Section 1. Identification

Product Identifier  DENTURE CLEANSING TABLETS
Synonyms  MDS136405; MSD_SDS0336
Manufacturer Stock Numbers  MDS136405

Recommended use  Consumer use.
Uses advised against  No information available.

Manufacturer Contact
Address  Medline Industries, Inc.
3 Lakes Drive
Northfield, IL, 60093
USA

Phone  (800) 633-5463
Emergency Phone  (800) 424-9300
 CHEMTREC
Fax  (847) 643-4436

Website  www.Medline.com

Section 2. Hazards Identification

OSHA Regulatory Status
This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Classification  ACUTE TOXICITY - ORAL - Category 4
EYE DAMAGE/IRRITATION - Category 2A

Signal Word  Warning

Pictogram

Hazard Statements  Causes serious eye irritation
Harmful if swallowed

Precautionary Statements
Response  If eye irritation persists: Get medical advice/attention.
If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If swallowed: Call a poison center/doctor/physician if you feel unwell.
Rinse mouth. If skin irritation or rash occurs: Get medical advice/attention.

Prevention
Do not eat, drink or smoke when using this product.
This is a low hazard product. However, chewing or swallowing the tablets or gargling with the solution may cause serious health effects. DO NOT take internally. Do not breathe dust. Keep out of eyes and avoid extended contact with skin to minimize chance of irritation.
Wash face, hands and any exposed skin thoroughly after handling.
Wear eye protection/face protection.

Storage
None

Disposal
Dispose of contents/container to an approved waste disposal plant.

Hazards not otherwise classified: N.A.
Unknown toxicity: 7% of the mixture consists of ingredient(s) of unknown toxicity.
Other information: Harmful to aquatic life with long lasting effects. When added to water, the product produces carbon dioxide bubbles for agitation, and a mild detergent and peroxide solution for cleaning. Read entire Safety Data Sheet for more information regarding this product.

Supplemental Information: This is a low hazard product. However, chewing or swallowing the tablets or gargling with the solution may cause serious health effects. DO NOT take internally. Do not breathe dust. Keep out of eyes and avoid extended contact with skin to minimize chance of irritation.

### Section 3. Ingredients

<table>
<thead>
<tr>
<th>CAS</th>
<th>Ingredient Name</th>
<th>Weight %</th>
</tr>
</thead>
<tbody>
<tr>
<td>1847-58-1</td>
<td>Acetic acid, sulfo-, 1-dodecyl ester, sodium salt</td>
<td>0.1% - 1%</td>
</tr>
<tr>
<td>497-19-8</td>
<td>Carbonic acid disodium salt</td>
<td>10% - 20%</td>
</tr>
<tr>
<td>70693-62-8</td>
<td>Potassium peroxymonosulfate sulfate (K5[HSO3(O2)][SO3(O2)][HSO4]2)</td>
<td>10% - 30%</td>
</tr>
<tr>
<td>77-92-9</td>
<td>1,2,3-Propanetricarboxylic acid, 2-hydroxy-</td>
<td>10% - 30%</td>
</tr>
<tr>
<td>7757-82-6</td>
<td>Sulfuric acid disodium salt</td>
<td>3% - 7%</td>
</tr>
<tr>
<td>15630-89-4</td>
<td>Carbonic acid disodium salt, compd. with hydrogen peroxide (H2O2) (2:3)</td>
<td>5% - 10%</td>
</tr>
</tbody>
</table>

Occupational exposure limits, if available, are listed in Section 8.

**Substance Mixture:** This product is a mixture.
Section 4. First-Aid Measures

General Advice: Under conditions of normal use, no hazards are anticipated which require special first aid measures. Get medical attention if any symptoms develop or persist. Always have plenty of water available for first aid.

Eye Contact: Not an expected route of exposure. Immediately flush with plenty of water. After initial flushing, remove any contact lenses and continue flushing for at least 15 minutes. Call a physician if irritation persists.

Skin Contact: Not an expected route of exposure. Get medical attention if irritation develops and persists.

Inhalation: Not an expected route of exposure. IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. If breathing is difficult, give oxygen. If not breathing, give artificial respiration. If continued difficulty with breathing is experienced, get medical attention immediately.

Ingestion: Do not ingest tablets or place them in mouth. Do not ingest or gargle solutions containing denture cleanser. Read and follow all usage directions. IF SWALLOWED. Do NOT induce vomiting. Drink plenty of water. Never give anything by mouth to an unconscious person. If swallowed, call a poison control center or physician immediately.

Most important symptoms and effects, both acute and delayed: Symptoms: Severe eye irritation. Symptoms may include stinging, tearing, redness, swelling and blurred vision. May cause skin irritation. May cause eye irritation. Ingestion may cause damage to the esophagus, abdominal pain, internal bleeding, breathing problems, seizures, bleaching of tissues, blood in the urine and vomiting. Chronic exposure may cause allergic reactions. Allergic reactions can occur with both proper and improper use of these cleaners. Symptoms of allergic reaction may include irritation, tissue damage, rash, hives, gum tenderness, breathing problems, low blood pressure.

Indication of any immediate medical attention and special treatment needed: Notes to physician: Treat symptomatically.

Section 5. Fire Fighting Measures

Suitable Extinguishing Media: Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Use copious amounts of water to extinguish fire.

Unsuitable Extinguishing Media: None.

Specific hazards arising from the chemical: Dry product will react with water and effervesce. Wet product in tight containers may rupture. No significant hazard expected.

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.
Section 6. Accidental Release Measures

Personal precautions: Physical form requires no specific personal protection when cleaning up spills. Wear dust mask, safety glasses and gloves as appropriate.

Other Information: Sweep up or vacuum. Collect material for disposal.

For Emergency Responders: Use personal protective equipment as required.

Environmental Precautions: Collect spillage. Not readily biodegradable. Although product is not considered to be an environmental hazard avoid release to the environment.

Methods for Containment: Sweep up or vacuum. Collect material for disposal.

Methods for Cleaning Up: Avoid creating dust. Sweep up and shovel into suitable containers for disposal.

Section 7. Handling and Storage

Advice on Safe Handling: Handle in accordance with good industrial hygiene and safety practice. Avoid breathing dust. Wash thoroughly after handling.

Storage Conditions: Keep away from heat. Protect from moisture.

Incompatible Materials: Water causes production of gaseous carbon dioxide and a slowly reactive hydrogen peroxide.

Section 8. Exposure Controls/Personal Protection

Occupational Exposure Limits

<table>
<thead>
<tr>
<th>Ingredient Name</th>
<th>ACGIH TLV</th>
<th>OSHA PEL</th>
<th>STEL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acetic acid, sulfo-, 1-dodecyl ester, sodium salt</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>Carbonic acid disodium salt</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>Potassium peroxymonosulfate sulfate (K(5[H2O2])) <a href="HSO4">SO3(O2)</a>2</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>1,2,3-Propanetricarboxylic acid, 2-hydroxy-</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>Sulfuric acid disodium salt</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>Carbonic acid disodium salt, compd. with hydrogen peroxide (H2O2) (2:3)</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
</tbody>
</table>

Personal Protective Equipment

Goggles, Gloves


Eye/Face Protection: Wear safety glasses with side shields (or goggles) if exposed to powder or dust.

Skin and Body Protection: Wear rubber gloves during industrial processing. Extended contact may cause skin irritation.

Respiratory Protection: If exposure limits are exceeded or irritation is experienced, a NIOSH/MSHA approved respiratory protection should be worn.

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

Exposure Guidelines:

OSHA PELs for Particulates Not Otherwise Regulated (PNOR):
15 mg/m3 TWA (total dust)
5 mg/m3 TWA (respirable fraction).
## Section 9. Physical and Chemical Properties

<table>
<thead>
<tr>
<th>Physical State</th>
<th>Solid or Powder</th>
</tr>
</thead>
<tbody>
<tr>
<td>Color</td>
<td>Blue, green, white or combination of Compressed Tablet</td>
</tr>
<tr>
<td>Odor</td>
<td>Peppermint</td>
</tr>
<tr>
<td>Odor Threshold</td>
<td>No information available</td>
</tr>
<tr>
<td>Solubility</td>
<td>Soluble in water</td>
</tr>
<tr>
<td>Partition coefficient Water/n-octanol</td>
<td>N.A.</td>
</tr>
<tr>
<td>VOC%</td>
<td>N/A</td>
</tr>
<tr>
<td>Viscosity</td>
<td>N.A.</td>
</tr>
<tr>
<td>Specific Gravity</td>
<td>N.D.</td>
</tr>
<tr>
<td>Density lbs/Gal</td>
<td>N/A</td>
</tr>
<tr>
<td>Pounds per Cubic Foot</td>
<td>N/A</td>
</tr>
<tr>
<td>Flash Point</td>
<td>N.A.</td>
</tr>
<tr>
<td>FP Method</td>
<td>N.A.</td>
</tr>
<tr>
<td>pH</td>
<td>(1-3% aqueous solution) 6-9</td>
</tr>
<tr>
<td>Melting Point</td>
<td>N.A.</td>
</tr>
<tr>
<td>Boiling Point</td>
<td>N.A.</td>
</tr>
<tr>
<td>Boiling Range</td>
<td>N.A.</td>
</tr>
<tr>
<td>LEL</td>
<td>N/A</td>
</tr>
<tr>
<td>UEL</td>
<td>N/A</td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>N.A.</td>
</tr>
<tr>
<td>Flammability</td>
<td>N.A.</td>
</tr>
<tr>
<td>Decomposition Temperature</td>
<td>N.A.</td>
</tr>
<tr>
<td>Auto-ignition Temperature</td>
<td>N.A.</td>
</tr>
<tr>
<td>Vapor Pressure</td>
<td>N.A.</td>
</tr>
<tr>
<td>Vapor Density</td>
<td>N.A.</td>
</tr>
</tbody>
</table>

Other information: Mixture of detergents, mild inorganic bleaching agents and auxiliary ingredients.

Oxidizing Properties: Contains oxidizing compounds but in a form which reduces any hazard arising from their presence.

Softening Point: N.A.

Molecular Weight: No information available.

VOC content (%): N.A.

Bulk Density: 0.9 g/cc
### Section 10. Stability and Reactivity

<table>
<thead>
<tr>
<th>Category</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Reactivity:</td>
<td>N.A.</td>
</tr>
<tr>
<td>Chemical Stability:</td>
<td>Stable under normal conditions of handling, use and transportation.</td>
</tr>
<tr>
<td>Possibility of Hazardous Reactions:</td>
<td>None under normal processing.</td>
</tr>
<tr>
<td>Hazardous Polymerization Conditions to avoid:</td>
<td>Hazardous polymerization does not occur.</td>
</tr>
<tr>
<td>Incompatibility (Materials to Avoid)</td>
<td>Heat, Water.</td>
</tr>
<tr>
<td>Hazardous Decomposition or Byproducts:</td>
<td>Water causes production of gaseous carbon dioxide and a slowly reactive hydrogen peroxide.</td>
</tr>
<tr>
<td>Hazardous Decomposition or Byproducts:</td>
<td>Carbon dioxide.</td>
</tr>
<tr>
<td></td>
<td>Hydrogen peroxide.</td>
</tr>
</tbody>
</table>
Section 11. Toxicological Information

Product Information: The product has not been tested. Toxicological testing has not been conducted for this product overall. Available toxicological data for individual ingredients are summarized below.

Eye Contact: Contact with eyes may cause irritation.
Skin Contact: Prolonged contact may cause redness and irritation.
Inhalation: May cause irritation of respiratory tract.
Ingestion: Harmful if swallowed.

Chemical Name: Oxone CAS-No. 70693-62-8
Oral LD50: = 1204 mg/kg (Rat)
Dermal LD50: > 11000 mg/kg (Rabbit)
Inhalation LC50: > 14 mg/L (Rat) 1 h

Chemical Name: Citric acid CAS-No. 77-92-9
Oral LD50: = 3000 mg/kg (Rat)
Dermal LD50: -
Inhalation LC50: -

Chemical Name: Sodium carbonate CAS-No. 497-19-8
Oral LD50: = 4090 mg/kg (Rat)
Dermal LD50: -
Inhalation LC50: = 2300 mg/m3 (Rat) 2 h

Chemical Name: Sodium percarbonate CAS-No. 15630-89-4
Oral LD50: = 1034 mg/kg (Rat)
Dermal LD50: -
Inhalation LC50: -

Chemical Name: Sodium sulfate CAS-No. 7757-82-6
Oral LD50: = > 10000 mg/kg (Rat)
Dermal LD50: -
Inhalation LC50: -

Chemical Name: Sodium Lauryl Sulfoacetate CAS-No. 1847-58-1
Oral LD50: = 700 mg/kg (Rat)
Dermal LD50: -
Inhalation LC50: -

Information on Toxicological Effects:
Symptoms: No information available.
Skin corrosion/irritation: Not classified.
Serious Eye Damage/Eye irritation: Not classified.
Irritation: May cause irritation.
Corrosivity: Not classified.
Sensitization: No sensitization responses were observed.
Germ cell Mutagenicity: Not classified.
Carcinogenicity: This product does not contain any carcinogens or potential carcinogens as listed by OSHA, IARC or NTP.
Reproductive Toxicity: This product does not contain any known or suspected reproductive hazards.
Developmental Toxicity: Not classified.
Teratogenicity: Not classified.
Specific Target Organ Toxicity - Single exposure: Not classified.
Specific Target Organ Toxicity - Repeated exposure: Not classified.
Chronic Toxicity: No known effect.
Subchronic Toxicity: No known effect.
Target Organ Effects: No known effects under normal use conditions, Gastrointestinal tract (GI).
Neurological Effects: None known
Aspiration hazard: N.A.

Section 12. Ecological Information

Ecotoxicity: The following table lists information related to aquatic toxicity.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Algae/aquatic plants:</th>
<th>Fish:</th>
<th>Crustacea:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oxone CAS-No. 70693-62-8</td>
<td>-</td>
<td>32: 96 h Brachydanio rerio mg/L LC50 semi-static</td>
<td>5.3: 24 h Daphnia magna mg/L EC50</td>
</tr>
<tr>
<td>Citric acid CAS-No. 77-92-9</td>
<td>-</td>
<td>1516: 96 h Lepomis macrochirus mg/L LC50 static</td>
<td>120: 72 h Daphnia magna mg/L EC50</td>
</tr>
<tr>
<td>Sodium carbonate CAS-No. 497-19-8</td>
<td>242: 120 h Nitzschia mg/L EC50</td>
<td>300: 96 h Lepomis macrochirus mg/L LC50 static 310 - 1220: 96 h Pimephales promelas mg/L LC50 static</td>
<td>265: 48 h Daphnia magna mg/L EC50</td>
</tr>
<tr>
<td>Sodium percarbonate CAS-No. 15630-89-4</td>
<td>70: 240 h Chlorella emersonii mg/L EC50</td>
<td>70.7: 96 h Pimephales promelas mg/L LC50 static</td>
<td>4.9: 48 h Daphnia pulex mg/L EC50</td>
</tr>
<tr>
<td>Sodium sulfate CAS-No. 7757-82-6</td>
<td>-</td>
<td>13500 - 14500: 96 h Pimephales promelas mg/L LC50 6800: 96 h Pimephales promelas mg/L LC50 static 3040 - 4380: 96 h Lepomis macrochirus mg/L LC50 static 13500: 96 h Lepomis macrochirus mg/L LC50</td>
<td>2564: 48 h Daphnia magna mg/L EC50 630: 96 h Daphnia magna mg/L EC50</td>
</tr>
</tbody>
</table>

Persistence and degradability: Not readily biodegradable.
Bioaccumulation: Not readily biodegradable.

Other adverse effects: No information available.

Partition coefficient: -1.72
Section 13. Disposal

Waste Treatment Methods: Disposal of Wastes:
Disposal should be in accordance with applicable regional, national and local laws and regulations. Dispose of contents/containers in accordance with local regulations. This material, as supplied, is not a hazardous waste according to state and federal regulations (40 CFR 261).

This product contains one or more substances that are listed with the State of California as a hazardous waste.

Chemical Name: Sodium carbonate CAS-No. 497-19-8
California Hazardous Waste Status: Corrosive

Chemical Name: Sodium percarbonate CAS-No. 15630-89-4
California Hazardous Waste Status: Ignitable

Section 14. Transport Information

UN Number: N/A
UN Proper Shipping Name: Not Regulated
DOT Classification: Not regulated
Packing Group: Not regulated

Section 15. Regulatory Information

SARA 311/312: N.A.
SARA 302: N.A.
SARA 313: N.A.
TSCA: N.A.
CERCLA Hazardous Substance List: N.A.
Clean Air Act (CAA) Section 112, 112 (r): N.A.
Pennsylvania Right to Know Components: SODIUM SULFATE (SOLUTION)
### Section 16. Other Information

<table>
<thead>
<tr>
<th>Revision Date</th>
<th>5/12/2017</th>
</tr>
</thead>
</table>
| Legend        | N.A. - Not Applicable  
               | N.E. - Not Established  
               | N.D. - Not Determined |
| HMIS (U.S.A.): Health Hazard | 1 |
| HMIS (U.S.A.): Flammability | O |
| HMIS (U.S.A.): Physical Hazard | O |
| HMIS (U.S.A.): Personal Protection | E. |
| National Fire Protection Association (U.S.A): Health Hazard | O |
| National Fire Protection Association (U.S.A): Flammability | O |
| National Fire Protection Association (U.S.A): Instability Hazard | O |
| National Fire Protection Association (U.S.A): Physical and Chemical Properties: | - |

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