Proposed amendment to the classification criteria for flammable liquids in Chapter 2.6 of the GHS

Submitted by the International Paint and Printing Ink Council (IPPIC)*

Introduction

1. The goal of the GHS, as described in Chapter 1.1, is to achieve worldwide harmonization in the classification and labelling of chemicals. The International Paint and Printing Ink Council (IPPIC), which has many member companies operating globally or multi-nationally, supports this goal of harmonization and appreciates the work that has gone into creating and developing the GHS since its inception.

2. It is also a goal to achieve harmonization or consistency between the GHS and the rules for the transport of dangerous goods. Paragraph 1.1.3.1.2 states that “For transport, it is expected that application of the GHS will be similar to application of current transport requirements.” Section 1.3.1.2 states that for physical hazards, the transport definitions, test methods and classification criteria were used as the basis for development of the GHS criteria. At the present time a substantial amount of work is ongoing to revise the UN Recommendations on the Transport of Dangerous Goods - Manual of Tests and Criteria to better take into account its use in the context of the GHS.

* In accordance with the programme of work of the Sub-Committee for 2017–2018 approved by the Committee at its eighth session (see ST/SG/AC.10/C.3/100, para. 98, and ST/SG/AC.10/44, para. 14).
Background and discussion

3. Note 2 in section 2.6.2 of the GHS describes the possibility to ‘de-classify’ liquids, which would be classified as flammable based on flash point alone, on the basis of a negative result in the sustained combustibility test L.2 of Part III, section 32 of the Manual of Tests and Criteria. (The same note also appears as footnote 2 to the decision logic in 2.6.4.1.)

4. This possibility however applies only to some other regulatory purposes, such as transport, and is not implemented as a classification criterion in GHS itself. It seems incongruous that the results of test L.2 cannot also be applied for classification under GHS, which creates an inconsistency between transport classification and GHS classification for supply and use. This inconsistency can cause confusion and lead to consignments being stopped or delayed when packages carry labelling/marking for both supply and transport.

5. In the European Union the note has been adopted as a core classification criterion in its implementation of GHS, Regulation (EC) No 1272/2008 (the ‘CLP Regulation’), in Annex I Part 1, section 2.6.4 ‘Additional Classification Considerations’ for flammable liquids:

   “2.6.4.5 Liquids with a flash point of more than 35 °C [and not more than 60 °C] need not be classified in Category 3 if negative results have been obtained in the sustained combustibility test L.2, Part III, section 32 of the UN RTDG, Manual of Tests and Criteria.”

   The text in square brackets was added in the second Adaptation to Technical Progress, Commission Regulation (EU) No 286/2011. Category 4 for flammable liquids is not implemented in the CLP Regulation.

6. In order to remove the inconsistency between supply and transport classification, and to increase harmonisation between jurisdictions implementing GHS, IPPIC proposes to delete Note 2 and convert its content into GHS classification criteria text, to enable its implementation as part of the hazard class flammable liquids.

7. In its document ST/SG/AC.10/C.3/2016/62-ST/SG/AC.10/C.4/2016/13 (fiftieth session of the TDG Sub-Committee thirty-second session of the GHS Sub-Committee), Germany pointed out that in principle it should also be possible to exempt flammable liquids of Category 4 in a similar way using a sustained combustibility test. This would however require a modification to test L.2 to introduce test temperatures appropriate to liquids with a flash point above 60 °C. This aspect is not addressed in this proposal from IPPIC and should be the subject of a separate dedicated proposal. In the meantime however, the first reference to footnote 2 in the decision logic in 2.6.4.1 remains erroneous, as pointed out by the expert from Germany, and should perhaps be deleted unless/until such amendment is adopted.

8. In this document IPPIC is proposing amendments to the GHS only, and no changes are proposed to the Model Regulations on the Transport of Dangerous Goods. It is nonetheless submitted as a formal working document to both sub-committees since it concerns a physical hazard, for which the TDG Sub-Committee is the relevant focal point.
Proposal

9. Amend section 2.6.2 of the GHS as follows (additions are underlined, deletions in strikethrough):

“2.6.2 Classification criteria

2.6.2.1 A flammable liquid is classified in one of the four categories for this class according to the following table:

Table 2.6.1: Criteria for flammable liquids

<table>
<thead>
<tr>
<th>Category</th>
<th>Criteria</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Flash point &lt; 23 °C and initial boiling point ≤ 35 °C</td>
</tr>
<tr>
<td>2</td>
<td>Flash point &lt; 23 °C and initial boiling point &gt; 35 °C</td>
</tr>
<tr>
<td>3</td>
<td>Flash point ≥ 23 °C and ≤ 60 °C</td>
</tr>
<tr>
<td>4</td>
<td>Flash point &gt; 60 °C and ≤ 93 °C</td>
</tr>
</tbody>
</table>

2.6.2.2 Liquids with a flash point of more than 35 °C and not more than 60 °C need not be classified in Category 3 if negative results have been obtained in the sustained combustibility test L.2 of Part III, section 32 of the UN Recommendations on the Transport of Dangerous Goods, Manual of Tests and Criteria.

NOTE 1: Gas oils, diesel and light heating oils in the flash point range of 55 °C to 75 °C may be regarded as a special group for some regulatory purposes.

NOTE 2: Liquids with a flash point of more than 35 °C and not more than 60 °C may be regarded as non-flammable liquids for some regulatory purposes (e.g. transport) if negative results have been obtained in the sustained combustibility test L.2 of Part III, section 32 of the UN Recommendations on the Transport of Dangerous Goods, Manual of Tests and Criteria.

NOTE 3: Viscous flammable liquids such as paints, enamels, lacquers, varnishes, adhesives and polishes may be regarded as a special group for some regulatory purposes (e.g. transport). The classification or the decision to consider these liquids as non-flammable may be determined by the pertinent regulation or competent authority.

NOTE 4: Aerosols should not be classified as flammable liquids. See Chapter 2.3.”

10. In section 2.6.4.1, amend footnote 2 to decision logic 2.6 to reflect the wording of new section 2.6.2.2 in paragraph 9 above.

11. Optional (temporary) amendment: in decision logic 2.6, in the arrow between the second question (“Does it have a flash point > 60 °C?”) and Category 4, replace “Yes1,2” by “Yes3.”