SAFETY DATA SHEET

Product Name: BioBlend® XD 25150 BioPolymer
Product No: BioBlend® XD 25150
Revision Date: 8 January 2021

SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Product Name	BioBlend XD 25150 BioPolymer
Common Names	BioBlend XD
Product Use	Plastic resin for rigid products such as injection molding, thermoforming, sheet extrusion, etc.
Manufacturer	BiologiQ Inc. 3834 Professional Way Idaho Falls, ID 83402
Emergency Number	1-208-357-9650

SECTION 2. HAZARDS IDENTIFICATION

GHS Classification and Label Elements			
Category	Combustible Dust (OSHA Defined)		
Label Content			
Pictogram	Not required		
Signal word	WARNING		
Hazardous warnings	May form combustible dust concentrations in air.		
Hazardous prevention measures	Not required		
Other Hazards			
Physical / Chemical Hazards			
Combustible Dust	If small particles are generated during further processing, handling or by other means, may form combustible dust concentrations in air.		
Health Hazards			
Eye	H320: Causes eye irritation. Particles may cause mechanical irritation.		
Skin Contact	H316: Causes skin irritation. Only when hot.		
Inhalation	Low order of toxicity.		
Ingestion	No hazard in normal industrial use.		
Environmental Hazards	No significant hazard		
NFPA Hazard ID	Health: 1	Flammability: 1	Reactivity: 0
HMIS Hazard ID	Health: 1	Flammability: 1	Reactivity: 0

SECTION 3. COMPOSITION / INFORMATION ON INGREDIENTS

Name	CAS #	Concentration	GHS Hazard Codes
NuPlastiQ® GP BioPolymer	-	-	N/A
Adhesive Resin	-	-	N/A
Polypropylene homopolymer	9003-07-0	-	N/A
Additives	Trade secret	<1%	N/A

As per paragraph (i) of 29 CFR 1910.1200, formulation is considered a trade secret and specific chemical identity and exact percentage composition will be provided to health professionals, employees, or designated representatives in accordance with applicable provision of paragraph (i).

SECTION 4. FIRST-AID MEASURES

Eye Contact	Flush eyes with large amounts of water until irritation stops. Seek medical attention if irritation persists.
Skin Contact	Wash with soap and water. For hot product: immediately immerse in or flush affected area with large amounts of cold water to dissipate heat. Cover with clean cotton sheeting or gauze and get prompt medical attention.
Inhalation	Remove to fresh air.
Ingestion	Not a probable route of exposure. However, in case of accidental ingestion, call a physician.

SECTION 5. FIREFIGHTING MEASURES

Extinguishing Media	Dry chemical; CO_2; Water fog; Foam
Unsuitable Extinguishing Media	No applicable data available.
Specific Hazards	Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source is a potential dust explosion hazard. Do not permit dust to accumulate.
Protective Equipment	Self-contained breathing apparatus.
Decomposition products	Hazardous decomposition products such as carbon oxides (CO, CO2), aldehydes, ketones, hydrocarbons are possible.

Flammability Properties		
Flash Point	No data	
Flammability Limits	LEL: N/D	UEL: N/D
Autoignition Temperature	N/A	

SECTION 6. ACCIDENTAL RELEASE MEASURES

Safeguards	Avoid the generation or accumulation of dust in the air. Good housekeeping practices should be used to avoid dust build up.
Spill Clean	Spilled material is a slipping hazard on hard surfaces. Sweep or scoop up pellets and remove. Spills of fine material should be cleaned using gentle sweeping or vacuuming. Cleaning methods (e.g. compressed air) which can generate potentially combustible dust clouds should not be used.
Environmental Precautions	Do not discharge to streams, ponds, lakes or sewers.
Disposal Method	In accordance with existing local/state/federal regulations.

SECTION 7. HANDLING AND STORAGE

Handling	Minimize dust generation and accumulation. Institute routine housecleaning to ensure dust does not accumulate on surfaces. Pneumatic conveying and other mechanical handling operations can generate combustible dust. Avoid significant deposits of material which may become airborne and form combustible dust clouds. Handling and processing operations should be conducted in accordance with best practices (e.g. NFPA-654). Ensure good ventilation of the work station. Wear protective equipment. Do not overheat the product. Avoid contact with heated product to avoid burns.
Loading/Unloading Temperature	[Ambient]
Transport Temperature	[Ambient]
Transport Pressure	[Ambient]
Storage	Store in cool dry place with adequate ventilation.
Storage Temperature	[Ambient]
Storage Pressure	[Ambient]

Suitable Containers/Packing	Bulk Containers, Bags. Store sealed to prevent moisture absorption and decomposition.

SECTION 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Exposure Limit Values for materials that can be formed when handling this product	For dusty conditions, OSHA recommends for particulates not otherwise regulated an 8-hour TWA of 15 mg/m3 (total dust), 5 mg/m3 (respirable fraction); ACGIH recommends for insoluble and poorly soluble particles not otherwise specified an 8-hour TWA of 10 mg/m3 (inhalable particles), 3 mg/m3 (respirable particles). NOTE: Limits/standards shown for guidance only. Follow applicable regulations. Under recommended processing conditions, this material has been shown to emit elevated concentrations of glycerol mist (CAS 56-81-5). This may cause smoke and possible odor during processing. OSHA does not list Glycerol mist as a hazardous material with specific exposure limits.
Engineering Controls	The level of protection and types of controls necessary will vary depending upon potential exposure conditions. Processors of this product should assure that adequate ventilation or other controls are used to control exposure. Provide readily accessible eye wash stations and safety showers.
Personal Protection	
Hand Protection	If product is hot, thermally protective, chemical resistant gloves are recommended. If contact with forearms is likely, a long sleeve shirt or gauntlet style gloves is recommended.
Eye Protection	If contact with hot material is likely, safety glasses with side shields are recommended.
Skin and Body Protection	If there is a potential for contact with hot product, thermally protective clothing and footwear is recommended.
Respiratory Protection	If engineering controls do not maintain acceptable airborne contaminate levels, an approved respirator may be appropriate. Typical type: Particulate air-purifying respirator approved for dust / oil mist is recommended.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

General Information / Appearance	
Physical State	Solid

Form	Resin Pellets
Type	Mixture
Color	Opaque, off-white to tan
Odor	N/D
Odor Threshold	No data available
Important Health, Safety, and Environmental Information	
Relative Density	N/A
pH as is	N/A
pH in 1% Solution	N/A
Boiling Point	N/A
Partition Coefficient	N/A
Specific Gravity	N/D
Evaporation Rate	N/A
Vapor Pressure (mm Hg)	N/A
Vapor Density	N/A
Volatiles	N/A
Volatile Organic Compounds	N/A
Auto ignition Temperature	N/A
Flammability (solid, gas)	May form combustible dust concentrations in air.
Flash Point	N/D
Upper Explosion Limit	N/D
Lower Explosion Limit	N/D
Decomposition Temperature	N/D
Oxidizing Properties	N/A
Viscosity	N/A
Other Information	
Freezing Point	N/A
Melting Temperature	N/A
Molecular Weight	>10,000
Solubility in Water	Low

SECTION 10. STABILITY AND REACTIVITY

Reactivity	No applicable data available.
Stability	Material is stable under normal conditions.

Conditions to Avoid	Temperatures > 300°C (>572°F)
Materials to Avoid	Strong Oxidizers
Hazardous Decomposition Products	This product does not undergo spontaneous decomposition. Hazardous decomposition products may include but are not limited to: Carbon dioxide (CO_2), Carbon monoxide, Organic acids, Aldehydes, Alcohols, Acrolein, Formaldehyde, Acetaldehydes

SECTION 11. TOXICOLOGICAL INFORMATION

Product Toxicology

Oral Toxicity	Not classified
Dermal Toxicity	Not classified
Inhalation Toxicity	Not classified
Eye Irritation	Not classified

Chronic (Long-Term) Effects of Exposure

Route of Entry	Eye, skin, inhalation, ingestion
Effects of chronic exposure	None
Target Organs	N/A
Special Health Effects	None known

Other Information

Carcinogenicity	Not classified
Dust	May be irritating to the eyes and respiratory tract.
Additives	Contains additives that are encapsulated in the polymer. Under normal processing conditions, the additives are not expected to pose any health hazard. However, grinding of the polymer is not recommended without the use of appropriate measures to control exposure.

SECTION 12. ECOLOGICAL INFORMATION

Biodegradability	N/D
Incinerability	Incinerable
Toxic Volatiles	None expected with complete combustion

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal Recommendations

Waste Disposal Methods:	In accordance with existing federal/state/local environmental regulations.
Empty Containers:	Empty container may contain product residue; follow SDS and label warnings even after containers have been emptied.

SECTION 14. TRANSPORT INFORMATION

Land (DOT)	Not regulated for Land Transport
Sea (IMDG)	Not regulated for Sea Transport
Air (IATA)	Not regulated for Air Transport

SECTION 15. REGULATORY INFORMATION

U.S. Regulations

SARA 313 title III	This material contains no chemicals with known CAS numbers that exceed the threshold levels required for reporting.
SARA 311/312 Hazard Class	Combustible Dust
TSCA Inventory List	The components with known CAS numbers listed in section 3 are in compliance with TSCA Inventory requirements for commercial purposes.

US State Regulations

No additional information available.

International Inventories

Canada DSL Inventory List	The components with known CAS numbers in Section 3 are listed.
China inventory of Existing Chemical Substances list:	The components with known CAS numbers in Section 3 are listed.

SECTION 16. OTHER INFORMATION

Created:	30 Jun 2017	Original
Revision:	6 Jun 2018	Updated the product name from MB207050 to NuPlastiQ® XD 25150.

Revision:	25 Feb 2019	Updated naming from NuPlastiQ® XD to BioBlend® XD.
Revision:	08 Jan 2021	Updated company name.

N/D = Not determined, N/A = Not applicable

Key to the H-Codes contained in Section 3 of this document (for information only)

H316: Causes mild skin irritation. Only when hot.

H320: Causes eye irritation. Particles may cause mechanical irritation.

This SDS covers the following BioBlend® XD BioPolymers: BioBlend® XD 25150 and BioBlend XD 25151.

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as guidance to safe handling, use, processing storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.