TECHNICAL DATA SHEET

1-(7Z-tetradecenoyl)-rac-glycerol

Catalog Number	850530	Physical state	Oil
Purity	99%	Transition temp.	No data
CAS		CMC	No data
Synonyms	7.7 MAG	pK _a	No data
Molec. Formula	$C_{17}H_{32}O_4$	TLC mobile phase	C:M*, 95:5, v/v
MW	300.434	Exact Mass	300.230
Percent composition	C 67.96% H 10.74% O 21.30%		
Stability	Store in <-20°C freezer for up to 6 months		
Solubility	Soluble in ethanol, methanol, water and chloroform		
Web link	850530	_	

^{*}C, chloroform; M, methanol

Description:

Crystallizing membrane proteins has been challenging. Recently, lipidic mesophases have been used to isolate the structures of many prokaryotic and eukaryotic membrane proteins, including G-protein receptors (Caffrey and Cherezov, 2009; Caffrey and Porter, 2010). The lipid choice for *in meso* crystallization must be considered (Li, Lee and Caffrey, 2011) because lipid bilayers have different compositions. This methodology has been automated for high-throughput robots (Caffrey and Cherezov, 2009). Avanti Polar Lipids currently offers four modified MAGs to use in *in meso* crystallization studies.

References:

- Caffrey M, Cherezov V (2009) Crystallizing membrane proteins using lipidic mesophases. Nat Protoc. 4(5):706-31
- Caffrey M, Porter C (2010) Crystallizing membrane proteins for structure determination using lipidic mesophases. J Vis Exp. 45:1712
- Li D, Lee J, Caffrey M (2011) Crystallizing membrane proteins in lipidic mesophases. A host lipid screen. Cryst Growth Des. 11(2): 530-7

Related products: Detergents

MSDS: Available at www.avantilipids.com for Product Number 850530

