

TECHNICAL DATA SHEET

## TECHNYL A 256P1 BK 2N

TECHNYL A 256P1 BK 2N is an unfilled polyamide 66, impact modified for injection moulding. This grade offers an excellent impact resistance at ambient and low temperature and a high flexibility.

### General

Certifications	RoHS	EC 1907/2006 (REACH)
Polymer type	PA66	
Feature	high impact resistant	low temperature impact resistant
Applications	consumer applications industrial applications	fasteners
Colors available	black	
Forms	pellets	
Processing technology	injection moulding	

### Product identification

ISO 1043 abbreviation	PA66
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Condition	Standard	Unit	Value
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### Physical properties

	Condition	Standard	Unit	Value
Density		ISO 1183	g/cm <sup>3</sup>	1.07
Water absorption	24 hr, 23°C	ISO 62	%	0.7

	Condition	Standard	Unit	Value
<b>Mechanical properties</b>				<b>dam / cond.*</b>
Tensile modulus	1 mm/min	ISO 527-1/-2	MPa	950 / -
Stress at break		ISO 527-1/-2	MPa	40 / -
Strain at break		ISO 527-1/-2	%	250 / -
Charpy impact strength, -30°C	-30°C	ISO 179/1eU	kJ/m <sup>2</sup>	60 / -
Charpy notched impact strength, +23°C	+23°C	ISO 179/1eA	kJ/m <sup>2</sup>	70 / -
Charpy notched impact strength, -30°C	-30°C	ISO 179/1eA	kJ/m <sup>2</sup>	9 / -

\*: **conditioned according to ISO 1110**

	Condition	Standard	Unit	Value
<b>Thermal properties</b>				
Melting temperature, 10°C/min		ISO 11357-1	°C	262
Temp. of deflection under load, 0.45 MPa	0.45 MPa	ISO 75	°C	105
Temp. of deflection under load, 1.80 MPa	1.80 MPa	ISO 75	°C	44

	Condition	Standard	Unit	Value
<b>Burning behaviour</b>				
Flammability, 0.75 mm	0.75 mm	UL 94		HB
Flammability, 1.5 mm	1.5 mm	UL 94		HB
Burning rate, FMVSS, Thickness 1 mm		FMVSS 302		<100 mm/min

	Condition	Standard	Unit	Value
<b>Electrical properties</b>				
Dielectric strength	1 mm	IEC 60243-1	kV/mm	22.0

<b>Processing conditions</b>				
Drying temperature/time	80 °C			
Suggested max moisture	0.2 %			

## Processing conditions

Rear temperature	265 - 275 °C
Middle temperature	270 - 280 °C
Front temperature	280 - 285 °C
Recommended mould temperature	60 - 80 °C

## Injection notes

The material is supplied in airtight bags, ready for use. In case that the virgin material has absorbed moisture, it must be dried with a dehumidified air drying equipment, dew point minimum -20°C. Recommended time 2-4h.

## Injection advice

For unfilled polyamides, Domo recommends the use of high alloy steel with a low chromium content. For example: X38CrMoV5-1 (EN Norm) - 1.2367 /1.2343 (DIN Norm). In the case of high requirements on surface quality a mould temperature of up to 120°C can be considered. The processing parameters like processing temperatures are a recommendation and can be adjusted in function of injection machine size, part geometry / design.