

They raise themselves without difficulty to the tops of the highest trees, and escape to their hiding-places with a quickness which eludes observation and baffles the efforts of their pursuers.

The solution of this enigma is to be sought for partly in the structure of the skin, which, in almost every species, is covered with numerous scales; and partly in the peculiar conformation of the ribs. The edges of the scales form rough projections, which are directed backwards, so as to catch the surfaces of the bodies to which they are applied, and to prevent any retrograde motion. In some species, the integument is formed into annular plates, reminding us of the structures so prevalent among worms and myriapode animals. Each scale is connected with a particular set of muscular fibres, capable of raising or depressing it, so that, in this way, it is converted into a kind of toe; and thus the body rests upon the ground by numerous fixed points of support.

This support is farther strengthened by the connexion of the ribs with the abdominal *scuta*, or the scales on the under side of the body. The mode in which the ribs become auxiliary instruments of progressive motion was first noticed by Sir Joseph Banks.* Whilst he was watching the movements of a *Coluber* of unusual size, which was exhibited in London, and was moving briskly along the carpet, he thought he saw the ribs come forward in succession, like the feet of a caterpillar. Sir Everard Home, to whom Sir Joseph Banks pointed out this circumstance, verified the fact by applying his hand below the serpent, and he then distinctly felt the ends of the ribs moving upon the palm, as the animal passed over it. The mode in which the ribs are articulated with the spine is peculiar, and has evidently been employed with reference to this particular function of the ribs, which here stand in place of the anterior and posterior extremities, possessed by most vertebrated animals, and characterizing the type of their osseous fabric. In the ordinary structure, the head of each rib has a convex surface, which plays either on the body of a

* Philos. Trans, for 1812, p. 163.