

# PRODUCT INFORMATION



## Elvitegravir

Item No. 17798

**CAS Registry No.:** 697761-98-1  
**Formal Name:** 6-[(3-chloro-2-fluorophenyl)methyl]-1,4-dihydro-1-[(1S)-1-(hydroxymethyl)-2-methylpropyl]-7-methoxy-4-oxo-3-quinolinecarboxylic acid

**Synonyms:** GS-9137, JTK-303

**MF:** C<sub>23</sub>H<sub>23</sub>ClFNO<sub>5</sub>

**FW:** 447.9

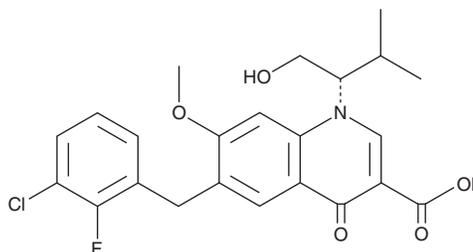
**Purity:** ≥98%

**UV/Vis.:** λ<sub>max</sub>: 258, 312 nm

**Supplied as:** A crystalline solid

**Storage:** -20°C

**Stability:** ≥4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

### Laboratory Procedures

Elvitegravir is supplied as a crystalline solid. A stock solution may be made by dissolving the elvitegravir in the solvent of choice. Elvitegravir is soluble in organic solvents such as DMSO and dimethyl formamide, which should be purged with an inert gas. The solubility of elvitegravir in these solvents is approximately 10 and 20 mg/ml, respectively.

### Description

Elvitegravir is a quinolone antibiotic that inhibits HIV-1 integrase (IC<sub>50</sub> = 7.2 nM).<sup>1</sup> It has antiviral activity against laboratory strains and clinical isolates of HIV-1 in MAGI cells (EC<sub>50</sub>s = 0.1-1.26 nM) and HIV-2 in peripheral blood mononuclear cells (PBMCs; EC<sub>50</sub>s = 0.3-0.9).<sup>2,3</sup> Formulations containing elvitegravir have been used in the treatment of HIV infections.

### References

1. Sato, M., Motomura, T., Aramaki, H., *et al.* Novel HIV-1 integrase inhibitors derived from quinolone antibiotics. *J. Med. Chem.* **49**(5), 1506-1508 (2006).
2. Burton, P., Adams, D.R., Abraham, A., *et al.* Erythro-9-(2-hydroxy-3-nonyl)adenine (EHNA) blocks differentiation and maintains the expression of pluripotency markers in human embryonic stem cells. *Biochem. J.* **432**(3), 575-584 (2010).
3. Roquebert, B., Damond, F., Collin, G., *et al.* HIV-2 integrase gene polymorphism and phenotypic susceptibility of HIV-2 clinical isolates to the integrase inhibitors raltegravir and elvitegravir *in vitro*. *J. Antimicrob. Chemother.* **62**(5), 914-920 (2008).

#### WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

#### SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

#### WARRANTY AND LIMITATION OF REMEDY

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

Copyright Cayman Chemical Company, 11/10/2022

#### CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD  
ANN ARBOR, MI 48108 · USA

**PHONE:** [800] 364-9897

[734] 971-3335

**FAX:** [734] 971-3640

CUSTSERV@CAYMANCHEM.COM  
WWW.CAYMANCHEM.COM