

Data Sheet

WWW.PROBECHEM.COM

Global Supplier of Chemical Probes, Inhibitors & Agonists.

Product Name : 2GBI

Cat. No. : PC-38295

CAS No. : 5418-95-1

Molecular Formula : $C_8H_9N_5$ Molecular Weight : 175.195

Target : Proton Pump

Solubility : 10 mM in DMSO

H HN NH₂

Biological Activity

2GBI (2-guanidinobenzimidazole) is a guanidine derivative that inhibits voltage-gated proton channel **Hv1** by binding to the VSD from its intracellular side.

2GBI also is an agonist directly targeting **NLRP3**, induces inflammasome activation, which is independent of potassium efflux, chloride efflux and mitochondrial dysfunction.

References

Hong L, et al. *Proc Natl Acad Sci U S A*. 2014 Jul 8;111(27):9971-6.

Gianti E, et al. *Proc Natl Acad Sci U S A*. 2016 Dec 27;113(52):E8359-E8368.

Geragotelis AD, et al. *Proc Natl Acad Sci U S A*. 2020 Jun 16;117(24):13490-13498.

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

E-mail: tech@probechem.com