

Technical Data

产品说明

TOTAL Polypropylene
Lumicene® MR 30MC2

Lumicene® MR30MC2 is a metallocene random copolymer with a Melt Flow Index of 30 g/10 min for injection moulding. Lumicene® MR30MC2 differs from the other random copolymers by its moulding reproducibility, outstanding organoleptic properties combined with low extractables, excellent transparency and gloss.

Producers of rigid food packaging, caps and closures, medical device and packaging, houseware and kitchenware will take full advantage of the new Lumicene® random metallocene product range.

We hereby confirm that we do not use peroxide in the manufacturing of the above-mentioned Product.

Bormed RG835MO is a resin intended for evaluation for use in Healthcare applications.

Bormed RG835MO is a transparent polypropylene random copolymer with a high melt flow, modified with slip agent for products requiring a low surface friction. This grade is characterized by easy processability, high transparency, high gloss, controlled low friction and good stiffness-impact balance at ambient temperature. In addition it can be sterilized with ethylene oxide and steam.

Applications

Bormed RG835MO has been evaluated according to different regulations and norms. Typical applications are mentioned below for Medical devices or Pharmaceutical & Diagnostic packaging. However, Borealis should be consulted for final approval to evaluate the use of Bormed RG835MO .

- Needle hubs
- Needle protection
- Disposable non pre-filled syringes
- Caps and closures

Bormed™
RG835MO

This grade may only be used for the applications listed in the Product Datasheet and only to the extent that the application is within the scope of the tests set out in the Statement on Compliance to Regulations on Medical Use for that grade. If an application is not listed in the Product Datasheet, the grade can be used for such application only after express written consent of the Borealis Marketing Manager, Healthcare. Borealis prohibits the use of any healthcare grade product in an implantable device that is introduced into the human body by surgical intervention and that is intended to remain in place following surgical procedure.

Special Features

- Improved gloss
- High transparency
- Easy processability

RANPELEN
J-570S

J-570S is a nucleated random copolymer for injection molding applications. This grade is designed to be processed in conventional injection molding equipment and offers high transparency, good stiffness/impact strength balance, high gloss, good flow and low smell. J-570S is a 'Phthalate-Free' product.

Sumitomo PP
AZ564

Applications: For large item such as washing machine tubs, shells, and lids, large household electrical appliances, automotive door trips, etc.

Characteristics: High flow, high impact, high stiffness and high heat stability, with nucleating agent.



TAIRIPRO® K4535		Injection Molding			
CHARACTERISTICS: High fluidity, High clarity, Anti-static, Good resistance to chemical					
总体	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535
生产商/供应商	• TOTAL Refining & Chemicals	• Borealis AG	• Lotte Chemical Corporation	• Sumitomo Chemical Asia	• Formosa Chemicals & Fibre Corporation
通用符号	• PP 无规共聚物	• PP 无规共聚物	• PP 无规共聚物	• 抗撞击 PP 均聚物	• PP 无规共聚物
材料状态	• 已商用：当前有效	• 已商用：当前有效	• 已商用：当前有效	• 已商用：当前有效	• 已商用：当前有效
资料 ¹	• Technical Datasheet (English)	• Technical Datasheet (English)	• Technical Datasheet (English)	• Technical Datasheet (English)	• Processing (English) • Technical Datasheet (English)
UL 黄卡 ²	--	--	--	--	• E162823-460054
搜索 UL 黄卡	• TOTAL Refining & Chemicals	• Borealis AG	• Lotte Chemical Corporation	--	• Formosa Chemicals & Fibre Corporation • TAIRIPRO®
供货地区	• 欧洲	• 北美洲 • 非洲和中东 • 拉丁美洲 • 欧洲 • 亚太地区	• 北美洲 • 欧洲 • 亚太地区	• 欧洲 • 亚太地区	• 北美洲 • 欧洲 • 亚太地区
添加剂	--	• 润滑剂	• 成核剂	• 成核剂	--
特性	• 低萃取物 • 高光 • 良好的感官特征 • 清晰度，高 • 无规共聚物	• 低摩擦系数 • 高光 • 环氧乙烷消毒 • 极佳的可印刷性 • 可回收材料 • 良好的加工性能 • 良好刚性 • 良好抗撞击性 • 流动性高 • 耐化学性良好 • 清晰度，高 • 润滑 • 脱模性能良好 • 无规共聚物 • 用蒸汽消毒	• 成核的 • 高光 • 良好的流动性 • 良好刚性 • 良好抗撞击性 • 气味低到无 • 清晰度，高 • 无规共聚物	• Block Copolymer • 成核的 • 高刚性 • 高抗撞击性 • 可回收材料 • 流动性高 • 热稳定性，良好	• 抗静电性 • 流动性高 • 耐化学性良好 • 清晰度，高 • 无规共聚物



总体	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535
用途	<ul style="list-style-type: none"> • Rigid Food Packaging • 厨具 • 护罩 • 家用货品 • 外壳 • 医疗器械 • 医用包装 	<ul style="list-style-type: none"> • 管件 • 护罩 • 皮下注射器零件 • 外壳 • 医疗/护理用品 	<ul style="list-style-type: none"> • 薄壁部件 • 媒介包装 • 容器 • 文具 	<ul style="list-style-type: none"> • 电器用具 • 家电部件 • 汽车领域的应用 	--
机构评级	• EC 1907/2006 (REACH) --	--	--	• FDA 21 CFR 177.1520	• EC 1907/2006 (REACH) • FDA 21 CFR 177.1520(c) 3.1a
RoHS 合规性	• RoHS 合规	--	• RoHS 合规	• RoHS 合规	• RoHS 合规
UL 文件号	--	--	--	--	• E162823
外观	• 清晰/透明	• 清晰/透明	--	--	--
形式	• 粒子	• 粒子	--	• 粒子	--
加工方法	• 注射成型	• 注射成型	• 注射成型	• 注射成型	• 注射成型

物理性能	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	测试方法
密度 / 比重	--	--	0.900	--	0.898	g/cm³	ASTM D792
--	--	--	--	0.900	--	g/cm³	ASTM D792A
--	0.902	0.905	0.900	--	--	g/cm³	ISO 1183
表观密度	0.53	--	--	--	--	g/cm³	ISO 1183
熔流率 (熔体流动速率)							
230°C/2.16 kg	--	--	28	30	35	g/10 min	ASTM D1238
230°C/2.16 kg	30	30	28	--	--	g/10 min	ISO 1133
收缩率							
流动 : 23°C	--	--	--	--	1.5 到 2.0	%	内部方法
--	--	1.0 到 2.0	--	--	--	%	
横向流量	--	--	--	1.4	--	%	内部方法
流量	--	--	--	1.4	--	%	内部方法



机械性能	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	测试方法
拉伸模量							
--	1300	--	--	--	--	MPa	ISO 527-2
--	--	1200	--	--	--	MPa	ISO 527-2/1
抗张强度							
屈服	--	--	29.0	24.0	--	MPa	ASTM D638
屈服, 23°C	--	--	--	--	30.0	MPa	ASTM D638
屈服	31.0	--	26.0	--	--	MPa	ISO 527-2
屈服	--	27.5	--	--	--	MPa	ISO 527-2/50
断裂	--	--	--	17.0	--	MPa	ASTM D638
拉伸应变							
屈服	10	--	--	--	--	%	ISO 527-2
屈服	--	12	--	--	--	%	ISO 527-2/50
断裂	--	--	> 100	--	--	%	ASTM D638 ISO 527-2
断裂, 23°C	--	--	--	--	> 200	%	ASTM D638
弯曲模量							
--	--	--	1180	1290	--	MPa	ASTM D790
23°C	--	--	--	--	1130	MPa	ASTM D790A
--	1250	1200	970	--	--	MPa	ISO 178
冲击性能	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	测试方法
简支梁缺口冲击强度 (23°C)	--	6.0	--	--	--	kJ/m²	ISO 179/1eA
悬臂梁缺口冲击强度							
-10°C	--	--	29	--	--	J/m	ASTM D256
-10°C	--	--	24	--	--	J/m	ISO 180
23°C	--	--	44	--	--	J/m	ASTM D256
23°C	--	--	39	--	--	J/m	ISO 180
23°C, 3.18 mm	--	--	--	--	49	J/m	ASTM D256
-20°C	--	--	--	5.0	--	kJ/m²	ASTM D256
23°C	--	--	--	8.0	--	kJ/m²	ASTM D256
23°C	5.0	--	--	--	--	kJ/m²	ISO 180



硬度	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	测试方法
洛氏硬度							ASTM D785
--	--	--	--	90	--		
R 级	--	--	95	--	--		
R 级, 23°C	--	--	--	--	95		
热性能	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	测试方法
载荷下热变形温度							
0.45 MPa, 未退火	--	--	95.0	109	--	°C	ASTM D648
0.45 MPa, 未退火 ⁴	--	82.0	--	--	--	°C	ISO 75-2/B
0.45 MPa, 未退火	--	--	85.0	--	--	°C	ISO 75-2/B
1.8 MPa, 未退火, 6.35 mm	--	--	--	--	95.0	°C	ASTM D648
维卡软化温度	--	--	--	151	--	°C	ASTM D1525 ⁵
熔融温度 (DSC)	140	--	--	--	--	°C	ISO 3146
可燃性	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	测试方法
UL 阻燃等级	--	--	--	HB	HB		UL 94
光学性能	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	测试方法
雾度	--	--	25	--	--	%	ASTM D1003
注射	TOTAL Polypropylene Lumicene® MR 30MC2	Bormed™ RG835MO	RANPELEN J-570S	Sumitomo PP AZ564	TAIRIPRO® K4535	单位制	
加工 (熔体) 温度	--	220 到 250	--	190 到 230	220 到 240	°C	
模具温度	--	30 到 40	--	20 到 70	30 到 50	°C	
注塑压力	--	--	--	--	3.92 到 8.83	MPa	
注射速度	--	中等偏快	--	--	--		
保压	--	20.0 到 50.0	--	--	--	MPa	



备注

- ¹ 通过这些链接您能够访问供应商资料。我们尽量保证及时更新资料；不过您可以从供应商处了解最新资料。
- ² UL 黄卡含有 UL 验证的易燃性和电气特性。UL Prospector 持续努力在 Prospector 中将黄卡链接至单个塑料材料，然而此列表可能未包括所有相应链接。重要的是，我们对 Prospector 中找到的这些黄卡和塑料材料之间的关联进行验证。如需完整的黄卡列表，请访问 UL 黄卡搜索。
- ³ 一般属性：这些不能被视为规格。
- ⁴ Injection molded specimen
- ⁵ 压力 1 (10N)



购买地点

供应商	
TOTAL Polypropylene Lumicene® MR 30MC2	TOTAL Refining & Chemicals Houston, TX USA 电话: 713-483-5000 Web: http://www.totalrefiningchemicals.com/
Bormed™ RG835MO	Borealis AG Vienna, Austria 电话: +43-122-400-302 Web: http://www.borealisgroup.com/
RANPELEN J-570S	Lotte Chemical Corporation Seoul, South Korea 电话: +82-2-829-4114 Web: http://english.lottechem.com/
Sumitomo PP AZ564	Sumitomo Chemical Asia , Tokyo Singapore 电话: +65-6306-5188 Web: http://www.sca.com.sg/
TAIRIPRO® K4535	Formosa Chemicals & Fibre Corporation Taipei, Taiwan 电话: +886-2-2712-2211 Web: http://en.fcfc-plastics.com/



分销商

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30MC2**Plastribution**电话: +44-845-345-4560
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Bormed™ RG835MO

Biesterfeld Plastic GmbH*Biesterfeld Plastic GmbH is a Pan European distribution company. Contact Biesterfeld Plastic GmbH for availability of individual products by country.*电话: +49-40-32008-0
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RANPELEN J-570S

请联系供应商以便为 RANPELEN J-570S 查找分销商

Sumitomo PP AZ564

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TAIRIPRO® K4535

Click Plastics AG

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Osterman & Company

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供货地区: North America

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