



October 2022

Editor: Kevan Nason, N4XL

Thank you to our group leadership:

President – Ed, K3DNE Web Master – Frank, KG4IGC

Vice President - Dave, WN4AFP SFCG Webpage: swampfoxcontestgroup.com

Treasurer – Phil, NI7R Secretary – Kevan, N4XL

The Presidents Corner

Please welcome Van Herridge N4VGE to the Swamp Fox Contest Group! Van holds an Extra Class license and lives in Charleston. Van was active in contesting in the early 80's from his QTH on the Eastern Shore of MD – his 3-acre antenna farm at that time included 2 rhombics and several yagis. He dropped out of the hobby when he moved to SC in 1984 and re-licensed in 2016. He's been very active in POTA and "enjoys running pileups" and activated 400 unique POTA locations! Van and his XYL travel extensively by motorhome (his station; Flex 6700 and FT891 is in the motorhome with a roof mounted Hustler 6BTV antenna that folds down) and they are now planning a 20K mile motorhome trip to AK (do I see a state QSO party DXpedition in the future?) as well as a DXpedition to the Vanuatu Islands for the 2024 CQWW DX Phone Contest! Please visit Van's QRZ.com bio page for more interesting info.

Van: Welcome to the Swamp Fox Contest Group!

Ed, K3DNE

<u>Farewell</u>

Scott, N2OG, has produced great newsletters filled with interesting content for the past several months. It's been enjoyable reading. He had willingly stepped up and carried the load while I recharged my editorial batteries. Scott and I had discussed that after a break I would be willing to take over again. After approaching him a few weeks back, and after making it clear he was doing an excellent job and I was happy to stay sidelined, he said his schedule would benefit if we swapped the relay baton.

Thank you, Scott, for your hard work and dedication. Your readiness to support our group is an example to all members as to what it takes to keep an organization healthy and fresh.

Returning with renewed interest, and considerably more energy, I decided to modernize the format of the newsletter. As always, improvement suggestions are very welcome. This newsletter is for you and should include things you want to see. Scott had looked outside the normal contesting sources for some of his inspiration and we should too. To prevent our newsletter from becoming too slanted towards my personal interests (and therefore being instantly routed to the trash bin) it is essential members contribute items to our publication. Shoot me an email about anything. Preferably you would jot down a few lines, but if you are not comfortable doing your own writing a link or idea to look at will be welcome. I just ask that should you not write things yourself you not be upset if the published result does not meet your expectations.

Contest Tips:

From the Florida Contest Group, Contesting Do's & Don'ts Rev. June 2021

Dos before the Contest

- Plan ahead for the contest
- Do all necessary antenna work far in advance
- Know your contest strategy in advance
- Know your category SO, SO Assisted, Multi-single, Multi-two, Multi-multi
- Select your power level. Consider if the contest rules allow for a power multiplier when making your decision of QRP, LP, or HP.

Dos during the Contest

- Start on time
- Send your full call when calling another station...no partial calls
- Be Quick!!!! Avoid time-wasting words, comments or conversations
- When running gets slow, turn the key speed down. If on phone get the "friendly voice" out.
- Don't be a packet rat. Listen for the guy's call; don't just log him from the cluster. It will save you from a busted Q or taking 10 minutes to work a dupe.

After the Contest

- Save and backup your log file to another computer or flash drive
- Turn off your rig and disconnect antennas
- Resolve any notes that were recorded during the contest
- Create your Cabrillo file and review for correctness
- Write a Soapbox if you are so inclined

EI8IC Contesting Tips

Want a really good station grounding system? Go to your local hardware store and buy a 12-14 inch width roll of aluminum -- the type used to put around chimneys, or used in roofing. Now ground everything by mounting on the almunium (using it as a ground plane) or grounding to it. If your desk is made out of wood, you may use a lot of self-tapping screws, but the grounding will go easily and quickly. Ground everything to eliminate hum and interstation interference.

Keep several different pairs of headphones, to relieve pressure on the ears.

To rotate or not to rotate?

The big contesters know how much time can be wasted waiting for the beam to swing around, so they generally have fixed antennas on all of the main ham areas, and use the rotating beam for multiplier catching. If they can cover the areas where most of there signals will come from, and be able to switch between them quickly, they are happy. From the budget contester's point of view, this idea is something to stick with too. Have you seen the price of rotators lately? The ones that can handle those big beams are pretty pricey, so doing without is worthwhile. A lot of contests are based on specific areas of the world, so if you've got your antenna pointing that way, and its beam-width is not too narrow, you'll be as good as the next guy and won't waste beam-turning time either.

From the Reflector:

(It's been great to have so much chatter on the Reflector. That's the sign of a healthy Contest group. Especially good to have so much participation from the newer members. Thank you – Editor)

- Chatter is strong as the SFCG membership is seeing the bands open up as the sunspot numbers and flux responds to the uptick in the 11 year cycle. Don't forget to consider this when making your contest plans. Your normal way of doing business these last few years might not serve you well these days.
- Brian, N8WRL, heard a 10 to 20 KHz wide motorboat sound low on 40 meters. Dave, AFP, heard it
 too. Not sure what it was, but it isn't unusual for foreign radars to sound that way. Just another type
 of QRM to contend with. Murphy loves to bring that kind of thing to the party.
- KY4ID has been tearing up the CW bands and becoming quite the runner. Keep it up! Looking for our other members learning CW to join him soon.
- We're sad to learn Dave, NJ4F, found a major problem after the hurricane came through. His crank
 up tower cable broke letting it come crashing down. It destroyed his SteppIR and looked like another
 antenna too. He suspects the tower might have suffered structural damage on impacting the
 bottom stops. Insurance will evaluate. Dave's a smart cookie though. He took insurance out just
 days before. Smart move.
- Also remember reading Ted, K7OM, and Scott, N2OG, had issues. (Sorry if I skipped over others.)
- Several people are checking into our Thursday night weekly gatherings on 80 meters. Now that it is getting darker earlier starting time is being reconsidered. Give Ed, K3DNE, a shout if you have preferences about that.
- Not our reflector, but Dave, WN4AFP, is sharing that he is closing in on his goal of reaching 100 q's
 during a single CWT. He shared this secret with them "One slight adjustment that I made was to
 move the CW 'weight' setting from 56 down to 50 in N1MM. i like the higher side, but for higher
 speeds, sliding it down helps copying. I quit running too early in the game this morning. Dave afp"
- Dave, WN4AFP, made it into the April SSB Sprint Top 10! Great job!

- Bob, AC4MC, had some N1MM problems during the CAQP. I know the feeling, Bob. It's a complicated program.
- Van, N4VGE, spoke up and offered to fetch and carry in the CQWW SSB contest. Volunteering right off the bat like that is admirable. We rarely have multi efforts in our group. Although if we've someone willing to help maybe that will change?
- Dave, WN4AFP, reported his school teacher daughter was caught up in the recent spate of nationwide false active shooter in school reports that have been going on. Didn't seem to distract him too much in his weekend or Wednesday CWT activity though. He's raging on.
- Burton, KY4ID, and Ed, K3DNE, responded in response to AFP's question about 6 meter frequencies. Check out the thread on our reflector starting with post #21622.
- Scott, N2OG, monitors the SCHAMSWAP reflector and is trying to snag a free 100 ft Rohn 25 tower up in North Carolina. Stand by. Maybe a big signal from N2OG in a few months. It's a lot of work with a lot of potential unknown pitfalls though so maybe he'll end up passing on that offer.

Running

By Kevan N4XL

We have a lot of people in our group who S&P almost exclusively. Arguably one of the biggest bangs for buck spent to improve your contest score is learning to run - it's free! All it takes to get started is a willingness to swallow your pride a bit and allow yourself to make a few mistakes while learning. Take your focus off S&P next contest to stop and smell the roses, er... listen to a good operator run a pileup. Pay attention to how he or she handles operators having different skill levels, asks for fills, manages a pileup, and maintains enthusiasm. After listening a few times doing find a clear frequency (higher is better when starting out) and try it yourself. Even a modest station can dramatically improve their score by switching back and forth between running and S&P as rate varies. Once you begin to run you will likely have more fun contesting since it improves overall rate and adds a new dimension to your strategy options.

A recent discussion on S&P versus Run took place on the cwops.groups.io reflector. Although it focused on the weekly CWT tests some thoughts about why you should run and how to start were shared that are also applicable to most contests and modes.

- (Discussion started with post #54248) I am a newcomer... and so far do exclusively search and
 pounce during the wonderful CWT's. As I scan the results on 3830 I wonder who else just does S&P
 (zero running) just to understand what kind of performance levels are possible, but I can only guess
 at who in the list are runners, who combine the two, and who are pure S&P folks. Dave
 N1RO/VE3TMK
- It will be a while before I gain confidence to call CQ CWT. That will probably be as nerve wracking as a first time CW QSO. Charles K5KXJ
- There are a few corollaries to consider:
 - if you only run, you will only work pouncers;
 - if you only pounce, you will only work runners.

In a serious or semi-serious contest effort you typically will have to do both... Everything being equal, running in a contest where there are lots of pouncers will result in more Qs than pouncing... Strategically, you need to decide when to run or pounce, and every contest presents a different set of variables, such as mults per band versus mults once each; or your power/antenna; rules regarding who you can work, and the like.

I always advise my CW Academy groups to start out in contesting by pouncing unless you run out of runners. Pouncing allows you to take as long as you need to get the runner's call and exchange before pouncing. Running is a diminished-return proposition if it takes more than one take to get call and exchange info more than occasionally. Rob K6RB

- For me at least the transition from S&P to running is a bit daunting. First, I have a decent station (hexbeam up 30', 40 M vertical, 600 watts out) but not a powerhouse. In larger contests I am likely going to do better with S&P, since there are way larger signals out there. So improving my S&P skills will help a lot in that arena... But the main thing I need to get past to try running is whether I can do a competent job copying callsigns in a pileup, and that requires a confidence level I am not up to yet. Like others have mentioned running in SSTs and MSTs are going to be my steppingstones. But mostly I have tried hard to be a considerate and yet competitive S&P person, and don't want to get known as an incompetent runner needing lots of repeats! So moving to running on a CWT is a big step for me. Dave N1RO/VE3TMK
- Dave, In between times, download and practice using RufzXP (fast callsign copy) and Morse Runner (simulates WPX CW) where you have to copy calls and exchanges. It's great practice. MST is where you get the best running practice because you have to copy name and QSO number. Do all of these and you'll be a contest superstar before you know it . Rob K6RB
- I am, so far, strictly S&P for the CWTs; and I have been at them for a good while now. Why, you may ask? It's because I am a rotten typist. Even during the SST and the one MST I have done, where I do Run, I have made enough typing faux pas that some callers wonder if I've disappeared. No, I'm trying to correct my keyboarding goofs! Ted WA3AER

(Editors Note: Touch typing is fine for fun but is a MANDATORY skill for competitive contesting. It is well worth practicing. Programs are available online, or you could set up a dummy log and copy along while listening to a good op running a pileup. Before my professional life had me working with a computer every day, I maintained my typing skills by simply opening a book and typing what I saw on the page. "Where there is a will, there is a way.")

Further to what K6RB said: Take a look at your log for ARRL DX CW if you worked it before. If you
worked lots of stations running a KW, that will demonstrate how much you are only work runners.
And what it costs you.

My station is less than yours— 500 watts and no hexbeam, only wires. So when I S&P and find a good hole, I run as much as I can. What I find is a TON of 100 watt Europeans and South Americans that get totally missed if I don't make myself available to them.

My skills got a LOT better through the CWops contests, and it's a great place to learn how to run and build confidence.

Beyond having a big station, running is all about confidence. Ted W3TB/G0PWW

- Just a few comments.
 - 1. There is absolutely nothing wrong in doing only S&P, or running, or both.
 - 2. Not everyone cares about rates and scores.
 - 3. Sure, if you do care about rates and scores, then you might need to do both.
 - 4. But if you don't care about rates and scores, then it is simply a matter of personal preference and circumstances. Peter N4UP
- ...I think this means you can crank your keyer down to 23 or 22 or whatever, and call CQ, and stations will not be answering you at speeds that slap you silly which means you can start out your CQing career at a level where you have some confidence.

(The other thing that has not been mentioned is, your skill and equipment need to be able to isolate a single caller when there are more than one).

I'd say for best results don't do this below 040 on the dial. Above 040 is where people hang out who are a little more open-minded about the existence of CW below 28wpm. But really most good ops will either slow down to answer someone calling CQ at 23 wpm or they will tune past you because they chose to chance saving time. The good news is, that doesn't matter at all because there are plenty of stations who will work you at 23 wpm. More than you can work in an hour, for sure...

Mark N5OT

What do I do if ...? Is that legal?

By Kevan N4XL

Those types of questions come up even if we've already read the rules. Or perhaps someone asks a question on the reflector, and it turns out people interpret the rules differently and you were given contradictory answers. Who's right? As I've mentioned a couple times before I once asked a Contest Manager a question. A couple years later Ed, K3DNE, asked the new Contest Manager the same question. The new manager completely contradicted the old! (The new guy obviously had the right answer since he is now the one making the rules.)

Some contest sponsors put Frequently Asked Questions on their web pages. It is often worth looking to see if your question has been asked before. It is usually in a different spot than the rules, so you must go looking for interpretations. Here are some FAQ's from the CQWW web page Rules FAQ found at https://www.cqww.com/rules_faq.htm. Although these only apply to the CQWW they are good guides for resolving contest questions in general as they are based in sound contesting ethics. Be sure to check each individual contest for its own FAQ page though.

Q: What should I do if I accidentally make a QSO outside my license privileges?

Use X-QSO to mark the contact so it will not count for your score.

If you want to remove a QSO for any reason, use a text editor to add "X-" to the beginning of the QSO line in the Cabrillo file. For example:

X-QSO: 7023 CW 2009-05-31 0033 AK1W 599 05 XX9XX 599 24

The log checking software will not count this QSO for you, but will give credit to the other station.

Q: What about...?

The web page http://www.arrl.org/files/file/Contest%20-%20General/HF-FAQ.pdf has some very helpful explanations about common situations encountered in HF contesting.

Q: I would like to work on several bands, but only submit a single band entry. Is this allowed? How should I submit my log?

Yes, you may work other bands and still submit your log as a single band entry. First, please make sure your log includes **all QSOs made on all bands**. This helps us with the log checking. Second, make sure the Cabrillo file header has your category set for the single band you want to enter. (e.g., CATEGORY-BAND: 20M) Only the QSOs on the single band will be used to compute your score.

Please enter only one log containing ALL QSOs! Each log that you submit will overwrite the previously submitted log.

Q: I work a station and they do not know their CQ zone or they give me a serial number, what should I put in the log?

Log the zone based on their location.

Q: A station gives me a serial number vs. the correct CQ Zone in their exchange. What should I log? Log the zone based on their location.

Q: A station sends me "cut numbers" on CW. What should I enter in the log?

The log checking software is expecting to see a log with sent and received zone numbers. No matter what someone sends you, it is your responsibility to convert it into the zone number you thought they were trying to communicate.

Q: I made a mistake in logging and do not want a QSO to count. Should I remove it from my log?

No, please do not remove any QSOs from your log! This will cause the other station that worked you to lose credit for the contact.

If you want to remove a QSO for any reason, use a text editor to add "X-" to the beginning of the QSO line in the Cabrillo file. For example:

X-QSO: 7023 CW 2009-05-31 0033 AK1W 599 05 XX9XX 599 24

The log checking software will not count this QSO for you, but will give credit to the other station.

Q: How can I tell if I am Single Operator or Single Operator Assisted?

The rules for Single Operator state "all operating and logging functions are performed by one person (the operator)." The CQ WW Contest has two classes of entry for stations with only one operator: Single Operator and Single Operator Assisted.

You are Single Operator IF you (and only you) *locate AND identify* every callsign that you put in your log. Locate means to tune in each signal. Identify means to determine the callsign of the station you are working. Do not use any outside tools such as the DX Cluster or RBN network to locate new contacts. If you cannot say this, then you should enter the Single Operator Assisted category.

Q: Can I use a code reader to help me work stations on CW and be in the single operator category? No. Any single operator that uses a code reader must enter the Assisted category. This was part of the rule changes for 2015. (Editors Note: Other contests allow code readers.)

Q: How do I know if I should record my contest operation to be compliant with the rules?

Recording your contest effort is a good practice for any entry. It provides an opportunity to learn from your mistakes (e.g., an RIT that wanders too far from your run frequency, unconfirmed QSOs, out-of-band errors, etc.). The rules clearly state that a Top-5 entry in any category MAY be subject to a request from the WW Contest Committee for an audio recording of your log. If you are unsure of your placement before the contest (or surprised by the result), it is prudent to make a recording in the event you are asked for one.

Q: When does my 24 hours of operation for the CLASSIC Overlay begin?

Your 24 hours of operating time begins with your first QSO in the log.

Q: Can club members that travel on DXpeditions count their score for the club?

Yes. Club members living within the club area that go on DXpeditions to other countries can count their score for the club. They must specify the club name in the log. (Editors Note: Other contests require you to be within the club circle. The SFCG club circle is the state of South Carolina.)

Q: Can I enter single band, but operate other bands and have the all band score count for my club? No. Only the score of your stated entry category will be applied to the club score.

Q: Is live video streaming considered self-spotting?

Live video streaming of your contest operation is permitted provided you do not provide the frequency you are using.

Observations by the Editor:

• Several Foxes use newer Yaesu rigs. Sometimes problems crop up when trying to connect them to computers. This little tidbit might help people even if they aren't using microHAM interface units. It was post 21028 on the microHAM reflector. A man was trying to simultaneously use a FTdx101, a Palstar tuner, and a microHAM DKII interface.

If you are using the "Tuner" jack for an external antenna tuner, you can not use the RS-232 jack for computer (e.g., microHAM interface) control. Yaesu screwed its customers by providing only one serial I/O on the CPU and switching it between external tuner and CAT control... Alternatively, you *may* be able to use the AT Auto with the FTdx101 by using the "Y" cable...
73, Joe, W4TV

I'll also note that I had once explored using "Y" cables and physical device for sharing rig COM ports with microHAM devices and was told by microHAM there is a strong possibility of packet collisions between devices sharing ports resulting in programs locking up. A situation they have encountered frequently enough to warn against trying them. That is the reason for Joe's emphasis and use of *may* in his answer. Many of you are using COM port sharing programs with great success. microHAM devices are a bit more problematical in that they require a proprietary version of Eltima to create virtual COM ports usable by microHAM. microHAM devices require those proprietary virtual COM ports be used for their equipment to properly function. In some cases, COM port sharing programs will not work in that special Eltima environment.

 Newer computers have begun to come without the standard USB type sockets we need for many ham accessories. Or they have a mixture of USB-C and USB-A without having enough of the old style. Heck, some laptops only have type C sockets these days. Discovered they make small USB-C to USB-A adapters.



- The SFCG website was mentioned on the CQ-Contest reflector. Frank, KG4IGC, placed a document from K3TN called "The Contesting Aargh! FAQ". Part of it was quoted by K1TN, who also posted a link to our website. Good to see we are being looked at beyond our South Carolina borders.
- Word has spread among hams to only use FTDI chips (instead of Prolific) in USB devices. Windows updates are sometimes causing driver problems with older FTDI chips. Ran across this being

discussed on different websites – Ham and non-Ham alike. The question from W8MET in post #72390 of the N1MM reflector was "I am using N1MM and K1EL and when in RUN mode during the CWOPs Wednesday event I get a 5 second delay while pressing F1 and F5 function key....why???." Steve, N2IC, is on the N1MM developer team and responded later on and said to look at post #70734. That post is below but rolling back the FTDI driver did in fact solve W8MET's problem.

A related issue to this might be that there are cloned and unofficial FTDI chips on the market. I think I remember hearing FTDI revamped their driver coding to counteract the pirates. Reputable sources, like Microsoft, are working with FTDI. The latest drivers being put out will not function correctly with the clones. If we have one of these chips we can keep an older FTDI driver on the machines and tell the problem device to use it instead of the default newer driver, but that will undoubtedly come to bite us down the road. Hard to fault FTDI for making things not work though. It is affecting their business afterall.

OS: Windows 10 21H2 version 10.0.19044.1806
N1MM+ 1.0.9606.0
WKmini Winkeyer USB, F/W 31.02
Kenwood TS-940S (yes it's a beastly boat anchor, so what? I am too, so we get along fine)

This morning, the Windows Update site presented me with, among other things, an update for the FTDI USB serial port and serial converter driver to version 2.14.1.2. Given that Windows Update was pushing it, I went ahead and installed it.

This afternoon, and after working perfectly well last night, I was having up to 6-7 seconds delay between any command to N1MM+ and the transceiver actually transmitting as desired. The delay seemed proportional to length of time since last transmission. After a couple of false starts, I rolled the FTDI drivers back to the previous version 2.12.36.4. This restored proper functionality, i.e. almost immediate transmission.

I don't have any useful error messages, and I have no idea why N1MM+ was affected that way. I did check a couple of other programs that can control the Winkeyer, they were minimally impacted compared to the effect on N1MM+. Hopefully (a) if anyone else has the same problem I did, this will help them with resolution, and (b) some of the experts in The Way It Works can check into it. I don't for a minute think the problem lay with N1MM+, but if the FTDI driver has changed some behavior it might be worth knowing about.

Thanks & 73, Doug AF4T

N1MM+ Tips:

 Many ops have discovered they have computer issues when using the N1MM Spectrum Windows since they place a heavy processing load on the CPU. Even I7 computers with plenty of RAM sometimes struggle. To address that issue the N1MM team created N1MMSDRServer. It removes the processor loading of the Spectrum Windows from the main N1MM program and dramatically improves performance. If you aren't using it, you should be.

https://n1mmwp.hamdocs.com/manual-windows/spectrum-display-window/#n1mm-sdr-server-for-radios-with-extio-dll-support-this-is-the-preferred-method-for-sdrplay-and-airspy-hf-discovery-sdrs

- If you are looking to add a stand alone SDR receiver, such as an RSP or Airspy unit, to your shack, be aware Tom, N1MM, recommends and uses the Airspy HF+ and Discovery SDR line. You can bet he ensures N1MM integrates seamlessly with those units. I recently exchanged emails with another ham having problems setting up an RSPduo and let him know that about Tom. The ham immediately purchased one and was up and running within hours of it arriving. I personally use both an Airspy HF+ and an RSP2. I sometimes have delays with how the RSP connects with N1MM or (rarely) had to reconnect it to N1MM but have never had any issue with the Airspy.
- I had been using an external to N1MM gray line map but recently changed. I operate assisted and receive spots. These spots are displayed on N1MM's gray line map. At a glance I can see heavily active areas to point my beam at or that unusual station in a rarely checked direction that indicates a chance at rarer mults should I look in that direction.
- New features in version 1.0.9678.
 - Added 5 minute & 10 minute options to Statistics window. START TIME MUST BE ACCURATE or results will be erroneous
 - Set the maximum number of minutes for a Repeat CQ or Dueling CQ. Set in Config dropdown "Maximum Repeat/Dueling CQ Duration" Default is current operation (unlimited).
 - I haven't played with this yet but am curious why I might want to. The only thing coming to mind is to stop the endless 0300 CQ you here now and then which makes me suspect someone has fallen asleep. Or maybe left the operation station and forgot to stop the CQ. I'd like to hear what y'all might use this feature for.
 - Make Ctl+U work for SS. Just appends the new number & prec (if any specified) to the end of the exchange
 - Filter out spots marked as "BEACON" if "Show Beacon Spots" unselected in Telnet->Filters.

Upcoming Contests:

See the WA7BNM webpages https://www.contestcalendar.com/contestcal.html

SFOTA Current Leaderboard:

2022 OVERALL STANDINGS

	CALL	Contests	CW QSO'S	SSB QSO'S	DIGITAL QSO'S	RTTY QSO'S	TOTAL QSO'S
1)	N4IQ	60	9796	623	1121	4009	15549
2)	WN4AFP	70	5979	1639	0	0	7618
3)	KY4ID	102	7147	121	18	169	7455
4)	K4FT	86	6823	510	0	65	7398
5)	K4QQG	44	0	6598	0	39	6637
6)	K3DNE	24	365	5274	582	407	6628
7)	KG4IGC	21	766	1176	0	2711	4653
8)	AC4MC	34	2526	1292	0	462	4280
9)	K7OM	25	1543	200	32	2490	4265
10)	N4QI	87	2362	869	0	988	4219
11)	N4XL	6	886	1344	0	0	2230
12)	WB5NHL	7	343	531	0	1042	1916
13)	KS4YX	10	278	27	391	1032	1728
14)	WA2BCK	4	1240	412	0	0	1652
15)	NU4E	4	500	958	38	0	1496
16)	KN4OQD	6	0	887	0	0	887
17)	NI7R	8	873	2	0	0	875
18)	N2OG	7	0	318	0	547	865
19)	NE4EA	5	95	632	0	0	727
20)	KG9V	7	0	438	0	0	438
21)	WB4HRL	1	60	0	0	0	60
22)	AJ4UQ	1	0	0	1	0	1

2022 INDIVIDUAL MODE STANDINGS

CALL	CW QSO'S	CALL	SSB QSO'S	CALL	DIGITAL QSO'S	CALL	RTTY QSO'S
N4IQ	9796	K4QQG	6598	N4IQ	1121	N4IQ	4009
KY4ID	7147	K3DNE	5274	K3DNE	582	KG4IGC	2711
K4FT	6823	WN4AFP	1639	KS4YX	391	K7OM	2490
WN4AFP	5979	N4XL	1344	NU4E	38	WB5NHL	1042
AC4MC	2526	AC4MC	1292	K7OM	32	KS4YX	1032
N4QI	2362	KG4IGC	1176	KY4ID	18	N4QI	988
K7OM	1543	NU4E	958	AJ4UQ	1	N2OG	547
WA2BCK	1240	KN4OQD	887			AC4MC	462
N4XL	886	N4QI	869			K3DNE	407
NI7R	873	NE4EA	632			KY4ID	169
KG4IGC	766	N4IQ	623			K4FT	65
NU4E	500	WB5NHL	531			K4QQG	39
K3DNE	365	K4FT	510				
WB5NHL	343	KG9V	438				
KS4YX	278	WA2BCK	412				
NE4EA	95	N2OG	318				
WB4HRL	60	K7OM	200				
		KY4ID	121				
		KS4YX	27				
		NI7R	2				

3830 Activity:

Some may wonder why the CWT's, SST's, and IWC's aren't included. Editorial decision. Why not show them? They are weekly tests followed directly by those who participate. And they (particularly the CWT) take up a lot of space. There are potentially four line items every week, for every operator, of the four weeks displayed in this section of the newsletter. Space is free so I'm not against including them, but the large number of displayed lines does detract visually from the other less frequent events. Just drop me a line if you would like to see them. It is actually less work for me to leave them in, but I've done it both ways and it looks better to me without them included.

Contest	Call	Class	Power	Score
AlQP				
9/14/2022	K4FT	SOCW	LP	300
AzQP				
10/9/2022	N4QI	SOMixed	LP	336
CaQP				
10/3/2022	AC4MC	SO(A)	HP	36,608
10/3/2022	K4FT	SO	LP	22,572
10/2/2022	KY4ID	SO(A)	LP	1,479
10/2/2022	N4QI	SO	LP	5,616
CQ WW RTTY				
9/26/2022	AC4MC	SO(A)AB	HP	260,064
9/29/2022	K4FT	SO(A)AB	LP	3,363
9/25/2022	K4QQG	SOAB	HP	2,124
9/26/2022	K70M	SOAB	HP	132,167
9/27/2022	KG4IGC	SO(A)AB	LP	308,812
9/26/2022	N4IQ	SO(A)AB	HP	1,067,722
9/26/2022	N4QI	SOAB Classic	LP	109,824
CWOpen				
9/13/2022	WN4AFP	Single Op	LP	20,590
9/13/2022	WN4AFP	Single Op	LP	1,260
9/13/2022	WN4AFP	Single Op	LP	30,942
IaQP				
9/18/2022	K4QQG	SO Fixed	HP	208
9/18/2022	N4QI	SO Fixed	LP	242
9/19/2022	WN4AFP	SO Fixed	LP	352

Contest	Call	Class	Power	Score
Makrothen RTTY				
10/9/2022	к70М	SO/Single Xcvr	HP	918,336
10/9/2022	KG4IGC	SO/Single Xcvr	LP	1,226,018
10/10/2022	N4QI	SO/Single Xcvr	LP	75,770
MeQP				
9/25/2022	K4QQG	Single Op	HP	41,657
9/25/2022	KY4ID	Single Op	LP	4,557
9/26/2022	N4QI	Single Op	LP	357
NCCC Sprnt Lad				
9/23/2022	KY4ID	Single Op	LP	154
NHQP				
9/19/2022	N4QI	Single Xmtr	LP	32
9/19/2022	WN4AFP	Single Xmtr	LP	40
NJQP				
9/18/2022	K4QQG	Single Op	HP	42
9/18/2022	N4QI	Single Op	LP	182
9/19/2022	WN4AFP	Single Op	LP	1,404
NvQP				
10/9/2022	WN4AFP	SOCW	LP	90
PaQP				
10/9/2022	N4QI	SOMixed	LP	3,408
10/9/2022	WN4AFP	SOMixed	LP	33,850
Salmon Run				
9/18/2022	K4QQG	SOSSB	HP	140
9/19/2022	N4QI	SOMixed	LP	1,328
9/19/2022	WN4AFP	SOCW	LP	740
SDQP				
10/9/2022	N4QI	SO FixedMixed	LP	24
TxQP				

Contest	Call	Class	Power	Score
9/18/2022	K4QQG	SO SSB	HP	1,600
9/18/2022	N4QI	SO Mixed	LP	1,995
9/18/2022	WN4AFP	SO Mixed	LP	38,151

73 es QRT de N4XL