



The BAARCer



July 2014

For Anyone Interested in Amateur Radio

Page 1 of 8

Club Call Sign: WØUJ

BAARC REPEATERS

53.110 MHz- 123.0 Hz
147.225 MHz+ (main rptr)
 145.130 MHz- Echo
 Link
 Node number 233515
 443.925 MHz + 110.9 Hz
 Packet: 145.670 MHz
 MNBRD, BRDBBS
 144.390 WØUJ-5 APRS
 Crosslake 147.030 MHz+
 Crosby 146.700 MHz+
 Tone 127.3
 Crosby 444.925 MHz +
<http://brainerdham.org>

OFFICERS

President + WWW

Editor:

Steve Mott **NØCRM**

Vice President:

Lyle Amundson **KØLFV**

Secretary:

Ron Finger **KØGOP**

Treasurer:

Doug Bergsnev **KDØERE**

Director-at-Large:

John Luce **WØWY**

Trustee + BAARCer

Editor: Fritz Bertelt
WØKO

Field Day 2014—Terry KIØFW & Lyle KØLFV, Chairmen



More Pix and Write-up on Pages 2, 3, and 4. TNX to all participants. Sorry we could not picture all of them.

Index of the BAARCer

Mtg. Minutes & FD—	2
DX Report—	3
BAARC FD 2014	
BAARC FD 2014	4
PIX	
100 years of Ham Radio History	5
Bike Tour & FCC TOWER PROJECT	6
More of Ham Radio History	7
Last Word—Updates Sunday Night Net	8

— Events Calendar —

Sat., July 5, Club Brkfst. @ 9 @ Northwind Grille in Brd.
Sat., July 19, Club Brkfst. @ 9 @ Northwind Grille in Brd.
Thurs., July 31, Club Meeting: Board @ 4 and Membership @ 7 @ Fire Hall.
 Program on High-Altitude Balloon Launches by Cory, Jim, and Al.
Upcoming Event: Annual TRIATHLON—AUG. Watch for details

Check the Club's Website and Activity Calendar

Listen for Activity Updates on our Sunday Night Nets

Encourage New Membership: Dues are still only \$20/year—a bargain for all you get. E-mail Doug for info: djbdesk@gmail.com

Have a Fun and Safe Holiday—Happy 4th of July

Thursday-June 19, 2014 - 4:00 PM - BAARC Board Meeting Minutes Brainerd Fire Station

President: Steve Mott, NØCRM
Vice President: Lyle Amundson, KØLFV
Treasurer: Doug Bergsnev, KDØERE
Secretary: Ron Finger, KØGOP

Past Presidents: Charles Lane, W5CCL; Al Doree, WØRC
Director At Large: John Luce, WØWY
Repeater Trustee: Fritz Bertelt, WØKO
Emergency Communications Director: John Luce, WØWY

Attendees: Steve NØCRM, John WØWY, Doug KDØERE, Al WØRC, Shirley KØDCW, Ron KØGOP, Lyle KØLFV, WØWUG, and Dave KBØSCT.

Secretary's Report: April Meeting Minutes were published in the May 2014 BAARcer; no corrections were noted. The website was updated for the ARRL 2014 Field Day. Sympathy card sent on behalf of Club for SK Al Cibuzar KDØCJL. Letter of thanks sent to Jack and Joanne Heidman, NØBVT, for their recent donation to the Club. Updated membership rosters posted to "Members Only" area of Club website. BAARC 2015 Hamfest Flyers and Posters completed. Two new ID badges made. **Motion to accept:** Lyle KØLFV, **Second** Al WØRC, **Passed.**

Treasurer's Report: Treasurer's report submitted showing all month's account transactions and balances to date. Club Liability and other insurance coverage was also discussed.

Motion to accept: John WØWY, **Second** Steve NØCRM, **Passed.**

Membership Meeting Program: Steve NØCRM gave an overview of recent and future Club programs and events. The July meeting is slated for a possible program on the recent **Forestview Middle School "High Altitude Balloon Club"** preparations, launch, and recovery.

Upcoming Events: Plans were discussed for **ARRL Field Day 2014** on June 28-29 at the Crow Wing County Fairgrounds. Final arrangements are being made with members of the MNANG and USAFR for their takedown of 2 Club towers. Coming in July: Initial **Repeater Committee Meeting:** 7 PM, Thursday, July 17, at the Brainerd Fire Station.

Digital & Emergency Communications: John WØWY was given approval to arrange for ARMER re-programming of 2 donated 800 MHz radios, by Granite City Electronics. The radios will be placed in the Club trailers for event emergency use, with anticipated improvement over the portable HT's currently loaned for this purpose. **Motion to accept:** Al WØRC, **Second** John WØWY, **Passed.**

The board meeting was adjourned at 5:17 PM.

Thursday-June 19, 2014 - 7:00 PM - BAARC Membership Meeting Minutes Brainerd Fire Station

Attendees: The President opened the Club membership business meeting at 7:10 PM with 23 members and guests present.

Information supplemental to Board Meeting Minutes: Steve NØCRM announced to the Club, the generous donation of a Communications trailer, by John WØWY. John's Trailer is well equipped for Club event use, and is smaller and easier to tow than our other full-size unit. The Club showed its appreciation for John's gift and will benefit from its use for years to come.

The business meeting was followed by a program on various Field Day topics by Lyle KØLFV, Ron KØGOP, and John WØWY.

--Respectfully submitted by **Ron KØGOP**, Secretary

FD 2014 Report: TOTAL CONTACTS: 289 (269 cont. USA, 12 Canada, HI, AK, PR)

BANDS WORKED: 80, 40, 20, 15

BAARC STATIONS: 9 :OPERATORS: 13

KØGOP, KØLFV, NØCRM, KIØFW, KEØAGA, KCØNAF, ADØHJ, KØNRI, WØRC, KDØERE, KBØSCT, WØWY, and WUØS. Everyone's talents are what made this kind of exercise work; of note were new Club members **Mitch ADØHJ's** assistance in repairing a damaged logging database, and new HAM **Erik KEØAGA's** 27 contacts on his first Field Day! **TNX to KIØFW and KØLFV for co-chairing this event.** I will compile and submit the Club FD 2014 log to ARRL.

73' Ron KØGOP

DX and the Paper Chase

The month of June wasn't stuffed with DXpeditions, but there was plenty of good DX available nonetheless. I've articulated it many times "any DX is good DX." We had a day of well over 250 sunspots making for great DX and a great time to renew old acquaintances like Charlie Ho in Hong Kong (VR2) and other contacts like Malaysia that have been buried over the past several months due to poor propagation. The Middle East was good for a couple of days making for some good DX just this past Monday and Tuesday. For the past 7-8 weeks the ARRL has been celebrating its centennial by putting W1AW on the air from every state including KL7 and KH6, using both phone and CW. This contest was joined from countries throughout the world that required W1AW to operate split because of the huge pileups. I worked most of the states on CW including Hawaii and Alaska...what great practice this was for me. There are so many good opportunities open for the use of CW, and if this old man can use the mode—anyone can master it. That's all for this month, and let me remind you to sit down at your station and call CQ because someone somewhere in this world is listening for you. So long for now, 73 es gud DX from Bob WØZPE—



On left is John WØWY in his new trailer. On right is Terry KIØFW with his 2014 experimental FD antenna. Lower left is Mitch KDØHJ with his newly acquired loop antenna and tuner system. Below is Al WØRC operating PSK 31.



Above is Dave KØNRI' fish house and ham radio shack when away from home. He used it for the John Beargrease Sled-Dog Race in the winter.



On left is the BAARC's FD antenna system with Old Glory in the wind. Above, Matt Amundson (pilot and ham) KCØNAF with dad Lyle KØLFV. Both enjoyed the time together in MN. Matt is from TX.



On left is Tim KDØYLO with Doug KDØERE checking out the bands just before start of FD. On the right



are three youngsters who came with their mom to admire Ron KØGOP's compactly outfitted military-style communications trailer.

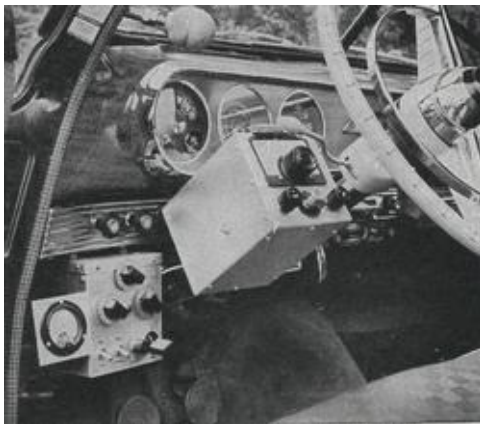
Lower left are Secretary Ron KØGOP and President Steve NØCRM examining the compact HF rig. Lower right is our newest member Erik KDØAGA getting some last minute pointers from his dad Rick WUØS. Talking this all in is Tim KDØYLO from Fifty Lakes. This is Tim's first FD.



A Century of Amateur Radio and the ARRL— from ARRL Letter

Continuing our look at ham radio in the early 1950s, we see that *QST* reported regularly on states that offered call sign license plates for motor vehicles. Just a handful of states offered call sign plates at first, but the idea gained momentum as more and more states joined in. Ham clubs -- or groups of ham clubs -- would lobby their state legislators to introduce bills requesting a new law. One notable example was Mississippi, where an *eight-member* Amateur Radio club lobbied successfully, leading to a new state law allowing Amateur Radio call sign tags!

With the help and advice of the ARRL, governments at the federal, state, and local levels started looking at ham radio's role in Civil Defense. The idea was to get a CD organization in place *before* an emergency, rather than waiting until afterward (as happened in World War II). By this time, the value of hams in providing emergency communication had been demonstrated to and appreciated by government agencies all over, so the ARRL's role was to get things operating smoothly while in the planning stages, rather than having to make a "hard sell."



Going mobile in the 1950s was not for the faint of heart, as can be seen in this 1952 ARRL *Handbook* photo. Note the crystal poking out from the transmitter below the dashboard.

The 1950s were, of course, the time of the "Cold War" and the threat of all-out nuclear war. Seattle, Washington, was the scene of a massive "A-Bomb Test," to test all aspects of emergency preparedness, should a nuclear device hit the city, and the Amateur Radio Emergency Corps -- as ARES was known in those days -- was a major asset during the test. On a related note, *QST* carried several articles on radiological monitoring during the early 1950s.

Following World War II, the number of private automobiles in the country increased by leaps and bounds, as vehicle production shifted from military to civilian needs, and as the populace became more affluent and more mobile. In 1938, about 1.7 million American cars were built; in 1953, more than 6 million. As a result, *QST* published many articles on mobile receiving converters, mobile transmitters (single-band and bandswitching), and mobile antennas -- particularly multiband antennas.

Other areas that received attention in *QST* included VHF topics, the Military Affiliate (now "Auxiliary") Radio System (MARS), huge rotary arrays for 10 meters, antennas for VHF/UHF, RTTY, HF receivers and transmitters, and electronic keyers.

The ugly face of zoning restrictions first appeared in the 1950s. The ARRL got involved in helping hams wage legal battles against overly restrictive community limits on antenna and tower heights -- or, in some cases, complete prohibitions of antennas. These cases were reported in *QST* as they developed. Happily, the radio amateurs always won complete or partial victories in the court cases, thereby setting precedents for future battles of a similar nature. -- *Al Brogdon, W1AB*

TOUR OF THE LAKES BIKE RIDE

The Brainerd Area Amateur Radio Club provided communications support for the Tour of the Lakes Bike Ride on Saturday, June 7, 2014. This is the 25th year of the Tour of the Lakes Bike Ride. The TOL had a short ride of 35 miles and a long one of 65 miles this year. We transmitted on 147.225+ and also operated APRS, which helped net control know where the SAG wagons were located. Net Control monitored the Armor frequency from the trailer, but we didn't have to use it this time.

BAARC had twelve radio operators working the event this year. We would like to thank all of the radio operators. The volunteers who worked this event are: SAG wagon operators: John WØWY, Shirley KØDCW, Dave KØNRI and Ron KØGOP. Our rest stop coverage was worked by Jim WØJDS – RS#1, Dave KBØSCT – RS#2 and Doug KDØERE & Dylan KDØLFE – RS#3. Roger WØWUG was our rover, and Al WØRC and Steve NØCRM did a great job as net control operators. Our floater for this event was Alan AAØAS and he helped cover RS#2 for us.

We had only one minor medical event and it was handled properly. We also had many, many flat tires due to the wet conditions at the beginning of the race. The SAG wagons were very busy all day.

THANK YOU to all the radio operators that worked this event. You all did a great job! The TOL Bike Ride organizers said we did a great job and they couldn't safely do this event without our help.

Al & Shirley--WØRC & KØDCW

JUST IN—FCC Okays Changes to Amateur Radio Exam Credit; New Rules for the Formerly Licensed :

The FCC's recently announced revisions to the Part 97 Amateur Radio rules governing exam credit to former licensees, test administration, and emission types will go into effect on Monday, July 21. The new rules were [published](#) in *The Federal Register* on June 20. Earlier this month, the Commission announced that it would grant examination credit for written elements 3 (General) and 4 (Amateur Extra) to holders of "expired licenses that required passage of those elements." However, the FCC will require former licensees falling outside the 2-year grace period to pass Element 2 (Technician) in order to be relicensed. The Commission declined to give exam credit to holders of expired *Certificates of Successful Completion of Examination (CSCEs)* or to extend lifetime validity to CSCEs. —*de ARRL*

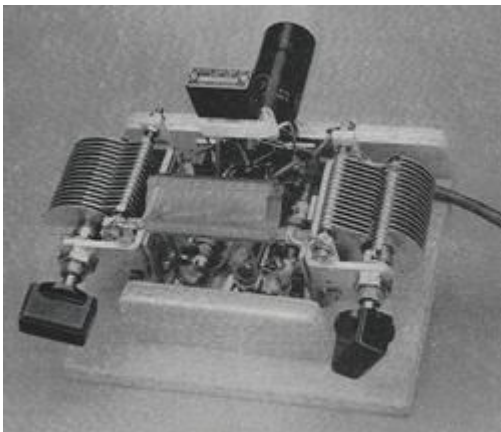
Tower Take-Down Activity June 22, 23, 24. We are extremely pleased and thankful for the work done by **eight** fine MN Air Force National Guard. They took down two towers with antennas. These were two systems: one donated to the BAARC (Gibson's) and the other one (ours and sold) that we were forced to remove by District 181 administration—along with our club station, done earlier. **We will have photos of these two operations and some of the participants in the August BAARcer.** Al WØRC was the coordinator with the military on this project. With the help of the Military and on-ground assistance from BAARC members, these projects are complete. Now we have two Mosley TA53M 5-band 4-element Yagis and a 60 ft. DMX tower for sale—also a Cushcraft HF vertical and VHF antennas for sale. **CONTACT LYLE FOR SALES INFORMATION ON THESE AND OTHER ITEMS.** The **BAARC helpers** were Al WØRC, Shirley KØDCW, Terry KIØFW, Roger WØWUG, Stan K3JKS, Fritz WØKO, Dave KDØVJL, and Lyle KØLFV. Lyle did the hauling of the beams and 60-ft tower, etc. This was a **three-day** event. WØKO has sent Alyce Gibson acknowledgment of the donation for the tax year 2014. Our thanks to all who helped out.

A Century of Amateur Radio and the ARRL—from the ARRL Letter

For many years, there had been talk about creating an entry-level ham license, first between the ARRL and the FCC, and later within the amateur community. Many who wanted to become hams viewed the 13 WPM Morse code test as an insurmountable obstacle. After much deliberation, the FCC decided to create a new "Novice" license class. The Commission began issuing Novice tickets on July 1, 1951.

In those early years, Novice licensees were allowed to operate CW on sub-bands in 80, 11 (yes, 11!), and 2 meters, and AM voice on a segment of 2 meters. Novices were restricted to crystal-controlled operation at an input power of 75 W.

Novice applicants had to pass a 5 WPM code test -- both sending and receiving. At first, the receiving test was made up of only 5-character words, making it an ever easier test. Early examinations consisted of 25 multiple-choice questions; the FCC would mail the test materials in a sealed envelope, and a local General or higher class licensee would administer the written and code exams to the applicant.



A lot of early Novices built their own gear. The 1952 edition of *The ARRL Handbook* included instructions on how to build this one-tube, crystal-controlled transmitter for the Novice.

The original Novice license had a 1-year, nonrenewable term, since it was anticipated that Novices could get their code speed up to 13 WPM and acquire the technical knowledge required to pass the General exam within that period. Earlier Novice call signs included an "N" after the W or K prefix. Upgrading to General often was referred to as "dropping the N." Later Novice designators included a "V" after the prefix, which became an "A" after the holder upgraded. The FCC eventually did away with special Novice call signs altogether.

One amusing aspect of that early Novice 80 meter operation: World War II crystals were abundant and inexpensive. Wartime military operation had been channelized, mostly using crystal control, and one surplus crystal frequency fell within the 80 meter Novice band -- 3735 kHz. As you tuned across the 80 meter Novice band back then, it sounded like a full-blown DX pileup, 24 hours a day, when you reached 3735 kHz (known in that era as "kc").

In later years Novice licenses were issued for 2-year non-renewable terms, and later still for 5-year renewable terms. More questions were added to the written exam. Other sub-bands were opened for Novices on 40 and 15 meters, 2 meter Novice operation was eliminated, and 11 meters was turned over to the Citizens Band. The FCC eventually allowed Novices to use VFOs.

On April 15, 2000, the FCC stopped issuing the Novice license. The Novice era had come to a close. A small number of Novices remain, but most upgraded long ago.

The aim of the Novice license had been accomplished: Opening access for more people to become part of the Amateur Radio community. -- *Al Brogdon, W1AB*

SUNDAY NIGHT NET OPERATORS

07-06-14	Rick	NØBJN
07-13-14	Dave	KCØTGT
07-20-14	Tim	KDØYLO
07-27-14	Doug	KDØERE
08-03-14	Rick	NØBJN
08-10-14	Dave	KCØTGT
08-17-14		
08-24-14		
08-31-14		

Can't make the schedule? Find a substitute operator. BAARC Sunday Night Net Control Coordinator is Fritz WØKO. To volunteer: w0ko "at" arrl.net

Can you help fill the schedule above?

King Juan Carlos, EAØJC, announced that he has turned over his throne to his son. The Spanish king turned 76 in January and had been allowed to take over from the dictator Francisco Franco in 1975.

Another Donation: Lyle KØLFV received a donation of ham gear for the BAARC from Jack and Joanne Heidman of Pequot Lakes. We again thank them for their generosity.

Gov. Mark Dayton proclaimed Amateur Radio Days in MN in commemoration of the 2014 annual ARRL FD.

Call Sign Changes: Rick Peterson is now NØSEH; Rick Vinje is now WUØS. Congratulations on your selections!!

A Get-Well Card was sent to **Curt Richmond**, one of our members in Pierz. We all wish him a speedy recovery.

Antique Floor Model Broadcast & Shortwave radios—project radios for the right buyer. One is a Sears & Roebuck model R-301. Contact Fritz.

Welcome New Member Erik Vinje, KEØAGA. He is the son of Rick WUØS of Little Falls.

HAPPY INDEPENDENCE DAY—4TH OF JULY

United We Stand



FIRST CLASS MAIL
Address Correction Requested

Brainerd Area Amateur Radio Club
c/o M. Fritz Bertelt WØKO
16167 Ahrens Hill Road
Brainerd, MN 56401