

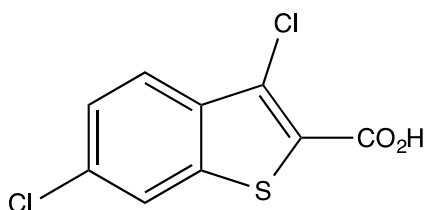
Catalog # 10-4717

BT2

CAS# 34576-94-8

3,6-Dichlorobenzo[b]thiophene-2-carboxylic acid

Lot # FBS1027



BT2 is an inhibitor of the mitochondrial branched-chain α -ketoacid dehydrogenase complex kinase (BCKDC) - $IC_{50} = 3.19 \mu\text{M}$.¹ Inhibition of this kinase has been shown to reduce levels of branched-chain amino acid concentrations *in vivo*. BT2 has also been shown to be a moderate inhibitor ($K_i = 59 \mu\text{M}$) of myeloid cell leukemia 1 (Mcl 1), a Bcl-2 family protein.²

- 1) Tso *et al.* (2014), *Benzothiophene carboxylate derivatives as novel allosteric inhibitors of branched-chain α -ketoacid dehydrogenase kinase*; J.Biol.Chem. **289** 20583
- 2) Friberg *et al.* (2013), *Discovery of potent myeloid cell leukemia (Mcl 1) inhibitors using fragment based methods and structure based design*; J.Med.Chem. **56** 15

PHYSICAL DATA

Molecular Weight:	247.10
Molecular Formula:	$\text{C}_9\text{H}_4\text{Cl}_2\text{O}_2\text{S}$
Purity:	>95% by TLC
	NMR: (Conforms)
Solubility:	DMSO (> 20mg/mL)
Physical Description:	Off-white solid
Storage and Stability:	Store as supplied at -20°C for up to 1 year from the date of purchase. Solutions in DMSO may be stored at -20°C for up to 3 months.

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