MATERIAL SAFETY DATA SHEET GEON M7230 TAN

Version Number 1.3 Revision Date 04/22/2013

Product Use

Page 1 of 8 Print Date 4/22/2013

POLYONE CORPORATION 33587 Walker Road, Avon Lake, OH 44012

Telephone Emergency telephone number	:	1 (440) 930-1000 or 1 (866) POLYONE CHEMTREC 1-800-424-9300 (24hrs for spill, leak, fire, exposure or accident).
Product name	:	GEON M7230 TAN
Product code	:	VC10004500
Chemical Name	:	Mixture
CAS-No.	:	Mixture

: Industrial Applications

2. COMPOSITION/INFORMATION ON INGREDIENTS

Components	CAS-No.	Weight percent
8-Oxa-3,5-dithia-4-stannatetradecanoic acid, 10-ethyl-4,4-dimethyl-7-oxo-, 2-ethylhexyl ester	57583-35-4	1 - 5
Stannane, methyltris(2- ethylhexyloxycarbonylmethylthio)-	57583-34-3	1 - 5
Styrene	100-42-5	0.1 - 1
Titanium dioxide	13463-67-7	0.1 - 1
Calcium stearate	1592-23-0	1 - 5

3. HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW

This mixture has not been evaluated as a whole. All ingredients are bound and potential for hazardous exposure as shipped is minimal. However, some vapors may be released upon heating or processing. The end-user (fabricator) must take the necessary precautions (mechanical ventilation, respiratory protection, etc.) to protect employees from exposure. See sections 8 and 11 for special precautions. May emit Hydrogen Chloride (HCl) or Carbon Monoxide (CO) under fire conditions.

POTENTIAL HEALTH EFFECTS

Routes of Exposure: : Inhalation, Ingestion, Skin contact

Acute exposure

Inhalation

: Resin particles, like other inert materials, can be mechanically irritating.

PolyOne.

MATERIAL SAFETY DATA SHEET **GEON M7230 TAN**

ion Number 1.3 sion Date 04/22/2013	Page 2 Print Date 4/22/2
Ingestion Eyes	May be harmful if swallowed.Resin particles, like other inert materials, are mechanically irritating to
Skin	eyes. : Experience shows no unusual dermatitis hazard from routine handling
Chronic exposure	: Refer to Section 11 for Toxicological Information.
Medical Conditions Aggravated by Exposure:	: None known.
	4. FIRST AID MEASURES
Inhalation	: Move to fresh air in case of accidental inhalation of fumes from overheating or combustion. When symptoms persist or in all cases of doubt seek medical advice.
Ingestion	: Do not induce vomiting without medical advice. When symptoms persist or in all cases of doubt seek medical advice.
Eyes	: Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. If eye irritation persists, seek medical attention.
Skin	: Wash off with soap and plenty of water. If skin irritation persists seek medical attention.
	5. FIREFIGHTING MEASURES
Flash point	: not applicable
Flammable Limits	
Upper explosion limit	: not applicable
Lower explosion limit	: not applicable
Auto-ignition temperature	: Not applicable
Suitable extinguishing media	: Carbon dioxide blanket, Water spray, Dry powder, Foam.
Special Fire Fighting Procedures	: Fullface self-contained breathing apparatus (SCBA) used in positive pressure mode should be worn to prevent inhalation of airborne contaminants.
Unusual Fire/Explosion Hazards	 May emit Hydrogen Chloride (HCl) or Carbon Monoxide (CO) under fire conditions. Carbon dioxide (CO2), carbon monoxide (CO), oxides of nitrogen (NOx), other hazardous materials, and smoke are all possible.
	6. ACCIDENTAL RELEASE MEASURES
Personal precautions	: Wear appropriate personal protection during cleanup, such as impervious gloves, boots and coveralls.
Environmental precautions	: Should not be released into the environment. The product should not



MATERIAL SAFETY DATA SHEET **GEON M7230 TAN**

ion Number 1.3 sion Date 04/22/2013		Page 3 Print Date 4/22/2
		be allowed to enter drains, water courses or the soil.
Methods for cleaning up	:	Clean up promptly by sweeping or vacuum. Package all material in plastic, cardboard or metal containers for disposal.
		7. HANDLING AND STORAGE
Handling	:	Take measures to prevent the build up of electrostatic charge. Heat only in areas with appropriate exhaust ventilation. Processing fume condensates may contain combustible or toxic residue. Periodically clean hoods, ducts, and other surfaces to minimize accumulation of these materials.
Storage	:	Keep containers dry and tightly closed to avoid moisture absorption and contamination. Keep in a dry, cool place.
8. EX	POSU	RE CONTROLS/PERSONAL PROTECTION
Respiratory protection	:	No personal respiratory protective equipment normally required. If dusty conditions occur wear appropriate respiratory protection.
Eye/Face Protection	:	Safety glasses with side-shields
Hand protection	:	Protective gloves
Skin and body protection	:	Long sleeved clothing
Additional Protective Measures	:	Safety shoes
General Hygiene Considerations	:	Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday. This product may contain residual vinyl chloride monomer (VCM) (CAS number 75-01-4) below 8.5 ppm (0.00085%). It is unlikely, under normal working conditions with adequate ventilation, that the exposure limits will be exceeded for residual VCM. However, the user should take the necessary precautions (e.g. mechanical ventilation, local exhaust ventilation, air-monitoring, respiratory protection, etc.) to ensure airborne levels of any vapors including VCM or dusts that may be released during heating or processing are below regulated levels.
Engineering measures	:	Heat only in areas with appropriate exhaust ventilation. Provide appropriate exhaust ventilation at machinery.
Exposure limit(s)		

PolyOne

MATERIAL SAFETY DATA SHEET **GEON M7230 TAN**

Version Number 1.3 Revision Date 04/22/2013 Page 4 of 8 Print Date 4/22/2013

Components	Value	Exposure time	Exposure type	List:
Calcium stearate	10 mg/m3	Time Weighted Average (TWA):		ACGIH
Styrene	20 ppm	Time Weighted Average (TWA):		ACGIH
	40 ppm	Short Term Exposure Limit (STEL):		ACGIH
	50 ppm 215 mg/m3	Recommended exposure limit (REL):		NIOSH
	100 ppm 425 mg/m3	Short Term Exposure Limit (STEL):		NIOSH
	100 ppm	Time Weighted Average (TWA):		OSHA Z2
	200 ppm	Ceiling Limit Value:		OSHA Z2
	600 ppm	Maximum concentration:		OSHA Z2
	50 ppm 215 mg/m3	Time Weighted Average (TWA):		OSHA Z1A
	100 ppm 425 mg/m3	Short Term Exposure Limit (STEL):		OSHA Z1A
	50 ppm 215 mg/m3	Time Weighted Average (TWA):		MX OEL
	100 ppm 425 mg/m3	Short Term Exposure Limit (STEL):		MX OEL
Titanium dioxide	10 mg/m3	Time Weighted Average (TWA):		ACGIH
	15 mg/m3	PEL:	Total dust.	OSHA Z1
	10 mg/m3	Time Weighted Average (TWA):	Total dust.	OSHA Z1A
	10 mg/m3	Time Weighted Average (TWA):	as Ti	MX OEL
	20 mg/m3	Short Term Exposure Limit (STEL):	as Ti	MX OEL

9. PHYSICAL AND CHEMICAL PROPERTIES

- Form Appearance Colour Odour Melting point/range Boiling Point: Water solubility
- solid
 pellets, powder
 TAN
 very faint
 Not determined
 not applicable
 insoluble
- Evapouration rate Specific Gravity Bulk density Vapour pressure Vapour density pH
- Not applicable
 Not determined
 Not established
 not applicable
 not applicable
 not applicable

10. STABILITY AND REACTIVITY

Stability

: The product is stable if stored and handled as prescribed.

Hazardous Polymerization

: Will not occur.



MATERIAL SAFETY DATA SHEET **GEON M7230 TAN**

Version Number 1.3 Page 5 of 8 Print Date 4/22/2013 Revision Date 04/22/2013 : Keep away from oxidizing agents and open flame. To avoid thermal Conditions to avoid decomposition, do not overheat. : Incompatible with strong acids and oxidizing agents., Avoid contact Incompatible Materials with acetal homopolymers and acetal copolymers during processing. Hazardous decomposition Carbon dioxide (CO2), carbon monoxide (CO), oxides of nitrogen : products (NOx), other hazardous materials, and smoke are all possible. Prolonged heating (approximately 30 minutes or more) above 392 °F (200 °C) or short term heating at 482 °F (250 °C) may result in product decomposition and evolution of carbon monoxide and hydrogen chloride.

11. TOXICOLOGICAL INFORMATION

This mixture has not been evaluated as a whole for health effects. Exposure effects listed are based on existing health data for the individual components which comprise the mixture.

Toxicity Overview

This product contains the following components which in their pure form have the following characteristics:

CAS-No.	Chemical Name	Effect	Target Organ
57583-35-4	8-Oxa-3,5-dithia-4-	Irritant	Eyes, Skin.
	stannatetradecanoic acid,		
	10-ethyl-4,4-dimethyl-7-		
	oxo-, 2-ethylhexyl ester		
57583-34-3	Stannane, methyltris(2-	Irritant	Eyes, Skin.
	ethylhexyloxycarbonylmet		
	hylthio)-		
100-42-5	Styrene	Irritant	Eyes, Respiratory system.
		Systemic effects	Eyes, Skin, Respiratory
			system, Liver, central nervous
			system (CNS).
13463-67-7	Titanium dioxide	Systemic effects	Respiratory system.

LC50 / LD50

This product contains the following components which, in their pure form, have the following toxicity data:

CAS-No.	Chemical Name	Route	Value	Species
57583-34-3	Stannane, methyltris(2- ethylhexyloxycarbonylmet hylthio)-	Oral LD50	920 mg/kg	rat
100-42-5	Styrene	LC50 Oral LD50	12 gm/m3 2,650 mg/kg	rat rat
1592-23-0	Calcium stearate	Oral LD50	> 10 gm/kg	rat

Carcinogenicity

This product contains the following components which, in their pure form, have the following carcinogenicity data:

PolyOne.

MATERIAL SAFETY DATA SHEET **GEON M7230 TAN**

Version Number 1.3 Revision Date 04/22/2013 Page 6 of 8 Print Date 4/22/2013

CAS-No.	Chemical Name	OSHA	IARC	NTP
100-42-5	Styrene	no	2B	no
13463-67-7	Titanium dioxide	no	2B	no

IARC Carcinogen Classifications:

1 - The component is carcinogenic to humans.

2A - The component is probably carcinogenic to humans.

2B - The component is possibly carcinogenic to humans.

NTP Carcinogen Classifications:

1 - The component is known to be a human carcinogen.

2 - The component is reasonably anticipated to be a human carcinogen.

Additional Health Hazard Information:

Styrene 100-42-5 Irritating to eyes, skin, and respiratory tract with many CNS effects such as narcosis, cramps and respiratory tract paralysis.

	12. ECOLOGICAL INFORMATION
Persistence and degradability	: Not readily biodegradable.
Environmental Toxicity	: Adverse ecological impact is not known or expected under normal use.
Bioaccumulation Potential	: no data available
Additional advice	: not applicable
	13. DISPOSAL CONSIDERATIONS
Product Contaminated packaging	 Like most thermoplastic plastics the product can be recycled. When possible recycling is preferred to disposal or incineration. The generator of waste material has the responsibility for proper waste classification, transportation and disposal in accordance with applicable federal, state/provincial and local regulations. Recycling is preferred when possible. The generator of waste material has the responsibility for proper waste classification, transportation and disposal in accordance with applicable federal, state/provincial and local regulations, transportation and disposal in accordance with applicable federal, state/provincial and local regulations.
	14. TRANSPORT INFORMATION
U.S. DOT Classification	: Not regulated for transportation.
ICAO/IATA	: Not regulated for transportation.
IMO/IMDG (maritime)	: Not regulated for transportation.
	15. REGULATORY INFORMATION

PolyOne.

MATERIAL SAFETY DATA SHEET **GEON M7230 TAN**

on Date 04/22/2013				rint Date 4/	22/
S Regulations:					
OSHA Status : Classified as ha	zardous based	on compo	nents		
		-			
TSCA Status : All components TSCA Inventor		ict are listed	l on or exer	mpt from the	
S. EPA CERCLA Hazardous Substances (40 CFR	302)				
not applicable					
California Proposition : Not applicable 65					
ADA Tida III Gastian 202 Estamola Harandana Ga	h store a				
ARA Title III Section 302 Extremely Hazardous Su	ibstance				
nless specific chemicals are identified under this se	ction this pro	duct is Not	Applicable	under this r	
I	cuon, uns pro		Аррисаон		egul
r	ction, uns pro	duct 13 1 101	Аррисаок		egul
ŗ	etton, this pro	duct 15 1 (ot	Аррисанк		egul
ARA Title III Section 313 Toxic Chemicals:	etion, this pro		Аррпсалк		egul
ARA Title III Section 313 Toxic Chemicals:	·				-
-	ction, this pro		Applicable		-
ARA Title III Section 313 Toxic Chemicals:	ction, this pro	duct is Not	Applicable	e under this ro	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations:	ction, this pro	duct is Not AS-No.	Applicable Weigh	e under this ro	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI)	ction, this pro CA 100	duct is Not AS-No.)-42-5	Applicable Weigh 0.10 -	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations:	ction, this pro	duct is Not AS-No. 0-42-5 We	Applicable Weigh	e under this ro	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI)	ction, this pro CA 100	Muct is Not AS-No. 0-42-5 We pero 0.10	Applicable Weigh 0.10 -	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164)	ction, this pro CA 100 CAS-No. 68412-38-4	duct is Not AS-No.)-42-5 We pero 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164) Rutile, antimony chromium buff	ction, this pro CA 100 CAS-No. 68412-38-4 68186-90-3	duct is Not AS-No. -42-5 We per 0.10 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00 0 - 1.00 0 - 1.00	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164) Rutile, antimony chromium buff Styrene	ction, this pro CAS-No. 68412-38-4 68186-90-3 100-42-5	duct is Not AS-No. 0-42-5 We pero 0.10 0.10 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00 0 - 1.00 0 - 1.00 0 - 1.00	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164) Rutile, antimony chromium buff	ction, this pro CA 100 CAS-No. 68412-38-4 68186-90-3	duct is Not AS-No. 0-42-5 We pero 0.10 0.10 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00 0 - 1.00 0 - 1.00	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164) Rutile, antimony chromium buff Styrene	ction, this pro CAS-No. 68412-38-4 68186-90-3 100-42-5	duct is Not AS-No. 0-42-5 We pero 0.10 0.10 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00 0 - 1.00 0 - 1.00 0 - 1.00	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164) Rutile, antimony chromium buff Styrene	ction, this pro CAS-No. 68412-38-4 68186-90-3 100-42-5	duct is Not AS-No. 0-42-5 We pero 0.10 0.10 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00 0 - 1.00 0 - 1.00 0 - 1.00	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Tanadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164) Rutile, antimony chromium buff Styrene Iron chromite brown spinel	ction, this pro CAS-No. 68412-38-4 68186-90-3 100-42-5	duct is Not AS-No. 0-42-5 We pero 0.10 0.10 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00 0 - 1.00 0 - 1.00 0 - 1.00	e under this ro t percent 1.00	-
ARA Title III Section 313 Toxic Chemicals: Inless specific chemicals are identified under this se Chemical Name STYRENESTYRENE Canadian Regulations: National Pollutant Release Inventory (NPRI) Chemical Name Manganese antimony titanium brown rutile (C.I. Pigment Yellow 164) Rutile, antimony chromium buff Styrene Iron chromite brown spinel WHMIS Classification : D2A	ction, this pro CAS-No. 68412-38-4 68186-90-3 100-42-5	duct is Not AS-No. 0-42-5 We pero 0.10 0.10 0.10 0.10	Applicable Weigh 0.10 - ight cent 0 - 1.00 0 - 1.00 0 - 1.00 0 - 1.00	e under this ro t percent 1.00	-

PolyOne

MATERIAL SAFETY DATA SHEET **GEON M7230 TAN**

Version Number 1.3 Revision Date 04/22/2013 Page 8 of 8 Print Date 4/22/2013

57583-34-3 100-42-5		
DSL	: All components of this product are on the Canadian Domestic Substances List (DSL) or are exempt.	
National Inventories:		
Australia AICS	: Listed	
China IECS	: Listed	
Europe EINECS	: Listed	
Japan ENCS	: Not determined	
Korea KECI	: Listed	
Philippines PICCS	: Not determined	
	16. OTHER INFORMATION	Τ

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.