

Of individual variations not known to characterise particular breeds, and not great or injurious enough to be called monstrosities, I have not collected many cases. Mr. G. Brown, of the Cirencester Agricultural College, who has particularly attended to the dentition of our domestic animals, writes to me that he has "several times noticed eight permanent incisors instead of six in the jaw." Male horses only should have canines, but they are occasionally found in the mare, though a small size.⁴ The number of ribs on each side is properly eighteen, but Youatt⁵ asserts that not unfrequently there are nineteen, the additional one being always the posterior rib. It is a remarkable fact that the ancient Indian horse is said in the Rig-Vêda to have only seventeen ribs; and M. Piétrement,⁶ who has called attention to this subject, gives various reasons for placing full trust in this statement, more especially as during former times the Hindoos carefully counted the bones of animals. I have seen several notices of variations in the bones of the leg; thus Mr. Price⁷ speaks of an additional bone in the hock, and of certain abnormal appearances between the tibia and astragalus, as quite common in Irish horses, and not due to disease. Horses have often been observed, according to M. Gaudry,⁸ to possess a trapezium and a rudiment of a fifth metacarpal bone, so that "one sees appearing by monstrosity, in the foot of the horse, structures which normally exist in the foot of the Hipparion,"—an allied and extinct animal. In various countries horn-like projections have been observed on the frontal bones of the horse: in one case described by Mr. Percival they arose about two inches above the orbital processes, and were "very like those in a calf from five to six months old," being from half to three-quarters of an inch in length.⁹ Azara has described two cases in South America in

⁴ 'The Horse,' &c. by John Lawrence, 1829, p. 14.

⁵ 'The Veterinary,' London, vol. v. p. 543.

⁶ 'Mémoire sur les chevaux à trente-quatre côtes,' 1871.

⁷ Proc. Veterinary Assoc., in 'The Veterinary,' vol. xiii. p. 42.

⁸ 'Bulletin de la Soc. Géolog.,' tom.

xxii., 1866, p. 22.

⁹ Mr. Percival, of the Enniskillen Dragoons, in 'The Veterinary,' vol. i. p. 224: see Azara, 'Des Quadrupèdes du Paraguay,' tom. ii. p. 313. The French translator of Azara refers to other cases mentioned by Huzard as having occurred in Spain.