

SAFETY DATA SHEET

1. Identification

Material name: Alumanation® 301 FR

Material: 301050 FR

Recommended use and restriction on use

Recommended use: Coatings

Restrictions on use: Not known.

Manufacturer/Importer/Supplier/Distributor Information

Tremco CPG Inc. - U.S. Roofing

3735 Green Road

Beachwood OH 44122

US

Contact person:

EH&S Department

Telephone:

216-292-5000

Emergency telephone number:

1-800-424-9300 (US); 1-613-996-6666 (Canada)

2. Hazard(s) identification

Hazard Classification

Physical Hazards

Flammable liquids Category 3

Health Hazards

Acute toxicity (Inhalation - dust and mist) Category 4

Carcinogenicity Category 1A

Unknown toxicity - Health

Acute toxicity, dermal 15.88 %

Acute toxicity, inhalation, vapor 97.04 %

Acute toxicity, inhalation, dust or mist 83.69 %

Environmental Hazards

Acute hazards to the aquatic environment Category 2

Chronic hazards to the aquatic environment Category 2

Unknown toxicity - Environment

Acute hazards to the aquatic environment 56.93 %

Chronic hazards to the aquatic environment 56.93 %

Label Elements

Hazard Symbol:



Signal Word:

Danger

Hazard Statement:

Flammable liquid and vapor.
Harmful if inhaled.
May cause cancer.
Toxic to aquatic life with long lasting effects.

Precautionary Statements

Prevention:

Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Keep container tightly closed. Ground and bond container and receiving equipment. Use explosion-proof electrical, ventilating and lighting equipment. Use non-sparking tools. Take action to prevent static discharges. Avoid breathing dust/fume/gas/mist/vapors/spray. Use only outdoors or in a well-ventilated area. Avoid release to the environment. Wear protective gloves/ eye protection/ face protection. Use personal protective equipment as required.

Response:

IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water [or shower]. IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER or doctor/ physician if you feel unwell. IF exposed or concerned: Get medical advice/attention. In case of fire: Use dry sand, dry chemical or alcohol-resistant foam for extinction. Collect spillage.

Storage:

Store in a well-ventilated place. Keep cool. Store locked up.

Disposal:

Dispose of contents/ container to an approved facility in accordance with local, regional, national and international regulations.

Hazard(s) not otherwise classified (HNOC):

Static accumulating flammable liquid can become electrostatically charged even in bonded and grounded equipment.

3. Composition/information on ingredients

Mixtures

Chemical Identity	CAS number	Content in percent (%)*
Stoddard solvent (Mineral Spirits)	8052-41-3	25 - <50%
Oxidized asphalt	64742-93-4	10 - <20%
Asphalt	8052-42-4	10 - <20%
Aluminum	7429-90-5	10 - <20%
Naphtha, petroleum, hydrodesulfurized heavy	64742-82-1	5 - <10%
Expandable flake graphite	12777-87-6	1 - <5%
Nonane	111-84-2	1 - <2.5%
Triphenyl phosphite	101-02-0	0.1 - <0.25%

* All concentrations are percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

4. First-aid measures

Description of necessary first-aid measures

Inhalation:	Move to fresh air.
Skin Contact:	Wash skin thoroughly with soap and water. Take off immediately all contaminated clothing. If skin irritation occurs: Get medical advice/attention.
Eye contact:	Any material that contacts the eye should be washed out immediately with water. If easy to do, remove contact lenses. If eye irritation persists: Get medical advice/attention.
Ingestion:	Call a POISON CENTER/doctor if you feel unwell. Rinse mouth.
Personal Protection for First-aid Responders:	Firefighters must use standard protective equipment including flame retardant coat, helmet with face shield, gloves, rubber boots, and in enclosed spaces, SCBA.

Most important symptoms/effects, acute and delayed

Symptoms:	Respiratory tract irritation.
Hazards:	No data available.

Indication of immediate medical attention and special treatment needed

Treatment:	Symptoms may be delayed.
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5. Fire-fighting measures

General Fire Hazards:	Use water spray to keep fire-exposed containers cool. Water may be ineffective in fighting the fire. Fight fire from a protected location. Move containers from fire area if you can do so without risk.
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Suitable (and unsuitable) extinguishing media

Suitable extinguishing media:	Use fire-extinguishing media appropriate for surrounding materials.
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Unsuitable extinguishing media: Avoid water in straight hose stream; will scatter and spread fire.

Specific hazards arising from the chemical: Vapors may travel considerable distance to a source of ignition and flash back. Vapors may cause a flash fire or ignite explosively. Prevent buildup of vapors or gases to explosive concentrations.

Special protective equipment and precautions for fire-fighters

Special fire-fighting procedures: No data available.

Special protective equipment for fire-fighters: Firefighters must use standard protective equipment including flame retardant coat, helmet with face shield, gloves, rubber boots, and in enclosed spaces, SCBA.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures: Ventilate closed spaces before entering them. ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area). Keep upwind.

Accidental release measures: In the event of a spill or accidental release, notify relevant authorities in accordance with all applicable regulations.

Methods and material for containment and cleaning up: Dam and absorb spillages with sand, earth or other non-combustible material. Collect spillage in containers, seal securely and deliver for disposal according to local regulations.

Environmental Precautions: Do not contaminate water sources or sewer. Prevent further leakage or spillage if safe to do so. Avoid release to the environment.

7. Handling and storage

Handling

Technical measures (e.g. Local and general ventilation): Observe good industrial hygiene practices. Observe occupational exposure limits and minimize the risk of inhalation of vapors and mist. Mechanical ventilation or local exhaust ventilation may be required.

Safe handling advice: Provide adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices. Do not handle until all safety precautions have been read and understood. Obtain special instructions before use. Use personal protective equipment as required. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Ground and bond container and receiving equipment. Take precautionary measures against static discharges.

Contact avoidance measures: No data available.

Hygiene measures: Observe good industrial hygiene practices. Wash hands before breaks and immediately after handling the product. When using do not smoke.

Storage

Safe storage conditions: Store locked up. Store in a well-ventilated place. Store in a cool place.

Safe packaging materials: No data available.

8. Exposure controls/personal protection

Control Parameters

Occupational Exposure Limits

Chemical Identity	Type	Exposure Limit Values	Source
Stoddard solvent (Mineral Spirits)	PEL	500 ppm 2,900 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000), as amended (02 2006)
	TWA	100 ppm	US. ACGIH Threshold Limit Values, as amended (2008)
Asphalt - Inhalable fume - as benzene solubles	TWA	0.5 mg/m3	US. ACGIH Threshold Limit Values, as amended (03 2018)
Aluminum - Total dust - as Al	PEL	15 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000), as amended (02 2006)
Aluminum - Respirable fraction - as Al	PEL	5 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000), as amended (03 2016)
Aluminum - Respirable fraction	TWA	5 mg/m3	US. OSHA Table Z-3 (29 CFR 1910.1000), as amended (03 2016)
	TWA	15 millions of particles per cubic foot of air	US. OSHA Table Z-3 (29 CFR 1910.1000), as amended (03 2016)
Aluminum - Total dust	TWA	50 millions of particles per cubic foot of air	US. OSHA Table Z-3 (29 CFR 1910.1000), as amended (03 2016)
	TWA	15 mg/m3	US. OSHA Table Z-3 (29 CFR 1910.1000), as amended (03 2016)
Aluminum - Inhalable particles	TWA	10 mg/m3	US. ACGIH Threshold Limit Values, as amended (01 2025)
Aluminum - Respirable particles	TWA	3 mg/m3	US. ACGIH Threshold Limit Values, as amended (01 2025)
Aluminum - Respirable fraction	TWA	1 mg/m3	US. ACGIH Threshold Limit Values, as amended (01 2025)
Naphtha, petroleum, hydrodesulfurized heavy	TWA	100 ppm	US. ACGIH Threshold Limit Values, as amended (2008)
	PEL	500 ppm 2,900 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000), as amended (02 2006)
Nonane	TWA	200 ppm	US. ACGIH Threshold Limit Values, as amended (02 2012)

Chemical name	Type	Exposure Limit Values	Source
Stoddard solvent (Mineral Spirits)	STEL	580 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
	TWA	290 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)

Stoddard solvent (Mineral Spirits)	TWA	100 ppm		Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (11 2010)
Stoddard solvent (Mineral Spirits)	TWA	100 ppm	525 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (09 2017)
Asphalt - Aerosol, inhalable - as benzene solubles	TWA		0.5 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
Asphalt - Inhalable fraction - as benzene solubles	TWA		0.5 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (11 2010)
Asphalt - Fume	TWA		5 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (09 2017)
Asphalt	TWA		5 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (02 2024)
Asphalt - Vapor and particulates. - as benzene solubles	TWA		1.5 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (02 2024)
Aluminum - Respirable fraction	TWA		1 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (11 2010)
Aluminum - Respirable dust	TWA		5 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (04 2022)
Aluminum - Total dust	TWA		10 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (06 2022)
Aluminum - Respirable fraction	TWA		3 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (06 2022)
Aluminum - Respirable	TWA		1.0 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (06 2022)
Aluminum - Total dust	TWA		10 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (04 2022)
Naphtha, petroleum, hydrodesulfurized heavy	TWA		525 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (12 2007)
	TWA	100 ppm		Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (11 2010)
Naphtha, petroleum, hydrodesulfurized heavy	STEL		580 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
	TWA		290 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
Naphtha, petroleum, hydrodesulfurized heavy	TWA	100 ppm	525 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (09 2017)
Trade Secret - Total dust	TWA		10 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (05 2013)
Trade Secret - Respirable fraction	TWA		3 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (05 2013)

Trade Secret - Total dust	TWA	10 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (09 2017)
Trade Secret - Respirable fraction	TWA	3 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)
Trade Secret - Inhalable fraction	TWA	10 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)

Cellulose - Respirable fraction	TWA	3 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
Cellulose - Total dust	TWA	10 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
Cellulose	TWA	10 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (11 2010)
Cellulose - Total dust	TWA	10 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (09 2017)
Nonane	TWA	200 ppm 1,050 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (12 2008)
Nonane	TWA	200 ppm	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)
Nonane	TWA	200 ppm	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (06 2022)
Amorphous silica - Respirable fraction	TWA	3 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (06 2020)
Amorphous silica - Respirable particles	TWA	3 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)
Amorphous silica - Total dust	TWA	10 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (03 2020)
Amorphous silica - Total dust	TWA	10 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (06 2020)
Amorphous silica - Inhalable particles	TWA	10 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)
Amorphous silica - Inhalable fraction	TWA	10 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)
Amorphous silica - Respirable fraction	TWA	3 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)
Trimethyl benzene (mixed isomers)	TWA	25 ppm	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
Trimethyl benzene (mixed isomers)	TWA	25 ppm	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (11 2010)
Trimethyl benzene (mixed isomers)	TWA	25 ppm	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (03 2020)
Clay - Respirable	TWA	2 mg/m3	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (07 2007)
Clay - Respirable fraction	TWA	2 mg/m3	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (08 2017)
Clay - Respirable dust	TWA	2 mg/m3	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (03 2020)

1,2,4-Trimethylbenzene	TWA	25 ppm 123 mg/m3	Canada. Alberta OELs (Occupational Health & Safety Code, Schedule 1, Table 2), as amended (07 2009)
1,2,4-Trimethylbenzene	TWA	25 ppm	Canada. Quebec OELs. (Ministry of Labor - Regulation respecting occupational health and safety), as amended (04 2022)
1,2,4-Trimethylbenzene	TWA	25 ppm	Canada. Ontario OELs. (Control of Exposure to Biological or Chemical Agents), as amended (01 2020)
1,2,4-Trimethylbenzene	TWA	25 ppm	Canada. British Columbia OELs: Table of Exposure Limits for Chemical Biological Substances (Workers Compensation Board); as amended (06 2022)

Biological Limit Values

Chemical Identity	Exposure Limit Values	Source
Asphalt (1-Hydroxypyrene, with hydrolysis (1-HP): Sampling time: End of shift at end of work week.)	2.5 µg/l (Urine)	ACGIH BEI (01 2021)
Asphalt (3-Hydroxybenzo(a)pyrene, with hydrolysis: Sampling time: End of shift at end of work week.)	(Urine)	ACGIH BEI (01 2021)

Appropriate Engineering Controls

Observe good industrial hygiene practices. Observe occupational exposure limits and minimize the risk of inhalation of vapors and mist. Mechanical ventilation or local exhaust ventilation may be required.

Individual protection measures, such as personal protective equipment (PPE)

Eye/face protection:

Wear safety glasses with side shields (or goggles).

Skin Protection

Hand Protection:

Additional Information: Use suitable protective gloves if risk of skin contact.

Skin and Body Protection:

Wear suitable protective clothing.

Respiratory Protection:

In case of inadequate ventilation use suitable respirator. Seek advice from local supervisor.

Hygiene measures:

Observe good industrial hygiene practices. Wash hands before breaks and immediately after handling the product. When using do not smoke.

9. Physical and chemical properties

Appearance

Physical state:

liquid

Form:

Viscous Liquid

Color:

Gray

Odor:

Mild petroleum/solvent

Odor threshold:

No data available.

pH:

No data available.

Melting point/freezing point:	No data available.
Initial boiling point and boiling range:	No data available.
Flash Point:	41 °C 105 °F
Evaporation rate:	Slower than Ether
Flammability (solid, gas):	No
Upper/lower limit on flammability or explosive limits	
Flammability limit - upper (%):	No data available.
Flammability limit - lower (%):	No data available.
Explosive limit - upper:	No data available.
Explosive limit - lower:	No data available.
Vapor pressure:	No data available.
Vapor density:	Vapors are heavier than air and may travel along the floor and in the bottom of containers.
Relative density:	0.95
Solubility(ies)	
Solubility in water:	Practically Insoluble
Solubility (other):	No data available.
Partition coefficient (n-octanol/water):	No data available.
Auto-ignition temperature:	No data available.
Decomposition temperature:	No data available.
Viscosity:	No data available.

10. Stability and reactivity

Reactivity:	No data available.
Chemical Stability:	Material is stable under normal conditions.
Possibility of hazardous reactions:	No data available.
Conditions to avoid:	Heat, sparks, flames.
Incompatible Materials:	Avoid contact with oxidizing agents (e.g. nitric acid, peroxides and chromates).
Hazardous Decomposition Products:	Thermal decomposition or combustion may liberate carbon oxides and other toxic gases or vapors.

11. Toxicological information

Information on likely routes of exposure

Inhalation:	In high concentrations, vapors, fumes or mists may irritate nose, throat and mucus membranes.
Skin Contact:	May be harmful in contact with skin. Causes mild skin irritation.
Eye contact:	Eye contact is possible and should be avoided.
Ingestion:	May be ingested by accident. Ingestion may cause irritation and malaise.

Symptoms related to the physical, chemical and toxicological characteristics

Inhalation: No data available.
Skin Contact: No data available.
Eye contact: No data available.
Ingestion: No data available.

Information on toxicological effects

Acute toxicity (list all possible routes of exposure)

Oral
Product: ATEmix: 40,051.27 mg/kg
Dermal
Product: ATEmix: 2,791.68 mg/kg
Inhalation
Product: ATEmix: 20.94 mg/l
ATEmix : 2.09 mg/l

Repeated dose toxicity
Product: No data available.

Skin Corrosion/Irritation
Product: No data available.

Specified substance(s):

Stoddard solvent (Mineral Spirits)	in vivo (Rabbit): Category 2 , 72 h in vivo (Rabbit): Category 3 , 24 - 72 h in vivo (Rabbit): Category 3 , 24 - 72 h in vivo (Rabbit): Category 2 , 72 h skin irritation / corrosion, other (Rabbit): Not irritating , 24 - 72 h skin irritation / corrosion, other (Rabbit): Not irritating , 24 - 72 h
Oxidized asphalt	in vivo (Rabbit): Not irritating , 72 h
Asphalt	in vivo (Rabbit): Not Classified , 24 h
Aluminum	in vivo (Rabbit): Not irritating , 24 - 72 h
Naphtha, petroleum, hydrodesulfurized heavy	in vivo (Rabbit): Irritant , 7 d
Expandable flake graphite	in vivo (Rat): Not Classified , 24 h
Nonane	in vivo Irritating , 72 h
Triphenyl phosphite	in vivo (Rabbit): Category 2 , 24 - 72 h

Serious Eye Damage/Eye Irritation

Product: No data available.
Specified substance(s):

Asphalt	Rabbit, 24 - 72 h: Not irritating
Aluminum	Rabbit, 24 h: Not irritating
Naphtha, petroleum, hydrodesulfurized heavy	Rabbit, 24 - 72 h: Not irritating
Expandable flake graphite	Rabbit, 24 - 72 h: Not irritating
Nonane	Rabbit, 24 - 72 h: Not irritating
Triphenyl phosphite	Rabbit, 3 d: Irritant

Respiratory or Skin Sensitization

Product: No data available.

Carcinogenicity

Product: May cause cancer.

IARC Monographs on the Evaluation of Carcinogenic Risks to Humans:

Oxidized asphalt	Overall evaluation: Probably carcinogenic to humans.
Asphalt	Overall evaluation: Possibly carcinogenic to humans.

US. National Toxicology Program (NTP) Report on Carcinogens:

Asphalt	Known To Be Human Carcinogen.
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US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1053), as amended:

No carcinogenic components identified

Germ Cell Mutagenicity

In vitro Product:	No data available.
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In vivo Product:	No data available.
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Reproductive toxicity Product:	No data available.
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Specific Target Organ Toxicity - Single Exposure Product:	No data available.
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Specific Target Organ Toxicity - Repeated Exposure Product:	No data available.
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Aspiration Hazard Product:	No data available.
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Other effects:	Constituents of this product may include crystalline silica which, if in inhalable form, may cause silicosis, a form of progressive pulmonary fibrosis. Inhalable crystalline silica is listed by IARC as a group I carcinogen (lung) based on sufficient evidence in occupationally exposed humans and sufficient evidence in animals. Crystalline silica is also listed by the NTP as a known human carcinogen. Constituents may also contain asbestiform or non-asbestiform tremolite or other silicates as impurities, and above de minimis exposure to these impurities in inhalable form may be carcinogenic or cause other serious lung problems.
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12. Ecological information

Ecotoxicity:

Acute hazards to the aquatic environment:

Fish

Product: No data available.

Specified substance(s):

Stoddard solvent (Mineral Spirits) LC 50 (Oncorhynchus mykiss, 96 h): 2.5 mg/l

Aluminum LC 50 (Pimephales promelas, 96 h): 1.16 mg/l

Nonane LC 50 (Oncorhynchus mykiss, 96 h): 0.11 mg/l

Aquatic Invertebrates

Product: No data available.

Specified substance(s):

Aluminum LC 50 (Ceriodaphnia dubia, 48 h): 0.72 mg/l Experimental result, Weight of evidence

Nonane EC 50 (Daphnia magna, 48 h): 0.7 mg/l Read-across from supporting substance (structural analogue or surrogate), Supporting study

Triphenyl phosphite EC 50 (Daphnia magna, 48 h): 0.94 mg/l

Chronic hazards to the aquatic environment:

Fish

Product: No data available.

Specified substance(s):

Asphalt NOEL (Oncorhynchus mykiss): $\geq 1,000$ mg/l read-across from supporting substance (structural analogue or surrogate)

Aluminum NOEL (Pimephales promelas): 90.7 μ g/l experimental result

Aquatic Invertebrates

Product: No data available.

Specified substance(s):

Stoddard solvent (Mineral Spirits) NOEC (Daphnia magna): 0.1 mg/l experimental result Experimental result, Key study

Aluminum NOEC (Daphnia magna): 0.076 mg/l experimental result Experimental result, Weight of evidence

Nonane NOEC (Daphnia magna): 0.17 mg/l read-across from supporting substance (structural analogue or surrogate) Read-across from supporting substance (structural analogue or surrogate), Key study

Toxicity to Aquatic Plants

Product: No data available.

Persistence and Degradability

Biodegradation

Product: No data available.

Specified substance(s):

Nonane 67 % (15 d) Detected in water. Experimental result, Key study

Triphenyl phosphite 84 % (28 d) Detected in water. Experimental result, Key study

BOD/COD Ratio

Product: No data available.

Bioaccumulative potential

Bioconcentration Factor (BCF)

Product: No data available.

Specified substance(s):

Naphtha, petroleum, hydrodesulfurized heavy Bioconcentration Factor (BCF): 10 - 2,500 Aquatic sediment Estimated by calculation, Key study

Partition Coefficient n-octanol / water (log Kow)

Product: No data available.

Specified substance(s):

Nonane Log Kow: 5.65

Mobility in soil:

No data available.

Other adverse effects:

Toxic to aquatic life with long lasting effects.

13. Disposal considerations

Disposal methods:

Dispose of waste at an appropriate treatment and disposal facility in accordance with applicable laws and regulations, and product characteristics at time of disposal.

Contaminated Packaging:

No data available.

14. Transport information

TDG:

UN1999, ALCATRÕES LÍQUIDOS, 3, PG III

CFR / DOT:

UN1999, Tars, liquid, 3, PG III

IMDG:

000000033305

UN1999, TARS, LIQUID, 3, PG III

Further Information:

The above shipping description may not be accurate for all container sizes and all modes of transportation. Please refer to Bill of Lading.

15. Regulatory information**US Federal Regulations****TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)****Chemical Identity**

Nonane

Reportable quantity

De minimis concentration: TSCA 4% Subject to One-Time Reporting Requirements (Per Country)

US. Toxic Substances Control Act (TSCA) Section 5(a)(2) Final Significant New Use Rules (SNURs) (40 CFR 721 and 725, Subpt E)

None present or none present in regulated quantities.

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1053), as amended**Chemical Identity**Crystalline Silica
(Quartz)/ Silica Sand**OSHA hazard(s)**kidney effects
lung effects
immune system effects
Cancer**CERCLA Hazardous Substance List (40 CFR 302.4):****Chemical Identity**Asphalt
Naphtha, petroleum,
hydrodesulfurized heavy
Nonane
Xylene
Sulfuric acid
Naphthalene
Ethylbenzene**Reportable quantity**100 lbs.
100 lbs.
100 lbs.
100 lbs.
1000 lbs.
100 lbs.
1000 lbs.**Superfund Amendments and Reauthorization Act of 1986 (SARA)****Hazard categories**Fire Hazard
Immediate (Acute) Health Hazards
Delayed (Chronic) Health Hazard
Flammable (gases, aerosols, liquids, or solids)
Acute toxicity (any route or exposure)
Carcinogenicity
Hazards Not Otherwise Classified (HNOC)**US. EPCRA (SARA Title III) Section 304 Extremely Hazardous Substances Reporting Quantities and the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) Hazardous Substances**

Not Regulated.

US. EPCRA (SARA Title III) Section 313 Toxic Chemical Release Inventory (TRI) Reporting

<u>Chemical Identity</u>	<u>% by weight</u>
Aluminum	1.0%

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)

<u>Chemical Identity</u>	<u>Reportable quantity</u>
Sulfuric acid	lbs

Clean Water Act Section 311 Hazardous Substances (40 CFR 117.3)

<u>Chemical Identity</u>	<u>Reportable quantity</u>
Xylene	Reportable quantity: 100 lbs.

US State Regulations

US. California Proposition 65



WARNING
Cancer - www.P65Warnings.ca.gov

International regulations

Montreal protocol

Not applicable

Stockholm convention

Not applicable

Rotterdam convention

Not applicable

Kyoto protocol

Not applicable

VOC:

Regulatory VOC (less water and exempt solvent) : 276 g/l

VOC Method 310 : 29.06 %

Inventory Status:

Australia Industrial Chem. Act (AIC):	One or more components in this product are not listed on or exempt from the Inventory.
Canada DSL Inventory List:	One or more components in this product are not listed on or exempt from the Inventory.
Canada NDSL Inventory:	One or more components in this product are not listed on or exempt from the Inventory.
Ontario Inventory:	One or more components in this product are not listed on or exempt from the Inventory.
China Inv. Existing Chemical Substances:	One or more components in this product are not listed on or exempt from the Inventory.
Japan (ENCS) List:	One or more components in this product are not listed on or exempt from the Inventory.
Japan ISHL Listing:	One or more components in this product are not listed on or exempt from the Inventory.
Japan Pharmacopoeia Listing:	One or more components in this product are not listed on or exempt from the Inventory.
Korea Existing Chemicals Inv. (KECI):	One or more components in this product are not listed on or exempt from the Inventory.
Mexico INSQ:	One or more components in this product are not listed on or exempt from the Inventory.
Philippines PICCS:	One or more components in this product are not listed on or exempt from the Inventory.
Taiwan Chemical Substance Inventory:	One or more components in this product are not listed on or exempt from the Inventory.
Switzerland New Subs	One or more components in this

Notified/Registered:	product are not listed on or exempt from the Inventory.
Thailand DIW Existing Chemical Inv. List:	One or more components in this product are not listed on or exempt from the Inventory.
Vietnam National Chemical Inventory:	One or more components in this product are not listed on or exempt from the Inventory.
EC Inventory:	One or more components in this product are not listed on or exempt from the Inventory.
New Zealand Inventory of Chemicals:	All components in this product are listed on or exempt from the Inventory.
US TSCA Inventory:	One or more components in this product are not listed on or exempt from the Inventory.

16. Other information, including date of preparation or last revision
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Revision Date: 02/13/2026

Version #: 1.1

Further Information: No data available.

Disclaimer: For Industrial Use Only. Keep out of Reach of Children. The hazard information herein is offered solely for the consideration of the user, subject to their own investigation of compliance with applicable regulations, including the safe use of the product under every foreseeable condition.