



MT. AIRY V.H.F. RADIO CLUB, INC., PHILA., PA. (50.2; 145.2; 221.4; 432.2 \$ 1296.4 MC)

CLUB CALL: W3CCX

AFFILIATED MEMBER: AMERICAN RADIO RELAY LEAGUE

EDITOR: HELEN BRICK, XYL, W3SAO (MEETING NOTICES: LAST PAGE)



NUMBER 10

VOLUME VII

OUR PREZ SEZ



Now that the Holidays are put of the way, we can all concentrate on the next order of business, the January Sweepstakes. I hope you all enjoyed yourselves and best wishes for a healthy and happy New Year.

By the time you receive this issue, you should be in the last minute frantic throes of making sure all equipment is in readiness. I hope all of you had the time and foresight to make sure of things earlier and this week is strictly for checkout. In any event, my sincere good wishes and best of luck in the contest.

It is not too early to think of another club effort, the June QSO Party. W2EIF, Jo, has graciously accepted the Chairmanship and all those wishing to serve with him should 1et him know. All of us who participated last year had a nice weekend and enjoyed every minute. I see that our fellow member, K3EMA, Pete, had a nice article printed in Ham Buerger's QRN. It was about 'time' and well worth reading.

The January meeting promises to be one of the wettest meetings in our history. This will be the 'Crying Towel' session when each member relates his experiences during the January Contest. Don't miss it!

Articles for Cheese Bits are always welcome, so you budding writers can gain valuable experience and also see some of your efforts in print.

73. K3GAS. Doc

(Aside to K3EMA, Pete: Mama's going to slap your hands. A beautiful write-up for "QRN", but what's wrong with Cheese Bits?)

CHEESE BITS IS PUBLISHED MONTHLY BY MI. AIRY V.H.F. RADIO CLUB, INC., PHILADELPHIA, PENNSYLVANIA

\$1.00 a year

WE OPERATE ON AN EXCHANGE BASIS WITH OTHER PUBLICATIONS, AND ANYTHING THAT IS PRINTED IN "CHEESE BITS" MAY BE RE-PRINTED, UNLESS SO STATED, IN ANY PUB-LICATION AS LONG AS PROPER CREDIT IS

DEADLINE FOR ARTICLES: 20th of the

ALL INFORMATION SHOULD BE SENT TO THE EDITOR: HELEN BRICK, XYL, W3SAO 829 W. Fishers Avenue, Phila., Pa. 19141 215- DA. 4-7524

TRUSTEE OF CLUB CALL: W3CCX W3SAD, FRANCIS BRICK 829 W. Fishers Avenue, Phila., Pa. 19141

DIRECTORS meetings are held the second Wednesday of each month at designated locations.

AWARDS CHAIRMAN: WZEIF, JOSEPH KILGORE 5 Sunnybrook Court, Stratford, N.J. 08084

MONDAY NIGHT NETS:

8:00 P.M. - 145.2 9:00 P.M. - 50.2 10:00 P.M. - 221.4

OFFICERS: 1964-1965

PRESIDENT: K3GAS, DOC CUTLER

VICE-PRES: WZEIF, JOSEPH KILGORE COR. SEC.: W3SAO, FRANCIS BRICK REG. SEC .: W3HAB, MONROE POWELL TREASURER: W3MVF, DAVID BLach

DIRECTORS: K3HWZ, BILL MCCUTCHEON W2AXU, JOHN POWER W3LHF, DAVID ZIMMERMAN

W3HKZ, ED KUSHNER (by Appointment)

K3CIV, RALPH HERSH (EX-OFFICIO)

JANUARY BIRTHDAYS

K3KKM, Woody; W3MFY, Pres; W3ELI, Van; K3MSV, Jule; K3EHQ, Jim; W3BYB, George; K3VPP, John; K3ACR, Rich; K3OBY, Jim; K3CIV, Ralph; W38VR, Ted and W3FSC, Ozzie.

PHILA. COUNTY AREC MEETINGS

PLANNING COMMITTEEL Wednesday, January 27, 8:00 P.M.

GENERAL MEETING: Wednesday, February 3, 8:00 P.M.

MEETING PLACE: GILBERT SPRUANCE SCHOOL, LEVICK & HORROCKS STS.

At the December 2nd, general meeting, K3KTY, John Tate, was appointed the . new EC for Phila. County.

The radio training course at the Shriners Hospital will commence on 🥕 January 2nd with K3WEU, Paul, in charge many years of wanting SSB equipment. FCC will conduct exams for those who 73, (sig.) Jim rate General Class Licenses.

"FIRE DESTROYS TOWNSHIP HALL IN WILLingeoro; 3 injured"

The above headline appeared in the Phila Inquirer on Wednesday, December 9. What did not appear in the paper was ARPSC at work. We entitle it:

GREATER DISASTER AVERTED BY HAM RADIO

ա3ELI, Major George S. Van Dyke, Jr, picked up the QRRR of WAZTHL, Armand L. Caron, 48 Brierdale Lane, Willingboro, N.J., mobile, at 9:20 A.M., Tuesday, December 8, 1964.

He learned that the Municiple Building stored combustable liquids for use of the Civil Defense Council. George contacted the Willingboro police, via landline, and they were able to remove it, thus averting a number of explosions, and, perhaps loss of life.

Time Elapsed: 1 minute.

(Note to K3KTY, John: Sorry we omit⊶ ted you in the stamp ceremonies, but at the time the plans were made, Van was still the EC.)

NEW DIRECTOR APPOINTED

At the December Directors' Meeting, Doc appointed W3HKZ, Ed Kushner to serve the unexpired term of W3FSC, Oscar Jacoby, who, due to out-of-town business committments, found it heat possible to complete his elected terms

LETTER FROM EX-PACK RAT

To W3CL, Harry, from W2UZN/4, Jim Throop, 5408 Berry Hill Road, Norfolk, Throop, 540 Va. 23502.

I'm stationed in the Norfolk area now at the Staff, Operational Test and Evaluation Force in the Air ASW section of the Underseas Warfare Division Got my antennas up and on the air about the beginning of September.

There is quite a bit of activity around here on six and two......

There is absolutely no activity on 220 mc. here. Looks like I am the only one with any sort of gear for that band. I've tried to stir up some interest but no luck as yet. 432 mc. seems to be the coming band for this area. I have a list of calls doing something about the band. Only one has something on the air; W5BZQ/4 but he forgot to renew his ticket so is temporarily off!

•••••• I just completed the 164 Handbook converter but havent tested it as yet - then will build the antenna followed by the Tripler/ Amplifier in the Handbook. (68W4 modulated oscillator transceiver) Have any spare 6939's?

I also just got a used Central Electronics 20A side band exciter after

(Look for Jim on two)

CITY OF PHILADELPHIA

Proclamation

Whereas...

"Ham" radio operation, in addition to being a constructive and fruitful hobby for many citizens, has served this nation well in many emergencies and is an unofficial training ground which schools many young people in the fundamentals of electronics; and

Among public service contributions, radio "hams" perform a variety of acts ranging from assistance to the Civil Defense effort enabling American servicemen abroad to communicate with loved ones at home; and

Locally, the Amateur Radio Public Service Corps under the direction of W3ELI, Major George S. Van Dyke, Jr., is a "ham" organization assisting the American Red Gross, the police and local hospitals; and

In recognization of the services of a quarter million Amateur Radio Operators, the United States Post Office will issue a commemorative stamp;

Now, Therefore...

I, James H. J. Tate Mayor of the City of Philadelphia, do hereby proclaim the week of December $14\,-\,18\,,\,1964$ as

AMATEUR RADIO WEEK

in Philadelphia, both encourage citizens to enter and follow this worthwhile avocation and also to honor its many achievements.

MAYOR

Given under my hand and the Seal of the City of Philadelphia this fourteenth day of December, one thousand nine hundred and sixty-four.

Sig. James H.J. Tate

CITY REPRESENTATIVE Sig. Fredric R. Mann

Edgar P. Grim, Chief of the Communications and Special Services of the Department of Public Property, on behalf of Mayor Tate, presented the Proclemation to W3UMK, Richard Berens, Chairman of the Delaware Valley Council of Amateur Radio Clubs representing the hams in the area.

Present at the ceremony were; Kenneth Roberts, Engineer in Charge, Phila. FCC office; K3GAS, Doc Cutler, President, Mt. Airy VHF Radio Club, W3ELI, George Van Dyke, Jr., SEC and Mt. Airy; W3PST, Woody Haldeman, RACES Radio Officer; W3CDY, Lloyd Sherman, Phil-Mont Mobile Radio Club; W3GTC, Carolyn Curran, North Penn ARC and Mother Rat.

The ceremony took place in the Mayor's reception room, 202, in City Hall on Monday, December 14 at 1130 A.M.

HAM OPERATORS MARK 50th YEAR

From Phila. Inquirer, Sunday, December 13, 1964

Philadelphis ham operators will mark the 50th anniversary of the American Radio Relay League, Inc., during a weeklong exhibit beginning Dec. 16 in Franklin Institute.

(next page)

50th YEAR (Cont'd)

The observance also will feature a special sale of the five cent commemorative postage stamp honoring the country's amateur radio operators' voluntary services during disasters.

The first sale of the commemorative stamp will be made Dec. 15 in Anchorage, Alaska. That city was selected because of the outstanding communication work of hams during the earthquake last March.

The local sale will begin in Philadelphia post offices Dec. 16. Ouring the Franklin Institue ceremonies, the Post Office will sell sheets of stamps to officials of the Mt. Airy VHF Radio Club.

LLoyd Sherman, of Franklin Institute, during the exhibition by the amateur operators, will supervise operation of a ham radio by members of the Phil-Mont Radio Club.

***** ***** ***** *****

Around Dur Town 'HAMS' GET NEW CALL LETTERS: S-T-A-M-P-S

ByCharlie Bannister, Phila. Daily News, Wed., Dec. 16, 1964

Fhiladelphia's 3000 amateur radio operators got an official stamp of recugnition today.

The stamp is a 5-cent commemorative that marks the 50th anniversary of the founding of the American Radio Relay League, which represents 250,000 "ham" operators throughout the Mation.

Postmaster Anthony I. Lambert sold the first sheets of the commemorative to four area hams; Dr. Isadore Eutler, president of the Mount Airy VHF Radio Club, Richard Berens chairman of the Delaware Valley Council of Amateur Radio Clubs, Maj. George S. Van Dyke, Jr., emergency amateur radio coordinator for Philadelphia county, and Elwood Haldeman, radio officer for the Philadelphia Civil Defense Council.

Also taking part was Edgar P. Grim, chief of communications for the city, who represented the Mayor.

The stamp pictures a radio wave and tuning dial.

5-CENT STAMP ISSUED TO HONOR RADIO 'HAMS' From Evening Bulletin, Dec. 16.
A five-cent postage stamp honoring the nation's 250,000 amateur radio operations went on sale at the General Post Office here today.

The stamp, depicting a radio wave symbol and a tuning dial, was released yesterday at Anchorage, Alaska, where amateurs transmitted important messages during the earthquake last March.

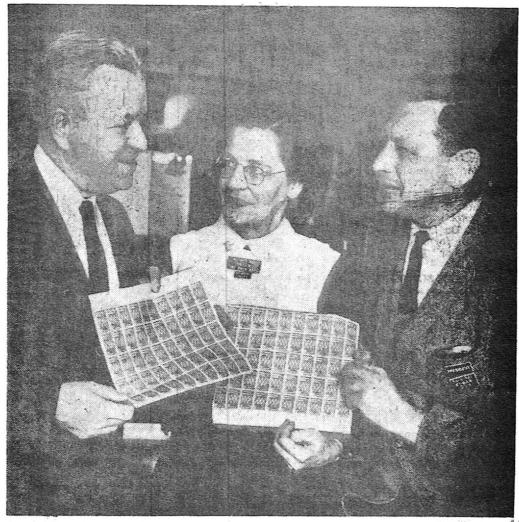
Philadelphia Postmaster Anthony I. Lambert said sale of the new stamp also commemorates the 50th anniversary of the founding of the American Radio Relay League.

(On page 60, of the later editions of the Bulletin was a picture of the Post-master selling the first sheets to K3GAS, Doc Cutler and Mother Rat.)

Also attending the ceremony at the post office were: Kenneth Roberts, Engineer in Charge, FCC; W30W, W. Lawrence LePage, President Franklin Institute: W3CDY, Lloyd Sherman and W3ADV, Fred Shaw of Phil-Mont Mobile Radio Club; W3KVZ, Paul Damankis of the Post Office, Mr. Ernest Appel, Public Relations, Post Office and Mother Rat.

Doc and I arrived early and Mr. Appel took us on a grand tour of the post office which at this time of the year, needless to say, is very busy. He showed us some of the letters to Santa Claus. We also saw the new electronic Cancellation machine in action. As the case always is, it jammed while we watched it, and leave it to Mother Rat, she found out why. The name of the manufacturer is, (can't remember the first name) Bownes & Werkespoor. (Serry, Ernie, couldn't resist that one, his)

In the Phila. Daily News, of Thursday, December 17, a picture appeared with the representatives of the hams in the area, along with the Postmaster and the Philadelphia Chief of Communications. Entitled "Stamp this sale for "Hams" only", reading from left to right, Anthony I, Lambert, Postmaster; Edgar P. Grim, Communications Chief; K3GAS, Doc Cutler, Mt. Airy; W3PST, Ellwood Haldeman, Radio Officer, CD; W3ELI, Gorge Van Dyke, EC and W3UMK, Dick Berens, Delaware Valley Council of Amateur Radio Clube.



FIRST ISSUE OF A NEW STAMP honoring amateur radio operators is sold by Postmaster Anthony I. Lambert (left) at the 30th st. post office to Mrs. Helen Brick, of the Mt. Airy VHF Radio Club, and Dr. Isadore Cutler, club president.

27898



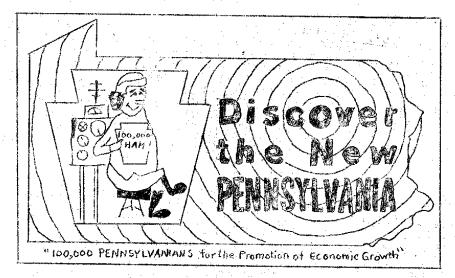








December 16, 1964



ADVERTISE PENNSYLVANIA

The above is a reasonable facsimile of the QSL Card put out by the Committee of "100,000 Pennsylvanians for the Promotion of Economic Growth". We say reasonable because it is hard to trace, small printing (at least for us) and radio waves cannot be made with a compass on stencils, you wind up with a bug hole in the middle.

The card is in the state colors, Royal Blue and Gold. The state is gold, the printing, large keystone and border are royal blue. The ham, and his equipment are white as is the lattering on the bottom.

The reverse side of the card is for your information with a large block at the bottom for your call.

In the left hand corner on the reverse side, above the space for your QSO info, reads the following;

CQ - ALL AMATEURS

Get set for Q-5 reception.....

Pse copy NR-100,000.....

An invite from the 100,000 PENNSYLVANIANS for Economic Growth...Pse discover the new Pennsylvania. Everything's A-OK in Pennsylvania, So, get on the frequency...see how our State's moving ahead with new industries, new jobs, a great new inter-state highway system and new attraction for visitors. Follow the beam that leads to the Keystone State-plan your field day, jaunt or vacation-plan to go Pennsylvania. There's so much to see...so much to do.. so many wonderful places to stay in the new Pennsylvania.

If you would like a supply of QSL cards write to;

Frank L. Magee, Chairman 100,000 Pennsylvanians 501 South Office Building, State Capital, Harrisburg, Pennsylvania 17120

You, too, will become an Ambassador for Pennsylvania.

OFFICIAL BULLETIN NR. 984 FROM ARRL HEADQUARTERS, DEC. 17, 1964

A recent CRPL forecast bulketin notes that solar activity will soon be increasing following the summer minimum which probably occured in late summer of 1964. The occurance of flare producing solar regions will soon be on the increase and associated shortwave fadeouts, SWF, will become a more significant factor in long distance communications. Radio communications may then be abruptly interrupted by sudden large increases in absorption. On the average, communications may be impossible for twenty to thirty minutes after which normal field strength is gradually recovered.

AR

SIX METERS

By K3WEU, Paul Behrmann

HATS OFF Dept: To RICH: K3ACR for his decision to undertake a professional carear involving four years of college and at least three more of graduate work. He attends classes during the day, works night shift. Godspeed Rich! To GRANDPA BILL, K3HWZ for his representation to the Delaware Valley Council and to the stimulus he will bring to that group on behalf of all of us. To K3TPM (8UD), our newest member, for the job he did arranging QSLs gratis from the Commonwealth of Pennsylvania; to CARMEN, K3PXT for his superb definition of a Ham (last month's CHEESE BITS) To W3LHE, DAVE for the organization and planning he is giving to the contest; to JOHN K3KTY on his appointment as E.C. for Philadelphia County and to GEORGE (VAN) W3ELI on his appointment as S.E.C. of Eastern Pennsylvania and to FRANKIE W3SAO on his appointment as Assistant E.C. to all club members for the will increase to lend a helpino hand whenever E.C.; to all club members for the willingness to lend a helping hand whenever necessary.

HAVE YOU EVER WONDERED Dept?: How much our many mobile members would appreciate more consistant contacts? A few who are mobile regularly come to mind: JDE W3MXW; GEORGE W3GLI; W3FLI GEORGE (VAN); EL K3JJZ; HERM K3GDZ; K3ZPQ 808; K3GFQ GEORGE; FRANKIE W3SAO; K3KTY JOHN; BILL K3HWZ; EARL K3HJA; HAL W3HFY; SID W3GEW; BEN K3ESL; DOC K3GAS; FRED W3DJV; RICH K3ACR. To others in this category whose calls I've missed, my apologies - tell me and they will be included. This corner believes that ALAN W3OR should give us a brief talk at an early meeting explaining his urgent reasons for working the mobilers splendid unselfish motivation; also all of us, especially newer members, should have Alan tell us of the beloved American Silver Dollar - WJASD KARL, who was a legend in his own lifetime.

GROUND WAVE, SKIP and SPORADIC E or ? Dept: TOM W30HY had an elusive and Brief contact with a MAINE station; we had a similar one with St. Louis. Conditions have seemed especially good (to this inexperienced ear) to the North east - northern Connecticut, Massachusetts, and excellent to New York (Machat's tan, Long Island, Brooklyn) and northern New Jersey. Virginia and Maryland have been fair to good. K3LOM HARRY, ALAN K3DUW and JOE W3MXW it appears, have been working many of the stations at these distances.

I COULD BE WRONG Dept: But, have you observed more Q.R.M. than usual on 6? Would we be arrogant or patronizing if we spoke kindly to some of the newer and younger operators and asked them to listen first prior to transmitting; and generally to suggest better operating habits? Perhaps, they may be told. that they will have more six-appear if they listen to the counsel of older, more experienced operators. gartiga e en carri

I'M WORRIED Dept: Two recent situations indicate the urgency for monitoring 50.2 when we're not in QSO elsewhere: one worked out favorably - VAN, W3ELI heard a ORRR from a 2-land mobile who wanted to advise the fire department in Willingbord of queoline drums in the CD area of the municiple building + it was handled with dispatch; the second episode involved NICK K3YPL, who saw a body in the middle of City Line near the Episcopal Academy at approximately 8 P.M. a recent Friday. He called and called but when WSZMTU (Tony) over in Sicklerville answered the police were arriving on the scene. The body, was that of a 13 year old boy who died as a result of being hit by an automobile. None of us knows whether or not he would have been alive had a doctor and ambulance arrived promptly. Your support in monitoring 50.2 whns convenient may save a life.

Finally, your suggestions as to what you would like to see in this column will be appreciated - also any items of interest to the members will be wel-

NEW PRODUCTS OF INTEREST TO HAMS

By W3MSI, Lynford Rowland, Jr.

1. Varactor Diode

A new varactor diode with a voltage breakdown rating of 175 has just been introducted by Amperex Co. The H4A can deliver 25W into a 50 ohm load at 150 Mc ehen used as a tripler from 50 Mc. It will deliver 13 watts at 450 Mc with an efficiency of 50%. (as a tripler) This means if you are able to provied 20 watts of 144 Mc power on the input side, 10 watts will be available on the output side at 432 Mc. No power supply is required for the varactor. Common of the section of the Price - about \$35 Amperex Electronic Corp. Providence Pike, Slatersville, R.I.

2. Transient Suppressor

The Selistor is an epoxy-dipped, selenium-type transient-voltage suppressor. The unit operates instataniously to protect transistors and other ~-{6}}--

semi-conductors in solid state circuitry. It suppresses voltage transients generated by the load, transformers switching and inductive filters.

Both AC and DC types are available for ratings up to 150 v.

Price - about 20-80 cents each

Eastern Delta Corp. 29-39 E. Broadway, Fair Lawn, N.J.

3. Meter Protector

The "Metergard" protects meter movements against accidental overloads up to 10,000%. It is installed directly across the meter terminals and does not affect the meter reading.

Price - 2.95 each

Lectrotech Inc. 113 E. Centre St., Nutley, N.J.

4. Five-in-One Cobination Tool

General Electric now offers a new Five-in-One tool featuring added convenience and durability for both the electronic service technician and hobbyist. The versatile new tool combines two screwdrivers — one standard and one Phillips — with three hex socket wrenches, in $\frac{1}{4}$ —, 5/16—and 3/8—inch sizes. It has a pocket clip and shock-resistant plastic handle. Metal parts are made of mickel-plated, tempered tool steel. Tools are available through authorized General Electric electronic components distributors.

Suggested price is 98 cents

K.U.I.

By W3HKZ, Ed Kushner

OF HOGS, HAMLETS, AND HAMS

Many an amateur radio "ham" has recognized the sad fact that, if he is going to ride his hobby, he is going to be universally referred to as a "ham". Sometimes the term is so accepted that the subject doesn't even wonder how or why he has turned out to be a fried second cousin to a pig.

Actually, there is no relation between a radio ham to either a living hamlette or a dead Hamlet. The English are to blame, not the farmers or the

When amateur radio was in its infancy, the English were quite active in it. As is the Henglish custom, they hinvariable put an "H" in front of every vowel without one and, to even matters up, they always add an H to words hordinarily spelled without them.

So when the English radio experimenters referred to themselves, or others like them, they called them "hamateurs". This was eventually shortened to "Hams" ...at least that's what we are told by the National Geographic Society.

For sheer fun and nonsence—a commodity which seems to be in shorter supply these days——an advertiser in the Edmonton, Alberta, Journal, in Canada, pleads his case for business with the following item:

FRONKELSNORTZES? WELL, WHY NOT?

Edmonton, Alta, Canada—Anyone who manufactures fronkelsnortzes can find 31 possible buyers in Canada, particularly if they come equipped with transverse gridges and other special accessories.

G.T. Wheatly, advertising manager of the Edmonton Journal, ran an ad for a fronkelsnortz in his own paper the other day and got a pleasing commentary on advertising readership.

The model he advertised came with a transverse gridge, special power dippole \mathbf{z} k and lefthanded zoenstiff.

Thirty-one persons wrote back. Only five asked what the machine was, if it was a machine. The others carried on the fun.

On firm said it would buy the fronkelsnortz at 10 percent below the original price if it was a Mark IX model.

One man offered 450 herns or a straight trade for two 1948 sorlit-sfitzers (one on skids).

Finkeleheimer's Multi-Schnorkel Machine Shop wrote three letters offering 10,000 equity units providing it could be paid off in payments of 100 units per month.

Many trades were offered. These included a variable-proble lapse tuner (with a complete set of stainless steel gropers thrown in gratis), a 1957 Veeble (next page) (%)

Feetzer with an output of 17 blink-kovac and a 1958 Splitzenkister with a self lubricating glok-spleen and hoffer shaft.

We are all out of Fronkelsnortzes, but we do have some new and used construction, mining and logging machinery. Please call Val Galeron, Don Burrus or Dave Fritschi at Reno, Equipment Sales, Inc., 1510 West Fourth Street, Reno, Revada.

From Electronic Science Preview, Nov. 15, 1964

MICROWAVE POWER FLIES

In the first public demonstration of the remote transmission of microwave power a helicopter driven by wireless microwave power from the ground took off on a 50-ft. flight. The event took place at Raytheon Company's Spencer Laboratory, Burlington, Mass. The microwave energy was beamed from a saucer-like transmitting antenna on the ground. Mounted under the helicopter was a special rectifying antenna consisting of thousands of tiny diodes, each less than ½-inch long. When the diodes were hit by the beam of microwave energy an immediate flow of electricity resulted, running the motor which turned the rotor blades. Five kilowatts of power was generated. A new Amplitron tube has been developed which can produce nearly 100 times as much power at 70% efficiency. With this amount of power helicopters can be maintained for long periods of time up to 50,000 feet.

KNOWS SIX FROM SEX

In development by Sperry Rand Corp. is a new machine dubbed Sceptron (TM) which is being "taught" to recognize words and recognize speakers regardless of the words they use. Currently computors communicate with man in a variety of machine languages, Sperry's machine can already differentiate between such words as "six", "sex", and "Sick". Sperry technicians are hopeful that the machine can also be "taught" to recognize the tonal characteristics of individual speakers. Sceptron consists of light-carrying quartz fibers which vibrate in response to stimulus that can be changed into an electric Signal.

DID ADN KNOMS

That K3WEU, Paul, is no longer a "Private" in the Ham Army? He now sports the Stars of a General on η is ticket. Congratulations.

That the latest report, via W3MXW, Joe, Monday, December 21, is that W3CFS. Ed, is responding well to the radioactive treatments following his operation and expects to leave the Norristown Hospital on Saturday, December 25? God bless you. Ed.

That K3CIV, Ralph, who celebrates his 75th birthday on January 18, is in the Temple University hospital, Room 928. Drop him a card. We hope that you will be at home by the time this issue arrives, Ralph. God bless you. The address, Temple University Hospital, Broad and Ontario Streets, Phila., Pa. 19140.

'It is pointed out by the organizers of the League that up to the advent of wireless telegraphy it was necessary to rely upon either a telephone or telegraph company or the Federal government, for transmitting intelligence from one part of the country to another. The coming of wireless telegraphy has made it possible for the private citizen to communicate across great distances without the aid of either the government or a corporation, so that the organization of the relay league actually marks the beginning of a new epoch in the interchange of information and the transmission of messages.' "

Did you know that the Delaware Valley Council is making application for the call letters of the late John Harris, W3AYG? This is not only an honor to John but also to the Pack Rats.

SWAP AND SHOPPE

É

Conducted by; W3ZRR, Ray Whitehead 4534 N. Smedley Street. Phila., Pa. 19140 215- DA. 4-5910

FOR SALE: Communicator IV with (Gonset WEO 6 meter, 21meterezed 14 meters) 4 ring Halo for 6 meters and 3 element beam, portable. All in new condition. \$300.00

> HQ 180 with Hammerlund noise silencer. Mint condition. \$275.00

Polycome 2 meter transceiver. Like new.

\$225.00

CONTACT: K3KUB, WALTER RANDERSON 2103 Fanshawe Street, Phila., Pa. 19149 215- DE. 3-4864

FOR SALE: KW linear amplifier 80. 40, 20, 15 & 10 meter bands, Pi-network output variable vaccum condenser and roller coil, all band tank grid circuit.

> Eimac 4-250 A final with spare adjustable bias and screen supplies, 2500 V, 500 MA plate supply, all voltages and currents metered, overload with reset and mercury primary melay.

R.F. circuits in sheilded box with filtered leads, a quiet blower in 42" rack cabinet with 16" panel. Unused.

A real cool KW with nothing but the best parts. Priced less than the cost of the plate transformer and final \$175.00 tubes.

CONTACT: W3LHF, DAVID ZIMMERMAN 520 Centennial Road Johnsville, Pa. 18974 215- OS. 5-4539

FOR SALE: Utica 650 transceiver with VFO. Excellent condition. \$140.00

> Heath HW 12-80 meter transceiver with Xtal calibrator, mike and Heath antenna. \$115.00

Eico model 425 Øscillascops \$20.00

CONTACT: K30RT, ROBERT PABST 215- TU. 7#5683

FOR SALE: Johnson Valiant transmitter, old model. Excellent condi-\$200.00 tion.

TH 3 Hy-Gain beam for 10.

15 and 20 meters-\$45.00

CONTACT: GORDON BENNETT 1917 Tomlinson Road,

Phila., Pa. 19116 215- OR. 6-5137

FOR SALE: DX 100

CONTACT: K3GQJ, JACK GREENAGE

1245 W. Westmoreland Street,

Phila., Pa. 19140 215- BA. 3-6040

MEETING DATES

WEDNESDAYS

1965 JAN. 20 FEB. 17 MAR. 17 APR. 21 MAY 19 JUNE 16

GENERAL MEETINGS are held the third Wednesday, when possible, at the WEST OAK LANE JEWISH COMMUNITY CENTER Sedgwick and Thouron Streets, 8:00 PM

MEETING NOTICES

JANUARY 13 DIRECTORS

The Board of Directors meeting will be held at the QTH of K3HWZ, Bill McCutcheon, 124 Orchard Lane, Feasterville, Pa on Wednesday, January at 8:00 P.M. If for any reason you are unable to attend, please call; 215- EL. 7-4972

JANUARY 20 GENERAL MEETING

Our speaker will be the renouned - well-known YOU.

Subject: "Crying Towel"

Be sure to bring your aponges, maps and boots.

DO YOU KNOW THE PHONE NUMBER OF THE WEST DAK LANE JEWISH COMMUNITY CENTER?

It is: 215- LI. 9-8000

This is a good number to leave at the QTH just in case an emergency should arise at home while you are at the meeting.

Remember Sheri Cook, our little Pack Mouse, who was in the Shriner's Hospital? She received a nice present for Christmas. WA30QO, Conditional.

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



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K3BPP. Walter Bohlman
101 East St.
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 $\hat{\varphi}_{i,j} = \varphi_{i,j}^{(2)} + \varphi_{i,j}^{(2)} + \varphi_{i,j}^{(2)} + \varphi_{i,j}^{(2)} + \varphi_{i,j}^{(2)}$

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