

QUANTUM CHEMICAL CORPORATION

USI Division

MATERIAL SAFETY DATA SHEET

PETROTHENE (TM)

MSDS NO. NA117000

DATE 10/10/89

EMERGENCY NUMBERS:

Quantum (713) 479-2873

CHEMTREC (800) 424-9300

GENERAL INFORMATION:

Quantum (513) 530-6917

SECTION I - IDENTIFICATION

PRODUCT: Petrothene (TM) NA 117-000

SYNONYMS: Low Density Polyethylene; LDPE pellets

FORMULA:  $CH_3-(CH_2)_n-CH_3$

CHEMICAL FAMILY: Polyolefin

CAS RN: 9002-88-4

SECTION II - INGREDIENTS

COMPOSITION	NOMINAL %	PEL/TLV	HAZARD
Polyethylene	100	None	None noted

SECTION III - HEALTH INFORMATION

INHALATION: Nuisance dust can be caused by handling and some operations. Fumes may be generated in operations using heated polyethylene.

INGESTION: Acute oral doses of 7.95 g/kg fed to rats showed no evidence of adverse effects. Dietary levels of 1.25, 2.5, or 5 percent polyethylene for 90 days produced no adverse effects in rats.

EYE CONTACT: Not Determined

SKIN CONTACT: The pellets can be abrasive. Molten or heated material can cause serious burns to unprotected skin.

SECTION IV - OCCUPATIONAL EXPOSURE LIMITS

PEL (OSHA Permissible Exposure Limit): For nuisance dust. 15 mg/m<sup>3</sup> for total dust and 5 mg/m<sup>3</sup> for respirable dust.

TLV/TWA (ACGIH Threshold Limit Value/Time-Weighted Average): For nuisance particulates. 10 mg/m<sup>3</sup> for total dust.

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SECTION VIII - REACTIVITY

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STABILITY: Generally stable

HAZARDOUS POLYMERIZATION: Not likely

CONDITIONS & MATERIALS TO AVOID: May burn or react violently with fluorine/oxygen mixtures with 50 to 100% fluorine. Maybe decomposed by strong oxidizing agents such as nitric and sulfuric acids, halogens and chlorinating agents.

HAZARDOUS DECOMPOSITION PRODUCTS: Thermal decomposition products may include C, CO, CO<sub>2</sub>, H<sub>2</sub>O, acrolein, formaldehyde and other organic vapors.

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SECTION IX - EMPLOYEE PROTECTION

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CONTROL MEASURES: Handle in the presence of adequate ventilation. Provide adequate mechanical ventilation at the points of extrusion where polyethylene is at elevated temperatures coming from extruder into dies, mold, etc.

RESPIRATORY PROTECTION: Where exposure to nuisance dust can exceed acceptable criteria, use NIOSH/MSHA approved respiratory protection equipment. Respirators should be selected based on the form and concentration of contaminant in air in accordance with OSHA 29CFR 1910.134.

PROTECTIVE CLOTHING: Wear heat protective gloves and clothing if there is potential for contact with heated material.

EYE PROTECTION: Wear safety glasses meeting the specifications of ANSI Standard Z87.1

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SECTION X - ENVIRONMENTAL PROTECTION

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ENVIRONMENTAL PRECAUTIONS: Avoid uncontrolled releases of this material. Where spills are possible, a comprehensive spill release response plan should be developed and implemented. If material enters a water course or sewer, advise proper authorities of possible floating polymer.

SPILL OR LEAK PROCEDURES: Use good housekeeping practices since spilled pellets may be a slipping hazard. Wear appropriate respiratory protection and protective clothing as described in Section IX. Contain spilled material. Transfer to secure containers. In the event of an uncontrolled release of this material, the user should determine if the release is reportable under applicable laws and regulations.

WASTE DISPOSAL: All recovered material should be packaged, labeled, transported and disposed or reclaimed in conformance with applicable laws and regulations and in conformance with good engineering practices. Reclaim where possible.