

## PRODUCT INFORMATION

# RADILON A RV300RKC 106 NT

### DESCRIPTION

PA66 30% glass fiber reinforced injection moulding grade. Heat stabilized. Natural colour.

Suitable for parts requiring high stiffness and good mechanical resistance. Good resistance to hydrolysis. Product specifically intended for applications in civil and industrial water management sector. Suitable and approved for drinking water and foodstuff contact.

ISO 1043: PA66-T GF30

REGIONAL AVAILABILITY: North America, Europe, Asia Pacific, South and Central America, Near East/Africa

### MATERIAL HANDLING AND PROCESSING

The material is delivered in moisture-proof packaging ready for processing. Maximum recommended water content for best processing is 0.15%. Typical conditions with a desiccant drier: temperature 80 ° C, dew point -20 ° C or below, time 2-4 h or more. Special care must be taken to avoid moisture absorption and contamination with other polymers when adding regrind material. Colour variation and mechanical properties reduction may occur and should always be carefully monitored.

#### Injection Molding Processing Parameters

Melt Temperature  
280 - 300°C

Mold Temperature  
80 - 100°C

Injection Speed  
medium-high

### PRODUCT SAFETY AND APPROVALS

For safety instruction please refer to Material Safety Data Sheet

ROHS compliant 2011/65/UE and following amendments

Underwriters Laboratories Inc. certified material. File number: E116324 [www.ul.com](http://www.ul.com)

Suitable for use in contact with food and potable water. Please get in contact with our Customer Service for further information.

This material grade meets the requirements of: BS 6920-1:2000 (Water Regulation Advisory Scheme "WRAS"), KTW Guidelines and DVGW-Standard W270 (11/2007)

## TECHNICAL DATA SHEET

# RADILON A RV300RKC 106 NT

PROPERTY	STANDARD	UNIT	VALUE	DAM*	Cond**
<b>PHYSICAL PROPERTIES</b>					
Density				1360	
Moulding shrinkage - Parallel / Normal	300 / 90 / 60 <sup>[1]</sup>	ISO 1183	kg/m <sup>3</sup>	0.3 / 1.0	
Water Absorption, immersion at 23°C	2mm	ISO 294-4	%	6.2	
Moisture Absorption 23°C - 50%RH	2mm	ISO 62	%	1.6	
<b>MECHANICAL PROPERTIES</b>					
Tensile Modulus	1mm/min	ISO 527-2/1A	MPa	9800	7500
Stress at Break	5mm/min	ISO 527-2/1A	MPa	190	140
Strain at Break	5mm/min	ISO 527-2/1A	%	3.6	6
Flexural Modulus	2mm/min	ISO 178	MPa	8900	
Flexural Strength	2mm/min	ISO 178	MPa	290	
Charpy Impact Strength	+23°C	ISO 179/1eU	kJ/m <sup>2</sup>	90	105
Charpy Impact Strength	-30°C	ISO 179/1eU	kJ/m <sup>2</sup>	75	
Charpy Notched Impact Strength	+23°C	ISO 179/1eA	kJ/m <sup>2</sup>	14	18
Charpy Notched Impact Strength	-30°C	ISO 179/1eA	kJ/m <sup>2</sup>	11	
<b>THERMAL PROPERTIES</b>					
Melting Temperature	10°C/min	ISO 11357-1/-3	°C	260	
Heat Deflection Temperature	1.80 MPa	ISO 75/2Af	°C	245	
Heat Deflection Temperature	0.45 MPa	ISO 75/2Bf	°C	255	
Vicat Softening Temperature	50°C/h 50N	ISO 306	°C	250	
<b>FLAMMABILITY PROPERTIES</b>					
Flammability	0.8mm	UL 94	class	HB	
Glow Wire Flammability Index	2mm	IEC 60695-2-1/2	°C	700	
Automotive Interior Flammability	3mm	ISO 3795	mm/min	0	
<b>ELECTRICAL PROPERTIES</b>					
Volume Resistivity	500V	IEC 60093	Ohm*m	1E13	1E11
Surface Resistivity	500V	IEC 60093	Ohm	1E12	1E10
Comparative Tracking Index	Sol.A	IEC 60112	-	550	

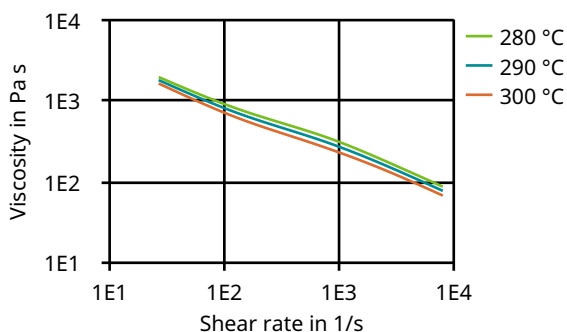
\*: DAM = Dry As Moulded state according to ISO 16396-2 \*\*: Cond = Conditioned state similar to ISO 1110 1: Melt Temperature [°C] / Mold Temperature [°C] / Cavity Pressure [MPa]

## TECHNICAL DATA SHEET

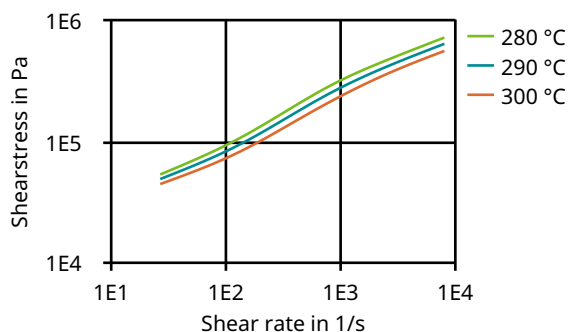
# RADILON A RV300RKC 106 NT

## Diagrams

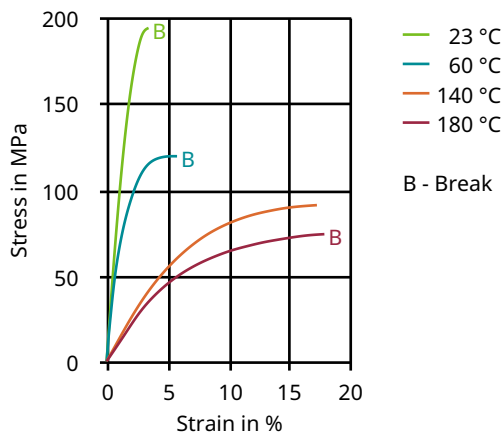
## Viscosity-shear rate



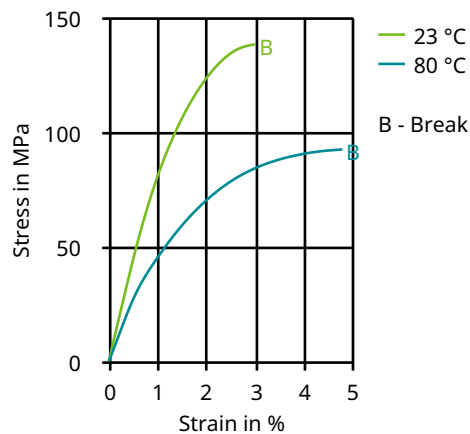
## Shearstress-shear rate



## Stress-strain (dry)



## Stress-strain (cond.)



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Secant modulus-strain (dry)

Secant modulus-strain (cond.)

