

Message from the London Amateur Radio Club



Promoting Amateur Radio in London
And surrounding area since 1920

March 10, 2013

L.A.R.C. Executive

President

David Lambert, VE3KGK

Vice-President, Membership

John Visser, VA3MSV

Past President

Doug Elliott, VA3DAE

Treasurer

Brian Bouckley, VA3ATB

Secretary, Flea Market

Ruth Dahl, VE3RBO

Director, Flea Market

Ann Rundle, VA3EOR

Director, Repeaters

Mike Watts, VE3ACW

Director, Field Day

Pat Ross, VE3CNX

Non-Voting

Director, ARES & CANWARN

Brett Gilbank, VE3ZBG

Appointments

Repeater Coordinator

Brad Seward, VE3NRJ

Repeater

Operator/Programmer

Vacant

Field Day Coordinator

Pat Ross, VE3CNX

Webmaster

Doug Elliott, VA3DAE
Doug Tompkins, VE3IDT

Newsletter Editor

John Visser, VA3MSV

Auditor

Rob Hockin, VA3HO

March L.A.R.C. Meeting

The next meeting will be on Thursday, March 14th and will feature a presentation feature the annual presentation by **Mike Cook, VE3ZMC**. He's hoping his presentation on "**The Mystery of Magnetism**" will be attractive to the audience, although a few may be repelled.

Is Your Address Up To Date?

It has become apparent, through examination of records maintained by Industry Canada and by Radio Amateurs of Canada, that the Canadian callsign database is becoming corrupted by inaccurate information. One of the prime reasons for this is the failure of some Radio Amateurs to advise IC of address changes.

Amateurs are reminded of Section 15 of [Regulation By Reference 4](#) (RBR-4), which states:

"The holder of an Amateur Radio Operator Certificate shall notify the Department within thirty (30) days with respect to a change of mailing address."

Please note that this refers to a MAILING address and that it is not an option but a **requirement**.

You can inform Industry Canada of your change of address [online](#) or you can contact the Industry Canada Amateur Radio Service Centre at:

Phone: 1-888-780-3333 (toll free)

Fax: (613) 991-5575

E-mail: spectrum.amateur@ic.gc.ca

Industry Canada Amateur Radio Service Centre
P.O. Box 9654 Postal Station "T"
Ottawa, ON
K1G 6K9

If you are a RAC member you will also need to advise RAC of your address change. You can update your address in "[My profile](#)" in the [member section](#) of the RAC website so that we can keep your copies of *The Canadian Amateur* going to your correct address.

Thank you for ensuring that IC's and RAC's databases are accurate and up to date.

Next Meeting is Where and When?

Reminder: The next monthly L.A.R.C. meeting on February 14, 2013 at 7:30 pm

All meetings are normally located at St. Judes Anglican Church, 1537 Adelaide Street North at Fanshawe Park Road East in London, Ontario.

The meetings are **normally** held on the second Thursday of the month at 7:30 pm EST during the months of September to June.

Next Meeting will be March 14, 2013. This meeting will feature a presentation by Mike Cook, VE3ZMC.

Area Repeaters

LARC Repeaters

London

VA3LON 147.060 + 114.8Hz

VE3MGI 145.390 - 114.8Hz

SHORT Repeaters

London

VE3TTT 147.180 + 114.8Hz
Echolink Node 10741

VE3SUE 444.400 + 114.8 Hz
IRLP Node 2400

VE3TTT 442.200 + D-Star

Ipperwash

VE3TCB 146.940 - 114.8 Hz
Linked to VE3SUE

Grand Bend

VE3SRT 442.050 + 114.8 Hz
Linked to VE3SUE

Other Area Repeaters

London

VA3SIX 53.470 - 114.8 Hz

VE3OME 145.450 - 114.8 Hz
CANWARN

VA3FEZ 444.100 + 114.8 Hz

Grand Bend

VE3RGB 146.760 + 173.8 Hz

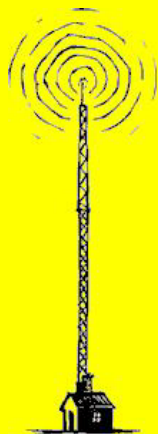
Stratfordville

VE3DPL 146.655 - 131.8 Hz

St. Thomas

VE3STR 147.330 + 114.8 Hz
Echolink Node: 72886

VE3STR 443.825 + 114.8 Hz
IRLP Node: 2482



If you have a repeater that should be listed here, please forward the information to John Visser, VA3MSV at va3msv@hotmail.com and I'll add it to the list.

Membership Certificates

The Club has created membership certificates for its current members. You can see your own certificate at the following link. <http://www.larc.ca/member-list.htm>

Simply click on your surname and it will bring up a PDF of your certificate suitable for printing.

Flaunt Your Face – Show Your Shack

In our hobby it's not always easy to put a face to all the fellow hams you talk to on the air. To help us all figure who's who, LARC invites its members to submit digital photos of yourself and/or your shack to be published on the membership page of our website. Purely voluntary of course, and if you prefer you can submit just one (depending on whether you think your face or your shack is more presentable).

How will it work? On the membership page, we'll attach your own picture where your first name appears, and the picture of your shack to your callsign. See the entry for Doug Elliott, VA3DAE for an example.

How do you submit your pictures?

Just email them to the LARC site webmaster address, which is: webmaster@larc.ca

Mutual Aid

Would you be willing to answer some questions if a fellow ham needed some advice? Got a problem you can't figure out? Want to try something new but need someone to show you the ropes? Check out our new **Mutual AID page** (<http://www.larc.ca/mutual-aid.html>), a new way to get people who are looking for assistance together with the folks who can help supply the answers. **Let us know** what you think of this new facility.

Membership Report

Currently the membership for the London Amateur Radio Club stand at 92. Of the 16 Honorary Members brought in from the L.S.R.C., 4 have paid for the current 2013/2014 year. For the 2013/2014 year, we so far have 18 new members.

I would like to welcome the following new members.

Gary Burton, VE3JEA	Don Cameron, VA3AKT
Geoffrey Clark, SWL	Tim Clark, VE3WGH
Corbin Lippert, VE3NIS	Rob Luzius-Vanin, VA3LTZ
Maryann Mosley, VA3FMV	Todd Mosley, VE3FMV
Sarah Nethercoot, VA3AKV	Mac Goodyear, VA3MGA
Jason Pollock, VA3QIX	Jim Rivers, VA3DVT
Joshua Sandor, VA3EFT	Don Stefanik, VA3KBC
Zachary Seguin, VA3ZTS	Darrell Smiley, VE3DLY
Alan Zhang, VA3ZHN	Gary Wabersich, VE3XDM

Nets



Daily

ONTARS Net

3.755 MHz 7:00 am – 6:00 pm

Trans Provincial Net

7.055 MHz 7:00 am – 5:00 pm

London Senior's Net

146.400 MHz 7:00 pm – 7:30 pm

Sunday

ARES Ontario Net

7.153 MHz 1:00 pm

7.055 MHz 3:00 pm

3.742 MHz 7:15 pm

IRLP Reflector 9005 8:00 pm

Monday

LARC 2m Net

147.060 + VA3LON 8:00 pm

SATERN Net

147.180 + VE3TTT 9:00 pm

444.400 + VE3SUE 9:00 pm

Tuesday

ELMER Net

147.060 + VA3LON 9:00 pm

Wednesday

ARES Net

145.450 + VE3OME 7:30 pm

ARES Ontario Net

IRLP Reflector 9005 8:00 pm

Thursday

PROCOMM Net

147.180 + VE3TTT 8:00 pm

444.400 + VE3SUE 8:00 pm

Friday

Tech Net

147.180 + VE3TTT 8:00 pm

444.400 + VE3SUE 8:00 pm

Saturday

VE3TTT 2m Net

147.180 + VE3TTT 7:30 pm

444.400 + VE3SUE 7:30 pm

146.940 - VE3TCB 7:30 pm

442.050 + VE3SRT 7:30 pm

2013/2014 L.A.R.C. Executive Elections

It is that time of year again for us to think about the lineup for the club's executive members for 2013-2014.

Every May we decide who will be responsible for the handling of the money, physical resources, and determining the future direction of the club.

The club's executive requires at least 7 members each year and if you are interested, we request that you make yourself available one night per month to go over club business.

Some of us have been on the executive for several years and enjoy the experience.

We have some simple rules

1. Any current member of the club can request to be a member of the club's executive and added to the ballot.
2. Only members in good standing can vote (must be a paid member)
3. We must have a quorum (at least 25 members in good standing) in order to hold a valid election.

Some of the activities that require planning, coordination or at least some monthly discussions: Monthly meeting topics, fund raising, flea market, field day, repeaters & other equipment, extra activities.

We currently meet the 4th Thursday of the month from 7:30 pm to about 9:00 pm. All club members are invited to attend any executive meeting. If you have some interest but are unsure, and want to come and see what we do, just check with one of the executive as to where we are meeting.

The next page is a snip from the club's by-laws that specifically deal with the election process.

Upcoming Events

Sat., Mar. 23, 2013

[Ham-Ex 2013](#) – Peel & Mississauga ARC

Brampton Fall Fair Grounds - 12942 Heart Lake Rd.
(43.77121N, -79.8298W)

Sat., Apr. 20, 2013

[Durham Region Amateur Radio Hamfest](#) – South Pickering ARC & North Shore ARC

Pickering Recreation Complex, 1867 Valley Farm Road, Pickering, Ontario

Sun., Jun. 2, 2013

[Central Ontario Hamfest & Fleamarket](#) - Guelph ARC & Kitchener-Waterloo ARC

Waterloo Regional Police Association Recreation Centre, R.R. 2, 1128 Rife Rd. North Dumfries Township. Beside Hwy 401, between exits 268 & 275

Sat., Jul. 13, 2013

[Ontario Hamfest](#) – Burlington Amateur Radio Club

Milton Agricultural Fairgrounds, Milton, Ontario

Sat., Oct. 5, 2013

[HARC Hamfest 2013](#) -

[Hamilton Amateur Radio Club](#)

Concession Building at the Ancaster Fair Grounds, 630 Trinity Road, Ancaster, ON

Every Saturday Morning

starting at 8:30 am.
Breakfast at the Cottage Restaurant. Located across the street from the London Police Station on Dundas St.

If you have an upcoming event that you would like to have listed here, please forward the information to John Visser, VA3MSV at va3msv@hotmail.com and I'll add it to the list.

2013/2014 L.A.R.C. Executive Elections

*from the LONDON AMATEUR RADIO CLUB
INCORPORATED - BY-LAW #1*

3. Board of Directors

3.1 The day-to-day affairs of the Corporation shall be arranged by a Board of Directors composed of 7 selected Directors, 1 non-voting Director appointed by the Amateur Radio Emergency Service (A.R.E.S.) and the Past President of the Corporation.

3.3 To be eligible to stand for election to the Board of Directors one must be a member in good standing for at least 30 days prior to the Annual Meeting at which members of the Board of Directors will be elected.

This year's Annual Meeting will be held May 10, 2011

3.4 A Nominating Committee shall be struck by the President at least 90 days prior to the Annual Meeting and it shall begin its activities immediately upon being appointed.

3.4.1 The Committee shall be composed of three members in good standing. The Past President shall be the Chairperson of the Committee.

3.5 The recommendations of the Nominating Committee shall be presented to the Board of Directors. The Board shall cause such report to be published in the L.A.R.C. Newsletter, which will be sent to all members in good standing as notice of the Annual Meeting. Such report shall also outline the procedure pertaining to additional nominations.

3.6 Additional nominations may be received by the Secretary up to 12 hours prior to the Annual Meeting if submitted by a member in good standing supported by the written agreement of 4 other members and the written acceptance of the nominee.

3.7 The election of the Board of Directors shall take place at the Annual Meeting of LARC. The Directors shall be elected by a simple majority vote of the members. The Directors shall take office on July 1 of that year.

Please contact the L.A.R.C. Secretary Ruth Dahl, VE3RBO, if you have any nominees or questions. You can reach me at ragann61@hotmail.com.

HF Corner for March 2013

by John Visser, VA3MSV

Editor Note: Dave Lambert, VE3KGK was unable to submit the HF Corner for March due to recently returning from vacation. I filled in this month but I don't know the sources that Dave use.

Dec 17 for 20 wks	Lesotho	7P8RI	all HF bands CW/SSB/Digital modes
Feb 01 to Mar 25	Guadeloupe	FG	SSB & digital
Feb 01 to Dec 31	Russian Antarctic station	Progress	RI1ANP
Feb 04 to Mar 15	Togo	5V7JD	
Feb 10 to Mar 18	Cambodia	XU7ACQ	SSB/CW
Feb 11 to Apr 03	Senegal	6V7S	
Feb 20 to Mar 21	St. Kitts/Nevis	V47JA	SSB
Mar 02 to Mar 16	Longboat Key	W0FK	
Mar 05 to Mar 20	Grenada	J34G	HF bands
Mar 06 to Mar 26	Lesotho	7P8PB	Activity - Limited (Family Holiday)
Mar 08 to Mar 22	Curacao	W1USN/PJ2 AA1M/PJ2 W1SSR/PJ2	160m-10m CW/SSB/PSK/RTTY
Mar 08 to Mar 17	Dominica	J79GV	Operation - Holiday Style/SSB only
Mar 09 to Mar 23	Maldives	8Q7WK	Operation - Holiday Style/HF bands
Mar 23 to Apr 04	Somalia	T5TC	HF bands
Mar 26 to Apr 03	Aruba	P41P	CQ WW WPX SSB Contest/17m/12m
Mar 26 to Apr 03	Aruba	DF7ZS	CQ World Wide WPX SSB Contest/17m/12m
Mar 30 to Apr 13	Cocos Keeling Island	VK9C/GM2MP	SSB/CW/some RTTY
Apr 04 to Apr 16	Seychelles	S79VJG	40m - 10m SSB
Apr 05 to Apr 16	Saint Lucia	N7QT/J6	80m - 10m CW/SSB/RTTY/PSK
Apr 08 to Apr 20	Bonaire	SP9FIH/PJ4 & SP6AXW/PJ4	160m - 6m SSB/RTTY
Apr 20 to Apr 28	Tanzania	5H1DX	
Apr 29 to May 06	Djerba Island	TS8TI	HF bands CW/SSB/RTTY/AMTOR/PSK31
Next 3-4 years	Cameroon	TJ3SN	HF bands plus 6 m various modes
until mid-April	Sudan	ST2SF	40m-10m

Lastly, Bill Moore NC1L, the ARRL's Awards Branch Manager says that the current 5X8C operation from Uganda, along with the T6TJ and T6BP operations from Afghanistan have been approved for DXCC credit. If you've had cards declined except Logbook of the World applications please send an e-mail to bmoore@arrl.org to be placed on the list for an update. If your QSOs were confirmed only via Logbook of the World, they were not imported to DXCC since at the time of your application these were not yet approved. Moore says that Logbook of the World confirmed QSOs' can be reclaimed via your next submission only. Also from NC1L word that the Z81A and Z81D operations commencing back in 2012 from Republic of South Sudan have also been approved.

Lastly, word that the Sri Lanka 4S7DXG and Maldives 8Q7VR operations in 2008 and 2011 have been approved for DXCC credit. If you had request rejected for contacts with these dates only, send an e-mail to dxccrules@arrl.org to be put on the list for an update. Contacts before or after these periods cannot be accepted. *(Various DX Sources)*

Propagation: Solar Cycle 24 May Have A Double Peak

March 8, 2013

Will 2013 be the year of the Solar maximum of Cycle 24 or have we already seen one and is there another peak yet to come. Some researchers think that the best has not happened yet because this could be another double cycle.

Something unexpected appears to be happening on the sun. 2013 is supposed to be the year of Solar Max also known as the peak of Cycle 24. Yet 2013 has arrived and solar activity is relatively low. Sunspot numbers are well below their values in 2011, and strong solar flares have been infrequent for many months. The quiet has led some observers to wonder if forecasters missed the mark.

Dean Pesnell is a Solar physicist at the Goddard Space Flight Centre in Greenbelt, Maryland. He suggests that this is the solar maximum, but it looks different from what we expected because it will be double peaked.

Conventional wisdom holds that solar activity swings back and forth like a simple pendulum. At one end of the cycle, there is a quiet time with few sunspots and flares. At the other end, the Solar Max brings high sunspot numbers and solar storms with a regular rhythm that repeats every 11 years.

Reality, however, is more complicated. Astronomers have been counting sunspots for

centuries, and they have seen that the solar cycle is not perfectly regular. For one thing, the back-and-forth swing in sunspot counts can take anywhere from 10 to 13 years to complete. Also, the amplitude of the cycle varies. Some solar maxima are very weak while others can be very strong.

And as researcher Pesnell notes, there is yet another complication. He says that the last two solar maxima, around 1989 and 2001, had not one but two peaks. He says that solar activity went up, dipped, and then resumed while performing a mini-cycle within the Solar Max that lasted about two years.

Pesnell says that the same thing could be happening now. He notes that sunspot counts jumped in 2011 and dipped in 2012. As such, he expects them to rebound again saying that another peak will happen in 2013 and possibly last into 2014. Let's hope he is right.

Another curiosity of the solar cycle is that the sun's hemispheres do not always peak at the same time. In the current cycle, the south has been lagging behind the north. The second peak, if it occurs, will likely feature the southern hemisphere playing catch-up, with a surge in activity south of the sun's equator. *(SARL, NASA)*

IARU To Review Region II HF Bandplan This Year

February 15, 2013

The ARRL reports that the International Amateur Radio Union Region 2 High Frequency bandplan will be a topic of discussion at a conference will be held later this year in Mexico. According to the League, the Region 2 conference is held every three years and is attended by delegations from the national Amateur Radio societies in the western hemisphere that are members of the IARU.

The ARRL is the IARU Member Society for the US. It notes that IARU band plans are voluntary guidelines. It adds that they do not

have the force of FCC regulations and that for radio amateurs in the US, IARU band plans are informational, not regulations. However most other countries do not have the detailed sub-band regulations as are in place here in the United States, so for radio amateurs in those nations the voluntary IARU band plans may offer the only guidance on frequency usage.

Hams living in Region 2 can find the current bandplan on-line at www.iaru-r2.org/bandplan. The Region 1 and Region 3 band plans are also posted there as well. *(ARRL, IARU)*

New International Reply Coupon Introduced

February 22, 2013

The Universal Postal Union has introduced the newest model of the International Reply Coupon. The new Doha coupon named for the 25th Universal Postal Congress that took place in Doha, Qatar in October 2012 will replace the current model, known as the Nairobi model.

Although the US Postal Service no longer sells IRC's, they are still available in other countries and post offices in the United States are mandated to redeem them. The Doha model IRC will be available for purchase on July 1st and is valid for exchange until the end of 2017. The Nairobi model remains valid until December 31st of this year. (ARRL)

International Lighthouse And Lightship Weekend Grows

March 1, 2013

An update on pre-registration for the 2013 International Lighthouse and Lightship Weekend operating event. So far there have been some 150 registrations from 25 countries. Germany has the most with 35 closely followed by Australia accounting for 34.

This years International Lighthouse and Lightship Weekend is on August the 17th and 18th. More information on this fun event along with registration details is on line at www.illw.net. (VK3PC)

World Amateur Radio Day 2013

March 8, 2013

World Amateur Radio Day is April 18th and according to the International Amateur Radio Union that sponsors the event the theme this year is Amateur Radio: Entering Its Second Century of Disaster Communications.

According to the IARU announcement, the theme for 2013 of Amateur Radio: Entering Its Second Century of Disaster Communications is an excellent opportunity for amateur radio emergency communications groups to take advantage of the event to highlight the role amateur radio plays in disaster response.

Among the suggestions are for IARU member societies to arrange ham radio demonstrations in public places such as parks or shopping areas. The IARU says that such demonstrations in public areas usually

generate inquiries and questions from the public about amateur radio. It adds that this makes it a great opportunity to attract new people to become members of the ham radio community.

The IARU notes that in 2013, April 18th is a weekday but that should not keep public activity from taking place either on the weekend before or after that date. Also, if you plan on holding a public demonstration, the IARU says not to forget to include some young people to show all ages are a part of this growing world wide public service oriented hobby.

More information on World Amateur Radio Day is on the web at www.iaru.org. (IARU)

RAC Bulletin 2013-007E - Ian MacFarquhar, VE9IM appointed as Regulatory Affairs Officer

February 26, 2013

I am pleased to announce that Mr. Ian MacFarquhar, VE9IM, has taken on the post of Regulatory Affairs Officer pending our recruitment of a new executive member to undertake that post. Mr. MacFarquhar will continue in the role of Vice President but will be assisted in that role by Mr. Doug Mercer, VO1DM. Mr. Mercer will continue in his role of Chief Field Services Officer.

Geoff Bawden VE4BAW
President and Chair RAC

Vernon Ikeda - VE2MBS/VE2QQ
Pointe-Claire, Québec
RAC Blog Editor/RAC E-News/Web News
Bulletin Editor

RAC Bulletin 2013-008E - Review of Amateur Radio Exam Questions

February 27, 2013

As a result of its response to a Request for Proposals from Industry Canada, Radio Amateurs of Canada has been awarded a \$20,000 contract by Industry Canada to review the questions used for examinations to qualify radio amateurs in Canada. The work began on 28 January 2013 and the final product will be delivered to Industry Canada on 17 April 2013. Radio Amateurs du Quebec Inc. (RAQI) is working with RAC on the French language component.

More than 3000 questions are being reviewed: 965 questions in English and in French for the Basic qualification and 545 in English and in French for the Advanced qualification. Some current questions were revised in 2007 but many questions date from much earlier. The present work will be the first comprehensive review in more than a decade.

The objective of the review is to identify questions and answers no longer relevant as well as those requiring modifications to correct grammatical errors or improve clarity. The review should also lead to new questions on aspects of amateur radio that have changed in recent years. The curriculum for the qualifications (Basic and Advanced) is not changing so while individual questions may be

changed the main areas of knowledge required for certification will not change.

Both RAC and Industry Canada have recognized for some time that a thorough review of the questions was required. Last summer a RAC bulletin invited radio amateurs to provide comments and suggestions on the current questions by the end of August. Responses highlighted some incorrect questions and pointed out several others that were vague or confusing. These comments provided a good starting point for the current review.

RAC is pleased to have RAQI working on this project. The team conducting the review has experience not only in conducting amateur radio exams but also in designing and delivering amateur radio courses in both official languages. It is well qualified to deal with technical issues and assess clarity and grammar of the questions in both official languages.

Industry Canada is responsible for the amateur radio certification and will make the final decision changes to the questions. The project led by Radio Amateurs of Canada with the assistance of RAQI will ensure that the experience of active radio amateurs will guide recommendations to improve the questions

that will be used for amateur radio certification in the future.

For more information contact Glenn MacDonell, Project Manager, Question Bank Update Project and Deputy Director Ontario North East, (ve3xra@rac.ca).

Geoff Bawden VE4BAW
President and Chair RAC

Vernon Ikeda - VE2MBS/VE2QQ
Pointe-Claire, Québec
RAC Blog Editor/RAC E-News/Web News
Bulletin Editor

RAC Bulletin 2013-009E - RAC Field Organization, Industry Canada meet in Ottawa

March 6, 2013

Recently, a meeting was held at Industry Canada's Ottawa headquarters, a follow up to last year's Canadian Amateur Radio Advisory Board (CARAB) where an offer to meet on operational issues was made.

During the meeting RAC shared documents relating to the Field Organization Review Project that explained the operational structure and purpose of the project and spoke about our Training working group's work. Industry Canada presented an outline of their District Emergency Telecommunications (DET) emergency telecom organization and their roles and responsibilities. They also explained their initiatives relating to use of their HF radio system, voice and digital for exercises, regular

drills and emergencies, expressing an interest in building on their interactions in this area with RAC members.

Both parties agreed at the end of the meeting that regular informal exchanges could be of value.

Doug Mercer VO1DTM/VO1DM CEC
Chief Field Services Officer - Radio Amateurs of Canada

Vernon Ikeda - VE2MBS/VE2QQ
Pointe-Claire, Québec
RAC Blog Editor/RAC E-News/Web News
Bulletin Editor

Canada Launch Mototrbo Digital Audio C-Bridge Interconnect

March 1, 2013

Hams in Canada have taken their first step toward the creation of a national amateur radio Division Multiple Access or DMR network. This with the launch of the first inter-provincial DMR networking server on Saturday, February 23rd.

The server, more commonly known as a "c-Bridge" was manufactured by Rayfield Communications and will serve as a network hub for Canadian amateur radio DMR repeaters. It will not only allow them to reliably link to one another but also to the growing DMR-MARC global network using Internet connectivity.

The DMR-MARC global network is an all-digital group of Mototrbo DMR repeaters in the USA, Germany, Australia, South Africa, New

Zealand,
Switzerland,
Spain, Austria,
Finland,
Sweden and of
course Canada.

The backbone networking is being created by amateur radio operators many of whom are Motorola Solutions employees, Motorola Service Station employees, dealers, system installers, and just plain Motorola equipment aficionados. Repeaters on this network are connected around the clock.



And for those listeners who are unfamiliar with Mototrbo system, this is a Motorola digital radio product marketed primarily to business and industrial users, but which has found its way into some public safety uses and now to ham radio. The format is based on and compatible with the European 2-slot DMR standard and uses Time Division Multiple Access to accommodate two simultaneous users. Therefore a single 12.5 kHz channel is able to carry two simultaneous and independent conversations or simultaneous and independent voice and data paths each with 6.25 kHz equivalency. More about the world-wide DMR-MARC global ham radio network is on-line at www.dmr-marc.net/.

The Canadian c-Bridge is located in Montreal and is currently supporting several DMR repeaters in Ontario and Quebec, including the VA3XPR digital DMR repeater located in downtown Toronto. For more information on

the new Canadian digital interconnect and how your organization can connect their DMR system to it, please visit tinyurl.com/canada-c-bridge.

And before you ask, Mototrbo and D-Star radios cannot talk directly to one another. This is because each uses a different and incompatible digital voice encode and decode technology. (VA3FXT via QRZ.com, DMR-MARC)

A special thanks goes out to all who made the launch of the Canadian c-Bridge possible, including Alain, VA2SPB, Chris, VE3BNI, Stephane, VE2TAX, Pierre, VE2PRT, Mike, AA9VI, JP, KC9KKO, John, W0PM and Don, VA3XFT.

For more information on the Canadian c-Bridge and how your organization can connect their DMR repeater to it, please contact [Don Trynor, VA3XFT](mailto:Don.Trynor@VA3XFT).

Last Man Standing to Feature Amateur Radio Storyline

March 5, 2013

In an episode tentatively scheduled to air Friday, March 15, the hit ABC comedy *Last Man Standing* -- starring Tim Allen as Mike Baxter, KA0XTT -- will [feature a secondary ham radio storyline](#). This is the first time that the show will highlight Amateur Radio in its plot, showing various cast members on the air and communicating via ham radio.

In Episode 217 -- called "The Fight" -- Mike's daughter Mandy (played by Molly Ephraim), gets her cell phone taken away as punishment. She discovers Mike's home shack in the basement and uses ham radio to make faraway friends. According to *Last Man Standing* Producer John Amodeo, NN6JA, the home shack is a brand new set built just for this episode. The ARRL provided many of the awards and certificates -- including 5 Band DXCC, 5 Band Worked All States, 5 Band Worked All Continents, VUCC (for 50 MHz), the Diamond DXCC Challenge and the Morse Code Proficiency Certificate -- seen on Mike Baxter's home shack wall.

Two other regular cast members -- Mike's boss Ed Alzate (played by Hector Elizondo) and Mike's co-worker Kyle Anderson (played by Christoph Sanders) -- will also have Amateur Radio call signs and be shown on the radio.

"As a ham, I am very excited to be able to have an episode that presents our hobby in an upbeat and positive way," Amodeo told the ARRL. "As a television producer, I am pleased to present a very funny episode for our more than 7 million viewers. This episode will feature more ham gear than seen in mainstream movies such as *Frequency*, *Contact* and *Super 8*-- all great films that had Amateur Radio in them. It's worth noting that although hams will enjoy the episode, it was written with our 7 million non-ham viewers in mind. Please be prepared for some inconsistencies related to Amateur Radio, but enjoy the show nevertheless."

Last Man Standing is produced by 20th Century Fox for the ABC Television Network and airs on

Friday nights at 8 PM Eastern and Pacific and 7 PM Central.

<http://www.arrl.org/news/em-ham-radio-in-hollywood-em-last-man-standing-to-feature-amateur-radio-storyline>



In an episode of Last Man Standing to air March 15, Mandy Baxter (played by Molly Ephraim) loses her technology privileges and discovers her father's ham shack in the basement of their house. [ABC Photo]



Since Mandy can't use her cell phone or computer to communicate with her friends, she tries to communicate with others via ham radio. [ABC Photo]



Mike's boss Ed (played by Hector Elizondo) is also a licensed radio amateur. Here he is seen on the radio as he travels through the jungle. [ABC Photo]

Behind The Scenes Of Last Man Standing Show

March 8, 2013

The hit ABC sitcom, *'Last Man Standing'*, starring Tim Allen as **Mike Baxter, KAOXTT**, has always had a real amateur radio station as part of the set.

In Episode 217, the radios are no longer relegated to set dressing, but are actually used by several cast members, and form a major part of the storyline.

The show's Producer, **John Amodeo, NN6JA**, has long been trying to get everyone in agreement, from the writers, up to the network, and finally it happened, amateur radio hits the big time. This video won't tell you what happens, because the show has not aired yet, but it will show you some of what went on behind the scenes to make it all happen.

For those concerned about such things... all the radios were used on the lowest power settings possible, and transmitted into dummy

loads. The studio is designed to stop RF from getting in, or out. A mobile radio was used to check that no RF got out of the studio. The dummy loads were placed physically close to each other, allowing each radio station to hear the minute amount of RF that "leaked" from the dummy loads. The audio heard in the final, on-air version of the show, was a mixture of audio taken from the clean audio recorded on set, audio from the receiving radio, and actual ham radio transmissions.

[Watch Ham Nation - "Last Man Standing" - Episode 217, "The Fight" - Behind The Scenes!](http://www.southgatearc.org/news/february2013/watch-ham-nation--last-man-standing-episode-217-the-fight-behind-the-scenes)
Ham Radio in upcoming episode of Last Man Standing
<http://www.southgatearc.org/news/february2013/ham-radio-in-upcoming-episode-of-last-man-standing.htm>

Low Cost Chinese Made All Mode HF Transceiver From China Introduced

February 22, 2013

A new all mode low priced High Frequency transceiver from China is on the way. Called the Feitong model FT-808 the new radio is being billed primarily as a Marine Band transceiver but its published specifications read more like a mid-range piece of ham radio gear. For instance the FT-808 has a receive range of 500 Khz to 29.9 Mhz and a transmitter that covers 1.6 to 29.9 Mhz. In other words, it covers all the ham radio bands from 160 through 10 and lots more.

The receiver is a double conversion superhetrodyne with both it and the transmitter capable of operating Upper and lower sideband, CW and AM with 100 memory channels. Tuning appears to be by up and down push buttons with a claimed receiving sensitivity of 12 db SINAD and a squelch

sensitivity threshold on SSB, CW, and RTTY of less than 5.6uV.

One thing of note. While transmitter power appears to be in the 100 watt or slightly higher range but according to the public spec sheet there appears to be no provision to lock out transmission on 11 meters. This will likely keep it from gaining FCC acceptance for legalized sales in the United States. At least not in its current non locked out 11 meter configuration.

That said, the Feitong FT-808 carries a delivered list price of only \$410 US dollars. Its complete specifications and a video of an Italian ham radio operation using it on 40 meters is on-line at tinyurl.com/feitong-808-hf. (Sparkys Blog, www.ecvv.com, iv3vjh.me, others)

SDR Touch Turns Tablet Or Phone Into SDR Receiver

February 15, 2013

Ham Radio Science reports on an interesting new app called SDR Touch. This is software that allows you to use your Android tablet or cell-phone along with a RTL2832U USB plug in thumb drive as a Software Defined Radio.

All you need do is to plug the relatively inexpensive drive into your Android 4.0 devices USB port and load the SDR Touch app. The

combination is reported to allow you to tune and decode the audio from it. Simple, easy and if we may add, cheap.

More about the device itself is on-line at www.realtek.com.tw. A video showing it in action is at tinyurl.com/sdr-tablet. (Southgate, Ham Radio Science)

APRS Experiment Extends Underground Communications

March 8, 2013

APRS works to extend communications range underground. So says the modes developer Bob Bruninga, WB4APR, who reports on an experiment that took place on March 2nd. One where he and several other hams tested the use of APRS as a means to extend radio communications underground in Mammoth Cave, Kentucky.

According to Bob Bruninga, WB4APR, typically, VHF and UHF radio in underground caves are

limited to only a few hundred feet and strictly line-of-sight making their routine use of little value. But with APRS radios acting as packet digipeaters, these few hundreds of feet can be extended by an order of magnitude.

Bruninga says that in the test a total of 14 APRS equipped radios were used in the cave to establish a network almost a mile long providing real-time position and text message communications along the route. Cavers

carried a map of the cave marked with a Latitude and Longitude grid so they could manually enter their position into their handheld APRS-equipped transceivers. Texting via APRS provided communications end to end.

Among the interesting findings were that UHF worked about 13% better than VHF within average link distance of about 450 feet even in the large subway sized passages of Mammoth Cave. Also power did not seem to matter much. The Kenwood TH-D72 walkie-talkie performed as well as several portable 10 watt mobile radios housed in boxes.

Another advantage of using UHF for this APRS network was that individual links in other caves can just as easily be pre-tested by unlicensed cave explorers using inexpensive FRS radios. This way, all cavers can plan and individually test the topology of an APRS network before actually gathering the required APRS equipment and setting up the actual expedition.

Bruninga says that the system could even include e-mail into the topside global APRS system. (WB4APR)

STRaND-1 Cellphone Based Hamsat Now On-Orbit

March 1, 2013

The United Kingdom first CubeSat named STRaND-1 was launched on Monday, February 25 on the PSLV-C20 booster. This from the Indian Space Research Organization Space Launch Center. Successful deployment from the STRaND-1 into a 785 km orbit took place about 20 minutes later.

Signals from STRaND-1 were received by Nader Omer, ST2NH, in the Sudan at 15:55 UTC and by the Surrey Space Centre later in the day. Soon afterward on Hector Martinez, CO6CBF, in Cuba used an AMSAT-UK FUNCube Dongle to receive the satellite.

STRaND stands for Surrey Training, Research and Nanosatellite Demonstration. STRaND 1 and was built in only three months using a Google Nexus One smartphone with an Android operating system. This to demonstrate the feasibility of using such an inexpensive device to control a spacecraft.

STRaND-1 carries an amateur radio AX.25 packet radio downlink on 437.568 MHz. It also uses a 9k6 bps Frequency Shift Keying in an

High Level Data Control frame and Non-Return-to-Zero Inverted encoding.

The overall STRaND program is intended to be a long-term arrangement between the space company SSTL and academic researchers at the Surrey Space Centre. STRaND-1 is the first of a long line of STRaND smartphone based nano-satellites.

According to the latest reports hams around the world have responded to the request for telemetry data from the STRaND-1 satellite controllers. Information on how to receive the satellites telemetry data is available at tinyurl.com/hearing-strand-one.

The STRaND-1 team has asked if radio amateurs can assist in collecting telemetry from around the world to help them determine the health and attitude of the spacecraft. Again, the downlink uses amateur radio AX.25 packet radio on 437.568 MHz using 9600 bps FSK modulated data with an HDLC frame and NRZI encoding. Reports go by e-mail to Dr. Chris Bridges at C.P.Bridges@surrey.ac.uk. (AMSAT-UK, STRaND)

ARISS Switches To Ericsson Radio After Experiencing Problems With The Kenwood D700

February 15, 2013

ARISS has switched radios. After experiencing issues with the Kenwood D700 on two consecutive school contacts, Amateur Radio on the International Space Station operations have announced plans to use the Ericsson radio on the Columbus module for all contacts until problems with the D700 are resolved.

Frank Bauer, KA3HDO, is AMSAT's Vice President for Human Spaceflight Programs. He says that for some reason signals from the Service Module Kenwood D700 radio are much diminished. He notes that a recent contact with Israel had low audio levels. Another contact with the Hospital for Sick Children was even

worse. Only one student was able to talk to Chris Hadfield before signals on the ground were lost even though the crew reports hearing the ground station well.

It should be noted that both these contacts were with made using telebridge stations which have above average gear. Also astro-ham Hadfield used the space stations IP Phone, immediately after the hospital radio contact and answered all the student's questions so that all was not lost. A later contact with a school in Japan using the Columbus Module Ericsson radio proved very successful. *(ANS, ARISS)*

Scientists Offer Support For NASA's Next Mars Rover

February 22, 2013

Scientists have applauded a NASA decision to send another rover to Mars in 2020. At the same time they are stressing that the mission should pave the way to return Martian rocks to Earth.

The new Mars rover mission was announced last December 4th by NASA's Associate Administrator for Science John Grunsfeld. This, at the annual meeting of the American Geophysical Union in San Francisco.

At that time it was announced that the next rover will share some design features with NASA's Mars Science Laboratory Curiosity rover, which landed on Mars in August to begin at least a two-year mission.

Now, in a pair of statements released January 28th and 30th, two well-respected groups of researchers have shared their views on the plan to send another robotic explorer to the Red Planet in seven years. The Planetary

Society and the American Astronomical Society's Division for Planetary Sciences applauded the announcement that NASA plans another mission to the Red Planet in 2020. At the same time both strongly suggested that the mission should have the capability to collect and store Martian rock samples as recommended by the National Research Council's Planetary Science Decadal Survey.

NASA has released very few details on the proposed new rover plan. Because of this it's still unclear whether the robot will be able to collect Martian rock samples intended to be brought back to Earth.

It should be noted that most plans for returning Mars samples are multi-phase, with an initial mission to collect and store the rocks. Later missions would rendezvous with the collector and return the samples to Earth. *(Space & Science)*

UK Ham Locates 1965 Satellite As It Returns To Life

March 8, 2013

An American satellite, abandoned in 1967 as a piece of space junk has begun transmitting again after 46 years and a ham radio operator is responsible for finding it.

Phil Williams, G3YPO, is an Amateur Radio Astronomer in North Cornwall in the U.K.. According to reports he accidentally picked up the signal and after cross checking with various lists, he identified it as LES 1.

LES 1 was built by the Massachusetts Institute of Technology and launched in 1965. The satellite failed to reach its intended orbit owing to a wiring error and has been drifting out of control ever since.

Williams ran across it while monitoring near 237 MHz when he noticed a signal with a peculiar signal drift caused by the bird tumbling end over end every 4 seconds as the solar panels became shadowed by the satellites engine. Williams said that gives the signal a particularly ghostly sound as the voltage from the solar panels fluctuates.

The LES 1 satellite is about the size of a small car and is not likely to re-enter the atmosphere for a long time as the orbit is still relatively high. It poses no threat other than that caused by the thousands of other pieces of space junk currently in orbit. By now it's likely that the on board batteries have now disintegrated so it's likely that some other component failure has caused the transmitter to start up when it's in sunlight bringing the ghost satellite back to life.

G3YPO says it's remarkable to think that electronics built nearly 5 decades ago, 12 years before Voyager 1, and long before microprocessors and integrated circuits, is still capable of working in the hostile environs of space. He adds that listening to the signal one can easily imagine the craft tumbling over and over every 4 seconds and the transmitter starting up as the sun rises on its solar panels. *(G3YPO)*

Meteor That Hit Russia Trajectory Identified

March 1, 2013

Scientists from Colombia believe they have pinpointed the origin of the giant meteor that smashed into a remote region of Russia last month. Using some of the dozens, if not hundreds, of videos that captured the once-in-a-century event, the scientists have calculated the Chelyabinsk meteor's trajectory, tracing it back to a group of Earth-crossing objects known as Apollo asteroids. Researchers Jorge Zuluaga and Ignacio Ferrin, from the University of Antioquia then used trigonometry to calculate the height, speed and position of the rock as it fell to Earth.

To reconstruct the meteor's original orbit around the sun, they used six different

properties of its trajectory through Earth's atmosphere. They then plugged all of that data into specialized astronomy software developed by the U.S. Naval Observatory. The computers then confirmed that it was from the Apollo group.

Unlike the more stable objects in the Asteroid Belt which lies between Mars and Jupiter, Apollo asteroids tend to sideswipe Earth's orbit, posing a risk of collision like the one in Russia. According to the International Astronomical Union's Minor Planet Center, more than 4,800 Apollo asteroid close approaches that have been identified to date. *(Science Now)*

Amateur-Created 'Varicode' Adopted As ITU Recommendation

March 1, 2013

The ARRL report that Varicode, developed by Peter Martinez, G3PLX, has been adopted as an International Telecommunications Union Recommendation. On Tuesday, February 19th, Francois Rancy who is the Director of the Radiocommunication Bureau of the ITU announced the simultaneous adoption and approval of the Recommendation entitled Telegraphic Alphabet for Data Communication by Phase Shift Keying at 31 Baud in the Amateur and Amateur-Satellite Services.

This digital mode alphabet is commonly called "Varicode" because the more frequently used characters in the English language occupy fewer bits. It was developed by G3PLX in the 1990's. For his effort Martinez was awarded the ARRL Technical Innovation Award for the year 2000 for his development of PSK31, which uses Varicode for transmission efficiency.

Varicode now becomes Recommendation ITU-R M.2034. More on it is on the web at www.arrl.org/psk31-spec (ARRL)

ARRL's Dave Sumner K1ZZ Explains DIY Renaissance In Ham Radio

March 8, 2013

The resurgence in ham radio may partly be due to a renaissance in home building coupled with a need on the part of radio amateurs to serve their community. So says ARRL Executive Vice President Dave Sumner, K1ZZ's, in a recent article appearing in the Urgent Communications on-line newsletter.

In his commentary Sumner notes that when amateurs began experimenting with radio more than a century ago, they had no choice but to build everything they needed. Some went on to become successful entrepreneurs, selling their creations to fellow hobbyists who were more interested in operating radios than in constructing them. Others built their own receivers and transmitters either from economic necessity or for the fun and satisfaction of being able to say, "I did it myself." This in turn led to the era of kit building with such giants as Heathkit becoming household names in ham radio.

K1ZZ notes that the advent of solid-state devices, printed circuit boards, and automatic parts insertion removed the price advantage that kits enjoyed. By the time the Heath Company closed its doors in 1992, most amateur-radio equipment was being manufactured in Japan. But this has not stopped ham radio operators from continuing the art of home construction and this in itself has led to a resurrection in the art of kit building. And this in turn has made portable emergency communications ability more attainable in the hobby.

As Dave Sumner notes, society has come to rely on a fragile telecommunications infrastructure that is susceptible to overload and outright failure. And while ham radio operators cannot substitute for all that infrastructure hams can communicate, no matter what.

You can read K1ZZ's entire article on-line at tinyurl.com/amateur-radio-renaissance. (Urgent Communications)

MEMBERSHIP INVITATION

-- Membership application and dues are currently requested.

Our term of membership runs from November 1 to October 31 of the following year. Each and every year it is increasingly more difficult to get Amateurs to commit to membership in their local club due to the alternate functions we are asked to fund.

The **London Amateur Radio Club** has a long history of providing technical support, social support and repeater facilities. Public service efforts are currently provided by a club affiliation with Amateur Radio Emergency Services (**ARES**) and **Radio Amateurs of Canada (RAC)**.

Your Directors work tirelessly to provide meeting topics that are informative and entertaining, events that are timely (Christmas meeting, field day, bus trip) and participate in events that display and promote Amateur Radio in the community.

To be effective in its pursuits, the Club needs the support of the local Amateur fraternity through membership.

While we obtain financial support from our Annual Flea Market, we require membership support to fund such things as meeting hall rent, repeater sites rent and maintenance, web site fees, membership cards and liability insurance. For what it's worth, none of these things are getting any cheaper.

The cost of membership has not changed for a number of years and even in the face of increased cost, we would like to keep it that way.

With more than 1000 'hams' in the London area, it's inconceivable that less than 10% support a pastime about which most of us are passionate.

PLEASE, make a choice and do your part to keep the **London Amateur Radio Club** alive and well by purchasing your membership at our next meeting (or by mail – details on our web site). The cost is still only \$25.00 (single) or \$30.00 (family residing at the same address).

Rob Hockin VA3HO
PO Box 13
Komoka, ON
N0L 1R0

2013-01-05

The Board of Directors
London Amateur Radio Club
London, ON

I have examined the books of receipts and disbursements of London Amateur Radio Club Inc, prepared by your treasurer for the year ended June 30, 2012.

In my opinion, the statements of cash receipts and expenditures present fairly the results of the club's operations.

No GICs matured in the 2011/2012 fiscal year.

A handwritten signature in black ink, appearing to read "Rob Hockin", with a long horizontal flourish extending to the right.