Data Sheet (Cat.No.T80742)

TargetMol

Zelavespib hydrochloride

Chemical Properties

CAS No. :

Formula:

Molecular Weight:

Storage: Powder: -20°C for 3 years | In solvent: -80°C for 1 year
Actual storage temperature shall be subject to the COA.

Biological Description

Description	Zelavespib (PU-H71) hydrochloride is a potent Hsp90 inhibitor with an IC50 of 51 nM in MDA-MB-468 cells.
Targets(IC50)	HSP
In vitro	Zelavespib hydrochloride is an effective Hsp90 inhibitor with an IC50 of 51 nM in MDA-MB-468 cells. It suppresses the growth of various tumor cells, including MDA-MB-468, MDA-MB-231, and HCC-1806 cells with IC50s of 65 ± 8 nM , 140 ± 5 nM , and 87 ± 3 nM , respectively, an effect associated with G2-M arrest. Zelavespib (10-1000 nM) significantly induces apoptosis in triple-negative breast cancer (TNBC). At concentrations of 0.5 and 1 μM, Zelavespib downregulates oncoproteins involved in TNBC invasiveness [1]. Zelavespib (0.5 μM) reduces and depletes BCR signaling kinases. It exhibits cytotoxicity against CLL cells at 0.25-10 μM with minimal impact on PBMC or resting B cells. Moreover, Zelavespib (0-1μM) diminishes CLL cell viability by inducing mitochondrial apoptosis and opposes survival signals from the CLL microenvironment at 0.5 μM [2]. Additionally, Zelavespib (0.05 μM) induces apoptosis in MDA-MB-231, BT-474, and MCF7 cells, an effect enhanced by TNF-α. It also degrades IKKβ and downregulates NF-κB transcriptional activity induced by TNF-α treatment [3].
In vivo	Zelavespib (75 mg/kg, intraperitoneal injection) induces accumulation within the tumor and prolongs the downregulation of oncogenic drivers, achieving a non-toxic dose response while preserving efficacy in MDA-MB-468 tumor-bearing mice. Zelavespib administered thrice weekly at the same dosage via intraperitoneal injection inhibits tumor growth, an effect associated with the downregulation of multiple Hsp90-regulated oncoproteins [1].