

SEFA - Explanation on Drop Test Orientation for Large Drums According to ISO 16104

This information has been developed by SEFA in order to give a clear interpretation of the ISO 16104 text regarding the acceptable position of the closures during drop test. In particular it shows that the closure does not have to be on the folding line

Introduction

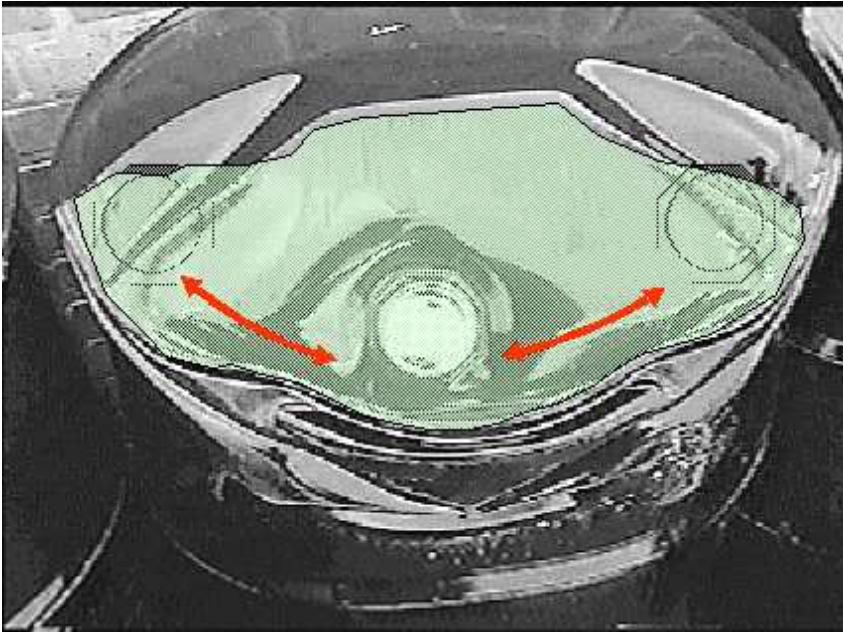
ISO16104, revision date 23 May 2003, specify the following for diagonal drop test orientation:

“First drop: the packaging shall strike the target diagonally on the chime or, if the packaging has no chime, on a circumferential seam or an edge.”

The explanatory note reads: “Non removable head drums strike the target diagonally on the top chime. Open head drums strike the target on the bottom chime. In either case it is on a circumferential seam or an edge adjacent, where possible, to a closure or junction of top and side seams, such that the closure, closure flange or junction of the top and side seams is within or intersected by the crush pattern.

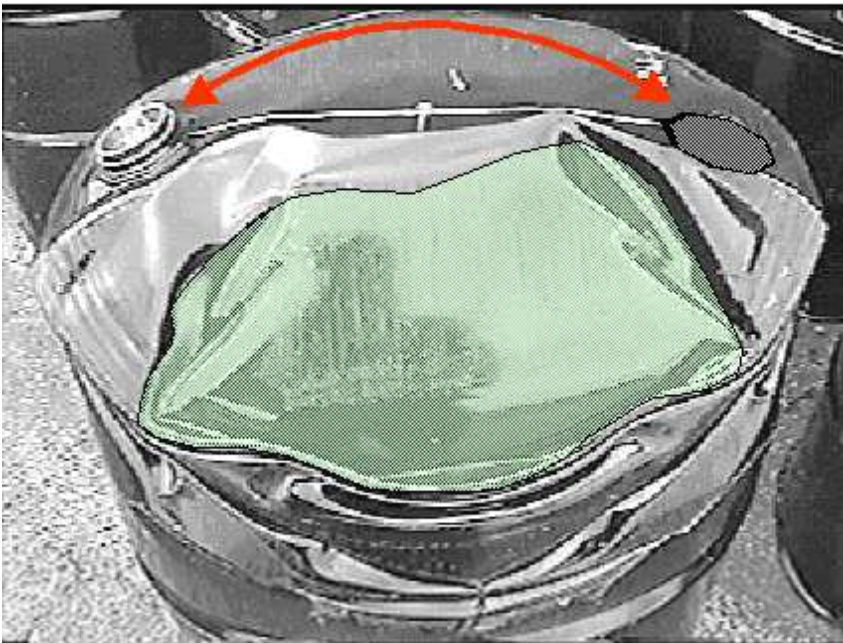
The following pictures are proposed to visualize the closure orientation in line with this definition:

Positioning of 2" closure for diagonal drop tests for Tight Head drums



Correct orientation:

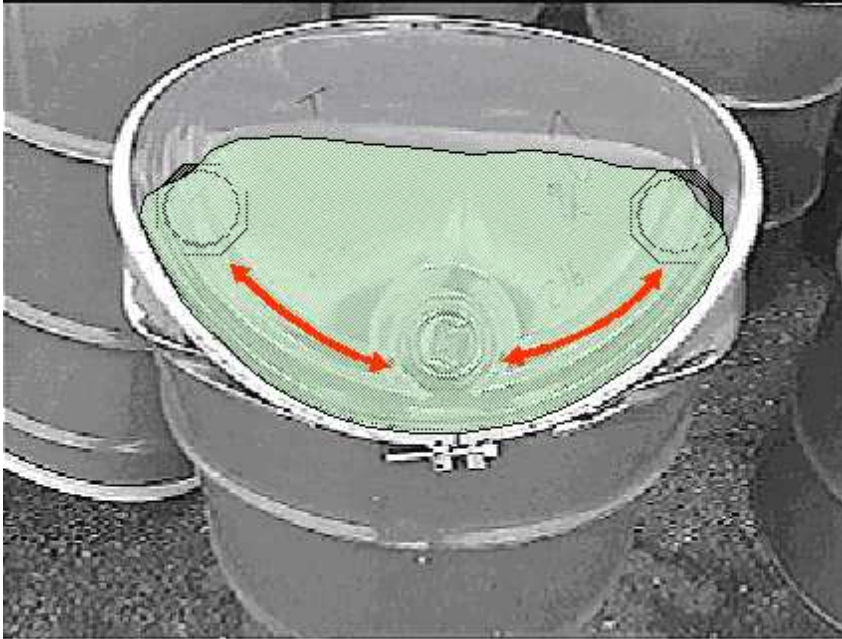
The closure can be anywhere within the green area (crush area)
As can the "T" junction of the top and side seam.



Incorrect orientation:

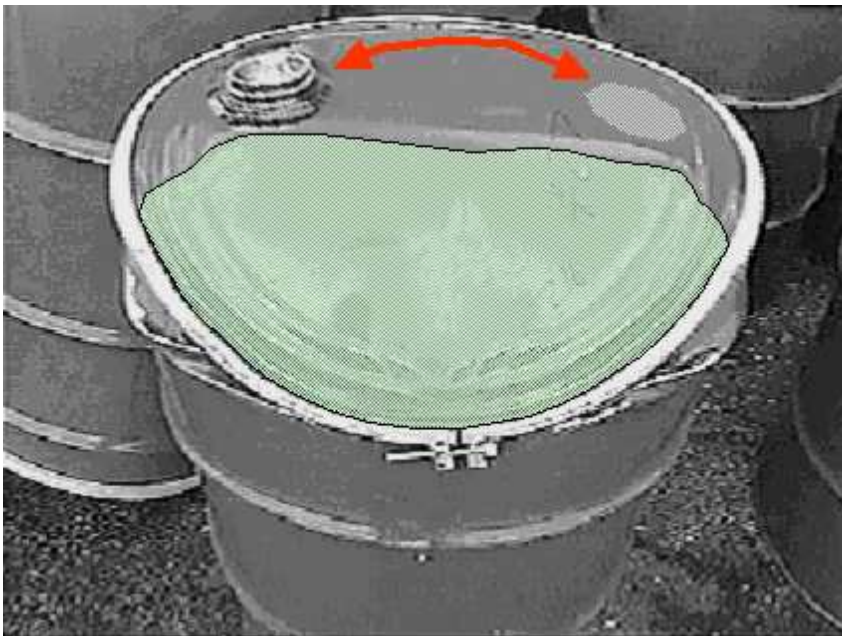
The closure may not be anywhere outside the green area (crush area)

Positioning of 2" closure for diagonal drop tests for Open Head drums



Correct orientation:

The closure can be anywhere within the green area (crush area)



Incorrect orientation:

The closure may not be anywhere outside the green area (crush area)