RC-736

MBS Core-Shell Impact Modifier for POM

TECHNICAL DATA SHEET TDS | Rev. 2026-10-02

Product Description

RC-736 is an MBS core-shell impact modifier for engineering plastics, with available technical evidence focused on polyoxymethylene (POM). Its core-shell morphology is intended to improve impact performance while maintaining practical processability and compatibility in the evaluated POM system.

Application Guidance

Primary documented application: POM impact modification.
Typical evaluation range in the source: 5-15%. This is a reference range, not a universal recommended dosage. Optimum loading depends on the POM grade, formulation and target properties.

POM Application Test

Test formulation: POM / RC-736 = 90 / 10

Property	Test / Condition	Neat POM	With RC-736
Izod impact	ASTM D256; 23°C	64 J/m	91 J/m
Tensile strength	ASTM D638; 50 mm/min	56.5 MPa	48.2 MPa
Elongation at break	-	99.2%	177.4%
Flexural strength	ASTM D790; 2 mm/min	76.8 MPa	65.2 MPa
Flexural modulus	-	2218 MPa	1925 MPa
MFR	ASTM D1238; 190°C / 2.16 kg	6.62	5.41
Gloss	60°	84	87
L	CIE	93.39	93.31
a	CIE	-0.48	-0.64
b	CIE	2.17	2.25
Yellow Index	-	3.84	4.02

The test shows higher impact and elongation in the evaluated 90/10 formulation, together with changes in tensile, flexural and flow properties. Qualification should consider the complete property balance rather than impact strength alone.

Selection & Qualification

RC-736 should be evaluated in the customer's own POM grade and finished-part requirements. Processing conditions, stabilizer package, pigments, fillers and other formulation variables may affect the final result.

Comparable-Grade Context

Comparable-grade evaluation may be discussed against products used for similar POM impact-modification applications. No claim of chemical identity, guaranteed equivalence or drop-in replacement is made in this TDS.

Packaging & Supply

Packaging	20 kg/bag; PE inner liner + PP woven outer bag
MOQ	1 MT
Sample	5 kg free sample; customer pays freight
Lead time	7-10 days after order, before shipment/loading
Main export port	Qingdao, China
Container reference	20GP: 14 MT / 700 bags; 40GP: 24 MT / 1,200 bags

Technical Documents

Request the current TDS, current batch COA, SDS and transport documentation when required for qualification or shipment.

Disclaimer

This TDS summarizes available product-positioning and application-test evidence. Application data are formulation-specific and do not constitute a guaranteed specification or finished-part performance warranty.

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