

Product Data Sheet

Product Name: Capecitabine-d11

Cat. No.: GC47034

Chemical Properties

Cas. No. 1132662-08-8

SMILES CCCCCOC(=O)Nc1nc(=O)n(cc1F)[C@@H]1O[C@H](C)C(O)C1O

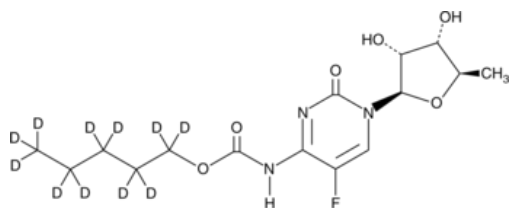
Formula C₁₅H₁₁D₁₁FN₃O₆ M.Wt 370.4

Solubility DMSO: Slightly Soluble, Methanol: Warmed Storage Store at -20°C

General For obtaining a higher solubility, please warm the tube at 37 °C and shake it in the tips ultrasonic bath for a while. Stock solution can be stored below -20°C for several months.

Shipping Evaluation sample solution: ship with blue ice All other available size: ship with RT, or Condition blue ice upon request.

Structure



Background

Capecitabine-d₁₁ is intended for use as an internal standard for the quantification of capecitabine by GC- or LC-MS. Capecitabine is a prodrug form of 5-fluorouracil.¹ It is converted to 5-FU via several enzymatic steps beginning in the liver and ending with conversion in tumor tissue by thymidine phosphorylase, an enzyme that is more concentrated in tumor tissue compared with normal tissue. Capecitabine is cytotoxic only at high concentrations in Scaber, SIHA, and MKN45 cells (IC₅₀s = 97, 578, and 994 μM, respectively) and is inactive in a variety of cancer cell lines, including COLO 205, HCT116, and MCF-7 cells (IC₅₀s = >1,000 μM).

1. Miwa, M., Ura, M., Nishida, M., et al. Design of a novel oral fluoropyrimidine carbamate, capecitabine, which generates 5-fluorouracil selectively in tumours by enzymes concentrated in human liver and cancer tissue. *Eur. J. Cancer* 34(8):1274-1281 (1998)

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: (909) 407-4943 Fax: (626) 353-8530 E-mail: tech@glpbio.com

Address: 10292 Central Ave. #205, Montclair, CA, USA