



September 2014

ARCOver

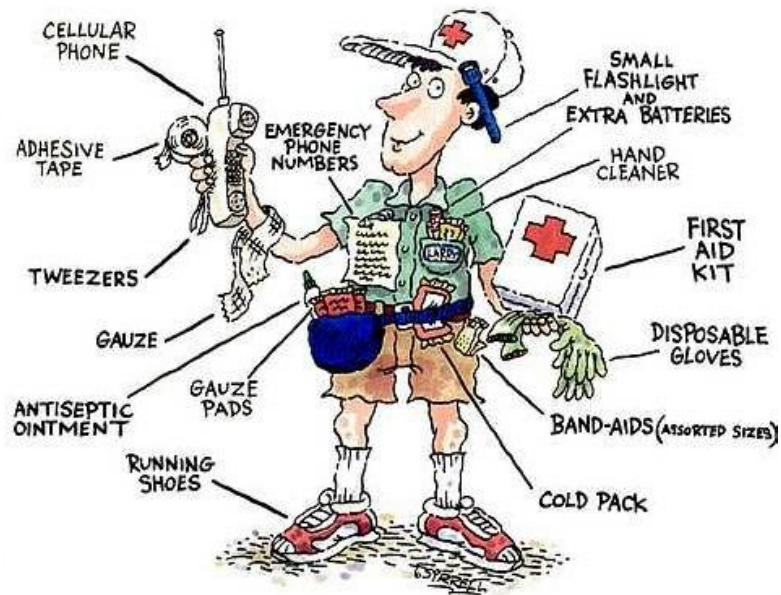
A Community Service Organization Dedicated to Amateur Radio Since 1970

In this issue:

- ◆ President's Message
- ◆ Guest Speaker
- ◆ Quiz Column
- ◆ Q&A: Maidenhead Grid
- ◆ Venerable LUSAT-1
- ◆ J Pole Antennas
- ◆ JOTA
- ◆ From the Secretary

September is..

National Preparedness Month



E-mail: W6SBA@arrl.net



Website: <http://www.w6sba.org>

Hello W6SBA,

SUMMER BBQ:

First off, I want to thank James - K16UPL for organizing and setting up our summer BBQ at DePortola Park. We had a great turnout and lots of delicious burgers and hot dogs to munch down while we socialized. Thank you James and Rob for doing the cooking!!! It was a beautiful clear Saturday, a bit on the hot side, but we had plenty of shade to retreat to, so I thought the event turned out great!

SATELLITE ANTENNA PROJECT:

I also want to thank Tom - K16RC for graciously volunteering his time in helping our hams build their own hand-held satellite antennas. Tom found a good design, researched all the parts that were needed to build it, and then took it one step further by pre-cutting some of the pieces to make it easy on us ... well, amateurs! All in all, we had nine people sign up for this event and I'm anxious to see hear the results! Thank you again Tom for your generosity!!!

NEW YAESU RADIO COMING OUT SOON!!!

Yaesu will be launching a new radio called the FT-991 in the near future. To me, it looks similar to the ICOM IC-7000 series. It does 160-6m plus 2m and 440. HF bands are 100 watts, and VHF/UHF is 50. It also has a built-in auto tuner, and a 3.5" touch screen (something I've never seen on an amateur transceiver), and if that wasn't enough... two roofing filters at 3 and 15khz for screening out those problematic signals that are preventing you from contacting that rare station in the Pacific! The price for the radio hasn't been formally announced, but it's certainly whetting my appetite! The link below has a lot of detailed information about the rig (except the price), check it out!!! <http://grznw.com/yaesu-ft-991/>

JOTA:

Jamboree On The Air (JOTA) is coming up pretty quick - Saturday, October 18th, and we need your help! It scheduled to be held at the Cabrillo Beach Scout Center (same place as last year). We're still in the process of determining whether we want to do traditional RF or whether we want to leverage an Echolink system to facilitate communications. Since the Scout Center is right on the water, direct access to the club repeater is not possible due to challenges with the terrain. If you're interesting in helping out, please contact Joe WB6MYD and let him know.

ANNUAL PROJECT CONTEST COMING UP IN NOVEMBER!

As a reminder, our annual project contest is coming up in November and I can't wait to see all the innovative entries for this year's submissions. You can build antennas, electronic project of some type, or even software. The rule is that it has to pertain to Amateur Radio. Those in attendance will vote on the best entries and the winners for each category will win a \$25 gift card. Our Past President Alan - KG6ZPL will be running the event. If you have any questions, please contact him.

That's all for now. Until next time, this is Alex saying 73!





guest speaker September

Arnie Shatz (N6HC)
on Amsterdam Island DXpedition

Arnie was first licensed as KN3ANU at the age of 13 in Philadelphia, Pennsylvania and quickly upgraded to a General Class ticket. I received an Official Relay Station (ORS) appointment from the ARRL and enjoyed handling CW traffic and participating in CD contests. Amateur radio was put on hold while I attended Temple University and earned a B.S. in Biology and a M.D. degree. Post medical school training followed at the University of California, San Francisco and service in the United States Public Health Service (Department of the Navy- Lieutenant Commander), Indian Health Service on the Navajo and Hopi reservations.


I moved to Southern California in 1976 and started a solo private urology practice. In 1977 I upgraded to Extra Class as N6HC. I retired from full time urology practice in 2001 and continue to work as a part-time locum tenens physician and volunteer at the Orange Free clinic. I am a Fellow of the American College of Surgeons and a long time member of the California and Orange County Medical Associations, a diplomate of the American Board of Urology and a member of the American Urological Association, Western Section of the AUA and the California Urological Association. I was a member of the clinical faculty of Loma Linda University School of Medicine.

I have been an ARRL member for more than 50 years and I am a member of the league's Legacy Circle and Maxim Society. I serve as a Volunteer Examiner and a field QSL card checker for both ARRL and CQ awards. I am a member of the Southern California DX club (Vice-President-2009), Northern California DX Foundation, Southern California Contest Club and Orange County Amateur Radio Club. I am also a member of the Chiltern DX Association (UK) and the Medical Amateur Radio Council, Ltd. (MARCO). I was elected to membership in the A-1 operators club and I have earned many operating awards including WAS (6 bands, SSB, CW, RTTY), DXCC Honor Roll, DXCC (8 bands, SSB, CW, RTTY), WAZ (CW & SSB), WAC, WPX (SSB & CW), and VUCC. I am an active contester and have earned numerous awards for participation in both domestic and DX competitions. I have operated from many places around the continental United States as well as Hawaii, Alaska, Mexico, Samoa and Prince Edward Island. I was named the DXer of the Year (2012) by the Southern California DX Club.

I have operated from many places around the continental United States as well as Hawaii, Alaska, Mexico, Samoa and Prince Edward Island. I was named the DXer of the Year (2012) by the Southern California DX Club.

I have been a team member of nine major DXpeditions: K7C-Kure atoll (2005), 3B7C- St. Brandon Island (2007), TX5C- Clipperton Island (2008), K4M-Midway Island (2009), T31A- Kanton atoll, Central Kiribati (2011), T32C- Christmas Island, Eastern Kiribati (2011), NH8S-Swains Island (2012), T33A-Banaba (2013) and FT5ZM-Amsterdam Island



- 1) How far can a bird fly into the jungle? 
- 2) Before Mount Everest was discovered, what was the highest mountain in the world?
- 3) If the vice-president of the US was killed, who would become president?
- 4) One and only one word in the English language becomes shorter when two letters are added to it. What word is it?

Answers to last month's quiz:

- 1) What English word is invariably pronounced wrong by every radio operator at ARRL? **Wrong**
- 2) Rearrange the letters in "new door" to make one word. **One word**
- 3) An Extra class operator bought nine donuts and ate all but four. How many were left? **Four**

President

Alex Marko - KD6LPA
kd6lpa@socal.rr.com - 310-530-6614

Vice-President

James Murakami - KI6UPL
katsu442@yahoo.com - 310-480-7794

Secretary/Treasurer

Joe Lanphen - WB6MYD
jlanphen@ca.rr.com or w6sba@arrl.net
310-328-0817

CLUB OFFICERS FOR 2014

Activities Council Member

Bruce Jackson - KK6BJ
bjackson@ucla.edu - 310-502-0071

Events Council Member

Ray Grace-WA6OWM
rgrace3@verizon.net - 310-370-1913

Information Council Member

Steve Wojtak - KJ6VWN
swihtaj@juno.com - 310-755-1688

Past President

Alan Parks - KG6ZPL
thermic72@sbcglobal.net - 310-558-8718



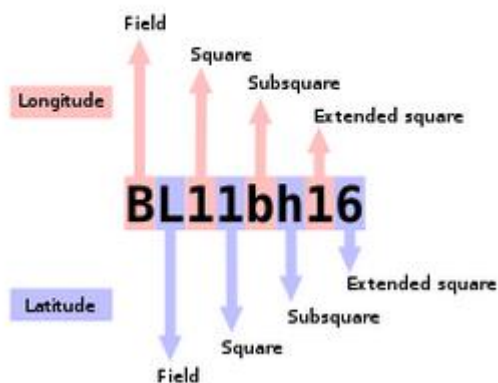
With Alan, KG6ZPL

At the August general meeting, Jerry, JI6JJ and others were asking about the **origin and definition of the Maidenhead Grid Square System**. The Maidenhead Locator System is a geographic coordinate system used by amateur radio operators.

Dr. John Morris, G4ANB, originally devised the system, and a group of VHF managers, meeting in Maidenhead, England in 1980, adopted it. The Maidenhead Locator System replaces the older QRA locator system with one that is usable outside Europe.

The only abbreviation recommended to indicate a Maidenhead reference in Morse code and radio teleprinter transmission was "LOC", as in "LOC KN28LH".

Description of the system



A Maidenhead locator compresses latitude and longitude into a short string of characters. This position information is presented in a limited level of precision to limit the amount of characters needed for its transmission using voice, Morse code, or any other operating mode

The chosen coding uses alternating pairs of letters and digits, like so:

BL11BH16 In each pair, the first character encodes longitude and the second character encodes latitude.[3] These character pairs also have traditional names, and in the case of letters, the range of characters used in each pair does vary.

At the 1999 IARU Conference in Lillehammer it was decided that, to avoid negative numbers in the input data, the latitude is measured from the South Pole to the North Pole, and longitude measured eastward from 180 degrees giving the Prime Meridian a false easting of 180° and the equator a false northing of 90°.

The globe is divided into 18 zones of longitude of 20° each, and 18 zones of latitude 10° each. These zones are encoded with the letters "A" through "R" and are called a field. The world is divided into 324 (18²) Maidenhead fields.

The first pair of numbers placed after the first pair of letters, is encoded using the digits "0" to "9". This is where the alternative name "grid squares" comes from. Each of these squares represents 1° of latitude by 2° of longitude.

For additional precision, each square can optionally be sub-divided further, into sub-squares. These are encoded into a second pair of letters, often (but not always) in lowercase letters from "a" to "x" giving these sub-squares dimensions of 2.5' of latitude by 5' of longitude.

The resulting Maidenhead sub-square locator string is therefore composed of two letters, two digits, and two more letters. To give an example, W1AW in Newington Connecticut is found in grid locator FN31pr. Two points within the same Maidenhead sub-square are always less than 12 km apart, which means a Maidenhead locator gives significant precision from just six easily transmissible characters.

Fields are divided into 100 squares each.

To summarize:

- Character pairs encode longitude first, and then latitude.
- The first pair (a field) uses the letters "A" to "R".
- The second pair (square) uses the digits "0" to "9".
- The third pair (sub-square) uses the letters "A" to "X".

The fourth pair (extended square) uses the digits "0" to "9". On shortwave frequencies, positions are reported at square precision, and on VHF and UHF, sub-square precision is used. More precise position reports are very rarely used. (Thank you Wikipedia) Please send questions and comments to Alan at thermic72@sbcglobal.net.

J Pole Antennas

Submitted by *Steve Wojtak* -
KJ6VWN

Amateur Radio, Land Mobile, Scanner, Low Power FM, and Airband Antennas. Simple antennas with superior performance



222 MHz Amateur Radio Antenna

A good base antenna makes the 222 MHz band much more enjoyable; why suffer with a mobile antenna when you can have a quality made all-copper J-Pole base antenna. The 222 MHz J-Pole antenna will get you on the air with great signal reports. Same basic specs as the other antennas, you should expect low noise, great results, and about 3db of gain. This antenna is a perfect companion for your Jetstream JT220M or Alinco DR-235TMKIII radios.

It's difficult to find a good base antenna for the 222MHz band. Many of the manufacturers have given up on this band, which is a shame. I personally enjoy the 220 band; it's relatively quiet and you don't have every person with a scanner listening in on your conversations.

This antenna is designed and tuned specifically for the 1.25 meter amateur radio band. Many of the hams that have purchased this antenna have put it to use for in situations such as:

- FM voice operations
- Remote base and repeater control
- Data and packet radio network stations
- Mil-Air frequency scanning and monitoring

Benefits

- The 222 MHz J-Pole antenna is a great companion for your Jetstream, Alinco or other brand of 220MHz amateur radios. □ □ Omnidirectional radiation pattern
- Half Wave design doesn't require radials or a ground plane
- 3 dbi of gain and low noise floor enhances weak signal operations
- Solid construction out of 1/2 inch copper tubing

Specifications

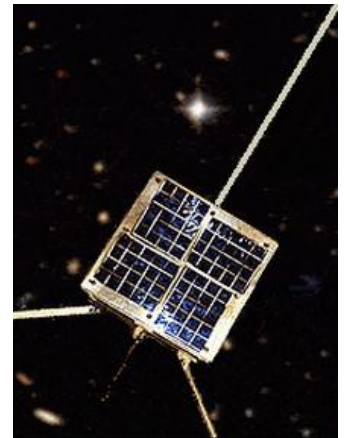
- Approximately 49 inches tall
- Half wave design with 1/4 wave matching stub. No groundplane necessary
- 11 inch mounting section
- Pretuned to 222 MHz with 5+ MHz of bandwidth

I like the idea of no ground plane needed and it comes apart into two pieces so it is compact. In addition, I have a stand made up of PVC pipe that also comes apart. This antenna also works with 144/440 bands also.

Venerable LUSAT-1 (OSCAR 19) Takes to the Dark Side

ARRL.com 8/21/14

Set to celebrate its silver anniversary next year, LUSAT-1 -- which is also known as OSCAR 19 or LO-19 -- appears once again to be functioning, sort of, when not in sunlight. At this point, OSCAR 19 is only transmitting telemetry; its digital transponder has not been reported to be operational.



"We knew that our LUSAT started transmitting again a couple of years ago, but only when illuminated by sunlight and was not heard during the night," Pedro Converso, LU7ABF, reported to the AMSAT-BB. During a recent nighttime pass, though, he was surprised to hear "the usual strong 900 mW continuous carrier on 437.125 MHz," 22 minutes after LO-19 had emerged from Earth's shadow.

"It's almost a miracle that after almost 25 years, LUSAT's vintage Ni-Cd batteries can receive and hold [a] charge," he said.

Launched in 1990 from Kourou, French Guyana, on an Ariane 4 vehicle, the satellite -- Argentina's first -- has completed more than 128,000 orbits, and is one of the oldest active Amateur Radio satellites. The satellite carries a digital store-and-forward packet transponder with uplink frequencies at 145.84, 145.86, 145.88, and 145.90 MHz 1200 bps FM, with AX.25 protocol downlink at 437.125 MHz SSB.



57th Annual

Jamboree on the Air

A Worldwide Scouting Event

October 18-19, 2014

Los Angeles Area Council, BSA

24 Hour Event from 9:00am Saturday - 9:00am Sunday

Cabrillo Youth Center - 3000 Shoshonean Rd., San Pedro, CA



www.arri.org/jamboree-on-the-air-jota

www.scouting.org/JOTA



Join us in this "World Wide" Scouting event where Scouts all around the World will be trying to contact each other via the Amateur (Ham) Radio. We will be contacting Scouts on other continents and in the different time zones.

Radio Merit Badge and Citizenship in the World Merit Badge - MUST Complete Prerequisites

JOTA Participants only - FREE between 10:00am - 4:00pm Saturday
Boy Scouts, Girl Scouts, Adventure Scouts, Cub Scouts, and Brownies

Early Registration Fee: Scouts \$45.00 / Adults \$35 prior to 10/13/14. Must wear Class A uniform.
(Includes; Campground facility, Lunch, Dinner & Breakfast, Tour the USS IOWA, Radio & Cit/World MB,
Movie, Snacks & Drinks, Build electronic Kits-Approx.\$10.00ea). **USS Iowa admission Included!!**
(Oct. 18th only, Must wear Class A's) **USS Iowa admission by itself \$7.00** (Oct. 18th only, Must wear Class A uniforms)

Go online to register for the early bird price Now; Click on the link below:

<http://boyscoutsla.doubleknot.com/event/2014-jamboree-on-the-air-jota/1587740>

Contact: Curtis Watanabe
Asst. Scoutmaster Troop 378
FCC License: K18KUK
e-mail: Curtisw0007@gmail.com
cell 310-528-7767

Special Thanks to:
Battleship Iowa Amateur Radio Association,
South Bay Amateur Radio Club,
Palos Verdes Amateur Radio Club, &
Rio Hondo Amateur Radio Club

From The Secretary



1. **Attendance drawing:** The lucky winner for the August 21st meeting was Jim-K6JGL. Unfortunately Jim was not present and therefore the kitty for our September meeting will be \$ 35.00. Be sure to join us because your presence is necessary to win. Remember this is open to members in good standing only and the winner must be present.
2. **Thank you:** We wish to thank Marty Woll-N6VI our ARRL Southwestern Division Vice Director. Marty made an excellent presentation on the "Future of Amateur Radio". Those of us present I am sure realize that yes our ranks are increasing but it takes all of us to be proactive in all aspects of the greatest hobby in the world to maintain our present privileges we all so much enjoy. The Grassroots campaign at this time promoting the "Amateur Radio Parity Act" is one example. HR4969 calls on the FCC to apply the "reasonable accommodation " three-part test of the PRB -1 federal Pre-emption policy to private land-use restrictions regarding antenna. It is asking us to sign and deliver letters to our representatives to co-sponsor and sign on to co-sponsors this bill which is essential to the bill's success. Last month's Arc Over on page 4 explains this and it is hoped you would go the ARRL website to use the prepared letters and such to asks them to sign-on as co-sponsors of HR-4669. We need to be vigilant and get this support in order to make this an enjoyable for all hams. Thank you Marty for giving us the wakeup call.
3. **Satellite antenna project:** The actual date for the assembly of the antenna's is a couple of days after the scheduled Sep 18 SBARC General meeting. I thought you might want an update. I've been able to present Tom-KI6RC with 9 prepaid orders for this antenna. He now (as of 8/30/14) has now ordered the parts needed for this project. He and Bruce KK6BJ will prepare the parts sometime before the 20th of Sept so you will have ample time to assemble and finish the entire project just that one day. The antenna will have coax on it with an PL259 male end as usual. It is your job to be sure to have any type of adapter you might need to go from the UHF PL259 connector to whatever your radio needs to connect. Please look at your HT or radio you are planning to use for it. This should be very doable please. If you have any question please feel free to ask either Tom or Ray (I'll be out of town till the 16th of Sep). Thank you so much for your participation and support on another fine project by the SBARC.

4. **DIY Project:** This "Do it Yourself" project is scheduled for our November meeting as in the past. 2 classes as long as we have enough participants which as was indicated at our Aug meeting was 4 or 5 at least. So once again please prepare your project for a show and tell wonderful evening on the November 2014 meeting.

5. **Elections:** Yes we are facing the election process for the election of officers for the 2015 SBARC year. If you wish to be part of it and feel you can do a good job with whatever project you favor for the good of the club please let the nomination committee (or any present officer) know this. Neither our present President and Vice President are scheduled to leave the area sometime due to their work. It's always been SBARC policy of course that anyone has to give priority to their work requirement and so we hope you will consider that as well. Please think about this and either step up or you may want to suggest someone as well (they must approve of course). Main thing is to think how you could be involved if you wish. Thank you and may the best man win

6. **New Member:** Please welcome Scott Hartnett-KK6MNM to our SBARC family as a member in good standing. As many of you have heard Scott on the W6SBA repeater I am sure and have heard about his fabulous " Slim Jim " antenna which he uses from his QTH. Scott holds an General class license and resides in Hermosa Beach. On his membership application he shows his amateur radio interest in HF, VHF and UHF with more to come I am sure. Club activities he wishes to participate in are 220 repeater nets and that to will change once we get to know him and help him by exposing him to all the other things we so take for granted. Yes he is new to our world which is why we need to welcome him and provide him with all he wants to know (well sort of course). Please welcome him, talk to him and help him in any way you can. Thank you Scott for joining us. .

Thursday Night Net
@ 7:30 p.m.



Please join us on W6SBA 224.38 minus offset and the PLat 198.2 hz you can share your experiences or just say hello!

CALENDAR

Council Meeting - 1st Wednesday of the month
Call Joe - WB6MYD (310) 328-0817

Club Meeting - 3rd Thursday of the month
September 17, 2014 - 7:30 p.m.
Torrance Memorial Med Center
West Tower, Room A

Club Nets - **W6SBA WEEKLY NET**
Every Thursday @7:30pm
(except the night of club meetings)
PVUSD EMERGENCY NET
1st Tuesday of the month
09:30 Hours on the W6SBA repeater

TRW Swap Meet Saturday,
September 27, 2014, 7-11 a.m.

VE Session - Contact: Joe WB6MYD
Phone: (310) 328-0817
jlanphen@ca.rr.com or w6sba@arrl.net

Social Event - Contact: Joe WB6MYD
Phone: (310) 328-0817
jlanphen@ca.rr.com or w6sba@arrl.net

Answers to Mr. Wave's face on page 5: Eyes = Amplitude modulation;
Mouth = Frequency modulation

CLUB SERVICES

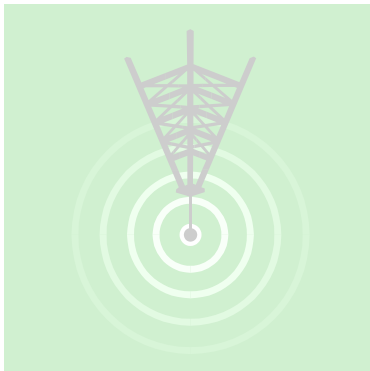
Awards Manager (HF/VHF)	Cliff - K6LH
Health & Welfare	Joe - WB6MYD
Swap Meet Chair	Joe - WB6MYD
VE Test Liaison	Joe - WB6MYD
VE Test Sessions	Joe - WB6MYD
Webmaster	Alex - KD6LPA
Editor	Glenda - KF6QFE Glenda.simpson@hotmail.com
Proofreader	Alex - KD6LPA

South Bay Amateur Radio Club Repeater
224.38 MHz · PL - 192.8 Hz Offset -1.6 MHz
(See Calendar for Weekly Net Times)

NEWSLETTER SUBMISSION

South Bay Amateur Radio Club
P.O. Box 536
Torrance, CA 90508
W6SBA@arrl.net
Website: <http://www.w6sba.org>

TO:



Address Correction Requested

A COMMUNITY SERVICE ORGANIZATION

W6SBA

South Bay Amateur Radio Club
Post Office Box 536
Torrance, CA 90508-0536

