

Official Publication of the Ten-Ten International Net, Inc. - www.ten-ten.org Monitoring 28.380 and 28.800 MHz daily at 1800Z except Sunday

### **The Ten-Ten International News**

Is published four times annually by the TEN-TEN INTERNATIONAL NET, INC. Publication dates are approximately mid January, April, July and October.

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News items should be sent to the Editor. Technical articles and information on all 10 meter activities or news are welcome and solicited. All copy submitted must be typed, and sent on computer disk or E-mail. Suitable formats will be provided upon request.

Photographs are encouraged. Black and White or Color are acceptable. Include complete information on the back of each photo. Attach a label or other suitable paper to the back of the photo and write all information on the label, not the photo. If sending digital images, high resolution of a minimum 300 dpi must be used. Please do not send newspaper or digitally printed photos as they cannot be used.

### DEADLINE FOR NEXT ISSUE: 1 June 2022

### PLEASE MAIL ALL ARTICLES AND PHOTOS TO:

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10-10 CHAPTER ACTIVITY REPORTS: Should be sent to the Chapter Coordinator ADDRESS CHANGES: All members should send address changes to the Data Manger NOTE: 10-10 IS NOT RESPONSIBLE FOR POSTAL SERVICE DIFFICULTIES

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## April 2022

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# From the Editor

Randy Mather, AJ7B (#7675)

The last time I wrote for this column, I noted the changes I was seeing during the daily 1800Z 10-10 net. More distant stations were checking in. Well, that trend appears to be continuing. This upward trend is also reflected in Bob Farrow's net report. I just did a comparison of the total check-in numbers between his report in the January issue and what is in this issue. A definite marked increase. I also noted a number of stations checking in to collect their first 10-10 numbers so they can apply for membership.

Another really big indicator is the comparison between this year's and last year's Phone QSO party numbers. Stations submitting scores this year were up by 60% and the reported scores were up significantly as well. Last year the station with the most contacts had 229 QSOs but this year a station logged 468 QSOs.

I also did a quick check with our Data Manager (David Smith) and he has told me that membership applications are trending up as well.

So, as expected, the upswing in propagation continues and you should get on 10 meters and add your voice to the growing number of calls for contact.

As activity ramps up, there will be more need for volunteers to help manage all the different tasks required to keep the 10-10 International Net operating. In addition to needing new board members (See Call for Nominations), certificate managers, award managers, net control stations, and many other positions need filling. Please consider joining the list of volunteers and help this organization continue to function and even grow.

For some of you reading this column, these words will seem familiar. This newsletter needs your input. Readers are interested in Do-It-Yourself projects. If you have created something that improves your operation on the air, please share it with the rest of us. I'm open to anything like that. It doesn't have to be letter perfect. That's my job. I work with the writer to help make the story presentable to the public. The article doesn't have to be a construction project. It can be an on-air experience or even a show or hamfest visit where you saw something notable related to the hobby. Ten meter relevant is preferred but not necessary. Amateur radio centric is just fine. If you are a Ten-Ten volunteer, then you might share your involvement and how you feel about what you do. I can always use your help

Randy - AJ7B



# From the President

Mel Sojka KD5DE #33513

### UPPER-LEVEL QRM

Well Orlando Hamcation 2022 is a wrap. A bit of an uncertain event with the pandemic still in place. Several major dealers did not attend, and many felt that the attendance would be very low. Actually, as for the North Hall where we are located, the Friday attendance was quite surprising. Both 10-10 and the QCWA across from us did well that day. Saturday was not as good, and Sunday was way down for us. The only problem was that I was manning the table alone at a major event. This happened due to a last-minute unavoidable cancellation by one of our Officers. If it wasn't for a very special and very kind member, I don't think I could have survived. Michelle, W5NYV #74808, was there with Open Research Institute. She came by multiple times during the event allowing me to take short breaks. When I returned, there was always a crowd gathered. She is a life member and has been on board for at least 4 years. I told her it was time that she ran for a 10-10 office. She would be a real boost with the everimproving band conditions. She seemed a bit concerned since she lives on the West Coast. When I told her that our meetings were teleconferences, there was a little twinkle.

While on the subject of elections. It seems that in the age of devices that speak to you in your homes, internet search engines, and phone apps for smart phones, that the concept of service has lost its attractiveness. With all this available, why should one desire to serve in a position of leadership? Within 10-10, the net officials provide the skill set to promote growth and support within the organization. Each of the Directors have a specific function and with their individual input and leadership, continuity is insured. In 1990, during the first open election, there were many candidates for each office and the number of ballots mailed in was guite large. This was the case until the internet took a hold on the population. Now support for the election as well as those seeking office has dropped to disappointing levels. During the upcoming election, there are three Director offices that will appear on the ballot. Each of these offices have a vital function within 10-10. There's a Director responsible for awards, a director responsible for publications, and one for chapters. Each of these are of vital importance. Also, the office of President will be on the ballot. If your membership has been current (paid) for the last 4 years, you are eligible to seek any of these offices. Please contact WA2SUH Larry #00407 at wa2suh@aol.com for further

information. You must have the required information in place by the first of May this year.

One of the goals I wanted 10-10 to reach before I left office was that our membership numbers issued reach 78000. Up until this month I had my doubts, but after the winter phone event, this looked much better. Apparently cycle 25 may be a very good one. There have always been many pro and con predictions made by the "Experts" when it comes to solar activity. It is a bit like the weather forecast you get every day. All I can say is we have gained 35 new members since the day before the winter SSB QSO Party as I write this article the last week in February. With the solar flux hovering around 100 and a large number of spots, I can only see growth in the near future.

I continue to encourage new local chapters, and net activities. Historically, there has been as many as 125 affiliated chapters promoting activity on 10 meters. At last report, I believe that number is down to less than 40. The local chapter here is strong and growing. We have an average of 15 net check-ins every Thursday evening. This little chapter has over 1,700 members world-wide. When conditions here allow overseas contacts, that number will increase. It is a very simple chapter with an electronic certificate and a point upgrade structure. Many chapters are less involved with only weekly 10-meter nets.

You may be able to establish a local chapter if you can get at least seven 10-10 members to agree to hold a 10-meter net in your area. Contact KA0ZPP Jim #43428 ka0zpp10ten@gmail.com for information.

As 10-meter propagation improves, it would be well to remember the purpose of 10-10. Our mission statement is that we strive to promote activity on 10 meters and to preserve that spectrum for amateur radio use. In many regions, there are small but active nets being held locally on 10 meters. Many of these are not 1010-chapter nets, but instead gatherings of local hams. It has been suggested that we use our web presence to promote these other nets. The BOD unanimously approved this action and our IT Manager has been instructed to include them in the net activity database. They will be posted on the entry page daily as they occur. If you are aware of one of these nets, contact N7YG Jeff #65084 at n7yg@n7yg.com.

Next on the schedule is the Dayton Hamvention. This event will be held at the Greene County Fairgrounds May 20, 21, and 22. If the turn out there is as good as it was at the Orlando Hamcation, it will be a super event. We will be in the Marconi building just as we have always been. If you make the event, stop by. There may be a 10-10 forum, but it is too early to tell since that possibility depends on other events. At this time KR7RK, W5SUM, K5PLH, and I will be manning the booth.

May the year 2022 be a much better year for all, as 2020 and 2021 were. Hope to work each one of you during cycle 25.

God Bless & 73 Mel KD5DE #33513



Michelle W5NYV #7480 and Mel KD5DE #33513



Karen W4KRN #66628, Mel, Jim K4JJR #68413 You get that warm and fuzzy feeling when two long time friends show up from 800 miles away.

Mel KD5DE #33513

## **NEW LIFE MEMBERS**

04713	W9BFO	John A Warren	IL
05790	WB4OQL	Ronald L Beaver	SC
08109	WØCEL	David W Gadbois	MN
38286	N9CJT	Noel A Taylor	IN
39407	KF4EA	Mark W Brandel	FL
40394	W8SOL	James E Henderson Jr	OH
44936	WC7F	Jerald D Jensen	ID
63218	KD4CXG	Douglas D Kiser	IN
71025	WØZAP	Richard D Parent	KS
71292	KKØMG	Robert E Lewis	ND
76218	WØHMS	Harry J Steger Jr	MO
77163	KX1W	Ronald E Fish	NJ
77475	VE3MT	Barry Monaghan	DX
77934	KG5SSB	Daniel A Bostick	MS
77937	K4BBH	David Walk	GA
77938	ADØL	Michael Essex	CA
77944	KD4IZ	John K (Jack) Spitznagel	MD

10-10 Has Two Official Daily Nets 28.380 and 28.800 MHz Both Run At 1800z Every Day Except Sunday Listen And If You Can Hear Us Join IN!!!

### **10-10 NET CONTROL STATIONS** ALL NETS BEGIN AT 1800Z

Mon (28.380)	Open. N6OPR	#45715	ΑZ
Mon (28.800)	Doc, WB6OJB	#70675	CA
Tues (28.380)	Ray, K7CWS	#50288	AZ
Tues (28.800)	Open. Contact Bob N60	OPR for info	
Wed (28.380)	Bob, N6OPR	#45715	AZ
Wed (28.800)	Open, WB6OJB	#70675	CA
Thu (28.380)	Bob, N6OPR	#45715	ΑZ
Thu (28.800)	Robert, W4SOT	#63201	NC
Fri (28.380)	Open. Contact Bob N60	OPR for info	
Fri (28.800)	Tim, K1IEB	#74965	AZ
Sat (28.380)	Open, N6OPR	#45715	AZ
Sat (28.800)	Open. Contact Bob N60	OPR for info	
Alternate	Steve, W7WHB	#74965	ΑZ
Sunday NEVER ON S	JNDAY		

## April 2022



## Chapter Coordinator

Jim Fox, KA0ZPP (#43428)

### **GENERAL NEWS**

1) **All CH/CM**: Please double check the TEN-TEN Net Guide to be sure your net(s) are listed correctly. If there are changes, be sure to let me know so I can update the list.

2) If your chapter is planning a special during the months of July, August or September of 2022, please let me know before May 30th so I can include the details in the July 2022 newsletter.

3) Reminder of Quarterly Reports Due: **In Extremis** (no report in over a year): None. **Past Due** (no report received during the prior quarters when due): none. Reports received after February 28 (date of this report) are not included here and will be acknowledged in the Chapters section of the 10-10 website.

Chapter Reports **Due during second quarter 2022:** Fort McHenry/ Cornerstone/Yodar Kritch (May), Hanse (May), Speedway (May). Note that Quarterly Chapter Reports may be sent any time. The months indicated here are the dates in 2021 in which the last report was received.

4) I thank **ALL CH/CM** who sent me a **complete report** during 2021 so I have up to date contact and net information. Other chapters, please send me a complete report in 2022. See www.ten-ten.org/index.php/resources/ ten-ten-documents/ten-ten-forms for a form to download or www.ten-ten.org/ chapters/quarterly-report to fill out and submit electronically. Be sure to notify IT Manager Jeff, N7YG, before using this easy-to-use form so he can add you to the Chapter Management Group. If you do not have internet access, let me know and I will send you a blank form that you can copy and submit.

5) Poor propagation in recent years has certainly affected Chapter Net activity. But hang in there – conditions are improving. One of the primary purposes of Ten-Ten International is to promote activity on this band, especially in such times as these.

### **CHAPTER NEWS**

1) I regret to announce that **The Aliis** have gone **QRT**. CH Samuel, NH6SS, reports that there are simply not enough active members to continue.

However, he will continue to call a net on Saturday 2200 UTC at 28730 in order to provide contacts when conditions permit.

2) Not having received a report from **Colorado Frontier Gang or Centennial** in over two years, the Chapter is declared unaffiliated effective 02/28/2022. I have no information whether their net is continuing to be called.

3) **Down Under** CH Bob, ZL1AFU, reports that there are no longer sufficient 10-10 members in New Zealand to qualify potential new members for their own number. Now that propagation is beginning to improve, point your antenna toward the South Pacific and help them out.

4) All chapters are asked to plan for succession of leadership. To aid in such planning, IT Manager, Jeff, N7YG, is setting up FTP accounts on the 10-10 server where chapters can save their data. All CH: contact Jeff for the details if you wish to take advantage of this opportunity.

5) It has been depressing to continue reporting Chapters as QRT or Unaffiliated. However, now that propagation is starting to improve, I have had three inquiries about forming new chapters. It remains to be seen if any of these materialize.

6) Chapters below accept email upgrades as of November 30. All the listed chapters generally need previous, new and total points and seals claimed. Any transaction with the CM that requires that a certificate be issued, and most worksheet specials, should still be handled via US Mail. Also, it is good practice to keep a detailed listing of the upgrade in the event that the CM should require verification. Requirements peculiar to a particular chapter are noted.

(\*\* indicates change)

**Bauxite** – CM K5BKT, <u>k5bkt@nwla.com</u>. Bauxite and Arkansas Visitor numbers only.

Bay Area – CM K6RDK, <u>k6rdk@arrl.net</u>

Branding Iron – CM DL6DK, <u>bic-cm@voits.de</u>

Castle Craig – CM N1API, <u>n1api@cox.net</u>

Chesapeake Bay - CM N3TGB, n3tgb@aol.com

Down Under – CM ZL1AFU, zl1afu@nzart.org.nz

Fort McHenry/Cornerstone/Yodar Kritch - CM K3TUJ, k3tuj@juno.com

Hanse – CM DL5HAN, <u>dl5han@t-online.de</u>

Houston S.H.O.T – CM N5MT, <u>n5mt@aol.com</u>

Louisiana Pelican – CM N5MT, <u>n5mt@aol.com</u>

Major League Baseball - CM N6OPR, n6opr@msn.com

New Mexico Mud Ducks – CM KM5EH, buckml@lobo.net

North Georgia – CM W4GKF, <u>10X@chazcone.com</u>

Oregon Trail- CH/CM K7QXG, k7qxg2@gmail

Speedway - CM W7CAR, w7car@arrl.net

### Steamboat Plus – CM KD5DE, kd5de@nwla.com

If any chapter not listed accepts email upgrades or if the email listed has changed, please let me know so I can update the list. Thanks.

Jim Fox, KA0ZPP, PO Box 135 Mayhill NM 88339, email: <u>ka0zpp10ten@gmail.</u> com

## TEN-TEN NET GUIDE As of March 1, 2022

					As of Marc	<u>ch 1, 20</u>	)22				
DAY	ZSUM	ZWIN	Chapter Name	Location	Freq	DAY	ZSUM	ZWIN	Chapter Name	Location	Freq
SUN	0001	0100	Chesapeake Bay	Chestertown, MD	28345	WED	0000	0000	Possum Trot	Raeford, NC	28345
SUN	1300	1400	Arlington	Arlington, VA	29200	WED	0001	0100	Castle Craig	Meriden, CT	28375
SUN	1400	1500	Neanderthal	Bergkamen, DL	28355	WED	0100	0200	Cincinnati Area Ten	Milan, IN	28430
SUN	1700	1700	Major League Baseball	Gilbert, AZ	28380				Tuners		
SUN	1900	2000	Oregon Trail	Dallas, OR	28330	WED		0200	Houston SHOT	Houston, TX	28488
SUN	1930	1930	North Georgia	Atlanta, GA	28410	WED	0200	0300	10 Bar X	El Paso, TX	28445
MON	0100	0100	Arizona Desert 10-10 Net	Phoenix, AZ	28445	WED	1400	1500	EU DX/Branding Iron/ Hanse	Bergkamen, DL	28355
MON	0100	0200	Milwaukee	Milwaukee, WI	28365	WED	1930	1930	Route-66	Boonville, IN	28370
MON	0100	0100	Lonestar	Arlington, TX	28460	THU	0100	0200	Gateway	St. Louis, MO	28650
MON		0230	Bauxite	Benton, AR	28470	THU	0100	0100	Cow Town	Arlington, TX	28460
MON	1730	1730	Chief Seattle	Seattle, WA	28430	THU	0100	0200	Milwaukee	Milwaukee, WI	28365
TUE	0001	0100	Ft McHenry/Corner-	Arbutus, MD	28370	THU	0230	0230	Windfarms	Livermore, CA	28485
102	0001	0100	stone/Yodar Kritch		20070	THU	0230	0330	Up The Crick	Eugene, OR	28450
TUE	0100	0200	CO Centennial/CO	Lakewood, CO	28340	THU	1930	1930	Speedway	Rainer, OR	28350
TUE	0100	0200	Frontier Gang City of Lights	Aurora, IL	28150 CW	FRI	0001	0100	Fort McHenry/Corner-	Arbutus, MD	28370
TUE	0130	0230	City of Lights	Aurora, IL	28720	FRI	0001	1000	stone/Yodar Kritch Steamboat Plus	Shreveport, LA	28430
TUE	0130	0230	Bauxite	Benton, AR	28470	FRI	0300	0400	Chief Seattle	Seattle, WA	28430
TUE	0300	0400	Bay Area	Hayward, CA	28475	FRI	2230	2130		Aukland, ZL	
TUE	0430	0430	Aloha	Hilo, HI	28490	ΓŔΙ	2230	2130	Down Under (Summer in NZ is winter in US)	Aunanu, ZL	28530
TUE	1500	1600	New Mexico Mud Ducks		28835	SAT	1510	1610	Louisiana Pelican	Baton Rouge, LA	28450
TUE	1500	1000			20030	SAT	1730	1730	Tango	Buenos Aires, LU	28650
									-		

### FT4/FT8 10-10 INFORMATION TRANSFER

If you don't know how to send your 10-10 info for a FT4 or FT8 QSO, it's very easy using the "Tx5" message.

Enter your 10-10 info into a "Tx Macro." then using the pull-down option of "Tx 5", select your 10-10 info. Mine is "Chas NY 40510."

I suggest you review a very informative article that appeared in this Newsletter last October. Volume 59, pages 19 thru 21. "FT8 Mode Update" by Randy,

### AJ7B, #7675.

Charlie - WA2HMM #40510

### **NET CONTROL STATIONS NEEDED**

Needed: Net Control Station for the 28.380 and 28.800 MHz Nets at 18:00 UTC Monday-Saturday. If interested contact N6OPR via e-mail: <u>N6OPR@msn.com</u>.



## **DX** News

Mike Davidson, N5MT (#24949)

Welcome to the Spring DX season of the 10-10 DX News.

I am sorry to inform readers that one of our DX members has died. Paul Herbet F2YT #22871, gave out his 10-10 from many countries. Paul was a member of the A-1 Op Club and operated all modes and bands. I looked at my computer log to check for QSOs and found 15 entries for Paul. His last QSO was on 15 Mtr on Sept 24, 2021.

Another local member has passed, Jeff Hawkins WA5RRT #28434. Jeff was the net control for the La Pelican net on Saturday morning at 10:10 am local time for many years.

I will probably get promoted as net control since I subbed for him when he was out sick. RIP my friends.

We now have eight new 10-10 members from Hawaii joined the past nine months. This indicates we are having more propagation on Ten to talk with DX. New DX members are listed farther down, so read on for more DX information.

Well I'll try to give you some 10-10 history about Russia and Ukraine members that have been on Ten. My first QSO was Vic UA0FCK #28646 in 1981 from Asiastic Russia. Next was Tom RA6AR #25950 in 1988 and I met Tom at a 10-10 convention in 1989. Tom works at the Sochi Airport on the Black Sea coast of Russia. I have a total of five Russian members in my log. My last QSO was Vic UA9OS #55518 in 2002, and no others the past 20 years. My first Ukraine member was Vic RB7GG #42055 in 1988, his call now is UR5MPA. I have worked a total of five members in Ukraine, my last was also in 2002. It takes good propagation to make the 6500 mile path and nine time zones for our radio signals to get into Russia and talk to these DX members!

I continue to see DX members traveling to give out DX. During the Winter QSO Party the first week of February, I was able to talk with 82 stations, 29 members but only 2 DX members. Steve HP9SAM #75838 in Panama and Cliff ZL4AS #23481 in New Zealand. I did help Xenia ZL4YL get her new 10-10 number #77957 from New Zealand. Her family now has three 10-10

members, father Holger ZL3IO #22401, and mother Birgit ZL3IQ #62276.

OK the good ham propagation news is better. We are having increased sun spots appearing on the Sun surface. This makes the solar flux go higher which is helping cycle 25 give us better skip conditions on Ten into Europe and the South Pacific. I have talked into Europe several times this winter on Ten. The east coast of the USA and South America have been talking into Europe a bunch the past three months.

The 15-17-20-30 meter bands continue to be the best DX bands this past winter, so use these bands for DX, when Ten is not open. Stay on the radio and call CQ to see where you can talk. When propagation is poor on Ten, I start the FT8 software where I will find weak stations to work when you think the band is closed. Here in Louisiana, FT8 QSO's beat out the SSB signals when propagation was poor on Ten.

I see a small increase in people traveling in the future as the Covid infections are allowing more travel. I do not expect to see a new 10-10 country show up on Ten this year but a big DXpedition in 2023 might be coming. Until we get better propagation in cycle 25, the rare DX locations will not get visited by an organized DXpedition. Accordingly, ops are staying home and the amount of DX news is still reduced. Please keep turning on you HF radio to find DX that may be calling CQ on a band besides Ten.

Remember, as a paid up 10-10 member, you can apply for a 10-10 award by using the website to get forms for all awards at no cost. No QSL cards are required for our awards unlike the ARRL where you can sign up for the LoTW system of QSL matching or paper QSL checking.

As the 10-10 Countries Award Manager, I follow most all of the ARRL DXCC award rules. We do require for you to have exchanged your Callsign, Name, State and 10-10 number over the air, only on Ten, and record all of that info on your award application. The honor system does apply for all contacts on 10-10 awards. I keep the 10-10 DX records with my job as the Countries Award manager. As of March 2022, there remains 22 countries that have not been worked for 10-10 country credit as published in last years March News.

There are now 645 members that have the basic 10-10 Countries Award certificate for 25 countries, only 52 members that have an award for 100 Countries, which is the equivalent to the ARRL DXCC award. The present record of the most countries worked by a member is 302, the next high is by a silent key member with 208 countries.

**Countries Award:** There were no Countries Awards application submitted this past quarter. One **lost certificate was replaced for a member.** 

Download an excellent DX'ers Handbook written by Bryce Anderson

K7UA/SK, at: www.K7UA.com.

### GENERAL 10-10 DX REPORTED IN THE PAST QUARTER:

**4U United Nations**. The ham radio station 4U1UN #55555, in the New York UN building, has a remote HF station setup and where the Ten meter beacon is located. I have copied the beacon a few times the past three months. Check DXSummit for QSO reports and wait for an opening.

**F France**. Gerard **F2JD** #63443, was not on from HR Honduras as planned but was home in France from December 2021 to March 2022 on HF. LoTW.

**HP Panama**. Steve **HP9SAM** #75838, continues to operate on Ten on Saturday mornings. We talked several times this past winter, as he tries to be on the LA Pelican net on 28450 MHZ at 1610 UTC.

**HR Honduras**. John **AD8J** #16120, was on Guanaja Island in Honduras for several weeks in February. He used wire antennas from 10-80 meters on CW, SSB and FT8. John prefers LoTW and will upload logs ASAP. No eQSL.

His call was HR9/AD8J from February 12-26th.

**HS Thailand**. Fred **K3ZO/HS0ZAR** #8859, reported many new HS hams passed their HF written and CW test in February. No active 10-10 member is in Thailand now.

**LX Luxembourg**. Andy **LX1DA** #50458, was using the callsign LX40DA on FT8 until December 31st.

**P4 Aruba.** John **W2GD** #14109 was operating as P44W from February 14th to 22nd. When not in a contest, he operates on the WARC bands. LoTW.

**PJ2 Curacao**. Mike **W1USN** #51238 was on Curacao from February 2-12th using call PJ2/W1USN. He operated 100 watts with his FT-891 to a dipole. LoTW.

**PJ7 St. Maarten**. Jeff **PJ7/VA3QSL** #73406, was on the island from February 21-23rd. No reports of activity.

**V4 St. Kitts and Nevis**. Chuck **KG9N** #17038, was on St. Kitts using call V4/ KG9N from February 8th until March 1st. Chuck is using a lcom 7300 at a rental home with antennas.

**VP2M Montserrat.** Thaire **W2APF** #50022, was using call VP2MDX in February until the 18th on CW and SSB.

**VP6 Pitcairn Island**. Miralda **VP6MW** #50434, has been on the radio with huge pileups in February. Good luck.

**VP8 Falkland IsI**. Bob **VP8LP** #8854 and friends in the Falklands ARC, operated from January 14-16th on SSB and Digi FT8. Bob is the only 10-10 member on the Falklands.

**ZF Cayman Islands.** Jim **WB2REM/ZF2OO** #48365, has been operating remotely in February around 1530 UTC.

### UPCOMING DX & NEW 10-10 ACTIVITY:

**3Y Bouvet Island.** A DXpedition to Bouvet will be attempted in November for the #2 most wanted country. The only op that might be going is Bill **KO7SS** #8631. In 1990, this was a first time country for a 10-10 member.

**HP Panama.** Jose **HP2AT** #42071, will be using callsign H32AT for his 32 years in ham radio all of 2022. LoTW.

**J6 St. Lucia**. Kyle **WA4PGM** #50763 and Dan W0CN #27026, will visit with Bill K9HZ/J68HZ #2618 starting March 1-7th. Be sure to work the correct 10-10 number.

**OA Peru**. Father Ed **OA4SS** #10802 is a 83 year old Jesuit priest who has worked in Peru for the past 50 years. Several people donated a set of new 3-500 tubs for his amp recently, so watch for him on Ten.

**OH0 Aland Islands**. Hans **DK8RE** #75943 and friends, will be using callsign OH0EG from April 1-9th and 22-29th.

**P4 Aruba**. Tony **N2TK** #22425, will be on Aruba from March 2-9th. His call will be P40F and only use LoTW.

**PJ2 Curacao.** Andreas **PJ2/DK5ON** #54260, will be on from March 1-16th all bands and modes.

PJ5 St. Eustatius. Frank PJ5/K3TRM #69974, will be on the island from March 6-12th. He will operate SSB, RTTY, and FT8 on 40-10 Mtr. LoTW. **Note:** Frank and his father had the same callsign but different 10-10 numbers.

**ZF Cayman Islands.** Jim **WB2REM** #48365 will be on the island as ZF2OO until January 2023 on FT8, CW and SSB. LoTW.

MISCELLANEOUS ITEMS & NOTES:

Propagation forecast: http://www.solen.info/solar/,

www.SolarHam.net and http://ARRL.org/Propagation.

More propagation: <u>http://dx.qsl.net/propagation/</u>.

DX Calendar: http://www.dxwatch.com/.

DX: <u>http://www.youtube.com/watch?v=k4dJcK-WVRw</u>.

DXCC Most Wanted at: https://Secure.Clublog.org/mostwanted.php.

**NEW->** History of ARRL DXCC program:

http://ebarc.org/pdf/dx-entity-history.pdf.

NEW-> Ham Lookup various ways:

http://Haminfo.tetranz.com.map.

NEW-> Ham website for LoTW users:

### http://www.hb9bza.net/lotw-users-list.

Propagation: I expect the solar flux to range from 94-119 during the Spring which means the flux continues to rise as we get more spots on the sun for cycle 25.

The 2022 Spring Equinox is on Sunday March 20th. Spring starts in the northern hemisphere and the Sun is above the equator giving the US its night/ day times equal time. In the southern hemisphere, fall starts on this day. Cycle 25, started on November 17, 2019. The Sun was really active in December 2020 but now has started a slow rising flux. A solar flux maximum of 125 has been forecast by NOAA for the winter of 2024. Sunspots are counted by looking at the Sun but Solar flux is measured by radio at 2.8 GHz.

The 2021-2022 monthly **maximum** flux was: Jan 79, Feb 79, March 79, April 85, May 81, June 94, July 95, Aug 90, Sept 102, October 112, November 100, December 131, January 2022 was 130, February 130. Average 99.0.

The 2021-2022 monthly **minimum** flux was: Jan 70, Feb 67, March 72, April 71, May 70, June 69, July 73, Aug 71, Sept 75, October 76, November 78, December 76, January 2022 was 84, February 93. Average 74.6.

**On March 1st, the solar flux was 99, the A index was 8 and K index was 2**. There have been good sunspot regions on the Sun the past few months with increased solar flux up 9 points average. The USAF solar flux forecast for March 1st to April 15th is from a high of 105 to a low of 95 with most days ranging from 98 to 102.

**My Prediction:** Over the next three months, the best conditions on Ten could be: March 3-5th, 28-30th; April 23-27th; May 21-24th; and June 16-20th. For the USA, expect a 50% chance of DX to Europe or Asia with a 85% chance of DX to South America or into the Pacific. Listen for the CW beacons from 28.175-28.300 to see if Ten is open.

There were three new 10-10 DX members joining from December 2021 to February 2022. December: WH6GOG #77928; January 2022: none; and February: VE7RVZ #77949, ZL4YL #77957.

Thanks to the Daily DX by Bernie W3UR #25731 and the ARRL DX Bulletins. This DX News edition is my number 126th of DXing reports. DX Info to: Mike Davidson, 26274 Whispering Pines Ave, Denham Springs LA 70726 USA and Email: Email: <u>N5MT@aol.com</u>.

DX IS! 73 Mike Davidson N5MT #24949

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We encourage all of our members to support the 10-10 International Net Scholarship Foundation. Our goal has always been to fund our scholarships entirely through member donations. At the Scholarship Foundation meeting last May, the Foundation Board voted to guarantee the funding for three \$2000 scholarships to be awarded in 2022. The Foundation was created in 2001 and is a qualified 501(c)(3) tax exempt organization and contributions are tax deductible. Why not consider a donation as a Chapter or an individual in memory of a fellow ham or loved one. A donation was received by Sheila Schwartz, KE6GFI # 72985 in memory of Jim Stafford, W4QO, #14628. This following people donated in the memory of my father Abraham Berger, W2BLH, #33333: Matthew Berger, K2MSB, #60606; Robert Berger, WA2EJO, #27615; Andy Kirschenbaum, WA2CDL, #3087; Larry Berger, WA2SUH, #407 and Michael Berger (now W2BLH). If you have an employer matching program, please let us know. An employer match was received this guarter as result of the donation by Taras Sochan, K2ERD, #74082. If you haven't donated before, we want you to know that all donations are appreciated and they do add up. At the time you make a donation to your favorite charity, please consider a donation to the 10-10 Scholarship Foundation

If you make a donation of \$25 or more you are eligible to receive one of the historic 10-10 pins. As more and more members have told me not to send a pin and want the maximum amount of their donation to go to the students, if you have made a qualifying donation and would like a pin, please contact me at wa2suh@aol.com. To pay by credit card see payment information on Page 27 or send your check to me or the Data Manager. Our addresses can be found on Page 26.

The members listed below became 10-10 Scholarship Foundation Supporters during the months of December, January and February and we appreciate their support.

Platinum (\$1000 or more)	
None	
Gold (\$500 to \$999)	
KB5UJYKenneth Schulz	63342
Silver (\$100 to \$499)	
KE6GFI Arlene Schwartz K2ERD* Taras Sochan	72985 74082
Bronze (Up to \$99)	
WA2SUH Larry Berger	00407

## Bronze (Up to \$99)

WA2CDL	Andy Kirschenbaum	03087
W4GEK**	Alton Morris, Jr.	09861
WA2EJO	Robert Berger	27615
KD5DE	Mel Sojka	33513
KR3A	Donald Kirby	45933
KA4SSH	Harvey Rubin	51482
K2GEP	Gregory Preuss	55388
K2MSB	Matthew Berger	60606
WA3HGT	Herbert Raemsch	63062
N7ELL	James Wasson	75662
KD7DGK	Michael McGrath, Jr.	76407
W9RX	Erich Grauke	77531
W2BLH	Michael Berger	
*Employer match received	-	
**Silent Key		

### **10-10 SCHOLARSHIP APPLICANT INFORMATION**

Each year the 10-10 International Net, through our non-profit corporation, the 10-10 Scholarship Foundation, funds three \$2,000 scholarships, which are administered on our behalf by the Foundation for Amateur Radio (FAR). It is suggested that every 10-10 member encourage qualified college-bound amateur radio operators to take advantage of this opportunity. Over the past 34 years, 10-10 has funded 130 scholarships valued at \$171,000.

Applicants must be licensed amateurs. There is no restriction on the course of study, but applicants must intend to seek at least an Associate Degree from a college or university. Non-U.S. amateurs and those seeking graduate degrees are also eligible, as well as students who study outside the United States. Initial applications must be received by FAR prior to April 15th of each year. Download an application from FAR's website:http://www.farweb.org or request an application from:

FAR Scholarships P.O. Box 911 Columbia, MD 21044-0911

### **QSL Bureau News**

The QSL Bureau manger, Jim Stoeber WI9X #49635 became a Silent Key. Contact Mel Sojka if you are interested in managing QSL cards for the 10-10 International Net.



## Were you first licensed 25 years ago and licensed today?

Then you should join the Quarter Century Wireless Association, Inc.

To Join or Renew, Visit: http://www.qcwa.org/join-renew.php

## For more information, please contact: om@qcwa.org



## Net Report

Bob Farrow, N6OPR (#45715)

	Net	Report for 4		2021	
		wonua	ay Nets		
	28.380 MHz			28.800 MHz	
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
4-Oct	10	1	4-Oct	3	0
11-Oct	16	1	11-Oct	3	0
18-Oct	12	0	18-Oct	3	0
25-Oct	10	0	25-Oct	3	0
1-Nov	36	19	1-Nov	3	0
8-Nov	8	0	8-Nov	3 3 3 3 3	0
15-Nov	15	3	15-Nov		0
22-Nov	14	0	22-Nov	4	0
29-Nov	5	0	29-Nov	6	0
6-Dec	9	0	6-Dec	4	0
13-Dec	10	1	13-Dec	5	0
20-Dec	40	15	20-Dec	4	0
27-Dec	XX	XX	27-Dec	6	0
		Tuesda	ay Nets		
2	28.380 MHz		:	28.800 MHz	
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
5-Oct	7	0	5-Oct	XX	0
12-Oct	10	1	12-Oct	XX	0
19-Oct	12	1	19-Oct	XX	0
26-Oct	5	0	26-Oct	XX	0
2-Nov	11	1	2-Nov	XX	Ō
9-Nov	11	Ó	9-Nov	XX	Ō
16-Nov	5	Ō	16-Nov	XX	Ō
23-Nov	10	Õ	23-Nov	XX	Õ
30-Nov	12	2	30-Nov	XX	Õ
7-Dec	9	1	7-Dec	XX	Õ
14-Dec	10	2	14-Dec	XX	Õ
21-Dec	35	10	21-Dec	XX	0 0
28-Dec	11	1	28-Dec	XX	Ő
20 000			20 000	~~~	0

		Wednes	day Nets		
'	28.380 MHz TOTAL			28.800 MHz	
DATE 6-Oct	6	0	DATE 6-Oct	TOTAL XX	NO 10# 0
13-Oct	5	0	13-Oct	XX	0
20-Oct	9	0	20-Oct	XX	ŏ
27-Oct	7	ŏ	27-Oct	XX	ŏ
3-Nov	22	13	3-Nov	XX	ŏ
10-Nov	25	12	10-Nov	XX	Ō
17-Nov	9	0	17-Nov	XX	0
24-Nov	13	2	24-Nov	XX	0
1-Dec	10	4	1-Dec	XX	0
8-Dec	8	0	8-Dec	XX	0
15-Dec	39	14	15-Dec	XX	0
22-Dec	47	14	22-Dec	4	0
29-Dec	12	0	29-Dec	XX	0
			ay Nets		
	28.380 MHz			28.800 MHz	
DATE		NO 10#	DATE	TOTAL	
7-Oct	10	0	7-Oct	7	2
14-Oct 21-Oct	8 8	0	14-Oct 21-Oct	5 9	2
28-Oct	8	1	28-Oct	8	2 2 3 2 2 2
4-Nov	7	2	20-001 4-Nov	5	2
11-Nov	4	ō	11-Nov	6	2
18-Nov	7	0	18-Nov	4	1
25-Nov	XX	XX	25-Nov	3	1
2-Dec	25	11	2-Dec	3	1
9-Dec	8	0	9-Dec	6	3
16-Dec	27	16	16-Dec	4	2
23-Dec	30	10	23-Dec	7	2 2 2
30-Dec	24	8	30-Dec	6	2
		Frida	y Nets		
	28.380 MHz	 NO 40#		28.800 MHz	
DATE 1-Oct		NO 10#	DATE		NO 10#
8-Oct	XX XX	0 0	1-Oct	8 8	0 0
15-Oct	XX	0	8-Oct 15-Oct	11	0
22-Oct	XX	0	22-Oct	9	0
29-Oct	XX	ŏ	29-Oct	12	ŏ
5-Nov	XX	ŏ	5-Nov	12	ŏ
12-Nov	XX	Ō	12-Nov	8	Ō
19-Nov	XX	0	19-Nov	10	0
26-Nov	XX	0	26-Nov	6	0
3-Dec	XX	0	3-Dec	7	0
10-Dec	XX	0	10-Dec	9	0
17-Dec	XX	0	17-Dec	6	1
24-Dec	XX	0	24-Dec	17	4
31-Dec	XX		31-Dec	8	0

		Saturd	ay Nets		
	-28.380 MHz			28.800 MHz	
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
2-Oct	8	0	2-Oct	XX	0
9-Oct	3	0	9-Oct	XX	0
16-Oct	7	0	16-Oct	XX	0
23-Oct	8	0	23-Oct	XX	0
30-Oct	11	2	30-Oct	XX	0
6-Nov	5	0	6-Nov	XX	0
13-Nov	XX	0	13-Nov	XX	0
20-Nov	10	0	20-Nov	XX	0
27-Nov	XX	0	27-Nov	XX	0
4-Dec	XX	0	4-Dec	XX	0
11-Dec	9	3	11-Dec	XX	0
18-Dec	24	10	18-Dec	XX	0
25-Dec	22	11	25-Dec	XX	0
хх	No Net Calle	d			
XXX	No Report Re	eceived			

### NOTES ON 10-METER ANTENNA TUNERS

Editor's note: This article is a reprint of an article done by L.B. Cebik, W4RNL (SK), #41159 in a previous issue of this newsletter.

There are many excellent tuners (ATUs) on the market that will match at 80 or 160 meters. On 10, the match may be more of an illusion than an effective reality with some designs. If you are a dye-in-the-wool 10-meter operator and use an antenna system that calls for an antenna tuner, you may be better off building your own. So what is wrong with the commercial tuners? (Remember, not all of them are wrong. Compare the points made here with the features you see when you think about buying one.) A number of things go wrong in the designs aimed at covering 160-10 meters.

**1. The basic design:** Most ATUs use a T-network with series capacitors and a shunt inductor, as schematically show in Figure 1.

The design is a high-pass filter and provides little, if any, suppression of harmonic energy. One can argue that we should not rely on the ATU to do the job our rig's output circuitry should be doing. That argument is sound, but if there is a design that will also provide some harmonic energy suppression, it may be preferable. Two designs fill the bill.

Figure 2 shows a PI network with shunt capacitors and a series inductor. It is inherently a low-pass filter.

The circuit in Figure 3 is also a low-pass filter: it is T-circuit with series inductors and a shunt capacitor.

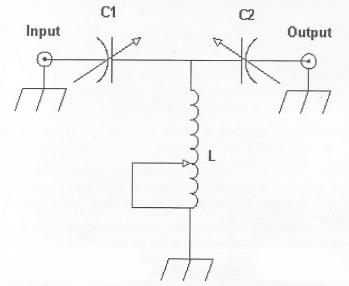
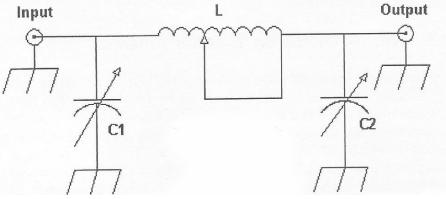


Figure 1. The C-L-C Tee Network



### Figure 2. The PI Network

The reasons for using a series-C (C-L-C) T are cost and size. The components for it are smaller for a given power level, since we can fit a 20+  $\mu$ H coil (rotary or tapped) alongside a pair of 250 pF variable capacitors in a compact case. By contrast, the inductors for the other circuits may require up to and over 30  $\mu$ H, and the capacitor for the series-L (L-C-L) may need values up to 1000 pF. That is, if you want to tune 80 or 160. Moreover, two roller inductors cost more than the 2 capacitors of the C-L-C T circuit.

If you only want to cover 10 meters with your tuner, then the values of the components drop. A 5  $\mu$ H inductor (or 2) and a 250 pF air variable (or 2) give all

## **April 2022**

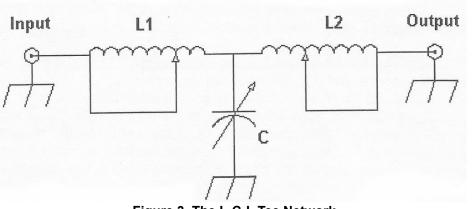


Figure 3. The L-C-L Tee Network

the range anyone should need for 10.

**2. Tapped inductors:** A tapped inductor may to the job you require, but for some antenna situations, you may not be able to find the 1:1 SWR point. That is not fatal if you can find a point under 2:1. However, a good rotary inductor (or 2 in the series-L T circuit) is superior, since there is no required setting that is unavailable to you. You can find some good near bargains in rotary inductors at hamfests. However, inspect them carefully for quality. The same potentials and precautions apply to large variable capacitors.

**3. High-value components:** The higher the highest value of a capacitor or coil, the higher the lowest value. The large frames of high-value rotary inductors may limit the lowest value to well over 1  $\mu$ H. Capacitors are even worse, because the high maximum value does not tell the whole story. Usually, capacitors follow the rule, but you also have to watch out for construction. I have an old military capacitor with a maximum value of 35 pF. Unfortunately, its lowest value is 17 pF. It is built within a set of frame plates that surround the stators and limit how low it can go. By contrast, a 100 pF old E. F. Johnson capacitor in one of my units has a minimum value of about 10 pF. Its supporting metal work consists of two small plates on either end of the unit. If you roll your own, look for the capacitor's minimum value as well as its maximum value.

**4. Closed tight cases:** On ten meters, some commercial ATUs achieve a match more with stray capacitance and inductance the with the higher Q variable components that are supposed to do the work. Steel cases that cut the inductive fields of coils and provide several Pf of shunt capacitance to the other components complicate and usually hinder the basic work of the matching network. A spacious case, however much against the grain of today's stylistic fetish of ultracompactness, is a plus for an ATU.

**5. Poor ground paths:** Ideally, there should be one good ground point for the ATU network. With large components, this condition is often impossible to

attain. However, grounding should be as direct and compact as possible – and a near to the ground lugs of the coax sockets as possible. It should not rely on the bite of a lock washer through a painted surface. A rivet used as a ground connector is a prelude to malfunction. There are no shortcuts to good, short, wide ground paths and good mechanical and electrical connections. They are not expensive, but they do take care.

This list of difficulties is not an indictment of all ATUs. Many units have taken the trouble to be the best they can be as 10 or 160 through 10 meter units. However, you can probably do better yourself. For 10 (or realistically, 10-20 meters), a PI or series-L T circuit is achievable with parts you can obtain from hamfests. A PI might use a 5 to 10  $\mu$ H inductor with a pair of 5 to 10  $\mu$ H rotary inductors and a couple of 250 or 300 pF variable capacitors, with a switch to bring them into play either one or both at a time. A surplus or home brew case with plenty of room helps ensure that strays are minimized, as do well-planned ground paths. Consider a plexiglass case for the ultimate in avoidance of strays. And, of course, pay special attention to the routing of the common ground paths.

Remember, multiband is not always the most efficient, even fi it is the most compact. The bands that take the beating are the ones at the high and low ends of the multiband range, Then meters, unfortunately, is one of those ends. Hence, if you use a 10-meter antenna system calling for an ATU, consider building yourself a customized unit with all the advantages and none of the difficulties of the general purpose tuners.

## **10 Meter Beacons**

As 10 meter operators one should be aware propagation beacon frequencies are coordinated.

I would appreciate a message from anyone with thoughts of activating a beacon. <u>wi5v.be@gmail.com</u>

73 Dennis Stice WI5V #35806

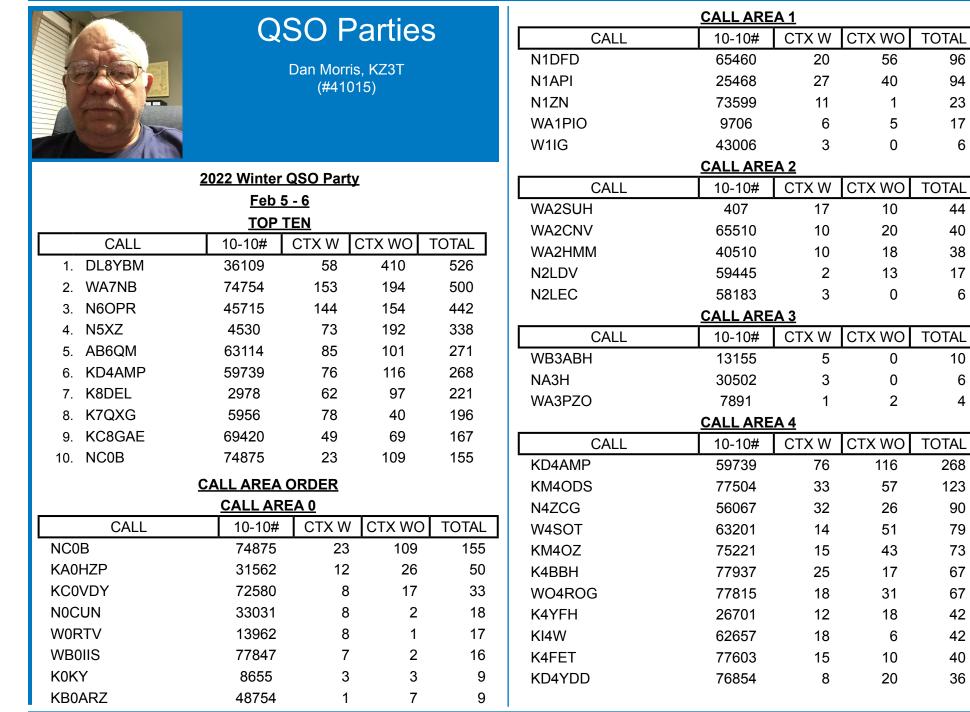
IARU Region 2 HF Beacon Coordinator

https://wi5v.net/author/wi5v

### ARTICLES

There is always a need for articles in the News. There have been a couple requests for Do-It-Yourself articles. If you have something you would like to see in print please feel free to submit it. The most popular articles seem to be those relating to antennas, DIY projects, and kit building. Send your submissions to editor@ten-ten.org.

### **April 2022**



CALL AREA 4 (Cont.)					
CALL	10-10#	CTX W	CTX WO	TOTAL	
N3GTY	50585	14	4	32	
AK4YS	75328	12	5	29	
WA4JA	72743	9	8	26	
KM4AEM	77309	6	4	16	
KK4AMR	76031	3	7	13	
KA5VZG	46596	4	2	10	
KZ3T	41015	4	2	10	
KX5U	34669	3	0	6	
	CALL ARE	A 5			
CALL	10-10#	CTX W	CTX WO	TOTAL	
N5XZ	4530	73	192	338	
N5MT	24949	29	53	111	
KG5ZMQ	77628	30	50	110	
W5SUM	2019	20	30	70	
WB5CMI	8292	21	27	69	
KD5DE	33513	21	7	49	
W2ODH	30859	5	23	33	
KD5ILA	77652	10	12	32	
KM5FF	50356	7	3	17	
AD5IF	73372	3	4	10	
KG5SSB	77934	3	0	6	
KM5EH	71103	2	0	4	
	CALL ARE	A 6			
CALL	10-10#	CTX W	CTX WO	TOTAL	
AB6QM	63114	85	101	271	
WB6IZG	55393	53	22	128	
W6DAS	17309	36	22	94	
N7WLC	63782	28	24	80	
K6ME	8780	13	17	43	
W6JBR	75351	10	5	25	

CAI	LL AREA 6	<u>(Cont.)</u>		
CALL	10-10#	CTX W	CTX WO	TOTAL
KS6F	59191	8	5	21
W6ZAR	77554	10	1	21
N6GP	21149	8	4	20
KE6FQC	69047	9	0	18
	CALL ARE	<u>A 7</u>		
CALL	10-10#	CTX W	CTX WO	TOTAL
WA7NB	74754	153	194	500
N6OPR	45715	144	154	442
K7QXG	5956	78	40	196
KE6GFI	72985	32	45	109
AJ7B	7675	28	23	79
N7QOZ	62599	18	11	47
N7AME	27859	9	2	20
W7DSX	77707	7	4	18
WA7WA	14426 3		0 6	
	CALL ARE		. <u> </u>	
CALL	10-10#	CTX W	CTX WO	TOTAL
K8DEL	2978	62	97	221
KC8GAE	69420	49	69	167
K8LL	76801	1	1	3
	CALL ARE			
CALL	10-10#	CTX W	CTX WO	TOTAL
KA9JCP	50609	16	19	51
KC9TQU	77157	4	4	12
NA9A	31121	4	2	10
KC9EOQ	74609	3	1	7
N9TNT	77872	3	1	7
N9CJT	38286	1	4	6
NK9Y	37014	1	1	3

	<u>QRP</u>				<u> </u>	OW POWER	<u>(Cont.)</u>		
CALL	10-10#	CTX W	CTX WO	TOTAL	CALL	10-10#	CTX W	CTX WO	TOTAL
AD5IF	73372	3	4	10	WO4ROG	77815	18	31	67
NK9Y	37014	1	1	3	LU1BJW	39329	11	42	64
	<u>ARGENTI</u>	NA			KA9JCP	50609	16	19	51
CALL	10-10#	CTX W	CTX WO	TOTAL	KA0HZP	31562	12	26	50
LU1BJW	39329	11	42	64	KD5DE	33513	21	7	49
	FRANC	E			N7QOZ	62599	18	11	47
CALL	10-10#	CTX W	CTX WO	TOTAL	WA2SUH	407	17	10	44
F6BXQ	25912	3	30	36	DH1PAL	69212	19	5	43
F6IRG	39399	4	20	28	K6ME	8780	13	17	43
	<u>GERMAN</u>	<u>IY</u>			K4YFH	26701	12	18	42
CALL	10-10#	CTX W	CTX WO	TOTAL	KI4W	62657	18	6	42
DL8YBM	36109	58	410	526	K4FET	77603	15	10	40
DL6DK	39944	34	23	91	WA2CNV	65510	10	20	40
DH1PAL	69212	19	5	43	DF3TE	69610	19	0	38
DF3TE	69610	19	0	38	KD4YDD	76854	8	20	36
	IRELAN	<u>D</u>			KC0VDY	72580	8	17	33
CALL	10-10#	CTX W	CTX WO	TOTAL	W2ODH	30859	5	23	33
EI9HQ	71019	40	29	109	KD5ILA	77652	10	12	32
	LOW POW	/ER			N3GTY	50585	14	4	32
CALL	10-10#	CTX W	CTX WO	TOTAL	AK4YS	75328	12	5	29
AB6QM	63114	85	101	271	F6IRG	39399	4	20	28
KM4ODS	77504	33	57	123	WA4JA	72743	9	8	26
N1API	25468	27	40	94	W6JBR	75351	10	5	25
W6DAS	17309	36	22	94	N1ZN	73599	11	1	23
N4ZCG	56067	32	26	90	KS6F	59191	8	5	21
N7WLC	63782	28	24	80	W6ZAR	77554	10	1	21
AJ7B	7675	28	23	79	N6GP	21149	8	4	20
KM4OZ	75221	15	43	73	N7AME	27859	9	2	20
W5SUM	2019	20	30	70	KE6FQC	69047	9	0	18
WB5CMI	8292	21	27	69	NOCUN	33031	8	2	18
K4BBH	77937	25	17	67	W7DSX	77707	7	4	18
unut ton ton ora	TO	-				Ly Note 20 200 8	00.000.000	- of 49007 (ov	oont Sunday

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## **April 2022**

LOW POWER (Cont.)				HIG		<u>ER (Cont.)</u>		-	
CALL	10-10#	CTX W	CTX WO	TOTAL	CALL	10-10#	# CTX W	CTX WO	TOTAL
KM5FF	50356	7	3	17	K8DEL	2978	62	97	221
N2LDV	59445	2	13	17	K7QXG	5956	78	40	196
WORTV	13962	8	1	17	KC8GAE	69420	49	69	167
WA1PIO	9706	6	5	17	NC0B	74875	23	109	155
KM4AEM	77309	6	4	16	WB6IZG	55393	53	22	128
WB0IIS	77847	7	2	16	N5MT	24949	29	53	111
KK4AMR	76031	3	7	13	KG5ZMQ	77628	30	50	110
KC9TQU	77157	4	4	12	EI9HQ	71019	40	29	109
KA5VZG	46596	4	2	10	KE6GFI	72985	32	45	109
KZ3T	41015	4	2	10	N1DFD	65460	20	56	96
WB3ABH	13155	5	0	10	DL6DK	39944	34	23	91
K0KY	8655	3	3	9	W4SOT	63201	14	51	79
KB0ARZ	48754	1	7	9	WA2HMM	40510	10	18	38
N9TNT	77872	3	1	7	F6BXQ	25912	3	30	36
KG5SSB	77934	3	0	6	NA9A	31121	4	2	10
KX5U	34669	3	0	6	KC9EOQ	74609	3	1	7
N2LEC	58183	3	0	6	СНАРТ	ER ENT	RIES		
N9CJT	38286	1	4	6	CHAPTER			PTS	
NA3H	30502	3	0	6	NEANDERTHAL			429	
W1IG	43006	3	0	6	POSSUM TROT		13	722	
WA7WA	14426	3	0	6	HOUSTON SHOT	F	6	570	
KM5EH	71103	2	0	4	MLB		1	442	
WA3PZO	7891	1	2	4	CATT		4	376	
K8LL	76801	1	1	3					
	<u>HIGH POW</u>				STEAMBOAT		10	347	
CALL	10-10#	CTX W	CTX WO	TOTAL	CASTLE CRAIG		6	211	
DL8YBM	36109	58	410	526	OREGON TRAIL		1	196	
WA7NB	74754	153	194	500	GATEWAY		5	113	
N6OPR	45715	144	154	442	CHIEF SEATTLE		1	79	
N5XZ	4530	73	192	338	TANGO		1	64	
KD4AMP	59739	76	116	268	MILWAUKEE		1	51	

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_	<u>CHAP</u>	TER EN	TRIES (Co	<u>nt.)</u>				<u>CHEC</u>	<u>K LOGS</u>		
ſ	CHAP	TER	LOGS	S PTS	5	CALL	10-10#	CTX W	CTX WO	TOTAL	OPS
-	NM MUD DU	JCKS	1	17	7	NC6R	0	83	115	281	0
	CITY OF LIC	GHTS	1	10	)	W5FMH	77568	7	17	31	KJ0D
		CLUE	B ENTRIES			KA3MTT	73110	10	9	29	0
CALL	10-10#	CTX W	CTX WO	TOTAL	OPS	VE3RVZ	0	12	1	25	0
DF0IA	68914	58	410	526	DL8YBM	N5VAV	59692	7	10	24	0
N4SVC	75836	76	116	268	KD4AMP	KK4TBC	0	11	1	23	0
K4MN	24874	33	57	123	KM4ODS	ZL4YL	0	10	2	22	0
NM5H	68588	29	53	111	N5MT	K7AEZ	0	4	8	16	0
W1NRG	29650	27	40	94	N1API	WB5WAJ	26676	7	1	15	0
<b>DL0BIC</b>	77526	34	23	91	DL6DK	W6ZE	18000	5	1	11	N6GP
W5RRV	42114	21	7	49	KD5DE	WA2UBK	549	5	0	10	0
DK0DWK	73418	19	0	38	DH1PAL	K6KTS	0	4	1	9	0
DK0HHC	73417	19	0	38	DH1PAL						
DL0KAC	73416	19	0	38	DF3TE						
NZ4FF	77686	14	4	32	N3GTY	I					

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THE AMATEURS CODE

by Paul M. Segal, W9EEA (1928)

The Radio Amateur is:

CONSIDERATE..... never knowingly operating in such a way as to lessen the pleasure of others.

LOYAL..... offering loyalty, encouragement and support to other amateurs, local clubs and the American Radio Relay League, through which Amateur Radio in the United States is represented nationally and internationally.

PROGRESSIVE..... with knowledge abreast of science, a well built and efficient station, and operation beyond reproach.

FRIENDLY..... with slow and patient operation when requested, friendly advice and counsel to the beginner, kindly assistance, co-operation and consideration for the interests of others. These are the hallmarks of the amateur spirit.

BALANCED..... Radio is an avocation, never interfering with duties owed to family, job, school or community.

PATRIOTIC..... with station and skill always ready for service to country and community.

## TEN-TEN AWARDS

To apply for any 10-10 Award, paid-up membership is mandatory. You are not required to send in proof as the Awards Manager has the current membership database. All contacts made for any award must be legal 10-10 contacts (a full exchange of Call, Name, QTH and 10-10 number from BOTH members). An application listing the rules for each award is available from the appropriate Awards Manager listed at the end of the award listings. Please send your request with a #10 (business size) envelope, self addressed and stamped with one unit of first class postage (or enclose one IRC for GB Award), to the Award Manager for the Award you are interested in obtaining. Please no phone calls to Award Managers for an application or list of rules. Contact requirements and rules for all Awards are available on the 10-10 website at www.ten-ten.org

	<u>TOP TEN</u>	<u>I HONOR ROLL</u>			<u>TOP</u>	TEN CLUB	
No.	CONTACTS	CALL	10-10#	No.	CONTACTS	CALL	10-10#
1.	24600	WA5JDU	3017	1.	10100	WD0SFT	37933
2.	11700	K0PV	9902	2.	4400	K6MQ	K6MQ
3.	11700	N5XZ	4530	3.	3400	DL0X	DL0X
4.	11300	DL8YBM	36109	4.	2100	W8PGW	W8PGW
5.	10600	N1API	25468	5.	1800	W1NRG	W1NRG
6.	10000	K6PZE	1341	6.	1200	NM5MD	NM5MD
7.	9800	N5DAS	35877	7.	1100	W4MNM	W4MNM
8.	8800	AC6FU	10937				
9.	8300	N6OPR	45715				
10.	8200	K5FBS	48461				
	AWARDS MANAGERS						
Bar 1000+	900 Dan Morris,KZ3T Tony Lisnak, N2V Open						Ibmorris315@gmail.com lisnak@optonline.net

VP WAS Open	
VP Lucky 13 Dan Morris KZ3T #41015	dbmorris315@gmail.com
WAC	kevinemtid@tvcconnect.net
Counties Mark Tatlor Murphy, KC4HIT #57488 . PO Box 936, Conover, NC 28613-0936	<u>kc4hit@gmail.com</u>
Countries Mike Davidson, N5MT #24949 26274 Whispering Pines Ave, Denham Springs, LA 70726 (713) 417-4727	N5MT@aol.com
CW Lee Zalaznik, KI6OY #50948 334 Olivina Ave., Livermore, CA 94551-6137	lee.zalaznik@sbcglobal.net
Digital Mel Sojka, KD5DE #33513	kd5de@nwla.com
Mobile Open	
OM/XYL Marcus Lieberman, KM5EH #711032300 Hurley Drive NW, Albuqerque, NM 87120-1013 (505) 836-1724	<u>buckml@lobo.net</u>
WAS Eva Donaldson, WBoCON #53964 12933 W Montana Drive, Lakewood, CO 80228-4244 (303) 989-0475	wb0con@comcast.net
WPX Ed Bryant, KM5FF, #50356	elbble@gmail.com
GB Counties Mike Crawshaw, G4BLH #18446 35 Edward Drive, Clitheroe, Lancashire, England BB7 1EF No Phone	g4blh@zen.co.uk

## ELECTION 2022 CALL FOR NOMINATIONS

10-10 International holds an election every two years. In the year 2022 we will be electing the President, and three (3) Directors, whose terms will commence January 2023. The organization does not run itself, so if you have ever thought about participating in the running of our organization, this is a great opportunity to do so! Nominations must be sent to the Nomination Committee prior to May 1, 2022.

The Nominating Committee develops a slate of eligible candidates by May 15, 2022. The chairman of the committee will provide each potential nominee with information regarding eligibility and specifying the information required by the committee. The chairman of the committee will notify members selected by the Nominating Committee, in writing. Members not selected by the committee may petition for candidacy by having a petition signed by 50 full members and presented to the Secretary by June 15, 2022. A nomination information form is required and is available from the Nominations Committee Chairperson. Further questions concerning the election/nomination process may be addressed to Larry Berger, WA2SUH #00407 wa2suh@aol.com.

### **QUALIFICATION FOR NOMINATION TO BE AN OFFICER OR DIRECTOR OF 10-10**

In accord with the bylaws, no member of 10-10 may qualify for nomination to be an Officer or Director of 10-10 unless he or she has been a full member for more than four (4) years immediately preceding his/her Nomination, and that he/she can show that their membership will remain current during the period of the office they are seeking. The Nominating Committee or Petition for Candidacy are the only methods to be used by members who wish to be nominated.

### SELECTION BY THE NOMINATING COMMITTEE

The Nominating Committee is charged with the task of selecting from those who indicate a desire or willingness to serve as an Officer or Director and to form a slate of candidates who the committee believes represent the best qualified candidates from information submitted to the Committee.

### PETITION FOR CANDIDACY

Members and nominees not selected by the nominating committee may petition for candidacy. Such petitions shall be signed by 50 current members and submitted to the Secretary by June 15, 2022.

### **BIOGRAPHICAL SKETCH**

All Candidates, whether selected by the Nominating Committee or by Petition, must submit a biographical information form and biographical sketch. The Nominating Committee will use this information in the process of selecting a slate of Candidates. Those who petition for nomination must submit a biographical information form to be provided by and returned to the Secretary. This biographical outline, not to exceed 200 words of narrative, shall be printed in the July 2022 issue of the 10-10 News.

### NOTIFICATION OF POTENTIAL NOMINEES

The chair of the Nominating Committee shall notify members selected by the Nominating Committee to be candidates in writing. The chair of the Nominating Committee shall also notify, in writing on or before May 15, 2022, members who are not selected by the nominating committee, and inform them of the proper method of placing their names in nomination by petition.

## **ELECTION TIME LINE**

- Call for Nominations will be printed in the January and April 2022 edition of the 10-10 NEWS.
- I May 2022 Candidates must have names and bios to Nominating Committee.
- Is May 2022 Nominating Committee will develop slate of candidates and notify members who applied but were not selected.
- Is June 2022 Deadline for Petitions for Candidacy to Secretary.
- Ballots and all Candidates' bios to be printed in July 2022 edition of the 10-10 NEWS.
- □ 1 October 2022 "In Hand" Deadline for return of Ballots.
- I November 2022 Election results posted on 10-10 Web Site.
- □ 1 January 2023 Newly elected officers take office.
- Election results posted in January 2023 edition of the 10-10 NEWS.

## Silent Keys

### Mark Steele, KD2NOM (#77596)

It is with sorrow that we note the following Ten-Ten members who are now Silent Keys. We extend our sincere condolences to the families and friends of those SK members whose calls and Ten-Ten numbers will forever be kept in the records of the Ten-Ten Net.

10-10#	Call	Name - City, State
00570	WA8QAA	Roger W. Norman - Gobles, MI
01029	WA5EVW	William R. Harris - Pea Ridge, AR
01344	K1HTN	Bruce C. Beaman - Center Ossipee, NJ
02660	WB4RLU	James L. Arendell - West Palm Beach, FL
02875	W9YJD	Frank N. Chase - Albuquerque, NM
06708	WN3V	John R. Miller - Liverpool, PA
07416	W7UMH	James C. Kaufman - Bellingham, WA
07993	W6ARK	Roger M. Denny - Garden Grove, CA
08626	KE7MP	Francis D. Hurlbut, Jr Sequim, WA
09861	W4GEK	Alton C. Morris, Jr Oak Ridge, TN
10024	WA5FLG	Billy J. Farley - Alamogordo, NM
10811	W4BBN	Robert L. Lovell - Oneonta, AL
11543	W4WNT	William N. Turner - Matthews, NC
11865	AD5O	Lawrence B. Moore - Brandon, MS
13958	<b>WB0NIU</b>	Erik W. Brom - Winona, MN
14139	W2RS	Raphael Soifer - Green Valley, AZ
14628	W4QO	James C. Stafford - Roswell, GA
16825	WB3CBI	John A. Shuey - Tower City, PA
17201	K5QQT	Betty M. Beckstein - Diberville, MS
17516	KC4OJ	William I. Bland - Shepherdsville, KY
21703	WA4IAX	John Byzet - Tupelo, MS
22493	N3KB	Kent A. Badger - Buffalo Township, PA
23676	WW5F	Guy A. Navarro - Alexandria, LA
24282	K9KY	Lloyd R. Fox - Richmond, IN
24653	VE7AVM	Michael A. Holley - Surrey, BC
25067	WA7ND	Raymond R. Conners - Poulsbo, WA
25220	W3TJT	Anthony C. De Nadai - Pen Argyl, PA
25355	NY8R	Leroy F. Gramza - Manistee, MI
27595	WD5CAB	Donald C. Graham - Zavalla, TX
28462	KC5YM	Paticia S. De Sain - Longview, TX
28747	KD3N	James R. Joy - Frederick, MD
28785	KB3GN	George L. Roberts, Jr Frederick, MD
29777	K4VAI	Gene B. Robbins - Richmond, KY
32259	N5BEO	Billy G. McMillan - Lucedale, MS
33152	WB9NYG	Russell R. Fleming - Waunakee, WI
33155	W9YEL	Paul E. Brower - Columbia City, IN

10-10#	Call	Name - City, State
34684	WB5AKR	Larry G. Clark - Meridian, MS
34829	KA2LIM	Kenneth E. Kent - Pine Valley, NY
35189	W9OIG	Arthur A. Bierman - Lincolnshire, IL
36547	NOTW	Terry R. Webb - Monticello, FL
37248	KA5OST	Jay M. Hoffman - Round Rock, TX
37289	NM5Z	David L. Pickard - McComb, MS
38150	KX8Q	Robert A. Cook, Jr Napoleon, OH
38509	N7CFA	Edward C. Hayes - Vancouver, WA
38516	NU7D	Randy D. Greeley - Longview, WA
40238	VE3MR	Mark Rosenthal - Toronto, ON
40404	K1CN	William R. Welch - Woodstock, VT
40647	WG7Y	Robert E. Davis - Gillette, WY
41434	K5SNA	Larry L. Warner, Sr Harlingen, TX
41841	KB4CRT	John P. Silberman - Micanopy, FL
42158	WB5AAA	James D. Barron - Breaux Bridge, LA
43756	KA7CSP	Kyle Pugh - Spokane, WA
44946	N7AM	David E. Wells - Pima, AZ
45271	KA1MTM	Charles W. Matthews - Swanzey, NH
46377	WD6DFH	Jon T. Goss - Eugene, OR
46379	KK6LK	Jack F. Green - Dinuba, CA
46701	KE9OI	David L. Czerniak - Wheatfield, IN
48002	N3JSP	Norman L. Goldinger - Freeport, PA
48746	NOEOF	Mark S. Ebert - Park Hills, MO
50190	AA6MV	Lawrence H. Selman - Santa Cruz, CA
50786	KA4N	Bennett J. Begnaud - Nashville, TN
52216	N4VGY	Wayne F. Smith - Carthage, TN
53457 53501	N3FSN K9OWQ	Gary R. Redmore - Sarver, PA
54460	W2GFM	William V. Peterson - Tinley Park, IL Gerald F. Moses - Lee, FL
55000	KA1EPT	Dominick J. Menditto - Cary Plantation, ME
55092	KT1I	Charles R. Cayen - Bow, NH
58027	NA7AZ	Frederick R. Fitzgerald - Peoria, AZ
58483	WR3J	Larry W. Herring - Pikesville, MD
59434	W2WK	William J. Koeth - Piscataway, NJ
60422	N4ENE	David L. Purifoy, Jr New Bern, NC
62158	KS5L	Robert D. Riska - Carrollton, TX
63936	N1MEO	Fletcher W. Seagroves, Jr Milford, NH
67196	KD1R	Ralph T. Stetson, III - Westford, VT
68558	K90EE	Robert E. Kopacek - Cary, IL
69307	KR4R	Johnnie M. Ritter, Jr Dover, FL
70510	WA4SEX	Donna J. O'Brien - Dallas, GA
70712	N9EH	Ellis G. Hygema - Warsaw, IN
72055	N3TO	Robert B. Short - Derwood, MD
72258	W3ARS	Clinton A. Brosenne, Sr Shelby, NC
72576	K4IB	William P. Arnold, III - Charlottesville, VA
73397	KJ9R	Joseph P. Randle - Fort Wayne, IN
73590	KI4SP	Jack A. Belew, Jr Florence, AL

**April 2022** 

10-10#	Call	Name - City, State
73858	KC0JCA	Charles F. Spitler - Desoto, MO
74785	WD5CAE	Melvin J. Simon - New Iberia, LA
74918	W1GWN	Warren M. Zapol - Falmouth, MA
76363	WA9VIQ	John M. Ward - Tavares, FL
76447	WB0PYF	Ray Myers - Saint Louis, MO

76790 NC5IR Richard S. Barnes - Friendswood, TX 76857 KD5BQT Danny Burris - Smithdale, MS

76857 KD5BQT Danny Burris - Smithdale, MS Thanks to Lee - K2HAT - #76138 for his efforts in helping me keep the sk

column as up to date as possible.

Mark 73, KD2NOM #77596

# **Meet The Volunteers**

A year-long event to find and make contact with all of the people who devote time to keep 10-10 an active organization! The goal? Make contact with each of the following volunteers during 2022

AJ7B, Randy	Editor	N5MT, Mike	Awards - DX
G4BLH, Mike		N6OPR, Bob	
K1IEB, Tim	Net Control	N7YG, Jeff	
K5BKT, Peg	Committee Member	N9AC, Gerald	W6OI Trustee
K6RDK, Dave		NP2MR, David	Committee Member
K7CWS, Ray		NS6X, John	Committee Member
KA0ZPP, Jim		NZ1I, Kevin	Awards – WAC
KD2NOM, Mark	Director	VA7GY, Garry	Committee Member
KD5DE, Mel	President	VE3MEW, Bill	Committee Member
KG5RJ, Greg	Committee Member	W2FDH, Frank	Committee Member
KI6OY, Lee	Awards-CW	W4SOT, Robert	Net Control
KJ5SZ, Hugo	General Counsel	W5DJT , David	Committee Member
KM4ODS, George	Director	W5SUM, Ronnie	Vice President / Secretary
KM5EH, Marcus	Director	W7WHB, Steve	Net Control
KM5FF, Ed	Awards-WPX	W9HT, Joshua	Committee Member
KR7RK, Keith,	Treasurer	WA2SUH, Larry	Director
KZ3T, Dan	QSO Party Manager	WB0CON, Eva	Awards – WAS
N2WIE, Tony	Awards-1000+ Bars	WB6OJB, Arnold	Net Control

RULES FOR THIS EVENT AVAILABLE AT WWW.TEN-TEN.ORG IN THE QSO PARTY HANDBOOK

## April 2022

## The V-Yagi

Editor's note: This article is a reprint of an article done by L.B. Cebik, W4RNL (SK), #41159 in a previous issue of this newsletter.

In May, 1998, QST, NW3Z and WA3FET published an interesting 3-element beam for 40 meters, using one tubular element and two wire elements. The result was a light weight (for that band) beam with excellent SWR and F-B characteristics. It superficially resembled an old design by Dick Bird, G4ZU, but had been optimized for performance resembling that of a Moxon rectangle: great F-B ratio, wide pattern forward, and direct coax feed. However, with an extra element, it had more gain. Why not adapt the design to 10 meter?

As Figure 1 shows, the adapted antenna for 10 meters has decent gain and good front-to-back ratio across the first MHz of the band. The patterns are taken with the antenna modeled at 35'  $(1\lambda)$  up.

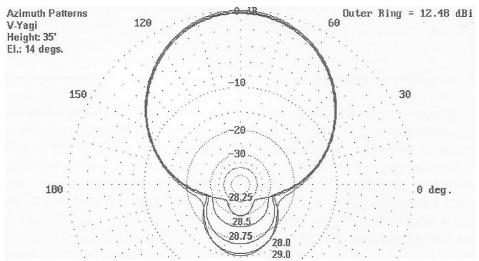
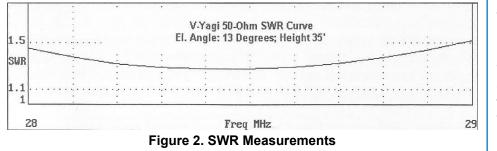


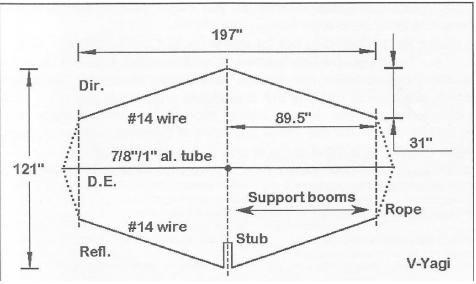
Figure 1. Radiation Patter for V-Yagi

The SWR curve in Figure 2 strongly suggests that direct coax feed is certainly in order. As always, I recommend a choke balun at the feedpoint.



Now that we have seen what the antenna can do, all we need to know is what the antenna looks like and how hard it might be to build. Like all Yagis, it will have significant side-to-side and front-to-back dimension. However, unlike the usual Yagis, only one of the elements will be made from aluminum tubing, while the other two will be made from #14 AWG copper wire.

As the sketch in Figure 3 shows, the driven element is the longest part of the antenna. Overall, it is 197" long, with an insulated mounting plate to permit direct connection of the feedline to the element. The inner parts of the element are 48" lengths of 1" diameter hardware store aluminum, while the outer ends are made from 7/8" diameter tubing from the same source.



### Figure 3. V-Yagi Construction Specifications

The dashed lines crossing the driven element are booms to support the wire elements. They can be made from fiberglass or aluminum, with the center boom stronger, since it is about 12' long. The end support booms can be lighter, but need to support the wire ends. If the end booms are made from aluminum, they should be insulated from the driven element and set farther outward, so that the wire elements can terminate at an insulator. Simple UV resistance rope (3/16" diameter) connects the wire and end-support boom to the driven element ends, which helps prevent the wires from loading the end supports too much.

The wires are each 94.4" long from the center boom to the end (at an insulator or at the support boom). At the ends, they should be between 30 and 31 inches from the driver. Since both wires are the same length, we need to load one of them to electrically lengthen it to become a reflector. A shorted transmission line stub about 65.55° long will do the job, although you may want to adjust the exact length when tuning up the antenna. The length in degrees translates into

50.125" of RG-58/RG-8 (velocity factor 0.66) line. You can use standard stub equations to calculate the length of 300-Ohm or 450-Ohm line as a substitute.

The V-Yagi will not give all of the gain that a 12' boom is capable of giving if the elements were linear and fatter. In fact, this antenna is about 1 dB shy of maximum gain for the boom length. On the plus side of the ledger, the antenna is quite light, sturdy, and has a smaller turn radius, since the corners are shortened by the slope of the director and reflector wires. A TV rotator should turn the beam with ease. However, you may not have to turn this beam as often as you might have to turn a standard Yagi, since the beam width is quite a bit wider.

The V-wire for 10 meters is not for everyone, not even for every addict of home brew antennas. However, I have learned over the years that different folks have different needs, different skills, and access to different materials. So I never try to prejudge which mechanical designs are acceptable and which are not. That attitude would limit folks to only my own level of construction ability. Instead, I pass along ideas for designs, and let those who can make good use of them have at it. Others can pass up this design, hoping for a more suitable one in the next column.

Over the past 7 years or so, we have looked at a lot of antenna ideas. And yet, we have only scratched the surface.

### SOME MISCONCEPTIONS ABOUT SWR

Editor's note: This article is a reprint of an article done by L.B. Cebik, W4RNL, #41159 in a previous issue of this newsletter.

We have all read dozens of articles about SWR. So we all know that the Voltage Standing Wave Ratio is a complex function of the relationship between the feedpoint impedance of our antenna and the characteristic impedance of our transmission line. When the antenna feedpoint impedance is a pure resistance, the relationship is simple: SWR equals the larger of the two divided by the smaller of the two. If the antenna feedpoint exhibits reactance in addition to resistance, then the SWR is higher by a somewhat more complex calculation.

We also all know that generally, the better the match between the load, the transmission line, and the source (our transmitter outputs), the more power is consumed by the load. Hence, it is generally wise to strive for a well-matched antenna-feedline-transmitter system. So we place an SWR meter in the line at or near the transmitter and monitor the SWR at that point.

Despite all this knowledge, I still encounter some interesting misunderstandings about SWR. Of course, they come from outside the 10-10 ranks, so everyone can claim, "Well, I knew better than that." Even so, it may be useful to review a few of them.

**1. My SWR is low, so my transmitter is safe.**" In olden days when tube-type rigs had adjustable output circuits, folks worried about burning out tubes and other components "because" of SWR. Actually, the combination of resistance and reactance seen by the transmitter output circuit would sometimes permit only a small RF transferal. What is not RF in a final is heat, and that excess conversion of DC power to heat is what destroyed tubes and stuff around the tubes.

Today's transistor rigs have feedback circuits that sample the reverse voltage at the output and automatically reduce drive to the finals in the event of a high SWR output load. However, SWR is NOT the only thing that can hurt a rig. Overdrive, with or without SSB compression, is a source of major stresses on a rig's circuitry. However, the chief rig killer seems to be voltage surges coming from the antenna, the power line, or the ground. And that is a matter of safety that calls for measures outside the rig – like disconnecting the antenna, power cord, and system ground to totally isolate the rig when not in use.

2. "My antenna system if fine, because the SWR is better today than when I put it up three years ago." The fact of a lower SWR over time is often true. However, the conclusion drawn is false. If the SWR is lower than it used to be, the chief reason is an increase in losses in the system. Losses represent that portion of energy converted to heat along the line and at the antenna terminals, energy that is no longer available as energy to radiate. As systems age, cables become "lossier," terminals become corroded, and a variety of other things contribute to the problem.

Yes, a lowering of SWR can indicate problems, not improvements. It is not impossible, but it is exceedingly rare for an antenna system to change its feedpoint impedance to match the transmission line. It is so rare that the lowering of SWR with time should always be taken as a sign that it is time for antenna system maintenance. Clean, deoxidize, tighten, and seal, as appropriate. If things do not improve, replace the outdoor coax with new stock (but save the old stuff for noncritical uses if it has any life left in it).

**3.** "My antenna is operating very well because my SWR is a perfect 1:1 match." Unfortunately, my dummy load gives nearly perfect 1:1 match, and I cannot hear anyone when it is in the line. SWR is one measure of impedance match, but it is not an indicator of the quality of antenna performance as an antenna. Antennas convert radio frequency energy – a form of AC voltage and current – into electro-magnetic radiation (and also the reverse for reception); and they also manage to focus that radiation in various patterns. How well an antenna does this job is only indirectly connected with the impedance match to the transmission line carrying the energy to be converted and directed.

The practical consequences of this fact are pretty basic. First, before committing to an antenna, try to determine what kind of operating you want to do and select an antenna that will enhance that operation – within limits of what you can handle in terms of finances, maintenance, and home site restrictions.

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Second, maintain your antenna regularly – even more regularly that most folks change automobile oil. Preventative maintenance will keep your antenna operating to its maximum ability. Third, if you build your own antenna for a longterm installation, use sensible quality materials. Stainless steel hardware is a must. Tubing and wire made for antennas or equally strong and conductive are necessary. Applying No-Ox or similar antioxidation conduction materials at connections of dissimilar metals is always a good idea.

4. "My antenna has a feedpoint impedance of 100 ohms. Surely 50-ohm coax will give me lower losses than the more highly mismatched 450-ohm parallel feedline." This misconception stems from the belief that SWR is a direct measure of the ability of an antenna to "absorb" energy and convert it into radiation. SWR is only part of the story.

Every transmission line displays two kinds of losses: first is a basic loss based on two significant factors: the ability of the wires to handle RF currents and the leakage between wires through the insulation. Because any coax we can afford compromises cost vs. effectiveness, all common coaxial cables have a higher basic loss per 100 feet than parallel feedline, whether 300-ohm or 450 ohm. In fact, for the HF bands, most parallel feedline has a minuscule loss compared to coax.

The second loss source is a result of SWR – or rather the mismatch that SWR indicates. Since peak voltages climb, leakage increases. Since peak currents climb, heat conversion losses are higher. In effect, SWR puts a multiplier on the transmission line's basic loss. Since coax begins with significant basic losses, additional losses due to SWR are that much more significant. Parallel transmission lines begin with almost insignificant losses, and the same or higher multipliers usually mean that losses are still insignificant. Under some common conditions, a parallel transmission line with a 10:1 SWR may have lower power losses than a coax with a 3:1 SWR. Parallel transmission line is almost always the best bet for multiband wire antennas that require an antenna tuner.

But remember that even a 3:1 SWR on the lower bands, like 80 meters, coax losses will still be too low to worry about. If your 75 meter dipole shows an SWR at the low end of 80 within the limits of your rig's built-in antenna tuner to handle and you would like to work a little CW, go for it.

## 5. "My meter shows the reflected power to be 25 watts. I'm worried about losing that power at the antenna and what it must be doing to my rig."

Most folks who see these kinds of readings have never looked seriously at their forward power under the same conditions. Suppose you set your rig to exactly 100 watts output. Your reflect power reads 25 watts on a decent meter. Your forward power will read at least 125 watts – perhaps a couple of watts more to account for the cable losses just described (and your rig will be putting out about 102 watts). The difference is 100 watts. Where is it – and where did the extra forward power come from?

The reflected power simply returns to the forward direction and adds to the rig's power along the line. No need to worry about the rig, since it is not affected by the reflected power except as the reverse voltage may activate may activate a power reduction circuit). The antenna is receiving and converting 100 watts of power (less only the very small among changed to heat due to cable losses). A receiving station cannot tell the difference in signal strength between an exactly matched dipole and one running a 10:1 SWR to a parallel feedline and ATU system. The received signal strengths will be the same, assuming the antennas occupied the same transmitting positions with the same propagation conditions. Both antennas converted just about 100 watts of RF energy into radiation. It may take about a dozen cycles for the high SWR system to build to full power and an equal number to return to zero, but when you have millions of cycles per second to use, those few make no difference to the signal intelligence.

I hope these notes help all those "other" folks approach SWR and antennas a little more intelligently. World Radio's Kurt N Sterba occasionally runs into SWR misconceptions, and I assure you that his treatment is far more entertaining than mine – except to the sources of those misconceptions, who are technical writers who ought to know better. He is a good incentive for writers to keep things right and sensible. The best extended treatment of SWR and for SWR misconceptions is still Walt Maxwell's book, Reflections. Unfortunately, it appears to be out of print, although a new edition will appear soon. Mine is too dog-eared to be borrowed. Anything right in these notes belongs to Walt. Anything wrong is likely to be noted by Kurt.

### ARTICLES

If you have a Ten-Ten related adventure/experience you think would be good to share with the other members of the Ten-Ten International organization, please send your story to editor@ten-ten.org.

Event	Dates	Postmark		
Spring Digital	April 23-24	May 2		
Spring CW	May 7-8	May 16		
Open Season	June 4-5	June 13		
Weak Signal	Jul 9-10	July 18		
Summer Phone	Aug. 6-7	Aug. 15		
Sprint	Oct. 10	Oct 18		
Fall CW	Oct. 15-16	Oct. 24		
Fall Digital	Nov. 12-13	Nov. 21		
Anniversary (60)	Jan 1 - Dec 31	Jan 8, 2023		
Meeth the Volunteers	Jan 1 - Dec 31	Jan 8, 2023		

### 2022 Ten-Ten QSO Party Schedule

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## WOULD YOU LIKE TO JOIN 10-10?

### Here is what you need:

1. You must hold a valid amateur operator license.

2. Your valid amateur operator license MUST authorize or qualify you for unsupervised transmitting operations in the ten meter amateur band under your own personal call sign. 3. You must make contact with ten members of 10-10 and submit a log listing all contacts, their 10-10 number, call sign, name (as received on the air), date of contact, and QTH (state/province/country). The contact form and membership application is provided on the page that follows.

4. You must remit dues for one or more year's full membership. Fee schedule and payment information can be found in Section 2 of the page that follows.

### **TYPES OF MEMBERSHIPS**

To become a member either fill out the form on the following page and mail to the Data Manager at the indicated address or go on-line to the 10-10 web page, <u>www.ten-ten.org</u> and follow the links from 'membership' to 'application' and select membership category.

### **Primary Membership**

Primary membership is available with yearly dues, although there is a special incentive available when you pay for three years at once.

### Family Membership

Family membership consists of a primary member and one or more family members who qualify as a 10-10 member (has made the necessary 10 contacts) and who reside at the same location and postal address. Family memberships run concurrently with that of the primary member. Add \$5.00 for each additional family member for each year. Only the primary member will receive a copy of the 10-10 News.

### Life Membership

Life membership is available and may be paid in one lump sum or spread across two or three yeas. For information refer to the "Life Membership Application" form on the web or contact the 10-10 Data Manager.

### Senior Life Membership

Senior life membership is available to anyone who is currently 65 years of age or older. Payment can be made as one lump sum or within a one year period. For information refer to the "Life Membership Application" form on the web or contact the 10-10 Data Manager.

Family Life Membership is no longer available

### **Club Membership**

Club membership is available to any Amateur Radio Organization which holds a valid Amateur Radio License. Application must be made by the club trustee. Dues are the same as the Primary member. No family or life memberships are available. Clubs have all the same rights and privileges as primary members except the right to vote in elections.

### Electronic Membership

Electronic Membership is available to anyone who qualifies for any of the types of membership listed previously. Electronic membership means that all communications, including the 10-10 NEWS, from 10-10 to the qualifying member will be conducted via email distribution. The exception to this policy is when a member qualifies for a certificate from either one of the various QSO Parties or from one of the Awards programs.

### **MEMBERSHIP RENEWALS**

Either fill out on the following page the top half of Section 1, including your 10-10 number and Section 2 and mail to the Data Manager at the indicated address or go on-line to the 10-10 web page <u>www.ten-ten.org</u> and follow the links from 'membership' to 'renew-als' and select the membership category.

### **DATA MANAGER SERVICES**

### Call/Name/Address Changes

All changes are to be sent to the 10-10 Data Manager. Please include your address label (or a copy) with necessary corrections. This also can be accomplished at <u>www.ten-ten.org</u> using the membership/update link.

All payments may be made by Check, or Money Order. Due to banking regulations Credit Cards cannot be accepted for merchandise. Membership Services and Scholarship Donations can be made via credit card using the secure shopping cart at <u>www.</u> <u>ten-ten.org</u>

Mail to:

Data Manager, 10-10 International Net, Inc. 1349 Vernon Terrace San Mateo, CA 94402-3331

### **SCHOLARSHIP DONATIONS**

Donations to the 10-10 Scholarship Foundation are encouraged by our members to help fund three \$2,000 10-10 Scholarships that will be awarded next year. For donations of \$25 or more you are eligible to receive a current year's lapel pin as a thank you gift. To pay by credit card, see the payment information on our website. Your check should be made payable to the 10-10 Scholarship Foundation and sent to the Data Manager (address shown above) or the Scholarship Manager:

> Larry Berger, WA2SUH 10-10 Scholarship Manager 9 Nancy Blvd. Merrick, NY 11566-3119

### 5.2 **10-10 QSO PARTIES**

10-10 QSO Parties are events that are held for fun and to meet old, new and prospective members around the world. The rules listed here are for all general QSO parties. The Spirit of 76 and Open Season QSO Parties are specialty events and do have additional rules. The Anniversary and Meet the Volunteers are year long contact events.

### 5.2.1 WHO IS ELIGIBLE?

QSO Parties are open to all amateurs with operating privileges on the 10 meter band, however, logs will be accepted only from active members as of the date of the event with the following exception: Open Season event logs will be accepted from all amateurs. Other logs received will be handled as check logs. Check logs are used to validate (check) other logs, but do not qualify the sender for any awards. A QSO Party contact log submitted by an Amateur that intentionally submits erroneous contact information to cause errors on membership applications and awards will be considered an invalid log. Ten-Ten will not accept any log of contacts from an Amateur who had his or her membership/1010 number revoked.

### 5.2.2 WHEN ARE THE QSO PARTIES?

There are currently nine QSO Parties held throughout the calendar year:

Winter Phone - held on the first full weekend in February 0001 UTC Saturday through 2359 UTC Sunday. Spring Digital - held on the last full weekend in April. 0001 UTC Saturday through 2359 UTC Sunday. Spring CW - held on the first full weekend in May. 0001 UTC Saturday through 2359 UTC Sunday. Open Season (PSK) - held on the first full weekend in June 0001 UTC Saturday through 2359 UTC Sunday. Weak Signal - held on the second full weekend in July - 0001 UTC Saturday through 2359 UTC Sunday. Summer Phone - held on the first full weekend in August. 0001 UTC Saturday through 2359 UTC Sunday. Sprint - a 24 hour event held on October 10th (10-10). 0001 UTC through 2359 UTC. Fall CW - held on the third full weekend in October. 0001 UTC Saturday through 2359 UTC Sunday. Fall Digital - held on the second full weekend in November.

0001 UTC Saturday through 2359 UTC Sunday.

### 5.2.3 FREQUENCY AND MODES

Direct unassisted contacts only are permitted. Repeater, Satellite, IRLP, Echolink, or any other similar type of assisted contacts are NOT allowed. Based on the appropriate band plan for the country of operator, CW QSO Parties should be operated in the CW area of the 10-meter band and operated using CW only. Digital QSO Parties should be operated in the digital area of the 10-meter band and operated using Digital modes only (RTTY, PSK, etc). Phone QSO Parties must be operated in the PHONE area of the 10-meter band and may be operated using any approved method (SSB, FM, AM). The SPRINT utilizes all operating modes in the 10-meter band.

### 5.2.4 ENTRY CLASSIFICATION

Entrants may submit a log in ANY of the following classifications:

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**QRP:** Includes single station operators and can also include OM/XYL teams or any families or groups of people using individual call signs and 10-10 numbers. CW/Digital/RTTY operations max 5 watts and Phone operations max 10 watts during the entire event.

**LOW POWER:** Same as QRP listed above except that output power for CW/Phone/ Digital/RTTY operations is max 150 watts during the entire event.

*HIGH POWER:* Same as QRP listed above except that output power for CW/Phone/ Digital/RTTY operations is greater than 150 watts during the event.

**CLUB:** A Club must have a valid club station license issued by their National Licensing Authority and must have an active 10-10 membership. Club entries must list the call, name and 10-10 number (if any) for all operators using the club call. Club operations will take place at one location using one set of equipment. Operators entering under a club entry may also enter an individual log for contacts made using their own call sign.

**MOBILE:** A mobile applies to car, truck, RV, motorcycle, boat, airplane or other mode of transportation. Use of a base station antenna, amplifier or commercial power is not permitted. Operation while your vehicle is parked across a county line, occupying two counties, counts as two counties and two contacts. Marine and aeronautical mobiles must be able to establish counties of operation. Safety is paramount while operating mobile. If you are unable to park near multiple county lines due to safety issues (i.e. on a bridge, on a freeway, etc.), please move to the closest area which would provide the best operating conditions and still be able to give out multiple counties. Duplicate entries are allowed when working in multiple counties. In addition to the normal log information provided the County Worked from and County worked must also be included. Mobile stations will receive awards within their own category and will not be included in the individual sections or Top Ten in the World. **Mobile entries will only be accepted for Winter & Summer Phone and 10-10 Sprint QSO Parties.** 

### 5.2.5 TRANSMITTER INFORMATION

An operator may operate mobile, portable or fixed. If they change their exchange QTH during the QSO Party, the operator must show same in their log. The operator may enter a log from one call district, province, or DX country. Multi-transmitters (two or more transmitters operating simultaneously, sharing one call sign) are NOT permitted in any QSO Party. No matter your physical location, your QTH is the location of the transmitting antenna.

### 5.2.6 EXCHANGE

10-10 members send call sign, name, 10-10# and QTH (State, Province or Country). If received exchange does not have a 10-10#, then record a zero (0) in the log.

### 5.2.7 QSO POINTS

Two (2) points are awarded for contacts WITH a 10-10 number. One (1) point is awarded for contacts WITHOUT a 10-10 number. Duplicate entries should be retained in log and show a zero (0) for points. Any log showing 10% or more errors may be handled as a check log. A station may be counted only once regardless of mode except during certain specialty events.

### 5.2.8 CHAPTER SCORE ASSIGNMENT

Any entrant who is a chapter member may assign his/her score to that chapter. QSO Party chapter scores for the Sprint and Open Season may not be assigned.

## **TEN-TEN QSO PARTY RULES**

### 5.2.9 QSO PARTY ENTRIES

Logs shall be forwarded to the QSO Party Manager as identified in the 10-10 NEWS or on the 10-10 web site. It is strongly suggested that logs be sent as soon as possible after the close of the event. It is also recommended that DX logs should be sent AIR Mail to insure they are received in good time. Any logs received with a postmark date AFTER the deadline date will be handled as a check log. Any logs received more than 8 days after the entry deadline, regardless of postmark, will be discarded. LOGS MAY BE SENT VIA Email to tentencontest@ten-ten.org. Q95 files are not a proper format nor are they readable, therefore, they will not be accepted.

### 5.2.9.1 ENTRY DESCRIPTION

Entries must contain a Cover Sheet, Log and Dupe Sheet as described here: COVER SHEET will list the Event Entered, Entry Classification, US Call Area (W0-W9 or DX Country), Chapter Score Assignment (if any), number of contacts and points with 10-10#, number of contacts and points without 10-10#, and total contacts and points claimed. LOGS must be listed in date/time order and list UTC Date, UTC Time, Call, Name, 10-10# (zero (0) if none), QTH and Contact Point Value. A DUPE SHEET is required for any logs exceeding 50 contacts. It may be either a list of all calls contacted in call sign order or hand entered on a dupe sheet grid.

### 5.2.9.2 ENTRY DEADLINES

Entries for all QSO Parties listed EXCEPT the Sprint shall be postmarked no later than 8 calendar days (this will always be a Monday) after the close of the event. Entries for the Sprint (held on 10/10) shall be postmarked no later than October 18th, unless that day falls on a Sunday or holiday, than the postmark deadline shall be October 19th.

### 5.2.10 QSO PARTY RESULTS AND AWARDS

QSO Party results will be posted on the 10-10 web site about 15 days after the closing deadline for the event and also printed in the 10-10 NEWS in the appropriate issue. Awards will be issued by the certificate manager for Top Ten Individual scorers in the World, the top individual scorer in each US Call Area (W0-W9), each DX Country, and for top QRP, LOW POWER, HIGH POWER, CLUB, MOBILE and CHAPTER. Electronic certificates will be sent to the 2nd and 3rd place scorers in these categories.

### 5.2.11 ANNIVERSARY and MEET THE VOLUNTEERS EVENTS

These events run from January 1 0001 UTC to December 31 2359 UTC. In the Anniversary event, entrants may submit a log of contacts with members that have the anniversary year contained in their membership number. Example: 2022 is the 60th anniversary year of 10-10 International Net, Inc. Contact with members containing a "60" in their membership number (i.e., 72060, 69605,66054, 60126, 00607) would count toward the event. Each year the anniversary number changes, making a new group of members the focus of the event and promoting the use of the 10-meter band. All general rules are applicable with the following exceptions: During the calendar year (January 1 through December 31) make legal 10-10 contacts with 10-10 Number, Date, Call Sign, QTH with members containing the anniversary year in their membership number as described above.

In the MEET THE VOLUNTEERS event, entrants may submit a log of contacts with members listed in the 10-10 NEWS as being a 10-10 volunteer. One contact per volunteer is permitted, regardless of mode of contact. In both events, contacts must be made on the 10-meter band with any legal mode (AM, SSB, FM, PSK, CW, etc.). All submitted logs

must contain only one entry for each 10-10 number contacted. Contacts MUST be listed in 10-10 number order and each entry must list the 10-10 Number, Date, Call, Name, QTH and Mode, in that order. These events are for Individual entries as described in section 5.2.4 and certificates will be awarded for the TOP Ten, however all entrants will be listed in the 10-10 NEWS.

Logs MUST be postmarked no later than January 8th of the year following both the Anniversary and Meet the Volunteers events. Only members in good standing (with dues paid) are allowed to submit logs.

### 5.2.12 WEAK SIGNAL QSO PARTY (WSQP)

This event was added to help promote digital activity on the ten-meter band. The event in no way affects or modifies the policies for other scheduled Ten-Ten events. All weak signal modes for this event include: FT/JT/JS8/JS8CALL and any future weak signal mode. No repeater, cross-mode or cross-band contacts allowed.

FT4 (28.180) FT8 (28.074) JT65 (28.076) JS8/JS8CALL (28.078)

Entry categories: QRP – Maximum 10 watts output. Low Power – Maximum 150 watts output.

Exchange: 10-10 members should send call sign, name, 10-10# and QTH (ST/Prov/ Country). Received exchange should include normal exchange for FT/JT/JS8/JS8CALL modes and for extra points name, QTH and 10-10#. Scoring will be 1 point for contacts without a 10-10 number and three (3) points for contacts with a valid 10-10# exchange. NO MULTIPLIERS! All other normal rules apply. Logs shall be forwarded to the QSO Party Manager..

### 5.2.13 10-10 SPRINT (October 10) QSO PARTY

An award will be issued for working all 10 USA Call Districts.

### 5.2.14 W6OI SPECIAL EVENT

#### This event has been postponed until further notice.

This special event operation is where volunteers operate the 10-10 official club stations (W6OI/VE9TEN/DL0X) seeking to work anyone anywhere. Any mode of operation is permitted. Many operators will be authorized to operate W6OI from most US states and VE9TEN from various Provinces/Territories simultaneously. DL0X is operated by Henry, DL8YBM. The purpose is to have fun promoting 10-meter activity making contacts with 10-10 members and of course, non-members. This is a great way to increase membership! Exchange is similar to any 10-10 QSO Party event - name, call, QTH, and 10-10 number if one is available. As contacts are made, provide info on the 10-10 organization and where to find our website - www.ten-ten.org. If anyone wants to volunteer to operate W6OI during this event contact Jerry, N9AC. Members in Canada should contact Rob, VE9KM for permission to operate VE9TEN.

### 5.2.15 FOR MORE INFORMATION

Current information about 10-10 and upcoming 10-10 QSO Parties and events are always available on the 10-10 web site. Cover sheets, logging forms and dupe sheets are also available for downloading or printing at http://www.ten-ten.org. Any unanswered questions regarding the QSO Party rules may be forwarded to the QSO Party Manager.

	QSO P/	ARTY CO	OVER SHEET		
QSO Party (select one):					
<ul> <li>WINTER PHONE</li> <li>SUMMER PHONE</li> </ul>	SPRING CW FALL CW	<ul> <li>SPRING DIGI</li> <li>FALL DIGITAL</li> </ul>			
Contest Exchange:					
Callsign: Nar	ne:	10-10#:	QTH*: in QTH field - counties must show in log		
		or counties operated norm	in Qin held - counties must snow in log		
Entry Information: Name:				_	
Mailing address:				_	
City:			Zip:	_	
State/Province/County: _					
Your e-mail address (for a	contest questions o	nly):			
Call Area (W0-W9) or ARR	L DX Country you	operated from:			
Chapter Assignment, if ar	ny (not valid in Sprint)	:			
Entry Type (check one onl LOW POWER CLUB (if Club station, please	HIGH POWER				
Claimed Score:					
	nber:		X2 =	_	
			X1 =		
Total Contacts:		Tot	tal Pts:	_	
Submitting Logs: MAILED ENTRIES: All submissions must contain this cover sheet (or reasonable facsimile), the log in UTC Date/ Time order, and a dupe sheet in callsign order or in grid format (if more that 50 contacts). Mail to Dan Morris, KZ3T, 3162 Covington Way, Lenoir NC 28654, USA					
EMAILED ENTRIES: All submissions can be in most formats and must additionally include all information from					
this cover sheet either in separate summary or as summary at head of log. Many contest programs do this for you. Dupe sheets are <b>NOT</b> required with an e-mail entry. <b>Q95</b> formats <b>ARE NOT</b> acceptable.					
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