

Solid Copy



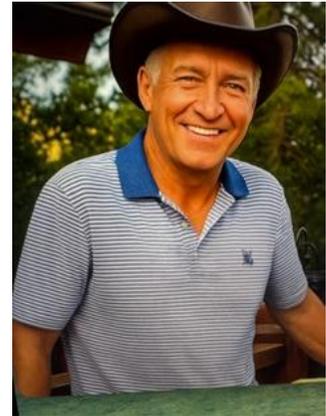
The CW Operators Club Newsletter
March 2026 — Issue 194

President's Message



Its amazing how many amateur radio operators also claim astronomy as a passion. Page 37.

It is with deep sadness that we learned of the passing of **Lada Prajzner, OK2PAY**, on February 21, 2026.



On behalf of the many within the DX CW community — representing thousands around the world who shared the bands with Lada — we

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CWops "CWT" 1 hour 'tests
Every Wednesday at 1300z and 1900z
Every Thursday at 0300z and 0700z
Exchange: name/number (members)
name/SPC (non-members)
Avoid DX Pileups!

CWO Mini-club callsign web site:
<http://cwomc.org>

CWops "neighborhood": Look for CWops on 1.818, 3.528, 7.028, 10.118, 14.028, 18.078, 21.028, 24.908, 28.028, 50.098 "and up"

CWops Officers and Directors

President: Mark Wohlschlegel, [WC3W](#)
Vice President: John Glover, [W2QL](#)
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Treasurer: Craig Thompson, [K9CT](#)
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Director: Ken Tanuma, [JN1THL](#)
WebGeek: Dan Romanchik [KB6NU](#)
Newsletter Editor: Dick Strassburger, [N9EEE](#)



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extend our sincere condolences to his family, friends, and fellow operators in the Czech Republic and beyond.

Lada was truly one of the giants of our hobby. A remarkable operator and competitor, he achieved what few ever will — becoming a ten-time World Winner of the DX Marathon CW category, while also earning numerous world-class CW championship honors throughout his distinguished amateur radio career. His skill, dedication, and consistency set a standard admired across the global DX and CW community.

Yet beyond the extraordinary achievements and scores was something even more meaningful. Lada embodied the very spirit of DXing — patience, excellence in CW operation, fairness, and a lifelong passion for connecting people across borders through radio. Many DX Marathoners came to recognize his callsign instantly on the bands, knowing they were hearing one of the finest operators in the world.

His presence will be deeply missed, but his legacy will remain permanently woven into the history of our hobby and the friendships he helped create across continents and cultures.

May he rest in peace, and may his signal continue to echo in the memories of all who had the privilege to work him.

Reflecting on Lada and his love for CW led me to think about my own love for this mode.

I have always been drawn to challenges. From the very beginning, CW has demanded just a little extra — from me, and I suspect from all of us who love it. As I've reflected more deeply, I've tried to put into words what drives that passion.

- CW asks us for focus in a distracted world
- It rewards patience in an age of immediacy
- It connects people across continents with nothing more than a key, a radio, and a wire in the air

CW represents one of the purest forms of amateur radio communication. With modest power and simple antennas, we can work the world. We can break through noise and QRM. We can succeed where other modes struggle. That simplicity — combined with incredible effectiveness — continues to amaze me.

But there is something even deeper.

CW builds operators.

It sharpens listening skills. It develops timing and precision. It creates confidence. When you become proficient in CW, you know you have earned something. That accomplishment builds pride — not boastful pride, but a quiet, internal satisfaction that says, *"I can do this."*

And then there is the community.

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CW operators share a special bond. Whether in a contest, a DX pileup, a casual rag chew, or a CWT, there is mutual respect. We understand the effort it took to get there. Organizations like CWops amplify that bond — through mentoring, education, and encouragement.

That is why I care so deeply about promoting CW. Not because it is nostalgic. Not because it is traditional. But because it is transformational.

CW brings new operators into deeper engagement with the hobby. It keeps experienced operators challenged. It levels the playing field. It transcends language barriers. It strengthens the foundation of amateur radio itself.

As President of CWops, I feel both a responsibility and a privilege to help ensure that CW not only survives — but thrives. That means expanding mentoring. Supporting events like CWTs. Welcoming newcomers. Keeping standards high while keeping the door open.

Most of all, it means remembering why we fell in love with CW in the first place. For me, it is the magic of pulling a weak signal out of the noise. It is the satisfaction of clean, efficient exchanges. It is the friendships formed one QSO at a time.

CW is not just part of the hobby for me. It is the heartbeat of it. And I intend to promote it in every way I can.

A couple of weeks ago, I had the privilege of presenting a CWops Forum at HamCation in Orlando. I'm pleased to report that the session was very well attended, with strong interest and thoughtful engagement from both current members and prospective CWops operators. It was encouraging to see such enthusiasm for CW, mentoring, and the continued growth of our organization.

Thank you to everyone who attended, asked questions, and shared ideas. The energy in the room reaffirmed what we already know — CW is alive and thriving, and CWops continues to play an important role in that success.

Looking ahead, I plan to be in Dayton for Hamvention and will attend our CWops dinner on Thursday evening. I will also be presenting a CWops Forum during the convention weekend.

If you are planning to attend, I would very much enjoy meeting as many CWops members as possible. Whether you are a long-time member, a newer addition to the club, or considering membership, please introduce yourself. One of the greatest strengths of CWops is the fellowship behind the key, and events like Dayton that give us the opportunity to strengthen those connections in person.

I look forward to seeing many of you there.

73, Mark, WC3W, President (CWops #3525)



Editor's Notes:

Adding to the Bench

A rolling stone gathers no moss—and neither does *Solid Copy*. Month after month, as I read through the hundreds of new member bios that Tim, K9WX, assembles, one thing jumps out: this club is overflowing with talent. Our members dive deep into every corner of amateur radio, from QRP to DXing to portable ops, and those passions deserve a spotlight.

It's time to bring those niche interests into spotlight in the pages of *Solid Copy*. I'm looking to expand our lineup of recurring columns—pieces that explore the history of CW, the art of station design, the magic of keys, the thrill of POTA/SOTA, the craft of the workbench, and the operating tips that only experience can teach. If one of these areas is your natural habitat, I'd love to talk with you about becoming a columnist. You can write the articles yourself or gather contributions from others who share your enthusiasm.

I'm very excited to announce a brand new monthly column launching this month: **QRV: CWops DX**, written by Bill Salyers, AJ8B (CWops #1567). Many of you know Bill from his DX Mentor videos and podcasts, or from his leadership roles with the DX Dinner and DX Forum at Hamvention. His expertise makes him an ideal guide for our DX-minded members. Each month, Bill will narrow his focus on the DX World to those CWops members who are making DX exciting. While Adrian, KO8SCA, and Lacy, HAØNAR, are working the pile-ups from Bouvet, Bill talked with Philipp, DK6SP, about the Next Generation DX Club. It starts on page 50.

If you have a similar passion that belongs in these pages—and the writing chops to bring it to life—reach out. Let's build something great together.



This is the biggest issue of *Solid Copy* if you count the number of pages. A plethora of great articles has contributed to this volume, but one in particular spreads out like a pictorial and will simply “wow” you. My Other Hobby Is...Astronomy by Raoul Coetzee, ZS1C, starting on page 37. His picture-taking is “out of this world.”

I hope you will share the link to this newsletter so others may enjoy it.

73, Dick N9EEE, (CWops #3113)

Editor, *Solid Copy*
SolidCopy@cwops.org



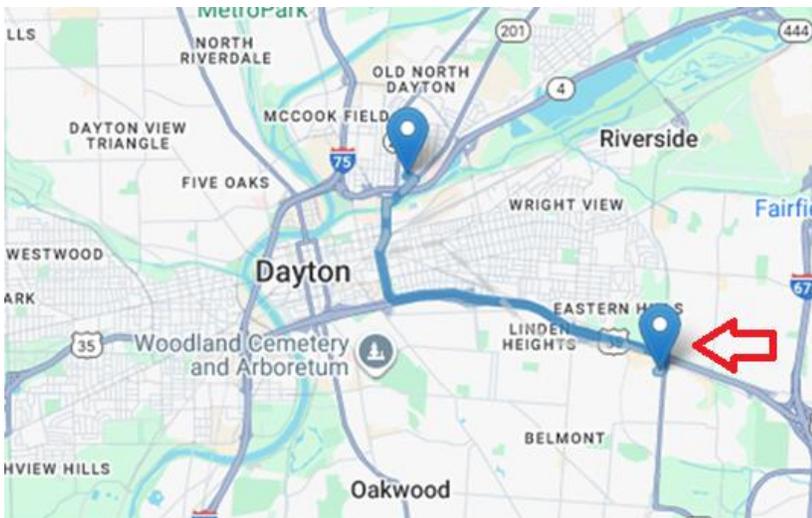
OFFICIAL ANNOUNCEMENT

2026 Dayton Hamvention CWops Annual Dinner

Thursday, May 14 at 7:00 pm (6 pm Happy Hour)

This is the major CWops social gathering of the year, where you can meet face-to-face many of the CWops operators you know from on-air contacts or know from other events over the years. This year we have a new, brighter, larger, more upscale venue for our premier CWops social event. It is **The Galleria Event & Conference Center**, 4140 Linden Ave., Rt 35 & Woodman Dr., Dayton, OH. We again will have our excellent caterer, Rob, who will provide us with an expansive and delicious buffet-style dinner!

There are photos of The Galleria at www.thegalleriaevents.com. It is a lovely facility that will be a delight for all who attend.



As you can see, The Galleria (identified by the pointer adjacent to "Linden Heights" on the map) is only a few minutes from the Hope Hotel and Conference Center, considerably closer than was the Rona Catering Hall in Fairborn last year. And of course there is plenty of parking at The Galleria.

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Many may recall we used to hold our CWops dinners at the Spaghetti Warehouse in downtown Dayton, but our need for more space necessitated a new approach, meaning something larger than a restaurant. We found the Rona Catering Hall, a private event venue in nearby Fairborn, Ohio, not very far from the Hope Hotel and Conference Center. Due to the continued success of the dinner, we decided to find a larger facility that could better accommodate our growing attendance. The Galleria fits the bill, and it is closer to the Hope Hotel and Conference Center. The additional good news is that the event price this year is only \$50, which covers our catering and facility costs.

Following dinner, we will feature what promises to be a terrific slate of speakers. Then, at the end of the evening, we will conduct our fabulous door prize program, thanks to donations from CWops members, manufacturers, and dealers.

The CWops Hamvention dinner at The Galleria is the CWops social event of the year! Feel free to invite guests! There will be room for everyone.

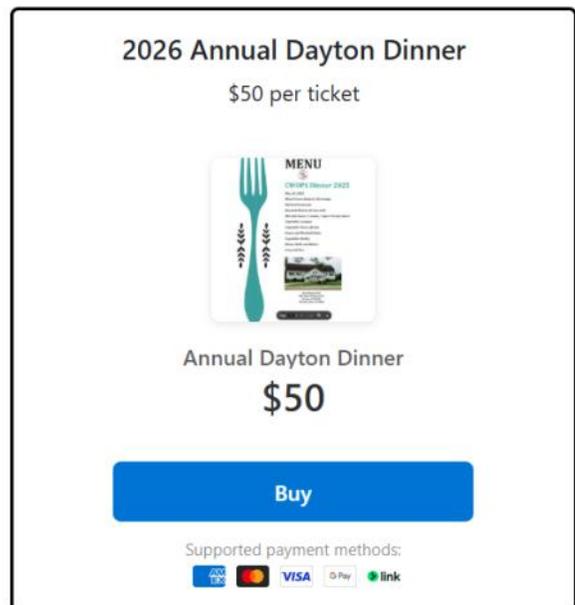
Folks are welcome to arrive at or after 6 p.m for Happy Hour. Dinner will commence promptly at 7 pm.

(Note that The Galleria venue adheres to and enforces Ohio alcoholic beverage laws, which are quite strict. We are told that if beer or wine is brought into the facility, we either must have a bartender serve it or it must be consumed outside – and we will not have a bartender!)

The cost of the dinner is \$50 per person. You may make your reservation by clicking on the payment box to the right or the link below. A guest should be registered with a second registration purchase and designated with your call sign and the suffix -2 (for example W1HRB-2).

There are no physical tickets as such; we will have a list of those who have paid. You will see we are using Stripe rather than PayPal because it is vastly easier, handles credit cards and provides payment tracking. Gerry, W1VE, will maintain the list of attendees. While not preferred, PayPal can be used but please select “family and friends” when making your payment. Send payment to paypal@cwops.org. There can be no refunds because we will be giving the caterer an attendance number that will serve as the basis for our club payment.

Payment link => [CWops Store](#)



The image shows a digital ticket purchase interface. At the top, it reads "2026 Annual Dayton Dinner" and "\$50 per ticket". Below this is a menu card with a blue fork icon and the text "MENU" and "CWOPS Dinner 2026". Underneath the menu card, it says "Annual Dayton Dinner" and "\$50". A large blue button labeled "Buy" is positioned below the price. At the bottom, it lists "Supported payment methods:" with icons for American Express, Mastercard, VISA, Apple Pay, and link.

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View our menu and registered attendees on the next page.

Here is our buffet dinner menu, which is even more expansive than last year:

Appetizers: Meatballs, cheese display

Meal: Mixed green salad (with 4 dressings)

Vegetable medley

Chicken parmesan

Roast beef (with gravy)

Vegetarian lasagna

Roasted baby potatoes

Dessert: Blueberry (sugar-free), apple, pecan, cherry pie

Beverages: Iced tea, water, coffee, lemonade (sweetened) – and sodas at \$1 each

It is not too early to reserve your spot for the 2026 CWops dinner! See you there!

73, John Glover, W2QL (#2331) and **Jim Talens**, N3JT (#1)

Registrants, as of March 8:

AA3R	K2GO	K9WX	KP4DX	NJ3K	WA3AER
AC6AC	K3CT	KAØWWT	KT1OK	NM5M	WA4PGM
AD8J	K3GG	KBØLNA	KV8Q	NR4M	WC3W
AF1E	K3TN	KB6NU	N1RM	NR4P	WD5JR
AF1E-2	K3WJV	KB8GAE	N2MA	VE3YT	WG3J
AG3I	K3WJX	KC4D	N2MA	W1HRB	WG4V
AJ1DM	K3YD	KC7V	N3AM	W1HRB-2	WN7S
AJ6V	K4CBW	KC9YL	N3EDO	W1VE	
AJ8B	K4EAK	KD1MD	N3JT	W1WEF	
AK4SQ	K4GM	KD1MD-2	N3RD	W2GD	
KØHB	K4PI	KE3LA	N4LSJ	W2QL	
KØOO	K4QS	KE8EON	N5VOF	W2RQ	
K1FV	K6ZO	KF7WX	N7TY	W3TB	
K1GU	K7SV	KJ5CMP	N7US	W4CMG	
K1MT	K8VAN	KJ5CMS	N8DNA	W4WF	
K1SEI	K8WWS	KJ5T	N8EA	W8FN	
K1SM	K9EZ	KM4CH	N8KDC	W8WZ	
K1UI	K9GY	KM4FO	N9EEE	W9NXM	
K1ZJA	K9VEG	KN2D	NA8V	WA1NLG	
K2EJ	K9WO	KO4VW	NF8M	WA1VQY	



North America CW Weekend

[Don Lynch](#), W4ZYT (CWops #55)

Yes, there will be a North American CW Weekend this year!

As in the past, the Weekend is primarily aimed at those amateur radio operators with a particular interest in Morse code (CW) operation - FOC, CWops, SKCC, FISTS - anyone with an interest in Morse code communication is welcome.

We are delighted to welcome regulars back, and look forward to meeting some new players.

There is a nominal registration of \$25 per couple or \$15 per single person. This will help defray costs and fees. Any excess will be donated to the CWops Scholarship fund. Please send your check, made out to Don Lynch W4ZYT at 1517 West Little Neck Road, Virginia Beach, VA 23452-4717.

QUESTIONS/INQUIRIES:

Email any questions to Don at: w4zyt.don@gmail.com

Event Summary

Start Date: Thursday, June 11, 2026

End Date: Monday, June 14, 2026

Hotel Information

Fairview Park Marriott (This has been the usual for the past several years)

3111 Fairview Park Drive

Falls Church, VA 22042

Phone: 703-849-9400

Rate: \$ 129.00 plus taxes/night (Friday/Saturday)

Reservations: 800-228-9290 (Event Block is: North American CW Weekend)

Here is a reservation link. 1-800-627-7468. If you have problems with this link, please call 1-855-297-1430. Book your group rate for North American CW Room Block

Last Day to Book at the Group Rate: Friday, May 15, 2026



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Program Details

There will be a hospitality suite between 1800-2400 on Friday and Saturday with refreshments and snacks available, plus plenty of collegiality and good conversation.

Friday Evening (6/12) at 1800

Pizza

Pines of Florence (new this year!)

6852 Old Dominion Dr,
McLean, VA 22101 .

Salad, beverage (non-alcoholic), unlimited pizza. Alcohol available.

Dress casual. Individual checks

Saturday Brunch (6/13) from 0900 to 1200

Brunch

Home of

Nina Lane, K4NML and Jim Talens, N3JT
6017 Woodley Road

McLean, VA 22101

Phone 703-241-1144

Saturday Dinner (6/13) from 1800 until...

Metro 29 Diner

4711 Lee Highway

Arlington, VA 22207

703-528-2454

Don't be put off by the "Diner" moniker. Take a look at the menu at <https://metro29diner.com/>. This is an informal place with a class kitchen and a full selection of meal options which should suit every taste. Cocktails, beer, and wine available. Dress casual. Individual checks.

We are looking forward to a nice weekend and good participation. This is a nice time of year in the DC area, and there are plenty of shopping or other places of interest to visit in your free time.

Please stay safe and well, drive carefully, and come prepared for a good time.

Vy 73, Don W4ZYT



Ops News and Notes

[Duncan \(Mac\) Fisken, G3WZD](#)

Welcome to another [Ops News and Notes](#) You'll notice we have a painfully thin postbag this month. This is your space to let our Members know about an interesting activation, an operating award, a shiny new key or perhaps a useful gizmo that makes your CW experience even better. Please send all submissions to me at NewsAndNotes@cwops.org and remember, there's no need to wait for Dick's monthly call for articles, or my reminder. TU!

We regret to report the following Members have become Silent Keys.

Condolence cards have been sent on behalf of CWops.



Gary R Rutledge,
KR8V #1043
16 February 2026



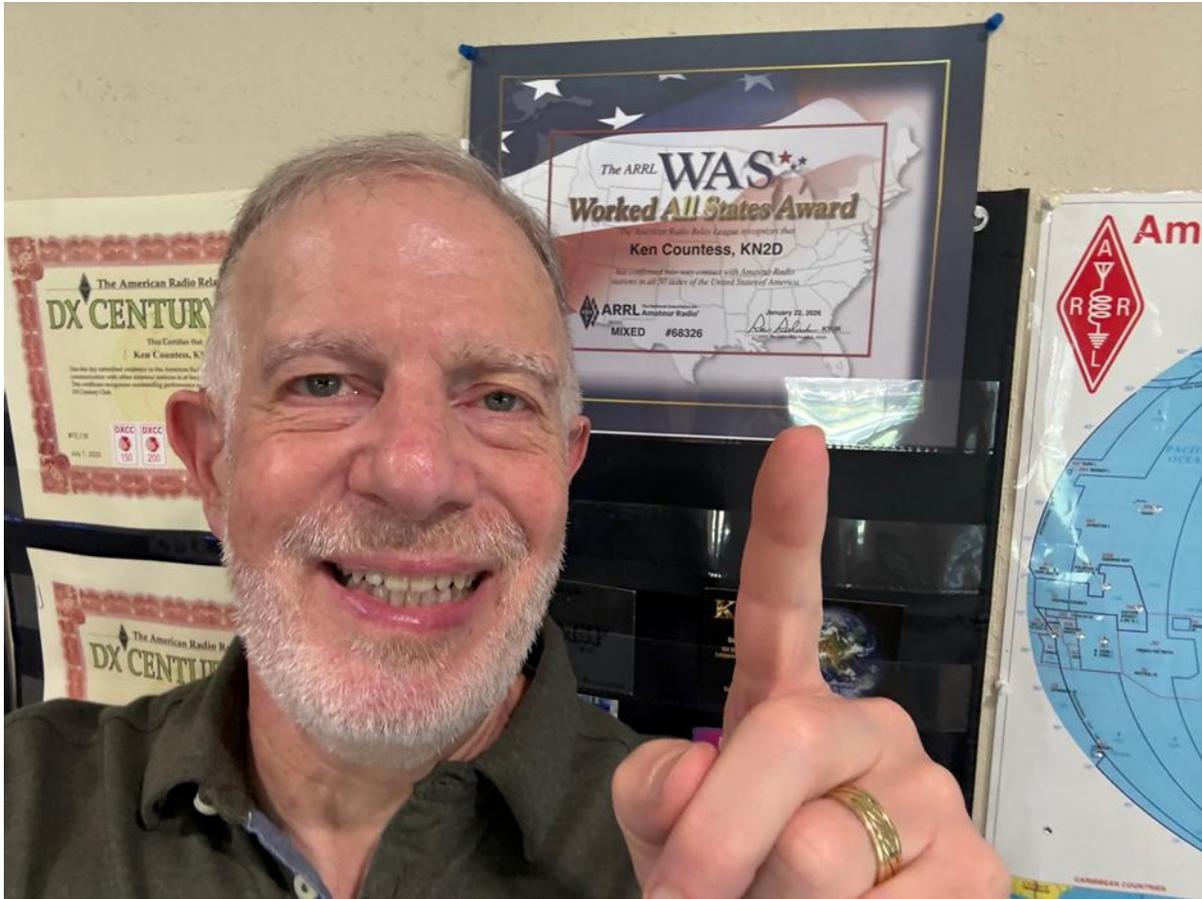
Lada Prajsner,
OK2PAY #816
21 February 2026

Steve, KW7Q #1039 KW7Q was signing the name Gary in the 18th February CWT in memory of my older brother, KR8V, CW Ops # 1043, Clinton Township MI. Gary became a SK on Monday, 16 February 2026. He was not able to be active the last several years due to health problems but did participate in CWT for years, getting his number (1043) just 4 numbers after me (1039). He was an accomplished DXer, achieving Honor Roll on Phone, Mixed and CW. He was also past President of the Southeast Michigan DX Association. When I last visited Gary in October 2025, he gave me his Honor Roll plaques and original DXCC certificates which are now proudly displayed on a wall in my shack. I gave Gary his novice test in 1976, when he was issued his first call WN0PBU. He also bought me my Novice station equipment back in the spring of 1968, when I was WN0UIR. I will miss him.

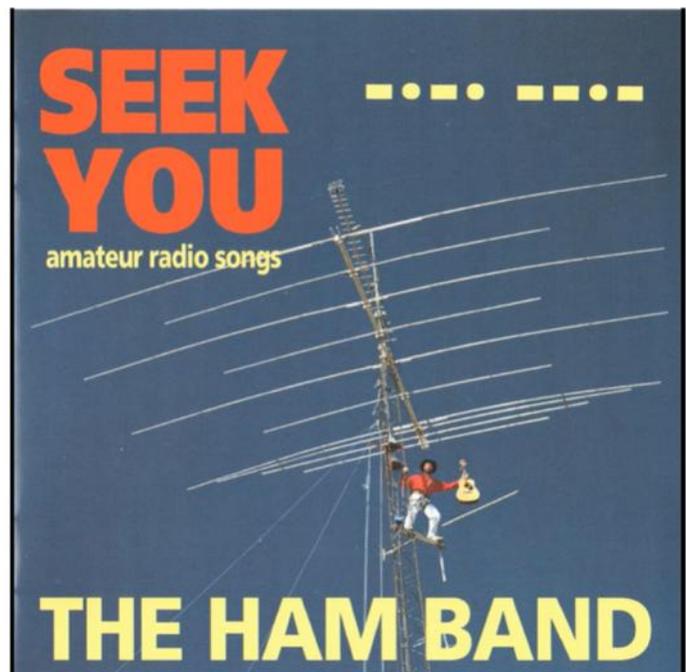
Ken, KN2D #3566 I've hit 2 milestones in the last few months - DXCC 200, and WAS. Also, since I was unable to attend the 2026 Orlando Hamcation (because my son was getting married that weekend), I've decided to attend Hamvention in Dayton, Ohio in May. As a bonus, I will be joined by 2 ham buddies of mine from grade school, Steve, NR4P (formerly WA2RAZ) and Barry, WA2MQT, along with former ham Geoff, who was WN2PHD back in the day.

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N3JT #1: This was sent to a friend who sent to a friend who sent to me. [Click](#) to enjoy it.



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Scott, N7JI #2348 Free weekend Technician Class ham radio class. March 21-22 ham radio class covering the Technician license (and beyond). Yes, it's really free, and yes, it's serious education for those who want to develop a good grasp of not just the exam question pool but the theory that makes it all work.

Spring Break Weekend Ham Radio License Class!
ONLINE (via Zoom) - Covers TECHNICIAN license - and It's FREE!
March 21-22, 2026 (Saturday-Sunday)

- The class and materials are FREE, but you MUST register.
- Open to all ages (kids and adults alike).
- Learn new skills, serve your community, and have fun.
- For students, this is a great way to...
 - ...earn radio-based scholarships...
 - ...develop hands-on skills...
 - ...explore real-world science.

Contact:

- Scott Rosenfeld, N7JI, ARRL Registered Instructor
- Please EMAIL your **name, e-mail, and phone number**.
- Email: ars.n7ji@gmail.com

Saturday 9 a.m. - 4 p.m.
Sunday 9 a.m. - 1 p.m.
all times Pacific
Taught via Zoom



Until the next News and Notes, QAC!

73, Duncan G3WZD (CWops #1979)

NewsAndNotes@CWops.org

SC

CW Open – September 5, 2026

The session times will be as follows:

Session 1: 00:00 UTC, Sept 5

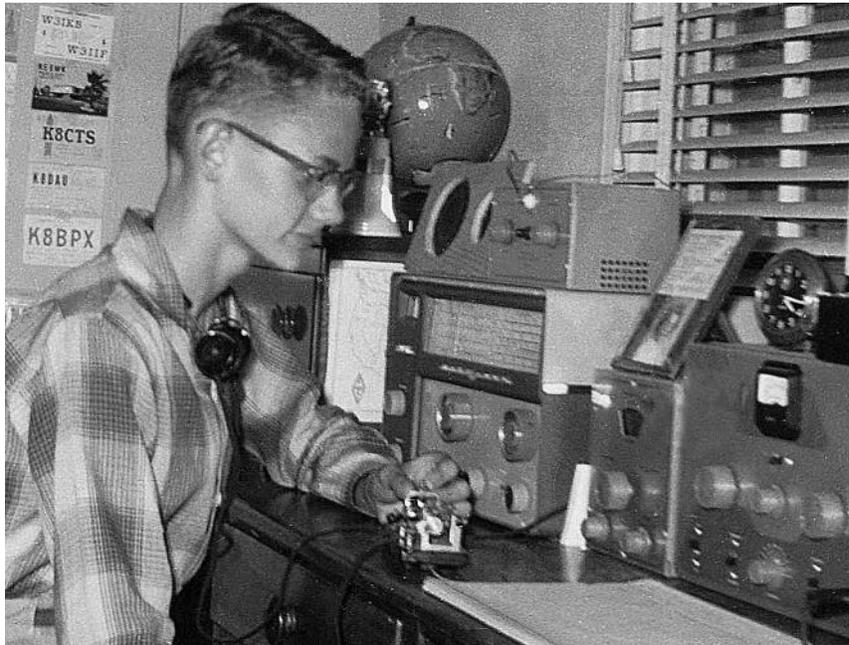
Session 2: 12:00 UTC, Sept 5

Session 3: 20:00 UTC, Sept 5

How We Were

[Ian Capon](#), GWØKRL

K4HQK, John Fuller, CWops #894



“Here is a photo from 1958, when I was 16 years old, showing my National NC-300 receiver and a Heath DX-20 transmitter with VF-1 VFO. The little picture frame contains my license plus a photo of Susan, my high school girlfriend. Hometown QTH: Barnwell, SC.

I started with a crystal set, a three-tube Meissner regenerative receiver kit with plug-in coils, a vis-it with a ham friend of my grandfather’s near Columbia, SC (who gave me a code practice oscillator), training by neighbours K4GDL/Herb and K4GLT/Kelley; a bike ride from my home . . . The bug had now bitten and soon I had my KN4HQK Novice license (February 1956; I was 14 years old). My station was the regenerative receiver plus a Heathkit AT-1 transmitter from, well, Santa Claus. I built the kit, plugged it in, and blew out the electrolytic capacitors; I’d soldered them in backwards. Eventually I got underway and nervously made my first contact (K4GAN/Jerry). I soon found I loved CW, and still do to this day. There were so many ways to have fun in amateur radio—traffic nets, DXing, ragchewing, contests, building a station with interesting antennas and equipment . . . They’ve all kept me deeply attached to this hobby--for 70 years as of next February.”

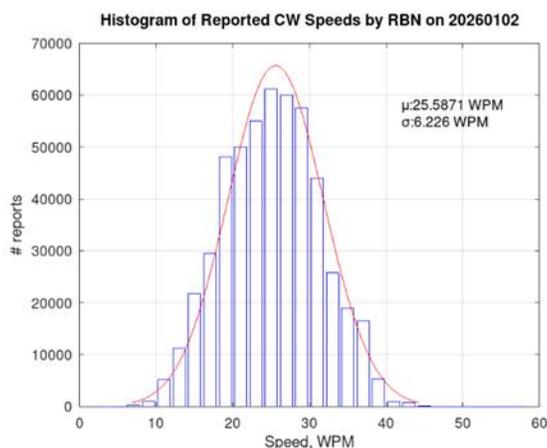
So now it's your turn, do you have a picture to share accompanied by a brief paragraph description, of your early days in radio, experimenting, exploring or just "being a ham". Please send it to [Ian Capon](#).

73, Ian GWØKRL (CWops #2896)

What is the average CQ speed?

[Chris Chapman](#), VK3QB (CWops #2949)

I thought I'd dig into the Reverse Beacon Network ([RBN](#)) data to better understand a little more about the average speed of those calling CQ. Well, the average speed sits around 25 wpm, with a standard deviation of about 6. For contests it's 30 wpm. Now, this isn't a statistical research paper; it's a high level look at the data aimed at providing some broadbrush observations based on simple statistical analysis.



What does this data tell us? Well, for starters, about half (the median was close to this number as well) of those calling CQ were calling slower, and about half were faster. But given the relatively low standard deviation, we can assume (lacking any further analysis) somewhere around 68 % (1xSD) of all stations calling CQ are between 19 – 31 wpm. Or, about eight out of ten stations (84 %) are calling at 19 wpm or faster.

Now, understanding that the RBN measures character speed and not true wpm, we can probably assume (a very poor statistical method) that most actual

QSOs are little slower than what is reported by the RBN. Most people put extra spacing in when they send, include pauses and other nuances that impact the overall speed of their code. Very few send at 100 % of their character speed all the time.

So, from the above loose analysis, let's assume most people are sending at a character speed of 19 wpm or faster, and that many of those are actually slowing their actual wpm speed using the Farnsworth Method. The Farnsworth Method describes the practice of decreasing the effective speed by increasing the spacing between letters and words. This makes it easier to copy whilst one is learning the code.

This provides a strong argument that we should be learning the code with 18 - 20 wpm as a target. Obviously, few start at 18 wpm, *but* we can start at 18 wpm and slow it down (Farnsworth) to 8 – 10 wpm effective speed.

Many will be sending at an effective wpm speed of maybe 2 – 4 wpm slower than their character speed. When you check the RBN and see someone calling CQ at (say) 19 wpm, chances are their QSO speed will more likely be in the 15-18 wpm speed range.

Based on these rather broadbrush observations, we should aim to learn Morse Code at 18- 20 wpm character speed. All sorts of analysis and experience confirm this as the best way to learn the code. Learn to hear the code at a speed where you can't count the dits and dahs. You follow the rhythm and hear the code. This is best achieved by learning at a minimum character speed of 18 - 20 wpm.

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There is another good saying: "Don't teach the ears through the eyes". So, ditch those look-up tables, now. Break the habit before it becomes entrenched.

If you're thinking of learning the code, or improving your code, contact [CW Academy](#) for more information. Only tested methods are used, and CW Academy has successfully taught over 12,000 students since 2010. Another great course is offered by the Long Island CW Club (LICW). They use very similar methods and are well suited to people who have the discipline to manage their own learning schedule.

(This article was originally written for the Fists Newsletter in VK/ZL to promote CW Academy).

sc

Empirical Findings About Morse Code Learning and the Need For Further Research

[Mikel L. Forcada](#), EA5IYL/N7EES (CWops #3765)

Introduction

Although Morse code is no longer a regulatory requirement for obtaining an amateur radio license in most jurisdictions, it remains a thriving 'mode of choice' for many: that includes the CWops community. This enduring interest has fostered a unique culture of mentorship, leading to the rise of organizations like CWops' CW Academy. Here, the traditional *Elmer* system has evolved into a structured academic environment, where experienced operators use systematic curricula and rigorous courses to teach CW.

The heyday of Morse code has long since passed, and much of the existing research on its pedagogy is decades old. This is largely because the bulk of the literature originated within professional sectors—such as the military, telegraphy, railroad traffic, and maritime transport—where Morse was once a vital operational requirement. Since these industries transitioned to other technologies long ago, the formal *science* of teaching the code slowed down in the mid-20th century.

A significant body of academic literature exists containing high-quality, reproducible empirical studies on Morse code pedagogy. However, because much of this research is decades old, the findings are at risk of being relegated to obscurity or misrepresented within contemporary amateur radio lore. The accessibility of this data presents a further challenge; many of these papers remain locked behind academic paywalls, hindering their adoption by the ham community.

By revisiting these findings, we can provide evidence-based support for successful modern practices while identifying areas where current teaching methods might benefit from research-driven revisions.

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Unsurprisingly, the vast majority of the research focuses on the *copying* of code rather than *sending*. It is important to note the historical context of these studies. The oldest papers deal with copying single characters as heard from *sounders*, electromechanical devices which went “click-clack” for a *dit* and “click... clack” for a *dah*; no “beeps” from oscillators until well into the 20th century. Regarding the art of sending, the literature is even more sparse, and primarily limited to the use of the traditional straight key.

The present article will discuss some empirical studies and findings about learning to *receive* Morse code: what makes some characters harder to learn than other and how to deal with that, the merit of copying behind, why is it important to learn at full speed, and whether students face learning plateaus or not.

I will leave other important aspects for another article: research about learning how to *send*, more detail about early Morse code teaching methods and how they relate to current teaching practice, and perhaps the thorny issue of the *aptitude testing*, that is, knowing early in advance if a student will have success in learning Morse code.

Hard characters, common confusions, and teaching

Anyone learning or teaching Morse code knows there are characters which are harder to learn and recognize, and character pairs that are more frequently confused than others. The results in the literature are fairly consistent. Keller and Taubman (1943) found that when teaching to students, “P, W, and J were most often the source of omitted or incorrect responses, whereas the signals for T, 0 (zero) and E were most often recognized correctly”; they also recorded the most common confusions for each letter; their Table 4 is reproduced here.

Table 4

A List of the Most Common Incorrect Responses to Morse Code Signals

P—J(77), F(56), L(52), C(29), I(22), Q(21), X(20).	K—R(56), D(41).
W—R(88), U(73), G(46), K(29), D(27), M(23).	1—2(100), J(35), 9(24), Ø(21).
J—I(94), 2(46), L(29), B(26), P(21).	R—K(40), G(23), W(22).
F—L(59), P(38), Q(31), V(26), C(21).	7—2(36), Z(35), 6(20).
Y—C(86), X(53), Q(41), L(25).	4—V(75), 5(53), 9(29).
G—W(42), R(32), D(29), O(23).	8—7(44), 3(28).
Q—Z(68), Y(44), L(41), F(21).	H—S(138), 5(49).
L—Z(49), P(37), C(32), F(25).	9—Ø(59), 4(31), 8(29), 5(24).
Z—Q(49), 7(28), L(27).	5—H(113), S(27), Ø(21), 4(20).
3—4(50), 2(36), 1(22), 8(20).	V—4(42), H(17), U(15).
U—S(43), W(42), V(38), D(26).	S—H(30), I(24), O(21).
B—6(87), X(26), D(20).	N—A(53), I(12), M(11).
2—3(143), 1(27), 7(22).	O—S(26), M(13), H(12).
C—Y(93), X(37), Q(22), P(21).	M—A(21), I(21), N(10).
D—B(43), K(38), W(26), G(21).	A—N(20), E(14), I(14).
X—B(62), P(30), Q(25), Y(22).	I—S(22), M(17).
6—B(134), 1(47), 4(22).	T—E(49).
	Ø—5(32).
	E—T(10).

In table 4 from Keller and Taubman (1943) one can easily recognize many typical errors of Morse code beginners.

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Very similar results were reported by Spragg (1943) in an independent but contemporary study. Are these difficulties intrinsic to their sound patterns? Rothkopf (1957) report on a study in which pairs of Morse characters were sent at 20 “codez” (“codex”) WPM, that is, 24 “Paris” WPM¹, and subjects without any Morse code experience were simply asked to report whether their sound patterns were the same or different. Interestingly, “the five signals which were judged as ‘same’ least often when compared to themselves were: P, B, 1, J, and 7.”. The identical pairs “which were correctly judged ‘same’ most often involved the signals E, T, M, S, and 0.”. Confusions between characters correlate rather well with Keller and Taubman’s (1943) observations. In both papers, as expected, among signal pairs confused or that were often judged as ‘same’ we find the categories of errors we are used to seeing: “how many *dits*?” (B/6, H/S, H/5, V/4), “did that end in a *dit* or a *dah*?” (B/X, C/Y, D/K, J/P, Q/Z, R/W), and “did I get it backwards?” (F/L, G/W, Q/Y).

What are the consequences of these findings as regards training? Let’s take a look at some of the existing methods:

Morsh and coworkers (1948) describe what they call the Vimy² adaptation of Keller’s (1943) “code –voice” method³, in which “characters are presented throughout the course with a frequency proportional to their difficulty. The hard characters are then learned more rapidly and unnecessary repetition of easy characters is avoided”; consequently, “the frequency of presentation varies from 29 for the five easiest characters 0, 5, M, E, T [...] to 402 repetitions for F, the most difficult character.”.

When it comes to introduce characters in lessons, CW Academy’s beginner’s courses consistently start with empirically easy characters (A, T, E, N, then S, I, O, 1, 4, etc.); the trend, however, breaks apart: some hard characters are taught early (F, Y, session 6) and some easy characters quite late (0, session 9); to compensate for that, exercises accumulate all characters, and therefore, easy characters end up being practiced more often. Should this be redesigned? The Japanese beginners’ curriculum has a different sequence, so that CQ DX and Japanese call signs with J are introduced as soon as possible; perhaps “early usefulness” is also an important criterion when it comes to learn characters *in context* rather than on their own.

The grandfather of all methods of gradual introduction of characters is the method described by Ludwig Koch in his 1936 thesis. His pioneering dissertation on the learning of Morse code takes this to the atomic limit: one new character is added per lesson, and only if the previous characters are sufficiently consolidated. This is the well-known Koch method.

1 These are the two five-letter words used to compute “words per minute”. If the inter-word space is added, PARIS is 50 *dits* long, and CODEX is 60 *dits* long, hence the 20% difference.

2 During World War I, the Canadian army defeated the Germans in a crucial battle at Vimy ridge in France. Perhaps the Canadian authors chose to name a winning method after this important battle.

3 “In the Code-Voice Method, as developed by Keller [(1943)], the student is equipped with a headset through which he can hear the instructor’s voice and key. The instructor sends a code character which the student attempts to identify and write down during a three-second pause. At the end of the pause the instructor names the character phonetically before sending the next”.

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Common practice (such as in LCWO.net) starts with similar characters (K and M, then U, then R, etc.) but Koch's (1936) description in page 56 allows for the reconstruction of a different sequence (L, F, C, K, R,...) which places "difficult" characters (P, X, V, Y, Q, Z) quite early and leaves "easy", "counting" characters (H, S, I, E, O, M, T) to the end.

As regards similar and dissimilar characters and the order in which new characters are introduced in lessons, Taylor (1943) empirically found that introducing "similar characters together or dissimilar characters together" made "no difference in the speed of learning to receive". Accordingly, it would seem that the beginners' course of the CW Academy does not group characters by any criterion of mutual similarity.

The value of "copying behind"

The idea of "copying behind" is mentioned early in Morse code days; as early as in an 1899 paper by Bryan and Harter:

"It should be explained that receiving is practically always 'copying behind.' That is, one does not, or should not, anticipate from part of a group of clicks what the rest will be; for if one guesses wrong, confusion of mind and error are likely to follow. Beginners are prone to guess ahead, and must acquire the habit of not doing so. Experts learn to wait. One expert said, "It is more natural to read back." He was asked if 'reading back' was like counting the strokes of a clock just after it is done striking. He replied, 'precisely'"

Note that "clicks" are mentioned. Remember, *sounders* went "click-clack"!

In Morse code, *reading back*, or *copying behind* as it more usually known, is the practice of maintaining a mental buffer by intentionally delaying the writing or typing of characters until one or several more have been sent. The operator listens to a full character or group of characters, holds it in their short-term memory, and transcribes it while simultaneously listening to the next incoming material.

Copying behind is generally considered to be the way to advance in Morse code copying proficiency. Among a few studies deal with copying behind, the work of Wisher and coworkers (1995) clearly stands out. In a study in which students are taught to acquire copying speed by hearing characters sent at full speed (20 groups per minute⁴) but with a separation that gradually decreases as the course progresses, Wisher and colleagues (1995) clearly distinguish the learning progression of *superior* and *attrite* (drop-out) students by measuring reaction times (from character exposure to key press) and comparing them to intercharacter intervals, and find that a superior student processes code at intercharacter intervals which are shorter than their reaction time, which provides clear evidence for copying behind as a winning strategy.

4 From their description, this equals 20 "CODEX" WPM (one *dit* lasts 50 milliseconds), that is, 24 "PARIS" WPM.

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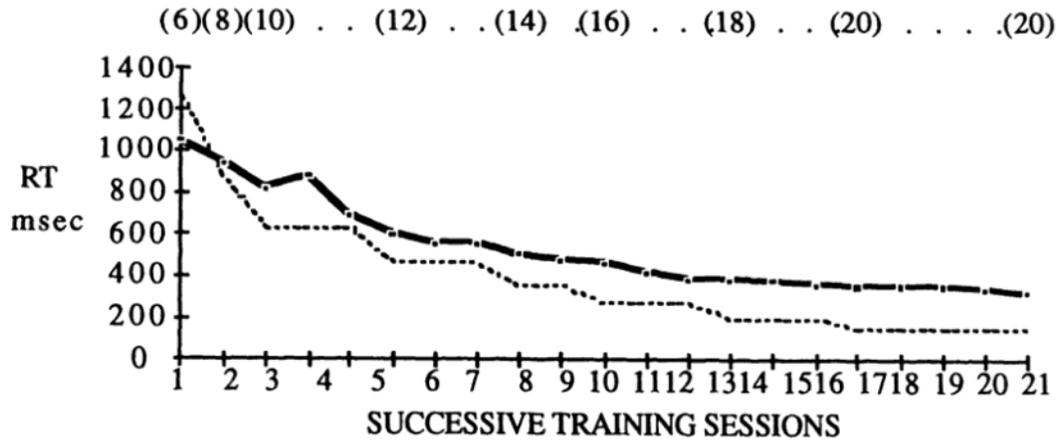


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"superior performer"

— REACTION TIME (RT) - - - - - INTERCHARACTER INTERVAL

The superior student in the study of Wisher and colleagues (1995) has learned to copy characters that are sent to him closer than his reaction time and reaches the goal of full 20 groups per minute.



(6), (8), (10), (12), etc.

= code presentation speed (in groups per minute) for each session

A puzzling result reported by Wisher and colleagues (1995) is that, the longer the character duration, the shorter the measured reaction time was (that is, the time elapsed between the end of the character and the student's response). This is explained to be the combined result of (a) the way in which characters are equally separated when sent, and (b) the hypothesis that the process consisting of two fixed-duration steps: (1) an "activation and character selection" step, and (2) a "response execution" step; the latter may be lengthened at will to keep a certain pace or rhythm. These two steps are launched for the current character as soon as the "activation and character selection" step for the previous character has completed, with the corresponding "response execution" step left to occur automatically and in parallel, often while the current character is being received.

"Copying behind" has been the subject of a few other recent studies; one that is worth mentioning is Fisher and Townsend's (1993), who designed and simulated complex theoretical "copying behind" models and found them to predict the observed behaviour of Morse code intercept students.

Wait, wasn't that good-old Farnsworth spacing?

In the description of "copying behind" studied, many readers have immediately recognized what is usually called *Farnsworth* spacing or *Farnsworth* method. This happens to be a misnomer, as the late Russ Farnsworth, W6TTB, apparently did not use this method; he got however quite famous because of his "Revolutionary New Word Method To Learn Radio Code" in six units, and three LP records (1959)⁵, which emphasized learning the characters in the context of words, with true — not "Farnsworth"— spacing, and quite slow (13 WPM).

5 Available in Youtube: youtu.be/1INx7IJuNhs

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The idea of starting by sending characters at *full speed* but with artificially increased intercharacter space, and then progressively decreasing this spacing during instruction is, in fact, older. Ted McElroy (1945), cited by Pierpoint (2001) clearly implies it: “Assuming that the average person will practice several hours the first day, we can tell you ... that you’ll be copying that very first day, words and sentences at the rate of 20 wpm. ... You won’t copy 20 full words in one minute. But each letter you write will hit your ears at a full 20 wpm and the space between letters becomes progressively shorter as the rolls go along”. Almost simultaneously, Morsh and coworkers’ (1948) description of Keller’s (1943) “code-voice” method already advocates for the use of lengthened intercharacter spacing in training: “It is also notable that the characters given in the Code-Voice runs are twenty-word-per-minute characters, though the spacing between them is much greater than this implies, and are thus identical in sound with the characters the students will be receiving at an advanced stage of training.”.

While “Farnsworth” spacing does have its detractors, it is promoted by a large majority of instructors, who think that learning characters at a slow pace is detrimental, as it leads to “counting” *dits* and *dahs* instead of focusing on the whole sound pattern of a character. This philosophy is indeed at the core of our CW Academy teaching: characters at full speed, decreasing “Farnsworth” spacing as students progress.

An empirical study by Taylor (1943), however, would seem to suggest otherwise: after a contrastive study with two groups of students, Taylor concludes that “whether one transmits individual characters at high speeds or slow speeds, during the process of learning, makes no difference in the speed with which students learn to receive”.

It has to be noted, however, that Taylor’s (1943) result only applies to an early stage of learning (first twenty-two hours of practice, speeds up to about 9 WPM); differences between both methods could still be perceived in later learning. In the absence of additional rigorous, randomized experiments comparing different training speeds while tracking *long-term speed gains* and *retention* through the use of standardized outcome measures (e.g., speeds achieved after fixed training doses) and with controlled learner variables (aptitude, practice time, instruction format), the proponents of “Farnsworth” spacing can reasonably contend, in spite of Taylor’s (1943) result, that sending characters very slow encourages learners to build an analytic “dot-dash counting” strategy that may work at low speeds but becomes a bottleneck later. Starting with faster characters does not necessarily make beginners learn faster in week one — Taylor may be right there — but it may shape *how* they learn, nudging them toward whole-pattern auditory recognition from the start (recognition of *sound images*, as Koch would have it). The argument is not that high character speed accelerates early progress (the *sprint*), but that it may reduce the need to unlearn counting and may smooth the path to higher-speed proficiency later (the *marathon*), which Taylor did not measure.

Indirect support for learning characters at full speed, and therefore for “Farnsworth” spacing, is provided by one of Koch’s (1936) empirical finding that four *trained telegraphists* (accustomed to about 20 WPM) had a hard time recognizing code sent at speeds below about 10 WPM (50 characters per minute in Koch’s work) and made lots of errors, but that they did not make any errors if the low overall speed was attained by increasing intercharacter spacing “à la

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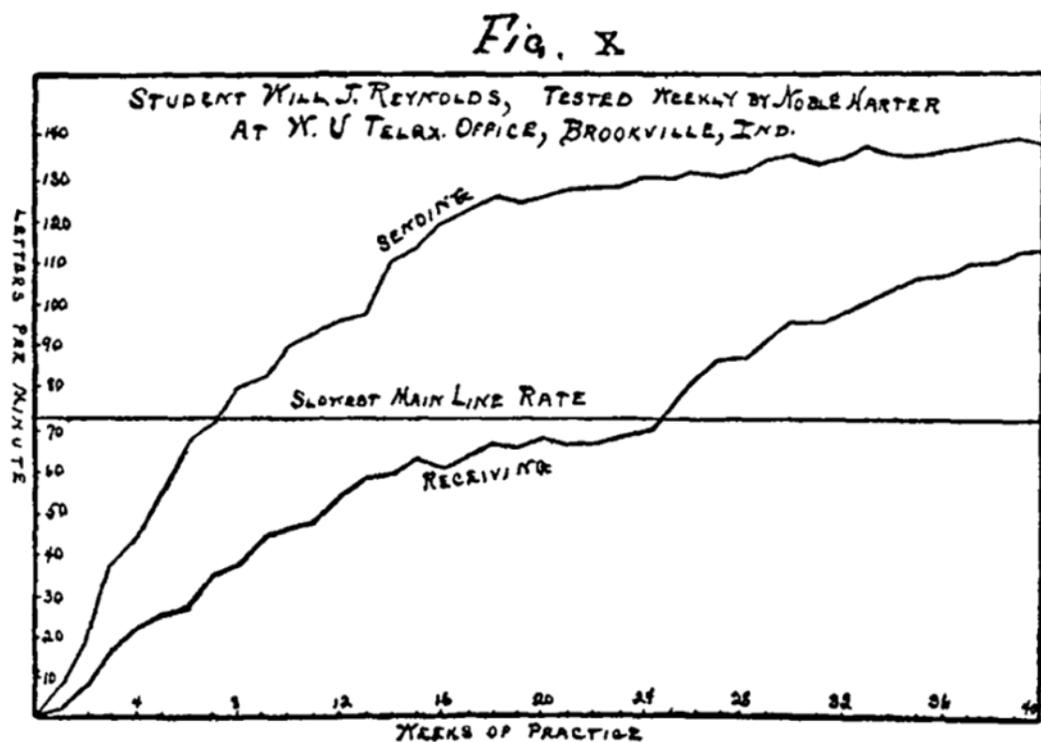
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Farnsworth". This would clearly point at the fact that *skilled operators do not count*, but instead rely on sound patterns or "sound images" or *Klangbilder*, as Koch calls them.

Plateaus: do they really exist?

Many papers report on the existence of plateaus in the learning curves of Morse code students. Plateaus appear on learning curves as flat areas where learning progress seems to stall despite continued practice. These plateaus were described as early as in Bryan and Harter's (1899) paper; their "first plateau" occurs when the learner slows down as he learns the large vocabulary of words that make up the messages, and disappears when enough vocabulary has been acquired so that the learner's attention is "free for something else". The authors go on to compare these plateau to plateaus observed in English composition or Chemistry. They contend that plateaus occur when "the lower-order habits [in a hierarchy of habits] are approaching their maximum development, but are not yet sufficiently automatic to leave the attention free to attack the higher-order habits". A plot is shown in Bryan and Harter's (1897) earlier paper which features a plateau when a student, Will Reynolds, is about to be able to receive at the "slowest main line rate" (of about 20 WPM).

Figure X in Bryan and Harter's (1897) paper shows how student Will J. Reynolds's struggles with the learning of receiving around week 16, and up to week 26. He seems to be stuck when he's just about to be able to receive at the "slowest main line rate".



The existence of these plateaus has been subject to criticism. Keller (1958) talks about *the phantom plateau*, compares it to more recent code learning curves, obtained under more controlled experiments, where the curve of a much faster learner, Anne Simmons, showed no plateau under comparable conditions. One interesting comment by Keller (1958) is that, at the time, "no Morse code researcher" had "ever yet entered" the "realm of the expert" telegraphist, which recalls the criticism above of Taylor's (1943) results regarding character speed.

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More recently, Robertson and Glines (1985) reported clear plateaus in the learning curve of the majority of (but not all) subjects were exposed to a simple computer game (not related to Morse code) in which the acquisition of a hierarchy of strategies (Bryan and Harter's *hierarchy of habits*) was reported as necessary to beat the machine, and learners had to find out how. An interesting feature is that before each plateau, the performance of subjects was slightly worse, in a phase called *reorganization*. Subjects reported *confusion* or *uncertainty* in this phase. Doesn't this sound familiar?

The need for solid empirical Morse code learning research

One might wonder at the scarcity of empirical research to support current Morse code learning methods and strategies in the ham community, but one cannot forget that most professional usages of Morse code are almost gone now, and therefore, it will come as no surprise that both the interest in this research and the funding needed to implement it are hard to find. Of course, Morse code training still occurs; for example, would the French military keep funding daily FAV22 broadcasts just because they are useful to radio amateurs?

Having said that, I believe that amateur telegraphists, as a small but well-prepared community with lots of willing volunteers, could conceivably organize to tackle some of that research. For that, and with the help of those of us that have some academic or research background, we should select *research questions* or *hypotheses* that are of immediate interest to our learning and training endeavour, define a solid *methodology* to investigate them in real scenarios, obtain empirically significant results, and then draw *conclusions* on how to apply them to improve our teaching and learning techniques and tools.

Of course, it will be hard to gather commercial or public support, but not impossible. Maybe some of the existing companies marketing ham radio equipment could help. Count on me—a retired professor of computer engineering who worked mainly in the field of machine translation— if you're interested.

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Mikel L. Forcada EA5IYL / N7EES, CWops #3765, retired in 2024 from his position of professor of computer engineering who researched mainly on translation technologies at the Universitat d'Alacant in Spain. He got his first amateur radio licence in 2019, and almost immediately started doing "summits on the air" and, as a natural consequence, embraced CW. After graduating from Advanced in 2025, he started the CW Academy groups in Catalan. As a researcher and teacher, he decided to gather existing empirical evidence about how Morse code is taught and learned to improve his advising at CW Academy as well as his continuous learning. This article aims at sharing some of his findings with fellow radiotelegraphists.

Z-Match Tuner for Ladder Line

[René Voortwist](#), PA3GPX (CWops #3752)

I really enjoy heading out into nature with my radio gear and seeing whether I can activate parks on the HF bands. As an antenna, I like using a two-by-ten-meter dipole with open-wire feedline. You can use it on all HF bands from 40m up to 10m, and it performs very well. The downside is that you need an antenna tuner that can handle an open feedline.

Up to now, I've been using an MFJ Versatuner, which works more than fine. However, this summer I'd also like to go into nature reserves on foot or by bike, so I'm looking for a complete HF station that fits in a backpack. In that case, the MFJ tuner is just a bit too bulky.

Through my mild YouTube addiction, I found a video by LY2H, who came up with a solution for this. If you want to watch the video, see:

https://www.youtube.com/watch?v=sgOpwG_EbKs&list=WL&index=7&t=480s

He uses a tiny QRP Z-match tuner that is, among other places, available on AliExpress. If you search for "z-match antenna tuner," you'll find it easily. The thing costs about twenty euros. Originally, it's only suitable for coax-fed antennas, but it's very easy to modify it for openwire feedlines.

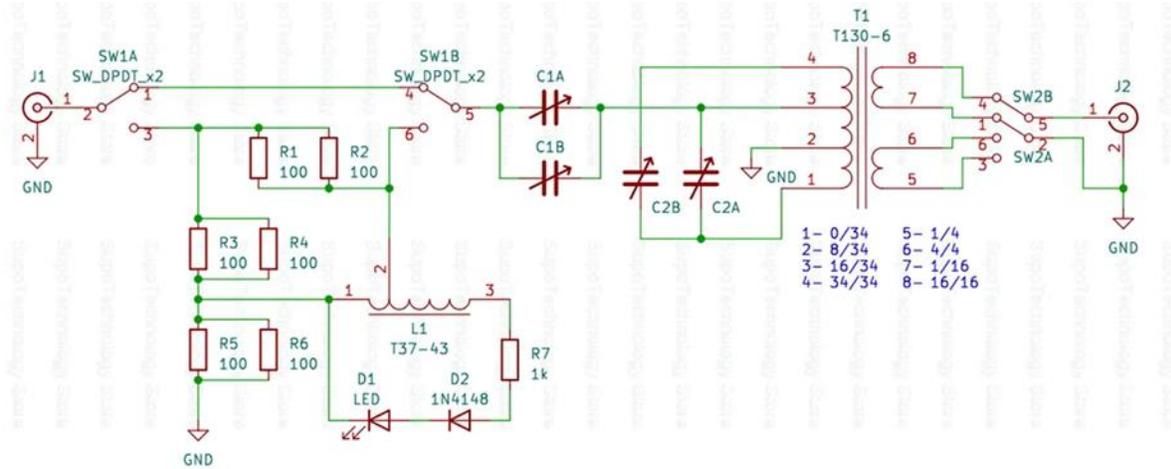
I bought the little tuner as well. This is what it looks like:



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On AliExpress you can also find the schematic of the tuner:



A Z-match tuner matches the antenna impedance to approximately 50Ω through a combination of inductive coupling and variable capacitors that together form a symmetrical matching network. The impedance transformation does not rely on a single fixed L- or π -configuration, but instead on the coupling between two resonant circuits that you tune with the two capacitors.

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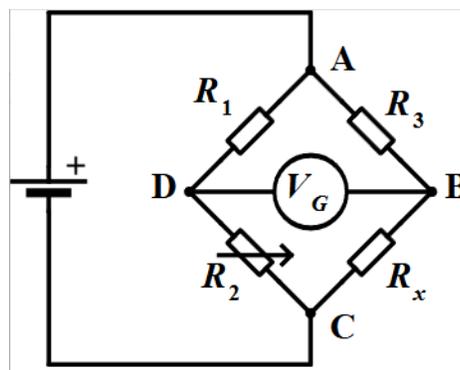
The process is similar to an HF transformer with a continuously adjustable turns ratio:

- A high antenna impedance results in a low current in the secondary circuit; by increasing the capacitance, the coupling becomes stronger and the input impedance drops toward 50 Ω .
- A low antenna impedance is transformed upward to 50 Ω through weaker coupling and smaller capacitances.

The tuner operates symmetrically, so both antenna leads see the same impedance and phase.

The result is that the transmitter sees an almost perfect 50 ohm load, even when the antenna impedance varies from, for example, 20 Ω to several kilo-ohms.

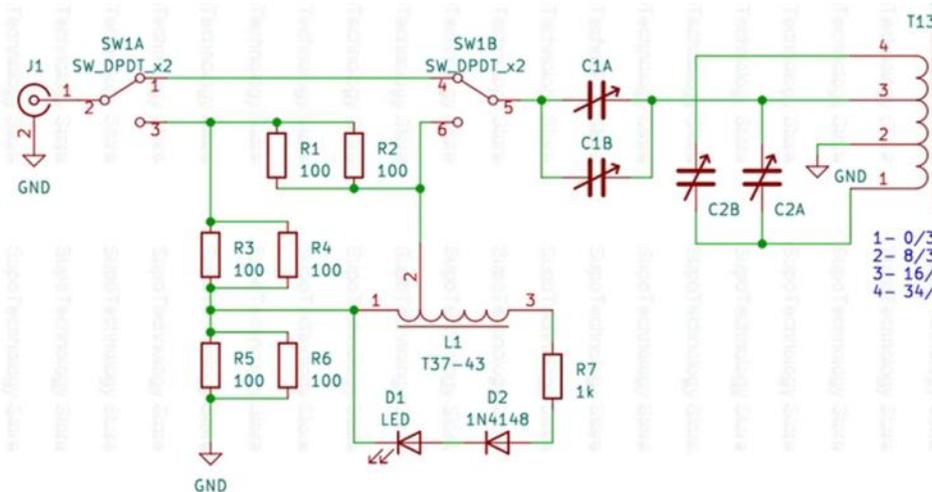
In addition, this small tuner also contains a clever SWR meter in the form of a LED. You can see it in the lower left corner of the schematic. It took me a moment to figure out how it works. It uses a so-called Wheatstone bridge.



That brought back memories from my technical school days. The Wheatstone bridge is an electrical bridge circuit that can be used in measuring instruments to determine electrical resistance. It works by balancing the two branches of the bridge, one of which contains the component with the unknown resistance — in this case, R_x . By adjusting R_2 , which is variable, you set things up so that no current flows through the meter V_g . At that point, there is no potential difference between points B and D, and the bridge is in balance. You can then determine the unknown resistance based on the value of R_2 , because the ratio between R_1/R_2 is equal to the ratio between R_3/R_x . Wow, that takes me back.

In the tuner, the Wheatstone bridge appears in the form of the six 100-ohm resistors, the coil, a resistor, a diode, and an LED.

Those six 100 ohm resistors form three of the four resistors in the bridge. Because each pair of 100ohm resistors is connected in parallel, they effectively become three 50 ohm resistors. The fourth resistor of the bridge is the impedance that the tuner presents to the transceiver. Ideally, that should also be 50ohms, because that is what the transmitter's final stage is designed for.



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When the tuner presents exactly 50 ohms, the bridge is in balance. At that point, all four resistances are 50 ohms. Instead of a meter, an LED is used. Diode D2 rectifies the HF signal, and the LED remains off.

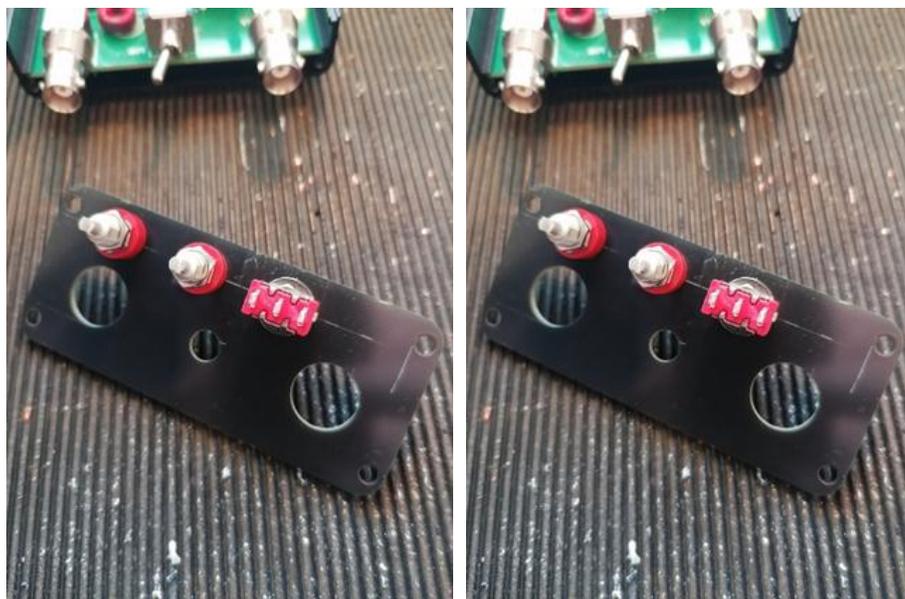
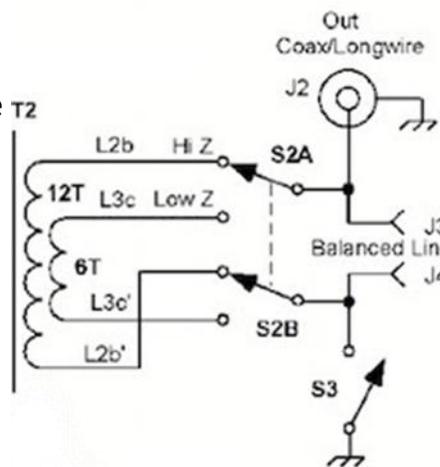
If the tuner presents more or less than the desired 50 ohms, the bridge becomes unbalanced. A current then flows that causes the LED to light up. You can therefore tune the antenna simply by adjusting the controls until the LED goes out. Switch S1 turns the measurement circuit on and off. Brilliant, isn't it?

And all of that in a little box costing about twenty euros from AliExpress.

You can see that the tuner is built for coax-fed antennas. So how do you adapt it for open-wire feedline? That's very simple:

You only need to interrupt the ground connection of the input circuit and connect the balanced antenna to the switch that selects the input impedance of the transformer. This gives you the option to use the tuner either for a coax-fed antenna or for an antenna with a balanced feedline.

How do you do that in practice? It's just as simple. You open the tuner by removing the screws and taking off the back panel. In that panel you install two chassis sockets for banana plugs and a simple toggle switch. This is quite easy because both the front and back panels are made of PCB material. It's relatively soft and easy to work with.

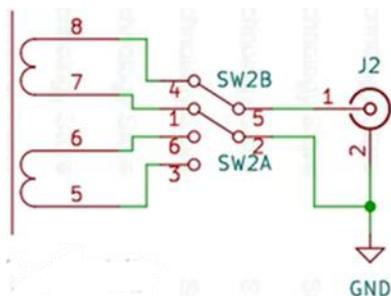


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After that, you need to modify the existing switch that is soldered onto the PCB.

You cut the center pin of the switch and desolder it from the PCB. This is pin 2 of switch SW2a. Solder a wire from the pad on the PCB (ground) to the toggle switch. From the toggle switch, solder another wire to the cut-off pin of the original switch. With this switch you can now either connect pin 2 of W2a to ground or disconnect it from ground.



After that, you connect the two chassis-mounted banana sockets to the two middle terminals (pins 2 and 5) of the switch. And that's it. And does it work? Absolutely!

I took my holiday Xiegu G90 out of the closet and connected it to my two-times-17-meter dipole with open-wire feedline, using the little Z-match tuner. Just to be sure, I also placed a "real" SWR meter in line. I only tested 30, 40, and 80 meters, and on all of them the tuner had no trouble matching the antenna to 50 ohms. That's quite remarkable, because a two-times-17-meter dipole is actually too short for 80-meters. Z-match tuners are known for being able to tune a very wide impedance range, and that certainly proved true here.

The little LED on the tuner works surprisingly well too. It's actually very simple: you first tune the tuner for maximum noise. Then you switch it to "tune" mode and drive it with a maximum of 1 watt — something you do need to remember. Then you tune until the LED goes out, and you've got an excellent SWR. The SWR meter confirmed this. I made a few QSOs with 5 watts and received good reports. Mission accomplished.



The next project will be a small QMX QRP transceiver from QRP Labs, and then my backpack set-up will be complete.

Keys We Lust: March Magnetic Keys

an interview with Mike March, K4QU (CWops #2318)

(Ed: This piece comes from two conversations with Mike at the past two Hamventions, where he could be found in the flea market area under a simple canopy with a table and chair—his preferred setup for its relaxed, no-nonsense feel. We talked on the nearby bleachers, and it didn't take long to realize that Mike is one of those quietly gifted craftsmen who comes alive in his workshop.)

The article that follows reflects the spirit of those interviews. Rather than rely on too many words, we let the photos do the heavy lifting—they tell his story with far more clarity and charm. All images are used with his permission from our visit in the flea market and his website, which I highly recommend visiting – be prepared to be wowed.)

Name of Company: March Magnetic Paddles

Owner's Name: Michael March

HQ Location: Winchester, VA

Website: <https://sites.google.com/view/march-magnetic-paddles/home>



Working the flea market at Hamvention 2024.

SC: Mike, these are some of the most exquisite keys I've ever seen. You are the jeweler among craftsmen. What motivated you to design and create Morse code keys?

Mike: I have been doing CW since I was a novice at age 13 and have always enjoyed designing and making things. The first paddle I made consisted of 2 hand keys, bolted back-to-back. I took a machining class in college and realized I had the skills to make a quality paddle. I started the building in 1985. Since then, the addition of a CNC milling machine has increased accuracy and production speed. It's just me in the workshop creating each piece one at a time.

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I tend to concentrate on each minute detail to make every key unique and a true work of art. The functionality is just as wonderful and pleasing as its good looks.



Brass base inlaid with Bloodwood. Engine turned. Bloodwood fingerpieces.



Rosewood inlay with molten lava fingerpieces.

SC: do you have a “why” you’re in business?

Mike: I'd have to say the gratification from hearing the customer's comments about my keys. It starts with the making process...working with my hands, and culminates with the customer reaction when they view their piece of art.

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SC: what is it about your magnetic keys that makes them so unique?

Mike: the artistry for one. I do not run a production line. Each piece stands on its own.

They are all hand-made CW paddles using magnetic repulsion. The materials are primarily brass, drill rod, German silver, acrylic, exotic woods.

Some of the unique features are:

- Magnetic Repulsion
- Round base
- Engraving
- Jewelling



Brass base with standard engraving. Acrylic fingerpieces.



Gunmetal black engraved base. Engine turned with rosewood fingerpieces.

I don't keep track of my hours. I don't want to be limited by anything other than creating a Morse code key that a customer will treasure.

SC: what is your ordering process?

There really is not an ordering process. I prefer that anyone interested in a key, contact me by [email](#). At that point, we discuss all the features that the customer wants, price, and delivery details.

The cost of my keys range from \$275.00 to \$400.00

SC: What are your future plans?

Mike: Incorporate my new Laser cutter/engraver

N9EEE: Thank you for sharing your story and the wonderful Morse keys you craft.

An Unexpected Adventure During POTA

[Fabrizio Faleni](#), HB9HXH (CWA)

Hello, this is HB9HXH from Geneva, Switzerland. I got my full license in May 2023, I'm curious of about everything in radio, and I just passed the CW Academy Beginner Level under the careful and protective supervision of Dick, N9EEE.

I knew from the start that operating from home would have been a challenge because of the inability to install an antenna on the roof and because of the very near surrounding houses. So, I purchased a portable HF transceiver, having POTA and other open-air activities in mind.

POTA is beautiful, even more when done with friends; I often go with my good friend HB9HDV. He is an experienced Morse operator and this winter after Christmas, despite the cold and humidity, we have activated several parks that are nature reserves - woods but also marshes where the portable chair sinks into the mud. Walking kilometers with the backpack on my shoulders, the portable chair in one hand, the board that I hold sitting on my thighs with all the Velcro strips so that the "rig", the battery, the phone with Ham2k, and a block of paper do not fall off - on the other shoulder...you feel like explorers.

But for these explorations it takes time, you must be on vacation. And last Sunday we had only a couple of hours and frankly we wanted a little comfort: a park near a parking lot, where you don't have mud up to your ankles and possibly where you can stay in the barely warm sun of early March. On Friday afternoon, each of us from his work looked at the maps, analyzed the pros and cons of five or six possibilities and finally decided on the wonderful "Parc du Chateau de Penthes". Yes, "Chateau" means castle, it already gives you an idea that there are tall trees and freshly mowed lawns, a beautiful sight and a nice little castle.

The park is beautiful, we both know it well, it is close to the United Nations area, but it is not a POTA park. In Switzerland we only have nature reserves such as POTA parks, and they are few. However, in the far west corner, the park touches two trails: "Alpine Panorama National Scenic Trail" (CH-0218) and "Via Jacobi National Scenic Trail" (CH-0219). From that corner of the park, we are less than 30m from the two trails and we can activate them in full compliance with the rules.

So we go there on Sunday early afternoon, we find a parking lot near the chosen area, there is a closed gate beyond which there is the park and so we throw our backpacks and bags into the park (when I activate a park by car I tend to carry half the house) and we go around to enter the park and reach our area. There is a beautiful sun, little wind, the temperature is about 14 degrees C (57F), everyone installs their own antenna - POTA performers by KJ6ER strictly self-built - and we start operating.



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HB9HDV operates in Morse. I still in phonics. I brought my paddle, but I still don't dare using it, it's more like the cover of Linus from Peanuts.

Despite the different band, I can hear his metered rhythm in the background. Of course, he beats me by far on the distances with a QSO with Thailand and on the number of QSOs: there is a good reason I take CW Academy courses!

Once the park is (abundantly) activated with 19 QSOs, I start dismantling the antenna and putting the equipment away. HB9HDV does the same from his station. It is about 4 o'clock and the sun is setting. It is just behind the gate that separates us from the parking lot. Suddenly the sun is obscured by something, I turn around and see against the light some silhouettes jumping and others climbing the gate and then all running toward me. I don't understand right away because I'm dazzled but then a voice shouts, "Get up against there!" and I realize it's law enforcement.

"ID please. What are you doing?"

All four of them are around me. Instinctively I look at my friend and realize they hadn't noticed him; they see him following my gaze. One of the four walks up to him. We are really pitiful as spies.

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"I am an amateur radio operator, I am doing a recreational activity called Parks On The Air. I am fully authorized to carry out these activities in public parks. I have a license and a concession from OFCOM (the Switzerland Ministry of Telecommunications)." I'm now holding out my amateur radio card to someone for the first time in my life. And I thought it was useless!

They don't seem very impressed by that plastic rectangle with my picture, the Switzerland flag on it, and other things that are incomprehensible to them.

"Yes, but what exactly are you doing?"

"I am communicating by radio with other hams in other countries."

"Other countries..." He echoes me. His face is surprised and I can hear him thinking, "Could it be possible that this spy is so stupid as to admit everything candidly?"

As I explain I pick up the phone and open Ham2K where I have logged my QSOs.

"We are thousands of radio amateurs in Switzerland alone and hundreds of thousands worldwide. I belong to a radio club that is the Geneva branch of the Switzerland Amateur Radio Association..."

"Oh yeah, a club? And how many of you are there?"

"We are only ninety."

"NINETY???" I realize that it sounds like a lot to him.

"I told you there are thousands of us in Switzerland." And I add, "I'm also a member of the CERN Amateur Radio Club (CERN is a huge nuclear physics research institute in Geneva)," trying to give some sort of dignity to the unknown and dreaded activity of amateur radio.

And now the surprise move: I open the log application on the page with the map of Europe and all the curved lines from Switzerland to points scattered across the continent and put it in front of his face.

"These are the contacts I made today," I say.

He reads "Bulgaria? Latvia?"

"Yes," I confirm to him, but why does he have it in for Eastern Europe? "And Spain, UK, Italy, too," I add. "You know, there are clear rules that we have to follow. Not only power, technologies or frequencies to use, but also about what we can talk about: technique, weather, things like that," I try to reassure him.

That's a lot of unexpected information all at once. The four retreat a short distance and report back to someone by phone.

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Then they return and they ask us to spread out the contents of our backpacks and bags so they can photograph everything. They even search my fanny pack (yes, I am a boomer with a fanny pack) and the trunk of my car. They are nice but nothing will stop them from taking an “X-Ray” of us and of our stuff.

They are the *diplomatic police*: not in the meaning of tactful and delicate, in the meaning of ambassadorial, of United-Nations-related (that was obvious from the start, right?). I discover that they have been called by the Swiss army patrol that protects 24x7 the USA Mission and whose gates are... only 50m from where we are. Add that we are on day two of *Operation Epic Fury* and you get the overall picture.

“Hey, I’ve done nothing wrong,” I respond to his guilty gaze. We’re finished and get released.

My friend and I throw the stuff in bulk in the backpacks and decide to go admire the view of the lake from an overlook nearby (we are on the Panorama trails route, after all) to calm down a little bit.



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Later in the week I go to the police station. With the policewoman at the desk we agree that holding a seminar to teach all the Genevas Police the difference between an amateur radio operator and a spy would be difficult to get approved.

So, I ask if we could announce ourselves whenever we want to activate an area which is a sensitive area or that is crowded, or near the city center. She says yes and to just call 117 (our 911), that way they would calm down any callers first.

Now I'm looking at that sweet spot, a jetty on Lake Geneva with a lighthouse at the end called "Bains des Pâquis", where there's a Spa and a nice little beach. On summer mornings, there are free concerts that start before dawn, and you can watch the sun rise as you listen to music. There, three parks meet: should I take the risk and activate it?

Pictures shown, in order:

1. View of the park
2. The board on the camping seat
3. The view from the near viewpoint on the trail
4. Geneva Lake Lighthouse - The "Bains des Pâquis" lighthouse



My Other Hobby Is...Astronomy

[Raoul Coetzee](#), ZS1C (CWops #338)

I still remember, as a young child, gazing upward in awe at the stars, bright planets, and pale milky patches scattered across a truly dark sky. Light pollution was almost nonexistent then, as we lived on the outskirts of Kuils River in South Africa's Western Cape. It was a small rural town. My opportunities to be outside at night were rare—usually only when returning home after visiting family—but those brief glimpses left a lasting impression.

Born in 1959, I grew up during the era of the Gemini and Apollo missions. South Africa had no television at the time, yet my school showed us a film of the first Moon landing. Grainy newspaper images and well-worn library books about space only deepened the sense of wonder and quietly planted the seeds of a lifelong fascination.

My practical journey into astronomy began with Halley's Comet in 1986. Peering at its faint glow through a modest Tasco Newtonian telescope of 6" in diameter (around 100mm) was both captivating and slightly underwhelming—expectations had been inflated by the excitement surrounding the event. Soon afterward, marriage, career, and amateur radio took priority, and astronomy slipped into the background.

Decades later, I borrowed that same red telescope from the friend with whom I had first observed the comet. When I turned it toward the Great Orion Nebula, I found myself wanting more detail than the instrument could provide. That moment rekindled something powerful. I upgraded to a 10-inch Dobsonian, which delivered magnificent visual views, but locating deep-sky objects by star-hopping often consumed precious observing time. The solution became clear: if I wanted to reveal the finer structures hidden in the night sky, I needed to move beyond visual observing and into imaging, where a camera's ability to gather light over time far surpasses that of the human eye.

At its core, astrophotography is about capturing as many photons as possible from a distant object and guiding them onto a camera's light sensor. This is achieved through multiple exposures—ranging from milliseconds to ten minutes or more, depending on the target. Each individual frame, known as a *sub-exposure*, is carefully aligned and then combined using specialized software.

Stacking these images significantly improves the final result. While the true signal—the light from stars and nebulae—adds together consistently, noise is largely random and is reduced during the stacking process. The technique not only enhances faint details but also eliminates unwanted artifacts such as satellite trails.

The **camera sensor**, and its supporting components, memory, buffers, etcetera do generate thermal noise, just as RF amplifiers in our receivers have an inherent noise figure. To combat this, dedicated astrophotography cameras use built-in Peltier thermal coolers that lower the sensor temperature to around -10 to -15°C , dramatically reducing thermal noise and allowing finer detail to emerge in the final images.

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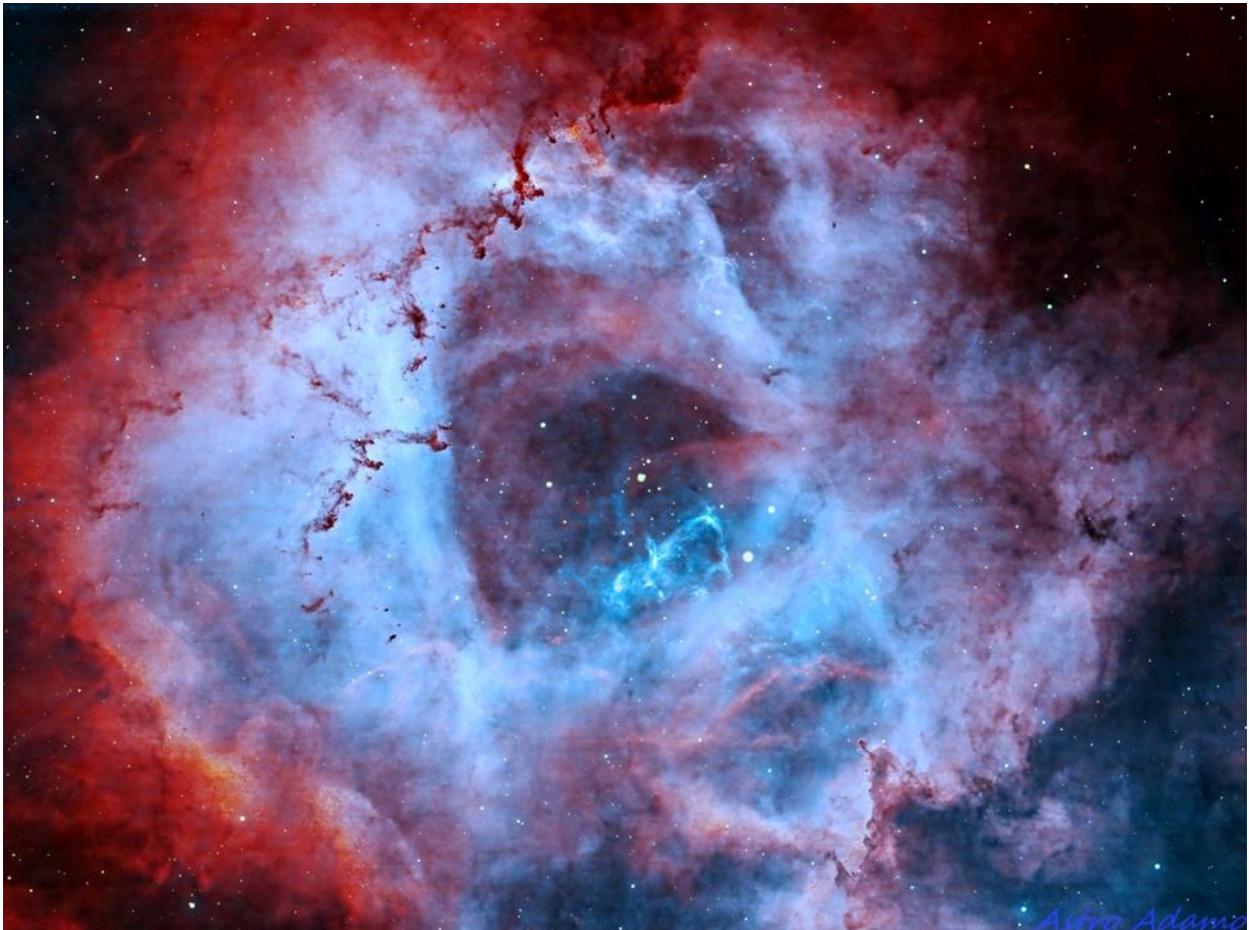


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For more advanced work, many astrophotographers favor monochrome cameras paired with specialized **narrowband filters**. These filters isolate the subtle wavelengths of light emitted by faint nebulae, revealing structures and textures that would otherwise remain invisible.

Star-forming nebulae consist mainly of hydrogen, along with smaller amounts of oxygen and sulfur. Young, hot stars energize these gases, causing them to glow at very specific colors — something scientists identify through spectroscopy.

For astrophotographers, these glowing gases shape the images we capture. Hydrogen-alpha (Ha) produces a deep red light that defines much of a nebula's structure. Oxygen (OIII) shines in blue-green, highlighting energetic regions and fine detail, while sulfur (SII) adds subtle contrast that helps reveal the surrounding gas.



The Rosette Nebula (NGC 2237) is a vast cloud of gas and dust located in the constellation Monoceros, about 5,200 light-years from Earth. This image was captured using a Sky-Watcher ED120 telescope on my home-built equatorial mount, with a Touptek ATR3CMOS colour camera cooled to -15°C and an L-Ultimate dual-band 3 nm Ha/OIII filter. The red tones reveal hydrogen-alpha emission, while the blue highlights oxygen-III, tracing this nebula's active star-forming regions.

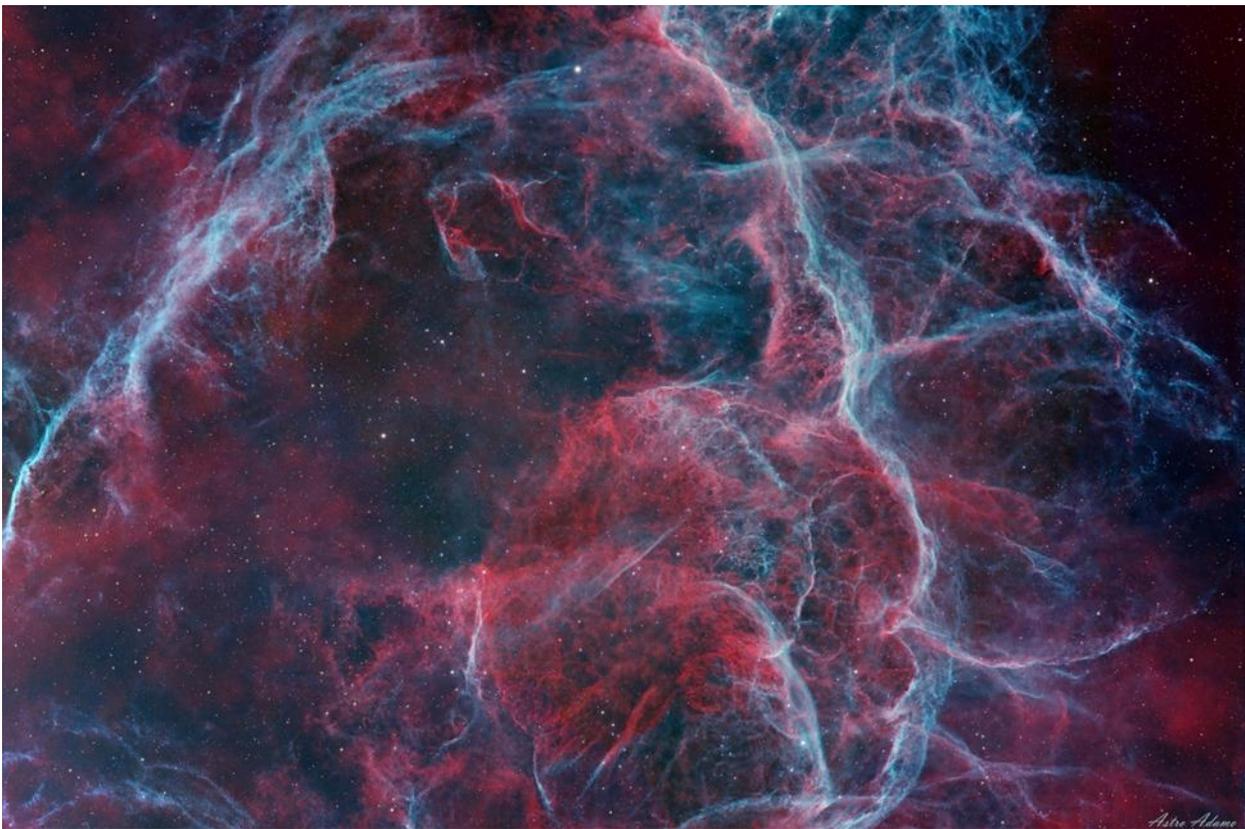
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Using narrowband filters, we photograph each of these wavelengths separately and then combine them into a single image. This allows us to reveal faint structures that would otherwise remain invisible, turning distant clouds of gas into detailed portraits of stellar birth.

Why use narrow band filters? Just like a narrow CW filter, we cut down on the stuff we do not want to capture! We are only interested in the data from our target object, we are not interested in the moonlight, streetlights or natural sky glow. The filters are made by using top grade glass, extremely accurate surfaces and very complex layers of coatings.

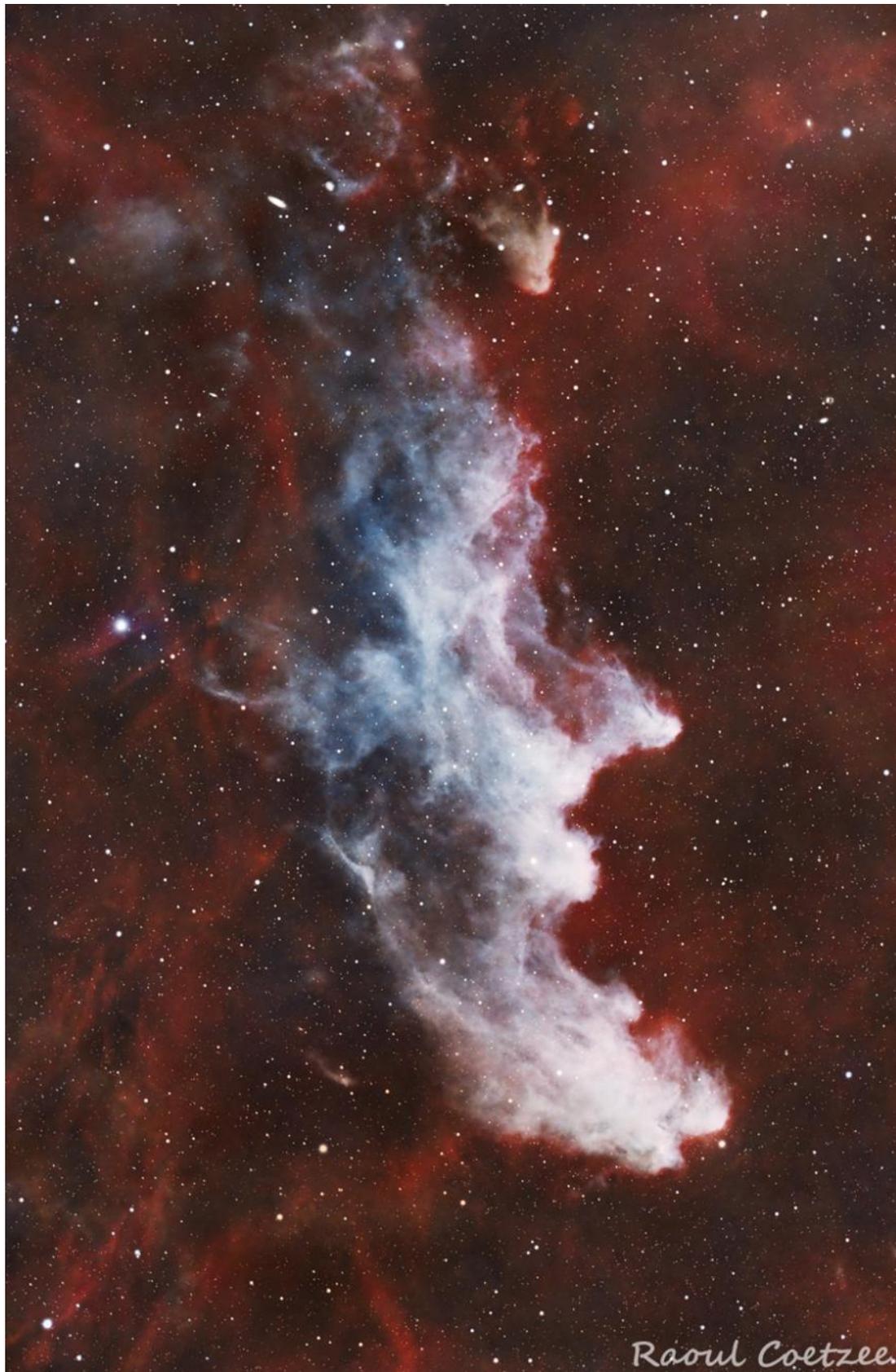
Then to be able to take long exposures images, the telescope need to be able to track the object, sometimes from early evening till dawn. In most cases, images are taken of the same object over days, or weeks. Total exposure time may vary from an hour to 30 hours or more.



My image of a portion of the Vela Supernova Remnant. This nebula is the expanding cloud of gas and debris left behind by a supernova explosion that occurred approximately 11,000–12,300 years ago in the Vela constellation. It is located about 800 light-years from Earth, making it one of the closest known supernova remnants. The remnant spans an area over 8 degrees across the sky, which is about 16 times the size of the full Moon.

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The Witch Head Nebula (IC 2118) lies near Orion's brilliant star Rigel, its ghostly profile shaped from interstellar dust. This image combines LRGB and narrowband H α data, revealing not only the reflected starlight that defines the nebula but also faint traces of hydrogen emission interwoven with the dust — remnants of the vast Orion-Eridanus superbubble.

I captured it from my home observatory in Hopefield, in the Western Cape, South Africa. The image was taken using a William Optics GT81 telescope with a Flat6 field flattener on a self-designed and built equatorial mount.

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The camera was a Touptek ATR2600MM, paired with Antlia LRGB filters and an Antlia 4 nm H α filter. The LRGB data consist of 213 \times 120-second sub-exposures, while the H α component comprises 36 \times 300-second frames.



The Fighting Dragons of Ara he "Fighting Dragons of Ara," an emission nebula where intense stellar winds and radiation shape the surrounding hydrogen clouds into dramatic, dragon-like forms.

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A moody, slightly dramatic image of the iconic Pillars of Creation in the Eagle nebula.

For this I used Meade 8" Smit Cassagrain Telescope and narrowband filters.

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The **Pencil Nebula (NGC 2736)** (centre, top,) is another emission nebula in the constellation Vela, approximately 800 light-years from Earth. It is a small, filamentary segment of the larger Vela Supernova Remnant, formed by the explosion of a massive star about 11,000 years ago. The nebula's name comes from its thin, elongated appearance, resembling a pencil or broomstick. Its brilliant colors result from ionized gases—predominantly hydrogen and oxygen—illuminated by the shock wave moving through interstellar material..

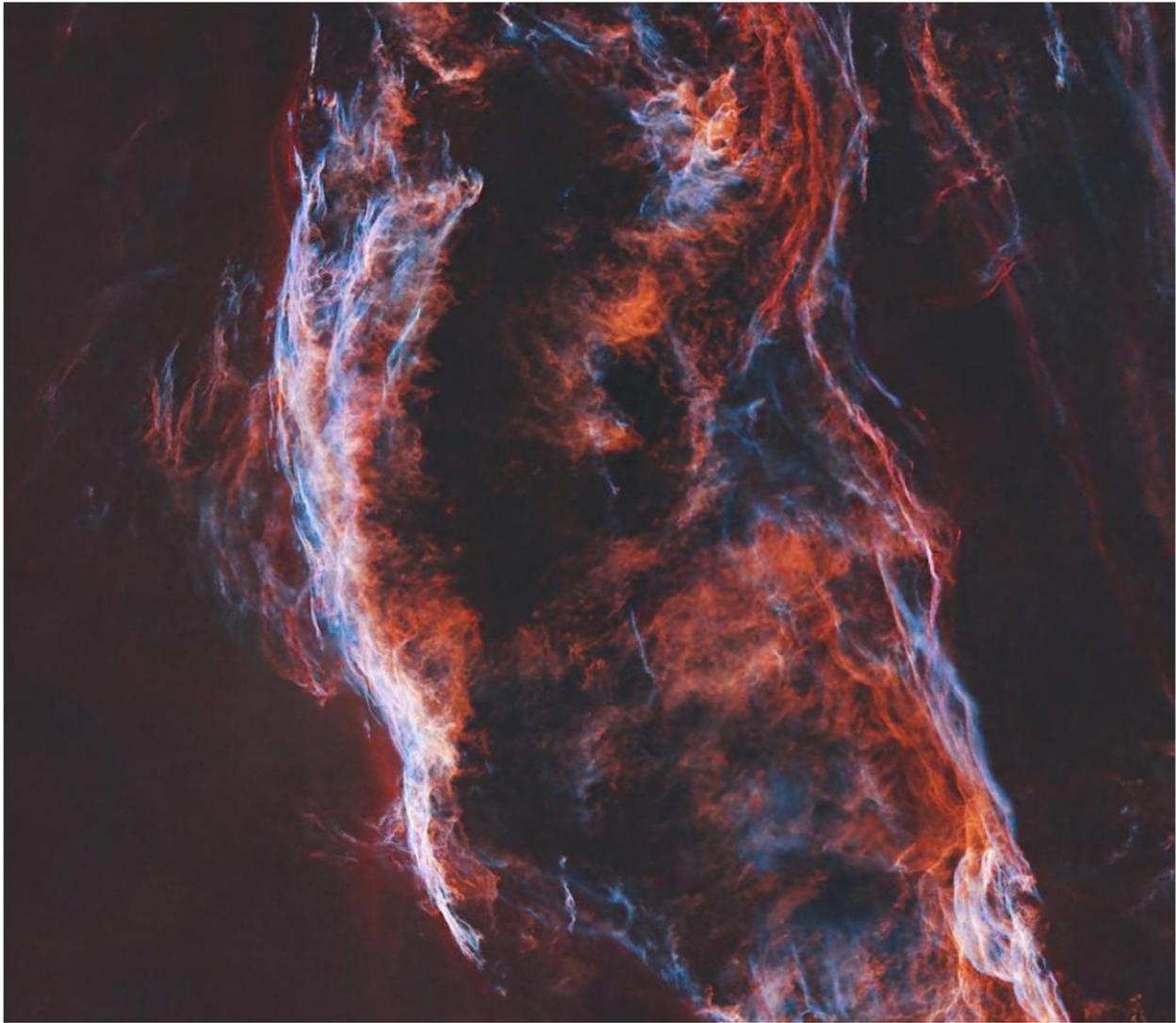
The Pencil Nebula was discovered by **John Herschel** on **1 March 1835**. Whilst he was observing from the **Cape of Good Hope** in South Africa

He described it in his observing notes as:

“an extraordinary long narrow ray of excessively feeble light.”

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The “Witch’s Broom,” part of the Western Veil Nebula (NGC 6960) in the constellation Cygnus, is a delicate filament of glowing gas created by the shockwave of an ancient supernova explosion. Sweeping across the star field near 52 Cygni, these intricate strands of hydrogen and oxygen mark a small portion of the vast Veil Nebula—the expanding remains of a massive star that exploded roughly 10,000 years ago.

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My version of the famous M42: The Orion Nebula (M42) is one of the brightest and most studied stellar nurseries in the night sky. Located in the constellation Orion about 1,350 light-years from Earth, this immense cloud of glowing gas and dust is a region where new stars are actively forming. Intense radiation from the young stars of the Trapezium cluster illuminates and sculpts the surrounding hydrogen and oxygen clouds, creating the dramatic shapes and colours that make M42 one of the most spectacular objects for both observers and astrophotographers.

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Wanting a sturdier alternative to my small EQ5 Sky-Watcher mount — and faced with the high cost of commercial options — I decided to build my own in my garage workshop. Starting with an old wheel-stub axle that became the Right Ascension axis, I machined each component myself, including the worm gear, learning as I went as a self-taught machinist. Controlled by an Arduino-based AstrEq system linked through ASCOM and Stellarium, the finished 11 kg Go-To mount now runs nightly imaging sessions in my observatory — a handmade tool built for reaching the stars.



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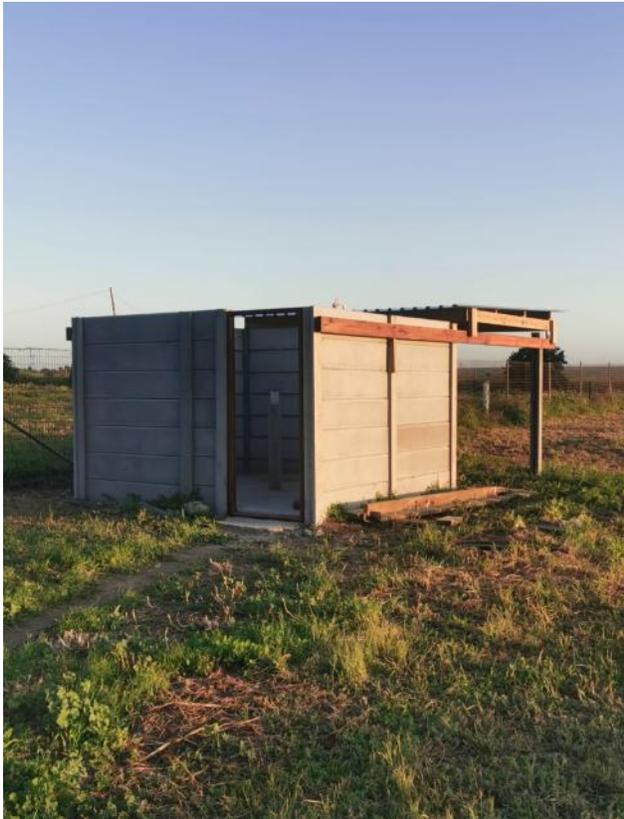
The Horsehead Nebula (B33) and the nearby Flame Nebula (NGC 2024) lie within the rich molecular clouds of the constellation Orion, about 1,300 light-years from Earth. The dark silhouette of the Horse-



head is a dense column of cold dust seen against a glowing background of hydrogen gas, while the Flame Nebula shines brightly as intense radiation from the star Alnitak illuminates and sculpts the surrounding interstellar clouds. Together they form one of the most iconic and dramatic regions of the Orion complex.

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The observatory is more like a garden shed with a sliding roof, home built of course! The photo of the observatory—my so-called "astro shack"—was taken while it was still under construction.

The picture of me was taken to show a smaller imaging telescope that I won as second prize in a competition run by the South African Astronomical Society.

My location is not ideal. Years ago I bought this property next to the sports field of a small school, but they are now utilizing the sports field, and they have evening games with bright lights. I am paying the price for so called progress.

Wishes:

Astronomers are fighting light pollution just as fiercely as radio amateurs fight QRM. While brightening skies already threaten our view of the universe, another growing concern is the increasing number of satellites in orbit, leaving streaks across astronomical images and adding to the glow above our heads.

In small towns we are still fortunate to experience relatively dark skies and enjoy the breathtaking spectacle of the stars. Sadly, that privilege is slowly disappearing, often because of something simple: poorly installed security lighting that shines upward or reflects off nearby surfaces.



Take a moment to check your own outdoor lights. Do they illuminate the ground where they are needed, or do they shine into the sky? After all, very little crime comes from above — but a lot of unnecessary light does.

QRV: CWops DX

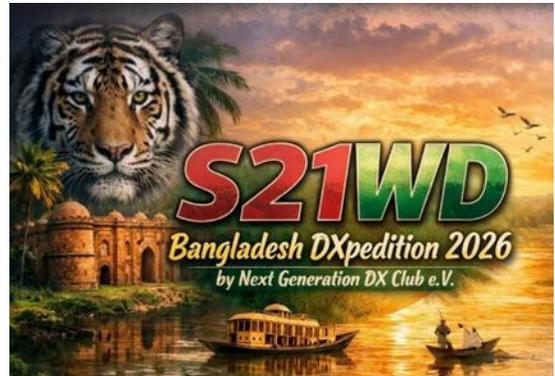
[Bill Salyers, AJ8B](#)

We have some CWops members who are proactively trying to answer the question “How do we get youth involved in ham radio?” This is the Next Generation DX Club (<https://next-generation-dx.com/>)

Three of the four founding members are CWops members: Philipp, DK6SP (#2588), Sven, DJ4MX (#2697), and Jaimie, MØSDV (#3738).

There are approximately 20 members in this club, and they continue to add members. Their focus is on DXpeditions with trips to V73WW and 8R7X and the recent S21WD trip to Bangladesh.

I was able to meet (virtually) and discuss the Next Generation DX club as well as the S21WD trip with Sven, DJ4MX, on our recent [DX Mentor](#) podcast. We discussed his path to ham radio, the Next Generation DX club, the S21WD, and the impact that CWops has had on him.



Sven mentioned that the CWops program had an impact on the participants, so I decided to contact Sven, and Philipp, the Team Lead and ask a few questions. Their answers are below.

Solid Copy: You are CWops member #2588. Who got you into CWops?

Philipp, DK6SP: I was invited to join CWops by several active members I had worked frequently on the air during contests and DXing. The CWops community has always had a strong reputation for excellent operators and a very positive culture around CW, so it was a great honor to receive the invitation and become part of the group.



Solid Copy: Did CWops have a major impact on your love of CW?

Philipp, DK6SP: My passion for CW started well before CWops, but being part of the organization certainly reinforced it. CWops brings together a group of very active and highly skilled operators, and that environment naturally encourages you to keep improving. It also highlights how efficient, elegant, and universal CW still is in amateur radio.

Solid Copy: Did the CWTs help you when it came time to hit the pileups at 8R7X or V73WW

Philipp, DK6SP: Absolutely. The CWTs are fantastic practice. They force you to operate at high speed, maintain accuracy, and quickly extract callsigns under pressure. That kind of training translates directly



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into handling DX pileups – whether you are chasing DX or sitting on the other side of the pileup running a rare station.

Solid Copy: How has CW helped or enhanced your desire to BE DX instead of just working DX?

Philipp, DK6SP: CW is still the backbone of many DXpeditions. Its efficiency, reliability under difficult conditions, and the ability to move large numbers of QSOs quickly make it ideal for rare-entity operations. Operating CW during DXpeditions allows us to serve a huge portion of the amateur radio community and keep the rate high, which is essential when thousands of stations are calling.

Solid Copy: Do you have any other comments about CW or CWops?

Philipp, DK6SP: CW remains one of the most effective and enjoyable modes in amateur radio. Organizations like CWops play an important role in keeping the art of good CW operating alive while also welcoming new operators. The mentoring aspect and the regular activity programs are extremely valuable for the long-term health of CW in our hobby.

Sven chose a narrative style, but the message still comes through!

Sven – DJ4MX: I was well aware of CWOPs before joining, since I did a lot of CWTs beforehand. Philipp DK6SP nominated me, and DL6KVA, WT9U, K1VUT, PA3AAV, WT8P and G3WZD were my sponsors.

In a way CWops had an impact in my love of CW, while still learning CW, doing the CWTs, every week I got better and better at CW. Of course, I also kept getting better at CW contesting and pileups, which I enjoy most about CW now.

I think the CWTs and other weekly contests are one of the best ways to train running pileups. Of course, really large pileups, like I experienced in 8R7X are on another level compared to the CWTs, but they help setting the foundation to operate such pileups.

Enjoying CW contesting and pileups in general, I wanted to experience bigger and bigger pileups. First starting with “fresh meat” pileups in contests, then to contests from “big gun” stations and then later of course going on DXpeditions, where one can experience the biggest pileups.

After spending an hour with Sven, I had two feelings. The first was that of optimism. There is a lot of lip service paid to getting youth involved in Ham Radio in general and in DX in particular. These guys are trying to do something about it.

Secondly, it really made me proud to be a CWops member! We have very active CWOPs members who are making a difference in the DX world and I am going to find them and report on them!

73, Bill AJ8B (CWops#1567)

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About Bill Salyers, AJ8B (CWops #1567)

Bill Salyers, AJ8B, is an active operator and is president of the Southwest Ohio DX Association. (SWODXA) SWODXA is the group that bestows the "DXPeditioneer of the Year" award at the DX Dinner during Hamvention and hosts the DX Forum on Saturday of Hamvention. Bill is also a CWops member, #1567.

Bill was first licensed as WN8IQN in 1971. He has become a somewhat prolific writer having first published an article in The DX Magazine in 1985. Since then, he has been published in QST, The National Contest Journal, Radio Amateurs Old Timers Club Australia, Radio Amateurs Old Timers Association of Britain, and the CWOPs newsletter. Bill is also the editor of the weekly DX column in the Ohio Section Journal, the webmaster for SWODXA, and the newsletter editor for SWODXA and the newsletter of the Twin Cities DX Association. Bill is also the "N" letter sorter for the 8th area incoming QSL Bureau.



Bill was on the QSO today podcast #319 and has presented several times at W4DXCC, W8DXCC, and the QSO Today Virtual Expo. Bill has also been an instructor in the CWOPS organization, the CW Academy.

Bill resides with his wife of 40 plus years, Karen, in Waynesville, Ohio. He is an IT Director in Cincinnati and has a 2-hour commute which allows plenty of time for DXing from the car with the Yaesu FT-857.

Bill has modest DXCC totals including 8BDXCC, WAZ, and 327 confirmed overall, WAS Triple Play, and the ARRL Trident award.

Currently, Bill is the host of The DX Mentor podcast and the DX Mentor YouTube channel. He also a weekly contributor to the This Week in Amateur Radio podcast as well as the W2PHradio.com internet radio station. You can correspond with Bill at thedxmentor@gmail.com

Keyed Up

This Month's Poll

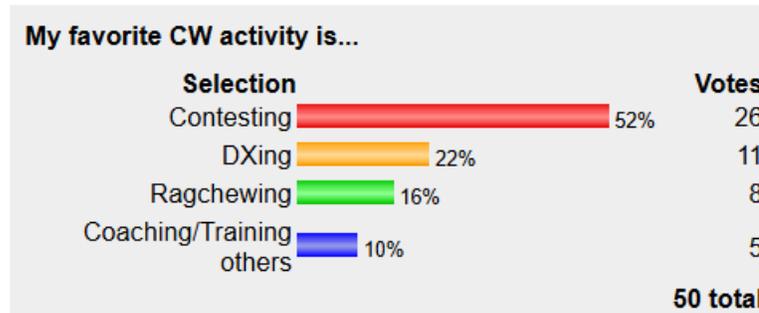
"How do you typically read Solid Copy each month?"

Your choices are: Computer, Tablet, Smartphone, Printed, Other

Take the poll: <https://cwops.org/keyed-up/>. Leave a comment.

Check the results in next month's *Solid Copy*.

Last Month's Poll



SOAPBOX

Eric WS4K: My problem is I love them all!! I can't pick just one. I enjoy spreading the joy of CW. I like to Contest when I can. I get all the DXpeditions I can hear. I really love when I can ragchew with someone. Yes, I love it all!

Kim N5OP: I enjoy all aspects of CW operating. Currently, I enjoy DXing. I'm in the Oklahoma DX Association and so far have a total of 304 CW; I enjoy the hunt and hearing what propagation sounds like under different conditions. For me, DXing is a bit magical - the ability to communicate (even if it's perfunctory) with another person on the other side of the world with a bit of wire connected to a 100 W transmitter (no more than a common incandescent light bulb), using nothing but rarefied air and sunlight immersed in our planet's magnetic field. But, fundamentally there is little to compare to the romance of a winter's night, a faint whiff of wood smoke, and the air perfumed with Morse.

Victor 4X6GP: Nothing's better than working distant stations on CW. Sometimes I enjoy a ragchew, especially with someone I've known for a few decades. I don't have the patience for contests much longer than the CWT these days.

Bob WR7Q: The thrill of a dxpedition coming back with my callsign is as exciting today and the first time I ever heard. I love it.

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Pete AB0WW: Tracking my QTX and mQTX for about a year now.

Tom KV8Q: I've always enjoyed CW contesting. Being in a condo with very limited indoor antennas, I can't do much chasing DX anymore. I like to rag chew whenever I find the time.

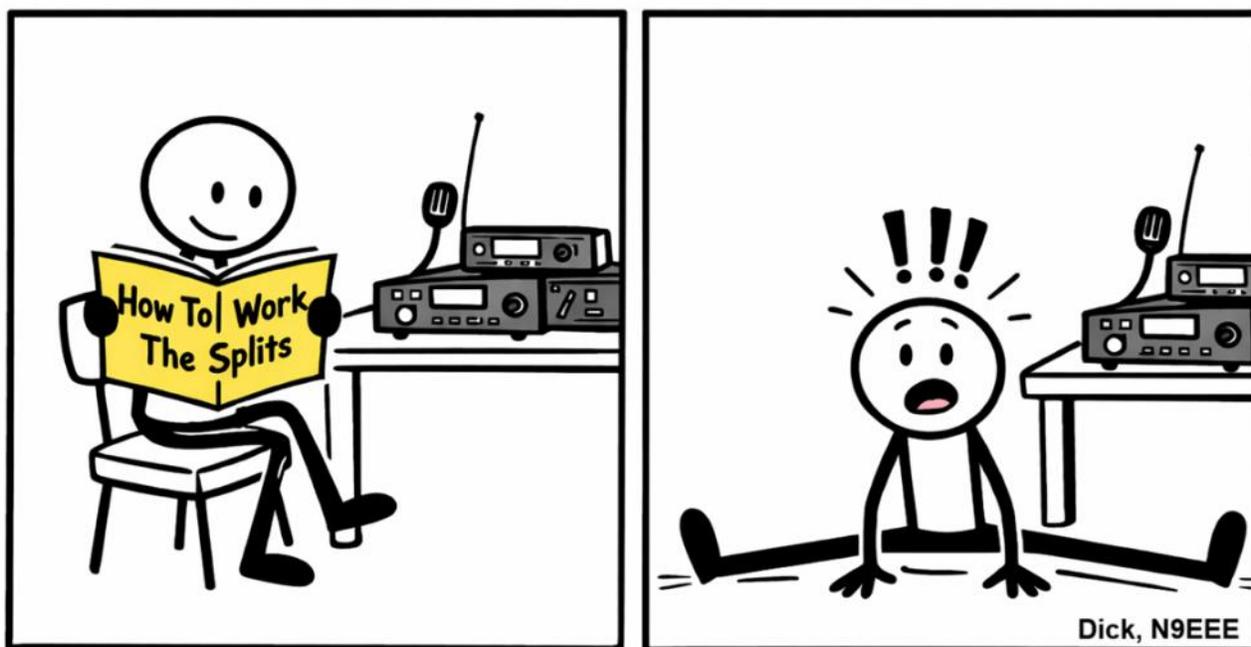
Bob W1EQ: Contesting and DX chasing. Got em all but one. North Korea.

Bruce NJ3K: Although Contesting is my favorite, chasing DX is high on my list also.

Cainan N9FZ: I picked ragchewing but I would have selected "All of the above" if possible.

SC

Hamming It Up



New Members

[Trung Nguyen, W6TN](#)

With great pleasure we welcome the following new members to CWops:

<u>CWops</u>	<u>Call</u>	<u>Name</u>	<u>CWops</u>	<u>Call</u>	<u>Name</u>	<u>CWops</u>	<u>Call</u>	<u>Name</u>
3873	KE7IR*	Patti	3878	AD2EK*	Jean	3883	K4KYN*	Jeffrey D
3874	AI5BE*	Tim	3879	KN4CW*	Bear	3884	W2EQ*	Tom
3875	F4GBY	Davy	3880	VA7YE*	Denise	3885	DL2COM*	Leo
3876	N7KV*	Kevin	3881	WB2FKO*	Mike			
3877	KØRX*	Dave	3882	W4JF*	Joe			

* Lifetime member

As of March 8, 2026:

Need Sponsors: SM7WNM, SA4ZAB, G3NDS, M5LGM, LA4HIA, W1P

Invitations Extended: WØEAS, N8KH, W4LTE

For more details about nominees and up-to-date status, check the ["Members only"](#) page on the website. For information about joining CWops, check the ["Membership"](#) page on the website.

Notes: If you have updated your personal info, e.g., new QTH, new callsign, or additional callsign, please send it to membership@cwops.org so I can add it to the roster. Vice versa, if your callsign becomes inactive I can remove it, too. Then the roster will be accurate and current for our usage.

73, Trung W6TN (CWops #1707)

Membership Manager

— **SC** —

Did your **CALL SIGN** change recently?

Did you move to a **NEW ADDRESS** or change your **NAME** ?

Congratulations!

Help us keep our **DATABASE UP-TO-DATE**

Click [HERE](#) to update your contact information.

Giving Back Update

[Rob Brownstein, K6RB](#) (CWops #3)

CWops' Giving Back (GB) program is meant to provide on-air QSO experience and practice for anyone who wants it. It was initially intended as a way for our CW Academy students to get some on-air experience. We all know that when there is activity on the bands, these days, it's usually a DXpedition pileup or a contest. Today's CW aspirants have had little chance to work others who are skilled at CW, operate at moderate speed, and are committed to helping. That's the mission of Giving Back. The GB volunteers get on the air at approximately 7 pm local time and seek out CQers, or call CQ, and engage in routine QSOs including some conversational tidbits. The operators' schedule appears on the next page.

Here are the February 2026 results (GB hosts are shown in **bold**):

GW2CWO	F8FXA EU1TN VK2BJ	PA3KW G3MD	RN6LRI R6ZCL	RX7KA SP2BMW	YO2ARM G1MPC	DB2OIF HB9APJ	IW2MXE SP3DGV
JG1UQD	JJ2OXS	JA8XOT	JR2SCZ	JA4IJ			
JJ1FXF	JJ6MDA JM4AOA	JQ3FRX VK5GG	JJ2JVU JR3RHI	JN1FAO	VK3DA	BA4SUA	BG6TVZ
JK1QYL	JJ6MDA(2) JO1UFB	JL2SQK JF6IUL(2)	N6TI JF3WGG(2)	JN1FAO JA4IJ	JS2DJM JA1GZV	HL1MIM JE6AJO	JL1DZP JQ6EQD
JM4AOA	7N1OEX JJ2JVU	BH1ONB/5 JK1TCE	HL1MIM JM1TBU	JA6PWF JN1FAO	JG1BGT JQ3FRX	JH4COC JR0CWZ	JH7OTG N6T
JO1DGE	JF3WGG						
JQ3FRX	JF1LXO	JK1KDH					
K7NJ	K7XU	WA6MOW	WA4JYX	KB0BWY	WN3Q	WA9VDW	N7BO
M0WDD	DF1XC LA7HNA	DK4AT M0IYP	DK6EQ OE1MSW	EA3BDE OK1CZ	G4BPJ RW6A	HB9APJ UR3KK	IK2JET
N7DZ	KK7VLU	W7VIX	KG6C	KJ5DC	N4QYO		
W5DT	W4USR	W7LXN					
W8OV	W3CT	K4IBZ	K8VBL	W1AAF	K4ARD	W0HM	KC0DX
7J1ATG	JK6UPC	JM4AOA	JH8ECQ	BH3OQQ	JN4BNV	JE6AJO	
7L2VPL	R0LN JH2HTQ JL1STV	JH1XUP HL1MIM JF3WGG	BH1ONB/5 DS4OMS JS2OVO	BD3OIT JS2OVO	JA4IJ JK1WCW	HL1MIM JA4IJ	JH8KWM N6RO
7N2XZB	HL1MIM(2) JA4MRL	BI4JCR(2) JK1PWT	BH1ONB YB1NWP	JF1LXO JA4IJ	JF3WGG JH1XUP	BH2XBV	BG2TFW

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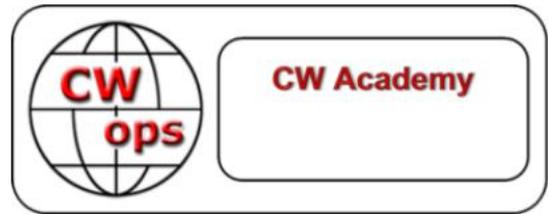
Giving Back Operating Schedule - 7 PM Local October - April: 40m & 80m May - September: 40m & 20m Frequencies: 7.035 - 7.039, 3.535 - 3.539, 14.035 - 14.039 MHz JA - 7.028 +/-												
UTC+10	UTC+9	UTC+7	UTC+3	UTC+2	UTC+1	UTC/BST	UTC-1	New York UTC-4	Chicago UTC-5	Denver UTC-6	Los Angeles UTC-7	Hawaii UTC-10
MON												
VK1CWO	JØ1DGE							W2XS	W8OV			
	JG1GBT											
TUE												
	JR1WYW	E25JRP		SV2BBK		GW2CWO		WE5P	K8UDH	K7NJ	W7ZDX	
	7N2XZB											
WED												
	7J1ATG							N8DD			N7DZ	
THURS												
	7N2XZB			SV2BBK				KV8Q		K7NJ		
	JG1BGT											
	JQ3FRX											
FRI												
	JK1QYL			SV2BBK		GW2CWO					K6RB	
						MØWDD						
SAT												
	JJ1FXF							W5DT				
	JM4AOA											
	JG1UQD											
SUN												
	JJ1FXF							W5DT				
	JM4AOA											
	7L1VPL											



CW Academy

[Bob Carter](#), WR7Q and [Roland Smith](#), K7OJL

My Take on Contesting



In continuation of my January article on helping new people get involved with CW, I am going to share a few things I have learned over my 20 years in using Morse Code.

First, you should know that I am a big DX'er. I have been a member and served in most all the Board positions many times in the Utah DX Association.



One of the reasons I learned CW is that I could be more effective at working DX entities. I will be discussing this in more detail for the May *Solid Copy* article.

I am not, however, a big contester. I often participated in the weekly CWT contests. Every year I do the 7th Area QSO party (7QP), and ARRL Field Day, which the ARRL says, is not a contest...even though it looks like a contest; sounds like a contest and smells like a contest...hi!!

My primary use of contests is to activate DX stations that I need. The reason this works so well is less competition to contend with, and they are generally easier to work than a DXpedition.

When I do contests for DX, I always do "Search-and-Pounce" (S&P). This means I am scrolling through a band looking for an entity that I need, and is loud enough for me to be able to work. The station generally stays on the same frequency. This allows me

TO RADIO:	WR7Q			
XX9D confirms				
DATE	UTC	BAND	2-WAY	RST
13-02-2019	14:07	80 m	CW	599

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to be able to ensure that I have their callsign and “exchange” correct, before I try to work them. You don’t have to worry about them “working split” (I’ll explain more about this next time). You can take all the time you need to get everything ‘correct’, before you send them your callsign.

You should already have pre-loaded your exchange into your contest logging software (i.e. N1MM+). And just like in POTA, this takes most of the fear out of the process.

You likely are only competing with a half dozen or so other stations so, I typically wait for the “big-boys” to get out of the way before I try to make the contact. These are the guys that are really loud or just trying to monopolize the frequency until they work him. This generally only takes a few minutes and is easier to complete the exchange.

When the other station you want calls “CQ” again, I simply send my callsign and listen for him to come back to me. Then all I have to do is hit F2 and my exchange goes out correctly. I wait for his acknowledgement; log the contact; and move to the next “entity” that I am looking for.

If you try this and follow the suggestions, you will be amazed how easy and comfortable you will get at working contests.

More to come in May...

Recap of the 2026 Jan/Feb semester Signup Statistics

Total Assigned	433	Total Advisors	56	Total Classes	69
Beg Assigned	159	Beg Advisors	28	Beg Classes	29
Fun Assigned	117	Fun Advisors	14	Fun Classes	17
Int Assigned	92	Int Advisors	10	Int Classes	16
Adv Assigned	65	Adv Advisors	4	Adv Classes	7

If you have any questions, suggestions, or comments please contact either Bob Carter WR7Q (kcgator@gmail.com) or Roland Smith K7OJL (rolandksmith@gmail.com)

73, Bob, WR7Q (CWops #1423)

CWA Co-Admin

CW Academy

Session Dates

January / February

May / June

September / October

Learning Levels

Beginner

Fundamental

Intermediate

Advanced



CWops Tests (CWTs)

[Rich Ferch](#), VE3KI

No report this month.

Enjoy the CWTs and keep those reported scores coming!

73, Rich VE3KI (CWops #783)

CWT Manager

2026 CWops Test (CWT) Schedule

Wednesdays at 1300 – 1400z and 1900 – 2000z. Thursdays at 0300 – 0400z and 0700 – 0800z.

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Week 1	1	4-5	4-5	1-2	7-8	3-4	1-2	5-6	2-3	1	4-5	2-3
Week 2	7-8	11-12	11-12	8-9	13-14	10-11	8-9	12-13	9-10	7-8	11-12	9-10
Week 3	14-15	18-19	18-19	15-16	20-21	17-18	15-16	19-20	16-17	14-15	18-19	16-17
Week 4	21-22	25-26	25-26	22-23	27-28	24-25	22-23	26-27	23-24	21-22	25-26	23-24
Week 5	28-29			29-30			29-30		30	28-29		30-31



CWops Member Awards

[Bill Gilliland, WØTG](#)



Monthly Update

During February, 20 additional members submitted logs, increasing the number of active participants in the awards program to 182.

The **ACA** QSO totals and rankings for the end of February 2026 have **KR2Q** in first place and leading second place **AA3B** by 121 QSOs. The top ten ACA totals this month are: **(1) KR2Q, (2) AA3B, (3) KY4GS, (4) K3WW, (5) N5RZ, (6) NA8V, (7) KO4VW, (8) WT9U, (9) N7US** and **(10) KG9X**. The separation between first place and tenth place is 458 QSOs.

The **ACMA** QSO totals and rankings for the end of February 2026 have **AA3B** in first place and leading second place **KR2Q** by 534 QSOs. The top ten ACMA totals this month are: **(1) AA3B, (2) KR2Q, (3) N5RZ, (4) K3WW, (5) KY4GS, (6) OM2VL, (7) KC7V, (8) NA8V, (9) KO4VW** and **(10) WT9U**. The separation between first place and tenth place is 1562 QSOs.

The **CMA** QSO totals and rankings for the end of February 2026 have **AA3B** in first place and leading second place **K3WW** by 3572 QSOs. The top ten CMA totals this month are: **(1) AA3B, (2) K3WW, (3) N5RZ, (4) KR2Q, (5) N5ZO, (6) DL6KVA, (7) NA8V, (8) F6HKA, (9) OM2VL** and **(10) VE3KI**. The separation between first place and tenth place is 7000 QSOs.

The number of participants who have contacted CWops members in 100 or more **DXCC** entities increased to **102** this month with the addition of **DL5XL**.

The number of participants who have accomplished CWops **WAS** remained at **291** this month.

You can see complete rankings for all award categories at <https://cwops.telegraphy.de/scores>.

CWops Award Tools Participation

At the end of 2025 we had 297 active participants in the Member Awards Program. As of March 1, 2026, we have 182 active participants. If you have not submitted any logs for the Awards Program, please submit them so we can include your scores among the participants.

The Top 100 and the Searchable and Sortable Scores Table show rankings and scores for active participants only. To be an active participant and be included in awards scoring including the ACA, ACMA and CMA competitions, you must have submitted a log during the current year.

To see rankings and scores for both active and inactive participants please use the Score Overview Table where inactive participants are listed with ACA and ACMA scores of zero, but their scores in other categories are listed at the highest level that was previously submitted.

You can see the final 2025 scores or final scores for any other year by going to the Score Overview Table and selecting the desired year from the "Final scores:" list at the top of the page.

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All scores categories on the page will then show the final scores and standings for the end of the selected year.

The Searchable and Sortable Table can graph your current year's ACA scores by date and allows you to compare your progression to that of others. Check the Plot button for the calls you wish to see plotted and they will all appear on the same graph.

The CWops Award Tools website main page provides a means of printing your CWT Participation Certificate. You may request a downloadable certificate by clicking the "CWT certificate download" selection at the top of the page. For more information about CWT Participation Awards, please go to <https://cwops.org/cwops-tests/>.

CWops Member Awards Program Overview

Several operating awards are available for contacting CWops members. These include **Annual Competition Award (ACA)** recognizing the total number of CWops members contacted during the current year, **Annual Cumulative Membership Award (ACMA)** counting QSOs with members on all bands (once per band) during the current year, **Cumulative Membership Award (CMA)** counting QSOs with members on all bands (once per band) since January 3, 2010, **CWops WAS** award for contacting members in all 50 states, **CWops DXCC** award for contacting members in countries on the ARRL DXCC list, **CWops WAE** award for contacting members in Europe, and **CWops WAZ** award for contacting members in each of the 40 CQ zones. All contacts must be via CW and between current CWops members. To qualify for these awards, you must submit your logs via the tool at the CWops Award Tools [website](#) . You can also print out your awards certificates at that same website.

A set of tools for managing your awards status is provided on the CWops Award Tools website and if you regularly upload your logs your awards will be automatically tracked for you. To view complete data for all currently active participants and see where you and others rank among active participants in the awards program, use the [online tools](#). For more details on the tools provided, see the [August 2021 Solid Copy](#) article.

Please Join Us!

Fabian, DJ5CW, who created the website and the tools, made it extremely easy to participate in the awards program.

If you are not among the CWops members who are currently participating, please join us! It adds a lot of friendly competition and fun to your operating.

More Information

View our website for more information on the [CWops Awards Program](#). Send your feedback, questions or comments to cwopscam@w0tg.com.

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Here are the Top 100 ACA, ACMA and CMA QSO totals as of March 1, 2026.

ACA

Rank	Call	ACA
1	KR2Q	1294
2	AA3B	1173
3	KY4GS	1071
4	K3WW	980
5	N5RZ	954
6	NA8V	903
7	KO4VW	865
8	WT9U	856
9	N7US	844
10	KG9X	836
11	OM2VL	830
12	KC7V	813
13	K7QA	790
14	W4CMG	784
15	N5TJ	746
16	K1AJ	691
17	F6HKA	678
18	K1VUT	632
19	W4WF	631
20	K3QP	628
21	NA4J	620
22	AA2IL	618
23	KC3M	604
24	NJ3K	602
25	EA6EJ	598
26	K6NR	585
26	K9WX	585
27	DL6KVA	575
28	KM4FO	567
29	KT5V	558
30	NE2V	557
31	KW1X	549
32	N2UU	547
32	WS7L	547
33	VE3TM	546
34	WØUO	544
35	WN7S	519
36	W5AL	513
37	VK2GR	510
38	N5XE	505
39	K3ZA	479
40	K1TR	475
41	WØVX	471

ACMA

Rank	Call	ACMA
1	AA3B	3511
2	KR2Q	2977
3	N5RZ	2648
4	K3WW	2647
5	KY4GS	2501
6	OM2VL	2194
7	KC7V	2080
8	NA8V	2055
9	KO4VW	1951
10	WT9U	1949
11	K7QA	1858
12	KG9X	1811
13	N7US	1801
14	W4CMG	1597
15	N5TJ	1466
16	K1AJ	1447
17	K1VUT	1318
18	F6HKA	1310
19	DL6KVA	1243
20	EA6EJ	1215
21	NA4J	1201
22	AA2IL	1150
23	KC3M	1133
24	N2UU	1130
25	WS7L	1112
26	W4WF	1109
27	WØUO	1070
28	N5XE	1069
29	K6NR	1068
30	K9WX	1046
31	WØVX	1027
32	KM4FO	997
33	W5AL	991
34	NJ3K	939
35	KW7Q	934
36	KW1X	933
37	NE2V	932
38	VE3TM	915
39	K3QP	909
40	KT5V	861
41	VK2GR	851
42	WN7S	847
43	W9CF	822

CMA

Rank	Call	CMA
1	AA3B	15384
2	K3WW	11812
3	N5RZ	10985
4	KR2Q	10935
5	N5ZO	10698
6	DL6KVA	10490
7	NA8V	10025
8	F6HKA	9455
9	OM2VL	8576
10	VE3KI	8384
11	KG9X	8226
12	KC7V	8175
13	K7QA	8167
14	N7US	8049
15	N5AW	7732
16	W9ILY	7646
17	WT9U	7532
18	KY4GS	7288
19	K1VUT	7229
20	WØVX	7173
21	K3JT	6991
22	N5TJ	6904
23	K9WX	6869
24	W4WF	6520
25	K6NR	6507
26	N1DC	6276
27	SM6CUK	6268
28	WT3K	6240
29	N2UU	6220
30	WN7S	6120
31	K4IU	6081
32	KO4VW	5970
33	9A1AA	5793
34	AA5JF	5783
35	VE3TM	5648
36	WØUO	5636
37	G4BUE	5566
38	NJ3K	5555
39	AC6ZM	5544
40	K1SM	5422
41	NA4J	5389
42	N5XE	5353
43	K1AJ	5336

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ACA

42	K4TZ	464
43	F5SGI	460
43	K3JT	460
44	KW7Q	450
45	VE3KI	444
46	W9CF	439
47	K1SM	426
48	VE9KK	421
49	SM6CUK	420
50	AA5JF	415
51	N5ZO	414
52	N5ER	404
53	KV8Q	395
54	N3CKI	394
55	VE3KIU	390
56	K9CW	387
57	K4IU	377
58	EA3NO	374
59	AF5J	373
60	K1RF	370
61	EA6BF	359
62	KB8GAE	354
63	NE5A	345
64	MØRYB	343
64	W2VM	343
64	W9ILY	343
65	WA4JUK	342
66	HB9ARF	341
66	KM4JEG	341
67	W6AYC	320
68	N2EIM	318
68	W2CDO	318
69	WØTG	317
70	KR3E	315
71	K4GM	309
72	W7LG	302
73	DM6EE	300
74	W8EWH	292
75	KKØU	286
76	WM4Q	285
77	KC3MAL	284
78	KE4CR	281
79	SP4JFR	278
80	PA2TA	276
81	WA5RML	269
82	GWØETF	265
83	LY2MM	259
84	AC3RA	250
85	DF7TV	248

ACMA

44	SM6CUK	815
45	K1TR	811
46	K3ZA	786
47	F5SGI	781
48	K3JT	767
49	EA6BF	757
50	K4TZ	752
51	N5ER	746
52	VE3KI	743
53	AA5JF	734
54	K9CW	730
55	AF5J	702
56	VE9KK	684
57	K4IU	678
58	K1RF	648
59	K1SM	636
60	N5ZO	632
61	WØTG	630
62	VE3KIU	623
63	KV8Q	620
64	MØRYB	617
65	G3NKC	608
66	N3CKI	587
67	WS1L	583
68	W9ILY	551
69	KM4JEG	529
70	PA2TA	523
71	EA3NO	522
72	K4GM	520
73	WM4Q	518
74	W2VM	513
75	KC3MAL	510
76	WA5RML	502
77	DM6EE	495
78	W8EWH	491
79	KB8GAE	466
80	W6AYC	462
81	KR3E	454
82	NE5A	452
83	LY2MM	447
84	WA4JUK	446
84	W2CDO	446
85	VE3MV	445
86	HB9ARF	441
87	G4IZZ	438
88	G4PVM	435
89	SP4JFR	434
90	W7LG	414
91	N5AW	410

CMA

44	AA2IL	5315
45	GWØETF	5288
46	WS7L	5000
47	F6JOE	4984
48	KT5V	4949
49	K3QP	4948
50	WA4JUK	4928
51	VK2GR	4921
52	DM6EE	4868
53	K4GM	4814
54	OK1RR	4790
55	EA6BF	4733
56	DF7TV	4703
57	W4CMG	4676
58	VE3MV	4614
59	KC4WQ	4571
60	DJ5CW	4560
61	OZ3SM	4545
62	KM4FO	4522
63	W6AYC	4432
64	F5SGI	4407
65	WØTG	4230
66	WS1L	4222
67	G4PVM	4187
68	KW7Q	4161
69	AF5J	4146
70	KØTC	4105
71	KV8Q	4081
72	NE2V	4075
73	W2CDO	4040
74	NE5A	4029
75	N1EN	4027
76	EA6EJ	4012
77	W3WHK	4004
78	KKØU	3985
79	MØRYB	3978
80	KR3E	3818
81	KC3M	3780
82	SMØHEV	3757
83	N3CKI	3752
84	K4TZ	3708
85	HB9ARF	3679
86	K3ZA	3606
87	KW1X	3484
88	K2YR	3410
89	4X6GP	3354
90	G3LDI	3342
91	W5AL	3263
92	G3NKC	3240

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ACA

86	F6JOE	243
86	G4IZZ	243
86	VE3MV	243
86	WS1L	243
87	K9CPO	240
88	KC9YL	239
89	KT4XN	238
90	KØTC	235
91	KC4WQ	228
92	G4PVM	225
93	G3LDI	212
93	N1DC	212
94	K2YR	211
95	KB4DE	209
96	KC8J	205
97	WB5N	204
98	G3NKC	203
99	AC6ZM	202
100	KQ4E	200
100	W3WHK	200

ACMA

92	KE4CR	407
93	F6JOE	406
94	KKØU	394
95	AC3RA	385
96	WJØC	360
97	SP7OGP	354
98	K9CPO	351
99	KC9YL	347
99	G3LDI	347
100	KØTC	344

CMA

93	W2VM	3219
94	W8OV	3211
95	W9CF	3193
96	IT9VDQ	3179
97	W7GF	3161
98	VE9KK	3076
99	KB8GAE	3073
100	KC8J	3072

73, Bill WØTG (CWops #1873)
CWops Operating Awards

XXT Schedule

SPEED	XST	DAY	TIME (UTC)	EXCHANGE	SPONSOR LINK
20 - 25	MST	Monday	1300 - 1400z	Name + QSO serial number	International CW Coun-
20 - 25	MST	Monday	1900 - 2000z	Name + QSO serial number	International CW Coun-
20 - 25	MST	Tuesday	0300 - 0400z	Name + QSO serial number	International CW Coun-
QRS	AWT	Wednesday	1145 - 1200z	RST + Name	A1Club
20+ wpm	AWT	Wednesday	1200 - 1300z	RST + Name	A1Club
25+ wpm	CWT	Wednesday	1300 - 1400z	Name + CWops # (or S/P/C)	CWops
25+ wpm	CWT	Wednesday	1900 - 2000z	Name + CWops # (or S/P/C)	CWops
25+ wpm	CWT	Thursday	0300 - 0400z	Name + CWops # (or S/P/C)	CWops
25+ wpm	CWT	Thursday	0700 - 0800z	Name + CWops # (or S/P/C)	CWops
< 20 wpm	SST	Friday	2000 - 2100z	Name + S/P/C	K1USN
< 20 wpm	SST	Monday	0000 - 0100z	Name + S/P/C	K1USN



QTX: Enjoying the Art of Conversational CW

[Dan Romanchik](#), KB6NU

Ragchew with an AI?

I was running short on time to submit this month's QTX column, so I thought I'd give the Claude AI chatbot a shot at it. At first, I told it, "Write a 500-word article on CW ragchewing in the style of Dan Romanchik, KB6NU. It came back with:

"I now have a solid feel for Dan's style — conversational, first-person, enthusiastic, practical, self-deprecating at times, uses specific callsigns and real-world anecdotes, speaks directly to the reader, avoids jargon without explanation, and champions CW with genuine passion. Let me write the article."

What it then produced was something that was decent, but a little too basic, I thought, for this newsletter. So, then I told it, "Focus in on how to start a ragchew CW contact." What it came back with was an article that advised one to call "CQ RAGCHEW" and on the first transmission, tell the other station about your rig and antenna. When I said that we normally don't do that, it said, "Fair point — I made that up, and I shouldn't have. Let me correct that." Then, it rewrote the article.

How to Start a Ragchew CW Contact

So you want to ragchew on CW, but you're not sure how to get the ball rolling. Trust me, this is the part that trips up a lot of otherwise capable operators. Your code is solid, your rig is warmed up, and yet — you just sit there, tuning back and forth, never quite pulling the trigger. I've been there. Here's how to get off the bench.

Find a Clear Frequency

First things first — pick a spot on the band that isn't already occupied. On 40 meters, ragchew territory is roughly 7.050 to 7.125 MHz. On 20, try between 14.025 and 14.060. Before you transmit anything, listen for at least a full minute. Then send "QRL?" and listen again. If the frequency is clear, it's yours.

Call CQ

Call a standard CQ at the speed you're comfortable copying. This is the part operators always get wrong. If you call at 25 wpm and someone comes back at 25 wpm, you'd better be ready to copy it. Send at 15 wpm and you'll attract 15 wpm operators. The band self-selects. Let it work in your favor. A typical call looks like this:

CQ CQ CQ DE KB6NU KB6NU KB6NU K

Three calls, three callsigns, K. Don't send a novel. If nobody answers after a couple of tries, move a few kHz and try again.

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Answering Someone Else's CQ

Plenty of ragchews start this way — you're tuning around, you hear someone calling CQ, and you answer. Send their callsign once, your callsign two or three times, then "K." Clean and simple. If the band sounds busy and you suspect there are other callers, send your callsign slowly and deliberately rather than faster. Clarity beats speed every time.

Your Opening Transmission

This is where a lot of people freeze. You've made contact — now what do you say? Keep it simple. Your name and QTH, an honest signal report, and then throw it back with a "BK" or "K." That's it. Two or three lines of text at most.

The rig, the antenna, the weather, the grandkids — all of that comes later, as the conversation finds its footing. You don't walk up to someone at a hamfest and immediately tell them your feed line loss figures. Same principle applies on the air.

The Move That Changes Everything

Before you hand it back, ask a question. It doesn't have to be deep — "HW IS WX UR WAY?" or "UR FIRST TIME ON 40?" is more than enough. A question signals to the other operator that you're genuinely interested in more than a rubber-stamp exchange. It's the difference between a QSO that wraps up in two minutes with a polite 73, and one that's still going strong half an hour later.

Most ragchews don't start with any special intent. They grow organically out of a normal contact where both operators happen to be in no particular hurry. Your job is simply to be the one who keeps the door open.

Do that consistently, and you'll have more ragchews than you know what to do with.

Overall, this article is really not too bad. I'd probably tell it to nix the questions about the weather and it being the other operators first time on 40 meters, or I'd just do that myself. I'd also delete the advice to change frequency after a number of tries.

All this AI work got me thinking that perhaps someone should put an AI ragchewer on the air. If you can't find a real ragchew, you could call this AI station and get it to ragchew with you. It might also be useful for ragchew training because newcomers needn't feel self-conscious about making mistakes. What do you think about that?

73, Dan KB6NU (CWops #1418)



AAØYY: Lots of Qs this month. One of my favorites was with a regular - no sked, just find each other - most mornings on 30m is KG5IEE Randal with probably the most Qs in my log this month. Honorable mentions are K6TTA Jeff, WB4IT Brian, K4MW Pete, - these last 3 like to give me QRQ

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practice and they are very well-fisted, shall we say. CU on the bands I hope. Everyone needs a confirmation from a rare MO Midwest state like me. I hope to be the first in the Bouvet log. HIHI!

AA3TZ: I'm enjoying getting back into rag chewing! Everybody seems to have had rough WX this winter.

ABØWW: Hard to find QTX during contests.

AE4GS: Not much ragchewing this month. Was traveling, with the eventual destination Orlando for Hamcation.

AJ1DM: More fun this month ragchewing with my friends!

DG5CW: Still too cold for longer chats during /P activities.

GWØETF: Most memorable MQTX was at the very end of my last Giving Back session on 40m running 90w to my vertical. When VK2BJ (#294) called at 599 I swapped the straight key for my paddle and had an enjoyable armchair QSO. The beauty of ham radio - expect the unexpected.!

K6DGW: February was a little slow on the radio, lots going on. March will be taxes with likely the same radio time. Still fun, tho.

K9OZ: I enjoyed a couple of rag chews with students in my Advanced class in CW Academy. It is very gratifying to be developing new ragchewers.

KE7IR: I just heard about QTX during my final class with my adviser, Joe KK5NA, last week. Had two short QSOs before March ended. The one with W5ZR in Louisiana was interesting as we both had two-element beams pointed at each other. Easy copy on 40 m.

KF9VV: Most were on 30-meters this month. Most interesting was an op that managed to make me laugh out loud several times.

KW4NJA: I had some nice ragchews this month, and feel a little more comfortable with longer conversations. Band conditions were great most of the month. I plan to continue to improve and increase my number of QTX and mQTX in March.

NØBM: Quiet Month but had a nice long chat with Shawn, W1SCW. First foray into WSPR this month. Unfortunately, antenna performed as expected. :->

N2DA: Nice CW ragchews with the usual gang (AJ1DM, WA3JJT, W4TG, WA3PYU. Also enjoyed three FB ragchew QSOs with Mark AAØYY.

N8AI: Talked to John, KO4MJC for 11 minutes who flew on the ISS once and did 2m FM amateur radio from there.

N9EEE: Nice QSO with Mary, VE3INE and Gary, AE4GS. Suke, JM7OLW had a nice signal into WI - my QRP sig was readable - so we had a mQTX. (His 7-el Yagi helped a bit).

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N9FZ: Lots of good ragchews this Feb. There's probably a few more because I've just gotten 30m hamstick and have had more ragchews driving to work. But its hard to log start and stop time for those.

VE3INE: Last month, I had a QTX QSO with an op activating POTA on a museum ship. This month, I broke 3 of my records: (1) For the first time, I used my weaker hand to key. (2) For the first time, I worked on the 60m band and I had QTX QSOs with 2 different ops on the same 60m frequency. (3) I had 2 QSOs which lasted 82 minutes and they were with a different op each time.

VE3WH: Take your time, trust your rhythm, and let the conversation unfold one dit at a time. Every QSO builds confidence. Your fist and your voice will grow stronger with each exchange.

W1SIM: Days of snowblowing the Blizzard of '26 cut into my CW time.

W8OV: During my QSO with K4ARD, I mentioned CW Academy. He immediately wanted to know more about it, and emailed me the next morning. I gave him some info and suggestions on getting started improving his CW, and he began that day, sending me a report on his practice work.

WB3EGD: In February I had 3 excellent ragchews with Dave WA2PAY. Our conversations ranged from recounting our experiences at the NYC FCC office in the 1970s taking license exams administered by Charlie Finkelman to our more recent experiences in CW Academy! In both cases, much hilarity ensued! Based upon our enjoyable ragchews, I've nominated WA2PAY for CWops membership. Please sponsor him if you are able. Thanks!

WE5J: It seems a bit easier than expected to go over 10-minute in QSOs but pushing past 20 minutes seems to be much more difficult! I just started attempting long form QSOs in December, I'm loving this!

WG9P: Last year I was invited to join a Sunday morning roundtable on 80 meters. It has been a fun experience and has really helped me get my cw skills sharpened. All week I look forward to this 2-3 hours of fast paced CW and comradery with my CW buddies. If you are ever invited to a roundtable, don't pass up the opportunity for some good CW fun.



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QTX - February 2026

Call	QTX								
VE3INE	113	VE3WH	24	KG5IEE	14	ABØWW	4	DG5CW	1
AAØYY	76	KY4GS	22	KN5EE	13	K8WWS	4	GWØETF	1
N7HCN	64	WA4IAR	22	AJ1DM	12	KW4NJA	4	KM4JEG	1
WG9P	55	KCØVKN	21	W1SIM	12	N9EEE	4	NØBM	1
N8AI	35	WS1L	21	AA3TZ	10	K8UDH	3	N5LB	1
K9OZ	32	G4KKU	18	AE4GS	7	N9FZ	3	SV2BBK	1
KB6NU	25	KR2Q	16	K6DGW	5	WB3EGD	3		
KF9VV	24	N2DA	15	W8OV	5	WE5J	2		

mQTX - February 2026

Call	mQTX								
KY4GS	48	GWØETF	17	VE3INE	7	AJ1DM	4	W8OV	2
AAØYY	44	WA4IAR	14	KW4NJA	6	N9EEE	4	W1SIM	1
KCØVKN	35	KF9VV	13	ABØWW	5	DG5CW	3	N9EEE	1
N8AI	31	WE5J	11	KG5IEE	5	KM4JEG	3	PE2V	1
G4KKU	26	SV2BBK	10	N7HCN	5	NØBM	3	KM4JEG	1
KR2Q	24	WG9P	10	VE3WH	5	K8UDH	2		
WS1L	22	N9FZ	9	AA3TZ	4	K8WWS	2		
KB6NU	20	K6DGW	7	AE4GS	4	KE7IR	2		

QTX - Total 2026

Call	QTX	Call	QTX	Call	QTX	Call	QTX	Call	QTX
VE3INE	180	WA4IAR	59	AJ1DM	25	W8OV	9	NØBM	2
AAØYY	132	KCØVKN	58	W1SIM	23	ABØWW	7	W3WHK	2
N7HCN	116	WS1L	58	KN5EE	21	K8UDH	7	WE5J	2
WG9P	86	KB6NU	47	AE4GS	18	KW4NJA	6	DG5CW	1
VE3WH	80	KR2Q	45	G4KKU	18	N9EEE	6	KM4JEG	1
N8AI	71	KF9VV	40	K2MZ	16	K6DGW	5	N5LB	1
KY4GS	66	N2DA	33	AA3TZ	10	K8WWS	4	SV2BBK	1
K9OZ	59	KG5IEE	28	N9FZ	9	WB3EGD	3		

mQTX - Total 2026

Call	mQTX	Call	mQTX	Call	mQTX	Call	mQTX	Call	mQTX
KY4GS	118	VE3WH	31	N9FZ	15	AJ1DM	7	DG5CW	3
AAØYY	82	WA4IAR	28	WE5J	11	K6DGW	7	K8WWS	2
KCØVKN	82	G4KKU	25	KW4NJA	10	W8OV	5	KE7IR	2
WS1L	66	GWØETF	23	SV2BBK	10	N9EEE	5	W1SIM	1
N8AI	64	KG5IEE	22	K2MZ	9	NØBM	5	PE2V	1
KR2Q	59	KB4DE	22	AE4GS	8	AA3TZ	4		
KB6NU	40	VE3INE	17	ABØWW	8	KM4JEG	4		
KF9VV	33	WG9P	15	N7HCN	7	K8UDH	3		



My Story: New Member Introductions

Compiled by [Tim Gennett, K9WX](#) (CWops #1462)

Joe Jennings, KEØM CWops #3864

I am originally from and currently reside in Denver, Colorado. I was first licensed in 2007 (KCØZQR) after taking a Technician course with my father as part of a community-led emergency preparedness effort. I quickly became interested in HF and taught myself Morse code using the G4FON Koch trainer. After reaching 20 wpm proficiency within a few months, I was actively operating CW (a combination of DXing, contesting and the occasional ragchew) and eventually earned my amateur Extra and the vanity call KEØM.

After 2010, my CW operating was more sporadic, though I was fortunate to operate from W6YX while a graduate student at Stanford. Since 2023, my activity has picked up significantly, and at my current QTH I am on the bands every day.

My educational background is in geophysics (seismic imaging), and I currently work in applied deep learning research. Within amateur radio, my interests include radio and antenna modeling, homebrewing, and radio-wave propagation. Outside of amateur radio, I enjoy traveling with my wife and gluten-free cooking. I also value teaching and education and look forward to contributing to CWops.

Many thanks to Dave W8OV for his nomination and generous time spent answering my questions. A special thanks as well to my sponsors Hank W6SX, Jim WT9U, and Kevin NB7O. I look forward to working fellow CWops in future CWTs and ragchews.



Gianni Pellitteri, IT9ORA CWops #3870

I am Gianni (short name of Giovanni) IT9ORA, I was born in 1959, in Bagheria, a little town with about 60,000 inhabitants, near Palermo only 13 Km.

I am retired now, I was an accountant in a Big Fish Company and in 2021 I got my pension.

Ham since 1991, after my license my first “love” was the CW, telegraphy was immediately music to my ears, I have in my log about 200,000 QSOs and 80% are in CW, but I am QRV also in all mode SSB, FT8/FT4, PSK31-64-128, Hell, AMTOR, RTTY, I like all modes about communication radio.

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Contests are part of my activity, but all day I do regular QSOs with my friends on telegraphy, my setup are ICOM IC 7300, Kenwood TS 940 SAT, ICOM IC 705 (QRP) Kenwood TS 711 E (VHF) and I use only a Long Wire Antenna 16,20 m, before I had a 3 Element ECO 10/15/20 Meters and dipole but all my QSOs are with 100 watts, I don't use power.

I am member in CWops (just now), HSC, Club Radiotelegraphy Italy, Marconi Club Loano, in this moment I am President ARI Sez. Termini Imerese.

I hope to see you on the air soon.



John Belstner, W9EN CWops #3869

Thank you to Gregg WJ8Y for my initial nomination along with Mark AAØYY, Bud AA3B and Tom KV8Q for your sponsorship. I am honored to be a member!

I credit my Dad W9VSC for getting me hooked at age 14 to a hobby that would guide my career as an electrical engineer and give me the opportunity to spend so much money on rigs



and towers and antennas and cables and keys and tuners and power supplies and ... (HIHI)

As a Novice, I found CW a bit daunting as very few folks were willing to slow down to 5 wpm. However, it didn't take long to get comfortable with 13 wpm and at the time I got my Extra, 20 wpm was still the requirement. It took all the concentration I could muster to get my 1 minute perfect copy. Because I learned CW the wrong way, I was never able to get past the 20 wpm barrier. Operating CW wasn't fun anymore and as a result, I set it aside for many years.

Thanks to CWops and the great resources provided by the CW Academy, I've relearned to copy CW the right way. Unfortunately, my work schedule always seemed to conflict with participating in one of the live CW Academy classes. But the CWops online student resources allowed me to study and practice on my schedule. Those resources are invaluable! Now, CW is fun again! I would love the opportunity to give back and share what I've learned with someone learning CW for the first time, that way they can enjoy it rather than dread it.

As far as operating, I have always enjoyed ARRL Field Day, dabbling with the occasional contest, and (of course) rag-chewing. I've also been bitten by the POTA bug. My POTA involvement to date

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has been strictly as a hunter, but I'm anxious to try being the hunted this summer with my recently completed CFT1 and QMX kits. POTA seems like the perfect way to mix in my other hobby of mountain biking.

Patti Donahue, KE7IR CWops #3873

I am so honored to have been nominated and sponsored for membership in CWops. My journey with CW has been interesting and supported by many of my Ham friends.

I was first licensed in 1976. That means, I had to learn Morse code. I practiced with my brother in the living room of my apartment with each of us holding an oscillator in our laps, sending characters until we could pass a 5 wpm test and obtain a Novice license. Not too long after that I was able to copy well enough and studied theory enough to obtain a General class license.

In July of 1976 I moved to Arizona following the love of my life, Tom (W7PD). All the changes in my life delayed my amateur radio growth a bit, but, in 1978 I was able to test and obtain an Advanced class license. And, there I stayed for 45 years. I was busy with 3 sons (all 3 are hams now) and a career. I was the copilot in the radio room; Tom was the pilot. I never turned a knob, tuned up, or did anything but sit down and talk with friends.



In Feb 2022, Tom became a Silent Key. The radio room went dark.

In October of 2022, I returned to my Arizona home from my island home in Ontario, Canada, and found my eldest son (the new W7PD) had worked over the summer to begin streamlining the radio room with easier to manage equipment so that we could have the grandchildren talk with Santa. This was a tradition that Tom started, and Tommy insisted we must continue.

That was the beginning. Ever so slowly, I started learning how to "turn the knobs." Gradually my too quiet home began to come to life again. In December of 2023, I obtained my Extra class license. How different to study online and pass the test via Zoom.

I felt a little like I cheated by not ever passing the 20 wpm code test that would have been required if I had not taken a 45 year hiatus. My friend, Gill Gray, N2GG (CWops# 2705) suggested I register for CW Academy. I did not listen right away, but the thought stayed in my mind. In January 2025, I studied in a Beginner class advised by Bill Leahy (KØMP CWops# 1736). I had forgotten nearly everything, which turned out to be a good thing because I had also forgotten all my bad habits. Thanks to Bill's guidance I was able to successfully attend an Intermediate class in the May/June semester. Presently, I am nearly finished with Advanced class.

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I enjoy participating in SSTs, MSTs and CWTs. Improving head copy is my current passion.

Besides amateur radio, I volunteer at my grandkids' elementary schools and enjoy helping kids with reading. I also get to grade a LOT of 5th grade homework.

I love to read. I enjoy knitting and gardening. During the summer I enjoy swimming, boating, and fishing, living off grid and connecting more closely with nature. I usually have some grandkids with me and it is a delight to see them being "old fashioned" kids, with electronic devices left aside for frog catching and kick ball.

Thanks for the nice welcome to CWops.

Jean Consortim, AD2EK CWops #3878

Thank you for the nomination and sponsorship for CWops. It happened sooner than I thought and I'm grateful for the vote of confidence.

My ham journey started in 2023 when a friend from my community makerspace days, AC2OK emailed a flyer to me from the YLRL hosting online classes for the Technician's license. It was my gateway into ham radio. I passed both Tech and General after that class. I had crammed for the General and intended to go back and study the materials for the General more carefully but then got matched up with another YL who was looking for a study partner for the Extra. Eventually, I hosted a study group with my friend AC2OK being our instructor and ultimately passed the Extra in September 2023.



From there, I've been exploring different aspects of amateur radio like kit building, fox hunting, POTA, radio scouting and eventually CW. As a kid, I had always wanted to learn it and now here was the opportunity. It's been a slow road for me. I have so many competing hobbies (knitting, sashiko, hiking, reading), interests (languages, food, history) and obligations (family, friends, volunteer work).

Professionally, I used to be an instructional designer/program coordinator in makerspace education where I would work with subject matter experts to create workshops for teachers or for children involving electronics and art materials, or how to use a desktop vinyl cutter and sewing or entry level programming. It was a great opportunity and allowed me to dabble and go down a lot of rabbit holes, especially with electronics and technology.

When COVID lockdown happened, I ended up shifting to merit badge counseling for the Scouting program on Zoom. Eventually with this Zoom account, I started hosting CW practice sessions

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with classmates I've met along the way.

Now I parlay the old work skills with one of my radio clubs and help brainstorm and facilitate workshops and volunteer for M.O.R.E project which is a Technician licensing program that also handles testing with GLAARG. I also volunteer as a VE both in-person for ARRL and online with GLAARG.

My husband, Jason and two children (one finishing college ; one starting college) are not hams. I'm working on my husband though and he is now ham curious. Jason and I like traveling, seeing historic sites, and learning Italian together.

I love the community here and CW. Thank you for having me and looking forward to being an active part of the CWops community.

David Andersen, KØRX CWops # 3877

I grew up in Ames, IA and learned about ham radio when a couple of friends and their dad took a class and passed their Novice exams. After watching them make a few QSOs, I was hooked and received my ticket and callsign WNØNCT. My first radio was a Heathkit HW-16 with three crystals. I participated with the Story County, Iowa club's Feld Day, my first exposure to someone who knew how to run stations. During this time, I made the journey to the Federal Building in Des Moines and upgraded my ticket to Advanced and my callsign to WBØNCT.



I went to Iowa State and got an EE degree. There was a bit of hamming, but most of my time and energy were spent learning my new trade. I did a co-op internship at (then) Rockwell-Collins in Cedar Rapids during this period, which convinced me that I was truly interested in an academic career. I was accepted into the Purdue graduate school in EE and headed that way during the summer of 1981.

The day I moved in to married student housing at Purdue, I was carrying a 2m antenna from my moving truck to our apartment, and the neighbor upstairs stuck his head out the window and introduced himself as Ted, N9NB. He was a junior in EE at the time and invited me to come to a Purdue Amateur Radio Club (W9YB) meeting.

The first meeting I attended featured Norm, N9MM showing slides and speaking about his recent DXpedition to Palmyra Island/Kingman Reef. There was a photo of a tribander up on Kingman that really grabbed my imagination. Another significant thing that happened to me in my early days at W9YB was watching N9NB and Tom, N9NC (member of CWops) do the ARRL SS CW contest that November. I decided that my CW skills definitely needed improvement, and I practiced

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on and off the air for about the next eight months. I made the trip up to the Federal Building in Chicago and passed my Amateur Extra ticket. I received the callsign KK9W.

After that, there was lots of operating both at W9YB and home. I made a trip one year to VE4UM for SS CW and was invited to participate in a few contests at the W9ZRX/N9MM (now W9PA/N9MM) superstation – this was the first really big station that I had ever seen.

Eventually, I completed my Ph.D. in EE and took a job as an assistant professor at the University of Iowa. After a while, the ham radio bug bit again, and I put up an 80 ft tower with a C4XL and some wires and did lots of contesting and DXing at home. I also started CW contesting at the N0NI multi-op superstation. We had lots of fun and managed to work quite a few stations. I continued to operate until 2002, when family and work responsibilities became more significant and I dropped out of the ham radio scene for about 21 years.

In 2023, I retired from Iowa at the rank of full professor. Retirement rekindled my interest in ham radio, and I began putting together a station. To say that there have been lots of changes to the hobby during my two-decade absence is definitely an understatement!

The HF bug bit again and ultimately led to the CWTs and CWops club. I love the CWT short format, and there are enough players that it is fun even with a low wire antenna for my station. I'm not sure where my ham radio adventure will take me next, but there is always something exciting happening on the horizon!

Jonathan "Bear" Bear KN4CW, CWops #3879

There should be a Q-code that means "(I have.../do you have...?) the desire and will to be an amateur radio telegrapher." I suggest "QCW." (Yes, the QCx series belongs to aeronautics, but so does QLx, and we use QLF! Besides, "QCW" is apparently either unassigned or extremely rare). I got infected with QCW at age 12, but I failed to overcome the internal obstacles to learning the code until I had reached 60 years of age. Prior to that, I went through repeated cycles of attempting to learn it and then giving up, usually during periods of transition. I think my wife believed that CW was a strange reaction that I had to stress! But one of the benefits of aging is learning to see oneself clearly, and I eventually understood that, with regard to skills based learning, it was only my lack of diligence that was holding me back. Shortly after my 60th birthday, I bolstered my QCW with resolve and determination and was finally able to break through the initial plateaus and get the confidence to get on the air. Since then, there has been no turning back.



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I love to learn and I love languages, and one of the most rewarding aspects of studying CW is getting to watch my own brain go through the learning process. It's fascinating!

I am blessed to live in rural North Florida. I am a semi-retired physician, having spent most of my career as a civil servant working for two states and Uncle Sam. In the past I have travelled to Israel and Japan, and I hope to return to both those places one day. Lately, besides amateur radio, I spend a lot of time drawing and painting and writing a Dictionary of "拼意" (semantic transcription of English into Chinese characters).

The poet Mitsuo Aida wrote, "Everything we know, everything we do, and everything we have made in our world, exists because of others." I cannot list all those to whom I am in debt, but mention must be made of my YF Elizabeth; my instructors Roland AE6VL, Jeff K6TTA, Chris KF7WX, Joe KK5NA, Chris NW6V, & Bob WO6W; all my learning buddies and classmates especially Doug KI4VDU; my official CWops sponsors Bruce K8UDH, Patti KE7IR, Jim KE8EON, Joe KK5NA, & Kevin N7KV; and my "unofficial sponsors" Jean AD2EK, Paul DM7TW, Chris KF7WX & Sally WQ5T. Being invited to join the ranks of those who have taught me, and whose skills far exceed my own, is a great honor. I view this honor rather like a first-degree black belt in CW - not as a mark of mastery, but as a recognition that my effort and commitment have earned me a place amongst the serious students. With the help of CWops and CW operators everywhere, I look forward to lots more CW learning fun in the coming years. QCW!

Jeff Gary, K4KYN CWops #3883

Jeff Gary, K4KYN, recently got back into our wonderful hobby after many years of being QRT. But once I returned to the airwaves after the break, I have been very active and wonders why it took me so long!

Last year, I celebrated 50 years of being licensed as an amateur radio operator. Originally holding the call sign WA4ZJW, I learned CW from my late father, Nick. Nick had been a CW operator in the U.S. Army in the late 1950s.

When I became active again in 2021, I applied for (and was granted) a vanity license by the FCC to have my dad's old call sign: K4KYN.

In December, I retired after 40 years in the public relations/corporate communications field. Most recently, I managed a group of 75 communications professionals (including writers, editors, and graphic designers, among others). Before that, I spent 15 years of my career working in higher education public relations. Early in my career, I worked in the newspaper industry as an editor and reporter.



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Outside of work and ham radio, my other interests are travel, photography, writing, and sports (specifically baseball). Last fall, I completed a quest of seeing a Major League Baseball Park in each of the current 30 parks (a quest I dubbed "The Worked All Ballparks" Award).

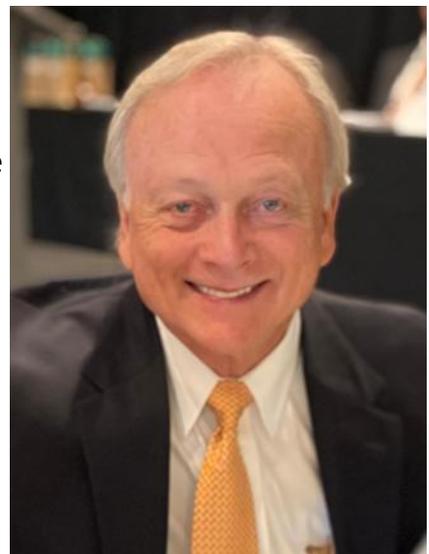
In April, my wife, Lisa and I will celebrate their 40 year anniversary. We have two adult children, Holly and Paul, and two ham shack kitties, Scottie and Kells.

I am very happy to join CW Ops and am humbled and honored by the nomination and sponsorships.

Joey "Joe" Ferguson, W4JF CWops #3882

Born in 1955 in Johnson City, TN. I grew-up in the country where I helped a good friend milk his dad's tremendous herd of Holstein Friesians each day...twice. After lunch one day, he showed me his radio because I asked about his antenna. He had an old Lafayette 11 meter radio, and I was fascinated at how well it worked and the places he was able to talk with less than 5 watts on AM. That hooked me on the magic of radio.

After a short stint on 11 meters, and with my mother's encouragement, I pursued ham radio. Early in my college freshman year, I joined an evening Novice class at night at the university. I assembled an old code oscillator from Radio Shack and bought a cheap straight key. For practice I would send all the letters I had learned up to that point in my weekly Novice classes to an old cassette recorder. Then I would play it back and see if I could copy the random letters. There was no way I could afford a real receiver back then.



I was first licensed in 1974 as a Novice during that freshman year in college with the call WN4NNL. Even before my Novice ticket arrived in the mail, I passed my 13 wpm code exam and the General written test in front of an FCC examiner in an acoustically horrible theater-like room in Asheville, NC. While I waited on my Novice ticket to arrive, which took 8 weeks, I would go to the East Tenn State University ham station, between classes no less, and work CW using the club call of WA4UCI. There was "usually" someone there to act as control operator.

Sandra and I married after my sophomore year and moved to Knoxville for me to finish school at UT. While there, I passed my Advanced class license, again in front of the FCC examiner, and was a member-operator of the club station in the engineering building, W4EAL. My CW sessions really use to play havoc with the EE's lab equipment on the 3rd floor, all of which were very close to the tower and the TH7DXX just above the roof line of the building.

After graduation, I started my career in forest resource management working on the industrial

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side of the profession. I passed my Extra code and written exam in front of an FCC examiner at the Virginia Beach hamfest in 1979. I was issued KF4R by the FCC and kept that for years. But in 1996, the FCC allowed Extra-class-only licensees to apply for a vanity call. I was fortunate to get my first choice, a 1x2 with my initials starting with a W.

Sandra and I have been married 51 years, two boys in their mid-forties, and 9 grands. I worked as an industrial forester for 45 years. During that time, we lived in tidewater Virginia, North Carolina, and South Carolina. I mostly performed wood procurement and land management activities for large paper mill and sawmill employers. The last 16 or so years of my career was managing large-scale investment-grade timberlands for institutional investors. At age 67, I retired in early 2023, moving later in the year from Pawleys Island to Rock Hill, SC to get closer to family.

I have taught CW classes on a few occasions over the years. I found that to be quite enjoyable and a real blessing to work with new hams that yearn for CW proficiency. Both my sons learned CW from those classes and my oldest passed 20 wpm at a Shelby, NC hamfest licensing session years ago.

My CW work on the bands today is largely handling formal written traffic in the National Traffic System. I am a net control station at the section and region level and a region liaison to the Eastern Area Net twice weekly. I fill-in for Trans-Continental Corp slots when needed. I am also a member of the ARRL, the Straight Key Century Club as a Senator, FISTS, QCWA, and a few other ham-related groups. I do like to chew the rag on CW when I hear someone calling CQ. Keyer or bug, it doesn't matter to me. But I could never wrap my brain around my cootie key! One of my sponsors, Glenn VE1AQF, has absolutely the best bug-hand I have ever copied.

Years ago, I worked over 100 countries on 160 meters, most of them with less than 100 watts. I used my 50' Rohn tower (75' with antennas) back then fed as a folded unipole against a nice field of radials. It worked pretty darn good. I've never been much of a certificate chaser during my 51 years as a ham, but I will work the DX if I haven't worked that part of the world before. The sheer joy of operating and helping other hams satisfies most of my ambitions in this hobby.

All my CW sending hardware (paddles and straight keys) are Begali. I also have the Begali Intrepid "bug" that I use during SKCC events. Rigs are Icom and Elecraft. Amp is Acom A2100 running strong with a 60-year-old 4CX1000A grid-driven tetrode. All antennas and feedpoint RF chokes are home brew of various designs. I also have a home brew triode amp running a 3cx1200Z7 at 4KV I built in the early 90's from scratch. I enjoy building and fixing radio-related "bits and pieces" and helping others with their antenna projects, especially those not able to physically do it themselves.

I use to ride motorcycles but decided enuf is enuf and sold my BMW R1200RT recently. Way too many distracted drivers these days. I enjoy shooting sports including black powder and archery equipment. Sandra and I enjoy being able to attend various sporting events that involve our grandchildren. We bought a new Brinkley i275 camper last year, so we are planning to do some "glamping" in the spring, summer, and fall seasons. I may put together some kind of portable set-up to use when camping.

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I am honored to become part of the CWops family. I wish to thank my sponsors (Jose, KP3W, John, K4BAI, Bud, AA3B, and Glenn, VE1AQF) for their awesome support.

May God richly bless each and every one of you and your families, and I look forward to meeting you on the air!

Davy Nauleau, F4GBY CWops #3875

I am 50 years old and I have been a radio amateur since 2009. I first operated under the callsign FØGBY, then F4GBY, and I am also active as CN2GBY.

In my early years, I mainly operated SSB and digital modes. At that time, the CW exam no longer existed in France, which did not particularly encourage me to learn Morse code. And yet, CW had fascinated me since early childhood. If I became a radio amateur, it was above all to operate CW.

Facing this demanding learning process alone, without a clear method, I tried several times to get started... only to give up.

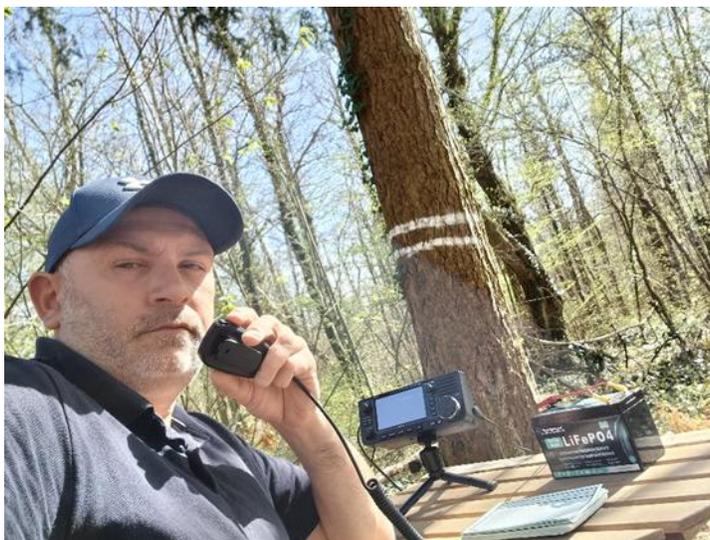
A decisive turning point came in 2025, when I became president of the Versailles radio club (F6KFV). Among the members, F5PNP, Pascal, never stopped encouraging me to take the plunge. Thanks to his support, I finally got serious about it. I resumed my learning in a structured way: alphabet, numbers, punctuation... step by step. Once the basics were solidly in place, I completed my first QSOs on VHF and then on HF. At that moment, I realized something was truly changing.

Shortly afterward, I met F4JEP, David, who was also just starting out in CW. We were at the same level and decided to progress together. This mutual support proved decisive. It was he who told me about the CWops courses. We enrolled together and followed the fundamental program side by side.

These courses are remarkably well designed and progressive. Through consistent practice and with the guidance of our instructors, MØWDD David and KQ4JKO Daynah, I gradually became more comfortable. Today, I can send and copy at 27 wpm.

The next step came naturally: joining CWops. I had the pleasure of becoming a member, number 3875, supported by my sponsors and mentors, whom I notably met during CWops activities.

Since CW became part of my daily operating, it now represents about 95% of my on-air activity. I



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participated in the French Cup with nearly 350 QSOs, and I also take part in CWops activity days whenever my schedule allows.

However, my true passion lies in portable operation, especially POTA. In fact, this was one of the main reasons I wanted to master CW: for me, the ultimate pleasure is setting up a station in the great outdoors, operating QRP, and letting a few watts travel across the bands at the rhythm of the key. With the arrival of warmer days, a new season of activations is beginning.

If this testimony can encourage those who are still hesitating to start learning CW, then it will have achieved its goal: it is never too late to begin, and mutual support makes all the difference.

I look forward to meeting you on the HF bands in CW.



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