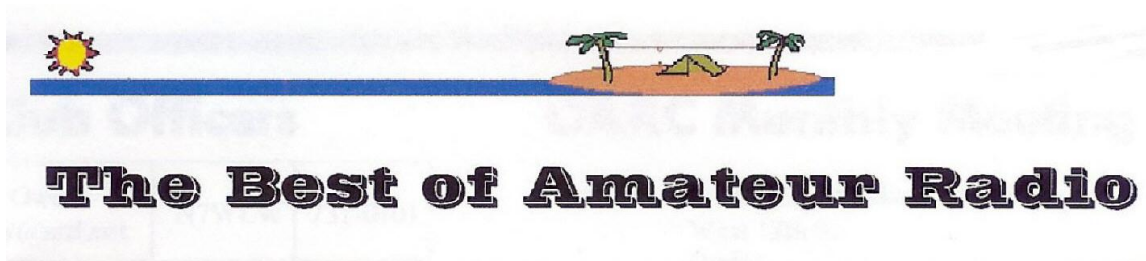




WATTS NEWS



Welcome to the OARC e-Magazine

www.OgdenArc.org

APRIL 2013

Next Club Meeting/Activity

3rd Saturday 20 April 2013

Topic: EmComm Hamfest



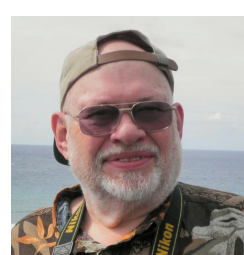
Larry Griffin AD7GL
President



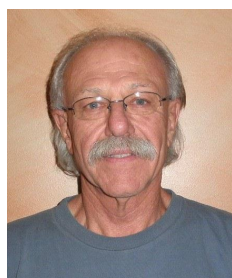
Gil Leonard NG7IL
Vice President



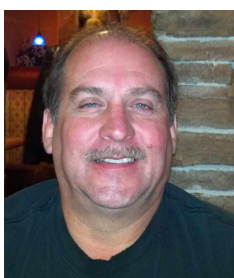
Gary Hudman KB7FMS
Secretary



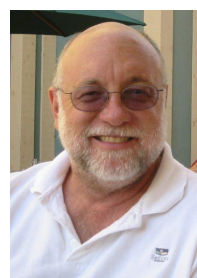
John Shupe K7DJO
Treasurer



Rich Kennedy KF7VAQ
Program Director



Dave Woodcock WY7P
Activity Director



Val Campbell K7HCP
Webmaster/NL Editor

PREVIOUS CLUB MEETINGS

3rd Saturday 16 March 2013

Topic: Get To Know Your Fellow Ham" social

Time: 9:00 AM

Location: Riverdale Fire Station

Meeting Topic: *Get to Know Your Fellow Ham" social.*

Refreshments will be served.

Please Bring:

Anything Radio-Related that you like to talk about (no formal presentations, just table side conversation).



















NEXT CLUB MEETING

3rd Saturday 20 April 2013

Activity: EmComm Hamfest
Time: 8:00 AM to 3:00 PM
Location: Ogden Weber ATC campus
Talk-In: 146.90 (pl=123)

Ogden-Weber Applied Technology College - Student Union Building

200 North Washington Boulevard Ogden, UT 84404

NOTE: Student Union Building (near UTA bus stop - west side of campus)
Use North Entrance. Plenty of parking on the north side of campus.

NOTE: Subway Boxed Lunch can be purchased/ordered at check-in

ECOMM HAMFEST 2013 REGISTRATION

Weber County ARES Team and OARC are sponsoring a HamFest on the 3rd Saturday 20 April 2013.

EComm 2013 will be held at the Ogden/Weber ATC on April 20, 2013. (<http://goo.gl/maps/6XyZJ>) about 2nd North and Washington Blvd in Ogden Utah. Registration is \$5 and will include 3 raffle tickets.

Preregistration (online only) will include 2 additional raffle tickets. Preregistration will still pay at the door. *Last day to preregister is April 13.*

More information can be found on the pre-registration form at the following website...

>>> Pre Register >>> <http://tinyurl.com/ecommm2013>

JOIN OARC

Renew your membership now!

Membership in the Ogden Amateur Radio Club is open to anyone interested in Amateur Radio. You do not need an amateur license to join us. You do not need to join the club to participate with us. Dues are used to operate the club, field day activities, and repeater equipment maintenance.

Joining is easy. Come to a club meeting or fill out an application form from the club website (click "Join" from the left side main menu). Instructions for mailing on the form.

DUES: Dues are \$15.00 per person and runs September - August.
Additional family members are \$8.00 each.

NOTE: New Hams >>> Membership in OARC is complimentary for remainder of 1st year licensed.

Club Badges

OARC Club badges are still available for all club members and non-members. The cost is \$8.00 each. You can order the badge with either a "PIN" clip or a "MAGNETIC" clip. Badge includes your Call Sign in large letters and your First Name in a somewhat smaller font in white lettering on a pitch black background. See example below.



Place your order along with \$8.00 in advance for each badge ordered and specify Pin or Magnet style fastener, Call Sign and First Name.

Contact any club officer via email or see them at the next club meeting.
See web site www.ogdenarc.org "Club Officers" page.

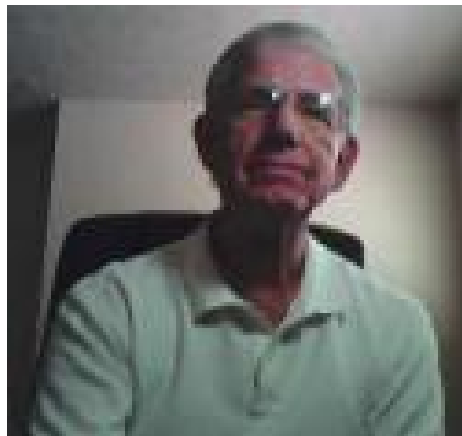
Club Swapmeet

"SALE" or "WANTED" ITEMS NEEDED

OARC's *O-bay (On-Line Swap-Meet)* items needed for the web site...

Visit <http://www.ogdenarc.org/> then click on **Obay-Swap**.

QST's and QRM from LARRY'S SHACK



Larry Griffin AD7GL President



QST'S and QRM from Larry's shack

I hope everyone enjoyed the last club meeting as much as I did. The member participation was excellent and "radio related item" sharing was very informative. It was fun to have some time to visit with all of you. If you liked this type of meeting, let us know and we'll calendar it again for next year.

Our Golden Spike Special Event Station club function is upon us. W7G will be on the air during the three days of the Golden Spike Anniversary Celebration. We will be operating on May 9, 10, and 11 from 9 AM to 5 PM. Our station location will be at the visitor center in Golden Spike State Park. **We really need your help!** We will be covering two hour shifts for all three days. **If you can help, please send Dave Woodcock or myself an E-Mail indicating when you can operate.** E-Mail and sign up information can be found under the Golden Spike announcement on the main page of the club website. We will greatly appreciate your assistance.

Another fun Field Day is coming up soon. Our Ogden Amateur Radio Club will be operating from the same great location as last year. We will be at Marriott - Slaterville Park again. The park is a neat place to have fun and operate Field Day. We hope you'll be able to join us. Please mark your calendar for June 22nd and 23rd. More information will follow. Please stay tuned.

Club Meeting attendance and membership has improved nicely during the last few meetings. Please remind someone you haven't seen for a while to come to our meetings. It is great to see more people join the fun. **Thanks to all of you for your help!**

And now for a shot of the latest and greatest mobile station:



I hope to see all of you at the EM COM/OARC Ham Fest on April 20th.

Thanks for listening.

Larry

CLUB NEWS

OARC Coming Events

- ARES Northern Utah Hamfest - 3rd Saturday 20 April 2013
 - Golden Spike Special Event - 9,10,11 May 2013
 - VE Test Session - 1st Wednesday 05 June 2013
 - ARRL Field Day Weekend - 22,23 June 2013
 - "T" Hunt - 3rd Saturday 20 July 2013
 - Steak Fry & Elections - 3rd Saturday 17 August 2013
 - Joint SwapMeet - 3rd Saturday 21 September 2013
 - VE Test Session - 1st Wednesday 02 October 2013
 - Family Dinner - 3rd Saturday 21 December 2013
-

Coming in May ... **NEW!**

Golden Spike Special Event Station Activity

Date: 9-10-11 Thu-Fri-Sat May 2013

Time: 9:00 am to 5:00 pm

Location: Golden Spike State Park Site

Meeting/Activity: [Golden Spike Special Event Station](#)

NOTE: We need Operators for this event.. Please sign up now.

Any/All class licenses acceptable:

Send email to [Larry Griffin AD7GL](mailto:ad7gl@msn.com) (ad7gl@msn.com) or [Dave Woodcock WY7P](mailto:wy7p_dave@yahoo.com) (wy7p_dave@yahoo.com) and specify preference:

>>> **Day/Date (9th/10th/11th) & Time slot (9am/11am/1pm/3pm)**

MORE CLUB NEWS

Submitted by Scott Willis KD7EKO



Mt Ogden Repeater Site

Mike Fullmer KZ7O

This is the **6th** and final picture in a series that Scott Willis KD7EKO and Mike Fullmer KZ7O took from the Mt Ogden repeater site during their recent visit to the site to do necessary repairs.

Scot and Mike are the OARC repeater engineers that keep our club repeaters at Mt Ogden and Little Mountain operational.

Next month: Little Mountain Repeater site repairs

MORE CLUB NEWS

William S. Hope - WA7GTL (sk)



(December 11, 1934 - March 30, 2013)



William S. Hope, the love of my life passed away on Saturday, March 30, 2013 at two minutes before Easter Sunday. What a special day for this wonderful man to go back to his Father.

He was born on December 11, 1934. There was a horrible snowstorm, and his father had to go in a sleigh to get the doctor. He was the first of four children born to John Sterling and Esther Henderson Hope.

He was raised on a farm in Clifton, Idaho. He worked hard as a young man. Then his parents divorced and he moved to Ogden and lived with his father. He worked for a trucking company until he joined the Navy. He graduated from Ogden High School.

While in the Navy he sustained a life changing event. He became a paraplegic. This did not stop Bill. He became active in Veteran's Sports Program. Just after he was rehabbed at Long Beach VA Hospital he went on a national tour to play wheelchair basketball. Howard Hughes paid all the expenses. He became a great bowler from a wheelchair. He could do anything he wanted without the use of his legs. He fished and hunted and truly enjoyed life, it was not wasted. He traveled all over the world. He was a great man.

Bill met the lady he loved and adored on a blind date. They were married in Ogden on February 16, 1974. They were later sealed in the Ogden Temple. They traveled extensively.

He was a High Priest in the LDS Church and had held different positions. He had a strong testimony of the Gospel.

He was preceded in death by his parents, and by a brother Claine. He is survived by the love of his life, Diane, three sisters, Leola (Bill) Oberman, Zanetta (Roger) Jacobson, O'Enone Ross, many nieces, nephews and cousins.

Funeral services will be held Tuesday, April 9, 2013 at 11 a.m. at Lindquist's Layton Mortuary, 1867 No. Fairfield Road. Friends may visit family Monday from 6 to 8 p.m. and Tuesday from 9:45 to 10:45 a.m. at the mortuary. Interment, Lindquist's Washington Heights Memorial Park, 4500 Washington Blvd., Ogden.

Special thanks go to the doctors and nurses at the ICU Unit at McKay-Dee Hospital. Thanks to all the wonderful friends and family who have been so concerned about Bill and a special thanks to the Koehne family.

In lieu of flowers please send donations to a Veteran's Organization of your choice.



2012 Marks All-Time High for Amateur Radio Licenses

At the end of 2012, there were almost 710,000 radio amateurs in the United States – the largest number in the history of Amateur Radio licensing.

In the past 40 years, the number of Amateur Radio operators in the US has grown at a steady rate:

- December 1971: 285,000
- December 1981: 433,000
- December 1991: 494,000
- December 2001: 683,000
- December 2012: 709,500

Source: 1971, 1981, 1991: print editions of Radio Amateur Callbook. 2001, 2012: www.ah0a.org. Please note: While the number of licensees has grown considerably over the years, we realize that these numbers include some who are no longer active in Amateur Radio. A recent survey of ARRL members, however, indicates that more than 80 percent of those responding are active.

New FCC Licenses

Totals issued per year: 2010 through 2012

Year	2010	2011	2012
Totals	27,528	23,953	27,082

Upgraded FCC Licenses

Totals issued per year: 2010 through 2012

Year	2010	2011	2012
Totals	10,726	10,337	10,283

These charts illustrate new and upgraded FCC license activity over the past three years, with results through the end of 2012 showing stronger than the previous year. More than 3000 more new licenses were issued in 2012 than in 2011, while upgraded license activity remained steady in 2012.

COMPARE AMATEURS PER FCC CALL SIGN REGION

CALL SIGN REGION	2001	2012
1	33,500	35,000
2	40,500	42,000
3	35,000	36,500
4	134,000	140,000
5	82,500	86,000
6	97,700	100,000
7	90,000	93,500
8	55,000	57,000
9	45,500	47,500
0	57,500	60,000
KL7 - Alaska	3,300	3,500
KP4 - Caribbean	4,200	4,000
KH6 - Pacific	4,300	4,500
Total US Amateurs	683,000	709,500

This chart shows the distribution of license holders by call sign region, comparing 2001 to 2012 and shows that the number of US licensees has increased by 4 percent since 2001!

GUEST ARTICLE

W8P Spreads the Word about End Polio Now

By Dan Romanchik, KB6NU

On Saturday and Sunday, February 23-24, 2013, amateur radio operators gathered at WA2HOM, the amateur radio station at the Ann Arbor Hands-On Museum. We were there to operate special event station W8P to commemorate the founding of the Rotary Club on February 23, 1905 and spread the word about Rotary International's End Polio Now Campaign (www.endpolio.org).

The goal of the End Polio Now program is to rid the world of this terrible disease. Rotary International launched this program in 1985, and with the aid of UNICEF, the World Health Organization, and the Bill and Melinda Gates Foundation has cut the number of cases by more than 99.9%. In 1988, polio was endemic in 125 countries. In 2012, polio is endemic in only two regions. We like to say that we're "this close" to eradicating polio.

The unique part of the special operating event is that stations all over the world took part in it. Rotary is an international organization, and its amateur radio fellowship, Rotarians on Amateur Radio (ROAR), includes members all over the world. In Australia, a group operated the special event station VI4POLIO. In Europe, Pertti, past president of ROAR, operated his station, EA7GSU. Here in the States, a group that included yours truly; Jack, N8PMG; Jameson, KD8PIJ; Dinesh, AB3DC; and Mark, W8MP operated W8P.

Since the museum is only open from 1500Z - 2200Z, we were only able to operate for seven hours on Saturday. We spent all of our time on 20m phone, with our beam pointed southwest, concentrating on working mostly U.S. stations. We had originally intended to operate on 14.287 MHz, but quickly had to change frequencies, as that portion of the band was occupied by participants in the Mississippi QSO party.

We finally ended up on 14.227 MHz and made a total of 110 contacts on Saturday. This included 29 states and four DX contacts.

On Sunday, we only operated for a couple of hours and made another 27 contacts. While we made fewer contacts on Sunday, the contacts that we did make were more poignant than the ones on Saturday.

My first contact on Sunday was with a gentleman who was spending the winter in Florida, but whose hometown was Standish, Michigan. He told me that his mother had polio, and in the late 1930s and early 1940s, they would put her on a bus for Ann Arbor, where she would receive treatments. While there's no way to be sure, I think that this ham's mother was taking part in some of the research leading to the Salk vaccine in 1955. That research took place right here at the University of Michigan in Ann Arbor.

I also talked to hams that had direct experience with polio. One was a polio survivor himself. Another's wife was a polio survivor. A third was a physician who had been to Africa and had treated polio victims there.

It was a real treat to combine two activities that I enjoy so much-amateur radio and Rotary-and it felt good to know that in some small way I was furthering the work of the End Polio Now campaign. I hope that next year we will once again operate this special event and get even more Rotarians and amateur radio operators to participate.

=====

When he's not trying to save the world, Dan, KB6NU enjoys working CW on the HF bands. For more information about his operating activities and his "No-Nonsense" series of amateur radio license study guides, go to KB6NU.Com or e-mail cwgeek@kb6nu.com.

FEATURE ARTICLE

VLA to the LWA Revisited

By Kent Gardner WA7AHY

Some time back (2008), my wife Lauralee and I made one of our yearly trips to Albuquerque, New Mexico to visit our son and his family.

Being a member of the Society of Amateur Radio Astronomers (SARA), I was well aware of the Very Large Array (VLA) of radio telescopes located West of Socorro, New Mexico. Socorro is 60 miles south of Albuquerque and the telescopes are located about that same distance west. The VLA is officially named the Karl G. Jansky Very Large Array in honor of the founder of radio astronomy. We took a walking tour of the VLA and had lunch. It was so cool.

Many of you who saw Jodie Foster in the movie Contact will remember that the VLA was prominently featured.

This year (2013), SARA held their Western Conference in Socorro. Once again, Lauralee and I made the fun trip to Albuquerque so she could visit the grandkids and I could visit the VLA, this time with an in-depth tour of one of the dishes and a great tour of the nearby Long Wavelength Array (LWA). To me, it was one of the trips of a life-time. We were treated the first day to excellent presentations on radio astronomy. The second day was the visit to the VLA site.



A medium shot shows the magnitude of the project.

Each of the twenty-seven antennas weighs 230 tons and each dish is 25 meters in diameter. They are all transportable on railroad tracks. All the dishes can all be synchronized to work together as one large antenna.

As impressive as the VLA was however, I immediately took a liking to the new LWA radio telescope. The LWA antennas occupy a piece of ground to the South of the VLA. See the dishes in the background below.



Picture used by permission of the LWA Project Office at the University of New Mexico.

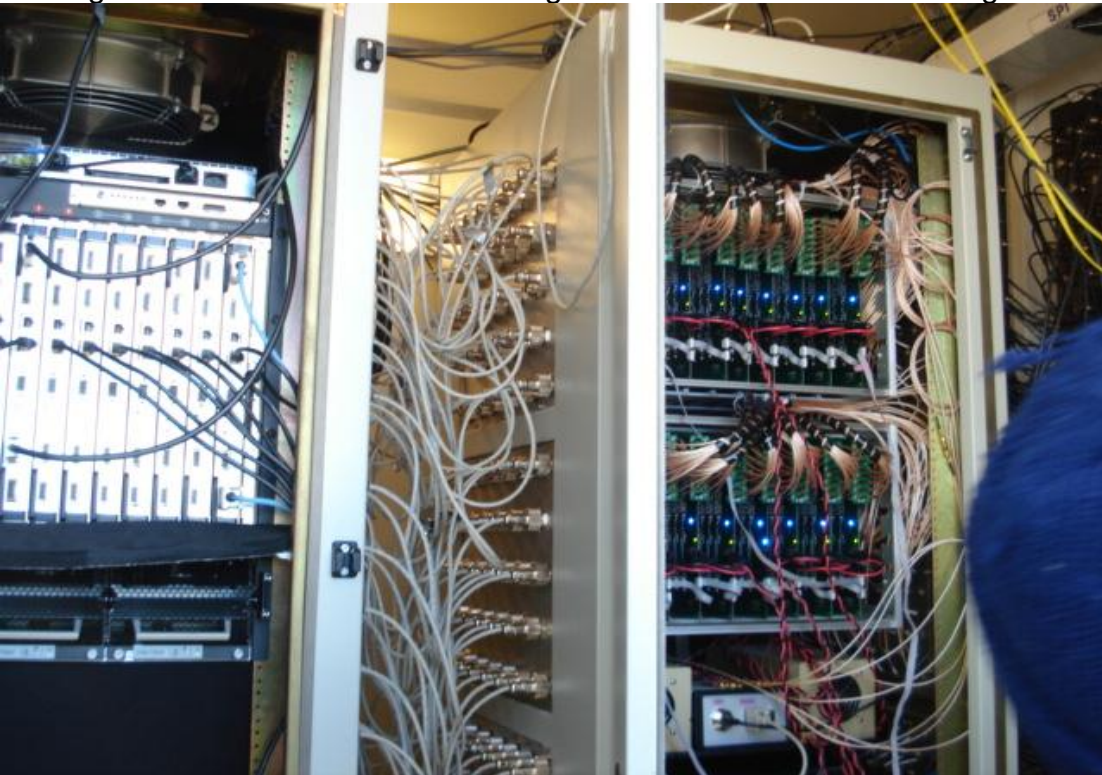
The picture above shows graduate students building a field full of these dipole antennas. There are 514 complete dipoles on 257 stands within a fenced boundary just over 100 yards on a side. They are similar to inverted vee antennas that we use in ham radio. The dipoles are fed with coaxial cables in underground conduits. The ground box below shows how many coaxial cables there are.



All these cables enter a radio frequency (RF) tight shipping container/trailer box through these feed-through panels.



The signals are then fed into the analog receiver rack shown on the right below.



From the receiver rack, the analog signals are transmitted, differentially, into the digital processor rack shown on the left. Here is where some in-trailer computers do some rudimentary processing. The data is then piped over fiber to the VLA complex and is processed by a computer cluster. The University of New Mexico also does some processing in Albuquerque.

Here is where it gets even more interesting. The signals are digitized and either recorded individually or combined into beams. Four of these independently-steerable beams are available, each with two sets of 16 MHz bandwidths that can be independently tuned to any frequency in the 5 to 88 MHz range.

The coaxial feed cables coming from the dipoles are cut to exact-engineered lengths. The phasing of each of these can be computer calculated and manipulated to form these beams.

Our tour guide was Joe Craig. He is the project engineer shown in the photograph of the outside input coaxial patch panel. He has been with the LWA since its inception. It was very cold and windy that day, but the trip and tour was entirely worth it to have been there in person to experience this kind of amazing science and engineering.

More information on the Long Wavelength Array is online at: <http://lwa.unm.edu>.

To view a brief video explaining beaming forming of signals arriving from space click the following link <http://OgdenArc.org/downloads/lwa.mpg> (25 Mb)

TNX

Kent, WA7AHY

ANNOUNCEMENTS

Next Club Meeting:

3rd Saturday of each Month

- The Ogden Amateur Radio Club meetings are usually held on the **3rd Saturday** of each month.

Meeting/Activity: See notices above

- **Talk-in: -146.90 (pl 123.0)**

Check OARC web site for details

www.ogdenarc.org

- Please invite a friend to join you. You do not have to be a member of the club to participate in our club meetings or activities. We invite all to join us.
- If anyone is interested in doing a presentation on something or just have something unique to show at the meetings. - Please get a hold of any of the officers and let us know.

Next Weber Co VE Test Session:

1st Wednesday 05 June 2013

- Exam sessions are held in Ogden every few months, *usually* the first Wednesday in February, June, and October.

Time: 05:00 PM *Walk-ins allowed*

Location: New for 2013

**Weber County Sheriff Office
Training Room
712 W 12th Street Ogden Utah**

Contact: VE Liaison:

Rick Morrison W7RIK morrisonri@msn.com
(801-791-9364)

Jason Miles KE7IET
(IT)

Mary Hazard W7UE w7ue@arrl.net
(advisor) (801-430-0306)

Cost: \$ 14.00

Two forms of **ID**, one of which must be a **picture ID**.

For "Upgrades" bring current **license** and a **copy** of current license, and any **CSCE**'s

Most **calculators** allowed. Calculator memories must be cleared before use.

Club Web Site

Be sure to visit our club web site.

- www.OgdenARC.org

Club membership is open to anyone interested in Amateur Radio. You do not need an amateur license to join us. Dues are used to operate the club, field day activities, and repeater equipment maintenance.

You do not need to join the club to participate with us.

Club Call Sign

Listen to the club repeaters for this very familiar CW ID. You do know Morse Code don't you?

- **W7SU**

ARRL Field Day is held on the last full weekend of June every year.

Location may vary each year so watch this notice for details as time draws near.

See you there.

OARC REPEATERS			
FREQ	CLUB	ZONE	LOCATION
146.820-	OARC	123.0	Mt Ogden
448.600-	OARC	123.0	Mt Ogden
146.900-	OARC "Talk-in"	123.0	Little Mtn (w/auto patch)
448.575-	OARC	100.0	Little Mtn (w/auto patch)

OTHER AREA REPEATERS			
FREQ	CLUB	ZONE	LOCATION
146.620-	UARC	none	Farnsworth Pk
147.120+	UARC	100.0	Farnsworth Pk
449.100-	UARC	146.2	Farnsworth Pk
449.500-	UARC	100.0	Farnsworth Pk
ATV	UARC	Ch-58	Farnsworth Pk
147.040+	DCARC	123.0	Antelope Isl
447.200-	DCARC	127.3	Antelope Isl
449.925-	DCARC	100.0	No Salt Lake
145.290-	GSARC	123.0	Brigham City
145.430-	GSARC	123.0	Brigham City
147.220+	GSARC	123.0	Brigham City
448.300-	GSARC	123.0	Brigham City
146.640-	BARC	none	Logan
146.720-	BARC	103.5	Mt Logan
147.260+	BARC	103.5	Promontory Pt
449.625-	BARC	103.5	Mt Logan
145.250-	WSU	123.0	* coming soon
449.250-	WSU	123.0	* coming soon
145.490-	K7HEN	123.0	Promontory Pt
146.920-	N7TOP	123.0	Promontory Pt
449.775-	N7TOP	123.0	Promontory Pt
448.825-	IRLP/Echo	123.0	Clearfield City
449.950-	IRLP	123.0	Clearfield City
449.425-	IRLP	100.0	Nelson Peak
147.360+	Summit County	100.0	Lewis Peak

AREA CLUB MEETINGS & WEB SITES

CLUB	WEB SITE	DATE/TIME	LOCATION
OgdenARC	ogdenarc.org	3 rd Saturday 09:00 am	Check OARC web site ...
WC ARES	ogdenarc.org/join.html#ares	2 nd Thursday 06:30 pm	Weber Co. Library Ogden Utah
WC Sheriff Comm-O		1 st Saturday 10:00 am	Weber Co. Sheriff Complex West 12 th Street Ogden Utah
Barc	barconline.org	2 nd Saturday 10:00 am	Cache Co. Sheriffs Complex 200 North 1400 West Logan Ut
CSERG	dcarc.net/ares.htm/	Last Wednesday 8:30pm	Clearfield City Hall Clearfield Utah
DCarc	dcarc.net	2 nd Saturday 10:00 am	Davis Co. Sheriff Complex Farmington Utah
NU Ares	home.comcast.net/~noutares/	3 rd Wednesday 7:00 pm	Cache Co. Sheriff Office Logan Utah
Uarc	xmission.com/~uarc/	1 st Thursday 7:30 pm	UofU EMC Bldg Room 101 Salt Lake City Utah
GSarc	Ubetarc.org	Check Website	Check Website
Utah DX Association	udxa.org	3 rd Wednesday check web page for details	check web page for details Salt Lake City area
UvhfS	ussc.com/~uvhfs/	Each Tuesday 8:00 pm (refer to web site)	Weekly 2 meter net (no eye ball meetings)
WDArc	westdesertarc.org/	1 st Tuesday 7:00 pm	Tooele County Courthouse Tooele Utah
WsuArc	arcweber.edu	3 rd Thursday 5:30 pm	WSU Blding #4 Room ? Ogden Utah

LOCAL AREA NETS

DATE	CLUB	FREQ
Daily @ 12:30 PM mt	Utah Beehive net HF	7.272 Mhz HF LSB
Daily @ 07:30 PM mt	Utah Code net HF	3.570 Mhz HF CW
Daily @ 02:00 UTC	Utah Farm net HF	3.937 Mhz HF LSB
Sunday @ 8:45 AM	Ogden Old Timers HF net	7.193 Mhz HF LSB
Sunday @ 7:30 PM	GS ARC	145.430 - 123.0 (training net)
Sunday @ 8:30 PM	SATERN Net	145.900 - 123.0
Sunday @ 9:00 PM	Morgan Co Net	147.060 = simplex
Sunday @ 9:00 PM	UARC Info net	146.620- no PL tone required
Monday @ 9:00 PM	2-meter SSB net	144.250 Mhz 2-meter USB
Tuesday @ 8:00 PM	Weber ARES	448.600 - 123.0
Tuesday @ 8:00 PM	VHF Society Swap	147.120 + 100.0
Tuesday @ 9:00 PM	Bridgerland ARC	147.260 + 103.5
Wednesday @ 8:00 PM	GS ARC	145.290-, 145.430-, 448.300- (all 123.0)
Wednesday @ 8:30 PM	CSERG	145.770 simplex
Wednesday @ 9:00 PM	No. Utah 10m HF net	28.313 Mhz HF USB
Wednesday @ 9:00 PM	6-meter SSB net	50.125 Mhz 6-meter USB
Thursday @ 6:30 PM	Davis Co Elmers Net	147.040 + 123.0 New Hams
Thursday @ 8:00 PM	Weber State ARC	146.820 - 123.0 (coming soon)
Thursday @ 8:00PM	State RACES VHF/IRLP	145.490 - 123.0, 146.680 - 123.0 3 rd Thursday - even months only
Thursday @ 8:30 PM	Davis ARES	147.420 = simplex
Thursday @ 9:00PM	Wasatch Back Net	147.360 + 100.0
Saturday @ 8:00AM mst	RACES State HF	3.920 Mhz HF LSB 3 rd Saturday – odd months only
Saturday @ 11:00AM mst	QCWA net HF	7.272 Mhz HF LSB

OARC OFFICERS

President: Larry Griffin AD7GL

Vice Pres: Gil Leonard NG7IL

Secretary: Gary Hudman WB7FMS

Treasurer: John Shupe K7DJO

Program Director:
Rich Kennedy KF7VAQ

Activity Director:
Dave Woodcock WY7P

"WATTS NEWS" e-Magazine

NL Editor: Val Campbell K7HCP

OTHER CLUB APPOINTMENTS

Webmaster: Val Campbell K7HCP

Historian/Librarian: Kent Gardner WA7AHY

Advisor: Kim Owen KO7U

Advisor: Kent Gardner WA7AHY

Advisor: Stan Sjol WOKP

Photographer: John Shupe K7DJO

QSL Manager: John Shupe K7DJO

Equipment Manager: Val Campbell K7HCP

Repeater Engineer: Mike Fullmer KZ7O

VE Liaison: Richard Morrison W7RIK
Jason Miles KE7IET (IT)
Mary Hazard W7UE (advisor)

Club Call Sign Trustee: Larry Griffin AD7GL

73 es cul de W7SU

www.OgdenArc.org