

Section 2

Instructions

How To Get The Most From This Program

INSTRUCTIONS

To ensure the greatest amount of your success with this program, please read through this section very carefully and refer back to it as often as needed.

1. Isometric training involves no repetitions. As mentioned in Chapter 1, isometric training is *the sustained contraction of a muscle over a certain period of time where the length of the muscle remains unchanged*. In other words, unlike weight training where the lengths of your muscles are always changing, as in performing a set of ten biceps curls, isometric contractions are typically held at a point about halfway between a full repetition, and then this position is maintained for 10-15 seconds.

Take a moment now and look ahead to page 26, Figure 3-1a. This is the final position for the right leg in Exercise #1 and is held for 10-15 seconds. The leg does not repetitively go forward and back, again and again, as you normally do with weights. This is very important because isometric contractions using the resistance band is a very efficient way to train your muscles for speed and strength and as a result all of the exercises in this program are done this way.

2. Attaching the resistance band. This training program comes with at least two resistance bands. Some of the exercises require you to attach your bands around an immovable object such as a pole. Look ahead again to page 26, Figure 3-1a. Here, the band is attached around a steel pole. When it is time for you to attach your bands to a similar object, here are two simple rules to follow: 1) make sure the object you tie the band to is really immovable relative to your own strength and 2) make sure the object you tie the band around does not have any rough or sharp edges as this will cause your exercise band to tear. Serious injury may result if the exercise band breaks and snaps back and hits you.

If you have trouble locating a convenient place to attach your band, you can make and use a simple door attachment shown on pages 21 and 22. The three hinges on a typical door frame are excellent reference points to anchor your band to and should be strong enough to withstand the amount of force you will be using during these exercises however, common sense applies and if you feel you may damage the door frame, look for another more stable location.

You may also order a pre-made door attachment designed specifically for this purpose. Go to www.AthleticQuickness.com/order.asp and scroll down to bottom of the page.

3. How much effort should you exert for each exercise? Isometric contractions can be done with any amount of force but typically they are done using between 70-80% of your maximum strength. The best way to gauge this amount of effort is as follows: when you start an exercise, if you can easily hold the final position for a lot longer than the recommended 10-15 seconds, then you are not using enough effort. If you feel like you need a break around the 10 second mark similar to the breaks taken between weightlifting sets, then you are exerting the proper amount of force.

4. Proper positioning. Some of the exercises will require you to be at a certain distance away from where the band is tied in order to achieve enough resistance. Again, look ahead to page 26, Figure 3-1a. If this exercise becomes too easy when you first try it, then you will need to move farther away from where your band is tied. This will force your band to stretch a little more thereby increasing its resistance. Likewise, if this exercise is too hard, then you will need to move closer to where the band is tied. Getting into the proper position is a simple thing to do. It is also critical to achieving good results with this program. As you become familiar with all of the exercises, you should be able to judge for yourself the best position to be in to make the exercises most effective for you.

5. Doubling-up the resistance. There will also be times when the entire length of the band is needed but the resistance it can supply is still not strong enough. Therefore, you can use two bands and double-up the resistance. Again, look ahead to page 26, Figure 3-1a. This is the final holding position for Exercise #1 and a similar image is shown below in Figure 2-1a. When you perform this exercise, if it appears too easy to hold this position, then using a second band will help make it more difficult. Simply tie a knot in the second band and attach it next to the other as shown in Figure 2-1b. This is the same exercise except two bands are used at the same time to increase the resistance.

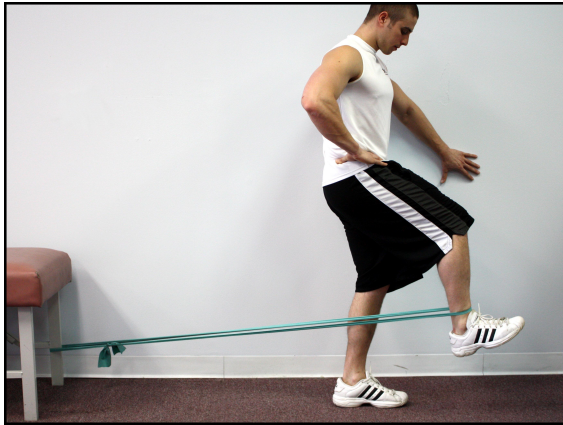


Figure 2-1a. Final holding position for Exercise #1 using one band.

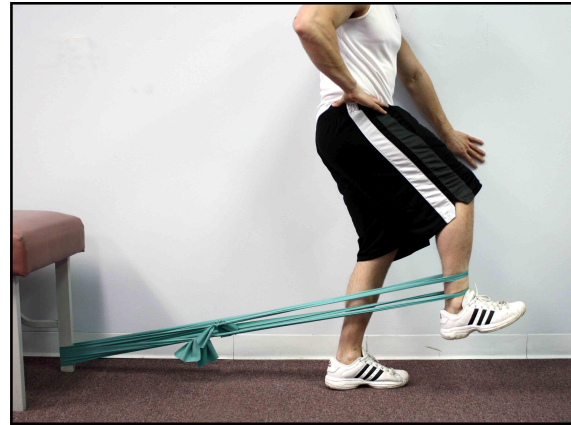


Figure 2-1b. Final holding position for Exercise #1 using two bands.

6. You may use bands with a higher resistance level. Each band has a specific color that corresponds to a particular resistance level ranging from the color *red* which is of light resistance to the color *gold* which is of xxx-heavy resistance. By using a band with more resistance, you should be able to exercise well within the physical limits of that particular band. See the product information section in the appendix for all available bands.

7. Maintaining good balance during each exercise. Since some of the exercises are performed using one leg at a time you may find that your balance is really being tested in the beginning with this type of training. Its important to maintain proper form with each exercise and finding something to balance against while you do them is essential for your success.

In Figures 2-1a and 2-1b above, the athlete is shown balancing against a wall while this exercise is being performed. If you are doing these in your home, walls make good places to balance against since they provide you with a sturdy support should you need it. However, be careful there are no items on the walls such as pictures or mirrors that can slide if you happen to find yourself losing your balance and end up placing your hands on them.

If you are doing these exercises in a gym and are attaching your bands to say, one piece of equipment, you might also look for a second nearby machine that can also serve as a good support for your hands. Gym equipment makes perhaps the best places to attach your bands to. This is because the equipment is typically immovable relative to your own body strength and most of the equipment is finished with smooth steel that won't cut your bands and cause them to tear. If you have access to gym equipment, it is suggested that you use it. As a cautionary note, if you choose to incorporate gym equipment into your setup, make sure you keep your hands away from any moving parts on the equipment (pulleys, cables, hinges etc.) that you may be using for balance to avoid injury.

8. Creating a door attachment. There will be some who purchase this program that find themselves faced with the challenge of locating a safe and convenient place to attach the band to perform a specific exercise. The door attachment will solve this problem.

The three hinges on a typical door frame provide very good locations to anchor your bands for most of the exercises shown in this program. They are ideally spaced for exercises where the bands need to be attached below your knees, waist level and above the shoulder. Here's how to make your door hinge attachment if you have no other place to attach your bands:

STEP 1. You will need to locate about a five foot piece of nylon rope, preferably 1/8" diameter and not any larger. See Figure 2-2. You can find this at your typical home improvement store and it will cost about a dollar or two. Nylon rope is best since it compresses better and is needed to securely attach it to the door frame as well as to allow the door to close completely.

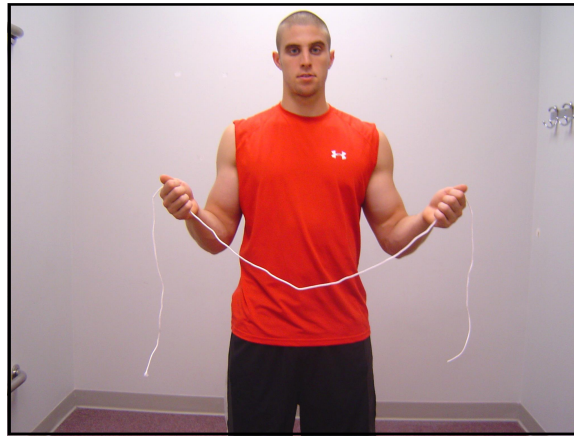


Figure 2-2. Five foot piece of nylon rope.

STEP 2. Fold the rope in half to form two ropes about 2 1/2 feet long each. You don't need to cut the rope in half. See Figure 2-3a. Then fold these in half again to form four ropes. See Figure 2-3b.

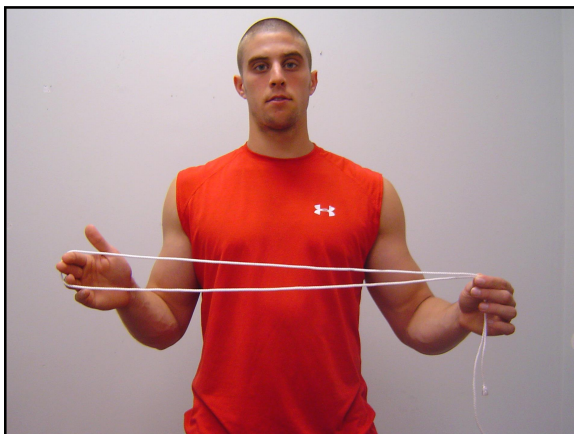


Figure 2-3a. Rope folded in half to make two strands about 2 1/2 feet long.



Figure 2-3b. Rope folded in half again to make four strands a little more than a foot long each.

STEP 3. Tie a knot in these four strands near the middle as shown leaving yourself with a loop that is at least six inches long. Your door attachment is now complete. See Figure 2-4 on the next page:

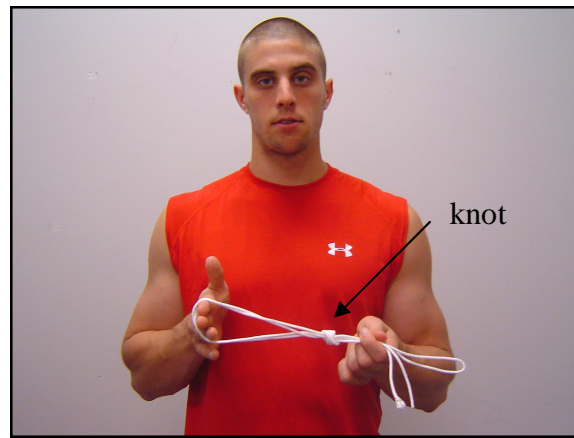


Figure 2-4. Door attachment complete.

Next, we will show you the proper way to attach it to the door frame. The first thing you need to pay attention to is which way the door you plan on attaching your band to opens. Most doors open *in* to a particular room and not *out* into the hallway. This is important to know because it is always safer (and recommended) that exercises be performed on the opposite side of where the door opens. This will be the hallway in most situations but not always. Note: The side of the door frame where the hinges are on doesn't matter.

STEP 1. In Figure 2-5a, the door opens into the room. Feed your door attachment with some of the loose ends first through the door above the top hinge so that the knot is resting on the hinge. **STEP 2.** Close the door until it closes and cannot be opened unless you turn the door knob. See Figure 2-5b. This will keep your door attachment fastened securely between the door and the frame. This is also why you want to use nylon rope, which is fairly compressible, as well as not to exceed the 1/8 inch diameter. Anything larger may prevent closing the door or cause damage to it if forced too much. **STEP 3.** The exposed loop without any loose ends on the other side of the door is now ready to have a band attached to it. See Figure 2-5c. **STEP 4.** Band attached to loop with slip knot and ready for use. See Figure 2-5d.

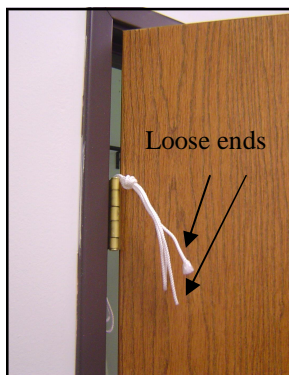


Figure 2-5a. View from *inside* the room. Door slightly open.

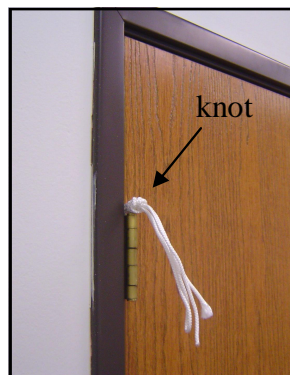


Figure 2-5b. View from *inside* the room. Door closed tightly shut.

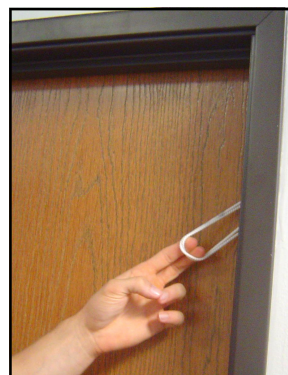


Figure 2-5c. View from *outside* the room. Loop exposed - ready for band.



Figure 2-5d. *Outside* the room. Band attached to loop with slip knot.

General Rules. 1) Attach the door attachment *below the bottom hinge* for exercises where the band is attached below the knee and *above the top hinge* for exercises where the band is attached above the shoulder. This prevents any sliding of the band during the exercise. Middle door hinge attachments are attached directly above or below the middle hinge for exercises where the band is attached about waist level. 2) Periodically check your door attachment for any wear and tear and create a new one when necessary to prevent accidental breaking.

HOW TO GET THE MOST FROM THIS PROGRAM

Below are several tips on how to get the most from this program. Review them as often as necessary as each of these tips holds a key to your success.

Tip #1. Perform approximately five minutes of light stretching before starting these exercises.

Tip #2. Use a watch or clock with a clearly visible second hand so that you can accurately time your isometric exercises.

Tip #3. The final position for each exercise should be held for 10-15 seconds. The amount of effort you should be exerting during this time should be between 70-80% of your maximum strength.

Tip #4. Isometric exercises are to be done with normal breathing. Do not hold your breath during the exercises because this may cause a sudden increase in blood pressure and/or light-headedness.

Tip #5. If you experience any abnormal discomfort during these exercises, ease off just a little bit. If the discomfort persists, consult with your physician before continuing.

Tip #6. Perform each exercise according to the *Weekly Training Schedule*.

Tip #7. It doesn't matter what time of day you exercise however, your body will respond best if you choose the same time each day to train.

Tip #8. Pay close attention to the way your body position is shown for each exercise, because correct positioning is needed to isolate specific muscle groups.

Tip #9. Periodically check your resistance bands for any wear and tear. Replace them when necessary to prevent them from breaking during an exercise.

Tip #10. To reduce the resistance for a given exercise, create a longer loop with your band, use bands with less resistance and/or position yourself closer to where the band is attached. Positioning yourself closer means the band will not be stretched as much thereby reducing the resistance.

Tip #11. To increase the resistance for a given exercise, use two bands together, use bands with more resistance and/or position yourself further away from where the bands are attached. Positioning yourself further away will cause the bands to stretch a little more adding to their resistance.

Tip #12. Always train within the physical limits of the band. What this means is, no matter how much effort you are exerting for a given exercise, the exercise band should still be capable of stretching a little further. If the band is stretched to its maximum, you will essentially turn the band into a static rope or cable, incapable of returning any hyper-elastic force back. This greatly reduces its effectiveness. If this situation ever occurs, see Tip #11 on how to rectify it.

Tip #13. The exercises demonstrated in this program are meant to be physically challenging. If you find that your initial attempt with an exercise is too easy, you should either add another resistance band to the exercise, use a stronger band and/or reposition your self further away from your band attachment to stretch the bands. Remember, holding the final position for these exercises using 70-80% of your maximum strength is a significant amount of effort to exert over a 10-15 second period of time before wanting to take a rest.

Tip #14. Gym equipment provides safe and effective places to attach your bands since they are relatively immovable and do not typically possess any rough or sharp edges that may accidentally cut your band. If you have access to such equipment it is suggested that you use it.

Tip #15. If you have a game scheduled and have been actively performing most, if not all, of the exercises in this program for at least two consecutive weeks prior to competition, you may want to allow yourself two full days of rest from these exercises before the competition.

IMPORTANT NOTICE. Consult with your physician before beginning this exercise program.