
KL001

产品编号: D51009

CAS: 309928-48-1

分子式: C₂₁H₂₂N₂O₄S

纯度: ≥98%

InChi: InChI=1S/C₂₁H₂₂N₂O₄S/c1-28(25,26)22(15-17-7-6-12-27-17)13-16(24)14-23-20-10-4-2-8-18(20)19-9-3-5-11-21(19)23/h2-12,16,24H,13-15H₂,1H₃

InChi Key: OQAFDLPAPSSOHY-UHFFFAOYSA-N

Smiles: CS(=O)(=O)N(CC(O)CN1C2=CC=CC=C2C2C=CC=CC1=2)CC1=CC=CO1

外观: 固体粉末

作用通路: Others

溶解性: DMSO up to 100 mM

保存条件: Store in dry, dark place for one year.

产品介绍: KL001 is a novel and specific small molecule activator of cryptochrome (CRY) identified from an unbiased cell-based circadian screen (in human osteosarcoma U2OS cell line harboring a Bmal1-dLuc luciferase reporter). KL001 prevented ubiquitin-dependent degradation of CRY, resulting in lengthening of the circadian period. In addition, KL001-mediated CRY stabilization inhibited glucagon-induced gluconeogenesis in primary hepatocytes. Therefore, KL001 serves as a useful tool to study the regulation of CRY-dependent physiology and may help development of clock-based therapeutics for treating diabetes.