Section 1 - Product and Company Identification

Material Name: Elastomeric Asphalt Emulsion
Chemical Category: Asphalt Based Rubberized Emulsion
Product Code: AP-3370
Product Description: Asphalt emulsion roof and foundation coating
Manufacturer: APOC
4161 E. 7th Avenue
Tampa, FL 33605
United States

Section 2 - Hazards Identification

Signal Word: WARNING!

Hazards and Precautions

May be harmful if swallowed. May cause respiratory irritation. Causes eye irritation. Causes mild skin irritation. Vapors may cause headache, nausea, and respiratory tract irritation. Contains Petroleum Based Products. Use only with adequate ventilation. Avoid prolonged breathing of vapor or spray mist. Keep product closed and properly stored when not in use. Avoid contact with skin. Use protective gloves, safety glasses, and protective clothing when using this product. Do not use in drinking water or food systems. Do not reuse empty container. Make sure container is sealed and secured in an upright position during transportation. Do not eat or drink while using this product and wash hand thoroughly after use.

Prevention: Do not breathe dust, fume, gas, mist, vapors and/or spray. Do not handle until all safety precautions have been read and understood.

Response: IF exposed or if you feel unwell: Call a POISON CENTER or doctor/physician.

Physical Form: Liquid
Color: Black
Odor: Mild Hydrocarbon.
Flash Point: 460°F
OSHA(HCS2012): Specific Target Organ Toxicity Repeated Exposure - Category 2, Skin Corrosion/Irritation - Category 2, Serious Eye Damage, Eye Irritation - Category 2, Germ Cell Mutagenicity - Category 1, Carcinogenicity - Category 1A
WHMIS: Other Toxic Effects - D2A
Potential Health Effects

Inhalation:
Acute (Immediate) • May cause irritation.
Chronic (Delayed) • No data available

Skin:
Acute (Immediate) • May cause irritation.
Chronic (Delayed) • Repeated and prolonged exposure may cause dermatitis.

Eye:
Acute (Immediate) • May cause burning and redness or swelling of the eyes. May cause irritation.
Chronic (Delayed) • Repeated and prolonged exposure may cause irritation.

Ingestion:
Acute (Immediate) • May be harmful or fatal if swallowed.
Chronic (Delayed) • No data available

Carcinogenic Effects • See Section 11 - Toxicological Information.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Identifiers</th>
<th>% (weight)</th>
<th>LD50/LC50</th>
<th>Classifications According to Regulation/Directive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asphalt</td>
<td>CAS:8052-42-4</td>
<td>30% TO 40%</td>
<td>Ingestion/Oral-Rat LD50 • &gt;5000 mg/kg, Inhalation-Rat LC50 • &gt;94.4 mg/m³</td>
<td>OSHA: Carc.; Irrit. WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 2; Eye Irrit. 2A; Skin Irrit. 2</td>
</tr>
<tr>
<td>Quartz</td>
<td>CAS:14808-60-7</td>
<td>1% TO 5%</td>
<td></td>
<td>WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 1A; STOT RE 1 EU DSD/DPD: Carcinogen 1(Carc. Cat.1); R49 WHMIS: Other Toxic Effects - D2A UN GHS: STOT RE 2 EU DSD/DPD: Harmful(Xn); R48/20</td>
</tr>
<tr>
<td>Bentonite</td>
<td>CAS:1302-78-9</td>
<td>1% TO 5%</td>
<td></td>
<td>UN GHS: Carc. 2; Eye Irrit. 2A; Skin Irrit. 2</td>
</tr>
</tbody>
</table>

Other Information
• This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding. During spraying or sanding the product, wear suitable respiratory equipment to protect against inhalation of mist and dust.

See Section 12 for Ecological Information.

Section 3 - Composition/Information on Ingredients

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Identifiers</th>
<th>% (weight)</th>
<th>LD50/LC50</th>
<th>Classifications According to Regulation/Directive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>CAS:7732-18-5</td>
<td>30% TO 50%</td>
<td>Ingestion/Oral-Rat LD50 • &gt;90 mL/kg</td>
<td></td>
</tr>
<tr>
<td>Latex Polymer</td>
<td>mixture</td>
<td>5% TO 15%</td>
<td></td>
<td>EU DSD/DPD:</td>
</tr>
</tbody>
</table>

Non-Hazardous Components
This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding.

See Section 11 for Toxicological Information.

### Section 4 - First Aid Measures

**Inhalation**  •  Remove to fresh air. Call a physician or poison control center. If not breathing, give artificial respiration.

**Skin**  •  Wash the contaminated area of body with soap and fresh water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.

**Eye**  •  Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first five minutes, then continue rinsing eye. If eye irritation persists: Get medical advice/attention.

**Ingestion**  •  Call a physician or poison control center immediately. Do not give anything by mouth to an unconscious person. Do NOT induce vomiting.

See Section 2 for Potential Health Effects.

### Section 5 - Fire Fighting Measures

**Extinguishing Media**  •  SMALL FIRES: Dry chemical, CO2, water spray or regular foam.

**Unsuitable Extinguishing Media**  •  No data available

**Firefighting Procedures**  •  Keep unauthorized personnel away. Stay upwind. Fire fighters should wear complete protective clothing including self-contained breathing apparatus.

**Unusual Fire and Explosion Hazards**  •  Some of these materials may burn, but none ignite readily. May release irritating or toxic gases, fumes, or vapors.

**Hazardous Combustion Products**  •  Wear positive pressure self-contained breathing apparatus (SCBA).

**Flash Point**  •  460°F(238°C)

**Explosion Limits:**

- **Upper**  •  No data available
- **Lower**  •  No data available
- **Autoignition Temperature**  •  No data available

### Section 6 - Accidental Release Measures

**Personal Precautions**  •  Do not handle damaged containers or spilled material unless wearing appropriate protective clothing. If you have not donned special protective clothing approved for this material, do not expose yourself to any risk of this material touching you. Ventilate enclosed areas.

**Emergency Procedures**  •  Stop leak if you can do it without risk. Isolate the area and contain the spilled material. Persons not wearing the appropriate PPE should be removed from the area until the spill is cleaned up.

**Environmental Precautions**  •  Avoid run off to waterways and sewers. Do NOT wash away into sewer.

**Containment/Clean-up Measures**  •  Use appropriate Personal Protective Equipment (PPE) Contain and/or absorb spill with inert material (e.g. sand, vermiculite), then place in suitable container.

**Prohibited Materials**  •  Avoid contact with strong oxidizing agents and acids.

### Section 7 - Handling and Storage

**Handling**  •  Keep containers tightly closed when not in use. Use only with adequate ventilation.

**Storage**  •  Keep only in the original container/package in a cool well-ventilated place. Keep away from fire. Keep container closed when not in use.

**Special Packaging Materials**  •  No data available
Section 8 - Exposure Controls/Personal Protection

Personal Protective Equipment

Pictograms

Respiratory - When used with adequate ventilation, a respirator is not normally required. If required, use a NIOSH-approved air purifying respirator with organic vapor cartridge or supplied air respirator. This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding.

Eye/Face - Wear ANSI approved safety glasses with side shields or safety goggles.

Hands - Wear chemical protective gloves made of Nitrile or Neoprene.

Skin/Body - Wear clothing that covers the skin to prevent skin exposure.

General Industrial Hygiene Considerations

Engineering Measures/Controls - Adequate ventilation systems as needed to control concentrations of airborne contaminants below applicable threshold limit values.

<table>
<thead>
<tr>
<th>Material</th>
<th>Result</th>
<th>ACGIH</th>
<th>Canada Ontario</th>
<th>Mexico</th>
<th>United States - California</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quartz (14808-60-7)</td>
<td>TWAs</td>
<td>0.025 mg/m³ TWA (respirable fraction)</td>
<td>0.10 mg/m³ TWA (designated substance regulation, respirable)</td>
<td>0.1 mg/m³ TWA LMPE-PPT (respirable fraction)</td>
<td>0.3 mg/m³ PEL (total dust); 0.1 mg/m³ PEL (respirable dust)</td>
</tr>
<tr>
<td>Asphalt (8052-42-4)</td>
<td>TWAs</td>
<td>0.5 mg/m³ TWA (fume, inhalable fraction, as benzene soluble aerosol)</td>
<td>0.5 mg/m³ TWA (fume, inhalable, as Benzene-soluble aerosol)</td>
<td>5 mg/m³ TWA LMPE-PPT</td>
<td>5 mg/m³ PEL (fume)</td>
</tr>
</tbody>
</table>

Exposure Control Notations

ACGIH

Asphalt (8052-42-4): Carcinogens: (A4 - Not Classifiable as a Human Carcinogen (fume, coal tar-free))

Quartz (14808-60-7): Carcinogens: (A2 - Suspected Human Carcinogen)

Section 9 - Physical and Chemical Properties

<table>
<thead>
<tr>
<th>Material Description</th>
<th>Appearance/Description</th>
<th>Odor</th>
<th>Color</th>
<th>Physical and Chemical Properties</th>
<th>Density</th>
<th>Specific Gravity/Relative Density</th>
<th>Boiling Point</th>
<th>Melting Point</th>
<th>Water Solubility</th>
<th>Vapor Pressure</th>
<th>pH</th>
<th>Volatility</th>
<th>Water Solubility</th>
<th>Flash Point</th>
<th>Volatility</th>
<th>Flammability</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Thick black semi-liquid.</td>
<td>Mild Hydrocarbon.</td>
<td>Black</td>
<td>No data available</td>
<td>~9.3 lbs/gal</td>
<td>Bulk Density</td>
<td>212 F(100 C)</td>
<td>No data available</td>
<td>No data available</td>
<td>17 @ 77 F(25 C)</td>
<td>9 to 10</td>
<td>1 Water = 1</td>
<td>No data available</td>
<td>460°F(238°C)</td>
<td>UEL</td>
<td>No data available</td>
</tr>
</tbody>
</table>
Section 10 - Stability and Reactivity

**Stability**
- Stable under normal temperatures and pressures.

**Hazardous Polymerization**
- Hazardous polymerization not indicated.

**Conditions to Avoid**
- Avoid contact with strong oxidizing agents and acids.

**Incompatible Materials**
- Strong oxidizers and acids.

**Hazardous Decomposition Products**
- Carbon monoxide, carbon dioxide and hydrocarbons.

Section 11 - Toxicological Information

<table>
<thead>
<tr>
<th>Component Name</th>
<th>CAS</th>
<th>Acute Toxicity:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asphalt (30% TO 40%)</td>
<td>8052-42-4</td>
<td>orl-rat LD₅₀: &gt;5000 mg/kg; ihl-rat LC₅₀: &gt;94.4 mg/m³</td>
</tr>
<tr>
<td>Quartz (1% TO 5%)</td>
<td>14808-60-7</td>
<td>orl-rat TDLo: 120 gm/kg</td>
</tr>
<tr>
<td>Bentonite (1% TO 5%)</td>
<td>1302-78-9</td>
<td>orl-rat TDLo: 700 mg/kg/7D-I</td>
</tr>
</tbody>
</table>

**Other Component Information**
- IARC has concluded that the following chemicals in this product are carcinogenic to humans (Group 1): silica, quartz. ACGIH has designated the following chemicals in this product as suspected human carcinogens (A2): silica, quartz. NTP has listed the following chemicals in this product as known human carcinogens: silica, quartz. Risk of cancer depends on duration and level of exposure to this product as a dust or aerosol mist. Airborne exposure is not expected with this product. The materials are encapsulated and would only be release if the dry material was sanded. Exposure could increase if the product is sprayed.

**Other Information**
- This product contains petroleum asphalt. Petroleum asphalt is not listed as a carcinogen by OSHA or NTP. The National Institute of Occupational Safety and Health (NIOSH), has concluded that at higher temperatures roofing asphalt fumes are a potential occupational carcinogen. If this product is heated or comes in contact with heated material, avoid breathing fumes. This product may contain small amounts of polycyclic aromatic hydrocarbons (PAH’s) which are recognized carcinogens in humans and experimental animals. Mouse skin painting studies of roofing asphalt vapor concentrate have shown evidence of tumor formation associated with localized skin irritation in recent studies. Inhalation studies of high airborne concentrations of asphalt/bitumen fumes in rats and mice produced bronchitis, pneumonitis, and lung changes such as fibrosis and cell damage.

Section 12 - Ecological Information

**Ecological Fate**
- No data available.

**Persistence/ Degradability**
- No data available.

**Bioaccumulation Potential**
- No data available.

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

Section 13 - Disposal Considerations

**Product**
- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

Section 14 - Transportation Information

**DOT- United States- Department of Transportation** – Not Restricted

**IMO/IMDG – International Maritime Transport** – Not Restricted

**IATA- International Air Transport Association** – Not Restricted

Section 15 - Regulatory Information

**SARA Hazard Classifications**
- Acute, Chronic

**Risk & Safety Phrases**
- California PROP 65: Asphalt and Asphalt Fumes may contain detectable amounts of chemicals
known to the State of California to cause cancer or reproductive harm.

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS</th>
<th>MA</th>
<th>MN</th>
<th>NJ</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>7732-18-5</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Latex Polymer</td>
<td>NDA</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Asphalt</td>
<td>8052-42-4</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Quartz</td>
<td>14808-60-7</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Bentonite</td>
<td>1302-78-9</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS</th>
<th>EU EINECS</th>
<th>TSCA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>7732-18-5</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Asphalt</td>
<td>8052-42-4</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Quartz</td>
<td>14808-60-7</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Bentonite</td>
<td>1302-78-9</td>
<td>Yes</td>
<td>Yes</td>
</tr>
</tbody>
</table>

Canada

Labor

Canada - WHMIS - Classifications of Substances
- Asphalt 8052-42-4 30% TO 40% Not Listed
- Quartz 14808-60-7 1% TO 5% D2A (In certain cases, this classification does not apply. For more information, consult the section Substance Specific Issues - Silica, crystalline, encapsulated on Health Canada's WHMIS Division website.)
- Bentonite 1302-78-9 1% TO 5% D2A
- Water 7732-18-5 30% TO 50% Uncontrolled product according to WHMIS classification criteria

United States - California

Environment

U.S. - California - Proposition 65 - Carcinogens List
- Asphalt 8052-42-4 30% TO 40% Not Listed
- Quartz 14808-60-7 1% TO 5% carcinogen, initial date 10/1/88 (airborne particles of respirable size)
- Bentonite 1302-78-9 1% TO 5% Not Listed
- Water 7732-18-5 30% TO 50% Not Listed

Section 16 - Other Information

Prepared By • GG Inc.
Preparation Date • 2/27/2013
Last Revision Date • 5/26/2015
Disclaimer/Statement of Liability • This information relates to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is to the best of our knowledge and belief, accurate and reliable as of the date compiled. However, no representation, warranty or guarantee is made as to its accuracy, reliability or completeness. It is the user’s responsibility to verify the suitability and completeness of such information for particular use. APOC does not accept liability for any loss or damage that may occur from the use of this information.

NFPA:
Section 1 - Product and Company Identification

Material Name • Elastomeric Asphalt Emulsion
Chemical Category • Asphalt Based Rubberized Emulsion
Product Code • AP-3375
Product Description • Asphalt emulsion roof and foundation coating

Manufacturer • APOC
4161 E. 7th Avenue
Tampa, FL 33605
United States

Telephone
Emergency • 800-424-9300 - CHEMTREC
Emergency • 703-527-3887 - CHEMTREC (Outside US)

Section 2 - Hazards Identification

Signal Word: WARNING!

Hazards and Precautions

May be harmful if swallowed. May cause respiratory irritation. Causes eye irritation. Causes mild skin irritation. Vapors may cause headache, nausea, and respiratory tract irritation. Contains Petroleum Based Products. Use only with adequate ventilation. Avoid prolonged breathing of vapor or spray mist. Keep product closed and properly stored when not in use. Avoid contact with skin. Use protective gloves, safety glasses, and protective clothing when using this product. Do not use in drinking water or food systems. Do not reuse empty container. Make sure container is sealed and secured in an upright position during transportation. Do not eat or drink while using this product and wash hand thoroughly after use.

Prevention • Do not breathe dust, fume, gas, mist, vapors and/or spray. Do not handle until all safety precautions have been read and understood.

Response • IF exposed or if you feel unwell: Call a POISON CENTER or doctor/physician.

Physical Form • Liquid
Color • Black
Odor • Mild Hydrocarbon.
Flash Point • 460°F
OSHA(HCS2012) • Specific Target Organ Toxicity Repeated Exposure - Category 2, Skin Corrosion/Irritation - Category 2, Serious Eye Damage, Eye Irritation - Category 2, Germ Cell Mutagenicity - Category 1, Carcinogenicity - Category 1A
WHMIS • Other Toxic Effects - D2A
GHS
- Specific Target Organ Toxicity Repeated Exposure - Category 2, Skin Corrosion/Irritation - Category 2, Serious Eye Damage, Eye Irritation - Category 2, Germ Cell Mutagenicity - Category 1, Carcinogenicity - Category 1A

Potential Health Effects

Inhalation:
Acute (Immediate) • May cause irritation.
Chronic (Delayed) • No data available

Skin:
Acute (Immediate) • May cause irritation.
Chronic (Delayed) • Repeated and prolonged exposure may cause dermatitis.

Eye:
Acute (Immediate) • May cause burning and redness or swelling of the eyes. May cause irritation.
Chronic (Delayed) • Repeated and prolonged exposure may cause irritation.

Ingestion:
Acute (Immediate) • May be harmful or fatal if swallowed.
Chronic (Delayed) • No data available

Carcinogenic Effects • See Section 11 - Toxicological Information.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>CAS</th>
<th>IARC</th>
<th>NTP</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quartz</td>
<td>14808-60-7</td>
<td>Group 1-Carcinogenic</td>
<td>Known Human Carcinogen</td>
</tr>
<tr>
<td>Asphalt</td>
<td>8052-42-4</td>
<td>Group 2B-Possible Carcinogen</td>
<td>Under Consideration</td>
</tr>
</tbody>
</table>

Other Information
- This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding. During spraying or sanding the product, wear suitable respiratory equipment to protect against inhalation of mist and dust.

See Section 12 for Ecological Information.

Section 3 - Composition/Information on Ingredients

### Hazardous Components

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Identifiers</th>
<th>% (weight)</th>
<th>LD50/LC50</th>
<th>Classifications According to Regulation/Directive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asphalt</td>
<td>CAS: 8052-42-4 UN: NA1999 EINECS: 232-490-9</td>
<td>30% TO 40%</td>
<td>Ingestion/Oral-Rat LD50 • &gt;5000 mg/kg Inhalation-Rat LC50 • &gt;94.4 mg/m³</td>
<td>OSHA: Carc.; Irrit. WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 2; Eye Irrit. 2A; Skin Irrit. 2</td>
</tr>
<tr>
<td>Quartz</td>
<td>CAS: 14808-60-7 EINECS: 238-878-4</td>
<td>1% TO 5%</td>
<td></td>
<td>WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 1A; STOT RE 1 EU DSD/DPD: Carcinogen 1(Carc. Cat.1); R49 WHMIS: Other Toxic Effects - D2A UN GHS: STOT RE 2 EU DSD/DPD: Harmful(Xn); R48/20</td>
</tr>
<tr>
<td>Bentonite</td>
<td>CAS: 1302-78-9 EINECS: 215-108-5</td>
<td>1% TO 5%</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Non-Hazardous Components

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Identifiers</th>
<th>% (weight)</th>
<th>LD50/LC50</th>
<th>Classifications According to Regulation/Directive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>CAS: 7732-18-5 EINECS: 231-791-2</td>
<td>30% TO 50%</td>
<td>Ingestion/Oral-Rat LD50 • &gt;90 mL/kg</td>
<td></td>
</tr>
<tr>
<td>Latex Polymer</td>
<td>mixture</td>
<td>5% TO 15%</td>
<td></td>
<td>EU DSD/DPD:</td>
</tr>
</tbody>
</table>
This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding.

See Section 11 for Toxicological Information.

**Section 4 - First Aid Measures**

**Inhalation** • Remove to fresh air. Call a physician or poison control center. If not breathing, give artificial respiration.

**Skin** • Wash the contaminated area of body with soap and fresh water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.

**Eye** • Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first five minutes, then continue rinsing eye. If eye irritation persists: Get medical advice/attention.

**Ingestion** • Call a physician or poison control center immediately. Do not give anything by mouth to an unconscious person. Do NOT induce vomiting.

See Section 2 for Potential Health Effects.

**Section 5 - Fire Fighting Measures**

**Extinguishing Media** • SMALL FIRES: Dry chemical, CO2, water spray or regular foam.

**Unsuitable Extinguishing Media** • No data available

**Firefighting Procedures** • Keep unauthorized personnel away. Stay upwind. Fire fighters should wear complete protective clothing including self-contained breathing apparatus.

**Unusual Fire and Explosion Hazards** • Some of these materials may burn, but none ignite readily. May release irritating or toxic gases, fumes, or vapors.

**Hazardous Combustion Products** • Carbon monoxide, carbon dioxide, hydrocarbons.

**Protection of Firefighters** • Wear positive pressure self-contained breathing apparatus (SCBA).

**Flash Point** • 460°F(238°C)

**Explosion Limits:**

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Upper</td>
<td>No data available</td>
</tr>
<tr>
<td>Lower</td>
<td>No data available</td>
</tr>
<tr>
<td>Autoignition Temperature</td>
<td>No data available</td>
</tr>
</tbody>
</table>

**Section 6 - Accidental Release Measures**

**Personal Precautions** • Do not handle damaged containers or spilled material unless wearing appropriate protective clothing. If you have not donned special protective clothing approved for this material, do not expose yourself to any risk of this material touching you. Ventilate enclosed areas.

**Emergency Procedures** • Stop leak if you can do it without risk. Isolate the area and contain the spilled material. Persons not wearing the appropriate PPE should be removed from the area until the spill is cleaned up.

**Environmental Precautions** • Avoid run off to waterways and sewers. Do NOT wash away into sewer.

**Containment/Clean-up Measures** • Use appropriate Personal Protective Equipment (PPE) Contain and/or absorb spill with inert material (e.g. sand, vermiculite), then place in suitable container.

**Prohibited Materials** • Avoid contact with strong oxidizing agents and acids.

**Section 7 - Handling and Storage**

**Handling** • Keep containers tightly closed when not in use. Use only with adequate ventilation.

**Storage** • Keep only in the original container/package in a cool well-ventilated place. Keep away from fire. Keep container closed when not in use.

**Special Packaging Materials** • No data available
Incompatible Materials or Ignition Sources

- Avoid contact with strong oxidizing agents and acids.

Section 8 - Exposure Controls/Personal Protection

Personal Protective Equipment

Pictograms

Respiratory • When used with adequate ventilation, a respirator is not normally required. If required, use a NIOSH-approved air purifying respirator with organic vapor cartridge or supplied air respirator. This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding.

Eye/Face • Wear ANSI approved safety glasses with side shields or safety goggles.

Hands • Wear chemical protective gloves made of Nitrile or Neoprene.

Skin/Body • Wear clothing that covers the skin to prevent skin exposure.

General Industrial Hygiene Considerations • Avoid contact with skin, eyes or clothing. Do not eat, drink or smoke during work. Wash hands before eating.

Engineering Measures/Controls • Adequate ventilation systems as needed to control concentrations of airborne contaminants below applicable threshold limit values.

Exposure Limits/Guidelines

<table>
<thead>
<tr>
<th>Result</th>
<th>ACGIH</th>
<th>Canada Ontario</th>
<th>Mexico</th>
<th>United States - California</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quartz (14808-60-7)</td>
<td>TWAs 0.025 mg/m3 TWA (respirable fraction)</td>
<td>0.10 mg/m3 TWA (designated substance regulation, respirable)</td>
<td>0.1 mg/m3 TWA LMPE-PPT (respirable fraction)</td>
<td>0.3 mg/m3 PEL (total dust); 0.1 mg/m3 PEL (respirable dust)</td>
</tr>
<tr>
<td>Asphalt (8052-42-4)</td>
<td>TWAs 0.5 mg/m3 TWA (fume, inhalable fraction, as benzene soluble aerosol)</td>
<td>0.5 mg/m3 TWA (fume, inhalable, as Benzene-soluble aerosol)</td>
<td>5 mg/m3 TWA LMPE-PPT</td>
<td>5 mg/m3 PEL (fume)</td>
</tr>
</tbody>
</table>

Exposure Control Notations

ACGIH

- Asphalt (8052-42-4): Carcinogens: (A4 - Not Classifiable as a Human Carcinogen (fume, coal tar-free))
- Quartz (14808-60-7): Carcinogens: (A2 - Suspected Human Carcinogen)

Section 9 - Physical and Chemical Properties

<table>
<thead>
<tr>
<th>Material Description</th>
<th>Appearance/Description</th>
<th>Color</th>
<th>Physical and Chemical Properties</th>
<th>Water Solubility</th>
<th>Solvent Solubility</th>
<th>Volatility</th>
<th>Flammability</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance/Description</td>
<td>Thick black semi-liquid.</td>
<td></td>
<td>Black</td>
<td>No data available</td>
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<td></td>
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</tr>
<tr>
<td>Odor</td>
<td>Mild Hydrocarbon.</td>
<td></td>
<td></td>
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<td>No data available</td>
<td></td>
<td></td>
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<td>General Properties</td>
<td>Boiling Point 212 F(100 C)</td>
<td>Melting Point</td>
<td>No data available</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>pH</td>
<td>9 to 10</td>
<td>Specific Gravity/Relative Density 1.12 Water=1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Density</td>
<td>~9.3 lbs/gal</td>
<td>Bulk Density</td>
<td>No data available</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Water Solubility</td>
<td>No data available</td>
<td>Solvent Solubility</td>
<td>No data available</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Volatility</td>
<td>Vapor Pressure 17 @ 77 F(25 C)</td>
<td>Vapor Density 1 Air=1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>1 Water = 1</td>
<td>VOC (Vol.) &lt; 10 g/L</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flammability</td>
<td>Flash Point 460°F(238°C)</td>
<td>UEL</td>
<td>No data available</td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>LEL</td>
<td>No data available</td>
<td>Autoignition</td>
<td>No data available</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>


Section 10 - Stability and Reactivity

Stability
- Stable under normal temperatures and pressures.

Hazardous Polymerization
- Hazardous polymerization not indicated.

Conditions to Avoid
- Avoid contact with strong oxidizing agents and acids.

Incompatible Materials
- Strong oxidizers and acids.

Hazardous Decomposition Products
- Carbon monoxide, carbon dioxide and hydrocarbons.

Section 11 - Toxicological Information

<table>
<thead>
<tr>
<th>Component Name</th>
<th>CAS</th>
<th>Acute Toxicity:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asphalt (30% TO 40%)</td>
<td>8052-42-4</td>
<td>orl-rat LD50:&gt;5000 mg/kg; ihl-rat LC50:&gt;94.4 mg/m3</td>
</tr>
<tr>
<td>Quartz (1% TO 5%)</td>
<td>14808-60-7</td>
<td>orl-rat TDLo:120 gm/kg</td>
</tr>
<tr>
<td>Bentonite (1% TO 5%)</td>
<td>1302-78-9</td>
<td>orl-rat TDLo:700 mg/kg/7D-I</td>
</tr>
</tbody>
</table>

Other Component Information
- IARC has concluded that the following chemicals in this product are carcinogenic to humans (Group 1): silica, quartz. ACGIH has designated the following chemicals in this product as suspected human carcinogens (A2): silica, quartz. NTP has listed the following chemicals in this product as known human carcinogens: silica, quartz. Risk of cancer depends on duration and level of exposure to this product as a dust or aerosol mist. Airborne exposure is not expected with this product. The materials are encapsulated and would only be release if the dry material was sanded. Exposure could increase if the product is sprayed.

Other Information
- This product contains petroleum asphalt. Petroleum asphalt is not listed as a carcinogen by OSHA or NTP. The National Institute of Occupational Safety and Health (NIOSH), has concluded that at higher temperatures roofing asphalt fumes are a potential occupational carcinogen. If this product is heated or comes in contact with heated material, avoid breathing fumes. This product may contain small amounts of polycyclic aromatic hydrocarbons (PAH’s) which are recognized carcinogens in humans and experimental animals. Mouse skin painting studies of roofing asphalt vapor concentrate have shown evidence of tumor formation associated with localized skin irritation in recent studies. Inhalation studies of high airborne concentrations of asphalt/bitumen fumes in rats and mice produced bronchitis, pneumonitis, and lung changes such as fibrosis and cell damage.

Section 12 - Ecological Information

Ecological Fate
- No data available.

Persistence/Degradability
- No data available.

Bioaccumulation Potential
- No data available.

Mobility in Soil
- No data available.

Section 13 - Disposal Considerations

Product
- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

Section 14 - Transportation Information

DOT - United States - Department of Transportation – Not Restricted
IMO/IMDG – International Maritime Transport – Not Restricted
IATA - International Air Transport Association – Not Restricted

Section 15 - Regulatory Information

SARA Hazard Classifications
- Acute, Chronic

Risk & Safety Phrases
- California PROP 65: Asphalt and Asphalt Fumes may contain detectable amounts of chemicals
known to the State of California to cause cancer or reproductive harm.

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS</th>
<th>MA</th>
<th>MN</th>
<th>NJ</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>7732-18-5</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Latex Polymer</td>
<td>NDA</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Asphalt</td>
<td>8052-42-4</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Quartz</td>
<td>14808-60-7</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Bentonite</td>
<td>1302-78-9</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS</th>
<th>EU EINECS</th>
<th>TSCA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>7732-18-5</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Asphalt</td>
<td>8052-42-4</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Quartz</td>
<td>14808-60-7</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Bentonite</td>
<td>1302-78-9</td>
<td>Yes</td>
<td>Yes</td>
</tr>
</tbody>
</table>

**Canada**

**Labor**
- **Canada - WHMIS - Classifications of Substances**
  - Asphalt 8052-42-4 30% TO 40% Not Listed
  - Quartz 14808-60-7 1% TO 5% D2A (In certain cases, this classification does not apply. For more information, consult the section Substance Specific Issues - Silica, crystalline, encapsulated on Health Canada's WHMIS Division website.)
  - Bentonite 1302-78-9 1% TO 5% D2A
  - Water 7732-18-5 30% TO 50% Uncontrolled product according to WHMIS classification criteria

**United States - California**

**Environment**
- **U.S. - California - Proposition 65 - Carcinogens List**
  - Asphalt 8052-42-4 30% TO 40% Not Listed
  - Quartz 14808-60-7 1% TO 5% carcinogen, initial date 10/1/88 (airborne particles of respirable size)
  - Bentonite 1302-78-9 1% TO 5% Not Listed
  - Water 7732-18-5 30% TO 50% Not Listed

**Section 16 - Other Information**

- **Prepared By**
  - GG Inc.
- **Preparation Date**
  - 2/27/2013
- **Last Revision Date**
  - 5/26/2015
- **Disclaimer/Statement of Liability**
  - This information relates to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is to the best of our knowledge and belief, accurate and reliable as of the date compiled. However, no representation, warranty or guarantee is made as to its accuracy, reliability or completeness. It is the user’s responsibility to verify the suitability and completeness of such information for particular use. APOC does not accept liability for any loss or damage that may occur from the use of this information.
Safety Data Sheet
AP-3377
5-26-15

Section 1 - Product and Company Identification

Material Name • Elastomeric Asphalt Emulsion
Chemical Category • Asphalt Based Rubberized Emulsion
Product Code • AP-3377
Product Description • Asphalt emulsion roof and foundation coating
Manufacturer • APOC
4161 E. 7th Avenue
Tampa, FL 33605
United States

Telephone
  Emergency • 800-424-9300 - CHEMTREC
  Emergency • 703-527-3887 - CHEMTREC (Outside US)

Section 2 - Hazards Identification

Signal Word: WARNING!

Hazards and Precautions

May be harmful if swallowed. May cause respiratory irritation. Causes eye irritation. Causes mild skin irritation. Vapors may cause headache, nausea, and respiratory tract irritation. Contains Petroleum Based Products. Use only with adequate ventilation. Avoid prolonged breathing of vapor or spray mist. Keep product closed and properly stored when not in use. Avoid contact with skin. Use protective gloves, safety glasses, and protective clothing when using this product. Do not use in drinking water or food systems. Do not reuse empty container. Make sure container is sealed and secured in an upright position during transportation. Do not eat or drink while using this product and wash hand thoroughly after use.

Prevention • Do not breathe dust, fume, gas, mist, vapors and/or spray. Do not handle until all safety precautions have been read and understood.

Response • IF exposed or if you feel unwell: Call a POISON CENTER or doctor/physician.

Physical Form • Liquid
Color • Black
Odor • Mild Hydrocarbon.
Flash Point • 460°F
OSHA(HCS2012) • Specific Target Organ Toxicity Repeated Exposure - Category 2, Skin Corrosion/Irritation - Category 2, Serious Eye Damage, Eye Irritation - Category 2, Germ Cell Mutagenicity - Category 1, Carcinogenicity - Category 1A
WHMIS • Other Toxic Effects - D2A
Potential Health Effects

Inhalation:
**Acute (Immediate)** • May cause irritation.
**Chronic (Delayed)** • No data available

Skin:
**Acute (Immediate)** • May cause irritation.
**Chronic (Delayed)** • Repeated and prolonged exposure may cause dermatitis.

Eye:
**Acute (Immediate)** • May cause burning and redness or swelling of the eyes. May cause irritation.
**Chronic (Delayed)** • Repeated and prolonged exposure may cause irritation.

Ingestion:
**Acute (Immediate)** • May be harmful or fatal if swallowed.
**Chronic (Delayed)** • No data available

Carcinogenic Effects • See Section 11 - Toxicological Information.

### Carcinogenic Effects

<table>
<thead>
<tr>
<th></th>
<th>CAS</th>
<th>IARC</th>
<th>NTP</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quartz</td>
<td>14808-60-7</td>
<td>Group 1-Carcinogenic</td>
<td>Known Human Carcinogen</td>
</tr>
<tr>
<td>Asphalt</td>
<td>8052-42-4</td>
<td>Group 2B-Possible Carcinogen</td>
<td>Under Consideration</td>
</tr>
</tbody>
</table>

### Other Information

- This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding. During spraying or sanding the product, wear suitable respiratory equipment to protect against inhalation of mist and dust.

See Section 12 for Ecological Information.

### Section 3 - Composition/Information on Ingredients

#### Hazardous Components

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Identifiers</th>
<th>% (weight)</th>
<th>LD50/LC50</th>
<th>Classifications According to Regulation/Directive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asphalt</td>
<td>CAS: 8052-42-4, UN: NA1999, EINECS: 232-490-9</td>
<td>30% TO 40%</td>
<td>Ingestion/Oral-Rat LD50 • &gt;5000 mg/kg, Inhalation-Rat LC50 • &gt;94.4 mg/m³</td>
<td>OSHA: Carc.; Irrit. WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 2; Eye Irrit. 2A; Skin Irrit. 2</td>
</tr>
<tr>
<td>Quartz</td>
<td>CAS: 14808-60-7, EINECS: 238-878-4</td>
<td>1% TO 5%</td>
<td></td>
<td>WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 1A; STOT RE 1 EU DSD/DPD: Carcinogen 1(Carc.Cat.1); R49 WHMIS: Other Toxic Effects - D2A UN GHS: STOT RE 2 EU DSD/DPD: Harmful(Xn); R48/20</td>
</tr>
<tr>
<td>Bentonite</td>
<td>CAS: 1302-78-9, EINECS: 215-108-5</td>
<td>1% TO 5%</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

#### Non-Hazardous Components

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Identifiers</th>
<th>% (weight)</th>
<th>LD50/LC50</th>
<th>Classifications According to Regulation/Directive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>CAS: 7732-18-5, EINECS: 231-791-2</td>
<td>30% TO 50%</td>
<td>Ingestion/Oral-Rat LD50 • &gt;90 mL/kg</td>
<td>EU DSD/DPD:</td>
</tr>
<tr>
<td>Latex Polymer</td>
<td>mixture</td>
<td>5% TO 15%</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding.

See Section 11 for Toxicological Information.

### Section 4 - First Aid Measures

**Inhalation**
- Remove to fresh air. Call a physician or poison control center. If not breathing, give artificial respiration.

**Skin**
- Wash the contaminated area of body with soap and fresh water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.

**Eye**
- Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first five minutes, then continue rinsing eye. If eye irritation persists: Get medical advice/attention.

**Ingestion**
- Call a physician or poison control center immediately. Do not give anything by mouth to an unconscious person. Do NOT induce vomiting.

See Section 2 for Potential Health Effects.

### Section 5 - Fire Fighting Measures

**Extinguishing Media**
- SMALL FIRES: Dry chemical, CO2, water spray or regular foam.

**Unsuitable Extinguishing Media**
- No data available

**Firefighting Procedures**
- Keep unauthorized personnel away. Stay upwind. Fire fighters should wear complete protective clothing including self-contained breathing apparatus.

**Unusual Fire and Explosion Hazards**
- Some of these materials may burn, but none ignite readily. May release irritating or toxic gases, fumes, or vapors.

**Hazardous Combustion Products**
- Carbon monoxide, carbon dioxide, hydrocarbons.

**Protection of Firefighters**
- Wear positive pressure self-contained breathing apparatus (SCBA).

**Flash Point**
- 460°F (238°C)

**Explosion Limits:**
- Upper: No data available
- Lower: No data available

**Autoignition Temperature**: No data available

### Section 6 - Accidental Release Measures

**Personal Precautions**
- Do not handle damaged containers or spilled material unless wearing appropriate protective clothing. If you have not donned special protective clothing approved for this material, do not expose yourself to any risk of this material touching you. Ventilate enclosed areas.

**Emergency Procedures**
- Stop leak if you can do it without risk. Isolate the area and contain the spilled material. Persons not wearing the appropriate PPE should be removed from the area until the spill is cleaned up.

**Environmental Precautions**
- Avoid run off to waterways and sewers. Do NOT wash away into sewer.

**Containment/Clean-up Measures**
- Use appropriate Personal Protective Equipment (PPE) Contain and/or absorb spill with inert material (e.g. sand, vermiculite), then place in suitable container.

**Prohibited Materials**
- Avoid contact with strong oxidizing agents and acids.

### Section 7 - Handling and Storage

**Handling**
- Keep containers tightly closed when not in use. Use only with adequate ventilation.

**Storage**
- Keep only in the original container/package in a cool well-ventilated place. Keep away from fire. Keep container closed when not in use.

**Special Packaging Materials**
- No data available
Section 8 - Exposure Controls/Personal Protection

Personal Protective Equipment

- Respiratory: When used with adequate ventilation, a respirator is not normally required. If required, use a NIOSH-approved air purifying respirator with organic vapor cartridge or supplied air respirator. This product is an encapsulated mixture which reduces the likelihood of exposure to hazardous particulates. Airborne exposures to hazardous dusts or mists may be generated by spraying, sanding or grinding.
- Eye/Face: Wear ANSI approved safety glasses with side shields or safety goggles.
- Hands: Wear chemical protective gloves made of Nitrile or Neoprene.
- Skin/Body: Wear clothing that covers the skin to prevent skin exposure.

General Industrial Hygiene Considerations
- Avoid contact with skin, eyes or clothing. Do not eat, drink or smoke during work. Wash hands before eating.

Engineering Measures/Controls
- Adequate ventilation systems as needed to control concentrations of airborne contaminants below applicable threshold limit values.

<table>
<thead>
<tr>
<th>Material</th>
<th>Result</th>
<th>ACGIH</th>
<th>Canada Ontario</th>
<th>Mexico</th>
<th>United States - California</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quartz (14808-60-7)</td>
<td>TWAs</td>
<td>0.025 mg/m3 TWA (respirable fraction)</td>
<td>0.10 mg/m3 TWA (designated substance regulation, respirable)</td>
<td>0.1 mg/m3 TWA LMPE-PPT (respirable fraction)</td>
<td>0.3 mg/m3 PEL (total dust); 0.1 mg/m3 PEL (respirable dust)</td>
</tr>
<tr>
<td>Asphalt (8052-42-4)</td>
<td>TWAs</td>
<td>0.5 mg/m3 TWA (fume, inhalable fraction, as benzene soluble aerosol)</td>
<td>0.5 mg/m3 TWA (fume, inhalable, as Benzene-soluble aerosol)</td>
<td>5 mg/m3 TWA LMPE-PPT</td>
<td>5 mg/m3 PEL (fume)</td>
</tr>
</tbody>
</table>

Exposure Control Notations
ACGIH
- Asphalt (8052-42-4): Carcinogens: (A4 - Not Classifiable as a Human Carcinogen (fume, coal tar-free))
- Quartz (14808-60-7): Carcinogens: (A2 - Suspected Human Carcinogen)

Section 9 - Physical and Chemical Properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance/Description</td>
<td>Thick black semi-liquid.</td>
</tr>
<tr>
<td>Odor</td>
<td>Mild Hydrocarbon.</td>
</tr>
<tr>
<td>Color</td>
<td>Black</td>
</tr>
<tr>
<td>Physical and Chemical Properties</td>
<td>No data available</td>
</tr>
<tr>
<td>Boiling Point</td>
<td>212 F(100 C)</td>
</tr>
<tr>
<td>Melting Point</td>
<td>No data available</td>
</tr>
<tr>
<td>pH</td>
<td>9 to 10</td>
</tr>
<tr>
<td>Specific Gravity/Relative Density</td>
<td>1.12 Water=1</td>
</tr>
<tr>
<td>Density</td>
<td>~9.3 lbs/gal</td>
</tr>
<tr>
<td>Bulk Density</td>
<td>No data available</td>
</tr>
<tr>
<td>Water Solubility</td>
<td>No data available</td>
</tr>
<tr>
<td>Solvent Solubility</td>
<td>No data available</td>
</tr>
<tr>
<td>Volatility</td>
<td>&lt; 10 g/L</td>
</tr>
<tr>
<td>Vapor Pressure</td>
<td>17 @ 77 F(25 C)</td>
</tr>
<tr>
<td>Vapor Density</td>
<td>1 Air=1</td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>1 Water = 1</td>
</tr>
<tr>
<td>VOC (Vol.)</td>
<td>&lt; 10 g/L</td>
</tr>
<tr>
<td>Flammability</td>
<td></td>
</tr>
<tr>
<td>Flash Point</td>
<td>460°F(238°C)</td>
</tr>
<tr>
<td>UEL</td>
<td>No data available</td>
</tr>
<tr>
<td>LEL</td>
<td>No data available</td>
</tr>
<tr>
<td>Autoignition</td>
<td>No data available</td>
</tr>
</tbody>
</table>
Section 10 - Stability and Reactivity

Stability • Stable under normal temperatures and pressures.

Hazardous Polymerization • Hazardous polymerization not indicated.

Conditions to Avoid • Avoid contact with strong oxidizing agents and acids.

Incompatible Materials • Strong oxidizers and acids.

Hazardous Decomposition Products • Carbon monoxide, carbon dioxide and hydrocarbons.

Section 11 - Toxicological Information

<table>
<thead>
<tr>
<th>Component Name</th>
<th>CAS</th>
<th>Acute Toxicity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asphalt (30% TO 40%)</td>
<td>8052-42-4</td>
<td>orl-rat LD50: &gt;5000 mg/kg; ihl-rat LC50: &gt;94.4 mg/m3</td>
</tr>
<tr>
<td>Quartz (1% TO 5%)</td>
<td>14808-60-7</td>
<td>orl-rat LD120 gm/kg</td>
</tr>
<tr>
<td>Bentonite (1% TO 5%)</td>
<td>1302-78-9</td>
<td>orl-rat TDLo: 700 mg/kg/7D-I</td>
</tr>
</tbody>
</table>

Other Component Information • IARC has concluded that the following chemicals in this product are carcinogenic to humans (Group 1): silica, quartz. ACGIH has designated the following chemicals in this product as suspected human carcinogens (A2): silica, quartz. NTP has listed the following chemicals in this product as known human carcinogens: silica, quartz. Risk of cancer depends on duration and level of exposure to this product as a dust or aerosol mist. Airborne exposure is not expected with this product. The materials are encapsulated and would only be released if the dry material was sanded. Exposure could increase if the product is sprayed.

Other Information • This product contains petroleum asphalt. Petroleum asphalt is not listed as a carcinogen by OSHA or NTP. The National Institute of Occupational Safety and Health (NIOSH), has concluded that at higher temperatures roofing asphalt fumes are a potential occupational carcinogen. If this product is heated or comes in contact with heated material, avoid breathing fumes. This product may contain small amounts of polycyclic aromatic hydrocarbons (PAH’s) which are recognized carcinogens in humans and experimental animals. Mouse skin painting studies of roofing asphalt vapor concentrate have shown evidence of tumor formation associated with localized skin irritation in recent studies. Inhalation studies of high airborne concentrations of asphalt/bitumen fumes in rats and mice produced bronchitis, pneumonitis, and lung changes such as fibrosis and cell damage.

Section 12 - Ecological Information

Ecological Fate • No data available.

Persistence/Degradability • No data available.

Bioaccumulation Potential • No data available.

Mobility in Soil • No data available.

Section 13 - Disposal Considerations

Product • Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

Section 14 - Transportation Information

DOT - United States - Department of Transportation – Not Restricted
IMO/IMDG – International Maritime Transport – Not Restricted
IATA - International Air Transport Association – Not Restricted

Section 15 - Regulatory Information

SARA Hazard Classifications • Acute, Chronic

Risk & Safety Phrases • California PROP 65: Asphalt and Asphalt Fumes may contain detectable amounts of chemicals
known to the State of California to cause cancer or reproductive harm.

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS</th>
<th>MA</th>
<th>MN</th>
<th>NJ</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>7732-18-5</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Latex Polymer</td>
<td>NDA</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Asphalt</td>
<td>8052-42-4</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Quartz</td>
<td>14808-60-7</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Bentonite</td>
<td>1302-78-9</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Inventory</th>
<th>CAS</th>
<th>EU EINECS</th>
<th>TSCA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water</td>
<td>7732-18-5</td>
<td>Yes</td>
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<td>Asphalt</td>
<td>8052-42-4</td>
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<td>Bentonite</td>
<td>1302-78-9</td>
<td>Yes</td>
<td>Yes</td>
</tr>
</tbody>
</table>

Canada

Labor
Canada - WHMIS - Classifications of Substances
• Asphalt 8052-42-4 30% TO 40% Not Listed
• Quartz 14808-60-7 1% TO 5% D2A (In certain cases, this classification does not apply. For more information, consult the section Substance Specific Issues - Silica, crystalline, encapsulated on Health Canada’s WHMIS Division website.)
• Bentonite 1302-78-9 1% TO 5% D2A
• Water 7732-18-5 30% TO 50% Uncontrolled product according to WHMIS classification criteria

United States - California

Environment
U.S. - California - Proposition 65 - Carcinogens List
• Asphalt 8052-42-4 30% TO 40% Not Listed
• Quartz 14808-60-7 1% TO 5% carcinogen, initial date 10/1/88 (airborne particles of respirable size)
• Bentonite 1302-78-9 1% TO 5% Not Listed
• Water 7732-18-5 30% TO 50% Not Listed

Section 16 - Other Information

Prepared By
• GG Inc.
Preparation Date
• 2/27/2013
Last Revision Date
• 5/26/2015
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