

This OVARC email newsletter is sponsored by the Oro Valley Amateur Radio Club  
<http://www.tucsonhamradio.com>

household member is defined as someone who resides at the same address as the regular member.



See <http://tucsonhamradio.com> for details and paypal links.

---

**MONTHLY CLUB MEETING LOCATION**  
**Ascension Lutheran Church**  
**1220 W Magee Rd**  
**Tucson, AZ 85704 (east of LaCanada on Magee)**  
*Third Friday of each month at 7:00 pm*

---

**2015 BOARD MEMBERS :**  
**Bob Molczan, KA7VPR -- President**  
**Ron Herring, W7HD -- Vice President**  
**Scott Boone, K7ADX -- Treasurer**  
**Howard Chorost, KC7AC -- Secretary**

**Board Members:**  
**Dave Coccio, N7AKC**  
**Gary Schmitz, KT7AZ**  
**Steve Wood, W1SR**  
**Carl Foster, KB7AZ**  
**Bob Stephens, AF9W**

-----  
How to email your officers:  
[president@tucsonhamradio.org](mailto:president@tucsonhamradio.org)  
[vicepresident@tucsonhamradio.org](mailto:vicepresident@tucsonhamradio.org)  
[treasurer@tucsonhamradio.org](mailto:treasurer@tucsonhamradio.org)  
[secretary@tucsonhamradio.org](mailto:secretary@tucsonhamradio.org)  
-----

**DUES INCREASE FOR 2015**  
On January 1, 2015 the membership rates went up to \$25 for regular members and we are adding a discounted rate of \$15 for members who are in the same household as a paid regular member. A

---

**Sunday Night Net**  
19:00 MST  
OVARC Repeater



System  
Join the group every Sunday night at 19:00 MST (7:00PM) on the OVARC repeater system for the Sunday Night Net. We also have our Radio Tradio on this net where you can list ham radio items for sale. Everyone is welcome on the net regardless of club affiliation.



We are always looking for Net Control Stations so if you would like your hand at being NCS, contact Lanny, KF7LV our Net Manager.  
[ [Net\\_Manager@tucsonhamradio.com](mailto:Net_Manager@tucsonhamradio.com) ]

---

**Wednesday Night NBEMS Net**

Every Wednesday from 7:00 PM to 8:00 PM the Oro Valley Amateur Radio Club (OVARC) repeater network is used for a weekly net on the topic of narrow band emergency message system (NBEMS.)  
Across the country NBEMS is becoming a standard means for communicating during disasters and is endorsed by the Pima County Office of Emergency Communications (PCOEMCOMM.) NBEMS uses both voice and digital modes to send messages in formats that follow the Incident Command System (ICS) developed by the Federal Emergency Management Agency (FEMA.) and other served agencies.

Do you need to have digital support on your radio to join the net? Absolutely not! Message passing using voice is part of the NBEMS system. People in the field who are providing status information often do not have digital setups and may in fact

not even be amateur radio operators! They may be using FRS or GMRS radios or cell phones to pass their messages.

However, when available, we do use fldigi and its associated programs to send messages. Fldigi provides intrinsic support for ICS forms and can send messages with built-in error correction. If you add digital support to your radio we will help you with setup. You can also use just the mic and speaker on the rig for an audio connection to your PC mic and speaker.

Resources

[www.w1hkj.com/Fldigi.html](http://www.w1hkj.com/Fldigi.html) - Download fldigi here  
<https://groups.yahoo.com/neo/groups/azNBEMS/files> - Information on interfaces and installation, also at <http://w7hd.homelinux.net/nbems>

**MAY MEETING SUMMARY**  
**International Global HF Beacons**

Presented via Skype by Charlie Mason – W4NJK



- Are the HF bands dead?
- Which bands might be usable at my location?
- How do rare DX stations use the beacons?
- How can we determine the optimal bands in about 3 minutes?

Charlie discussed the International Global HF Beacons network- its origins, features and how you can use it from anywhere (with either an HF receiver or only an internet connection). Once you learn this, you can try several Beacon Monitoring programs or smart phone apps and be equipped to try that next "quest" for DX, higher scores in any contest or portable HF operations. He also discussed some true happenings at beacon stations from high winds, theft and tropical ants.

**About Charlie Mason – W4NJK**



Former calls: K4BFA, W6NHG, W3HSZ, FP8BE, G5DGR, 8P9EW  
 Portable in -P4, PJ4,J3, PJ2, FO;  
 NORCAL QRP, HI-QRP; NORTHERN CALIFORNIA CONTEST CLUB (NCCC), NCDXF BEACONS Advisory Committee; entrepreneur and management consultant, wireless, spectrum strategy, license bidding, new services; rollout in 17 countries; BOD VC joint ventures; Tri-Sentinel founder; jointly hold 4 patents; First Responder tracking/location; Naval Aviator - Air medal

-----  
**Handyman Corner — Tom, W8TK**

Tom talked about the necessity of planning as the key to success at Field Day. Tom announced Field Day signups. Gary, KT7AZ — Repeater update. Gary took a survey of who in the Membership uses the Golder Ranch UHF Analog repeater. Not a single person raised their hand. Gary gave a short presentation about restored Echolink service along with W5ZIT and KC7AC.

Dave, N7AKC — Field Day Dinner and Ticket sales for dinner.

OVARC Hamfest 2015 – reminder Date is November 7, 2015 Marana Middle School.

KA7VPR Polled the membership about antennas as a Special Raffle Prize. By a show of hands the vast majority of members present were in favor of a transceiver prize and not an antenna prize.

KA7VPR announced the next Special Raffle Prize – ICOM IC-718 HF Rig.



Special Raffle Drawing for Alinco DX-SR8T — Prize won by K7ADX.



**OVARC LINKED REPEATER SYSTEM**

The Oro Valley Amateur Radio Club currently has five wide area repeaters. All of our repeaters are normally linked via VOIP over internet connections, with the exception of the Dstar repeater (the newest of the five).

All of our repeaters are open to ANY licensed ham. We invite you to use these repeaters as often as you like. If you can monitor the repeater system for a few hours each week to respond to calls, it would be very much appreciated.

**2 Meters**

**146.620(-) PL 156.7 - Callsign WØHF**

Located on Keystone Peak  
 (Map: <http://g.co/maps/5tdjg>)

Antenna Height: 40+ Feet  
 Elevation: at nearly 7,000 feet  
 Power Output: 100 Watts  
 Antenna: Decibel DB-224  
 Feedline: 7/8" Hard Line  
 Repeater: Kenwood TKR-720

#### 147.320(+) PL 156.7 - Callsign WØHF

Located on the Oro Valley Police substation tower on Oracle Rd at Magee Ave, Tucson, Arizona

Antenna Height: 57 Feet  
 Elevation: 2584 Feet  
 Power Output: 40 Watts  
 Antenna: Tram 1491  
 Feedline: LMR-600  
 Repeater: Kenwood TKR-720

### 70cm

#### 444.100(+) PL 156.7 - Callsign WØHF (MOVED to OVPD Main at Tangerine and LaCanada)

WIDE Northwest coverage and additional Tucson Coverage (including Sahuarita)

Antenna Height: Feet (adi) Power  
 Output: 50 Watts  
 Antenna: JetStream JTB3  
 Feedline: LMR-400  
 Repeater: Kenwood TKR-820

#### 440.400(+) PL 156.7 - Callsign WØHF

Located on the Golder Ranch Fire District tower on Golder Ranch Road in Catalina, Arizona.

Antenna Height: 67 Feet  
 Elevation: 3081 Feet  
 Power Output: 50 Watts  
 Antenna: Diamond X-30  
 Feedline: Andrews 1/2" Hard Line  
 Repeater: Kenwood TKR-820

### Dstar

#### 445.800(-) DSTAR WØHF

Located at Magee and Oracle with the 147.32 repeater

Antenna Height: 50 feet  
 Elevation: 2584 feet  
 Power Output: 20 watts  
 Repeater: Icom V4000

Controller: Icom RP-2

Computer: Dell Dimension running CentOS 5.10 Linux and Icom RP-2 Gateway software

445.1375 (-) DSTAR KG7PJV

Located at Howard's KC7AC in a drawer at his QTH with a 4-bay dipole in his attic.

DSTAR KG7RWN coming soon on the east side. There is a proposal to locate it at AK2L's home off Ina Road west of I-10.

### Public Service Opportunites

There are many opportunities to provide public service in Southern Arizona. Specific requests for help will be communicated via email. If you would like to volunteer for any of these events contact [public\\_service@tucsonhamradio.com](mailto:public_service@tucsonhamradio.com)

## ARRL ACTIVITIES (excerpted from ARRL Newsletter May 2015)

### ARRL Arizona Section

Section Manager: Rev Robert J Spencer, KE8DM  
[ke8dm@arrl.org](mailto:ke8dm@arrl.org)

Full color copy of the newsletter with pictures and hamfest flyers can be found at  
<http://www.arrl.org/Groups/view/arizona>

HAMCON 2015--also the 2015 ARRL Southwestern Division Convention is September 11-13, 2015, at the Torrance Marriott South Bay Hotel , 3635 Fashion Way, Torrance, CA 90503

### ARIZONA NETS:

-Arizona Traffic And Emergency Net (ATEN) meets in the winter from October 15 to April 15 at 5:30 PM and in the summer from April 15 to October 15 at 7:00PM on 3986 kHz daily. Tommy Ivan KF7GC Net Manager, Arizona Section Traffic Manager  
[kf7gc@arrl.net](mailto:kf7gc@arrl.net) [www.atenaz.net](http://www.atenaz.net) -

Saguaro National Traffic System (NTS) Net ([www.saguaronts.net](http://www.saguaronts.net)), meets daily at 6:30 PM MST (0130Z) on the Eastern Arizona Amateur Radio Society (E.A.A.R.S.) (<http://www.eaars.org/>) repeaters. We are always looking for people to take messages and deliver them via telephone to hams and non-hams. The net is open to all ham operators regardless of license level and there's no membership

requirement associated with this net. Traffic is not required to check into the net. Training is conducted as needed or when someone asks. This is GREAT way to get involved with Emergency Communications (EMCOM) and learn how it's done prior to an actual emergency. The repeaters are; 146.86 and (440.700 Hub) Heliograph Peak; 147.28 Guthrie Peak - Greenlee County; 145.21 Jacks Peak, New Mexico. Between Lordsburg & Silver City; 145.41 Pinal Peak Near Globe, AZ; 147.16 Mt Lemmon Near Tucson; 146.70 Greens Peak Near Springerville - Showlow; 145.27 South Mtn. Near Alpine, AZ; 147.08 Mule Mtn. Near Bisbee in Cochise County. All E.A.A.R.S. network repeaters operate with PL tone 141.3. For more information about this net, contact Greg Peters (kc5zgg@arrl.net), Net Co-Manager. - There are many more nets in Arizona. Contact Tommy Ivan KF7GC for the full list.

#### VE TESTING TIMES AND LOCATIONS:

Tucson Area. Lighthouse YMCA/ARRL: First Thursday Contact Matt, AC7IL, [veregistration@ac7il.org](mailto:veregistration@ac7il.org)

Oro Valley/ARRL: First Saturday Contact [licensing@tucsonhamradio.org](mailto:licensing@tucsonhamradio.org)

RST/ Laurel (No Fee): Second Monday Contact Diane, AA3OF, [dzimmerman2002@gmail.com](mailto:dzimmerman2002@gmail.com)

Jacobs Park YMCA/ARRL: Third Saturday Contact Fred, K7OFA, [k7ofa@arrl.net](mailto:k7ofa@arrl.net)

Graham / Greenlee County Area For VE testing on request, please contact Dave, N7AM, and he will arrange it.

Technician License Class - Tucson Every Tuesday, 6:30 - 9:00pm at TMC. Contact Dan, KC7VDA for info. [kc7vda@gmail.com](mailto:kc7vda@gmail.com)

#### HAM RADIO EVENTS -

[highdesertranch@powerc.net](mailto:highdesertranch@powerc.net) - 6 June 2015 -- Kachina / White Mountain Hamfest Location: Show Low City Hall Facilities 180 North 9th Street Show Low, AZ 85901 Website: <http://www.kachina-arc.org/> Sponsor: Kachina Amateur Radio Club Type: ARRL Hamfest Talk-In: 145.310 (PL 110.9) Public Contact: KK Miyagawa , KB9SI PO Box 632 Lakeside, AZ 85929 Phone: 480-586-6303/480-586-6303 Email: [kb9si@yahoo.com](mailto:kb9si@yahoo.com) -

July 24 -25 2014 -- Williams Hamfest, Williams AZ.

Williams Rodeo Grounds, Hosted by the Amateur Radio Council of Arizona Williams Rodeo Grounds, Rodeo Road, Williams, AZ Hamfest Hours: Dawn to Dusk Friday and Saturday Grand Canyon Train Trip on Sunday, 26 July Gates Open at 12 Noon on Thursday, 23 July for set up contact [www.arca-az.org](http://www.arca-az.org) or call 602-881-2722 -

September 11-13, 2015 HAMCON 2015--also the 2015 ARRL Southwestern Division Convention is at the Torrance Marriott South Bay Hotel , 3635 Fashion Way, Torrance, CA 90503 - Oct 10 1600Z to Oct 11 0600Z and Oct 11 1400Z to Oct 11 2359Z the 2015 Arizona QSO Party, sponsored by the ARRL Arizona Section and Catalina Radio Club. Phone, CW and Digital modes on 160/80/40/20/15/10/6/2 meters. Single-Op, Multi-Op, Arizona Multi-Multi, Arizona County Expedition and Mobile categories. If any Arizona clubs are interested in hosting the Special Event Station, please contact [ke7dx@marketemporium.com](mailto:ke7dx@marketemporium.com). -

17 October 2015 CopaFest Maricopa Amateur Radio Association, Harrah's Complex, located on Ak-Chin land, Ultra Star Multi Tainment Center 16000 Maricopa Road, Maricopa AZ 85139 -October 23 2015 - October 24 2015 Arizona State Convention Location: Mohave County Fairgrounds 2600 Fairgrounds Blvd. Kingman, AZ 86401 Website: <http://k7mpr.net> Sponsor: Mohave Amateur Radio Club Talk-In: 147.240 (PL 123.0) Public Contact: William Smith , KD7MIA 1530 Ellerman Drive Kingman, AZ 86401 Phone: 928-529-2299/928-529-2299 Email: [bill1021@gmail.com](mailto:bill1021@gmail.com) -

November 7 2015 - Cochise Swapfest & CW Communications Exercise Event Time: 0700-1200 Event City: Sierra Vista Event State: AZ Event Sponsor(s): Cochise Amateur Radio Association Event Facility: Green Acres Event Facility Address: 2756 South Moson Road Special Features of Event: Flea market Tailgating VE sessions Exams being given: ARRL Sponsored Exams Talk-In Freq: 146.76- 162.2 Advance admission fee: Free At-door admission fee: Free Table fee: \$5 for Tailgating, \$10 for Indoor Table Event Web URL: <http://www.k7rdg.org> Public contact name: Lee Ilse Public contact call sign: KD7OED Public contact address: PO Box 1855 Sierra Vista, AZ 85636 Public contact phone: (520) 236-1237 Public contact fax: Public contact email: [kd7oed@arrl.net](mailto:kd7oed@arrl.net) -

7 November 2015 - Oro Valley Amateur Radio Club hamfest in Marana, AZ -

14 November - 2015 HARKFEST Tailgate Hamfest Hosted by the Hassayampa Amateur Radio Klub North Ranch Escapees RV Park, 30625 S Highway 89, Congress, AZ. Hours are 8:00 AM until 12:00 Noon. Free Admission - Free Tailgate Space (pre-registration required) Overnight Camping with Full Hook-Up or Dry (pre-registration required at [www.escapees.com/parking/congress](http://www.escapees.com/parking/congress)) Free VE Testing at 9:00 AM - Prizes - Arts & Crafts Show - Lunch Available beginning at 10:30 AM. Talk-In 146.62 (PI 162.2) or 146.580 (simplex) -

5 December 2015 - Superstition SuperFest 2015 Hosted by Superstition Amateur Radio Club, 1833 W. Southern Avenue, Mesa AZ. 85202. VE Testing at 9:00 AM. ARRL DXCC Card Checking, Fox Hunt, Special Event Station, Gota Station. <http://www.superstitionsuperfest.org> for more information -

17 -23 January 2016 Quartzfest, Quartzsite Arizona ARRL Specialty Convention [www.quartzfest.org](http://www.quartzfest.org) -

19 -20 February 2016 Southwest Division Convention and Yuma Hamfest, 2520 E. 32nd Street, Yuma AZ. 85365 You can email the Director of the Yuma Amateur Radio Hamfest Organization (YARHO), Roger Hunt (K7MEX). Snail mail YARHO P.O. Box 1843 Yuma, AZ 85366-1843 <http://www.yumahamfest.org>

---

## RUNNING MULTIPLE COPIES OF FLDIGI

I was getting frustrated with having to change all of the configuration parameters in FLDigi when I wasn't running NBEMS or SGARN. Finally found the instructions on how to run multiple copies. Way too simple, hi hi. Make a copy of the icon for FLDigi on your desktop. Rename it to something like FLDIG NORMAL. Then edit the properties for the icon by right-clicking on the shortcut and selecting Properties. Add the following to the target:

```
--config-dir C:\FLDIGI\
```

or wherever you wish it to be. When you next invoke that icon, it will create the directory you specify – nice touch... Then, you can configure this version however you wish it to operate. Save your new configuration and macros before exiting FLDigi. If you need yet another version (I have three of them), just give the icon a different name, and specify a different directory.

This has a side-benefit of allowing you to run multiple versions of FLDigi itself. At least now, you can have the configuration you need for the task at hand.

---

## NBEMS NET Wednesday nights and SGARN traffic bulletins

These programs require downloading and installing FLDIGI and FLMSG, if you don't already have them. There are versions for MAC, Windows, Puppy Linux, and Linux. Note that fldigi and flmsg are also available through the package manager in Linux.

You can also download them for free here:

<http://w1hkj.com>

If you want to set up FLDIGI for the NBEMS net at 7:00 pm on Wednesdays, check this URL:

<http://w7hd.net/nbems>

Both MAC and Windows setups are provided at this link.

If you want to set up FLDIGI for the SGARN traffic, check this URL:

<http://w7hd.net/sgarn>

This link will also show the schedule for the SGARN traffic bulletins when it becomes active.

**NBEMS - Narrow Band Emergency Message Software**

**SGARN - Second Generation Amateur Radio Network**

-----

From Tom W8TK:

Handyman's creed: "If the women don't find you handsome, they should at least find you handy!"

---

## ***Printing Your Amateur License***

**Please remember, this comes from the FCC.....**

PLEASE NOTE: Per Public Notice DA 15-72, The FCC no longer mails license authorizations. If you provide an email address on your application, an official copy of your license will be automatically emailed to you after the application has granted.

Licensees can also opt to download electronic authorizations by logging into License Manager:

Log in to

<https://wireless2.fcc.gov/UlsEntry/licManager/login.jsp> with your FCC Registration Number (FRN) and Password (Ed. Note..... This is essential. You have to have these two items BEFORE you begin)

If you do not know the password:

- ☐ Click on the Contact Tech Support link
- ☐ Click the Reset Password button and follow the prompts for resetting the password
- ☐ After receiving confirmation of a successful password reset, click the link for Universal Licensing System (DO NOT click the CORES Public Interface link).

Click the button labeled ULS License Manager; you will be taken to the log in screen

Click the "Download Electronic Authorizations" link on the navigation bar on the left side of the License Manager home page.

1. To search for the authorization(s) you want to download:
    - a. Enter the call sign OR
    - b. Enter a date range (based on Effective Date of the license)
  2. In the My Authorization box, select the call signs you wish to download
  3. Add the call signs to the Authorizations to Download box.
  4. Once the licenses have been selected, click the Download button in the lower right-hand corner of the screen.
  5. The download will be automatically converted to a PDF file, and you can choose to Open (to print) or Save (to save to a desired folder).
- Downloading Authorizations Using MAC Operating Systems: The FCC recommends using the Chrome or Firefox browsers for MAC when downloading authorizations using the MAC OS.
- Should you have any further questions or need additional information, please submit a request for help at <http://esupport.fcc.gov/index.htm>, or call the FCC Licensing Support Center at 1-877-480-3201, selecting option 2 after the main menu recording.

Sincerely,  
FCC Licensing Support Center

---

**Don't forget Field Day 2015 weekend of June 27-28 at the EOC off Tangerine Road across the field west from Walmart in the shopping center.**

### **FIELD DAY MEAL**

It looks like a very tasty menu on tap for the Field Day Saturday evening dinner at \$20 per person. Here is the planned lineup:

Famous Dave's will be the caterer.

\*St. Louis-Style Ribs (3)

\*Country-Roasted Chicken (1/4)

\*Texas Beef Brisket with Bun (4oz)

\*Corn Bread Muffin (1)

\*Wilbur Beans

\*Garlic Red-Skinned Mashed Potatoe

---

**How do you like the new 2-column format?**

**An email to :**

**[newsletter@tucsonhamradio.org](mailto:newsletter@tucsonhamradio.org) will get your vote to me.**

---

**I would also appreciate any articles you would like to submit. It doesn't have to be about some exotic topic! Was it a struggle getting your first license? Share it as an article... Done something interesting and fun lately, share it! How hard was it to put up that new antenna? Did some people come over to help? Share it....**

---

## OPERATING FROM THE CAMPGROUND

Lately I've been operating a lot from the fifth-wheel at the campground in New Mexico. The ham shack is set up inside a shelf unit with doors in the bunk bed area in the rear of the fifth-wheel. A pair of 12vdc muffin fans suck air in at the middle and push it out at the top. The antenna is a simple 18-foot vertical attached to the back of the fifth-wheel on a painters pole mounted into a pair of conduit hangers screwed onto the back of the camper. Using a 9:1 unun made by my son Sean AF7LP, I have been able to tune it on 80-6M. A pair of radials about 20-30 feet long spread out from the back of the trailer seem to provide adequate ground plane. At least I get out very nicely with 5 watts from my Elecraft KX3 using PSK31!

When operating SSB I up the power to 10 watts... I also frequently run Propnet on 30M (10.140 Mhz) when not on the air otherwise.

There is also a Kenwood TS2000 for my satellite work, which is occasionally used for HF work, as well.

Everything is run off 12vdc, so I have about 48 hours worth of operating time with no AC power available. I do have a Honda 2kw generator for emergency power plus a 4500 watt generator in the back of the pickup, as well, so would have power as long as I have gas.

A Dell laptop, a Powerwerx 30A power supply, and a marine battery with a Powergate PG-40S complete the station. I do also have a small Samsung M2020 laser printer that does wireless printing. Hard to beat it for about \$55 on Amazon. You can see pictures of the setup at:

<http://w7hd.homelinux.net/hamshack/mobileshack.htm>

This particular area has very low ambient noise, since it is a ranching area nestled in a valley between two mountain ranges about 8 miles east of Portal, AZ and 5 miles north of Rodeo, NM. It also has outstanding astronomy viewing due to the lack of pollution. The view at night is breathtaking. There are several astronomers set up at the campground with scopes mounted just outside their year-round Rvs.

Being retired affords me the opportunity to go camping many times per year, so we get lots of use out of the fifth-wheel. When we're on the move, I have the Yaesu FT-857D in the Toyota Tundra truck connected to an Outbacker Perth Plus, which does an outstanding job.

It's a hard life, but someone has to do it :-)

Ron W7HD

---

## **LINUX IN YOUR LIFE**

Having been a Linux admin since 1995, I've accumulated a number of tips and tricks. We'll be presenting those here starting with this issue.

One question that comes up frequently is how to have a certain program run when you log in. In most versions of Linux, you can either have it start when the operating system loads, or when the user logs in.

To have it load when the operating system loads, put

it at the end of the /etc/profile file. For example, I need for my USB serial port to be accessible by users when Linux starts so that I can run FLdigi to control my Elecraft KX3. So I put this line in /etc/profile:

```
chmod go+rw /dev/ttyUSB0
```

which makes it executable by anyone. Then I use ttyUSB0 from the drop-down list in FLdigi configuration.

You can find out which port is used like this:

```
dmesg | grep USB
```

and you will see a line similar to this:

```
usb2-1: FTDI USB Serial Device Converter
now attached to ttyUSB0
```

One firm rule: do NOT allow root to login remotely. This opens your system up to all sorts of nasty things if someone guesses your root password. You did make it hard to guess, didn't you? I use one based on a phrase that is easy to remember and uses just the first letter of each word. For example, the phrase is: "There are 7 ways to understand Linux and keep it safe." So the password would be

**Ta7wtuLakis**

---

Enjoy, and be safe out there!

---

## HEAR YE! HEAR YE! FD2015

The granddaddy of all field-based exercises/contests is ARRL Field Day. Every fourth full weekend in June, radio amateurs and clubs pack their vehicles full of radios and antennas, cables and poles, coolers and grills, and leave their ham shacks and creature comforts behind. They head to an open field to, as the ARRL Field Day rules

state "work as many stations as possible on any amateur band (excluding 60, 30, 17 and 12 meter bands) and in doing so to learn to operate in abnormal situations in less than optimal conditions. A premium is placed on developing skills to meet the challenges of public service communications preparedness as well as to acquaint the general public with the capabilities of Amateur Radio." Entry classes emphasize the purposes of Field Day. Classes are delineated by such aspects as battery operation, portable, mobile, home, or even EOC locations, transmitter output power limitations, the kinds of conditions an operator or group might experience in a real incident or public service event. Bonus points are awarded for factors such as using 100% emergency power, alternate power sources, sending radiogram-formatted messages, using a satellite for contacts, and site visitation by a public safety agency, a Red Cross official, and/or government official. Field Day is one of the oldest and most traditional of the ARRL operating events. Hams have debated whether or not it is an actual contest, a simulated emergency test, or a social event--the point is that Field Day gets hams out of their shacks and into the field to set up effective antennas and stations, and then to efficiently compete, all the while honing their skills in less than optimal conditions. OVARC will participate as a class 3F station, which means we will have 3 transmitters operating simultaneously, and the "F" means we will be operating from an Emergency Operations Center. Our location is at the Oro Valley Police substation (air conditioned!) in the Oro Valley Marketplace, just west of WalMart. We will set up antennas in the empty lot between WalMart and the EOC beginning at 0700 MST on Friday, June 26. We can use all the hands we can muster and you need bring only work gloves. Coffee and donuts will be provided and the work should take less than 2 hours. Field Day operations begin at 1100 MST on Saturday, June 27, and run for 24 hours. In addition to our 3 stations, we will have a GOTA (Get On The Air) station with an experienced coach to guide new or inexperienced hams. Instructions for signing up for operator and coach/assistant slots are on the club website: [www.tucsonhamradio.org](http://www.tucsonhamradio.org) Stay tuned for further details.

## Preparing for Field Day

OVARC will participate in ARRL Field Day on June 27-28. We will begin setting up on Friday, June 26, at the Oro Valley Police substation Emergency Operations Center located in the OV Marketplace just west of WalMart. We will set up antennas in the vacant lot adjacent to the EOC beginning at 0700 in an attempt to beat the heat.

Coffee and donuts will be provided and work should be finished in less than 2 hours. The more hands we have to help, the less time setup will take. All equipment and tools will be on site and you need bring only a pair of work gloves to protect your hands.

### What else can you do to prepare for Field Day?

As far as equipment is concerned, radios, accessories, and networked computers will be furnished. Each station will have a contest-capable radio, WinKey keyer with Begali paddle, headset with boom microphone, foot switch for PTT, Signalink for digital modes, and external audio amplifier with 4 sets of headphones for spectators. If you feel, as I do, that using somebody else's headphones or code key/keyer/paddle is like using a stranger's toothbrush, bring your own. Radios will accept 1/4 inch phone plugs on headphones and adapters will be available. Keyer paddles should be 1/8 inch phone plug and software can accommodate whichever way your paddle is wired. Antennas will include a triband beam with triplexer which enables simultaneous operation on 3 bands, and inverted Vee fan dipoles for 80/75 and 40 meters with apex at 45 ft.

### What about preparing yourself for FD?

First of all, read the rules:

[http://www.arrl.org/files/file/Field-Day/2015/2015\\_Rules.pdf](http://www.arrl.org/files/file/Field-Day/2015/2015_Rules.pdf)

There's lots of good information in the rules, and after you read them you will understand the rationale for most of what we do at FD. The FD exchange is very simple, only your class and ARRL section is required. But the bonus points available are numerous, and we try to earn as many as possible. Why is our score important? There's an old dictum or management: If you can't measure it, you can't manage it. Our score gives us a goal for constant improvement from year to year and allows us to compare our preparedness to other groups across the country.

You should familiarize yourself with the ARRL sections and their abbreviations. You can find a list at <http://www.arrl.org/section-abbreviations> In addition, each operating position will have the printed list.

We use an excellent logging program called N1MM Logger Plus. You can download a copy (it's FREE) and play with it at home. It works with any contest, and you will find it invaluable if you try contesting. There is an

excellent video on using Logger at FD:

<http://n1mm.hamdocs.com/tiki-index.php?page=Video+->

+Operating+N1MM+Logger+on+Field+Day#Video\_Operating\_N1MM\_Logger\_on\_Field\_Day

If that lengthy link doesn't work for you, google N1MM+ Logger at FD and you will find it. Video runs only 14 minutes and will prepare you to operate FD.

You should schedule yourself in an operating slot. We schedule operating times in advance for two reasons. First, if you are scheduled, you can be sure the station will be yours for that time. Second, we will be able to fill empty slots in advance so we won't have stations going unused during the contest.

The OVARC website ([www.tucsonhamradio.org](http://www.tucsonhamradio.org)) has a link to Signup Genius which will allow you to sign up for one hour slots as operator or assistant. We ask that you sign up for not more than 2 consecutive slots until everyone who wants to operate has a shot at getting on the schedule. If you have a general class license or better and some HF experience, you are welcome to sign up as coach for the GOTA (Get On The Air) station. Coaches will receive a 2015 FD commemorative coffee mug and get to wear the official COACH vest and whistle.

If you are a new ham or lack experience on HF bands, sign up for a slot or two as operator of the GOTA station. We will keep it staffed with a coach for all 24 hours even if I have to do it myself.

Why do we choose to operate 3 stations simultaneously?

It is unlikely that more than 3 HF bands will be open at any time during FD. One station will be on either 40 or 10 meters, one station on 80 or 15 meters, and one station only on 20 meters. This makes it unlikely that your operating slot will find you with a dead band.

The operator of each station becomes "captain of the ship" which means he decides on which band and mode the station operates. Keep in mind that CW and digital QSOs are worth twice as many points as phone contacts. If you wish to operate digital modes (PSK and RTTY are most popular during FD), be familiar with N1MM+ and its digital mode engine fldigi. Fldigi is another FREE software program, so you can download and play with it before FD. It interfaces seamlessly with N1MM Logger and makes it possible to make QSOs with just a couple mouse clicks.

If you are not experienced in digital modes but wish to

see them in action, you should be able to observe a few operators with the knowhow to demonstrate.

One aspect of FD which is unique to OVARC is the Saturday evening dinner. This year will feature barbecue from Famous Dave's and seating for 60 will be available at 4:30 PM. Tickets for the dinner will be available from N7AKC at the club meeting in May and every Saturday morning at the OVARC breakfast. This is a great opportunity to get together with fellow club members in a social setting.

If you have any questions or suggestions, don't hesitate to contact me.

Email: [tkravec@pobox.com](mailto:tkravec@pobox.com)

Phone: (520) 572-0554

73,

Tom Kravec, W8TK  
OVARC Field Day Chairman

---

## eQSL - The Final Courtesy

by Dave Morris, N5UP, Founder and Webmaster,  
eQSL.cc February 5, 2001

The world's first and only eQSL exchange centre, [www.eQSL.cc](http://www.eQSL.cc), started the year 2001 with a bang. Only a few weeks earlier, on the first of December, it had blown through the 1 million card mark, and now 2 million cards were in the central database. But instead of slowing down, the rate increased as thousands of eQSL cards were uploaded every hour.

The eQSL.cc site was launched in April of 2000, and included about 1500 hams who had been part of an earlier experiment in an electronic QSL card exchange. The "big" idea was that eQSLs should not be sent around from person to person via e-mail, but should be available at any time through a web-based exchange system and a central database.

Other concepts using e-mail or by posting one stock QSL card on a web page and calling it an eQSL were not satisfactory, because security could not be guaranteed, e-mail addresses had to be looked up, and the sender had to laboriously design his QSL card using graphic design software.

So, we used our 25 years of software development and database design experience to develop a site where each user could guarantee his identity with a scanned image

of his ham license, could lay out an eQSL card design using simple point-and-click forms, and could upload logbooks either one-at-a-time, or by uploading an entire ADIF format log file at once. The concept is such a breakthrough, we have patents pending on its technology.

To retrieve one of these eQSL cards, the recipient only need enter the callsign, date, and band of the QSO he wants to retrieve, and if the other ham has entered that QSO into the system, up pops the complete eQSL card, ready for printing on a local printer. Furthermore, if the recipient registers his callsign with us, he can get a listing of all incoming eQSLs, and can just point and click to print each card received. Sending a reciprocal card back is a matter of clicking a button!

Apparently, most everyone else thinks this is the right way to do it, too. Another six weeks after hitting the 2 million card mark, it appears the number of cards will double again to 4 million.

Many of the members of the eQSL.cc site are using stock images for their eQSL card designs. But since it is possible to upload a graphic image to use on one's card, there are many custom cards online as well. Users are signing up from over 180 countries all over the world. In many places, a stack of 500 traditional QSL cards might well cost the average ham operator and entire year's salary. On eQSL.cc, 500 beautiful full-color cards can be sent for free!

In an era when "dot coms" are failing left and right, it is noteworthy that the eQSL.cc site, which is supported almost entirely through voluntary donations, has been operating in the black since Day One. Since the site runs virtually without any human intervention, the only ongoing expenses are for development of new features, and for continually increasing disk space, processor power, and bandwidth. A small amount goes to answering the questions and suggestions that come into the webmaster's office by e-mail. In most cases, replies are returned within the same day.

Not everyone agrees that eQSLing is the way to go. Some people like to get their hands on that stiff cardboard with the exotic stamps that spent months in transit from the jungles of some island that is only above water for 3 weeks out of the year. Others are bothered that some amateur organizations still have "no electronic transmission" clauses in the rule books for their awards. Others still are spooked by the privacy issues that this interconnected new world brings up.

But it's very difficult to argue - as the saying goes - with success. And 4 million cards is success by anyone's

measure. At the present growth rate (with the number of eQSLs doubling every month), eQSL.cc could be home to virtually all of the world's amateur radio operators within a couple of years. Contest "big guns" will be able to "QSL 100%" within a matter of minutes, saving hundreds of hours of time and thousands of dollars in the process. DXpeditions will be able to "QSL 100%" on the spot, whether it be from that desert island with a dial-up Internet connection, or when the crew gets back to "civilization". It's just a quick log file upload, and they are done!

And eQSLs, unlike their traditional cardboard counterparts, can be verified through automated computer interfaces by amateur organizations wanting to validate award and contest submissions. The presence of a scanned license image on file for each user goes way beyond the simplistic checking that is possible using the older traditional QSL cards.

And now eQSL.cc is also a favorite site for SWLs, because users can identify themselves as either licensed amateur operator, or SWL. The eQSL cards between SWLs and hams are automatically configured to contain proper SWL phrasing, making their lives easier and saving them tons of money.

Complex systems shouldn't be designed in a vacuum, so we have assembled a capable group of hams and SWLs into an Advisory Board. Among these advisors are users with satellite and DX experience, contesting backgrounds, and international origins, as well as technology gurus and people with long-term operating histories. This group discusses current issues and future development plans for the site on a daily basis. Just another feature of the interconnected world we have entered as the 21st Century dawns.

There were nay-sayers when SSB first began to push CW aside. There were those who thought packet radio was just a short-lived fad. Others thought we shouldn't be wasting money on amateur satellites. And some people think eQSLs are "not natural". But for tens of thousands of hams and SWLs who upload their entire logbooks nightly in an effort to live up to the "100% QSL" promise of amateur radio, the final courtesy of a QSO is an eQSL.

*Permission granted to reprint this article in whole or in part. Please send an e-mail to [Support1@eqsl.cc](mailto:Support1@eqsl.cc) to notify us if you do so.*

---

Don't forget to visit my website for lots of useful information:

<http://w7hd.homelinux.net>

-AND-

<http://w7hd.net>

and the club websites for club information:

<http://tucsonhamradio.org>

-AND-

<http://tucsonhamradio.com/hamfest>

===== END NEWSLETTER =====

Enjoy,

Ron Herring W7HD