



chemical-concepts.com

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## Maintenance, Repair and Overhaul Systems





# Maintenance, Repair and Overhaul Systems

Devcon products are the result of 50 years' experience, all developed to be easily and safely applied by your own personnel. They provide effective solutions throughout industry and even at sea. They are used extensively in plant facilities and equipment MRO, for emergency repairs and in OEM applications, particularly in the heavy engineering, automotive, construction and shipping industry sectors.

**DEVCON PRODUCTS AND SYSTEMS INCLUDE**

- Metal filled epoxy alternatives to welding and brazing
- Systems for rubber and conveyor belt repairs
- Repairs to all different metals, plastics and ceramics
- Protective coatings to reduce abrasion

- High strength adhesives for industrial bonding
- Easy to use systems for floor repairs and protection
- Fast and precise tooling and mould making resins

**DEVCON SOLUTIONS**

- Extend the life of your machinery
- Reduce and prevent costly downtime
- Increase your productivity
- Make prototyping easy
- Make safe and secure bonded assemblies
- Have local technical advice, support and training
- Available from an extensive distribution network



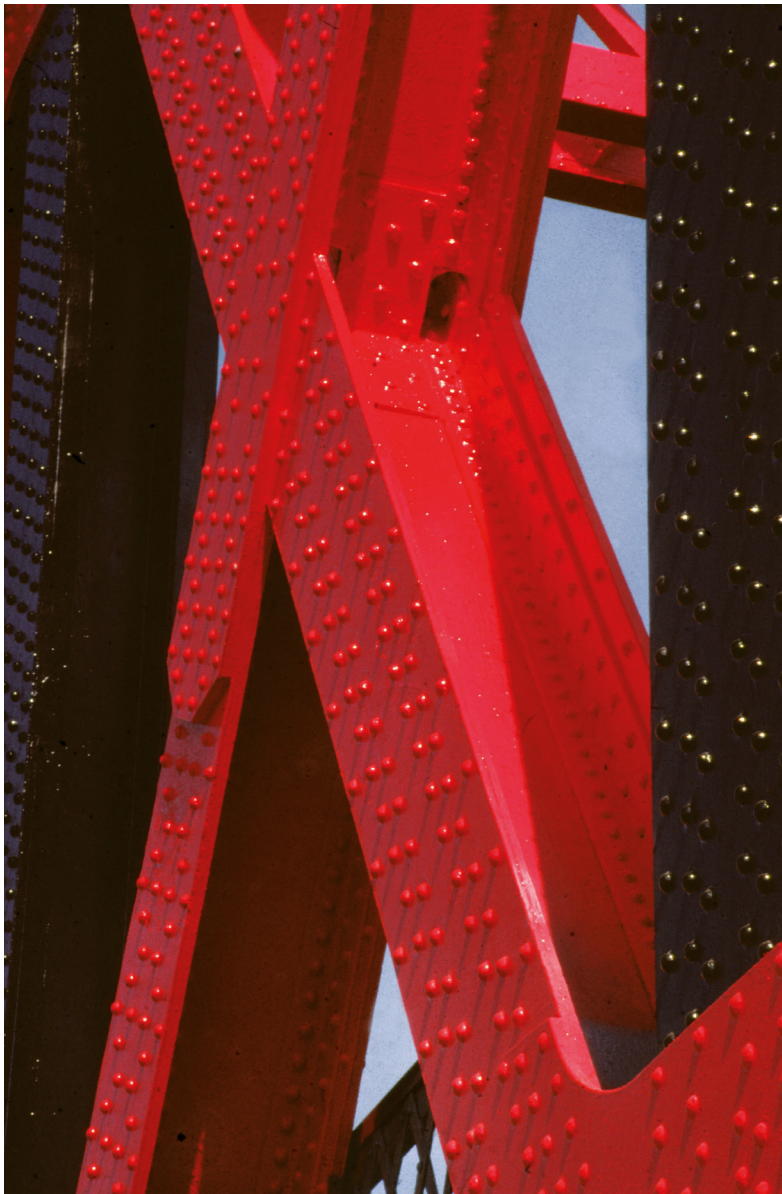
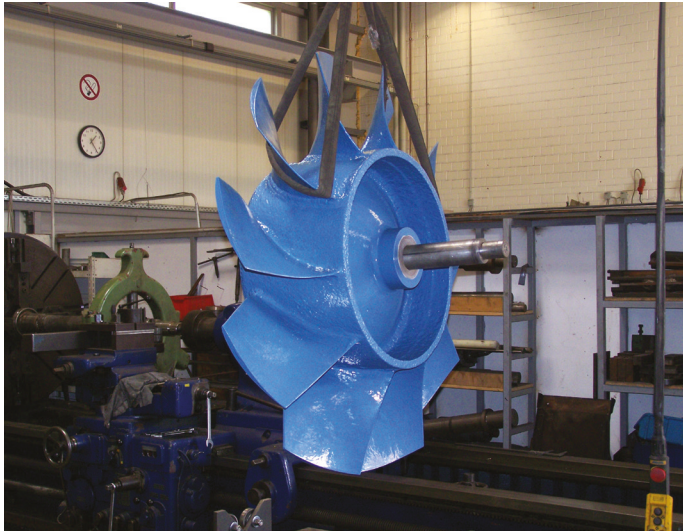
# Worldwide Technology and Market Leaders

Devcon is known throughout the world as the technology and market leaders in products for plant maintenance, repair and overhaul operations, including all types of industrial high strength bonding applications.

This brochure shows only a small and representative selection from the extensive Devcon range – for further information, technical support and training for your personnel, please visit our website, contact our distributors or the Devcon Technical Service Centres. Our dedicated and practically experienced technical service team will be pleased to assist you.

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# Metal Filled Epoxy Systems

Devcon metal filled epoxy putty systems make fast, economic and fully compatible repairs to different metallic components including steel, stainless steel, aluminum and bronze etc, reducing downtime and returning you to full operation within hours.

Devcon metal filled epoxy liquid systems have excellent flow properties allowing accurate and detailed reproduction over existing components. They cure at room temperatures, have excellent chemical resistance and include products for dry operating temperatures of up to 175°C and for application down to 4°C.



Devcon® Bronze Putty (BR)

Bronze filled epoxy putty for repairing bronze and brass machinery parts.

- Used on castings, brushes and shafts when brazing is not possible
- Easily machined, tapped and drilled
- Dry service temperature up to 120°C

Size:500 g

Product code:10261

Devcon® Titanium Putty (HP)

Smooth, titanium reinforced epoxy putty for making repairs that can be precision machined.

- Provides abrasion and chemical resistant surfaces
- Repairs and rebuilds worn pumps, shafts, impellers etc.
- Dry service temperature up to 175°C

Size:500 g1 kg

Product code:1076110765

Devcon® Aluminum Putty (F)

Aluminum filled epoxy putty for cost effective repairs to aluminum castings, components and equipment.

- Bonds to other metals and most rigid plastics
- Resistant to CFCs and many other chemicals
- Dry service temperature up to 120°C

Size:500 g

Product code:10611

Devcon® Aluminum Liquid (F-2)

Aluminum filled pourable epoxy liquid for making moulds and reproducing the fine details of patterns and fixings.

- Cost effective moulds
- Good thermal conductivity
- Dry service temperature up to 120°C

Size:500 g

Product code:10711

Devcon® Stainless Steel Putty (ST)

Stainless steel filled epoxy putty for patching, repairing and rebuilding stainless steel and non ferrous equipment.

- Used for rust free patching and rebuilding
- Bonds to ferrous and non-ferrous metals
- Dry service temperature up to 120°C

Size:500 g

Product code:10271

Devcon® Plastic Steel Putty (A)

The original metal filled and machinable Devcon epoxy putty. Replaces welding for hundreds of routine applications.

- Bonds to most materials with a tough finish
- Excellent resistance to oil, petrol, water and many other chemicals
- Dry service temperature up to 120°C

Size:500 g1 kg

Product code:1011210115

Devcon® Plastic Steel® 5 min® Putty (SF)

Fast curing, steel filled epoxy putty for permanent emergency repairs and use at low temperatures.

- Machinable and ready for service in 1 hour
- Rapid curing and low temperature use
- Dry service temperature up to 90°C

Size:500 g

Product code:10241

Devcon® Plastic Steel Liquid® (B)

Provides accurate detailing reproduction in the making of moulds, light gauge forming dies etc.

- Fast curing and self levelling for cost effective moulds and dies
- Machinable to fine tolerances
- Dry service temperature up to 120°C

Size:500 g

Product code:10211

# Wear and Abrasion Systems

Devcon epoxy systems make fast, durable repairs to almost all types of plant and machinery, bonding to most materials including metals, ceramics and concrete.

Devcon epoxy systems are easy to use, in many cases fast curing and have high performance characteristics, giving a very cost effective way of improving performance and extending useful service life.

Devcon epoxy systems can be used to make fast, durable repairs to almost all types of plant and machinery.



Devcon® Wet Surface Repair Putty (UW)

Water resistant putty for repairing, patching and rebuilding equipment in underwater or habitually wet environments.

- Penetrates moisture, eliminates the need to dry substrates thoroughly before repairs
- Can be applied and cures down to 4°C
- Dry service temperature up to 90°C

Size:500 g

Product code:11801

Devcon® Brushable Ceramic

Low viscosity, ceramic filled, brushable epoxy that provides a smooth, protective barrier against abrasion, erosion and chemical attack.

- Low friction surface for operating efficiency
- Rebuilds and seals heat exchanger tubes and protects pump casings and flange faces etc.
- Dry service temperature up to 175°C

Size:500 g Blue500 g Red5 kg Blue

Product code:117621175211763

Devcon® Wear Resistant Liquid (WR)

Ceramic filled epoxy liquid for casting metal forming dies and tracers etc. where exceptional durability is required.

- Low friction with outstanding wear resistance
- Non shrink for accurate reproduction of critical details
- Dry service temperature up to 120°C

Size:500 g

Product code:11211

Devcon® Wear Guard™ Fine Load

Ceramic filled, trowel applied epoxy for use in situations where small particle abrasion is present.

- Fine detail can be achieved with high performance maintained
- Ideal for applications where small particles or dust are the abrasive media being transported

Size:30 lb

Product code:11470

Devcon® Sprayable Ceramic

A reinforced, sprayable, ceramic epoxy, which is chemically resistant, for surfaces which require an exceptionally smooth finish.

- Very low friction surface
- Protects tanks, pumps, blades, valves etc exposed to erosion and corrosion
- Dry service temperature up to 150°C

Size:10 kg Blue

Product code:15411

Devcon® Wear Resistant Putty (WR-2)

Smooth, non-rusting, multi-purpose, ceramic filled epoxy 'putty' for repairs requiring very smooth, high-slip finishes, such as lathe beds etc.

- Prevents abrasion and erosion of metal components
- Repairs metals, concrete and even some rigid plastics
- Dry service temperature up to 120°C

Size:500 g

Product code:11411

Devcon® Ceramic Repair Putty

Trowelable, ceramic filled epoxy putty for rebuilding worn or damaged equipment, particularly in abrasive environments.

- Excellent erosion and corrosion resistance
- Rebuilds casings, plates, materials handling, chutes and hoppers, plus valves etc.
- Dry service temperature up to 175°C

Size:3 lb

Product code:11700

Devcon® Wear Guard™ High Temperature 450

Special high performance Epoxy resin matrix which encapsulates the ceramic bead and provides high temperature resistance.

- Exceptional abrasion performance at temperatures up to 230°C
- Non shrink for accurate reproduction of critical details

Size:30 lb

Product code:11480



Devcon® DFense Blok™

Our latest technology, a blend of ceramic beads and impact modifier for the highest performance in abrasion and especially impact situations.

- Superior sliding abrasion resistance
- Withstands high impact conditions
- Non-sagging on vertical or overhead surfaces

|       |       |               |       |
|-------|-------|---------------|-------|
| Size: | 30 lb | Product code: | 11330 |
|-------|-------|---------------|-------|

Devcon® DFense Blok™ Fast Cure

When time is of the essence this Fast Cure version of DFense Blok gives a rapid return to service but without compromising on performance.

- Faster curing version of DFense Blok
- Allows equipment to be returned to service in 2 hours
- Less prone to unexpected fractures

|       |      |               |       |
|-------|------|---------------|-------|
| Size: | 9 lb | Product code: | 11350 |
|-------|------|---------------|-------|

Devcon® DFense Blok™ Quick Patch

When there is a failure in your equipment and a shutdown is out of the question the Quick Patch is our fastest curing solution to keep the process running until the next shutdown.

- For use in emergency situations where plant cannot be taken out of service
- Fast cure but still with high performance

|       |      |               |       |
|-------|------|---------------|-------|
| Size: | 1 lb | Product code: | 11320 |
|-------|------|---------------|-------|

Devcon® DFense Blok™ Surface Wetting Agent (SWA)

The primer for our DFense Blok and DFense Blok Fast Cure, SWA ensures the best possible adhesion to your substrate. Overcoated directly after application the use of SWA adds little time to your application but vastly enhances performance.

- Zero wait time before applying DFense Blok
- Allows superior adhesion to all surfaces
- Orange color for easy visual inspection

|       |      |               |       |
|-------|------|---------------|-------|
| Size: | 1 lb | Product code: | 11340 |
|-------|------|---------------|-------|



# Epoxy Flooring Systems

Easily applied by plant maintenance teams, Devcon epoxy flooring systems provide high strength, fast setting chemically resistant repairs and can help to solve slip problems. Suitable for floors, walkways, ramps, platforms, loading docks etc.

Devcon® Floor Patch™

Multi purpose concrete patching compound with a compressive strength of 55 MPa which is 2-3 times the typical strength of conventional concrete.

- Chemically resistant
- Bonds to new and old concrete
- Ready to walk on after 8 hours

|       |      |               |       |
|-------|------|---------------|-------|
| Size: | 5 kg | Product code: | 13101 |
|-------|------|---------------|-------|



Devcon® Epoxy Sealer 100

Solvent free, epoxy coating system for sealing and waterproofing concrete, masonry and wood surfaces.

- Bonds to wet surfaces and can be used as a primer on damp concrete for other systems
- Durable translucent floor coating ideally used as a primer coat for our other floor coatings

|       |      |               |       |
|-------|------|---------------|-------|
| Size: | 5 kg | Product code: | 12540 |
|-------|------|---------------|-------|

Devcon® Floor Grip™

Heavy duty epoxy coating with silicone carbide granules producing an exceptionally tough non-slip surface.

- Extremely durable system with weather resistant aggregate
- Bonds to metals, concrete and wood
- Cures as low as +5°C

|       |       |               |       |
|-------|-------|---------------|-------|
| Size: | 10 kg | Product code: | 13090 |
|-------|-------|---------------|-------|

Devcon® Epoxy Coat™ 7000 AR

Solvent free, chemically resistant, epoxy coating with exceptional performance against concentrated (98%) Sulphuric Acid.

- It can be applied to metal or concrete for secondary containment of various high strength acids
- Easy to apply by roller

|       |         |               |       |
|-------|---------|---------------|-------|
| Size: | 7.56 kg | Product code: | 12750 |
|-------|---------|---------------|-------|

Devcon® Ultra Quartz™

High strength, high build solution with excellent chemical resistance where there is no time for concrete to be laid and cure.

- Ultraquartz can both rebuild concrete and provide a protective coating at the same time
- Ideal for high traffic areas or situations where standard concrete alone will be subject to by chemical exposure

|       |       |               |       |
|-------|-------|---------------|-------|
| Size: | 35 lb | Product code: | 13550 |
|-------|-------|---------------|-------|

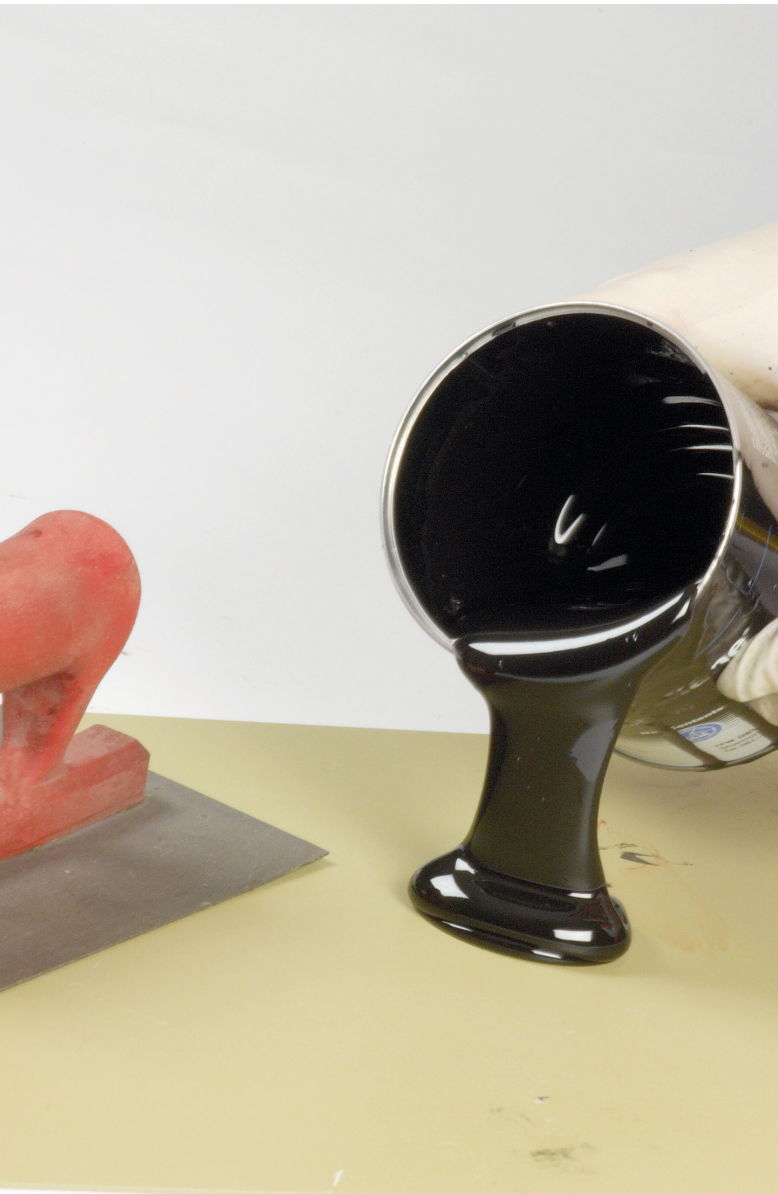


# Flexible Urethane Maintenance and Repair

Devcon Flexane repair products are all flexible, urethane resin based materials, available in a range of hardness’ and as either liquid or putty.

In liquid form they are castable, very low shrink compounds for producing new, custom or discontinued rubber parts and flexible moulds. In putty form they may be used to repair worn or damaged rubber equipment, to form protective coatings as linings in extremely abrasive environments, or for repairs subject to wear, impact or vibration.

Devcon Flexane products bond to metal, rubber, concrete, fibreglass, wood and many other materials\*. They are all easily applied by trowel or brush and cure quickly to form a ‘rubber-like’ compound with exceptional tear strength and abrasion resistance.



**Devcon® Flexane® HP Brushable**

High performance brushable system with excellent impact, wear and chemical resistance.

- Excellent flexibility, tear and tensile strengths
- Cures to a medium hard ‘rubber-like’ compound, (Shore A Hardness 86)

|       |       |               |       |
|-------|-------|---------------|-------|
| Size: | 500 g | Product code: | 15350 |
|-------|-------|---------------|-------|

**Devcon® Flexane® GP Putty**

Trowelable putty for repairing, coating and lining equipment and components exposed to impact, abrasion, vibration and movement etc.

- Excellent abrasion and impact resistant
- Bonds to most common substrates
- Cures to a medium hard rubber-like compound (Shore A Hardness 87)

|       |       |               |       |
|-------|-------|---------------|-------|
| Size: | 500 g | Product code: | 15821 |
|-------|-------|---------------|-------|

**Devcon® R-Flex® Belt Repair Kit**

The new belt repair solution, R-Flex is a self-leveling urethane kit for repairing holes, tears and gouges in heavy weight rubber conveyor belts. It can also be used to cover metal staples and crimps used for more extensive belt repairs.

- A self-levelling liquid during the application which then becomes a non-sag gel in 4 minutes, (depending on temperature conditions)
- Very high adhesion demonstrated as substrate failure when conducting bond testing

|       |                |               |                |
|-------|----------------|---------------|----------------|
| Size: | 1.5 lb<br>4 lb | Product code: | 15565<br>15550 |
|-------|----------------|---------------|----------------|

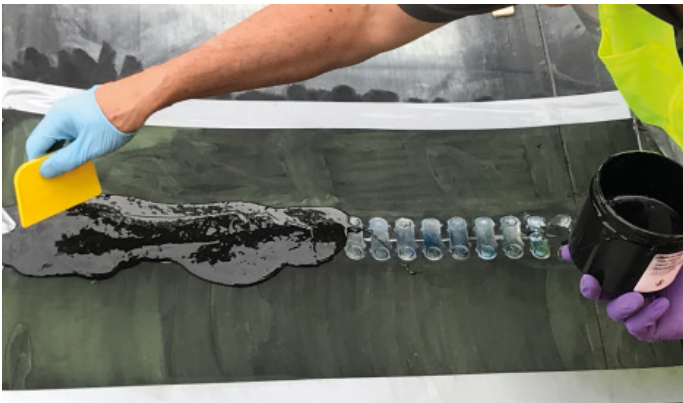


**Devcon® Flexane® GFR 40 (Flame Retardant)**

Elastomeric system to produce flame retardant in-situ gaskets. Pourable and self levelling properties also make it ideal for casting and moulding.

- Battleship grey color ideal for marine and naval applications
- NATO approved for military use

|       |      |               |       |
|-------|------|---------------|-------|
| Size: | 3 kg | Product code: | 96000 |
|-------|------|---------------|-------|

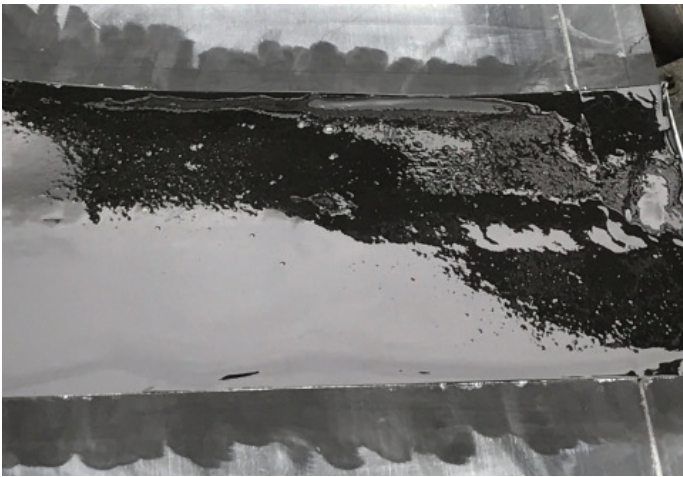


**Devcon® Flexane® 60/80/94**

Flexane liquid products are available in three different grades to cover a variety of applications with different hardness requirements.

- Good abrasion and wear resistance
- Self levelling

|               |                   |                   |                   |
|---------------|-------------------|-------------------|-------------------|
|               | <b>Flexane 60</b> | <b>Flexane 80</b> | <b>Flexane 94</b> |
| Size:         | 500 g             | 500 g 5 kg        | 500 g 5 kg        |
| Product Code: | 15200             | 15800 15810       | 15250 15260       |
| Flexibility:  | High              | Medium            | Low               |



\*with suitable primers from our range



## Flexane Ancillary Materials

Devcon provide a range of ancillary materials and equipment to support the efficient application, use and performance of the Flexane urethane repair systems.



Devcon® Flexane® Primers

Ensures the optimum adhesion of Devcon Flexane® urethane products.

- Use FL-10 for all types of metals
- Use FL-20 for rubber, wood, FRP and concrete

Size:

FL-10 112 g  
FL-20 112 g

Product code:

15980  
15985



## Epoxy Adhesive Systems

Devcon provides the most technically advanced epoxy adhesives, in a range of different grades with different viscosities, pot lives, open times and cure times, for many industrial bonding applications.

These tough, fast curing systems also have excellent chemical resistance. Innovative packaging and dispensing systems are also supplied in a wide range of different packaging and sizes to suit all types of applications.

Devcon® 1 Minute™ Epoxy Gel

Lightning fast curing epoxy adhesive gel for filling gaps, cracks and surface defects.

- Bonds in one minute or less
- Non sag for use in vertical and overhead applications
- Fixture time 60 seconds

Size:

50 ml

Product code:

14277

Devcon® 5 Minute Epoxy®

Rapid curing multi-purpose epoxy adhesive and encapsulating resin.

- Bonds rigid, durable substrates such as metal, glass, ceramics, concrete and wood in five minutes or less
- Fixture time 10-15 minutes

Size:

28 g Dev-Tube  
70 g Twin-Tube  
50 ml Cartridge  
400 ml Cartridge

Product code:

14251  
14210  
14270  
14272

Devcon® 2 Ton® Clear Epoxy

Extremely strong, water resistant, medium fast cure epoxy adhesive and surface filler.

- Achieves a strong, rigid bond on metals, ceramics, wood, concrete, glass etc
- Non shrink with good impact strength
- Available in a wide range of different packaging
- Fixture time 30-35 minutes

Size:

50 ml  
200 ml

Product code:

14260  
20222

**Fixture time:**  
The time after the surfaces have been joined until they will support a 1kg weight on a 12.5mm x 25mm wide overlap joint.



## Methacrylate Systems

Devcon Methacrylate Adhesives are formulated for use with today’s hard to bond engineered plastics, advanced composites, exotic metals, and other difficult substrates. Mixing as they are dispensed, they produce tough, flexible adhesive bonds with little or no surface preparation.

They cure rapidly at room temperatures, and provide exceptional physical strengths and environmental resistance. Fully recyclable and solvent free, they can also help to reduce VOC.

| Devcon® Devweld 530                                                                                                                                                                         | Devcon® Devweld 531                                                                                                                                                                                 |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Rapid curing, multi-purpose, tough, structural methacrylate adhesive that produces high strength load bearing bonds to engineered plastics, metaceramics and many other materials.          | Methacrylate adhesive for 'difficult to bond' engineered plastics such as nylon based alloys, epoxy composites, modified polyesters, many other plastics and various other materials etc.           |
| <ul style="list-style-type: none"><li>Minimal surface preparation</li><li>Resistant to weathering, moisture and wide variations in temperature</li><li>Fixture time 12-15 minutes</li></ul> | <ul style="list-style-type: none"><li>Superior bond strength, durability and impact resistance</li><li>Excellent environmental and chemical resistance</li><li>Fixture time 30-35 minutes</li></ul> |
| <div>Size:50 ml</div> <div>Product code:20500</div>                                                                                                                                         | <div>Size:50 ml</div> <div>Product code:21500</div>                                                                                                                                                 |



| Devcon® Zip Patch™ Repair Kit                                                                                                                                    |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Easy to use waterproof adhesive patching kit. Hardens in minutes at room temperatures and suitable for a wide range of applications.                             |
| <ul style="list-style-type: none"><li>Permanently waterproof field repairs</li><li>Tough and durable when cured</li><li>Bonds to all common substrates</li></ul> |
| <div>Size:1 Patch Kit</div> <div>Product code:11500</div>                                                                                                        |

**Fixture Time:**  
The time after the surfaces have been joined until they will support a 1kg weight on a 12.5mm x 25mm wide overlap joint.

## System Accessories

Devcon system accessories are designed to complement the product range and provide even more efficient or increased performance with improved surface conditioning, or preparation of substrates or for use in adverse conditions.

| Devcon® Silite                                                                                                                                                                                 | Devcon® Liquid Release Agent                                                                                      |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------|
| The Silite White and Clear provide an easy to apply Silicone polymer for use in a range of sealing and filling applications. Adhesion to most substrates is exceptional.                       | Silicone release agent prevents Devcon's epoxy and urethane products from sticking to patterns or mould surfaces. |
| <ul style="list-style-type: none"><li>Applicable to horizontal and vertical surfaces this non sag formula makes Devcon Silite a versatile solution for a number of repair situations</li></ul> | <ul style="list-style-type: none"><li>Ensures a high gloss finish on cast Devcon resin surfaces</li></ul>         |
| <div>Size:310 ml Clear310 ml White</div> <div>Product code:1715017140</div>                                                                                                                    | <div>Size:473 ml</div> <div>Product code:19600</div>                                                              |

## Dispensing and Mixing Equipment

Devcon provide a range of application guns and static mixing nozzles for dispensing and mixing. They can eliminate pre-mixing and greatly reduce waste, speed up application, guarantee correct ratios and dramatically reduce clean up – collectively these can also reduce your overall production or maintenance costs.

| Devcon® Static Mixing Nozzles                                                                                                      | Devcon® Dispensing Guns                                                                                  |
|------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------|
| Static mixing nozzles for mixing Devcon two component products supplied in cartridges, directly on application from the gun.       | Specially developed application guns for dispensing the Devcon products that are supplied in cartridges. |
| <div>Size/Ratio:MA 6.3-21/50 mlMA 6.3-12S/50ml* (1 min Epoxy Gel)MC 10-18/200-400 ml</div> <div>Product code:142832999129999</div> | <div>Cartridge Size:50 ml200/250 ml400 ml</div> <div>Product code:200151428120020</div>                  |



## Global operations

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