Energy Conservation in Nultiple Scierosis

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I have no financial disclosures or conflicts of interest

Objectives

We will discuss the following:

- Effects of MS on energy
- Energy conservation strategies
- Monitoring fatigue
- Importance of recovery-what does this look like?
- Use of exercise to improve energy level and activity tolerance

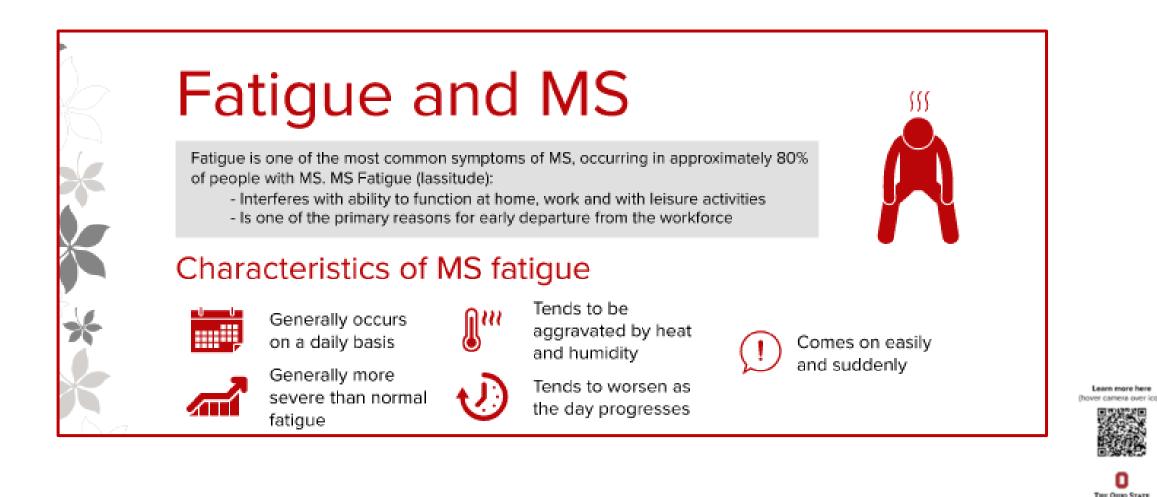
What is Fatigue and how does it relate to energy conservation?¹⁻²

Fatigue is the most commonly reported symptom among those with MS

Fatigue is reported in 50-90% of those living with MS Fatigue may interferee with activities of daily living as well as work, exercise, and overall quality of life

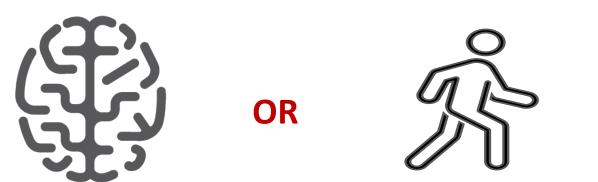
Fatigue is: "the subective lack of physical or mental energy" to complete a specific activity

What does fatigue look like in MS?



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What is making me feel fatigued?



Do I get more mentally or physically fatigued? Or both?

Planning Meals/Grocery list	Laundry
Reading	Cooking
Talking to family/making plans	Cleaning
Driving	Grocery Shopping
Paying Bills	Bathing/dressing



Try to plan and **Prioritize**

prioritize activities that you most need to and want to accomplish

Take rest breaks (can be active) to allow for recovery

Allow for Rest

Utilize relaxation, physical activity for more mental breaks, cognitive activities for a physical break Plan Alternate activities that fatigue you either more **mentally** or physically

Consider the environment **Plan activities** around heat, weather, or other factors that increase your fatigue



Energy Conservation Strategies³

How to save energy even when your to-do list is long

Sit while performing activities when able

 folding laundry, cooking, making a list Use an assistive device or bracing if it has been prescribed to you

• These can help with efficiency of movement and safety (grabber, cane, walker, etc) Set up your home/office so there are chairs or places to rest throughout



Try to minimize trips, consolidate related objects

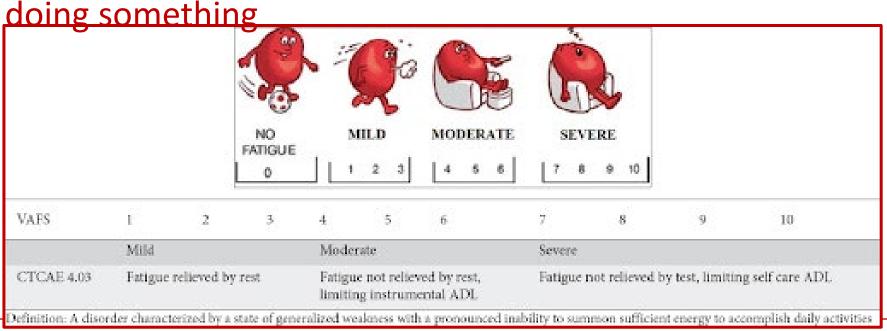




Take time to stay safe! Rushing and changing speeds quickly will ultimately take more time and may put you at increased risk of falling

How to monitor fatigue⁴

- Knowing how tired you are before and after a specific activity can be helpful for deciding when you may need a break
 - If you know a specific activity is very tiring or at a certain time of day you are always more tired, try to monitor how tired you are with this scale to determine if you may need to rest before/after



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Consider low-moderate activity to decrease fatigue

- Fatigue can limit the day-to-day activities you are able to perform, but exercise can improve fatigue in the moment and over time improve endurance
 - Consider seated or supine exercises versus standing exercise depending on fatigue and exertion





Additional Resources

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- **Physical therapy** can help with prescription of appropriate activity and exercise as this may look different for everyone regarding time of day, effect on symptoms, intensity, and duration of activity
- If you are having trouble with memory/cognitive difficulties in planning your day, **Speech therapy** may be helpful



 If more fine motor activities are tiring or difficult, or you have difficulty with specific activities of daily living, Occupational therapy may be helpful for building strength, endurance and providing specific energy conservation strategies

References

1. Brenner, P., & Piehl, F. (2016). Fatigue and depression in multiple sclerosis: Pharmacological and non-pharmacological interventions. *Acta Neurologica Scandinavica*, 134, 47–

54. <u>https://doi.org/10.1111/ane.12648</u>

2. Kratz, Anna L. PhD; Atalla, Mareena BS; Whibley, Daniel PhD; Myles, Abigail PT, DPT; Thurston, Taylor PT, DPT; Fritz, Nora E. PT, PhD, DPT, NCS Calling Out MS Fatigue: Feasibility and Preliminary Effects of a Pilot Randomized Telephone-Delivered Exercise Intervention for Multiple Sclerosis Fatigue, Journal of Neurologic Physical Therapy: January 2020 - Volume 44 - Issue 1 - p 23-31 doi: 10.1097/NPT.00000000000296

3. *Life with MS*. National MS Society. (n.d.). Retrieved December 6, 2021, from <u>https://msfocusmagazine.org/Magazine/Magazine-Items/Energy-Conservation-and-Work-Simplification-for-Pe.aspx</u>.

4. Jiang, Z. (2016). Role of methylphenidate in the treatment of fatigue in advanced pancreatic cancer population. *Annals of Gastroenterology*. <u>https://doi.org/10.20524/aog.2016.0065</u>

