

Safety Data Sheet

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH)
Classification according to Regulation (EC) No. 1272/2008 [CLP]

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

Product identifier

Product code 4404307
Product name BTL,HI-DI FORMAMIDE 5ML
Unique Formula Identifier (UFI) Not Applicable
Chemical Name Not Applicable
REACH registration number Formamide : 01-2119496064-35-XXXX

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

Relevant identified uses For in vitro diagnostic use
Use Description Code SU22 - Professional uses: Public domain (administration, education, entertainment, services, craftsmen), PROC15 - Use as laboratory reagent, PC21 - Laboratory chemicals, SU20 - Health services
Uses advised against Not for consumer use.

Details of the supplier of the safety data sheet

Manufacturer / Supplier

LIFE TECHNOLOGIES EUROPE BV
KWARTSWEG 2
2665 NN BLEISWIJK
NETHERLANDS
31-(0)180 392 400
Email: MSDS@lifetech.com

Life Technologies Limited
3 Fountain Drive
Inchinnan Business Park
Paisley
PA4 9RF, UK
+44 (0)141 814 6100

Emergency telephone number

24 hour Emergency Response for Hazardous Materials [or Dangerous Goods] Incident. Spill, Leak, Fire, Exposure, or Accident. Call CHEMTREC Within the USA + Canada: 1-800-424-9300 and 1-703-527-3887
Outside the USA + Canada: 1-703-741-5970

Revision number 7
Product code 4404307

Revision date 19-Jun-2023
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Country Specific Emergency Number (if available):

CHEMTREC Ireland (Dublin)

+(353)-19014670 (Greeting Language: English and Irish)

CHEMTREC UK (London)

+(44)-870-8200418 (Greeting Language: English)

SECTION 2: Hazards identification**Classification of the substance or mixture****Classification according to Regulation (EC) No. 1272/2008 [CLP]****Physical hazards**

Not Hazardous

Health hazards

Carcinogenicity	Category 2
Reproductive Toxicity	Category 1B
Specific target organ toxicity - Repeated exposure	Category 2

Environmental hazards

Not Hazardous

Additional information

No information available

Label elements**Labelling according to Regulation (EC) No 1272/2008 [CLP]****Hazard pictograms****Signal Word**

Danger

Hazard Statements

H351 - Suspected of causing cancer if swallowed

H360 - May damage fertility or the unborn child if swallowed

H373 - May cause damage to organs through prolonged or repeated exposure

Precautionary Statements**Prevention**

P201 - Obtain special instructions before use

P202 - Do not handle until all safety precautions have been read and understood

P260 - Do not breathe dust/fume/gas/mist/vapours/spray

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

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Response

P308 + P313 - IF exposed or concerned: Get medical advice/attention

P314 - Get medical advice/attention if you feel unwell

Storage

Not Applicable

Disposal

P501 - Dispose of contents/ container to an approved waste disposal plant

Other hazards

Not Applicable

SECTION 3: Composition/information on ingredients

Mixtures

Chemical Name	CAS No	EC No.	Weight-%	REACH registration number	Classification according to Regulation (EC) No. 1272/2008 [CLP]
Formamide	75-12-7	200-842-0	95-100	01-2119496064-35-XXXX	Repr. 1B - H360 Carc. 2 - H351 STOT RE 2 - H373

Chemical Name	Specific concentration limit (SCL)	M-Factor	Acute Toxicity Estimate
Formamide	-	-	-

SECTION 4: First aid measures

Description of first aid measures**Skin contact**

Wash off immediately with plenty of water for at least 15 minutes. Remove and wash contaminated clothing and gloves, including the inside, before re-use. Immediate medical attention is required.

Eye contact

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Immediate medical attention is required.

Ingestion

Never give anything by mouth to an unconscious person. Do not induce vomiting without medical advice. If swallowed, rinse mouth with water (only if the person is conscious). Risk of serious damage to the lungs (by aspiration). Get medical attention if symptoms occur.

Inhalation

Remove to fresh air. If not breathing, give artificial respiration. If symptoms persist, call a doctor.

Notes to Physician

Treat symptomatically.

Most important symptoms and effects, both acute and delayed

H360 - May damage fertility or the unborn child if swallowed H351 - Suspected of causing cancer if swallowed H373 - May cause damage to organs through prolonged or repeated exposure

Indication of any immediate medical attention and special treatment needed

IF exposed or concerned: Get medical advice/attention. Get medical advice/attention if you feel unwell.

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SECTION 5: Firefighting measures

Extinguishing media

Suitable extinguishing media

Foam. Dry powder. Dry chemical. Carbon dioxide (CO₂).
Water spray.

Unsuitable extinguishing media

No information available.

Special hazards arising from the substance or mixture

No data

Advice for firefighters

Wear self-contained breathing apparatus and protective suit.

SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

Avoid exposure to vapour

Avoid breathing vapours or mists

Ensure adequate ventilation

Avoid contact with skin, eyes or clothing

Use personal protection equipment

See section 8 for more information

Environmental precautions

No special environmental precautions required.

Methods and material for containment and cleaning up

Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Sweep up and shovel into suitable containers for disposal. Clean contaminated surface thoroughly.

Reference to other sections

See section 8 for more information.

SECTION 7: Handling and storage

Precautions for safe handling

Always wear recommended Personal Protective Equipment. Wash hands before breaks and immediately after handling the product. Do not get in eyes, on skin, or on clothing. Avoid breathing vapours or mists. If during normal use the material presents a respiratory hazard, use adequate ventilation and/or wear appropriate respirator. See section 8 for more information.

Conditions for safe storage, including any incompatibilities

Keep in properly labelled containers. Keep in a dry, cool and well-ventilated place. Store in accordance with local regulations. Keep away from combustible material.

Storage Conditions

Freezer (-25 to -15 C)

Specific end use(s)

For in vitro diagnostic use.

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SECTION 8: Exposure controls/personal protection

Control parameters

Chemical Name	EU OEL (TWA)	EU OEL (STEL)	EU Skin Notation
Formamide 75-12-7	None	None	None

Chemical Name	Austria	Belgium (TWA)	Czech Republic
Formamide 75-12-7	9 ppm 16 mg/m ³	10 ppm 18 mg/m ³	None

Chemical Name	Denmark (TWA)	Finland OEL (TWA)	France OEL (VME)
Formamide 75-12-7	10 ppm 18 mg/m ³	10 ppm 19 mg/m ³	20 ppm 30 mg/m ³

Chemical Name	Germany OEL (TWA)	Ireland (TWA)	Italy OEL (TWA)
Formamide 75-12-7	None	10 ppm 18 mg/m ³	None

Chemical Name	Lithuania OEL (TWA)	Netherlands OEL (MAC)	Norway
Formamide 75-12-7	10 ppm 20 mg/m ³	None	10 ppm TWA 18 mg/m ³ TWA 20 ppm STEL 27 mg/m ³ STEL

Chemical Name	Poland	Portugal	Spain OEL (TWA)
Formamide 75-12-7	23 mg/m ³ TWA Skin Notation	10 ppm TWA skin - potential for cutaneous exposure	10 ppm 19 mg/m ³

Chemical Name	Sweden - Occupational Exposure Limits - TLVs (LLVs)	Switzerland	United Kingdom
Formamide 75-12-7	10 ppm TLV NGV; 20 mg/m ³ TLV NGV	10 ppm TWA 18 mg/m ³ TWA	20 ppm TWA; 37 mg/m ³ TWA

Engineering Measures Ensure adequate ventilation, especially in confined areas.

Exposure controls

Personal protection equipment

Respiratory protection In case of insufficient ventilation wear respirators and components tested and approved under appropriate government standards.

Hand protection Glove material: Nitrile rubber with thickness (mm) :5 Break through time (hours) :>1
Recommended glove type has not been tested for use with this product.
Information is based on professional knowledge

Eye protection Tight sealing safety goggles.

Skin and Body Protection Wear laboratory coat for body protection.

Hygiene Measures Handle in accordance with good industrial hygiene and safety practice.

Environmental exposure controls
No special environmental precautions required.

SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state	liquid	
Colour	No data	
Odour	No data	
Molecular Weight	No data	
Melting point / melting range	°C No data	°F No data
Boiling point / boiling range	°C No data	°F No data
Flammability (solid, gas)	No data	
Lower explosion limit	No data	
Upper explosion limit	No data	
Flash point	°C No data	°F No data
Autoignition Temperature	°C No data	°F No data
Decomposition temperature	°C No data	°F No data
Evaporation rate	No data	
Viscosity	No data	
Solubility	No data	
Partition coefficient: n-octanol/water	No data	
Vapour Pressure	No data	
Specific gravity	No data	
Relative density	No data	
Vapour density	No data	
Explosive properties	No data	
Oxidising properties	No data	
Particle characteristics	No data	

Other information

Information with regards to physical hazard classes

No information available

Other safety characteristics

No information available

SECTION 10: Stability and reactivity

Reactivity	None known.
Chemical stability	Stable under normal conditions.
Possibility of hazardous reactions	Hazardous reaction has not been reported.
Conditions to avoid	No information available.
Incompatible materials	No information available.
Hazardous decomposition products	No data available.

SECTION 11: Toxicological information

Information on hazard classes as defined in Regulation (EC) No 1272/2008

Chemical Name	Oral LD50	Dermal LD50	Inhalation LC50
Formamide	3200 mg/kg	13500 mg/kg	3900 ppm/6H

Principal Routes of Exposure

Skin corrosion/irritation	Data are conclusive but insufficient for classification
Serious eye damage/irritation	Data are conclusive but insufficient for classification
Respiratory or skin sensitisation	Data are conclusive but insufficient for classification
Specific target organ toxicity (STOT) – single exposure	Data are conclusive but insufficient for classification
Specific target organ toxicity (STOT) – repeated exposure	Target organ(s) : Cardiovascular System Hematopoietic System
Carcinogenicity	Contains a known or suspected carcinogen
Germ cell mutagenicity	Data are conclusive but insufficient for classification
Reproductive Toxicity	May cause adverse reproductive effects - such as birth defect, miscarriages, or infertility
Aspiration Hazard	Data are conclusive but insufficient for classification

Information on other hazards

Endocrine disrupting properties

No information available

Other information

No information available

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SECTION 12: Ecological information

Toxicity

The environmental impact of this product has not been fully investigated.

Chemical Name	Toxicity to algae	Toxicity to daphnia and other aquatic invertebrates	Toxicity to fish	Microtox Data	log Pow
Formamide	Desmodesmus subspicatus EC50>500 mg/L (72 h) Desmodesmus subspicatus EC50>500 mg/L (96 h)	Daphnia magna EC50>500 mg/L (48 h)	No data available	No data available	logPow-0.82

Persistence and degradability No information available.

Bioaccumulative potential No information available.

Mobility in soil No information available.

Results of PBT and vPvB assessment

No information available.

Endocrine disrupting properties

This product does not contain any known or suspected endocrine disruptors

Other adverse effects

No information available.

SECTION 13: Disposal considerations

Waste treatment methods

The generation of waste should be avoided or minimized wherever possible. Empty containers or liners may retain some product residues. This material and its container must be disposed of in accordance with approved disposal technique. Disposal of this product, its solutions or of any by-products, shall comply with the requirements of all applicable local, regional or national/federal regulations.

SECTION 14: Transport information

IATA / ADR / DOT-US / IMDG

Not regulated in the meaning of transport regulations

UN number or ID number	Not Applicable
UN proper shipping name	Not Applicable
Transport hazard class(es)	Not Applicable
Packing group	Not Applicable

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Special precautions for user

Not Applicable

Maritime transport in bulk according to IMO instruments

Not Applicable.

SECTION 15: Regulatory information

Safety, health and environmental regulations/legislation specific for the substance or mixture**Substances of Very High Concern**

Chemical Name	Weight-%	EU - REACH (1907/2006) - Article 59(1) - Candidate List of Substances for Eventual Inclusion in Annex XIV
Formamide	95-100	Reason for inclusion Toxic for reproduction, Article 57c

Substance subject to authorisation per REACH Annex XIV

None

Restricted substances under EC 1907/2006, Annex XVII

Chemical Name	Weight-%	EU - REACH (1907/2006) - Annex XVII - Restrictions on Certain Dangerous Substances
Formamide	95-100	Use restricted. See item 30. Use restricted. See item 75.

Regulation (EC) No 649/2012 (Rotterdam Convention - export/import of dangerous chemicals)**Regulation (EU) No 2019/1021 (Stockholm Convention – persistent organic pollutants)****EU - Substances Depleting the Ozone layer (1005/2009)****German Water hazard classes (Wassergefährdungsklassen)**

Chemical Name	Weight-%	Water hazard class (WGK)
Formamide	95-100	hazard class 1 - slightly hazardous to water

Other International Inventories

Chemical Name	EINECS (European Union)	ELINCS (European List of Notified Chemical Substances)	ENCS (Japan)	PICCS (Philippines)
Formamide	Listed	-	Listed	Listed

Chemical Name	AICS (Australia)	South Korea	Canada (DSL)	NDSL

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		(KECL)		
Formamide	Listed	Listed	Listed	-

Chemical safety assessment

No Chemical safety assessment has been carried out.

SECTION 16: Other information

Reason for revision Update according to Commission Regulation EU No. 2020/878
Revision number 7
Revision date 19-Jun-2023

References

- ECHA: <http://echa.europa.eu/>
- TOXNET: <http://toxnet.nlm.nih.gov/>
- eChemPortal: <http://www.echemportal.org/>
- LOLI database: <https://www.chemadvisor.com/loli-database>

Classification and procedure used to derive the classification for mixtures according to Regulation (EC) 1272/2008 [CLP]:

Carcinogenicity	Category 2	Calculation method
Reproductive Toxicity	Category 1B	Calculation method
Specific target organ toxicity - Repeated exposure	Category 2	Calculation method

Abbreviations and acronyms

TWA - Time-Weighted Average
OELs - Occupational Exposure Limits
STEL - Short Term Exposure Limit
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
KECL - Korean Existing and Evaluated Chemical Substances
ENCS - Japan Existing and New Chemical Substances
IECSC - China Inventory of Existing Chemical Substances
PICCS - Philippines Inventory of Chemicals and Chemical Substances
AICS - Australian Inventory of Chemical Substances
NZIoC - New Zealand Inventory of Chemicals
EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances
TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
CEPA - Canadian Environmental Protection Act
EPA - Environmental Protection Agency
OSHA - Occupational Safety and Health Administration of the US Department of Labour
IATA - International Air Transport Association
DOT - Department of Transportation
IMDG - International Maritime Dangerous Goods
ACGIH - American Conference of Governmental Industrial Hygienists
NIOSH - National Institute for Occupational Safety and Health
AIHA - American Industrial Hygiene Association
HMIS - Department of Defense Hazardous Materials Information System
NTP - National Toxicology Program
IARC - International Agency for Research on Cancer

This safety data sheet complies with the requirements of Regulation (EC) No. 1907/2006 COMMISSION REGULATION (EU) 2020/878 amending Annex II to Regulation (EC) No 1907/2006.

"The above information was acquired by diligent search and/or investigation and the recommendations are based on prudent application of professional judgment. The information shall not be taken as being all inclusive and is to be used only as a guide. All materials and mixtures may present unknown hazards and should be used with caution. Since the Company cannot control the actual methods, volumes, or conditions of use, the Company shall not be held liable for any damages or losses resulting from the handling or from contact with the product as described herein. THE INFORMATION IN THIS SDS DOES NOT CONSTITUTE A WARRANTY, EXPRESSED OR

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IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE"

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Certificate of Registration

QUALITY MANAGEMENT SYSTEM - ISO 9001:2015

This is to certify that:

MarqMetrix
2157 North Northlake Way
Suite 240
Seattle
Washington
98103
USA

Holds Certificate No:

FM 705363

and operates a Quality Management System which complies with the requirements of ISO 9001:2015 for the following scope:

The Design, Development, Manufacture and test of Raman spectroscopy systems and accessories for commercial distribution.

For and on behalf of BSI:

Carlos Pitanga, Chief Operating Officer Assurance – Americas

Original Registration Date: 2019-05-07

Effective Date: 2022-05-07

Latest Revision Date: 2022-04-01

Expiry Date: 2025-05-06

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