THE HEALING POWER OF AWE

How one woman found comfort and connection in moments of awe

From the time I was a little girl, I have sought comfort and solace in the expansiveness of nature. I've scoured beaches for seashells and colorful rocks, lain beneath the night sky marveling at the stars, and planted myself at the base of a giant oak tree in the front yard of my childhood home, notebook in hand, recording my thoughts.

Now a mother to three boys, I try to instill that same sense of wonder in my children during monthly hikes up to a cross in the mountains near our home. Once, my 8-year-old son Jack suggested we find unique rocks to place in a wooden box that rests at the base of the cross. "We can leave them as an offering—a prayer for joy, love, and peace," he said.

We each selected one rock, then opened the box. Inside, we saw letters, book pages, even a pair of black horn-rimmed eyeglasses—peoples' prayers for guidance, peace, and clarity—and we placed our rocks alongside them, connecting our prayers to theirs.

As we made our way back down the hill, we saw a trio of hummingbirds dancing around us. Jack's eyes followed the tiny, flitting creatures, his mouth curled into a slight grin. We were both mesmerized.

"We already got our blessings," he said. "Joy, love, peace."

It turns out, such quests for awe are on the rise, particularly in response to a growing body of evidence linking awe with myriad health benefits, including lower levels of stress, enhanced well-being, and greater social connectedness.

In fact, when people experience awe, they report feeling more connected to other people and the world at large. There's even a growing movement through an online platform called The Awe Collective (*awe.arizona.edu*) to gather, connect, and map moments of awe and cultivate a community rooted in creative expression and childlike wonder.

AWE EXPLAINED

So what is awe, really? It's difficult to put the experience into words, even for scientists—and writers. I can't articulate what was happening in my body and mind while those hummingbirds danced before my eyes.

BY AMY PATUREL

Some call awe a nebulous emotion. Others say it's a sense of wonder about the world around us. Perhaps the most accepted definition of awe though is the experience of something mysterious or beyond words, something larger than yourself.

"It's a palpable and visceral feeling of emotional intenseness that is alluring, and often ineffable. A feeling of wholly otherness characterized by vastness which evokes spaciousness, openness, the imagination, and wonder," says Helen Marlo, Ph.D., dean of the School of Psychology at Notre Dame de Namur University. You can feel awe when noticing the fractals in a leaf or watching the sunlight ripple across the water. You can feel it just by noticing what you notice and focusing on things that make you feel peaceful, calm, and connected.

If you've hiked the Great Smoky Mountains, watched the sky transform into a canvas of breathtaking hues as the sun dips below the horizon, or felt your skin prickle with goosebumps after witnessing a heroic act of kindness, you know what it means to experience awe. It's the emotion you encounter in response to something so vast, so full of wonder, that your sense of self recedes into the background.

In a 2022 study published in *Emotion*, researchers of 52 people in their 60s, 70s, and 80s discovered that those who were instructed to cultivate awe—to pay attention to details and view their surroundings with childlike eyes—during 15-minute daily walks became more skilled at discovering and amplifying awe. Awe-walkers also reported a greater sense of well-being and social connectedness than those who weren't told to focus on awe. But the most surprising finding, according to study author Virginia Sturm, Ph.D., an associate professor of neurology at the University of California in San Francisco, was the marked differences in the groups' selfies.

During the eight-week study, the awe participants' photos revealed a visible shift: They focused less on themselves and more on the landscape around them. In other words, their "selfies" became smaller, while the world grew larger. At the same time, awe participants also appeared happier, their smiles more intense, as the study progressed.

The images I snapped during my morning hikes with my sons revealed a similar pattern. We became smaller, while the focus on the birds in the background, the cross, and the cloud-filled sky became more prominent. I was capturing awe on camera without even realizing it.

THE SCIENCE OF AWE

Even back in the late 1800s, pioneers in psychology were well aware of the power of awe. Unfortunately, without technology like functional magnetic resonance imaging (fMRI) or even heart rate monitors to produce scientifically sound data, their theories didn't gain much traction.

> Studies show that awe can help calm the nervous system, reduce inflammation, and bring people together through a shared sense of community.

Today, research shows that our bodies react differently in response to awe than to emotions like surprise or joy—we make different sounds and facial expressions. Awe puts daily stressors into perspective, boosts creativity, and enhances mood. Studies show that awe can help calm the nervous system, reduce inflammation, and bring people together through a shared sense of community.

While scientists aren't entirely clear how awe-filled experiences produce these effects, they do have a few theories. Awe seems to deactivate the default mode network, the part of your brain that chatters in the background during your daily activities. It stimulates the vagus nerve, an information superhighway in the brain that not only regulates heart rate, digestion, and respiration, but also halts inflammation and unlocks the relaxation response. And preliminary studies suggest that awe triggers the release of feel-good chemicals, including oxytocin, helping people feel more cooperative and generous.

"There's incredible openness and freedom that happens when you view yourself as a small part of a much larger picture," Marlo says. During our hikes, when my boys and I see ourselves as a speck of dust in an expansive universe, we're humbled by our smallness, but we also have the sense of being part of something that's larger than life—and it's compounded by our togetherness.

Sturm says that makes sense. In fact, the most awe-filled experiences often happen in concert with other people. Maybe you're at a show belting out a favorite song alongside thousands of strangers in a massive concert venue, or maybe you're cheering for a favorite team at a sporting event, or maybe, like me and my family, you're doing a slow-motion wave at a Harlem Globetrotters event in a stadium of hundreds. There's something awesome about being part of a larger collective movement.

Scientists call this sense of awe in numbers "collective effervescence," moving in unison with other people—and research shows that when we walk, dance, sing, pray, or meditate in unison, our neurons begin firing in similar patterns; hormones like cortisol, oxytocin, and dopamine begin syncing up, and there's a certain synergy and energy in the group collective. Add it all together and it seems few things are better for mind, body, and soul than a hefty dose of awe.

CULTIVATING AWE

Many people think awe is reserved for the natural wonders of the world—things like watching an eclipse, standing on the rim of the Grand Canyon, or swimming in the Dead Sea. But Sturm tells me that awe can happen anywhere and everywhere, such as seeing flowers blooming through cracks in a sidewalk or hearing your child laugh just like your mother.

Awe doesn't even have to be physical. It can be conceptual. Maybe you're reading a novel and marveling at the writer's immense talent, looking at an impressive painting, or considering how big data, algorithms, and artificial intelligence are impacting our world. Anything that "blows your mind" can be an awesome experience.

"Practicing awe is a skill, just like anything else," Marlo says. The good news: Having awe experiences inspires more awe.

That has certainly been my experience. My boys and I continue to hike up our favorite mountain as often as we can, choosing a different path to the cross during every trek. We notice the colors in the sky, the formation of the clouds, the way the leaves swirl in the breeze, and of course, the birdsong performing background music for our journey.

During a recent hike, when we arrived at the cross, a hawk swooped down and circled right above us. "He's circling around us not because he's looking for prey, but because he's circling around our prayer," Jack said. I marveled not just at the hawk, but also at my son who uncovered a truism I'm only beginning to grasp: Wherever you are, there's your awe … you just have to open your eyes, and mind, to see it. &

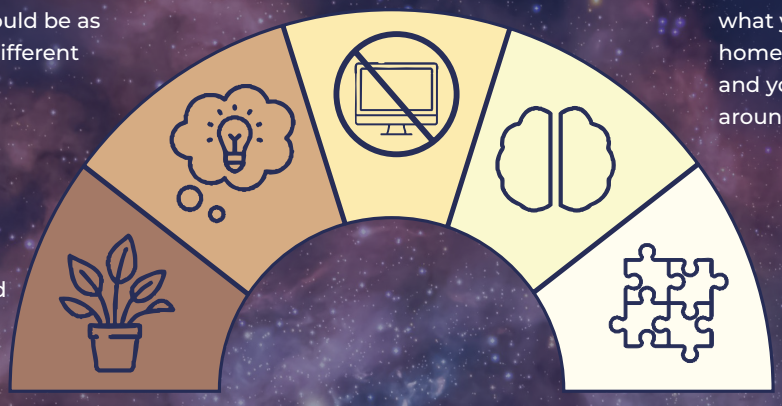
WANT TO MAXIMIZE THE AWE IN YOUR LIFE?

TRY THESE FIVE STRATEGIES:

DO SOMETHING DIFFERENT. Sturm tells me that we're more likely to feel awe in environments that are unfamiliar, which could be as simple as taking a different route to work.

POWER DOWN YOUR SCREENS. IMAX films aside, people are more likely to experience awe when they're away from devices and are instead connecting with other people.

PRACTICE MINDFULNESS. Mindfulness helps us focus on the present moment and silences distractions. Pay attention to what your senses are noticing and home in on what you're feeling, and you will rediscover the world around you with childlike eyes.



STEP OUT IN NATURE. Nature is one of the most common catalysts for experiencing awe. It provides both physical and emotional benefits and helps people feel more spiritually connected.

STICK WITH IT. Quiet the cognitive chatter of trying to process your experience as you're having it and instead just stay in the moment.