

Q1) Give five differences between elements and compounds.

ans:- <u>ELEMENTS</u>	<u>COMPOUNDS</u>
<p>⇒ Elements are pure substances which are composed of only one type of atom.</p>	<p>⇒ compounds are substances which are formed by two or more different types of elements that are united chemically in fixed proportions.</p>
<p>⇒ there are 118 elements.</p>	<p>⇒ compounds are almost endless.</p>
<p>⇒ Elements are classified as either metals, nonmetals, or metalloids.</p>	<p>⇒ compounds are classified according to their bonds which can be ionic, molecular or metallic.</p>
<p>⇒ The representation of an element takes place by using a symbol.</p>	<p>⇒ The representation of a compound is by using a chemical formula.</p>
<p>⇒ Oxygen (O), Hydrogen (H)</p>	<p>⇒ Sodium chloride (NaCl), Water (H₂O)</p>

Q2) The constituents of compounds can't be separated by physical means only by certain chemical means. Justify this statement.

Compounds differ from mixtures in that the elements in a compound are held together by chemical ~~for~~ bonds and ~~so~~ cannot be separated by differences in their physical properties. Compounds can be separated into their components only by chemical change.