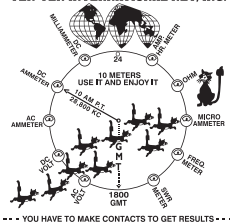


TEN-TEN INTERNATIONAL NET, INC.



# TEN-TEN INTERNATIONAL **NEWS**

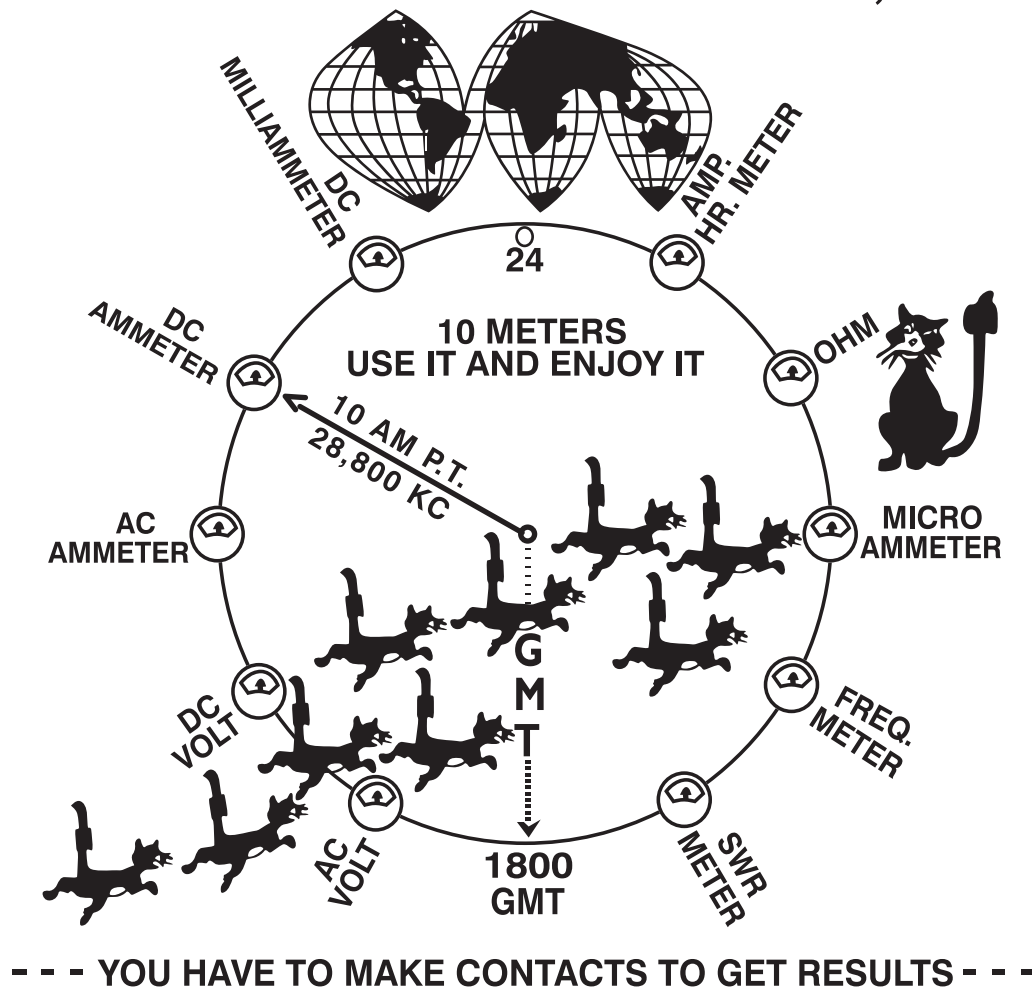


Member  
AMATEUR RADIO  
NEWS SERVICE

Volume 59 Issue 1

January 2021 (Winter)

## TEN-TEN INTERNATIONAL NET, INC.



Official Publication of the Ten-Ten International Net, Inc. - [www.ten-ten.org](http://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.

Each paid-up member will receive a copy. This publication is the property of Ten-Ten International Net and the contributors therein. Permission to reprint is hereby granted, providing suitable credit is shown.

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 March 2021**

**PLEASE MAIL ALL ARTICLES AND PHOTOS TO:**

**EDITOR Ten-Ten News**

**E-mail: [editor@ten-ten.org](mailto:editor@ten-ten.org)**

**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

## CONTENTS

<a href="#"><u>Net Officials.....</u></a>	<a href="#"><u>3</u></a>
<a href="#"><u>From the Editor.....</u></a>	<a href="#"><u>3</u></a>
<a href="#"><u>From the President.....</u></a>	<a href="#"><u>5</u></a>
<a href="#"><u>Chapter Coordinator.....</u></a>	<a href="#"><u>6-7</u></a>
<a href="#"><u>Ten-Ten Net Guide.....</u></a>	<a href="#"><u>7</u></a>
<a href="#"><u>Steamboat Chapter History.....</u></a>	<a href="#"><u>7-8</u></a>
<a href="#"><u>DX News.....</u></a>	<a href="#"><u>9-11</u></a>
<a href="#"><u>3D Printing and Amateur Radio.....</u></a>	<a href="#"><u>11-12</u></a>
<a href="#"><u>Net Report.....</u></a>	<a href="#"><u>13-14</u></a>
<a href="#"><u>QSO Party Results.....</u></a>	<a href="#"><u>15-18</u></a>
<a href="#"><u>Ten-Ten Awards.....</u></a>	<a href="#"><u>19</u></a>
<a href="#"><u>Award Managers.....</u></a>	<a href="#"><u>19</u></a>
<a href="#"><u>Meet the Volunteers.....</u></a>	<a href="#"><u>20</u></a>
<a href="#"><u>10-10 Scholarship Foundation Supporters.....</u></a>	<a href="#"><u>21</u></a>
<a href="#"><u>Antenna System Project Part 3.....</u></a>	<a href="#"><u>22-23</u></a>
<a href="#"><u>Silent Keys.....</u></a>	<a href="#"><u>24-25</u></a>
<a href="#"><u>Multiband v.s. 10-Meter Dipole.....</u></a>	<a href="#"><u>25-26</u></a>
<a href="#"><u>Membership Information and Services.....</u></a>	<a href="#"><u>27</u></a>
<a href="#"><u>QSO Party Rules.....</u></a>	<a href="#"><u>28-29</u></a>
<a href="#"><u>QSO Party Schedule.....</u></a>	<a href="#"><u>30</u></a>
<a href="#"><u>10-10 QSO Party Cover Sheet.....</u></a>	<a href="#"><u>31</u></a>

## OFFICERS AND DIRECTORS

**President**

Mel Sojka, KD5DE #33513 (2022)

353 Atlantic Ave., Shreveport, LA 71150-2909

(318) 286-2963 ..... [kd5de@ten-ten.org](mailto:kd5de@ten-ten.org)

**Past President**

Terry Webb, N0TW, #36547

1103 Fulford Road, Monticello, FL 32344-4352

(614) 216-5334 ..... [n0twterry@yahoo.com](mailto:n0twterry@yahoo.com)

**Vice President/Secretary**

Ronnie Hull, W5SUM, #02019 (2024) - QSO Parties

1855 Shady Lane Dr., Shreveport, LA 711118

(318) 550-8269 ..... [w5sum@comcast.net](mailto:w5sum@comcast.net)

**Treasurer**

Keith Schlottman, KR7RK #63324

6206 E. Pima St., Suite #2, Tucson, AZ 85712

(520) 290-5883 ..... [keithschlottman@gmail.com](mailto:keithschlottman@gmail.com)

**Directors**

Robert L. Farrow, N6OPR #45715 (2024) - Daily Nets

23417 S 180th Street, Gilbert, AZ 85298

(562) 631-1393 ..... [n6opr@msn.com](mailto:n6opr@msn.com)

Larry Berger, WA2SUH #00407 (2024)

9 Nancy Blvd, Merrick, NY 01156-3119

(516) 223-4611 ..... [wa2suh@aol.com](mailto:wa2suh@aol.com)

Mark Steele, KD2NOM #77569 (2024) - Publicity

1 Karen Court, Monroe Township, NJ 08831-4037

(732) 213-0159 ..... [kd2nom@gmail.com](mailto:kd2nom@gmail.com)

Marcus Lieberman, KM5EH #71103 (2022) - Awards

2300 Hurley Dr. NW, Albuquerque, NM 87120-1013

(505) 836-1724 ..... [buckml@lobo.net](mailto:buckml@lobo.net)

Thomas Trissell, KC5ILO #72239 (2022) - Publications

487 County Rd. 1367, Clarksville, TX 75426-3479

(903) 517-1787 ..... [kc5ilo@trissell.net](mailto:kc5ilo@trissell.net)

Jim Fox, KA0ZPP #43428 (2022) - Chapters

PO Box 135, Mayhill, NM 8839-0135

(575) 687-2448 ..... [ka0zpp10ten@gmail.com](mailto:ka0zpp10ten@gmail.com)

**General Counsel**

Hugo Holland, KJ5SZ #77741

10008 Bedlington Court, Shreveport, LA 71118

No Phone ..... [dahugobrit@gmail.com](mailto:dahugobrit@gmail.com)

## NET OFFICIALS

**Chapter Coordinator**

Jim Fox, KA0ZPP #43428  
 PO Box 135, Mayhill, NM 8839-0135  
 (575) 687-2448 ..... [ka0zpp10ten@gmail.com](mailto:ka0zpp10ten@gmail.com)

**Data Manager / Supplies**

David Smith, K6RDK #65812  
 1349 Vernon Terrace, San Mateo CA 94402-3331  
 (650) 504-4962 ..... [membership@ten-ten.org](mailto:membership@ten-ten.org)

**Editor 10-10 International News**

Randy Mather, AJ7B #7675  
 9625 101st Ave NE  
 Arlington, WA 98223 ..... [editor@ten-ten.org](mailto:editor@ten-ten.org)

**Historian**

Ronnie Hull, W5SUM #2019  
 1855 Shady Lane Dr  
 Shreveport, LA 71118 ..... [w5sum@comcast.net](mailto:w5sum@comcast.net)

**Net Manager**

Robert L. Farrow, N6OPR #45715  
 23417 S 180th Street, Gilbert, AZ 85298  
 (562) 631-1393 ..... [N6OPR@msn.com](mailto:N6OPR@msn.com)

**QSL Bureau Manager**

Jim Stoeber, WI9X, #49635  
 8829 Bermuda Ave., Caseyville, IL 62232  
 (618) 560-7098 ..... [wi9x1989@yahoo.com](mailto:wi9x1989@yahoo.com)

**QSO Party Manager/Certificate Manager**

Dan Morris, KZ3T #41015  
 3162 Covington Way, Lenoir, NC 28645  
 (828) 728-5049 ..... [dbmorris315@gmail.com](mailto:dbmorris315@gmail.com)

**IT Manager**

Jeff Steinkamp, N7YG #65084  
 6765 E. Rosewood Cir., Tucson, AZ 85710  
 (520) 546-2290 ..... [n7yg@n7yg.com](mailto:n7yg@n7yg.com)

**Scholarship Manager**

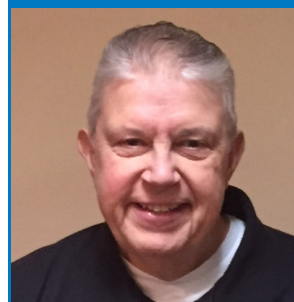
Larry Berger, WA2SUH #00407  
 9 Nancy Blvd., Merrick, NY 11566-3119  
 (516) 223-4611 ..... [wa2suh@aol.com](mailto:wa2suh@aol.com)

**SK Manager/Social Media Manager**

Mark Steele, KD2NOM #77596  
 1 Karen Court, Monroe Township, NJ 08831-4037  
 (732) 213-0159 ..... [kd2nom@gmail.com](mailto:kd2nom@gmail.com)

**W6OI Station Trustee**

Jerry Kopstein N9AC #61453  
 8041 W Lakeshore Drive Burlington, WI 53105  
 (262) 661-9094 ..... [treismine2@yahoo.com](mailto:treismine2@yahoo.com)



# From the Editor

Randy Mather, AJ7B  
 (#7675)

Here we are once again at the start of a new year. We certainly are hoping for 2021 to be a LOT better than 2020. But wait, there's even more hope for us amateur radio hobbyists: A new solar cycle! Yea. It just has to be better than 2020. I know I have high hopes for more on-air activities. So far though, not much has changed on 10 meters. I just need to have some patience.

Along with the new year comes a new person on our board of directors. Please welcome Ronnie Hull (W5SUM #2019) who was elected to the Vice President/Secretary position. As his 10-10 number indicates, Ronnie has been a member a long time. I am sure he will be a good addition to our board. Hey Ronnie. What was 10 meters like back in 1971?

This year we have a new QSO party event. The Weak Signal event replaces the Spirit of 76 event held in July. The Weak Signal QSO party incorporates some of the new amateur radio modes: FT8, JT65, FT 4 and JS8. Make sure you check out the rules for this event on page 25. This is one event I will be sure not to miss this year. Hope you will give it a try.

In this issue we have three "non-recurring" articles from 10-10 members. Ronnie Hull gives us a little bit of a history lesson on the forming of the Steamboat 10-10 chapter. I am sure you will find the story interesting on how he and Mel re-floated the Steamboat. Mark Steele shares with us the world of 3D printing. A fairly new technology that has taken a foothold in the Maker hobby and will have an impact on Amateur radio. As the cost of 3D printers come down, we will see more application in our hobby. I also add another chapter in Antenna System project I started back at the beginning of this year. This chapter describes the remote control aspect of the tuner and the addition of a display for manual tuning.

I would like to take part of this column to tell people who want to get a new license or upgrade, that you can do that from the comfort of your own home. I just recently got VE accreditation from the Greater Los Angeles Amateur Radio Group (GLAARG) for the purpose of helping with on-line amateur radio testing. Next, I joined the Lake Washington Ham Club's VE team. As an on-line operation, people from all over the country can sign up and be tested. If you are interested in signing up for a test session, please contact them at

K7LWH@lakewashingtonhamclub.org. There are many more organizations offering on-line testing. The ARRL website has a list under their link "Find an Online Exam". No need to let the COVID-19 restrictions stop you from upgrading your license.

I hope the new year finds you well and ready to take full advantage of what is sure to be improving propagation. I hope to hear you on 10 meters.

73 - Randy AJ7B #7675

## NEW LIFE MEMBERS

48377	N2IER	Mark E Putman	NY
50203	WF7K	David M McKibben	AZ
73162	AE6FC	Harold W Johnsen	CA
73167	W7LDT	Larry D Taylor	AZ



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!!!



*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**



## From the President

Mel Sojka KD5DE  
#33513

### UPPER-LEVEL QRM

Without a doubt the year 2020 will be one not easily forgotten. Of course, this was not the first time for a world-wide pandemic, but in my lifetime it was. Instant and constant updates and information concerning the crisis made this nearly yearlong event very unique. At this time in early November, every other day a million new cases are being reported. No wonder there is so much anxiety and fear in every corner of the world. The possibility of a vaccine soon is a source of hope and optimism.

Well that is enough of the bad news. Cycle 25 is officially here, there are different opinions among the experts on the start date of the cycle. Personally, I really could care less about that date. What thrills me the most is the rising SFI and the almost constant sunspots this early in the cycle. I have already seen Israel and Tanzania on the FT8 waterfall. From Northwest Louisiana I have completed several FT8 exchanges with stations in Western Europe. This will be my 5th Solar Cycle since I was re-licensed and probably the last. With a degree of excitement, I look forward to working friends in Europe and Oceania once again, and really desire to work one very special person in Sochi. On the downside, we have lost so many during cycle 24 that one is easily saddened. With over 23,000 silent keys many of our well known and active members are no longer with us. Here locally, since the last news, 3 founding members of the Steamboat chapter have passed. One newer member is gone as well. Those of us who have been around for a time need to encourage the newer members to become involved with the activities and awards of 1010.

One of my functions as President is to acquire name badges for our newly elected or appointed officers/officials. After checking the badge data, I found that one of our newly elected directors had already been issued a director's badge. This member always says that he was born with a 1010 number and which is almost accurate. WA2SUH Larry Berger #407 has had a long and active career with 1010. Until 1997 we had call area managers that were responsible for issuing membership numbers within their respective call areas. Larry served in this position from 1979 to 1997. Then from 1998 till 2007 he served as a director. In 2008 he was elected as Vice President and served in that position until 2016. He has mentioned that the only reason he left office was to give newer members

an opportunity to serve. Of course, he has remained as the official responsible for the Scholarship program. He stepped up this past election because we could not acquire enough candidates to fill the vacancies.

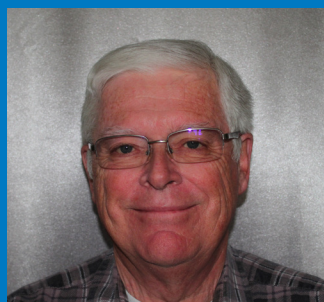
On the subject of election Ronnie Hull, W5SUM #2019 was elected as Vice President/ Secretary, Robert Farrow, N6OPR #45715 remained as Director in charge of the daily nets, Mark Steele, KD2NOM # 77596 was elected as Director in charge of publicity and Larry Berger, WA2SUH #407 will be Director in charge of QSO parties. All these will serve until the end of 2024. The other 3 Directors and the President will serve until December 31, 2022. The 10-meter band should be in good shape by that time. Now would be a great time to consider running for office in the next election.

With the return of better solar conditions and the possibility of activity on 10 meters, there should be more interest in chapters. In the 80's, there were over 125 affiliated chapters. Currently there are only 41. Locally there are about 35 active 1010 members that participate in 1010 related activities. On a Thursday evening net, 15 – 20 will check in. On the first Saturday of every month, we have an informal gathering. I realize there are some who like to be on the top of the heap and rather stand alone, but I do not desire to have a named soccer ball as my only companion. If you reside in a metropolitan area with amateurs in residence, I encourage you to look in to starting a chapter. You may discover that by working with a local amateur club, prospects and activities can be a joint endeavor. Information on forming a local affiliated chapter can be found on the ten-ten web site. In summary, it requires 5 current 1010 members, a member to remain current as the chapter official, weekly nets, and regular reports of net activity.

I waited until after Thanksgiving to finish this article because there was an increase in activity on 10 meters. Some chapters offer certificates, point or award incentives all to promote activity on 10 meters. The day before the Thanksgiving holiday that magic number appeared in the solar flux index. After so many months with an index in the 60's and very few if any sunspots, it was good to see this index value and 40 sunspots. As a result, I have been able to make contacts across the Atlantic with Europe and Africa on CW and FT8. Just checking every day for that to be the case in the phone and FM portion of the band. Hello cycle 25 glad to see you made it.

I suggest you consider using modes that you have not tried yet as the band begins to return to the upside of the solar cycle. Amateur radio is much more than SSB, CW, and RTTY. One thing you will begin to notice once the beacons are available on a regular basis, all the other modes will come into play. There will even be activity at the topside of the band using FM and AM for the purist. Unlike some of the weak signal modes, the traditional modes encourage conversation and promote friendship. On that point, I hope to work many of you during cycle 25 and hopefully meet you at a hamfest when they become possible.

God Bless & 73  
Mel KD5DE #33513



## 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 April, May or June, please let me know before March 1st so I can include the details in the January newsletter.
  - 3) Reminder of Quarterly Reports Due: In Extremis (no report in over a year): Channel Islands. If anyone has knowledge of this chapter's activity, please let me know. Past Due (no report received during the prior quarters when due): Colorado Centennial/Frontier Gang, Cradle of the Confederacy, Down Under, Fort McHenry/Cornerstone/Yoder Kritch, Neanderthal, Route 66, Speedway, Steamboat Plus. Reports received after November 30 (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 fourth quarter: Cincinnati Area Ten Tuners (Jan.), City of Lights (Jan.). Note that Quarterly Chapter Reports may be sent any time. The months indicated here are the dates in 2020 in which the last report was received.
- 4) I thank ALL CH/CM who sent me a complete report during 2020 so I have up to date contact and net information. Other chapters, please send me a complete report in 2021. See [www.ten-ten.org/index.php/resources/ten-ten-documents/ten-ten-forms](http://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](http://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.
  - 5) Poor propagation in recent years has certainly affected Chapter Net activity. If any of you have ideas on ways to increase participation in our Chapters, please contact me at the address given below. One of the primary purposes of Ten-Ten International is to promote activity on this band, especially in such times as these. I welcome your input.

### CHAPTER NEWS

- 1) Several chapters report having to resort to Zoom in lieu of face-to-face chapter meetings.
  - 2) Many chapters and individual members report great success with digital modes during this time of solar minimum. If you have conducted a digital chapter net, let me know the details so I can pass it on.
  - 3) 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)
- Alii – CM WH6S, [wh6s@outlook.com](mailto:wh6s@outlook.com). Use form available from the CM.
- Bauxite – CM K5BKT, [k5bkt@nwla.com](mailto:k5bkt@nwla.com). Bauxite and Arkansas Visitor numbers only.
- Bay Area – CM K6RDK, [k6rdk@arri.net](mailto:k6rdk@arri.net)
- Branding Iron – CM DL6DK, [bic-cm@voits.de](mailto:bic-cm@voits.de)
- Castle Craig – CM N1API, [n1api@cox.net](mailto:n1api@cox.net)
- Chesapeake Bay – CM N3TGB, [n3tgb@aol.com](mailto:n3tgb@aol.com)
- Colorado Centennial/Colorado Frontier Gang – CM WB0CON, [wb0con@comcast.net](http://wb0con@comcast.net)
- Cradle of the Confederacy – CM K4PO, [pcsalley@gmail.com](mailto:pcsalley@gmail.com)
- Down Under – CM ZL1AFU, [zl1afu@nzart.org.nz](mailto:zl1afu@nzart.org.nz)
- Fort McHenry/Cornerstone/Yoder Kritch – CM K3TUJ, [k3tuj@juno.com](mailto:k3tuj@juno.com)
- Gold City – CM K4QHH, [rabisch@hotmail.com](mailto:rabisch@hotmail.com)
- Hanse – CM DL5HAN, [dl5han@t-online.de](mailto:dl5han@t-online.de)
- Houston S.H.O.T – CM N5MT, [n5mt@aol.com](mailto:n5mt@aol.com)
- Louisiana Pelican – CM N5MT, [n5mt@aol.com](mailto:n5mt@aol.com)
- Major League Baseball – CM N6OPR, [n6opr@msn.com](mailto:n6opr@msn.com)
- Neanderthal – CM PA2NJC, [cm.neanderthal@online.de](mailto:cm.neanderthal@online.de)
- New Mexico Mud Ducks – CM KM5EH, [buckml@lobo.net](mailto:buckml@lobo.net)
- North Georgia – CM W4GKF, [10X@chazcone.com](mailto:10X@chazcone.com)
- Oregon Trail– CH/CM K7QXG, [k7qyg2@gmail.com](mailto:k7qyg2@gmail.com)

Speedway – CM W7CAR, [w7car@arri.net](mailto:w7car@arri.net)

Steamboat Plus – CM KD5DE, [kd5de@nwla.com](mailto: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: [ka0zpp10ten@gmail.com](mailto:ka0zpp10ten@gmail.com)

# TEN-TEN NET GUIDE

As of December 1, 2020

DAY	ZSUM	ZWIN	Chapter Name	Location	Freq	DAY	ZSUM	ZWIN	Chapter Name	Location	Freq
SUN	0001	0100	Chesapeake Bay	Chestertown, MD	28345	WED	0001	0100	Castle Craig	Meriden, CT	28375
SUN	1300	1400	Arlington	Arlington, VA	29200	WED	0100	0200	Cincinnati Area Ten Tuners	Milan, IN	28430
SUN	1400	1400	Neanderthal	Leichlingen, DL	28355	WED	0100	0200	Houston SHOT	Houston, TX	28488
SUN	1630	1730	Possum Trot	Raeford, NC	28345	WED	1400	1500	EU DX/Branding Iron/Hanse	Bergamen, DL	28355
SUN	1700	1700	Major League Baseball	Gilbert, AZ	28380	WED	1700	1700	Gold City	Rutherfordton, NC	28425
SUN	1900	2000	Oregon Trail	Dallas, OR	28330	WED	1930	1930	Route-66	Boonville, IN	28370
SUN	1930	1930	North Georgia	Atlanta, GA	28410	THU	0001	0100	Cradle of the Confederacy	Pike Road, AL	28350
SUN	2030	2030	Santa Fe Trail	Galesburg, IL	28345	THU	0100	0200	Gateway	St. Louis, MO	28650
SUN	2100	2200	Possum Trot	Raeford, NC	28150	THU	0100	0100	Cow Town	Arlington, TX	28460
MON	0100	0100	Arizona Desert 10-10 Net	Phoenix, AZ	28445	THU	0100	0200	Milwaukee	Milwaukee, WI	28365
MON	0100	0200	Milwaukee	Milwaukee, WI	28365 CW	THU	0230	0230	Windfarms	Livermore, CA	28450
MON	0100	0100	Lonestar	Arlington, TX	28460	THU	0230	0330	Up The Crick	Eugene, OR	28450
MON	0130	0230	Bauxite	Benton, AR	28470	THU	1930	1930	Speedway	Rainier, OR	28350
MON	1630	1730	Chief Seattle	Seattle, WA	28430	FRI	0001	0100	Fort McHenry/ Cornerstone/Yodar Kritch	Arbutus, MD	28370
TUE	0001	0100	Ft McHenry/ Cornerstone/Yodar Kritch	Arbutus, MD	28370	FRI	0001	0100	Steamboat Plus	Shreveport, LA	28430
TUE	0100	0200	CO Centennial/ CO Frontier Gang	Lakewood, CO	28340	FRI	0300	0400	Chief Seattle	Seattle, WA	28430
TUE	0100	0200	City of Lights	St Charles, IL	28150	FRI	2230	2130	Down Under (Summer in NZ is winter in US)	Auckland, ZL	28530
TUE	0130	0230	City of Lights	St Charles, IL	28720	SAT	1510	1610	Louisiana Pelican	Baton Rouge, LA	28450
TUE	0130	0230	Bauxite	Benton, AR	28470	SAT	1730	1730	Tango	Buenos Aires, LU	28650
TUE	0200	0300	10 Bar X	El Paso, TX	28445	SAT	2200	2200	Alii	Lihue, HI	28730
TUE	0300	0400	Bay Area	Hayward, CA	28475 CW	SAT	1730	1730	Tango	Buenos Aires, LU	28650
TUE	0430	0430	Aloha	Hilo, HI	28490	SAT	2200	2200	Alii	Lihue, HI	28730
TUE	1500	1600	New Mexico Mud Ducks	Albuquerque, NM	28835						

## Steamboat Chapter History

When last I left you, we had discussed the history of Ten-Ten International, up to about 1974. I had become very active on 10-10 in the early 70's, having gotten my own #2019 on February 2, 1971. Grace K5MRU was my first #, and on AM at that. I had graduated to a Hallicrafters HT-37 in summer 1971, then to a Heathkit HW101 in 1972. SSB was taking over and AM was out.

## The Steamboat Chapter is formed in Spring 1975.

There were several locals that were on 10 meters consistently. John K5RNM (N5FJ), Les K5PKV (K5HR), Junior W5SUM (my elmer and my call now) and myself WB5AIA (W5SUM). 10-10 Chapters were springing up. The first paper I collected was from the Raggedy Ann & Andy chapter! Imagine having a certificate with the signature of Worth Gruelle.. the son of Johnny Gruelle, the creator of Raggedy Ann and Andy!! That certificate is dated 5 Jan 1975. My next paper

certificate was from the South Florida OJ chapter. K5RNM, K5PKV and I had regular nightly QSOs on 28.8mhz, and decided we needed our own chapter.

Shreveport, La, being an early river port on the red river with lots of Steamboat traffic in the 1800's through the 1920's, it was only logical that the Chapter name would be The Steamboat Chapter of 10-10 International. John Mussey K5RNM #8285 ( now N5FJ SK ) was #1, Emmett Green W5WNR (SK) was #2 and I ( WB5AIA at the time ) was #3. Original artwork for our certificate was drawn by my then girl friend Barbara. That's a whole 'nuther story, but if you look closely at an original certificate you will see the boat is named The SS Barbara Ann.

The first 10 Charter members, (present calls), were N5FJ #1(SK), W5WNR #2 ( SK), W5SUM #3, WA5UAI #4(SK) , W5AU #5(SK), WB5CMI #6, N5FH #7, K5HR #8(SK), K5SL #9 and KB5LE #10.

Looking back in my old log books, the chapter really took off. Our net was Thursday night on 28.8. It wasn't long until we had 20-25 regulars. We were in the midst of great sun spot activity and we had check-ins from all over the U.S., Canada and the Caribbean. I remember one night after the net, John Les and I turned our power down until we had barely any RF and a fellow from Arizona broke and said "hey I still hear you guys". Man, that was something.

At that point the Steamboat Chapter was just that, you could get our beautiful certificate to put on the wall, check into our nets, but there was no real competition for points, seals, upgrades etc etc. But.. paper chasing had begun. Between 1975 and 1980 the participation waxed and waned. Sadly.. the Steamboat docked and went into mothballs and basically ceased to exist. There were 356 members.

#### Enter Mel KD5DE.

I was working the counter at a local electronics parts store where all the hams hung out. I had met Mel a few years before and we both knew of each others interest in 10 meters and Ten-Ten. In 1980 Mel asked me about the Steamboat and if we could bring it back to life. I sent him to see John N5FJ (ex: K5RNM ) , whose idea the Steamboat had been in the first place, and John gave Mel his blessings to float the boat!

So, we had the rise of the New and Improved Steamboat Chapter, called The Red River Valley Steamboat Chapter, with Mel as the Chapter Head and me as the Certificate Manager. Paper chasing was big at that time, REALLY big.. and our chapter being a 'new' chapter to many, got really popular really fast. Mel really went all out. You could get your number and certificate, but there were Points to be had, sub chapters and seals also. As we began to get new members from all over the country, many were designated as "First State" ( worth extra points ). Soon there were sub categories like the Robert E. Lee, River Rose and Gypsy. Our nets were almost as popular as the Sky Blue Waters net. You could always count on a long net with coast to coast check ins. When we re-floated the boat our nets were on 28.585, but soon we moved to 28.430 in April

of 1987. Also, as the chapter grew nationwide, our local numbers also grew, with sometimes as many as 30 locals in addition to the out of state and occasional dx check ins.

My number at this time #3CLHMFS (Charter Local, Honorary Member, First State ), my Robert E. Lee was #3CLFS, River Rose #4 and my Gypsy was #11FS. My Steamboat WAS is #2FS. We had so much fun. Mel came by my job every afternoon with applications for new members and upgrades for existing members. I would go home from my job and work the Certificate Manager Job.

Mel and I and Glenn N5HUP #40802 SK, took a trip up to Dayton in 1985, my first time there, and there was a HUGE gathering of 10-10'ers and a banquet. I met so many people that I had shared QSOs with over the years but that's for another Newsletter. In 1987 the Steamboat Chapter hosted the first ever 10-10 convention in conjunction with the Shreveport Hamfest. It was an outstanding success and set the standard for many conventions to come.

My own participation became very spotty after the convention due to work, family, children, and life in general. At some point the net was moved to Saturday mornings on 28.430 at 10 am local time. In 2018 we moved the net back to Thursday nights. Mel and I began to push locals again to get active on 10 and it worked. The Steamboat Plus Net has picked up many new members in the last year or so and continues to grow. Presently it is the most active Chapter in Ten-Ten. Our check-ins wax and wane of course, but typically there are anywhere from 12-25 check-ins, mostly locals, but occasionally when the band opens up, we will have some out of state check-ins along with some south Americans.

Currently we have 1702 members!

So, the Steamboat is still making smoke and taking on new passengers! Join us on Thursday nights on 28.430 at 7 pm Central Time. If the band is open, we would be glad to hear your voice!

73 and God Bless  
Ronnie W5SUM #2019

---

#### 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](mailto:editor@ten-ten.org).



## DX News

Mike Davidson, N5MT  
(#24949)

I hope all of our 10-10 members have followed their various health rules to be safe this past quarter. Just as the Fall contest season is starting at the end of October, there has been new Ten meter activity on the radio, with the Sun blooming many new Sun spots that have generated a much higher Solar flux, better Ten meter propagation and Cycle 25 has started! Several members have reported making SSB and FT8 contacts into Europe and Asia the past two months!

The ARRL Ten Meter contest is in twelve days and this contest could give you a better score than previous years and some new DX that you have not heard in a long time. Contest rules do not require you to wear a mask to operate the Ten Meter contest, so good luck with finding a few 10-10 members friends on the 12th and 13th of December.

The fall months are now over, and the winter DX season has started in the USA. Solar Cycle 25 has officially started with a bang and the Sun is now sending out more ionization for better propagation. In one to two years from now, the Sun could be generating enough daily energy to let our Ten-meter signals skip across the oceans on a daily basis! One solar prediction for Cycle 25, has put this one in the top ten of all previous cycles, so we will see what happens.

It has been four plus years since I have heard a new 10-10 country on Ten due to the closing years of Cycle 24. As a result of the present pandemic virus, poor propagation, and a lot of DX ops not traveling far to operate, this situation has made for a lot less info to be reported in my DX article. Any true DX'er will tell you it's all in the chase of finding new countries as the chase is the best fun in finding a new one! There are several DX'ers that are 10-10 members that have talked with more countries than myself. But I may be the only member that has taken the extra effort to swap numbers and put them in the log for future 10-10 paperwork. As for my 10-10 country collecting, I still need 37 countries. For my ARRL countries list, I still need 10 more to complete all countries on Ten Meters. I have chased countries on Ten for 42 years, but I may not get the chance to work them all, due to propagation! DX IS!

Please remember to submit your QSO logs to the free LoTW database at the ARRL website. You can upload your logbook into the LoTW database after you are approved by the ARRL for an account, and yes there is security involved and rules. The only cost is when you apply for an ARRL award using your LoTW contacts for DXCC or WAS.

The US Post Office is not accepting Airmail for forty countries as of the end of November. Sending an airmail QSL can cost several US dollars to get a QSL card. There is NO charge for a 10-10 award at the present time, which is one of your membership perks and 10-10 does not require a QSL card, unlike the ARRL system. The 10-10 Countries Award Manager does follow most of the ARRL rule awards. But you must have swapped your Callsign, Name, State and 10-10 number over the air on Ten, to record that member's information for all 10-10 award applications. So, the honor system has applied for your contacts for all 10-10 awards.

I have talked with 10-10 members that use WSJT and FT8 that can swap their 10-10 info using the TX5 macro in FT8. All you need to do is setup the TX5 tab to send the maximum 13 characters with the info you have saved in TX5. So, type into the TX5 macro: a 4-character name, a space, your five digit ten-ten number, a space and your two-character state abbreviation that you will send during a FT8 QSO. If your name is longer, either use a short nickname or you will have to make two TX5 messages to transmit your info to complete the 10-10 contact, so the shorter the name the better. See the 10-10 website for a help video on FT8.

As you may know I am the 10-10 Countries Award Manager and I keep a lot of DX records of who has worked what countries. As of now, December 2020, there remains 22 countries that have never been worked for 10-10 country credit. They are as follows: 5R Madagascar, 9N Nepal, 9X Rwanda, 4O Montenegro, A7 Qatar, AP Pakistan, BS7 Scarborough Reef, EP Iran, FR/R Reunion, FR/G Glorioso, FR/W Crozet, HV Vatican, JX Jan Mayen, R1FJ Franz Josef Land, TN Congo, SY Mt Athos, VK0H Heard Isl., VK0M Macquarie Isl., VP8/S So. Shetland Isl., VU7A Andaman Isl., VU7L Laccadive Isl., and XU Cambodia.

I predict there will never be a 10-10 member in some of these rare DX countries! Places like Scarborough Reef, the Vatican, and Mount Athos, may never be 10-10 active. Scarborough Reef BS7, is in the South China Sea and ownership of the reef is disputed. The Vatican club station HV0A in Rome, is not a 10-10 member. The only ham operator at Mt. Athos is not a 10-10 member. The French islands are a mix of military restrictions, and permission to operate ham radio is not easy to get. But a 10-10 member of a French group could get permission to operate, which would be a rare event. However, you can go to Reunion Island and get a license and operate as a 10-10 visitor. The other islands are tough as they have travel restriction, some have no airport

and others only have access by ship, like the islands off India, Heard Island, Mellish Reef and South Shetland Islands. The islands off India have no resident ops and a DXpedition is infrequent but possible for a member to travel to and operate in the future.

I am glad that 2020 is almost over so we can start 2021 with maybe a solid C-19 virus preventative. All of us are ready for new defensive measures and we are hoping for a better 2021 year, especially fewer hurricanes in LA. I promise to keep reporting any DX news I find from my sources. Please do not forget that the ARRL Ten Meter contest is coming on December 12-13 and send in your log. We are now in Cycle 25, so use your station to find something new and log it. Best of luck this Christmas season and stay safe in 2021.

Countries Award: There were no Countries Award applications submitted this quarter. A DXCC Most Wanted list has not changed in months and it can be found at: <https://Secure.Clublog.org/mostwanted.php>.

I am posting this to the 10-10 website on December 1st.

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

**4U United Nations.** The remote ham radio station 4U1UN #55555, in the UN building in New York was last on Ten using FT8 on July 8th and little activity was posted for the station this past quarter. Look for the UN beacon on 28200 to tell if you can hear their signal on Ten. I do not know if they will be in the ARRL Ten Meter contest.

**5T Mauritania.** Dima RA9USU/KP2P #54234, is now using call 5T5WW as a guest op at 5T5PA station. Dima arrived Nov 28th and I have no info as to how long he will be in Mauritania using the radio station of Jo 5T5PA.

**CE Chile.** Update: Jorge CE3HFI #39382 has changed his call to CE0YHF and I have worked him twice on Ten in November. Jorge is using CE0YHF/CE3 on FT8 today.

**HP Panama.** Steve HP9SAM #75838, lived in Louisiana in the past and is a member of the LA Pelican net. He tries to check-in to the net on Saturday at 1610 UTC when he has propagation from Panama. We talked on Nov 28th and he told me that all DX Incoming mail is blocked and is being returned by Panama. So do not try to send him a QSL, just wait until they resume accepting mail. NO LoTW.

**K USA.** The Texas DX Society celebrated 50 years of club activity with the callsign **K5DX/50** #76334 from September 14th to October 13th. I gave out the K5DX/50 call and number during the 10-10 Sprint on October 10th.

Website: <https://K5DX-50.TDXS.net>.

**KH0 Mariana Islands.** Tom KC0W #67688, has a new club call KH0W for the Saipan CW Club. The club call does not have a 10-10 number. So you have to

find Tom for his number. Unknown if he will operate the Ten Meter contest.

**J2 Djibouti.** Rene DL2JRM #69623, was issued call J28XX from Djibouti. I have no reports of activity for him the past six months. This is a rare location so good luck.

**P4 Aruba.** John W2GD #14109, was back on Aruba from November 23rd to December 1st using the call P40W. He was active in the CW DX contest the weekend of the 28th. LoTW.

**V7 Marshall Isl. / Kwajalein.** Randy KX4QD #58874, has been on the air for about a year from his home station where he operates low power with FT8 as V7/KX4QD. At the club station, call **V73AX** #8239, there is KW amp and big antennas. Randy was reported on FT8 once in October on Ten. He is a TV broadcast engineer bringing US TV to the island. Randy uses LoTW and the club uses Club Log.

The Kwajalein atoll is controlled by the US Army for rocket testing. There are no personal autos allowed on the island, so bicycles are used to ride around the island. The island and the large lagoon were formed by a volcano and the ocean is good for scuba diving as there are several WW2 shipwrecks that can be explored offshore.

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

**4Z Israel.** Ros 4Z5LA #42000 and Yuli 4X6HP #72709, will be operating with a group of nine ops on Christmas Dec 25-26th, using a special call 4X7T. They will operate from a UNESCO World Heritage site, more info at website: <https://www.biblewalks.com/telbeersheba>.

**DP1 Antarctica.** Felix DL5XL #55519, is going back to Antarctica with a group from the German Polar Institute. The only hams are Felix and Theresa DC1TH who is not a 10-10 member. The club callsign DP0GVN will be used by both so ask who is the operator to find Felix! LoTW.

#### MISCELLANEOUS ITEMS & NOTES:

**Propagation forecast:** <http://www.solen.info/solar/>,

[www.SolarHam.net](http://www.SolarHam.net) and <http://ARRL.org/Propagation>.

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

**DX Calendar:** <http://www.dxwatch.com/>.

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

Propagation: **I expect the solar flux to range from 75-115 during the Winter which will be a record high for the new cycle!** The 2020 Winter Solstice is on Monday December 21st. Winter starts in the Northern Hemisphere that day and the Sun is below the equator giving us shorter daylight days thru the end of 2020.

There have been twenty-five solar cycles recorded since the year 1755 when records began. **Our Solar Cycle 25, is brand new as the Sun has been very active for the start of this new cycle as we had a record solar flux of 115 for the first time this year.** Cycle 25 officially started in October 2019. The old method that is used to determine the start of a solar cycle is a thirteen month running mean of the observed sunspot numbers and the 2019 low was verified this year by NOAA. Sunspots are counted by looking at the sun and solar flux is measured by radio at 2.8 GHz.

The monthly maximum solar flux in 2020: Jan 72, Feb 71, March 70, April 70, May 69, June 73, July 73, Aug 75, Sept 69, Oct 88, Nov 115 and Dec 115.

The monthly minimum flux in 2020: Jan 70, Feb 70, March 69, April 69, May 66, June 67, July 68, Aug 69, Sept 67, Oct 71, Nov 75 and Dec 82.

**On December 1st, the solar flux was 109, the A index was 8 and K index was 1.** The solar flux numbers continue to indicate new sunspots producing much higher solar flux numbers for Cycle 25! The USAF solar flux forecast for December 1st to January 14th is 82 to 115!

**My Prediction:** Over the next three months, the best conditions on Ten could be: December 1-3rd and 26-30th, January 23-26th, February 18-22nd and March 25-29th. For the USA, expect a 40% chance of DX to Europe or Asia with a 75% chance of DX to South America or to the Pacific. Listen for the CW beacons from 28.175-28.300 to see if the Ten Meter band is open and use WSJT-X FT8 for all weak/low propagation QSOs.

**There were no new 10-10 DX members joining from September to November 2020.** This DX News edition is my number 122nd which equals to a lot of DXing reports.

Thanks to the Daily DX by Bernie W3UR #25731 and the Ohio/Penn DX Bulletins. DX Info to: Mike Davidson, 26274 Whispering Pines Ave, Denham Springs LA 70726 USA and Email: [N5MT@aol.com](mailto:N5MT@aol.com).

DX IS! 73 Mike Davidson N5MT #24949

Copyright © 2020 by N5MT

## QSL Bureau News

Things at the QSL Bureau have been very quiet. No cards are currently in the bureau, and none have been processed.

Remember that I can process cards between all 10-10 members, no matter the band, mode or operating event - the only requirement is that both stations have a valid 10-10 number. All cards should be sent to my address below.

Jim Stoeber, w9x #49635  
8829 Bermuda Ave.  
Caseyville, IL 62232

## 3D Printing and Amateur Radio

Are you considering purchasing a 3D Printer? Many Hams have – it's a logical progression for us into the 'Maker Space' of additive manufacturing. We have, for decades, designed our own parts, circuits, radios and enclosures. 3D printing make it easier, at least it can.

### What is 3D Printing?

3D printing or additive manufacturing is a process of making three dimensional solid objects from a digital file.

The creation of a 3D printed object is achieved using additive processes. In an additive process an object is created by laying down successive layers of material until the object is created. Each of these layers can be seen as a thinly sliced cross-section of the object.

### What Materials are used, and which are appropriate for Amateur Radio use?

The most common format of 3D printing materials that the Ham will use are Filaments and Resins. Filaments are usually plastic based and come on spools that are then fed into a 3D printer and melted as they are 'printed'. Resins are liquids that are exposed to UV light to through a filter or 'grate' to harden the resin one layer at a time. Filament based printing and printers are generally referred to as FDM (Fused Deposition Modeling or Fused Filament Fabrication) printing and Resin based printing and printers are generally referred to as SLA (Stereolithography) printing.

SLA Printing is often used to create very precise and high resolution prints, such as jewelry molds, gaming miniatures, etc. FDM is often used to create functional parts and that is what we will be discussing today.

### Types of Filament

There are many different types of filament that and FDM printer might use. Some have specific or special requirements that make them harder to print with, but in general, any FDM printer can be upgraded to print with most filament types. Here is a brief list of Filament types and their characteristics:

- PLA – PolyLactic Acid is arguably the easiest filament to print with. It has a lower printing temperature than other filaments and is not prone to warping (lifting from the print bed). It does not give off an offending odor and it is somewhat biodegradable. PLA comes in an almost unlimited variety of colors. PLA is NOT UV resistant and thus is not suitable for outside use.
- ABS - Acrylonitrile butadiene styrene is slightly more difficult to print with than PLA, but it has some benefits over PLA such as higher durability and capacity to withstand high temperatures. It's downsides are, it takes a much higher temperature to print with, it is prone to warping during printing and it gives off

potentially hazardous fumes. When you think of ABS, think of Legos – they are made of the same material

- PETG - Polyethylene terephthalate is the most common plastic in the world. Bottled water bottles are PET material. The 'G' in PETG stands for 'glycol-modified' and means it is clearer, less brittle and easier to print with than PET. PETG is hydroscopic, meaning it absorbs moisture from the air – and that makes it harder to print with. Care must be taken to keep the PETG material as dry as possible. PETG is UV resistant and is suitable for outdoor use.

- TPE, TPU and TPC – thermoplastic elastomers are very flexible materials, even after printing. These filaments are best used when the print will need to withstand a lot of wear (bending, stretching, etc.)

PLA and PETG are used most often in 3D printing for Amateur Radio, with ABS a close third. Prints for indoor use such as replacement radio knobs, headphone hangers, wire organizers and Raspberry Pi Hotspot cases can be made of PLA. Outdoor prints such as guy wire tensioners, external antenna tuning cases and antenna components can be made of PETG

### How to Print?

There are a couple of steps necessary to successfully print something on a 3D printer.

1. What are you going to print (design it yourself or use an available design)
2. Prepare the design for printing (slicing)
3. Print the design

#### *What are you going to print?*

All prints start out as a design that is digitally created. Many makers use tools such as AutoDesk Fusion360, TinkerCAD or other CAD based programs to create a 3D Model of what they want to print. The tool you use is up to you. I prefer Fusion360 as it is still free for non-commercial use and is very powerful. TinkerCAD is very simple to use and learn. Whichever tool you decide to use, you will create a 3D model and then export it as an STL (Standard Tessellation Language or STereoLithography) file.

On the other hand, you can find already created files available on sites such as Thingiverse.com, cults3d.com, yeggi.com, etc. Makers upload their STL files to these sites and allow people to download them (either for free or for a fee) for printing on their own 3D Printers. There are literally millions of designs available for download.

#### *Slicing – getting the STL file ready for your printer.*

Slicers are programs that take your STL file (and some other 3D formats) and prepare them for printing by converting them into GCODE. GCODE files contain

specific instructions that tell the printer where to print, how hot to print, how fast to print and dozens of other instructions. The slicer allows the maker to select a myriad of settings to tell the printer what type of filament is being used, what temperatures to use, how to cool the part, how much support and infill to use, and more. If the model is created properly (i.e. it is manifold or watertight) the slicer can be used to determine how the final print will look and how strong it will be. Popular free slicers are Cura, IdeaMaker, and PrusaSlicer. There are also several slicers that require purchase – which slicer you choose to use is entirely up to you.

### Printing

Depending on your material, printer and slicer settings, your print can take as little as 10 minutes to complete, or as long as 72 hours, or more. Arguably, the most important time of a print is the first layer – if the first layer is good, the print has a much higher chance of succeeding. A first layer that is too close or too far away can lead to disaster.

### Conclusion

3D Printing can be frustrating, but it can be highly rewarding as well. Hams will love the ability to incrementally improve their shack without having to run to the store or place an order online, or to create something that helps out the Amateur Radio community – see a need, fill a need.

If you have any questions, or would like more information about anything I have talked about here, please feel free to email me at [kd2nom@gmail.com](mailto:kd2nom@gmail.com)

KD2NOM – Mark Steele is the current Director of Publicity and the Silent Key Manager for Ten-Ten International. In his day job, he manages a team of technical support and operations staff for a broadcast server manufacturer. He enjoys contesting and working various digital modes, including PSK, FT8/FT4 and FeldHell. Mark owns his own 3D Printing company and sells many non-amateur radio related items on Etsy.

### 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](mailto:editor@ten-ten.org).



# Net Report

Bob Farrow, N6OPR  
(#45715)

## Net Report for 3rd Quarter 2020

### Monday Nets

28.360 MHz			28.800 MHz		
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
6-Jul	2	0	6-Jul	4	0
13-Jul	11	2	13-Jul	5	0
20-Jul	4	0	20-Jul	7	1
27-Jul	2	0	27-Jul	2	0
3-Aug	6	0	3-Aug	6	0
10-Aug	2	0	10-Aug	4	0
17-Aug	2	0	17-Aug	8	0
24-Aug	2	0	24-Aug	3	0
31-Aug	2	0	31-Aug	8	0
7-Sep	8	0	7-Sep	5	0
14-Sep	6	0	14-Sep	6	0
21-Sep	8	0	21-Sep	4	0
28-Sep	8	1	28-Sep	5	0

### Tuesday Nets

28.360 MHz			28.800 MHz		
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
7-Jul	12	1	7-Jul	XX	0
14-Jul	16	1	14-Jul	XX	0
21-Jul	11	0	21-Jul	XX	0
28-Jul	14	0	28-Jul	XX	0
4-Aug	8	0	4-Aug	XX	0
11-Aug	13	0	11-Aug	XX	0
18-Aug	17	5	18-Aug	XX	0
25-Aug	8	0	25-Aug	XX	0
1-Sep	10	0	1-Sep	XX	0
8-Sep	7	0	8-Sep	XX	0
15-Sep	9	0	15-Sep	XX	0
22-Sep	9	1	22-Sep	XX	0
29-Sep	8	1	29-Sep	XX	0

### Wednesday Nets

28.360 MHz			28.800 MHz		
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
1-Jul	12	3	1-Jul	XX	0
8-Jul	30	11	8-Jul	XX	0
15-Jul	10	2	15-Jul	XX	0
22-Jul	11	0	22-Jul	XX	0
29-Jul	21	2	29-Jul	XX	1
5-Aug	13	0	5-Aug	XX	0
12-Aug	10	0	12-Aug	XX	0
19-Aug	11	0	19-Aug	XX	0
26-Aug	11	0	26-Aug	XX	0
2-Sep	10	0	2-Sep	XX	0
9-Sep	10	0	9-Sep	XX	0
16-Sep	8	0	16-Sep	XX	0
23-Sep	9	1	23-Sep	XX	0
30-Sep	8	0	30-Sep	XX	0

### Thursday Nets

28.360 MHz			28.800 MHz		
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
2-Jul	16	7	2-Jul	5	2
9-Jul	13	2	9-Jul	4	2
16-Jul	11	3	16-Jul	2	0
23-Jul	8	0	23-Jul	6	3
30-Jul	14	1	30-Jul	2	0
6-Aug	11	0	6-Aug	3	1
13-Aug	11	1	13-Aug	3	0
20-Aug	14	0	20-Aug	4	0
27-Aug	9	0	27-Aug	2	0
3-Sep	8	0	3-Sep	0	0
10-Sep	10	0	10-Sep	2	0
17-Sep	10	1	17-Sep	3	1
24-Sep	8	0	24-Sep	2	0

### Friday Nets

28.360 MHz			28.800 MHz		
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
3-Jul	47	27	3-Jul	12	0
10-Jul	4	0	10-Jul	12	1
17-Jul	4	0	17-Jul	11	0
24-Jul	4	0	24-Jul	12	0
31-Jul	4	0	31-Jul	14	0
7-Aug	4	0	7-Aug	13	0
14-Aug	14	1	14-Aug	14	0
21-Aug	4	0	21-Aug	9	0
28-Aug	4	0	28-Aug	9	0
4-Sep	4	0	4-Sep	8	0
11-Sep	4	0	11-Sep	10	0
18-Sep	4	0	18-Sep	10	0
25-Sep	4	0	25-Sep	8	0

## Saturday Nets

-----28.360 MHz -----			-----28.800 MHz -----		
DATE	TOTAL	NO 10#	DATE	TOTAL	NO 10#
4-Jul	XX	0	4-Jul	XX	0
11-Jul	XX	0	11-Jul	XX	0
18-Jul	XX	0	18-Jul	XX	0
25-Jul	XX	0	25-Jul	XX	0
1-Aug	XX	0	1-Aug	XX	0
8-Aug	XX	0	8-Aug	XX	0
15-Aug	XX	0	15-Aug	XX	0
22-Aug	XX	0	22-Aug	XX	0
29-Aug	XX	0	29-Aug	XX	0
5-Sep	XX	0	5-Sep	XX	0
12-Sep	XX	0	12-Sep	XX	0
19-Sep	XX	0	19-Sep	XX	0
26-Sep	XX	0	26-Sep	XX	0

XX NO NET CALLED

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	AZ
Mon (28.800)	Doc, WB6OJB	#70675	CA
Tues (28.380)	Ray, K7CWS	#50288	AZ
Tues (28.800)	Mike, KF4WKY	#70191	NC
Wed (28.380)	Bob, N6OPR	#45715	AZ
Wed (28.800)	Open, WB6OJB	#70675	CA
Thu (28.380)	Bob, N6OPR	#45715	AZ
Thu (28.800)	Robert, KQ4PK	#63201	NC
Fri (28.380)	Terry N0TW	#36547	FL
Fri (28.800)	Tim, K1IEB	#74965	AZ
Sat (28.380)	Mike, KF4WKY	#70191	NC
Sat (28.800)	Open. Contact Bob N6OPR for info		
Alternate	Louise, N6ELK	#36654	CA
Sunday	NEVER ON SUNDAY		



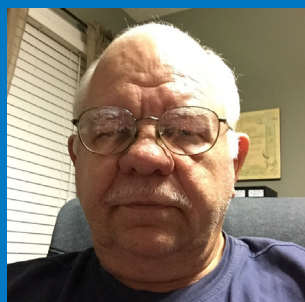
*Were you first licensed 25 years ago  
and licensed today?*

**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**



# QSO Parties

Dan Morris, KZ3T  
(#41015)

## 2020 Sprint QSO Party

Oct - 10

### TOP TEN

CALL	10-10#	CTX W	CTX WO	TOTAL
1. DL8YBM	36109	32	114	178
2. DL6DK	39944	23	7	53
3. KD5DE	33513	14	3	31
4. W5SUM	2019	12	3	27
5. N2VOX	77798	11	1	23
6. N6OPR	45715	8	5	21
7. K5JAD	77778	10	0	20
8. N5MT	24949	9	0	18
8. KG5ZMQ	77628	9	0	18
9. KM4ODS	77504	5	5	15
10. KI5ELV	77743	7	0	14

### CALL AREA ORDER

#### CALL AREA 0

CALL	10-10#	CTX W	CTX WO	TOTAL
NC0B	74875	1	0	2

#### CALL AREA 2

CALL	10-10#	CTX W	CTX WO	TOTAL
WA2HMM	40510	3	7	13
W2VTV	71275	2	0	4

#### CALL AREA 4

CALL	10-10#	CTX W	CTX WO	TOTAL
KM4ODS	77504	5	5	15
N0TW	36547	3	7	13
AK4YS	75328	6	1	13
KJ4RV	37776	4	1	9
K4FET	77603	1	0	2

#### CALL AREA 5

CALL	10-10#	CTX W	CTX WO	TOTAL
KD5DE	33513	14	3	31
W5SUM	2019	12	3	27
N2VOX	77798	11	1	23
K5JAD	77778	10	0	20
N5MT	24949	9	0	18
KG5ZMQ	77628	9	0	18
KI5ELV	77743	7	0	14
KM5FF	50356	3	0	6
K5RIX	39006	0	1	1

#### CALL AREA 6

CALL	10-10#	CTX W	CTX WO	TOTAL
AB6QM	63114	1	2	4

#### CALL AREA 7

CALL	10-10#	CTX W	CTX WO	TOTAL
N6OPR	45715	8	5	21
N7QHC	59244	1	3	5
AJ7B	7675	1	0	2

#### CALL AREA 8

CALL	10-10#	CTX W	CTX WO	TOTAL
K8DEL	2978	3	2	8

#### QRP

CALL	10-10#	CTX W	CTX WO	TOTAL
AK4YS	75328	6	1	13
KJ4RV	37776	4	1	9

**COUNTRY ENTRIES****GERMANY**

CALL	10-10#	CTX W	CTX WO	TOTAL
DL8YBM	36109	32	114	178
DL6DK	39944	23	7	53

**LOW POWER**

CALL	10-10#	CTX W	CTX WO	TOTAL
KD5DE	33513	14	3	31
W5SUM	2019	12	3	27
N2VOX	77798	11	1	23
K5JAD	77778	10	0	20
N5MT	24949	9	0	18
KG5ZMQ	77628	9	0	18
KM4ODS	77504	5	5	15
KI5ELV	77743	7	0	14
WA2HMM	40510	3	7	13
KM5FF	50356	3	0	6
N7QHC	59244	1	3	5
AB6QM	63114	1	2	4
W2VTV	71275	2	0	4
AJ7B	7675	1	0	2
K4FET	77603	1	0	2
K5RIX	39006	0	1	1

**HIGH POWER**

CALL	10-10#	CTX W	CTX WO	TOTAL
DL8YBM	36109	32	114	178
DL6DK	39944	23	7	53
N6OPR	45715	8	5	21
N0TW	36547	3	7	13
K8DEL	2978	3	2	8
NC0B	74875	1	0	2

**CLUB ENTRIES**

CALL	10-10#	CTX W	CTX WO	TOTAL	OPS
DF0IA	68914	32	114	178	DL8YBM
DL0BIC	77526	23	7	53	DL6DK
W5RRV	42114	14	3	31	KD5DE
K4MN	24874	5	5	15	KM4ODS

**CHECK LOGS**

CALL	10-10#	CTX W	CTX WO	TOTAL	OPS
KC2JRQ	0	0	2	2	0

**2020 Fall CW QSO Party****Oct 17 - 18****TOP TEN**

CALL	10-10#	CTX W	CTX WO	TOTAL
1. N4ZCG	56067	15	9	39
2. KI4W	62657	15	3	33
3. K4FET	77603	14	0	28
4. KM4ODS	77504	9	5	23
5. KD5DE	33513	10	1	21
5. DL6DK	39944	5	11	21
6. AK4YS	75328	10	0	20
7. KJ4RV	37776	9	1	19
8. KZ3T	41015	6	4	16
9. KA5VZG	46596	6	1	13
10. K2CWM	9712	4	2	10

**CALL AREA ORDER****CALL AREA 2**

CALL	10-10#	CTX W	CTX WO	TOTAL
K2CWM	9712	4	2	10
WA2SUH	407	1	0	2
W2VTV	71275	0	1	1

**CALL AREA 3**

CALL	10-10#	CTX W	CTX WO	TOTAL
WA3JXW	4377	0	1	1

**CALL AREA 4**

CALL	10-10#	CTX W	CTX WO	TOTAL
N4ZCG	56067	15	9	39
KI4W	62657	15	3	33
K4FET	77603	14	0	28
KM4ODS	77504	9	5	23
AK4YS	75328	10	0	20
KJ4RV	37776	9	1	19
KZ3T	41015	6	4	16
KA5VZG	46596	6	1	13
N4ERM	34524	4	0	8
AC4ZM	72780	3	2	8
AA4XU	46677	2	1	5

**CALL AREA 5**

CALL	10-10#	CTX W	CTX WO	TOTAL
KD5DE	33513	10	1	21

**CALL AREA 7**

CALL	10-10#	CTX W	CTX WO	TOTAL
KR7RK	63324	0	6	6

**QRP**

CALL	10-10#	CTX W	CTX WO	TOTAL
AK4YS	75328	10	0	20
KJ4RV	37776	9	1	19

**COUNTRY ENTRIES****GERMANY**

CALL	10-10#	CTX W	CTX WO	TOTAL
DL6DK	39944	5	11	21

**LOW POWER**

CALL	10-10#	CTX W	CTX WO	TOTAL
N4ZCG	56067	15	9	39
KI4W	62657	15	3	33
K4FET	77603	14	0	28
KM4ODS	77504	9	5	23
KD5DE	33513	10	1	21
KZ3T	41015	6	4	16
KA5VZG	46596	6	1	13
K2CWM	9712	4	2	10
N4ERM	34524	4	0	8
AC4ZM	72780	3	2	8
KR7RK	63324	0	6	6
AA4XU	46677	2	1	5
WA2SUH	407	1	0	2
WA3JXW	4377	0	1	1
W2VTV	71275	0	1	1

**HIGH POWER**

CALL	10-10#	CTX W	CTX WO	TOTAL
DL6DK	39944	5	11	21

**CHAPTER ENTRIES**

CHAPTER	LOGS	PTS
POSSUM TROT	8	186
BRANDING IRON	2	42
STEAMBOAT	1	21

**CLUB ENTRIES**

CALL	10-10#	CTX W	CTX WO	TOTAL	OPS
DL0BIC	77526	5	11	21	DL6DK

**2020 Fall DG QSO Party****Nov 14 - 15****TOP TEN**

CALL	10-10#	CTX W	CTX WO	TOTAL
1. N4ZCG	56067	13	5	31
2. KM4ODS	77504	9	13	31
3. AK4YS	75328	11	1	23
4. KJ4RV	37776	11	0	22
5. N3GTY	50585	9	0	18
6. N5MT	24949	0	11	11
7. KD5DE	33513	5	0	10
8. LU1BJW	39329	3	3	9
9. WA1IOG	46677	1	0	2
10. N3DUE	41066	0	1	1

**CALL AREA ORDER****CALL AREA 3**

CALL	10-10#	CTX W	CTX WO	TOTAL
N3DUE	41066	0	1	1

**CALL AREA 4**

CALL	10-10#	CTX W	CTX WO	TOTAL
N4ZCG	56067	13	5	31
KM4ODS	77504	9	13	31
AK4YS	75328	11	1	23
KJ4RV	37776	11	0	22
N3GTY	50585	9	0	18
WA1IOG	46677	1	0	2

**CALL AREA 5**

CALL	10-10#	CTX W	CTX WO	TOTAL
N5MT	24949	0	11	11
KD5DE	33513	5	0	10

**QRP**

CALL	10-10#	CTX W	CTX WO	TOTAL
AK4YS	75328	11	1	23
KJ4RV	37776	11	0	22

**COUNTRY ENTRIES****ARGENTINA**

CALL	10-10#	CTX W	CTX WO	TOTAL
LU1BJW	39329	3	3	9

**LOW POWER**

CALL	10-10#	CTX W	CTX WO	TOTAL
N4ZCG	56067	13	5	31
KM4ODS	77504	9	13	31
N3GTY	50585	9	0	18
N5MT	24949	0	11	11
KD5DE	33513	5	0	10
LU1BJW	39329	3	3	9
WA1IOG	46677	1	0	2

**HIGH POWER**

CALL	10-10#	CTX W	CTX WO	TOTAL
N3DUE	41066	0	1	1

**CHAPTER ENTRIES**

CHAPTER	LOGS	PTS
POSSUM TROT	7	174
STEAMBOAT	2	20
LOUISIANA PELICAN	1	11
TANGO	1	9

**CLUB ENTRIES**

CALL	10-10#	CTX W	CTX WO	TOTAL	OPS
K4MN	24874	9	13	31	KM4ODS
NZ4FF	77686	9	0	18	N3GTY
W5RRV	42114	5	0	10	KD5DE

# 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 - [www.ten-ten.org](http://www.ten-ten.org)

## TOP TEN HONOR ROLL

No.	CONTACTS	CALL	10-10#
1.	24600	WA5JDU	3017
2.	11700	K0PV	9902
2.	11700	N5XZ	4530
4.	11300	DL8YBM	36109
5.	10600	N1API	25468
6.	10000	K6PZE	1341
7.	9800	N5DAS	35877
8.	8800	AC6FU	10937
9.	8200	K5FBS	48461
10.	8200	N6OPR	45715

## TOP TEN CLUB

No.	CONTACTS	CALL	10-10#
1.	10100	WD0SFT	37933
2.	4400	K6MQ	K6MQ
3.	3400	DL0X	DL0X
4.	2100	W8PGW	W8PGW
5.	1800	W1NRG	W1NRG
6.	1200	NM5MD	NM5MD
7.	1100	W4MNM	W4MNM

## DIGITAL AWARDS

### Basic Award CONTACTS

NO.	CALL	10-10#
126	W5SUM	2019

## AWARDS MANAGERS

BAR 100-900 ..	Dan Morris, KZ3T #41015 .....	3162 Covington Way, Lenoir NC 28645 .....	(828) 728-5049	<a href="mailto:dbmorris315@gmail.com">dbmorris315@gmail.com</a>
Bar 1000+ ....	Tony Lisnak, N2WIE, #66790 .....	192 Greenvale Ave, Yonkers, NY 10703 .....	(914) 476-4032	<a href="mailto:lisnak@optonline.net">lisnak@optonline.net</a>
VP Bar .....	Bob Bishchoff K4QHH #26040 .....	180 Persimmon, Rutherfordton, NC 28139-9319 .....	(000) 000-0000	<a href="mailto:rabisch@hotmail.com">rabisch@hotmail.com</a>
VP WAS .....	Bob Bishchoff K4QHH #26040 .....	180 Persimmon, Rutherfordton, NC 28139-9319 .....	(000) 000-0000	<a href="mailto:rabisch@hotmail.com">rabisch@hotmail.com</a>
VP Lucky 13 ..	Dan Morris KZ3T #41015 .....	3162 Covington Way, Lenoir NC 28645 .....	(828) 728-5049	<a href="mailto:dbmorris315@gmail.com">dbmorris315@gmail.com</a>
WAC .....	Kevin Gilot, NZ1I, #72759 .....	50 Cindy Lane Mystic, CT 06355-1404 .....	(860) 572-6086	<a href="mailto:kevinemt1d@tvconnect.net">kevinemt1d@tvconnect.net</a>
Counties .....	Open			
Countries .....	Mike Davidson, N5MT #24949 .....	26274 Whispering Pines Ave, Denham Springs, LA 70726 ..	(713) 417-4727	<a href="mailto:N5MT@aol.com">N5MT@aol.com</a>
CW .....	Lee Zalaznik, KI6OY #50948 .....	334 Olivina Ave., Livermore, CA 94551-6137 .....	(925) 455-0361	<a href="mailto:lee.zalaznik@sbcglobal.net">lee.zalaznik@sbcglobal.net</a>
Digital .....	Mel Sojka, KD5DE #33513 .....	353 Atlantic Ave., Shreveport, LA 71105-2909 .....	(318) 861-7012	<a href="mailto:kd5de@nwla.com">kd5de@nwla.com</a>
Mobile .....	Bob Bishchoff K4QHH #26040 .....	180 Persimmon, Rutherfordton, NC 28139-9319 .....	(000) 000-0000	<a href="mailto:rabisch@hotmail.com">rabisch@hotmail.com</a>
OM/XYL .....	Marcus Lieberman, KM5EH #71103 ..	2300 Hurley Drive NW, Albuquerque, NM 87120-1013 .....	(505) 836-1724	<a href="mailto:buckml@lobo.net">buckml@lobo.net</a>
WAS .....	Eva Donaldson, WB0CON #53964 ...	12933 W Montana Drive, Lakewood, CO 80228-4244 .....	(303) 989-0475	<a href="mailto:wb0con@comcast.net">wb0con@comcast.net</a>
WPX .....	Ed Bryant, KM5FF, #50356 .....	9001 Sunbow Ave SW, Albuquerque, NM 87121-8851 .....	(505) 934-2100	<a href="mailto:elbble@gmail.com">elbble@gmail.com</a>
GB Counties ..	Mike Crawshaw, G4BLH #18446 ....	35 Edward Drive, Clitheroe, Lancashire, England BB7 1EF ..	No Phone	<a href="mailto:g4blh@zen.co.uk">g4blh@zen.co.uk</a>

# Meet The Volunteers

**Note:** The Annual "Meet the Volunteers" event has been canceled until further notice due to band conditions.

AJ7B, Randy.....	Editor	KR7RK, Keith, .....	Treasurer
G4BLH, Mike .....	Awards - GB	KZ3T, Dan.....	QSO Party Manager
K1IEB, Tim.....	Net Control	N0TW, Terry.....	Past President
K4QHH, Bob.....	Awards – Mobile & VP	N2WIE, Tony.....	Awards-1000+ Bars
K5BKT, Peg .....	Committee Member	N5MT, Mike.....	Awards - DX
K6DNR, Bob .....	Net Control	N6ELK, Louise.....	Alternate Net Control
K6RDK, Dave .....	Data/ Membership Manager	N6OPR, Bob.....	Director
K7CWS, Ray .....	Net Control	N7YG, Jeff .....	IT Manager
KA0ZPP, Jim.....	Director	N9AC, Gerald .....	W6OI Trustee
KA5VVD, Robert.....	Committee Member	NP2MR, David.....	Committee Member
KC5ILO, Tom .....	Director	NS6X, John .....	Committee Member
KD2NOM, Mark .....	Director	NZ1I, Kevin.....	Awards – WAC
KD5DE, Mel.....	President	VA7GY, Garry .....	Committee Member
KF4WKY, Mike.....	Net Control	VE3MEW, Bill .....	Committee Member
KG5RJ, Greg .....	Committee Member	W5DJT , David .....	Committee Member
KI6OY, Lee .....	Awards-CW	W5SUM, Ronnie.....	Vice President / Secretary
KJ5SZ, Hugo .....	General Counsel	WA2SUH, Larry .....	Director
KM5EH, Marcus .....	Director	WB0CON, Eva.....	Awards – WAS
KM5FF, Ed.....	Awards-WPX	WB6OJB, Arnold.....	Net Control
KQ4PK, Robert.....	Net Control	WI9X, Jim .....	QSL Bureau Manager

## 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.

## 10-10 SCHOLARSHIP FOUNDATION SUPPORTERS

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 in May, the Foundation Board voted to guarantee the funding for three \$2000 scholarships to be awarded in 2021. 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. If you have an employer matching program, please let us know. This quarter a matching donation was received from his employer for Charles Thompson, KE6DRN , #68855. 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-line or send your check to me or the Data Manager. Our addresses can be found on Page 27.

The members listed below became 10-10 Scholarship Foundation Supporters during the months of September, October and November and we appreciate their support.

### Platinum (\$1000 or more)

None

### Gold (\$500 to \$999)

WB0CON..... Eva Donaldson 53964

### Silver (\$100 to \$499)

\*KE6DRN..... Charles Thompson 68855  
KD5HIP..... John Zumbro 71476

### Bronze (Up to \$99)

K6ME..... Terry Cobb, Sr. 08780  
WA4TIV ..... Gordon Erwin 37370  
W1DYJ ..... Larry Banks 65485

\* Employer Match Received

## 10-10 SCHOLARSHIP APPLICANT INFORMATION

Each year the 10-10 International Net, through our non-profit corporation, the 10-10 Scholarship Foundation, funds three \$2000 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 33 years, 10-10 has funded 126 scholarships valued at \$163,000.

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**

## 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. [wi5v.be@gmail.com](mailto:wi5v.be@gmail.com)

73 Dennis Stice WI5V #35806

IARU Region 2 HF Beacon Coordinator

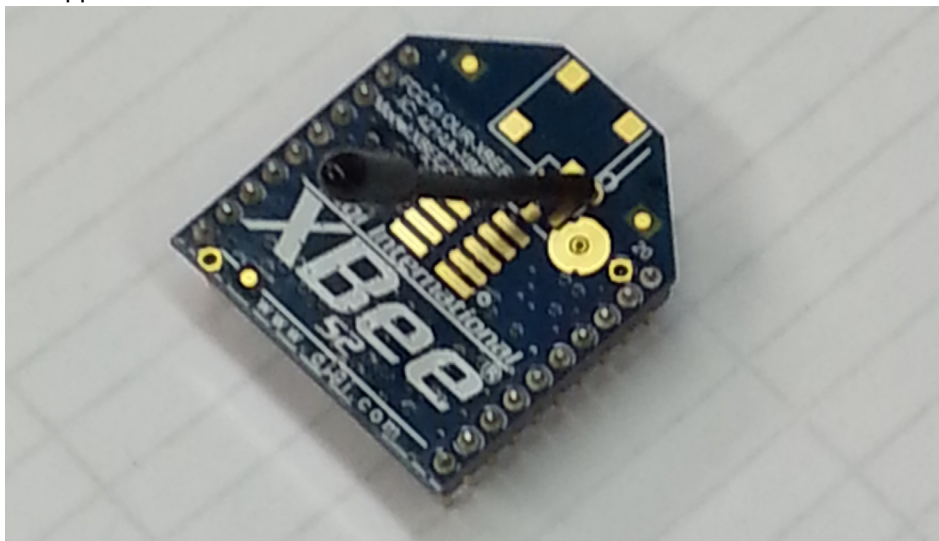
<https://wi5v.net/author/wi5v>



## Antenna System Project – Part 3

At the end of part 2 of this story, phase 1 of the project was complete. The prototype tuner matches different antenna systems with the tuner components controlled through the two switches on the control panel. Phase 2 focuses on controlling the tuner remotely. Rob's (NR3O) setup will have the tuner at the base of the 160-meter horizontal loop, 200 feet away from the ham shack. A 200-foot USB cable isn't possible. So, it looks like we will have to rely on an RF communications link between the ham shack and tuner.

After a little research, we decided to use Digi International's XBee Series 2 wireless module. See Figure 1. This module has the range we need to reach the remote tuner and is easily interfaced with the Arduino micro-controller. The data inputs D0 and D1 on the Arduino can not only be used as standard digital inputs but they are also programmed as the input and output channels of the serial communication circuit. When these two data pins are connected to the Data In and Data Out pints of the XBee module, we can send and receive commands over the wireless connection. This looks like the perfect solution for our application.

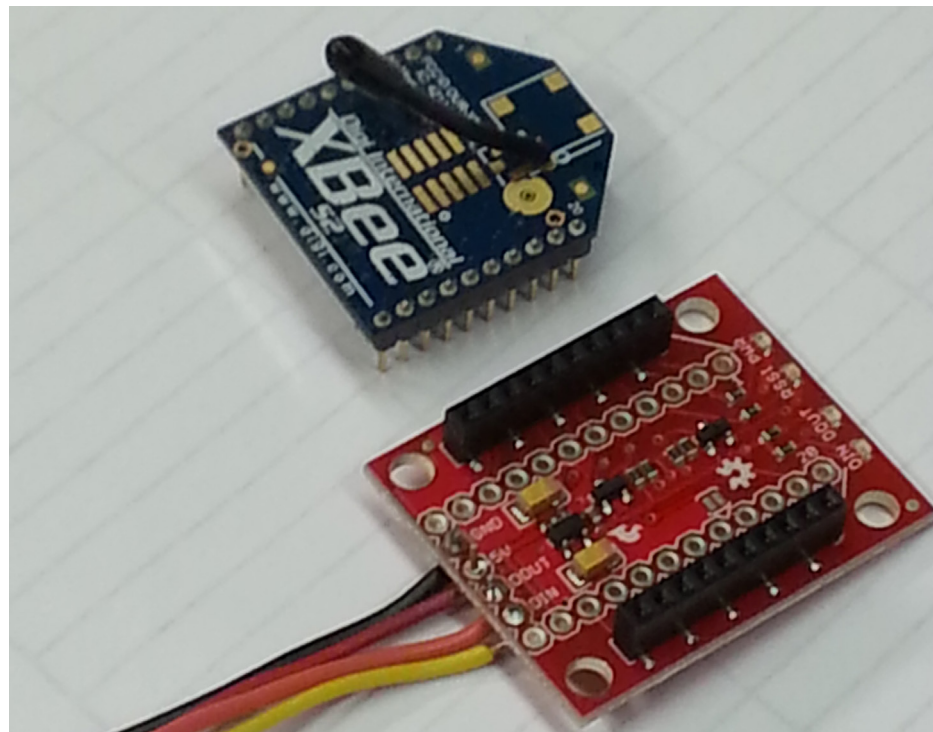


**Figure 1. XBee Module**

As shown in Figure 1, an XBee module has a short antenna for transmitting and receiving. Other connections like ground, power, and in and out data are fed through the pins along the two edges of the module. These pins do not align with the connections on the Arduino micro-controller. Sparkfun has a solution to this challenge.

Sparkfun makes a circuit board (XBee Explorer Regulated) that simplifies the connection between the XBee module and the Arduino. See Figure 2. The XBee

module plugs in to the XBee Explorer board which has pads to which you can solder wires for power, ground, and in and out signals.



**Figure 2. XBee with XBee Explorer Regulator board**

To complete the wireless channel to the tuner, another XBee module must be used. Sparkfun makes another circuit board that plugs into a USB port on a PC: XBee Explorer Dongle. The two XBee modules must be configured so they can communicate between them. There is free PC software (XCTU) available you can use to set the configuration of each XBee module. One module is set to "Coordinator" function and the other is set to "Router" function.

We have started using the XBee modules to control the prototype tuner. As of this writing, there are still some delay issues with the wireless communication, but all the functions are working. We just need to do some more research and make sure we have the correct configuration for our application.

After completing the addition of the wireless communication on the prototype tuner, the next step was to build a final version. Now that we know all the components needed for the tuner, we needed a design plan to fit it all inside a box. I replaced my manual tuner with the prototype and disassembled the old tuner. The plan is to take the capacitor and inductors from the old tuner and incorporate them into a new electronically controlled tuner based on the

prototype design. In the planning process, I discovered a need for some kind of front panel indication of the capacitor and inductor positions. I felt an LCD display was the best choice for this purpose.

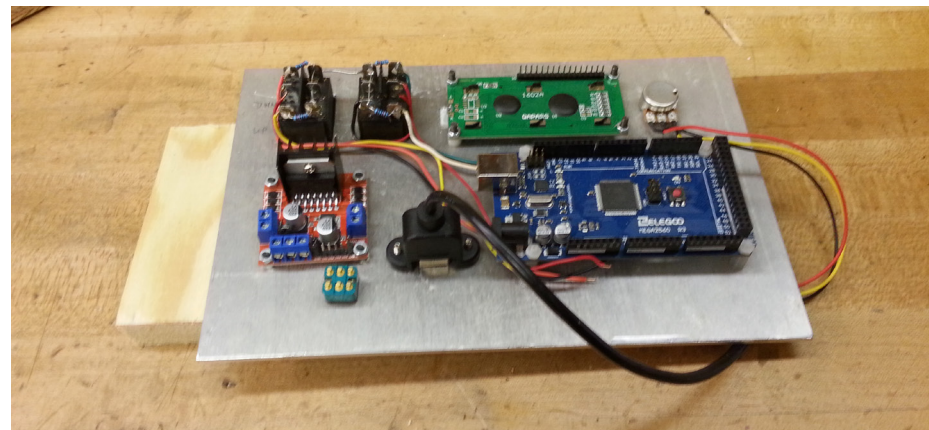
The 1602 Serial LCD Module is the one that would do the job. It is a two-line display with 16 characters on each line. An Arduino sketch for this display was already available. There was one downside issue however. The 1602 has 7 digital signal pins to control and write to the display. The Arduino UNO we used in the prototype only had two more digital pins available. To accommodate the 1602 display, we had to upgrade the Arduino micro-controller to an Arduino Mega. The Mega has 54 digital input/output pins, more than enough to allow the addition of the LCD module. The Mega also gave us more flexibility for adding enhancements and features to the tuner. No reprogramming of the sketch used in the UNO was needed for the Mega. Just adding the code to drive the LCD was all that was necessary.

With the display added, we can set the position of the tuner components with the two front-panel switches and not have to connect a USB cable or activate the wireless channel. When we go out to the remotely located tuner, we don't have to bring along a laptop and USB cable to move the capacitor and inductors. Figure 3 shows how I incorporated the inductors, capacitor, DC Motors and potentiometers in a 12" X 20" X 8" wooden box.

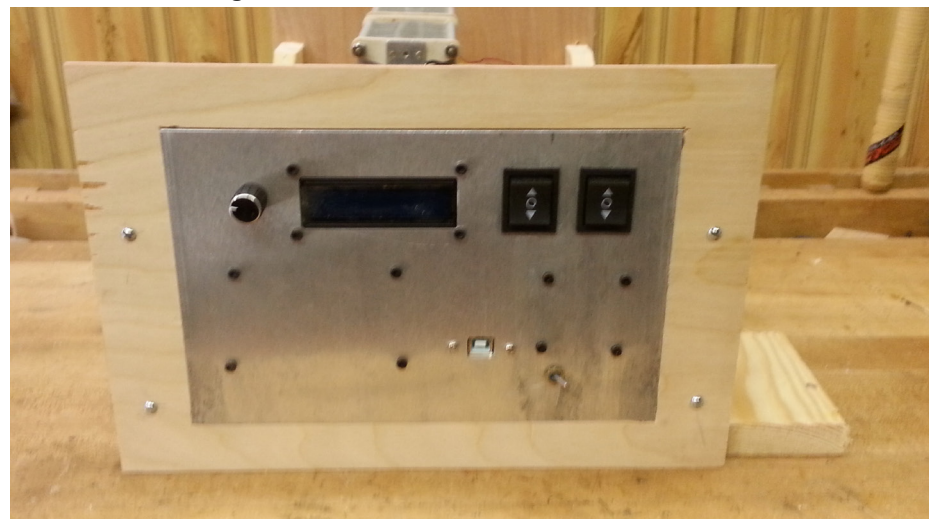


**Figure 3. Tuner Components mounted in a box**

A metal panel was fabricated to hold the switches, display, Arduino, and motor driver board. See Figure 4.



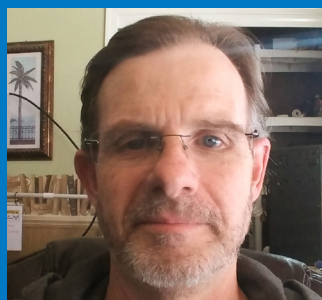
**Figure 4. Back side of Front Control Panel**



**Figure 5. Front Panel mounted on Tuner enclosure.**

As of this writing, the front panel is being wired and a back panel is being fabricated to mount the antenna connectors, transceiver connector, and 12 Vdc power connector. By the next issue of this newsletter, the tuner that I will use in my ham shack will be complete and installed. We should also have some work done on the tuner that will be installed at Rob's (NR3O) ham shack. It's Rob's tuner that will physically be 200 feet from the ham shack. Hopefully we will have worked out the wireless communication delays by then.

Randy – AJ7B #7675



## 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
00603	K3GY	Donald W. Eller - Erie, PA
02094	K9JPQ	Daryl L. Waite - Carthage, IL
02579	K4DII	Frederick M. McKenzie - Titusville, FL
04864	W3CKU	James H. Doyle - Chambersburg, PA
05188	W6GAR	Mike K. Davis, Jr. - San Antonio, TX
07686	K6JAT	Jim A. Tiemstra - Oakland, CA
08104	W0OWY	Bill Nash - Sun City, AZ
09700	KM3B	Thomas C. Hogan - Pittsburgh, PA
10078	K8SIA	James E. Besancon - Tawas City, MI
10878	K0BOY	Douglas D. Halbert - Omaha, NE
12749	NG2C	Leonard L. Ledger - North Bangor, NY
12848	W9ZMR	Kenneth A. Piletic - Bakersfield, CA
13118	WA3WQO	Wayne L. Wacker - Fayetteville, PA
13339	WB7CUS	Roger N. Morrell - Dallas, OR
13582	AF4K	Brian J. Carling - Sanford, FL
15788	W6HDP	William T. Jackson - Prescott, AZ
16309	KN4F	James F. Lane - Germantown, TN
16957	NS9K	Arthur A. Braghini - Rantoul, IL
19933	N3PF	Martin J. O'Malia - Plains, PA
20148	WA2JTX	Paul E. Rambusch - Putnam Valley, NY
20232	N7QD	Stanley B. LeSieur - Sandy, UT
20463	W5KC	Carl E. Bradley - Lewisville, NC
20595	W7IB	William J. McPartland - Foresthill, CA
22255	ZL2AH	Wallace J. Reed - Marton, NZL
22294	N9AGM	Robert L. Ulrich - Eureka, IL
22801	KG5J	Alfred H. Garrett - Perryville, AR
25555	NL7C	James L. Moody - Childress, TX
26614	WB5VEV	James P. Christenberry - Benton, AR
27438	N8BEL	Alex M. Nickoloff - Burton, MI
28491	W5UOM	Thomas B. Bowen, Jr. - Moore, OK
31235	WD4AFY	Andrew J. Blackburn, III - Savannah, GA
32717	N7CPE	Ronald L. Grant - Klamath Falls, OR
33844	K3BYV	John R. Mantell, Jr. - Matthews, NC

10-10#	Call	Name - City, State
35167	N9CVC	Randy Mingus - Pekin, IL
36448	KW4DW	Dennis E. Wyman - Highland Springs, VA
38825	NC7MT	William B. Patterson, Jr. - Chapel Hill, NC
40367	N8HEJ	Billy R. Miller - Bryson City, NC
40846	W5HRF	Gus N. Gikas - Baton Rouge, LA
40942	HB9BHY	Walter Sieber - Zurich, CHE
43323	K9YCG	Loren T. Mathews - Kissimmee, FL
43345	K9NZ	Perry A. Cummins - Metamora, IN
45550	W9ULS	Francis S. Olson - Urbana, IL
46092	WA0S	Robert A. Hamilton, Jr. - St. Louis, MI
46514	WA5JHJ	Edwin J. Mraz - Iola, TX
47346	AF4UU	Robert A. Holcombe - Stafford, VA
48019	N3BMT	Donald G. Link - Knoxville, PA
48416	W4DGH	Raymond E. Ringer - Valley Head, AL
49885	AC8VG	Scott J. Pakulski - Independence, KY
50086	K1TXU	Ernest R Doane - Colorado Springs, CO
51173	W3FIK	Thomas R. Bain - Bethlehem, PA
51264	K1NNP	Donald N. Lefrancois - Jewett City, CT
51669	KE8VK	Thomas A. Johnson - Okeechobee, FL
52173	N5CTD	John C. Murray - Arlington, TX
55620	WW7R	James M. Buford - Flagstaff, AZ
55761	K3TKQ	George W. Collier - York, PA
56474	NH6YH	James A. Koch - Albuquerque, NM
57971	WB6MVP	Daniel R. Saltzman - Las Vegas, NV
58361	KC4OIX	Herbert E. Sherer - Springville, AL
58789	W0HED	Donald Hed - Arlington Heights, IL
60387	KM6HA	Arnold J. Familian - Henderson, NV
60618	AA2KS	Richard J. Alderiso - Brick, NJ
62908	KA9JJS	Douglas J. Hayes - Mount Vernon, IL
62931	AA9DE	James T. Clevenger - Farmland, IN
63276	AC4PV	Ray A. Wingfield, Jr. - Williamsburg, VA
63942	N1AWQ	Richard F. Cubi - Halifax, MA
65368	N9DJQ	John S. Richmond, Sr. - Aurora, IL
66157	N7UG	Joyce R. Medlen - Vass, NC
67320	W6WTJ	Robert Szentimrey - El Sobrante, CA
68359	W0ROB	Robert C. Baker - Sartell, MN
70203	W5BAD	Charles W. Simpson - Florence, MS
70509	KA2BIG	Theodore R. Steinhurst, Jr. - Layton, UT
70751	W7LWS	Leland W. Schaefer - Sunriver, OR

10-10#	Call	Name - City, State
72199	K9DEA	Mark E. Keister - Jekyll Island, GA
72240	WA6CDO	Jerry D. Boucher - Carlsbad, CA
72829	KF6WZN	Raymond Rittenhouse - Cerritos, CA
73562	KA9PCU	Larry E. Heller - Galesburg, IL
73628	K2ON	Robert W. Miskelly - Millville, NJ
74352	N2PTA	Barton B. Bonney - Davenport Center, NY

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

## Multiband vs. 10-meter dipoles

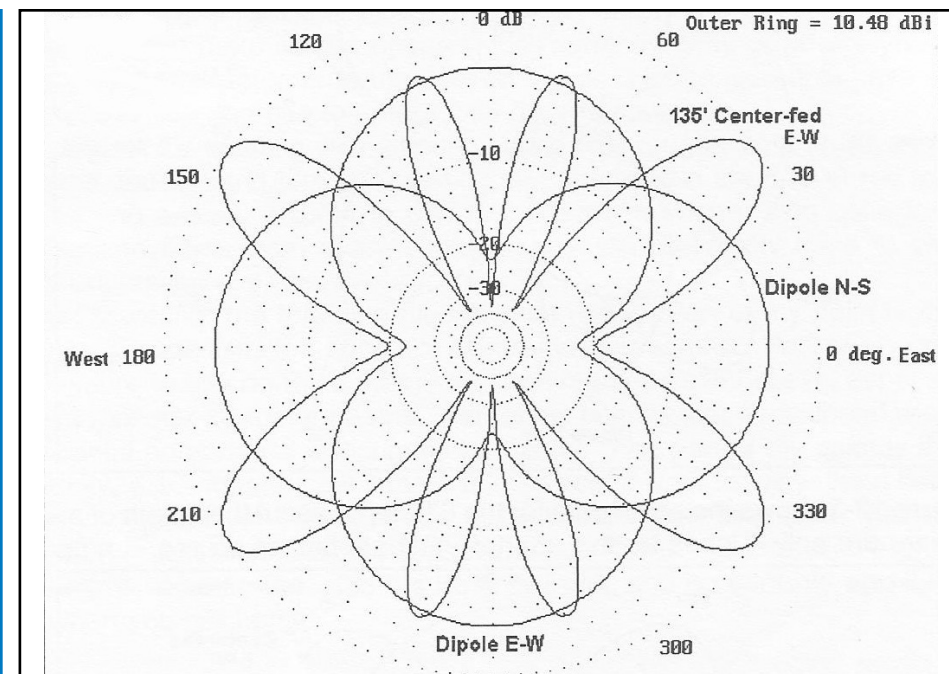
Editor's note: This article is a reprint of an article done by L.B. Cebik, W4RNL (SK), #41159 in a previous issue of this newsletter.

If we had unlimited money and space, we could ask the following question sensibly: What is the best 10-meter antenna? The answer might be about 4 stacked long-boom, many-element Yagis from about 70' feet on up on a rotatable tower on a one-hill island surrounded by ocean. Even that answer might get an argument. However, for most of us, the simple question of what the best 10-meter antenna might be is an exercise in irrelevancy.

A more sensible question is usually this one: which of two alternatives is the better antenna? Each alternative might fit your yard and bank account. However, no general answer is possible. Even if one antenna does outperform another, there are always a number of other factors that affect the final decision. Can you maintain this antenna? What will your neighbors say when they see it? Is it compatible with the rose garden?

With those qualifications in mind, let's compare two antennas on performance alone just because people have asked a certain question: which is better: a multiband wire antenna like a G5RV or a center-fed Zepp on the one hand, or a dipole cut for 10 meters on the other hand? And let's presume you have the room and supports for both antennas to make this a real comparison.

If you like to work all of the HF ham bands and are limited to a single antenna, then the multiband wire is certainly an antenna to consider. An "80-meter" 135' center-fed Zepp (also simply called a "doublet"), a G5RV 102' dipole, and a "40-meter" 67' center-fed Zepp (or doublet) are all long doublets, center-fed with parallel transmission lines and differ only in length. All require an antenna tuner, although some antennas show a low impedance on some bands. The 135' Zepp obviously works better on 80, although the 102' center-fed antenna does quite well there, and all three antennas can show respectable performance from 40-10. The key to their good performance on the lower HF bands is height – the higher, the better. However 30-40 feet up is usually plenty high enough for good 10-meter performance.



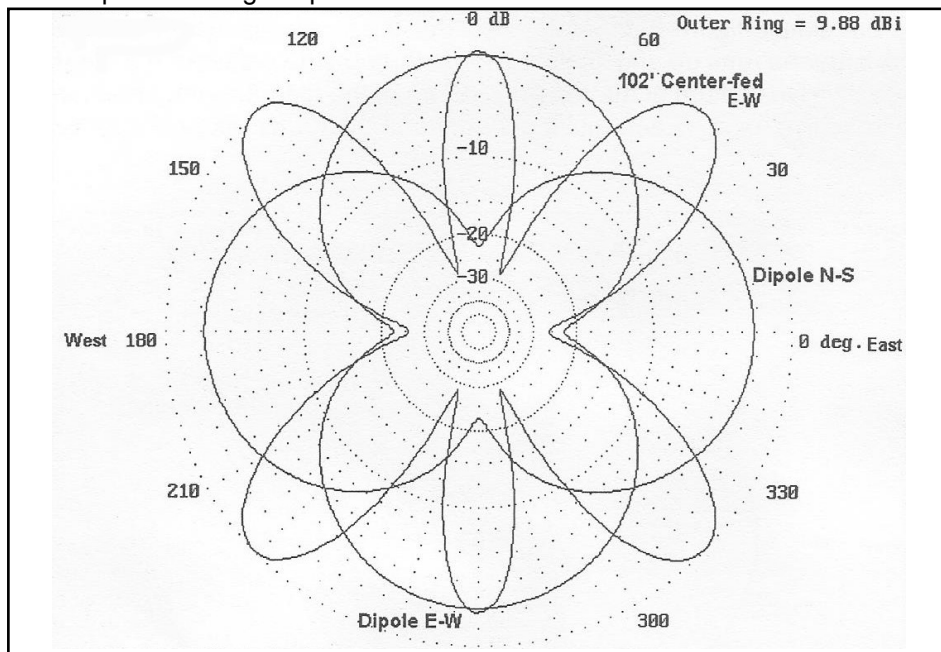
**Figure 1. Radiation patterns of two dipoles and a Multiband Wire Antenna**  
In fact, some folks praise these longer antennas because they show some gain over a 10-meter dipole on 10-10's favorite band. Unfortunately, that kind of claim is like preferring \$10 bills over \$5 dollar bills. I'll take the \$5 if you give me enough more of them than the \$10s. The bill size is not relevant until you know how many of each are at stake.

When comparing any of the longer multiband wires with a 10-meter dipole, the extra gain is not relevant until we answer the question of where it goes and, equally, where it does not go. A lot of variables go into the answer to the "where" question, but we can give a glimpse into the answer with Figure 1, 2, and 3. Each shows the azimuth pattern of 3 antennas (2 dipoles and one multiband antenna) modeled at a height of 35' (a typical amateur backyard installation) over real ground at a 14-degree angle of maximum radiation at 28.5 MHz.

Think of these patterns as looking down on the antenna from overhead. The dipoles are the simple figure-8 double loops. For the loops reaching out to 0 and 180 degrees, the antenna runs up and down the page through the center of the diagram. For the loops reaching maximum at the top and bottom of the diagram, the antenna runs left and right across the page. Each multiband antenna also runs left and right across the page.

Figure 1 shows the 135' Zepp. It has four lobes that exceed the dipole limit by a good bit. However, notice how narrow they are. Notice also the nulls in the

pattern. With some careful planning and some good luck in where your yard trees happen to be located, you might align the antenna so that one or more of the lobes points right where you find the stations you like to work most. Then again, you might end up aligning the antenna so that nulls point at your second and third favorite spots. The key thing to notice is that on 10-meters, the nulls of the 135' doublet occupy far more of the pattern than do the lobes – and the lobes represent the good possibilities for communications.

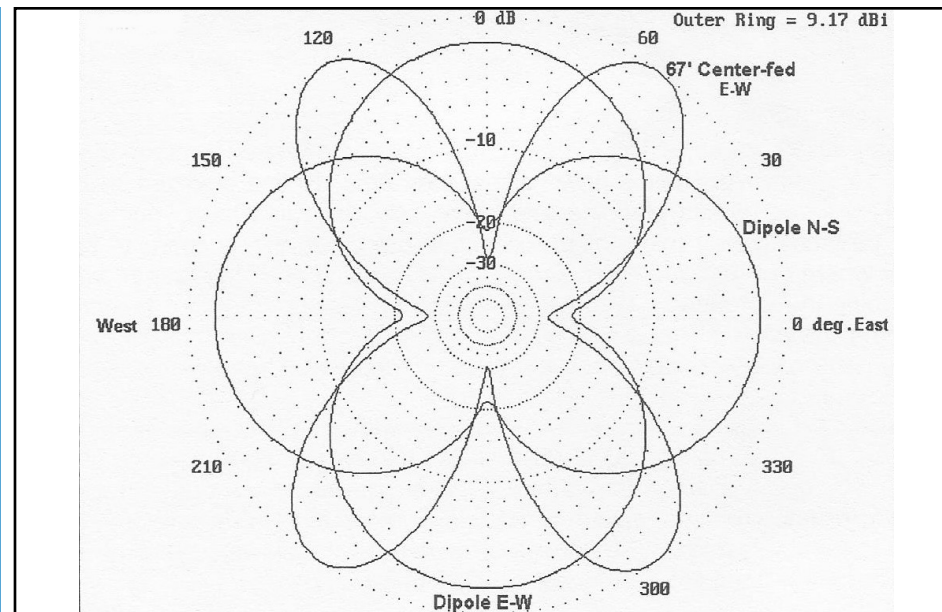


**Figure 2. Radiation Patterns of G5RV and Dipole Antennas**

Figure 2 shows the N-S and E-W dipoles with a G5RV that is set in the E-W direction. Again, the G5RV or 102' doublet shows higher-gain narrow lobes, but aimed more at the 45-degree point in the pattern. The shorter antenna creates fewer lobes. Again, you might use this information to hit one or more of your targets, and possibly miss a few desirable targets. Still, the area covered by nulls occupies more of the overall horizon than does the area occupied by lobes.

Figure 3 shows the same data for the 67' Zepp, about the length of a 40-meter dipole. There are only 4 lobes for this shorter antenna, but, of course, 4 nulls as well.

Each of these antennas has its place in some ham's yard, especially for working the lower HF bands (and each antenna will show a different pattern on each band). But is any really significantly better than a dipole on 10 meters? Gain is nice, but those nulls can drive you crazy.



**Figure 3. Center-Fed 67 foot Zepp and Dipole Antenna Radiation Patterns**

Well, the dipole also has nulls off each side, so it too is limited. However, with an overall length of between 16' and 16.5' (depending on the element diameter), it is not too difficult to put up a rotatable dipole. You can hand-rotate the antenna mast or use a TV rotator. Then the nulls disappear. More correctly, they go where you put them, as you broadside the antenna to the desired signal. Hence, you only have to rotate a dipole less than 180 degrees to get full 360-degree coverage.

A stack of TV masting with a house clamp only roughly tight or guys in guy rings would permit you to hand turn the mast. You can attach a short level rod to the mast to make turning easier. Except in odd late afternoon shorter skip conditions, where signals seem to come from every direction, you will likely only have to change the antenna's orientation every few hours.

Am I "pushing" the rotatable dipole? Not really. Part of my point is that gain is not everything, especially if it does not point anywhere useful. Part of my point is that pointing is more simply done on 10 meters than many people believe, especially if they only look at monster 20-meter beams. Part of my point is that a multiband wire antenna is a very useful antenna for working all bands. And part of my point is that, with a little ingenuity, a 10-meter dipole can do a lot of useful work for us without being unduly noticeable or expensive. Even if you already have that long wire, you might also consider adding a rotatable dipole to the antenna "farm." If it is simple enough, you might even take it apart, toss it in the truck or trunk, and go portable with it – and put it back up when you get home.

## 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, [www.ten-ten.org](http://www.ten-ten.org) 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 years. 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 [www.ten-ten.org](http://www.ten-ten.org) and follow the links from 'membership' to 'renewals' 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 [www.ten-ten.org](http://www.ten-ten.org) 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 [www.ten-ten.org](http://www.ten-ten.org)

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, go to 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**

## TEN-TEN QSO PARTY RULES

## 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. NOTE: A QUIET ZONE between 28.490 and 28.510 shall be in effect during QSO Parties using the Phone portion of the 10-meter band to allow for others to use the band.

## 5.2.4 ENTRY CLASSIFICATION

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

**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. If a single transmitter becomes inoperable, it is permissible to change to a replacement transmitter. 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.

## TEN-TEN QSO PARTY RULES

**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.

**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](mailto: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, then 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**

**Due to poor band conditions, these events have been postponed until further notice.**

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: 2010 is the 48th anniversary year of 10-10 International Net, Inc. Contact with members containing a "48" in their membership number (i.e., 72048, 69485, 64854, 48126, 00487) 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](http://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.

**2021 Ten-Ten QSO Party Schedule**

<b>Event</b>	<b>Dates</b>	<b>Postmark</b>
Winter Phone	Feb. 6-7	Feb. 16
Spring Digital	April 24-25	May 3
Spring CW	May 1-2	May 10
Open Season	June 5-6	June 14
Weak Signal	Jul 10-11	July 19
Summer Phone	Aug. 7-8	Aug. 16
Sprint	Oct. 10	Oct 18
Fall CW	Oct. 16-17	Oct. 25
Fall Digital	Nov. 13-14	Nov. 22

# 10-10 QSO PARTY COVER SHEET

## QSO Party (select one):

- |                                       |                                    |                                         |                                       |
|---------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------|
| <input type="checkbox"/> WINTER PHONE | <input type="checkbox"/> SPRING CW | <input type="checkbox"/> SPRING DIGITAL | <input type="checkbox"/> 10-10 SPRINT |
| <input type="checkbox"/> SUMMER PHONE | <input type="checkbox"/> FALL CW   | <input type="checkbox"/> FALL DIGITAL   | <input type="checkbox"/> SPIRIT OF 76 |

## Contest Exchange:

Callsign: \_\_\_\_\_ Name: \_\_\_\_\_ 10-10#: \_\_\_\_\_ QTH\*: \_\_\_\_\_  
*\* if operating FROM mobile, enter number of counties operated from in QTH field - counties must show in log*

## Entry Information:

Name: \_\_\_\_\_

Mailing address: \_\_\_\_\_

City: \_\_\_\_\_ Zip: \_\_\_\_\_

State/Province/County: \_\_\_\_\_

Your e-mail address (for contest questions only): \_\_\_\_\_

Call Area (W0-W9) or ARRL DX Country you operated from: \_\_\_\_\_

Chapter Assignment, if any (not valid in Sprint): \_\_\_\_\_

## Entry Type (check one only):

- |                                                                                            |                                     |                              |                                 |
|--------------------------------------------------------------------------------------------|-------------------------------------|------------------------------|---------------------------------|
| <input type="checkbox"/> LOW POWER                                                         | <input type="checkbox"/> HIGH POWER | <input type="checkbox"/> QRP | <input type="checkbox"/> MOBILE |
| <input type="checkbox"/> CLUB (if Club station, please list all operators below this line) |                                     |                              |                                 |

## Claimed Score:

Contacts WITH 10-10 number: \_\_\_\_\_ X2 = \_\_\_\_\_

Contact WITHOUT 10-10 number: \_\_\_\_\_ X1 = \_\_\_\_\_

Total Contacts: \_\_\_\_\_ Total 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 than 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 **NOT** required with an e-mail entry. **Q95** formats **ARE NOT** acceptable.

**EMAIL to: [tentencontest@ten-ten.org](mailto:tentencontest@ten-ten.org).**

© Copyright 2019 10-10 International