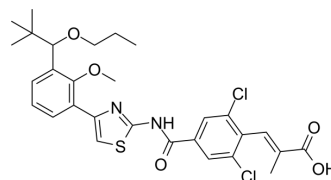


Butyzamide

Cat. No.:	HY-148748
CAS No.:	1110767-45-7
Molecular Formula:	C ₂₉ H ₃₂ Cl ₂ N ₂ O ₅ S
Molecular Weight:	591.55
Target:	JAK; STAT; p38 MAPK
Pathway:	Epigenetics; JAK/STAT Signaling; Protein Tyrosine Kinase/RTK; Stem Cell/Wnt; MAPK/ERK Pathway
Storage:	4°C, sealed storage, away from moisture and light * In solvent : -80°C, 6 months; -20°C, 1 month (sealed storage, away from moisture and light)



SOLVENT & SOLUBILITY

In Vitro	DMSO : 100 mg/mL (169.05 mM; Need ultrasonic)					
		Solvent Concentration	Mass			
	Preparing Stock Solutions			1 mg	5 mg	10 mg
			1 mM		1.6905 mL	8.4524 mL
		5 mM		0.3381 mL	1.6905 mL	3.3809 mL
		10 mM		0.1690 mL	0.8452 mL	1.6905 mL
Please refer to the solubility information to select the appropriate solvent.						

BIOLOGICAL ACTIVITY

Description	Butyzamide is an orally active activator of Mpl, a thrombopoietin (TPO) receptor. Butyzamide increases the phosphorylation level of JAK2, STAT3, STAT5 and MAPK. Butyzamide increases the level of human platelets in mouse xenotransplantation assay ^[1] .		
IC₅₀ & Target	JAK2	STAT3	STAT5
In Vitro	Butyzamide (3 μM; 15 min) induces the phosphorylation of JAK2, STAT3, STAT5 and MAPK in Ba/F3-hMpl cells ^[1] . Butyzamide (3 μM; 48 h) induces colony-forming unit-megakaryocyte and polyploid megakaryocytes from human CD34 ⁺ hematopoietic progenitor cells ^[1] . MCE has not independently confirmed the accuracy of these methods. They are for reference only.		
In Vivo	Butyzamide (10 mg/kg, 50 mg/kg; p.o.; once daily for 20 days) increases human platelets in NOG mice transplanted with human fetal liver-derived CD34 ⁺ cells ^[1] . MCE has not independently confirmed the accuracy of these methods. They are for reference only.		

REFERENCES

[1]. Nogami W, et al. The effect of a novel, small non-peptidyl molecule butyzamide on human thrombopoietin receptor and megakaryopoiesis. *Haematologica*. 2008 Oct;93(10):1495-504.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA