

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 1 of 15

Revision date: 07.25.2025**HardLine 21-55 Resin Black****SECTION 1: Identification****Product Identifier****Product Name:** HardLine 21-55 Resin Black**Product code:** 60157**Recommended Use of the Product and Restriction on Use****Relevant Identified Uses:** POLYURETHANE SPRAY ELASTOMER SYSTEM -Resin Component**Uses Advised Against:** Not determined or not applicable.**Reasons Why Uses Advised Against:** Not determined or not applicable.**Manufacturer or Supplier Details****Manufacturer:****United States**

Rhino Linings Corporation

9747 Businesspark Avenue

San Diego, CA 92131

858-450-0441

www.rhinolinings.com

Emergency Telephone Number:**North America**

CHEMTREC

800-424-9300 (24/7)

SECTION 2: Hazard(s) Identification**GHS Classification:**

Acute toxicity (oral), category 4

Skin corrosion, category 1C

Serious eye damage, category 1

Skin sensitization, category 1

Specific target organ toxicity - repeated exposure, category 1

Chronic aquatic hazard, category 3

Label elements**Hazard Pictograms:****Signal Word:** Danger**Hazard statements:**

H314 Causes severe skin burns and eye damage

H318 Causes serious eye damage

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 2 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

H302 Harmful if swallowed

H317 May cause an allergic skin reaction

H372 Causes damage to organs through prolonged or repeated exposure.

H412 Harmful to aquatic life with long lasting effects

Precautionary Statements:

P201 Obtain special instructions before use

P202 Do not handle until all safety precautions have been read and understood

P260 Do not breathe dust, fumes, gas, mist, vapors or spray.

P264 Wash any exposed skin thoroughly after handling.

P270 Do not eat, drink or smoke when using this product

P280 Wear protective gloves, protective clothing, eye protection and face protection.

P272 Contaminated work clothing must not be allowed out of the workplace

P273 Avoid release to the environment

P301+P330+P331 IF SWALLOWED: Rinse mouth. Do NOT induce vomiting

P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with shower.

P310 Immediately call a POISON CENTER.

P321 Specific treatment (see Sections 4-8 of this SDS and any supplemental information on the product label).

P333+P313 If skin irritation or rash occurs: Get medical advice or attention.

P363 Wash contaminated clothing before reuse

P304+P340 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing

P314 Get medical advice or attention if you feel unwell.

P405 Store locked up

P501 Dispose of contents and container in accordance with local, regional, national, and international regulations.

Hazards Not Otherwise Classified: None

SECTION 3: Composition/Information on Ingredients

Identification	Name	Weight %
CAS Number: Proprietary	Polyether Polyol	50-70
CAS Number: 9046-10-0	Poly(propylene glycol) bis(2-aminopropyl ether)	1-10
CAS Number: 111-46-6	(2-hydroxyethoxy) ethan-2-ol	1-10
CAS Number: 1318-02-1	Zeolites	5-15
CAS Number: 25265-71-8	Oxydipropanol	1-5
CAS Number: 1333-86-4	Bound Carbon Black	1-5

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 3 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

CAS Number: 26401-97-8	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	0.1-1
---------------------------	---	-------

Additional Information:

Specific chemical identity and/or exact percentage (concentration) of each ingredient may be held as confidential business information (CBI). Any ingredient not disclosed in this section may have been determined not to be hazardous to health or the environment, or it may be present at a level below its disclosure threshold.

SECTION 4: First Aid Measures

Description of First Aid Measures

General Notes:

Show this Safety Data Sheet to the doctor in attendance.

After Inhalation:

If inhaled, remove person to fresh air and place in a position comfortable for breathing. Keep person at rest. If breathing is difficult, administer oxygen. If breathing has stopped, provide artificial respiration. If experiencing respiratory symptoms, seek medical advice/attention.

After Skin Contact:

Treatment is urgent. Seek emergency medical treatment. Remove contaminated clothing and shoes. Rinse skin with copious amounts of water [shower] for several minutes. Launder contaminated clothing before reuse.

After Eye Contact:

Immediately rinse eyes with plenty of gently flowing lukewarm water for 15 minutes. Remove contact lenses if present and easy to do so. Protect unexposed eye. Seek immediate medical attention, preferably from an ophthalmologist.

After Swallowing:

If swallowed, DO NOT induce vomiting unless told to do so by a physician or poison control center. Rinse mouth with water. Never give anything by mouth to an unconscious person. If spontaneous vomiting occurs, place on the left side with head down to prevent aspiration of liquid into the lungs. Seek immediate medical attention.

Most Important Symptoms and Effects, Both Acute and Delayed

Acute Symptoms and Effects:

Exposure to skin may result in redness, pain, burning, inflammation and tissue damage. Exposure to eyes may result in irritation, redness, pain, inflammation, itching, burning, tearing, corneal damage and loss of vision. Exposure via inhalation may result in cough, sore throat, burning sensation and shortness of breath. Exposure via ingestion may result in burns of the mouth and throat, abdominal pain, burning sensation in the throat and chest, nausea, vomiting, shock or collapse.

Delayed Symptoms and Effects:

Symptoms of exposure may be delayed.

Effects are dependent on exposure (dose, concentration, contact time).

Causes damage to organs through prolonged or repeated exposure. Effects are dependent on exposure (dose, concentration, contact time).

Immediate Medical Attention and Special Treatment

Specific Treatment:

In case of eye contact, seek prompt medical attention while rinsing is continued.

In case of skin contact, seek prompt medical attention while rinsing is continued.

In case of ingestion, seek prompt medical attention.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 4 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Notes for the Doctor:

Treat symptomatically.

SECTION 5: Firefighting Measures

Extinguishing Media

Suitable Extinguishing Media:

Water mist/fog, carbon dioxide, dry chemical or alcohol resistant foam.

Unsuitable Extinguishing Media:

Do not use water jet.

Specific Hazards During Fire-Fighting:

Thermal decomposition may produce irritating/toxic fumes/gases.

Special Protective Equipment for Firefighters:

Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full-face piece operated in positive pressure mode.

Special precautions:

Avoid contact with skin, eyes, hair and clothing. Do not breathe fumes/gas/mists/aerosols/vapors/dusts.

Move containers from fire area if safe to do so. Use water spray/fog for cooling fire exposed containers.

Avoid unnecessary run-off of extinguishing media which may cause pollution.

SECTION 6: Accidental Release Measures

Personal Precautions, Protective Equipment, and Emergency Procedures:

Evacuate unnecessary personnel. Ventilate area. Extinguish any sources of ignition. Wear recommended personal protective equipment (see Section 8). Avoid contact with skin, eyes and clothing. Avoid breathing mist, vapor, dust, fume and spray. Do not walk through spilled material. Wash thoroughly after handling.

Environmental Precautions:

Prevent further leakage or spillage if safe to do so. Prevent from reaching drains, sewers and waterways. Discharge into the environment must be avoided.

Methods and Material for Containment and Cleaning Up:

Do not touch damaged containers or spilled material unless wearing appropriate personal protective clothing. Stop leak if you can do it without risk. Contain and collect spillage and place in suitable container for future disposal. Dispose of in accordance with all applicable regulations (see Section 13).

Reference to Other Sections:

For personal protective equipment see Section 8. For disposal see Section 13.

SECTION 7: Handling and Storage

Precautions for Safe Handling:

Use appropriate personal protective equipment (see Section 8). Prevent skin contact. Do not get in eyes. Use only with adequate ventilation. Do not add water to the corrosive product. If it is necessary to mix a corrosive product with water, do so slowly adding the corrosive to cold water, in small amounts, and stir frequently. Avoid breathing mist/vapor/spray/dust. Do not eat, drink, smoke, or use personal products when handling chemical substances. Wash affected areas thoroughly after handling. Keep away from incompatible materials (See Section 10). Keep containers tightly closed when not in use. Keep only in original packaging.

Conditions for Safe Storage, Including Any Incompatibilities:

Store in cool, dry, well-ventilated location out of direct sunlight and away from exit paths. Store in a corrosion-resistant container with a resistant inner liner. Inspect containers and storage area regularly for signs of leak and damage. Store containers at a convenient height for handling, below eye level if possible.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 5 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

High shelving increases the risk of dropping containers, personal injury and exposure. Ensure that appropriate fire fighting and spill-clean up equipment is readily available. Keep away from food and beverages. Protect from freezing and physical damage. Store away from heat, open flames and other sources of ignition. Store separately. Keep container tightly sealed. Store away from incompatible materials (See Section 10).

Recommended storage temperature: 16 - 32°C (60 - 90°F)

SECTION 8: Exposure Controls/Personal Protection

Only those substances with limit values have been included below.

Occupational Exposure Limit Values:

Country (Legal Basis)	Substance	Identifier	Permissible concentration
WEEL	(2-hydroxyethoxy) ethan-2-ol	111-46-6	8-Hour TWA: 10 mg/m ³
ACGIH	Zeolites	1318-02-1	8-Hour TWA: 1 mg/m ³ (Aluminum metal and insoluble compounds, respirable fraction)
	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	26401-97-8	8-Hour TWA: 0.1 mg/m ³ (tin, organic compounds, as Sn)
	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	26401-97-8	15-Minute STEL: 0.2 mg/m ³ (tin, organic compounds, as Sn)
	Bound Carbon Black	1333-86-4	8-Hour TWA: 3 mg/m ³ (inhalable particulate matter)
OSHA	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	26401-97-8	8-Hour TWA-PEL: 0.1 mg/m ³ (tin, organic compounds, as Sn)
	Bound Carbon Black	1333-86-4	8-Hour TWA-PEL: 3.5 mg/m ³
NIOSH	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	26401-97-8	REL-TWA: 0.1 mg/m ³ (tin, organic compounds, as Sn [up to 10 hr])
	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	26401-97-8	IDLH: 25 mg/m ³ (tin, organic compounds, as Sn)
	Bound Carbon Black	1333-86-4	IDLH: 1750 mg/m ³
	Bound Carbon Black	1333-86-4	REL-TWA: 0.1 mg/m ³ (in the presence of polycyclic aromatic hydrocarbons [up to 10 hr])
	Bound Carbon Black	1333-86-4	REL-TWA: 3.5 mg/m ³ (up to 10 hr)
United States(California)	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	26401-97-8	8-Hour TWA-PEL: 0.1 mg/m ³ (tin, organic compounds, as Sn)
	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	26401-97-8	15-Minute STEL: 0.2 mg/m ³ (tin, organic compounds, as Sn)
	Bound Carbon Black	1333-86-4	8-Hour TWA-PEL: 3.5 mg/m ³

Biological Limit Values:

No biological exposure limits noted for the ingredient(s).

Information on Monitoring Procedures:

Not determined or not applicable.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 6 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Appropriate Engineering Controls:

Emergency eye wash stations and safety showers should be available in the immediate vicinity of use or handling. Provide adequate ventilation to maintain the airborne concentrations of vapor, mists, and/or dusts below the applicable workplace exposure limits, while observing recognized national standards (or equivalent).

Personal Protection Equipment

Eye and Face Protection:

Use safety glasses with side shields or goggles. Consider the use of a face shield for splash protection. Use eye protection equipment that has been tested and approved by recognized national standards (or equivalent).
Safety glasses or goggles. Use eye protection equipment that has been tested and approved by recognized national standards (or equivalent).

Skin and Body Protection:

Chemical resistant, impervious gloves approved by the appropriate standards. Gloves must be inspected prior to use. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated. Avoid skin contact with used gloves. Appropriate techniques should be used to remove used gloves and contaminated clothing. Full body protection should be worn. Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. Ensure that all personal protective equipment is approved by recognized national standards (or equivalent).

Respiratory Protection:

If engineering controls do not maintain airborne concentrations below the applicable workplace exposure limits, or to an acceptable level (if exposure limits have not been established), a respirator approved by recognized national standards (or equivalent) must be worn.

General Hygienic Measures:

When handling chemical products, do not eat, drink or smoke. Wash hands after handling, before breaks, and at the end of the workday. Avoid contact with skin, eyes and clothing. Wash contaminated clothing before reuse. Perform routine housekeeping.

SECTION 9: Physical and Chemical Properties

Information on Basic Physical and Chemical Properties

Appearance	Black Liquid
Odor	Slight ammonia-like odor
Odor threshold	Not determined or not available.
pH	8-10
Melting point/freezing point	Not determined or not available.
Initial boiling point/range	>200°C (>392°F)
Flash point (closed cup)	>200°C (>392°F)
Evaporation rate	Negligible
Flammability (solid, gas)	Not determined or not available.
Upper flammability/explosive limit	Not determined or not available.
Lower flammability/explosive limit	Not determined or not available.
Vapor pressure	Not determined or not available.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 7 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Vapor density	Not determined or not available.
Density	Not determined or not available.
Relative density	1.00-1.05 @ 25°C (77°F)
Solubilities	Not determined or not available.
Partition coefficient (n-octanol/water)	Not determined or not available.
Auto/Self-ignition temperature	Not determined or not available.
Decomposition temperature	Not determined or not available.
Dynamic viscosity	Not determined or not available.
Kinematic viscosity	Not determined or not available.
Explosive properties	Not determined or not available.
Oxidizing properties	Not determined or not available.

SECTION 10: Stability and Reactivity

Reactivity:

Not reactive under recommended handling and storage conditions.

Chemical Stability:

Stable under recommended handling and storage conditions.

Product is hygroscopic; contamination with moisture will negatively affect product performance. Avoid unintended contact with isocyanates; the reaction will generate heat.

Possibility of Hazardous Reactions:

Hazardous reactions are not anticipated under recommended conditions of handling and storage.

Conditions to Avoid:

Avoid generation of aerosols and mists, extreme heat, open flames, hot surfaces, sparks, ignition sources and incompatible materials.

Incompatible Materials:

Strong oxidizing agents. Water, alcohols, amines, bases, acids, copper, aluminum and zinc alloys.

Hazardous Decomposition Products:

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

In fire conditions, decomposition depends upon temperature, air supply and the presence of other materials.

Can include, but are not limited to carbon and nitrogen oxides, amines, hydrogen cyanide, lower molecular weight organic molecules, aluminum oxides.

SECTION 11: Toxicological Information

Acute Toxicity

Assessment:

Harmful if swallowed.

Product Data: No data available.

Substance Data:

Name	Route	Result
Poly(propylene glycol) bis(2-aminopropyl ether)	oral	LD50 Rat: 2885.3 mg/kg
	dermal	LD50 Rabbit: 2979.7 mg/kg
(2-hydroxyethoxy) ethan-2-ol	dermal	LD50 Rabbit: 13300 mg/kg
	inhalation	LC50 Rat: >4.6 mg/L (4 hr [Aerosol])
	Oral ATE	LD50 Rat: 500 mg/kg

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 8 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Name	Route	Result
Zeolites	inhalation	LC50 Rat: >3.35 mg/L (4 hr [dust])
Oxydipropanol	oral	LD50 Rat: > 5000 mg/kg
	dermal	LD50 Rabbit: > 5010 mg/kg
	inhalation	LC50 Rat: > 2.34 mg/L (4 hr [aerosol])
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	oral	LD50 Rat: 1800 mg/kg
	dermal	LD50 Rat: >2000 mg/kg
Bound Carbon Black	oral	LD50 Rat: > 2000 mg/kg
	dermal	LD50 Rabbit: > 2000 mg/kg
	inhalation	LC50 Rat: >= 4.6 mg/L (4 hr [dust])

Skin Corrosion/Irritation

Assessment:

Causes severe skin burns and eye damage.

Product Data:

No data available.

Substance Data:

Name	Result
Poly(propylene glycol) bis(2-aminopropyl ether)	Causes severe skin burns.

Serious Eye Damage/Irritation

Assessment:

Causes serious eye damage.

Product Data:

No data available.

Substance Data:

Name	Result
Poly(propylene glycol) bis(2-aminopropyl ether)	Causes serious eye damage.
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	Causes serious eye irritation.

Respiratory or Skin Sensitization

Assessment:

May cause an allergic skin reaction.

Product Data:

No data available.

Substance Data:

Name	Result
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	May cause an allergic skin reaction.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 9 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Carcinogenicity

Assessment: Based on available data, the classification criteria are not met.

Product Data: No data available.

Substance Data:

Name	Species	Result
Bound Carbon Black	Not applicable.	The carcinogenic classification only applies to airborne, unbound particles of respirable size.

International Agency for Research on Cancer (IARC):

Name	Classification
Poly(propylene glycol) bis(2-aminopropyl ether)	Not Applicable
(2-hydroxyethoxy) ethan-2-ol	Not Applicable
Zeolites	Group 3
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	Not Applicable
Oxydipropanol	Not Applicable
Bound Carbon Black	Group 2B

National Toxicology Program (NTP):

Name	Classification
(2-hydroxyethoxy) ethan-2-ol	Not Applicable
Zeolites	Not Applicable
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	Not Applicable
Poly(propylene glycol) bis(2-aminopropyl ether)	Not Applicable
Oxydipropanol	Not Applicable
Bound Carbon Black	Not Applicable

OSHA Carcinogens:

Ingredient Name	CAS	OSHA Carcinogens Status
Bound Carbon Black	1333-86-4	Yes

Germ Cell Mutagenicity

Assessment: Based on available data, the classification criteria are not met.

Product Data:

No data available.

Substance Data: No data available.

Reproductive Toxicity

Assessment: Based on available data, the classification criteria are not met.

Product Data:

No data available.

Substance Data: No data available.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 10 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Specific Target Organ Toxicity (Single Exposure)

Assessment: Based on available data, the classification criteria are not met.

Product Data:

No data available.

Substance Data: No data available.

Specific Target Organ Toxicity (Repeated Exposure)

Assessment:

Causes damage to organs through prolonged or repeated exposure.

Product Data:

No data available.

Substance Data:

Name	Result
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	Causes damage to the thymus through prolonged or repeated oral exposure.

Aspiration toxicity

Assessment: Based on available data, the classification criteria are not met.

Product Data:

No data available.

Substance Data: No data available.

Information on Likely Routes of Exposure:

No data available.

Symptoms Related to the Physical, Chemical, and Toxicological Characteristics:

No data available.

Other Information:

No data available.

SECTION 12: Ecological Information

Acute (Short-Term) Toxicity

Assessment: Based on available data, the classification criteria are not met.

Product Data: No data available.

Substance Data:

Name	Result
Poly(propylene glycol) bis(2-aminopropyl ether)	Aquatic Plants EC50 Pseudokirchneriella subcapitata: 15 mg/L (72 hr [growth rate])
	Aquatic Invertebrates EC50 Daphnia magna: 80 mg/L (48 hr [immobilization])
	Fish LC50 Oncorhynchus mykiss: >15 mg/L (96 hr)
(2-hydroxyethoxy) ethan-2-ol	Fish LC50 Pimephales promelas: 75,222 mg/L (96 hr [mortality])
	Aquatic Invertebrates EC50 Daphnia magna: > 100 mg/L (48 hr)
	Aquatic Plants EC50 Raphidocelis subcapitata: > 6500 - < 13000 mg/L (72 hr [growth rate; read-across substance data])

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 11 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Name	Result
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	Fish LC50 Danio rerio: > 24.8 mg/L (96 hr [mortality])
	Aquatic Invertebrates EC50 Daphnia magna: 24.12 mg/L (48 hr [mobility])
	Aquatic Plants EC50 Raphidocelis subcapitata: > 100 mg/L (72 hr [growth rate])
Oxydipropanol	Fish LC50 Pimephales promelas: 46,500 mg/L (96 hr [Read-across substance])
	Aquatic Invertebrates EC50 Daphnia magna: > 100 mg/L (48 hr [mobility])
	Aquatic Plants EC50 Desmodemus subspicatus: > 100 mg/L (72 hr [biomass, growth rate])
Bound Carbon Black	Fish LC50 Danio rerio: > 1000 mg/L (96 hr [mortality])
	Aquatic Plants EC50 Raphidocelis subcapitata: > 100 mg/L (72 hr [growth rate and cell number])
	Aquatic Invertebrates EC50 Daphnia magna: >100 mg/L (48 hr [immobilisation and toxicity])

Chronic (Long-Term) Toxicity

Assessment:

Harmful to aquatic life with long lasting effects.

Product Data: No data available.

Substance Data:

Name	Result
Poly(propylene glycol) bis(2-aminopropyl ether)	Aquatic Plants NOEC Skeletonema costatum: 100 mg/L (72 hr [growth rate])
(2-hydroxyethoxy) ethan-2-ol	Aquatic Plants NOEC Raphidocelis subcapitata: > 100 mg/L (72 hr [growth rate])
	Aquatic Invertebrates NOEC Daphnia magna: 7500 - 15000 mg/L (21 d [growth])

Persistence and Degradability

Product Data: No data available.

Substance Data:

Name	Result
Poly(propylene glycol) bis(2-aminopropyl ether)	The substance is not readily biodegradable. 0% degradation in water, measured by CO2 evolution, after 28 days.
(2-hydroxyethoxy) ethan-2-ol	The substance is readily biodegradable. 102 % degradation in water, measured by DOC removal, after 28 days.
Zeolites	Persistence and degradability studies are not applicable to inorganic substances.
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	The substance is not readily biodegradable. 30 - 40% degradation in water, measured by BOD/THOD, after 28 days.
Oxydipropanol	The substance is readily biodegradable. 64.5% degradation in water, measured by CO2 evolution, after 28 days.
Bound Carbon Black	Persistence assessment based on biodegradability is not relevant for inorganic compounds such as this substance.

Bioaccumulative Potential

Product Data: No data available.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 12 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Substance Data:

Name	Result
Zeolites	Bioaccumulation studies are not applicable to inorganic substances.
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	Substance is not expected to bioaccumulate (BCF: 99 dimensionless).
Poly(propylene glycol) bis(2-aminopropyl ether)	The substance is not expected to bioaccumulate (BCF: 3.16 L/kg, basis, whole body w.w., aquatic specie: fish, QSAR substance data).
(2-hydroxyethoxy) ethan-2-ol	The substance is not expected to bioaccumulate (log Kow= -1.98 at 25 °C).
Oxydipropanol	The substance is not expected to bioaccumulate (BCF= 0.3 - 4.6 & log Pow= -0.462 at 21.7 °C).
Bound Carbon Black	Bioaccumulation assessment using a classic BCF assessment is not considered relevant for inorganic compounds such as this substance.

Mobility in Soil

Product Data: No data available.

Substance Data:

Name	Result
Zeolites	Adsorption to soil and sediment is not expected because the substance is inorganic.
Poly(propylene glycol) bis(2-aminopropyl ether)	The substance is mobile, therefore, there is low potential for adsorption to soil and sediment (Koc: 52.1 L/kg, QSAR substance data).
(2-hydroxyethoxy) ethan-2-ol	Mobility in soil assessment does not need to be conducted due to low octanol water partition coefficient.
Oxydipropanol	The substance is highly mobile therefore, adsorption to soil is not expected (log Koc= 0.78).
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	The substance is immobile, therefore, there is a significant potential for adsorption to soil and sediment (Koc: 1925000000 L/Kg).
Bound Carbon Black	Mobility in soil assessment based on KOC/Kd values are not relevant for inorganic compounds such as this substance.

Results of PBT and vPvB assessment

Product Data:

PBT assessment: This product does not contain any substances that are assessed to be a PBT.

vPvB assessment: This product does not contain any substances that are assessed to be a vPvB.

Substance Data:

PBT assessment:

(2-hydroxyethoxy) ethan-2-ol	The substance is not PBT.
Zeolites	This substance is not PBT.
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	The substance is not PBT.
Poly(propylene glycol) bis(2-aminopropyl ether)	The substance is not PBT.
Oxydipropanol	The substance is not PBT.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 13 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

Bound Carbon Black	PBT assessment does not apply to inorganic compounds such as this substance.
--------------------	--

vPvB assessment:

(2-hydroxyethoxy) ethan-2-ol	The substance is not vPvB.
Zeolites	This substance is not vPvB.
6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	The substance is not vPvB.
Poly(propylene glycol) bis(2-aminopropyl ether)	The substance is not vPvB.
Oxydipropanol	The substance is not vPvB.
Bound Carbon Black	vPvB assessment does not apply to inorganic compounds such as this substance.

Other Adverse Effects: No data available.

SECTION 13: Disposal Considerations

Disposal Methods:

The generation of waste should be avoided or minimized wherever possible. If product becomes a waste, it does not meet criteria of hazardous waste as defined in 40 CFR 261, Subpart C and D. Do not discharge into sewer system. Spill cleanup residues may still be subject to RCRA storage and disposal requirements.

Dispose waste in compliance with local, state and federal regulations via licensed waste disposal contractor.

Contaminated packages:

Even after emptying, container may retain residues. Containers should be completely emptied and safely stored until appropriately reconditioned or disposed through licensed contractor in accordance with government regulation. This material and its container must be disposed of in a safe way.

SECTION 14: Transport Information

United States Transportation of Dangerous Goods (49 CFR DOT)

UN Number	Not regulated
UN Proper Shipping Name	Not regulated
UN Transport Hazard Class(es)	None
Packing Group	None
Environmental Hazards	None
Special Precautions for User	None

International Maritime Dangerous Goods (IMDG)

UN Number	Not regulated
UN Proper Shipping Name	Not regulated
UN Transport Hazard Class(es)	None
Packing Group	None
Environmental Hazards	None
Special Precautions for User	None

International Air Transport Association Dangerous Goods Regulations (IATA-DGR)

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 14 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

UN Number	Not regulated
UN Proper Shipping Name	Not regulated
UN Transport Hazard Class(es)	None
Packing Group	None
Environmental Hazards	None
Special Precautions for User	None

SECTION 15: Regulatory Information

United States Regulations

Inventory Listing (TSCA):

111-46-6	(2-hydroxyethoxy) ethan-2-ol	Listed - Active
1318-02-1	Zeolites	Not Listed
26401-97-8	6-methylheptyl 14-methyl-4,4-dioctyl-7-oxo-8-oxa-3,5-dithia-4-stannapentadecan-1-oate	Listed - Active
9046-10-0	Poly(propylene glycol) bis(2-aminopropyl ether)	Listed - Active
25265-71-8	Oxydipropanol	Listed - Active
1333-86-4	Bound Carbon Black	Listed - Active

Significant New Use Rule (TSCA Section 5): None of the ingredients are listed.

Export Notification under TSCA Section 12(b): None of the ingredients are listed.

SARA Section 302 Extremely Hazardous Substances: None of the ingredients are listed.

SARA Section 313 Toxic Chemicals:

111-46-6	(2-hydroxyethoxy) ethan-2-ol	Listed
----------	------------------------------	--------

CERCLA:

111-46-6	(2-hydroxyethoxy) ethan-2-ol	Listed
----------	------------------------------	--------

RCRA: None of the ingredients are listed.

Section 112(r) of the Clean Air Act (CAA): None of the ingredients are listed.

Massachusetts Right to Know:

1333-86-4	Bound Carbon Black	Listed
-----------	--------------------	--------

New Jersey Right to Know:

1333-86-4	Bound Carbon Black	Listed
-----------	--------------------	--------

New York Right to Know:

25265-71-8	Oxydipropanol	Listed
------------	---------------	--------

Pennsylvania Right to Know:

111-46-6	(2-hydroxyethoxy) ethan-2-ol	Listed
25265-71-8	Oxydipropanol	Listed
1333-86-4	Bound Carbon Black	Listed

California Proposition 65: None of the ingredients are listed.

Additional information: Not determined.

Safety Data Sheet

According to OSHA Hazard Communication Standard, 29 CFR 1910.1200

Initial Preparation Date: 08.01.2006

Page 15 of 15

Revision date: 07.25.2025

HardLine 21-55 Resin Black

SECTION 16: Other Information

Abbreviations and Acronyms: None

Disclaimer:

The data set forth in this sheet are based on information provided by the suppliers of the raw materials and chemicals used in the manufacture of the aforementioned product. Rhino Linings Corporation makes no warranty with respect to the accuracy of the information provided by their suppliers, and disclaims all liability of reliance thereof. Section 14 (Transport Information): Information provided in Section 14 is not intended to convey all specific regulatory or operational requirements/information relating to this product. Transportation classifications may vary by container volume and may be influenced by regional or country variations in regulations. It is the responsibility of the transporting organization to follow all applicable laws, regulations and rules relating to the transportation of the material. Sections 11/12 Disclaimer (Toxicity/Ecotoxicity): This product itself has not been tested. Information given is based on data on the components and the toxicology of similar products.

NFPA: 2-1-0

HMIS: 2*-1-0

Initial Preparation Date: 08.01.2006

Revision date: 07.25.2025

Revision Notes:

Revision Date	Notes
2006-08-01	
2008-12-05	Internal Review
2012-08-07	Internal Review
2016-08-01	Internal Review
2018-08-01	Internal Review
2025-07-25	Internal Review

End of Safety Data Sheet