

Issue Date 26-Jun-2015

Revision Date 29-Sep-2015

Version 1

## 1. IDENTIFICATION

### Product identifier

**Product Name** CM8005

### Other means of identification

**Product Code** MS-CM8005

**UN/ID no.** None

**Synonyms** None

### Recommended use of the chemical and restrictions on use

**Recommended Use** Anaerobic Adhesive.

**Uses advised against** None known

### Details of the supplier of the safety data sheet

#### **Manufacturer Address**

Hernon Manufacturing Inc.  
121 Tech Drive  
Sanford, FL 32771  
800-527-0004

### Emergency telephone number

**Company Phone Number** 407-322-4000

**Emergency Telephone** Chemtel 800-255-3924

## 2. HAZARDS IDENTIFICATION

### Classification

#### **OSHA Regulatory Status**

This chemical is not considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

|  |            |
|--|------------|
| Acute toxicity - Inhalation (Dusts/Mists)          | Category 4 |
| Skin corrosion/irritation                          | Category 2 |
| Serious eye damage/eye irritation                  | Category 1 |
| Respiratory sensitization                          | Category 1 |
| Skin sensitization                                 | Category 1 |
| Specific target organ toxicity (repeated exposure) | Category 2 |

### Label elements

#### **Emergency Overview**

#### **Warning**

#### **Hazard statements**

Harmful if inhaled  
Causes skin irritation  
Causes serious eye damage  
May cause allergy or asthma symptoms or breathing difficulties if inhaled  
May cause an allergic skin reaction  
Suspected of causing cancer  
May cause respiratory irritation  
May cause damage to organs through prolonged or repeated exposure

**Appearance** No information available**Physical state** gel**Odor** mild**Precautionary Statements - Prevention**

Obtain special instructions before use  
 Do not handle until all safety precautions have been read and understood  
 Wear protective gloves/protective clothing/eye protection/face protection  
 Wash face, hands and any exposed skin thoroughly after handling  
 In case of inadequate ventilation wear respiratory protection  
 Contaminated work clothing must not be allowed out of the workplace  
 Do not breathe dust/fume/gas/mist/vapors/spray

**Precautionary Statements - Response**

Call a POISON CENTER or doctor/physician if you feel unwell  
 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing  
 IF ON SKIN: Wash with plenty of water and soap  
 Take off contaminated clothing and wash it before reuse  
 If skin irritation or rash occurs: Get medical advice/attention  
 IF INHALED: Remove person to fresh air and keep comfortable for breathing  
 If experiencing respiratory symptoms: Call a POISON CENTER or doctor

**Precautionary Statements - Storage**

Store in a well-ventilated place. Keep container tightly closed

**Precautionary Statements - Disposal**

Dispose of contents/container to an approved waste disposal plant

**Hazards not otherwise classified (HNOC)**

Not applicable

**Other Information**

Very toxic to aquatic life with long lasting effects

### 3. COMPOSITION/INFORMATION ON INGREDIENTS

**Substance**

| Chemical Name  | CAS No.     | Weight-% | Trade Secret |
|--|-------------|----------|--------------|
| Polyurethane Dimethacrylate  | Proprietary | 70-100   | *            |
| Polyethylene Glycol Dimethacrylate<br>POLYETHYLENE GLYCOL DIMETHACRYLATE | 25852-47-5  | 10-20    | *            |
| Silicon Dioxide, Amorphous, Fumed, Crystalline Free                      | 112945-52-5 | 5 - 10   | *            |
| ACRYLIC ACID   | 79-10-7     | 1 - 5    | *            |
| Cumene Hydroperoxide   | 80-15-9     | 1 - 5    | *            |
| Ethylene Glycol  | 107-21-1    | 0.1 - 1  | *            |
| ACETYL 2 PHENYLHYDRAZINE   | 114-83-0    | 0.1 - 1  | *            |

\*The exact percentage (concentration) of composition has been withheld as a trade secret.

### 4. FIRST AID MEASURES

**Description of first aid measures**

|                     |  |
|---------------------|--|
| <b>Eye contact</b>  | Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids. Consult a physician.   |
| <b>Skin contact</b> | Wash with soap and water. Flush skin with water for several minutes. Remove contaminated clothing and shoes. If irritation develops, seek medical attention. Wash clothing before reuse. |
| <b>Inhalation</b>   | Remove to fresh air. If breathing is difficult, give oxygen. If breathing has stopped, give artificial respiration. Get medical attention immediately.                                   |
| <b>Ingestion</b>    | Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Call a POISON CENTER or doctor/physician if you feel unwell.  |

**Most important symptoms and effects, both acute and delayed**

**Symptoms** No information available.

**Indication of any immediate medical attention and special treatment needed**

**Note to physicians** Treat symptomatically.

## 5. FIRE-FIGHTING MEASURES

**Suitable extinguishing media**

Carbon dioxide (CO<sub>2</sub>). Dry chemical. Foam.

**Unsuitable extinguishing media** None.

**Specific hazards arising from the chemical**

No information available.

**Hazardous combustion products** Carbon oxides. Nitrogen oxides (NO<sub>x</sub>). Irritating organic vapors.

**Explosion data**

**Sensitivity to Mechanical Impact** None.

**Sensitivity to Static Discharge** None.

**Protective equipment and precautions for firefighters**

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

## 6. ACCIDENTAL RELEASE MEASURES

**Personal precautions, protective equipment and emergency procedures**

**Personal precautions** Wear protective gloves/protective clothing and eye/face protection.

**Environmental precautions**

**Environmental precautions** Do not allow into any sewer, on the ground or into any body of water. See Section 12 for additional ecological information.

**Methods and material for containment and cleaning up**

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Soak up with inert absorbent material. Pick up and transfer to properly labeled containers.

## 7. HANDLING AND STORAGE

### Precautions for safe handling

**Advice on safe handling** Avoid contact with skin, eyes or clothing. Avoid breathing vapors or mists. Wash thoroughly after handling. Ensure adequate ventilation, especially in confined areas.

### Conditions for safe storage, including any incompatibilities

**Storage Conditions** Keep at temperatures between 46° and 82 °F.

**Incompatible materials** Strong oxidizers. Reducing agent. Aldehydes. Alkali. Acids. Bases. Zinc. Iron. Aluminum. Copper.

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### Control parameters

**Exposure Guidelines** This product, as supplied, does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.

| Chemical Name               | ACGIH TLV                                   | OSHA PEL   | NIOSH IDLH  |
|-----------------------------|---|--|---|
| Polyurethane Dimethacrylate | TWA: 0.005 ppm                              | (vacated) Ceiling: 0.02 ppm<br>regulated under Methylene bisphenyl isocyanate<br>(vacated) Ceiling: 0.2 mg/m <sup>3</sup><br>regulated under Methylene bisphenyl isocyanate<br>Ceiling: 0.02 ppm<br>Ceiling: 0.2 mg/m <sup>3</sup> | IDLH: 75 mg/m <sup>3</sup><br>Ceiling: 0.020 ppm 10 min<br>Ceiling: 0.2 mg/m <sup>3</sup> 10 min<br>TWA: 0.005 ppm<br>TWA: 0.05 mg/m <sup>3</sup> |
| ACRYLIC ACID<br>79-10-7     | TWA: 2 ppm<br>S*                            | (vacated) TWA: 10 ppm<br>(vacated) TWA: 30 mg/m <sup>3</sup><br>(vacated) S*   | TWA: 2 ppm<br>TWA: 6 mg/m <sup>3</sup>  |
| Ethylene Glycol<br>107-21-1 | Ceiling: 100 mg/m <sup>3</sup> aerosol only | (vacated) Ceiling: 50 ppm<br>(vacated) Ceiling: 125 mg/m <sup>3</sup>  | -   |

### Appropriate engineering controls

**Engineering Controls** Minimize exposure by partial enclosure of the operation or equipment and provide extract ventilation at openings.

### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection** Wear protective gloves and protective clothing. Use rubber or plastic gloves.

**Respiratory protection** If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations.

**General Hygiene Considerations** Handle in accordance with good industrial hygiene and safety practice.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

### Information on basic physical and chemical properties

|                       |                          |                       |                          |
|-----------------------|--------------------------|-----------------------|--------------------------|
| <b>Physical state</b> | gel                      | <b>Odor</b>           | mild                     |
| <b>Appearance</b>     | No information available | <b>Odor threshold</b> | No information available |
| <b>Color</b>          | red                      |                       |                          |

|                 |                |                         |
|-----------------|----------------|-------------------------|
| <b>Property</b> | <b>Values</b>  | <b>Remarks • Method</b> |
| pH              | Does not apply |                         |

|                                       |                          |
|---------------------------------------|--------------------------|
| <b>Melting point / freezing point</b> | No information available |
| <b>Boiling point / boiling range</b>  | > 149 °C / 300 °F        |
| <b>Flash point</b>                    | > 93 °C / 200 °F         |
| <b>Evaporation rate</b>               | No information available |
| <b>Flammability (solid, gas)</b>      | No information available |
| <b>Flammability Limit in Air</b>      |                          |
| <b>Upper flammability limit:</b>      | No information available |
| <b>Lower flammability limit:</b>      | No information available |
| <b>Vapor pressure</b>                 | < 10 mm Hg @80 °F        |
| <b>Vapor density</b>                  | No information available |
| <b>Relative density</b>               | 1.11                     |
| <b>Water solubility</b>               | slightly soluble         |
| <b>Solubility in other solvents</b>   | No information available |
| <b>Partition coefficient</b>          | No information available |
| <b>Autoignition temperature</b>       | No information available |
| <b>Decomposition temperature</b>      | No information available |
| <b>Kinematic viscosity</b>            | No information available |
| <b>Dynamic viscosity</b>              | No information available |
| <b>Explosive properties</b>           | No information available |
| <b>Oxidizing properties</b>           | No information available |

**Other Information**

|                         |                          |
|-------------------------|--------------------------|
| <b>Softening point</b>  | No information available |
| <b>Molecular weight</b> | No information available |
| <b>VOC Content (%)</b>  | <4%                      |
| <b>Density</b>          | No information available |
| <b>Bulk density</b>     | No information available |

## 10. STABILITY AND REACTIVITY

**Reactivity**

No data available

**Chemical stability**

Stable under recommended storage conditions.

**Possibility of Hazardous Reactions**

None under normal processing.

**Conditions to avoid**

Storage near to reactive materials. Keep away from heat, sparks and open flame.

**Incompatible materials**

Strong oxidizers. Reducing agent. Aldehydes. Alkali. Acids. Bases. Zinc. Iron. Aluminum. Copper.

**Hazardous Decomposition Products**

Carbon oxides. Nitrogen oxides (NOx). Irritating organic vapors.

## 11. TOXICOLOGICAL INFORMATION

**Information on likely routes of exposure**

|                            |  |
|----------------------------|--|
| <b>Product Information</b> | Harmful by inhalation and in contact with skin                   |
| <b>Inhalation</b>          | Avoid breathing vapors or mists.                                 |
| <b>Eye contact</b>         | Contact with eyes may cause irritation.                          |
| <b>Skin contact</b>        | Irritating to skin. May cause skin irritation and/or dermatitis. |
| <b>Ingestion</b>           | No data available.   |

| Chemical Name               | Oral LD50                    | Dermal LD50 | Inhalation LC50                     |
|-----------------------------|------------------------------|-------------|-------------------------------------|
| Polyurethane Dimethacrylate | = 31600 mg/kg ( Rat ) = 9200 | -           | = 369 mg/m <sup>3</sup> ( Rat ) 4 h |

|  |   |   |  |
|--|---|---|--|
|  | mg/kg ( Rat )                             |   |  |
| Silicon Dioxide, Amorphous, Fumed, Crystalline Free<br>112945-52-5 | = 3160 mg/kg ( Rat )                      | -   | -  |
| ACRYLIC ACID<br>79-10-7  | = 193 mg/kg ( Rat ) = 33500 µg/kg ( Rat ) | = 280 µL/kg ( Rabbit ) = 295 mg/kg ( Rabbit ) | = 11.1 mg/L ( Rat ) 1 h = 3.6 mg/L ( Rat ) 4 h |
| Cumene Hydroperoxide<br>80-15-9                                    | = 382 mg/kg ( Rat )                       | = 0.126 mL/kg ( Rabbit )                      | = 220 ppm ( Rat ) 4 h                          |
| Ethylene Glycol<br>107-21-1  | 4000 - 10200 mg/kg ( Rat )                | = 10600 mg/kg ( Rat ) = 9530 µL/kg ( Rabbit ) | -  |

**Information on toxicological effects**

**Symptoms** No information available.

**Delayed and immediate effects as well as chronic effects from short and long-term exposure**

**Sensitization** No information available.

**Germ cell mutagenicity** No information available.

**Carcinogenicity** No information available.

| Chemical Name  | ACGIH | IARC    | NTP | OSHA |
|--|-------|---------|-----|------|
| Polyurethane Dimethacrylate  | -     | Group 3 | -   | -    |
| Silicon Dioxide, Amorphous, Fumed, Crystalline Free<br>112945-52-5 | -     | Group 3 | -   | -    |
| ACRYLIC ACID<br>79-10-7  | -     | Group 3 | -   | -    |

**Reproductive toxicity** No information available.

**STOT - single exposure** No information available.

**STOT - repeated exposure** Irritant.

**Aspiration hazard** No information available.

**Numerical measures of toxicity - Product Information**

The following values are calculated based on chapter 3.1 of the GHS document.

|                                      |                 |
|--------------------------------------|-----------------|
| <b>ATEmix (oral)</b>                 | 6,993.00 mg/kg  |
| <b>ATEmix (dermal)</b>               | 21,046.00 mg/kg |
| <b>ATEmix (inhalation-dust/mist)</b> | 1.59 mg/l       |

**12. ECOLOGICAL INFORMATION****Ecotoxicity**

Very toxic to aquatic life with long lasting effects

| Chemical Name                   | Algae/aquatic plants  | Fish   | Crustacea   |
|---------------------------------|---|--|---|
| ACRYLIC ACID<br>79-10-7         | 0.17: 96 h Pseudokirchneriella subcapitata mg/L EC50 0.04: 72 h Desmodesmus subspicatus mg/L EC50 | 222: 96 h Brachydanio rerio mg/L LC50 semi-static  | 95: 48 h Daphnia magna mg/L EC50 270: 24 h Daphnia magna mg/L LC50 Static |
| Cumene Hydroperoxide<br>80-15-9 | -   | 3.9: 96 h Oncorhynchus mykiss mg/L LC50 static   | 7: 24 h Daphnia magna mg/L EC50   |
| Ethylene Glycol<br>107-21-1     | 6500 - 13000: 96 h Pseudokirchneriella subcapitata mg/L EC50                                      | 41000: 96 h Oncorhynchus mykiss mg/L LC50 14 - 18: 96 h Oncorhynchus mykiss mL/L LC50 static 27540: 96 h Lepomis macrochirus mg/L LC50 static 40761: 96 h Oncorhynchus mykiss mg/L LC50 static 40000 - 60000: 96 h Pimephales promelas mg/L LC50 static 16000: 96 h Poecilia reticulata mg/L LC50 static | 46300: 48 h Daphnia magna mg/L EC50                                       |

**Persistence and degradability**

No information available.

**Bioaccumulation**

No information available.

| Chemical Name               | Partition coefficient |
|-----------------------------|-----------------------|
| ACRYLIC ACID<br>79-10-7     | 0.38 - 0.46           |
| Ethylene Glycol<br>107-21-1 | -1.93                 |

**Other adverse effects** No information available

**13. DISPOSAL CONSIDERATIONS**

**Waste treatment methods**

**Disposal of wastes** Disposal should be in accordance with applicable regional, national and local laws and regulations.

**Contaminated packaging** Do not reuse container.

| Chemical Name                   | RCRA | RCRA - Basis for Listing | RCRA - D Series Wastes | RCRA - U Series Wastes |
|---------------------------------|------|--------------------------|------------------------|------------------------|
| ACRYLIC ACID<br>79-10-7         | -    | -                        | -                      | U008                   |
| Cumene Hydroperoxide<br>80-15-9 | -    | -                        | -                      | U096                   |

| Chemical Name                   | California Hazardous Waste Status |
|---------------------------------|-----------------------------------|
| Cumene Hydroperoxide<br>80-15-9 | Toxic<br>Ignitable                |

**14. TRANSPORT INFORMATION**

**DOT** Not regulated  
**UN/ID no.** None  
**Proper shipping name** Not regulated  
**Hazard Class** None  
**Subsidiary class** None  
**Packing Group** None  
**Reportable Quantity (RQ)** None  
**Special Provisions** None

**IATA** Not regulated  
**UN/ID no.** None  
**Proper shipping name** Not regulated  
**Hazard Class** None  
**Subsidiary hazard class** None  
**Packing Group** None  
**ERG Code** None  
**Special Provisions** None  
**Description** None

**IMDG** Not regulated  
**UN/ID no.** None  
**Proper shipping name** Not regulated  
**Hazard Class** None

Subsidiary hazard class None  
 Packing Group None  
 EmS-No. None  
 Special Provisions None

**RID** Not regulated  
 UN/ID no. None  
 Proper shipping name Not regulated  
 Hazard Class None  
 Packing Group None  
 Classification code None  
 Special Provisions None

**ADR** Not regulated  
 UN/ID no. None  
 Proper shipping name Not regulated  
 Hazard Class None  
 Packing Group None  
 Classification code None  
 Tunnel restriction code None  
 Special Provisions None

## 15. REGULATORY INFORMATION

### International Inventories

TSCA Complies  
 DSL/NDSL Complies  
 EINECS/ELINCS Complies  
 ENCS Complies  
 IECS Complies  
 KECL Complies  
 PICCS Complies  
 AICS Complies

All ingredients are on the inventory or are exempt from listing.

### Legend:

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory  
 DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List  
 EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances  
 ENCS - Japan Existing and New Chemical Substances  
 IECS - China Inventory of Existing Chemical Substances  
 KECL - Korean Existing and Evaluated Chemical Substances  
 PICCS - Philippines Inventory of Chemicals and Chemical Substances  
 AICS - Australian Inventory of Chemical Substances

### US Federal Regulations

#### SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

| Chemical Name                  | SARA 313 - Threshold Values % |
|--------------------------------|-------------------------------|
| Polyurethane Dimethacrylate -  | 1.0                           |
| ACRYLIC ACID - 79-10-7         | 1.0                           |
| Cumene Hydroperoxide - 80-15-9 | 1.0                           |
| Ethylene Glycol - 107-21-1     | 1.0                           |

#### SARA 311/312 Hazard Categories

Acute health hazard No  
 Chronic Health Hazard No  
 Fire hazard No



**Sudden release of pressure hazard** No  
**Reactive Hazard** No

**CWA (Clean Water Act)**

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

**CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material

| Chemical Name                   | Hazardous Substances RQs | CERCLA/SARA RQ | Reportable Quantity (RQ)                   |
|---------------------------------|--------------------------|----------------|--|
| Polyurethane Dimethacrylate     | 5000 lb                  | -              | RQ 5000 lb final RQ<br>RQ 2270 kg final RQ |
| ACRYLIC ACID<br>79-10-7         | 5000 lb                  | -              | RQ 5000 lb final RQ<br>RQ 2270 kg final RQ |
| Cumene Hydroperoxide<br>80-15-9 | 10 lb                    | -              | RQ 10 lb final RQ<br>RQ 4.54 kg final RQ   |
| Ethylene Glycol<br>107-21-1     | 5000 lb                  | -              | RQ 5000 lb final RQ<br>RQ 2270 kg final RQ |

**US State Regulations****California Proposition 65**

This product does not contain any Proposition 65 chemicals

**U.S. State Right-to-Know Regulations**

| Chemical Name                   | New Jersey | Massachusetts | Pennsylvania |
|---------------------------------|------------|---------------|--------------|
| Polyurethane Dimethacrylate     | X          | X             | X            |
| ACRYLIC ACID<br>79-10-7         | X          | X             | X            |
| Cumene Hydroperoxide<br>80-15-9 | X          | X             | X            |
| Ethylene Glycol<br>107-21-1     | X          | X             | X            |

**U.S. EPA Label Information**

**EPA Pesticide Registration Number** Not applicable

|  |
|--|
| <b>16. OTHER INFORMATION, INCLUDING DATE OF PREPARATION OF THE LAST REVISION</b> |
|--|

|                    |                  |                |                    |                                    |
|--------------------|------------------|----------------|--------------------|------------------------------------|
| <b><u>NFPA</u></b> | Health hazards 0 | Flammability 0 | Instability 0      | Physical and Chemical Properties - |
| <b><u>HMIS</u></b> | Health hazards 2 | Flammability 1 | Physical hazards 1 | Personal protection X              |

**Prepared By** SDS coordinator  
**Issue Date** 26-Jun-2015  
**Revision Date** 29-Sep-2015  
**Revision Note**

No information available

**Disclaimer**

The information provided in this Material Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

**End of Safety Data Sheet**