PRODUCT INFORMATION

TG101209
Item No. 14696

CAS Registry No.: 936091-14-4
Formal Name: N-(1,1-dimethylethyl)-3-[[5-methyl-2-[[4-(4-methyl-1-piperazinyl)phenyl]amino]-4-pyrimidinyl]amino]-benzenesulfonamide

MF: C_{26}H_{35}N_{7}O_{2}S
FW: 509.7
Purity: ≥98%
UV/Vis.: λ_{max}: 282 nm
Supplied as: A crystalline solid
Storage: -20°C
Stability: As supplied, 2 years from the QC date provided on the Certificate of Analysis, when stored properly

Laboratory Procedures

TG101209 is supplied as a crystalline solid. A stock solution may be made by dissolving the TG101209 in the solvent of choice. TG101209 is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide (DMF), which should be purged with an inert gas. The solubility of TG101209 in these solvents is approximately 0.12, 12.5, and 16 mg/ml, respectively.

TG101209 is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, TG101209 should first be dissolved in DMF and then diluted with the aqueous buffer of choice. TG101209 has a solubility of approximately 0.5 mg/ml in a 1:1 solution of DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

TG101209 is a potent inhibitor of the tyrosine kinases Janus kinase (JAK) 2, FMS-like tyrosine kinase 3, proto-oncogene RET, and JAK3 (IC_{50} = 6, 25, 17, and 169 nM, respectively). Through these effects, it induces cell cycle arrest and apoptosis in leukemic cell lines and CD45^+ myeloma cells.

References