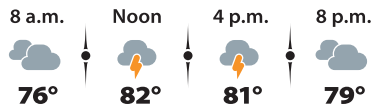


LET'S GO

Looking for something fun to do today? Try a game of beach tennis! **D1**

THE WEATHER TODAY, C2



## Golden State Overwhelms Cleveland

The Warriors took a 2-0 series lead in the NBA Finals with a big win Sunday. Sports, B1

WORLD NEWS

### 12 ARRESTED IN LONDON BRIDGE TERROR ATTACKS

British police arrested a dozen people Sunday in a widening terrorism investigation after attackers using a van and large knives turned a balmy evening of nightlife into a bloodbath and killed seven people in the heart of London. The Islamic State group claimed responsibility. **World News, A9**



The Associated Press

Two women hug Sunday after bringing flowers to add to tributes laid on the north side of London Bridge following the terror attacks.

## Top of the News

INSIDE THE ISSUES SHAPING OUR COMMUNITY

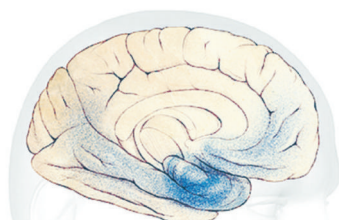
# Programs Claim to Help Improve Brain Function

### ALZHEIMER'S: THE MOST COMMON DEMENTIA

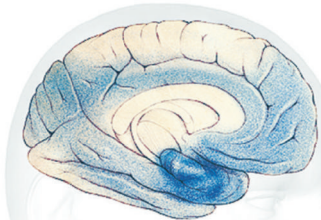
Plaques and tangles (shown in the blue-shaded areas) tend to spread through the cortex in a predictable pattern as Alzheimer's disease progresses. The rate of progression varies greatly. People with Alzheimer's live an average of eight years, but some people may survive up to 20 years. The course of the disease depends in part on age at diagnosis and whether a person has other health conditions.



**Earliest stage — changes may begin 20 years or more before diagnosis:** In the earliest stages, before symptoms can be detected with current tests, plaques and tangles begin to form in brain areas that impact learning, memory, thinking and planning.



**Mild to moderate stage — generally lasts from 2-10 years:** Most people with Alzheimer's are diagnosed in these stages. Mental impairment now is serious enough to interfere with work or social life. Patients may get confused and have trouble handling money, expressing themselves and organizing their thoughts.



**Severe stage — may last from 1-5 years:** Most of the cortex is seriously damaged. The brain shrinks dramatically due to widespread cell death. Individuals lose their ability to communicate, to recognize family and loved ones and to care for themselves.

Sources: National Institutes of Health, Alzheimer's Association

Research proves some activities contribute to cognitive health, but residents should be wary of claims to prevent dementia.

By CIARA VARONE | Daily Sun Staff Writer

Filling in a crossword puzzle, playing poker with friends or strumming a guitar won't help sculpt muscle, but it may contribute to improved fitness.

Research proves brain training activities contribute to cognitive health, to a certain extent. June is Alzheimer's Awareness Month, and many have brain health on their minds.

Brain exercises won't prevent dementia or increase IQ, but with practice, they may better performance on a set task. And as with physical exercise, there's no one-size-fits-all regimen.

Dr. Michael Marsiske, a researcher and associate professor in the University of Florida department of clinical and health psychology, said that for decades studies have shown adults age 65 and older can experience substantial improvements after brain training sessions, gaining in areas such as memory, reasoning and problem solving.

Please See BRAIN, A21

### LONG-DELAYED PROJECT LEAVES NY RAIL RIDERS IN A LURCH

The latest estimates for the new railroad that will bring suburban trains beneath the East River to Grand Central in Manhattan is 2022, 13 years after the original finish date. **National News, A10**

### THAT'S AMAZING

### EMERGENCY OFFICIALS HELP DOG TRAPPED INSIDE TREE

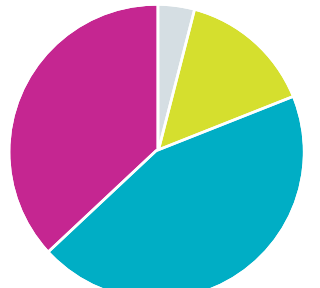
A couple of Kentucky State Police troopers and a firefighter proved man can be dog's best friend by coming to the rescue of a dachshund trapped in a tree trunk. Police say two off-duty troopers were mowing a cemetery in Salem, about 35 miles northeast of Paducah, when they heard barking Thursday. Sgt. Michael Williams and Trooper Gerick Sullivan looked for several minutes and finally found the pooch trapped inside a tree. Rocco had accessed the tree through a groundhog hole. — The Associated Press

38.5%

The projected increase of Alzheimer's disease in Florida residents age 65 and older by the year 2025

### ALZHEIMER'S DISEASE PATIENTS BY AGE

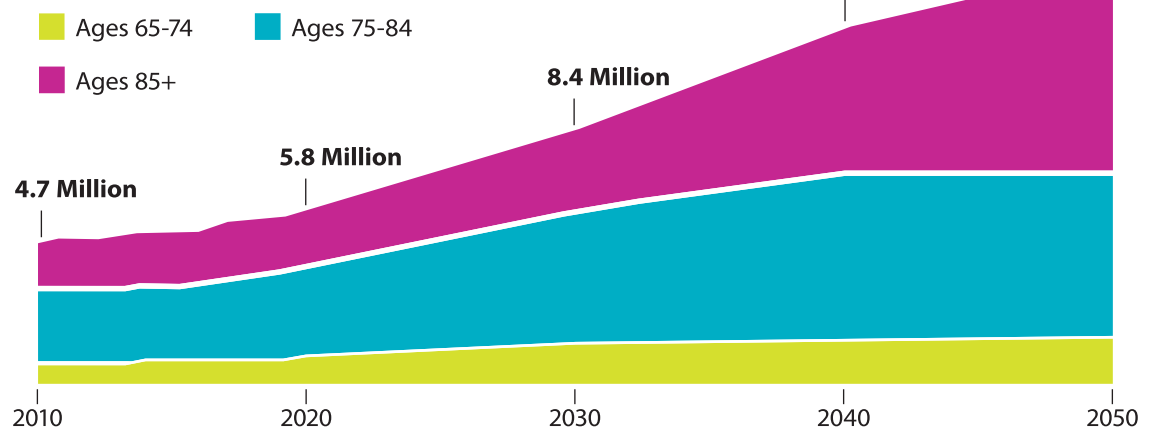
Ages of people with Alzheimer's disease in the U.S. in 2017



Percentages do not total 100 due to rounding.

### ALZHEIMER'S PROJECTIONS

Projected number of people age 65 and older in the U.S. with Alzheimer's disease, 2010 to 2050



Graphic source: Alzheimer's Association

Advice	D11
Classifieds	E1
Comics	D6
Lottery	A4
Movie Listings	D3
Puzzles	D7
Television	D10

We support our men and women in uniform.



## COMMUNITY & CONNECTIONS

### Only in The Villages

LIFE IN FLORIDA'S FRIENDLIEST HOMETOWN

### VHS Grad Soars to Success as Marine One's Newest Recruit

By KATHERINE BROWN  
Daily Sun Staff Writer

When Staff Sgt. Dereck LoRusso received an intriguing email in January, he wasn't sure if he should respond to it. "I was reluctant to do it just because I get a lot of junk email," he said. The email in question was from a recruiter for Marine One, the code name given to the presidential helicopter. The recruiter asked LoRusso if he was interested in applying to join the Marine One squadron. "I figured this is a once-in-a-lifetime opportunity; might as well apply and see if I can get it," he said. Now, after going through several

Please See RECRUIT, A22



Louis Brems | Daily Sun

USMC Staff Sgt. Dereck LoRusso, of Wildwood, is scheduled to join the Marine One squadron in January 2018 to serve as communications chief.

### THE DIGIT

4,976  
motorcyclists killed

The number of motorcyclists killed in crashes in 2015, according to the U.S. Department of Transportation. The number injured was 88,000. The Sumter County Board of County Commissioners issued a proclamation May 23 for Motorcycle Safety Awareness Month in an effort to raise public awareness about motorcycle safety. — Patricia Steele, Daily Sun

### TONIGHT'S EVENTS ON THE SQUARES

Entertainment runs from 5 to 9 p.m.

**Spanish Springs Town Square**  
Blue Stone Circle  
Happy hour, 5-7 p.m.

**Lake Sumter Landing Market Square**  
Bobby Croft & Valerie Gillespie  
Happy hour, 5-6 p.m.

**Brownwood Paddock Square**  
Amee Reese Automatic Duo  
Happy hour, 5-6 p.m.

from the front page

**BRAIN**

Continued from A1

But a challenge with cognitive training is its specificity. If training to improve memory, for instance, don't expect improvements in other cognitive abilities.

Even when using a memory-focused approach, consumers still need to specify the type of memory they're trying to improve, Marsiske said. Bettering the ability to memorize a shopping list may not translate to improved facial recognition.

"You have to match your training to the precise aspect of mental functioning you're trying to improve," he said.

Locally, senior-living communities implement mental exercises into daily schedules to keep residents' minds engaged.

Each morning at Mission Oaks, residents in assisted living start off the day with chair exercises, followed by brain-stimulating activities such as brain teasers.

"We wake up the body, and then we wake up the mind," said Nancy Bedle, an activity director. "They think they're having fun, but they're also stretching their minds."

It's not the only community focused on brain health.

Bobbi Sarmiento, director of marketing for Sumter Grand and Sumter Place, said all activities planned in the communities are meant to target the mind, body and spirit.

On the independent living side at Sumter Grand, activities such as card games, crafting and yoga are offered frequently.

A doctor visits assisted living and memory care residents at Sumter Place twice a week for 45-minute brain-training sessions.

Sarmiento said they make sure those activities aren't making unrealistic promises, but they do keep residents thinking.

"It helps keep them engaged and their minds sharp," Sarmiento said. "We're very upfront and honest. This is not going to improve your memory, this is just trying to help your brain stay stabilized."

HarborChase works to engage the minds of its residents in the community's activities.

The goal is to improve quality of life, not memory.

There is currently no substantial treatment to slow the progression of dementia.

"We try to be really realistic," said Sherry Adolfsen, director of memory care. "Everybody prays for a cure."

Thirty years in the business has helped Adolfsen craft daily mental exercises that her residents enjoy.

"The coloring or bingos or singalongs are all part of that cognitive activity," she said.

Residents also participate in word games, like finding the common bond in a list of items or finishing the end of a well-known saying.

"It makes them feel better about themselves," Adolfsen said. "The one main thing is you want them to feel that they have purpose."

**Brain-Training Companies**

As ads for brain training dominate airwaves, playing mind games has new meaning.

Research has proven that brain training may improve brain health, but researchers say consumers must remain on the lookout for messages that are manipulative.

Science says brain training has its benefits, but researchers have been more critical of the companies that profit from the programs.

In 2014, a letter published by the Stanford Center on Longevity and the Berlin Max Planck Institute for Human Development criticized brain game companies for claiming their software improved performance on everyday, cognitive tasks and reduced mental decline without sufficient support, to the detriment of consumers.

More than 70 psychologists and neuroscientists, including Marsiske, signed it.

"We object to the claim that brain games offer consumers a scientifically grounded avenue to reduce or reverse cognitive decline when there is no compelling scientific evidence to date that they do," the letter read. "The promise of a magic bullet detracts from the best evidence to date, which is that cognitive health in old age reflects the long-term effects of healthy, engaged lifestyles."



Louis Brems | Daily Sun

Jean Mitchell can't control her excitement after taking every trick in a hand of bridge at Sumter Grand. Sumter Grand offers brain-stimulating activities for residents.

A few months later, more than 100 scientists released a response letter agreeing that many companies did not back their claims with proper support but argued there was a growing field of evidence that brain exercises could reduce or reverse cognitive decline.

An October 2016 scientific review of literature published in Psychological Science in the Public Interest on brain training found extensive evidence that brain training improved performance on the trained tasks but less evidence that translated to improvements on other tasks, and little evidence that training enhanced ability to perform activities of daily life.

"Not all brain training companies are the same," Marsiske said. "Some companies have sought to include only training approaches for which there is research support."

Other companies have gathered less research and made marketing claims beyond what their programs can

accomplish, he added.

A few have paid the price. Last January, the Federal Trade Commission fined Lumos Labs, the company behind Lumosity, \$2 million.

The FTC said Lumos Labs deceived customers by saying its games improved performance on everyday tasks, delayed age-related cognitive decline and reduced cognitive impairment associated with health conditions, such as stroke, without significant evidence.

Four months later, LearningRx Franchise Corp. paid \$200,000 under a settlement with the FTC for making unsubstantiated claims that its brain training programs are clinically proven to permanently improve serious health conditions, including Alzheimer's disease.

"No strong evidence yet exists to support the claim that brain training can reduce the likelihood of becoming cognitively impaired," Marsiske said.

Research does show that computerized brain training

may benefit healthy brains, but whether it's worth the money or the time remains up for debate.

**Finding What's Right for You**

Dr. Michael Schoenberg, board-certified neuropsychologist and a professor in the department of neurosurgery at the University of South Florida, said he typically suggests other activities for improved brain health to his patients.

It is most important to first ensure systemic diseases, such as hypertension, diabetes and COPD, are under control, he said.

Then they can look to physical activity, especially aerobics, and mentally stimulating tasks, such as crossword puzzles or reading and then recounting the newspaper.

"The worst thing you can do in terms of cognitive aging is not managing your medical problems, sit on the sofa watching TV, drinking alcohol and smoking," he said.

He does sometimes recommend brain games to patients with limited mobility.

"It's not going to do harm, and it may help," Schoenberg said.

Schoenberg said consumers should be wary of companies citing brain plasticity — the ability of the brain to recover and alter its neuropsychological process — in their studies.

Many of those studies used participants with a cognitive impairment, such as traumatic brain injury, which may not translate to improvement in a healthy brain.

"They're trying to take advantage," he said.

Think before reaching into your wallet, he added. Many programs are available for free, and he said those that cost more aren't necessarily proven to have more benefit.

Marsiske said that if consumers want to improve cognitive ability but are unsure of a program's claims, they should ask someone who is not financially invested in the company.

"It is probably a good idea to ask your doctor or to consult researchers at universities near you for more specific recommendations to fit your situation," he said.

**STILL RUNNING OUT TO FETCH THE PAPER?**

**SUBSCRIBE TO HOME DELIVERY, AND WE'LL DELIVER IT TO YOUR HOME FOR LESS THAN HALF THE COST.**

Why spend **MORE** to pick your paper up from a rack or store when you could have it delivered to your home for **less**?

**52 Weeks for less than 22¢ a day**

**SUBSCRIBE TODAY**

**Locally (352) 751-7964**

**Toll Free 1-800-726-6592**

The Villages **DAILY SUN** **FETCH 52**

**6-MONTH CD**

**2.75%\* APY**

*Insured & Guaranteed*

**FIRST FINANCIAL GUARANTEE**

THE ORIGINAL CD LOCATOR AND FINANCIAL SERVICE CO.™

**352-561-2050**

Ask Us About Our IRAs

Annual percentage yield. Yield and deposit amount, subject to availability. Penalty for early withdrawal. \*Promotional incentives included to obtain yield. Certain restrictions apply. Rates may vary depending on deposit amount. BBB All bank accounts are FDIC insured.

**JACQUELINE C. DELLINGER, P.A.**

Over 25 years experience

**FAMILY LAW**

DIVORCE • ALIMONY  
MARITAL SETTLEMENT AGREEMENTS  
PRE-NUPITAL AGREEMENTS  
SHARED PROPERTY AGREEMENTS

**REAL ESTATE**

FOR SALE BY OWNER • RESIDENTIAL LEASES  
LEASE/PURCHASE AGREEMENTS

**352-750-2404**

Southern Trace Office Center off Wedgewood Lane  
551 Fieldcrest Drive • The Villages, FL 32162

**GOLF CARE APPROVED**

**The Villages Daily Sun Mobile**

**Check out these exciting features!**

- **Get Breaking News fast**
- **Read Top Stories on your phone**
- **Check out this month's Town Square event calendars**
- **View The Villages Phone Book yellow pages**
- **Check out The Villages Daily Sun Facebook timeline.**
- **Plan your day in The Villages around the weather by using the updated interactive weather feature and so much more...**

Make sure to enable push notifications so that you will get any breaking news updates sent right to your phone.

Tap your App Store (iphone) or Google Play (Android) icon and search for, "The Villages Daily Sun Mobile."

You can navigate the app by using the sidebar. Enjoy all the features the updated Town Square App has to offer.