Conforms to Regulation (EC) No. 1907/2006 (REACH), Annex II / Regulation (EU) No. 2015/830. - Netherlands

23.11.2020

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# SAFETY DATA SHEET

Fertigro KZZ

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

**1.1** Product identifier

| Product name | 10 | YaraTera SUBSTRAFEED KALISUL |
|--------------|----|------------------------------|
| Product code | :  | PZ03FL                       |
| Product type | :  | Liquid                       |

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

| Identified uses   |  |
|---|--|
| Industrial distribution.  |  |
| Industrial USE to formulate chemical product mixtures.  |  |
| Professional formulation of fertiliser products.<br>Professional USE as fertiliser at Farm - loading and spreading. |  |
| Professional USE as fertiliser in Greenhouse.   |  |
| Professional USE as liquid fertiliser in open field.  |  |
| Professional USE as fertiliser - maintenance of equipment.  |  |
|   |  |

| Uses advised against | : Other non-specified industry   |
|----------------------|--|
| Reason               | <ul> <li>Due to lack of related experience or data, the supplier<br/>cannot approve this use.</li> </ul> |

### 1.3 Details of the supplier of the safety data sheet

|                          | Yara Vlaardingen B.V.   |
|--------------------------|-------------------------|
| <u>Address</u>           | -                       |
| Street                   | <br>Zevenmanshaven Oost |
| Number                   | <br>67                  |
| Postal code              | <br>3133 CA             |
| City                     | <br>Vlaardingen         |
| Country                  | <br>Netherlands         |
| Telephone number         | <br>+31 10 445 2000     |
| Fax no.                  | <br>31 10 445 2009      |
| e-mail address of person | <br>yaraquest@yara.com  |
| responsible for this SDS |                         |

#### **1.4 Emergency telephone number**

| National advisory body/Poison Center                                       |   |   |  |  |  |
|--|---|---|--|--|--|
| Name<br>Telephone number   | : | Nationaal Vergiftigings Informatie Centrum<br>+31 (0) 30 274 88 88 Uitsluitend bestemd om<br>professionele hulpverleners te informeren bij acute<br>vergiftigingen. (Only intended to inform professionals<br>in acute poisonings.) |  |  |  |
| Hours of operation   | : | 24h   |  |  |  |
| <u>Supplier</u><br>Emergency telephone number<br>(with hours of operation) | : | +44 1235239670<br>24 h  |  |  |  |

# **SECTION 2: Hazards identification**

|  | 2.1 | Classification | of the | substance | or | mixture. |
|--|-----|----------------|--------|-----------|----|----------|
|--|-----|----------------|--------|-----------|----|----------|

| Product definition | : | Mixture |
|--------------------|---|---------|
|--------------------|---|---------|

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

| Classification | : | Met. Corr. 1, H290 |
|----------------|---|--------------------|
|                |   | Skin Corr. 1, H314 |
|                |   | Eye Dam. 1, H318   |

The product is classified as hazardous according to Regulation (EC) 1272/2008 as amended.

See Section 16 for the full text of the H statements declared above. See Section 11 for more detailed information on health effects and symptoms.

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#### 2.2 Label elements

Hazard pictograms

| nazara protogramo          |   |              | •   |
|----------------------------|---|--------------|---|
| Signal word                | : | Danger       |   |
| Hazard statements          | : | H290<br>H314 | May be corrosive to metals.<br>Causes severe skin burns and eye damage.                   |
| Precautionary statements   |   |              |   |
| Prevention                 | : | P260<br>P280 | Do not breathe gas or vapour.<br>Wear protective gloves/clothing and eye/face protection. |
| Response                   | : | P305<br>P351 | IF IN EYES:<br>Rinse cautiously with water for several<br>minutes.                        |
|                            |   | P338         | Remove contact lenses, if present and easy to do. Continue rinsing.                       |
|                            |   | P310         | Immediately call a POISON CENTER or doctor/physician.                                     |
|                            |   | P303         | IF ON SKIN (or hair):   |
|                            |   | P361         | Take off immediately all contaminated   |
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| Storage<br>Hazardous ingredients   | :        | P353<br>P234<br>sulphuric a | clothing.<br>Rinse skin with water.<br>Keep only in original packaging.<br>cid |
|--|----------|-----------------------------|--|
| EU Regulation (EC) No.<br><u>1907/2006 (REACH) Annex XVII</u><br>- Restrictions on the<br>manufacture, placing on the<br>market and use of certain<br>dangerous substances,<br>mixtures and articles | :        | Applicable,                 | Table 3.   |
| Special packaging requirements   | <u>s</u> |                             |  |
| Containers to be fitted with   | :        | Not applica                 | ble.   |
| child-resistant fastenings<br>Tactile warning of danger  | :        | Not applica                 | ble.   |
| 2.3 Other hazards  |          |                             |  |
|  |          | ure does not<br>vPvB.       | contain any substances that are assessed to be a                               |
| Other hazards which do not result in classification  | :        | None know                   | 'n.  |

### **SECTION 3: Composition/information on ingredients**

3.2 Mixtures

Mixture

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| Product/ingredient<br>name | Identifiers  | %                | Regulation (EC) No. 1272/2008 [CLP]     | Туре    |
|----------------------------|--|------------------|---|---------|
| sulphuric acid             | RRN:<br>01-2119458838-<br>20<br>EC:<br>231-639-5<br>CAS :<br>7664-93-9<br>Index:<br>016-020-00-8 | >= 10 -<br><= 15 | Skin Corr. 1A, H314<br>Eye Dam. 1, H318 | [1] [2] |

<u>Type</u>

[1] Substance classified with a physical, health or environmental hazard

[2] Substance with a workplace exposure limit

[3] Substance meets the criteria for PBT according to Regulation (EC) No. 1907/2006, Annex XIII

[4] Substance meets the criteria for vPvB according to Regulation (EC) No. 1907/2006, Annex XIII

[5] Substance of equivalent concern

See Section 16 for the full text of the H statements declared above.

There are no additional ingredients present which, within the current knowledge of the supplier and in

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|----------------------------|-----------|

the concentrations applicable, are classified as hazardous to health or the environment, are PBTs, vPvBs or Substances of equivalent concern, or have been assigned a workplace exposure limit and hence require reporting in this section.

Occupational exposure limits, if available, are listed in Section 8.

### **SECTION 4: First aid measures**

#### 4.1 Description of first aid measures

| Eye contact   | : | Immediately flush eyes with running water for at least 15<br>minutes, keeping eyelids open. Check for and remove any<br>contact lenses. Get medical attention immediately. Chemical<br>burns must be treated promptly by a physician.   |  |  |
|---|---|---|--|--|
| Inhalation  | : | Avoid inhalation of vapor, spray or mist. If inhaled, remove to<br>fresh air. Get medical attention immediately. If it is suspected<br>that fumes are still present, the rescuer should wear an<br>appropriate mask or self-contained breathing apparatus.  |  |  |
| Skin contact  | : | In case of contact, immediately flush skin with plenty of water for<br>at least 15 minutes while removing contaminated clothing and<br>shoes. Get medical attention immediately. Chemical burns must<br>be treated promptly by a physician.   |  |  |
| Ingestion   | : | Wash out mouth with water. If material has been swallowed and<br>the exposed person is conscious, give small quantities of water<br>to drink.   |  |  |
| Protection of first-aiders                                      | : | No action shall be taken involving any personal risk or without<br>suitable training. If it is suspected that fumes are still present, the<br>rescuer should wear an appropriate mask or self-contained<br>breathing apparatus. Wash contaminated clothing thoroughly<br>with water before removing it, or wear gloves. |  |  |
| 4.2 Most important symptoms and effects, both acute and delayed |   |   |  |  |

| Over-exposure signs/symptoms   | 5               |  |  |  |  |
|--|-----------------|--|--|--|--|
| Eye contact  | :               | Adverse symptoms may include the following: pain, watering, redness  |  |  |  |
| Inhalation   | 1               | No specific data.  |  |  |  |
| Skin contact   | 1               | Adverse symptoms may include the following: pain or irritation, blistering may occur   |  |  |  |
| Ingestion  | :               | May cause burns to mouth, throat and stomach.  |  |  |  |
| 4.3 Indication of any immediate medical attention and special treatment needed |                 |  |  |  |  |
| 4.3 Indication of any immediate  | mee             | dical attention and special treatment needed   |  |  |  |
| <b><u>4.3 Indication of any immediate</u></b><br>Notes to physician            | <u>meo</u><br>: | dical attention and special treatment needed<br>Treat symptomatically. Contact poison treatment specialist<br>immediately if large quantities have been ingested or inhaled. |  |  |  |

### **SECTION 5: Firefighting measures**

### 5.1 Extinguishing media

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| Suitable extinguishing media                   | -   | Use an extinguishing agent suitable for the surrounding fire.  |
|--|-----|--|
| Unsuitable extinguishing media                 | :   | None identified.   |
| 5.2 Special hazards arising from               | the | substance or mixture   |
| Hazards from the substance or mixture          | :   | In a fire or if heated, a pressure increase will occur and the<br>container may burst. Reacts violently with water. Attacks<br>many metals producing extremely flammable hydrogen gas<br>which can form explosive mixtures with air. Acidic. In a fire,<br>decomposition may produce toxic gases/fumes.  |
| Hazardous combustion<br>products               | :   | Decomposition products may include the following<br>materials: sulfur oxides, metal oxide/oxides, Avoid<br>breathing dusts, vapors or fumes from burning materials.,<br>In case of inhalation of decomposition products in a fire,<br>symptoms may be delayed.   |
| 5.3 Advice for firefighters                    |     |  |
| Special protective actions for fire-fighters   | :   | Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.  |
| Special protective equipment for fire-fighters | :   | Fire-fighters should wear appropriate protective equipment<br>and self-contained breathing apparatus (SCBA) with a full<br>face-piece operated in positive pressure mode. Clothing for<br>fire-fighters (including helmets, protective boots and gloves)<br>conforming to European standard EN 469 will provide a basic<br>level of protection for chemical incidents. |

# **SECTION 6: Accidental release measures**

6.1 Personal precautions, protective equipment and emergency procedures

| For non-emergency personnel      | :    | No action shall be taken involving any personal risk or without<br>suitable training. Evacuate surrounding areas. Keep<br>unnecessary and unprotected personnel from entering. Do not<br>touch or walk through spilled material. Do not breathe vapor<br>or mist. Provide adequate ventilation. Wear appropriate<br>respirator when ventilation is inadequate. Put on appropriate<br>personal protective equipment (see Section 8). |
|----------------------------------|------|---|
| For emergency responders         | :    | If specialized clothing is required to deal with the spillage, take<br>note of any information in Section 8 on suitable and unsuitable<br>materials. See also the information in "For non-emergency<br>personnel".  |
| 6.2 Environmental precautions    | :    | Avoid dispersal of spilled material and runoff and contact with<br>soil, waterways, drains and sewers. Inform the relevant<br>authorities if the product has caused environmental pollution<br>(sewers, waterways, soil or air).  |
| 6.3 Methods and materials for co | onta | inment and cleaning up  |
| Small spill                      | :    | Stop leak if without risk. Move containers from spill area.<br>Dilute with water and mop up if water-soluble. Alternatively, or   |
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|                                    | if water-insoluble, absorb with an inert dry material and place<br>in an appropriate waste disposal container. Absorb spillage to<br>prevent material damage. Dispose of via a licensed waste<br>disposal contractor.   |
|------------------------------------|---|
| Large spill                        | : Stop leak if without risk. Move containers from spill area.<br>Absorb spillage to prevent material damage. Approach<br>release from upwind. Prevent entry into sewers, water<br>courses, basements or confined areas. Wash spillages into an<br>effluent treatment plant or proceed as follows. Contain and<br>collect spillage with non-combustible, absorbent material e.g.<br>sand, earth, vermiculite or diatomaceous earth and place in<br>container for disposal according to local regulations. The<br>spilled material may be neutralized with sodium carbonate,<br>sodium bicarbonate or sodium hydroxide. Dispose of via a<br>licensed waste disposal contractor. Contaminated absorbent<br>material may pose the same hazard as the spilled product. |
| 6.4 Reference to other<br>sections | : See Section 1 for emergency contact information.<br>See Section 8 for information on appropriate personal<br>protective equipment.<br>See Section 13 for additional waste treatment information   |

### **SECTION 7: Handling and storage**

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

### 7.1 Precautions for safe handling

Not for human or animal consumption.

| Protective measures                    | : | Put on appropriate personal protective equipment (see<br>Section 8). Do not get in eyes or on skin or clothing. Do not<br>breathe vapor or mist. Do not ingest. If during normal use the<br>material presents a respiratory hazard, use only with<br>adequate ventilation or wear appropriate respirator. Keep in<br>the original container or an approved alternative made from a<br>compatible material, kept tightly closed when not in use. Keep<br>away from alkalis. Empty containers retain product residue<br>and can be hazardous. Do not reuse container. Spillages<br>should be cleaned up promptly to avoid damage to<br>surrounding materials. |
|--|---|---|
| Advice on general occupational hygiene | : | Eating, drinking and smoking should be prohibited in areas<br>where this material is handled, stored and processed.<br>Workers should wash hands and face before eating, drinking<br>and smoking. Remove contaminated clothing and protective<br>equipment before entering eating areas. See also Section 8   |

### 7.2 Conditions for safe storage, including any incompatibilities

Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Store in a corrosion resistant container with a resistant inner liner. Store locked up. Separate from alkalis. Keep container tightly closed and sealed until ready for use. Containers that

for additional information on hygiene measures.

have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination. Bund storage facilities to prevent soil and water pollution in the event of spillage.

#### 7.3 Specific end use(s)

#### **Recommendations** : Not available.

### **SECTION 8: Exposure controls/personal protection**

The information in this section contains generic advice and guidance. Information is provided based on typical anticipated uses of the product. Additional measures might be required for bulk handling or other uses that could significantly increase worker exposure or environmental releases.

#### 8.1 Control parameters

#### **Occupational exposure limits**

| Product/ingredient name           | Exposure limit values   |  |  |  |  |
|-----------------------------------|---|--|--|--|--|
| sulphuric acid                    | Ministry of Social Affairs and Employment, Legal limit values (2011-12-18).   |  |  |  |  |
|                                   | TWA 0,05 mg/m3 Form: Respirable mist  |  |  |  |  |
| Recommended monitoring procedures | <ul> <li>If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment.</li> <li>Reference should be made to monitoring standards, such as the following:</li> <li>European Standard EN 689 (Workplace atmospheres - Guidance for the assessment of exposure by inhalation to chemical agents for comparison with limit values and measurement strategy)</li> <li>European Standard EN 14042 (Workplace atmospheres - Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents)</li> <li>European Standard EN 482 (Workplace atmospheres - General requirements for the performance of procedures for the measurement of chemical agents)</li> <li>Reference to national guidance documents for methods for the determination of hazardous substances will also be required.</li> </ul> |  |  |  |  |

### **DNELs/DMELs**

| Product/ingredie<br>nt name | Туре | Exposure                 | Value      | Population | Effects |
|-----------------------------|------|--------------------------|------------|------------|---------|
| sulphuric acid              | DNEL | Short term<br>Inhalation | 0,1 mg/m³  | Workers    | Local   |
|                             | DNEL | Long term<br>Inhalation  | 0,05 mg/m³ | Workers    | Local   |

#### PNECs

| Product/ingredient name  | Туре | Compartment Detail | Value       | Method Detail |
|--------------------------|------|--------------------|-------------|---------------|
| sulphuric acid           | PNEC | Fresh water        | 0,0025 mg/l | Assessment    |
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|      |                           |                  | Factors               |
|------|---------------------------|------------------|-----------------------|
| PNEC | Marine water              | < 0,0003<br>mg/l | Assessment<br>Factors |
| PNEC | Sewage Treatment<br>Plant | 8,8 mg/l         | Assessment<br>Factors |

### 8.2 Exposure controls

| Appropriate engineering controls                   | : | If user operations generate dust, fumes, gas, vapor or mist, use<br>process enclosures, local exhaust ventilation or other<br>engineering controls to keep worker exposure to airborne<br>contaminants below any recommended or statutory limits.  |
|--|---|--|
| Individual protection measures<br>Hygiene measures | : | A washing facility or water for eye and skin cleaning<br>purposes should be present. Wash hands, forearms and<br>face thoroughly after handling chemical products, before<br>eating, smoking and using the lavatory and at the end of<br>the working period. Wash contaminated clothing before<br>reusing.   |
| Eye/face protection                                | : | Safety eyewear complying with an approved standard<br>should be used when a risk assessment indicates this is<br>necessary to avoid exposure to liquid splashes, mists,<br>gases or dusts.<br><b>Recommended</b> : Tightly-fitting goggles, CEN: EN166,  |
| Skin protection<br>Hand protection                 | : | Chemical-resistant, impervious gloves complying with an<br>approved standard should be worn at all times when<br>handling chemical products if a risk assessment indicates<br>this is necessary. For general applications, we<br>recommend gloves with a thickness typically greater than<br>0.35 mm. It should be emphasized that glove thickness is<br>not necessarily a good predictor of glove resistance to a<br>specific chemical, as the permeation efficiency of the<br>glove will be dependent on the exact composition of the<br>glove material.<br>> 8 hours (breakthrough time): Protective gloves should<br>be worn under normal conditions of use. |
| Body protection                                    | : | Personal protective equipment for the body should be selected based on the task being performed and the risks involved.  |
| Other skin protection                              | : | Appropriate footwear and any additional skin protection<br>measures should be selected based on the task being<br>performed and the risks involved and should be approved<br>by a specialist before handling this product.   |
| Respiratory protection                             | : | In case of inadequate ventilation wear respiratory protection. Recommended acid gas filter (Type E)  |
| Environmental exposure<br>controls                 | : | Emissions from ventilation or work process equipment<br>should be checked to ensure they comply with the<br>requirements of environmental protection legislation.<br>In some cases, fume scrubbers, filters or engineering<br>modifications to the process equipment will be necessary<br>to reduce emissions to acceptable levels.  |
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Personal protective equipment : (Pictograms)



### **SECTION 9: Physical and chemical properties**

### 9.1 Information on basic physical and chemical properties

| Appearance<br>Physical state<br>Color<br>Odor<br>Odor threshold<br>pH                                  |     | Liquid<br>Not determined.<br>Not determined.<br>0,5  |
|--|-----|--|
| Melting point/freezing point   | ÷., | 0 - 5 °C   |
| Initial boiling point and boiling range  | :   | Not determined   |
| Flash point  | 1   | Not determined   |
| Evaporation rate   | 10  | Not determined   |
| Flammability (solid, gas)  | 1   | Non-flammable.   |
| Upper/lower flammability or<br>explosive limits<br>Vapor pressure<br>Vapor density<br>Relative density |     | Lower: Not determined<br>Upper: Not determined<br>Not determined<br>Not determined<br>1,19 @ 20 °C |
| Bulk density   | 1   | Not determined   |
| Miscibility with water   | 10  | Miscible in water.   |
| Partition coefficient: n-<br>octanol/water   | •   | Not determined   |
| Auto-ignition temperature  | 1   | Not determined   |
| Viscosity  | :   | <b>Dynamic:</b> Not determined. <b>Kinematic:</b> Not determined.                                  |
| Explosive properties   | 1   | Non-explosive.   |
| Oxidizing properties   | 1   | None   |
|  |     |  |

**<u>9.2 Other information</u>** No additional information.

### **SECTION 10: Stability and reactivity**

| 10.1 Reactivity                         | : | May be corrosive to metals.Expert judgment                                      |
|---|---|---|
| 10.2 Chemical stability                 | : | The product is stable.  |
| 10.3 Possibility of hazardous reactions | : | Under normal conditions of storage and use, hazardous reactions will not occur. |
| 10.4 Conditions to avoid                | : | Avoid contamination by any source including metals, dust and organic materials. |
| 10.5 Incompatible materials             | : | Attacks many metals producing extremely flammable                               |
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hydrogen gas which can form explosive mixtures with air. Reactive or incompatible with the following materials:, alkalis, metals

10.6 Hazardous:Under normal conditions of storage and use, hazardousdecomposition productsdecomposition products should not be produced.

### **SECTION 11: Toxicological information**

### **11.1 Information on toxicological effects**

#### Acute toxicity

| Product/ingredie<br>nt name                    | Method                | Species                 | Result   | Exposure                                 | References  |
|--|-----------------------|-------------------------|--|--|-------------|
| sulphuric acid                                 | •                     | -                       |  |  |             |
|  | OECD 401<br>LD50 Oral | Rat                     | 2.140 mg/kg  | Not applicable.                          | IUCLID5     |
| Conclusion/Sumn                                | nary :                | No knowr                | n significant effect   | s or critical hazar                      | ds.         |
| Acute toxicity est                             | imates                |                         |  |  |             |
| Irritation/Corrosio                            | <u>n</u>              |                         |  |  |             |
| Conclusion/Sumn<br>Skin<br>Eyes<br>Respiratory | nary<br>:             | Causes s<br>May give    | e to the skin.<br>erious eye damag<br>off gas, vapor or<br>to the respiratory              | dust that is very ir                     | ritating or |
| Sensitization                                  |                       |                         |  |  |             |
| Conclusion/Sumn<br>Skin<br>Respiratory         | nary<br>:             | classifica<br>No data a | available for this e<br>tion is not conside<br>available for this e<br>tion is not conside | ered to be applica<br>nd-point, hence th | ble.<br>nis |
| <b>Mutagenicity</b>                            |                       |                         |  |  |             |
| Conclusion/Sumn                                | nary :                | No knowr                | n significant effect   | s or critical hazar                      | ds.         |
| <b>Carcinogenicity</b>                         |                       |                         |  |  |             |
| Conclusion/Sumn                                | nary :                | No knowr                | n significant effect   | s or critical hazar                      | ds.         |
| Depreductive texi                              | a:4.                  |                         |  |  |             |

#### **Reproductive toxicity**

| Product/ingredient name | Method                 | Species | Result   | Exposure | References |
|-------------------------|------------------------|---------|--|----------|------------|
| sulphuric acid          |                        |         |  |          |            |
|                         | OECD 414<br>Inhalation | Mouse   | Fertility effects-<br>Negative<br>Developmental-<br>Negative<br>19,3 mg/m <sup>3</sup> | -        | IUCLID5    |

| Conclusion/Summary  | :                         | No known significant effects or critical hazards.   |
|---|---------------------------|---|
| Information on the likely routes of exposure:   | :                         | Not available.  |
| Potential acute health effects  |                           |   |
| Inhalation  | :                         | Vapor is strongly irritating to the eyes and respiratory system.  |
| Ingestion   | :                         | May cause burns to mouth, throat and stomach.   |
| Skin contact  | :                         | Causes severe burns.  |
| Eye contact   | :                         | Causes serious eye damage.  |
| Symptoms related to the physic  | cal, c                    | hemical and toxicological characteristics   |
| Inhalation  |                           | No specific data.   |
| Ingestion<br>Skin contact<br>Eye contact  |                           | May cause burns to mouth, throat and stomach.<br>Adverse symptoms may include the following: pain or<br>irritation, blistering may occur<br>Adverse symptoms may include the following: pain,   |
| Ingestion<br>Skin contact<br>Eye contact<br>Delayed and immediate effects   | ::                        | May cause burns to mouth, throat and stomach.<br>Adverse symptoms may include the following: pain or<br>irritation, blistering may occur  |
| Ingestion<br>Skin contact<br>Eye contact  | ::                        | May cause burns to mouth, throat and stomach.<br>Adverse symptoms may include the following: pain or<br>irritation, blistering may occur<br>Adverse symptoms may include the following: pain,<br>watering, redness  |
| Ingestion<br>Skin contact<br>Eye contact<br><u>Delayed and immediate effects</u><br><u>Short term exposure</u>                                | :<br>:<br>and             | May cause burns to mouth, throat and stomach.<br>Adverse symptoms may include the following: pain or<br>irritation, blistering may occur<br>Adverse symptoms may include the following: pain,<br>watering, redness<br>also chronic effects from short and long term exposure  |
| Ingestion<br>Skin contact<br>Eye contact<br><u>Delayed and immediate effects</u><br><u>Short term exposure</u><br>Potential immediate effects | :<br>:<br><u>and</u><br>: | May cause burns to mouth, throat and stomach.<br>Adverse symptoms may include the following: pain or<br>irritation, blistering may occur<br>Adverse symptoms may include the following: pain,<br>watering, redness<br>also chronic effects from short and long term exposure<br>No known significant effects or critical hazards. |

### Potential chronic health effects

| Product/ingredient name | Method                                      | Species | Result    | Exposure                      | References |
|-------------------------|---|---------|-----------|-------------------------------|------------|
| sulphuric acid          |   |         |           |                               |            |
|                         | OECD 412<br>Sub-acute<br>NOEC<br>Inhalation | Rat     | 0,3 mg/m³ | 28 days 6<br>hours per<br>day | IUCLID5    |

| Carcinogenicity             | : | No known significant effects or critical hazards. |
|-----------------------------|---|---|
| Mutagenicity                | : | No known significant effects or critical hazards. |
| Fertility effects           | : | No known significant effects or critical hazards. |
| Developmental effects       | : | No known significant effects or critical hazards. |
| Effects on or via lactation | : | No known significant effects or critical hazards. |
| Other effects               | : | No known significant effects or critical hazards. |
| Other information           | : | Not available.                                    |
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# **SECTION 12: Ecological information**

### 12.1 Toxicity

| Product/ingred<br>ient name        | Method                    | Species   | Result  | Exposure           | References |  |
|------------------------------------|---------------------------|---|---|--------------------|------------|--|
| sulphuric acid                     |                           |   | 1   | ł                  | 1          |  |
| •                                  | Acute LC50<br>Fresh water | Fish  | > 16 mg/l   | 96 h               | IUCLID5    |  |
|                                    | Acute EC50<br>Fresh water | Water flea  | > 100 mg/l  | 48 h               | IUCLID5    |  |
|                                    | Acute EC50<br>Fresh water | Algae   | > 100 mg/l  | 72 h               | IUCLID5    |  |
| Conclusion/Sum                     | mary                      | : No known s  | ignificant effects                                  | or critical hazard | S.         |  |
| 12.2 Persistence and degradability |                           |   |   |                    |            |  |
| Conclusion/Sum                     | imary                     | : No known significant effects or critical hazards. |   |                    |            |  |
| 12.3 Bioaccumulative potential     |                           |   |   |                    |            |  |
| Conclusion/Summary                 |                           | : No known s  | : No known significant effects or critical hazards. |                    |            |  |
| 12.4 Mobility in s                 | soil                      |   |   |                    |            |  |
| Soil/water partiti<br>(KOC)        | on coefficient            | : Not availabl                                      | e.  |                    |            |  |
| Mobility                           |                           | : Not available.                                    |   |                    |            |  |
| 12.5 Results of F                  | PBT and vPvB as           | <u>ssessment</u>                                    |   |                    |            |  |
| This mixture does                  | s not contain any         | substances that a                                   | are assessed to l                                   | be a PBT or a vPv  | vB.        |  |
| 12.6 Other adver                   | <u>se effects</u>         | : No known s  | ignificant effects                                  | or critical hazard | S.         |  |

# **SECTION 13: Disposal considerations**

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

| 13.1 Waste treatment methods<br>Product |  |   |
|---|--|---|
| Methods of disposal                     | : The generation of waste should be avoided or minimized<br>wherever possible. Disposal of this product, solutions and<br>any by-products should at all times comply with the<br>requirements of environmental protection and waste<br>disposal legislation and any regional local authority<br>requirements. Dispose of surplus and non-recyclable<br>products via a licensed waste disposal contractor. Waste<br>should not be disposed of untreated to the sewer unless<br>fully compliant with the requirements of all authorities with<br>jurisdiction. | b |
| Hazardous waste                         | : Yes.   |   |

### European waste catalogue (EWC)

| Waste code          |   | Waste designation  |
|---------------------|---|--|
| 06 01 01*           |   | sulphuric acid and sulphurous acid   |
| Packaging           |   |  |
| Methods of disposal | : | The generation of waste should be avoided or minimized<br>wherever possible. Waste packaging should be recycled.<br>Incineration or landfill should only be considered when<br>recycling is not feasible.  |
| Special precautions | : | This material and its container must be disposed of in a<br>safe way.<br>Care should be taken when handling emptied containers<br>that have not been cleaned or rinsed out.<br>Empty containers or liners may retain some product<br>residues.<br>Avoid dispersal of spilled material and runoff and contact<br>with soil, waterways, drains and sewers. |

# **SECTION 14: Transport information**

| Regulation: ADR/RID             | Regulation: ADR/RID |  |  |
|---------------------------------|---------------------|--|--|
| 14.1 UN number                  | 2796                |  |  |
| 14.2 UN proper shipping name    | SULPHURIC ACID      |  |  |
| 14.3 Transport hazard class(es) | 8                   |  |  |
|                                 | 8                   |  |  |
| 14.4 Packing group              | II                  |  |  |
| 14.5 Environmental hazards      | No.                 |  |  |
| Additional information          |                     |  |  |
| Hazard identification number    | : 80                |  |  |
| <u>Tunnel code</u>              | : (E)               |  |  |

| Regulation: ADN                 |                       |
|---------------------------------|-----------------------|
| 14.1 UN number                  | 2796                  |
| 14.2 UN proper shipping name    | SULPHURIC ACID        |
| 14.3 Transport hazard class(es) | 8<br>8<br>8<br>8<br>8 |
| 14.4 Packing group              | II                    |
| 14.5 Environmental hazards      | No.                   |
| Additional information          |                       |
| <u>Danger code</u>              | : Not applicable.     |

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| Regulation: IMDG                |                |
|---------------------------------|----------------|
| 14.1 UN number                  | 2796           |
| 14.2 UN proper shipping name    | SULPHURIC ACID |
| 14.3 Transport hazard class(es) | 8              |
| 14.4 Packing group              | П              |
| 14.5 Environmental hazards      | No.            |
| Additional information          |                |
| Marine pollutant                | : No.          |
| IMDG Code Segregation<br>group  | : SG1A         |
|                                 | : F-A, S-B     |

| Regulation: IATA                                  |                |
|---|----------------|
| 14.1 UN number                                    | 2796           |
| 14.2 UN proper shipping name                      | SULPHURIC ACID |
| 14.3 Transport hazard class(es)                   | 8              |
| 14.4 Packing group                                |                |
| 14.5 Environmental hazards                        | No.            |
| Additional information<br><u>Marine pollutant</u> | No.            |

| 14.6 Special precautions for<br>user                | Transport within user's premises: Ensure that persons transporting the product know what to do in the event of an accident or spillage. | • |  |
|---|---|---|--|
| 14.7 Transport in bulk according to IMO instruments | Proper shipping name:Sulphuric acidRemarks:Liquid bulk cargoesShip type: 3Pollution category: Y   |   |  |

14.8 IMSBC

: Not applicable.

## **SECTION 15: Regulatory information**

**<u>15.1</u>** Safety, health and environmental regulations/legislation specific for the substance or mixture

EU Regulation (EC) No. 1907/2006 (REACH) Annex XIV - List of substances subject to authorization

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| Annex XIV<br>None of the components are list<br>Substances of very high conc | <u>ern</u> |                      |
|--|------------|----------------------|
| None of the components are liste   | ed.        |                      |
| EU Regulation (EC) No.   | :          | Applicable, Table 3. |
| 1907/2006 (REACH) Annex XVII   |            |                      |
| - Restrictions on the  |            |                      |
| manufacture, placing on the  |            |                      |
| market and use of certain  |            |                      |
| dangerous substances,  |            |                      |
| mixtures and articles  |            |                      |

Other EU regulations Europe inventory

: All components are listed or exempted.

### Ozone depleting substances (1005/2009/EU)

None of the components are listed.

### Prior Informed Consent (PIC) (649/2012/EU)

None of the components are listed.

#### Seveso Directive

This product is not controlled under the Seveso Directive.

#### National regulations

#### **Biocidal products regulation** : Not applicable.

| Product name   | List name       | Name on list    | Classification | Notes           |
|----------------|-----------------|-----------------|----------------|-----------------|
| sulphuric acid | Not applicable. | Not applicable. | Carc           | Not applicable. |
|                |                 |                 |                |                 |

Water Discharge Policy (ABM) :

: Slightly harmful to aquatic organisms., Abatement effort:, B

| Notes                              | : | To our knowledge no other country or state specific regulations are applicable. |
|------------------------------------|---|---|
| 15.2 Chemical Safety<br>Assessment | : | Complete.   |

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

| Abbreviations and acronyms | : | ATE = Acute Toxicity Estimate<br>CLP = Classification, Labelling and Packaging Regulation<br>[Regulation (EC) No. 1272/2008]<br>DNEL = Derived No Effect Level<br>DMEL = Derived Minimal Effect Level<br>EUH statement = CLP-specific Hazard statement<br>N/A = Not available<br>PNEC = Predicted No Effect Concentration<br>RRN = REACH Registration Number<br>SGG = Segregation Group<br>PBT = Persistent, Bioaccumulative and Toxic<br>vPvB = Very Persistent and Very Bioaccumulative<br>bw = Body weight |
|----------------------------|---|---|
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Key data sources

 EU REACH ECHA/IUCLID5 CSR. National Institute for Occupational Safety and Health, U.S. Dept. of Health, Education, and Welfare, Reports and Memoranda Registry of Toxic Effects of Chemical Substances.
 Sphera Solutions Inc., 4777 Levy Street, St Laurent, Quebec HAR 2P9, Canada. Regulation (EC) No 1272/2008 Annex VI.

### Procedure used to derive the classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]

| Classification     | Justification         |
|--------------------|-----------------------|
| Met. Corr. 1, H290 | Expert judgment       |
| Skin Corr. 1, H314 | On basis of test data |
| Eye Dam. 1, H318   | On basis of test data |

#### Full text of abbreviated H statements

| H290 | May be corrosive to metals.              |
|------|--|
| H314 | Causes severe skin burns and eye damage. |
| H318 | Causes serious eye damage.               |

### Full text of classifications [CLP/GHS]

| Met. Corr. 1                    | CORROSIVE TO METALS - Category 1                                 |
|---------------------------------|--|
| Skin Corr. 1                    | SKIN CORROSION/IRRITATION - Category 1                           |
| Skin Corr. 1A                   | SKIN CORROSION/IRRITATION - Category 1A                          |
| Eye Dam. 1                      | SERIOUS EYE DAMAGE/ EYE IRRITATION - Category 1                  |
|                                 |  |
| Revision comments               | : The following sections contain new and updated information: 3. |
| Date of printing                | : 27.12.2021   |
| Date of issue/ Date of revision | : 23.11.2020   |
| Date of previous issue          | : 15.07.2019   |
| Version                         | : 8.0  |
| Prepared by                     | : Yara Chemical Compliance (YCC).                                |

|| Indicates information that has changed from previously issued version.

#### Notice to reader

To the best of our knowledge, the information provided in this Safety Data Sheet is accurate as at the date of its issue. The information it contains is being given for safety guidance purposes and relates only to the specific material and uses described in it. This information does not necessarily apply to that material when combined with other material(s) or when used otherwise than as described herein, since all materials may represent unknown hazards and should be used with caution. Final determination of the suitability of any material is the sole responsibility of the user.



### Annex to the extended Safety Data Sheet (eSDS) -Exposure Scenario/Safe Use Information:

| Identification of the substance or mixture<br>Product definition : Mixture |   |   |  |
|--|---|---|--|
| Product name   | : | Fertigro KZZ  |  |
| Exposure Scenario/Safe<br>Use Information                                  | : | Exposure Scenarios are not attached for corrosive or irritant hazards, relevant information on safe use is included in section 8. |  |