

Diaphragmatic Breathing

The diaphragm is the most efficient muscle of breathing. It is a large, dome-shaped muscle located at the base of the lungs. Your abdominal muscles help move the diaphragm and give you more power to empty your lungs. But chronic obstructive pulmonary disease (COPD) may prevent the diaphragm from working effectively.

When you have pulmonary disease, air often becomes trapped in the lungs, pushing down on the diaphragm. The neck and chest muscles must then assume an increased share of the work of breathing. This can leave the diaphragm weakened and flattened, causing it to work less efficiently.

Diaphragmatic breathing is intended to help you use the diaphragm correctly while breathing to:

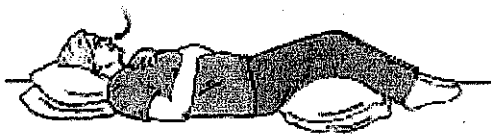
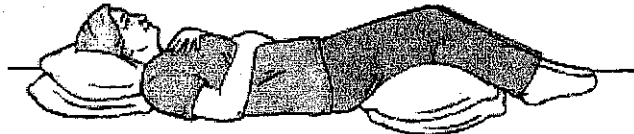
- Strengthen the diaphragm
- Decrease the work of breathing by slowing your breathing rate
- Decrease oxygen demand
- Use less effort and energy to breathe

Diaphragmatic breathing technique

1. Lie on your back on a flat surface or in bed, with your knees bent and your head supported.

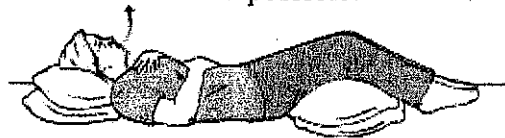
You can use a pillow under your knees to

support your legs. Place one hand on your upper chest and the other just below your rib cage. This will allow you to feel your diaphragm move as you breathe.



2. Breathe in slowly through your nose so that your stomach moves out against your hand. The hand on your chest should remain as still as possible.

3. Tighten your stomach muscles, letting them fall inward as you exhale through pursed lips (see "*Pursed Lip Breathing Technique*"). The hand on your upper chest must remain as still as possible.



When you first learn the diaphragmatic breathing technique, it may be easier for you to follow the instructions lying down, as shown on the first page. As you gain more practice, you can try the diaphragmatic breathing technique while sitting in a chair, as shown below.

To perform this exercise while sitting in a chair:

1. Sit comfortably, with your knees bent and your shoulders, head and neck relaxed.

2. Place one hand on your upper chest and the other just below your rib cage. This will allow you to feel your diaphragm move as you breathe.



3. Tighten your stomach muscles, letting them fall inward as you exhale through pursed lips (*see "Pursed Lip Breathing Technique"*). The hand on your upper chest must remain as still as possible.

Note: You may notice an increased effort will be needed to use the diaphragm correctly. At first, you'll probably get tired while doing this exercise. But keep at it, because with continued practice, diaphragmatic breathing will become easy and automatic.

How often should I practice this exercise?

At first, practice this exercise 5-10 minutes about 3-4 times per day. Gradually increase the amount of time you spend doing this exercise, and perhaps even increase the effort of the exercise by placing a book on your abdomen.

© Copyright 1995-2005 The Cleveland Clinic Foundation. All rights reserved

[Health Information Home](#) / Last Reviewed: 12/23/2005 / [Disclaimer & Privacy](#) / © Cleveland Clinic Health System 2004

This information is provided by the Cleveland Clinic Health System and is not intended to replace the medical advice of your doctor or health care provider. Please consult your health care provider for advice about a specific medical condition.

index#9445