

Exercise and Post Polio Syndrome

FACT SHEET



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Post Polio Syndrome (PPS) is a condition that affects many polio survivors. Decades after contracting the polio virus, individuals may begin to experience new weakness, pain and fatigue. Managing these new symptoms differs for each person. It is recommended that polio survivors seek treatment from specialists familiar with Post Polio Syndrome.

Exercise is an important part of treatment. Researchers found that individuals with Post Polio Syndrome who engage in regular physical activity reported a higher level of function and fewer symptoms than those who were not physically active.

General Strengthening Exercise Guidelines

- Exercise should not cause muscle soreness or pain
- Exercise should not lead to fatigue that prevents participation in other activities that day or the days following
- Strengthening exercises should only be attempted with muscles that move through their full range of motion
- Minimal to moderate intensity exercise is generally recommended
- Progression of exercise is slow especially in those muscles that have not been exercised for a period of time or have chronic weakness from the initial polio virus

Aerobic Exercise

Aerobic exercise is recommended for most individuals with Post Polio Syndrome except when there are complaints of overwhelming fatigue. It is important to find the best type of activity to safely achieve a cardiovascular benefit.

Aerobic exercise should not cause muscle fatigue, generalized fatigue, muscle soreness or pain.

- Duration:
 - ◊ Aerobic activity is recommended 3-4 times per week building up to a total of 30 minutes each session.
- Mode of exercise:
 - ◊ Walking over ground or on a treadmill may be recommended for individuals who do not have symptoms of leg weakness or pain.



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- ◇ An upper body ergometer (UBE) or arm bike may be recommended when the arms are strong but there are symptoms of leg weakness.
- ◇ A stationary bike may be recommended when arm weakness is the primary problem, or balance problems limit safe walking.
- Intensity:
 - ◇ Light to moderate intensity

Aquatic Exercise

Water exercises in a warm pool can improve pain, endurance and reports of wellbeing.

- Water exercises are used for strengthening, flexibility and aerobic exercise.
- People with PPS must use caution in the pool to avoid overuse and fatigue. Water can make the limbs and trunk feel weightless but it can also

Stretching

Flexibility is important for improving muscle length and joint range of motion for daily activities such as reaching and walking.

Stretching exercises can help to:

- Manage pain
- Improve flexibility
- Reduce risk of osteoporosis
- Reduce risk of falls

Special Considerations

- When fatigue is significant, lifestyle changes to conserve energy may be a priority before starting an exercise program
- When weakness is significant, strengthening may not be recommended as it can further damage affected muscles.
- Stretching and aerobic exercise should be considered whenever possible.

Exercise is an important part of treatment for individuals with PPS but should not cause fatigue, muscle soreness or pain. If these symptoms are experienced, consult with your physical therapist to modify the prescription.

For further information and resources, go to <http://post-polio.org/>.



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