

Safety Data Sheet

according to 29 CFR 1910.1200 and 1907/2006/EC, Article 31

Date Printed: 06/06/2018 Version 5 Date Reviewed: 06/06/2018

Section 1: Identification of the Substance/Mixture and of the Company/Undertaking

· Product Identifier: Formolene® Linear Low Density Polyethylene-Butene Copolymer

· Synonyms: LLDPE-B Copolymer

· Product Code: L42----

· CAS Number:

25087-34-7

· Product Use: Resin, extrusion and compounding, plastic molding, molded articles, films and coatings.

· Manufacturer/Supplier:

Formosa Plastics Corporation, Texas 201 Formosa Drive Point Comfort, TX 77978 USA +1 (361) 987-7000

E-Mail: MSDS@fpcusa.com

- · European REACH Representative: Intertek France
- · Business Division: High Density Polyethylene
- · Emergency Telephone Number:

In case of a chemical emergency, contact CHEMTREC (24 hrs) at:

- +1 (800) 424-9300 (United States, Canada, Puerto Rico, Virgin Islands)
- +1 (703) 527-3887 (International & Maritime)

Section 2: Hazards Identification

· Hazard Classification:

Combustible dust. May form combustible dust concentrations in air.

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Other Hazards:

Molten material may cause thermal burns. Spilled pellets present slip and fall hazard.

· Signal Word: WARNING

· Precautionary Statements:

Product is a static accumulator.

Ground and bond containers and receiving equipment.

Keep away from sparks and open flame.

· NFPA Ratings (scale 0 - 4):



Health = 0 Fire = 1 Reactivity = 0

· Additional Information:

If you do not understand the hazards or safety precautions described in this data sheet, contact your supervisor or safety administrator before handling this product.

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Section 3: Composition/Information on Ingredients

- · Substances:
- · CAS No. Description

25087-34-7 ethylene-butene copolymer (>99%)

Section 4: First Aid Measures

· General information: Provide symptomatic and supportive care.

· After Inhalation:

Remove victim to fresh air.

Administer oxygen if breathing is difficult.

Administer artifical respiration if breathing has stopped.

Get medical assistance if irritation or other symptoms develop.

After Skin Contact:

After contact with the molten product, cool rapidly with cold water.

Do not pull solidified product away from the skin.

Get medical attention.

· After Eye Contact:

In case of accidental contact, immediately flush eyes with water.

Hold eyelids open to ensure adequate flushing.

Get medical assistance if irritation or other symptoms develop.

After Swallowing:

Administer 1-2 glasses of water to dilute ingested material.

Never give anything by mouth to an unconscious person.

Get medical attention.

· Most Important Symptoms and Effects: No further relevant information available.

Section 5: Firefighting Measures

· Suitable Extinguishing Agents:

CO2, extinguishing powder or water spray. Fight larger fires with water spray.

· Special Firefighting Hazards:

Product is supplied as pellets. Dust formed during processing or handling may form combustible dust concentrations in air.

Protective Equipment:

In the event of a fire, wear a NIOSH (USA) or CEN (EU) approved self-contained breathing apparatus (SCBA) and full protective clothing.

Section 6: Accidental Release Measures

· Personal Precautions, Protective Equipment and Emergency Procedures:

Avoid dust formation.

Wear appropriate personal protective equipment during all clean-up activities. See Section 8 for more information.

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• Environmental Precautions: Keep spilled material out of sewage/drainage systems and waterways.

· Methods for Containment and Clean-Up:

Collect spilled material mechanically.

Place waste in an appropriate container for disposal.

Section 7: Handling and Storage

· Precautions for Safe Handling:

Avoid dust formation.

Accumulations of dust should be removed from settling areas.

Follow good engineering and work practices, including routine housekeeping.

Promptly clean up spills to avoid slip and fall hazard.

Use only in well ventilated areas.

· Protection Against Fires and Explosions:

Dust can combine with air to form an explosive mixture.

Take precautions against static discharge.

Transfer and store in properly bonded and grounded containers.

To determine required precautions, consult applicable standards such as NFPA 654, Standard for the Prevention of Fire and Dust Explosions from the Manufacturing, Processing, and Handling of Combustible Particulate Solids (latest edition), and NFPA 499, Recommended Practice for the Classification of Combustible Dusts and of Hazardous (Classified) Locations for Electrical Installations in Chemical Process Areas.

· Conditions for Safe Storage:

Store in closed, properly labeled containers.

Protect containers from heat, physical damage, ignition sources and incompatible materials.

Have emergency equipment for fires and spills readily available.

· Specific End Uses: Resin, extrusion and compounding, plastic molding, molded articles, films and coatings.

Additional Information:

If you do not understand the hazards or safety precautions described in this data sheet, contact your supervisor or safety administrator before handling this product.

Section 8: Exposure Controls/Personal Protection

Occupational Exposure Limits:

Use occupational exposure limits for dust when controlling exposure to this product.

25087-34-7 ethylene-butene copolymer

PEL (USA) Eight-Hour Value: 15*, 5** mg/m3

*as total dust; **as respirable dust

TLV (USA) Eight-Hour Value: 10*, 3** mg/m3

*as inhalable dust; **as respirable dust

- · Exposure Controls: None required under normal conditions of use.
- · General Protective and Hygienic Measures: Wash thoroughly after handling.
- · Respiratory Protection: None required under normal conditions of use.

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Hand Protection:



Work gloves.

Eye/Face Protection:



Safety glasses with side shields.

- · Body Protection: Protective work clothing
- Additional Information:

If unusual exposures are expected, an industrial hygiene review of work practices, engineering controls and personal protective equipment is recommended.

Section 9: Physical/Chemical Properties

· Form: **Pellets** · Color: White Odorless · Odor:

· Odor Threshold: Not determined. · pH Value: Not determined. · Melting Point: 131 °C (267.8 °F) · Boiling Point: Not determined. · Flash Point: 335 °C (635 °F) · Autoignition Temperature: 342 °C (647.6 °F) · Lower Explosive Limit (LEL): Not determined. Upper Explosive Limit (UEL): Not determined. Not determined. Vapor Pressure:

· Density at 20 °C (68 °F): 0.919-0.953 g/cm³ (7.67-7.95 lbs/gal)

Insoluble.

· Vapor Density: Not determined. · Evaporation Rate: Not determined. · Solubility in Water:

Partition Coefficient (n-octanol/water): Not determined.

Section 10: Stability and Reactivity

· Chemical Stability/Reactivity: Stable under anticipated conditions of use.

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- Conditions to Avoid: Stable up to melting point.
- · Possibility of Hazardous Reactions/Incompatible Materials: No dangerous reactions known.
- · <u>Hazardous Decomposition Products:</u> No dangerous decomposition products known.

Section 11: Toxicological Information

- · Acute Toxicity: This product is not acutely toxic.
- · Skin Irritation: Not expected to cause skin irritation.
- Eye Irritation: Mechanical eye irritation.
- · Respiratory Irritation: May cause respiratory irritation.
- · Sensitization/Allergic Reaction: No data available.
- · Subchronic/Chronic Toxicity: No data available.

Section 12: Ecological Information

- · Aquatic Toxicity: No data available.
- · Persistence and Degradability: No data available.
- · Bioaccumulative Potential: No data available.

Section 13: Disposal Considerations

· Disposal Instructions:

Dispose of waste in accordance with applicable laws and regulations.

Maximize product recovery for reuse or recycling.

Section 14: Transport Information

- · UN Number:
- · DOT, ADR, IMDG, IATA Not Applicable
- · UN Proper Shipping Name:
- · DOT, ADR, IMDG, IATA Not Applicable
- · Transport Hazard Class(es):
- · DOT, ADR, IMDG, IATA
- · Class: Not Applicable
- · Packing Group:
- · DOT, ADR, IMDG, IATA Not Applicable
- · Environmental Hazards: Not applicable.

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- · Additional Information:
- · DOT:

• Remarks: This product is not regulated as a hazardous material/dangerous good for

transportation.

Section 15: Regulatory Information

- · U.S. Superfund Amendments & Reauthorization Act (SARA) 355 (Extremely Hazardous Substances):

 Substance is not listed.
- · <u>U.S. Superfund Amendments & Reauthorization Act (SARA) 313 (Specific Toxic Chemical Listings):</u>
 Substance is not listed.
- · U.S. Toxic Substances Control Act (TSCA):

Substance is listed.

· California Proposition 65 Carcinogens:

Substance is not listed.

· Canadian Domestic Substances List (DSL):

Substance is listed.

· Canadian Ingredient Disclosure List (limit 0.1%)

Substance is not listed.

· Canadian Ingredient Disclosure List (limit 1%):

Substance is not listed.

- · Container Labeling: .
- · Hazard Pictograms: Not Applicable
- · Signal Word: WARNING
- · Hazard Statements: Combustible dust. May form combustible dust concentrations in air.
- · Precautionary Statements:

Product is a static accumulator.

Ground and bond containers and receiving equipment.

Keep away from sparks and open flame.

Section 16: Other Information

This information is furnished without warranty, expressed or implied, except that it is accurate to the best knowledge of Formosa Plastics Corporation, U.S.A. at the time it was prepared. Formosa Plastics Corporation, U.S.A. does not assume any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, Formosa Plastics Corporation, U.S.A. and its subsidiaries cannot guarantee that these are the only hazards that exist. Formosa Plastics Corporation, U.S.A. assumes no legal responsibility for loss, damage or expense arising out of, or in any way connected with, the handling, storage, use or disposal of this product.

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- · Department Issuing Safety Data Sheet: Corporate Environment, Health & Safety
- Sources & References:

This Safety Data Sheet conforms to regulation 1907/2006/EC (REACH). This product has been classified in accordance with European CLP regulations (1272/2008/EC) and the U.S. Hazard Communication standard (29 CFR 1910.1200).

* - Indicates that data has been updated from the previous version.

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