



MERICAN 9406 is a high-performance ISO type unsaturated polyester resin, it has low viscosity and excellent mechanical properties, it is suitable for liquid processes such as vacuum infusion.

It has been certified by Lloyd's Register and China Classification Society, certificate number is MATS/4050/1 and SH13W00078.

## FEATURES

- ◆ Excellent curing performance, it can be completely cured in high heat dissipation environments
- ◆ Excellent mechanical properties, strong inter layer adhesion of composite products

## APPLICATIONS

- ◆ Suitable for fiberglass reinforced plastic (FRP) hull making, such as fishing boats, yachts, lifeboats, etc
- ◆ Suitable for hand lay-up, winding, pultrusion and RTM process for making FRP products reinforced by glass fiber, carbon fiber, etc., such as storage tanks and pipes
- ◆ Suitable for making high temperature resistant FRP products

## LIQUID RESIN PROPERTIES <sup>(1)</sup>

Property	Value	TM
Appearance	Yellow viscous liquid	Visual
Acid value,mg KOH/g	10.0 - 16.0	ISO 2114
Viscosity, cps(25°C)	350 - 550	ISO 2555
Gel Time <sup>(2)</sup> , min	6.0 - 9.0	ISO 2535
Solid Content, %	59 - 65	ISO 3233
Thermal stability, hr (80 °C)	≥ 24	ISO 584

## PROPERTIES OF PURE RESIN CASTING <sup>(1)</sup>

Property	Value	TM
HDT (1.8 MPa), °C	105	ASTM D648
Tensile Strength, MPa	73	ASTM D638
Tensile Modulus, GPa	3.3	ASTM D638
Tensile Elongation, %	2.6	ASTM D638
Flexural Strength, MPa	115	ASTM D790
Flexural Modulus, GPa	3.4	ASTM D790
Barcol hardness	42	ASTM D2583

(1) Typical physical properties, should not be considered as product specifications.

# MERICAN® 9406

(2) Water bath at 25 °C, 100g of resin was added with 2.5% M50 (Akzo-Nobel) and 2.5 % (1% cobalt content of cobalt isooctanoate solution).

## TESTING CONDITIONS

Temperature: 25 °C. Relative moisture: 50 ± 5%.

## PACKING

Net weight 20 Kg / iron drum, 220 Kg / iron drum, 1000 Kg / IBC tank.

## STORAGE

The storage environment should be dry and ventilated. The storage period below 25 °C is 6 months, Improper storage or transportation conditions will cause a shortening of the resin's storage period. The products shall comply with the provisions on the storage, transportation, loading and unloading of hazardous chemicals in the Regulations on the Safety Management of Hazardous Chemicals of the State Council. It is recommended to transport resin by refrigerated truck when the temperature exceeds 35 °C, and transport it at night to avoid direct sunlight.

## MATERIAL SAFETY

A Material Safety Data Sheet of this product is available on request.

## TEST METHODS

Test methods (TM) referred to in the table(s) are available on request.

SINO POLYMER is a leading manufacturer of epoxy vinyl ester resin, unsaturated polyester, epoxy resin, polysulphone, coating and adhesives since year 1958, with its headquarter and plant located in Shanghai Chemical Industry Park, P.R. China. The company's Total Quality Management Gene's guaranty sustainable product & service quality, lead time and competitiveness, as the Safety & Security Management, Improvement Process, R&D and International developments make Sino Polymer a sustainable partner on long term.

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