

## Concept- 04 : Nomenclature of Organic Compounds

### Topic – 02 : Roots and Suffixes

1. **Root** : The word "Root" indicates the total number of Carbon atoms present in the longest carbon chain belonging to the compound. For example,

"meth" refers to a chain with 1 carbon atom and "Pent" refers to a chain with 5 carbon atoms.

meth	→	1
eth	→	2
prop	→	3
but	→	4
pent	→	5
hex	→	6
hept/sept	→	7
oct	→	8
non	→	9
dec	→	10

2. **Suffix** : The suffix in IUPAC nomenclature is usually a functional group belonging to the molecule which follows the root of the name. It can be further divided into the following types :

- **A Primary Suffix** : Which is written immediately after the word root as in the case of alkanes, where the Suffix is "ane".

- **A Secondary Suffix** : Which is generally written after the primary suffix is written. For example, Compounds having an alkane and alcohol group attached to them will be named as “alkanol”, with “ol” being the secondary suffix for the alcohol group.

Thus, suffix in IUPAC nomenclature can be broadly classified into primary suffixes and secondary suffixes.