ANGINA

What is it: Angina is a symptom of an underlying heart problem, usually coronary heart disease (CHD). It produces chest pain or discomfort which is felt when there is not enough blood flow to the heart muscle. There are 3 main types of angina: Stable, Unstable, Variant.

Stable angina is the most common type and occurs when the heart is working harder than usual, like when the patient is exercising, walking upstairs or walking. Other factors, such as emotional stress, cold temperatures, heavy meals and smoking will also narrow blood vessels and can trigger an episode of angina. Stable angina usually goes away with rest and/or medications.

Unstable angina is the most dangerous type, there is no pattern to when the symptoms will present and it does not go away with rest and/or medication. It can result from plaques that break free and cause a clot that further decreases blood flow to the heart. Unstable angina could be a sign that you may have a heart attack soon. Unstable angina should be evaluated immediately to prevent a heart attack.

Variant angina is the rarest of three. It is also called Prinzmetal's angina. Variant angina is caused by a spasm in the coronary artery causing it to temporarily narrow which reduces the amount of blood flowing through the artery. This type of angina can occur when the patient is at rest and is helped by medications.

It is important to remember that not all chest pain is angina and patients should always follow up with their health care provider.

Who is at risk: Factors that put patients at risk for angina include:

- High cholesterol levels
- High blood pressure
- Smoking
- Diabetes
- Overweight or obesity
- Metabolic syndrome
- Lack of physical activity
- Unhealthy diet
- Older age. (The risk increases for men after 45 years of age and for women after 55 years of age.)
- Family history of early heart disease

Cause: Angina usually is a symptom of coronary heart disease (CHD). This means that the underlying causes of angina generally are the same as the underlying causes of CHD. Research suggests that CHD starts when certain factors damage the inner layers of the coronary arteries. These factors include:

- Smoking
- High levels of fat and cholesterol in the blood
- High blood pressure
- Diabetes or insulin resistance

Symptoms: The symptoms of angina can vary depending on the type of angina the patient has. Stable angina may feel like chest pain that spreads to the arms, back or other areas, it may feel like indigestion or gas. Stable angina occurs when the heart is working harder than normal, such as when the patient is exercising or performing other physical exertion. The pain lasts a short time, five minutes or less and normally goes away with rest and/or medication. Unstable angina most often occurs at rest or when the patient is sleeping. This type of angina lasts longer than stable angina, it can last as long as 30 minutes. Rest and/or medication may not relieve the chest pain and the pain can get worse over time. Unstable angina may be an indication that the patient will have a heart attack soon. Variant angina normally occurs during rest and while the pain tends to be severe, it is usually relieved by medication. All types of angina can be described as pain, pressure, squeezing or tightness in the chest area or behind the breastbone. Some patients complain of nausea, fatigue, shortness of breath, sweating, lightheadedness or weakness also. Because these symptoms may be indicative of a heart attack, chest pain that lasts for longer than a few minutes and is not relieved by rest or medications should be evaluated by a physician.

How is it diagnosed: To diagnose chest pain as stable or unstable angina, your doctor will do a physical exam, ask about your symptoms, and ask about your risk factors for and your family history of CHD or other heart diseases. Diagnostic procedures include an EKG, Stress Test, Chest X-Ray, Cardiac Catheterization, Angiography. The doctor will also want to run blood tests to determine the patient's cholesterol, triglycerides, glucose and C-Reactive proteins all of which, if abnormal, can indicate Coronary Heart Disease.

Complications: The most dangerous complication of angina is a heart attack.

Treatment: Treatment for angina are targeted at relieving the pain and can include lifestyle changes, medications, medical procedures and cardiac rehab. The physician will work with the patient to reduce their personal risk factors for CHD which will reduce the symptoms of angina. Some lifestyle changes may include reducing physical exertion by slowing down or taking rest breaks if the patient feels discomfort; avoiding large meals; reduce stress and quit smoking. Medications commonly prescribed for angina include Nitrates, which relax and widen blood vessels and reduce the hearts workload. Beta Blockers, calcium channel blockers, ACE inhibitors, antiplatelet medications and blood thinners are also prescribed. These medications help by lowering blood pressure and cholesterol levels, slowing the heart rate, relaxing blood vessels, reducing the strain on the heart and preventing blood clots.

Did you know? Over 7 million people in the United States suffer from angina. It occurs equally among men and women (https://www.gbhealthwatch.com/angina-details.php). It is

important to repeat that any chest pain that lasts longer than a few minutes and is not relieved by rest or medications should be evaluated immediately by a physician.

Sources:

Mayoclinic.com

Medlineplus.gov

www.gbhealthwatch.com