Arkema France - A French "société anonyme", registered in the Nanterre (France) Trade and Companies Register under the number 319 632 790 SDC/11-2018 Source: automatically generated TDS from Material Database on 20-02-2024



Polyether block amide **Pebax® 5533 SA 01 MED resin** is a thermoplastic elastomer made of flexible polyether and rigid polyamide.

This grade offers the highest quality and it is specially designed to meet the stringent requirements of the medical applications such as minimally invasive devices.

Pebax® 5533 SA 01 MED resin also offers an excellent combination of properties such as: kink resistance, low friction coefficient and superior dynamic response.

Upon request, letters regarding USP Class VI compliance can be provided.

PROPERTIES	DRY / COND	UNIT	TEST STANDARD
RHEOLOGICAL PROPERTIES			
Molding Shrinkage, parallel	1.2 / *	%	ISO 294-4, 2577
Molding Shrinkage, normal	1.4 / *	%	ISO 294-4, 2577
MECHANICAL PROPERTIES			
Tensile Modulus	170 / 161	MPa	ISO 527-1/-2
	24700 / 23400	psi	
Yield Stress	12 / 12	MPa	ISO 527-1/-2
	1740 / 1740	psi	
Yield Strain	25 / 25	%	ISO 527-1/-2
Nominal Strain at Break	>50 / >50	%	ISO 527-1/-2
Shore D Hardness, after 15 s	50 / *	-	ISO 868
Charpy Impact Strength, +23°C	- / No Break	kJ/m²	ISO 179/1eU
Charpy Impact Strength, -30°C	- / No Break	kJ/m²	ISO 179/1eU
Charpy Notched Impact Strength, +23°C	- / No Break	kJ/m²	ISO 179/1eA
Charpy Notched Impact Strength, -30°C	- / No Break	kJ/m²	ISO 179/1eA
THERMAL PROPERTIES			
Melting Temperature, 10°C/min	159 / *	°C	ISO 11357-1/-3
Vicat Softening Temperature, 50°C/h 50N	66 / *	°C	ISO 306
	151 / *	°F	
OTHER PROPERTIES			
Water Absorption, 23°C, immersion, equilibrium	1.2 / *	%	ISO 62
Humidity Absorption, 23°C, RH50%, equilibrium	0.6 / *	%	ISO 62
Density	1010 / 1010	kg/m³	ISO 1183
	1.01 / 1.01	g/cm³	

MAIN APPLICATIONS: • Tubings like angiography and angioplasty catheters

Flexible injected parts

PACKAGING:

This grade is delivered dried in sealed packaging (20 kg bags) ready to be processed.





SHELF LIFE:

Two years from the delivery. For any use above this limit, please refer to our technical services.

Processing conditions:

- Typical melt temperature (Min / Recommended / Max): 200°C / 240°C / 270°C.
- Typical mold temperature : 25 60°C.
- Drying time and temperature (only necessary for bags opened for more than two hours): 4-6 hours at 65-75°C.

Processing conditions:

- Typical melt temperature (Min / Recommended / Max): 210°C / 220°C / 230°C.
- Drying time and temperature (only necessary for bags opened for more than two hours): 4-6 hours at 65-75°C.

PROCESSING	Headquarters:	
Injection Molding, Other Extrusion	Arkema France 420 rue d'Estienne d'Orves 92705 Colombes Cedex France T +33 (0)1 49 00 80 80 hpp.arkema.com Arkema Inc. – High Performance Polymers 900 First Avenue King of Prussia, PA 19406 Tel.: +1 610 205 7000 hpp.arkema.com	
DELIVERY FORM		
Pellets		
SPECIAL CHARACTERISTICS		
Heat Stabilized		
REGIONAL AVAILABILITY		
North America, Europe, Asia Pacific, South and Central America, Near East/Africa		

The statements, technical information and recommendations contained herein are believed to be accurate as of the date hereof. Since the conditions and methods of use of the product and of the information referred to herein are beyond our control, ARKEMA expressly disclaims any and all liability as to any results obtained or arising from any use of the product or reliance on such information; NO WARRANTY OF FITNESS FOR ANY PARTICULAR PURPOSE, WARRANTY OF MERCHANTABILITY OR ANY OTHER WARRANTY, EXPRESSED OR IMPLIED, IS MADE CONCERNING THE GOODS DESCRIBED OR THE INFORMATION PROVIDED HEREIN. The information provided herein relates only to the specific product designated and may not be applicable when such product is used in combination with other materials or in any process. The user should thoroughly test any application before commercialization. Nothing contained herein constitutes a license to practice under any patent and it should not be construed as an inducement to infringe any patent and the user is advised to take appropriate steps to be sure that any proposed use of the product will not result in patent infringement.

