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TEST REPORT

Requester:	**CP CASES** Unit 11 Worton Hall Industrial Estate Worton Road- Isleworth TW7 6ER MIDDLESEX
Application date and reference	27/07/10, Order No. 20100727010 by the Company Baudry BP 12 39120 DOMBLANS
Subject:	Mechanical tests
Reference document:	ATA 300 (revision 2008.1)
Samples received on:	16/08/2010
Tests performed on:	18/08/2010 to 03/09/2010
Sample identification:	AMAZON rotomoulded polyethylene container ref AC1260-5307 No. X

For any difficulty in the interpretation of this document, please refer to the original report L061578 – DE/1 which is the only authentic text.

1. DESCRIPTION OF SAMPLES

The applicant has submitted for testing a container referenced AC1260-5307 No. X, the main characteristics of which are summarised below:

Sample (LNE references)	Type	Dimensions (mm)	Weight empty (kg)	Gross weight (kg)
1	Rotomoulded polyethylene container	1,200 x 600 x 600	**29**	**109**

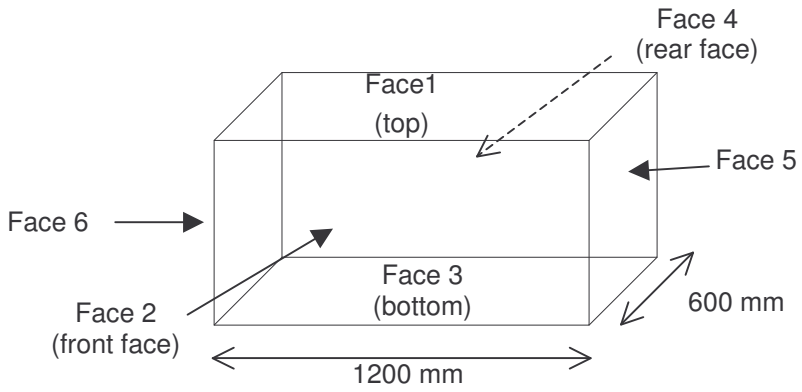
Packaging formed of *(see photos 1 to 5 in Appendix):*

- A rotomoulded polyethylene container
- A lid lockable via five butterfly latches on the large face and two butterfly latches on each small face
- Two fold-back carry handles on each small face
- A safety relief valve on face 2
- Two wheels on a small face

Interior formed of (see photo 6 in Appendix):

- Foam wedging
- Three cases containing a dummy weight

Note: the faces of the package were identified as per the diagram given below:



2. TEST METHOD

The tests performed on container 1 are taken from ATA 300 – revision 2008.1, and performed in the following order:

- A rainwater tightness test
- A compression test using foot effect
- A penetration test
- An impact test on edges and corners
- A second rainwater tightness test

2.1. RAINWATER TIGHTNESS TEST

Exposure time	:	30 ± 1 min
Rain height	:	50 to 80 cm
Flow rate	:	100 ± 20 mm

2.2. COMPRESSION TEST USING FOOT EFFECT

Weight applied	:	135 ± 0.1 kg
Surface applied	:	0.09 ± 0.005 m²
Application duration	:	24 ± 1 h
Position	:	centre of lid

2.3. PENETRATION TEST

Impactor	:	metal cylinder with Ø 3.2 cm and hemispherical end, weighing 6 ± 0.1 kg
Drop height	:	0.5 ± 0.001 m
Position	:	top of package
Number of drops	:	1

report to be followed on next page

2.4. IMPACT TEST ON EDGES AND CORNERS

Load weight : 80 ± 1 kg

a) 96 impacts on edges, distributed as follows: 2 impacts per edge at 1.8 m/s, 2.4 m/s, 3.0 m/s and 3.6 m/s (i.e. 2 impacts x 12 edges x 4 speeds = 96 impacts)

b) 128 impacts on corners, distributed as follows: 4 impacts per corner at 1.8 m/s, 2.4 m/s, 3.0 m/s and 3.6 m/s (i.e. 4 impacts x 8 corners x 4 speeds = 128 impacts)

Impact speed tolerance : ± 0.1 m/s

2.5. SECOND RAINWATER TIGHTNESS TEST

Exposure time : 30 ± 1 min

Rain height : 50 to 80 cm

Flow rate : 100 ± 20 mm

3. TESTING PROCEDURE

The tests took place between 18 August and 3 September 2010 at the Trappes National Metrology and Test Laboratory.

4. RESULTS

4.1. RAINWATER TIGHTNESS TEST

No infiltration of water observed on the container.

4.2. COMPRESSION TEST USING FOOT EFFECT

Test performed on the empty container.
Under the effect of the load applied, an indentation of the lid of 28 mm was noted (*see photo 7 in Appendix).*
Slight, permanent deformation of the lid.

4.3. PENETRATION TEST

Slight, permanent marking of the lid (*see photo 8 in Appendix*).

4.4. IMPACT TEST ON EDGES AND CORNERS

Marking of edges and corners, without puncturing or cracks.

4.5. SECOND RAINWATER TIGHTNESS TEST

No infiltration of water observed on the container on completion of the mechanical tests.

5. COMMENTS AND CONCLUSIONS

At the end of the tests, it was noted that the container showed good resistance to the stresses exerted. No major damage was observed (such as cracks, opening of lid, infiltration of water).

The container submitted and subjected to the tests meets the requirements of air transport standard ATA 300 – revision 2008.1, in relation to the following tests:

- A rainwater tightness test
- A compression test using foot effect
- A penetration test
- An impact test on edges and corners
- A second rainwater tightness test

Trappes, 15 February 2011

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The results stated apply only to the samples, products and materials submitted to LNE and as defined in this document.

APPENDIX

Photo 1: identification of container

Photos 2 to 5: close-up views of container

Photo 6: view of laden container

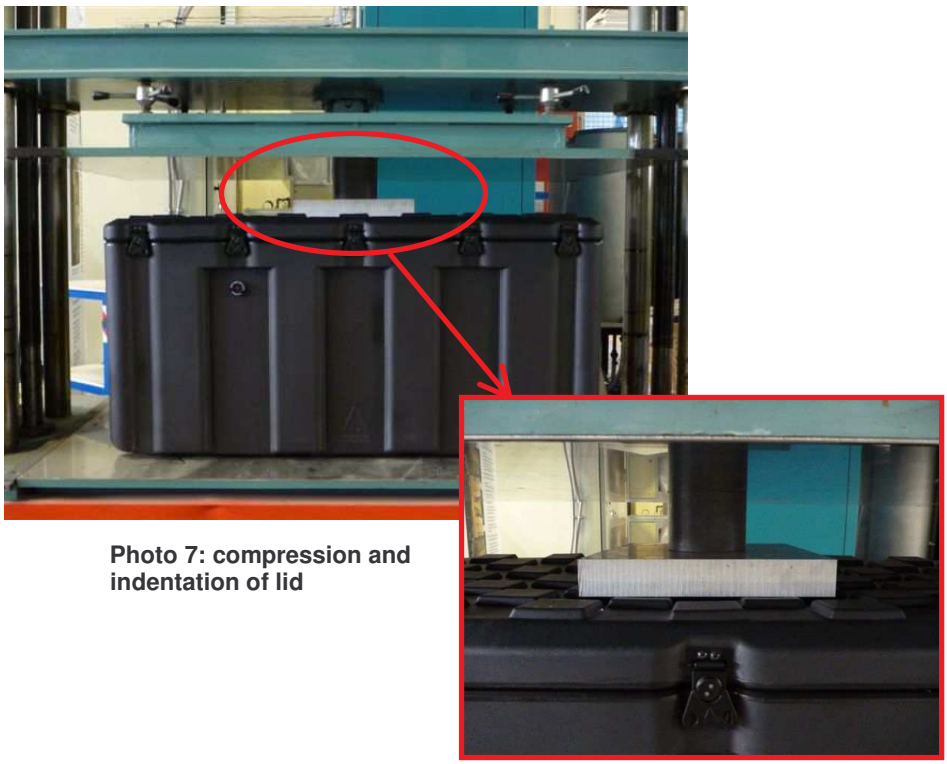

Photo 7: compression and indentation of lid

Photo 8: penetration test
and marking of lid