also don't forget, that if you change your call letters, we need to be informed.

We have enjoyed participating in the Chapter's Zoom meetings, courtesy of the Cleveland Hamfest group, and arranged by Don K8ZGW. This next meeting may be an in-person picnic, so stay tuned for details elsewhere in this newsletter, or on the weekly Wednesday night net.

Also, thanks to the NORMA group. The weekly net continues on Wednesday nights, at 8 PM, on the NORMA 147.015+ repeater, which has pretty good coverage. While I cannot "get in" from my location, I am able to listen in. Set your handheld or mobile/fixed station to transmit the 110.9 Hz CTCSS tone if you wish to join in.

Some history: CTCSS stands for Continuously Tone Coded Squelch System. Years ago some of the major manufacturers came up with their own names for this. PL stands for Private Line. TPL for Tone Private Line. CG stands for Channel Guard, and QC stands for Quiet Channel. These names are the property of their respective owners.

On days when the VHF band is open, often in the hot summer weather, signals can travel a hundred miles or more. The purpose of the CTCSS subaudible tone is to help prevent an out-of-town signal from keying up the wrong repeater, on its own. Each city/area usually has their own tone, and in Cleveland on VHF it is 110.9 Hz.

There are over 3 dozen CTCSS codes, but even that many were apparently not enough. That gave rise to DCS – Digitally Coded Squelch, which also can be used with analog FM. But that is a story for another time ...

QCWA AT HAMVENTION

(Continued from page 1)

WA2FRW, would not be able to attend for personal reasons and Ken was concerned that both Canadian and US covid related travel restrictions would keep him from Xenia.

Bob suggested that our Chapter 1 would be able to run the table if enough volunteers could be mustered up. He also reached out to other active chapters in Ohio, West Virginia, Pennsylvania, New York and Ontario for help. Although none of those could assist, our chapter had a enough volunteers and Ken was also able to attend under newly relaxed travel covid rules shortly before Hamvention. The result was a resounding success as QCWA signed up and renewed almost a record number of members!



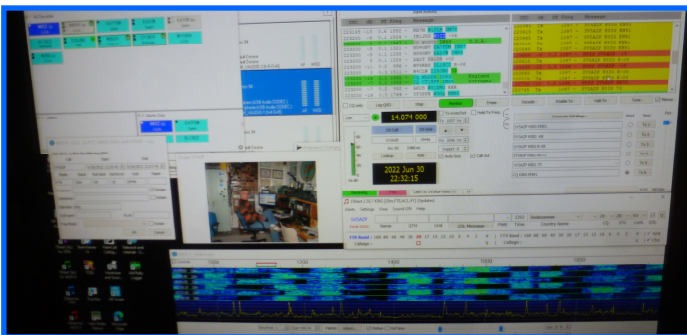
KC8MNW Signing up a new member with VE6AFO (left) and K8HLJ in the background.

Chapter 1 members who worked at the table included **George Harizal, K8HLJ, Fred Freer, K8IG, Bob Winston, W2THU, and Jeannie St. Marie, KC8MNW** (*friend and eligible for QCWA membership in 2024*), who single handedly signed up several new members during the QCWA Forum. Chapter 1 is proud of its contribution to maintaining the QCWA presence at Hamvention.

FT-8: Try It...You'll Like it!

Part 1—by Fred Freer, K8IG

Let's get this over with! Everything written from this point forward is an opinion of the author and does not necessarily reflect the opinions of others or QCWA. I use FT-8 and I love it!! FT-8 (and its contest cousin FT-4) are digital or data modes (FT-8 uses 8 tone continuous-phase frequency shift keying while FT-4 uses four tones and as a result is about twice as fast as FT-8...although less sensitive to weak signals). Developed by Dr. Joe Taylor, K1JT, FT-4 and FT-8 are program components of a computer-managed amateur radio suite called WSJT-X through Princeton Physics. WSJT-X is an open-source weak signal communication software for Amateur Radio (available free for download). Parenthetically, the suite includes other computer-managed software including JT-9, JT-65, Q65, MSK144, WSPR and others. WSJT-X will run on Windows, Linux and Macintosh PCs (I use Windows 10). Programs in this suite offer digital protocols optimized for EME (moon bounce), meteor scatter and ionospheric scatter for LF, MF, HF, VHF and UHF propagation. My experience with the program, at present, is limited to FT-4, FT-8 and WSPR. Setting up a digital station requires a single sideband transceiver and a personal computer with a sound card (available from West Mountain Radio, MFJ, DXE, SignalLink from Tigertronics and others). Note that the ICOM 7300...which I use...does not require the soundcard and is readily configured to work with WSJT-X.



Of course, there are those who will argue that digital or data modes like FT-8 are not really amateur radio. That for “real” amateur radio, a microphone or a key are required. However, those who operate RTTY do not use a microphone or a key. In fact, I would guess that the majority of RTTY operators today use computer software like MMTTY, EXTFK or Fldigi to drive their radios. In this author's view, there is a marked parallel between RTTY and digital modes like FT-8. Certainly, to operate FT-8 or other digital modes requires an amateur radio license. Of course, a SSB transceiver and an Internet connection are also required.

With FT-8 communication, each message is 15 seconds in length. There are four data slots per minute, where you transmit for a 15 second block, then listen for a reply for 15 seconds and you transmit again for 15 seconds and so-on. In the sequence of things and as shown in the attached not-very-clear picture (sorry about the poor quality screen shot...lot's of data there):

- ◆ The Dodecanese station (SV5AZP) (Padelis known as “Bill”) station sent a CQ
- ◆ I answered with my location (EN91 grid square); it took five attempts) for his receipt
- ◆ SV5AZP then sent my signal strength report (in dB measured against the noise floor) as -19 dB
- ◆ I, in turn, sent his signal report as -8 dB (it took two attempts)
- ◆ Bill, SV5AZP, then sent RR73 indicating his transmission completion
- ◆ In response, I then sent 73 indicating the end of my transmission and the conclusion of our mutually acknowledged QSO.

So why use FT-8? In short, during the daytime doldrums of cycle 24 (and not to mention Covid), I made thousands of contacts worldwide. Was it satisfying? Yes! Sometimes, working a station is easy and takes about 1 ½ to 2 minutes for a completed QSO (including logging). Sometimes, working a desired station (domestic or DX) requires tenacity and effort...that may or may not be rewarded with a QSO. *(To be continued in the Fall 2022 Newsletter)*

President's Perspective

By Bob Winston, W2THU

Our Spring meeting:

The Chapter 1 virtual tour of W1AW hosted by station manager, **Joe Carcia, NJ1Q**, was a great success. Joe did a wonderful job in showing us the ins and outs of the Hiram Percy Maxim Memorial Station. In addition to our local members, we were joined by QCWA Director, **Carole Perry, WB2MGP** and others who we didn't even know, via Zoom. Thanks to Joe for coming into ARRL headquarters on a Saturday to show us around, clearly something he loves to do.



*Joe Carcia, NJ1Q, W1AW License Trustee
And Station Manager*

Meet Your New Chapter 1 Secretary:

As you know, **Jim Arcaro, WD8PEK**, has been both treasurer and secretary of Chapter 1 for many years. He has done a great job in both roles, but expressed his desire to step down over a year ago. Fortunately, our chapter member, **Marc Barnett, KA8CPB**, has offered his services as secretary while Jim will remain as treasurer.

You might remember Marc from an earlier luncheon when he spoke about the internet of things. At that time we were still meeting in the now defunct Play Arcade & Kitchen. He later presented a Zoom program on grounding.

Marc, a Mayfield Heights resident, has been a ham for 63 years, and is QCWA member #38050. He is a graduate of Cleveland State University where he earned a BSEE. Along the way, he sat around all sides of the table having designed products, integrated systems, and networks. He has been a RCC license holder and operator, as well as a designer of wireless IP data



Marc Barnett, KA8CPB, Chapter 1 Secretary

networks.

Marc also spent a large portion of his life as a volunteer firefighter / EMT, teaching cold water rescue, incident command and mass casualty triage. Currently he hangs his hat at John Carroll University where he actually wears 2 hats, Director of Infrastructure and the Senior Switch Engineer. At John Carroll he is responsible for all networks, including data, voice, video, security, and wireless. Twice a year, campus becomes the wild west; move-in and right after the holidays. Everything you can imagine gets connected to his networks.

When people ask him what he does over the summer, he just says, EVERYTHING, no vacation, as this is the only time he can perform major work on the networks. Finally the question he always gets asked, "Do you like what you do?" His response? "No, I LOVE what I do."

We welcome KA8CPB as our newest officer!

Future Luncheons:

As the covid virus wanes (I think) and the world returns to normalcy (whatever that is), we need to think about where we are going to meet after this week's picnic luncheon. No one has come up with a good "middle location" so I suggest that it wouldn't be a bad idea to alternate between two restaurants, one on the east side and one on the west side of Cleveland. This would be a fair solution so that half of you would only be inconvenienced half of the time. I'm leaning towards The Firehouse in Willoughby Hills for the east side location. ***Where would you like to meet on the west side of town?***

In the meantime, I look forward to our picnic luncheon in the Forest Picnic Area this coming Saturday at noon!

Best 73, Bob W2THU

SIX METER RADIOS I HAVE USED AND OWNED

By George J. Mistic, KE8RN

Introduction

Back when I first got an amateur radio license, a Technician class license on November 22, 1963, the day President John F. Kennedy was assassinated, I got on six meter AM with a Gonset model G-50 owned by my father, John, W8VRJ. The six meter band was not open for “skip” contacts, so they were local Cleveland hams. I was in junior high school in Warrensville Heights, Ohio. In 1965, I was offered a part time job on Saturdays at Bernie’s Ham Shack, 2118 East 21st Street for \$16.00 a day by Bernie’s wife, Eunice Vernon who ran the Apricot net on 51.000 MHz on Monday nights at 8PM. In 1965, gasoline was less than \$0.40 per gallon and I had a car inherited from my maternal grandfather, so I took the job.

Lafayette HE-45 rebuild becomes first mobile rig

I met Tom Lawrence, WA8UXL, at Bernie’s along with many other hams who were customers or visitors. Tom often had pieces of amateur radio equipment that did not work right; I bought a Lafayette HE-45 six meter transmitter-receiver [I call it a transmitter-receiver because it was crystal controlled on



transmit and a transceiver will automatically transmit on the receive frequency]. I fixed the HE-45 and modified it for better performance; the H-45s were known for having poor modulation on transmit. I modified the H-45 with a type 7868 tube in place of the original 6AQ5 and replaced the original audio transformer with a vertical sweep transformer from a donated TV set I had salvaged for parts. I made other modifications to it and used it as a mobile rig after painting it two tone brown and tan to match the interior of my car.

When I checked into the Apricot net, Eunice, K8ONA, could not believe I was using a Lafayette HE-45 because the audio sounded so good. I used the HE-45 for years until I got a Clegg Thor 6 [or VI; Clegg used both ways].

Cleggs and Gonset bought at Olson Radio fire sale

A few years later, Olson Radio who had a store at 2020 Euclid Avenue in downtown Cleveland decided to exit the ham radio equipment business; the Euclid Avenue store had a Clegg Thor 6, and a Clegg Venus six meter SSB rig and a Gonset 910 Sidewinder largely solid state SSB radio. I bought all three for a very good price. I used the Clegg Thor as both a home and mobile rig, as I got it with both an AC and DC power supply/modulator for the Thor 6. The Clegg Thor and the solid state Lafayette HA-750 were the only six meter rigs that were true transceivers because they automatically transmit on the receive frequency.



Lafayette HE-35 rebuild

I also bought a Lafayette HE-35 transmitter-receiver from WA8UXL; it was Lafayette’s low cost six meter rig without Push To Talk [PTT], a DC power supply for mobile use, or a VFO. I believe the DeWald six meter radio phone is the same basic radio as the HE-35. I built the one I bought, converting it to PTT with two relays. It was still a minimalist six meter radio, but it worked and I made contacts with it.

(Please turn to page 7)

Six Meter Radios (*continued from p. 6*)

Lafayette HA-750 and E. F. Johnson AM business band amplifier

Sometime in 1968, I obtained a Lafayette HA-750 six meter transceiver; it was all solid state and the size of their very popular HB-525 Citizen's Band [CB] transceiver. It ran about 5 watts input power, a bit more than the battery powered Lafayette HA-650 six meter portable station that was crystal controlled on transmit. The HA-750 acted somewhat like the Clegg Thor 6 in that it could transmit on the receive frequency, the only modern radio besides the Thor 6 to do this. The HA-750 had the VFO operated by the same control that tuned the receiver; the tracking was not perfect, but the HA-750 had a receiver offset control and a "spot switch, so you could always get the receiver and transmitter on the same frequency. I worked part time at Pioneer-Standard's ham radio department; we used to sell AM business band equipment made by Johnson, the ham radio and CB company. We had an RF amplifier and modulator left over; I bought it for a very low price as they could no longer be sold for business band use. I set it up mobile with the HA-750, giving me more than 50 watts with plate modulation; it was a great but compact mobile installation for six meter AM.



Drake TR-6, one of only five radios I bought new

My Drake TR-6 transceiver was purchased in 1968 along with the AC-4 power supply and MS-4 speaker; in 1968, I was in college and worked part time at Pioneer-Standard Electronic Supply in the amateur radio and commercial sound department. Drake, like most manufacturers at the time, had a program for employees of their distributors. Their goal was to have the employees selling and servicing amateur radio equipment to be happy users of their products. We could buy Drake products at a 40% discount from the retail price, a good bit below the dealer cost. That made the Drake TR-6 with a noise blanker cost me \$390.00, the AC-4 power supply was \$59.97 and the MS-4 speaker was \$11.97 plus shipping from southern Ohio to northern Ohio. Living at the end of a dead end street in a new neighborhood, I had little use for the noise blanker. But the TR-6 worked very well on both SSB and AM. Most AM contacts liked the "punchy" sounding AM from a Drake product. The 6JB6 tubes in the final amplifier were surprisingly efficient on six meters, especially considering they were designed to work at 15.75 KHz, as they were designed as TV horizontal sweep tubes. I sold my TR-6 after I finished building a six and two meter SSB transmitter with internal plate modulated AM and mechanical digital frequency readout like the National NCX-5. My TR-6 was serial number 023, an early production unit. I wonder where it is today; if anyone has a TR-6 with serial number 023 or knows where it is, please Email me at KE8RN@comcast.net The only other amateur radio units bought new were a Heath HW-30 Twoer, an Ameco CN-144 two meter converter, a Regency HR-2 and Clegg FM-27B two meter FM radios.