

tafeln." They are issued by the Austrian Central Institute for Meteorology and Dynamics for use at Austrian meteorological stations. The tables give vapour pressure in millimetres in terms of the two arguments, dry-bulb temperature and relative humidity, the latter to be observed by means of the hair hygrometer. In a general discussion of the question of measurement of humidity, Dr. Schlein recommends the use of the hair hygrometer in preference to other methods, quoting a statement by Pircher that the indications of the hair hygrometer are independent of the air-pressure and of wind velocity. He also quotes a remark made by de Saussure in 1783: "When all other possible hygrometers have been tried, one will always fall back on the hair hygrometer."

There is a brief account of the precautions necessary to obtain accurate results by the use of Lambrecht's polymeter, which appears to be the standard type of instrument used by the Austrian service. This is followed by some remarks on the use of the readings in local forecasting, particularly forecasting of frost. A conversion table is given for converting pressure in millimetres to millibars. The discussion by Dr. Schlein will be read with interest by all who are interested in questions of humidity.

The tables, which were prepared by Dr. Dörr, are printed in a very clear and convenient form, and will doubtless be regarded as the standard tables for use when relative humidity is observed directly.

*Primitive Trade: its Psychology and Economics.*  
By Prof. Elizabeth Ellis Hoyt. Pp. vi+191.  
(London: Kegan Paul and Co., Ltd., 1926.)  
7s. 6d. net.

IF it were necessary to classify Miss Hoyt's "Primitive Trade" as anthropological, economic, social, or psychological science, it would be difficult to assign it to its proper category, for it belongs to all. It is essentially a study of values, and all the various influences, social, religious, customary, and personal, which can be held to bear in determining values have been brought into the account. Miss Hoyt visualises the central problem of economics as a study of the attempt to arrive at a 'perfect price.' This involves a full satisfaction of needs, while how it is to be attained necessitates a study of the underlying psychological processes and their development. This in turn is dependent upon a survey of the facts—the data provided by the anthropologist showing what people actually do at various stages of culture when they fix 'price' either explicitly or implicitly. She begins with the consideration of interests and passes on to the objectifying of needs, and shows how these interact and are brought into operation in the beginnings and extension of trade. Miss Hoyt has clearly been strongly influenced by Dr. Malinowski's studies of primitive trade and economic conditions in the Trobriands, which demonstrated clearly that in determining the factors of value, we must extend our vision far beyond the vistas of the economist of the schools. Her treatise is

a stimulating and really original contribution to the literature of economic science.

*Microscopic Fresh-Water Life.* By F. J. W. Plaskitt. Pp. xi+278+14 plates. (London: Chapman and Hall, Ltd., 1926.) 13s. 6d. net.

It is with regret that one learns of the sudden death of the author of this book almost immediately after its publication. But though the author has passed away, his book remains, and sentimental considerations must not prevent a reviewer from giving a plain statement of his impression of it. The book is meant primarily to assist the beginner and to instil into him some enthusiasm for that most fascinating of hobbies, the study of pond life. In his desire to popularise this subject, the author has certainly written a very attractive and interesting book. He had considerable experience of the subject, and has therefore been able to give much valuable information on the habitat and the best method of collecting fresh-water organisms. Both animals and plants are treated very fully. Most of the illustrations are admirable, and there are a great many remarkably fine photo-micrographs, the majority of which are taken with dark-ground illumination.

There is a useful glossary at the beginning of the book, and a really valuable chapter has been written by Mr. Chas. D. Soar on Hydracarina.

Unfortunately, the book contains much that is both incorrect and unscientifically written. A list of a few such blemishes has been sent to the publishers. A. G. L.

*Riemannian Geometry.* By Prof. L. P. Eisenhart. Pp. vii+262. (Princeton: Princeton University Press; London: Oxford University Press, 1926.) 13s. 6d. net.

THE recent physical interpretation of intrinsic differential geometry of spaces has stimulated the study of this subject. Riemann proposed the generalisation, to spaces of any order, of Gauss's theory of surfaces, and introduced certain fundamental ideas in this general theory. Bianchi, Beltrami, and others made substantial contributions to the subject, which was extended by Ricci with the use of tensor analysis and his absolute calculus. Recently there has been an extensive study and development of Riemannian geometry, and the book before us aims at presenting the existing theory.

The first chapter contains an exposition of tensor analysis sufficient for the reader who has not previously studied this subject. Most of the contributors to the theory of Riemannian geometry have limited their investigations to spaces with a metric defined by a positive quadratic differential form. The theory of relativity, however, deals with spaces with an indefinite fundamental form, and the former restriction is not made in the present book. Although many results in the older theory have been modified to meet the demands of relativity, much remains to be done in the unrestricted field.