

Why Is Training the “Core” So Important for Competitive Athletes?

Over the past decade or so, the term “Core Training” has been beaten to death in almost every fitness magazine, professional journal, conference topic, and product advertising. I feel it necessary to “pile on” because STILL many competitive athletes and coaches neglect training the muscles of the torso and lower back in favor of the more “glamorous” and “visually appealing” muscles.

So why is a strong core so important for the competitive athlete?

1. Speed and Power Production.

Your body is one big machine, and everything is held together and stabilized with your core muscles. Whenever your body directs force into the ground, against another athlete, or a into a sports implement such as a bat, ball, javelin, etc., power is lost if your core musculature is weak and unstable. One of my favorite analogies for this phenomenon is, “You can’t shoot a cannon out of a canoe.” The cannon ball would fly much further if it were shot from a firm and stable carriage.

For example: If I were a boxer and had extremely powerful shoulders and arms, I may be able to generate 700 lbs of force with a right cross. But if my core muscles could only stabilize 400 lbs of force, then the net force generated into my opponent would only be 400 lbs. The “lost” 300 lbs of force would be absorbed by me and a mushy mid-section.

Another analogy to simplify this reality is running in soft sand. We all know that we run slower on soft surfaces. Why? Because much of the force we direct into the ground is absorbed by the unstable sandy base. A weak torso has the same effect, except this time the soft and unstable matter are your own core muscles!

2. Injury Prevention.

A strong core holds everything together. I would be willing to bet that many lower back, hamstring, and hip flexor injuries could be traced back to an underdeveloped torso. It seems so simple if you think of your body as a three link chain, the upper-body, core, and lower-body making up the three links. The athlete who only focuses on upper body and lower body power development will create a very unbalanced “chain” The upper body “link” is made of steel, the lower body “link” is made of steel, but the core link, which holds it all together, is made of paper. We all know that a chain is only as strong as its weakest link. Guess where the chain will break!

So why are well designed, functional core training programs so rare in many athletes’ strength and conditioning regimen? I believe the main reason is our obsession with easily measurable results. Ask any jock what he benches or squats, and he would be able to tell you with great pride. He has designed his whole training program to improving these numbers. Ask him how strong his core is, and he can’t tell you because he can’t quantify it. Therefore, he deems it unimportant and puts core strength/stability on the back burner. His ignorance of the importance of a well developed and functional core may make him an impressive weightlifter, but will eventually lead to decreased speed and power development on the game field--and maybe--a season ending injury.

As coaches we must remember that we are training functional, explosive, multi-directional athletes. Not weight lifters! Being strong and having an impressive 1-rep max is very important, but that aspect of training is only a small part of a comprehensive training program for athletes.

Train Hard...Train Smart

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