

The SDS format adheres to the standards and regulatory requirements of the United States and may not meet regulatory requirements in other countries.

Bioclear Matrix Systems Safety Data Sheet – TruContact

US IUPILON031: S-3001R 5313

SAFETY DATA SHEET

Revision: 19 May 2015 Version number: 1

SECTION 1: Identification

1.1 Product identifier used on the label: IUPILON

1.2 Grade S-3001R 5313

1.3 Other identification: Polycarbonate product.

1.4 Recommended use of the chemical and restrictions on use: Plastic for injection or extrusion molding.

Restrictions on use: not available.

1.5 Manufacturer, importer, or other responsible party Bioclear Matrix Systems by Dr. David Clark 3802 South Warner Street, Suite A Tacoma, WA 98409 USA

Non-US supplier:

Mitsubishi Engineering-Plastics Corp., Environment and Quality Assurance Department, Shiodome Sumitomo-Bldg. 25F, 9-2, Higashi-shinbashi 1-Chome, Minato-ku, Tokyo 105-0021, Japan; Tel +81-3-6274-9060; Fax +81-3-6274-9085.

1.6 Emergency phone number

Tel: +1-248-669-6418

(business hours, Monday to Friday, 9:00 am to 5:00 pm, EST).





SECTION 2: Hazard(s) identification

2.1 Classification of the chemical in accordance with paragraph (d) of § 1910.1200

Not hazardous according to the OSHA Hazard Communication Standard 2012.

2.2 Symbols, signal word, hazard and precautionary statements

Pictogram: None. Signal word: None.

Hazard statements: None.

Precautionary statements: None.

2.3 Other hazards: Not available.

SECTION 3: Composition/information on ingredients

3.1 Mixtures

| Declarable components | Conc. (wt%) | CAS No. |
|-----------------------|-------------|---------|
| None | | |
| | | |

| Other components | | |
|------------------|-----|------------|
| Polycarbonate | >99 | 25971-63-5 |

SECTION 4: First-aid measures

4.1 Description of first aid measures

Inhalation: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. If experiencing respiratory symptoms, call a doctor.

Skin: If dust, or vapor or condensation products from heated product, contacts the skin, wash off well with soap and water.

If skin irritation or rash occurs, get medical attention. Launder clothing before re-use. If melted product on skin: immediately cool with clean water for 15 minutes. Do not try to peel off solidified resin from the skin. Get medical attention.

Eye: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists, get medical attention.





Ingestion: Rinse mouth with water, and give milk or water to drink. Call a poison center or doctor if you feel unwell. Do not induce vomiting, unless instructed by medical personnel.

4.2 Most important symptoms/effects, acute and delayed Dust from processing, and vapor from heated resin, may irritate the eyes, skin and respiratory system.

4.3 Indication of immediate medical attention and special treatment needed Treat symptoms as they occur.

SECTION 5: Fire-fighting measures

5.1 Extinguishing media

Suitable Pouring water, water spray and fire extinguishers. Pouring water is most preferable. Unsuitable Carbon dioxide gas and dry chemicals lack cooling capacity, with the possibility of re-ignition.

5.2 Special hazards arising from the chemical

Not classified as flammable, but is a combustible thermoplastic material which will melt and drip when ignited.

During a fire will produce strong heat, black smoke, and toxic gases, including carbon dioxide, carbon monoxide and traces of aliphatic and aromatic hydrocarbons, aldehydes, acids, phenol and phenol derivatives.

5.3 Special protective equipment and precautions for firefighters Remove containers from fire or cool them with water spray. Firefighters should wear an approved self-contained breathing apparatus and full protective clothing.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures For large spills, wear full personal protection. Keep unauthorized personnel from the spillage area. May cause slip hazard. Ventilate area and avoid creating airborne dust. Take precautionary measures against static discharge and use non-sparking equipment. Follow prescribed procedures for responding to large spills and reporting to authorities. For recommended personal protective equipment, see Section 8. For disposal considerations, see Section 13.





6.2 Methods and material for containment and cleaning up

Prevent product from entering water courses or drainage system.

Clean up spill as soon as possible.

Carefully sweep up with brush or collect using vacuum cleaner.

Place waste in a container for disposal.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Avoid skin and eye contact, and inhalation of any dust or vapor during heat processing. Use protective measures as described in Section 8. Use only in a well-ventilated area. Wash hands after use. Dust that develops from processing may cause dust explosion hazard. Always clean up dust. Keep away from sources of ignition. Use only non-sparking equipment. Ground the pneumatic conveying, bag filter, hopper and such facilities to remove static electricity. When processing molten resin, use protective equipment to prevent burns. In order to avoid hazardous decomposition, purged plastics should be cut into small, flat forms to allow rapid cooling. Do not allow molten resin to remain in container at elevated temperature for long periods.

7.2 Conditions for safe storage, including any incompatibilities
Protect from direct sunlight. Store away from fire and heat sources in a well-ventilated area.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Exposure limits None.

8.2 Engineering controls Good general ventilation is recommended for handling the product. For processing, where dust or vapor might be formed, local exhaust ventilation or use in a closed system is recommended.

8.3 Individual protection measures

The need for personal protective equipment should be based on a workplace risk assessment for the particular use.

Avoid skin and eye contact by wearing chemical resistant gloves and protective glasses with side seals, or goggles. Electroconductive shoes are recommended.

During processing, if exposure to dust or vapors is possible, wear a dust mask or organic vapor mask.





When handling a molten resin, wear heat-resistant gloves and long-sleeved clothing to prevent burns.

PPE should be to state or federal standards. Consult manufacturers concerning breakthrough times.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties Appearance Pellet

Odor: Not available

Odor threshold: Not available

pH: Not available

Melting/freezing point: Not available Initial boiling point/range: Not available

Flash point: >522 °C

Evaporation rate: Not available

Flammability (solid, gas): Not available Flamm. or expl. Limits; Not available

Vapor pressure: Not available Vapor density: Not available

Relative density: 1.2

Solubilities: Insoluble in water

Partition coeff. (log Kow): Not available

Auto-ignition temp.: >550 °C Decomposition temp.: 380 °C

Viscosity: Not available

9.2 Other information Not available

SECTION 10: Stability and reactivity

10.1 Reactivity Not available.

10.2 Chemical stability Stable at room temperature under normal storage and handling conditions.

10.3 Possibility of hazardous reactions

No hazardous decomposition products when stored and handled correctly. Hazardous polymerization does not occur.





- 10.4 Conditions to avoid: Avoid storage at high temperatures, or in direct sunlight.
- 10.5 Incompatible materials Strong acids, alkalis, and oxidising agents.
- 10.6 Hazardous decomposition products

Smoldering or incomplete combustion leads to the formation of toxic gases, including carbon dioxide, carbon monoxide and traces of aliphatic and aromatic hydrocarbons, aldehydes, acids, phenol and phenol derivatives.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute toxicity: Not classified.

Skin corrosion/irritation: Not classified due to lack of data.

Serious eye damage/irritation: Not classified due to lack of data. Respiratory or skin sensitization: Not classified due to lack of data.

Germ cell mutagenicity: Not classified due to lack of data.

Carcinogenicity: Not classified due to lack of data.

Reproductive toxicity: Not classified due to lack of data. STOT-single exposure: Not classified due to lack of data. STOT-repeated exposure: Not classified due to lack of data.

Aspiration hazard: Not classified.

SECTION 12: Ecological information

- 12.1 Ecotoxicity Not available.
- 12.2 Persistence and degradability
 Not expected to be readily biodegradable.
- 12.3 Bioaccumulative potential: Not available.
- 12.4 Mobility in soil Not available.
- 12.5 Other adverse effects Not available.

SECTION 13: Disposal considerations

13.1 Waste treatment methods





Incineration or landfill may be suitable for this product and any recovered material. Disposal via the drains is not recommended. This product and contaminated containers should be disposed of according to current local, state, or federal regulations.

SECTION 14: Transport information

- 14.1 UN Number Not classified as dangerous goods for transport.
- 14.2 UN proper shipping name: Not applicable.
- 14.3 Transport hazard class(es): Not applicable.
- 14.4 Packing group: Not applicable.
- 14.5 Environmental hazards: Not classified as environmentally hazardous for transport.
- 14.6 Special precautions for user: Not available.
- 14.7 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code: Not applicable.

SECTION 15: Regulatory information

15.1 Safety, health and environmental regulations specific for the substance or mixture

| | Section 302 | Section 304 | CERCLA | Section | RCRA Code | CAA 112(r) |
|------|-------------|-------------|--------|---------|-----------|------------|
| | (EHS TPQ) | EHS RQ | RQ | 313 | | TQ |
| None | | | | | | |

OSHA: Hazard Communication Rule, 29 CFR, 1910.1200.

EPCRA (Emergency Planning and Community Right-to-Know Act): Section 302: Extremely Hazardous Substances (EHS), Threshold Planning Quantity (TPQ) in 40 CFR 355; EPCRA Section 304 gives EHS reportable quantities (RQ); Section 313 Toxic Chemicals, subject to annual reporting (40 CFR 372).

CERCLA (Comprehensive Environmental Response Compensation and Liability Act), Hazardous Substances; accidental release of substances above the Reportable Quantity (RQ) listed (in pounds) requires reporting; local reporting requirements may be in force.





RCRA Hazardous Wastes: RCRA P and U lists (40 CFR 261.33).

CAA Substances for Accidental Release Prevention: Clean Air Act 112 (r), Hazardous Air Pollutants; Threshold Quantities (TQ).

Other regulatory Not available

SECTION 16: Other information

Revisions This SDS is the first version in US format.

Abbreviations STOT RE, specific organ toxicity repeated exposure; STOT SE, specific target organ toxicity single exposure.

References

Search for chemicals; available at the European Chemicals Agency website: http://echa.europa.eu/.

List of Lists; Consolidated List of Chemicals Subject to the Emergency Planning and Community Right-To-Know Act (EPCRA), Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) and Section 112(r) of the Clean Air Act; US EPA; October 2012.

Guide to Occupational Exposure Values; ACGIH, 2013.

IARC Monographs on the Evaluation of Carcinogenic Risks to Humans:

http://monographs.iarc.fr/ENG/Classification/.

Basis of classification The substance is classified on the basis of available information.

Disclaimer: The data given here is based on current knowledge and experience. The purpose of this

Safety Data Sheet is to describe the products in terms of their safety requirements. The data does not signify any warranty with regard to the product's properties.

End of MSDS

