ELECTRONIC ENGINEERING MASTER INDEX

1946

The ELECTRONIC ENGINEERING MASTER INDEX 1946

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Edited by FRANK A. PETRAGLIA

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The ELECTRONIC ENGINEERING MASTER INDEX

A Subject Index to Electronic Engineering Periodicals
July 1945 to December 1946

Edited by FRANK A. PETRAGLIA
ASSOCIATE MEMBER, I.R.E.

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PREFACE

This 1946 edition of THE ELECTRONIC ENGINEERING MASTER INDEX is the first annual supplement to the 1925-1945 edition covering the electronics literature published during the twenty-year period from January, 1925 to June, 1945. The present compliation brings the bibliography up to date from July, 1945 through December, 1946.

Approximately 7500 new entries are included in this volume, comprising selections from more than 85 periodicals in electronics and allied engineering fields. About two-thirds of the new listings relate to the new technical literature of the current period, and the remaining third consists of miscellaneous entries, principally from foreign periodicals, ranging over the last decade.

Two entirely new sections are included in this book, the "Bibliography of Engineering Texts," and the section entitled "Trade Literature," the latter being a survey of manufacturers' literature issued during the past six months. For obvious reasons the selections included in this section have been limited to recent issues. While this section is therefore not complete, it is fairly representative. These two new sections should be found very useful in their handy presentation of both the theoretical and practical working literature of the profession.

The cumulative "Cross Index of Subjects" at the end of this book serves as a guide to both the present compilation and the 1925-1945 edition. Thus the entire bibliography of electronics literature from 1925 to 1946 may be conveniently surveyed by referring to this single table of contents.

FRANK A. PETRAGLIA

New York City, N. Y.
March, 1947

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Key to Abbrevations

abr	abridged	Mar	March
Aug	August	Nov	November
Apr	April	Oct	October
bibliog	bibliography	p	page
comp	compiled or compiler	pl	plate
cond	condensed	pt	part
contd	continued	rev	revised
Dec	December	Sept	September
diag	diagram	sup	supplement
ed	edition or editor	tr	translation or translator
Feb	February		
il	illustrations	v	volume
Jan	January		

Each entry is presented as follows:

Title of article
Author or authors
Title of periodical
Volume number
Page number
Month and year

Sample entry:

Method of measuring noise levels on short-wave radiotelegraph circuits. H. O. Peterson. Proc Inst Radio Eng 23:128 Feb '35

LIST OF PERIODICALS INDEXED

Aero Digest—Aero Digest. $3; single numbers 50c. Semi-monthly. Aeronautical Digest Publishing Corp, 515 Madison Ave, New York 22, N. Y.

Aerovox Res W—Aerovox Research Worker. 50c; single numbers upon request. Aerovox Corporation, New Bedford, Mass.

Amer Inst Chem Eng Trans—American Institute of Chemical Engineers Transactions. $10; single numbers $2. Bimonthly. American Institute of Chemical Engineers, 50 E 41st St, New York, N. Y.

Amer Jour Sci—American Journal of Science. $6; single numbers 60c. Monthly. American Journal of Science, New Haven, Conn.

Ann der Phys—Annalen der Physik. Irregular. Verlag von Johann Ambrosius Barth, Leipzig, Germany.

Arch Forum—Architectural Forum. $4; single numbers $1. Monthly, Time, Inc, 330 E 22nd St, Chicago 16, Ill.

Arch Record—Architectural Record. $3; single numbers $1. Monthly. F. W. Dodge Corp, 119 W 40th St, New York, N. Y.

Aviation—Aviation. $3; single numbers 50c. Monthly. McGraw-Hill Pub. Co, Inc, 330 W 42d St, New York 18, N. Y.

Aviation N—Aviation News. $5; single numbers 50c. Weekly. McGraw-Hill Pub. Co, Inc, 330 W 42d St, New York 18, N. Y.

B.B.C. Quart—B. B. C. Quarterly. British Broadcasting Co, Broadcasting House, London, W.C. 1, England.

Beama Jour—Beama Journal. Monthly. British Electrical & Allied Manufacturers' Assn, 36 Kingsway, London, W.C. 2, England.

Bell Lab Rec—Bell Laboratories Record. $2; single numbers 25c. Monthly. American Telephone and Telegraph Co, 195 Broadway, New York, N. Y.

Bell System Tech Jour—Bell System Technical Journal. $1.50; single numbers 50c. Quarterly. American Telephone and Telegraph Co, 195 Broadway, New York, N. Y.

Brown Boveri Rev—Brown Boveri Review. Monthly. Brown, Boveri & Company, Ltd, Baden, Switzerland.

Bsns W—Business Week. $5; single numbers 20c. Weekly. McGraw-Hill Pub. Co, Inc, 330 W 42d St, New York 18, N. Y.

CAA Jour—Civil Aeronautics Journal; issued monthly by the Civil Aeronautics Administration. 50c. Superintendent of Documents, Washington 25, D.C.

Chem & Ind—Chemistry and Industry. £2 15s. single numbers 2s. Weekly. Society of Chemical Industry, 56 Victoria St, London, S.W. 1, England.

Civil Aero Jour—Civil Aeronautics Journal; issued monthly by the Civil Aeronautics Administration. 50c. Superintendent of Documents, Washington 25, D. C.

Communications — Communications. $2.00. Single numbers 25c. Monthly. Bryan-Davis Publishing Co, 52 Vanderbilt Ave, New York, N. Y.

Elec Comm—Electrical Communication. $1.50; single numbers 50c. Quarterly. International Telephone & Telegraph Co, 67 Broad St, New York.

Elec Eng—Electrical Engineering. $12; single numbers $1.50. Monthly. American Institute of Electrical Engineers, 33 W 39th St, New York 18, N. Y.

Electronic Eng—Electronic Engineering. 26s; single numbers 2s. Monthly. Hulton Press, 43-44 Shoe Lane, London, E.C. 4, England.

Elec Ind & Inst—Electronic Industries and Instrumentation. Two year subscription only. $3; single numbers 25c. Caldwell-Clements, Inc, 480 Lexington Ave, New York 17, N. Y.

Elec Rev (Lond)—Electrical Review. £2 7s 8d; Canadian subs £2 3s 4d; elsewhere £2 5s 6d; single numbers 9d. Weekly. Electrical Review, Dorset House, Stamford St, London, S.E. 1, England.

Elec West—Electrical West. $2; single numbers 25c. Monthly. McGraw-Hill Co. of California, 68 Post St, San Francisco 4, Calif.

Elec World—Electrical World. $5; single numbers 25c. Weekly. McGraw-Hill Publishing Co, Inc, 330 W 42d St, New York 18, N. Y.

Electrician—Electrician. 30s; single numbers 6d. Weekly. Benn Bros, Ltd, Bouverie House, 154 Fleet St, London, E.C. 4, England.

Electrochem Soc Trans—The Electrochemical Society Transactions. Electrochemical Society, Columbia University, New York 27, N. Y.

Electronic Indus — Electronic Industries. Monthly. (Now Electronic Industries and Instrumentation.) $3; single numbers 35c. Electronic Industries, 480 Lexington Ave, New York 17, N. Y.

Electronics—Electronics. $5; single numbers 50c. Monthly. McGraw-Hill Pub. Co, Inc, 330 W 42d St, New York 18, N. Y.

Elektrotech Zeit — Elektrotechnische Zeitschrift. Weekly. Verband Deutscher Elektrotechniker, VDE Haus, Berlin-Charlottenburg 4, Germany.

Eng N—Engineering News-Record. $5; single numbers 25c. Weekly. McGraw-Hill Pub. Co, Inc, 330 W 42d St, New York 18, N. Y.

Engineer—Engineer. £3 3s; Canadian subs £2 18s 6d; single numbers 1s 6d. Weekly. Engineer, 28, Essex St, Strand, London, W.C. 2.

Engineering—Engineering. Thick paper ed £3 7s 6d; thin paper ed £3 3s; Canadian subs thick paper ed £3 3s; thin paper ed £2 18s 6d; single numbers 1s 2½d. Weekly. Engineering, Ltd, 35 and 36 Bedford St, Strand, London, W.C. 2, England.

Factory Management — Factory Management and Maintenance. $3; single numbers 35c. Monthly. McGraw-Hill Publishing Co, Inc, 330 W. 42d St, New York 18, N. Y.

FM & Tele—FM and Television. $3; single numbers 25c. Monthly. FM Company, Great Barrington, Mass.

Franklin Inst Jour—Journal of the Franklin Institute. $6; single numbers 60c. Monthly. Franklin Institute, Benjamin Franklin Parkway, Philadelphia, Pa.

Funktech Monatschefte — Funktechnische Monatschefte fuer Rundfunk, Hochfrequenztechnik und Grenzgebiete. Monthly. Weidemannsche Buchhandlung, Berlin, Germany.

Gen Elec Rev—General Electric Review. $3; single numbers 30c. Monthly. General Electric Co, Schenectady 5, N. Y.

Genie Civil—Le Genie Civil, 280 fr; single numbers 5 fr. Weekly. Genie Civil, 5 Rue Jules Lefebre. Paris, France.

Helv Phys Acta—Helvetica Physica Acta. E. Birkhaeuser & Cie.. A.G., Basel, Switzerland.

Hochfrequency und Electronik—Hochfrequenztechnik und Electroakustik, Jahrbuch der drahtlosen Telegraphie und Telephonie. Monthly. Akademische Verlagsgesellschaft Becker und Erler Kom.-Ges., Leipzig, Germany.

Iron Age—Iron Age. $8; single numbers 35c. Weekly. Chilton Co, Inc, Chestnut & 50th Sts, Philadelphia, Pa; 100 E 42nd St, New York 17, N. Y.

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Ind Stand—Industrial Standardization and Commercial Standards Monthly. $4; single numbers 35c. American Standards Association, 29 W. 39th St, New York, N. Y.

Jour Acoustical Soc Amer—Journal of the Acoustical Society of America. $6; single numbers $1.80. Quarterly. American Institute of Physics, 57 W 56th St, New York 22, N. Y.

Jour Aeronautical Sci—Journal of the Aeronautical Sciences. $7; single numbers $2. Quarterly. Institute of the Aeronautical Sciences, Inc, 30 Rockefeller Plaza, New York 20, N. Y.

Jour Amer Cer Soc—Journal of the American Ceramic Society. $15; single numbers $1.50. Monthly. American Ceramic Society, 2525 N High St, Columbus 2, Ohio.

Jour Amer Inst Elec Eng—See Elec Eng.

Jour Ap Phys—Journal of Applied Physics. $7; single numbers 70c. Monthly. American Institute of Physics, 57 E 55th St, New York 22, N. Y.

Jour Fr Inst—See Franklin Inst Jour.

Jour Inst Elec Eng—Journal of the Institution of Electrical Engineers. Single numbers pt 1 5s; pt 2 7s 6d; pt 3 6s. Monthly. The Institution, Savoy Place, Victoria Embankment, London, W.C. 2; E.&F.N. Spon, Ltd, 57 Haymarket, London, S.W. 1, England.

Jour Opt Soc Amer—Journal of the Optical Society of America. $7; single numbers 70c. Monthly. American Institute of Physics, Inc, 57 E 55th St, New York 22, N. Y.

Jour Phys—Journal of Physics. Irreg. Academy of Sciences of the U.S.S.R., Moscow, Russia.

Jour Res Nat Bur Stand—Journal of Research of the National Bureau of Standards. $3.50; single numbers 30c. Monthly. Superintendent of Documents, Washington 25, D. C.

Jour Roy Aeronautical Soc—Journal of the Royal Aeronautical Society. £4 10s; single numbers 7s 9d. Monthly. Royal Aeronautical Sociay, 4 Hamilton Place, Piccadilly, London. W. 1, England.

Jour Sci Inst — Journal of Scientific Instruments. Monthly. Institute of Physics, 19 Albermarle St, London, W.1, England.

Jour Soc Motion Picture Eng—Journal of Society of Motion Picture Engineers. $8; single numbers $1. Monthly. Society of Motion Picture Engineers, Hotel Pennsylvania, New York 1, N. Y.

Jour Western Soc of Eng—Journal of the Western Society of Engineers. $3; single numbers 75c. Quarterly. Western Society of Engineers, 205 W Wacker Drive, Chicago 6, Ill.

Marine Eng—Marine Engineering and Shipping Review. $3; single numbers 35c. Monthly. Simmons-Boardman Publishing Corp, 30 Church St, New York 7, N. Y.

Mech Eng—Mechanical Engineering. $6; single numbers 75c. Monthly. American Society of Mechanical Engineers, 29 W 39th St, New York 18, N. Y.

Metals & Alloys—Metals and Alloys. $2; single numbers 25c. Monthly. Reinhold Publishing Corp, 330 W 42d St, New York 18, N. Y.

Mod Plastics—Modern Plastics. $5; single numbers 50c. Monthly. Modern Plastics, Inc, 122 E 42d St, New York 17, N. Y.

Nat Research Council Bul—National Research Council, 2101 Constitution Ave, Washington, D. C. Price list of individual numbers sent on request.

Nature—Nature. Weekly. McMillan & Co, Ltd, St. Martin's St., London, W.C.2, England.

Onde Elec—L'Onde Electrique. Bulletin de la Societe des Radioelectriciens. Monthly. Etienne Chiron, 40, Rue de Seine, Paris 6e, France.

Philips Res Rep—Philips Research Report. Bimonthly. Eindhoven, Holland.

Phil Mag — The Philosophical Magazine. Monthly. Taylor and Francis, Ltd, Red Lion Court, Fleet St, London, England.

Physica—Physica. The Hague, Holland.

Phys Rev—The Physical Review. $15; single numbers $1.50. Monthly. American Institute of Physics, Inc, 57 E 55th St, New York 22, N. Y.

Phys Soc Proc—Proceedings of the Physical Society. Bimonthly. The Physical Society, 1 Lowther Gardens, Prince Consort Road, London, S.W.7, England.

P.O. Elec Eng Jour—Post Office Electrical Engineers' Journal. Quarterly. Birch & Whittington, Epsom, Surrey, England.

Power—Power. $3; single numbers 35c. Monthly. McGraw-Hill Publishing Co, Inc, 330 W 42nd St, New York 18, N. Y.

Proc Inst Radio Eng—Proceedings of the Institute of Radio Engineers. $10; single numbers $1. Monthly. Institute of Radio Engineers, Inc, 1 E 79th St, New York 21, N. Y.

Product Eng—Product Engineering. $5; single numbers 50c. Monthly. McGraw-Hill Publishing Co, Inc, 330 W 42d St, New York 18, N. Y.

QST—QST. $2.50; single numbers 25c. Monthly. American Radio Relay League, West Hartford, Conn.

Radio—Radio. $3; single numbers 35c. (Discontinued). Radio Magazines, Inc, 342 Madison Ave, New York 17, N. Y.

Radio Craft—Radio Craft. $2.50; single numbers 25c. Monthly. Radcraft Publications, 25 W. Broadway, New York, N. Y.

Radio N—Radio News. $3; single numbers 35c. Monthly. Ziff-Davis Publishing Co, 185 N Wabash Ave, Chicago 1, Ill.

Rev Sci Instr—Review of Scientific Instruments. $5; single numbers 50c. Monthly. American Institute of Physics, Inc, 57 E 55th St, New York 22, N. Y.

R.S.G.B. Bul—R.S.G.B. Bulletin. Monthly. Official Journal of Incorporated Radio Society of Great Britain. New Ruskin House, London, W.C. 1, England.

Ry Age—Railway Age. $6; single numbers 25c. Weekly. Simmons-Boardman Publishing Corp, 30 Church St, New York 7, N. Y. Price of Jan. 6 issue $1.

S A E Jour—S.A.E. Journal. $10; single numbers $1. Monthly. Society of Automotive Engineers, Inc, 29 W 39th St, New York 18, N. Y.

Sci Amer—Scientific American. $4; single numbers 35c. Monthly. Munn & Co, Inc, 24 W 40th St, New York 18, N. Y.

Science—Science. $6; single numbers 15c. Weekly. American Association for the Advancement of Science. Lancaster, Pa.

Tech Rev—Technology Review. $3.50; single numbers 50c. Monthly (except Aug, Sept, Oct). Massachusetts Institute of Technology, Cambridge 39, Mass.

Tele-Tech—Tele-Tech. $3; single numbers, 25c. Monthly. Caldwell-Clements, Inc, 480 Lexington Ave, New York 17, N. Y.

Telev Franc—La Television Francaise. Monthly. 21 Rue des Jeuneurs, Paris, 2½, France.

Toute la Radio—Toute la Radio. Societe des Editions Radio, 9 Rue Jacob, 6e, France.

Trans A S M E—Transactions of the American Society of Mechanical Engineers. $12; single numbers $1.50. Monthly (except Mar, June, Sept, Dec). American Society of Mechanical Engineers, 29 W 39th St, New York 18, N. Y.

VDI—Zeitschrift des Vereines Deutscher Ingenieure. VDI—Verlag G. m. b. H. Dorotheenstr 40, Berlin NW 7, Germany.

Wireless Eng—Wireless Engineer. 32s; single numbers 2s 6d. Monthly. Iliffe & Sons, Ltd. Dorset House, Stamford St, London, S.E. 1, England.

Wireless World—Wireless World. 20s; single numbers 1s 6d. Monthly. Iliffe & Sons, Ltd. Dorset House, Stamford St, London, S.E. 1, England.

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ACOUSTICS

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Absorption of sound by coated porous rubber wallcovering layers. C. W. Kosten. Jour Acous Soc Amer 18:457-471 Oct '46

Acoustic feedback reduction by increased directivity in megaphones. A. J. Sanial. diags Communications 25:38 Sept '45

Acoustic impedance of porous materials. L. L. Beranek. Jour Acous Soc Amer 13:248-260 Jan '42

Acoustic intensity distributions from a "piston" source. A. O. Williams, Jr. and L. W. Labau. Jour Acous Soc Amer 16:231-236 Apr '45

Acoustic laboratory; description of Harvard "anechoic chamber." Electronic Indus 5:78 Mar '46

Acoustic material effects. Communications 26:40 Mar '46

Acoustic models of radio antennas. E. C. Jordan and W. L. Everitt. Proc Inst Radio Eng 29:186 Apr '41

Acoustic reflection from triplanes, spheres and disks. C. J. Burbank. Phys Rev 69:136 Feb 1 '46

Acoustic testing of high fidelity receivers. Harold A. Wheeler and Vernon E. Whitman. Proc Inst Radio Eng 23:610 June '35

Acoustical correction by sound diffusion; semi-spherical diffusers used for acoustical correction in recording studio. Forrest L. Bishop. Communications 26:36 Oct '46

Acoustics of small rooms and studios; abstract. J. Moir. plan Electronics 18:286 Feb '45

Analysis of sound decay in rectangular rooms. F. V. Hunt. Jour Acous Soc Amer 11:80-94 July '39

Analysis of the tones of a few wind instruments. F. A. Saunders. Jour Acous Soc Amer 18:395-401 Oct '46

Application of the Helmholtz resonator to the measurement of sound absorption. W. S. Tucker. Phil Mag 36:473-485 July '45

Attenuation of sound in circular ducts. E. Fisher. Jour Acous Soc Amer 17:121-122 Oct '45

Attenuation of sound in lined circular ducts. C. T. Molloy and E. Honegman. Jour Acous Soc Amer 16:267-272 Apr '45

Contribution to the theory of acoustic radiation. Philips Res Rep 1:251-277 Aug '46

Correction of the audio characteristics of communication systems with measured articulation scores. L. L. Beranek. Jour Acous Soc Amer 18:250 July '46

Curve-tracer for acoustic devices; quality control over production of handset receivers obtained. R. K. Hellmann. il diags Electronics 18:130 Dec '45

Demountable soundproof rooms; rooms built for Murray Hill laboratories of Bell laboratories. W. S. Gorton. il Communications 26:30 Mar '46

Design and construction of anechoic sound chambers. L. L. Beranek and H. P. Sleeper, jr. Jour Acous Soc Amer 18:140-150 July '46

Design and properties of an adjustable comparison impedance. K. Schuster and W. Stohr. Akus Zeit 4:253-260 July '39

Direct method of finding the value of materials as sound absorbers. H. O. Taylor. Phys Rev 2:no. 4 270-287 Oct '43

Discussion of the acoustical properties of fiberglass. W. M. Rees and R. B. Taylor. Jour Soc Mot Pic Eng 46:52-63 Jan '46

Distributions of eigentones in a rectangular chamber at low frequency range. D. Y. Maa. Jour Acous Soc Amer 10:235-238 Jan '39

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Effect of an absorbing wall on the decay of normal frequencies. N. B. Bhatt. Jour Acous Soc Amer 11:67-73 July '39

Effect of non-uniform wall distributions of absorbing material on the acoustics of rooms. H. Feshbach and C. M. Harris. Jour Acous Soc Amer 18:472-478 Oct '46

Effects of distortion on the intelligibility of speech at high altitudes. G. A. Miller and S. Mitchell. Jour Acous Soc Amer 18:250 July '46

Effects of high altitude on speech and hearing. H. W. Rudmose, K. C. Clark and others. Jour Acous Soc Amer 18:250-251 July '46

Electrical-acoustical equivalents. C. E. Harrison. Communications 25:44-45 June '45

Electroacoustic laboratory at Harvard University. il Communications 26:50 Feb '46

Electro-acoustic reactions; with special reference to quartz crystal vibrators. A. T. Starr. diags Wireless Eng 17:247-303 June-July '40

Electro-mechanical analogy in acoustic design. A. M. Wiggins. Radio 30:28-9 Apr '46

Electronic engineering patent index, 1946. F. A. Petraglia, ed. Electronics Research Publ. Co., New York 19, N. Y. p. 1-3

Electronics in auditory research. David M. Speaker. Electronics 14:38-41 Sept '41

Elements of acoustical engineering. H. F. Olson. D. Van Nostrand Co., New York, N. Y. 344 p $6.00 '40

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Extraneous frequencies generated in air carrying intense sound waves. A. I. Thuras, R. T. Jenkins and H. T. O'Neil. Bell Sys Tech Jour 14:159 Jan '35

Forms, properties and functions of fibrous glass, acoustical materials. Willis M. Rees. Communications 26:36 Jan '46

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General theory of passive linear electroacoustic transducers and the electroacoustic reciprocity theorems. L. L. Foldy and H. Primakoff. Jour Acous Soc Amer 17:109-120 Oct '45

Heat and sound insulation. L. M. Ball. SAE Jour 54:39-40 Dec '46

Higher fidelity in sound transmission and reproduction. George M. Nixon. Jour Acous Soc Amer 17:132-135 Oct '45

Hundred-element tone synthesizer. E. C. Wente, C. A. Lovell, and J. F. Muller. Jour Acous Soc Amer 18:253 July '46

Investigation of room acoustics by steady-state transmission measurements. F. V. Hunt. Jour Acous Soc Amer 10:216-227 Jan '39

Investigation of the performance of the Raleigh disc. R. A. Scott. Proc Roy Soc ser A 183:296-316 Feb 22 '45

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La resonance electroacoustique et ses applications recentes. M. Adam. il diag Genie Civil 108:580 June 20 '36

Masking of speech by sine waves, square waves, and regular and randomized pulses. S. S. Stevens, J. Miller and I. Truscott. Jour Acous Soc Amer 18:250 July '46

Materials and construction of speech broadcast studios. Lonsdale Green, jr. Electronic Indus 2:74 May '43

Measurement of acoustic absorption by the stationary wave method. G. Sacerdote. Alta Frequenza 15:68-76 June '46. Summaries in English, French and German.

Measurement of reverberation. W. Tak. Philips Tech Rev 8:82-88 Mar '46

Measurement of supersonic absorption in water by the balance method with mechanical integration. E. Tsung-Yereh Hsu. Jour Acous Soc Amer 17:127-131 Oct '45

Non-linear propagation of underwater shock waves. H. F. M. Osborne and A. H. Taylor. Phys Rev 70:218 Aug 1 '46

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Notes on acoustic impedance measurement. H. J. Sabine. Jour Acous Soc Amer 14:no. 2 153-150 Oct '42

On sound absorption with the aid of damped resonators. W. Willms. Akust Zeit 4:29-32 Jan '39

On the theory of the directional patterns of continuous source distributions on a plane surface. R. Clark Jones. Jour Acous Soc Amer 16:147-171 Jan '45

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Pitch, loudness and quality of musical tones. Amer Jour Phys 14:215 July-Aug '46

Practical acoustics and planning gains and noise. B. Hope. Chemical Publishing Co., New York, N. Y. 146 p $2.50 '42

Principles of noise reduction in offices and factories. M. A. Smith. Eng N 137:643-645 Nov 14 '46

Problems of modern acoustics; noise and vibration. P. Chevasse. Onde Elec 26:274-287 July '46

R-C filter circuits. G. J. Thiessen. Jour Acous Soc Amer 16:275-279 Apr '45

Resonant circuit modulator for broad band acoustic measurements. G. F. Hill, jr. Jour Ap Phys 17:1066-1075 Dec '46

Scott high-fidelity receivers. E. H. Scott. Proc Inst Radio Eng 29:295 June '41

Selected problems in architectural acoustics; problems pertaining to recording studios and conditions of microphone pickup. M. Rettinger. Proc Inst Radio Eng 31:18 Jan '43

Some aspects of the theory of room acoustics. P. M. Morse. Jour Acous Soc Amer 11:56-66 July '39

Some practical comparison tests made between several acoustic measurement methods. E. T. Dickey. Proc Inst Radio Eng 25:1136 Sept '37

Sound spectra of sparks and pistol shots with reference to their application to electroacoustic measurement technique. W. Weber. Akus Zeit 4:373-391 Nov '39

Standards on electroacoustics; 1938. 37 p Institute of Radio Engineers, New York 50c.

The conical sound source. P. G. Bordoni. Jour Acous Soc Amer 17:123-126 Oct '45

The multitone; sound source for space-acoustic measurement. W. L. Barrow. Jour Acous Soc Amer 10:275-279 Apr '39

Thermal and acoustic effects attending the absorption of microwaves by gases. W. D. Hershberger, E. T. Bush and A. W. Leck. il diag RCA Rev 7:422-31 Sept '46

War influence on acoustic trends; account of special measures needed to transmit through high noise levels of battle conditions; abstract. H. S. Knowles. Electronic Indus 4:81 Dec. '45

Wave-front determination in a unidirectional supersonic beam. L. W. Labau. Jour Acous Soc Amer 17:19-23 July '45

Z-meter; basic laboratory instrument opens new field in accurate electrical and electroacoustic measurements. L. E. Packard. Electronic Indus 5:42-45 Dec '46

See also

Broadcasting Studios
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ADCOCK Antennas. See Antennas, Directional

AERIALS. See Antennas

AERONAUTICAL Radio

Aeronautical communications in the postwar era. McMurdo Silver. Communications Vol 25 Jan '45

Airline v-h-f f-m system. (Trans-Canada Air Lines Network). T. W. Hall. diags Communications Vol 25 Sept '45

Aviation communication systems. D. W. Rentzel. il Elec Eng 64:387 Nov '45

Aviation's electronic requirements. D. W. Rentzel. Electronics 18:288 Oct '45

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Britain's radio system. Roy C. Norris 11 diags Communications 23:11 May '43

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CAA would hold advances in electronics for future use. B. Stubblefield. Aviation N 4:44 Dec 3 '45

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Future of electronics in aviation. J. D. Goodell and D. J. Coleman. il Radio N 35:25 Feb '46

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AIDS to Aviation. See Aircraft Navigation Aids

See also

Aircraft Blind Landing Systems
Aircraft Instrument Landing Systems
Radar, Airborne
Television, Airborne

AIDS to Navigation. See Marine Navigation Aids Misc.

AIRBORNE Radar. See Aircraft Radar

See also

Aircraft Navigation Aids, Misc.

AIRBORNE Television. See Television, Airborne

AIRCRAFT Antennas

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McGraw-Hill Book Co., 144 p, $2.50.

Proceedings of 1946 National Electronics Conference. R. E. Beam, ed.
Electrical Eng. Dept., Northwestern University, Evanston, Ill., 741 p, $3.50.

Production and Direction of Radio Programs. J. S. Carlile.
Prentice-Hall, 937 p, $3.75.

The Radio Amateur's License Manual.
American Radio Relay League, 25 cents.

Radio's Conquest of Space. Donald McNichol.
Murray Hill Books, 374 p, $4.00, 1946.

Radio Networks and the Federal Government. T. P. Robinson.
Columbia University Press, $3.50.

Relay Engineering. Charles A. Packard.
Struthers-Dunn, Inc., 1946, 640 p, $3.00.

Rhombic Antenna Design. A. E. Harper.
D. Van Nostrand Co., 111 p, $4.00, 1941.

Technic of Electrotherapy and Its Physical and Physiological Basis. S. L. Osborn, and H. J. Holmquest.
Charles C. Thomas, $7.50.

The Technique of Motion Picture Production.
Interscience Publishing, 158 p, $3.50.

What You Should Know About the Signal Corps. H. M. Davis and F. G. Gassett, Jr.
W. W. Norton & Co., Inc., $2.50.

X-Ray Crystallography. M. J. Buerger.
D. Van Nostrand Co., 531 p, $6.50.

X-Ray in Practice. W. T. Sproull.
McGraw-Hill Book Co., 603 p, $6.00, 1946.

PHYSICS

A Course in Radio Fundamentals.
American Radio Relay League, Inc., 50 cents.

Analytical Experimental Physics. H. B. Lemon and M. Ference, Jr.
The Universit yof Chicago Press, 584 p, $5.75, 1943.

Atomic Theory. A. Haas.
D. Van Nostrand Co., 272 p, $6.00.

Circuit Analysis by Laboratory Methods. Carl E. Skroder and M. Stanley Helm.
Prentice-Hall, Inc., 282 p, $5.35, 1946.

The Cyclotron. W. B. Mann.
Blackie & Sons Ltd., 92 p, $1.50.

Conduction of Electricity Through Gases. J. J. and G. P. Thomsn.
Macmillan Co., Vol. I 491 p, $6.00, 1928. Vol. II 608 p, $7.00, 1933.

Electrical Counting: With Special Reference to Counting Alpha and Beta Particles. W. B. Lewis.
Macmillan Co., 144 p, $2.50.

Electron and Nuclear Counters. Serge A. Korff.
D. Van Nostrand Co., 212 p, $3.00, 1946.

Electron and Nuclear Physics. J. B. Hoag.
D. Van Nostrand Co., 502 p, $4.00, 1938.

Electron Emission and Adsorption Phenomenon. J. H. DeBoer.
Macmillan Co., 398 p, $5.50, 1935.

Electron Intertia Effects. F. B. Llewellyn.
Macmillan Co., 104 p, $2.00, paper, 1941.

Electronic Structure and Chemical Binding. O. K. Rice.
McGraw-Hill Book Co., 1940, 511 p, $5.00.

Elementary Wave Mechanics. W. Heitler.
Oxford University Press, 150 p, $2.25.

Emission of Electricity from Hot Bodies. O. W. Richardson.
Longmans, Green & Co., 304 p, $7.50, 1916.

Experimental Atomic Physics. G. P. Harnwell and J. L. Livingood.
McGraw-Hill Book Co., 472 p, $5.00, 1938.

Introduction to Atomic Physics. S. Tolonsky.
Longmans, Green & Co., 343 p, $4.50, 1942.

Introduction to Circuit Analysis. Abner R. Knight and Gilbert H. Fett
Harper & Brothers, 447 p, $3.50, 1943.

Introduction to Contemporary Physics. K. K. Darrow.
D. Van Nostrand Co., 648 p, $7.00, 2nd ed., 1939.

Introduction to Modern Physics, 3rd ed. F. K. Richtmyer and E. H. Kennard.
McGraw-Hill Book Co., 718 p, $5.00.

Introduction to Physics. H. Howe.
McGraw-Hill Book Co., 559 p, $3.75, 1942.

Introduction to Theoretical Physics. A. Haas.
D: Van Nostrand Co., Vol. I, 346 p, $7.50, Vol. II, 492 p, $7.50.

Introduction to Theoretical Physics. L. Page.
D. Van Nostrand Co., 661 p, $6.50, 1928.

Introduction to Theoretical Physics. J. C. Slater and N. H. Frank.
McGraw-Hill Book Co., 576 p, $5.00, 1933.

Ions, Electrons and Ionizing Radiatrons. J. A. Crowther, 7th ed.
Longmans, Green & Co., 348 p, $4.00, 1939.

Kinetic Theory of Gases. E. H. Kennard.
McGraw-Hill Book Co., 483 p, $5.00, 1938.

Kinetic Theory of Gases. L. B. Loeb.
McGraw-Hill Book Co., 687 p, $6.00, 1934

Matter, Electricity, Energy. W. Gertach.
D. Van Nostrand Co., 422 p, $6.00, 1928.

Nature of the Atom. G. K. T. Conn.
Blackie & Sons or Chemical Publishing Co., 115 p, $1.50.

Nature of Crystals. A. G. Ward.
Blackie & Sons or Chemical Publishing Co., 114 p, $1.50.

Superconductivity. D. Shoenberg.
The Macmillan Co., 112 p, $1.75, 1939.

The Particles of Modern Physics. J. D. Stranathan.
The Blackiston Co., 571 p, $4.00, 1942.

Wave Nature of the Electron. G. K. T. Conn.
Blackie & Sons or Chemical Publishing Co., $1.50.

RADAR

Principles of Radar. By Staff Members of Radar School of M.I.T.
McGraw-Hill Book Co., 887 p, $5.00, 1946.

Radar Engineering. Donald G. Fink
McGraw-Hill Book Co., 644 p, $7.00, 1947.

Radar. Orrin E. Dunlap, Jr.
Harper & Brothers, 1946, 203 p, $2.50.

Radar—What It is. John F. Rider.
John F. Rider, Publisher, 80 p, $1.00, 1946.

RADIATION

(See Waves)

RADIO

(See also Communication)

Alternating Currents in Radio Receivers.
J. F. Rider, Publisher, 96 p, $1.25.

Automatic Frequency Control Systems. J. F. Rider.
John F. Rider, Publisher, 144 p, $1.75, 1937.

Automatic Record Changers and Recorders. J. F. Rider.
John F. Rider, Publisher, 744 p, $9.00.

Automatic Volume Controls. J. F. Rider.
John F. Rider, Publisher, 96 p, $1.25.

Basic Principles of Radio. M. G. Suffern.
McGraw-Hill Book Co., $3.00.

Basic Radio, the Essentials of Electron Tubes and Their Circuits. J. B. Hoag.
Chapman & Hall, 388 p, 18s.

Basic Radio. J. B. Hoag.
D. Van Nostrand Co., 379 p, $3.25, 1942.

D-C Voltage Distribution in Radio Receivers. J. F. Rider.
John F. Rider, Publisher, 96 p, $0.90.

Electrical and Radio Notes for Wireless Operators.
Chemical Pub. Co., $2.50.

Electrical Essentials of Radio. M. Slurzberg and W. Osterheld.
McGraw-Hill Book Co., 529 p, $4.00.

Elements of Radio. C. I. Hellman.
D. Van Nostrand Co., 324 p, $2.40, 1945.

Elements of Radio. A. Marcus and W. Horton.
Prentice-Hall, 699 p, $4.00, 1943.

The Essentials of Electron Tubes and Their Circuits. J. B. Hoag.
D. Van Nostrand Co., 379 p, $3.25.

Foundations of Radio. R. L. Duncan.
John Wiley and Sons, 247 p, $2.50, 1931.

Fundamentals of Radio. W. L. Everitt, editor, and E. C. Jordan, P. H. Nelson and W. C. Osterbrock, F. H. Pumphrey, and L. C. Smeby.
Prentice-Hall, 400 p, $5.00, 1942.

Fundamentals of Radio. F. E. Terman and F. W. MacDonald.
McGraw-Hill Book Co., 458 p, $3.75.

An Hour a Day With Rider on Automatic Volume Control. J. F. Rider.
John F. Rider, Pub., 96 p, $1.25, 1936.

Introduction to Frequency Modulation. J. F. Rider.
John F. Rider, Publisher, 136 p, $2.00.

An Introduction to Practical Radio. D. J. Tucker.
The Macmillan Co., 322 p, $3.00, 1945.

Physics and Radio. M. Nelkon.
Longmans, Green & Co., 388 p, $2.50, 1944.

Practical Radio Communication. A. R. Nilson and J. L. Hornung.
McGraw-Hill Book Co., 754 p, $6.00, 1935.

Principles of Radio. K. Henney. 5th ed.
John Wiley and Sons, 533 p, $3.75, 1945.

Principles of Radio for Operators. R. Atherton.
The Macmillan Co., 344 p, $3.75, 1945.

Radio, a Study of First Principles. E. E. Burns.
D. Van Nostrand Co., 293 p, $2.00, 3rd ed.

Radio: Fundamental Principles and Practices. F. E. Almstead, K. E. Davis, and G. K. Stone.
McGraw-Hill Book Co., Inc., 219 p, $1.80.

Radiotron (Designer's Handbook) 3rd ed., edited by F. L. Smith.
Wireless Press, for Amalagamated Wireless Valve Co. RCA, Camden, N. J., 352 p, 1941.

Short Wave Radio. J. H. Reyner.
Pitman Publishing Co., 495 p, $3.25.

Short Wave Wireless Communication. A. V. Ladner and C. R. Stoner.
John Wiley and Stons, 453 p, $4.50, 4th ed., rev. 1942.

The Technique of Radio Design. E. E. Zepler.
Chapman & Hall, 324 p, 21s.

Ultra-High Frequency Radio Engineering. W. L. Emery.
Macmillan Co., 295 p, $3.25, 1944.

UHF Radio Simplified. M. S. Kiver.
D. Van Nostrand Co., 238 p, $3.25.

RADIOLOGY

(See also Physics)

Applied X-Rays. G. L. Clark.
McGraw-Hill Book Co., 674 p, $6.00, 2nd ed., 1940.

Physical Foundations of Radiology. Glasser, Quimby, Taylor, and Weatherwax.
Paul B. Hoeber(Harper & Bros.), $5.00.

Radiography in Modern Industry. Staff Members Kodak Research Laobratories.
Eastman Kodak Co., 122 p, $3.00, 1947.

Symposium on Radiography.
American Society for Testing Materials, $4.00.

The Theory and Practice of Radiology, With a Synopsis of Radiography and Radiotherapy. J. Leggett.
Chapman & Hall, Vol. I, 250 p, 21s., Vol. II, 318 p, 28s., Vol. III, 560 p, 47s.

X-Rays in Research and History. H. Hirst.
Chemical Publishing Co.

X-Ray Technology. The Production, Measurement and Application of X-Rays. H. M. Terrill and C. T. Ulrey.
Chapman & Hall, 264 p, 24s.

SERVICING

(See also Experiments and Measurements)

Abridged Manual (Trouble Shooter's Manual). J. F. Rider.
John F. Rider, Publisher, 2,000 p, $17.50.

Aligning Philco Receivers. J. F. Rider.
John F. Rider, Publisher, Vol. I, 1929 to 1936, 176 p, $2.00, Vol. II, 1937 to 1941, 200 p, $2.00.

Maintenance and Servicing of Electrical Instruments. J. Spencer.
Instruments Publishing Co., 256 p, $2.00.

Modern Radio Servicing. A. A. Ghirardi.
Radio and Technical Publishing Co., New York, 1300 p, $5.00, 1936.

Most-Often-Needed 1946 Radio Diagrams. M. N. Beitman, ed.
Supreme Publications, 1946, 192 p, $2.00.

Perpetual Trouble Shooter's Manual. J. F. Rider.
John F. Rider, Publisher, Volumes I to V, abridged, 2000 p, $17.50, Vol. VI, 1240 p, $11.00, Vol. VII, 1600 p, Vol. VIII, 1650 p, Vol. IX, 1672 p, Vol. X, 1664 p, Vol. XI, 1652 p, Vol. XII, 1648 p,Vol. XIII, 1672 p, 1933-1942, Vol. XIV, 1376 p, $15.00 per vol.

Principles and Practice of Radio Servicing. H. J. Hicks.
McGraw-Hill Book Co., 300 p, $3.00.

Radio Construction and Repairing. J. A. Moyer and J. F. Wostrel.
McGraw-Hill Book Co., 444 p, $2.50, 4th ed., 1933.

SERVICING—Continued

Radio Service Encyclopedia.
P. R. Mallory Co., 415 p, $1.50, 4th ed., 1943.

Radio Service Trade Kinks. L. S. Simon.
McGraw-Hill Book Co., 254 p, $3.00, 1939.

Radio Troubleshooter's Handbook. A. A. Ghirardi.
Radio & Technical Publishing Co., New York, 710 p, $5.00, 2nd ed., 1941.

Resonance and Alignment.
John F. Rider, Publisher, 96 p, $1.25.

Servicing by Signal Tracing. J. F. Rider.
John F. Rider, Publisher, 360 p, $2.00 (Spanish edition, $3.50), 1939.

Servicing Receivers by Means of Resistance Measurement. J. F. Rider.
John F. Rider, Publisher, 203 p, $2.00, 1932.

Servicing Superhetrodynes.
John F. Rider, Publisher, 307 p, $2.00, 1934.

Superhet Manual. Edited by F. J. Camm.
Chemical Publishing Co., $2.50.

Testing Radio Sets. J. H. Reyner.
Chapman & Hall, 228 p, about 12/6.

SOUND

(See also Acoustics)

The Amplification and Distribution of Sound. A. E. Greenless.
Chapman and Hall, 254 p, 12s.

Dynamical Theory of Sound. H. Lamb.
Longmans, Green and Co., 303 p, $6.50, 2nd ed., 1925.

Motion Picture and Sound Engineering. F. Albin, L. E. Clark, A. P, Hill, J. K. Hillard, H. Kemball, K. Lambert, and W. Miller.
D. Van Nostrand Co., 547 p, $6.50, 1938.

Motion Picture Sound Engineering. Research Council of the Academy of Motion Picture Arts & Sciences.
D. Van Nostrand Co., 550 p, $6.00.

Music and Sound Systems in Industry. B. E. Benson.
McGraw-Hill Book Co., $5.00.

Radio Sound Effects. J. Creamer and W. B. Hoffman.
Ziff-Davis Publishing Co., $1.50.

Science and Music. J. Jeans.
Macmillan Co., 258 p, $2.75, 1937.

Sound. A. T. Jones.
Chapman & Hall, 462 p, 22s.

Sound, a Textbook. A. T. Jones.
O. Van Nostrand, 450 p, $3.75, 1937.

Sound. F. R. Watson.
John Wiley and Sons, 219 p, $2.50, 1935.

Speech and Hearing. H. Fletcher.
D. Van Nostrand Co., 331 p, $5.50, 1929.

Textbook of Sound. A. B. Wood.
Macmillan Co., 519 p, $5.00, 1930.

Theory of Sound by Lord Rayleigh. Edited by R. W. Strutt.
Macmillan Co., Vol. I, 480 p, $5.00, Vol. II, 504 p, $5.00.

Theory of Sound, 2nd ed. J. W. Strutt, Baron Rayleigh.
Dover Publ., 984 p, $4.95.

Theory of Vibrating Systems and Sound. I. B. Crandall.
D. Van Nostrand Co., 282 p, $5.00, 1926.

Vibration and Sound. P. M. Morse.
McGraw-Hill Book Co., 350 p, $4.00, 1936.

TELEGRAPHY AND TELEPHONY

The Director System of Automatic Telephony. W. E. Hudson.
Pitman Pub. Co., 156 p, $1.50, 1927.

Fundamentals of Telephony. A. L. Albert.
McGraw-Hill Book Co., Inc., 374 p, $3.25.

History of Radio Telegraphy and Telephony. G. G. Blake.
Chapman and Hall, 447 p, 28s.

Introductory Study of Electrical Characteristics of Power and Telephone Transmission Lines. F. W. Norris and L. A. Mingham.
International Textbook Co., 272 p, $2.50, 1937.

Learning the Radio Telegraph Code. J. Huntoon.
American Radio Relay League, 534 p, $0.25.

Principles of Transmission in Telephony. M. P. Weinbach.
Macmillan Co., 303 p, $4.00, 1924.

Printing Telegraph Systems and Mechanisms. H. H. Harrison.
Longmans, Green & Co., $7.00, 1923.

Radio Code Manual. A. R. Nilson.
McGraw-Hill Book Co., 174 p, $2.00, 1942.

Radio Operating Questions and Answers. A. R. Nilson and J. L. Hornung.
McGraw-Hill Book Co., 415 p, $2.50, 7th ed., 1940.

Radio Telegraphy and Telephony. R. L. Duncan and C. E. Drew.
John Wiley and Sons, 1046 p, $7.50, 1931.

Submarine Telegraphy. Italo de Guilo.
Pitman Publishing Co.

Telegraphy and Telephony. C. S. Rhoads.
Simmons-Boardman, 518 p, $3.00, 1924.

Telegraph Engineering. E. Hausman.
D. Van Nostrand Co., 2nd ed., $3.00, 1922.

Telegraphy and Telephony, Including Wireless Communication. E. Mallett.
Chapman & Hall, 416 p, 21s.

Telephone Communication. Wright and Puchstein.
McGraw-Hill Book Co., 515 p, $5.00, 1925.

Telephone Communication System. R. G. Kloeffler.
Macmillan Co., 284 p, $4.00, 1925.

Telephony Including Automatic Switching. A. B. Smith.
Frederick Drake & Co., 450 p, $2.50, 1924.

Telephone Theory and Practice. K. B. Miller.
McGraw-Hill Book Co., Vol. 1, 492 p, $5.00, Theory and Elements, 1930, Vol. II, 439 p, $5.00, Manual Switching, 1933, Vol. III, 490 p, $5.00, Automatic Switching, 1943.

Transmission Circuits for Telephone Communication. K. S. Johnson.
D. Van Nostrand Co., 333 p, $5.00, 1927.

TELEVISION

American Television Directory, 1946.
American Television Society, N. Y., 144 p, $5.00.

Mechanische Eigenschaften Quasi-Elastisoher Istroper Korper. Frederick Popert.
Leemann & Co., Zurich 2, Switzerland, 105 p, Fr.8., 1946.

Practical Radio Including Television. J. A. Moyer and J. F. Wostrel.
McGraw-Hill Book Co., 410 p, $2.50, 4th ed., 1931.

Practical Television. E. T. Larner.
D. Van Nostrand Co., 223 p, $4.50, 2nd ed.

Principles of Television Engineering. D. G. Fink.
McGraw-Hill Book Co., 540 p, $5.00, 1940.

Radio Facsimile.
RCA Institutes Technical Press, 368 p, $3.00, 1938.
Servicing of Television Receivers.
Philco Corp., 140 p, $2.25, 1946.
Telecasting and Color. K. S. Taylor.
Harcourt, Brace & Co., 213 p, $2.75, 1946.
Television Broadcasting. L. R. Lohr.
McGraw-Hill Book Co., 274 p, $3.00, 1940.
Television Engineering. J. C. Wilson.
Pitman Pub. Co., 492 p, $10.00, 1937.
Television Enginering. J. C. Wilson. Isaac Pitman Sons, 1937.
Television Optics. L. M. Myers.
Pitman Pub. Co., 30[illegible] p, $12.00, 2nd ed., 1938.
Television Programming and Production. Richard Hubbell.
Murray-Hill Books, Inc., 203 p, $3.00, 1945.
Television Receiving Equipment. W. T. Cocking.
Interscience Publ., 306 p, $2.80, 1940.
Television Simplified. Milton S. Kiver.
D. Van Nostrand Co., 375 p, $4.75, 1946.
Television Standards and Practice. Edited by D. G. Fink.
McGraw-Hill Book Co., 405 p, $5.00, 1943.
Television: Theory and Practice. J. H. Reyner.
Chapman & Hall, 235 p, 14s.
Television: Today and Tomorrow. S. A. Moseley and H. J. Barton.
Pitman Publishing Co., 187 p, $3.00.
Television, the Electronics of Image Transmission. V. K. Zworykin and G. A. Morton.
John Wiley & Sons, 646 p, $6.00, 1940.
Television. Vol. III (1938-1941), Vol. IV (1942-1946). Alfred N. Goldsmith, ed.
Radio Corp. of America, Vol. III, 468 p, Vol. IV, 510 p, $1.00 paper, $2.50 cloth, 1947. (Vols. I and II out of print. Summaries of papers in these volumes are contained in Vol. III).
The First Principles of Television. A. Dinsdale.
Chapman and Hall, 260 p, 14s.
Wireless Pictures and Television. T. T. Baker.
D. Van Nostrand Co., 188 p, $2.50.

TUBES

(See Electronics)

WAVES AND NETWORKS

Electric Circuits and Wave Filters. A. T. Starr.
Pitman Publishing Co., 476 p, $8.50.
Electric Lines and Nets. A. E. Kennelly.
McGraw-Hill Book Co., 426 p, $5.00, 1928, 2nd ed.
Electric Oscillations and Waves. G. W. Pierce.
McGraw-Hill Book Co., 515 p, $5.00, 1920.
Electromagnetic Engineering. Vol. 1, Fundamentals. W. P. King.
McGraw-Hill Book Co., Ins., 580 p, $6.00.
Electromagnetic Theory. J. A. Stratton.
McGraw-Hill Book Co., 615 p, $6.00, 1941.
Electromagnetic Waves. S. A. Schelkunoff.
D. Van Nostrand Co.
Electromechanical Transducers and Wave Filters. W. P. Mason.
D. Van Nostrand Co., 333 p, $5.00, 1942.
Elements of Electro-Magnetic Theory. A. W. Duff and S. J. Plimpton.
The Blakiston Co., 173 p, $2.75, 1940.
Fields and Waves in Modern Radio. S. Ramo and J. R. Whinnery.
John Wiley and Sons, $5.00
Fundamentals of Electric Waves. H. H. Skilling.
John Wiley & Sons, 186 p, $2.75, 1942.
Heaviside's Electric Circuit Theory. H. J. Josephs.
Chemical Publishing Co., 115 p, 1946.
Microwave Transmission. J. C. Slater.
McGraw-Hill Book Co., 309 p, $3.50, 1942.
Network Analysis and Fedback Amplifier Design. H. W. Bode.
D. Van Nostrand Co., Inc., p, 551, $7.50.
On the Propagation of Radio Waves. Olof E. H. Rydbeck.
Elanders Boktryckeri Aktiebolag, Goteborg, Sweden, 169 p, 10.0 kroner, 1944.
Radio Waves and the Ionosphere. T. W. Bennington.
Iliffe & Sons, Ltd., 6s.
Theoretical Survey of the Possibilities of Determining the Distribution of the Free Electrons in the Upper Atmosphere. Olaf E. H. Rydbeck.
Elanders Boktrycker Aktiebolog, Goteborg, Sweden, 74 p, 37 illustrations, 4.50 kroner.
Transmission Lines, Antennas, and Wave Guides. R. W. P. King, H. P. Mimno, and A. H. Wing.
McGraw-Hill Book Co., 347 p, $3.50.
Transmission Networks and Wave Filters. T. E. Shea.
D. Van Nostrand Co., 470 p, $6.50, 1929, also Chapman & Hall, 476 p, 35s.
Understanding Microwaves. V. J. Young.
John F. Rider, Publisher, 400 p, $6.00, 1946.

X-RAYS

(See Radiology)

PUBLISHERS' ADDRESSES

American Institute of Electrical Engineers
29-35 West 39th St., N. Y. 18
American Radio Relay League
38 LaSalle Rd., West Hartford, Conn.
American Society for Testing Materials
260 S. Broad St., Philadelphia 2
Appleton-Century
35 West 32nd St., N. Y. 1
Blakiston Company
1012 Walnut St., Philadelphia 5
British Standards Institution
28 Victoria St., Westminster, London SW 1
Caldwell-Clements, Inc.
480 Lexington Ave., N. Y. 17, N. Y.
Chapman & Hall
37-39 Essex St., Strand, London, WC 2
Chemical Publishing Company
26 Court St., Brooklyn 2, N. Y.
Chemical Rubber Publishing Company
2310 Superior Avenue, Cleveland, Ohio
Columbia University Press
2960 Broadway, N. Y. 27
Cornell Maritime Press
241 West 23rd St., N. Y. 11
Dial Press
461 Fourth Ave., N. Y. 16
Digest Press
1901 F St., NW, Washington 6, D.C.
Dover Publications
1780 Broadway, N. Y. 19
Electronics Research Publishing Company
2 West 46th St., N. Y. 19, N. Y.
Frederick J. Drake and Company
600-610 West Van Buren St., Chicago 7

PUBLISHERS' ADDRESSES—Continued

E. P. Dutton and Company
286-302 Fourth Avenue, N. Y. 10
Harper and Brothers
28 East 33rd St., N. Y. 16
Iliffe & Sons
Dorset House, Stamford St., London SE 1
Instruments Publishing Company
1117 Wolfendale St., N.S., Pittsburgh 12, Pa.
International Text Book Company
1001 Wyoming Avenue, Scranton 9, Pa.
Interscience Publishing Company
215 Fourth Avenue, N. Y .3
John F. Rider, Publisher
404 Fourth Ave., N. Y. 16
Lippincott Company
227-231 South 6th St., Philadelphia 5
Longmans, Green and Co.
55 Fifth Avenue N. Y. 3
Macmillan Company
60 Fifth Avenue, N. Y. 11
Mallory, P. R., Company
3029 East Washington St., Indianapolis, Ind.
McGraw-Hill Book Co.
330 West 42nd St., N. Y. 18
Murray Hill Books
232 Madison Avenue, N. Y. 16
Norton, W. W., and Company
70 Fifth Avenue, N. Y. 11
Oxford University Press
114 Fifth Avenue, N. Y. 11
Philosophical Library
115 East 40th St., N. Y. 16
Pitman Publishing Company
2-6 West 45th St., N. Y. 19
Pitman, Isaac, and Sons, Now Pitman House
381-383 Church St., Toronto, Canada
Prentice-Hall Co.
70 Fifth Avenue, N. Y. 11
Radio and Technical Publishing Co.
232 Madison Avenue, N. Y. 16
Ronald Press
15 East 26th St., N. Y. 10
Reinhold Publishing Company
330 West 42nd St., N. Y. 18
Rutgers University Press
New Brunswick, N. J.
Simmons-Boardman Co.
30 Church St., N. Y. 7
Steehert, G. E., and Company
31-37 East 10th St., N. Y. 3
Thomas, Charles C.
301-327 East Lawrence Ave., Springfield, Ill.
University of California Press
California Hall, Berkeley 4, California
University of Chicago Press
5750 Ellis Avenue, Chicago 37
Van Nostrand, D., Company
250 Fourth Avenue, N. Y. 3
Wiley, John, and Sons
440 Fourth Ave., N. Y. 16
Wireless Press
326 Broadway, N. Y.
Ziff-Davis Publishing Company
185 North Wabash Ave., Chicago 1
Supreme Publications
9 S. Kedzie Ave., Chicago 12
Hulton Press, Ltd.
London, England

TRADE LITERATURE

Approximately 500 catalogs, bulletins, handbooks and other forms of manufacturers' literature are described briefly in this section. Selections have been limited to recent publications ranging over a representative group of products and services.

AIRCRAFT RADIO

Aircraft Navigational Aids. Pamphlet entitled "For Wider Horizons" describes radio equipment and navigational techniques for the personal plane. Bendix Aviation Corp., Towson, 4, Md.

Aircraft Radio Equipment. Series of bulletins giving engineering specifications, photos and dimensional drawings. Included are RA-1, RA-2D, and RA-10 series aircraft receivers; TA-2, TA-6 and RTA-1B series transmitters and transceivers and also the MN-26 series manual radio compass, the MN-31 automatic radio compass and the MS-105A Vhf broad-band antenna. Bendix Radio Corp., Baltimore, Md.

Aircraft Receivers and Transmitters. Literature available; also components catalog. Aircraft Radio Corporation, Boonton, N. J.

Aircraft Relays. 24-page booklet covers Aerotrol "400" series small size relays originally designed for military aircraft and now available to industry. Cook Electric Co., Chicago 14, Ill.

Altimeter Transfer Switch. New type (AVA-68) coaxial transfer switch can be operated from any remote position in the aircraft technical data. Radio Corp. of America, RCA Victor Div., Camden, N. J.

Components. In addition to preliminary data on microwave components equipment, bulletins are available covering fasteners, multi-contact plugs and receptacles, switches, d-c relays, sealed capacitors, chokes and transformers and variable air capacitors suitable for transmitting or receiving equipment. Aircraft Radio Corporation, Boonton, N. J.

Direction Finders. Publication 15-43 describes an aircraft radio direction finder, listing specifications and tests taken by CAA approved methods. Sperry Gyroscope Co., Inc., Great Neck, N. Y.

50-Watt Ground Station. 4-page, illustrated brochure giving special features and electrical and mechanical specifications of station for small airports. Aireon Mfg. Corp., Kansas City, Kansas.

New basic designs of Ledex rotary solenoids for aircraft and industrial applications are described in 34-page Engineering Letter. George H. Leland, Inc., 133 Webster St., Dayton 2, Ohio.

Personal Plane Radio. Publication EBA-2 describes the AS-1B airborne transmitter and receiver in detail. General Electric Co., Syracuse, N. Y.

ANTENNAS

Antenna Arrays; f-m, television, and a-m arrays described in catalog 27A. Technical Appliance Corp., 41-06 De Long St., Flushing, N. Y.

Antennas. Antenna catalog including information on f-m and television, auto-radio antennas and a complete line of parts. Insuline Corp. of America, 36-02 35th Ave., Long Island City, N. Y.

FM and TV Antennas. Antenna and mounting catalog. Also Premax Antenna Manual. Premax Products, 4713 Highland Ave., Niagara Falls, N. Y.

High-gain Radiator. Enginering details of square-loop f-m broadcast antenna are published in a booklet containing illustrations and graphs of characteristics and performance. Federal Telephone and Radio Corp., Newark 1, N. J.

Low-loss Leadin. A single-sheet catalog bulletin on the characteristics of two type of 300-ohm parallel twin-conductor cable for television and f-m and the somewhat similar 100-ohm r-f cable. General Electric Co., Syracuse, N. Y.

Mobile Antennas. Bulletin on tubular verticals, police mobiles and elements. Premax Products, 4712 Highland Ave., Hyland Falls, N. Y.

Square Loop Antenna. 8-bay square-loop antenna providing a power gain of 9 is described in a 16 pg. booklet. The advantages of the antenna are explained and transmission feed line arrangements and constructional details are discussed in detail. Included are charts of power gain vs. loop separation, radiation pattern diagrams and a table listing electrical and mechanical specifications for 1 to 8-bay antennas. Federal Telephone and Radio Corp., Newark 1, N. J.

Stand-by Antenna; type 1200 folded quadrupole, approved by FCC, available for f-m transmitters. Bulletin 46. Andrew Co., 363 E. 75th St., Chicago 19, Ill.

Television Antenna. 2-page technical data sheet, complete with graphs, describes the Di-Fan television and f-m broad band antenna. Andrew Co., 363 East 75th St., Chicago 19, Ill.

Vhf Antenna. The type CA-1a (non-directional) and type CA-2a directional antennas are described in a 2-page leaflet issued by the company. The antenna, which is of the ground-plane type, can be used in the frequency range 30 to 170 mc. Radio Corporation of America, Camden, N. J.

ATTENUATORS

Ladder-Type. Catalog on "Variaten" attenuators. Cinema Engineering Co., Burbank, Calif.

Midget and Standard Type Attenuators. Bulletin 431. Tech Laboratories, 337 Central Ave., Jersey City 7, N. J.

BATTERIES

Carbon Products. Catalog 25 is devoted primarily to brush grades, but dry-cell battery electrodes and filler, rheostat discs, and graphite power tube anodes are also covered in 40 pages. Speer Carbon Co., St. Mary's, Pa.

BATTERIES—Continued.

Battery Plugs. 4-page circular giving up-to-date listings of all types of plugs to fit batteries used in portable radios, testing equipment and electronic devices. Sketches and descriptions of each type and reference layout sheets are included. J. F. D. Mfg. Co., 4109-4123 Ftl Hamilton Parkway, Brooklyn 19, N. Y.

Batteries. Battery Engineering Bulletin which shows batteries according to usage and suggested current range. With this information a table will show a choice of several suitable to the purpose. Weight, size and operating cost will then determine the final choice. Sketches of size and location of terminals are given. National Carbon Co., Inc., 30 East 42nd St., New York 17, N. Y.

CABLES AND TRANSMISSION LINES

Cable Bulletin. Flamenol is the title of a 16-page, four-color bulletin (GEA-4352) that tells the story of manufacture and use of this particular type of conductor. Flamenol Mine-Telephone Cable is described in a companion two-page bulletin, GEA-3612B. General Electric Co., Schenectady 5, N. Y.

Coaxial Cables and Cable Accessories. Described and illustrated in bulletin giving detailed data on electrical and mechanical properties. Andrew Co., 363 E. 75th St., Chicago 19, Ill.

FM Transmission Lines. Bulletin 42, technical information on FM transmission lines and new 51:5 ohm coaxial lines for FM and TV; also descriptions of dry air equipment and automatic dehydrators for use on coaxial lines. 16 pages. Andrew Co., 363 E. 75th St., Chicago 19, Ill.

F-m Transmission Lines. Bulletin 42 contains technical information on transmission lines developed particularly for f-m and television installations. Andrew Co., 363 East 75th St., Chicago 19, Ill.

High-Frequency Cables. Four-page leaflet summarizes Army-Navy RG types of r-f cables, giving wire sizes, dielectric uses, voltage capacity, etc. Data sheet 113. Simplex Wire and Cable Co., 79 Sidney St., Cambridge 39, Mass.

Seamless Tubing. 8-page catalog describing seamless metal tubing with particular emphasis laid on new methods of forming coaxial cables. Small capacitors and unity-coupled coils can be furnished by this method of construction. Precision Tube Co., 3824 Terrace St., Philadelphia 28, Pa.

Transmission Lines. For a-m, f-m and television. New catalog, including pamphlet No. 100, is a presentation of Seal-O-Flange and Aircore lines. The complete line of goods includes air fittings and dryers. Communication Products Co., Inc., Keyport, N. J.

Transmission Line Components. Catalog. De Mornay-Budd, Inc., 475 Grand Concourse, New York, N. Y.

CAPACITORS

Capacitor Analyzer. Direct reading between 10 mmfd and 800 mfd. Instrument may also be used as a line frequency resistance bridge covering range from 50 ohms to 2 megohms. Catalog IN-2. Solar Manufacturing Corp., 285 Madison Ave., N. Y. 17, N. Y.

Capacitor Catalog. The new 1946 Aerovox General Catalog in a loose-leaf binder is an exhaustive and complete compendium of information on the line of capacitors manufactured by the company. Aerovox Corp., New Bedford, Mass.

Capacitor Production. Illustrated booklet showing process of manufacture. Aerovox Corporation, New Bedford, Mass.

Capacitors. Illustrated bulletin covering silver-electrode, ceramic capacitors with complete specifications and JAN type designations. Electrical Reactance Corp., Franklinville, N. Y.

Capacitors. Catalog A546 describes the company's complete line of dry electrolytic and paper dielectric capacitors. American Condenser Corp., 4410 No. Ravenswood Ave., Chicago, Ill.

Capacitors. Catalog 46-E covers extensive line of molded oil-paper, metal-cased, a-c types and high-voltage capacitors. Tobe-Deutschmann Corp., Canton, Mass.

Capacitors and Filters. 24-page catalog describing C-D eelctrolytic, paper, and mica capacitors, capacitor test instruments, and interference filters. Cornell-Dubilier Electric Corp., South Plainfield, N. J.

Ceramic Capacitors. Construction and specification charts for Hi-Q silver electrode ceramic capacitors of the CN and CI type are shown in two folders. The capacitors, which are a compound of titanium dioxide with ceramic material are custom made and applied to specification. Electrical Reactance Corp., Franklinville, N. Y.

Micro-Miker. Measures capacities from 1 to 230 mmfd by direct substitution. Described in Bulletin 4-D. Kalbfell Laboratories, 941 Rosecrans St., San Diago 6, Calif.

Midget Capacitors. Literature available on complete line of flat type. Cornell-Dubilier Electric Corporation, S. Plainfield, N. J.

Oil Capacitors. Type EC, CC, and BC oil-filled capacitors are high-voltage, high-capacitance units for power supply filtering and similar use. They are described in Bulletins 104 and 105. The Capacitron Co., 849 North Kedzie Ave., Chicago 51, Ill.

Paper Capacitors. Small, self-healing, metalized paper capacitors are described in detail in a 4-pg. bulltin. Electrical ratings, available designs and engineering applications are given, as well as a table of available SL tubular capacitors. Solar Mfg. Corp., 285 Madison Ave., New York 17, N. Y.

Vacuum Capacitors. Bulletin available on a variety of types. Jennings Radio Manufacturing Company, 1098 East William St., San Jose 12, Calif.

Vacuum Capacitors. 16-page bulletin ETX-3 listing various types of vacuum capacitors and their use. General Electric Co., Syracuse, N. Y.

VHF-UHF Variable Capacitors. New "VU" type capacitors can be used in conventional tuned circuits at frequencies as high as 500 mc. Folder with full technical data. Hammarlund Mfg. Co., Inc., 460 West 34th St., New York 1, N. Y.

See also
Components

COILS AND CORE MATERIALS

I-F Slug-Tuned Inductors. Catalog No. 100 describes standard LS-3 coils possessing frequency span from ½ mc. to 150 mc. Cambridge Thermionic Corporation, 456 Concord Ave., Cambridge 38, Mass.

Iron Powders. 31-page booklet describes the characteristics of carbonyl iron powders, gives formulas, a bibliography of papers and a glossary. General Aniline and Film Corp., Special Products Div., 270 Park Ave., New York 17, N. Y.

Magnetic Iron Powders. Data on grades of powders, including photomicrographs, electrical and mechanical properties, graphs of "Q" vs. frequency, etc., are subject of 28-page data book. George S. Mepham Corp., 2001 Lynch Ave., East St. Louis 3, Ill.

Powdered Iron Cores. Descriptive booklet on powdered iron cores and their uses. In addition to a technical explanatory section, a large number of charts are included showing effective permeability-frequency relations for the various powder and binder combinations maintained as standard. Sections are devoted to effect of addition of adjusting screws, uses of copper cores and to a new low cost core called "croloy." Detailed outline drawings of a large number of stock sizes of cores are included. Henry L. Crowley & Co., Inc., West Orange, N. J.

COMMUNICATION SYSTEMS & EQUIP.

AM and FM Communication Equipment. Catalogs and bulletins. Collins Radio Company, Cedar Rapids, Iowa.

Automatic Engine Control. F-m stations in remote locations often rely upon an auxiliary power plant for power and tower lights in the event of failure of exposed power lines. The almost human action of the apparatus described in a bulletin can be applied to any auxiliary power or pumping installation. Synchro-Start Products, Inc., 1046 West Fullerton Ave., Chicago 14, Ill.

Broadcast Speech Equipment. 40-page catalog on speech equipment and accessories. Collins Radio Co., Cedar Rapids, Iowa.

Communication Equipment. Small transmitters, audio and remote amplifiers, and transcription equipment are pictured in a 22-page booklet which also gives some details of the modulation system employed in the transmitting equipment. Taylor-Western Transmitters, 6127 So. Western Ave., Los Angeles 44, Calif.

Commercial Equipment. An illustrated file folder containing a leaflet on mobile f-m communications equipment, main stations, antennas, and other necessary paraphernalia manufactured by this company. Fred M. Link, 125 West 17th St., New York 11, N. Y.

Deflection Yokes. Magnetic deflection yokes and blocking oscillator transformers are described on a single-sheet bulletin. These television components can be used for replacement service of new equipment, owing to their standard method of construction. The Telectron Co., 1988 East 59th St., Cleveland 3, Ohio.

Emergency Communication System. 41-page brochure describing system for police and other mobile operation. Federal Telephone & Radio Corp., Newark 1, N. J.

Facsimile Communication. 4-page folder describes duplex equipment designed to take place of the telegraph printer. Instrument is available for speeds from 15 sq. in. to 48 sq. in. per minute. Finch Telecommunications, Inc., 10 E. 40th St., New York 17, N. Y.

Facsimile Equipment. Various literature available. Finch Telecommunications, Inc., 10 East 40th Street, New York 16, N. Y.

Flexible Shaft Handbook. Contains information and technical data on line of flexible shafts for remote control of communication equipment. S. S. White Industrial Division, 10 East 40th St., New York 16, N. Y.

Flexible Shafting. Flexible shafting design and engineering data are given in a new 20-page bulletin just released. Covering applications in radio, instruments, and the field of industrial machinery, the new bulletin includes engineering formulas and tables to aid in selection of proper shafting for the job. Walker-Turner Co., Inc., Plainfield, N. J.

Flexible Tubing. Various types of flexible wave guides are described in "Electronics Data Book." American Metal Hose Divn., American Brass Company, Waterbury 88, Conn.

F-M Broadcasters. Complete with circuit diagrams, specifications, and illustrations, Federal's latest publication on its 1 and 3 kilowatt f-m broadcast transmitters for the 88 to 108 megacycle band. Federal Telephone and Radio Corp., Newark 1, N. J.

FM Broadcast Equipment. Twenty operating FM stations described in 16-page booklet, also giving prices and delivery schedules on transmitters and accessories. Radio Engineering Laboratories, 35-34 36th St., Long Island City, N. Y.

Mobile Radiophone Service. Two booklets describing a proposed mobile service and one type of mobile equipment. American Telephone and Telegraph Co., 195 Broadway, New York 7, N. Y.

Nomographs. Folder containing technical data in the form of single sheets will be found useful to engineers interested in determining such information as the attenuation in square wave guides, power dissipated in water-cooled devices, and paint requirements for various shaped pieces. Federal Telephone and Radio Corp., Newark 1, N. J.

Power Generators. Entitled "Generating AC Electric Power," ten-page booklet describes generating plants, independent generators, rotary converters, high-frequency converters and d-c battery chargers. Kato Engineering Co., Mankato, Minn.

Radio Service Encyclopedia. Fifth edition lists recommended component replacements for all prewar receivers, besides giving the complete tube lineup and i-f value. Price $1.25. P. R. Mallory and Co., Inc., Indianapolis 6, Ind.

Radio Teletype. A non-technical booklet is available describing applications and operation of the Radiotype system. Globe Wireless, Ltd., Chrysler Bldg., New York 17, N. Y.

COMMUNICATION SYSTEMS & EQUIP.—Cont'd.

Service Manual. This firm now issues a service manual in loose-leaf form on all its products. Leaflet supplements keep the niformation up to date. Topically arranged, wtih schematic diagrams and line drawings, and including descriptions, specifications, tube complement, normal operating voltage, normal operating currents, alignment procedure and other pertinent data. Hoffman Radio Corp., Los Angeles, Calif.

Telecommunication Systems. Booklet describing in detail Press Wireless and its services. Press Wireless Manufacturing Corp., 1475 Broadway, New York 18, N. Y.

Television Synchronizing Generator and Monitor. Descriptive literature available. Telequip Radio Company, 1901-07 S. Washtenaw Ave., Chicago 8, Ill.

Vibration Control. Engineering booklet explaining vibration problems and their solution by means of special mounts. Applications of "Isomode" mounts for various conditions are shown and a selector chart facilitates the choice of units for each application. The last part of the catalog describes a variety of products such as vibration exciters, vibration pickups and meters, switching units, preamplifiers and a vibration test machine. The Vibration Div., MF Mfg. Co., New Haven 11, Conn.

See also

Aircraft Radio
Marine Equipment
Receivers
Transmitters

COMPONENTS, Misc.

Antennas and Parts. Two catalogs on ICA line. Insuline Corporation of America, Long Island City, N. Y.

Chemicals and Hardware. Catalog No. 46, a 16-page catalog contains a complete line of electronic hardware items and radio chemicals. Walter L. Schott Co., Beverly Hills, Calif.

Components Catalog. Knobs, dial plates, tuning units, drives, and accessory items are among the products listed in Bulletin No. **244, issue 2.** Croname, Inc., 3701 Ravenswood Ave., Chicago 13, Ill.

Components Catalog. Catalog No. 467 lists capacitors, controls, switches, resistors, power supplies, and other components together with their prices. P. R. Mallory and Co., Inc., Indianapolis 6, Ind.

Components Catalog. 20-page tabbed-section catalog with specification sheets giving data on all firm's products except crystals. Cambridge Thermionic Corp., 445 Concord Ave., Cambridge 38, Mass.

Electronic Components. Intended for manufacturer, distributor, and exporter, catalog M, contains diverse electronic components and equipment of standard manufacture. In 28 pages listings are given of a variety of transformers, capacitors, rf chokes, reactors, coils, switches, insulators, tubes, knobs, meters, relays, resistors, headsets and mikes, terminal strips and miscellaneous parts. A section on microwave equipment includes synchroscopes, frequency meters, signal generators, magnetrons, uhf crystals, tubes, antennas, coaxial cables and fittings. Eldico of New York, Inc., 44-31 Douglaston Pkwy., Douglaston, N. Y.

Electronic Data Sheets. A number of new data sheets issued by General Electric Co., Schenectady, N. Y., bring the Special Products Handbook up to date with the latest developments. Affected by revisions and new data are the sections on permanent magnets, apparatus to measure strain, force and tension, color and optical equipment, testing equipment for wire, coils, insulations, gas, and materials, and equipment for chemical analysis. Of special interest are the dew point recorders, the magnetic comparator, insulation resistance meter, and colorscope.

Lock Washers. A brochure picture many applications of lock washers and parts engineered to gain their advantage without increasing assembly costs. Shakeproof, Inc., 2501 North Keeler Ave., Chicago 39, Ill.

New Parts Catalog. Catalog 700 lists the line of parts, oscilloscopes and receivers available. National Co., Inc., Malden, Mass.

Parts and Equipment. General catalog. Concord Radio Corporation, 901 W. Jackson Blvd., Chicago 7, Illinois; 205 Peachtree Street, Atlanta 3, Georgia.

Parts and Equipment. 100-page catalog. Walker-Jimieson, Inc., 311 South Western Ave., Chicago 12, Ill.

Parts and Equipment. General catalog. Allied Radio Corp., 833 W. Jackson Blvd., Chicago, Ill.

Parts and Equipment. Three new catalogs are now available from the company describing component parts and complete assemblies of laboratory equipment. A condensed general catalog of transmitting and receiving equipment. James Millen Mfg. Co., Inc., 150 Exchange St., Malden, Mass.

Radio Components. Three new catalogs describe a long line of "designed for application" components and finished products such as frequency standards, UHF calibrators, synchroscopes, regulated power supplies and pulse formation equipment. A condensed general catalog covers practically the complete line, with prices. The third catalog is devoted to component parts, variable condensers, insulators, special sockets, chokes, coils, etc., and the line of midget absorption frequency meters. James Millen Mfg. Co., Malden, Mass.

Sheet Metal Cabinets. Instrument panels, chassis units, and waterproof cabinets, including Navy-specification parts boxes, are available or can be fabricated on order. The service is described in a 4-page brochure. S. Walter Co., 144-146 Centre St., Brooklyn 31, N. Y.

CONNECTORS AND TERMINALS

AP Connectors. Exploded views, dimensions, and general information on AP type plugs and jacks are given in a 12-page booklet. Cannon Electric Development Co., 3209 Humboldt St., Los Angeles 31, Calif.

Cables and Connectors. 12-page bulletin describes various sorts of transmission line and cable as well as cable fittings and connectors particularly useful at high radio frequencies. American Phenolic Corp., Chicago 50, Ill.

Connectors. 64-page illustrated catalog is offered to those interested in electrical connectors for conductor sizes from No. 22 to 2,000 Mcm. Special tools for use with particular types of connectors are also described. Burndy Engineering Co., Inc., 107 Bruckner Blvd., New York 54, N. Y.

Connectors. A 78-page loose-leaf book giving manufacturer's line of plugs. Cannon Electric Development Co., 3209 Humboldt St., Los Angeles 21, Calif.

Eyelets, Ferrules and Terminals. Comprehensive catalog, Waterbury Companies, Inc., Waterbury, Conn.

Hermetic Terminals. 20-page catalog giving complete engineering data about Fusite terminals and HermetiCans also contains information on the company's automatic sealer. Cincinnati Electric Products Co., Carthage at Hannaford, Cincinnati, Ohio.

"Mechanical Principles of Gorilla Grip Electrical Connectors." 12-page booklet presenting a factual analysis of design and function. National Electric Products Corp., Pittsburgh, Pa.

Multiple Connectors. 64-page booklet on plugs, receptacles, junction shells, etc. Cannon Electric Development Co., 3209 Humboldt St., Los Angeles, Calif.

Solderless Wire Terminals. One operation of hand tool or press die makes the complete installation of terminal on wire. Aircraft-Marine Products, Inc. 1521-73 North Fourth St., Harrisburg, Pa.

Terminals and Banding Clips. 40-page bulletin of detailed data and engineering specifications on terminals for electric wires and banding clips have been compiled. Actual size cuts and drawings are included of over 400 terminals, which can be supplied with plain finish, electro tinned, hot tin dipped, cadmium plated or nickle plated finishes. With various size holes, these terminals make over 1,000 combinations. Condensed, tabulated information for quick reference is contained in the first eight pages, while the latter section has complete engineering data. Patton-MacGuyer Co., Providence, R. I.

Test Clips. 48-page comprehensive catalog, No. 4C, on heavy-duty connectors, with one page describing an excellent line of small tests clips extensively used in radio and telephone service. Frankel Connector Co., Inc. 177 Hudson St., New York, N. Y.

Waterproof Connectors. The new series of waterproof connectors designed for underwater use and presently employing An-type inserts is pictured in Bulletin No. W-146. Cannon Electric Development Co., 3209 Humboldt St., Los Angeles 31, Calif.

CONTROL SYSTEMS, ELECTRONIC

Automatic Controls. Complete line of controls for heating, air conditioning, refrigeration, etc. described in catalog 600A. Mercoid Corp., 4201 Belmont Ave., Chicago 41, Ill.

Bulletin on low-inertia servo motors. Transcoil Corporation, 114 Worth Street, New York 13, N. Y.

Control Devices. Bulletin just issued is available without charge. It describes all manner of electric control devices such as midget relays, rheostats, time delays, and starters. Ward Leonard Electric Co., Mount Vernon, N. Y.

Electronic Temperature Control. Diagrams, analyses and tables of design information for guidance in planning specific control systems; a 20-page review, Bulletin No. 5. Wheelco Instruments Co., 847 West Harrison St., Chicago 7, Ill.

Industrial Frequency Chart. A convenient chart is available which indicates the industrial frequency spectrum from 60 cycles through X-ray frequencies. Various frequencies are identified with equipment used therein such as motor generators, spark-gap generators, and electronic high frequency generators. Formulas relating frequency to wavelength in meters as well as Angstrom units are given. The chart is black on white, smooth-coated blotter stock, size 4 x 7 inches. Sherman Industrial Electronics Company, 503 Washington Avenue, Belleville 9, N. J.

Industrial Instruments. Industrial process indicators, recorders and controllers are described in Catalog 370. Instruments and accessories for the measurement and control of pressure, temperature, moisture, liquid level, specific gravity, flow, pH, speed, thickness, weight, time sequence and many other properties are illustrated, with brief specifications of each. Foxboro Co. of Foxboro, Mass.

Interval Timer. A 1-page data sheet is available describing an electronic interval timer. Electronic Controls, Inc., 44 Summer Ave., Newark 4, N. J.

Lighting Controls. Electronic control of theatre lighting systems is described in Bulletin 74. Included are various types of control consoles and panels for use with the Ward Leonard Hysterset system of reactance dimmer switchboards for smooth, pre-set programming of lighting effects. Ward Leonard Electric Co., Mount Vernon, N. Y.

Photoelectric Devices. 4-page leaflet listing available apparatus for electronic determination of smoke density, specular gloss of surfaces, and color of liquids, each of which is described in greater detail in a separate bulletin. Photovolt Corp., 95 Madison Ave., New York 16, N. Y.

Phototube. High-vacuum, blue-sensitive phototube, type 1P42, is completely analyzed in leaflet. Tube designed particularly for control purposes in applications where space limitation is main consideration, maximum diameter of the tube being ¼ inch. Radio Corp. of America, Harrison, N. J.

Phototubes. Catalog on various applications of the "Visitron." Rauland Corporation, Chicago 41, Ill.

Powder-Metallurgy. In 4-page booklet entitled "Geiger Counter Used in Powder Metallurgy," data is presented to illustrate how analysis time has been reduced in some cases from two days to 35 minutes. Booklet R1022. North American Philips Co., Inc., 100 East 42nd St., New York 17, N. Y.

Process Controllers. Process controllers, measuring and telemetering components, and gas analyzers are described in an 9-page bulletin

CONTROL SYSTEMS, ELECTRONIC—Continued

No. 17. Bailey Meter Com, 1050 Ivanhoe Road, Cleveland 10, Ohio.

Pulsing Drive. A brochure describes the new pulsing drive that, by the turn of a knob, applies pulses of voltage to the motor under control. As the knob is turned farther in the desired direction the pulses become longer, effectively increasing the speed. Yardeny Laboratories, Inc., 105-107 Chambers St., New York 7, N. Y.

Radioactive Counters. Data sheet No. 3 is a 6-page folder describing a line of Geiger, mica-window, beta and gamma counters. A glossary of terminology is included. Radiation Counter Labs., 1451 East 57th St., Chicago 37, Ill.

Remote Indication and Control. Direct current remote indicating and control systems are explained concisely in a 12-pg. engineering bulletin. Construction of transmitters, receivers and and indicators of electric follow-up systems, their operation, their advantages and specifications are graphically presented with photos, diagrams, and charts. DC remote systems have been used in the oil, metal, power, marine, and other industries in applications using valves, rehostats and potentiometers. Allis-Chalmers Mfg. Co., Milwaukee 1, Wis.

Servomechanisms. A memorandum describing the uses of servomechanisms for control, indication, and computation; also basic information and a brief history of wartime use of the servo. G. C. Wilson & Company, Box 389, Chatham, N. J.

Servo Unit. Illustrated sheet on Motron servo unit 61A, a packaged continuous balance control system that can be applied to automatic control or regulation of equipment. W. C. Robinette Co., 802 Fair Oaks Ave., South Pasadena, Calif.

Small Motors. Several separate sheets have recently been printed, each describing small motors useful as adjuncts to electronic equipment. Some are suitable for blowers, others for driving record changers. One reversible motor with gear train has been designed for radio tuning. The Alliance Manufacturing Co., Alliance, Ohio.

Stage Switchboard. 12-page Bulletin 74, describing a new line of electronic reactance dimmers for control of modern stage lighting. Includes simple equipment suitable for a school auditorium and more complicated desk type switchboards for large theatres. Ward Leonard Electric Co., 31 South Street, Mount Vernon, N. Y.

Temperature Control. Catalog No. 14 contains 16 pages of illustrations and details of temperature control for ovens, heating baths and refrigerants. H-B Instrument Co., 2519 N. Broad St., Philadelphia 32, Pa.

Temperature Cabinets. 48 illustrated pages, covering an extensive variety of standard and special models. Included are electrically heated ovens for drying, preheating, conditioning, rubber aging; sterilizers, incubators, paraffin embedding ovens, low temperature cabinets, humidity control cabinets; steam-heated explosion-proof cabinets carrying underwriter's approval; vacuum ovens and combustion-tube furnaces for laboratory use. Precision Scientific Co., 1750 No. Springfield Ave., Chicago 47, Ill.

CRYSTALS

Crystals. Various crystal units are pictured in a 4-page leaflet. Among the more unusual items are a postage-stamp unit less than an inch square and 3/16 inch thick, and a low-cost crystal designed for use in home broadcast receivers to insure foolproof pushbutton tuning. Reeves-Hoffman Corp., 215 East 91st St., New York 28, N. Y.

Crystals. All types of mounted and unmounted crystals, with a description of a compact transmitter unit which may be soldered into the circuit. Catalog. Aireon Mfg. Corp., Kansas City, Kansas.

Germanium and Silicon Crystals. Described in bulletins EB-6 and EC-22B. Sylvania Electric Products, Inc., 500 Fifth Ave., New York 18, N. Y.

Mounted Crystals. 8-page folder on a complete line, including special and standard types. Crystal Research Laboratories, Hartford 3, Conn.

Quartz Crystals. "The Story of Monitor Crystals" is non-technical and well illustrated. The history and uses of quartz are described in 28 pages. Monitor Products Co., 815 Fremont Ave., South Pasadena, Calif.

Quartz Crystals and Frequenty Control Equipment. 16-page illustrated catalog describing its product. Standard units are available and a new midget series operating in the frequency range 900 to 20,000 kc and measuring ⅞ inch in diameter, 7/32 inch thick and weighing ½ ounce is featured. Standard Piezo Co., Carlisle, Pa.

ENGINEERING SERVICES

Engineering Service. Brochure describing complete engineering service from FCC construction permit application to finished studio and station. Conlan Design & Engineering Division, 1042 Atlantic Ave., Brooklyn 16, N. Y.

Research Organization. Brochure describing the services available to industry in the field of applied physics. Polytechnic Research & Development Co., Inc., 66 Court St., Brooklyn 2, N. Y.

Research Report. The 9th annual report of this Foundation occupies 20 pages and touches upon many electronic developments such as the magnetic wire sound recorder, cathode-ray tube screen, voltage regulator, radio and radar components and the a-c network calculator. In this publication are described other bulletins issued by the Foundation of interest to industry. Armour Research Foundation of Illinois Institute of Technology, Chicago, Ill.

FILTERS

Capacitors and Filters. 40-page catalog has been formulated as an aid to engineers in the design of equipment using capacitors and noise-eliminating filters, listing the complete line of these items manufactured by the company. Tobe Deutschmann Corp., Canton, Mass.

Filterettes. Literature available on these noise suppressors. Tobe-Deutschmann Corp., Canton, Mass.

Replacement Filters and Capacitors. Suitable for all general replacement and industrial applications a wide variety of P-B paper and electrolytic capacitors are described in a 4-page bulletin. Paper capacitors range in value from .005 to .25 mid to 600 volts working voltage. Single and dual-section tubular electrolytics are available for all standard capacities. Also described are radio noise filters and fluorescent filters. Atlas Condenser Products Co., 548 Westchester Ave., New York 25, N. Y.

HEARING AIDS

Hearing Aid. A hearing aid featuring a replaceable chassis to avoid repair delays is pictured in an 8-page brochure. Paraphone Hearing Aind, Inc., 2056 East Fourth St., Cleveland 15, Ohio.

Subminiature Tubes. Tentative data on the CK515BX hearing aid triode as well as other subminiature tubes are available from the manufacturer. Raytheon Manufacturing Co., 60 East 42nd St., New York 17, N. Y.

HIGH-FREQUENCY HEATING

High-Frequency Melting. Methods and equipment for induction heating and melting. The data is presented as to facilitate proper selection of equipment. Bulletin 27. Ajax Electrothermic Corp., Ajax Park, Trenton 5, N. J.

Induction Heating. 31-page booklet illustrates the manifold uses of induction heating in the industrial field. Soldering, brazing and gear hardening are all possible on the same equipment with a proper choice of work coil for the individual job. Lepel High Frequenty Laboratories, Inc., 39 W. 60th St., New York 32, N. Y.

Induction Heating Handbook. 59-page comprehensive handbook, presents the general history, principles and applications of induction heating as well as dealing specifically with many important technical considerations and problems. Among the subjects covered are power generators, equipment and controls, control factors for surface hardening, dielectric heating, heating of internal surfaces, melting, heat treating, annealing, etc. Ohio Crankshaft Co., 3800 Harvard Ave., Cleveland 1, Ohio.

Induction Heaters. Thermionic generators used in industrial heating applications are pictured in a recent 6-page booklet. Work tables designed for particular assembly problems are included in the list of products. Induction Heating Corp., 389 Lafayette St., New York 3, N. Y.

R-F Heating. Mechanical and electrical specifications, illustrations, suggestions for use of Model 2-B and Type 15-B power generators for high-frequency heating. Radio Corporation of America, Camden, N. J.

INSULATION

Ceramics. 48-page catalog has just been issued that includes data on bushings, coil forms as well as design criteria for other classes of ceramic insulators. General Ceramics and Steatite Corp., Keasbey, N. J.

Ceramics in Radio. Booklet describing Lavite, Steatite and technical ceramics that traces the electrical use of these products from 1880 down to the highly specialized components of today. D. M. Steward Mfg. Co., Chattanooga, Tenn.

Ceramics Wall Chart; two-color wall chart gives complete information on more widely used AlSiMag compositions. American Lava Corp., Chattanooga 5, Tenn.

Collodial Graphite. Technical bulletin presents uses and characteristics of "dag" solutions. Acheson Colloids Corp., Port Huron, Mich.

Diffusion Pump Fields. Pamphlet describes method of obtaining high vacuums up to $5x10^{-8}$ by use of silicone fluids DC702 and DC703. Dow Corning Corp., Midland, Mich.

Electrical Insulation; technical publication 21T4 summarizes composite nature of electrical insulation and the wide variations in insulation resistance owing to temperature changes; simplified curves of temperature correction factors are presented. James G. Biddle Co., 1211 Arch St., Philadelphia 4, Pa.

Electrical Porcelain. New booklet published by 13 cooperating manufacturers of electrical porcelain products describes the physical properties, uses, mechanical properties, and other pertinent data on the material. Electrical Manufacturers Public Information Center, 155 East 44th St., New York 17, N. Y.

Electrical Porcelain. 20-page booklet lists applications and the average properties of three types of electrical porcelain. National Electrical Manufacturers Assn., 155 E. 46th St., New York 17, N. Y.

Fiber Insulation. Several types of insulating materials, their electrical and mechanical properties and possible uses described in Bulletin GF16. Continental-Diamond Fibre Co., Newark, Delaware.

Fiberglas Insulation. Electrical insulation materials made of Fiberglas are described in booklet. Properties of this material as well as test data and comparisons woth other commercial materials are given and illustrated by graphs. Owens-Corning Fiberglas Corp., Toledo 1, Ohio.

Insulating Materials. The electrical insulating material guide book recently issued includes everything from sleevings to fish paper as well as the latest price list. Mitchell-Rand Insulation Co., 51 Murray St., New York 7, N. Y.

Insulating Varnishes. 40-page reference booklet containing complete technical and application data on GE insulating varnishes. Chemical Dept., General Electric Co., Pittsfield, Mass.

Insulation. Theory and Behavior of Dielectrics, Mica and Mica Plate, Natural Oils as Dielectrics, Varnishes for Electrical Insulation, Inorganic Insulations, Table of Mechanical and Electrical Properties of Plastic Materials are some of the headings given in this 32-page bulletin. William Brand & Co., 276 4th Ave., New York 10, N. Y.

Insulation Saturants. 15-page booklet filled with useful information about Zyrox used in treating fibrous materials for insulating electrical wire and cable. The desirable properties are listed. Bakelite Corp., 300 Madison Ave., New York 17, N. Y.

INSULATION—Continued

Insulation Tester. New bulletin on midget "Megger" insulation testers. An illustrated description of the method of use and of the operating principles as well as complete specifications are included. Three models are listed giving readingto 10, 20 and 50 megohms respectively. James G. Biddle Co., 1211 Arch St., Philadelphia 7, Pa.

Insulators. 28-page catalog gives information on standards, design criteria, body characteristics and common shapes of various ceramic insulators. Included is data on metallized ceramics and printed circuits. Centralab, 900 E. Keepe Ave., Milwaukee, Wis.

Mica Ceramic Insulation. Bulletin No. 104 gives suggestions for use of Mykroy insulating material in the fabrication of sockets and terminal supports. Electrnic Mechanics, Inc., 70 Clifton Boulevard, Clifton, N. J.

Mycalex Booklet. 24-page booklet describes the properties, available types, fabricated parts and machining factors for six grades of Mycalex, the stone-like mica and glass insulator. General Electric Co., Pittsfield, Mass.

Mycalex Catalog. Catalog describing typical applications, types of molding and fabricating, and salient characterisitcs of glass-bonded mica insulating material no wavailable. Mycalex Corp. of America, 60 Clifton Blvd., Clifton, N. J.

Reference Manual. Theory and behavior of dielectrics discussed in first 20 pages; catalog in back of loose-leaf binder contains information on flexible tubing, sleeving, fibre glass and extended plastic tubing, etc. William Brand & Co., 276 Fourth Ave., New York 10, N. Y.

Schering Bridge. Comprehensive discussion with photographs, photo-diagrams, and explanatory text pointing up advantages of this direct-reading instrument for measurement of dielectric constant and power factor. Catalog E-54. Leeds & Northrup Co., 4934 Stenton Ave., Philadelphia, Pa.

Silicone Compounds. Properties and applications of the rapidly expanding family of organs-silicon-oxide polymers are described in "Dow Corning Silicones, New Engineering Materials." Dow Corning Corp., Midland, Mich.

Synthetic Rubber Insulation. A 12-page slick-paper report to industry on synthetic rubber insulations used by the company. Simplex Wire and Cable Co., 79 Sidney St., Cambridge 39, Mass.

Technical Ceramics. Representative samples of extruded and machined parts made of Lavite Steatite ceramics for application in communications and industrial electronics are shown in a 16-page illustrated pamphlet. Lavite steatite ceramics are widely used for electrical insulation because of their excellent dielectric properties, heat resistant qualities, and ability to be easily machined. The back of the bulletin contains detailed technical specifications. D. M. Steward Mfg. Co., Chattanooga, Tenn.

LAMPS

Concentrated-arc Lamp. Special arc lamps with a light-emitting source less than a tenth of an inch in diameter give brightnesses up to 65,000 candles per square inch. Types, specifications and prices are given in a leaflet now available. The Western Union Telegraph Co., 60 Hudson St., New York 13, N. Y.

Electronic Flash Bulb. Described in bulletion EC-23. Sylvania Electric Products, Inc., 500 Fifth Ave., New York 18, N. Y.

Power Measurement Lamps. Four loose-leaf sheets have been published outlining the ratings and characteristics of lamps used for measuring high frequency power output. Three graphs are included. Slyvania Electric Products, Inc., Emporium, Pa.

Rugged Duty Light Bulbs. Designed for rugged-duty service where ordinary light bulbs fail four types or bulbs are described in the 4-pg. bulletin 103, issued by Lustra Corp. of America, 40 W. 25th St., New York 10, N. Y. Efficient service is assured by vibration service lamps with flexible construction, rough service lamps with flexible 12-anchor filament mount, and Milltype lamps with shock-absorbing filament supports. Traffic signal lamps are included in the bulletin.

Socket and Pilot Light Assemblies. Catalog available on their firm's extensive line. Drake Manufacturing Co., 1713 W. Hubbard St., Chicago 22, Ill.

LOUDSPEAKERS

Loudspeakers. Latest catalog of outdoor-type loudspeakers and projectors, some of which are explosion-proof, others capable of operating under water, etc. University Loudspeakers, Inc., 225 Varick St., New York 14, N. Y.

Loudspeakers. This firm is issuing a new 22-page catalog of heavy-duty loudspeakers for outdoor use. University Loudspeakers, Inc., 225 Varick St., New York 14, N. Y.

Loudspeaker Magnets. Literature available. Rowe Industries, 3120 Monroe Street, Toledo 6, Ohio.

"Permanent Magnets For Industry" is a technical bulletin containing data on design, production characteristics and applications of permanent magnets. Arnold Engineering Company, 147 E. Ontario St., Chicago 11, Ill.

Technical Bulletin. Nine standard sizes of speaker magnets. Arnold Engineering Company, 147 E. Ontario Street, Chicago 11, Ill.

Reproducer. Catalog bulletin that tell about the new electronic reproducer claimed to banish needle talk, tone arm rumble and make cracked records sound whole. General Electric Co., Bridgeport, Conn.

See also
Sound Equipment

MARINE EQUIPMENT

Loran Folder. An accurate fix within three minutes without and from any other navigational system is a feature of the loran long range aid to navigation operating over the Atlantic and Pacific oceans. Compact ship receiver-indicators based upon equipment designed for airplane service ar described in a 4-page folder. Radiomarine Corp. of America, 75 Varrick St., New York 13, N. Y.

Loran Publication. The Bureau of Ships, Navy Department, has announced that it will place on public sale a 60-page profusely illustrated handbook entitled "Loran Handbook for Shipboard Operators." Originally confidential, the pamphlet is now available from the Superintendent of Documents, U. S. Government Printing Office, Washington, D. C. at 30 cent a copy.

Marine Electronic Equipment. Non-technical 16-page bulletin about electronic aids to navigation such as in depth finders, direction finders or radar-type lookout. General Electric Co., Schenectady 5, N. Y.

Navigation Radar Equipment. Six-page booklet describing CR-101 equipment operating on 3.2 centimeter band. Radiomarine Corp. of America, 75 Varick St., New York 13, N. Y.

Navigation Survey. "The Future of Hyperbolic Navigation" by J. A. Pierce, has been declassified from the secret list and is now available through the Department of Commerce as report PB-2834 in photostat form at $2 or on microfilm for 50 cents. Included are an evaluation of Gee, Loran and the British Admirality Decca system. Office of Technical Services, Dept. of Commerce, Washington 25, D. C.

Radar Booklet. 12-page booklet describes Model CR-101 shipboard radar equipment for installation on cargo or passenger vessels as an aid to navigation. Radiomarine Corp. of America, 75 Varick St., New York 13, N. Y.

Radar Booklet. The new marine radar system for private vessels or commercial shipping is illustrated in a 6-page booklet recently released by the company. Sperry Gyroscope Co., Inc., Great Neck, N. Y.

METALS

Embossing and Drawing. 12-page booklet outlines the hydrodynamic embossing and drawing process for forming metal. The patented process and engineering advice on its use are offered. S. B. Whistler & Sons, Inc., 748 Military Road, Buffalo 17, N. Y.

High Nickel Alloy Steel. Comprehensive booklet on special steels used in the electronic and allied fields. The Carpenter Steel Co., Reading, Pa.

Metal Fabrication. Metal fabrication for the electronic industry is described in a two-color booklet showing microwave fittings, wave guides and unusual formed metal components. Bernard Rice's Sons, Inc., 325 Fifth Ave., New York 16, N. Y.

Metals for Electronic Use. B-3369 as a guide to the properties and applications of recent metallurgical developments of importance to the field of communications and electronics. Westinghouse Electric Corp., Box 868, Pittsburgh 30, Pa.

Platinum-Gold-Silver. 4-page bulletin describes the various uses of the noble metals, particularly those in the platinum series with their industrial applications. The American Platinum Works, Newark 5, N. J.

Sheet Metal Enclosures. Custom-built panels, relay racks, meter panels, and cases are pictured in an 8-page bulletin. Karp Metal Products Co., Inc., 139 30th St., Brooklyn, N. Y.

Silver Graphalloy. Literature and test samples available. Graphite Metallizing Corporation, 1057 Nepperhan Ave., Yonkers, N. Y.

METERS

Ball Bearings. Bulletin 47 describes a new line of small ball bearings suitable for instrument and small mechanisms use. New Hampshire Ball Bearings, Inc., 2 Main St., Peterborough, N. H.

D-C V-T Voltmeter. Catalog sheet has just been issued on the model SD-14 d-c vacuum-tube voltmeter. The meter is of particular interest because of its small size and long battery life. Development Engineering Co., 1818 Ashland St., Houston, Texas.

Direct reading pH meter. Bulletin B-569-B describes type D-303-B direct reading meter with accuracy of 0.05 pH. Equipment may be used alternatively as a high-impedance millvolt meter. Muirhead & Co., Ltd., Elmers End, Beckenham, Kent England.

Electrical Instruments. Catalog on glass-to-metal seal instruments and standard units. Sealed instruments are available in 2½ and 3½ in. sizes for all dc ranges. Marion Electrical Instrument Co., Manchester, N. H.

Electronic Voltmeters. 11 pages of electronic voltmeters and accessories, including amplifiers, multipliers, precision resistors and an artificial ear. Ballantine Laboratories, Inc., Boonton, N. J.

Galvanometers. Catalog ED comprising 37 pages of complete specifications, prices and illustrations for an extensive line of d-c and a-c galvanometers and astatic dynamometers. Leeds & Northrup Co., 4934 Stenten Ave., Philadelphia 44, Pa.

High Sensitivity Meters. Bulleton 501 shows how the line of d-c laboratory meters is constructed and what they do. Rawson Electrical Instrument Co., Cambridge 42, Mass.

Impedance Measurements. The type 310-A Z-Angle Meter measures impedance in ohms and phase angle in degrees. The instrument is direct reading over the entire a-f spectrum. It uses a circuit basically different from that of conventional a-c bridges. A pamphlet describes the instrument. Technology Instrument Corp., 1058 Main St., Waltham 54, Mass.

Inspection Instruments. 24-page bulletin describing a line of optical inspection devices comprising a variety of mirror and lamp combinations. Van Wagner Co., 89-04 113th St., Richmond Hill 18, N. Y.

Instrumentation. The quarterly "Instrumentation" runs to 30-odd pages and includes a number of interesting articles on instrument technology. The Brown Instrument Co., Wayne and Roberts Ave., Philadelphia 44, Pa.

Meter Catalog. Catalog No. 46 describing a complete line of indicating instruments and auxiliary equipment. Complete dimensional drawings and layouts, ranges, scale divisions, resistances and list prices are included. Burlington Instrument Co., Box 589, Burlington, Iowa.

Meters. 28-page catalog describing a line of hermetically sealed meters and the materials and parts from which they are made. Marion Electrical Instrument Co., Manchester, N. H.

RF Thermocouples. 10 page booklet describes company's complete line of vacuum thermocouples for the measurement of low and high frequency ac power. Data on heater current,

METERS—Continued

dc thermojunction voltage and heater resistance is supplied for 86 different types of vacuum thermocouples suitable for use a frequencies from 0 to over 50 mc. American Thermo-Electric Co., 67 E. 8th St., New York, N. Y.

Surface Pyrometers. Various types of surface pyrometers, widely used throughout industry, are described in a 12 page bulletin. Roll, extension, mold and needle pyrometers are illustrated; their industrial applications and technical characteristics are given. Cambridge Instrument Co., 3005 Grand Central Terminal, N. Y.

Synthetic Jewels. 27-page booklet describes the properties, production techniques and uses of synthetic sapphire, ruby and spinel. These artificial gems have been used for precision gages and suspending meter movements. Linde Air Products Co., 30 East 42nd St., New York 17, N. Y.

Switchboard Meters. Catalog No. 17 describes in as many pages the line of switchboard and portable meters produced by the company. Ordering information and prices are given. The Norton Electrical Instrument Co., Manchester, Conn.

Thermocouples. 32-page booklet giving information on selection of proper thermocouples and installation aids. Wheelco Instruments Co., Chicago 7, Ill.

UHF Thermocopule. 4-page folder describing uhf vacuum thermocouples. Electrical data construction, dimensions, response and overload characteristics of unmounted vacuum thermocouples are given. Field Electrical Instrument Co., 109 E. 184th Street, New York, N. Y.

Vacuum Tube Voltmeter. Single sheet describes Model 451 vacuum-tube voltmeter and Model 101 amplifier that can be used to increase sensitivity a hundredfold. Reiner Electronics Co., Inc., 152 West 25th St., New York 1, N. Y.

Weston Notes. A new publication entitled "Weston Engineering Notes," which will serve as a medium to provide pertinent application engineering information for users of electrical indicating instruments, has ben inaugurated by the Engineering Laboratories. The first issue featured articles entitled "The Galvanometer and the Bridge" and "Copper Oxide Rectifiers as Used in Measuring Instruments". Weston Electrical Instrument Corp., Newark, N. J.

See also
Testing and Measuring Equipment

MICROPHONES

Microphones and Pickups. Catalog 155 contains detailed information on applications, technical data, construction, and design. Shure Bros., 225 W. Huron St., Chicago 10, Ill.

General Catalog. Eight pages in standard looseleaf size list the entire line of microphones and recording components. A preview of the 1947 line is also give. Universal Microphone Co., Inglewood, Calif.

General Catalog. Complete new catalog and selection guide describes cardioid, dynamic, crystal, velocity, differential, and carbon microphones and suggests the best microphone for any particular use. Electro-Voice, Inc., 1239 South Bend Ave., South Bend 24, Ind.

See also
Sound Equipment

MICROWAVE EQUIPMENT

Maintenance Handbook. Basic maintenance operations for electrical equipment are described in a small handbook of 30 pages. Westinghouse Electric Corp., P. O. Box 868, Pittsburgh 30, Pa.

Microwave Accessories and Components. Illustrated catalog. Aircraft Radio Corporation, 708 Main St., Boonton, N. J.

Microwave Apparatus. A new catalog in three parts pictures some of the latest equipment available for civilian use in the microwave region of the radio spectrum. Microwave measurements, klystrons and wave-guide components are included. The Model 127 30-mc variable attenuator is illustrated. Sperry Gyroscope Co., Inc., Great Neck, N. Y.

Microwave Components; six page folder describing cross-section of products available; industrial and navigation equipment also decribed. Sperry Gyroscope Co., Inc., Great Neck, N. Y.

Wave Guide Fittings. An 18-page profusely illustrated catalog of standard microwave components. Mechanical and electrical characteristics, including drawings, are presented for each element. De Mornay-Budd, Inc., 475 Grand Concourse, New York 51, N. Y.

PLASTICS

Grommet Bushings. Copies of a chart of grommet bushings covering all dimensions, including collars, and ranges from 1/6 to ½ inch inside diameter may be obtained for the asking. Creative Plastics Corp., 963 Kent Ave., Brooklyn 5, N. Y.

Heating and Sealing. An 8-page booklet "Electronic Heating and Sealing With the Thermatron" describes the use of industrial heat generators for preheating and sealing of plastics, rubber, plywood, and other dielectric materials. Radio Receptor Co., Inc., 251 West 19th St., New York 11, N. Y.

Plastic Compounds. Booklet describes many uses and industrial applications of Vinylite elastomeric compounds. Tables of properties included. Bakelite Corp., 30 E. 42nd St., New York 17, N. Y.

Plastic Materials Table. General properties and uses for molded plastics materials are given compactly on two sides of a single sheet. All of the common materials are included together with typical applications. Shaw Insulator. Co., 160 Coit St., Irvington 11, N. J.

Plastic Molders. Brochure entitled, "A Businessman's Guide to the Molding of Plastics" gives specifications for various plastic materials, classified according to use, and data is given on the company's facilities, equipment and production capacity for molded parts and components. Kurz-Kasch, Inc., 1415 South Broadway, Dayton 1, Ohio.

Plastics. Illustrated, colored brochure summarizing the progress in design, moldmaking and manufacturing technics of plastics. In twenty pages a review is presented of the phrases plastic materials undergo from their earliest conception as a research project, through the development, design, moldmaking and manufacturing stages. Typical finished products made by compression, injection and low pressure molding as well as laminated materials are shown. Plastics Division General Electric Co., Schenectady, N. Y.

Plastics. 24-page book shows work done by company in making plastic computers, industrial parts, nameplate's, scales and crystals. G. Felsenthal & Sons, 4100 W. Grand Ave., Chicago 51, Ill.

"Selecting the Right Thermosetting Molding Material." 36-page booklet. Bakelite Corp., 30 East 42nd St., New York 17, N. Y.

Testing Plastics Parts. Advance chapter No. 4 of the SPI Handbook has been designed as a guide to industry in setting up its own performance tests on plastics parts. The general principles of product testing are set forth in a 14-page booklet. Society of the Plastics Industry, Inc., 295 Madison Avenue, New York 17, N. Y.

Thermoplastics. Many suggested uses and a listing of the properties and advantages of vinyl compounds, cellulose acetate, ethyl cellulose and polystyrene plastics are shown in a new booklet. Chemaco Corp., Berkeley Heights, N. J.

POWER SUPPLIES

For Laboratory and Production Testing. Literature available on several units. Electronic Measurements Company, Red Bank, N. J.

Genemotor. General catalog. Carter Motor Co., 2638 N. Maplewood Ave., Chicago, Illinois.

Regulated Power Supplies. Catalog sheets on models 310-A and 310-B electronically regulated power supplies. Type 310-A also provides a source of variable a-c. Furst Electronics, 800 W. Forth Ave., Chicago 22, Ill.

Vibrators and Inverters. Comprehensive catalog of various units. American Television and Radio Co., St. Paul 1, Minn.

Voltage Controls. Bulletin 150 replaces all other bulletins and describes the complete Superior line of powerstats, automatic voltage regulators, and remote positioners. Superior Electric Co., 713 Laurel St. ,Bristol, Conn.

Voltage Regulators. 16-page catalog describing the principles of operation and technical specifications of electronically-controlled regulators and Nobatrons. Sorensen & Co., Inc., 375 Fairfield Ave., Stamford, Conn.

RECEIVERS

Block diagrams, specifications and photographs of diversity reception components for radio telephone and telegraph. A necessity for high-speed printer or other signalling circuits, the diversity system of receiving fading signals insures communication otherwise impossible. Schuttig and Co., Washington 17, D. C.

Communications Receiver. Cardwell model 54 with range .54 to 54.0 mcs. Technical bulletin. Allen D. Cardwell Mfg. Corp., 97 Whiting Street, Plainville, Conn.

Components and Receivers. Catalog No. 600 is a 20-page bulletin describing products currently available in the way of transmitting and receiving parts, complete receivers, and small cathode-ray oscilloscopes. National Co., Inc., 61 Sherman St., Malden, Mass.

Communications Receivers. A series of four bulletins containing two new additions. Bulletins cover RME 84, a new 8-tube communications receiver with a frequency coverage from .54 to 44 mc.; VHF-152 converter for the 2, 6, and 10 meter amateur bands; revised DB 20 preselector, which has a tuning range from .55 to 33 mc, and the RME-45 communications receiver. Radio Mfg. Engineers, Inc., Peoria 6, Ill.

Communications Receivers. Two receivers model S-38 and S-40, tune from 540 kilocycles to 32 megacycles and 540 kilocycles to 43 megacycles respectively in four bands. The SX-42 gives continuous coverage from 540 kilocycles to 110 megacycles on either a-m or f-m. These receivers and some antennas are described in an 8-page folder. The Hallicrafters Co., Chicago, Ill.

Diversity Receivers. 35-page booklet describing diversity receiving equipment developed for circumventing signal fading in commercial communication systems. The information is presented in non-technical language. Schuttig & Co., Ninth & Kearny Sts., N.E., Washington 17, D. C.

Loran Receiver. A 10-page, well-illustrated exposition on basic concepts underlying the Loran system. Sperry Gyroscope Co., Inc., Great Neck, N. Y.

Noise Suppressor. The dynamic noise suppressor type 910-A, is completely described in a 7-page booklet recently made available. Technology Instrument Corp., 1058 Main St., Waltham 54, Mass.

Panoramic Handbook. Although this booklet is designed as in instruction manual for the use of the Model PCA-2 Pandadaptor, it serves to show how the panoramic system of visual reception operates. Its 34 well-illustrated pages describe the various functions which can be performed, such as measuring the deviation caused by modulation in a frequency-modulated signal, as a modulation indicator and for the analysis of keying transients, as well as the accurate determination of carrier frequency. Price, 50 cents. Panoramic Radio Corp., 242-250 W. 55th St., New York 19, N. Y.

VHF Receiver. Frequency range, 30-200 mc. Catalog "C." Boonton Radio Corp., Boonton, N. J.

Volume Control Guide. A collection of cards with a cross-index of corresponding type numbers in numerical order of four volume manufacturers. Clarostat Mfg. Co., Inc., 130 Clinton St., Brooklyn 2, N. Y.

RECORDING APPARATUS

Automatic Record Changer. Catalog. Garrard Sales Corp., 401 Broadway, New York City.

Fidelity Recorder. Electrone-Tone recorder uses motion picture film for recording up to five tracks on 16 mm. strip. Other widths give a corresponding increase or decrease in the number of tracks. Equipment records up to 10,000 cycles. Four-page booklet. Electronic Chemical Engineering Co., 443 So. La Cienega, Los Angeles 36, Calif.

Film and Magnetic Recorders. Technical data sheets and illustrated literature. Frederick Hart & Co., Inc., 350 Madison Ave., New York 17, N. Y.

Graphic Pyrometer. Single or multiple temperatures can be recorded on same sheet with Speedomax type G recorder, designed for pyrometers. Catalog ND46. Leeds and Northrup Co., 4934 Stenton Ave., Philadelphia 44, Pa.

Graphic Recorders. 19-page catalog describes a line of frequency-response and power-level recorders and allied equipment. Sound Apparatus Co., 233 Broadway, New York 7, N. Y.

Lateral Pickup. A magnetic-type pickup engineered for lateral records and transcriptions, completely described in an 8-page bulletin. Pickering and Crowe, Oceanside, N. Y.

Magnetic Recorder; specifications and resume of features of type SR-1 magnetic wire recorder given in 4-page brochure. Magnecord, Inc., 304 W. 63rd St., Chicago 21, Ill.

Magnetic Wire Recorder and Reproducer. Portable device for recording voice, sound and music on wire. Catalog available. Utah Radio Products, 820 Orleans St., Chicago 10, Ill.

Nylon Pickup. The new Nylon 1-J crystal pickup cartridge is described in a 4-page brochure. Both chuck and needle are formed from Nylon, but the needle tip is sapphire. A special guard protects the unit from damage by careless handling. Astatic Corp., Conneaut, Ohio.

Phono Pickups, Recording Heads and Accessories. Catalog 46. Astatic Corporation, Conneaut, Ohio.

Portable Recorder. Catalog describing company's line of portable recorders. Ellinwood Industries, 170 West Slauson Ave., Los Angeles 3, Calif.

Recording Discs. 24-page brochure presents its five types of recording discs. In addition there is much technical data of a practical nature concerning proper cutting methods and the reason for faults that develop. There is also a section devoted to the company's line of recording styli and playback points. Audio Devices, Inc., 444 Madison Ave., New York.

Recording Equipment. Illustrated literature on recording assemblies and recording level meters. Rek-O-Kut Company, 146 Grand St., New York 13, N. Y.

Recording Materials. The significant properties of recording materials for practically every type of recording instrument described in 44-page data book. Eastman Kodak Co., Rochester 4, N. Y.

Temperature Recorder. Various industrial applications are given for new CF-2 inkless recorder for recording temperatures in generators' transformers, ovens, air ducts, etc. Bulletin GEA-4572. General Electric, Schenectady, N. Y.

Wire Recorder. A 2-pager covers their new wire recorder complete with built-in loudspeaker, timer, volume level indicator, and microphone with plug and cord. Radiotechnical Laboratory, 1328 Sherman Ave., Evanston, Ill.

RECTIFIERS

Dry Plate Rectifiers. Catalog B presents a fairly complete sketch of selenium rectifiers from the discovery of the basic metal in 1817 up to a summary of new developments on page 34. The pages between are full of circuits, specifications and descriptions of uses to which cataloged items can be put. Selenium Corp. of America, 17 West Pico Blvd., Los Angeles 15, Calif.

Hydrogen Thyratron. Described in bulletin 4C35. Sylvania Electric Products, Inc., 500 Fifth Ave., New York 18, N. Y.

Instrument Rectifier. A 39-page booklet describing instrument rectifiers. Conant Electrical Laboratories, 6500 "O" St., Lincoln 5, Neb.

Midget Rectifier. Two buletins describe the new midget selenium rectifier and ways of using it in console radios, portables and intercommunicators. Federal Telephone and Radio Corp., Newark 1, N. J.

Portable Rectifiers. The Model 725S1C portable rectifier with output of 25 amperes from 0 to 6 volts is completely described in bulletin. W. Green Electric Co., Inc., 130 Cedar St., New York 16, N. Y.

Rectifiers. Several publications and a file folder describing this firm's bench and telegraph-type products. W. Green Electric Co., 130 Cedar St., New York 16, N. Y.

Selenium Rectifiers. 8-page bulletin describes in detail the various types of standard selenium rectifier equipments for direct-current requirements. Complete specifications and ratings are included. Radio Receptor Co., Inc., 251 West 19th St., New York 11, N. Y.

Selenium Rectifiers. Catalog of standard selenium rectifier equipments. Information on rectifier stacks is not given but may be obtained in a separate catalog. Federal Telephone and Radio Corp., 100 Kingsland Road, Clifton, N. J.

Selenium and VT Rectifiers. 16-page catalog containing a complete line of selenium-plate and vacuum-tube rectifiers has been published, containing illustrations, specifications, and prices. Electronic Rectifier Co., Inc., Rochester 2, N. Y.

Thyratrons and Rectifiers. Data sheets on 13 rectifier and thyratron tubes are loose-leaf bound into a paper cover. Characteristics, tube base connections, and maximum ratings are given for the industrial electronic tubes. Chatham Electronics, 475 Washington St., Newark 2, N. J.

RELAYS

AC-DC Relays. Complete engineering and ordering information is given in the 14 looseleaf pages of a folder issued recently on the line of a-c and d-c relays now available. Allied Control Co., Inc., 2 East End Ave., New York 21, N. Y.

AC, DC Relays. Profusely illustrated 38 page catalog includes dc relays, midget relays, hermetically sealed relays, a variety of industrial relays, keying relays, overload relays, time delay units, ac relays, telephone and transmitter relays, and a number of special types. Dimensional sketches, electrical and mechanical characteristics, switch combinaitons, and other data are given for each type. Advance Electric & Relay Co., 1260 West 2nd St., Los Angeles, Cal.

Aircraft Relays. 24-page booklet describes small-size relays originally designed for military aircraft and now available to industry. Cook Electric Co., Chicago 14, Ill.

General Catalog. Catalog No. 46 describes the complete line of this company's products in detail, occupying 49 pages that are well illustrated. Leach Relay Co., 5915 Avalon Blvd., Lon Angeles 3, Calif.

General Catalog. Catalog AR-145 lists the various types of relays, spring combinations, and time-delay features available in the "Aerotrol" line. A special application is the 52-point consecutive operation rotary relay. Cook Electric Co., Chicago 14, Ill.

Interchangeable Relay Coils. 4-page bulletin describes the Series-200 relays with interchangeable coil and contact assemblies for use on various voltages, a-c or d-c. Guardian Electric Mfg. Co., 1625 West Walnut St., Chicago 12, Ill.

Midget Relays. Bulletin 104 describing midget metal-base relays designed for aircraft and other applications where space and weight must be limited. Ward Leonard Electric Co., 31 South St., Mount Vernon, N. Y.

Millisecond Relay. New relay housed in metal-tube container and intended principally for use on resistive loads has operating time of one millisecond or less; contact rating 0.5 ampere at 110 volts. Stevens Arnold Co., 22 Elkins St., South Boston, Mass. Catalog 105A.

Relays and Timers. New 24-page well-illustrated catalog gives sales information on this company's line of standard relay and electrical timing devices. All relays are rated on the current-carrying capacity of the contact possible without damage to any portion of the relay assembly. Potter & Brumfield Sales Co., Dept. 214, 549 W. Washington Blvd., Chicago 2, Ill.

Telephone Type Relays. Telephone type relays for a-c or d-c operation can be supplied in slow-operate, slow-release, two-section coil and rotary types and are illustrated in a bulletin recently issued. Electro Voice Corp., 5215 Ravenswood Ave., Chicago 40, Ill.

Temperature Controlled Relays. A series of temperature controlled relays is described in a 16-page catalog. In the first part of the folder various types of normally open, normally closed and inclosed relays are shown and their load ratings, coil voltages and dimensions are given. The second part illustrates and describes thermo-regulators, mercury plunger relays, multi-contact thermo-regulators, relays and selector switches, thermometers, thermostats and differential temperature controls. H-B Instrument Co., 2518 N. Broad St., Philadelphia 32, Pa.

Thermal Relay. Publication 3007X describes model 501 thermal relay, a thermal time-delay device, preset and sealed. Thomas A. Edison, Inc., West Orange, N. J.

Various Types. 4-page bulletin shows a few representative types of overload, midget power, and latching relays available for circuit controls in communicaitons and industrial electronic applications. Automatic Electric Mfg. Co., Mankato, Minn.

RESISTORS

Ballast Bulletin. New 4-page bulletin has been announced for free distribution listing a complete line of ballast resistors for a-c and d-c receivers. JFD Mfg. Co., 4117 Fort Hamilton Parkway, Brooklyn 19, N. Y.

Catalog. Catalog 25 contains 20 pages and brings the Centralab line up to date. Included is information on switches, resistors, capacitors and special items. Centralab, Div. of Globe-Union Inc., 900 E. Keefe Ave., Milwaukee 1, Wis.

Enamel Resistors. Wire-wound vitrious enamel resistors used in radio, television and radar. Catalog D-2. Ward Leonard Electric Co., 31 South St., Mount Vernon, N. Y.

Fixed and Variable Resistors. Electronic components catalog RC6. Stackpole Carbon Company, St. Mary's, Pa.

Fixed Insulated Resistors. Technical data sheet sent on request. Allen-Bradley Co., 114 W. Greenfield Ave., Milwaukee 4, Wis.

Flat Resistor Bulletin. 4-page bulletin C-1 gives characteristics of the type FRW power wire-wound resistors, together with information as to dimensions and stacking. International Resistance Co., 401 N. Broad St., Philadelphia 8, Pa.

Line, Slide, Rotary Action Types. Designed for high-grade, low-cost applications. Catalog RC6. Stackpole Carbon Company, St. Mary's, Pa.

Negative Coefficient Resistances. 14-page engineering treatise describes resistance materials whose electrical resistance decreases with rising temperature for use in compensating or neutralizing the positive temperature coefficient of electrical circuit components. The booklet contains standard sizes and wattage ratings of the units, which are available in values from 5 to 35,000 ohms, discusses methods for changing their resistance, and suggests a number of applications. The bulletin includes graphs of resistance vs. temperature. Keystone Carbon Co., St. Mary's, Pa.

Precision Resistors. Bulletin No. 126 gives detailed information on the complete line of Ohmite Riteohm ½ watt and 1 watt nonconductive wire-wound precision resistors. These resistors are accurate within plus or minus 1 per cent. Ohmite Mfg. Co., 4635 W. Fluormon St., Chicago 44 ,Ill.

Precision Resistors. Catalog sheet giving engineering data and dimensions of precision wire-wound resistors. Resistance Products Co., 140 South Second Street, Harrisburg, Pa.

Resistor-Capacitor-Catalog. 40-page catalog describing this firm's line of resistors and capacitors, testing equipment and radio inter-

RESISTORS—Continued

ference filters for radio service and experimental use. Sprague Products Co., North Adams, Mass.

Resistor Catalog. Now available, catalog No. 50 describing the standard line of fixed and variable resistors. International Resistance Co., 401 N. Broad St., Philadelphia, Pa.

Resistor Catalog. Successor to Carter Radio and Utah Products, offers a new 8-page, 2-color catalog describing a line of vitreous enameled resistors. Model Engineering & Mfg., Inc., Huntington, Ind.

Resistor Specification Chart. Engineering data on Akra-Ohm resistors appears on a wall chart that shows JAN style numbers on a wall chart equivalent manufacturer's number. Shallcross Mfg. Co., Collingdale, Pa.

Resistors. New catalog bulletin No. 87 of resistor data on the full line of the company's resistors and windings. Resistors, Inc., 2241 S. Indiana Ave., Chicago 16, Ill.

Variable Resistors. Precision variable resistors are described in an 8-page pamphlet. Standard model, type RV3, is intended for use in experimental and laboratory gear; laboratory model, type RVL3 is provided with a dial plate for direct reading in ohms to a high degree of accuracy. Among other interesting features is one that permits ganging these resistors in a self-supporting assembly. Technology Instrument Corp., 1058 Main St., Waltham 54, Mass.

Variable Resistors. New engineering data folder with complete information on carbon and wire wound variable resistors. Taper charts, dimensional drawings, a specification sheet, etc., are also given. P. R. Mallory & Co., 3029 E. Washington St., Indianapolis 6, Ind.

Wire-Wound Resistors. A series of bulletins and sheets describes the complete line of wire-wound resistors. Shallcross Manufacturing Co., Collingdale, Pa.

Wire Wound Resistors. Type FRW flat wire wound resistors have a higher space-power ratio than standard tubular wire wounds and they lend themselves to assembly in stacks and gangs. 4-page descriptive bulletin available. International Resistance Co., 401 North Broad St., Philadelphia 8, Pa.

Wire Wound Resistors. 16-page bulletin in color, fully describes all this firm's standard wire-wound resistors. Exact resistance values maximum current carrying capacities and types of terminal in both the fixed and adjustable models of these vitreous enameled units are given. A page is devoted to the specifications of the two electrically heated soldering pots made by this company. Lectrohm, Inc., 5139 W. 25th St., Ciero 50, Ill.

RHEOSTATS

Power Rheostats; type PRT (AN3155) power rheostats described with temperature rise curves and dimensions clearly indicated. Bulletin E-1. International Resistance Co., 401 N. Broad St., Philadelphia 8, Pa.

Rheostats. Catalog 4 lists a series of circular rheostats that can be used in power ranges from 50 to 500 watts. Resistance wire or ribbon is wound on a ceramic core and held in position by a coating of vitreous enamel. Rex Rheostat Co., Baldwin, L. I., N. Y.

SOLDER

Bulletin T-200. Alpha Metals, 363 Hudson Ave., Brooklyn 1, N. Y.

Silver Brazing. A four-page, two-color brochure lists silver solder and fluxes for the new electronic world of hermetically sealed components and microwave plumbing. American Platinum Works, 231 New Jersey R. R. Ave., Newark 5, N. J.

SOUND EQUIPMENT

Audio Amplifier; four-page leaflet describes high-quality audio amplifier with optional bass and treble controls. Brook Electronics, Inc., Box 430, Elizabeth, N. J.

Audio Components. High-Q toroidal coils, equalizers and attenuation filters are described in a four-page, two-color catalog. Burnell and Co., 10-12 Van Cortlandt Ave., East Bronx 58, N. Y.

Audio Components. Components such as loudspeakers, audio transformers and package units like amplifiers are described on separate sheets or folders furnished by the company which are available upon request. Altec Lansing Corp., 250 W. 57th St., New York 19, N. Y.

Audio Publication. A 4-page monthly bulletin known as "Audio Record," is published containing items of interest to those using transcriptions. Audio Devices, Inc., 444 Madison Ave., New York 22, N. Y.

Plug-In Amplifiers. A 4-page, 2-color catalog folder gives the details of booster and monitor amplifiers that can be plugged into rack-mounted assembly. The equipment has been standardized so that only two types of tubes are used in two types of amplifiers for all general audio purposes. The Langevin Co., Inc., 37 West 65th St., New York 23, N. Y.

School Sound. "School Sound Systems" provides for the first time an authoritative guide, agreed upon by educators and manufacturers, for the use of radio equipment in the classroom. Single copies of the report are available from RMA. Radio Manufacturers Association, 1317 F St., N. W., Washington, D. C.

Sound Advances. New issue of their technical bulletin "Sound Advances" dealing with a new graphic recorder, the twin recorder, and a new regulated power supply. Sound Apparatus Co., 233 Broadway, New York 7, N. Y.

Sound Equipment. 4-page brochure describes complete rack-mounted or portable sound equipment together with horns and microphones. Stromberg-Carlson Mfg. Co., 100 Carlson Road, Rochester, N. Y.

Sound Equipment. 24-page, plastic-ring bound catalog showing complete line of cutter heads, pickups, studio recorders, portable recorders, and other gear necessary for high-precision cutting of records. Fairchild Camera and Instrument Corp.. 88-09 Van Wyck Blvd., Jamaica 1, N. Y.

See also
Loudspeakers
Microphones

SPRINGS

Contact Springs. Bulletin B-61 describes beryllium copper electrical contact springs and contact assemblies. Electrical and mechanical properties are included. Gibson Electric Co., 8350 Frankstown Ave., Pittsburgh, Pa.

Handbook available on this manufacturer's line of springs. Accurate Spring Mfg. Company, 3835 W. Lake St., Chicago 24, Ill.

SWITCHES

Lever Switches. Catalog No. 200 describes an interesting line of lever switches, multiple spring contact, pushbutton and multiple cam switches. Contacts can be furnished in locking and non-locking positions, and in many combinations of multiple, make-before-break and ohter special types. General Control Company, 1200 Soldier's Field Road, Boston 34, Mass.

Master and Foot Switches. Two catalogs on "Master Switches" and on "Manually Operated Foot Switches." The 12-page master switch bulletin lists and describes a variety of lever switches, midget lever switches, rotary and rotary snap switches, push button switches and contage assembies. The 8-page foot switch catalog gives applications, specifications and dimensions for three styles and ten standard types of units. General Control Co., 1200 Soldiers Field Rd., Boston 34, Mass.

Mercury Switches. 15-page booklet lists complete details of 66 basic switch models for direct control of electrical loads up to 50 amperes. Minneapolis-Honeywell Regulator Co., 2753 Fourth Avenue So., Minneapolis 8, Minn.

Pressure Switches. Comprehensive catalog illustrating pressure operated switches. Various models operate from near zero absolute in. of vacuum to 5,000 PSI. The catalog is designed to give data of a general nature and an engineering data summary sheet is included for specific problems to be submitted to the company. Meletron Corp., 950 N. Highland Ave., Los Angeles 38, Cal.

Small Switches. Interesting catalog with split pages making it easy to refer to the various switch types and at the same time thumb through a secondary cataloging of their characteristics. There are more than 19 pages of photographs, specifications and prices. Mu-Switch Corp., Inc., Canton, Mass.

Selector Switches. Selector switches of all kinds are described; complete dimensional and mounting information, and interstage shielding, mounting straps and other hardware are included in 32 pages. Centralab Division, Globe Union, Inc., Milwaukee 1, Wis.

Snap Switches for Gaging. Bulletin No. 36 treats the special application of micro switches in the measurement of tolerances, go and no-go indicators, high-speed mica gages and for automatic graduation engraving. 16 pages are well illustrated. Micro Switch Divn., First Industrial Corp., Freeport, Ill.

Time Switches. Time switches in a wide variety of types and for application in any field where accurate control is required are illustrater and described in a new four-page bulletin (T-55). The bulletin describes and illustrates operation of six of many types, including automatic resetting, continuous repeating, dial setting and a special cut cam type which reverses SPDT switch for one minute every five minutes. Automatic Temperature Control Co., 18 W. Chelten Ave., Philadelphia 44, Pa.

TESTING & MEASURING EQUIPMENT

Audio Test Equipment. 8-page brochure describing the new Model 201B a-f oscillator, and Model 330B distortion analyzer. Hewlett-Packard Co., Box 1188, Station A, Palo Alto, Calif.

Catalog 700. Line of parts, oscilloscopes and receivers. National Co., Inc., Malden, Mass.

Conductivity Cells. A survey of conductivity checking equipment for laboratory and plant use; catalog deals primarily with large selection of conductivity cells for checking various liquids under different conditions. Industrial Instruments, Inc., 17 Pollock Ave., Jersey City 5, N. J.

Decade Units. Descriptive 8-page folder covering decade units designed for experimental setups on dc or low frequency ac circuits. A variety of inductor units, resistor units, transformer units and capacitor units are available. Harvey-Wells, Southbridge, Mass.

Electronic Pyrometer. 16-page bulletin No. 323 describes the new Pyrotron electronic potentiometer pyrometer and illustrates various indicating, recording and controlling combinations. Performance data and principles of operation are included in this bulletin. Bailey Meter Co., 1050 Ivanhoe Road, Cleveland 10, Ohio.

High Vacuum Engineering. Low pressures formerly obtainable in the laboratory are now commercially feasible. Equipment for obtaining vacuums is described in a well-illustrated booklet. National Research Corp., 100 Brookline Ave., Boston, Mass.

Instrument Catalog. Catalog 10 contains 15 illustrated pages that describe the complete line of industrial testing equipment, including bridges, conductivity apparatus, capacitance and resistance decades. Industrial Instruments, Inc., 17 Pollock Ave., Jersey City, N. J.

Laboratory Apparatus. Catalog D contains information on Q meters, QX checkers, generators, accessories and parts. A price sheet and ordering information are included in the 36-page catalog. Boonton Radio Corp., Boonton, N. J.

Laboratory Measuring Equipment. Various literature available on company's extensive line. General Radio Company, Cambridge 39, Mass.

Limit Bridge. Brochure available for the new No. 1010 comparison and limit bridge useful in production testing of components. Freed Transformer Co., 72 Spring St., New York 12, N. Y.

Precision Testing Equipment. Catalog K, Fifth Edition, describes the complete line of frequency standards, signal generators, monitors, and components. Included is a new price list. General Radio Co., 275 Massachusetts Ave., Cambridge 39, Mass.

Production Test Equipment. Catalog describing firm's line. De Mornay-Budd, Inc., 475 Grand Concourse, New York, N. Y.