

## Study: Triathlons can pose deadly heart risks

March 28 2009, By MARILYNN MARCHIONE , AP Medical Writer

---

(AP) -- Warning to weekend warriors: Swim-bike-run triathlons pose at least twice the risk of sudden death as marathons do, the first study of these competitions has found.

The risk is mostly from [heart problems](#) during the swimming part. And while that risk is low - about 15 out of a million participants - it's not inconsequential, the study's author says.

Triathlons are soaring in popularity, especially as charity fundraisers. They are drawing many people who are not used to such demanding exercise. Each year, about 1,000 of these events are held and several hundred thousand Americans try one.

"It's something someone just signs up to do," often without a medical checkup to rule out heart problems, said Dr. Kevin Harris, a cardiologist at the Minneapolis Heart Institute at Abbott Northwestern Hospital. "They might prepare for a triathlon by swimming laps in their pool. That's a lot different than swimming in a lake or a river."

He led the study and presented results Saturday at an American College of Cardiology conference in Florida. The Minneapolis institute's foundation sponsored the work and tracks athlete-related sudden deaths in a national registry.

Marathon-related deaths made headlines in November 2007 when 28-year-old Ryan Shay died while competing in New York in the men's marathon Olympic trials. Statistics show that for every million

participants in these 26.2-mile running races, there will be four to eight deaths.

The rate for triathletes is far higher - 15 out of a million, the new study shows. Almost all occurred during the swim portion, usually the first event.

"Anyone that jumps into freezing cold water knows the stress on the heart," said Dr. Lori Mosca, preventive cardiology chief at New York-Presbyterian Hospital and an American Heart Association spokeswoman. She had no role in the study but has competed in more than 100 triathlons, including the granddaddy - Hawaii's Ironman competition.

Cold water constricts blood vessels, making the heart work harder and aggravating any pre-existing problems. It also can trigger an irregular heartbeat. On top of this temperature shock is the stress of competition.

"It's quite frightening - there are hundreds of people thrashing around. You have to keep going or you're going to drown," Mosca said.

Swimmers can't easily signal for help or slow down to rest during swimming as they can in the biking or running parts of a triathlon, said Harris, who also has competed in these events. Rescuers may have trouble spotting someone in danger in a crowd of competitors in the lakes, rivers and oceans where these events typically are held, he added.

For the study, researchers used records on 922,810 triathletes competing in 2,846 USA Triathlon-sanctioned events between January 2006 and September 2008.

Of the 14 deaths identified, 13 occurred during swimming; the other was a bike crash. Autopsies on six of the victims showed that four had underlying heart problems. Two others had normal-looking hearts, but

they may have suffered a fatal heart rhythm problem, Harris said.

A search of the Minneapolis registry and the Internet found four other triathlon-related deaths from 2006 through 2008 beyond those that occurred in the officially sanctioned events.

"While not a large risk, this is not an inconsequential number," Harris said.

Fundraising triathlons have enticed many runners to try to expand into areas like swimming, which they may not have learned to do very efficiently, to benefit particular charities, Mosca said.

"They're really recruiting people to do these events," she said. "It can be a recipe for disaster."

Doctors offer these tips to anyone considering a triathlon:

- Get a checkup to make sure you don't have hidden heart problems.
- Train adequately long before the event, including open-water swims - not just in pools.
- Acclimate yourself to the water temperature shortly before a race, and wear a wetsuit if it's too cold.
- Make sure the race has medical staff and defibrillators on site.

--

On the Net:

Heart meeting: <http://www.acc.org>

American Heart Association: <http://americanheart.org>

Registry: <http://www.suddendeathathletes.org>

*©2009 The Associated Press. All rights reserved. This material may not be published, broadcast, rewritten or redistributed.*

Citation: Study: Triathlons can pose deadly heart risks (2009, March 28) retrieved 1 May 2024 from <https://medicalxpress.com/news/2009-03-triathlons-pose-deadly-heart.html>

<p>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.</p>
--