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AF Q&A

BY MATT BRZYCKI

Does strength training improve flexibility?

Years ago, the prevailing belief was that lifting weights would make people muscle-bound. Despite the fact that strength training has become widely accepted, the perception that it reduces flexibility still remains.

In one study, 25 exercise science majors at the University of North Dakota were randomly assigned to groups that did either strength training or static stretching for the same muscles and joints. (A third group acted as a control and didn't train.)

After five weeks, both groups significantly increased range of motion in their hips and hamstrings and there were no significant differences between the groups. The two groups made a small but nonsignificant improvement in their shoulder flexibility with no significant differences between the groups.

So, it seems as if fears of decreased flexibility are unfounded. As long as repetitions are performed throughout a full range of motion, strength training is at least as good as stretching for improving flexibility.

How great is the risk of cardiac arrest when running long-distance races?

Running gained a foothold in this country in the early 1970s, coinciding with the so-called "Fitness Boom" (which, of course, was actually the start of a fitness trend). Seemingly overnight, millions of Americans took to the streets in pursuit of improved fitness. As the number of runners increased, so did participation in long-distance races, especially the marathon and half-marathon. Unfortunately, every now and then, a runner dies during or shortly after a race, which elicits considerable attention and scrutiny. Suggestions are made that long-distance races are dangerous. But are they?

Researchers looked at marathon and half-marathon races that occurred in the United States from January 2000 to May 2010. Over that period of time, they found that among 10.9 million participants, 59 suffered a cardiac arrest (their hearts stopped beating). Of those instances, 42 were fatal. The majority of cardiac arrests were attributable to cardiovascular disease.

The overall incidence rate of cardiac arrest was 1 in 124,000 participants; sudden death was 1 in 259,000 participants. These numbers show that long-distance races have a low risk.

The best predictor of survival? Bystanders who administered cardiopulmonary resuscitation. This underscores the importance of getting certified in life-saving skills.

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