

# Varnish

## Damicoat® 2404-02 HFP Red

- ▶ High flash point protective coating varnish,
- ▶ Highly resistant to chemical aggressions
- ▶ Excellent antitracking properties
- ▶ High level of anti fungal protection
- ▶ Outstanding behaviour in tropical conditions
- ▶ Class F varnish

### General description

Base : Isophthalic Acid Alkyd Resin

Air or oven drying, red-brown pigmented protective coating varnish.

It exists also in grey colour.

### Application

Coating varnish with high permanent thermal strength as additional protection against dirt and moisture. e.g.

- Impregnated windings
- Housings and laminations
- Printed circuit boards

### Special characteristics :

- High flexibility of the coating
- Resistance to transformer oil
- Resistance to moisture
- Resistance to mould and tropical conditions
- Very good dielectric properties
- High flashpoint, therefore higher safety
- Free of Xylene and Toluene
- Drying at room temperature or at higher temperatures

### Packaging

1, 5, 20 kg cans,  
200 kg drums.

### Processing

Damicoat 2404-02 HFP can be applied with a spray gun, brush or using the quick dip process. The viscosity can be adjusted according to the application using solvent 9114.

Drying of the varnish in thin layer : 20 - 40 micro.m. (DIN 53150)

- dust free at 23°C : 15 - 30 mn
- tack free at 23°C : 5 - 8 h
- can be handled at 23°C : 15 - 20 h
- completely dry at 23°C : 2 - 4 days.
- Surface drying at 70°C : 30 - 60 mn
- Surface drying at 130°C : 10 - 15 mn
- Complete drying at 70°C : 3 - 5 h
- Complete drying at 130°C : 1 - 2 h.

Over-coating ability after drying at 23°C : 1 to 2 days.

|  |                   | Value                     | Test norm             |
|--|-------------------|---------------------------|-----------------------|
| <b>Physical properties</b>   |                   |                           |                       |
| Colour   |                   | Red Brown                 |                       |
| Flash point  | °C                | 37                        | DIN 53213             |
| Density at 23°C  | g/cm <sup>3</sup> | 1.140                     |                       |
| Viscosity at 20°C  | s                 | 63 (cup 5) ± 7            | ISO 2431              |
| Solid content  | %                 | 53 (150°C/1g/30mn) ± 2    | DIN 46449             |
| Diluent  |                   | Damidil 9114              |                       |
| Viscosity (Brookfield) at 23°C   | mPa.s             | 200 ± 20                  |                       |
| <b>Chemical properties</b>   |                   |                           |                       |
| Mould resistance   |                   | Very satisfactory         | ISO 846-B             |
| Water absorption after 96 h in water at 23°C                           | %                 | <1                        |                       |
| Stability in transformer oil after drying for 48 h and stored at 23°C  |                   | No influence after 7 days |                       |
| Stability in transformer oil after drying for 48 h and stored at 105°C |                   | No influence after 7 days |                       |
| <b>Electrical properties</b>   |                   |                           |                       |
| Dielectric strength (50% R.H./ 23°C)                                   | kV/mm             | ≥80                       | IEC 464-2 / DIN 46456 |
| Specific resistivity after 24 h 50 % r.h. at 23°C                      | Ohms.cm           | ≥10 Exp 11                | IEC 464-2 / DIN 46456 |
| Specific resistivity after 96 h storage in water at 23°C               | Ohms.cm           | ≥10 Exp 11                | IEC 464-2 / DIN 46456 |
| Dielectric strength after 24 h storage in water at 23°C                | kV/mm             | ≥40                       | IEC 464-2 / DIN 46456 |
| Dielectric strength after 96 h storage in water at 23°C                | kV/mm             | ≥30                       | IEC 464-2 / DIN 46456 |

#### Health and safety

- . Avoid any contact with skin and eyes,
- . Work in a well ventilated area, far from any flame,
- . Wear safety gloves and goggles.

Refer to the Material Safety Data Sheet for complet information.

#### Storage Conditions

Stored at maximum 25°C, the shelf life is 12 months. Higher temperature can be reached during short period of time. Pigmented varnishes tend to settle and require stirring before use. To prevent a skin forming and loss of solvent, the container must be closed immediately after use.

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