



# ARKANSAS REFRIGERATOR CURRICULUM FOR SIXTH GRADE



## ENGLISH LANGUAGE ARTS \*

*Aligned to Common Core State Standards*

- Provide detailed summaries of texts
- Determine the theme or central idea of a text and how it is conveyed through particular details
- Use a range of reading strategies to determine the meaning of unknown words in a text
- Integrate information presented in different media or formats (e.g., visually, numerically) to develop a coherent understanding of a topic or issue
- Understand the figurative and connotative (implied) meaning of words and phrases
- Identify and evaluate specific claims or arguments in a text
- Support written claims or arguments with clear reasons and relevant evidence
- Produce clear and coherent writing appropriate to the task, purpose, and audience
- Participate in discussions about various texts and topics
- Conduct short research projects to answer a question
- Use precise language and subject-specific vocabulary

## MATHEMATICS \*

*Aligned to Common Core State Standards*

- Understand and apply the concepts of ratios and unit rates (e.g., the ratio of wings to beaks in a flock of birds is 2 to 1 because for every 2 wings there is 1 beak) to solve real-world and mathematical problems
- Divide fractions by fractions using both visual models and equations to show the problem
- Quickly and accurately add, subtract, multiply, and divide multi-digit decimals
- Find the greatest common factor of two numbers less than or equal to 110 and the least common multiple of two numbers less than or equal to 12
- Understand and use rational numbers (fractions, decimals, and percentages)
- Understand that positive and negative numbers are used together to describe quantities having opposite

directions or values

- Use pairs of numbers, including negative numbers, as coordinates for locating or placing a point on a graph
- Write and determine the value of expressions with whole-number exponents (e.g.,  $15+3^2$ )
- Identify and write equivalent mathematical expressions by applying the properties of operations {e.g., recognize that  $2(3+x)$  is the same as  $6+2x$ }
- Understand that solving an equation such as  $2 + x = 12$  means answering the question: *What number does x have to be to make this statement true?*
- Represent and analyze the relationships between independent and dependent variables
- Solve problems involving area, surface area, and volume
- Understand statistical variability and summarize distributions

## SCIENCE

*Aligned to Arkansas Curriculum Frameworks*

- Actively investigate topics of interest. Suggestions include the following:
  - Model the layers of earth
  - Examine the body systems of plants and animals in a variety of ways (e.g., computer simulations, models)
  - Create and use simple and compound machines
  - Compare the density of common items (e.g., rocks, marbles, cork, candle wax) using a water displacement
  - Create a model representing the phases of the moon
- Learn how energy is transferred
- Discover ways that plants and animals have adapted to their environment (e.g., teeth, horns, fur, coloration, wings, type of seed, thorns)
- Research selective breeding in plants and animals
- Explore landforms found in Arkansas (e.g., mountains, plateaus, earthquake faults)

- Use available technology to research contemporary scientists

## SOCIAL STUDIES

*Aligned to Arkansas Curriculum Frameworks*

- Illustrate population, climate, weather patterns on selected types of maps, charts, and graphs
- Examine the cultural contributions of people from different places
- Discuss roles and responsibilities of the three branches of government
- Discuss how rights and laws in the U.S. were created
- Examine the founding documents
- Analyze the importance of citizen participation
- Analyze the impact of scientific and technological innovations on AR and the U.S.

You are your child's first and most important teacher. We value your support in building a solid foundation to prepare your child for school. This is a list of concepts and skills that will help your child be successful in sixth grade. This list is only a sample and does not include everything that will be taught throughout the year.

\* Adapted from the Council of the Great City Schools Parent Roadmaps to Common Core Standards: <http://www.cgcs.org/domain/36>  
Additional resource: National PTA <http://www.pta.org/4446.htm>