Long Crack Repair Kit INSTRUCTIONS KIT1036

- 1. CRACK EXPANDER
- 2. MYLAR[®] SHEETS
- 3. CRACK FILLER RESIN
- 4. RAZOR BLADE
- 5. DISPENSING NEEDLE
- 6. GLYCERIN



Preparation

NOTE: This kit is intended for use in compliance with the ANSI/NWRA/ROLAGS 001 Standard. Users should be trained in all relevant industry and regulatory standards applicable in their region before attempting to repair windshields.



NOTE: Inexperienced personnel should perform practice repairs on a used windshield before repairing a customer's vehicle. Their technique and results should improve with each attempt.

- **1.** Park the vehicle in shade, if possible. Otherwise, shade the repair area with an appropriate screen (such as KIT1044 [fig. 1], sold separately), to prevent premature resin curing.
- 2. The ideal glass temperature for doing a repair is 40° 85° F (5° 30° C). Verify that the glass is not too hot or too cold before starting the repair.
- **3.** Test your UV lamp (such as LMP2007 [fig. 2], sold separately). If it does not appear to be working, consult its instructions, when applicable.



Figure 1







Wear appropriate personal protective equipment and follow trade association guidelines.

4. Protect the vehicle from resin (see Caution 1) and tool damage using an appropriate cover (such as HDW5523 [fig. 3], sold separately).



CAUTION 1: If resin contacts the paint, do not wipe it off; cure the resin with the UV lamp (see Curing the Resin) and carefully peel it off.

5. Clean the glass by spraying isopropyl alcohol on a soft cloth and wiping the repair area. Do not spray directly on the crack (see Note 1).



Figure 3



NOTE 1: If moisture is present, dry the crack with a heat gun (see Caution 2) or a moisture evaporator (such as TLS5000 [fig. 4], sold separately).

Figure 4

CAUTION

CAUTION 2: Use a heat gun with care, because too much heat could cause the crack to expand. Allow adequate time for the glass to cool before proceeding.

Applying the Resin

Only use resins in a well-ventilated area, and avoid contact with skin and eyes (see Additional Safety Information).



NOTE: Check the expiration date on the resin bag. Do not use any expired resin.



- **3.** Repeat step 2 on the other end of the crack.
- **4.** Attach the crack expander on the interior side of the windshield (see Caution 3), perpendicular to the crack. Make sure the adjusting screw is positioned directly over the crack and midway between the cured ends (fig.5).
- **5.** Turn the adjusting screw until it contacts the glass (fig. 6). Then slowly turn the screw another 1/2 to 3/4 turn; if the crack starts to run, immediately reverse 1/4 turn.

- **1.** Remove a dispensing needle and a resin tube from the bag. Remove the cap and cut the tip off the tube. Then install the needle on the tube.
- 2. At one end of the crack, apply a drop of resin at the point where the the crack seems to disappear. The resin should flow into the crack. If it does not, gently flex the glass on the interior side. Once the end of the crack is filled with resin, cover it with a Mylar[®] sheet and cure the resin (see Curing the Resin). After curing, leave the Mylar[®] sheet in place.



CAUTION 3: Use minimum force when applying the crack expander, because too much force can cause the crack to run.



- 6. Continue filling the crack from the point where you first cured the resin on one end. As the resin fills the crack, always keep the drop of resin just behind the front edge of the resin flow as you move toward the center, to avoid trapping air in the crack. Once a 2" (5 cm) span of crack is filled with resin, add another drop of resin and cover it with a Mylar[®] sheet. Mylar should overlap the previous piece to ensure air will not enter the crack.
- 7. Cure the resin at 2" (5 cm) intervals (see Curing the Resin). Do *not* allow anything to flex the glass, including a UV lamp.
- 8. After the entire crack is filled and fully cured, remove the crack expander. Then remove all Mylar[®] sheets and scrape off the excess resin (see Curing the Resin).

Curing the Resin

- 1. Quickly place Mylar[®] sheets over the crack, to contain the resin. Use as many sheets as needed to cover the crack entirely.
- 2. Place a UV lamp over the crack for at least 1 minute (see Note 2), making sure the lamp is perpendicular to the crack. Long crack repairs



will require curing at 2" intervals, so repeat this step as many times as needed.

- **3.** Lift a corner of each Mylar[®] sheet and gently peel it away, using a razor blade if needed.
- **4.** Remove excess resin: Hold the razor blade perpendicular to the glass and apply smooth, fast strokes in the direction of the crack's run without lifting the blade off the surface.
- 5. Clean the repair area with isopropyl alcohol and a soft cloth.

Additional Safety Information

- Read resin label and Safety Data Sheet provided.
- If resin gets on your skin, wash thoroughly with soap and water.
- If resin gets in your eyes, flush them with water for 15 minutes and seek medical attention immediately.
- If you swallow any resin, drink 2 glasses of water and seek medical attention immediately.

Parts and Supplies

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Limited Warranty

AEGIS Tools International[®] products are warranted to be free from defects in manufacturing or materials for 1 year from the date of purchase. Read the <u>Warranty Return Form</u> at aegistools.com for important details about the warranty.

If a problem develops during the warranty period, follow the instructions below to obtain warranty service. If inspection shows that the product has a defect, AEGIS will repair or replace the product without charge.

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For customers in the U.S. and Canada: Go to the <u>Warranty</u> page at aegistools.com and click the applicable link. Alternatively, you may contact AEGIS Tools International (see contact information).

For customers in all other localities: Contact AEGIS Tools International (see contact information) or your dealer for assistance.

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