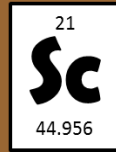


# Cell

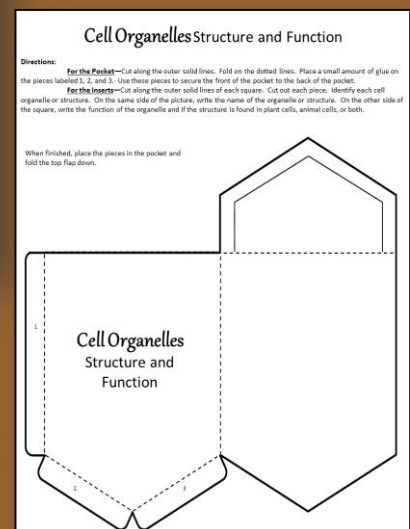
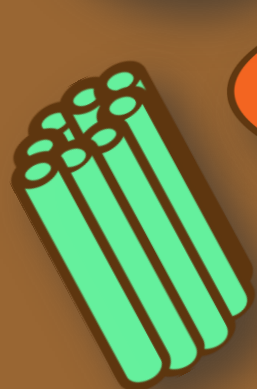
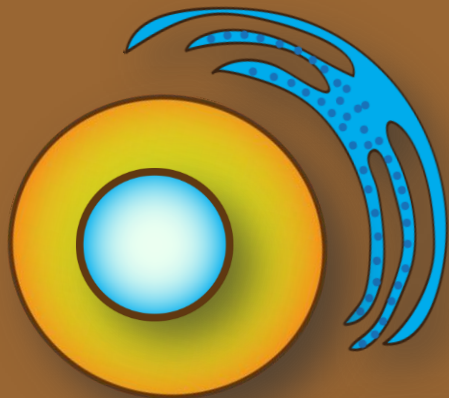


IENCE  
From The South

# Organelles

## Structure and Function

### Interactive Notebook Activity



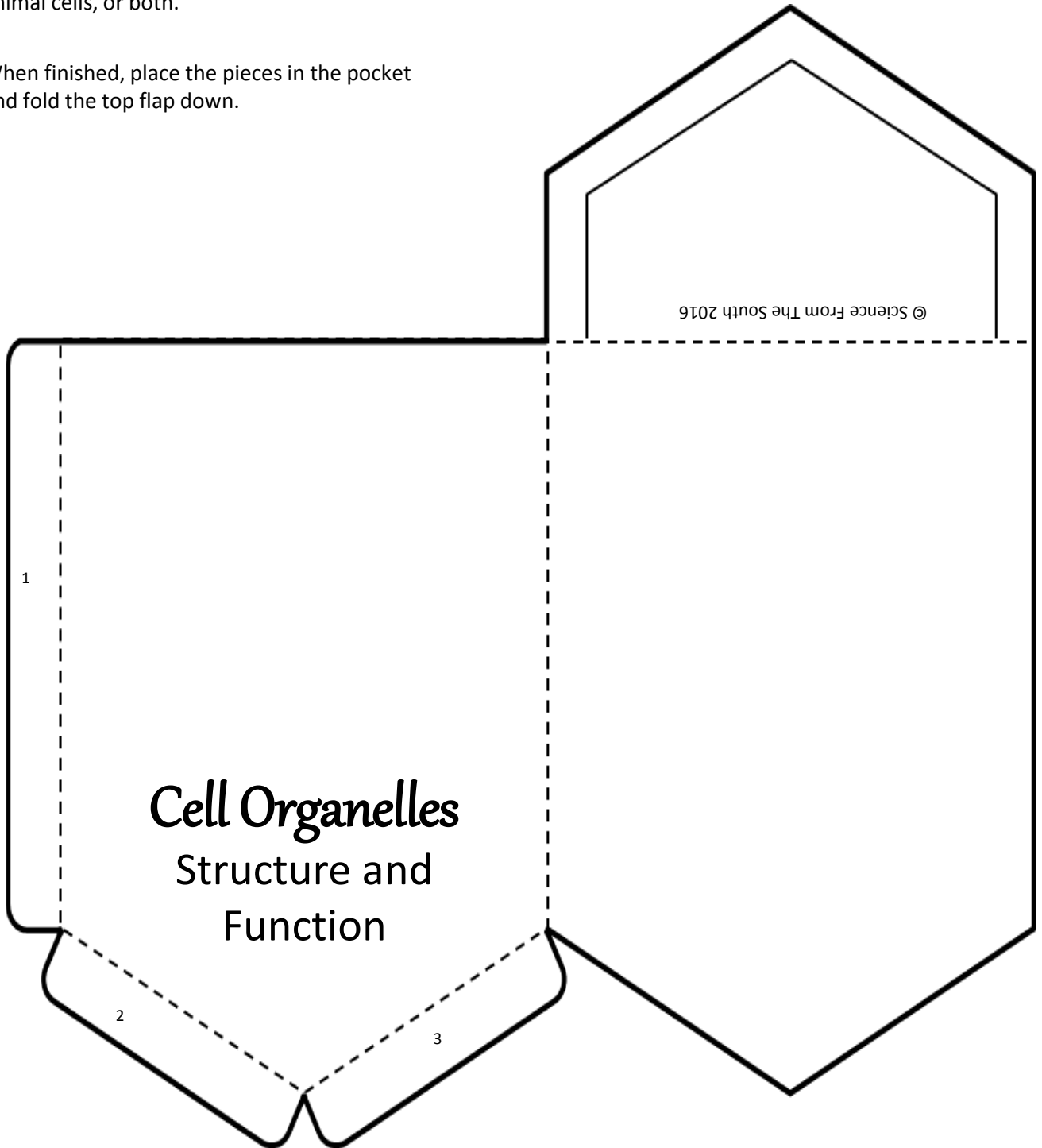
# Cell Organelles Structure and Function

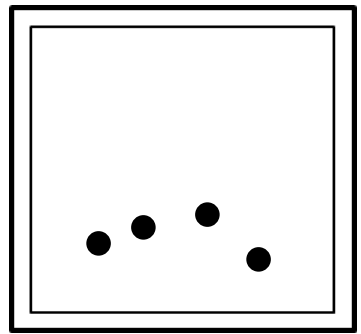
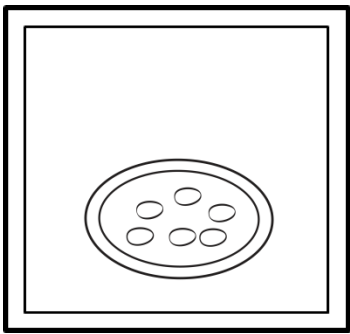
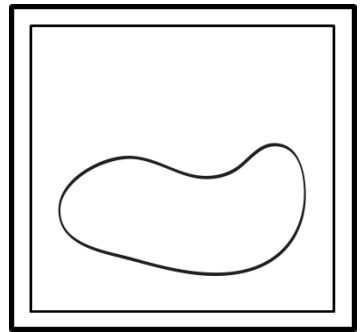
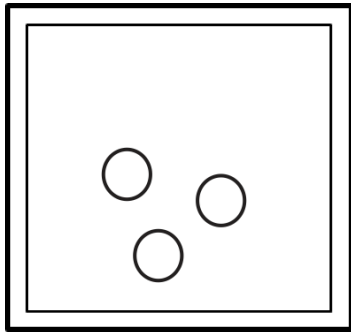
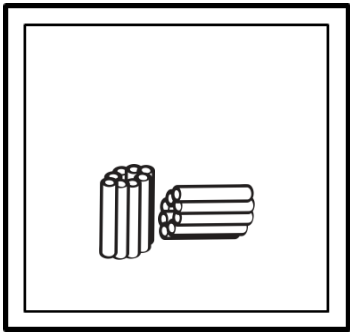
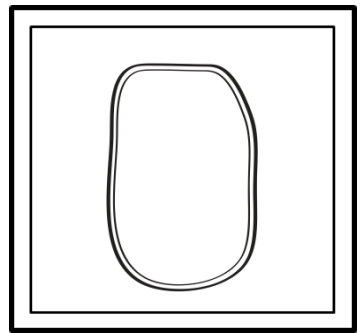
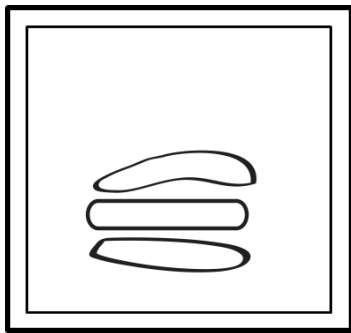
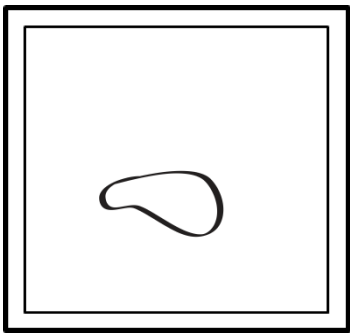
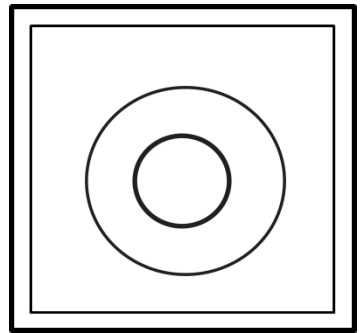
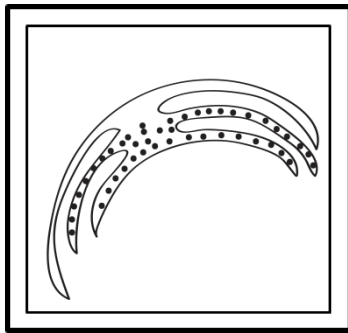
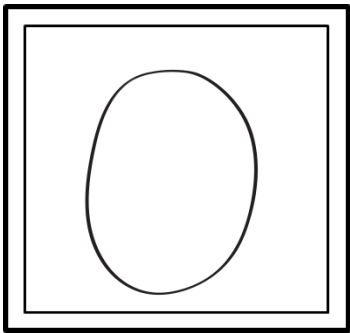
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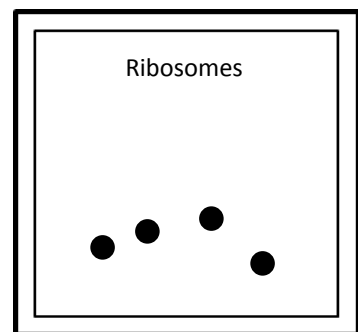
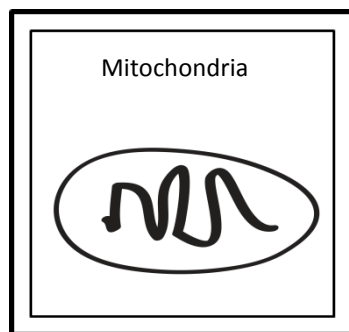
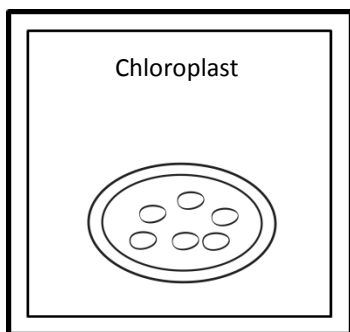
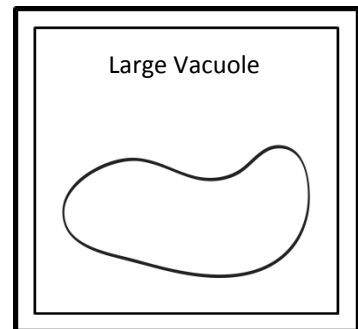
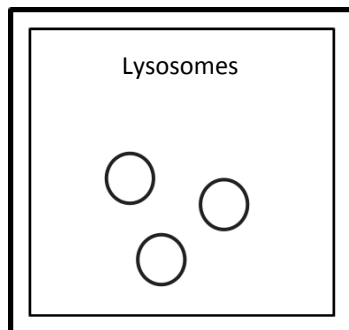
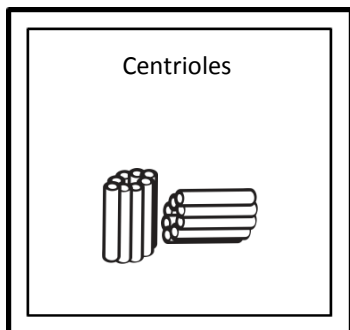
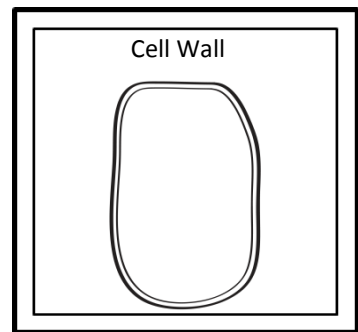
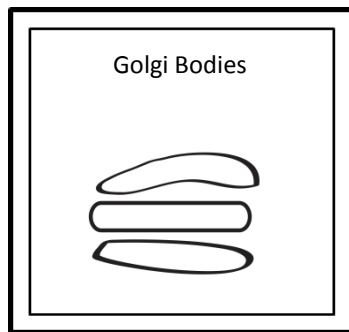
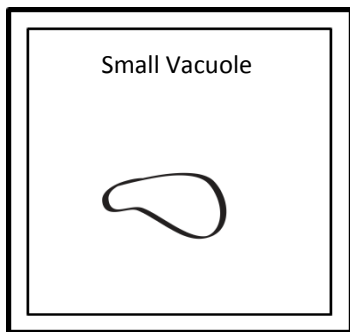
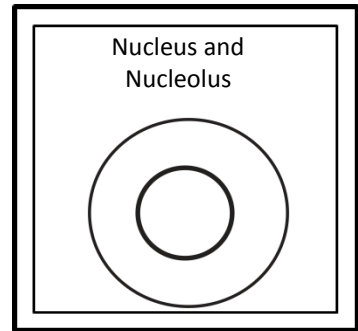
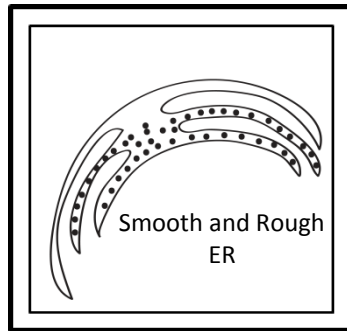
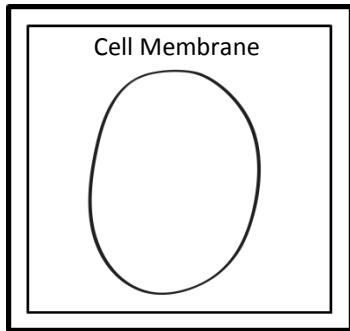
**For the Pocket**—Cut along the outer solid lines. Fold on the dotted lines. Place a small amount of glue on the pieces labeled 1, 2, and 3. Use these pieces to secure the front of the pocket to the back of the pocket.

**For the Inserts**—Cut along the outer solid lines of each square. Cut out each piece. Identify each cell organelle or structure. On the same side of the picture, write the name of the organelle or structure. On the other side of the square, write the function of the organelle and if the structure is found in plant cells, animal cells, or both.

When finished, place the pieces in the pocket and fold the top flap down.







### **Cell Membrane**

Structure found in all cells. It is essential in maintaining homeostasis by controlling what gets in and out of the cell.

### **Smooth and Rough ER**

The smooth ER contains enzymes that aid in cell function. The rough ER is responsible for transporting proteins. It acts like a highway of the cell.

### **Nucleus and Nucleolus**

The nucleus is the boss of the cell. It holds the DNA (instructions for making proteins). The nucleolus is the center of the nucleus where ribosomes are made.

### **Small Vacuole**

Also known as a vesicle, they are used as storage and transportation vesicles to move materials in and out of the cell. Smaller ones are found in animal cells.

### **Golgi Bodies**

Responsible for inspecting and packaging proteins before they are shipped out to their target areas.

### **Cell Wall**

Thick, rigid outer wall found in plant cells, but not animal cells. It provides support and protection for the cell.

### **Centrioles**

Structures found in animal cells that aid in cell division.

### **Lysosomes**

Responsible for cleaning up the cell, by getting rid of waste. Found in animal cells only. NOTE: Some scientists believe they are found in plant cells but rarely visible.

### **Large Vacuole**

Large storage compartment used for storing water and other materials needed. Larger vacuoles are found in plant cells.

### **Chloroplast**

The site of photosynthesis. It is found in plant cells but not in animal cells.

### **Mitochondria**

The power house of the cell responsible for cellular respiration.

### **Ribosomes**

Responsible for making proteins in the cell. Found attached to the rough ER and free floating in the cytoplasm.

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### Cell Membrane

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### Smooth and Rough ER

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### Nucleus and Nucleolus

The nucleus is the boss of the cell. It holds the \_\_\_\_\_ (instructions for making proteins). The nucleolus is the center of the nucleus where \_\_\_\_\_ are made.

### Small Vacuole

Also known as a vesicle, they are used as \_\_\_\_\_ and transportation vesicles to move materials in and out of the cell. Smaller ones are found in animal cells.

### Golgi Bodies

Responsible for \_\_\_\_\_ and packaging proteins before they are shipped out to their target areas.

### Cell Wall

Thick, rigid outer wall found in plant cells, but not animal cells. It provides \_\_\_\_\_ and protection for the cell.

### Centrioles

Structures found in animal cells that aid in \_\_\_\_\_.

### Lysosomes

Responsible for \_\_\_\_\_ the cell, by getting rid of waste. Found in animal cells only. NOTE: Some scientists believe they are found in plant cells but rarely visible.

### Large Vacuole

Large \_\_\_\_\_ compartment used for storing water and other materials needed. Larger vacuoles are found in plant cells.

### Chloroplast

The site of \_\_\_\_\_. It is found in plant cells but not in animal cells.

### Mitochondria

The power house of the cell responsible for \_\_\_\_\_.

### Ribosomes

Responsible for making \_\_\_\_\_ in the cell. Found attached to the rough ER and free floating in the cytoplasm.

## Thank you for your download!

If you have any questions or concerns, please do not hesitate to let me know. Your 100% satisfaction is valued. Feedback and ratings are greatly appreciated.

### Teacher's Notes:

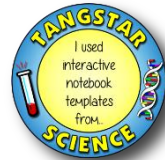
You can use this product in many different ways. See some examples below!

- Interactive notebook
- Manipulative
- Pre-assessment, practice assignment, assessment (match pictures with descriptions)
- Cooperative learning
- As a station
- For early finishers
- Differentiated for you already (give students with special needs labeled squares and descriptions and have them match).
- Race to complete
- Game

### Credits

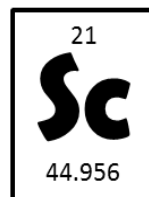
Tangstar Science


<http://www.teacherspayteachers.com/Product/Interactive-Notebook-Templates-MEGA-PACK-Over-1000-Templates-1289821>

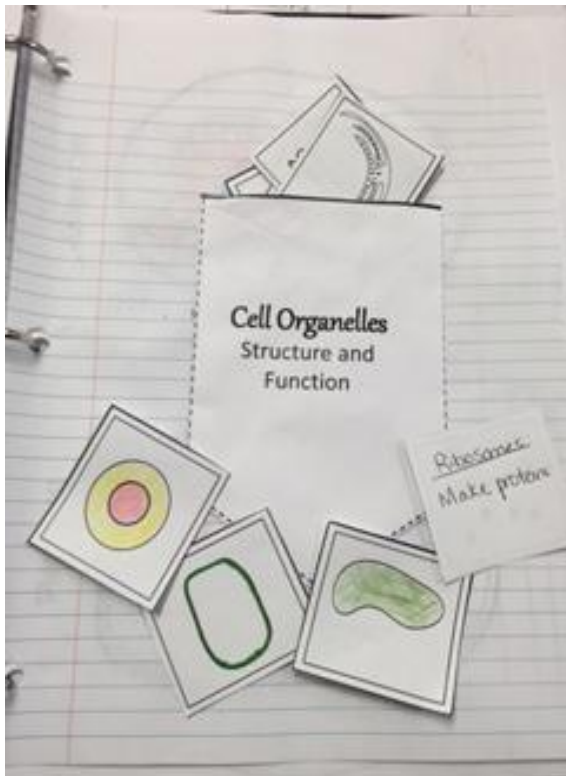


The Painted Crow

<http://www.teacherspayteachers.com/Store/The-Painted-Crow>



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<http://www.teacherspayteachers.com/Store/Science-From-The-South>  
<http://sciencefromthesouth.blogspot.com/>



# Building PLANT and ANIMAL Cells

## An Interactive Notebook Activity

PLANT CELL

ANIMAL CELL

Structure	Function	Location
Cell Wall	Provides structural support and protection.	Outermost layer of the cell.
Cell Membrane	Controls the movement of substances in and out of the cell.	Just inside the cell wall.
Nucleus	Contains genetic material (DNA) and controls cell activities.	Central part of the cell.
Chloroplasts	Convert light energy into chemical energy through photosynthesis.	Scattered throughout the cytoplasm.
Mitochondria	Convert chemical energy into a form the cell can use (ATP).	Scattered throughout the cytoplasm.
Rough Endoplasmic Reticulum	Site of protein synthesis and transport.	Surrounds the nucleus.
Smooth Endoplasmic Reticulum	Involved in lipid synthesis and detoxification.	Scattered throughout the cytoplasm.
Golgi Apparatus	Modifies, sorts, and packages proteins for transport.	Scattered throughout the cytoplasm.
Lysosomes	Break down waste materials and cellular debris.	Scattered throughout the cytoplasm.
Vacuole	Stores water, salts, and other substances.	Large central vacuole in plant cells.
Centrioles	Organize microtubules, important for cell division.	Present in animal cells, absent in plant cells.

Labels: \_\_\_\_\_

SciENCE  
Hands-On Learning










# Cell Organelles and Structures BINGO


# Cell

SCIENCE  
From The South

## Organelles

Cut and Paste

Cell Organelles and Functions		
Organelle	Name	Function
		
		
		
		
		
		
		
		
		



# Chemical Formulas

## Graphic Organizer

For Interactive Notebooks and More

**Chemical Formulas**

**Ba<sub>3</sub>(PO<sub>4</sub>)<sub>2</sub>**

1. What is the cation?  
Ba<sup>2+</sup>

2. What is the anion?  
PO<sub>4</sub><sup>3-</sup>

3. What is the polyatomic ion?  
PO<sub>4</sub><sup>3-</sup>

**Chemical Formulas**

**Sc<sub>2</sub>S<sub>3</sub>**

1. What is the cation?  
Sc<sup>3+</sup>

2. What is the anion?  
S<sup>2-</sup>


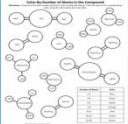
3. What is the polyatomic ion?  
S<sup>2-</sup>

**ScIENCE**  
Solving the Mystery of Science

# Color by Number of Atoms

**ScIENCE**  
FROM THE SOUTH

understanding Chemical Formulas



# Color by Significant Number

by JENICE

An interactive way to practice using Significant Figures

# Covalent Compounds MAZE


*INTERACTIVE*




An Interactive Review or Assessment

# Element Symbols

Coloring Pages

 **Sciencing**  
Making The Science



Ni Bh

H Ti Mg

[illegible]

# Ionic Compounds

# MAZE

An Interactive Review or Assessment

**Ionic Compounds**

Directions: Identify the compound in each box. Write the name of the compound in the space provided. You will be given a clue and the formula of the compound. You will be given the name of the compound and the formula of the compound. You will be given the name of the compound and the formula of the compound.

STARIK		SCIENCE		NACI	
What is the name of the compound?	NaCl	What is the name of the compound?	NaCl	What is the name of the compound?	NaCl
What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl
What is the name of the compound?	NaCl	What is the name of the compound?	NaCl	What is the name of the compound?	NaCl
What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl
What is the name of the compound?	NaCl	What is the name of the compound?	NaCl	What is the name of the compound?	NaCl
What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl
What is the name of the compound?	NaCl	What is the name of the compound?	NaCl	What is the name of the compound?	NaCl
What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl	What is the formula of the compound?	NaCl

MAZE

NaCl

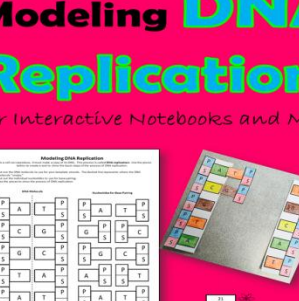
KOH

CaCl<sub>2</sub>

(NH<sub>4</sub>)<sub>2</sub>S

# Modeling DNA Replication

For Interactive Notebooks and More



**Modeling DNA Replication**

Directions: Use the materials provided to create a model of DNA replication. Use the template strand to create a new strand. The new strand is synthesized in the 5' to 3' direction. The template strand is oriented 3' to 5'.

**Materials:**

- Index cards (A, T, C, G)
- String
- Scissors
- Glue

**Procedure:**

1. Create a template strand using index cards and string.
2. Create a new strand using index cards and string.
3. Connect the template strand and the new strand to form a DNA molecule.
4. Repeat steps 1-3 to create a second DNA molecule.

**Diagram:**

Template strand: 3' A T C G A T 5'

New strand: 5' T A C G T A 3'

Resulting DNA molecule: 3' A T C G A T 5' / 5' T A C G T A 3'

**ScIENCE**

Science for Everyone

# Molar Mass Puzzle