

# Air and Atmosphere



Photo by Linda Huber



Photo by Matias Pinasco



Photo by Enrica Bressan



Photo by Mohamed Riffath

photos from freeimages.com

**What we call air is a small part of the atmosphere. The atmosphere is like a blanket that makes our Earth habitable, because it keeps the air (the gases we need to breathe) from disappearing into space.**

## Think about it!

Imagine if you sat in your car, with the windows closed on a sunny day. Pretty soon the inside of the car gets very hot. If the car was totally sealed eventually you would use up all the oxygen in the car and you wouldn't be able to breathe.



Photo by Herman Hooyschuur

## Rainforests

God has gifted us with rainforests - some have named them the 'lungs of the earth'. "Rainforests produce about 20% of our oxygen and store a huge amount of carbon dioxide, reducing the impact of greenhouse gas emissions" says National Geographic. People who live near the rainforest need the world's help to survive, so the rainforests can be protected. Learn more here <https://www.nationalgeographic.org/encyclopedia/rain-forest/>

God created a perfect environment for us to live in (along with a variety of creatures). Humans and animals use oxygen and release carbon dioxide. Plants, like trees in the forest and algae in the ocean, use carbon dioxide and release oxygen. This delicate balance that God created can be disturbed by us. When we pollute, it makes the atmosphere trap heat and the planet heats up. This is like being in that sealed up car. We need to produce fewer harmful gases and make sure we protect the plants that help clean our air.

Gn 2:7

...then the LORD God formed the man out of the dust of the ground and blew into his nostrils the breath of life, and the man became a living being.



Photo by Rick Hawkins

Virtual visit to a rainforest  
<https://www.calacademy.org/exhibits/osher-rainforest>

## Pollution

Check out what Bill Nye the Science Guy has to say about pollution here  
<https://www.billnye.com/the-science-guy/pollution>

- Pollution makes air, land, and water unclean.
- Pollution is made by humans.
- Humans can change the amount of pollution they make.

## For Reflection

What have you learned from the pandemic? Some say "I consume less". Others say "I don't do so many errands". What have you noticed in your family's lifestyle? Can you travel less, walk more, consume less, waste less, ... Also, what can you do to help others make choices like these.

# snack ideas



## Rainy days

Clumps of whipped cream with blueberry raindrops

<https://www.pinterest.com/pin/225180050090835064/>



Photo by Yicel Tellici

## Glaciers

Freeze ice cubes with fruit inside and put them in sparkling water. When the ice cubes melt, you have glacial erratics. What's that? See more here at the National Snow and Ice Data Center

<https://tinyurl.com/ybr2jlxg>



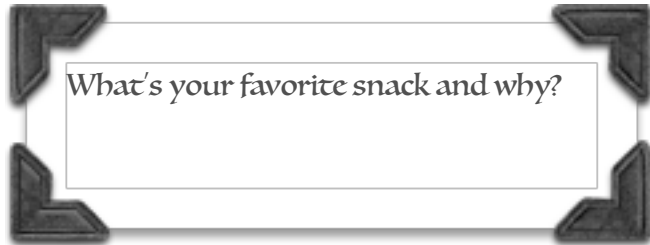
## Cupcakes with cloud frosting

<https://www.pinterest.com/pin/498210777524448411/>



## Making marshmallows

<https://tinyurl.com/y8ne9ysd>



*May the God of hope fill you  
with all joy and peace in believing,  
so that you may abound in hope  
by the power of the holy Spirit.  
Rom 15:13*

Don't forget to make s'mores  
with your marshmallows.

## Music

Enjoy some music that makes you think of the air and the atmosphere.



*This is the air I breathe* - Michael Smith

<https://tinyurl.com/yb4qu5os>

*Touch the Sky* - Hillsong United

<https://www.youtube.com/watch?v=y1RQciil7B0>

### Laudato Si quote

Young people demand change. They wonder how anyone can claim to be building a better future without thinking of the environmental crisis and the sufferings of the excluded. #13

## activities



See how things disperse through the air. Try this - Spray air freshener or perfume or burn a scented candle and observe how the scent travels in the room.

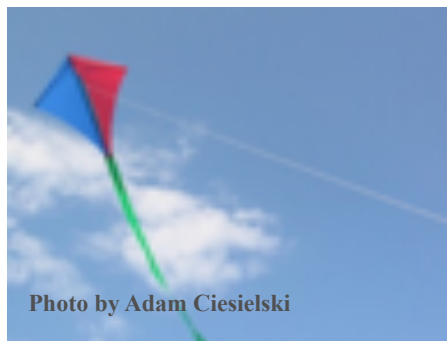
Clouds are constantly new and unique, reflecting God's creative energy. Try this - looking at the sky - what types of clouds do you see? You can look up cloud images on the link below to help you identify them. Try comparing them on different days. What do you notice?

<https://tinyurl.com/ydeanoa2>

More science ideas about the atmosphere

<https://tinyurl.com/ybf8xvgf>

## crafts that play with air



Make a kite and fly it - <https://tinyurl.com/y8srf7nk>

Boat races in a kiddie pool or bathtub - link to directions on how to make Origami boats  
<https://tinyurl.com/yabagptr>

Making musical instruments - how many things can you make a sound with, by breathing on or into them - blade of grass, straw with holes, tap a coffee can, blow over the top of a bottle, popsicle sticks rubber banded with wax paper between them...

Make a pinwheel - use your breath to show how air works

<https://tinyurl.com/odb9s>



Make bubbles and watch them float - Bubble recipe from DIY Network

<https://tinyurl.com/yb54lz6v>

Airplanes - make and fly a paper airplane <https://tinyurl.com/ybru5kr8>

### Conversation starters

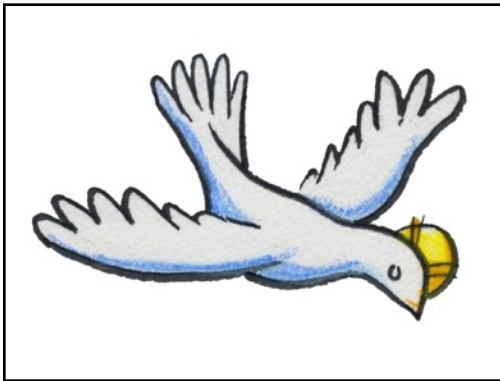
Have you ever run so hard and long that when you stop it is hard to catch your breath? Or have you ever tried to hold your breath under water? What was that like?

When babies are born, the first thing the doctor or midwife wants to make sure of, is that the baby can breathe. In Scripture we hear that Jesus breathes on the Apostles and then says, be not afraid. Why do you think he says that?

What ways do you use your breath? (i.e. blowing bubbles) How many ways can you find that you use your breath for?



## The Holy Spirit



**Think about it!** The Holy Spirit, the third person of the Trinity, has many names and images - Ruah, breath, fire, wind, .... We hear Jesus, in Acts chapter 1, tell us how the disciples will be baptized with the Holy Spirit who will bring power to be Christ's witnesses.

### For Reflection

Next time you feel the wind, imagine the Holy Spirit pouring over you to give you courage and strength, and all the gifts of the Holy Spirit - wisdom, understanding, knowledge, fortitude (courage), right judgment (counsel), reverence, fear of the Lord (awe). Read more here at Loyola Press.com <https://tinyurl.com/y8hf5gnc>

### Snack Idea

Fruit kabobs- pick seven fruits like banana, pineapple, apple, strawberry, orange, blueberries, peaches, etc. and put them on a skewer to create your Fruits of the Spirit kabob. Which fruit do you think goes with each gift?

### Prayer with the Holy Spirit

We know God is with us, whether we think of God or not. We can feel God's presence more when we pray. One way to pray is to relax using a prayer that focuses on our breathing. It's called square breathing. Slowly breathe in to a count of 4, hold your breath for a count of 4, slowly breathe out to a count of 4 and again hold your breath for a count of 4. Sometimes when you relax, it can remind you that God is with you. You can also use the words 'Come...Holy...Spirit....Come' for each step of the square breathing. Be still and quiet and listen for the Holy Spirit as you practice this prayerful breathing. How do you feel when you pray this way?

### Make friends with a Saint




#### Our Lady of Loreto, the patron saint of aviation



Image from Our Lady of Loreto church in Cold Spring, New York

Our Lady of Loreto is the patron saint of pilots, airmen and women, and flight attendants. This connection has to do with The Holy House (the house of Mary and Jesus where the Word of God became flesh). It is said to have been transported to a hill in Loreto, Italy. The legend says it was moved by angels, but some research says it was moved there by the Angeli Family. Loreto is one of the most famous Marian shrines in Italy. Read more here <https://udayton.edu/imri/mary/o/our-lady-of-loreto-and-aviation.php>

#### Symbol Code Key

-  Early Child/Toddler
-  Elementary
-  Middle School-Adult



*Resource created by the Diocese of Monterey, Department of Catechetical Ministries*