

SAFETY DATA SHEET

SECTION 1) CHEMICAL PRODUCT AND MANUFACTURER'S IDENTIFICATION

Product Name: ISO-Guard™ ISO-103 Part A
Revision Date: Aug 03, 2023 **Date Printed:** Aug 03, 2023
Version: 1.0 **Supersedes Date:** N.A.
Manufacturer's Name: Res-Tek, Inc.
Address: 110 Riverside Drive SW Cartersville, GA, 30120 United States of America
Emergency Phone: CHEMTREC 24 hr. 1-800-424-9300 / 1 (703) 527-3887 (Collect calls accepted).
Information Phone Number: 1-888-737-8351 / 1-770-427-4034
Product/Recommended Uses: Industrial Flooring Resin

SECTION 2) HAZARDS IDENTIFICATION

Classification

Acute toxicity Inhalation Dust/Mist - Category 4

Respiratory Sensitizer (Solid/Liquid) - Category 1A

Skin Sensitizer - Category 1A

Specific Target Organ Toxicity - Single Exposure (Respiratory Tract Irritation) - Category 3

Safety data sheet prepared in accordance to the United States Occupational Safety and Health Administration (OSHA) Hazard Communication Standard (29 CFR 1910.1200) and the Canadian Workplace Hazardous Materials Information System (WHMIS).

Pictograms



Signal Word

Danger

Hazardous Statements - Health

H332 - Harmful if inhaled

H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled

H317 - May cause an allergic skin reaction

H335 - May cause respiratory irritation

Precautionary Statements - General

P101 - If medical advice is needed, have product container or label at hand.

P102 - Keep out of reach of children.

P103 - Read label before use.

Precautionary Statements - Prevention

P261 - Avoid breathing dust/fume/gas/mist/vapors/spray.

P271 - Use only outdoors or in a well-ventilated area.

P284 - Wear respiratory protection.

P272 - Contaminated work clothing should not be allowed out of the workplace.

P280 - Wear protective gloves, protective clothing, eye protection/face protection.

P233 - Keep container tightly closed.

Precautionary Statements - Response

- P304 + P340 - IF INHALED: Remove person to fresh air and keep comfortable for breathing.
- P312 - Call a POISON CENTER/doctor if you feel unwell.
- P342 + P311 - If experiencing respiratory symptoms: Call a POISON CENTER/doctor.
- P302 + P352 - IF ON SKIN: Wash with plenty of water.
- P333 + P313 - If skin irritation or a rash occurs: Get medical advice/attention.
- P321 - Specific treatment (see First-Aid on this label).
- P362 + P364 - Take off contaminated clothing. And wash it before reuse.

Precautionary Statements - Storage

- P403 + P405 - Store in a well-ventilated place. Store locked up.

Precautionary Statements - Disposal

- P501 - Dispose of contents/container in accordance with local/national/international regulations.

SECTION 3) COMPOSITION/INFORMATION ON INGREDIENTS

CAS	Chemical Name	% By Weight
0028182-81-2	HEXAMETHYLENE DIISOCYANATE POLYMER	80% - 100%
0000822-06-0	HEXAMETHYLENE DIISOCYANATE	0% - 1%

Specific chemical identity and/or exact percentage (concentration) of the composition has been withheld to protect confidentiality.

SECTION 4) FIRST-AID MEASURES

Inhalation

Remove source of exposure or move person to fresh air and keep comfortable for breathing. If breathing is difficult, trained personnel should administer emergency oxygen if advised to do so by the POISON CENTER/doctor. Call a POISON CENTER/doctor if you feel unwell. Take precautions to ensure your own safety (e.g. wear appropriate protective equipment).

Eye Contact

If eye irritation persists: Get medical advice/attention. Avoid direct contact. Wear chemical protective gloves, if necessary. Rinse eyes cautiously with lukewarm, gently flowing water for several minutes, while holding the eyelids open. Remove contact lenses, if present and easy to do. Continue rinsing for a duration of 15-20 minutes. Take care not to rinse contaminated water into the unaffected eye or onto the face.

Skin Contact

Take off contaminated clothing, shoes and leather goods (e.g. watchbands, belts). Wash with plenty of lukewarm, gently flowing water for a duration of 15-20 minutes or until medical aid is available. If skin irritation or a rash occurs: Get medical advice/attention. Wash contaminated clothing before re-use or discard.

Ingestion

Rinse mouth. If exposed/If you feel unwell/If concerned: Get medical advice/attention.

Most important symptoms and effects, both acute and delayed

No data available.

Indication of any immediate medical attention and special treatment needed

Treat according to symptoms (decontamination, vital functions), no known specific antidote. Treatment should be supportive and based on the judgement of the physician in response to the reaction of the patient.

SECTION 5) FIRE-FIGHTING MEASURES

Suitable Extinguishing Media

Small Fire : Dry chemical, foam, carbon dioxide, water-spray or alcohol-resistant foam. Carbon dioxide can displace oxygen. Use caution when applying carbon dioxide in confined spaces. Large Fire : Water spray, fog or alcohol-resistant foam.

Unsuitable Extinguishing Media

Do not use straight stream of water.

Specific Hazards in Case of Fire

Fire will produce irritating and toxic gases.

Fire-fighting Procedures

Isolate immediate hazard area and keep unauthorized personnel out. Stop spill/release if it can be done safely. Move undamaged containers from immediate hazard area if it can be done safely. Cool containers with flooding quantities of water until well after fire is out.

Caution should be exercised when using water or foam as frothing may occur, especially if sprayed into containers of hot, burning liquid. Dispose of fire debris and contaminated extinguishing water in accordance with official regulations. **Special Protective Actions**
Wear protective pressure self-contained breathing apparatus (SCBA) and full turnout gear.

SECTION 6) ACCIDENTAL RELEASE MEASURES

Emergency Procedure

Stay uphill and/or upstream. Ventilate closed spaces before entering. Do not touch damaged containers or spilled materials unless wearing appropriate protective clothing. Evacuate and isolate hazard area and keep unauthorized personnel away.

Recommended Equipment

Breathing protection is required. Wear chemical protective clothing and positive pressure self-contained breathing apparatus (SCBA).

Personal Precautions

Do not breathe vapor or mist. Do not get on skin, eyes or clothing.

Environmental Precautions

Stop spill/release if it can be done safely. Prevent spilled material from entering sewers, storm drains, other unauthorized drainage systems and natural waterways by using sand, earth, or other appropriate barriers.

Methods and Materials for Containment and Cleaning up

Absorb Liquids in vermiculite, dry sand, earth, or similar inert material and deposit in sealed containers for disposal. Ventilate area after clean-up is complete.

SECTION 7) HANDLING AND STORAGE

General

Wash hands after use. Do not breathe vapor or mist. Use good personal hygiene practices. Eating, drinking and smoking in work areas is prohibited. Remove contaminated clothing and protective equipment before entering eating areas. All containers must be properly labelled. Eyewash stations and showers should be available in areas where this material is used and stored Do not get in eyes, on skin, or on clothing.

Ventilation Requirements

Use only with adequate ventilation to control air contaminants to their exposure limits. The use of local ventilation is recommended to control emissions near the source. Report ventilation failures immediately.

Storage Room Requirements

Store in a cool, dry, well ventilated area, away from sources of ignition and incompatibilities. Keep containers securely sealed when not in use. Containers that have been opened must be carefully resealed to prevent leakage. Indoor storage should meet OSHA standards and appropriate fire codes. Empty containers retain residue and may be dangerous.

SECTION 8) EXPOSURE CONTROLS/PERSONAL PROTECTION

Eye protection

Wear eye protection with side shields or goggles. Wear indirect-vent, impact and splash resistant goggles when working with liquids.

Skin Protection

Use of gloves approved to relevant standards made from the following materials may provide suitable chemical protection: PVC, neoprene or nitrile rubber gloves. Suitability and durability of a glove is dependent on usage, e.g. frequency and duration of contact, chemical resistance of glove material, glove thickness, dexterity. Always seek advice from glove suppliers. Contaminated gloves should be replaced. Use of an apron and over-boots of chemically impervious materials such as neoprene or nitrile rubber. Launder soiled clothes or properly disposed of contaminated material, which cannot be decontaminated.

Respiratory protection

If engineering controls do not maintain airborne concentrations to a level which is adequate to protect worker, a respiratory protection program that meets or is equivalent to OSHA 29 CFR 1910.134 should be followed. Check with respiratory protective equipment suppliers.

Appropriate Engineering Controls

Provide exhaust ventilation or other engineering controls to keep the airborne concentrations of vapors below their respective threshold limit value.

Chemical Name	OSHA Tables (Z1, Z2, Z3)	OSHA Carcinogen	OSHA TWA (ppm)	OSHA TWA (mg/m3)	OSHA STEL (ppm)	OSHA STEL (mg/m3)	ACGIH TWA (ppm)	ACGIH TWA (mg/m3)
HEXAMETHYLENE DIISOCYANATE							0.005	
Chemical Name	ACGIH STEL (ppm)	ACGIH STEL (mg/m3)	ACGIH Carcinogen	ACGIH TLV Basis	ACGIH Notations	OSHA Skin designation	CAN_ONsmg	CAN_ONtmg

HEXAMETHYLENE DIISOCYANATE				URT irr; resp sens	BEI			
Chemical Name	CAN_ONsppm	CAN_ONtppm	CAN_QCVEMP ppm - CANADA_QUE BEC VALEUR D'EXPOSITION MOYENNE PONDÉRÉE_ppm	CAN_QCVEMP mg - CANADA_QUE BEC VALEUR D'EXPOSITION MOYENNE PONDÉRÉE_mg	CAN_QCVECD ppm - CANADA_QUE BEC VALEUR D'EXPOSITION DE COURTE DURÉE_ppm	CAN_QCVECD mg - CANADA_QUE BEC VALEUR D'EXPOSITION DE COURTE DURÉE_mg	CAN_ALtppm	CAN_ALtmg
HEXAMETHYLENE DIISOCYANATE	C 0.02	0.005	0.005	0.034			0.005	0.03
Chemical Name	CAN_ALsmg	CAN_AL_Notation	CANtppm	CANtmg	CANsppm	CANsmg	CAN_AL_Carcinogen	CAN_ALsppm
HEXAMETHYLENE DIISOCYANATE			0.005	0.034				
Chemical Name	NIOSH TWA (mg/m3)	NIOSH TWA (ppm)	NIOSH STEL (mg/m3)	NIOSH STEL (ppm)	NIOSH Carcinogen			
HEXAMETHYLENE DIISOCYANATE	0.035	0.005						

BEI - Substances for which there is a Biological Exposure Index or Indices, irr - Irritation, resp - respiratory , sens - sensitization, URT - Upper respiratory tract

SECTION 9) PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Appearance	Liquid
Odor	Typical Solvent
Odor Threshold (ppm)	Not available.
pH (Value)	Not available.
Melting Point (°C) / Freezing Point (°C)	Not available.
Boiling point/boiling range (°C):	Not available.
Flash Point (°C)	Not applicable.
Evaporation Rate	Not available.
Flammability (solid, gas)	Not applicable.
Explosive Limit Ranges	Not available.
Vapour pressure (mmHg)	0.050
Vapour Density (Air=1)	Not available.
Density (g/ml)	1.160 @ 25 °C (9.68 lb/gal).
Specific Gravity	1.160
Solubility (Water)	Not available.
Solubility (Other)	Not available.
Partition Coefficient (n-Octanol/water)	Not available.
Auto Ignition Point (°C)	Not available.
Decomposition Temperature (°C)	Not available.
Dynamic Viscosity (cPs @ 25°C)	Not available.
Explosive properties	Not available.
Oxidizing properties	Not oxidizing.

SECTION 10) STABILITY AND REACTIVITY**Stability**

Stable under normal storage and handling conditions.

Conditions To Avoid

Avoid heat, sparks, flame and contact with incompatible materials

Hazardous Reactions/Polymerization

Will not occur. No data available.

Incompatible Materials

Strong bases, acids, and oxidizing agents.

Hazardous Decomposition Products

Oxides of carbon.

SECTION 11) TOXICOLOGICAL INFORMATION**Acute Toxicity**

Harmful if inhaled

The Acute Toxicity Estimate (ATE) for an oral exposure to this mixture is >5000 mg/kg body weight

The Acute Toxicity Estimate (ATE) for a dermal exposure to this mixture is >5000 mg/kg body weight

The Acute Toxicity Estimate (ATE) for an inhalation (vapour) exposure to this mixture is >20 mg/l

The Acute Toxicity Estimate (ATE) for an inhalation (dust and mist) exposure to this mixture is >5 mg/l

Aspiration Hazard

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

Carcinogenicity

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

Germ Cell Mutagenicity

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

Reproductive Toxicity

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

Respiratory/Skin Sensitization

May cause allergy or asthma symptoms or breathing difficulties if inhaled

May cause an allergic skin reaction

Serious Eye Damage/Irritation

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

Skin Corrosion/Irritation

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

Specific Target Organ Toxicity - Repeated Exposure

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

Specific Target Organ Toxicity - Single Exposure

May cause respiratory irritation

Likely Routes of Exposure

Inhalation, Ingestion, Skin contact, Eye contact

Potential Health Effects - Miscellaneous

0028182-81-2 HEXAMETHYLENE DIISOCYANATE POLYMER

Overexposure may cause asthma-like reactions with shortness of breath, wheezing, cough, which may be permanent; or permanent lung sensitization. This effect may be delayed for several hours after exposure. The following medical conditions may be aggravated by exposure: asthma, skin disorders, respiratory disorders. Potential skin sensitizer that may cause allergic reactions and contact dermatitis resulting in severe irritation, dryness, and cracking of the skin. Skin or eye contact may cause any of the following: irritation.

LC50 (rat): 310-350 mg/m³ (45-51 ppm) (4-hour exposure) (1,2)LC50 (rat): 274 mg/m³ (40 ppm) (1-hour exposure); 137 mg/m³ (20 ppm) (equivalent 4-hour exposure) (2)LC50 (mouse): 30 mg/m³ (4.4 ppm) (2-hour exposure); 21.2 mg/m³ (3.1 ppm)

LD50 (oral, rat): 710 mg/kg (1); 738 mg/kg (2); 960 mg/kg (2)

LD50 (oral, mouse): 350 mg/kg; 1980 mg/kg (2)

LD50 (dermal, rabbit): 570 mg/kg (1); 593 mg/kg (2)

SECTION 12) ECOLOGICAL INFORMATION**Toxicity**

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

Persistence and Degradability

No data available.

Bioaccumulative Potential

No data available.

Mobility in Soil

No data available.

Other Adverse Effects

No data available.

SECTION 13) DISPOSAL CONSIDERATIONS**Waste Disposal**

It is the responsibility of the user of the product to determine at the time of disposal whether the product meets local criteria for hazardous waste. Waste management should be in full compliance with national, state and local laws. Empty Containers retain product residue which may exhibit hazards of material, therefore do not pressurize, cut, glaze, weld or use for any other purposes.

SECTION 14) TRANSPORT INFORMATION

Display Order	U.S. DOT Information	IMDG Information	IATA Information
UN Number	Not Regulated	Not Regulated	Not Regulated
UN proper shipping name	N/A	N/A	N/A
Transport Hazard class(es)	Not Applicable	Not Applicable	Not Applicable
Packing group	Not Applicable	Not Applicable	Not Applicable
Hazardous substance (RQ)	Not Applicable	Not Applicable	Not Applicable
Environmental hazards	No Data Available	No Data Available	No Data Available
Special precautions for user	No Data Available	No Data Available	No Data Available
Transport in bulk according to Annex II of MARPOL and the IBC code	No Data Available	No Data Available	No Data Available

SECTION 15) REGULATORY INFORMATION

CAS	Chemical Name	% By Weight	Regulation List
0028182-81-2	HEXAMETHYLENE DIISOCYANATE POLYMER	80% - 100%	DSL, SARA312, TSCA, Canada_ON_419, , TSCATS - TOXIC SUBSTANCES CONTROL ACT TEST SUBMISSIONS
0000822-06-0	HEXAMETHYLENE DIISOCYANATE	0.10% - 1.00%	SARA313, DSL, CERCLA, SARA312, TSCA, Canada_ON_419, , , MA_RightToKnow - MASSACHUSETTS RIGHT TO KNOW, TSCATS - TOXIC SUBSTANCES CONTROL ACT TEST SUBMISSIONS

Product does not contain any chemicals listed under California Proposition 65

SECTION 16) OTHER INFORMATION

Glossary

ACGIH - American Conference of Governmental Industrial Hygienists; CAS - Chemical Abstracts Service ; Chemtrec - Chemical Transportation Emergency Center; DSL - Domestic Substances List; ESL- Effects screening levels; GHS - "Globally Harmonized System of Classification and Labelling of Chemicals" developed by the United Nations; HMIS - Hazardous Material Information Service; IATA - Dangerous Goods Regulations (DGR) for the air transport (IATA); IMDG - International Maritime Dangerous Goods Code; LC - Lethal Concentration; LD - Lethal Dose; NFPA - National Fire Protection Association; OEL - Occupational Exposure Limits; OSHA- Occupational Safety and Health Administration, US Department of Labor; PEL - Permissible Exposure Limit; SARA 313 - Superfund Amendments and Reauthorization Act, Section 313; SCBA - Self Contained Breathing Apparatus; ppm - parts per million; STEL - Short-term exposure limit; TLV - Threshold Limit Value; TSCA - Toxic Substances Control Act Public Law 94-469; TWA - Time-weighted average; US DOT- US Department of Transportation.

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