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Mindfulness for Your Health

The Benefits of Living Moment by Moment

Paying attention to what's going on right this second can be hard. We often spend more time thinking about what's coming up in the future. Or dwelling on things in the past we can't change. We can miss out on experiencing the present.

It's possible to train yourself to focus on the present moment. You become aware of what's going on inside and around you—your thoughts, feelings, sensations, and environment. You observe these moments without judgment. This is called mindfulness.

"We're looking at our thoughts and feelings with curiosity, gentleness, and kindness," explains Dr. Eric Loucks, director of the Mindfulness Center at Brown University.

Mindfulness has its roots in Buddhist meditation. Meditation is a practice that aims to increase awareness of the mind and concentration.

In recent years, mindfulness has become a household term. Mindfulness programs are now commonly found in schools, workplaces, and hospitals.

Mindfulness can involve a sitting meditation that's practiced in a quiet space. In this practice, you focus on your breathing or sensations in your body. If your mind wanders—like thoughts popping in about things you need to do—you try to return your mind to the present moment.

But mindfulness doesn't have to



be done sitting still or in silence. You can integrate the practice into things you do every day, like walking or eating. You can also be mindful while interacting with others.

Health Benefits of Mindfulness • Studies suggest that focusing on the present can have a positive impact on health and well-being.

Mindfulness-based treatments have been shown to reduce anxiety and depression. There's also evidence that mindfulness can lower blood pressure and improve sleep. It may even help people cope with pain.

"For many chronic illnesses, mindfulness meditation seems to improve quality of life and reduce mental health symptoms," says Dr. Zev Schuman-Olivier of Harvard University.

One of the first mindfulness-based therapies was used for depression. Many studies have shown that it can be effective for some people.

Mindfulness appears to help with depression in two ways. First, it helps you develop the ability to stay grounded in the present, explains Dr. Sona Dimidjian of the University of Colorado Boulder. She studies the use of mindfulness-based treatments to prevent relapse of depression, including among pregnant women.

With depression, "your attention can get hijacked into the past or future," she explains. You spend time focusing on past negative

experiences or worrying about things to come.

Second, mindfulness can help you "de-center" from such thoughts. "It's like being able to sit on the riverbank and watch thoughts floating by like leaves on a stream," Dimidjian says. "Developing the skill of mindfulness can help stop you from being pulled into any one thought and carried down the stream. People often experience thoughts like, 'nothing ever works out for me,' or 'it's always going to be this way. Over time, and with practice, you can develop the ability to stand back from these painful thought patterns.'"

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Researchers are now studying whether mindfulness training can help with a variety of other conditions, including PTSD, eating disorders, and addiction.

Schuman-Olivier is looking at whether mindfulness can help reduce anxiety among people being treated for opioid use. This could help prevent relapse.

Developing Healthy Habits • Being mindful may also help you make healthier choices. Loucks's team at Brown created an eight-week mindfulness program for people with high blood pressure.

They studied whether the program increased participants' awareness of their habits. This included how they ate. The study found that participants chose a healthier diet after taking the course.

You can bring mindfulness to your eating habits, too. Studies suggest that it can help reduce binge eating and emotional eating. Paying closer attention to your body can help you notice signals that you're full and help you better enjoy your food.

This body awareness seems to be one part of how mindfulness

helps people adopt healthier habits. If you've just eaten a jelly donut, you may be more likely to notice an unpleasant sugar crash, Loucks explains. Remembering this can help you to make better food choices in the future.

This goes for positive feelings too. "With physical activity, just about everybody feels better afterwards. So, with mindfulness training we're aware of it improving our mood, and then we can use that reward to actually train ourselves," Loucks says.

Mindfulness may also help with setting a goal. "We can place our mind on being more active or eating more fruits and vegetables. And if we place our intention there, it may be more likely that we're going to carry through and make it happen," Loucks explains.

Learning To Be Mindful • If you want to practice mindfulness, there are many online programs and apps. But they're not all created equal. Experts suggest looking for resources from medical schools and universities. Check to see if they're evidence-based.

Dimidjian's team developed an eight-week self-guided online mindfulness program. Her studies showed that the program helped reduce symptoms of depression more than a standard treatment alone.

"If you end up having difficulty with an app, though, don't take it personally or think that you're somehow bad at mindfulness, or it's not meant for you," Schuman-Olivier says. You can also try finding a teacher or someone with the skills to guide you in mindfulness training.

And just like any skill, mindfulness takes practice. "Just because something is simple, doesn't mean that it's easy," Dimidjian says.

Mental training can take time and dedication. Aim for a few minutes of



Wise Choices

Being Mindful

Becoming more mindful requires practice. Here are some tips to help you get started:

- **Take some deep breaths.** Breathe in through your nose to a count of 4, hold for 1 second and then exhale through the mouth to a count of 5. Repeat often.
- **Enjoy a stroll.** As you walk, pay attention to your breath and the sights and sounds around you. If thoughts and worries enter your mind, note them but then return to the present.
- **Practice mindful eating.** Be aware of taste, textures, and flavors in each bite. Listen to when your body is hungry and full.
- **Do a body scan.** Bring your attention to how each part of your body is feeling. This can help you connect with your body.
- **Find mindfulness resources** including online programs and teacher-guided practices.

mindfulness each day to start.

A body scan meditation can be a good way to connect with your body. It helps make you aware of how your body feels as you mentally scan from head to toe.

Start in a comfortable position with your eyes closed. Take several deep breaths. Then, notice your feet. How do they feel?

Let your scan travel up your body—legs, stomach, arms, hands, neck, and finally, head. Notice any sensations or discomfort. Try not to change or judge these feelings—you're simply checking in. Doing body scans on a regular basis can help increase mindfulness.

For more tips on practicing mindfulness, see the Wise Choices Box. ■

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Web Links

For more about mindfulness, see "Links" in the online article: newsinhealth.nih.gov/2021/06/mindfulness-your-health

Beat the Heat

Staying Safe in the Summertime

After a long winter cooped up, the arrival of sunny days can make you eager to be outside. Getting outdoors can be good for you in many ways. It provides opportunities for exercise. It can also boost your mental health.

But as the heat rises, some health risks also increase. Intense heat can put strain on both your body and brain. Too much heat can cause a heat-related illness called hyperthermia. Mild hyperthermia can cause discomfort, like muscle cramps or swelling in the ankles and feet.



Wise Choices

Protect Yourself From the Heat and Sun

- Do outdoor activities during the coolest part of the day, in the early morning or evening.
- Exercise in an air-conditioned space if possible. Or do water workouts.
- Try to stay in the shade when outdoors during peak sunlight.
- Drink plenty of liquids, especially water. Avoid drinks that contain alcohol or caffeine.
- Wear protective clothing, such as hats, long-sleeve shirts, and long pants to block out the sun's harmful rays. Choose light-colored, loose-fitting clothing.
- Use sunscreen that blocks both UVA and UVB radiation. Choose a sun protection factor (SPF) of at least 15, preferably 30. Reapply frequently.
- Use sunglasses that block both UVA and UVB.
- If you don't have air conditioning, keep your home as cool as possible. If you need help paying energy bills, visit go.usa.gov/x6arw or call 1-866-674-6327.

Heat exhaustion is more serious. It occurs when your body can no longer keep itself cool. You may start to feel dizzy or nauseated. Other symptoms include feeling thirsty, weak, or uncoordinated.

The most extreme form of hyperthermia is heat stroke. Heat stroke is life-threatening, so seek medical help right away. Symptoms include fainting or having trouble walking. You may start feeling confused or agitated. You can also feel very hot but not sweat or have dry, flushed skin.

Some people are more at risk for heat-related illness than others. That includes infants and young children, and those with certain health conditions, such as heart, lung, or kidney disease. Older adults are the most heat sensitive. That's because the body's ability to cool itself changes as we get older.

There are two main ways your body regulates its temperature, explains Dr. Craig Crandall, who studies heat effects on the body at UT Southwestern Medical Center. "One is increasing how much blood flows to the skin. The other is how much we sweat."

Neither of these works as well in older adults, Crandall says. That makes it more difficult for them to cool off. His research has shown that sitting in front of a fan increased older adults' body temperature in extreme heat. That's because they weren't sufficiently sweating when the hot air was blowing over their skin. This suggests that older adults may need to use other ways to keep cool, such as going to an air-conditioned place.

Too much heat is not safe for anyone. If you're outside in the



heat, drink lots of water. Don't try to exercise or do a lot of activities outdoors when it's hot.

If you start to feel sick in the heat, rest in a cool place and drink plenty of fluids. If you think someone has heat stroke, get them to a cool place and call 911.

"Shade is your friend," Crandall says. "If you're going out to exercise or mow the lawn, take breaks in the shade."

If possible, go into an air-conditioned room for a while. "That time you're inside, your core temperature is going to be cooled," Crandall explains. "If you stay outside, it may just go up and up and up."

If you want to exercise outside in the summer, start slow. "It takes about 10 days to two weeks to get acclimated to hotter temperatures," Crandall says.

Heat isn't the only hazard during the summer. It's also important to protect your skin and your eyes from the sun. See the Wise Choices box for tips to keep safe in the heat. ■



Web Links

For more about hyperthermia, see "Links" in the online article: newsinhealth.nih.gov/2021/06/beat-heat



Health Capsules

For links to more information, please visit our website and see these stories online.

Lack of Sleep in Middle Age May Increase Dementia Risk

Not sleeping enough can harm your health. It raises your risk of many diseases and disorders. A new study found this may include dementia.

The study looked at data from about 8,000 people in Britain starting at age 50 who were in a long-term health study. Participants were asked how many hours they slept per night. They reported on their sleep six times over a 30-year period. Some also wore a device that measured when they were active to check the accuracy of the reports.

During the study, 521 participants were diagnosed with dementia. They were about 77 years old on average at diagnosis. When researchers analyzed the data, they saw a link between short sleep and dementia.

People who slept six hours or less a night had a higher risk for dementia later in life. They were 30% more likely to be diagnosed with dementia than people who slept seven hours per night.

The researchers controlled for other factors that affect sleep. These

included smoking, physical activity, and certain medical conditions.

This study doesn't prove that a lack of sleep increases the risk of dementia. But it adds to others that suggest a connection. More studies are needed to understand why.

"While we cannot confirm that not sleeping enough actually increases the risk of dementia, there are plenty of reasons why a good night's sleep might be good for brain health," says Dr. Séverine Sabia of Inserm and University College London. ■

Living With Scoliosis

Scoliosis is a disease that causes the spine to curve. It can result in an abnormal s-shaped or c-shaped curve. Anyone can get scoliosis. But it's most common in children age 11 and older.

Many children and teens with mild scoliosis have no symptoms or pain. They may have changes in their posture. Their shoulders or hips may look uneven.

Scientists don't know what causes the disease, but think **genes** and **hormones** play a role. You are more likely to have scoliosis if your parent or sibling has it.

A health care provider can diagnose the condition with a physical exam and X-rays. Treatment for scoliosis depends on how severe the spinal curve is and where it occurs.

Mild forms may only require regular check-ups from a doctor. Some children and teens may need to wear a brace to keep the curve from getting worse. Physical therapy can help strengthen muscles. In some severe cases, surgery may be needed.

Most people with scoliosis can have normal, active lives with treatment. Support groups can help. These

are available for children and teens, and their parents. To learn more about scoliosis, visit www.niams.nih.gov/health-topics/scoliosis. ■



Definitions

Genes

Stretches of DNA you inherit from your parents. These define features like your risk for certain diseases.

Hormones

Substances made by the body to affect how the body grows and functions.



Featured Website

Healthy Moments Broadcasts: COVID-19

www.niddk.nih.gov/health-information/healthy-moments

Why should you consider getting a COVID-19 vaccine? Hear Dr. Anthony Fauci explain why getting vaccinated is key to ending the

pandemic. Learn why it's safe and important. These quick interviews (in English or Spanish) give you the facts about COVID vaccines.

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