

# PRODUCT INFORMATION



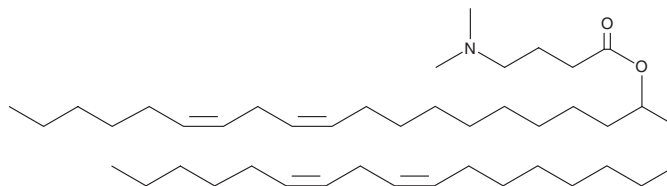
## DLin-MC3-DMA

Item No. 34364

**CAS Registry No.:** 1224606-06-7  
**Formal Name:** 4-(dimethylamino)-butanoic acid,  
(10Z,13Z)-1-(9Z,12Z)-9,12-octadecadien-  
1-yl-10,13-nonadecadien-1-yl ester

**Synonym:** MC3  
**MF:** C<sub>43</sub>H<sub>79</sub>NO<sub>2</sub>  
**FW:** 642.1  
**Purity:** ≥95%

**UV/Vis.:** λ<sub>max</sub>: 204 nm  
**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

DLin-MC3-DMA is supplied as a solution in ethanol. A stock solution may be made by dissolving the DLin-MC3-DMA in the solvent of choice, which should be purged with an inert gas. DLin-MC3-DMA is soluble in DMSO.

### Description

DLin-MC3-DMA is an ionizable cationic amino lipid (apparent  $pK_a = 6.44$ ) that has been used in combination with other lipids in the formation of lipid nanoparticles (LNPs).<sup>1</sup> Administration of Factor VII siRNA in DLin-MC3-DMA-containing LNPs reduces plasma Factor VII protein levels in mice. Formulations containing DLin-MC3-DMA have been used in the development of LNPs for siRNA delivery in patients with hereditary transthyretin-mediated amyloidosis.

### Reference

1. Jayaraman, M., Ansell, S.M., Mui, B.L., *et al.* Maximizing the potency of siRNA lipid nanoparticles for hepatic gene silencing in vivo. *Angew. Chem. Int. Ed. Engl.* **51(34)**, 8529-8533 (2012).

#### 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.

#### WARRANTY AND LIMITATION OF REMEDY

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