Aldehydes P 0170 19- 049

Tris(trimethylsilyl)silyl-Governed Aldehyde Cross-Aldol Cascade Reaction. —

The bulky silylenol ethers allow high-yielding and highly diastereoselective Mukaiyama cross-aldol reaction with a broad range of aldehydes (primary, secondary, tertiary, aromatic and unsaturated). Moreover, an unprecedented one-pot cascade reaction affording bis-, and tris-hydroxyaldehydes with high selectivity is described. — (BOXER, M. B.; YAMAMOTO*, H.; J. Am. Chem. Soc. 128 (2006) 1, 48-49; Dep. Chem., Univ. Chicago, Chicago, IL 60637, USA; Eng.) — Bartels

b 72% (90% d.e.) c 75% (98% d.e.)