

Product Data Sheet

Product Name: TFB-TBOA (hydrate)

Cat. No.: GC48159

Chemical Properties

Cas. No. N/A

SMILES FC(F)(F)C1=CC=C(C(NC2=CC=CC(CO[C@H](C(O)=O)[C@H](N)C(O)=O)=C2)=O)C=C1.O

Formula C₁₉H₁₇F₃N₂O₆.XH₂O

M.Wt 426.3

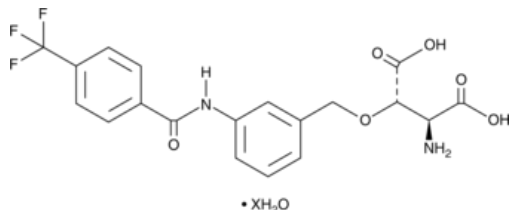
Solubility DMSO: 30 mg/ml

Storage Store at -20°C

General For obtaining a higher solubility, please warm the tube at 37 °C and shake it in the tips ultrasonic bath for a while. Stock solution can be stored below -20°C for several months.

Shipping Evaluation sample solution: ship with blue ice All other available size: ship with RT, or Condition blue ice upon request.

Structure



Background

TFB-TBOA is an inhibitor of excitatory amino acid transporter 1 (EAAT1) and EAAT2 with IC₅₀ values of 22 and 17 nM for EAAT1 and EAAT2, respectively, in a glutamate uptake assay using COS-1 cells.¹ It is selective for EAAT1 and EAAT2 over EAAT3 (IC₅₀ = 300 nM), as well as the choline, dopamine, GABA, norepinephrine, and serotonin transporters and a variety of neurotransmitter receptors at 10 μM. TFB-TBOA (10 μM) inhibits L-glutamate- and L-aspartate-induced currents in *X. laevis* oocytes. It induces convulsions in mice when administered at a dose of 0.2 μg/animal.

1. Shimamoto, K., Sakai, R., Takaoka, K., et al. Characterization of novel L-threo-β-benzoyloxyaspartate derivatives, potent blockers of the glutamate transporters. *Mol. Pharmacol.* 65(4):1008-1015 (2004)

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: (909) 407-4943 Fax: (626) 353-8530 E-mail: tech@glpbio.com

Address: 10292 Central Ave. #205, Montclair, CA, USA