

# DVB-2152 SILICA(HR)



## Non-solvent-based insulation varnish

DVB-2152 SILICA (HR) is an insulating varnish for impregnation that mainly consists of unsaturated polyester resin. It obtained the UL Type R (220 °C) certification. This product includes silica and features outstanding adhesiveness, heat resistance, electrical properties, and thermal conductivity. Especially, it is suitable for current stabilizer products which require high heat resistance and rust resistance.

Usage

For impregnation of both microwave HVT and current stabilizers (REACTOR)

### Specification

Type of varnish	Two-component unsaturated polyester resin		
Product Features	<ol style="list-style-type: none"><li>1. It features outstanding heat resistance. (Type N: 200 °C)</li><li>2. It features outstanding rust resistance.</li><li>3. It features outstanding electrical properties.</li><li>4. It features outstanding adhesiveness.</li><li>5. It features outstanding thermal conductivity.</li></ol>		
Thinner	DTB-7302	Storage stability (25°C) (A + B)	Over 7 days
Exterior	Amber liquid		
Viscosity	15 - 28 seconds (Zahn cup #3)	Curing conditions	1 - 2 hours at 150 - 160 °C
Specific gravity	1.32 ± 0.02	UL-certified	Type N (200 °C)-E93947
Gel time (120 °C)	3 - 5 min.	Storage conditions	Store in a shaded indoor space with sufficient ventilation.
Mixing ratio	A : B = 100 : 1.4 (Weight)	Shelf life	2 months (Summer) or 3 months (Winter) from the manufacturing date

### Product Features (Substance DATA)

Breakdown voltage	Above 7 KV (Twist Pair method, MW-35 Coil)
Volume resistivity	At least $1.0 \times 10^{14} \Omega\text{cm}$

### How to Use

How to Use	<ol style="list-style-type: none"><li>1. Mix evenly after adding the substances according to the designated mixing ratio.</li><li>2. Preheat the substrate at 80 - 120 °C for 10 - 30 minutes to eliminate cutting oil and debris from the substrate.</li><li>3. Maintain the surface temperature of the substrate at 40 - 50 °C.</li><li>4. Impregnate it in well-mixed varnish for 2 - 5 minutes. (Impregnation in the vacuumed state can increase the penetrance.)</li><li>5. Leave until the varnish does not fall off from the substrate (10 - 30 minutes at room temperature).</li><li>6. Dry according to the designated curing conditions.</li></ol>
Caution	<ol style="list-style-type: none"><li>1. Liquid B (hardener) is sensitive to heat. So store it in a refrigerated space.</li><li>2. When the varnish temperature is high, there is a risk of varnish turning into gel. So maintain the varnish temperature inside the tank at below 30 °C.</li><li>3. Instructions above may vary depending on the type of substrate and the painting line conditions</li></ol>

▶ The data shown above were obtained under the laboratory conditions, and the product properties may vary depending on work method and circumstances. Please refer to the property data listed above only as reference.