	Grade: 4 th Grade Unit: Social Studies	s Activities
Learning Target Social Studies: 4 th	Activity	Activity
Examine responsibilities and powers of government officials at various levels and branches of local and state governments.	Make a chart of the government officials in your city or state, and research about their roles in government. What are their responsibilities? How do they serve their constituents?	By playing this downloadable <u>board game</u> from the Center for Legislative Archives, students will experience the law-making process designed by the Founders and incorporated into the Constitution. The game is intended to introduce students to the important role Congress plays in our republic.
Explain effects of supply and demand on prices.	Use this lesson from $\underline{\text{EconEdLink}}$ on the effect of supply and demand on prices.	Economics Education resources from <u>Economics Arkansas</u>
Analyze ways cultural characteristics influence population distribution in regions of the United States and the world.	Cultural characteristics are things like a common history, common language, common dress. Why do you think cities often have various districts? (e.g., Little Italy, Chinatown) If you moved to a different country, would you want to live near people with similar customs or different ones? Why?	Visit the Arkansas Traveler Database here , scroll down and click on "CultureGrams," and then click "States Edition." Use the CultureGrams site to explore and learn about the 50 States. Try these free printables to learn about the 50 States.
Analyze ways environmental characteristics affect population distribution in Arkansas, the United States, and the world.	Compare a population density map and a physical map of the same region. How does the physical map help to explain the population density map?	Would you rather live in a dry desert or in the cold tundra? Why? How does the environment influence your decision? What things could you do to make living in a desert easier? What makes living in a tundra hard? Deserts cover more than ½ of the world's land. Possible resources: National Geographic article on Tundras National Geographic article on Deserts
Describe global connections created through increased trade, transportation, communication, and technology.	When making an online purchase, have your child consider the following: 1. Where was the item made? 2. Where is it being shipped from? 3. Track the item as it makes its way to your home. What methods of transportation were used to get the item to your doorstep?	Follow the journey of a t-shirt from cotton plants to the store. Watch the Studies Weekly video "Communication Over Time" and talk about how communication has changed.
Examine why individuals and groups during the same historical period had differing perspectives.	Read this <u>story</u> . How does your perspective change when you take on a different role?	Think about a time in history that you may have read about or watched a movie about. Identify two sides in the event.

	Grade: 4 th Grade Unit: Science Activities	
Learning Target Science: 4 th	Activity	Activity Resources
Identify renewable (sun, water, wind) and non-renewable (nuclear power, coal, oil) sources of energy.	Discuss renewable sources of energy. Go for a walk and list or take pictures of the different renewable sources of energy you see in your neighborhood. On another day, do the same for non-renewable sources of energy. You might not see them, like a chunk of coal or an oil well, but you might see things that USE non-renewable sources of energy.	Family Activity: Renewable or Not?
Explain changes in landscapes caused by erosion.	Erosion is often aided by water or the wind. Erosion of soil and the eventual change of a landscape is largely due to natural processes, but sometimes humans can take part in either making erosion happen faster or slowing it down. In pictures, show and tell how a family could change the landscape of a backyard.	Weathering & Erosion
Communicate how the Ring of Fire (volcano belt) and the earthquake belts on Earth form mountain ranges and other geographical features.	View <u>images of volcanoes</u> and observe their features. Record ideas and questions and draw images of these volcanoes. Create your own explanation as to what they are and how do they form. Then, after watching a video of an erupting volcanoes, record your observations and discuss patterns that are formed.	Band of Volcanoes in the Pacific
Discuss ways that humans protect themselves from natural weather disasters like flash flooding and severe storms.	Make a family emergency plan based on natural occurrences that happen in your region, such as flash floods or tornadoes. What should your family do to be safe? What items would be good to have in a safety kit or first aid kit? Where would you keep the kit?	Flood by NOVATeachers; Flood Safety Tips by CDC
Explain how speed and energy can transfer and cause different effects in a collision.	Use a toy car and a board to build a small ramp outside. Put a light object (like a paper cup) at the end of the ramp. Measure how far the car pushes the cup when it hits it at the base of the ramp. What happens when you adjust the slope of the ramp? Make a graph or a table to show your results. Can you write an "if, then" statement about the ramp and the distance the cup travels?	Hot Wheels Speedometry by Speedometry
Compare energy that occurs in different waves and explain how that energy can cause movement.	Take an empty 2L clear bottle, and fill it half full with water. Drop a piece of cork or something small that floats into the bottle. Place the bottle on its side on a table or flat surface. Make a wave in your bottle by briefly lifting one end of the bottle. What happens to the floating object? Now add two or three small pieces of paper to the bottle. Make another wave. Do the pieces of paper move? Finally, add a metal paper clip to the bottle. Make another wave. Did the paperclip move? Write a paragraph about the energy of waves and the movement of objects in a wave.	

4th Grade: Activities to Support Learning Targets

Learning Target Science: 4 th	Activity	Activity Resources
Explain different ways to communicate with others in addition to speech, such as hand signals, flags, or secret codes.	There are several codes humans have used over the years to communicate with each other when it was not possible to speak to the person. Some of the earliest examples of these codes are smoke signals used by Native Americans and Morse Code used by telegraph operators with short dots and dashes carried over telegraph lines. Sometimes flags are used to communicate, such as in NASCAR races. Pretend you and your friends are playing hide and seek. You want to communicate with another person who is hiding beside you. You cannot talk or whisper or you will be caught. Come up with a way to communicate with your friend without speaking.	Examples of Hand Signals
Develop problem solving skills by creating a solution to a problem, testing it, and making improvements to your design.	The typical home has many things that you might be able to use to build a model car that moves. You could use bottle caps for wheels, or a sail to catch a breeze or twisted rubber bands. You could use toilet tissue tubes or paper towel tubes for the body of a car, or even a clothes pin. Think of what you have. Do you have pencils or Q-tips for axles? Do you have a balloon? Do you have paper cups or empty yogurt cups? Now build a car with your stuff. (Note: a twisted rubber band attached to a paper clip will release kinetic energy when the rubber band unravels—see How to make Rubber Band Energy Experiment Car link Take your car for a test drive. Record how far it travels. Make improvements to your car and test it again. That's engineering!	Build a Boat by Education World; Build a Toy Workshop by TeachEngineering.com How to make Rubber Band Energy Experiment Car

Grade: 4 th Grade Unit: Math Activities		
Learning Target Math: 4 th	Activity	Activity and/or Resources
Compare two multi-digit numbers based on the meanings of the digits in each place, using the symbols > (more than), = (equal to), and < (less than).	Construct a set of playing cards numbered 0-9. Shuffle the cards, have your child turn over 4 cards and build two 2-digit numbers. Which number is larger? E.g., if your child builds the numbers 72 and 91. Ask them which number is larger and explain the reasoning using the meanings of the digits in each place. (Variation: Which number is smaller?)	Write down the first six prices from a store receipt, omitting the dollar values (e.g., \$14.56 becomes \$0.56, \$8.99 becomes \$0.99, etc.). Arrange the new values in increasing or decreasing order. Ask your child to defend his or her reasoning using place value understanding.
Fluently add and subtract whole numbers up to 1 million.	Roll a die 6 times and write the numbers down to create a 6-digit number. Roll the die 6 times again and write the numbers down to create another 6-digit number. Add the two 6-digit numbers together, then subtract the smaller number from the larger number. Talk about the strategy your child used to solve the problems.	Use playing cards 2-9 only, shuffle the cards. Draw 6 cards and write the numbers down to create a 6-digit number. Draw 6 more cards and write the numbers down to create another 6-digit number. Add the two 6-digit numbers together; then subtract the smaller number from the larger number. Talk about the strategy your child used to solve the problems.
Multiply and divide multi-digit whole numbers.	Create a story problem for the math expression. Then find the answer to the problem. $1{,}385x7$	Find the answer to the division problems. Express your answer as whole number or a whole number with a remainder. Make up and solve division problems of your own like the ones below (up to 4-digit number divided by a 1-digit number). Do you notice any patterns for which ones have remainders and which do not? Explain your observations. $392 \div 4 = 196 \div 7 = 8125 \div 5 = 100 \div 3 = 961 \div 2 = 45 \div 6 =$
Create a fraction and explain why it is equal to another fraction.	Roll a die to make a fraction. The first roll is the numerator, and the second roll is the denominator. Draw a visual model to explain how the value of a fraction changes if you double its numerator. How does the value of a fraction change if you double its denominator? Talk to a family member about your visual model and explanation.	<u>Equivalent Fractions Games</u>

Learning Target Math: 4 th	Activity	Activity and/or Resources
Add and subtract fractions and mixed numbers (whole numbers mixed with fractions) that have the same denominators.	Time yourself cleaning your bedroom to the nearest quarter of an hour (e.g., 1/4, 2/4, 3/4, 4/4). Time yourself cleaning the kitchen to the nearest quarter of an hour (e.g., 1/4, 2/4, 3/4, 4/4). How much time did you spend cleaning altogether? Time yourself for 5 days. Did you clean more than 4/4? How much more?	How much ribbon would be left if we used 21/4 yards of a 43/4-yard spool of ribbon? Draw a visual model to explain and justify your reasoning. Cynthia's Perfect Punch
Compare the size of two fractions with different numerators (top numbers) and different denominators (bottom numbers).	Using a measuring cup, locate the 1/2 cup mark and the 3/4 cup mark. What do you notice? Which one is more? What other fractions can you compare on the measuring cup? How were you able to compare the fractions with different numerators and denominators? How can you figure out which is more, 1/4 or 3/6, if you did not have a measuring cup?	<u>Fraction Games for 4th Graders</u>
Convert fractions with denominators of 10 or 100 into decimals.	Deck of Cards: Number cards (2-10) Face cards (Jack's value: tenths) and (Queen's value: hundredths). Discard the Kings and Aces. Make two stacks face down, one stack with the numbers and one stack with the face cards. Turn over a number card (this will be the numerator), then turn over a face card (this will be the denominator). Convert each fraction into a decimal. (E.g., 3 and queen - 3/100 - 0.03)	Math Playground: Converting Fractions to Decimals
Compare decimals and fractions using the symbols > (more than), = (equal to), and < (less than).	Use two different receipts from a store or restaurant. Compare the cost using the symbols <, >, =. If a penny is worth 1/100 of a dollar and a dime is 1/10 of a dollar, what could be the different coins used to make the change? Write the fractional values of each (e.g., \$4.56 - 56/100) and compare their values using the symbols <, >, =.	Decimal Games Dimes and Pennies
Solve multi-step word problems involving the four operations (sum, difference, product, quotient).	Jennie paints pictures and sells them at art shows. She charges \$56.25 for a large painting. He charges \$25.80 for a small painting. Last month she sold six large paintings and three small paintings. How much did she make in all? Talk to a family member about your strategy for solving the problem.	Word Problem
Solve word problems involving measurement and conversion of measurement from larger to smaller units (e.g., km, m, cm; kg, g; lb., oz; l, ml; hr., min, sec).	Measure your bed, couch, or table using centimeters or meters. How many 30-cm rulers do we need? Talk to a family member about your strategy and solution.	Record the time (using minutes) it takes to do your chores, help a family member cook a meal, do school work, and/or play outside. Convert your minutes to seconds or even hours. Who's the tallest?

4th Grade: Activities to Support Learning Targets

Learning Target Math: 4 th	Activity	Activity and/or Resources
Draw and identify lines (perpendicular or parallel) and angles (right, acute, obtuse).	You can use your arms to make angles. Practice making right, acute, obtuse, straight, reflex, and full rotation angles with a family member. Find examples of each angle in your home.	Look around your house and find items that have perpendicular or parallel lines.
Read and write multi-digit whole numbers using base-ten numerals, number names, and expanded form (e.g., 853= eight hundred fifty-three=800+50+3).	Roll a die 3 times and write the numbers down. Write the number's name, expanded form, and read the number to a family member.	Expanded and Standard Forms within 1,000

	Grade: 4 th Grade Unit: Literacy Activities	
Learning Target Literacy: 4 th	Activity	Activity and/or Resources
Read and show understanding of grade-level texts by answering questions.	Create a question cube. On each side, write one question word: who, what, when, where, why, how, what. Take turns rolling the cube and asking each other questions about the book read together.	Fourth grade level text examples: NewsELA; Reading Rockets Book Finder; ReadWorks; CommonLit
Identify the theme of a text.	After reading a story, discuss what they learned from the story or what the story was all about. Is there anything that can apply to your life?	<u>Literary Terms: Theme</u>
Compare and contrast two similar texts.	Example: Read two versions of the classic tale, <i>Cinderella</i> . Determine the similarities (compare) and differences (contrast) of the cultures,	Reading Rockets: Text Structure Strategy
	language used, setting, etc.	Reading Rockets Venn Diagram Graphic Organizer
Decode words using knowledge of Latin prefixes, bases, suffixes and connectives.	Use the word attack strategy to determine meaning for word parts	RISE Newsletter, December 2021
suffixes and connectives.	(prefix, suffix, base) when reading words in context.	RISE Newsletter, January 2022
		<u>Morphology Resources</u>
Explain how an author uses reasons and evidence to support specific points in a text.	After reading a nonfiction text, act as a lawyer representing the author. Read and reread to determine the viewpoint and points to explain to the jury how the author feels and why.	Looking Back at the Text for Evidence
Describe how a character changes throughout a story.	As you read, create a story map to follow the character, noting changes due to specific events, interactions, reflections, etc.	Reading Rockets: Story Maps
Use standard English when speaking and writing.	When having a conversation with your child, if they are not speaking standard English, repeat the statement correctly and have your child repeat the statement.	When your child writes, if they are not using standard English, have your child correct the writing using standard English. Arkansas PBS Learning Media Language (free)

Learning Target Literacy: 4 th	Activity	Activity and/or Resources
Participate in discussions by adding thoughts and explaining others' ideas.	Engage in collaborative conversations with family members. For example, model how to use these starters with your child, "How do you know that?, "I also noticed,"I'd like to add, "I disagree/agree because, "Say more about what you mean."	Engaging Students in Collaborative Academic Discussions
Write to tell a story, to give information, or to give an opinion using grade-appropriate conventions.	Write a story about a favorite family vacation or road trip. What made it special? Use dialogue to tell your story. Use information gathered from books, articles, and online resources to write an informative paper about a self-selected topic. Write an opinion paper about your favorite sports team. Support your opinion with reasons and information on why this team is the best.	Arkansas and The Writing Revolution: DESE provides resources based on The Writing Revolution in this resource. Use this as a tool to assist your child to expand, combine, or correct sentences, or use the outlines for writing and revision tools for improving writing.
Write a summary of a text using key details.	After reading a text, create a graphic organizer to plan the summary. You can trace the outline of your hand and on each finger write one of these words: Somebody, Wanted, But, So, Then and in the center write Summarize. Somebody: Who is the main character or who is the text about? Wanted: What did that person want? But: What was the problem? So: How did the person try to solve the problem? Then: What was the resolution?	Summarizing a Text
Learn and use new vocabulary.	Analyze the word by looking for known bases, prefixes, and suffixes to determine the meaning of the word. Use the vocabulary word in speaking and writing, being sure to manipulate the prefixes and/or suffixes to alter the meaning of the word to fit the context. Determine synonyms and antonyms for the term and create a semantic gradient.	Semantic Gradients List Group Label Word Maps RISE Newsletter, December 2021 RISE Newsletter, January 2022 Morphology Resources