bio-techne
TOCRIS

Print Date: Jul 16th 2026

Certificate of Analysis

www.tocris.com

Product Name: **AM 9022** **Catalog No.: 8969** **Batch No.: 1**

CAS Number: 2446872-46-2

IUPAC Name: 2-(6-Azaspiro[2.5]oct-6-yl)-*N*-[2-(4,4-difluoro-1-piperidinyl)-6-methyl-4-pyrimidinyl]-4-[[[(1*R*)-2-hydroxy-1-methylethyl] sulfonyl]amino]benzamide

1. PHYSICAL AND CHEMICAL PROPERTIES

Batch Molecular Formula: $C_{27}H_{36}F_2N_6O_4S$

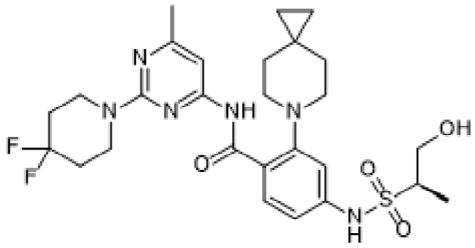
Batch Molecular Weight: 578.68

Physical Appearance: Off White solid

Solubility: DMSO to 100 mM

Storage: Store at -20°C

Batch Molecular Structure:



2. ANALYTICAL DATA

HPLC: Shows 99.5% purity

Chiral HPLC: Shows 99.6% purity

^{1}H NMR: Consistent with structure

Mass Spectrum: Consistent with structure

Microanalysis:

	Carbon	Hydrogen	Nitrogen
Theoretical	56.04	6.27	14.52
Found	55.94	6.28	14.43

bio-techne.com
info@bio-techne.com
techsupport@bio-techne.com

North America
Tel: (800) 343 7475

China
info.cn@bio-techne.com
Tel: +86 (21) 52380373

Europe Middle East Africa
Tel: +44 (0)1235 529449

Rest of World
www.tocris.com/distributors
Tel:+1 612 379 2956

Product Name: **AM 9022** **Catalog No.: 8969** **Batch No.: 1**

CAS Number: 2446872-46-2

IUPAC Name: 2-(6-Azaspiro[2.5]oct-6-yl)-*N*-[2-(4,4-difluoro-1-piperidinyl)-6-methyl-4-pyrimidinyl]-4-[[[(1*R*)-2-hydroxy-1-methylethyl] sulfonyl]amino]benzamide

Description:

AM 9022 is a potent and selective KIF18A inhibitor (IC_{50} = 60 nM). It displays selectivity for KIF18A over a panel of diverse kinesin motor proteins. Upon blocking MT-ATPase motor activity (non-competitive with ATP and MTs), it activates the mitotic checkpoint and selectively kills chromosomally unstable cancer cells. Has minimal detrimental effects on human bone marrow cells in culture, distinct from other anti-mitotic agents. In mice, inhibition of KIF18A leads to robust anti-cancer effects with tumor regression observed in human HGSOC and TNBC models at well-tolerated doses. AM 9022 can be used for the selective targeting of CIN cancers. Please see product specific page on www.tocris.com for full description.

Physical and Chemical Properties:

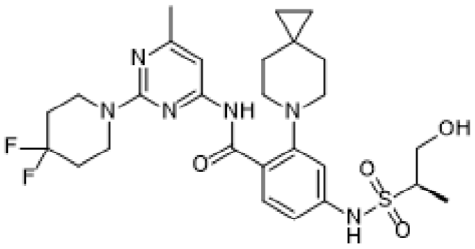
Batch Molecular Formula: $C_{27}H_{36}F_2N_6O_4S$

Batch Molecular Weight: 578.68

Physical Appearance: Off White solid

Minimum Purity: ≥98%

Batch Molecular Structure:



Storage: Store at -20°C

Solubility & Usage Info:

DMSO to 100 mM

Stability and Solubility Advice:

Some solutions can be difficult to obtain and can be encouraged by rapid stirring, sonication or gentle warming (in a 45-60°C water bath).

Information concerning product stability, particularly in solution, has rarely been reported and in most cases we can only offer a general guide. *Unless contradicted by product-specific protocols or instructions, our standard recommendations apply:

SOLIDS: Provided storage is as stated on the product label and the vial is kept tightly sealed, the product can be stored for up to 6 months from date of receipt.

SOLUTIONS: We recommend that stock solutions, once prepared, are stored aliquoted in tightly sealed vials at -20°C or below and used within 1 month. Wherever possible solutions should be made up and used on the same day.

References:

Payton *et al* (2023) Small-molecule inhibition of kinesin KIF18A reveals a mitotic vulnerability enriched in chromosomally unstable cancers. Nature Cancer ***5*** 66. PMID: 38151625.