



Ddev Plastiks Industries Limited

An ISO 9001:2015 company

TECHNICAL DATA

NATURAL MDPE INSULATION COMPOUND:

KI-IN-0477

DESCRIPTION:

KI-IN-0477 is high molecular weight, Medium density based Insulation Compound, specially formulated for Polyethylene insulated cables. An enriched additive package ensures its thermal stability during processing. KI-IN-0477 has excellent stress crack resistance and tensile properties. It contains metal deactivators to ensure excellent resistance to thermal ageing of insulation cores.

Specification:

Solid Type 03 as per BS: 6234

TYPICAL PROPERTIES:

Properties	Unit	Typical Value	Test Method
Density	g/cm ³	0.938	ASTM-D-792
MFI@190°C,2.16 kg load	g/10 Minutes	0.6	ASTM-D-1238
Oxidation Induction Time	Minutes	> 50	ASTM-D-3895
Tensile Strength at break	MPa	28	ASTM-D-638
Elongation at break	%	1500	ASTM-D-638
ESCR	Hrs	> 48	ASTM-D-1693
Hardness	Shore D	56 - 57	ASTM-D-2240
Oven ageing at 110°C,14Days a) Variation in Tensile Strength b) Variation in Elongation at Break	% %	±20 ±20	IS-10810 Part-11/ IEC 60811-401
Petroleum Jelly absorption @70°C, 14 days as per BS 6234			
Absorption	%	<15	KIIL Internal
Variation in Tensile Strength	%	< 25	IEC 60811-401
Variation in Elongation at break	%	< 50	IEC 60811-401
Volume Resistivity@25°C	Ohm-cm	>1x10 ¹⁵	ASTM-D-257
Di-electric Strength	KV/mm	> 25	ASTM-D-149
Di-Electric Constant @25°C	-	2.3	ASTM-D-150
Dissipation Factor @25°C	-	0.0004	ASTM-D-150

All the above properties have been from compression moulded plaque after 24 hours conditioning.

MKT: TDS – IN/0477 – 08/2023

PREDRYING:

Dehumidified hoper drying at 70°C for 1 to 2 hours prior to extrusion may be used to remove moisture. Specific processing condition depends on type / size of the extruder and cable dimension and output.

PROCESSING CONDITIONS:

Barrel Position	Temperature, °C
Barrel	180-200
Head	200-220
Die	230

PACKING:

25 Kg packed woven sack bags containing inner PE liners, other packing to customer's specific requirements are also available.

STORAGE:

Storage should be in cool and dry place. Bags should be kept on Wooden or plastic pallets.

The information given in the document is believed to be reliable and is given in good faith but without warranty. The user should test the product to ascertain the suitability for the intended use. Product specification or the whole document is subject to change without any prior notice.