

Substrate	S _N 2	E2	S _N 1	E1
CH_3X $\text{R-CH}_2\text{X}$ (primary)	Favored with <i>strong nucleophiles</i> $(\text{N}_3^-, \text{I}^-, \text{CN}^-, \text{etc})$	Favored with <i>strong bases</i> $(\text{NaOH}, \text{NaOMe}, \text{NaOEt}, \text{NaNH}_2 \text{ give Zaitsev product})$ $(\text{KOtBu}, \text{LDA} \text{ give least substituted alkene})$	<i>No reaction</i> (carbocation too unstable)	<i>No reaction</i> (carbocation too unstable, but alcohols where X = OH eliminate with dehydrating acids)
$\text{R-CH-R}'$ $\quad $ $\quad \text{X}$ (secondary)	Both can happen, but strong Nu versus strong base preferences remain (same reagents as above)		Favored with <i>weak nucleophiles</i> (watch for carbocation rearrangements with X = OH, OR)	Favored with X = OH, OR with dehydrating acids (conc. H ₂ SO ₄ or H ⁺ /heat) X = Cl, Br, I, not useful (watch for rearrangements)
R' $\quad $ $\text{R-C-R}''$ $\quad $ $\quad \text{X}$ (tertiary)	<i>No reaction</i>	Favored with <i>strong bases</i> (same reagents as above)	Favored with <i>weak nucleophiles</i>	Favored with X = OH, OR with dehydrating acids, more useful on reverse reaction (additions to alkenes catalyzed by H ⁺)