

UTILEX ENGINEERING PVT. LTD.

Technical Data (Paper Based Industrial Laminates (P2))

GRADE	LPP02 (P2)
COLOUR	Sheets are supplied in natural color, but can be also supplied in Black Color also against specific enquires.
THICKNESS	0.8 MM - 50.0 MM
DESCRIPTION	These are paper Based Laminates confirming to specification as per IS:2036, GRADE P2. These Laminates are having good Mechanical Properties and better Electrical Properties, than P1 and are especially suitable for Power Electrical Industry for High voltage applications at power frequencies. High electric strength under oil. Good electric strength in air under normal humidity.
SIZE	These sheets are supplied in standard size of 2440mm x 1220mm or 1220 x 1220mm or 1220mm x 610 or 610mm x 610mm.
TOLERANCES	Sheets are supplied as per tolerance specified in IS:2036. Material can be supplied with still closer tolerance as per customers requirement.

Properties	Units	Average Test Results	Value As Per IS:2036 -1995
------------	-------	----------------------	----------------------------

Mechanical

Tensile Strength	Kg/cm ²	850	--
Flexural Strength /Cross Breaking strength	Kg/cm ²	1450	1300 Min
Shear Strength	Kg/cm ²	820	700 Min
Impact Strength (Edgewise) (Charpy method)	KJ/m ²	6.2	--
Specific Gravity		1.38	--

Electrical

Insulation Resistance after immersion in water for 24hrs. at 20°C	MegOhms	150	100
ELECTRICAL STRENGTH in oil at 90°C			
* Flat wise (3.0 mm Thickness)	Kv/mm	7.6	6.4
* Edgewise (12.7 mm Thickness)	Kv	30	20

Water Absorption: (Specimen size -50 ± 1 mm square)

* Thickness	mm	0.8	3.0	12.0	25.0
* Maximum Values	mg	125	169	292	397
* Typical Value Results	mg	35	95	156	210

**SPECIFICATIONS MET: BS:2572:GRADE P2/1 /EN 60893-3-4-PF CP203
NEMA:L1-I-1989 GRADE XX
DIN:7735 GRADE HP 2061.5**