# **Emergency Radio Communications** An Open Letter To All Amateurs In Ottawa-Carleton

This newsletter has been sent to all licensed amateur radio operators in Ottawa-Carleton. The list was created using the Industry Canada database, sorted by postal code, which extends outside Ottawa-Carleton in some places. The purpose of this newsletter is to update the almost 1700 licensed amateurs in this region about the changes and improvements that have taken place in the Emergency Measures Radio Group (EMRG), also known as Ottawa-Carleton ARES.

## TEAM LEADERS MESSAGE

In the past 5 years, there has been a lot change in local government, local employment and local emergency radio communications in Ottawa-Carleton. With restructuring starting this year, change will continue.

Many amateurs are not aware of opportunities to become involved in emergency radio communications, while others became disenchanted at various points over the past 5 years.

The purpose of this newsletter, is to ensure that every amateur in Ottawa-Carleton has the opportunity to find out about EMRG and what has been happening.

I ask each person that receives this letter, to take the time to read it and discuss it with other amateurs in the area. Remember, EMRG is about volunteering to help your family, friends, neighbors and community. This should not be a political decision.

Peter Gamble -VE3BQP Team Leader EMRG <u>Ve3bqp@rac.ca</u>

## EMRG GENERAL MEETING

DATE: TIME: LOCATION: Saturday March 18 9:00AM - 12:00PM Ottawa Fire Dept 900 Industrial Road

All interested amateurs are encouraged to attend the general meeting. This meeting is an opportunity for anyone interested, to see what EMRG is all about.

There will be guest speakers and equipment displays as well as free coffee. There is no obligation to join, so if you are interested, please make an effort to get out to the meeting.

This will be the first of the new style meetings, using local facilities other than the Regions. This meeting will be held at the Ottawa Fire Department training facility, at 900 Industrial Road in Ottawa. (Near the corner of Saint Laurent & Industrial Road)

Please park in the side or back lot. There is a functional fire station at this location. **DO NOT** park in front of the fire station entrance, even for a few minutes. The Emergency Measures Radio Group (EMRG) is a non partisan group with no direct affiliations to any club. EMRG is not a club itself, is not incorporated and owns no equipment. EMRG is a group of volunteers who provide organization and training and acts as the interface between the volunteer radio community in Ottawa-Carleton and the people we serve. It is through EMRG that local communities, the Region, Hospitals and the Red Cross, would contact local radio operators for assistance in an emergency.

## HISTORY

The role of volunteer radio communications in Ottawa-Carleton, began back in the 1950s & early 60s. EMO was set up at the national, provincial and municipal levels. Equipment was put in place for emergency use, to link agencies within a municipality and to link municipalities.

In 1963 the XM49 Emergency Radio Squadron (XM49ers) was enlisted by the local EMO coordinator as a way to expand the base of radio operators in the event of an emergency. EMO provided courses in First Aid and CPR as well as training exercises. In 1966 the XM49ers assisted during the Heron Road bridge collapse.

In 1980, amateur radio VHF repeaters were available in Ottawa-Carleton and a group was formed called the Emergency Measures Amateur Radio Group (EMARG). This expanded the base of radio operators in the Region and provided communications using repeaters. In 1988 the Cumberland Township placed an advertisement in the local Orleans weekly newspaper, requesting help from the amateur radio population, to back up their communication system at the Fire Hall. This advertisement was answered by VE3XL, Ric Guidone, and the process of forming a core of volunteers was begun VE3CER was chosen as the callsign and the Cumberland Emergency Radio Group (CERG) was created.

In 1990, the present organization, the Emergency Measures Radio Group (EMRG) was formed. EMRG brought the Amateur Radio operators and the XM49 Emergency Radio Squadron under one volunteer radio group. Members operate their respective equipment and on the appropriately licensed frequencies. Many members of the XM49 Emergency Radio Squadron are also have an Amateur license.

In 1998, after the ice storm, local amateurs in Osgoode Township, got together to form an ARES group to serve their community.

## EMRG WEB SITE

The Emergency Measures Radio Group web site is located at:

### www.igs.net/~gamble/index.htm

The purpose of the web site is to share information about EMRG, emergency communications in Ottawa-Carleton and emergency preparation in general.

It takes more than a group of individuals who own radios to be useful in an emergency. It takes an organized team!

# EMRG The Last 5 Years

#### Joe MacPherson Resigns

Many local amateurs knew Joe MacPherson (Formerly VE3CAT), long time leader for EMRG. Joe brought in many training sessions and exercises during his time, but in late 1995, Joe suddenly resigned over differences with the Regions Emergency Measures Unit.

Following Joe's resignation rumors spread that the Region didn't want anything to do with amateur radio and that they had removed all amateur radios and antennas from their building. Rumors are easy to start but hard to stop. The radios and antennas are still in place and are being improved.

#### <u>New Team Leader</u>

In January 1996, Peter Gamble took on the task of meeting with the Region to find out what was happening. Peter continued in this role, eventually becoming the new team leader. Most of 1996 was spent working with the Region and within EMRG, to develop a common understanding of where EMRG fit into the Region's emergency plan and developing a formal agreement.

The year 1997 passed with no major changes. EMRG met several times, but nothing was happening. Peter Gamble, team leader, was learning that it takes a lot of skill and work to lead a group like EMRG. People don't tend to volunteer.

#### The Ice Storm

In 1998 the ice storm hit. When EMRG was not activated as part of the ice storm emergency response, many believed this was confirmation that the Region did not care. While EMRG was not active as a group, many EMRG members were busy. The main thing learned from the ice storm, is the need to have a direct working relationship with local municipalities. It was the local Municipality that was responsible for local response to the emergency and if they did not know about EMRG or amateur radio, they did not think of EMRG as a solution and so did not ask for assistance.

The review after the ice storm made it clear that EMRG had some issues to deal with. Some people wanted to fold EMRG, but they had no alternative. However Peter Gamble and some dedicated members believed that it was better to fix the problems than to bail out.

#### The Latest Chapter

For the past two years, EMRG has suffered "chicken & egg" syndrome with respect to retaining and attracting members. People did not want to be involved in a group that they feel is not recognized, but it is difficult to become recognized without members. Despite the membership challenges, there have been a lot of positive changes and a lot of organizational activity in the past two years.

Local Municipalities, Fire Departments, Police, Hospitals and the Red Cross, now recognize EMRG and expect to see members in to operate from their location. Amateur stations have been installed in several fire stations and more permanent installations are being planned.

The final phase for EMRG is to attract new members. People who can be active participants and people who can take ownership of activities such as organizing exercises, coordinating construction parties and testing out new locations.

# CHANGES TO EMRG

The consensus after the ice storm, was that changes & improvements were critical to the continuation of EMRG.

### Four Improvements Identified

- 1. Clarify the relationship between the RMOC and EMRG.
- 2. Become an active organization, not just meetings.
- 3. Become known by, and involved in, the local Municipal emergency response community.
- 4. Clarify EMRGs role with the Red Cross.

## Making Changes

- 1. RMOC EMRG Relationship
- EMRG is an independent group of volunteer radio operators. EMRG is not part of the RMOC.
- EMRG and the RMOC have a partnership, which includes a signed agreement for EMRG to provide communications for the Region in an emergency.
- EMRG is free to operate in any manner it chooses and to provide assistance to any other groups or organizations that it so chooses.

### 2. Getting Active

- EMRG has communications exercises and the process is in place to ensure they continue with a minimum of 3 per year.
- Repeater VA3EMV is now a portable repeater on 145.490 -.
- Training courses are being planned.
- Local fire departments are interested in joint exercises.
- EMRG is now the Amateur Radio Emergency Service (ARES) group for Ottawa-Carleton.

- 4. Getting Known
- On January 20 1999, EMRG sent an information package to all 11 Municipalities in Ottawa-Carleton. The information package provided information on EMRG and the services we can provide in an emergency.
- The information package was followed up with face to face meetings.
- The response from the Municipalities has been fantastic!

### 5. EMRG & the Ottawa Red Cross

- Signed a Memorandum Of Understanding (MOU) on January 23, 1999. This provides the basis for ongoing work between the two groups.
- Now working on the details of how EMRG can meet the needs of the Red Cross.

These changes have happened and local municipalities and the Red Cross are aware of EMRG and have expressed great interest.

### More Changes

Now that there is a demand, we need to ensure that EMRG has the resources to meet these needs. The next three changes have started, but still have a lot of work to do. The three remaining changes are:

- 1. Stimulate greater participation from the existing membership.
- 2. Promote EMRG to the amateur community to get new members.
- 3. Demonstrate a committed working team to local municipalities through joint exercises.

EMRG needs you as a member!

3.

# **RECENT ACTIVITIES**

#### Gloucester Comms Room

The Gloucester fire department has made available their training room at the fire station on the corner of Blair and Innes, as an emergency radio communications room for EMRG. The room comes complete with 3 operator positions, maps and white boards as well as lots of table space. While the main intent is to serve the City of Gloucester, the City is willing to make it available for EMRG to use in any emergency anywhere in Ottawa-Carleton.

The initial installation is a VHF 4 bay antenna mounted to the side of the tower at roof level, with a Kenwood tri-band (144, 220 & 440) radio. The plan is to install a second antenna, which would be a tri-band for the Kenwood radio and connect a commercial VHF radio with amateur and commercial frequencies to the existing antenna.

This site provides a key element that EMRG was missing, which is space to operate net control and planning during an emergency. The Emergency Operations Centre (EOC) at Regional headquarters does not have much space and is a very busy place. The EOC at the Region will remain a key site, but the purpose of the radio link is to get information into and out of the EOC. Long term goals for Gloucester include adding a computer for packet & APRS.

#### 911 Backup

The Region and local municipalities have developed a 911 backup plan and EMRG is a key component. The plan would be used in the event that phone service for 911 failed. If that happened, announcements would be made directing people to flag down designated vehicles to report any problems. EMRG would place radio operators at the 911 centre and at the local dispatch centres across Ottawa-Carleton. If a problem was reported to the Dispatcher, the EMRG operator would relay the message to 911.

#### Hospitals

The local hospitals are a key component of emergency planning and EMRG is now a recognized resource. Operator positions have been designated at the Civic, General and Queensway Carleton hospitals (Working on the Montfort). Operation from these locations would require a mix of external antennas and coax or portable repeaters.

#### Local Municipalities

The response from local Municipalities has been excellent. Through a concerted effort by EMRG, with help from the Regions Emergency Measures Unit (EMU), EMRG has now made solid contact with all the municipalities in Ottawa-Carleton, with the exception of Cumberland and Osgoode, who have their own radio groups.

Some of the items that have developed, include local fire departments submitting budget requests for an amateur radio and antenna, to be permanently installed at their main fire station, testing radio operations from the Ottawa Fire Department dispatch centre at Alta Vista and inclusion in emergency plans.

#### Are you prepared for an emergency?

Batteries charged? Emergency pack up to date? Maps, license and radio manual Paper & Pens/pencils Medication

# **EMRG** – The Future

As the EMRG team leader for the past 4 years, I have learned a lot about leadership and emergency planning. For the past year, EMRG has become almost a full time job for me and I cannot keep up that pace. This year, we need greater involvement of EMRG members and I need to delegate more responsibilities to distribute the load.

There are many activities that must take place this year, if the Emergency Measures Radio Group is to be recognized as a serious solution for emergency radio communications.

Many activities have been started, they just need to be continued. For example, the EMRG call out structure was examined and it was decided to use a zone based model. Each zone covers an area with about 10 amateurs. There is a zone leader, responsible to keep up their zones portion of the call out list and to make sure they regularly test any permanent radio equipment in their zone.

On March 5, there was a communications exercise to test radio operation from the local fire stations that have permanent amateur radio capabilities. More tests need to be done this year for 911, from the hospitals, within each Municipality, with the Red Cross and between multiple agencies.

Training is an important component of EMRG, because we claim to provide trained volunteers. There is a small group working on the initial operations courses, but more help is required. People are needed to help write and teach specific modules of training and there is always help required to coordinate the course times, places and participants.

Communications across an area as large as Ottawa-Carleton takes more than some hand held radios and a few repeaters. What if repeaters aren't working (that does happen here). What if the objective is to send information about 10,000 people who have been evacuated from their homes.

Amateur radio has much more than VHF/UHF communications to offer. We need to look at these other communications methods and integrate them into our "tool kit" of solutions. For example, many of the sites that could require emergency communications do not have any way to install an external antenna. The solution for these buildings may be a cross band repeater located just outside the building.

Packet radio is an excellent means of sending data using a computer. For emergency use, think of packet as the wireless "last mile" link. Hang onto that old computer and TNC they can still be used. APRS has a large group of users in Ottawa-Carleton, but how can it be used in an emergency. There are people who have trackers that could be used to locate key officials on the move, but who has them, who knows how to use them. There is an ATV repeater in Ottawa, but not many people use it. This is an option to provide information from an emergency scene, but to the Emergency Operations Centre.

In order to be a useful solution, equipment must be understood and tested by EMRG members and resources must be readily available.

This can be a great year for EMRG and amateur radio. We need you to make it happen!

Peter (VE3BQP)

# Volunteer Radio Operation

#### SECONDARY COMMUNICATIONS

The main purpose of volunteer radio groups, is to establish a secondary communications infrastructure during an emergency. The secondary communications infrastructure would provide communications to:

- Relieve primary agencies from message traffic which is not of a critical nature.
- Provide communications for agencies, field workers or local citizen patrols, who do not have radio communications.
- Link agencies which operate on different networks such as Social Services, Hospitals & Red Cross.
- Link sites which do not normally require communications, such as emergency shelters.
- Assist in the event that primary communications systems are degraded or disabled by the emergency or disaster

#### **IMPORTANT THINGS TO KNOW**

Family safety and security comes first. Make sure your own family is safe and secure before you leave.

Under Federal regulations, the contents of messages handled by amateur radio are not to be divulged to unauthorized persons and such public service communications are provided without compensation of any kind.

All EMRG members shall comply with all applicable laws, rules and regulations in the performance of the communication services.

#### YOU ARE A VOLUNTEER

Emergency radio groups are formed on their own and volunteer their time and equipment to the local municipality to provide radio communications in an emergency. The radio group is not an auxiliary unit of the Municipality, available to be deployed on a moments notice to provide any service requested.

Each radio group is responsible to operate as a functional unit and to manage itself. Local Municipalities usually know little about amateur radio and have little time, so they are not interested in managing the radio group.

#### **INSURANCE**

Emergency radio communications volunteers, must ensure that they and their equipment are covered by their personal insurance. During an officially declared state of emergency, volunteers are eligible for workers compensation.

## Y2K

The year 2000 "bug" turned out to be a minimal problem, but a lot of great things happened in the preparation. EMRG operated from the Regional EOC on New Years eve as part of the Y2K operation.

Special thanks to the members who operated the net and checked in, as well as local clubs (OVMRC, OARC, PARC & CPC) who made their repeaters available to EMRG in the event that they were needed as part of the Y2K response.

# Mike Reviews The Ski Marathon

You all have your own lists of what to pack for an emergency, (don't you?) so there should be nothing much new here. I thought I would take a look at the pack list from the point of a single exercise. The results are as follows:

What I brought:	Why:
Scanner and antenna	To hear the other agencies we were working with. Gives my boss a chance to think about problems before they are formally reported.
Cell phone with external antenna	It works much better in the hills than hand held phones (works better when every second cell site is down, too)
Mobile 2m rig	For the obvious reason
Hand held 2m rig	See above
Antenna(s)	5/8 mag mount, cell phone mag mount, 1/4 wave mag mount, rubber duck
note pad	Easier to keep track of than loose sheets, especially when I'm on the move
Extra loudspeaker	Sometimes a speaker for "them" and 'phones for you is way to do audio.
Pencils markers and pens	(pens don't work outside at those temperatures)
sleeping bag	You never know where you will be or how long the 'event' will really last
Extra clothes	See above
Granola bars	All this stuff normally lives in my parka anyway. It provides the
Compass	basics to get me out of trouble in the event of a transportation problem, or similar personal emergency. The idea is to avoid
Candles, matches, lighter	becoming part of the problem we are trying to solve.
Plastic bags, small to extra XXL	
DC extension cord and splitter	There are always more DC toys to be plugged in than there are outlets.
Lighter socket with alligator clips	Used directly on battery, as sockets often shut off with ignition key
Extra mobile rig	(loaned it out to someone else during the event)
Extra DC splitter	(loaned it out to someone else during the event)
Spare fuses	(If you don't know why, you need to do more exercises.)

#### What I brought but didn't use:

Extra 12v and AA batteries	Some of the alkalines got loaned out. Always a good idea to have
	spares.

#### What I wish I brought but didn't:

Cord	To tie up antennas, tidy cables
Chewing gum	Mouth gets dry after all that time on the air. Sometimes I just wanted some.
Extra note pad	We had enough traffic in two days to use more than my usual single notepad.
Automotive Blade type fuses	Flashing roof light blew the fuse for the socket everything was plugged into. *
Duct tape	The usual reasons
Another 20ft of Coax	Extra antenna height can't be used if there isn't enough coax to reach back to the rig.

\*Fortunately, we already had a socket connected directly to the battery, so the fuse problem didn't put us off the air.

Something that has been added to the pack list for "indoor" types of events as a result of setting up a HF/VHF station this past weekend, has been a length of **foam pipe insulation** to wedge in a window or door to seal the gap left when cables are run through.

MK (VE3FFK)

## Ottawa-Carleton

Not everyone is clear on what makes up the area we know as Ottawa-Carleton. Today, there are two levels of Municipal government; local and Regional. Ottawa-Carleton is an area made up of 11 local Municipalities plus the Region.

- 1. City of Cumberland
- 2. City of Gloucester
- 3. Village of Rockcliffe
- 4. City of Vanier
- 5. City of Ottawa
- 6. City of Nepean
- 7. City of Kanata
- 8. Osgoode Township
- 9. Rideau Township
- 10. Goulbourn Township
- 11. West Carleton Township

The Region provides common services across all of Ottawa-Carleton, while the local Municipalities provide services within their Municipality.

Local Municipalities have the authority and responsibility for emergency planning and response within their community (fires, shelters etc). The Region has the authority and responsibility for emergency planning and response related to Regional services (i.e. Police, ambulance, water) and to support local Municipalities when requested.

Restructuring will bring all 12 municipal units (11 local + the Region) together into one new City of Ottawa, effective January 1, 2001.

# FIELD DAY 2000

A large, multi-club Field Day is shaping up for the Capital Region this June 24 and 25. It's expected to be the largest ever in the area and it has the potential to be the largest ever anywhere in Field Day history, based on the possible number of transmitters and participants.

More than 100 participants are expected with stations operating from 160 metres through 2.5 GHz on all modes as VA3RAC. The minimum target is Class 12A but considerably more transmitters are expected to be in operation.

The objectives for Field Day 2000 are:

- to have all Amateur Radio clubs and organizations in the area participate;
- to be a joint effort by as many Radio Amateurs as possible;
- to operate a minimum of 12A and probably many more transmitters;
- to provide publicity and raise the public profile of Amateur Radio.
- above all, for everyone to have fun!

Field Day 2000 is not a single-club or Ottawa-only event but rather an undertaking with the cooperation and assistance of any and all Amateur Radio clubs and Amateurs around the Capital Region in Ontario and Québec.

Many volunteers will be needed as station managers and operators along with radios, antennas and equipment to make Field Day 2000 a truly memorable, record-setting, and non-partisan event.

Clubs or individuals wishing more information or wishing to become involved are invited to contact Field Day Coordinator Glenn McLeod, VE3GLN, at home at 613-746-3776 (between 6 p.m. and 9 p.m. please). Check out the field day web site: <u>http://hamradio.unplug.org/</u>. **Field Day 2000 will happen. Will you be a part of it?** 

### EMRG & Field Day 2000

EMRG is a participant in Field Day 2000, providing presentations, explanations and demonstrations of amateur radio as a volunteer emergency communications resource within the community. Stop by to see some innovative solutions used to provide communications in an emergency.

## Local Flea Markets

#### OVMRC

DATE:	Saturday May 6, 2000
PLACE:	Stittsville Arena
CONTACT:	John J. Barnhardt
	Ve3zov@rac.ca
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#### OARC

DATE:	
PLACE	

Saturday Sept 2, 2000 Carp Fair Grounds

Thank you for taking the time to read this newsletter. If you have questions or want more information, please contact EMRG team leader, Peter Gamble at 523-3434 (ve3bqp@rac.ca).

Future meetings will be held in other locations within Ottawa-Carleton, so if you cannot make it to this meeting, the next meeting may be in you neighborhood. Up coming meetings will be posted on the web site, announced on local nets or you can give me a phone call to find out when the next meeting will be.

73 Peter Gamble – VE3BQP