Seventh Grade Social Studies

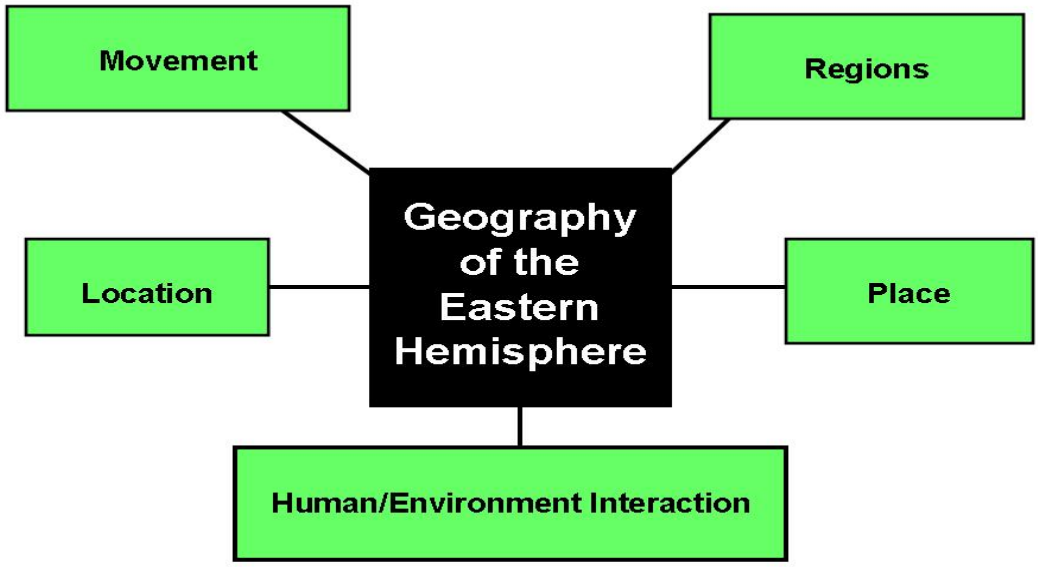
Unit 1: Geography of the Eastern Hemisphere

Big Picture Graphic

Overarching Question:

How can the fundamental themes of geography be used to describe the Eastern Hemisphere?

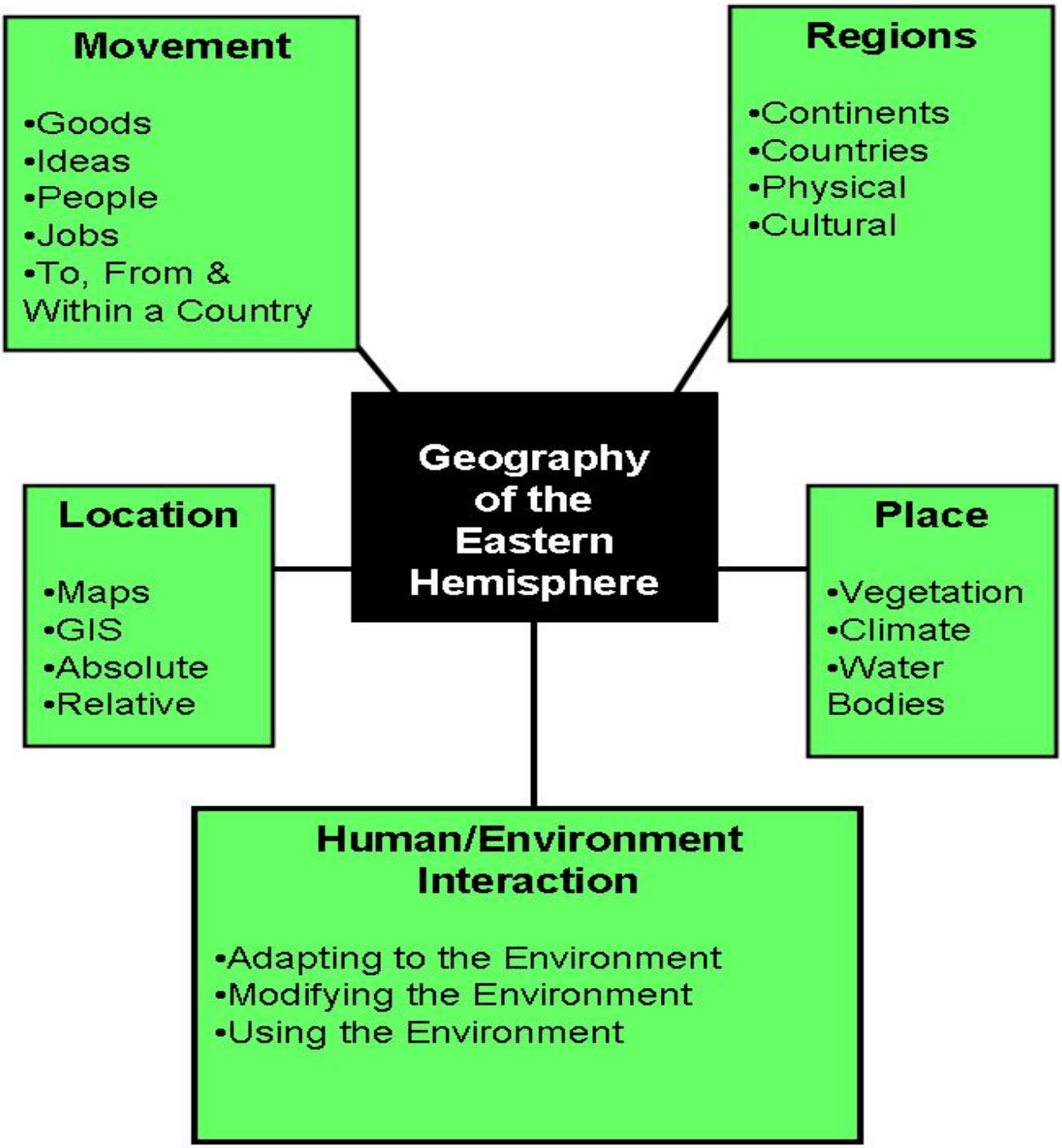
Previous Unit:	This Unit:	Next Unit:
Grade 6 Australia and Oceania	**Geography of the Eastern Hemisphere**	**Africa: People, Places, and Issues**



Questions to Focus Instruction and Assessment:

1. What are the significant physical and human characteristics of the Eastern Hemisphere?
2. How is the geography of the Eastern Hemisphere different from the geography of the Western Hemisphere? How is it alike?
3. How have humans used, adapted to, and modified different environments in the Eastern Hemisphere?

Graphic Organizer



Unit Abstract

In this unit students use the fundamental themes of geography to explore the Eastern Hemisphere. Throughout the unit students connect back to sixth grade by comparing the geography of the Eastern Hemisphere and Western Hemisphere. The unit begins with the students analyzing a wide variety of maps of the Eastern Hemisphere using the themes of location, place, and region to understand the similarities and differences between the two hemispheres. They continue to explore different ways the Eastern Hemisphere can be divided into regions including both physical and cultural regions. Working in small groups, students gather information about significant physical features of the Eastern Hemisphere including landforms, bodies of water, and vegetation. A series of maps and graphic data describing the climate regions are used by pairs of students to construct climate graphs comparing two different places. The graphs and other data are used to make generalizations about the impact of climate on the people and culture of the regions. Building on the concept of human characteristics, students make additional generalizations regarding population and settlement patterns through an analysis of historical and modern maps as well as satellite images. Students then synthesize what they have learned in the unit during a lesson on human/environment interaction in which they explore various ways people have modified different environments in the Eastern Hemisphere as well as ways in which people have adapted to physical changes in the environment. Finally, students combine what they have learned about the geography of the Eastern and Western Hemispheres as they take a global look at the geography of Earth.

Focus Questions

1. What are the significant physical and human characteristics of the Eastern Hemisphere?
2. How is the geography of the Eastern Hemisphere different from the geography of the Western Hemisphere? How is it alike?
3. How have humans used, adapted to, and modified different environments in the Eastern Hemisphere?

Content Expectations

7 – G1.1.1: Explain and use a variety of maps, globes, and web based geography technology to study the world, including global, interregional, regional, and local scales.

7 – G1.1.2: Draw an accurate sketch map from memory of the Eastern Hemisphere showing the major regions (Africa, Asia, Europe, Australia/Oceania, Antarctica).

7 – G1.2.1: Locate the major landforms, rivers and climate regions of the Eastern Hemisphere.

7 – G1.2.3: Use observations from air photos, photographs (print and CD), films (VCR and DVD) as the basis for answering geographic questions about the human and physical characteristics of places and regions. *See also 6 – G1.2.4.*

7 – G1.2.4: Draw the general population distribution of the Eastern Hemisphere on a map, analyze the patterns, and propose two generalizations about the location and density of the population.

7 – G1.2.5: Use information from modern technology such as Geographic Positioning System (GPS), Geographic Information System (GIS), and satellite remote sensing to locate information and process maps and data to analyze spatial patterns of the Eastern Hemisphere to answer geographic questions.

7 – G1.3.1: Use the fundamental themes of geography (location, place, human environment interaction, movement, region) to describe regions or places on earth. *See also 6 – G1.3.1.*

7 –G1.3.2: Explain the locations and distributions of physical and human characteristics of Earth by using knowledge of spatial patterns*. See also 6 – G1.3.2.*

7 – G2.1.1: Describe the landform features and the climate of the region (within the Western or Eastern Hemispheres) under study.

7 – G2.1.2: Use information from GIS, remote sensing and the World Wide Web to compare and contrast the surface features and vegetation of the continents of the Eastern Hemisphere.

7 – G2.2.1: Describe the human characteristics of the region under study (including languages, religion, economic system, governmental system, cultural traditions).

7 – G3.1.1: Construct and analyze climate graphs for two locations at different latitudes and elevations in the region to answer geographic questions and make predictions based on patterns. (e.g., compare and contrast Norway and France, Nairobi and Kilimanjaro, Mumbai and New Delhi).

7 – G4.3.1: Identify places in the Eastern Hemisphere that have been modified to be suitable for settlement by describing the modifications that were necessary (e.g., Nile River irrigation, reclamation of land along the North Sea, planting trees in areas that have become desertified in Africa).

7 – G4.3.2: Describe patterns of settlement by using historical and modern maps (e.g., the location of the world's mega cities, other cities located near coasts and navigable rivers, regions under environmental stress such as the Sahel).

7 – G5.2.1: Describe the effects that a change in the physical environment could have on human activities and the choices people would have to make in adjusting to the change (e.g., drought in Africa, pollution from volcanic eruptions in Indonesia, earthquakes in Turkey, and flooding in Bangladesh).

Key Concepts
climate
fundamental themes of geography
geographic tools and technologies
human characteristics
human/environment interaction
physical characteristics
population patterns
region

Duration: 2 weeks

Lesson Sequence
Lesson 1: Exploring Maps of the Eastern Hemisphere
Lesson 2: Landforms, Bodies of Water and Vegetation of the Eastern Hemisphere
Lesson 3: Climate Regions of the Eastern Hemisphere
Lesson 4: Human Characteristics of the Eastern Hemisphere
Lesson 5: Population Patterns of the Eastern Hemisphere
Lesson 6: Human/Environment Interaction in the Western Hemisphere
Lesson 7: Putting it All Together: Geography of Planet Earth

Assessment
Selected Response Items

Constructed Response Items

Extended Response Items

Performance Assessments

Resources
Equipment/Manipulative
Atlases and textbooks
Computers with Internet and geographic technology loaded
Document camera or overhead projector
Examples of climographs that appear in textbooks, travel books, newspapers, or on Web sites
Examples of maps
- Large wall map of the world
- Eastern Hemisphere
- Africa and Asia
- Physical maps of the continents from books or atlases

Floor plan of the school or hallway
Geography journal
Markers for completing maps (optional)
Newspapers or news magazines with photos (borrow from the library)

Outline maps of Africa and Asia downloaded from
About.com. 24 March 2009 <http://geography.about.com/library/blank/blxindex.htm>.
Paper and markers for world maps
Student handouts copied from *Supplemental Materials*
Pictures of life in the Eastern Hemisphere
Pictures of the students' city or town, both old and new

Student Resource

Altapedia Online. 24 March 2009 <http://www.atlapedia.com/>.

Five Themes of Geography Links. 24 March 2009 <http://geography.mrdonn.org/5themes.html>.

The Geography Guide. 24 March 2009 <http://www.infoplease.com/spot/99geography1.html>.

Geography Network. 26 March 2009 <http://www.geographynetwork.com/>.

Google Earth. 24 March 2009 <http://earth.google.com/>.

Goralewski, Sharon. *Supplemental Materials for Unit 1.*Teacher-made material. Michigan Citizenship Collaborative, 2008-09. (Separate files for each lesson available at www.micitizenshipcurriculum.org).

Local weather reports and climate information from newspapers, the Internet and television

National Geographic Map Machine. 24 March 2009
<http://plasma.nationalgeographic.com/mapmachine/>.

Terrafly. 24 March 2009 <http://www.terrafly.com/>.

Terraserver. 24 March 2009 <http://www.terraserver.com/>.

United Nations Cartographic Section. 24 March 2009
<http://www.un.org/Depts/Cartographic/english/htmain.htm>.

What is Drought? 2006. National Drought Mitigation Center. 24 March 2009
<http://www.drought.unl.edu/whatis/climographs.htm>.

World Climate. 2005. Buttle and Tuttle Ltd. 24 March 2009 <http://www.worldclimate.com/>.

World Geography. 24 March 2009 <http://www.infoplease.com/ipa/A0873835.html>.

Teacher Resource

Africa. 26 March 2009 <http://www.pbs.org/wnet/africa/>.

GeoImages Project. 24 March 2009 <http://geoimages.berkeley.edu/>.

Geographic Information Systems. 24 March 2009 <http://erg.usgs.gov/isb/pubs/gis_poster/>.

Grandfather's Journey. 24 March 2009 <http://faculty.salisbury.edu/~elbond/grand.htm>. (Or any picture book that shows human/environment interaction.) Available at the library.

Introduction to GIS. 24 March 2009 <http://www.geom.unimelb.edu.au/gisweb/GISModule/GISModule.htm>.

Maps. 24 March 2009 <http://geography.about.com/library/blank/blxindex.htm>.

National Geographic. 24 March 2009 <http://www.nationalgeographic.com/>.

National Geographic Educational Network. 24 March 2009 <http://www.ngsednet.org/>.

Outline Maps. 24 March 2009 <http://www.eduplace.com/ss/maps/>.

Peace Corps. 24 March 2009 <http://www.peacecorps.gov/index.cfm>.

Physical Geography.net. 24 March 2009 <http://www.physicalgeography.net/fundamentals/8r.html>.

[*]*Resources for Geography Teachers.* 24 March 2009 <http://www.cnr.vt.edu/geography/vga/resource.html>.

The World Quiz. 24 March 2009 <http://www.lizardpoint.com/fun/geoquiz/worldquiz.html>.

World Wise Schools. 24 March 2009 <http://www.peacecorps.gov/wws/>.

Xpeditions@National Geographic. 24 March 2009 <http://www.nationalgeographic.com/xpeditions/>.

[*] Although the resources denoted with an asterisk are not cited in the lessons for this unit, they are included here to provide meaningful options for teachers.

Instructional Organization

Lessons 1: Exploring Maps of the Eastern Hemisphere

Content Expectations:

7 – G1.1.1: Explain and use a variety of maps, globes, and web based geography technology to study the world, including global, interregional, regional, and local scales.

7 – G1.1.2: Draw an accurate sketch map from memory of the Eastern Hemisphere showing the major regions (Africa, Asia, Europe, Australia/Oceania, Antarctica).

7 – G1.2.5: Use information from modern technology such as Geographic Positioning System (GPS), Geographic Information System (GIS), and satellite remote sensing to locate information and process maps and data to analyze spatial patterns of the Eastern Hemisphere to answer geographic questions.

Key Concepts: geographic tools and technologies, region

Abstract: In this lesson students review what they have learned about maps in previous grades. Using a geography journal, they start with a simple "Stop and Jot" activity; students share this information and add to their journal entries. They discuss the importance of mental maps, and create from memory a simple sketch map of the world that they will use throughout the year. Looking through their books, on the Internet and at home, they find and explain five examples of maps. They share their information with a partner and discuss how to use these maps to answer geographic questions. The class suggests a variety of locations in the Eastern Hemisphere; first the teacher and then the students demonstrate how to use geographic technology to discover more about these places. The students end the lesson by comparing what they already know about the geography of the Western Hemisphere with that of the Eastern Hemisphere.

Lesson 2: Landforms, Bodies of Water and Vegetation of the Eastern Hemisphere

Content Expectations:

7 – G1.2.1: Locate the major landforms, rivers and climate regions of the Eastern Hemisphere.

7 – G1.2.3: Use observations from air photos, photographs (print and CD), films (VCR and DVD) as the basis for answering geographic questions about the human and physical characteristics of places and regions. *See also 6 – G1.2.4.*

7 – G1.3.1: Use the fundamental themes of geography (location, place, human environment interaction, movement, region) to describe regions or places on earth. *See also 6 – G1.3.1.*

7 – G2.1.1: Describe the landform features and the climate of the region (within the Western or

Eastern Hemispheres) under study.

7 – G2.1.2: Use information from GIS, remote sensing and the World Wide Web to compare and contrast the surface features and vegetation of the continents of the Eastern Hemisphere.

Key Concepts: fundamental themes of geography, physical characteristics

Abstract: In this lesson students learn how geographers study the location of physical features and how these features are related to the location of other features. This knowledge enables people to connect historical processes with present activities in many places. There are connections between the geographic characteristics of a place and its economy as well as many other relationships. In many ways this understanding can help geographers answer questions and plan for the future. Students continue to explore different ways the Eastern Hemisphere can be divided into regions including both physical and cultural regions. Working in small groups, they gather information about significant physical features of the Eastern Hemisphere including landforms, bodies of water, and vegetation. Students rely on a variety of sources to collect this information. The students identify a variety of regions within the Eastern Hemisphere, choosing one region to map in detail. They discuss why and how this information is useful.

Lesson 3: Climate Regions of the Eastern Hemisphere

Content Expectations:

7 – G1.3.1: Use the fundamental themes of geography (location, place, human environment interaction, movement, region) to describe regions or places on earth. *See also 6 – G1.3.1.*

7 – G2.1.1: Describe the landform features and the climate of the region (within the Western or Eastern Hemispheres) under study.

7 – G3.1.1: Construct and analyze climate graphs for two locations at different latitudes and elevations in the region to answer geographic questions and make predictions based on patterns. (e.g., compare and contrast Norway and France, Nairobi and Kilimanjaro, Mumbai and New Delhi).

Key Concepts: climate, physical characteristics, region

Abstract: In this lesson students study the climate patterns of the Eastern Hemisphere. After reviewing the components of weather and climate, they choose a major city in this region and research the average temperature and precipitation characteristics. They collect climate data for the city and construct a climograph, a graph that shows average monthly temperature and precipitation for a year in a city or region. After studying the graphs the students ask a geographic question that links climate to another aspect of geography, such as the economy of the region under study. They present this information to their classmates, comparing and contrasting the climates of the various cities they have graphed. The class forms statements about how climate is

linked to the regional, cultural, natural, and economic characteristics of countries and regions in the Eastern Hemisphere citing general patterns and influences of the area.

Lesson 4: Human Characteristics of the Eastern Hemisphere

Content Expectations:

7 – G1.2.3: Use observations from air photos, photographs (print and CD), films (VCR and DVD) as the basis for answering geographic questions about the human and physical characteristics of places and regions. *See also 6 – G1.2.4.*

7 – G2.2.1: Describe the human characteristics of the region under study (including languages, religion, economic system, governmental system, cultural traditions).

Key Concepts: human characteristics

Abstract: In this lesson the students review what they have learned about physical characteristics in the previous lesson and discuss how these features or characteristics serve to create regions. They work as a class to define human characteristics and create a list of several examples. From multiple sources students gather various images and text of events and places in the Eastern Hemisphere. They use the images and text to speculate about the human characteristics depicted, asking geographic questions to be answered as they continue the lesson. Employing a variety of sources, they confirm or change their ideas regarding the regions of the Eastern Hemisphere. They choose three human characteristics from a selected photograph or article and conduct further research about these characteristics. They write a paragraph about each one and prepare regional map for only one of the characteristics. Using a large map of the Eastern Hemisphere they connect their map to specific locations. They complete the lesson by explaining how physical and human characteristics connect to help define regions.

Lesson 5: Population Patterns of the Eastern Hemisphere

Content Expectations:

7 – G1.2.4: Draw the general population distribution of the Eastern Hemisphere on a map, analyze the patterns, and propose two generalizations about the location and density of the population

7 – G4.3.2: Describe patterns of settlement by using historical and modern maps (e.g., the location of the world's mega cities, other cities located near coasts and navigable rivers, regions under environmental stress such as the Sahel).

Key Concepts: human characteristics, population patterns

Abstract: In this lesson the students study the difference between population distribution and population density. They begin by determining the population density and distribution of their own school, expanding this information to the Eastern Hemisphere. They add the physical features to a

map of Africa and discuss how these characteristics influence settlement patterns. They use this information to analyze population patterns, looking at modern as well as historical maps. The region of the Sahel is examined in relation to the environmental problems it has experienced in the last century and how this affects its population. They complete a population density map of Africa and note areas of dense population as well as sparsely settled areas. The students summarize that they have learned about population in a final discussion.

Lesson 6: Human/Environment Interaction in the Eastern Hemisphere

Content Expectations:

7 – G1.3.1: Use the fundamental themes of geography (location, place, human environment interaction, movement, region) to describe regions or places on earth. *See also 6 – G1.3.1.*

7 – G4.3.1: Identify places in the Eastern Hemisphere that have been modified to be suitable for settlement by describing the modifications that were necessary (e.g., Nile River irrigation, reclamation of land along the North Sea, planting trees in areas that have become desertified in Africa).

7 – G5.2.1: Describe the effects that a change in the physical environment could have on human activities and the choices people would have to make in adjusting to the change (e.g., drought in Africa, pollution from volcanic eruptions in Indonesia, earthquakes in Turkey, and flooding in Bangladesh).

Key Concepts: fundamental themes of geography, human/environment interaction

Abstract: In this lesson, students synthesize what they have learned so far in the unit during a lesson on human/environment interaction. They explore various ways people have modified the different environments in the Eastern Hemisphere as well as ways in which people have adapted to physical changes in the environment. After listening to a read-aloud book they select examples of human/environment interaction depicted. They determine whether it is a modification or an adaptation to the environment. They examine historical as well as modern pictures of their own surroundings and list in a T-chart how the environment has been changed. In a guided discussion the students explore the positive and negative aspects of human/environment interaction. The students are introduced to the organization of Peace Corps. They study some of the Peace Corps projects and identify modifications that have been made to areas in the Eastern Hemisphere where Peace Corps volunteers work. Finally they answer the question, “How have humans used, adapted to, and modified different environments in the Eastern Hemisphere?”

Lesson 7: Putting it All Together: Geography of Planet Earth

Content Expectations:

7 – G1.3.1: Use the fundamental themes of geography (location, place, human environment interaction, movement, region) to describe regions or places on earth. *See also 6 – G1.3.1.*

7 –G1.3.2: Explain the locations and distributions of physical and human characteristics of Earth by using knowledge of spatial patterns*. See also 6 – G1.3.2.*

Key Concepts: fundamental themes of geography, human characteristics, physical characteristics

Abstract: In this last lesson of the unit the students combine what they have learned about the geography of the Eastern and Western Hemispheres as they take a global look at the geography of the Earth. Using a map of the Western Hemisphere, they review what they already know about the physical features of South and North America as well as other continents they have studied including Europe and Australia. They complete maps and charts of comparable features found in Africa and Asia answering the question, "How is the geography of the Eastern Hemisphere like that of the Western Hemisphere?" Students suggest many different human characteristics that make each continent unique. They choose one continent from the Eastern Hemisphere and one from the Western Hemisphere and write a paragraph comparing the two, using both human and physical features around the frame of the five themes of geography. Accessing a variety of world maps, they explore global universals such as the oceans, wind patterns, populations and climates. They discuss why this information is important and how it will be useful in their future.