

WIND

How fast is the wind blowing?

You can estimate the wind speed by observing what's moving and by using a chart called the **Beaufort Scale**.



What direction is the wind coming from?

You can estimate which direction the wind is coming from by observing ripples on the water, feeling the wind on your face, or by using a **wind sock**.

Beaufort Number	Wind Speed (miles per hour)	Term	Effects on Land
0	Under 1 mph	Calm	Calm, smoke rises vertically
1	1–3 mph	Light Air	Smoke drifts
2	4–7 mph	Light Breeze	Wind felt on face, leaves rustle
3	8–12 mph	Gentle Breeze	Leaves, twigs in constant motion
4	13–18 mph	Moderate Breeze	Dust, leaves raised up, small branches move
5	19–24 mph	Fresh Breeze	Small trees sway
6	25–31 mph	Strong Breeze	Large branches in motion
7	32–38 mph	Moderate Gale	Whole trees in motion
8	39–46 mph	Fresh Gale	Twigs and small branches broken
9	47–54 mph	Strong Gale	Slight structural damage occurs
10	55–63 mph	Whole Gale	Trees and structures broken
11	64–72 mph	Storm	Widespread damage
12	73 or higher	Hurricane	Extreme damage and destruction of structures

This weather journal is intended as a supplemental activity for students taking Cumberland Island National Seashore's distance learning Weather class. This program was made possible by a grant from the National Park Foundation through generous support of partners including Union Pacific Railroad and donors across the country. Revised February 2021.

Fold me!



Cumberland
Island
National
Seashore

WEATHER JOURNAL

Name: _____

TEMPERATURE

How hot or cold is it?

You can estimate the temperature by observing how it looks and feels outside.

1. Guess if it's warm or cold without going outside.
2. What are people wearing? Jackets? T-shirts? Boots? Flip-flops?
3. Go outside and see how warm or cold it feels. Can you see your breath? Do you start to feel sweaty or like you need a drink of water?
4. Measure the actual temperature with a **thermometer**.

AIR QUALITY & HUMIDITY

How does the air feel and smell?

It is **humid** if the air feels sticky. If the humidity levels are high, the air is holding a lot of moisture and can't absorb more. The air feels wet or damp on your skin.

If the air feels **dry**, the humidity is lower, but it can never be zero!

If the air smells like **earth**, dirt, or compost, it may indicate that rain is coming soon.

If the air smells like **smoke**, there may be a fire nearby. Be careful!

PRECIPITATION

Precipitation can be in the form of **rain**, **snow**, **sleet**, or **hail**.

Is it raining? Has it rained in the last 24 hours? Are there puddles of water outside? How long did it rain for?

You can measure how much it rained using a **rain gauge**. They gather rain or other precipitation over a period of time, which tells you how much rain fell. You can even make your own rain gauge at home! The average yearly rainfall in Georgia is 48 inches!

Is there snow? Does the snow accumulate or does it melt?

If it **accumulates** (grows), the ground is freezing or colder.

If it **melts**, the ground is warmer than freezing.

CLOUDS

Do you see any?

Sometimes clouds look like animals...but they can also tell you about the weather!

Cumulus (puffy)

These clouds are usually out on sunny, clear days. If they are very tall and grey, they can indicate a storm is coming.

Cirrus (thin, curly)

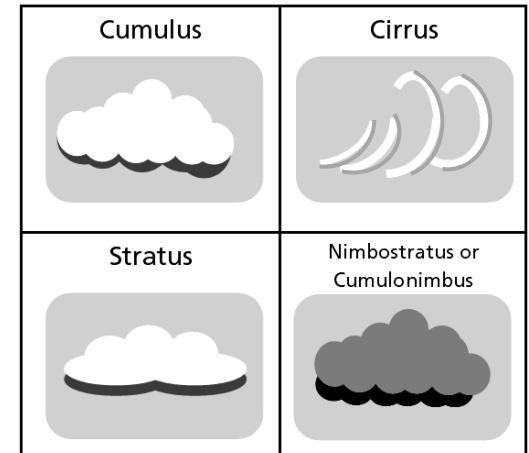
These clouds mean calm weather. If more appear, a storm may be coming.

Stratus (flat)

These clouds mean drizzle, light rain, or snow is coming.

Nimbostratus or Cumulonimbus (thick, grey)

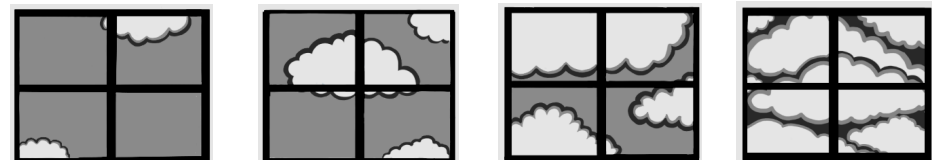
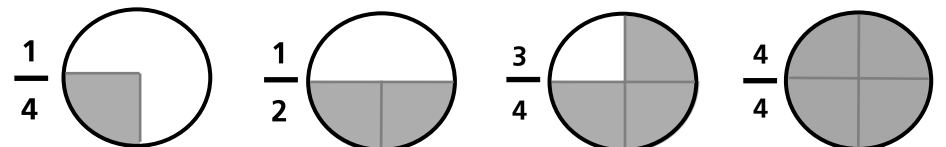
These clouds mean there is a large chance of severe weather or thunderstorms.



Cloud Cover

How much of the sky is covered in clouds?

Cloud cover can be estimated by using a fraction of how much the whole sky is covered by clouds (If you can't see the sky, this is maximum cloud cover). 0 (zero, 0%) means that there is no visible cloud in the sky. 1/4 (one-fourth, 25%) means there is mostly open sky, with clouds covering a small portion of the sky. 1/2 (One-half, 50%) means half the sky is covered in clouds, and half is open sky. 100% cloud cover means no clear sky is visible.



DATA COLLECTION

Scientists collect weather data over time to find patterns and predict future weather.

Date: ____ / ____ / ____

Time: _____ a.m. / p.m.

	Your Location	Cumberland Island
Temperature:		
Air Quality:		
Precipitation:		
Type of Clouds:		
Cloud Cover (fraction):		
Wind Speed:		
Wind Direction:		

Draw a picture of what it looks like outside!

Predict what the weather will be like tomorrow...

Was your prediction from yesterday correct?

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