

Section 1 - Product and Company Identification

Material Name • TopShield #22 Wet/Dry Flashing Cement

Chemical Category • Asphalt Based Mixture

Product Code • TS-2203

Product Description • All Weather Roof Cement

Product Use • Roof Patch and Flashing Cement

Manufacturer • APOC - Asphalt Products Oil Corporation

4161 East 7th Avenue
Tampa, FL 33605

Telephone

General • 813-248-2101

Emergency • 800-424-9300 - CHEMTREC

Technical • 813-248-2101 - Customer Service

Section 2 - Hazards Identification

GHS HAZARDS AND PRECAUTIONS

CAUTION SIGNAL WORD: WARNING!

Flammable liquid (paste) and Vapor. Contains Combustible Petroleum Distillates. Harmful or Fatal if swallowed. Keep away from heat, sparks, and open flame. Avoid prolonged breathing of vapor and use only in adequate ventilation. Repeated and prolonged overexposure to solvent vapor may cause brain and nervous system damage, respiratory tract irritation, dizziness, or loss of consciousness. May cause skin and eye irritation.

Prevention *Avoid breathing dust, fume, gas, mist, vapors and/or spray. Do not handle until all safety precautions have been read and understood. Keep away from heat, sparks, open flames and/or hot surfaces. - No smoking. Use personal protective equipment as required. Keep out of reach of children.*

Response *IF INHALED: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.*

Storage/Disposal *Store in a closed container. Store in a well-ventilated place. Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.*



Physical Form • Liquid
Color • Black
Odor • Mild Hydrocarbon.

- Flash Point** • 105°F(41°C) CC (Closed Cup)
- UEL** • 6 %
- LEL** • .9 %
- OSHA(HCS2012)** • Flammable Liquids - Category 3, Specific Target Organ Toxicity Repeated Exposure - Category 2, Skin Corrosion/Irritation - Category 2, Serious Eye Damage, Eye Irritation - Category 2A, Carcinogenicity - Category 1A
- WHMIS** • Combustible Liquids - B3, Other Toxic Effects - D2A, Other Toxic Effects - D2B
- GHS** • Flammable Liquids - Category 3, Specific Target Organ Toxicity Repeated Exposure - Category 2, Skin Corrosion/Irritation - Category 2, Serious Eye Damage, Eye Irritation - Category 2A, Carcinogenicity - Category 1A

Potential Health Effects

Inhalation

- Acute (Immediate)** • May cause irritation. Excessive breathing of high vapor concentration can cause possible unconsciousness and even asphyxiation.
- Chronic (Delayed)** • Refer to other information found in Section 11-Toxicology.

Skin:

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

Eye:

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

Ingestion:

- Acute (Immediate)** • May be harmful or fatal if swallowed.
- Chronic (Delayed)** • Repeated and prolonged exposure may be harmful.

Carcinogenic Effects • This product or one of its ingredients present at 0.1% or more is listed as a carcinogen by NTP, IARC or OSHA. See Section 11 - Toxicological Information for more details.

Carcinogenic Effects			
	CAS	IARC	NTP
Quartz	14808-60-7	Group 1-Carcinogenic	Known Human Carcinogen
Hydrated aluminium-magnesium silicate	12174-11-7	Group 2B-Possible Carcinogen Group 3-Not Classifiable	Not established
Asphalt	8052-42-4	Group 2B-Possible Carcinogen Group 3-Not Classifiable	Under Consideration

Section 3 - Composition/Information on Ingredients

Hazardous Components				
Chemical Name	Identifiers	%(weight)	LD50/LC50	Classifications According to Regulation/Directive
Asphalt	CAS: 8052-42-4 UN: NA1999 EINECS: 232-490-9	50% TO 70%	Ingestion/Oral-Rat LD50 • >5000 mg/kg Inhalation-Rat LC50 • >94.4 mg/m ³	OSHA HCS 1994: Carc.; Irrit. WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 2; Eye Irrit. 2A; Skin Irrit. 2
Mineral Spirits	CAS: 8052-41-3 EINECS: 232-489-3	15% TO 25%		
Hydrated aluminium-magnesium silicate	CAS: 12174-11-7	10% TO 20%		WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 2; STOT RE 2
Solvent naphtha (petroleum), light aromatic	CAS: 64742-95-6	5% TO 10%		UN GHS: Asp. Tox. 1; Carc. 1B

Cellulose	CAS:9004-34-6 EINECS:232-674-9	1% TO 10%	Ingestion/Oral-Rat LD50 • >5 g/kg Inhalation-Rat LC50 • >5800 mg/m ³ 4 Hour(s)	OSHA HCS 1994: Irrit. WHMIS: Other Toxic Effects - D2B UN GHS: Eye Irrit. 2A; Skin Irrit. 2
Quartz	CAS:14808-60-7 EINECS:238-878-4	1% TO 2%		WHMIS: Other Toxic Effects - D2A UN GHS: Carc. 1A; STOT RE 1
1,2,4-Trimethylbenzene	CAS:95-63-6 EINECS:202-436-9	0.5% TO 1.5%	Ingestion/Oral-Rat LD50 • 5 g/kg Inhalation-Rat LC50 • 18000 mg/m ³ 4 Hour(s) Ingestion/Oral-Mouse LD50 • 6900 mg/kg	OSHA HCS 1994: Comb. Liq.; Irrit. WHMIS: Comb. Liq. - B3
Benzene, 1,3,5-trimethyl	CAS:108-67-8 UN:UN2325 EINECS:203-604-4	0.5% TO 1.5%		

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** • IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. If breathing is difficult, give oxygen. Get medical attention immediately.
- Skin** • IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention. Take off contaminated clothing and wash before reuse.
- Eye** • 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 advice/attention.
- Ingestion** • Call a physician or poison control center immediately. If swallowed, do not induce vomiting: seek medical advice immediately and show this container or label. Never give anything by mouth to an unconscious person.

See Section 2 for Potential Health Effects.

Section 5 - Fire Fighting Measures

- Extinguishing Media** • Use CO₂, dry chemical, or foam.
- Unsuitable Extinguishing Media** • Do not use direct stream of water.
- Firefighting Procedures** • Fight advanced or massive fires from safe distance or protected location. Avoid water in a straight hose stream as the stream will cause splatter and spread fire. If product is heated above its flash point it will produce vapors sufficient to support combustion. Vapors are heavier than air and may travel along the ground and can be ignited by heat, pilot lights, other flames and ignition sources at locations near the point of release.
- Unusual Fire and Explosion Hazards** • Combustible liquid. May release irritating or toxic gases, fumes, or vapors.
- Hazardous Combustion Products** • Carbon monoxide, carbon dioxide, hydrocarbons.
- Protection of Firefighters** • Firefighters should wear self-contained breathing apparatus and full protective gear.
- Flash Point** • 105°F(40.5°C) CC (Closed Cup)
- Explosion Limits:**
- Upper** • 6 %
- Lower** • 0.9 %
- 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. Stay upwind. Ventilate the area before entry.
- Emergency Procedures** • ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area) 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. Keep unauthorized personnel away.
- Environmental Precautions** • Prevent entry into waterways, sewers, basements or confined areas.
- Containment/Clean-up Measures** • Contain and/or absorb spill with inert material (e.g. sand, vermiculite), then place in suitable container. Use appropriate Personal Protective Equipment (PPE)
- Prohibited Materials** • Avoid contact with strong oxidizing agents and acids.

Section 7 - Handling and Storage

- Handling** • KEEP OUT OF THE REACH OF CHILDREN! Keep away from heat, sparks, and flame – No Smoking. Use only with adequate ventilation.
- Storage** • Store in a well-ventilated place. Keep container tightly closed. No open flames, no sparks and no smoking.
- 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



- Respiratory** • In case of insufficient ventilation, wear suitable respiratory equipment. If listed exposure limits are expected to be exceeded, use approved respiratory protection suitable for the hazard. 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.
- 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. Wash thoroughly with soap and water after handling. When using do not smoke, eat, or drink.
- Engineering Measures/Controls** • Adequate ventilation systems as needed to control concentrations of airborne contaminants below applicable threshold limit values. Use precaution to protect building intake from fumes and vapors created outdoors.

Exposure Limits/Guidelines						
	Result	ACGIH	Canada Ontario	Mexico	OSHA	United States - California
Cellulose (9004-34-6)	TWAs	10 mg/m ³ TWA	10 mg/m ³ TWA	10 mg/m ³ TWA LMPE-PPT	15 mg/m ³ TWA (total dust); 5 mg/m ³ TWA (respirable fraction)	5 mg/m ³ PEL (respirable fraction, listed under Particulates not otherwise regulated); 10 mg/m ³ PEL (total dust, listed under Particulates not otherwise regulated)
Quartz (14808-60-7)	TWAs	0.025 mg/m ³ TWA (respirable)	0.10 mg/m ³ TWA (designated)	0.1 mg/m ³ TWA LMPE-PPT (respirable)	Not established	0.3 mg/m ³ PEL (total dust); 0.1 mg/m ³ PEL

		fraction)	substance regulation, respirable)	fraction)		(respirable dust)
Mineral Spirits (8052-41-3)	TWAs	100 ppm TWA	525 mg/m3 TWA (140°C Flash aliphatic solvent)	100 ppm TWA LMPE-PPT; 523 mg/m3 TWA LMPE-PPT	500 ppm TWA; 2900 mg/m3 TWA	100 ppm PEL; 525 mg/m3 PEL
Asphalt (8052-42-4)	TWAs	0.5 mg/m3 TWA (fume, inhalable fraction, as benzene soluble aerosol)	0.5 mg/m3 TWA (fume, inhalable, as Benzene-soluble aerosol)	5 mg/m3 TWA LMPE-PPT	Not established	5 mg/m3 PEL (fume)

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)

Key to abbreviations

PEL = Permissible Exposure Level determined by the Occupational Safety and Health Administration (OSHA)

Section 9 - Physical and Chemical Properties

Material Description

Physical Form	Liquid	Appearance/Description	Thick black semi-liquid.
Color	Black	Odor	Mild Hydrocarbon.
Physical and Chemical Properties	Semi-liquid		

General Properties

Boiling Point	310 to 400 F(154.4444 to 204.4444 C)	Melting Point	No data available
pH	No data available	Specific Gravity/Relative Density	1.23 Water=1
Density	~10.32 lbs/gal	Bulk Density	No data available
Viscosity	See TDS		

Volatility

Vapor Pressure	2 mmHg (torr) @ 68 F(20 C)	Vapor Density	1 Air=1
Evaporation Rate	1 Ether = 1	VOC (Vol.)	< 300 g/L

Flammability

Flash Point	105° F(40.5556 C) CC (Closed Cup)	UEL	6 %
LEL	0.9 %	Autoignition	No data available

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 flame.

Incompatible Materials

- Strong oxidizers.

Hazardous Decomposition Products

- Carbon monoxide, carbon dioxide and hydrocarbons.

Section 11 - Toxicological Information

Component Name	CAS	Data
Asphalt (50% TO 70%)	8052-42-4	Acute Toxicity: orl-rat LD50:>5000 mg/kg; ihl-rat LC50:>94.4 mg/m3
Solvent naphtha (petroleum), light aromatic (5% TO 10%)	64742-95-6	Acute Toxicity: orl-rat LD50:8400 mg/kg
Cellulose (1% TO 10%)	9004-34-6	Acute Toxicity: orl-rat LD50:>5 gm/kg
1,2,4-Trimethylbenzene (0.5% TO 1.5%)	95-63-6	Acute Toxicity: orl-rat LD50:5 gm/kg; ihl-rat LC50:18000 mg/m3/4H

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.

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. 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: Not restricted if shipped in containers <450L (119 gallons) Restricted if shipped in containers >450L (119 gallons)

TDG - Not Restricted under General Exemption for small container packaging. Bulk Regulated: Tars, Liquids; UN1999; Hazard Class: 3; Packing Group: III

IMDG Code 2.3.2.5 - exempted from marking, labeling & testing of packages.

IATA - International Air Transportation Association - TARS, LIQUID; UN1999; Hazard Class: 3; Packing Group: III.

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.

State Right To Know					
Component	CAS	MA	MN	NJ	PA
Asphalt	8052-42-4	Yes	Yes	Yes	Yes
Mineral Spirits	8052-41-3	Yes	Yes	Yes	Yes
Hydrated aluminium-magnesium silicate	12174-11-7	No	No	No	No
Solvent naphtha (petroleum), light aromatic	64742-95-6	No	No	No	No
Cellulose	9004-34-6	Yes	Yes	Yes	Yes
Quartz	14808-60-7	Yes	Yes	Yes	Yes
1,2,4-Trimethylbenzene	95-63-6	Yes	Yes	Yes	Yes
Benzene, 1,3,5-trimethyl	108-67-8	Yes	No	No	No
Inventory					
Component	CAS	EU EINECS		TSCA	
Asphalt	8052-42-4	Yes		Yes	
Mineral Spirits	8052-41-3	Yes		Yes	
Solvent naphtha (petroleum), light aromatic	64742-95-6	Yes		Yes	
Cellulose	9004-34-6	Yes		Yes	

Quartz	14808-60-7	Yes	Yes
1,2,4-Trimethylbenzene	95-63-6	Yes	Yes
Benzene, 1,3,5-trimethyl	108-67-8	Yes	Yes

Canada

Labor

Canada - WHMIS - Classifications of Substances

•Cellulose	9004-34-6	1% TO 10%	Uncontrolled product according to WHMIS classification criteria (including microcrystalline and paper fibers)
•Asphalt	8052-42-4	50% TO 70%	Not Listed
•1,2,4-Trimethylbenzene	95-63-6	0.5% TO 1.5%	B3
•Solvent naphtha (petroleum), light aromatic	64742-95-6	5% TO 10%	B3, D2B
•Quartz	14808-60-7	1% TO 2%	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.)
•Mineral Spirits	8052-41-3	15% TO 25%	B3, D2B
•Benzene, 1,3,5-trimethyl	108-67-8	0.5% TO 1.5%	B3
•Hydrated aluminium-magnesium silicate	12174-11-7	10% TO 20%	Not Listed

United States

U.S. - CERCLA/SARA - Section 313 - Emission Reporting

•Cellulose	9004-34-6	1% TO 10%	Not Listed
•Asphalt	8052-42-4	50% TO 70%	Not Listed
•1,2,4-Trimethylbenzene	95-63-6	0.5% TO 1.5%	1.0 % de minimis concentration
•Solvent naphtha (petroleum), light aromatic	64742-95-6	5% TO 10%	Not Listed
•Quartz	14808-60-7	1% TO 2%	Not Listed
•Mineral Spirits	8052-41-3	15% TO 25%	Not Listed
•Benzene, 1,3,5-trimethyl	108-67-8	0.5% TO 1.5%	Not Listed
•Hydrated aluminium-magnesium silicate	12174-11-7	10% TO 20%	Not Listed

Section 16 - Other Information

Prepared By

- GG Inc.

Last Revision Date

- 1/11/2018

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. The Manufacturer does not accept liability for any loss or damage that may occur from the use of this information.

NFPA:

