



>>Entry Name: **5-Amino-1-naphthalenesulfonic acid**, 9CI
Synonym(s): 1-Naphthylamine-5-sulfonic acid. Laurent's acid

CAS Registry Number: 84-89-9

Molecular Formula: C₁₀H₉NO₃S

Molecular Weight: 223.252

Accurate Mass: 223.030314

Percentage Composition: C 53.80%; H 4.06%; N 6.27%; O 21.50%; S 14.36%

Use/Importance: Dyestuff intermediate

Physical Description: Needles + 1H₂O

pKa Value: pK_a 3.62 (25°)

Other Data: Fairly readily oxid. acid and salts colour in moist air

Fluka: 70800

Rare Chemicals Library: S57908-4

>>Derivative: S-Benzylthiuronium salt

Melting Point: Mp 179°

>>Derivative: Amide

Synonym(s): 5-Amino-1-naphthalenesulfonamide

CAS Registry Number: 32327-47-2

Molecular Formula: C₁₀H₁₀N₂O₂S

Molecular Weight: 222.267

Accurate Mass: 222.046298

Percentage Composition: C 54.04%; H 4.53%; N 12.60%; O 14.40%; S 14.43%

Use/Importance: Used as a 0.05% soln. in aq. EtOH as acid-base fluorescent indicator (pH range: 2.0-4.0. colour change; no fluorescence → yellow-orange; pH range: 9.5-13.0, colour change; yellow-orange → no fluorescence)

Melting Point: Mp 241° (259-260°)

pKa Value: pK_{a2} 10.16 (25°)