

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

#### 1.1. Product identifier

Product form : Mixture  
 Trade name : LIQUID DESCALER XDL  
 Product code : XDL  
 UFI Number : D682-21XK-600F-J5JE  
 Product group : Trade product

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

##### 1.2.1. Relevant identified uses

Main use category : Professional use  
 Industrial/Professional use spec : For professional use only  
 Use of the substance/mixture : Washing and cleaning product.. Removes lime-scale from shower heads, kettles and boilers, etc

##### 1.2.2. Uses advised against

No additional information available

#### 1.3. Details of the supplier of the safety data sheet

Bio-Productions  
 72 Victoria Road  
 Burgess Hill - United Kingdom  
 T 0044 (0) 1444 244000 - F 0044 (0) 1444 244999  
[technical@bio-productions.com](mailto:technical@bio-productions.com) - [www.bio-productions.com](http://www.bio-productions.com)

#### 1.4. Emergency telephone number

Emergency number : 0044 (0) 1444 244000 (office hours only)

Country	Organisation/Company	Address	Emergency number	Comment
United Kingdom	National Poisons Information Service (Birmingham Centre) City Hospital, Guy's & St Thomas' Hospital Trust	Dudley Road B18 7QH Birmingham	0844 892 0111 (UK only, Monday to Friday, 08.00 to 18.00 hours)	

### SECTION 2: Hazards identification

#### 2.1. Classification of the substance or mixture

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

Skin corrosion/irritation, Category 1A H314

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

##### Adverse physicochemical, human health and environmental effects

Causes severe skin burns and eye damage.

#### 2.2. Label elements

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

Hazard pictograms (CLP) :



GHS05

Signal word (CLP) : Danger  
 Hazard statements (CLP) : H314 - Causes severe skin burns and eye damage  
 Precautionary statements (CLP) : P102 - Keep out of reach of children  
 P260 - Do not breathe fume, mist, spray, vapours  
 P264 - Wash hands, forearms and face thoroughly after handling  
 P280 - Wear protective gloves, protective clothing, eye protection, face protection  
 P301+P330+P331 - IF SWALLOWED: rinse mouth. Do NOT induce vomiting  
 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

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P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing  
P310 - Immediately call a POISON CENTER, a doctor  
P501 - Dispose of contents/container to an approved waste disposal plant

Additional labelling information

Contains; Phosphoric acid 20%

### 2.3. Other hazards

No additional information available

## SECTION 3: Composition/information on ingredients

### 3.1. Substance

Not applicable

### 3.2. Mixture

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
phosphoric acid ... %, orthophosphoric acid ... %	(CAS No) 7664-38-2 (EC no) 231-633-2 (EC index no) 015-011-00-6 (REACH-no) 01-2119485924-24	10 - 20	Skin Corr. 1B, H314
(2-methoxymethylethoxy)propanol [DPGME] substance with a Community workplace exposure limit	(CAS No) 34590-94-8 (EC no) 252-104-2	1 - 3	Not classified

#### Specific concentration limits:

Name	Product identifier	Specific concentration limits
phosphoric acid ... %, orthophosphoric acid ... %	(CAS No) 7664-38-2 (EC no) 231-633-2 (EC index no) 015-011-00-6 (REACH-no) 01-2119485924-24	( 10 =<C < 25) Skin Irrit. 2, H315 ( 10 =<C < 25) Eye Irrit. 2, H319 (C >= 25) Skin Corr. 1B, H314

Full text of H-statements: see section 16

## SECTION 4: First aid measures

### 4.1. Description of first aid measures

- First-aid measures general : Call a physician immediately.
- First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing.
- First-aid measures after skin contact : Rinse skin with water/shower. Remove/Take off immediately all contaminated clothing. Call a physician immediately.
- First-aid measures after eye contact : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Call a physician immediately.
- First-aid measures after ingestion : Rinse mouth. Do not induce vomiting. Call a physician immediately.

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

- Symptoms/injuries after skin contact : Burns.
- Symptoms/injuries after eye contact : Serious damage to eyes.
- Symptoms/injuries after ingestion : Burns.

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

Treat symptomatically.

## SECTION 5: Firefighting measures

### 5.1. Extinguishing media

- Suitable extinguishing media : The product is not flammable. Use extinguishing agent suitable for surrounding fire. Water spray. Dry powder. Foam. Carbon dioxide.

### 5.2. Special hazards arising from the substance or mixture

- Hazardous decomposition products in case of fire : Toxic fumes may be released.

### 5.3. Advice for firefighters

- Protection during firefighting : Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.

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### SECTION 6: Accidental release measures

#### 6.1. Personal precautions, protective equipment and emergency procedures

##### 6.1.1. For non-emergency personnel

Emergency procedures : Ventilate spillage area. Avoid contact with skin and eyes. Do not breathe fume, mist, spray, vapours.

##### 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

Avoid release to the environment.

#### 6.3. Methods and material for containment and cleaning up

Methods for cleaning up : Take up liquid spill into absorbent material.  
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

Precautions for safe handling : Ensure good ventilation of the work station. Avoid contact with skin and eyes. Do not breathe spray, mist, fume. Wear personal protective equipment.  
Hygiene measures : Wash contaminated clothing before reuse. Do not eat, drink or smoke when using this product. Always wash hands after handling the product.

#### 7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Store locked up. Store in a well-ventilated place. Keep cool.

#### 7.3. Specific end use(s)

No additional information available

### SECTION 8: Exposure controls/personal protection

#### 8.1. Control parameters

(2-methoxymethylethoxy)propanol [DPGME] (34590-94-8)		
EU	Local name	(2-Methoxymethylethoxy)-propanol
EU	IOELV TWA (mg/m <sup>3</sup> )	308 mg/m <sup>3</sup>
EU	IOELV TWA (ppm)	50 ppm
EU	Notes	Skin
United Kingdom	Local name	(2-methoxymethylethoxy) propanol
United Kingdom	WEL TWA (mg/m <sup>3</sup> )	308 mg/m <sup>3</sup>
United Kingdom	WEL TWA (ppm)	50 ppm
United Kingdom	Remark (WEL)	Sk (Can be absorbed through the skin. The assigned substances are those for which there are concerns that dermal absorption will lead to systemic toxicity)
phosphoric acid ... %, orthophosphoric acid ... % (7664-38-2)		
EU	Local name	Orthophosphoric acid
EU	IOELV TWA (mg/m <sup>3</sup> )	1 mg/m <sup>3</sup>
EU	IOELV STEL (mg/m <sup>3</sup> )	2 mg/m <sup>3</sup>
United Kingdom	Local name	Orthophosphoric acid
United Kingdom	WEL TWA (mg/m <sup>3</sup> )	1 mg/m <sup>3</sup>
United Kingdom	WEL STEL (mg/m <sup>3</sup> )	2 mg/m <sup>3</sup>

#### 8.2. Exposure controls

##### Appropriate engineering controls:

Ensure good ventilation of the work station.

##### Hand protection:

Protective gloves

##### Eye protection:

Safety glasses

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### Skin and body protection:

Wear suitable protective clothing

### Respiratory protection:

In case of insufficient ventilation, wear suitable respiratory equipment

### Environmental exposure controls:

Avoid release to the environment.

## SECTION 9: Physical and chemical properties

### 9.1. Information on basic physical and chemical properties

Physical state	: Liquid
Colour	: Green.
Odour	: acidic.
Odour threshold	: No data available
pH	: 1 - 1.5
Relative evaporation rate (butyl acetate=1)	: No data available
Melting point	: Not applicable
Freezing point	: < 0 °C
Boiling point	: > 100 °C
Flash point	: No data available
Auto-ignition temperature	: No data available
Decomposition temperature	: No data available
Flammability (solid, gas)	: Not applicable
Vapour pressure	: No data available
Relative vapour density at 20 °C	: No data available
Relative density	: No data available
Solubility	: Soluble in water.
Log Pow	: 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	: No data available

### 9.2. Other information

No additional information available

## SECTION 10: Stability and reactivity

### 10.1. Reactivity

The product is non-reactive under normal conditions of use, storage and transport.

### 10.2. Chemical stability

Stable under normal conditions.

### 10.3. Possibility of hazardous reactions

----- TO BE COMPLETED -----

### 10.4. Conditions to avoid

None under recommended storage and handling conditions (see section 7).

### 10.5. Incompatible materials

Do not mix with other bleaching agents. Strong bases.

### 10.6. Hazardous decomposition products

On burning: release of carbon monoxide - carbon dioxide.

## SECTION 11: Toxicological information

### 11.1. Information on toxicological effects

Acute toxicity : Not classified

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phosphoric acid ... %, orthophosphoric acid ... % (7664-38-2)	
LD50 oral	1530 mg/kg bodyweight
LD50 dermal	2740 mg/kg bodyweight

Skin corrosion/irritation	: Causes severe skin burns and eye damage. pH: 1 - 1.5
Serious eye damage/irritation	: Serious eye damage, category 1, implicit pH: 1 - 1.5
Respiratory or skin sensitisation	: Not classified
Germ cell mutagenicity	: Not classified
Carcinogenicity	: Not classified
Reproductive toxicity	: Not classified
Specific target organ toxicity (single exposure)	: Not classified
Specific target organ toxicity (repeated exposure)	: Not classified
Aspiration hazard	: Not classified

## SECTION 12: Ecological information

### 12.1. Toxicity

phosphoric acid ... %, orthophosphoric acid ... % (7664-38-2)	
EC50 other aquatic organisms 1	> 100 mg/l EC50 waterflea (48 h)
EC50 other aquatic organisms 2	> 100 mg/l IC50 alga (72 h) mg/l

### 12.2. Persistence and degradability

LIQUID DESCALER XDL	
Persistence and degradability	The surfactant(s) contained in this preparation complies(comply) with the biodegradability criteria as laid down in Regulation (EC) No. 648/2004 on detergents. Data to support this assertion are held at the disposal of the competent authorities of the Member States and will be made available to them, at their direct request or at the request of a detergent manufacturer.

### 12.3. Bioaccumulative potential

No additional information available

### 12.4. Mobility in soil

No additional information available

### 12.5. Results of PBT and vPvB assessment

No additional information available

### 12.6. Other adverse effects

No additional information available

## SECTION 13: Disposal considerations

### 13.1. Waste treatment methods

No additional information available

## SECTION 14: Transport information

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

### 14.1. UN number

UN-No. (ADR)	: 1805
UN-No. (IMDG)	: 1805
UN-No. (IATA)	: 1805
UN-No. (ADN)	: 1805
UN-No. (RID)	: 1805

### 14.2. UN proper shipping name

Proper Shipping Name (ADR)	: PHOSPHORIC ACID, LIQUID (15-20%)
Proper Shipping Name (IMDG)	: PHOSPHORIC ACID SOLUTION (15-25%)
Proper Shipping Name (IATA)	: PHOSPHORIC ACID, SOLUTION (15-25%)
Proper Shipping Name (ADN)	: PHOSPHORIC ACID, SOLUTION (15-25%)
Proper Shipping Name (RID)	: PHOSPHORIC ACID, SOLUTION (15-25%)

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Transport document description (ADR)	: UN 1805 PHOSPHORIC ACID, LIQUID (15-20%), 8, III, (E)
Transport document description (IMDG)	: UN 1805 PHOSPHORIC ACID SOLUTION (15-25%), 8, III
Transport document description (IATA)	: UN 1805 PHOSPHORIC ACID, SOLUTION (15-25%), 8, III
Transport document description (ADN)	: UN 1805 PHOSPHORIC ACID, SOLUTION (15-25%), 8, III
Transport document description (RID)	: UN 1805 PHOSPHORIC ACID, SOLUTION (15-25%), 8, III

### 14.3. Transport hazard class(es)

#### ADR

Transport hazard class(es) (ADR)	: 8
Danger labels (ADR)	: 8



#### IMDG

Transport hazard class(es) (IMDG)	: 8
Danger labels (IMDG)	: 8



#### IATA

Transport hazard class(es) (IATA)	: 8
Hazard labels (IATA)	: 8



#### ADN

Transport hazard class(es) (ADN)	: 8
Danger labels (ADN)	: 8



#### RID

Transport hazard class(es) (RID)	: 8
Danger labels (RID)	: 8



### 14.4. Packing group

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

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Packing group (RID) : III

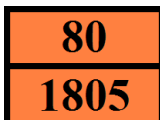
### 14.5. Environmental hazards

Dangerous for the environment : No  
Marine pollutant : No  
Other information : No supplementary information available

### 14.6. Special precautions for user

#### - Overland transport

Classification code (ADR) : C1  
Limited quantities (ADR) : 5I  
Excepted quantities (ADR) : E1  
Packing instructions (ADR) : P001, IBC03, LP01, R001  
Mixed packing provisions (ADR) : MP19  
Portable tank and bulk container instructions (ADR) : T4  
Portable tank and bulk container special provisions (ADR) : TP1  
Tank code (ADR) : L4BN  
Vehicle for tank carriage : AT  
Transport category (ADR) : 3  
Special provisions for carriage - Packages (ADR) : V12  
Hazard identification number (Kemler No.) : 80  
Orange plates :



Tunnel restriction code (ADR) : E  
EAC code : 2R

#### - Transport by sea

Special provisions (IMDG) : 223  
Limited quantities (IMDG) : 5 L  
Excepted quantities (IMDG) : E1  
Packing instructions (IMDG) : P001, LP01  
IBC packing instructions (IMDG) : IBC03  
Tank instructions (IMDG) : T4  
Tank special provisions (IMDG) : TP1  
EmS-No. (Fire) : F-A  
EmS-No. (Spillage) : S-B  
Stowage category (IMDG) : A

#### - Air transport

PCA Excepted quantities (IATA) : E1  
PCA Limited quantities (IATA) : Y841  
PCA limited quantity max net quantity (IATA) : 1L  
PCA packing instructions (IATA) : 852  
PCA max net quantity (IATA) : 5L  
CAO packing instructions (IATA) : 856  
CAO max net quantity (IATA) : 60L  
Special provisions (IATA) : A3  
ERG code (IATA) : 8L

#### - Inland waterway transport

Classification code (ADN) : C1  
Limited quantities (ADN) : 5 L  
Excepted quantities (ADN) : E1  
Carriage permitted (ADN) : T  
Equipment required (ADN) : PP, EP

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Number of blue cones/lights (ADN)	: 0
<b>- Rail transport</b>	
Classification code (RID)	: C1
Limited quantities (RID)	: 5L
Excepted quantities (RID)	: E1
Packing instructions (RID)	: P001, IBC03, LP01, R001
Mixed packing provisions (RID)	: MP19
Portable tank and bulk container instructions (RID)	: T4
Portable tank and bulk container special provisions (RID)	: TP1
Tank codes for RID tanks (RID)	: L4BN
Transport category (RID)	: 3
Special provisions for carriage – Packages (RID)	: W12
Colis express (express parcels) (RID)	: CE8
Hazard identification number (RID)	: 80

### 14.7. Transport in bulk according to Annex II of MARPOL and the IBC Code

Not applicable

## SECTION 15: Regulatory information

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

#### 15.1.1. EU-Regulations

Contains no REACH substances with Annex XVII restrictions

Contains no substance on the REACH candidate list

Contains no REACH Annex XIV substances

#### 15.1.2. National regulations

No additional information available

### 15.2. Chemical safety assessment

No chemical safety assessment has been carried out

## SECTION 16: Other information

Changes from Previous version:

- UFI number added in section 1.1
- P-Statements added in Section 2.2

Abbreviations and acronyms:

ADN	European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways
ADR	European Agreement concerning the International Carriage of Dangerous Goods by Road
ATE	Acute Toxicity Estimate
CLP	Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008
EC50	Median effective concentration
IATA	International Air Transport Association
IMDG	International Maritime Dangerous Goods
LC50	Median lethal concentration
LD50	Median lethal dose
PBT	Persistent Bioaccumulative Toxic
REACH	Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006
RID	Regulations concerning the International Carriage of Dangerous Goods by Rai
SDS	Safety Data Sheet
vPvB	Very Persistent and Very Bioaccumulative

Full text of H- and EUH-statements:

Skin Corr. 1A	Skin corrosion/irritation, Category 1A
Skin Corr. 1B	Skin corrosion/irritation, Category 1B
H314	Causes severe skin burns and eye damage



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Changes from version 1.0 = amended the concentration values of Phosphoric Acid to make all values uniform.

SDS EU (Reach Annex II) GREEN

*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*