L&L Products

TECHNICAL DATA SHEET

SOLUTION
L&L Bond

VERSION
August 2021

PR-0100

Aerospace primer for polyamide prior to adhesive bonding.

QUALIFIED TO AIRBUS AIMS 10-15-006

PRODUCT DESCRIPTION

L&L Bond PR-0100 is an epoxy-based two-component, heat-curing primer designed to prepare polyamide (PA66, PA6, PA12, etc.) for bonding. This product is available in 1liter kits.

L&L Bond PR-0100's key product attributes include high adhesion on polyamide, indefinite shelf life for primed polyamide parts, if stored properly, is REACH compliant and has no CMRs.

The substrate coating process is also quick and easy.

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Technical Data

	PR-0100	Part A	Part B
Typical Properties	Color	Black liquid	Low viscosity yellow liquid
	Mix Ratio (by weight)	48	100
	Mix Ratio (by volume)	33	100
	Density (ISO 2811)	1.15 kg/L, [9.60 lb/gal]	0.85 kg/L, [6.76 lb/gal]
	Mixing Time	5 min approx.	
	Service Temperature	-55 to 85°C, [-67 to 185°F]	
	Curing Conditions[1]	12±2min @ 100±5°C, [212±9°F]	
		125±5min @ 65±5°C, [150±9°F]	
		Results	Test Method
Properties in Mixed Condition	Color	Black	Visual
	Work life (pot life)	≤ 90 min in a closed container	ISO 10364
	L&L Seal PA Primer		Test Method
Mechanical Properties[2]	Lap Shear Strength on Al/PA+primer/Al @ -55°C [67°F]	6 MPa [870 psi]	ISO 4587
	Lap Shear Strength on Al/PA+primer/Al @ 23°C [75°F]	7 MPa 1,015 psi]	ISO 4587
	Lap Shear Strength on Al/PA+primer/Al @ 85°C [185°F]	3.6 MPa [522 psi]	ISO 4587
	Lap Shear Strength on Al/PA+primer/Al @ 23°C [75°F] after heat ageing (dry-heat) @ 85°C [185°F]	7 MPa [1,015 psi]	ISO 4587
	Lap Shear Strength on Al/PA+primer/Al @ 55°C [67°F] after ageing cycles 3 x 24h @ 70°C, [158°F] / 95% R.H.	6 MPa [870 psi]	ISO 4587

Shelf Life & Storage Conditions

Shelf Life: 48 months if stored between 15 to 25°C, [59 to 77°F], at less than 70% R.H. in original packaging. Primed parts have an indefinite open-time when stored according to these conditions. Keep parts free from dust, and out of direct sunlight.

Special Handling: This material should be stored in non-flammable storage. Keep away from direct sunlight and all sources of heat and ignition. Keep properly sealed when not in use. If Part A crystallizes during storage, it can be restored by warming the material to 50°C, [122°F] for 3h while stirring.

Application

General: The following recommendations are for informational purposes only. Before attempting any bonding application users should test adhesion to the surface using their specific material and application. Any applications involving critical or serial production should consult L&L Products Technical Service & Support Staff.

Surfaces must be clean, dry; and free of dust, debris, and any loose oxides or coatings. Heavy oils and grease must be removed. Clean surfaces thoroughly using a general purpose industrial organic solvent. Consult L&L Products Technical Service & Support staff.

Mix the material manually and apply with a paint brush or roller, but do not use absorbant foam brushes or rollers.

The primer shall be applicated to both surfaces as a uniform thin layer. Make sure to close the lid immediately after use, the product may gel if the packaging is left open for extended periods.

Shake well before using.

Health & Safety

Avoid contact with skin and eyes. Consult product-specific Safety Data Sheet.

1. Other curing conditions should be tested before use. The data should be considered typical, and not for specification purposes.
2. Tested Substrates: Etched Aluminum 2024T3 - thickness 1.6mm. Primed Polyamide (PA6) - thickness 2mm. L-9107 2-Component Epoxy Adhesive - thickness 125µm.