

F.C.A.R.C. Inc.
P.O. Box 773
Greenfield, MA 01302

FIRST CLASS MAIL



THE COMMUNICATOR THE COMMUNICATOR

February 2018

Upcoming Events

Feb 12 Mon 6:00 p.m.E-Board, 7:15 General Meeting, GCC Hammond Studio
Feb 17 Sat 8:00 am Breakfast, Denny's; 10 am Emergency Comm Group, GCC
Feb 19 Mon Presidents Day
Feb 26 Mon 7:00 pm VE Exams, Northfield Unitarian Church
Mar 10 Sat MTARA Hamfest, Castle of Knights Chicopee
Mar 17 Sat 8:00 am Breakfast, Denny's; 10 am Emergency Comm Group, GCC
Mar 19 Mon 6:00 pm E-Board, 7:15 General Meeting, GCC Hammond Studio
Mar 26 Mon 6:00 pm Technician license Class, GCC, 1st of 6 M-W sessions

Greenfield Winter Carnival Annual Sleigh Bell Race



February Meeting

"Elmer and Elmira" is the topic for our February 12 meeting (early in the month because of President's Day Holiday on the 19th). Experienced Elmers and Elmiras will be available to help new and not so new folks with what they need help with.

VE LICENSE TESTS

FCARC will hold VE License Tests on Monday Feb 26 at 7:00 p.m. at the Northfield Unitarian Church. Contact Al Woodhull N1AW for more information.

Secretary's Report

Minutes of FCARC e-board meeting on 22 January 2018

Chris, KB1NEK

Al explained that since we now have permission to change the frequency pair for the 70cm on Rocky Mountain in Greenfield, we need to have its duplexer re-tuned. Keith has been searching for qualified technicians, and has found two possibilities. Which one we use depends on the availability to do the job reasonably soon. The cost will be about \$50. A motion was made and seconded to appropriate up to \$100 for the work, and it passed.

Plans to present a class for entry level license are still in the works. It is in the written course announcements of the GCC spring catalog. We still need to organize our instructors and divide up the work.

Tracy Rogers, who was already scheduled to be the feature speaker at the members meeting to follow, was present at the e-board meeting. We asked her to explain what decisions FRCOG has made for the future of its Citizens Corps programs, CERT and MRC. Tracy said that the decision has been made for FRCOG to close out its involvement by the end of June, which is also the end of its fiscal year. She said a letter was sent to the coordinators of the Hampshire County and Berkshire County MRC programs asking if they would consider taking over the Franklin County program. The letter included a requirement that a certain amount of meetings and training of new recruits would have to take place in Franklin County.

Once a coordinator is selected to take over the Franklin County program, FRCOG would give that coordinator the keys to the storage container at the jail where our club has a small amount of space for its emergency and surplus equipment. FRCOG is working on the assumption that we will have to clear out our equipment by the end of June so some unspecified equipment now in the basement of the Transit Center can be moved into the container at the jail.

Our members made several arguments for allowing us to keep our equipment there. Tracy said that it would have to be up to the new coordinator, but so far as she knew space would have to be made so more supplies or equipment can be moved from the basement of the Transit Center.

Al passed around a sheet of paper listing prices of commercial self storage centers in the area. The cheapest is at the end of Laurel St. near the fairgrounds, for \$35 a month. It is not open at night, and there is no electricity on site. A better, but more distant possibility is at Bernardston Self Storage. It has 5 x 5 units for \$35 a month and 5 x 10 units for \$55 a month.

So far no member has offered space on his or her property to park a trailer or storage shed. But at least we found out we have about five months to make a decision and move our equipment. In that time, we may also have a chance to convince the new Citizens Corp coordinator to find a way to let us stay in the container at the jail.

On the back of Al's hand out with the self storage prices, he wrote a summary of the contributions amateur radio operators connected with the club have made over the years to the country's emergency response capability. We look forward to elaborating this list when we get to meet the new Citizen Corps coordinator.

In response to a question about Tracy's responsibilities as emergency program planner at FRCOG, she said the main focus of her work for over a year has been on strengthening the Health and Medical Care Coalition.. She also mentioned the recent adoption of a Multi Agency Coordinating Center for county use in large scale disasters.

News, Activities & Articles

Technician License Class Plans: March and April

Al, N1AW

Our October Technician License Class was a success. Nine of the ten participants who made it through all the scheduled classes are now licensed, one of them has already upgraded to General Class. We believe there are others in the community who could not take the class as it was scheduled in the Fall but are interested, and we have scheduled another class to begin on Monday March 26th.

We are doing this a little differently this time around. Our October class consisted of four evening sessions on Tuesdays and Thursdays plus a Saturday review and exam session. We found several problems with this. First, we did not have a way of reaching participants before the first class - so we could not assume they had already started to read the textbook before the first class. Also, one participant was unable to attend a Saturday session - he is the only one who has not yet passed the license exam, I don't know whether he even took it somewhere else.

So this time we plan to have six evening classes on, Mondays and Wednesdays for three weeks, instead of four evenings plus a Saturday. We hope the extra session will help everyone get off to a good start, and having the exam on the last evening class day will avoid another scheduling problem. Also, we believe there are some potential participants for whom a Monday-Wednesday schedule will work better than Tuesday-Thursday.

Another change we plan to make this time is to mix up the order of the classes from the order in the textbook. The ARRL Ham Radio License Manual has eight chapters that reference topics in the exam question pool. So that looks like a good match for a class that will meet eight times. There are really two kinds of topics that need to be learned to pass the Technician exam - there are parts of the exam that require technical knowledge, understanding of things like the relationship between wavelength and frequency or Ohm's Law. There are also things you have to learn about FCC regulations and standard operating procedures. These are not technical, they require learning by memorization. The textbook clusters the technical stuff and the rules and procedures stuff. We are going to experiment with going at things in a different order. We will divide each evening class into two sections, one technical and the other non-technical. We hope mixing up topics this way will make learning easier.

As this is being written in February we have four club members definitely committed to helping to teach the class. More help is welcome. If you would like to help please get in touch with Al N1AW or Jeanne KC1DCQ.

It would be a good idea to take a look at the textbook or at one of the websites that provides practice exams. You don't have to have an Extra Class license or an engineering degree to be able to help beginners pass the Technician exam.

Emergency Radio Planning Meeting Possibilities for future ARES activities

Chris, KB1NEK

At the club meeting on Jan.22, Tracy Rogers talked briefly about planning for a shelter drill to take place at the Turners Falls High School sometime in the early spring. Then on Wednesday, Jan. 25 at another meeting, a coordinator for the Hampshire County Medical Reserve Corps announced that it will be conducting a shelter drill in a few months at the Smith Vocational School in Northampton.

It is possible, but not yet sure, that amateur radio operators will be invited to participate in one or both of these drills. If we do, it will be an opportunity to demonstrate the usefulness of amateur radio communications in a disaster.

In the past, when asked to set up radio operations in a shelter located in a school, we have found it quite challenging. Often the building is large and constructed with enough steel and other metal that it partly shields radio signals from the outside. At a shelter in Gardner after the ice storm of 2008, one of our members, Chet Chin, volunteered to bring a J-pole antenna and long piece of coaxial cable to the hams working there. Chet then helped them place the antenna on the roof of the three story middle school, and connect the cable over the edge and down to a door on the ground floor, where it could be brought in to the operating position. Without that antenna, radios inside the shelter area could not connect directly to the nearest 2 meter repeater. We may have to try something similar at Turners Falls or Northampton.

The other problem in the past with shelter operations has been the failure to insure there will be operators in the town EOC to communicate to. After the October 2011 snow storm, I volunteered to help as an MRC volunteer at a small shelter in a nearby town. At midnight, an EMT with a public service radio left, taking the radio with her. I realized my own handheld amateur radio was useless since no provision had been made for another ham to stay awake at a location where it would be possible to pass messages to local authorities. Regular land line phone service was dead, and cell phones only worked if I stepped out into the cold night air.

Hopefully some of us will have a say early in the planning of the drills, so we can build a realistic operating scheme into the plan.

Report on January ARRL Board Meeting

AI, N1AW

Joe KB1WVO and I attended an ARRL New England Division cabinet meeting on January 6th. These meetings are hosted by New England ARRL Director Tom Frenaye twice a year, previous to ARRL Board of Directors' meetings in January and July. In the January Communicator Joe KB1WVO reported on the meeting and promised a report on the BoD meeting for February.

Complete official reports of ARRL Board meetings don't appear for a few months - look for one in April QST. But unofficial reports can be found on the Internet. Dennis Egan, W1UE, is president of the Yankee Clipper Contest Club and wrote an editorial for the February issue of the YCCC newsletter. With his permission, I am quoting parts of it here. He clearly states the opinions expressed are his own, but from all I have read I agree:

"A couple of months ago, it seemed like the entire governance of the ARRL was being renegotiated at the Board of Directors level, with seemingly no input from the membership. Radical, IMHO, proposals were being floated that would change the way that the ARRL has governed for the past 100 years. It seems that NY2RF felt that these changes were needed to more rapidly push through what he (being from the corporate world and, thus, more advanced than the rest of us) felt needed to be done. The Code of Conduct, the N6AA censure, the N2YBB proposals, and the K5UZ proposals all made the blood curl on longtime ARRL members. The response from the amateur community, from what I could tell, was loud and strong. IMHO, the membership made it clear that they did NOT want these ARRL changes to happen.

"So, on to the January Board Meeting. None of the above-mentioned proposals were even considered. The Code of Conduct was softened somewhat, and was going to be subject to a more thorough review at the July BOD. The N6AA censure wasn't rescinded, but its not dead yet. NY2RF, apparently knowing that his agenda wasn't going to pass, resigned the day before the BOD meeting."

As a footnote: not only did ARRL CEO Tom Gallagher, NY2RF, resign, but ARRL President Rick Roderick, K5UR, was not re-elected without opposition. Our own New England Director

Tom Frenaye, K1KI, was also nominated and received six votes. I am pleased that Tom obviously heard and stood up for opinions expressed at the cabinet meeting.

MTARA Hamfest Coming March 10

AI, N1AW

The annual Mt Tom Amateur Repeater Association Amateur Radio & Electronics Hamfest will take place on Saturday March 10, 2018 at the Castle of Knights, 1599 Memorial Drive in Chicopee. This is the major such event of the year in the Pioneer Valley. Looking back at my Communicator archives, it looks like this is the eighth year that the MTARA has invited all local amateur radio clubs to have a table, free of charge, to publicize their club and let club members sell their surplus items. The FCARC will again take advantage of this generous offer. We have several club-owned items to sell: power supplies, transceivers, and other items that have been donated to the club. In addition, club members are welcome to bring their own items to sell. We will ask a contribution of 10% of your sales to the club, but we will waive the commission if you help us staff the table for at least an hour.

There will be raffle prizes, six tickets for \$5. Talk-in will be on the Mt Tom repeater, 146.94 (PL 127.3) The website for more information about the hamfest is <http://www.mtara.org> .

The HCRA will also hold the drawing for their annual raffle. The HCRA prize a Yaesu FT-891 and a Yaesu ATAS-120 antenna. The HCRA will sell only 250 tickets. You should check their website <http://hcra.org> to find if there any still available; if so they will be for sale at the HCRA's hamfest table.

General admission is \$5.00 and doors open for the public at 8:30 a.m. Doors will open at 6:30 for vendors and I hope one or two members will join me to help set up. Contact me (mailto: n1aw@arrl.net) for more information or if you want to sell an item but cannot attend

Canadian Radio Amateur Finds Resurrected NASA Satellite

from ARRL website 01/29/2018

When he's not on ham radio, Scott Tilley, VE7TIL, an amateur astronomer, hunts spy satellites. Using an S-band radio from his home in Roberts Creek, British Columbia, Tilley routinely scans the skies for radio signals from classified objects orbiting Earth, according to a recent article on Spaceweather.com. Since starting 5 years ago, Tilley has located dozens of secret or unlisted satellites. Earlier this month, while hunting for ZUMA — an undisclosed US government spacecraft lost in a January 8 launch mishap — when he saw the signature of IMAGE (Imager for Magnetopause-to-Aurora Global Exploration), a NASA spacecraft believed to have died in December 2005. The discovery has delighted space scientists.

“The long gone and nearly forgotten IMAGE spacecraft has come back to life and been

detected by an amateur astronomer,” said Mission Manager Richard J. Burley at NASA’s Goddard Space Flight (GSFC), which confirmed that what Tilley spotted is, indeed, IMAGE.

Amateur observer Paul Marsh, M0EYT, in the UK provided the first independent confirmation of the IMAGE signal.

NASA said on January 29 that observations from five sites were consistent with the RF characteristics expected of IMAGE. “Specifically, the radio frequency showed a spike at the expected center frequency, as well as side bands where they should be for IMAGE,” NASA said “Oscillation of the signal was also consistent with the last known spin rate for IMAGE.”

If data decoding succeeds, NASA will try to turn on the science payload to understand the status of the various science instruments.

After the spacecraft went silent, an unsuccessful 2007 effort was made to track IMAGE in the hope that a “long shadow encounter” would drain the battery enough to cause IMAGE to reset its control hardware. When that effort failed, the mission was declared to have ended. Space scientists now theorize that an even longer eclipse — or other event — did reset the system and bring the transmitter back to life. Yet to be determined is whether it’s possible to restore IMAGE to operation and to what degree.

Launched in 2000 on a mission to monitor space weather, IMAGE mapped plasma patterns around Earth, keeping tabs on the planet’s magnetosphere as it responded to solar activity; on-board ultraviolet cameras shot images of Earth’s auroras. “It had capabilities that no other spacecraft could match — before or since,” said Patricia Reiff, a member of the original IMAGE science team at Rice University.

After seeing the radio signature, Tilley used a program called STRF to identify it. STRF deduces orbital elements from the Doppler shifts of their radio signals, and it immediately matched what Tilley saw to IMAGE.

THE COMMUNICATOR is an informational publication for members of the Franklin County Amateur Radio Club. Officers: President: Al Woodhull, N1AW (n1aw@arrl.net), Vice President: Joe Henefield, KB1WVO (joehenefield@comcast.net), Treasurer: Howard Field, N1LUP (howfield@comcast.net), Secretary: Chris Myers, KB1NEK (camyers1@verizon.net), Director: Belle Dyer, KB1NOG (bdyer58@mtdata.com), Director: Ron Niswander, K8HSF (reniswander@gmail.com). This is your newsletter! Amateur radio information of general interest, club member project descriptions and doings, radio applications to other activities, corrections, or suggestions are all welcome. Individual submissions make for variety! We need more writers! Send submissions to: Jeanne A. Dodge, KC1DCQ (j.annododge@gmail.com).