

GENERAL DESCRIPTION

E40-417 is a low cost, epoxy resin system developed for production casting, potting, encapsulating, and coating applications where easy handling, good flowability and low thermal coefficient of expansion over a wide temperature range is required.

E40-417, with its good exotherm, pot life and pouring characteristics, is especially suited for large mass castings, as well as for other industrial and electronic large-pour applications. It develops excellent adhesion to rigid plastics, laminates, ceramics and metals, has a low coefficient of thermal expansion, and can be readily machined with ordinary shop tools. The fully cured system is a good electrical insulator and is compatible with electrical components, has good resistance to water, weather, gases and vapors, and to many commercial organic and inorganic compounds including mild acids and alkalis, many corrosive salts, jet fuels and petroleum products and lubricants.

APPLICATION

E40-417 is a versatile epoxy casting system that may be cured with a room temperature or elevated-temperature, curing agent. Simply select the catalyst that best suits your requirements.

Catalyst 417A: Room temperature curing. 40 minute pot life in 1 lb mass. Tough and rigid casting to all temperatures to 300°F.

Catalyst 417B: Elevated temperature curing. 4 hours pot life in 5-7 lb mass. Best electrical and physical properties above 250°F. Operating temperature to 400°F.

SPECIFICATIONS**CURED WITH CATALYST E40-417A**

Mix Ratio, Resin to Cat, by Weight: 100:7

Mixed Viscosity @ 25°C cps: 60,000

Recommended Cure: 24 hrs @ room temp

Color: black

Hardness, Shore D: 84

Specific Gravity, 25°C / 25°C: 1.55

Compressive Strength, psi: 15,100

Operating Temperature, °C: 150

Dielectric Strength, volts / mil: 435

Dissipation Factor, 1,000 KHz², 25°C: 0.02

Loss of Weight, 24 hrs @ 125°C: 0.19%

CURED WITH CATALYST E40-417B

Mix Ratio, Resin to Cat, by Weight: 100:8

Mixed Viscosity @ 25°C cps: 25,000

Recommended Cure: 2 hrs @ 220°F

Color: black

Hardness, Shore D: 88

Specific Gravity, 25°C / 25°C: 1.55

Compressive Strength, psi: 16,000

Operating Temperature, °C: 200

Dielectric Strength, volts / mil: 450

Dissipation Factor, 1,000 KHz², 25°C: 0.02

Loss of Weight, 24 hrs @ 125°C: 0.14%