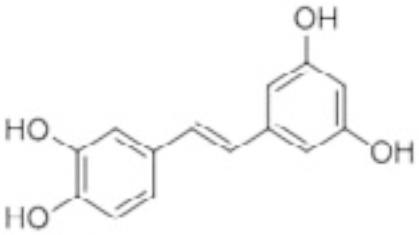
Piceatannol

Catalog Number P009-5MG

Catalog Number P009-25MG



ARBOR ASSAYS

FEATURES

- Activator of SIRT1
- Inhibits NF-kB activation
- Induces apoptosis

INTRODUCTION

Activator of human deacetylase SIRT1. Anti-inflammatory, immunomodulatory and antiproliferative agent that inhibits p56lck and syk protein tyrosine kinases and inhibits TNF-induced NF-κB activation and gene expression. Piceatannol is a resveratrol analog formed by the cytochrome P450-catalyzed hydroxylation of resveratrol. Piceatannol exhibits potent anticancer properties by inducing apoptosis in BJAB Burkitt-like lymphoma cells with an ED_{50} value of 25 µM. Piceatannol also exhibits anti-proliferative and anti-inflammatory effects by inhibiting the activity of a wide range of tyrosine and serine/threonine protein kinases and suppressing NF-κB activation through inhibition of IκBα kinase.

FORM:	Light pale pink powder
MOLECULAR WEIGHT:	244.25
STORAGE:	4°C
FORMULA:	$C_{14}H_{12}O_4$
CAS NUMBER:	10083-24-6
OTHER NAMES:	4-[(1E)-2-(3,5-Dihydroxyphenyl)ethenyl]-1,2-benzenediol; 3,4,3',5'-Tetrahydroxy-trans-stilbene; Astringenin
USES:	Soluble to 10 mg/mL in DMSO or ethanol

REFERENCES:

Wieder, T., Prokop, A., Bagci, B., et al. Piceatannol, a hydroxylated analog of the chemopreventive agent resveratrol, is a potent inducer of apoptosis in the lymphoma cell line BJAB and in primary, leukemic lymphoblasts. Leukemia 15, 1735-1742 (2001).

Geahlen, R.L., and McLaughlin, J.L. Piceatannol (3,4,3',5'-tetrahydroxy-trans-stilbene) is a naturally occurring protein-tyrosine kinase inhibitor. Biochem. Biophys. Res. Comm. 165:1, 241-245 (1989).

Potter, G.A., Patterson, L.H., Wanogho, E., et al. The cancer preventative agent resveratrol is converted to the anticancer agent piceatannol by the cytochrome P450 enzyme CYP 1B1. Br. J. Cancer 86, 774-778 (2002).