

α -effect

A positive deviation of an α -nucleophile (a nucleophile bearing an unshared pair of electrons on an atom adjacent to the nucleophilic site) from a Brønsted-type plot of $\log k_{\text{nuc}}$ vs. $\text{p}K_{\text{a}}$ constructed for a series of related normal nucleophiles. More generally, it is the influence of the atom bearing a lone pair of electrons on the reactivity at the adjacent site.

See also *Brønsted relation* .

The use of the term has been extended to include the effect of any substituent on an adjacent reactive centre, for example in the case of the ' α -silicon effect'.

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