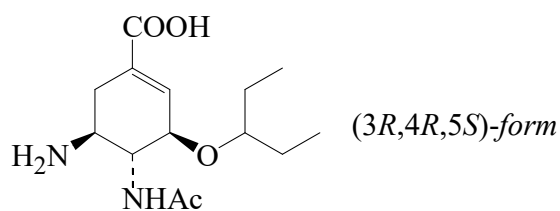




>>Entry Name: 4-(Acetylamino)-5-amino-3-(1-ethylpropoxy)-1-cyclohexene-1-carboxylic acid, 9CI

Synonym(s): GS 4071



Molecular Formula: C₁₄H₂₄N₂O₄

Molecular Weight: 284.355

Accurate Mass: 284.173608

Percentage Composition: C 59.14%; H 8.51%; N 9.85%; O 22.51%

Biological Use/Importance: Influenza neuraminidase inhibitor

>>Variant: (3R,4R,5S)-form

CAS Registry Number: 187227-45-8

Molecular Formula: C₁₄H₂₄N₂O₄

Molecular Weight: 284.355

Accurate Mass: 284.173608

Percentage Composition: C 59.14%; H 8.51%; N 9.85%; O 22.51%

>>Derivative: Et ester

Synonym(s): Oseltamivir, INN. Tamiflu. GS 4104

CAS Registry Number: 196618-13-0

Molecular Formula: C₁₆H₂₈N₂O₄

Molecular Weight: 312.408

Accurate Mass: 312.204908

Percentage Composition: C 61.51%; H 9.03%; N 8.97%; O 20.49%

Biological Use/Importance: Antiviral agent. Used to treat influenza

Physical Description: Foam

Development Status: Launched 1999 (Switzerland and US)

Other Data: Prodrug of GS 4071

>>Derivative: Et ester, hydrochloride

CAS Registry Number: 204255-09-4

Melting Point: Mp 206°

Optical Rotation: [α]_D -43 (c, 0.4 in H₂O)

>>Derivative: Et ester, phosphate

Synonym(s): Oseltamivir phosphate, USAN. Ro 64-0796

CAS Registry Number: 204255-11-8

Physical Description: Needles

Melting Point: Mp 203-204°

Optical Rotation: [α]_D -39.9 (c, 1 in H₂O)

References:

- Eisenberg, E.J. *et al.*, *Antimicrob. Agents Chemother.*, 1997, **41**, 1949-1952; 1998, **42**, 640-646; 647-653, (*Et ester, pharmacol*)
Pat. Coop. Treaty (WIPO), 1998, *Gilead*, 98 07 685; *CA*, **128**, 217186m, (*Et ester, synth*)
Kim, C.U. *et al.*, *Antiviral Chem. Chemother.*, 1999, **10**, 141
Bardsley-Elliot *et al.*, *Drugs*, 1999, **58**, 851-860, (*Et ester, rev*)
Pat. Coop. Treaty (WIPO), 1999, *Gilead*, 99 14 185; *CA*, **130**, 237807j, (*oseltamivir phosphate*)
Gubareva, L.V. *et al.*, *Lancet*, 2000, **355**, 827
McClellan, K. *et al.*, *Drugs*, 2001, **61**, 263-283, (*oseltamivir*)