

ISONOM[®] NKN 2039

Description:

ISONOM[®] NKN 2039 consists of Polyimide film, (e.g. Kapton¹) covered on both sides with uncalendered Nomex¹.

Properties:

ISONOM[®] NKN 2039 is a combined flexible material of thermal classification 180° C (H) with good mechanical properties like high tensile strength and high tear resistance combined with high electrical strength.

ISONOM[®] NKN 2039 is highly flexible and has an absorbent surface.

Application:

ISONOM[®] NKN 2039 is mainly used as a slot liner, slot closure and phase insulation in thermal high stressed electrical motors. ISONOM[®] NKN 2039 is also used as interlayer insulation in transformers and other electrical machines and appliances.

Formats:

Sheets: untrimmed width 965mm, length on request.
Rolls: untrimmed max. width 965 mm
Tapes: from 10 mm width upwards

Storability:

ISONOM[®] NKN 2039 can be stored unlimited under normal conditions (20°C, 50% r. h.).

¹ KAPTON and NOMEX are registered trademarks of DU PONT

Technical Data

ISONOM® NKN 2039					
Properties	Test method	Unit	Value	Value	Value
Nominal thickness		mm	0.25	0.27	0.30
Tolerance	IEC 626	mm	± 0.02	± 0.03	± 0.03
Total substance	IEC 626	g/m ²	147	183	220
Nomex 411	IEC 626	µm	130	130	130
Polyimide film	IEC 626	µm	25	50	75
Nomex 411	IEC 626	µm	130	130	130
Breakdown voltage	IEC 626	kV	≥ 5	≥ 9	≥ 12
Breakdown voltage after folding	IEC 626	kV	≥ 5	≥ 9	≥ 12
Tensile strength MD and TD	IEC 626	N/cm	≥ 35		
Elongation MD and TD	IEC 626	%	≥ 3		
Thermal classification	IEC 216 UL 1446	°C	180 200		

ISONOM® NMN 2035

Description:

ISONOM® NMN 13 2035 consists of PET-film, covered on both sides with uncalandered Nomex

Properties:

ISONOM® NMN 2035 is a combined flexible material of thermal classification 155° C (F) with excellent mechanical properties like high tensile strength and high edge tear resistance combined with high electrical strength.

ISONOM® NMN 2035 is highly flexible and has an absorbent surface.

Applications:

ISONOM® NMN 13 2035 is mainly used as a slot liner, slot closure and phase insulation in the production of low voltage motors.

Besides this ISONOM® NMN 13 2035 is used as interlayer insulation in transformers and other electrical machines and appliances.

Materials:

ISONOM® NMN 13 2035 consists of PET-film, covered on both sides with uncalandered Nomex.

Formats:

Sheets: on request
Rolls: untrimmed approx. 965 mm wide.
Tapes: from 10 mm width upwards

Storability:

ISONOM® NMN 13 2035 can be stored unlimited under normal conditions (20°C, 50% r. h.).

Additional Information:

Additional Technical Data are available in the Productdata Pdf

Technical Data

Type			ISONOM [®] NMN 13 2035			
Properties	Test method	Unit	Value	Value	Value	Value
Nominal thickness		mm	0,25	0,28	0,30	0,45
Tolerance	IEC 626	mm	± 0,04	± 0,03	± 0,03	± 0,04
Total substance	IEC 626	g/m ²	162	197	232	442
Nomex uncalandered		my	130	130	130	130
PET-film		my	50	75	100	250
Nomex uncalandered		my	130	130	130	130
Breakdown voltage	IEC 626	kV	≥ 6	≥ 11	≥ 10	≥ 23
Breakdown voltage after folding	IEC 626	kV	≥ 6	≥ 10	≥ 9	≥ 18
Tensile strength	IEC 626	longitudinal	≥ 75	≥ 200	≥ 120	≥ 340
		transversal	≥ 75	≥ 170	≥ 120	≥ 300
Elongation	IEC 626	longitudinal	≥ 10	≥ 20	≥ 10	≥ 20
		transversal	≥ 10	≥ 20	≥ 10	≥ 20
Thermal classification	IEC 216/UL1446		155/180°C	155/180°C	155/180°C	155/180°C