

Radio Amateur News & Views

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RANV SUMMER PICNIC Saturday August 2nd Kill Kare State Park

Everyone pack up your coolers and picnic gear and head over to Kill Kare State Park on Saturday, August 2nd for the **RANV** Summer Picnic. Activities will get underway at 11 AM and will run through the afternoon.

RANV will supply park admission, soft drinks and charcoal. You bring the rest. Be sure to bring family and friends, food to eat, appropriate sporting goods and clothing and any radio stuff you would like to play with. Leave pets at home since the park doesn't allow them, and it is too hot to leave a pet in the car. **Please let Brian know how many are in your group so that we can plan.** Most of the activity will center around cooking, eating and socializing.

Directions to Kill Kare are as follows: Take I-89 North to exit 19, St. Albans. Go past the light and down the access highway 1 mile to Route 7. Make a right and head 0.5 miles into downtown St. Albans. Look for Taylor Park (big green) on your right and then look for Lake Street and make a left. Go 3 miles on Lake Street until you come to the lake and the community of St. Albans Bay. The Bayside Pavilion will be at your left and a Shell station at your right. Make a right turn and head north. You will pass St. Albans Town Park. Keep going! You will only go 0.7 miles from the turn and will cross a small bridge. Right after this bridge, turn left on to Hathaway Point Road. Unfortunately, there is no sign for the Park at this junction, so you will have to pay attention. Go 3 miles to the entrance of the Park. If you have a GPS, the coordinates are: N44 46.778 W73 11.035. If you get lost, give a yell!

Let's have a great tunout and a great day at the picnic!

W1V AND FOX HUNT AT PICNIC

For those who couldn't get enough operating at Field Day, we will have plenty of opportunity for you to get on the air at the picnic. Once again, we will have W1V on the air. Our station will feature a very high antenna and amplifier to help pull in those weak ones. Be sure to plan some time to work a few in between munching burgers.

Some have asked about Fox Hunts this year. Activity for this has been down for the last few years and with the \$4 a gallon gas these days, it has also become an expensive proposition. However our picnic Fox Hunt will cost nothing to you except a little exercise. The hunt will commence after lunch, around 1:00. Bring your Fox Hunt stuff and have some fun!

STEERING WHEEL MEETING

As a reminder, the RANV Steering Wheel Meeting is always the 3rd Tuesday of the month at Manhattan Pizza on Railroad Avenue in Essex Junction. Discussions and eating get underway at 6:30 PM and tend to finish up around 9 PM. All members are invited to attend to help come up with new ideas for upcoming meetings and activities. As you have come to realize by now, we very rarely have a presentation about the same subject twice. If we do, it is because of a new development in the topic that makes it worth another look. This makes it very difficult for the same few people to come up with fresh and interesting ideas month after month. So please drop on by, if you can. Don't be afraid most of the talk is just casual ham radio, computer and other related chatter. The next Steering Wheel will be Tuesday, August 19th.

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OUR LAST RANV MEETING

by Paul AA1SU

Brian N1BQ called the meeting to order at 7:10 PM on Tuesday, July 9th. There were 17 members in attendance. He presented a short overview of Field Day, which went very well. Thanks to all who helped out at Field Day this year. It was announced that the August meeting will be the RANV Summer Picnic at Kill Kare State Park in St. Albans Bay on Saturday, August 2nd. There will no regular meeting on Tuesday.

Shel announced that he has a new call sign. Formerly KC1MP, he is now known as KC1VT. This is not to be confused with his long-standing club call – AA1VT. Moe N1ZBH and John KB1LIE were acknowledged for recently passing their General Class License exam. Congratulations guys!

The presentation was on how to program a modern radio with your home computer. Brian found a free program called *Link7000* that allows Kenwood owners to copy memories from one radio and copy it to a different model. Brian copied memories from his TH-D7A and then uploaded them into my TS-2000. This was handy, as my memory banks were blank. Kenwood also provides a copy of radio specific software when you purchase a new radio.

Bob KB1FRW then showed us some Yaesu software that had similar features. Unfortunately, Yaesu does not provide free software with their radios. Most of these programs can also import repeater data from TravelPus for Repeaters, available from the ARRL on a CD. You can also quickly change your memory banks to suite your travel needs by switching files.

John K1JCM then mentioned that various Yahoo Groups will often have files of popular frequencies, such as NASCAR, Railroad, Aircraft, etc that can be loaded into your radio for scanning purposes.

When all this was done, we broke for snacks and continued with enlightening radio chats until 9 PM.

THE PREZ SEZ

by Brian N1BQ, President

The big news right now is that, for the moment, RANV is homeless! The City of South Burlington administration is experiencing a space crunch. They need more office space. Their immediately solution is to move the Recreation Department office out of their office building on Dorset Street and into the O'Brien Center on Patchen Road, where RANV has met for years.

In the letter explaining the decision and consequent actions, Thomas Hubbard, the Recreation Director graciously offered help in securing a meeting venue possibly in one of the South Burlington schools. The timing on this was somewhat fortuitous in that our August meeting is the picnic at Kill Kare State Park in St. Albans, giving us an extra month to find a resolution. The **RANV** Board is currently exploring a number of options and we will keep the membership informed. We also would like to hear from anyone who may have concrete suggestions for a new venue.

Field Day has come and gone and RANV has put forth another superlative effort. Indeed it was our best performance ever. There were the usual suspects who were there for set up, operations and take down. We all know who they are and they have had their bows, but there are a number of people who come for setup and/or takedown but who for one reason or another can't or don't operate much. To them I must offer a great amount of thanks. We couldn't do it without that extra help, either we would be too tired by the time set up was done to give our best efforts operating, or so tired when we were done that take down would be pure hell. My hat's off to you!

It's that time of year again for summer camp and a RANV group is once again spending 3-4 days each week at Mount Norris Scout Reservation teaching the Radio Merit Badge and exposing the kids to ham radio and electronics. It a beautiful place to be, the staff treats us very fine, and these young men are a pleasure to be around. Organized last year by John K1JCM, we do 5-6 one week sessions each summer. We have a complete HF/VHF station with a healthy 200 foot doublet up 60 feet and a 2m/70cm vertical up 30 feet. When HF is not open we can reach all major repeaters for 50-70 miles around.

The Picnic is the first Saturday in August (August 2nd) at Kill Kare State Park in St. Albans starting at 11:00 and running until late afternoon. RANV pays your admission and supplies sodas, ice, charcoal and lighter fluid. You bring yourselves and the food. All hams, RANV members or not, are welcome. Just tell the person at the gate that you are with the ham radio group and let them get a head count in your vehicle. See you there.

Contacting RANV

In Person: Meeting: Summer Picnic

Aug 2, Kill Kare State Park

By Mail: PO Box 9392,

So. Burlington, VT 05403

By Radio: 145.15 repeater

WW Web: http://www.ranv.org

President: Brian N1BQ 899-4527

n1bq@wulfden.org

VP/Tres Bob KB1FRW 434-2517

mcamp@gmayt.net

Secretary: Carl AB1DD 482-3878

ab1dd@arrl.net

Editor: Mitch W1SJ 879-6589

w1sj@arrl.net

Please send submissions for the newsletter to the editor, W1SJ.

REPEATER NEWS

by Mitch W1SJ

Regular users of Hot 515 may have noticed that our receive capability has been reduced for some time, especially the HT users. Much of the time, one hears a heterodyne or whine in with the signal. In addition, what is not heard is that the receiver is quite a bit less sensitive. This is due to our transmit frequency of 145.15 MHz mixing with something else and generating a local signal on our receive frequency of

144.55 MHz which goes right through our filtering. It is like a weak jammer coming on every time the repeater is keyed up.

The problem became ap-

parent in March, 2007 about the same time someone attempted to break into the building and dropped a 30 pound grating on top of our duplexer, damaging it. The duplexer was replaced, but the interference did not go away. It was intermittent,

known factors.

Between the generally rotten weather all Spring and lack of time to devote to this project, the problem

coming and going depending on

outside temperature and other un-

was ignored for a while. To go up to that site, we need stable weather and a crew of at least 2-3 people. Solo trips are highly dangerous up there. Frankly, I was hoping it would go away on its own, but no such luck. Finally, we had a window of opportunity when I learned that Johannes KB1JDT had to visit the site for some work he was doing. We settled on Thursday, July 17th to go up.

It was a very hot and humid day and the forecast called for thunderstorms in the late afternoon, so we left very early. Fortunately, the crew was able to get a ride on a quad and a large vehicle called a gator. The trip up was very bumpy because they have been using the mountain access trail for other activities and it was all torn up. Unfortunately, we had to walk in the last ¾ mile. Besides the well known "Heartbreak Hill" which generally stops vehicles, we had a sizeable lake in front of that which literally required a swamp boat. It was a hot, sticky, wet and arduous climb with a 35 pound backpack. Finally, we arrived.

"It is like a weak jammer coming on every time the repeater is keyed up."

Last year, I attempted to locate the source of this problem, and initial indications with the limited equipment I had pointed to a problem in our box. So I spend a lot of time then taking the repeater apart and trying different parts and assemblies to no avail. The problem is that we are looking for a very weak (0.2 uV) signal on our input, only 600 KHz away from the 40 watts of our transmitter. in addition to a bunch of other transmitters up there. Brian WA1ZMS recommended bringing a single sideband radio to detect this signal. I ended up brining my small 2 meter SSB radio, in addition to a duo band FM radio, power supply, HT's, assorted connectors and tools. I also brought a scanner which I used as a weak signal source. Now you know why the pack was 35 pounds!

Using the sideband radio on the receive side of the duplexer, I quickly heard the offending signal. Now, with a clear telltale of what was happening, I was free to try different experiments to see where that signal was emanating from. Very quickly, I eliminated our equipment

- the signal was coming from outside. I went up the tower and opened up the hardline connector and it was clean (great job by Neil on the sealing job!). We hung a small antenna on the feed line and moved it around. Eventually, the offending signal was pinning the S-meter. The source was a 5.8 GHz data unit used by the local ISP to provide computer access to some remote areas. When I pushed on the unit, the signal jumped in

frequency. Gotcha!

Now I had to deal with the problem of fixing this. Johannes is familiar with these units in his work and the story isn't good. Essen-

tially, it is a computer and radio on a circuit board, mounted in an ungrounded plastic (yes, plastic) box on a tower, 5 feet from our antenna. Ever hold your HT near a computer or fax machine? All sorts of garbage comes out of these devices and your HT is inundated. This unit is no different. Evidently, one of the frequencies it is spewing out is mixing with our transmitter and crapping on our receive frequency. We took turns playing around on the tower tightening and grounding as much as we could and reduced the problem somewhat. I then moved our transmit frequency right back on 145.15 MHz, as it was moved up last year to reduce the interference. This almost eliminated the problem. However, it is still there and when the temperature changes, the signal will drift back up a few Khz and smack us head on again.

The full solution will be touchy as we will have to communicate this problem to a renting user and hope that there is a willingness to provide a solution. In the meantime, the repeater is working better. Enjoy!

MORE ON HAM RADIO SOFTWARE

by Paul AA1SU

As a follow up to the RANV meeting minutes, here is some more specific information on how to find cloning software for your radio. The link7000 software that Brian N1BQ showed us at the last meeting provides support for Kenwood TH-D7, TM-D700, TM-G707, TH-F6/ 7, TS-480 and TS-2000 radios. The program is a free download. It can also be registered for a \$35 fee, which will put an end to pop ups encouraging you to register it. Brian told us that he plans to register his copy just as soon as the author updates the program with support for another radio. I think it will be the Yaesu FT-817, which would be the first non-Kenwood radio to be included in the mix. The link for link7000 is: www.wa3hrl.com/link700.

As mentioned in the meeting minutes, Kenwood provides free copies of their memory control programs for several of their radios. For a free download, go to: www.kenwood.net and click on Amateur Radio Files Download under Amateur Radio Support. Then click on Download Amateur Radio products software and support files.

I also did some research after the meeting. I went looking for cloning software for my Yaesu mobile rig. I went to the Yahoo group hoping to find a free download of their ADMS software. I found a prospective link and clicked on it. It took me to a site to purchase cloning software for Icom and Yaesu radios. The link is: www.rtsystemsinc.com/index.cfm. The site sells some software not available from the manufacturer anymore. This makes it a necessary evil for those of us looking to hook our ham radio up to the computer. Typical prices are \$49 with a cable or \$25 without the cable.

Many Yaesu owners use freeware software. The older version is *Eve (a takeoff on ADMS "Adams")*. The newer version of software for the HT's is called *VX5* and *VX7 Commander*. You can easily find these by searching the Web and they download easily.

You can also do some more research on your radio and share it with us on the RANV Reflector. Yahoo Groups has many discussion groups dedicated to specific radios, and members will often upload ham radio cloning software to the *Files* section of the group. See what you can find and tell us.

USE OR MISUSE OF TECHNOLOGY

by Brian N1BQ

At our January meeting, Mitch W1SJ, gave a wonderful presentation on radio frequency interference (RFI). Among the anecdotes he related was one concerning a 950 MHz link transmitter used by a radio station to feed its on the air material from the studio to a remote transmitter site. It seemed that almost every weekday on or about 5 PM they would lose their link for 15-30 seconds. To make a long story short, after all sorts of investigation and surveillance they found out the cause. It seems there was a guy who commuted to/from work each day passing along a road by the remote transmitter site who was using a (quite illegally) cell phone jamming transmitter to keep people for a couple of hundred foot radius around him from using a cell phone. This, ostensibly, would render him safer from cell phone distracted drivers in his vicinity - a point that could be argued, but that is a whole other matter. That aspect aside, the problems caused by such broadband jamming would make a long list.

So, what possible use could there be for such technology? We have all heard of restaurants and movie theatres employing them, for reasons not without merit. But, likewise, the downsides of broadband jamming in such venues have to be considered as well

With all this fresh in my mind not long after Mitch's presentation I heard an interview with Peter Galbraith on National Public Radio. Galbraith, former US ambassador to Kosovo and former Vermont State Democratic Party Chair, is the son of John Kenneth Galbraith, President Kennedy's ambassador to India. During this time in his youth because of his father's position, Peter became friends with the late Benazir Bhutto, daughter of the then Prime Minister of Pakistan. They met again when he attended Harvard and she, at the age of 16 matriculated at Radcliffe. Their friendship grew and went on for many years.

It seems that about ten days before the fateful day of her assassination on December 27th, Ms. Bhutto called Peter Galbraith here in Vermont and made an odd request of him. She wanted him to obtain a half dozen cell phone jamming transmitters for her by using his influence with the Iraqi government, it being nearby.

It seems that in her dealings with the Musharef government concerning her upcoming return to Pakistan, her requests for cell phone jamming devices were consistently turned down.

Now, in case you haven't connected the dots, hacked cell phones is the remote detonation method of choice for the today's jihadist. Galbraith's efforts were rebuffed and ten days later Benazir Bhutto was dead by a cell phone detonated improvised explosive device.

I make no further comment other than to say, that I feel that this story gives yet another dimension to the ways in which technology being employed/ not employed can be used and misused!

SUPPORTING VENDORS AT HAMFESTS

by John VE2EQL

Hamfests are a time to meet old and new friends. It's a time to help our fellow radio operators clean up their basements and radio rooms. Or it's a time to help a member get rid of all his excess radio equipment. There are the bargains or deals of the century to locate.

But more importantly, our local hamfests are the perfect size to see all the tables, talk and meet with our friends, and hopefully take in a forum or two. The success of any hamfest is made up of 5 parts: 1) ham vendors, 2) hams that come and participate, 3) commercial vendors, 4) forums, and 5) food.

Besides looking at all the tables, we hams have a lot of projects on the drawing board or work in progress, or the ideal project that we want to get started on. By taking a look at our commercial vendors, you will find many items that you can not live without. Plus, since they are present, you will see first hand their wares, and should you wish to make a purchase you will be saving the shipping cost. Please keep in mind that any commercial vendor or private ham has taken the time and expenses to travel, unload and set up tables. Then he is trying to sell his wares. His goal is to return with less material. As members of RANV, we should make every effort to thank the vendors that support us.

Some of the things that I personally look for:

New Antenna Wire. I'm always experimenting with wire antennas. So I'm always looking for rolls.

Ladder Line. At one time this was very popular and plentiful. Now, due to reduced demand, it is getting harder to find. Many antenna projects use ladder line, and by getting it at the hamfest you will save the shipping costs.

Coax Connectors. How many times, have you required one, but your only option was to use a Radio Shack part. Then, you had to drive to the store, and ask someone who didn't know what a PL-259 was. I personally try to keep a few on hand. So If I mess one up, I'll have one handy. The cost of a package of 5 or 10 is very small compared to if you had to travel 10 or 15 miles to the nearest Radio Shack for only 1 connector.

Coax Cables. Again, you will save on shipping, and be able to buy immediately so you could start your projects. If you have a large requirement, it might be best to call at least 1 week before the hamfest to see if the vendor will have stock and to confirm the pricing.

Coax Adapters. If you are using BNC, SMA, UHF or N, vendors have all the adapters.

Take a look at the commercial vendors' websites, as they have many products that can be used. Remember, if they are successful, they will have incentive to continue to support us.

NEW ENGLAND DIVISION CONVENTION BOXBORO

The 2008 ARRL New England Division Convention will take place August 22-24th at the Holiday Inn Convention Center in Boxborough, Massachusetts. This convention, which occurs only on even years, features a tremendous forum and activities progam. Forums cover a wide range of topics and this year's speakers include Bob Heil from Heil Sound and John Johnston, formerly of the FCC. Inside, the dealers set up booths, while outside is the flea market. While not quite the size of Hosstraders, one can usually find an interesting array of goodies there. In addition, there will be a VE Session, special event station W1A and at midnight, the dreaded Wouff Hong Ceremony!

Boxborough is easily reached via I-89, I-93, U.S. 3 and I-495 and is 225 miles or about 3½ hours from Burlington. Forums and activities run all day Saturday and also Sunday until 2.

Details on the convention can be found at: www.boxboro.org

STARC SUMMER HAMFEST

FRANKLIN COUNTY FIELD DAYS AIRPORT RD, SWANTON I-89 Exit 21 to Route 78 East, 1 mile

Friday-Saturday August 15-16, 2008

Opens 6 AM Friday 6AM to 5 PM Saturday

Flea Market - Forums - VE Exams

Admission: \$5/day; \$8 both days Outdoor vendor: \$8/day, \$10 both days Indoor vendor: \$10/day, \$15 both days

> Information: www.starc.org n1arn@yahoo.com 802-285-6457 802-309-0666

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RANVP.O. Box 9392
South Burlington, Vt 05407

http://www.RANV.org