

Heating Oil Plus dI2

A Product of Advanced Fuel Solutions, Inc.



Material Safety Data Sheet

1 Company Identification

Advanced Fuel Solutions
P.O. Box 291
Lynnfield, MA 01940

Product information 1-978-664-5923
In Case of Emergency
Call Chemtrec 1-800-424-9300

2 Composition / Ingredient Information

<u>Material</u>	<u>CAS Number</u>	<u>%</u>
Proprietary	<10
Light Ends of Polyethylbenzene Residue	178535-25-6	>90
*(Triethylbenzene)	102-25-0	(<20)
*(Naphthalene)	91-20-3	(<2)

*Disclosure as a toxic chemical is required under Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR part 372.

3 Hazardous Identification

Potential Health Effects

Eye contact with the product ingredients may cause eye irritation with discomfort, tearing, or blurring of vision. Direct exposure may cause skin irritation (redness, swelling). A single prolonged exposure may result in the material being absorbed through the skin in harmful amounts.

In general, overexposure to high atmospheric concentrations of alkyl-substituted aromatics may produce central nervous system depression, headache, dizziness, incoordination, nausea and loss of appetite. Aspiration (liquid enters the lung), may cause lung damage due to chemical pneumonia, a condition caused by petroleum-like solvents.

Minute amounts of petroleum hydrocarbons aspirated into the lungs during ingestion or vomiting may cause mild to severe pulmonary injury and possible death.

Individuals with preexisting diseases of the kidneys or liver may have increased susceptibility to the toxicity of excessive exposures.

Carcinogenicity Information

Naphthalene has been classified by the International Agency for Research on Cancer (IARC) as possibly carcinogenic to humans (Group 2B). This IARC classification was based upon limited evidence of carcinogenicity to animals and inadequate evidence of carcinogenicity to humans.

4 First Aid Measures

Inhalation

If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Call a physician.

Skin Contact

Flush skin with water after contact. Wash contaminated clothing before reuse.

Eye Contact

In case of contact immediately, flush eyes with plenty of water for at least 15 minutes. Call a physician.

Ingestion

If swallowed, do not induce vomiting. Allow victim to rinse his mouth and then to drink 2-4 cupfuls of water. Never give anything by mouth to an unconscious person. Call a physician.

Notes to Physicians

Activated charcoal mixture may be administered. To prepare activated charcoal mixture, suspend 50 grams activated charcoal in 400-ml water and mix thoroughly. Administer 5 ml/kg or 350 ml for an average adult.

Because of the danger of aspiration, emesis or gastric lavage should not be employed unless the risk is justified by the presence of additional toxic substances. Activated charcoal may induce vomiting, but may be given after emesis or lavage to absorb toxic additives. Steroid therapy in mild to moderate cases does not improve outcome. Bacterial pneumonia often occurs after exposure, but prophylactic antibiotics are not indicated and should be reserved for documented bacterial pneumonia.

5 Fire Fighting Measures

Flammable Properties

Flash Point..... 173°F (78°C)

Method..... PMCC

Extinguishing Media

Water Spray, Foam, Dry Chemical, CO₂.

Fire Fighting Instructions

Wear self-contained breathing apparatus. Wear full protective equipment.

6 Accidental Release Measures

Note: Review FIRE FIGHTING MEASURES and HANDLING (PERSONNEL) SECTIONS before proceeding with clean up. Use appropriate PERSONAL PROTECTIVE EQUIPMENT during clean up. Soak up with sawdust, sand, oil dry or other absorbent material. Remove source of heat, sparks, flame, impact, friction, or electricity. Dike spill. Prevent material from entering sewers, waterways, or low areas.

Spill Clean-Up

Soak up with sawdust, sand, oil dry or other absorbent material.

Accidental Release Measures

Spills are very slippery and should be cleaned up promptly.

7 Handling and Storage

Handling (Personnel)

Avoid breathing vapors or mist. Avoid contact with eyes, skin, or clothing. Wash thoroughly after handling.

Handling (Physical Aspects)

Keep away from heat, sparks and flames.

Storage

Store in a well-ventilated place. Keep container tightly closed. Store in accordance with National Fire Protection Association recommendations.

8 Exposure Controls

Engineering Controls

Use only with adequate ventilation. Keep container tightly closed.

Personal Protective Equipment

Eye/Face Protection

Wear coverall chemical splash goggles or safety glasses.

Respirators

Where there is potential for airborne exposures in excess of applicable limits, wear NIOSH/MSHA approved respiratory protection.

Protective Clothing

Where there is potential for skin contact have available and wear as appropriate impervious gloves, apron, pants, hood and jacket.

Exposure Limits

Naphthalene:

PEL (OSHA).....	10 ppm, 50 mg/m ³ , 8 hr. TWA
TLV (ACGIH).....	10 ppm, 52 mg/m ³ , 8 hr TWA, Skin; A4 STEL 15 ppm, 79 mg/m ³ , A4

The "skin" notation following the exposure guideline refers to the potential for dermal absorption of the material. It is intended to alert the reader that inhalation may not be the only route of exposure and that measures to minimize dermal exposure should be considered

9 Physical and Chemical Properties

Physical Data

Appearance..... Clear Amber
Form..... Liquid
Odor Aromatic
Specific Gravity 0.894 @ 60/60°F (16/16°C)
Density 7.44 lbs./gal. @ 60°F (16°C)
Solubility in water nil

10 Stability and Reactivity

Chemical Stability

Stable at normal temperatures and storage conditions.

Incompatibility

Incompatible with strong oxidizers.

Decomposition

Decomposes with heat. Hazardous decomposition products include oxides of carbon.

Polymerization

Will not occur.

11 Toxicological Information

Animal Data

Naphthalene:

Inhalation 15 minute LC50: >0.34 mg/L in rats
Skin Absorption LD50: 10,000 mg/kg in rabbits
Oral LD50:..... 1,780 mg/kg in rats

The toxicological effects of this material have not been investigated but are expected to be similar to petroleum based naphtha or kerosene.

12 Ecological Information

The ecological effects of this material have not been investigated but are expected to be similar to petroleum based naphtha or kerosene.

16 Other Information

NPCA-HMIS Rating

Health..... 2* (Chronic Health Effects)
Flammability..... 2
Reactivity 0

Personal Protection rating to be supplied by user depending on use conditions

The data in this Material Safety Data Sheet relates only to the specific material designated herein and does not relate to use in combination with any other material or in any process.

Responsibility for MSDS:

**MSDS Coordinator
Advanced Fuel Solutions
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1-978-664-5923**