Phase I Cardiac Rehab: After Your Heart Catheterization

Activity precautions and exercise program

This handout explains the activity precautions and exercise program you need to follow as you recover from your heart catheterization procedure.

Your procedure was on:

Date: _______________________

Follow the precautions given in this handout until after:

Date: _______________________

You have been referred for phase II (outpatient) cardiac rehab at:

Place: _______________________

Your Precautions

For your procedure, your doctor inserted a catheter into a blood vessel in either your arm or your groin. Please follow the precautions checked below to help your incision heal.

- Femoral (Groin) Artery Precautions

Your surgeon accessed a blood vessel in your groin. For the next 7 days:

- Do not lift anything that weighs more than 10 pounds. This includes groceries, laundry, children, pets, or other items. (A gallon of milk weighs almost 9 pounds.)

- Do not hold your breath or bear down with any activity. For example, do not strain with exercise or while using the toilet.

- Do not open tight jar lids, stuck windows, or heavy doors. Ask someone for help.

- Ask someone else to do chores such as vacuuming, mopping, digging, mowing the lawn, or other “heavy” housework.
Radial (Arm) Artery Precautions
Your surgeon accessed a blood vessel in your wrist. Please follow these precautions:

- **For 48 hours**: Do not lift, push, or pull anything with that arm. Do not use that arm to push up from a chair or pull yourself out of bed.

- **For 5 days**: Do not lift, push, or pull anything that weighs more than 5 pounds with that arm. (A half gallon of milk weighs almost 5 pounds.)

Your Exercise Program
While You Are in the Hospital
Your therapist will prescribe an exercise and walking program for you to start while you are in the hospital. It is important that you walk with staff 3 to 4 times every day. Activity will help:

- Your digestive, *respiratory* (breathing), and *circulatory* (blood vessel) systems recover from your procedure. This will help you:
  - Stabilize your blood pressure and reduce dizziness
  - Stop using extra oxygen
  - Improve your strength, balance, and energy
  - Improve your mood and help you sleep better at night
  - Ease constipation and nausea

When You Go Home
Remember, you cannot drive for 24 hours after your procedure.

When you leave the hospital:

- Keep doing the exercise and walking program that your therapists taught you.

- Your goal is to **be walking at least 30 to 40 minutes every day** by 6 weeks after your procedure.

To get the best results from your walking program:

- **Warm up before you walk and cool down afterward.** Stretch or do gentle exercises for at least 5 minutes before and after you walk. This will allow your heart and breathing rates to increase slowly before you walk and decrease slowly afterward. This helps your heart and muscles get the right amount of oxygen.
• Take many short walks every day, spread throughout the day. Slowly increase the amount of time you spend walking each day. To do this:
  
  – When you first get home, walk at least 3 times a day for 5 minutes each time. This is about the same amount of time that you walked while you were in the hospital.

  – Each week, increase the total time you exercise by about 3 minutes. Do this by adding 1 minute to each of your 3 daily walks until you are walking for a total of 30 to 40 minutes every day. Here is a sample walking program:

  **Sample Walking Program**

<table>
<thead>
<tr>
<th>Week #</th>
<th>Warm-up Exercises</th>
<th>Walk</th>
<th>Cool-down Exercises</th>
<th>Total Exercise Time</th>
<th>Goal Met?</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>5 min.</td>
<td>3 x 5 min.</td>
<td>5 min.</td>
<td>25 min.</td>
<td>☐</td>
</tr>
<tr>
<td>2</td>
<td>3 x 6 min.</td>
<td>3 x 7 min.</td>
<td>5 min.</td>
<td>28 min.</td>
<td>☐</td>
</tr>
<tr>
<td>3</td>
<td>3 x 8 min.</td>
<td>3 x 9 min.</td>
<td>5 min.</td>
<td>31 min.</td>
<td>☐</td>
</tr>
<tr>
<td>4</td>
<td>3 x 9 min.</td>
<td>3 x 10 min.</td>
<td>5 min.</td>
<td>34 min.</td>
<td>☐</td>
</tr>
<tr>
<td>5</td>
<td>3 x 10 min.</td>
<td>5 min.</td>
<td>5 min.</td>
<td>37 min.</td>
<td>☐</td>
</tr>
<tr>
<td>6</td>
<td>5 min.</td>
<td>5 min.</td>
<td>5 min.</td>
<td>40 min.</td>
<td>☐</td>
</tr>
</tbody>
</table>

  Note: If you cannot walk for exercise, talk with your physical therapist about the type of exercise that will work best for you. Follow the sample program above, but do your type of exercise instead of walking.

**Monitor Your Body**

For **6 weeks after your procedure, be active at a low to moderate level.** Pace yourself. Slow down or rest if you are breathless, dizzy, cannot talk, or are perspiring.

Your physical therapist will teach you different ways to monitor how hard your body is working. These include:

• **Taking your pulse.** Your pulse will tell you how hard your heart is working. For the first 2 weeks after your procedure, make sure your pulse does not increase more than **20 to 30 beats per minute** above your resting heart rate.

  Check your pulse at rest before you start, during, and after exercise. To do this:

  – Use your index and middle fingers (not your thumb) to find your pulse on the inner part of your wrist, just above your thumb. If you cannot find your wrist pulse, gently find the pulse on one side of your neck. Do not press hard. Pressing too hard could reduce blood flow to your head and make you feel dizzy or faint.
- Count the beats for 1 minute.

- Subtract your normal resting heart rate from your pulse taken during and after exercise to see how much your heart rate has increased.

- **Monitor your rate of perceived exertion (RPE) on a scale of 0 to 10.** When you are active, think about how hard you are working, or how much effort it takes for you to keep doing the activity you are doing. Rate your effort on a scale of 0 to 10, with 0 being lowest exertion and 10 being highest exertion. If you are working between levels 2 and 4 on a scale of 0 to 10, you are exercising at a low to moderate level (see table on page 6, “Effort Level”).

- **Talk to someone while you exercise.** Use your rate of breathing to guide how hard you are exercising. When exercising or walking, you should not be so out of breath that you cannot talk with someone.

- **Pay attention to your body.** Reduce your activity during exercises and daily tasks (such as dressing, bathing, grooming, and household chores) if you:
  
  - Have an increase in heart rate (pulse) of more than 20 to 30 beats above your resting heart rate, or if your RPE is greater than 4 during the activity
  
  - Keep having a high heart rate for 10 minutes after you stop exercising
  
  - Are breathless for longer than 10 minutes after you stop exercising
  
  - Have fatigue (extreme tiredness) or notice increased swelling in your legs or feet up to 24 hours after you exercise
  
  - Have pain or cramping in your leg muscles
  
  - Have pain in your joints, heels, or shins

**Tip:** To help save your energy, sit to take a shower and to do other activities that you usually stand to do.

- **Stop exercising** and talk with your doctor before starting again if you:

  - Have an abnormal heart rhythm – an irregular pulse, *palpitations* (a rapid, fluttering, or pounding heart), sudden very slow pulse, or a sudden burst of rapid heartbeats
  
  - Have new or ongoing pain or pressure in your chest, back, arms, or throat
  
  - Feel dizzy, lightheaded, or faint
  
  - Lose coordination, have changes in your vision, or become confused
  
  - Have cold sweats or become pale
  
  - Have nausea or vomiting
When at home, if you need medical care right away, call 911.

Phase II Cardiac Rehab
Most people who have heart procedures start phase II cardiac rehab 2 to 6 weeks after discharge.
The staff at the cardiac rehab facility you have chosen will help you safely increase the intensity and duration of your exercises. Your goal is to be able to do your exercise program on your own. Keep doing your walking program on the days you do not go to cardiac rehab.

Choose a Heart-Healthy Lifestyle
The American Heart Association advises people with heart disease to choose a lifestyle that supports heart health. This includes:

- Taking the medicines your doctor prescribes, on time and as directed
- Being active
- Being careful about what you eat and drink

To support your heart’s health:

- **Quit smoking.** Quitting smoking can improve the health of your heart and blood vessels and help your heart disease symptoms improve.

- **Maintain a healthy weight.** Staying at a healthy weight lowers your risk of diabetes, high blood pressure, high cholesterol, and high triglycerides. A healthy weight reduces the burden on your heart and can keep heart disease from getting worse.

- **Eat a healthy diet.** Eat a diet that is high in fruits, vegetables, whole grains, nuts, low-fat dairy products, and fish (instead of other types of meat). Avoid foods that are high in sugar, sodium, and unhealthy fats (saturated or trans fats).

- **Reduce stress in your life.** Plan ahead, slow down, and make time to connect with friends and family. Try not to worry about things that you cannot change.

American Heart Association Resources
Visit the American Heart Association website at www.heart.org for ideas and inspiration to help you stay active and healthy. From the menu bar, click on “Healthy Living” and then “Fitness.”
**Exercise Intensity Guidelines**

For 6 weeks after your discharge, it is important that you **work at a low to moderate level** to help your heart recover. To judge the correct level of *exertion* (effort), rate your effort on a scale of 0 to 10, with 0 being least effort and 10 being greatest effort.

The table below shows the Rate of Perceived Exertion (RPE) scale. You are exercising at a low to moderate level if you are working **between levels 2 and 4 on the scale of 0 to 10**. The area outlined in bold halfway down the table is your Goal Training Zone.

### Effort Level (RPE)

<table>
<thead>
<tr>
<th>RPE</th>
<th>Work Load</th>
<th>Talk Test</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>Very, very light</td>
<td>At rest</td>
</tr>
<tr>
<td>1</td>
<td>Very light</td>
<td>Gentle walking or strolling</td>
</tr>
<tr>
<td>2</td>
<td>Fairly light</td>
<td>Steady pace, not breathless</td>
</tr>
<tr>
<td>3</td>
<td>Somewhat hard</td>
<td>Brisk walking, can hold a conversation</td>
</tr>
<tr>
<td>4</td>
<td>Hard</td>
<td>Very brisk walking, must take a breath every 4 to 5 words</td>
</tr>
<tr>
<td>5</td>
<td>Very hard</td>
<td>Cannot talk and keep pace</td>
</tr>
<tr>
<td>6</td>
<td>Very, very hard</td>
<td></td>
</tr>
</tbody>
</table>


### Your Questions Are Important

While you are in the hospital, your physical therapist will answer your questions about exercise. If you have questions or concerns about exercise after you leave the hospital, talk with your outpatient cardiac rehab provider, outpatient physical therapist, or main care team.