MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

Version Number 1.0 Revision Date 10/02/2012 Page 1 of 8 Print Date 10/2/2012

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	:	11054 J D BROWN UV 3
Product code	:	CC10170164
Chemical Name	:	Mixture
CAS-No.	:	Mixture
Product Use	:	Industrial Applications

2. COMPOSITION/INFORMATION ON INGREDIENTS

Components	CAS-No.	Weight percent
Decanedioic acid, bis(2,2,6,6-tetramethyl-4-	52829-07-9	1 - 5
piperidinyl) ester		
Carbon black	1333-86-4	1 - 5
Iron oxide	1309-37-1	1 - 5
Silica, amorphous	7631-86-9	1 - 5
Titanium dioxide	13463-67-7	10 - 30

3. HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW

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.

POTENTIAL HEALTH EFFECTS

Routes of Exposure:	: Inhalation, Ingestion, Skin contact
Acute exposure	
Inhalation	: Resin particles, like other inert materials, can be mechanically irritating.
Ingestion Eyes	May be harmful if swallowed.Resin particles, like other inert materials, are mechanically irritating to

PolyOne.

MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

Version Number 1.0 Revision Date 10/02/2012 Page 2 of 8 Print Date 10/2/2012

Skin	eyes. : Experience shows no unusual dermatitis hazard from routine handle	.ng
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 case doubt seek medical advice.	s of
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 least 15 minutes. If eye irritation persists, seek medical attention.	: at
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 Carbon dismide blanket Water source Dreasender From	
Suitable extinguishing media	: Carbon dioxide blanket, Water spray, Dry powder, Foam.	
Special Fire Fighting Procedures	: Fullface self-contained breathing apparatus (SCBA) used in positi pressure mode should be worn to prevent inhalation of airborne contaminants.	ve
Unusual Fire/Explosion Hazards	: Carbon dioxide (CO2), carbon monoxide (CO), oxides of nitrogen (NOx), other hazardous materials, and smoke are all possible.	
	5. ACCIDENTAL RELEASE MEASURES	
	: Wear appropriate personal protection during cleanup, such as impervious gloves, boots and coveralls.	
Personal precautions		
Personal precautions Environmental precautions	: Should not be released into the environment. The product should be allowed to enter drains, water courses or the soil.	not

PolyOne.

MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

Version Number 1.0 Revision Date 10/02/2012 Page 3 of 8 Print Date 10/2/2012

		7. HANDLING AND STORAGE
Handling	:	Take measures to prevent the build up of electrostatic charge. Heat only in areas with appropriate exhaust ventilation.
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.
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.
Engineering measures	:	Heat only in areas with appropriate exhaust ventilation. Provide appropriate exhaust ventilation at machinery.
Exposure limit(s)		

<u>PolyOne</u>

MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

Version Number 1.0 Revision Date 10/02/2012 Page 4 of 8 Print Date 10/2/2012

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
Iron oxide	10 mg/m3	PEL:	Fume.	OSHA Z1
	5 mg/m3	Time Weighted Average (TWA):	as Fe	MX OEL
	10 mg/m3	Short Term Exposure Limit (STEL):	as Fe	MX OEL
	5 mg/m3	Time Weighted Average (TWA):	Respirable fraction.	ACGIH
Silica, amorphous	6 mg/m3	Recommended exposure limit (REL):		NIOSH
	0.8 mg/m3	Time Weighted Average (TWA):		Z3
	10 mg/m3	Time Weighted Average (TWA):	Inhalable particulate.	MX OEL
	3 mg/m3	Time Weighted Average (TWA):	Respirable dust.	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
: BROWN
: very faint
: Not determined
: not applicable
: insoluble

Evaporation rate Specific Gravity Bulk density Vapour pressure Vapour density pH Not applicable
Not determined
Not established
not applicable
not applicable
not applicable

PolyOne.

MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

Version Number 1.0 Revision Date 10/02/2012

Page 5 of 8 Print Date 10/2/2012

	10. STABILITY AND REACTIVITY
Stability	: The product is stable if stored and handled as prescribed.
Hazardous Polymerization	: Will not occur.
Conditions to avoid	: Keep away from oxidizing agents and open flame. To avoid thermal decomposition, do not overheat.
Incompatible Materials	: Incompatible with strong acids and oxidizing agents.
Hazardous decomposition products	: Carbon dioxide (CO2), carbon monoxide (CO), oxides of nitrogen (NOx), other hazardous materials, and smoke are all possible.

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
52829-07-9	Decanedioic acid,	Irritant	Eyes.
	bis(2,2,6,6-tetramethyl-4-		
	piperidinyl) ester		
1333-86-4	Carbon black	Systemic effects	Eyes, Respiratory system.
1309-37-1	Iron oxide	Systemic effects	Respiratory system.
7631-86-9	Silica, amorphous	Irritant	Eyes, Respiratory system.
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
52829-07-9	Decanedioic acid, bis(2,2,6,6-tetramethyl-4- piperidinyl) ester	Oral LD50 Dermal LD50	3,700 mg/kg > 3,100 mg/kg	rat rabbit
1333-86-4	Carbon black	Oral LD50 Dermal LD50	> 15,400 mg/kg > 3 gm/kg	rat rabbit

Carcinogenicity

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

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

IARC Carcinogen Classifications:

MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

Version Number 1.0 Revision Date 10/02/2012

Page 6 of 8 Print Date 10/2/2012

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:

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.
Environmental Toxicity	: Chemicals are not readily available as they are bound within the polymer matrix.
Bioaccumulation Potential	: Chemicals are not readily available as they are bound within the polymer matrix.
Additional advice	: no data available
	13. DISPOSAL CONSIDERATIONS
Product	: Like most thermoplastic plastics the product can be recycled. Wher 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.

PolyOne.

MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

/ersion Number 1.0 Revision Date 10/02/2012			Pr	Page 7 of int Date 10/2/201
ICAO/IATA	: Refer to specifi	c regulation.		
IMO/IMDG (maritime)	: Refer to specifi	c regulation.		
	15. REGULATOR	RY INFORMATI	ON	
US Regulations:				
OSHA Status	: Classified as ha	zardous based on o	components.	
TSCA Status	: All component TSCA Inventor	s of this product any.	re listed on or exen	npt from the
US. EPA CERCLA Hazardo	us Substances (40 CFR	302)		
not applicable				
California Proposition 65	n : Not applicable			
SARA Title III Section 302 I	Extremely Hazardous Su	ubstance		
Unless specific chemicals are	e identified under this se	ection, this product	is Not Applicable	under this regulation
SARA Title III Section 313	Foxic Chemicals:			
Unless specific chemicals are	e identified under this se	ection, this product	is Not Applicable	under this regulation
Chemical Name ZINC COMPOUNDS		CAS-N 68187-5		<u>- 30.00</u>
Canadian Regulations:		001070	10100	
-	lease Inventory (NPRI)			
Chemical Name	lease inventory (IVI KI)	CAS-No.	Weight	NPRI ID#
Zinc ferrite brown spinel (119)	C.I. Pigment Yellow	68187-51-9	percent 10.00 - 30.00	
WHMIS Classification	on : D2A			
	· •			

WHMIS Ingredient Disclosure List

PolyOne.

MATERIAL SAFETY DATA SHEET 11054 J D BROWN UV 3

Version Number 1.0 Revision Date 10/02/2012 Page 8 of 8 Print Date 10/2/2012

CAS-No. 1333-86-4 1309-37-1 7631-86-9	
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	: Listed
	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 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.