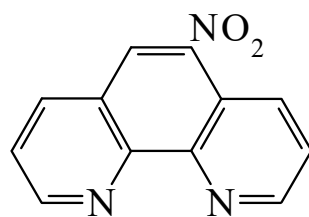




>>Entry Name: 5-Nitro-1,10-phenanthroline, 9CI



CAS Registry Number: 4199-88-6

Molecular Formula: C₁₂H₇N₃O₂

Molecular Weight: 225.206

Accurate Mass: 225.053827

Percentage Composition: C 64.00%; H 3.13%; N 18.66%; O 14.21%

Physical Description: Pale yellow needles (petrol)

Melting Point: Mp 202°

Aldrich: 19367-4

Fluka: 73520

Sigma: N8501

>>Derivative: Hydrochloride

CAS Registry Number: 23484-56-2

Use/Importance: Used as redox indicator

Physical Description: Pale yellow cryst.

Solubility: Sol. EtOH, CHCl₃, C₆H₆

>>Derivative: Tris-Fe(II) complex

References:

Aldrich Library of 13C and 1H FT NMR Spectra, 1992, **3**, 479A, (*nmr*)

Aldrich Library of FT-IR Spectra, 1st edn., 1985, **2**, 892A, (*ir*)

Harcrow, B.E. *et al.*, *J.C.S.*, 1946, 155, (*synth*)

Smith, G.F. *et al.*, *J.O.C.*, 1947, **12**, 781, (*synth*)

Bishop, E., *Indicators*, Pergamon, Oxford, 1972, (*use, ind*)