RCA AMATEUR RADIO CLUB

MARCH, 2011 MONTHLY NEWSLETTER

INDIANAPOLIS, IN

THE NEXT MEETING OF THE **RCA AMATEUR RADIO CLUB** WILL BE TUESDAY, MARCH 8TH, 6:30 PM AT <u>G.T. SOUTH'S</u>, 5711 E. 71st STREET, INDIANAPOLIS, IN

RCA ARC NEWS

SUMMARY OF THE FEBRUARY MEETING -- Some of the upcoming events were discussed including the February Indy Radio Club meeting on the history of Indianapolis area repeaters. Field Day will be a joint venture with the Indianapolis Radio Club again this year. This will be the forth year we have worked with the IRC and we continue to improve the setup each year. It will be at the Marion County Fairs Grounds with a setup similar to last years.

The Indy Hamfest was discussed and we are planning to have tables in the tent again this year. We have enough stuff left for one more year. We approved paying the annual dues to the Indiana Repeater Council and the Indiana Radio Club Council. K9RU, W9ZB and N9KZJ operated in the ARRL VHF contest and discussed band conditions during the contest.

The Indianapolis Radio Club is chartering a bus to the Dayton Hamvention again this year. This is "to the door service" at the Hamvention on Saturday, May 21. The bus will park at Hara Arena so you will have access to it. Tickets are \$35. Contact Jay Willever, K9LJW for tickets.

ON THE AIR: THE HF BANDS COME ALIVE FOR THE ARRL INTERNATIONAL DX SSB CONTEST -- With the CW running of the ARRL International DX Contest over, it's time to get ready for the phone portion. With the solar flux peaking at 125 during the CW contest -- and 10 meters in unexpectedly good shape and open to Europe during the event -- one wonders if the same kind of conditions will be present for the phone running, 0000 UTC Saturday, March 5-2359 UTC Sunday, March 6. With another region of the Sun coming around to face Earth for this contest, there could be more unstable conditions. But if the solar flux index stays high -- and there aren't any more solar flares -- the ARRL DX SSB Contest could have some openings like there haven't been in years. Are you ready? Read more here http://www.arrl.org/news/the-hf-bands-come-alive-for-the-arrl-international-dx-ssb-contest. -ARRL Letter

HAMFESTS, OPERATING EVENTS & TESTING

Mar 5	Amateur Radio Testing – IRC, 9AM, Indianapolis Training Center, 2820 N Meridian
	St, Indianapolis, IN 46208, Contact: Rhonda Curtis, e-mail: WS9H@comcast.net
Mar 5 - 6	ARRL International DX SSB Contest
Mar 5	Dugger Hamfest, Dugger IN
Mar 12	Terre Haute Hamfest, Terre Haute, IN http://www.w9uuu.org
Mar 26	Columbus Hamfest, Columbus, IN http://www.qsl.net/carc
Mar $26 - 27$	CQ WW WPX SSB Contest
Apr 16	IRC's "O'Dark 30 Swapfest" - Georgetown Road (Across from Speedway Track)

Apr 16 North Central Indiana Hamfest, Peru, IN http://www.nci-hamfest.net

May 7 – 8 Indiana QSO Party May 20 – 21 Dayton Hamvention

Jun 11 South Bend Hamfest, South Bend, IN http://w9ab.org

June 25 - 26 Field Day

July 9 Indy Hamfest, Camp Sertoma, Indianapolis http://www.indyhamfest.com

All dates, unless otherwise stated, are UTC. See the ARRL Contest Branch page,

http://www.arrl.org/contest-update-issues, the WA7BNM Contest Calendar,

http://www.hornucopia.com/contestcal/ and the ARRL Special Event Stations page,

http://www.arrl.org/special-event-stations for more info. See ARRL training page for test sessions:

http://www.arrl.org/exam sessions/search

SPECTRUM MANAGEMENT BILL THREATENS AMATEUR FREQUENCIES

On February 10, Representative Peter King (R-NY-3), Chairman of the House Homeland Security Committee, introduced HR 607, the *Broadband for First Responders Act of 2011*. The bill has been referred to the House Energy and Commerce Committee, which handles telecommunications legislation. HR 607 addresses certain spectrum management issues, including the creation and maintenance of a nationwide Public Safety broadband network. As part of that network, the bill provides for the allocation of the so-called "D-Block" of spectrum in the 700 MHz range for Public Safety use.

The D-Block consists of two, 5-megahertz-wide segments of spectrum (758-763 and 788-793 MHz) that became available when the FCC ended analog television broadcasts in June 2009 and reallocated the 698-806 MHz band for Public Safety and commercial broadband. It was anticipated that the D-Block would be auctioned for commercial use. There are several bills in Congress providing for the allocation of the D-Block for Public Safety use, and HR 607 is one of those. But HR 607 uniquely provides for the reallocation of other spectrum for auction to commercial users, in order to offset the loss of revenue that would occur as the result of the allocation of the D-Block to Public Safety instead of commercial auction. HR 607 lists the paired bands of 420-440 MHz and 450-470 MHz among the bands to be reallocated for commercial auction within 10 years of its passage.

"Of serious concern to the ARRL is the inclusion of the 420-440 MHz amateur allocation in the list of frequencies to be cleared for auction," said ARRL Regulatory Information Manager Dan Henderson, N1ND. "The ARRL and the Amateur Radio community certainly support the work of public safety agencies and understand their desire for an interoperable network; however, the inclusion of most of the amateur 70 cm spectrum as one of the replacement bands is illogical and unacceptable. The 420-440 MHz band is not Public Safety spectrum and should never have been included in any spectrum swap of Public Safety allocations."

Saying that the ARRL Washington team has already begun meeting with key Congressional staff on Capitol Hill, Henderson noted that Amateur Radio already shares the 70 cm band on a secondary basis with the governmental radiolocation services, such as the PAVE PAWS radar systems: "The 70 cm band is a critical and irreplaceable resource for Amateur Radio public service and emergency communications. The specification of the 420-440 MHz band in this legislation is ill-conceived. To be sure, the ARRL will vigorously oppose this legislation in its present form. It is, as evidenced by other legislation, completely unnecessary to the creation of a nationwide Public Safety broadband network or the use by Public Safety of the D-Block for that purpose. The role of the Amateur Service as a partner to Public Safety in the provision of public service and emergency communications necessitates the retention of full access to the entire 420-440 MHz band."

HR 607 is presently cosponsored by the Homeland Security Committee's Ranking Member,

Representative Bennie Thompson (D-MS-2) as well as Representatives Shelley Berkley (D-NV-1), Yvette Clarke (D-NY-11), Billy Long (R-MO-7), Candice S. Miller (R-MI-10), Laura Richardson (D-CA-37), Mike Rogers (R-AL-3), and Michael Grimm (R-NY-13).

ARRL is asking its members to contact their US representatives in opposition to the sections of HR 607 that could affect the Amateur Radio Service allocation at 420-440 MHz. ARRL Regulatory Information Manager Dan Henderson, N1ND, clarified that the League opposes HR 607 *in its present form*. "We do not oppose the concept of dedicated spectrum for the development of a Public Safety infrastructure and wireless network. We object to the bill because of the inclusion of 420-440 MHz as part of the spectrum to be swapped and auctioned to commercial users."

You can find a sample letter, "how to find your Representative" and the contact information for ARRL's legislative consultant, Chwat & Co, at http://www.arrl.org/sample-letters. –ARRL Letter

ARRL MEMBERS RESPOND TO HR 607

Last month, a bill was <u>introduced in the US House of Representatives</u> that addresses certain spectrum management issues, including the creation and maintenance of a nationwide Public Safety broadband network. This bill -- <u>HR 607</u>, known as *The Broadband for First Responders Act of 2011* -- if passed, also calls to auction off parts of the 70 cm band, namely 420-440 and 450-470 MHz. As such, the <u>ARRL asked its members to write their Representative</u>, asking them to not support HR 607 in its current form.

According to ARRL Regulatory Information Manager Dan Henderson, N1ND, Chwat & Co -- the ARRL's legislative relations firm in Washington, DC -- received almost 1000 letters in just the first week from League members in opposition to HR 607. "This is a great start and many thanks to the diligent members who have risen to the challenge; however, it cannot stop there. As long as HR 607 is in its current form, we must continue this campaign." He clarified that the ARRL opposes HR 607 in its present form: "We do not oppose the concept of dedicated spectrum for the development of a Public Safety infrastructure and wireless network. We object to the bill because of the inclusion of 420-440 MHz as part of the spectrum to be swapped and auctioned to commercial users."

Henderson shared a few pointers for writing letters in opposition to HR 607. He said that two of the most frequently asked questions that he receives are *Why does the ARRL ask us to funnel our letters to Congress through Chwat & Co? Why can't I send my letter directly to my Representative?*

"Trust me when I say I understand your concern and I firmly believe that the more input members of Congress receive -- either for or against an issue -- from their constituents, the better the public interest is served," Henderson said. "But using the services of Chwat & Co has many advantages that help the ARRL further its legislative agenda. The most important part of our system is that hand-delivery of constituent letters to a Congressional office provides the opportunity for a face-to-face meeting with key staff or your Member of Congress -- an opportunity to make our point directly."

Unfortunately, several dozen letters sent to Chwat & Co. are not usable for a variety of reasons, Henderson explained. Some letters are in support of bills that the ARRL supported in previous sessions, but have no bearing on HR 607. Henderson cautioned that bill numbers change in subsequent Congresses, as do the issues being addressed: "Please make sure your letter is addressing the correct issue. Don't 'dust off' that letter you sent previously -- it will not help with the current problem."

While we all look for "easy" ways to express ourselves to our Representatives, a letter sent without a signature carries little weight when Congressional staffs begin assessing support or opposition to a bill. Though many members of Congress have websites where constituents can simply fill out a web page form to share their thoughts with their Representative, such web forms have only limited usefulness in

lobbying on a specific issue. "The fact that a constituent makes the effort to sign a letter personally -then sends it in via fax, regular US Mail or by scanning the signed letter into a PDF then e-mailing it -has a far greater impact than an unsigned e-mail or web-based form," Henderson said. "Please make
sure your letter carries your signature. It does make a difference!"

Henderson said that several letters received at Chwat & Co were addressed to the wrong person. For example, there were several letters addressed to Senator Boxer, but began with "Dear Representative Boxer" -- an incorrect title. "We are not asking letters be sent to members of the Senate -- only to your Representative in the US House. If you are unsure of who your Representative is, you can find out here."

Sometimes, in our eagerness to help, we can overlook some of the basics, like grammar, spelling and the proper form of address. "Please proofread your letter several times to ensure it is accurate," Henderson advised. "This should include all names, addresses and salutations, as well as any comments or edits you may add to our form letter." He said that by reading the final letter out loud to yourself several times before sending to Chwat & Co, you can find most, if not all, mistakes.

"Defeating HR 607 in its present form is a fight Amateur Radio can win -- but only with thoughtful participation by us all," Henderson explained. "Thanks to all of you for your efforts and let's keep this moving forward. Protecting our spectrum is important to all of us! – ARRL Letter

AMATEUR MF ALLOCATION MOVES A STEP CLOSER

Amateur Radio has moved a step closer to a medium frequency (MF) allocation below the AM broadcast band. During the first week of the Conference Preparatory Meeting (CPM) for the 2012 World Radiocommunication Conference (WRC-12) of the International Telecommunication Union (ITU), held in Geneva February 14-25, delegates completed the drafting of nine pages of analysis of the technical and regulatory issues related to WRC-12 Agenda Item 1.23: consideration of a possible secondary allocation to the Amateur Service of about 15 kHz somewhere between 415 and 526.5 kHz. Two possible methods of satisfying the agenda item, along with the possibility of there being no change (and therefore no allocation), are set out in the CPM Report, along with the advantages and disadvantages of each.

What is now called Method A envisions an allocation of up to 15 kHz between 472 and 487 kHz. Method B calls for allocations of 461-469 kHz and 471-478 kHz. Another Method that had been developed at earlier meetings of Working Party 5A of the ITU Radiocommunication Sector, for an allocation of about 15 kHz between 493 and 510 kHz, was dropped from the draft CPM Report because no support for this approach had developed among the administrations participating in the preparatory process. A new digital system centered on 500 kHz is being developed by the maritime radio community, and an amateur allocation, even on a secondary, not-to-interfere basis, was found to be incompatible with the planned system.

"The hard work of a team of radio amateurs led by the International Amateur Radio Union (IARU) -- and with considerable help from friendly administrations -- has gotten us to this point," said ARRL Chief Executive Officer David Sumner, K1ZZ, who attended the first half of the CPM on behalf of the IARU. "While more support will need to be developed among other administrations if we are to achieve an allocation at WRC-12, our prospects are better now than they were a week ago." He gave particular credit to Ken Pulfer, VE3PU, who has coordinated the IARU effort and gained valuable support from the Canadian administration. "Ken and the IARU team have been working on this issue for three years," Sumner said.

ARRL Chief Technology Officer Brennan Price, N4QX attended the CPM as a member of the United States delegation. The US supports what is now called Method B, which also has sufficient support among other administrations in the Americas to have become an Inter-American Proposal of the Inter-

American Telecommunication Commission (CITEL) [see this article for more information]. At this stage, what is now called Method A has support from several administrations in Europe, Africa, Asia and Oceania.

WRC-12 will be held in Geneva next year from January 23 to February 17. -ARRL Letter

THREE YACHTSMEN KILLED BY SOMALI PIRATES WERE HAMS

Four Americans -- including three Amateur Radio operators -- who were being held hostage on their yacht by pirates off the coast of Oman have been killed. Scott Adam, K9ESO, and his wife Jean, KF6RVB, along with Bob Riggle, KE7IIV, and Phyllis Macay were on board the S/V *Quest* when pirates boarded their vessel on Friday, February 18. The Adams were based in the Los Angeles area; Riggle and Macay were from Seattle.

According to the US Central Command, the boat was in the Indian Ocean, headed toward the Somali coast when on Friday, the 58 foot yacht sent a distress signal. The boat was being trailed by US Navy forces; it was about a two day sail from the Somali coast. They had begun tracking the yacht after being alerted that a Danish naval helicopter had seen the *Quest* off Oman under the pirates' control. The Central Command oversees US anti-piracy operations in the Indian Ocean.

Officials were in the process of negotiating for the Americans' release when gunfire was heard around 1 AM (EST) on Tuesday, February 22. "As (US forces) responded to the gunfire, reaching and boarding the *Quest*, the forces discovered all four hostages had been shot by their captors," a statement from US Central Command said. "Despite immediate steps to provide life-saving care, all four hostages ultimately died of their wounds." Read more here. –ARRL Letter

ARISSAT-1 DEPLOYMENT POSTPONED

According to the AMSAT News Service, the deployment of the ARISSat-1 satellite from the International Space Station -- previously scheduled for Wednesday, February 16 -- has been postponed. The postponement was necessary because of changes in the work schedule for the February 16 space walk. Instead, ARISSat-1 deployment will be added to a spacewalk scheduled for July 2011.

When launched, ARISSat-1 will add another dimension to science classrooms worldwide, in addition to space communications for the Amateur Radio community. Unfortunately this delay will considerably narrow the window of opportunity for US school calendar activities, but may provide opportunities for summer learning activities.

The project is a cooperative effort between AMSAT, ARISS (Amateur Radio on the International Space Station,) RSC-Energia (the Russian space agency) and NASA. The design, development and construction of the satellite were done entirely by AMSAT volunteers. Original plans called for the satellite to be hosted inside an old Russian spacesuit. But when the suit became unavailable, the radio equipment was modified and refitted to a newly designed space frame and named ARISSat-1.

After it is deployed from the International Space Station, ARISSat-1 is expected to be operational in orbit for up to six months. For more on ARISSat-1, check out this article from the February 2011 issue of *OST*. –ARRL Letter

SHORTS

ARRL FIELD DAY: 2011 FIELD DAY PACKETS AVAILABLE -- It's that time of year again -- time to start gearing up for ARRL Field Day, June 25-26, 2011! ARRL's flagship operating event -- always held the fourth full weekend in June -- brings together new and experienced hams for 24 hours of operating fun. Field Day packets are now available for download and include the complete rules (including a change for 2011), as well as other reference items such as forms, ARRL Section abbreviation list, entry submission instructions, a Frequently Asked Questions section, guidelines for getting bonus points, instructions for GOTA stations and a kit to publicize your event with the local press. Read more here. –ARRL Letter

NASA ASSESSING NEW LAUNCH DATES FOR THE GLORY MISSION -- Preparations for the launch of NASA's Glory mission from Vandenberg Air Force Base in California have been suspended temporarily. Engineers continue to troubleshoot a malfunction in ground support equipment associated with the Taurus XL rocket. This is the launch from Vandenberg AFB that includes the University of Kentucky, University of Montana, and University of Colorado cubesats. For status updates on the Glory launch, visit: http://www.nasa.gov/glory --AMSAT News Service

DAYTON HAMVENTION: ASTRONAUT DOUG WHEELOCK, KF5BOC, TO BE HONORED GUEST OF ARRL AND AMSAT -- Doug Wheelock, KF5BOC, will be attending the 2011 ARRL EXPO - part of the Dayton Hamvention® -- as a special guest of the ARRL and AMSAT. While at Hamvention, Wheelock will share his experiences about using Amateur Radio in space. Wheelock spent six months on the ISS, seven weeks as ISS Commander; while on board the ISS, he, along with fellow astronaut Shannon Walker, KD5DXB, participated in the Amateur Radio on the International Space Station (ARISS) program. Together, the two made 22 ISS-to-school and ISS-to-camp QSOs. Read more here.

ROS ACROSS THE ATLANTIC ON 500 KHZ -- A new low frequency record between the United Kingdom and Canada has been set using a newly developed digital mode called R-O-S. Jeramy Boot, G4NJH, is in Nottingham, in the United Kingdom with the rest of the story: At 2134GMT on 13 February, Joe, VO1NA managed a full beacon decode from Graham, G0NBD on 502kHz using the ROS mode. It is believed this was the first live data mode decoded over the Atlantic on this band. The signal to noise ranged from -23 to -27dB, giving a 100% decode of the test message. The transmission was sent using MF-7 with an estimated ERP of 1 watt from a 35ft top loaded vertical. The ROS mode did a good job of resolving the signals despite deep and rapid QSB over the 3500km path.

At just over a year old the ROS data mode is relatively new and uses an adaptation of multiple frequency shift keying and forward error correction to help make successful contacts under very difficult band conditions.

The software for the R-O-S is completely free, but is still not legal for use by United States amateurs to transmit with. None the less US hams are free to listen in using it world-wide. More information can be found in cyberspace at rosmodem.wordpress.com

COMPLAINTS FROM HAMS MOVE VOICE OF RUSSIA OFF 7.200 MHZ -- Shortwave station the Voice of Russia is now in the part of the 40 meter band where it belongs. The station was first heard on 7.200 MHz on February 1st and reported to the IARU Monitoring System by Dick van Elpelen, PA0GRU, in the Netherlands. Ulrich Bihlmayer, DJ9KR, from the IARU Region 1 Monitoring System then reported the station to the German Telecommunicationss authorities on February 2nd. Then, in correspondence with the Russian General Radiofrequency Centre, DJ9KR was

able to demonstrate the interference. Subsequently, the Voice of Russia moved up the band to 7.265 MHz. -- Newsline

A HAM RADIO EQUIPPED BALLOON CALLED SPEEDBALL-1 WILL SOON ATTEMPT TO BECOME THE FIRST AMATEUR RADIO BALLOON TO CROSS THE ATLANTIC. -- Speedball-1 was originally scheduled to launch the weekend of February 26th from Space Port Indiana located in Columbus, Indiana. According to the projects website, that date has now been pushed back to when both the Jet Stream as well as ground launch conditions are more favorable for such a flight.

While no exact launch date for Speewdball-1 has been announced, once aloft it will be transmitting RTTY and DominoEX on a Upper Sideband with dial frequency of 7.102 MHz. The actual signal will be on 7.1035 MHz and the transmitter will alternate between 110bps RTTY and the DominoEX digital mode. Free dl-fldigi decoder software to follow the balloons progress is at tinyurl.com/4lplegy

Speedball-1 is a project of the new LVL1 Makerspace in Louisville, Kentuckey. They vdescribe themselves as a team of makers, hackers, and amateur scientists, loving the incredible number of challenges this has project presented. – NewsLine

THE RCA ARC MONTHLY NEWSLETTER IS COMPILED AND EDITED BY JIM RINEHART, AND JIM KEETH. ALL MATERIAL CONTAINED HEREIN IS OBTAINED FROM THE SOURCES CREDITED AND EDITED FOR THIS NEWSLETTER. EMAIL TO mailto:WebMaster@w9rca.org. Check our web site at http://www.w9rca.org/