# PRODUCT INFORMATION



## 8-M-PDOT

Item No. 29521

CAS Registry No.: 134865-70-6

Formal Name: N-(1,2,3,4-tetrahydro-8-methoxy-2-

naphthalenyl)-propanamide

Synonym: MF:  $C_{14}H_{19}NO_{2}$ 233.3 FW: **Purity:** ≥98%

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**

8-M-PDOT is supplied as a crystalline solid. A stock solution may be made by dissolving the 8-M-PDOT in the solvent of choice, which should be purged with an inert gas. 8-M-PDOT is soluble in the organic solvent DMSO.

## Description

8-M-PDOT is a melatonin receptor 2 (MT<sub>2</sub>) agonist ( $K_i = 1.12 \text{ nM}$ ).<sup>1</sup> It is 5.2-fold selective for MT<sub>2</sub> over MT<sub>1</sub> receptors in a radioligand binding assay. Striatal microinfusion of 8-M-PDOT (10 μg/μl) increases the percentage of time spent in the open arms of the elevated plus maze, indicating anxiolytic-like activity, in a rat model of rotenone-induced Parkinson's disease.<sup>2</sup>

### References

- 1. Browning, C., Beresford, I., Fraser, N., et al. Pharmacological characterization of human recombinant melatonin mt<sub>1</sub> and MT<sub>2</sub> receptors. Br. J. Pharmacol. 129(5), 877-886 (2000).
- 2. Noseda, A.C., Targa, A.D., Rodrigues, L.S., et al. REM sleep deprivation promotes a dopaminergic influence in the striatal MT2 anxiolytic-like effects. Sleep Sci. 9(1), 47-54 (2016).

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

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.

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