Economic Commission for Europe

Inland Transport Committee

Working Party on the Transport of Dangerous Goods

105th session 16 October 2018

Geneva, 6-9 November 2018

Item 5 (b) of the provisional agenda:

Proposals for amendments to annexes A and B of ADR:

miscellaneous proposals

Proposal to add a footnote to the table in 1.1.3.2 to define Nm³

Transmitted by the Government of the United Kingdom

Summary

Executive summary: To facilitate correct interpretation of the exemptions related to the

carriage of gases, it is appropriate to define the unit Nm³ used in

the table of ADR 1.1.3.2, energy content of fuels.

Action to be taken: Add a footnote to the table in NOTE 1 of 1.1.3.2 defining a normal cubic

meter, Nm³

Introduction

- 1. The table in NOTE 1 of 1.1.3.2 states the energy content of gases in MJ/Nm3. The unit Nm3, a normal cubic meter, is associated with reference conditions of temperature and pressure which are not defined in 1.1.3.2 or elsewhere in ADR.
- 2. The United Kingdom has not identified the use of Nm3 in ADR outside of 1.1.3.2.

Proposal

- 3. To create a footnote (a) to the table in NOTE 1 of ADR 1.1.3.2, stating:
 - "(a) 1 Nm³ refers to a 'normal cubic meter': the amount of a gas occupying 1 m³ under temperature and pressure conditions of 0 °C and 1.013 bar (1 atmosphere)."

A superscript (a) next to the two mentions of Nm³ may be used to reference the footnote.

Justification

4. Defining Nm³ in 1.1.3.2 will help to ensure accurate interpretation of the text. It is noted that different regions and organisations may choose to use different temperature and pressure conditions when defining what conditions are "normal" and "standard". Therefore, it would be helpful to include a definition of the Nm³ reference conditions in ADR.