

THE ENTOMOLOGIST.

VOL. LVI.]

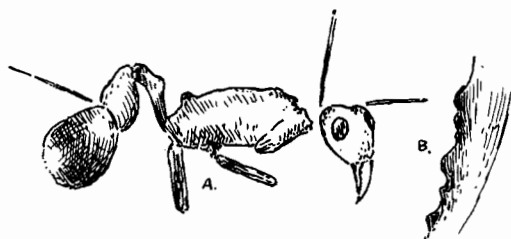
MARCH, 1923.

[No. 718

THE EARLIEST KNOWN PONERINE ANT.

BY T. D. A. COCKERELL.

THE earliest known ants are from the Green River Eocene of the Rocky Mountain region. From this formation in Colorado I recently published (1921) a new genus *Eoformica*, belonging to the Formicinae (or Formicidae proper), apparently more or less related to the modern *Oecophylla*. Scudder had previously indicated species supposed to belong to the existing genera *Myrmica*, *Lio-metopum*, *Lasius* and *Camponotus*, but these generic assignments are subject to revision. Among all these there is no evidence of



Archimyrmex rostratus, Ckll. A. Magnified 4 diameters. B. Cutting edge of mandible.

the Poneridae (or Ponerinae), which are supposed to be the most primitive of living ants. These animals, as we know them to-day, are comparatively rare and retiring, usually with small colonies. It is therefore to be expected that they will be uncommon among the fossils, though they have been found, *e. g.* in amber and at Gurnet Bay. Among the Poneridae, the Myrmecii or Myrmeciinae (not Myrmicinae), the bull-dog ants of Australia, stand apart as a distinct group, considered by Emery and Wheeler to be the most generalised of all known ants. In Baltic amber is a genus of these insects, *Prionomyrmex* Mayr, which Wheeler finds to be still more primitive than *Myrmecia*, and therefore the archetype of all known Formicoidea.

I now have to record another genus, allied to *Myrmecia* and *Prionomyrmex*, from the Green River Eocene of Colorado. It was found last July by Mrs. Cockerell at our Station 1, which is on a spur of the Roan Mountains, at the top of the Ute trail. The

characters cannot be seen as well as in the amber species, but they are sufficient to indicate a distinct type.

Archimyrmex new genus.

Rather large, elongated ants, with a general resemblance to *Myrmecia*, but with the eyes (as in *Prionomyrmex*) high up on the side of the head; the epinotum with a distinct elevation (presumably pair of elevations), placed as in *Ectatomma tuberculatum*, but large and obtuse; mandibles less elongated, but still long, the cutting edge with coarse obtuse teeth, between which are smaller ones; femora apparently shorter than in *Myrmecia*; first joint of pedicel elongated, with a dorsal elevation beyond the middle, the joint less massive than in the other two genera, but similar in principle to that of *Myrmecia vindex* Smith; second joint large and robust (its position reversed in the specimen), quite like that of *Myrmecia*, as also is the gaster. The mandibles of *Prionomyrmex* have a reniform denticulation, so those of our insect more resemble *Myrmecia*, which has irregular but much more prominent teeth.

Archimyrmex is therefore intermediate in some respects between *Myrmecia* and *Prionomyrmex*, but on account of the position of the eyes should apparently fall in Wheeler's tribe Prionomyrmecini.

Archimyrmex rostratus n. sp.

Worker.—Colour as preserved brown, the upper part of head and the gaster blackened, the coloration perhaps originally similar to that of *Myrmecia vindex* var. *nigriceps* Mayr. Length nearly 16 mm.; head with mandibles about 4 mm.; thorax about 5.3 mm.; middle femur about 3.7 mm. The specific name is derived from the beak-like effect produced by the mandibles.

SPRING LEPIDOPTERA IN SOUTH AND CENTRAL
SPAIN.

BY ALBERT F. ROSA, M.D., F.E.S.

PERHAPS rather late in the day I am penning a few notes on a short trip to Andalusia in the spring of 1921, though I am bound to say the species met with, as will be seen, include nothing new; still it is a few years since any records have been given of the localities visited.

A month seems to be a long time when you are looking forward, but when you deduct the *ida y vuelta* and journeys from one place to another, which apparently always occupy the better part of a day in the South of Spain, there is very little time left for actual work, not to speak of days when none can be done through inclement