

TRICARD

TRIANGLE CHEMICAL COMPANY – P.O. BOX 4528, MACON, GEORGIA 31213
CARDINAL CHEMICALS, INC. – KINSTON, NC

IN CASE OF EMERGENCY, CALL CHEMTREC
UNITED STATES: 1-800-424-9300
INTERNATIONAL: 1-202-483-7616

MATERIAL SAFETY DATA

1. PRODUCT IDENTIFICATION

PRODUCT NAME:	COBLEND ES
SYNONYMS:	NA
CHEMICAL FAMILY:	Aliphatic Phosphate Ester Blend
GENERIC DESCRIPTION:	Compatibility Agent
MOLECULAR WEIGHT:	NA

2. HAZARDOUS INGREDIENTS

COMPONENT	CAS. NO.	WT %	EXPOSURE LIMITS
Phosphoric Acid	7664-38-2	<1	1mg/m ³

Maximum of 1 ppm Ethylene Oxide (EO) (75-21-8) May be present in the product.
The OSHA PEL and ACGIH TLV for EO is 1 ppm.

3. EFFECTS OF OVEREXPOSURE

EYE:	Irritation can occur causing redness or swelling.
SKIN:	Toxic by skin absorption.
INHALATION:	Toxic by prolonged inhalation.
ORAL:	Toxic by ingestion, acute effects are visual impairment, convulsions, headaches, and dizziness.

The above listed potential effects of overexposure are based on actual data, results of studies performed upon similar compositions, component data and/or expert review of the product. Overexposure to any chemical may result in enhancement of pre-existing adverse medical condition and allergic reactions.

4. EMERGENCY FIRST AID

Call a poison control center or doctor immediately for treatment advice.

IF SWALLOWED:	Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by a poison control center or doctor. Do not give anything by mouth to an unconscious person.
IF ON SKIN OR CLOTHING:	Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes.
IF INHALED:	Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth to mouth if possible.
IF IN EYES:	Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses if present, after the first 5 minutes, then continue rinsing eye. Have the product container with you when calling a poison control center or doctor, or going for treatment.

5. REACTIVITY DATA

STABILITY:	Stable
CONDITIONS TO AVOID:	Excessive heat and open flames.
POLYMERIZATION:	Will not occur.
INCOMPATIBILITY:	Oxidizers and strong acids.
DECOMPOSITION:	Carbon and Phosphorous Oxides.

6. PHYSICAL PROPERTIES

APPEARANCE AND ODOR:	Amber to gold, mild odor
BOILING POINT:	NA
MELTING POINT:	NA
VAPOR PRESSURE (mmg of Hg):	NA
SPECIFIC GRAVITY:	1.12 (+/- .05)
VAPOR DENSITY (AIR=1):	NA
% VOLATILE (BY WGT.%):	>1
EVAPORATION RATE (Butyl A.)r=1):	NA
SOLUBILITY IN WATER:	Soluble

7. NFPA HAZARD RATING (National Fire Protection Association)

Flammability	Health:	Intense or continued exposure could cause temporary incapacitation or possible residual injury unless prompt medical attention is given.
2		
Health 2	0 Instability	
—	Flammability:	Must be moderately heated or exposed to relatively high temperature before ignition can occur.
Special Hazard	Instability:	Normally stable, even under fire exposure conditions, and are not reactive with water.

8. FIRE AND EXPLOSION HAZARD INFORMATION

FLASHPOINT:	149° F (Pensky-Martens closed cup ASTM D93)
FLAMMABLE LIMITS:	Not Available
EXTINGUISHING MEDIA:	Foam, Dry Chemical, C02
FIRE FIGHTING:	Use alcohol-type or universal-type foams on larger fires. Smaller fires should be extinguished with carbon dioxide or dry chemical. Do not use water or foam directly on the fire. Use self-contained breathing apparatus with fighting any fire in an enclosed area.
UNUSUAL FIRE HAZARD:	May be ignited by heat, sparks, or flames. Vapors may travel to a source of ignition and flash back. Containers may explode in heat of fire.

9. SPECIAL PRECAUTIONS

HANDLING AND STORAGE:	Keep out of reach of children. Store in cool dry place. Keep in original container tightly closed. Do not reuse empty container.
OTHER PRECAUTIONS:	Do not store with food, feed, or other material to be used or consumed by humans or animals. Do not contaminate water supplies. Do not store with materials labeled "Oxidizers" or oxidizing agents.

10. SPECIAL PROTECTION INFORMATION

RESPIRATORY PROTECTION:	None required for normal use.
VENTILATION:	Normal room ventilation (mechanical) should be satisfactory.
PROTECTIVE GLOVES:	Impervious.
EYE PROTECTION:	Wear goggles or a face shield.
OTHER PROTECTION:	Full body protective suit, eye wash and safety shower.

11. SPILL OR LEAK PROCEDURES

SPILLS OR RELEASES:	Material should be collected and disposed in proper manner. Avoid discharge to natural waters as concentrated material is highly toxic to fish. Wear suitable protective equipment.
WASTE DISPOSAL:	Do not contaminate water, food or feed by storage or disposal. Dispose of in an approved waste disposal facility in accordance with all Federal, State and Local Regulations.
CONTAINER DISPOSAL:	Triple rinse (or equivalent) adding rinse water to application tank. Offer container for recycling or dispose of in a sanitary landfill or by other procedures approved by local regulations.

12. REGULATORY INFORMATION

COMPOUNDS WHICH REQUIRE REPORTING UNDER SARA TITLE III

Sara regulated compounds	% Wt.	CAS NO.
Phosphoric Acid	<1	7664-38-2

13. OTHER INFORMATION

WARNING! This product contains a detectable amount of ethylene oxide, which is known to the State of California to cause cancer and/or reproductive toxicity. Ethoxylated products may contain residual amounts of ethylene oxide (EO) which can accumulate in the container headspace and be released into the ambient environment. This process is enhanced when the product is agitated, as during tank car loading and unloading, and blending operations. Ethylene oxide causes tumors in laboratory animals. The Occupational Safety and Health Administration (OSHA) Permissible Exposure Level (PEL) for EO is 1 ppm for an eight-hour time weighted average exposure. The standard regulates occupational exposure to EO from all sources, including products containing residual EO. It is the responsibility of the employer to comply with OSHA ethylene oxide standard (29) CFR 1910.1047).

The recommendation for safe handling and protection procedures are believed to be generally suitable for the standard uses of this compound. However, each user should identify his intended uses of this material and determine whether they are appropriate. All data included in this document is released as typical values and should not be utilized to determine the suitability of this material for a particular use or purpose. No warranty, either expressed or implied, is hereby made, nor do we give permission, inducement, or recommendations to practice any patented invention without a license. All data is offered for consideration, investigation and verification purposes only.