

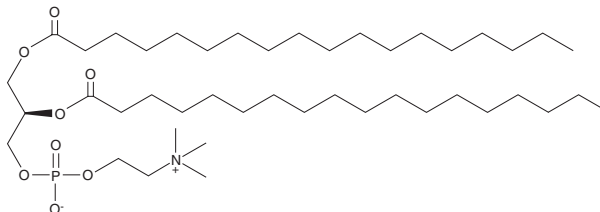
PRODUCT INFORMATION



1,2-Distearoyl-*sn*-glycero-3-PC

Item No. 15100

CAS Registry No.: 816-94-4
Formal Name: 1,2-distearoyl-*sn*-glycero-3-phosphatidylcholine
Synonyms: Coatsome MC 8080,
1,2-Distearoyl-*sn*-glycero-3-Phosphocholine,
1,2-DSPC, PC(18:0/18:0), 18:0/18:0-PC
MF: C₄₄H₈₈NO₈P
FW: 790.2
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

1,2-Distearoyl-*sn*-glycero-3-PC (1,2-DSPC) is supplied as a crystalline solid. A stock solution may be made by dissolving the 1,2-DSPC in the solvent of choice, which should be purged with an inert gas. 1,2-DSPC is soluble in the organic solvent ethanol at a concentration of approximately 1 mg/ml.

Description

1,2-DSPC is a phospholipid containing the saturated long-chain (18:0) stearic acid inserted at the *sn*-1 and *sn*-2 positions. It is commonly used in the generation of micelles, liposomes, and other types of artificial membranes.^{1,2} The transition temperature of 1,2-DSPC is approximately 55°C in a multilamellar aqueous solution.³

References

1. Hoyrup, P., Mouritsen, O.G., and Jorgensen, K. Phospholipase A₂ activity towards vesicles of DPPC and DMPC-DSPC containing small amounts of SMPC. *Biochim. Biophys. Acta.* **1515(2)**, 133-143 (2001).
2. Zhao, H., Joseph, J., Zhang, H., *et al.* Synthesis and biochemical applications of a solid cyclic nitron spin trap: A relatively superior trap for detecting superoxide anions and glutathionyl radicals. *Free Radic. Biol. Med.* **31(5)**, 599-606 (2001).
3. Mabrey, S. and Sturtevant, J.M. Investigation of phase transitions of lipids and lipid mixtures by sensitivity differential scanning calorimetry. *Proc. Natl. Acad. Sci. USA* **73(11)**, 3862-3866 (1976).

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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