

Material Safety Data Sheet / Safety Data sheet

Boric Acid

Section 1: Chemical Product Identifier and Synonyms

Product Name: Boric Acid

UN Number: Not available.

CAS Number: 10043-35-3

Synonym: Boron(III) hydroxide, Trihydroxidoboron, Orthoboric acid, Boracic acid, Sassolite, Optibor, Borofax, Trihydroxyborane, Boron(III) hydroxide and Boron Trihydroxide

Chemical Formula: H3BO3

Section 2: Composition and Information on Ingredients

Composition

Name	CAS Number:	% By Weight
Boric Acid	10043-35-3	99.9%

Toxicology Data On Ingredients: Boric Acid LD50: Not Available. LC50: Not Available

Section 3: Hazards Identification

Potential Acute Health Effects:

May damage fertility or the unborn child.

Potential Chronic Health Effects:

CARCINOGENIC EFFECTS: Not available. MUTAGENIC EFFECTS: Not available. TERATOGENIC EFFECTS: Not available. DEVELOPMENTAL TOXICITY: Not available.

Section 4: First Aid Measures

Eye Contact:

Rinse immediately with plenty of water. Obtain medical attention if pain, blinking or redness persist.

Skin Contact:

Remove affected clothing and wash all exposed skin area with mild soap and water, followed

by warm water rinse.

Inhalation:

Allow victim to breathe fresh air. Allow the victim to rest.

Ingestion:

Rinse mouth. Do NOT induce vomiting. Obtain emergency medical attention.

Section 5: Fire and Explosion Data

Flammability of the Product: This product is not flammable.

Auto-Ignition Temperature: Not available.

Flash Points: Not applicable.

Flammable Limits: Not applicable.

Products of Combustion: Not available.

Fire Hazards in Presence of Various Substances: Not applicable.

Explosion Hazards in Presence of Various Substances: Not available.

Risks of explosion of the product in presence of mechanical impact: Not available.

Risks of explosion of the product in presence of static discharge: Not available.

Fire Fighting Media and Instructions: Foam. Dry powder. Carbon dioxide. Water spray. Sand.

Do not use a heavy water stream.

Use water spray or fog for cooling exposed containers. Exercise caution when fighting any chemical fire. Prevent fire-fighting water from entering environment.

Special Remarks on Fire Hazards: Not available.

Special Remarks on Explosion Hazards: Not available.

Section 6: Accidental Release Measures

Small Spill:

Evacuate unnecessary personnel. Ventilate area.

Large Spill:

Evacuate unnecessary personnel. Ventilate area.

On land, sweep or shovel into suitable containers. Minimize generation of dust. Store away from other materials.

Section 7: Handling and Storage

Precautions:

Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Provide good ventilation in process area to prevent formation of vapor. Do not handle until all safety precautions have been read and understood. Obtain special instructions before use.

Storage:

Keep only in the original container in a cool, well ventilated place away from: incompatible materials. Keep container closed when not in use.

Section 8: Exposure Controls / Personal Protection

Engineering Controls:

Emergency eye wash fountains and safety showers should be available in the immediate vicinity of any potential exposure.

Personal Protection:

Safety glasses. Gloves. Protective clothing. Dust production: dust mask with filter.

Personal Protection in Case of a Large Spill:

Splash goggles. Full suit. Boots. Gloves. Suggested protective clothing might not be sufficient; Consult a specialist BEFORE handling this product.

Exposure Limits:

Consult local authorities for acceptable exposure limits.

Section 9: Physical and Chemical Properties

Physical state and appearance: Free flowing powder.

Odour: Not available.

Taste: Not available.

Molecular Weight: 61.83 g/mole

Colour: White.

pH (1% soln/water): 3.8 - 4.8 3.3% solution.

Boiling Point: 300 °C

Melting Point: 169 °C

Critical Temperature: Not available.

Specific Gravity: 1.435 (Water = 1)

Vapour Pressure: 2.7 mbar 20°C

Vapour Density: Not available.

Volatility: Not available.

Odour Threshold: Not available.

Water/Oil Dist. Coeff.: Not available.

Ionicity (in Water): Not available.

Dispersion Properties: Not available.

Solubility: Soluble in water.

Section 10: Stability and Reactivity Data

Stability: Stable under normal conditions.

Instability Temperature: Not available.

Conditions of Instability: Direct sunlight. Extremely high or low temperatures.

Incompatibility with various substances: Strong bases.

Special Remarks on Reactivity: Not available.

Special Remarks on Corrosivity: Not available.

Polymerization: Not available.

Section 11: Toxicological Information

Routes of Entry: Eye contact. Inhalation. Ingestion.

Toxicity to Animals: LD50 oral rat 2660 mg/kg LC50: Not available.

Chronic Effects on Humans: Not available.

Other Toxic Effects on Humans: Not available.

Special Remarks on Toxicity to Animals: Not available.

Special Remarks on Chronic Effects on Humans: Not available.

Special Remarks on other Toxic Effects on Humans: Not available.

Section 12: Ecological Information

Ecotoxicity: Not available.

BOD5 and COD: Not available.

Products of Biodegradation: Not available.

Toxicity of the Products of Biodegradation: Not available.

Special Remarks on the Products of Biodegradation: Not available.

Section 13: Disposal Information

Waste Disposal: Dispose of in accordance with local regulations

Section 14: Transport Information

DOT Classification: This product does not require a classification for transport.

Identification: Not available.

Special Provisions for Transport: Not available.

Section 15: Regulatory Information

Regulations: Labelling according to Regulation (EC) No 1272/2008.

Section 16: Other Information

The information supplied in this Safety Data Sheet is designed only as guidance for the safe use, storage and handling of the product. This information is correct to the best of our knowledge and belief at the date of publication however no guarantee is made to its accuracy. This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials. The author will not be held liable for any damage or injury caused by this product and does not obviate the requirement for end users to carry out their own workplace and specific use risk assessment.

Date of Publication: 18th May 2017