To the Teacher

Outline maps afford students the opportunity to practice basic map skills by allowing them to create their own maps. Such an activity, even if only to replicate an existing map, can strengthen students’ ability to use scales, interpret legends, coordinate longitude and latitude, and realize relative and exact location. This will also reinforce students’ awareness of the five themes of geography—location, place, region, movement, and human-environment interaction—the geographic forces that have been at work throughout the history of the earth.

SPECIAL FEATURES

McDougal Littell’s Geography Skills and Outline Maps offers both physical and political maps for the world and for all continents except for Australia, which has a physical-only map. Also included are the standard large-area views of the earth (entire world, hemispheres, and continents). However, there are further subdivisions of the world into unique smaller zones that correspond to the organization of time periods and regions as found in Modern World History: Patterns of Interaction. This allows you to coordinate and customize outline-map work. For example, Geography Skills and Outline Maps provides several treatments of Asia. The continent is found in its entirety on maps for the world, Eastern Hemisphere, the Asian continent, and Eurasia. In addition, a large part of Asia also appears in the map for the Pacific region, and smaller parts are found in varying close-up views of East Asia, North Asia and Russia, Southeast Asia, Southwest Asia, the Middle East, the Indian subcontinent, Japan and Korea, the Mediterranean region, and Greece and Asia Minor. Thus, you can find an outline map that captures the focus of virtually any Asian topic covered in Modern World History: Patterns of Interaction.

Preceding the outline maps are eight pages of geography skills worksheets that review the major components of map reading:

- projections
- latitude and longitude
- continents and oceans
- hemispheres
- physical divisions
- scales and compass rose
- lines, labels, and symbols
- legends (keys)

These worksheets can be used at the start of the school year to prepare students for creating their own maps. (An answer key for these exercises is provided at the back of this book.)

SUGGESTIONS FOR USE

The physical maps in Geography Skills and Outline Maps present students with opportunities to label significant bodies of water and mountains already put in place. Beyond that, things not shown on the maps, such as forests, deserts, and valleys, can be identified by students and added to the maps at your direction. Each political map outlines all of the countries for its region. Having students label such political divisions around the world will strengthen their awareness of the exact location of countries, as well as their relative positions. Also, being asked on occasion to take a physical map and mark countries from memory can challenge and solidify the knowledge of the world for some students.

Each outline map also includes a blank legend box. Students can use this to identify features they add to their maps, including:

- extents of empires and kingdoms
- areas of political influence
- stars and other symbols for capitals and major cities
- arrows showing movement of goods and people
- symbols marking a region’s battle sites, resources, or economic activities

Students should use colored markers and/or patterning to indicate the boundaries of larger surface areas.
The earth is a sphere and is best shown as a globe. For books and posters, though, the earth has to be represented as a flat object. To do this, mapmakers create various plans called projections.

A projection turns every location on earth into a corresponding location on a map. However, all projections distort to some degree. Flat maps cannot show size, shape, and direction all at once with total accuracy. That is why the look and location of Earth’s features will not totally agree on maps of different projections. For example, areas such as Greenland and Antarctica, farthest from the Equator, are often stretched. Goode’s Interrupted avoids stretching and is more accurate for land areas. Polar projections show the earth from above either the North Pole or South Pole. Below are four common projections.

1. Name the four projections. ______________________________________________________

2. Compare the sizes of Greenland and Antarctica on the Mercator projection with the Robinson projection. ____________________________________________________________________
______________________________________________________________________________

3. What would you consider the main drawback of Goode’s Interrupted projection? ____________________________________________________________________

4. Why do you think that the Mercator projection is considered the best for plotting direction? ____________________________________________________________________

GEOGRAPHY SKILLS 1  Understanding Projections

OUTLINE MAP

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Geography Skills 1
GEOGRAPHY SKILLS 2  Recognizing Latitude and Longitude

Most maps contain imaginary horizontal and vertical lines of measurement. Horizontal lines, running east and west, are called latitude lines or parallels. Vertical lines, running north and south, are called longitude lines or meridians. The lines are numbered in degrees (shown by the symbol °). Latitude starts at 0°, known as the equator, where the earth is at its widest. There are 90 degrees north of the equator and 90 degrees south of it. Longitude starts at 0°, the Prime Meridian, and goes 180 degrees west and 180 degrees east.

Because latitude and longitude cross and form a grid, the use of these lines to locate places is called the grid system. Every place in the world has a single grid location—where its latitude and longitude intersect. Study the maps below.

1. How many degrees separate the North Pole from the South Pole?

2. Between about what longitude and latitude degrees does most of the connected United States fall?

3. An airplane lost from radar at 5° S and 55° W was over which continent?

4. Mark the map titled “North and South America” at the approximate point where a ship in distress at 45° S and 5° E might be found.

2 Geography Skills
Complete knowledge of the features of the earth’s surface is only a few hundred years old. As recently as the 1300s, the Atlantic Ocean was a mysterious “Sea of Darkness” on a flat surface. The regions of the Arctic, Pacific, and Antarctic oceans were unknown. There were also great misconceptions about the world. For example, Europeans knew of the region of the Indian Ocean but thought it was a great salt lake surrounded by land. They assumed Asia could be reached from the west only by land.

Today the earth is completely mapped and classified. The largest units of Earth’s land are called continents. Except for the division between Europe and Asia, they are generally well defined. Two continents are islands, and isthmuses—narrow necks of land—clearly separate others. The oceans are merely names given to the largest sections of the body of salt water that covers 71 percent of the globe. Study the map below.

1. What are the seven continents? ____________________________________________________

2. Which geographical formation separates the Americas? separates Asia from Africa? ________

3. What appears to divide Asia from Europe? ____________________________________________

4. Where is most of the earth’s land mass—north or south of the equator? ________________

5. A trip from Australia to Africa would cross which ocean? ______________________________

Geography Skills 3

Recognizing Continents and Oceans
The study of the earth does not always involve the entire planet at once. Mapmakers often deal with large sections of the earth called hemispheres.

The word hemisphere combines sphere—meaning anything round, like a ball—with the prefix hemi—meaning “half.” The world can be divided into any of four hemispheres—Northern, Southern, Western, and Eastern. They are illustrated below by both bird’s-eye and profile views. Hemispheres are further dramatized by the cutting of the globe horizontally and vertically. Study the globes below.

1. Why do you think the word hemisphere accurately describes the six globes shown above?

________________________________________________________________________

2. The vertically cut globe creates what two hemispheres?

________________________________________________________________________

3. Name the continents found all or mostly in the Northern Hemisphere.

________________________________________________________________________

4. Look at the globes for the northern and southern hemispheres. What is the main difference between the North and South poles?

________________________________________________________________________

4 Geography Skills
GEOGRAPHY SKILLS 5  Reading Physical Maps

Physical maps show the earth’s physical features, such as bodies of water and landforms. Among other natural features, these maps show where rivers, lakes, mountains, and types of vegetation such as grasslands and forests are located. Below is a physical map of the Eastern Hemisphere. Study it and answer the questions.

1. Which continent is almost totally desert? __________________________________________

2. Ice is the sole physical feature of what continent? ____________________________________

3. What is the only totally inland sea that is identified? __________________________________

4. What is the prominent physical feature of Northern Asia?______________________________

5. What are the physical features of Africa below the equator? ____________________________
____________________________________________________________________________

The Eastern Hemisphere: A Physical Map

1. Which continent is almost totally desert? __________________________________________

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____________________________________________________________________________
Geography Skills 6 Using Scales and the Compass Rose

The scale of a map helps you determine the actual size or length of any of its features or of any distance between two points. It is a ratio between a unit of length on a map and a unit of distance on the earth. Typically, a scale shows a length of line and indicates the number of miles or kilometers that length represents on the map. A map that covers 1,000 miles per inch has a scale of 1:1,000.

The compass rose is a pointed symbol that shows a map’s direction on the globe. It is usually placed on an area of the map near one edge, away from map details that could make the device difficult to find. On maps showing both water and land, the compass rose is usually placed on the water. The compass rose may show all four cardinal directions—N, S, E, W—or just one, north. Study the maps below and answer the questions.

1. Is Tasmania north, south, east, or west of Australia?

2. About how many inches wide is Australia as it is shown in Map A? (Use a ruler to measure across the widest part of the continent.)

3. What is the approximate distance across Australia in miles?

4. How much larger is Australia in Map B than it is in Map A?
Maps show more than just size and direction. They also define borders of cities, regions, states, and countries. They can be used to depict historical events, to demonstrate how geography has influenced history, and to illustrate human interaction with the environment.

Such information found on a map comes from a reading of its various lines, labels, and symbols. Lines of various width indicate land boundaries, types of roads and waterways, and routes of movement. Labels are words on a map that identify such things as cities, states, countries, continents, and bodies of water. Symbols are decorative objects such as large circles, dots, stars, and bursts used to identify an area’s special features—cities, battle sites, resources, and the like. Study the map below and answer the questions.

1. Vikings came from a region of four present-day countries north of Europe called Scandinavia. Which one, identified on the map, was not a point of origin for Vikings? ______________________

2. Which of the cities on the map is farthest from the Vikings’ homeland? __________________

3. What direction did the Vikings go to reach Greenland? ________________________________

4. What is the region of North America where the Vikings landed? ________________________

5. The Arctic Circle runs just south, north, east, or west of Iceland?______________________
GEOGRAPHY SKILLS 8 Understanding Legends (Keys)

The lines and symbols that appear on a map often need further explanation. For this reason, a legend, also known as a key, is often used. A legend is a small table within a map that explains what some symbols and lines mean.

A legend is also used to indicate the meaning of any patterned or colored areas on a map. For black-and-white maps, patterns such as diagonal lines, large and small dot fields, and cross-hatching are commonly used to show separate regions within a particular boundary. For maps printed in color, the same distinctions are shown by use of different colors. The legend reproduces a sampling of the pattern or color and then identifies what it stands for. Study the map below and answer the questions.

1. What do the different patterns on the maps represent? ______________________________________

2. What temperature range does not appear in Africa in January? ______________________________

3. In which large region is the average July temperature more than 86 degrees? ________________

4. In which region of Africa does the temperature stay virtually unchanged throughout the year? __________________________

8 Geography Skills
Australia and New Zealand: Physical
North America: Political