

# GenFlex Roofing Systems Material Safety Data Sheet

February 19, 2008

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## SECTION 1: PRODUCT IDENTIFICATION

Product Name:	Pourable Sealer - Part B
Chemical Name / Synonym:	Polymethylene Polyisocyanate
Chemical Family:	Polyisocyanate (Polymeric MDI)
24-Hour Emergency Phone:	(800) 424-9300 CHEMTREC
Manufacturer's Name:	GenFlex Roofing Systems, LLC
Manufacturer's Address:	250 West 96 <sup>th</sup> Street, Indianapolis, IN 46260
NFPA Hazard Rating:	Health 3, Flammability 1, Reactivity 1
HMS Hazard Rating:	Health 3, Flammability 1, Reactivity 1

## SECTION 2: CHEMICAL COMPOSITION

Chemical Name:	Common Name:	CAS #:	% (by wt)	Exposure Limits:
MDI Oligomers	None	9016-87-9	41.7	None Established
Methylene Bisphenyl Isocyanate	MDI	101-68-8	41.7	OSHA CEIL 0.02 ppm TLV 0.005 ppm
Carbon Black	Channel Black	1333-86-4	1.9	PEL 3.5 mg/M <sup>3</sup> TLV 3.5 mg/M <sup>3</sup>
Di-"isodecyl" Phthalate	Diisodecyl Phthalate	26761-40-0	14.7	None Established

## SECTION 3: HAZARD IDENTIFICATION

Primary Route of Exposure:	Inhalation, skin or eye contact, ingestion.
Signs and Symptoms of Exposure:	Eye contact may result in conjunctival irritation and mild corneal opacity. Skin contact may result in irritative or allergic dermatitis. Inhalation of MDI vapors may cause irritation of the mucous membranes of the nose, throat, or trachea, shortness of breath, chest discomfort, difficulty breathing and reduced pulmonary function. Airborne overexposure well above the PEL may result in eye irritation, headache, chemical bronchitis, asthma-like findings or pulmonary edema. Isocyanates have also been reported to cause hypersensitivity pneumonitis, which may be characterized by flu-like symptoms, the onset of which may be delayed. Neurologic effects after exposure to high levels of diisocyanates can include euphoria, anxiety, personality changes, memory deficits, depression or paranoia. Aerosol MDI LC <sub>50</sub> : 490 mg/M <sup>3</sup> , rat; MDI LD <sub>50</sub> : >10,000 mg/kg, rat; diisodecyl phthalate LD <sub>50</sub> : 64 gm/kg, rat
Medical Conditions Aggravated by Exposure:	Individuals who are sensitized to isocyanates and those with pre-existing lung diseases or conditions, including non-specific bronchial hyperactivity or asthma, must avoid all exposure to Isocyanate containing materials.
Chronic Effects:	Acute or chronic overexposure to isocyanates may cause

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sensitization in some individuals, resulting allergic symptoms of the lower respiratory tract (asthma-like), including wheezing, shortness of breath and difficulty breathing. Subsequent reaction may occur at or substantially below the PEL or TLV. Asthma caused by isocyanates, including MDI, may persist in some individuals after removal from exposure and may be irreversible. Some isocyanate sensitized persons may experience asthma reactions upon exposure to non-isocyanate containing dusts or irritants. Cross-sensitization to different isocyanates may occur. Long-term exposure to isocyanates has also been reported to cause lung damage, including reduced lung function, which may be permanent.

Carcinogenicity: Carbon black is an IARC class 2B Carcinogen (*possibly carcinogenic to humans: limited evidence in humans in the absence of sufficient evidence in experimental animals*).

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### SECTION 4: FIRST AID MEASURES

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First Aid Procedures: For eyes, flush immediately with gentle stream of water for at least 15 minutes, preferably at eye wash fountain For skin contact, clean with rubbing alcohol, followed immediately by washing affected area thoroughly with soap and water. Remove contaminated clothing and wash prior to reuse. For inhalation, remove to fresh uncontaminated air. Keep person warm and give oxygen if breathing is labored and artificial respiration if breathing has stopped. Get medical attention immediately. In case of accidental ingestion, do not induce vomiting. Get medical attention and advise the physician of the nature of the material. The mixture of parts A and B must be immediately removed from the skin using acetone.

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### SECTION 5: FIRE FIGHTING PROCEDURES

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Suitable Extinguishing Media: Foam, CO<sub>2</sub> or dry chemical.

Hazardous Combustion Products: Carbon dioxide, carbon monoxide, hydrogen cyanide, oxides of sulfur and oxides of nitrogen.

Recommended Fire Fighting Procedures: Wear impermeable protective clothing and self-contained breathing apparatus. Toxic fumes and vapors may be evolved.

Unusual Fire and Explosion Hazards: Water reacts vigorously with this material.

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### SECTION 6: PRECAUTIONS FOR SAFE HANDLING AND USE

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Steps to Be Taken in Case Material is Released or Spilled: Ventilate spill area. Absorb on inert material. Shovel in secure containers for proper disposal.

Precautions to Be Taken in Handling and Storing: Keep containers tightly closed and store in a dry, well-ventilated area at 60-80°F. Avoid moisture, as it may react with product. Contamination by moisture or basic compounds can cause dangerous pressure buildup in closed containers.

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### SECTION 7: EXPOSURE CONTROLS / PERSONAL PROTECTION

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Ventilation:	Use in a well-ventilated location.
Respiratory Protection:	Use NIOSH approved chemical cartridge respirator for organic vapors if exposure might exceed the PEL or TLV.
Eye Protection:	The use of safety glasses with side shields when handling this product may be warranted.
Skin Protection:	The use of natural or nitrile rubber gloves for direct handling of this product may be warranted.
Other:	Wear appropriate protective clothing to avoid skin contact during spill cleanup. Clean or dispose of contaminated equipment and clothing after each use.
Work / Hygienic Practices:	Wash exposed skin prior to eating, drinking or smoking and at the end of each shift. Wash contaminated clothing prior to reuse.

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### SECTION 8: PHYSICAL AND CHEMICAL PROPERTIES

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Appearance and Odor:	Viscous black paste, characteristic odor.		
Flash Point:	272°F	Lower Explosive Limit:	Not Determined
Method Used:	COC	Upper Explosive Limit:	Not Determined
Evaporation Rate:	Unknown	Boiling Point:	374°F
pH (undiluted product):	Unknown	Melting Point:	Not Applicable
Solubility in Water:	Insoluble	Specific Gravity:	1.2(Water=1)
Vapor Density:	Unknown	Percent Volatile:	Unknown
Vapor Pressure:	0 mm Hg @ 20°C		

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### SECTION 9: STABILITY AND REACTIVITY

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Thermal Stability:	Stable
Hazardous Polymerization:	Will occur
Conditions to Avoid:	Avoid contamination with moisture, alcohol, ammonia, amines, and alkalis that react with Isocyanates. Reaction with water may form CO <sub>2</sub> .

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### SECTION 10: TRANSPORTATION

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Regulatory Agency:	Not Regulated
Proper Shipping Name:	Not Applicable
Hazard Classification:	Not Applicable
Identification Number:	Not Applicable
Labels Required:	Not Applicable
Other Requirements:	Not Applicable

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## SECTION 11: MISCELLANEOUS INFORMATION

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Additional Comments:	None
Date of Previous MSDS:	August 5, 1998
Changes Since Previous MSDS:	Company name and address change in section 1; chemical composition in section 2; toxicological information in section 3; precautions for safe handling in section 6; physical and chemical properties in section 8; conditions to avoid in section 9; overall formatting change.
Telephone Number for Additional Information:	(317) 575-7190

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## DISCLAIMER

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