

## SHEERGARD® K40C

K40C is a SHEERGARD® microwave transmissive composite designed specifically for use in RF applications. The composite is made of high strength aramid fibers (Kevlar®) and a polytetrafluoroethylene (PTFE) matrix.

The "K" group incorporates the aramid yarns in a 2x2 basket weave for enhanced flexural characteristics and high tear strength.

### Typical Properties

Property	Value	Test Method
Coated Fabric Weight (g/m <sup>2</sup> )	1150 nominal	ASTM D751
Thickness (mm)	0.838 nominal	ASTM D751
Tensile Strength (N/cm) Warp, Fill	1575 min. avg..	ASTM D4851
Tensile Strength, 50lb crease-fold (N/cm) Warp, Fill	1400 min. avg.	ASTM D4851
Trap Tear Strength (N) Warp, Fill	400 min. avg.	ASTM D4851
Coating Adhesion (N/cm)	22.7 min. avg.	ASTM D4851
Uniaxial Elongation at 70 N/cm (%) Warp Fill	0.50 nominal 0.70 nominal	ASTM D4851
Dielectric Constant	2.59 nominal	ASTM D2520
Loss Tangent	0.007 nominal	ASTM D2520
Incombustibility (seconds)	0 to flameout	NFPA 701
Hydrophobic Contact Angle (degrees)	95 nominal	ASTM C813

Nominal values available upon request. Values listed are for virgin roll goods only. Appropriate industry safety factors need to be used to account for the in-service effects of handling, weathering, etc.

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