



Peripheral Arterial Disease

Peripheral Arterial Disease

Edited by DR. KELLIE R. BROWN

PAD is a chronic disease in which plaque builds up in the arteries to the legs. This buildup typically occurs gradually. If allowed to progress, blood flow in that artery can become limited or blocked all together.

PAD is relatively common, affecting more than 10 million people in the U.S. It is more common in people who are 65 or older, but can occur at nearly any age. Smoking; high blood pressure; high cholesterol or triglycerides; diabetes; kidney failure; and obesity increase your risk for PAD.

PERIPHERAL ARTERIAL DISEASE (PAD)

YOUR VASCULAR HEALTH

What is PERIPHERAL ARTERIAL DISEASE?

You probably are familiar with the terms angina and heart attack, which are related to a blockage of blood flow to the heart. That same sort of blockage can occur elsewhere in the body, depriving the limbs (the peripheral parts of the body) of oxygen and nutrients. Left untreated, the disease can lead to amputation.

Healthy peripheral arteries are smooth and unobstructed, allowing blood to freely provide the legs with oxygen, glucose and other nutrients. As we age, peripheral arteries build up plaque, a sticky substance made up mostly of fat and cholesterol. Plaque narrows the passageway within the arteries and causes them to become stiff.

A moderate blockage in one of arteries in a major leg muscle, such as the calf or thigh, can cause pain when walking. This pain can be temporarily decreased with rest, but will act up again with more walking or activity.

Lower extremity pain, similar to angina, is called claudication by medical providers. The pain itself is not limb-threatening but it is a sign that the person should make lifestyle changes and see a doctor. Examples of possible treatments include: smoking cessation, daily exercise and medical management.

If the disease becomes more severe, the limb can be starved of basic nutrients and the patient begins to suffer pain at rest (especially at night). Sores that won't heal may develop on the feet. This is a very concerning sign for losing toes or even amputation of the leg. An urgent referral to a vascular surgeon is necessary to prevent limb loss in this situation.



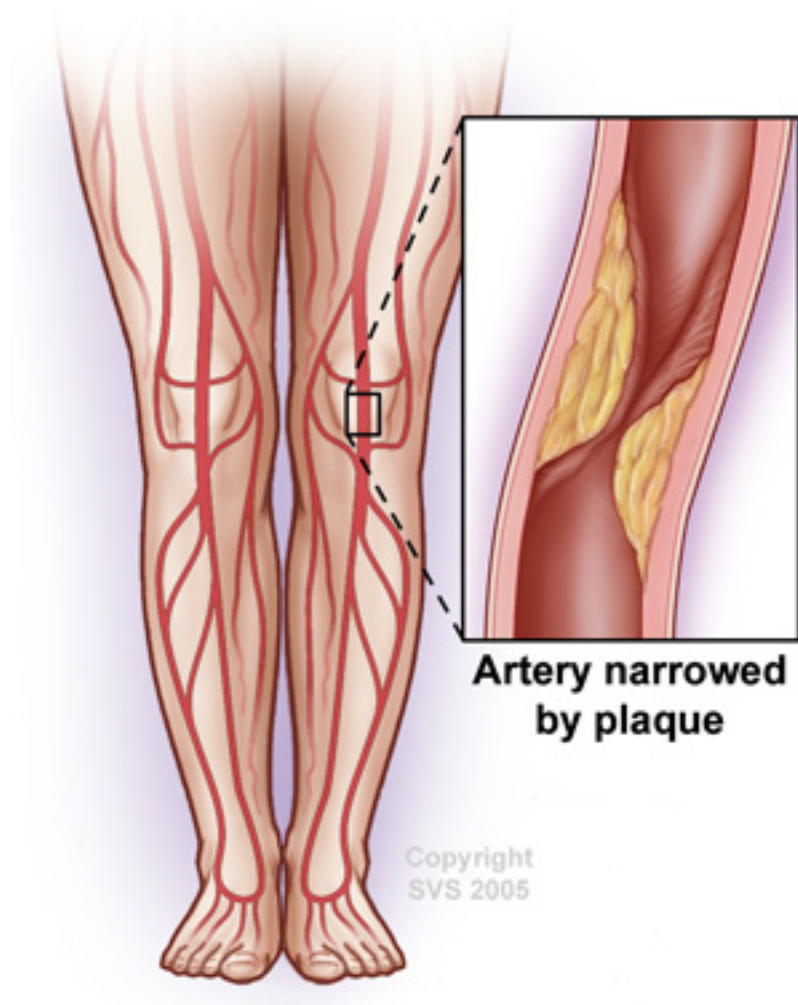
SVS Society for Vascular Surgery SVS Foundation

For more information visit [Vascular.org](https://vascular.org)
Copyright © 2018, Society for Vascular Surgery. All rights reserved.

Download the PAD flier

Find a vascular specialist near you

Symptoms



MAY HIDE

Many patients experience no symptoms.

FATIGUE OR CRAMPING OF MUSCLES WHILE WALKING

Fatigue or cramping of your muscles (claudication) in the calf, thigh, hip, or buttock may signal you have PADs. Typically the discomfort is felt after walking a certain distance and goes away with rest.

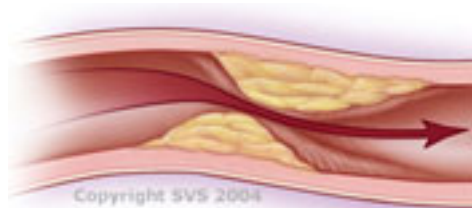
PAIN IN TOES OR FEET WHILE RESTING

If you have pain in your toes or feet while resting, you may have an advancing case of PAD.

OPEN WOUND ON TOES OR FEET

An open wound or ulcer on your toes or feet, often at a pressure point on the foot, can signal a serious case of PAD. An ulcer can progress to gangrene. These symptoms require immediate medical attention.

Causes



The causes of PAD include smoking, high cholesterol or high triglycerides, high blood pressure, diabetes, kidney failure, and obesity. Genetic factors also play a role, but are not well understood.

Diagnosis

SEE A VASCULAR SURGEON

You will be asked questions about symptoms and medical history, including questions about family members. The vascular surgeon will also perform a physical exam.

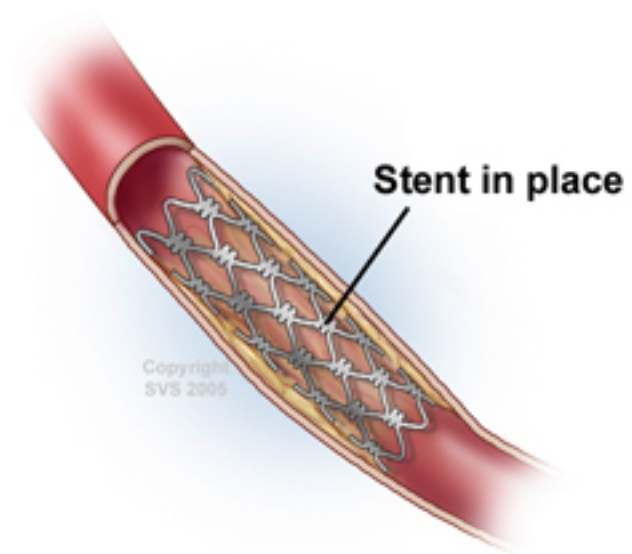
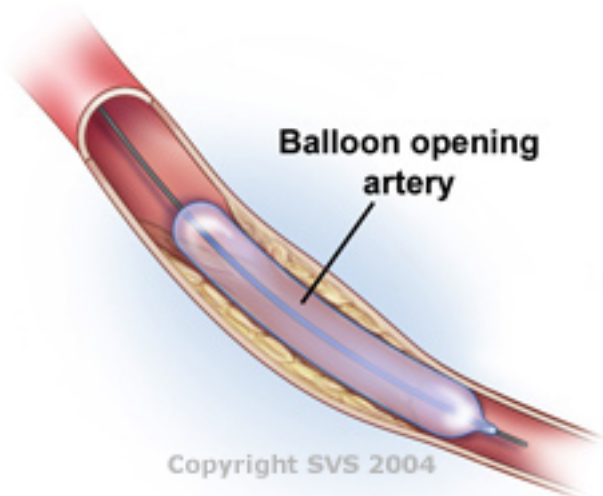
TESTS MAY BE RECOMMENDED

- An initial diagnostic test for PAD is the ankle brachial index (ABI) . The test involves taking a blood pressure reading at the ankle and comparing it to that in the arm.
- Typically an angiogram is done to determine where the in the arteries plaque has built up to assess treatment options. This can be done using a CT or MRI, or possibly by doing a catheter-directed angiogram, which involves placing a thin tube into the artery and injecting dye into the arteries to see where the blockages are located.

Treatments

PAD is usually treated by aggressively managing the risk factors with lifestyle changes and medication. This includes quitting smoking, controlling blood pressure and cholesterol, controlling diabetes, and losing weight. In addition, an exercise program, if followed faithfully, can significantly improve the symptoms of PAD in many cases.

If PAD is causing serious symptoms, further treatments such as balloon angioplasty, stent placement, or surgical bypass can be very effective in improving the blood flow to the affected leg.



Staying Healthy

- Avoid tobacco use. If you smoke, ask your vascular surgeon to help you find a smoking cessation program that will work for you.
- Exercise regularly.
- Take prescribed medications as recommended to control high blood pressure, high cholesterol or triglycerides, diabetes, and kidney failure.
- Lose weight to decrease the amount of work your muscles need to do when you walk.
- Eat a balanced, low-sodium, low-fat diet.

Resources

Peripheral Arterial Disease

Published on Society for Vascular Surgery (<https://vascular.org>)

Vascular Cures - Peripheral Artery Disease

PAD Resources, Links for Physicians, Videos and More

Diabetic Vascular Problems

Find a vascular specialist near you