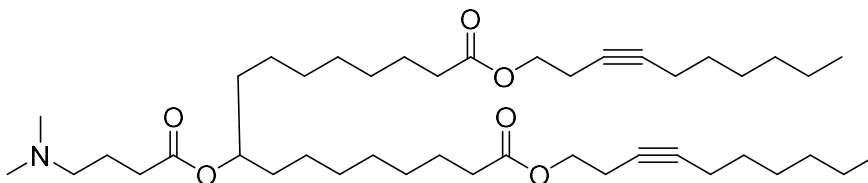


## Lipid A6

**Catalog number:** N-1006



**Molecular Formula:** C<sub>43</sub>H<sub>75</sub>NO<sub>6</sub>

**MW:** 702.07

**CAS#:** 3037332-21-8

**Alternate Name:** 9-[4-(dimethylamino)-1-oxobutoxy]-heptadecanedioic acid, 1,17-di-(dec-3-yn-1-yl) ester  
Di(dec-3-yn-1-yl)9-((4-(dimethylamino)butanoyl)oxy)heptadecanedioate

**Solubility:** Methanol, ethanol, DMSO, and dimethyl formamide.

**Storage and Handling:** Lipid A6 is stable for at least one year when stored as a solid, protected from moisture, and light at -20°C. Solutions of Lipid A6 should be stored at -20°C between uses.

**Background:** Lipid A6 is an ionizable and biodegradable lipid. Lipid A6 has similar structure as MC3 but with ester and alkyne bonds to improve its biodegradability and cell membrane fusion ability. Lipid A6 forms lipid-like nanoparticles together with cKK-E12 synergistically facilitate robust mRNA delivery with improved tolerability. MC3 is the key delivery nanoparticle component of the first siRNA drug Onpattro.

**References:** 1) Miao L. et al. "Synergistic lipid compositions for albumin receptor mediated delivery of mRNA to the liver." *Nat. Commun.* 2020, *11(1)*, 1-13 <https://pubmed.ncbi.nlm.nih.gov/32415122/>

**Hazardous Properties and Cautions:** The toxicological and pharmacological properties of this compound are not fully known. For further information see the MSDS on request. This product is manufactured and shipped only in small quantities, intended for research and development in a laboratory utilizing prudent procedures for handling chemicals of unknown toxicity, under the supervision of persons technically qualified to evaluate potential risks and authorized to enforce appropriate health and safety measures. As with all research chemicals, precautions should be taken to avoid unnecessary exposures or risks.

**Warranty and Disclaimer:** Echelon warrants the product conforms to the specifications stated herein. In the event of nonconformity, Echelon will replace products or refund purchase price, at its sole option, and Echelon shall not be responsible for any other loss or damage, whether known or foreseeable to Echelon. No other warranties apply, express or implied, including but not limited to warranty of fitness for any purpose or implied warranty of merchantability. Purchaser is solely responsible for all consequences of its use of the product and Echelon assumes no responsibility therefore, including success of purchaser's research and development, or health or safety of any uses of the product.

Technical Data Sheet, Rev 1, 9/25/2024 – **For research use only.** Not intended for diagnostic or therapeutic use.

