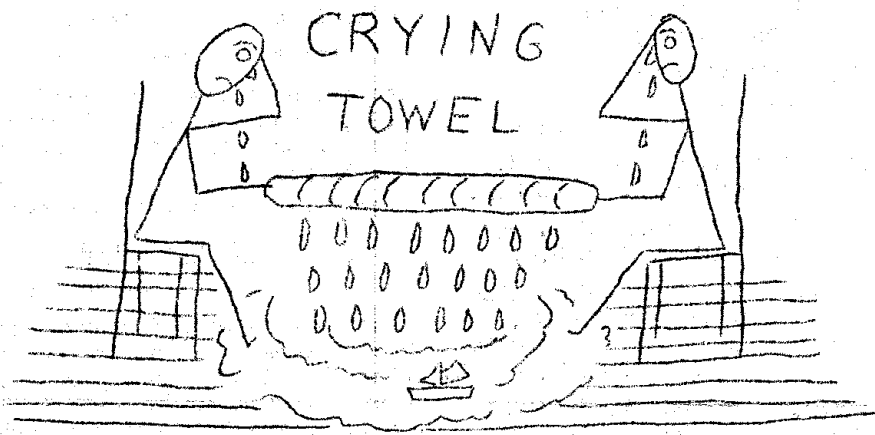


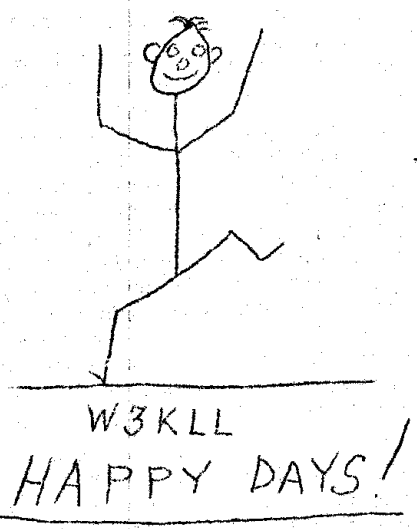
# PACK RATS CHEESE BITS

VOLUME IV MT. AIRY V.H.F. RADIO CLUB, INC., PHILA., PA. NUMBER 11  
(50.2, 144.2 and 221.4 MC)  
W3CCX  
(meeting notices, last page) FEBRUARY 1962

V.H.F. S.S., JAN. 6 + 7, 1962



Where's da sections?  
(see 'Highlights of Jan. Meeting')



"CHEESE BITS" PUBLISHED MONTHLY BY THE  
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(EX-Officio)

COUNCIL REPRESENTATIVES:  
W3AYG, John Harris  
K3LBT, Alfred Obenland

MEETINGS: DIRECTORS: Second Wed.  
of each month. 8:00 P.M.

GENERAL: Third Wed. of  
each month. 8:00 P.M.

MEETING PLACE: WEST OAK LANE JEWISH  
COMMUNITY CENTER,  
SEDGWICK AND THOURON  
STS., MT. AIRY, PHILA.

NETS: 144.2, each Monday, 0100 GMT  
50.2, each Monday, 0200 GMT  
221.4, each Monday, 0300 GMT  
NITWIT NET each Monday follow-  
ing 6 meter net at 50.2.

NET CONTROL STATIONS:

2 meters; W3SAO, alt. W3AYG  
6 meters; W3CL  
220 net, W3KKN  
NITWIT NET, W3SAO

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How many of you, when reading "Cheese Bits", take each page and flip it over the corner then turn it around to read the next page? Try opening it like a book and reading it. If I stapled it all the way down the side, you would have to open it that way.

This was brought to my attention by one of our subscribers. He asked me if I was using a new format in the January issue by arranging it so that you could open it like a book. Thinking that he had received one of the copies where I accidentally printed one page upside down I told him that was done by mistake. After speaking to him, I got an extra copy of it and tried reading it like a book, and found that it was always printed that way.

I must admit, that I was one of the "stups" that read it the hard way, but that seems to be the natural way to read anything stapled in the corner.

Here is an article that I read in "HAM-HUM", published by the AK-SAR-BEN Radio Club, Inc., of Omaha, Neb. that they got from "THE GROUND WAVE", St. Paul.

"A lot of members are like wheelbarrows not good unless pushed.

Some are like canoes,  
they need to be paddled.

Some are like kittens,  
more contented when petted.

A few are like footballs,  
which way will they bounce next?

A few like balloons,  
full of wind and ready to blow up.

Some are like trailers,  
they have to be pulled.

Some are like lights,  
they keep going on and off.

Many, thank God, are like the north  
star,

there when you need them, depend-  
able

Ever loyal and a guide to all."

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After seeing the results of the V.H.F. S.S., I can say that only the last three lines apply to the members of Mt. Airy.

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#### CONTEST RECAP

By "Mother Rat"

Last year we were fortunate to win the Sweepstakes, with adverse band conditions (a slight opening on 6). This year, we know for sure that band conditions were nil, and sections were at a premium, as the Northeast, Midwest and Western sections were in a freeze position, and we had to make more local contacts than usual.

Please do not misunderstand, this does not mean that we are number one again this year. Every club had to face the same problem of sections as we did. The final decision of who is number one lies with the contest committee of the ARRL. No matter how we stand, I would like to congratulate each and everyone for the greatest effort put forth on their part. Out of 94 members, we had 87 members on.

I would like to take this opportunity to thank Pete, K3EMA, for participating. As you know, Pete is a cab driver on the night shift, and only has Monday and Wednesday nights off, but he got right into the contest until he had to go to sleep so as to report to work at 4:00 P.M. Sunday, Jan 7. That is club spirit. I would also like to thank each one of you who participated even though you were sick. No club could ask any more from their members. In fact it was club spirit that egged you on. Congratulations.

I have no idea of how many hours each member spent on the contest, but I do know that W2EIF, Joe, was on for 34 hours and Frankie was on for 29 hours. By the scores, many others spent quite a number of hours on the air. Congratulations.

We know that it was stick-to-it-tive-ness that gave the club the final score achieved.

No matter how we fare in the final tally, I would like to congratulate Joe, W3EIF, and his committee for a job well done.

With sons who will work that hard, with the cooperation of the XYL and family, you can readily see why I am proud of the name "Mother Rat".

88,  
"Mother Rat"

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#### CONTEST TIME AT W3SAQ's

Here is an hour by hour score that I kept of Frankie's contacts in the V.H.F. S.S.

I do not do this every year, but due to weather conditons throughout the country, I just wanted to see how he could fare under adverse conditions.

First, the weather condition here.

Rain and fog  
Temperature 45°  
Humidity 98%  
Date 1/6/62

1st hour score;  
31 contacts, 1 section = 682

2nd hour score;  
61 contacts, 3 sections = 1586

3rd hour score;  
83 contacts, 3 sections = 2158  
(drop of 8 contacts per hour)

4th hour score;  
100 contacts, 3 sections = 2600  
(pouring rain-contact drop)

5th hour score;  
115 contacts, 3 sections = 2990

6th hour score;  
148 contacts, 3 sections = 3588  
(contact pick-up)

7th hour score;  
172 contacts, 3 sections = 4572

8th hour score;  
190 contacts, 3 sections = 4940

9th hour score;  
206 contacts, 3 sections = 5356

10th hour score;  
215 contacts, 4 sections = 6020

11th hour score; 1/7/62  
229 contacts, 4 sections = 6412

12th hour score;  
238 contacts, 4 sections = 6664

13th hour score;  
251 contacts, 4 sections = 7028

At this point I went to bed. Between 0300 and 0925 he only made 40 contacts but gained one section. At 0925 he took time out to get washed and dressed for church. After church, 1230 he took a nap until 1345, ate lunch and got right back on until 2400 Sunday night.

At 2100, 1/6/62 I gave him a thermos bottle of milk, a 12 cup pot of coffee and a jar of cookies. This I do every

year.

One thing I do know, out of his nine sections, (final score) seven were made on 2 meters. It seems that 2 is the band to work for sections under adverse conditions.

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Comments heard on the air about the contest; IT WAS THE CLEANEST CONTEST EVER. No one tried to delibertly jam another station.

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#### ARRL CD BULLETIN, JANUARY 1962

##### ARRL PETITIONS FCC

- (1) ARRL has now requested our government to review the status of Loran use in the 1800-2000 kc. region, looking to expansion of our amateur work, sharing with this primary navigational use.
- (2) A formal petition is in process to ask FCC to relax the present power limitation in the amateur 420-Mc. band.
- (3) Per Board action the League likewise has asked FCC for rules changes which if approved would
  - a. Relax the requirements for mobile log keeping.
  - b. Eliminate the requirement for dual identification by c.w. in RTTY work.
  - c. Provide for slow-scan picture sending (in 10 and 15 m. voice segments) with bandwidth limited to that for A3.

All of us will watch the New Year for the proposed rule-makings that will get these matters under consideration for the betterment of amateur radio. For the detailed filings on such matters and news as it develops follow "Happenings of the Month" in QST.

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O E S ATTENTION! ECHO-II SATELLITE DUE FOR RELEASE IN MARCH-APRIL '62

Because of its lower altitude and larger reflecting area than Echo I, ECHO II may prove out for permitting QSO's on 144 and/or 220 Mc. at distances of 1400 mi. or more. Ray Soifer, K2QBW, will have an article on this soon in QST. Echo II is to be a rigid 135-ft. sphere with twice the area of Echo I, and while Echo I was too high and too small for much experimentation with "bounce" QSO's, the polar orbit is to be much lower, 600 miles at first, with perhaps only 100-200 miles height as it nears the end of its expected two-year life in orbit. When this reflecting-area balloon is put up in the spring, W1AW will give you the news.

W1HDQ tells us that chances of successful OES-v.h.f. work way beyond present 2-meter tropospheric scatter 500 mi. ranges will be for those (1) with a low noise converter, (2) reasonably high power and c.w., (3) a high-gain v.h.f. beam, able to be tilted at least 35°. The latter is

most important at first while the orbit is highest. There's speculation that, due to possible interaction of EVHO II with auroral effects or Van Allen belts increasing the effective bounce area, that experimenters with top gear and readiness might find transcontinental or transoceanic work possible. K2QBW's latest letter from M.I.T. says the balloon will carry a 136-Mc. beacon transmitter. It may help in tracking to investigate special effects. Watch for more in QST in early '62 . . . but start to get the Special Beams, etc., ready now, so we can at least try some DX with each other. W1AW will give advance expectations on the ECHO II firing, when known . . . this to be followed with orbital correction data on usual Bulletin Skeds.

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#### ON AIR POLITICAL ACTIVITIES QUESTIONABLE

The League is solely an amateur organization. Amateurs are licensed to work two-way with similarly licensed amateurs. "Broadcasting" is prohibited by FCC's section 12.103. One-way communications for limited purposes for strictly amateur radio concepts are provided for and spelled out in FCC's 12.106 . . . code-practice and bulletins "solely of subject matter of direct interest to amateurs . . ."

What we're getting at is that there are some amateurs, who with the best of intentions, would like to use amateur frequencies to fight communism in an organized program such as an anti-communist network. A statement has been made that infers this activity is approved by an ARRL Director. Such is not correct, and this Director has cautioned those concerned that their activities must not conflict with FCC regulations. Their proposed amateur work is not. Let's make it clear once and for all that ARRL would be the last to approve or condone communistic activities to the welfare of the USA. Matters of politics, however, are far afield from radio amateur techniques; it is contrary to law for our frequencies to be used as a broadcast or propaganda medium. Personally we subscribe to the view that there is no better way to combat alien political philosophies than to freely talk and converse two-way with amateurs of all countries --- demonstrating the good life, how we live and use amateur radio, where we go and what we do, without political or other emphasis . . . keeping ourselves clear of slogans and directed politics of any kind!

Amateur operation must be in accord with FCC regulations. There's also the Logan act that prohibits private citizens from meddling in foreign affairs. May we suggest that all licensed amateur operators be careful to abide by both the letter and spirit of the rules.

#### BOLIVIA (CP) FILES 3RD PARTY AGREEMENT

Here's one to add to your page 64A (cardboard) insert page from Oct. QST.

Effective November 22, '61, the radio amateurs of Bolivia and the United States are permitted to exchange messages or other communications on behalf of third parties. "Such communications shall not include commercial or political information but shall be limited to conversations or messages of a technical or personal nature for which by reason of their unimportance recourse to the public telecoms service is not justified..." Also in disaster for communications relating to safety of life or property may be handles. The agreement deposited follows the language and defines the limitations on what may be handled in a fashion very like that followed by the other nations having such special agreements going beyond the prohibition in the international treaty against any handling of communications for others. Your addition of Bolivia will bring to 15 countries the list on 64A/.

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#### GENERAL ELECTRIC BULLETIN

412-62-5

1/12/62

#### NEW LITERATURE ANNOUNCEMENT

OWENSBORO, KY. --A two-page interchangeability sheet (ETR-2816) lists General Electric communications type receiving tubes, their standard proto types, and functions. Special controlled processing, stabilization and manufacturing techniques are described. Available through authorized General Electric tube distributors.

-30-

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K.U.I.

By Ed Kushner, W3HKZ

An ion membrane fuel cell battery has delivered 5.5 amps at more than 3.75 volts for 8 hours continuous operation. Experimental 3 cell device is powered by energy derived from reaction of hydrazine with nitric acid. It utilizes platinized platinum electrodes. Fuel-electrode system produces a higher power output per cell than any other commonly used type.

Watch for the run of Nitric acid in your drug store!

The FCC is receiving its usual quota of "Odd-ball" calls!

"Mysterious" actions of a garage door opener near a plant that conducts test firings of missiles was reported. The implication was that if this happened, then the garage door opener could trigger off a missile. FCC inquiry indicated erratic operation of garage door opener. However, missiles could not be set off by such devices because missile firing requires a complex coded signal that cannot be reproduced by a simple Xmtc. -----MCLW?

Denver police have all kinds of problems!

Interference to their radio was traced to a garage door opener that radiated 10 times maximum permitted. Inquiry made showed that adjustments made on a recent servicing job had shifted frequency to the police band.

Hospitals, which are always getting in trouble radiating, particularly with diathermy, have been complaining about their electrocephalograph (brain wave analysis) receiving FM stations. When they were shielded correctly then they worked right.

Amperex has a replacement out for the 5894. It is the 7854, you can put 1000 volts on plate and run 165 watts output on 2 meters, but you have to put a fan on it. But---costs more.

RCA has come out with high power small tubes, for mobile primarily, that go up to 500 Mc. They are 8072, 8121, 8122, They run 100 to 300 watts output. Cooling is the added problem here!

Motorola has come out with 45 amp alternator modification kits for your mobile rigs and Johnson has a noise suppression kit for your car for \$13.50. Above items for the 1Kw mobile puffs!

FCC has given commercial mobile radio users to November 1963 to shift deviation down to 5 KC. Look out for good buys in the older, wider band equipment.

4 frequencies in the 46 Mc band have been given up by scatter communication and will be given away to local use, may turn out to be good beacon signal for 6 M band openings!

A west German monitoring service asked for identification of strange messages which seemed Japanese. FCC determined that the signals were sent by a system for transmitting Chinese characters. They were found to come from a station near Peking, China. Verticle polarization?

A satellite tracking station in Alabama has interference on tracking "Iota I". The culprit was found to be a transmitter near Madrid, Spain. Contact with the Spanish Government resulted in spurious emissions being eliminated. Is this "STI"?

SPS type rough noise in 80 band in Arizona sent monitors out hunting. The complainant accused a neighbor, a ham. However, he was cleared, as is usually the case, so the FCC next tried an electrical plant. There was plenty of noise but not their fault. They found the trouble on a turkey ranch. A loose power line connection to a large pump. Maybe SPS has a loose wire?

A field engineer visited the home of a CB friend, who was the subject of numerous complaints, and he found the walls plastered with DX QSL cards, which is prohibited.

He returned his CB license to the FCC and went after his Ham license so he could work DX. Not a DX card since?

A recent report squelches rumors that Teflon is dangerous. Only when it is heated to 750 degrees may it be temporarily discomforting, so don't cut it up in small pieces and put it in your cigarettes or pipes!

Those overhead radar signals that operate the traffic lights in many intersections work on the doppler frequency shift principle on 2455 Mc. You can use it to calibrate your microwave frequency meter?

Heathkit has a dummy load out for \$9.95. It handles up to 1 KW to 300 MC with less than 1.5 V SWR and is shielded at 50 ohms. It has a coax connector for xmtr and a phone jack for the DC output for relative power measurements. One gallon of oil cooks the temperature-stable resistive elements, oil not included in cost. Oil is stored in boxes on P.E. poles.

The new Heathkit VFO, that is used from 80M to 2 M has been extremely stable on 6M, as tested during VHF Contest.

When using Heat Pawnee or Shawnee as fixed station, feed the I.F. output into your 80 M band receiver for excellent selectivity with sensitivity.

Long distance communications via the moon are being experimented with to determine optimum frequency, type of modulation and antenna size. They are now using 210 MC using 1KW transmitter and Jodell Bank radio telescope. Note: 10 P.M. Monday gang.

A study of UHF space communications using the moon as a reflector are being conducted. Signals at 440 MC from a xmtr at College, Alaska were reflected and received. Note: in  $\frac{3}{4}$  M band.

The noise figure of a variable-capacitance Parametric amplifier can be greatly improved by refrigerating the diode. Save those old refrigerators and air-conditioners!

Transmission of power without wires has been an unfulfilled dream for more than 50 years. Interest dates back to 1899 when Nikola Tesla tried it at a 2 hundred KC, he failed. A typical system envisioned would involve a 350 foot antenna on the ground operating at 6000 MC and a 50 foot receiving antenna. At 65,000 feet above, at 200 KC output they think they can keep a helicopter operating. Practical?

Reflections of radio from the sun are 50 to 100 times less than ~~two~~ reported a year ago. These tests are to obtain information about the nature and extent of electrical phenomena and disturbances in the solar corona, rather than measure the precise distance from Sun to Earth. This system is built around a xmtr, operating at 500,000 watts output at VHF. The signal is applied to an array of 1,024

dipole antennas in 8 rows, 15 feet apart and about 1/3 of a mile long. The antenna concentrates the signal in a tight, fan shaped beam 15 degrees wide in E-W direction and 1/4 of a degree in N-S direction. In each run on the sun, the xmtr operates 16 minutes. The signal takes about 8 minutes to travel 93 million miles to the sun and another 8 minutes to return to earth. After 16 minutes, as echoes begin to come back the receiver goes into operation. The fan shaped beam of the antenna is aimed at the sun by electrical adjustments, as the antenna is built on the ground. In order to dig out the signal from cosmic noise and the sun's noise, a certain frequency pattern is modulated. By switching carrier frequency up and down 8 KC at 8 second intervals, it can be found in the noise and unlike radar, this is continuous transmission and no a train of pulse.

Good Luck,  
73, Ed, W3HKZ

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#### THANK YOU

We bow our head in humble thanks to the editor of the B.C.A.R.C. "X-Mitter" for the following;

"The VHF Sweepstakes on the weekend of the 6th and 7th was the usual jumble of wild QRM (using any band as a standard), with the usual lousey winter propagation. The outstanding feature was the degree of organization and discipline displayed by the Packrats, who were underfoot racking up top scores everywhere. I expect I could have heard them on 160 except I haven't anything to tune 160."

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#### CLUB HISTORY

By Frank Brick  
W3SAO

#### THE SECOND YEAR OF THE PACK RATS

In May, 1957, the club was invited to participate in a program to instruct Boy Scouts in obtaining ham tickets. Mr. George Kohler, of WFIL, met with a group of directors at the radio transmitter of WFIL. This project was supported by the club and many of our members gave up their time to travel to Whitmarsh once a week and did a fine job. However, the project came to a sad end due to the lack of interest on the part of the Boy Scouts.

In June, 1957, our first TVI Committee was formed consisting of W3HWV, Chairman, W3DHH, W3EMG, W3FOZ and W3CCX.

The election of officers and directors was held and the outcome was as follows:

President; W3OZP, Bill Miller  
Vice-pres.: W3FOZ, Charles Koelsch  
Secretary: W3SAO, Frank Brick  
Treasurer: W3CPT, Ken Harrison

Directors: 2 years  
W3CL, Harry Stein  
W3CFS, Oscar Jacoby

Our speaker, Mr. Barnes, of the Bell Telephone Co., gave a talk on the mighty mite, better known as the transistor.

The 2nd annual picnic was a success and was held at Fort Washington State Park, Flourtown, Pa.

The August meeting was held at the QTH of W3KKN, Ernie. A 6 meter project for the club was discussed. A new meeting place was to be found. The meetings at this time, were held on the first Thursday of each month.

At the September meeting, delinquent members had already received their notices and proper action was to be taken at a later date.

President, W3OZP, appointed W3FSC and W3SAD to look for a new meeting place and have the meetings held on the third Wednesday of each month as that was the time most suited to the majority of the members.

The six meter project was now under way.

John, W3AYG, announced he would conduct a code class each Thursday at 8:30 P.M. on 147.3 MC.

The November meeting was held in our new QTH, West Oak Lane Jewish Community Center, Sedgwick and Thouron Sts., Mt. Airy, Phila.

Our 1st member was dropped from the rolls for delinquency in dues. The membership voted on this matter.

President, W3OZP, gave one of the most sincere and level headed quoting of the Constitution and By-Laws ever given. He stressed the fact that membership was by invitation only and also two sponsors were required on an application. He stressed the fact that if an applicant is blackballed, it is also a reflection on the sponsors who proposed the applicant. Personal differences are not considered as reason for a blackball, however, proof of immoral character is considered a reason. A motion to have all future elections of an applicant for membership a secret ballot was defeated.

President, W3OZP, announced an emergency net on any meeting night when the weather is inclement, forcing a cancellation. The frequency will be 144.2 and 50.2 Mc at 1900 to 1930.

In the Jan V.H.F. S.S. of 1958 we came in 5th place with a score of 169,946. Top man, W3KKN, Ernie, with 22,848 Points.

The February meeting set the date for our second Ladies' Nite, to be held on April 12, 1958 at the Southwark A.C.

John, W3AYG made a motion that we obtain the call W3CCX, our deceased member, Matt Gelardi, who passed away suddenly on Februar 4th, as a memorial to him. Our first "Silent Key".

It was decided to hold this motion over until the wishes of the family could be determined.

We had as our speaker, Mr. Appelgarth of NARCO, who explained samples of their xmtrs and rcvrs. He also suggested a "Garbage Can Filter", for 2 meter converters.

At the March meeting, W3OZP, reminded members to notify the secretary of a prolonged absence. Also members should check with the Treasurer on their dues status.

The speaker of the evening was W3JAY, Doc Nichols who gave us a fine talk on the effects of electric shock on the heart.

The April featured a temporary amendment to the By-Laws, by W3CPT, to defer nomination of officers until the June meeting and the election until the July meeting.

W3KKN suggested that members be appointed to report band conditions for material for "Cheese Bits".

"Cheese Bits" was born.

K3CIV was given a vote of thanks for obtaining our first mimeograph machine for the printing of "Cheese Bits".

W3FSC was commended, by the President, for conducting code classes for the Boy Scouts of the Community Center.

The speaker of the evening was Charlie Badgett, W3LVF, Vice-Director, Atlantic Division, ARRL.

W3CL was appointed spokesman for the club at the Abington Township meeting concerning the height of ham towers.

The May meeting was held in the auditorium of the Center on the 27th.

The speaker was W1HDQ, Ed Tilton, V.H.F. Editor of QST. The subject of his talk was "Getting The Most Out Of Ham Radio."

60 Hams were present and we had visitors from most of the area clubs.

This was one of our best meetings due to the fine speaker. Refreshments and rag chews which followed were enjoyed by all present.

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The "Second Year" will be continued in the next issue.

73,  
Frankie, W3SAO

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GOLDEN ANNIVERSARY OF AMATEUR  
RADII - 1912-1962

From the March 1962 issue of Electronics Illustrated.

(Editor's note; Either they are a month ahead of themselves or I'm a month behind. Today is January 17, I hope. I haven't received the February issue yet.)

By Robert Hertzberg, W2DJJ and Eli Flam.

- \* HALF A CENTURY AGO. AN ACT OF CONGRESS CREATED HAM RADIO
- \* WINNER OF THE FIRST LICENSE IS STILL AT HIS KEY AS W1ZE

It started half a century ago. The air even then was filled with signals from commercial wireless telegraph stations and a couple of thousand unlicensed and unregulated experimenters. Clearly something had to be done to bring order out of chaos. So in 1912 Congress passed Public Law 264, "An Act to Regulate Radio Communication." The law gave official status and a license to radio amateurs, and constituted the birth of a hobby that has fascinated and captivated hundreds of thousands.

On December 12 of that memorable year of 1912 representatives of the Departments of Commerce and Labor, which had been chosen to administer the communication law, began giving examinations for wireless experimenters at the Brooklyn Navy Yard. At 7 o'clock in the morning a 22-year-old chap named Irving Vermilya showed up to take the test--with shaking hands and a butterfly stomach, like every ham since then--and won the first Certificate of Proficiency, thus becoming the No. 1 radio amateur in the country.

In 1962, the Golden Anniversary year of ham radio, we have more than a quarter of a million amateur licenses in the United States. Still active among them is . . . Irving Vermilya, now W1ZE. Irving lives in a cottage overlooking Buzzards Bay at Mattapoisett, Mass. Now 71 and retired, he spends several hours every day in his ham shack, working both phone and CW. Although he prefers to work other New England operators and belongs to some regional nets, W1ZE now and then does a little DXing and is well known to hundreds of other amateurs.

Actually, Vermilya was an 11-year veteran of wireless telegraphy when he got his license. His witnessing of a historical event in radio had given him his interest in the hobby in 1901. Young Irving, then living in New York City suburb of Mount Vernon, was taken on a trip by his pastor to Goat Hill (Later Signal Hill) in Newfoundland. The date, coincidentally, was December 12, and Irving watched an Italian engineer named Guglielmo Marconi receive the first transatlantic wireless signal, the letter S, sent from Cornwall in Great Britain. Marconi later gave the minister two coherers and two tappers and Irving ended up with one of each.

In the early days the most important application of wireless was between ships and shore stations and Vermilya was a ship "sparks" before becoming a station engineer. He retired from WNBH-WFMR in New Bedford, Mass.

By Smel A. Rhat

After interference got so bad that Congress took its 1912 action hams were no longer able to use any wave-length and power desired, but they still had a lot of freedom. Commercial stations took over 300 and 600 meters and the "tinkerers" were told to stay below 200 meter(1,500 Kc).

At that time 1,500 Kc. was considered pretty useless and anyone who ventured into higher frequencies was some kind of a nut. Every ham knows the result. This banishment to the wilds of the "short" waves forced amateurs to do experiments leading to the wide use and popularity of the higher frequencies.

A typical ham station of 50 years ago had a primitive receiver using crystal detectors, slide-adjusted tuning coils and headphones. But the impressive item was the transmitter. It had a hugh, coffin-like transformer putting out 20,000 volts or so, a big bank of capacitors and an open-air spark gap. When the brass transmitting key (the operator became known as a brass pounder) was presse, the capacitors discharged through the spark gap with a lightning-like crash that made women and children run for cover.

All communications then were in code, of course, Phone transmission, made possible by Lee DeForest's Audion tube, did not become popular until after World War I. Meanwhile, hams had decided they needed a national organization to look out for their interests and in 1914 had set up the American Radio Relay League.

Amateur radio at first grew slowly. In 1945 there were only about 50,000 hams. But since then the hobby has mushroomed until today there are more than 250,000 licensees.

Irving Vermilya, although he's moved some 40 times during his career, has never been without his ham gear. But in 50 years he's gone a long way. And so has amateur radio.

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For illustrations of early ham gear, QSL card and first YL, we suggest that you purchase Electronics Illustrated, March, 1962.

We know that the foregoing will only be one of a number of articles on amateur radio in this year of their 50th Anniversary. We will not reprint all that we see. We suggest that you keep your eyes open for further articles in QST and other radio publications.

I, personally feel that here is a good time for the Delaware Valley Council of Amateur Radio Clubs to have an exhibit of gear, from the early days until now. This is my idea, what the council does is their business.

We have come a long way in amateur radio, even to putting a satellite in orbit. Where do we go from here?

I hope that all of you Rats thoroughly enjoyed yourselves during the recent fracas on January 6-7. It begins to look as if the Pack Rats have retained the "Gavel" for another year. As a matter of fact IF we win, we will be presented with a duplicate of the one we got last year, so that the president and vice-president can pound away at the meetings at the same time!

The contest was accomplished without a band opening or aurora for the first time in years. Ground wave on the second day was very good, to make section hunting comparatively easy.

The club did very well by all reports in spite of QRM, breakdown, lack of openings, antenna collapse, ill health angry XYL's and other minor items. Looking over the bands it is very apparent that the Mt. Airy VHF Club was the only one that seemed to generate a lot of interest in its nets after the contest. It was quite gratifying to note the interest, both by our own members and many non-members, in what the club had done. If a contest has any value, which can be demonstrated, it is the one showing a club pulling together in a common cause. It has given the Pack Rats a cohesiveness which would be hard to obtains by any other means.

In line with the club objectives and constitutional requirements to promote the use of VHF activity, a project is under way to get more members on 220 megacycles. The means etc will be covered at the January meeting, but in case you didn't get to the meeting, the information is that a new source has been found for obtaining a very fine transmitter and receiver for 220 megacycles at very low prices. Quantities seem to be in good supply also,---If you're interested better get on the bandwagon. Club members on 220 are W3KKN, W3CL, W3HKZ, K3GAS, K3LBT, W2AXU, W3IHT, K3IUV, W2EIF, W2KFC, K2SMZ and W3NSI. There are others on from York, Pa., Wilmington, Virginia, N.W.J. and N.Y.-L.I. as follows; K4RAY, W3FEY, W3UCA, W3CGV, W3HIX, K3DZM and many others.

Best of luck on all bands,  
Smel.

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SWAP & SHOPPE

Conducted by, W3ZRR, Ray Whitehead  
4534 N. Smedley Street,  
Phila., 40, Pa.  
215- DA. 4-5910

FOR SALE: 1 Gonset Communicator III  
6 meter, 6 volt \$195.00  
with VFO.  
TO BE SOLD WITH GONSET  
1-6 meter saturn halo with  
mount \$10.00

Contact: K3BCV, Charles Royer  
1609 Hanover Acres  
Allentown, Pa.



SWAP & SHOPE (cont'd)

FOR SALE: Surplus receiver either BC or ARC 5 to tune broadcast band.

CONTACT: W3IXL, Ellis Hersch 8435 Cedarbrook Avenue, Phila., 18, Pa. 215- CH. 7-7325

FOR SALE OR TRADE: NEW BOTTLES 2 - 805's 2 - 873's 2 - 872's 2 - 465A's

CONTACT: K3HWZ, Bill McCutcheon 124 Orchard Lane, Feasterville, Pa. 215- EL. 7-4972

FOR SALE: NC 183 receiver, perfect condition \$160.00

CONTACT: W3FSC, Oscar Jacoby 1618 E. Barringer Street, Phila., 19, Pa. 215- WA. 4-8913

FOR SALE: 1-Gonset tri-band converter 10, 20 and 80 meters \$25.00 1- Gonset Communicator III \$180.00 1- carrying case for above \$8.00 1- Nat'l 6 & 2 VFO \$34.00 3- Gonset thinline xtals 50.2, 50.55 & 50.70 \$2.00 Each 1- Shakespear whip with spring - 6 meters \$9.00 1- 4 element 6 meter beam \$9.00 1- Shure mike, 505C \$9.00 1- Alliance TV Rotator \$9.00 1- Olds trumpet tone silver & gold, complete with case and mutes \$165.00

CONTACT: K3JJZ, Elliott Weisman 8533 Algon Avenue, Phila., 15, Pa. 215- PI. 2-3525

FOR SALR: 1-Sederal No. 240 enlarger 1-Ansco contact printer 3- 7x4 glass trays 3- 4x5 bakelite trays 2- 1 gallon chemical bots. All for \$15.00 1-Webcore recorder \$50.00

CONTACT: K3RNS, Harry Hanauer 8451 Loretto Avenue, Phila., 11, Pa. 215- PI. 2-3116

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WHAT HAPPENS

The harmonic of W3HYD, Lenny, took his copy of "Cheese Bits", Sept, 1961, to school and never returned it. Lenny saves all of the copies and keeps them in a file, but is now short this one. It is the one with the comics on the cover page. If any of our readers, who do not save them, should happen to still have that copy, we would appreciate them sending it to Lenny. His address is; 126 Abbottsford Ave., Phila., 44, Pa.

We were sorry to hear of the passing of the father of W3OZP, Bill, and also the passing of Bert's, W3TNP, XYL of W3KKN, brother. We extend our sincere sympathy to both families.

We are sorry to hear that the Jr. Op. of Sid, W3GEW, is seriously ill. His handle is Gil and he is K3WDA. We all wish him a speedy recovery.

Who was 2 when called on 6 on Monday, January 15, 1962?

WA2WCR, Charlie, the brother-in-law of W3ASD, Karl, is home from the hospital and is doing OK. Welcome home, Charlie.

Don't forget the "Old Buzzard's Net" on Tuesday's at 2100 on 51.6.

Ossie, W3FSC, you now have a "hot-shot" signal. Happy?

Earl, K3HJA, is running 15 to 60 watts input. On what?

Frankie, W3SAO, is now using a nuvis-tor converter on 6.

Congratulats to Joe, W3GEC, on his recent marriage, December 26, 1961. The XYL's handle is Pat.

Congratulats to Ed, K2TYW, and XYL, Betty, on their 18th wedding anniversary, January 17. That's why Ed was not at the meeting.

On TV's "Play Your Hunch", of January 10, 1962, WA2HLU, Martin Rattner, of Williston, L.I., was a part of a problem presented to the contestants where they were to find the Ham by the language used. He stumped them.

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HIGHLIGHTS OF JANUARY

MEETING

Our visitors were: Woody, K3KKM; Dave, K3BPK; Bob, K3IKF; Bob, K3IOK; Paul, K3EOU and Mike, W3WED.

Our birthdays for January are: Jim, K3EHQ; Ted, W3BVR; Ralph, K3CIV; (74, Ralph? My oldest son.) Ossie, W3FSC; Jule, K3MSV and George, W3BYB. Congratulations, boys.

The club extended its sympathy to Bill, W3OZP, on the loss of his father and to Ernie, W3KKN, on the loss of his brother-in-law.

Harry, W3CL, reported on the nets, especially, Monday, January 8, the night after the contest.

21 on 144.2 36 on 50.2 14 on 220

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CRYING TOWEL

W3BRU, Ted; Hoaras voice, asked us to turn our beams NW.

W3CXU, John; No breakdown. Rotator by whommy W3FSC, Ossie.

W3BYB, George; Lots of fun

K3GAY, Don; Only worked 18 Pack.Rats. 800 V on P of 6146 N.G. 30 hours on and only 44 contacts.

CRYING TOWEL (cont'd)

(In reference to Don's score. That is how rough conditions were only 60 miles NW of Phila.)

W3AYG, John; 2 meter CW good for sections.

W3UMI, Willie; Better than last year. plate transformer burned out.

W3ZEY, Russ; Fine contest, but missed a lot of the Pack Rats.

W3WED, Mike; (a visitor) Not over it yet.

W3GEW, Sid; Rock bound with 11 xtals.

W3MXW, Joe; Enjoyed the contest. worked 61 members and commented on the gentlemanly conduct. For-got to count E. Pa. as a section.

W3KLL, Walt; Happy Days, first time in two years his company did not send him out of town. Had a ball.

K3BEF, Al; Loaned out xtals. Only had 2 xtals for contest.

W3CFS, Ed; W3MXW did not bother him.

K3KMN, George; Started on 6. 2 band saver. VFO and xtal on both.

W2KFC, Lee; No breakdown, lots of QRM in Jersey.

W3FSC, Ossie; Helped W3IBH, Charlie, get on by giving him the 5763's he needed.

W3FQD, Dick; No Breakdown. Fix-up for next year.

K2SMZ, John; No tears. Nice contest.

K3EPB, Howard; Thanks for points and congratulations to all Rats. Worked 60.

W3CPT, Ken; Stations did not tune where they said.

W3KKN, Ernie; Good brawl. High scores near end. Sunday slow.

W3IBH, Charlie; Soft tubes held up.

K3JJZ, El; No breakdown.

K3MSV, Jule; Rain caused wash out, gas main broke. Gas Co. came with portable generator for jack hammers. When Jule told them that they were interfering with his rig, they thought he was nuts. Explained to them that he was in a contest for radio.

K3HJA, Earl; No breakdown. Had to take mother-in-law to airport and plane was two hours late.

K3LBT, Al; K3ALK, George knocked his receiver off.

K3GAS, Doc; Antenna must be up higher and must work 2 bands.

K3HSS, Charlie; Trouble with rig.

K3BHK, Jerry; Called K3HSS and W3IHT to no avail. Had 2 breakdowns.

K3ESL, Ben; & K3BPK, Dave; No complaints in January. Thanked the gang for antenna raising.

Also complimented the Rats on good conduct during contest.

W3HFY, Hal; Nuvisor Converter saved the day. Had guests on Sunday.

K3IKF, Bob; (a visitor) 8ft mast and 10' box, containing new antenna had to be brought home on E1 and trolley, but trolley motor-man would not let him on. His father picked him up, and the antenna fell off the roof of the car. Had to carry up three flights of stairs and assemble in room. Some fun.

W3LHF, Dave; Fine contest. No overload due to nuvisor converter.

W3CL, Harry; Lot of fun. W3IBH had 300 contacts on 2 meters. Harry on from 2 until 2 Sunday morning.

W3AJF, Horace; Lots of noise caused by rain on power lines. Modulator blew up at 8:00 P.M. Sunday.

W3CLT, Doc; Had a good time.

K3NCN, Kelly; Rig blew up at 11:30 Saturday night.

W3KXH, Jim; All set. Clock disconnected- tripped over wires. Enjoyed the contest.

W3HAB, Monroe; Contacts with S.N.J. OK. Hard to work Phila.

K3KKM, Woody; (a visitor) on 4hours, 40 contacts. Domestic problems.

W3MYF, Dave; No problems. 27 hours on air.

K3ALK, George; Rough time but enjoyed it.

W3HKZ, Ed; Cleanest contest ever.

K3AUH, Al; TVI phone calls.

K3HWZ, Bill; All OK

K3EOD, Al; No voice at all. Tents hard to pitch on stone tower.

K38PP, Walt; 2 meters helped. Get rigs ready now. Don't put antennas up on morning of contest. VFO problems.

K3IUU, Bert; interference due to power line loss. VFO went bad. Receiver quit. Borrowed one, did OK. Courtesy shown. Sections were made by turning beam.

W2EIF, Joe; Enjoyed contest. Rigs back together 15 minutes before contest.

W3SAO, Frankie; No major breakdown in three years. Magnetized relay on transmit-receive switch. Worked 80 members out of 87 on.

W3ZRR, Ray; time lost due to work, never catch up. 6 meter rig out.

W2AXU, Jack; Thanked all members for participating.

W3HYJ, Joe; Rotator broke and beam got stuck up north.

W3FOZ, Charlie; Two meter beam broke. Climbed on roof and mounted a Halo.

W3CKP, Warren; Infected wisdom tooth had to take time out for the dentist.

W3JSD, John; Had a mobile station riding in front of his house jamming him. (May be the same party that parked in the driveway of W3KKN and tried to jam Ernie.)

MEETING NOTICES

FEBRUARY 14

DIRECTORS MEETING

The Board of Directors meeting will be held at the QTH of W3SAD, Frank Brick, 829 W. Fishers Avenue., Phila., on Wednesday, February 14, at 8:00 P.M. If for any reason you are unable to attend, please call 215- DA. 4-7525.

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FEBRUARY 21

GENERAL MEETING

The regular meeting will be held at the West Oak Lane Jewish Community Center, Sedgwick and Thouron Streets, Mt. Airy Phila., Pa., at 8:00 P.M.

Well, there is the "Crying Towel". As you can see there were very few crying. All got on, worked out their problems and had a good time.

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LATE SWAP & SHOPPE

FOR SALE: TEFLON WIRE  
 24 GA. \$2.00 per 100'  
 22 GA. \$2.50 per 100'  
 TEFLON SHIELDED CABLE  
 22"GA. \$4.00 per 100'  
 SILICONE HIGH TEMP. SPAGHET-  
 TE  
 11 GA. \$2.00 per100'  
 BNC RIGHT ANGLE RECEPTACLES  
 3 for \$1.00 (Teflon insu-  
 lated)

CONTACT: K3MAX, Walt Roberts  
 215- HO. 7-0212

FEATURE OF THE EVENING

!!! AUCTION SALE !!!

AUCTION SALE !!!!

!!! AUCTION SALE !!!

AUCTION SALE !!!!

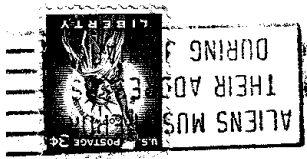
All you guys with nuvis-convertors, dig out your old 417A's or transistor convertors for sale, Hi!

Don't bring junk, but usable gear.

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WORKING BOARD MEMBERS  
AND THE BOARD OF DIRECTORS  
OF THE NATIONAL ASSOCIATION  
OF AMATEUR RADIO



JAN 20 1962

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829 W. FISHERS AVE.  
PHILA. 41, PA.

**GOLDEN  
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1912-1962**