

MATERIAL SAFETY DATA SHEET

1. PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: **White and Pigmented, Printed Polystyrene Foam Products
(GreenGuard DC14, BACKER-PRO®)**

SUPPLIER: Pactiv Corporation
1900 West Field Court
Lake Forest, Illinois 60045

CONTACTS: For product and MSDS information, telephone your Pactiv Corporation Building Products sales representative or customer service representative. 1-800-227-7337, Extension 589-7309.

2. COMPOSITION / INGREDIENTS INFORMATION

INGREDIENTS CONSIDERED HAZARDOUS TO HEALTH: This product conforms to the U.S. Occupational Safety and Health Administration (OSHA) Hazard Communication Standard's definition of an "Article," i.e., "... a manufactured item: (i) which is formed to a specific shape or design during manufacture; (ii) which has end use function(s) dependent ... upon its shape or design ...; and (iii) which *does not release, or otherwise result in exposure to, a hazardous chemical, under normal conditions of use.*" [29 CFR 1910.1200 (b)(6)(iv)]

3. HAZARDS IDENTIFICATION

U.S. OSHA HAZARD COMMUNICATION: Product assessed in accordance with OSHA requirements per 29 CFR 1910.1200 and determined to be not hazardous.

EFFECTS OF OVER EXPOSURE: No significant effects expected.

EMERGENCY RESPONSE DATA: Colored or white, foamed plastic. This material burns vigorously and releases dense, black, toxic smoke.

HMIS HAZARD IDENTIFICATION CODE: (Health: 0) (Flammability: 1) (Reactivity: 0)

NFPA HAZARD IDENTIFICATION CODE: (Health: 0) (Flammability: 1) (Reactivity: 0)

4. FIRST AID MEASURES

EYE CONTACT: Not expected to be a problem. Loosened particles may cause slight discomfort, such as that experienced from airborne dust. Flush eyes with water.

SKIN CONTACT: Not expected to be a problem. Wash exposed skin with soap and water.

INHALATION: Not expected to be a problem. If adverse effects occur, remove from exposure.

INGESTION: Not expected to be a problem. No significant health hazards identified. Ingestion of large amounts may cause gastrointestinal distress requiring medical attention.

5. FIRE-FIGHTING MEASURES

EXTINGUISHING MEDIA: Agents approved for Class A hazards, including carbon dioxide, foam, dry chemical and water fog.

SPECIAL FIRE FIGHTING PROCEDURES: Water or foam may cause frothing. Use water to keep fire-exposed containers cool. Water spray may be used to flush spills away from exposures. Prevent runoff from fire control or dilution from entering streams, sewers, or drinking water supply.

FIREFIGHTING EQUIPMENT: Positive pressure self-contained breathing apparatus.

UNUSUAL FIRE & EXPLOSION HAZARDS: This material burns vigorously and emits dense, black, toxic smoke. Well-established fires are difficult to bring under control.

Flash Point: 500^o F. + (ASTM D 1929)

Autoignition Temperature: 900^o F. +

Flammable Limits: LEL and UEL not established

NFPA HAZARD IDENTIFICATION: Health: 0 Flammability: 1 Reactivity: 0

MATERIAL SAFETY DATA SHEET

Product Name: **White and Pigmented, Printed Polystyrene Foam Products
(GreenGuard DC14, BACKER-PRO®)**

Page 2

HAZARDOUS DECOMPOSITION PRODUCTS: Carbon monoxide; carbon dioxide; possible hydrocarbon fragments; monomers; acrolein; halogens; acids; ketones; aldehydes

6. ACCIDENTAL RELEASE MEASURES

NOTIFICATION PROCEDURES: Not expected to be a problem.

RELEASE / SPILL PROCEDURES: Pick up and dispose as normal refuse.

ENVIRONMENTAL PRECAUTIONS: Normal good environmental housekeeping, i.e., prevent spills from entering storm sewers / drains and prevent disposal in local soil.

PERSONAL PRECAUTIONS: See Section 8.

7. HANDLING AND STORAGE

HANDLING: No special precautions are necessary beyond normal good hygiene and workplace safety practices. Provide adequate ventilation. See Section 8 for personal protection suggestions.

STORAGE: **WARNING:** Polystyrene foam is combustible. Do not expose to open flame or any other source of high temperature or ignition. This product should be stored as a Group A substance under NFPA 231.

PRECAUTIONS: Keep away from sources of ignition, e.g.: heat and open flame.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

VENTILATION: No special equipment required. Use in adequately ventilated area.

RESPIRATORY PROTECTION: No special requirements under ordinary conditions of use and with adequate ventilation.

EYE PROTECTION: No special protection required. However, use of eye protection is good practice.

SKIN PROTECTION: No special protection required. However, use of gloves is good practice.

EXPOSURE LIMITS: This product does not contain any components which have recognized exposure limits.

9. TYPICAL PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE: Foamed, Molded Plastic Articles

AUTOIGNITION TEMP: 900 ° F. +

COLOR: White (natural) or colored with various colorants, printed logos and/or text

FLAMMABILITY: Not Classified

FLASH POINT: 500 ° F. + (ASTM D 1929)

FREEZING POINT: Not Established

MELTING POINT: 200 ° F. +

ODOR: Slightly sweet, slight plastic odor

SPECIFIC GRAVITY: 0.07 (Water = 1.0)

WATER SOLUBILITY: Negligible

10. STABILITY AND REACTIVITY

STABILITY (THERMAL, LIGHT, ETC.): Stable

CONDITIONS TO AVOID: Extreme heat and ignition sources, e.g.: sparks, open flames

MATERIAL SAFETY DATA SHEET

Product Name: **White and Pigmented, Printed Polystyrene Foam Products** Page 3
(GreenGuard DC14, BACKER-PRO®)

INCOMPATIBILITY: Strong oxidizers, aromatic and chlorinated hydrocarbons
HAZARDOUS DECOMPOSITION: Incomplete combustion can produce acids, acrolein, aldehydes, carbon monoxide, halogens, ketones, monomers, possible hydrocarbon fragments
Acetic Acid
HAZARDOUS POLYMERIZATION: Will not occur.

11. TOXICOLOGICAL DATA

ORAL TOXICITY (Rats): Practically non-toxic (LD50: > 2000 mg/kg), based on tests of similar products and / or the components.
DERMAL TOXICITY (Rabbits): Practically non-toxic (LD50: > 2000 mg/kg), based on tests of similar products and / or the components.
INHALATION TOXICITY (Rats): Practically non-toxic (LC50: > 5 mg/ L), based on tests of similar products and / or the components.
EYE IRRITATION (Rabbits): Practically non-irritating (Draize score: $\geq 0, \leq 6$), based on tests of similar products and / or the components.
SKIN IRRITATION (Rabbits): Practically non-irritating (Primary Irritation Index: ≤ 0.5), based on tests of similar products and / or the components.
CARCINOGENIC COMPONENTS: None at 0.1% + concentration identified by IARC, NTP, OSHA;
No exposures to California Proposition 65-listed substances.

12. ECOLOGICAL INFORMATION

ENVIRONMENTAL FATE AND EFFECTS: Ecological testing of this product has not been conducted. Components of this product photodegrade under lengthy exposures to UV light. Their proper incineration in state-of-the-art incinerators equipped with afterburners yields carbon dioxide and water. Polymer materials may not decompose in modern sanitary landfills. Component materials may be recycled, given adequate collection infrastructure and appropriate recycling facilities.

13. DISPOSAL CONSIDERATIONS

WASTE DISPOSAL: Dispose of waste as normal refuse where recycling capability is not available.
RCRA INFORMATION: The unused product is not, in our opinion, specifically listed by U.S. EPA as a hazardous waste (40 CFR 261D). It is not formulated to contain materials which are listed hazardous wastes. It does not exhibit the hazardous characteristics of ignitability, corrosivity, or reactivity, and it is not formulated with contaminants as determined by the Toxicity Characteristic Leaching Procedure (TCLP). Used product may be regulated.

14. TRANSPORT INFORMATION

U.S. DEPARTMENT OF TRANSPORTATION: Shipping Name Not Regulated
INTERNATIONAL SEA TRANSPORT / I.M.O.; I.M.D.G.: Shipping Name Not Determined / Not Regulated
INTERNATIONAL AIR TRANSPORT / I.A.T.A.; I.C.A.O.: Shipping Name Not Determined / Not Regulated
EUROPEAN ROAD & RAIL / A.D.R.; R.I.D.: Shipping Name Not Determined
CANADIAN TRANSPORT OF DANGEROUS GOODS: Shipping Name Not Determined

MATERIAL SAFETY DATA SHEET

Product Name: **White and Pigmented, Printed Polystyrene Foam Products
(GreenGuard DC14, BACKER-PRO®)**

Page 4

15. REGULATORY INFORMATION

CERCLA 102A / 103: Product is not a Reportable Hazardous Substance under 40 CFR 302.4.
OSHA: Product is an unregulated "Article" under OSHA HazCom 29 CFR 1910.1200 (b)(6)(iv).
TSCA: All components comply with U.S. Toxic Substances Control Act requirements.
SARA III, Sec. 302: Product is not an "Extremely Hazardous Substances" under 40 CFR 355.
SARA III, Sec. 311 / 312: No Reportable Hazard Categories under 40 CFR 370.
SARA III, Sec. 313: Product components not reportable under Toxic Release Program, per 40 CFR 372.

16. OTHER INFORMATION

PRECAUTIONARY LABEL CONTENT: WARNING: Polystyrene foam is combustible. Do not expose to open flame or any other source of high temperature or ignition. This product should be stored as a Group A substance under NFPA 231.

CHEMICAL NAMES AND SYNONYMS: Polystyrene thermoplastic polymer (C₈H₈) x

INTENDED USE: Building Insulation Materials

INGREDIENTS MENU: Polystyrene polymer resins (CAS No. 09003-53-6)

Alternate Foaming Agents:

Butane	(CAS No. 00106-97-8)
Carbon Dioxide	(CAS No. 00124-38-9)
Isobutane	(CAS No. 00075-28-5)
Isopentane	(CAS No. 00078-78-4)
Propane	(CAS No. 00074-98-6)

Magnesium Silicate (CAS No. 14807-96-6)

Organic / Inorganic Pigments and/or Dye Mixtures (trace)

Acrylic or Epoxy Copolymer Mixtures (trace)

Information provided by sources external to our company and set forth herein is offered in good faith as accurate, but without guarantee. Safety precautions contained herein cannot anticipate all individual and unique situations. Conditions of use and suitability of the product for particular uses are beyond our control. All risks of use of the product are, therefore, assumed by the user and we expressly disclaim all warranties of every kind and nature, including warranties of merchantability and fitness for a particular purpose in respect to the use or suitability of the product. Nothing herein is intended as recommendation for uses which infringe valid patents or as extension of license under valid patents. Appropriate warnings and safe handling procedures should be provided to users.

PREPARED BY: Pactiv Corporation
Product Stewardship Office
Technology Center
2651 Brickyard Road
Canandaigua, New York 14424-1026

DATE PREPARED: August 1, 2000
REVISION DATE: May 17, 2007
DATE PRINTED: January 30, 2009

This MSDS prepared in accordance with ANSI Z400.1