Product Revision date **RELOAD 1 SANITIZER DEGREASER CONCENTRATE**

05 July 2017 Revision 1



Safety Data Sheet (SDS)

Section 1: Identification of the substance/preparation and of the company/undertaking

1.1 Product identifier

Product name	RELOAD 1 SANITIZER DEGREASER CONCENTRATE
Product no.	REAQUATRIG
Synonyms, Trade names	No information available.

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

Identified uses	Cleaning agent.
Uses advised against	Any other purpose.

1.3 Details of the supplier of the safety data sheet

Supplier	Kitchenmaster NI Ltd
	11 Comber Road
	Belfast
	BT8 8AN
	United Kingdom
	Tel: 028 9081477 02890812881
Contact person	sales@kitchenmaster-ni.com
1.4 Emergency telephone number	
Emergency telephone	Emergency Telephone Number: 028 9081 4777 08:30 – 17:00 Monday to Thursday 08:30 – 16:30 Friday

Section 2: Hazards identification

2.1 Classification of the substance or mixture

Classification (EC 1272/2008)	
Physical and chemical hazards	Not classified
Human health	Skin Corr. 1B - H314, Eye Dam. 1 - H318
Environment	Aquatic Chronic 3 - H412

2.2 Label elements

Contains

Detergent labeling

Alcohols, C12-15, ethoxylated sodium hydroxide caustic soda Benzyl-C12-14-alkyldimethylammonium chlorides N,N-dimethyltetradecylamine N-oxide \geq 5% <15% non-ionic surfactants <5% phosphonates <5% amphoteric surfactants

Label in accordance with (EC) no. 1272/2008

Signal word

Hazard statements

Danger

H314 Causes severe skin burns and eye damage. H412 Harmful to aquatic life with long lasting effects.

Precautionary statements

Prevention

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

P280 Wear protective gloves/ protective clothing/eye protection/face protection. **Response**

P301 + P330 + P331 IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

P303 + P361 + P353 IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/ shower.

 $P305 + P351 + P338 \ \text{IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.}$

P310 Immediately call a POISON CENTER or doctor/physician.

2.3 Other hazards

None known.

Section 3: Composition/identification of ingredients

3.1 Substance

Not applicable.

3.2 Mixtures

Name	Product identifier	Reg. EU 1272/2008	%
Alcohols, C12-15, ethoxylated		Eye Dam. 1 - H318, Aquatic Acute 1 - H400, Aquatic Chronic 3 - H412	1-10%
sodium hydroxide caustic soda	CAS-No.: 1310-73-2 EC No.: 215-185-5	Skin Corr. 1A - H314	1-10%
IBenzyl (12, 14, alkyldimethylammonium chlorides	CAS-No.: 85409-22-9 EC No.: 939-350-2 REACH Reg No.: 01-2119970550-39-0000	Aquatic Acute 1 - H400, Aquatic Chronic 1 - H410, Acute Tox 4 - H302, Skin Corr. 1B - H314, Eye Dam. 1 - H318	1-10%
1-Propanaminium, 3-amino-N-(carboxymethyl)- N,N-dimethyl-, N-coco acyl derivs., hydroxides, inner	CAS-No.: 61789-40-0 EC No.: 263-058-8	Skin Irrit.2 - H315, Eye Irrit.2A - H319	1-10%
salts 4,6-DIHYDROXY-2-MERCAPTO-5-NITROSOPYRIMIDINE	CAS-No.: 63681-88-9 EC No.:	Acute Tox 4 - H302, Eye Irrit.2A - H319	0-1%
N,N-dimethyltetradecylamine N-oxide	CAS-No.: 3332-27-2 EC No.: 222-059-3	Acute Tox 4 - H302, Skin Irrit.2 - H315, Eye Dam. 1 - H318, Aquatic Acute 1 - H400, Aquatic Chronic 2 - H411	0-1%
ethanol	CAS-No.: 64-17-5 EC No.: 200-578-6	Eye Irrit.2A - H319, Flam. Liq 2- H225	0-1%

The full text for all hazard statements are displayed in section 16.

Composition comments

The data shown are in accordance with the latest EC Directives.

Section 4: First aid measures

<u>4.1 Description of first aid measures</u>

General information	As a general rule, in case of doubt or if symptoms persist, always call a doctor. Seek medical attention for all burns and eye injuries, regardless how minor they may seem. First aid personnel must be aware of own risk during rescue. Provide general first aid, rest, warmth and fresh air.
Inhalation	Move the exposed person to fresh air at once. If breathing is difficult, oxygen should be administered by qualified personnel. If not breathing, give artificial respiration. Get prompt medical attention.
Ingestion	Get medical attention immediately. Do not induce vomiting. Provided the patient is fully conscious, washout mouth with water. Never give anything by mouth to an unconscious person. If vomiting occurs, the head should be kept low so that stomach vomit doesn't enter the lungs. Artificial respiration and/or oxygen may be necessary.
Skin contact	Take off contaminated clothing and shoes immediately. Promptly flush contaminated skin with water. Continue to rinse for at least 15 minutes. Seek medical attention immediately.
Eye contact	SPEED IS ESSENTIAL. Avoid contaminating unaffected eye. Wash thoroughly with soft, clean water for 15 minutes holding the eyelids open. Remove contact lenses if present and easy to do so. Get medical attention immediately.

4.2 Most important symptoms and effects, both acute and delayed

General information	The severity of the symptoms described will vary dependant of the concentration and the length of exposure.
Inhalation	Inhalation may cause respiratory irritation.
Ingestion	May cause chemical burns in mouth and throat. May cause stomach pain or vomiting.
Skin contact	Symptoms: Redness, swelling of tissue, burns, ulceration. May cause serious chemical burns to the skin.
Eye contact	May cause irreversible eye damage. Symptoms may include redness, lachrymation, swelling of tissue, burns.

4.3 Indication of any immediate medical attention and special treatment needed

Notes to the physician	Treat symptomatically.
Section 5: Fire-fighting measures	

5.1 Extinguishing media

Extinguishing media	Use extinguishing measures that are appropriate to local circumstances and the surrounding
Unsuitable extinguishing media	environment. Water spray. Water fog. Foam. Dry powder. Carbon dioxide. Dry chemical. High volume water jet.

5.2 Special hazards arising from the substance or mixture

Hazardous combustion products Unusual fire & explosion hazards Specific hazards	Hazardous decomposition products formed under fire conditions. Flammable hydrogen can form when the product contacts metals. During fire, gases hazardous to health may be formed. Do not allow run-off from fire fighting to enter drains or water courses.
5.3 Advice for firefighters	
Special fire fighting procedures	If possible, fight fire from protected position. Ventilate closed spaces before entering them. Keep up-wind to avoid fumes. Containers close to fire should be removed immediately or cooled with water. Suppress (knock down) gasses/vapours/mists with a water spray.
Protective equipment for firefighter	s Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode. Clothing for fire-fighters (including helmets, protective boots and gloves) conforming to European standard EN 469 will provide a basic level of protection for chemical incidents.

Section 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Personal precautions	Do not mix with other chemicals. Wear protective clothing as described in Section 8 of this safety data sheet. Avoid inhalation of vapours and contact with skin and eyes. Provide adequate ventilation. In case of inadequate ventilation, use respiratory protection. Eliminate
For emergency responders	all sources of ignition. Follow safe handling advice and personal protective equipment recommendations for normal use of product.
6.2 Environmental precautions	
Environmental precautions	Avoid discharge into drains, water courses or onto the ground. Spillages or uncontrolled discharges into watercourses must be IMMEDIATELY alerted to the Environmental Agency or other appropriate regulatory body.
6.3 Methods and material for containme	ent and cleaning up
Spill clean up methods	Ventilate and evacuate the area. Eliminate all ignition sources. Wear necessary protective equipment DO NOT touch spilled material! Stop leak if possible without risk. Use non - metallic tools/containers for clean up. Absorb spillage with inert, damp, non-combustible material or use a liquid binding material. Place waste material into suitable labelled sealed containers for disposal. Remove waste

promptly to a safe area. Flush with plenty of water to clean spillage area.

6.4 Reference to other sections	
Reference to other sections	See section 1 for emergency contact. For personal protection, see section 8. For waste disposal, see section 13.
Section 7: Handling and storage	
7.1 Precautions for safe handling	
Handling	Read and follow manufacturer's recommendations. Use personal protective equipment, see Section 8. Avoid contact with skin and eyes. Do not handle broken packages without protective equipment. Ensure adequate ventilation. If necessary, use local exhaust ventilation. Do not use contact lenses. Keep away from flammable materials and incompatible substances. Use only equipment and materials which are compatible with the product. Do not confine the product in a circuit, between closed valves, or in a container without a vent. Always wash hands after handling.
7.2 Conditions for safe storage, includ	ling any incompatibilities
Storage precautions	Keep locked up and out of reach of children. Store in tightly closed original container in a

Storage precautions	Keep locked up and out of reach of children. Store in tightly closed original container in a cool, dry and well-ventilated place.
Storage class	Corrosive storage
7.3 Specific end use(s)	
Specific end use(s) Usage description	The identified uses for this product are detailed in Section 1.2. Use only according to directions.

Section 8: Exposure controls/Personal protection

8.1 Control parameters

Component	STD	TWA (8 Hrs)	STEL (1	l5mins)	Notes
sodium hydroxide caustic soda	OEL				2 mg/m ³	
sodium hydroxide caustic soda	WEL				2 mg/m ³	
ethanol	OEL			1000 ppm		
ethanol	WEL	1000 ppm	1920 mg/m ³			

Ingredient comments

WEL - Workplace Exposure Limits - EH40/2005 Workplace exposure limits. OEL - Occulational Exposure Limit - Ireland, Occupational Exposure Limits 2016.

8.2 Exposure Controls



Engineering measures

Respiratory equipment

Hand protection

Provide adequate ventilation, including appropriate local extraction, to ensure that the defined occupational exposure limit is not exceeded.

When workers are facing concentrations above the exposure limit they must use appropriate certified respirators. Use respirators and components tested and approved under appropriate government standards such as CEN (EU). If the respirator is the sole means of protection, use a full-face supplied air respirator. Self-contained breathing apparatus (EN 133). Respirator with a vapour filter (EN 141). In case of decomposition (see section 10), face mask with combined type B-P2 cartridge.

Where hand contact with the product may occur the use of gloves approved to relevant standards (e.g. Europe: EN374) is recommended. (EU Directive 89/686/EEC). Selection of the glove material depends on consideration of the penetration times, rates of diffusion and degradation, and concentration specific to the workplace. Gloves must be inspected prior to use.

	Suggested material: Butyl-rubber. Minimum layer thickness: >= 0.35 mm. Break through time: 480 min. Gloves must be inspected prior to use. Consult manufacturer for specific advice on material. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product.
Eye protection	Wear safety goggles or face shield to prevent any possibility of eye contact. Use equipment for eye protection tested and approved under appropriate government standards such as EN 166(EU).
Other protection	Wear appropriate clothing to prevent any possibility of skin contact. The selected clothing must satisfy the European norm standard EN 943. Protective clothing should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Hygiene measures	DO NOT SMOKE IN WORK AREA! Wash hands after handling. Wash promptly if skin becomes wet or contaminated. Promptly remove any clothing that becomes contaminated. When using do not eat, drink or smoke.
Process conditions	Keep container tightly sealed when not in use. Ensure that eye flushing systems and safety showers are located close by in the work place.

Section 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

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Appearance Colour Odour	Liquid. Clear. Fluorescent pink. Characteristic odour.
Odour threshold - lower	No information available.
Odour threshold - upper	No information available.
pH-Value, Conc. Solution	>14.
pH-Value, Diluted solution	No information available.
Melting point	No information available.
Initial boiling point and boiling range	No information available.
Flash point	No information available.
Evaporation rate	No information available.
Flammability state	No information available.
Flammability limit - lower(%)	No information available.
Flammability limit - upper(%)	No information available.
Vapour pressure	No information available.
Vapour density (air=1)	No information available.
Relative density	1.060g/cm ³ @ 20.00 °C
Bulk density	No information available.
Solubility	Soluble in water.
Decomposition temperature	No information available.
Partition coefficient; n- Octanol/Water	No information available.
Auto ignition temperature (°C)	No information available.
Viscosity	No information available.
Explosive properties	Not classified as explosive.
Oxidising properties	No information available.

9.2 Other information

Molecular weight	No information available.
Volatile organic compound	No information available.
Other information	None noted.

Section 10: Stability and reactivity	
10.1 Reactivity	
Reactivity	Corrosive to metals. Reaction with acids.
<u>10.2 Chemical stability</u>	
Stability	Stable under normal temperature conditions and recommended use. Corrosive in contact with metals.
10.3 Possibility of hazardous reactions	
Hazardous reactions Hazardous polymerisation Polymerisation description	Corrosive in contact with metals. Reacts with acids. Unknown. Not applicable.
10.4 Conditions to Avoid	
Conditions to avoid	Heat, sparks, open flames, temperature extremes and direct sunlight. To avoid thermal decomposition do not overheat. Keep away from contact with metals (Nickel, Copper, Cobalt, Aluminium, Manganese, etc.). Avoid freezing.
10.5 Incompatible materials	
Materials to avoid	Metals, Salts of metals, Acids, Organic materials. Avoid contact with oxidising agents.
10.6 Hazardous decomposition products	ł
Hazardous decomposition products	Thermal decomposition or combustion may liberate carbon oxides and other toxic gases or vapours. Decomposition may lead to the release of flammable hydrogen gas.

Section 11: Toxicological information

<u>11.1 Information on toxicological effects</u>

Toxicological information	Caustic/ irritant effect on skin, eyes and mucous membranes (Respiratory tract).
Acute toxicity (Oral LD50)	Alcohols, C12 -15, ethoxylated (CAS 68131-39-5): > 5000 mg/kg, Rat. REACH dossier information. SODIUM HYDROXIDE (CAS 1310-73-2): 325 mg/kg bw, Rabbit. REACH dossier information.
Acute toxicity (Dermal LD50)	Alcohols, C12 -15, ethoxylated (CAS 68131-39-5): > 2000 mg/kg, Rat. REACH dossier information. SODIUM HYDROXIDE (CAS 1310-73-2): 1350 mg/kg, Rabbit. IUCLID chemical data sheet.
Acute toxicity (Inhalation LD50)	Alcohols, C12 -15, ethoxylated (CAS 68131-39-5): > 1.6 mg/l, (dust/mist), Rat - 4 hours. REACH dossier information.
Serious eye damage/irritation	Causes serious eye damage.
Skin corrosion/irritation	No information available.
Respiratory sensitisation Skin sensitisation	No information available. No information available.
Germ cell mutagenicity	No information available.
Carcinogenicity	No information available.
Specific target organ toxicity - Sing STOT - Single exposure	Jle exposure: No information available.

Specific target organ toxicity - Repeated exposure: **STOT - Repeated exposure** No information available. Inhalation Inhalation may cause respiratory irritation. Ingestion May cause chemical burns in mouth and throat. May cause stomach pain or vomiting. **Skin contact** Symptoms: Redness, swelling of tissue, burns, ulceration. May cause serious chemical burns to the skin. **Eve contact** May cause irreversible eye damage. Symptoms may include redness, lachrymation, swelling of tissue, burns. Dispose of in accordance with local and national regulations. When handling waste, Waste management consideration should be made to the safety precautions applying to handling of the product. **Routes of entry** No information available. Eyes, skin, digestive system, respiratory system. **Target organs Aspiration hazards:** No information available. **Reproductive toxicity:** No information available.

Name	LD50 oral	LD50 dermal	LD50 inhalation
Alcohols, C12-15, ethoxylated	>5000.00mg/kg Rat		
TRISODIUM CITRATE	5400.00mg/kg Mouse	>2000.00mg/kg Rat	
Benzyl-C12-14-alkyldimethylammonium chlorides	379.50mg/kg Rat	3412.00mg/kg Rabbit	
N,N-dimethyltetradecylamine N-oxide	>2000.00mg/kg Rat		
4,6-DIHYDROXY-2-MERCAPTO-5-NITROSOPYRIMIDINE	300.00mg/kg Rat		

Section 12: Ecological information

12.1 Toxicity

Acute toxicity - Fish Acute toxicity - Aquatic invertebrate	Alcohols, C12 -15, ethoxylated (CAS 68131-39-5) LC50: (96 hours) 0.59 mg/l, Pleuronectes platessa. REACH dossier information. SODIUM HYDROXIDE (CAS 1310-73-2) LC50: (96 hours) 45.4 mg/l, Oncorhynchus mykiss (Rainbow trout.) IUCLID chemical data sheet. s Alcohols, C12 -15, ethoxylated (CAS 68131-39-5) EC50: (48 hours) 0.14 mg/l, Daphnia
Acute toxicity - Aquatic plants Acute toxicity - Microorganisms	magna. REACH dossier information. SODIUM HYDROXIDE (CAS 1310-73-2) EC50: (48 hours) 40.4 ug/L, Ceriodaphnia sp. REACH dossier information. Alcohols, C12 -15, ethoxylated (CAS 68131-39-5) EC50: (72 hours) 0.75 mg/l, Selenastrum capricornutum. REACH dossier information. No information available.
Chronic toxicity - Fish	No information available.
Chronic toxicity - Aquatic	No information available.
invertebrates	
Chronic toxicity - Aquatic plants	No information available.
Chronic toxicity - Microorganisms	No information available.
Ecotoxicity	The product contains substance which is very toxic to aquatic life.
Eco toxilogical information	The product contains a substance which is harmful to aquatic organisms.
12.2 Persistence and degradability Degradability Biological oxygen demand Chemical oxygen demand	The degradability of the product has not been stated. No information available. No information available.
12.3 Bioaccumulative potential	
Bioaccumulative potential Bioacculmation factor Partition coefficient; n- Octanol/Water	No data available on bioaccumulation. No information available. No information available.
12.4 Mobility in soil Mobility	Soluble in water.

12.5 Results of PBT and vPvB assessment

Results of PBT and vPvB assessment The product does not contain any PBT or vPvB Substances.

12.6 Other adverse effects

Other adverse effects

No information available.

Name	Acute toxicity (Fish)	Acute toxicity (Aquatic invertebrates)	Acute toxicity (Aquatic plants)
Alcohols, C12-15, ethoxylated	LC50 96 Hours >2.00ppm Brachydanio rerio (Zebra Fish)		
Benzyl-C12-14-alkyldimethylammonium chlorides	LC50 0.52mg/l Freshwater Fish	EC50 0.02mg/l Daphnia magna	
N,N-dimethyltetradecylamine N-oxide	LC50 96 Hours 5.00mg/l Freshwater Fish		
4,6-DIHYDROXY-2-MERCAPTO-5-NITROSOPYRIMIDINE	LC50 96 Hours >100.00mg/l Onchorhynchus mykiss (Rainbow Trout)		

Section 13: Disposal considerations	
Waste management	Dispose of in accordance with local and national regulations. When handling waste, consideration should be made to the safety precautions applying to handling of the product
13.1 Waste treatment methods	
Disposal methods	Dispose of waste and residues in accordance with local authority requirements. Dispose in a safe manner in accordance with local/national regulations.
Section 14: Transport information	
14.1 UN number	
UN no. (ADR)	UN1760
UN no. (IMDG)	UN1760
UN no. (IATA)	UN1760
<u>14.2 UN proper shipping name</u>	
ADR proper shipping name	CORROSIVE LIQUID, N.O.S. (sodium hydroxide caustic soda + Benzyl-C12 4-alkyldimethylammonium chlorides)
IMDG proper shipping name	CORROSIVE LIQUID, N.O.S. (sodium hydroxide caustic soda + Benzyl-C12 4-alkyldimethylammonium chlorides)
IATA proper shipping name	CORROSIVE LIQUID N.O.S. (sodium hydroxide caustic soda + Benzyl-C12 4-alkyldimethylammonium chlorides)

14.3 Transport hazard class(es)

ADR class	
IMDG class	
IATA class	

Transport labels



8 8 8

II II II

14.4 Packing group

ADR/RID/ADN packing group IMDG packing group IATA packing group	
<u>14.5 Environmental hazards</u>	

ADR	Yes
IMDG	Yes

IATA

14.6 Special precautions for user

EMS	F-A, S-B
Emergency action code	A3
Hazard no. (ADR)	80
Tunnel restriction code	(E)

$\underline{14.7}$ Transport in bulk according to annex II of MARPOL73/78 and the IBC code

Yes

Not applicable.

Section 15: Regulatory information

15.1 Safety, health and environmental regulations/Legislation specific for the substance or mixture		
EU legislation	Regulation (EC) No 1272/2008 of the European Parliament and of the Council of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006 with amendments. The UN Globally Harmonized System (GHS) Safety Data Sheet format (Annex IV) is implemented as Annex II of REACH EU No 453/2010 of 20th May 2010 amending regulation (EC) No 1907/2006.	
Approved code of practice	Workplace Exposure Limits Guidance Note EH40/2005.	
	2016 Code of Practice for the Chemical Agents Regulations in accordance with section 60 of the Safety, Health and Welfare at Work Act 2005 (No. 10 of 2005).	
Chemical safety assessment	No chemical safety assessment has been carried out.	

Section 16: Other information

General information	This Safety Data Sheet is in accordance with Reach Regulation (EC) No 453/2010 This is first issue
Revision comments Revision date	05 July 2017
Revision	1
Safety data sheet status	Approved.

Hazard statements in full

H302	Harmful if swallowed.
H318	Causes serious eye damage.
H400	Very toxic to aquatic life.
H412	Harmful to aquatic life with long lasting effects.
H314	Causes severe skin burns and eye damage.
H410	Very toxic to aquatic life with long lasting effects.
H315	Causes skin irritation.
H319	Causes serious eye irritation.
H411	Toxic to aquatic life with long lasting effects.
H225	Highly flammable liquid and vapour.

Disclaimer

This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is, to the best of the company's knowledge and belief, accurate and reliable as of the date indicated. However, no warranty guarantee or representation is made to its accuracy, reliability or completeness. It is the user's responsibility to satisfy himself as to the suitability of such information for his own particular use.