

## Decongestive and Breathing Exercises for Lymphedema

In this last part of the three-part series about exercises, I would like to address decongestive- and breathing exercises, which are an integral part in the treatment and management of lymphedema.

Unlike the heart in the blood circulatory system, the lymphatic system does not have an active pump to propel lymphatic fluid back to the bloodstream. Effective lymph flow depends on sufficient muscle and joint activity, especially if the functionality of the lymphatic system is compromised. Decongestive exercises are most effective if performed while the patient wears compression garments or bandages, which are also essential components in lymphedema management. Ideally, decongestive exercise protocols are performed two to three times daily for about 10-15 minutes, and the patient should rest with the affected limb elevated for at least 10 minutes following the exercises.



These active, non-resistive and repetitive exercise protocols should be customized by the lymphedema therapist and/or physician to meet individual goals for patients affected by lymphedema. The stage and type of lymphedema, specific restrictions and limitations of joint and muscle activity, as well as additional medical conditions need to be considered.

### Breathing Exercises

The downward and upward movement of the diaphragm in deep abdominal breathing is an essential component for the sufficient return of lymphatic fluid back to the bloodstream. Patients affected by lymphedema of the leg benefit greatly from an exercise program including diaphragmatic breathing exercises. The movement of the diaphragm, combined with the outward and inward movements of the abdomen, ribcage, and lower back, also promotes general well-being, peristalsis and return of venous blood back to the heart.



Following are sample decongestive exercise protocols, combined with breathing exercises for the upper and lower extremity, which are published in the book [Lymphedema Management](#). This book also contains self-MLD and self-bandaging protocols for patients affected by lymphedema. The exercise protocols below serve as guidelines and the movements outlined must not cause discomfort, pain, or soreness.

Before you engage in any exercise program, especially if you have additional medical conditions, please make sure to get your physicians approval.

I would like to wish all of my readers a Happy and Healthy 2011!

### **Decongestive Exercises for the Upper Extremity**

- Exercises should be performed wearing compression bandages or compression sleeves (except when exercises are performed in the water)
- Tight or restrictive clothing (tight underwear or bra, heavy breast prosthesis) should not be worn while performing the exercises
- Exercises should be performed twice daily for about 10-15 minutes. The duration of the program should be slowly increased over a comfortable period of time
- Movements should be performed in a slow and controlled manner, and the musculature should be relaxed between each individual exercise. The relaxation phase should last at least as long as the time spent during the exercise

Exercises are performed sitting on stool or a chair without leaning back. Many of the exercises however may be performed lying on the floor. Proper breathing techniques should be used throughout the session.

### **Abdominal Breathing** (3 repetitions)

*Place both hands on your belly*

Inhale deeply through your nose into your belly (feel how you breathe against your hands)

Exhale through your mouth

*Perform breathing exercises as often as possible during the day*

### **Neck Exercises** (2-3 repetitions each)

Turn your head slowly and look to the right as far as possible; return to normal position; repeat on the left side

Bend your head to the right and try to touch the shoulder with your ear (do not shrug your shoulder). Return to the starting position and repeat for left side

### **Shoulder Exercises**

*"Shoulder Rolls"* (3-5 repetitions each)  
Rotate shoulders alternately on the right and left side.  
Perform shoulder rolls using both shoulders forwards and backwards

*"Shoulder Shrug"* (3-5 repetitions each)  
Shrug both shoulders and inhale. Exhale while the shoulders relax

**Arm Exercises** (3-5 repetitions each)

*Fingers*

Place palms and fingers together  
Move little fingers away from each other and back together  
Move ring fingers away from each other and back together

Continue with each finger

Alternate position:

Hold palms out in front of the body with the palms facing up  
Move thumb and index finger together, so the finger pads touch each other, return to open hand  
Move thumb and ring finger together, so the finger pads touch each other, return to open hand

Continue with each finger

*Hand*

*Alternate between hands, the relaxed hand rests on the leg*  
Make a fist and hold for about three seconds  
Open the fist and relax the hand for about three seconds  
Make a fist and rotate the wrist clock wise and counter-clockwise  
Make a fist and touch it to the opposite shoulder

*Arm and Hands*

"Picking Oranges"  
Stretch out arm and lean forward  
Make a fist and return hand to leg

"Climb up the Ladder"  
*Alternate between arms and continue for about 30-40 seconds*  
Hold arms above head  
Grasp rungs of imaginary ladder and "climb" as high as possible (remain seated)

### "Swimming"

Use breaststrokes as far as possible to the front, move arms to the side, then to the knees and to the front again

### "Push Hand to Opposite Knee" (*Alternate between arms*)

Place the palm of one hand on opposite knee and push down with hand, and upward with knee  
Hold for five seconds

### **Exercises with a Broomstick** (3-5 repetitions each)

#### *"Climb up and down the stick"*

Hold the stick vertically between your knees with your hands  
Take the stick at bottom with one hand and walk up and down the stick with alternating hands

#### *"Weight Lifting"*

Hold the stick with both hands horizontally with the palms up  
Lift the stick up and towards your head and return to original position

#### *"Wringing the Stick"*

Hold the stick with both hands horizontally with the palms down and about one foot apart  
Attempt to wring the stick moving one hand forward and the other back  
Hold for about 3-5 seconds and wring in the other direction

#### *"Canoeing"*

Hold the stick with both hands horizontally with the palms down and about one foot apart  
Start to paddle to either side with nice and big strokes

### **Decongestive Exercises for the Lower Extremity** \_\_\_\_\_

- Exercises should be performed wearing compression bandages or compression garments (except when exercises are performed in the water)
- Tight or restrictive clothing should not be worn while performing the exercises
- Exercises should be performed twice daily for about 10-15 minutes. The duration of the program should be increased slowly over a comfortable period of time
- Movements should be performed in a slow and controlled manner, and the musculature should be relaxed between each individual exercise. The relaxation phase should last at least as long as the time spent during the exercise

Exercises should be performed lying supine on the floor, preferably on a cushioned mat or other surface that maintains some firmness. Proper breathing techniques should be used throughout the session. To avoid back strain, a small pillow may be placed under the knees

### **Abdominal Breathing** (3 repetitions)

Place both hands on your belly  
Inhale deeply through your nose into your belly (feel how you breathe against your hands)  
Exhale through your mouth

*Perform breathing exercises as often as possible during the day*

**Foot and Leg Exercises** (3-5 repetitions each)

*Toe Clenches* (either alternating or with both feet at the same time)  
Curl your toes and squeeze for about three seconds  
Relax the toes for three seconds

*Spread the Toes* (either alternating or with both feet at the same time)  
Spread the toes as far as possible and hold for about three seconds  
Relax the toes for about three seconds

*Ankle Curls* (either alternating or with both feet at the same time)  
Flex the foot as far as possible at the ankle with the toes pointing away from the body (back of the knee remains on the floor)  
Hold for about three seconds  
Flex the foot as far as possible at the ankle with the toes pointing to the shin

Relax for about three seconds

*Ankle Rotation* (either alternating or with both feet at the same time)  
Rotate foot at the ankle, clockwise and counter-clockwise

*"Riding the Bike"* (for about one minute)  
Lying on your back, move legs in the air as if riding a bicycle  
(If you use a stationary bike, keep it on a low setting to avoid soreness or strain)

*Heel Sliding*  
Move the heel of your foot as close as possible to your buttocks  
Return to starting position and alternate the leg

*Hand and Knee Touch*  
Lift one knee and push the palm of the opposite hand against knee. Hold for about three seconds  
Relax for about three seconds and alternate sides

*Butt Lift*  
Bend the knees and place your feet flat on the floor  
Raise your buttocks off the floor and hold for about three seconds  
Bring the buttocks back to the floor and relax for about three seconds

**Walking**

Walking is a great exercise for lymphedema of the lower extremities and can be easily performed while you walk your dog around the block (if you have one). If you use a Stairmaster or treadmill, keep it on a low setting to avoid soreness or strain.

Remember to always try to walk with a normal gait. Do not drag the affected leg and avoid limping.

Additional Resources:

Stretching exercises - [video](#)

Arm Exercises (examples) - [video](#)

Arm Exercises with a Wand (examples) - [video](#)

Leg Exercises (examples) - [video](#)

Lymphedema People – [Exercises for Lymphedema](#)