

**Product name:** InfinityLab LC Installation Standard Kit  
**Part no.:** 5191-4548

This product is composed of the following:

### Kit Components, Reagents

Box/Module Part number	Box/Module Name	Kit Component Part Number	Kit Component Name	Qty Units	GHS
-	-	5191-4547-1	InfinityLab LC Performance Checkout Std	1	Yes
-	-	5191-4549-1	LCMS Grade Formic Acid	1	Yes

Article SDSs, if maintained, are available on [www.agilent.com](http://www.agilent.com). We recommend using the article product code when searching. SDSs are only available for a limited set of countries.

### Transport Information for the Kit:

**Dangerous Goods classification for:** 5191-4548

DOT	IMDG	IATA
UN3316, Chemical kit, 9, II	UN3316, CHEMICAL KIT, 9, II	UN3316, Chemical kit, 9, II

De minimis quantities

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SDSs for each individual Kit component follow this cover sheet.

# SAFETY DATA SHEET

LCMS Grade Formic Acid

## Section 1. Identification

**GHS product identifier** : LCMS Grade Formic Acid

**Part no.** : 5191-4549-1

### Relevant identified uses of the substance or mixture and uses advised against

**Identified uses** : Reagents and Standards for Analytical Chemistry Laboratory Use  
2 x 1 ml

**Supplier/Manufacturer** : Agilent Technologies, Inc.  
5301 Stevens Creek Blvd  
Santa Clara, CA 95051, USA  
800-227-9770

**Emergency telephone number (with hours of operation)** : CHEMTREC®: 1-800-424-9300

## Section 2. Hazards identification

**OSHA/HCS status** : This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

### Classification of the substance or mixture

H226 FLAMMABLE LIQUIDS - Category 3  
H302 ACUTE TOXICITY (oral) - Category 4  
H331 ACUTE TOXICITY (inhalation) - Category 3  
H314 SKIN CORROSION - Category 1A  
H318 SERIOUS EYE DAMAGE - Category 1

### GHS label elements

**Hazard pictograms** :



**Signal word** : Danger

**Hazard statements** : H226 - Flammable liquid and vapor.  
H302 - Harmful if swallowed.  
H314 - Causes severe skin burns and eye damage.  
H331 - Toxic if inhaled.  
Corrosive to the respiratory tract.

### Precautionary statements

**Prevention**

: P280 - Wear protective gloves, protective clothing and eye or face protection.  
P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.  
P261 - Avoid breathing vapor.  
P270 - Do not eat, drink or smoke when using this product.  
P264 - Wash thoroughly after handling.

## Section 2. Hazards identification

**Response** : P304 + P340, P310 - IF INHALED: Remove person to fresh air and keep comfortable for breathing. Immediately call a POISON CENTER or doctor.  
 P301 + P310, P330, P331 - IF SWALLOWED: Immediately call a POISON CENTER or doctor. Rinse mouth. Do NOT induce vomiting.  
 P303 + P361 + P353, P310 - IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water. Immediately call a POISON CENTER or doctor.  
 P363 - Wash contaminated clothing before reuse.  
 P305 + P351 + P338, P310 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor.

**Storage** : Not applicable.

**Disposal** : P501 - Dispose of contents and container in accordance with all local, regional, national and international regulations.

**Supplemental label elements** : Keep container tightly closed. Do not breathe vapor or spray. Do not taste or swallow. Use only with adequate ventilation. Wash thoroughly after handling.

### Other hazards

**Hazards not otherwise classified** : Causes severe digestive tract burns.

**Hazards identified when used** : No known significant effects or critical hazards.

## Section 3. Composition/information on ingredients

**Substance/mixture** : Substance

Ingredient name	Synonyms	%	Identifiers
Formic acid	Formic acid	100	CAS: 64-18-6

Any concentration shown as a range is to protect confidentiality or is due to batch variation.

**There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified and hence require reporting in this section.**

Occupational exposure limits, if available, are listed in Section 8.

## Section 4. First aid measures

### Description of necessary first aid measures

**Eye contact** : Get medical attention immediately. Call a poison center or physician. Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 10 minutes. Chemical burns must be treated promptly by a physician.

**Inhalation** : Get medical attention immediately. Call a poison center or physician. Remove victim to fresh air and keep at rest in a position comfortable for breathing. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

**Skin contact** : Get medical attention immediately. Call a poison center or physician. Wash contaminated skin with soap and water. Remove contaminated clothing and shoes. Wash contaminated clothing thoroughly with water before removing it, or wear gloves. Continue to rinse for at least 10 minutes. Chemical burns must be treated promptly by a physician. Wash clothing before reuse. Clean shoes thoroughly before reuse.

## Section 4. First aid measures

- Ingestion** : Get medical attention immediately. Call a poison center or physician. Wash out mouth with water. Remove dentures if any. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. Do not induce vomiting unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Chemical burns must be treated promptly by a physician. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

### Most important symptoms/effects, acute and delayed

#### Potential acute health effects

- Eye contact** : Causes serious eye damage.
- Inhalation** : Toxic if inhaled. Corrosive to the respiratory tract. Causes burns.
- Skin contact** : Causes severe burns.
- Ingestion** : Severely corrosive to the digestive tract. Causes severe burns. May cause burns to mouth, throat and stomach. Harmful if swallowed.

#### Over-exposure signs/symptoms

- Eye contact** : Adverse symptoms may include the following:  
pain  
watering  
redness
- Inhalation** : Adverse symptoms may include the following:  
respiratory tract irritation  
coughing
- Skin contact** : Adverse symptoms may include the following:  
pain or irritation  
redness  
blistering may occur
- Ingestion** : Adverse symptoms may include the following:  
stomach pains

### Indication of immediate medical attention and special treatment needed, if necessary

- Notes to physician** : Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
- Specific treatments** : No specific treatment.
- Protection of first-aiders** : No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

See toxicological information (Section 11)

## Section 5. Fire-fighting measures

### Extinguishing media

- Suitable extinguishing media** : Use dry chemical, CO<sub>2</sub>, water spray (fog) or foam.
- Unsuitable extinguishing media** : Do not use water jet.

## Section 5. Fire-fighting measures

- Specific hazards arising from the chemical** : Flammable liquid and vapor. Runoff to sewer may create fire or explosion hazard. In a fire or if heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion. The vapor/gas is heavier than air and will spread along the ground. Vapors may accumulate in low or confined areas or travel a considerable distance to a source of ignition and flash back.
- Hazardous thermal decomposition products** : Decomposition products may include the following materials:  
carbon dioxide  
carbon monoxide
- Special protective actions for fire-fighters** : Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training. Move containers from fire area if this can be done without risk. Use water spray to keep fire-exposed containers cool.
- Special protective equipment for fire-fighters** : Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

## Section 6. Accidental release measures

### Personal precautions, protective equipment and emergency procedures

- For non-emergency personnel** : No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Shut off all ignition sources. No flares, smoking or flames in hazard area. Do not breathe vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.
- For emergency responders** : If specialized clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".

- Environmental precautions** : Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

### Methods and materials for containment and cleaning up

- Methods for cleaning up** : Stop leak if without risk. Move containers from spill area. Use spark-proof tools and explosion-proof equipment. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

## Section 7. Handling and storage

### Precautions for safe handling

- Protective measures** : Put on appropriate personal protective equipment (see Section 8). Do not get in eyes or on skin or clothing. Do not breathe vapor or mist. Do not ingest. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Do not enter storage areas and confined spaces unless adequately ventilated. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Store and use away from heat, sparks, open flame or any other ignition source. Use explosion-proof electrical (ventilating, lighting and material handling) equipment. Use only non-sparking tools. Take precautionary measures against electrostatic discharges. Empty containers retain product residue and can be hazardous. Do not reuse container.
- Advice on general occupational hygiene** : Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

## Section 7. Handling and storage

**Conditions for safe storage, including any incompatibilities** : Store in accordance with local regulations. Store in a segregated and approved area. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Store locked up. Eliminate all ignition sources. Separate from oxidizing materials. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.

## Section 8. Exposure controls/personal protection

### Control parameters

### Occupational exposure limits

Ingredient name	Exposure limits
Formic acid	<p><b>NIOSH REL (United States, 10/2020)</b>  TWA 10 hours: 5 ppm.  TWA 10 hours: 9 mg/m<sup>3</sup>.</p> <p><b>CAL OSHA PEL (United States, 1/2025)</b>  STEL 15 minutes: 19 mg/m<sup>3</sup>.  STEL 15 minutes: 10 ppm.  TWA 8 hours: 9 mg/m<sup>3</sup>.  TWA 8 hours: 5 ppm.</p> <p><b>OSHA PEL (United States, 5/2018)</b>  TWA 8 hours: 5 ppm.  TWA 8 hours: 9 mg/m<sup>3</sup>.</p> <p><b>OSHA PEL 1989 (United States, 3/1989)</b>  TWA 8 hours: 5 ppm.  TWA 8 hours: 9 mg/m<sup>3</sup>.</p> <p><b>ACGIH TLV (United States, 1/2024)</b>  TWA 8 hours: 5 ppm.</p>

### Biological exposure indices

No exposure indices known.

**Appropriate engineering controls** : Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits. The engineering controls also need to keep gas, vapor or dust concentrations below any lower explosive limits. Use explosion-proof ventilation equipment.

**Environmental exposure controls** : Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

### Individual protection measures

**Hygiene measures** : Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

## Section 8. Exposure controls/personal protection

- Eye/face protection** : Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: chemical splash goggles and/or face shield. If inhalation hazards exist, a full-face respirator may be required instead.
- Skin protection**
- Hand protection** : Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated.
- Body protection** : Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. When there is a risk of ignition from static electricity, wear anti-static protective clothing. For the greatest protection from static discharges, clothing should include anti-static overalls, boots and gloves.
- Other skin protection** : Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
- Respiratory protection** : Based on the hazard and potential for exposure, select a respirator that meets the appropriate standard or certification. Respirators must be used according to a respiratory protection program to ensure proper fitting, training, and other important aspects of use.

## Section 9. Physical and chemical properties

The conditions of measurement of all properties are at standard temperature and pressure unless otherwise indicated.

### Appearance

- Physical state** : Liquid.
- Color** : Colorless.
- Odor** : Pungent.
- Odor threshold** : Not available.
- pH** : Not available.
- Melting point/freezing point** : 4°C (39.2°F) [OECD 102]
- Boiling point or initial boiling point and boiling range** : 100.23°C (212.4°F) [OECD 103]
- Flash point** : Closed cup: 49.5°C (121.1°F) [DIN EN ISO 13736]
- Evaporation rate** : 1.14 (butyl acetate = 1)
- Flammability** : Not applicable.
- Lower and upper explosion limit/flammability limit** : Lower: 18%  
Upper: 51%
- Vapor pressure** : 4.3 kPa (32.03522 mm Hg) [room temperature] [EU A.4]  
17.4 kPa (130.51 mm Hg) [50°C (122°F)]
- Relative vapor density** : 1.6 [Air = 1]
- Relative density** : 1.2
- Density** : 1.22 g/cm<sup>3</sup> [20°C (68°F)]



## Section 9. Physical and chemical properties

Solubility(ies)

: MediaResultmethanolSolublediethyl etherSolubleacetoneSolublerwaterSoluble

Miscible with water

: Yes.

Partition coefficient: n-octanol/water

: -2.3 [OECD 107]

Auto-ignition temperature

: 434°C (813.2°F)

Decomposition temperature

: 150 to 300°C (302 to 572°F)

Heat of combustion

: -4756670 J/kg

Viscosity

: Dynamic (room temperature): 1.8 mPa·s (1.8 cP) [OECD 114]  
Kinematic (room temperature): 1.47 mm²/s (1.47 cSt) [OECD 114]  
Kinematic (40°C (104°F)): 1.02 mm²/s (1.02 cSt) [OECD 114]

Particle characteristics

Median particle size

: Not applicable.

## Section 10. Stability and reactivity

<b>Reactivity</b>	:	No specific test data related to reactivity available for this product or its ingredients.
<b>Chemical stability</b>	:	The product is stable.
<b>Possibility of hazardous reactions</b>	:	Under normal conditions of storage and use, hazardous reactions will not occur.
<b>Conditions to avoid</b>	:	Avoid all possible sources of ignition (spark or flame). Do not pressurize, cut, weld, braze, solder, drill, grind or expose containers to heat or sources of ignition. Do not allow vapor to accumulate in low or confined areas.
<b>Incompatible materials</b>	:	Reactive or incompatible with the following materials: oxidizing materials Reactive or incompatible with the following materials: metals and alkalis. Slightly reactive or incompatible with the following materials: acids.
<b>Hazardous decomposition products</b>	:	Under normal conditions of storage and use, hazardous decomposition products should not be produced.

## Section 11. Toxicological information

### Information on toxicological effects

#### Acute toxicity

Product/ingredient name	Result	
Formic acid	Rat - Oral - LD50	730 mg/kg
	Rat - Inhalation - LC50 Vapor	7400 mg/m <sup>3</sup> [4 hours]
<b>Conclusion/Summary [Product]</b>	:	Not available.

#### Skin corrosion/irritation

<b>Conclusion/Summary [Product]</b>	:	Not available.
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## Section 11. Toxicological information

### Serious eye damage/eye irritation

**Conclusion/Summary** : Not available.  
**[Product]**

### Respiratory corrosion/irritation

**Conclusion/Summary** : Not available.  
**[Product]**

### Respiratory or skin sensitization

#### **Skin**

**Conclusion/Summary** : Not available.  
**[Product]**

#### **Respiratory**

**Conclusion/Summary** : Not available.  
**[Product]**

### Germ cell mutagenicity

**Conclusion/Summary** : Not available.  
**[Product]**

### Carcinogenicity

Not available.

**Conclusion/Summary** : Not available.  
**[Product]**

### Reproductive toxicity

**Conclusion/Summary** : Not available.  
**[Product]**

### Specific target organ toxicity (single exposure)

Not available.

### Specific target organ toxicity (repeated exposure)

Not available.

### Aspiration hazard

Not available.

**Information on the likely routes of exposure** : Routes of entry anticipated: Oral, Dermal, Inhalation, Eyes.

### Potential acute health effects

**Eye contact** : Causes serious eye damage.

**Inhalation** : Toxic if inhaled. Corrosive to the respiratory tract. Causes burns.

**Skin contact** : Causes severe burns.

**Ingestion** : Severely corrosive to the digestive tract. Causes severe burns. May cause burns to mouth, throat and stomach. Harmful if swallowed.

## Section 11. Toxicological information

### Symptoms related to the physical, chemical and toxicological characteristics

- Eye contact** : Adverse symptoms may include the following:  
pain  
watering  
redness
- Inhalation** : Adverse symptoms may include the following:  
respiratory tract irritation  
coughing
- Skin contact** : Adverse symptoms may include the following:  
pain or irritation  
redness  
blistering may occur
- Ingestion** : Adverse symptoms may include the following:  
stomach pains

### Delayed and immediate effects and also chronic effects from short and long term exposure

#### Short term exposure

- Potential immediate effects** : Not available.
- Potential delayed effects** : Not available.

#### Long term exposure

- Potential immediate effects** : Not available.
- Potential delayed effects** : Not available.

### Potential chronic health effects

- Conclusion/Summary [Product]** : Not available.
- General** : No known significant effects or critical hazards.
- Carcinogenicity** : No known significant effects or critical hazards.
- Mutagenicity** : No known significant effects or critical hazards.
- Reproductive toxicity** : No known significant effects or critical hazards.

### Numerical measures of toxicity

#### Acute toxicity estimates

Product/ingredient name	Oral (mg/kg)	Dermal (mg/kg)	Inhalation (gases) (ppm)	Inhalation (vapors) (mg/l)	Inhalation (dusts and mists) (mg/l)
Formic acid	730	N/A	N/A	7.4	N/A

## Section 12. Ecological information

### Toxicity

- |                                     |                            |                       |
|-------------------------------------|----------------------------|-----------------------|
| <b>Product/ingredient name</b>      | <b>Result</b>              |                       |
| Formic acid                         | Acute - NOEC - Fresh water | ≥100 mg/l [21 days]   |
|                                     | Acute - EC50 - Fresh water | 151.2 mg/l [48 hours] |
| <b>Conclusion/Summary [Product]</b> | : Not available.           |                       |

## Section 12. Ecological information

### Persistence and degradability

**Conclusion/Summary [Product]** : Not available.

Product/ingredient name	Aquatic half-life	Photolysis	Biodegradability
Formic acid	-	-	Readily

### Bioaccumulative potential

Product/ingredient name	LogP <sub>ow</sub>	BCF	Potential
Formic acid	-2.3	-	Low

### Mobility in soil

**Soil/Water partition coefficient** : 5.39642 Koc

**Other adverse effects** : No known significant effects or critical hazards.

## Section 13. Disposal considerations

**Disposal methods** : The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Vapor from product residues may create a highly flammable or explosive atmosphere inside the container. Do not cut, weld or grind used containers unless they have been cleaned thoroughly internally. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

### RCRA Toxic hazardous waste "U" List

Ingredient	CAS #	Status	Reference number
Formic acid (C,T)	64-18-6	Listed	U123

## Section 14. Transport information

**DOT / TDG / Mexico / IMDG / IATA** : Not regulated.

### Additional information

**Remarks:** De minimis quantities

**Special precautions for user** : **Transport within user's premises:** always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.

**Transport in bulk according to IMO instruments** : Not available.

## Section 15. Regulatory information

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

**U.S. Federal regulations** : **Clean Water Act (CWA) 311:** Formic acid

#### TSCA 12(b) - Chemical export notification

Not applicable.

**Clean Air Act Section 112 (b) Hazardous Air Pollutants (HAPs)** : Not listed

**Clean Air Act Section 602 Class I Substances** : Not listed

**Clean Air Act Section 602 Class II Substances** : Not listed

**DEA List I Chemicals (Precursor Chemicals)** : Not listed

**DEA List II Chemicals (Essential Chemicals)** : Not listed

#### SARA 302/304

##### Composition/information on ingredients

No products were found.

**SARA 304 RQ** : Not applicable.

#### SARA 311/312

**Classification** : FLAMMABLE LIQUIDS - Category 3  
ACUTE TOXICITY (oral) - Category 4  
ACUTE TOXICITY (inhalation) - Category 3  
SKIN CORROSION - Category 1A  
SERIOUS EYE DAMAGE - Category 1  
HNOC - Corrosive to digestive tract [severe]

##### Composition/information on ingredients

Name	%	Classification
Formic acid	100	FLAMMABLE LIQUIDS - Category 3 ACUTE TOXICITY (oral) - Category 4 ACUTE TOXICITY (inhalation) - Category 3 SKIN CORROSION - Category 1A SERIOUS EYE DAMAGE - Category 1 HNOC - Corrosive to digestive tract [severe]

#### SARA 313

	Product name	CAS number	%
<b>Form R - Reporting requirements</b>	Formic acid	64-18-6	100
<b>Supplier notification</b>	Formic acid	64-18-6	100

SARA 313 notifications must not be detached from the SDS and any copying and redistribution of the SDS shall include copying and redistribution of the notice attached to copies of the SDS subsequently redistributed.

### State regulations

**Massachusetts** : This material is listed.

**New York** : This material is listed.

**New Jersey** : This material is listed.

**Pennsylvania** : This material is listed.

**California Prop. 65**

## Section 15. Regulatory information

This product does not require a Safe Harbor warning under California Prop. 65.

### International regulations

#### Chemical Weapon Convention List Schedules I, II & III Chemicals

Not listed.

#### Montreal Protocol

Not listed.

#### Stockholm Convention on Persistent Organic Pollutants

Not listed.

#### Rotterdam Convention on Prior Informed Consent (PIC)

Not listed.

#### UNECE Aarhus Protocol on POPs and Heavy Metals

Not listed.

### Inventory list

<b>Australia</b>	: This material is listed or exempted.
<b>Canada</b>	: This material is listed or exempted.
<b>China</b>	: This material is listed or exempted.
<b>Japan</b>	: <b>Japan inventory (CSCL)</b> : This material is listed or exempted. <b>Japan inventory (ISHL)</b> : This material is listed or exempted.
<b>New Zealand</b>	: This material is listed or exempted.
<b>Philippines</b>	: This material is listed or exempted.
<b>Republic of Korea</b>	: This material is listed or exempted.
<b>Taiwan</b>	: This material is listed or exempted.
<b>Thailand</b>	: This material is listed or exempted.
<b>Turkey</b>	: This material is listed or exempted.
<b>United States</b>	: This material is active or exempted.
<b>Viet Nam</b>	: This material is listed or exempted.

## Section 16. Other information

### Procedure used to derive the classification

Classification	Justification
FLAMMABLE LIQUIDS - Category 3	Expert judgment
ACUTE TOXICITY (oral) - Category 4	Expert judgment
ACUTE TOXICITY (inhalation) - Category 3	On basis of test data
SKIN CORROSION - Category 1A	Expert judgment
SERIOUS EYE DAMAGE - Category 1	Expert judgment

### History

<b>Date of issue/Date of revision</b>	: 06/30/2025
<b>Date of previous issue</b>	: No previous validation
<b>Version</b>	: 1

## Section 16. Other information

### Key to abbreviations

: ATE = Acute Toxicity Estimate  
BCF = Bioconcentration Factor  
DOT = Department of Transportation  
GHS = Globally Harmonized System of Classification and Labelling of Chemicals  
IATA = International Air Transport Association  
IBC = Intermediate Bulk Container  
IMDG = International Maritime Dangerous Goods  
IMO = International Maritime Organization  
LogPow = logarithm of the octanol/water partition coefficient  
MARPOL = International Convention for the Prevention of Pollution From Ships, 1973  
as modified by the Protocol of 1978. ("Marpol" = marine pollution)  
N/A = Not available  
SGG = Segregation Group  
TDG = Transportation of Dangerous Goods  
UN = United Nations

Indicates information that has changed from previously issued version.

### Notice to reader

**Disclaimer:** The information contained in this document is based on Agilent's state of knowledge at the time of preparation. No warranty as to its accurateness, completeness or suitability for a particular purpose is expressed or implied.

# SAFETY DATA SHEET

InfinityLab LC Performance Checkout Std

## Section 1. Identification

**GHS product identifier** : InfinityLab LC Performance Checkout Std  
**Part no.** : 5191-4547-1

### Relevant identified uses of the substance or mixture and uses advised against

**Identified uses** : Reagents and Standards for Analytical Chemistry Laboratory Use  
 2 x 0.5 ml

**Supplier/Manufacturer** : Agilent Technologies, Inc.  
 5301 Stevens Creek Blvd  
 Santa Clara, CA 95051, USA  
 800-227-9770

**Emergency telephone number (with hours of operation)** : CHEMTREC®: 1-800-424-9300

## Section 2. Hazards identification

**OSHA/HCS status** : This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

### Classification of the substance or mixture

H225 FLAMMABLE LIQUIDS - Category 2  
 H301 ACUTE TOXICITY (oral) - Category 3  
 H311 ACUTE TOXICITY (dermal) - Category 3  
 H331 ACUTE TOXICITY (inhalation) - Category 3  
 H351 CARCINOGENICITY - Category 2  
 H360 TOXIC TO REPRODUCTION - Category 1B  
 H370 SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 1  
 H400 AQUATIC HAZARD (ACUTE) - Category 1  
 H410 AQUATIC HAZARD (LONG-TERM) - Category 1

### GHS label elements

**Hazard pictograms** :



**Signal word** : Danger

**Hazard statements** : H225 - Highly flammable liquid and vapor.  
 H301 + H311 + H331 - Toxic if swallowed, in contact with skin or if inhaled.  
 H351 - Suspected of causing cancer.  
 H360 - May damage fertility or the unborn child.  
 H370 - Causes damage to organs.  
 H410 - Very toxic to aquatic life with long lasting effects.

### Precautionary statements



## Section 2. Hazards identification

- Prevention** :
- P201 - Obtain special instructions before use.
  - P280 - Wear protective gloves, protective clothing and eye or face protection.
  - P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
  - P273 - Avoid release to the environment.
  - P260 - Do not breathe vapor.
  - P270 - Do not eat, drink or smoke when using this product.
  - P264 - Wash thoroughly after handling.
- Response** :
- P391 - Collect spillage.
  - P308 + P311 - IF exposed or concerned: Call a POISON CENTER or doctor.
  - P304 + P340, P311 - IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER or doctor.
  - P301 + P310 - IF SWALLOWED: Immediately call a POISON CENTER or doctor.
  - P302 + P312, P352 - IF ON SKIN: Call a POISON CENTER or doctor if you feel unwell. Wash with plenty of water.
  - P361 + P364 - Take off immediately all contaminated clothing and wash it before reuse.
- Storage** :
- Not applicable.
- Disposal** :
- P501 - Dispose of contents and container in accordance with all local, regional, national and international regulations.

### Other hazards

**Hazards not otherwise classified** : None known.

**Hazards identified when used** : No known significant effects or critical hazards.

## Section 3. Composition/information on ingredients

**Substance/mixture** : Mixture

Ingredient name	Synonyms	%	Identifiers
Methanol	methyl alcohol	≥65 - ≤85	CAS: 67-56-1
bis(2-Ethylhexyl) phthalate	-	≥0.1 - ≤1	CAS: 117-81-7

Any concentration shown as a range is to protect confidentiality or is due to batch variation.

**There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified and hence require reporting in this section.**

Occupational exposure limits, if available, are listed in Section 8.

## Section 4. First aid measures

### Description of necessary first aid measures

- Eye contact** :
- Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 10 minutes. Get medical attention. If necessary, call a poison center or physician.
- Inhalation** :
- Remove victim to fresh air and keep at rest in a position comfortable for breathing. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Get medical attention. If necessary, call a poison center or physician. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

## Section 4. First aid measures

- Skin contact** : Wash with plenty of soap and water. Remove contaminated clothing and shoes. Wash contaminated clothing thoroughly with water before removing it, or wear gloves. Continue to rinse for at least 10 minutes. Get medical attention. If necessary, call a poison center or physician. Wash clothing before reuse. Clean shoes thoroughly before reuse.
- Ingestion** : Get medical attention immediately. Call a poison center or physician. Wash out mouth with water. Remove dentures if any. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. Do not induce vomiting unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

### Most important symptoms/effects, acute and delayed

#### Potential acute health effects

- Eye contact** : No known significant effects or critical hazards.
- Inhalation** : Toxic if inhaled. Causes damage to organs following a single exposure if inhaled.
- Skin contact** : Toxic in contact with skin. Causes damage to organs following a single exposure in contact with skin.
- Ingestion** : Toxic if swallowed. Causes damage to organs following a single exposure if swallowed.

#### Over-exposure signs/symptoms

- Eye contact** : No specific data.
- Inhalation** : Adverse symptoms may include the following:  
reduced fetal weight  
increase in fetal deaths  
skeletal malformations
- Skin contact** : Adverse symptoms may include the following:  
reduced fetal weight  
increase in fetal deaths  
skeletal malformations
- Ingestion** : Adverse symptoms may include the following:  
reduced fetal weight  
increase in fetal deaths  
skeletal malformations

### Indication of immediate medical attention and special treatment needed, if necessary

- Notes to physician** : Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
- Specific treatments** : No specific treatment.
- Protection of first-aiders** : No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

See toxicological information (Section 11)

## Section 5. Fire-fighting measures

### Extinguishing media

**Suitable extinguishing media** : Use dry chemical, CO<sub>2</sub>, water spray (fog) or foam.

**Unsuitable extinguishing media** : Do not use water jet.

**Specific hazards arising from the chemical** : Highly flammable liquid and vapor. Runoff to sewer may create fire or explosion hazard. In a fire or if heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion. This material is very toxic to aquatic life with long lasting effects. Fire water contaminated with this material must be contained and prevented from being discharged to any waterway, sewer or drain.

**Hazardous thermal decomposition products** : Decomposition products may include the following materials:  
carbon dioxide  
carbon monoxide  
Formaldehyde.

**Special protective actions for fire-fighters** : Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training. Move containers from fire area if this can be done without risk. Use water spray to keep fire-exposed containers cool.

**Special protective equipment for fire-fighters** : Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

## Section 6. Accidental release measures

### Personal precautions, protective equipment and emergency procedures

**For non-emergency personnel** : No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Shut off all ignition sources. No flares, smoking or flames in hazard area. Do not breathe vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.

**For emergency responders** : If specialized clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".

**Environmental precautions** : Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air). Water polluting material. May be harmful to the environment if released in large quantities. Collect spillage.

### Methods and materials for containment and cleaning up

**Methods for cleaning up** : Stop leak if without risk. Move containers from spill area. Use spark-proof tools and explosion-proof equipment. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

## Section 7. Handling and storage

### Precautions for safe handling

## Section 7. Handling and storage

<b>Protective measures</b>	: Put on appropriate personal protective equipment (see Section 8). Avoid exposure - obtain special instructions before use. Avoid exposure during pregnancy. Do not handle until all safety precautions have been read and understood. Do not get in eyes or on skin or clothing. Do not breathe vapor or mist. Do not ingest. Avoid release to the environment. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Do not enter storage areas and confined spaces unless adequately ventilated. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Store and use away from heat, sparks, open flame or any other ignition source. Use explosion-proof electrical (ventilating, lighting and material handling) equipment. Use only non-sparking tools. Take precautionary measures against electrostatic discharges. Empty containers retain product residue and can be hazardous. Do not reuse container.
<b>Advice on general occupational hygiene</b>	: Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.
<b>Conditions for safe storage, including any incompatibilities</b>	: Store in accordance with local regulations. Store in a segregated and approved area. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Store locked up. Eliminate all ignition sources. Separate from oxidizing materials. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.

## Section 8. Exposure controls/personal protection

### Control parameters

### Occupational exposure limits

<b>Ingredient name</b>	<b>Exposure limits</b>
Methanol	<p><b>NIOSH REL (United States, 10/2020)</b>  Absorbed through skin.  TWA 10 hours: 200 ppm.  TWA 10 hours: 260 mg/m<sup>3</sup>.  STEL 15 minutes: 250 ppm.  STEL 15 minutes: 325 mg/m<sup>3</sup>.</p> <p><b>CAL OSHA PEL (United States, 1/2025)</b>  Absorbed through skin.  STEL 15 minutes: 325 mg/m<sup>3</sup>.  STEL 15 minutes: 250 ppm.  C: 1000 ppm.  TWA 8 hours: 260 mg/m<sup>3</sup>.  TWA 8 hours: 200 ppm.</p> <p><b>OSHA PEL (United States, 5/2018)</b>  TWA 8 hours: 200 ppm.  TWA 8 hours: 260 mg/m<sup>3</sup>.</p> <p><b>OSHA PEL 1989 (United States, 3/1989)</b>  Absorbed through skin.  TWA 8 hours: 200 ppm.  TWA 8 hours: 260 mg/m<sup>3</sup>.  STEL 15 minutes: 250 ppm.  STEL 15 minutes: 325 mg/m<sup>3</sup>.</p> <p><b>ACGIH TLV (United States, 1/2024)</b>  Absorbed through skin.  TWA 8 hours: 200 ppm.</p>

## Section 8. Exposure controls/personal protection

bis(2-Ethylhexyl) phthalate	<p>TWA 8 hours: 262 mg/m<sup>3</sup>.          STEL 15 minutes: 250 ppm.          STEL 15 minutes: 328 mg/m<sup>3</sup>.</p> <p><b>NIOSH REL (United States, 10/2020)</b> NIA.          TWA 10 hours: 5 mg/m<sup>3</sup>.          STEL 15 minutes: 10 mg/m<sup>3</sup>.</p> <p><b>CAL OSHA PEL (United States, 1/2025)</b>          TWA 8 hours: 5 mg/m<sup>3</sup>.</p> <p><b>OSHA PEL (United States, 5/2018)</b>          TWA 8 hours: 5 mg/m<sup>3</sup>.</p> <p><b>OSHA PEL 1989 (United States, 3/1989)</b>          TWA 8 hours: 5 mg/m<sup>3</sup>.          STEL 15 minutes: 10 mg/m<sup>3</sup>.</p> <p><b>ACGIH TLV (United States, 1/2024)</b> A3.          Absorbed through skin.          TWA 8 hours: 0.1 mg/m<sup>3</sup>.</p>
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### Biological exposure indices

Ingredient name	Exposure indices
Methanol	<p><b>ACGIH BEI (United States, 1/2024)</b>          BEI: 15 mg/l, methanol [in urine]. Sampling time: end of shift.</p>
bis(2-Ethylhexyl) phthalate	<p><b>ACGIH BEI (United States, 1/2024)</b>          BEI: 25 µg/g creatinine, mono(2-ethyl-5-carboxypentyl)phthalate [in urine]. Sampling time: end of shift.          BEI: 15 µg/g creatinine, mono(2-ethyl-5-oxohexyl)phthalate [in urine]. Sampling time: end of shift.          BEI: 20 µg/g creatinine, mono(2-ethyl-5-hydroxyhexyl)phthalate [in urine]. Sampling time: end of shift.          BEI: 5 µg/g creatinine, mono(2-ethylhexyl)phthalate [in urine]. Sampling time: end of shift.</p>

### Appropriate engineering controls

- : Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits. The engineering controls also need to keep gas, vapor or dust concentrations below any lower explosive limits. Use explosion-proof ventilation equipment.

### Environmental exposure controls

- : Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

### Individual protection measures

#### Hygiene measures

- : Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

## Section 8. Exposure controls/personal protection

- Eye/face protection** : Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: safety glasses with side-shields.
- Skin protection**
- Hand protection** : Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated.
- Body protection** : Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. When there is a risk of ignition from static electricity, wear anti-static protective clothing. For the greatest protection from static discharges, clothing should include anti-static overalls, boots and gloves.
- Other skin protection** : Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
- Respiratory protection** : Based on the hazard and potential for exposure, select a respirator that meets the appropriate standard or certification. Respirators must be used according to a respiratory protection program to ensure proper fitting, training, and other important aspects of use.

## Section 9. Physical and chemical properties

The conditions of measurement of all properties are at standard temperature and pressure unless otherwise indicated.

### Appearance

- Physical state** : Liquid.
- Color** : Not available.
- Odor** : Not available.
- Odor threshold** : Not available.
- pH** : Not available.
- Melting point/freezing point** : Not available.
- Boiling point or initial boiling point and boiling range** : Not available.
- Flash point** : Closed cup: -18 to 23°C (-0.4 to 73.4°F)
- Evaporation rate** : Not available.
- Flammability** : Not applicable.
- Lower and upper explosion limit/flammability limit** : Not available.
- Vapor pressure** : 10.9 kPa (81.505859 mm Hg) [Calculated]
- Relative vapor density** : Not available.
- Relative density** : Not available.
- Solubility(ies)** :
- | Media | Result  |
|-------|---------|
| water | Soluble |
- Miscible with water** : Yes.

## Section 9. Physical and chemical properties

**Partition coefficient: n-octanol/water** : Not applicable.

<b>Auto-ignition temperature</b>	<b>Ingredient name</b>	<b>°C</b>	<b>°F</b>	<b>Method</b>
	Methanol	455	851	DIN 51794

**Decomposition temperature** : Not available.

**Viscosity** : Dynamic (room temperature): Not available.  
Kinematic (room temperature): Not available.  
Kinematic (40°C (104°F)): Not available.

### Particle characteristics

**Median particle size** : Not applicable.

## Section 10. Stability and reactivity

**Reactivity** : No specific test data related to reactivity available for this product or its ingredients.

**Chemical stability** : The product is stable.

**Possibility of hazardous reactions** : Under normal conditions of storage and use, hazardous reactions will not occur.

**Conditions to avoid** : Avoid all possible sources of ignition (spark or flame). Do not pressurize, cut, weld, braze, solder, drill, grind or expose containers to heat or sources of ignition.

**Incompatible materials** : Reactive or incompatible with the following materials:  
oxidizing materials

**Hazardous decomposition products** : Under normal conditions of storage and use, hazardous decomposition products should not be produced.

## Section 11. Toxicological information

### Information on toxicological effects

#### Acute toxicity

<b>Product/ingredient name</b>	<b>Result</b>	
Methanol	Rabbit - Dermal - LD50	15800 mg/kg
	Rat - Oral - LD50	5600 mg/kg
	Rat - Inhalation - LC50 Vapor	145000 ppm [1 hours]
	Rat - Inhalation - LC50 Vapor	64000 ppm [4 hours]
	Rat - Inhalation - LC50 Vapor	83.84 mg/l [4 hours]
	Rat - Inhalation - LC50 Vapor	189.95 mg/l [1 hours]
bis(2-Ethylhexyl) phthalate	Rabbit - Dermal - LD50	25 g/kg
	Rat - Oral - LD50	30 g/kg

**Conclusion/Summary [Product]** : Not available.

#### Skin corrosion/irritation

<b>Product/ingredient name</b>	<b>Result</b>	
Methanol	Rabbit - Skin - Moderate irritant	Duration of treatment/ exposure: 24 hours
bis(2-Ethylhexyl) phthalate	Rabbit - Skin - Mild irritant	Duration of treatment/ exposure: 24 hours



## Section 11. Toxicological information

**Conclusion/Summary [Product]** : Repeated exposure may cause skin dryness or cracking.

**Ingredient name**

Methanol

**Conclusion/Summary**

Repeated exposure may cause skin dryness or cracking.

### Serious eye damage/eye irritation

Methanol

**Result**

Rabbit - Eyes - Moderate irritant

Duration of treatment/  
exposure: 24 hours

Rabbit - Eyes - Moderate irritant

-

Rabbit - Eyes - Severe irritant

-

bis(2-Ethylhexyl) phthalate

Rabbit - Eyes - Mild irritant

Duration of treatment/  
exposure: 24 hours

Rabbit - Eyes - Mild irritant

-

**Conclusion/Summary [Product]** : May cause eye irritation.

**Ingredient name**

Methanol

**Conclusion/Summary**

May cause eye irritation.

### Respiratory corrosion/irritation

**Product/ingredient name**

**Conclusion/Summary [Product]** : Not available.

### Respiratory or skin sensitization

**Skin**

**Conclusion/Summary [Product]** : Not available.

**Respiratory**

**Conclusion/Summary [Product]** : Not available.

### Germ cell mutagenicity

**Conclusion/Summary [Product]** : Not available.

### Carcinogenicity

Not available.

**Conclusion/Summary [Product]** : Not available.

**Classification**

Product/ingredient name	OSHA	IARC	NTP
bis(2-Ethylhexyl) phthalate	-	2B	Reasonably anticipated to be a human carcinogen.

### Reproductive toxicity

**Conclusion/Summary [Product]** : Repeated or prolonged exposure to the substance can produce reproductive system damage.

**Ingredient name**

**Conclusion/Summary**

## Section 11. Toxicological information

methanol

Repeated or prolonged exposure to the substance can produce reproductive system damage.

### Specific target organ toxicity (single exposure)

#### Product/ingredient name

Methanol

#### Result

SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 1

### Specific target organ toxicity (repeated exposure)

Not available.

### Aspiration hazard

Not available.

### Information on the likely routes of exposure

: Routes of entry anticipated: Oral, Dermal, Inhalation, Eyes.

### Potential acute health effects

#### Eye contact

: No known significant effects or critical hazards.

#### Inhalation

: Toxic if inhaled. Causes damage to organs following a single exposure if inhaled.

#### Skin contact

: Toxic in contact with skin. Causes damage to organs following a single exposure in contact with skin.

#### Ingestion

: Toxic if swallowed. Causes damage to organs following a single exposure if swallowed.

### Symptoms related to the physical, chemical and toxicological characteristics

#### Eye contact

: No specific data.

#### Inhalation

: Adverse symptoms may include the following:  
reduced fetal weight  
increase in fetal deaths  
skeletal malformations

#### Skin contact

: Adverse symptoms may include the following:  
reduced fetal weight  
increase in fetal deaths  
skeletal malformations

#### Ingestion

: Adverse symptoms may include the following:  
reduced fetal weight  
increase in fetal deaths  
skeletal malformations

### Delayed and immediate effects and also chronic effects from short and long term exposure

#### Short term exposure

##### Potential immediate effects

: Not available.

##### Potential delayed effects

: Not available.

#### Long term exposure

##### Potential immediate effects

: Not available.

##### Potential delayed effects

: Not available.

### Potential chronic health effects

## Section 11. Toxicological information

**Conclusion/Summary [Product]** : Not available.

**General** : No known significant effects or critical hazards.

**Carcinogenicity** : Suspected of causing cancer. Risk of cancer depends on duration and level of exposure.

**Mutagenicity** : No known significant effects or critical hazards.

**Reproductive toxicity** : May damage fertility or the unborn child.

### Numerical measures of toxicity

#### Acute toxicity estimates

Product/ingredient name	Oral (mg/kg)	Dermal (mg/kg)	Inhalation (gases) (ppm)	Inhalation (vapors) (mg/l)	Inhalation (dusts and mists) (mg/l)
InfinityLab LC Performance Checkout Std	131.9	395.8	N/A	4.0	N/A
Methanol	100	300	N/A	3	N/A
bis(2-Ethylhexyl) phthalate	30000	25000	N/A	N/A	N/A

**Other information** : Adverse symptoms may include the following: blurred or double vision, Eye contact can result in corneal damage or blindness. Repeated or prolonged exposure to the substance can produce liver damage. Narcotic effect. May cause nervous system disturbances.

## Section 12. Ecological information

### Toxicity

Product/ingredient name	Result
Methanol	Acute - LC50 - Marine water 2500 mg/l [48 hours] Acute - LC50 - Fresh water 290 mg/l [96 hours] Chronic - NOEC - Marine water 9.96 mg/l [96 hours]
bis(2-Ethylhexyl) phthalate	Acute - EC50 - Marine water 2736 mg/l [96 hours] Acute - LC50 - Fresh water 37.95 mg/l [96 hours] Chronic - NOEC - Fresh water 0.077 mg/l [21 days] Chronic - NOEC - Fresh water 0.1 µg/l [28 days] Acute - EC50 6.02 mg/l [96 hours] Acute - LC50 - Marine water 1.04 ng/l [48 hours] Chronic - NOEC - Marine water 1.2 µg/l [4 days]

**Conclusion/Summary [Product]** : Not available.

### Persistence and degradability

Product/ingredient name	Result
bis(2-Ethylhexyl) phthalate	OECD [Ready Biodegradability - CO <sub>2</sub> Evolution Test] 82% [29 days] - Readily Aerobic - 20.3 mg/l - Activated sludge OECD [Ready Biodegradability - CO <sub>2</sub> Evolution Test] 82% [29 days] - Readily Aerobic - 20.3 mg/l

**Conclusion/Summary [Product]** : Not available.

Product/ingredient name	Aquatic half-life	Photolysis	Biodegradability
Methanol	-	-	Readily

## Section 12. Ecological information

### Bioaccumulative potential

Product/ingredient name	LogP <sub>ow</sub>	BCF	Potential
Methanol	-0.77	<10	Low
bis(2-Ethylhexyl) phthalate	7.6	1380	High

### Mobility in soil

**Soil/Water partition coefficient** : Not available.

**Other adverse effects** : No known significant effects or critical hazards.

## Section 13. Disposal considerations

**Disposal methods** : The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Vapor from product residues may create a highly flammable or explosive atmosphere inside the container. Do not cut, weld or grind used containers unless they have been cleaned thoroughly internally. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

### RCRA Toxic hazardous waste "U" List

Ingredient	CAS #	Status	Reference number
Methanol (I)	67-56-1	Listed	U154

## Section 14. Transport information

**DOT / TDG / Mexico / IMDG / IATA** : Not regulated.

### Additional information

**Remarks:** De minimis quantities

**Special precautions for user** : **Transport within user's premises:** always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.

**Transport in bulk according to IMO instruments** : Not available.

## Section 15. Regulatory information

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

**U.S. Federal regulations** : TSCA 5(a)2 final significant new use rules: di-n-pentyl phthalate  
Clean Water Act (CWA) 307: bis(2-Ethylhexyl) phthalate; Diethyl phthalate

### TSCA 12(b) - Chemical export notification

Not applicable.

**Clean Air Act Section 112 (b) Hazardous Air Pollutants (HAPs)** : Listed

**Clean Air Act Section 602 Class I Substances** : Not listed

**Clean Air Act Section 602 Class II Substances** : Not listed

**DEA List I Chemicals (Precursor Chemicals)** : Not listed

**DEA List II Chemicals (Essential Chemicals)** : Not listed

### SARA 302/304

#### Composition/information on ingredients

No products were found.

**SARA 304 RQ** : Not applicable.

### SARA 311/312

**Classification** : FLAMMABLE LIQUIDS - Category 2  
ACUTE TOXICITY (oral) - Category 3  
ACUTE TOXICITY (dermal) - Category 3  
ACUTE TOXICITY (inhalation) - Category 3  
CARCINOGENICITY - Category 2  
TOXIC TO REPRODUCTION - Category 1B  
SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 1

#### Composition/information on ingredients

Name	%	Classification
Methanol	≥65 - ≤85	FLAMMABLE LIQUIDS - Category 2 ACUTE TOXICITY (oral) - Category 3 ACUTE TOXICITY (dermal) - Category 3 ACUTE TOXICITY (inhalation) - Category 3 SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 1
bis(2-Ethylhexyl) phthalate	≥0.1 - ≤1	EYE IRRITATION - Category 2B CARCINOGENICITY - Category 2 TOXIC TO REPRODUCTION - Category 1B

### SARA 313

	Product name	CAS number	%
<b>Form R - Reporting requirements</b>	Methanol	67-56-1	≥65 - ≤85
	bis(2-Ethylhexyl) phthalate	117-81-7	≥0.1 - ≤1
<b>Supplier notification</b>	Methanol	67-56-1	≥65 - ≤85
	bis(2-Ethylhexyl) phthalate	117-81-7	≥0.1 - ≤1

SARA 313 notifications must not be detached from the SDS and any copying and redistribution of the SDS shall include copying and redistribution of the notice attached to copies of the SDS subsequently redistributed.

### State regulations

**Massachusetts** : The following components are listed: METHANOL

**New York** : The following components are listed: Methanol

## Section 15. Regulatory information

**New Jersey** : The following components are listed: METHYL ALCOHOL; BIS(2-ETHYLHEXYL) PHTHALATE

**Pennsylvania** : The following components are listed: METHANOL

### California Prop. 65

**⚠ WARNING:** This product can expose you to chemicals including Di(2-ethylhexyl)phthalate, which is known to the State of California to cause cancer and birth defects or other reproductive harm. This product can expose you to chemicals including Benzophenone, which is known to the State of California to cause cancer, and Methanol and Di-n-hexyl phthalate, which are known to the State of California to cause birth defects or other reproductive harm. For more information go to [www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov).

Ingredient name	No significant risk level	Maximum acceptable dosage level
Methanol	-	Yes.
Di(2-ethylhexyl)phthalate	Yes.	Yes.
Di-n-hexyl phthalate	-	Yes.
Benzophenone	-	-

### International regulations

#### Chemical Weapon Convention List Schedules I, II & III Chemicals

Not listed.

#### Montreal Protocol

Not listed.

#### Stockholm Convention on Persistent Organic Pollutants

Not listed.

#### Rotterdam Convention on Prior Informed Consent (PIC)

Not listed.

#### UNECE Aarhus Protocol on POPs and Heavy Metals

Not listed.

### Inventory list

**Australia** : Not determined.

**Canada** : Not determined.

**China** : All components are listed or exempted.

**Japan** : **Japan inventory (CSCL):** Not determined.  
**Japan inventory (ISHL):** Not determined.

**New Zealand** : All components are listed or exempted.

**Philippines** : Not determined.

**Republic of Korea** : All components are listed or exempted.

**Taiwan** : All components are listed or exempted.

**Thailand** : Not determined.

**Turkey** : Not determined.

**United States** : All components are active or exempted.

**Viet Nam** : All components are listed or exempted.

## Section 16. Other information

### Procedure used to derive the classification

Classification	Justification
FLAMMABLE LIQUIDS - Category 2	Expert judgment
ACUTE TOXICITY (oral) - Category 3	Calculation method
ACUTE TOXICITY (dermal) - Category 3	Calculation method
ACUTE TOXICITY (inhalation) - Category 3	Calculation method
CARCINOGENICITY - Category 2	Calculation method
TOXIC TO REPRODUCTION - Category 1B	Calculation method
SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 1	Calculation method
AQUATIC HAZARD (ACUTE) - Category 1	Calculation method
AQUATIC HAZARD (LONG-TERM) - Category 1	Calculation method

### History

<b>Date of issue/Date of revision</b>	: 06/30/2025
<b>Date of previous issue</b>	: No previous validation
<b>Version</b>	: 1
<b>Key to abbreviations</b>	: ATE = Acute Toxicity Estimate BCF = Bioconcentration Factor DOT = Department of Transportation GHS = Globally Harmonized System of Classification and Labelling of Chemicals IATA = International Air Transport Association IBC = Intermediate Bulk Container IMDG = International Maritime Dangerous Goods IMO = International Maritime Organization LogPow = logarithm of the octanol/water partition coefficient MARPOL = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution) N/A = Not available SGG = Segregation Group TDG = Transportation of Dangerous Goods UN = United Nations

Indicates information that has changed from previously issued version.

### Notice to reader

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