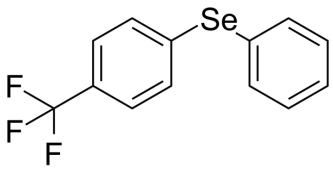
LDHA-IN-3

Cat. No.:	HY-139319
CAS No.:	227010-33-5
Molecular Formula:	$C_{13}H_9F_3Se$
Molecular Weight:	301.17
Target:	Lactate Dehydrogenase
Pathway:	Metabolic Enzyme/Protease
Storage:	Please store the product under the recommended conditions in the Certificate of Analysis.



BIOLOGICAL ACTIVITY

Description	LDHA-IN-3, as a selenobenzene compound, is a potent, noncompetitive lactate dehydrogenase (LDHA) inhibitor (IC_{50}=145.2 nM). LDHA-IN-3 can be used for the research of cancer[1].
IC_{50} & Target	IC50: 145.2 nM (LDHA)[1]
In Vitro	PSTMB (0~500 μM; 48 hours; MCF-7 cells) shows cytotoxic effect[1]. PSTMB (0.01~1 μM) shows dose-dependent inhibition of LDHA activity. PSTMB (0~0.5 μM) inhibits LDHA activity in Michaelis-Menten and Lineweaver-Burk plots. PSTMB (30 and 50 μM; HT29 cells) induces ROS production and mitochondrial damage[1]. PSTMB can bind to LDHA protein efficiently. PSTMB induces the intrinsic pathway-mediated apoptosis of cancer cells via production of mitochondrial ROS[1]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Cell Viability Assay[1]

Cell Line:	MCF-7 cells
Concentration:	0~500 μM
Incubation Time:	48 hours
Result:	Showed cytotoxic effect.

REFERENCES

[1]. Kim EY, et al. A Novel Lactate Dehydrogenase Inhibitor, 1-(Phenylseleno)-4-(Trifluoromethyl) Benzene, Suppresses Tumor Growth through Apoptotic Cell Death. Sci Rep. 2019;9(1):3969. Published 2019 Mar 8.

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