



Environmental Report Card

- ✓ VOC compliant
- ✓ Non-carcinogenic
- ✓ Solventless
- ✓ Biodegradable

CRETE-LEASE® Bio-Tru-Xtra Release Agent Specification Sheet

1. PRODUCT NAME

Crete-Lease Bio-Tru-Xtra Release Agent

2. MANUFACTURER

Cresset Chemical Co., Inc.
 One Cresset Center
 Weston, Ohio 43569
800-367-2020 USA & Canada
 419-669-2041
 (FAX) 419-669-2200
 www.cresset.com
 cresset@cresset.com

3. PRODUCT DESCRIPTION

Basic Use: Crete-Lease Bio-Tru-Xtra permits easy stain-free removal of forms, formliners, pallets, etc. from hardened concrete. It:

- Is a soy based product
- Sprays from 20° to 120°F
- No Haz-Mat requirement for product, driver or truck
- Meets biodegradability regulations
- Cuts form clean-up time up to 70% when properly applied
- Can reduce bugholes on concrete surfaces
- Doesn't interfere with adhesion of caulk, architectural coatings, paint, sealers and curing compounds on cured concrete surfaces when properly applied
- Reduces incidences of skin rashes to an absolute minimum

Limitations: a. Not recommended for forms or formliners made from expanded polystyrene, SBR, or natural rubber or latexes made of these. Use Crete-Lease 20 for expanded polystyrene.

b. Although subfreezing temperatures have no effect on the releasing action of Crete-Lease Bio-Tru-Xtra, temperatures below freezing promote film thicknesses which do cause more bugholes.

Ground Shipping in the USA: Containers holding 55 gallons or 5 gallons or less (regardless of quantity) are not federally regulated and shipping product in the Cresset package does not require following hazardous shipping requirements.

TABLE OF PROPERTIES

Color	Straw
Opacity	Clear
Freeze Temperature	-7°F (-22°C)
Freeze Damage	None
Flash Point	210°F
Viscosity (centipoises)	13 @ 68°F (20°C)
Solids	None
Pounds per gallon	7.14
VOC	80 g/L

Composition: A proprietary blend of vegetable oils in mineral oil. Contains no waxes, no silicones...no carcinogens.

Applicable Standards: Crete-Lease Bio-Tru-Xtra Release Agent meets U.S. Army, Corps of Engineers CE-204, Section 7.10 and CE 1401.01, Section 17.4.

4. TECHNICAL DATA

Please see Tables.

5. APPLICATION

Preparatory Work: Form surfaces should be clean, dry, and free from contaminants. Apply Crete-Lease just minutes before concrete is placed or up to 14 days before if treated surface is protected.

Methods: Your choice of application methods will determine the final appearance of the concrete. Use Release Method when a form release is the primary concern; use a Visual Guide Specification for concrete where both visual impact and form reuse are primary concerns.

Release Method: Apply with any type applicator or technique. Use a sprayer, roller, brush, or mop.

Too much release agent will cause bugholes and "wormtracks" (as seen in CCS 6), and an increased difficulty in stripping.

Dilution with fuel oil, diesel fuels, or mineral spirits will promote an increase in stripping difficulties, concrete build-up, bugholes, soft spots, and staining.

Visual Guide Specifications: Cresset Concrete Standard 3 (CCS 3) is typical of Crete-Lease Bio-Tru-Xtra. CCS 2 is attainable when coverage rates are carefully followed. See Spray Coverage Rates Chart for specification details.

Visual Guide Specification Notes:

1. With Crete-Lease Bio-Tru-Xtra, the thinner the film the better the appearance, plus the forms strip easier.
2. Form surfaces used in producing CCS 1 and CCS 2 must be as clean as the hood on a showroom car before the release agent is applied. Protect treated surfaces from precipitation, dust and debris.
3. Non-porous form surfaces are required to uniformly produce CCS 1, CCS 2, and CCS 3. Examples include HDO plywood, elastomerics, all plastics, metals, and coatings.
4. Thin spray applications of release agent at temperatures below 45°F are produced by increasing spray pressure about 10 psi.

TABLE OF FORM AND FORMLINER COMPATIBILITY

Plywood	All Grades, Pre-oiled, Overlaid (LDO, MDO, HDO)
Plastics	Fiberglass Reinforced, ABS, PVC
Coatings	Epoxy, Urethane
Elastomerics	Urethane, Silicone
Steel	
Aluminum	
Wood	

Storage: Factory sealed containers will keep up to 2 years at temperatures from -20°F to 140°F (-30°C to 60°C). Crete-Lease Bio-Tru-Xtra is a class 3A liquid for purposes of meeting OSHA storage requirements (Section 1910.106).

Store drums horizontally or in a position to prevent standing water from collecting over the bungs.

Precautions: Keep out of reach of children. Avoid prolonged contact with the skin. Use with adequate ventilation. See Material Safety Data Sheet for additional information.

6. AVAILABILITY AND COST

Availability: Crete-Lease Bio-Tru-Xtra is available in 1 and 5 gallon containers; orange and white striped 55 gallon drums and 275 gallon MegaPaks. Contact Cresset Chemical Company for your nearest distributor.

Cost: The cost on hard, smooth surfaces is about \$0.01 per square foot (January 2007).

COVERAGE WITH CRETE-LEASE Bio-Tru-Xtra

Form Surface	(sq ft/gal)
Hard & Smooth	1,500
Pre-oiled Plywood	1,000
Untreated Plywood	700

SPRAY COVERAGE RATES TO OBTAIN HIGH VISUAL IMPACT CONCRETE

Flat Spray Tip	Pressure	Optimum Coverage Rate For	
		CCS 2	CCS 3
8001 tip	30-40 psi	40 sq ft/10 sec	20 sq ft/10 sec
800067 fine tip	50-60 psi	35 sq ft/10 sec	15 sq ft/10 sec
800050 fine tip	50-60 psi	25 sq ft/10 sec	12 sq ft/10 sec
Wet Film Thickness		0.0005 to 0.001 inch	0.001 to 0.0025 inch

- Notes:**
1. The coverage rates are for smooth non-porous forms.
 2. Distance between form and spray tip is constant; typically between 12 and 18 inches.

7. LIMITED WARRANTY

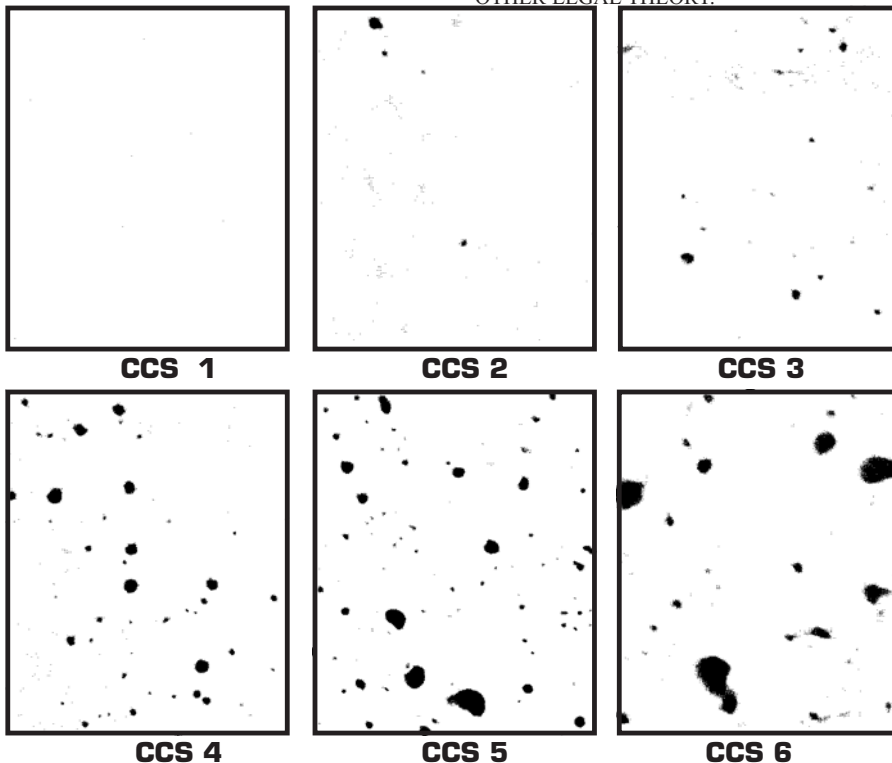
Cresset Chemical Company warrants the product against defects in materials for a period of 1 year from purchase. If Cresset receives notice of such defects during the warranty period, Cresset at its option will either replace the product or refund the purchase price. THE WARRANTY SET FORTH ABOVE IS EXCLUSIVE AND NO OTHER WARRANTY, WHETHER WRITTEN OR ORAL, IS EXPRESSED OR IMPLIED. CRESSET SPECIFICALLY DISCLAIMS THE WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE REMEDIES PROVIDED HEREIN ARE BUYER'S SOLE AND EXCLUSIVE REMEDIES. IN NO EVENT SHALL CRESSET CHEMICAL COMPANY BE LIABLE FOR DIRECT, INDIRECT, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES (INCLUDING LOSS OF PROFIT) WHETHER BASED ON CONTRACT, TORT OR ANY OTHER LEGAL THEORY.

8. MAINTENANCE

Not required.

9. TECHNICAL SERVICES

To keep you abreast of new ideas in the development, selection and application techniques of release agents, we publish newsletters, technical brochures, specification sheets and Material Safety Data Sheets.



These simulated Figures are parts of larger photographs which appear in "Cresset Concrete Standards". Write or call for your free brochure. Scale 1:1.