



July 8, 2001

PRODUCT DATA SHEET

Witcamine 4130A

Applications

Wetting agent and biological enhancer for herbicides

Description

Alkoxyated Fatty Amine

Characteristics

| | <i>Typical</i> | <i>Specification</i> | <i>Test Methods*</i> |
|--|----------------|----------------------|----------------------|
| <i>Appearance at 25 °C</i> | | amber liquid | Visual |
| <i>Color, gardner</i> | | 5-8 | KL 31500 |
| <i>Moisture, %</i> | | 5 max | KL 510.00 |
| <i>pH at 1% water</i> | | 8.5-10.5 | KL 502.50 |
| <i>Pour point, °C</i> | 10-12 | | KL 346.00 |
| <i>Flash point, (seta) °C</i> | >90 | | KL 343.80 |
| <i>Specific gravity at 25 °C, g/ml</i> | 1.040 | | KL 321.90 |

Solubility At 10%

| | |
|----------------|-----------|
| In water | soluble |
| In isopropanol | soluble |
| In kerosene | insoluble |
| In mineral oil | insoluble |

EPA Classification

Exempt from tolerance under EPA regulation 40 CRF 180. 1001(d)

Precaution For Use

Avoid eyes and skin contact. During handling, wear rubber gloves and chemical splash goggles. In case of eye contact, flush with large amount of water for at least 15 minutes and get medical attention. In case of skin contact, wash with water. For more safety information, consult Witcamine 4130's MSDS.

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SAFETY DATA SHEET

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY UNDERTAKING

Trade name WITCAMINE 4130A

Chemical description/Application Wetting agent

Supplier Akzo Nobel Surface Chemistry Pte Ltd
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SINGAPORE 117610
Tel: +65 6773 8488
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Emergency telephone + 31 570679211 (Fax: +31 570679801)
Akzo Nobel Chemicals, Deventer, NL

2. COMPOSITION/INFORMATION ON INGREDIENTS

This product is to be considered as a substance according to EU-legislation.

| Substance name | CAS number | Concentration | Symbols | Risk phrases |
|------------------------------|--|---------------|---------|-----------------|
| Tallow alkylamine ethoxylate | 61791-26-2 | 100 % | Xn ,N | R-22, 41, 51/53 |
| Other information | The substance is registered in EINECS. (polymer) | | | |

3. HAZARDS IDENTIFICATION

Harmful. Harmful if swallowed. Risk of serious damage to eyes. Dangerous for the environment. Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

4. FIRST AID MEASURES

General Get medical attention immediately.

Inhalation Not relevant.

Skin Rinse with water.

Eyes Immediately rinse with water for several minutes. Hold eyelids apart. Get medical attention immediately. Continue to rinse during transport.

Ingestion Rinse nose, mouth and throat with water. Drink plenty of water. Obtain medical attention.

5. FIRE FIGHTING MEASURES

Extinguishing media Water spray, fog or mist, foam, powder, carbon dioxide.

Special fire fighting procedures Note that fire-extinction with water may discharge substances dangerous to the environment into sewage, wells and watercourses.

Unusual fire hazards Non-flammable. If involved in a fire it will support combustion.

Hazardous combustion products Carbon monoxide, carbon dioxide, nitrous gases.

6. ACCIDENTAL RELEASE MEASURES

| | |
|----------------------------------|--|
| Personal precautions | For personal protection see Section 8. |
| Environmental precautions | Do not contaminate drains or water courses. |
| Methods for cleaning up | Contain spill with inert material. Absorb in vermiculite, dry sand or earth. Place in container for disposal according to local regulations. |

7. HANDLING AND STORAGE

| | |
|-----------------|--|
| Handling | The usual precautions for handling chemicals should be observed. |
| Storage | No specific storage precautions noted. |

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

| | |
|-----------------------------|---|
| Exposure limits | |
| Comments | No exposure limits have been established. |
| Engineering controls | Provide eyewash station. |
| Personal protection | |
| Hand | Use protective gloves made of: Neoprene or nitrile. |
| Eyes | Wear approved safety goggles. |

9. PHYSICAL AND CHEMICAL PROPERTIES

| | | | |
|--------------------------------------|------------------------|-------------------------|---------|
| Appearance | Liquid. | | |
| Colour | Amber. | | |
| Boiling point/range (°C) | > 100 | Pressure (kPa) | 760mmHg |
| Melting point/range (°C) | < 12 | | |
| Flash point (°C) | > 100 | Method | |
| Autoignition temperature (°C) | > 150 | | |
| Lower explosion limit (vol %) | - | | |
| Upper explosion limit (vol %) | - | | |
| Density (kg/m³) | ~ 1055 | Temperature (°C) | 20 |
| Viscosity | > 300 mPas | Temperature (°C) | 20 |
| pH value diluted solution | 8,5-10,5 | Conc. (%) | 1 |
| Solubility in water | Soluble. | | |
| Solubility in other solvents | Soluble in 2-propanol. | | |

(These data are typical for the product and not a specification)

10. STABILITY AND REACTIVITY

| | |
|---|------------------|
| Stability | Normally stable. |
| Hazardous decomposition products | Not known. |

11. TOXICOLOGICAL INFORMATION

Toxicological data

Health effects

| | |
|--------------------|--|
| Respiratory | Inhalation of vapour may cause irritation of nose, throat and airway. |
| Skin | Defats the skin. Prolonged or frequent contact may give transient redness and skin cracking. |
| Eyes | Severely irritating. Risk of serious damage to eye. |
| Ingestion | Moderate acute toxicity. May cause irritation to mucous membranes in mouth and throat. |

Component Tallow alkylamine ethoxylate

Toxicological data

LD50. oral Rat. 200-2000 mg/kg ¹⁾

Toxicological information 1) The value is estimated from tests on similar products.

12. ECOLOGICAL INFORMATION

Ecotoxicological data

| | |
|----------------------|---|
| Ecotoxicology | The product contains substance(s) classified as toxic to aquatic organisms. |
| Degradation | The product is classified as not readily biodegradable. |

Component Tallow alkylamine ethoxylate

Ecotoxicological data

| | |
|--|---|
| | LC50 96 hours <i>Oncorhynchus mykiss</i> (fish) > 1-10 mg/l ¹⁾ |
| | EC50 48 hours <i>Daphnia magna</i> > 1-10 mg/l ¹⁾ |
| Ecotoxicology | Toxic to aquatic organisms. |
| Degradation | Ultimately biodegradable. >70% DOC, Modified Zahn-Wellens Test (OECD 302B). <70% DOC, 28 days, Modified OECD Screening Test (OECD 301E). (The data are estimated from tests on similar products.) |
| Partition coefficient (log Pow) | - |
| Other information | ¹⁾ The data are estimated from tests on similar products. |

13. DISPOSAL CONSIDERATIONS

| | |
|-------------------------|---|
| Disposal methods | Incineration is recommended. Dispose of in accordance with local authority requirements. |
| Waste category | Hazardous waste in accordance with the Council Directive 91/689/EEC of 12 December 1991 on hazardous waste. |

14. TRANSPORT INFORMATION**Land transport****Sea transport**

| | | | |
|---------------------------|---|-------------------------|-----|
| UN number | - | | |
| IMDG class | - | EmS | - |
| IMDG packing group | - | Marine pollutant | No. |

Air transport

| | | | |
|------------------------|---|------------------------|---|
| UN number | - | Subsidiary risk | - |
| IATA/ICAO class | - | Packing group | - |

Other information Not dangerous goods according to international transport regulations.

15. REGULATORY INFORMATION

Substance name Tallow alkylamine ethoxylate

Symbols

| | |
|-----------------------|--|
| Risk phrases | R-22 Harmful if swallowed. R-41 Risk of serious damage to eye. R-51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment. |
| Safety phrases | S-26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. S-39 Wear eye/face protection. S-57 Use appropriate containment to avoid environmental contamination. |
| EU directive | Safety Data Sheet according to EC-directive 2001/58/EC.. |

16. OTHER INFORMATION

This information only concerns the above mentioned product as supplied and may not be valid if used with other product(s) or in any process. It remains the user's own responsibility to make sure that the information is appropriate and complete for his special use of this product.

| | |
|---|--|
| Composed by | Barbro Dihné Eva Cassel |
| Explanations to R-phrases in section 2 | R-22 Harmful if swallowed. R-41 Risk of serious damage to eye. R-51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment. |
| Date of printing | 2003-11-13 |