

SECTION 1: Product and company identification

Product name : Vanquish Disinfectant
 Use of the substance/mixture : Disinfectant
 Product code : 0175
 Company : Total Solutions
 P.O. Box 240014
 Milwaukee, WI 53224 - USA
 T (414) 354-6417
 Emergency number : Chemtec: (800) 424-9300

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

GHS-US classification

Skin Corr. 1B H314

2.2. Label elements

GHS-US labeling

Hazard pictograms (GHS-US) :



GHS05

Signal word (GHS-US) :

Danger

Hazard statements (GHS-US) :

Causes severe skin burns and eye damage

Precautionary statements (GHS-US) :

Do not breathe spray
 Wash thoroughly after handling
 Wear eye protection, protective gloves
 If swallowed: rinse mouth. Do NOT induce vomiting
 If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower
 If inhaled: Remove person to fresh air and keep comfortable for breathing
 If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing
 Immediately call a doctor
 Specific treatment (see First aid measures on this label)
 Wash contaminated clothing before reuse
 Store locked up
 Dispose of contents/container to comply with local/regional/national/international regulations

2.3. Other hazards

No additional information available

2.4. Unknown acute toxicity (GHS US)

Not applicable

SECTION 3: Composition/Information on ingredients

3.1. Substances

Not applicable

Full text of H-phrases: see section 16

3.2. Mixtures

Name	Product identifier	%	GHS-US classification
Quaternary ammonium compounds, benzyl-C12-16-alkyldimethyl, chlorides	(CAS-No.) 68424-85-1	1 - 5	Acute Tox. 4 (Oral), H302 Skin Corr. 1B, H314
Alcohols (c12-15 Ln. Saturated) Ethoxylate	(CAS-No.) 68131-39-5	1 - 5	Acute Tox. 4 (Oral), H302 Eye Dam. 1, H318
tetrasodium ethylenediaminetetracetate	(CAS-No.) 64-02-8	1 - 5	Acute Tox. 4 (Oral), H302 Eye Dam. 1, H318
QUATERNIUM-24	(CAS-No.) 32426-11-2	0.5 - 1.5	Acute Tox. 4 (Oral), H302 Skin Corr. 1B, H314

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Name	Product identifier	%	GHS-US classification
didecyldimethylammonium chloride	(CAS-No.) 7173-51-5	0.5 - 1.5	Acute Tox. 3 (Oral), H301 Skin Corr. 1B, H314
Dimethyldioctylammonium chloride	(CAS-No.) 5538-94-3	0.5 - 1.5	Acute Tox. 4 (Oral), H302 Skin Corr. 1B, H314

A specific chemical identity and/or percentage of composition has been withheld as a trade secret. Any concentration shown as a range is to protect confidentiality or is due to batch variation.

SECTION 4: First aid measures

4.1. Description of first aid measures

- First-aid measures general : If you feel unwell, seek medical advice (show the label where possible).
- First-aid measures after inhalation : Remove victim to fresh air and keep at rest in a position comfortable for breathing.
- First-aid measures after skin contact : Rinse immediately contaminated clothing and skin with plenty of water before removing clothes. Take victim to a doctor if irritation persists.
- First-aid measures after eye contact : Rinse immediately with plenty of water for 15 minutes. Take victim to an ophthalmologist.
- First-aid measures after ingestion : Immediately call a poison center or doctor/physician. Rinse mouth. Do NOT induce vomiting. Drink plenty of water.

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

- Symptoms/effects : Causes severe skin burns and eye damage.
- Symptoms/effects after inhalation : Corrosive to the respiratory tract.
- Symptoms/effects after skin contact : Caustic burns/corrosion of the skin.
- Symptoms/effects after eye contact : Causes serious eye irritation. Corrosion of the eye tissue. Permanent eye damage.
- Symptoms/effects after ingestion : Burns to the gastric/intestinal mucosa.

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

No additional information available

SECTION 5: Firefighting measures

5.1. Extinguishing media

- Suitable extinguishing media : All extinguishing media allowed.

5.2. Special hazards arising from the substance or mixture

- Reactivity : Upon combustion: CO and CO₂ are formed.

5.3. Advice for firefighters

- Firefighting instructions : Exercise caution when fighting any chemical fire. Use water moderately and if possible collect or contain it. Use water spray or fog for cooling exposed containers.
- Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

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

6.1.1. For non-emergency personnel

- Protective equipment : Gloves. Protective goggles. Face-shield.
- Emergency procedures : Keep upwind.

6.1.2. For emergency responders

- Protective equipment : Equip cleanup crew with proper protection.
- Emergency procedures : Stop leak if safe to do so. Stop release. Ventilate area.

6.2. Environmental precautions

Avoid release to the environment. Prevent soil and water pollution.

6.3. Methods and material for containment and cleaning up

- For containment : Contain released substance, pump into suitable containers.
- Methods for cleaning up : This material and its container must be disposed of in a safe way, and as per local legislation.

6.4. Reference to other sections

No additional information available

SECTION 7: Handling and storage

7.1. Precautions for safe handling

- Precautions for safe handling : Carry operations in the open/under local exhaust/ventilation or with respiratory protection. Do not handle until all safety precautions have been read and understood. Use personal protective equipment as required.
- Hygiene measures : Do not eat, drink or smoke when using this product. Wash contaminated clothing before reuse.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions	: Keep container closed when not in use. Store in original container.
Incompatible products	: Strong acids.
Storage area	: Keep only in the original container. Store in a dry area. Store in a cool area.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Quaternary ammonium compounds, benzyl-C12-16-alkyldimethyl, chlorides (68424-85-1)
Not applicable
QUATERNIUM-24 (32426-11-2)
Not applicable
didecyldimethylammonium chloride (7173-51-5)
Not applicable
Dimethyldioctylammonium chloride (5538-94-3)
Not applicable
Alcohols (c12-15 Ln. Saturated) Ethoxylate (68131-39-5)
Not applicable
tetrasodium ethylenediaminetetracetate (64-02-8)
Not applicable

8.2. Exposure controls

Personal protective equipment : Gloves. Safety glasses. Protective clothing. Use appropriate personal protective equipment when risk assessment indicates this is necessary.



SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	: Liquid
Appearance	: Clear, colorless liquid.
Odor	: Mild odor
Odor threshold	: No data available
pH	: 12.4
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
Explosion limits	: No data available
Explosive properties	: No data available
Oxidizing properties	: No data available
Vapor pressure	: No data available
Relative density	: No data available
Relative vapor density at 20 °C	: No data available
Specific gravity / density	: 1 g/ml
Solubility	: Soluble in water.
Log Pow	: No data available
Log Kow	: No data available
Auto-ignition temperature	: No data available

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Decomposition temperature	: No data available
Viscosity	: No data available
Viscosity, kinematic	: No data available
Viscosity, dynamic	: No data available
VOC content	: < 1 %

SECTION 10: Stability and reactivity

10.1. Reactivity

Upon combustion: CO and CO₂ are formed.

10.2. Chemical stability

No additional information available

10.3. Possibility of hazardous reactions

No additional information available

10.4. Conditions to avoid

No additional information available

10.5. Incompatible materials

May be corrosive to metals. Strong acids. metals.

10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity : Not classified

Quaternary ammonium compounds, benzyl-C12-16-alkyldimethyl, chlorides (68424-85-1)	
LD50 oral rat	344 mg/kg
LD50 dermal rabbit	3340 mg/kg
ATE CLP (oral)	344.000 mg/kg body weight
ATE CLP (dermal)	3340.000 mg/kg body weight

didecyldimethylammonium chloride (7173-51-5)	
LD50 oral rat	238 mg/kg Method: OECD Test Guideline 401
LD50 dermal rabbit	3342 mg/kg
ATE CLP (oral)	238.000 mg/kg body weight
ATE CLP (dermal)	3342.000 mg/kg body weight

Alcohols (c12-15 Ln. Saturated) Ethoxylate (68131-39-5)	
LD50 oral rat	> 2000 mg/kg
LD50 dermal rabbit	> 2000 mg/kg

tetrasodium ethylenediaminetetracetate (64-02-8)	
LD50 oral rat	> 2000 mg/kg (Rat)
ATE CLP (oral)	500.000 mg/kg body weight

Skin corrosion/irritation	: Causes severe skin burns and eye damage. pH: 12.4
Serious eye damage/irritation	: Not classified pH: 12.4
Respiratory or skin sensitization	: Not classified
Germ cell mutagenicity	: Not classified
Carcinogenicity	: Not classified
Reproductive toxicity	: Not classified
Specific target organ toxicity – single exposure	: Not classified
Specific target organ toxicity – repeated exposure	: Not classified
Aspiration hazard	: Not classified
Symptoms/effects after inhalation	: Corrosive to the respiratory tract.
Symptoms/effects after skin contact	: Caustic burns/corrosion of the skin.

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Symptoms/effects after eye contact	: Causes serious eye irritation. Corrosion of the eye tissue. Permanent eye damage.
Symptoms/effects after ingestion	: Burns to the gastric/intestinal mucosa.
Likely routes of exposure	: Skin and eye contact

SECTION 12: Ecological information

12.1. Toxicity

Alcohols (c12-15 Ln. Saturated) Ethoxylate (68131-39-5)	
LC50 fish 1	5 - 10 mg/l Fish
EC50 Daphnia 1	5 - 10 mg/l Daphnia
ErC50 (algae)	10 - 100 mg/l Algae
tetrasodium ethylenediaminetetracetate (64-02-8)	
LC50 fish 1	121 mg/l (LC50; 96 h)
EC50 Daphnia 1	625 mg/l (EC50; 24 h)
Threshold limit algae 1	> 100 mg/l (EC0; 72 h)

12.2. Persistence and degradability

tetrasodium ethylenediaminetetracetate (64-02-8)	
Persistence and degradability	Not readily biodegradable in water.
Biochemical oxygen demand (BOD)	< 0.002 g O ₂ /g substance
Chemical oxygen demand (COD)	0.54 - 0.58 g O ₂ /g substance

12.3. Bioaccumulative potential

tetrasodium ethylenediaminetetracetate (64-02-8)	
Log Pow	-2.6
Bioaccumulative potential	Bioaccumulation: not applicable.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Product/Packaging disposal recommendations	: Dispose in a safe manner in accordance with local/national regulations.
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SECTION 14: Transport information

Department of Transportation (DOT)

Transport document description	: UN1903 Disinfectants, liquid, corrosive n.o.s. (Quaternary Ammonium Chloride), 8, II
UN-No.(DOT)	: UN1903
Proper Shipping Name (DOT)	: Disinfectants, liquid, corrosive n.o.s.
Class (DOT)	: 8 - Class 8 - Corrosive material 49 CFR 173.136
Hazard labels (DOT)	: 8 - Corrosive



Packing group (DOT)	: II - Medium Danger
DOT Packaging Non Bulk (49 CFR 173.xxx)	: 202
DOT Packaging Bulk (49 CFR 173.xxx)	: 242
DOT Symbols	: G - Identifies PSN requiring a technical name
DOT Special Provisions (49 CFR 172.102)	: B2,IB2,T7,TP2
DOT Packaging Exceptions (49 CFR 173.xxx)	: 154
DOT Quantity Limitations Passenger aircraft/rail (49 CFR 173.27)	: 1 L
DOT Quantity Limitations Cargo aircraft only (49 CFR 175.75)	: 30 L
DOT Vessel Stowage Location	: B

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Additional information

Emergency Response Guide (ERG) : 153
Number
Other information : No supplementary information available.

ADR

No additional information available

Transport by sea

No additional information available

Air transport

No additional information available

SECTION 15: Regulatory information

All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substances Control Act (TSCA) inventory

This product or mixture is not known to contain a toxic chemical or chemicals in excess of the applicable de minimis concentration as specified in 40 CFR §372.38(a) subject to the reporting requirements of section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372.

This chemical is a pesticide product registered by the Environmental Protection Agency and is subject to certain labelling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets, and for workplace labels of non-pesticide chemicals. Following is the hazard information as required on the pesticide label:

DANGER. CORROSIVE. Causes irreversible eye damage and skin burns. Do not get in eyes, on skin or on clothing. Wear protective eyewear (goggles, face shield, or safety glasses), protective (rubber or chemical resistant) gloves and protective clothing. Harmful if swallowed or absorbed through the skin. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco or using the toilet. Remove contaminated clothing and wash clothing before reuse.

California Proposition 65 - This product does not contain substances known to the state of California to cause cancer and/or reproductive toxicity

SECTION 16: Other information

Training advice : Normal use of this product shall imply use in accordance with the instructions on the packaging.

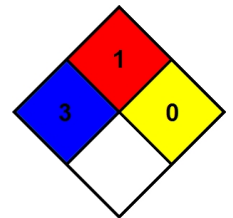
Full text of H-phrases:

H301	Toxic if swallowed
H302	Harmful if swallowed
H314	Causes severe skin burns and eye damage
H318	Causes serious eye damage

NFPA health hazard : 3 - Materials that, under emergency conditions, can cause serious or permanent injury.

NFPA fire hazard : 1 - Materials that must be preheated before ignition can occur.

NFPA reactivity : 0 - Material that in themselves are normally stable, even under fire conditions.



Prepared by: Technical Department

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. No warranty is expressed or implied regarding the accuracy of this data or the results obtained from the use thereof. Our company assumes no responsibility for personal injury or property damage to the vendee, users or third parties caused by the material. Such vendees or users assume all risks associated with the use of this material.