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SAFETY DATA SHEET

LS5 MOROCCAN SUN 2000

Section 1. Identification	on	
GHS product identifier		LS5 MOROCCAN SUN 2000
Chemical name	•	Mixture
CAS number	:	Mixture
Other means of identification	:	CC10178769
Product type	:	solid
<u>Relevant identified uses of the subs</u> Product use	tance :	e or mixture and uses advised against Industrial applications. Plastics.
Supplier's details	:	POLYONE CORPORATION
- III		33587 Walker Road, Avon Lake, OH 44012
		1 (440) 930-1000 or 1 (866) POLYONE
Emergency telephone number (with hours of operation)	:	CHEMTREC 1-800-424-9300 (24hrs for spill, leak, fire, exposure or accident).

Section 2. Hazards identification

This mixture has not been evaluated as a whole. Information provided on the health effects of this product is based on individual components. All ingredients are bound and potential for hazardous exposure as shipped is minimal. However, some vapors may be released upon heating and the end-user (fabricator) must take the necessary precautions (mechanical ventilation, respiratory protection, etc.) to protect employees from exposure. After handling, always wash hands thoroughly with soap and water.

OSHA/HCS status	:	This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).While this material is not considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200), this SDS contains valuable information critical to the safe handling and proper use of the product. This SDS should be retained and available for employees and other users of this product.
Classification of the substance or mixture	:	Not classified.

GHS label elements

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Signal word Hazard statements	:	No signal word. No known significant effects or critical hazards.
Precautionary statements		
General	:	Not applicable.
Prevention	:	Not applicable.
Response	:	Not applicable.
Storage	:	Not applicable.
Disposal	:	Not applicable.
Supplemental label elements	:	None known.
Hazards not otherwise classified	:	None known.

Section 3. Composition/information on ingredients

Substance/mixture	:	Mixture
Chemical name	:	Mixture
Other means of identification	:	CC10178769

CAS number/other identifiers

Ingredient name	%	CAS number
2-Propenenitrile, polymer with Ethenylbenzene	50 - 75	9003-54-7
Titanium dioxide	10 - 25	13463-67-7
Carbon black	0.3 - 1	1333-86-4
	0.1.02	100.42.5
Styrene	0.1 - 0.3	100-42-5

Any concentration shown as a range is to protect confidentiality or is due to batch variation.

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.

Occupational exposure limits, if available, are listed in Section 8.



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Section 4. First aid measures

Description of necessary first aid measures

Eye contact	:	Check for and remove any contact lenses. Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical attention immediately. Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
Inhalation	:	Move exposed person to fresh air. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. Loosen tight clothing such as a collar, tie, belt or waistband. Get medical attention immediately. Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur. In case of inhalation of decomposition products in a fire, symptoms may be delayed. The exposed person may need to be kept under medical surveillance for 48 hours.
Skin contact	:	In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse. Clean shoes thoroughly before reuse. Get medical attention immediately. Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
Ingestion	:	Wash out mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Get medical attention immediately. Wash out mouth with water. Remove victim to fresh air and keep at rest in a position comfortable for breathing. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.

Most important symptoms/effects, acute and delayed

Potential acute health effects	
Eye contact	: No known significant effects or critical hazards.No known significant effects or critical hazards.
Inhalation	: Exposure to decomposition products may cause a health hazard. Serious effects may be delayed following exposure.No known significant effects or critical hazards.
Skin contact	: No known significant effects or critical hazards.No known significant
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Ingestion	:	effects or critical hazards. No known significant effects or critical hazards.No known significant effects or critical hazards.
Over-exposure signs/symptoms		
Eye contact	:	No specific data.
Inhalation	:	No specific data.
Skin contact	:	No specific data.
Ingestion	:	No specific data.
Indication of immediate medical attention and special treatment needed, if necessary		
Notes to physician	:	In case of inhalation of decomposition products in a fire, symptoms may be delayed. The exposed person may need to be kept under medical surveillance for 48 hours. In case of inhalation of decomposition products in a fire, symptoms may be delayed. The exposed person may need to be kept under medical surveillance for 48 hours.
Specific treatments	:	No specific treatment.
Protection of first-aiders	:	No action shall be taken involving any personal risk or without suitable training. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. No action shall be taken involving any personal risk or without suitable training.

See toxicological information (Section 11)

Section 5. Fire-fighting measures

Extinguishing media

Suitable extinguishing media	:	In case of fire, use water spray (fog), foam, dry chemical or CO_2 .In case of fire, use water spray (fog), foam, dry chemical or CO_2 . None known.None known.
Unsuitable extinguishing media	•	None known. None known.
Specific hazards arising from the chemical Hazardous thermal decomposition products	:	No specific fire or explosion hazard.No specific fire or explosion hazard. Decomposition products may include the following materials: carbon dioxide carbon monoxide nitrogen oxides metal oxide/oxidesDecomposition products may include the following materials:



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		carbon dioxide carbon monoxide nitrogen oxides metal oxide/oxides
Special protective actions for fire- fighters	:	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Special protective equipment for fire-fighters	:	Fire-fighters should wear appropriate protective equipment and self- contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

Section 6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

For non-emergency personnel For emergency responders	:	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Put on appropriate personal protective equipment. If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Environmental precautions	:	Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air). Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
Methods and materials for contain	ment a	nd cleaning up
Small spill	:	Move containers from spill area. Avoid dust generation. Do not dry sweep. Vacuum dust with equipment fitted with a HEPA filter and place in a closed, labeled waste container. Dispose of via a licensed waste disposal contractor. Move containers from spill area. Vacuum or

sweep up material and place in a designated, labeled waste container.

Dispose of via a licensed waste disposal contractor.

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Large spill:Move containers from spill area. Approach release from upwind.
Prevent entry into sewers, water courses, basements or confined areas.
Avoid dust generation. Do not dry sweep. Vacuum dust with
equipment fitted with a HEPA filter and place in a closed, labeled
waste container. Dispose of via a licensed waste disposal contractor.
Note: see Section 1 for emergency contact information and Section 13
for waste disposal.Move containers from spill area. Prevent entry into
sewers, water courses, basements or confined areas. Vacuum or sweep
up material and place in a designated, labeled waste container.
Dispose of via a licensed waste disposal contractor. Note: see Section
1 for emergency contact information and Section 13 for waste
disposal.

Section 7. Handling and storage

Precautions for safe handling

Protective measures Advice on general occupational hygiene	:	Put on appropriate personal protective equipment (see Section 8). Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.
Conditions for safe storage, including any incompatibilities	:	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate container tightly closed and sealed until ready for use.

Section 8. Exposure controls/personal protection

Control parameters



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Occupational exposure limits

Ingredient name	Exposure limits
Carbon black	OSHA PEL 1989 (1989-03-01)
	PEL: Permissible Exposure Level 3.5 mg/m3
	OSHA PEL (1993-06-30)
	PEL: Permissible Exposure Level 3.5 mg/m3
	NIOSH REL (1994-06-01)
	Time Weighted Average (TWA) 3.5 mg/m3
	Time Weighted Average (TWA)
	ACGIH TLV (2010-12-06)
	TLV-TWA: Threshold Limit Value - Time weighted average PEL:
	Permissible Exposure Level 3 mg/m3 Form: Inhalable fraction
Titanium dioxide	OSHA PEL 1989 (1989-03-01)
	PEL: Permissible Exposure Level 10 mg/m3 Form: Total dust
	OSHA PEL (1993-06-30)
	PEL: Permissible Exposure Level 15 mg/m3 Form: Total dust
	NIOSH REL (1994-06-01)
	ACGIH TLV (1996-05-18)
	TLV-TWA: Threshold Limit Value - Time weighted average PEL:
	Permissible Exposure Level 10 mg/m3
2-Propenenitrile, polymer with	
Ethenylbenzene	
Styrene	OSHA PEL 1989 (1989-03-01)
5	PEL: Permissible Exposure Level 215 mg/m3 50 ppm
	Short Term Exposure Limit value for a 15-minute reference
	period expressed in parts per million or in mg/m3. 425 mg/m3 100
	ppm
	OSHA PEL Z2 (1993-06-30)
	PEL: Permissible Exposure Level 100 ppm
	Ceiling, is a a limit indicating the maximum concentration of a
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm Acceptable Maximum Peak (AMP) 600 ppm
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm Acceptable Maximum Peak (AMP) 600 ppm NIOSH REL (1994-06-01)
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm Acceptable Maximum Peak (AMP) 600 ppm NIOSH REL (1994-06-01) Time Weighted Average (TWA) 215 mg/m3 50 ppm
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm Acceptable Maximum Peak (AMP) 600 ppm NIOSH REL (1994-06-01) Time Weighted Average (TWA) 215 mg/m3 50 ppm Short Term Exposure Limit value for a 15-minute reference
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm Acceptable Maximum Peak (AMP) 600 ppm NIOSH REL (1994-06-01) Time Weighted Average (TWA) 215 mg/m3 50 ppm Short Term Exposure Limit value for a 15-minute reference period expressed in parts per million or in mg/m3. 425 mg/m3 100
	 Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm Acceptable Maximum Peak (AMP) 600 ppm NIOSH REL (1994-06-01) Time Weighted Average (TWA) 215 mg/m3 50 ppm Short Term Exposure Limit value for a 15-minute reference period expressed in parts per million or in mg/m3. 425 mg/m3 100 ppm
	Ceiling, is a a limit indicating the maximum concentration of a chemical substances in the breathing zone that should not be exceeded. 200 ppm Acceptable Maximum Peak (AMP) 600 ppm NIOSH REL (1994-06-01) Time Weighted Average (TWA) 215 mg/m3 50 ppm Short Term Exposure Limit value for a 15-minute reference period expressed in parts per million or in mg/m3. 425 mg/m3 100



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		Permissible Exposure Level 85 mg/m3 20 ppm TLV-STEL: Threshold Limit Value - Short Time Exposure Level 170 mg/m3 40 ppm
Appropriate engineering controls	:	If user operations generate dust, fumes, gas, vapor or mist, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits.Good general ventilation should be sufficient to control worker exposure to airborne contaminants.
Environmental exposure controls	:	Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels. Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.
Individual protection measures		
Hygiene measures	:	Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location. Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.
Eye/face protection	:	Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: safety glasses with side-shields. Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: safety glasses with side-shields.

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Skin protection

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Hand protection	:	Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated. Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.
Body protection	:	Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Other skin protection	:	Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Respiratory protection	:	Use a properly fitted, particulate filter respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator. Use a properly fitted, particulate filter respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.

Section 9. Physical and chemical properties

Appearance

Physical state	:	solid [Pellets.]
Color	:	TAN
Odor	:	Faint odor.
Odor threshold	:	Not available.
рН	:	Not available.
Melting point	:	Not available.
Boiling point	:	Not available.

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Flash point	:	Not available.
Burning time	:	Not available.
Burning rate	:	Not available.
Evaporation rate	:	Not available.
Flammability (solid, gas)	:	Not available.
Lower and upper explosive	:	Lower: Not available.
(flammable) limits		Upper: Not available.
Vapor pressure	:	Not available.
Vapor density	:	Not available.
Relative density	:	Not available.
Solubility	:	Not available.
Solubility in water	:	insoluble in water.
Partition coefficient: n- octanol/water	:	Not available.
Auto-ignition temperature	:	Not available.
Decomposition temperature	:	Not available.
SADT	:	Not available.
Viscosity	:	Dynamic: Not available.
-		Kinematic: Not available.

Section 10. Stability and reactivity

Reactivity	:	No specific test data related to reactivity available for this product or its ingredients.
Chemical stability	:	Stable under recommended storage and handling conditions (see Section 7). Stable under recommended storage and handling conditions (see Section 7).
Possibility of hazardous reactions	:	Under normal conditions of storage and use, hazardous reactions will not occur.Under normal conditions of storage and use, hazardous reactions will not occur.
Conditions to avoid	:	Keep away from extreme heat and oxidizing agents.Keep away from extreme heat and oxidizing agents.
Incompatible materials	:	Keep away from strong acids. Oxidizer.Keep away from strong acids. Oxidizer.
Hazardous decomposition products	:	Under normal conditions of storage and use, hazardous decomposition products should not be produced.Under normal conditions of storage and use, hazardous decomposition products should not be produced.

Section 11. Toxicological information

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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.

Information on toxicological effects

Acute toxicity

Product/ingredient name	Result	Species	Dose	Exposure
Styrene				
	LD50 Oral	Rat	2,650 mg/kg	-
	LD50 Oral	Rat	5,000 mg/kg	-
	LC50 Inhalation	Rat	2,770 ppm	4 h
	LC50 Inhalation	Rat	11.8 mg/l	4 h
Carbon black				
	LD50 Oral	Rat	15,400 mg/kg	-
Titanium dioxide				
	LC50 Inhalation	Rat - Male	6.82 Mg/l	4 h
	LD50 Dermal	Rabbit	> 5,000 mg/kg	-
2-Propenenitrile, polymer with	h Ethenylbenzene			
	LD50 Oral	Rat	1,800 mg/kg	-
Conclusion/Summary	: Mixtu	re.Not fully tested.	· · · ·	•

Conclusion/Summary

Irritation/Corrosion

Product/ingredient name	Result	Species	Score	Exposure	Observation
Styrene	Eyes - Mild	Human			-
	irritant				
	Skin - Mild	Rabbit			-
	irritant				
	Skin -	Rabbit			-
	Moderate				
	irritant				
	Eyes - Severe	Rabbit			-
	irritant				
	Eyes -	Rabbit		24 hrs	-
	Moderate				
	irritant				
Titanium dioxide	Skin - Mild	Human		72 hrs	-
	irritant				
Conclusion/Summary					
Skin	• M	ixture.Not fi	illy tested		

Skin Mixture.Not fully tested. : Eyes Mixture.Not fully tested. : Respiratory :

Mixture.Not fully tested.

Sensitization

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Conclusion/Summary Skin Respiratory	:		ixture.Not fu ixture.Not fu	
<u>Mutagenicity</u>				
Conclusion/Summary	:	М	ixture.Not fu	illy tested.
Carcinogenicity				
Conclusion/Summary <u>Classification</u>	:	М	ixture.Not fu	illy tested.
Product/ingredient	OSHA		IARC	NTP
name Styrene			2B	Reasonably anticipated to be a human carcinogen.
Carbon black	+		2B 2B	
Titanium dioxide	+		2B 2B	
2-Propenenitrile, polymer	+		3	
with Ethenylbenzene			-	
Conclusion/Summary	: y (single ex		ixture.Not fu <u>re)</u>	Illy tested.
Specific target organ toxicit Not available.				
Not available. Specific target organ toxicit	y (repeated	d expo	osure)	
Not available. Specific target organ toxicit Not available.	<u>y (repeate</u> c	d expo	osure)	
Not available. <u>Specific target organ toxicit</u> Not available. <u>Aspiration hazard</u> Not available. Information on the likely rou			o <mark>sure)</mark> ot available.	
Not available. <u>Specific target organ toxicit</u> Not available. <u>Aspiration hazard</u> Not available. Information on the likely roue exposure	ites of a state of a s			
Specific target organ toxicit Not available. Aspiration hazard	ites of a state of a s	No	ot available. o known sign	ificant effects or critical hazards. No known significant
Not available. <u>Specific target organ toxicit</u> Not available. <u>Aspiration hazard</u> Not available. Information on the likely roue exposure <u>Potential acute health effects</u>	utes of 2	No efi	ot available. o known sign fects or critic	



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		Serious effects may be delayed following exposure. No known
Skin contact	:	significant effects or critical hazards. No known significant effects or critical hazards. No known significant effects or critical hazards.
Ingestion	:	No known significant effects or critical hazards. No known significant effects or critical hazards.
Symptoms related to the physical,	chemi	cal and toxicological characteristics
Eye contact	:	No specific data.
Inhalation	:	No specific data.
Skin contact	:	No specific data.
Ingestion	:	No specific data.
Deleved and immediate offerster and		abuania affects from about and long torms are agree
Delayed and inimediate effects and	i aiso	chronic effects from short and long term exposure
Short term exposure		
Potential immediate effects	:	Not available.
Potential delayed effects	:	Not available.
Long term exposure		
Potential immediate effects	:	Not available.
Potential delayed effects	:	Not available.
Potential chronic health effects		
Conclusion/Summary	:	Mixture.Not fully tested.
General	:	Contains material that can cause target organ damage. No known
Carcinogenicity	:	significant effects or critical hazards. Contains material which may cause cancer, based on animal data. Risk
		of cancer depends on duration and level of exposure. No known significant effects or critical hazards.
Mutagenicity	:	No known significant effects or critical hazards. No known significant
		effects or critical hazards.
Tanataganiaitu	:	No known significant effects or critical hazards. No known significant
Teratogenicity		
		effects or critical hazards.
Developmental effects	:	No known significant effects or critical hazards. No known significant effects or critical hazards.

Numerical measures of toxicity



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Acute toxicity estimates

Not available.

Section 12. Ecological information

Toxicity

Product/ingredient name	Result	Species	Exposure
Styrene			
	Acute LC50 9,900 µg/l Fresh water	Fish - Fish	96 h
	Acute LC50 9.1 mg/l Marine water	Fish - Fish	96 h
	Acute LC50 4,020 µg/l Fresh water	Fish - Fish	96 h
	Acute LC50 4.7 mg/l Fresh water	Fish - Fish	96 h
	Acute LC50 4,080 µg/l Fresh water	Fish - Fish	96 h
	Acute LC50 23,000 µg/l Fresh	Aquatic invertebrates.	48 h
	water	Daphnia	
	Acute EC50 4,700 µg/l Fresh water	Aquatic invertebrates.	48 h
		Daphnia	
	Acute LC50 59,000 µg/l Fresh	Aquatic invertebrates.	48 h
	water	Daphnia	
	Acute LC50 52,000 µg/l Marine	Aquatic invertebrates.	48 h
	water	Crustaceans	
	Acute EC50 33 mg/l Fresh water	Aquatic plants - Algae	96 h
	Acute EC50 720 µg/l Fresh water	Aquatic plants - Algae	96 h
	Acute EC50 1,400 µg/l Fresh water	Aquatic plants - Algae	72 h
	Acute EC50 78,000 µg/l Marine	Aquatic plants - Algae	96 h
	water		
	Acute NOEC 63 µg/l Fresh water	Aquatic plants - Algae	4 d
Carbon black			
	Acute EC50 37.563 mg/l Fresh	Aquatic invertebrates.	48 h
	water	Daphnia	
	Acute LC50 61.547 mg/l Fresh	Aquatic invertebrates.	48 h
	water	Daphnia	
Titanium dioxide			
	Acute LC50 > 1,000,000 μg/l	Fish - Fish	96 h
	Marine water		
	Acute LC50 > 1,000 mg/l Fresh	Fish - Fish	96 h
	water		
	Acute LC50 13 mg/l Fresh water	Aquatic invertebrates.	48 h
		Daphnia	
	Acute LC50 6.5 mg/l Fresh water	Aquatic invertebrates.	48 h



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		Daphnia	
	Acute LC50 3 mg/l Fresh water	Aquatic invertebrates. Crustaceans	48 h
	Acute LC50 15.9 mg/l Fresh water	Aquatic invertebrates. Crustaceans	48 h
	Acute LC50 3.6 mg/l Fresh water	Aquatic invertebrates. Crustaceans	48 h
	Acute LC50 11 mg/l Fresh water	Aquatic invertebrates. Crustaceans	48 h
	Acute LC50 13.4 mg/l Fresh water	Aquatic invertebrates. Crustaceans	48 h
	Acute EC50 27.8 mg/l Fresh water	Aquatic invertebrates. Daphnia	48 h
	Acute EC50 19.3 mg/l Fresh water	Aquatic invertebrates. Daphnia	48 h
	Acute EC50 35.306 mg/l Fresh water	Aquatic invertebrates. Daphnia	48 h
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Remarks - Acute - Aquatic invertebrates.:	Chemicals are not readily available a	s they are bound within the	polymer matrix.
Conclusion/Summary	: Chemicals are not readil polymer matrix.	y available as they are boun	nd within the
Persistence and degradability	<u>v</u>		
Conclusion/Summary	: Chemicals are not readil polymer matrix.	y available as they are boun	nd within the
Conclusion/Summary	: Chemicals are not readil polymer matrix.	y available as they are bound	nd within the

Bioaccumulative potential

P ======			
Product/ingredient name	LogPow	BCF	Potential
Styrene	2.96	13.49	low
Titanium dioxide		352.00	low

Mobility in soil

Soil/water partition coefficient	:	Not available.
(KOC)		
Other adverse effects	:	No known significant effects or critical hazards. No known significant
		effects or critical hazards.



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Section 13. Disposal considerations

Disposal methods

The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any byproducts should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and nonrecyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

United States - RCRA Acute hazardous waste "P" List: Not listed

United States - RCRA Toxic hazardous waste "U" List: Not listed

Section 14. Transport information

U.S. DOT Classification	:	Not regulated for transportation.
ICAO/IATA	:	Not classified as dangerous good under transport regulations.
IMO/IMDG (maritime)	:	Not classified as dangerous good under transport regulations.

Section 15. Regulatory information

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U.S. Federal regulations	:	 United States - TSCA 12(b) - Chemical export notification: None of the components are listed. United States - TSCA 4(a) - Final Test Rules: Not listed United States - TSCA 4(a) - ITC Priority list: Not listed United States - TSCA 4(a) - Proposed test rules: Not listed United States - TSCA 4(f) - Priority risk review: Not listed United States - TSCA 4(f) - Priority risk review: Not listed United States - TSCA 5(a) - Proposed test rules: Not listed United States - TSCA 5(a) - Proposed significant new use rules: Not listed United States - TSCA 5(a) - Proposed significant new use rules: Not listed United States - TSCA 5(e) - Substances consent order: Not listed United States - TSCA 6 - Final risk management: Not listed United States - TSCA 6 - Proposed risk management: Not listed United States - TSCA 8(a) - Chemical risk rules: Not listed United States - TSCA 8(a) - Dioxin/Furane precusor: Not listed United States - TSCA 8(a) - Chemical Data Reporting (CDR): Not determined United States - TSCA 8(a) - Preliminary assessment report (PAIR): Not listed United States - TSCA 8(c) - Significant adverse reaction (SAR): Not listed United States - TSCA 8(d) - Health and safety studies: Not listed United States - EPA Clean water act (CWA) section 307 - Priority pollutants: Listed Acrylonitrile United States - EPA Clean air act (CAA) section 112 - Accidental release prevention - Flammable substances: Not listed United States - EPA Clean air act (CAA) section 112 - Accidental release prevention - Flammable substances: Not listed United States - Department of commerce - Precursor chemical: Not listed
Clean Air Act Section 112(b) Hazardous Air Pollutants (HAPs)	:	Not listed
Clean Air Act Section 602 Class I Substances	:	Not listed
Clean Air Act Section 602 Class II Substances	:	Not listed
DEA List I Chemicals (Precursor Chemicals)	:	Not listed
DEA List II Chemicals (Essential Chemicals)	:	Not listed

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US. EPA CERCLA Hazardous Substances (40 CFR 302)

not applicable

SARA 311/312

Classification

Not applicable.

:

Composition/information on ingredients

Name	%	Classification
Styrene	0.1 - 0.3	F, AH, CH
Carbon black	0.3 - 1	СН
2-Propenenitrile, polymer with Ethenylbenzene	50 - 75	АН

<u>SARA 313</u>

	Product name	CAS number	%
Form R - Reporting requirements	Rutile, antimony chromium buff	68186-90-3	5 - 10
	Styrene	100-42-5	0.1 - 0.3
Supplier notification	Styrene	100-42-5	0.1 - 0.3
	Rutile, antimony chromium buff	68186-90-3	5 - 10

SARA 313 notifications must not be detached from the SDS and any copying and redistribution of the SDS shall include copying and redistribution of the notice attached to copies of the SDS subsequently redistributed.

State regulations	
Massachusetts	: The following components are listed:
	Iron oxide
	Titanium dioxide
New York	: The following components are listed:
	Styrene
New Jersey	: The following components are listed:
	2-Propenenitrile, polymer with Ethenylbenzene
	Titanium dioxide
	Iron oxide
	Carbon black
	Styrene
Pennsylvania	: The following components are listed:
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Styrene Carbon black Iron oxide Titanium dioxide California Prop. 65 WARNING: This product contains a chemical known to the State of California to cause cancer. United States inventory (TSCA 8b) : All components are listed or exempted. All components are listed or exempted. **Canada inventory** : **International regulations International lists** Australia inventory (AICS): Not determined. : Taiwan inventory (CSNN): Not determined. Malaysia Inventory (EHS Register): Not determined. **EINECS:** All components are listed or exempted. Japan inventory: Not determined. China inventory (IECSC): Not determined. Korea inventory: All components are listed or exempted. New Zealand Inventory of Chemicals (NZIoC): Not determined. Philippines inventory (PICCS): Not determined. **Chemical Weapons Convention** Not listed • List Schedule I Chemicals **Chemical Weapons Convention** Not listed : List Schedule II Chemicals **Chemical Weapons Convention** Not listed : List Schedule III Chemicals

Section 16. Other information

History		
Date of printing	:	08/02/2018
Date of issue/Date of revision	:	10/20/2016, 10/20/2016
Date of previous issue	:	08/31/2015
Version	:	1, 1.2, 2
Key to abbreviations	:	ATE = Acute Toxicity Estimate BCF = Bioconcentration Factor GHS = Globally Harmonized System of Classification and Labelling of Chemicals

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IATA = International Air Transport Association IBC = Internediate Bulk Container IMDG = International Maritime Dangerous Goods LogPow = logarithm of the octanol/water partition coefficient MARPOL 73/78 = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution) UN = United Nations Not available.

References

Notice to reader

To the best of our knowledge, the information contained herein is accurate. However, neither the abovenamed supplier, nor any of its subsidiaries, assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist. Particularly this information may not be valid for such material used in conjunction with any other materials or in any process, unless specified in the text.