



>>Entry Name: 4-Biphenylboronic acid

Synonym(s): [1,1'-Biphenyl]-4-ylboronic acid, 9CI. Biphenyl-4-yl-dihydroxyborane. 4-(Dihydroxyboryl)biphenyl

CAS Registry Number: 5122-94-1

Molecular Formula: $C_{12}H_{11}BO_2$

Molecular Weight: 198.029

Accurate Mass: 198.08521

Percentage Composition: C 72.78%; H 5.60%; B 5.46%; O 16.16%

Source/Synthesis: Synth. from 4-PhC₆H₄MgBr or 4-PhC₆H₄Li + B(OR)₃, followed by hydrol.

Physical Description: Cryst. (C₆H₆ or EtOH aq.)

Melting Point: Mp 232-234°. Mp 264-266°

References:

Yabroff, D.L. *et al.*, *J.A.C.S.*, 1934, **56**, 1850, (*synth*)

Bowie, R.A. *et al.*, *J.C.S.(C)*, 1966, 566, (*synth*)

Diorazio, L.J. *et al.*, *Tetrahedron*, 1992, **48**, 8073, (*synth, ir, pmr, ms*)

Bien, J.T. *et al.*, *J.O.C.*, 1995, **60**, 4525, (*synth, pmr, cmr*)

Galda, P. *et al.*, *Synthesis*, 1996, 614, (*synth, pmr, cmr*)