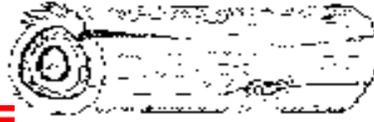




FOUNDED 1947

# WEST PARK RADIOPS



# LOG



Web: <http://www.westparkradiops.org>  
Email: [w8vm-<at>-arrrl.net](mailto:w8vm-<at>-arrrl.net)

Dec. 2010 – Jan. 2011  
VOL. XLVI - No. 1

**Our Nets 28.450/147.36 Mondays 9 p.m. local**

## 2010 CLUB OFFICERS

President	
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## COMMITTEES

FIELD EVENTS  
W8IDM, W8PN

PUBLIC SERVICE

WAS & VUCC CHECKERS  
K8ME, N8CX

ARRL VE'S  
AF8C, N8CX, K8TTL

ARTICLES THIS TIME  
AB8HY

ANTENNAS  
W8PN, W8IDM

CLUB AWARDS  
W8IDM

CONTESTS, SATELLITES  
W8IDM

DX  
N8WS

8TH AREA BUREAU LETTER MGRS.  
N8WS (T) & (W), AF8C (V)

EDITOR, WEBMASTER  
AF8C

LABELS & ROSTERS  
N8CX

## WEST PARK EVENTS \*

\* Subject to Change

### Dec. 3 - FIRST FRIDAY BUSINESS/ FIXIT NIGHT

Bring your questions or answers to the radio problems of the day/week/month.

### Dec. 17 - ANNUAL CHRISTMAS CHEER NIGHT

Be of good cheer, bring your edible season goodies, watch your calories grow. The program tonight is seeing if you can hold back from sampling every type of cookie and chip that is brought for our party.

### Jan. 7 - FIRST FRIDAY BUSINESS/ FIXIT NIGHT

Bring your questions or answers to the radio problems of the day/week/month.

### Jan. 21 - METAL DETECTORS - FINDING "TREASURE" \*

We will have a presentation on metal detectors. Find nails, coins, meteorites, old bullets, someone's wedding ring; who knows? We will have a presentation on metal detectors. Everyone's treasure is as they (can't) see it to be, until it's found..

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## CONTESTS AND EVENTS

- de WA7BNM & ARRL

Dec 3-5	ARRL 160M CONTEST
Dec 11-12	ARRL 10M CONTEST
Dec 18-19	STEW PERRY CHALLENGE
Dec 20	RUN FOR THE BACON QRP
Jan 1	STRAIGHT KEY NIGHT
Jan 2	ARRL KIDS DAY
Jan 8-9	ARRL RTTY ROUNDUP
Jan 15-16	NA QSO PARTY SSB
Jan 22-24	ARRL VHF SWEEPSTAKES
Jan 29-30	CQ 160M CW

## SOAPBOX

We are now moving into the depths of winter but 2010 seems different somehow. With Cycle 24 it's been tougher to hear in contests and DX. Some new DX-peditions will be showing up in spite of all.

Our new net formats have been quite productive. Try out our 9 p.m. Monday nets.

This document was created using Open Office 3.2.1, and a PDF creator. Usage of Microsoft products was limited to as little as possible.

## Prez Sezs...

Well, it has certainly been a good last two years as president and I appreciate the opportunity to serve the club as president. It has been fun, and with all the contributions and new ideas put forth by club members, this has kept West Park from being stagnant. This can be seen by the increase in new membership to the club just in the last few months partly due to the 2 meter nets that we started a couple months ago. Simple ideas like this can make a big difference in the vitality of the club.

Last meeting we held nominations for club officers. I want to congratulate the following club nominees :

Al Moriarty N8CX, President  
 Don Pearson W8IDM, Vice President  
 Kevin Brandstetter K8VUS, Treasurer  
 Glenn Williams AF8C, Secretary  
 Egon Fordos AB8HY , Trustee

Please give these officers your support and lets continue coming up with other ideas on how to improve our club.

Happy Holidays.  
 73 de, Egon AB8HY  
 President 2009-2010

## WEST PARK PUBLIC SERVICE...

The next LCAC food delivery will occur on December 18. On November 20, Al N8CX, Ken W8KH, Kevin K8VUS, and Glenn AF8C helped with the LCAC organization's delivery of 300 set of food delivery bags. The West Park team delivered on several streets in Lakewood, Ohio.

In 2011 we already have an invitation to support the North Olmsted Scouts during their All Scouts Weekend on the first Saturday in June. Come on summer!

## RECENT NETS & TALK...

For the Club's nets, 28450 kHz +/- and 147.36+, lots of discussions have been summarized in our almost weekly net reports. Of late we have been picking up some attention during our second and fourth Mondays 2m net.

As a result of our net activity we have new members Mark NB8I, Mark KD8OLG, and a few others are planning to join us.

Our recent forays into 2m net activity were proposed by Bill, N8WS. The splitting of our net into alternate weeks of 10m and 2m activity is providing a way for the new amateurs to get into HF activity as well.

## NEWS FROM THE ARRL ...

"Weavers Words", November 1, de Jim Weaver, K8JE, ARRL Great Lakes Division Director.

Here are a few results of the recent Great Lakes Division Survey [edited to fit this space]:

One item that came through 599 or 59, depending on your choice of modes, is that respondents to the survey want ARRL to place its primary effort on representing Amateur Radio at the government level. I do not interpret this to indicate this is the only job you want the League to do, but that making certain we amateurs continue to have frequencies to use, are able to install antennas and remain capable of operating is your first priority. Seventy four percent of the 262 who took the survey said this was their top need for ARRL. Promoting EmComm (9.2%) and promoting Amateur Radio to the public (6.9%) came in second and third. "Other" comments (3.4%) included reducing the emphasis on EmComm and the preference for combining two or more of the options I had presented.

Answers to Question No. 2 (your favorite ham activity) were split primarily three ways with Emergency/Public Service communications coming in first (27.4%). DX-ing second (22.1%) and Building/Experimenting third (21.4%). Ragchewing came in fourth (15.5%).

Question No. 3 asked about the frequency with which you experience QRM from contests or DX pile-ups in your on-air activities. I sometimes receive rather strong comments to this effect. Answers indicated that QRM does not interfere with your operations (56.5%) and that interference occurs only occasionally (36.3%). The remaining survey-takers (6.9%) said they experience interference no more than one day every two-four weeks or at least one day a week. This would seem to say that interference from contests and DX pile-ups is not a significant problem.

The answers to Question No. 4 (the number of contests ARRL sponsors annually) were fairly well spread over the 6, 9, 14 and 27 given as possible answers. The answer is 14, excluding Field Day and the Simulated Emergency Test. This means that League-sponsored contests are relatively few. Considering that some ARRL contests occur only on 160m, 10m or higher frequencies, the likelihood of frequent interference from ARRL-sponsored contests to non-contest operation is rather low.

To view all results of the survey, go to < [www.arrl-greatlakes.org](http://www.arrl-greatlakes.org) >. Click on the Surveys/Feedback link at the left of the page and then on View Results near the middle of the next page that opens. Thanks to everyone who took the time and thought to complete the survey. I will have further comments on the survey results in coming newsletters. Expect another survey soon.

## AMSAT HAS A SATELLITE FOR YOU ...

(News from AMSAT)

A Minotaur-4 launch from the Kodiak Launch Complex in Alaska, managed by Alaska Aerospace Corp. on November 19 lifted seven satellites into a 400 mile high circular orbit.

Four of the satellites will be of interested to amateur radio operators:

- FASTRAC (science and amateur radio mission)
- \* RAX - Radio Aurora eXplorer (science and amateur radio mission)
- \* NanoSail-D
- \* O/OREOS

### FASTRAC

< [http://fastrac.ae.utexas.edu/for\\_radio\\_operators/overview.php](http://fastrac.ae.utexas.edu/for_radio_operators/overview.php) >

The FASTRAC mission consists of two satellites built by students at UT-Austin. This mission is divided into two basic phases, both phases relying heavily on the participation of the amateur radio community.

The first phase is for the two satellites to share GPS data during relative AOS. The GPS data will be processed on board each satellite and then stored in flash memory to calculate an on-orbit relative navigation solution. Also, the satellites will be performing attitude determination with the GPS receiver. FASTRAC 1 will be firing a micro-discharge plasma thruster during certain periods and the data will be relayed to the ground. Participating amateur radio stations can help in collecting this data for the FASTRAC web site.

The second phase of the mission begins use by the amateur radio community. The the satellites are use Kantronics KPC9612-Plus TNCs, and will go on the APRS network.

FASTRAC 1 "Sara Lily"; FASTRAC 2 "Emma"

Downlink 437.345 MHz FM 145.825 MHz FM Beacon 437.345 MHz\* 145.825 MHz\*

Uplink (1200 Baud) 145.980 MHz FM 435.025 MHz FM  
Uplink (9600 Baud) 145.825 MHz FM 437.345 MHz FM \*  
AX.25 1200 AFSK beacon data format

RAX (Radio Aurora eXplorer) <http://rax.engin.umich.edu/>  
Status:

RAX is a space weather science spacecraft carrying a 9600 baud UHF transceiver that will transmit telemetry in the amateur satellite bands. This mission also consists of a primary scientific experiment with future reconfiguration for amateur radio experimentation.

In the science phase the satellite will use a a radar receiver capable of 1 MHz I/Q sampling of select bandwidths between 400-500 MHz, including the amateur satellite bands.

The primary objective of the mission is to use the onboard radar receiver in conjunction with a powerful radar station in Alaska to study the formation of a plasma anomaly known for causing the scintillation of radio signals in the UHF and higher bands. This scintillation effect is known to inhibit our

space radar tracking capabilities and ground-space communications.

The RAX team is looking for amateur ground stations to help acquire RAX's 437.505 MHz beacon during the next few weeks of early launch and continue to help collect telemetry throughout the mission. The RAX team will invite the AMSAT community to submitting proposals on how to use the radar receiver for amateur radio experiments. The call for proposals which will be posted in the next few months.

### NanoSail-D

[http://www.nasa.gov/mission\\_pages/smallsats/nanosaild.html](http://www.nasa.gov/mission_pages/smallsats/nanosaild.html)

NanoSail-D is a test of solar sail mechanism technology. The solar sail will operate predominantly as a drag sail, causing the craft to de-orbit in less than 100 days as a test of small satellite de-orbiting techniques. The amateur radio beacon will transmit a one-half second data signal every 5 seconds on 437.270 MHz.

### O/OREOS

[http://www.nasa.gov/mission\\_pages/smallsats/oreos/main/index.html](http://www.nasa.gov/mission_pages/smallsats/oreos/main/index.html) Status: Beacon

O/OREOS is a biological test spacecraft developed by a team at NASA Ames Research Center, as a triple cube spacecraft planned performing two tests during its 1-year mission. The first test is how microorganisms survive and adapt to the stresses of space; the other will monitor the stability of organic molecules in space. O/OREOS includes an amateur radio beacon operating on 437.305 MHz. This satellite also includes a novel de-orbit mechanism design by a Santa Clara University graduate student.

AX.25 437.305 MHz O/OREOS Beacon decoding information:

<http://beacon.engr.scu.edu/BeaconProcessingSystem/OOREOS/BeaconDecoding.pdf> If you are able to capture the beacon telemetry, please take the time to file a report at <http://beacon.engr.scu.edu/Submission.aspx> which is an interface to the Beacon Data Processing System.

## DAYTON BUS MAY 2011...

Dwaine, K8ME, is arranging on behalf of CARS a Saturday bus to the Dayton Hamvention, for \$40.00 per person. Contact Dwaine at 440-582-3462.



## LATVIANS STILL USE 158 YEAR OLD TELEGRAPH SYSTEM...

(from the Web)

Latvia Post is still using the telegraph to send telegrams in Latvia. And the Latvian Railway continues to use them to post speed limits.

This month, Latvia celebrates the 158th anniversary the electric telegraph in their country. The telegraph service is operated by the national company Latvijas Pasts (Latvia Post).

Karina Jankovska, manager of production development at Latvia Post, said that around 200 telegrams continue to be sent every month in Latvia. There are around 140 telegraphic messages being sent to foreign countries and around 300 international telegrams are being received in Latvia, per month. Telegrams cost just 0.80 Latvian lats (1.15 euros) for a domestic message. The postmen have telegram forms.

Latvians of course want to stay in touch with their friends or relatives abroad. Most of the telegrams go to Russia, Belarus and Ukraine. The telegraph also allows communication of official documents, such as visa declarations. Latvia Post says that the majority of the messages are sent by older Latvians who do not use e-mails nor mobile phones, and by those who prefer it for nostalgic reasons.

"For example, one can easily send a wedding invitation," Jankovska added. "The sender simply has to write the text and pay extra seven cents for each written word. I think that most of the people use telegrams nowadays because it is interesting."

The first public electromagnetic telegraph line in the territory of Latvia was opened on November 1, 1852. The line connected the capital city of Riga with Bolderaja, a nearby residential town. It was the longest civilian telegraph line in the Northern Europe at the time. But the first telegram was sent in German.

The telegraph technology has changed greatly during the years. Latvia Post doesn't employ real telegraph equipment these days. All the telegrams are now being sent by computer over the Internet using a special email system between the post offices. The message is printed out with a printer and then delivered to the addressee by the postman the following day.

Meanwhile, the telegraphic messages are being used in the business as well. The telegraph remains a bit of an anachronism in modern-day Riga. The Latvian

Railway still uses teletype to communicate between the stations, freight senders and the ports. For instance, the company uses the old-fashioned technology in situations when any speed limitations have to be imposed on the railway network.

"We don't have yet [a] so-called e-signature," said Antra Birzule, a Latvian Railway spokesperson. By contrast, Latvia's northern neighbor, Estonia, has had digital signatures and publicly-provided encrypted email for almost a decade.

"Those documents sent by teletype are documented as an official document. If it's just an e-mail it doesn't work yet in Latvia at such a high level because in the railway, the key issue is safety. So, we still rely on the teletype."

The telegraph had a key role in Latvia's fight for restoration of its independence back in January 1991. The Soviet political and military forces tried to overthrow the Latvian authorities by occupying important governmental buildings. "When the telephone lines were shut down by the KGB, the so called Telex Central was still operating," said Levs Datelis, a Latvian telecommunications engineer and expert on Latvian telegraph history. "The Soviet secret police didn't pay much attention to it and the Latvian politicians used it for communication. It also enabled them to communicate with foreign countries."

However, in spite of all that history, Karina Jankovska of Latvia Post says that though the telegram service doesn't lose money, the company plans on shutting down the service by 2015.

## MORSE CODE KEY...

9120 WW-II RAF BROWN "BATHTUB KEY"  
< <http://chss.montclair.edu/~pererat/m9200.htm> >



## BACKUP YOUR LOTW CERTIFICATE NOW...

In November I received feedback at two different clubs, including West Park Radiops, saying that the ARRL Logbook of the World is too hard to use, or that one's certificate has expired or etc.

So this week I needed to upload to LOTW some recent contest files and it seemed like a good time to find out more about the ARRL certificate process. Actually, pretty quickly I learned that I really needed to check out the certificate renewal process because my own certificate had expired in mid-October. So there was the business about requesting a renewal certificate in TQSL-CERT, and then emailing that to the LOTW logs site for renewal. (LOTW recognizes the different file extension and converts the data to a new certificate after about 20-30 minutes, and does not treat the request file as a log file. There is also a form on the web site for sending a new request via the Web instead of email.)

So I sent the LOTW administrators an email requesting information on what I suspected was the underlying method the ARRL uses to make LOTW certificates. The ARRL, according to the return email, sends the requesting amateur operator a certificate that is a processed certificate received by request to a Certificate Authority (CA), although the ARRL did not disclose which CA they use.

To quote Wikipedia:

*"A CA issues digital certificates that contain a public key and the identity of the owner. The matching private key is not similarly made available publicly, but kept secret by the end user who generated the key pair. The certificate is also a confirmation or validation by the CA that the public key contained in the certificate belongs to the person, organization, server or other entity noted in the certificate. A CA's obligation in such schemes is to verify an applicant's credentials, so that users and relying parties can trust the information in the CA's certificates. CAs use a variety of standards and tests to do so. In essence, the Certificate Authority is responsible for saying "yes, this person is who they say they are, and we, the CA, verify that".*

There are at least 36 CA's and as I said, the ARRL did not disclose which one they use. But my point was confirmed: in order to make the LOTW QSO confirmation process squeaky clean, LOTW uses certificates that cannot be forged. By use of the mailed postcard, the ARRL is confirming that the registered USPS (or foreign) snail mail address is the ONLY

place that can receive the first password that is used to register your LOTW certificate and QTH of operation.

So because of the CA process, you the user of LOTW must endure the process in order to be registered with a certificate.

By now, I should also have said that the certificate contains some encrypted information that no one can "crack" with any known computer, at least right now in 2010. I don't have room here and \$10.00 says you don't have the math skills to understand why the certificate is uncrackable (bet limited to 2010 West Park Radiops members!).

Users of LOTW already know the next part: registering the certificate, and all that. One big rule is get some kind of logbook, "little black book," or other means and record your passwords. You will need passwords for registering the certificate, creating log submission files (.tq8), for being able to log into the ARRL's LOTW database site so you can view your DXCC and WAS status, and finally, for one more thing to be discussed next.

Apparently you can make all the passwords the same, or different. That's up to you. But don't just save your passwords on your hard drive!!! I confess to always being confused, myself, during certificate processing on my computer, about which password is which, during certain operations. That's the ARRL way and I too just live with it.

### BACKUP, BACKUP, BACKUP

Here it is, that last reason for a password! Using TQSL-CERT, "SAVE" a backup copy of your certificate (a .tq12 file) and then transfer that copy to some kind of off-the computer media, such as floppy disk, thumbdrive, or CD or DVD record. You could even email it to yourself and leave the email on your Internet Service Provider's site.

It's easy to forget to make the backup and the ARRL's Web pages don't say much about it. But someday when you buy a new computer or replace your dead hard drive and reload LOTW, guess what won't work!! If you just use a backup of your LOTW folder from your previous hard drive, the LOTW certificates will be as "busted" as a miscopied QSO log and you will have to START ALL OVER in getting another new certificate from the ARRL, with postcard and all! But if you have the good .tq12 file, go get it then and you can restore your good certificate.

Happy QSO processing. – de AF8C

# WEST PARK RADIOPS

# LOG

PUBLISHED BI-MONTHLY BY WEST PARK RADIOPS AMATEUR RADIO CLUB, INC. ----  
A NON-PROFIT SCIENTIFIC AND EDUCATIONAL CORPORATION, FAIRVIEW PARK, OHIO.  
MEETINGS: WEST PARK RADIOPS ARC meets the FIRST and THIRD Friday evenings each month at  
Ascension Lutheran Church, 28081 Lorain Road, North Olmsted, OH (across from North Olmsted Park) at 8 PM sharp.  
Dues \$12/yr. We welcome anyone interested in amateur radio to our meetings.  
We operate Monday night nets on 28450 kHz and 147.36 MHz Mondays at 9:00 p.m. local time.

<http://www.westparkradiops.org>  
<mailto:w8vm@arrl.net>

# W8VM

