

ecovio[®] M2350 EXP

Biodegradable Compound for Agricultural Film

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Product Description

ecovio[®] M2350 EXP is our biodegradable compound for film extrusion based on our biodegradable copolyester ecoflex[®] F Blend. Due to its outstanding mechanical strength ecovio[®] M2350 EXP offers a great down gauging potential needed for thin agricultural or horticultural film applications like mulch film, cover film, silage film and others. ecovio[®] M2350 EXP already contains antiblocking agents required for easy processing on film extrusion and film conversion equipment. ecoflex[®] F Blend is the continuous phase in the structure of ecovio[®] M2350 EXP transferring the beneficial film properties of ecoflex[®] F Blend into the new product.


Our ecovio® M2350 EXP exhibits the following properties compared to PE-LD:

- Translucent, semi-crystalline structure with DSC melting point 110-120 °C (ecoflex® F Blend)
- High strength, stiffness and failure energy (dart drop)
- Good thermostability up to 230 °C
- High melt strength
- Excellent processability on conventional LDPE blown film lines
- Down gauging to 8 µm possible, typical thicknesses: 10 - 120 µm
- Good mechanical properties

The processing of ecovio® M2350 EXP on extrusion lines depends on the formulation, the extrusion technology and processing conditions. Trials are always recommended to assess the quality of the final product. ecoflex® masterbatches are available to tailor properties of the final product as well as the barrier to water vapour. Detailed information concerning our ecoflex® masterbatches will be sent upon request.

Certification of Compostability and Biodegradability

ecovio® M2350 EXP fulfils the requirements of the existing standards for compostable and biodegradable polymers, because it can be degraded by microorganisms.

Certification body	TÜV Austria
Certification Scheme	OK BIODEGRADABLE Soil
Certification Number	TA8032509384 

The biodegradation process in soil depends on the specific environment (climate, soil quality, population of microorganisms).

Form Supplied and Storage

ecovio® M2350 EXP is supplied as lenticular pellets in 1 t Octabins. Temperatures during transportation and storage may not exceed 60 °C at any time. Storage time in an unopened bag may not surpass 12 month at room temperature (23 °C).

Quality Control

ecovio® M2350 EXP is produced as a standard material in a continuous production process according to DIN EN ISO 9001. The melt volume rate, MVR, at 190 °C, 5 kg, according to ISO 1133 has been defined as specified parameter for quality control. A certificate of the MVR value can be provided with each lot number upon request. Other data given in our literature are typical values, which are not part of our product specification for ecovio® M2350 EXP.

Applications

ecovio® M2350 EXP has been developed for the conversion to flexible films using a blown film process. Typical applications are agricultural film. In view of numerous factors influencing functionality and shelf life of ecovio® films and finished articles made thereof the production parameters have to be tested by the converters before utilisation. Additionally sufficient field tests are required to ensure the right functionality of the articles made from ecovio® M2350 EXP.

We supply technical service information concerning the blown film process with ecovio® M2350 EXP on demand.

**Typical Basic Material Properties
of ecovio® M2350 EXP**

*see Quality Control

Property	Unit	Test Method	ecovio® M2350 EXP
Mass Density	g/cm ³	ISO 1183	1.38 - 1.40
Melt Volume Rate MVR 190°C, 5 kg*	ml/10 min.	ISO 1133	8.9
Melting Points	°C	DSC	110 - 120

**Typical Properties* of ecovio® M2350
EXP Blown Film, 15µm**

*not to be construed as specifications

Property	Unit	Test Method	ecovio® M2350 EXP
Tensile Modulus MD/TD	MPa	ISO 527	120 / 100
Tensile Strength MD/TD	MPa	ISO 527	33 / 25
Ultimate Elongation MD/TD	%	ISO 527	400 / 400
Dart Drop	g	ASTM D 1709-04 Method A	240
Tear Propagation by Elmendorf (200 g) MD	mN	DIN EN ISO 6383-2	480
Tear Propagation by Elmendorf (200 g) TD	mN	DIN EN ISO 6383-2	1441

Note

The information submitted in this document is based on our current knowledge and experience. In view of the many factors that may affect processing and application, these data do not relieve processors of the responsibility of carrying out their own tests and experiments; neither do they imply any legally binding assurance for a special purpose. It is the responsibility of those to whom we supply our products to ensure that any proprietary rights and existing laws and legislation are observed. (February 2026)