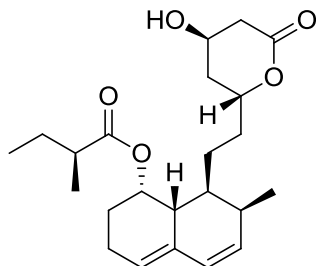


Mevastatin

Code No.: **BIA-M1209**

Pack sizes: **25 mg, 100 mg**



Synonyms : Compactin, ML 236B, SIPI 8915

Specifications

| | |
|-------------------|---|
| CAS # | : 73573-88-3 |
| Molecular Formula | : C₂₃H₃₄O₅ |
| Molecular Weight | : 390.5 |
| Source | : <i>Penicillium</i> sp. |
| Appearance | : White solid |
| Purity | : >95% by HPLC |
| Long Term Storage | : -20°C |
| Solubility | : Soluble in ethanol, methanol, DMF or DMSO. Limited water solubility. |

Application Notes

Mevastatin (compactin) is a diterpene produced by several species of the genera *Penicillium* and *Monascus*, first reported in 1976. Mevastatin, the prototype of the statin class, is a potent competitive inhibitor of HMG-CoA reductase, a regulatory enzyme for cholesterol biosynthesis. Mevastatin has also been shown to induce apoptosis by inhibiting post-translational prenylation of proteins such as Ras, increasing eNOS mRNA and protein levels by blocking the geranylgeranylation of Rho, and inhibiting myoblast fusion. It induces cell cycle arrest in late G1 phase and may induce bone morphogenic protein-2 (BMP-2).

References

1. Crystal and molecular structure of compactin, a new antifungal metabolite from *Penicillium brevicompactum*. Brown A. G. et al., J.C.S. Perkin 1, 1976, 1165.
2. Sterol biosynthesis: effect of compactin and its derivatives. Fears R., Biochem. Soc. Trans. 1983, 11, 642.
3. Post-transcriptional regulation of endothelial nitric oxide synthase mRNA stability by Rho GTPase. Laufs U. & Liao J.K., J. Biol. Chem. 1998, 273, 24266.