

TECAMID 66 GF15 FR black - 型材 (棒材, 板材, 管件)

化學命名

PA 66 (聚醯胺 66)

顏色

黑色 不透明

密度

1.31 g/cm³

添加物

阻燃劑 (無鹵素), 玻璃纖維

主要特色

- 根據FAR 25.853 防火測試
- 低煙排放
- 耐油、潤滑油及燃油
- 高強度
- 良好的機械特性

目標產業

- 航空與航太內裝
- 航空與航太科技
- 機械工程
- 運輸工具

機械特性	參數	值	單位	標準	註解
抗拉強度	50mm/min	54	MPa	DIN EN ISO 527-2	(1) For tensile test: specimen type 1b
彈性模數 (張力測試)	1mm/min	3700	MPa	DIN EN ISO 527-2	(2) For flexural test: support span 64mm, norm specimen.
降伏點抗拉強度	50mm/min	54	MPa	DIN EN ISO 527-2	(3) Specimen 10x10x10mm
降伏點伸長率	50mm/min	7	%	DIN EN ISO 527-2	(4) Specimen 10x10x50mm, modulus range between 0.5 and 1% compression.
斷裂伸長率	50mm/min	7	%	DIN EN ISO 527-2	(5) For Charpy test: support span 64mm, norm specimen.
抗彎強度	2mm/min, 10 N	103	MPa	DIN EN ISO 178	(6) Specimen in 4mm thickness
彈性模數 (彎曲測試)	2mm/min, 10 N	3500	MPa	DIN EN ISO 178	
壓縮強度	1% / 2% / 5%	23/42/90	%	EN ISO 604	3)
壓縮模數	5mm/min, 10 N	1600	MPa	EN ISO 604	4)
衝擊強度(Charpy)	max. 7.5J	40	kJ/m ²	DIN EN ISO 179-1eU	5)
衝擊強度(Charpy)	max. 7.5J	4	kJ/m ²	DIN EN ISO 179-1eA	
球壓式硬度		199	MPa	ISO 2039-1	6)
熱特性	參數	值	單位	標準	註解
熔化溫度		261	°C	DIN EN ISO 11357	(1) Found in public sources. Individual testing regarding application conditions is mandatory.
使用溫度	long term	110	°C	-	
使用溫度	short term	180	°C	-	1)
熱膨脹 (CLTE)	23-60°C, longitudinal	5	10 ⁻⁵ K ⁻¹	DIN EN ISO 11359-1;2	
熱膨脹 (CLTE)	23-100°C, longitudinal	5	10 ⁻⁵ K ⁻¹	DIN EN ISO 11359-1;2	
其他特性	參數	值	單位	標準	註解
吸水率	24h / 96h (23°C)	0.36/0.76	%	DIN EN ISO 62	(1) 4 mm test specimen
耐燃性	60 seconds Vertical Bunsen Burner test	pass		AITM 2.0002A	(2) 4 mm test specimen
耐燃性	15 seconds Horizontal Bunsen Burner test	pass		AITM 2.0003	(3) 4 mm test specimen
耐燃性	Specific Optical Smoke Density	pass		AITM 2.0007B	(4) 3 mm test specimen
耐燃性	60 seconds Vertical Bunsen Burner test 25.853 (a) Amdt 25-116 App F Part 1(a)(1)(i)	pass		FAR 25.853	(5) 4 mm test specimen
耐燃性	Gas Toxicity, as Per Airbus directive ABD0031	pass		AITM 3.0005	

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