

⑤ Pure substances & Mixtures; Separation of mixture

1. Select homogenous and heterogenous mixtures from the following:

Ans → Homogenous mixture → Salt solution, brass, or air dissolved in water, air; alcohol and water.

Heterogenous mixture - petrol and water, sand and charcoal, sea water, fruit juice, mist

2. a) Pure substance → Pure substances are either elements or compounds. They contain the same kind of atoms and molecules

and have a definite set of physical and chemical properties.

Ex - ~~Atom~~ Gold, is an element which contains the same kind of ~~atom~~ atoms and molecules and have a definite which contains the same kind of atoms. Sugar is a ~~comop~~ compound which contains the same kind of molecules and has the same properties through out.

(b) Impure substance

Ans → A substance in which some

other ~~in~~ substances are also present in smaller or larger amount is called a mixture or impure substance. Ex - Air

c) Alloy: " A homogeneous solid mixture of two or more ~~metals~~ a metal and a non-metal is called an alloy?

Ex - Bronze, Brass

d) solution: " The homogeneous mixture of water and a substance soluble in it is called an ~~alloy~~ a solution.

e) Heterogeneous mixture :- "A mixture in which the components are not ~~uniformly~~ uniformly distributed through its volume and can be easily seen separately is called a heterogeneous mixture"
Ex → Sand and charcoal, Sand in water, Mist

b) Homogeneous mixture
Ans → "A mixture in which its constituents are uniformly distributed throughout its volume and cannot be seen

separately is called a homogeneous mixture."

Ex - Brass, Sugar solution