

Heat Stroke and Dehydration Can Kill

During an average summer, 175 people in the U.S. die of heat-related illnesses. But many more deaths occur in years with prolonged heat waves. In extreme heat and humidity, with vigorous physical exertion under the sun, the body temperature can rise to 106 degrees or higher.

Increased risk: When heat gain is more than your body can remove, the trouble begins. When a person cannot sweat enough to cool their body, heat can build up to dangerous levels. Some medications (psychotropic medications, antihistamines, diuretics, and others) interfere with the body's ability to regulate temperature and fluids and can cause heat stroke. Heart disease, obesity, strenuous outside activity, previous heat stroke, direct sun, high humidity, recent vomiting, lack of proper sleep, age (children or over 60), and pregnancy all contribute to an increased risk. Sunburn affects your body's ability to cool, plus fluid loss.

Our bodies lose fluid every day in urine, stool, sweat and even tears. Drinking fluids and eating foods that contain water replaces it. When the body loses more than is water than is replaced, plus essential body salts, dehydration occurs. This can be life-threatening.

Symptoms: The beginning signs are thirst, fatigue, dry lips, and feeling hot. If you do not stop and rest, drink fluids and cool off, your symptoms will progress; heat cramps may occur in the legs or abdomen.

Progression to heat exhaustion: symptoms involve dizziness, nausea, headaches, rapid heartbeat, and decrease in urine output. You can start to get confused - a dangerous condition on a motorcycle. Immediate medical attention is required, but rarely is it life threatening.

Progression to heat stroke: The skin may be hot but dry (or wet if the person has just transitioned to that stage), and the victim may be unconscious, delirious, or having seizures. *A person in this condition can die in minutes.*

Prevention: Drink water, drink water, drink water. Sports drinks are good as well. Don't wait until you feel thirsty - then it has already started. A camelback type water supply worn on your back gives you a large supply of water, and the contact of the reservoir on your back helps to keep you cool. Drinks with alcohol, sugar and caffeine should be avoided because they reduce the body's ability to release heat. Wet down your shirt. Ice packs activated by crushing worn in your inside jacket pockets or around your neck may help. Rest in the shade often. Condition yourself for the heat. Start by limiting your ride to two hours in excessive heat and gradually increase. Realize that some days may be too hot to ride.

First Aid: In the case of mild hydration, drinking fluids, especially sports drinks that restore the body salt balance and electrolytes. For moderate dehydration, intravenous fluids may be required. Heat stroke is a life threatening condition and cause permanent organ damage. Call 911 immediately. The person can die within minutes. Carefully move the person to a cooler spot and shade them. Remove their clothing. Pour water on their arms and legs and fan the person to increase air circulation and evaporation, or cover the extremities with cool wet cloths and fan the patient. Immersion in cool (**not cold**) water is also useful. Put ice packs under armpits and groin. Vigorously massage arms and legs while cooling, to help move the cooled blood back into the body. Stretch and massage cramps and drink sports drink or water with a pinch of salt. Discontinue fluids if a person vomits or feels nauseated.

Recommended Hydration: In the Fall and Spring, 2 - 3 quarts a day is recommended when doing moderate to strenuous activity and 3 - 4 quarts in the summer and winter when doing strenuous activities.