Contents

Approximatin of relative reactivity of aldehydes and ketones with each other

Aldehydes are more reactive than ketone

List of basis for explanation of greater reactivity of aldehydes than ketones

- Steric Hindrance
- Inductive effect

Steric hindrance in carbonyl compounds

Resistance of nucleophile from atoms present in carbonyl carbon - Greater the number of atoms attached to carbonyl carbon greater the steric hindrance

List of activities in Inductive effect in carbonyl compounds

- Resonate electrons around carbonyl carbon
- Increase electron density at carbonyl carbon

Expression of reactivity order of formaldehyde , aldehyde and ketone

Formaldehyde > Aldehyde > Ketone

List of reactions exhibited by aliphatic aldehydes and ketones

- Nucleophilic addition
- Nucleophilic addition by loss of carbonyl oxygen
- Reduction

- Oxidation
- Alkyl and aryl
- Miscellaneous