

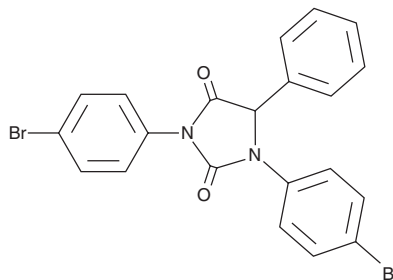
PRODUCT INFORMATION



CAY10508

Item No. 10008669

CAS Registry No.: 878533-35-8
Formal Name: 1,3-bis(4-bromophenyl)-5-phenyl-2,4-imidazolidinedione
MF: C₂₁H₁₄Br₂N₂O₂
FW: 486.2
Purity: ≥98%
UV/Vis.: λ_{max}: 248 nm
Supplied as: A crystalline solid
Storage: -20°C
Stability: ≥4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

Laboratory Procedures

CAY10508 is supplied as a crystalline solid. A stock solution may be made by dissolving the CAY10508 in the solvent of choice, which should be purged with an inert gas. CAY10508 is soluble in organic solvents such as DMSO and dimethyl formamide (DMF). The solubility of CAY10508 in these solvents is approximately 10 and 30 mg/ml, respectively.

CAY10508 is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, CAY10508 should first be dissolved in DMF and then diluted with the aqueous buffer of choice. CAY10508 has a solubility of approximately 0.25 mg/ml in a 1:2 solution of DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

CAY10508 is a potent and selective central cannabinoid (CB₁) receptor inverse agonist with a K_i value of 243 nM and an EC₅₀ of 195 nM.¹ A 10 μM concentration of CAY10508 resulted in 100% and 35% displacement of [³H]-CP-55,940 at the CB₁ and peripheral cannabinoid (CB₂) receptors, respectively. A [35S]-GTPγS binding assay revealed the inverse agonist properties of CAY10508 at the CB₁ receptor.

Reference

- Muccioli, G.G., Wouters, J., Charlier, C., *et al.* Synthesis and activity of 1,3,5-triphenylimidazolidine-2,4-diones and 1,3,5-triphenyl-2-thioxoimidazolidin-4-ones: Characterization of new CB₁ cannabinoid receptor inverse agonists/antagonists. *J. Med. Chem.* **49**(3), 872-882 (2006).

WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY

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