



Presidents Message

This past week has seen some crazy weather extremes. First there was a record high of 70 degrees, then a whole day of 40 to 50 mile per hour wind, and now another 3 to 4 inches of snow. Just keep saying “spring is just around the corner”.

Remember to get your Club dues for 2011 in to our new Treasurer Lou, KC2FXK. Dues must be paid by the April General Membership Meeting in order to remain a Club member in good standing.

With better weather fast approaching, we are making plans to tackle the two main objectives that I mentioned in January; the Clubhouse roof and the 2 meter repeater. We are contacting local trailer parks to find someone familiar with mobile homes that can give us their advice and prices as to the best way to proceed. We are also discussing options for the 2 meter repeater including relocation and even changing frequency.

Our Field Day Chairman Vinnie, N4NYY, has already lined up the band chairmen for this year. If the sun-spot numbers continue their recent climb, this could be a record breaking year, especially for the 15, 10, and 6 meter bands.

I hope everyone has checked out the W2MMD website, especially the Crosstalk newsletters from the past. Art, K2AWS, has done a lot of work scanning and putting the newsletters in electronic form on the website. By reading the newsletters one can see the changes in the Club, and even society in general, over the past 5 decades. One thing that I noticed in particular was that the Club used to hold more social events like picnics and banquets. These events allowed members to bring their spouses and children and get to know each other on a more personal level. Would the Club would be interested in holding events like these in the future? Let me know.

73, Al KB2AYU

March Club Meeting Program

At the March General Membership Meeting John Zaruba Jr., K2ZA, will give a presentation entitled “Digital Technologies for Emergency Communications.” John’s presentation will cover Automatic Packet Reporting Systems (APRS), Narrow Band Emergency Messaging Systems (NBEMS) and Digital Smart Technologies for Amateur Radio (DSTAR).

Down Jersey DXing

By Bill Grim, W0MHK

We have been having another tough winter in SNJ with weather and DX. Some of the high wind that has battered us has been less than kind to our antennas and radio conditions have been up and down with low bands being somewhat cooperative in long nights of winter, but nothing to get too excited about! Be sure to check your rotor(s) and antennas to see if they are still calibrated correctly. These strong winds have moved many a yagi off their intended direction. Compensate at the control box or make a note of the correction if it is severe enough to warrant outdoor repair. Nothing more frustrating than failing to work someone with the antenna pointed in the wrong direction!

The sun has seen fit to blast the earth with some pretty intense energy lately. One episode was the largest flare of its type in about 6 years! We might not be having the best solar cycle in years, but the flux numbers on average are heading up and that is to our DX advantage. Skewed Paths and Long Path will increasingly be noticed in DX signals as the cycle continues. These effects should improve DX. If you have a directional antenna, check out different paths for maximum reception of the signal. Again, checking spaceweather.com on the net is a great way to see what to expect for propagation in the near term.

A quick "59 New Jersey" can get you a new DXCC entity or a new band country in the upcoming ARRL International Phone Contest on March 5th through 6th. All of the world is looking for USA QSO's, so it's a great time to test out equipment, antennas, and skills at working DX stations. The exchange is simple and a great way to see how the bands are progressing with solar flux finally coming back. Reports are that 10 Meters and particularly 15 and 40 Meters were excellent for at least a day in the ARRL CW Contest in Mid-February. It was nice to hear some European stations coming in on a favorite band like 10 Meters in that contest!

Don't forget that an ESPECIALLY rare DX spot will be activated for about two weeks in mid-March. VU4, Andaman and Nicobar Islands, which are southeast of India, will be activated with four stations and around 20 operators. This one has always been quite difficult to work, and possibly favorable conditions will make it more available to the many that need a contact with VU4. If you can't "crack" them on reliable 20 Meters, probably 17 Meters would be the next best bet from SNJ. Google VU4PB or check out their plans at the amateur Radio Society of India website.

Possibly the following will help you recover from the aches and pains of the past month:

CALL	DATES	HIGHLIGHTS	RARITY	ENTITY
3W6LI	3/1-3/7	HF	4	VIETNAM
4A4A	3/3-3/20	5 STNS, 160-10M	3	REVILLA GIDEDO
CY0	3/7-3/15	HF	2	LESOTHO
VU4PB	3/15-3/31	4 STNS, 160-6M	5	ANDAMAN IS.
3D2A	3/15-4/02	160-10M, FOCUS:LOW BANDS	2	FIJI
9L5MS	3/15-4/04	3 STNS, 160-10M	2	SIERRA LEONE
MJ0CFW	3/18-3/21	160-10M	1	JERSEY IS.
VK9CF	3/19-3/29	160-10M, FOCUS: SSB	4	COCOS KEELING
EL	3/31-4/13	4 STNS, HF + 6M	2	LIBERIA

SOURCES: ADXO, NG3K

Super Capacitor Energy Storage Devices

By Lou Ranson, KC2FXK

A company named Maxwell Technologies, www.maxwell.com, in San Diego has developed a full line of energy storage devices that operate as super capacitors. Their line ranges from 5 farads to 2500 farads. Each device is rated at 2.5 volts. One of their more popular 10 farad devices can light a red LED for over an hour. The energy storage density of these devices is about 3 watt-hours per kilogram and about 84 watt-hours per cubic foot. Their goal is push the technology to about 15 watt-hours per kilogram over the next few years. But, to be practical for electric vehicles, they will need to exceed 100 watt-hours per kilogram.

Free Computer Monitor

By Doug Gehring, WA2NPD

I have a large, 20' diagonal screen, Trinitron computer monitor in perfect condition with cables available to the first caller for free. Call 468-2255 if you are interested.

Larry, AD2L, New DXCC Member

By Doug Gehring, WA2NPD

Larry, AD2L, recently earned his DXCC after several years of apartment living operation. Larry obtained his Novice Class License many years ago (1967) and it wasn't until recently, in 2008, that he earned his Extra Class License and became more involved in DXing. Being an apartment dweller, of course, limits one to a more of less modest antenna farm. He uses a long wire (160ft.) antenna and a match box but, nevertheless managed to work over 100 entities. This is quite impressive. Larry retired in 2009 and this status also helps with being able to devote more free time toward the radio station. Congratulations to Larry

30 Years Later

By Vinnie Sallustio, N4NYY

At our January 2011 General Meeting program, a slideshow was presented by Doug Gehring, WA2NPD, about various ham radio awards. During the slideshow, one of the slides was for a Megapoint Award earned by Gary Hitchner, WA2OMY, who was a teenage ham with the Club during the late 1970s. The award is given out by the Club when a ham contester achieves 1 million contesting points. When I asked if Gary was still with the Club, Doug said no. He said that Gary had either started a job or had gone away to college, around 1979, and was never seen or heard from again. Gary had never received the award that he had earned.

So that night, I checked QRZ, and saw that he was still a ham. I then Googled, and found him with the Mt. Airy VHF Radio Club (also known as the Pack Rats) in Southampton, PA. I contacted their club president, Doc Whitticar, W3GAD, and set it up for the GCARC to finally present Gary with his award, at one of their general meetings.

On Feb 17, 2011, Doug and I attended the Pack Rats general meeting, and finally presented Gary with his award, more than 30 years after he achieved it! It received a great reception, and everyone got a kick out of it! Congrats to Gary Hitchner on his award! It is better late, than never, even if it is after 30 years!

What We Have Here, is a Failure to Communicate

By Cory Sickles, WA3UVV

Twelve years and one month ago (as I type this), an event occurred in aviation and communications history that still has ramifications today. In 1990 on January 25th, Avianca flight 52 left Medellin, Columbia on its way to New York City. Piloted by a Spanish-speaking crew, they elected not to use their company's control dispatch system. This would have allowed updates as to the aircraft's position along the way and given traffic control personnel at JFK a "heads up" as to when the flight was expected to arrive into the New York Traffic Control Area. This is an incredibly busy TCA, with 3 major airports and several smaller ones within its footprint.

When the Boeing 707 entered the area, bad weather and already delayed traffic put them into a holding pattern. Thinking they would be landing shortly, the remaining fuel level was apparently not a communicated concern by the flight crew, initially. Later, they would ask for a "priority landing". This phrase is important for its meaning based on language and culture. In a Spanish to Spanish exchange, it can be interpreted to mean an emergency landing is required. In English it is not the same. The idea was presumably intended to mean "we need to get on the ground NOW", but was not received with the same meaning. While AVA052 could have initially diverted to Logan in Boston, it expended too much fuel while circling for over an hour.

Somehow, the low-fuel crisis did not get the appropriate attention of the initial Air Traffic Controller handling the flight and he handed it off to another one. When the controller now handling the flight finally asked how long they could continue to hold, the response was "about 5 minutes". Why an emergency was never declared by the crew remains a mystery.

If you've ever felt stress trying to find a gas station on the highway when your low-fuel indicator comes on in your car, magnify that feeling to being in the air with 80,000+ tons of aircraft and over 150 lives at risk. You might just have some idea of how it felt to be the pilot or first officer.

ATC instructed them to land, but neglected to keep them updated on severe wind shear conditions. Take a look at this clip to get some idea of what such conditions can mean:

<http://www.youtube.com/watch?v=Nc-X9WBWaBo&feature=fvsr>

I suggest turning off the unnecessary music.

The crew encountered shear at about 1,500 feet and again at 500, which pushed them down below the ILS glideslope and they barely pulled out of a crash at that point. Attempting a "go around", they told ATC they were running out of fuel. The controller instructed them to climb for another attempt. They radioed back a "No", again stating they were running out of fuel. A few moments later, the first of 4 engines flamed out, with the remaining ones shutting down in short order.

The plane lost all power, went dark and dropped into Cove Neck on Long Island in Oyster Bay. It broke into 2 main pieces as it slid down a hill in a remote area of the North Shore. While 73 passengers and crew died, 85 survived.

Police, Fire and EMS personnel were dispatched from Queens, Nassau and Suffolk Counties. Each service used different frequencies (and bands). Each respective county used different frequencies than the others. Not much cooperative communication was possible, impeding everyone's ability to locate the site and treat victims. Because of the remoteness of the site, most portables had severely limited range. Please see "Communicate" on Page 5.

“Communicate” from Page 4.

Ambulances were so numerous that they created a traffic jam on dirt pathways and couldn't get out of the area efficiently. Survivors with minor injuries were being transported before those with life-threatening injuries. There was no “big picture” communications available within the millions of dollars worth of “professional” equipment.

Hams also arrived on the scene to help. Every Ham knew what frequencies to use and they were able to communicate. A huge benefit of the Hams being present was that they were able to act as liaisons between the various communications systems in use by the agencies and quickly established something we know today as “interoperability”.

In the weeks and years that followed, interoperability would become the buzzword on every newscaster's and politician's lips, even if they didn't have the first freaking idea of what they were talking about. It's a proud tradition that continues today.

I've given you some detail of the entirely avoidable tragedy (and there was more than enough finger pointing and blame to go around) that this event represents, so that you have a fresh idea of how important effective communications is. Hopefully, you have some idea of just how important a bunch of non-uniformed folks with simplistic radios that know how to use them can be. I also want you to understand the seriousness of the need for effective communications at all times, but especially in emergencies.

We've seen other incidents when interoperability was desirable, not the least of which were the 2 separate attacks on the World Trade Center. For all the hype and all the taxpayer money spent, interoperability remains something of a Holy Grail to manufacturers and users.

Motorola provided Philadelphia with a much-hyped, multi-million dollar system that frequently crashed. Frequency assignments are still made with disregard to other (incompatible) services covering the same spectrum. Even after all these years, Ham Radio still represents the only system that can even approach interoperability (if you keep it analog) on a moment's notice with the best “bang for buck”.

At some point, it was decided that instead of trying to come up with “work around” solutions in currently-assigned spectrum, a new band of frequencies was needed. Factor in the framework for an analog to digital television broadcast transition and the “shiny metal” that attracts politicians to things like spectrum auctions and the 700 MHz band was conceived.

The new band was broken into “blocks” for different purposes. The auction(s) went well, with the exception of the D Block. None of the bidders saw much in the way of profit from how the FCC wanted to parcel it out and the price they wanted. So, the D Block went unloved.

Let's ignore for a moment the current transition from 5 KHz to 2.5 KHz deviation (narrowbanding) that Tom, KE2ES spoke about at the February meeting. Let's ignore the fact that while some municipalities have already spent money to comply with this new unfunded mandate and that more are trying to come up with a way to accomplish it. Let's ignore the factors that Tropo-ducting play on communications like in Gloucester County when digital TV stations' signals severely degrade communications for the same first responders that the digital transition was supposed to benefit. Let's ignore the incredible added expense that moving everyone from existing UHF frequencies to “The Undiscovered Country” of 700 MHz involves. Let's ignore the fact that no proven system that provides consistency has been demonstrated. Please see “Communicate” on Page 6.

“Communicate” from Page 5.

over the long term. Let’s ignore the other current users, including the military and yes, Ham Radio. Let’s ignore all this, because that’s what Representative Peter King (R-NY) has done. He has introduced HR-607, which is the most damaging piece of legislation to users in the 420~440 MHz and 450~470 MHz band in some time. Mr. King’s idea is to force us all off of these frequencies within the next 10 years, subsequent to another auction.

Now lest you think this is just some crazy idea from a random politician, Mr. King is Chairman of the House Homeland Security Committee! Yes, this idea comes from someone in charge and, if left alone, stands a reasonable chance of being passed into law in some form.

Many of us will remember the battle to take away (steal) our 220~225 MHz band since the Class-E CB proposals of the 70’s. Although that idea ultimately failed, it spotlighted the band and made it a target for the financial interests of others. Eventually, we lost 40% of the band, presumably for use with a package tracking system that UPS’s II Morrow division was supposedly developing.

How’d that go? The system never worked, was abandoned, and we didn’t get the 2 MHz back. Looking back, it was a total farce and all our arguments against it were valid. Yet, we still lost.

Our 70 cm band has come under attack before. From Low Earth Orbiting Satellites to companies like RECON, the band has been a desirable target. Now, the guy in charge of one of the very things we help with - wants to burn us. PAVE PAWS, a radar system that provides early warning for missile attacks, which we share spectrum nicely with – they get burned, too.

Oh, in case you think we don’t “really need” that 20MHz because it’s just used by OSCAR, ATV and the Weak Signal crowd and not repeaters, think again. A lot of links and backhaul communications take place there. Besides, how much ground do you really think you should yield? What band will come under attack tomorrow?

I could go on, but hopefully, every ham reading this understands the background, the threat and why we need to fight this NOW!

It takes less than 10 minutes to compose and send a letter to your Representative. Let’s kill this NOW, before it gets any more traction. Like a plague, the longer it’s allowed to continue unabated, the harder it is to cure and the more damage is done.

You can find the exact wording of the bill and additional background information here:

<http://www.arrl.org/news/spectrum-management-bill-threatens-amateur-frequencies>

Sample letters are available here:

<http://www.arrl.org/news/spectrum-management-bill-threatens-amateur-frequencies>

You can find your Representative here:

<https://writerep.house.gov/writerep/welcome.shtml>

OK, now stop reading this for a moment, open up a new browser window and TAKE ACTION. You’ve seen what can happen when communications failures occur. Let’s not allow our failure to communicate our message, in the strongest possible way - create another avoidable disaster!

March Birthdays

James Casto, N2IMH
Ed Champion, N2RO
Stu Cleveland, N2WUP
Jeffery Garth, KC2WCS
Doug Gehring, WA2NPD
Paul Muzenmayer, K2DX
Greg Potter, WN2T
Bill Price, NJ2S
Mark Smith, N2MR
Dave Strout, W2YC
Mark Townsend, W2OCY
Dan Tremolini, N2TXG
Wayne Wilson, WA2LET
James Wright, N2GXJ
John Zaruba, K2ZA

Crosstalk Submissions

This is your Club newsletter. Make use of it. Feel free to contribute general interest articles and ideas for articles.

All submissions, queries, comments and editorials should be addressed to Gene Schoeberlein at aa2yo@arrl.net.

Submission deadline for the April issue:
3/25/2011

Club Website

<http://www.w2mmd.org>

President-Al Arrison, KB2AYU
Vice President-Tom Gorman, KE2ES
Treasurer-Open

Chuck Colabrese, WA2TML
Doug Gehring, WA2NPD
Art Strong, K2AWS

Steve Blasko, W2TDS
Cory Sickles, WA3UVV

ARES/RACES-John, K2ZA
Awards-Dave, W2YC
Budget-Steve, W2TDS
Clubhouse Site-Al, KB2AYU
Club License Trustee-Darrell, AB2E
Constitution-As needed
Crosstalk-Gene, AA2YO
Database-Ken, N2CQ
DX-Bill, W0MHK
Field Day-Vinnie, N4NYY
Hamfest-Al, KB2AYU
Historian-Art, K2AWS

GCARC Officers

Recording Secretary-John Zaruba, K2ZA
Corresponding Secretary-Vinnie Sallustio, N4NYY

Board of Directors

Dave MacDonald, WB3JOY
Gene Schoeberlein, AA2YO
Bob Krukowski, KR2U

Trustees

Ray Schnapp, WB2NBJ
Mike Mollet, N2SRO

Committees

Hospitality-Ray, WB2NBJ
Membership-Cory/Ray, WA3UVV/WB2NBJ
Nominations-Al, KB2AYU
Programs-Tom, KE2ES
Publicity-Cory, WA3UVV
Repeaters-Al, KB2AYU
4H Liaison-Cory, WA3UVV
Special Services, Darrell, AB2E
Sunshine-Ray, W2RM
Technical/TVI-Cory, WA3UVV
VEC Testing-Gary, N2QEE
Website-Art, K2AWS

The W2MMD Repeaters

147.78/18 Mhz-Pitman
(CTCSS 131.8Hz)

223.06/224.66 Mhz-Sewell

447.1/442.1 Mhz-Pitman
(CTCSS 167.9Hz)

1272.4/1284.4 MHz-Pitman

GCARC Meetings

General Membership

7:30 pm 1st Wednesday every month
Pfeiffer Community Center
Williamstown, NJ

Board of Directors

8 pm 3rd Wednesday every month
GCARC Club site
Harrison Twp. 4H Grounds
1 mile south of Mullica Hill on RT77

Nets

ARES/RACES
Sunday 20:00 Hrs
(147.78/18 and
223.06/224.66
repeaters)

10 Meter- Sunday
following the
ARES/RACES Net
(28.350 Mhz)

March Meeting

Digital Technologies for Emergency
Communications
John Zaruba Jr., K2ZA

Gloucester County Amateur Radio Club
P. O. Box 370
Pitman, NJ 08071

