# Glass Fibre Repair Kit



## **Fibreglass Repair**

This is a land-based repair that requires a minimum of 12 hours to dry/cure, ideally at +15°C. The repair is useable after 12hrs and will be full strength after 3 days.

## Contents:

- 1 Resin
- 2 Hardener
- 5 Sandpaper
- 6 Glassfibre cloth
- 3 Filler powder (Microballoons)
- 7 Gloves
- 8 Brush
- 4 J-cloth
- 9 Wooden spatulas (2)
- Also required:

Scissors to cut the glass sheet (first aid kit shears are ideal)



# Caution

The resin can get hot once it has been mixed and has been known to catch fire. Once used place it in a safe area to cool.

None of these materials are re-usable, except for the glass cloth. Please consider the environment and dispose of them carefully.

### Health & Safety

This repair kit contains epoxy resin. In a very, very small number of cases and usually after extended exposure or use, the user may develop an allergic reaction to the resin. This may manifest itself in respiratory problems and/or skin disorders like dermatitis, but not exclusively.

It is essential to wear gloves throughout the repair/laminating operation and wash hands thoroughly afterwards. Once exposure to the resin and/or dust has been removed, any of the above complaints will usually clear up very quickly with no adverse or long-term effects.

However, If you suffer any unusual or adverse problems/effects after using this resin, contact your Doctor and inform them you have used these products.

During and/or after cutting of the glassfibre cloth, the fibres may irritate the skin (in particular the inner forearms/wrists) and cause itching. Rinsing the area with COLD water will usually wash away the fibres and quickly reduce the irritation.

### Shelf Life

Manufacturers of epoxy resin give a shelf life of the product to which they will guarantee its effectiveness. This is usually around 6 months. In my own experience I have found this to be much longer, however, I can only provide the same guarantee as that of the manufacturer.

To this end, if the repair kit is returned to me within 1 year of purchase, I will replace the resin and hardener, re-vac pack the contents and return the kit for a small nominal charge. Please check the web site for current prices.

Whenever possible try to effect the repair from the inside of the kayak.

- 1 Clean the damaged area with fresh water.
- 2 Dry the area; in the sun, with a blowtorch or with stove in the hatch (on a very low burn).

Remember, the melting point of the plastic used in your hatch rim is a lot lower than that of GRP!

3 Clean away any rough edges and compress the area to make it as even and flat as possible.







4 On the inside use sandpaper to roughen the area around the repair, this will help the resin to key and adhere to the area.



On the outside place gaffa tape across the repair, to stop the resin coming through and to fill any gaps.

If repairing from the outside use sandpaper to roughen the surrounding area of gel coat, this will help the resin to key/stick.

Place gaffa tape across the repair on the inside, to stop the resin coming through and to fill any gaps.

If the damage has left a void/hole, mix the resin and hardener as per steps 10 & 11, then pour approximately one third of the resin mix into the empty container. Add a small amount of white 'Microballoon' powder to this resin mix. Continue to add more powder until a paste is formed that is a stiff, nonsagging consistency. Smear/trowel the paste into the void/hole.

6 Cut a piece of glass (ideally circular), that will cover the hole and the surrounding area by abut 5cm/2inches.

- 7 Cut a minimum of 5 additional pieces of glass, each increasing in diameter (by approx. 3cm/1 inch).
- 8 Assemble all the pieces in order prior to use; this repair process can get messy!
- 9 Put on the gloves.
- Mix all the resin and hardener together (this has been pre-measured to ensure the correct ratio).
- Stir with the wooden spatula for at least 2 minutes.















- Pour some resin into the hole.
- 3 Brush to coat the surrounding area.

- 14 Place the smallest glass patch over the resin-coated hole.
- Hold the patch in place and brush over it to bed it into the resin. A stippling action will help up the process (pushing down with the bristles rather than brushing).
- 16 Continue brushing and stippling until the patch turns translucent.
- Place the next patch, hold in place and brush/stipple until translucent.
- 18 If the patch seems a little dry pour more resin onto it and continue to brush/ stipple until translucent.

depending on the temperature).

21 Once the repair has cured, use the

sandpaper to remove any sharp edges or

spikes.















