Economic Commission for Europe

Inland Transport Committee

Working Party on the Transport of Perishable Foodstuffs

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Proposals of amendments to the ATP: New proposals

Separate testing of liquefied gas systems - Related document ECE/TRANS/WP.11/2011/15

Transmitted by the Government of the Netherlands

Introduction

- 1. Only for mechanically refrigerated equipment the option to test and approve the thermal unit separately is given in subsection 3.2.6 of Annex 1 Appendix 2.
- 2. For equipment with a thermal unit working on liquefied gas the option to test and approve the thermal unit separately is not foreseen in ATP. There is however no technical problem to test and approve separately. Although document 2011/15 of France makes an effort to make this option possible for refrigerated liquefied gas units, we are of the opinion that more amendment is needed to make this work. Additionally to the proposal in 2011/15 we propose the introduction of new subsections in 3.1 of Annex 1, Appendix 2 and a consequential amendment to 3.2.6 of Annex 1, Appendix 2 for mechanically refrigerated units to make a link to the special test procedure in part 4 of Annex 1, Appendix 2.

Proposal

- 3. Introduce new subsections 3.1.7 and 3.1.8 after subsection 3.1.6 to read:
- "3.1.7 If the liquid gas refrigerating appliance with all its accessories has undergone separately, to the satisfaction of the competent authority, a test in conformity with the procedure in part 4 of this Appendix to determine its effective refrigerating capacity at the prescribed reference temperatures, the transport equipment may be accepted as refrigerated equipment without undergoing an efficiency test if the effective refrigerating capacity of the appliance in continuous operation exceeds the heat loss through the walls for the class under consideration, multiplied by the factor 1.75.
- 3.1.8 If the liquid gas refrigerating unit is replaced by a unit of a different type, the competent authority may:
- (a) require the equipment to undergo the determinations and verifications prescribed in paragraphs 3.1.1 to 3.1.5; or
- (b) satisfy itself that the effective refrigerating capacity of the new refrigerating unit is, at the temperature prescribed for equipment of the class concerned, at least equal to that of the unit replaced; or



- (c) satisfy itself that the effective refrigerating capacity of the new refrigerating unit meets the requirements of paragraph 3.1.6."
- 4. Amend subsection 3.2.6 to read: (new text in italic script)
- "3.2.6 If the refrigerating appliance with all its accessories has undergone separately, to the satisfaction of the competent authority, a test *in conformity with the procedure in part 4 of this Appendix* to determine its effective refrigerating capacity at the prescribed reference temperatures, the transport equipment may be accepted as mechanically refrigerated equipment without undergoing an efficiency test if the effective refrigerating capacity of the appliance in continuous operation exceeds the heat loss through the walls for the class under consideration, multiplied by the factor 1.75."

Justification

- 5. Thermal appliances working on refrigerated liquefied gas are becoming ever more popular even for large equipment. There is no pollution on site and the operation is quiet.
- 6. Identical thermal appliances are used on a variety of insulated bodies made by different manufacturers. The efficiency is however not influenced by the fitting in the insulated bodies produced by the various manufacturers. Making this separate test possible will save time, money and even the environment by testing only once.

Costs

7. By testing one sample of a thermal unit working on refrigerated liquefied gas costs will be reduced.

Feasibility

8. Less testing will be necessary with consequences for manufacturers and testing stations. The amendment is a relaxation from testing so no transitional measures are required. A practical procedure will be legalized.

Enforceability

9. The amendment will harmonize the procedure of approval of equipment with thermal units working on refrigerated liquefied gas between contracting parties. Enforceability will improve.

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