

PRODUCT INFORMATION

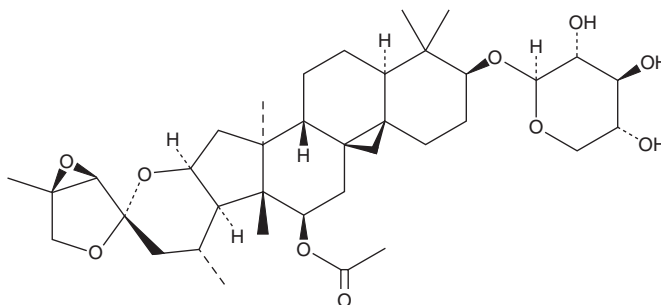


23-*epi*-26-Deoxyactein

Item No. 25126

CAS Registry No.: 264624-38-6
Formal Name: (3 β ,12 β ,16 β ,23S,24R,25R)-12-(acetyloxy)-16,23:23,26:24,25-triepoxy-9,19-cyclolanostan-3-yl, β -D-xylopyranoside

Synonym: 27-Deoxyactein
MF: C₃₇H₅₆O₁₀
FW: 660.8
Purity: \geq 95%
Supplied as: A crystalline solid
Storage: -20°C
Stability: \geq 4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

Laboratory Procedures

23-*epi*-26-Deoxyactein is supplied as a crystalline solid. A stock solution may be made by dissolving the 23-*epi*-26-deoxyactein in water. We do not recommend storing the aqueous solution for more than one day.

Description

23-*epi*-26-Deoxyactein is a triterpene glycoside and a major constituent of black cohosh (*C. racemosa*).^{1,2} It reduces intracellular calcium concentrations, collapse of the mitochondrial membrane potential, production of reactive oxygen species (ROS), and cardiolipin peroxidation and inhibits autophagy and apoptosis in osteoblastic MC3T3-E1 cells induced by 2,3,7,8-tetrachlorodibenzo-*p*-dioxin (TCDD).¹ 23-*epi*-26-Deoxyactein (0.01-10 μ M) reduces production of ROS and IL-1 β and cell death induced by methylglyoxal in RIN-m5F β -cells.²

References

1. Suh, K.S., Choi, E.M., Jung, W.-W., *et al.* 27-Deoxyactein prevents 2,3,7,8-tetrachlorodibenzo-*p*-dioxin-induced cellular damage in MC3T3-E1 osteoblastic cells. *J. Environ. Sci. Health A. Tox. Hazard Subst. Environ. Eng.* **53(6)**, 561-570 (2018).
2. Suh, K.S., Choi, E.M., Jung, W.-W., *et al.* Deoxyactein protects pancreatic β -cells against methylglyoxal-induced oxidative cell damage by the upregulation of mitochondrial biogenesis. *Int. J. Mol. Med.* **40(2)**, 539-548 (2017).

WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

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