

Heading the Risk Factors of Stroke

Stroke is a disease that affects the arteries leading to and within the brain. It is the No. 4 cause of death and a leading cause of disability in the United States, according to the American Stroke Association.

A stroke occurs when a blood vessel that carries oxygen and nutrients to the brain is either blocked by a clot or bursts (or ruptures). When that happens, part of the brain cannot get the blood (and oxygen) it needs, so it and brain cells die.

Fixed Risk Factors

Some lifestyle behaviors you can change, while others you can't. But being aware of the risk factors for stroke can make you more informed and vigilant to the dangers. Here are some risk factors you cannot change.

AGE. The chance of having a stroke approximately doubles for each decade of life after age 55. While stroke is common among the elderly, a lot of people under 65 also have strokes.

HEREDITY (FAMILY HISTORY). Your stroke risk may be greater if a parent, grandparent, sister or brother has had a stroke. Some strokes may be caused by genetic disorders such as a gene mutation that leads to damage of blood vessel walls in the brain, blocking blood flow.

RACE. African-Americans have a much higher risk of death from a stroke than Caucasians do. This is partly because African-Americans have higher risks of high blood pressure, diabetes and obesity.

GENDER. Each year, women have more strokes than men, and stroke kills more women than men. Use of birth control pills, pregnancy, history of preeclampsia/eclampsia or gestational diabetes, oral contraceptive use, and smoking, and post-menopausal hormone therapy may pose special stroke risks for women. Be sure to discuss your specific risks with your doctor.

PRIOR STROKE, TIA OR HEART ATTACK. The risk of stroke for someone who has already had one is many times that of a person who has not. Transient ischemic attacks (TIAs) are "warning strokes" that produce stroke-like symptoms but no lasting damage. TIAs are strong predictors of stroke. A person who's had one or more TIAs is almost 10 times more likely to have a stroke

than someone of the same age and sex who hasn't. Recognizing and treating TIAs can reduce your risk of a major stroke. TIA should be considered a medical emergency and followed up immediately with a healthcare professional. If you've had a heart attack, you're at higher risk of having a stroke, too.

Modifiable Risk Factors

While some risk factors cannot be changed, there are steps you can take to lower your risk profile.

HIGH BLOOD PRESSURE. High blood pressure is the leading cause of stroke and the most important controllable risk factor for stroke. Many people believe the effective treatment of high blood pressure is a key reason for the accelerated decline in the death rates for stroke.

CIGARETTE SMOKING. In recent years, studies have shown cigarette smoking to be an important risk factor for stroke. The nicotine and carbon monoxide in cigarette smoke damage the cardiovascular system in many ways. The use of oral contraceptives combined with cigarette smoking greatly increases stroke risk.

DIABETES MELLITUS. Diabetes is an independent risk factor for stroke. Many people with diabetes also have high blood pressure and high blood cholesterol, and are overweight. This increases their risk even more. While diabetes is treatable, the presence of the disease still increases your risk of stroke.

CAROTID OR OTHER ARTERY DISEASE. The carotid arteries in your neck supply blood to your brain. A carotid artery narrowed by fatty deposits from atherosclerosis (plaque buildups in artery walls) may become blocked by a blood clot. Carotid artery disease is also called carotid artery stenosis.

Peripheral artery disease is the narrowing of blood vessels carrying blood to leg and arm muscles. It's caused by fatty buildups of plaque in artery walls. People with peripheral artery disease have a higher risk of carotid artery disease, which raises their risk of stroke.

ATRIAL FIBRILLATION. This heart rhythm disorder raises the risk for stroke. The heart's upper chambers quiver instead of beating effectively, which can let the blood pool and clot. If a clot breaks off, enters the blood-



stream and lodges in an artery leading to the brain, a stroke results.

OTHER HEART DISEASE. People with coronary heart disease or heart failure have a higher risk of stroke than those with hearts that work normally. Dilated cardiomyopathy (an enlarged heart), heart valve disease and some types of congenital heart defects also raise the risk of stroke.

SICKLE CELL DISEASE (ALSO CALLED SICKLE CELL ANEMIA). This is a genetic disorder that mainly affects African-American and Hispanic children. "Sickled" red blood cells are less able to carry oxygen to the body's tissues and organs. These cells also tend to stick to blood vessel walls, which can block arteries to the brain and cause a stroke.

HIGH BLOOD CHOLESTEROL. People with high blood cholesterol have an increased risk for stroke. Also, it appears that low HDL ("good") cholesterol is a risk factor for stroke in men, but more data are needed to verify its effect in women.

POOR DIET. Diets high in saturated fat, trans fat and cholesterol can raise blood cholesterol levels. Diets high in sodium (salt) can contribute to increased blood pressure. Diets with excess calories can contribute to obesity. Also, a diet containing five or more servings of fruits and vegetables per day may reduce the risk of stroke.

PHYSICAL INACTIVITY AND OBESITY. Being inactive, obese or both can increase your risk of high blood pressure, high blood cholesterol, diabetes, heart disease and stroke. So go on a brisk walk, take the stairs, and do whatever you can to make your life more active. Try to get a total of at least 30 minutes of activity on most or all days.

Information adapted from the American Stroke Association. Visit www.strokeassociation.org