

Lesson 12 Sleep, Stress, & Nutrition





Why Do We Need Sleep?

Sleep allows the body and mind to recover and recharge. Getting enough sleep each night helps your body fight disease and illness. Sleep also allows your muscles to recover after exercise or injury. Quality sleep can also improve your mental health, leading to improved focus and mood.

Most of us need 7 to 9 hours of sleep each night. When we don't get enough sleep, we are at an increased risk of weight gain, diabetes, heart disease, and depression. Lack of sleep may also increase the risk of falling or having an accident.

The Science of Sleep

We all have an internal clock that controls when we feel tired and when we feel awake. This clock works on a 24-hour cycle known as the circadian rhythm. Melatonin and cortisol are two hormones that help regulate the circadian rhythm.



Melatonin is released in the evening, when the sun begins to go down, and tells the brain that it is time to go to sleep.



Cortisol is released in the morning, when the sun rises, and tells the brain that it is time to wake up.

Once we fall asleep, our bodies cycle through four stages of sleep. The first three stages are known as non-rapid eye movement (NREM) sleep, followed by the final stage known as rapid eye movement (REM) sleep. NREM sleep relaxes your muscles, slows your heart rate, and slows brain waves. REM sleep often happens about 90 minutes after falling asleep and is when dreaming occurs. REM sleep is important because it turns on the areas of the brain that help in learning and memory.



How Aging Affects Sleep

Sleep cycles tend to change as we age because we produce less and less melatonin, making it more difficult to fall asleep. It is estimated that almost 50 percent of older adults have trouble falling asleep. Older adults also spend less time in REM sleep and tend to wake up more often throughout the night. Sleep medications are common for older adults. However, these medications can harm your health and memory if used for extended periods of time. Please speak to your doctor and care team before starting a new sleep medication or changing the dose of a current sleep medication.

Review the tips below to discover how you can get a better night's sleep without the use of sleep medications.

Small changes for better sleep

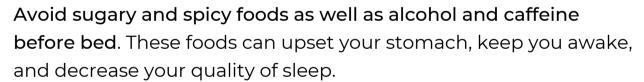


Avoid screens (computers, phones, television) before bedtime. The light from screens can lower melatonin levels and make it

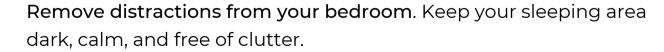
harder to fall asleep.



Avoid big meals right before bed. Indigestion is more likely to happen when you are lying down.



Limit the amount of fluids you drink before bed. You may find yourself needing to get up to use the bathroom throughout the night which can disrupt your sleep.





Keep the room cool. It is easier to fall asleep and stay asleep when the room is 65-68 degrees F. Try opening windows, adding a fan, or turning the heat down at night.



Some foods and drinks have been shown to help promote sleep.

Review the following list and think about which foods you can start incorporating into your nighttime routine.



Kiwi, also known as kiwifruit, has been shown to help improve sleep when eaten about an hour before bedtime.

Tart cherries and tart cherry juice contain melatonin and help improve sleep time and quality of sleep.



Fatty fish like salmon or tuna can help improve sleep when eaten three times a week.

Nuts like almonds, walnuts and cashews contain essential minerals known to help with insomnia and trouble falling asleep.





Chamomile tea, along with other decaffeinated warm beverages, can help improve sleep when consumed before bedtime.

Learn more about how stress effects your health on the next page!



As we age, our stress levels can increase due to things such as illness, money concerns, losing loved ones, or family challenges.

We can't eliminate stress, but we can manage it by being aware of what stress does to our bodies.

How Does Your Body Respond to Stress?

Our bodies naturally respond to stress. There are physical stressors (like a car accident or being chased by an animal) and mental stressors (like a work deadline). But, our body treats all stress the same way.

When you feel stress, your body makes "stress hormones" such as adrenaline and cortisol. These hormones can cause changes such as:

- Increased heart rate
- Higher blood pressure
- Increased blood sugar
- Slower digestion
- Weaker immune system

These changes will last until your brain no longer senses stress.

Both physical and mental stress are common and can go on for long periods of time. If stress continues for a long time without stopping, there can be long-lasting effects.

For immediate stress relief, try Four Count Breathing

- Take a breath in for four counts, pushing your belly out.
- Hold that breath for four counts.
- Release your breath for four counts.
- Repeat for at least 10 breaths.



Health problems linked to chronic stress:



Heart disease



Asthma



Diabetes



Depression



Headaches



Stomach issues

Emotional Responses

Here are some common emotions you may feel as a result of stress:

Restless

Afraid

Frustrated

Upset

Anxious

Tense

Distracted

Forgetful

Physical Responses

Here are some common ways that stress may show up for you as a physical response:

Not feeling hungry
Feeling hungry all the time
Problems sleeping
Needing to use the
bathroom often
Feeling tired
Headaches
Body aches and pains

Ways to Manage Stress



Talk it Out

Sharing with a friend or family member can really help to work through difficult emotions. You can find support groups to help with stress caused by grief, caregiving, or other life issues. Working with a care manager, counselor, or therapist can be helpful too. Remember, everyone feels stress and you are not alone.



Make Time for Fun

Doing the things you love and having fun is a natural stress reliever. Laughing can relax your muscles, increase blood flow, and improve mood.



Relax and Breathe

There is nothing more stressful than when someone says "just relax." But, there are some tools you can use to relieve stress and feel more relaxed. Guided meditation, gentle stretching, yoga, writing in a journal, and expressing gratitude are all proven stress relievers. Many of these are free and available online!



Stay Active

Exercise increases "feel-good hormones" called endorphins. Moving your body can boost your mood and energy level. It can help your brain work better. In upcoming lessons, we will explore ways to include more movement in your day.



Nourish Your Body

Foods with a lot of vitamins and minerals (like fruits, vegetables, whole grains, nuts and seeds) nourish your body. When your blood sugar stays constant throughout the day it is much easier for your body to manage stress.



From Lesson To Reflection



After reading over this lesson, it is time to reflect on how you're handling sleep, stress, and nutrition in your life. Use the space below to answer some questions to help you develop a plan of action moving forward.



- How much sleep are you getting each night?
- What is one thing you can add to your nighttime routine to help you sleep better?
- What makes you feel stressed?
- How do you think your body responds to stress physically and emotionally?

What helps you manage your stress now?					