

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Product form : Mixture
Product name : Custom 8270 Appendix IV Mix
Product code : AL0-130342
Product group : Trade product

1.2. Relevant identified uses of the substance or mixture and uses advised against

1.2.1. Relevant identified uses

Main use category : Laboratory Use
Industrial/Professional use spec : Industrial
For professional use only
Use of the substance/mixture : Certified reference material for laboratory use only

1.2.2. Uses advised against

No additional information available

1.3. Details of the supplier of the safety data sheet

Phenova
6390 Joyce Dr. Suite 100
80403 Golden, CO - United States
T 1-866-942-2978 - F 1-866-283-0269
info@phenova.com - www.phenova.com

1.4. Emergency telephone number

Emergency number : ChemTel Assistance (US/Canada) 1-800-255-3924
ChemTel Assistance (International) +1 813-248-0585

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008 [CLP]

Flam. Liq. 2	H225
Acute Tox. 4 (Oral)	H302
Acute Tox. 4 (Dermal)	H312
Acute Tox. 4 (Inhalation)	H332
Carc. 1A	H350
Aquatic Chronic 3	H412

Classification according to Directive 67/548/EEC [DSD] or 1999/45/EC [DPD]

Carc.Cat.1; R45
F; R11
E; R3
Xn; R20/21/22
N; R51/53
R44

Full text of R-phrases: see section 16

Adverse physicochemical, human health and environmental effects

No additional information available

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

2.2. Label elements

Labeling according to Regulation (EC) No. 1272/2008 [CLP]

Hazard pictograms (CLP) :



GHS02

GHS07

GHS08

Signal word (CLP) :

Danger

Hazard statements (CLP) :

H225 - Highly flammable liquid and vapor
H302+H312+H332 - Harmful if swallowed, in contact with skin or if inhaled
H350 - May cause cancer
H412 - Harmful to aquatic life with long lasting effects

Precautionary statements (CLP) :

P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking
P233 - Keep container tightly closed
P261 - Avoid breathing dust/fume/gas/mist/vapors/spray
P301+P330+P331+P310 - IF SWALLOWED: rinse mouth. Do NOT induce vomiting. Immediately call a POISON CENTER or doctor
P270 - Do not eat, drink or smoke when using this product
P271 - Use only outdoors or in a well-ventilated area
P273 - Avoid release to the environment
P280 - Wear protective gloves/protective clothing/eye protection/face protection
P303+P361+P353 - IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water
P304+P340 - IF INHALED: Remove person to fresh air and keep comfortable for breathing
P308+P313 - IF exposed or concerned: Get medical advice/attention
P362+P364 - Take off contaminated clothing and wash it before reuse
P370+P378 - In case of fire: Use media other than water to extinguish
P403+P235 - Store in a well-ventilated place. Keep cool
P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation

EUH phrases

: EUH208 - Contains quitozene(82-68-8), aniline(62-53-3). May produce an allergic reaction
EUH044 - Risk of explosion if heated under confinement

No labeling applicable

2.3. Other hazards

No additional information available

SECTION 3: Composition/Information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
Methylene Chloride (Component)	(CAS No) 75-09-2 (EC-No.) 200-838-9 (EC index no) 602-004-00-3	96.1	Carc. 2, H351
2,6-dichlorophenol (Component)	(CAS No) 87-65-0 (EC-No.) 201-761-3	0.1	Skin Corr. 1B, H314 Aquatic Chronic 2, H411
7,12-Dimethylbenz[a]anthracene (Component)	(CAS No) 57-97-6 (EC-No.) 200-359-5	0.1	Acute Tox. 4 (Oral), H302 Carc. 1A, H350
hexachloropropene (Component)	(CAS No) 1888-71-7 (EC-No.) 217-560-9	0.1	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335
ethyl methanesulfonate (Component)	(CAS No) 62-50-0 (EC-No.) 200-536-7	0.1	Acute Tox. 4 (Oral), H302 Carc. 1B, H350
methyl methanesulfonate (Component)	(CAS No) 66-27-3 (EC-No.) 200-625-0	0.1	Acute Tox. 3 (Oral), H301 Skin Irrit. 2, H315 Eye Irrit. 2, H319 Carc. 1B, H350 STOT SE 3, H335
4-Nitroquinoline N-oxide (Component)	(CAS No) 56-57-5 (EC-No.) 200-281-1	0.1	Acute Tox. 2 (Oral), H300
3-methylcholanthrene (Component)	(CAS No) 56-49-5 (EC-No.) 200-276-4	0.1	Carc. 1B, H350
pentachloroethane (Component)	(CAS No) 76-01-7 (EC-No.) 200-925-1 (EC index no) 602-017-00-4	0.1	Carc. 2, H351 STOT RE 1, H372 Aquatic Chronic 2, H411

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
quintozene (Component)	(CAS No) 82-68-8 (EC-No.) 201-435-0 (EC index no) 609-043-00-5	0.1	Acute Tox. 4 (Oral), H302 Skin Sens. 1, H317 Aquatic Acute 1, H400 Aquatic Chronic 1, H410
1-naphthylamine (Component)	(CAS No) 134-32-7 (EC-No.) 205-138-7 (EC index no) 612-020-00-2	0.1	Acute Tox. 4 (Oral), H302 Aquatic Chronic 2, H411
2-naphthylamine (Component)	(CAS No) 91-59-8 (EC-No.) 202-080-4 (EC index no) 612-022-00-3	0.1	Acute Tox. 4 (Oral), H302 Carc. 1A, H350 Aquatic Chronic 2, H411
pentachlorobenzene (Component)	(CAS No) 608-93-5 (EC-No.) 210-172-0 (EC index no) 602-074-00-5	0.1	Flam. Sol. 1, H228 Acute Tox. 4 (Oral), H302 Aquatic Acute 1, H400 Aquatic Chronic 1, H410
phenacetin (Component)	(CAS No) 62-44-2 (EC-No.) 200-533-0	0.1	Carc. 1A, H350 STOT RE 1, H372
1,3,5-trinitrobenzene (Component)	(CAS No) 99-35-4 (EC-No.) 202-752-7 (EC index no) 609-005-00-8	0.1	Expl. 1.1, H201 Acute Tox. 2 (Oral), H300 Acute Tox. 1 (Dermal), H310 Acute Tox. 2 (Inhalation), H330 STOT RE 2, H373 Aquatic Acute 1, H400 Aquatic Chronic 1, H410
1,2,4,5-tetrachlorobenzene (Component)	(CAS No) 95-94-3 (EC-No.) 202-466-2	0.1	Aquatic Chronic 2, H411
safrrole (Component)	(CAS No) 94-59-7 (EC-No.) 202-345-4 (EC index no) 605-020-00-9	0.1	Acute Tox. 4 (Oral), H302 Muta. 2, H341 Carc. 1B, H350
4-dimethylaminoazobenzene (Component)	(CAS No) 60-11-7 (EC-No.) 200-455-7	0.1	Acute Tox. 3 (Oral), H301 Carc. 1B, H350
4-aminobiphenyl (Component) substance listed as REACH Candidate (Biphenyl-4-ylamine)	(CAS No) 92-67-1 (EC-No.) 202-177-1 (EC index no) 612-072-00-6	0.1	Acute Tox. 4 (Oral), H302 Carc. 1A, H350
pyridine (Component) substance with a Community workplace exposure limit	(CAS No) 110-86-1 (EC-No.) 203-809-9 (EC index no) 613-002-00-7	0.1	Flam. Liq. 2, H225 Acute Tox. 4 (Oral), H302 Acute Tox. 4 (Dermal), H312 Acute Tox. 4 (Inhalation), H332
dinoseb (Component) substance listed as REACH Candidate (Dinoseb (6-sec-butyl-2,4-dinitrophenol))	(CAS No) 88-85-7 (EC-No.) 201-861-7 (EC index no) 609-025-00-7	0.1	Acute Tox. 2 (Oral), H300 Acute Tox. 2 (Dermal), H310 Eye Irrit. 2, H319 Repr. 1B, H360D Aquatic Acute 1, H400 Aquatic Chronic 1, H410
o-toluidine (Component) substance listed as REACH Candidate	(CAS No) 95-53-4 (EC-No.) 202-429-0 (EC index no) 612-091-00-X	0.1	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Inhalation), H331 Eye Irrit. 2, H319 Carc. 1B, H350 Aquatic Acute 1, H400
2-Picoline (Component)	(CAS No) 109-06-8 (EC-No.) 203-643-7 (EC index no) 613-036-00-2	0.1	Flam. Liq. 3, H226 Acute Tox. 4 (Oral), H302 Acute Tox. 3 (Dermal), H311 Acute Tox. 4 (Inhalation), H332 Eye Irrit. 2, H319 STOT SE 3, H335
5-nitro-o-toluidine (Component)	(CAS No) 99-55-8 (EC-No.) 202-765-8 (EC index no) 612-210-00-5	0.1	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation), H331 Carc. 2, H351 Aquatic Chronic 3, H412
N-Nitrosodiethylamine (Component)	(CAS No) 55-18-5 (EC-No.) 200-226-1	0.1	Acute Tox. 3 (Oral), H301 Carc. 1B, H350
N-Nitroso-N-methylethylamine (Component)	(CAS No) 10595-95-6	0.1	Flam. Liq. 3, H226 Acute Tox. 3 (Oral), H301 Carc. 1B, H350
N-Nitrosomorpholine (Component)	(CAS No) 59-89-2	0.1	Acute Tox. 3 (Oral), H301 Carc. 1B, H350
N-Nitrosopiperidine (Component)	(CAS No) 100-75-4 (EC-No.) 202-886-6	0.1	Acute Tox. 3 (Oral), H301 Carc. 1B, H350
N-nitrosodibutylamine (Component)	(CAS No) 924-16-3 (EC-No.) 213-101-1	0.1	Acute Tox. 4 (Oral), H302 Carc. 1B, H350
N-Nitrosopyrrolidine (Component)	(CAS No) 930-55-2 (EC-No.) 213-218-8	0.1	Acute Tox. 4 (Oral), H302 Carc. 1B, H350
3-Methylphenol (Component)	(CAS No) 108-39-4 (EC-No.) 203-577-9 (EC index no) 604-004-00-9	0.1	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Skin Corr. 1B, H314 Aquatic Chronic 2, H411

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
diphenylamine (Component)	(CAS No) 122-39-4 (EC-No.) 204-539-4 (EC index no) 612-026-00-5	0.1	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation), H331 STOT RE 2, H373 Aquatic Acute 1, H400 Aquatic Chronic 1, H410
1,3-dinitrobenzene (Component)	(CAS No) 99-65-0 (EC-No.) 202-776-8 (EC index no) 609-004-00-2	0.1	Acute Tox. 2 (Oral), H300 Acute Tox. 1 (Dermal), H310 Acute Tox. 2 (Inhalation), H330 STOT RE 2, H373 Aquatic Acute 1, H400 Aquatic Chronic 1, H410
aniline (Component)	(CAS No) 62-53-3 (EC-No.) 200-539-3 (EC index no) 612-008-00-7	0.1	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation), H331 Eye Dam. 1, H318 Skin Sens. 1, H317 Muta. 2, H341 Carc. 2, H351 STOT RE 1, H372 Aquatic Acute 1, H400
2,3,4,6-tetrachlorophenol (Component)	(CAS No) 58-90-2 (EC-No.) 200-402-8 (EC index no) 604-013-00-8	0.1	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Skin Irrit. 2, H315 Eye Irrit. 2, H319 Aquatic Acute 1, H400 (M=100) Aquatic Chronic 1, H410

Name	Product identifier	Specific concentration limits
pentachloroethane (Component)	(CAS No) 76-01-7 (EC-No.) 200-925-1 (EC index no) 602-017-00-4	(0.2 =<C < 1) STOT RE 2, H373 (C >= 1) STOT RE 1, H372
2-naphthylamine (Component)	(CAS No) 91-59-8 (EC-No.) 202-080-4 (EC index no) 612-022-00-3	(C >= 0.01) Carc. 1A, H350
aniline (Component)	(CAS No) 62-53-3 (EC-No.) 200-539-3 (EC index no) 612-008-00-7	(0.2 =<C < 1) STOT RE 2, H373 (C >= 1) STOT RE 1, H372
2,3,4,6-tetrachlorophenol (Component)	(CAS No) 58-90-2 (EC-No.) 200-402-8 (EC index no) 604-013-00-8	(C >= 5) Skin Irrit. 2, H315 (C >= 5) Eye Irrit. 2, H319

SECTION 4: First aid measures

4.1. Description of first aid measures

First-aid measures general	: Never give anything by mouth to an unconscious person. IF exposed or concerned: Get medical advice/attention.
First-aid measures after inhalation	: Allow victim to breathe fresh air. Allow the victim to rest.
First-aid measures after skin contact	: Rinse skin with water/shower. Remove/Take off immediately all contaminated clothing. Immediately call a poison center or doctor/physician. Wash with plenty of soap and water. Wash contaminated clothing before reuse.
First-aid measures after eye contact	: Rinse immediately with plenty of water. Obtain medical attention if pain, blinking or redness persists.
First-aid measures after ingestion	: Rinse mouth. Do NOT induce vomiting. Obtain emergency medical attention. Call a POISON CENTER or doctor/physician if you feel unwell.

4.2. Most important symptoms and effects, both acute and delayed

Symptoms/effects after inhalation	: May cause cancer by inhalation.
Symptoms/effects after skin contact	: Repeated exposure to this material can result in absorption through skin causing significant health hazard. Harmful in contact with skin.
Symptoms/effects after ingestion	: Swallowing a small quantity of this material will result in serious health hazard.

4.3. Indication of any immediate medical attention and special treatment needed

No additional information available

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media	: Use extinguishing media appropriate for surrounding fire.
Unsuitable extinguishing media	: Do not use a heavy water stream.

5.2. Special hazards arising from the substance or mixture

Fire hazard	: Highly flammable liquid and vapor.
-------------	--------------------------------------

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

Explosion hazard : May form flammable/explosive vapor-air mixture. Heat may build pressure, rupturing closed containers, spreading fire and increasing risk of burns and injuries. Risk of explosion if heated under confinement.

5.3. Advice for firefighters

Firefighting instructions : Use water spray or fog for cooling exposed containers. Exercise caution when fighting any chemical fire. Prevent fire-fighting water from entering environment. DO NOT fight fire when fire reaches explosives. Evacuate area.

Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

Emergency procedures : Evacuate unnecessary personnel.

6.1.2. For emergency responders

Protective equipment : Equip cleanup crew with proper protection.

Emergency procedures : Ventilate area.

6.2. Environmental precautions

Prevent entry to sewers and public waters. Notify authorities if liquid enters sewers or public waters. Avoid release to the environment.

6.3. Methods and material for containment and cleaning up

Methods for cleaning up : Take up in absorbent material. Collect spillage.

6.4. Reference to other sections

See Heading 8. Exposure controls and personal protection.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Additional hazards when processed : Handle empty containers with care because residual vapors are flammable. Hazardous waste due to potential risk of explosion.

Precautions for safe handling : Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Provide good ventilation in process area to prevent formation of vapor. No open flames. No smoking. Use only non-sparking tools. Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Keep away from sources of ignition - No smoking.

Hygiene measures : Do not eat, drink or smoke when using this product. Gently wash with plenty of soap and water. Remove/Take off immediately all contaminated clothing. Wash contaminated clothing before reuse.

7.2. Conditions for safe storage, including any incompatibilities

Technical measures : Proper grounding procedures to avoid static electricity should be followed. Ground/bond container and receiving equipment.

Storage conditions : Keep in fireproof place. Keep container tightly closed. Keep container tightly closed and in a well-ventilated place. Keep away from any flames or sparking source.

Incompatible materials : Direct sunlight. Heat sources.

7.3. Specific end use(s)

No additional information available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

quintozene (82-68-8)		
Belgium	Limit value (mg/m ³)	0.5 mg/m ³ (Pentachloronitrobenzène; Belgium; Time-weighted average exposure limit 8 h)
Italy - Portugal - USA ACGIH	ACGIH TWA (mg/m ³)	0.5 mg/m ³ (Pentachloronitrobenzene; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value)
4-aminobiphenyl (92-67-1)		
France	VME (mg/m ³)	0.007 mg/m ³ (4-Aminobiphényle; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
France	VME (ppm)	0.001 ppm (4-Aminobiphényle; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

2-naphthylamine (91-59-8)		
France	VME (mg/m ³)	0.005 mg/m ³ (2-Naphtylamine; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
France	VME (ppm)	0.001 ppm (2-Naphtylamine; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
5-nitro-o-toluidine (99-55-8)		
Italy - Portugal - USA ACGIH	ACGIH TWA (mg/m ³)	1 mg/m ³ (5-nitro-o-toluidine; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value; Inhalable fraction)
o-toluidine (95-53-4)		
Belgium	Limit value (mg/m ³)	8.9 mg/m ³ (o-Toluidine; Belgium; Time-weighted average exposure limit 8 h)
Belgium	Limit value (ppm)	2 ppm (o-Toluidine; Belgium; Time-weighted average exposure limit 8 h)
France	VME (mg/m ³)	9 mg/m ³ (o-Toluidine; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
France	VME (ppm)	2 ppm (o-Toluidine; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	2 ppm (o-Toluidine; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value)
United Kingdom	WEL TWA (mg/m ³)	0.89 mg/m ³ o-Toluidine; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL TWA (ppm)	0.2 ppm o-Toluidine; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
pyridine (110-86-1)		
EU	IOELV TWA (mg/m ³)	15 mg/m ³ (Pyridine; EU; Time-weighted average exposure limit 8 h; Indicative occupational exposure limit value)
EU	IOELV TWA (ppm)	5 ppm (Pyridine; EU; Time-weighted average exposure limit 8 h; Indicative occupational exposure limit value)
Belgium	Limit value (mg/m ³)	3.3 mg/m ³ (Pyridine; Belgium; Time-weighted average exposure limit 8 h)
Belgium	Limit value (ppm)	1 ppm (Pyridine; Belgium; Time-weighted average exposure limit 8 h)
France	VLE (mg/m ³)	30 mg/m ³ (Pyridine; France; Short time value; VL: Valeur non réglementaire indicative)
France	VLE (ppm)	10 ppm (Pyridine; France; Short time value; VL: Valeur non réglementaire indicative)
France	VME (mg/m ³)	15 mg/m ³ (Pyridine; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
France	VME (ppm)	5 ppm (Pyridine; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	1 ppm (Pyridine; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value)
Netherlands	Grenswaarde TGG 8H (mg/m ³)	0.9 mg/m ³ (Pyridine; Netherlands; Time-weighted average exposure limit 8 h; Public occupational exposure limit value)
Netherlands	Grenswaarde TGG 8H (ppm)	0.27 ppm (Pyridine; Netherlands; Time-weighted average exposure limit 8 h; Public occupational exposure limit value)
United Kingdom	WEL TWA (mg/m ³)	16 mg/m ³ Pyridine; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL TWA (ppm)	5 ppm Pyridine; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL STEL (mg/m ³)	33 mg/m ³ Pyridine; United Kingdom; Short time value; Workplace exposure limit (EH40/2005)

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

pyridine (110-86-1)		
United Kingdom	WEL STEL (ppm)	10 ppm Pyridine; United Kingdom; Short time value; Workplace exposure limit (EH40/2005)
aniline (62-53-3)		
Belgium	Limit value (mg/m ³)	7.7 mg/m ³ (Aniline et homologues; Belgium; Time-weighted average exposure limit 8 h)
Belgium	Limit value (ppm)	2 ppm (Aniline et homologues; Belgium; Time-weighted average exposure limit 8 h)
France	VME (mg/m ³)	10 mg/m ³ (Aniline; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
France	VME (ppm)	2 ppm (Aniline; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	2 ppm (Aniline; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value)
United Kingdom	WEL TWA (mg/m ³)	4 mg/m ³ Aniline; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL TWA (ppm)	1 ppm Aniline; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
3-Methylphenol (108-39-4)		
EU	IOELV TWA (mg/m ³)	22 mg/m ³ (Cresols (all isomers); EU; Time-weighted average exposure limit 8 h; Indicative occupational exposure limit value)
EU	IOELV TWA (ppm)	5 ppm (Cresols (all isomers); EU; Time-weighted average exposure limit 8 h; Indicative occupational exposure limit value)
Belgium	Limit value (mg/m ³)	22 mg/m ³ (Crésols (tous isomères); Belgium; Time-weighted average exposure limit 8 h)
Belgium	Limit value (ppm)	5 ppm (Crésols (tous isomères); Belgium; Time-weighted average exposure limit 8 h)
France	VME (mg/m ³)	22 mg/m ³ (Crésols (tous isomères); France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
France	VME (ppm)	5 ppm (Crésols (tous isomères); France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
Italy - Portugal - USA ACGIH	ACGIH TWA (mg/m ³)	20 mg/m ³ (Cresol, all isomers; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value; Inhalable fraction and vapor)
Netherlands	Grenswaarde TGG 8H (mg/m ³)	22 mg/m ³ (Kresol (alle isomeren); Netherlands; Time-weighted average exposure limit 8 h; Public occupational exposure limit value)
1,3-dinitrobenzene (99-65-0)		
Belgium	Limit value (mg/m ³)	1 mg/m ³ (Dinitrobenzène (tous isomères); Belgium; Time-weighted average exposure limit 8 h)
Belgium	Limit value (ppm)	0.15 ppm (Dinitrobenzène (tous isomères); Belgium; Time-weighted average exposure limit 8 h)
France	VME (mg/m ³)	1 mg/m ³ (Dinitrobenzène (tous isomères); France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
France	VME (ppm)	0.15 ppm (Dinitrobenzène (tous isomères); France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	0.15 ppm (Dinitrobenzene, all isomers; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value)
United Kingdom	WEL TWA (mg/m ³)	1 mg/m ³ Dinitrobenzene, all isomers; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL TWA (ppm)	0.15 ppm Dinitrobenzene, all isomers; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL STEL (mg/m ³)	3.5 mg/m ³ Dinitrobenzene, all isomers; United Kingdom; Short time value; Workplace exposure limit (EH40/2005)

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

1,3-dinitrobenzene (99-65-0)		
United Kingdom	WEL STEL (ppm)	0.5 ppm Dinitrobenzene, all isomers; United Kingdom; Short time value; Workplace exposure limit (EH40/2005)
diphenylamine (122-39-4)		
Belgium	Limit value (mg/m ³)	10 mg/m ³ (Diphénylamine; Belgium; Time-weighted average exposure limit 8 h)
France	VME (mg/m ³)	10 mg/m ³ (Diphénylamine; France; Time-weighted average exposure limit 8 h; VL: Valeur non réglementaire indicative)
Italy - Portugal - USA ACGIH	ACGIH TWA (mg/m ³)	10 mg/m ³ (Diphenylamine; USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value)
United Kingdom	WEL TWA (mg/m ³)	10 mg/m ³ Diphenylamine; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL STEL (mg/m ³)	20 mg/m ³ Diphenylamine; United Kingdom; Short time value; Workplace exposure limit (EH40/2005)
Methylene Chloride (75-09-2)		
Belgium	Limit value (mg/m ³)	177 mg/m ³ (Chlorure de méthylène; Belgium; Time-weighted average exposure limit 8 h)
Belgium	Limit value (ppm)	50 ppm (Chlorure de méthylène; Belgium; Time-weighted average exposure limit 8 h)
France	VLE (mg/m ³)	356 mg/m ³ (Dichlorométhane; France; Short time value; VRC: Valeur réglementaire contraignante)
France	VLE (ppm)	100 ppm (Dichlorométhane; France; Short time value; VRC: Valeur réglementaire contraignante)
France	VME (mg/m ³)	178 mg/m ³ (Dichlorométhane; France; Time-weighted average exposure limit 8 h; VRC: Valeur réglementaire contraignante)
France	VME (ppm)	50 ppm (Dichlorométhane; France; Time-weighted average exposure limit 8 h; VRC: Valeur réglementaire contraignante)
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	50 ppm (Dichloromethane (Methylene chloride); USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value)
United Kingdom	WEL TWA (mg/m ³)	350 mg/m ³ Dichloromethane; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL TWA (ppm)	100 ppm Dichloromethane; United Kingdom; Time-weighted average exposure limit 8 h; Workplace exposure limit (EH40/2005)
United Kingdom	WEL STEL (mg/m ³)	1060 mg/m ³ Dichloromethane; United Kingdom; Short time value; Workplace exposure limit (EH40/2005)
United Kingdom	WEL STEL (ppm)	300 ppm Dichloromethane; United Kingdom; Short time value; Workplace exposure limit (EH40/2005)

8.2. Exposure controls

Appropriate engineering controls

: Either local exhaust or general room ventilation is usually required.

Personal protective equipment

: Avoid all unnecessary exposure. Gloves. Protective clothing. Protective goggles. Safety glasses.



Hand protection

: Wear chemically resistant protective gloves. Wear suitable gloves resistant to chemical penetration.

Eye protection

: Chemical goggles or safety glasses. Safety glasses.

Skin and body protection

: Wear chemically protective gloves, lab coat or apron to prevent prolonged or repeated skin contact.

Respiratory protection

: Wear appropriate mask.

Other information

: Do not eat, drink or smoke during use.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state

: Liquid

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

Color	: Colorless.
Odor	: characteristic.
pH	: No data available
Melting point	: No data available
Freezing point	: No data available
Boiling point	: No data available
Flash point	: No data available
Auto-ignition temperature	: No data available
Decomposition temperature	: No data available
Flammability (solid, gas)	: Highly flammable liquid and vapor
Relative density	: No data available
Solubility	: No data available
Explosive properties	: Risk of explosion if heated under confinement.
Oxidizing properties	: No data available
Explosion limits	: No data available

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

No additional information available

10.2. Chemical stability

Highly flammable liquid and vapor. May form flammable/explosive vapor-air mixture. Risk of explosion if heated under confinement. Extreme risk of explosion by shock, friction, fire or other sources of ignition.

10.3. Possibility of hazardous reactions

Not established.

10.4. Conditions to avoid

Direct sunlight. Extremely high or low temperatures. Open flame. Heat. Sparks. Overheating.

10.5. Incompatible materials

No additional information available

10.6. Hazardous decomposition products

May release flammable gases.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity : Oral: Harmful if swallowed. Dermal: Harmful in contact with skin. Inhalation: Harmful if inhaled.

Custom 8270 Appendix IV Mix	
ATE CLP (oral)	1671.438 mg/kg body weight
ATE CLP (dermal)	1100 mg/kg body weight
ATE CLP (gases)	4500 ppmV/4h
ATE CLP (vapors)	11 mg/l/4h
ATE CLP (dust, mist)	1.5 mg/l/4h
2,6-dichlorophenol (87-65-0)	
LD50 oral rat	2940 mg/kg (Rat; Weight of evidence)
ATE CLP (oral)	2940 mg/kg body weight
7,12-Dimethylbenz[a]anthracene (57-97-6)	
LD50 oral rat	327 mg/kg
ATE CLP (oral)	327 mg/kg body weight
ethyl methanesulfonate (62-50-0)	
ATE CLP (oral)	500 mg/kg body weight
methyl methanesulfonate (66-27-3)	
LD50 oral rat	225 mg/kg (Rat)
ATE CLP (oral)	225 mg/kg body weight
4-Nitroquinoline N-oxide (56-57-5)	
LD50 oral rat	12.6 mg/kg Subcutaneous
ATE CLP (oral)	12.6 mg/kg body weight

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

pentachlorobenzene (608-93-5)	
LD50 oral rat	1080 mg/kg (Rat)
ATE CLP (oral)	1080 mg/kg body weight
quintozene (82-68-8)	
LD50 oral rat	1100 mg/kg (Rat)
LD50 dermal rat	4000 mg/kg (Rat)
ATE CLP (oral)	1100 mg/kg body weight
ATE CLP (dermal)	4000 mg/kg body weight
phenacetin (62-44-2)	
LD50 oral rat	> 1000 mg/kg (Rat)
safrole (94-59-7)	
LD50 oral rat	1950 mg/kg (Rat)
LD50 dermal rabbit	> 5000 mg/kg (Rabbit)
ATE CLP (oral)	1950 mg/kg body weight
1,2,4,5-tetrachlorobenzene (95-94-3)	
LD50 oral rat	3105 mg/kg (Rat)
ATE CLP (oral)	3105 mg/kg body weight
1,3,5-trinitrobenzene (99-35-4)	
LD50 oral rat	275 mg/kg (Rat)
ATE CLP (oral)	5 mg/kg body weight
ATE CLP (dermal)	5 mg/kg body weight
ATE CLP (gases)	100 ppmV/4h
ATE CLP (vapors)	0.5 mg/l/4h
ATE CLP (dust, mist)	0.05 mg/l/4h
4-aminobiphenyl (92-67-1)	
LD50 oral rat	500 mg/kg (Rat)
ATE CLP (oral)	500 mg/kg body weight
4-dimethylaminoazobenzene (60-11-7)	
LD50 oral rat	200 mg/kg (Rat)
ATE CLP (oral)	200 mg/kg body weight
1-naphthylamine (134-32-7)	
LD50 oral rat	680 mg/kg (Rat)
ATE CLP (oral)	680 mg/kg body weight
2-naphthylamine (91-59-8)	
LD50 oral rat	727 mg/kg (Rat)
ATE CLP (oral)	727 mg/kg body weight
5-nitro-o-toluidine (99-55-8)	
ATE CLP (oral)	100 mg/kg body weight
ATE CLP (dermal)	300 mg/kg body weight
ATE CLP (gases)	700 ppmV/4h
ATE CLP (vapors)	3 mg/l/4h
ATE CLP (dust, mist)	0.5 mg/l/4h
N-nitrosodibutylamine (924-16-3)	
LD50 oral rat	1200 mg/kg (Rat)
ATE CLP (oral)	1200 mg/kg body weight
N-Nitrosodiethylamine (55-18-5)	
LD50 oral rat	220 mg/kg (Rat)
ATE CLP (oral)	220 mg/kg body weight
N-Nitroso-N-methylethylamine (10595-95-6)	
LD50 oral rat	90 mg/kg (Rat)
ATE CLP (oral)	90 mg/kg body weight
N-Nitrosomorpholine (59-89-2)	
LD50 oral rat	282 mg/kg (Rat)
ATE CLP (oral)	282 mg/kg body weight
N-Nitrosopiperidine (100-75-4)	
LD50 oral rat	200 mg/kg (Rat)
ATE CLP (oral)	200 mg/kg body weight

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

N-Nitrosopyrrolidine (930-55-2)	
LD50 oral rat	900 mg/kg (Rat)
ATE CLP (oral)	900 mg/kg body weight

2-Picoline (109-06-8)	
LD50 oral rat	600 mg/kg (Rat)
LD50 dermal rabbit	410 mg/kg (Rabbit)
LC50 inhalation rat (mg/l)	13 mg/l/4h (Rat)
ATE CLP (oral)	600 mg/kg body weight
ATE CLP (dermal)	410 mg/kg body weight
ATE CLP (gases)	4500 ppmV/4h
ATE CLP (vapors)	13 mg/l/4h
ATE CLP (dust, mist)	1.5 mg/l/4h

o-toluidine (95-53-4)	
LD50 oral rat	670 mg/kg (Rat)
LD50 dermal rabbit	3250 mg/kg (Rabbit)
ATE CLP (oral)	100 mg/kg body weight
ATE CLP (dermal)	3250 mg/kg body weight
ATE CLP (gases)	700 ppmV/4h
ATE CLP (vapors)	3 mg/l/4h
ATE CLP (dust, mist)	0.5 mg/l/4h

pyridine (110-86-1)	
LD50 oral rat	> 891 mg/kg (Rat)
LD50 dermal rabbit	1120 mg/kg (Rabbit)
ATE CLP (oral)	500 mg/kg body weight
ATE CLP (dermal)	1120 mg/kg body weight
ATE CLP (gases)	4500 ppmV/4h
ATE CLP (vapors)	11 mg/l/4h
ATE CLP (dust, mist)	1.5 mg/l/4h

aniline (62-53-3)	
LD50 oral rat	250 mg/kg (Rat)
LD50 dermal rabbit	840 mg/kg (Rabbit; Experimental value; 21 CFR 191.10; 836 mg/kg bodyweight; Rabbit)
LC50 inhalation rat (mg/l)	3.27 mg/l/4h (Rat; Experimental value)
ATE CLP (oral)	250 mg/kg body weight
ATE CLP (dermal)	840 mg/kg body weight
ATE CLP (gases)	700 ppmV/4h
ATE CLP (vapors)	3.27 mg/l/4h
ATE CLP (dust, mist)	3.27 mg/l/4h

3-Methylphenol (108-39-4)	
LD50 oral rat	242 mg/kg (Rat)
LD50 dermal rat	1100 mg/kg (Rat)
LD50 dermal rabbit	2050 mg/kg (Rabbit)
ATE CLP (oral)	242 mg/kg body weight
ATE CLP (dermal)	300 mg/kg body weight

1,3-dinitrobenzene (99-65-0)	
LD50 oral rat	60 mg/kg (Rat)
LD50 dermal rat	1200 mg/kg (Rat)
ATE CLP (oral)	5 mg/kg body weight
ATE CLP (dermal)	5 mg/kg body weight
ATE CLP (gases)	100 ppmV/4h
ATE CLP (vapors)	0.5 mg/l/4h
ATE CLP (dust, mist)	0.05 mg/l/4h

2,3,4,6-tetrachlorophenol (58-90-2)	
LD50 oral rat	140 mg/kg (Rat)
LD50 dermal rat	485 mg/kg (Rat)
ATE CLP (oral)	140 mg/kg body weight
ATE CLP (dermal)	485 mg/kg body weight

diphenylamine (122-39-4)	
ATE CLP (oral)	100 mg/kg body weight

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

diphenylamine (122-39-4)	
ATE CLP (dermal)	300 mg/kg body weight
ATE CLP (gases)	700 ppmV/4h
ATE CLP (vapors)	3 mg/l/4h
ATE CLP (dust, mist)	0.5 mg/l/4h

dinoseb (88-85-7)	
LD50 oral rat	25 - 40 mg/kg (Rat)
LD50 dermal rat	80 - 134 mg/kg (Rat)
LD50 dermal rabbit	80 mg/kg (Rabbit)
ATE CLP (oral)	25 mg/kg body weight
ATE CLP (dermal)	80 mg/kg body weight

Methylene Chloride (75-09-2)	
LD50 oral rat	> 2000 mg/kg (Rat; Literature study)
LD50 dermal rabbit	> 2000 mg/kg (Rabbit; Literature study)

Skin corrosion/irritation	: Not classified Based on available data, the classification criteria are not met
Serious eye damage/irritation	: Not classified Based on available data, the classification criteria are not met
Respiratory or skin sensitization	: Not classified Based on available data, the classification criteria are not met
Germ cell mutagenicity	: Not classified Based on available data, the classification criteria are not met
Carcinogenicity	: May cause cancer. May cause cancer
Reproductive toxicity	: Not classified Based on available data, the classification criteria are not met
Specific target organ toxicity – single exposure	: Not classified Based on available data, the classification criteria are not met
Specific target organ toxicity – repeated exposure	: Not classified Based on available data, the classification criteria are not met
Aspiration hazard	: Not classified Based on available data, the classification criteria are not met
Potential Adverse human health effects and symptoms	: Harmful if swallowed. Harmful in contact with skin.

SECTION 12: Ecological information

12.1. Toxicity

Ecology - water : Harmful to aquatic life with long lasting effects.

2,6-dichlorophenol (87-65-0)	
LC50 fish 1	6.4 mg/l (LC50; 96 h; <i>Oryzias latipes</i>)
EC50 Daphnia 1	3.4 mg/l (EC50; 48 h; <i>Daphnia magna</i>)
Threshold limit algae 2	9.7 mg/l (EC50; 96 h; <i>Chlorella vulgaris</i>)

pentachloroethane (76-01-7)	
LC50 fish 1	7 mg/l (LC50; 96 h; <i>Lepomis macrochirus</i>)
EC50 other aquatic organisms 1	134 mg/l (96 h; <i>Selenastrum capricornutum</i> ; Cell numbers)

phenacetin (62-44-2)	
LC50 fish 1	335 mg/l (LC50; 48 h)

1,3,5-trinitrobenzene (99-35-4)	
LC50 fish 1	0.52 mg/l (LC50; 96 h)
EC50 Daphnia 1	2.7 mg/l (EC50; 48 h)
Threshold limit algae 1	0.1 mg/l (EC0; 120 h)

1-naphthylamine (134-32-7)	
LC50 fish 1	1 - 10 ppm (LC50; 96 h)
Threshold limit algae 1	1.7 mg/l (EC20; 4 h)

N-Nitrosodiethylamine (55-18-5)	
LC50 fish 1	775 mg/l (LC50; 96 h)

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

2-Picoline (109-06-8)	
LC50 fish 1	897 mg/l (LC50; 96 h)
EC50 Daphnia 1	> 100 mg/l (EC50; 48 h)
o-toluidine (95-53-4)	
LC50 fish 1	68 - 100 mg/l (LC50; 96 h; Leuciscus idus)
EC50 Daphnia 1	0.52 mg/l (EC50; 48 h)
pyridine (110-86-1)	
LC50 fish 1	4.6 mg/l (LC50; 96 h)
EC50 Daphnia 2	495 mg/l (EC50; 48 h)
3-Methylphenol (108-39-4)	
LC50 fish 1	8.9 mg/l (LC50; 96 h; Salmo gairdneri)
EC50 Daphnia 1	8.9 mg/l (EC50; 24 h)
Threshold limit algae 1	15 mg/l (EC0; 192 h)
1,3-dinitrobenzene (99-65-0)	
LC50 fish 1	1.7 mg/l (LC50; 96 h)
EC50 Daphnia 1	27.4 mg/l (EC50; 48 h)
2,3,4,6-tetrachlorophenol (58-90-2)	
LC50 fish 1	0.14 mg/l (LC50; 96 h; Lepomis macrochirus)
EC50 Daphnia 1	0.01 mg/l (EC50; 48 h)
Threshold limit algae 2	1.3 mg/l (EC50; 96 h)
diphenylamine (122-39-4)	
EC50 Daphnia 1	2.3 mg/l (EC50; 24 h)
LC50 fish 2	2.2 - 5.1 mg/l (LC50; 48 h)
Threshold limit algae 1	0.048 mg/l (EC50; 72 h)
dinoseb (88-85-7)	
LC50 fish 1	0.08 - 0.15 mg/l (LC50; 96 h)
EC50 Daphnia 1	0.68 mg/l (LC50)
Methylene Chloride (75-09-2)	
LC50 fish 1	193 mg/l (LC50; 96 h; Pimephales promelas)
EC50 Daphnia 1	168.2 mg/l (EC50; 48 h)

12.2. Persistence and degradability

Custom 8270 Appendix IV Mix	
Persistence and degradability	May cause long-term adverse effects in the environment.
2,6-dichlorophenol (87-65-0)	
Persistence and degradability	Not readily biodegradable in water. Forming sediments in water. Biodegradable in the soil. Biodegradable in the soil under anaerobic conditions. Adsorbs into the soil.
BOD (% of ThOD)	0.148 (3 h)
ethyl methanesulfonate (62-50-0)	
Persistence and degradability	Biodegradability in water: no data available.
hexachloropropene (1888-71-7)	
Persistence and degradability	Biodegradability in soil: no data available.
3-methylcholanthrene (56-49-5)	
Persistence and degradability	Not readily biodegradable in water. Forming sediments in water. Adsorbs into the soil.
methyl methanesulfonate (66-27-3)	
Persistence and degradability	Biodegradability in water: no data available.
pentachlorobenzene (608-93-5)	
Persistence and degradability	Not readily biodegradable in water. Biodegradability in soil: no data available.
pentachloroethane (76-01-7)	
Persistence and degradability	Not readily biodegradable in water.
phenacetin (62-44-2)	
Persistence and degradability	Not readily biodegradable in water.
safrole (94-59-7)	
Persistence and degradability	Biodegradability in water: no data available.
1,2,4,5-tetrachlorobenzene (95-94-3)	
Persistence and degradability	Not readily biodegradable in water. Forming sediments in water. Adsorbs into the soil.

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

1,3,5-trinitrobenzene (99-35-4)	
Persistence and degradability	Not readily biodegradable in water.
4-aminobiphenyl (92-67-1)	
Persistence and degradability	Biodegradability in water: no data available.
4-dimethylaminoazobenzene (60-11-7)	
Persistence and degradability	Biodegradability in water: no data available.
1-naphthylamine (134-32-7)	
Persistence and degradability	Not readily biodegradable in water.
Biochemical oxygen demand (BOD)	0.89 g O ₂ /g substance
Chemical oxygen demand (COD)	2.41 g O ₂ /g substance
ThOD	2.57 g O ₂ /g substance
BOD (% of ThOD)	0.35
2-naphthylamine (91-59-8)	
Persistence and degradability	Not readily biodegradable in water.
ThOD	2.57 g O ₂ /g substance
BOD (% of ThOD)	0.57
5-nitro-o-toluidine (99-55-8)	
Persistence and degradability	Photolysis in water. Adsorbs into the soil.
N-nitrosodibutylamine (924-16-3)	
Persistence and degradability	Biodegradability in water: no data available.
N-Nitrosodiethylamine (55-18-5)	
Persistence and degradability	Not readily biodegradable in water.
N-Nitroso-N-methylethylamine (10595-95-6)	
Persistence and degradability	Biodegradability in water: no data available.
N-Nitrosomorpholine (59-89-2)	
Persistence and degradability	Biodegradability in water: no data available.
N-Nitrosopiperidine (100-75-4)	
Persistence and degradability	Biodegradability in water: no data available.
N-Nitrosopyrrolidine (930-55-2)	
Persistence and degradability	Biodegradability in water: no data available.
2-Picoline (109-06-8)	
Persistence and degradability	Readily biodegradable in water.
ThOD	2.75 g O ₂ /g substance
o-toluidine (95-53-4)	
Persistence and degradability	Readily biodegradable in water. Forming sediments in water. Photolysis in the air.
Biochemical oxygen demand (BOD)	1.43 g O ₂ /g substance
ThOD	2.54 g O ₂ /g substance
BOD (% of ThOD)	0.56
pyridine (110-86-1)	
Persistence and degradability	Readily biodegradable in water. Non degradable in the soil. Biodegradable in the soil under anaerobic conditions.
Biochemical oxygen demand (BOD)	1.15 g O ₂ /g substance
Chemical oxygen demand (COD)	0.05 g O ₂ /g substance
ThOD	2.23 g O ₂ /g substance
BOD (% of ThOD)	0.52
aniline (62-53-3)	
Persistence and degradability	Readily biodegradable in water. Photodegradation in water. Inhibition of nitrification. Biodegradable in the soil. Low potential for adsorption in soil.
BOD (% of ThOD)	0.62
3-Methylphenol (108-39-4)	
Persistence and degradability	Readily biodegradable in water. Biodegradable in the soil. Photodegradation in the air.
Biochemical oxygen demand (BOD)	1.7 g O ₂ /g substance
Chemical oxygen demand (COD)	2.4 g O ₂ /g substance
ThOD	2.52 g O ₂ /g substance
BOD (% of ThOD)	0.68

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

1,3-dinitrobenzene (99-65-0)	
Persistence and degradability	Not readily biodegradable in water. Non degradable in the soil.
2,3,4,6-tetrachlorophenol (58-90-2)	
Persistence and degradability	Not readily biodegradable in water. Non degradable in the soil.
diphenylamine (122-39-4)	
Persistence and degradability	Not readily biodegradable in water.
ThOD	2.39 g O ₂ /g substance
dinoseb (88-85-7)	
Persistence and degradability	Not readily biodegradable in water. Biodegradable in the soil.
Methylene Chloride (75-09-2)	
Persistence and degradability	Not readily biodegradable in water. Biodegradable in the soil.
12.3. Bioaccumulative potential	
Custom 8270 Appendix IV Mix	
Bioaccumulative potential	Not established.
2,6-dichlorophenol (87-65-0)	
BCF fish 1	4.1 - 20 (BCF; 8 weeks; Cyprinus carpio)
Log Pow	2.57 - 3.33 (Literature)
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).
ethyl methanesulfonate (62-50-0)	
Bioaccumulative potential	No bioaccumulation data available.
hexachloropropene (1888-71-7)	
Bioaccumulative potential	No bioaccumulation data available.
3-methylcholanthrene (56-49-5)	
Log Pow	6.42
Bioaccumulative potential	Bioaccumable.
methyl methanesulfonate (66-27-3)	
Bioaccumulative potential	No bioaccumulation data available.
pentachlorobenzene (608-93-5)	
BCF fish 1	3000 (BCF; 72 h)
BCF fish 2	6840 (BCF)
BCF other aquatic organisms 1	16000 (BCF)
BCF other aquatic organisms 2	4000 (BCF; 24 h)
Log Pow	4.88 - 5.69
Bioaccumulative potential	High potential for bioaccumulation (BCF > 5000).
pentachloroethane (76-01-7)	
BCF fish 1	60 - 68 (BCF; 672 h)
BCF fish 2	67 (BCF; 336 h)
Log Pow	2.89 - 3.67 (Experimental value)
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).
quintozene (82-68-8)	
Log Pow	4.64 - 4.89
Bioaccumulative potential	Potential for bioaccumulation ($4 \geq \text{Log Kow} \leq 5$).
phenacetin (62-44-2)	
BCF fish 1	< <3/<30,BCF
Log Pow	1.58 (Experimental value)
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).
safrole (94-59-7)	
Log Pow	3.45 (Estimated value)
1,2,4,5-tetrachlorobenzene (95-94-3)	
BCF fish 1	13000 (BCF)
BCF fish 2	1650 - 4830 (BCF)
BCF other aquatic organisms 1	> 5012 (BCF)
Log Pow	4.5 - 4.98
Bioaccumulative potential	High potential for bioaccumulation (BCF > 5000).
1,3,5-trinitrobenzene (99-35-4)	
Log Pow	1.18

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

1,3,5-trinitrobenzene (99-35-4)	
Bioaccumulative potential	Low potential for bioaccumulation (Log Kow < 4).
4-aminobiphenyl (92-67-1)	
Log Pow	3.09 (Calculated)
Bioaccumulative potential	No bioaccumulation data available.
4-dimethylaminoazobenzene (60-11-7)	
Log Pow	4.58
Bioaccumulative potential	No bioaccumulation data available.
1-naphthylamine (134-32-7)	
BCF fish 1	9 - 54 (BCF)
Log Pow	2.09 - 2.25
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).
2-naphthylamine (91-59-8)	
BCF fish 1	32 (BCF)
Log Pow	2.08 - 2.4
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).
5-nitro-o-toluidine (99-55-8)	
BCF fish 1	3.16 (BCF; 672 h; Poecilia latipinna)
Log Pow	1.96 (Estimated value)
Bioaccumulative potential	Bioaccumable.
N-nitrosodibutylamine (924-16-3)	
Bioaccumulative potential	No bioaccumulation data available.
N-Nitrosodiethylamine (55-18-5)	
BCF other aquatic organisms 1	1 (BCF)
Log Pow	0.48
Bioaccumulative potential	Low potential for bioaccumulation (Log Kow < 4).
N-Nitroso-N-methylethylamine (10595-95-6)	
Bioaccumulative potential	No bioaccumulation data available.
N-Nitrosomorpholine (59-89-2)	
Log Pow	-0.44
Bioaccumulative potential	Bioaccumulation: not applicable.
N-Nitrosopiperidine (100-75-4)	
Bioaccumulative potential	No bioaccumulation data available.
N-Nitrosopyrrolidine (930-55-2)	
Bioaccumulative potential	No bioaccumulation data available.
2-Picoline (109-06-8)	
Log Pow	1.1
Bioaccumulative potential	Low potential for bioaccumulation (Log Kow < 4).
o-toluidine (95-53-4)	
BCF fish 1	2.2 (BCF; 48 h)
BCF other aquatic organisms 1	5.9 (BCF)
Log Pow	1.29 - 1.4
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).
pyridine (110-86-1)	
Log Pow	0.65 - 1.04 (Experimental value)
Bioaccumulative potential	Low potential for bioaccumulation (Log Kow < 4).
aniline (62-53-3)	
BCF fish 2	2.6 (BCF; Danio rerio; Static system)
Log Pow	0.91 (Experimental value; EU Method A.8: Partition Coefficient; 25 °C)
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).
3-Methylphenol (108-39-4)	
BCF fish 1	20 (BCF; 72 h)
BCF fish 2	10.7 (BCF)
BCF other aquatic organisms 1	4900 (BCF; 24 h)
Log Pow	1.96 - 2.01 (Experimental value)
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

1,3-dinitrobenzene (99-65-0)	
BCF fish 1	4.5 - 7.5 (BCF; 72 h)
BCF fish 2	74.13 (BCF)
Log Pow	1.49 - 1.6
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).

2,3,4,6-tetrachlorophenol (58-90-2)	
BCF fish 1	200 (BCF; 24 h)
BCF fish 2	93 (BCF; 24 h)
Log Pow	4.1 - 4.8
Bioaccumulative potential	Potential for bioaccumulation ($4 \geq \text{Log Kow} \leq 5$).

diphenylamine (122-39-4)	
BCF fish 1	51 - 253 (BCF)
Log Pow	3.22 - 3.50
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).

dinoseb (88-85-7)	
BCF fish 1	< 2.5 (BCF)
BCF fish 2	1 (BCF)
Log Pow	3.09 - 4.12
Bioaccumulative potential	Potential for bioaccumulation ($4 \geq \text{Log Kow} \leq 5$).

Methylene Chloride (75-09-2)	
BCF fish 1	2 - 40 (BCF)
Log Pow	1.25 (Experimental value)
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).

12.4. Mobility in soil

o-toluidine (95-53-4)	
Surface tension	0.043 N/m

pyridine (110-86-1)	
Surface tension	0.038 N/m (20 °C)

aniline (62-53-3)	
Surface tension	0.071 N/m (20 °C); 0.042 N/m; 25 °C; 0.039 N/m; 50 °C; 0.037 N/m; 75 °C)
Log Koc	Koc, 130; Experimental value; GLP

3-Methylphenol (108-39-4)	
Surface tension	0.04 N/m (20 °C)
Ecology - soil	May be harmful to plant growth, blooming and fruit formation.

diphenylamine (122-39-4)	
Surface tension	0.03 N/m (60 °C)
Ecology - soil	May be harmful to plant growth, blooming and fruit formation.

dinoseb (88-85-7)	
Ecology - soil	Toxic to bees.

Methylene Chloride (75-09-2)	
Surface tension	0.028 N/m (20 °C)
Ecology - soil	May be harmful to plant growth, blooming and fruit formation.

12.5. Results of PBT and vPvB assessment

Component	
4-aminobiphenyl (92-67-1)	This substance/mixture does not meet the PBT criteria of REACH, annex XIII This substance/mixture does not meet the vPvB criteria of REACH, annex XIII
dinoseb (88-85-7)	This substance/mixture does not meet the PBT criteria of REACH, annex XIII This substance/mixture does not meet the vPvB criteria of REACH, annex XIII
o-toluidine (95-53-4)	This substance/mixture does not meet the PBT criteria of REACH, annex XIII This substance/mixture does not meet the vPvB criteria of REACH, annex XIII

12.6. Other adverse effects

Additional information : Avoid release to the environment

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Product/Packaging disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

Additional information : Handle empty containers with care because residual vapors are flammable. Hazardous waste due to potential risk of explosion.
Ecology - waste materials : Avoid release to the environment.

SECTION 14: Transport information

In accordance with ADR / RID / IMDG / IATA / ADN

14.1. UN number

UN-No. (ADR) : 2810
UN-No. (IATA) : 2810
UN-No. (IMDG) : 2810
UN-No. (ADN) : 2810

14.2. UN proper shipping name

Proper Shipping Name (ADR) : TOXIC LIQUID, ORGANIC, N.O.S.
Proper Shipping Name (IATA) : Toxic liquid, organic, n.o.s.
Proper Shipping Name (IMDG) : TOXIC LIQUID, ORGANIC, N.O.S.
Proper Shipping Name (ADN) : TOXIC LIQUID, ORGANIC, N.O.S.
Transport document description (ADR) : UN 2810 TOXIC LIQUID, ORGANIC, N.O.S., 6.1, III, (E)

14.3. Packing group

Class (ADR) : 6.1
Classification code (ADR) : T1
Class (IATA) : 6.1
Class (IMDG) : 6.1
Class (ADN) : 6.1
Classification code (ADN) : T1
Hazard labels (ADR) : 6.1



Division (IATA) : 6.1
Hazard labels (IATA) : 6.1



Hazard labels (IMDG) : 6.1



Hazard labels (ADN) : 6.1



14.4. Packing group

Packing group (ADR) : III
Packing group (IATA) : III
Packing group (IMDG) : III
Packing group (ADN) : III

14.5. Environmental hazards

Other information : No supplementary information available.

14.6. Special precautions for user

14.6.1. Overland transport

Hazard identification number (Kemler No.) : 60

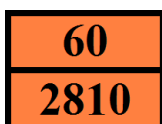
Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

Classification code (ADR) : T1

Orange plates :



Special provision (ADR) : 274, 614

Transport category (ADR) : 2

Tunnel restriction code (ADR) : E

Limited quantities (ADR) : 5I

Excepted quantities (ADR) : E1

EAC : 2X

APP : B

14.6.2. Transport by sea

Special provision (IMDG) : 223, 274

Limited quantities (IMDG) : 5 L

Excepted quantities (IMDG) : E1

Packing instructions (IMDG) : P001, LP01

IBC packing instructions (IMDG) : IBC03

Tank instructions (IMDG) : T7

Tank special provisions (IMDG) : TP1, TP28

EmS-No. (Fire) : F-A

EmS-No. (Spillage) : S-A

Stowage category (IMDG) : A

Properties and observations (IMDG) : Toxic if swallowed, by skin contact or by inhalation.

14.6.3. Air transport

CAO packing instructions (IATA) : 663

CAO max net quantity (IATA) : 220L

PCA packing instructions (IATA) : 655

PCA Limited quantities (IATA) : Y642

PCA limited quantity max net quantity (IATA) : 2L

PCA max net quantity (IATA) : 60L

PCA Excepted quantities (IATA) : E1

Special provision (IATA) : A3, A4, A137

ERG code (IATA) : 6L

14.6.4. Inland waterway transport

Special provision (ADN) : 274, 614, 802

Limited quantities (ADN) : 5 L

Excepted quantities (ADN) : E1

Carriage permitted (ADN) : T

Equipment required (ADN) : PP, EP, TOX, A

Ventilation (ADN) : VE02

Number of blue cones/lights (ADN) : 0

Carriage prohibited (ADN) : No

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not applicable

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

15.1.1. EU-Regulations

Contains no REACH substances with Annex XVII restrictions

Contains substance on the candidate list in concentration $\geq 0.1\%$ or with a lower specific limit: Biphenyl-4-ylamine (EC 202-177-1, CAS 92-67-1), Dinoseb (6-sec-butyl-2,4-dinitrophenol) (EC 201-861-7, CAS 88-85-7), o-Toluidine (EC 202-429-0, CAS 95-53-4)

Contains no REACH Annex XIV substances.

15.1.2. National regulations

Custom 8270 Appendix IV Mix

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830

Germany

Water hazard class (WGK) : 3 - strongly hazardous to water

15.2. Chemical safety assessment

No chemical safety assessment has been carried out

SECTION 16: Other information

Data sources : REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 16 December 2008 on classification, labeling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006.

Other information : None.

PHV SDS EU

Copyright 2015 Phenova, Inc. License granted to make paper copies for internal use. The information contained in this Safety Data Sheet is based on our current knowledge. The information contained in this document should be used only as a guide for appropriate safety precautions and should not be considered to be all inclusive. Users should make their own investigation to determine the suitability of the information for their particular purposes. The document does not represent any guarantee of the properties of the product. Phenova, Inc. shall not be held liable for any damage resulting from the handling or use of this product. Visit the Terms and Conditions of Sale link at www.phenova.com for additional terms and conditions of sale.