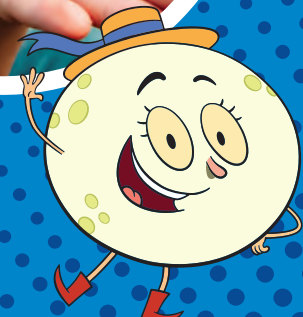




SUMMER!

FUN ACTIVITY BOOK



**UPPER
ELEMENTARY**

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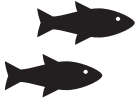













Week 6: Great Lakes

July 24-30

Dive in and explore the lakes that make Michigan special. Our featured careers this week are meteorologist, oceanographer, and water chemist. Scan the QR code or visit MichiganLearning.org/Summer/Lakes to explore all of our videos this week.

Use the sheet below to mark off this week's activities as you complete them. See if you can get a BINGO! Some of them are in this book, and some ask you to use your imagination or go outside.



 Go fishing	 60 mins. of activity	 Read for 20 minutes	 Watch the sunset	Make a pond viewer
 Read for 20 minutes	Watch Story Pirates	Name all 5 Great Lakes	Design a boat or ship	 60 mins. of activity
 60 mins. of activity	Draw an underwater world	 HAVE FUN! (Free Space)	Watch BeLEAF It or Not	 Read for 20 minutes
Watch Curious About Careers	 Go swimming	List careers that work in or near water	Watch InPACT at Home	 Play in the rain
Watch InPACT at Home	 Read for 20 minutes	 Watch the sunrise	 60 mins. of activity	Watch Live From the Opera House



A POND WITH A VIEW

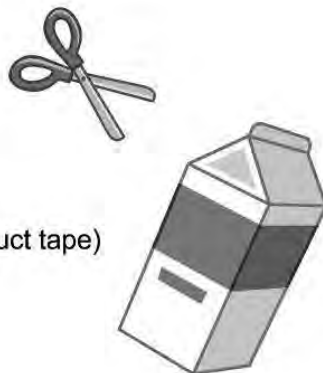
DIFFICULTY: EASY

While there is action all around a pond, what do you think is happening *in* the water? Ponds are filled with animal and plant life that have special qualities that help them spend all or most of their lives underwater. Make this pond viewer to bring on your next pond exploration!



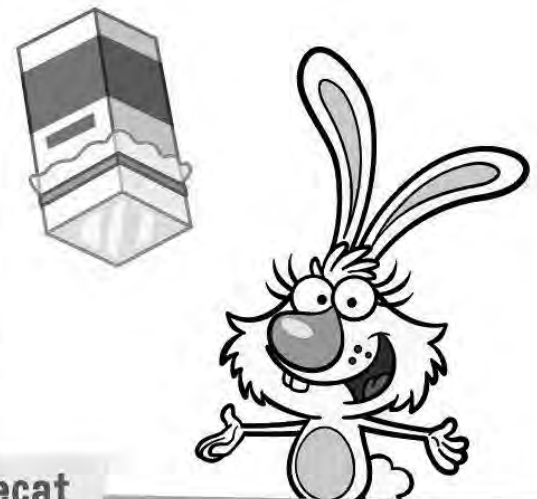
MATERIALS

- One-half gallon milk carton
- Scissors
- Waterproof, strong tape (e.g. duct tape) or a sturdy rubber band
- Heavy, clear plastic wrap



LET'S MAKE A POND VIEWER!

- 1 Have an adult cut off the very top of the milk carton and the very bottom to create a rectangular tube.
- 2 Tear off a sheet of plastic wrap and place it over one of the open ends. Fold down the plastic wrap... make sure wrap is smooth and tight for clear viewing.
- 3 Using the tape or the rubber band, secure the plastic wrap in place. Keep the plastic wrap as tight as possible so you have a flat viewing surface.



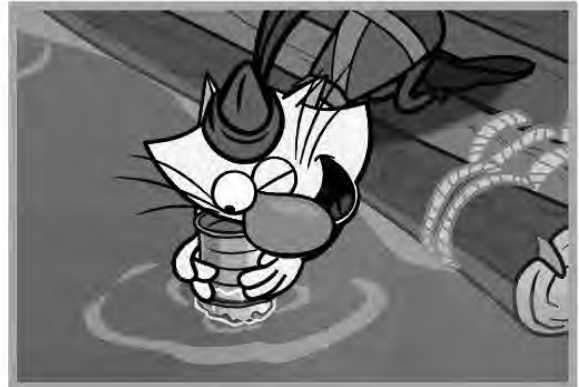
pbskids.org/naturecat

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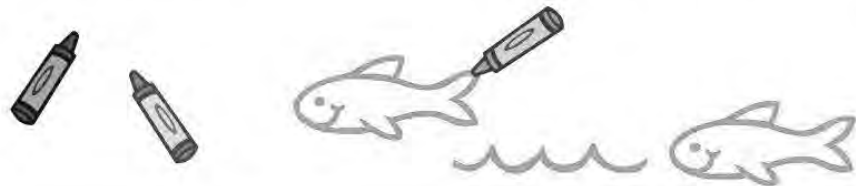
POND VIEWING TIPS

- 1 Splashing and stirring up mud will make it difficult to see into the pond. Be as still as possible when using your viewer.
- 2 Despite what NatureCat says, it is noble and fun to get wet! If the shoreline is murky, slowly wade out to your knees before using your viewer where it may be less murky.
- 3 Other ways to view: on a dock, over the side of a canoe, or in a stream, lake or tide pool!



LET'S TAKE A CLOSER LOOK

Describe a plant or animal that you see. Draw a picture of it, and ask an adult to help you identify and label your picture.



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DIALOGUE PRACTICE

A hero story needs lots of interesting dialogue. You want the reader to be able to hear it when your hero gives an inspiring speech, or whispers a secret plan, or makes a cool snappy comment. Practice writing some dialogue for your hero that you might put into a story later! For more ideas and information, watch our Hero Stories videos at storypirates.com/storypiratesuniversity.

Write some dialogue here. Use quotation marks, and check out the next page for some words you could use instead of “said”.

You can also draw your hero in an exciting scene, and add a speech bubble for what they’re saying.

DIY Bouncy Ball Recipe



FUN FACT

Bini the Bunny holds the world record for the most basketball slam dunks in one minute by a rabbit. Bini made 7 dunks in just 60 seconds! Now that's one bouncy bunny!

MATERIALS

Ball mixture

- Glue
- Cornstarch
- Food coloring
- Mixing bowl
- Measuring spoons

Borax Bath

- Borax
- Warm water
- Mixing bowl

DIFFICULTY



Why did the bucket bounce?

*Answer on the next page

POLYMERS

Polymers are large molecules made from bonded (chemically linked) groups of similar atoms. The word polymer is Greek for "many parts." Polymers are made of many monomers (Greek for "one part"). A polymer is a chain of linked monomers. Polymers can be found all around us: bicycle tires, plastic plates, strands of our hair, and even super duper bouncy balls!

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DIY Bouncy Ball Recipe

EXPERIMENT

- Step 1:** Create a Borax bath by mixing together 2 Tbsp Borax into 1 cup of warm water in a mixing bowl.
- Step 2:** Create your ball mixture by mixing together 1 Tbsp cornstarch with 2 Tbsp of glue. If you want your ball to be colored, add food coloring and mix together in another bowl.
- Step 3:** Carefully drizzle your ball mixture into your Borax bath. Allow it to sit in the bath for 15-20 seconds. Stir and make sure that all parts of the mixture have been activated by the Borax bath (should feel firm).
- Step 4:** Remove your ball mixture from the Borax bath and form into a ball shape. A measuring spoon can be used as a guide to help shape your ball. Place your ball back into the Borax bath for 60 seconds.
- Step 5:** Be sure to wash your hands after handling the Borax bath.
- Step 6:** Try bouncing and testing your ball!



WHY IT WORKS

You are seeing a chemical reaction right before your eyes during this experiment. The glue is a polymer and the Borax links together the molecule chains of the glue. The cornstarch helps to thicken the mixture, allowing it to be formed and hold a ball-like shape. Although you can't see the molecules linking in the chemical reaction, we know a chemical reaction has taken place because our ingredients have combined to create a new item!

EXTEND YOUR LEARNING

- What happens if you changed the amount of cornstarch or glue used in the recipe? Could you make a larger ball?
- Does your bouncy ball behave differently if chilled in the freezer?
- Could you separate your recipe and use different food coloring to make a multi-colored ball?

WORKFORCE CONNECTION

A geneticist is a biologist who studies genetics, the science of genes, heredity, and variation of organisms. The genes they study are made of polymers called DNA. Two long strands of these polymers form the familiar double helix shape of DNA. The monomers that make up DNA strands are called nucleotides. Geneticists study the genes of organisms like human beings, animals, crops and bacteria.

it's Storytime CHALLENGE

Build a boat that can float for 3 minutes.



What other materials could you find and use?

- Cardboard
- Paint Stirrers
- Paper/Newspapers
- Drinking Straws
- Tree Bark
- Tennis Balls
- Styrofoam
- Balloons
- Plastic Shopping Bags
- Popsicle Sticks
- Rubber Bands
- Tape/String/Glue
- Ruler
- Wax Paper/Aluminum Foil



ASK

▶▶▶ What is the problem?



IMAGINE

▶▶▶ Brainstorm possible solutions.



PLAN

▶▶▶ Pick an idea and plan out how you are going to do it.



CREATE

▶▶▶ Build it!



IMPROVE

▶▶▶ What worked? What didn't?
▶▶▶ How can you make it better?



SHARE

▶▶▶ Share your idea!

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Meet Up and Eat Up provides FREE nutritious meals for children and teens 18 years and younger.

HOW DO I SIGN UP?

No application or sign-up needed, just come and join us!

WHERE IS IT?

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Visit: www.michigan.gov/meetupeatup

Call: 211

Text: Food to 304-304

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