

# laminates

## CDM DURAPOL 68910

- ▶ Increased temperature resistance : temperatures higher than 300°C.
- ▶ Better flux and chemical resistance.
- ▶ Dissipative material. Surface resistivity 10E5 to 10E9 Ohm/Square.
- ▶ Low deformation.
- ▶ Excellent dimensional stability : good mechanical characteristics.
- ▶ Good machinability.

### General description

CDM DURAPOL 68910 is a composite material made of glass mat, combined with a high mechanical resistance resin system. Static and its companion ESD (electrostatic discharge) damage electronic components and circuits every day. To use CDM DURAPOL ESD will allow charges to move slowly out of the circuit and will ensure the quality of your production. CDM DURAPOL ESD product have guaranteed dissipative characteristics.

The CDM DURAPOL range of products exhibits higher mechanical and resistance properties as standard composite materials. The random glass mat substrate present in the CDM DURAPOL 68910 minimizes delaminations problems during machining or pallet use.

The relative low thermal conductivity in the CDM DURAPOL materials allows quick pallet turnaround eliminating most of the time both the necessity to provide a cooling station and the process heat sink effect experienced in the metallic pallets. CDM DURAPOL materials can substitute metallic solder frames with great advantages.

This product was referenced as Durapol L 200 in the past.

### Description

Flux resistance is depending on composition and pH level. CDM DURAPOL has been developed to have a better withstand towards chemicals. To preserve the stability of CDM DURAPOL material, a regular cleaning can still be made. Due to the high fiberglass content, machining is recommended with carbide or diamond toolings. Precise machining with very accurate tolerances can be achieved by experts in the conception and machining of pallets.

### Application

Full process solder wave, SMT and selective soldering process  
Components insertion  
Silk screen printing of solder paste in SMT  
SMT placement  
Reflow soldering  
Components protection  
Testing of PCBs  
Cleaning of PCB boards

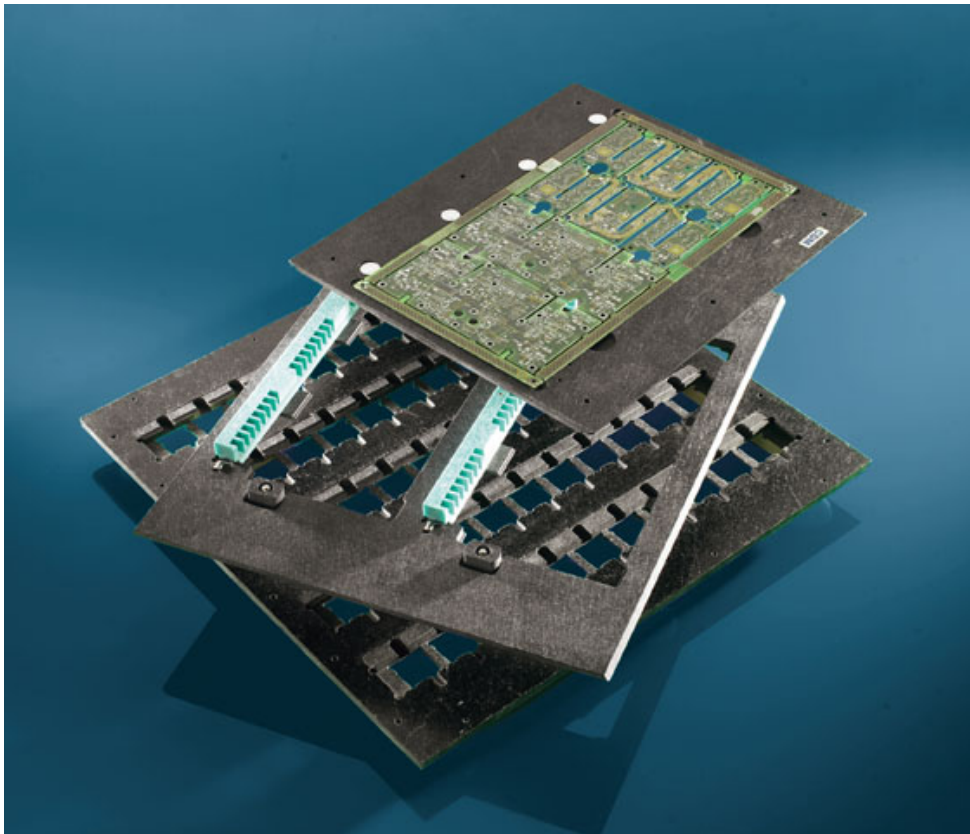
### Availability

Standard sheet size : 2350 +/-10mm x 1335 +/-10mm and 1250x2000mm (please ask for the tolerances)  
Other sheet sizes possible : please consult

Standard thicknesses available on stock: 5mm, 6mm, 8mm, 10mm, 12mm  
Other thicknesses available. Please consult.

Color : black

		Value	Test norm
<b>Mechanical properties</b>			
Flexural strength at 23°C, flatwise	MPa	400	ISO 178
Flexural strength at 150°C, flatwise	MPa	230	ISO 178
Flexural strength at 200°C, flatwise	MPa	≤100	ISO 178
Modulus of elasticity in flexure at 23°C, flatwise	MPa	18000	ISO 178
Modulus of elasticity in flexure at 150°C, flatwise	MPa	13000	ISO 178
Modulus of elasticity in flexure at 200°C, flatwise	MPa	≤7500	ISO 178
<b>Electrical properties</b>			
Surface resistivity	Ohm/square	10E5 to 10E9	IEC 60093
<b>Thermal properties</b>			
Thermal conductivity	W/m.K	0.3	DIN 52612
<b>Physical properties</b>			
Density	g/cm <sup>3</sup>	1.8 ±0.1	ISO 1183
Water absorption 24h 23°C	%	0.15	ISO 62
Linear coefficient of thermal expansion, parallel	K <sup>-1</sup>	10.10E-6	VSM 77110



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