

"Journal of Research (National Bureau of Standards)," Vol. 27, No. 4.

"Canadian Journal of Research," Vol. 19, No. 11.

Books

"Chromatographic adsorption analysis," by Harold H. Strain. (Interscience Publishers, Inc. New York), 1942. Pp. x + 222. Price \$3.75.

"Chinese lessons to Western Medicine," by I. Snapper. (Interscience Publishers, Inc. New York), 1941. Pp. x + 380. Price \$5.50.

"Advances in enzymology," Vol. I, by Nord and Werkman. (Interscience Publishers, Inc. New York), 1941. Pp. x + 433. Price \$5.50.

"The analytical chemistry of industrial poisons, hazards and solvents," by Morris B. Jacobs. (Interscience Publishers, Inc. New York), 1941. Pp. xviii + 661. Price \$7.00.

"Modern inorganic chemistry" (Tamil), by N. Ananthavaidyanathan. (Annamalai University), 1941. Pp. viii + 642. Price Rs. 2-8.

"Indian Scientists," by Kapur. (Sahitya Niketan, Cawnpore), 1942. Pp. 364. Price Rs. 3.

"A short history of plant sciences," by H. S. Reed. (Chronica Botanica Company, Waltham, Mass., U.S.A.), 1942. Pp. 320. Price \$5.00.

"Reference service and bibliography," Vol. I: by S. R. Ranganathan and A. Sundaram, 1940; pp. 642; Vol. II: by S. R. Ranganathan and K. M. Sivaraman, 1941, pp. 511. (Madras Library Association, Triplicane, Madras). Price Rs. 15 for both the volumes.

"Wave mechanics," by V. V. Narlikar. (Registrar, Patna University), 1942. Pp. vii + 160.

"Science for the prosecution," by Julius Grant. (Chapman & Hall, London), 1941. Pp. viii + 302. Price 15sh.

"Science and everyday life," by J. B. S. Haldane. (Messrs. Penguin Books, Middlesex, England), 1941. Pp. 192.

"British Scientists of the Nineteenth Century," Vol. II, by J. G. Crowther. (Messrs. Penguin Books, Middlesex, England), 1941. Pp. 233-441.

"Food, the deciding factor," a guide to rationing and food values, by Frank Wokes. Messrs. Penguin Books, Middlesex, England), 1941. Pp. xi + 144.

ACADEMIES AND SOCIETIES

Indian Academy of Sciences: (Proceedings)

March 1942. SECTION A.—B. S. MADHAVA RAO: Commutation rules for matrices related to particles of higher spins. P. SURYAPRAKASA RAO AND T. R. SESHADRI: Isolation of hibiscitrin from the flowers of *Hibiscus sabdariffa*: Constitution of hibiscetin. Hibiscitrin is a new flavonal glucoside of structure 3:5:7:8:3':4':5'-hepta-hydroxy-flavone. G. V. L. N. MURTY AND T. R. SESHADRI: Raman effect and hydrogen bonds, Part II. Mixtures of aldehydes and ketones with acceptor solvents. There are two types of hydrogen bonds, (1) the true hydrogen bonds in which both the cationoid and anionoid centres are affected and (2) hydrogen bonds in which only the cationoid group indicates change. C. J. DASA RAO AND T. R. SESHADRI: Fatty acids of neem oil. The work of Khuda et al., relating to the isolation of new fatty acids from neem oil could not be confirmed. R. D. DESAI, R. F. HUNTER AND G. S. SAHARIYA: Studies in the cyclohexane series. Part VI. The stereoisomeric forms of 4-Methyl, and 3-Methylcyclohexane-1: 1-Dicarboxylic acids and a conclusive chemical evidence for the multiplanar cyclohexane ring. S. S. PILLAI: On algebraic irrationals. S. S. PILLAI: On a problem in diophantine approximation. E. V. CHELAM: Application of tensor analysis of molecular anisotropy.

SECTION B.—G. N. RANGASWAMI AYYANGAR, M. A. SANKARA AYYAR, T. R. NARAYANAN AND

A. KUNHI KORAN NAMBIAR: *The train sorghums of the Durra group*. G. W. CHIPLONKAR: *Age and affinities of the bagh fauna*. P. MAHESHWARI AND BALWANT SINGH: *On the internal bundles in the stem of Rumex patientia L.* P. MAHESHWARI: *The embryo-sac of Euphorbia heterophylla L.—A reinvestigation*.

Indian Association for the Cultivation of Science: (Proceedings)

December 1941.—K. DAS GUPTA AND S. R. DAS: *X-ray study of selenium in the liquid and colloidal state*. H. N. BOSE: *Diffraction pattern of sulphuric acid at different concentrations*. T. TIRUNARAYANACHAR: *Vibrograph used as a viscometer*. L. D. MAHAJAN: *The optical hygrometer and its working*. S. SEN: *The secondary K-absorption spectra of ferric oxide in solid and in colloidal solution*. S. R. KHASTGIR: *Studies in antenna resistance and reactance*. M. M. SEN GUPTA: *Application of the theory of random scattering on the intensity variations of the down-coming wireless waves over long transmission paths*. M. G. SASTRY: *Structure of the electronic bands of the OD molecule, Part III*.

Indian Chemical Society: (Journal)

December 1941.—T. L. RAMACHAR: *Studies on the photochemical activity of mixtures of vanadic acid and tartaric acid sol. Part III. Induced circular dichroism in vanadic acid sol. Photoreduction of dichroic sol. by tartaric acid*

in circularly polarised light. **PRYADARANJAN RAY AND KSHITISHRANJAN CHAKRAVARTY:** Complex compounds of biguanide and bivalent metals. Part III. Copper and nickel phenylbiguanidines and their different modifications. **SRIDHAR SARVOTTAM JOSHI AND K. SRINIVASAN:** Electrochemical preparation of sodium chlorate from aqueous sodium chloride. **R. V. JOGLEKAR AND S. K. K. JATKAR:** Kinetics of hydrogenation of oils in a continuous process. **RAFAT HUSAIN SIDDIQUI AND SALAH-UD-DIN:** Studies in substituted succinic acids. Part I. **M. L. GUPTA, R. KAUSHAL AND DESHPANDE:** A method of preparing mono-ethers of methyleneglycol. **SHIAM KISHORE VASHISTHA AND SALIMUZAMAN SIDDIQUI:** Chemical examination of *Thalictrum foliolosum* DC. Isolation and characterisation of a new alkaloid, thalictarin. **B. CHATTERJEE AND A. SEN:** Variations in the electrochemical properties of hydrogen clay sols with temperature.

January 1942.—**PRIYADARANJAN RAY AND SAILAJAPRASAD GHOSH:** Complex compounds of biguanide with tervalent metals. Part X. Hydroxo-aquo cobaltic bisBiguanidine and its salts. **DUSHYANT NARASINGASA SOLANKI AND BHASKAR GOVIND JOSHI:** Complex formation in aqueous mercuric chloride and potassium iodide by conductivity, viscosity and refractivity measurements. **B. CHATTERJEE AND A. SEN:** The electrochemical properties of silicic acid sols. Part III. Variation in the pH, specific conductivity and total acidity of silicic acid sols with dilution and with temperature. **RAMCHANDRA SAHASRABUDHEY AND HANS KRALL:** Phenylthiocarbamides. A contribution to the study of the triad—N.C.S. Part XI. Oxidation of phenylthiocarbamide with copper sulphate, cupric chloride, copper nitrate, ferric chloride and iodine. **PARES CHANDRA BANERJEE:** Use of vanadous sulphate as reducing agent. Part IV. Estimation of titanium. **PARES CHANDRA BANERJEE:** Use of vanadous sulphate as a reducing agent. Part V. **TEJENDRA NATH GHOSH AND DEBABRATA DAS-GUPTA:** Synthesis of some four-membered heterocyclic compounds. **DIL BAHAR SINGH MITTAL:** Condensation of o-, m- and p-nitrobenzaldehydes with malonic acid in the presence of organic bases. **S. D. CHATTERJEE:** On the 'Kinetic' equivalence of bromine atoms in phosphorous pentabromide.

Entomological Society of India

Delhi Branch (New Delhi):

January 19, 1942.—**A. P. KAPUR:** Observations on the biology and control of *San Jose Scale* and *Woolly Aphis* in *Kashmir Valley*. **K. K. NIRULA:** *Aonidiella aurantii* infesting twigs of rose at Delhi. **GHULAM ULLAH:** *Microtharus rhinocylloides* Hochh. (Curculionidae) and its

parasite *Prodecotoma* sp. with illustrations. **E. J. VEVAI:** *Potato hopper-burn* by *Empoasca punjabensis* Pruthi. **S. PRADHAN:** On the scope and the aims of studies on insect population. **P. J. DEORAS:** On fresh-water *Trichoptera* from Gujerat.

U.P. Branch (Cawnpore):

February 18, 1942.—**B. D. GUPTA AND R. L. GARG:** Biology and distribution of *Chilo trypetes* Bisset in the United Provinces. **K. M. GUPTA:** A lepidopterous borer of mango inflorescence at Benares.

Royal Asiatic Society of Bengal:

March 2, 1942.—**K. P. BISWAS:** Notes on the occurrence of a *Cosmopolitan Blue-green Alga* in the Hot Springs at Wairaki in the Thermal Region of New Zealand. **K. N. BAGCHI:** Some Indigenous Poisons used in Crimes.

April 6, 1942.—**O. R. BARON EHRENFELS:** Traces of a Matriarchal Civilization among the Kolli Malaiyalis.

Botanical Society of Bengal:

March 7, 1942.—The Sixth Annual General Meeting of the Society was held at the Botanical laboratory, University College of Science, Calcutta, with Prof. S. P. Agharkar, President of the Society, in the chair.

The following were elected office-bearers and members of the Council of the Society for the year 1942-43.

President: Prof. S. P. Agharkar; Vice-Presidents: Prof. S. C. Mahalanobis, Prof. G. P. Majumdar, Mr. S. N. Bal, Dr. K. P. Biswas, Prof. S. R. Bose; Hon. Treasurer: Mr. I. Banerji; Councillors: Mr. K. G. Banerjee, Dr. B. K. Kar, Mr. M. B. Dutta, Dr. N. K. Chatterji, Mr. E. A. R. Banerji, Dr. J. K. Choudhury, Mr. R. M. Datta, Mr. A. K. Sen and Dr. S. R. Sen Gupta; Hon. Auditors: Dr. S. Mukherji and Dr. K. T. Jacob; Hon. Secretaries: Dr. S. M. Sirkar and Dr. B. C. Kundu.

Prof. S. P. Agharkar delivered his presidential address on "A plea for better organisation of Botanical Research in India".

Indian Mathematical Society: (Journal)

December 1941.—**F. W. LEVI:** On the number of generators of a free product, and a lemma of Alexander Kurosch. **C. RACINE:** Contribution to the relativistic problem of n bodies (I). **C. RACINE:** Contribution to the relativistic problem of n bodies (II). **S. M. SHAH:** A theorem on integral functions of integral order. **S. M. SHAH:** Note on a theorem of Polya. **HANS RAJ GUPTA:** On numbers of the form $4^n(8b+7)$.

ERRATUM

Vol. 11, No. 3, March 1942, page 107, Fig. 3, read 'hn' instead of 'gn'.