

Technical Data Sheet

Engineering Materials

CONAPOXY® AD-10

One-Component Epoxy Adhesive

ELANTAS PDG, Inc.

1405 Buffalo Street
Olean, NY 14760
USA
Tel +1 716 372-9650
Fax +1 716 372-1594
info.elantas.pdg@altana.com
www.elantas.com

5200 North Second Street
St. Louis, MO 63147
USA
Tel +1 314 621-5700
Fax +1 314 436-1030
info.elantas.pdg@altana.com
www.elantas.com

CONAPOXY® AD-10

Product Description

CONAPOXY® AD-10 is a one-component, 100% solids, elevated temperature cure epoxy adhesive system

Areas of Application

CONAPOXY® AD-10 is a structural adhesive and miniature electronic potting compound ideal for electrical applications up to 150°C / 302°F.

Some applications include bonding and sealing magnet and speaker assemblies, batteries, filters, end cap filling, structural materials, miniature potting, and staking.

CONAPOXY® AD-10 should not be used in excess of 1/8" thickness.

Features and Benefits

- High bond strength
- Good dielectric properties
- Heat cure as low as 93°C / 200°F
- Non-flow paste

Transportation / Storage

Store at or below 25°C / 77°F in a dry controlled environment out of direct sunlight. This material should be suitable for use stored under these conditions in the original sealed containers for four (4) months from the date of shipment.

The shelf life for CONAPOXY® AD-10 may be extended when stored at or below 5°C / 41°F.

Failure to store the product as recommended above may lead to deterioration in product performance.

Health / Safety

Refer to the Safety Data Sheet.

Typical Properties of Material as Supplied

Property	Conditions	Value
Viscosity	25°C / 77°F	Thixotropic, Non-flow
Specific Gravity	25°C / 77°F	1.27
Color		Brown
Flash Point	ASTM D93	>94°C >201°F

CONAPOXY® AD-10

Surface Preparation

High-strength bonds can only be obtained if all surfaces to be bonded are free of moisture, dirt, rust, chemicals, and mold releases. In addition, surfaces to be bonded should be sandblasted, etched, or degreased. See ELANTAS PDG Technical Bulletin *TI-3000 Surface Preparation Guide* for additional information.

Application / Curing Schedule

Cure Temperature	Minimum	Maximum
93°C / 200°F	120 minutes	150 minutes
107°C / 225°F	65 minutes	80 minutes
121°C / 250°F	30 minutes	40 minutes
135°C / 275°F	12 minutes	20 minutes
149°C / 300°F	8 minutes	12 minutes
163°C / 324°F	5 minutes	8 minutes
204°C / 400°F	2 minutes	4 minutes

For bonding, apply CONAPOXY® AD-10 by suitable means adjusting the glue line from 1 to 10 mils. Contact pressure is suitable for most bonding applications.

Typical Physical Properties

Property	Test Method	Conditions	Value	Units
Shore Hardness	ASTM D2240	25°C / 77°F	D 85	
Lap Shear Strength aluminum / aluminum	ASTM D1002	25°C / 77°F	3,000	psi
Operating Temperature	-55°C / -67°F to 150°C / 302°F			

Typical Electrical Properties

Property	Test Method	Conditions	Value	Units
Dielectric Strength	ASTM D149	25°C / 77°F	> 375	volt / mil
Dielectric Constant	ASTM D150	1 kHz @ 25°C / 77°F	4.0	
Dissipation Factor	ASTM D150	1 kHz @ 25°C / 77°F	0.006	

The above properties are typical values and are not intended for specification use.

ELANTAS PDG, Inc. warrants the chemical composition of its products within stated tolerances, but does not guarantee that a product will be appropriate for any particular application. Any recommendation, performance of tests or suggestion is offered merely as a guide and is not a substitute for a thorough evaluation by the user. No representative of ELANTAS PDG, Inc. has the authority to offer a warranty that a product will perform satisfactorily in manufacturing an article and no such representation should be relied upon.

The user may forward, distribute, and/or photocopy this document only if unaltered and complete, and should refrain from any unauthorized use. This document may not be copied to a website without specific authorization from ELANTAS PDG, Inc.