

process of the first caudal vertebra—on the same plane with the superficial muscle, and under cover of the agitator caudæ. It passes downwards under cover of the biceps proper, and appearing at its posterior border is inserted into the fascia on the fibular aspect of the leg.

These caudal divisions of the biceps muscle are undoubtedly present for the purpose of associating the movements of the heavy tail with those of the hind limb.

The bicipiti accessorius appears to be only occasionally present. According to Macalister¹ it is found in *Sarcophilus*, but "is absent in the Wombat, Giant Kangaroo, Bennett's Kangaroo, *Phalanger*, and Opossum. Young,¹ however, asserts its presence in the Opossum, but states that it is absent in the Koala.

Semi-tendinosus (Pl. III. fig. 1, *s.t.*, and fig. 2, *s.t.*; Pl. IV. fig. 5, *s.t.*, and fig. 1, *s.t.*).—In both animals this muscle has the usual origin from the tuber ischii, and in both its origin is partially blended with that of the biceps proper. Its connections with the supercaudal portion of the biceps have already been noticed. In *Cuscus* it is inserted into the inner aspect of the tibia about its middle, and completely under cover of the gracilis (Pl. III. fig. 2, *s.t.*); in *Thylacine* it is inserted very much higher up, and at a lower level than the gracilis (Pl. IV. fig. 1, *s.t.*).

In *Thylacine* the muscle is traversed by a faint tendinous intersection, but no such appearance was visible in *Cuscus*. It is a rare occurrence to find such in the semi-tendinosus of a Marsupial.

Semi-membranosus.—Little need be said about this muscle. It has the usual origin, and it ends in a round tendon which passes under cover of the strong cord-like internal lateral ligament (Pl. III. fig. 1, *i.l.l.*) of the knee to be inserted into the side of the anterior tuberosity of the tibia. It acts, therefore, as a rotator of the leg upon the thigh, as well as a powerful flexor (Pl. III. fig. 2, *s.m.*, and Pl. IV. fig. 1, *s.m.*).

Muscles on the Anterior and Inner Aspects of the Thigh.

Sartorius.—In both cases this muscle arises from the anterior superior spine of the ilium. In *Cuscus*, owing to the flexed condition of the thigh, it is at first closely applied to the lower part of the abdominal wall. Expanding into an exceedingly thin sheet of muscular fibres, it is inserted into the tendinous expansion of the quadriceps extensor muscle on the front of the knee, and also into the fascia upon the inner aspect of the joint (Pl. III. fig. 1, *s.*). In *Thylacinus* it is a thick prismatic muscle, and is inserted entirely in front of the knee-joint into the quadriceps expansion.

These animals therefore prove no exception to the rule that in Marsupialia generally the sartorius acts chiefly as an extensor of the leg upon the thigh.

¹ Myology of the Wombat and Tasmanian Devil, Ann. and Mag. Nat. Hist., vol. v., 4th ser.

² Muscular Anatomy of Koala, Jour. of Anat. and Phys., vol. xvi. p. 235.