### SDS Urea

Date of Issue: 09/08/2024 Expiry: 09/08/2029

### 1. IDENTIFICATION OF THE MATERIAL AND SUPPLIER

Company Name ECP Limited

Address: 39 Woodside Ave, Northcote, Auckland, New Zealand

Emergency Tel: 0800 243 622 or	<b>Tel</b> +64 9 480 4386	FAX +64 9 480 4385
0800 CHE M CA LL		

Product	Urea			Codes	54101, 4203, 4204, 6450,			
				L13940.36				
CAS#		HSNO#	UN#	DG	Packing group #		Tracking?	Handlers
				Class/es				Certificate?
57-13-6	6	HSR002808	NA	NA	1	NA	No	No

**Recommended use:** Laboratory Investigations

#### 2. Hazards identification

Not a hazardous substance or mixture.

# 3. Composition/information on ingredients

Substance/mixture: Substance

3.1 Substances

Synonyms: Carbamide, Carbonyldiamide

Formula: CH<sub>4</sub>N, Molecular weight: 60.06 g/mol, CAS No.: 57-13-6

#### 4. First aid measures

4.1 Description of first aid measures

If breathed in, move person into fresh air. If not breathing, give artificial respiration.

In case of skin contact - Wash off with soap and plenty of water.

In case of eye contact - Flush eyes with water as a precaution.

If swallowed - Never give anything by mouth to an unconscious person. Rinse mouth with water.

# 5. Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

5.2 Special hazards arising from the substance or mixture

Carbon oxides, nitrogen oxides (NOx).

5.3 Advice for firefighters

Wear self-contained breathing apparatus for firefighting if necessary.

# 6. Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Avoid dust formation. Avoid breathing vapours, mist or gas.

6.2 Environmental precautions

No special environmental precautions required.

6.3 Methods and materials for containment and cleaning up

Sweep up and shovel. Keep in suitable, closed containers for disposal.

# 7. Handling and storage

7.1 Precautions for safe handling

Provide appropriate exhaust ventilation at places where dust is formed.

7.2 Conditions for safe storage, including any incompatibilities

Store in cool place. Keep container tightly closed in a dry and well-ventilated place.

#### 8. Exposure controls/personal protection

8.1 Control parameters

No exposure limits have been set for this substance.

8.2 Exposure controls

Appropriate engineering controls

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

Personal protective equipment

Eye/face protection

Face shield and safety glasses. Use equipment for eye protection tested and approved under appropriate government standards.

Skin protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Full contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm Break through time: 480 min

Splash contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm Break through time: 480 min

**Body Protection** 

Complete suit protecting against chemicals. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace. Respiratory protection

Where risk assessment shows air-purifying respirators are appropriate use a full-face particle respirator type or respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards.

Control of environmental exposure

No special environmental precautions required.

### 9. Physical and chemical properties

9.1 Information on basic physical and chemical properties

a) Appearance Form: powder Colour: white

b) pH

7.5 - 9.5 at 480 g/l at 25 °C c) Melting point/freezing point Melting point/range: 132 - 135 °C

d) Vapour pressure

0.009 hPa at 20 °C

e) Relative density

1.335 g/mL at 25 °C

f) Water solubility

480 g/l at 20 °C - completely soluble

g) Partition coefficient: n-octanol/water

log Pow: -2.59 - -1.59

# 10. Stability and reactivity

10.1 Chemical stability

Stable under recommended storage conditions.

10.2 Hazardous decomposition products

Hazardous decomposition products formed under fire conditions:

Carbon oxides, nitrogen oxides (NOx).

#### 11. Toxicological information

11.1 Information on toxicological effects

Acute toxicity

LD50 Oral - Rat - 8,471 mg/kg

Skin corrosion/irritation

Skin - Rabbit

Result: No skin irritation

Serious eye damage/eye irritation

Eyes - Rabbit

Result: No eye irritation

Carcinogenicity

IARC: No component of this product present at levels greater than or equal to 0.1% is identified as

probable, possible or confirmed human carcinogen by IARC.

Additional Information RTECS: YR6250000

# 12. Ecological information

12.1 Toxicity

Toxicity to fish

LC50 - Poecilia reticulata (guppy) - 17,500 mg/l - 96 h

Toxicity to daphnia and other aquatic invertebrates

EC50 - Daphnia magna (Water flea) - 3,910 mg/l - 48 h

### 13. Disposal considerations

13.1 Waste treatment methods

Product

Offer surplus and non-recyclable solutions to a licensed disposal company.

Contaminated packaging

Dispose of as unused product.

### 14. Transport Information Table

		ADR/RID – European packaging certification	IMDG International Maritime Dangerous Goods Code	IATA – DGR International Air Travel Association – Dangerous Goods Regulations
14.1	UN Number	-	-	-
14.2	UN Proper Shipping	Not dangerous	Not dangerous	Not dangerous goods
	name	goods	goods	
14.3	Transport Hazard	-	-	-
	Class			
14.4	Packaging group	•	-	-
14.5	Environmental	No	No	No
	Hazards			
14.6	Special precautions	None		
	for user			

# 15. Regulatory information

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

National regulatory information HSNO Approval Code: HSR002808

HSNO Group Standard Approval: HSR002596 - Laboratory Chemicals and Reagent Kits

**Group Standard 2006** 

Tracking Required: not required
Approved Handler Cert.: not required

#### 16. Disclaimer

The information above is believed to be accurate and represents the best information currently available to us. However, the information is not a guarantee expressed or implied, with respect to such information, and we assume no liability resulting from its use. Anyone using the chemical described here should ensure that he or she has the appropriate training and has the expertise and any equipment required for safe handling. If clarification or further information is required, please contact ECP Ltd or refer to the official handler of dangerous goods within your own company. The user should also make their own investigations to determine the suitability of the product for their particular purposes. In no event shall the company be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential, or exemplary damages howsoever arising, even if the company has been advised of the possibility of such damages.