



The Halifax Amateur Radio Club

# REFLECTOR

PO BOX 8895  
HALIFAX NS  
B3K 5M5

May 2012, Volume 73 Number 5  
club web site is [www.halifax-arc.org](http://www.halifax-arc.org)



Plan to Come to the  
DownEast Flea Market on May 26



HARC Club Station phone number - 490-6421

### Executive

President - Fraser MacDougal, VE1WO	865-4198	fmac@ns.sympatico.ca
First V.P. - Bill Elliott, VE1MR	865-8567	bowser.elliott@ns.sympatico.ca
2nd V.P. - Betty Caithness, VE1BSW	477-7081	betty.caithness@ns.sympatico.ca
Secretary - VACANT		
Treasurer - John Goddwin, VE1CDD	865-5731	VE1CDD@eastlink.ca
Director-at-Large: - Doug LeBlanc, VE1LDL	465-4665	leblanc@accesscable.net
Club Station Mgr. - Jim Flowers, VE1JIM	443-8657	ve1jim@ns.sympatico.ca
Past President - VACANT		

### Committees/Offices/Prime Contacts

Government liaison - VACANT

QSL Bureau Mgr - Tom Caithness, VE1GTC 477-7081 tom.caithness@ns.sympatico.ca

EMO Coordinator - Dave George, VE1AJP 466-8723 dgeorge@dal.ca

EMO Trailer coordinator - David Musgrave, VE1EDA 435-4333 ve1eda@rac.ca

Reflector editor - Lynn Bowser, VE1ENT 865-8567 bowser.elliott@ns.sympatico.ca

Reflector Dist. - Carol Wood, VE1HAZ carolwood@accesswave.ca

Membership - Carol Wood, VE1HAZ carolwood@accesswave.ca

Web page - Frank Smith, VE1FIS frankiansmith@gmail.com

Basic ham course - Barry Diggins, VE1TRI 861-3719 ve1tri@rac.ca

2011 Flea market Chair - David Nimmo, VE1NN 462-3945 dnimmo@bellaliant.net

Callbook Editor - Howard Dickson, VE1DHD, 823-2024 dhickson@eastlink.ca

Field Day coordinator - Sheldon Hartling, VE1GPY 835-2694 hartling@netpathinc.com

Safety Officer - Terry Bigelow, VE1TRB ve1trb@eastlink.ca

NSARA Director - Barry Diggins, VE1TRI 861-3719 ve1tri@rac.ca

Honorary Legal Counsel - Paul Radford, VE1ARH

### Non Club Contacts

RAC Atlantic Director - Everett Price, VO1DK vo1dk@rac.ca

RAC Section Manager - VACANT

RAC Assistant Director for HRM Scott Wood, VE1QD, 823-2761 ve1qd@rac.ca

The **May General Meeting** of the Halifax Amateur Radio Club will take place Wednesday, May 16, 2012 in the club rooms on the 2nd Floor of the St. Andrew's Centre, 3380 Barnstead Lane, Halifax

6:30 pm. - 7:30 pm - Social Hr  
7:30 pm - 8:20 pm - Presentation by Scott Wood "Celebrating Ham Radio Anniversaries, But Still Looking Ahead". Scott is celebrating his 60th anniversary as an amateur and wanted to celebrate this anniversary along with those of other long-time hams, some of whom will also speak at this meeting. Scott and the other speakers will also look ahead to the future of amateur radio. As well, there will be special refreshments served during the social hour at this meeting.

8:30-9:30 General meeting  
Door prize will be a \$20 Canadian Tire gift card.

Guests are welcome.

The 2012 RAC Convention will be held on the weekend of August 11 & 12.

### Take-15 Net Controllers

This will be the rotation. We need at least 2 more. **If you want to join**, let Bill Elliott, VE1MR, know.



May 13	Bruce	VE1MLW
May 20	Emil	VE1ESP
May 27	Win	VE1WIN
June 3	Erik	VE1JEH
June 10	Doug	VE1LDL
June 17	Bruce	VE1MLW
June 24	Emil	VE1ESP



The Callbook is FINISHED and off to the printer!  
- Howard, VE1DHD

**Deadline for submissions to the June Reflector is Saturday, June 9, 2012**

*I think part of a best friend's job should be to immediately clear your computer history if you die.*



### GENERAL INFORMATION



Sunday evenings:  
TAKE-15 NET at 8:30 PM

CLUB REPEATERS:  
VE1PSR - 147.270 MHz + TX=82.5  
VE1PSR/UHF - 444.350 MHz +  
VE1PSR/6M - 53.550 MHz -  
access tone 151.4 Hz  
VE1HNS - 146.940 MHz - TX=82.5

PACKET: VE1NSD 145.050 MHz  
LAN NODE

*Events for Your Calendar*

May 26/12 – DownEast Flea Market  
 7:30AM Open for Sellers  
 9:00AM Open for Buyers  
 1:00 - Final Draw & Pack up

May 27 – MS Walk – Contact Tom, VE1GTC

June 2 & 3— Museum Ships Special Event

June 23-24 – ARRL Field Day

July 28 & 29 – MS Bike Tour  
 Contact Rick Gardner, VE1RGG, to help with communications  
 Email Rick at rsgardiner@eastlink.ca

July, last full weekend – IOTA (Islands On The Air) contest

July & August – Pizza nights

May 18-20 -- Dayton Hamvention, Dayton, Ohio

**ANNUAL MS BIKE TOUR AND MS WALK**

The Club has again been requested to take part in these Worthwhile Events. Rick Gardner VE1RGG has again agreed to co-ordinate the Bike Tour, Tom, VE1GTC is co-ordinating the MS walk which takes place in Halifax on May 27 2012. If you are willing to volunteer, please contact Tom

**HARC Basic Course Co-ordinator**

HARC is looking for a replacement Basic Course Co-ordinator. Barry, VE1TRI, has indicated that he wishes to pass this on to another person. He has been looking after this for the last few years and now wishes to put his efforts in other roles. He is willing to work with the new co-ordinator to assist then as required. Please consider taking on this task; if additional information is required, contact the Club Executive or Barry Diggins direct.

Every Monday night except in July and August, volunteer club members of the WARC conduct the WARC Weekly Net at 8pm on various linked repeaters. Listeners and checkers welcome.

**Downeast Flea Market**

**Date:** Saturday, May 26

**Location:** Halifax Forum (Bingo Annex) - same as last year - corner Yonge and Windsor streets. Lots of parking.

**TALK-IN:** 147.27 +



**Times:**

Doors open for Sellers – 7:30 AM  
 Doors open to Public - 9AM

Tables: FREE ! **BUT** reserve by contacting David, VE1NN by phone at 462-3945 or email dnimmo@bellaliant.net

Admission: \$4.00 per head for everybody

**Enjoy:**

- a) a Friday night "social"
- b) reduced rates the Chebuctou Inn
- c) casual breakfast at the Steak & Stein before the FleaMarket.
- d) door prizes & draws
- e) the NSARA meeting immediately following fleamarket at same venue
- f) **The NEW 2012 Maritime Call Book will be available.**
- G) commercial sellers



To help out contact FleaMarket Co-ordinator David Nimmo at dnimmo@bellaliant.net

And come participate (browse, sell, buy, socialize at our fleamarket.



The **MAARC of Moncton, NB** will be holding their **annual FleaMarket** on Saturday, Sept.22, 2012 at the Lion's Club Hall in Riverview, NB. This fleamarket is normally held in Shediac, NB, but has been moved to this location in Riverview this year.

**Brit Fader Scholarship Trust Announces Call for Applications**

The Brit Fader Scholarship was established in 1993 by the Halifax Amateur Radio Club and endowed through the generosity of Club members and Radio Amateurs throughout the Maritime Provinces of Canada. This scholarship is intended exclusively for post-secondary educational use, to provide assistance with the cost of tuition, room, board, books and/or other fees essential to the advanced education of the recipient. The amount of the 2012 award will be \$1000.00.



Applicant must be a citizen of Canada, but without regard to gender, race, national origin, handicap status or any other factor and must be performing at a high academic level.

Applicant must, hold an active Basic Class or higher grade of Canadian Amateur Radio license.

This Scholarship will be provided for attendance at an accredited Canadian post-secondary technical school, college or university, with preference given to applicants who have been accepted into a program in the field of electronics or electrical engineering.

Application submissions must be postmarked no later than July 15th, 2012.

A zipped application package (Criteria; Application Form; Reference Form) is available for downloading from the HARC website at [www.Halifax-arc.org](http://www.Halifax-arc.org).

Follow the link to the Brit Fader Scholarship from the Home Page under Education..

D. Howard Dickson – VE1DHD for the Brit Fader Scholarship Committee

*A bank is a place that will lend you money, if you can prove that you don't need it.*



**PRESIDENT'S MESSAGE for MAY 2012**

The time period for the use of the Special Call CG1T is over. The Clubs use was only for the Month of April in memory of the Titanic sinking. Indications are that over 500 contacts were made by various club members. If you used this call, please forward a copy of your log to Jim, VE1JIM, for consolidation. We were not able to operate from Maritime Museum in April due to the fact we could not set up an antenna. Talks are ongoing with them about installing a permanent antenna there.

We are still looking into purchasing a Vertical Antenna for portable use. Several models are being considered but no firm decision has been made.

The Flea Market plans are progressing well, over 50 tables have been reserved. Volunteers are needed on Saturday morning to assist with setting up the room in preparation for the Market.

The Call Book is at the printers and will be ready for the Flea Market on the 26<sup>th</sup>.

Please do not forget the MS walk on the 27<sup>th</sup>. If you are interested in assisting, contact Tom, VE1GTC, for details.

Plans for Field Day are on going. Sheldon, VE1GPY, will have details and will be requesting volunteers to assist at the General meeting on June 20<sup>th</sup>.

Fraser Mac Dougall, VE1WO

**CONGRATULATIONS**

TO RODNEY AND SUZAN PADMORE ON THE OCCASION OF THEIR MARRAGE AT ST. JOSEPH'S CATHEDRAL CHAPEL IN MANCHESTER, NEW HAMPSHIRE ON APRIL 21, 2012



**HARC Monthly Meeting**

The Executive has reviewed the comments regarding the change of format and venue for the Monthly Meetings for February, March and April.

It was decided to keep the adopted format, social hour, entertainment followed by the general meeting. The feedback received has been positive on this.

The feedback on the meeting room venue has not been as positive. Many members feel that the Club Station is small and the area lacks required ventilation for the number of people present. We have decided to return to holding our general meetings in the Seniors Area on the first floor.

**Club Satellite Installation**

HARC is now prepared to move forward with the Satellite Installation. We had agreed to purchase the required additional equipment from the money received from Surplus Equipment sales.

John, VE1CDD, has indicated we now have sufficient revenue from sales to pay for the required equipment and materials.

Discussion on this will be an Agenda item for the May General Meeting.

*Quotes By George Burns  
May 29, 1903 - July 27, 2003  
ON NEVER WINNING AN OSCAR  
'Welcome to the Academy Awards or,  
as it's called at my home, 'Passover'.'*

**Executive Reports for April, 2012**

**1<sup>st</sup> Vice President's Report**

Nothing to report.

- Bill Elliott, VE1MR

**Second Vice-President's Report**

How would members feel about the possibility of holding one of our general meetings (possibly in September) at EMO in Dartmouth? Barry Manuel has invited us to do so at some point and I have tentatively booked EMO for our September meeting. Barry will be available to give us an on-site tour of the facilities as the entertainment/speaker portion of the evening. Please provide me with your comments either at our May 16 meeting or by phone or e-mail as listed on the front page of this Reflector.

Betty, VE1BSW

RAC's web site is [www.rac.ca](http://www.rac.ca)

**Station Manager's Report**

Completion of phone lines is being co-ordinated.

New equipment sign-out log will be in effect shortly.

All computers were updated with the latest Windows updates.

Equipment is working fine at present

Jim, VE1JIM

**Report of Director-at-Large**

Nothing to report

- Doug, VE1LDL

The **Incoming QSL Bureau** may have cards for you. If you want them, you must have a little money deposited with the Bureau to cover the cost of envelopes, labels, postage & handling; and of course your correct mailing address. Send to the Brit Fader Memorial QSL Bureau

P.O. Box 8895  
Halifax, N.S. B3K 5M5



From the April RAC Report  
**RAC President's Report** by Geoff Bawden, VE4BAW

RAC is once again looking for volunteers to operate the Booth at the Dayton Hamvention from May 18 to 20. Last year we organized a single three-hour slot for each volunteer. Your availability will determine your slot and flexibility is the watchword. Please forward your contact information and availability by email to <ve4baw@rac.ca> with a copy to our office at <rachq@rac.ca>.

Once again I would like to thank the Montreal Amateur Radio Club for hosting the upcoming 2012 RAC Annual General Meeting. The AGM will be held in Montreal on the weekend of September 22-23 and will be held in conjunction with their 80th Anniversary Celebration. There will be a great deal of fun and this is your opportunity to put me on the spot. Please join us in "la belle province".

RAC Director Mitch, ve6om (Alberta, the Northwest Territories and Nunavut) has been labouring mightily to shape a RAC Forum within an Amateur Radio Conference and has announced that yes, indeed, we will be having a Conference in Edmonton on August 10, 11 and 12. I am looking forward to being in Alberta this summer and I hope that you will join Mitch and the crew at the 2012 RAC Convention.

— 73, Geoff, VE4BAW

Do you have a mobile or portable radio that is D-Star capable? A D-Star repeater is now operational in Lunenburg County. The install was completed on February 18, 2012 at a tower site located at Church Lake, NS, not far from Bridgewater. If you're in the area give it a try! Frequency is 145.290 (-.600). Callsign is VE1DSR.

*When a clock is hungry,  
it goes back four seconds.*

**The Brit Fader Scholarship** is intended to assist with post-secondary education for a young Canadian Radio Amateur. Please inform potential candidates about this opportunity. The time to submit 2012 applications is now.

To keep the scholarship fund self-sustaining the fund needs donations. Please make an income tax deductible donation to:  
 The Brit Fader Scholarship Fund.



From the April RAC Report  
**Update on 60 Metres** by Bill Gade, VE4WO  
 – RAC Regulatory Affairs Officer

RAC has been pursuing channelized access to 60m since early 2010. Our request was for an allocation identical to the US allocation, with one additional unique Canadian channel, and with fewer restrictions (the US allocations were restricted to USB voice only, with power and antenna restrictions). One of the rationales for RAC requesting a 60m allocation was to enhance emergency communications including cross-border interoperability.

Industry Canada (IC) responded by indicating that they were prepared to support access in synch with US Amateur allocation and regulations. In late 2011, in response to an ARRL petition for change, the FCC issued a final Report and Order that, once it has been published in the Federal Register, will result in a change to the frequency of one of the channels and will enable the use of CW and data modes in addition to USB voice. These features had already been in the original RAC request. The FCC Report and Order has cleared the way for Canada to move ahead with finalizing its allocation to match the new US allocations, including the ability to use CW and data modes. This allocation, which will be on a secondary basis, requires a public consultation through the Canada Gazette, which

RAC anticipates will occur in the second quarter of 2012.

It is important that Canadian Amateurs comment on the draft once released. RAC will continue to keep our members aware of the status of this important initiative.

An important offer has been made by IC with regards to 60m. Industry Canada is prepared to license operators in channelized 60m operation pending the results of the consultation process. The licensing process will be managed out of IC's regional offices and is open to any Canadian Amateur. The process requires a formal licence application, payment of a licence fee, and the use of a special call sign instead of the licensee's Amateur call sign. RAC regards this as an important interim step allowing Amateurs to get on the air in the 60m band as soon as possible and thanks IC for this initiative. RAC's objective, however, is to ensure that Canadian Amateurs have the 60m allocation available to all Amateurs as part of their Amateur Radio certification, i.e., without licence applications, licence fees or special call signs. RAC is cautiously optimistic that this will come about in the summer of 2012.

If you wish to obtain a temporary, paid licence to operate on 60m, please contact your local Industry Canada Regional Office to complete the application form. The total fee depends upon the date of your application but in any case is less than \$100.

To make the most of **our web page** please send photos, notices of events, and ham radio news items, etc. to Frank Smith; e-mail frankiansmith@gmail.com

The HARC Reflector is also available on the web (photos in colour) via [www.halifax-arc.org](http://www.halifax-arc.org)

*Golf is the only sport  
where  
your most  
feared  
opponent  
is you.*



### Atlantic Canadian Schools Prepare for VA3OOG ISS Deployment

If everything goes as planned Canadian astronaut Chris Hadfield, VA3OOG / KC5RNJ, will begin a 6 month deployment to the International Space Station in early December 2012 and Atlantic Canadian schools are eager to speak with him. In this article I'll provide information on who will be participating in this historic event as well as some of the other ARISS activities planned for this summer/fall. I'll also provide some background information on ARISS with specifics on our Radio Club's involvement in the program.

At the time of this submission Chris continues to prepare for his "ride uphill" and is continuing his training at various facilities in Canada, Germany, Russia and at Johnson Space Center in Houston. He will launch on Soyuz 33A (currently planned for December 5, 2012. After a 2 day chase they will catch-up with the ISS with docking to take place on December 7. During the first 3 months of the planned 6 month habitation Chris will act as one of 2 Expedition 34 Flight Engineers. It's during the second half of his deployment that Chris will make Canadian history by acting as the Commander of the ISS Expedition 35.

To date, a total of 5 ARISS contacts are planned to take place in Atlantic Canada. Each are eagerly planning for their opportunity to speak with the ISS. Of these, the Hadfield contacts will likely receive heavy media coverage (local, regional, national, international). The remaining 2 contacts will involve either NASA or ESA Astronauts. This level of activity will bring the opportunity to introduce Amateur Radio to students, educators and the general public as never before.

Schools (scheduled for contacts with Chris Hadfield) are from Nova Scotia, New Brunswick and PEI. These

schools are as follows:

Charles P. Allen High School,  
Bedford, NS  
Saint Rose Elementary School  
Saint John, NB  
Stonepark Intermediate School,  
Charlottetown, PE

Note: ARISS Canada (East) is seeking a school in Newfoundland and Labrador and will assist them in completing and submitting an application for an ARISS contact. Please e-mail me at ariss@eastlink.ca with any contacts or direction that readers might have.

From the technical support side, Amateur Radio operators in our region who are experienced in satellite operations and have created working groups are preparing to meet the challenge of establishing ground stations needed to support these "direct" contacts (a "direct" contact is a radio communication link between an Amateur Radio ground station established where the participants are located and the ISS). This includes meeting the strict requirements and specifications as laid out by ARISS Operations and NASA. Technical Mentorship for all of the ARISS contacts in this region will be provided by Wayne, VE1WPH / VE1ISS.

In addition to the previously mentioned "direct" ARISS contacts a number of "telebridge" events will be taking place in the Halifax area. A "telebridge" contact is conducted when a dedicated ARISS Amateur Radio ground station, (part of the ARISS Telebridge Network) is not at the same location as the participants (somewhere else in the world), and establishes/provides the radio up/down link with the ISS. Voice communication between the event moderator & participants and the astronauts is provided over regular telephone lines similar to a teleconference. Typically these events are steamed to both IRLP

and EchoLink listeners.

Those who have applied and are approved for contact are as follows:

Scouts Canada, Keshen Goodman Library, Halifax, NS (tentative contact date 23 - June -2012)

Sacred Heart School of Halifax, Halifax, NS (tentative date of late September / early October)

ARISS or Amateur Radio on the International Space Station (ariss.org) is an educational outreach program whose principle aim is to inspire students, world wide, to pursue careers in science, technology, engineering and math or STEM by providing Amateur Radio communications opportunities with the International Space Station (ISS) on-orbit crewmembers.

In addition to the classroom environment, this unique "voice-to-voice" Amateur Radio based communication with ISS astronauts exposes a much larger audience where, in a variety of public forums, other students, teachers, parents and communities can learn about space, space technology, and of course Amateur Radio, first hand.

Since early in 2003 (April, ARISS at IMAX Bayers Lake) members of the Halifax ARC have played a significant support role to the ARISS program. HARC has been fundamental to the introduction, testing and qualification of the ARISS Audio Distribution System that serves both IRLP and EchoLink communities. HARC continues to support this popular aspect of the ARISS program by maintaining IRLP Reflector 9010 "Discovery" as well as it's sister website [www.discoveryreflector.ca](http://www.discoveryreflector.ca).

Look for continuing coverage and additional information on these and other ARISS events in future editions of the "Reflector", the "Take 15 Net" and as postings to [halifax-arc.ca](http://halifax-arc.ca).

73, Wayne, VE1WPH / VE1ISS  
ARISS Canada Mentor

**Halifax Amateur Radio Club  
Minutes of the General Monthly  
Meeting of  
Wednesday, April 18, 2012**

Meeting declared open at 8:35 PM by President Fraser MacDougall, VE1WO.

There were no Silent Keys Reported.

Agenda was presented, there were two additions under new business, it was moved by Scott VE1QD and seconded by Jim VE1JIM that the amended agenda be accepted. Motion carried.

There was one guest, David Shindler. David now resides in New Harbour and did hold the US Call of K3IIF.

It was moved by Tom, VE1GTC, and seconded by Eric, VE1JEH, that the minutes of the March 12<sup>th</sup> monthly meeting be accepted as distributed in the April Reflector. Motion carried.

John, VE1CDD, presented his Treasures Report. Discussion followed regarding Income and Expenses. John moved that his report be accepted; motion was seconded by Carol VE1HAZ. Motion carried.

There was one addition to the Executive Reports, Betty, VE1BSW, informed the meeting that Scott Wood will lead a discussion on "Celebrating 60 Years in Ham Radio, Still Looking Forward" at the May General Meeting.

**COMMITTEE REPORTS**

EMO: Dave, VE1AJP, stated that he had nothing to report from EMO.

Search and Rescue: Dave, VE1AJP, reported that the Search Group was involved in an Evidence Search along with the Canadian Border Services at Laurie Park. The Border Services were using a Deep Sea Search Vehicle (ROV). In addition, the Search Group conducted a Lost Person search in Bayside; the victim was found safely.

2012 Call Book: The draft copy is at

the printers. The call book will be printed and available at the Flea Market in May. The Advertisement Campaign has provided approximately 96 % of our Printing costs.

Membership: Carol, VE1HAZ, reported the membership stands at 122, this is made up of 98 full, 20 associate and 4 life members.

**OLD BUSINESS**

Discovery Center: John, VE1CDD, reported that the Amateur Radio demonstration at the Discovery Center has completed. We will look at the results and base our decision on continuing this event if requested.

MMA Titanic Event: The Club was not able to set up a Radio Station due to the fact we were not able to setup Antennas. We did obtain a Special Call, CG1T, for the month of April and several club members have been active using this call.

Climbing Certification. This course took place on the 18<sup>th</sup> of March. Five club members obtained certification for three years.

Flea Market Report: Plans are progressing well, there are approximately 50 tables reserved at this time. The bulk of reservations normally come in during the last month.

Field Day: Sheldon, VE1GPY, reported that plans are progressing for the Event at York Redoubt. We will be operating in the 2A category. Volunteers will be required for all the events (set up, operating, bonus points co-ordinator, public relations and tear down).

**NEW BUSINESS:**

Policy for Loan of Club Equipment: This amendment was published in the March Reflector. A short discussion took place. It was moved by Dick, VE1AI, and seconded by Jim VE1JIM that this be accepted. Motion carried.

Tall Ships 2012: The club has re-

ceived an additional e-mail from this committee, they will be providing additional information on what they may require from HARC.

High School and ISS Contacts: It was reported that there are two upcoming Tela-Bridge contacts, one in mid June and the other in late September. In addition, CP Allen High School is planning an ISS Contact in late 2012.

Radio Canada International:

The Maritime Contest Club is looking into the possibility of using the Facilities of RCI at Sackville, NB when the station ceases operation in June. Contact is being made with CBC and other Agencies. Additional information will be distributed when it is available.

Door Prize: The \$ 20.00 Gift Certificate was won by Eric, VE1JEH.

The 50 / 50 draw of \$29.00 was won by Spud, VE1BC

Meeting Adjourned at 9:30 PM

Respectfully submitted by:  
Fraser MacDougall – VE1WO

**Brit Fader Scholarship**

This scholarship is granted in memory of Brit Fader, VE1FQ, by the Brit Fader Scholarship Trust, a Canada Revenue Agency registered charity whose trustees are appointed by the Halifax Amateur Radio Club. The first grant was awarded in 2008

To donate, make cheques payable to Brit Fader Scholarship Trust and mail to the attention of Paul Radford, c/o Coady Filliter, Barristers & Solicitors, Suite 208, 5880 Spring Garden Road, Halifax, Nova Scotia, Canada B3H 1Y1.

Donations are tax deductible. We are a registered charity with Canada Revenue Agency (registration # 0984971-25).

*Why do doctors leave the room while you change?  
They're going to see you naked anyway.*



*Safety Tip*

CAR AIR-CONDITIONING -

My car book says to roll down the windows to let out all the hot air before turning on A/C.

Here's why: According to research, the car dashboard, seats and air freshener emit Benzene, a Cancer causing toxin (carcinogen - take time to observe the smell of heated plastic in your car). And many people are in their cars first thing in the morning and the last thing at night, 7 days a week.

Please do NOT turn on A/C as soon as you enter the car. Open the windows after you enter your car and then turn ON the A/C after a couple of minutes

In addition to causing cancer, Benzene poisons your bones, causes anemia and reduces white blood cells. Prolonged exposure will cause Leukemia, increasing the risk of cancer. Can also cause miscarriage.

Acceptable Benzene level indoors is 50 mg per sq. ft.

A car parked indoors with windows closed will contain 400-800 mg of Benzene.

If parked outdoors under the sun at a temperature above 60 degrees F, the Benzene level goes up to 2000-4000 mg, 40 times the acceptable level.

People who get into the car, keeping windows closed will inevitably inhale excessive amounts of the toxin.

Benzene is a toxin that affects your kidney and liver.. What's worse, it is extremely difficult for your body to expel this toxic stuff.

So please open the windows and door of your car - give time for interior to air out -dispel the deadly stuff - before you enter.

This is what snopes.com says. It is not the air conditioning in the car but the Benzene producing agents that cause cancer.

<http://www.snopes.com/medical/toxins/benzene.asp>

*The shin bone is a device for finding furniture.*



**On April 6th, 2012, Rothesay High School successfully launched a payload to the edge of space.** Our goal was to reach an altitude of 100000' (30km) and return pictures and data to the ground.



From this altitude, we were able to see much of NB, as well as parts of Nova Scotia and Maine. The curvature of the earth was visible and the sky appeared black.

The flight took 2 hours and at times experienced temperatures of -60 C and 110 km/h winds. The air pressure was about 1% of what it is at sea level. Conditions were more like those on the surface of Mars than on Earth.

On board, were 2 cameras shooting still pictures every 30 seconds as well as two video cameras. Two tracking devices kept tabs on the craft's position and altitude as it flew across NB.

**Tracking** was achieved using two separate pieces of technology. Our **primary tracker was an APRS tracker** which broadcast its position via short wave. At altitude, this signal could be received by short wave radio operators all over southern New Brunswick. The positional data was ported this site, which allowed us to graphically follow the progress of the capsule.

Secondary tracking was provided by a SPOT tracker. This is a commercial device, usually carried by hikers to allow them to provide updates of their location to the web. The SPOT tracker reported its position every 10 minutes.

Each device was chosen for a particular strength. the APRS tracker was able to provide real time position information and could track to a very high altitude without loss of signal. In addition, even when on the ground, the APRS was detectable by amateur radio operators with mobile radio systems. The spot device, being a commercial device was easy to use. In addition, since it was satellite based, it should be able to broadcast its position from anywhere in the world. Other projects have utilized cell phone technology to track their payloads, but due to the rural nature of New Brunswick, it was decide that the risk of landing in an area without cell coverage was too great to employ this method

For more go to: <http://rhsspaceflight.wikispaces.com/Media+and+other+Data..+The+good+stuff!>

*Click on "photos and videos" or some interesting visuals.  
Thanks to Wayne, VE1WPH for this item. -ed*

Researchers at the University of California-Irvine believe that **iron pyrites** can be processed into a thin film for use in **photovoltaic cells** and could eventually convert sunlight to electricity at roughly the same rate as existing technology. Existing cells such as cadmium telluride and amorphous silicon use materials that are either very scarce, potentially toxic or not especially efficient.

A prototype could be ready within the year.

Source -An article in the Los Angeles Times by Tiffany Hsu

From the April RAC Report

Scott Carter, VE3CGN, of Dutton, Ont. is RAC's new Ontario Section Emergency Coordinator (SEC) for ARES

Scott was the former District Emergency Coordinator for the Tecumseh District. Scott has many certifications in emergency management including his CEC, BEM, IMS-100, IMS-200. Scott is also very active with the Salvation Army Team Emergency Radio Network (SATERN).

Scott's appointment took effect on March 1. His term is until Sept.1 when respective appointments will be made in each of the 4 new Sections in Ontario.



**From the Mail Bag**

Going somewhere in your car and want to check if your route has a holdup in traffic? I just found it on the TomTom site and it's free.

<http://www.tomtom.com/livetraffic/>  
Best Regards, Nigel, VE1NPS

The Maritime Contest Club (MCC) is in the process of making an application to the Government and to CBC to have access to the Radio Canada International (RCI) site in Sackville NB once the CBC finishes broadcasting shortwave at the end of June. The idea is to request access to the site to use their antenna system for several contests in the summer/fall of 2012 - IRA Radio Sport contest in the summer; CQ WW SSB and CQ WW CW in the fall. They will also extent one of more of those contests for a week making it into a DX-pedition to promote RCI. While this is driven by MCC we will need the support of all of the radio amateurs and clubs in the Maritimes. We have support from Nautel (thanks to Scott). It would be nice if HARC could support this initiative as well. If successful, it would really put amateur radio, particularly in Maritime Canada on the map, and will serve to support RCI and CBC.

73 Howard, VE1DHD

URL's noted on the Westcumb Amateur Radio Club website

Tower Climb - climbing to the top of a transmission tower.

<http://file.qip.ru/embed/139653439/bb7b65c3>

Here is the Wiki Article on SDR (Software Defined Radio):

[http://en.wikipedia.org/wiki/Software-defined\\_radio](http://en.wikipedia.org/wiki/Software-defined_radio)

...and here is a webpage where you can have hours of fun using SDR on radios from around the world:

<http://www.websdr.org/>

*Clip info found & forwarded by Spud, VE1BC*  
*How's this for a ham shack accessory? -ed*

[http://www.youtube.com/watch?feature=player\\_embedded&v=neHreW-PNtw](http://www.youtube.com/watch?feature=player_embedded&v=neHreW-PNtw)

Just a note to all that Bill and I along with help from Howard VE1FV have completed the re-installation of the LCA VHF Repeater, UHF HUB, RC210 controller and RLC Club Deluxe controller.

With many hours spent by Bill on programming and construction I would like to express my appreciation on this project, along with many others preceding this one. This was one of our largest projects to date. We started April 21 arriving at 10:00 am (Bill arrived home at 2:00 am Sunday); we were unable to complete at that time. We arrived today April 28, 2012, 9:30 am, (Bill arrive home at midnight).

All seems to be working well and noticeable improvements on all links, Hub, and LCA repeater. There are a number of features, DTMF read back, temperature, time announcements and more....

73, Tom VE1TA

VE1GK, Glenn has written an interesting and informative article on D-STAR. Glenn's article appears in this month's issue of "The Tantramar".

In his article he notes that further info can be gleaned from the ARRL 2012 Handbook, including its extra info DVD, and the following: LINKS  
1. Wikipedia – 9 pages of History & development, with unending URL references!

<http://en.wikipedia.org/wiki/D-STAR>

2. YouTube – 10 and 5 minute videos by an experienced ham on programming radios.

[http://www.youtube.com/watch?v=7-\\_MK\\_TKMfg](http://www.youtube.com/watch?v=7-_MK_TKMfg)

3. RadioWorld IC-80 & 880 combined 4 page brochure.

[http://www.radioworld.ca/product\\_brochures/amateur/icom\\_brochures/ic-80ad-id880h\\_brochure.pdf](http://www.radioworld.ca/product_brochures/amateur/icom_brochures/ic-80ad-id880h_brochure.pdf)

*I went to a seafood disco last week ... and pulled a mussel.*

From the ARRL Letter April 12, 2012  
**Malaysia to Host Eighth Global Amateur Radio Emergency Communications Conference**

The Eighth Global Amateur Radio Emergency Communications Conference (GAREC) -- called MyGAREC 2012 -- will be held November 12-14 in the Malaysian state of Negeri Sembilan at the Thistle Port Dickson Resort.

GAREC began in 2005 in Tampere, Finland. The conference attracts radio amateurs who have an interest in providing emergency communications in response to disasters or during training exercises. MyGAREC 2012 has been timed to immediately follow the IARU Region 3 Conference in Vietnam (scheduled for November 5-9) with its theme of disaster relief communications.

General information for MyGAREC 2012 -- including information on the venue, registration fees, the tentative agenda and registration forms -- has been posted on the MyGAREC website. According to organizers, the website will be updated weekly with the latest news and program changes. Among the topics to be discussed include the HF emergency operating procedure and the future of GAREC, as well as presentations from the three IARU regions. Presentations from various IARU Member Societies regarding recent disaster relief communications operations will also be scheduled.

Previous GARECs have been held in Finland (2005 and 2006), the USA (2007), Germany (2008), Japan (2009), Curaçao (2010) and South Africa (2011).



## VE1LCA MOVE

The VE1LCA VHF repeater and UHF hub linking repeater have been in a site at East Dalhousie for quite a while but complicated the linking system since another multi directional link site was only a few miles away at Springfield. Part of the problem was the Springfield site did not have enough UHF antennas available for linking and another major consideration was the number of controller ports needed. Several years ago the NSARA had acquired a Link Communications RLC-Club Deluxe II 6 port controller and earmarked it for Springfield. In late 2010 a UHF antenna became available at Springfield and the NSARA submitted an application to use this antenna and make extensive changes to the installation in the site. Permission was granted in mid 2011. During the winter of 2011/2012, Bill, VE1MR programmed and tested the RLC-Club controller, loaded the Digital Voice Recorder (DVR) with announcements and messages and since the site would eventually need more than 5 ports (the DVR uses port 6) interfaced an ARCOM RC210 3 port controller to the RLC-Club for a total of 6 usable ports. The plan was to make the link to VE1VO (Liverpool) full duplex with the upgrade and allow for future upgrade of both VE1VL and VE1KEJ to full duplex links.

On Saturday April 21, Bill, VE1MR, Tom, VE1TA were met at the East Dalhousie site of VE1LCA by Howie, VE1FV for the removal of the VE1LCA VHF repeater and the UHF hub link repeater. The removal went quickly and the gear loaded into Howie's truck and we went down the road a few miles to the Springfield site. This site already housed 2 full duplex links and a simplex link - full duplex to Bridgetown and South and full duplex to Chester and North, the simplex link was to the hub repeater at East Dalhousie. The Springfield site also had APRS installed.

Part of the permission to make changes at the site required that we move the rack we were currently using to another location and to also move the rack in the other location to the far end of the row. The second rack at the far end of the row was restricted to us only using the bottom of the rack to allow servicing of the exhaust fan just behind that rack.

On arrival at Springfield we killed the power to both racks and proceeded to move them to their final locations. Then we installed the full duplex link radio for VE1VO, moved some equipment around and generally installed and tidied wiring in the racks. We also installed the VE1LCA VHF repeater in the end of row rack and temporarily installed the UHF hub repeater in the original rack. We planned to eventually replace the UHF hub repeater with a newer piece of gear.

It was getting late and Howie decided to leave but found he could not get enough traction on the wet grass and mud to make the run up a slight grade. We got Howie turned around and backed into a flat section and he was able to get enough momentum to make it up the hill to the main highway and was on his way home. We worked a little longer but were getting tired and starting to make mistakes so we made some quick adjustments and hoped for the best. We turned off several of the radios including the VHF repeater which we had not interfaced. We found as we headed home that nothing was working properly and decide that we would return the next Saturday to finish off. Tom, VE1TA was dropped off at 0130 and Bill, VE1MR arrived home at 0230.

During the week before April 28 Tom, VE1TA programmed and tuned the replacement UHF hub repeater and Bill, VE1MR tuned the replacement duplexer for the UHF

hub repeater. On Saturday April 28 we arrived at the site and installed the replacement UHF hub repeater, interfaced the VHF repeater and finished wiring everything, then placed dummy loads on all radios in preparation for setting audio levels. In the early afternoon we were visited by Don, VE1AMC who would deliver an interface cable to Howie, VE1FV. When Don went to leave he experienced the same problem Howie had the week before except now the ground was much wetter and muddier. Don was unable to gain enough speed to get away from the site. Bill got his car behind Don's and gently assisted him on his way - All Wheel Drive does work.

We began adjusting audio levels and discovered a couple of inconsistencies and realized the audio pick off of the VHF repeater was wrong so had to rewire that. We also found another audio inconsistency on the UHF hub repeater and changed a jumper in the controller to correct the issue. We felt everything was set correctly so connected all radios to antennas and began some testing on the links. We quickly realized we had not set the regenerated DTMF levels from the controller and the manual did not explicitly state where these adjustments were. We looked over the board and determined which adjustments must be the correct ones and tried adjusting these - it worked. So we set up the regenerated DTMF on the link ports and had a chat with several people on several repeaters getting good reports on signal quality and audio quality. We packed up and headed home with Tom being dropped off at about 9:30 PM and Bill arriving home about 11:00 PM.

*(Continued on page 10)*



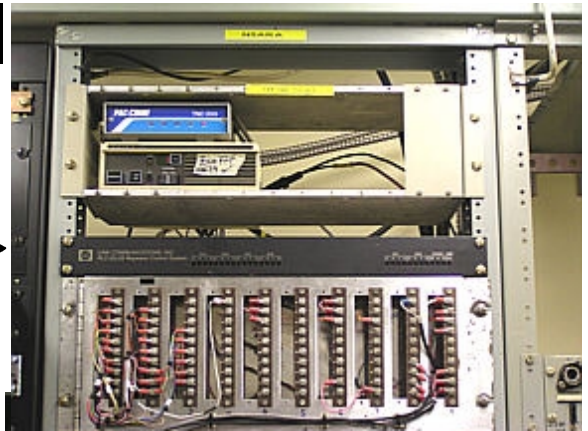
*Mom, what's a "gaffe"?  
Well, dear, that's when  
politicians slip up and  
unintentionally say what  
they really mean.*

So ended two very long days of work at the Springfield site. This site is probably one of the busiest sites with a VHF repeater, 3 full duplex links, a UHF hub repeater servicing 2 links and APRS. We have had good reports of its operation but will need to make a brief stop to make minor programming changes the next time we are passing by.

Bill Elliott, VE1MR

### VE1LCA at Springfield

A closer look at the rack-mounted components



Amateur Radio equipment in the rack lineup



Bill, VE1MR & Tom, VE1TA took 2 long days, April 21 & 28, 2012, to move all the equipment of the VE1LCA repeater/hub installation from Dalhousie to Springfield and get everything lined up and working properly. The finished installation is a tidy and professional one.



“Cans” are tidily rack mounted. More than one system can transmit/receive using the same antenna when the signal goes through a set of 4 properly tuned cans. A single can may be tuned to function as a pass or reject filter



VHF repeater VE1LCA

