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Data Sheet

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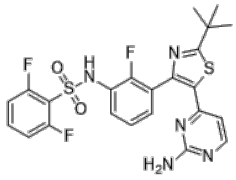
Product Name	:	Dabrafenib
Cat. No.	:	PC-24572
CAS No.	:	1195765-45-7
Molecular Formula	:	$C_{23}H_{20}F_3N_5O_2S_2$
Molecular Weight	:	519.56
Target	:	Raf
Solubility	:	10 mM in DMSO



Biological Activity

Dabrafenib (GSK2118436) is potent, selective ATP-competitive inhibitor of Raf with IC50 of 5 nM and 0.6 nM for C-Raf and B-Raf V600E respectively, also potently inhibits RIPK3 with IC50 of 28 nM.
Dabrafenib displayed highly selective inhibition on RIP3 over RIP1, RIP2 and RIP5.
Dabrafenib rescued cells from RIP3-mediated necroptosis induced by the necroptosis-induced combinations, that is, tumor necrosis factor (TNF)α, TNF-related apoptosis-inducing ligand or Fas ligand plus Smac mimetic and the caspase inhibitor z-VAD.
Dabrafenib decreased the RIP3-mediated Ser358 phosphorylation of mixed lineage kinase domain-like protein (MLKL) and disrupted the interaction between RIP3 and MLKL.

References

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