

Cellulose Acetate Film

Formula: CA

Thickness: 0.1mm

Length 1: 10mm

Length 2: 10mm

Category: Green Production

Type: Biodegradable

Colour: Clear

CAS Number: 9004-35-7

UOM Code: 327-805-46

SKU: 1000001883-group

Product Code: AC31-FM-000100

Material Properties for Polymers

Chemical Resistance

Element	Value
Acids - concentrated	Poor
Acids - dilute	Good-Poor
Alcohols	Fair-Poor
Alkalis	Poor
Aromatic hydrocarbons	Good-Poor
Greases and Oils	Good
Halogenated Hydrocarbons	Good-Poor
Halogens	Poor
Ketones	Poor

Electrical Properties

Element	Value
Dielectric constant @ 1MHz	~5
Dissipation factor @ 1kHz	0.06
Dielectric strength(kV mm ²)	11
Volume resistivity(Ohmcm)	5 x 10 ¹²

Physical Properties

Element	Value
Flammability	HB
Radiation resistance	Fair
Refractive index	1.49
Resistance to Ultra-violet	Fair
Limiting oxygen index(%)	19
Water absorption - over 24 hours(%)	1.9-7
Density(gcm ³)	1.3

Mechanical Properties

Element	Value
Hardness - Rockwell	34-125
Tensile modulus(GPa)	01-Apr
Izod impact strength(J m ²)	100-450
Abrasive resistance - ASTM D1044(mg/1000 cycles)	65
Tensile strength(MPa)	12-110

Thermal Properties

Element	Value
Heat-deflection temperature - 0.45MPa(C)	52-105
Heat-deflection temperature - 1.8MPa(C)	48-86
Lower working temperature(C)	-20
Upper working temperature(C)	55-95
Specific heat(J K ⁻¹ kg ⁻¹)	1200-1900
Thermal conductivity(W m ⁻¹ K ⁻¹)	0.16-0.36@23°C
Coefficient of thermal expansion(x10 ⁻⁵ K ⁻¹)	80-180