natural history, it is found that many are copied after drawings in old manuscripts.

A good example is furnished by Conrad Gesner's figure of an ichneumon, taken from an ancient MS. of Oppian, as the author declares.



FIG. 1.-Giraffe from mural painting at Villa Pamfili, near Rome. (After Keller, from Jahn).

In the case of the giraffe, what is thought to be the earliest portrait taken from life and engraved in a printed book, occurs in a work published in 1486 by Bernard de Breydenbach, a canon of Mayence, under the title of "Opusculum sanctorum perigrina-tionum." The figure is, however, inferior to those



FIG. a.—Giraffe and Cercocebus, from ancient Egyptian monument at Thebes. (After Ehrenberg).

of the same and other African mammals which are introduced in the Ebsdorf and Hereford maps of 1282. Pictorial representations of the giraffe by Roman

artists have been preserved from the time of classical NO. 2364, VOL. 94]

antiquity, and still earlier designs have come down antiquity, and still earlier designs have come down to us in the form of ancient Egyptian hieroglyphics and inscriptions. That some of these were remark-ably faithful likenesses may be judged from the two accompanying figures, one of which is reproduced from O. Keller's "Die antike Tierwelt" (1909), and the other from a memoir by C. G. Ehrenberg, "Ueber dem Cynocephalus und den Sphinx der Aegypter," published in 1834. C. R. EASTMAN.

American Museum of Natural History.

The Economic Status of the Blackcap.

MR. COLLINGE does not meet the question whether the good the blackcap does in the spring balances the value of the fruit it takes in the summer. But he mentions having found a few aphids in the stomachs even in the fruit season, from which it may be inferred that more would be eaten, when there was no fruit in the spring. Now considering the enormous reproductive powers of the female aphis and that every female destroyed in the spring represents a diminution of many hundreds of the most mischievous pests that the farmer has to contend with in the summer, it seems only reasonable to conclude that the bird does at least as much good as harm. But the latter is seen while the former is not.

ALFRED O. WALKER. Ulcombe, Kent, February 5.

My experience of the blackcap is that the good it does in the spring by no means balances the harm it does during the rest of the year in fruit-growing districts.

The aphids found in the stomachs were all pea lice (Macrosiphum pisi, Kalt.), and were probably obtained accidentally when feeding upon peas.

I have elsewhere pointed out (Journ. Board Agric., Sept., 1912) that all birds, other than doves and pigeons, feed their young upon an animal diet, of which insects form a large proportion, whatever may be the character of the food of the adult; the blackcap would, however, seem to form an exception, judging from the four nestlings I examined, whose stomach contents consisted of seeds or remains of fruit and fruit pulp. WALTER E. COLLINGE. fruit pulp.

8 Newhall Street, Birmingham.

The Rusting of Iron.

I DO not know if any account of experiments such as the following on the rusting of iron has appeared in print before, but if not they may be of interest to others of your readers besides myself. Briefly, they are as follows :-

(a) A small flask (100 c.c. flask with long narrow neck does well) is filled to the bottom of the neck with potassium ferricyanide solution, and then the neck is filled to the top with ordinary water. A long bright iron nail is then suspended in the water without disturbing the ferricyanide solution, and in a few minutes a blue colour will make its appearance in the neighbourhood of the boundary between the water and the ferricyanide. The formation of Turnbull's blue goes on regularly, and it settles to the bottom instead of iron rust.

(b) A bright iron nail is placed at the bottom of a solution of potassium ferricyanide in a similar flask, and in a short time spots of blue make their appearance on the nail instead of the usual deposit of iron rust.

The explanation according to the ionic theory seems E. J. SUMNER. obvious.

The Grammar School, Burnley, Lancs, February 5.