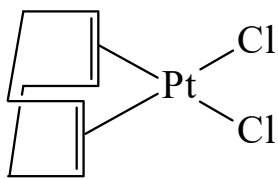




>>Entry Name: Dichloro[(1,2,5,6-η)-1,5-cyclooctadiene]platinum, 9Cl

Synonym(s): 1,5-Cyclooctadienedichloroplatinum



CAS Registry Number: 12080-32-9

Molecular Formula: C₈H₁₂Cl₂Pt

Molecular Weight: 374.168

Accurate Mass: 372.99637

Percentage Composition: C 25.68%; H 3.23%; Cl 18.95%; Pt 52.14%

Source/Synthesis: Synth. from K₂PtCl₄ and cod

Use/Importance: Catalyst for hydroformylation or hydrosilylation of alkenes. Used to deposit platinum on Al₂O₃ or SiO₂ for hydrogenation catalysts. Versatile starting material for synth. of platinum and organoplatinum compds.

Physical Description: Cryst. (CH₂Cl₂/petrol)

Melting Point: Mp 250-280 dec.°

Other Data: Cyclodextrin complexes known

Hazard & Toxicity: Neoplasm inhibitor

Aldrich: 24493-7

References:

- Aldrich Library of FT-IR Spectra, 1st edn.*, 1985, **2**, 1241A, (*ir*)
Chatt, J. *et al.*, *J.C.S.*, 1957, 2496, (*synth*)
Brown, T.L. *et al.*, *Inorg. Chem.*, 1971, **10**, 1097, (*nqr*)
Riggs, W.M., *Anal. Chem.*, 1972, **44**, 830, (*pe*)
Inorg. Synth., 1972, **13**, 48, (*synth*)
McDermott, J.Y. *et al.*, *J.A.C.S.*, 1976, **98**, 6521, (*synth*)
Kennedy, J.D. *et al.*, *J.C.S. Dalton*, 1976, 874, (*P-31 nmr, Pt-195 nmr*)
Wertz, D.W. *et al.*, *Inorg. Chem.*, 1980, **19**, 705, (*ir, Raman*)
Goel, A.B. *et al.*, *Inorg. Chim. Acta*, 1982, **65**, L205, (*cryst struct*)
Syed, A. *et al.*, *Inorg. Chem.*, 1984, **23**, 3673, (*struct*)
Harada, A. *et al.*, *Organometallics*, 1989, **8**, 2560, (*props*)
Bennett, M.A. *et al.*, *Gazz. Chim. Ital.*, 1993, **123**, 405, (*cryst struct*)
Synthetic Methods of Organometallic and Inorganic Chemistry, (ed. Hermann, W.A.), Thieme, 1996, **1**, 168, (*synth, pmr*)
Wyrwa, R. *et al.*, *Z. Anorg. Allg. Chem.*, 1997, **623**, 649, (*ms*)
Skvortsov, N.K. *et al.*, *Russ. J. Gen. Chem. (Engl. Trans.)*, 1999, **68**, 1345, (*synth*)