

Protect your heart and health during 'dog days' of summer

17 July 2018



Summer is a time for barbecues and other outdoor fun, but it's also a time for sweltering heat. And experts say everyone, especially the elderly and very young, need to know how to limit the potentially deadly effects of high temperatures.

The ancient Greeks and Romans called the sultriest days of summer the "dog days." The Old Farmer's Almanac marks the time as 40 days from July 3 to Aug. 11, coinciding with the rising of the star Sirius, also called the Dog Star.

Already this year, the dog days have proved dangerous.

Heat warnings and advisories have been issued over a large swath of the country, with [heat](#) waves smothering the Northeast and shifting into the South and West. In Quebec, at least 70 people reportedly have died from a [heat wave](#) hitting eastern and central Canada.

More than 600 people die every year in the United

States from heat-related illnesses that are preventable, according to the U.S. Centers for Disease Control and Prevention. The agency estimates more than 65,000 Americans visit an emergency room for acute heat illness each summer.

"I think people underestimate how quickly it happens. And when it starts to happen, if someone is progressing to heat exhaustion or heat stroke, you lose your self-awareness," said Dr. Robert O'Connor, chair of emergency medicine at the University of Virginia. "It's important to keep an eye on those around you for heat-related problems. If someone is flushed, dizzy or uncoordinated, it can be an early sign."

Dehydration can begin within just a few hours of extreme heat, so drinking extra fluids is important, especially when taking certain medications. Fatigue, headaches, muscle cramps, dizziness, sleepiness and dry mouth can all be signs of dehydration.

Dehydration causes the heart to work harder, putting it at risk. Hydration helps the heart more easily pump blood through the blood vessels to the muscles. And, it helps the muscles work efficiently.

A 2016 Environmental Protection Agency analysis of heat-related deaths said [high temperatures](#) could be a factor in many more deaths than officials realize—or count.

"By studying how daily death rates vary with temperature in selected cities, scientists have found that extreme heat contributes to far more deaths than the official death certificates might suggest," the report said. "This is because the stress of a hot day can increase the chance of dying from a heart attack, other heart conditions, or respiratory diseases such as pneumonia."

While infants and the elderly are more vulnerable to

problems from heat, O'Connor said sometimes medicines can make someone more sensitive to heat and dehydration.

"They should talk to their doctor and look up their medications to see if it predisposes them," he said.

Heat exhaustion and [heat stroke](#) are serious medical emergencies that require treatment. Both can cause headaches, nausea or vomiting. Heat stroke also can cause a high fever, warm skin with no sweating, and confusion or unconsciousness.

Heat stroke is not the same as a stroke. Stroke happens when a blood vessel to the brain either bursts or is blocked by a clot, causing a decrease in oxygen flow to the brain.

Beyond some of the obvious and sometimes extreme physical symptoms brought on by sweltering temperatures, a recent study showed it could affect how you think. And it doesn't just affect the most vulnerable.

A group of researchers at Harvard University in Boston published an observational study last week showing students who lived in dormitories without air conditioning during a heat wave performed worse on a series of cognitive tests compared with students who lived in air-conditioned dorms.

The study was conducted over 12 consecutive days in the summer of 2016. Students living in buildings without AC experienced 13.4 percent longer reaction times on color-word tests, and 13.3 percent lower scores on addition/subtraction tests compared with students in air-conditioned rooms. The research showed students in rooms with AC were not just faster in their responses, but also more accurate.

Hot summers and heat waves won't be going away any time soon, according to federal research. In fact, unusually high temperatures have become more common in recent decades, and heat waves are expected to become longer, more frequent and more intense in the future, according to the EPA and the CDC.

O'Connor said thinking ahead and being prepared

in the heat will help prevent trouble.

"Drink plenty of fluids and limit the amount of time you are in the heat. Even if someone comes into a cooler environment for a few minutes every hour, that can prevent a heat-related illness," he said.

"Limit outdoor activity to early morning or late evening, and stay in the shade," O'Connor said. "It might be tough if you are working outside or on the golf course. Soak a towel in cold water and put it around your neck. Evaporative cooling, dousing in cold water and letting it evaporate, is the best way to eliminate heat."

Copyright is owned or held by the American Heart Association, Inc., and all rights are reserved. If you have questions or comments about this story, please email editor@heart.org.

APA citation: Protect your heart and health during 'dog days' of summer (2018, July 17) retrieved 16 June 2019 from <https://medicalxpress.com/news/2018-07-heart-health-dog-days-summer.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.