



>>Entry Name: 1-Phenyl-1,3-butadiene, 8Cl

Synonym(s): 1,3-Butadienylbenzene, 9Cl. 1-Phenylerythrene

CAS Registry Number: 1515-78-2

$\text{H}_2\text{C}=\text{CHCH}=\text{CHPh}$

Molecular Formula: $\text{C}_{10}\text{H}_{10}$

Molecular Weight: 130.189

Accurate Mass: 130.07825

Percentage Composition: C 92.26%; H 7.74%

>>Variant: (E)-form

CAS Registry Number: 16939-57-4

Molecular Formula: $\text{C}_{10}\text{H}_{10}$

Molecular Weight: 130.189

Accurate Mass: 130.07825

Percentage Composition: C 92.26%; H 7.74%

Melting Point: Mp 4.5°

Boiling Point: Bp₁₁ 76°. Bp₄ 69.2°

>>Variant: (Z)-form

CAS Registry Number: 31915-94-3

Molecular Formula: $\text{C}_{10}\text{H}_{10}$

Molecular Weight: 130.189

Accurate Mass: 130.07825

Percentage Composition: C 92.26%; H 7.74%

Physical Description: Liq.

Melting Point: Mp -57°

Boiling Point: Bp₁₁ 86°. Bp₂ 58-60°

References:

Muskat, I.E. *et al.*, *J.A.C.S.*, 1931, **53**, 252-260, (*synth*)

Grummitt, O. *et al.*, *J.A.C.S.*, 1949, **71**, 4157; 1951, **73**, 3479, (*synth, uv, ir*)

Org. Synth., Coll. Vol., 4, 1963, 771-775, (*synth*)

Meyers, A.I. *et al.*, *J.O.C.*, 1976, **41**, 1735-1742, (*synth*)

Ochiai, M. *et al.*, *Chem. Pharm. Bull.*, 1984, **32**, 1829, (*synth, ir, pmr*)

Ikeda, Y. *et al.*, *Bull. Chem. Soc. Jpn.*, 1986, **59**, 657, (*synth*)

Wuts, P.G.M. *et al.*, *J.O.C.*, 1991, **56**, 365, (*synth, pmr, cmr, ir, ms*)

Wang, Q. *et al.*, *Eur. J. Org. Chem.*, 1999, 3263-3268, (*synth, pmr*)