The Official Newsletter of the DVHRC

Vol. 4 No. 10, October 1996

MEETINGS - UPCOMING AND JUST PAST

October's DVHRC meeting will feature the first of a series of presentations by Lewie Newhard on '20s battery radios: history, functioning, and restoration wisdom.

September's meeting was devoted to an extensive tailgate auction which drew enough response to extend to well after dark. All present had a jolly time directing "radio stuff" to new homes.

VANICEK HONORED

We are delighted to report that Jerry Vanicek has won the 1996 "Houck Award for Preservation" of the Antique Wireless Association. Jerry is DVHRC's original Midwest member and, um, chief of the Oscillator's Chicago bureau. More seriously, he's a long-term collector of vacuum tubes who has assembled an extraordinary range of rare and historic types over the past 30+ years. Jerry gave a satisfyingly informative slide talk at Rochester this year on Weagant and Fleming valves, with photo after photo of never-seen examples. He has also written important articles on early tubes for the AWA Review and OTB, and provided consulting aid to museums. We congratulate him warmly on this achievement!

NJARC MEET-AUCTION, HIGHTSTOWN

The New Jersey club is planning another swapmeet and auction for Saturday, Oct. 5. This is at the Hightstown "Country Club" on NJ 33, at Exit 8 of the Turnpike. The flea market will open at 7:30, with auction checkin from 9:00 to 10:30 and auction at noon. Table rates (outdoors) are \$15 (\$3 discount to NJARC members); parking is \$2 per car. Food is available nearby, as are three motels. Internet users can reach the latest scoop - including the initial version of the auction catalog - at http://www.globalent.net/oldradio. Phone users can get reservations from Marv Beeferman on (609) 693-9430, and general info from Bill Overbeck on (610) 789-8199.

The auction will be a fast moving, no-minimum affair with both preplanned/catalogued gear and bring-in material. Auctioneer will be the well known Sam Cannan of MAARC. The catalog will be available on Saturday; questions on its contents can be directed to Ludwell Sibley on (908) 782-4894.

CENTRAL PA RADIO COLLECTORS MEET, DANVILLE

Another Central Pennsylvania meet is planned, this one for Saturday, Oct. 5. New location: the Cloverleaf Barn Antique and Gift Village on Rte. 54W in Danville (east of Williamsport). The event starts at 8:30 AM; no charge for dealer spaces. Food will be available from a snack bar on-site. The location is reached from Exit 33 of I-80. Contacts: Frank Hagenbuch, (717) 326-0932, or Mike Heffner, (717) 546-2907.

	ON THE HORIZON
Oct. 5	NJARC Swapmeet/Auction (see above).
Oct. 5	Central PA Radio Collectors meet, Danville (see above).
Oct. 6	Pack Rats Hamfest, Bucks Co. Drive-In, Rte. 611, Willow Grove. Contact: Paul Drexler, (609) 538-
	1687.
Oct. 13	MAARC Picnic - Arcadia Fairgrounds, Arcadia, MD (same as last year), noon to dusk. Site is on MD Rte. 30, ca. 9 mi. S of PA-MD line. No charge for picnic (commercial food vendor on-site) or tailgating.
Oct. 20	Sellersville Hamfest, Sellersville Firehouse, Rte. 152, 5 mi. S of Quakertown. Contact: Linda Erdman,
. 1717-1400-1407-151 * . 1107-1417-1417-1	(215) 679-5764.
Oct. 27	Newtown Hamfest, 8 AM, Bucks Co. Comm. College, Swamp Rd. Contact: Steve Ewall, (215) 752-
	1202.

THE OSCILLATOR

Newsletter of the Delaware Valley Historic Radio Club Post Office Box 41031, Philadelphia, PA 19127

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.

Unless indicated otherwise, attributed reproduction for nonprofit purposes of any material in this publication is welcome. (Contact the editor to obtain copy on-disc.)

Personal views, opinions and technical advice offered in this newsletter do not necessarily reflect those of the members, officers or Board of Directors of the DVHRC, nor is the organization responsible for any buying or selling transaction incurred.

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may be sent to the editor at 44 E. Main St, Flemington, NJ 08822, (908) 782-4894.

COPY DEADLINE: The 20th of each month. NEXT MEETINGS: Oct. 8, Nov. 12

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.

WANTED: Large type 14-pin CRT socket for tubes like 7JP4. Need socket to modify my N. R. I. model 66 tube tester. Already have newer tube test socket. Got any hook-up advice? FOR SALE: doesn't anyone want an RCA 7" scope, model WO-56A? the power transformer has a shorted turn and starts to cook after about 5 minutes. All tubes are good, manual included. Make an offer, plus shipping. Alton A. DuBois, Jr., 67 Peggy Ann Rd., Queensbury, NY 12804, (518) 792-3130. (10-11/96)

FOR SALE: Philco AM-SW console, late '30s-early '40s, cabinet dusty but finish good. Barb, (908) 284-0642. (9-10/96)

ON THE NET: The latest A. G. Tannenbaum catalog - much bigger than the old one - is available on the Internet at www.voicenet.com/~K2BN. Besides literature, it includes antique radios for sale, hi-fi equipment, testgear, and parts. (9-10/96)

WANTED: Chassis for Philco 37-116. Lewie Newhard, (610) 262-3255. (10-11/96)

FOR SALE: Clear repro dial windows, from stock, for 200+ radio models - Admiral AM-7 through Wells-Gardner 6A26, \$15 each. (Six for the price of five in quantity.) Doyle Roberts, HC-63, Box 236-1, Clinton, AR 72031, (501) 745-6690. (Nonmember ad; please contact originator for list of models.) (10-11/96)

FOR SALE: Tubes, schematics, service notes, Rider's, Sams Photofact folders, transistor books, etc., for early radios. Send LSASE for price list. Sam Faust, PO Box 94, Changewater, NJ 07831. (10-11/96)

Phonograph-related items - top dollar paid im-WANTED: mediately for Vogue Picture Records, wax-cylinder records, needle tins, Nipper, record cleaners, puzzles, advertising mirrors, pins, phonograph toys, posters, original advertising from Edison and Victor. Thanks! Bernie Seinberg, 714 Moredon Rd., Meadowbrook, PA 19046-1907, (215) 886-6124. (9-10/96)

FOR SALE: Novelty items - RCA, Victor, Edison, Splitdorf, and others. Send LSASE (55 cents postage). Sams Photofacts No. 500 up to 1000 - you pick up - 50 cents each. Over 300 books send LSASE (55 cents postage) for list. J. J. Papovich, 53 Magnolia Ave, Pitman, NJ 08071, (609) 582-8279. (10-11/96)

WANTED: AC Dayton Model XL-60 chassis. Can be a junker but speaker and cabinet must be in better shape. A picture would be helpful. Stanley Thompson, 43 Cozy Corner, Avenel, NJ 0701-1122, (908) 636-3630. (10-11/96)

FOR SALE: Collection of the late John Kara (NJARC member), consisting of: AK 188, early battery set, hi-fi equipment, ham receivers, consoles, wood and plastic table-tops, transistor radios, test equipment, crystal sets, 2000 to 3000 radio-TV tubes, etc. Elsie Kara, Whiting, NJ (908) 849-4318. (9-10/96)

WANTED: For Philco Model 21 - speaker, escutcheon, and dial. Aaron Hunter, 23 Lenape, Trail, Southampton, NJ 08088, (609) 267-3065. (10-11/96)

WANTED: EV 666 microphone with cord and correct connector; Emerson 790B in blue, black, or red; national NTS-2 loudspeaker for NC-303 receiver; Hitachi TH-660A 6-transistor radio (black); Polyrad "Capri" 6-transistor in blue; Shalco 3-transistor in black; Shure M63 Audiomaster. Frank Feczko, 37 E. 36th St., Bayonne, NJ 07002, (201) 437-6895. (10-11/96)

FOR SALE: Ware cathedral model B-1 "Bantam" (Bunis 1 & 2), made by the Ware Mfg. Corp., Trenton, NJ, all original, \$200. Freed-Eisemann NR-5 battery set (Bunis 2, p. 81), all original, no tubes, nice, \$90. Crosley XJ battery set (Bunis 1 & 2), all original, no tubes, \$175. Freshman Masterpiece, slanted front, table model, no tubes, all original, \$75. Elwood F. Hunt, 308 Georgetown Rd., Carney's Point, NJ 08069, (609) 299-5259. (10-11/96)



1921, Oct. 16. The *Newark Sunday Call* publishes the first radio section in an American newspaper.

1921, Oct. 18. Radio's first big stars, Billy Jones and Ernie Hare, debut as "The Happiness Boys" on WJZ.

1926, Oct. 17. The controversial radio priest Father Coughlin makes his first commentary on WJR, Detroit.

1929, Oct. 24. Premiere of 'The Fleishman Hour' starring Rudy Vallee.

1932, Oct. 23. Fred Allen debuts on 'The Linit Bath Club Revue' on CBS.

1933, Oct. 1. Ed Wynn's Amalgamated Broadcasting System signs-on as the third network with 100 affiliates, only to go bankrupt and off the air two months later.

1934, Oct. 13. The Quality Group changes its name to the Mutual Broadcasting System.

1937, Oct. 25. First broadcast of the long-running soap opera, "Stella Dallas."

1938, Oct. 30. Martians land in New Jersey and Orson Welles laughs all the way to Hollywood (the infamous "War of the Worlds" broadcast on CBS).

1942, Oct 6. In a twenty-hour "radiothon," singer Kate Smith is credited with selling \$2M in War Bonds.

1951, Oct. 15. First telecast of "I Love Lucy."

1953, Oct. 19. Dr. Edwin Armstrong makes the first public demoe of FM stereo multiplex transmission.

1995, Oct. 17. S. N. Shure of Shure Microphone fame dies at 93.

1995, Oct. 23. US radio stations now total 11, 987: 4908 commercial AMs, 5274 commercial AMs, and 1805 educational FMs.

BOOK REVIEW

TUBE LORE

A Reference for Users and Collectors

By Ludwell Sibley

Reviewed by Marv Beeferman - by arrangement with NJARC's The Jersey Broadcaster

Up to this point, standard tube references have been dedicated to the historical development of vacuum tubes in general (Tyne's <u>Saga of the Vacuum Tube</u>, Stokes' <u>70 Years of Radio Tubes and Valves</u>) or those of a specific manufacturer (Magers' <u>75 Years of Western Electric Tube Manufacturing</u>). In most cases, stress is placed on the progression of tube technology and refinements, with little emphasis on application. In this sense, Ludwell Sibley's <u>Tube Lore comes</u> as a welcome addition, uniting both the practical with the historical, with an appeal to the restorer, collector and historian alike. In the author's words:

This book is intended to aid the present-day user and collector of electron tubes by providing historical insight and specific technical data. It supplies information, from a variety of sources, on the characteristics and design relationships of tubes. With this insight, the user (equipment restorer, audiophile, etc.) may be aided in finding suitable replacement tubes as the supply grows smaller, and the collector may be able to determine the nature and uses of a fresh acquisition.

The data chapters are divided into three major sections, each with an individual theme: types preceding centralized registration by the Radio Manufacturers Association (today's EIA), receiving tubes registered by the RMA/EIA, and special-purpose tubes registered by the RMA/EIA. Supplementary chapters deal with nonregistered special-purpose tubes as produced by multiple makers and those unique to particular manufacturers such as De Forest, Eimac, GE, Raytheon, RCA, Sylvania, Western Electric and Westinghouse.

The information in the data sections goes beyond supplementing conventional tube manuals and guides. For example, the Arcturus AC Series, in addition to its technical characteristics, is described as "Promoted for use w/ common toy transformer. (A)28 and (A)30 first used in Hugo Gernsback's 'Electrified Peridyne,' Radio News, Feb. 1928." Comments such as "Two in WE 50-kW broadcast xmtr." for the 298A and B, and "Two in Galaxy V Mk. 3 and (WRL) Galaxy GT-550 xcvrs" for the 6LB6 are typical of Sibley's extensive knowledge of application and attention to detail. The author explains his reason for taking this approach: "Because it is not tied to the products of a particular manu-

facturer, [<u>Tube Lore</u>] contains information unobtainable elsewhere. (<u>Tubemakers did not publish handbooks covering types available only from their competitors!)." Sibley also refers to his data as a "vector sum . . . because errors and ambiguities are often present in old-time tube material, and may send the unwary reader in the wrong direction."</u>

Additional chapters include trends in tube design, tracing the physical development from acorn tube through the novar; a section on interpreting tube data, with extensive interpretations of abbreviations, codes and tube numbering; a tube user's guide with practical guidance on replacement, testing, substitution, building a repair stock, repair and reactivation (Sibley's "Tube Hospital"), identifying and dating; a section on TV sweep tubes in RF and audio use, and a listing of recent tube auction prices. You'll find typical information on how to repair a loose base but also less typical guidance such as fixing broken keys on octals or restoring open filaments. Sibley's lighthearted "tube scoop" style makes reading pleasant and unencumbered.

For the novice, locating a particular tube in the data tables may take a little effort. For example, one would have to know that a 6005 is included in the RMA-EIA 5500-Series section or that a 1B23 is under the RMA 1942-1944 system. But with such an extensive listing as one finds in <u>Tube Lore</u>, it would be difficult to index individual types in a more structured manner.

<u>Tube Lore</u> is not a coffee-table edition; extensive illustrative filler material takes a back seat to useful technical information. Don't expect it to take a place next to Tyne on your bookshelf, either; it would feel more comfortable on your repair bench - suffering the same solder-flux onslaught as Rider's Volume 1.

Information regarding availability is on page 10.

PHILADELPHIA RADIO HISTORY

THE WORLD BEFORE WUSL Bob Thomas, W3QZO

The July Oscillator reported on presentation of the prestigious Mercury Gold Award to DVHRC's Mike Koste in recognition of the outstanding Public Service Announcement he produced as Production Director at FM Station WUSL. That item prompted some reminiscences of WPBS, which was the predecessor, in frequency and physical property, to WUSL.

It all began in the late 1950s when the Bulletin Company, owner of WCAU and publisher of the Evening and Sunday Bulletin newspapers, sold the entire WCAU-AM, -FM and -TV broadcast properties to CBS. Not included in that sale was the Muzak franchise for Philadelphia, which was retained by the Bulletin. Muzak background music programming, sometimes irreverently referred to as "wall-to-wall" or "elevator" music, was a highly profitable operation which the Bulletin had been broadcasting on a subcarrier of WCAU-FM. Because the Muzak transmission channel had been lost with the sale of WCAU, and desiring to maintain their broadcast presence in the Philadelphia area, the paper established a new FM outlet, WPBS. CBS was instrumental in obtaining a frequency allocation for the new station, which was built on land adjacent to WCAU property at the Roxborough transmitter and antenna complex on Domino Lane.

The Bulletin also retained two of its WCAU managers to run their new operation: Donald Thornburgh, who had been the highly respected General Manager of WCAU, became Vice President for the Bulletin's new broadcast interests; and Ed Meehan, formerly in charge of Muzak and other activities at WCAU, became General Manager of WPBS. Ed had had a colorful career in sales at RCA's Broadcast Division, rising to Transmitter Sales Manager prior to joining WCAU. He hired Jim Quinn from the RCA Service Company to be Chief Engineer of the new sta-

tion, and together they designed and managed construction of new WPBS facilities. Russ Spencer was brought in to separately manage Muzak sales, billing, and extensive installation and service operations.

The WPBS building was rather large for an FM station because it accommodated the entire Muzak operation in addition to the usual broadcast requirements for sales, traffic, production, library and transmitter. The source for Muzak programs was 1/4" audio tape on 18-inch reels, each supplying eight hours of music from unattended playback machines. Reproducing equipment was built especially for Muzak; it was owned by them and physically located in a room entirely separate from normal broadcasting. Tapes were "bicycled" from one station to another to maintain variety in music sequences. Muzak was very aggressive in maintaining its trademark. Inspectors roamed the city listening for "bootlegged" Muzak in restaurants and other commercial establishments, while ASCAP inspectors were similarly on the lookout for unlicensed use of their music properties that might have been received from conventional broadcasts and distributed on a private PA system.

There was a convivial atmosphere at WPBS and Muzak, a reflection of Ed Meehan's gregarious nature. Birthdays and special events were celebrated with office parties or in-house lunches; ladies from various departments frequently went out together for lunch at a restaurant or at one of their homes; outdoor picnics were held in a grove behind the station where the company had provided tables and benches; and the company sponsored a Christmas party every year for employees and their spouses. It might not have been a happy family 100 percent of the time, if such a thing is possible, but it was a family - a nice place to work.

In those times the Chief Engineer of a radio station was a full-time resident employee responsible for installation and maintenance of all technical equipment in conformance with strict, if not intrusive, FCC regulations. Additionally, in a station the size of WPBS, building services also fell within the purview of the Chief ("Jim, the faucet in the ladies' room is leaking."). One of the most stressful events for a Chief (although not as bad as being shut down by lightning or ice falling from the tower and smashing the antenna line below) was the unannounced arrival of an FCC Radio Inspector (RI). Everything was fair game for the RI. He would issue a citation for a burned-out pilot lamp, frayed insulation on a mike cable, or fewer spare tubes than specified by FCC regulations. Without debating the economics, it has become a sad fact that the romance of broadcast engineering in small stations has been drained by today's automated solidstate equipment, an FCC unconcerned about internal operations, and the resultant part-time consultants who now roam from station to station, perusing computer printouts of transmitter performance.

When WPBS went on the air in December 1961, the FM band was an entirely different place than it is today. First, there were vastly fewer stations - they now pack every available channel from one end of the band to the other. All FM broadcasting was with horizontal RF polarization, severely limiting reception quality on portable and automobile receivers with their vertically polarized antennas. Most modern FM stations transmit RF with circular polarization (horizontal and vertical combined) to ameliorate cross-polarization losses and detrimental effects of multipath distortion and flutter due to vehicle motion. But it is in the type of program material that the disparity between the two eras is most obvious. Without making a judgment on today's programs, it can be said that early FM broadcasters were concerned less about arcane distinctions between nearly identical "formats" than about offering real choices of program content [see box]. Thus, one could listen to quality music from films and Broadway shows, popular numbers by the great American composers, classical and semi-classical works, jazz, and "Easy Listening." Unfortunately, there was also a certain amount of lazy simulcasting, where an FM station simply duplicated programs originated on its AM sister station, a waste of spectrum not permitted today.

WPBS offered a variety of programs. The staple in daytime was current pops and old standards, interspersed with news and a few - very few - commercial spots. Lack of financial return didn't seem to bother Mr. Thornburgh in the early days; after all, the *Bulletin* had a means for broadcasting Muzak, which apparently was a good source of revenue, and FM ratings had not yet become a big concern. News was handled by Jay Lloyd, presently suburban correspondent at KYW. One of the early announcers was Harry Prime, formerly a vocalist with the Ralph Flanagan Band, now heard on WNPV,

Lansdale. Later on Jack Pyle, Jack O'Reilly, and John Trent, all fixtures on Philadelphia radio, were disk jockeys on pop and vintage music programs. "All Night Concert" ran lengthy classical works every night from midnight to 6 AM. Ed Meehan conducted "Saturday Night Dance Party," featuring Big Band recordings from the station library and supplemented by historic records and tapes that Ed brought from home or borrowed from friends.

That's the way programming went for the first several years, until ratings became a major issue as WPBS found itself in keen competition with "Easy Listening" station WDVR. In what turned out to be a futile effort to bolster results, Ed hired an aggressive sales manager and strengthened the sales force who, try as they might, were unable to vault WPBS ahead of WDVR. Attention then turned to program format. In a major abdication of local control, WPBS management contracted with a Chicago firm who guaranteed (ha!) to get the station out of its doldrums with new packaged programming. This outfit supplied tapes "scientifically" formatted with bland, middle-of the-road music selections that were to be aired in strict conformance to the consultant's hour-by-hour daily schedules. But Jerry Lee, G. M. of WDVR, knew a thing or two about listener preferences and time sales. His music programming and marketing skills kept WDVR well ahead in ratings. He changed WDVR call letters to instantly identifiable WEAZ ("Easy 101"), and then flooded the region with inexpensive FM receivers fixed-tuned to WEAZ, whose call letters were emblazoned on the front of the radios. Incidentally, Mike Koste has one of these artifacts from the old ratings battles.

Whatever variety in programming that had previously existed to make WPBS unique among Philadelphia FM stations was completely obliterated by the blind frenzy to sound like everyone else, a trend since raised to High Art at many FM and TV stations. In any case, it didn't work for WPBS. In 1976 the *Bulletin* (destined for failure itself) sold the station to Lin Broadcasting. New management came in, call letters were changed to WUSL (*U.S.-1*), and the format abruptly shifted to "Urban Somethingorother." I have no knowledge of subsequent transactions,

EARLY PHILADELPHIA FM STATIONS OF NOTE

WDVR, later WEAZ (Phila.) - Background *Easy 101* WFLN (Philadelphia) - Long-Form Classical

WJBR (Wilmington) - Light classics; Shows/Films/-Soundtracks. First station in the region to broadcast stereo, employing the Crosby system.

WPBS (Phila.) - Background; Big Band; Classical WSNJ (Bridgeton, NJ) - Light classics, Jazz, Shows/-Films

WTOA (Trenton, NJ) - Classical; Light Concert; Shows. "Voice of the *Trenton Times*, from the Capitol to the Cape."

WUHY (PBS, Phila.) - Classical, Jazz, Public Affairs

but apparently the station has been sold again (haven't they all!) with an ironic twist that finds the former WPBS now owned by Easy Communications - a name strangely reminiscent of its old nemesis, WEAZ!

I would like to thank Charlie Higgins, devoted long-time employee of WCAU, and my wife Phyllis, Ed Meehan's secretary throughout the existence of WPBS, for their assistance in preparing this article.

POLITICALLY INCORRECT BOOK REVIEW

"Recently a book appeared on the history of the Transoceanic, by John H. Bryant and Harold N. Cones. This is very interesting in a rather pedantic way, but unfortunately neither of the authors knows much about radio, and what little technical information there is is unreliable. But the photos are very useful." - Geoff Dixon-Nuttall (former Chairman of the British Vintage Wireless Society), in The Radiophile, Summer 1996.

NEMO REDUX Bob Thomas, W3QZO

My article about Nemo, the old-time industry term for a remote broadcast ("What Happened to Nemo?", September Oscillator), concluded with the assumption that Nemo has disappeared from the modern broadcaster's lexicon. Maybe not! New information came to light in a conversation I just had with Bill, N3QMH. He's a free-lance broadcast engineer who has been upgrading audio facilities for several local radio stations. A Broadcast Engineering Airtrak-90 console he recently installed came with a sheet of labels for customizing control nomenclature (similar to call-letter sheets that used to accompany push-button radios). Well, guess what? Along with labels like STUDIO-A, MIC-1, and MASTER, were two marked NEMO! Maybe our old friend hasn't disappeared after all!

AUCTION RESULTS - ROCHESTER Ludwell Sibley

The auctions at AWA's event at Rochester (Sept. 5, 6) offered a broad variety of collectible gear. Ed Gable's communications-equipment sale on Thursday included a group of coilsets for the WW II German version of the National HRO receiver. Friday's all-day auction was expanded by the inclusion of Museum-support donations and material from three estates. It ran unusually late as a result. The "literature" part included an unusual supply of early radio catalogs in good condition and a letter signed by Samuel F. B. Morse. High-interest tubes included a spherical audion (one filament good), a French Métal E4M transmitting tube from WW I, two iconoscopes, a scarce WE 224B 'scope tube, and lots of WE audio types. Early radar tubes may have finally become "collectible": there was spirited bidding for magnetrons and other specialized types in little demand a few years ago. "General" material on Friday included a nice De Forest six-unit Interpanel receiver (deaccessioned by the AWA Museum), a crisp Federal 59, a fine Grebe CR-5, and an L. M. Ericsson all-brass telegraph register. Total take for both days' auctions was \$62,500, close to AWA's record.

ABBREVIATIONS BBT - brass-based, tipped

Book - orig. manual COB - (xero)copy of book

HB - homebuilt	rcvr receiver
NE - Northern Electric	W - Westinghouse
NIB - new in box	WE - Western Electric
NT - no tubes	WT - with tubes
PS - power supply	xmtr transmitter
ADVERTISING	and EPHEMERA
AK employees at facto	ory, 1927 photo ca. 15',
	400
	ard, ship scene, ca. 4'
	290
	e, framed hand-colored
	48
	h-Jongg' card set, radio-
	pads in orig. box300
	ertificate & authorization
	50
Crosley Illum. sign, 24	wide oval, "Appliances-
lelevision, VG	50
	rse, matted & framed, w/
	1750
Philco store wall clock,	ca. 14" plastic face45
RCA key fob a tie clip, a	and RCA "Expert Color TV

Service" thermometer, old logo, both NIB55
RCA Victor showroom chair, chrome/vinyl100
Ritz Crackers advertising tray, '20s23
Stock certificates, Submarine Signal Co. and
Mexican Tel. & Tel. Co., pre-'4525
Zenith tin radio sign, repro./modern (not "our"
Zenith)14
·

COMMUNICATION EQUIPMENT

***: comm gear sold in the main auction.

GENERAL

Abbott TR-4 2-1/2 meter xcvr., exc	45
*Can. Marconi MSL-5 regen, ship rcvr.	, w/
shock mount	
Collins 75A-3, 2 filters, book, exc	370
Galaxy GT-550 xcvr., good, w/ PS	55
German "HRO" coils, set of 3 in coil box,	
close to National, for 3-6, 6-12, 11-22 I	νHz;
light gray; have ceramic contact boards	
ramic rotary trimmers, wide high-resol	
paper dial charts; VG	
Hallicrafters	
S-19 Sky Buddy, VG (2)	10, 45
SX-28, cosmetically VG	
*S-38, VG	33
S-40, VG	35
SX-42 w/ R-42 spkr., needs electronic v	

cosmetically exc190
S-85 rcvr., book, exc40
SX-130, needs restringing, else exc., COB 45
Hammarlund
HC-10 SSB adapter, less case, VG70
HQ-129X, less case, knobs changed, cosmet.
VG35
HQ-170, non-clock model, w/ spkr100
*HQ-170A, non-clock model, VG80
SP-400, HB PS built-in replacing audio xfmrs,
else good35
Home-built
5-tube regen, w/ Bud coils in boxes, VG 45
QRP CW xmtr, 1-tube AC-DC w/ xtal, exc 55
*TNT breadboard xmtr, 210 tube, oldie 48
Heathkit
AT-1 xmtr, VG75
MT-1 Cheyenne xmtr w/ mic, less PS40
SB-300/401 xmtr-rcvr w/ cables, book, VG60
SB-301/401 xmtrrcvr., books60
Johnson Viking L, in almost-matching cabinet,
shield added, recapped, works50
Knight-Kit Span-Master regen., good20
Kuhn (Cincinnati) 353A portable superregen
rcvr., 26-175 MHz, VG30
Lafayette "Lester" VHF conv., 6/10/11 m, VG 12
Lafayette KT-340 rcvr., VG40

	Experimental Television, Collins, 1932 (scan-	Pilot Radio, 1929; Universal Microphones,
National	disc TV), good60	1933; both good15
VG250	F. A. D. Andrea neutrodyne kit instruction book	
HRO-5TA1, 4 coilsets, w/ coil box and Nat'l.	W/ panel stencils, VG15	Flashes (both catalogs)8 Radio Guild 1925; Airex '31; RCA '35 metal-tube
spkr, HB PS, VG170	chinson; VG	
NC-44A (model w/ isol. xfmr), coax conn. ad-		Sears radio '36-'37; plus Watt News, Dec. 1937;
ded at side, else nice80		both exc14
*NC-98, exc65	Heathkit novice-course binder5	Silver-Marshall, ca. 6, exc
	Man of High Fidelity, Lessing, hardbound, re-	
NC-17770		WE 1000-W Broadcast Equipment10
RCQ, less cover, fair-good80	Manual for RCA direction finder, '30s18	WE 5000-W Broadcast Equipment10
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SW-54, VG22		Amateur-radio mags, '60s & later, 2 bundles 5 ARCA Gazette, 10' stack
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Peerless, works, needs minor cloth fix35	Executone 6550s (2), used, good23	UX-199, UV-199 (2), crisp '20s boxes, unk.
RCA Radiola 103, good but small hole in	Majestic spray-shielded, Can., ca. 10	cond
tapestry, works	Marathon AC-608 (5), all good130 Marconi-De F audion, BBT, open38	WD-11s (2), tipped, bklt. bases, good
Vocarola, wall-plaque mounting100	Myers RAC (2) good w/ socket, 70; open, 43	Audiotron, good
Sterling "Dinkie" horn, 6" bell, w/ original box,	National Union 350Bs (6)110	Crookes "mineral" CRT, repro, vertical on
VG700	Northern Electric	wood base225
Tower "Adventurer" ship cone, VG, works500	216A, good45	
WE 10D horn, minor repairs, VG110	221D (3), good48	Disc-TV neon (De Forest 601?), dud
TEST GEAR	DX-221, good35	
Boonton 100A (early) Q-meter23	RX-235 (pair), good	*
Cossor Telecheck 1230 sig. gen10	RCA	FOREIGN TYPES
Federal Television TV-2A tube tester, six	2AP1, new in "world" box10	Box lot (5): Stabilovolt, EF39, ECH11, etc 45 Box lot, early radar (20): CV85, CV92, CV90,
meters, VG, case repainted280	2A3 (5), NIB260	CV116, CV1484, etc.; plus some US 160
Firth Model I wavemeter, VG13	50, ST bulb, NIB110	CV-1226 short silica valve (Brit.) and French
General Radio	203As (2), alum. base, crisp "world" boxes 30	TM-30, good170
222LS prec. condenser in carry case, exc23 583-A output power meter, exc25	224, 227 (4), new in crisp '20s boxes	E4M Métal (French WW I), used850
Decade resistor, 5-switch10	860, nice but unk. cond	Everready (Brit.), 12 NIB, good55
Tube bridge, one socket, VG53	1608 (3), NIB80	Genelex KT-66 (4), good, in orig. boxes 210
VTVM, prewar sloping-front, good18	1848 (?) iconoscope, 5*, octal base240	Genelex KT-88 (2), used, "excellent" 110
Wavemeter w/ coils & shipping case30	1850A iconoscope, w/ GE box210	Marconi-Osram V24, good100
Wavemeter w/ coils, no crate32 Gray portable Wheatstone bridge (*galvano-	8005 (2), NIB70	Osram sim. to DEQ, plus Myers RAC3, Osram
meter), very nice35	UV-201A, BBT, pretty "rainbow," good emission40	2292
Hitachi bench-style lab meter, WW II20	UV-849, aluminum base, good33	BOX LOTS
James Bill Co Frahm portable reed freq. me-		Big-pin, ca. 80 , tested OK20
	UV-851, aluminum base, good270	Diamin 40 incl Chulb 04A and accord 45.
ters (3), 400 & 800 Hz45	UX-199 (3), good, crisp boxes35	Big-pin, 13, incl. S-bulb 01A and several 45s,
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond110
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes 35 WD-11, BB, NIB 80 Store-display neon, cond. unk 105 Rogers R-30, good 10	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes 35 WD-11, BB, NIB 80 Store-display neon, cond. unk 105 Rogers R-30, good 10 Speed (Cable) 296 "Triple Twin," good 50	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond
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ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond
ters (3), 400 & 800 Hz	UX-199 (3), good, crisp boxes	unk. cond