RAINBOW CANYONS AMATEUR RADIO CLUB NEWSLETTER

Club Website: www.rcarc.info Number 7 – Vol. 2 February 2025

Club Meeting Information

The RCARC meets at 7:00 p.m. on the 2nd Tuesday of each month at the Cedar City Senior Center, 489 E. 200 South. Down Stairs.

2025 Club Officer's

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CQ, CQ, Happy Valentines Day

Presidents Message

Dear Fellow Amateur Radio Operators,

We are off to a good start for 2025! Winter Field Day was a lot of fun and went very well. The weather held out and much of the snow melted. We also had nice temperatures and we had 21 volunteers come out to Winter Field Day. This year we made 222 contacts (213 phone and 9 digital) and Brody (K7VXV) was our top operator (and really excited to get Hawaii twice!). Last year we made 88 contacts so this was a great event! Everything seems to run well and we were able to have contact on 40, 20, 15 and 10 meters. We also had emails sent and received using Winlink! Thank you everyone who participated this year! digital mode for HAM radio.

Continued on Page 2

RCARC Club Nets:
7:00 a.m. Breakfast Net - Monday – Saturday – 146.760.
12:30 p.m. Daily – Utah Beehive Net 0n 7.272.
8:30 p.m. Tuesday's - ORCA Digital Net. Using FLDIGI, FLMSG AND FLAMP – 3.581 +, 1500/MFSK32.
8:00 p.m. Wednesday – Panguitch Net – 147.160.
7: pm. Thursday– Morse Code Net- This is a Zoom Meeting.
8:30 p.m. Thursday's - WDN Digital Net. Using FLDIGI, FLMSG AND FLAMP – 3.581 +, 1500/MFSK32.
8: p.m. Saturdays – SSTV – 449.925.
9:00 p.m. Daily – Friendship Net – 146.760.
11: a.m. Saturdays (Mtn. Time) QCWA – 160 Net, Utah Chapter,
12: p.m. Freq. 7.272.
8:00 pm. Sunday's – New Harmony Valley Net – Bumblebee Repeater. – 146.680 with a minus offset – PL 100.

Local Repeaters:

Iron Mountain
146.760 MHz – Tone 123.0 Hz
146.980 MHz – Tone 100.0 Hz
448.800 MHz – Tone 100.0 Hz
449.500 MHz – Tone 100.0 Hz
448.400 MHz -- Tone 100.0/FM & DMR

Intermountain Intertie:
146.940 MHz – Tone 100.0 Frisco.
146.800 MHz – Tone 100.0 Blow Hard
147.200 MHz + Tone 100.0 Tod's/Hatch
146.820 MHz – Tone 100.0 Utah Hill

Bumblebee/New Harmony:
146.680 MHz – Tone 100.0 Hz

Rowberry:
449.925 MHz – Tone 100.0 VHF Remote

Dutton:
147.160 MHz + Tone 100.0 Hz.

Save The Date

February 11, 2025

RCARC Club Meeting.

7:00 pm. Cedar City Senior Center, 489 E. 200 South. James Moore (KJ7VEI) to talk about Disaster Communications.

March 11, 2025

RCARC Club Meeting.

7:00 pm. Cedar City Senior Center, 489 E. 200 South. More info to follow

April 15, 2025

RCARC Club Meeting.

7:00 pm. Cedar City Senior Center, 489 E. 200 South. More info to follow

May 13, 2025

RCARC Club Meeting.

7:00 pm. Cedar City Senior Center, 489 E. 200 South. More info to follow

President's Message

Continued from page 1.

We will also be starting a technician class in March so let potential students know!

I encourage you all to play, share, and have fun on the radio! We all have strengths and weaknesses but we are all interested in radio communications and can benefit from each other. If you are interested in any aspect of HAM radio please explore the topic, experiment, and share what you have done with the group! That is what makes this such a fun hobby! Don't be shy, we are all friends here!

In service,

Fred Govedich (KI7TPD)

Notice

RCARC Annual Radio Swap Meet/Go Box Challenge coming May 3, 2025. Stay tuned for more info

RCARC Monthly Breakfast

Please cone join us on the first Saturday of each month at 9:00 am. for our club breakfast. We meet at the Golden Corral Buffet & Grill (in the back room), 1379 S. Main Street, Cedar City. Their menu offers an unmatched variety of quality foods from breakfast to dinner.

See you there.

Happy Birthday and Anniversary to those celebrating in February

Happy Valentines Day

Breakfast & Friendship Net Awards

January 2025

Breakfast Net		Friendship Net		
First Place	KE8OYI - Caleb	**First Place**	**Second Place**	**Third Place**
KE6ZIM - Johnny	KI7SCX - John	K7HDX - Ron	KE8OYI - Caleb	WA7GVL - Paul
KG7PBX - Linda	N7SND – Larry	K7NKH - Lee	KI7LUM - Bruce	W1EPR - Austin
KI7TPD - Fred	**Third Place**	KAZ7J - Lance	KI7LVB - Tammy	K7WEP - Paul
KI7WEX - Bonnie	KK6FLO - Dave	KI7TPD - Fred	KI7LVC - Tim	
W0KLH - Kevin	KK7UBC - Tommy	KI7WEX - Bonnie	KJ7LTQ - Brant	
WA7GVL - Paul		KK7UBC - Tommy	KK7FLL - Maddie	
Second Place		N7WWB - Darlene	W9YNK - Benjamin	
K2MFK - Kevin		W0KLH - Kevin		
KC6WFI - Tony		W6DLW – Dennis		

Rainbow Canyons Amateur Radio
Club Treasurer Report Jan 14, 2025

Bank balance Dec 1, 2024	**$3043.77**
Membership NL7EL K7NKH, KC7IHE, K7VXV Johnson Family, KB3FXC, KA7J, KC6WFI, KD6HYH	+ 125.00
Expenses Rocky mountain Power (98 repeater elec exp)	- 21.82
Bank Balance Dec 31, 2024	**$3,146.95**
Jan Expenses Rocky Mountain Power (due 1/20/2025) 3 Peaks field day reservation	 - 22.80 - 70.00
Funds Available after 1/20/2025	**$ 3,054.15**
Waiting for Bill for Xmas Meat expense	- ???

Submitted by
Linda Shokrian KG7PBX
2023 RCARC Treasurer
435-867-5914

RCARC Upcoming Events

February 11, 2025 VE Testing Session at the Cedar City Senior Center 489 E. 200S. at 6:00 PM

February 11, 2025 RCARC Club Membership Meeting at the Cedar City Senior Center 489 E. 200S. at 7:00 PM.

February 20, 2025 RCARC EComm Membership Meeting at the Heritage Center at 105 N 100 E. at 5:30 PM. upstairs.

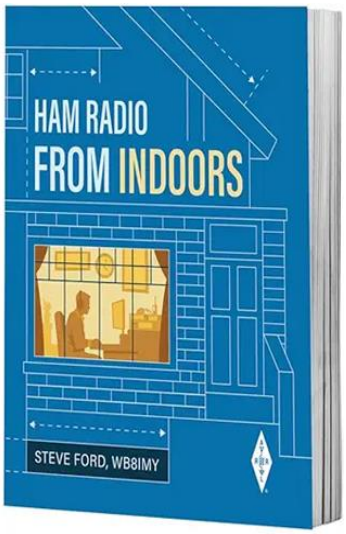
March 6, 2025 RCARC Technician Class at the Cedar City Senior Center 489 E. 200 S at 6:00 PM. Classes will run each Thursday starting a 6:00 PM. through the testing session on April 10, 2025.

Saturday May 3, 2025 RCARC Annual Radio Swap Meet. 9:00 AM through 12:00 or 1:00 PM. Christ the King Catholic Church 690 S. Cove Drive in the pavilion. In addition, there will be a breakfast and Go Kit Challenge. More info to follow.

In This Issue

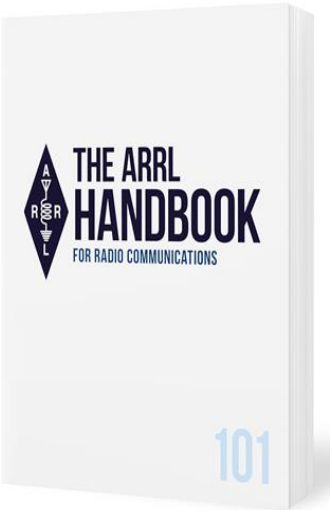
RCARC Book Giveaway. Books are donated by Linda Shokrian (KG7PBX)

Shown below is the book that will be given away at the February 11, 2025 meeting.



The Book below was given away to Paul Errickson (WA7GVL)

at the January 14, 2025 meeting



Congratulations Paul
See Picture on page

Contact Us.

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Cedar City, Utah 84721

Club E-mail:
cedarcity.rcarc@gmail.com

Newsletter E-mail:
rcarcnewsletter@gmail.com

Website
www.rcarc.info

Face Book Page:
https://www.facebook.com/groups/440325486875752/

To Join RCARC or Pay Dues:

Go to www.rcarc.info select "Club Info" and then "Join " RCARC. Follow the instructions on the template.

Make check payable to RCARC. Please write call sign on check.

Thank You

RCARC Events Calendar

Want to know what the clubs up to. Then check out the calendar on the club website. Access the following URL: rcarc.info, select from the menu "Club Info" then Select "Calendar. Scroll over the item you want to view and right click for more detailed information

Buzz's February Safety Tip(s)

What You Need in Your Car for Winter

Today, it's all about what you need in your car for winter. Did you know it's a good idea to have specific items packed in your vehicle during winter in case of emergencies of various kinds? A lot can happen when the temperature drops and those cold temperatures cause the roads to become hazardous due to snow, ice, rain, and sleet. You don't want to end up stranded in your vehicle with nothing available to keep you comfortable, warm, and safe while waiting for help.

Because rough conditions from winter storms can make it challenging for help to arrive, you don't know how long you'll need to wait in the car until someone can get to you and provide assistance. You'll feel more at ease if you have the right essentials stored in your vehicle. Make sure you have items packed in your winter emergency car kit for each person who'd typically ride in the car with you, such as your significant other, older parents, and children.

Blankets It's always beneficial to have a supply of blankets in your vehicle. During those cold winter months, you could find yourself not only cold but dangerously so. If someone in the car gets chilly, you'll have a blanket available for them to use. If the heat stops working and you find yourself stranded while waiting for assistance, you don't want to be unprepared and subject to severe exposure due to the elements.

Continued next column

So, ensure you're protected from the cold weather by using heavy-duty blankets to stay warm. You can fold these blankets and have them in a convenient storage tote bag that you can put in the backseat of the car or the trunk, whichever you prefer.
Be sure to have a minimum of three blankets to use and more than that if you're traveling with multiple passengers.

Flashlights with Batteries
If you find yourself in a situation where you need to evaluate your surroundings or check your vehicle's condition, it helps to have flashlights with workable batteries. Always ensure you have some extra batteries for backup to use just in case the ones inside the flashlight have died out. You may think bigger flashlights are better, but they are not so much anymore. Many of the smaller flashlights put out sufficient light to get the job done. Their size make so you can conveniently fit them in the back of your vehicle or the trunk, keeping them with the blankets and other items you'll keep in the car for winter.

Matt, in our comment forum, a good friend of mine suggested this brand of flashlights; this is the first one I purchased. I'll buy as many as I can. **OLIGHT**, but I want this one, **OLIGHT**

Continued on page 6

What You Need in Your Car for Winter

Continued from Page 6

Change of Clothes

Always have at least one extra set of clothes you can change into inside the vehicle. Then, if you've had to exit the car for some reason, or something spills or gets all over you, you can take off the wet clothes, place them in a plastic bag, and put on your clean, dry clothes to feel comfortable again. You wouldn't want to get stuck sitting in cold, wet, or soiled clothing for hours. Of course, when you're packing a change of clothes, it will be clothing for those emergencies and not just everyday wear.

A pair of jeans or sweatpants with a warm shirt and sweater should suffice unless you feel an extra coat would provide the additional protection you may want. Be sure to include warm socks and winter boots to protect your feet if you have to get out in the snow or ice conditions.

Extra Gloves

Pack some extra warm and protective gloves to have with you in the car. If you get stuck and need to wait for help, or you get stuck and need to exit the vehicle as you work to get the car up and going again, you might need to put on an extra pair of gloves as your fingers start to get exposed to the cold air and possibly wet conditions.

Continued next column

Excessive exposure to freezing temperatures could easily cause frostbite that you don't want to experience. As a result, it pays to be safe by packing comfortable and durable gloves that will keep your fingers warm.

Emergency Car Kit

I have two of these bags that I made into a car kit for roadside emergency use, and they are secured in the back of my Honda CRV as shown above. My Dewalt tool kit is my first aid kit, and I added the RED first aid symbol so people would hopefully realize I do not have expensive DeWalt tools in it. I love these **Husky Tool Bags**.

Road Flares

Have some road flares in the car to set outside when dealing with a roadside emergency. It's one of the best ways to draw attention to yourself when you need help, but also alert others that you are there if visibility is reduced due to a storm.

People are more likely to notice the flares and then come to your vehicle to check on things. It's also an excellent way to let the tow truck or the person you're waiting for figure out where you are from the location you've given them because they can see the road flares from a distance.

You can buy road flares online, have them shipped directly to you, and place them in your car for emergencies. These work for me. **Emergency Flares**

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RADIO NEWS

H. GERNSBACK, Editor and Publisher
ROBERT E. LACAULT, Associate Editor

EDITORIAL AND GENERAL OFFICES, 53 PARK PLACE, NEW YORK

Vol. 6 FEBRUARY, 1925 No. 8

Radio Evolution

By HUGO GERNSBACK

RADIO, like the whole of the universe, shares in the universal evolution. Just as a tree grows from a small seed, Radio has grown from infinitesimal beginnings into a huge art. If someone had the time and money it would be a beautiful thing to assemble a radio museum. A profitable afternoon might be spent in walking through such an interesting collection and looking over the various types of radio apparatus from the days of Hertz down to our latest Super-Heterodyne and present day commercial sending station equipment. It would be an education complete in itself. We would smile, and perhaps laugh, at the original model coherer, or the primal tuning coil, or the first sending and receiving sets. Just so, the imaginary visitor who visited this radio museum twenty-five years from *now* would smile at our present efforts, if he did not laugh out loud.

For such is the way of evolution. A thing a few years old is hopelessly outclassed and looks as silly to us as do the bustle and beaver hat to the present owner of a vanity case or derby. All the while we are bringing out new things, learning new ways about our friends, the radio waves, and are hopeful of learning more of their nature. The writer says "hopeful" because it does not appear that we shall ever know much about them. In the meantime, we are finding out a few things and trying to improve our present crude apparatus and instruments, because crude they still are, and crude they probably will remain for a long time to come. To be sure, our present efforts are not as crude as those of twenty-five years ago, but nevertheless there is much to be improved.

The coming year, for instance, will probably go down in radio history as the Low Loss Year. We have suddenly found out, it would appear, that our former good old condensers and our former aristocratic tuning inductances are all wrong. Soon they will be as extinct as the proverbial dodo. The reason for this is that a few nights spent in our laboratories have shown us that radio frequency currents behave in an outrageous manner as compared to their brothers, audio or low frequency currents. For instance, when we connect a bell to a battery and a push button, and run the wire along the wall, this does very nicely, providing the wire is fairly well insulated. There are practically no losses encountered in such a system.

BUT try to do the same thing with radio frequency currents; that is, the currents that are induced into the aerial by radio waves; immediately many awful and wonderful things happen. We find that if we string even a well-insulated wire against a wall, that wire immediately becomes an excellent sieve, *i.e.*, a great part of the radio frequency currents pass right through the insulation and into the wall, and if the end of the wire happens to be a radio receiving outfit, there isn't much current left to operate the set. We also find that what we formerly thought were excellent insulators act almost as badly as metals when we try to use them in radio instruments.

Thus, for instance, a fine insulator, silk, which was formerly considered excellent for use as wire insulation no longer is considered good at all when used in a radio inductance coil. And so on down the line through many similar reversals of practice. For that reason we now have the present Low Loss era. Instead of using bakelite, cardboard, or hard rubber tubing for our inductances, our engineers prefer to use air—and no tubes at all—because air just now is the best insulator.

During the next year we shall have a fearful outcropping of such coils which will take on the most fantastic shapes. Indeed we are seeing many of them right and left even now. The same is true of variable condensers, which are also, due to the same reasons, taking on the most grotesque forms imaginable. And all in order to cut down not only radio frequency losses, but also to make the minimum capacity of the condensers as small as it is humanly possible to make it. For if the minimum capacity of a condenser is high, it is impossible to tune down to the low wave-lengths.

Our fixed condensers have as yet not been touched by the low loss fever, although they are the worst offenders in this respect. Nearly all fixed condensers, whether mica-insulated or otherwise, have fearful losses in the eyes of the engineer, and it is safe to say that we shall have a revolution in fixed condensers, just as we are having it now in the variable types.

In the vacuum tubes, our leading manufacturers already have helped the movement by providing composition bases which are now incorporated in all of the better vacuum tubes, instead of the former metal bases, which gave rise to capacity effects and losses.

Vacuum tube sockets also have large losses, which probably will soon be remedied.

Then the little, but most important item, our bus bar construction will probably come in for hot discussion during the next few months, for it begins to appear that our bus bar connecting wire causes more losses in receiving sets than all of the other losses combined. It will be found, during the coming year, that only a certain thickness of bus bar will be suitable for best results. It probably will be found also that the shape of the wire must be round. Square wire, the writer believes, will be as popular, at the end of this year, as yellow fever, for it seems that the square edges give rise to losses. And even our beautifully-arranged wiring that we Americans are now so fond of, with all the nice right angle corners, will soon be avoided, for it seems that a right angle on bus bar wire is a thing greatly to be avoided. *All sharp angles create losses.*

Perhaps a wise condenser manufacturer will see these lines and immediately start working on a condenser that has neither sharp points nor sharp edges. If he succeeds, he will have an ideal condenser.

AFTER all these losses have been reduced to almost zero, we shall then have radio receiving sets that will be really efficient, and the writer makes the prediction that we shall soon have ordinary crystal receiving sets made on the low loss principles which will bring in real distance at all times. It would also appear that two and three tube sets will do the work of the present six tube ones. Already we hear enthusiastic reports from investigators who are using low loss receiving sets, and this design is as yet in its infancy. Much can be expected when the losses have been still further reduced.

There is really no good reason why, in the future, a 100-watt station should not be received on the loud speaker at the furthest distance possible on this globe, namely, 12,000 miles. It can be proven mathematically that the waves sent out from a small electric buzzer will cover the entire surface of the globe. At a distance of 12,000 miles the waves still persist, although infinitesimally weak. For that reason, if we have, let us say, a 100-watt broadcast station in New York, this station in the future should be picked up by means of a good two or three tube set, providing the losses in the set have all been reduced to the lowest possible minimum, on an antenna 12,000 miles away. And it can be proven mathematically. It is only a matter of the greatest possible sensitivity and then amplification of the minute energy. And this is possible only by stopping all the leaks.

Our present day radio receiving outfits may be compared to a heavily perforated soup ladle. As soon as we start ladling out the soup, it escapes through the perforations. Some of the soup sticks to the sides of the ladle and in the spaces between the perforations. This is our present day radio outfit. Most of the energy leaks away in places that we do not even suspect. Such an innocent thing as a sharp cornered binding post may give us tremendous losses. The future will show.

RCARC January Membership Meeting Pictures

Member's arriving and waiting for meeting to start.

Fred (KI7TPD) bringing meeting to order.

Members citing the Pledge of Allegiance

Continued next column

Fred (KI7TPD) conducting meeting business.

Paul (WA7GVL) shows off the book he just won.

Fred (KI7TPD) celebrating his Birthday. Happy Birthday Fred.

Continued on page 10

RCARC January 2025 Club Breakfast Pictures

Bruce (KI7LUM) and his wife

Tammy (KI7LVB) and Tim KI7LVC) enjoying conversation and breakfast.

Bryan (KG7OOW) George (AL7BX) and Linda (KG7PBX)

Continued next column

Ron (K7HDX), Bonnie (KI7WEX) and Terry West.

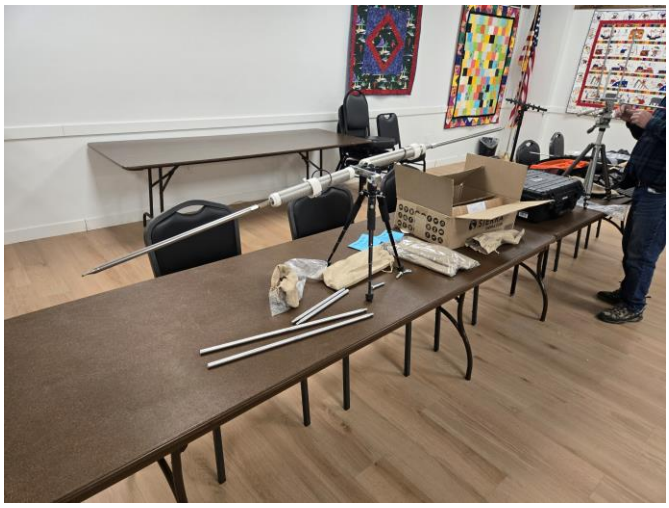
Dick (K7ZI) and his wife Susan all smiles. Breakfast must have been good.

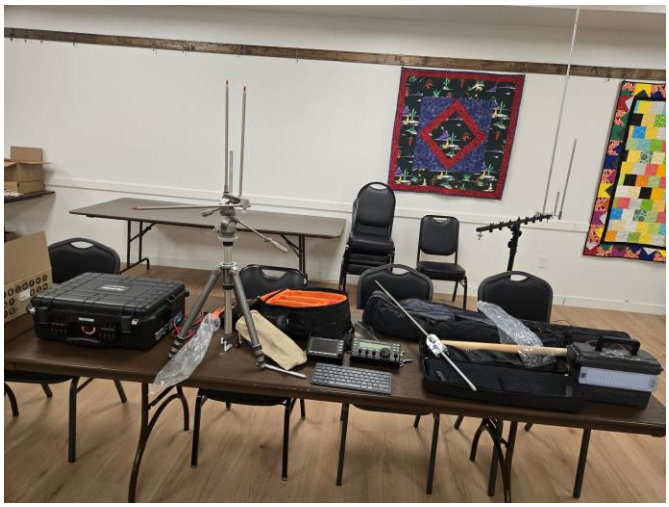
RCARC January Membership Meeting Pictures

Continued from page 9

Cake being cut serving.

Meeting Presentation – Kent from K&N Antennas shared several of his new antenna configuration.





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Kent from K&N Antennas answering questions about his antennas.

Bruno (KG7VVN)), Dick (KI7ZI) and Kevin (K2MFK) looking at one of the antennas.

Hugo (KC9OSA) looking at one of the antennas

RCARC 2025 Winter Field Day

This year's RCARC's Winter Field Day Operations was held at the Iron County Emergency Operations Center (EOC) facility on Kitty Hawk Drive between Bull Dog Road and Airport Road across from the Cedar City Animal Control Office.

Set up commenced at 3 pm. on Friday January 24, 2025 and Winter Field Day was underway at 9:00 am. on Saturday January 25, 2025 and continued until 3:00 pm. on Sunday January 26, 2025.

Field Day demonstrates ham radio's ability to work reliably under any conditions from almost any location and create an independent communications network.

Ham radio functions completely independent of the Internet or cell phone infrastructure, can interface with tablets or smartphones, and can be set up almost anywhere in minutes.

This year we operated as 4 Mike set up with call sign N7U.

See Pictures next column.

Continued on next column

Antenna Trailer setup is underway.

Antenna being attached to mast.

The tower is up and finishing measures are being taken.

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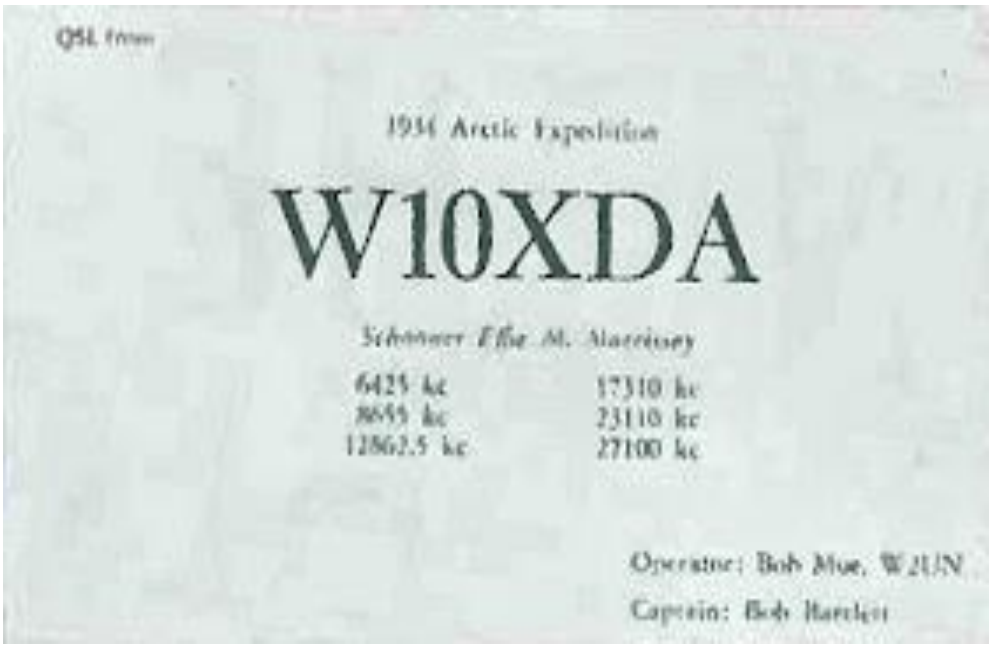
History of the 11m HAM band

First Published October 22, 2022

We know the 11m or the 27MHz (27-Mc) band as CB (Citizens Band) band. Some people refer to it as the "chicken" band. CB radio was very popular before everyone had a mobile phone and internet. When you search for the 11m band history you will read numerous sites about how 11m CB started in 1958 with highlights in the seventies of last century including movies like "Smokey and the Bandit", "Convoy" and "Handle with care". But not many know that the 11m was a legal HAM band at least in north/south America, Australia, New Zealand, South Africa and south-west Africa from 1947-1958.



Following several publications first experimental license was given to W6XBC (experimental Broadcast) in 1933, the experimental frequency was 27,1 MHz. Actually 27 MHz was considered VHF at that time. Transmissions took place from Yuma, AZ. The aim was to see if VHF was useful for remote broadcast pickups. They transmitted 1 hour per week and asked for reports. At around the same time the same frequency was used by a ship that was on arctic expedition. They used several callsigns, one of them was W10XDA.

Searching for more historical research I found that first commercial licenses were given in March 1928 to 6XAR in San Fransisco CA transmitting on 27,523 MHz, 2XBM in Water Mill NY transmitting on 27,900 MHz and 6XJ in San Diego CA transmitting on 27,900 MHz.

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History of the 11m HAM band
First Published October 22, 2022

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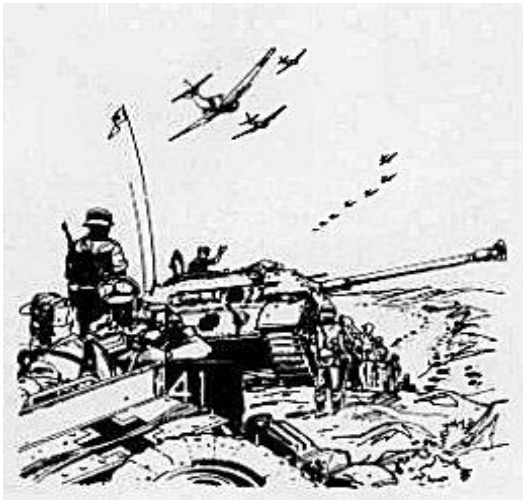
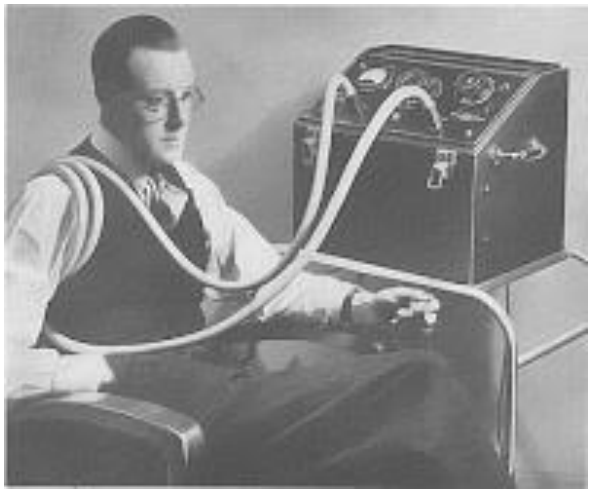
In the WW2 years 27MHz communication gear was used in tanks both by Germans



and American armed forces. A story that can be read in several old CB magazines is about discovering 27MHz signals heard from German tanks stationed in Africa. Fiction or real, a HAM from Rhode Island recorded some strange voices he heard on the 11m band. One day he played the recording to a friend who understood German. This friend realized it was some military communication between tanks and base stations. When the US Navy was called in, they found out it were tanks from general Rommel in North-Africa. Although the signals came in almost every day it seems best to receive was at a few square miles in the Rhode Island territory. Intelligence immediately took over an old farmhouse at the sweet spot and installed a few 11m receivers and German translators. Every information that was transmitted in North-Africa by the German tanks and base stations was monitored and given to the British. After the war the 27MHz was no longer in use in the military but it certainly proves that this frequency did do well in difficult circumstances.



Continued on page 15

Word Search

Signal Propagation Factors

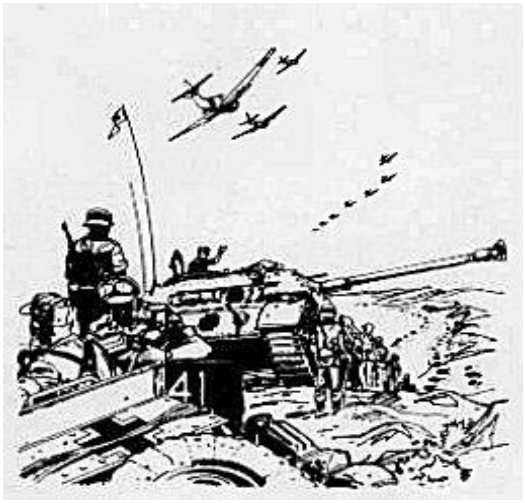
M	J	Y	F	A	B	B	Q	V	U	B	R	G	E	U
R	F	R	U	M	F	T	R	V	N	E	A	H	C	S
E	R	E	C	N	A	T	S	I	D	N	G	A	R	P
F	E	F	S	U	N	I	E	B	I	A	T	O	S	K
L	Q	R	M	N	C	O	F	A	B	M	T	M	H	H
E	U	A	S	M	O	B	R	S	O	C	U	S	D	V
C	E	C	M	A	W	R	O	S	A	Z	E	N	Y	Y
T	N	T	U	M	E	R	P	F	Y	B	N	S	N	F
I	C	I	L	T	P	H	K	H	Y	D	F	M	J	G
O	Y	O	W	T	E	H	U	O	E	U	Z	R	C	W
N	D	N	I	R	E	T	F	O	P	E	T	S	N	F
K	A	O	E	N	O	I	T	A	G	A	P	O	R	P
Z	N	J	Q	D	I	F	F	R	A	C	T	I	O	N
J	K	E	S	G	O	M	S	I	P	D	J	P	R	Z
K	U	V	J	A	R	F	T	J	Y	L	T	W	A	M

PROPAGATION	FACTORS	FREQUENCY	DISTANCE	TERRAIN
ATMOSPHERE	REFLECTION	REFRACTION	DIFFRACTION	ABSORPTION

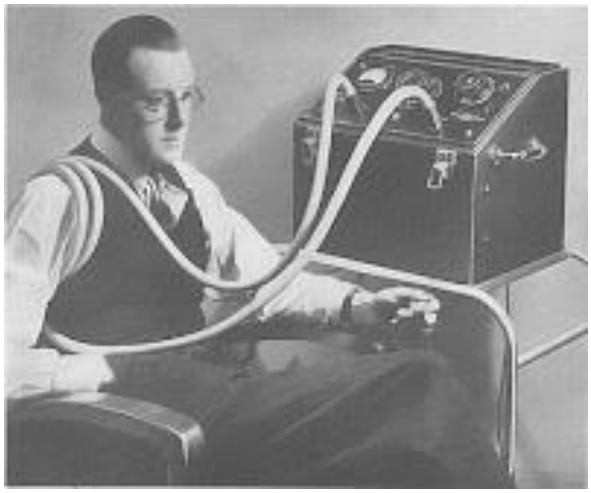
History of the 11m HAM band
First Published October 22, 2022

Continued from page 13

In the WW2 years 27MHz communication gear was used in tanks both by Germans



and American armed forces. A story that can be read in several old CB magazines is about discovering 27MHz signals heard from German tanks stationed in Africa. Fiction or real, a HAM from Rhode Island recorded some strange voices he heard on the 11m band. One day he played the recording to a friend who understood German. This friend realized it was some military communication between tanks and base stations. When the US Navy was called in, they found out it were tanks from general Rommel in North-Africa. Although the signals came in almost every day it seems best to receive was at a few square miles in the Rhode Island territory. Intelligence immediately took over an old farmhouse at the sweet spot and installed a few 11m receivers and German translators. Every information that was transmitted in North-Africa by the German tanks and base stations was monitored and given to the British. After the war the 27MHz was no longer in use in the military but it certainly proves that this frequency did do well in difficult circumstances.



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History of the 11m HAM band
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Other users of 27MHz were doctors that used this frequency for medical uses like diathermy. This, of course, was a huge source of QRM and so the 11m was not really a popular HAM band. In 1947 the FCC allows use of the 11-meter band on a shared basis with Industrial, Scientific and Medical devices. Most HAMs operate on 11m with their 10m antenna, not really effective. In 1948 Firestone Tire Company granted experimental license W10XXD for 27.255 MHz (Ch 23) using two 3Watt transmitters. All documentation about this experiment is lost but these might be forerunners of CB radios as we know it now.

Did you know that the US radio technical planning board proposed to lower the 10m amateur band by 1 MHz to 27-29 MHz. Although this proposal was later withdrawn, the ISM band (27,185 - 27,455 MHz) was not established until 1945, and the FCC hinted that it could be distributed to amateurs as a secondary service.

The 11m HAM band has been changed several times:

27.185-27.455MHz (March 26, 1946 to April 29, 1947) FCC Order 130-D (March 13, 1946), Federal Register Notification (11FR3158, March 26, 1946)

27.160-27.430MHz (April 30, 1947 to June 30, 1949): FCC Order 130-M (April 10, 1947), Federal Register Notice (12FR2815, April 30, 1947)

26.960-27.230 MHz (from 1 July 1949 to 10 September 1958)

The 11m HAM band was not only established in the USA. It seems 11m was also allowed in the America's (Canada, central/south America), South Africa, Southwest Africa, Australia and New Zealand. International DX contacts were certainly possible.

But what did the HAMs do on 11m? Did they use it for nearby contacting or did they do make some DX? I searched in some old magazines to find evidence and found some remarkable things. Activity without the need for an experimental license was from 1947-1958.

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- 1947 - The mountaineer amateur radio association operated W8BOK/8 at field day with 6 stations simultaneously. One of the stations operated "27-Mc phone".

- W3CDQ is planning a 27-Mc. 'phone-cw rig' for a net composed of amateurs connected with the Central Radio Propagation Lab. (CRPL) ionosphere group.

- Several amateur radio stations researched meteor scatter on 27-Mc

- 1948 - QST June 1948 reports W9AND, worked EL5A, OX3GE, VO4T, KH6GT, KII6BI and CXlFB. W6ZZ reports working J9AAI. All on 27-Mc.

- 1950 - The 16th ARRL International competition also counts (DX) contacts on 27-Mc.

Bands	3.5 Mc.	7 Mc.	14 Mc.	27 Mc.	28 Mc.	Total
Nr. Countries Qs0.0d	1		4		3	*8
Number of contacts						15

- 1957 - The FCC announces the end of the 11m HAM band to use it for "Citizens Band"
"Save 11 meter" contests were hurriedly organized among the Hams to show the FCC that
there really was life in the old 11-meter band. About 400 stations rose to the occasion, and
many exotic calls were to be heard, such as CX2AY, CN8JW, XE1A, ZP5IB, VK2QL, and
KC4AI. Unfortunately, these "protests" are not enough and didn't help to convince the FCC.

CB Licenses

W10XVX	250 MHZ Experimental CB 1944-1945
W10XVY	250 MHZ Experimental CB 1944-1945
W8XAF	460-470 MHZ Experimental CB 1945
W8XAG	460-470 MHZ Experimental CB 1945
W8XAH	460-470 MHZ Experimental CB 1945
KQ2XAL	460-470 MHZ Experimental CB 1948
19W0001	460-470 MHZ First Official CB License March 22, 1948
19W0003	460-470 MHZ First Official CB License March 22, 1948
KHI 1547	27 MHZ CB 1958
KNN 0522	27 MHZ CB 1969
KBU 1052	27 MHZ CB 1972
KALM 8450	27 MHZ CB 1977

AMATEUR STATION LICENSE

W8PAL	Issued-1934

Holder of the First Type approvals for Citizens Band and Radio Paging Equipments by the Federal Communications Commission CR 401, CR 402, CR 404, CR 413, CR 414, CR 430.

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History of the 11m HAM band
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The 11m HAM band came to an end. September 11 1958 was the date that 11m would be known as "Citizens Band". In fact, Al Gross W8PAL is by most seen as the man that invented CB, although the idea was already brought up in 1938 by Herbert Brooks W9SDG. His letter to the editor of QST magazine described a theoretical "Citizens Band" nearly identical to what we know today. Al Gross actually developed equipment for the UHF band since CB on an experimental basis at that time was on 250MHz and later between 460-470MHz. It looks like he had the first official CB license issued in 1948. But W2XQD was really the first one with a CB license issued February 14, 1947. It would actually take another decade before CB started on the 11m band.

Related reading links and documentation:

Detailed information about the schooner Morrissey arctic expedition radio experiment:

https://www.rsp-italy.it/Electronics/Magazines/QST/_contents/QST%201934_12.pdf

History of the 11m band documentation:

https://ukspec.tripod.com/rf/cb/

https://www.retrocom.com/wtcollect/27_megacycle_history_in_the_u.htm

https://sites.google.com/site/cb465mhz/home

Another article I wrote about Al Gross:

https://pe4bas.blogspot.com/2014/11/historical-first-time-1944-handheld.html

Update 28-11-2024:

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What You Need in Your Car for Winter

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Kitty Litter and a Small Shovel

Some people don't realize it, but or kitty or cat litter can help a car's tires gain more traction. You spread the kitty litter as far under and in front of the traction wheels and let it sit for a minute or two. It should give those wheels some extra traction to get out of that "stuck" situation unless you are in so deep, you'll need an extra assist. That's where the small shovel comes in.

Use the shovel to remove the snow in front of and behind the wheels so you can apply the kitty litter and rock the car enough for it to get the necessary traction. You can also use sand and rock salt for tire traction.

I had a friend who is a professional photographer take the two pictures of my **PLANO Fishing Tackle Box** below (which is no longer available), so this is why they have a black background.

It always pays off to have a first-aid kit in your car. You can buy a first-aid kit or prepare one by adding items to a plastic container. Some of the things you should have in the first-aid kit include:

Rubbing alcohol packets
Hydrogen peroxide
Gauze
Bandages
Benadryl
Topical ointment
Scissors

Continued next column

Prescription medications and over-the-counter medicine – particularly for a longer trip
Other essentials

These items get put to good use when you're dealing with injuries or other issues and you can't get help right away. Even if you're not in pain or dealing with a severe injury, someone else in your vehicle may end up in that situation, and you can make sure you're fully prepared for the most unexpected challenges that can happen while out on the road.

Here is what the inside of the fishing tackle container looks like; this will give you ideas on what YOU need in your emergency first aid kit for your car or truck. In case you missed this post, **First Aid: What You Need To Survive**.

Hand and Foot Warmers

Kylie reminded me about having hand and foot warmers in the car. You can pick them up at the dollar stores or even Sam's Club or Costco. Hand and Foot Warmers. You remove the hand warmer from the packaging, shake it, and in 15-30 minutes it will warm your hands and feet for up to 10 hours. They are for one-time use

Personal Hygiene Items

After we empty one of our #10 cans, which are approximately six inches in diameter and nine inches tall, we should never throw them out. If you are like me…I think to myself, "I might need this for something!" So, I stash them in the pantry or garage. Well, I have read in the newspaper that cars with adults, toddlers, and babies are sometimes stranded for hours on a highway.

All you need is the #10 can with the lid, some **4-gallon garbage bags**, toilet paper, hand sanitizer, and some **Toilet Deodorizer** or some **Biffy Bags** and you are good to go, literally! Leanne reminded me about a piece of cloth for privacy; if you don't have some cloth to hang or plastic sheeting, consider getting a small popup tent for the occasion. **Small Popup Tent**

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History of the 11m HAM band
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GM4FVM Jim came up with a story about his Yaesu FT101E. It seems the FT101 had an extra position on the band switch for 11m although it was disabled. Jim thought that 11m was still a HAM band in Australia after 1957. Till now I can't find any evidence about this or when the 11m amateur radio band stopped in any other countries. But my search directed me to other radios that had an extra position. Like the Heath DX-100 on the picture. The last position on the band switch is for 11m. I thought this was a nice addition to this history post. END.

Someone has to much time on their hands

You just have to love it.

What You Need in Your Car for Winter

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Non-Perishable Food and Water

If you get stuck in a situation where you can't move your vehicle and have to wait for help, having non-perishable food and water in your car will be useful. Be sure to have several options available, including protein bars, granola bars, a peanut butter container, trail mix, and other snack items that can provide you with protein, vitamins, and nutrients. Non-perishable snacks are always a hit with the kids.

Hazel mentioned some comfort candy, like chocolate or just candy! Maybe M&M's would be awesome unless the car gets hot. If the items will be in the car for an extended period, be sure to rotate the food items from time to time so they stay as fresh as possible.

It's also a good idea to have a pack of bottled water available to drink. While you may not expect to get stuck and stranded, you don't know what could happen, so it's best to be prepared for what could happen just in case.

12-Volt Air Compressor

A 12-volt air compressor is a must. Last summer I experienced a flat tire while heading home from a quick Wal-Mart trip. Thank goodness my granddaughter was with me to help with the tire change tasks. Our challenge was having a spare tire that had gone flat since the last time we had the car serviced and the tires checked out. Without that 12-volt air compressor to plug into the car's 12-volt outlet and use to pump up the spare, we would have been in a world of hurt!

Continued next column

Having a pair of work gloves in the car also proved very helpful. Working with that lug wrench was hard on the hands, so the gloves were lifesaving. Although we didn't need one, a tire plug set (buy them cheaply at Wal-Mart) may be something you consider having if you need a quick and temporary tire repair you can perform on the spot. **12 Volt Car Tire Pump Compressor**

Car window break tool

If you get locked out of your car, the doors become frozen shut, or the door lock mechanisms won't work for some reason, you may need to use a car window break tool to get into or out of the vehicle.

We all hope we don't have to face this type of situation, but we see emergencies on the news where car occupants can't get out of a vehicle.

This tool could prove the difference between life and death. It is worth having in your emergency supplies as you prepare the car for winter travel or a fun weekend road trip.

Cash/Small Bills

This is one that's been critical from the time I started driving. My dad made me keep $5.00 in the car if I got stranded. At the time $5.00 was a lot of money, it wouldn't go far today! That was back in 1966, driving my 1951 Chevy to school and work. You need to decide how much you feel comfortable putting in your car, it would be way more than $5.00, these days. Anyway, slip some cash in small bills, in your wallet, purse, or another place in your car to keep it in case of emergencies. It would be enough to fill your car with gas and buy food and water to get you to a safe place.

Entertainment Items

If you're like me, you have been stranded a time or two due to car accidents, icy roads, or snow-packed roads. Mark and I were parked on a California main road between Barstow, California, and Las Vegas, Nevada for three hours.

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RCARC 2025 Winter Field Day

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Fred (KI7TPD) and Ron (KI7HDX) setting up the radios.

Fred (KI7TPD) and Brody (K7VXV) working 40 and 20 meters in the Comm Trailer.

Dinner provided by Las Flores Family Restaurant.

Continued next column

Members taking a break from getting contracts and enjoying dinner.

Dennis W6DLW) working 15 meters and George (AL7BX) working 10 meters.

Field Day is coming to an end and Antenna Tower is coming down

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What You Need in Your Car for Winter

Continued from Page 21

It got boring; people were thirsty, hungry, and frustrated. If you are stuck for 3-4 hours on the highway, it would be nice to have something to help time pass a bit faster, playing cards, reading books, or whatever.

What are Some Other Car-Related Items to Consider?

Make sure you have jumper cables
An ice scraper and snow brush
A full gas tank before you start out – try to keep it near full as you travel and storms are pending
Fresh windshield wipers that will keep up with the rain or snow falling on the vehicle
Clean headlights – if your older car has foggy headlights, consider getting one of those kits that clears them up
Backup charging unit like a cell phone charger and power bank for your other devices
A lighter you can use to start a small fire if needed

Final Word

Be sure to have these essential items in your car during winter. You don't know when they might come in handy. Be safe instead of sorry by packing a bag full of these essential items, including a first-aid kit, non-perishable food, heavy blankets, and more. It doesn't hurt to have these items readily available and easily accessible, especially during the winter when the roads are wet and slippery.

If you're prepared for the hazardous road conditions, you can stay safe while waiting for help if you ever need it. End.

RCARC 2025 Winter Field Day

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Antenna Tower is coming down. Ann (KJ7OGZ) on right against fence holding guy rope.

Tower is down and beam being removed from the mast.

Meet the 2025 Winter Field Day tear down/demob team.

Picture by Terry West who was part of the team.

73 until Summer Field arrives in June.

The Rainbow Canyons Amateur Radio Club (RCARC)
is Sponsoring an Amateur Radio

Technician Class

Beginner Level for Ham Radio

Dates: Thursdays - March 6, 13, 20, 27 and April 3, 2025
with the test, Thursday April 10, 2025
Time: 6:00 pm - 9:00 pm

Where: Cedar City Senior Center
489 E 200 South, Cedar City, UT 84720

Class Cost: Free*

Study Manual: Free Download

www.ad7fo.com/training.html

Click on Amateur License Technician Syllabus (green button on left) to download. We will be teaching from this syllabus so **Please bring to class**

This class will be presented live, in person at Cedar City Senior Center. You may attend however fits your schedule but must be present in person for testing on April 10th. If you cannot make the 10th, other arrangements can be made.

Contact to register:

Linda Shokrian KG7PBX
435-867-5914 or
email: Lgshokrian@gmail.com

***While the class is Free,**
there is a $15 ARRL Test Fee
and if you pass the FCC requires $35 to issue a license