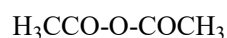




>>Entry Name: Acetic anhydride, 9CI

CAS Registry Number: 108-24-7

Related CAS Registry Numbers(s): 16649-49-3



Molecular Formula: C₄H₆O₃

Molecular Weight: 102.09

Accurate Mass: 102.031695

Percentage Composition: C 47.06%; H 5.92%; O 47.02%

Biological Source: Reportedly found in watercress *Nasturtium officinale*

Use/Importance: Acetylating agent for lab. use and in manuf. of cellulose acetate (rayons) etc. Solvent.

Physical Description: Liq. with pungent, irritating odour

Melting Point: Mp -73°

Boiling Point: Bp 139.55°. Bp₁₅ 44°

Solubility: Spar. sol. H₂O, sol. org. solvs.

Density: d₄¹⁵ 1.085

Other Data: Aq. soln. reacts neutral and is very slowly hyd. to acetic acid

Hazard & Toxicity: Flammable, fl. p. 49°, autoignition temp. 316/390°. Reacts violently with some oxidants. Acid-catalysed hydrolysis can be violent. Vapour is a severe irritant of eyes, mucous membranes and skin. Contact with liq. causes burns and blisters of the skin, and can damage eyes. OES: short-term 5 ppm

Aldrich: 32010-2

Fluka: 45840

Sigma: A6404

Supelco: R40-4010

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