SAFETY DATA SHEET

Section 1. Product And Company Identification

Product Name: Kolor+
Product Use: Dental product: Composite

Manufacturer: Kerr Corporation
1717 W. Collins Ave.
Orange, CA 92867-5422
U.S.A.

Information Phone Number: 1-800-841-1428 (Customer Service)

Chemical Emergency Phone Number (Chemical Spills, Leaks, Fire, Exposure or Accident only):
CHEMTREC 1-800-424-9300 (in the US) 1-703-527-3887 (Outside the US)

SDS Date of Preparation/Revision: April 4, 2019

Section 2. Hazards Identification

GHS Classification:
Eye Irritant Category 2A
Skin Irritant Category 2
Skin Sensitization Category 1
Toxic to Reproduction Category 1B
Aquatic Acute Toxicity Category 3
Aquatic Chronic Toxicity Category 3

Label Elements:
Danger!

Hazard Phrases
Causes skin irritation.
May cause an allergic skin reaction.
Causes serious eye irritation.
May damage fertility or the unborn child by ingestion.
Harmful to aquatic life with long lasting effects.

Precautionary Phrases:
Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood.
Avoid breathing dust or vapors.
Wash thoroughly after handling.
Contaminated work clothing should not be allowed out of the workplace.
Avoid release to the environment.
Wear protective gloves and eye protection.
IF exposed or concerned: Get medical attention.
IF ON SKIN: Wash with plenty of soap and water.
If skin irritation or rash occurs: Get medical attention.
Take off contaminated clothing and wash before reuse.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If eye irritation persists: Get medical attention.
Store locked up.
Dispose of contents and container in accordance with local and national regulations.

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS No.</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Silanated barium borosilicate glass</td>
<td>65997-17-3</td>
<td>30-60%</td>
</tr>
<tr>
<td>Triethylene glycol dimethacrylate</td>
<td>109-16-0</td>
<td>&lt;10%</td>
</tr>
<tr>
<td>Fumed silica, treated</td>
<td>68909-20-6</td>
<td>1-5%</td>
</tr>
<tr>
<td>Fumed silica</td>
<td>112945-52-5</td>
<td>1-5%</td>
</tr>
<tr>
<td>Titanium dioxide</td>
<td>13463-67-7</td>
<td>1-5%</td>
</tr>
<tr>
<td>2-Ethylhexyl-4-(dimethylamino)benzoate</td>
<td>21245-02-3</td>
<td>&lt;1%</td>
</tr>
<tr>
<td>2-Hydroxy-4-methoxybenzophenone</td>
<td>131-57-7</td>
<td>&lt;1%</td>
</tr>
<tr>
<td>2,6-Di-(tert-butyl)-4-methylphenol</td>
<td>128-37-0</td>
<td>&lt;1%</td>
</tr>
</tbody>
</table>

Section 4. First Aid Measures

**Inhalation:** Remove victim to fresh air. If breathing is difficult or irritation persists, get medical attention.

**Skin Contact:** Remove contaminated clothing and shoes. Flush skin thoroughly with water for several minutes. Get medical attention if irritation occurs. Launder clothing before re-use.

**Eye Contact:** Immediately flush eyes with large quantities of water for several minutes, while holding the eyelids apart. Remove contact lenses if easy to do so. Continue rinsing. Get medical attention if irritation persists.

**Ingestion:** Rinse mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Do not attempt to give anything by mouth to an unconscious person. Get medical attention if symptoms develop.

**Most important symptoms and effects, acute and delayed:** May cause moderate eye and skin irritation. May cause skin sensitization. Inhalation of dust from dried product or vapors may cause irritation of the mucous membranes and upper respiratory tract. This product may cause reproductive harm.

**Indication of immediate medical attention and special treatment, if needed:** Immediate medical attention is not required.
Section 5. Fire Fighting Measures

Suitable (and Unsuitable) Extinguishing Media: Use any media appropriate for the surrounding fire. Cool fire exposed containers with water.

Specific Hazards Arising from the Chemical: Combustion may produce oxides of carbon and nitrogen, and metal oxides.

Special Protective Equipment and Precautions for Fire-fighters: Firefighters should wear positive pressure self-contained breathing apparatus and full protective clothing for fires in areas where chemicals are used or stored. Cool fire-exposed containers with water. Contain water used in firefighting from entering sewers or natural waterways.

Section 6: Accidental Release Measures

Personal precautions, Protective equipment, and Emergency procedures: Evacuate spill area and keep unprotected personnel away. Avoid contact with eyes, skin and clothing. Wear appropriate protective clothing and equipment. Avoid breathing dust from dried product or vapors.

Environmental Precautions: Avoid releases to the environment. Report spill as required by local and federal regulations.

Methods and Materials for Containment and Cleaning up: Collect material with an inert absorbent material and place in appropriate, labeled container for disposal.

Section 7. Handling and Storage

Precautions for Safe Handling: Avoid contact with eyes, skin and clothing. Always wear impervious gloves, chemical safety goggles and protective clothing when handling this material. Wash thoroughly with soap and water after handling. Do not eat, drink or smoke in the work area. Do not breathe dust or vapors. Use with adequate ventilation. Remove and wash contaminated clothing before reuse.

Empty containers retain product residues which can be hazardous. Follow all SDS precautions when handling empty containers.

Conditions for Safe Storage, Including any Incompatibilities: Store in a cool, dry, well-ventilated area away from direct sunlight. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers.

Section 8. Exposure Controls / Personal Protection

Exposure Limits

<table>
<thead>
<tr>
<th>Chemical</th>
<th>Exposure Limit</th>
</tr>
</thead>
<tbody>
<tr>
<td>Silanated barium borosilicate glass (as PNOC)</td>
<td>5 mg/m³ (respirable fraction), 15 mg/m³ (total dust) TWA OSHA PEL</td>
</tr>
<tr>
<td>Triethylene glycol dimethacrylate</td>
<td>None Established</td>
</tr>
<tr>
<td>Fumed silica, treated</td>
<td>5 mg/m³ TWA OSHA PEL (respirable)</td>
</tr>
<tr>
<td></td>
<td>15 mg/m³ TWA OSHA PEL (total dust)</td>
</tr>
<tr>
<td>Fumed silica</td>
<td>6 mg/m³ TWA NIOSH REL</td>
</tr>
</tbody>
</table>
Titanium dioxide 10 mg/m$^3$ TWA ACGIH TLV
2-Ethylhexyl-4-(dimethylamino)benzoate None Established
2-Hydroxy-4-methoxybenzophenone None Established
2,6-Di-(tert-butyl)-4-methylphenol 10 mg/m$^3$ TWA OSHA PEL

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

**Respiratory Protection:** In operations where exposure levels are exceeded, an approved dust/mist respirator or supplied air respirator should be used. Equipment selection depends on contaminant type and concentration. Select in accordance with applicable regulations and good industrial hygiene practice.

**Hand protection:** Impervious gloves are suggested to prevent skin contact. Contact your glove supplier for selection assistance.

**Eye Protection:** Chemical safety goggles are recommended if contact is possible.

**Skin Protection:** Wear protective clothing as needed to avoid skin contact and contamination of personal clothing.

**Hygiene measures:** Suitable eye and skin washing facilities should be available in the work area.

### Section 9. Physical and Chemical Properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance</td>
<td>Paste of various colors</td>
</tr>
<tr>
<td>Odor Threshold</td>
<td>Not available</td>
</tr>
<tr>
<td>Melting/Freezing Point</td>
<td>Not available</td>
</tr>
<tr>
<td>Flash Point</td>
<td>Not flammable</td>
</tr>
<tr>
<td>Flammability: (Solid, Gas)</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Vapor Pressure</td>
<td>Not available</td>
</tr>
<tr>
<td>Relative Density</td>
<td>2</td>
</tr>
<tr>
<td>Partition Coefficient: (N-Octanol/Water)</td>
<td>Not available</td>
</tr>
<tr>
<td>Decomposition Temperature</td>
<td>Not available</td>
</tr>
<tr>
<td>Odor</td>
<td>Fruity ester-like</td>
</tr>
<tr>
<td>pH</td>
<td>Not available</td>
</tr>
<tr>
<td>Boiling Point/Range: Evaporation Rate</td>
<td>Not available</td>
</tr>
<tr>
<td>Flammability Limits: Vapor Density:</td>
<td>LEL: Not applicable UEL: Not applicable</td>
</tr>
<tr>
<td>Solubilities:</td>
<td>Insoluble in water</td>
</tr>
<tr>
<td>Autoignition Temperature</td>
<td>Not available</td>
</tr>
<tr>
<td>Viscosity</td>
<td>Not available</td>
</tr>
</tbody>
</table>

### Section 10. Stability and Reactivity

**Reactivity:** The product is not expected to be reactive.

**Chemical Stability:** Stable under normal storage and handling conditions.

**Possibility of Hazardous Reactions:** Hazardous polymerization will not occur.

**Conditions to avoid:** Keep away from heat and direct sunlight.

**Incompatible Materials:** Oxidizing materials and reducing materials, amine, and peroxide.

**Hazardous decomposition products:** Thermal decomposition will produce oxides of carbon and nitrogen, and metal oxides.
Section 11. Toxicological Information

Potential Health Effects:

**Inhalation:** Inhalation of dust from dried product or vapors may cause nose, throat and upper respiratory tract.

**Skin Contact:** May cause moderate skin irritation. May cause an allergic skin reaction (sensitization)

**Eye Contact:** Direct contact may cause moderate eye irritation.

**Ingestion:** Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.

**Chronic Hazards:** None currently known.

**Skin corrosion/irritation:** This product is expected to cause skin irritation.

**Eye damage/ irritation:** This product is expected to cause eye irritation.

**Skin Sensitization:** This product is expected to cause skin sensitization.

**Respiratory Sensitization:** No data available. This product is not expected to cause respiratory sensitization.

**Germ Cell Mutagenicity:** None of the components are mutagenic.

**Carcinogen:** None of the components are listed as a carcinogen or potential carcinogen by IARC, NTP, ACGIH, or OSHA.

**Developmental / Reproductive Toxicity:** 2-Ethylhexyl-4-(dimethylamino)benzoate is expected to cause reproductive harm by ingestion.

**Specific Target Organ Toxicity (Single Exposure):** No data available.

**Specific Target Organ Toxicity (Repeated Exposure):** No data available.

**Aspiration Toxicity:** Not an aspiration hazard.

**Acute Toxicity Values:**

Product ATE: 33291.3 mg/kg (Oral)
Silanated barium borosilicate glass: Not toxic
Triethylene glycol dimethacrylate: LD50 Oral rat: 10837 mg/kg
Fumed silica, treated: LD50 Oral rat: >5000 mg/kg; LC50 Inhalation rat: >0.14 mg/L/4hr (no mortality);
LD50 Dermal rabbit: >5000 mg/kg
Fumed silica: LD50 Oral rat: >5000 mg/kg; LC50 Inhalation rat: >0.14 mg/L/4hr (no mortality);
LD50 Dermal rabbit: >5000 mg/kg
Titanium dioxide: LD50 Oral rat: >2000 mg/kg; LC50 Inhalation rat: 3.43-5.09 mg/L/4hr (no mortality)
2-Ethylhexyl-4-(dimethylamino)benzoate: LD50 Oral rat: 14900 mg/kg
2-Hydroxy-4-methoxybenzophenone: LD50 Oral rat: 7400 mg/kg
2,6-Di-(tert-butyl)-4-methylphenol: LD50 Oral rat: >2000 mg/kg, LD50 Dermal rat: >2000 mg/kg

Section 12. Ecological Information

Toxicity:
Fumed silica, treated: 96 hr LC50 Brachydanio rerio >10000 mg/L; 
72 hr Scenedesmus subspicatus >10000 mg/L; 24 hr EC50 Daphnia magna >1000 mg/L 
Fumed silica: 96 hr LC50 Brachydanio rerio >10000 mg/L; 
24 hr EC50 Daphnia magna >10000 mg/L 
Titanium dioxide: 96 hr LC50 Pimephales promelas >1000 mg/L; 
72 hr Pseudokirchneriella subcapitata >100 mg/L; 48 hr Daphnia magna >1000 mg/L 
2-Hydroxy-4-methoxybenzophenone: 96hr LC50 Japanese rice fish- 3.8 mg/L; 
48hr EC50 Daphnia magna- 1.87 mg/L; 72hr Pseudokirchneriella subcapitata- 0.67 mg/L 
2,6-Di-(tert-butyl)-4-methylphenol: 96hr LC50 fish- 0.199 mg/L (QSAR); 
48hr EC50 Daphnia magna- 0.77 mg/L 

This product is classified as harmful to the aquatic environment with long-term adverse effects. Releases to the environment should be avoided.

**Persistence and degradability:** 2-Hydroxy-4-methoxybenzophenone: readily biodegradable but failing 10 day window- 62% in 28 days. 2,6-Di-(tert-butyl)-4-methylphenol: Not readily biodegradable in water screening tests-4.7% in 28 days. Biodegradation is not applicable to inorganic substances.

**Bioaccumulative Potential:** No data available.

**Mobility in Soil:** No data available.

**Other Adverse Effects:** No data available.

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### Section 13. Disposal Considerations

**Disposal:** For unused product, dispose of in accordance with Federal and local regulations. 
**Container Disposal:** Dispose of empty container in accordance with Federal and local regulations.

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### Section 14. Transport Information

<table>
<thead>
<tr>
<th></th>
<th>UN Number</th>
<th>UN Proper Shipping Name</th>
<th>Hazard Class(s)</th>
<th>Packing Group</th>
<th>Environmental Hazards</th>
</tr>
</thead>
<tbody>
<tr>
<td>US DOT</td>
<td>None</td>
<td>Not Regulated</td>
<td>None</td>
<td>None</td>
<td>Not applicable</td>
</tr>
<tr>
<td>EU ADR/RID</td>
<td>None</td>
<td>Not Regulated</td>
<td>None</td>
<td>None</td>
<td>Not applicable</td>
</tr>
<tr>
<td>IMDG</td>
<td>None</td>
<td>Not Regulated</td>
<td>None</td>
<td>None</td>
<td>Not applicable</td>
</tr>
<tr>
<td>IATA/ICAO</td>
<td>None</td>
<td>Not Regulated</td>
<td>None</td>
<td>None</td>
<td>Not applicable</td>
</tr>
</tbody>
</table>

**Special Precautions for User:** None identified

**Transport in Bulk According to Annex II MARPOL 73/78 and the IBC Code:** Not applicable – product is transported only in packaged form.

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### Section 15. Regulatory Information

**U.S. Federal Regulations:**

**EPA SARA 311/312 Hazard Classification:** Refer to Section 2 for OSHA Hazard Classification.
EPA SARA 313: This Product Contains the Following Chemicals Subject to Annual Release Reporting Requirements Under SARA Title III, Section 313 (40 CFR 372): None

Protection Of Stratospheric Ozone: This product is not known to contain or to have been manufactured with ozone depleting substances as defined in 40 CFR Part 82, Appendix A to Subpart A.

CERCLA SECTION 103: This product is not subject to CERCLA reporting requirements; however, many states have more stringent release reporting requirements. Report spills required under federal, state and local regulations.

International Inventories

US EPA TSCA Inventory: All of the components of this product are listed on the Toxic Substances Control Act (TSCA) Chemical Substances Inventory or exempt.

Canada CEPA: All of the components of this material are listed on the DSL or exempt.

Section 16. Other Information

Effective Date: April 4, 2019
Supersedes Date: April 2, 2015
Revision Summary: All Sections – New SDS format

The information and recommendations set forth herein are taken from sources believed to be accurate as of the date of preparation, however, KERR Corporation makes no warranty with respect to the accuracy or suitability of the recommendations, and assumes no liability to any use thereof.