

Properties of Matter

All things are made up of matter. All the objects around you, like a chair, a tree, or a pet, are matter. Matter can be described by how it looks, feels, and more!


Circle one word to describe each piece of matter.



Hardness

hard


soft



Texture

smooth

rough



Appearance

shiny

dull



Flexibility

flexible

stiff

Observe your pencil. Then answer each question.

What color is it?

What shape is it?

What does it feel like?

What does it sound like when you tap it?



Matter has different properties—for example, paper is thin, while a tree trunk is thick. Because of these differences, different types of matter are useful for different needs.

Read the text aloud. Then circle the object that each Mot/Mot needs and explain why you chose that object.



Enid needs a flexible material to wrap her trophy in.



or



Why? _____



Frank needs a strong material to make a leash for his pet alligator.

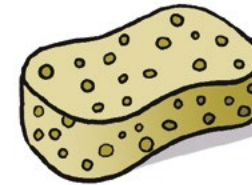


or

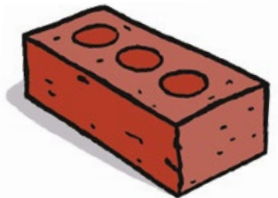


Why? _____

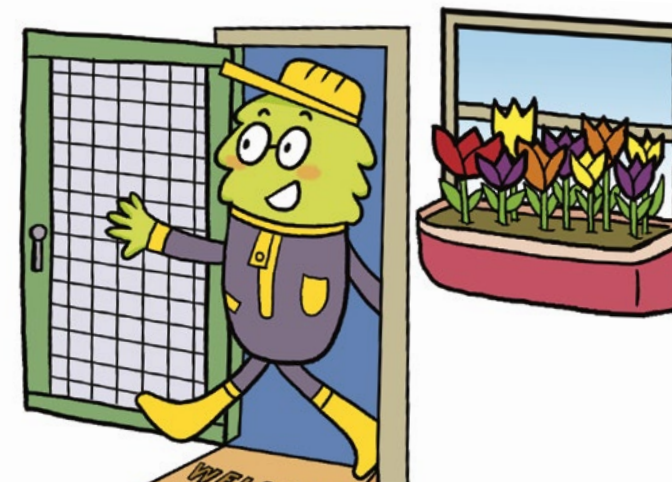
Brian needs a soft material to clean this mirror with.



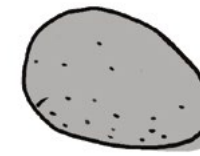
or



Why? _____



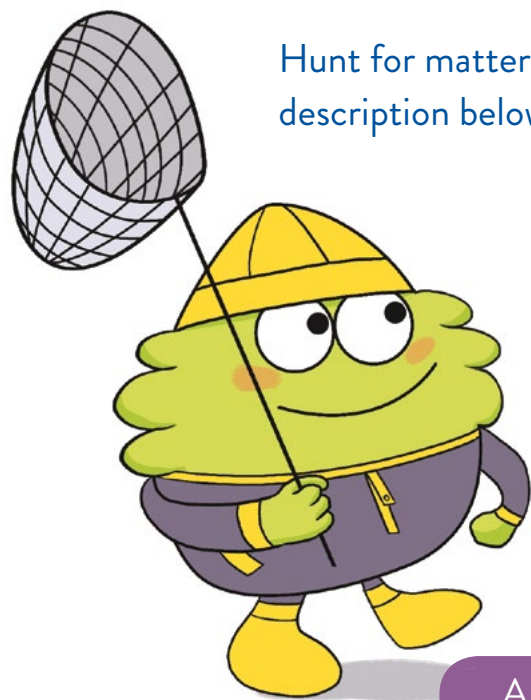
Dimitri needs a heavy material to hold open this door.



or



Why? _____



Hunt for matter around you. Find an object that fits each description below. Then write its name or draw it.

A material that is
RED

A material that is
BUMPY

A material that is
STICKY

A material that is
SOFT

A material that is
WARM

A material that is
WET

A material that is
BENDABLE

Choose something of your own to observe and draw it. Then circle all the descriptions that apply or fill in your own.

My object is a _____.

COLOR	SHAPE	TEXTURE
<div><div></div><div></div><div></div><div></div><div></div><div></div></div>	<div><div></div><div></div><div></div></div>	<ul style="list-style-type: none">• Smooth• Bumpy• Hairy
Other: _____	Other: _____	Other: _____
SIZE	FLEXIBILITY	HARDNESS
<ul style="list-style-type: none">• Small• Medium• Large	<ul style="list-style-type: none">• Flexible• Rigid• Mixed	<ul style="list-style-type: none">• Soft• Hard• Mixed

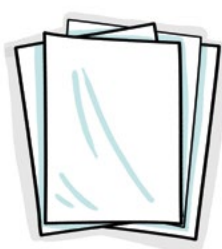
I notice that my object is also: _____

LET'S START!

GATHER THESE TOOLS AND MATERIALS.



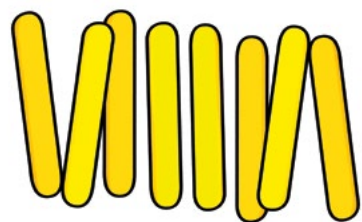
Markers



Paper



2 or more cans



10 or more craft sticks



10 or more plastic cups



Aluminum foil

LET'S TINKER!

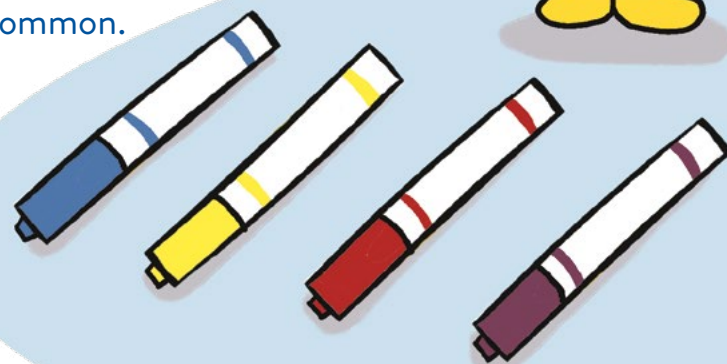
Observe each of your materials.

- What color is it?
- Is it round?
- Pointed?
- Slippery?

Describe them all.

- How are they the same?
- How are they different?

Group materials that have something in common.



LET'S MAKE: TOWERING TOWER

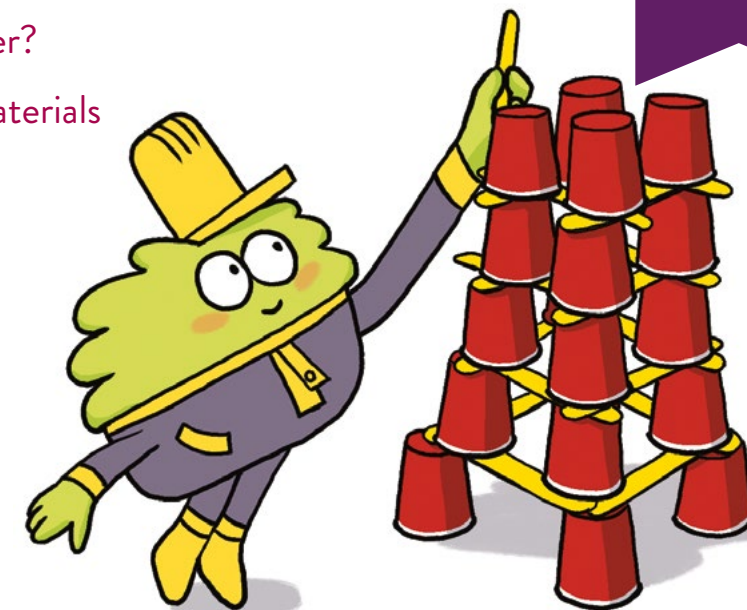
1

Properties
of Matter

Make a tall tower with your materials.

Ask yourself: What qualities should the materials have in order to make a tall tower?

Choose rigid and strong materials that can be stacked without bending. Choose wide materials that can't fall over. How can you stack the materials to make the tower taller and stronger?



LET'S ENGINEER!

Enid and Callie are playing hide-and-seek with the other MotMots. Enid wants to send a message to Callie, who is hiding behind the pantry door.

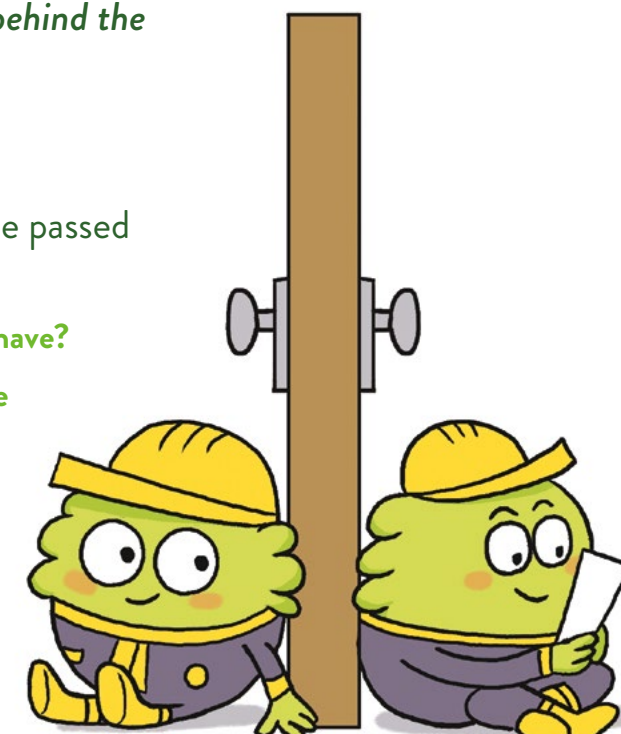
How can Enid send Callie a message?

Think about what shape of material can be passed under a door.

- What other properties should the material have?
- How can the materials be combined to solve the problem?

Write your own secret message. You can add stickers from page 129.

Test your ideas by trying to send a note under a door.



PROJECT 1: DONE!
Get your sticker!