CAREGIVERS: THE INVISIBLE WORKFORCE PAGE 1

WEBMD.COM

NOV/DEC 2017

TOXIC OFFICE? HOW TO COPE

PAGE 12

WHEN TO CALL

PAGE 63

HUMAN HEALTH IN OUTER SPACE WAYS TO CURB YOUR ANXIETY PAGE 16

MAKE A GREAT CHILI TONIGHT

SHARON STONE

STEPS BACK INTO THE SPOTLIGHT
PAGE 40

## Contents



## Contents



#### NOV/DEC 2017

## Contents





## LIVING

#### 12 Work Wise

The health impact of toxic work environments

#### 13 Men's Health

How male caregivers can take better care of themselves

#### 14 Cutting Edge

Unique health challenges of space travel

#### 16 Mind Matters

10 ways to curb your anxiety

#### 20 Fitness Smarts

Could your workout help with depression?

#### **BEAUTY**

#### 22 **Derm Q&A**

Get the scoop on quickacting facial rejuvenation treatments—no surgery required

#### 23 Expert Picks

Dermatologist-approved face masks and gentle exfoliators

#### 26 Beauty Smarts

What you should know about your pores





#### **FAMILY**

#### 29 Bedtime

Conquer school stress with better sleep

#### 30 Pregnancy

The benefits of yoga

#### 31 Rahy

Your teething questions, answered

#### 32 Kids' Health

Exercise is good for kids' bodies and brains

#### 33 **Pets**

Diabetes can affect dogs and cats, too

#### 35 Teen Health

Rules of the road for safe driving

#### **FOOD**

#### 54 Good for You

The power of grapefruit

#### 55 **3 Ways:**

#### **Sweet Potatoes**

Try this nutritious holiday staple in a torte, a salad, or soup

#### 57 1 Food 5 Meals

Enjoy cranberry sauce all week long with these tasty meal ideas

#### 58 Build a Better

The secrets of great chili

#### 59 **Onions 101**

Get to know this versatile and varied veggie



- 60 **Cutting Edge** | Recent innovations in COPD treatment
- 61 **Expert Q&A** | Filling prescriptions online? Get the facts.
- 62 **Health Highlights** | Coping with depression
- 63 Be Prepared | Know when to call 911
- 64 By the Numbers | Smoking cessation
- 65 **Living Well** | The complex truth about shingles
- 66 **Doctor Q&A** | Our expert sets the record straight on HIV
- 67 **Doctor Q&A** | Alleviate heartburn with these tips
- 68 **Quiz: Cold & Flu** | Which one do you have?
- 69 **Health Highlights** | Tips for dry eye relief
- 71 **Quiz: Overactive Bladder** | OAB risk factors and symptoms
- 72 **Quiz: Osteoporosis** | Prevent this bone-weakening disease

#### In Every Issue

4 EDITOR'S NOTE

#### 6 UPFRONT

The health benefits of giving thanks, plus drones in health care and more

#### 73 **TAKE 10**

Reality star Daymond John on thyroid cancer and healthy habits

#### On the Cover

PHOTOGRAPHY BY: NINO MUNOZ/ CPI SYNDICATION



## The Fight Continues



December 1 marks World Aids Day, a day to both acknowledge how far we've come in the fight against HIV/AIDS and to reflect on what we need to focus on to prevent new cases and provide treatment for those in need. For our cover celebrity, actor Sharon Stone, HIV/AIDS advocacy is close to her heart, and a cause she's actively supported for more than 20 years.

In this issue, Stone tells us not only about her work on this important cause but also about some of her other passions, including living a healthy lifestyle. And for anyone focused on eating well and exercising, we know this time of year has temptations waiting at every turn, especially the infamous holiday buffet. We've got some tips and tricks to get you through the season without adding pounds. We also have some healthy and hearty dinner ideas for cold winter nights,

including recipes for the sweet potato, a nutritional powerhouse, and comforting—and filling—chili dishes.

Be sure to check out WebMD.com as well for the latest in health and medicine. We have the results of a fascinating new survey on bias in health care that looks at how both patients and doctors view each other along race, gender, age, and ethnicity lines—see below for details.

Here's to a happy—and healthy—holiday season from our WebMD family to yours.

Kristy Hammam
Editor in Chief
kristy@webmd.com





#### **BIAS IN HEALTH CARE**

"Patient Prejudice" is a new special report from WebMD, Medscape, and STAT. Anchoring the report is a WebMD/Medscape survey, which, among many other findings, reveals that 59% of health care professionals say they have experienced bias from their patients. Some 47% of doctors say a patient has requested a different doctor based on their personal characteristics, and 24% have documented patients' negative comments on their medical record.

Check out the report at www.webmd.com/patientprejudice



Correction: In our September story "Opioid Addiction: The Gender Gap," we stated that opioid addiction is more common for women and kills at a higher rate compared to men. In fact, certain gender differences do put women at higher risk but the addiction rate is not necessarily more common for women. Also, the death rate from opioid abuse grew at a faster rate for women between 1999 and 2010, not a higher rate. And the line "Psychological and emotional distress...can make it more likely for women to misuse opioids, but not for men" should read "Psychological and emotional distress...can make it more likely for women to misuse opioids, more so than for men."

STAY IN TOUCH



SUBSCRIBE TO OUR NEWSLETTERS Webmd.com/ newsletters



LIKE US ON FACEBOOK facebook.com/ webmd



TWEET US twitter.com/ webmd



pinterest.com/ webmd/webmd-magazine



email the editors webmdmagazine editors@webmd.net



395 HUDSON ST., NEW YORK, NY 10014

#### CORPORATE

**EDITOR IN CHIEF** Kristy Hammam

**EDITORIAL DIRECTOR** 

Colleen Paretty **EXECUTIVE EDITOR** 

Jennifer Fields

VICE PRESIDENT, **EDITORIAL DEVELOPMENT** 

Stephanie Snipes

ART DIRECTOR John Todd

**DIGITAL EDITOR** Alyson West

SENIOR EDITOR Sylvia Davis

**CHIEF MEDICAL DIRECTOR** 

Michael W. Smith, MD

MEDICAL DIRECTORS

Brunilda Nazario, MD Hansa Bhargava, MD Arefa Cassoobhoy, MD, MPH

MEDICAL EDITOR

Neha Pathak, MD

**CONTRIBUTING WRITERS** 

Christina Boufis, Sonya Collins, Heather Hatfield, Jodi Helmer Ayren Jackson-Cannady, Katherine Kam, Lauren Paige Kennedy, Lisa Marshall, Matt McMillen, Erin O'Donnell, Gina Shaw, Stephanie Watson

VICE PRESIDENT, PUBLISHER

Vanessa Cognard

SENIOR DIRECTOR, GENERAL MANAGER

Mathew Reynders

SALES OPERATIONS ANALYST

Kimberley Gillen

**ADVERTISING SALES** 

NEW YORK

CLAUDIA FERN cfern@webmd.net

212-624-3728

PATRIA RODRIGUEZ prodriguez@webmd.net 212-417-9542

CHICAGO

TRACY KENNEDY

tkennedy@webmd.net 312-416-9275

ANNA NOVINGER

anovinger@webmd.net 312-416-9278

WEST COAST

**NICOLE JONES** 

njones@webmd.net 213-718-5550

CHIEF EXECUTIVE OFFICER

Steven L. Zatz, MD

CHIEF FINANCIAL OFFICER

Blake DeSimone

**GENERAL COUNSEL** 

Michael Glick

VICE PRESIDENT, FINANCE

James McCann

**DIRECTOR, POLICY & GOVERNANCE** 

Theresa Saladino



805 THIRD AVENUE, NEW YORK, NY 10022

PRESIDENT

Georgine Anton

**CHIEF CLIENT OFFICER** 

Tom Sebok

**CREATIVE OPERATIONS OFFICER** 

Dan Davenport

#### **ACCOUNT MANAGEMENT**

**GROUP DIRECTOR** 

Marissa Bryan

ACCOUNT DIRECTOR

Eric Meisner

ACCOUNT SUPERVISOR

Billie Koester

Wenona Williams-Fassinou

PROJECT MANAGER

Kellie Kramer

SENIOR MARKETING SERVICE MANAGER

Annie Gormley

ACCOUNT EXECUTIVE

Nealy Hale

**EDITORIAL** 

EDITOR

Michelle Rubin

ASSISTANT EDITOR

Kelsey Roehrich

**HEALTH EDITOR** 

Martiña Gago

FOOD EDITOR

Elizabeth Elliott

COPY CHIEF

Grant Fairchild

BOOKINGS DIRECTOR

Wendy Zipes Hunter wendy@celebrity-concepts.com **CREATIVE** 

**GROUP DESIGN DIRECTOR** 

Missy Bergwall

SENIOR ART DIRECTOR

Casey Gradischnig

ART DIRECTOR

Mekala Johnson

ASSISTANT ART DIRECTORS

Amber Hanson

Brittany Long

PRODUCTION

ASSOCIATE PRODUCTION DIRECTOR

Sigrid Anderson

## **CUSTOMER SERVICE & SUBSCRIPTIONS**

#### MANAGE YOUR SUBSCRIPTION

EMAIL webmd@emailcustomerservice.com CALL 888-798-0088 CLICK "Contact Us" at the bottom of every page on WebMD.com.

WEBMD MAGAZINE ON MOBILE DEVICES

**DOWNLOAD** 

WebMD Magazine on your iPad for free.

WebMD Magazine is distributed to doctors' offices throughout the U.S., online at WebMD.com, and by download from the App Store. WebMD Magazine is not responsible for advertising claims. WebMD Magazine (ISSN 1553-9946), Vol. 13, No. 8, is published by WebMD LLC and may not be reproduced in whole or in part without written permission of WebMD LLC. All editorial content is reviewed by our board-certified physicians, is for informational purposes only, and is not intended to be a substitute for professional medical advice, diagnosis, or treatment. WebMD does not endorse any specific product, service, or treatment. Always seek the advice of your health care provider with any questions regarding a medical condition and never disregard professional medical advice or delay seeking it because of something you have read in WebMD Magazine. If you think you have a medical emergency, call your doctor or 911 immediately. © 2017 WebMD LLC. All rights reserved.

## Upfront



25%

Percentage of Americans who volunteered in the last year. Volunteers spent an average of 52 hours giving back. 40%

Percentage by which volunteering lowered the risk of high blood pressure in adults older than 50 who gave at least four hours a week to help others.

50%

Percentage by which your likelihood of living longer increases if you have a strong network of friends, family, neighbors, and/or work colleagues.

84%

Percentage of Americans who say they're thankful for their family's health.

IN THE NEWS

## The Toll of Caregiving



**COLLEEN PARETTY** 

Forty-four million people. Think about that for a moment. That's an enormous number. But they are not in one place or organized in any way. They are men, women, and even children. They are all over the country but mostly behind closed doors, often alone and isolated. These are America's caregivers, engaged in the important work of caring for aging or ill loved ones every day, day in and day out. While brave and noble, the work they do is often beyond the knowledge or training most have for effective caregiving. "I had no idea how hard this would be," says one woman who quit her job to care for her father fulltime. And the health toll on caregivers can be steep—they have a higher risk of depression, stress, dementia, and heart disease. What's the solution? Some states and agencies are beginning to mobilize to help, as we report in



"The Invisible Workforce" on page 50. — Caller



### GO **GREEN**

#### LUTEIN-THE COMPOUND

that gives dark green, leafy vegetables, such as spinach, their color-may reduce the inflammation that leads to and worsens heart disease.

SOURCE: Atherosclerosis

who get a different diagnosis in

a second opinion.

SOURCE: Journal of Evaluation in Clinical Practice



## Put the Phone Down

Idle hands might not be such a bad thing. Researchers asked college students about their smartphone use and examined their hands, wrists, and arms. Those who spent more than five hours a day clicking away

on their smartphones were more likely to show symptoms of carpal tunnel syndrome than those who limited their use to less than five hours.

SOURCE: Muscle & Nerve

#### **UPFRONT**



**FAT CHANCE** 

Swapping saturated fat for healthy fat could lower heart disease risk as much as cholesterollowering drugs. Fried foods and full-fat meat and dairy contain saturated fat. Nuts, avocados, olive oil, and fatty fish contain healthy fat.

SOURCE: American Heart Association

## THE SINGLE MOM MYTH

#### RESEARCHERS COMPARED

69 single-mothers-by-choice and their children ages 18 months to 6 years to 59 mothers from heterosexual two-parent families and their children of the same age. Between the two family types, researchers found no difference in mothers' emotional involvement with their children nor their stress level.

What's more, children of two-parent families misbehaved just as often as the children of single moms did. Researchers only found one key difference: Single mothers reported stronger social support networks than the other moms, and the stronger their support networks, the better their children's behavior.

SOURCE: European Society of Human Reproduction and Embryology



## Serotonin and SIDS

**BLOOD SAMPLES OF BABIES** who died of SIDS found unusually high levels of serotonin. The discovery could lead to developing a test for increased SIDS risk.

SOURCE: Proceedings of the National Academy of Sciences



### YOGA AND BACK PAIN

Namaste your back pain away. Yoga could bring relief for chronic low back pain. Some 320 people with mild to moderate pain got one of three treatments: 12 yoga classes, 15 physical therapy visits, or educational materials on pain management. After 12 weeks, the yogis reported just as much pain reduction as their peers in physical therapy. About half the yogis and physical therapy participants needed pain medication during the study while three-quarters of those in the education group did. Practicing yoga at home, attending drop-in classes, or attending physical therapy booster sessions continued to stave off pain for a year.

SOURCE: Annals of Internal Medicine

e-cigarettes to help them quit smoking, but the devices might have the opposite effect on younger people. In a study of 17,389 teens and young adults, those who had tried an e-cigarette had more than a 30% chance of going on to smoke tobacco cigarettes later. The ones who had never used an e-cigarette? They only had an 8% chance of picking up the real thing.

SOURCE: JAMA Pediatrics



Want to eat healthier and save money? People who cook at home at least six times a week take in fewer empty calories, less salt, and save about \$100 a month compared to those who eat out that often.

## Boost Your Mood

HEALTHY EATING LOWERS RISK FOR OBESITY, DIABETES, HEART DISEASE, and possibly depression. Among 177,000 U.S. adults surveyed, those who ate healthy the entire day before were 34% less likely to have

depression than the others.

SOURCE: Gallup

**PERCENTAGE** the average American's

weight increases after Thanksgiving, It's 0.4% after Christmas.

SOURCE: New England Journal

WEBMD.COM

### MOVE FASTER, AGE SLOWER

Frequent exercise could slow the aging process by up to nine years. In a study of 5,823 adults, the most active ones—they logged physical activity equal to five jogs of 30 to 40 minutes per week had significantly longer telomeres than their peers. Telomeres are protein caps on the ends of

chromosomes that shorten as you age. The length of exercise buffs' telomeres suggested they were nine years younger than their sedentary counterparts.

SOURCE: Journal of the American Heart Association

## **NEXT-GEN RISK**

value of a healthy diet now and help lower their breast cancer risk later. Researchers tracked the eating habits of 45,204 women throughout their lives. Those who ate the most inflammatory foods in vellow and cruciferous vegetables. high school—added sugar, simple

carbs, and red or processed meat had 35 percent greater odds of developing breast cancer before menopause than those who ate more anti-inflammatory foods, such as leafy green vegetables and



**UNDERAGE BINGING** 

One in seven young people ages 12 to 20 binged on alcohol last month. That's four drinks in two hours for females and five for males.

SOURCE: Substance Abuse and Mental Health Services Administration



## Drone Health Care

Many more people would survive cardiac arrest if help arrived faster. Drones might be the answer. When researchers in Sweden raced defibrillatorcarrying drones against ambulances, drones arrived on the scene an average of 16 minutes and 39 seconds faster than emergency medical services.



## **FRY FACTS**

Read this and you might drop French fries like a hot potato. Researchers tracked 4,400 adults ages 45 to 79 for eight years, during which time 236 died. When the researchers examined the adults' diet, they found that those who ate fried potatoes—like chips, hash browns, tater tots, and fries—two to three times per week were 11% more likely to die during the study than those who ate them once a month or less. The real potato heads—the ones who indulged in fried spuds more than three times a week—were 15% more likely to die.

who have completed an advanced directive-instructions on the

medical care you wish to receive (and not receive) in the event you are unable to speak for yourself.

SOURCE: Health Affairs

**HEALTHY HABITS** 

MEANINGFUL CHANGE

## Living

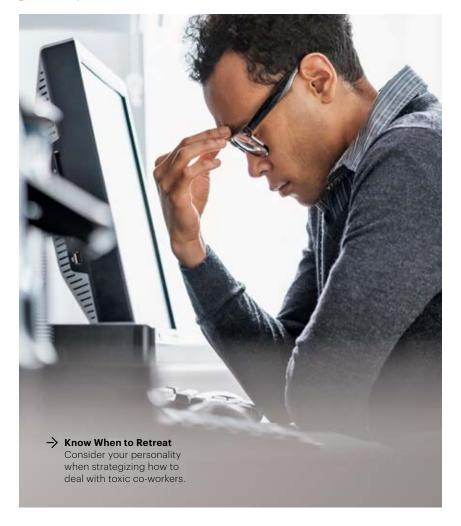


REVIEWED BY Patricia A. Farrell, PhD WebMD Medical Reviewer

#### WORK WISE

## **Job Strain**

Does your office stress you out? The physical impact is real—so be sure to promote your own health first.



IF YOUR OFFICE LIFE FEELS LIKE A PARTICULARLY TENSE EPISODE OF Game of Thrones—plotting, bloodbaths, queen bees—it's time to assess colleagues, managers, and—most important—yourself, for the good of your health.

So says psychotherapist Katherine Crowley, MEd, co-owner of the career counseling K Squared Enterprises in New York City. Crowley, author of three books, including Working for You Isn't Working for Me, believes that some toxic office politics can be successfully managed, overcome, and even defeated.

Other situations, however, undermine long-term physical and emotional health. "Frustration and stress brought on by coworkers increase cortisol levels," she says, which, if streaming in steady enough supply, can lead to lowered immune function, heart disease, sleep loss, anxiety, depression, and weight gain.

If the latter happens to you, you might want to consider moving on, Crowley advises. Decades of research—from the groundbreaking Whitehall studies in the 1960s, 1970s, and 1980s that correlates lack of job control with earlier mortality rates to more recent analyses on the link between psychological job strain and diastolic blood pressure—supports this position.

Determining just how unhealthy your workplace is, and whether you can successfully overcome—or retreat—often comes down to your own personality type, Crowley says.

"Some people enjoy competing; others don't. If you have a colleague who takes credit for your ideas, the stress is in staying silent. Always copy other people on important emails, and never take a meeting with this person unless another higher up is in the room."

In other words, strategize. Don't allow yourself to fall victim to others' sabotaging styles.

## **Work Toward Good Health**

EXPERT KATHERINE CROWLEY, M ED,

SUGGESTS A FEW WAYS YOU CAN IMPROVE YOUR WORKPLACE

#### TRY 'UNHOOKING'

Do you clench your teeth and suffer headaches? "Unhook" yourself from tense work situations, Crowley advises, even just to go the restroom or water-cooler. Take a walk or work out. Studies show exercise boosts feel-good endorphin levels.

#### TAKE INVENTORY

"Look at the facts" about the office culture. "Be honest about what role you play in it. Stress comes from constantly expecting a different outcome from others' behavior."

#### **CURB YOUR EMOTIONS**

Jealous of your coworkers? Research shows envy only harms you; it unleashes a flood of hormones, triggering higher levels of aggression.

#### LOOK OUT FOR #1

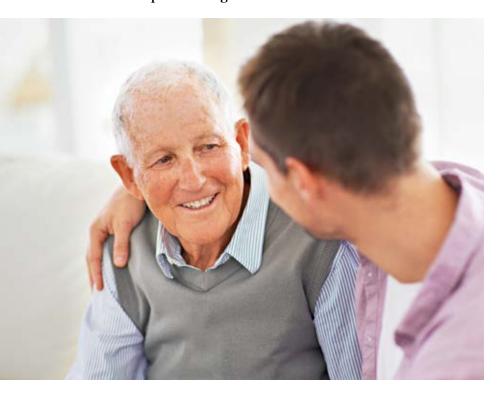
If you have trouble, "seek help from a career therapist, executive coach, or mentor. Share your reality, and devise strategies to change it."

REVIEWED BY Arefa Cassobhoy, MD, MPH WebMD Senior Medical Director

#### MEN'S HEALTH

## **Your Care Comes First**

Men now account for 40% of the 40 million Americans who are caregivers, up from 34% eight years ago, according to a 2017 AARP report. In this role, men face some unique challenges.



DESPITE THE REWARDS OF HELPING A LOVED ONE THROUGH A TOUGH ILLNESS, caregiving requires a lot, from personal, hands-on tasks like feeding and bathing to managing finances and medical assistance. Such intense work takes a toll.

Caregivers—both men and women—have higher rates of depression and anxiety. They seek medical care less frequently. They become more socially isolated. They eat more poorly.

Men, though, may make things even harder on themselves.

"Men are less likely to seek out other caregivers, to get individual counseling, or to go to a support group," says Michelle Venegas, LCSW, the director of programs and services for the Family Caregivers Alliance in San Francisco.

That adds to the isolation and emotional burden of caregiving. Men also tend to pay less attention than they should to their physical well-being. That mistake could cost both them and those in their care. "If you get sick," says Venegas, "who will care for your loved one?"

So, if you are a caregiver, make both your physical and emotional health a priority. Take time for yourself, not once in a while, but consistently and regularly. Meet a friend for coffee or lunch, take a walk, practice meditation. Decide what makes you feel good, and schedule it. While you have your calendar out, check to see if it's time for a physical or a trip to the dentist.

Accept that you may require help. Many men struggle with asking for assistance, so you may need to practice. Build a support network of nearby family, neighbors, and friends. Ask who's available, for example, to sit with your mother or spouse while you get out for a half hour. Also, research local services. Adult day care centers, says Venegas, provide safe surroundings where your loved one can feel engaged and find joy.

"You can't keep giving and giving without giving yourself a break," says Venegas. "If you take care yourself, you will be able to provide better care."

#### 4 Tips

CAREGIVING IS TOUGH WORK, BUT YOU CAN MAKE IT EASIER FOR YOURSELF

#### **KNOW YOUR RIGHTS**

The law requires most employers to help workers balance their job with their caregiving responsibilities. Find out how it applies to you.

#### DO SOME HOMEWORK

Understand the details about the disease you're dealing with so you understand how it will progress and what you can expect. Start with your loved one's doctor.

#### **SLEEP WELL**

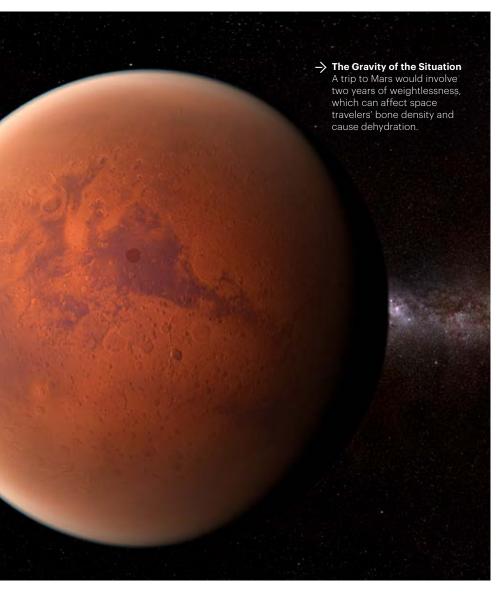
To think rationally and with a clear head, especially when your loved one no longer can, you must stay sharp. Address any sleep problems you may have.

#### START TALKING

Fear, anxiety, and sadness can come with caregiving. Consider joining a support group or seeing a mental health counselor. CUTTING EDGE

## Safe Space

Can we really send humans to Mars and back in the near future? Very likely, experts say. But how would such a journey impact the health of long-term space travelers?



FOR MOST OF US. THE NOTION OF SPACE TRAVEL TO MARS IS LIMITED TO A Saturday night viewing of *The Martian*, starring Matt Damon. But for NASA and a team of researchers planning for such a mission, not only is it possible, it's probable. And perhaps relatively soon.

Still, even if NASA can tackle the technological challenges of landing a shuttle on the "red planet" some 40 million miles away from Earth and then safely returning its crew home, important questions must be answered about potential health effects on astronauts before blastoff can happen.

Enter Carl A. Olsson of Advanced Urology Centers of New York and Michael Leapman, MD, assistant professor in the Department of Urology at the Yale School of Medicine. Their studies incorporate ongoing research collected from the International Space Station and focus on gender differences in osteoporosis and fertility, as well as issues of the genitourinary tract (which includes the reproductive organs and the urinary system) during prolonged missions in space.

#### **GRAVITY MATTERS**

Humans have already survived prolonged space flights. Record holder Russian cosmonaut Valeri Polyakov logged an uninterrupted 483 days in space back in 1995, and American astronaut Scott Kelly claimed the secondlongest stay at 340 days in 2016.

According to Olsson, a mission to Mars would likely take, "at minimum, two years," including time spent for data collection on the planet's surface as well as the roundtrip flight. That's twice the length of time any human being has thus far lived in microgravity, or weightlessness, which NASA defines not as zero gravity but as very weak gravity.

The mission's duration matters because the human body reacts differently to microgravity—which negatively impacts both skeletal and renal health—than it does to Earth's stronger gravitational pull.

"During the earliest space missions of the 1960s scientists observed prompt changes in bone density and leakage of calcium into the urine. So skeletal health is a big concern," Leapman explains.

Olsson elaborates: "Earth's gravity pulls bodily fluid"-meaning blood, plasma, and urine—"down into the direction of our feet, or, when we're lying down, toward the back. In microgravity more fluid goes to the brain and upper torso."

The result, he says, is that bodies in space immediately react to protect the heart, brain, and eyesight from too much fluid, working to readjust total blood volume mass through

urine loss, as well as through calcium leakage from the bones into the urine.

"Astronauts become significantly dehydrated with losses of 2% to 3% of the entire body's water," says Olsson. Such fluid loss may trigger a range of renal problems, including kidney stones.

#### **OVERRIDING MICROGRAVITY**

Left untreated, kidney stones can be painful and life-threatening. "That's why urologists are involved," Leapman says. "We can walk [an astronaut] through an emergency situation in space when kidneys are blocked. NASA is developing "contingency plans so astronauts can perform ultrasounds, downlink to medical personnel on Earth, and theoretically perform an emergency procedure on themselves," he adds.

Bone density loss also contributes to osteoporosis, a condition where the bones become brittle and fragile, which can lead to bone breaks. To maintain bone health as well as strong cardiovascular systems, NASA crew members exercise on average two hours each day. Olsson says astronauts use AREDs or advanced resistance exercise devices aboard NASA flights-the equivalent of lifting weights in space.

As for dehydration, NASA has developed a specially formulated electrolyte concentrate called "The Right Stuff," a daily staple of astronauts' space diets. (Space fans here on Earth can order the hydrating drink online.)

#### IS THERE A GENDER DIVIDE?

"To boldly go where no man has gone before" goes the famous Star Trek refrain. Memo to Captain Kirk: NASA's latest class of astronauts is 50% female.

When it comes to gender difference, "There don't seem to be that many," Olsson says. Bone density changes occur in both men and women at the same rates. "Women may have different baselines, but no worsening in space than men do."

"For decades there was a sexist attitude: Can women tolerate the stresses of space? We have female astronauts approaching their seventh decades, still flying and doing well, and women in space who then had children, or who've gone to space after having children," says Olsson.

Similar to Polyakov and Kelly, women astronauts show no long-term health or fertility effects once they've returned to Earth. Leapman says research shows that once the known physiological challenges of the microgravity state are controlled for, both genders can thrive among the stars.

But will a Mars mission really happen in our lifetime?

"It's a lofty goal," admits Leapman. "I think it's going to happen by the 2030s," predicts Olsson, citing the Space X program of entrepreneur Elon Musk, who "has done an amazing job catching up to, and exceeding, the capacity of NASA in very few years. It's doable with people like Musk on board, along with the entire NASA effort."

### **Final Frontier Facts**



#### **DO ASTRONAUTS HAVE SPECIAL NUTRITIONAL** NEEDS?

In space astronauts' blood iron, which can cause bone loss, according to NASA. So iron monitored.

#### **IS VITAMIN D ISSUE?**

Astronauts in space can't absorb this essential nutrient from sunlight. NASA studies humans working in Antarctica who absorb zero sunlight over long periods of time to predict how much supplemental vitamin D astronauts require

#### DO CIRCADIAN **RHYTHMS GO HAYWIRE IN** SPACE?

The answer is

investigating the

body's biological

clock, the roughly

affecting sleeping

patterns, and how

it changes during

long-duration

missions.

24-hour cycle

and feeding

still pending. Currently, NASA is

volume contracts, resulting in excess levels are carefully

## **DEFICIENCY AN**

in space.

#### **HOW ABOUT** INTERPLANETARY PROCREATION?

"For truly prolonged missions there is talk of colonization. Could we fertilize an egg?" muses Michael Leapman, MD. "It has yet to be demonstrated if that's viable. There are concerns about cosmic radiation."

#### BY THE NUMBERS

A recent study on 12 astronauts showed the heart becomes more spherical with less muscle mass after prolonged exposure to microgravity, which could cause cardiac problems during a lengthy Mars mission.

a single journey to Mars and back could expose a space traveler to two-thirds of his or her safe lifetime limit for radiation exposure, thus increasing cancer and DNA damage risk.

On April 24, 2017, astronaut Peggy Whitson broke the record for most cumulative (as opposed to consecutive) days spent in space by any NASA astronaut, male or female



BY THE NUMBERS

Number of adults in the United States who have anxiety disorders.

billion

ety disorder who live with symptoms for

Cost of

treating

anxiety

disorders

each year.

10 years or more before getting help.

Number of American adults who have panic disorder in a given year. Typically developing in early adulthood, women are twice as likely as men to have panic disorder.

3. Fact-check your thoughts.

People with anxiety often fixate on worst-case scenarios, Chansky says. To combat these worries, think about how realistic they are. Say you're nervous about a big presentation at work. Rather than think, "I'm going to bomb," for example, say, "I'm nervous, but I'm prepared. Some things will go well, and some may not," she suggests. Getting into a pattern of rethinking your fears helps train your brain to come up with a rational way to deal with your anxious thoughts.

- 4. Breathe in and out. Deep breathing helps you calm down. While you may have heard about specific breathing exercises, you don't need to worry about counting out a certain number of breaths, Chansky says. Instead just focus on evenly inhaling and exhaling. This will help slow down and re-center your mind, she says.
- 5. Follow the 3-3-3 rule. Look around you and name three things you see. Then, name three sounds you hear. Finally, move three parts of your body—your ankle, fingers, or arm. Whenever you feel your brain going 100 miles per hour, this mental trick can help center your mind, bringing you back to the present moment, Chansky says.
- 6. Just do something. Stand up, take a walk, throw away a piece of trash from your desk—any action that interrupts your train of thought helps you regain a sense of control, Chansky suggests.

- **7. Stand up straight.** "When we are anxious, we protect our upper body—where our heart and lungs are located—by hunching over," Chansky says. For an immediate physical antidote to this natural reaction, pull your shoulders back, stand or sit with your feet apart, and open your chest. This helps your body start to sense that it's back in control, she says.
- **8. Stay away from sugar.** It may be tempting to reach for something sweet when you're stressed, but that chocolate bar can do more harm than good, as research shows that eating too much sugar can exacerbate anxious feelings. Instead of reaching into the candy bowl, Chansky says, drink a glass of water or eat protein, which will provide a slow energy your body can use to recover.
- **9. Ask for a second opinion.** Call or text a friend or family member and run through your worries with them, Chansky says. "Saying them aloud to someone else can help you see them clearly for what they are." It can also help to write your fears on paper.
- 10. Watch a funny video. This final tactic may be the easiest one yet: Cue up clips of your favorite comedian or funny TV show. Laughing is a good prescription for an anxious mind, Chansky says. Research shows that laughter has lots of benefits for our mental health and well-being; one study found that humor could help lower anxiety as much as (or even more than) exercise.

REVIEWED BY Michael W. Smith, MD, CPT WebMD Chief Medical Director

#### FITNESS SMARTS

## **Gifts for Workout Fans**

With an abundance of exercise gear online and in stores, how do you know what fitness fanatics will love and what will get tossed onto a slush pile? We asked pros for their top picks.

LIVING











WANT TO WOW THE FITNESS LOVERS IN YOUR life? Scoop up these expert-recommended gadgets and gear. The rest is up to them.

#### BOSE SOUNDSPORT WIRELESS **HEADPHONES (\$135)**

Recommended by: sports rehabilitation specialist Tim Hartwig, CSCS These little babies pack a punch: They're wireless, lightweight, and sweatproof. That's not all, says Hartwig. "They have six hours of battery life, which is ideal for the athlete in all of us."

#### **2** LEAF URBAN BY BELLABEAT (\$110 AND UP)

Recommended by: fitness expert Shana Schneider

Have a friend who's too style-conscious to strap on a Fitbit? Give her this fitness tracker. It comes in gold or silver and can be worn as a necklace, bracelet, or clip. "It tracks all your movements so you can see how even going to the grocery store can help you rack up steps," says Schneider.

#### **3** S'WELL WATER BOTTLE (\$25-\$35)

Recommended by: Tim Hartwig, CSCS

Need a simple something to please just about anyone? This water bottle has a clean style, customized color options, and a tight seal to prevent spills, says Hartwig. It's vacuum-sealed and made with stainless steel to keep drinks cool for 24 hours.

#### **4** THE HEAT PAIN PRO TENS UNIT BY **OMRON HEALTHCARE (\$70)**

Recommended by: celebrity trainer Ramona Braganza

Braganza gives this device a gold star for relieving post-workout pain. It combines soothing heat with electrical stimulation a technique physical therapists have used for years, she says—in a portable, do-it-yourself unit.

## 5 THERAGUN (\$600, PRE-ORDER)

Recommended by: Tim Hartwig, CSCS

A few experts we talked to agree this handheld vibration-therapy device is one of the most powerful new products on the market. It applies vibration to your muscles to boost recovery. It's lightweight and easy to use, so you don't have to be a pro to give it a go, says Hartwig.

#### 6 FOAM ROLLER (VARIOUS BRANDS, \$10 AND UP)

Recommended by: Jake Giamoni, certified personal trainer and former  $professional\ wrestler$ 

Foam rollers come in all shapes and sizes and can be used to massage individual muscles. Pick from trigger-point rollers, smooth stick rollers, or massage ball rollers. The impact is big but the price tag is small. For mobility issues or pain, says Giamoni, it's the best \$20 you'll ever spend.

#### **SLAM BALLS (VARIOUS BRANDS, \$10** AND UP)

 $Recommended \ by: personal \ trainer$  $Richard\ Wilcock$ 

These sand-filled medicine balls do double duty, says Wilcock: Throw them at the floor or a mat, and you'll gain power in your muscles while getting a healthy dose of stress relief. No need to hold back, Wilcock says. "Put as much aggression and power as you want into each slam."

#### HYDROCOLLATOR BY DYNATRONICS (\$10 AND UP)

Recommended by: certified massage therapist Austin Gresham

"Wet heat is great for loosening stiff muscles and joints," says Gresham. Soak this canvascovered bag in hot water for 10 minutes, wrap it in a bath towel, and place it over sore spots for 30 minutes.

#### TRX HOME GYM (\$180)

Recommended by: Laura DeSimone Arndt, NSCA-CSCS, and Adam Sanford, NASM, CPT

This gym is a popular pick among trainers. "This portable system is a must for any fitness fanatic," says Sanford. "It offers so many options and exercises that you'll never get bored." You simply attach it to a closet door to work your entire body using just your body weight, adds Arndt.

#### **BIONIC BODY BANDS (\$15 AND UP)**

Recommended by: fitness author Drew Logan Logan reaches for resistance bands with his celebrity clients because they're powerful and portable—perfect for staying in shape on set. They build strength and stability, he says, because as you pull, tension makes your muscles work extra hard. Bionic is his go-to brand because it has handle attachments, a how-to guide, and adjustable tension levels.

### **Outside-the-Box Fitness Gifts**



WANT SOMETHING LESS TRADITIONAL? TRY THESE GIFT IDEAS FROM MARGO **DONOHUE**. CO-HOST OF THE FITNESS PODCAST "FIT BOTTOM GIRLS."

"I live and die by the music I use in my playlists. So any gift certificate to iTunes, Amazon, or Barnes and Noble would be a big help," Donohue says.

#### **BLING**

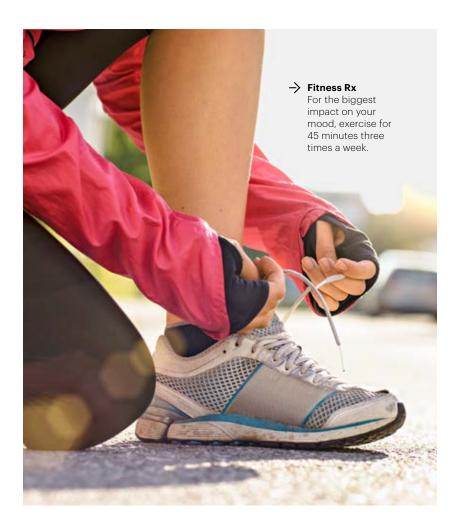
Donohue loves her fitness tracker but admits it's not very fashionable. Her solution: jewels to cover it up. "My favorite is from Bezels & Bytes (\$48-\$98)," she says. "It covers my Fitbit and my Apple watch—at a great price."

#### **AROMATHERAPY**

Donohue gives aromatherapy a thumbs-up for fitness lovers who also crave relaxation. "I'm a sucker for soothing scents and smells," says Donohue. "When I need a fix, I head over to Etsy's home and bath section."

THE OPINIONS EXPRESSED IN THIS SECTION ARE OF THE EXPERTS

AND ARE NOT THE OPINIONS OF WEBMD. WEBMD DOES NOT ENDORSE ANY SPECIFIC PRODUCT, SERVICE, OR TREATMENT.



#### FITNESS SMARTS

## **Boost Your Mood**

Lace up your sneakers. Working out could be as effective as medication for mild to moderate depression.

IF YOU LIVE WITH DEPRESSION, FINDING THE MOTIVATION TO EXERCISE can be challenging. But breaking a sweat could be the best thing you can do for your mental health.

"People who are depressed will see their mood get better with regular exercise," says Vonetta Dotson, PhD, associate professor of psychology at Georgia State University. Indeed, research shows that regular exercise can be as effective as antidepressants for mild to moderate depression.

Dotson believes several possible explanations account for why exercise helps lift depression: Working out boosts the neurotransmitter serotonin (similar to certain anti-depressants); it also decreases the stress hormone cortisol, which tends to be elevated in those with depression. Research also suggests that depression increases inflammatory markers in the blood; exercise helps lower this inflammation.

#### ASK YOUR DOCTOR

Q Is exercise right for me? Exercise might not be the best treatment for severe depression. "Until symptoms are under control with medication, exercise might feel like an extra burden," Vonetta Dotson, PhD, explains.

#### Q How much exercise do I need?

The answer varies. Your doctor will take your physical and mental health into consideration.

a Should exercise replace other treatments?
Ask your doctor where exercise fits into your treatment plan before ditching medication and therapy for the treadmill.

#### o How long will it take to feel better? Exercise may deliver an immediate mood boost, but it takes longer to create biological changes in the brain, according to Dotson.

In addition, exercise could boost the effectiveness of antidepressants. A 2016 study found that the medications worked more effectively in those who participated in regular aerobic exercise; the same study found that exercise may decrease the need for higher doses of antidepressants.

The positive impact of exercise on depression holds true across a range of physical activities from running and strength training to yoga and tai chi. But "getting regular exercise is more important than the type of exercise," Dotson says.

For maximum impact, Dotson suggests exercising for at least 45 minutes three times per week. Because depression affects motivation, she advises exercising with a friend or as part of a group program. The peer support, she explains, will make it easier to show up—and the feel-good effects will keep you going back.

You may be less likely to develop depression if you exercise regularly. One study found that those with the lowest levels of cardiovascular fitness were 75% more likely to be diagnosed with depression than their fitter peers.

"There are psychological benefits to exercise," Dotson says. "It makes you feel better about yourself, and that increase in self-esteem can help combat depression."

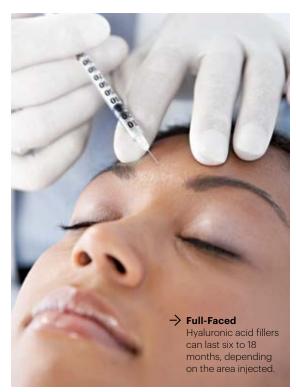
## Beauty



#### BEAUTY Q&A

## **Get Your Fill**

Love the idea of a more youthful appearance but not a fan of cosmetic surgery? Meet hyaluronic acid fillers: quick-acting facial rejuvenation treatments dermatologists use for everything from smoothing wrinkles to enhancing contours—no surgery required.



WHEN YOU TURN 30, YOU START LOSING ABOUT A TEASPOON of collagen every year. Over time, you may notice the impact: wrinkles, sagging skin, and less elasticity.

Enter hyaluronic acid (HA) fillers: soft, gel-like injectables that fill in lines, restore volume, and give lips a boost. Hyaluronic acid is a substance that occurs naturally in your skin to keep it plump and hydrated. **Jeanine B. Downie, MD,** a dermatologist in Montclair, New Jersey, gives the lowdown on these facial rejuvenation treatments.

- O What's the advantage of HA fillers?

  DOWNIE They can lift your skin, smooth out wrinkles, and improve your skin's overall appearance to help you look years younger. I like HA fillers because they're reversible, so if you're not satisfied, you can remove them. They also deliver a naturallooking result and are very versatile.
- Q What's the procedure like?
  DOWNIE Your physician will take photographs, clean your face, and then apply a numbing paste prior to delivering the injections. You might feel a little stinging from the needle.
- O How's the recovery?
  DOWNIE You may have a little swelling or bruising. For some people, the recovery is one to two days. For some, no recovery is needed. But if there's an

area with a lot of bruising, it could be a week or two.

- o How fast does it work and how long do results last?
  DOWNIE You see results immediately. HA fillers usually last a minimum of six months and can last up to 18 months. Lips typically last the shortest period of time. Cheeks, temples, under the eyes, and the chin can last a lot longer.
- Q How often are follow-up treatments? **DOWNIE** It depends on when you start. Many people start in their 30s, so they need a little every once in a whilemaybe once a year. Those who begin in their 40s or 50s might have to go back more often. Ultimately, it depends on the results you want, your smoking and tanning history, and your lifestyle as it relates to stress.

"I like HA fillers because they're reversible, so if you're not satisfied, you can remove them."

### **Expert Tips**

READY FOR HYALURONIC ACID FILLERS? SMOOTH OUT THE PROCESS WITH THESE TIPS FROM DERMATOLOGIST JEANINE B. DOWNIE, MD.

#### GO EXPERT

"Choose a board-certified dermatologist who has experience with fillers. Keep in mind the procedure is probably not covered by insurance."

#### MINIMIZE BRUISING

"Five days before, avoid anything that may increase bruising, like fish oil, St. John's wort, and anti-inflammatory medicine like aspirin, ibuprofen, and naproxen."

#### **NUMB HELP**

"At your appointment, ask for a numbing paste to reduce bruising and speed recovery."

#### **REDUCE SODIUM**

"After your treatment, cut back on salt for two to three days to help reduce swelling." Search for the video In Plain Sight: Exfoliating on WebMD.com.

REVIEWED BY Karyn Grossman, MD

WebMD Medical Reviewer

#### EXPERT PICKS

## **Back to Brilliance**

Give your complexion an instant boost with these face masks and gentle exfoliators highlighted by Moneé Thomas, MD, a dermatologist at U.S. Dermatology Partners in Houston

1 MADE IN THE MUD Sephora Mud Mask Purifying and Mattifying (\$20)

"Rivaling some pricier counterparts, this wash-off mud mask mattifies oily skin, helps decrease the appearance of small blackheads and large pores, and leaves the skin feeling soft and clean."

NO BUMPS AHEAD Neutrogena Rapid Clear Daily Leave-On Mask (\$8.49)

"Great for acne-prone skin, the active ingredient in this put-it-on-and-go face mask is benzoyl peroxide, which can help reduce the size of pimples and inflammation."

3. YOU'VE GOT A PEEL NeoStrata Smooth Surface Daily Peel (\$70)

"Glycolic acid exfoliates and boosts cell turnover in this one-step, no-rinse daily peel. The result? Smoother skin texture and a more even skin tone."

4. PORE-FECTION Dr. Brandt PoreDermabrasion (\$58)

"This physical and chemical exfoliator helps decrease the appearance of large pores and is perfect for oily skin types. It contains salycilic acid that can help with clogged pores and mild acne."

THE OPINIONS EXPRESSED IN THIS SECTION ARE OF THE EXPERTS AND ARE NOT THE OPINIONS OF WEBMD. WEBMD DOES NOT ENDORSE ANY SPECIFIC PRODUCT, SERVICE, OR TREATMENT.



dr. brandt® PoreDermabrasion® pore perfecting exfoliator

exfoliant sublimateur des pores

deep cleans pores
s smooth the appearance of skin texture

ne the appearance of porm

ade à améliorer l'apparence des pores nettole les pores en profondeur à lisser l'apparence et la texture de la su-

dr.

4

NeoStrata RESURFACE

Enhances skin clarity and texture 2

3

Smooth Surface Daily Peel Pads

10 AHA + Aminofil®

OGRAPHY: RICK LOZ

#### SKIN CARE

## **Grooming Gifts**

What would the country's top dermatologists like to find wrapped up in a box or tucked away in a stocking this holiday season? Take a look.

'TIS THE SEASON TO SPRUCE UP YOUR SKIN CARE ROUTINE or spread beauty cheer to friends and family. Try these top-rated beauty and skin care products recommended by dermatologists. They're reasonably priced and avail-



#### J. MATTHEW KNIGHT, MD. **FAAD** dermatologist, Knight Dermatology Institute, Orlando, Florida

To improve hair texture and tame frizz, says Knight, try this one-two punch: a high-quality hair dryer like the Elchim 2001 Professional Hair Drver 3 (\$85) and a jar of **Oribe Fibre Groom Elastic** Texture Paste (\$36).

The trick to beautiful skin is protecting it from sun damage. Sunscreen is key, of course, but it's just one tool in the fight

against skin aging and cancer, says Knight. "A nice widebrimmed hat like the **Tilley** TWS1 Paddler's Hat 6 (\$87) provides great UV protection in any weather or environment. Similarly, sunglasses with polarization and good skin coverage are helpful." His favorite: Spy Optic Cooper Sunglasses **2** (\$45-\$95).

What's a simpler stocking stuffer than a pack of high-quality razors and shaving cream? "A good razor and quality shave foam—along with good razor technique

and hygiene—are a must to avoid dry skin, cuts, and rashes," says Knight. He recommends the Gillette Fusion Razors 3 (\$10) and Aveeno Therapeutic Shave Gel (\$4) or a subscription to Harrys. com (prices vary).

Need a gift in a hurry? Pop into your local drugstore for luxurious moisturizer. "Moisturizers help seal water in the skin, increasing its hydration," Knight says. "Dehydrated skin doesn't function normally and is more prone to wrinkles. infections, and rashes." He likes

Vanicream Moisturizing Skin **Cream 0** (\$15) and **Cetaphil** Moisturizing Cream (\$15).

#### LINDSEY BORDONE.

MD assistant professor of dermatology, NYP-Columbia University Medical Center, New York City

How about a beauty-themed assortment? Toss these skin care goodies into a gift box or basket to meet multiple skin care needs.

Neutrogena Rapid Wrinkle Repair with Retinol **(\$24)** gets an A for anti-aging, says

Bordone. But don't go overboard on this once-a-day serum. "Use a small amount because it can cause peeling," she says.

Sunscreen is also a great gift. "A new favorite product I discovered is **Replenix Ultimatte Perfection SPF 50+ 4 (\$38),**" she says. "It's the best tinted sunscreen I've ever used. It doesn't feel at all greasy and makes your skin look even and shine-free."

To stave off acne, Bordone recommends Neutrogena Grapefruit Oil-Free Acne Wash 6 (\$8). "It has salicylic

skin but isn't irritating—and the smell is so refreshing."

She also likes Cerave Moisturizing Ceam (\$15). "It's my absolute favorite because it moisturizes well but doesn't cause acne." For hands, try O'Keeffe's Working Hands Hand Cream (\$8), which locks in moisture without leaving a thick film on your skin. "It's perfect in the winter for chapped hands," she says.

What better winter pick-me-up than a scent to remind you of summer vacaacid and is good for dry or oily tion? **Aveeno Skin Relief** to your wet scalp, lather for a

**Nourishing Coconut Body** Wash (\$8) smells incredible and is a soothing pick-me-up. "It won't leave your skin feeling dry," says Bordone, "but it does a great job of cleansing."

#### COYLE CONNOLLY, DO

dermatologist, Connolly Dermatology, Linwood, New

Connolly gives drugstore staple Neutrogena T/Sal **Shampoo** (\$6) top marks for relieving dandruff and an itchy scalp. Apply the shampoo

few minutes, then rinse. For best results, use it two to three times a week. It's also great for scaly, red skin on your face, eyebrows, or chest, he says.

Pick up a tube of **Differin** Gel (\$12) for anyone trying to combat acne. It's the only FDA-approved but prescription-strength retinoid acne treatment you can get over the counter. The effects are similar to prescription Retin-A, but it's less drying and irritating. "Use it every other night for two to three months at a time," Connolly says.



#### BEAUTY SMARTS

## In Pursuit of **Perfect Pores**

Staring at those tiny crevices in the mirror? Turns out your skin care habits might cause more harm than good. Our experts address the biggest misconceptions about the size of your pores.

IT'S A COMMON SKIN OBSESSION—AT LEAST HALF OF WOMEN CONFESS to fixating on pore size, according to a recent survey.

"My patients are very obsessed with their pores—it's a major concern," says Whitney Bowe, MD, a dermatologist in Briarcliff Manor, New York. "I see it more now that people are wanting a flawless complexion to post on

But in the pursuit of vanishing pores, some people try tactics that can make the problem worse. Before you step in front of a magnifying mirror ready to attack your pores, learn the biggest myths dermatologists want to dispel.

#### MYTH: BLACKHEADS AND WHITEHEADS ARE PORES.

FACT: A pore is a sebaceous gland that produces sebum, an oil that moisturizes and protects the skin. And while that sebum keeps your skin healthy, it can sit on the surface and magnify the pores or collect in the gland and clog it. Once the clog reaches the skin's surface, it may oxidize and turn black. In the case of a whitehead, a layer of skin seals off the pore. Both cause the pore to look bigger.

Many people think blackheads and pores are the same thing because it's

a visible obstruction on the skin's surface, Bowe explains, which leads to misguided logic that removing the blockage will shrink pore size. Trying to extract a whitehead or blackhead will injure the structures that support the sebaceous glands, which will make the condition worse, she explains. "There is no reason to pick your skin," Bowe warns. See a dermatologist or trained aesthetician to perform extractions.

→ Oil Slick

Drying out your skin in an attempt to

remove oils will only

cause it to produce

more oils.

#### MYTH: YOU CAN OPEN AND CLOSE PORES.

FACT: There's no door or flap to your sebaceous glands. Healthy pores are always open to release sebum. You may have heard that cold water closes them and steam opens them, but the muscles in the face don't work this way. A blackhead or

#### **PRODUCT PICK**

#### **AVEENO Colloidal Oatmeal** Soothing B™ath Treatment (\$9)

"Colloidal oatmeal coats the skin and acts as an anti-inflammatory, soothing skin suffering from irritation. This forms a milky bath that gently and naturally cleanses the skin while treating skin irritations like burns, eczema, and bug bites."

#### Melanie Palm, MD

assistant clinical professor, University of California San Diego

#### PRODUCT PICK

#### **NEUTROGENA Body Oil Light** Sesame Formula (\$10)

"This lightweight oil is rapidly absorbed into the skin and can be applied to damp skin after bathing or added to the bath to make the skin feel silky smooth.

#### Vivian Bucay, MD

dermatologist, San Antonio, Texas

#### PRODUCT PICK

#### TRADER JOE'S Lavender Salt **Scrub** (\$6)

"If you like salt scrubs for mild exfoliation, try this one during your next bath. In addition to the exfoliating texture, it contains moisturizing sunflower oil and the skin-calming antioxidant green tea, both great for soaking."

Tsippora Shainhouse, MD clinical instructor, University of Southern California

#### to reduce oil and debris in pores makes sense, Tanzi says, but scrubbing and aggressive cleansing can damage the skin's surface and make pores more visible.

"You don't need a product to completely remove oils," says Seemal R. Desai, MD, dermatologist in Plano, Texas, and a clinical assistant professor of dermatology at University of Texas Southwestern Medical Center. "I tell patients that skin is designed to maintain balance so over-drying the skin will cause it to produce more oils."

a whitehead may cause a pore to look full,

but if they are functioning properly, pores

remain "open." Steam or warm water will

help loosen debris and soften sebum mak-

MYTH: EXFOLIATION WILL MAKE PORES SMALLER.

FACT: The instinct to scrub and peel to strip

away oils will backfire. "Pores are not dirty

and do not need to be cleaned every day," says

Elizabeth Tanzi, MD, founder and director of

Capital Laser and Skin Care in Washington

D.C. "Over exfoliating is a problem." The urge

ing the clog easier to extract.

Rather than scrubbing and stripping the skin, Bowe advises washing with a gentle face wash in the morning and doing a two-part cleanse at night with an oil-based cleanser followed by a lightweight version: "It's about finding a balance between removing oils and avoiding irritation."

#### MYTH: YOU CAN SHRINK YOUR PORES.

FACT: "This is the biggest myth," Tanzi says. Pore size is based on genetics. Age and skin conditions like rosacea can also affect

their appearance, but reversing their size is not a reasonable expectation. "You can't really shrink pores forever—treatments can reduce the appearance, but not permanently." Some products can make them look more refined, she says (see sidebar).

However, you can avoid behaviors that will enlarge pores. "Excessive sun exposure always makes pores worse," Tanzi warns. UV rays can damage the fibers that support the pores. Without that internal structure, pores expand. Avoiding pore-clogging makeup and skin care will also preserve pore size. "I advise limiting heavy makeup and only using non-comedogenic formulas that won't clog pores," Desai says.

And if you can't stop obsessing, think about the last time you noticed someone's pores. If nothing comes to mind right away it's because the problem is most likely bigger in your mind.

### **Pore-fecting Treatments**

DERMATOLOGIST WHITNEY BOWE, MD, SUGGESTS SOME STRATEGIES FOR MINIMIZING THE APPEARANCE OF PORES

#### **GLYCOLIC AND SALICYLIC ACID**

When used in gentle peels and cleansers, these can remove surface oil and exfoliate without irritation.

The anti-ager and agne fighter speeds cell turnover, which keeps pores clear.

#### SUN PROTECTION

Shielding skin from UV rays helps avoid damage to collagen which helps support pores.

#### **VITAMIN C**

The nutrient is essential for collagen production. Use it topically and eat brightly colored fruits and vegetables.

THE SCOOP

#### **Smooth the Rough Patches**

HAVE YOUR ELBOWS AND KNEES TAKEN THE BRUNT OF THE DAMAGE OF A DEHYDRATING SEASON? FIND RELIEF WITH THESE TIPS FROM PAUL YAMAUCHI, MD, A DERMATOLOGIST IN SANTA MONICA, CALIFORNIA.



**ROLL UP YOUR** 

SLEEVES.

Friction from

clothes is one

of the sneaky

roughness on

knees. To cut

back on fabric-

to-skin contact

wear soft, loose

pants and tops.

the elbows and

culprits of

#### **SWITCH OUT** MOISTURIZES.

Petrolatum-in Vaseline and Aquaphor ointment-is most effective at locking in moisture and preventing dryness. Mineral oil or baby oil also works the same way.

Minimize the

length and temperature of

baths and show-

ers. Also, use a

surfactant-free

cleanser to keep

elbow and knee

skin soft and

#### **GET A SECOND** WASH THIS WAY. OPINION.

If your knees or elbows have redness, itching, and a lot of thickness. the problem may be psoriasis, a condition that commonly affects those areas. See a dermatologist for treatment.

#### **RESURFACING LASERS**

They stimulate protein "scaffolds" in the skin that bolster pores so they look smaller.

#### MAGNIFYING MIRRORS

Avoid them! If you can't see your pores in a regular mirror. they are normal.

WEBMD.COM

**Aisle Do** 

BRING SOME SERIOUS SKIN

**DERMATOLOGIST FAVORITES** 

BENEFITS TO YOUR NEXT

BATH TIME WITH THESE



#### ANATOMY OF...

## **Perfume**

The story behind your favorite scents

#### **PASS THE SMELL TEST**

The juice, or the scent's recipe, is what gives the fragrance its distinctive smell. The intensity of the juice determines which type of fragrance it is. *Parfum* is the most intense type, containing up to 40% scent material. Eau de parfum has up to 20%, and eau de toilette has less than 15%.

#### **TAKE NOTES**

Most scents are formulated to have three levels of notes—top, heart, and base—which affect how the fragrance "develops" as it dries. The perfume industry categorizes scents into olfactory groups based on their most prominent notes. The basic groups include fresh (citrusy, crisp, and herbal); floral (powdery, sweet, and flowery); Oriental (intense spices); and woody (sandalwood, cedar wood, and patchouli).

#### **SMELL OF SUCCESS**

For centuries, fragrances were created with essential oils and natural ingredients. Then in the 1890s, perfumers discovered aldehydes, synthetic chemicals formed by partial oxidation of alcohols, which changed the industry. Chanel's original perfumer added high levels of aldehydes to a formula he was creating for Mademoiselle Chanel, known as Chanel No 5.

#### **PRICELESS PERFUMES**

Some fragrances are so expensive because they are formulated with rare, difficult-to-harvest ingredients. Oud, for example, is derived from the wood of the Southeast Asian agar tree. When it's infected with a specific mold, the tree produces a scented resin. Only 2% of agar trees produce this resin, and it can sell for \$5,000 a pound.

#### **UNCOMMON SCENTS**

Perfume has a long history. Wearing essential oils dates to the ancient Egyptians. Archaeologists have discovered a 4,000-year-old perfume factory on Cyprus. Elizabeth I had a custom fragrance of musk and rose water. Napoleon ordered 50 bottles of cologne a month.

#### **STAY FRESH**

Apply fragrance to moisturized skin to help the scent cling longer. Scent starts to change after about a year. Store your bottles in a dark, cool place to help preserve them.

## Family



REVIEWED BY Nivin C.S. Todd, MD
WebMD Medical Reviewer



#### PREGNANCY

## **Pregnant Pose**

Incorporate yoga into your prenatal workout to keep weight gain in check, improve flexibility and balance, and ease stress

YOUR GROWING BELLY MIGHT TEMPT YOU TO TAKE IT EASY FOR A FEW months, but staying active is especially important when you're pregnant. Daily exercise helps control pregnancy weight gain, reduces your risk for gestational diabetes, and readies your body for delivery. Prenatal yoga, which combines strengthening and stretching poses with deep breathing, offers its own set of benefits.

"There is pretty good evidence that a yoga practice can reduce anxiety, stress, depression, and even low back pain during pregnancy," says Shilpa Babbar, MD, assistant professor of obstetrics, gynecology, and women's health at Saint Louis University.

You won't need to twist your pregnant body into a pretzel. Accommodate

## ASK YOUR DOCTOR

- a Is it safe for me to do yoga during pregnancy? Yoga is usually safe, unless you have specific health issues like a heart condition or bleeding, or you're at risk for preterm labor.
- o How can I practice safely?
  Go at your own pace, avoid any pose that's uncomfortable, and stay hydrated.

- Q Are any types of yoga off-limits? Take a break from hot yoga—especially during your first trimester—because overheating has been linked to birth defects. Some types of power yoga may be too intense during pregnancy.
- what other types of exercises can I do? Try to get 30 minutes of exercise on most days. Walking, swimming, and cycling are all safe for you and your baby.

your practice to your new shape. "Yoga is a pretty easy, modifiable exercise that any woman who is pregnant can do, even if they've never done it before," Babbar says.

You should avoid certain poses during pregnancy, such as twisting and lying on your belly or back. Also, skip inverted poses such as headstands or the plow (pulling your feet up over your head and placing them on the floor behind you). Use props like a block or strap to help you reach the floor, a chair to keep your balance, and a blanket to support your knees and hips.

Prenatal yoga classes are already modified for pregnancy, but if you've been practicing for a while and want to stick with the same class, let the instructor know you're pregnant. Also, check with your doctor to make sure yoga is safe for you.

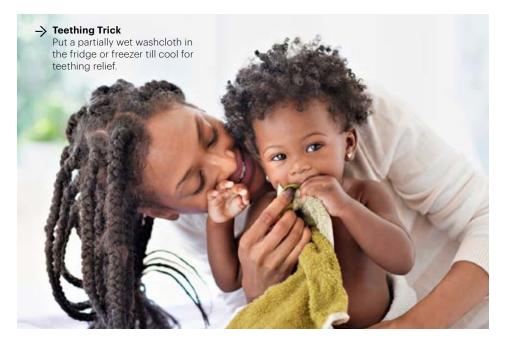
You can start practicing yoga at any point during your pregnancy, and you don't have to stop until you deliver. "I've seen women go to the end of their pregnancy," Babbar says. "There's no cutoff." But, she advises listening to your body and stopping if the poses don't feel right.

REVIEWED BY Hansa Bhargava, MD
WebMD Senior Medical Director

ВАВУ

## **Teething Wisdom**

What are the signs of teething? Which products are safe? Our experts reveal their top tips to navigate this tough time for babies and parents.



"If any symptoms aren't mild or last longer than 24 hours, you should consult your physician."

YOUR BABY IS CRYING. SHE'S DROOLING. SHE'S FEVERISH. BUT is she teething? Sometimes it can be very hard to tell. And, in fact, some symptoms your mom or grandmother might say are a result of teething aren't.

A recent study found that while teething may make babies cranky, it does not typically cause a full-fledged fever or serious tummy troubles, as some old wives' tales would have you believe. "A low-grade fever—less than 101—may be a sign of teething, as well as a clear, runny nose, a slight loss of appetite, diaper rash, or fussiness, but all of these are generally mild," says Danelle Fisher, MD, and chair of pediatrics at Providence Saint John's Health Center in Santa Monica, California. "If any of [your baby's] symptoms are not mild or last longer than 24 hours, you should consult your physician."

If your baby is teething, you'll want to do something to help relieve the pain, but think twice before you reach for that teething ring. A new study found that many teethers—even those labeled "BPA-free" or "non-toxic"—still contained harmful levels of toxins, chemicals, and endocrine disruptors.

"Since teething products are regulated by the CPSC [Consumer Product Safety Commission], they don't have the same chemical limits that the FDA requires for food and drugs," says Jonas Sickler from ConsumerSafety.org. And research shows that early exposure to those chemicals can potentially cause asthma, diabetes, neurodevelopment disorders, obesity, and reproductive abnormalities. Your best bet? "Consult your pediatrician when choosing a teether or pacifier for your baby," says Fisher.

While your grandmother's old wives' tales might not be on the mark—her old-fashion remedies likely are. Filling a mesh basket with frozen chunks of banana or offering baby a cool washcloth to chew on (partially wet a washcloth and put it in the fridge or freezer until cold) can often help ease teething pain.

### **4 Questions**

TALK TO YOUR PEDIATRICIAN ABOUT TEETHING AT YOUR NEXT VISIT

#### MY BABY HASN'T STARTED TEETHING YET. IS THIS NORMAL?

The first teeth usually pop through the gums between 5 to 7 months of age. But remember: Every baby is different. If you are worried, talk to your doctor.

#### ARE HOMEOPATHIC REMEDIES FOR TEETHING SAFE?

Some homeopathic products contain belladonna, which has been linked to seizures. Always check with your doctor first.

## IS IT OK TO GIVE ACETAMINOPHEN FOR THE PAIN?

If your baby is especially cranky, acetaminophen might help. Check with your doctor for the appropriate dosage.

#### AT WHAT AGE DOES MY CHILD NEED TO SEE A DENTIST FOR THE FIRST TIME?

The American Academy of Pediatric Dentistry recommends that a child go to the dentist by age 1 or when the first tooth appears.

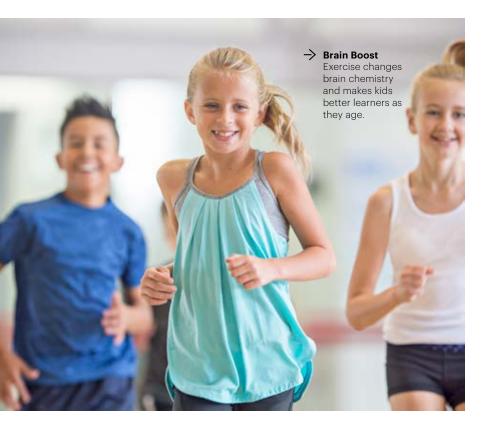
REVIEWED BY Roy Benaroch, MD

WebMD Medical Reviewer

#### KIDS' HEALTH

## **Brains and Brawn**

Studies show a direct correlation between academic performance and fitness levels in kids, not to mention improved behavior and school attendance



AS SCHOOLS CUT BACK OR EVEN ELIMINATE P.E. CLASSES ACROSS THE nation, research from all over the world indicates more—not less—exercise boosts cognitive ability over the short and long terms, improves student test scores, and helps decrease behavioral issues in the classroom.

So says John J. Ratey, MD, associate clinical professor of psychiatry at Harvard Medical School and author of *Spark: The Revolutionary New Science of Exercise and the Brain*. He cites studies conducted nationwide, plus others out of Ontario, Sweden, Finland, and Iran.

"Everyone gets a big benefit from exercise," says Ratey, and by this he means sweat-inducing physical movement for at least 30 minutes each day. "Kids with

behavioral problems represent the low-hanging fruit: They get much better, are more in control and focused. But the major news about exercise is that it promotes not just emotional regulation but can optimize our cognitive apparatus, our ability to take in information—to remember, learn, and manipulate it." Which is especially key for children, he notes, as they process large loads of new, incoming information each day.

Exercise promotes neuroplasticity in the brain. "This is the ability of brain cells to grow," Ratey explains. "The way we learn anything is to grow more neurotransmitters and receptors that make connections stronger. If we don't grow the information, we don't change the brain to retain the information in our heads, and then we don't remember. Nothing improves the state of neuroplasticity better than exercise. Drugs, meditation, a better diet, and sleep can all help. But exercise is best."

The reason, he says, is that exercise changes the brain's chemistry: "It's like taking a little bit of Prozac and a little bit of Ritalin, making you less anxious and more focused. You also activate more of the brain during exercise than any other human activity. This causes your brain cells to release more BDNF or brain-derived neurotrophic factor. I call this 'brain fertilizer.' It promotes the brain so it's ready to grow; it makes you more attentive, with brain cells ready to take in and retain information."

The fitter a child is, the research shows, the higher his or her tests scores are. "It's very clear—a straight line," Ratey maintains, citing a California study, among others. And, he adds for emphasis, "Not only do kids establish healthier habits, they begin to make a better brain to carry forward," making them stronger learners with less cognitive decline as they age.

#### BY THE NUMBERS





The world ranking of Naperville, Illinois, school district in science; as well as #6 in math, with zero obesity. Some 19,000 students exercise for 45 minutes each school day.



The drop in discipline problems among students after just four months of daily exercise at one school.



Suspensions (down from 95) after one Ontario high school had a special class that introduced daily exercise.

PETS

## **Pets and Diabetes**

Just like people, your dog or cat can get diabetes. Improved lifestyle factors may make the difference for your pet's health.



DOES YOUR CAT DRINK A LOT MORE WATER LATELY? DOES YOUR dog need to urinate more? These could be signs of diabetes, which means your pet's blood sugar is higher than normal. Diabetes occurs when your dog or cat doesn't make or use insulin well, a natural hormone needed to move sugar from the bloodstream to the cells.

However, "the first thing to make clear is that diabetes in dogs and diabetes in cats is very, very different," says Audrey K. Cook, BVM&S, MRCVS, associate professor of Small Animal Internal Medicine at the College of Veterinary Medicine and Biomedical Sciences at Texas A&M University.

"We tend to draw parallels between type 1 human diabetes and the kind of diabetes we see

→ Warning Signs Take your dog to you notice signs of increased thirst

and urination

in dogs," she says. In type 1, the immune system attacks insulinthe vet as soon as producing cells in the pancreas and destroys them. And just as for humans, this type of diabetes in dogs "is generally not a

reversible condition," she explains.

On the other hand, diabetes in cats is similar to type 2 diabetes in humans—caused largely by lifestyle issues like being overweight, inactive, or eating a high-carbohydrate diet, Cook says.

For cats, diabetes is on the rise. They are designed to spend lots of energy hunting and eating a high-protein, high-fat, and lowcarbohydrate diet. But today's domestic cats are largely kept indoors because "we love them and want to keep them safe," and where we leave lots of food out for them.

In short, like their human counterparts, cats can become couch potatoes. "They're not hunting, so they become sedentary and obese," says Cook.

#### What are the signs?

"A lot of people notice that their pet starts drinking more. And with dogs, they have to go outside all the time and urinate a lot," says Jennifer M. Reinhart, DVM, MS, DACVIM (SAIM), clinical instructor, Small Animal Internal Medicine at the University of Wisconsin-Madison School of Veterinary Medicine.

It may be harder to tell if your cat is urinating more, though "with clumping litter, you may see larger clumps," says Reinhart.

Another sign? Your pet may be eating more but losing weight.

While increased thirst and urination are similar in cats and dogs, the changes can be pretty dramatic with dogs, says Cook: "Your

Continued on page 34

#### Continued from page 33

dog was perfectly normal a week ago, and then today is extremely thirsty, urinating a huge amount. And, once a dog becomes diabetic, [he or she] is very hungry."

Don't wait to take your dog to the vet if you notice these signs. "If they don't see a doctor and aren't treated fairly quickly, they'll start to get ill from what's called diabetic ketoacidosis," says Cook. "And that's a fatal condition if left untreated."

With cats, the process is less dramatic. "Cats will drift into a diabetic state," says Cook. "So their blood sugars will [rise] up much more slowly, and they'll bounce on the prediabetic or diabetic fence for maybe weeks."

#### What's the treatment for diabetes?

"In all cases with animals the treatment is insulin therapy, which is injectable under the skin, usually twice a day," says Reinhart.

And while it may take some time to get used to giving your pet insulin shots, it doesn't seem to bother them. "Just sneak up behind them while they're eating, and pop them in the scruff of the neck," she advises. "They don't even notice because they're focused on their food."

#### Can diabetes be cured?

"I would be careful with the word 'cure," says Reinhart. "We use the word 'remission' with cats because though

you can get them back under control, there's a high likelihood of it coming back. Dogs almost never go into remission. Dogs will very likely need to be on insulin for the rest of their lives because of the type of diabetes."

To get your cat into remission, put him on low-carbohydrate food. But you don't have to count carbs. "Many of the big pet companies make cat foods that are designed for cats with diabetes, diets that are very high protein, high fat, and low in carbohydrates," says Cook.

"For dogs, any balanced diet is usually fine," she adds.

Next? Exercise. "Just adding 10 minutes of play time for kitties can be beneficial," says Reinhart. "There's something about muscle activation that reduces insulin resistance, so it can really be therapeutic."

Though it may feel daunting to have a pet with diabetes, be sure to educate yourself about the disease, says Cook. "Talk to your family about it. Talk to other pet owners with diabetic animals," Reinhart adds. "A lot of people find that after the first three or four weeks everybody falls into a routine, and it's not as bad as you think it's going to be."

"Find a vet who understands diabetes and is going to be your cat or dog's advocate," advises Cook. "You need a good team around you. And ask as many questions as you need."



#### ASK YOUR VET

Q How is diabetes diagnosed?
Your veterinarian will base the likelihood of the disease on the age, sex, and breed of your pet, and any symptoms you report. He or she will then confirm a diagnosis with blood and urine tests.

Q What's the best food for my pet? "For a diabetic or prediabetic cat, the guidelines say that less than 12% of calories should come from carbohydrates," says Audrey K. Cook, BVM&S. "For dogs, any balanced diet is fine," she adds. Q How can I help my cat exercise? "You don't have to take them out on a leash and make them walk around the block," says Jennifer Reinhart, DVM. "Just getting off the couch playing with a string or laser pointer for a few minutes a day can be beneficial."

#### o Can my pet with diabetes lead a normal life?

"A well-managed pet with diabetes can have a fairly normal life span," says Reinhart. Make sure to partner with your vet and stay in good communication to keep diabetes under control.

BY THE NUMBERS



Percentage of cats with diabetes that have the type 2 form, often caused by being overweight and inactive.

The average age of a diabetes diagnosis in cats.



The average age of a diabetes diagnosis in dogs.

REVIEWED BY Roy Benaroch, MD WebMD Medical Reviewer

#### TEEN HEALTH

## **Cruise Control**

Young drivers are at more risk than ever, new research suggests. One street-smart instructor gives his tested rules for the road.



"Kids often don't consider consequences. They focus on what they're doing, not where they're going."

EARNING A DRIVER'S LICENSE HAS LONG BEEN A RITE OF PASsage for teenagers in America. But with mobile devices distracting teens at every turn, are they ready to take the keys?

Maybe not. Some studies suggest the internet has abated the urgency for young people to connect in real life now that they can group text and meet online. Yet even with the rate of 16 year olds applying for their learner's permits falling by 47% since 1983, deadly teen crashes are on the rise. According to a recent study by the AAA Foundation for Traffic Safety, drivers ages 16 to 17 are three times more likely than adults to be involved in a collision, with a 10% spike in fatalities between 2014 and 2015, the latest data collected.

Ira Okin, an instructor at Formula One Driving School in Mamaroneck, New York, who has taught teens and adults how to drive for the past decade, steers teen drivers toward safety with these pointers:

#### SIGNALS! MIRRORS! BLIND SPOTS!

"Signals are your lifeline," Okin emphasizes. "They inform others of what you're doing. Too many people, including grownups, don't use them. Also, take quick glances at your side and rearview mirrors every three to five seconds. Regularly glance at blind spots to stay out of trouble."

#### **THINK AHEAD**

"Kids often don't consider consequences, like pulling out of a driveway too quickly. Or they don't look down the road 500 feet-they focus on what they're doing, not where they're going. Or they zone out at red lights." Remind them: anticipate, anticipate, anticipate.

#### LISTEN TO THE LAW

"I've had kids tell me: 'My dad says I can go a little faster than the [posted] speed limit.' Never confuse your kids. Follow the law exactly."

#### YOU'RE IN THIS ALONE.

"Nobody out there cares about you," Okin tells his students bluntly. "Other people want to go where they want to go, and they don't want you in their way. Stay observant at all times."

First and last rule? "Put down your phone" when you drive.

BY THE NUMBERS



Percentage of teen drivers who admit to texting while driving. Some 13% of 18 to 20 year olds involved in car wrecks confessed to using cell phones while driving.

Number of people in the U.S. killed in crashes involving inexperienced teen drivers in the past five years.

More than



Compared to driving solo, a 16- to 17-year-old driver's risk of death per mile driven doubles when carrying two passengers

REVIEWED BY Arefa Cassoobhoy, MD WebMD Senior Medical Director



Battery-powered toys are fun for older kids, but keep the batteries away from small children.





earch for the Parenting Message

## **Holiday Hazards**

Take these precautions to keep your kids safe during this season of festivities

> FULL OF FESTIVE DECOR AND FAMILY TRADITIONS, THIS TIME OF YEAR offers plenty to be jolly about. But many items that make the holidays merry may also pose a health or safety risk to children. In fact, this time of year is one of the busiest for emergency rooms. Whether you have kids of your own or plan to host children at your home this holiday season, these eight tips will help keep them out of harm's way.

#### STAY AWAY FROM TOXIC PLANTS

Sharp, prickly leaves aren't the only reason to avoid holly bushes. The berries can be poisonous to people and pets. Eating just a few berries can cause vomiting, diarrhea, dehydration, or drowsiness. Mistletoe also contains a potential toxin. Though most people who eat small amounts of mistletoe generally won't be poisoned, keep these potentially harmful plants out of your home if you have young children around.

#### WATCH OUT FOR DANGEROUS DECOR

Bubble lights (those throwback lights from the 1950s, 1960s, and 1970s) may look cheerful, but they pose a danger to little ones. The fluid inside the bulbs—methylene chloride—is highly poisonous if inhaled or swallowed, or if it

touches the skin. Symptoms include nausea, vomiting, headache, drowsiness, or even death.

Shiny tinsel and sparkly ornaments can also be choking hazards. As a general rule, if it's small enough to fit in the mouths of babies and toddlers, it's too small to play with. Plus, fragile glass ornaments can break easily and cause cuts. Keep all of these potentially dangerous decorations high on the tree—or better yet, skip them altogether until your children are older.

#### CHILD-PROOF YOUR CHRISTMAS TREE

Homemade or commercial tree preservatives (especially if they're made with bleach and vinegar or alcohol) can harm your children or pets if they drink them. Use only plain water in tree stands. Also, if swallowed,

needles can cause painful cuts in the mouth and throat, so clean up fallen needles quickly.

#### **PLAN A SAFE PARTY**

Pickup any leftover drinks sitting around during a party, and keep any bottles or cans of alcohol out of kids' reach. Whether it's wine, spirits, or beer, a sip of alcohol can be dangerous for children, causing their blood sugar to drop and possibly leading to seizures, coma, or even death. Party foods like popcorn and peanuts are small enough for kids to choke on. If you're hosting children under the age of 4, serve an alternative snack.

#### **BEWARE OF BATTERY-POWERED PRODUCTS**

Make sure that children can't get their hands on a batteries from toys or decorations. The button-shape kind is especially risky because they're round, but any size can cause burns in the esophagus if they're swallowed. Never leave batteries sitting out, and use tape to secure any battery compartments that may open if dropped.

#### STORE MEDICATIONS SAFELY

If you have guests over, remind them to keep all medications and vitamins securely closed and kept out of sight and reach of children. Kids can also get into purses or bags, so store those in a place they can't reach. If your kids

visit or stay at other peoples homes, make sure they put any medications (including products like cold medicine or diaper rash creams) in a safe place.

#### AVOID THE RISK OF A FIRE

A roaring fire sets a cozy scene for holiday celebrations, but it can be risky. More home fires occur during winter than any other time of year. Have your fireplace inspected before lighting the fire for the first time each year. Don't burn paper or pine boughs, which can drift out the chimney and possibly spark a fire on your roof or a neighbor's. And keep any heat sources, like radiators, space heaters, or candles, away from your tree.

#### TRAVEL SMART

Traveling during the holidays isn't easy on anyone, but it can be especially difficult with toddlers. Try to plan sleeping arrangements in advance, and make sure the area is safe and secure. Beware of any loose cords and stairs they could fall down, and ask your host if it's OK to move any potentially dangerous items. When it comes time to eat, take inventory of the table setting. Watch out for any potential choking hazards, foods your child is allergic to, or foods that could burn them, like hot soup or foods in chafing dishes.

Party foods like popcorn and peanuts are small enough for kids to choke on. If you're hosting children under the age of 4, serve an alternative snack.

BY THE NUMBERS

Number of annual emergency department visits for

scooters cause the most injuries of any toy.

toy injuries in children under age 15. Non-motorized

Number of injuries involving holiday decorating in November and December—that's about 250 injuries a day

Number of home fires that begin with Christmas trees

How quickly a swallowed button battery can start to damage a child's esophagus.

REVIEWED BY Will Draper, DVM
WebMD Medical Reviewer

#### PETS

## **Pet Presents**

When you make a list and check it twice, don't forget to include your pets—even the ones that spend part of the year on the naughty list

THE HOLIDAYS ARE A great time to treat dogs, cats, and birds to presents designed to improve their health and well-being. Our experts highlight some of their favorites.



THE OPINIONS EXPRESSED IN THIS SECTION ARE OF THE EXPERTS AND ARE NOT THE OPINIONS OF WEBMD. WEBMD DOES NOT ENDORSE ANY SPECIFIC PRODUCT, SERVICE, OR TREATMENT.

Wendy Mandese DVM, clinical assistant professor at the University of Florida College of Veterinary Medicine, recommends three products that will get two paws up from your favorite canine.

**FOR DOGS** 

## • WHISTLE 3 GPS PET TRACKER (\$80 PLUS A MONTHLY MONITORING FEE)

The next time your dog follows his nose around the neighborhood, you'll know exactly where to find him. The GPS tracker attaches to his collar and syncs to a mobile map, helping reunite missing pets and their owners. Mandese calls it "a

#### 2 THUNDERSHIRT (START-ING AT \$40)

great backup" to a microchip.

Outfit your anxious dog in a ThunderShirt (starting at \$40) during a storm and watch her worry disappear. The fitted vests "provide a constant soothing pressure that [instills] a sense of calm," says Mandese. Dogs can also wear the vests to quell separation anxiety, during nerve-wracking trips to the vet, or in other situations that make them uncomfortable or afraid.

#### **3** OUR PETS IQ TREAT BALL (\$10)

The next time your dog wants a treat, make him work for it. Puzzle toys are available in multiple designs—from balls that dispense treats when dogs roll them around to activity boards that require moving knobs or flaps to uncover food. This ball toy is simple to fill and rolling it around the house will help your pet get a little exercise while chasing his supper. Rather than filling the ball with treats, Mandese recommends putting a portion of your dog's daily kibble in the puzzle, which can help prevent weight gain.

## 3 Tips

OUR EXPERTS SHARE SOME TIPS TO HELP YOU CHOOSE THE RIGHT GIFT FOR YOUR PET

#### SIZE MATTERS

A Rottweiler shouldn't chomp on a bone meant for a Chihuahua, and a parakeet needs a different perch than a cockatoo. **Laurie Hess**,

**DVM**, advises keeping the size and breed of animal in mind. New pet owners or someone buying a gift for a pet owner might not.

#### THINK OUTSIDE THE PET STORE

For a social dog, a gift card to a doggie daycare or membership to a good park may be the best present. "Many dogs don't get enough time to play," says **Wendy Mandese**, **DVM**.

#### DON'T EXPECT PETS TO SHARE

When it comes to bones, food treats, or food puzzles, Mandese says, keep them separate for feeding time and give each pet its own food toys.



**Alicia Hines, DVM**, veterinarian at Boone Animal Hospital in Western Springs, Illinois, chooses three purr-fect gifts for your feline friends.

#### **4** PETCUBE PLAY WIFI PET CAMERA (\$155)

The interactive WiFi camera connects to a smartphone app and allows you to see and play with your kitty when you're not home. The camera lets you check in on your cat, but Hines likes the built-in laser pointer best. "We spend so much time away from our cats, and this is a great way to interact with them even when we can't be there," she says.

#### **5** HEXBUG REMOTE CONTROL MOUSE (\$20)

The old-fashioned mouse has gone high-tech. This battery-operated version runs and stops with a touch of the remote, resembling (to your cat, anyway) a real mouse. "Playtime is great for bonding with your cat, and these kinds of chase toys are great for exercise, too," says Hines.

#### 6 KATRISCAT MODULAR CAT TREE (\$200)

This structure comes with five geometric blocks that can be rearranged into multiple configurations, creating a feline jungle gym of vertical and horizontal surfaces. "Rotating the blocks enriches their environment, giving them new places to scratch and spread their scent," Hines says.

#### FOR BIRDS

Three cheeps for these gifts for your feathered friends, says **Laurie Hess, DVM**, veterinarian and founder of The Veterinary Center for Birds and Exotics in Bedford Hills, New York.

#### **7** A&E CAGE COMPANY CHUNKY MONSTER (\$24)

"Birds have a behavioral and psychological need to chew," says Hess. This toy has multiple materials, such as softwood and string, that satisfy those urges and provides in-cage entertainment.

#### **8** CAITEC BUFFET FORAGING BOX (STARTING AT \$15)

Mount this foraging box to the side of your bird's cage and watch him hunt for hidden food items. Inquisitive birds like parrots will love this activity, which mimics wild behavior. "It helps provide intellectual stimulation," Hess says. Choose from various shapes and sizes designed for different species of birds.

## DOCTORS FOSTER AND SMITH TEACH BOX (STARTING AT \$15)

Give the gift of education. Your bird can learn to deposit colored acrylic coins into slots. Hess says it involves teaching color and shape recognition while your bird manipulates objects with its beak and feet—"it's a good choice for mental stimulation," she adds.





**By** Kara Mayer Robinson

**Reviewed by** Brunilda Nazario, MD WebMD Lead Medical Director

# SETIN STONE

A long-time advocate for HIV/AIDS awareness and a believer in clean living, actor **Sharon Stone shares her passion** with the world

ears after actor Sharon Stone burst onto the scene with her unflappable confidence and glamour, she continues to shock fans and critics.

In July, the Hollywood icon posted pictures of herself clad in a bikini on social media, and the internet went wild. One photo received 30,681 Instagram "likes"—and triggered an avalanche of comments, like "sexiest woman on Earth," "still scorching," and "an absolute inspiration to all women."

Of course, not everyone was a fan. Some called her "old." Others suggested the images were digitally enhanced.

But Stone, 59, isn't the type to let naysayers ruin her day. In fact, criticism is nothing new. "I've had people try to shame me for my work—but to what end?" says the former model and film star who'll appear in the movie *The Disaster Artist*, in theaters in December. "People will find anything to have a reason to make you feel 'less than.' They don't want you to pop up above the water level. But everybody should feel special and wonderful."

Though she has appeared in more than 100 films and earned a Golden Globe for her work in the Martin Scorsese blockbuster *Casino*, her turn as a femme fatale in the 1992 thriller *Basic Instinct* made her notorious for pushing the envelope. The film included a scene with partial nudity. While it established her as a bona fide movie star, it attracted some criticism.

Stone took the criticism and accolades in stride. "I don't want to be the flavor of the day," she says. Stone tries not to be swayed by fickle nature of Hollywood or by others' expectations. "I just think it's better to have a more grounded perspective," she says.

So she focuses less on what people think and more on making the world a better place. "All we have to give in this life is service and kindness to others," she says. "What else is there?"

#### A Passion for Good

True to her word, Stone has passionately advocated for many health causes. She helped raise money for breast cancer research and those in need following Hurricane Katrina. In 1993, she co-created Planet Hope, a foundation for homeless and abused mothers and children that is still going strong.

In the early 90s, Stone became involved in HIV/AIDS education and fundraising. Her neighbor, Elizabeth Glaser, who created the Pediatric AIDS Foundation to raise money for research, was living with HIV. Glaser's daughter, Ariel, had died from AIDS. Stone and a group of other neighbors wanted to help, so they organized street fairs to raise funds.

"That grew and grew," Stone says. The president of the Dominican Republic heard what Stone did for Glaser and asked for her help. "There were so many children dying in the Dominican Republic, and they needed someone to come down and guide them," she says. "I went with maybe six people. We tried to help people understand what we knew and to raise money. It was heartbreaking."

Since then, Stone has continued to be actively involved. For more than 20 years she has been the global campaign chair for amfAR, the Foundation for AIDS Research, traveling to places like Dubai, Mumbai, and Sao Paolo to chair events and raise money for research.

Stone received several awards for her advocacy, including the Academy of Television Arts & Sciences' Ribbon of Hope and the Human Rights Campaign's Humanitarian Award.

Now she works with the Foundation for the AIDS Monument to raise money for a memorial to be installed near West Hollywood Park in 2019. Funded by donations from private organizations and the public, it will be a group of totem-pole structures designed to honor, memorialize, and inform visitors about the many people affected by HIV/AIDS. The memorial will also have a digital component—video interviews that tell stories about HIV and AIDS from the perspective of activists, medical professionals, and family members.

Jeff Valenson, a volunteer who works with Stone and the Foundation for the AIDS Monument to raise money, says Stone's impassioned speeches have inspired many to get involved. "She has served as a spokesperson for events and helped raise over \$500,000, in addition to contributing as a major donor," he says, adding that Stone was recently named to serve on the board of trustees of the foundation.

#### 'It's Not Over'

HIV, or human immunodeficiency virus, is a virus that attacks the body's immune system and is spread through body fluids like blood, semen, vaginal secretions, and breast milk. It makes it hard for the body to fight infection and disease and may develop into AIDS, or acquired immunodeficiency syndrome, if not treated properly. HIV can't be cured but medication, called

antiretroviral therapy (ART), can keep it under control.

Since the epidemic began in the early 1980s, 35 million people have died from AIDS-related illnesses worldwide. But researchers and doctors have made major strides in testing, treatments, and prevention.

"In the 1980s, HIV was a virtual death sentence," says Michael Gottlieb, MD, an HIV specialist who was actor Rock Hudson's doctor and co-founded amfAR. "Now patients fortunate enough to be able to access antiretroviral medicines and who take them are projected to have near normal life expectancy." he says. Treatment can bring the virus to what doctors call an "undetectable" level. "This reduces the risk of transmission to a miniscule level, if at all," Gottlieb adds.

But it's not over. In poorer countries, people with HIV are often diagnosed too late, lack access to medicine, and are still dying, says Gottlieb. In 2016, 1.8 million became newly infected and 1 million people died.

In the U.S. about 1.2 million people have HIV. Certain groups are particularly at risk, including black and Hispanic gay and bisexual men. "People don't realize the HIV epidemic is not under control in the U.S.." Gottlieb adds.

Gottlieb says funding is key to target, educate, and treat high-risk populations and to find an effective vaccine and a possible cure. That's where people like Sharon Stone come in.



#### **Act Three**

Even though Stone has continued to step into the spotlight for HIV/AIDS awareness, in recent years she dipped below the radar professionally. Though she kept working—in films like Fading Gigolo and television series like *Law & Order: SVU*—since the early 2000s she has had mostly smaller roles.

This was by choice, she says, so she could actively support her adopted sons, Roan, now 17, Laird, 12, and Quinn, 11. It didn't feel right to be away filming movies and in the public eye as they grew up, she says now.

Stone believes it paid off. "I'm so proud of the young men that they are. They're kind and warm and funny and bright and interested. And they're good—they have good character," she says.

Now that they're older, she's diving back in. "Because they're running around doing so much stuff out of the house, it's the appropriate time for me to be out of the house too. It's natural," she says.

But she wouldn't trade her time away from big film projects for anything. "I'm so much less in the spotlight right now, which has actually been terrific," she says. "Frankly, I've enjoyed my reprieve."

For much of her adult life, Stone says she felt pulled by the desires of others. She was in a series of relationships with men who she now believes weren't in it for the right reasons and didn't support her.

Having kids helped her see the big picture, she says. Now she's squarely focused on what feels right—having a happy family, following her own compass, and striving for health and wellness.

Speaking of wellness, how does Stone radiate such confidence and health?

Perhaps it's attitude. Stone believes hyperfocusing on the aches and pains that come with age, and talking about them incessantly, is a trap. "We have to stop having these conversations or else we're going to have to meet people and be like, 'Hi, I'm Sharon, you know, teeth and knees," she says with a laugh.

Stone is also a believer in clean living. "I don't eat a lot of processed food, though I haven't been able to get potato chips out of my mind!"



she says. She eats gluten-free, avoids caf-

Being active comes naturally. "I'm ath-

letic. I've always been kind of a tomboy.

I'm the person who likes to hit baseballs

and throw footballs and run around on the

But it was actor and bodybuilder Arnold

Schwarzenegger who turned Stone into a fitness enthusiast. To play his wife in the

1990 movie Total Recall, she whipped

herself into top shape. "I had to lift really

heavy weights and do karate for hours

every day," she says. After hanging out

with Schwarzenegger and his fitness-buff

friends, she became a believer that fitness

Stone especially loves Pilates and does it

three to five times a week. "On a good day I

might work really hard for an hour and 15

minutes on a Pilates machine. If my body

doesn't feel willing, I might do stretches for 30 to 40 minutes. Like everybody, I have

good days and not-so-good days. I really

Stone also swears by sleep, deep breathing, tending her garden, and prac-

After decades of ups and downs in Hollywood and in life, she believes it's equally important to be kind and loving to herself-no matter what people say, think,

"I feel like this is the third act of my life," Stone says. "To come to the true core of my being and not be pulled by the fancy of others? That, in fact, is true wellness."

believe you have to listen to your body."

feine, and rarely drinks alcohol.

beach," she says.

changes everything.

ticing Buddhism.

or expect.

Top left: Stone will appear in The Disaster Artist with Dave Franco. Top right: Sharor at amfAR's 21st Cinema Against AIDS Gala in 2014.





Stone won a Golden Globe for her role in Casino in 1995.

### **HIV/AIDS** Then and Now

- + Since the epidemic began, **76.1** million people have been infected
- + Globally, **36.7 million people now live with HIV**–17.8 million are women and 2.1 million are children.
- + Regions most affected are sub-Saharan Africa, Asia, the Pacific, Latin America and the Caribbean, Eastern Europe, and Central Asia.
- + As of 2014, about **1.2 million** people in the U.S. live with HIV.
- + In the U.S., about one in seven people who live with HIV don't know they have it.
- + Most people diagnosed with HIV in the U.S. are men-about four in five.
- + The number of black and Hispanic people living with HIV is higher than average. In 2015, 45% of people in the U.S. with HIV were black and 24 percent were Latino.
- + AIDS-related deaths peaked in 2005. Since then, the rate has fallen by 48%.
- + Since 2010, **new infections have** fallen by 11 percent.
- + About 19.5 million people currently take medication for HIV.
- + About **53% of people** with HIV have access to treatment.
- + In 2016, about one guarter of pregnant women living with HIV lacked access to medication to prevent passing it to their babies.



EXPERTS HAVE
DETERMINED
THREE KEY
STRATEGIES THAT
MAY PREVENT
MEMORY LOSS

rom eating blueberries to doing mental puzzles, researchers have long searched ways to prevent memory loss and dementia as we age.

An expert panel that reviewed the science behind hundreds of studies finds that three strategies may help lower the odds of memory loss: regular exercise, blood pressure control, and brain training.

This conclusion, however, comes with a strong caution that the evidence is modest and doesn't prove the strategies can prevent declines in thinking and memory. Still, the report—released last summer by the National Academies of Sciences, Engineering, and Medicine—suggests that lifestyle changes could help.

"I think the bottom line is, there are some areas of hope and encouragement," says panel member Dan Blazer, MD, PhD, of Duke University School of Medicine in Durham, North Carolina.

#### A WAY FORWARD

To create the report, titled "Preventing Cognitive Decline and Dementia: A Way Forward," the expert panel evaluated evidence from hundreds of studies called randomized clinical trials, considered the gold standard for scientific research. They also looked at evidence from other types of research.

Preserving memory and thinking skills is especially crucial. More than 5 million Americans now have Alzheimer's disease, the most common form of dementia, according to the Alzheimer's Association (AA). By 2050, the number could reach 16 million. Treatments are elusive, with no new drugs approved for use for more than a decade into the future. Drugs that are approved now may help slow the disease, but they do not provide a cure.

The panel stopped short of recommending everyone use the strategies—blood pressure control, regular exercise, and brain training—saying they need more research that shows how well they work.

Some research has found that managing high blood pressure, especially from ages 35 to 65, lowers the chance of developing dementia. While previous research showed that inexpensive blood pressure drugs can cut the odds of Alzheimer's, what seems to matter most, Blazer says, is not a specific drug but that blood pressure is controlled.

Research has also linked regular exercise with a healthy brain, but the studies reviewed were not consistently positive, the panel said. "Exercise is a good thing," Blazer says. But so far scientists lack enough research to pinpoint how much is needed or what type of exercise is best.

Brain training includes a variety of activities, such as computer-based and non-computer-based training exercises to improve memory, problem solving, and other skills. The panel singled out a study known as ACTIVE (Advanced Cognitive Training for Independent and Vital Elderly), funded by the National Institutes of Health, as one with the strongest design. It found "moderate strength" evidence at two years that the training can improve how well your brain works, but the results diminished after five years. A commercial version of the training program, not yet available to the public, is in the works, says lead researcher George Rebok, PhD.

MANAGING HIGH BLOOD PRESSURE, ESPECIALLY FROM

**AGES 35 TO 65,** 

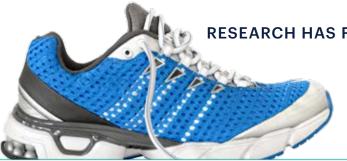
LOWERS THE CHANCE OF DEVELOPING DEMENTIA.



#### **BRAIN TRAINING**

INCLUDES A VARIETY
OF ACTIVITIES, SUCH
AS COMPUTER-BASED
AND NON-COMPUTERBASED TRAINING
EXERCISES TO
IMPROVE MEMORY,
PROBLEM SOLVING,
AND OTHER SKILLS.





RESEARCH HAS FOUND THAT EXERCISE AT MIDLIFE

**COULD LOWER THE CHANCE** 

**OF DEMENTIA BY HALF.** 

# **WHAT ABOUT DIET?**

Claims about diets for brain health are plentiful. In one of the latest studies, Temple University researchers found that extravirgin olive oil helped stave off Alzheimer's, at least in mice. Those fed a diet enriched in extra-virgin olive oil could learn and remember better than those not fed the diet.

The panel did not find enough evidence to recommend any specific diet. But it did single out three diets that showed promise: the Mediterranean, the DASH (Dietary Approaches to Stop Hypertension), and the MIND diet (Mediterranean-DASH Intervention for Neurodegenerative Delay). The diets emphasize whole grains, fruits and vegetables, and low-fat dairy, and keeping salt in check.

"Diet deserves more study," Blazer says.
"It doesn't reach the level of evidence that exercise does."

As far as other factors, the panel found no benefit from antidementia drugs, also known as acetylcholinesterase inhibitors. While the drugs are used to treat Alzheimer's symptoms, none treat the underlying cause or slow the worsening of the disease, the panel says. Research also shows they didn't help memory and thinking skills in those with mild cognitive impairment, which happens before dementia.

DIET DESERVES

MORE STUDY.

IT DOESN'T REACH
THE LEVEL OF
EVIDENCE THAT
EXERCISE DOES.

The panel also did not find any benefits from nonsteroidal anti-inflammatory drugs (NSAIDS), such as aspirin, ibuprofen, and naproxen; gingko biloba, an herbal supplement; or vitamin E.

# THE BOTTOM LINE

Keith Fargo, PhD, director of scientific programs for the AA, says the organization agrees with the top three strategies the expert panel highlighted.

Fargo adds that while the panel found dietary evidence inconclusive, the AA believes moderate evidence suggests that the Mediterranean diet or a similar one, such as DASH, may help lower the chance of developing dementia.

Gary Small, MD, director of the UCLA Longevity Center, says the report's conclusions make sense. "Intuitively, we know that what is good for your heart is going to be good for your brain," he says, referring to blood pressure control and exercise findings. While not yet proven by research that these practices will also lower the odds of dementia, the strategies are good for your overall health, he says.

Ross Andel, PhD, a gerontologist and professor of aging studies at the University of South Florida in Tampa, has found in his own research that exercise at midlife could lower the chance of dementia by half. Even so, Andel says, "There's a tremendous amount of work to be done before we can make any recommendations to the public." With cancer and heart disease, he says, "we have made great strides forward. There are ways to reduce risk." Not so for dementia, he says.

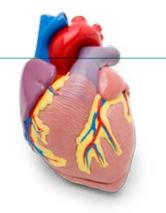
"The issue is magnified by the fact that there is no definitive treatment for dementia," Andel says.

At least, not so far.



# INTUITIVELY, WE KNOW THAT

WHAT IS GOOD FOR YOUR HEART IS GOING TO BE GOOD FOR YOUR BRAIN.



PERCENTAGE OF PEOPLE WITH ALZHEIMER'S WHO DEVELOP SYMPTOMS BEFORE AGE 65, CALLED EARLY-ONSET ALZHEIMER'S. 5%

# BY THE NUMBERS

NUMBER OF PEOPLE IN THE U.S. WHO CURRENTLY LIVE WITH ALZHEIMER'S DISEASE.

66 SECONDS

HOW OFTEN A NEW PERSON IS DIAGNOSED WITH ALZHEIMER'S DISEASE. 105

60%-80%

PERCENTAGE

OF DEMENTIA

CASES CAUSED

BY ALZHEIMER'S

DISEASE.

2050

NUMBER OF NEW ALZHEIMER'S DRUGS IN DEVELOPMENT, AS OF 2017.

NOW

45

PROJECTED NUMBER OF U.S. ALZHEIMER'S PATIENTS BY 2050.

**ALZHEIMER'S** 

**MILLION** 

ESTIMATED COST OF CARING FOR ALZHEIMER'S AND OTHER DEMENTIAS BY 2050.

\$1.1 TRILLION

110,561

NUMBER OF DEATHS CAUSED BY ALZHEIMER'S IN 2015, MAKING IT THE SIXTH LEADING CAUSE OF DEATH BEHIND STROKE AND ACCIDENTS.

GETTY IM,

# THE STATE OF THE ST

By Lisa Marshall Reviewed by Brunilda Nazario, MD, WebMD Lead Medical Director

A **volunteer army** of **44 million** Americans cares for aging or ill loved ones **each day**, saving the U.S. economy **\$470 billion** in health care costs. **But who cares for the caregivers?** 

to a grinding halt for Josette Murray. The 51-year-old New Yorker was already juggling two jobs—as an actor and census worker—raising a 16-year-old son, volunteering with the homeless, and helping her elderly parents with shopping, cleaning, and cooking. After her father, already diagnosed with dementia, landed in the hospital requiring bypass heart surgery, his care became more intense and her to-do list got even longer.

"I suddenly went from having a schedule I could almost manage to being told Dad needed someone by his side every day," recalls Murray, who had to quit her jobs and now lives with her parents, caring for her father 10 hours a day.

Her new role hasn't been easy. She has trouble sleeping, is tired all the time, and sometimes feels isolated and depressed. For a while, she let her own health slide.

"It's like when you are on a plane and they tell you if the oxygen mask drops, you're supposed to place it on yourself first and then go help other people," she says. "I put the mask on Dad first, and when I started looking for mine I couldn't find it. I had no idea how hard this would be."

Murray is among the roughly 44 million Americans who provide unpaid help to an ill or elderly loved one, doing everything from driving

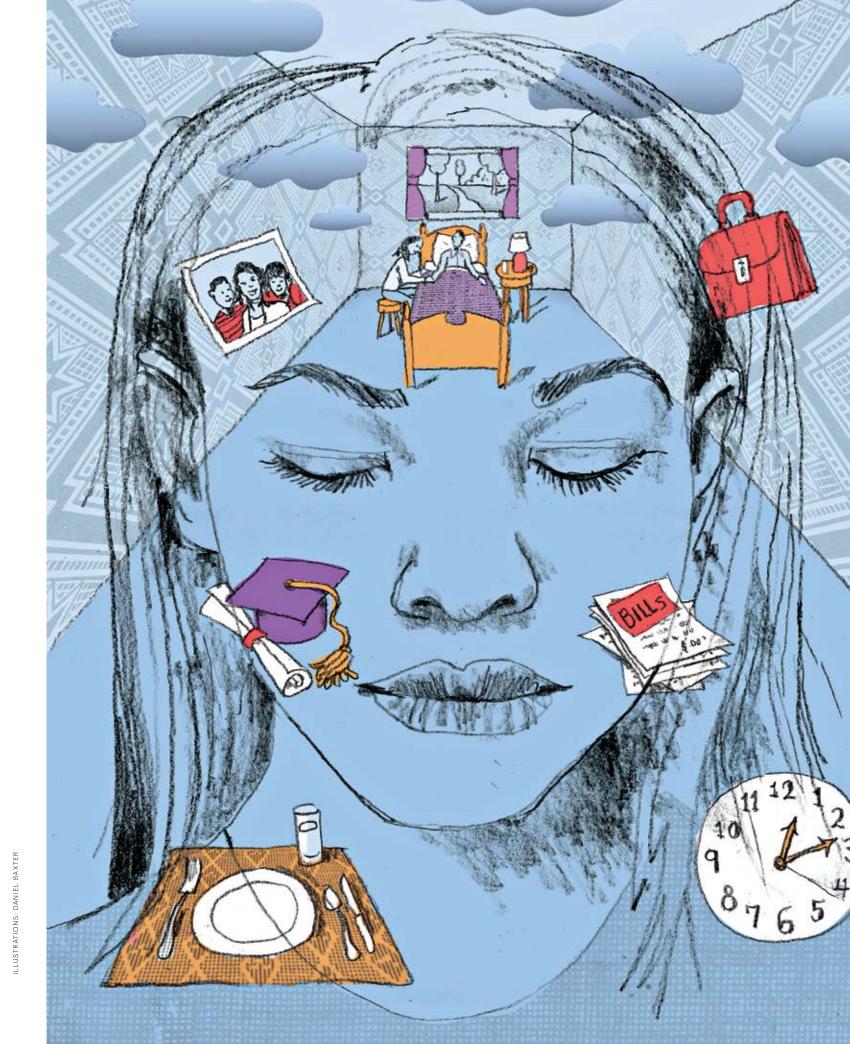
n January 16, 2017, life as she knew it came them to doctor's appointments and making sure their bills get paid to bathing and dressing them, administering their medications, tending to bedside urinals, and dressing wounds. This invisible workforce saves the U.S. economy a staggering \$470 billion in health care costs, according to a 2015 AARP report. And as Murray can tell you, the job can be incredibly rewarding.

> But it can also take a heavy toll. Caregivers are more likely to suffer from depression, anxiety, and heart disease than non-caregivers and have higher levels of stress hormones and weaker immune systems, making them more vulnerable to illness, studies show.

> Six in 10 say they exercise less and eat worse since they started caregiving. Three-quarters have neglected going to the doctor themselves when they should. Four in 10 say caregiving has put a financial strain on their families.

> This all matters, not only for the sake of the caregiver but also for the sake of the cared for, research suggests. One study by New York University School of Medicine researchers found that when caregivers of people with dementia were offered free individual and family counseling, access to support groups, and referrals to services to ease their workload, their loved ones were able to stay in their own home 557 days longer than the loved ones of caregivers without such support.

"Studies like ours have made it clear that if



the well-being of the family caregiver can be maintained, then the person will be better cared for and the need for residential care, which can be very expensive, can be postponed," says lead author Mary Mittelman, DrPH, a research professor in the departments of psychiatry and rehabilitative medicine at New York University.

# WHO ARE THE CAREGIVERS?

The average caregiver is a 49-year-old woman caring for an elderly mother while working at least part-time, according to the AARP. But the face of the caregiver is growing more diverse, with men now making up 40%, millennials making up one-quarter, and 1.5 million children ages 8 to 18 now providing care.

"Every caregiver comes to the role with a different history and different challenges," says Mittelman. For those tasked with caring for parents and children simultaneously, guilt often weighs heavy.

"I was plagued with guilt," says Amy Kreider, a working 41-year-old mother of two teenagers who cared for her mother with amyotrophic lateral sclerosis (ALS) until her recent death. "When I was working, I felt like I should be with my kids or my mom. When I was with mom, I felt like I should be with my kids."

A spouse caring for a spouse faces other challenges. If they are older than 65, as most spousal caregivers are, they're more vulnerable to illness, or injury from helping to lift a loved one.

CAREGIVERS ARE MORE LIKELY TO SUFFER FROM DEPRESSION, ANXIETY, AND HEART DISEASE THAN NON-CAREGIVERS.

If they're tending to a spouse with dementia, they tend to become increasingly isolated as the disease progresses, their spouse's behavior becomes more erratic, and it becomes harder to go out in public, says Mittelman, who has studied spousal caregivers for 30 years. "Maybe her wellmeaning friends invite them out, but she is too embarrassed by his behavior and says no. After a while, they don't ask anymore. In the meantime, the person she has relied on for companionship all her life isn't the same anymore."

This isolation, combined with stress, may put the caregiving spouse at risk of dementia, too. One recent study of 1,200 couples followed for up to 12 years found that people caring for spouses with dementia were six times more likely to develop it themselves.

Perhaps the most invisible caregivers

are children caring for ill parents, grandparents, or siblings, says Connie Siskowski, founder of the American Association of Caregiving Youth. For them, schoolwork often gets neglected and extracurricular activities are sacrificed.

"If you are a kid worried about a loved one at home, it is impossible to focus on anything else," says Siskowski, who cared for her grandfather until age 11. She trimmed his nails and mustache, helped him get dressed, and slept in the living room next to his bedroom so she could help if he needed to go to the bathroom. One day, when she went to give him his medication, she found him dead. "There can be a lot of trauma for these kids," she says.

Because caregivers of all ages are often thrown into their roles suddenly and asked to perform medical procedures like injecting medications or suctioning drainage tubes with little training, they often live in fear, according to a report issued in September by the National Academies of Sciences, Engineering and Medicine.

As the authors reported, "Family caregivers describe learning by trial and error and fearing that they will make a life-threatening mistake."

# WHAT DO THEY NEED?

With demand growing as the population ages, and the pool of potential caregivers shrinking due to smaller family sizes, some policymakers warn that the country is facing a "caregiving cliff" with shortages looming and existing caregivers taking on

more than they used to.

"We have millions of people who we are asking to do a critically important job that puts their health and career at risk," says C. Grace Whiting, chief operating officer for the National Alliance for Caregiving and master of ceremonies for a first-of-its kind National Institutes of Health "Science of Caregiving" conference held in Washington, D.C. in July. "We need to do more to support them."

Some progress is already underway. As of July, 39 states had passed the Caregiver Advise, Record, and Enable (CARE) Act, which requires hospitals to notify a caregiver when the patient will be discharged, offer instruction (via video or in person) on how to perform medically related tasks, and provide a number a caregiver can call for further instructions. (Some hospitals now have

24-hour hotlines.)

On the financial front, home care agency Home Instead Senior Care recently launched a Daughters in the Workplace initiative aimed at providing support for working women juggling caregiving for an aging parent. (In a recent survey, 23% said their supervisor was unsympathetic to their needs as a caregiver.) Meanwhile, numerous companies—including Bank of America and Deloitte—now include caregiving for parents in family leave policies and provide workplace support groups for caregivers.

"It has been a long-fought battle to empower parents in the workforce, and we have made a lot of strides," says Jisella Dolan, advocacy officer for Home Instead. "It's time we as a society and we as employers step up to acknowledge working people who care for their parents, too."

Since Mittelman developed the New York University Caregiver Intervention—which provides counseling, support groups, on-call consultations, and referrals for caregivers of people with dementia—similar government-subsidized programs have sprung up in several states across the country, often administered by local service portals called Area Agencies on Aging.

Not only do such programs extend the time the cared-for can remain home, studies show they significantly decrease depression for the caregiver. Murray can attest to that. Her father's doctor gave her a pamphlet for the free state-sponsored NYU caregiver support program as he was about to be discharged. But out of pride, she waited months to sign up. "I didn't think of myself as a caregiver. I was just a daughter taking care of a sick parent."

When she started to feel her own health was in jeopardy, she made the call. Now she's in counseling, eating better, and—thanks to help from neighbors and a respite care program she connected with—takes Tuesdays off for a meditation class. "I went from feeing very alone and overwhelmed to having a huge support system," says Murray. "And my Dad and I have forged a whole new relationship. Caring for him has become a really positive experience."

# RESOURCES:

**Area Agencies** on Aging: Local resource portals that provide direct support to caregivers, primarily through the National **Family Caregiver** Support Program. Services include respite care (temporary supervision of the care recipient to provide rest for the caregiver), individual counseling and support groups, caregiver education, and emergency assistance. www.eldercare.org

AARP: Comprehensive site with tips and a local resource guide. www.aarp. org/caregiving

Family Caregiver Alliance: Nonprofit advocacy group with e-newsletters and online support groups.

www.caregiver.org

American
Association
of Caregiving
Youth: Floridabased nonprofit
dedicated to serving
caregivers ages
18 and under.
www.aacy.org

Daughters in the Workplace: Sponsored by Home Instead Senior Care. Offers advice for working caregivers and their employers. caregiverstress.com

Alzheimer's
Disease & Related
Dementia Family
Support Program:
Free, state-funded
program providing
support for New
York City caregivers
of people with
dementia.
www.nyulangone.org

# CAREGIVING BY THE NUMBERS



Percent of high school dropouts who leave school to care for a family member.

% 330/

Percent of working female caregivers who decreased their work hours to care for a loved one—22% took a leave of absence; 16% quit their jobs.





Percentage of caregivers who suffer from depression. Those caring for someone with dementia are most likely to be depressed.

Number of potential caregivers for each elderly person today. By 2030, due to **shrinking family sizes**, that number will be 4; by 2050, it will be 3.



**DELICIOUS BITES** 

### MEALS MADE EASY

# Food



RECIPES BY Kathleen Zelman, MPH, RD, LD

earch for the slideshow Sweet Potatoes Why You Should Make These Healthy Spuds Your Buds on WebMD.com.

# Sweet Potatoes

A beloved holiday staple, sweet potatoes are loaded with nutrients, including more than 430% of an adult's daily value of vitamin A. Think beyond calorie-dense sweet potato pie with our festive and healthy options.



### THE HEALTHIER POTATO CASSEROLE

# **Sweet and Yukon Gold Potato Torte**

This tasty torte swaps the cream in many holiday potato dishes for a little low-sodium chicken stock, which helps the potatoes steam and then evaporates, allowing the bottom and edges to brown slightly. We peeled the sweet potatoes but left the skin on the golden spuds.

→ THE MIX

Sweet potato + lowsodium chicken stock, salt, freshly ground black pepper, fresh rosemary, Yukon gold potatoes, leeks, butter



thinly sliced leeks (white part only),

and chopped fresh rosemary. Pour

½ cup chicken stock over top layer.

minutes. Remove cover and bake 15

wedges, garnish with rosemary, and

minutes more. Invert torte, slice in

Cover and bake at 425°F for 30

serve warm. **SERVES 6** 



MAKE IT Thinly slice 3 large Yukon gold potatoes and 3 large peeled sweet potatoes. Arrange in a deepdish pie pan coated with nonstick cooking spray-alternate layers of sweet potatoes and gold potatoes. Brush each layer with melted butter, a sprinkle of salt and pepper,

PER SERVING (1/6 OF PIE) | 258 calories, 5 g protein, 44 g carbohydrate, 8 g fat (5 g saturated fat), 20 mg cholesterol, 5 g fiber, 5 g sugar, 249 mg sodium. Calories from fat: 27%

### THE LEAFY SIDE

# **Spinach and Sweet Potato Salad**

Tender baby spinach pairs well with roasted sweet potatoes in this bright, hearty salad, chock-full of disease-fighting antioxidants including vitamin A, vitamin C, and folate.

→ THE MIX

Sweet potato + baby spinach, toasted pecar champagne vinegar, goat cheese crumbles, dried cranberries, olive oil, canola oil





MAKE IT Peel and cube 2 large sweet potatoes. Toss with salt, pepper, and canola oil, and roast at 450°F until golden brown. Combine 8 ounces fresh baby spinach with 2 tbsp each of

champagne vinegar and olive oil. Divide among 6 plates. Top with cooled potatoes. Garnish with toasted pecans, dried cranberries, and goat cheese crumbles. Serve immediately. SERVES 6

PER SERVING (ABOUT 2 CUPS EACH) | 175 calories, 3 g protein, 16 g carbohydrate, 12 g fat (2 g saturated fat), 2 mg cholesterol, 3 g fiber, 6 g sugar, 182 mg sodium. Calories from fat: 58%



### THE VIBRANT SOUP

# **Curried Sweet Potato-Carrot Soup**

This perfectly seasoned soup is comfort in a bowl. Use a blender to puree the ingredients until velvety, and then serve with a whole-grain roll and salad for lunch, or ladle out small bowls as a colorful dinner starter.

→ THE MIX Sweet potato + onion, curry powder, toasted sliced almonds, lowsodium chicken stock, cilantro, plain yogurt, carrots, fresh ginger





MAKE IT In a large soup pot, sauté diced onion in olive oil. Add garlic; 4 or more cups chicken stock; 3 large, peeled, cubed sweet potatoes; 2 large peeled, chopped carrots; one tbsp each of curry powder and fresh grated ginger; and salt and pepper. Simmer about 20 minutes or until veggies are soft. Puree soup in a blender. Garnish with plain yogurt, cilantro, and toasted almonds and serve warm. **SERVES 6** 

PER SERVING (ABOUT 1 CUP EACH) | 172 calories, 7 g protein, 20 g carbohydrate, 8 g fat (1 g saturated fat), 0 mg cholesterol, 3 g fiber, 5 g sugar, 290 mg sodium. Calories from fat: 40%

WEBMD.COM

WEBMD.COM

# 1 FOOD, 5 MEALS

# **Cranberry Sauce**

CRANBERRY SAUCE ADDS A TANGY SWEET KICK AND FESTIVE FLAIR TO EVERYDAY DISHES. AND IT'S EASY TO MAKE: JUST SIMMER 12 OUNCES OF FRESH CRANBERRIES WITH 1 CUP OF WATER AND 1 CUP OF SUGAR UNTIL BERRIES BURST (ABOUT 10 MINUTES).



# MONDAY

## DIY FLAVORED OATMEAL

Stir cranberry sauce and a little orange zest into plain cooked oatmeal, then top with a sprinkling of cinnamon and chopped nuts or pumpkin seeds.

# TUESDAY

# CRANBERRY VINAIGRETTE

Whisk together ½ cup cranberry sauce with 1 cup olive oil, ½ cup balsamic vinegar, 1 tbsp of Dijon mustard, and a pinch of salt and pepper. Pair this sweet dressing with bitter greens, such as kale, escarole, or arugula. Toss with chopped apples, blue cheese, toasted pecans, and grilled chicken for a one-dish lunch or dinner.



# WEDNESDAY

# CRANBERRY GRILLED CHEESE

Spread two slices of whole-grain bread with cranberry sauce, layer with sharp cheddar or creamy Gruyere cheese and a dash of nutmeg, press together and grill until melted. Plate with a simple green salad.



# THURSDAY

### **GREEN CRANBERRY SMOOTHIE**

Change up your go-to green smoothie recipe by swapping out one of the fruit servings for a ¼ cup of the cranberry sauce. Add a little freshly grated ginger, which complements the cranberries with its subtle bite.

# FRIDAY

### **CRANBERRY-GLAZED PORK CHOPS**

Turn cranberry sauce into a glaze by heating in a small saucepan, adding a little water if needed. Season boneless pork chops with salt and pepper and place in a skillet with a bit of olive oil over mediumhigh heat. Brush with cranberry sauce, turn chops, and brush again. Cook until the inside temperature registers 145°F, about 4 to 5 minutes each side. Serve with remaining cranberry sauce.

# KIDS' BOX

# **Little Helpers**

LET YOUR KIDS HELP YOU PREP THE HOLIDAY MEAL, AND YOU'LL TEACH THEM VALUABLE SKILLS



Eating together helps children learn social skills and form healthy attitudes toward food and eating. Getting them involved in holiday meal prep can also double as an opportunity for them to learn skills, such as:

- Following instructions: Have them cut soft ingredients, pour ingredients into bowls, and set and decorate the table.
- Math skills: Have them measure ingredients, while teaching them about fractions.
- Motor skills and manners: Let them serve themselves (with help, if they're really little).



OFF THE MENU

# **Build a Better Chili**

Break out a big pot and prepare to get creative. Chili comes in as many varieties as the number of people who cook it.

"CHILI CAN BE INTERPRETED PRETTY MUCH ANY WAY YOU WANT, AS LONG AS YOU include chili peppers (or, more accurately, pods)," says New Mexico-based cooking instructor **Jane Butel**, who published her classic cookbook *Chili Madness* in 1980. (The third edition arrives next year.) Meaty or vegetarian, with beans or without, chili often introduces people to hot, spicy food, says Butel. "That's just one reason it's so exciting." Check out her pro tips on the right.

### MAKEIT

- Use pure powdered chili that has no additives. Chili powder blends have too much salt and other seasonings. All you want is the chili flavor.
- Cook your chili in a large, heavy pot. Do not cover the chili as it cooks, or you will spoil the texture of the meat.
- For the meat, buy a chuck roast, which has the ideal amount of fat, and cut it into ½-inch to ½-inch cubes.
- Don't brown the cubed beef. If you do, the meat won't break down properly while the chili cooks.
- Cook with a neutral flavored oil, like vegetable oil. You don't want the fruitiness of olive oil.
- Before you add the chili powder, take the pot off the heat; otherwise, you'll burn it. Stir the powder in with the beef, then add the liquid and return to the heat.
- Be patient. Simmer for at least an hour, but two to three hours will greatly improve the flavor.
- Be really patient. To fully develop the flavors, refrigerate the chili overnight and reheat when it's time to eat.
- Top each bowl with your choice of cheese, sour cream, lime juice whatever you like. If the chili is too spicy, the dairy will help tame the heat.

# **Acid Test**

"MOST CHEFS SAY, IF THERE'S SOMETHING MISSING IN A DISH, IT MUST NEED ACID," SAYS MICHAEL HARLAN TURKELL, AUTHOR OF ACID TRIP: TRAVELS IN THE

WORLD OF VINEGAR.

SEEK OUT THESE

WAKE UP YOUR

COOKING:

FIVE VINEGARS TO

# MARTIN POURET CHAMPAGNE VINEGAR

"From a sixth-generation French vinegar maker comes this subtlyflavored, barrel-aged classic. Perfect for vinaigrettes, traditional French butter sauces, and raw oysters."



### DATU PUTI CANE VINEGAR

"Swap your white distilled vinegar for this Filipino staple. Light, bright, and slightly sweet, this vinegar makes a great marinade base for pork and chicken dishes like adobo."



### PIERRE GINGRAS XO APPLE CIDER VINEGAR

"So lip-smackingly good that it tastes like biting into a freshly picked apple. Perfect for pickling, it's also fantastic for braising pork shoulders and building BBQ sauces."



### IIO JOZO RICE VINEGAR

"Clean, smooth, and invigoratingly sharp, this vinegar provides a great base for dipping sauces. Make it your go-to if you like to craft your own sushi."



### KATZ LATE HARVEST VIOGNIER HONEY VINEGAR

"Reminiscent of fine wine, this lightly sweet vinegar from the Napa Valley pairs well with grilled meat. Or add it to fruit juice for a refreshing cocktail."

THE OPINIONS EXPRESSED IN THIS SECTION ARE OF THE EXPERTS AND ARE NOT THE OPINIONS OF WEBMD; WEBMD DOES NOT ENDORSE ANY SPECIFIC PRODUCT, SERVICE, OR TREATMENT.



# CUTTING EDGE

# Chronic obstructive pulmonary disease (COPD)— which includes emphysema, chronic bronchitis, and nonreversible asthma—damages the air sacs and airways that pull air into the lungs. This restricts air flow and can make people feel like they can't catch their breath. COPD has no cure, but ongoing, innovative research into treatments could one day change that.

SMOKING IS THE GREATEST RISK FACTOR FOR COPD, but not everyone who smokes gets it. Conversely, one in four people who have COPD has never smoked. Genes play a role, too. Researchers at Brigham and Women's Hospital in Boston recently uncovered 13 new genetic regions—areas of the human genome—that are associated with risk for COPD. Understanding the genetic underpinnings of a disease could lead to the development of drugs that target the genetic defects. The new discovery can also help doctors identify patients at greatest risk of developing the condition.

Going down a different research path,

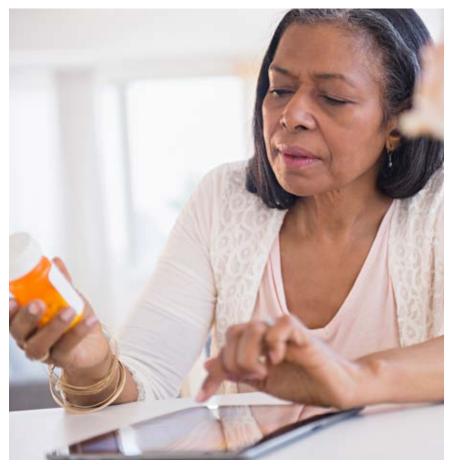
the University of North Carolina and Children's Hospital in Boston are exploring ways to repair damaged lung tissue with stem cells. Stem cells, which can develop into any type of human tissue, could one day become new lung tissue and repair the air sacs and airways that COPD damages.

In a new procedure to treat COPD, doctors use a bronchoscope—a camera on a flexible tube that reaches the lungs through the mouth—to insert coils in damaged lung tissue. COPD can cause air sacs to lose elasticity, which limits their ability to draw air in and release it. The coils can restore some of that lost elasticity and improve lung function. —SONYA COLLINS

# EXPERT Q&A

# **Online Rx**

Get the scoop on buying prescriptions on the internet



WITH THE INCREASING EASE AND CONVENIENCE OF ONLINE PURCHASING, YOU MIGHT already buy your prescriptions safely from legitimate and reputable pharmacies. But online buying can be risky. **John Whyte, MD**, director of professional affairs and stakeholder engagement at the FDA, explains why.

### Q What's the risk?

WHYTE More than 10,000 online pharmacies exist, according to the National Association of Boards of Pharmacy, but only a few comply with U.S. pharmacy laws. This poses major risks to consumers, since most are likely to be fraudulent pharmacies.

# What could happen if I buy from fraudulent online pharmacies?

WHYTE For one, you could get a fake drug with the wrong ingredients, which could lead to a bad reaction-potentially making your condition worse—and even result in death. At best, these medicines may be less effective or have unexpected side effects. Also, most fake online pharmacies lack adequate safeguards to protect personal and financial information, and some intentionally misuse the information you provide.

# Q How can I recognize a fake online pharmacy from a real one?

WHYTE It may not be obvious. Many online pharmacies use fake storefronts that closely resemble legitimate pharmacies. In fact, many online pharmacy scams are so sophisticated that even health care professionals have a hard time detecting them. Watch out for pharmacies that:

Allow you to buy

- drugs without a prescription or by completing an online questionnaire
- Offer discounts or cheap prices that seem too good to be true
- Are located outside of the U.S.
- Send unsolicited email or other spam offering cheap medicine

# Q How can I ensure an online pharmacy is safe?

WHYTE Check the pharmacy's license through your state board of pharmacy (or equivalent state agency). The FDA has an online tool that allows you to search by state to locate state-licensed online pharmacies (www.fda.gov/ BeSafeRx), Also, ensure that the online pharmacy:

- · Requires a valid prescription from your doctor
- · Provides a physical address and telephone number in the U.S.
- · Has a licensed pharmacist to answer your questions

### BY THE NUMBERS

Percentage of the 10,000 Less than online pharmacies that comply with U.S. laws and National Association of Boards of Pharmacy (NABP) standards.

Number of internet users in a survey who reported purchasing prescription medicine online.

Percentage of those in the same survey who said they were unsure how to safely purchase drugs online.

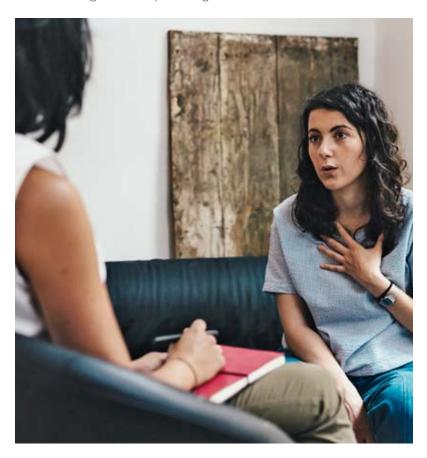


Percentage of those in the survey who checked an online pharmacy's license with a state board of pharmacy before making a purchase.

# HEALTH HIGHLIGHTS

# **Coping With Depression**

Depression can be affected by a number of factors, so try these strategies to help manage it



# 10 Ways to Deal

TAKE CHARGE WITH THESE LIFESTYLE TIPS

- 1. STAY CONNECTED
  Spend time with
  others, but don't focus
  on problems.
- 2. SLEEP WELL
  Talk to your doctor about sleep problems, which may worsen depression.
- 3. BE PATIENT
  Treatment can take time.
  Don't give up on it.
- 4. GET CREATIVE
  To boost your mood, draw, make music, or keep a journal.
- 5. DON'T WAIT Early treatment works best. Seek help right away.

- **6. CHOOSE WISELY** Pick a therapist you can trust and be open with.
- 7. BE REALISTIC
  Depression saps your
  energy. Adjust your todo list accordingly.
- 8. LET OTHERS IN
  Allow friends and family
  to offer support and
  understanding.
- 9. WORK IT OUT
  Make recovery your
  priority. Try not to let
  work interfere.
- 10. TALK BACK
  Counter your negative beliefs with positive, factual thoughts.

### **EXPERT TIPS**

"Eat right to improve your mood and counter depression. Focus your meals on plant-based foods, such as fruits and vegetables, whole grains, legumes and nuts, and healthy fats like olive oil and canola oil. Eat lean proteins, especially fish, and avoid processed foods and sugar."

### Mary Fristad, PhD

professor of psychiatry, psychology, and nutrition, Ohio State University Wexner Medical Center, Columbus, Ohio "Get some exercise. Mood-boosting physical activity should be your first line of treatment for mild to moderate depression. The greatest benefits come from cardio workouts that make you sweat, like running, biking, walking, and swimming, for at least 30 minutes three times a week."

# Emanuel Maidenberg, PhD

clinical professor of psychiatry and director, Cognitive Behavioral Therapy Clinic, Semel Institute for Neuroscience ℧ Human Behavior, University of California, Los Angeles "Don't ignore suicidal thoughts and actions, thoughts of death and dying, or thoughts of not wanting to be around any longer. These thoughts, common with depression, can be life-threatening. Get professional help as soon as possible. In more severe circumstances, go the nearest emergency room right away."

### Amit Anand, MD

psychiatrist, professor, and vice-chair for research, Center for Behavioral Health, Cleveland Clinic, Cleveland, Ohio

REVIEWED BY Hansa Bhargava, MD WebMD Senior Medical Director



BE PREPARED

# When to Call 911

Dialing those three numbers is the fastest way to get life-saving help. But how do you know it's a true emergency?

IN A MEDICAL EMERGENCY, EVERY SECOND COUNTS. THE FASTER YOU GET EXPERT care, the more likely you are to survive a heart attack, stroke, or other health crisis. But first, you must detect the danger signs and seek help.

Rule No. 1? Trust your instincts, says Hamad Husainy, DO, FACEP, medical director of the emergency department at North Alabama Medical Center in Florence, Alabama. "If you think it's bad enough, you should probably call," he says.

In an emergency, symptoms are often severe and sudden or rapidly getting worse. For example, sudden weakness or numbness on one side of the body may signal a stroke, and crushing pressure in the chest is a classic sign of a heart attack. Heavy bleeding from a deep cut that won't stop when you apply pressure also warrants a call to 911.

Take into account age and other health conditions, as minor symptoms can become major problems for the very young or very old. Infections spread quickly in a newborn, so a fever of 100.4 degrees or greater in a baby up to 2 months old should be treated as an emergency. In an older adult, pain in the neck, jaw, or back or sudden shortness of breath might point to a heart attack. However, "some of the most significant heart attacks I've seen have had subtle pains and slight changes in pain or indigestion," Husainy says.

Your call to 911 will bring emergency medical personnel to assess the situation and provide immediate care, which is especially critical if distance or traffic would delay your trip to a hospital. If the situation isn't as dire as you thought, the EMT or paramedic may advise you to follow up with your physician rather than transporting you to the hospital.

Husainy recalls the recent case of a 74-year-old man who had chest discomfort and just didn't feel well when he awoke one morning. His wife wanted to call 911, but he told her not to. An hour later, she found him slumped over the wheel of his car. By the time emergency personnel arrived, it was too late. When in doubt, make that call—you could be glad you did so.

# **Red Flags**

THESE SYMPTOMS MAY BE TELLTALE SIGNS OF AN EMERGENCY AND WARRANT A CALL TO 911, SAYS MEDICAL DIRECTOR HAMAD HUSAINY, DO

### VOMITING

Vomiting blood requires emergency attention. So does vomiting that is severe, lasts 24 hours or more, or accompanies chest pain, severe stomach or rectal pain, or a recent head injury.

### DAIN

Beware of sudden, intense pain, especially along with dizziness or shortness of breath. Severe abdominal pain could be appendicitis or a perforated ulcer. A headache that feels different from previous headaches could signal a stroke.

### LOSS OF CONSCIOUSNESS

Fainting occurs when the blood supply to the brain suddenly drops. In a person with diabetes, very low blood sugar can cause loss of consciousness. Fainting also could be a sign of a heart attack, abnormal heart rhythm, or seizure.

# **Smoking/Smoking Cessation**

BY THE NUMBERS: Facts and Stats on Trending Health Topics

MORE THAN Number of Number of former smokers living people in the in the U.S. U.S. living Percentage of adults in the with a disease Number of chemicals in **U.S. WHO ARE SMOKERS** caused by **TOBACCO SMOKE** smoking die in the U.S. each year due to smoking Annual total cost of medical care Number of for adults related chemicals in to smoking **TOBACCO SMOKE THAT CAN CAUSE** CANCER of people who stop smoking for Ranking of at least one smoking as a day each CAUSE OF year IN AN **PREVENTABLE DEATH ATTEMPT TO QUIT** 

Percentage of people who smoke but **WANT TO QUIT**  MINUTES
Length of time after quitting smoking that HEART RATE AND BLOOD PRESSURE DROP

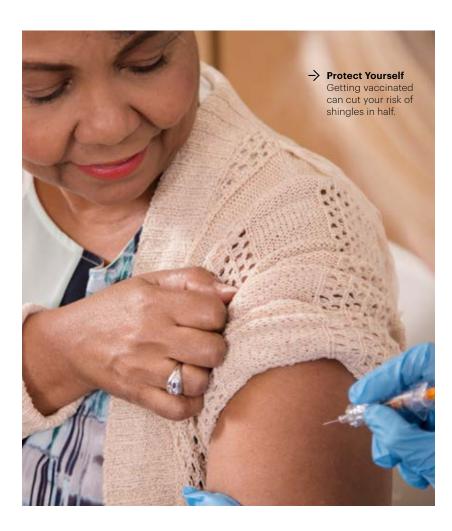
Z WEEKS TO 3 MONTHS Length of time after quitting smoking that circulation improves and lung

function increase

Length of time after quitting smoking that RISK OF HEART DISEASE DROPS

Length of time after quitting smoking that risk of dying from lung cancer becomes half that of a smoker

REVIEWED BY Hansa Bhargava, MD
WebMD Senior Medical Director



# LIVING WELL

# The Scoop on Shingles

This painful condition is not just about chicken pox. Understanding the truth about shingles is much more complex.

MANY PEOPLE MIGHT ASSUME THAT SHINGLES, WHICH IS CAUSED BY THE SAME virus as chicken pox, is "just a rash" and not that serious, says Anne Louise Oaklander, MD, PhD, associate professor of neurology at Harvard Medical School and assistant in pathology at Massachusetts General Hospital. That's definitely not true.

"Shingles is a quite serious neurologic disease," she says. "It's inside the nerves in your body. It goes in and around your spinal cord and can go into your brain."

One in three people will get shingles in their lifetime. If you've ever been exposed to chicken pox as a kid (and 99% of adults in the U.S. have, even if you don't remember it), you can get shingles decades later.

"It's a very devious virus," says Oaklander. "It lies latent in your nerves for half a century and then reemerges to cause shingles."

Shingles can lead to strokes, blindness, deafness, nerve damage, and chronic nerve pain (called postherpetic neuralgia or PHN), weeks or months after the

# ASK YOUR DOCTOR

Q Should I get vaccinated?
Yes, if you're 60 or older, with some exceptions, such as if you have a weakened immune system from HIV or certain cancers, says Oaklander.

Q What is the treatment? While there's no cure, getting antiviral medication early on can help reduce the severity of shingles and the damage it causes, she says.

# Q Can I spread shingles? No. While the blistering

No. While the blistering sores from shingles can spread chicken pox, "you catch shingles from yourself," says Oaklander.

# Q What harm can shingles do?

Shingles is a really disabling disease," says Oaklander. "It can leave you with terrible pain," for months or even years afterward. Talk to your doctor about prevention, she advises.

blistering rash has gone, explains Oaklander.

However, shingles is highly preventable and treatable, she adds. Here's what you need to know:

**Get vaccinated.** "Immunization is safe, and it's highly effective," says Oaklander. The CDC recommends people 60 and older get vaccinated, which can slash your risk of shingles in half and cut your risk of PHN by nearly 70%. Even if you've had shingles, get vaccinated to prevent it from reoccurring.

Know the warning signs. Unexplained jolts of pain or itching in a band on one side of the torso or above the eye are classic warning signs of shingles. These can occur days or a week before the rash, says Oaklander.

**See your doctor ASAP.** Think you might be getting shingles or notice a rash? "Call your doctor immediately," says Oaklander. "When you have shingles it's a medical emergency."

**Soothe the itch.** Talk to your doctor about ointments to ease the itch and pain of shingles. And keep the area clean to avoid infection, says Oaklander.

REVIEWED BY Arefa Cassoobhoy, MD, MPH WebMD Senior Medical Director

### DOCTOR Q&A

# **HIV 101**

Certain misperceptions still persist about the virus and how it's spread. Patrick Ryscavage, MD, assistant professor, Institute of Human Virology, University of Maryland School of Medicine, sets the record straight.

MORE THAN 35 YEARS HAVE PASSED SINCE SCIENTISTS FIRST IDENTIFIED THE HIV virus. Since then, doctors' knowledge and ability to treat HIV/AIDS have improved dramatically. Here's what everyone—regardless of their relationship status—needs to know about this infection and how it spreads.



Your risk of getting HIV isn't the same from all types of sexual activity.

RYSCAVAGE The risk of transmission from just being intimate [such as kissing] is incredibly low. The highest risk is among people who have anal sex. Women who have vaginal sex are at the next highest risk.

It's nearly impossible to catch HIV from a blood transfusion.

RYSCAVAGE In 1985, shortly after researchers discovered the HIV antibody, they used that test to screen the general blood supply. They pretty quickly eliminated HIV from the blood supply.

Your risk of catching HIV is low—but it increases every time you're exposed. RYSCAVAGE If you have unprotected anal intercourse with an HIV-infected partner, your risk from each act is between 1% and 2%. For unprotected vaginal sex, it's about .04% to .1% per act. That's if you were having sex once, but your risk starts to accumulate the more often you have sex.

You don't have to wait long to find out if you have HIV.

RYSCAVAGE The

most recent tests turn positive about three weeks after HIV has been transmitted. Most people will have symptoms in the first one to two weeks after they've been infected, before they test positive. Many people feel like they have the flu-fever. muscle soreness. fatigue, headache, mild rash, and swelling of lymph nodes in the neck.

You can prevent HIV. RYSCAVAGE Preexposure prophylaxis (PrEP) is a prescription pill you can take to prevent the infection. If you take PrEP every day, you can lower your risk of HIV by up to 96%.

# **Virus Block**

ANYONE WHO IS SEXUALLY ACTIVE SHOULD CONSIDER THEIR RISKS AND TAKE STEPS TO PREVENT HIV, SAYS PATRICK RYSCAVAGE, MD

### TAKE THE PrEP PILL

"One group of concern is men who have sex with men, especially if they have unprotected sex with partners who are HIV-positive."

### **USE CONDOMS**

"If you want to maximize your protection, use condoms, which have the added benefit of preventing you from getting other sexually transmitted infections."

### **GET TESTED**

"Everyone ages 15 to 65 should get tested for HIV at least once in their lifetime. People who are at risk should be tested more frequently."

# IF YOU'RE INFECTED, GET TREATED

"After you've been on treatment and you reduce your viral load to undetectable limits, your ability to transmit HIV to your partner goes down almost to zero."

REVIEWED BY Michael W. Smith, MD WebMD Chief Medical Director

DOCTOR Q&A

# Soothe the Burn

Take control of heartburn symptoms for relief and less disruption to your life



HEARTBURN CAN RANGE FROM A MILD ANNOYANCE TO A DAILY AGGRAVATION. Aline Charabaty, MD, associate professor of medicine, gastroenterology division, MedStar Georgetown University Center, explains ways to ease discomfort and prevent acid reflux complications—especially helpful for the indulgences the holiday season tends to bring.

# What factors trigger heartburn?

CHARABATY A hiatal hernia, when part of the stomach slides up into the chest, can let acid leak back up into your esophagus. Chocolate, coffee, and spicy, fatty, or sugary foods can also relax the esophageal sphincter—the muscle between the esophagus and stomach that keeps acid from flowing back up into the esophagus. Obesity is a common cause of heartburn; when extra fat surrounds the abdomen, it increases pressure against the stomach and promotes more acid backup.

# Can heartburn cause complications? CHARABATY Yes.

Heartburn can worsen asthma, cause respiratory problems, or lead to a raspy voice or chronic cough. Chronic irritation of the esophagus from acid exposure can cause a change in the lining of the esophagus called Barrett's esophagus. This increases the risk for cancer of the esophagus. If you get heartburn more than three times a week or you have it for many years, your doctor may suggest a test called an upper endoscopy to look for Barrett's esophagus.

# How do you treat heartburn?

CHARABATY If you're overweight, losing weight with diet and exercise is key to treating reflux. Weight loss will relieve some of the pressure that's allowing acid to back up into your esophagus. Also try not to wear tight clothes, which can add pressure on your abdomen.

Use a food diary to identify which foods and drinks set off your heartburn, and eliminate them from your diet temporarily to see if your symptoms improve. Avoid eating large, fatty meals in the evening.

Eat at least three hours before going to bed. Elevate the head of your bed, either with a pillow or by putting books or bricks under the legs. And if you smoke, get help to quit. Tobacco smoke can weaken your sphincter muscle even more.

If you need medicine, typically vou'll start with an over-the-counter H2 blocker such as famotidine (Pepcid) or ranitidine (Zantac). These medicines reduce the amount of stomach acid. People with heartburn that happens from time to time or that's triggered by specific foods can use H2 blockers or antacids like Tums on an as-needed basis.

If the heartburn doesn't get better, you can take a proton pump inhibitor (PPI). These drugs suppress acid completely and they work for 24 hours. Over-the-counter and prescription PPIs are basically the same, except overthe-counter versions may be a lower dose. If you've been on an over-the-counter heartburn medicine for more than two weeks with no relief, see your doctor. You may need a higherdose PPI and an upper endoscopy.

REVIEWED BY Neha Pathak, MD WebMD Medical Editor

### QUIZ

# Is It a Cold—or the Flu?

Your body aches. Your throat burns. Your nose is stuffed, and you're coughing like mad. Take this quiz to see whether you've caught a run-of-the-mill cold or the seasonal flu.



# ASK YOUR DOCTOR

# Q Do I have a cold or the flu?

The speed and intensity of your symptoms can give you clues to which respiratory ailment you have. Colds come on gradually and are more mild. Flu symptoms start suddenly and can wipe you out.

# **Q** Should I get a flu test?

A rapid flu test from your doctor can quickly determine if you've caught the flu with a swipe of your nose or throat. The trouble is, results aren't always accurate.

# **Q** What can I take to help me feel better?

Rest is the best prescription for respiratory ailments. Pain relievers and decongestants can ease symptoms while you recover. Antiviral drugs treat the flu, but you need to start them within 48 hours after your symptoms begin for best results.

# Q How can I avoid getting sick in the future?

To keep cold and flu germs away, wash your hands with warm water and soap or use an alcohol-based hand sanitizer. Put extra distance between you and anyone who coughs or sneezes. And get the flu vaccine every year.

# Quiz

















# You're running a

high fever. \_\_ COLD

\_\_ FLU

You're sneezing.

\_\_ COLD

\_\_ FLU

You're extremely tired.

\_\_ COLD

\_\_ FLU

You also have a

pounding headache.

\_\_ COLD

\_\_ FLU

You're achy.

\_\_ COLD

\_\_ FLU

Your throat is sore.

\_\_ COLD

\_\_ FLU

# **Answers**

1. Flu. A high number on your thermometer is a sign you've got the flu. Colds rarely cause a fever, but the flu can make your temperature spike as high as 102 degrees Fahrenheit.

2. Cold. The flu can clog up your nose, but sniffles and sneezes are more often signs of a cold. If congestion makes you uncomfortable, talk to your pharmacist about over-the-counter medications to treat your specific symptoms.

3. Flu. A cold can leave you a little drained, but it shouldn't exhaust you. The flu can feel like you've been run over by a steamroller. You may need antiviral medicine. The sooner you start taking it, the better it will work.

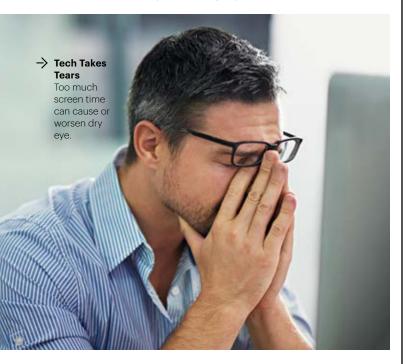
4. Flu. A headache along with the cough, body aches, and fever is very common with the flu. Colds can also cause a headache as well.

5. Flu. Your muscles can feel a little achy with a cold-like they do after a workout. With the flu, the achiness is more severe and most intense in your back, arms, and legs.

6. Cold and flu. Both can make your throat feel scratchy and raw, but a sore throat is more typical with colds. REVIEWED BY Alan Kozarsky, MD WebMD Medical Reviewer

# HEALTH HIGHLIGHTS

# **Dry Eye**Find relief and prevent symptoms



# 10 Tips for Dry Eye Relief

REDUCE IRRITATION AND INFLAMMATION

# 1. SHOP AROUND

You may need to try several brands of artificial tears before you find the right one for you.

# 2. AVOID SMOKE

Cigarette smoke irritates your eyes and may cause dry eye. Stop smoking and steer clear of secondhand smoke.

# 3. KEEP CLEAR

Gels and ointments for dry eye can blur your vision. Use them only at bedtime.

# 4. DON'T STARE

TVs, computer monitors, tablets, and phones can cause or worsen dry eye, so limit screen time.

### 5. CUT BACK

Reduce or quit alcohol and caffeine. Both may contribute to dry eye.

### 6. GO NATURAL

Using makeup around the eyes can make dry eye worse for some people. Apply less or avoid it altogether.

## 7. DON'T WAIT

Use artificial tears often, even if your eyes don't yet feel dry.

### 8. KEEP IT CLEAN

Try an over-the-counter evelid cleanser to reduce inflammation, which can cause dry eye.

# 9. SNOOZEMORE

Lack of sleep makes dry eye worse. Aim for seven to nine hours a night.

### 10. GO FISH

Add a fish oil supplement to your diet. The omega-3 fatty acids may ease your symptoms.

GETTY IMAGES

### QUIZ

# Navigating the Holiday Buffet

Holiday buffets are notorious diet wreckers. And when you have diabetes, a table piled with high-carb, high-fat treats is a blood sugar disaster waiting to happen. Take the quiz to learn some tips.



# ASK YOUR DOCTOR

a Can you
recommend a
dietitian to help
me plan holiday
meals?
A dietitian can help you
choose healthy foods to
balance the

spikes, how can I lower it? Your doctor can give you step-by-step strategies to deal with high glucose.

my blood sugar

Q If I do over-

indulge and

o Can I eat
sweets? Can I
drink alcohol?
You can if your doctor
has given you the green
light—but understand
your limits and when to

cut back.

occasional treat.

# Quiz



Salad is a healthy buffet choice, but which of these dressings is lightest?

\_\_ RUSSIAN

\_\_ ITALIAN \_\_ CAESAR 2

To visualize the right portion size, which object should you use?

\_\_\_ A MEDIUM DINNER PLATE

\_\_ YOUR HEAD

\_\_ YOUR FIST



Which of these appetizer choices is healthiest?

\_\_ CARROTS WITH HUMMUS

\_\_ PRETZELS

\_\_ GUACAMOLE AND CHIPS



If you choose to have alcohol, which drink is best?

\_\_ MARGARITA

\_\_ WHITE WINE SPRITZER

\_\_ VODKA AND COLA

# **Answers**

1. Italian dressing is the best of the three options, with just over 70 calories per two tablespoon serving. (Russian dressing has 106 calories, and Caesar has more than 160.) Even better, choose a low-fat or fat-free dressing. No matter which salad topping you pick, don't ladle it on. Serve dressing on the side and dip your fork first in the dressing, then the salad. You'll save nearly 100 calories.

2. Each of your fists is about the size of one cup of food. Two cups is a good portion size for adults. One cup should be non-starchy vegetables (green beans, broccoli, mushrooms). Divide the remaining cup between whole grains and lean protein (skinless chicken breast, fish, tofu).

3. Carrots and hummus are nutrient-dense—high in vitamins, but low in calories and fat. Pretzels are also low-calorie, but they're low in nutrition, too. They won't fill you up, so you'll be more likely to hit the buffet table for refills. Avocados are good for you, but guacamole can be high in calories and the tortilla chips that come with it are usually fried.

4. Alcohol doesn't have to be offlimits as long as your doctor says it's OK for you to drink. But imbibe in moderation—no more than one drink for women, one or two for men. To cut the sugar and calories in wine or spirits, add a spritz of seltzer.

REVIEWED BY Hansa Bhargava, MD WebMD Senior Medical Director

QUIZ

# What's Your OAB IQ?

Some 33 million Americans have overactive bladder (OAB). How much do you know about this common condition?



# ASK YOUR DOCTOR

Q Am I at risk for OAB?

Age is one risk factor; post-menopausal women and men with prostate problems are at higher risk for developing OAB.

Q What could be causing frequent urination?

OAB could be to blame, but other conditions, including urinary tract infections, diabetes, and medication side effects, could also be culprits. Q Will lifestyle changes improve my symptoms?

Limiting caffeinated and sugary drinks may help; exercises to relax the bladder muscles can also alleviate symptoms.

Q What are my treatment options?

OAB can't be cured, but your doctor can recommend treatments to reduce symptoms and improve your quality of life.

### Quiz















Urinating often is the only sign of OAB.

\_\_\_ TRUE

\_\_ FALSE

\_\_ FALSE

TDUE

Age is a risk factor.

\_\_\_ TRUE

\_\_\_ TRUE

\_\_ FALSE

OAB affects only

OAB can affect your sex life.

\_\_\_ TRUE

\_\_ FALSE

No reliable tests can diagnose OAB.

\_\_ TRUE

\_\_ FALSE

Surgery is the only treatment option.

\_\_ TRUE

\_\_ FALSE

# **Answers**

1. False: Frequent trips to the bathroom (more than eight times in 24 hours) are only one symptom. Bladder leakage and the sudden urge to urinate are also signs.

2. True: Your risk for OAB does increase with age (by age 80, upward of 70% of adults have OAB), but anyone at any age can develop the condition.

3. False: Although symptoms can be different—more women than men have urinary incontinence—OAB affects both sexes almost equally. About 12% of the population has OAB.

4. True: Research shows that frequent urges to urinate can interrupt sex. A full bladder can cause discomfort, and fears about incontinence can make it difficult to achieve orgasm.

5. False: In addition to a physical exam, your doctor may order a urine culture to rule out infections and an ultrasound to see how well your bladder functions. 6. False: Surgery is one option. Other treatments, including medications, behavior therapy, injections to numb the bladder muscles, and nerve stimulation, may also alleviate symptoms.

REVIEWED BY Brunilda Nazario, MD

WebMD Lead Medical Director

QUIZ

# **Brittle Bones**

As you get older, your bones can become so porous that a fall—or even a hearty sneeze—could fracture them. Learn about your osteoporosis risk and how to prevent this bone-weakening disease.



# ASK YOUR DOCTOR

Q Do I need α bone density test?

Experts say women need screening with a DXA scan starting at age 65. Both men and women should get tested earlier if they have risks such as smoking, a family history of osteoporosis, or a slim frame.

**Q** How can I prevent further bone loss?

Stay at a healthy weight; quit smoking; get plenty of calcium, vitamin D, and protein in your diet; and exercise daily.

# Q How much calcium and vitamin D do I need?

After age 50, women need 1,200 mg of calcium; men need 1,000 mg. You also need 600 to 800 IU of vitamin D daily. If you don't get enough from your diet, ask your doctor about supplements.

Q What kind of exercise should I do?

Combine weightbearing exercises, such as walking, stair climbing, and dancing, with strength training. Add balance exercises, such as yoga and tai chi, to help prevent falls.

# Quiz













I'm female.

\_\_\_ YES

\_\_ NO

\_\_ YES \_\_ NO

I drink milk.

\_

I regularly exercise.

YES

\_\_ NO

I smoke.

\_\_ YES

\_ NO

I have a few alcoholic drinks each day.

\_\_ YES

\_\_ NO

I take steroid medicines.

\_\_ YES

\_\_ NO

# **Answers**

- 1. Osteoporosis affects more women than men, but by age 65, men lose bone mass just as quickly and also become vulnerable to fractures.
- 2. Dairy foods like milk and yogurt, along with green vegetables and fish, are the best sources of calcium, vitamin D, and other nutrients important for bone health.
- 3. Weight-bearing exercises like walking, stair climbing, and dancing strengthen the bones and the muscles that support them. A workout should be part of your daily routine.
- 4. Smoking is a risk factor for osteoporosis. Smokers are more prone to fractures. And after a break, their bones don't heal as well as they should.
- 5. A glass of wine or beer might be good for your bones, but too much alcohol contributes to bone loss. If you drink, limit yourself to two drinks or less a day.
- 6. Long-term use of corticosteroid drugs to treat arthritis, asthma, and other conditions can lower your bone density. Some anti-seizure, cancer, and endometriosis medicines can also weaken bones.

# Take 10

# Daymond John

 $CEO\ and\ reality\ TV personality, 48, New\ York\ City, New\ York$ 

# 1

### You recently underwent treatment for thyroid cancer. How did you learn you had the disease?

I had what's called an executive physical, which is very comprehensive, and the doctor found a nodule. The biopsy was inconclusive, but I said, "Let's not take chances. Take it out." Two weeks after surgery, tests showed it was stage 2 cancer.

# 2

# How are you now?

The surgery fully removed it, and I'm considered cancer-free, but I'll be monitored every three to six months because there's a slight chance that it will come back.

# 3

# You've been very open about your experience. Why?

I went public because one group that doesn't take care of themselves is entrepreneurs like me. They're so busy 24 hours a day that they tend to forget about their health. I want to be an example of somebody who took care of himself and therefore can still run around like I want.

# 4

### Men, entrepreneurs or otherwise, don't have the best track record of paying attention to their health. What do you say to them?

We think we're supermen, but we're not. There is no success without your health. Without it, you might not be around for your family, you might not be able to get up, you might lose everything. That's not success.



"We think we're supermen, but we're not. There is no success without your health."

# 5

# What's your key message about health?

I want people to understand the importance of early detection, whether it's mammograms, pap smears, colonoscopies. And if you know that something runs in your family, look into that.

# 6

# Has your health always been a priority?

Not so much as a young person, but since about the time I was 40, I've been into checking on my health regularly. I take it very, very seriously.

# 7

### What do you do to stay in shape?

I try to walk as much as I can. When I'm able, I walk on the treadmill for two hours a day, while I make phone calls. I try to squeeze in 100 pushups a day. If I really have time, I do about an hour of weight training every few days.

# 8

# Do you have a health habit you'd like to change?

Too much caffeine. I drink iced tea and energy drinks, and I need to find a healthier substitute for those.

# 9

# Do you take time to rest and rejuvenate?

I do make a point to relax, and I take days off here and there. On my ideal day off, I'll go hiking, walking, or fishing or do some other outdoor sport.

# 10

# What can we look forward to on the new season of Shark Tank?

We have a whole new set, which looks great. Sitting next to such a legendary entrepreneur as Richard Branson can be intimidating but also very inspiring. Going toe-to-toe with him, Marc Cuban, and Sara Blakely, the founder of Spanx, brings a whole new dynamic to the show.

-MATT McMILLEN