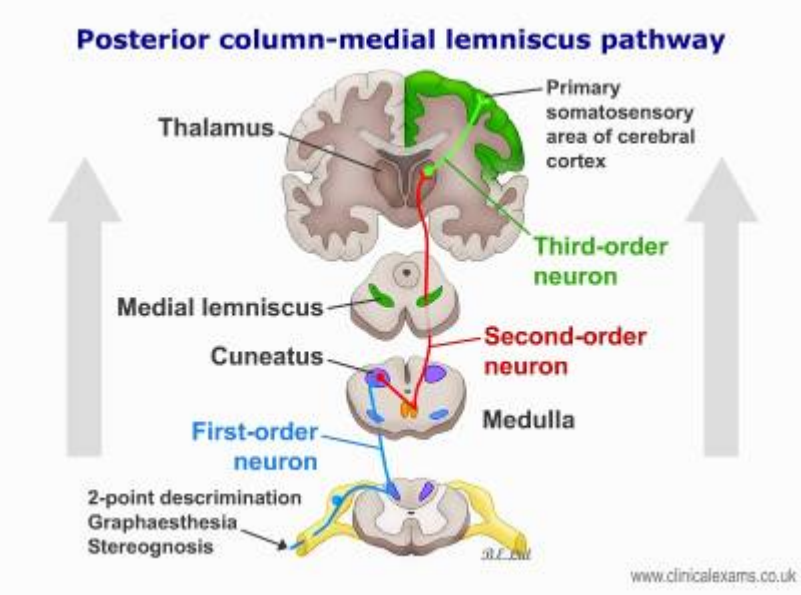
Medial lemniscus



The medial lemniscus, also known as Reil's band or Reil's ribbon, is a large ascending bundle of heavily myelinated axons that decussate in the brainstem, specifically in the medulla oblongata. The medial lemniscus is formed by the crossings of the internal arcuate fibers. The internal arcuate fibers are composed of axons of nucleus gracilis and nucleus cuneatus. The axons of the nucleus gracilis and nucleus cuneatus in the medial lemniscus have cell bodies that lie contralaterally.

The medial lemniscus is part of the dorsal column–medial lemniscus pathway, which ascends from the skin to the thalamus, which is important for somatosensation from the skin and joints, therefore, lesion of the medial lemnisci causes an impairment of vibratory and touch-pressure sense.