

Getting to know the periodic table

name _____

▲ Use the key in the bottom left-hand corner of your periodic table to make a key:

<u>This data...</u>	<u>Gives this information...</u>	<u>Fill in by writing...</u>
name	the English name of an element	"name of element"
symbol	the abbreviated name of an element	"X"
atomic number	the number of protons in the nucleus	"atomic #"
density	mass per unit volume at a given temperature	"density in _____ at _____"
melting and boiling points	the temperature at which changes of state occur	"mp in _____" and "bp in _____"
atomic weight	the mass of an average atoms of this element (the same as "MW" in the CRC handbook)	"atomic mass"

_____	_____
_____	_____
_____	_____
_____	_____
_____	_____
_____	_____

▲ Use your periodic table to answer these questions:

<u>Question...</u>	<u>Answer...</u>
What is the atomic number of lead?	
What is the density of titanium (don't forget units)?	
What is the melting point of platinum?	in °C?
Give the name of the densest element on the periodic table.	
Give the symbols of 3 elements that are classified as metalloids.	
List the lowest and highest atomic numbers.	
In which directions do atomic numbers increase?	
How are the metals and nonmetals separated?	
What is the rule for symbols (upper/lower case letters)?	
How can you tell at a glance that He is a gas?	
What does the outlining on the element Pm (#61) mean?	
What is the name of element #47?	
What is the name of the element whose symbol is Sr?	

▲ Element Scavenger Hunt

<u>Item</u>	<u>name</u>	<u>symbol</u>
Find an element whose name has exactly seven letters.		
Find an element that is a liquid at 200.K.		
Find an element whose symbol seems to bear no relationship to its name.		
Find an element named after a person.		
Find an element that is a liquid at room temperature.		
Find a metallic element with a density of less than 1.0 g/cm ³ .		
Find the nonmetal with the highest density.		
Find an element that is synthetically prepared.		
Find an element with <100°C difference between melting and boiling points.		
Find an element with an atomic mass between 150 and 160.		