



Understanding Ataxia

A Neuro Physical Therapist's Guide for
Patients and Families



Defining Ataxia

Ataxia = Impaired Coordination

Ataxia Impacts:

- Timing of movement
- Accuracy of foot and hand placement
- Balance during movement

Goal is to improve consistency and control of movement



Why Does It Happen?

Difficulty with control, not strength

Cerebellum is a movement coordinator

- **Timing**
- **Accuracy**
- **Coordination**
- **Smooth Movement**
- **Balance**

If injured, movements become less accurate



Symptoms

How Ataxia Affects Each Item

Walking

- Wide base of support
- Staggering
- Difficulty turning

Upper Extremities

- Hand tremor
- Difficulty writing

Speech

- Slurred speech

Vision

- Blurred vision during movement
- Nystagmus

Daily Tools

Rehab Approaches to Incorporate at Home

High
Repetitions

Balance
training

Coordination
Exercises

Proximal
Strengthening

Walking

External
Cuing

Proximal Strengthening

Foundation of Control

Targeting:

- Core
- Hip muscles
- Pelvis
- Trunk Extensors

Proximal strengthening does NOT directly fix ataxia or improve coordination.

- Reduces risk of loss of balance
- Improves ability to recover from sway
- Improves stability for transfers and standing

Examples of Exercises

Not All Exercises Need to Be Completed In Standing

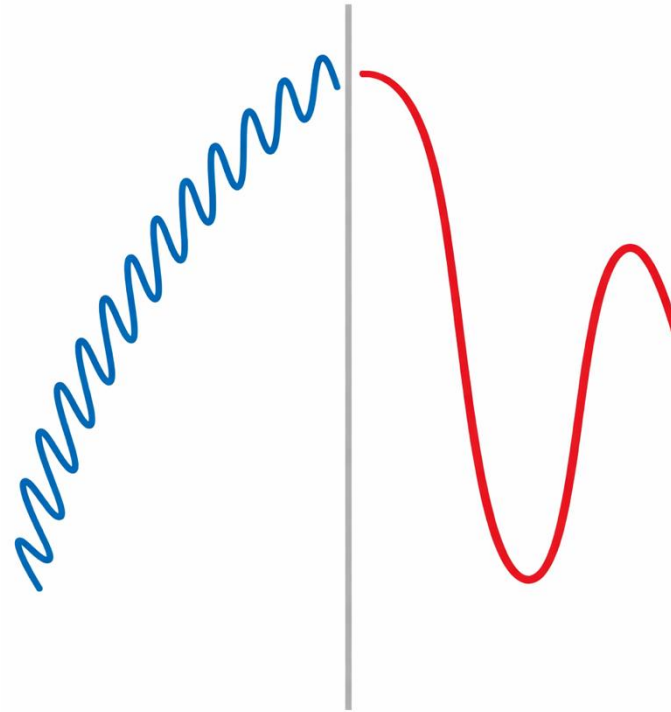


Target Based Coordination Training

Foot and hand placement

- Target Stepping
- Tracing
- Segmented walking
- Reaching to objects

Goal: Improve spatial accuracy and reduce overshooting



External Cuing

Safety First at Home

Using **outside signals** to guide movement:

- Visual cues
- Auditory cues

Examples:

- Floor tape or markers for stepping
- Lines on countertops for reaching
- Mirrors for visual feedback
- Metronome or rhythmic counting for walking
- Verbal cues (“slow, step, pause”)



Balance Training

The best way to improve walking is by practicing walking

Examples:

- Standing with different foot positions
- Weight shifting side to side or forward/back
- Perturbation training
- Reaching while standing
- Stepping in different directions
- Walking while changing speed or direction



Safety Tip: Perform Exercises in a Corner with Chair in Front

Walking

The best way to improve walking is by practicing walking

- Slow and controlled > fast
- Practice variety
 - Different speeds
 - Turning
 - Obstacle negotiation
 - Community walking



Factors that Can Worsen Ataxia

Safety First at Home

- Fatigue
- Fast movements
- Dual tasking too early
- Anxiety/stress
- Poor sleep
- Alcohol
- Sedating medications
- Visual overload



Special Offer for All Webinar Attendees

Email reminder will be sent out following webinar — code will be valid for 1 week.

Discount code: RachelPT50

**Get 50% off your first month of the remote neuro recovery program.*

Sign up at flintrehab.com/neuro-recovery-program/

If you want expert guidance, structure, and support to continue progressing at home, this program was designed for you.

Questions? Email me at: rhigdon@flintrehab.com

