ROCK-OLOGY The Dard Hacks Objective COOPERation of the Cooperation of

by Ellen Lawrence

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by Ellen Lawrence

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New York, New York

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Recycling Rocks

Rocks are all around us—in backyards, on beaches, and in high, rugged mountains.

Most of these rocks are millions of years old.

Yet no matter how old they are, rocks don't always stay the same.

In fact, old rocks are changing into new rocks all the time.

The way that old rocks are recycled into new ones is called the **rock cycle**.

granite

How does the rock cycle work?

marble

sandstone

There are thousands of different kinds of rocks. For example, sandstone, marble, and granite are three different kinds of rocks.

4

Look for rocks in a garden, in a park, or at the beach. Try to find three rocks that look very different from one another. Draw a picture of your rocks.

Three Main Types

Scientists group all the rocks on Earth into three main types.

They are called **igneous**, **sedimentary**, and **metamorphic** rock.

Each type of rock forms in a different way.

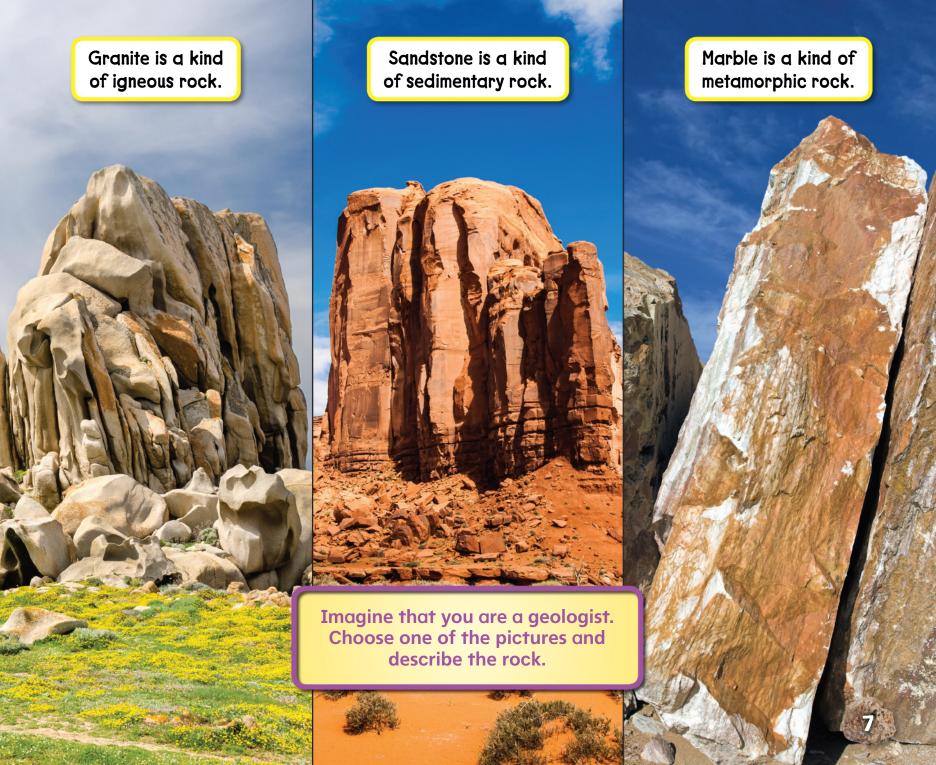
There are new igneous, sedimentary, and metamorphic rocks forming all the time.

The way that these rock types form is part of the rock cycle.



The scientific study of Earth's rocks is called geology. Scientists who study rocks are called geologists.







basalt 10, 16 Earth's crust 8–9, 10–11, 16–17, 18–19, 20–21 gabbro 8 geologists 6, 7 geology 6 granite 4, 7, 17 igneous rock 6–7, 8–9, 10, 12, 16, 21, 22 lava 10–11, 21, 22 magma 8–9, 10–11, 18, 20–21 marble 4, 7 metamorphic rock 6–7, 16–17, 18–19, 21, 22 pegmatite 8 pumice 10

Read More

Slade, Suzanne. The Rock Cycle (Cycles in Nature). New York: PowerKids Press (2007). Walker, Sally M. Rocks (Early Bird Earth Science). Minneapolis: Lerner (2007).

Learn More Online

To learn more about the rock cycle, visit www.bearportpublishing.com/Rock-ology

About the Author

Ellen Lawrence lives in the United Kingdom. Her favorite books to write are those about nature and animals. In fact, the first book Ellen bought for herself, when she was six years old, was the story of a gorilla named Patty Cake that was born in New York's Central Park Zoo. quartzite 17 rock cycle 4, 6, 20–21, 22 sandstone 4, 7, 17 schist 16 sediment 12–13, 14–15, 21, 22 sedimentary rock 6–7, 14–15, 16–17, 21, 22 volcano 10–11, 12–13, 14, 18, 20–21, 22

Zoefeld, Kathleen Weidner. Rocks and Minerals. Washington, D.C.: National Geographic (2012).



Page II: When lava erupts from a volcano, it cools, hardens, and becomes a mound of igneous rock. The next time the volcano erupts, more lava flows over the mound and turns into rock. Each time the volcano erupts, a new layer of rock is made until the rocky mound becomes a mountain.

Page 15: You can tell that the rock is sedimentary rock because you can see the layers of different sediment that formed the rock.



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What Is the Rock Cycle?

Some of the rocks we see around us are millions of years old. Rocks don't stay the same forever, though. Look inside to find out how they are changing and becoming new rocks all the time. Along the way, you'll also learn about the different forces that help create new rocks—from falling rain and fiery volcanoes to powerful movements deep within Earth.

Baking and Crushing A Look at Metamorphic Rock

Famous Rocks

How Do People Use Rocks?

How Do Volcanoes Make Rock? A Look at Igneous Rock How Do Water and Wind Change Rock? A Look at Sedimentary Rock

Is Sand a Rock?

What Are Rocks Made Of?

What Is the Rock Cycle?





