

Splitomicin

Catalog No: 14086, 14087

Format: 25 mg, 5 mg

Chemical Properties:

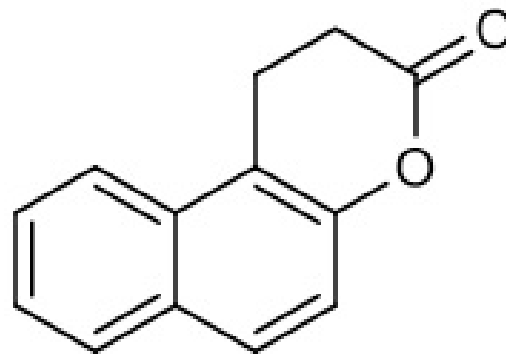
MW = 198.2

C₁₃H₁₀O₂

CAS 5690-03-9

Physical Properties: White powder

Names: Splitomicin, Splitomycin, 1,2-Dihydro-3*H*-naphtho[2,1-*b*]pyran-3-one



Pharmacology: Initially shown to inhibit Sir2p (the yeast Sirt1 homolog) and create a conditional phenocopy of a sir2 deletion mutant in *S. cerevisiae* (ref 1). Cells grown in the presence of the drug have silencing defects at telomeres, silent mating-type loci and the ribosomal DNA (ref 1). Inhibits all class III HDACs (sirtuins) and alleviates gene silencing in Fragile X mental retardation syndrome (ref 2). Reverses ischemic preconditioning-induced cardioprotection in a mouse model (ref 3).

Solubilization: May be dissolved in DMSO (>25 mg/ml); Ethanol (>25 mg/ml)

Fluorescent Properties: N/A

Quality Control:

>98% (TLC); NMR (Conforms)

References:

1. A Bedalov *et al. Proc. Natl. Acad. Sci. USA* 2001, 98:15113
2. R Biacsi *et al. PLoS Genet.* 2008, 4(3):e1000017
3. SM Nadochiy *et al. Cardiovasc. Res.* 2011, 89:643

Storage and Guarantee: Store desiccated as supplied at room temperature for up to 2 years. Store solutions at -20°C for up to 1 month. This product is guaranteed for 6 months from date of arrival.