

The Sun :

its Phenomena and Physical Features. By Giorgio Abetti. Translated by Alexandre Zimmermann and Frans Borghouts. Pp. 360. (London : Crosby Lockwood and Son, Ltd., 1938.) 20s. net.

IT is a commonplace to refer to the sun as the nearest star, unique in presenting a disk for detailed study and thus deserving the closest of observation. In this book, Dr. Abetti, the director of the Arcetri Solar Observatory at Florence, surveys our knowledge of solar phenomena gained from the rather restricted direct telescopic observations to those embraced by the extensive field of spectroscopy. How rich the results have been may be quickly appreciated by looking through the numerous illustrations. Behind some of these lie years of devoted research and great inventive ability, as in the case of a spectroheliogram of beautiful definition, the detection and measurement of the magnetic field of a sunspot, or the recording of the sun's inner corona without a total eclipse.

Of astronomical readers of the book, the solar observer will perhaps derive the greatest profit and pleasure, because the book is written from his point of view. To the theoretical worker, however, this comprehensive survey will be of use as a reminder (to quote from the prefatory note) "of the existence of a large body of observational material which cries out for investigation by the inductive theorist". During the last few years, there has been a growing body of wireless research workers and others who require information of the sun's behaviour during its 11-year cycle of activity. To these also, Abetti's book can be recommended to answer their questions. It will be surprising if nothing more than a transitory interest is felt after this introduction to a star in action.

Du pétrole

Par Victor Forbin. (Ce qu'il faut connaître, 28). Pp. 158. (Paris : Boivin et Cie., 1936.) 8 francs.

THERE is no doubt that M. Victor Forbin in his book "Ce qu'il faut connaître du pétrole" has satisfied a long-felt desire of the 'French layman'. Every intelligent person at some time or other is driven by an urge to find out more about petroleum, that commodity which in an unbelievably short time revolutionized modern standards of living and which is used in some form or other every day by the poorest and richest alike. The development of the petroleum industry has been, and still is, romantic, and there is no reason why its romance should be buried and lost amid chemical formulæ and statistics of text-books comprehensible only to technologists and others directly concerned with the industry.

M. Forbin has written an easily assimilated story of petroleum, but at the same time there are included in it much authentic information and a number of judiciously inserted statistics. There is so much information in this small paper-covered book that it should provide a satisfactory answer to practically all non-technical queries about petroleum and a great many technical ones, whether concerning origin, production, refining or commercial distribution.

Mosquitoes of the Ethiopian Region

2 : Anophelini; Adults and Early Stages. By the late Dr. Alwen M. Evans. Pp. x+404. (London : British Museum (Natural History), 1938.) 20s.

A SHORT time before her death in August 1937 Dr. Alwen Evans brought to London the MS. and drawings for a monograph on the Anophelines of the Ethiopian region. This work was, happily, nearly complete, and has been seen through the press by Dr. F. W. Edwards of the British Museum (Natural History). In rather less than twelve years the number of Anopheline mosquitoes known from the region in question has become about doubled. This increase in knowledge has made the present monograph one of great value and necessity. *Anopheles*, it may be added, is the only genus of these mosquitoes that occurs in Africa, and is represented by the two subgenera *Anopheles sen. str.* and *Myzomyia*. Wherever possible there is included, under each species, a description of the adult insect, the pupa, larva and egg. There follow accounts of the larval habits and breeding places; habits of the adults; relation to malaria; and, finally, distribution.

We have nothing but praise for this comprehensive and scholarly work, which is admirably arranged and clearly illustrated. In every respect it forms a worthy memorial to its author, whose decease, in the midst of an active and scientific life, was a great loss to workers in medical entomology. A. D. I.

Chemie und Technik der Gegenwart

Herausgegeben von Dr. H. Carlsohn. Band 18 : Feuerfeste Baustoffe : silikatischer und silikathaltiger Massen. Von Dr. Claus Koepfel. Pp. xvi+296. (Leipzig : S. Hirzel, 1938.) 17 gold marks.

THE first part of this book deals with the various modifications of silica (quartz, tridymite and cristobalite) in a very clear and satisfactory manner, the quantitative data being summarized in tables and curves. In the second part, the system silica-alumina is described, followed by the system silica-alumina-lime. The changes of state of silica in refractories owing to changes of temperature and the effects of various other substances are systematically described. The remaining part of the book deals with the effects of silica in other refractories, namely, magnesia, dolomite, natural magnesium silicates, chromite and zirconia.

Domestic Pests :

What they Are and How to Remove Them. By L. Hunter. Pp. xii+235. (London : John Bale, Sons and Curnow, Ltd., 1938.) 7s. 6d. net.

THIS little book is intended to give information regarding the various kinds of animals— from mites and insects to rats and mice—which invade human dwellings. Besides giving accounts of preventive and remedial measures, something is also said about the life-histories of the various creatures likely to be met with. In addition to animal invaders, a short account of the common domestic moulds is also included. The book has been well planned, and its subject-matter is scientifically accurate and well adapted for the purposes intended.