

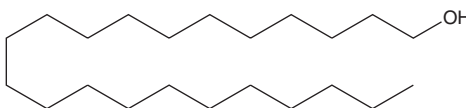
# PRODUCT INFORMATION



## Docosanol

Item No. 23793

**CAS Registry No.:** 661-19-8  
**Formal Name:** 1-docosanol  
**Synonyms:** Behenyl Alcohol, *n*-Docosanol, Docosyl Alcohol, NSC 8407  
**MF:** C<sub>22</sub>H<sub>46</sub>O  
**FW:** 326.6  
**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

Docosanol is supplied as a crystalline solid. A stock solution may be made by dissolving the docosanol in the solvent of choice, which should be purged with an inert gas. Docosanol is soluble in the organic solvent chloroform at a concentration of approximately 1.7 mg/ml.

### Description

Docosanol is an aliphatic alcohol that has broad-spectrum antiviral activity against viruses with a lipid envelope (ID<sub>50</sub>s = 3-12 nM for inhibition of replication).<sup>1</sup> It inhibits herpes simplex virus type 1 (HSV-1) replication and protein synthesis in Vero cells.<sup>2</sup> It also inhibits HSV-2 plaque formation and virus production in wild-type Vero cells and cells resistant to acyclovir (Item No. 14160). Docosanol acts by prohibiting the HSV envelope from fusing with the plasma membrane.<sup>1</sup> Formulations containing docosanol have been used in the topical treatment of HSV-1.

### References

1. Pope, L.E., Marcelletti, J.F., Katz, L.R., *et al.* The anti-herpes simplex virus activity of *n*-docosanol includes inhibition of the viral entry process. *Antiviral Res.* **40(1-2)**, 85-94 (1998).
2. Katz, D.H., Marcelletti, J.F., Khalil, M.H., *et al.* Antiviral activity of 1-docosanol, an inhibitor of lipid-enveloped viruses including herpes simplex. *Proc. Natl. Acad. Sci. USA* **88(23)**, 10825-10829 (1991).

#### 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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