

## Meralgia paraesthetica

Meralgia paraesthetica is a nerve (neurological) condition that causes pain in the outer thigh. It is caused by compression of a nerve called the lateral cutaneous nerve of the thigh. This nerve supplies feeling (sensation) to the outer thigh. In many cases, the cause is not known. Usually the condition improves with conservative (non-surgical) treatment - such as anti-inflammatories, painkillers or steroid injections.

### What is meralgia paraesthetica?

Meralgia paraesthetica is a nerve (neurological) condition that causes an area of skin over the upper outer thigh to become painful, numb or tingly.

Meralgia paraesthetica is known as a nerve entrapment syndrome. This means it is a collection of symptoms caused by a trapped or compressed nerve. The trapped nerve in question is called the lateral cutaneous nerve of the thigh (also known as the lateral femoral nerve).

### Meralgia paraesthetica symptoms

The most common symptoms are burning pain or numbness in the upper thigh, on the outer side. Children and younger people may just have pain that limits normal activities.

Other symptoms include altered sensation of that part of the thigh, or tingling/[pins and needles](#). Symptoms tend to be made worse by walking and standing but relieved by lying down with the hip flexed. (Hip flexion is movement of the leg towards your tummy (abdomen); this can be with your knee bent or straight - but on your back it is easiest to draw your bent knee up to your chest.)

Other reported symptoms include aching in the groin, pain in the buttocks and an area of skin that seems super-sensitive to heat and light touch (as opposed to firm pressure).

## Meralgia paraesthetica causes

Most cases have no identifiable cause.

Meralgia paraesthetica can, however, be caused by direct injury to the lateral cutaneous nerve of the thigh accidentally. For example:

- A seat belt injury from a car accident.
- Inadvertently, during medical or surgical procedures - for example, keyhole (laparoscopic) hernia repairs.

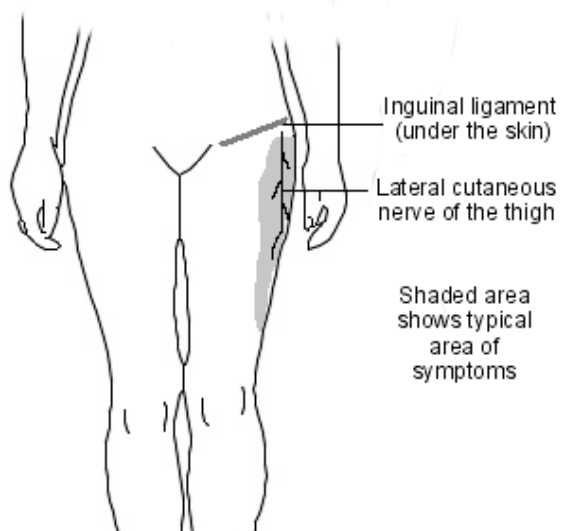
Various sports and physical activities can be associated with meralgia paraesthetica. These include gymnastics, baseball, soccer, bodybuilding and strenuous exercise.

Rarer causes include a neuroma. Neuromas are non-cancerous (benign) growths (tumours) on a nerve. Pelvic or intra-abdominal tumours (including cancerous ones) could also compress the nerve and cause this problem. This is rare.

Other possible causes include lying down for long periods of time in a curled-up position. [Diabetes](#) can affect nerves in general and, although it would be unusual simply to have this one nerve affected, the lateral cutaneous nerve of the thigh **could** potentially be damaged by diabetes.

---

# What is the lateral cutaneous nerve of the thigh?



The lateral cutaneous nerve of the thigh is found in the upper leg. It provides sensation to an area of skin on the upper outer thigh. If this nerve is trapped or compressed, burning pain, numbness or tingling might be felt in the area of skin supplied by the nerve. These symptoms constitute meralgia paraesthetica.

The lateral cutaneous nerve of the thigh is a sensory nerve that supplies the skin. It starts off in the lower part of the spinal cord, in the lumbar region. It has to pass over the front of the hip bones and under the inguinal ligament before reaching the thigh. The inguinal ligament is a tough fibrous band in the groin. This is the site at which the nerve is most commonly compressed or trapped.

## Who develops meralgia paraesthetica?

Anyone can develop meralgia paraesthetica. It is more common in men than in women. Generally it occurs between the ages of 30-40 years. It is much rarer in children.

Risk factors include obesity, pregnancy and ascites. Ascites is the term used for a tense swelling of the tummy (abdomen) due to fluid.

## How common is meralgia paraesthetica?

Meralgia paraesthetica is a very uncommon condition. It most often affects people between the ages of 30-40 years. The condition is thought to be much rarer in children. It occurs more often in men than in women.

## How is meralgia paraesthetica diagnosed?

A doctor can make the diagnosis based on your symptoms and examination of your body. The diagnosis is likely to be suspected if you have typical pain or sensory symptoms affecting the upper outer thigh. The condition can, occasionally, affect both sides at the same time (about 1 in 5 cases).

Examination might show altered sensation in the area of skin supplied by the lateral cutaneous nerve of the thigh. The pain can usually be provoked by getting you to extend your hip. Hip extension is the movement of the leg backwards. The main buttock muscle (gluteus maximus) tightens when you make this movement.

Because the lateral cutaneous nerve of the thigh is a sensory nerve, it affects feeling and sensation. It does not affect movement of the leg or hip. Your doctor will check to see that there is no weakness of the muscles - if there is, the diagnosis is not meralgia paraesthetica.

## Do I need any investigations?

Often no investigations (such as blood tests, X-rays and scans) are needed for the diagnosis of meralgia paraesthetica. However, an [ultrasound scan](#) may be used if there is concern that a mass in the pelvis is causing the symptoms.

Further tests may be done if an underlying problem or alternative diagnosis is suspected. If you have meralgia paraesthetica arising from an accident or injury (such as a pelvic fracture) then other tests will be needed.

In some cases, [nerve conduction tests are performed](#) if surgery for meralgia paraesthetica is planned. Nerve conduction tests look at the electrical activity running through a nerve. This is adversely affected if a nerve is compressed or trapped.

---

## Meralgia paraesthetica treatment

Treatments can be grouped into conservative treatments (which are non-surgical) and surgical treatment (operations). In most cases, only conservative treatments are needed.

Examples of conservative treatments include:

- **Rest** – meralgia paraesthetica is aggravated by standing and walking. Reduction in physical activity may be advised in severe cases. It may even be necessary to rest in bed.
- **Weight loss** – if obesity is thought to be the cause.
- **Physical therapies** – manipulation, massage and stretching exercises sometimes help.
- **Painkillers (analgesics)** – such as [paracetamol](#) or [codeine](#).
- **Non-steroidal anti-inflammatory drugs (NSAIDs)** – such as [ibuprofen](#), [naproxen](#) and [diclofenac](#).
- **Corticosteroid injections** – commonly referred to as steroid injections. A steroid and, usually some local anaesthetic, can be injected around the lateral cutaneous nerve to numb it and reduce inflammation.
- **Other medicines** – sometimes medications are used that act as nerve painkillers. Some types of antidepressant medications ([tricyclic antidepressants](#)) such as [amitriptyline](#) or [anticonvulsant drugs](#) can be useful for nerve-related pain (also called neuralgia or neuropathic pain). Examples of these drugs include [gabapentin](#) (brand name [Neurontin®](#)), [pregabalin](#) (brand name [Lyrica®](#)) and [carbamazepine](#) (brand name [Tegretol®](#)).

If you have meralgia paraesthetica it is also advisable to avoid tight clothing, such as belts or corsets, that presses on the upper thigh/hip area.

Surgical treatment involves taking the pressure off the nerve (surgical decompression) and releasing any entrapment.

# What is the outlook (prognosis) for meralgia paraesthetica?

Generally, the prognosis is good. Often, the symptoms of pain and pins and needles resolve with time but sometimes the numbness and altered sensation can remain long-term. However, if there is a serious underlying cause of the entrapment (this is rare) then the prognosis will depend on the underlying cause.

---

## Further reading

- [Treatment for meralgia paraesthetica](#); Cochrane Library, 2012
- [Cheatham SW, Kolber MJ, Salamh PA](#); Meralgia paresthetica: a review of the literature. *Int J Sports Phys Ther.* 2013 Dec;8(6):883–93.
- [Klauser AS, Abd Ellah MM, Halpern EJ, et al](#); Meralgia paraesthetica: Ultrasound-guided injection at multiple levels with 12-month follow-up. *Eur Radiol.* 2016 Mar;26(3):764–70. doi: 10.1007/s00330-015-3874-1. Epub 2015 Jun 21.
- [Chopra PJ, Shankaran RK, Murugesan DC](#); Meralgia paraesthetica: Laparoscopic surgery as a cause then and a cure now. *J Minim Access Surg.* 2014 Jul;10(3):159–60. doi: 10.4103/0972-9941.134883.
- [Solomons JNT, Sagir A, Yazdi C](#); Meralgia Paresthetica. *Curr Pain Headache Rep.* 2022 Jul;26(7):525–531. doi: 10.1007/s11916-022-01053-7. Epub 2022 May 27.

**Disclaimer:** This article is for information only and should not be used for the diagnosis or treatment of medical conditions. Egton Medical Information Systems Limited has used all reasonable care in compiling the information but makes no warranty as to its accuracy. Consult a doctor or other healthcare professional for diagnosis and treatment of medical conditions. For details see our [conditions](#).

Authored by:	Peer Reviewed by: Dr Colin Tidy, MRCGP	
Originally Published: 19/11/2023	Next review date: 15/09/2023	Document ID: doc_13604

---

View this article online at: [patient.info/brain-nerves/meralgia-paraesthetica-leaflet](https://patient.info/brain-nerves/meralgia-paraesthetica-leaflet)

Discuss Meralgia paraesthetica and find more trusted resources at [Patient](#).

---



To find out more visit [www.patientaccess.com](http://www.patientaccess.com)  
or download the app



Follow us

