



>>Entry Name: Tetraethyl pyrophosphite, 8Cl

Synonym(s): Tetraethyl diphosphite, 9Cl

CAS Registry Number: 21646-99-1

$(\text{EtO})_2\text{POP}(\text{OEt})_2$

Molecular Formula: $\text{C}_8\text{H}_{20}\text{O}_5\text{P}_2$

Molecular Weight: 258.19

Accurate Mass: 258.078599

Percentage Composition: C 37.22%; H 7.81%; O 30.98%; P 23.99%

Use/Importance: Reagent for peptide synth. Ligand for Cu, Fe, Mo, Pt, Re, and Mn

Physical Description: Liq.

Boiling Point: Bp_1 87-89°

Density: d_4^{20} 1.057

Refractive Index: n_D^{20} 1.4377

Aldrich: 15541-1

Sigma: T9012

References:

Aldrich Library of FT-IR Spectra, 1st edn., 1985, **1**, 927A, (ir)

Aldrich Library of NMR Spectra, 2nd edn., 1983, **2**, 877C, (nmr)

Ressler, C. *et al.*, *J.A.C.S.*, 1957, **79**, 4511, (use)

Samuel, D. *et al.*, *J.O.C.*, 1963, **28**, 1155, (synth, ir)

Fieser and Fieser's Reagents for Organic Synthesis, Wiley, 1967, **1**, 1138

Stec, W.J. *et al.*, *Org. Mass Spectrom.*, 1975, **10**, 485, (ms)

Du Preez, A.L. *et al.*, *J. Organomet. Chem.*, 1977, **141**, C10, (complexes)

Kabachnik, M.M. *et al.*, *Zh. Obshch. Khim.*, (Engl. transl. p. 1264), 1979, **49**, 1446, (synth)