

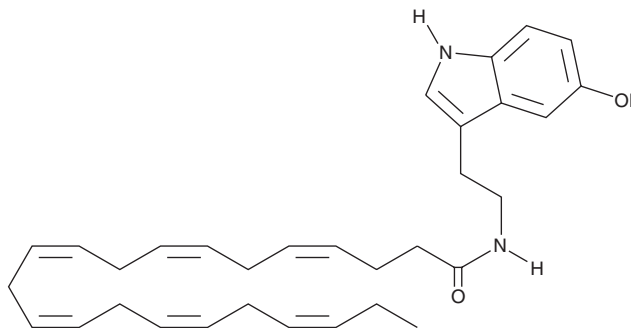
# PRODUCT INFORMATION



## Docosahexaenoyl Serotonin

Item No. 9000639

**CAS Registry No.:** 212707-51-2  
**Formal Name:** N-[2-(5-hydroxy-1H-indol-3-yl)ethyl]-4Z,7Z,10Z,13Z,16Z,19Z-docosahexaenamide  
**MF:** C<sub>32</sub>H<sub>42</sub>N<sub>2</sub>O<sub>2</sub>  
**FW:** 486.7  
**Purity:** ≥98%  
**Supplied as:** A solution in ethanol  
**Storage:** -20°C  
**Stability:** ≥2 years



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

### Laboratory Procedures

Docosahexaenoyl serotonin is supplied as a solution in ethanol. To change the solvent, simply evaporate the ethanol under a gentle stream of nitrogen and immediately add the solvent of choice. Solvents such as DMSO and dimethyl formamide purged with an inert gas can be used. The solubility of docosahexaenoyl serotonin in these solvents is approximately 15 mg/ml.

Docosahexaenoyl serotonin is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, the ethanolic solution of docosahexaenoyl serotonin should be diluted with the aqueous buffer of choice. The solubility of docosahexaenoyl serotonin in PBS (pH 7.2) is approximately 0.25 mg/ml. We do not recommend storing the aqueous solution for more than one day.

### Description

Docosahexaenoyl serotonin is a hybrid molecule patterned after arachidonoyl serotonin (Item No. 70665). Arachidonoyl serotonin is a dual antagonist of fatty acid amide hydrolase (FAAH) and the transient receptor potential vanilloid 1 (TRPV1) channel, reducing both acute and chronic peripheral pain.<sup>1,2</sup> The effects of replacing the arachidonoyl portion with docosahexaenoyl have not been studied.

### References

- Ortar, G., Cascio, M.G., De Petrocellis, L., *et al.* New N-arachidonoylserotonin analogues with potential "dual" mechanism of action against pain. *J. Med. Chem.* **50**, 6554-6569 (2007).
- Maione, S., De Petrocellis, L., de Novellis, V., *et al.* Analgesic actions of N-arachidonoyl-serotonin, a fatty acid amide hydrolase inhibitor with antagonistic activity at vanilloid TRPV1 receptors. *Br. J. Pharmacol.* **150**, 766-781 (2007).

#### 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.

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