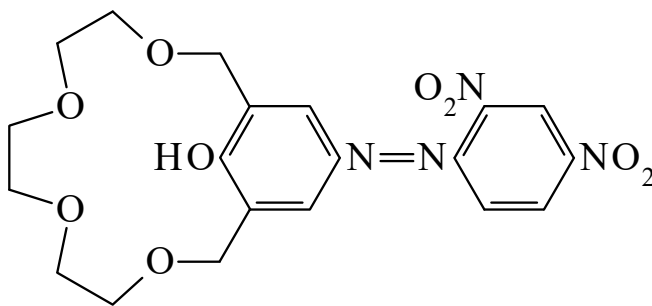




>>Entry Name: 16-[(2,4-Dinitrophenyl)azo]-3,6,9,12-tetraoxabicyclo[12.3.1]octadeca-1(18),14,16-trien-18-ol, 9Cl

Synonym(s): *m*-Dinitrophenylazohydroxybenzene-7-crown-4



CAS Registry Number: 81238-57-5

Type of Compound Code(s): PS8300 PS7700 PM6140 PA3650 PA0650 PA2100 PM6200

Molecular Formula: C₂₀H₂₂N₄O₉

Molecular Weight: 462.415

Accurate Mass: 462.138681

Percentage Composition: C 51.95%; H 4.80%; N 12.12%; O 31.14%

Use/Importance: Used as a 0.25mM soln. in CHCl₃ for extraction-photometric detn. of Cs, Li, Rb

Physical Description: Reddish orange cryst. (EtOH)

Melting Point: Mp 167.5-168.5°

Solubility: Sol. EtOH, Me₂CO, CHCl₃; insol. H₂O

pKa Value: pK_{a1} 7.05 (25°, μ = 0.1C)

Other Data: λ_{max} 400 nm (CHCl₃)

References:

Kaneda, Y. *et al.*, *Tet. Lett.*, 1981, **22**, 4407, (*synth*)

Nakashima, K. *et al.*, *Chem. Lett.*, 1982, 1781; 1983, 1415, (*detn. Li, Cs, Rb*)