## February 2018- American Heart Month

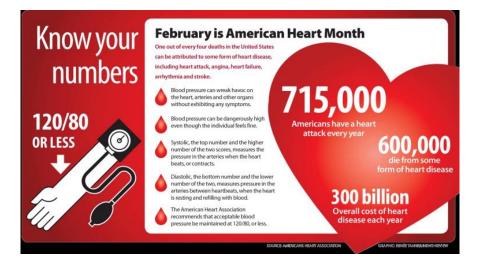
A note from the author-

Hello NCP friends and family! This month, we are celebrating one of the most popular and well-known health observances.. American Heart Month! With everyone's "New Year's Resolutions" still fresh in mind, what better subject to feature than living a heart healthy life? Heart disease is the leading cause of death for men and women in the United States. Every year, 1 in 4 deaths are caused by heart disease. This month, read more about heart disease below to lessen your risk for disease, and boost your healthy lifestyle choices this month!



#### The Impact of Heart Disease

Heart disease is the leading cause of death for men and women. While Americans of all backgrounds can be at risk for heart disease, African American men, especially those who live in the southeast region of the United States, are at the highest risk for heart disease. Additionally, more than 40 percent of African Americans have high blood pressure, a leading cause of heart disease and stroke.<sup>3</sup> That's why this February during American Heart Month, Million Hearts® is encouraging African American men to take charge of their health and start one new, heart-healthy behavior that can help reduce their risk of heart disease and stroke.



# American Heart Month- The Good News

Heart disease can often be prevented when people make healthy choices and manage their health conditions. Communities, health professionals, and families can work together to create opportunities for people to make healthier choices.

Make a difference in your community: Spread the word about strategies for preventing heart disease and encourage people to live heart healthy lives.

# How can American Heart Month make a difference?

We can use this month to raise awareness about heart disease and how people can prevent it — both at home and in the community.

Here are just a few ideas:

- Encourage families to make small changes, like using spices to season their food instead of salt.
- Motivate teachers and administrators to make physical activity a part of the school day. This can help students start good habits early.
- Ask doctors and nurses to be leaders in their communities by speaking out about ways to prevent heart disease.
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# How can I help spread the word?

We've made it easier for you to make a difference. This toolkit is full of ideas to help you take action today. For example:

- Add information about living a heart healthy lifestyle to your newsletter.
- Tweet about American Heart Month.
- Host a community event where families can be active while learning about local health resources.
- Take action: Be the cure! Join the American Heart Association's national movement in support of healthier communities and healthier lives.

# What is "Heart Disease"?

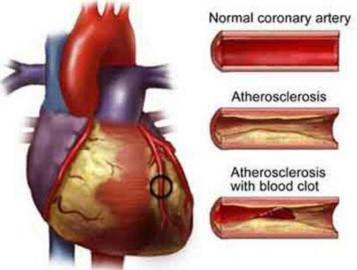
The majority of patients with "heart disease" suffer from blockages around their heart, known as "Coronary Artery Disease". Coronary heart disease (CHD) is a disease in which a waxy substance called plaque builds up inside the coronary arteries. These arteries supply oxygen-rich blood to your heart muscle.

When plaque builds up in the arteries, the condition is called atherosclerosis. The buildup of plaque occurs over many years.

### Atherosclerosis

Over time, plaque can harden or rupture (break open). Hardened plaque narrows the coronary arteries and reduces the flow of oxygen-rich blood to the heart.

If the plaque ruptures, a blood clot can form on its surface. A large blood clot can mostly or completely block blood flow through a coronary artery. Over time, ruptured plaque also hardens and narrows the coronary arteries.



#### **Coronary Artery Disease**

If the flow of oxygen-rich blood to your heart muscle is reduced or blocked, angina or a heart attack can occur.

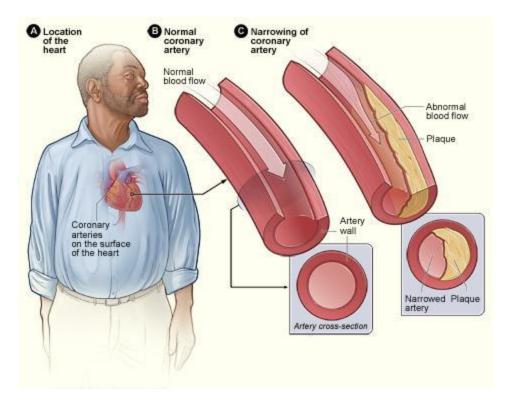
Angina is chest pain or discomfort. It may feel like pressure or squeezing in your chest. The pain also can occur in your shoulders, arms, neck, jaw, or back. Angina pain may even feel like indigestion.

A heart attack occurs if the flow of oxygen-rich blood to a section of heart muscle is cut off. If blood flow isn't restored quickly, the section of heart muscle begins to die. Without quick treatment, a heart attack can lead to serious health problems or death.

Over time, CHD can weaken the heart muscle and lead to heart failure and arrhythmias. Heart failure is a condition in which your heart can't pump enough blood to meet your body's needs. Arrhythmias are problems with the rate or rhythm of the heartbeat.

## Outlook

Lifestyle changes, medicines, and medical procedures can help prevent or treat coronary heart disease. These treatments may reduce the risk of related health problems.



# What Causes Heart Disease?

Research suggests that coronary heart disease (CHD) starts when certain factors damage the inner layers of the coronary arteries. These factors include:

- Smoking
- High levels of certain fats and cholesterol in the blood
- High blood pressure
- High levels of sugar in the blood due to insulin resistance or diabetes
- Blood vessel inflammation



Plaque might begin to build up where the arteries are damaged. The buildup of plaque in the coronary arteries may start in childhood.

Over time, plaque can harden or rupture (break open). Hardened plaque narrows the coronary arteries and reduces the flow of oxygen-rich blood to the heart. This can cause angina (chest pain or discomfort).

If the plaque ruptures, blood cell fragments called platelets stick to the site of the injury. They may clump together to form blood clots. Blood clots can further narrow the coronary arteries and worsen angina. If a clot becomes large enough, it can mostly or completely block a coronary artery and cause a heart attack.

#### **Risk Factors for Heart Disease**

In the United States, coronary heart disease (CHD) is a leading cause of death for both men and women. Each year, about 370,000 Americans die from coronary heart disease.

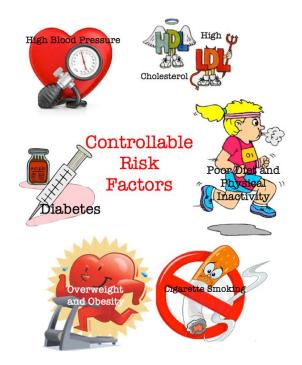
Certain traits, conditions, or habits may raise your risk for CHD. The more risk factors you have, the more likely you are to develop the disease. You can control many risk factors, which may help prevent or delay CHD.



Sources: 'National Heart, Lung, and Blood Institute. (2005). Your guide to a healthy heart, <sup>2</sup> Diabetes Prevention Program Research Group (2002). Reduction in the incidence of type 2 diabetes with lifestyle intervention or metformin. New England Journal of Medicine, (346)6, 393-403.

**Major Risk Factors** 

- Unhealthy blood cholesterol levels. This includes high LDL cholesterol (sometimes called "bad" cholesterol) and low HDL cholesterol (sometimes called "good" cholesterol).
- *High blood pressure*. Blood pressure is considered high if it stays at or above 140/90 mmHg over time. If you have diabetes or chronic kidney disease, high blood pressure is defined as 130/80 mmHg or higher. (The mmHg is millimeters of mercury—the units used to measure blood pressure.)
- *Smoking*. Smoking can damage and tighten blood vessels, lead to unhealthy cholesterol levels, and raise blood pressure. Smoking also can limit how much oxygen reaches the body's tissues.
- *Insulin resistance.* This condition occurs if the body can't use its own insulin properly. Insulin is a hormone that helps move blood sugar into cells where it's used for energy. Insulin resistance may lead to diabetes.
- *Diabetes.* With this disease, the body's blood sugar level is too high because the body doesn't make enough insulin or doesn't use its insulin properly.



- Overweight or obesity. The terms "overweight" and "obesity" refer to body weight that's greater than what is considered healthy for a certain height.
- *Metabolic syndrome*. Metabolic syndrome is the name for a group of risk factors that raises your risk for CHD and other health problems, such as diabetes and stroke.

- Lack of physical activity. Being physically inactive can worsen other risk factors for CHD, such as unhealthy blood cholesterol levels, high blood pressure, diabetes, and overweight or obesity.
- Unhealthy diet. An unhealthy diet can raise your risk for CHD. Foods that are high in saturated and *trans* fats, cholesterol, sodium, and sugar can worsen other risk factors for CHD.
- Older age. Genetic or lifestyle factors cause plaque to build up in your arteries as you age. In men, the risk for coronary heart disease increases starting at age 45. In women, the risk for coronary heart disease increases starting at age 55.
- A family history of early coronary heart disease is a risk factor for developing coronary heart disease, specifically if a father or brother is diagnosed before age 55, or a mother or sister is diagnosed before age 65.

Although older age and a family history of early heart disease are risk factors, it doesn't mean that you'll develop CHD if you have one or both. Controlling other risk factors often can lessen genetic influences and help prevent CHD, even in older adults.

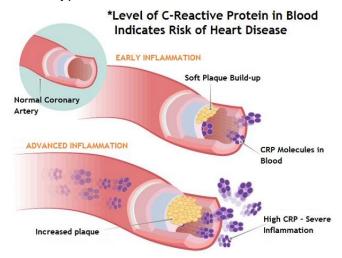
#### **Emerging Risk Factors**

Researchers continue to study other possible risk factors for Coronary Heart Disease.

High levels of a protein called C-reactive protein (CRP) in the blood may raise the risk of CHD and heart attack. High levels of CRP are a sign of inflammation in the body. Inflammation is the body's response to injury or infection. Damage to the arteries' inner walls may trigger inflammation and help plaque grow.

Research is under way to find out whether reducing inflammation and lowering CRP levels also can reduce the risk of CHD and heart attack.

High levels of triglycerides in the blood also may raise the risk of CHD, especially in women. Triglycerides are a type of fat.



## Other Risks Related to Coronary Heart Disease

Other conditions and factors also may contribute to CHD, including:

- Sleep apnea. Sleep apnea is a common disorder in which you have one or more pauses in breathing or shallow breaths while you sleep. Untreated sleep apnea can increase your risk for high blood pressure, diabetes, and even a heart attack or stroke.
- *Stress.* Research shows that the most commonly reported "trigger" for a heart attack is an emotionally upsetting event, especially one involving anger.
- *Alcohol*. Heavy drinking can damage the heart muscle and worsen other CHD risk factors. Men should have no more than two drinks containing alcohol a day. Women should have no more than one drink containing alcohol a day.
- *Preeclampsia*. This condition can occur during pregnancy. The two main signs of preeclampsia are a rise in blood pressure and excess protein in the urine. Preeclampsia is linked to an increased lifetime risk of heart disease, including CHD, heart attack, heart failure, and high blood pressure.

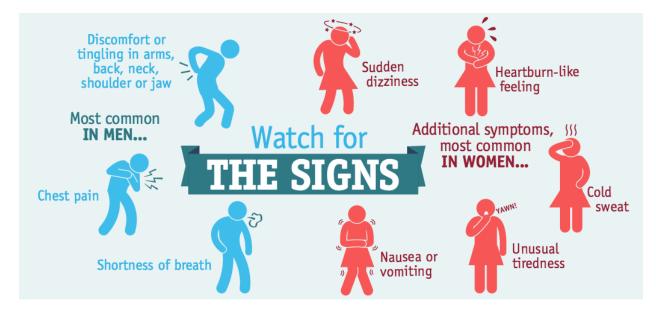


# Signs, Symptoms, and Complications of Heart Disease

A common symptom of coronary heart disease (CHD) is angina. Angina is chest pain or discomfort that occurs if an area of your heart muscle doesn't get enough oxygen-rich blood.

Angina may feel like pressure or squeezing in your chest. You also may feel it in your shoulders, arms, neck, jaw, or back. Angina pain may even feel like indigestion. The pain tends to get worse with activity and go away with rest. Emotional stress also can trigger the pain.

Another common symptom of CHD is shortness of breath. This symptom occurs if CHD causes heart failure. When you have heart failure, your heart can't pump enough blood to meet your body's needs. Fluid builds up in your lungs, making it hard to breathe. The severity of these symptoms varies. They may get more severe as the buildup of plaque continues to narrow the coronary arteries.

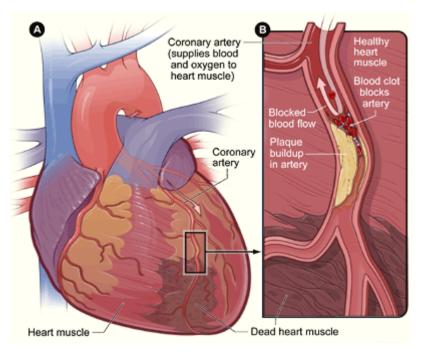


# Signs and Symptoms of Heart Problems Related to Coronary Heart Disease

Some people who have CHD have no signs or symptoms—a condition called silent CHD. The disease might not be diagnosed until a person has signs or symptoms of a heart attack, heart failure, or an arrhythmia (an irregular heartbeat).

# HEART ATTACK

A heart attack occurs if the flow of oxygen-rich blood to a section of heart muscle is cut off. This can happen if an area of plaque in a coronary artery ruptures (breaks open). Blood cell fragments called platelets stick to the site of the injury and may clump together to form blood clots. If a clot becomes large enough, it can mostly or completely block blood flow through a coronary artery. If the blockage isn't treated quickly, the portion of heart muscle fed by the artery begins to die. Healthy heart tissue is replaced with scar tissue. This heart damage may not be obvious, or it may cause severe or long-lasting problems.



HEART WITH MUSCLE DAMAGE AND A BLOCKED ARTERY

The most common heart attack symptom is chest pain or discomfort. Most heart attacks involve discomfort in the center or left side of the chest that often lasts for more than a few minutes or goes away and comes back. The discomfort can feel like uncomfortable pressure, squeezing, fullness, or pain. The feeling can be mild or severe. Heart attack pain sometimes feels like indigestion or heartburn.

The symptoms of angina can be similar to the symptoms of a heart attack. Angina pain usually lasts for only a few minutes and goes away with rest.

Chest pain or discomfort that doesn't go away or changes from its usual pattern (for example, occurs more often or while you're resting) might be a sign of a heart attack. If you don't know whether your chest pain is angina or a heart attack, call 9-1-1. All chest pain should be checked by a doctor.

Other common signs and symptoms of a heart attack include:

- Upper body discomfort in one or both arms, the back, neck, jaw, or upper part of the stomach
- Shortness of breath, which may occur with or before chest discomfort
- Nausea (feeling sick to your stomach), vomiting, light-headedness or fainting, or breaking out in a cold sweat

• Sleep problems, fatigue (tiredness), or lack of energy

## HEART FAILURE

Heart failure is a condition in which your heart can't pump enough blood to meet your body's needs. Heart failure doesn't mean that your heart has stopped or is about to stop working.

The most common signs and symptoms of heart failure are shortness of breath or trouble breathing; fatigue; and swelling in the ankles, feet, legs, stomach, and veins in the neck.

All of these symptoms are the result of fluid buildup in your body. When symptoms start, you may feel tired and short of breath after routine physical effort, like climbing stairs.



## ARRHYTHMIA

An arrhythmia is a problem with the rate or rhythm of the heartbeat. When you have an arrhythmia, you may notice that your heart is skipping beats or beating too fast. Some people describe arrhythmias as a fluttering feeling in the chest. These feelings are called palpitations.

Some arrhythmias can cause your heart to suddenly stop beating. This condition is called sudden cardiac arrest (SCA). SCA usually causes death if it's not treated within minutes.

Normal Heatbeat

Irregular Heartbeat

## **Screening and Prevention**

You can prevent and control coronary heart disease (CHD) by taking action to control your risk factors with heart-healthy lifestyle changes and medicines. Examples of risk factors you can control include high blood cholesterol, high blood pressure, and overweight and obesity. Only a few risk factors—such as age, gender, and family history—can't be controlled.

Your risk for CHD increases with the number of risk factors you have. To reduce your risk of CHD and heart attack, try to control each risk factor you have by adopting the following heart-healthy lifestyles:

- Heart-healthy eating
- Maintaining a healthy weight
- Managing stress
- Physical activity
- Quitting smoking

Know your family history of health problems related to CHD. If you or someone in your family has CHD, be sure to tell your doctor. If lifestyle changes aren't enough, you also may need medicines to control your CHD risk factors.

	Risk factors and solutions f	or managing them
Ŷ	High blood pressure - Make control your goal.	Unhealthy diet - Eat a healthy diet, low in sodium and trans fats and high in fresh fruits
6	High cholesterol – Work with your doctor on a treatment plan to manage your cholesterol.	and vegetables.
24	Diabetes – Work with your doctor on a treatment plan to manage your diabetes.	Physical inactivity – The Surgeon Genera recommends adults engage in moderate- intensity exercise for 2 hours and 30
3	Tobacco use – If you don't smoke, don't start. If you do smoke get help to quit.	minutes every week. Obesity – Work to maintain a healthy weight.

# Small Changes= Big Differences

African American men can make a big difference in their heart health by taking these small steps during the month of February and beyond.

• Schedule a visit with your doctor to talk about heart health. It's important to schedule regular check-ups even if you think you are not sick. Partner with your doctor and health care team to set goals for improving your heart health, and don't be afraid to ask questions and trust their advice.

- Add exercise to your daily routine. Start off the month by walking 15 minutes, 3 times each week. By mid-month, increase your time to 30 minutes, 3 times each week.
- Increase healthy eating. Cook heart-healthy meals at home at least 3 times each week and make your favorite recipe lower sodium. For example, swap out salt for fresh or dried herbs and spices.
- Take steps to quit smoking. If you currently smoke, quitting can cut your risk for heart disease and stroke. Learn more at CDC's Smoking and Tobacco Use website .
- **Take medication as prescribed.** Talk with your doctor about the importance of high blood pressure and cholesterol medications. If you're having trouble taking your medicines on time or if you're having side effects, ask your doctor for help.

#### Move More for Heart Health

Heart disease is the leading cause of death in the United States. Fortunately, it is largely preventable and there are many things people can do to reduce their risk, such as being more active.

Join the NHLBI and its *The Heart Truth*® program this year in encouraging Americans to move more and Move with Heart. You should strive for at least 150 minutes (2 ½ hours) each week of physical activity that gets your heart pumping and leaves you a little breathless. There are flexible ways to break it into amounts of daily activity, and even small amounts add up and can have lasting heart health benefits.



## **Diagnosing Heart Disease**

Your doctor will diagnose coronary heart disease (CHD) based on your medical and family histories, your risk factors for CHD, a physical exam, and the results from tests and procedures. No single test can diagnose CHD. If your doctor thinks you have CHD, he or she may recommend one or more of the following tests.

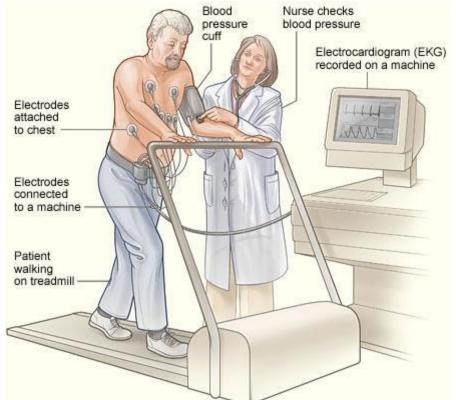
## **EKG (Electrocardiogram)**

An EKG is a simple, painless test that detects and records the heart's electrical activity. The test shows how fast the heart is beating and its rhythm (steady or irregular). An EKG also records the strength and timing of electrical signals as they pass through the heart.

An EKG can show signs of heart damage due to CHD and signs of a previous or current heart attack.

## **Stress Testing**

During stress testing, you exercise to make your heart work hard and beat fast while heart tests are done. If you can't exercise, you may be given medicine to raise your heart rate.



When your heart is working hard and beating fast, it needs more blood and oxygen. Plaque-narrowed arteries can't supply enough oxygen-rich blood to meet your heart's needs.

A stress test can show possible signs and symptoms of CHD, such as:

Abnormal changes in your heart rate or blood pressure

- Shortness of breath or chest pain
- Abnormal changes in your heart rhythm or your heart's electrical activity

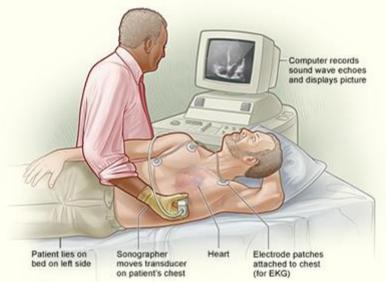
If you can't exercise for as long as what is considered normal for someone your age, your heart may not be getting enough oxygen-rich blood. However, other factors also can prevent you from exercising long enough (for example, lung diseases, anemia, or poor general fitness).

As part of some stress tests, pictures are taken of your heart while you exercise and while you rest. These imaging stress tests can show how well blood is flowing in your heart and how well your heart pumps blood when it beats.

#### Echocardiography

Echocardiography (echo) uses sound waves to create a moving picture of your heart. The picture shows the size and shape of your heart and how well your heart chambers and valves are working.

Echo also can show areas of poor blood flow to the heart, areas of heart muscle that aren't contracting normally, and previous injury to the heart muscle caused by poor blood flow.



## Chest X Ray

A chest x ray takes pictures of the organs and structures inside your chest, such as your heart, lungs, and blood vessels.

A chest x ray can reveal signs of heart failure, as well as lung disorders and other causes of symptoms not related to CHD.

#### **Blood Tests**

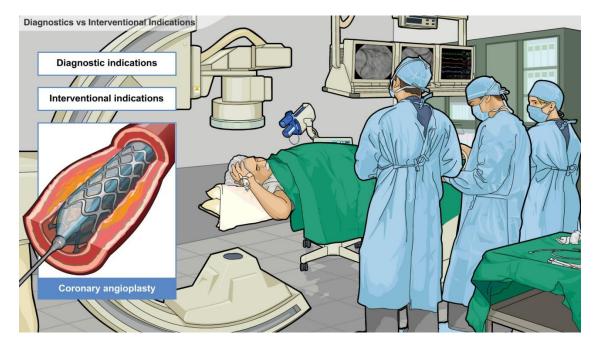
Blood tests check the levels of certain fats, cholesterol, sugar, and proteins in your blood. Abnormal levels might be a sign that you're at risk for CHD.



# **Coronary Angiography and Cardiac Catheterization**

Your doctor may recommend coronary angiography if other tests or factors show that you're likely to have CHD. This test uses dye and special x rays to show the insides of your coronary arteries.

To get the dye into your coronary arteries, your doctor will use a procedure called cardiac catheterization.



A thin, flexible tube called a catheter is put into a blood vessel in your arm, groin (upper thigh), or neck. The tube is threaded into your coronary arteries, and the dye is released into your bloodstream.

Special x rays are taken while the dye is flowing through your coronary arteries. The dye lets your doctor study the flow of blood through your heart and blood vessels. Cardiac catheterization usually is done in a hospital. You're awake during the procedure. It usually causes little or no pain, although you may feel some soreness in the blood vessel where your doctor inserts the catheter.

# A Survivor's Story

After undergoing triple coronary bypass surgery in 1999, Louisiana native, Clarence Ancar made the decision to make his heart health a priority. Before he had surgery, Clarence knew he had high cholesterol but had dismissed his doctor's advice on adopting a healthy lifestyle and taking his medication. Clarence's cardiologist, Dr. Keith C. Ferdinand, taught him that heart disease was not a death sentence and that he could still live a long, healthy life if he committed to making a few changes and respected his heart condition. Working together with his health care team, Clarence developed a plan to start and stay heart healthy.

By setting small, achievable goals and tracking those goals, Clarence made a big and lasting difference in his health. He learned the importance of taking his high blood pressure and cholesterol medications. With the help of a dietitian Dr. Ferdinand referred him to, he started eating less of the fatty, salty, and greasy food and added more fruits and vegetables. He also began walking 2-3 miles each day. After his surgery, Clarence lost a significant amount of weight and kept it off.

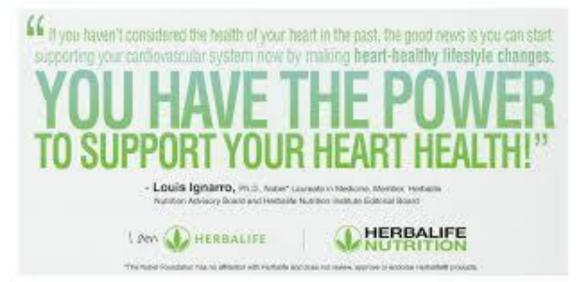
Today, Dr. Ferdinand continues to motivate and support Clarence in his heart health journey. By having a strong and trusting relationship with his doctor, Clarence was able to adopt and maintain a healthy lifestyle. Clarence encourages African American men to be strong and commit to making one heart-healthy lifestyle change during American Heart Month.



# Treatment and Lifestyle Changes

Treatments for coronary heart disease include heart-healthy lifestyle changes, medicines, medical procedures and surgery, and cardiac rehabilitation. Treatment goals may include:

- Lowering the risk of blood clots forming (blood clots can cause a heart attack)
- Preventing complications of coronary heart disease
- Reducing risk factors in an effort to slow, stop, or reverse the buildup of plaque
- Relieving symptoms
- Widening or bypassing clogged arteries



# **Heart-Healthy Lifestyle Changes**

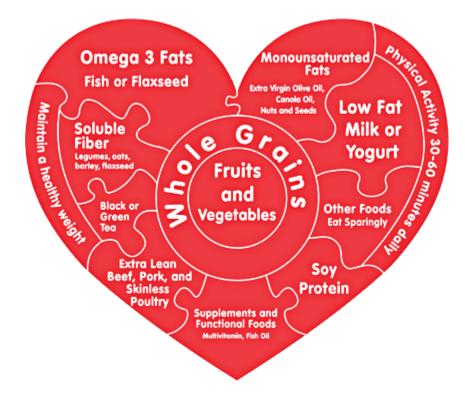
Your doctor may recommend heart-healthy lifestyle changes if you have coronary heart disease. Heart-healthy lifestyle changes include:

- Heart-healthy eating
- Maintaining a healthy weight
- Managing stress
- Physical activity
- Quitting smoking

# Heart-Healthy Eating

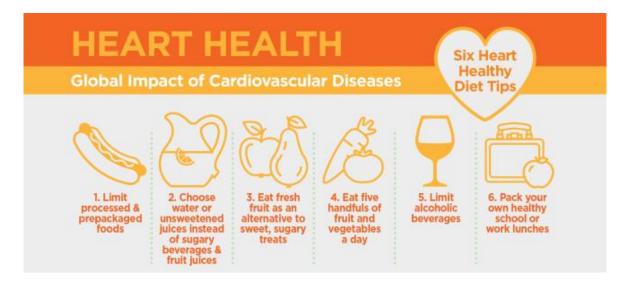
Your doctor may recommend heart-healthy eating, which should include:

- Fat-free or low-fat dairy products, such as fat-free milk
- Fish high in omega-3 fatty acids, such as salmon, tuna, and trout, about twice a week
- Fruits, such as apples, bananas, oranges, pears, and prunes
- Legumes, such as kidney beans, lentils, chickpeas, black-eyed peas, and lima beans
- Vegetables, such as broccoli, cabbage, and carrots
- Whole grains, such as oatmeal, brown rice, and corn tortillas



When following a heart-healthy diet, you should avoid eating:

- A lot of red meat
- Palm and coconut oils
- Sugary foods and beverages Two nutrients in your diet make blood cholesterol levels rise:
- Saturated fat-found mostly in foods that come from animals
- *Trans* fat (*trans* fatty acids)—found in foods made with hydrogenated oils and fats, such as stick margarine; baked goods, such as cookies, cakes, and pies; crackers; frostings; and coffee creamers. Some *trans* fats also occur naturally in animal fats and meats.



Saturated fat raises your blood cholesterol more than anything else in your diet. When you follow a heart-healthy eating plan, only 5 percent to 6 percent of your daily calories should come from saturated fat. Food labels list the amounts of saturated fat. To help you stay on track, here are some examples:

If you eat:	Try to eat no more than:
1,200 calories a day	8 grams of saturated fat a day
1,500 calories a day	10 grams of saturated fat a day
1,800 calories a day	12 grams of saturated fat a day
2,000 calories a day	13 grams of saturated fat a day
2,500 calories a day	17 grams of saturated fat a day

Not all fats are bad. Monounsaturated and polyunsaturated fats actually help lower blood cholesterol levels.

Some sources of monounsaturated and polyunsaturated fats are:

- Avocados
- Corn, sunflower, and soybean oils
- Nuts and seeds, such as walnuts
- Olive, canola, peanut, safflower, and sesame oils
- Peanut butter
- Salmon and trout
- Tofu

# SODIUM

You should try to limit the amount of sodium that you eat. This means choosing and preparing foods that are lower in salt and sodium. Try to use low-sodium and "no added salt" foods and seasonings at the table or while cooking. Food labels tell you what you need to know about choosing foods that are lower in sodium. Try to eat no more than 2,300 milligrams of sodium a day. If you have high blood pressure, you may need to restrict your sodium intake even more.

# DIETARY APPROACHES TO STOP HYPERTENSION

Your doctor may recommend the Dietary Approaches to Stop Hypertension (DASH) eating plan if you have high blood pressure. The DASH eating plan focuses on fruits, vegetables, whole grains, and other foods that are heart healthy and low in fat,

cholesterol, and sodium and salt. The DASH eating plan is a good heart-healthy eating plan, even for those who don't have high blood pressure.

## ALCOHOL

Try to limit alcohol intake. Too much alcohol can raise your blood pressure and triglyceride levels, a type of fat found in the blood. Alcohol also adds extra calories, which may cause weight gain.

Men should have no more than two drinks containing alcohol a day. Women should have no more than one drink containing alcohol a day. One drink is:

- 12 ounces of beer
- 5 ounces of wine
- 1<sup>1</sup>/<sub>2</sub> ounces of liquor

## Maintaining a Healthy Weight

Maintaining a healthy weight is important for overall health and can lower your risk for coronary heart disease. Aim for a healthy weight by following a heart-healthy eating plan and keeping physically active.

Knowing your body mass index (BMI) helps you find out if you're a healthy weight in relation to your height and gives an estimate of your total body fat. To figure out your BMI, check out the National Heart, Lung, and Blood Institute's (NHLBI) online BMI calculator or talk to your doctor. A BMI:

- Below 18.5 is a sign that you are underweight.
- Between 18.5 and 24.9 is in the normal range.
- Between 25 and 29.9 is considered overweight.
- Of 30 or more is considered obese.

A general goal to aim for is a BMI of less than 25. Your doctor or health care provider can help you set an appropriate BMI goal.

Measuring waist circumference helps screen for possible health risks. If most of your fat is around your waist rather than at your hips, you're at a higher risk for heart disease and type 2 diabetes. This risk may be high with a waist size that is greater than 35 inches for women or greater than 40 inches for men.

If you're overweight or obese, try to lose weight. A loss of just 3 percent to 5 percent of your current weight can lower your triglycerides, blood glucose, and the risk of developing type 2 diabetes. Greater amounts of weight loss can improve blood pressure readings, lower LDL cholesterol, and increase HDL cholesterol.

## Managing Stress

Research shows that the most commonly reported "trigger" for a heart attack is an emotionally upsetting event—particularly one involving anger. Also, some of the ways people cope with stress—such as drinking, smoking, or overeating—aren't healthy.

Learning how to manage stress, relax, and cope with problems can improve your emotional and physical health. Consider healthy stress-reducing activities, such as:

- A stress management program
- Meditation
- Physical activity
- Relaxation therapy
- Talking things out with friends or family

## **Physical Activity**

Routine physical activity can lower many coronary heart disease risk factors, including LDL ("bad") cholesterol, high blood pressure, and excess weight. Physical activity also can lower your risk for diabetes and raise your HDL cholesterol level. HDL is the "good" cholesterol that helps prevent coronary heart disease.

Everyone should try to participate in moderate-intensity aerobic exercise at least 2 hours and 30 minutes per week, or vigorous aerobic exercise for 1 hour and 15 minutes per week. Aerobic exercise, such as brisk walking, is any exercise in which your heart beats faster and you use more oxygen than usual. The more active you are, the more you will benefit. Participate in aerobic exercise for at least 10 minutes at a time spread throughout the week.

Talk with your doctor before you start a new exercise plan. Ask your doctor how much and what kinds of physical activity are safe for you.



# **Quitting Smoking**

If you smoke, quit. Smoking can raise your risk for coronary heart disease and heart attack and worsen other coronary heart disease risk factors. Talk with your doctor about programs and products that can help you quit smoking. Also, try to avoid secondhand smoke.

If you have trouble quitting smoking on your own, consider joining a support group. Many hospitals, workplaces, and community groups offer classes to help people quit smoking.



## **Medicines**

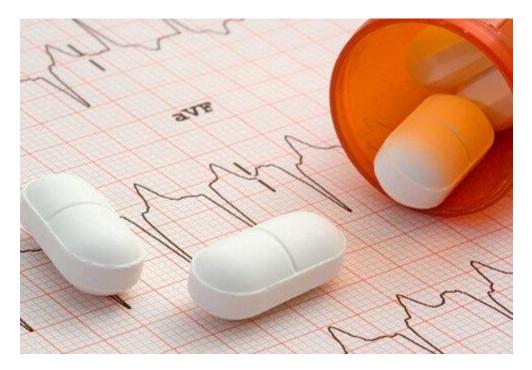
Sometimes lifestyle changes aren't enough to control your blood cholesterol levels. For example, you may need statin medications to control or lower your cholesterol. By lowering your cholesterol level, you can decrease your chance of having a heart attack or stroke. Doctors usually prescribe statins for people who have:

- Coronary heart disease, peripheral artery disease, or had a stroke
- Diabetes
- High LDL cholesterol levels

Doctors may discuss beginning statin treatment with those who have an elevated risk for developing heart disease or having a stroke.

Your doctor also may prescribe other medications to:

- Decrease your chance of having a heart attack or dying suddenly.
- Lower your blood pressure.
- Prevent blood clots, which can lead to heart attack or stroke.
- Prevent or delay the need for a stent or percutaneous coronary intervention (PCI) or surgery, such as coronary artery bypass grafting (CABG).
- Reduce your heart's workload and relieve coronary heart disease symptoms. Take all medicines regularly, as your doctor prescribes. Don't change the amount of your medicine or skip a dose unless your doctor tells you to. You should still follow a heart healthy lifestyle, even if you take medicines to treat your coronary heart disease.

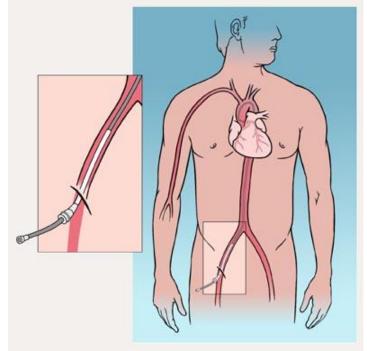


# Medical Procedures and Surgery

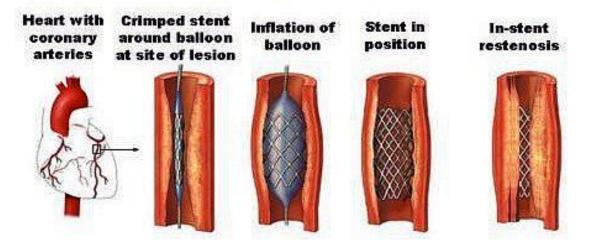
You may need a procedure or surgery to treat coronary heart disease. Both PCI and CABG are used to treat blocked coronary arteries. You and your doctor can discuss which treatment is right for you.

## Percutaneous Coronary Intervention

Percutaneous coronary intervention, commonly known as angioplasty, is a nonsurgical procedure that opens blocked or narrowed coronary arteries. A thin, flexible tube with a balloon or other device on the end is threaded through a blood vessel to the narrowed or blocked coronary artery. Once in place, the balloon is inflated to compress the plaque against the wall of the artery. This restores blood flow through the artery.

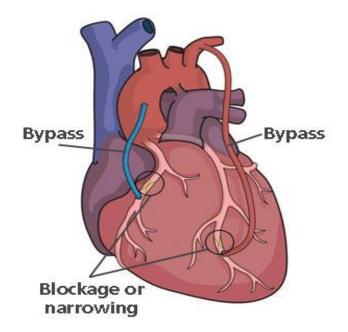


During the procedure, the doctor may put a small mesh tube called a stent in the artery. The stent helps prevent blockages in the artery in the months or years after angioplasty.



## **Coronary Artery Bypass Grafting**

CABG is a type of surgery in which arteries or veins from other areas in your body are used to bypass (that is, go around) your narrowed coronary arteries. CABG can improve blood flow to your heart, relieve chest pain, and possibly prevent a heart attack.



## Cardiac Rehabilitation

Your doctor may prescribe cardiac rehabilitation (rehab) for angina or after CABG, angioplasty, or a heart attack. Nearly everyone who has coronary heart disease can benefit from cardiac rehab. Cardiac rehab is a medically supervised program that may help improve the health and well-being of people who have heart problems.

The cardiac rehab team may include doctors, nurses, exercise specialists, physical and occupational therapists, dietitians or nutritionists, and psychologists or other mental health specialists.

Rehab has two parts:

- Education, counseling, and training. This part of rehab helps you understand your heart condition and find ways to reduce your risk for future heart problems. The rehab team will help you learn how to cope with the stress of adjusting to a new lifestyle and how to deal with your fears about the future.
- Exercise training. This part helps you learn how to exercise safely, strengthen your muscles, and improve your stamina. Your exercise plan will be based on your personal abilities, needs, and interests.

# Living with Heart Disease

Coronary heart disease (CHD) can cause serious complications. However, if you follow your doctor's advice and adopt healthy lifestyle habits, you can prevent or reduce the risk of:

- Dying suddenly from heart problems
- Having a heart attack and damaging your heart muscle
- Damaging your heart because of reduced oxygen supply
- Having arrhythmias (irregular heartbeats)

## **Ongoing Care**

Lifestyle changes and medicines can help control CHD. Lifestyle changes include following a healthy diet, being physically active, maintaining a healthy weight, quitting smoking, and managing stress.

Work closely with your doctor to control your blood pressure and manage your blood cholesterol and blood sugar levels.

A blood test called a lipoprotein panel will measure your cholesterol and triglyceride levels. A fasting blood glucose test will check your blood sugar level and show whether you're at risk for or have diabetes.

These tests show whether your risk factors are controlled, or whether your doctor needs to adjust your treatment for better results.

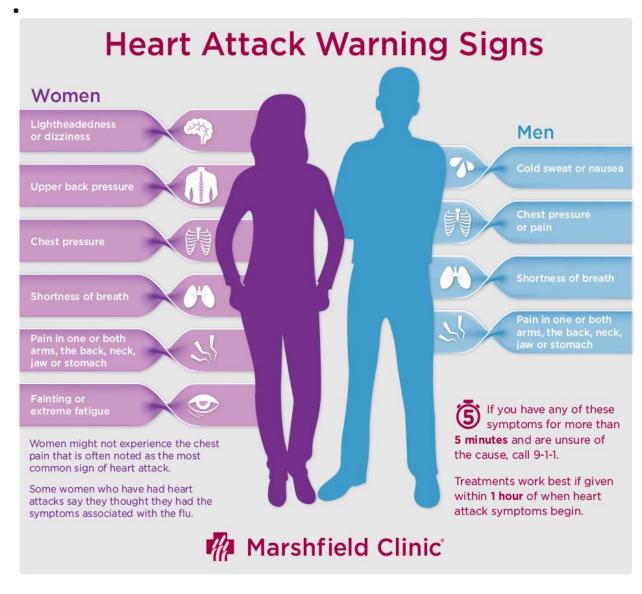
Talk with your doctor about how often you should schedule office visits or blood tests. Between those visits, call your doctor if you have any new symptoms or if your symptoms worsen.



## **Heart Attack Warning Signs**

CHD raises your risk for a heart attack. Learn the signs and symptoms of a heart attack, and call 9–1–1 if you have any of these symptoms:

- Chest pain or discomfort. This involves uncomfortable pressure, squeezing, fullness, or pain in the center or left side of the chest that can be mild or strong. This pain or discomfort often lasts more than a few minutes or goes away and comes back.
- Upper body discomfort in one or both arms, the back, neck, jaw, or upper part of the stomach.
- Shortness of breath, which may occur with or before chest discomfort.
- Nausea (feeling sick to your stomach), vomiting, light-headedness or fainting, or breaking out in a cold sweat.



Symptoms also may include sleep problems, fatigue (tiredness), and lack of energy.

The symptoms of angina can be similar to the symptoms of a heart attack. Angina pain usually lasts for only a few minutes and goes away with rest.

Chest pain or discomfort that doesn't go away or changes from its usual pattern (for example, occurs more often or while you're resting) can be a sign of a heart attack. If you don't know whether your chest pain is angina or a heart attack, call 9-1-1.

Let the people you see regularly know you're at risk for a heart attack. They can seek emergency care for you if you suddenly faint, collapse, or have other severe symptoms.

## **Emotional Issues and Support**

Living with CHD may cause fear, anxiety, depression, and stress. You may worry about heart problems or making lifestyle changes that are necessary for your health.

Talk about how you feel with your health care team. Talking to a professional counselor also can help. If you're very depressed, your doctor may recommend medicines or other treatments that can improve your quality of life.

Joining a patient support group may help you adjust to living with CHD. You can see how other people who have the same symptoms have coped with them. Talk with your doctor about local support groups or check with an area medical center.

Support from family and friends also can help relieve stress and anxiety. Let your loved ones know how you feel and what they can do to help you.



#### **Resources**

https://www.nhlbi.nih.gov/health-topics/education-and-awareness/heart-month https://www.cdc.gov/features/heartmonth/index.html https://millionhearts.hhs.gov/news-media/events/heart-month.html https://healthfinder.gov/NHO/FebruaryToolkit.aspx