

# Periodic Table Basics

Name: \_\_\_\_\_ Block: \_\_\_\_\_

Color code each section of the periodic table.

1																	18				
Hydrogen 1 <b>H</b> 1.01																	Helium 2 <b>He</b> 4.00				
Lithium 3 <b>Li</b> 6.94	Beryllium 4 <b>Be</b> 9.01															Boron 5 <b>B</b> 10.81	Carbon 6 <b>C</b> 12.01	Nitrogen 7 <b>N</b> 14.01	Oxygen 8 <b>O</b> 16.00	Fluorine 9 <b>F</b> 19.00	Neon 10 <b>Ne</b> 20.18
Sodium 11 <b>Na</b> 22.99	Magnesium 12 <b>Mg</b> 24.31															Aluminum 13 <b>Al</b> 26.98	Silicon 14 <b>Si</b> 28.09	Phosphorus 15 <b>P</b> 30.97	Sulfur 16 <b>S</b> 32.07	Chlorine 17 <b>Cl</b> 35.45	Argon 18 <b>Ar</b> 39.95
Potassium 19 <b>K</b> 39.10	Calcium 20 <b>Ca</b> 40.08	Scandium 21 <b>Sc</b> 44.96	Titanium 22 <b>Ti</b> 47.88	Vanadium 23 <b>V</b> 50.94	Chromium 24 <b>Cr</b> 52.00	Manganese 25 <b>Mn</b> 54.94	Iron 26 <b>Fe</b> 55.85	Cobalt 27 <b>Co</b> 58.93	Nickel 28 <b>Ni</b> 58.69	Copper 29 <b>Cu</b> 63.55	Zinc 30 <b>Zn</b> 65.39	Gallium 31 <b>Ga</b> 69.72	Germanium 32 <b>Ge</b> 72.61	Arsenic 33 <b>As</b> 74.92	Selenium 34 <b>Se</b> 78.96	Bromine 35 <b>Br</b> 79.90	Krypton 36 <b>Kr</b> 83.80				
Rubidium 37 <b>Rb</b> 85.47	Strontium 38 <b>Sr</b> 87.62	Yttrium 39 <b>Y</b> 88.91	Zirconium 40 <b>Zr</b> 91.22	Niobium 41 <b>Nb</b> 92.91	Molybdenum 42 <b>Mo</b> 95.94	Technetium 43 <b>Tc</b> (98)	Ruthenium 44 <b>Ru</b> 101.07	Rhodium 45 <b>Rh</b> 102.91	Palladium 46 <b>Pd</b> 106.42	Silver 47 <b>Ag</b> 107.87	Cadmium 48 <b>Cd</b> 112.41	Indium 49 <b>In</b> 114.82	Tin 50 <b>Sn</b> 118.71	Antimony 51 <b>Sb</b> 121.76	Tellurium 52 <b>Te</b> 127.60	Iodine 53 <b>I</b> 126.90	Xenon 54 <b>Xe</b> 131.29				
Cesium 55 <b>Cs</b> 132.91	Barium 56 <b>Ba</b> 137.33	57-70 *	Lutetium 71 <b>Lu</b> 174.97	Hafnium 72 <b>Hf</b> 178.49	Tantalum 73 <b>Ta</b> 180.95	Tungsten 74 <b>W</b> 183.84	Rhenium 75 <b>Re</b> 186.21	Osmium 76 <b>Os</b> 190.23	Iridium 77 <b>Ir</b> 192.22	Platinum 78 <b>Pt</b> 195.08	Gold 79 <b>Au</b> 196.97	Mercury 80 <b>Hg</b> 200.59	Thallium 81 <b>Tl</b> 204.38	Lead 82 <b>Pb</b> 207.20	Bismuth 83 <b>Bi</b> 208.98	Polonium 84 <b>Po</b> (209)	Astatine 85 <b>At</b> (210)	Radon 86 <b>Rn</b> (222)			
Francium 87 <b>Fr</b> (223)	Radium 88 <b>Ra</b> (226)	89-102 **	Lawrencium 103 <b>Lr</b> (262)	Rutherfordium 104 <b>Rf</b> (267)	Dubnium 105 <b>Db</b> (268)	Seaborgium 106 <b>Sg</b> (271)	Bohrium 107 <b>Bh</b> (272)	Hassium 108 <b>Hs</b> (270)	Mitnerium 109 <b>Mt</b> (276)	Darmstadtium 110 <b>Ds</b> (281)	Roentgenium 111 <b>Rg</b> (280)	Copernicium 112 <b>Cn</b> (285)	Ununtrium 113 <b>Uut</b> (284)	Ununquadium 114 <b>Uuq</b> (289)	Ununpentium 115 <b>Uup</b> (288)	Ununhexium 116 <b>Uuh</b> (293)	Ununseptium 117 <b>Uus</b> (294?)	Ununoctium 118 <b>Uuo</b> (294)			

- Alkali metals
- Alkaline earth metals
- Transition metals
- Other metals
- Metalloids (semi-metal)
- Nonmetals
- Halogens
- Noble gases
- Inner transition metals

Element name → Mercury ← Atomic #

Symbol → Hg ← Avg. Mass

80

200.59

\*lanthanides

\*\*actinides

Lanthanum 57 <b>La</b> 138.91	Cerium 58 <b>Ce</b> 140.12	Praseodymium 59 <b>Pr</b> 140.91	Neodymium 60 <b>Nd</b> 144.24	Promethium 61 <b>Pm</b> (145)	Samarium 62 <b>Sm</b> 150.36	Europium 63 <b>Eu</b> 151.97	Gadolinium 64 <b>Gd</b> 157.25	Terbium 65 <b>Tb</b> 158.93	Dysprosium 66 <b>Dy</b> 162.50	Holmium 67 <b>Ho</b> 164.93	Erbium 68 <b>Er</b> 167.26	Thulium 69 <b>Tm</b> 168.93	Ytterbium 70 <b>Yb</b> 173.04
Actinium 89 <b>Ac</b> (227)	Thorium 90 <b>Th</b> 232.04	Protactinium 91 <b>Pa</b> 231.04	Uranium 92 <b>U</b> 238.03	Neptunium 93 <b>Np</b> (237)	Plutonium 94 <b>Pu</b> (244)	Americium 95 <b>Am</b> (243)	Curium 96 <b>Cm</b> (247)	Berkelium 97 <b>Bk</b> (247)	Californium 98 <b>Cf</b> (251)	Einsteinium 99 <b>Es</b> (252)	Fermium 100 <b>Fm</b> (257)	Mendelevium 101 <b>Md</b> (258)	Nobelium 102 <b>No</b> (259)

There are 18 columns. Columns are called \_\_\_\_\_. There are 7 rows. Number each row. Rows are called \_\_\_\_\_.

***Describe each of the following:***

Mendeleev:

Mosley:

Characteristics of metals:

Characteristics of nonmetals:

Characteristics of metalloids:

*Label metals, nonmetals, & metalloids on the periodic table below.*

The diagram shows a periodic table grid. The main grid has 7 rows and 18 columns. A vertical line is drawn between the first and second columns of the main grid. An arrow points from the bottom of this line to a separate grid below, which has 2 rows and 10 columns.