

Catalog	Unit
TBI5258-5MG	5 mg
TBI5258-25MG	25 mg

Product Details

Formal Name: 6-isothiocyanatohexylbenzene

Alternate Names: PHITC; PHI

Molecular Formula: C₁₃H₁₇NS

Formula Weight: 219.40

CAS Number: 133920-06-6

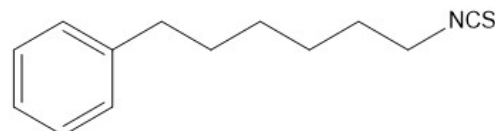
Purity: >98%

Formulation: Liquid

Solubility: Soluble in DMSO (25 mg/ml)

Storage: -20°C

Stability: ≥ 2 years.



Applications

Chemopreventive; HDAC inhibitor; p53 reactivator

Functions

Isothiocyanate constituents of cruciferous vegetables are potent chemopreventive agents for carcinogen-induced cancers in rodents. PHITC was the most potent in a series of synthetic arylalkyl isothiocyanates at inhibition of tumorigenicity by NNK, a tobacco-derived nitrosamine, in a mouse model. It was also found to induce apoptosis and inhibit leukemia cell growth in vivo and was shown to have dual function as a histone deacetylase inhibitor and hypomethylating agent. PHITC was also shown to restore the activity of mutant p53 and reactivate the p53 pathway in human myeloid leukemia M2 cells.

Application Procedures

First dissolved in DMSO (25 mg/ml), then diluted to aqueous buffer. Solutions in DMSO may be stored at -20°C for up to 2 months.

For research use only.