PolvOne

## MATERIAL SAFETY DATA SHEET 16198-01 EXPM7400 BLACK 2999

### Version Number 1.2 Revision Date 03/29/2014

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### 1. PRODUCT AND COMPANY IDENTIFICATION

### 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	:	16198-01 EXPM7400 BLACK 2999
Product code	:	VC10007611
Chemical Name	:	Mixture
CAS-No.	:	Mixture
Product Use	:	Industrial Applications

### 2. COMPOSITION/INFORMATION ON INGREDIENTS

Components	CAS-No.	Weight percent
Styrene	100-42-5	0.1 - 1
Carbon black	1333-86-4	1 - 5
Paraffin waxes and Hydrocarbon waxes	8002-74-2	1 - 5
Dibutyltin mercaptide	10584-98-2	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.
Ingestion	: May be harmful if swallowed.
Eyes	: Resin particles, like other inert materials, are mechanically irritating to eyes.
Skin	: Experience shows no unusual dermatitis hazard from routine handling.

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Medical Conditions	:	None known.
Aggravated by Exposure:		
		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	:	Fullface self-contained breathing apparatus (SCBA) used in positive
Procedures		pressure mode should be worn to prevent inhalation of airborne
Unuquel Fire/Explosion		contaminants. May emit Hydrogen Chloride (HCl) or Carbon Monoxide (CO) under
Unusual Fire/Explosion Hazards	•	fire conditions. Carbon dioxide (CO2), carbon monoxide (CO),
11dZdru5		oxides of nitrogen (NOx), other hazardous materials, and smoke are all possible.
	6. A	CCIDENTAL RELEASE MEASURES
Personal precautions		Wear appropriate personal protection during cleanup, such as
resonal productions	·	impervious gloves, boots and coveralls.
Environmental precautions	:	Should not be released into the environment. The product should not 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.

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	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	POSURE 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)	

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Components	Value	Exposure time	Exposure type	List:
Carbon black	3.5 mg/m3	Recommended exposure limit (REL):		NIOSH
	0.1 mg/m3	Recommended exposure limit (REL):		NIOSH
	3.5 mg/m3	PEL:		OSHA Z1
	3.5 mg/m3	Time Weighted Average (TWA):		OSHA Z1A
	3.5 mg/m3	Time Weighted Average (TWA):		MX OEL
	7 mg/m3	Short Term Exposure Limit (STEL):		MX OEL
	3 mg/m3	Time Weighted Average (TWA):	Inhalable fraction.	ACGIH
Paraffin waxes and Hydrocarbon waxes	2 mg/m3	Time Weighted Average (TWA):	Fume.	ACGIH
	2 mg/m3	Recommended exposure limit (REL):	Fume.	NIOSH
	2 mg/m3	Time Weighted Average (TWA):	Fume.	OSHA Z1A
	2 mg/m3	Time Weighted Average (TWA):	Fume.	MX OEL
	6 mg/m3	Short Term Exposure Limit (STEL):	Fume.	MX OEL
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
Dibutyltin mercaptide	0.1 mg/m3	Time Weighted Average (TWA):	as Sn	ACGIH
	0.2 mg/m3	Short Term Exposure Limit (STEL):	as Sn	ACGIH
	0.1 mg/m3	PEL:	as Sn	OSHA Z1

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	0.1 mg/m3	Time Weighted Average (TWA):	ge as Sn	MX OEL
	0.2 mg/m3	Short Term Exposure Li (STEL):	mit as Sn	MX OEL
	9. PHYSIC	CAL AND CHEMICAL	PROPERTIES	
Form Appearance Colour Odour Melting point/range Boiling Point: Water solubility	: BLA : very : Not o	ts, powder Sj CK B faint V letermined V pplicable pl	becific Gravity : ulk density : apour pressure : apour density :	Not applicable Not determined Not established not applicable not applicable not applicable
Stability		<b>TABILITY AND REAC</b> he product is stable if stor		ibed.
Hazardous Polymerization		/ill not occur.	Ĩ	
Conditions to avoid		: Keep away from oxidizing agents and open flame. To avoid thermal decomposition, do not overheat.		
Incompatible Materials		acompatible with strong a ith acetal homopolymers		
Hazardous decomposition products	(1 P. (2 pi	arbon dioxide (CO2), car NOx), other hazardous ma rolonged heating (approxi 200 °C) or short term heat roduct decomposition and ydrogen chloride.	terials, and smoke are all mately 30 minutes or mo ing at 482 °F (250 °C) ma	possible. re) above 392 °F ay result in

**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.

<u>Toxicity Overview</u> This product contains the following components which in their pure form have the following characteristics:

CAS-No.	Chemical Name	Effect	Target Organ
100-42-5	Styrene	Irritant	Eyes, Respiratory system.
		Systemic effects	Eyes, Skin, Respiratory system, Liver, central nervous system (CNS).
1333-86-4	Carbon black	Systemic effects	Eyes, Respiratory system.
8002-74-2	Paraffin waxes and Hydrocarbon waxes	Systemic effects	Eyes, Skin, Respiratory system.



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10584-98-2	Dibutyltin mercaptide	Irritant	Eyes, Skin.

### 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
100-42-5	Styrene	LC50	12 gm/m3	rat
		Oral LD50	2,650 mg/kg	rat
1333-86-4	Carbon black	Oral LD50	>15,400 mg/kg	rat
		Dermal LD50	> 3 gm/kg	rabbit
8002-74-2	Paraffin waxes and	Oral LD50	> 2,000 mg/kg	rat
	Hydrocarbon waxes			

### Carcinogenicity

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

CAS-No.	Chemical Name	OSHA	IARC	NTP
100-42-5	Styrene	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.

### Additional Health Hazard Information:

Carbon black 1333-86-4 Carcinogenicity: Many inhalation toxicologists believe that the tumor response observed in the referenced rat studies is species specific and does not correlate to human exposure. However, the IARC evaluation in Monograph Volume 65, issued in April 1996 concluded that, "There is sufficient evidence in experimental animals for the carcinogenicity of carbon black". Based on this evaluation, along with their evaluation of inadequate evidence of carcinogenicity in humans, IARC's overall evaluation is that "Carbon Black is possibly carcinogenic to humans (Group 2B). The IARC 2B listing only pertains to airborne, unbound carbon black particles of respirable size. Carbon Black has not been listed as a carcinogen by the National Toxicology Program (NTP) or the Occupational Safety and Health Administration (OSHA). The National Institute of Occupational Safety and Health (NIOSH) criteria document on carbon black recommends that only carbon black with PAH (polynuclear aromatic hydrocarbon) levels greater than 0.1% be considered suspect carcinogens.

### **12. ECOLOGICAL INFORMATION**

Persistence and degradability

: Not readily biodegradable.

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Bioaccumulation Potential	
	: no data available
Additional advice	: not applicable
	13. DISPOSAL CONSIDERATIONS
Product	: Like most thermoplastic plastics the product can be recycled. Whe 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.
Contaminated packaging	: 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.
	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
US Regulations:	
OSHA Status	: Classified as hazardous based on components.
TSCA Status	: All components of this product are listed on or exempt from the TSCA Inventory.
US. EPA CERCLA Hazardous	Substances (40 CFR 302)
not applicable	
California Proposition 65	: Not applicable
SARA Title III Section 302 E	tremely Hazardous Substance

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Unless specific chemicals are identified under this section, this product is Not Applicable under this regulation

SARA Title III Section 313 Toxic Chemicals:

Un	less specific chemicals are identified under this section, this	s product is Not Ap	plicable 1	under this	regulation
(	Chemical Name	CAS-No.	Weight	percent	
S	STYRENESTYRENE	100-42-5	0.10 - 1	.00	

Canadian Regulations:

National Pollutant Release Inventory (NPRI)			
Chemical Name	CAS-No.	Weight	NPRI ID#
		percent	
Styrene	100-42-5	0.10 - 1.00	

WHMIS Classification : D2A

WHMIS Ingredient Disclosure List

CAS-No.	
1333-86-4	
100-42-5	
10584-98-2	

DSL

All components of this product are on the Canadian Domestic Substances List (DSL) or are exempt.

National Inventories:

Australia AICS	:	Not determined
China IECS	:	Not determined
Europe EINECS	:	Listed
Japan ENCS	:	Not determined
Korea KECI	:	Not determined
Philippines PICCS	:	Not determined

:

### **16. OTHER INFORMATION**

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

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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.