



CAMBRIDGE ISOTOPE LABORATORIES

PRODUCT AND COMPANY IDENTIFICATION

Product Name: SET OF OTHER CHLOROPHENOLICS FOR METHOD 1653A
UNLABELED

Catalog No: EM-4186

Company: Cambridge Isotope Laboratories Inc.
50 Frontage Road
Andover, MA. 01810
USA

Telephone: 1-800-322-1174 International information 1-978-749-8000
Emergency: 1-800-424-9300 International Emergency 1-202-483-7616

HAZARDS IDENTIFICATION

Emergency Overview

OSHA Hazards

Highly flammable

Toxic

Irritant

GHS Classification(s)

Flammable Liquid – Cat 2

Acute Toxicity (Oral) – Cat 3

Acute Toxicity (Dermal) – Cat 3

Acute Toxicity (Inhalation) – Cat 3

Skin Irritation – Cat 2

Eye irritation – Cat 2

Specific Target Organ Toxicity (Single Exposure) – Cat 1

GHS Label elements, including precautionary statements



Pictograms

Signal word

Danger

Hazard statement(s)

See individual Safety Data Sheets

COMPOSITION

Each kit contains two ampoules:

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL (1)

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE (1)



OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830 and according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Date of issue: 05/09/2014

Revision date:

Version: 1.0

EM-4183

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

1.1. Product identifier

Product form : Mixtures
Product name : OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL
Product code : EM-4183

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

1.2.1. Relevant identified uses

Main use category : Professional use
Industrial/Professional use spec : For professional use only

1.2.2. Uses advised against

No additional information available

1.3. Details of the supplier of the safety data sheet

Cambridge Isotope Laboratories, Inc.
50 Frontage Road
Andover, MA 01810
USA

USA: 1-800-322-1174 Int: 1-978-749-8000
cilsales@isotope.com www.isotope.com

Emergency telephone number

Emergency numbers:

Chemtrec: 1-800-424-9300 (24 hours)
International: 1-703-741-5970 (24 hours)

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. 3 (Oral)	H301
Acute Tox. 3 (Dermal)	H311
Acute Tox. 3 (Inhalation)	H331
Skin Irrit. 2	H315
Eye Irrit. 2	H319
STOT SE 1	H370

Full text of hazard classes and H-statements : see section 16

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

F; R11
T; R23/24/25
Xi; R36/38

Full text of R-phrases: see section 16

GHS-US classification

Flam. Liq. 2	H225
Acute Tox. 3 (Oral)	H301
Acute Tox. 3 (Dermal)	H311
Acute Tox. 3 (Inhalation:vapour)	H331
Skin Irrit. 2	H315
Eye Irrit. 2A	H319
STOT SE 1	H370

Full text of H statements : see section 16

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Adverse physicochemical, human health and environmental effects

Eyes, Kidney, Liver, Heart, Central nervous system. Highly flammable liquid and vapour. Causes damage to organs (eyes, kidneys, liver, heart, central nervous system) (if inhaled, if swallowed, in contact with skin). Toxic in contact with skin. Toxic if inhaled. Toxic if swallowed. Causes skin irritation. Causes serious eye irritation.

2.2. Label elements

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

Hazard pictograms (CLP)



Signal word (CLP)

: Danger

Hazardous ingredients

: 100% METHANOL UNLABELED

Hazard statements (CLP)

: H225 - Highly flammable liquid and vapour
H301+H311+H331 - Toxic if swallowed, in contact with skin or if inhaled
H315 - Causes skin irritation
H319 - Causes serious eye irritation
H370 - Causes damage to organs (central nervous system, eyes, heart, kidneys, liver) (in contact with skin, if inhaled, if swallowed)

Precautionary statements (CLP)

: P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking
P233 - Keep container tightly closed
P240 - Ground/bond container and receiving equipment
P241 - Use explosion-proof electrical, lighting, ventilating equipment
P260 - Do not breathe fume, mist, spray, vapours
P264 - Wash Both hands thoroughly after handling
P270 - Do not eat, drink or smoke when using this product
P271 - Use only outdoors or in a well-ventilated area

GHS-US labelling

Hazard pictograms (GHS-US)



Signal word (GHS-US)

: Danger

Hazard statements (GHS-US)

: H225 - Highly flammable liquid and vapour
H301+H311+H331 - Toxic if swallowed, in contact with skin or if inhaled
H315 - Causes skin irritation
H319 - Causes serious eye irritation
H370 - Causes damage to organs (central nervous system, eyes, heart, kidneys, liver) (Dermal, oral, Inhalation)

Precautionary statements (GHS-US)

: P210 - Keep away from heat, hot surfaces, open flames, sparks. - No smoking
P233 - Keep container tightly closed
P240 - Ground/Bond container and receiving equipment
P241 - Use explosion-proof electrical, ventilating, lighting equipment
P242 - Use only non-sparking tools
P243 - Take precautionary measures against static discharge
P260 - Do not breathe fume, mist, spray, vapours
P264 - Wash hands, forearms and face thoroughly after handling
P270 - Do not eat, drink or smoke when using this product
P271 - Use only outdoors or in a well-ventilated area
P280 - Wear eye protection, face protection, protective clothing, protective gloves
P301+P310 - If swallowed: Immediately call a doctor, a POISON CENTER
P302+P352 - If on skin: Wash with plenty of water
P303+P361+P353 - If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower
P304+P340 - If inhaled: Remove person to fresh air and keep comfortable for breathing
P305+P351+P338 - If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing
P311 - Call a doctor, a POISON CENTER

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P312 - Call a doctor, a POISON CENTER if you feel unwell
 P330 - Rinse mouth
 P332+P313 - If skin irritation occurs: Get medical advice/attention
 P337+P313 - If eye irritation persists: Get medical advice/attention
 P361 - Take off immediately all contaminated clothing
 P362 - Take off contaminated clothing and wash before reuse
 P363 - Wash contaminated clothing before reuse
 P370+P378 - In case of fire: Use alcohol resistant foam, carbon dioxide (CO2), dry extinguishing powder to extinguish
 P403+P233 - Store in a well-ventilated place. Keep container tightly closed
 P403+P235 - Store in a well-ventilated place. Keep cool
 P405 - Store locked up
 P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation

2.3. Other hazards

PBT: not relevant – no registration required

SECTION 3: Composition/information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Product identifier	%	Classification according to Directive 67/548/EEC
100% METHANOL UNLABELED	(CAS No) 67-56-1 (EC No) 200-659-6 (EC Index No) 603-001-00-X (REACH-no) 01-2119433307-44	99.4034	F; R11 T; R48/23/24/25 Xi; R36/38
4,5-DICHLOROCATECHOL UNLABELED (CHEM. PURITY 95-99%)	(CAS No) 3428-24-8 (Unlabeled) (EC No) 222-331-1	0.0628	Xi; R36/37/38 N; R50
4,5-DICHLOROGUAIACOL UNLABELED	(CAS No) 2460-49-3	0.0628	Xi; R36/37/38
2,4-DICHLOROPHENOL UNLABELED	(CAS No) 120-83-2 (EC No) 204-429-6 (EC Index No) 604-011-00-7	0.0628	T+; R28 T; R24 C; R35 Xi; R41 N; R51/53
3,4-DICHLOROGUAIACOL UNLABELED	(CAS No) 77102-94-4	0.0628	Xi; R36/37/38
4,6-DICHLOROGUAIACOL UNLABELED	(CAS No) 16766-31-7	0.0628	Xi; R36/37/38
3,4-DICHLOROCATECHOL UNLABELED	(CAS No) 3978-67-4 (Unlabeled)	0.0628	Xi; R36/37/38 N; R50
3,6-DICHLOROCATECHOL UNLABELED	(CAS No) 3938-16-7 (Unlabeled)	0.0628	Xi; R36/37/38 N; R50
2,6-DICHLOROPHENOL UNLABELED	(CAS No) 87-65-0 (Unlabeled) (EC No) 201-761-3	0.0628	T; R23/25 C; R34 N; R51/53
4-CHLOROCATECHOL UNLABELED (CHEM. PURITY 90-95%)	(CAS No) 2138-22-9 (Unlabeled) (EC No) 218-381-9	0.0314	T; R23/25 C; R34 N; R51/53
4-CHLOROGUAIACOL UNLABELED (CHEM PURITY 85-90%)	(CAS No) 16766-30-6	0.0314	Xi; R36/37/38
4-CHLOROPHENOL UNLABELED	(CAS No) 106-48-9 (Unlabeled) (EC No) 203-402-6 (EC Index No) 604-008-00-0	0.0314	Xn; R20/21/22 N; R51/53

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
100% METHANOL UNLABELED	(CAS No) 67-56-1 (EC No) 200-659-6 (EC Index No) 603-001-00-X (REACH-no) 01-2119433307-44	99.4034	Flam. Liq. 2, H225 Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation:vapour), H331 Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 1, H370

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Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
4,5-DICHLOROCATECHOL UNLABELED (CHEM. PURITY 95-99%)	(CAS No) 3428-24-8 (Unlabeled) (EC No) 222-331-1	0.0628	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335 Aquatic Acute 1, H400
4,5-DICHLOROGUAIACOL UNLABELED	(CAS No) 2460-49-3	0.0628	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335
2,4-DICHLOROPHENOL UNLABELED	(CAS No) 120-83-2 (EC No) 204-429-6 (EC Index No) 604-011-00-7	0.0628	Acute Tox. 2 (Oral), H300 Acute Tox. 3 (Dermal), H311 Skin Corr. 1A, H314 Eye Dam. 1, H318 Aquatic Chronic 2, H411
3,4-DICHLOROGUAIACOL UNLABELED	(CAS No) 77102-94-4	0.0628	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335
4,6-DICHLOROGUAIACOL UNLABELED	(CAS No) 16766-31-7	0.0628	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335
3,4-DICHLOROCATECHOL UNLABELED	(CAS No) 3978-67-4 (Unlabeled)	0.0628	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335 Aquatic Acute 1, H400
3,6-DICHLOROCATECHOL UNLABELED	(CAS No) 3938-16-7 (Unlabeled)	0.0628	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335 Aquatic Acute 1, H400
2,6-DICHLOROPHENOL UNLABELED	(CAS No) 87-65-0 (Unlabeled) (EC No) 201-761-3	0.0628	Acute Tox. 3 (Oral), H301 Skin Corr. 1B, H314 Aquatic Chronic 2, H411
4-CHLOROCATECHOL UNLABELED (CHEM. PURITY 90-95%)	(CAS No) 2138-22-9 (Unlabeled) (EC No) 218-381-9	0.0314	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Inhalation:dust,mist), H331 Skin Corr. 1B, H314 Aquatic Chronic 2, H411
4-CHLOROGUAIACOL UNLABELED (CHEM PURITY 85-90%)	(CAS No) 16766-30-6	0.0314	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335
4-CHLOROPHENOL UNLABELED	(CAS No) 106-48-9 (Unlabeled) (EC No) 203-402-6 (EC Index No) 604-008-00-0	0.0314	Acute Tox. 4 (Oral), H302 Acute Tox. 4 (Dermal), H312 Acute Tox. 4 (Inhalation), H332 Aquatic Chronic 2, H411

Name	Product identifier	%	GHS-US classification
100% METHANOL UNLABELED	(CAS No) 67-56-1	99.4034	Flam. Liq. 2, H225 Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation:vapour), H331 Skin Irrit. 2, H315 Eye Irrit. 2A, H319 STOT SE 1, H370

Full text of R- and H-statements: see section 16

SECTION 4: First aid measures

4.1. Description of first aid measures

- First-aid measures general : Call a POISON CENTER or doctor/physician.
- First-aid measures after inhalation : Remove victim to fresh air and keep at rest in a position comfortable for breathing.
- First-aid measures after skin contact : Remove/Take off immediately all contaminated clothing. Wash with plenty of soap and water. Wash contaminated clothing before reuse.
- First-aid measures after eye contact : Remove contact lenses, if present and easy to do. Continue rinsing. Rinse cautiously with water for several minutes.
- First-aid measures after ingestion : Rinse mouth. Obtain emergency medical attention. Immediately call a POISON CENTER or doctor/physician.

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

- Symptoms/injuries after inhalation : Toxic if inhaled.
- Symptoms/injuries after skin contact : Repeated exposure to this material can result in absorption through skin causing significant health hazard. Toxic in contact with skin. Causes skin irritation.

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Symptoms/injuries after eye contact	: Causes serious eye irritation.
Symptoms/injuries after ingestion	: Toxic if swallowed. 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

Treat symptomatically.

SECTION 5: Fire-fighting measures

5.1. Extinguishing media

Suitable extinguishing media	: Dry powder. Dry sand.
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 vapour.
Explosion hazard	: May form flammable/explosive vapour-air mixture.
Reactivity	: Vapours may form flammable mixture with air. Highly flammable liquid and vapour.

5.3. Advice for firefighters

Firefighting instructions	: Do not enter fire area without proper protective equipment, including respiratory protection.
Protection during firefighting	: Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing. Wear recommended personal protective equipment.
Other information	: Use water spray to cool exposed surfaces.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General measures	: Remove ignition sources. Use special care to avoid static electric charges. No open flames. No smoking.
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6.1.1. For non-emergency personnel

Emergency procedures	: Wear respiratory protection. Do not breathe dust, mist, gas, spray, vapours, fume. Avoid contact with skin, eyes and clothing. Ventilate spillage area. Remove all sources of ignition. No open flames, no sparks, and no smoking. Ensure adequate air ventilation. Special attention should be given to low areas/pits where flammable vapours can accumulate.
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6.1.2. For emergency responders

Protective equipment	: Do not attempt to take action without suitable protective equipment. For further information refer to section 8: "Exposure controls/personal protection".
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6.2. Environmental precautions

Prevent spreading in sewers. Do not allow to enter drains or water courses. Avoid release to the environment. Prevent entry to sewers and public waters.

6.3. Methods and material for containment and cleaning up

For containment	: Dike and contain spill.
Methods for cleaning up	: Take up liquid spill into absorbent material. Notify authorities if product enters sewers or public waters. This material and its container must be disposed of in a safe way, and as per local legislation.
Other information	: Dispose of materials or solid residues at an authorized site.

6.4. Reference to other sections

For further information refer to section 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Additional hazards when processed	: Handle empty containers with care because residual vapours are flammable.
Precautions for safe handling	: No open flames. No smoking. Use only non-sparking tools.
Hygiene measures	: Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

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	: Store at room temperature away from light and moisture.
Incompatible materials	: Heat sources.

7.3. Specific end use(s)

No additional information available

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SECTION 8: Exposure controls/personal protection

8.1. Control parameters

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL		
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	200.00000000 ppm Basis: USA. ACGIH Threshold Limit Values (TLV)
Italy - Portugal - USA ACGIH	ACGIH STEL (ppm)	250 ppm Basis: USA. ACGIH Threshold Limit Values (TLV)
Italy - Portugal - USA ACGIH	Remark (ACGIH)	Headache. Nausea. Dizziness. Eye damage. Substances for which there is a Biological Exposure Index or Indices (see BEI section). Danger of cutaneous absorption.

100% METHANOL UNLABELED (67-56-1)		
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	200.00000000 ppm Basis: USA. ACGIH Threshold Limit Values (TLV)
Italy - Portugal - USA ACGIH	ACGIH STEL (ppm)	250 ppm Basis: USA. ACGIH Threshold Limit Values (TLV)
Italy - Portugal - USA ACGIH	Remark (ACGIH)	Headache. Nausea. Dizziness. Eye damage. Substances for which there is a Biological Exposure Index or Indices (see BEI section). Danger of cutaneous absorption.
USA NIOSH	NIOSH REL (TWA) (mg/m ³)	260 mg/m ³ Basis: NIOSH Recommended Exposure Limits
USA NIOSH	NIOSH REL (TWA) (ppm)	200 ppm Basis: NIOSH Recommended Exposure Limits
USA NIOSH	NIOSH REL (STEL) (mg/m ³)	325 mg/m ³ Basis: NIOSH Recommended Exposure Limits
USA NIOSH	NIOSH REL (STEL) (ppm)	250 ppm Basis: NIOSH Recommended Exposure Limits
USA NIOSH	Remark (NIOSH)	Potential for dermal absorption.
USA OSHA	OSHA PEL (TWA) (mg/m ³)	260 mg/m ³ Basis: USA. Occupational Exposure Limits (OSHA) - Table Z-1 Limits for Air Contaminants - 1910.1000. California permissible exposure limits for chemical contaminants (Title 8, Article 107)
USA OSHA	OSHA PEL (TWA) (ppm)	200 ppm Basis: USA. Occupational Exposure Limits (OSHA) - Table Z-1 Limits for Air Contaminants - 1910.1000. California permissible exposure limits for chemical contaminants (Title 8, Article 107)
USA OSHA	OSHA PEL (STEL) (mg/m ³)	325 mg/m ³ Basis: USA. OSHA - Table Z-1 Limits for Air Contaminants - 1910.1000. California permissible exposure limits for chemical contaminants (Title 8, Article 107)
USA OSHA	OSHA PEL (STEL) (ppm)	250 ppm Basis: USA. OSHA - Table Z-1 Limits for Air Contaminants - 1910.1000. California permissible exposure limits for chemical contaminants (Title 8, Article 107)
USA OSHA	OSHA PEL (Ceiling) (ppm)	1000 ppm California permissible exposure limits for chemical contaminants (Title 8, Article 107)
USA OSHA	Remark (OSHA)	The value in mg/m ³ is approximate. Skin notation.

2,4-DICHLOROPHENOL UNLABELED (120-83-2)		
USA OSHA	Remark (OSHA)	Component: 2,4-Dichlorophenol CAS-No.: 120-83-2 Value: TWA Control parameters: 1.00000 ppm Remarks: Kin. Absorbed rapidly through the skin in molten or heated liquid form in amounts that have caused rapid death in humans. Basis: USA. Workplace Environmental Exposure Levels (WEEL)

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL		
DNEL/DMEL (Workers)		
Acute - systemic effects, dermal	40 mg/kg bodyweight/day	
Acute - systemic effects, inhalation	260 mg/m ³	
Acute - local effects, dermal	260 mg/cm ²	

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OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL	
Long-term - systemic effects, dermal	40 mg/kg bodyweight/day
Long-term - local effects, dermal	260 mg/cm ²
Long-term - local effects, inhalation	260 mg/m ³
DNEL/DMEL (General population)	
Acute - systemic effects, dermal	8 mg/kg bodyweight
Acute - systemic effects, inhalation	50 mg/m ³
Acute - systemic effects, oral	8 mg/kg bodyweight
Acute - local effects, inhalation	50 mg/m ³
Long-term - systemic effects, oral	8 mg/kg bodyweight/day
Long-term - systemic effects, inhalation	50 mg/m ³
Long-term - systemic effects, dermal	8 mg/kg bodyweight/day
Long-term - local effects, inhalation	50 mg/m ³
PNEC (Water)	
PNEC aqua (freshwater)	154 mg/l
PNEC aqua (marine water)	15.4 mg/l
PNEC (Sediment)	
PNEC sediment (freshwater)	570.4 mg/kg dwt
PNEC (Soil)	
PNEC soil	23.5 mg/kg dwt
PNEC (STP)	
PNEC sewage treatment plant	100 mg/kg

8.2. Exposure controls

Appropriate engineering controls	: Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work.
Personal protective equipment	: Gloves. Protective clothing. Protective goggles. Self-contained breathing apparatus.
	
Materials for protective clothing	: Wear suitable protective clothing and gloves.
Hand protection	: protective gloves.
Eye protection	: Wear eye protection. Chemical goggles or face shield with safety glasses.
Skin and body protection	: Wear suitable protective clothing.
Respiratory protection	: Where exposure through inhalation may occur from use, respiratory protection equipment is recommended.
Environmental exposure controls	: Avoid release to the environment.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

The properties listed below are for the solvent, the main component of this mixture.

Physical state	: Liquid
Appearance	: Liquid.
Molecular mass	: 32.04 g/mol
Colour	: Colourless.
Odour	: Pungent.
Odour threshold	: No data available
pH	: No data available
Relative evaporation rate (butylacetate=1)	: No data available
Melting point	: -98 °C (-144 °F)
Freezing point	: No data available
Boiling point	: 64.7 °C (148.5 °F)
Flash point	: 9.7 °C (49.5 °F) - closed cup
Auto-ignition temperature	: 455 °C (851 °F) at 1,013 hPa (760 mmHg)
Decomposition temperature	: No data available
Flammability (solid, gas)	: Highly flammable liquid and vapour

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Vapour pressure	: 130.3 hPa (97.7 mmHg) at 20 °C (68 °F); 169.27 hPa (126.96 mmHg) at 25 °C (77 °F)
Vapour pressure at 50 °C	: 546.6 hPa (410 mmHg) at 50 °C (122 °F)
Relative vapour density at 20 °C	: 1.11
Relative density	: No data available
Density	: 0.791 g/ml at 25 °C (77 °F)
Solubility	: Water: Completely miscible
Log Pow	: -0.77
Log Kow	: No data available
Viscosity, kinematic	: No data available
Viscosity, dynamic	: No data available
Explosive properties	: Product is not explosive.
Oxidising properties	: Non oxidizing material according to EC criteria.
Explosive limits	: 6 - 36 % (V)

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Vapours may form flammable mixture with air. Highly flammable liquid and vapour.

10.2. Chemical stability

See storage and expiration date on CoA.

10.3. Possibility of hazardous reactions

No dangerous reactions known under normal conditions of use.

10.4. Conditions to avoid

Open flame. Direct sunlight.

10.5. Incompatible materials

Acid anhydrides. Acid chlorides. Oxidizing agent. Alkali Metal Amides. Reducing agents. Acids.

10.6. Hazardous decomposition products

May release flammable gases.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

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

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL	
LD50 oral rat	1187 - 2769 mg/kg
LD50 dermal rabbit	17.1 mg/kg
LC50 inhalation rat (mg/l)	128.2 mg/l/4h ; 87.6 mg/l - 6 h
ATE CLP (oral)	100.000 mg/kg bodyweight
ATE CLP (dermal)	300.000 mg/kg bodyweight
ATE CLP (gases)	700.000 ppmv/4h
ATE CLP (vapours)	3.000 mg/l/4h
ATE CLP (dust,mist)	0.500 mg/l/4h
LDLO, oral, human	143 mg/kg Remarks: Lungs, Thorax, or Respiration: Dyspnea. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.
100% METHANOL UNLABELED (67-56-1)	
LD50 oral rat	1187 - 2769 mg/kg
LD50 dermal rabbit	17.1 mg/kg
LC50 inhalation rat (mg/l)	128.2 mg/l/4h ; 87.6 mg/l - 6 h
ATE CLP (oral)	100.000 mg/kg bodyweight
ATE CLP (dermal)	17.100 mg/kg bodyweight
ATE CLP (vapours)	3.000 mg/l/4h
ATE CLP (dust,mist)	128.200 mg/l/4h
LDLO, oral, human	143 mg/kg Remarks: Lungs, Thorax, or Respiration: Dyspnea. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL

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4-CHLOROCATECHOL UNLABELED (CHEM. PURITY 90-95%) (2138-22-9 (Unlabeled))	
ATE CLP (oral)	100.000 mg/kg bodyweight
ATE CLP (dust,mist)	0.500 mg/l/4h
2,4-DICHLOROPHENOL UNLABELED (120-83-2)	
LD50 oral rat	47 mg/kg Remarks: Behavioral: Food intake (animal). Lungs, Thorax, or Respiration: Dyspnea. Gastrointestinal: Other changes.
LD50 dermal	790 mg/kg Mammal
ATE CLP (oral)	47.000 mg/kg bodyweight
ATE CLP (dermal)	300.000 mg/kg bodyweight
4-CHLOROPHENOL UNLABELED (106-48-9 (Unlabeled))	
LD50 oral rat	670 mg/kg
LC50 inhalation rat (mg/l)	11 mg/m ³
ATE CLP (oral)	670.000 mg/kg bodyweight
ATE CLP (dermal)	1100.000 mg/kg bodyweight
ATE CLP (gases)	4500.000 ppmv/4h
ATE CLP (vapours)	0.011 mg/l/4h
ATE CLP (dust,mist)	0.011 mg/l/4h
2,6-DICHLOROPHENOL UNLABELED (87-65-0 (Unlabeled))	
ATE CLP (oral)	100.000 mg/kg bodyweight
ATE CLP (dust,mist)	0.500 mg/l/4h

Skin corrosion/irritation	: Skin. rabbit. Result: No skin irritation
Serious eye damage/irritation	: Eyes. rabbit. Result: No eye irritation
Respiratory or skin sensitisation	: Maximisation Test . Guinea pig. Did not cause sensitisation. (OECD 406 method)
Germ cell mutagenicity	: AMES test : S. typhimurium. Result: negative. fibroblast. Result: Negative. Mutation in mammalian somatic cells. Mutagenicity (in vivo mammalian bone-marrow cystogenetic test, chromosomal analysis) - Mouse - male and female Result: negative. Mouse - male and female. Result: Negative
Carcinogenicity	: Not classified
Reproductive toxicity	: Damage to fetus not classifiable. Fertility classification not possible from current data.
STOT-single exposure	: Causes damage to organs through prolonged or repeated exposure Causes damage to organs
STOT-repeated exposure	: The substance or mixture is not classified as specific target organ toxicant, repeated exposure. No data available
Aspiration hazard	: No aspiration toxicity classification.
Potential adverse human health effects and symptoms	: Toxic if swallowed. Toxic in contact with skin.
Symptoms/injuries after inhalation	: Toxic if inhaled.
Symptoms/injuries after skin contact	: Repeated exposure to this material can result in absorption through skin causing significant health hazard. Toxic in contact with skin. Causes skin irritation.
Symptoms/injuries after eye contact	: Causes serious eye irritation.
Symptoms/injuries after ingestion	: Toxic if swallowed. Swallowing a small quantity of this material will result in serious health hazard.

SECTION 12: Ecological information

12.1. Toxicity

Ecology - general	: The product is not considered harmful to aquatic organisms nor to cause long-term adverse effects in the environment.
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OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL	
LC50 fish 1	15400 mg/l mortality LC50 - Lepomis macrochirus (Bluegill) - 96 h
EC50 Daphnia 1	> 10000 mg/l Daphnia magna (Water flea) - 48 h
EC50 Daphnia 2	22000 mg/l Growth inhibition EC50 - Scenedesmus capricornutum (fresh water algae) - 96 h
NOEC (acute)	7900 mg/l Oryzias latipes - 200 h
100% METHANOL UNLABELED (67-56-1)	
LC50 fish 1	15400 mg/l mortality LC50 - Lepomis macrochirus (Bluegill) - 96 h
EC50 Daphnia 1	> 10000 mg/l Daphnia magna (Water flea) - 48 h
EC50 Daphnia 2	22000 mg/l Growth inhibition EC50 - Scenedesmus capricornutum (fresh water algae) - 96 h

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100% METHANOL UNLABELED (67-56-1)	
NOEC (acute)	7900 mg/l <i>Oryzias latipes</i> - 200 h
4-CHLOROCATECHOL UNLABELED (CHEM. PURITY 90-95%) (2138-22-9 (Unlabeled))	
LC50 fish 1	1.58 mg/l <i>Pimephales promelas</i> (fathead minnow) - 96 h
4,5-DICHLOROCATECHOL UNLABELED (CHEM. PURITY 95-99%) (3428-24-8 (Unlabeled))	
LC50 fish 1	0.89 mg/l <i>Pimephales promelas</i> (Fathead minnow) - 96 h
EC50 <i>Daphnia</i> 1	6.64 mg/l <i>Daphnia magna</i> (Water flea) - 24 h
ErC50 (algae)	0.45 mg/l Growth inhibition <i>Pseudokirchneriella subcapitata</i> - 96 h
2,4-DICHLOROPHENOL UNLABELED (120-83-2)	
LC50 fish 1	1.6 - 2.6 mg/l <i>Lepomis macrochirus</i> (Bluegill) - 96 h
LC50 other aquatic organisms 1	9.2 mg/l Growth inhibition EC50 - <i>Chlorella vulgaris</i> (Fresh water algae) - 96 h
EC50 <i>Daphnia</i> 1	2.7 - 3.9 mg/l <i>Daphnia magna</i> (Water flea) - 24 h
LC50 fish 2	2.2 - 3.1 mg/l <i>Oncorhynchus mykiss</i> (rainbow trout) - 96 h
EC50 <i>Daphnia</i> 2	9.2 mg/l <i>Chlorella vulgaris</i> (Fresh water algae) - 96 h
4-CHLOROPHENOL UNLABELED (106-48-9 (Unlabeled))	
LC50 fish 1	3.1 - 4.8 mg/l <i>Lepomis macrochirus</i> (Bluegill) - 96 h
EC50 <i>Daphnia</i> 1	2.8 - 8.6 mg/l <i>Daphnia magna</i> (water flea) - 24 h
2,6-DICHLOROPHENOL UNLABELED (87-65-0 (Unlabeled))	
LC50 fish 1	7.7 mg/l <i>Poecilia reticulata</i> (guppy) - 96 h
EC50 <i>Daphnia</i> 1	3.4 mg/l <i>Daphnia magna</i> (Water flea) - 48 h
ErC50 (algae)	9.7 mg/l - 96h, Growth inhibition <i>Chlorella vulgaris</i> (Fresh water algae) -

12.2. Persistence and degradability

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL	
Biochemical oxygen demand (BOD)	600 - 1200 mg/g
Chemical oxygen demand (COD)	1420 mg/g
ThOD	1500 mg/g
Biodegradation	72 % - rapidly biodegradable aerobic - Exposure time 5 d
100% METHANOL UNLABELED (67-56-1)	
Biochemical oxygen demand (BOD)	600 - 1200 mg/g
Chemical oxygen demand (COD)	1420 mg/g
ThOD	1500 mg/g
Biodegradation	72 % - rapidly biodegradable aerobic - Exposure time 5 d
4-CHLOROCATECHOL UNLABELED (CHEM. PURITY 90-95%) (2138-22-9 (Unlabeled))	
Persistence and degradability	Not available.
4,5-DICHLOROCATECHOL UNLABELED (CHEM. PURITY 95-99%) (3428-24-8 (Unlabeled))	
Persistence and degradability	Not available.
4-CHLOROGUAIACOL UNLABELED (CHEM PURITY 85-90%) (16766-30-6)	
Persistence and degradability	Not available.
4,5-DICHLOROGUAIACOL UNLABELED (2460-49-3)	
Persistence and degradability	Not available.
2,4-DICHLOROPHENOL UNLABELED (120-83-2)	
Persistence and degradability	No data available.
4-CHLOROPHENOL UNLABELED (106-48-9 (Unlabeled))	
Persistence and degradability	Not available.
3,4-DICHLOROGUAIACOL UNLABELED (77102-94-4)	
Persistence and degradability	Not available.
4,6-DICHLOROGUAIACOL UNLABELED (16766-31-7)	
Persistence and degradability	Not available.
3,4-DICHLOROCATECHOL UNLABELED (3978-67-4 (Unlabeled))	
Persistence and degradability	Not available.
3,6-DICHLOROCATECHOL UNLABELED (3938-16-7 (Unlabeled))	
Persistence and degradability	Not available.

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2,6-DICHLOROPHENOL UNLABELED (87-65-0 (Unlabeled))	
Persistence and degradability	Not available.

12.3. Bioaccumulative potential

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL

BCF fish 1	5 mg/l Cyprinus carpio (Carp) - 72 d at 20 °C
Bioconcentration factor (BCF REACH)	1
Log Pow	-0.77

100% METHANOL UNLABELED (67-56-1)

BCF fish 1	5 mg/l Cyprinus carpio (Carp) - 72 d at 20 °C
Bioconcentration factor (BCF REACH)	1
Log Pow	-0.77

4-CHLOROCATECHOL UNLABELED (CHEM. PURITY 90-95%) (2138-22-9 (Unlabeled))

Bioaccumulative potential	Not available.
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4,5-DICHLOROCATECHOL UNLABELED (CHEM. PURITY 95-99%) (3428-24-8 (Unlabeled))

Bioaccumulative potential	Not available.
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4-CHLOROGUAIACOL UNLABELED (CHEM PURITY 85-90%) (16766-30-6)

Bioaccumulative potential	Not available.
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4,5-DICHLOROGUAIACOL UNLABELED (2460-49-3)

Bioaccumulative potential	Not available.
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2,4-DICHLOROPHENOL UNLABELED (120-83-2)

BCF fish 1	8 mg/l Carassius auratus (goldfish) - 24 h
Bioconcentration factor (BCF REACH)	34
Log Pow	3.065

4-CHLOROPHENOL UNLABELED (106-48-9 (Unlabeled))

Log Pow	2.39
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3,4-DICHLOROGUAIACOL UNLABELED (77102-94-4)

Bioaccumulative potential	Not available.
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4,6-DICHLOROGUAIACOL UNLABELED (16766-31-7)

Bioaccumulative potential	Not available.
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3,4-DICHLOROCATECHOL UNLABELED (3978-67-4 (Unlabeled))

Bioaccumulative potential	Not available.
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3,6-DICHLOROCATECHOL UNLABELED (3938-16-7 (Unlabeled))

Bioaccumulative potential	Not available.
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2,6-DICHLOROPHENOL UNLABELED (87-65-0 (Unlabeled))

Bioaccumulative potential	Not available.
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12.4. Mobility in soil

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL

Ecology - soil	Not degradable in the soil.
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100% METHANOL UNLABELED (67-56-1)

Ecology - soil	Not degradable in the soil.
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4-CHLOROCATECHOL UNLABELED (CHEM. PURITY 90-95%) (2138-22-9 (Unlabeled))

Ecology - soil	Not available.
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4,5-DICHLOROCATECHOL UNLABELED (CHEM. PURITY 95-99%) (3428-24-8 (Unlabeled))

Ecology - soil	Not available.
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4-CHLOROGUAIACOL UNLABELED (CHEM PURITY 85-90%) (16766-30-6)

Ecology - soil	Not available.
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4,5-DICHLOROGUAIACOL UNLABELED (2460-49-3)

Ecology - soil	Not available.
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2,4-DICHLOROPHENOL UNLABELED (120-83-2)

Ecology - soil	No data available.
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4-CHLOROPHENOL UNLABELED (106-48-9 (Unlabeled))

Ecology - soil	Not available.
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3,4-DICHLOROGUAIACOL UNLABELED (77102-94-4)	
Ecology - soil	Not available.
4,6-DICHLOROGUAIACOL UNLABELED (16766-31-7)	
Ecology - soil	Not available.
3,4-DICHLOROCATECHOL UNLABELED (3978-67-4 (Unlabeled))	
Ecology - soil	Not available.
3,6-DICHLOROCATECHOL UNLABELED (3938-16-7 (Unlabeled))	
Ecology - soil	Not available.
2,6-DICHLOROPHENOL UNLABELED (87-65-0 (Unlabeled))	
Ecology - soil	Not available.

12.5. Results of PBT and vPvB assessment

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL	
PBT: not relevant – no registration required	
100% METHANOL UNLABELED (67-56-1)	
PBT: not relevant – no registration required	

12.6. Other adverse effects

Other adverse effects	: Avoid release to the environment.
Other information	: Stability in water: at 19 °C - (83 - 91%) - 72 h. Remarks: Hydrolyses on contact with water. Hydrolyses readily.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Regional legislation (waste)	: Waste materials should be disposed of under conditions which meet Federal, State, and Local environmental control regulations.
Product/Packaging disposal recommendations:	: Dispose in a safe manner in accordance with local/national regulations.
Additional information	: Handle empty containers with care because residual vapours are flammable.
Ecology - waste materials	: Hazardous waste due to toxicity.

SECTION 14: Transport information

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

14.1. UN number

UN-No.(DOT)	: 1230
DOT NA no.	UN1230

14.2. UN proper shipping name

Proper Shipping Name (DOT)	: Methanol
Class (DOT)	: 3 - Class 3 - Flammable and combustible liquid 49 CFR 173.120
Hazard labels (DOT)	: 3 - Flammable liquid 6.1 - Poison



DOT Symbols	: + - Fixes (cannot be altered) proper shipping name, hazard class, and packing group, I - Proper shipping name appropriate for international and domestic transportation
Packing group (DOT)	: II - Medium Danger
DOT Special Provisions (49 CFR 172.102)	: IB2 - Authorized IBCs: Metal (31A, 31B and 31N); Rigid plastics (31H1 and 31H2); Composite (31HZ1). Additional Requirement: Only liquids with a vapor pressure less than or equal to 110 kPa at 50 C (1.1 bar at 122 F), or 130 kPa at 55 C (1.3 bar at 131 F) are authorized. T7 - 4 178.274(d)(2) Normal..... 178.275(d)(3) TP2 - a. The maximum degree of filling must not exceed the degree of filling determined by the following: (image) Where: tr is the maximum mean bulk temperature during transport, tf is the temperature in degrees celsius of the liquid during filling, and a is the mean coefficient of cubical expansion of the liquid between the mean temperature of the liquid during filling (tf) and the maximum mean bulk temperature during transportation (tr) both in degrees celsius. b. For liquids transported under ambient conditions may be calculated using the formula: (image) Where: d15 and d50 are the densities (in units of mass per unit volume) of the liquid at 15 C (59 F) and 50 C (122 F), respectively.
DOT Packaging Exceptions (49 CFR 173.xxx)	: 150

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DOT Packaging Non Bulk (49 CFR 173.xxx) : 202
DOT Packaging Bulk (49 CFR 173.xxx) : 242

14.3. Additional information

Other information : No supplementary information available.

Overland transport

Packing group (ADR) : II
Class (ADR) : 3 - Flammable liquid
Hazard identification number (Kemler No.) : 336
Classification code (ADR) : FT1
Danger labels (ADR) : 3 - Flammable liquids
6.1 - Toxic substances



Orange plates : 

Tunnel restriction code (ADR) : D/E
Limited quantities (ADR) : 11
EAC code : •2WE
APP code : A(fl)
Excepted quantities (ADR) : E2

Transport by sea

DOT Vessel Stowage Location : B - (i) The material may be stowed "on deck" or "under deck" on a cargo vessel and on a passenger vessel carrying a number of passengers limited to not more than the larger of 25 passengers, or one passenger per each 3 m of overall vessel length; and (ii) "On deck only" on passenger vessels in which the number of passengers specified in paragraph (k)(2)(i) of this section is exceeded.
DOT Vessel Stowage Other : 40 - Stow "clear of living quarters"
MFAG-No : 131

Air transport

DOT Quantity Limitations Passenger aircraft/rail (49 CFR 173.27) : 1 L
DOT Quantity Limitations Cargo aircraft only (49 CFR 175.75) : 60 L
Civil Aeronautics Law : Flammable liquids

14.4. Environmental hazards

Other information : No supplementary information available.

14.5. Special precautions for user

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

Not applicable

SECTION 15: Regulatory information

15.1. US Federal regulations

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL	
Listed on the United States TSCA (Toxic Substances Control Act) inventory Subject to reporting requirements of United States SARA Section 313	
CERCLA RQ	5000 lb
SARA Section 302 Threshold Planning Quantity (TPQ)	Not subject to reporting requirements of the United States SARA Section 302.
SARA Section 311/312 Hazard Classes	Fire hazard Immediate (acute) health hazard Delayed (chronic) health hazard

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL

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100% METHANOL UNLABELED (67-56-1)	
Listed on the United States TSCA (Toxic Substances Control Act) inventory Subject to reporting requirements of United States SARA Section 313	
CERCLA RQ	5000 lb
SARA Section 302 Threshold Planning Quantity (TPQ)	Not subject to reporting requirements of the United States SARA Section 302.
SARA Section 311/312 Hazard Classes	Fire hazard Immediate (acute) health hazard Delayed (chronic) health hazard

15.2. International regulations

CANADA

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL	
Listed on the Canadian DSL (Domestic Substances List)	
100% METHANOL UNLABELED (67-56-1)	
Listed on the Canadian DSL (Domestic Substances List)	

15.2.1. National regulations

No additional information available

15.3. US State regulations

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN METHANOL()	
U.S. - California - Proposition 65 - Carcinogens List	No
U.S. - California - Proposition 65 - Developmental Toxicity	Yes
U.S. - California - Proposition 65 - Reproductive Toxicity - Female	Yes
U.S. - California - Proposition 65 - Reproductive Toxicity - Male	Yes
State or local regulations	U.S. - Delaware - Pollutant Discharge Requirements - Reportable Quantities U.S. - Idaho - Non-Carcinogenic Toxic Air Pollutants - Acceptable Ambient Concentrations U.S. - Massachusetts - Right To Know List U.S. - Pennsylvania - RTK (Right to Know) List U.S. - New Jersey - Right to Know Hazardous Substance List U.S. - New York - Reporting of Releases Part 597 - List of Hazardous Substances

100% METHANOL UNLABELED (67-56-1)				
U.S. - California - Proposition 65 - Carcinogens List	U.S. - California - Proposition 65 - Developmental Toxicity	U.S. - California - Proposition 65 - Reproductive Toxicity - Female	U.S. - California - Proposition 65 - Reproductive Toxicity - Male	No significant risk level (NSRL)
No	Yes	Yes	Yes	

100% METHANOL UNLABELED (67-56-1)	
State or local regulations	
U.S. - Delaware - Pollutant Discharge Requirements - Reportable Quantities U.S. - Idaho - Non-Carcinogenic Toxic Air Pollutants - Acceptable Ambient Concentrations U.S. - Massachusetts - Right To Know List U.S. - Pennsylvania - RTK (Right to Know) List U.S. - New Jersey - Right to Know Hazardous Substance List U.S. - New York - Reporting of Releases Part 597 - List of Hazardous Substances	

SECTION 16: Other information

Other information : This product is not radioactive. The data given for this product are those of the corresponding unlabeled compound, unless specifically indicated otherwise. Health and safety data for labeled compounds are generally not available, but are assumed to be similar or identical to the corresponding unlabeled compound.

Full text of R-, H- and EUH-statements:

Acute Tox. 2 (Oral)	Acute toxicity (oral), Category 2
Acute Tox. 3 (Dermal)	Acute toxicity (dermal), Category 3
Acute Tox. 3 (Inhalation)	Acute toxicity (inhal.), Category 3
Acute Tox. 3 (Inhalation:dust,mist)	Acute toxicity (inhalation:dust,mist) Category 3
Acute Tox. 3 (Inhalation:vapour)	Acute toxicity (inhalation:vapour) Category 3
Acute Tox. 3 (Oral)	Acute toxicity (oral), Category 3

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Acute Tox. 4 (Dermal)	Acute toxicity (dermal), Category 4
Acute Tox. 4 (Inhalation)	Acute toxicity (inhal.), Category 4
Acute Tox. 4 (Oral)	Acute toxicity (oral), Category 4
Aquatic Acute 1	Hazardous to the aquatic environment — Acute Hazard, Category 1
Aquatic Chronic 2	Hazardous to the aquatic environment — Chronic Hazard, Category 2
Eye Dam. 1	Serious eye damage/eye irritation, Category 1
Eye Irrit. 2	Serious eye damage/eye irritation, Category 2
Flam. Liq. 2	Flammable liquids, Category 2
Skin Corr. 1A	Skin corrosion/irritation, Category 1A
Skin Corr. 1B	Skin corrosion/irritation, Category 1B
Skin Irrit. 2	Skin corrosion/irritation, Category 2
STOT SE 1	Specific target organ toxicity — single exposure, Category 1
STOT SE 3	Specific target organ toxicity — Single exposure, Category 3, Respiratory tract irritation
H225	Highly flammable liquid and vapour
H300	Fatal if swallowed
H301	Toxic if swallowed
H302	Harmful if swallowed
H311	Toxic in contact with skin
H312	Harmful in contact with skin
H314	Causes severe skin burns and eye damage
H315	Causes skin irritation
H318	Causes serious eye damage
H319	Causes serious eye irritation
H331	Toxic if inhaled
H332	Harmful if inhaled
H335	May cause respiratory irritation
H370	Causes damage to organs
H400	Very toxic to aquatic life
H411	Toxic to aquatic life with long lasting effects
R11	Highly flammable
R20/21/22	Harmful by inhalation, in contact with skin and if swallowed
R23/24/25	Toxic by inhalation, in contact with skin and if swallowed
R23/25	Toxic by inhalation and if swallowed
R24	Toxic in contact with skin
R28	Very toxic if swallowed
R34	Causes burns
R35	Causes severe burns
R36/37/38	Irritating to eyes, respiratory system and skin
R36/38	Irritating to eyes and skin
R41	Risk of serious damage to eyes
R48/23/24/25	Toxic: danger of serious damage to health by prolonged exposure through inhalation, in contact with skin and if swallowed
R50	Very toxic to aquatic organisms
R51/53	Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment
C	Corrosive
F	Highly flammable
N	Dangerous for the environment
T	Toxic
T+	Very toxic
Xi	Irritant
Xn	Harmful

NFPA health hazard

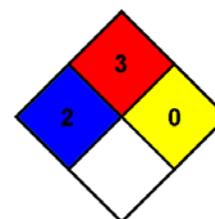
: 2 - Materials that, under emergency conditions, can cause temporary incapacitation or residual injury.

NFPA fire hazard

: 3 - Liquids and solids (including finely divided suspended solids) that can be ignited under almost all ambient temperature conditions.

NFPA reactivity

: 0 - Material that in themselves are normally stable, even under fire conditions.



HMIS III Rating

Health

: 2 Moderate Hazard - Temporary or minor injury may occur

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Flammability : 3 Serious Hazard
Physical : 0 Minimal Hazard

CIL Mixture SDS

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product



OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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Date of issue: 29/07/2014
EM-4184

Revision date:

Version: 1.0

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

1.1. Product identifier

Product form : Mixtures
Product name : OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE
Product code : EM-4184

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

1.2.1. Relevant identified uses

Main use category : Professional use
Industrial/Professional use spec : For professional use only

1.2.2. Uses advised against

No additional information available

1.3. Details of the supplier of the safety data sheet

Cambridge Isotope Laboratories, Inc.
50 Frontage Road
Andover, MA 01810
USA

USA: 1-800-322-1174 Int: 1-978-749-8000
cilsales@isotope.com www.isotope.com

Emergency telephone number

Emergency numbers:

Chemtrec: 1-800-424-9300 (24 hours)
International: 1-703-741-5970 (24 hours)

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
Eye Irrit. 2 H319
STOT SE 3 H336

Full text of hazard classes and H-statements : see section 16

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

F; R11
Xi; R36
R67

Full text of R-phrases: see section 16

GHS-US classification

Flam. Liq. 2 H225
Eye Irrit. 2A H319
STOT SE 3 H336

Full text of H statements : see section 16

Adverse physicochemical, human health and environmental effects

No additional information available

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830 and according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

2.2. Label elements

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

Hazard pictograms (CLP) :



GHS02

GHS07

Signal word (CLP) :

Danger

Hazardous ingredients :

ACETONE UNLABELED

Hazard statements (CLP) :

H225 - Highly flammable liquid and vapour

H319 - Causes serious eye irritation

H336 - May cause drowsiness or dizziness

Precautionary statements (CLP) :

P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking

P233 - Keep container tightly closed

P240 - Ground/bond container and receiving equipment

P241 - Use explosion-proof electrical, lighting, ventilating equipment

P261 - Avoid breathing dust, fume, gas, mist, spray, vapours

P264 - Wash hands, forearms and face thoroughly after handling

P271 - Use only outdoors or in a well-ventilated area

P280 - Wear eye protection, face protection, protective clothing, protective gloves

GHS-US labelling

Hazard pictograms (GHS-US) :



GHS02

GHS07

Signal word (GHS-US) :

Danger

Hazard statements (GHS-US) :

H225 - Highly flammable liquid and vapour

H319 - Causes serious eye irritation

H336 - May cause drowsiness or dizziness

Precautionary statements (GHS-US) :

P210 - Keep away from heat, hot surfaces, open flames, sparks. - No smoking

P233 - Keep container tightly closed

P240 - Ground/Bond container and receiving equipment

P241 - Use explosion-proof electrical, lighting, ventilating equipment

P242 - Use only non-sparking tools

P243 - Take precautionary measures against static discharge

P261 - Avoid breathing dust, fume, gas, mist, spray, vapours

P264 - Wash hands, forearms and face thoroughly after handling

P271 - Use only outdoors or in a well-ventilated area

P280 - Wear protective clothing, protective gloves

P303+P361+P353 - If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower

P304+P340 - If inhaled: Remove person to fresh air and keep comfortable for breathing

P305+P351+P338 - If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing

P312 - Call a doctor if you feel unwell

P337+P313 - If eye irritation persists: Get medical advice/attention

P370+P378 - In case of fire: Use alcohol resistant foam, carbon dioxide (CO2), dry extinguishing powder to extinguish

P403+P233 - Store in a well-ventilated place. Keep container tightly closed

P403+P235 - Store in a well-ventilated place. Keep cool

P405 - Store locked up

P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation

2.3. Other hazards

No additional information available

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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SECTION 3: Composition/information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Product identifier	%	Classification according to Directive 67/548/EEC
ACETONE UNLABELED	(CAS No) 67-64-1 (EC No) 200-662-2 (EC Index No) 606-001-00-8	99.558	F; R11 Xi; R36 R67 R66
5,6-DICHLOROVANILLIN UNLABELED	(CAS No) 18268-69-4	0.126	Xi; R37
2,6-DICHLOROSYRINGEALDEHYDE UNLABELED	(CAS No) 76330-06-8 (Unlabeled)	0.126	Xi; R37
2-CHLOROSYRINGEALDEHYDE UNLABELED	(CAS No) 76341-69-0 (Unlabeled)	0.063	Xi; R37
5-CHLOROVANILLIN UNLABELED	(CAS No) 19463-48-0	0.063	Xi; R36/37/38
6-CHLOROVANILLIN UNLABELED	(CAS No) 18268-76-3 (Unlabeled)	0.063	Xi; R37

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
ACETONE UNLABELED	(CAS No) 67-64-1 (EC No) 200-662-2 (EC Index No) 606-001-00-8	99.558	Flam. Liq. 2, H225 Eye Irrit. 2, H319 STOT SE 3, H336
5,6-DICHLOROVANILLIN UNLABELED	(CAS No) 18268-69-4	0.126	STOT SE 3, H335
2,6-DICHLOROSYRINGEALDEHYDE UNLABELED	(CAS No) 76330-06-8 (Unlabeled)	0.126	STOT SE 3, H335
2-CHLOROSYRINGEALDEHYDE UNLABELED	(CAS No) 76341-69-0 (Unlabeled)	0.063	STOT SE 3, H335
5-CHLOROVANILLIN UNLABELED	(CAS No) 19463-48-0	0.063	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335
6-CHLOROVANILLIN UNLABELED	(CAS No) 18268-76-3 (Unlabeled)	0.063	STOT SE 3, H335

Name	Product identifier	%	GHS-US classification
ACETONE UNLABELED	(CAS No) 67-64-1	99.558	Flam. Liq. 2, H225 Eye Irrit. 2A, H319 STOT SE 3, H336

Full text of R- and H-statements: see section 16

SECTION 4: First aid measures

4.1. Description of first aid measures

First-aid measures general	: Call a POISON CENTER or doctor/physician.
First-aid measures after inhalation	: Remove victim to fresh air and keep at rest in a position comfortable for breathing.
First-aid measures after skin contact	: Remove/Take off immediately all contaminated clothing. Gently wash with plenty of soap and water.
First-aid measures after eye contact	: Remove contact lenses, if present and easy to do. Continue rinsing. Rinse cautiously with water for several minutes.
First-aid measures after ingestion	: Rinse mouth. Obtain emergency medical attention. Immediately call a POISON CENTER or doctor/physician.

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

Symptoms/injuries after inhalation	: May be harmful if inhaled. May cause respiratory irritation. May cause drowsiness or dizziness.
Symptoms/injuries after skin contact	: May be harmful in contact with skin.
Symptoms/injuries after eye contact	: Causes serious eye irritation.
Symptoms/injuries after ingestion	: May be harmful if swallowed.

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

No additional information available

SECTION 5: Fire-fighting measures

5.1. Extinguishing media

Suitable extinguishing media : Water spray, dry chemical powder, alcohol-resistant foam, carbon dioxide (CO2).

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830 and according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

5.2. Special hazards arising from the substance or mixture

- Fire hazard : Highly flammable liquid and vapour.
Explosion hazard : May form flammable/explosive vapour-air mixture.
Reactivity : Vapours may form flammable mixture with air. Highly flammable liquid and vapour.

5.3. Advice for firefighters

- Firefighting instructions : Do not enter fire area without proper protective equipment, including respiratory protection.
Protection during firefighting : Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing. Wear recommended personal protective equipment.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

- General measures : Remove ignition sources. Use special care to avoid static electric charges. No open flames. No smoking.

6.1.1. For non-emergency personnel

- Emergency procedures : Wear respiratory protection. Do not breathe dust, mist, gas, spray, vapours, fume. Avoid contact with skin, eyes and clothing. Ventilate spillage area. Remove all sources of ignition. No open flames, no sparks, and no smoking. Ensure adequate air ventilation. Special attention should be given to low areas/pits where flammable vapours can accumulate.

6.1.2. For emergency responders

- Protective equipment : Do not attempt to take action without suitable protective equipment. For further information refer to section 8: "Exposure controls/personal protection".

6.2. Environmental precautions

- Prevent spreading in sewers. Do not allow to enter drains or water courses. Avoid release to the environment. Prevent entry to sewers and public waters.

6.3. Methods and material for containment and cleaning up

- For containment : Dike and contain spill.
Methods for cleaning up : Take up liquid spill into absorbent material. Notify authorities if product enters sewers or public waters. This material and its container must be disposed of in a safe way, and as per local legislation.

6.4. Reference to other sections

- No additional information available

SECTION 7: Handling and storage

7.1. Precautions for safe handling

- Additional hazards when processed : Handle empty containers with care because residual vapours are flammable.
Precautions for safe handling : No open flames. No smoking. Use only non-sparking tools.
Hygiene measures : Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

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 : Store at room temperature away from light and moisture.
Incompatible materials : Heat sources.

7.3. Specific end use(s)

- No additional information available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE		
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	500.0000000 ppm Eye & Upper Respiratory irritation,Central Nervous System impairment.
Italy - Portugal - USA ACGIH	ACGIH STEL (ppm)	750 ppm Eye & Upper Respiratory irritation,Central Nervous System impairment.
ACETONE UNLABELED (67-64-1)		
Italy - Portugal - USA ACGIH	ACGIH TWA (ppm)	500.0000000 ppm Eye & Upper Respiratory irritation,Central Nervous System impairment.
Italy - Portugal - USA ACGIH	ACGIH STEL (mg/m ³)	Eye & Upper Respiratory irritation,Central Nervous System impairment.

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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ACETONE UNLABELED (67-64-1)		
Italy - Portugal - USA ACGIH	ACGIH STEL (ppm)	750 ppm
USA OSHA	OSHA PEL (TWA) (ppm)	750 ppm The acetone STEL does not apply to the cellulose acetate fiber industry.
USA OSHA	OSHA PEL (STEL) (ppm)	100 ppm The acetone STEL does not apply to the cellulose acetate fiber industry.

8.2. Exposure controls

Appropriate engineering controls : Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work.

Personal protective equipment : Gloves. Protective clothing. Protective goggles. Self-contained breathing apparatus.



Materials for protective clothing : Wear suitable protective clothing and gloves.

Hand protection : Wear suitable protective clothing and gloves.

Eye protection : Wear eye protection. Chemical goggles or face shield with safety glasses.

Skin and body protection : Wear suitable protective clothing.

Respiratory protection : Where exposure through inhalation may occur from use, respiratory protection equipment is recommended.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

The properties listed below are for the solvent, the main component of this mixture.

Physical state	: Liquid
Appearance	: Liquid, clear.
Molecular mass	: 58.08 g/mol
Colour	: Colourless.
Odour	: No data available
Odour threshold	: No data available
pH	: No data available
Relative evaporation rate (butylacetate=1)	: No data available
Melting point	: -94 °C (-137 °F)
Freezing point	: No data available
Boiling point	: 56 °C (133 °F) at 1,013 hPa (760 mmHg)
Flash point	: -17 °C (1.4 °F) - closed cup
Auto-ignition temperature	: 465 °C (869 °F)
Decomposition temperature	: No data available
Flammability (solid, gas)	: Highly flammable liquid and vapour
Vapour pressure	: 533.3 hPa at 39.5 °C (103.1 °F)
Critical pressure	: 245.3 hPa (184.0 mmHg) at 20.0°C (68.0 °F)
Relative vapour density at 20 °C	: No data available
Relative density	: No data available
Density	: 0.791 g/ml at 25 °C (68.0 °F)
Solubility	: Water: Completely miscible
Log Pow	: -0.24
Log Kow	: No data available
Viscosity, kinematic	: No data available
Viscosity, dynamic	: No data available
Explosive properties	: No data available
Oxidising properties	: No data available
Explosive limits	: 2 - 13 % (V)

9.2. Other information

No additional information available

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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SECTION 10: Stability and reactivity

10.1. Reactivity

Vapours may form flammable mixture with air. Highly flammable liquid and vapour.

10.2. Chemical stability

See storage and expiration date on CoA.

10.3. Possibility of hazardous reactions

No dangerous reactions known under normal conditions of use.

10.4. Conditions to avoid

Open flame. Direct sunlight.

10.5. Incompatible materials

Bases, Oxidizing agents, Reducing agents.

10.6. Hazardous decomposition products

Carbon oxides (CO, CO₂).

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity : Not classified

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE	
LD50 oral rat	5800 mg/kg
LC50 inhalation rat (mg/l)	50100 mg/m ³ 8 h
ATE CLP (oral)	5800.000 mg/kg bodyweight
ATE CLP (vapours)	50.100 mg/l/4h
ATE CLP (dust,mist)	50.100 mg/l/4h
LD50 Dermal Guinea Pig	7,426 mg/kg

ACETONE UNLABELED (67-64-1)	
LD50 oral rat	5800 mg/kg
LC50 inhalation rat (mg/l)	50100 mg/m ³ 8 h
ATE CLP (oral)	5800.000 mg/kg bodyweight
ATE CLP (vapours)	50.100 mg/l/4h
ATE CLP (dust,mist)	50.100 mg/l/4h

Skin corrosion/irritation	: Skin - rabbit - Mild skin irritation - 24 h skin - rabbit - Mild skin irritation - 24 h
Serious eye damage/irritation	: Result: Severe eye irritation - 24 h Eyes - rabbit - Eye irritation - 24 h
Respiratory or skin sensitisation	: Chronic exposure may cause dermatitis. No data available
Germ cell mutagenicity	: Not available.
Carcinogenicity	: This product is or contains a component that is not classifiable as to its carcinogenicity on its IARC, ACGIH, NTP, or EPA classification.
Reproductive toxicity	: Not available.
STOT-single exposure	: May cause drowsiness or dizziness. May cause damage to organs.
STOT-repeated exposure	: Not classified No data available
Aspiration hazard	: Not classified
Potential adverse human health effects and symptoms	: This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.
Symptoms/injuries after inhalation	: May be harmful if inhaled. May cause respiratory irritation. May cause drowsiness or dizziness.
Symptoms/injuries after skin contact	: May be harmful in contact with skin.
Symptoms/injuries after eye contact	: Causes serious eye irritation.
Symptoms/injuries after ingestion	: May be harmful if swallowed.

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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SECTION 12: Ecological information

12.1. Toxicity

Ecology - general : The product is not considered harmful to aquatic organisms nor to cause long-term adverse effects in the environment.

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE	
LC50 fish 1	5540 mg/l Oncorhynchus mykiss (rainbow trout) - 96 h
EC50 Daphnia 1	13500 mg/l Daphnia magna (Water flea) - 48 h
ACETONE UNLABELED (67-64-1)	
LC50 fish 1	5540 mg/l Oncorhynchus mykiss (rainbow trout) -96h
EC50 Daphnia 1	13500 mg/l Daphnia magna (Water flea) - 48h

12.2. Persistence and degradability

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE	
Persistence and degradability	Not available.
2-CHLOROSYRINGEALDEHYDE UNLABELED (76341-69-0 (Unlabeled))	
Persistence and degradability	No data available.
5-CHLOROVANILLIN UNLABELED (19463-48-0)	
Persistence and degradability	Not available.
5,6-DICHLOROVANILLIN UNLABELED (18268-69-4)	
Persistence and degradability	No data available.
2,6-DICHLOROSYRINGEALDEHYDE UNLABELED (76330-06-8 (Unlabeled))	
Persistence and degradability	No data available.
6-CHLOROVANILLIN UNLABELED (18268-76-3 (Unlabeled))	
Persistence and degradability	No data available.

12.3. Bioaccumulative potential

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE	
Log Pow	-0.24
Bioaccumulative potential	Not available.
2-CHLOROSYRINGEALDEHYDE UNLABELED (76341-69-0 (Unlabeled))	
Bioaccumulative potential	No data available.
5-CHLOROVANILLIN UNLABELED (19463-48-0)	
Bioaccumulative potential	Not available.
5,6-DICHLOROVANILLIN UNLABELED (18268-69-4)	
Bioaccumulative potential	No data available.
2,6-DICHLOROSYRINGEALDEHYDE UNLABELED (76330-06-8 (Unlabeled))	
Bioaccumulative potential	No data available.
6-CHLOROVANILLIN UNLABELED (18268-76-3 (Unlabeled))	
Bioaccumulative potential	No data available.
ACETONE UNLABELED (67-64-1)	
Log Pow	-0.24

12.4. Mobility in soil

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE	
Ecology - soil	Not available.
2-CHLOROSYRINGEALDEHYDE UNLABELED (76341-69-0 (Unlabeled))	
Ecology - soil	No data available.
5-CHLOROVANILLIN UNLABELED (19463-48-0)	
Ecology - soil	Not available.
5,6-DICHLOROVANILLIN UNLABELED (18268-69-4)	
Ecology - soil	No data available.
2,6-DICHLOROSYRINGEALDEHYDE UNLABELED (76330-06-8 (Unlabeled))	
Ecology - soil	No data available.
6-CHLOROVANILLIN UNLABELED (18268-76-3 (Unlabeled))	
Ecology - soil	No data available.

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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12.5. Results of PBT and vPvB assessment

No additional information available

12.6. Other adverse effects

Other adverse effects : Not available.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Regional legislation (waste) : Waste materials should be disposed of under conditions which meet Federal, State, and Local environmental control regulations.

Product/Packaging disposal recommendations: : Offer surplus and non-recyclable solutions to a licensed disposal company. Contact a licensed professional waste disposal service to dispose of this material.

Ecology - waste materials : Dispose of as unused product.

SECTION 14: Transport information

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

14.1. UN number

UN-No.(DOT) : 1090
DOT NA no. UN1090

14.2. UN proper shipping name

Proper Shipping Name (DOT) : Acetone
Class (DOT) : 3 - Class 3 - Flammable and combustible liquid 49 CFR 173.120
Hazard labels (DOT) : 3 - Flammable liquid



Packing group (DOT) : II - Medium Danger
DOT Special Provisions (49 CFR 172.102) : IB2 - Authorized IBCs: Metal (31A, 31B and 31N); Rigid plastics (31H1 and 31H2); Composite (31HZ1). Additional Requirement: Only liquids with a vapor pressure less than or equal to 110 kPa at 50 C (1.1 bar at 122 F), or 130 kPa at 55 C (1.3 bar at 131 F) are authorized.
T4 - 2.65 178.274(d)(2) Normal..... 178.275(d)(3)
TP1 - The maximum degree of filling must not exceed the degree of filling determined by the following: Degree of filling = $97 / (1 + a (tr - tf))$ Where: tr is the maximum mean bulk temperature during transport, and tf is the temperature in degrees celsius of the liquid during filling.

DOT Packaging Exceptions (49 CFR 173.xxx) : 150
DOT Packaging Non Bulk (49 CFR 173.xxx) : 202
DOT Packaging Bulk (49 CFR 173.xxx) : 242

14.3. Additional information

Emergency Response Guide (ERG) Number : 127
Other information : No supplementary information available.

Overland transport

Packing group (ADR) : II
Class (ADR) : 3 - Flammable liquid
Hazard identification number (Kemler No.) : 33
Classification code (ADR) : F1
Danger labels (ADR) : 3 - Flammable liquids



OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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Orange plates : 

Tunnel restriction code (ADR) : D/E
Limited quantities (ADR) : 11
Excepted quantities (ADR) : E2

Transport by sea

DOT Vessel Stowage Location : B - (i) The material may be stowed "on deck" or "under deck" on a cargo vessel and on a passenger vessel carrying a number of passengers limited to not more than the larger of 25 passengers, or one passenger per each 3 m of overall vessel length; and (ii) "On deck only" on passenger vessels in which the number of passengers specified in paragraph (k)(2)(i) of this section is exceeded.
MFAG-No : 127

Air transport

DOT Quantity Limitations Passenger aircraft/rail : 5 L
(49 CFR 173.27)
DOT Quantity Limitations Cargo aircraft only (49 : 60 L
CFR 175.75)
Civil Aeronautics Law : Flammable liquids

14.4. Environmental hazards

Other information : No supplementary information available.

14.5. Special precautions for user

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

Not applicable

SECTION 15: Regulatory information

15.1. US Federal regulations

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

Listed on the United States TSCA (Toxic Substances Control Act) inventory
Subject to reporting requirements of United States SARA Section 313

SARA Section 302 Threshold Planning Quantity (TPQ)	Not subject to reporting requirements of the United States SARA Section 302.
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SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard Fire hazard Delayed (chronic) health hazard
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ACETONE UNLABELED (67-64-1)

SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard Fire hazard Delayed (chronic) health hazard
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15.2. International regulations

CANADA

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

Listed on the Canadian DSL (Domestic Substances List)

15.2.1. National regulations

No additional information available

15.3. US State regulations

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE()

U.S. - California - Proposition 65 - Carcinogens List	No
U.S. - California - Proposition 65 - Developmental Toxicity	No
U.S. - California - Proposition 65 - Reproductive Toxicity - Female	No
U.S. - California - Proposition 65 - Reproductive Toxicity - Male	No

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE

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Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2015/830 and according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

OTHER CHLOROPHENOLICS FOR METHOD 1653A UNLABELED IN ACETONE()	
State or local regulations	U.S. - Massachusetts - Right To Know List U.S. - New Jersey - Right to Know Hazardous Substance List U.S. - Pennsylvania - RTK (Right to Know) List

ACETONE UNLABELED (67-64-1)				
U.S. - California - Proposition 65 - Carcinogens List	U.S. - California - Proposition 65 - Developmental Toxicity	U.S. - California - Proposition 65 - Reproductive Toxicity - Female	U.S. - California - Proposition 65 - Reproductive Toxicity - Male	No significant risk level (NSRL)
No	No	No	No	

ACETONE UNLABELED (67-64-1)	
State or local regulations	
U.S. - Massachusetts - Right To Know List U.S. - New Jersey - Right to Know Hazardous Substance List U.S. - Pennsylvania - RTK (Right to Know) List	

SECTION 16: Other information

Other information : This product is not radioactive. The data given for this product are those of the corresponding unlabeled compound, unless specifically indicated otherwise. Health and safety data for labeled compounds are generally not available, but are assumed to be similar or identical to the corresponding unlabeled compound.

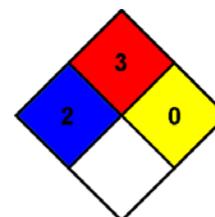
Full text of R-, H- and EUH-statements:

Eye Irrit. 2	Serious eye damage/eye irritation, Category 2
Flam. Liq. 2	Flammable liquids, Category 2
Skin Irrit. 2	Skin corrosion/irritation, Category 2
STOT SE 3	Specific target organ toxicity — Single exposure, Category 3, Narcosis
STOT SE 3	Specific target organ toxicity — Single exposure, Category 3, Respiratory tract irritation
H225	Highly flammable liquid and vapour
H315	Causes skin irritation
H319	Causes serious eye irritation
H335	May cause respiratory irritation
H336	May cause drowsiness or dizziness
R11	Highly flammable
R36	Irritating to eyes
R36/37/38	Irritating to eyes, respiratory system and skin
R37	Irritating to respiratory system
R66	Repeated exposure may cause skin dryness or cracking
R67	Vapours may cause drowsiness and dizziness
F	Highly flammable
Xi	Irritant

NFPA health hazard : 2 - Materials that, under emergency conditions, can cause temporary incapacitation or residual injury.

NFPA fire hazard : 3 - Liquids and solids (including finely divided suspended solids) that can be ignited under almost all ambient temperature conditions.

NFPA reactivity : 0 - Material that in themselves are normally stable, even under fire conditions.



HMIS III Rating

Health : 2 Moderate Hazard - Temporary or minor injury may occur

Flammability : 3 Serious Hazard

Physical : 0 Minimal Hazard

CIL Mixture SDS

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product