

SAFETY DATA SHEETS

This SDS packet was issued with item:

074383113

The safety data sheets (SDS) in this packet apply to the individual products listed below. Please refer to invoice for specific item number(s).

075982103 075982152

DENTSPLY International
DENTSPLY PROSTHETICS

Safety Data Sheet

Date Issued: 10/13/97
Document Number: 135
Date Revised: 07/07/11
Revision Number: 3

1. PRODUCT IDENTIFICATION

Trade Name (as labeled): Trubyte® OrthoStone Dental Stone
Product Identifier (Part/Item Number): 99206, 99207, 99208
U.N. Number: None
U.N. Dangerous Goods Classification: Not Regulated for Transport
Recommended Use: Fabrication of Dental Molds and Acrylic Dentures
Restrictions on Use: For Professional Use Only
Manufacturer/Supplier Name: Dentsply Prosthetics
Manufacturer/Supplier Address: 570 West College Ave.
York, PA 17405-0872
Manufacturer/Supplier Telephone Number: 717-845-7511 (Product Information)
Emergency Contact Telephone Number: 800-424-9300 Chemtrec
Email address: Prosthetics_MSDS@Dentsply.com

2. HAZARD(S) IDENTIFICATION

EU Classification (1999/45/EC): Not Classified as Hazardous

Labeling in accordance with 1999/45/EC: No labeling required

US Hazard Classification: Hazardous





3. COMPOSITION AND INFORMATION ON INGREDIENTS

Hazardous Components	C.A.S. # EC#	EINECS #	Substance Classification	WT %
Calcium Sulfate Hemihydrate	26499-65-0	231-900-3	Not classified as hazardous	100%

4. FIRST-AID MEASURES

Routes of Exposure	First Aid Instructions
Eye	Flush eyes with water, holding the eyelids apart. Get medical attention if irritation occurs and persists.
Skin	No first aid is generally required. Wash skin with soap and water after use.
Inhalation	Remove victim to fresh air. If irritation or other symptoms persist, get medical attention.
Ingestion	May cause gastrointestinal discomfort and intestinal blockage. If swallowed, drink 1 or 2 glasses of water to dilute. Never give anything by mouth to an unconscious or convulsing person. Get immediate medical attention.
Most important symptoms of exposure	May cause eye irritation. Inhalation of dust may cause mucous membrane and respiratory irritation. When mixed with water, this material hardens and becomes very hot – may cause burns
Note to Physicians (Treatment, Testing, and Monitoring): Treat symptomatically.	

5. FIRE-FIGHTING MEASURES




Suitable Extinguishing Media:	Use media appropriate for surrounding fire.		
Fire Fighting Procedures:	Use water to cool fire exposed containers.		
Specific Hazards Arising from the Chemical:	Thermal decomposition (above 1450°C) may generate calcium oxide and sulfur dioxide.		
Precautions for Fire Fighters:	Firefighters should wear full emergency equipment and approved positive pressure self-containing breathing apparatus.		
Recommended Protective Equipment for Fire Fighters:			
EYES/FACE	HANDS	RESPIRATORY	SKIN
			

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions, PPE and Emergency Procedures: Wear appropriate protective clothing as described in Section 8. Avoid contact with eyes and skin. Do not breathe dust.

Environmental Precautions: Report releases as required by local and national authorities

Methods and Materials for Containment and Clean-up: Collect using dustless method (HEPA vacuum or wet method) and place in appropriate container for use. Do not use compressed air.

Recommended Personal Protective Equipment for Containment and Clean-up:			
EYES/FACE	HANDS	RESPIRATORY	SKIN
			

7. HANDLING AND STORAGE

Precautions for Safe Handling: Avoid contact with the eyes and skin. Do not breathe dust. Wear protective clothing and equipment as described in Section 8. Use with adequate ventilation and proper dust collection methods to keep exposure level below occupational exposure limits. Wash thoroughly with soap and water after handling. Keep containers closed when not in use

Conditions for Safe Storage: Store in a cool, dry, well ventilated area away from incompatible materials. Protect from physical damage.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Occupational Exposure Limits:



Calcium Sulfate Hemihydrate 5 mg/m³ TWA (respirable) 15 mg/m³ TWA (total dust) US OSHA PEL
 10 mg/m³ TWA (inhalable) ACGIH TLV
 1.5 mg/m³ (respirable), 4 mg/m³ TWA (inhalable) DFG MAK

Biological Exposure Limits: None

Appropriate Engineering Controls: Use adequate general or local exhaust ventilation to maintain exposures below the occupational exposure limits.

Individual Protection Measures (PPE)

- Specific Eye/face Protection:** Safety glasses or goggles if needed to avoid eye contact
- Specific Skin Protection:** Wear rubber or other impervious gloves to avoid prolonged or repeated contact. Impervious clothing as needed to avoid contamination of personal clothing.
- Specific Respiratory Protection:** If the exposure limits are exceeded an approved particulate respirator appropriate for the form and concentration of the contaminants should be used. Selection and use of respiratory equipment must be in accordance with all applicable regulations and good industrial hygiene practice.
- Specific Thermal Hazards:** None needed.

Recommended Personal Protective Equipment			
EYES/FACE	HANDS	RESPIRATORY	SKIN
			

Environmental Exposure Controls: Use dust collection if needed to avoid release to the environment.
General Hygiene Considerations and Work Practices: Avoid contact with eyes, skin, and clothing. Wash thoroughly after handling.
Protective Measures During Repair and Maintenance of Contaminated Equipment: Wear appropriate protective clothing and equipment.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	White powder	Explosive limits:	Not applicable
Odor:	No odor	Vapor pressure:	Not applicable
Odor threshold:	None	Vapor density:	Not applicable
pH:	Not applicable	Relative density:	2.6-3.2
Melting/freezing point:	Decomposes	Solubility:	Nil
Initial boiling point and range:	Not applicable	Partition coefficient: n-octanol/water:	Not available
Flash point:	Not flammable	Auto-ignition temperature:	Not applicable
Evaporation rate:	Not applicable	Decomposition temperature:	Not available
Flammability:	Not flammable	Viscosity:	Not applicable
Explosive Properties:	None	Oxidizing Properties:	None

10. STABILITY AND REACTIVITY

Reactivity: None known
Chemical Stability: Hygroscopic – absorbs water or moisture from the air.
Possibility of Hazardous Reactions: None known
Conditions to Avoid: Contact with water causes product to harden
Incompatible materials: Aluminum (+ heat), diazomethane, acids.

Hazardous Decomposition Products: Thermal decomposition will generate calcium oxide and toxic sulfur dioxide.

11. TOXICOLOGICAL INFORMATION

Potential Health Effects:

Eyes: Contact may cause mechanical irritation and possible injury.

Skin: May cause irritation. When this product is mixed with water, the material hardens and becomes hot – may cause skin burns.

Ingestion: No adverse effects expected for normal, incidental ingestion. Large amounts may cause gastrointestinal irritation.

Inhalation: Inhalation of dust may cause irritation to the nose, throat and upper respiratory tract with coughing and shortness of breath.

Chronic Health Effects: Prolonged or repeated skin contact may cause dermatitis.

Carcinogenicity: None of the components of this product are listed as carcinogens by OSHA, IARC, NTP, ACGIH or the EU Substances Directive.

Mutagenicity: No data is available. This product is not expected to cause mutagenic activity.

Medical Conditions Aggravated by Exposure: Individuals with pre-existing skin and respiratory disorders may be at increased risk from exposure

Acute Toxicity Data:

Calcium Sulfate Hemihydrate: Oral Rat LD50: >5000 mg/kg

Reproductive Toxicity Data: No data available. This product is not expected to cause adverse reproductive effects.

Specific Target Organ Toxicity (STOT):

Single Exposure: No data available.

Repeated Exposure: No data available.

12. ECOLOGICAL INFORMATION

Toxicity: Calcium Sulfate Hemihydrate: No data available

Persistence and Degradability: Biodegradation is not applicable to inorganic substances.

Bio-accumulative Potential: The potential for bioaccumulate is expected to be low.

Mobility in Soil: No data available.

Other Adverse Effects: None known

Results of PBT/vPvB Assessment: Not required

13. DISPOSAL CONSIDERATIONS

Regulations: Dispose in accordance with all national and local regulations.

Properties (Physical/Chemical) Affecting Disposal: None currently known.
Waste Treatment Recommendations: None known.

14. TRANSPORT INFORMATION

UN Identification Number: N/A
UN Proper Shipping Name: Not regulated for transport
Transport hazard class(es): N/A
Packing Group: N/A
Special precautions for user: None

15. REGULATORY INFORMATION

U.S. Federal Regulations

US OSHA Hazard Classification: Acute Health.

Comprehensive Environmental Response and Liability Act of 1980 (CERCLA): This product is not subject to CERCLA reporting requirements. Many states have more stringent release reporting requirements. Report spills required under federal, state and local regulations.

Toxic Substances Control Act (TSCA): All of the components are listed on the TSCA inventory (CAS number 7778-18-9)

Clean Water Act (CWA): This material is not regulated under the Clean Water Act

Clean Air Act (CAA): This material is not regulated under the Clean Air Act

Superfund Amendments and Reauthorization Act (SARA) Title III Information:

SARA Section 311/312 (40 CFR 370) Hazard Categories:

Immediate Hazard:	Yes	Pressure Hazard:	No
Delayed Hazard:	No	Reactivity Hazard:	No
Fire Hazard:	No		

This product contains the following toxic chemical(s) subject to reporting requirements of SARA Section 313 (40 CFR 372):

Components	C.A.S. #	WT %
None		

State Regulations

California: This product contains the following chemicals(s) known to the State of California to cause cancer, birth defects or reproductive harm:

Components	C.A.S. #	WT %
None		

International Regulations

Canadian Environmental Protection Act: All of the components in this product are listed on the Domestic Substances List (DSL).

Canadian Workplace Hazardous Materials Information System (WHMIS): Class D Division 2B (Toxic material causing other toxic effects)

European Inventory of Existing Chemicals (EINECS): All of the components in this product are listed on the EINECS inventory.

EU REACH: All components requiring registration have been pre-registered.

Australian Inventory of Chemical Substances: All of the components in this product are listed on the AICS for Australia.

China Inventory of Existing Chemicals and Chemical Substances: All of the components in this product are listed on the IECSC for China.

Japanese Existing and New Chemical Substances: All of the components in this product are listed on the Japanese ENCS list.

Korean Existing Chemicals List: All of the components in this product are listed on the KECL for Korea.

Philippine Inventory of Chemicals and Chemical Substances: All of the components in this product are listed on the PICCS.

16. OTHER INFORMATION

HMIS Hazard Rating:

Health -1 Flammability - 0 Physical Hazard - 0

Full text of Classification abbreviations used in Section 2 and 3: None

Supersedes: November 29, 2007

Revision Summary: Change in formulation. Change in format. Comprehensive review. Changes to all sections.

Data Sources: US NLM ChemID Plus and HSDB, Substance SDS for components, IUCLID Dataset EU Chemical Bureau, ESIS, Country websites for occupational exposure limits.