



photo by G. Lamar

## Flashing Lightning

Last week we learned about tornadoes. Another element of storms that you might notice — and it's hard not to since it lights up the sky — is lightning. The Mini Page takes a look at lightning this week.

### Formation

Lightning is a strong blast of electricity that occurs in a flash of a second during a thunderstorm. It's basically a large electrical spark that starts in the sky.

A bolt of lightning can be 5 miles long! Since light travels faster than sound, you might notice that you'll see a flash of lightning before you hear the thunder that accompanies a storm.

Among the factors that make lightning visible are dust and moisture. Did you know lightning bolts often appear white, but based on atmospheric conditions, we can also see them as blue, violet, red, orange, green or yellow.



photo by Anton Pinchuk

### Distance

Sometimes people count the seconds between a flash of lightning and a boom of thunder to determine how far a storm is from their location. If you divide the number

of seconds you count between the flash and thunder by 5, some say you'll get an estimate of how many miles the storm is from you.

### Power

According to the National Weather Service, the average flash of lightning is about 300 million volts and 30,000 amps. To give you an idea of how powerful that is, one flash of lightning could power a 100-watt lightbulb for three months.

### Fast facts

The location that is struck by lightning the most is Lake Maracaibo in Venezuela. Residents there can see as many as



photo by Andrew Knapp

40,000 lightning strikes per night. There are more than 3 million flashes of lightning around the world every day. That's 44 strikes every second!

During the 1700s, people believed that ringing church bells would drive off lightning. During storms, **bell ringers** would go to work, ringing their bells until the lightning and thunder stopped.

The width of a lightning bolt is only 2 to 3 centimeters! That's about the size of a grape, penny, walnut or slice of banana.

The Mini Page® © 2022 Andrews McMeel Syndication

## Try 'n' Find

Words that remind us of lightning are hidden in this puzzle. Some words are hidden backward or diagonally, and some letters are used twice. See if you can find:

AMPS, BELLS, BOLT, COLOR, DUST, FLASH, FULGURITE, LIGHTNING, MOISTURE, QUARTZ, SAND, SILICA, STORM, STRIKE, THUNDER, VENEZUELA, VOLTS, WORLD.

N	P	S	G	B	V	H	S	A	L	F	F	X	T	T
A	E	L	N	L	O	D	T	I	V	O	U	A	H	T
S	R	L	I	M	L	T	O	C	R	G	L	X	U	L
T	U	E	N	R	T	S	R	G	A	E	G	N	N	O
R	T	B	T	S	S	U	M	C	U	R	U	Y	D	B
I	S	B	H	S	N	D	I	Z	A	N	R	D	E	R
K	I	O	G	I	A	L	E	K	M	X	I	L	R	O
E	O	Z	I	L	I	N	O	S	P	D	T	R	V	L
R	M	F	L	S	E	M	D	N	S	I	E	O	Q	O
P	A	U	B	V	K	Q	U	A	R	T	Z	W	L	C



## Cook's Corner

### Easy Tomato Salsa

#### You'll need:

- 1 (28-ounce) can diced tomatoes
- 2 cups roughly chopped cilantro
- Juice from 1 lime
- 1/2 medium onion, chopped (optional)

- 1 medium jalapeño pepper, chopped and seeds removed (optional)
- Tortilla chips



\* You'll need an adult's help with this recipe.

#### What to do:

1. Place all ingredients (except chips) in a blender.
2. Blend until well-mixed.
3. Chill and serve with tortilla chips.

1. To shine or briefly give off bright light (5-letter verb)

□ □ □ □ □

2. Strikes or discharges of lightning (5-letter plural noun)

□ □ □ □ □

3. Possible harm or injury that can be avoided (6-letter noun)

□ □ □ □ □ □

4. A form of energy in nature (8-letter adjective)

□ □ □ □ □ □ □ □

1. Marcel saw lightning \_\_\_\_\_ above the tall treetops.
2. Three \_\_\_\_\_ of lightning struck during the storm.
3. One \_\_\_\_\_ of lightning is igniting a fire.
4. The \_\_\_\_\_ force of lightning lit up the dark sky.

©2022 Cassius One LLC --- www.myvocabulary.com

ROOTONYM®  
by Jan & Carey Orr Cook



Study the definition. When you know the missing word, fill in the letter boxes and the sentence blanks.

Answers: Flash, Bolts, Danger, Electric.

## Fulgurite

When lightning strikes an area full of sand that is high in the compound **silica** (quartz), it leaves behind something rare: a **fulgurite**, or a unique formation of sand fused together by the heat of the blast. Fulgurite gets its name from *fulgur*, which is the Latin word for "lightning."

The National Park Service describes the formation of fulgurites at the Great Sand Dunes National Park and Preserve in Colorado this way:

"Lightning blasts the sand, vaporizing the area where the

bolt of electricity shoots through the sand and melting the surrounding sand into dark glass."

The lightning striking the sand is 50,000 degrees Fahrenheit — hotter than the sun's surface!

The size of a fulgurite depends on the strength of the lightning bolt and the thickness of the bed of sand it strikes. Fulgurites are most often white or black in color.



photo courtesy Endoplasmy

This fulgurite was found in Michigan.

## Resources



### On the Web:

- [bit.ly/MPLighting](https://bit.ly/MPLighting)

### At the library:

- "National Geographic Readers: Storms!" by Miriam Goin
- "Lightning (Smithsonian-science)" by Seymour Simon

## Mini Jokes



**Lark:** What did one lightning bolt say to another lightning bolt?

**Lil:** "You're shocking!"

## Eco Note



New research suggests that the movement of water between the clouds, land and ocean due to climate change has intensified at twice the rate earlier predicted. Writing in the journal *Nature*, scientists say that rising global temperatures have been making this process more extreme, with water moving away from dry regions toward wetter ones. This is driving more severe droughts in some areas while amplifying heavy rainfall and the resulting flood disasters in others.

adapted with permission from Earthweek.

## For later:

Look in your newspaper for articles about lightning.

**Teachers:** Follow and interact with The Mini Page on Facebook!



The **NEW Mini Spy Booklets** volumes 4 and 5! Features 48 of your favorite puzzles from The Mini Page! Volumes 1, 2 and 3 are still available!

Help Mini Spy and other classic characters from The Mini Page find hidden objects from a list of clues.

The 8.5x11-inch booklet is just \$5, plus \$1 each for shipping and handling.

Visit **MiniPageBooks.com**, or call **844-426-1256** for more information.

Mail payment to:  
Andrews McMeel Universal,  
Mini Page Books,  
1130 Walnut,  
Kansas City, MO 64106.

