

# Stroke Recovery Tips

[www.stroke-rehab.com](http://www.stroke-rehab.com)

## EXERCISES TO IMPROVE WALKING AND GAIT SPEED



For the stroke patient who is already walking but wants to improve speed of walking or the ability to make transitional movement, it is important to vary the routine and incorporate a variety of exercises. Transitional movement involves changing from one position to another. Examples of transitional movement include getting up and down, making turns, navigating up or down a step, changing directions, etc.

In order to improve gait speed and transitional movement, it is a good idea to incorporate exercises that are challenging. Some examples would include stair stepping, dance moves, walking over uneven surfaces, side stepping, walking backwards, getting up and down from the floor, and climbing up/down hills. Other activities to incorporate into the exercise

routine would include walking on a treadmill or riding a stationary bike at various speeds as well as including strengthening exercises to help weak musculature. Obviously some of these exercises may be too hard for some patients so it is important to consult with your own therapist to see what exercises may work for you.

By incorporating a good mix of exercises, you challenge your body more similar to the way that it is used in real life. If you simply do leg raises, knee extensions, and foot circles with ten minutes of riding a stationary bike, you are in no way challenging yourself to experience the situations you come across in real life. Such situations include navigating curbs or stairs, walking over uneven grass/dirt, going up/down a ramp or stairs, holding a door open while trying to walk

through it, getting up off the floor or a low seat, bending down to get something off the floor or out of the closet, etc. Our body does not simply move in a linear patterns walking only forward. There are twists and turns involved requiring complex patterns of movement.

It is important to challenge yourself and talk to your therapist about making sure your therapy program is challenging enough. For some ideas of exercises to improve gait, I recommend looking over the [FAME program](#) from the University of British Columbia. The exercises are meant for a group exercise program with supervision from an instructor, but the exercises presented would be beneficial even to an individual as long as adequate assistance is given. Remember to check with your therapist before trying any new exercises as the exercises may not be appropriate for you.

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## Finding a Gym for Stroke Patients

Some stroke patients recover enough to return to working out at a regular fitness facility, however, there are many stroke patients that cannot use a regular gym due to their physical limitations. Fortunately, there are gyms that are solely designed to help individuals with physical handicaps or traditional gyms that have incorporated equipment for the disabled into their gym.

After being discharged from physical and occupational therapy services, it is important to keep exercising and to continue to work on recovery. Many patients, however, feel that they cannot get a good

workout at home due to lack of equipment. This is why a gym can offer so much to the stroke patient. In order to find a gym or adaptive sports center in your area, you should search online for adaptive fitness centers. Many universities and city programs offer adaptive fitness centers or programs so research these entities as well.

Some stroke patients may have limited grip and need some type of grip assistive device to be able to use gym equipment. You can find grip assist products at the following websites:

<http://gripeeze.com/>

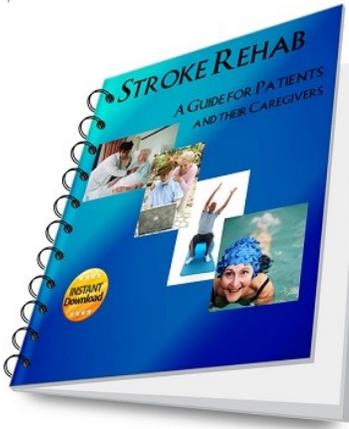
<http://www.easierliving.com/holding-mitt.html>

<http://www.lwgripgloves.com/>

<http://www.activehands.com/>

If you cannot locate an adaptive fitness center in your area, it may be worth approaching your regular gym facility and see if they would be willing to buy some equipment that could be used by individuals that are physically impaired. They may be willing to do so especially if there are several individuals who indicate a need for such services.

I have included a list of adaptive fitness centers that are located in various US Cities and other countries on the next page.



**Stroke Rehab e-book:  
A Guide for Patients and their  
Caregivers**

*Exercise photos included*

Visit

<http://www.stroke-rehab.com/stroke-rehab-e-book.html>

## Finding a Gym for Stroke Patients, cont.

Adaptive Fitness Centers:

**Chicago:** <http://www.ric.org/services/sports-and-fitness/>

**Dallas/Fort Worth:** <http://www.neurofitnessfoundation.com/>

**England(website gives location of inclusive gyms in England):** [http://www.efds.co.uk/inclusive\\_fitness](http://www.efds.co.uk/inclusive_fitness)

**Glendale, AZ:** <http://www2.gccaz.edu/academics/departments/fitness-wellness/adapted-fitness>

**Englewood, Colorado:** <https://craighospital.org/programs/the-peak-center>

**Golden Valley, Minnesota:** <http://www.allinahealth.org/Courage-Kenny-Rehabilitation-Institute/Golden-Valley/>

**Maryland:** <http://www.therafitgym.com/>

**Milwaukee:** <http://www.tacwi.org/>

**Peabody, Massachusetts:** <http://ymcamentronorth.org/locations/torigian/>

**Phoenix:** <http://ability360.org/>

**Redwood City, California:** <http://www.adaptivepevmc.org/pe/AdaptivePE.html>

**San Diego, California:** <http://fitnessclinic.sdsu.edu/>

**Santa Ana, California:** <http://www.ocgoodwill-fitnesscenter.org/about/>

**Victoria, BC, Canada:** <http://moveadaptedfitness.ca/>

**Washington D.C./Northern Virginia:** <http://www.devonpalermoinc.com/services-and-rates>

**White Plains, New York:** <http://www.burke.org/docs/FIT%204%20LIFE%20STROKE%20PACKET.pdf>

## ATAXIA

Ataxia means without coordination. It can occur after stroke and may affect various body parts including the eyes, hands, arms, legs, body, and speech. Ataxia is most common after a cerebellar stroke and can be identified by wide and unsteady gait, the inability to perform rapid alternating movements, incoordination of the limbs, slurred speech, difficulty swallowing, jerky movement, and impaired balance.

According to an article from the Center for International Rehabilitation Research Information and Exchange, ataxia treatment should focus on improving body awareness through proprioceptive input (input of sensation to joints and muscles through various techniques such as compression, vibration, plyometrics, resistance, etc), improving stabilization

of the body first proximally (e.g. in the trunk) and then distally (e.g. in the extremities), improving dynamic stabilization/gait, decreasing dizziness through vestibular exercises, and educating about compensatory techniques. Furthermore, training should involve first trying to perform exercises consciously and then later more automatically, progressing from simple to more difficult exercises, and working first proximally then distally at the extremities.

When determining the factors contributing to ataxia, various systems should be evaluated including the proprioceptive, visual, and vestibular systems and attention should be given to the areas of the brain damaged during stroke. Cerebellar damage can result in symptoms such as over or

undershooting when reaching for an object, tremors, jerky movements, dysarthria (incoordination in mouth musculature leading to slurred speech), abnormal eye movements, weakness and fatigue. Frontal lobe damage can lead to difficulty standing straight, legs scissor crossing when walking, and problems with leaning backwards.

To find out more about ataxia and treatment options, you can visit the following websites:

<http://cirrie.buffalo.edu/encyclopedia/en/article/112/#s9>

[www.ataxia.org](http://www.ataxia.org)

[www.LivingWithAtaxia.org](http://www.LivingWithAtaxia.org)

[www.ataxia.org.uk](http://www.ataxia.org.uk)

[www.ataxia-awareness.com](http://www.ataxia-awareness.com)



## CAREGIVERS' CORNER – Home Alone or Not?

As a caregiver, you may wonder if it is okay to leave your loved one alone or not. Sometimes, out of necessity, you may leave your loved one alone although it may not be the best decision. How can you determine if your loved one is safe to be left alone for short periods of time? Here is a checklist to help you determine the answer to this question.

1. Can your loved one exit the house in case of emergency such as fire or gas leak? If not, is there a neighbor close by that they can call to come get them out of the house quickly?
2. Will they stay home and not wander off?
3. Can they identify danger signals such as smoke alarms going off?
4. Can they contact emergency services on their own?
5. Do they have the judgement to stay home alone (e.g. will they avoid answering the doors to strangers, will they avoid using the stove if it's unsafe?)
6. Can they get to the bathroom without help?
7. If home for more than just a few hours, can they prepare food to eat?
8. Do they frequently have medical emergencies that require assistance (e.g. seizures)
9. If in a wheelchair, will they stay in their wheelchair if they are a high fall risk?

If you are thinking of having your loved one live alone, then there are even more questions to consider such as:

1. Can they safely bathe and dress?
2. Can they take their medication correctly?
3. Can they get around the house safely?
4. Can they manage their finances or have someone to do it for them?
5. Will they be able to prepare meals?
6. Can they safely drive or do they have someone that can transport them?
7. Is there someone who can check on them if necessary?
8. Can the person maintain their home (e.g. laundry/cleaning)?
9. Have the appropriate adaptations been made to their house for them to live safely (e.g. is there a ramp if needed, is there a shower bench if needed, are the doors wide enough for a walker if necessary, have items been adapted for low vision if this is an issue)
10. If they go outside, are they able to get back in?
11. Are they steady on their feet? If not do they have the appropriate assistive device (e.g. walker, wheelchair) to prevent them from falling, and do they use it?
12. Do they keep their body clean or do they avoid showering and hygiene?

Some items on these lists can be addressed and the person still be able to live alone. For example, a caregiver can come three times a week to help an individual with cleaning, laundry and showering. Meals can be prepared and put in microwaveable dishes for the person so that they only need to heat them instead of cooking. Medications can be put into weekly dispensers for the patient so that they only have to open the container and take their medicine for that day instead of trying to sort the meds. Alert bracelets or necklaces can be used if there is concern about getting to or using a phone. Cleaning and yard services can be hired. A loved one can be in charge of managing finances or getting groceries. Home adaptations can be made to make a house safe. Local transportation services can be used to get from one place to another.

Sometimes caregivers are afraid to approach their loved one and discuss the issue of discontinuing to live alone, but if you feel your loved one is unsafe, you must take the initiative to protect them. This is especially true if they lack insight into their disability or have cognitive issues (e.g. memory loss, decreased problem solving). Change is hard for individuals, but safety should always come first.