



Charley Horses and Nocturnal Leg Cramps

Charley horses or muscle cramps are involuntary muscle spasms that contract one or more muscles. Likely to occur at any age, these intense cramps are most prevalent for the unsuspecting 60+ year old whom is jolted awake from sleep. Studies show those afflicted include 1/3 of individuals over the age of 60 and 1/2 of those over 80. Muscle cramps can last for a few seconds up to a whole day. While a common occurrence, there is no one common answer to the cause. If nocturnal leg cramps are severely affecting your sleep quality, visit your doctor to help identify if one of the many conditions below could be the cause.

Endocrine System

Diabetes, Hypothyroidism

Neurological

Neuropathy, Parkinson's Disease, Multiple Sclerosis, Sleep Apnea, pinched nerve, spinal cord injury, other nerve disturbances

Deficiencies in the Body

Dehydration, Hormone Imbalance, Electrolyte Imbalances (i.e., low Potassium, low Magnesium, low Sodium, etc.)

Other Physical Factors

Poor circulation, muscle fatigue, muscle tightness, flat feet, sitting for long periods of time

Medications

Statins (for high cholesterol), Ace Inhibitors (for high blood pressure), Diuretics, Asthma, Osteoporosis, Alzheimer's

How Does a Muscle Cramp Form?

The brain sends electric impulses via nerve pathways to muscle cells using electrolytes; sodium, potassium, calcium and magnesium are examples of electrolytes. These electric impulses turn into energy to make the muscles move. When the wrong signal is sent, or an electrolyte imbalance exists, or any other condition exists (as noted above), the muscle responds improperly and begins to spasm.

Prevention of Nocturnal Cramps

During the Morning and Daytime

- Stay hydrated—Drink 8 glasses of water daily
- Speak with your doctor about:
 - Vitamin E (alpha-tocopheryl acetate)
 - Vitamin B complex (B-1, B5, B-6)
 - Calcium
 - Magnesium
 - Potassium
- Wear properly fitting shoes
- Exercise (drink water and stretch during this time)

Before Bedtime

- Perform light physical activity to get your blood flowing (i.e., walk around your home)
- Stretch the offending muscles
- Massage magnesium oil or spray onto the offending muscles
- Keep blankets loose around feet while sleeping

Treatment of Cramps in the Moment

- Stand up and stretch
- Walk around and wiggle muscles
- Massage cramps lengthwise
- Apply heat during the cramp and ice after
- Drink water

Can a CPAP Machine Help?

A study revealed participants with Obstructive Sleep Apnea who were treated with a CPAP machine had less nocturnal leg cramps. When participants stopped using the CPAP, their leg cramps returned.

Obstructive Sleep Apnea is a sleep disorder which causes breathing to repeatedly stop and start during sleep. By means of wearing a breathing appliance, a Continuous Positive Airway Pressure (CPAP) machine keep upper airway passages open through constant gentle air pressure.