



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

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

1.1 Product identifier Superphosphate

1.2 Relevant identified use Fertiliser/ Plant nutrient

1.3 Details of the supplier of the Safety Data Sheet

Westland Horticulture Ltd
14 Granville Industrial Estate
Granville Road
Dungannon
County Tyrone
BT70 1NJ

Email customerservice@WestlandHorticulture.com

1.4 Emergency telephone number 01480 443789 (UK)

2. HAZARDS IDENTIFICATION

2.1 Classification of the Substance or Mixture According to Regulation (EC) No 1272/2008:

Eye Dam. 1 H318 Causes serious eye damage

2.2 Label Elements According to Regulation (EC) No 1272/2008:

Hazard Pictograms GHS05 - Corrosive



Signal Word Danger

Hazard Statements H318 Causes serious eye damage

Precautionary Statements

P280 Wear gloves and eye protection.

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

Other hazards Not applicable



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

3. COMPOSITION/INFORMATION ON INGREDIENTS

3.1 Substances: N/A

3.2 Description

Superphosphates (SSP): CAS No 8011-76-5

EC Number: 232-379-5

This product is a multi-constituent substance

Ingredient	Identifiers	Concentration %W/W	Warning Symbols	Directive 67/548/EEC	Regulation (EC) No 1272/2008 (CLP)
Calcium bis (dihydrogen-ortho-phosphate)	CAS : 7758-23-8 EC: 231-837-1	>23 %		Xi; R41	Danger Eye Dam. 1 H318
Calcium Sulphate	EC: 231-900-3 CAS: 7778-18-9	>45 %			

Additional information: See Section 16 for the full text of the H statements declared above

4. FIRST AID MEASURES

4.1 Description of first aid measures

General information: Have the product container, label or Material Safety Data Sheet with you when calling a poison control center or physician, or going for treatment.

Inhalation: Move person to fresh air.
Keep patient warm and at rest.
Get medical advice if respiratory problems occur

Skin Contact: Immediately wash off with soap and plenty of water.
Get medical advice if irritation persists

Eye Contact: Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.
Remove contact lenses and continue flushing.
Get medical treatment

Ingestion: Rinse out mouth immediately after ingestion and then drink plenty of water
Get medical attention if symptoms persist



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

4.2 Most important symptoms and effects

After Eye Contact: Redness of the eye tissue. Irritation of the eye tissue

4.3 Indication of any immediate medical attention and special treatment needed

Treat symptomatically

5. FIRE FIGHTING MEASURES

5.1 Extinguishing Media:

The product is not flammable
Suitable extinguishing media for the surrounding fire should be used
Foam, fire extinguisher powder, carbon dioxide, water spray

5.2 Specific Hazards Arising From the Substance or Mixture:

Fire will produce hazardous products of combustion such as Sulphur and Phosphorous oxides (SO_x, P₂O₅)
Exposure to decomposition products may be a hazard to health

5.3 Advice for Fire Fighters:

Wear full protective clothing and self-contained respiratory apparatus as required.

Additional Information:

Collect contaminated fire fighting water separately. Do not allow to enter surface or ground water or sanitary sewer system.

6. ACCIDENTAL RELEASE MEASURES

6.1 Personal Precautions, Protective Equipment and Emergency Procedures:

Avoid formation / breathing of dust
Ensure adequate ventilation
Wear protective clothing
Use respiratory protective device against the effects of dust

6.2 Environmental Precautions:

Do not allow product to enter surface or ground water or sanitary sewer system.



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

6.3 Methods and Materials for Containment and Cleaning Up:

Sweep up and shovel into suitable containers for disposal according to local / national regulations

Dispose contaminated material as waste according to Section 13

Damp down dust with water spray

Additional information: If large quantities of the product contaminates water courses or drains (including via contaminated soil & vegetation), inform respective authorities.

7. HANDLING AND STORAGE

7.1 Precautions for safe handling

Handling:

- Prevent dust formation and inhalation
- Ensure good ventilation at the work place
- Avoid contact with eyes and skin
- Do not eat, drink or smoke when using this product
- Avoid unnecessary exposure to atmosphere to prevent moisture pick up
- Wash hands and observe good hygiene practice after handling this product (i.e. before breaks and at the end of work)

7.2 Conditions for safe storage, including any incompatibilities

- Keep containers closed tightly in a dry, cool and well-ventilated place.
- Keep away from alkalis (caustic solutions) and urea
- Keep away from foodstuffs, beverages and feed
- Protect from heat and direct sunlight
- Protect from humidity and water

7.3 Specific End Uses:

Use as fertiliser according to the instruction on the label

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

8.1 Control Parameters

Ingredients with limit values that require monitoring at the workplace: Not required



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

Derived No Effect Level (DNELs)	Predicted No Effect Concentration (PNECs)
Long Term Systemic effects Oral: 2.1 mg/kg bw/day (General Population)	Fresh Water: 1.7 mg/l
Long Term Systemic effects Dermal: 10.4 mg/kg bw/day (General Population) 17.4 mg/kg bw/day (Workers)	Marine Water: 0.17 mg/l
Long Term Systemic effects Inhalative: 0.9 mg/m ³ (General Population) 3.1 mg/m ³ (Workers)	Aqua (intermittent releases): 17 mg/l
	STP: 10 mg/l

8.2 Exposure Controls

8.2.1 Appropriate engineering controls: Avoid high dust concentration and provide ventilation where necessary. Ventilation must be sufficient to maintain TLV-TWA below 3mg/m³, respirable particles, and 10mg/m³, inhalable particles

8.2.2 Personal protective equipment: The use of technical measures should always have priority over the use of personal protective equipment
When selecting personal protective equipment, seek appropriate professional advice
Personal protective equipment should be certified to appropriate standards
The usual precautionary measures are to be adhere to when handling chemicals

Respiratory Protection: Not necessary if room is well ventilated
Use suitable dust mask with filter type P2 if dust concentration is high

Hand Protection: Wear protective gloves. The selection of suitable gloves depends on the material and quality.
Material of gloves: butyl rubber (0.7mm), nitrile rubber (0.4 mm), chloroprene rubber (0.5mm)

Eye Protection: Wear tightly sealed goggles

Skin and Body Protection: Protective work clothing



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

9. PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

Appearance: Light brown/grey powder or granules

Physical state: solid

Colour: Light brown/grey

Odour: acidic

Odour threshold: none known

9.2 Other information:

	Value	Concentration	Method	Temperature	Pressure	Remark
pH	3.7	-	-	20 °C	-	-
Melting point/freezing point	-	-	-	-	-	-
Initial boiling point/boiling range	-	-	-	-	-	-
Flash point	-	-	-	-	-	-
Evaporation rate	-	-	-	-	-	-
Flammability (solid, gas)	-	-	-	-	-	-
Upper/lower flammability or explosive limits	-	-	-	-	-	-
Upper explosive limits	-	-	-	-	-	-
Lower explosive limits	-	-	-	-	-	-
Vapour pressure	-	-	-	-	-	-
Vapour density	-	-	-	-	-	-
Relative density	1000-1200kg/m ³	-	-	-	-	-
Solubility(ies)	1-100g/l	-	-	20 °C	-	-
Partition coefficient: n-octanol/water	-	-	-	-	-	-
Auto-ignition temperature	-	-	-	-	-	-
Decomposition temperature	>200°C	-	-	-	-	-
Viscosity	-	-	-	-	-	-
Viscosity, dynamic	-	-	-	-	-	-
Viscosity, cinematic	-	-	-	-	-	-
Explosive properties	-	-	-	-	-	-
Oxidising properties	-	-	-	-	-	-



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

Physical hazards: none known

10. STABILITY AND REACTIVITY

10.1 Reactivity: Stable under normal conditions of storage, handling and use

10.2 Chemical Stability: Stable under normal conditions of storage, handling and use

10.3 Possible hazardous reactions: Hazardous reactions will not occur under normal transport or storage conditions. Reacts with alkali. Mixing with urea causes formation of very sticky urea phosphate

10.4 Conditions To Avoid: Avoid dust formation
Keep away from naked flames/heat

10.5 Incompatible Materials: Alkalis and urea

10.6 Hazardous decomposition products: Heating or fire can release toxic or irritant vapours and fumes (Sulphur oxides, Phosphorus oxides)

11. TOXICOLOGICAL INFORMATION

Toxicokinetics, metabolism and distribution

11.1 Information on toxicological effects

This product is expected to be of a low toxicity but prolonged skin or eye contact may cause some irritation, skin rash, inflammation and respiratory difficulties

Acute Toxicity: No test data available.
Not classified for acute toxicity as per analogous substance below

7783-28-0 Diammonium hydrogenorthophosphate

Median lethal dose Oral, LD50 >2000 mg/kg (Rat)

Median lethal dose Dermal, LD50 >5000 mg/kg (Rat)

Median lethal concentration Inhalation, LC50 >5 mg/l, 4h, (Rat)



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

Skin corrosion/Irritation: On the skin: As per analogous substance 7722-76-1 Ammonium dihydrogen-orthophosphate. No irritating effect, rabbit, OECD 404

Eye damage/Irritation: On the eye: Irritating effect, rabbit, OECD 405, EC B.5

Respiratory or Skin Sensitization: No test data available. As per analogous substance 7783-28-0 diammonium hydrogenorthophosphate. Not sensitizing, mouse. OECD 429, EC B.42

CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)

The mixture is not classified as mutagenic, carcinogen, reproductive toxic or aspiration hazard based on formulation components

Other information: None known

12. ECOLOGICAL INFORMATION

The mixture has not been tested.

12.1 Ecotoxicity: Inorganic phosphates are not considered to be toxic to aquatic species

- **Toxicity to Fish:** 7722-76-1 Ammonium dihydrogenorthophosphate. Median Lethal Concentration LC50 >85.9 mg/l, 96h, Oncorhynchus mykiss, fresh water, OECD 203
- **Toxicity to Aquatic Invertebrates:** 8011-76-5 Superphosphate. Median Lethal Concentration LC50 1790 mg/l, 72h, Daphnia carinata, freshwater
- **Toxicity to Algae and Other Aquatic Plants:** 65996-95-4 Superphosphate concentrated (TSP), EC50 >87.6 mg/l, 72h, algae, OECD 201

12.2 Persistence and Degradability: the substance is inorganic, therefore no biodegradation tests are applicable. This product dissociates into Calcium, sulfate and phosphate ions, which cannot be further degraded.

12.3 Bioaccumulative Potential: Not bioaccumulative. This substance is highly water soluble and dissociating.

12.4 Mobility in Soil: Low potential for adsorption in soil based on substance properties

12.5 PBT and vPvB assessment: No assessment required for inorganic substances



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

12.6 Other adverse effects: The product should not get in high quantities into waste water because it may act as a plant nutrient and cause eutrophication

13 DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods

Product: Do not contaminate ponds, waterways or ditches with large quantities of product. If uncontaminated, sweep up or collect, and reuse as product. Check if agriculture use is possible. Dispose of by use on farm as a fertiliser, by spreading thinly on open ground. Small quantities can be disposed of with household waste. Where possible recycling is preferred to disposal or incineration. If recycling is not practicable, dispose of in compliance with local regulations.

Contaminated Packaging: Empty remaining contents. Completely empty containers can be put in the bin or disposed of in compliance with applicable local regulations

14 TRANSPORT INFORMATION

	Land transport (ADR/RID)	Inland waterway transport (ADN)	Sea transport (IMDG)	Air transport (ICAO-TI / IATA-DGR)
14.1 UN No.	Not dangerous goods	Not dangerous goods	Not dangerous goods	Not dangerous goods
14.2 UN Proper shipping name	Not dangerous goods	Not dangerous goods	Not dangerous goods	Not dangerous goods
14.3 Transport hazard class(es)	Not dangerous goods	Not dangerous goods	Not dangerous goods	Not dangerous goods
Hazard label(s)	Not dangerous goods	Not dangerous goods	Not dangerous goods	Not dangerous goods
14.4 Packing group	Not dangerous goods	Not dangerous goods	Not dangerous goods	Not dangerous goods
14.5 Environmental hazards	Not dangerous goods	Not dangerous goods	Not dangerous goods	Not dangerous goods

14.6 Special precautions for user: None known



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

14.7 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Additional information: None known

15 REGULATORY INFORMATION

15.1 Safety, health and environmental regulations/legislation specific for the substance of mixture:

This substance is classified and labelled according to the CLP Regulation (EC) No 1272/2008

15.2 Chemical Safety Assessment: A Chemical Safety Assessment has been carried out

16 OTHER INFORMATION

16.1 Indication of changes

16.2 Abbreviations and Acronyms

ADR	International Carriage of Dangerous Goods by Road
CAS No	Chemicals Abstract Service Registry Number
Directive 67/548/EEC	Dangerous Substances Directive (DSD)
EC No	European Community Number for chemicals within EU regulations
IATA-DGR	Dangerous Goods Regulations by the International Air Transport Association
IMDG Code	International Maritime Dangerous Goods Code
PBT	Persistent, Bioaccumulative and Toxic Properties
Regulation (EC) No 1272/2008	Classification, Labelling and Packaging (CLP)
RID	International Transport of Dangerous Goods by Rail
vPvB	Very Persistent and Very Bioaccumulative Properties

16.3 Key literature references and sources for data: Westland Horticulture Ltd

16.4 Classification for mixtures and used evaluation method according to regulation (EC) 1207/2008 [CLP]: See SECTION 2.1 (classification).

16.5 Relevant H- and EUH-phrases (number and full text):

H318 Causes serious eye damage



Safety Data Sheet

According to Regulation (EC) No 1907/2006 (REACH)

Trade name: Superphosphate

Version:1.0

Revision date: 19.09.2018

Print date: 19.09.2018

16.6 Training advice: Follow the instructions

16.7 Further information

Before using this product, ensure that you read and understand its label

MSDS information:

This Safety Data Sheet is prepared in compliance with Directive 1999/45/EC, 1272/2008 and Annex I of the REACH regulation 453/2010.

This safety data sheet provides health and safety information. This product is to be used in applications with best use practice. Individuals handling this product should be informed under COSHH of the recommended safety precautions and should have access to this information. The product information in this data sheet is to the best of our knowledge correct as at the date of publication. Westland Horticulture Limited does not accept responsibility for damage caused by incorrect use of this information.

Training and related advice:

This document contains important information to ensure the safe storage, handling and use of this product. It is the responsibility of your organisation to ensure that the information contained in this document is communicated to the end user and that all necessary training to enable the product to be used correctly has been given.

For further information please contact Westland Horticulture Ltd, 14 Granville Industrial Estate, Granville Road, Dungannon, County Tyrone, BT70 1NJ.