

NOTES ON A NEWLY MOUNTED SKELETON OF MERY-
COIDODON,^a A FOSSIL MAMMAL.

By CHARLES W. GILMORE,

Of the Department of Geology.

During 1897, while engaged in field work for the U. S. Geological Survey, Mr. N. H. Darton collected from the Oligocene deposits of South Dakota a very complete skeleton of the small Oreodont, *Merycooidodon gracilis*.

The portions found consist of a poorly preserved skull and jaws; the vertebral column (articulated) from the atlas to the fourth caudal, one median caudal, twelve ribs of the right side and half of those of the left, three segments of the anterior portion of the sternum; both femora, both tibiae, right patella, articular portions of both scapulae, both humeri (the left one lacking the distal end), proximal ends of both ulnae, both radii (one lacking the distal portion); left scaphoid, lunar, and unciform; second, third, and fourth (latter lacking the distal end) metacarpals; several phalanges, including one ungual of the same foot; astragalus and calcaneum of the right hind foot; a portion of the hyoid arch.

This specimen (Cat. No. 2455), which was freed from the matrix and mounted by the writer, has recently been placed on exhibition in the U. S. National Museum. (See Plate XII.) So far as the writer is aware, it is the first example of this particular species to be thus exhibited.

The poorly preserved skull and jaws of Cat. No. 2455 have been replaced by the homologous parts of a more complete but somewhat smaller individual, Cat. No. 136, U.S.N.M. The latter elements are of peculiar interest as having been the subjects of study and illustration by Dr. Joseph Leidy as early as 1869 in his *Extinct Mammalian Fauna of Dakota and Nebraska*.^b The remainder of the skeleton pertains to

^a Commonly known as Oreodon. See Hay, Bull. No. 179, U. S. Geol. Surv., p. 665.

^b Jour. of the Acad. of Nat. Sci. (2), VII, 1869, p. 94, pl. vi, figs. 2 and 3.

Cat. No. 2455, except those parts which were missing; these have been restored in plaster. The lacking foot elements have been restored after a fore and hind foot of this species kindly placed at our disposal by Dr. H. F. Osborn, of the American Museum of Natural History, New York City. The tail has been given the same number of caudals as found in *M. culbertsoni*, a larger but closely allied species found in the same geological horizon. The vertebral formula of the species, as shown by this specimen, is as follows: Seven cervicals, 14 dorsals, 7 lumbar, 4 sacral, and 19 (?) caudals. The vestigial clavicle present in *M. culbertsoni* and *Agriochærus* was not found with this specimen.

This species was characterized first in a verbal communication by Doctor Leidy to the Academy of Natural Sciences of Philadelphia in 1851.^a It is the smallest representative of the Oreodonts, the skull being about the size of that of the red fox. The teeth show the animal to be allied to the ruminants, but it had many points of resemblance to the pigs, and Leidy has spoken of them as "ruminating hogs." The stout tusks indicate that, like the pigs, the animal was more disposed to fight than to run from its enemies.

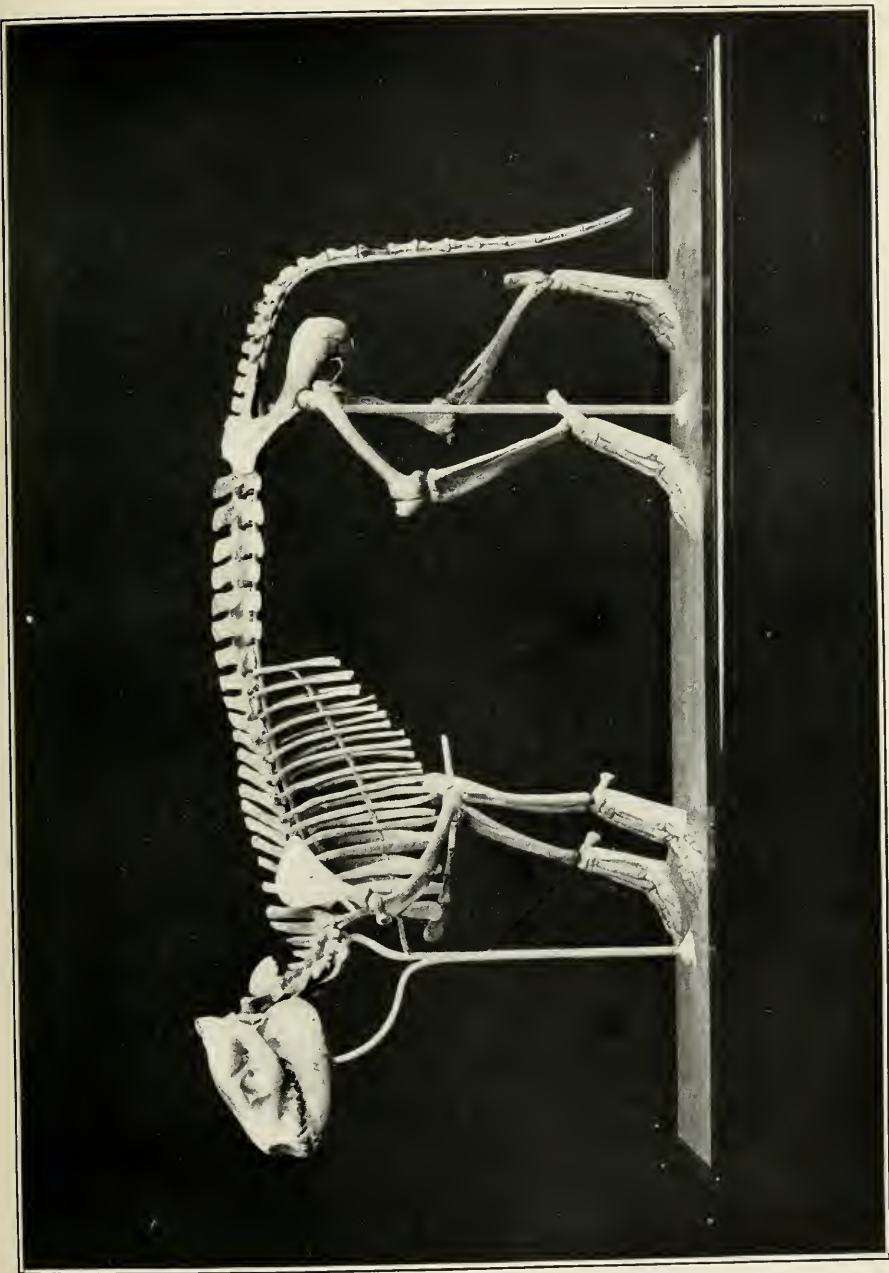
Although the skulls and bones of the Oreodonts are among the most frequent fossils found in the White River Bad Lands, their skeletons are not better represented in the several museums than many of the more rare forms.

Their remains have been found only in North America.

It seems quite probable, after a superficial examination of several individuals in the collections of this Museum, that there is more than one species of the small Oreodonts, and a careful study of a good series would undoubtedly be rich in scientific results.

The skeleton as mounted is 27 inches (690 mm.) in length and stands 12½ inches (320 mm.) high at the shoulder.

^a Proc. Acad. Nat. Sci. Phila., V. 1851, p. 239.



SKELETON OF MERYCOIODON GRACILIS.

FOR DESCRIPTION SEE PAGE 513.

