Quantification of Elements and Compounds

1. Find the relative molecular mass and molar mass of the following compounds.

i.	CO_2 (Carbon dioxide)	ii.	NaCl (Sodium chloride)
iii.	$CaCO_3$ (Calcium carbonate)	iv.	NH_4Cl (Ammonium chloride)
v.	Mg_3N_2 (Magnesium ni-tride)	vi.	H_2S (Hydrogen sulphide)
vii.	$AlCl_3$ (Aluminium chloride)	viii.	$(NH_4)_2CO_3$ (Ammonium carbonate)
ix.	$CuSO_4$ (Copper sulphate)	x.	$Na_2C_2O_4$ (Sodium oxalate)
xi.	CH_3OH (Methyl alchohol/Methanol)	xii.	CS2 (carbon disulphide)
xiii.	C_8H_{18} (Octane)	xiv.	CH3COOH (Acetic acid
xv.	$C_{12}H_{22}O_{11}$ (Sucrose)	xvi.	$CO(NH_2)_2$ (Urea)
xvii.	$C_9H_8O_4$ (Asprine)	xviii.	HNO_3 (Nitric acid)
xix.	CCl_4 (Carbon tetrachloride)	xx.	$C_8H_9NO_2$ (Paracetamol)
(R.A.M. : H=1, C=12, N=14, 0=16, Na=23, Mg=24, Al=27,S=32,Cl=35.5, S=32)			

2. Calculate the following, considering 67g of Sodium oxalate.
   a. The number of Sodium Oxalate moles
   b. The number of Oxygen moles
   c. Total number of atoms in moles
   d. The number of carbon atoms

3. Calculate the following, considering 2.5mol of Ammonium carbonate.
   e. The mass
   f. Number of Hydrogen atoms
   g. Total number of atoms in moles

4. 500mg of Paracetamol is included in the tablet of Paracetamol that use as a pain killer. Find the number of moles of Paracetamol includes in a tablet. Then find the number of moles of each element contains in it.