

PRODUCT INFORMATION



AMG 510

Item No. 29465

CAS Registry No.: 2296729-00-3
Formal Name: (1R)-6-fluoro-7-(2-fluoro-6-hydroxyphenyl)-1-[4-methyl-2-(1-methylethyl)-3-pyridinyl]-4-[(2S)-2-methyl-4-(1-oxo-2-propen-1-yl)-1-piperazinyl]-pyrido[2,3-d]pyrimidin-2(1H)-one

MF: C₃₀H₃₀F₂N₆O₃

FW: 560.6

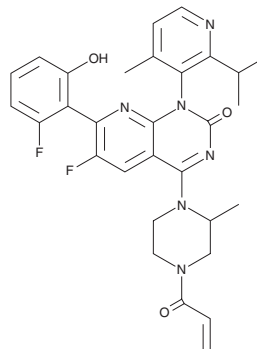
Purity: ≥98%

UV/Vis.: λ_{max}: 214 nm

Supplied as: A 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

AMG 510 is supplied as a solid. A stock solution may be made by dissolving the AMG 510 in the solvent of choice, which should be purged with an inert gas. AMG 510 is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide (DMF). The solubility of AMG 510 in these solvents is approximately 1, 20, and 25 mg/ml, respectively.

AMG 510 is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, AMG 510 should first be dissolved in DMF and then diluted with the aqueous buffer of choice. AMG 510 has a solubility of approximately 0.25 mg/ml in a 1:3 solution of DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

AMG 510 is a covalent inhibitor of K-Ras^{G12C}.¹ It inhibits EGF-induced phosphorylation of ERK1/2 in MIA PaCa-2 cells (IC₅₀ = 68 nM). AMG 510 reduces the viability of MIA PaCa-2 cells that express K-Ras^{G12C} but not K-Ras^{G12S}-expressing A549 cells (IC₅₀s = 5 and 36,500 nM, respectively). *In vivo*, AMG 510 (10, 30, and 100 mg/kg) reduces intratumor ERK1/2 phosphorylation and tumor volume in a MIA PaCa-2 mouse xenograft model.

Reference

1. Lanman, B.A., Allen, J.R., Allen, J.G., *et al.* Discovery of a covalent inhibitor of KRAS^{G12C} (AMG 510) for the treatment of solid tumors. *J. Med. Chem.* **63**(1), 52-65 (2020).

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.

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