Rottlerin

SIH-394-50MG



Overview		
Product Name	Rottlerin Small Molecule	
Unit Size	50mg	
Description	Autophagy inducer	
Purity	≥98%	

Technical Data		
Alternative Name(s)	3'-[(8-Cinnamoyl-5,7-dihydroxy-2,2-dimethyl-2H-1-benzopyran-6-yl)methyl]-2',4',6'-trihydroxy-5'-methylacetophenone	
Formula	C30H28O8	
CAS#	82-08-6	
Molecular Weight	516.55	
Chemical Structure	H ₃ C OH OH CH ₃ CH ₃ CH ₃	
Solubility	Soluble to 2 mM in ethanol and to 20 mM in DMSO.	
Source	Synthetic	
Appearance	Orange to brown solid.	
Storage Conditions	4°C; 1 year+	
Shipping Temperature	Shipped Ambient	
SMILES	C1=CC=CC=C1/C=C/C(C2=C(C(=C(C3=C2OC(C)(C)C=C3)O)CC4=C(C(=C(C(=C4O)C(C)=O)O)C)O)O)O)O	
Research Area(s)	Autophagy	

Biological Description		
Function	Rottlerin has been shown to inhibit protein kinase C as well as CAM kinase III. It is also a potent activator of many K+ channels which are Ca2+-activated. Studies have illustrated Rottlerin to act as a mitochondrial uncoupler which depolarizes membrane potential. Lastly, Rottlerin can induce autophagy by inhibition of mTORC1 signalling.	
	 Gschwendt M. et al. (1994) Biochem Biophys Res Commun. 199(1): 93-8. Wu S., et al. (2007) J Cell Physiol. 210(3): 655-66. Soltoff S. (2001) J Biol Chem. 276(41): 37986-92. Balgi A., et al. (2009) PLoS One. 4(9): e7124. 	
Product Citations	PubMed ID: N/A	

Material Safety Data Sheet Rottlerin SIH-394-50MG

This product is for *in vitro* research use only and is not intended for use in humans or animals

The below information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. StressMarq shall not be held liable for any damage resulting from handling or from contact with the above product. See the Technical Specification, Packing Slip, Invoice, and Product Catalogue for additional terms and conditions of sale.

Regulatory Information

 ${\bf Classification: Not\ WHMIS\ controlled.}$

Safety Phrases:

S22 - Do not breathe dust.

S24/25 - Avoid contact with skin and eyes.

S36/37/39 - Wear suitable protective clothing, gloves and eye/face protection.

Physical Data

This product consists of powder, shipped at ambient temperatures. The physical properties of this product have not been investigated thoroughly. CAS Number: 82-08-6

Fire and Explosion Hazard and Reactivity Data

NOT APPLICABLE

Toxicological Properties

May be harmful by inhalation, ingestion, or skin absorption. The toxicological properties of this product have not been investigated thoroughly. Exercise due caution.

Preventative Measures

Wear chemical safety goggles and compatible chemical-resistant gloves. Avoid inhalation, contact with eyes, skin or clothing.

Spill and Leak Procedures

Observe all federal, state and local environmental regulations.

- Wear protective equipment.
- Absorb on sand or vermiculite and place in closed containers for disposal.
- Dispose or mix the material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber.

First Aid Measures

- If swallowed, wash out mouth with water, provided person is conscious. Call a physician.
- In case of skin contact, flush with copious amounts of water for at least 15 minutes. Remove contaminated clothing and shoes. If a rash or other irritation develops, call a physician.
- If inhaled, remove to fresh air. If breathing becomes difficult, call a physician.
- In case of eye contact, flush with copious amounts of water for at least 15 minutes while separating the eyelids with fingers. Call a physician.