

LICENCE

GK 276 - 80

4G/4GV

for designs of packagings for the carriage of dangerous goods

Licence No.:

6300

Date: 2007-08-31

Designs: 4GV/4G Fibreboard Boxes

Applicant: Duropack
Wellpappe Ansbach GmbH

Robert-Bosch-Straße 3
D 91522 Ansbach

LICENCE FOR DESIGNS OF PACKAGINGS FOR THE CARRIAGE OF DANGEROUS GOODS

1 Legal Basis

Dangerous Goods Carriage Law - Federal Law Gazette I No. 145/1998 in the version of Federal Law Gazette I No. 118/2005

Roads with public traffic:

Enclosures A and B of the European Agreement concerning the International Carriage of Dangerous Goods by Road (ADR), Federal Law Gazette No. 522/1973, in the version of Federal Law Gazette III No. 21/2007

Railroad:

Regulations concerning the International Carriage of Dangerous Goods by Rail (RID), Federal Law Gazette No. 137/1967, in the version of Federal Law Gazette III No. 14/2007

Waterroutes:

Federal Law Gazette I No. 62/1997, in the version of Federal Law Gazette I No. 123/2005 and Federal Law Gazette II No. 13/2005 in the version of Federal Law Gazette II No. 356/2006

Transport by sea:

Federal Law Gazette No. 387/1996, with IMDG-Code, Amendment 33-06

Civil Aviation:

Federal Law Gazette No. 97/1949, with ICAO-TI, Edition 2007-2008

in connection with:

State-accreditation of the Austrian Institute for Packaging (ÖIV) as testing laboratory by the Republic of Austria, Federal Ministry for Economical Affairs (Notification of 1995-12-29, Zl. 92714/501-IX/2/95 in the version of Notification of 2007-05-16, Zl. 92.714/0224-I/12/2007)

Notification of the Republic of Austria, Federal Ministry of Transport, Section IV, concerning the allocation of a short marking to identify packagings which have been tested by the ÖIV in accordance with Federal Law Gazette No. 143/1981 (Notification of 1981-09-21, Zl. 75.170/1-IV/6-81)

2 Applicant

Duropack

Wellpappe Ansbach GmbH

Robert-Bosch-Straße 3

D 91522 Ansbach

3 Packaging Manufacturer

Identical to applicant

4 Description of the Packaging Designs

Folding boxes made of double wall corrugated fibreboard (sort "Concor 69800", composition according to the applicant 400 KLB/160 W/300 TLB/160 W/400 KLB or 400 KLB/175 HZ/300 TLB/175 HZ/300 TLB, flute CA) with short, not meeting skewed bottom flaps and outer top flaps meeting with reversed inner flaps in which the interlocking tongues are stuck in; the interlocking tongues are die cut on the broadsides; a palette made of corrugated fibreboard is joint with the folding box by means of flaps fixed on the palette; the flaps are inserted in the bottom flaps of the box and are bended;

manufactured with a glued and stitched joint;

Box closure: top side by interlocking tongues, bottom side by the design of the bottom flaps and the palette; additionally four times (twice lengthwise over the interlocking tongues and twice crosswise) strapping with a band made of plastics (min. width 12.5 mm);

Nominal inside dimensions: 780 x 580 x 610 mm (L x W x H);

Outside dimensions: 800 x 600 x 760 mm (L x W x H incl. palette);

4.1 Design “6985 - 4GV”

in the box a bag made of plastics, filled with absorbent material „Vermiculite” and leakproof sealed;

Inner Packagings: six 2500-ml-glass bottles (outside diameter: 139 mm; height <incl. closure>: 293 mm; gross mass of one filled inner packaging: 14.0 kg) with plastic screw closure, in two rows evenly distributed in the folding box, were used for the drop test;

Maximum gross mass of the filled and sealed package: 75.0 kg;

Original filling material: articles or inner packagings of any type for solids or liquids;

For the tests glass bottles as inner packagings filled with water and lead shot were used.

4.2 Design “6985 - 4G”

Maximum gross mass of the filled and sealed package:

- package is used for Packaging Groups I, II and III: 80 kg;
- package is used for Packaging Groups II and III: 110 kg;
- package is used for Packaging Group III: 130 kg;

Original filling material: solid substances/articles, maybe inner packagings;

For the tests barley with inserted paper-rolls (to decrease the gross mass) was used.

5 Requirements for the Packaging Designs

The packaging designs must be in conformity with the design types which were tested according to the below-mentioned test report for a design type 4GV and 4G respectively (“Fibreboard Boxes”) in accordance with chapter 6.1, Provisions for the construction and testing of packagings of enclosure A to the European Agreement regarding the International Carriage of Dangerous Goods by Road (ADR).

Similar regulations are in force for the transport by train (RID), by ship (IMDG-Code) and by plane (ICAO-Code), whereby the test requirements regarding the packagings for carrying dangerous goods by the various transport operators have been largely harmonised, because of the acceptance of the UN-Recommendations ("Orange book", Recommendations prepared by the United Nations Committee of Experts on the Transport of Dangerous Goods, fourteenth revised edition, 2005).

Therefore the mentioned test report is an integral part of this licence:

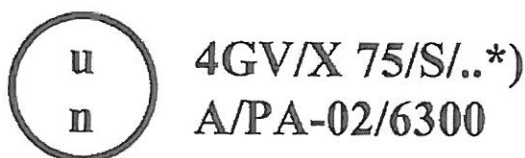
Test Report No.:	Date:	Testing House:
6300/8/07	2007-08-31	Österreichisches Institut für Verpackungswesen

6 Manufacturing of the Packagings

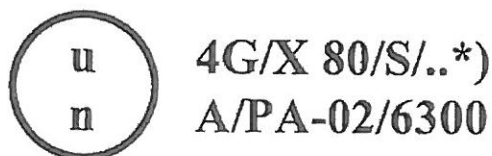
Packagings of these licensed designs may be mass-produced. By printing the UN-Marking on the packagings the manufacturer guarantees that the mass-produced packagings meet all the requirements of the licensed packaging designs and that all conditions and supports listed in this licence are fulfilled.

7 Marking

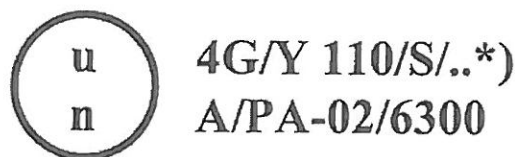
Packagings, when mass-produced in accordance with the tested designs, must be durably and visibly marked as follows:



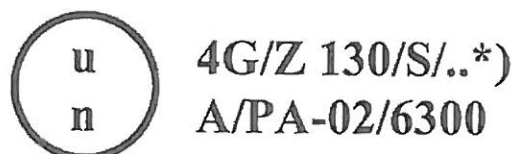
and/or



and/or



and/or



*) the last two digits of the year of production of the fibreboard boxes

All letters, numerals and symbols shall be at least 12 mm high and the markings or a duplicate thereof shall appear on the top or on a side of the packaging.

8 Conditions for the Use of the Packagings

- 8.1 Packagings, mass-produced in accordance with the licensed packaging designs and marked according to point 7 may be used for dangerous goods if such packagings are permitted by the regulations of the various transport operators. If used for transportation by ship, suitable qualities of papers for liners and flutes should be used and the glue of the corrugated board should be wet strength.
- 8.2 According to the capability of the packagings of the design "6985 - 4GV", dangerous goods to be transported can be classified in packaging group I, II or III.
- 8.3 According to the capability of the packagings of the design "6985 - 4G", dangerous goods to be transported must be classified in the corresponding packaging group depending on the maximum allowed gross mass.
- 8.4 The total gross mass of the inner packagings of the design "6985 - 4GV" must not exceed 42.0 kg.
- 8.5 The gross mass of the packages must not exceed the maximum gross mass stated in point 4.

- 8.6 The thickness of cushioning material between inner packagings and between inner packagings and the outside of the packaging shall not be reduced below the corresponding thicknesses in the originally tested packaging. When either fewer or smaller inner packagings are used (as compared to the inner packagings used in the drop test), the thickness of cushioning material between inner packagings shall not be less than the thickness of cushioning between the outside of the packaging and the inner packaging in the original test and sufficient additional cushioning material shall be used to take up void spaces.
- 8.7 Inner packagings containing liquids shall be completely surrounded with a sufficient quantity of absorbent material to absorb the entire liquid contents of the inner packagings.
- 8.8 In addition to the UN-Marking specified in point 7 the packagings have to bear other prescribed markings, symbols and dangerous goods labels.
- 8.9 Those parts of packagings which are in direct contact with dangerous substances shall not be affected by chemical or by other action of those substances. If necessary, they shall be provided with a suitable inner coating or treatment. Such parts of packagings shall not incorporate constituents liable to react dangerously with the contents so as to form hazardous products, or to weaken them significantly.
- 8.10 The applicant named in point 2 must be able to prove that all conditions concerning the usage of these packagings are well known to everybody who uses/fills these packagings for/with dangerous goods.
- 8.11 Direction is made to the necessary observation of the manufacturing of packagings of these packaging designs according to the "BAM - Regeln zu den Vorschriften über die Beförderung gefährlicher Güter", "BAM-GGR 001 - Verfahren der Überwachung und Qualitätssicherung der Herstellung von Verpackungen".
- 8.12 The content of the boxes of the design "6985 - 4G" may be solids or inner packagings, i.e. combination packagings. In this case the packer/shipper must be able to prove (e.g. by additional drop tests or considering paragraph 6.1.5.1.6, ADR, respectively IMDG-Code) that filled packages can meet the same requirements as the tested packaging design.

9 Others

The packaging designs are in accordance with the test requirements for packagings for the carriage of dangerous goods as stated in the international agreements for traffic by road (ADR), rail (RID), sea (IMDG-Code) and air (IATA-DGR/ICAO-TI). This also covers the test requirements laid down in the Recommendations of the United Nations (UN).

This licence is given but may be revoked at any time.

10 Licence

The packaging designs as prescribed in point 4 are licensed under the condition that the requirements of point 5 - 8 are fulfilled.

ÖSTERREICHISCHES INSTITUT FÜR VERPACKUNGSWESEN



Dir. Univ.-Lektor Th. Rieder
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This licence No. 6300 consists of 8 pages.