supported itself mainly on its hind legs and its massive tail. Its neck was flexible; and its teeth were of a very complicated structure, resembling those of the tiny iguana of to-day; and hence its name, iguanodon, which signifies iguana-tooth. Dr. Hawkins, the celebrated English geologist, has constructed a model of this huge beast, which can yet be seen at Sydenham Palace. The model contains 650 bushels of artificial stone, 100 feet of iron hooping, 600 bricks, 20 feet of inch bar iron, 900 plain tiles, and 650 two inch, half-round drain tiles; while the legs are four iron columns, nine feet long and four inches in diameter. An idea of its huge bulk may be gained from the fact, that on the completion of the model before described, 21 men took dinner within the restored body; on which occasion, Dr. Owens sat in the head, and officiated as the reptiles brains.

Fig. 19.

Among the strangest of the monstrosities of the Mesozoic time, the *Pterosauri*, or winged saurians, stand foremost. A common form was the *Pterodactyl*, or winged-fingered lizard. Let us turn to its skeleton (Fig. 20); and the reason for its name will

Fig. 20.

be plain. The bones corresponding to the outer finger were immensely prolonged, forming a support for a web-like expansion of the body covering, similar in appearance and functions to the wing of a bat. Perhaps this creature presents as close a realization of the fabled dragons of antiquity as can be found. Its form would certainly warrant the most extravagant stories which have ever been told respecting these fabulous monsters. Specimens have been found with a spread of wings of twenty-seven feet. The condor, our largest flying bird, does not exceed twelve feet from tip to tip of wings.

The *Mosasaurus* was a huge creation. Its skeleton has been found, showing a length of forty-five feet. Double rows of teeth existed in the jaws, and beneath each tooth were the germs of others. Rare specimens have been found indicating the almost incredible length of seventy feet. A fine specimen was for years the property of Prof. Hoffman. It was known as the "great beast of Maestricht." It was captured by the French Army during the war and carried in triumph to Paris as a highly prized trophy.

The serpent tribe was represented too. Here is a photograph of the skeleton of *Hydrarchos Harlanii* (Fig. 21). The creature seems to have derived its powers of motion

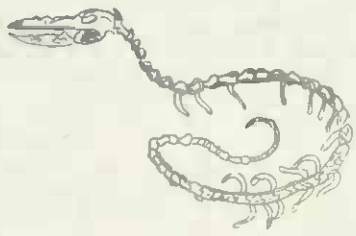

Fig. 21.

only from the telescoping action of the body rings. Such a structure, by comparison, suggests the idea of degredation. Though of the vertebrate order provided with a fully developed spinal column, yet it moves as the worm and the caterpillar do.

As the earth approaches its Cenozoic age, the power of reptiles seems to wane, and mammals take their places in the land. These creatures more closely resembled the animals of to-day. As a typical form, let us glance at the *Paleotherium* (Fig 22).

Fig. 22.

The figure is from the restored form by Cuvier, the father of comparative anatomy, as he has been justly termed, though subsequent discoveries lead to the belief that the neck was much longer than here represented, and that the animal bore closer resemblances to the deer family than to the tapirs. Its feet were three-hoofed.

The *Anophlotherium* (Fig. 23), was another animal of the early mammalian kind. It was truly graceful, and especially so in comparison to the hideous monstrosities of earlier times.

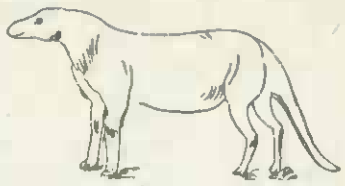

Fig. 23.

In size this creature resembled a horse. Its feet were each divided into two hoofs.

At this stage of the earth's growth a remarkable change came over the globe. This is spoken of as the *glacial epoch*, or *ice period*. From the vast deposits of drift material abounding all over the northern portion of the United States, it is believed that a great portion of the land was covered with an ice mantle, several thousand feet thick, perhaps similar to that which now envelops the Arctic and Antarctic regions. Much discussion has been indulged in as to whether the glacial epoch extended over the whole or but a portion of the land at any one time. Where this icy condition prevailed, most forms of animal and plant life would have become extinct; but they were probably preserved over this extreme of cold, in other parts.

The *Megatherium* (Fg. 24) deserves our attention. Its name means "monstrous beast," and the appellation is well-deserved. In size it was the equal of the elephant, though many

Fig. 24.

of its affinities would ally it to the sloths. Its bones, however, especially those of the hind legs, were far shorter than those of the elephant. It is believed that the beast supported itself while feeding, by its hind legs and by its tail, in tripod fashion, while with its front paws it drew