
Product Data Sheet

Product Name: RB-OPD
Cat. No.: GC61560

Chemical Properties

Cas. No. 1034863-51-8

SMILES O=C1C2=C(C3(N1C4=C(N)C=CC=C4)C5=CC=C(N(CC)CC)C=C5OC6=CC(N(CC)CC)=CC=C63)C=CC=C2

Formula $C_{34}H_{36}N_4O_2$

M.Wt 532.68

Solubility DMSO : 25 mg/mL (46.93 mM; ultrasonic and warming and heat to 60°C) Storage Store at -20°C

General For obtaining a higher solubility , please warm the tube at 37 °C and shake it in the 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 blue ice upon Condition request.

Structure

Background

RB-OPD (NO-red) is a o-phenylenediamine (OPD)-locked rhodamine nitric oxide (NO) fluorescent probe with great sensitivity and selectivity ($\lambda_{ex}=550$ nm, $\lambda_{em}=590$ nm)[1].

RB-OPD (compound 1) exhibits "turn-on" type fluorogenic and chromogenic behavior toward NO in aqueous solution with great sensitivity and selectivity, and it can be used for the sensing of NO under normal physiological conditions. NO-red is composed of two moieties: rhodamine B spiro lactam as the potential strong fluorophore and chromophore, and o-phenylenediamine as an NO-reactive group in a lactam form as a "masked" NO-sensitive modulator[1].

[1]. Hong Zheng, et al. Fluorogenic and chromogenic rhodamine spiro lactam based probe for nitric oxide by spiro ring opening reaction. Org Lett. 2008 Jun 19;10(12):2357-60.

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