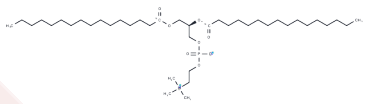
# Data Sheet (Cat.No.T38356)

TargetMol

## 1,2-Dipalmitoyl-13C-sn-glycero-3-PC

### Chemical Properties



CAS No. : 65277-91-0

Formula: C40H80NO8P

Molecular Weight: 736.037

Storage: Powder: -20°C for 3 years | In solvent: -80°C for 1 year
Actual storage temperature shall be subject to the COA.

### Biological Description

| | |
|---|---|
| Description | 1,2-Dipalmitoyl-13C-sn-glycero-3-PC is intended for use as an internal standard for the quantification of 1,2-dipalmitoyl-sn-glycero-3-PC by GC- or LC-MS. 1,2-Dipalmitoyl-sn-glycero-3-PC (T7773) (DPPC) is a zwitterionic glycerophospholipid commonly used in the formation of lipid monolayers, bilayers, and liposomes for use in a variety of applications.1,2,3,4 It has been used in the formation of proteoliposomes for implantation of γ-glutamyl transpeptidase into human erythrocyte membranes.3 Incorporation of glycosphingolipid antigens into DPPC-containing liposomes increases the immunogenicity of the antigens in mice.4 |
| Targets(IC50) | Endogenous Metabolite,Liposome |

### Solubility Information

| | |
|---|---|
| Solubility | Ethanol: 30 mg/mL (40.76 mM),Sonication is recommended.<br>(< 1 mg/ml refers to the product slightly soluble or insoluble) |

Preparing Stock Solutions

| | 1mg | 5mg | 10mg |
|---|---|---|---|
| 1 mM | 1.3586 mL | 6.7931 mL | 13.5862 mL |
| 5 mM | 0.2717 mL | 1.3586 mL | 2.7172 mL |
| 10 mM | 0.1359 mL | 0.6793 mL | 1.3586 mL |
| 50 mM | 0.0272 mL | 0.1359 mL | 0.2717 mL |

Please select the appropriate solvent to prepare the stock solution, according to the solubility of the product in different solvents. Please use it as soon as possible.

Note: The dilution table applies only to solid products. For liquid products, please calculate the stock solution based on the stated concentration and/or density.

Reference

Ege, C., and Lee, K.Y.C. Insertion of Alzheimer's Aβ40 peptide into lipid monolayers. Biophys. J. 87(3), 1732-1740 (2004).
Leekumjorn, S., and Sum, A.K. Molecular simulation study of structural and dynamic properties of mixed DPPC/DPPE bilayers. Biophys. J. 90(11), 3951-3965 (2006).
Kalra, V.K., Sikka, S.C., and Sethi, G.S. Transport of amino acids in γ-glutamyl transpeptidase-implanted human erythrocytes. J. Biol. Chem. 256(11), 5567-5571 (1981).
Uemura, A., Watarai, S., Iwasaki, T., et al. Induction of immune responses against glycosphingolipid antigens: Comparison of antibody responses in mice immunized with antigen associated with liposomes prepared from various phospholipids. J. Vet. Med. Sci. 67(12), 1197-1201 (2005).