

may be directed to the public textile testing and conditioning house which has been opened at the institute. This house examines textile materials with the object of ascertaining and certifying their true length, weight, condition, and strength; and of carrying out other investigations required by merchants and manufacturers.

THE Northampton Polytechnic Institute, London, E.C., has issued its "Announcements Educational and Social for the Session, 1914-15." The announcements form a volume of 298 pages, and give full particulars of a varied and comprehensive curriculum. The work of the institute is divided into two main sections: an educational section for technological subjects, and a social and recreative section. The educational aim is to provide classes in technological and trade subjects, special attention being directed to the immediate requirements of Clerkenwell, the district in which the polytechnic is situated. Prominent among the day courses is that provided in technical optics. The aim in this department is to provide the thorough theoretical and practical training now required in various branches of the optical industry. It is believed that there is now, and that there will be for some time to come, a considerable demand for well-trained men. In connection with the practical side of this training the department has had the benefit of advice and assistance from prominent members of the optical trade. The full course as at present established extends over two years, and is divided into two sections, for opticians and optical instrument makers respectively. The engineering day college is organised in two departments for civil and mechanical engineering, on one hand, and for electrical engineering on the other. In the former arrangements have been made for the teaching of aeronautical engineering. The course in aeronautical engineering will follow the same plan as the other engineering day courses, that is, the first two years will be devoted to the subjects which form the ground work of all engineering, and the necessary specialisation will take place in the third and fourth years. These are a few examples of the practical character of the instruction given, and a reference only is possible to some of the other courses, which include watch- and clock-making and horological engineering generally, many branches of technical chemistry, and subjects connected with the jewelry, silversmiths', and metal-working trades. Evening classes on an even more comprehensive plan have also been arranged.

## SOCIETIES AND ACADEMIES.

### PARIS.

**Academy of Sciences**, September 7.—M. P. Appell in the chair.—G. Bigourdan: Observations of the Delavan comet (1913f) made at the Paris Observatory. Positions given for September 2 and 3. The comet was visible to the naked eye in spite of the size of the moon. It appeared to be of the fifth magnitude.—M. Appell: A transformation of certain functions deduced from  $C$  functions of higher degree.—L. Mangin: The polymorphism of certain diatoms from the Antarctic. It is shown that the classification of diatoms by the markings or values is faulty, since these show for a given species much less fixity than the structure of the endochrome. The paper is accompanied by numerous illustrations.—M. Fournier: The resistance of a fluid to the horizontal translation of a spindle-shaped body, moving in the line of the axis of the figure.—P. Gaubert: The faces of solution of dolomite. A study of the relations between the crystalline symmetry and etching figures produced by the action of very dilute nitric or hydrochloric acids.

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## BOOKS RECEIVED.

Northampton Polytechnic Institute, St. John Street, E.C. Announcements Educational and Social for the Session 1914-15. Pp. 298. (London: Northampton Polytechnic.)

Uganda Protectorate. Annual Report of the Department of Agriculture for the Year ended March 31, 1914. Pp. 67. (Kampala: Uganda Printing and Publishing Co., Ltd.)

Transactions of the Leicester Literary and Philosophical Society, together with the Report of the Council and Annual Reports of the Sections. Vol. xviii. Pp. 103. (Leicester: W. Thornley and Son.) 2s. 6d.

Poems of the Great War, published on behalf of the Prince of Wales's National Relief Fund. 2nd edition. Pp. 39. (London: Chatto and Windus.) 1s. net.

Dove Marine Laboratory, Cullercoats, Northumberland. Report for the Year ending June, 1914. Edited by Prof. A. Meek. Pp. 108. (Newcastle-on-Tyne: Cail and Sons.) 5s.

Chemical Technology and Analysis of Oils, Fats, and Waxes. By Dr. J. Lewkowitsch. Fifth edition, entirely re-written and enlarged. Vol. ii., edited by G. H. Warburton. Pp. xiv+944. (London: Macmillan and Co., Ltd.) 25s. net.

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