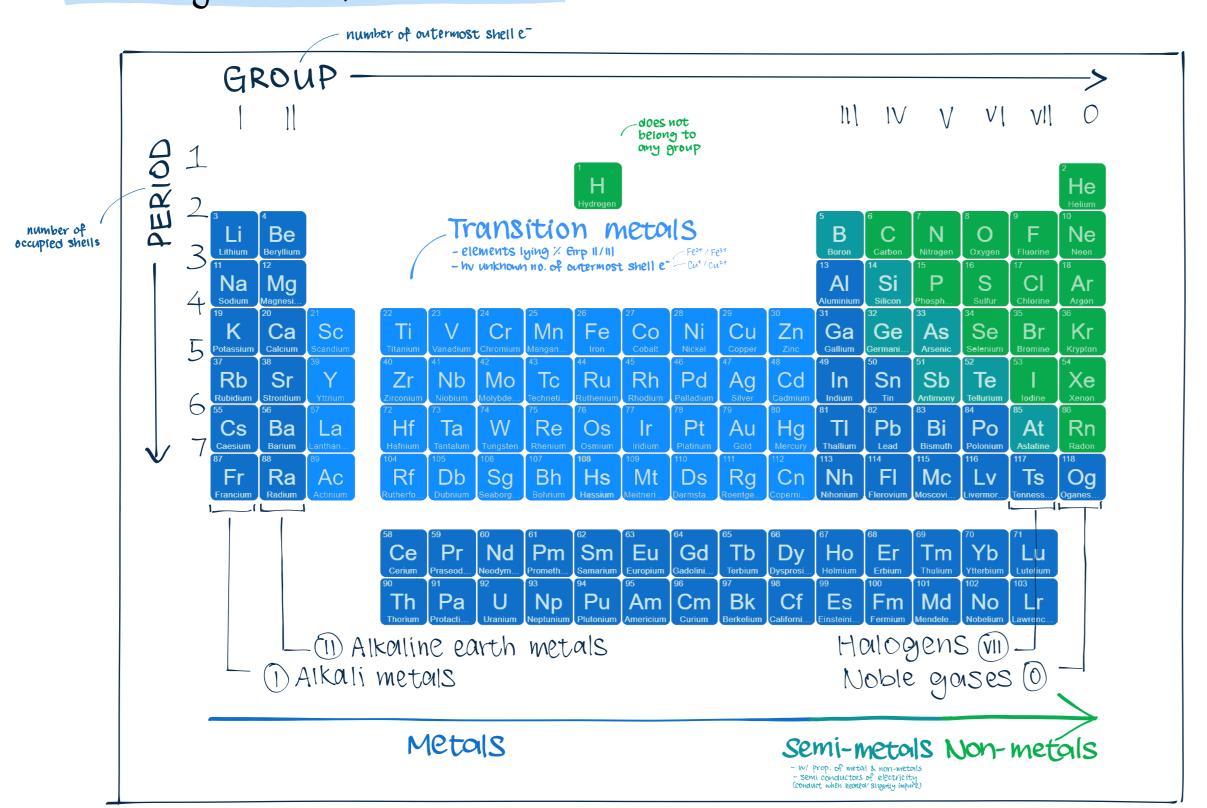
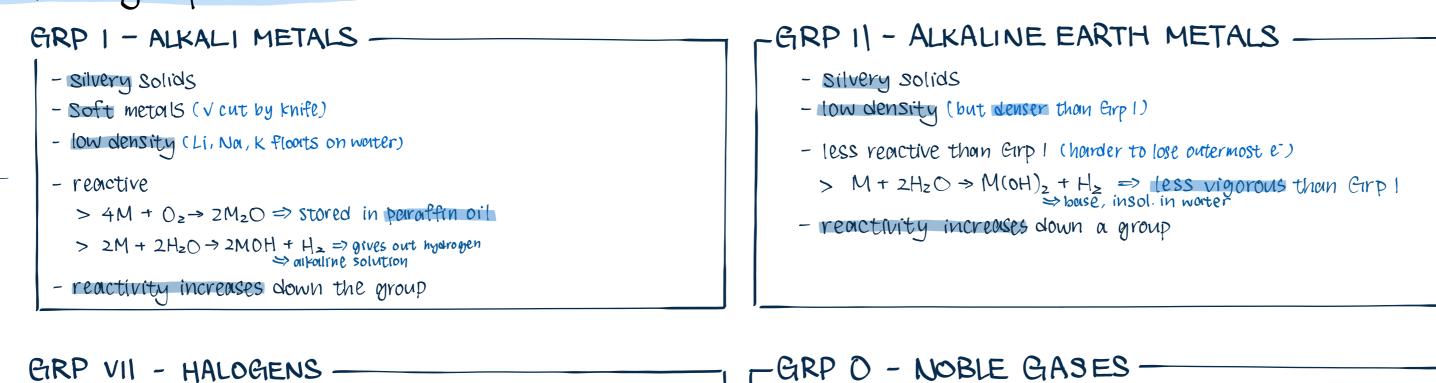


1 Arrangement - periodic table



2 Main group elements

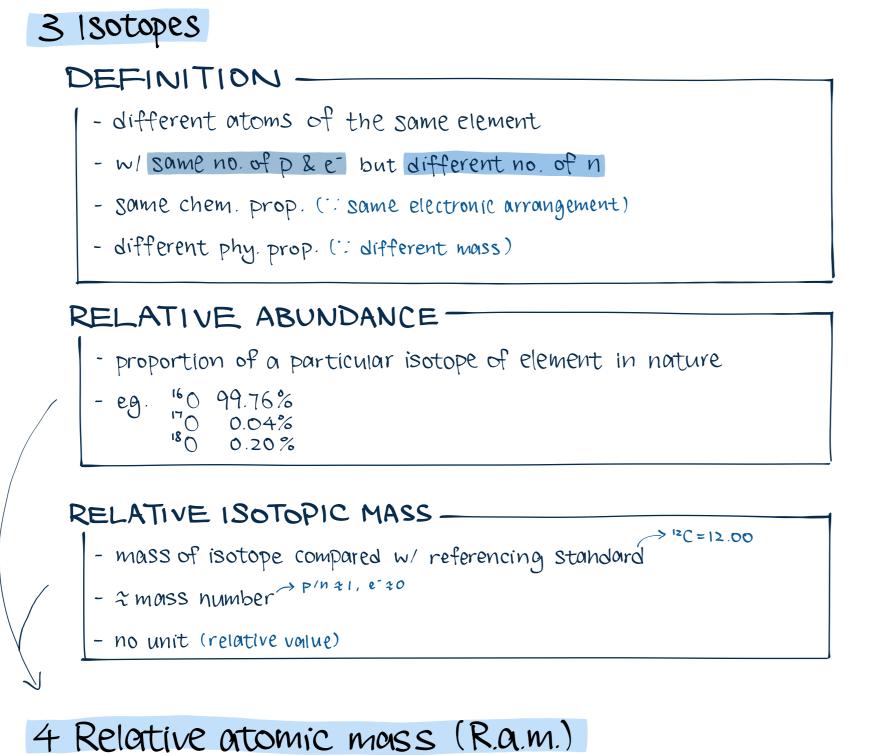


- colourless gases

- very unreactive (duplet /octet electronic structure -> very stable)

- toxic

For more metal reactions see topic 3: Metals



> Fluorine, Chlorine, Bromine, lodine, Astortine

K gas -> K liquid -> k Solid -> mp./b.p. P (\$12e7 ⇒ VDW7)

K— pale → K— yellowish—> K— readish → K— black — > colour light → dark

- reactivity decreases down a group

DEFINITION & CALCULATION

all naturally occuring isotopes

- Element - Isotope B - Relative isotopic mass B

- R.a.m. = MA · a% + MB · b% + Mc · c% ...

Isotope A — Relative isotopic mass A

Isotope C - Relative isotopic mass C

weighted -> R.a.m.

WHY DOES REACTIVITY DIFFER DOWN A GROUP?

- atomic size 1
- attraction / nucleus & outermost shell e +

Grp 1-111

Grp IV-VII

- easier to lose / harder to gain e
- reactivity increases / decreases