The Extensor propries hallucis in the Phocinæ and Macrorhinus lies along the dorsal side of the extensor communis digitorum, under cover of the peroneus longus. It arises from the whole of the ventral surface of the fibula, from a very slight margin of the outer surface of the interesseous membrane next the shaft, and from the ventral border of the shaft from the termination of the outer border to the junction of the middle and posterior thirds. It crosses from the dorsal side of the extensor communis to its ventral side, runs beneath the annular ligament between the tibialis anticus and the extensor communis digitorum, and goes over the tendon of the tibialis anticus to the ventral surface of the tarsus, then it ascends gradually to the outer surface of the distal end of the 1st metatarsal. It is inserted into the distal tibial outer surface of the same, into the proximal end of the 1st phalanx, and into the capsule of the joint between. In the Phocinæ it is supplied by the musculo-cutaneous nerve (ventral division).

In Arctocephalus gazella it is almost as large as the tibialis anticus in the same animal. It arises from the anterior two-thirds of the ventral surface of the fibula, from the anterior half of the dorsal border of the tibia, from a small triangular surface of the tibia posterior to its head, and between its short outer border and its dorsal border, from the fusion of the tibio-fibular articulation beneath the origin of the extensor longus digitorum, and from the interosseous membrane. It courses backwards between the tibialis anticus on its ventral side and the extensor longus digitorum on its dorsal; beneath the annular ligament it forms a tendon, which passes over the tibio-fibular joint and the tarsus, and runs along the dorsal side of the 1st metatarsal. It is inscrted, after the expansion of its tendon, into the proximal end of the outer surface of the 1st phalanx. In Otaria it arises from the fibula and interosseous membrane, and to the proximal end of the proximal phalanx of the hallux. In the Phocinæ and Macrorhinus it extends the digit, and then flexes the ankle, and depresses and abducts the pes. In Arctocephalus it only extends and flexes.

The Extensor communis or longus digitorum, named by Lucae the extensor quatuor digitorum, in the Phocinæ and Macrorhinus is an elongated triangle situated between the tibialis anticus and the The latter partially overlaps it on the dorsal side, and it partially overlaps the tibialis anticus, and crosses the extensor hallucis. It arises from the triangular surface of the tibia posterior to the superior tuberosity, marked off inferiorly by a faint ridge, i.e., the short outer border which extends from the middle of the outer surface of the superior tuberosity backwards and upwards to the dorsal border of the tibia, from the tibia anterior to the fusion of the bones of the leg, from the capsule of the joint, and from the outer surface of the tibia and fibula where they fuse posterior to the origin of the peroneus longus. It forms a strong tendon, which passes backwards, crosses over the extensor hallucis, and goes beneath the annular ligament dorsal to the extensor hallucis at the posterior tibio-fibular articulation. Having traversed this, it crosses the ankle-joint and enters the groove on the middle of the outer side of the tarsus, which terminates over the proximal end of the 3rd metatarsal bone. Here it expands and divides into four tendons. The first or ventral passes obliquely over the ventral distal end of the 3rd metatarsal and expands upon the upper proximal end of the 1st phalanx of the 2nd digit. The second tendon passes back over the middle of the outer surface of the 3rd metatarsal, and expands upon it. The third crosses obliquely over the middle of the dorsal side of the 3rd metatarsal, goes backwards upon the ventral side of the 4th metatarsal, and expands upon the proximal end of the inferior side of the 1st The fourth crosses obliquely backwards and upwards from the proximal dorsal end of the 3rd metatarsal, over the middle of the outer surface of the 4th metatarsal, and reaches the ventral