

MATERIAL SAFETY DATA SHEET

DO NOT USE THIS PRODUCT UNTIL YOU HAVE READ PRODUCT LABEL

MSDS Prepared By:
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Revised:

Section 1: General Information

Trade Names and Synonyms:

Miratak®

Chemical Names and Family: Rubberized asphalt self-adhering sheet with polyolefin fabric
Product Use: Waterproofing membrane for repaving or overlay application

Section 2: Hazardous Ingredients/Identity Information

<u>Ingredient</u> (Chemical Name, CAS#, and Common Name)	<u>CAS No.</u>	<u>Percent Range</u>
Petroleum Asphalt	8052-42-4	60 - 80
Rubber-Based Copolymer	9003-55-8	5 - 20
CaCO ₃	1317-65-3	10 - 30
Hydro treated Heavy Naphthenic Distillate	64742-52-5	< 20

This product is hazardous according OSHA 29CFR 1910.1200.

Flammable/Combustible X Acute Toxin X Chronic Toxin X Carcinogen X
Pressure No Reactive No Exposure Limit Target Organ Other

Section 3: Hazardous Identification

Emergency and Hazards Overview:

Repeated skin contact with rubberized asphalt may result in slight irritation. Prolonged skin contact with process oil in the rubberized asphalt may cause an increased risk of skin cancer, liver damage and reproduction effects based on laboratory animals tests. Skin cleansing studies with aromatic oils show that the toxic effects are not likely to occur to humans if good personal hygiene practices are used. May be harmful if swallowed. Read and understand all health and safety information on the product label and Material Safety Data Sheet before use.

Ratings

Health 2 Flammability 1 Reactivity 0

Primary Route of Exposure: Skin x Inhalation x Eye x Ingestion x

Health Effect Information

Eye Contact: May cause eye irritation if wiped or rubbed into eyes.

Skin Contact: May cause skin irritation on prolonged or repeated contact.

Inhalation: Inhalation is unlikely due to the nature of this product

Ingestion: There are no known health effects due to ingestion. Ingestion is unlikely due to the nature of this product.

Medical Conditions Aggravated by Exposure: Prolonged contact with oil residues in this product may produce effects including skin cancer.

Section 4: First Aid Information

Eye Contact: Flush with water for 15 minutes. Get medical attention immediately.

Skin Contact: Wipe off and wash skin with soap and water. Promptly remove contaminated clothing and wash before reuse. See a physician if irritation develops.

Inhalation: No known adverse effect unless heated.

Ingestion: Due to the nature of this product, ingestion is unlikely. Consult a physician immediately.

Notes to Physician: This product contains asphalt and mineral process oil.

Section 5: Fire and Explosion Information

Flammable Properties

Flash Point: >450°F

Test Method: COC

Flame extension: NA

Test Method: NA

Flammable Limits in Air

Upper Percent: NA

Lower Percent: NA

Auto ignition Temperature: NA

Test Method: NA

NFPA Classification: H 2 F 1 R 0

Extinguishing Media: CO₂, foam, dry chemical, or water spray.

Fire Fighting Measures

Special Fire Fighting Procedures and Equipment: Wear NIOSH/MSHA approved respirators, or self-contained breathing apparatus (SCBA).

Unusual Fire and Explosion Conditions: None known.

Hazardous Combustion By-Products: CO, CO₂, unburned hydrocarbons.

Section 6: Accidental Release Measures

Personnel Safeguards: Evacuate non-essential personnel to safe areas. Clean-up responders should wear proper protective clothing and gloves before entering the affected area.

Regulatory Notifications: Certain component of this product is defined as hazardous according to U.S. EPA. Spill reporting requirements and reportable quantities vary by region. Consult all applicable state and local regulations. For Canada, observe all precautions noted above.

Containment and Clean up: Observe above precautions, thoroughly clean the area, and remove materials for disposal.

Section 7: Handling and Storage Information

Handling: Avoid prolonged contact with skin. Use protective gloves. Avoid rubbing eyes while handling.

Storage: Store in dry, cool environment. Keep containers closed when not in use.

Empty Container Warnings

Drums: NA

Plastic: NA

Section 8: Exposure Controls / Personal Protection Information

Exposure Limits and Guidelines

Component	CAS No.	Exposure Limit
Asphalt	8052-42-4	5 mg/m ³ TWA
Hydrated Naphthenic Distillate	64742-52-5	5 mg/m ³ TWA, 10mg/m ³ ACGIH STEL
CaCO ₃	1317-65-3	2 mg/m ³ ACGIH TLV

Personal Protective Equipment

Eye/Face Protection: Wear safety goggles during hot melt application.

Skin Protection: Use protective insulation gloves during hot melt application.

Respiratory Protection: Provide adequate ventilation to maintain vapors below PEL/TWA. If vapor levels are exceeded, use NIOSH approved respirator, both during and immediately after application, until vapor levels are below limits.

Personal Hygiene: Avoid rubbing eyes during handling. Due to the nature of this product, ingestion is unlikely. Use good personal hygiene practices to avoid incidental ingestion.

Engineering Controls / Work Practices

Ventilation: If material is heated or otherwise made airborne, provide local exhaust or area ventilation to maintain concentration of vapors below 5 mg/m³ PEL/TWA.

Other: Source of clean water should be available in the work area for flushing eyes and skin. Wash thoroughly with soap and water after use and before eating.

Section 9: Physical and Chemical Properties

Appearance: Black rubberized asphalt membrane

Vapor Pressure: NA

Odor: Slight petroleum odor	Vapor Density (air=1): NA
Physical state: Pliable solid	Percent Volatile by Volume: Negligible
pH: NA	Volatile Organic Content: Negligible
DOT Corrosively: NA	Molecular Weight: NA
Boiling Point: NA	Average Carbon Number: NA
Melting Point: 190° to 230°F	Viscosity @ 77° F: Solid
Specific Gravity: 1.0-1.2	Solubility in Water: Negligible
Pour Point: >300°F	Octanol / Water Coefficient: Log K_{ow} = NA

Section 10: Stability and Reactivity Information

Chemical Stability: Stable under normal condition.

Conditions to Avoid: Avoid extreme heat, fire, and temperature.

Incompatible Materials to Avoid: Avoid strong acids, strong oxidizers.

Section 11: Toxicological Information

Primary Eye Irritation: Irritating

Primary Skin Irritation: May be irritating

Acute Dermal Toxicity: NA

Subacute Dermal Toxicity: NA

Dermal Sensitization: NA

Inhalation Toxicity: NA

Inhalation Sensitization: NA

Oral Toxicity: Mineral oil mist, LD₅₀(mouse): 22,000 mg/kg

Mutagenicity: NA

Carcinogenicity: Prolonged >5mg/m³ oil mist exposure may result in a cancer risk. Due to the nature of the product, it is unlikely that the CaCO₃ will be airborne.

Reproductive Toxicity: NA

Teratogenicity: NA

Immunotoxicity: NA

Neurotoxicity: NA

Other: No other toxicological information available

Section 12: Ecological Information

Aquatic Toxicity: Not known

Terrestrial Toxicity: Not known

Chemical Fate and Transport: Not known

No other ecological information available

Section 13: Disposal Information

Regulatory Information: Consult all regulations (federal, state, provincial, local etc.) or a qualified waste disposal firm when characterizing waste for disposal.

Waste Disposal Methods: Dispose of in accordance with all applicable regulations.

Section 14: Transportation Information

U.S. Department of Transportation (DOT)

Highway / Rail (Bulk): Not classified

Highway / Rail (Non-Bulk): Not classified

The DOT description is provided to assist in the proper shipping classification of this product and may not be suitable for all shipping descriptions.

International Information

Vessel: IMDG Regulated: Not classified IMDG Not

Air: ICAO Regulated: Not classified ICAO Not

Other: No other information available.

Section 15: Regulatory Information

Regulatory Lists

U.S. TSCA Inventory: All components of this material are on the US TSCA Inventory or exempt from listing on the TSCA Inventory.

Sara Section 313: This product contains no chemical listed in Sara, Title III, Section 313:

Chemical	CAS Number	Percent in Product
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Regulatory Lists Searched

Health & Safety: NA

Environmental: NA

International: NA

State: FL, MA, MN, PA, RI

National Inventories: NA

SARA 311 / 312 Categories

Acute: Yes **Chronic:** Yes **Fire:** No **Pressure:** No **Reactive:** No

Not Regulated:

California Proposition 65 Information: Warning! This product contains substances known to the state of California to cause cancer.

Canadian WHMIS Classification

Class: Class B

Division: 4

This product has been classified in accordance with hazard criteria of the Controlled Products Regulations (CPR). This MSDS contains all the information required by the CPR.

European Union Classification

Hazard Symbol:



Toxic

Risk Phrases: R45

Safety Phrases: S38, S45, S53

Other Regulations: No other information available.

Section 16: Other Information

Health and Environmental Label Language

All ingredients contained in this product are included on the US EPA Toxic Substances Control Act (TSCA) inventory or exempt from listing on the TSCA inventory. All ingredients contained in this product complies with the requirements of the Canadian Environmental Protection Act (CEPA) and are listed on the Domestic Substance List (DSL) or Non-Domestic Substance List (NDSL)

The information and recommendations contained in this publication have been compiled from sources believed to be reliable and to represent the best current opinion on the subject at the time of publication. Since we cannot anticipate or control the many different conditions under which this information or our products may be used, we make no guarantee that the recommendations will be adequate for all individuals or situations. Each user of the product described herein should determine the suitability of the described product for his particular purpose and should comply with all federal and state rules and regulations concerning the described products.

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