

Exercise: How to work those abdominals?

Back In School?

Remember back in grade school when you did the [Presidential fitness testing](#)? First you found the heaviest kid in class to sit on your feet. Then with your knees bent and fingers interlocked behind your head you attempted to do as many “sit-ups” as possible in 60 seconds. Supposedly this was testing abdominal strength. Wrong!

In The Gym

Then we got older, finished school, got a job and joined the gym. A trainer (in great shape) showed you how to do “ab crunches”. So next thing you know you are on your back (again) and doing 100 crunches and not feeling your abs fatigue. Reason: you likely were using all momentum (cheating) as you rapidly went back and forth. The only thing that really happened was strain on your neck! Not good.

Basic Anatomy

How muscles are attached to bone dictate the action or function. The [abdominal muscles](#) attach from the rib cage to the pelvis. When they contract they pull the rib cage closer to the [pelvis](#) or your pelvis closer to your rib cage, that’s it. The abs DO NOT attach to your [femur](#) (thigh bone), so any exercise where the knee comes closer to your chest or chest closer to your knee, the primary muscle working is NOT the abs. In this scenario the abs act as a stabilizing muscle group so you will feel them contract, but the primary muscle working is the [iliopsoas](#) (hip flexor group).

Why All The Fuss?

The problem is that in most people the [iliopsoas](#) group is stronger than the abs. This causes a [hyperlordosis](#) (increased low back curve) allowing low back muscles and ligaments to shorten. So if you strengthen them simultaneously you will never overcome this [muscular imbalance](#).

The Neurology

Okay so the basic neurology is that when low back muscles/hip flexors are shortened they are neurologically overly excited, and since they work opposite of the abs they actually neurologically inhibit (turn-off/weaken) the abs. Not good. To properly strengthen the abs we need to change the neurology of these muscle groups BEFORE we do our ab workout. Read on please.

Maximizing Your Ab Workout

So how do we “turn-off” the low back muscles and “turn-on” our abs? The easiest fastest way would be a chiropractic adjustment as that will inhibit the low back muscles and allow the abs to function at a higher level. But if you are at the gym then try this: Find a bench and lie on your side with your leg hanging over the edge. Now contract your low back muscles for 2-5 seconds. (This will actually help turn the low back muscles off). Now take a big breathe in and out and stretch your low back for 15-30 seconds. Repeat this on the other side. This will help “turn-off” your low back muscles and allow your abs to “turn-on” by about 5-15%!

Proper Ab Technique

Now for the crunch. Most people will struggle with crunches on their back as they will likely strain their neck. So try this: In a seated position with good posture, slowly contract your abs, bring shoulders straight down towards your belt line. (DO NOT bend at the waist as this causes the hip flexors to contract, we just covered that). Each contraction should last for 2-5 seconds and you should “feel it”! If you do not you are doing something wrong. Try 3 [sets](#) of 10 [repetitions](#). This should definitely be a good and safe ab workout. Enjoy!