Title: REINFORCING CLIP FOR A CORRUGATED SLEEVE

Abstract: A plastic reinforcing clip for use with a container of the type including a corrugated sleeve adapted to be removably attached to a plastic pallet or base member by the use of sliding latch members coaxing with circular apertures in the lower peripheral edge portion of the sleeve. The reinforcing clip structure is formed of a single piece of molded plastic material and includes an outer annular planar portion, an inner annular planar portion, an outer cup-shaped liner portion, an inner cup-shaped liner portion, and a central hinge portion. In use, the central hinge portion is positioned under and along the lower edge of the sleeve beneath an aperture in the sleeve and the inner and outer planar portions are swung upwardly about live hinges provided between the hinge portion and the inner and outer planar portions. As the inner and outer planar portions are swung upwardly and inwardly, the cup-shaped liner portions enter the slot from the inner and outer faces of the sleeve. A circular annular wall section of the outer liner portion is seated within and engages an outer annular portion of the circular aperture edge with a planar base section of the liner portion positioned centrally within the aperture and a circular annular wall section of the inner liner portion is seated within and engages an inner annular portion of the circular aperture with a planar base section of the inner liner portion abutting the base section of the outer liner portion. The abutting planar base sections are suitably secured together as by staking to fixedly secure the clip on the sleeve to preclude damage to the sleeve in response to repeated actuation of the latch members.
INTERNATIONAL SEARCH REPORT

A. CLASSIFICATION OF SUBJECT MATTER

IPC(7) : B65D 88/00, 6/16, 6/24, 8/14
US CL : 220/1.5, 4.28, 4.33, 6.22; 206/386, 600; 229/198.2, 198.3; 24/458, 519, 499, 564, 684

According to International Patent Classification (IPC) or to both national classification and IPC

B. DOCUMENTS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

U.S.: 220/1.5, 4.28, 4.33, 6.22; 206/386, 600; 229/198.2, 198.3; 24/458, 519, 499, 564, 684

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

<table>
<thead>
<tr>
<th>Category</th>
<th>Citation of document, with indication, where appropriate, of the relevant passages</th>
<th>Relevant to claim No.</th>
</tr>
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<tbody>
<tr>
<td>X</td>
<td>US 4,936,451 A (SHUERT) 26 June 1990, see entire document.</td>
<td>1-4, 6, 8, 11, 13, 15-18, 20, 22-25, 27, 29-32</td>
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<td>Y</td>
<td>US 5,109,985 A (ROSE) 05 May 1992, see entire document.</td>
<td>7, 14, 21, 28</td>
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<td>Y</td>
<td>US 5,123,541 A (GIANNINI ET AL.) 23 June 1992, see entire document.</td>
<td>3, 4, 5-11, 13, 17, 18, 20, 24, 25, 31, 32</td>
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<tr>
<td>A</td>
<td>US 5,862,917 A (NOBLE ET AL.) 26 January 1999, see entire document.</td>
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</table>

Further documents are listed in the continuation of Box C.

See patent family annex.

Date of the actual completion of the international search
27 June 2005 (27.06.2005)

Signature of the international search report

Date of mailing of the international search report
22 Aug 2005

Authorized officer

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