

Riddle Me This: Using Maps to Locate Places in the Americas

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Grade Level	4
Duration	1 class period

National Standards

GEOGRAPHY
Element 1: The World in Spatial Terms
1. How to use maps and other geographic representations, geospatial technologies, and spatial thinking to understand and communicate information

AZ Standards

MATHEMATICS
Measurement and Data
4.MD.A.2 Use the four operations to solve word problems and problems in real-world context involving distances, intervals of time (hr, min, sec), liquid volumes, masses of objects, and money, including decimals and problems involving fractions with like denominators, and problems that require expressing measurements given in a larger unit in terms of a smaller unit. Represent measurement quantities using a variety of representations, including number lines that feature a measurement scale

ELA
Writing
Production and Distribution of Writing
4.W. 4 Produce clear and coherent writing in which the development and organization are appropriate to task, purpose, and audience.

Other Arizona Standards

The use of geographic representations and tools help individuals understand their world.
4.G1.1 Use and construct maps and graphs to represent changes in the Americas over time.
Key concepts include but are not limited to human and physical features of the Americas, trade and exploration routes, the location of civilizations and societies in the Americas including indigenous peoples, and settlement patterns including the development of the Southern, Middle, and New England Colonies

Overview

Reading a political map is a basic geographic skill. Knowing how far places are from one another is important in understanding our world and in developing spatial thinking.

Purpose

In this lesson, students will choose places on a political map of the United States for which they will create riddles. The riddles will incorporate clues using cardinal (north, south, east, west) and intermediate (i.e., northwest, southeast) directions as well as mileage using the scale of the map.

Materials

- The United States (with state names) <https://geoalliance.asu.edu/sites/default/files/maps/US-NAMES.pdf>
- The United States and Capitals (labeled) http://geoalliance.asu.edu/sites/default/files/maps/States_With_Capitals.pdf
- South America's Capital Cities <http://geoalliance.asu.edu/sites/default/files/maps/s-america-caps.pdf>
- Rulers
- Sample Riddles
- Riddle Worksheet
- Riddle Quiz and Answer Key

Objectives

Riddle Me This

The student will be able to:

1. Read a political map and locate states and capitals.
2. Use cardinal and intermediate directions on a map.
3. Measure distances on a map using the mileage scale.

Procedures

Prerequisite geography skill: knowledge of cardinal and intermediate directions on a map. Prerequisite math skill: ability to use a map mileage scale.

*Note: Procedures below are given for using the **United States and Capitals** map. If students are just beginning to learn the states, use the *United States map* and have the clues be directions and distance from one state to another. If students have already learned the states, use the *South America map*. All of the same procedures can be used with the any of these maps.*

1. Distribute and project The United States and Capitals (labeled) map.
http://geoalliance.asu.edu/sites/default/files/maps/States_With_Capitals.pdf
2. Point out that the dots are the capital cities for these states. Since some states are so small on the map, their capitals are given in the box at the bottom of the map. Review how to measure on a map using the map scale. Point out the compass rose at the bottom of the map. Have students label the intermediate directions (NE, SE, SW, NW)
3. Choose a capital city on the map and tell the students clues about the location of this place without naming the capital city. (See Sample Riddle #1 for ideas)

4. Have students guess your mystery location as clues are given (distance and direction) (one at a time).
5. If needed, practice with more mystery locations and clues. (See Sample Riddle #2 and 3)
6. When students are ready, distribute the Riddle Worksheet. Project the Sample Riddles so students can see the format. Students may work in partners or independently to create their own mystery location (riddle).
7. Completed riddles can be shared in either whole group or small group settings.
8. Give the Riddle Quiz.

Assessment

Geography and Mathematics

Students can be assessed using the scoring system given on the Riddle Quiz. Mastery will be considered a score of 80% or higher.

Geography and ELA

Students can be assessed using the Riddle Worksheet. Students should have 4 accurate clues to the mystery location. The city/mystery location should be also correct. Mastery will be considered a score of 80% or higher.

Extensions

- Incorporate latitude and longitude in the clues.
- Create a bulletin board for weekly or daily riddles to be displayed.
- Incorporate landmarks, cultural, and any other aspect of geography as addressed in social studies curriculum.

Sources

Rand McNally Classroom Atlas