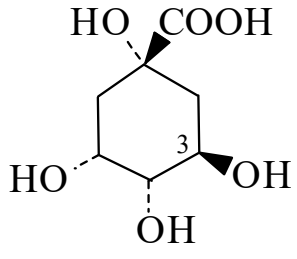
>>**Entry Name: Quinic acid**
ENTRY UNDER REVIEW
Synonym(s): 1,3,4,5-Tetrahydroxycyclohexanecarboxylic acid, 9CI. Hexahydro-1,3,4,5-tetrahydroxybenzoic acid. Chinic acid



(–)-*form*

CAS Registry Number: 36413-60-2

Molecular Formula: $C_7H_{12}O_6$
Molecular Weight: 192.168
Accurate Mass: 192.06339
Percentage Composition: C 43.75%; H 6.29%; O 49.95%

>>**Variant:** (–)-form

CAS Registry Number: 77-95-2

Molecular Formula: $C_7H_{12}O_6$
Molecular Weight: 192.168
Accurate Mass: 192.06339
Percentage Composition: C 43.75%; H 6.29%; O 49.95%
Biological Source: Occurs in cinchona bark, coffee beans, tobacco leaves and many other plant sources
Use/Importance: Food acidulant with good taste characteristics, use limited by cost
Melting Point: Mp 162-163°
Optical Rotation: $[\alpha]_D^{26}$ –42.1 (H_2O)
Solubility: BERDY SOL: Sol. H_2O
pKa Value: pK_a 3.58 (25°)
UV: [neutral] λ_{max} (MeOH) (Berdy)
Hazard & Toxicity: LD_{50} (mus, scu) 10000 mg/kg

Aldrich: 13862-2
Fluka: 22580
Supelco: 4-6944

>>**Derivative:** Lactone
Synonym(s): 1,3,4-Trihydroxy-6-oxabicyclo[3.2.1]octan-7-one, 9CI. **Quinide**

CAS Registry Number: 27783-00-2

Molecular Formula: $C_7H_{10}O_5$
Molecular Weight: 174.153
Accurate Mass: 174.052825
Percentage Composition: C 48.28%; H 5.79%; O 45.93%
Biological Source: Constit. of *Gardenia sootepensis*
Melting Point: Mp 187°
Optical Rotation: $[\alpha]_D^{23}$ –16.75 (c, 8.3 in H_2O)
Other Data: Lactonised onto the C-3 OH group

>>**Derivative:** Tetra-Ac

Molecular Formula: $C_{15}H_{20}O_{10}$
Molecular Weight: 360.317
Percentage Composition: C 50.00%; H 5.59%; O 44.40%
Melting Point: Mp 132-136°
Optical Rotation: $[\alpha]_D^{20}$ –22.5 (EtOH)