Safety Data Sheet

SECTION 1: Identification of	the substance/mixture and of the company/undertaking
1.1. Product identifier	
Product form	: Mixture
Product name	Scum Off
Product code	: 420
1.2. Relevant identified uses of	the substance or mixture and uses advised against
Use of the substance/mixture	: Heavy Duty Foaming Cleaner
1.3. Details of the supplier of the	
MSM, Inc. 1101 E. Francisco Blvd. San Rafael, CA 94901 - USA T 415-258-0550 - F 415-258-0564	
1.4. Emergency telephone num	iber
Emergency number	: 415-258-0550
SECTION 2: Hazards identified	cation
2.1. Classification of the subst	ance or mixture
Classification (GHS-US)	
Skin Irrit. 2 H315 Eye Dam. 1 H318	
Full text of H-phrases: see section 16	
2.2. Label elements	
GHS-US labeling	
Hazard pictograms	
Signal word Hazard statements Precautionary statements	<ul> <li>Danger</li> <li>Causes skin irritation.</li> <li>Causes serious eye damage.</li> <li>Wash hands and forearms thoroughly after handling.</li> <li>Wear eye protection, protective gloves.</li> <li>If on skin: Wash with plenty of water.</li> <li>If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if presen and easy to do. Continue rinsing.</li> <li>Immediately call a POISON CENTER or doctor/physician.</li> <li>If skin irritation occurs: Get medical advice/attention.</li> </ul>
2.3. Hazard not otherwise class	Take off contaminated clothing and wash before reuse.
2.3. Hazard not otherwise class No additional information available	
2.4. Unknown acute toxicity (G	HS-US)
3.49 percent of the mixture consists of 3.49 percent of the mixture consists of	ingredient(s) of unknown acute toxicity (Oral) ingredient(s) of unknown acute toxicity (Dermal) ingredient(s) of unknown acute toxicity (Inhalation (Dust/Mist))
SECTION 3: Composition/info 3.1. Substance	ormation on ingredients
Not applicable	
(NOTE: If component displays the * (aste	risk) symbol, the following statement applies.) act concentration have been withheld as a trade secret
3.2. Mixture	

### Scum Off Safety Data Sheet

Name	Product identifier	%	Classification (GHS-US)
2-butoxyethanol	(CAS No) 111-76-2	5 - 10	Flam. Liq. 4, H227 Acute Tox. 4 (Oral), H302 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation), H331 Acute Tox. 4 (Inhalation:dust,mist), H332 Skin Irrit. 2, H315 Eye Irrit. 2A, H319
alkylated naphthalene sulfonate, sodium salt	(CAS No) Proprietary	1 - 5	Skin Irrit. 2, H315 Eye Irrit. 2A, H319 STOT RE 2, H373
trisodium orthophosphate, dodecahydrate	(CAS No) 10101-89-0	1 - 5	Skin Irrit. 2, H315 Eye Dam. 1, H318 STOT SE 3, H335
tetrasodium ethylenediaminetetracetate	(CAS No) 64-02-8	1 - 5	Acute Tox. 4 (Oral), H302 Eye Dam. 1, H318
sodium xylenesulfonate	(CAS No) 1300-72-7	1 - 5	Skin Irrit. 2, H315 STOT SE 3, H335
benzenesulfonic acid, C10-16-alkyl derivs., sodium salt	(CAS No) 68081-81-2	0.1 - 5	Acute Tox. 4 (Oral), H302 Skin Irrit. 2, H315 Eye Irrit. 2A, H319 STOT SE 3, H335

(NOTE: If component displays the \* (asterisk) symbol, the following statement applies.)

*Chemical name, CAS number and/or exact concentration have been withheld as a trace	e secret
---	----------

SECTION 4: First aid measures	
4.1. Description of first aid measures	
First-aid measures general	: Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).
First-aid measures after inhalation	: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. If you feel unwell, seek medical advice.
First-aid measures after skin contact	: If skin irritation or rash occurs: Wash with plenty of soap and water. Wash contaminated clothing before reuse. If skin irritation persists, get medical attention.
First-aid measures after eye contact	: 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/physician.
First-aid measures after ingestion	: Rinse mouth. Do NOT induce vomiting. Obtain emergency medical attention.
4.2. Most important symptoms and effe	cts, both acute and delayed
Symptoms/injuries	: Not expected to present a significant hazard under anticipated conditions of normal use. If you feel unwell, seek medical advice.
Symptoms/injuries after skin contact	: May cause moderate irritation.
Symptoms/injuries after eye contact	: Causes serious eye damage.
Symptoms/injuries after ingestion	: FOLLOWING SYMPTOMS MAY APPEAR LATER: Gastrointestinal complaints. Irritation of the gastric/intestinal mucosa. Nausea.

**4.3.** Indication of any immediate medical attention and special treatment needed No additional information available

Suitable extinguishing media Unsuitable extinguishing media	: Alcohol-resistant foam. BC powder. Carbon dioxide. Dry chemical powder. Sand/earth.
Unsuitable extinguishing media	
	: No unsuitable extinguishing media known.
5.2. Special hazards arising fr	om the substance or mixture
Reactivity	: Reacts with (strong) oxidizers and with (some) acids. Reacts with (some) halogen compounds
5.3. Advice for firefighters	
Firefighting instructions	<ul> <li>Use water spray or fog for cooling exposed containers. Exercise caution when fighting any chemical fire. Prevent fire-fighting water from entering environment.</li> </ul>
Protection during firefighting	: Do not enter fire area without proper protective equipment, including respiratory protection.
Other information	: No additional information available.

General measures	:	Isolate from fire, if	f possible, without	unnecessary risk.

### Scum Off Safety Data Sheet

6.1.1. For non-emergency personnel	
Protective equipment	: Protective goggles.
	Protective gloves.
	Protective clothing.
Emergency procedures	: Evacuate unnecessary personnel.
6.1.2. For emergency responders	
Protective equipment	: Equip cleanup crew with proper protection.
Emergency procedures	: Ventilate area.
6.2. Environmental precautions	
Prevent entry to sewers and public waters.	Notify authorities if liquid enters sewers or public waters.
6.3. Methods and material for conta	inment and cleaning up
For containment	: Contain released substance, pump into suitable containers. Plug the leak, cut off the supply.
Methods for cleaning up	: Soak up spills with inert solids, such as clay or diatomaceous earth as soon as possible. Collect spillage. Store away from other materials. Wash down leftovers with plenty of water. Wash clothing and equipment after handling.
6.4. Reference to other sections	
See Heading 8. Exposure controls and pers	sonal protection.
SECTION 7: Handling and storage	je
7.1. Precautions for safe handling	
Precautions for safe handling	: Do not get in eyes, on skin, or on clothing. Do not breathe mist, vapors. Ensure good ventilation of the work station. Observe normal hygiene standards. Provide good ventilation in process area to prevent formation of vapor. Use only outdoors or in a well-ventilated area. Use personal protective equipment as required.

Hygiene measures	: Do not eat, drink or smoke when using this product. Wash contaminated clothing before reuse. Wash hands and forearms thoroughly after handling. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work.
7.2. Conditions for safe storage, includ	ing any incompatibilities
Technical measures	: Provide local exhaust or general room ventilation. Comply with applicable regulations.

	. Trovide local exhaust of general room ventilation. Comply with applicable regulations.
Incompatible products	: Strong acids. Oxidizing agent.
Storage area	: Store in a cool, dry well-ventilated area. Keep container tightly closed when not in use.

### SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

2-butoxyethanol (111-76-2)		
ACGIH	ACGIH TWA (ppm)	20 ppm
ACGIH	ACGIH STEL (ppm)	20 ppm
OSHA	OSHA PEL (TWA) (mg/m³)	97 mg/m³
OSHA	OSHA PEL (TWA) (ppm)	20 ppm

8.2. Exposure controls	
Personal protective equipment	: Avoid all unnecessary exposure.
Hand protection	: Wear protective gloves.
Eye protection	: Chemical goggles or safety glasses.
Skin and body protection	: Wear suitable protective clothing.
Respiratory protection	: Where exposure through inhalation may occur from use, respiratory protection equipment is recommended. In case of insufficient ventilation, wear suitable respiratory equipment.
Other information	: When using, do not eat, drink or smoke.
Appropriate engineering controls	: Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

Safety Data Sheet

SECTION 9: Physical and chemical	properties
9.1. Information on basic physical and	chemical properties
Physical state	: Liquid
Color	: Clear amber
Odor	: Lemon
Odor threshold	: No data available
bH	: 12.5 - 13.5
Melting point	: No data available
Freezing point	: No data available
Boiling point	: No data available
Flash point	: > 200 °F
Relative evaporation rate (butyl acetate=1)	: No data available
Flammability (solid, gas)	: No data available
Explosive limits	: No data available
√apor pressure	: No data available
Vapor density	: No data available
Specific Gravity @ 77º F	: 1.056 - 1.076
Solubility	: Soluble in water.
Partition Coefficient n-Octanol-Water	: No data available
Auto-ignition temperature	: No data available
Decomposition temperature	: No data available
Viscosity	: No data available
9.2. Other information	
VOC content	: < 80 g/I CARB VOC
SECTION 10: Stability and reactivit	У
I0.1. Reactivity	
Reacts with (strong) oxidizers and with (some)	acids. Reacts with (some) halogen compounds.
10.2. Chemical stability	
Stable under normal conditions.	
10.3. Possibility of hazardous reactions Not established.	
10.4. Conditions to avoid Extremely high or low temperatures.	
10.5. Incompatible materials	
Strong acids. Oxidizers.	
10.6. Hazardous decomposition produc	
Carbon monoxide. Carbon dioxide. Nitrogen o	kides. Sultur oxides.
SECTION 11: Toxicological information	ation
11.1. Information on toxicological effec	

cute toxicity	: Not classified
tetrasodium ethylenediaminetetrace	etate (64-02-8)
LD50 oral rat	> 2000 mg/kg (Rat)
ATE US (oral)	500.000 mg/kg body weight
2-butoxyethanol (111-76-2)	
LD50 oral rat	530 mg/kg (Rat; Equivalent or similar to OECD 401; Literature study; 1746 mg/kg bodyweight; Rat; Experimental value)
LD50 dermal rat	> 2000 mg/kg body weight (Rat; Experimental value; OECD 402: Acute Dermal Toxicity)
LD50 dermal rabbit	435 mg/kg body weight (Rabbit; Experimental value; OECD 402: Acute Dermal Toxicity; 435 mg/kg bodyweight; Rabbit; Weight of evidence; Equivalent or similar to OECD 402)
LC50 inhalation rat (mg/l)	2.17 mg/l/4h (Rat; Experimental value; 2.35 mg/l/4h; Rat; Experimental value)
Product Codo: 420	EN (English LIS) Page 4 of 8

Safety Data Sheet

LC50 inhalation rat (ppm)       450-468.Rat; Weight of evidence         ATE US (oral)       S30.000 mg/k body weight         ATE US (ermal)       436.000 mg/k body weight         ATE US (ermal)       436.000 mg/k body weight         ATE US (termal)       436.000 mg/k body weight         ATE US (toast, nist)       2.170 mg/kh         Descenseulfonic acid, C10-16-alkyl derivs., sodium sait (68081-81-2)       ATE US (toast, nist)         ATE US (toast, nist)       2.170 mg/kh         Descenseulfonic acid, C10-16-alkyl derivs., sodium sait (68081-81-2)       ATE US (toast, nist)         ATE US (toast, nist)       2.170 mg/kh         Descenseulfonic acid, C10-16-alkyl derivs., sodium sait (68081-81-2)       ATE US (toast, nist)         ATE US (toast)       500.000 mg/k body weight         tirisodium orthophosphate, dodecabydrate (10101-89-0)       Dubo mg/k (Pact DCCD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study: >2000 mg/k body weight; Rat)         LD50 dermal rabbit       > 7440 mg/k (Rat: DecCD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study: >2000 mg/k body weight         Solium xylenesulfonate (1300-72-7)       Dibo oral rat       3346 mg/g         LD50 dermal rabbit       > 2000 mg/k body weight       Sin Corrosion/irritation         Causes skin irritation.       pH: 12.5 - 13.5       Serious eye damage.         PH: 12.5 -			
ATE US (ora)       530.000 mg/kg body weight         ATE US (demai)       435.000 mg/kg body weight         ATE US (gases)       700.000 ppmV/4h         ATE US (vapors)       2.170 mg//4h         ATE US (oral)       500.000 mg/kg body weight         ATE US (oral)       500.000 mg/kg body weight         Trisodium orthophosphate, dodecahydrate (1010-98-0)       100.000 mg/kg body weight         Itisodium orthophosphate, dodecahydrate (1010-98-0)       100.000 mg/kg body weight         LD50 oran ar tabbit       > 740 mg/kg (Rabbit)         LD50 domai rabbit       > 740.000 mg/kg body weight         LD50 domai rabbit       > 740.000 mg/kg body weight         LD50 domai rabbit       > 2.033 mg/l4h (Rat: Read-across)         ATE US (oral)       3346 mg/kg         LD50 domai rabbit       > 2000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       Serious eye damage/irritation         Causes serious eye damage.       pH	2-butoxyethanol (111-76-2)	450,496 Det: Weicht of avidence	
ATE US (dermal)       435.000 mg/kg body weight         ATE US (qases)       700.000 ppm//4h         ATE US (qayors)       2.170 mg//4h         ATE US (dust, mist)       2.170 mg//4h         ATE US (oral)       500.000 mg/kg body weight <b>trisodium orthophosphate, dodecahydrate (10101-89-0)</b> LD50 dormal rabbit       7400 mg/kg (Rat, OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study: 2200 mg/kg body weight         LD50 dormal rabbit       > 7400 mg/kg (Rabbit)         LC50 inhalation rat (mg/l)       > 0.83 mg//4h (Rat; Read-across)         ATE US (oral)       3466 mg/kg         LD50 dermal rabbit       > 7400 mg/kg body weight         sodium xylenesulfonate (1300-72-7)       LD60 oral rat         LD50 dermal rabbit       > 2000 mg/kg body weight         Skin corrosion/irritation       : Causes serious eye damage.         pH: 12.5 - 13.5       Serious eye damage/irritation         erious eye damage/irritation       : Causes serious eye damage.         pH: 12.5 - 13.5       Serious eye damage/irritation         erious eye damage/irritation       : Not classified         Carcinogenicity       : Not classified         Carcinogenicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified			
ATE US (gases)       700.000 ppm//4h         ATE US (vapors)       2.170 mg//4h         ATE US (vapors)       2.170 mg//4h         ATE US (vat, mist)       2.170 mg//4h         ATE US (oral)       500.000 mg/kg body weight         trisodium orthophosphate, dodecahydrate (10101-89-0)       100.000 mg/kg body weight         LD50 oral rat       7400 mg/kg (Rat: OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study: >2000 mg/kg bodyweight (Rat)         LD50 dermal rabbit       > 7940 mg/kg (Rabbit)         LO50 dermal rabbit       > 7400.000 mg/kg body weight         Sodium xylenesulfonate (1300-72-7)       100.000 mg/kg body weight         LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       7440.000 mg/kg body weight         Solium xylenesulfonate (1300-72-7)       100.000 mg/kg body weight         LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes schious eye damage.         pH: 12.5 - 13.5       Serious eye damage/irritation         Education encity       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified </td <td></td> <td></td>			
ATE US (vapors)       2.170 mg//4h         ATE US (dust, mist)       2.170 mg//4h         Denzenesulfonic acid, C10-16-alkyl derivs., sodium salt (68081-81-2)       ATE US (cal)         ATE US (ral)       500.000 mg/kg body weight         Trisuotium orthophosphate, dodecahydrate (10101-89-0)       T400 mg/kg (Rat: OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study: >2000 mg/kg bodyweight, Rat)         LD50 oral rat       7400 mg/kg (Rat: OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study: >2000 mg/kg bodyweight         LD50 oral rat       7400.000 mg/kg bodyweight         LD50 dermal rabbit       > 7340 mg/kg (Rabbit)         LD50 dermal rabbit       > 2000 mg/kg         LD50 dermal rabbit       > 2000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       Serious eye damage/irritation         Skin corrosion/irritation       : Causes serious eye damage.         pH: 12.5 - 13.5       Serious eye damage/irritation         Carcinogenicity       : Not classified         2abutoxyethanol (111-76-2)       IARC group         IARC group       3 - Not classified         Specific target organ toxicity (repeated erros)       : Not classified         Specific target organ toxicity (repeated erros)       : Not classified         Specific			
ATE US (dust, mist)       2.170 mg//4h         benzenesuffonic acid, C10-16-alkyt derivs., sodium salt (68081-81-2)         ATE US (oral)       500.000 mg/kg body weight         trisodium orthophosphate, dodecahydrate (10101-89-0)         LD50 oral rat       7400 mg/kg (Rat: OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study; >2000 mg/kg bodyweight; Rat)         LD50 dermal rabbit       > 7440 mg/kg (Rabbit)         LD50 dinhalation rat (mg/l)       > 0.83 mg//4h (Kat: Read-across)         ATE US (oral)       7400.000 mg/kg body weight         Sodium xytepnesulfonate (1300-72-7)       UD50 oral rat         LD50 dermal rabbit       > 2000 mg/kg body weight         ATE US (oral)       7400.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation. pf: 12.5 - 13.5         Serious eye damage/irritation       : Causes serious eye damage. pf: 12.5 - 13.5         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         2butoxyethanol (111-76-2)       IARC group         IARC group       3 - Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified			
benzenesulfonic acid, C10-16-alkyl derivs., sodium salt (68081-81-2)           ATE US (oral)         500.000 mg/kg body weight           trisodium orthophosphate, dodecathydrate (1011-89-0)         Todo mg/kg (Rat OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study; >2000 mg/kg (Rat OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study; >2000 mg/kg body weight; Rat)           LD50 dermal rabbit         > 7840 mg/kg (Rat OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study; >2000 mg/kg body weight; Rat)           LD50 dermal rabbit         > 7840 mg/kg (Rat OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study; >2000 mg/kg body weight           Sodium xylenesulfonate (1300-72-7)         LD50 dermal rabbit           LD50 dermal rabbit         > 2000 mg/kg           Skin corrosion/irritation         : Causes skin irritation.           pH: 12.5 - 13.5         Serious eye damage.           pH: 12.5 - 13.5         Serious eye damage.           ger cell mutagenicity         : Not classified           Carcinogenicity         : Not classified           Zebuocyethanol (111-76-2)         IARC group           IARC group         3 - Not			
ATE US (oral)       500.000 mg/kg body weight         trisodium orthophosphate, dodecahydrate (10101-89-0)         LD50 oral rat       7400 mg/kg (Rath QECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study; >2000 mg/kg bodyweight; Rat)         LD50 dermal rabbit       > 7940 mg/kg (Rath)         LC50 inhaliation rat (mg/l)       > 0.83 mg/l/kf (Rat, Read-across)         ATE US (oral)       7400.000 mg/kg body weight         sodium xylenesulfonate (1300-72-7)          LD50 oral rat       3346 mg/kg         LD50 oral rat       3346 mg/kg         LD50 dermal rabbit       > 2000 mg/kg body weight         Stin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       Serious eye damage/irritation         Exespiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Zebutoxyethanol (111-76-2)       IARC group         IARC group       3 - Not Classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specofilic target o	ATE US (dust, mist)	2.170 mg/l/4h	
trisodium orthophosphate, dodecahydrate (10101-89-0)         LD50 oral rat       7400 mg/kg (Rat; OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study; >2000 mg/kg bodyweight; Rat)         LD50 dermal rabbit       > 7940 mg/kg (Rabbit)         LC50 inhalation rat (mg/l)       > 0.83 mg/l/4h (Rat; Read-across)         ATE US (oral)       7400.000 mg/kg bodyweight         sodium xylenesulfonate (1300-72-7)	benzenesulfonic acid, C10-16-alkyl derivs., s		
LD50 oral rat       7400 mg/kg (Rat; OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study, >2000 mg/kg bodyweight; Rat)         LD50 dermal rabbit       > 7340 mg/kg (Rat; OECD 420: Acute Oral toxicity – Acute Toxic Class Method; Literature study, >2000 mg/kg bodyweight; Rat)         LC50 inhalation rat (mg/l)       > 0.83 mg/l/4h (Rat; Read-across)         ATE US (oral)       7400.000 mg/kg body weight         Sodium xylenesulfonate (1300-72-7)       1050 oral rat         LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       Serious eye damage.         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         IA	ATE US (oral)	500.000 mg/kg body weight	
study: >2000 mg/kg bodyweight; Rat)         LD50 dermal rabbit       > 7940 mg/kg (Rabbit)         LC50 inhalation rat (mg/l)       > 0.83 mg/l/4, Rat; Read-across)         ATE US (oral)       7400.000 mg/kg body weight         sodium xylenesulfonate (1300-72-7)	trisodium orthophosphate, dodecahydrate (1	10101-89-0)	
LC50 inhalation rat (mg/l)       > 0.83 mg/l4h (Rat; Read-across)         ATE US (oral)       7400.000 mg/kg body weight         sodium xylenesulfonate (1300-72-7)       3346 mg/kg         LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       : Serious eye damage/irritation         Serious eye damage/irritation       : Causes serious eye damage.         pH: 12.5 - 13.5       : Serious eye damage/irritation         Carcinogenicity       : Not classified         Germ cell mutagenicity       : Not classified         Z-butoxyethanol (111-76-2)       IARC group         IARC group       3 - Not Classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (single exposure)       : Suptomalable data, the classification criter	LD50 oral rat		
ATE US (oral)       7400.000 mg/kg body weight         sodium xylenesulfonate (1300-72-7)       3346 mg/kg         LD50 oral rat       3346 mg/kg         LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation. pH: 12.5 - 13.5         Serious eye damage/irritation       : Causes serious eye damage. pH: 12.5 - 13.5         Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         Z-butoxyethanol (111-76-2)       IARC group         IARC group       3 - Not Classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified.         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after skin contact       : Causes serious eye damage.	LD50 dermal rabbit	> 7940 mg/kg (Rabbit)	
sodium xylenesulfonate (1300-72-7)         LD50 oral rat       3346 mg/kg         LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       pH: 12.5 - 13.5         Serious eye damage/irritation       : Causes serious eye damage.         pH: 12.5 - 13.5       pH: 12.5 - 13.5         Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         Z-butoxyethanol (111-76-2)       IARC group         IARC group       3 - Not Classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after skin contact       : May cause moderate irritation.	LC50 inhalation rat (mg/l)	> 0.83 mg/l/4h (Rat; Read-across)	
LD50 oral rat       3346 mg/kg         LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       pH: 12.5 - 13.5         Serious eye damage/irritation       :: Causes serious eye damage.         pH: 12.5 - 13.5       pH: 12.5 - 13.5         Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         IARC group       3 - Not Classified         Reproductive toxicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Symptoms/injuries after skin contact       : Based on available data, the classification criteria are not met symptoms         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.	ATE US (oral)	7400.000 mg/kg body weight	
LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       : Causes serious eye damage.         pH: 12.5 - 13.5       : Causes serious eye damage.         pH: 12.5 - 13.5       : Not classified         Germ cell mutagenicity       : Not classified         2-butoxyethanol (111-76-2)       : Not classified         IARC group       3 - Not Classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Symptoms       : Sased on available data, the classification criteria are not met symptoms         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.	sodium xylenesulfonate (1300-72-7)		
LD50 dermal rabbit       > 2000 mg/kg         ATE US (oral)       3346.000 mg/kg body weight         Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5       : Causes serious eye damage/irritation         Serious eye damage/irritation       : Causes serious eye damage.         pH: 12.5 - 13.5       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified <b>2-butoxyethanol (111-76-2)</b> : Not classified         IARC group       3 - Not Classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified.         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : May cause moderate irritation.	LD50 oral rat	3346 mg/kg	
Skin corrosion/irritation       : Causes skin irritation.         pH: 12.5 - 13.5         Serious eye damage/irritation       : Causes serious eye damage.         pH: 12.5 - 13.5         Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified <b>2-butoxyethanol (111-76-2)</b> IARC group       3 - Not Classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified         Specific target organ toxicity (repeated symptoms       : Not classified         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.	LD50 dermal rabbit	> 2000 mg/kg	
PH: 12.5 - 13.5Serious eye damage/irritation: Causes serious eye damage. pH: 12.5 - 13.5Respiratory or skin sensitization: Not classifiedGerm cell mutagenicity: Not classifiedCarcinogenicity: Not classifiedZ-butoxyethanol (111-76-2)IARC groupIARC group3 - Not ClassifiedSpecific target organ toxicity (single exposure): Not classifiedSpecific target organ toxicity (repeated exposure): Not classifiedSpecific target organ toxicity (repeated exposure): Not classifiedSynctinal Adverse human health effects and symptoms': Not classifiedSymptoms/injuries after skin contact: May cause moderate irritation. : Causes serious eye damage.	ATE US (oral)	3346.000 mg/kg body weight	
Serious eye damage/irritation       : Causes serious eye damage. pH: 12.5 - 13.5         Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified <b>2-butoxyethanol (111-76-2)</b> IARC group         IARC group       3 - Not Classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Aspiration hazard       : Not classified         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.	Skin corrosion/irritation	: Causes skin irritation.	
pH: 12.5 - 13.5         Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         Carcinogenicity       : Not classified <b>2-butoxyethanol (111-76-2)</b> IARC group         IARC group       3 - Not Classified         Reproductive toxicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified.         Symptoms       : Specific target organ toxicity (repeated exposure)         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.		pH: 12.5 - 13.5	
pH: 12.5 - 13.5         Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         Carcinogenicity       : Not classified <b>2-butoxyethanol (111-76-2)</b> IARC group         IARC group       3 - Not Classified         Reproductive toxicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Specific target organ toxicity (repeated exposure)       : Not classified.         Aspiration hazard       : Not classified         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.	Serious eve damage/irritation	Causes serious eve damage.	
Respiratory or skin sensitization       : Not classified         Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified <b>2-butoxyethanol (111-76-2)</b> : Not classified         IARC group       3 - 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         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.			
Germ cell mutagenicity       : Not classified         Carcinogenicity       : Not classified         2-butoxyethanol (111-76-2)	Respiratory or skin sensitization	•	
Carcinogenicity       : Not classified         2-butoxyethanol (111-76-2)       3 - Not Classifiable         IARC group       3 - Not Classifiable         Reproductive toxicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Aspiration hazard       : Not classified         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.		: Not classified	
2-butoxyethanol (111-76-2)         IARC group       3 - Not Classifiable         Reproductive toxicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Aspiration hazard       : Not classified         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.			
IARC group       3 - Not Classifiable         Reproductive toxicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Aspiration hazard       : Not classified         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.			
Reproductive toxicity       : Not classified         Specific target organ toxicity (single exposure)       : Not classified         Specific target organ toxicity (repeated exposure)       : Not classified.         Aspiration hazard       : Not classified         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.	2-butoxyethanol (111-76-2)		
Specific target organ toxicity (single exposure): Not classifiedSpecific target organ toxicity (repeated exposure): Not classified.Aspiration hazard: Not classifiedPotential Adverse human health effects and symptoms: Based on available data, the classification criteria are not metSymptoms/injuries after skin contact: May cause moderate irritation.Symptoms/injuries after eye contact: Causes serious eye damage.	IARC group	3 - Not Classifiable	
Specific target organ toxicity (single exposure): Not classifiedSpecific target organ toxicity (repeated exposure): Not classified.Aspiration hazard: Not classifiedPotential Adverse human health effects and symptoms: Based on available data, the classification criteria are not metSymptoms/injuries after skin contact: May cause moderate irritation.Symptoms/injuries after eye contact: Causes serious eye damage.	Denne dustine terrisitu		
Specific target organ toxicity (repeated exposure)       : Not classified.         Aspiration hazard       : Not classified         Potential Adverse human health effects and symptoms       : Based on available data, the classification criteria are not met         Symptoms/injuries after skin contact       : May cause moderate irritation.         Symptoms/injuries after eye contact       : Causes serious eye damage.			
exposure) Aspiration hazard : Not classified Potential Adverse human health effects and symptoms Symptoms/injuries after skin contact : May cause moderate irritation. Symptoms/injuries after eye contact : Causes serious eye damage.	Specific target organ toxicity (single exposure)	: Not classified	
Potential Adverse human health effects and symptoms: Based on available data, the classification criteria are not metSymptoms/injuries after skin contact: May cause moderate irritation.Symptoms/injuries after eye contact: Causes serious eye damage.		: Not classified.	
symptomsSymptoms/injuries after skin contact: May cause moderate irritation.Symptoms/injuries after eye contact: Causes serious eye damage.	Aspiration hazard	: Not classified	
Symptoms/injuries after eye contact : Causes serious eye damage.		: Based on available data, the classification criteria are not met	
Symptoms/injuries after eye contact : Causes serious eye damage.	Symptoms/injuries after skin contact	: May cause moderate irritation.	
	Symptoms/injuries after eye contact	: Causes serious eye damage.	
gastric/intestinal mucosa. Nausea.	Symptoms/injuries after ingestion	: FOLLOWING SYMPTOMS MAY APPEAR LATER: Gastrointestinal complaints. Irritation of the	

### SECTION 12: Ecological information 12.1. Toxicity

tetrasodium ethylenediaminetetracetate (64-02-8)		
LC50 fish 1	121 mg/l (96 h; Lepomis macrochirus; Soft water)	
EC50 Daphnia 1	625 mg/l (24 h; Daphnia magna)	
LC50 fish 2	374 - 792 mg/l (96 h; Lepomis macrochirus; pH > 7)	
Threshold limit algae 1	> 100 mg/l (72 h; Scenedesmus subspicatus; Growth)	
2-butoxyethanol (111-76-2)		
LC50 fish 1	116 ppm (96 h; Cyprinodon variegatus; Nominal concentration)	
EC50 Daphnia 1	1700 mg/l (48 h; Daphnia sp.; Nominal concentration)	
LC50 fish 2	1341 ppm (96 h; Lepomis macrochirus)	
EC50 Daphnia 2	1720 mg/l (24 h; Daphnia magna)	

Safety Data Sheet

2-butoxyethanol (111-76-2)	
TLM fish 1	100 - 1000,96 h; Pisces
TLM other aquatic organisms 1	100 - 1000,96 h
Threshold limit algae 1	900 mg/l (168 h; Scenedesmus quadricauda)
Threshold limit algae 2	35 mg/l (192 h; Microcystis aeruginosa)
· · · · · · · · · · · · · · · · · · ·	
trisodium orthophosphate, dodecahydrate (10	
LC50 fish 1	2400 mg/l (48 h; Leuciscus idus; Anhydrous form)
EC50 Daphnia 1 LC50 fish 2	> 100 mg/l (48 h; Daphnia magna) 220 mg/l (96 h; Lepomis macrochirus; Anhydrous form)
Threshold limit algae 1	<ul> <li>&gt; 100 mg/l (72 h; Desmodesmus subspicatus)</li> </ul>
-	
sodium xylenesulfonate (1300-72-7) LC50 fish 1	> 1580 mg/l (Rainbow trout)
EC50 Daphnia 1	> 1020 mg/l
ErC50 (algae)	758 mg/l
NOEC chronic algae	240 mg/l
-	
, , , , , , , , , , , , , , , , , , ,	
tetrasodium ethylenediaminetetracetate (64-0	
Persistence and degradability Biochemical oxygen demand (BOD)	Not readily biodegradable in water.
Biochemical oxygen demand (BOD)	< 0.002 g O <sub>2</sub> /g substance
Chemical oxygen demand (COD)	0.54 - 0.58 g O2/g substance
2-butoxyethanol (111-76-2)	
Persistence and degradability	Readily biodegradable in water. Biodegradable in the soil. Photodegradation in the air.
Biochemical oxygen demand (BOD)	0.71 g O2/g substance
Chemical oxygen demand (COD)	2.20 g O <sub>2</sub> /g substance
ThOD	2.305 g O <sub>2</sub> /g substance
BOD (% of ThOD)	0.31 % ThOD
trisodium orthophosphate, dodecahydrate (10	0101-89-0)
Persistence and degradability	Biodegradability: not applicable. Biodegradability in soil: not applicable. No (test) data on mobility of the substance available.
ThOD	Not applicable (inorganic)
sodium xylenesulfonate (1300-72-7)	
Persistence and degradability	Biodegradability in water: no data available.
2.3. Bioaccumulative potential	
tetrasodium ethylenediaminetetracetate (64-0	
Log Pow	-2.6
Bioaccumulative potential	Bioaccumulation: not applicable.
2-butoxyethanol (111-76-2)	
Log Pow	0.81 (Experimental value; BASF test; 25 °C)
Bioaccumulative potential	Low potential for bioaccumulation (Log Kow < 4).
trisodium orthophosphate, dodecahydrate (1) Bioaccumulative potential	0101-89-0) Not bioaccumulative.
•	
sodium xylenesulfonate (1300-72-7) Bioaccumulative potential	No bioaccumulation data available.
12.4. Other adverse effects	
Other information	: Avoid release to the environment.
SECTION 13: Disposal considerations	S
13.1. Waste treatment methods	
Waste disposal recommendations	: Dispose of contents/container in accordance with Local, State, and Federal regulations.
Product Code:420	EN (English US) Page 6 of 8

Safety Data Sheet

Ecology - waste materials :	Avoid release to the environment.		
SECTION 14: Transport information			
14.1. UN Number			
	Not Regulated		
	No supplementary information available		
14.2. UN proper shipping name			
DOT Proper Shipping Name	Not Regulated		
	Ĵ		
SECTION 15: Regulatory information			
15.1. US Federal regulations			
tetrasodium ethylenediaminetetracetate (64-02	2-8)		
Listed on the United States TSCA (Toxic Substar	,		
SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard		
2-butoxyethanol (111-76-2)			
Listed on the United States TSCA (Toxic Substan Listed on SARA Section 313 (Specific toxic chem			
SARA Section 311/312 Hazard Classes	Fire hazard Immediate (acute) health hazard Delayed (chronic) health hazard		
alkylated naphthalene sulfonate, sodium salt	(Proprietary)		
Listed on the United States TSCA (Toxic Substar	nces Control Act) inventory		
SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard Delayed (chronic) health hazard		
benzenesulfonic acid, C10-16-alkyl derivs., so	dium salt <b>(68081-81-2)</b>		
Listed on the United States TSCA (Toxic Substances Control Act) inventory			
SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard		
trisodium orthophosphate, dodecahydrate (10101-89-0)			
RQ (Reportable quantity, section 101(14) of CERCLA as published on EPA's List of Lists) :	5000 lb		
SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard		
sodium xylenesulfonate (1300-72-7)			
Listed on the United States TSCA (Toxic Substances Control Act) inventory			
SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard		

15.2. International regulations

CANADA

**EU-Regulations** No additional information available

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

Classification according to Directive 67/548/EEC or 1999/45/EC

Not classified

15.2.2. National regulations

#### trisodium orthophosphate, dodecahydrate (10101-89-0)

Trisodium orthophosphate dodecahydrate appears on the U.S. EPA TSCA Inventory under the cas# representing the anhydrous form of this material (7601-54-9 trisodium phosphate, crystalline).

#### 15.3. US State regulations

California Proposition 65 - This product contains, or may contain, trace quantities of a substance(s) known to the state of California to cause cancer and/or reproductive toxicity

Safety Data Sheet

Prop 65 Comments

:Formaldehyde (CAS#50-00-0): < 50 ppm

#### **SECTION 16: Other information**

Abbreviations Legend:

Acute Tox. 3 (Dermal)	Acute toxicity (dermal) Category 3
Acute Tox. 3 (Inhalation)	Acute toxicity (inhalation) Category 3
Acute Tox. 4 (Inhalation:dust,mist)	Acute toxicity (inhalation:dust,mist) Category 4
Acute Tox. 4 (Oral)	Acute toxicity (oral) Category 4
Eye Dam. 1	Serious eye damage/eye irritation Category 1
Eye Irrit. 2A	Serious eye damage/eye irritation Category 2A
Flam. Liq. 4	Flammable liquids Category 4
Skin Irrit. 2	Skin corrosion/irritation Category 2
STOT RE 2	Specific target organ toxicity (repeated exposure) Category 2
STOT SE 3	Specific target organ toxicity (single exposure) Category 3
H227	Combustible liquid
H302	Harmful if swallowed
H311	Toxic in contact with skin
H315	Causes skin irritation
H318	Causes serious eye damage
H319	Causes serious eye irritation
H331	Toxic if inhaled
H332	Harmful if inhaled
H335	May cause respiratory irritation
H373	May cause damage to organs through prolonged or repeated
	exposure

#### Disclaimer

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

Revision date: 01/26/2015 Supersedes: 01/02/2013 Version: 1.0