

NS1652

Catalog No: tcsc0018395



Available Sizes

Size: 1mg

Size: 5mg

Size: 10mg



Specifications

CAS No:

1566-81-0

Formula:

$C_{15}H_{11}F_3N_2O_3$

Pathway:

Membrane Transporter/Ion Channel

Target:

Chloride Channel

Purity / Grade:

>98%

Solubility:

10 mM in DMSO

Observed Molecular Weight:

324.25

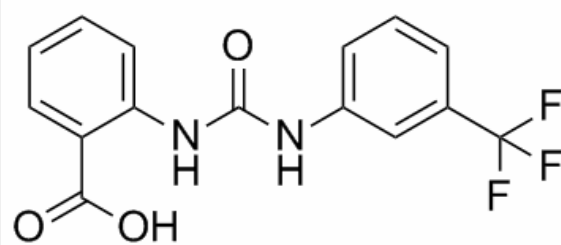
Product Description

NS1652 is a reversible **anion conductance** inhibitor, blocks **chloride channel**, with an **IC₅₀** of 1.6 μM in human and mouse red blood cells.

IC₅₀ & Target: IC₅₀: 1.6 μ M (chloride channel, human and mouse red blood cell)^[1]

In Vitro: NS1652 potently inhibits the chloride conductance (IC₅₀, 1.6 μ M) in human and mouse red blood cells, but only weakly inhibits VRAC (IC₅₀, 125 μ M) in HEK293 cells. NS1652 markedly blocks the NO production with an IC₅₀ of 3.1 μ M in BV2 cells. NS1652 also down-regulates iNOS expression at 3 μ M, and completely abolishes at 10 μ M in BV2 cells^[1]. NS1652 (0, 1.0, 3.3, 10, and 20 μ M) causes increasing hyperpolarization due to inhibition of the chloride conductance in normal erythrocytes. NS1652 lowers the net KCl loss from deoxygenated sickle cells from about 12 mM cells/h to about 4 mM cells/h. NS1652 (20 μ M) completely and reversibly inhibits the red cell Cl⁻ conductance^[2].

In Vivo: NS1652 (50 mg/kg, i.v.) blocks murine erythrocyte Cl⁻ conductance by >90% in mice^[2].



All products are for RESEARCH USE ONLY. Not for diagnostic & therapeutic purposes!