



**BC**  
(BUOYANCY COMPENSATORS)

**PATCHING**

**SERVICE  
PROCEDURE**

(for BCs constructed with Nylon or BioFlex<sup>®</sup> Material)

This BC Product Service Procedure reflects information applicable at the time of this writing (5/23/02).

**PATCHING**

**CONTENTS**

**WARNINGS AND PRECAUTIONS** ..... 3  
**PATCHING PROCEDURE** ..... 4

**GENERAL PROCEDURES**

**REFER TO** ..... **DOC. 12-2235**

**SUPPLIES AND TOOLS REQUIRED**

**BC Patching Kit (p/n 08.9030) contains:**

- (2) - 1.5 oz tubes of Weld-On 1784<sup>®</sup> Adhesive (p/n 08.9015)
- (2) - 2 in. diameter 420 Nylon Patches (p/n 08.9031)
- (2) - 2 in. diameter 840 Nylon Patches (p/n 08.9032)
- (2) - 2 in. diameter BioFlex<sup>®</sup> (dull knit) Patches (p/n 08.9033)
- (2) - 2 in. diameter BioFlex<sup>®</sup> Velour (fuzzy) Patches (p/n 08.9033)

**Tools**

- Small Roller
- 5 LB Weight

PATCHING

GENERAL

**⚠ WARNINGS and PRECAUTIONS:**

DO NOT attempt to perform the following Procedures using Patches or Adhesive other than those provided in the Oceanic BC Patching Kit (see contents list below).

Select the correct size patch needed, and ensure that it is approximately twice the size of the hole or tear (Fig. 1).

DO NOT attempt to patch an Oceanic BC constructed with Kevlar material. Return the BC to Oceanic for evaluation and repair.

DO NOT attempt to patch a hole or tear larger than 1/2 inch in diameter or length (Fig. 2). Return the BC to Oceanic for evaluation and repair.

DO NOT attempt to patch a hole or tear that is closer than one inch from any seam (Fig. 3). Return the BC to Oceanic for evaluation and repair.

Carefully read all CAUTIONS on the Adhesive's label.

Avoid inhaling vapors. Adhesive should only be applied in a well ventilated room.

Before patching, thoroughly wash the material surrounding the hole or tear with warm water and a mild anti-bacterial soap to remove any accumulation of salt, minerals, algae, or other contaminants. Rinse thoroughly and allow the BC to air dry for at least 24 hours. DO NOT use heat to dry the material.



Fig. 1

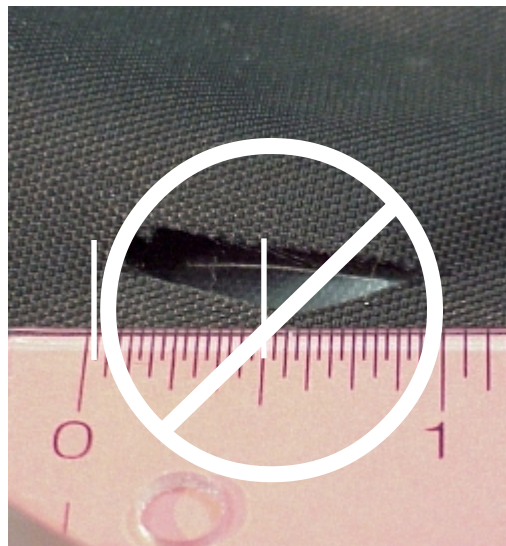


Fig. 2



Fig. 3

**PATCHING**

**BCs WITH NYLON OR BIOFLEX® MATERIAL**

1. Apply a first coat of Weld-On 1784® adhesive to the material of the BC surrounding the hole or tear. Allow this first coat to dry completely (approximately 24 hours).

**⚠ CAUTION: It is important to prevent any adhesion between the internal surfaces of the Bladder caused by the entrance of adhesive through the hole or tear. Position the Bladder as needed to maintain a separation of the Bladder at the point of the hole or tear, and ensure that adhesive does not enter the Bladder.**

2. After the first coat of adhesive is completely dry, apply a second coat of adhesive to the material of the BC surrounding the hole or tear, and apply a first coat to the glossy surface only of the Patch (plastic coating side). Wait 20 minutes.
3. After 20 minutes have elapsed, apply a third coat of adhesive to the BC material, and a second coat to the Patch. (Fig. 4)
4. Wait 5 to 10 minutes for this coat to grow tacky, and immediately apply the Patch over the hole or tear.
5. Using a Small Roller, roll the entire patch area to eliminate any air that may be trapped between the Patch and BC material. (Fig. 5)
6. Place a 5 pound Weight directly on the Patch positioned so there is flat/firm pressure applied to the entire Patch. Allow 2 hours for the Patch to set. (Fig. 6)

**⚠ CAUTION: DO NOT allow the Patch to set for more than 2 hours before performing the next step.**

7. Remove the Weight and inflate the BC (no more than 3/4 full), causing the inner surfaces of the Bladder to separate if any adhesion has occurred.
8. Apply a top coat of adhesive to the entire patch area extending outward onto the Bladder by 1/4 inch. Allow at least 24 hours to completely cure.
9. Repeat step 8 at least two more times.
10. After the final coat of adhesive is completely dry, perform the General Airleak Inspection Procedure to ensure that leakage is no longer present. Refer to Section 5.1 of Doc. 12-2235.



Fig. 4



Fig. 5



Fig. 6