

VIREX

Code: 03720

Material Safety Data Sheet compliant with Regulation (EC) 2015/830

Version 6.0.0

Revision: 15/04/19

Print Date : 10/02/20

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

1.1. Product identifier

Trade name VIREX

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

Use of the product

Breeding disinfectant
BACTERICIDAL AND VIRUCIDAL DISINFECTING PRODUCT FOR
MATERIALS, EQUIPMENT AND SURFACES
STOCK BREEDING

1.3. Details of the supplier of the safety data sheet

Company identification

Kilco (International) Ltd
Broomhouses 2 Industrial Estate
Old Glasgow Road
Lockerbie
United Kingdom
DG11 2SD

1.4. Emergency telephone number

Emergency phone number

Emergency direct number (24 hours a day, 7 days a week) :
(+ 1-760-476-3960 (Asian area, Pacific area)
(+ 1-760-476-3961 (European area)
(+ 1-760-476-3962 (Americas area)
(+ 1-760-476-3959 (Middle eastern countries and African area)
Access code : 333021

INRS
30, rue Olivier Noyer
75014 Paris - FRANCE
Tél : + 33 (0) 1 45 42 59 59

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SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

The mixture meets the classification criteria provided for under Regulation (EC) No 1272/2008.

Acute toxicity - Category 4 (per oral route)

H302: Harmful if swallowed.

Skin corrosion - Category 1B

H314: Causes severe skin burns and eye damage.

Skin sensitisation - Category 1

H317: May cause an allergic skin reaction.

Serious damage to eyes - Category 1

H318: Causes serious eye damage.

Hazardous to the aquatic environment – Chronic
- Category 2

H411: Toxic to aquatic life with long lasting effects.

2.2. Label elements

Labelling according to 1272/2008/EC Regulation:

Hazard pictograms(s) :



Signal word :

Danger

Contains : Bis(peroxymonosulfate)bis(sulfate) of pentapotassium

Hazard statement(s) :

H302: Harmful if swallowed. H314: Causes severe skin burns and eye damage. H317: May cause an allergic skin reaction. H411: Toxic to aquatic life with long lasting effects.

Precautionary statement(s) :

P260: Do not breathe dust. P273: Avoid release to the environment. P280: Wear protective gloves/protective clothing/eye 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 [or shower]. 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 or doctor/physician.

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2.3. Other hazards

No additional information available.

SECTION 3: Composition/information on ingredients

3.1. Substances

Not applicable as this involves a mixture.

3.2. Mixtures

Chemical nature of the mixture : Powders of acid nature

Substance(s)	CAS number(s)	EINECS number(s)	No registration REACH	Classification according to Regulation 1272/2008/EC	Type
5% <= Sulphamic acid < 10%	5329-14-6	226-218-8	01-2119488633-28	Skin Irrit. 2 H315 Eye Irrit. 2 H319 Aquatic Chronic 3 H412	(1)
30% <= Bis(peroxymonosulfate)bis(sulfate) of pentapotassium < 50%	70693-62-8	274-778-7	01-2119485567-22	Acute Tox. 4 (oral) H302 Skin Corr. 1B H314 Eye Dam. 1 H318 Aquatic Chronic 3 H412	(1)
5% <= Malic acid < 10%	6915-15-7	230-022-8	01-2119552463-40	Eye Irrit. 2 H319	(1)
1% <= Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts < 5%	68411-30-3	270-115-0	01-2119489428-22	Acute Tox. 4 (oral) H302 Skin Irrit. 2 H315 Eye Dam. 1 H318 Aquatic Chronic 3 H412	(1)
1% <= Troclosene sodium < 5%	2893-78-9	220-767-7	01-2119489371-33	Ox. Sol. 2 H272 Acute Tox. 4 (oral) H302 Eye Irrit. 2 H319 STOT SE 3 H335 Aquatic Acute 1 H400 Aquatic Chronic 1 H410 M Factor (Acute) 1 M Factor (Chronic) 1	(1)

Type

(1) : Substance classified as hazardous for health and/or the environment

(2) : Substance with an exposure limit at the work station.

Substance of very high concern candidate for the authorisation procedure:

(3) : Substance considered as PBT (persistent, bioaccumulable, toxic)

(4) : Substance considered as vPvB (very persistent, very bioaccumulable)

(5) : Substance considered as carcinogenic category 1A

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- (6) : Substance considered as carcinogenic category 1B
- (7) : Substance considered as mutagenic category 1A
- (8) : Substance considered as mutagenic category 1B
- (9) : Substance considered as reprotoxic category 1A
- (10) : Substance considered as reprotoxic category 1B
- (11) : Substance considered as endocrine disrupter

Full text of H- and EUH- phrases : see section 16.

SECTION 4: First aid measures

4.1. Description of first aid measures

General indications:

Take the contaminated clothes and shoes off immediately. Wash them before wearing them again.
In case of faintness , get medical advice/attention. Show this safety data sheet to the doctor.

In the event of inhalation :

To transport the person to the air, to maintain it with the heat and rest.

In the event of contact with the skin :

Take off immediately all contaminated clothing.
Wash immediately with plenty of water for 15 minutes at least.
If skin irritation or rash occurs: Get medical advice/attention.

In the event of contact with the eyes :

Rinse at once with a soft stream of water for at least 15 minutes, eyes wide open.
Remove contact lenses if present and easy to do. Continue rinsing.
Immediately call a POISON CENTER or doctor/physician.

In the event of ingestion :

Rinse mouth.
Do NOT induce vomiting.
Send to hospital.

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

Skin contact : Corrosive : Causes burns.
Symptoms: Redness, swollen tissues, burns.

Eye contact : Causes serious eye damage.
Can cause irreversible effects on the eyes such as ocular tissue lesions or serious damage to the sight.

Ingestion : Harmful if swallowed.
Causes severe burns in mouth and digestive tract.

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Inhalation : May cause a respiratory system irritation.

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

Treatments : Symptomatic treatment

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media :

Agents compatible with other products involved into fire.

Water spray, powder extinguisher, foam.

Unsuitable extinguishing media :

None from our knowledge.

5.2. Special hazards arising from the substance or mixture

Possible formation of toxic gas in case of fire.

5.3. Advice for firefighters

Wear independent respiratory equipment and protective suit.

Collect contaminated firefighting water separately, must not be discharged into the drains.

Keep containers cool by spraying with water if exposed to fire.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel :

Evacuate non-essential staff and those not equipped with individual protection apparatus.

6.1.2. For emergency responders :

Evacuate the personnel to a safe location.

Keep people upwind and away from the location of the flow/leak.

Use personal protection equipment.

6.2. Environmental precautions

Take as soon as possible all incompatible materials away.

Intervention limited to trained staff.

Do not discharge the product directly to sewer or to environment.

6.3. Methods and material for containment and cleaning up

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Small spillage :

- Limit the formation of dust.
- Sweep mechanically.
- Recover in a reservoir of help.

Large spillage :

- Proceed the same way as in the case of a small discharge.
- Never return spills in original containers for re-use.
- Keep in suitable, properly labelled and closed containers for disposal.

6.4. Reference to other sections

- Respect protective measures presented at heading 8.
- Refer to section 13 for the elimination.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

- Avoid contact with skin, eyes and clothing.
- Take off immediately all contaminated clothing.
- To handle in well ventilated zones.
- Avoid breathing dust.
- When using do not eat, drink or smoke.

7.2. Conditions for safe storage, including any incompatibilities

7.2.1. Storage :

- Keep only in the original container.
- Keep container closed.
- Keep in a clean and dry place.
- Keep away from products sensitive to acids.

7.2.2. Packaging or wrapping materials :

- High density polyethylene recommended.

7.3. Specific end use(s)

- VIREX is for use as a biocide.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure limit values :

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Substance	Country	Type	Value	Unit	Comments	source
Contains no substances with occupational exposure limit values.						

8.2. Exposure controls

According to the requirements of Directive 98/24 /EC, the employer is required to conduct a risk assessment and implement appropriate risks management measures.

* For any situation where the absence of risk is not proven, he must consider the substitution or reduction of risk by improving in priority processes used and collective protection measures. The effectiveness of the solutions implemented will be checked by measurement in comparison to the statutory limit values for substances defined in Section 8.1.

* If the risk remains after these corrective actions, he must always check by routinely measuring compliance with regulatory OEL if they exist in section 8.1 and apply all the individual protective measures given in section 8.2.

* When formalized risk assessment indicates a low risk to workers' health, control of compliance with regulatory OEL may not be considered and all individual protection measures is not always mandatory.

8.2.1. Appropriate engineering controls :

Provide adequate ventilation, particularly in closed areas.

8.2.2. Individual protection measures, such as personal protective equipment :

Eye/face protection :

Use safety glasses or facial screen in conformity with the EN 166 standard.



Hand protection :

Use chemical resistant gloves approved to EN 374.

Examples of preferred materials for insulating gloves:

Neoprene.

PVC

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Skin protection :

Wear boots and a protective cloth with chemical resistance.



Respiratory protection :

During handling causing the formation of dust, wear a complete mask compliant with the standard EN 136, fitted with a filter (compliant with the standard EN 143 or EN 14387) of the type:

P3: Particles, solid aerosols and liquids

Thermal hazards :

Not applicable

Health measures :

Safety shower and eye wash fountain near to workplace.

After using, wash systematically all personal protective equipment.

Handle in accordance with good industrial hygiene practices and the safety instructions.

8.2.3. Environmental exposure controls :

Do not discharge the product directly to sewer or to environment.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

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Appearance	Fluid powder
Colour	white to pink
Odour	Slightly chlorinated
Odour threshold	Not available
pH value at 10g/l	2
Freezing point :	Not applicable
Flash point	Not applicable
Evaporation rate:	Not applicable
Flammability	Not available
Vapour pressure	Not available
Vapour density	Not applicable
Mass density	1.01 g/cm ³
Relative density	1.01
Solubility in water	dissolvable
Partition coefficient: n-octanol/water	Not applicable
Auto-ignition temperature	Not available
Decomposition temperature	Not available
Viscosity	Not applicable
Explosive properties	Not available
Oxidising properties	Not available

9.2. Other information

No additional information.

SECTION 10: Stability and reactivity**10.1. Reactivity**

None under normal conditions of use.

10.2. Chemical stability

Stable in the recommended storage and handling conditions.

10.3. Possibility of hazardous reactions

None to our knowledge.

10.4. Conditions to avoid

High temperatures.

10.5. Incompatible materialsStrong acids.
Strong basis**10.6. Hazardous decomposition products**

Warming or fire can generate toxic gases

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These data are given for the concentrated mixture. The use of the mixture under its diluted form must be performed in conformity with data given by the technical data sheet and the technical adviser.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Substance-related data:

Acute toxicity

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : LD 50 - oral rat 1,080 mg/kg. - MSDS supplier

Sodium chloride + Troclosen sodium (100%) : LD 50 - oral rat 1,823 mg/kg. - MSDS supplier

Sulphamic acid : LD 50 - oral rat > 2,000 mg/kg. - MSDS supplier

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : LD 50 - dermal rat > 2,000 mg/kg. - MSDS supplier

Sulphamic acid : LD 50 - dermal > 2,000 mg/kg. - MSDS supplier

Malic acid (>99%) : LC 50 - inhalation rat 3,500 mg/kg. - MSDS supplier

Skin corrosion/irritation

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : Skin irritation (OECD 404): . Irritating - MSDS supplier

Sulphamic acid : Skin irritation . Irritating - MSDS supplier

Serious damage to eyes/eye irritation

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : Eye irritation (OECD 405): . Risk of serious damage of eyes - MSDS supplier

Sulphamic acid : Eye irritation . Irritating - MSDS supplier

Sensitisation

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : Sensitisation mouse, guinea-pig (OECD 406): . Not sensitising - MSDS supplier

Repeated dose toxicity

Sulphamic acid : NOEL- oral 1,000 mg/kg. - MSDS supplier

Mutagenicity

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : Chromosomal aberration test (OECD 473): . Not mutagenic - MSDS supplier

Reproductive toxicity

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : NOAEL - oral 350 mg/kg. - MSDS supplier

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : NOAEL 600 mg/kg. - MSDS supplier

Mix-related data:

Acute toxicity

LD 50 - dermal rat (OECD 402): > 2,000 mg/kg.

LD 50 - oral rat (OECD 403): > 1,000 mg/kg.

Skin corrosion/irritation

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Skin corrosivity male rat (EC B40): . Corrosive to the skin

Serious damage to eyes/eye irritation

Ocular corrosivity . Causes serious eye damage according to the criteria of Regulation 1272/2008/EC.

Respiratory / skin sensitisation

Skin sensitisation (OECD 429): . Can induce sensitization

Respiratory sensitisation . The mixture is not considered as a respiratory sensitiser according to 1272/2008/EC Regulation.

Mutagenicity

. The classification criteria are not met given the available data.

Carcinogenicity

. The classification criteria are not met given the available data.

Reproductive toxicity

. The classification criteria are not met given the available data.

Specific target organ toxicity - single exposure

. The classification criteria are not met given the available data.

Specific target organ toxicity - repeated exposure

. The classification criteria are not met given the available data.

Aspiration hazard

. The classification criteria are not met given the available data.

Most important symptoms and effects, both acute and delayed :

Skin contact : Corrosive : Causes burns.

Symptoms: Redness, swollen tissues, burns.

Eye contact : Causes serious eye damage.

Can cause irreversible effects on the eyes such as ocular tissue lesions or serious damage to the sight.

Ingestion : Harmful if swallowed.

Causes severe burns in mouth and digestive tract.

Inhalation : May cause a respiratory system irritation.

SECTION 12: Ecological information

12.1. à 12.4. Toxicity - Persistence and degradability - Bioaccumulative potential - Mobility in soil

Substance-related data:

Acute toxicity

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Sulphamic acid : LC 50 - 96h fishes (Pimephales promelas) 70.3 mg/L. - MSDS supplier
Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : EC 50 - 96h algae 47.3 mg/L. - MSDS supplier
Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : LC 50 - 96h fishes 1.67 mg/L. - MSDS supplier
Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : LC 50 - 48h daphnia 2.4 mg/L. - MSDS supplier
Sulphamic acid : EC 50 - 96h daphnia (Daphnia magna) 71.6 mg/L. - MSDS supplier
Sulphamic acid : EC 50 - 72h algae 48 mg/L. - MSDS supplier
Sodium chloride + Troclosesone sodium (100%) : LC 50 - 48hours daphnia 0.196 mg/L. - MSDS supplier

Chronic toxicity

Sulphamic acid : NOEC - 72h algae 18 mg/L. - MSDS supplier
Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : NOEC - 96days fishes 0.268 mg/L. - MSDS supplier

Degradability

Benzenesulfonic acid, mono-C10-13-alkyl derivs., sodium salts : 28days (OECD 301B): 85 %. Easily biodegradable. - MSDS supplier

Mix-related data:

Acute toxicity

LC 50 - 96h fishes (Oncorhynchus mykiss) (OECD 203): 41.7 mg/L.
EC 50 - 72h algae (Selenastrum capricornutum) (OECD 201): 0.747 mg/L.
EC 50 - 48h daphnia (Daphnia magna) (OECD 202): 5.10 mg/L.
LC 50 - 14 jours Earthworms (Eisenia foetida) (OECD 207): > 1,000 mg/kg.
EC 50 Activated mud (OECD 209): 215.9 mg/L.

Chronic toxicity

NOEC algae (Selenastrum capricornutum) 0.117 mg/L.
NOEC daphnia (Daphnia magna) (OECD 201): 2.07 mg/L.

Bioaccumulation

. No data available.

Mobility

. No data available.

Conclusion :

The mixture is considered to be dangerous for the environment according to 1272/2008/EC Regulation.

12.5. Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be a PBT or a vPvB

12.6. Other adverse effects

No additional information available.

SECTION 13: Disposal considerations

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13.1. Waste treatment methods

Treatment of the mixture :

Do not discharge the product directly to sewer or to environment.

Comply with Directive 2008/98/EC of 19/11/2008 amended, relating to waste and to Decision 2000/532/EC (amended ultimately by Decision 2014/955/EC) that establishes a list of hazardous waste that must be taken to an approved centre.

Packaging treatment :

Rinse thoroughly the packaging with water and treat the effluent like wastes.

Comply with Directive 2008/98/EC of 19/11/2008 amended, relating to waste and to Decision 2000/532/EC (amended ultimately by Decision 2014/955/EC) that establishes a list of hazardous waste that must be taken to an approved centre.

SECTION 14: Transport information

ROAD TRANSPORT:

Rail/Route (RID/ADR)

UN no : 3260

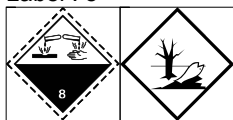
UN proper shipping name : ACID, CORROSIVE, INORGANIC SOLID, N.O.S. (Bis(peroxymonosulfate)bis(sulfate) of pentapotassium)

Transport hazard class(es) : 8

Packing group : II

Hazard code : 80

Label : 8



Tunnel code : E

Environmental hazard : Yes (Trosclosene sodium)

Special precautions for user : No information.

Limited Quantity (QL): 1kg

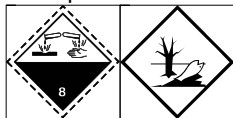
MARITIME TRANSPORT :

IMDG

UN no :3260

UN proper shipping name : ACID, CORROSIVE, INORGANIC SOLID, N.O.S. (Bis(peroxymonosulfate)bis(sulfate) of pentapotassium)

Transport hazard class(es) : 8



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Packing group : II
Marine pollutant : Yes (Troclosene sodium)
Special precautions for user : No information.
EmS number : F-A, S-B
Limited Quantity (QL): 1kg

Transport in bulk according to Annex II of MARPOL and the IBC Code :
Not concerned

SECTION 15: Regulatory information

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

Regulations relating to the hazards from major accidents :
SEVESO 3 Directive (2012/18/EC) : E2

Regulations relating to the classification, packing and labelling of substances and mixes :
Regulation 1272/2008/EC amended.

Waste regulations :
2008/98/EC Directive amended by 2015/1127/EC Directive - Regulation 1357/2014/EC
Decision 2014/955/EC which establishes the list of hazardous waste.

Protection of workers :
Directive 98/24/EC of 07/04/1998 on the protection of the health and safety of workers from the risks related to chemical agents at work.

Regulation 850/2004/EC on persistent organic pollutants and modifying Directive 79/117/EC : Not applicable

Regulation 1005/2009/EC amended on substances that deplete the ozone layer : Not applicable

Regulation (EC) 648/2004 :
Not concerned

Comply with national and local legislation.

15.2. Chemical safety assessment

No

SECTION 16: Other information

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The safety data sheet is additional to the technical data sheet but does not replace it. The information given here in is to the best of our knowledge correct and is given in good faith. We must also draw the user's attention on potential risks of the product is used for other purposes for which the product is known. In no way does it exempt users from being aware of and complying with regulations applicable to their activity. It is their sole responsibility to take all necessary precautions in accordance to the usage of the product they are aware of.

Regulations are only stated in order to help users fulfill the duties involved in the use of the product.

This description should not be considered as exhaustive. It does not exempt users from ensuring if other demands need to be complied with-according to other laws than the ones hereby stated and applicable to holding and usage of the product-demands for which they will remain sole responsibility.

Section(s) modified compared with the previous version :

Not concerned

List of H phrases referred to in sections 2 and 3 :

H272 : May intensify fire; oxidiser.

H302 : Harmful if swallowed.

H314 : Causes severe skin burns and eye damage.

H315 : Causes skin irritation.

H318 : Causes serious eye damage.

H319 : Causes serious eye irritation.

H335 : May cause respiratory irritation.

H400 : Very toxic to aquatic life.

H410 : Very toxic to aquatic life with long lasting effects.

H412 : Harmful to aquatic life with long lasting effects.

Sources of key data used to compile the data sheet :

MSDS supplier

Historical :

Version 6.0.0

Cancels and replaces previous version .