



>>Entry Name: Tributylgermane, 10Cl, 9Cl

CAS Registry Number: 998-39-0

$(\text{H}_3\text{CCH}_2\text{CH}_2\text{CH}_2)_3\text{GeH}$

Molecular Formula: $\text{C}_{12}\text{H}_{28}\text{Ge}$

Molecular Weight: 244.963

Accurate Mass: 246.140277

Percentage Composition: C 58.84%; H 11.52%; Ge 29.64%

Source/Synthesis: Synth. by LiAlH_4 reductn. of Bu_3GeCl

Use/Importance: With AIBN, reduces alkyl iodides and promotes reductive alkylation of activated alkenes by alkyl halides; hydrogermylates alkynes in presence of Rh or Pt complexes; reduces $\text{RCOCl} \rightarrow \text{RCHO}$ in presence of $\text{Pd}(\text{PPh}_3)_4$

Aldrich: 40917-0

Rare Chemicals Library: S66714-5

References:

Lesbré, M. *et al.*, *C. R. Hebd. Seances Acad. Sci.*, 1958, **247**, 471, (*synth*)

Satgé, J., *Ann. Chim. (Paris)*, 1961, **6**, 519, (*synth*)

Alberti, A. *et al.*, *J.C.S. Perkin 2*, 1978, 1098

Seyferth, D. *et al.*, *J. Organomet. Chem.*, 1980, **198**, C51

Stang, P.J. *et al.*, *J.A.C.S.*, 1981, **103**, 5429

Hoffmann, K., *J. Prakt. Chem.*, 1981, **323**, 399, (*ms*)

Pike, P. *et al.*, *Tetrahedron*, 1988, **44**, 6295, (*reactions*)

Geng, L. *et al.*, *J. Organomet. Chem.*, 1989, **376**, 41, (*reactions*)

Wada, F., *Bull. Chem. Soc. Jpn.*, 1991, **64**, 1701, (*reactions*)