

Lesson 2: What Is Geography?

☐ Getting Started

You may not think about geography very often, but it is a part of your life every day. **Geography** is the study of the physical features of the world we live in and the ways in which we, as humans, interact with, change, and are influenced by those physical features. Any time you look at a map, give directions, or figure out the best way to get to a friend's house, you're using geography! In this lesson, you'll learn some geographical terms and create your own representations of the Earth.

Stuff You Need

- *The Geography Book: Activities for Exploring, Mapping, and Enjoying Your World* by Caroline Arnold
- card stock paper or a file folder
- glue
- large orange (a type that peels easily)
- permanent markers
- piece of heavy paper (such as a file folder)
- plastic knife or butter knife
- round balloons (blue is best)
- scissors
- scissors (optional)

Ideas to Think About

- What is geography, and why is it valuable?
- How can the physical environment be represented visually, and how might different kinds of representations be useful?

Things to Know

- **Geography** is the study of the physical features of the earth and the ways in which humans both change and are influenced by the world around them.
- Maps can represent the physical world in a variety of different ways.
- Know the definitions of the following terms: **physical geography, human geography, equator, latitude lines, longitude lines, Prime Meridian, globe, scale, and cartography.**

☐ Reading and Questions

Read page 1 of *The Geography Book: Activities for Exploring, Mapping, and Enjoying Your World* by Caroline Arnold. Then read pp. 5-7. You can follow the "Star Directions" once it is very dark, and the stars are out. Answer the following questions:

1. What is geography?

2. How does physical geography differ from human geography?

3. Describe at least one way that you or your family have used geography or the tools that geographers use in the past month.

4. Describe what you see when you look out a window in your home, paying special attention to the kinds of things a geographer might find interesting - landforms, natural resources, plants, weather, and evidence of the ways in which humans have interacted with their environment.

5. What is the imaginary rod that runs from the North to the South Pole?

6. If you live in the northern hemisphere, how can you figure out which direction is north?

Activities

☐ Activity 1: Vocabulary Matching

Ask a parent whether you should follow Option 1 or Option 2 for this activity.

Option 1

Find the activity page labeled "Vocabulary Matching: Set 1." Cut out the twenty vocabulary cards and shuffle them thoroughly. Place them face down in four rows of five cards each. Turn over two cards at a time, and if you have chosen a vocabulary term and a definition that match each other, place them in a pile to the side. You'll know for sure that you have a match if you see that the symbols on your two cards (for example, a star or a circle) match each other. If you choose a pair of cards that do not match, return them face down to their original places. Continue until you have matched all ten pairs. If you like, use a watch to time yourself and see how quickly you can match the pairs, or challenge a sibling or parent to take turns playing and see who can collect the most pairs.

Once you have successfully found all of the matches using Set 1, you may want to challenge yourself by playing the same game with Set 2, which does not have any symbols to indicate the correct matches.

*Note: Hold onto the cards from this activity because you will need to study the vocabulary terms for the end-of-unit test.

Option 2

Find the activity page labeled "Vocabulary Matching: Set 2." Cut out the twenty vocabulary cards and shuffle them thoroughly. Place them face down in four rows of five cards each. Turn over two cards at a time, and if you have chosen a vocabulary term and a definition that match each other, place them in a pile to the side. Use the glossary of *The Geography Book: Activities for Exploring, Mapping, and Enjoying Your World* to look up any unfamiliar terms. If you choose a pair of cards that do not match, return them face down to their original places. Continue until you have matched all ten pairs. If you like, use a watch to time yourself and see how quickly you can match the pairs, or challenge a sibling or a parent to take turns playing and see who can collect the most pairs.

You can use the glossary at the back of *The Geography Book* to look up definitions. You may notice that the definitions on the cards are not always exactly the same as the definitions in the book. Different authors sometimes define terms differently, but the definitions should convey similar information. If you can't find a word in the glossary, you can look it up in a dictionary online. You'll probably find that the

definitions look a little different if you look up the same word in two or three different dictionaries!

NOTE: Hold onto the cards from this activity because you will need to study the vocabulary terms for the end-of-unit test.

☐ **Activity 2: Making a Balloon Globe**

One way that cartographers represent our Earth is with a globe — a round, three-dimensional model of how the Earth might look from space. In this activity, you'll make your own homemade globe.

Read pp. 15-16 in *The Geography Book*, which will tell you a little bit about the history of maps and mapmaking. Then complete the activity called "The Earth is Round" on pp. 17-18. You'll be using a balloon to create a model globe.

You may find it helpful to consult a globe or a world map as you create your model. You can also find virtual globes at the following links.



Google Earth

www.beyondthepage.com/link/11771/

Google Earth is a 3D application that lets you "fly" anywhere on Earth and explore the terrain, maps, and satellite images. If you do a search for "Google Earth home school," you will find a lot of ideas!



Virtual Globes

www.beyondthepage.com/link/11772/

Google Earth is a fun and easy way to use an example of a "virtual globe", but it is not the only one. If you are interested in learning more about virtual globes, you can find many examples on this Wikipedia site.



World Map for Kids

www.beyondthepage.com/link/11924/

This website shows a world map. You can see more details for each continent when you click on the map.

Optional Extension

If you enjoyed making your own globe, you can use another balloon to make a model of an imaginary planet with its own landforms and bodies of water. Instead

of basing your placement of continents, islands, and oceans on the real Earth, use your imagination and create your own unique world!

☐ Activity 3: Orange You Glad You Have a Map!

SAFETY NOTE: THIS ACTIVITY INVOLVES CUTTING WITH A KNIFE. ASK YOUR PARENTS FOR HELP BEFORE USING A KNIFE.

Globes like the one you created in Activity 2 are useful models of our world, but they aren't very portable. Sometimes cartographers want to represent the round earth on a flat plane, allowing for maps to be placed in books, displayed on computer screens, or folded up and kept in the car's glove compartment for easy reference.

In this activity, you'll make a second globe model, this time on the surface of an orange, and then peel the orange to see how the round Earth can be accurately represented on a flat surface.

Follow the instructions for "Making the Round Earth Flat" on pp. 19-20 of *The Geography Book*. Draw the continents on the skin of an orange and then check with a parent before proceeding to the cutting portion of the project; your parent may want to cut through the orange skin for you or supervise you as you cut it with a plastic knife or butter knife. **For safety, use knives only when an adult is available to supervise and help.**

Once the orange is cut and peeled, lay it out flat and compare it to the map shown on page 19 of the book. Use the "Orange You Glad You Have a Map" activity page to copy what your peeled orange globe looks like when it is flat on the table.

Optional Extension

You can keep your balloon globe from Activity 2 as it is, or for more flat map fun, you can cut off the knot of the balloon and follow the instructions for "Stretching the Globe" on page 20 to see how stretching a round map flat can change the shapes of the features on the map. Be sure to dispose of any leftover balloon pieces securely in the trash.

Wrapping Up

Geography helps us understand the physical features of the Earth and the ways in which humans interact with them, both changing their environments and being influenced by them. How do you interact with your own environment every day?

Review your new geography vocabulary by playing the vocabulary matching game again later in the week.

Life Application

As you go through this unit, notice the names of places in the world that are in the news or that come up in your reading, on television, and in daily conversation. See if you can find those places on a globe or world map. If you would like, use a poster-sized map of the world and small stickers or dots drawn with colored markers to note the places that you hear about over the next three weeks. Later in this unit, you will be creating your own "World Map" too.



National Geographic MapMaker

www.beyondthepage.com/link/11773/

Vocabulary Matching

– set 1 –

Directions: Cut out and shuffle the cards. Place them face down in rows of four or five. Flip over two cards at a time and set aside matching terms and definitions. A pair is identified by a matching symbol on the bottom right corner. Return unmatched cards face down to their original places. Continue until you match all ten pairs. Challenge a sibling or parent to see who can collect the most pairs or use a watch to time yourself.

the study of the physical features of the earth and the ways in which humans interact with them ○	the study of the physical features of the earth such as mountains and rivers ■	GEOGRAPHY ○	PHYSICAL GEOGRAPHY ■
the study of how people interact with the physical features of the earth □	the imaginary line that runs around the center of the earth at 0 latitude and is the starting point for measuring north and south distances on a globe ...	HUMAN GEOGRAPHY □	EQUATOR ...
the lines on a globe that run east to west, parallel to the equator (horizontally) ●	the lines on a globe that run north to south, perpendicular to the equator (vertically) △	LATITUDE LINES ●	LONGITUDE LINES △



the line at 0° longitude that runs through Greenwich, England and is the starting point for measuring distances east and west on a globe



**PRIME
MERIDIAN**



a spherical model of the earth as it would look from space



GLOBE



the relationship between the size of the objects depicted on a map and the size of the map itself



SCALE



mapmaking



CARTOGRAPHY



Vocabulary Matching

– set 2 –

Directions: Cut out and shuffle the cards. Place them face down in rows of four or five. Flip over two cards at a time and set aside matching terms and definitions. You'll need to use the glossary of *The Geography Book* to look up any unfamiliar terms. Return unmatched cards face down to their original places. Continue until you match all ten pairs. Challenge a sibling or parent to see who can collect the most pairs or use a watch to time yourself.

the study of the physical features of the earth and the ways in which humans interact with them	the study of the physical features of the earth such as mountains and rivers	GEOGRAPHY	PHYSICAL GEOGRAPHY
the study of how people interact with the physical features of the earth	the imaginary line that runs around the center of the earth at 0 latitude and is the starting point for measuring north and south distances on a globe	HUMAN GEOGRAPHY	EQUATOR
the lines on a globe that run east to west, parallel to the equator (horizontally)	the lines on a globe that run north to south, perpendicular to the equator (vertically)	LATITUDE LINES	LONGITUDE LINES



the line at 0° longitude that runs through Greenwich, England and is the starting point for measuring distances east and west on a globe

**PRIME
MERIDIAN**

a spherical model of the earth as it would look from space

GLOBE

the relationship between the size of the objects depicted on a map and the size of the map itself

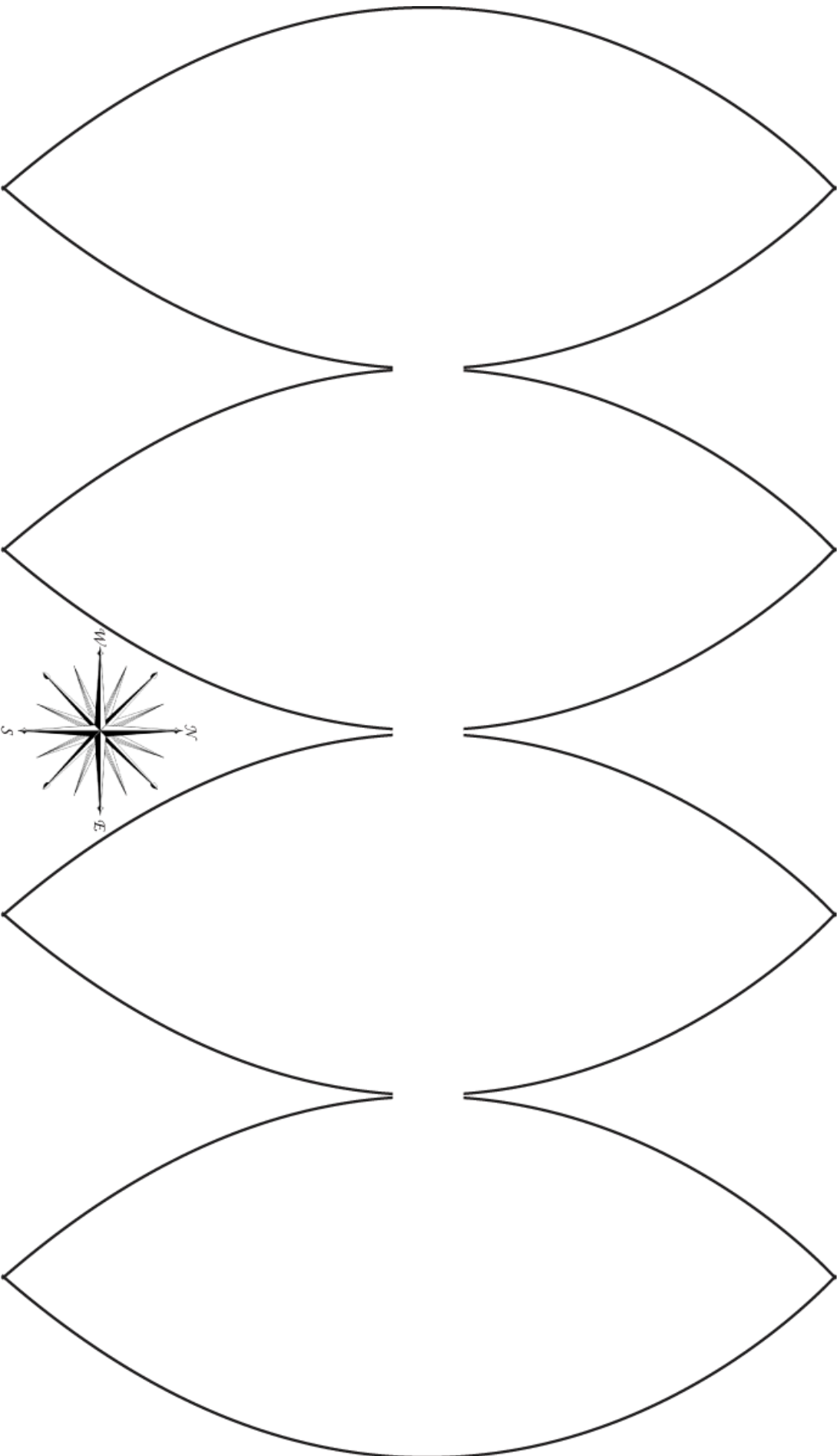
SCALE

mapmaking

CARTOGRAPHY



Directions: After placing your orange peel from Activity 3 flat on the table, use the space below to draw what your completed orange peel map looks like.



Lesson 2: What Is Geography?

Getting Started

✿ Ideas to Think About

- What is geography, and why is it valuable?
- How can the physical environment be represented visually, and how might different kinds of representations be useful?



Things to Know

- **Geography** is the study of the physical features of the earth and the ways in which humans both change and are influenced by the world around them.
- Maps can represent the physical world in a variety of different ways.
- Know the definitions of the following terms: **physical geography**, **human geography**, **equator**, **latitude lines**, **longitude lines**, **Prime Meridian**, **globe**, **scale**, and **cartography**.

• Skills

- Describe and locate the absolute and relative locations of major landforms and bodies of water. (SS)
- Identify and use models and maps as ways of representing landforms. (SS)

Introducing the Lesson

Tell your child that today she continues her study of geography and landforms. Ask her what she already knows about geography, and encourage her to think about the ways in which she might have encountered geographical tools like maps and globes.

NOTE: The final project for this unit will require your child to complete an informative book about a geographical feature of your local area. This can be a landform like a mountain or canyon, a water form like a river, creek, or bay, or an interesting natural area like a forest, park, or even a part of your own yard. You may want to read over the instructions for the final project before your child begins the unit and think about places that you could go on field trips or family outings that might work well for this project. If you have a state park nearby, that may be a great choice.

Reading and Questions

1. What is geography?

Geography is a science focused on the the study of the Earth (including its landforms, bodies of water and other features) and the processes by which the Earth and its features have been formed.

2. How does physical geography differ from human geography?

Physical geography is the study of the Earth's physical features while human geography is the study of how people use and interact with the Earth and its features.

3. Describe at least one way that you or your family have used geography or the tools that geographers use in the past month.

Answers will vary, but your child might mention the use of maps or photographs of the world around you, weather forecasts, or other tools related to geography.

4. Describe what you see when you look out a window in your home, paying special attention to the kinds of things a geographer might find interesting - landforms, natural resources, plants, weather, and evidence of the ways in which humans have interacted with their environment.

Answers will vary depending on your location, but your child should mention the physical features of the land around your home and may also mention the weather or evidence of the ways in which humans have interacted with the Earth, such as the construction of building or use of natural resources.

5. What is the imaginary rod that runs from the North to the South Pole?

The Earth's axis.

6. If you live in the northern hemisphere, how can you figure out which direction is north?

You can find the North Star.

Activities

Activity 1: Vocabulary Matching

In this activity, your child will turn over pairs of cards, trying to match vocabulary terms to their definitions. Assign one of the two sets of vocabulary matching cards for this activity.

Option 1

Set 1 has a unique symbol on each matching pair of cards to allow the child to self-check and be certain that they have found a match.

Option 2

Set 2 does not have visual clues, so the child will have to look up the terms in the glossary of *The Geography Book* in order to confirm that she has matched the terms correctly. You may wish to use Set 2 if your child already knows some of the terms or if you want to give your child the opportunity to practice her skills by looking up unknown words in a glossary or dictionary. You may also wish to have your child play the matching game with Set 1 first and then play again with Set 2 once they have some familiarity with the terms.

Activity 2: Making a Balloon Globe

In this activity, your child will use a round balloon and markers to create her own globe, using a standard globe or a world map as a reference. If you do not have a globe and would like your child to see a spherical representation of the Earth, you can assist your child in using the Internet to find an online globe.

Activity 3: Orange You Glad You Have a Map!

At the grocery store, pick up a large orange of an easy-to-peel variety for Activity 3. Your child will draw the continents on the orange to create another model globe, then remove the peel to see how a round object can be accurately represented on a flat surface.

This activity will **require parental supervision or assistance** since it involves cutting through the skin of an orange. An older child may be able to safely use a butter knife or plastic knife to cut through the orange skin with minimal assistance, but if the orange proves difficult to cut with a child-safe knife, an adult may want to cut through the orange skin and then allow the child to peel the orange.

Wrapping Up**Questions to Discuss**

- What is geography? (Geography is the study of the physical features of the earth and the ways in which humans both change and are influenced by the world around them.)
- How do you encounter geography in your own life? (Answers will vary.)
- How does a globe differ from a paper map? (A globe is three-dimensional while a paper map is two-dimensional or flat.)

Things to Review

- Observe your child working with the vocabulary cards from Activity 1 to make sure that she understands each term. Review the vocabulary terms from Activity 1 with your child as needed.
- Talk with your child about her balloon globe and orange globe projects. It may be interesting to compare her "Orange You Glad You Have a Map!" page with a printed world map and talk about the process of making maps.