

Amilan™ CM1023 G 1000 Nylon 6

TECHNICAL DATA

Product Description

Unreinforced

Uses

- Appliance Components
- Camera Applications
- Cell Phones
- Communication Applications
- Computer Components
- Construction Applications
- Displays
- Electrical/Electronic Applications
- Gears
- Office Automation Equipment
- Printer
- Pulleys
- Video Equipment
- White Goods & Small Appliances

Processing Method

- Injection Molding

ISO Designation

- >PA6-XD<

Type

- Nylon6/Abrasion resistance

ASTM & ISO Properties

Physical	Nominal Value	Unit	Test Method
Density (23°C)	1.13	g/cm³	ISO 1183
Molding Shrinkage ¹			Internal Method
Across Flow : 3.00 mm	1.00 to 1.60	%	
Flow : 3.00 mm	0.50 to 0.90	%	
Water Absorption ²			ISO 62
24 hr, 23°C	1.8	%	
Saturation, 23°C	10.5	%	
Mechanical	Nominal Value	Unit	Test Method
Tensile Strength (23°C)	75	MPa	ISO 527-2
Tensile Strain (Break, 23°C)	3.5	%	ISO 527-2
Flexural Modulus (23°C)	2800	MPa	ISO 178
Flexural Stress (23°C)	105	MPa	ISO 178
Taber Abrasion Resistance (1000 Cycles)	6	mg	ISO 9352
Coefficient of Friction - vs. Metal ³	0.10 to 0.15		Suzuki Method
Impact	Nominal Value	Unit	Test Method
Charpy Notched Impact Strength (23°C)	2.5	kJ/m²	ISO 179
Hardness	Nominal Value	Unit	Test Method
Rockwell Hardness (R-Scale, 23°C)	119		ISO 2039-2
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load			ISO 75-2/B
0.45 MPa, Unannealed	182	°C	
Melting Temperature	225	°C	DSC
Coefficient of Linear Thermal Expansion	9 to 10	cm³-5/cm/°C	ISO 11359-2
Flammability	Nominal Value	Unit	Test Method
Flame Rating (1.5 mm, NC)	HB		UL 94

Toray Industries, Inc.

