

Revision: 04/27/2019

				(= 0) 11						
			to Regulation (EC) No. 1907/2006 as amended b	-						
		Section 1. Ic	lentification of the Substance/Mix	ture and of th	ie Company/Ur	ndertaking				
.1		t Code:	27063							
		t Name:	1,2-Dilinoleoyl-3-Stearoyl-rac-gly							
	Synony	/ms:	9Z,12Z-octadecadienoic acid, 1,		ctadecyl)oxy]me	hyl]-1,2-ethanediyl] ester;				
			1,2-Linolein-3-Stearin; TG(18:2/		_					
.2			the substance or mixture and use	-						
		ant identified uses:	For research use only, not for hu	iman or veterin	nary use.					
1.3			e Safety Data Sheet:							
	Comp	bany Name:	Cayman Chemical Company 1180 E. Ellsworth Rd.							
			Ann Arbor, MI 48108							
	Web s	site address:	www.caymanchem.com							
	Inform	nation:	Cayman Chemical Company		+1 (734	971-3335				
.4	Emerge	ency telephone num	ber:							
	Emer	gency Contact:	CHEMTREC Within USA and Ca	anada:	+1 (800))424-9300				
			CHEMTREC Outside USA and C	Canada:	+1 (703	3)527-3887				
			Section 2. Hazards	dentifica	ation					
.1	Classif	ication of the Substa	nce or Mixture:							
2.2	Label E	lements:								
	GHS	Signal Word:	None							
		Hazard Phrases:								
	Base	d on evaluation of cur	ently available data this substance of	or mixture is no	ot classifiable ac	cording to GHS.				
	GHS	Precaution Phrases								
	No ph	nrases apply.								
	GHS	Response Phrases:								
	No phrases apply.									
	NO PI	rases apply.	GHS Storage and Disposal Phrases:							
	-		al Phrases:							
	GHS Pleas	Storage and Dispos	r Storage and Section 13 for Dispos							
2.3	GHS Pleas Advers	Storage and Dispos e refer to Section 7 fo se Human Health	r Storage and Section 13 for Dispos Material may be irritating to the muc	ous membrane	es and upper res	piratory tract.				
2.3	GHS Pleas Advers	Storage and Dispos the refer to Section 7 for se Human Health is and Symptoms:	r Storage and Section 13 for Dispos Material may be irritating to the muc May be harmful by inhalation, ingest	ous membrane tion, or skin abs	es and upper res sorption.	piratory tract.				
2.3	GHS Pleas Advers	Storage and Dispos the refer to Section 7 for se Human Health as and Symptoms:	r Storage and Section 13 for Dispos Material may be irritating to the muce May be harmful by inhalation, ingest May cause eye, skin, or respiratory s	ous membrane tion, or skin abs system irritatior	es and upper res sorption. n.					
2.3	GHS Pleas Advers	Storage and Dispos the refer to Section 7 for se Human Health is and Symptoms:	r Storage and Section 13 for Dispos Material may be irritating to the muce May be harmful by inhalation, ingest May cause eye, skin, or respiratory s To the best of our knowledge, the to	ous membrane tion, or skin abs system irritatior xicological prop	es and upper res sorption. n. perties have not	been thoroughly investigated				
2.3	GHS Pleas Advers Effects	Storage and Dispos the refer to Section 7 for se Human Health is and Symptoms: Sectio	r Storage and Section 13 for Dispos Material may be irritating to the much May be harmful by inhalation, ingest May cause eye, skin, or respiratory s To the best of our knowledge, the to on 3. Composition/Info	ous membrane tion, or skin abs system irritatior xicological prop rmation of	es and upper res sorption. n. perties have not n Ingredier	been thoroughly investigated				
CAS	GHS Pleas Advers Effects	Storage and Dispos the refer to Section 7 for se Human Health is and Symptoms: Sectio	r Storage and Section 13 for Dispos Material may be irritating to the muce May be harmful by inhalation, ingest May cause eye, skin, or respiratory s To the best of our knowledge, the to on 3. Composition/Info nents (Chemical Name)/ Conce	ous membrane tion, or skin abs system irritatior xicological prop rmation Ol entration	es and upper res sorption. n. perties have not	been thoroughly investigated				
CAS	GHS Pleas Advers Effects	Storage and Dispos the refer to Section 7 for se Human Health s and Symptoms: Section Hazardous Compo	r Storage and Section 13 for Dispos Material may be irritating to the much May be harmful by inhalation, ingest May cause eye, skin, or respiratory s To the best of our knowledge, the to On 3. Composition/Info nents (Chemical Name)/ Conce	ous membrane tion, or skin abs system irritatior xicological prop rmation of entration	es and upper res sorption. n. perties have not n Ingredier EC No./	been thoroughly investigated				

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		Section 4. First Aid Measures
4.1	Description of First Aid	
	Measures:	
	In Case of Inhalation:	Remove to fresh air. If not breathing, give artificial respiration or give oxygen by trained personnel. Get immediate medical attention.
	In Case of Skin Contact:	Immediately wash skin with soap and plenty of water for at least 15 minutes. Remove contaminated clothing. Get medical attention if symptoms occur. Wash clothing before reuse.
	In Case of Eye Contact:	Hold eyelids apart and flush eyes with plenty of water for at least 15 minutes. Have eyes examined and tested by medical personnel.
	In Case of Ingestion:	Wash out mouth with water provided person is conscious. Never give anything by mouth to an unconscious person. Get medical attention. Do NOT induce vomiting unless directed to do so by medical personnel.
		Section 5. Fire Fighting Measures
5.1	Suitable Extinguishing	Use alcohol-resistant foam, carbon dioxide, water, or dry chemical spray.
	Media:	Use water spray to cool fire-exposed containers.
	Unsuitable Extinguishing Media:	A solid water stream may be inefficient.
5.2	Flammable Properties an Hazards:	d No data available.
		No data available.
	Flash Pt:	No data.
	Explosive Limits:	LEL: No data. UEL: No data.
	Autoignition Pt:	No data.
5.3	Fire Fighting Instructions	: As in any fire, wear self-contained breathing apparatus pressure-demand (NIOSH approved or equivalent), and full protective gear to prevent contact with skin and eyes.
		Section 6. Accidental Release Measures
6.1	Protective Precautions,	Avoid raising and breathing dust, and provide adequate ventilation.
	Protective Equipment and	d As conditions warrant, wear a NIOSH approved self-contained breathing apparatus, or respirator,
	Emergency Procedures:	and appropriate personal protection (rubber boots, safety goggles, and heavy rubber gloves).
6.2	Environmental Precautions:	Take steps to avoid release into the environment, if safe to do so.
6.3	Methods and Material Fo	r Contain spill and collect, as appropriate.
	Containment and Cleanir	${ m g}$ Transfer to a chemical waste container for disposal in accordance with local regulations.
	Up:	
		Section 7. Handling and Storage
7.1	Precautions To Be Taken	Avoid breathing dust/fume/gas/mist/vapours/spray.
	in Handling:	Avoid prolonged or repeated exposure.
7.2	Precautions To Be Taken	Keep container tightly closed.
	in Storing:	Store in accordance with information listed on the product insert.
	Sec	tion 8. Exposure Controls/Personal Protection
8.1	Exposure Parameters:	
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8.2	Exposure Controls:				
8.2.1	Engineering Controls Us	se process enclosures, local exhaust ventilation, or other engineering controls to control airborne			
	(Ventilation etc.): le	vels below recommended exposure limits.			
8.2.2	Personal protection equipm	ent:			
	Eye Protection: Sa	afety glasses			
	Protective Gloves: Co	ompatible chemical-resistant gloves			
	Other Protective Clothing:La	ab coat			
	Respiratory Equipment N	OSH approved respirator, as conditions warrant.			
	(Specify Type):				
	Work/Hygienic/Maintenan De	o not take internally			
		acilities storing or utilizing this material should be equipped with an eyewash and a safety shower.			
		ash thoroughly after handling.			
		o data available.			
L	Sec	tion 9. Physical and Chemical Properties			
9.1	Information on Basic Physica	-			
	Physical States:	[]Gas [X]Liquid []Solid			
	Appearance and Odor:	A liquid			
	pH:	No data.			
	Melting Point:	No data.			
	Boiling Point:	No data.			
	Flash Pt:	No data.			
	Evaporation Rate:	No data.			
	Flammability (solid, gas):	No data available.			
	Explosive Limits:	LEL: No data. UEL: No data.			
	Vapor Pressure (vs. Air or m	m No data.			
	Hg):				
	Vapor Density (vs. Air = 1):	No data.			
	Specific Gravity (Water = 1):	No data.			
	Solubility in Water:	No data.			
	Solubility Notes:	0.5 mg/ml in a 1:1 solution of EtOH:PBS (pH 7.2); ~10 mg/ml in EtOH & DMF; soluble			
	······································	(slightly) in: chloroform;			
	Octanol/Water Partition	No data.			
	Coefficient:				
	Autoignition Pt:	No data.			
	Decomposition Temperature				
	Viscosity:	No data.			
0.0	-				
9.2	Other Information				
	Percent Volatile:	No data.			
	Molecular Formula & Weight	t: C57H102O6 883.4			

Multi-region format



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10.1	-							
10.2								
10.3	Stability Note(s):		Stable if stored in accordance with information listed on the product insert.					
	Polyme	rization:	Will occur [] Will not occur [X					
10.4	Conditio	ons To Avoid:	No data available.					
10.5	5 Incompatibility - Materials oxidizing agents To Avoid:							
10.6	Hazardous		carbon dioxide					
	Decomposition or		carbon monoxide					
	Byprodu	JCts:	_					
			Section 11. Toxicolog	cal Informa	ation			
11.1	Informa		The toxicological effects of this produced	ct have not beer	n thoroughly st	udied.		
	Toxicolo	ogical Effects:						
CAS	#	Hazardous Com	oonents (Chemical Name)	NTP	IARC	ACGIH	OSHA	
219	0-17-2	1,2-Dilinoleoyl-3-	Stearoyl-rac-glycerol	n.a.	n.a.	n.a.	n.a.	
219	0-17-2	1,2-Dilinoleoyl-3-	Stearoyl-rac-glycerol	n.a.		n.a.	n.a.	
219 1 2.1				n.a.		n.a.	n.a.	
	0-17-2 Toxicity		Stearoyl-rac-glycerol Section 12. Ecologic	n.a. al Informat	ion	n.a.	n.a.	
	Toxicity		Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment.	n.a. al Informat	ion	n.a.	n.a.	
12.1	Toxicity	: ence and	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa	n.a. al Informat	ion	n.a.	n.a.	
12.1	Toxicity Persiste Degrada	: ence and	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa	n.a. al Informat	ion	n.a.	n.a.	
12.1 12.2	Toxicity Persiste Degrada	: ence and ability: imulative	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available.	n.a. al Informat	ion	n.a.	n.a.	
12.1 12.2	Toxicity Persiste Degrada Bioaccu	: ence and ability: imulative al:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available.	n.a. al Informat	ion	n.a.	n.a.	
12.1 12.2 12.3	Toxicity Persiste Degrada Bioaccu Potentia Mobility	: ence and ability: imulative al:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available.	n.a. al Informat	ion	n.a.	n.a.	
12.1 12.2 12.3 12.4	Toxicity Persiste Degrada Bioaccu Potentia Mobility	: ence and ability: imulative al: in Soil: of PBT and vPvB	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available.	n.a. al Informat	ion	n.a.	n.a.	
12.1 12.2 12.3 12.4	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assessm	: ence and ability: imulative al: in Soil: of PBT and vPvB	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available.	n.a. al Informat	ion	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assessm	: ence and ability: imulative al: in Soil: of PBT and vPvB nent:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available.	n.a. al Informat	ion ollution.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ac	: ence and ability: imulative al: in Soil: of PBT and vPvB nent:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available.	n.a. al Informat ter may cause p Considerat	ion ollution.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5 12.6	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ac	: ence and ability: imulative al: in Soil: of PBT and vPvB nent: dverse effects:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available. Section 13. Disposal	n.a. al Informat ter may cause p Considerat te, and federal r	ion ollution. ions egulations.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5 12.6	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ac	: ence and ability: imulative al: in Soil: of PBT and vPvB nent: dverse effects:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available. No data available. Section 13. Disposal Dispose in accordance with local, sta Section 14. Transpo	n.a. al Informat ter may cause p Considerat te, and federal r	ion ollution. ions egulations.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5 12.6 13.1 14.1	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ac	: ence and ability: imulative al: in Soil: of PBT and vPvB nent: dverse effects: Disposal Method:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available. No data available. Section 13. Disposal Dispose in accordance with local, sta Section 14. Transpo	n.a. al Informat ter may cause p Considerat te, and federal r	ion ollution. ions egulations.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5 12.6 13.1 14.1 D	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ac	: ence and ability: imulative al: in Soil: of PBT and vPvB nent: dverse effects: Disposal Method: RANSPORT (US I er Shipping Name:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available. No data available. Section 13. Disposal Dispose in accordance with local, sta Section 14. Transpo	n.a. al Informat ter may cause p Considerat te, and federal r	ion ollution. ions egulations.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5 12.6 13.1 14.1 D	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ac Waste D LAND T	: ence and ability: imulative al: in Soil: of PBT and vPvB nent: dverse effects: Disposal Method: RANSPORT (US I er Shipping Name: d Class:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available. No data available. Section 13. Disposal Dispose in accordance with local, sta Section 14. Transpo	n.a. al Informat ter may cause p Considerat te, and federal r	ion ollution. ions egulations.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5 12.6 13.1 14.1 D	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ac Waste D LAND T OT Prope	: ence and ability: imulative al: in Soil: of PBT and vPvB nent: dverse effects: Disposal Method: RANSPORT (US I er Shipping Name: d Class:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available. No data available. Dispose in accordance with local, state Section 13. Disposal Dispose in accordance with local, state Section 14. Transpose Dot): Not dangerous goods.	n.a. al Informat ter may cause p Considerat te, and federal r	ion ollution. ions egulations.	n.a.	n.a.	
12.1 12.2 12.3 12.4 12.5 12.6 13.1 14.1 D U 14.1	Toxicity Persiste Degrada Bioaccu Potentia Mobility Results assess Other ad Waste D UNAND T OT Prope OT Hazar	: ence and ability: imulative al: in Soil: of PBT and vPvB nent: dverse effects: Disposal Method: RANSPORT (US I er Shipping Name: d Class: nber:	Stearoyl-rac-glycerol Section 12. Ecologic Avoid release into the environment. Runoff from fire control or dilution wa No data available. No data available. No data available. No data available. No data available. No data available. Dispose in accordance with local, state Section 13. Disposal Dispose in accordance with local, state Section 14. Transpose Dot): Not dangerous goods.	n.a. al Informat ter may cause p Considerat te, and federal r	ion ollution. ions egulations.	n.a.	n.a.	
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14.3 AIR TR	ANSPORT (ICAO/	IATA):					
ICAO/IATA	A Shipping Name:	Not dangerous goods.					
Additional Tra	ansport	Transport in accordance with le	ocal, state, and feder	al regulations.			
		Section 15. Regu	latory Informa	ation			
EPA SARA (S	uperfund Amendn	nents and Reauthorization Act	of 1986) Lists				
CAS #	Hazardous Com	ponents (Chemical Name)	S. 302 (EHS)	S. 304 RQ	S. 313 (TRI)		
2190-17-2	1,2-Dilinoleoyl-3-	Stearoyl-rac-glycerol	No	No	No		
CAS #	Hazardous Com	ponents (Chemical Name)	Other US EPA or State Lists				
2190-17-2	1,2-Dilinoleoyl-3-Stearoyl-rac-glycerol		CAA HAP,ODC: PROP.65: No	CAA HAP,ODC: No; CWA NPDES: No; TSCA: No; CA PROP.65: No			
Regulatory Inf Statement:	ormation	This SDS was prepared in accordance with 29 CFR 1910.1200 and Regulation (EC) No.1272/2008.					
		Section 16. Ot	nermonnauc	DN			
Revision Date: Additional Information About		04/27/2019 No data available.					
This Product: Company Policy or Disclaimer:		DISCLAIMER: This information currently available to us. Howe express or implied, with respec- use. Users should make their their particular purposes.	ver, we make no war t to such information	ranty of merchanta , and we assume r	ability or any other warrant		