

Metals make up 80% of all elements. They are found on the _____ side of the Periodic Table
Properties of metals:

solid at room temperature except one (.....)

Nonmetals are found in the _____ corner of the Periodic Table
Properties of nonmetals:

brittle solids or gases or liquids

Metalloids

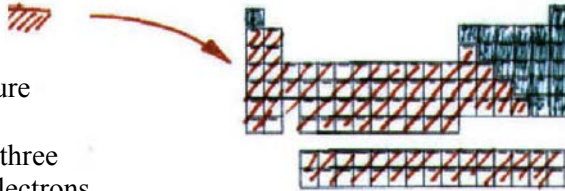
Stair step line divides metals from nonmetals.

Most elements that border this line are metalloids.

Properties are intermediate between those of metals and nonmetals. Some are _____

Metals:

electrical and thermal conductivity, luster, malleability, ductility solid at room temperature except mercury Most have one, two or three loosely bond valence electrons



Nonmetals:

nonlustrous, poor conductors, brittle solids or gases or liquids Most have six, seven or eight tightly bond valence electrons

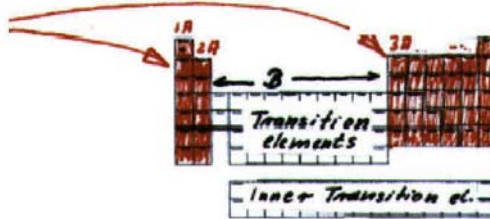
Metalloids are located along the staircase between metals and nonmetals. They have properties of both

Main group elements (A groups)

Transition elements (B groups)

Inner transition elements

(Lanthanides and Actinides)



Where are the 4 groups

Alkali metals

Alkaline earth metals

Halogens

Noble gases

IA																	VIIIA																
H	Li	Be	all B groups										B	C	N	O	F	Ne															
Na	Mg	Al	Si	P	S	Cl	Ar	K	Ca	Sc	Ti	V	Cr	Mn	Fe	Cu	Ni	Zn	Ga	Ge	As	Se	Br	Kr									
Rb	Sr	Y	Zr	Nb	Mo	Tc	Ru	Rh	Pd	Ag	Cd	In	Sn	Sb	Te	I	Xe	Ce	Pr	Nd	Pm	Sm	Eu	Gd	Tb	Dy	Ho	Er	Tm	Yb	Lu		
Fr	Ra	Ac	Th	Pa	U	Np	Pu	Am	Cm	Bk	Cf	Es	Fm	Mn	Co	Ni	Cu	Zn	Ga	Ge	As	Se	Br	Kr	Xe	Rn	At	Tl	Pb	Bi	Po	At	Rn
			La	Ce	Pr	Nd	Pm	Sm	Eu	Gd	Tb	Dy	Ho	Er	Tm	Yb	Lu																
			Th	Pa	U	Np	Pu	Am	Cm	Bk	Cf	Es	Fm	Mn	Co	Ni	Cu	Zn	Ga	Ge	As	Se	Br	Kr	Xe	Rn	At	Tl	Pb	Bi	Po	At	Rn