§ 160.047–3a Materials—Dee ring and snap hook assemblies and other instruments of closure for buoyant vests.

(a) Specifications. Dee ring and snap lock assemblies and other instruments of closure for buoyant vests may have decorative platings in any thickness and must meet the following specifications:

(1) The device must be constructed of inherently corrosion resistant materials. As used in this section the term inherently corrosion resistant materials includes, but is not limited to, brass, bronze, and stainless steel.

(2) The size of the opening of the device must be consistent with the webbing which will pass through the opening.

(b) Testing requirements. Dee ring and snap hook assemblies and other instruments of closure for buoyant vests must—

(1) Be tested for weathering. The Coast Guard will determine which one or more of the following tests will be used:

(i) Application of a 20 percent sodium-chloride solution spray at a temperature of 95 °F (35 °C) for a period of 240 hours in accordance with the procedures contained in method 811 of the Federal Test Method Standard No. 151.

(ii) Exposure to a carbon-arc weatherometer for a period of 100 hours.

(iii) Submergence for a period of 100 hours in each of the following:

(a) Leaded gasoline.

(b) Gum turpentine.

(iv) Exposure to a temperature of 0° ±5 °F (−17.6 ±2.775 °C) for 24 hours; and

(2) Within 5 minutes of completion of the weathering test required by paragraph (b)(1) of this section, the assembly must be attached to a support and bear 150 pounds for an adult size and 115 pounds for a child size for 10 minutes at the ambient temperatures without breaking or distorting.

§ 160.047–4 Construction.

(a) General. This specification covers buoyant vests which essentially consist of a vest-cut envelope containing compartments in which are enclosed pads of buoyant material arranged and distributed so as to provide the proper flotation characteristics and buoyancy required to hold the wearer in an upright backward position with head and face out of water. The buoyant vests are also fitted with tapes, webbing, and hardware to provide for proper adjustment and close and comfortable fit to the bodies of various size wearers.

(b) Envelope. The envelope or cover shall be cut to the pattern shown on Dwg. No. 160.047–1, Sheet 1, for adult size, and Sheets 2 and 3 for child sizes, and sewed with seams and stitching as shown on the drawing. Three compartments shall be formed to hold the buoyant pad inserts, two front compartments and one back compartment, and reinforcing strips of the same material as the cover shall be stitched to the inside of the front compartments in way of the strap attachments as shown by the drawings. As alternate construction, the front and/or back cover panels may be made in two pieces, provided that the two pieces are joined by a double stitched seam from the top center of the neck hole to the top of the vest as shown in Section J-J of the drawings.

(c) Pad inserts—(1) Forming and sealing. The buoyant pad inserts shall each be formed from two pieces of film cut to the patterns shown by Dwg. No. 160.047–1, Sheet 4, which shall be heat-sealed tight. The heat-sealed pad seams shall show an adhesion of not less than 8 pounds when 1 inch strips cut across and perpendicular to the seams are pulled apart at a rate of separation of the clamping jaws of the test machine of 12 inches per minute.

(2) Kapok-filled pads for Models AK–1, CKM–1, and CKS–1. The buoyant pad inserts for Models AK–1, CKM–1, and CKS–1 buoyant vests shall be filled with kapok distributed as provided in Table 160.047–4(c)(2).