

OPC Low Wear Porcelain

MSDS Number: 108

Revision Date: 03/13/14

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PRODUCT AND COMPANY IDENTIFICATION

Product Name: OPC Low Wear Porcelain
Revision Date: 03/13/14
MSDS Number: 108
CAS Number: 12001-21-7
Product Code: All: Body, Modifier, Opaceous, Tissue Tint, Incisal, Add-on, Veneer, Light Diffuser
Product Use: Dental restorations

Ardent, Inc.
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Amherst, NY 14228, USA

Technical Services: (866) 751-8548 (9 AM - 5 PM EST)

For MSDS assistance:
Emergency Call USA-Infotrac: (800) 535-5053 (24 hours/7 days)
Emergency Call Canada-Canutec: - 1-(613)-996-6666 (24 hours/7 days)

General MSDS Assistance:
US: 1-800-922-5520
Canada: 1-800-263-8182

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HAZARDS IDENTIFICATION

Route of Entry: Inhalation, Eye contact, Skin contact, Ingestion
Target Organs: Lungs
Inhalation: May irritate respiratory system.
Skin Contact: May irritate skin.
Eye Contact: Airborne dust may irritate eyes.
Ingestion: May irritate digestive system.

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3	COMPOSITION/INFORMATION ON INGREDIENTS
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Ingredients:

CAS #	Component
12001-21-7	Dental Porcelain

This material does not contain any forms of crystalline silica. In addition to silicon (Si) and oxygen (O), dental porcelains comprise the following chemical elements: Al, K, Na, Ca, and may also comprise Li, Mg, Ba, Ce, Ti, Zr, Sn, Y, B, F and Fe. All these elements are not present in their pure or individual oxide forms but rather chemically bonded together within insoluble alumo-silicate glass matrix. By convention the composition of dental porcelain, same as composition of many other glass-ceramic materials, is still reported on individual oxide basis. In that representation composition of dental porcelain may be given as about 50-80% of SiO₂, about 5-15% of Al₂O₃ and the balance comprised of chemical constituents listed above and below. Dental porcelain also contains small amounts of non-silica inclusions: pigments, opacifiers, opalescing and fluorescing agents, which are based on crystalline forms of TiO₂, ZrO₂, Al₂O₃, zirconium silicate (ZrSiO₄) and yttrium silicate (Y₂SiO₅). In the fired state of dental porcelain these components are fused and completely encapsulated in chemically durable, insoluble glass matrix specifically designed and tested to resist wear and corrosion in oral environment.

OSHA Regulatory Status: This MSDS contains valuable information critical to the safe handling and proper use of the product. This MSDS should be retained and made available for employees and other users of this product.

4	FIRST AID MEASURES
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Inhalation:	Remove to fresh air.
Skin Contact:	Rinse with soap and water. Consult a physician if irritation occurs.
Eye Contact:	Flush with copious amounts of water for at least 15 minutes. Consult an ophthalmologist or medical attention if necessary.
Ingestion:	Rinse out mouth and drink plenty of water. Seek medical attention if necessary.

5	FIRE FIGHTING MEASURES
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Non-flammable.
Use the correct fire fighting measures for the surrounding area.

6	ACCIDENTAL RELEASE MEASURES
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Use personal protection recommended in Section 8. Isolate area to prevent unnecessary and unprotected personnel from coming in contact with powder. Powder should be vacuumed carefully as to not generate airborne dust.

7	HANDLING AND STORAGE
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Handling Precautions:	Do not inhale or ingest.
Storage Requirements:	Keep container tightly closed when not in use. Store in original container.

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8	EXPOSURE CONTROLS/PERSONAL PROTECTION
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Engineering Controls: Mix, grind, and/or polish in a well ventilated area or an area with a proper exhaust fan.
Personal Protective Equip: Use NIOSH-approved safety glasses and dust mask.

This product has not been evaluated as a whole.

9	PHYSICAL AND CHEMICAL PROPERTIES
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Appearance:	Fine powder in various colors	Odor:	odorless
Physical State:	Powder	Solubility:	Not available
Spec Grav./Density:	Not available	Freezing/Melting Pt.:	Not available
Boiling Point:	Not available	Vapor Density:	Not available
Vapor Pressure:	Not available		
pH:	Not available		

Bulk Density: 2.4-2.5 g/cm³
 Fusion Point: 1500-1600 deg F (816-871 deg C)
 Glass Transition Temperature: 800 deg F (427 deg C)

10	STABILITY AND REACTIVITY
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Stability: Stable
Conditions to Avoid: None known
Materials to Avoid: None known
Hazardous Decomposition: None known
Hazardous Polymerization: None known

11	TOXICOLOGICAL INFORMATION
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Not available

12	ECOLOGICAL INFORMATION
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Not available

13	DISPOSAL CONSIDERATIONS
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This information applies to the material as manufactured; processing, use, or contamination may make the information inappropriate, inaccurate, or incomplete.
 Waste must be handled in accordance with all applicable regulations. State and local disposal regulations may differ from federal disposal regulations. Dispose of container and unused contents in accordance with federal, state, and local requirements.

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14	TRANSPORT INFORMATION
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Not available

15	REGULATORY INFORMATION
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Not available

16	OTHER INFORMATION
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The information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed in good faith and believed to be correct as of the date hereof. Ardent, Inc. however, makes no representations as to the completeness or accuracy of this information and supplies it on the condition that the persons receiving same will make their own determinations as to its suitability for their purpose prior to use. In no event will Ardent, Inc. be responsible for damages of any nature whatsoever resulting from the use of or reliance upon this information.

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