

# CRACKLIN' STATIC



## **SIERRA NEVADA** Amateur Radio Society

Serving the Amateur Radio Community since April 16, 1968

<http://www.snars.org>

**RENO, NEVADA**

**JULY 2014**

### **-----President's Voice-----**

We Did It! The NVCON was a success. There were a few bumps in the road and several good suggestions from the participants; however, overall we did very well. Thanks again to all that helped to put on the convention and to those of you that attended the event. The Board will discuss the probability of doing it again next year.

The last weekend of June was field day. We will publish the results of the clubs participation once we have all the info. Thanks to you that participated and to Howie and Ken for making it happen.

Sometime this month we will be heading up to Winnemucca Mountain to start the installation of our repeater at that site. We will be sharing space with (NDOW) Nevada Department of Wildlife. John, N7ROJ has been working with them and making all the arrangements to get us set up and running. More info as specifics are available.

We are always looking for 20-30 minute talks for the monthly club meetings. If you have some contacts and/or ideas on topics please let me know.

Membership is always an issue since the bulk of the money we get comes from dues. These funds are needed to keep the repeater system running and to take care of repairs and replacements as they are needed. Much of the equipment in use has been around for a long time and maintenance and replacement of the equipment is ongoing.

**If you haven't already renewed, please do so by going to this link and following the instructions.**  
<http://snars.org/membership/>

## SNARS meeting July 5



7:30 AM Denny's, 205 East Nugget Ave, Sparks

We will have a talk about the NTS (National Traffic System). It will be presented by Doug, KA7FOO – He will talk about what it is, how and why it is used and answer questions regarding the NTS locally and nationally.



### CRACKLIN' STATIC PUBLICATION

E-mail..... [holden7471@msm.com](mailto:holden7471@msm.com)

Cracklin' Static is the Newsletter of, and sponsored by the Sierra Nevada Amateur Radio Society. Opinions expressed herein are those of the editors and contributors and should not be considered as official expressions of the Club Officers, Staff or Club Members, or as endorsements by same.

Material for publication may be edited to enhance readability or to save space. We reserve the right to use whatever font size or line spacing may be required in order to publish this Newsletter.

Deadline for input to the newsletter is 1500 hours on the Sunday prior to the 1st Saturday of each month.

Cracklin' Static is e-published in Adobe PDF Format. It may be enjoyed at the SNARS web site.

### Amateur Radio License Testing 2014

SNARS, Third Saturday of February, April, June, August, October and December. Testing will be at the REOC located at 5195 Spectrum Blvd., Reno

..... Bill Nichols... NN7K

SIERA CLUB: Silver State Charter High School, 788 Fairview Dr, Carson City..... 3rd Saturday of January, March, May, July, September, and November

.....Dale Anderson, [kv7s@charter.net](mailto:kv7s@charter.net)

Elko Area: Third Saturday of January, April, July, October. 11:00AM, Northeast Nevada Regional Hospital, 2001 Errecart Boulevard, Elko, NV

.....Joe Giraud, N7JEH [n7jeh@arrl.net](mailto:n7jeh@arrl.net)

SNARS, P.O. Box 7727, Reno, NV 89510

Membership: \$25 Individual, \$40 Family

### OFFICERS 2014

President.....Mike Katz.....N7MSK  
 Vice President.....Don Seibert..... N2MOO  
 Treasurer.....Tony Marcin.....N7ACM  
 Secretary.....Rob Dunbar.....NB6C  
 Director.....Scott Brink..... KC7STV  
 Director.....Dave Miles..... KF7EGU  
 Director.....Jim Shepherd..... W6US

### STAFF 2014

By Laws Review Committee.....KE7HLR  
 Call Sign Badges.....KB7GNA  
 Club Public Information Officer.....  
 Control Operators Manager.....N7TGB  
 Cracklin' Static Editor.....WB2AWQ  
 Digital SYSOP.....K7JN  
 Meeting Greeters.....AE7OX  
 History Archivist.....KF7KTC  
 SK Estate Advisors.....KB7IWT  
 Station Licensee for KR7ENO.....WB2AWQ  
 Control Operators FOR KR7ENO.....WB2AWQ  
 Station Licensee for W7TA.....KE7VSR  
 Control Operators for W7TA.....KE7VSR  
 Tech Committee Chair.....N7ROJ  
 Chief VE Examiner.....NN7K  
 Membership Chairman.....N2MOO  
 Awards Chairman.....KB7ZBN  
 Program Chairman.....N2MOO  
 Web Master.....N7ACM & KG7DLF  
 Facebook Page Administrator.....N7ACM & KG7DLF  
 Events Coordinator.....WA6MTY

### SNARS Repeater System Frequencies

#### Linked System --- Reno, Carson Area

146.610 (-) PL 123.0

443.075 (+) PL 123.0

#### Lovelock & Black Rock area

146.925 (-) PL 123.0

#### Mt Rose Linked System

147.030 (+) PL 123.0 Virginia Peak

147.150 (+) PL 123.0 Mt Rose

147.210 (+) PL 100.0 Peavine Peak

444.925 (+) PL 100.0 Peavine Peak

444.875 (+) PL 100.0 Lobdelle Peak

#### GSR Linked System

147.300 (+) PL 123.0 Grand Sierra Resort

444.825 (+) PL 123.0 Mt Davidson

IRLP: 7873, Echolink:WA7DG/R (581256)

Rag Chew 147.390 (+) PL 100.0 (no link)

52.580 (-) PL 114.8 (no link or features)

Packet 145.050

APRS 144.390

D-Star 444.625 (+) N7NDS B, N7NDS G

# The Name of the Game

Jim Shepherd, W6US

[nvjims@gmail.com](mailto:nvjims@gmail.com)

## Portable operation

The premiere group portable event of the season has just been completed, Field Day. This was a big operation with community equipment and a number of hams participating. There are a lot more opportunities to 'go portable', and it can be a lot of fun.

Any time you are operating from a fixed location away from your or someone's home station, you are portable. Camped for the weekend at Lake Tahoe? Sitting there at the picnic table with an antenna tossed up in the trees you can enjoy being portable.

Where you are going and how you are getting there will directly affect the equipment you will be using. You probably will not be packing a Kenwood 990 and a group 24 lead acid battery to the top of Mt. Whitney, but that combo will work car camping in the boonies or staying in a cabin at the beach. There are a number of smaller HF rigs that will fit in your suitcase with a switching power supply and a small wire antenna that can get you on the air wherever you stay that has outside access and 120 Vac power.

If you are away from the power grid, your power source is going to be a big factor in your operation. Like Field Day, generators can produce plenty of power for your operation. They will have plenty of power left over for lights, recharging your other electronics, and a blender for icy liquid refreshments... Drawbacks include audio and electronic noise, fumes, fueling and the heavy weight and cost. Some of the new inverter type of gas powered generators will have electrically noisy electronics that show up in your receiver.

Batteries are an option, but their life is limited. AA packs for your handheld are ok if you just want to 'check in' at set times, but if you are going to do anything more, you will need to look at rechargeables and a way to recharge them. A solar panel and charge controller can be used for this

purpose. Vehicle chargers can be used also. Directly running off of the car battery can be done in short spurts, but for any extended operation, the car will need to be running to prevent the battery being pulled down so the car won't start.

Antennas are another consideration. Wire antennas are easy to erect if you have trees. A simple dipole or a tuned wire vertical will get you on the air. If you are in a remote location, especially if you are off the grid, you will usually have very quiet band conditions, so you won't need a fancy antenna to do well.

You may find out that your portable location is 'rare DX' and find yourself handling a pile-up with all wanting to work you! Rare counties, grid squares, mountaintops and islands can easily turn your vacation into a mini-DXpedition. Be sure to keep a log as all those hams are going to want confirmation for their awards. "Logbook of the World" has made it easy to upload your logs after the trip.

Then again, going portable may be the entire purpose of your trip. A couple of weeks ago we had the VHF contest, and several local mountains had large portable stations operating on them. High elevations, coupled with big antennas and real power make it possible to make contacts a lot further away than the usual line-of-sight on the VHF frequencies. The ultimate portable trip is to make a DXpedition to one of the very rare islands and rack up thousands of contacts all over the world.

Whether it is a mountaintop, a cabana at the beach, or a campground at Quartzite, take your radio along on the next trip and try a little portable operation.

## Weekly nets on the SNARS repeater systems

**Western Nevada Noon net (daily, 12:00 PM)**  
147.150 + 123.0, 147.210 + 100.0, 147.030 + 123.0, 444.875 + 100.0

**The Morning Net (Monday – Friday at 10:00 AM)**

147.300 + 123.0

**Bishops Storehouse Net (Monday nights at 9:15 PM)**

147.150 + 123.0, 147.210 + 100.0, 147.030 + 123.0, 444.875 + 100.0

**North Western Nevada ARES Net (Tuesday nights at 7:00 PM)**

147.150 + 123.0, 147.210 + 100.0, 147.030 + 123.0, 444.875 + 100.0

**State SATERN Net (Tuesday nights at 8:00 PM)**

147.300 + 123.0

**State SKYWARN Net (Wednesday nights at 7:00 PM)**

147.150 + 123.0, 147.210 + 100.0, 147.030 + 123.0, 444.875 + 100.0

**Northern Nevada Preppers Group Net (Wednesday nights at 8:00 PM)**

147.150 + 123.0, 147.210 + 100.0, 147.030 + 123.0, 444.875 + 100.0

**State ARES Net (Thursday nights at 7:00 PM)**

147.300 + 123.0

**SNARS New Ham Net (Sunday afternoons at 1:00 PM)**

146.610 - 123.0, 443.075 + 123.0, 146.925 - 123.0



## COMMUNICATIONS EVENTS

Below is the list of this summer's list of events that require Amateur Radio Communications. If you want to participate, email the contacts shown below.

The first event is Reno 5000 so if you want to participate email me now. I will hold a brief training at the April ARES training at the REOC on April 5<sup>th</sup>.

NOTICE: The Reno Tahoe Odyssey is the weekend of NVCON. If you aren't going to NVCON, I will need your help.

Bob WA6MTY

Washoe County EC

EVENT 2014	START DATE	DATE END	SPONSOR/ ORGANIZER	CONTACT	WEBSITE
Death Ride	7/12/14		TARA	<a href="mailto:paul.mcafee@att.net">paul.mcafee@att.net</a>	<a href="http://www.deathride.com/">http://www.deathride.com/</a>
Tahoe Rim Trail	7/19/14	7/20		<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://www.tahoemtnmilers.org/trailer/trindex.html">http://www.tahoemtnmilers.org/trailer/trindex.html</a>
Expedition Man	8/23/14			<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://www.expeditionman.com/">http://www.expeditionman.com/</a>
Tour De Tahoe	8/7/14		TARA	<a href="mailto:paul.mcafee@att.net">paul.mcafee@att.net</a>	<a href="http://www.bikethewest.com/tour-de-tahoe/">http://www.bikethewest.com/tour-de-tahoe/</a>
Reno Tahoe Gran Fondo	TBD			<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://www.renotahoegranfondo.com">http://www.renotahoegranfondo.com</a>
Tahoe 200	8/5/14	8/9		<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://www.tahoe200.com/">http://www.tahoe200.com/</a>
Reno 5000	9/7/14		Dolan Auto Group	<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://www.reno5000.com/Registration_home.php">http://www.reno5000.com/Registration_home.php</a>
Reno Air-Races	9/10/14	9/14		<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://www.airrace.org/">http://www.airrace.org/</a>
Sierra Valley Gran Fondo	TBD		Reno Cycling Club	<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://svgf.org/">http://svgf.org/</a>
Edible Pedal 100	9/21/14		Sunrise Rotary Club	<a href="mailto:wa6mty@gbis.com">wa6mty@gbis.com</a>	<a href="http://www.ediblepedal100.org/">http://www.ediblepedal100.org/</a>



## Impressions by a “First-Time” Contester

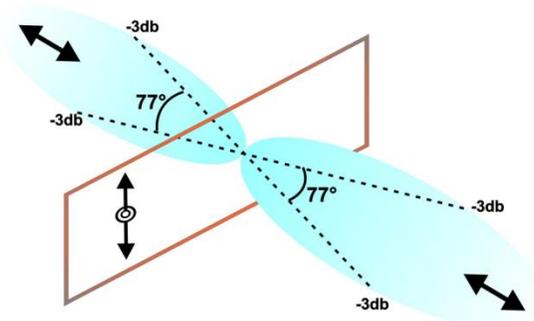
The annual ARRL June VHF Contest was held the weekend of June 14-16, 2014. I had resolved that I would participate in the contest, and see how well I could do considering my basic operating equipment. My only radio currently operational is a strictly 2 meter affair, that puts out a maximum of 75 watts in the FM mode only. My QTH is in Dayton, and I live right up against the east side of the Flowery Mountains. I have excellent success with our local repeaters, and am able to easily get onto the 146.610, 147.150, 147.247, and 147.390 systems on just 5 watts. I can even reach the 147.210 repeater on Peavine Mountain. This is in spite of my antenna not being anywhere in line-of-sight to any of the repeaters, and having to get my signal “over” the mountains. Speaking of antenna, my antenna is a fixed (no rotor) home-brew design called a “Hentenna,” that was originally designed in Japan for 6 meter operation. I have built a scaled-down version for 2 meters. The name for this antenna derives from the Japanese “hen,” which means “strange,” as the physical orientation of the antenna appears to be opposite to its polarization. This design is basically a 1 wavelength loop, with peculiar feeding. When the Hentenna is aligned horizontally, the polarization is vertical (normal for FM operation). The polarization is a result of the plane on which the feed-point is mounted. The photo shows the horizontal orientation on a home-brew 20-foot mast constructed of electrical conduit that has been strengthened internally with a wood pole.



**Home-brew Hentenna, mounted on a 20-foot non-metallic mast.**

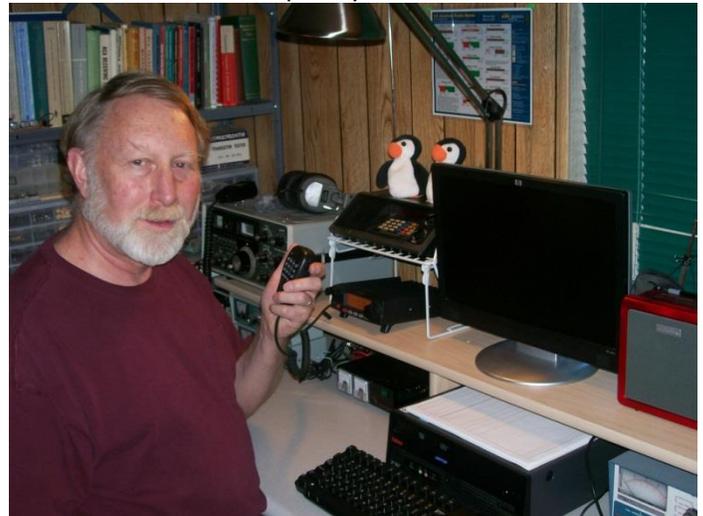
The antenna is directional only to the front and back planes, with about a 3dBi gain to those sides. Since I cannot rotate the antenna, my results in the VHF contest would be dependent on the existing orientation, which

puts the two signal lobes pointing generally towards Fallon and Carson City from my location.



**General signal pattern from the Hentenna**

Previously, I had checked all of the general rules for ARRL contests, and the specific rules for VHF/UHF contests. I also decided to use a traditional paper log for my contacts. I started working the contest at 1800 UTC Saturday (11:00am local time) on Saturday, and worked off and on Saturday till about 11:00pm local time. On Sunday, I began working the contest at 5:30am local time, until the end of the contest at 0259 UTC (7:59pm local time). I was working only the FM mode (it is all I have), and worked the following simplex frequencies: 146.49, 146.55, 146.58, 147.42, 147.45, 147.48, 147.51, 147.54, 147.57. Working the National Simplex Calling Frequency, at 146.52 MHz, is not allowed for contests, but I did generally monitor that frequency to see if there was any chatter about the contest. I didn't hear anyone mention the contest on that frequency.



**KF7KTC at his operating position. Yaesu FT-2900R for 2M, Yaesu FT-101EE for HF. (Editor's query: are the little twins in the tuxedos licensed?)**

As is said, I had resolved that I would participate in the contest, and I did. However, here in rural Nevada there

seems to be little participation on FM simplex. I only made six contacts during the entire time I was on the radio, and alternated between listening and very active calling. The most distant contact I made was in Silver Springs, about 25 miles in a direct line from my QTH. I could easily reach that distance on 10 watts, and could just be heard on 5 watts. This gave me lots of hope that I might reach out to Fallon, and perhaps even Battle Mountain or Lovelock on 75 watts. However, I don't believe that there were any operators using FM in that direction, as I could not hear anyone, and no one responded to my calls. I was not able to contact anyone outside of our local DM09 Grid. In speaking with my contacts, most said that they were using 6 meters to get out further, and that they were just coincidentally listening to 2 meter FM. A couple of the contacts were also trying 220 MHz and 70cm frequencies for additional contacts. They also mentioned that most 2 meter

contesting was typically done using the SSB mode, and not FM.

So, what did I get out of participating in the contest? I made contact with five local hams that I had not spoken to before, and that are not SNARS members. I learned how to "call out" for a contest, and to quickly provide the information critical to recording a contest log. I also had FUN – yes, in capital letters! I look forward to gaining more confidence, and greater skill in operating my radio, and working another contest in the future. Will I turn in my log to ARRL, and do I expect to win any award paper? I will definitely turn in my log, but I have already won, just by participating. Paper is cheap, but the experience of working a contest is what is really valuable. I learned a lot, and had fun while learning. It couldn't get much better than that!

73 Jon – KF7KTC

## THE NEW HAMS & INFORMATION NET

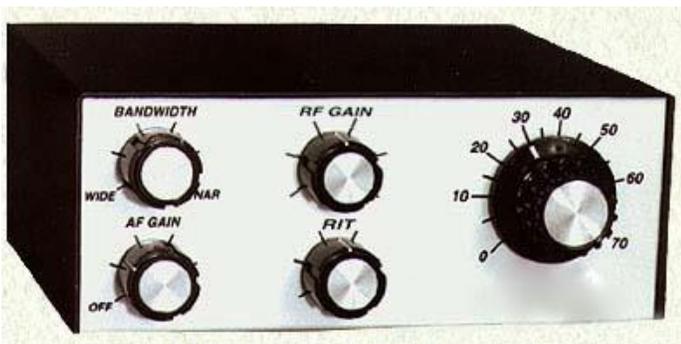
The New Hams Q&A Net on 146.610. The net is held weekly at 1300, every Sunday afternoon.

The purpose of this net is a Q&A and information net for newly licensed hams and all hams wishing to ask question about different aspects of Ham Radio. It will give new hams in particular a venue for getting on the air in a controlled net moderated by a ham with more experience. The net will be open to any interested ham. Questions will be answered and discussed by the more experienced hams listening on the Net.

For those in the North Valleys who may be out of the range of the 146.610 try using the 443.075 (+/123). It works from Lemmon Valley.

\* \* \* \* \*

## NAME THAT RIG



(Answer on pg 7)

## ARES NEWS

The Tahoe Rim Trail race takes place July 18, 19 and 20<sup>th</sup>, if you like camping and would like to help out, contact me as I need more radio operators.

Thanks to KE7JMN, KA7FOO, KF7KEM, AF7HD, KF7BNX, W7ADZ, KG7BOE, KF7ZKS, KA7ZAU and Bill DeCoux (who just passed his Tech), we provided communications for the directors of the RENO5000 half marathon race around Hidden Valley Park last Sunday the 29th. Directors William and Shanna were very pleased with our communications help.

73  
BOB MILLER WA6MTY  
Washoe County Emergency Coordinator  
Amateur Radio emergency Service (ARES)

[www.wcares.us](http://www.wcares.us)  
[wa6mty@wcares.us](mailto:wa6mty@wcares.us)  
[wa6mty@gbis.com](mailto:wa6mty@gbis.com)  
775 843-5952

## SNARS LADIES

We had 11 for the June luncheon at the Eldorado. Everyone had a great time and enjoyed each others company. For July we will be at the La Fuente

Mexican restaurant in Sparks. This will be on Wednesday, July 9th at 11:30 am. The restaurant is located on Baring Blvd just 1 block from McCarran Blvd.



Photo of Ladies luncheon in Virginia City at NVCON

## SNARS CALENDAR

**05 Jul 2014 | 0730**

### **SNARS Breakfast Meeting**

Dennys - 205 Nugget Ave, Sparks

Join us for our Breakfast meeting. All SNARS members and guests are welcome!

**09 Jul 2014 | 0600**

### **SNARS Tech Committee Meeting**

Regional Emergency Operations Center, 5195 Spectrum Blvd.

The SNARS Tech Committee meets monthly to go over the status of system projects, issues and other topics related to the SNARS repeater and digital systems.

**16 Jul 2014 | 1800**

### **SNARS Board of Directors Meeting**

Regional Emergency Operations Center, 5195 Spectrum Blvd.

The monthly board of directors meeting is held on the third Wednesday of each month. All members are welcome to attend.

## **NAME THAT RIG (from pg 6)**

Founded by Amateur Radio legend Doug DeMaw, W1FB (SK), Oak Hills Research (now a part of Milestone Technologies) produces the high quality QRP radio kit OHR-100A, a single band 5 watt CW transceiver. Featuring high performance receive specifications and all the controls QRP operators demand, OHR is a name well known to QRP enthusiasts.

\* \* \* \* \*

# Sierra Nevada Amateur Radio Society

## BOARD OF DIRECTORS MEETING

REOC, Wednesday, June 18, 2014

### A. Call to Order (N7MSK)

Time: 1759L

#### 1. Board Members Present:

SNARS: N7MSK, N2MOO, KC7STV, N7ACM, W6US, KF7EGU, NB6C

#### 2. Guests Present: N7ROJ

### B. Adoption of Agenda

1. Vote to adopt: NB6C Second: W6US

### III. Reports

1. Chair: (N7MSK) – directed to other reports.

2. Secretary: (NB6C):

- a. Current membership – 133 Members have renewed their membership as of this date.
- b. Estate sale of Dave Rupert's ham gear has earned \$1380 from two swap meets

3. Treasurer: (N7ACM):

- a. Bank Balances:     Checking \$14,468.53  
                              Savings \$3,236.95  
                              PayPal \$1,934.68

IV. Committee Report

1. Trustee (KE7VSR) No report

2. Tech Committee (N7ROJ) Tech Committee

- a. Made progress on hotspot on same frequency that it used to be
- b. Uplink radio on IRLP was not designed to work on 420 MHz and creates a lot of spurious signals.
- c. Winnemucca Mountain – N7ROJ has had good conversation with NDOW. Planning on a meeting with NDOW on site and install equipment at the same time if we get ok.
- d. Project plans are put together for Ophir Peak and Mt Rose. Dates will be posted after field day
- e. Mt Rose – Intent is remove old rack and install with new rack system which is ready to install
- f. Ophir Peak – Kenwood link is causing a mix problem and keying up a Storey County TAC repeater because it is not filtered enough. N7ROJ is going to try a window filter to see if this fixes the problem
- g. Pat has the repeater ready for Winnemucca. Pat also has a replacement link radio for Mt Rose

3. Education (N7ACM)

- a. No classes until October 1<sup>st</sup>

4. Events (WA6MTY) No Report

5. Field Day

- a. Field day will be at located at Washoe County REOC June 28-29

V. Report on NVCONS (N7MSK)

- 1. Do we want to do this again? We had almost 50 surveys returned. Most comments were "need more space and more vendors." Overall the board said they would like to have the convention again next year. A planning committee will be formed and request for proposals to hotels around the area will be sent out.

VI. New Business / Other Business:

- 1. Notice of W7TA reinstate of AF7CE

2. KD7YIM Ham class – N7ACM and N7MSK will have a meeting with KD7YIM and discuss how to integrate the class into the club
3. Legislative action Cell Phone bill. Tom Porada KK7YW is the ARRL state Government liaison and will present language requesting Ham operators to be exempt from the law.
4. Nevada 150<sup>th</sup> Special Event Station on October 31. N7ACM motioned that the club will plan on having a Special Event Station. KC7STV seconded the motion. Motion Passed.
5. From the floor
  - a. Discussion occurred regarding disbursement of the funds from the sale of Dave Rupert's (SK) donated radio equipment to other clubs in the area. SNARS can only share money with other 501c non-profits clubs. N7ACM motioned that if the three other clubs (SNARS, QRP and Reno Hams) in the valley would a portion of the proceeds they will need to make a request to SNARS after we inform them. N2M00 seconded and the motion passed
  - b. Our next general meeting will be on July 5<sup>th</sup> at Denny's.
  - c. KC7STV brought to the attention there are many "kerchunkers" on the repeaters. Also discussion of perhaps direction finding the offenders. When offenders are found then a letter will be sent to offenders letting them know if they continue they will be banned from SNARS repeaters.

VII. Motion to Adjourn: By: NB6C Second: N2M00 Motion Carried: Meeting adjourned. Time: 1910L