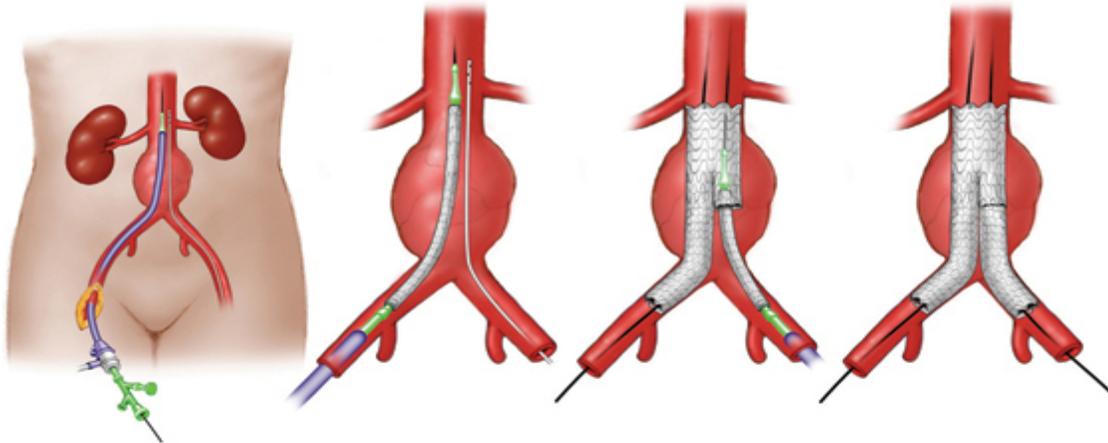
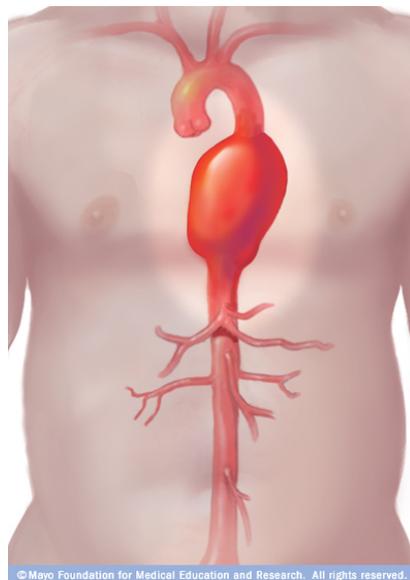


VASCULAR SURGERY & CONDITIONS

- **Abdominal Aortic Aneurysm (AAA) including endovascular repair (minimally invasive)**
 - An AAA is a dilatation of the abdominal aorta. High blood pressure, high cholesterol and smoking can weaken the walls of the aorta and cause enlargement. Endovascular repair is minimally invasive and excludes the AAA. This reduces the risk of AAA rupture and death.

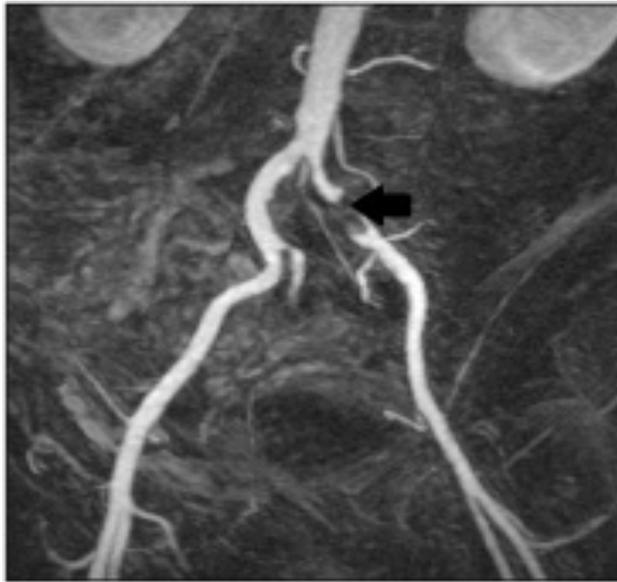


- **Thoracic Aortic Aneurysm**
 - A Thoracic Aortic Aneurysm is a dilatation of the thoracic aorta. Medical conditions, such as high blood pressure and high cholesterol, can weaken the walls of the aorta and cause enlargement.



- **Aorto-iliac Occlusive Disease**

- If after walking a short distance you start feeling pain or cramping in your buttocks, thighs or calves; if you have a history of diabetes, hypertension, high cholesterol, smoking, ulcers, and/or non-healing wounds in your feet, ankles or toes.

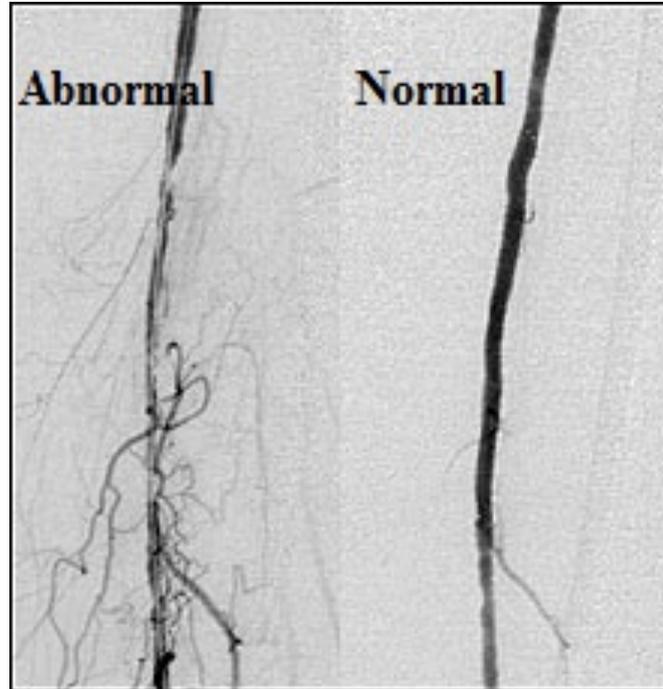


- **Mesenteric Ischemia**

- A chronic condition caused by poor blood supply to your intestines. It results from narrowing in one or more of the arteries supplying blood to your intestines (visceral arteries). It also can occur suddenly as a result of a blood clot severely restricting blood flow (acute mesenteric ischemia). Lack of oxygen-rich blood can permanently damage your intestines. You may experience sudden abdominal pain and, less often, bloody stools. This situation requires immediate medical care. Chronic mesenteric ischemia occurs gradually as the main visceral arteries narrow. You may develop pain after eating, lose weight or develop a fear of eating caused by fear of stomach pain.

- **Lower Extremity Arterial Disease**

- If after walking a short distance you start feeling pain or cramping in your buttocks, thighs or calves; if you have a history of diabetes, hypertension, high cholesterol, smoking, ulcers, and/or non-healing wounds in your feet, ankles or toes.



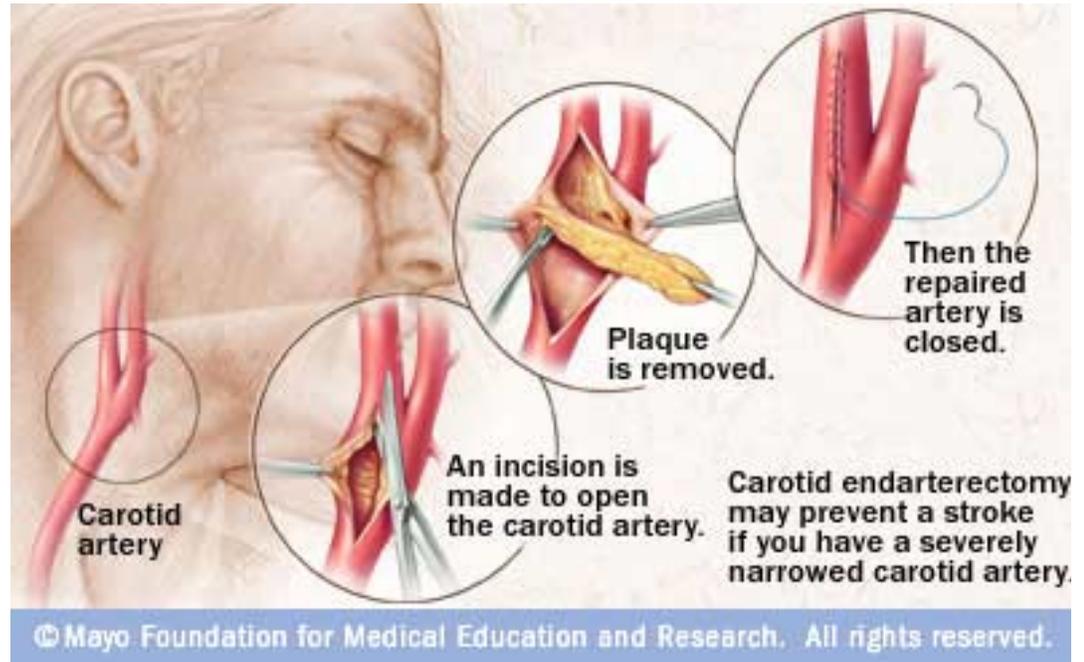
- **Upper Extremity Arterial Disease**

- Pain and cramping in your arms with movement, brachial blood pressures are different by 20 mmHg or more; if you have a history of diabetes, hypertension, high cholesterol, smoking, ulcers, and/or non-healing wounds in your hands, wrists, and fingers.



- **Carotid Artery Disease including transient ischemic attacks (TIAs) and carotid artery endarterectomy (CEA) for stroke prevention**

- If you are experiencing any dizziness, sudden vision changes, weakness on one side or the other, facial droop, or changes in speech; if you have a history of peripheral arterial disease (PAD), stroke, TIA or heart attack.



- **Claudication**

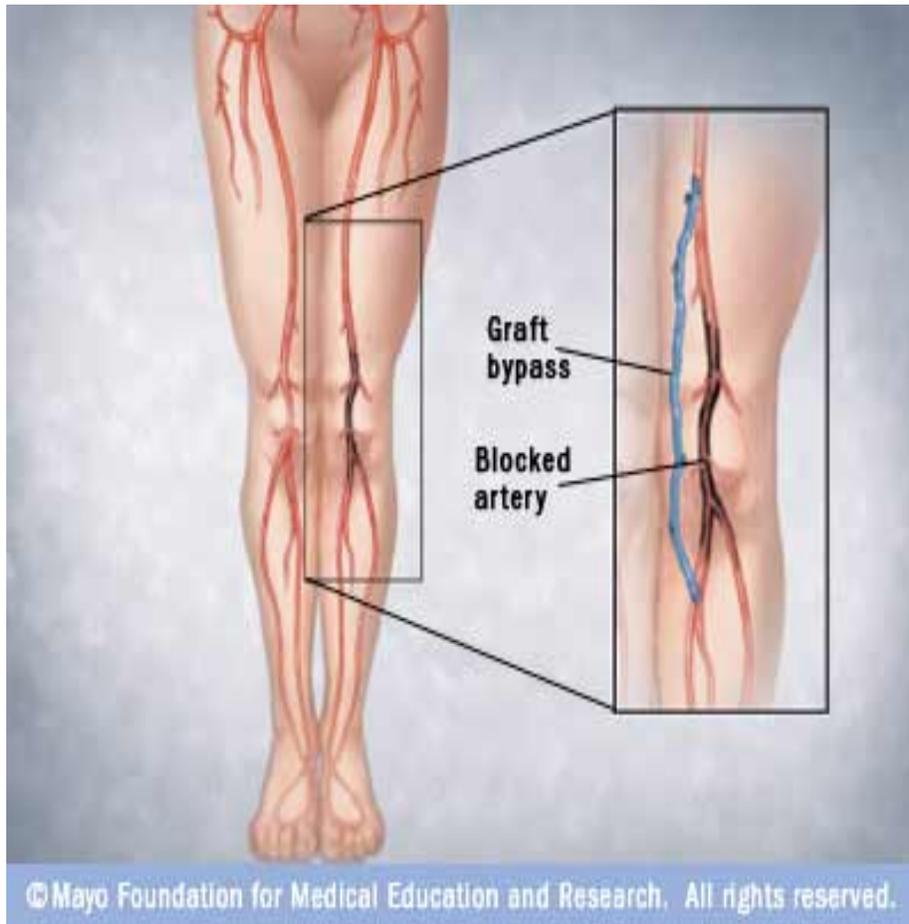
- Pain and/or cramping in the lower leg due to inadequate blood flow to the muscles. The pain usually causes the person to limp. The word "claudication" comes from the Latin "claudicare" meaning to limp. Claudication typically is felt while walking, and subsides with rest. It is commonly referred to as "intermittent" claudication because it comes and goes with exertion and rest.

- **Rest Pain**

- Pain and/or cramping at rest, mostly at night, that is relieved by "dangling" the limb off the edge of the bed.

- **Peripheral Arterial Bypass Graft**

- Bypass grafts are used to bypass an artery that is severely diseased, occluded, or aneurysmal in order to increase blood flow distally. This may be performed for claudication, rest pain, dialysis access steal syndrome, ulcers, gangrene, and/or limb salvage in both the upper and lower extremities.



- **Dialysis Access: Fistula or Graft**

- Dialysis replaces many of the kidney's important functions. A special machine is used to filter harmful wastes, salt, and excess fluid from your blood. This restores the blood to a normal, healthy balance. To do this, an artery and vein need to be connected either by a natural fistula or a synthetic graft, usually in the arm, to allow dialysis needles to be inserted to cleanse the blood.



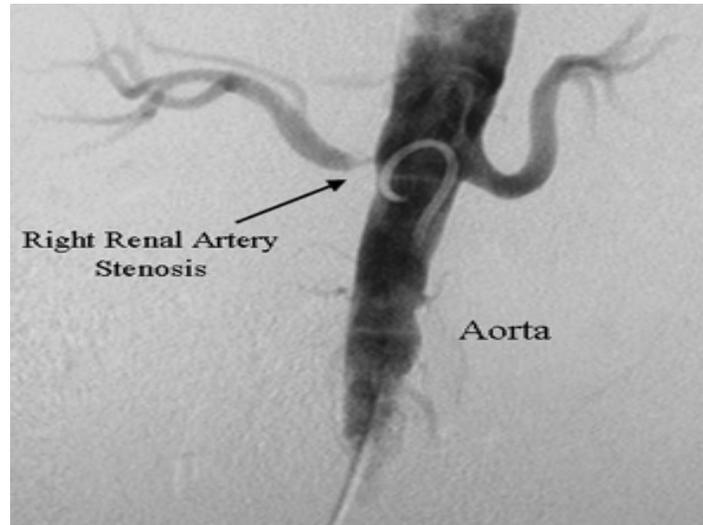
- **Peripheral Aneurysms**

- Aneurysms are a dilatation of a blood vessel's walls. They can occur anywhere in the body and may also be found in veins.



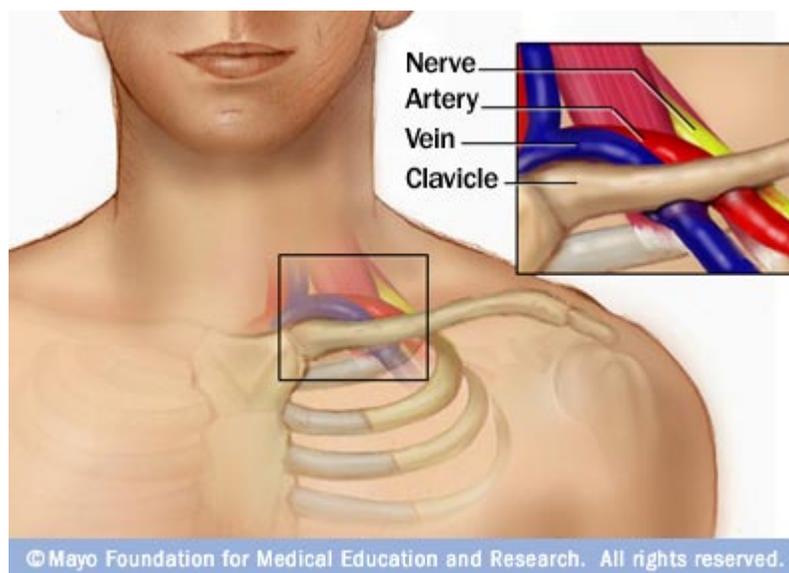
- **Renovascular Arterial Disease**

- Uncontrollable and/or difficult to control hypertension, or high blood pressure, may be caused by atherosclerotic disease of the arteries that feed the kidneys, or renal arteries. Symptoms and signs can include a whooshing sound in your abdomen that your physician hears through a stethoscope, decreased kidney function, congestive heart failure or, eventually, a small shrunken kidney.



- **Thoracic Outlet Syndrome (TOS)**

- Positional arm pain, discomfort, numbness, and tingling. Symptoms may be caused by the subclavian artery, vein, or nerve being compressed between the clavicle and the first rib in certain positions, which may cause a restriction of blood flow or nerve pain. Common causes of thoracic outlet syndrome include physical trauma from a car accident, repetitive injuries from job- or sports-related activities, certain anatomical defects (such as having an extra rib), and pregnancy. Sometimes doctors can't determine the cause of thoracic outlet syndrome.



- **Raynaud's Syndrome / Phenomena**

- A condition that causes some areas of your body - such as your fingers, toes, the tip of your nose and your ears - to feel numb and cool in response to cold temperatures or stress. In Raynaud's, smaller arteries that supply blood to your skin narrow, limiting blood circulation to affected areas. Women are more likely to have Raynaud's. It's also more common in people who live in colder climates. Treatment of Raynaud's depends on its severity and whether you have any other health conditions. For most people, Raynaud's is more a nuisance than a disability.



- **Varicose Veins & Venous Insufficiency**

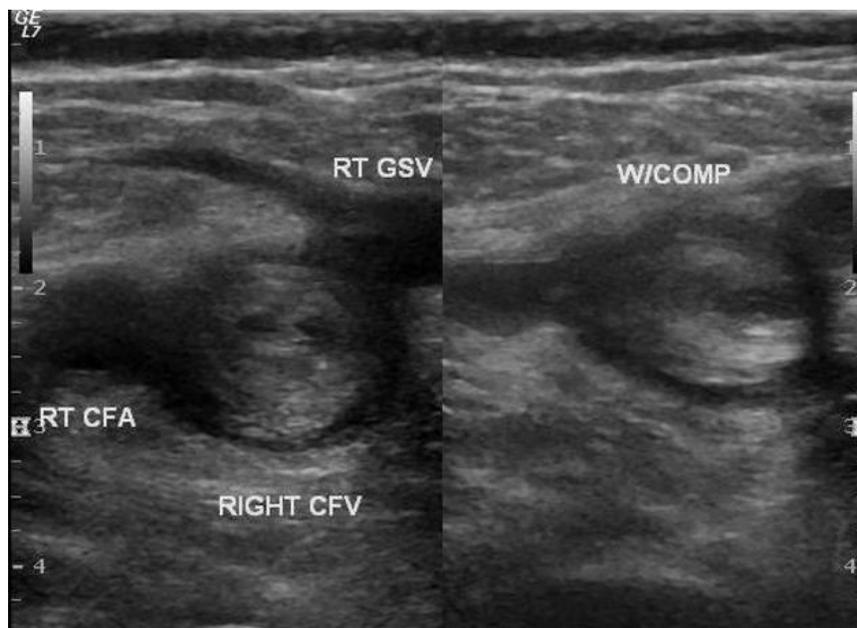
- Varicose veins are gnarled, enlarged veins. Any vein may become varicose, but the veins most commonly affected are those in your legs and feet. That's because standing and walking upright increases the pressure in the veins of your lower body. For many people, varicose veins and spider veins - a common, mild variation of varicose veins - are simply a cosmetic concern. For other people, varicose veins can cause aching pain and discomfort. Sometimes varicose veins lead to more serious problems, such as chronic venous insufficiency or blood clots. Varicose veins may also signal a higher risk of other circulatory problems. Treatment may involve self-care measures, compression therapy, and/or procedures to close or remove veins.



- **Lymphedema:** Lymphedema is caused by a blockage in your lymphatic system, an important part of your immune and circulatory systems. The blockage prevents lymph fluid from draining well, and as the fluid builds up, the swelling continues. Swelling generally occurs in one of your arms or legs. Although lymphedema tends to affect just one arm or leg, sometimes both arms and/or both legs may be swollen. There's no cure for lymphedema, but it can be controlled. Controlling lymphedema involves diligent care of your affected limb.

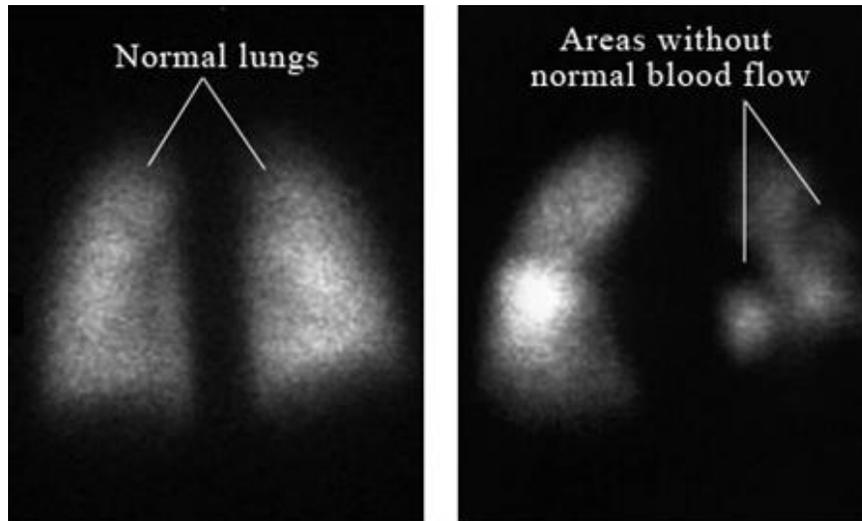


- **Deep Vein Thrombosis (DVT):**
 - Blood clots can affect the deep veins in the lower and upper extremities. It typically causes sudden swelling and pain of the affected limb and may be experienced after a long car or plane trip.



- **Pulmonary Embolism (PE)**

- PE is a blockage in one or more arteries in your lungs. In most cases, PE is caused by blood clots that travel to your lungs from another part of your body - most commonly your legs. PE is a complication of deep vein thrombosis (DVT). Common signs and symptoms include sudden and unexplained shortness of breath, chest pain and a cough that may bring up blood-tinged sputum. PE can be life-threatening, but immediate treatment with anti-clotting medications can greatly reduce the risk of death. Taking measures to prevent blood clots in your legs also can help protect you against PE.



- **Diabetes**

- Describes a group of metabolic diseases in which the person has high blood glucose (blood sugar), either because insulin production is inadequate, or because the body's cells do not respond properly to insulin, or both. Patients with high blood sugar will typically experience polyuria (frequent urination), they will become increasingly thirsty (polydipsia) and hungry (polyphagia). Diabetics may experience peripheral neuropathy, kidney disease and failure, and small vessel disease in the upper and lower extremities.

- **Hyperlipidemia**

- Increased lipids in the blood stream, or high cholesterol, that is usually controlled by diet or medication. Uncontrolled hyperlipidemia is a risk factor for vascular disease. A simple blood test can tell your physician if you have high cholesterol. Talk to your primary care provider if you have a familial history of high cholesterol or believe that you may be at risk.

- **Anterior Approach for Spinal Cases**

- Minimally invasive. In many ways, the anterior approach is an ideal technique for gaining access to the disc space in the lumbar spine with minimal risks or unwanted after effects for the patient. The anterior approach (from the front-through the abdomen) allows the surgeon to completely remove the painful degenerative disc while restoring the disc to its native disc height, put in a bone graft in the intervertebral disc space which allows for increased surgical area for the fusion; placing bone anteriorly puts it into compression, and a bone in compression tends to fuse better, and indirectly decompresses the nerve roots exiting the spinal canal in the foramen by distracting (opening up) the disc space.