

# MATERIAL SAFETY DATA SHEET

## Liquid One Shot (LOS)



### SECTION 1: IDENTIFICATION OF THE MATERIAL AND SUPPLIER

<b>Product Name:</b>	<b>Liquid One Shot (LOS)</b>
<b>Other Names:</b>	LOS, LOS Mid N, LOS High N, LOS + P
<b>Product Codes/Trade Names:</b>	Liquid One Shot
<b>Recommended Use:</b>	As a complete fertiliser for all crops, but mainly sugar cane, applied by spraying.
<b>Applicable In:</b>	Australia
<b>Supplier:</b>	Sucrogen BioEthanol Pty Ltd (ABN 85 009 660 191)
<b>Address:</b>	Bruce Highway, Sarina, QLD, 4737, Australia
<b>Telephone:</b>	+61 7 4940 9822
<b>Email Address:</b>	agservices@sucrogen.com
<b>Web Site:</b>	www.sucrogen.com
<b>Facsimile:</b>	+61 7 4956 2147
<b>Emergency Phone Number:</b>	000 Fire Brigade and Police (available in Australia only)
<b>Poisons Information Centre:</b>	13 11 26 (available in Australia only)

This Material Safety Data Sheet (MSDS) is issued by the Supplier in accordance with National Standards and Guidelines from Safe Work Australia (SWA – formerly ASCC/NOHSC). The information in it must not be altered, deleted or added to. The Supplier will not accept any responsibility for any changes made to its MSDS by any other person or organization. The Supplier will issue a new MSDS when there is a change in product specifications and/or Standards, Codes, Guidelines, or Regulations.

### SECTION 2: HAZARD IDENTIFICATION

**STATEMENT OF HAZARDOUS NATURE:** Classified as **Non Hazardous** according to the Approved Criteria For Classifying Hazardous Substances [NOHSC:1008] 3rd Edition.

**Liquid One Shot (LOS)** is classified as **Non Dangerous** according to the Australian Code for the Transport of Dangerous Goods by Road and Rail.

<b>Risk Phrases</b>	<b>Safety Phrases</b>
None Allocated	None Allocated

### SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS

<b>Chemical Name:</b>	<b>Synonyms</b>	<b>Proportion:</b>	<b>CAS Number:</b>
Nitrogen as urea		3.5 - 8.5% w/v	57-13-6
Potassium		Up to 3% w/v	7440-09-7
Nitrogen		0.75% w/v	7727-37-9
Phosphorus		< 1% w/v	7723-14-0
Calcium		< 1% w/v	7440-70-2
Magnesium		<1% w/v	7439-95-4
Sulphur		<1% w/v	7704-34-9

Water		40 - 50% w/v	7732-18-5
Carbohydrates		20 - 25% w/v	-
Ash		10 - 15% w/v	-
Glycerol		3 - 6% w/v	56-81-5

Liquid One Shot is a by-product of sugar cane milling and contains vegetable matter with traces of potassium, sodium, nitrogen, calcium, magnesium, phosphorus and sulphur. Sulphuric acid is added to increase the sulphur content and breaks down into water, Sulphur and may form sulphates in the final product.

#### SECTION 4: FIRST AID MEASURES

<b>Swallowed:</b>	Unlikely in the industrial setting. Give water to drink to dilute stomach contents. Do not induce vomiting
<b>Eyes:</b>	Flush thoroughly with flowing water for at least 15 minutes. If symptoms/irritation persist, seek medical attention.
<b>Skin:</b>	Wash with soap and water.
<b>Inhaled:</b>	Remove to fresh air.
<b>First Aid Facilities:</b>	Safety showers, eye wash stations and First Aid kits.
<b>Advice to Doctor:</b>	Treat symptomatically.

#### SECTION 5: FIRE FIGHTING MEASURES

<b>Flammability:</b>	Product will not burn. No specific requirements.
<b>Suitable extinguishing media:</b>	Product will not burn. If there is a fire in the surrounding area use suitable extinguishing media for the surrounding material.
<b>Hazards from combustion products:</b>	None - product will not burn.
<b>Special protective precautions and equipment for fire fighters:</b>	As required for fire in surrounding materials.
<b>HAZCHEM Code:</b>	Not applicable

#### SECTION 6: ACCIDENTAL RELEASE MEASURES

<b>Emergency Procedure:</b>	See Disposal Considerations.
<b>Containment Procedure:</b>	Bund and pump into suitable drum for re-use.
<b>Clean Up Procedure:</b>	Large spills - hose down but avoid this product getting into drains, sewers and waterways because of high BOD load and low pH.

#### SECTION 7: HANDLING AND STORAGE

<b>Handling:</b>	Transported by bulk tanker.
<b>Storage:</b>	Ensure product is soored in a manner that will prevent it getting into drains and waterways.
<b>Incompatibilities:</b>	None

**SECTION 8: EXPOSURE CONTROLS / PERSONAL PROTECTION**

<b>Exposure Standards:</b>	National Occupational Exposure Standard (NES), Safe Work Australia (formerly ASCC/NOHSC).
	No exposure standard is applicable to this non-hazardous product.
<b>Notes:</b>	Sucrogen AgServices recommendation: Keep exposure to aerosols and mists as low as practicable and avoid skin contact.
<b>Biological Limit Values:</b>	No biological limit allocated.
<b>ENGINEERING CONTROLS</b>	
<input type="checkbox"/> <b>Ventilation:</b>	All work with Liquid One Shot should be carried out in such a way as to minimise skin contact with the product and avoid generation of liquid aerosol (mist) where persons can inhale it. For applications where there is a risk of exposure to mists, please refer to Respiratory Protection requirements below.
<input type="checkbox"/> <b>Special Consideration for Repair &amp;/or Maintenance of Contaminated Equipment:</b>	Recommendations on exposure control and Personal Protection should be followed. Prevent getting into drains and waterways.
<b>PERSONAL PROTECTION</b>	
<input type="checkbox"/> <b>Personal Hygiene</b>	Wash hands before eating, drinking, using the toilet or smoking.
<input type="checkbox"/> <b>Skin Protection:</b>	Wear Loose comfortable clothing. Wear PVC or rubber gloves AS 2161. Wash work clothes regularly.
<input type="checkbox"/> <b>Eye Protection:</b>	Goggles or safety glasses (AS 1336 and AS/NZS 1337) and a face shield should be worn if there is a risk of splash.
<input type="checkbox"/> <b>Respiratory Protection:</b>	If an aerosol or mist is generated, wear a respirator for acid gases conforming to AS/NZS 1715 and 1716.
<input type="checkbox"/> <b>Thermal Protection:</b>	None should be needed under normal circumstances.
<input type="checkbox"/> <b>Smoking &amp; Other Dusts</b>	Inhalation of airborne particles from other sources, including those from cigarette smoke, may increase the risk of lung disease. Sucrogen AgServices recommends that all storage and work areas should be non-smoking zones, and other airborne contaminants be kept to a minimum.

**SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES**

<b>Appearance:</b>	Brown - Black liquid
<b>Odour:</b>	Mild molasses odour
<b>pH, at stated concentration:</b>	3.3 - 4.0
<b>Vapour Pressure:</b>	Not applicable - does not vapourise
<b>Vapour Density:</b>	1200 kg/cubic metre (40 Brix)
<b>Boiling Point/range (°C):</b>	100°C
<b>Freezing/Melting Point (°C):</b>	Not determined
<b>Solubility:</b>	Nutrients soluble in water, mixture partly soluble
<b>Specific Gravity (H<sub>2</sub>O = 1):</b>	~ 1.17
<b>FLAMMABLE MATERIALS</b>	
<input type="checkbox"/> <b>Flash Point:</b>	Not applicable

<input type="checkbox"/> <b>Flash Point Method:</b>	Not applicable
<input type="checkbox"/> <b>Flammable (Explosive) Limit - Upper:</b>	Not applicable
<input type="checkbox"/> <b>Flammable (Explosive) Limit - Lower:</b>	Not applicable
<input type="checkbox"/> <b>Autoignition Temperature:</b>	Does not auto-ignite
<b>ADDITIONAL PROPERTIES</b>	
<input type="checkbox"/> <b>Evaporation Rate:</b>	Not applicable
<input type="checkbox"/> <b>Molecular Weight:</b>	Not applicable
<input type="checkbox"/> <b>Volatile Organic Compounds Content (VOC):</b> (as specified by the Green Building Council of Australia)	Nil
<input type="checkbox"/> <b>% Volatiles:</b>	0%

## SECTION 10: STABILITY AND REACTIVITY

<b>Chemical Stability:</b>	Product is stable and will not polymerize.
<b>Incompatible Materials:</b>	None known.
<b>Conditions to avoid:</b>	None known.
<b>Hazardous Decomposition Products:</b>	None known.
<b>Hazardous Reactions:</b>	None known.

## SECTION 11: TOXICOLOGICAL INFORMATION

### Toxicological Data:

The health effects listed below are related to the acid pH of the product (3.3 - 4.0) and potential for mild irritation of skin and mucous membranes.

Health effects information is based on reported effects in use from overseas and Australian reports.

### Effects: Acute

<b>Swallowed:</b>	Unlikely under normal conditions of use, but could cause abdominal discomfort and nausea, and throat irritation.
<b>Eyes:</b>	Can irritate the eyes and cause watering and redness.
<b>Skin:</b>	Can cause skin irritation if in repeated or prolonged contact with the skin.
<b>Inhaled:</b>	Can be temporarily irritating to the respiratory system if aerosol mist breathed in.

### Effects: Chronic

Repeated skin contact may result in chronic dermatitis with redness and dryness of the skin.

### Additional Notes

MSDS Reference: MSDS-048  
Date Issued: 10 August 2010



**SECTION 12: ECOLOGICAL INFORMATION**

<b>Eco-toxicity:</b>	Product has no significant ecotoxicity.
<b>Persistence and Degradability:</b>	Biodegradeable.
<b>Mobility:</b>	Biodegradeable.

**SECTION 13: DISPOSAL CONSIDERATIONS**

Large spills - hose down but avoid this product getting into drains, sewers and waterways because of high BOD load and low pH. Bund and pump into suitable drum for reuse.

**SECTION 14: TRANSPORT INFORMATION**

<b>Proper Shipping Name:</b>	Not applicable
<b>UN number:</b>	Not applicable
<b>DG Class:</b>	Not applicable
<b>Subsidiary Risk 1:</b>	Not applicable
<b>Packaging Group:</b>	Not applicable
<b>HAZCHEM code:</b>	Not applicable
<b>Marine Pollutant:</b>	No
<b>Special Precautions for User:</b>	None
<b>ADDITIONAL TRANSPORT REQUIREMENTS:</b>	

**SECTION 15: REGULATORY INFORMATION**

<b>Poisons Schedule:</b>	Not scheduled
<b>Other:</b>	Nil

**SECTION 16: OTHER INFORMATION****For further information on this product, please contact:**

Sucrogen BioEthanol Pty Ltd (ABN 85 009 660 191)

Bruce Highway, Sarina, QLD, 4737, Australia

**Phone:** +61 7 4940 9822

**Fax:** +61 7 4956 2147

**ADDITIONAL INFORMATION****Australian Standards References:**

AS/NZS 1336	Recommended Practices for Occupational Eye Protection
AS/NZS 1715	Selection, Use and Maintenance of Respiratory Protective Devices

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AS/NZS 1716	Respiratory Protective Devices
AS 1940	The Storage and Handling of Flammable and Combustible Liquids
AS 2161	Industrial Safety Gloves and Mittens (excluding electrical and medical gloves)

**Other References:**

NOHSC:2011(2003)	National Code of Practice for the Preparation of Material Safety Data Sheets 2nd Edition, April 2003, National Occupational Health and Safety Commission.
NOHSC; 2012 (1994)	National Code of Practice for the Labelling of Workplace Substances, March 1994, Australian Government Publishing Service, Canberra.
NES	National Occupational Exposure Standards for Workplace Atmospheric Contaminants (NES), Safe Work Australia (formerly ASCC/NOHSC) 1995 as amended.
ADG Code	Australian Dangerous Goods Code 7 <sup>th</sup> Edition.

**AUTHORISATION**

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**END OF MSDS**