

ECLIPSE® d-LIMONENE DEGREASER

An extra-strength, all-purpose degreaser designed to remove the toughest grease build-up

FEATURES

- Concentrated for economical use
- Quickly removes grease build-up
- Phosphate free formula
- Fortified with natural citrus solvents - no petroleum solvents
- Effective on most washable surfaces



RECOMMENDED SURFACES

All washable surfaces

PRODUCT DATA

Description:	Non-phosphate, heavy duty degreaser
Appearance:	Clear, orange liquid
Fragrance:	Orange
Viscosity:	< 5 centipoise @ 68°F (20°C)
pH (undiluted):	12.9 ± 0.5 ASTM E70-97
pH @ 1:32:	10.9 ± 0.5 ASTM E70-97
Flash Point:	>200°F
Shelf Life:	2 years, ASTM D1791-93 (1998)
Density:	8.9 lb per gal @ 68°F 1.07 kg per liter @ 20°C
Freeze/Thaw:	Passes 3 cycles ASTM D3209-93 (1998)

PRECAUTIONS

Keep out of reach of children. Keep container sealed when not in use. Avoid freezing. If frozen, allow to return to room temperature slowly and mix thoroughly before using.

ORDERING INFORMATION

Product #314MP: 4 x 1.06 gallon per case (4 x 4 liter)

DIRECTIONS FOR USE: GENERAL DEGREASING

1. Mix Eclipse d-Limonene Degreaser with water according to the following dilution:

Light Degreasing

1:64 2 US oz per gal water (80 ml per 5 liters water)

Medium Degreasing

1:32 4 US oz per gal water (160 ml per 5 liters water)

Heavy Degreasing

1:16 8 US oz per gal water (320 ml per 5 liters water)

2. Apply to surface. Allow a contact time of 5 minutes.
3. Rinse with clean water or wipe with clean mop or sponge.

DIRECTIONS FOR USE: DEEP SCRUB CLEANING OF FLOOR

1. Dust mop floor using a mop treated with EnviroStar Green® Dust Mop Treatment or an untreated dust mop.
2. Mix Eclipse d-Limonene Degreaser with water according to the following dilution:

Moderate Soiling

1:32 4 US oz per gal water (160 ml per 5 liters water)

Heavy Soiling

1:16 8 US oz per gal water (320 ml per 5 liters water)
3. Apply to surface. Allow a contact time of 5 minutes.
4. Scrub floor with an autoscrubber or low speed floor machine using the appropriate scrubbing pad.
5. Pick up the cleaning residue with the autoscrubber or wet vac and rinse the floor twice with clean, cold water. Allow to dry.
6. Re-coat the floor with the recommended Pioneer Eclipse floor coating as desired.

Pioneer Eclipse®

ECLIPSE d-LIMONENE DEGREASER

LAST REVISION DATE: 02/23/06
MANUFACTURER: Pioneer Eclipse® Corporation
 Sparta, NC 28675 Phone: 1-336-372-8080.
FOR CHEMICAL EMERGENCY: Spill, Leak, Fire,
 Exposure or Accident **CALL CHEMTREC - Day or
 Night at 1-800-424-9300** Toll Free in the
 Continental US **483-7616** in DISTRICT OF
 COLUMBIA. For calls originating outside the US:
 Call Collect **1-202-483-7616** Washington, DC.

SECTION IV: FIRE AND EXPLOSION DATA

FLASH POINT: > 200°F
EXPLOSIVE LIMITS:
 LOWER: N/A UPPER: N/A
EXTINGUISHING MEDIA: Water spray, CO₂, dry
 chemical, alcohol-type or universal-type foams.
SPECIAL FIRE FIGHTING PROCEDURES: None
HAZARDOUS COMBUSTIBLE PRODUCTS: N/A
UNUSUAL FIRE AND EXPLOSION HAZARDS: N/A

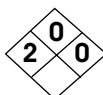
SECTION VIII: SPECIAL PROTECTION

EYE PROTECTION: Chemical splash goggles
 (ANSI Z87.1-1989 or approved equivalent)
RESPIRATORY PROTECTION: None required
 when permissible airborne concentrations are
 not exceeded. In emergency, use approved
 positive pressure self-contained breathing device.
VENTILATION: Mechanical local exhaust
 ventilation at point of contamination release
OTHER PROTECTIVE EQUIPMENT: As required
 by employer code. Rubber boots and chemical
 resistant gloves recommended.

SECTION I: GENERAL INFORMATION

PRODUCT NAME: Eclipse® d-Limonene Degreaser
PRODUCT #: 314
PRODUCT TYPE: Non-phosphate heavy-duty degreaser
PRECAUTIONS: Corrosive to skin and eyes. Keep
 container sealed when not in use. Keep out of
 reach of children.
HEALTH: 2
FLAMMABILITY: 0
REACTIVITY: 0
NFPA HAZARD RATINGS

4-EXTREME 3-HIGH 2-MODERATE
 1-SLIGHT 0-INSIGNIFICANT



SECTION V: REACTIVITY DATA

STABILITY: Stable
HAZARDOUS POLYMERIZATION: Will not occur
INCOMPATIBILITY (MATERIALS TO AVOID):
 Strong acids and oxidizing agents may produce
 carbon monoxide, carbon dioxide, and
 nitrogen oxides.
HAZARDOUS DECOMPOSITION PRODUCTS: N/A
REACTIVITY CONDITIONS: None

SECTION IX: SPECIAL PRECAUTIONS

HANDLING AND STORAGE: Storage temperature
 (MAX. 60°C / 140°F) (MIN. 1°C / 34°F)
OTHER PRECAUTIONS: Avoid freezing. If frozen,
 allow to return to room temperature slowly. Mix
 thoroughly before using.

SECTION II: HAZARDOUS INGREDIENTS

INGREDIENT: Sodium metasilicate
CAS#: 6834-92-0
%: 5-10
OSHA PEL: N/L
ACGIH TLV: N/L
LD₅₀ SPECIES & ROUTE: 1300 mg/kg, oral rat

N/E = Not Established, N/L - Not Listed
 N/A = Not Applicable

SECTION III: PHYSICAL/CHEMICAL DATA

APPEARANCE: Clear orange liquid
PHYSICAL STATE: Liquid
pH: 12.9 ± 0.5
BOILING POINT: 100°C / 212°F
EVAPORATION RATE: Less than water
FREEZING POINT: -3°C / 30°F
VAPOR DENSITY: More than air
% VOLATILE BY WEIGHT: 85-90%
VAPOR PRESSURE: Less than water
DENSITY: 8.9 lb per gal @ 68°F
 1.07 kg per liter @ 20°C
SOLUBILITY IN WATER: Miscible in all proportions

SECTION VI: HEALTH HAZARD DATA

EYES: May cause severe burns or possible
 corneal damage. For eye contact, flush with a
 large amount of water for at least 15 minutes.
 See a physician immediately.
SKIN: Irritation, reddening or possible damage
 upon repeated or prolonged contact. For skin
 contact, wash affected areas with soap and
 water. Seek medical attention if irritation persists.
INHALATION: Vapor or mist can cause headache,
 nausea and irritation of the eyes, nose, throat and
 lungs. For overexposure, move subject to fresh
 air. Seek medical attention if symptoms persist.
INGESTION: May cause nausea, abdominal
 discomfort, vomiting, diarrhea. If ingested, give
 two glasses of water or milk and do not induce
 vomiting. Remove by endotracheal intervention.
 Seek medical attention immediately.
**CHRONIC EFFECTS AND MEDICAL CONDITIONS
 AGGRAVATED BY OVEREXPOSURE:** Main hazard
 is due to product's severe irritant properties.
 Treatment should be directed at the control of
 symptoms and the clinical condition of
 the patient.
CARCINOGEN: Non-carcinogenic
REPRODUCTIVE EFFECTS: N/E
TERATOGENICITY: N/E
MUTAGENICITY: N/E
THRESHOLD LIMIT VALUE: See Section II.

SECTION VII: SPILL, LEAK & DISPOSAL PROCEDURES

SMALL SPILLS: Absorb spill with inert material
 (e.g. sand, earth) and dispose of as waste
 material in accordance with local, state, and
 federal law or flush with large amounts
 of water.
LARGE SPILLS: Keep spectators away. Floors may
 be slippery; use care to avoid falling. Dike and
 contain spill with inert material (e.g. sand, earth).
 Transfer liquid to containers for recovery or
 disposal and solid diking material to separate
 containers for disposal. Keep spills and cleaning
 runoff out of sewers and open bodies of water.
WASTE DISPOSAL: Dispose of as waste
 material in accordance with local, state,
 and federal regulations.

SECTION X: ADDITIONAL INFORMATION

Neither this data sheet nor any statement
 contained herein grants or extends any license,
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 information.

This MSDS has been provided to you in accordance with
 the OSHA HAZARD COMMUNICATION STANDARD
 (29CFR1910.1200).

***IMPORTANT SAFETY INFORMATION
 DO NOT DISCARD***
 PLEASE ROUTE TO COMPANY SAFETY OFFICER

Pioneer Eclipse®