



# Material Safety Data Sheet

## Sodium Bicarbonate MSDS

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### SECTION 1: CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

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**Product Name:** Sodium Bicarbonate

**CAS#:** 144-55-8

**Synonyms:** Sodium Hydrogen Carbonate

**Company Identification:**

PPEC Ltd, Sheepmarsh Lane, North Cotes Lincolnshire, DN36 5UU

**For information call:** 07741 161471 | 01472 389 545

**Emergency Number:** 07741 161471

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### SECTION 2: COMPOSITION AND INFORMATION ON INGREDIENTS

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Component	CAS-No	Weight%
Sodium Bicarbonate	144-55-8	>95

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### SECTION 3: HAZARDS IDENTIFICATION

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Classification

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

**Serious Eye Damage/Eye Irritation:** Category 2B

**Specific target organ toxicity (single exposure):** Category 3

**Target Organs:** Respiratory system.



## Label Elements

**Signal Word:** Danger

**Hazard Statements**

Causes eye irritation

May cause respiratory irritation



**Precautionary Statements**

**Prevention**

Avoid breathing dust/fume/gas/mist/vapors/spray

Use only outdoors or in a well-ventilated area

**Inhalation**

IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing

Call a POISON CENTER or doctor/physician if you feel unwell

**Storage**

Store locked up

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

**Disposal**

Dispose of contents/container to an approved waste disposal plant

**Hazards not otherwise classified (HNOC)**

None identified

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## SECTION 4: FIRST AID MEASURES

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**Eye Contact**

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.

Obtain medical attention.

**Skin Contact**

Wash off immediately with plenty of water for at least 15 minutes. Get medical attention if symptoms occur.

**Inhalation**

Move to fresh air. If breathing is difficult, give oxygen.

Get medical attention immediately if symptoms occur.

**Ingestion**

Do not induce vomiting. Obtain medical attention



**Most important symptoms/effects**

No information available.

**Notes to Physician:** Treat symptomatically

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SECTION 5: FIRE AND EXPLOSION DATA

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**Suitable Extinguishing Media:** Substance is nonflammable; use agent most appropriate to extinguish surrounding fire.

**Unsuitable Extinguishing Media :** No information available

**Flash Point:** No information available

**Method:** No information available

**Autoignition Temperature**

**Explosion Limits**

Upper - No data available

Lower - No data available

Sensitivity to Mechanical Impact - No information available

Sensitivity to Static Discharge - No information available

**Specific Hazards Arising from the Chemical**

Non-combustible, substance itself does not burn but may decompose upon heating to produce corrosive and/or toxic fumes.

**Hazardous Combustion Products**

Sodium Oxides

**Protective Equipment and Precautions for Firefighters**

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

NFPA

Health	Flammability	Instability	Physical Hazards
2	0	1	N/A



## SECTION 6: ACCIDENTAL RELEASE MEASURES

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### **Personal Precautions**

Ensure adequate ventilation. Use personal protective equipment. Avoid dust formation.

### **Environmental Precautions**

Should not be released into the environment. See Section 12 for additional ecological information.

### **Methods for Containment and Clean Up**

Sweep up or vacuum up spillage and collect in suitable container for disposal. Avoid dust formation.

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## SECTION 7: HANDLING AND STORAGE

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### **Handling**

Wear personal protective equipment. Ensure adequate ventilation. Avoid contact with skin and eyes. Avoid ingestion and inhalation. Avoid dust formation.

### **Storage**

Keep containers tightly closed in a dry, cool and well-ventilated place.

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## SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

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### **Exposure Guidelines**

This product does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.

### **Engineering Measures**

None under normal use conditions.

### **Personal Protective Equipment**

#### **Eye/face Protection**

Wear appropriate protective eyeglasses or chemical safety goggles as described by OSHA's eye and face protection regulations in 29 CFR 1910.133 or European Standard EN166

#### **Skin and body protection**

Wear appropriate protective gloves and clothing to prevent skin exposure.



### Respiratory Protection

No protective equipment is needed under normal use conditions..

### Hygiene Measures

Handle in accordance with good industrial hygiene and safety practice.

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## SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

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Physical State	Powder Solid
Appearance	White
Odor	Odorless
Odor Threshold	No information available
pH	8.3 0.1M aq. solution
Melting Point/Range	270 °C / 518 °F
Boiling Point/Range	No information available
Flash Point	Not applicable
Evaporation Rate	Not applicable
Flammability (solid,gas)	No information available
Flammability or explosive limits	
Upper	No data available
Lower	No data available
Vapor Pressure	No information available
Vapor Density	Not applicable
Relative Density	No information available
Solubility	Slightly soluble in water
Partition coefficient; n-octanol/water	No data available
Decomposition Temperature	> 50°C
Viscosity	Not applicable
Molecular Formula	C H Na O3
Molecular Weight	84.01

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## SECTION 10: STABILITY AND REACTIVITY DATA

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**Reactive Hazard:** None known, based on information available

**Stability:** Hygroscopic.

**Conditions to Avoid:** Avoid dust formation. Incompatible products. Exposure to moist air or water. Excess heat. Temperatures above 50°C

**Incompatible Materials:** Strong oxidizing agents, Acids

**Hazardous Decomposition Products:** Sodium oxides

**Hazardous Polymerization:** Hazardous polymerization does not occur.

**Hazardous Reactions:** Thermal decomposition.



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SECTION 11: TOXICOLOGICAL INFORMATION

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**Acute Toxicity**

**Product Information**

**Component Information**

Component	LD50 Oral	LD50Dermal	LC50 Inhalation
Sodium bicarbonate	4220 mg/kg ( Rat )	Not listed	Not listed

**Toxicologically Synergistic:** No information available

**Products**

**Delayed and immediate effects as well as chronic effects from short and long-term exposure**

**Irritation** Irritating to eyes and skin Moderately irritating to the eyes

**Sensitization:** No Information available

**Carcinogenicity:** The table below indicates whether each agency has listed any ingredient as a carcinogen.

Component	CAS-No	IARC	NTP	ACGIH	OSHA	Mexico
Sodium bicarbonate	144-55-8	Not Listed	Not Listed	Not Listed	Not Listed	Not Listed

**Mutagenic Effects:** No information available

**Reproductive Effects:** No information available

**Developmental Effects:** No information available

**Teratogenicity:** No information available

**STOT - single exposure:** Respiratory System

**STOT - repeated exposure:** None Known

**Aspiration hazard:** No information available

**Symptoms / effects,both acute and delayed:** No information available

**Endocrine Disruptor Information:** No information available

**Other Adverse Effects:**

The toxicological properties have not been fully investigated.

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SECTION 12: ECOLOGICAL INFORMATION

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**Ecotoxicity:**

Component	Freshwater Algae	Freshwater Fish	Microtox	Water Flea
Sodium bicarbonate	EC50: 650 mg/L/120h	8250 - 9000 mg/L LC50 96 h	-	EC50: 2350 mg/L/48h



**Persistence and Degradability:**

Soluble in water Persistence is unlikely based on information available.

**Bioaccumulation/ Accumulation:** No information available.

**Mobility:** Will likely be mobile in the environment due to its water solubility.

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SECTION 13: DISPOSAL CONSIDERATIONS

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**Waste Disposal Methods**

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. Chemical waste generators must also consult local, regional, and national hazardous waste regulations to ensure complete and accurate classification.

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SECTION 14: TRANSPORT INFORMATION

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DOT: Not Regulated

TDG: Not Regulated

IATA: Not Regulated

IMDG/IMO: Not Regulated

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SECTION 15: OTHER REGULATORY INFORMATION

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International Inventories

Component	TSCA	DSL	NDSL	EINECS	ELINCS	NLP	PICCS	ENCS	AICS	IECSC	KECL
Sodium bicarbonate	X	X	-	205-633-8	-		X	X	X	X	x

**Legend:**

X - Listed

E - Indicates a substance that is the subject of a Section 5(e) Consent order under TSCA.

F - Indicates a substance that is the subject of a Section 5(f) Rule under TSCA.

N - Indicates a polymeric substance containing no free-radical initiator in its inventory name but is considered to cover the designated polymer made with any free-radical initiator regardless of the amount used.

P - Indicates a commenced PMN substance

R - Indicates a substance that is the subject of a Section 6 risk management rule under TSCA.

S - Indicates a substance that is identified in a proposed or final Significant New Use Rule

T - Indicates a substance that is the subject of a Section 4 test rule under TSCA.



XU - Indicates a substance exempt from reporting under the Inventory Update Rule, i.e. Partial Updating of the TSCA Inventory Data Base

Production and Site Reports (40 CFR 710(B)).

Y1 - Indicates an exempt polymer that has a number-average molecular weight of 1,000 or greater.

Y2 - Indicates an exempt polymer that is a polyester and is made only from reactants included in a specified list of low concern reactants that comprises one of the eligibility criteria for the exemption rule.

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## SECTION 16: OTHER INFORMATION

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The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information 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 [scienceLab.com](http://scienceLab.com) has been advised of the possibility of such damages