



Launching young readers!

Reading Rockets

Literacy in the Sciences: Activity No. 15
 The Vocabulary of Science
 By: Reading Rockets

Science learning involves lots of new vocabulary words. Focusing on root words, prefixes and suffixes can help your child learn new science words more quickly and become a word detective!

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Science learning involves lots of new vocabulary words. When helping your child learn new science words, focus on words that allow you to teach more than just that one word. This can be done by considering a word's morphemes.

A morpheme is a meaningful part or unit of a word that can't be divided into smaller parts. It isn't important that your child know the word morpheme itself, but it is helpful for your child to learn that words may be related if they share a morpheme. There are different types of morphemes, including root words, prefixes and suffixes.

Below you'll find some science words, their morphemes, and some related words.

Common science words and morphemes

Science word	Morpheme (meaning)	Related words
Photosynthesis	Photo (light)	Photography, photograph
Thermometer	Therm (heat)	Thermos
Microscope	Micro (small), scope (see)	Microwave, stethoscope
Geology	Geo (earth)	Geode, Geometry
Graph	Graph (write)	Autograph, bar graph

How do I use this information?

Using morphemes helps you teach more about word meanings and families of related words. If they learn, for example, that micro means small and scope means see, they can figure out that a microscope is an instrument scientists use that helps individuals to see small objects. Once your child recognizes the meaning of a morpheme, she can use that information to learn other new words. When you're reading and you come across another word that shares a morpheme, you can help your child make a connection. "The boy in this story is using a periscope to see over a fence. What do you think a periscope might be? How is that related to the word microscope?"

It isn't necessary to break apart each new word into its morphemic parts. Try to focus just on the words for which you can develop a few related words. You and your child will have fun building your word families together.

Recommended children's books



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Clouds

By Anne Rockwell

Learn about 10 different types of clouds — cirrus, stratus, and cumulus — as well as cirrostratus, cirrocumulus, cumulonimbus, altostratus, altocumulus, nimbostratus, and stratocumulus! The author describes each type of cloud formation, explains where it is found in the sky, and tells what kind of weather is associated with it. The book ends with simple instructions for making your own cloud. (Age level: 3-6)

- **[Purchase book](http://www.amazon.com/exec/obidos/ASIN/0064452204/readingrocket-20)**



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The Greedy Triangle

By Marilyn Burns

Learn about basic polygons and geometry in this charming story of an adventurous triangle that wants to change — into a quadrilateral (a television or book), then into a

pentagon (a house) and so on. The clever text reveals unusual places to find different geometric shapes. In the end, the triangle realizes he is happiest as three-sided figure: he can hold up a roof, be a slice of a pie and, slip into place when people put their hands on their hips. (Age level: 4-8)

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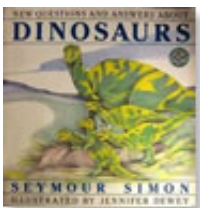
The Magic School Bus Inside the Earth

By Joanna Cole

Hold on for another exciting field trip with Miss Frizzle and her students — this time, it's to the center of the earth! The class collects rock samples before the bus is tossed from the earth's core in a volcanic eruption. (Age level: 4-9)

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New Questions and Answers About Dinosaurs

By Seymour Simon

Kids and adults have long been fascinated by dinosaurs. Did you know there are about 350 different kinds of dinosaurs and that new ones are found every year? Find the answers to lots of questions you and your child might have: Were all dinosaurs giants? How are dinosaurs named? Which was the largest meat-eater? and How smart were the dinosaurs? (Age level: 3-9)

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What Is a Plant?

By Bobbie Kalman

Plants provide people and animals with food, shelter, and even the air we breathe. Plants help us live and grow, but how does a plant grow? This picture book introduces young readers to a variety of plant types, including ferns, carnivorous plants, mosses, and trees. This fact-filled book explains photosynthesis, different ways that plants reproduce, how seeds germinate and grow, which plants grow in different climates, and much more. (Age level: 6-9)

- [Purchase book](http://www.amazon.com/exec/obidos/ASIN/0865059594/readingrocket-20)(<http://www.amazon.com/exec/obidos/ASIN/0865059594/readingrocket-20>)



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Why Do Elephants Need the Sun?

By Robert E. Wells

This book provides a good introduction to basic science concepts like photosynthesis, gravity, and the sun's effect on weather in an easy-to-understand format. Science vocabulary such as "nuclear fusion," "electromagnetic energy," "photosphere," are explained in both text and illustrations. The book includes 10 comic-strip-style panels of "Did You Know?" interesting facts. (Age level: 6-9)

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Submitted by Anonymous (not verified) on May 31, 2012 - 3:07am

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Reading Rockets is a national multimedia project that offers a wealth of research-based reading strategies, lessons, and activities designed to help young children learn how to read and read better. Our reading resources assist parents, teachers, and other educators in helping struggling readers build fluency, vocabulary, and comprehension skills.

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"You may have tangible wealth untold. Caskets of jewels and coffers of gold. Richer than I you can never be — I had a mother who read to me." — Strickland Gillilan