

BORON NITRIDE POWDER COSMETIC GRADE

[Section 1 – Product and Company Identification

Manufacturer/Distributor	TKB TRADING, LLC 1101 9th Avenue Oakland, CA 94606
Phone Numbers	510-922-9027
Trade Names and Synonyms	BORON NITRIDE
CAS Name	N/A
CAS Number	10043-11-5
TSCA Inventory status	Reported/Included

[Section 2 – Hazards Identification

Emergency Overview

Prevention	Do not breathe dusts or mists.
Responses	IF exposed or if you feel unwell: Call a POISON CENTER or doctor/physician
Storage/Disposal	Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

Physical Form	Powder
Color	White to off-white
Odor	Odorless
Route of Entry	Inhalation, Skin, Eye, Ingestion.
Eye:	May cause eye irritation
Skin	May cause skin irritation
Aggravated by Exposure	None
Inhalation	Inhalation of dusts may cause temporary irritation of the nose and throat.
Ingestion	Ingestion can cause nausea, vomiting and gastrointestinal irritation.

Potential Health Effects

Inhalation

- Acute (Immediate)** Exposure to dust may cause irritation. Nuisance dust may affect the lungs but reactions to short duration, low level dosage exposures are typically reversible.
- Chronic (Delayed)** No data available

Skin, Eyes

- Acute (Immediate)** Exposure to dust may cause mechanical irritation
- Chronic (Delayed)** No data available

Ingestion

- Acute (Immediate)** Excessive concentrations of nuisance dust in the workplace may cause mechanical irritation to mucous membranes.
- Chronic (Delayed)** No data available.

See Section 12 for Ecological Information

Section 3 – Composition/Information on Ingredients

Non-Hazardous Components						
Chemical Name	CAS	%(wt)	UN/EINECS	LD50/LC50	E R & S Phrases	Other
Boron Nitride	10043-11-5	99%-100%	233-136-6	NDA	NDA	None
Boron Oxide	1303-86-2	<0.5 %	N/A	NDA	NDA	None

Under United States Regulations (29CFR 1900-1200 – Hazard Communication Standard) this product is NOT hazardous.

In Canada, the product mentioned above is not considered hazardous under the Workplace Hazardous Materials Information System (WHMIS). According to European Directive 1999/45/EC this preparation is not considered dangerous.

According to Regulation (EC) No. 1272/2008 (CLP) this material is not considered *hazardous*.

According to the Globally Harmonized Standard for Classification and Labeling (GHS) this product is considered not hazardous.

See Section 11 for Toxicological Information

Section 4 – First Aid Measures

- Inhalation** Move victim to fresh air. Administer oxygen if breathing is difficult. Give artificial respiration if victim is not breathing.
- Skin** In case of contact with substance, immediately flush skin with running water for at least 20 minutes. Remove and isolate contaminated clothing and shoes.
- Eye** In case of contact with substance, immediately flush eyes with running water for at least 20 minutes.
- Ingestion** If swallowed, do NOT induce vomiting. Call a physician or poison control center immediately. NEVER give anything by mouth to an unconscious person.

See Section 11 for Toxicological Information.

Section 5 – Fire Fighting Measures

- Extinguishing Media** Use extinguishing media appropriate for surrounding fire.
- Unsuitable Extinguishing Media** No data available
- Firefighting Procedures** LARGE FIRES: Move containers from fire area if you can do it – without risk
LARGE FIRES: Do not scatter spilled material with high pressure water streams.
LARGE FIRES: Dike fire-control water for later disposal.
Keep unauthorized personnel away.
Stay upwind.
- Unusual Fire & Explosion Hazards** Material is non-combustible and is not expected to pose a fire or explosion hazard.
- Hazardous Combustion Products** Decomposition of this product may yield oxides of boron and nitrogen.
- Protection of Firefighters** Structural firefighter's protective clothing will only provide limited protection. Wear positive pressure self-contained breathing apparatus (SCBA).

Section 6 – Accidental Release Measures

Personal Precautions	Do not touch or walk through spilled material. Stay upwind. Use proper protective equipment as listed in section 8.
Emergency Procedures	As an immediate precautionary measure, isolate spill or leak area for at least 25 meters (75 feet) in all directions. Keep unauthorized personnel away. Avoid runoff into sewers, ditches, and waterways.
Containment/Clean-up	Stop leak if you can do it without risk. Shovel or sweep for disposal. Avoid creating dusty conditions. Provide ventilation.
Measures	SMALL SPILLS: Take up with sand or other non combustible absorbent material and place into containers for later disposal LARGE SPILLS: Dike far ahead of liquid spill for later disposal.

Section 7 – Handling and Storage

Handling	Avoid creating dusts. Do not use in areas without adequate ventilation. Wear eye protection (goggles, safety glasses or face mask). Wash hands thoroughly after handling.
Storage	Ventilate enclosed areas. Keep container closed. Keep away from heat and incompatible materials.
Special Packaging Materials	No data available
Incompatible Materials or Ignition Sources	No data available

Section 8 – Exposure Controls/Personal Protection

Personal Protective Equipment Pictograms



Respiratory	Gloves, Safety Glasses
Eye/Face	In case of insufficient ventilation, wear suitable respiratory equipment.
Hands	Wear Protective eyewear (goggles, face shield, or safety glasses).
General Industrial Hygiene Considerations	Wear appropriate gloves. Do not get in eyes or on skin or clothing. Handle in accordance with good industrial hygiene and safety practice.
Engineering Measures/Controls	Good general ventilation and/or local exhaust ventilation should be used. Ventilation rates should be matched to conditions in order to ensure that concentrations of airborne contaminants are below applicable threshold limit values.
Exposure Limits/Guidelines	No information available for product or components

	Result	Exposure Limits/Guidelines	OSHA
		ACGIH	
Boron Nitride as Particulate is not otherwise classified (PNOC)	TWAs	10 mg/m ³ TWA (inhalable particles, recommended); 3 mg/m ³ TWA (respirable particles, recommended) <i>as Particulates not otherwise classified (PNOC)</i>	15 mg/m ³ TWA (total dust); 5mg/m ³ TWA (respirable fraction) <i>as Particulates not otherwise classified (PNOC)</i>

Key to abbreviations

TWAEV	= Time-Weighted Average Exposure Value
TWA	= Time-Weighted Averages are based on 8h/day, 40h/week exposures
VLA-ED	= Valor Limite Ambiental Exposición Diaria is the limit for the daily average concentration
ACGIH	= American Conference of Governmental Industrial Hygiene
OSHA	= Occupational Safety and Health Administration

Section 9 – Physical and Chemical Properties

Physical Form Powder
Appearance/Description Pure white color, nano or micron powder with no apparent odor

Color: Pure white		Odor: Odorless	
Taste: NDA		Odor Threshold: NDA	
Boiling Point: NDA		Vapor Pressure: NDA	
Melting Point: NDA		Vapor Density: NDA	
Specific Gravity: 2.0-2.50		Evaporation Rate: NDA	
Particle size: 0-30 micron		VOC (Wt.): NDA	
Structure Hexagonal		VOC (Vol.): NDA	
pH: NDA		Volatiles (Wt.): NDA	
Water Solubility: Insoluble		Volatiles (Vol.): NDA	
Solvent Solubility: NDA		Flash Point: NDA	
Viscosity: NDA		Flash Point Test Type: NDA	
Half-Life: NDA		UEL: NDA	
Octanol/Water Partition coefficient: NDA		LEL: NDA	
Coefficient of water/oil distribution: NDA		Auto ignition: NDA	
Bioaccumulation Factor: NDA		Bio concentration Factor: NDA	
Biochemical Oxygen Demand BOD/BOD5: NDA		Chemical Oxygen Demand: NDA	
Persistence: NDA		Degradation: NDA	

Section 10 – Stability and Reactivity

Stability	➤ Stable
Hazardous Polymerization	➤ Hazardous polymerization will not occur
Conditions to Avoid	➤ Extreme heat, sparks, and open flame. Incompatible materials, oxidizers, and oxidizing agents.
Incompatible Materials	➤ This product may react with strong acids or oxidizing agents.
Hazardous Decomposition Products	➤ Decomposition of this product may result in oxides of boron and nitrogen. This will occur at 2204 °C (4000 °F).

Section 11 – Toxicological Information

Under normal conditions of use this material is not expected to pose any health risks. Exposure to this material may cause mechanical irritation to the skin, eyes and respiratory system.

Component Name	Concentration	CAS	Data
Boron Nitride	99%-100%	10043 11 5	Acute Toxicity : oral LD50:10 m/kg

Key to abbreviations
LD = Lethal Dose

Section 12 – Ecological Information

Ecological Fate	➤ No data available
Persistence/Degradability	➤ No data available
Bioaccumulation Potential	➤ No data available
Mobility in Soil	➤ No data available
No data available	➤ No data available

Section 13 – Disposal Considerations

Product

- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

Section 14 – Transportation Information

DOT – United States – Department of Transportation

Shipping Name: Not Regulated

TDG – Canada – Transport of Dangerous Goods

Shipping Name: Not Regulated

IMO/IMDG – International Maritime Transport

Shipping Name: Not Regulated

ADN – Europe Transport of Dangerous Goods by Road/Inland Waterway

Shipping Name: Not Regulated

IATA – International Air Transport Association

Shipping Name: Not Regulated

ADR – Europe Transport of Dangerous Goods by Road/Inland Waterway

Shipping Name: Not Regulated

RID – Europe Transport of Dangerous Goods by Railways

Shipping Name: Not Regulated

Section 15 – Regulatory Information

SARA Hazard Classifications

- None

Risk & Safety Phrases

- None

Inventory						
Component	CAS	Canada DSL	Canada NDSL	EU EINECS	EU ELNICS	TSCA
Boron Nitride	100463-11-5	Yes	No	Yes	No	Yes

Canada

Europe

United States

[Section 16 – Other Information

HMIS Health Hazard: 1
HMIS Fire Hazard: 1
HMIS Reactivity: 0
HMIS Personal Protection: X

Last Revision Date

➤ 07/16/13

Preparation Date

➤ 07/16/13

Disclaimer/Statement of Liability

➤ The information contained herein is believed to be accurate. It is not intended to constitute performance information concerning the product. No Express warranty, or implied warranty of merchantability or fitness for a particular purpose is made with respect to the product or the information contained herein.

Key to abbreviations

NDA = No Data Available

End of MSDS