

IRS 2125 High Performance Flexible Epoxy Adhesive



Description

Also available to buy online at [!\[\]\(666e09182d4cd268646ea700ea60dcdf_img.jpg\)](#) **SHOP** 

IRS 2125 Flexible Epoxy Adhesive is a high performance black resin system. Its combination of flexibility and high adhesive strength lends itself to many high technology bonding, sealing and insulating applications. A two part system with a simple 1:1 mix ratio, it is supplied in a convenient side-by-side double syringe cartridge, complete with static mixing nozzles. Common applications include sealing electronic connections and elevated temperature bonding.

“The IRS2125 epoxy adhesive, performed beyond expectations when applied to seal high pressure hydraulic fluid in a plastic fitting which had sheared. The epoxy set extremely well and passed pressure tests such that it was deemed to be suitable as a permanent seal of the hydraulic system. I would recommend this product as it set rapidly to create an excellent seal and performed well, solving issue with leakage of hydraulic fluids.” – Ian Ross, GMX

Features & Benefits

- Excellent flexibility giving high shear and peel strength
- Tough bonds withstand vibration and flex

IRS 2125 High Performance Flexible Epoxy Adhesive



- Outstanding chemical and fluid resistance, including moisture, diesel and fuel oils, hydraulic fluid
- Will bond metal, glass, wood, rubber and many plastics, including cable insulations and connector backshells, heat-shrink material
- Will operate at temperatures of up to 150°C
- Can seal to IP68, continuous immersion
- Supplied in 50ml cartridge for easy application
- Long shelf life – 18 months from date of manufacture

Applications

- Cable harness assemblies, wiring, cable joints & terminations, heat-shrink sealing
- Electronics
- Structural bonding
- Downhole and oil well operations

“It is nice to use because you don’t have to pre-mix it, and it has a convenient cure time. The tiles have been solid as a rock. It’s obviously the best!” – Carrie Reichardt, Artist

Specifications

IRS 2125 High Performance Flexible Epoxy Adhesive



Specification		
Mix ratio	1:1 resin to hardener	
Mixed viscosity	~ 100,000 cps	
Colour	Black	
Specific gravity	1.3	
Pot life	90 minutes @ 23°C	
Cure schedule	Bondline temperature	Time
	23°C	24 hours – handling strength
	23°C	7 days – full cure
	85°C	2 hours – full cure
Cured properties (Measurements taken @ 23°C)		
Hardness, Shore D	50-65	

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Specification	
Temperature range	-75 to 150°C 200°C possible depending on substrate
Elastic modulus	@25°C – 350MPa @50°C – 90MPa @75°C – 30MPa @100°C – 30MPa @125°C – 30MPa
Lap shear strength (Al/Al)	20MPa
Peel strength (XPLE/XPLE)	370N/25mm
Peel strength after thermal shock (4hrs @ 215°C)	370N/25mm
Dynamic shear (boot/cable shell size 22)	520N
Solvent resistance (de-icing fluid, petrol, oil, hydraulic fluid)	Excellent
Dielectric strength	408 volts/mil
Surface resistivity	5.5 x 10 ¹⁶ ohm/sq @ 500 volts DC

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Specification	
Volume resistivity	1.9 x 10 ¹² ohm.cm @ 500 volts DC
Thermal conductivity	0.4 W/mK

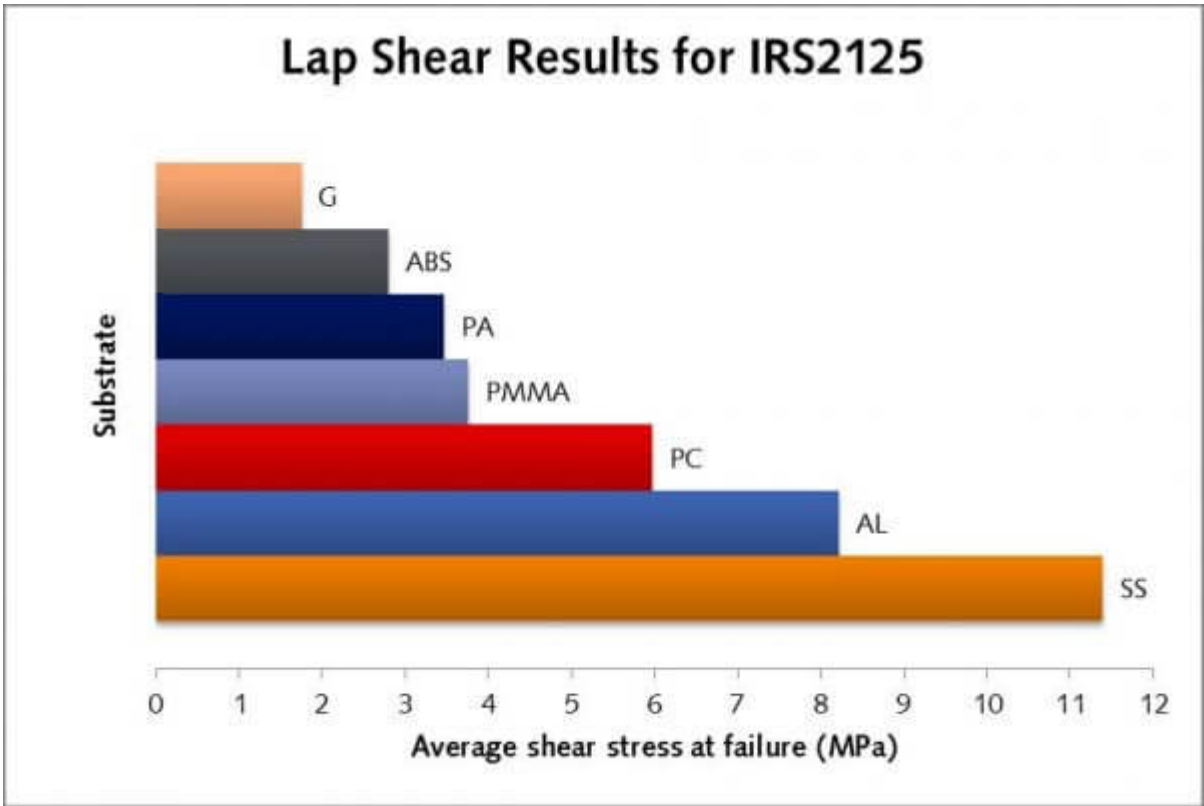
Lap shear results

Material	Shear stress at failure (MPa)	Mode of failure
Stainless steel	11.4	Adhesion
Aluminium 6082 T6	8.2	Adhesion
Polycarbonate	6.0	Cohesive substrates &/or adhesion
PMMA	3.8	Adhesion
Nylon 6/6	3.5	Adhesion
ABS	2.8	Adhesion

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Material	Shear stress at failure (MPa)	Mode of failure
Glass	1.8	Cohesive substrate



Lap shear results for IRS 2125

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Safety Data Sheets

For the latest SDS for this product, please e-mail msds@intertronics.co.uk

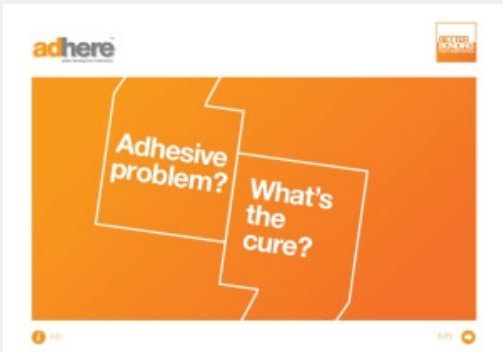
Other Information

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[Structural Adhesives Selector Guide](#)

Start your adhesive selection process by reading our Structural Adhesives Selector Guide, detailing different chemistries and material specifications.



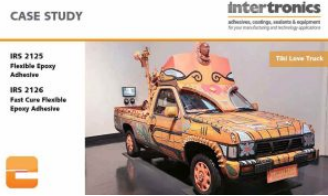
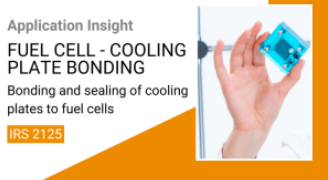
[Adhesive Problem? What's the Cure?](#)

A guide to adhesive bonding, considering structural bonding and the criteria involved for successful assembly.

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See how the **IRS 2125** works as part of a real application in these adhesive [Case Studies](#):

 <p>CASE STUDY</p> <p>intertronics adhesives, coatings, sealants & substrates for construction and manufacturing applications</p> <p>IRS 2125 Flexible Epoxy Adhesive</p> <p>IRS 2126 Fast Cure Flexible Epoxy Adhesive</p> <p>Tiki Love Truck</p>	<p>Flexible epoxy adhesive gives strength and durability to mosaic art</p> <p>British artist Carrie Reichardt relies on our structural adhesives to ensure a strong bond in her creative pieces.</p>
 <p>Application Insight</p> <p>FUEL CELL - COOLING PLATE BONDING</p> <p>Bonding and sealing of cooling plates to fuel cells</p> <p>IRS 2125</p>	<p>Application Insight – Cooling Plate Bonding</p> <p>Bonding and sealing of cooling plates to fuel calls using IRS 2125.</p>

Our [Technical Bulletins & Articles](#) page has links to:


- Technical Bulletin: [Instructions: 50ml Side-by-Side Double Syringe Cartridges](#)

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Ordering Information

IRS 2125 is available in a convenient side-by-side double syringe cartridge.

Part number	Description
IRS2125-50G 	Flexible Epoxy Adhesive, 50 gram double syringe cartridge
IDM805001	Dispensing Gun
IDM2N10	Static Mixing Nozzle (pkg 10)

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Part number	Description
<div>IRS2125-50KIT</div> <div><div>SHOP </div></div>	<div>Flexible Epoxy Adhesive Kit</div> <div>Contains 50 gram cartridge of epoxy, a Syringe Gun and three static mixing nozzles</div>

The IRS 2125-50KIT contains a 50 gram cartridge of epoxy, a [Syringe Gun](#) and three static mixing nozzles. It is ideal for product evaluations or small quantity users.

Storage: Store in the original unopened containers under cool dry conditions between 15° and 25°C.

Let’s start by talking about your application

IRS 2125 High Performance Flexible Epoxy Adhesive



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orders@intertronics.co.uk

- Name*
- Company*
- Phone*
- Email*
- Post code*

If you're in the UK, knowing your postcode would help us get in touch even more quickly. If you're outside the UK, please indicate your country.

-
- Tell us about your application

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