








SODIUM BICARBONATE

MATERIAL SAFETY DATA SHEET

1. PRODUCT IDENTIFICATION / COMPANY ADDRESS

Name Of Chemical	Sodium Bicarbonate
Synonyms	Bicarb, baking soda, bicarbonate, sodium acid carbonate
Chemical Classification	
Formula	NaHCO ₃
Company Name / Address / Phone	Tata Chemicals Limited, Mithapur, District : Devbhoomi Dwarka (Gujarat) 361 345 INDIA Tel +91(02892) 665991/92/93 Emergency No +91(02892 665802),+91 9227676113 Contact Person : Devendra Thakur

2. HAZARD IDENTIFICATION

NFPA Classification	Health Hazard: 1 Fire Hazard: 0 Reactive Hazard: 0 Special Hazard :	
Primary Routes of Entry	Ingestion, Eyes, Inhalation, Skin Absorption	
Inhalation 	Prolonged inhalation of product dusts may irritate nose, throat, and lungs.	
Skin Contact 	Prolonged contact may cause skin irritation (red, dry, cracked skin)	
Ingestion 	Although low in toxicity, ingestion may cause nausea, vomiting, stomach ache, and diarrhea.	
Eye Contact 	causes Irritating to the eyes, redness, pain and lachrymation.	

3. COMPOSITION / INFORMATION ON INGREDIENTS

Hazardous components	
Component	CAS-No.
Sodium Bicarbonate	144-55-8

4. FIRST AID MEASURE

Eye contact	Check for and remove any contact lenses. In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Cold water may be used. Get medical attention.
Skin contact	In case of contact, immediately flush skin with plenty of water. Cover the irritated skin with an emollient. Remove contaminated clothing and shoes. Cold water may be used. Wash clothing before reuse. Thoroughly clean shoes before reuse. Get medical attention..
Ingestion	Do NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. If large quantities of this material are swallowed, call a physician immediately. Loosen tight clothing such as a collar, tie, belt or waistband.
Inhalation	If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.

5. FIRE FIGHTING MEASURES

Flash Point	Not Applicable	LEL (%)	Not Applicable
Fire Point	Not Applicable	UEL (%)	Not Applicable
FIRE AND EXPLOSION HAZARDS:	Non-flammable.		
EXTINGUISHING MEDIA:	In case of fire in close proximity, all means of extinguishing are acceptable.		
FIRE FIGHTING INSTRUCTIONS:	Use Protective Equipment as applicable to the combustion products associated with the fire.		

5. ACCIDENTAL RELEASE MEASURES

Personal precaution:	Refer to Section 8 "Exposure Controls / Personal Protection".
Methods for containment / Methods for cleaning up	<ul style="list-style-type: none"> Prevent large quantities of this product from contacting vegetation or waterways; large spills could kill vegetation and fish. This product, if spilled, can be recovered and re-used if contamination does not present a problem. Vacuum or sweep up the material. If the spilled product is unusable due to contamination, consult state or federal environmental agencies for acceptable disposal procedures and locations.

7. HANDLING AND STORAGE

Handling	<ul style="list-style-type: none"> Use air conveying / mechanical systems for bulk transfer to storage. For manual handling of bulk transfer use mechanical ventilation to remove airborne dust from railcar, ship or truck. Use approved respiratory protection when ventilation systems are not available. Selection of respirators is based on the dust cloud generation. Keep material out of lakes, streams, ponds and sewer drains. Avoid eye contact or prolonged skin contact. Avoid breathing dusts. When dissolving, add to water cautiously and with stirring; solutions can get hot. Use good personal hygiene and housekeeping.
Storage	Store in a cool dry area, away from acids. Prolonged storage may cause product to cake from atmospheric moisture

8. EXPOSURE CONTROL / PERSONAL PROTECTION

PERSONAL PROTECTION			
Eye protection	<ul style="list-style-type: none"> For dusty or misty conditions, or when handling solutions where there is reasonable probability of eye contact, wear chemical safety goggles and hardhat. Under these conditions do not wear contact lenses. Otherwise, appropriate eye and face protection equipment (ANSI Z87 approved) should be selected for the particular use intended for this material. Safety glasses with side shields are recommended. 		
Skin and body protection	Wear long-sleeve shirt and trousers, and impervious gloves for routine product use. Cotton gloves are sufficient for dry product; wear impervious (e.g., rubber, neoprene, etc.) gloves when handling solutions.		
Respiratory protection	Whenever dust in the worker's breathing zone cannot be controlled with ventilation or other engineering means, workers should wear respirators or dust masks approved by NIOSH or comparable certification organization to protect them against airborne dust.		
EXPOSURE LIMITS			
PEL / TLV-TWA (OSHA)	10 mg/m3 (InhalableDust) 5 mg/m3 (Respirable Dust)	TLV-STEL	-----

9. PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE			
Form	Granular solid		
Color	White		
Odor	Odorless		
SAFETY DATA			
Flash Point	Not Applicable	Freezing point	851 'c
Lower explosive limit	Not Applicable	Boiling point/boiling range	Decompose
Upper Explosive limit	Not Applicable	Vapor pressure	Not Applicable
Auto ignition temperature	Not Applicable	Bulk density	950-1035
Molecular Weight	105.9885 g/mol	Water solubility	220 (g/L) @22°C
pH	11.6	Evaporation rate	Not Applicable

11. TOXICOLOGICAL INFORMATION

Target Organ	Respiratory system	IDLH	-----
LD50 (oral / rats)	4,090 mg/kg	LC50 (inhalation / rats)	24 – hour 800 mg/m3

12. ECOLOGICAL INFORMATION

Ecotoxicity	Fishes LC50, 96 h, 300 mg/l
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13. DISPOSAL CONSIDERATIONS

Waste must be disposed of in accordance with federal, state and local environmental control regulations

14. TRANSPORT INFORMATION

UN No.	-----	Hazchem No.	-----
Shipping Name	-----	Codes/Label	-----

15. REGULATORY INFORMATION

LABELING:	
PHRASES R:	R36: Irritating to eyes R37: Irritating to respiratory system R38: ating to skin:
PHRASES S:	S22: Do not breathe dust S24: Avoid contact with skin S25: Avoid contact with eyes S26: In case of contact with eyes, rinse immediately with plenty of water and seek medical advice

OTHER INFORMATION

The information provided in this Material Safety data sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with other materials