

Psoas major is a large, thick muscle situated mainly in the abdomen: within its substance is the lumbar plexus of nerves, with the branches emerging from its borders and surfaces.

Proximal Attachment

It arises by a series of slips, each of which arises from the adjacent margins of the vertebral bodies and intervening intervertebral discs from inferior border of T12 to **superior border of L5**, tendinous arches over the narrow parts of the bodies of L1 to L4, and the anterior surfaces and inferior margins of the transverse processes of L1 to L5.

Lumbar arteries, veins and branches of the sympathetic trunk pass around the vertebral bodies deep to the tendinous arches from which the psoas major arises.

Distal Attachment

The fibers join to form a thick muscle as it passes antero-inferiorly towards the pelvic brim, gradually narrowing and forming a tendon as it passes deep to the inguinal ligament and anterior to the capsule of the hip joint. During its course along the pelvic brim it receives the majority of the fibers of iliacus on its lateral side and is from there on referred to as the 'conjoint tendon of psoas major and iliacus'. The conjoined tendon passes inferiorly, posteriorly and laterally to attach to the apex and posterior aspect of the lesser trochanter of the femur. The tendon is separated from the pubis and the hip joint by a large subtendinous iliac bursa, which may communicate with the hip joint cavity

Nerve Supply

A muscular branch of the lumbar plexus, derived from the ventral rami of L1 to L3 and occasionally L4, supplies Psoas major.

Action

With the proximal attachment fixed, it acts with iliacus to flex the hip joint. With the distal attachment fixed, both muscles work together through their conjoined tendon to pull the trunk and pelvis forwards. With iliacus it also acts as a medial rotator of the hip.

Unilateral contraction of the muscle when the thigh is fixed will produce lateral flexion of the lumbar spine to the same side. When the neck of the femur is fractured, it laterally rotates the femur, producing a characteristic posture of the lower limb.

For more information on the hip see 'The Interactive Hip'.