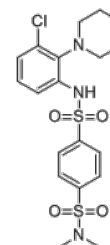


Product Name : ML-SA5
Cat. No. : PC-72043
CAS No. : 2418670-70-7
Molecular Formula : C₁₉H₂₄ClN₃O₄S₂
Molecular Weight : 457.988
Target : TRP Channel
Solubility : 10 mM in DMSO



Biological Activity

ML-SA5 (Mucolipin 1 agonist ML-SA5) is a potent, small molecule agonist of transient receptor potential mucolipin 1 (**TRPML1**/MCOLN1/ML1), dose-dependently activated whole-endolysosomal ML1 currents in DMD myoblasts with EC₅₀ of 285±144 nM.

ML-SA5-induced lysosomal Ca²⁺ release, measured with GCaMP3 imaging, in primary myotubes isolated from ML1MCK mice.

ML-SA5 ML1 agonist ML-SA5 ameliorate muscular dystrophies, facilitates sarcolemma repair to reduce muscle damage, activates TFEB to correct lysosomal insufficiency in mdx mice.

References

Lu Yu, et al. *Sci Adv.* 2020 Feb 7;6(6):eaaz2736.

Caution: Product has not been fully validated for medical applications. Lab Use Only!

E-mail: tech@probechem.com