



Melting Point: Mp 80-81°

>>Derivative: 7-*O*-[α -L-Rhamnopyranosyl-(1→2)- β -D-glucopyranoside]

Synonym(s): Neohesperidin. Hesperetin 7-neohesperidoside

CAS Registry Number: 13241-33-3

Molecular Formula: C₂₈H₃₄O₁₅

Molecular Weight: 610.568

Accurate Mass: 610.189775

Percentage Composition: C 55.08%; H 5.61%; O 39.31%

Biological Source: Constit. of Seville orange *Citrus aurantium* and other *Citrus* spp.

Use/Importance: Very bitter flavouring agent

Physical Description: Cryst. (EtOH)

Melting Point: Mp 244°

Optical Rotation: [α]_D -100 (c, 0.5 in Py)

Sigma: N1887

>>Derivative: 7-*O*-[α -L-Rhamnopyranosyl-(1→6)- β -D-glucopyranoside]

Synonym(s): Hesperidin. Citrus-hesperidin. Cirontin. Vitamin B. Cirantin. Hesperidoside. Hesperetin 7-rutinoside

CAS Registry Number: 520-26-3

Molecular Formula: C₂₈H₃₄O₁₅

Molecular Weight: 610.568

Accurate Mass: 610.189775

Percentage Composition: C 55.08%; H 5.61%; O 39.31%

Biological Source: Found in most citrus fruits and other members of the Rutaceae, also in *Mentha longifolia*, *Vernonia*, *Anthurium*, *Xanthoxylum* spp. and many others.

First isol. from oranges in 1828

Physical Description: Needles

Melting Point: Mp 258-262° (softens at 250°)

Optical Rotation: [α]_D²⁰ -47.3 (Py)

Solubility: BERDY SOL: Sol. bases; poorly sol. H₂O

Hazard & Toxicity: LD₅₀ (mus, ipr) 1000 mg/kg

Aldrich: 29260-5

Fluka: 52040

Rare Chemicals Library: S58047-3

Sigma: H3515

>>Derivative: 7-*O*-[α -L-Rhamnopyranosyl-(1→2)-[α -L-rhamnopyranosyl-(1→6)]- β -D-glucopyranoside]

CAS Registry Number: 97218-30-9

Molecular Formula: C₃₄H₄₄O₁₉

Molecular Weight: 756.71

Accurate Mass: 756.247685

Percentage Composition: C 53.97%; H 5.86%; O 40.17%

Biological Source: Constit. of *Citrus* spp. and *Buddleja madagascariensis*

>>Derivative: Tri-Ac

Molecular Formula: C₂₂H₂₀O₉

Molecular Weight: 428.395

Accurate Mass: 428.110735

Percentage Composition: C 61.68%; H 4.71%; O 33.61%

Melting Point: Mp 130-132°

Optical Rotation: [α]_D²⁶ +21.1 (c, 1.28 in CHCl₃)