AN UNUSUAL METEOR

WHILE riding in the fields about two miles east of Wolf, Wyoming, post office, on August 20, we observed a very interesting and unusual meteor. It entered the atmosphere about northwest of the point of observation, and about 60° above the horizon. Its illuminated path was perhaps seven degrees when it disappeared without reaching the earth. After the brilliant ball of light had disappeared an illuminated spiral remained and continued stationary in the sky for at least five minutes. This spiral was about one and a half turns and extended for about three degrees. The effect was much like a fiery serpent, the head being a ball more brilliant than the rest of the spiral, and the last part to disappear. The light from the meteor proper was the usual white, and almost sufficient to cast a shadow. It probably would have cast a shadow if it had been later in the evening (time 7:30 P.M., mountain time). The spiral was at first a light orange and very distinct in the twilight sky and gradually changed to a red, perhaps a little lighter than cherry, when it gradually disappeared. The spiral remained distinct for at least five minutes.

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SCIENTIFIC BOOKS

Food Products. By HENRY C. SHERMAN, Ph.D., Sc.D., professor of food chemistry, Columbia University. Second Edition Revised and Enlarged.

THIS valuable contribution to the knowledge of our foods has been rewritten in view of the great progress made in the knowledge of nutrition during the past ten years. In his preface he says:

> In order to put the user of the book in touch with recent advances in all phases of knowledge of food products without making the descriptive text unduly voluminous, many of the publications of the past ten years which are chiefly significant as extending our descriptive knowledge or as developing certain topics more fully than is feasible in a book of this size, are included by title in the lists of references at the ends of the chapters, so that by selection from these the teacher may develop the course, or the individual reader may extend his reading, as fully and in such direction as may be desired in each case.

As a result of this principle the references are inclusive and contain citations to all literature which any one wishing to secure further information may need to consult. This feature of the book is extremely valuable.

The book is descriptively chemical. It, however, is not written for the chemist alone but for the general reader as well. It particularly contains most valuable information which will be extremely helpful to the housewife in all her problems connected with the feeding of her family. As food is the most insistent need of humanity it should receive first consideration at the hands of those interested in human welfare and particularly the women who direct the domestic affairs in this country. It is a book, therefore, that can be read by every intelligent person and with great advantage to those who are seeking further knowledge as to the character of our foods and what they do to us.

I will not take time to describe the book in detail, but will mention only those important features which appeal to me as being of the greatest interest and value. First of all, of course, the housewife will read the articles on milk and its products. Butter is not considered in this article, but has first place in the chapters on edible oils. As milk is the most important of our foods, I want to call particular attention to the fine way in which the subject is presented and to the stress that is laid upon its importance in our dietary.

The feature which is most striking to me is the description of the use of sour milk, which is so palatable and has such wonderful helpful effects in many of the diseases of the digestive system. The new lactic acid ferment, bacillus acidophilous, is described, and the methods by which it does its work is set out in detail. The use of milk sugar in connection with the milk soured by the above ferment is explained in detail, and some hope is offered to those who wish to change to a certain extent the bacterial flora of the lower intestinal digestive organs. The importance of adding milk to bread, taking the place of water in the dough, is properly stressed. The importance of sanitation in the milk supply is duly pointed out.

The article on butter is full of valuable information. The progress in the manufacture of butter has resulted in the gradual increase of water in butter in the last few years, and particularly since the advent of the creamery. A few years ago the average content of butter fat in butter in 221 samples from fifty-five creameries in different parts of Iowa was 84 per cent. and the average content of moisture 12.73 per cent. In 1902 the United States Department of Agriculture analyzed eight hundred samples of butter from four hundred creameries in eighteen states, and the average of all the samples in moisture was 11.78 per cent. Gradually, under the insistent demands of the creameries, the standard for butter fat has been finally reduced to 80 per cent., a loss of 4 per cent. in the course of twenty or twenty-five years.