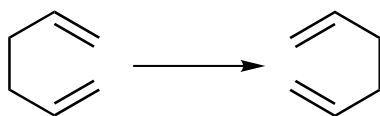


degenerate rearrangement

A *molecular rearrangement* in which the principal product is indistinguishable (in the absence of isotopic labelling) from the principal reactant. The term includes both ‘degenerate *intramolecular* rearrangements’ and reactions that involve intermolecular transfer of atoms or groups (‘degenerate *intermolecular* rearrangements’): both are degenerate *isomerizations*. The occurrence of degenerate rearrangements may be detectable by isotopic labelling or by dynamic NMR techniques. For example: the [3,3]*sigmatropic rearrangement* of hexa-1,5-diene (Cope rearrangement):



Synonymous but less preferable terms are ‘automerization’, ‘permutational isomerism’, ‘isodynamic transformation’, ‘topomerization’.

See also *fluxional*, *molecular rearrangement*, *valence isomer*.
1994, 66, 1104