# PRODUCT INFORMATION



## 5α-Cholestane

Item No. 26763

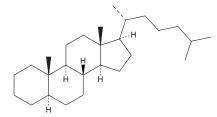
CAS Registry No.: 481-21-0 NSC 224419 Synonym:

MF: FW: **Purity:** ≥95%

Supplied as: A crystalline solid

-20°C Storage: Stability: ≥4 years

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



## **Laboratory Procedures**

5α-Cholestane is supplied as a crystalline solid. A stock solution may be made by dissolving the  $5\alpha$ -cholestane in the solvent of choice.  $5\alpha$ -Cholestane is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide, which should be purged with an inert gas. The solubility of  $5\alpha$ -cholestane in these solvents is approximately 20, 0.1, and 1 mg/ml, respectively.

5α-Cholestane is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, 5α-cholestane should first be dissolved in ethanol and then diluted with the aqueous buffer of choice.  $5\alpha$ -Cholestane has a solubility of approximately 0.1 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.

#### Description

5α-Cholestane is a sterol that has been found in dust samples from urban and rural paved and agricultural and public unpaved roads. It has been used as an internal standard for the quantification of phytosterols by HPLC-MS/MS and fecal sterols by GC-FID and GC-MS.<sup>2,3</sup>

#### References

- 1. Rogge, W.F., Medeiros, P.M., and Simoneit, B.R.T. Organic compounds in dust from rural and urban paved and unpaved roads taken during the San Joaquin Valley fugitive dust characterization study. Environ. Eng. Sci. 29(1), 1-13 (2012).
- 2. Mingyai, S., Strikaeo, K., Kettawan, A., et al. Effects of extraction methods on phytochemicals of rice bran oils produced from colored rice. J. Oleo. Sci. 67(2), 135-142 (2018).
- 3. Schönning, C., Leeming, R., and Stenström, T.A. Faecal contamination of source-separated human urine based on the content of faecal sterols. Water Res. 36(8), 1965-1972 (2002).

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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