



Not sold in stores . . .

OSCILLATOR

DELAWARE VALLEY HISTORIC RADIO CLUB

The Official Newsletter of the DVHRC

Vol. 4 No. 8, August 1996

WHAT'S HOT (OR WAS HOT) IN JULY

Bill Overbeck

DVHRC customarily does not have a July meeting, but the Board of Directors did meet to discuss operation of our club. Among items covered were swapmeets. Interest was directed toward selection of a location and date that would not be in conflict with our neighbors at NJARC. Unanimous support was expressed for a meet in connection with the Jersey club, to complement each other.

Mike Koste and I traveled to the NJARC meeting in Freehold, where perhaps a quarter of those in attendance were joint DVHRC-NJARC members. During a pleasant and informative meeting, I proposed a joint meet-auction and got a positive response. Their newly elected officers will discuss the possibility at their next board meeting. Meanwhile, the tentative date for their next meet is Saturday, Oct. 5. I pledged out support in three areas: volunteers, auction participation, and table rentals. Financial considerations, with some flexibility, are not a major concern. Of course, support by DVHRC members is always necessary and appreciated.

NOTES FROM AROUND THE DVHRC

Mike Koste

The DVHRC ventured into virgin territory at our June meeting, as our newest member Hugh Tague showed up with a truckload of items for our first-ever Tailgate Auction. Radio-related miscellanea ranged from "restorable" to parts sets, to electronic whatsits, paper, tubes, tube caddies, and empty cabinets yearning for a chassis. Thanks to promotion in your hometown *Oscillator*, over fifty members were in attendance and auctioneer Pete Grave liquidated the contents of Hugh's truck in short order. Since Hugh is relatively new to the hobby, he was surprised to see how merchandise he considered "junk" went for high bids, while seemingly desirable items sold at bargain prices. Needless to say, Tague was impressed, and the bidders in attendance were more than happy with the treasures they took home. (Incidentally, Hugh is looking for some premium console radios to start his collection, so if you're in the market to thin out . . .)

Our discussion and review of the Downingtown event at the June meeting suggested that, as an organization, we'd be wise to schedule our next swapmeet elsewhere. President Bill Overbeck is in the process of investigating a church in the Havertown area, convenient to the Blue Route, which may suit our purposes. Finally, just a friendly reminder: join us again on August 13th!

OVERBECK COLLECTION FEATURED IN ENQUIRER

Bill Overbeck's collection got featured in the *Philadelphia Enquirer* for Sunday, Aug. 4, in a half-page photo layout "Old Radios Are Music to His Ears." A nice plug for radio collecting and DVHRC. The main photo shows Bill smiling boyishly next to a Nipper statuette and an AK horn. And, as with the experience of other collectors, a goodly volume of calls came in from the public, offering radios for sale. Bill reports having been, so far, to Abingdon, Drexel Hill, Norristown, and Springfield to pick stuff up . . . including a couple of nice Philco cathedrals. (Thanks to Bob Thomas, W3QZO, for a copy of the story.)

RADIO NOTES

Recently heard on Oldies 99.9 from Allentown: Tommy James and the Shondells singing that great anthem to '20s radios, "Crystal Bloopers Suason" . . . Speaking of Oldies 99.9 (WODE): their signal is usable but not super-strong in Flemington, as heard on a piece of hookup wire hanging out the window. Occasionally, even in winter, another FM - in Bridgeport, Connecticut - will "capture" the receiver for a few seconds, drowning out the rock oldies with "light beautiful music." (Science-wise, the Bridgeport signal is probably arriving by a thermal "duct" caused by a temperature inversion just north of Long Island Sound.) But now that summer's here and "Sporadic E" propagation is in full effect,



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THE OSCILLATOR

Newsletter of the Delaware Valley Historic Radio Club
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The *Oscillator* is published monthly by members of the non-profit DVHRC. Its purpose is to provide a forum to educate, inform, entertain, and communicate with collectors and preservers of vintage radio technology.

We welcome and solicit information relating to radio history or collecting. Submissions should be carefully researched, typed and accompanied with clear photographs or diagrams. Material on-disc (3-1/2" or 5-1/4" DOS) is particularly welcome.

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NEXT MEETINGS: Aug. 13, Sept. 10

"Froggy 99.9" in Ocean City, MD comes fading in and out, sometimes taking over for thirty seconds or so. And there's been a cameo appearance by yet another station on 99.9 in Terre Haute. FM radio is a "line of sight" proposition - most of the time! . . . Our agents in the Midwest report that this year's EX-TRAVAGANZA ran well, in accordance with the pattern of past years, and enjoyed good weather. The auction was large, extending past midnight, and with record proceeds in the \$30K-40K range. Prize item in the flea market was a Sodian receiver and amplifier in near-mint shape. TRFs and other battery sets were selling relatively briskly this year (our reporter is not a transistor collector) . . . Under serious consideration for DVHRC's September meeting: an auction outdoors like the one in June. Stand by. For August, we'll have Lewie Newhard's rescheduled talk on restoring radios of the Roaring Twenties; and Bill Overbeck will bring in a bunch of big-pin/two-digit tubes for sale . . . Hydrargyrophobia hits Rochester: the promo material for AWA's Rochester conference includes flea-market and auction rules that give the message *NO ITEMS CONTAINING MERCURY* no fewer than five, count 'em, five times. Sounds like they're trying to get a message across. Under this rule, the tube auction in recent years has no longer had glass Cooper Hewitt rectifiers sitting loose in beer flats, filled with a teacup of mercury and just waiting to be dropped. Even so, a few 866s, etc. have slipped through. And - in principle - don't try to sell any collectible old-time radio batteries: the dry cells that they contain have mercury-amalgamated zinc cans. . . . Latest newsletter in the antique-radio field is *The Lone Star Waveform*, from the new Texas Antique Radio Club in San Antonio. Inquiries to Joe Koester, 7111 Misty Brook, San Antonio 78250, (210) 522-1662; dues are \$20/yr and their first swapmeet is Aug. 24 in Buda, TX. . . . A new documentary to be released to video stores this summer: *Theremin: An Electronic Odyssey*, about Russian musical inventor Leon Theremin.

WANT ADS

Free exposure for your desired or excess stuff! Unless requested otherwise, we'll run each ad for two months, and will send ads to NJARC's *Jersey Broadcaster* for double coverage.

FREE FOR THE ASKING: Radio chasses with all parts, available because my restoration plans ran out of steam. Choose from the following: early '30s Philco console, Emerson model 541 table radio, late '30s table radio with no manufacturer indicated. Also, EMC model 206 tube tester. The condition is rough but it works. Bruce Knapp, Rutherford, NJ, (201) 804-9259. (8-9/96)

FOR SALE: All or part of 6 cartons of old radio & TV schematics, manuals, books, substitution guides, Sams' Photofacts, test equipment, magazines, etc., 1930 thru 1960s. Martin Fleisher, 12 Zellers Road, Box 123, Long Valley, NJ 07853, (908) 832-7047. (8-9/96)

WANTED: Someone to repair/rebuild a small Philco cathedral for

me at a reasonable price. Mark Freilich, (610) 275-3140 days. (8-9/96)

FOR SALE: 36 consecutive issues of *Radio Guide*, starting 7-2-38 (Jack Benny) to 3-18-39 (Benny again), in good condition. Please send an offer to PO Box 598, Claymont, DE 19703. (An anonymous want ad! - no endorsement intended). (7-8/96)

WANTED: Phonograph-related items - top dollar paid immediately for Vogue Picture Records, wax-cylinder records, needle tins, Nipper, record cleaners, puzzles, advertising mirrors, pins, phonograph toys, posters, original advertis-

READERS' COMMENTS

MORE ON PHONETIC ALPHABETS

Ted Hannah, K3CL

An interesting piece about phonetics in the July issue . . . I seem to remember, however, that in Navy bootcamp in 1945, we used "Easy" for "E" and "Tare" for "T." [Yup - what with "Cast and "Hypo," it's clear that the Navy had an alphabet different from the Army's. - Ed.]

Here's a list of Russian phonetics from perhaps 25 years ago. If you read Russian, you will see that most of them are men's and women's first names.

A Anna	И John	Р Roman	Ш Shura
Б Boris	Й John Kratki	С Sergei	Щ Shchuka
В Viktor or Vera	К Konstantin	Т Tatyana or Timotei	Ы Yerl
Г Grigori	Л Leonid	У Ulyana	Ь Myagki Enak
Д Dmitri	М Mikhail	Ф Fedor	Э Ekho
Е Elena	Н Nadezhda	Х Khariton	Ю Yuri
Ж Zhenya	О Olga	Ц Tseer	Я Jakob
З Zoya	П Pavel	Ч Chelok	

[Transliterations by the DVHRC Institute of Slavic Languages. Accuracy not guaranteed.]

MORE (YET) ON PHONETICS

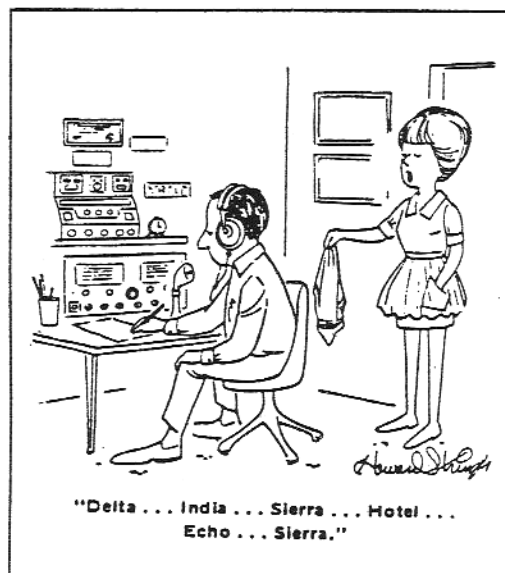
Bob Thomas, W3QZO (Why 3 Queue Zero Oedipus)

The table of phonetic alphabets in the July *Oscillator* provides interesting insights into the way humans have enhanced verbal communication over the years. I first became aware of phonetics, as did most of the public, during WW II, when the system designated "1945 Allied Services" was in use. These seemed to be logical, easily memorized, mostly monosyllabic words that were recognized by several nationalities (the Japanese and Germans probably had minimal input). Although good enough to win a war, 1945 phonetics were found wanting by subsequent "experts," who preferred two syllables where one would do, and words that did not sound like the letter they represented, e. g., "I = India" rather than "I = Item." The excuse for this tampering was that the Allied phonetics were inappropriate for some languages even though - get this - all international voice communications are conducted in English! Additionally, some ICAO phonetics have acquired, by affectation or decree, weird pronunciations, as in kilo, which is now pronounced by "communicators" as KEE-lo. Does any nationality actually refer to weight in KEE-lo-grams? We've come a long way since 1945. But not all is lost! Representatives from 387 nations recently convened in Geneva, Switzerland, traditional birthplace of international standards, to establish a new organization known as Comité Radiodiffusion à Phonétique (CRAP) to study all aspects of phonetics. Members of the committee have tirelessly devoted countless hours to CRAP. Their new Table of Phonetics, presented below, is destined to render the ICAO phonetics obsolete, and could conceivably usher in a bright new era of keyboard-based digital communications.

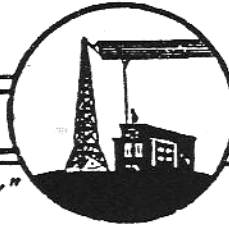
THE CRAP TABLE OF PHONETIC EQUIVALENTS

A Are	K Kay	U Ur n
B Bee	L Lieu	V Veri-
C Cue	M Mnemonic	simili-
D Delete	N Nine	tude
E Eye	O Oedipus	W Why
F Four	P Pea	X Xenon
G Gnu	Q Queue	Y Yew
H Hoe	R Rho	Z Zero
I Irk	S Sea	
J Juan	T Tea	

Author's Note: Many of the phonetics above are based upon a list published in *REMARCS*, newsletter of the Midatlantic Amateur Radio Club, WT3P, Editor.



AIRWAVES



TIMELINE

"This Month in Radio History"

Compiled by Mike Koste

- 1920, Aug. 20 Long-time contender in the "Who Was On First?" argument, the *Detroit News* station 8MK (now WWJ) signs-on.
- 1921, Aug. 1 All 48 states but Wyoming have radio stations, bringing to 451 the number of signals on the air.
- 1936, Aug. 15 Philco demonstrates its system of TV transmission with 345-line images.
- 1937, Aug. 1 Guglielmo Marconi dies in Rome at age 63.
- 1941, Aug. 31 Premiere of the radio comedy classic "The Great Gildersleeve."
- 1943, Aug. 2 Edward J. Noble buys NBC's Blue Network from RCA, paving the way for the formation of ABC.
- 1955, Aug. 22 US Census figures show 67% of American homes have TV.
- 1960, Aug. 13 Pioneer radio sportscaster Ted Husing dies at age 60.
- 1960, Aug. 22 Daytime serials on network radio come to an end.
- 1963, Aug. 25 The Emergency Broadcast System goes on-line, replacing CONELRAD (Control of Electromagnetic Radiation). 'CD' markings disappear from radio dials.
- 1964, Aug. 31 Gracie Allen dies at 58.
- 1970, Aug. 24 Arbitron says there are now more FM than AM listeners in Grand Rapids, Michigan and West Palm Beach, Florida.
- 1990, Aug. 15 After more than 60 years, CBS dumps Philadelphia's WCAU call letters, along with its news-talk format, in favor of the short-lived WOGL Oldies 1210 monicker.
- 1971, Aug. WYSP, Philadelphia, signs on.

BOOK REVIEW

WAKE OF THE WIRELESSMAN

By B. J. Clemons, ISBN 0-9637586-6-7, 6" by 9" soft-cover, 266 pp., 57 illus., The Glencannon Press, Box 341, Palo Alto, CA 94302. (Copy obtained from Jerry Simkin.)

This is the story of the brief radio-operating career of American Marconi employée Dale Clemons, one of the early radio amateurs who went to sea at the time of WW I in the then-enticing field of wireless operation. His daughter has painstakingly reconstructed the account from diaries and marine records, supplemented by contemporary photos.

The elder Clemons grew up in Storm Lake, Iowa and learned the basics of Morse telegraphy from the town's railroad operator. Enticed by the appeal of a job at sea, he signed up for radio instruction at Dodge's Institute of Telegraphy in Valpariso, Indiana. Graduating with honors, he received an operator's license at the age of 18 and worked for American Marconi on coastwise ships on the Pacific Coast. In two years he sailed on a total of ten vessels.

The nature of Clemons' peacetime employment changed considerably when he requested a Marconi job in the Atlantic just after the U. S. entered the war. He was assigned as sole operator to the S. S. *Vigo*, an elderly freighter of uncertain seaworthiness bound for Italy. Clemons, as sole operator, was expected to provide nearly round-the-clock wireless coverage, yet under conditions of wartime radio silence. Equipped with guns and overloaded with cargo, the ship endured damage in a heavy storm and reached the Azores with a cargo of benzene leaking into her drinking water. After evading attacks by *unterseebooten*, she delivered her goods to Genoa, then started home. A series of mishaps followed - steam leaks, burned-through fire tubes in the boilers, breakage of a critical casting in the feedwater system, shortage of coal - and she limped into New York to get the news of being presumed lost.

Clemons spent the rest of his time on land: first drafted into the Signal Corps, then back at Dodge's Institute as an instructor, finally as an engineer for Western Electric.

This account is quite readable. Ms. Clemons seems to have gathered bits of history from every extant maritime museum and record source to supplement the basics from her father's records. The result is an enjoyable insight into a wireless operator's life, which was not as tidy and safe as the radio schools' recruiting ads suggested! - LAS

OLD NEWS

NEW SET SALES

I have made many radio sales by close observation of the prospect and his family. For example, if there are children around ten or eleven years of age in the family, I tune in on police calls or aviation and amateur calls. This fascinates them, and they use their influence toward keeping the receiver. If the parents are of foreign extraction, I tune in one of the shortwave stations from their country, which is extremely effective in closing sales. This is a very simple idea, but it certainly produces results. Russ R. Yochum, Main & Market Sts., Bethlehem, Pa. (*RCA Radio Service News*, June, 1938).

SWEEP TUBES: COME N' GET 'EM

The NJARC tube program has been given a supply of new-old-stock sweep tubes. By special arrangement, DVHRC's meeting this month will feature a visiting NJARC agent, with these tubes on sale at special prices. The supply includes octals, Compactrons, and novars. This represents an opportunity to stock-up on spares for your gear, or for that of a radio-amateur or audiophile friend. Or maybe you know someone with a (*heh, heh*) CB linear amp that needs tubes.

N. O. S. SWEEP TUBES

Type	Qty.	A. E. S. Price	Sale Price	*Used In* / Comments
6BQ6GA	1	\$3.20	\$1.00	Four in Sansui 500A stereo receiver.
6CB5A	1	4.60	1.50	
6CL5	27	4.80	1.00	(Same pinout as 6CB5.)
6CU6 (6BQ6GTB)	4	3.20	1.00	See 6BQ6GA.
6DN6	6	5.70	1.00	
6DQ6B (/6GW6)	1	6.60	1.00	In Johnson Challenger, Knight-Kit T-60, and Eico 723 xmtrs.; two in Eico 753 xcvr.
6EX6	8	5.00	2.00	Very sim. to 7867 audio power tube.
6FW5	8	3.00	1.00	Very sim. to 6LB6B; different pinout.
6GB5/EL500	7	5.10	2.00	Two in Sideband Engineers SB-34 xcvr.
6GE5	2	6.30	2.00	One in Heathkit HW-16 xmtr. Two each in HW-12A, -22A, and -32A "single-bander" xcvs. and HW-18 xmtr.
6GT5	4	16.00	3.50	
6GW6	1	6.60	1.00	See 6DQ6.
6GY5	3	4.90	1.00	
6HF5	1	14.10	3.00	One in Drake 2-NT xcvr and Hallicrafters HT-46 xmtr. Two in Hallicrafters SR-400 xcvr.; Swan 350, 400 and 500 xcvs.; and WRL Duo-Bander 84, Galaxy III, and Galaxy 300 xcvs. Ten in WRL Galaxy 2000T linear.
6HJ5	11	4.10	1.00	
6JB6A	1	22.00	6.00	Two in National NCX-200 xcvr. and Drake T-4XC xmtg. conv. Three in Drake TC-6 6-m xmtg. conv. and TR-6 6-m xcvr. Four in Drake TR-4 xmtr.
6JE6C (/6LQ6)	1	44.00	12.00	One in Swan 260 and 270B xcvs.; two in Kenwood (Trio) TS-511S, Kenwood (Henry Radio) TS-900, and Swan 350C xcvs.; and Knight-kit T-175 linear; four in Amitron and Swan Cygnet 1200 W linears. Six in Sideband Engineers SB1-LA linear. Eight in McIntosh Labs MC3500 audio amp. Also in National NCX-500 xcvr.
6JM6	2	5.20	1.00	Capped version of 6JN6.
6JN6	3	4.20	1.00	Two in David Berning Co. EA-230 audio amp.
6JZ6	10	5.70	1.00	
6KM6/6JF6/6JU6	9	7.90	1.50	Lower-power version of 6JE6C; same pinout.
6KN6	5	8.00	2.00	
6LB6	2	20.00	7.00	Two each in Galaxy V Mk. 3 and (WRL) Galaxy GT-550 xcvs.
6LW6	4	25.30	7.00	Big, late-vintage high-rated octal sim. to 6CL5.
12DQ6B (12GW6)	3	9.30	1.00	Two in Hallicrafters SR-150 xcvr.
12GT5	3	2.50	1.00	
12JN6	6	3.00	1.00	
12JT6A	12	4.50	1.00	
17GE5	4	3.60	1.00	
17JF6A	16	6.40	1.00	
21GY5	7	4.40	1.00	
21HB5A	4	10.70	2.00	
21KA6	8	"Call"	1.50	
23JS6A	1	5.80	1.00	Variant of 6JS6A.
27GB5/PL500	10	5.20	2.00	Two in Sideband Engineers SB-33 xcvr.
50JY6	3	"Call"	1.50	

A BROADCASTING QUIZ

OK, old-timers (new guys too): try your skill on the following. A hint: everything you know is wrong . . .

- Channels authorized for TV in the U. S. are the following:
 - 2-83.
 - 1-83.
 - 2-36, 38-69.
 - 2-69.
 - 2-16, 18-36, 38-69.
 - None of the above.
- FM educational broadcast stations in the U. S. may operate on the following frequencies (and in 0.2-MHz steps between them):
 - 87.9-107.9 MHz.
 - 88.1-107.9 MHz.
 - 92.1-108.1 MHz.
 - 88.1-91.9 MHz.
 - 88-108 MHz.
- How many clear-channel AM stations are there?
 - 17.
 - 23.
 - 27.
 - None of the above.

QUIZ ANSWERS:

1. (E). Channel 1 was redirected to other services in 1946. Channels 70-83 were reallocated to cellular telephones, specialized mobile radio systems, etc. in the early '80s. Channel 37 is reserved for radio astronomy. And Channel 17 is allotted to non-TV use in Hawaii. So that leaves 2 to 16, 18 to 36, and 38 to 69.
2. (A). Educational FM stations have 88.1-91.9 MHz reserved for them. However, when Class D EDFMs (transmitter power 10 watts or less) lost their interference-protected status in the '70s, the FCC allowed them to move to locally idle commercial channels, that is, 92.1 MHz and above. And, oddly enough, Class Ds can theoretically operate on 87.9, which is officially part of TV channel 6. The rules governing use of 87.9 and protecting Channel 6 are so strict that there is no known EDFM use. Still, it's in the FCC rules.
3. (D). *Fageddaboutit*: there are no U. S. clear-channel (or cleared-channel) AM stations; haven't been for years. The Federal Radio Commission experimented with cleared channels in the late '20s, declaring dominant stations for certain frequencies and requiring off-at-sundown or shared-time use for the other stations. However, regulators began "breaking down the clears" as early as 1932-33. A wave of reallocations took place in the '60s, when, for example, the FCC authorized KRVN in Lexington, NB to operate on WCBS' "clear" 880 kHz. Previous to that, WCBS had been audible even on the West Coast. The process was completed in the '70s over the objections of the remaining clear-channel broadcasters. (While the FCC rulemaking was in process, WSM in Nashville encouraged its listeners to write the FCC to express their views. An irritated FCC complained to WSM over the huge resulting volume of protest letters - and was told that WSM was, after all, just exercising its First Amendment rights!)

OLD TUBES NEVER DIE

RELIABLE DISCONTINUED TYPES CONTINUE TO SATISFY VARIED INDUSTRIAL AND CONSUMER NEEDS

Sources and supplies of discontinued tubes appear to be diminishing more rapidly than the demand for them. Few major tube companies find it worthwhile to produce these types and negligible inventories of discontinued types in current demand cause large users to scurry for replacements.

- **Demand** - Over 500,000 discontinued tubes were sold last year in the U. S. Most were earmarked for domestic distributors, the foreign market or military use. Tubes in heavy demand include pre-war reliables like the 45 power triode, the 75 twin diode [*sic*] and the 80 rectifier. Distributors in rural areas, particularly the southern states and northern new England, do a brisk trade in such tubes.

- **Replacement** - Industrial and elevator control circuits, ticker-tape machines, railroad telephone equipment, and hi-fidelity amplifiers are a few of the sources of replacement demand for discontinued types.

A prominent theatre-service company estimates that 20% of American movie exhibitors use prewar sound equipment for which there is a continuous replacement demand. Although some sound equipment is modified to handle new tube types by altering filament voltages or socket connections, this company alone replaced 1,000 type 45 triodes last year. Replaced tubes may run to \$35 each.

- **Present applications** - High-performance characteristics qualify some discontinued tubes for use in new equipment. For example, the manufacturer of a diathermy machine employs a triode amplifier originally designed for amateur use, while the maker of an automobile ignition tester finds an 80 rectifier essential.

Because adequate substitutes do not exist, Boonton Radio of New Jersey is compelled to use a specially processed 2A6 high-my triode priced at \$31.50. In this application the high input impedance of the 2A6, registered in 1933, makes it well suited as the voltmeter tube in a Q meter.

Sound familiar? Well, the above story appeared in Electronics . . . 39 years ago!

A RADIO JABBERWOCKY

"Full of sound and fury and signifying nothing"

Charles Berrien, in the N. Y. *Herald-Tribune*, quoted in *Radio Engineering*, Feb. 1929

'Twas kolster, and the freshman set
Did haugh and pacent to and fro.
All console were the cabinet
And grebe fada low.
Be-Ware the music master, Son,
The tone that's true, the cone that's
free;
But harkness to the priess and shun
The straight line frequency.
He took his garod shield to lynch,
Longine the crosley foe he sought,
Then macnamee beneath the kel-

logg tree
And ballantined his thought.
But as in balkite thought he stood,
The cunningham with tubes half lit
Came heising through de Forest
wood
Freed eisemann as it hit.
A. C. D. C., tobe, acme,
The gang condensers wouldn't
track.
He left the dead end loss and said
Zeh bouck! morecroft I lack.

They erla took a willard a,
And splitdorf for a gould,
I hope you get your philco grimes
O bosch, my patents pooled.
And canst thou tune a superhet
Come to my armstrong, samoff boy.
El kay! El kay! O cockaday!
We must have permalloy.
'Twas kolster, and the freshman set
Did haugh and pacent to and fro.
All console were the cabinet
And grebe fada low.