



>>Entry Name: Lead(II) perchlorate (Pb(ClO₄)₂)

Synonym(s): Perchloric acid, lead(2+) salt, 9CI

CAS Registry Number: 13637-76-8

Pb(ClO₄)₂

Molecular Formula: Cl₂O₈Pb

Molecular Weight: 406.101

Accurate Mass: 405.873651

Percentage Composition: Cl 17.46%; O 31.52%; Pb 51.02%

Source/Synthesis: Synth. by dissolving PbO, PbCO₃ or Pb(NO₃)₂ in HClO₄

Physical Description: White, deliquescent solid. Stable at 200° but begins to dec. at 250°

Solubility: V. sol. H₂O

Hazard & Toxicity: Potentially explosive

Fluka: 15350

Sigma: L7406

>>Derivative: Monohydrate

CAS Registry Number: 113170-60-8

Melting Point: Mp 153-155°

>>Derivative: Trihydrate

CAS Registry Number: 13453-62-8

Physical Description: Cryst.

Melting Point: Mp 100 dec.°

References:

Willard, H.H. *et al.*, *J.A.C.S.*, 1930, **52**, 2391, (*synth*)

Harrison, P.G. *et al.*, *J.C.S. Dalton*, 1983, 1845, (*Pb-207 nmr*)

Krivtsov, N. *et al.*, *Zh. Neorg. Khim.*, 1987, **32**, 2691; *CA*, **108**, 105130u, (*synth, props, hydrates*)

Lewis, R.J., *Sax's Dangerous Properties of Industrial Materials*, 8th edn., Van Nostrand Reinhold, 1992, LDS499