LOS ANGELES AMATEUR RADIO CLUB 40/S9

MARCH 2016

www.losangelesarc.org

Monthly Meeting

The Los Angeles Amateur Radio Club will meet March 6, 2016. Club meetings are held at the Audrey & Sydney Irmas Youth Activity Center located at 11911 Vermont Ave., in Los Angeles Ca. 90044. This is on 120th and Vermont across from the Ralphs Market parking lot.

Club Net

The LAARC holds a radio net on 144.430 FM simplex at 8 PM pacific time every Saturday nite.

Tip of the Month

If it's quiet on the bands it's because you are not talking. Calling (CQCQCQ, this is "your call") usually gets the conversation started.

Club Officers

L.A.A.R.C. Officers

Stan Thornton	W6SMT	President
Doug Long	N6PZK	Vice-President
Jess Craig	W6CKC	Secretary
Laverne Carter	KJ6OSV	Secretary
Archie Buchanan	KD6OLH	Treasurer
Peter V. Swearingen	KJ6JQA	Sgt at Arms

Health and Welfare

None Reported

Tip of the Month

With a technician license you can talk worldwide using digital modes D-Star, DMR, and Fusion.

Did You Know?

The First African-American Radio Amateur was Rufus Turner, W3LF:

Rufus Turner, W3LF (ex-K6AI) is believed to be the first African-American radio amateur. Born on December 25, 1907, in Houston, Texas, Turner "became fascinated by crystal diodes and published his first article about radio when he was 17. W3LF became the first radio station licensed to an African-American.

(Repeat Article)
Baker to Vegas 2016

David Greenhut N6HD is looking for amateur radio operators for the 2016 Baker to Vegas relay race being held on March 19 and 20th 2016. Amateur radio operators assist with the race every year by providing radio communication throughout the 100 mile run from the city of Baker to Las Vegas. He needs about 5 operators to assist in the last leg of the race. He also mentioned our club sponsoring an entire leg which is a serious commitment and requires 10 to 15 people for the entire weekend. This maybe something to consider in the future as a club. So if you are willing to help out with the race call Barry Fitchew N6VOH so he can get you pointed in the right direction.

(Repeat Article)

How to File a Amateur Radio Complaint with the FCC

Amateur radio complaints should be as specific as possible, citing dates, times, and frequencies on which alleged violations occurred. Complaints should also include a name and telephone number where the complainant can be reached for further details, if necessary. Please submit your complaints/concerns regarding amateur radio to the Commission's on-line complaint system. The appropriate form for your complaint can be found here: https://esupport.fcc.gov/ccmsforms/form2000.action?form_type=2000F

Willful or Malicious Interference Complaints

Section 97.101(d) of the Commission's Rules prohibits amateur operators from willfully or maliciously interfering with or causing interference to any radio communication or signal. 47 C.F.R. § 97.101(d).

The **Spectrum Enforcement Division**, in conjunction with the **Regional and Field Offices**, is responsible for responding to complaints of willful and/or malicious interference (sometimes called ``jamming'') among amateur radio service licensees. Amateur radio service licensees wishing to file complaints alleging willful and/or malicious interference to other amateur radio service operations should follow the complaint process discussed above. Parties desiring further information may call: 1-888-225-5322

Amateur Radio News Briefs

FCC Invites Comments on ARRL Petition that Seeks 80/75 Meter Adjustments:

The FCC has put the ARRL's January Petition for Rule Making (RM 11759) on public notice and invited interested parties to comment on what the League has called "minimal but necessary changes" to 80 and 75 meters. The ARRL petitioned the FCC to fix a "shortfall in available RTTY/data spectrum" that the Commission created when it reapportioned 80 and 75 meters 10 years ago. The League's petition asked the FCC to shift the boundary between the 80 meter RTTY/data sub-band and the 75 meter phone/image sub-band from 3600 kHz to 3650 kHz.

Source: ARRL

FCC Seeks Comments On Petition to Grant Lifetime Amateur Radio Licenses:

The FCC is seeking comments on a Petition for Rule Making (RM 11760) that asks the FCC to grant lifetime Amateur Radio licenses. Mark F. Krotz, N7MK, of Mesa, Arizona, filed his request with the FCC last November. He wants the FCC to revise 97.25 of its rules to indicate that Amateur Radio licenses are granted for the holder's lifetime, instead of for the current 10-year term.

Source: FCC.gov

New Amateur Extra Question Pool Puts Greater Emphasis on Digital, SDRs, Propagation:

The new Amateur Extra class license examination question pool, effective from July 1, 2016, through June 30, 2020, now is available at the National Conference of Volunteer Coordinators (NCVEC http://www.ncvec.org/) website. The latest revision contains a few minor corrections that had been released in a February 5 errata of the initial January 8 release.
Source: ARRL Newsletter

(Repeat Article)
FCC QUESTION POOL REVISED FOR JULY 1, 2016

The FCC question pool for Amateur Radio Extra license exams has been revised and will be effective for exams conducted on or after July 1, 2016. ARRL will produce new study materials in preparation for the new Extra exam.

Source: ARRL News Letter

Practice exams are for those people who would like to study for a new US amateur radio license class. The questions contained within are provided by the

Federal Communications Commission and are selected from the same sub-elements that would be used for an official license examination.

http://www.qrz.com/hamtest/

http://www.eham.net/exams/

http://arrlexamreview.appspot.com

Find and Exam in Your Area:

You can find an Amateur License Exam In your area at ARRL.ORG

http://www.arrl.org/find-an-amateur-radio-license-exam-session/

You can find an Amateur License Exam In your area at ARRL.ORG

http://www.arrl.org/exam_sessions/search

Classes & VEC Testing

None scheduled

Ham Radio License Exam Practice

The ARRL has launched a new online resource that allows users to take randomly generated practice exams using questions from the actual examination question pool. **ARRL Exam Review for Ham Radio**™ is *free*, and users do *not* need to be ARRL members. The only requirement is that users must first set up a site login (this is a different and separate login from your ARRL website user registration).

http://arrlexamreview.appspot.com

Free Amateur Radio Practice Testing is available on the Web

Electronics Refresher

Using a Multimeter/multi-tester: Preliminary setup

Multi-tester (VOM-volt/ohmeter) also called *multimeter* is designed to measure different magnitudes of electrical units: voltage, current and resistance. It incorporates the functions of a voltmeter, ohmmeter, and Milli-ammeter into one device. A multimeter may be *Digital (DVOM/DMM)* or *Analog*.

Parts and functions of multi-tester

1. Zero ohm adjuster- for analog multi-testers this part sets the indicator of the left scale to zero

2. Range Selector switch knob-this is a switch that is calibrated to select the proper range of the meter
3. Amperage terminal -plug in connection for red (positive) test lead for measuring amperes

4   +V.Ω. f terminal (positive)- terminal for positive test probe. It is used for most types of measurements.
5.   -COM terminal (negative, N)- a terminal for the negative test probe
6.   Home plate-Serves as the cover or panel for multi-tester
7.   Indicator pointer- It deflects a certain point and use as a reference of where to read the measurement
8. Output socket- used for measuring special purpose such as high AC voltage, intensity of sounds in decibel, etc
9. Range Scale- it indicates the test function and scale option
10. Display for Digital multi meter (DMM) -it displays the measurement reading. Usually have a four digit display with a +/- indicator.

Safety Tip

Multimeter/multi-tester: Safety precautions

1. Never use meter on the electric circuit that exceeds 3k VA.
2. Pay special attention when measuring the voltage of AC30 volts or DC60V or more to avoid injury.
3. Never apply a input signals exceeding the maximum rating input value.
4. Never use meter for measuring the line connected with equipment that generates induced or surge voltage since it may

exceed the maximum allowable voltage.

5. Never use meter if the meter or test leads are damaged or broken.

6. Never use encase meter.

7. Be sure to use fuse of the specified rating type. never use substitute of the use or never make a short circuit of the fuse.

8. Always keep your fingers behind the finger guards on the probe when making measurements.

9. Be sure to disconnect the test pins from the circuit when changing the function of the range.

10. Before starting measurement, make sure that the function and range are properly set in accordance with the measurement.

11. Never use meter with wet hands or in damp environment.

12. Never open tester case except when replacing batteries or fuses. Do not attempt any alteration of original specifications.

13. Never use test leads other than the specified test leads.

14. To ensure safety and maintain accuracy, calibrate and check the meter at least once a year.

**Source:
http://www.engineermaths.com/2010/12/using-multimetermulti-tester.html**

Radio and Software Tech Talk

The Multi-Mode Digital Voice Modem (MMDVM)
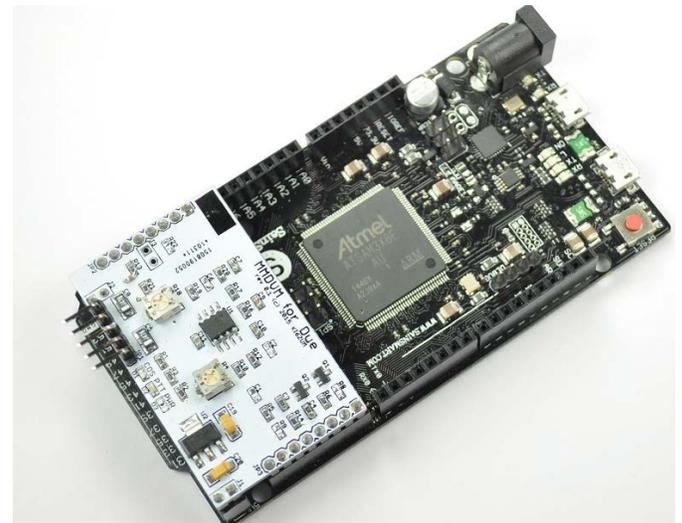
MMDVM attached to Arduino Due

The Multi-Mode Digital Voice Modem is a combined hardware and software development of a modem to handle all amateur digital voice modes. Initially it will support D-Star and DMR, with System Fusion and P.25 coming later, as well as a built-in FM repeater controller. For all modes other than DMR and FM, the modem can be used in simplex or duplex mode, while for DMR and FM full duplex must be used. The protocol between the modem and the host is new.

The hardware will typically be ARM based, with initial developments being aimed at the Arduino Due and Teensy 3.1, the STM32 range is also looking like a suitable chip, with the more advanced Cortex M4 architecture and higher clock speeds. The interfacing hardware will consist of op-amp low pass filters and level shifters.

There are no time scales for the release of hardware or software as all development is done in Jonathan Naylor's (G4KLX) spare time and there is a lot to do. If you have any experience of ARM (or any other decent embedded CPU), you are welcome to take part.

Source:

http://d-star-roundtable.boards.net/thread/90/mmdvm

For Sale or SWAP

For Sale:

This space is reserved for anything amateur related you want to sale, swap trade, buy or get rid of. Send your list to K6FED@yahoo.com. Items are listed for one month. Additional time can be requested by email.