

MATERIAL SAFETY DATA SHEET

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

Product: J Arthur Bower's Superphosphate NPK: 0-17.5-0
Supplier: William Sinclair Horticulture
Firth Road
Lincoln
Lincolnshire
LN6 7AH

Tel: 0044 (0) 1522 537561
Fax: 0044 (0) 1522 780278

SOLID FERTILISER CONTAINING NO NITROGEN

2. COMPOSITION/INFORMATION ON INGREDIENTS

This product contains, normal (single) Superphosphate

3. HAZARDS IDENTIFICATION

3.1 Human Health

Products are of low toxicity but prolonged skin or eye contact may cause some irritation.

Ingestion: Small quantities are unlikely to cause toxic effects.
Large quantities may give rise to gastro-intestinal disorders

Inhalation: Low toxicity dust but high concentration of air-borne material may cause Irritation of the nose and upper respiratory tract with symptoms such as sore throat and coughing. Generally regarded as a nuisance dust with no Occupational Exposure Limit (OEL).
See HSE Guidance Notes EH 40 and HSG 173

Molten material: Will cause burns and inhalation of decomposition gases (e.g. in a fire) may cause serious delayed lung effects.

3.2 Environment

As this fertiliser contains phosphate, heavy spillage may cause adverse environmental impact such as eutrophication in confined surface waters. See section 12.



William Sinclair Horticulture

4. FIRST AID MEASURES

Product

Skin contact: Wash the affected area with soap and water

Eye contact: Bathe the eye with running water or eyewash for 10 minutes.

Ingestion: Do not induce vomiting. Give milk or water to drink. Obtain medical advice if more than a small quantity has been swallowed.

Inhalation: Move from source of exposure to dust. Keep warm and at rest.

Fire and Thermal Decomposition products

Skin contact: Wash areas in contact with molten material. Wash copiously with cold water. Seek medical advice.

Inhalation: Remove from source of exposure to fumes. Keep warm and at rest.

Obtain medical advice if symptoms persist

5. FIRE FIGHTING MEASURES

When the fertiliser is not directly involved in the fire use the best means available to control the fire.

When the fertiliser is involved:-

- a. Avoid breathing the fumes. Wherever possible wear an approved breathing mask when fighting a fire or when fumes are being emitted.
- b. Call the fire brigade
- c. Use plenty of water
- d. Open doors and windows to give maximum ventilation
- e. Do not allow molten product to run into drains.

6. ACCIDENTAL RELEASE MEASURES

Sweep up into suitable labelled container and wash affected areas with water.



William Sinclair Horticulture

7. HANDLING AND STORAGE

Handling: Avoid excessive generation of dust. Avoid unnecessary exposure to the atmosphere to prevent moisture pick-up

Storage : The basic requirements are to avoid contamination and fire. Keep away from sources of heat, fire and explosion, and away from all combustible materials and chemical substances. **Do not permit smoking** or the use of naked lights in the storage area. Store in a cool, dry, well-ventilated place away from children and pets.
Further storage guidance is given in HSE Guidance IND (G) 230L

Use: Use only as a home garden fertiliser as directed on the pack

8. EXPOSURE CONTROL/PERSONAL PROTECTION

8.1 Occupational Exposure Limits

No specific official limits.

ACGIH recommended value (1995-1996) for inhalable particulate: TLV/TWA 10mg/m³

8.2 Precautionary and engineering measures

Avoid high dust concentration and provide ventilation where necessary

8.3 Personal Protection

Wear suitable gloves when handling the product over long periods. Use approved dust Respirators if airborne concentrations are high. Wash hands after handling the product and observe good hygiene practices.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance: White, grey or brown granules, crystal or powder.

Odour: Odourless

pH water solution:
(100g/l) Usually >4.5

Bulk density: Normally between 900-1100kg/m³

Solubility in water: Partially soluble in water
Most formulations are hygroscopic

10. STABILITY AND REACTIVITY

Stable under normal storage and handling conditions. Liberates ammonia when in contact with alkalis e.g. Caustic Soda.

Do not weld or apply heat to equipment that may have contained the fertiliser without first washing thoroughly to remove all fertiliser.



William Sinclair Horticulture

11. TOXICOLOGICAL INFORMATION

11.1 General

See section 3.1

11.2 Toxicity Data

Product toxicity will depend on the composition

Monoammonium phosphate:	LD50 (oral, rat)	>2000mg/kg
Diammonium phosphate:	LD50 (oral, rat)	>2000mg/kg

12. ECOLOGICAL INFORMATION

12.1 Mobility

Partially soluble in water.

12.2 Persistence/Degradability

Phosphates, whether water or citrate soluble, are translocated in the soil over very short distances, and are then immobilised.

12.3 Bio-accumulation

The product does not show any bio-accumulation phenomena

12.4 Ecotoxicity

Low toxicity to aquatic life

13. DISPOSAL CONSIDERATIONS

Depending on the degree of contamination, dispose of by use on farm/garden by spreading thinly on open ground or to an authorised waste facility. Take care to avoid the contamination of watercourses and drains. Inform the appropriate water authority in the event of accidental watercourse contamination.

14. TRANSPORT INFORMATION

14.1 UN classification

Classified as non-hazardous

15. REGULATORY INFORMATION

15.1 EU Directives

76/116/EEC (Relating to fertilisers)

15.2 National Regulations

The Fertilisers Regulations (1991) and subsequent amendments



16. OTHER INFORMATION

This safety data sheet provides health and safety information. The product is to be used in a way consistent with best horticultural 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 at the date of publication. William Sinclair Horticulture disclaims any liability for any loss or damage resulting from reliance on this information.

Updated January 2008/Version 1.3