



Exploring Size

Kindergarten

Duration

Pre-Visit: 20-30 minutes

Visit: 30 minutes

Post-Visit: 20-30 minutes

Location

Gem & Mineral Hall

Supplies

- Pictures of specimens from Gem & Mineral Hall
- Worksheet
- Pencil
- Clipboard*

Standards

CCSS

W.8, SL.1.a.b, K.L.5.a.c

CA State

Science K.4.b.d.e

ELA Grades K–2:

Speaking Applications
2.1

Vocabulary and Concept
Development 1.17

Vocabulary

Big

Small

Rock

Mineral

Specimen



Concepts

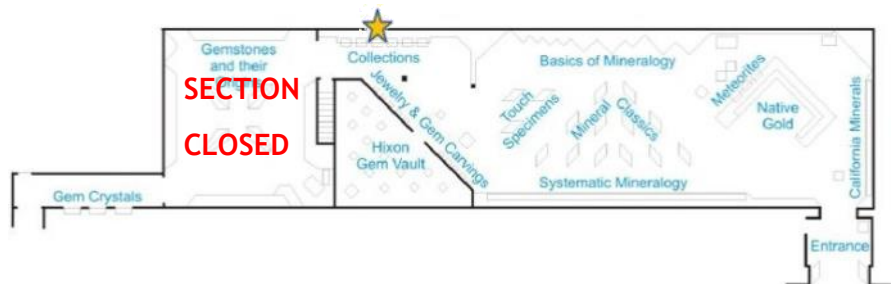
- Rocks and Minerals come in many different sizes.

Objectives

- Students will reinforce their understanding of “big” and “small” sizes and begin to explore relative size.
- Students will observe that rocks and minerals come in many different sizes
- Students will have fun exploring the Gem and Mineral Hall.

Outline

1. During one Pre-Visit session, discuss and review differences between big and small using relatable examples and show the students some of the pictures of the specimens on display and have students categorize them as “big” or “small.”
2. During a Museum visit, break the class up into small groups and have students identify big and small specimens in the Gem and Mineral Hall. Use the worksheets to record observations.
3. In one Post-Visit session, have groups share responses with the class while teacher records the findings on the board and discuss answers.



Pre-Visit

In class, discuss and review differences between big and small. It is helpful to use examples that are relevant to students' everyday life or things that they would be familiar with. Example: cars are big, a mouse is small.

Option 1: Hand out the first worksheet and have students look at the pictures of the specimens on display and discuss with students how the specimens look in terms of size, together go through the worksheet and categorize them as “big” or “small.”

Option 2: Hand out the second worksheet, and show students pictures of specimens on display specimens on display and discuss with students how the specimens look in terms of size, together go through the worksheet and categorize them as “big” or “small.”

Collect worksheets to complete during the Natural History Museum.

Museum Visit

Re-hand out the worksheet of your choice and break the class up into small groups. Depending on ability level, an adult may need to help record the students' answers.

Option 1: Have students walk around the Gem and Mineral Hall and draw a specimen that is big and a specimen that is small.

Option 2: Have students find the specimen they observed in class and see if their guess was correct. Note that all the specimens on the worksheet are to the rear of the Gem & Mineral Hall in the “collections” section.

Chaperones should help record the students' responses, while children draw the different specimens.

Post-Visit





Back in the classroom have groups share responses with the class and record the different groups' findings on the board and discuss similar or dissimilar answers. Were specimens bigger or smaller than they originally thought? What kinds of things helped them decide?

Variations & Extensions

- Students can draw a picture about their favorite big mineral and their favorite small mineral using the prompt: “My favorite big/small mineral was...”
- Continue to explore the idea of relative size using scale. Show them pictures of two sets of objects. The first set, objects should be pictured by themselves and students should classify them as large or small. Repeat the exercise with the same objects, this time pictured with a penny (or some other common object) next to them. Did answers change? How might the penny help us decide an answer?

Make a Guess!

Look at the picture on and guess if the specimen is big or small, circle your answer in the box. At the museum find the specimen and write in the answer on the right!

<p>Do you think this will be big or small?</p>  <p>Big Small</p>	<p>This object was...</p> <hr/>
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<p>Do you think this will be big or small?</p>  <p>Big Small</p>	<p>This object was...</p> <hr/>

Big and Small

In the Gem and Mineral Hall find one specimen that is big and one specimen that is small and draw them below.

This is a **big** specimen!

This is a small specimen!