## UN/SCEGHS/24/INF.29

Committee of Experts on the Transport of Dangerous Goods and on the Globally Harmonized System of Classification and Labelling of Chemicals

Sub-Committee of Experts on the Globally Harmonized System of Classification and Labelling of Chemicals

11 December 2012

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# Work of the Sub-Committee of Experts on the Transport of Dangerous Goods on its forty-second session

Note by the secretariat

### I. Introduction

1. The Sub-Committee of Experts on the Transport of Dangerous Goods (TDG Sub-Committee) considered during its forty-second session (3 to 11 December 2012) the following matters of interest to the GHS Sub-Committee:

- (a) Adoption of expert judgement and weight of evidence procedures into the Model Regulations on the Transport of Dangerous Goods
- (b) Classification of polymerizing substances
- (c) Classification of substances mentioned by name in the dangerous goods list, interpretation of the Model Regulations
- (d) Corrosivity criteria
  - (i) Hazard communication in the supply/use sector for substances and mixtures "corrosive to metals"

(ii) Joint TDG/GHS Working Group on corrosivity criteria

- (e) Criteria for water-reactivity (Test N.5)
- (f) Tests and criteria for oxidizing solids
- (g) Amendments to physical hazard precautionary statements
- (h) Consequential amendments to chapter 2.9 of the Model Regulations resulting from the corrections proposed in ST/SG/AC.10/C.3/2012/24
- (i) Classification criteria and flammability categories for certain refrigerants

2. The TDG Sub-Committee also considered a proposal to introduce an alternative test to the HSL flash composition test in the Manual of Tests and Criteria (refer to ST/SG/AC.10/C.3/2012/CRP.3).



### II. Excerpts from the draft report of the TDG Sub-Committee<sup>1</sup>

## A. Adoption of expert judgement and weight of evidence procedures into the Model Regulations on the Transport of Dangerous Goods

*Document:* ST/SG/AC.10/C.3/2012/74 (CEFIC)

16. Some experts supported the idea of incorporating in the Model Regulations certain paragraphs from subsections 1.3.2.4.7 and 1.3.2.4.8 of the Globally Harmonized System of Classification and Labelling of Chemicals (GHS), which explained the use of semiquantitative and qualitative criteria and concepts such as "expert judgement" and "weight of evidence".

17. Others were opposed, as they considered that the paragraphs in question were not written as regulatory provisions and could lead to problems of interpretation. They preferred introducing them in the Guiding Principles, or simply making reference to them there. Some experts also considered that the issue should be examined in more detail to see how to adapt them to the transport regulations before including them in the Guiding Principles.

18. The representative of CEFIC withdrew her proposal and said that it would be useful to take it up on the basis of the experience gained in the work currently under way on corrosivity.

Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.1, paragraphs 16–18)

#### **B.** Classification of polymerizing substances

*Document*: ST/SG/AC.10/C.3/2012/82 (DGAC)<sup>2</sup>

27. The Sub-Committee was in favour of dealing with the issue of substances that selfreacted by polymerization during transport and did not fall under Classes 1 to 8. However, it did not wish to decide on the specific proposals of DGAC, as it considered that the matter should be addressed as a whole and in greater detail during the next biennial period. Furthermore, **as the matter could affect areas other than transport, particularly storage, the Sub-Committee of Experts on the Globally Harmonized System of Classification and Labelling of Chemicals should be informed about it. The GHS Sub-Committee should be requested to help by including the issue of classification of such substances and hazard communication in its programme of work.** 

Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.1, paragraph 27)

## C. Classification of substances mentioned by name in the dangerous goods list, interpretation of the Model Regulations

Informal document: TDG/41/INF.20 (Netherlands)

55. The expert from the Netherlands drew attention on problems for classification of substances which are listed by name in the Dangerous Goods List. The provisions are clear

<sup>&</sup>lt;sup>1</sup> Paragraph numbers are those of the draft report of the TDG Sub-Committee.

<sup>&</sup>lt;sup>2</sup> Available at : http://www.unece.org/trans/main/dgdb/dgsubc3/c32012.html.

in the case of solutions and mixtures, or when it can be shown by the application of tests and criteria that a substance listed by name does not meet the criteria, but it is unclear how to deal with substances possessing additional hazards not identified in the list.

56. Some experts felt that such substances should be classified under the appropriate generic or NOS entry reflecting all hazards identified, whilst others feared that such an approach could lead to misunderstandings or legal problems in international transport.

57. It was noted that the classification work currently carried out in many countries in the context of implementation of the GHS is likely to put into question the current classification of some substances listed by name. Therefore **it was agreed that the issue raised by the Netherlands should be further discussed in the next biennium and that the GHS Sub-Committee should be informed accordingly**.

Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.6, paragraphs 55-57)

#### D. Corrosivity criteria

#### 1. Hazard communication in the supply/use sector for substances and mixtures "corrosive to metals"

Document: ST/SG/AC.10/C.3/2012/98 - ST/SG/AC.10/C.4/2012/15 (AISE)

69. The Sub-Committee **noted** with satisfaction the outcome of the work of the GHS correspondence group, in particular the fact that the options proposed would remain neutral for the transport sector, bearing in mind that the Sub-Committee is not in favour of a proliferation of new pictograms if not necessary. The Sub-Committee **noted also** that the range of substances that would be corrosive to metals and not corrosive to skin or eyes was rather limited. For the proposed options, there was no consensus but the majority of experts who took the floor expressed preference for option B.

Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.8, paragraph 69)

#### 2. Joint TDG/GHS Working Group on corrosivity criteria

Informal documents:	TDG/41/INF.6 – GHS/24/INF.6 (Secretariat)
	TDG/41/INF.36 – GHS/24/INF.16 (United Kingdom)
	TDG/41/INF.16 - GHS/24/INF.8 (CEFIC)
	TDG/41/INF.25 – GHS/24/INF.12 (CEFIC)
	TDG/41/INF.37 – GHS/24/INF.17 (Netherlands)

70. These documents were discussed by the Joint TDG-GHS Working Group on corrosivity criteria which met on 11 December 2012.

Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.8, paragraph 70)

#### E. Criteria for water-reactivity

Informal document: TDG/41/INF.40 (United States of America)

71. The Sub-Committee, looking forward to further developments, **took note of the information provided** on the status of the project managed by the United States Transportation Research Board.

(Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.8, paragraph 71)

#### F. Tests and criteria for oxidizing solids

*Document*: ST/SG/AC.10/C.3/2012/75 – ST/SG/AC.10/C.4/2012/11 (Germany)

76. The Sub-Committee **agreed to include an additional test O.3** for classification of oxidizing solids in the Manual of Tests and Criteria, subject to concurrence by the GHS Sub-Committee (see annex ...). This test is equivalent or preferable to the O.1 test.

77. The Sub-Committee **noted that** this new O.3 test was considered to be preferable to the O.1 test for new substances or mixtures to be classified. **Technical problems for performing both tests had been identified and additional work was needed**. Once these problems resolved, it was anticipated that the O.3 test could replace the O.1 test, possibly in four years. It was not expected that classifications would be amended on this basis in the interim period.

(<u>Reference document</u>: ST/SG/AC.10/C.3/2012/CRP.3/Add.9, paragraphs 76 and 77 as amended)

### G. Amendments to physical hazard precautionary statements

Document:	ST/SG/AC.10/C.3/2012/102 (United Kingdom)
Informal documents:	INF.8 and INF.8/Add.1 (United Kingdom)

79. The Sub-Committee **noted the information provided but did not express comments** on this issue to be discussed by the GHS Sub-Committee.

(Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.9, paragraph 79)

## H. Consequential amendments to chapter 2.9 of the Model Regulations resulting from the corrections proposed in ST/SG/AC.10/C.3/2012/24

80. The Sub-Committee instructed the secretariat to reflect the corrections that would be made by the GHS Sub-Committee to the GHS in Chapter 2.9 of the Model Regulations, as appropriate.

(Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.9, paragraph 80)

## I. Classification criteria and flammability categories for certain refrigerants

Informal document: TDG/42/INF.26 – GHS/24/INF.26 Belgium)

84. The Sub-Committee agreed to include this issue in its programme of work.

(Reference document: ST/SG/AC.10/C.3/2012/CRP.3/Add.9, paragraph 84)

### Annex

### Draft amendments to the 5th revised edition of the UN Recommendations on the Transport of Dangerous Goods, Manual of Tests and Criteria

Document ST/SG/AC.10/C.3/2012/75 - ST/SG/AC.10/C.4/2012/11 (adopted with the following modifications:

In the amendments to the Manual of tests and Criteria:

34.4.3 In the heading, replace "Alternative" by "Gravimetric".

34.4.3.1 In the first paragraph, delete the square brackets.

Figure 34.4.3.1 In the title of the figure, replace "UN O.1" by "UN O.3".

In the consequential amendments for the Model Regulations:

2.5.2.2.1.1 (b) Replace "equal to or less" with "equal to or greater".

For the Manual of tests and Criteria, add the following consequential amendment:

1.6.1 At the beginning of the fifth sentence, insert the following text: "Unless otherwise specified, ...".

In the Table of Contents of Part III, in Note 2, at the beginning, insert "Unless otherwise specified, ...".

34.3.1 In the second sentence, replace "test method is given" by "test methods are given".

(Reference document: ST/SG/AC.10/C.3/2012/CRP.4/Add.5)