

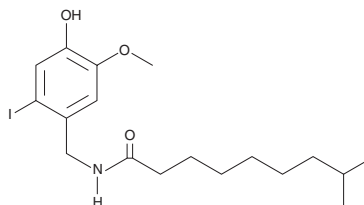
Product Information



CAY10448

Catalog No. 10005633

Formal Name: N-[(4-hydroxy-2-iodo-3-methoxyphenyl)methyl]-8-methyl nonanamide
MF: C₁₈H₂₈INO₃
FW: 433.3
Purity: ≥98%
Stability: ≥2 years at -20°C
Supplied as: A crystalline solid



For long term storage, we suggest that CAY10448 be stored as supplied at -20°C. It should be stable for at least two years.

CAY10448 is supplied as a crystalline solid. A stock solution may be made by dissolving the CAY10448 in an organic solvent purged with an inert gas. CAY10448 is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide. The solubility of CAY10448 in these solvents is approximately 30 mg/ml.

CAY10448 is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, CAY10448 should first be dissolved in ethanol and then diluted with the aqueous buffer of choice. CAY10448 has a solubility of approximately 0.25 mg/ml in a 1:2 solution of ethanol:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Capsaicin is the primary active component of the heat and pain-eliciting lipid soluble fraction of the Capsicum pepper.¹ Capsaicin signals are transduced by a heat-activated ion channel, the vanilloid receptor 1 (VR₁), or transient receptor potential vanilloid 1 (TRPV₁).² CAY10448 is an iodinated nonivamide, a potent capsaicin receptor antagonist with an IC₅₀ of approximately 10 nM.³

References

1. Gannett, P.M., Nagel, D.L., Reilly, P.J., *et al.* The capsaicinoids: Their separation, synthesis, and mutagenicity. *J. Org. Chem.* **53**(5), 1064-1071 (1988).
2. Caterina, M.J., Schumacher, M.A., Tominaga, M., *et al.* The capsaicin receptor: A heat-activated ion channel in the pain pathway. *Nature* **389**, 816-824 (1997).
3. Daddario, N., Minassi, A., Appendino, G., *et al.* The taming of capsaicin. Synthesis and vanilloid antagonistic activity of isosteric and regioisomeric halononiv amides and their products of halogen-carbon exchange. *14th Annual Symposium on the Cannabinoids* **137**, (2004).

Related Products

Capsaicin - Cat. No. 92350 • Dihydrocapsaicin - Cat. No. 92355

Cayman Chemical

Mailing address
1180 E. Ellsworth Road
Ann Arbor, MI
48108 USA

Phone
(800) 364-9897
(734) 971-3335

Fax
(734) 971-3640

E-Mail
custserv@caymanchem.com

Web
www.caymanchem.com

WARNING: THIS PRODUCT IS FOR LABORATORY RESEARCH ONLY: NOT FOR ADMINISTRATION TO HUMANS. NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

MATERIAL SAFETY DATA

This material should be considered hazardous until information to the contrary becomes available. Do not ingest, swallow, or inhale. Do not get in eyes, on skin, or on clothing. Wash thoroughly after handling. This information contains some, but not all, of the information required for the safe and proper use of this material. Before use, the user must review the complete Material Safety Data Sheet, which has been sent via email to your institution.

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Cayman will carry out its delivery obligations with due care and skill. Thus, in no event will Cayman have **any obligation or liability**, whether in tort (including negligence) or in contract, for any direct, indirect, incidental or consequential damages, even if Cayman is informed about their possible existence.

This limitation of liability does not apply in the case of intentional acts or negligence of Cayman, its directors or its employees. Buyer's **exclusive remedy** and Cayman's sole liability hereunder shall be limited to a **refund** of the purchase price, or at Cayman's option, the **replacement**, at no cost to Buyer, of all material that does not meet our specifications.

Said refund or replacement is conditioned on Buyer giving written notice to Cayman within thirty (30) days after arrival of the material at its destination. Failure of Buyer to give said notice within thirty (30) days shall constitute a waiver by Buyer of all claims hereunder with respect to said material.

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