

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

Section 1 - PRODUCT AND COMPANY IDENTIFICATION

Material Name

MANUS-BOND 65A

Product Use

adhesives, sealant.

Restrictions on Use

None known.

Details of the supplier of the safety data sheet

Manus Products, Inc.

866 Industrial Blvd. West

Waconia, MN 55387

Phone: (952) 442-3323

Emergency Phone #: (800) 424-9300

Section 2 - HAZARDS IDENTIFICATION

Classification in accordance with paragraph (d) of 29 CFR 1910.1200.

Flammable Liquids - Category 3

Aspiration Hazard - Category 1

Skin Corrosion/Irritation - Category 2

Serious Eye Damage/Eye Irritation - Category 2A

Carcinogenicity - Category 1A

Reproductive Toxicity - Category 1B

Specific Target Organ Toxicity - Single Exposure - Category 1 (central nervous system , kidneys , liver , respiratory system)

Specific Target Organ Toxicity - Single Exposure - Category 2 (Nervous System)

Specific Target Organ Toxicity - Single Exposure - Category 3

Specific Target Organ Toxicity - Repeated Exposure - Category 1 (nervous system , respiratory system)

Specific Target Organ Toxicity - Repeated Exposure - Category 2 (Central Nervous System)

GHS Label Elements

Symbol(s)



Signal Word

Danger

Hazard Statement(s)

Flammable liquid and vapor.

May be fatal if swallowed and enters airways.

Causes skin irritation.

Causes serious eye irritation.

May cause cancer.

May damage fertility or the unborn child.

Causes damage to organs.

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

May cause damage to organs.
May cause respiratory irritation. May cause drowsiness or dizziness.
Causes damage to organs through prolonged or repeated exposure.
May cause damage to organs through prolonged or repeated exposure.

Precautionary Statement(s)

Prevention

Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood.
Keep container tightly closed.
Keep away from heat/sparks/open flame/hot surfaces - No smoking.
Ground/Bond container and receiving equipment.
Use explosion-proof electrical/ventilating/lighting equipment.
Take precautionary measures against static discharge.
Use only non-sparking tools.
Use only outdoors or in a well-ventilated area.
Wear protective gloves/protective clothing/eye protection/face protection.
Do not breathe dust/fume/gas/mist/vapors/spray.
Wash thoroughly after handling.
Do not eat, drink or smoke when using this product.

Response

In case of fire: Use appropriate media to extinguish.
If exposed: Call a POISON CENTER or doctor/physician.
If exposed or concerned: Call a POISON CENTER or doctor/physician.
IF INHALED: Remove person to fresh air and keep at rest in a position comfortable for breathing.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
IF ON SKIN (or hair): Remove/take off immediately all contaminated clothing. Rinse skin with water/shower.
If skin irritation occurs: Get medical advice/attention.
Take off contaminated clothing and wash before reuse.
IF SWALLOWED: Immediately call a POISON CENTER/doctor.
Do NOT induce vomiting.
Call a POISON CENTER or doctor if you feel unwell.
Specific treatment (see label).

Storage

Store in a well-ventilated place. Keep container tightly closed.
Store in a well-ventilated place. Keep cool.
Store locked up.

Disposal

Dispose of contents/container in accordance with local/regional/national/international regulations.

Section 3 - COMPOSITION / INFORMATION ON INGREDIENTS

CAS	Component Name	Percent
1330-20-7	Xylenes (o-, m-, p- isomers)	30-60
1317-65-3	Calcium carbonate	10-30
63449-39-8	Chlorinated paraffin waxes and hydrocarbon waxes	5-10

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

13463-67-7	Titanium dioxide	1-5
1309-48-4	Magnesium oxide (MgO)	1-5
1333-86-4	Carbon black	<0.1

Section 4 - FIRST AID MEASURES

Inhalation

IF INHALED: If breathing is difficult, remove person to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.

Skin

IF ON SKIN: Wash with plenty of soap and water. If skin irritation or rash occurs: Get medical advice/attention. Take off contaminated clothing and wash before reuse.

Eyes

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

Ingestion

IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician. Do NOT induce vomiting.

Most Important Symptoms/Effects

Acute

May be fatal if swallowed and enters airways. Causes skin irritation. Causes serious eye irritation. May cause respiratory irritation. May cause drowsiness or dizziness.

Delayed

May cause cancer. May damage fertility or the unborn child. Causes damage to organs. May cause damage to organs. Causes damage to organs through prolonged or repeated exposure. May cause damage to organs through prolonged or repeated exposure.

Note to Physicians

Treat symptomatically and supportively.

Section 5 - FIRE FIGHTING MEASURES

Extinguishing Media

Suitable Extinguishing Media

Use carbon dioxide, regular dry chemical, regular foam or water.

Unsuitable Extinguishing Media

Do not use high-pressure water streams.

Special Hazards Arising from the Chemical

Flammable liquid and vapor. Upon decomposition, this product emits carbon monoxide, carbon dioxide and/or low molecular weight hydrocarbons.

Hazardous Combustion Products

Upon decomposition, this product emits carbon monoxide, carbon dioxide and/or low molecular weight hydrocarbons.

Advice for firefighters

Heating may cause an explosion. Containers may rupture or explode.

Fire Fighting Measures

Keep away from sources of ignition - No smoking. Move material from fire area if it can be done without risk. Avoid inhalation of vapors or combustion by-products. Dike for later disposal. Stay upwind and keep out of low areas.

Special Protective Equipment and Precautions for Firefighters

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

A positive-pressure, self-contained breathing apparatus (SCBA) and full-body protective equipment are required for fire emergencies.

Section 6 - ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment and Emergency Procedures

Wear personal protective clothing and equipment, see Section 8.

Methods and Materials for Containment and Cleaning Up

Keep unnecessary people away, isolate hazard area and deny entry. In case of spillage, stop the flow of material and block any potential routes to water systems. Only personnel trained for the hazards of this material should perform clean up and disposal.

Environmental Precautions

Do not flush into sanitary sewer systems, drains or surface water. Avoid release to the environment.

Section 7 - HANDLING AND STORAGE

Precautions for Safe Handling

Keep away from heat, sparks, and flames. Keep away from all ignition sources. Do not handle until all safety precautions have been read and understood. Avoid contact with eyes and skin. Do not eat, drink or smoke when using this product. Always wear recommended personal protective equipment. Wear personal protective clothing and equipment, see Section 8. Take precautionary measures against static discharge.

Conditions for Safe Storage, Including any Incompatibilities

Store in a well-ventilated place. Keep container tightly closed.

Store in a well-ventilated place. Keep cool.

Store locked up.

Store in a cool dry place. Store in a well-ventilated area. Keep separated from incompatible substances. Keep container tightly closed. Empty containers may contain product residue. Store and handle in accordance with all current regulations and standards. Avoid contact with temperatures above 120 C.

Incompatible Materials

Strong oxidizer. strong acids.

Section 8 - EXPOSURE CONTROLS / PERSONAL PROTECTION

Component Exposure Limits

Xylenes (o-, m-, p-isomers)	1330-20-7
ACGIH:	100 ppm TWA
	150 ppm STEL
Europe:	50 ppm TWA (pure); 221 mg/m ³ TWA (pure)
	Possibility of significant uptake through the skin (pure)
	100 ppm STEL (pure); 442 mg/m ³ STEL (pure)
OSHA (US):	100 ppm TWA ; 435 mg/m ³ TWA
Mexico:	100 ppm TWA VLE-PPT ; 435 mg/m ³ TWA VLE-PPT

Safety Data Sheet

Material Name: **MANUS-BOND 65A**

SDS ID: **MAN-003**

	150 ppm STEL [PPT-CT]; 655 mg/m3 STEL [PPT-CT]
Calcium carbonate	1317-65-3
NIOSH:	10 mg/m3 TWA total dust ; 5 mg/m3 TWA respirable dust
OSHA (US):	15 mg/m3 TWA total dust ; 5 mg/m3 TWA respirable fraction
Mexico:	10 mg/m3 TWA VLE-PPT
	20 mg/m3 STEL [PPT-CT]
Titanium dioxide	13463-67-7
ACGIH:	10 mg/m3 TWA
NIOSH:	2.4 mg/m3 TWA (CIB 63) fine ; 0.3 mg/m3 TWA (CIB 63) ultrafine, including engineered nanoscale
	5000 mg/m3 IDLH
OSHA (US):	15 mg/m3 TWA total dust
Mexico:	10 mg/m3 TWA VLE-PPT as Ti
	20 mg/m3 STEL [PPT-CT] as Ti
Magnesium oxide (MgO)	1309-48-4
ACGIH:	10 mg/m3 TWA inhalable particulate matter
NIOSH:	750 mg/m3 IDLH fume
OSHA (US):	15 mg/m3 TWA fume, total particulate
Mexico:	10 mg/m3 TWA VLE-PPT as Mg fume
Carbon black	1333-86-4
ACGIH:	3 mg/m3 TWA inhalable particulate matter
NIOSH:	3.5 mg/m3 TWA ; 0.1 mg/m3 TWA (Carbon black in presence of Polycyclic aromatic hydrocarbons) as PAH
	1750 mg/m3 IDLH
OSHA (US):	3.5 mg/m3 TWA
Mexico:	3.5 mg/m3 TWA VLE-PPT
	7 mg/m3 STEL [PPT-CT]

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

ACGIH - Threshold Limit Values - Biological Exposure Indices (BEI)

Xylenes (o-, m-, p- isomers) (1330-20-7)

1.5 g/g creatinine Medium: urine Time: end of shift Parameter: Methylhippuric acids

Engineering Controls

Ventilation equipment should be explosion-resistant if explosive concentrations of material are present. Provide local exhaust or process enclosure ventilation system.

Individual Protection Measures, such as Personal Protective Equipment

Eye/face protection

Wear splash resistant safety goggles with a faceshield.

Respiratory Protection

Selection and use of respiratory protective equipment should be in accordance in the USA with OSHA General Industry Standard 29 CFR 1910.134; or in Canada with CSA Standard Z94.4.

Glove Recommendations

Wear appropriate chemical resistant gloves.

Protective Materials

Wear appropriate chemical resistant clothing.

Section 9 - PHYSICAL AND CHEMICAL PROPERTIES

Appearance	paste	Physical State	liquid
Odor	petroleum odor	Color	various colors
Odor Threshold	Not available	pH	Not available
Melting Point	Not available	Boiling Point	138 - 142 °C (xylene)
Boiling Point Range	Not available	Freezing point	Not available
Evaporation Rate	Not available	Flammability (solid, gas)	Not available
Autoignition Temperature	Not available	Flash Point	25 °C
Lower Explosive Limit	Not available	Decomposition temperature	Not available
Upper Explosive Limit	Not available	Vapor Pressure	Not available
Vapor Density (air=1)	Not available	Specific Gravity (water=1)	Not available
Water Solubility	(negligible)	Partition coefficient: n-octanol/water	Not available
Viscosity	(varies)	Kinematic viscosity	Not available
Solubility (Other)	Not available	Density	Not available
Physical Form	paste	Molecular Weight	Not available

Section 10 - STABILITY AND REACTIVITY

Reactivity

No reactivity hazard is expected.

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

Chemical Stability

Stable at normal temperatures and pressure.

Possibility of Hazardous Reactions

Will not polymerize.

Conditions to Avoid

Avoid heat, flames, sparks and other sources of ignition. Avoid contact with incompatible materials. Avoid contact with temperatures above 120 C.

Incompatible Materials

Strong oxidizer. strong acids.

Hazardous decomposition products

Upon decomposition, this product emits carbon monoxide, carbon dioxide and/or low molecular weight hydrocarbons.

Section 11 - TOXICOLOGICAL INFORMATION

Information on Likely Routes of Exposure

Inhalation

May be harmful if inhaled. May cause respiratory irritation. May cause drowsiness or dizziness.

Skin Contact

Causes skin irritation.

Eye Contact

Causes serious eye irritation. Eye contact may cause tearing, redness, a stinging or burning feeling, swelling, and blurred vision.

Ingestion

May be fatal if swallowed and enters airways.

Acute and Chronic Toxicity

Component Analysis - LD50/LC50

The components of this material have been reviewed in various sources and the following selected endpoints are published:

Xylenes (o-, m-, p- isomers) (1330-20-7)

Oral LD50 Rat 3500 mg/kg

Dermal LD50 Rabbit >4350 mg/kg

Inhalation LC50 Rat 29.08 mg/L 4 h

Chlorinated paraffin waxes and hydrocarbon waxes (63449-39-8)

Oral LD50 Rat >21500 µL/kg

Titanium dioxide (13463-67-7)

Oral LD50 Rat >10000 mg/kg

Magnesium oxide (MgO) (1309-48-4)

Oral LD50 Rat 3990 mg/kg (females)

Carbon black (1333-86-4)

Oral LD50 Rat >15400 mg/kg

Product Toxicity Data

Acute Toxicity Estimate

Dermal	> 2000 mg/kg
Inhalation - Vapor	> 20 mg/L
Oral	> 2000 mg/kg

Immediate Effects

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

May be fatal if swallowed and enters airways. Causes skin irritation. Causes serious eye irritation. May cause respiratory irritation. May cause drowsiness or dizziness.

Delayed Effects

May cause cancer. May damage fertility or the unborn child. Causes damage to organs. May cause damage to organs. Causes damage to organs through prolonged or repeated exposure. May cause damage to organs through prolonged or repeated exposure.

Irritation/Corrosivity Data

Causes skin irritation. Causes serious eye irritation. May cause respiratory irritation.

Respiratory Sensitization

No information on significant adverse effects.

Dermal Sensitization

No information on significant adverse effects.

Component Carcinogenicity

Xylenes (o-, m-, p- isomers)	1330-20-7
ACGIH:	A4 - Not Classifiable as a Human Carcinogen
IARC:	Monograph 71 [1999] ; Monograph 47 [1989] (Group 3 (not classifiable))
Chlorinated paraffin waxes and hydrocarbon waxes	63449-39-8
IARC:	Monograph 48 [1990] (Group 2B (possibly carcinogenic to humans))
DFG:	Category 3B (could be carcinogenic for man)
OSHA:	Present
Titanium dioxide	13463-67-7
ACGIH:	A4 - Not Classifiable as a Human Carcinogen
IARC:	Monograph 93 [2010] ; Monograph 47 [1989] (Group 2B (possibly carcinogenic to humans))
DFG:	Category 3A (could be carcinogenic for man ;inhalable fraction with the exception of ultra small particles)
OSHA:	Present
NIOSH:	potential occupational carcinogen
Magnesium oxide (MgO)	1309-48-4
ACGIH:	A4 - Not Classifiable as a Human Carcinogen
DFG:	Category 4 (no significant contribution to human cancer)
Carbon black	1333-86-4

Safety Data Sheet

Material Name: **MANUS-BOND 65A**

SDS ID: **MAN-003**

ACGIH:	A3 - Confirmed Animal Carcinogen with Unknown Relevance to Humans
IARC:	Monograph 93 [2010] ; Monograph 65 [1996] (Group 2B (possibly carcinogenic to humans))
DFG:	Category 3B (could be carcinogenic for man ;inhalable fraction)
OSHA:	Present
NIOSH:	potential occupational carcinogen

Results of a DuPont epidemiology study showed that employees who had been exposed to titanium dioxide pigments were at no greater risk of developing lung cancer than were employees who had not been exposed to titanium dioxide pigments. No pulmonary fibrosis was found in any of the employees and no associations were observed between titanium dioxide pigment exposure and chronic respiratory disease or lung abnormalities. Based on the results of this study, DuPont concluded that titanium dioxide pigment will not cause lung cancer or chronic respiratory disease in humans at concentrations experienced in the workplace.

Germ Cell Mutagenicity

No information on significant adverse effects.

Tumorigenic Data

No information on significant adverse effects.

Reproductive Toxicity

May damage fertility or the unborn child.

Specific Target Organ Toxicity - Single Exposure

central nervous system. kidneys. liver. respiratory system. nervous system.

Specific Target Organ Toxicity - Repeated Exposure

nervous system. respiratory system. central nervous system.

Aspiration hazard

May be fatal if swallowed and enters airways.

Medical Conditions Aggravated by Exposure

No data available.

Section 12 - ECOLOGICAL INFORMATION

Ecotoxicity

Toxic to aquatic life with long lasting effects.

Component Analysis - Aquatic Toxicity

Xylenes (o-, m-, p-isomers)	1330-20-7
Fish:	LC50 96 h Pimephales promelas 13.4 mg/L [flow-through] ; LC50 96 h Oncorhynchus mykiss 2.661 - 4.093 mg/L [static] ; LC50 96 h Oncorhynchus mykiss 13.5 - 17.3 mg/L; LC50 96 h Lepomis macrochirus 13.1 - 16.5 mg/L [flow-through] ; LC50 96 h Lepomis macrochirus 19 mg/L; LC50 96 h Lepomis macrochirus 7.711 - 9.591 mg/L [static] ; LC50 96 h Pimephales promelas 23.53 - 29.97 mg/L [static] ; LC50 96 h Cyprinus carpio 780 mg/L [semi-static] ; LC50 96 h Cyprinus carpio >780 mg/L; LC50 96 h Poecilia reticulata 30.26 - 40.75 mg/L [static]
Invertebrate:	EC50 48 h water flea 3.82 mg/L; LC50 48 h Gammarus lacustris 0.6 mg/L

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

Chlorinated paraffin waxes and hydrocarbon waxes	63449-39-8
Fish:	LC50 96 h Lepomis macrochirus >300 mg/L [static]; LC50 96 h Oncorhynchus mykiss >0.0109 mg/L [flow-through]; LC50 96 h Oncorhynchus mykiss 94.5 - 271 mg/L [static]; LC50 96 h Lepomis macrochirus >0.1 mg/L [flow-through]; LC50 96 h Pimephales promelas >100 mg/L [static]

Section 13 - DISPOSAL CONSIDERATIONS

Disposal Methods

Dispose in accordance with all applicable federal, state/regional and local laws and regulations

Component Waste Numbers

The U.S. EPA has not published waste numbers for this product's components.

Section 14 - TRANSPORT INFORMATION

US DOT Information:

Shipping Name: PETROLEUM DISTILLATES, N.O.S.

Hazard Class: 3

UN/NA #: UN1268

Packing Group: III

Required Label(s): 3

IATA Information:

Shipping Name: PETROLEUM DISTILLATES, N.O.S.

Hazard Class: 3

UN#: UN1268

Packing Group: III

Required Label(s): 3

IMDG Information:

Shipping Name: PETROLEUM DISTILLATES, N.O.S.

Hazard Class: 3

UN#: UN1268

Packing Group: III

Required Label(s): 3

TDG Information:

Shipping Name: PETROLEUM DISTILLATES, N.O.S.

Hazard Class: 3

UN#: UN1268

Packing Group: III

Required Label(s): 3

International Bulk Chemical Code

This material contains one or more of the following chemicals required by the IBC Code to be identified as dangerous chemicals in bulk.

Safety Data Sheet

Material Name: **MANUS-BOND 65A**

SDS ID: **MAN-003**

Xylenes (o-, m-, p- isomers)	1330-20-7
IBC Code:	Category Y
Titanium dioxide	13463-67-7
IBC Code:	Category Z (slurry)

Section 15 - REGULATORY INFORMATION

U.S. Federal Regulations

This material contains one or more of the following chemicals required to be identified under SARA Section 302 (40 CFR 355 Appendix A), SARA Section 313 (40 CFR 372.65), CERCLA (40 CFR 302.4), TSCA 12(b), and/or require an OSHA process safety plan.

Xylenes (o-, m-, p- isomers)	1330-20-7
SARA 313:	1 % de minimis concentration
CERCLA:	100 lb final RQ ; 45.4 kg final RQ

SARA Section 311/312 (40 CFR 370 Subparts B and C) reporting categories

Flammable; Carcinogenicity; Reproductive Toxicity; Skin Corrosion/Irritation; Serious Eye Damage/Eye Irritation; Specific Target Organ Toxicity; Aspiration Hazard

U.S. State Regulations

The following components appear on one or more of the following state hazardous substances lists:

Component	CAS	CA	MA	MN	NJ	PA
Xylenes (o-, m-, p- isomers)	1330-20-7	Yes	Yes	Yes	Yes	Yes
Calcium carbonate	1317-65-3	No	Yes	Yes	Yes	Yes
Chlorinated paraffin waxes and hydrocarbon waxes	63449-39-8	No	Yes	No	No	No
Titanium dioxide	13463-67-7	No	Yes	Yes	Yes	Yes
Magnesium oxide (MgO)	1309-48-4	Yes	Yes	Yes	Yes	Yes
Carbon black	1333-86-4	Yes	Yes	Yes	Yes	Yes

California Safe Drinking Water and Toxic Enforcement Act (Proposition 65)



WARNING

This product can expose you to chemicals including Titanium dioxide, Carbon black , which are known to the State of California to cause cancer. For more information go to www.P65Warnings.ca.gov.

Titanium dioxide	13463-67-7
-------------------------	-------------------

Safety Data Sheet

Material Name: **MANUS-BOND 65A**

SDS ID: **MAN-003**

Carc:	carcinogen , 9/2/2011 (airborne, unbound particles of respirable size)
Carbon black	1333-86-4
Carc:	carcinogen , 2/21/2003 (airborne, unbound particles of respirable size)

Canada Regulations

Canadian WHMIS Ingredient Disclosure List (IDL)

Components of this material have been checked against the Canadian WHMIS Ingredients Disclosure List. The List is composed of chemicals which must be identified on MSDSs if they are included in products which meet WHMIS criteria specified in the Controlled Products Regulations and are present above the threshold limits listed on the IDL

Magnesium oxide (MgO)	1309-48-4
	1 %
Carbon black	1333-86-4
	1 %

Component Analysis - Inventory

Xylenes (o-, m-, p- isomers) (1330-20-7)

US	CA	EU	AU	PH	JP - ENCS	JP - ISHL	KR KECI - Annex 1	KR KECI - Annex 2	KR - REACH CCA	CN	NZ	MX	TW	VN (Draft)
Yes	DSL	EIN	Yes	Yes	Yes	Yes	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes

Calcium carbonate (1317-65-3)

US	CA	EU	AU	PH	JP - ENCS	JP - ISHL	KR KECI - Annex 1	KR KECI - Annex 2	KR - REACH CCA	CN	NZ	MX	TW	VN (Draft)
Yes	NSL	EIN	Yes	Yes	Yes	Yes	Yes	No	No	Yes	Yes	Yes	Yes	Yes

Chlorinated paraffin waxes and hydrocarbon waxes (63449-39-8)

US	CA	EU	AU	PH	JP - ENCS	JP - ISHL	KR KECI - Annex 1	KR KECI - Annex 2	KR - REACH CCA	CN	NZ	MX	TW	VN (Draft)
Yes	DSL	EIN	Yes	Yes	Yes	Yes	Yes	No	No	Yes	Yes	Yes	Yes	Yes

Titanium dioxide (13463-67-7)

US	CA	EU	AU	PH	JP -	JP -	KR	KR	KR -	CN	NZ	MX	TW	VN
----	----	----	----	----	------	------	----	----	------	----	----	----	----	----

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

					ENCS	ISHL	KECI - Annex 1	KECI - Annex 2	REACH CCA					(Draft)
Yes	DSL	EIN	Yes	Yes	Yes	Yes	Yes	No	No	Yes	Yes	Yes	Yes	Yes

Magnesium oxide (MgO) (1309-48-4)

US	CA	EU	AU	PH	JP - ENCS	JP - ISHL	KR KECI - Annex 1	KR KECI - Annex 2	KR - REACH CCA	CN	NZ	MX	TW	VN (Draft)
Yes	DSL	EIN	Yes	Yes	Yes	Yes	Yes	No	No	Yes	Yes	Yes	Yes	Yes

Carbon black (1333-86-4)

US	CA	EU	AU	PH	JP - ENCS	JP - ISHL	KR KECI - Annex 1	KR KECI - Annex 2	KR - REACH CCA	CN	NZ	MX	TW	VN (Draft)
Yes	DSL	EIN	Yes	Yes	Yes	Yes	Yes	No	No	Yes	Yes	Yes	Yes	Yes

Section 16 - OTHER INFORMATION

Summary of Changes

SECTION 2: Hazards identification. SECTION 4: First aid measures. SECTION 11: Toxicological information. Section 15 - REGULATORY INFORMATION. California Safe Drinking Water and Toxic Enforcement Act (Proposition 65).

Preparation Date

8/10/2018

Key / Legend

ACGIH - American Conference of Governmental Industrial Hygienists; ADR - European Road Transport; AU - Australia; BOD - Biochemical Oxygen Demand; C - Celsius; CA - Canada; CA/MA/MN/NJ/PA - California/Massachusetts/Minnesota/New Jersey/Pennsylvania*; CAS - Chemical Abstracts Service; CERCLA - Comprehensive Environmental Response, Compensation, and Liability Act; CFR - Code of Federal Regulations (US); CLP - Classification, Labelling, and Packaging; CN - China; CPR - Controlled Products Regulations; DFG - Deutsche Forschungsgemeinschaft; DOT - Department of Transportation; DSD - Dangerous Substance Directive; DSL - Domestic Substances List; EC - European Commission; EEC - European Economic Community; EIN - European Inventory of (Existing Commercial Chemical Substances); EINECS - European Inventory of Existing Commercial Chemical Substances; ENCS - Japan Existing and New Chemical Substance Inventory; EPA - Environmental Protection Agency; EU - European Union; F - Fahrenheit; F - Background (for Venezuela Biological Exposure Indices); IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; ICAO - International Civil Aviation Organization; IDL - Ingredient Disclosure List; IDLH - Immediately Dangerous to Life and Health; IMDG - International Maritime Dangerous Goods; ISHL - Japan Industrial Safety and Health Law; IUCLID - International Uniform Chemical Information Database; JP - Japan; Kow - Octanol/water partition coefficient; KR KECI Annex 1 - Korea Existing Chemicals Inventory (KECI) / Korea Existing Chemicals List (KECL); KR KECI Annex 2 - Korea Existing Chemicals Inventory (KECI) / Korea

Safety Data Sheet

Material Name: MANUS-BOND 65A

SDS ID: MAN-003

Existing Chemicals List (KECL) , KR - Korea; LD50/LC50 - Lethal Dose/ Lethal Concentration; LEL - Lower Explosive Limit; LLV - Level Limit Value; LOLI - List Of Lists™ - ChemADVISOR's Regulatory Database; MAK - Maximum Concentration Value in the Workplace; MEL - Maximum Exposure Limits; MX – Mexico; Ne- Non-specific; NFPA - National Fire Protection Agency; NIOSH - National Institute for Occupational Safety and Health; NJTSR - New Jersey Trade Secret Registry; Nq - Non-quantitative; NSL – Non-Domestic Substance List (Canada); NTP - National Toxicology Program; NZ - New Zealand; OSHA - Occupational Safety and Health Administration; PEL- Permissible Exposure Limit; PH - Philippines; RCRA - Resource Conservation and Recovery Act; REACH- Registration, Evaluation, Authorisation, and restriction of Chemicals; RID - European Rail Transport; SARA - Superfund Amendments and Reauthorization Act; Sc - Semi-quantitative; STEL - Short-term Exposure Limit; TCCA – Korea Toxic Chemicals Control Act; TDG - Transportation of Dangerous Goods; TLV - Threshold Limit Value; TSCA - Toxic Substances Control Act; TW – Taiwan; TWA - Time Weighted Average; UEL - Upper Explosive Limit; UN/NA - United Nations /North American; US - United States; VLE - Exposure Limit Value (Mexico); VN (Draft) - Vietnam (Draft); WHMIS - Workplace Hazardous Materials Information System (Canada).

Other Information

Disclaimer:

Supplier gives no warranty whatsoever, including the warranties of merchantability or of fitness for a particular purpose. Any product purchased is sold on the assumption the purchaser shall determine the quality and suitability of the product. Supplier expressly disclaims any and all liability for incidental, consequential or any other damages arising out of the use or misuse of this product. No information provided shall be deemed to be a recommendation to use any product in conflict with any existing patent rights.