



Melting Point: Mp 28-30° (*S*-form). Mp 39.5-40.5° (±-form)

Optical Rotation: $[\alpha]_D -6.6$ (c, 10.2 in Py) (*S*-form)

>>Variant: Glycerol 1-decanoate

Synonym(s): Decanoic acid 2,3-dihydroxypropyl ester. 1-Monodecanoin. α -Monocaprin

CAS Registry Number: 2277-23-8

Extra CAS Registry Numbers(s): 19670-50-9 26402-22-2

Molecular Formula: C₁₃H₂₆O₄

Molecular Weight: 246.346

Accurate Mass: 246.18311

Percentage Composition: C 63.38%; H 10.64%; O 25.98%

Melting Point: Mp 44° (*S*-form). Mp 53° (27°)(±-form)

Optical Rotation: $[\alpha]_D -5.5$ (c, 10 in Py) (*S*-form)

Other Data: Racemate shows polymorphism

>>Variant: Glycerol 1-dodecanoate

Synonym(s): 2,3-Dihydroxypropyl dodecanoate. 1-Monolaurin. α -Monolaurin. Glycerol 1-laurate. Lauricidin

CAS Registry Number: 142-18-7

Extra CAS Registry Numbers(s): 27215-38-9 40738-26-9 104266-02-6

Molecular Formula: C₁₅H₃₀O₄

Molecular Weight: 274.4

Accurate Mass: 274.21441

Percentage Composition: C 65.66%; H 11.02%; O 23.32%

Biological Source: Isol. from the fruit of *Serenoa repens*

Biological Use/Importance: Antibiotic

Melting Point: Mp 54-55° (*S*--form). Mp 63° (± -form)

Boiling Point: Bp₁ 186°

Optical Rotation: $[\alpha]_D -4.9$ (Py) (*S*-form)

Solubility: BERDY SOL: Sol. MeOH, bases, hexane; poorly sol. H₂O

Hazard & Toxicity: LD₅₀ (rat, orl) 53000 mg/kg

Rare Chemicals Library: S59110-6

>>Derivative: 2-Phosphate

Molecular Formula: C₁₅H₃₁O₇P

Molecular Weight: 354.379

Accurate Mass: 354.180742

Percentage Composition: C 50.84%; H 8.82%; O 31.60%; P 8.74%

Physical Description: Needles (as Ba salt)

Melting Point: Mp 245-255° (Ba salt)

>>Variant: Glycerol 1-tetradecanoate

Synonym(s): 1-*O*-Tetradecanoylglycerol. 1-Monomyristin. α -Monomyristin. Glycerol 1-myristate. 1-Myristoylglycerol. 2,3-Dihydroxypropyl tetradecanoate

CAS Registry Number: 589-68-4

Extra CAS Registry Numbers(s): 27214-38-6

Molecular Formula: C₁₇H₃₄O₄

Molecular Weight: 302.453

Accurate Mass: 302.24571

Percentage Composition: C 67.51%; H 11.33%; O 21.16%

Biological Source: Isol. from the fruit of *Serenoa repens*

Melting Point: Mp 63-64° (*R*-form). Mp 70-71° (± -form)

Optical Rotation: $[\alpha]_D -4$ (c, 2.8 in Py) (*R*-form)