

Official Publications Received.

BRITISH.

Further Impressions of the Public Library System of the United States of America. By Miss K. E. Overbury and Dr. E. E. Lowe. Pp. 47. (Dunfermline: Carnegie United Kingdom Trust.)

British Research Association for the Woollen and Worsted Industries. Publication No. 94: A Survey of the Production and Utilisation of Wool. By S. G. Barker and Arnold Frohisher. Pp. 10. (Leeds.)

Education, India. Occasional Reports, No. 15: Rural Education in England and the Punjab. By R. Sanderson and J. E. Parkinson. Pp. ii+92. (Calcutta: Government of India Central Publication Branch.) 12 annas; 1s. 3d.

FOREIGN.

Proceedings of the Imperial Academy. Vol. 4, No. 4, April. Pp. xi+137-137. (Tokyo.)

Zoopathologica: Scientific Contributions of the New York Zoological Society on the Diseases of Animals. Vol. 2, No. 1: The Treatment of Fish Diseases. By Ida Mellen. Pp. 31. (New York City.)

The Record of the Celebration of the Two Hundredth Anniversary of the Founding of the American Philosophical Society, held at Philadelphia for Promoting Useful Knowledge, April 27 to April 30, 1927. Proceedings, Vol. 66. Pp. xiii+750. (Philadelphia, Pa.)

CATALOGUES.

Geologie Deutschlands. (Lager-Katalog Nr. 196.) Pp. 296. (Leipzig: Max Weg.)

The Hump Method for the Heat Treatment of Steel. (Catalog No. 90.) Pp. 40. (Philadelphia, Pa.: Leeds and Northrup Co.; Birmingham: The Integra Co., Ltd.)

The Homo Method for the Tempering of Steel. (Catalog No. 93.) Pp. 28. (Philadelphia, Pa.: Leeds and Northrup Co.; Birmingham: The Integra Co., Ltd.)

Diary of Societies.

SATURDAY, JUNE 23.

NORTH OF ENGLAND INSTITUTE OF MINING AND MECHANICAL ENGINEERS (Newcastle-upon-Tyne), at 2.30.—J. L. Henard and J. T. Whetton: The Sinking of Londonderry Colliery, Seaham Harbour, Co. Durham, by the Freezing Process.—T. Greenland Davies: Extracts and Recommendations from the Report of the Water Dangers Committee.—Dr. John G. Kellett: The Physical Constitution of Coal and Coal Seams.—Dr. John G. Kellett: The Distribution of Ash in Bituminous Coal Seams.

MINING INSTITUTE OF SCOTLAND (in St. Margaret's Hall, St. Margaret Street, Dunfermline), at 3.—Discussion on David C. Gemmill's Paper on Supporting Underground Roadways with Steel Arches.—Discussion on J. A. Bernard Horsley's Paper on Design and Maintenance of Flame-Proof Enclosures, with Special Reference to Coal Face Machinery.—Discussion on T. A. Southern's Paper on Life Saving in Colliery Explosions and Fires.—John M. Williamson and John Bisland: An Experience of Machine Mining in a Highly Inclined Seam.—George W. Smith: A Trial Bore-Hole for Oil in South Africa and the Results.

PHYSIOLOGICAL SOCIETY (in the Department of Physiology, The University, Sheffield), at 8.—Demonstration by Benedict Finkleman: Preparation for the Measurement of the Excitability of the Cardiac Nerves of the Frog.—Demonstration by M. M. Croll: Specimens Illustrating the Relative Value of Different Methods for Demonstrating Nerve Fibres in the Pituitary.—F. R. Curtis and J. W. Pickering: The Effect of Pituitary Fractions on the Blood.—F. R. Curtis: The Action of Ephedrine and some of its Derivatives.—R. K. Christie and F. R. Curtis: The Effect of Ephedrine and its Derivatives on the Blood-Sugar.—John Freud: Biological Action of Iodides.—K. Furusawa: A Note on the Total Depolarisation of Crustacean Nerve.—M. Rabinovich: A Smooth Muscle Vagus Nerve Preparation.—W. Hartree and A. V. Hill: The Maximum Mechanical Efficiency of Muscles.—H. H. Dunlop: Adrenalin Dilatation.—G. A. Clark: The Action of Pituitrin on the Portal Circulation.—G. A. Clark: The Effect on Blood-Sugar of Interference with the Portal Circulation.—C. G. Imrie: The Action of Pituitrin in a Depancreatised Animal.—C. G. Imrie: Blood-Sugar and Hyperpnoea.—M. Hirst and C. G. Imrie: The Influence of Thyroid in Certain Types of Creatinuria.—G. P. Crowden and M. G. Pearson: The Effect of Morphia on the Adrenaline Content of the Suprarenal Glands.—E. C. Faves: The Pituitary and Nervous System in (a) Infantilitis with Diabetes Insipidus, (b) Post Encephalitis Diabetes Insipidus.—May Mellanby and C. Lee Pattison: The Healing of Dental Caries.—N. G. Green and E. Mellanby: Vitamin A as an Anti-Infective Agent.—E. Mellanby, E. M. Surie, and D. C. Harrison: The Antirachitic Action of Ergot.

MONDAY, JUNE 25.

INSTITUTION OF MECHANICAL ENGINEERS (at Southampton) (continued on June 26, 27, 28 and 29).

TUESDAY, JUNE 26.

ROYAL DUBLIN SOCIETY (in the Science Room, Ball's Bridge), at 4.15.—Report of the Irish Radium Committee for the year 1927.—C. Boyle, M. Murphy, and H. A. Cummins: "Blossom Wilt" of Apple Trees and "Wither Tip" of Plum Trees, with Special Reference to two Biological Forms of *Monilia cinerea* Bon.—T. Dillon and E. F. Lavelle: A Suggested Method for the Utilisation of Seaweed.—A. G. G. Leonard and P. F. Whelan: Spectrographic Analyses of Irish Ring-money and of a Metallic Alloy found in Commercial Calcium Carbide.—L. B. Smyth: *Salpingium salinosum*, a New Carboniferous Coral.—L. P. W. Renouf: A Preliminary Account of Lough Hyne, Co. Cork.

INSTITUTION OF ELECTRICAL ENGINEERS (Summer Meeting at Scottish Centre) (continued on June 27, 28, 29 and 30).

WEDNESDAY, JUNE 27.

ROYAL SOCIETY OF ARTS, at 4.—Annual General Meeting.  
BRITISH ASTRONOMICAL ASSOCIATION (at Sion College, Victoria Embankment).

BRITISH PSYCHOLOGICAL SOCIETY (Medical Section).—Mrs. Isaacs and Drs. Hadfield and Potts: Symposium on Mental Hygiene of Pre-School Age.

THURSDAY, JUNE 28.

SOCIETY OF GLASS TECHNOLOGY (at the Applied Science Department of the University, St. George's Square, Sheffield), at 11.15.—General Discussion on Lessons from the Tour in Germany.—A. Cosen, H. W. Howes, and F. Winks: The Control and Distribution of Temperature in Lehrs.

ROYAL SOCIETY, at 4.30.—Prof. J. C. McLennan: The Bakerian Lecture on The Aurora and its Spectrum.—To be read in title only.—E. Jones: Photographic Study of Detonation in Solid Explosives.—Prof. E. T. Whittaker: On the Potential of the Electromagnetic Phenomena in a Gravitational Field.—B. Topley and J. Hume: The Kinetics of the Decomposition of Calcium Carbonate Hexahydrate.—L. W. Nordheim: On the Kinetic Method in the New Statistics and its Application in the Electron Theory of Conductivity.—P. K. Kiechl: First Spark Spectrum of Krypton.—Prof. R. W. Wood and V. Voss: The Fluorescence of Mercury Vapour.—E. Rudberg: The Velocity Distribution of Photoelectrons by Soft X-Rays.—I. M. Mathews: The Absorption Spectrum of Cæsium.—D. Jack: The Band Spectrum of Water Vapour. III.—F. W. P. Götz and Dr. G. M. B. Dobson: Observations on the Height of the Ozone in the Upper Atmosphere.—Prof. T. M. Lowry and M. S. Vernon: An Improved Method of Ultra-Violet Polarimetry. Anomalous Rotatory Dispersion of Sodium Tartrate.

ROYAL SOCIETY OF MEDICINE (Urology Section), at 8.30.—Prof. Jurasz: Movable Kidney.

FRIDAY, JUNE 29.

ROYAL SOCIETY OF MEDICINE (Urology Section), 11 to 12.—Short Demonstration of Special Instruments.

SATURDAY, JUNE 30.

GENETICAL SOCIETY (at the John Innes Horticultural Institution, Merton, S.W.19), at 1.—Annual Meeting.

ROYAL SOCIETY OF MEDICINE (Disease in Children Section) (at Leicester).

FRIDAY, JULY 6.

GEOLOGISTS' ASSOCIATION (in the Architectural Theatre, University College, Gower Street), at 7.30.—F. Gosling: The Geology of the Country around Reigate.—H. A. Hayward: The Geology of the Lower Greensand around Dorking, Surrey.

CONGRESSES.

JULY 9-14.

SEVENTH INTERNATIONAL CONGRESS OF PHOTOGRAPHY, 1928 (at the Imperial College of Science and Technology, South Kensington).—Dr. A. Steigmann: Theory of Photographic Sensitivity.—Dr. Lüppo-Cramer: The Herschel Effect as a Regression Phenomenon.—L. A. Jones and V. C. Hall: On the Relation between the Time and Intensity in Photographic Exposure.—Dr. S. E. Sheppard and A. P. H. Trivelli: A Comparison of some Developers for Sensitometric Standards.—Dr. S. E. Sheppard and Crouch: A Machine for the Automatic Development of Sensitometric Strips.—L. A. Jones: Systematic Nomenclature in Photographic Sensitometry.—L. A. Jones and Russell: The Expression of Plate Speed in Terms of Minimum Useful Gradient.—O. Sandvik: On the Measurement of Resolving Power of Photographic Materials.—L. A. Jones and Chambers: High-Intensity Time-Scale Sensitometer.—Dr. E. P. Wightman and Quirk: Intensification of the Photographic Latent Image.—Dr. A. Steigmann: Silver Iodide in the Full-Ammonia Emulsion.—Prof. Dr. Emil Baur: Sensitisation and Desensitisation.—Prof. Dr. A. Lottermoser: Observations and Measurements on the Light-Sensitivity of Silver Halide Solis.—Prof. Dr. Fritz Weigert: On the Light-Sensitivity of Photographic Layers.—T. Thorne Baker and Balmain: The Effect of Temperature on the Sensitivity of Selected Photographic Emulsions and the Influence of Wave-length on such Temperature Effect.—O. Bloch: The Interaction of the Silver Halides in Emulsion Form.—Dr. F. C. Toy, and others: On Turbidity.—Prof. Dr. J. Eggert: On Secondary Processes in the Exposure of Silver Halides.—Prof. Dr. R. Luther: Sensitometric Studies.—Dr. F. M. Hamer: A Chemical Study of Desensitisers. Part I. An Account of the known Desensitisers.—Dr. D. A. Spencer: The Ferro-Prussiate Process; The Ferro-Gallic Process; The Diazo-Type Process; A New Application of the Ferro-Gelatine Process; Printing in Colours with Diazo Compounds.—H. W. Lee: The Modern Super-Speed Lens.—S. Jasienski: The Stereoscopic Effect of High-Aperture, Long-Focus Objectives.—N. Fleming: The Photography of Sound Waves.—Dr. Anderson: The Testing of Photographic Shutters; Lens Interferometry.—Prof. Hartridge: The Focal-Plane Shutter.—Capt. C. J. P. Cave: The Photography of Inaccessible Interior Architectural Details with a Spot-Light.—G. Auborne Clarke: The Photography of Clouds.—Prof. E. G. Coker: Photography as an Aid to the Study of Mechanical Stresses.—O. G. S. Crawford: Archeological Photography from the Air.—Capt. M. Hotine: On Photographic Surveying.—Prof. Namias: On Positives by Reversal.—A. R. Hinks: The Work of the Wild Phototheodolite in the Shaksgram.—W. M. H. Greaves: Astronomical Spectrophotometry.—Dr. E. Viterbi: The Fine-grained Emulsion and its Application to Spectrography.—Mr. Elwell: Paper on and Demonstration of Talking Film.—A. J. Bull: Tone Rendering by Half-Tone Processes.—H. M. Cartwright: (1) The Progress of Photogravure Etching; (2) A Method of Colour Correction.—A. A. K. Tallent: Latest Applications of Pyro-Tanning Processes.—E. L. Turner: Modern Photo-Engraving Screens.—William Gamble: The Present Position and Future Possibilities of Photo-Engraving.—H. N. Durham: Mercury Printing Processes.—F. J. Tritton: The Uses of Colour Photography in the Printing Trade.—Prof. Dr. E. Lehmann: On his Two-Colour Process.—Dr. R. von Arx: Dye-transfer Process from Dye-Mordant Images.—F. G. Tutton: The Value of the Chromoscope in Commercial Colour Photography.—Commander H. E. Rendall: A Paper on Tri-colour