



ST. FRANCIS HEALTH MINISTRIES

HIGH BLOOD PRESSURE OVERVIEW

Hypertension is the medical term for high blood pressure. Blood pressure refers to the pressure that blood applies to the inner walls of the arteries. Arteries carry blood from the heart to other organs and parts of the body. Some people may not have symptoms of high blood pressure until they have a heart attack or stroke. Maintaining a healthy blood pressure can lower your chances of having a heart attack or stroke and reduce other undesirable health consequences.

WHAT IS BLOOD PRESSURE?

An individual's blood pressure is defined by two measurements:

- Systolic pressure is the pressure in the arteries produced when the heart contracts (at the time of a heart beat).
- Diastolic pressure is the pressure in the arteries during relaxation of the heart between heartbeats.
- Blood pressure is reported as the systolic pressure over diastolic pressure (eg, 120/70 or 120 over 70).

Normal blood pressure— Systolic <120 mmHg AND diastolic <80 mmHg

Prehypertension—Systolic 120 to 139 mmHg OR diastolic 80 to 89 mmHg. The term pre-hypertension was chosen because patients with blood pressures in this range have an increased risk of progressing to hypertension and developing cardiovascular complications.

Hypertension

- Stage 1: systolic 140 to 159 mmHg OR diastolic 90 to 99 mmHg
- Stage 2: systolic \geq 160 mmHg OR diastolic \geq 100 mmHg

HIGH BLOOD PRESSURE DIAGNOSIS

Blood pressure often varies with time and many people are anxious when seeing a healthcare provider, which can elevate blood pressure. As a result, hypertension is often not diagnosed unless the blood pressure is persistently high when measured at two office visits at least one week apart.

The only exceptions to this are if the blood pressure is very high or if there is evidence of damage from persistently elevated blood pressure, such as heart, eye, or kidney injury. Measuring blood pressure outside the office setting is often recommended.

Benefits of treatment — In multiple studies of people with hypertension, those who were given blood pressure lowering medications for four to five years had a significant reduction in the number of coronary events, stroke, and death compared to those who did not receive treatment.

TREATMENT OPTIONS

Lifestyle changes — Treatment of hypertension usually begins with lifestyle changes. Recommended changes often include a moderate restriction on salt in the diet, eating more fruits and vegetables, eating fish on a regular basis, avoiding excessive amounts of caffeine, weight loss in those who are overweight or obese, avoiding excess alcohol intake, stopping smoking, stress reduction/mind-body practices, and regular aerobic exercise. These changes are often most effective when used together.

Reducing sodium — The main source of sodium in the diet is found in packaged and processed foods, and in restaurant food. Reducing the amount of sodium consumed for some can lower blood pressure if high or borderline high blood pressure is present.

The body requires a small amount of sodium in the diet. However, most people consume many times the amount of sodium needed. A low sodium diet contains fewer than 2 grams (2,000 milligrams) of sodium each day.

Reducing alcohol—Drinking an excessive amount of alcohol increases the risk of developing high blood pressure. People who have more than two drinks per day have a one-to two-fold increase in the incidence of high blood pressure compared to nondrinkers.

Vegetarian diet — Eating a vegetarian diet may reduce high blood pressure and protect against developing high blood pressure. A strict vegetarian diet may not be necessary: one study showed that eating more fruits and vegetables, low-fat dairy products, and a diet low saturated and total fat lowered blood pressure. One major feature of a vegetarian diet that may affect blood pressure is the amount of dietary fiber; an increased amount of fiber is associated with decreased blood pressure. The recommended amount of dietary fiber is 20 to 35 grams of fiber per day.

Exercise — Regular aerobic exercise can lower the blood pressure by as much as 5 to 15 mmHg, although the effect may not be as pronounced among older individuals. To maintain this benefit, exercise must be continued long term; stopping exercise will allow the blood pressure to become elevated again.

Weight Loss and Blood Pressure- Being overweight or obese increases the risk of having high blood pressure and increases the risk of cardiovascular

disease associated with hypertension. The definition of being overweight and obesity are based upon a calculation called body mass index. A person is said to be overweight if their BMI is greater than 25, while a person with a BMI greater than 30 is said to be obese. People who are overweight or obese can benefit from losing weight. One successful way to lose weight is to reduce the number of calories in the diet, increase physical activity, and practice mindful eating.

Benefits of weight loss on blood pressure—Obesity raises blood pressure and makes high blood pressure more difficult to control. In contrast, weight loss reduces blood pressure. Blood pressure falls by about 1 mmHg for every 2.2 pounds (1.0 kg) of weight lost, an effect that is consistent for both men and women and for people of different ethnicities.

Medication — Antihypertensive medication is usually recommended when the blood pressure is consistently at or above 140/90 mmHg. Treatment with medication is recommended at a lower blood pressure (usually 130/80 mmHg) for people with diabetes or chronic kidney disease. Some people need more than one medication to maintain a healthy blood pressure.

WHERE TO GET MORE

INFORMATION — Your healthcare provider is the best source of information for questions and concerns related to your health issues. Because no two people are exactly alike and recommendations can vary from one person to another, it is important to seek guidance from a provider who is familiar with your individual situation. **This information from Saint Francis Health Ministries should be discussed in partnership with your healthcare provider as your journey towards greater health and vitality further unfolds.**