



Product Information

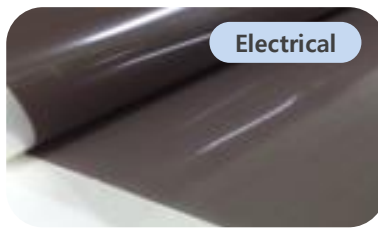
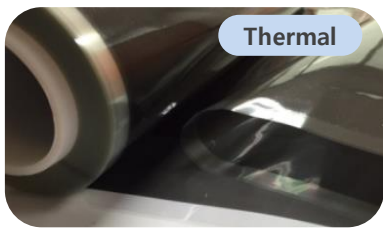
Thermal & Electrical Conductive Tape Series

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Thermal & Electrical Conductive Tape Series

This product family is comprised of thermal conductive tapes, electrical conductive tapes and non-metallic thermal conductive tapes made with conductive liquids mixed with carbon compounds and pure inorganic fillers for each thermal and electrical conductivity. **Thermal conductive tapes** outperforms conventional Graphite+PTE+Copper solutions in cost-efficiency and performance. One of our liquids is used for thermal conductive tapes in Samsung devices. **Electrical conductive tapes** are made of highly pure inorganic fillers and adjustable for customers' need or property of devices. **Non-metallic thermal conductive tapes** are made of highly pure non-metallic fillers for minimizing interference of electric wave and maximizing thermal conductivity in devices.



※ Product images are illustrative purposes only.

Products

Application	Grade	Product No.	Backing	Total Thickness (mm)	Adhesion (gf/25mm)	Characteristics	
Thermal Conductivity	Single-sided	INP-TST 5	PET	0.005	800~1,000	30~50 W/mk (Horizontal)	
		INP-TST 10		0.01			
	Double-Sided	INP-TDT 5		0.005	700~900		
		INP-TDT 10		0.01			
	Inorganic		INP-NDT 10	-	0.01		800~1,000
			INP-NDT 20		0.02		
			INP-NDT 30		0.03		
			INP-NDT40		0.04		
			INP-NDT50		0.05		
			INP-NDT100		0.1		
Electrical Conductivity	Single-sided	INP-EST	PET	0.005~0.05	700~900	Under 50mΩ (Copper 75mm laminated)	
	Double-Sided	INP-EDT		0.005~0.05			
	Inorganic	INP-ENT	-	0.005~0.05	1,000~1,500		
Non-metallic	Single-sided	INP-MST	PET	0.005~0.05	700~900	30~50 W/mk (Horizontal)	
	Double-Sided	INP-MDT		0.005~0.05			
	Inorganic	INP-MNT	-	0.005~0.05	1,000~1,500		

Technical Data

Thermal Conductive Tapes

Property	Typical Values			Test Method
	INP-TST	INP-TDT	INP-NDT	
Color	Gray	Gray	Gray	Observation
Type	Carrier	Carrier	Non carrier	-
Backing	PET	PET	-	-
Adhesive	Acryl	Acryl	Acryl	-
Total Thickness (mm)	0.005, 0.01	0.005, 0.01	0.01, 0.02, 0.03, 0.04, 0.05, 0.1	Digital Guage
Thickness Tolerance (mm)	±0.005	±0.005	±0.005	Digital Guage
Product Size (Length X Wide)	1000mm X 100M	1000mm X 100M	1000mm X 100M	-
Thermal Conductivity (W/mk)	Horizontal	30 ~ 50	30 ~ 50	ASTM E1461
	Vertical	1 ~ 3	1 ~ 3	ASTM E1461
Adhesion(gf/25mm)	300 ~ 500	300 ~ 500	300 ~ 500	ASTM D3330
Tensile Strength (Kg/mm ²)	28	28	- 40 ~ 200	ASTM D882
Working Temperature (°C)	- 40 ~ 200	- 40 ~ 200	- 40 ~ 200	ASTDM D792

※ The test was conducted with no specific purpose, values may vary depending on the methods or condition of measurement

Electrical Conductive Tapes

Property	Typical Values			Test Method
	INP-EST	INP-EDT	INP-ENT	
Color	Brown	Brown	Brown	Observation
Type	Carrier	Carrier	Non carrier	-
Backing	PET	PET	-	-
Adhesive	Acryl	Acryl	Acryl	-
Total Thickness (mm)	0.005 ~ 0.05	0.005 ~ 0.05	0.005 ~ 0.05	Digital Guage
Thickness Tolerance (mm)	±0.005	±0.005	±0.005	Digital Guage
Adhesive Surface Resistance (mΩ)	>50	>50	>50	ASTM D257
Product Size (Length X Wide)	1,000mm X 100M	1,000mm X 100M	1,000mm X 100M	-
Adhesive to steel (180° Peel)	700~900	700 ~ 900	1,000 ~ 1,500	KST 1028
Holding Power (40 °C,1kg, mm)	Max. 3	Max. 3	Max. 3	KST 1028
Working Temperature (°C)	- 40 ~ 200	- 40 ~ 200	- 40 ~ 200	ASTDM D792

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Technical Data

Non-metallic thermal conductive tapes

Property	Typical Values			Test Method
	INP-MST	INP-MDT	INP-MDT	
Color	White	White	White	Observation
Type	Carrier	Carrier	Non carrier	-
Backing	PET	PET	-	-
Adhesive	Acryl	Acryl	Acryl	-
Total Thickness (mm)	0.005 ~ 0.05	0.005 ~ 0.05	0.005 ~ 0.05	Digital Guage
Thickness Tolerance (mm)	±0.005	±0.005	±0.005	Digital Guage
Product Size (Length X Wide)	1000mm X 100M	1000mm X 100M	1000mm X 100M	-
Thermal Conductivity (W/mk)	Horizontal	30 ~ 50	30 ~ 50	ASTM E1461
	Vertical	1 ~ 3	1 ~ 3	ASTM E1461
Adhesion (gf/25mm)	700 ~ 900	700 ~ 900	1,000 ~ 1,500	KST 1028
Heat Resistance (150 °C, mm)	No Creep	No Creep	No Creep	KST 1028
Working Temperature (°C)	- 40 ~ 200	- 40 ~ 200	- 40 ~ 200	ASTDM D792

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Tested Data

NO.	Type	Composition	Thermal Conductivity	Note
1	Material	Copper	235.608	[Cooper] 20µm±5µm [General] 10µm±5µm [Backing] 10µm±5µm
2	Backing	Cooper + Normal double-sided Tape	151.362	
3		Cooper+ Double-sided(Backing) Tape	199.669	
4	Backing	Synthetic Sheet + Normal double-sided Tape	447.813	[Synthetic] 25µm±5µm [General] 10µm±5µm [Backing] 10µm±5µm
5		Synthetic Sheet + Double-sided(Double) Tape	639.341	
6	Backing	Synthetic Sheet + Normal double-sided Tape	843.968	Tested by Samsung
		Synthetic Sheet + Double-sided(Double) Tape	1257.660	
7	Inorganic	Copper + Double-sided (inorganic) Tape	222.993	[inorganic] 10µm±5µm

※ Values may vary depending on the methods or condition of measurement