# Rulon® 1045

## The following table is a list of typical physical property values for Rulon<sup>®</sup> 1045

Properties	ASTM	Units [Metric]	Value [Metric]				
GENERAL							
Specific Gravity	D792	_	2.11				
Hardness Shore D (nominal)	D676	_	55				
MECHANICAL							
Tensile Strength	D4894	psi [MPa]	3,900 [26.9]				
Elongation	D4894	%	450				
THERMAL							
Flammability	D635	In/min [m/s]	Non- flammable				
RECOMMENDED OPERATING LIMITS							
Maximum Pressure (P)		psi [MPa]	1,000 [6.9]				
Maximum Velocity (V) no pressure	_	ft/min [m/s]	400 [2]				
Maximum PV (P x V)	_	psi x ft/min [MPa x m/s]	10,000 [0.35]				
Minimum Mating Surface Hardness							
Rockwell Scale	_	— Rb25					
Tribological							
Friction – static & dynamic	_	_	0.10 - 0.20				

Coefficient of Thermal Expansion		x 10 <sup>-5</sup> m/m⁰C		x 10 <sup>-5</sup> in/in/°F	
TMA		Cross Direction	Molded Direction	Cross Direction	Molded Direction
78 to 200 °F	26 to 93 °C	9.3	12.2	5.2	6.8

Cross Direction: Parallel to length of molded or extruded rod or tube.

Molded Direction: Perpendicular to length of molded or extruded rod or tube.

#### Features / Benefits

- Excellent ability to elongate in flip seal application
- Increased sealing efficiency
- Resistant to many harsh chemicals
- Compatible with most commercial lubricants

#### **Working Temperature Range**

- 400 °F to + 550 °F
 [- 240 °C to + 288 °C]

#### Color

Dull Gold

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**NOTE**: The data listed here falls within the normal range of properties but should not be used to establish specification limits nor used alone as the basis of design. Saint-Gobain Performance Plastics assumes no obligation or liability for any advice furnished by it or for results obtained with respect to the products.

