

# **Optimax® Epoxy Resins**

Driving Industry standards, Optimax<sup>®</sup> next generation epoxy resin systems are based on proven chemistries.



### **Optimax® Structural Bonding Epoxy Resins**

We offer a complete line of two-component epoxy resin adhesives for structural bonding, potting and encapsulation applications. Below is a list of our front line grades. Custom formulation and packaging options are available upon request.

Optimax®	Packaging	Colour	Working Time min	Fixture Time min	Hardness Shore D	Application
150-CL	50ml 400ml	Clear	4-6	10-15	78-80	All purpose high strength adhesive with a 5 minute working time. Excellent adhesion to a wide variety of substrates.
300-CL	50ml 400ml	Clear	25-30	50-60	78-80	All purpose high performance adhesive with 30 minute working time. Excellent adhesion to a wide variety of substrates.
120-HP	50ml 400ml	Grey	20-30	120-180	78-80	High performance industrial, assembly and manufacturing epoxy adhesive.
140-RT	50ml 400ml	Off-White	60-70	160-180	85	Rubber toughened epoxy, high strength with high peel and shear properties.
141-MR	50ml	Metallic Grey	4-6	12-15	78-80	Quick me tal repair and assembly adhesive with very high strength properties.
589-SE	50ml 400ml	Black	60-90	185-200 min	78-80	Structural epoxy resin. High performance manufacturing epoxy resin for multiple manufacturing applications.

# **Optimax® UV Cured Epoxies**

Optimax <sup>©</sup>	Packaging	Viscosity Cps	Cure - Nm	Application
8046-LV	30ml 1 Litre Bulk	500	365	Optimax® 8046-LV is a fast curing, low viscosity, UV curable epoxy adhesive designed for bonding a wide variety of substrates including engineering plastics, glass, acrylic and ceramics.  Optimax® 8046-LV bonds in seconds under UV light and provides tough impact resistant adhesion to both flexible and rigid substrates.



#### Optimax® Epoxy Resins – Potting & Encapsulation

Optimax® epoxies are widely used for the encapsulation or potting of electronic components and structural bonding applications. The epoxy specification will depend on the type of component being encapsulated, potted or bonded and the performance requirements for the finished component. The performance of the potted or encapsulated component in terms of, for example, thermal conductivity, shrinkage, dielectric strength will be directly related to the product formulation.

Optimax®	Colour	Packaging	Working Time min	Open Time min	Hardness Shore D	Self Leveling	Application
815-PE	Clear	50ml 400ml	3-5	12-13	79	Yes	High performance epoxy resin used for potting and encapsulating electronic components. Formulated to exhibit superior chemical and environmental resistant properties. Used for potting and encapsulating switches, connectors, plugs, electronic components, solar panel assemblies, ballasts etc. Customised low viscosity formulation designed to flow around intricate and complex components. Short working time.
830-PE	Clear	50ml 400ml	20-30	54-58	78	Yes	Epoxy resin used for potting and encapsulating electronic components. Formulated to exhibit superior chemical and environmental resistant properties. Used for potting and encapsulating switches, connectors, plugs, electronic components, solar panel assemblies, ballasts etc. Customised low viscosity formulation designed to flow around intricate and complex components. Medium working time.
855-PE	Black	50ml 400ml	60-80	180-220	85	Yes	A potting and encapsulation compound with good electrical properties. Suitable for a wide range of potting, protection, coating and encapsulation applications.
894-PE	Black	50ml 400ml	60-70	175-200	79	Yes	Long open time potting and encapsulation epoxy resin. Superior chemical and resistance characteristics. Suitable for a wide range of manufacturing applications.

#### Optimax® Epoxy Resins - Heat Cure

Optimax®	Colour	Packaging	Working Time min	Hardness Shore D	Application
8517	Black	50ml 400ml Bulk	RT: 24 hours 2 Hours @ 65°C 30 Minutes @ 125°C	76	Optimax® 8517 is an Epoxy-Urethane Hybrid material designed to be used as an encapsulant for small electronic devices providing robust resistance to impact across a wide temperature range. Supplied as a 2:1 volume mix for easy dispense from side by side cartridges or meter mix & dispense equipment. It can be cured at room temperature or with heat for rapid processing.  The cured hybrid polymer demonstrates resistance to chemicals and can withstand prolonged immersion in water.
835-PE	Optically Clear	50ml 400ml Bulk	RT: 24 hours 3 hours at 65 °C	86	Optimax 835-PE is an ultra-clear, 2-component epoxy material designed for electronic, optical, medical, and general potting applications and for the casting of small electrical components. This epoxy system has a 2:1 mix ratio by volume. The cured adhesive gives high impact, high clarity and excellent bond strength to a wide range of substrates. It can be used for bonding glass, metals, woods and some plastics.

## Optimax® Epoxy Resins – Fibre Optic Grade Epoxy Adhesive

Optimax®	Colour	Packaging	Working Time min	Hardness Shore D	Self Leveling	Application
8154	Amber	50ml 400ml Bulk	30 minutes @ 120°C 5-10 minutes @ 150°C	92	Yes	Optimax 8154 is a low viscosity, high Tg, two-component epoxy that can be used for potting, encapsulating or bonding. Designed for use in the medical, optical and semiconductor industries.  Optimax 8154 has excellent high temperature resistance at 300°C and excellent solvent, chemical and moisture resistance including gamma rays, autoclave, and ETO. It is an excellent choice for semiconductor applications including capillary under fill or flip chip die attach.





# Innovative formulations based on proven chemistries.















Novachem Corporation Ltd U4 Dunboyne Industrial Estate Dunboyne Co. Meath Ireland

Tel: 00353-1-802-6554

Email:

sales@novachem.ie technicalservices@novachem.ie info@novachem.ie

www.novachem.ie

Novachem Corporation UK 86 – 90 Paul Street London EC2A 4NE England

Tel: 0044 (0) 20 8144 2098

Email:

sales@novachem-uk.co.uk technicalservices@novachem-uk.co.uk info@novachem-uk.co.uk

www.novachem-uk.co.uk