

## TECHNYL® A 21T3 V25

Product Datasheet - June 2007

### Description

Flame retardant polyamide 66, reinforced with 25% of glass fibre, heat stabilised, for injection moulding.

### Product Applications

This phosphorus flame retardant grade offers excellent filling qualities and with good mechanical properties. This grade is stabilised to offer a very low migration and corrosion of metallic contacts.

It is particularly suitable for moulding insulating parts for electrical devices:

- connectors,
- contactors,.
- bobbins coil formers,
- thin parts under stress.

This product is available in grey.

### Processing

The material is supplied in airtight bags, ready for use. In the case that the virgin material has absorbed moisture, it must be dried to a final moisture content of less than 0,2% with a dehumidified air drying equipment at approx 80°C.

Recommended moulding conditions:

Barrel temperatures:      - feed zone      260 - 270°C  
                                     - compression zone 270 - 280°C  
                                     - front zone      280 - 290°C

Mould temperatures:      60 at 80°C

For more detailed information, please refer to the technical sheet "Injection moulding".

### Safety

Please refer to the Safety Data Sheet

# TECHNYL® A 21T3 V25

The values of properties are for grey grade.

Properties	Standards	Unit	Values	
			d.a.m*.	Cond.**
<b>Physical</b>				
Water absorption (24 h at 23°C)	ISO 62	%	1	-
Density	ISO 1183-A	g/cm3	1.38	-
Molding shrinkage Parallel (1) (RHODIA-EP)	RHODIA-EP	%	0.5	-
Molding shrinkage normal or perpendicular (1) (Rhodia EP)	RHODIA-EP	%	0.90	-
<b>Mechanical</b>				
Tensile modulus	ISO 527 type 1 A	MPa	8160	5100
Elongation at break	ISO 527 type 1 A	%	2.70	6.20
Tensile strength at break	ISO 527 type 1 A	MPa	136	81
Charpy notched impact strength	ISO 179/1eA	kJ/m2	8	10
Charpy unnotched impact strength	ISO 179/1eU	kJ/m2	65	-
Izod notched impact strength	ISO 180/1A	kJ/m2	8	-
<b>Flamability</b>				
Flammability UL 94 (Thickness 0,8 mm)	ISO 1210/UL 94		V2	-
Flammability UL 94 (Thickness 1,6 mm)	ISO 1210/UL 94		V0	-
Flammability UL 94 (Thickness 3,2 mm)	ISO 1210/UL 94		V0	-
Glow wire flammability index (thickness = 1,6)	IEC 60695-2-12	°C	960	-
Limit Oxygen index	ISO 4589		26.80	-
<b>Thermal</b>				
Melting Temperature	ISO 11357	°C	263	-
Heat deflection temperature, 1,8 Mpa	ISO 75/Af	°C	250	-
Coef. of Linear thermal expansion normal or perpendicular ( 23°C to 85°C)	ISO 11359	E-5 / °C	3	-
<b>Electrical</b>				
Relative permittivity	IEC 60250		4.30	-
Dissipation factor	IEC 60250		0.02	-
Volume resistivity	IEC 60093	Ohm.cm	32E13	-
Surface resistivity	IEC 60093	Ohm	52E12	-
Dielectric strength	IEC 60243	kV/mm	25	-
Comparative tracking index sol. A	IEC 60112	Volt	550	-

## Identification Code :

The information contained in this document is supplied in good faith. It is based on the extent of our knowledge of the products as listed, and on the tests and experiments carried out in our laboratories. It is to be used only as an indication and shall not be construed in any way as a format commitment or warranty of our part. Compliance of our products with your conditions or use can only be determined pursuant to your own prior appropriate list. The listed values of properties are for natural grade, if not otherwise specified.

d.a.m\*.

Cond.\*\*



CHALLENGING BOUNDARIES

Engineering Plastics