FROM THE OLD FARMER'S ALMANAC

WITCH HAZEL CASTS A SPELL

THANKSGIVING HISTORY

RECIPES FOR THANKSGIVING LEFTOVERS

NEW USES FOR OLD SOCKS

FARMER'S
1792
ALMANAC

**NOVEMBER 2016** 



## **FEATURES**

#### **GARDENING**

Witch Hazel Casts a Spell

#### **FOOD**

Recipes for Thanksgiving Leftovers

#### **HISTORY**

Give Thanks for Sarah Josepha Hale Without her, we wouldn't have Thanksgiving Day.

#### LIVING NATURALLY

New Uses for Old Socks and Stockings

## **DEPARTMENTS**

#### **CALENDAR**

Moon View, This Month in History, Calendar Q&A

#### **ASTROLOGY**

Best Days to Do Things



#### **ASTROLOGY**

Gardening by the Moon's Sign

#### **ASTRONOMY**

Sky Map for November Visually navigate the night sky from your own backyard.

#### **HOT PRODUCTS**

Gifts Galore!

## WEATHER FORECASTS

How We Make Our Predictions

November U.S. and Canadian Weather Forecasts

Weather Update

#### WIT

Humor Me Grins and groans from the Almanac

#### **WHAT'S NEXT**

See what we have in store for our December issue!





# THE MONTH OF NOVEMBER

HOLIDAYS, HISTORY, AND FOLKLORE



## MOON VIEW

November's full Moon, the **Full Beaver Moon**, occurs on the 14th, at 8:52 A.M. EST.



TAP FOR MORE MOON PHASES



TAP FOR MORE ABOUT THE FULL BEAVER MOON





#### **NOVEMBER'S ZODIAC SIGNS**

Scorpio: October 23–

November 22

Sagittarius: November 23-

December 21

#### SAY HAPPY BIRTHDAY!

I have never been lost, but I will admit to being confused for several weeks.

-Daniel Boone, American frontiersman (b. November 2, 1734; d. September 26, 1820)



## FOLKLORE FUN.

If there's ice in November that will bear a duck,
There'll be nothing after but sludge and muck.



## NOVEMBER'S BIRTH FLOWER:

## Chrysanthemum

• Generally, chrysanthemums represent cheerfulness. A red one conveys "I love you." White symbolizes truth or pure love. A yellow one indicates slighted love.



TAP FOR MORE ABOUT THE LANGUAGE OF FLOWERS



# THIS MONTH IN HISTORY



#### **NOVEMBER 12: MAKING A CONNECTION**

On this day in 1936, the San Francisco–Oakland Bay Bridge opened in California, barely 3 years after the project had begun on July 9, 1933. Spanning 8.4 miles, 4.5 miles of which is over water, the bridge connects San Francisco and Oakland and was known at the time as the longest bridge in the world. The project cost about \$77.6 million to create, also making it the most expensive bridge of its day.

#### **NOVEMBER 15: SPECIAL APPEARANCE**

On this day in 1806, U.S. Army Lt. Zebulon Pike, leading an expedition in the Southwest, wrote in his journal, "At two o'clock in the afternoon, I thought I could distinguish a mountain to our right which appeared like a small blue cloud." Naming it Grand Peak, he and three other men from his expedition set out to climb it. Finding it to be much farther away than originally estimated, they did not have enough supplies to sustain the journey; after reaching the foothills, they had to abort. Today, Grand Peak is called Pikes Peak, in the explorer's honor. The 14,115-foot-tall mountain is located in the foothills of the Rocky Mountains in Colorado. (Editor's note: Although its name has quite properly been spelled "Pike's" at times, today—for some reason—the accepted form is without the apostrophe.)



#### **PIKES PEAK TRIVIA**

- The Ute tribe, which had lived in the area of the mountain long before Pike arrived, referred to it as Sun Mountain Sitting Big.
- Pikes Peak served as a landmark for settlers and gold miners moving West. The slogan for the 1859 Gold Rush to Colorado was "Pike's Peak or Bust."
- In 1893, teacher Katherine Lee Bates rode to the summit of Pikes Peak. The view from there inspired her to write the song "America the Beautiful."



# **CALENDAR Q&A**



### How did the days of the week get their names?

The ancient Romans named the days of the week with the Latin words for the Sun, the Moon, and the five known planets. These names have survived in European languages, but English names also reflect Anglo-Saxon and Norse influences.

#### SUNDAY

Anglo-Saxon/Norse: Sun's day (Sunnandaeg)

Latin: Sol's day (dies Solis). Sol was an ancient Roman sun god. Both the French dimanche and Spanish domingo are derived from Latin words meaning "Lord's day."

#### MONDAY

Anglo-Saxon/Norse: Moon's day (Monandaeg)

Latin: Luna's day (*dies Luna*). Similarly, *lundi* in French and *lunes* in Spanish. Luna was an ancient Roman Moon goddess.



#### **TUESDAY**

Anglo-Saxon/Norse: Tiw's day (*Tiwesdaeg*)
Tiw was an Anglo-Saxon god of war.

Latin: Mar's day (*dies Martis*). Similarly, *mardi* in French and *martes* in Spanish. Mars was an ancient Roman god of war.

#### **WEDNESDAY**

Anglo-Saxon/Norse: Woden's day (*Wodnesdaeg*) Woden was the Anglo-Saxon king of the gods.

Latin: Mercury's day (dies Mercurii). Similarly, mercredi in French and miércoles in Spanish. Mercury was a messenger of the ancient Roman gods and a god of commerce.

#### **THURSDAY**

Anglo-Saxon/Norse: Thor's day (*Thursdaeg*) Thor was a Norse god of thunder, lightning, and storms.

Latin: Jupiter's (or Jove's) day (dies Jovis). Similarly, jeudi in French and jueves in Spanish. Jupiter (or Jove) was the king of the ancient Roman gods and a god of sky and thunder.

#### **FRIDAY**

Anglo-Saxon/Norse: Frigg's day (*Frigedaeg*) Frigg was a Norse goddess of home, marriage, and fertility.

Latin: Venus's day (*dies Veneris*). Similarly, *vendredi* in French and *viernes* in Spanish. Venus was the ancient Roman goddess of love.

#### **SATURDAY**

Anglo-Saxon/Norse: Saturn's day (*Saeterndaeg*) Saturn was an ancient Roman god of fun and feasting.

Latin: Saturn's day (*dies Saturni*). Both the French *samedi* and the Spanish *sábado* are derived from Latin words meaning "Sabbath day."





## **BEST DAYS TO DO THINGS**

These November dates, deemed to be propitious in astrology, are based on the astrological passage of the Moon. However, consider all indicators before making any major decisions. –*Celeste Longacre* 

#### **PERSONAL**

Begin diet to lose weight: 18, 22, 27 Begin diet to gain weight: 10, 13 Cut hair to encourage growth: 9, 10, 13 Cut hair to discourage growth: 24, 25

Have dental care: 21–23 Quit smoking: 18, 22, 27 Wean children: 18, 22, 27

#### **AROUND THE HOUSE**

Can, pickle, or make sauerkraut: 17, 18, 26–28

End projects: 28 Start projects: 30

#### **OUTDOORS**

Begin logging: 4, 5 Go camping: 1–3, 29, 30 Go fishing: 1–14, 29, 30 Set posts or pour concrete: 4, 5

#### IN THE GARDEN

Destroy pests and weeds: 11, 12
Graft or pollinate: 17, 18
Prune to encourage growth: 1–3
Prune to discourage growth: 19, 20
Plant aboveground crops: 9, 10
Plant belowground crops: 17, 18,
26, 27

Harvest aboveground crops: 4, 5 Harvest belowground crops: 13, 22, 23

#### ON THE FARM

Breed animals: 26–28 Castrate animals: 7, 8 Cut hay: 11, 12 Set eggs: 15, 16

Slaughter livestock: 26–28 Wean animals: 18, 22, 27





## **GARDENING BY THE MOON'S SIGN**

Use the November dates shown in the Moon's Astrological Place calendar below to find the best days for the following garden tasks:

PLANT, TRANSPLANT, AND GRAFT: Cancer, Scorpio, or Pisces

HARVEST: Aries, Leo, Sagittarius, Gemini, or Aquarius

BUILD/FIX FENCES OR GARDEN BEDS: Capricorn

**CONTROL INSECT PESTS, PLOW, AND WEED:** Aries, Gemini, Leo, Sagittarius, or Aquarius

**PRUNE**: Aries, Leo, or Sagittarius. During a waxing Moon, pruning encourages growth; during a waning Moon, it discourages growth.

# TAP FOR MERCURY IN RETROGRADE DATES

APP EXTRA!
TAP FOR
NOVEMBER
MOON PHASES

#### THE MOON'S ASTROLOGICAL PLACE IN NOVEMBER

25 Libra26 Scorpio27 Scorpio28 Scorpio29 Sagittarius30 Sagittarius

<b>1</b> Sagittarius	9 Pisces	17 Cancer
2 Sagittarius	10 Pisces	18 Cancer
3 Sagittarius	<b>11</b> Aries	<b>19</b> Leo
4 Capricorn	12 Aries	<b>20</b> Leo
5 Capricorn	13 Taurus	21 Virgo
6 Aquarius	14 Taurus	22 Virgo
7 Aquarius	<b>15</b> Gemini	23 Virgo
8 Aquarius	<b>16</b> Gemini	24 Libra

#### MERCURY IN RETROGRADE

Sometimes the other planets appear to be traveling backward through the zodiac; this is an illusion. We call this illusion retrograde motion.

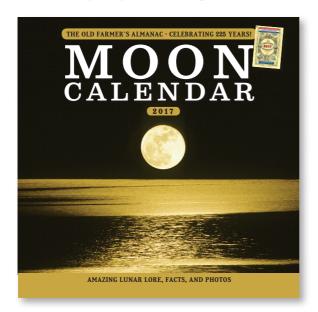
Mercury's retrograde periods can cause our plans to go awry. However, this is an excellent time to reflect on the past. Intuition is high during these periods, and coincidences can be extraordinary.

When Mercury is retrograde, remain flexible, allow extra time for travel, and avoid signing contracts. Review projects and plans at these times, but wait until Mercury is direct again to make any final decisions.

Mercury is retrograde from December 19, 2016–January 9, 2017.

-Celeste Longacre

# OUR FIRST-EVER MOON CALENDAR!







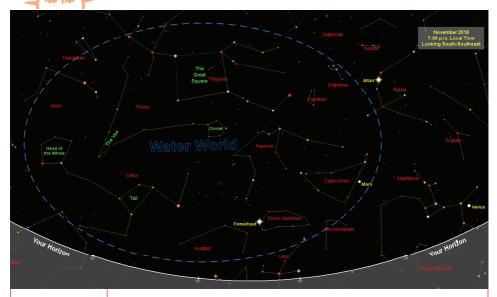




Amazing Lunar Lore, Facts, and Photos The 2017 Old Farmer's Almanac Moon Calendar

**ONLY \$10.99** | Printed in the USA

LEARN MORE



# APP EXTRA! TAP TO GET A PRINTABLE NOVEMBER SKY MAP

# APP EXTRA! TAP TO FOLLOW OHIOAN JEFF DETRAY'S SKY

**ADVENTURES** 

## THE CELESTIAL WATER WORLD

t this time of year, our view of the south-southeast sky is all about water, so prepare to explore the night sky's Water World, despite the chill in the air!

Start your tour by looking high in the sky to find the Great Square, part of the constellation Pegasus, the Flying Horse. How can a horse, flying or not, be a part of the Water World? In Greek mythology, the father of Pegasus is Poseidon, the God of the Sea, who just happens to be a horse-god as well. Thus, due to his unusual parentage, Pegasus can be considered a Sea Horse as well as a Flying Horse!

Pegasus appears upside down from our point of view, a common occurrence for constellations. Depending on the time of year—or even the time of night—a constellation may seem to be tipped, inverted, or otherwise askew. Experienced sky gazers learn to recognize the shapes of important constellations regardless of their orientation.



Just beneath the Great Square is the Circlet asterism, part of Pisces, the Fishes. The Circlet represents the head of one of the fishes. Pisces is a sprawling, V-shape constellation that extends from the Circlet down and to the left, where it meets the second fish at the point of the V. The second fish springs upward to the left of the Great Square.

The V points to the midsection of Cetus, the Whale (or Sea Monster). On the left is the five-sided Head of the Whale, which looks very much like a larger version of the Circlet of Pisces. From the Head, a meandering line of very faint stars leads rightward to the Tail of the Whale.

# DELPHINUS HAS THE DISTINCTION OF ACTUALLY RESEMBLING ITS NAMESAKE, A RARITY AMONG CONSTELLATIONS.

To the right of the Tail lies the bright star Fomalhaut, which represents the mouth of Piscis Austrinus, the Southern Fish. Fomalhaut is the 18th brightest star in the entire sky. This constellation is closely associated with Aquarius, the Water Bearer, located directly above Piscis Austrinus. Aquarius carries a large jar from which he eternally pours a great stream of water into Fomalhaut, the mouth of the Southern Fish.

etween Piscis Austrinus and Aquarius lies Capricornus, the Sea Goat, a bizarre creature with the head of a goat and the tail of a fish. The stars of Capricornus are rather dim, but this November the planet Mars sits nearby, shining far brighter than any of the Sea Goat's stars. Despite the faintness of its stars, Capricornus has been described as a Sea Goat by many ancient cultures as far back as 4,000 years ago.

Straight above Capricornus and to the right of Pegasus leaps little Delphinus, the Dolphin, the last and smallest denizen of the celestial Water World. Delphinus has the distinction of actually resembling its namesake, a rarity among constellations.

One more thing: The annual Leonid meteor shower will reach its peak on the night of November 16–17. Go outside after midnight and look toward the darkest and most open part of the sky to see this meteor (shooting star) show. –*Jeff DeTray* 



# **GIFTS GALORE!**



LEARN MORE

protection. \$47.95



#### **BALSAM FIR PILLOWS**

Traditionally given as a sign of friendship, these nicely made pillows are each filled with ground balsam fir from Maine. Many different designs are available. \$26.95

**LEARN MORE** 

#### **ANTIQUE WOOD BOBBIN CANDLESTICKS**

powder coat finish that will

yield many years of outdoor

Set of five candlesticks made from real wooden. bobbins that served in textile mills. Each hardwood bobbin has a distinctive patina from many years of use. No two bobbins are exactly the same and most will be between 50 and 100 years old. \$39.95

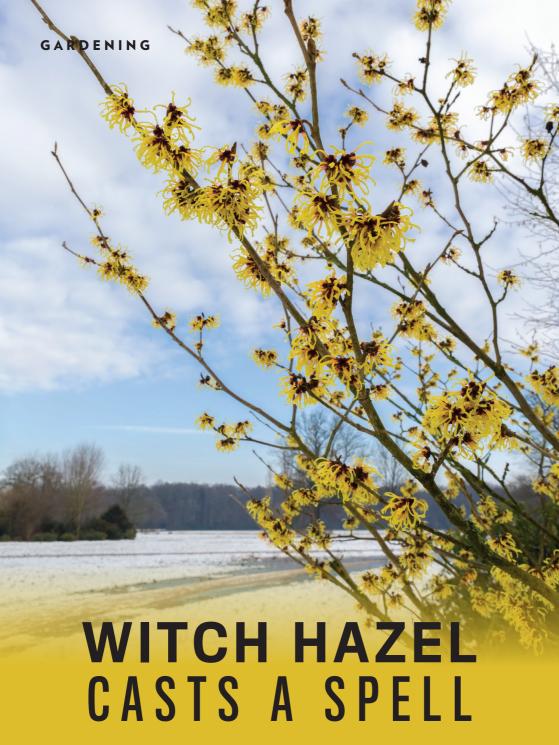




#### LOBSTER ROPE DOORMATS

Virtually impervious to wear and weather! These heavy large mats do an excellent job of removing dirt and mud from shoes while staying place. They're easy to clean, too. Made in the USA. \$59.95

LEARN MORE



#### GARDENING

or much of the year, American witch hazel, or winterbloom, is a shrub that grows mostly unnoticed along shaded stream banks and in damp woods from Georgia to southern Canada. Its light gray bark and rounded green leaves blend in well with its surroundings. Even when the leaves turn a dazzling clear yellow in the fall, their beauty is often lost in the colorful tangle of other plants.

hen witch hazel flowers—not in the spring, but in late October or November, or even early December. The fragrant, tasseled yellow blossoms often appear against a background of early snow. As the shrub blooms, its previous year's fruit matures. The seed capsules explode with an audible pop, shooting their two hard, shiny black seeds several yards from the parent plant.

TAP FOR MORE ABOUT BREATH-TAKING SHRUBS AND TREES





he plant's name does not refer to witchcraft, but comes from the Middle English word wych or wyche, meaning pliant or flexible. The "hazel" in the name comes from the plant's similarity to the common hazelnut.

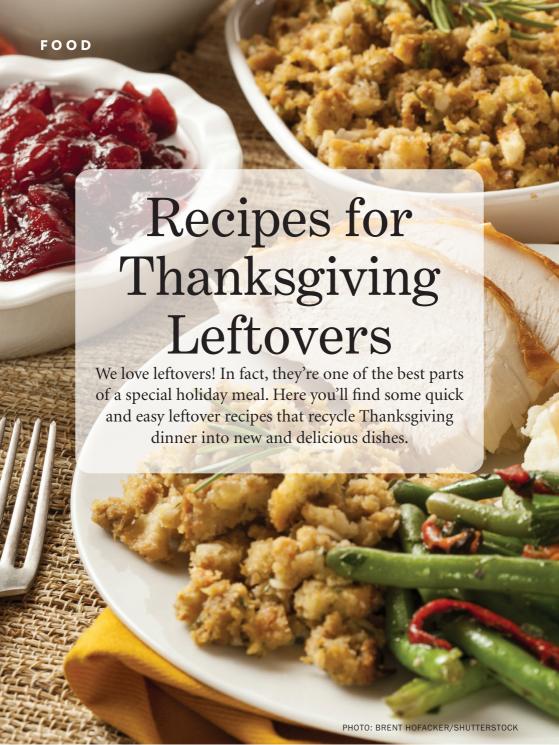
Native Americans used the plant's springy wood to make bows. They also valued the shrub for its medicinal qualities, using the astringent leaves and bark to control bleeding and take the sting out of insect bites and drinking the tea as a mild sedative.

If for no other reason than its time of bloom, witch hazel is a valuable landscaping plant—but choose its site carefully, because it may grow 25 feet tall and just as wide. Being shade tolerant,

witch hazel is often used for naturalizing wooded areas, but it may be grown in full sun and actually develops brighter fall foliage when planted in the open. Its extreme cold hardiness and resistance to insects and disease make witch hazel a good choice for an easy-care planting.

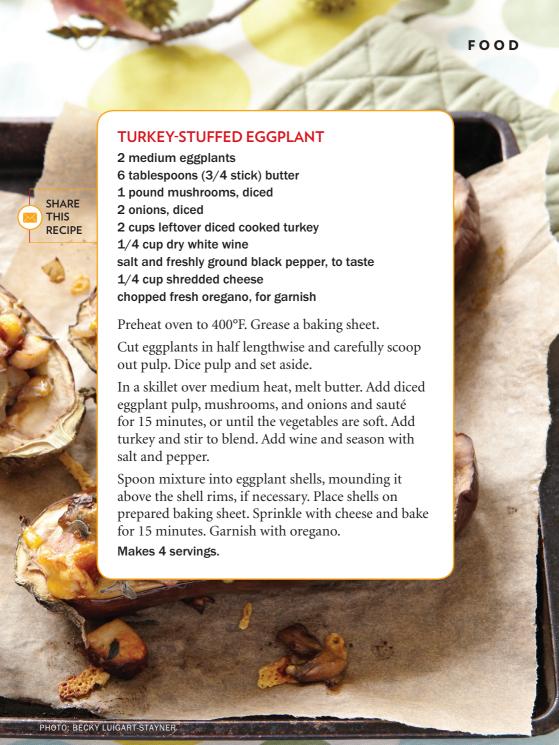
#### A POTENT POTION

he witch hazel that we find in the medicine cabinet today is made by distilling the bark of twigs and roots with alcohol to create a soothing lotion that reduces swelling and relieves aching joints. More than a million gallons of witch hazel are sold each year in the United States, making it one of the most popular natural remedies. —George Lohmiller



# Turkey-Stuffed Eggplant









3 tablespoons unsalted butter

1-1/2 cups milk

1 cup leftover mashed potatoes, at room temperature

2 teaspoons salt

1 tablespoon sugar or honey

2-1/4 teaspoons (1 packet) dry yeast

1/3 cup warm (105° to 115°F) water

5 cups all-purpose flour

In a saucepan, melt butter in milk. Let cool to room temperature.

In the bowl of a stand mixer with dough hook, combine milk mixture with mashed potatoes, salt, sugar, yeast, and warm water. Add flour and knead with dough hook for about 5 minutes, until you have a smooth and slightly glossy dough. Place into an oiled bowl. Cover with plastic or a clean, dry dish towel and let rise until doubled in bulk, about 1 hour.

Oil two 9x5-inch loaf pans.

Turn dough out onto a lightly floured work surface. Divide in half and knead three or four times. Shape each portion into a rectangle, about 9 inches long. Roll each one lengthwise into a log and place seam side down into its own loaf pan. Cover with plastic or a clean, dry dish towel. Let rise until doubled in bulk, about 1 hour.

Preheat oven to 375°F.

Bake for 30 minutes, or until loaves sound hollow when tapped. Turn out onto wire racks and let cool completely.

Makes 2 loaves.







#### **SQUASH RISOTTO**

- 4 cups turkey or chicken stock, divided
- 2 tablespoons unsalted butter
- 1 small onion, finely diced
- 3 cups Arborio or Carnaroli rice
- 2 cups leftover mashed squash
- 1/2 cup freshly grated Parmesan cheese

In a saucepan over high heat, bring turkey stock to a boil. Reduce heat to low and bring to a simmer.

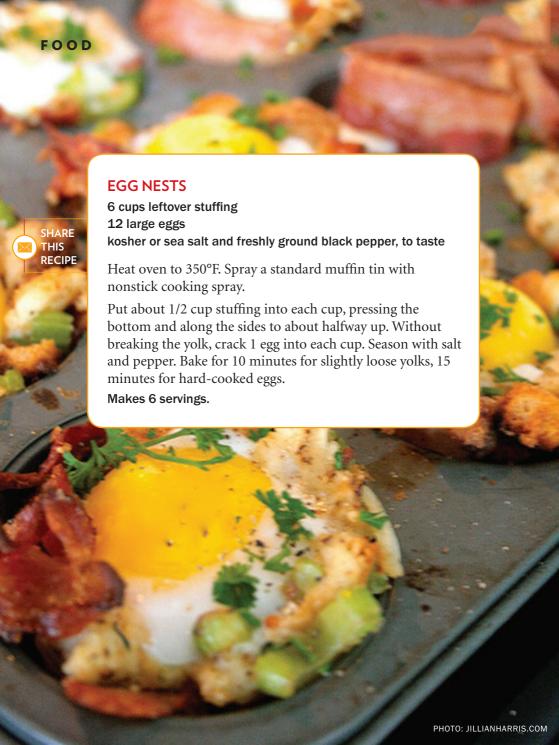
In another saucepan over medium-high heat, melt butter and sauté onions for 5 minutes, or until translucent. Add rice and stir well to coat. Cook, stirring often, for 3 minutes, being careful not to brown rice or onion.

Add 1-1/2 cups hot stock to rice mixture and stir until most of the liquid is absorbed. Add another 1 cup hot stock and stir until most of the liquid is absorbed. Repeat with another 1 cup hot stock until the rice is barely al dente.

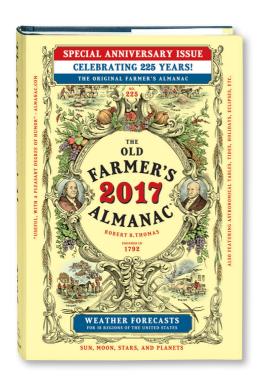
Add squash and remaining stock. Cook for 1 minute. Add cheese and stir until well incorporated.

Makes 6 servings.





## SPECIAL ANNIVERSARY ISSUE!







# THE 2017 OLD FARMER'S ALMANAC

Celebrating 225 Years!
GET 3 FREE GIFTS with purchase!



\$15.95 | Printed in the USA

# GIVE THANKS FOR SARAH JOSEPHA HALE

Without her, we wouldn't have Thanksgiving Day.

#### HISTORY

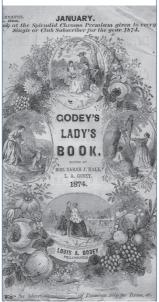
arah Josepha Buell was born on October 24, 1788, on a farm in Newport, New Hampshire. From a tender age, she was curious, smart, and eager to learn.

As a young girl, Buell was taught by her mother about history and literature. Later, her brother Horatio taught her everything that he was learning as a student at Dartmouth College.

When Buell was growing up, women were not accepted as teachers. However, this didn't stop her from founding a private school when she was 18 years old. She taught until she met David Hale. They married in 1813.

David encouraged Sarah to write short





stories and articles. Many of these were published in local newspapers.

Suddenly, in 1822, David died, and Hale was left to care for their five children. To make ends meet, she first operated a women's hat shop and later resumed teaching and writing. Soon she published her first book of poems, including one that became the famous nursery rhyme "Mary Had a Little Lamb." In 1827, she published her first novel.

ohn Blake of Boston read Hale's novel and asked her to work for him on Ladies' Magazine. She accepted and became the first woman editor of a magazine in the

AS A YOUNG GIRL, BUELL WAS TAUGHT BY HER MOTHER ABOUT HISTORY AND LITERATURE.

#### HISTORY

United States. Hale introduced new ideas and a new title, calling it *American Ladies' Magazine*.

Within a few years, Louis Godey of Philadelphia had bought Blake's magazine and merged it with *Godey's Lady's Book*, keeping Hale as editor.

hroughout this period, Hale had written hundreds of letters to governors, ministers, newspaper editors, and every U.S. president with one request: that the last Thursday in November be set aside to "offer to God our tribute of joy and gratitude for the blessings of the year."

Native American harvest festivals and colonists' services to give thanks had taken place for centuries in North America, but there had never been a Thanksgiving holiday.

In 1863, with the country torn by the Civil War, Hale's campaign finally got people's attention. That September, she put her thanksgiving message into an



TAP FOR FDR AND
THE FOURTH
THURSDAY

TAP FOR CANADIAN
THANKSGIVING

editorial and wrote to President Abraham Lincoln, urging him to make Thanksgiving Day a fixed national festival.

Lincoln liked Hale's idea. On October 3, 1863, he issued a proclamation declaring the last Thursday of November to be National Thanksgiving Day. He ordered all government offices in Washington closed on that day.

Hale enjoyed many Thanksgiving celebrations. She died on April 30, 1879, at the age of 90.

IN 1863, WITH THE COUNTRY TORN
BY THE CIVIL WAR, HALE'S CAMPAIGN FINALLY
GOT PEOPLE'S ATTENTION.

#### FINALLY, THE FOURTH

In 1939, President Franklin Roosevelt was pressured by store owners to move Thanksgiving Day to the third Thursday in November. They wanted more shopping days between Thanksgiving and Christmas. He did it, but millions of Americans continued to celebrate Thanksgiving Day on the last Thursday of November. In 1940, FDR realized his mistake. In the December 1941, he assigned the holiday to the fourth Thursday in November.

#### **HOW ABOUT MONDAY?**

Occasions for thanksgiving in Canada have been observed for hundreds of years. Thanksgiving became a national holiday in 1879; its date each year was determined by proclamation. In 1957, Parliament set the second Monday in October as the fixed date "for general thanksgiving to Almighty God for the blessings with which the people of Canada have been favoured."

# NEW USES FOR OLD SOCKS AND STOCKINGS



#### LIVING NATURALLY

#### LIKE ME, YOU PROBABLY HAVE A DRAWER OR BOX

where you toss all of those socks that emerge from the wash without a mate or with a hole in the toe.

You can count on females in the household to contribute tights and nylon stockings with runs.

My box never gets too full because after decades of practice, I've mastered the art of finding new uses for them.

I don't turn them into rugs, quilts, sock puppets, doll clothes, pet outfits, or anything that requires real work. Below, you'll find a (very) few of my favorites.

#### **OLD SOCKS**

• Nothing works better for dusting and scrubbing—or gets the job done faster—than slipping both hands into cotton socks and getting to work. Spritz the palms with appropriate cleaning products and use 'em on the floor, the counters, the ceiling fan, the car, the window blinds,









#### UNMATED SOCKS ALSO MAKE GOOD STORAGE BAGS.

the baby, or the dog. Washable, too, and good for many reuses.

- Unmated socks also make good storage bags, especially for organizing a junk drawer. Use them to store loose extension cords, crayons, or pieces from board games and jigsaw puzzles, or to organize toiletries when packing a suitcase. Use a permanent marker to categorize the contents and a rubber band or twist-tie to secure the bag. Hang a sturdy sock from a hook in the kitchen and toss your spare change into it once a week. At the end of the year, add the accumulated change to your emergency savings account or put it toward
- a special treat. We use ours, usually about \$50, to buy some holidayfeast items that wouldn't otherwise find their way onto our shopping list.
- As bar soaps shrink to small slivers, collect them in a cotton sock, tie up the end, and use the soap sock as a soap-in-a-bag for baths and showers.
- omake a cold or hot pack:

  Make a cold or hot pack:
  Fill a cotton knee sock
  or tube sock about 2/3
  full of dried rice, lentils,
  beans, or dried corn
  kernels. Tie it shut with
  a piece of twine. Place in
  the freezer for a flexible
  cold pack. Microwave for
  to 2 minutes for a hot
  pack. For a real treat,
  slip a couple of warm

ones under the covers at

the foot of your bed to

- warm up your feet on a chilly night.
- Winter runners and walking enthusiasts: Pull a couple of long wool socks over your lighter-weight gloves at the start of a winter jaunt. If your hands get too warm, pull the socks off and tuck them into your waistband or stuff them up the sleeves of your jacket.

#### OLD TIGHTS OR NYLONS

• Cut off a leg of nude panty hose from the knee down; add a measure of rice, barley, or lentils; tie it off loosely to allow for expansion; and toss it into a simmering pot of soup or soup stock. As they cook, the grains or legumes will absorb



## SLICED INTO 4-INCH LENGTHS, THE LEGS OF OLD TIGHTS MAKE GOOD PONYTAIL HOLDERS.

the flavors of the broth to become the basis for a new dish.

- A leg or a whole panty hose makes a good container for stored onions or garlic. Hang it from a hook in a cool, dry place.
- Sliced into 4-inch lengths, the legs of old tights or nylon stockings make good ponytail holders, easy on the hair shaft. Also use them as substitutes for rubber

bands.

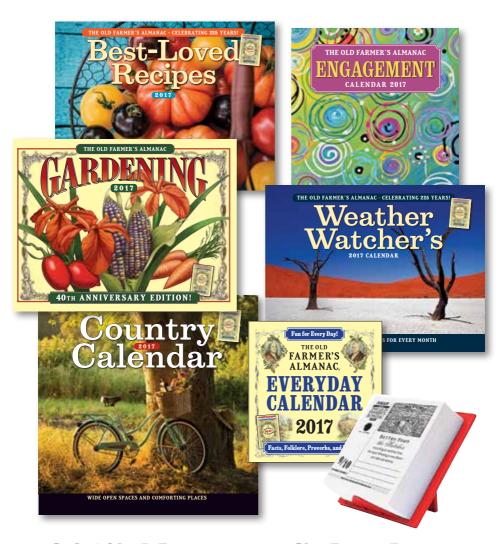
- The leg of a nylon stocking works for tying tomato and other tall plants or young trees to a stake. Wrap once around the stem, not too tightly, before tying it to the stake. The soft fabric won't injure the plant stem, and it will expand as the stem grows in diameter.
- Use a piece as a filter: Stretch it over the end of a vacuum-cleaner

hose and secure with a rubber band to retrieve small objects such as pins, screws, and earrings without sucking them in. Or use it to filter paint, used cooking oil, or other liquids while pouring them from one container to another.

–Margaret Boyles



TAP TO READ MORE OF MARGARET BOYLES'S POSTS IN HER "LIVING NATURALLY" BLOG



# 2017 Almanac Calendars SHIPPING NOW!

Updated with stunning new images. Same prices as last year.



\$9.99 - \$14.99



TAP TO FIND OUT THE WEATHER HISTORY OF THE DAY

LOVE ALL THINGS WEATHER? TAP FOR THE WEATHER FOLKLORE OF THE DAY THUNDER IN NOVEMBER, A FERTILE YEAR TO COME.

## **HOW WE MAKE OUR PREDICTIONS**

We derive our weather forecasts from a secret formula that was devised by the founder of this Almanac, Robert B. Thomas, in 1792. Thomas believed that weather on Earth was influenced by sunspots, which are magnetic storms on the surface of the Sun.

Over the years, we have refined and enhanced this formula with state-of-the-art technology and modern scientific calculations. We employ three scientific disciplines to make our long-range predictions: solar science, the study of sunspots and other solar activity; climatology, the study of prevailing weather patterns; and meteorology, the study of the atmosphere. We predict weather trends and events by comparing solar patterns and historical weather conditions with current solar activity.

Our forecasts emphasize temperature and precipitation deviations from averages, or normals. These are based on 30-year statistical averages prepared by government meteorological agencies and updated every 10 years. Most-recent tabulations span the period 1981 through 2010.

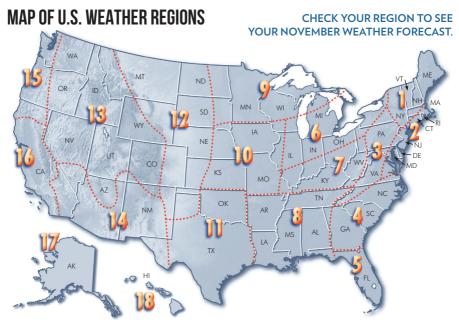
We believe that nothing in the universe happens haphazardly, that there is a cause-and-effect pattern to all phenomena. However, although neither we nor any other forecasters have as yet gained sufficient insight into the mysteries of the universe to predict the weather with total accuracy, our results are almost always very close to our traditional claim of 80 percent.



Body temperature

Water freezes

Water boils



## MAP OF CANADIAN WEATHER REGIONS





THUNDER IN NOVEMBER, A FERTILE YEAR TO COME.

### U.S. FORECASTS NOVEMBER 2016

#### **REGION 1: NORTHEAST**

Temp. 36° (3° below avg.); precip. 3.5" (avg.). 1–9 Snow showers, cold. 10–14 Scattered showers, mild. 15–17 Flurries, cold. 18–22 Snowstorm, then showers. 23–28 Rain to snow, then sunny, cold. 29–30 Showers, mild.

#### **REGION 2: ATLANTIC CORRIDOR**

Temp. 44° (3° below avg.); precip. 2" (1.5" below avg.). 1–3 Sunny, cold. 4–13 A few showers, turning warmer. 14–16 Rain and wet snow. 17–22 Heavy rain, chilly. 23–28 Sunny, cold. 29–30 Snow to rain.

#### **REGION 3: APPALACHIANS**

Temp. 40° (4° below avg.); precip. 3.5" (avg.). 1–3 Snow showers, cold. 4–8 Sunny; cold north, mild south. 9–12 Showers, mild. 13–16 Snow showers, cold. 17–21 Snow, then flurries, cold. 22–28 Rain, then flurries, cold. 29–30 Rain.

#### **REGION 4: SOUTHEAST**

Temp. 52° (3° below avg.); precip. 2.5" (0.5" below avg.). 1–5 Showers, then sunny, cool. 6–12 Sunny, warm. 13–25 Rainy periods, cool. 26–27 Snow inland, rain coast. 28–30 Showers, warm.

#### **REGION 5: FLORIDA**

Temp. 69° (avg.); precip. 2.5" (1" above avg. north, 1" below south). 1–7 T-storms, then sunny, cool. 8–12 Sunny, warm. 13–19 Isolated showers, cool. 20–30 Scattered t-storms, turning warm.

#### **REGION 6: LOWER LAKES**

Temp. 41° (3° below avg. east, 3° above west); precip. 2" (0.5" below avg.). 1–4 Rain and snow showers, chilly. 5–11 Showers east, sunny west; mild. 12–17 Lake snows, cold. 18–24 Rain, then snow showers, cold. 25–27 Sunny; cold east, mild west. 28–30 Rainy, mild.



#### **REGION 7: OHIO VALLEY**

Temp. 45° (1° below avg.); precip. 3" (0.5" below avg.). 1–4 Flurries, then sunny, cold. 5–11 Sunny, turning warm. 12–14 Rainy, turning chilly. 15–23 Periods of rain and snow, cold. 24–26 Sunny, cold. 27–30 Rainy, mild.

#### **REGION 8: DEEP SOUTH**

Temp. 54° (1° above avg. north, 3° below south); precip. 5" (1" below avg. north, 1" above south). 1–3 Showers, cool. 4–10 Sunny, turning warm. 11–14 Showers, cool. 15–17 Snow north, rain south. 18–27 Rainy periods, cold. 28–30 Rainy, mild.

#### **REGION 9: UPPER MIDWEST**

Temp. 32° (3° above avg.); precip. 2" (1" above avg. east, 1" below west). 1–6 Sunny, mild. 7–10 Rainy periods, mild. 11–15 Snow, then flurries, cold. 16–26 Snow, then flurries, cold. 27–30 Snow showers, mild.

#### **REGION 10: HEARTLAND**

Temp.  $46^{\circ}$  (3° above avg.); precip.  $1.5^{\circ}$  (1" below avg.). 1-8 Rain, then sunny, turning warm. 9-15 Rain, then sunny, cold. 16-19 Snow, then sunny. 20-27 Rain to snow, then sunny, cold. 28-30 Showers, mild.

#### **REGION 11: TEXAS-OKLAHOMA**

Temp. 56° (1° below avg.); precip. 4" (1" above avg.). 1–3 Showers, then sunny, cool. 4–8 Sunny, warm. 9–14 A few showers, mild. 15–16 Snow north, rain south. 17–21 Sunny, turning warm. 22–30 Periods of rain and snow north, rain south; chilly.

#### **REGION 12: HIGH PLAINS**

Temp. 38° (2° above avg.); precip. 1.5" (0.5" above avg.). 1–7 Sunny, mild. 8–14 Rain and snow, then sunny. 15–23 Rain and snow showers, turning cold. 24–28 Snow, then flurries south, snow showers north. 29–30 Snowy, cold.

#### **REGION 13: INTERMOUNTAIN**

Temp. 40° (1° above avg. north, 1° below south); precip. 1.5" (avg.). 1–5 Rainy periods, mild. 6–9 Showers north, snow showers south. 10–12 Snow showers, cold. 13–15 Sunny, mild north; snow showers south. 16–20 Rain and snow showers north, sunny south. 21–27 Snowy periods, cold. 28–30 Rain to snow.

#### **REGION 14: DESERT SOUTHWEST**

Temp. 54° (2° below avg.); precip. 0.8" (0.2" below avg.). 1–7 Sunny; mild east, cool west. 8–17 Showers, then sunny, cool. 18–25 A few showers east, sunny west; cool. 26–30 Showers, chilly.

#### **REGION 15: PACIFIC NORTHWEST**

Temp. 47.5° (0.5° above avg.); precip. 7" (2" below avg. north, 3" above south). 1–6 Rainy, mild. 7–15 Showers, cool. 16–21 Rainy, mild. 22–24 Sunny, cool. 25–30 Rain, some heavy; turning chilly.

#### **REGION 16: PACIFIC SOUTHWEST**

Temp. 56° (2° below avg.); precip. 1" (0.5" below avg.). 1–3 Sunny. 4–6 Rainy, cool. 7–18 Sunny, cool. 19–30 Rainy periods, cool.

#### **REGION 17: ALASKA**

Temp. 1° N, 35° S (1° below avg.); precip. 0.4" N, 4" S (avg. N, 1" below S). 1–7 Snow showers, turning mild. 8–13 Flurries; turning cold WC, mild EW. 14–17 Snowy periods. 18–30 Snow showers, cold.

**KEY:** Panhandle (P), Aleutians (A), north (N), central (C), south (S), west-central (WC), east-central (EC), south-central (SC), elsewhere (EW)

#### **REGION 18: HAWAII**

Temp. 76.5° (1° below avg.); precip. 1.5" (5" above avg. E, 7" below W). 1–16 Rain and t-storms E, daily showers C+W; cool. 17–18 T-storms, heavy E. 19–30 Rain and t-storms E, scattered showers C+W; seasonable.

KEY: east (E), central (C), west (W)

AS NOVEMBER 21. SO IS THE WINTER.

### **CANADIAN FORECASTS NOVEMBER 2016**

#### **REGION 1: ATLANTIC CANADA**

Temp. 2°C (1°C below avg.); precip. 180mm (100mm above avg. north, avg. south). 1–6 Showers, mild. 7–12 Showers, mild north; flurries, cold south. 13–16 Rainy, mild. 17–25 Periods of rain and snow; mild north, cold south. 26–30 Snow showers, cold.

#### **REGION 2: SOUTHERN QUEBEC**

Temp. -2°C (2°C below avg.); precip. 60mm (20mm below avg.). 1–9 Rain to snow, then flurries, cold. 10–12 Sunny, mild. 13–19 Rain to snow, then flurries, cold. 20–24 Snowstorm, then snow showers, cold. 25–30 Flurries, then snow, cold.

#### **RÉGION 2: QUÉBEC DU SUD**

Temp. -2°C (2°C en-dessous de la moy.); précip. 60mm (20mm en-dessous de la moy.). 1-9 Pluie voire neige, puis rafales, froid. 10-12 Ensoleillé, doux. 13-19 Pluie voire neige, puis rafales, froid. 20-24 Tempête de neige, puis chutes de neige, froid. 25-30 Rafales, puis neige, froid.

#### **REGION 3: SOUTHERN ONTARIO**

Temp. 3.5°C (1°C below avg. east, 2°C above west); precip. 65mm (20mm below avg.). 1–4 Snow showers, cold. 5–8 Flurries, milder. 9–13 Rainy, mild. 14–20 Snow showers, cold. 21–26 Rain to snow, then flurries, cold. 27–30 Rain and snow showers.

#### **REGION 4: THE PRAIRIES**

Temp. 0°C (3°C above avg.); precip. 15mm (5mm below avg.). 1–5 Sunny, mild. 6–13 Rain and snow showers, mild. 14–16 Sunny, mild. 17–26 Snow showers, cold, then mild. 27–30 Sunny, mild east; snow showers, cold west.

#### **REGION 5: SOUTHERN BRITISH COLUMBIA**

Temp. 8°C (3°C above avg.); precip. 140mm (10mm below avg.). 1–8 Rainy periods, mild. 9–11 Snow north, showers south; cold. 12–20 Rain and snow showers north, rainy periods south; mild. 21–25 Sunny, mild. 26–30 Rainy, cool coast; snowy periods, cold inland.

#### **REGION 6: YUKON**

Temp. -21°C (avg.); precip. 23mm (2mm below avg.). 1-6 Snow showers, mild. 7-17 Flurries north, snow showers south; mild. 18-22 Snow showers, cold. 23-30 Flurries, mild, then cold.

#### **REGION 7: NORTHWEST TERRITORIES**

Temp. -16°C (avg.); precip. 17mm (3mm below avg.). 1–8 Flurries, cold, then mild. 9–13 Snow showers, cold. 14–21 Clear, cold north; snow showers, mild south. 22–24 Clear, cold north; snowstorm, mild south. 25–30 Flurries, turning cold.



# MORE OF . . . HOW WEATHER AFFECTS HISTORY

ost of us know that it was a change in the climate, caused by an extraterrestrial impact or a massive bout of volcanism, that led to the extinction of the dinosaurs, rise of the mammals, and, eventually, emergence of humans. But, since that time, weather and climate have also played a critical role in numerous events that have dramatically changed the course of human history. Here are—in my opinion—another 5 of the top 10 (we presented the first 5 last month):

# 1. 1812: NAPOLEON DEFEATED BY RUSSIAN WINTER

In 1812, Napoleon assembled the largest army Europe had ever seen, with more than 600,000 men, to attack Russia and add it to his empire. His soldiers quickly captured Moscow,

but as they marched away with their spoils, the severely cold Russian winter arrived, with temperatures dropping as low as 40 degrees below zero (in both Fahrenheit and Celsius—40 below zero is the temperature at which the two scales have the same reading). As many as 50,000 horses died from the cold in 1 day and only 150,000 of the soldiers made it back to France, the rest succumbing to the cold. It was the beginning of the end for Napoleon's empire, and heralded the emergence of Russia as a power in Europe.

#### 2. 1815: "THE YEAR WITHOUT A SUMMER" LEADS TO FAMINE, CHOLERA, BICYCLES, MORMONS, AND FRANKENSTEIN

Earth was experiencing the concluding decades of The Little Ice Age in a period of relatively low solar activity

from 1790 to 1830 known as the Dalton Minimum. May 1816 in particular had the lowest sunspot number (0.1) to date since recordkeeping on solar activity had begun. From April 5-15, 1815, (what is now) Indonesia's Mount Tambora produced the world's largest eruption since A.D. 180, which ejected immense amounts of volcanic ash into the upper atmosphere, where the jet stream carried it around the world. The result was a further reduction in solar irradiance that brought record cold to much of the world during the summer.

The unusual cold played havoc with agricultural production in many parts of the world, resulting in crop failures, dramatic increases in food prices, famines, cultural disruptions, and epidemics of cholera and other diseases. Rapid, dramatic temperature changes occurred frequently, as temperatures sometimes went from above-normal summer levels to near freezing within hours. U.S. grain prices at least quadrupled, and oat prices increased almost eightfold.

Elsewhere around the world, famine, riots, arson, and looting occurred in many European cities, while China suffered from massive crop failures and disastrous floods and a disruption in the Indian summer monsoon spread a cholera outbreak from a region near the River Ganges all the way to Moscow.

"The Year Without a Summer" also had cultural effects:

• The lack of oats to feed horses likely inspired German inventor Karl Drais to research new ways of







horseless transportation, which led to his invention of the precursor to the bicycle.

- Many Americans left New England for the Midwest, accelerating the westward movement of the American people. Vermont alone had as many as 15,000 people emigrate, including the family of Joseph Smith, who moved from Norwich, Vermont, to Palmyra, New York. This move may have made possible the publication of the Book of Mormon and the founding of the Church of Jesus Christ of Latter-day Saints.
- In June 1816, Mary Shelley was forced by the weather to spend her Swiss holiday indoors with her literary companions, where to pass the time they decided to have a contest to see who could write the scariest story. The result was the novel *Frankenstein*; or, *The Modern Prometheus*.

#### 3. 1588: WEATHER-FUELED DEFEAT OF SPANISH ARMADA PROPELS ENGLAND TO WORLD DOMINANCE

The defeat of the Spanish Armada in 1588 has been called one of the most decisive battles in Western civilization. In 1588, King Philip of Spain sent an armada to collect his army from the Netherlands, where they were fighting, and take them to invade England. However, the wind didn't cooperate with his plans.

After about 2 weeks of battle, the Spanish fleet had been badly damaged and began to make a retreat. As the Armada reached the latitude of Ireland, it encountered a major hurricane. Hammered by the wind and sea, at least 24 ships were driven ashore on the Irish coast, where many of the survivors were killed by Queen Elizabeth's troops.

The defeat of the Spanish Armada was the key event that propelled England to

become the world's dominant power for the next three centuries.

# 4. 1944: DIFFERENCE IN U.S. AND GERMAN WEATHER FORECASTS CRITICAL FOR D-DAY

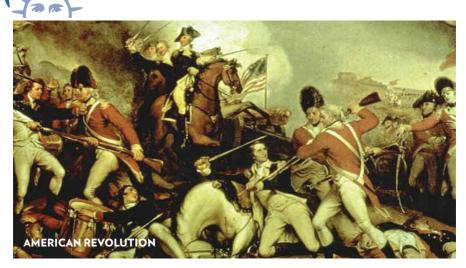
Perhaps the best known and most important weather-related event of World War II was Hitler's failed Russian invasion of 1941. He waited until June 22 to start the invasion, expecting a quick victory, but when Moscow held out until winter, the severe cold defeated Hitler just as it had defeated Napoleon more than a century earlier.

Less known, but also critical, was the influence of weather on the June 6, 1944, D-Day invasion of France across the English Channel that gave the Allied forces a crucial foothold in Europe, helping lead to Germany's defeat by the following May.

Critical decisions about when to send the Allied forces across the channel were based on weather forecasts compiled by Allied meteorologists, which predicted a break in the unfavorable weather on June 6.

In addition, the Allies had broken Germany's secret Enigma code, which enabled them to gather and use weather observations from German territories in making their forecasts, as well as to see that the Germans had forecast weather conditions to remain unsuitable for an Allied assault on June 6.





This gave the Allies' meteorologists extra information to advise that conditions would be marginal but sufficient to launch the invasion.

#### 5. 1776: FOG ALLOWS WASHINGTON TO AVOID DEFEAT, KEEP AMERICAN REVOLUTION ALIVE

The American Revolution almost ended with defeat by the British in the summer of 1776, when Gen. George Washington was leading 19,000 troops in the defense of New York City in the summer of 1776 after the British had increased their troops on Staten Island to 40,000.

Not sure where the British would attack, Washington left half of his forces in lower Manhattan and moved the rest to Brooklyn and Queens. On August 27, the British began an attack on Washington's Brooklyn and Queens positions, charging the American defenders with overwhelming force.

Under the cover of darkness and with the help of some locals, the Americans managed to slip away unnoticed to Manhattan via the East River, with General Washington himself one of the last to retreat to safety. The British, stationed only a few hundred yards away, were totally unaware of the movement because of a dense fog that had formed in the early hours of the morning.

If not for that fog, Washington likely would have been captured and the American Revolution would have ended in defeat, with its leaders hanged as traitors.

-Michael Steinberg, Old Farmer's Almanac meteorologist



# **HUMOR ME**

**GRINS AND GROANS FROM THE ALMANAC** 



**Great True Headlines from History** 

- **1.** Astronaut Takes Blame for Gas in Spacecraft
- **2.** Hospitals Sued by 7 Foot Doctors
- **3.** Police Begin Campaign to Run Down Jaywalkers
- **4.** Panda Mating Fails; Veterinarian Takes Over
- **5.** War Dims Hope for Peace
- **6.** Juvenile Court to Try Shooting Defendant
- **7.** Something Went Wrong in Jet Crash

- **8.** New Study of Obesity Looks for Larger Test Group
- **9.** Cold Wave Linked to Temperatures
- **10.** Typhoon Rips Through Cemetery; Hundreds Dead

#### THE CORNIEST BAR JOKE OF ALL TIME

A man walks into a bar with a slab of asphalt under his arm and says, "A beer, please, and one for the road."



# WHAT CERTAIN WORDS REALLY MEAN

Straight from *The Washington Post's* Mensa Invitational, some alternate meanings that you can feel free to use!

**COFFEE**, **NOUN**: the person upon whom one coughs

**ESPLANADE**, **VERB**: to attempt an explanation while drunk

FLABBERGASTED, ADJ.:

appalled by discovering how much weight one has gained

#### FLATULENCE. NOUN:

emergency vehicle that picks up someone who has been run over by a steamroller

#### **NEGLIGENT. ADJ.:**

absentmindedly answering the door when wearing only a nightgown

**TESTICLE**, **NOUN**: a humorous question on an exam

OYSTER, NOUN: a person who sprinkles his conversation with





BACK BY POPULAR DEMAND ...

## MORE HOW TO BECOME A PERMANENT JOB SEEKER

Honesty is good, but sometimes discretion would have been better—as evidenced by these true quotes from job interviews.

- "I'm really not a big learner. I'd much rather work at a place where the job is pretty stagnant and doesn't change a lot."
- "My parents told me that I need to get a job, so that is why I'm here."
- "I saw the job posted on Twitter and thought, Why not?"
- "What is two weeks' notice? I've never quit a job before—I've always been fired."
- "If this doesn't work out, can I call you to go out sometime?"

#### 19TH-CENTURY NONSENSE:

# Spotted: A Pun

Two scholarly gentlemen were dining when one noticed a spot of greasy gravy on the other's tie.

"Ah, I see you are Grecian," said the observer.

"Pooh!" replied his companion. "Now, that's far-fetched!"

"Not at all," the first responded. "I made it up on the spot."



# **See the Northern Lights with** *The Old Farmer's Almanac!*

Join us in Alaska to see the aurora borealis from February 26–March 3, 2017.

Led by the Almanac's astronomy editor, Bob Berman,
this 6-day, 5-night adventure promises to be the trip of a lifetime.

#### By night, behold the blazing and magical curtains of light. By day, tour Alaska!

Highlights include:

- · accommodations, most meals
- luxury bus transport in Alaska
- Museum of the North, University of Alaska Fairbanks
- · World Ice Art Championships

- dog sledding
- hot springs pool
- astronomy lectures
- photography tutorial
- · optional train tour
- and much, much more!









**Space is limited! For details and reservations, call 845–901–7049.** 





# WHAT'S NEXT



All about orchids



Full Cold Moon,
Indiana statehood, first
radio broadcast, where did
"calendar" come from?



LIVING NATURALLY Ward off winter colds



**ASTRONOMY** Explore with our Sky Map



**FOOD**Homemade holiday gifts from the kitchen



ANNIVERSARY
More moments
from the Almanac
history timeline

**PLUS:** Weather Update • U.S. and Canadian weather forecasts • Best Days to Do Things • Gardening by the Moon's Sign • • Humor • and much more in the December *EXTRA!*