

Restless Legs Syndrome (RLS)

Restless Legs Syndrome involves an uncontrollable urge to move the legs or other muscles due to extreme discomfort. People with RLS have difficulty falling or staying asleep because of their symptoms.

Restless Legs Syndrome: a neurological condition characterized by an irresistible urge to move the legs or other muscles in order to relieve unpleasant sensations that develop during rest.

Features

The uncomfortable sensations of Restless Legs Syndrome are intense, yet difficult to describe. RLS sufferers have used words like creepy, crawly, tingling, burning, tugging, pulling, and even painful to characterize their discomfort.

RLS disrupts sleep, and it is no wonder. Although symptoms can appear at any time of the day, they are worse at night, or during any period of rest. As soon as activity ceases, RLS sensations begin, along with the irresistible urge to move. Although movement provides immediate relief, it will only last as long as activity continues. It may be difficult for someone with RLS to remain still at all.

As the name implies, RLS often affects the legs, although it may be felt in the arms or even torso. The discomfort and urge to move are present no matter where RLS is felt.

A related problem involves involuntary muscle tightening or flexing. When strong enough, these movements are called *Periodic Limb Movements*. During wakefulness, this condition is known as *Periodic Limb Movements of Wakefulness (PLMW)*. During sleep, it is called *Periodic Limb Movements of Sleep (PLMS)*. The majority of people with RLS also have some form of PLMS.

Restless Legs Syndrome may be *primary* (not related to any other condition) or *secondary* to another medical problem. Primary RLS may be mild or severe, chronic or intermittent. Secondary RLS tends to resolve itself when the underlying medical problem is treated.

Diagnosis

Mild RLS may not be bothersome enough to require medical intervention. Consider a sleep consultation if your symptoms prevent sleep or other activities.

A two week *sleep log* as well as rating your sleep habits with the Epworth Sleepiness Scale will help demonstrate RLS. If necessary, an overnight sleep study at an accredited sleep lab will assess the quality of RLS movements or reveal another problem.

Treatment

Depending on the severity of symptoms, RLS may be treated with behavioral modifications or medication.

Behavioral Modifications: Regular exercise such as walking, riding a bicycle or swimming may reduce or eliminate symptoms. Massaging the legs or soaking in a hot tub prior to bedtime may also help.

Medications: Several prescriptions are available, many of which replace a chemical in the brain called dopamine. Other medications include sleeping pills, some anti-seizure medications, or narcotic pain killers. If restless legs symptoms are related to iron deficiency, then prescription iron treatment may be prescribed.



Do I have RLS?

I feel a strong urge to move my legs or other skeletal muscles, which I cannot resist.

The urge to move is accompanied by uncomfortable sensations that are creeping, crawling, tugging, or pulling.

My symptoms start or become worse when resting.

My symptoms improve when I move my legs or affected muscles. That relief only lasts until I stop moving.

My symptoms become consistently worse in the evening and whenever I am at rest (not moving).

SleepCaptions

RLS Mechanics

Restless Legs Syndrome can develop for any number of reasons. Some people have a genetic predisposition to the disorder, which may be enough to precipitate symptoms. More than 60% of people with RLS have a family history of the disorder.

Certain medical conditions increase the likelihood of developing RLS:

- » End stage renal (kidney) disease
- » Anemia
- » Low blood-iron levels
- » Peripheral neuropathy
- » Attention Deficit Hyperactivity Disorder (ADHD)
- » Pregnancy

Research suggests that RLS is most often associated with low levels of iron or the inability of the brain to process it. The brain relies on iron to manufacture the chemical *dopamine*, which works in the part of the brain that controls movement.

Risks for RLS

- ✓ Family history/genetics
- ✓ Female Gender
- ✓ PLMS/PLMD
- ✓ Iron Deficiency
- ✓ Parkinson's Disease
- ✓ End-stage renal disease
- ✓ Pregnancy
- ✓ COPD
- ✓ Auto-immune diseases (Rheumatoid Arthritis/ Celiac Disease)
- ✓ Middle age and beyond
- ✓ Certain medications
- ✓ Varicose Veins

Effects of RLS

- ✓ Sleep deprivation
- ✓ Chronic daytime tiredness
- ✓ Fatigue
- ✓ Chronic memory problems
- ✓ Poor job or school performance

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Visit the SleepMedicine Education web site at: sleepmedicineeducation.com for additional publications. See also:

SleepIssues: "Can't Sleep?"
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Did You Know?

The Mayo Clinic Proceedings reports that Restless Legs Syndrome affects 10-15% of the population, with men and women being affected equally.

In a large survey called the Walker Survey, more than 50% of respondents reported at least one first degree relative with symptoms of RLS.

A 2001 French-Canadian study of 25 family members, including 14 mem-

bers with RLS, suggests an autosomal recessive mode of inheritance. According to the RLS Foundation, there is a high prevalence of RLS in those with Multiple Sclerosis.

Internationally, the prevalence of RLS is estimated at 2-15% of the general population, according to several limited studies.