# UN/SCEGHS/37/INF.3 Rev.1

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

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

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Item 3(b) of the provisional agenda
Hazard communication:
improvement of annexes 1 to 3 and further
rationalization of precautionary statements

# **Proposed changes to Annex 1**

# Transmitted by the expert from the United Kingdom on behalf of the informal working group on improving Annexes 1, 2 and 3 of the GHS

This informal document sets out the changes proposed in working document ST/SG/AC.10/C.4/2019/2. New text is shown in red, and deleted text is shown in strikethrough. As it is difficult to clearly display the changes between existing adjacent table entries to the proposed merged table entries, only the merged entries are displayed in this document.

The differences in the proposed text presented in this document (INF.3 Rev.1) as compared to that presented in UN/SCEGHS/37/INF3 are shown in <u>red underlined</u> for new text and deleted text is shown in <u>red strikethrough</u>.

#### Annex 1

# Classification and labelling summary tables

**NOTE 1:** The codification of hazard statements is further explained in Annex 3 (Section 1). The hazard statement codes are intended to be used for reference purposes only. They are not part of the hazard statement text and should not be used to replace it.

**NOTE 2:** To provide clarity, assist labelling practicioners and enable comparison between equivalent classification and labelling systems under the GHS and the UN Recommendations on the Transport of Dangerous Goods Model Regulations (UN Model Regulations), UN Model Regulations), UN Model Regulations (UN Model Regulations), UN Model Regulations A1.1 to A1.30. However, it should be noted that in these tables the UN Model Regulations classification and labelling entries are provided for indicative purposes only. and for For the definitive transport purposes, the classification and labelling provisions prescribed by UN Model Regulations shall be used (see also Chapter 1.4, section 1.4.10 of the GHS) elassification and labelling under these Regulations please refer to the UN Model Regulations.

**NOTE 3:** GHS hazard pictograms are displayed with a black symbol on a white background within a diamond shaped red border. The <u>UN Model Regulationstransport</u> pictograms (commonly referred to as labels in the Model Regulations) shall be displayed on a background of contrasting colour or, where appropriate, shall have either a dotted or solid boundary line as provided in <u>Chapter 5.2 Volume II</u> of the UN Model Regulations\* and in Tables A1.1 to A1.30 below. For some hazard categories, the symbol, number and border line of the <u>UN Model Regulationstransport</u> pictogram may be shown in white instead of black. Where such an alternative <u>UN Model Regulations pictogram</u> is available it is <u>provided shown</u> in the relevant Tables below (see Tables A1.2, A1.3, A1.4; A1.5, A1.6, A1.12, A1.15, A1.17).

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<sup>\*</sup> see UN Recommendations on the Transport of Dangerous Goods, Model Regulations, Volume II, Chapter 5.2, Section 5.2.2.2 'Provisions for labels'.

# A1.1 Explosives (see Chapter 2.1 for classification criteria)

	Classificatio	on			Lat	pelling	Hazard
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes
	Unstabl	Unstable explosive		(Transport not allowed)		Unstable explosive	H200
	1.1				Explosive; mass explosion hazard	H201	
		1.2		2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2	Danger	Explosive; severe projection hazard	H202
						Explosive; fire, blast or projection hazard	H203
Explosives		1.4		1.4	Warning	Fire or projection hazard	H204
		1.5	No	1.5	Danger	May mass explode in fire	H205
		1.6	pictogram	1.6	No signal word	No hazard statement	None

<sup>&</sup>lt;sup>a</sup> Under the UN Model Regulations, (\*) signifies indicates the pPlace for compatibility group. The pictogram for Divisions 1.1, 1.2 and 1.3 is also assigned to substances which have an explosive subsidiary risk, but without the indication of the division number and the compatibility group (see also "Self reactive substances and mixtures" and "Organic peroxides").

## A1.2 Flammable gases (see Chapter 2.2 for classification criteria)

	(	Classification				La	belling		Hazard
Hazard class		GHS hazard category		UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes
		Flammable ;	gas					Extremely flammable gas	H220
		Pyrophoric ;	gas					Extremely flammable gas May ignite spontaneously if exposed to air	H220 H232
Flammable gases	1A	Chemically	A	2.1		or	Danger	Extremely flammable gas May react explosively even in the absence of air	H220 H230
<b>9</b>		unstable gas	В			2		Extremely flammable gas May react explosively even in the absence of air at elevated pressure and/or temperature	H220 H231
		1B						Flammable gas	H221
		2		Not applicable	No pictogram	Not applicable Not required	Warning		

Under the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, the symbol, number and border line may be shown in black instead of white. The background colour stays red in both cases. pyrophoric gases and chemically unstable gases (A and B) are classified based on their flammability in Class 2, Division 2.1 do not have a specific UN Model Regulations classification. However, as these hazard subcategories are also flammable gases, by default they are classified under this hazard class and bear the Division 2.1 UN Model pictogram.

# A1.3 Aerosols and Chemicals under pressure (see Chapter 2.3 for classification criteria)

	Classificati	on		Lab	elling		Hazard
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram*	Signal word	Hazard statement	statement codes
						Extremely flammable aerosol	H222
	2.1	Danger	Pressurized container: may burst if heated	H229			
Aerosols		2.1		or		Flammable aerosol	H223
(section 2.3.1)	.1)		Pressurized container: may burst if heated	H229			
,	3	2.2	No pictogram	or or	Warning	Pressurized container: may burst if heated	H229
Chemicals	1				Danger	Extremely flammable chemical under pressure: may explode if heated	H282
under pressure 2 (section	or 2	Wanis	Flammable chemical under pressure: may explode if heated	H283			
2.3.2)	3	2.2		or or	Warning	Chemical under pressure: may explode if heated	H284

Under the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, the symbol, number and border line may be shown in black or white. The background colour is red for categories 1 and 2 and green for category 3.

# A1.4 Oxidizing gases (see Chapter 2.4 for classification criteria)

-	Classificati	on	Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictograma	Signal word	Hazard statement	statement code
Oxidizing gases	1	2.2		and 5.1	Danger	May cause or intensify fire; oxidizer	H270

<sup>&</sup>lt;sup>a</sup> Under the UN Model Regulations, oxidising gases are classified under Division 2.2 (non-flammable, non-toxic gases) according to their primary hazard. However, under the UN Model Regulations as these substances also have <u>an oxidizing</u>

subsidiary hazard of being oxidising substances, they are assigned bear both a Division 2.2 (gas cylinder) and thea Division 5.1 (flame over circle) UN Model pictograms transport pictogram.

#### A1.5 Gases under pressure (see Chapter 2.5 for classification criteria)

	Classification		Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes
	Compressed gas					Contains gas under pressure; may explode if heated	11200
Gases	Liquefied gas	2.2		or or	W	Contains gas under pressure; may explode if heated	H280
under pressure	Refrigerated liquefied gas	2.2		01	Warning	Contains refrigerated gas; may cause cryogenic burns or injury	H281
	Dissolved gas			2		Contains gas under pressure; may explode if heated	H280

Under the UN-Recommendations on the Transport of Dangerous Goods, Model Regulations, the symbol, number and border line may be shown in white instead of black. The background colour stays green in both cases. This pictogram is not required for gases under pressure that are also toxic or flammable gases. In those cases, as the applicable toxic or flammable hazard class pictogram for these hazard classes is used instead (see also note "a" to tables A1.18 and A1.2).

## A1.6 Flammable liquids (see Chapter 2.6 for classification criteria)

	Classification		Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division <sup>a</sup>	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes
	1					Extremely flammable liquid and vapour	H224
Flammable	2	2 Class-3		or	Danger	Highly flammable liquid and vapour	H225
liquids	3		•	3		Flammable liquid and vapour	H226
	4	Not applicable	No pictogram	Not applicable Not required	Warning	Combustible liquid	H227

<sup>\*</sup> Under the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, the symbol, number and border line may be shown in black instead of white. The background colour stays red in both cases, flammable liquids are classified under Class 3 without any Division or Category.

## A1.7 Flammable solids (see Chapter 2.7 for classification criteria)

	Classification		Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram Signal word Hazard statement			statement codes
Flammable	1	41			Danger	Elements and	11220
solids	2	4.1			Warning	Flammable solid	H228

## A1.8 Self-reactive substances and mixtures (see Chapter 2.8 for classification criteria)

C	Classificatio	n			Lab	elling	Hazard
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes
	Type A	4.1 <u>Type A</u>		(Transport  not may not be allowed) <sup>b</sup>	Danger	Heating may cause an explosion	H240
Self-reactive substances and mixtures	Туре В	4.1 <u>Type B</u>	and A	and if applicable a:	Danger	Heating may cause a fire or explosion	H241
	Types C and D	4.1 <u>Types C and</u> <u>D</u>			Danger	Heating may cause a fire	H242
	Types E and F	4.1 <u>Types E and</u> <u>F</u>			Warning	ricating may cause a fire	П242
	Type G	Not applicable Type G	No pictogram	Not applicable Not required	No signal word	No hazard statement	None

For Type B, uUnder the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, where a Type B substance or mixture has an explosive subsidiary hazard, then the transport pictogram for Divisions 1.1, 1.2 and 1.3 shall also be used without the indication of the division number or the compatibility group. for For a substance or mixture of hazard category Type B, special provision 181 may apply (Exemption of explosive label with competent authority approval. See Chapter 3.3 of the UN Model Regulations for more details). Where a Type B substance or mixture has an explosive subsidiary

risk, then the orange pictogram assigned to Divisions 1.1, 1.2 and 1.3 is also used but without the indication of the division number or the compatibility group.

## **A1.9 Pyrophoric liquids** (see Chapter 2.9 for classification criteria)

(	Classification			Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement code	
Pyrophoric liquids	1	4.2			Danger	Catches fire spontaneously if exposed to air	H250	

# A1.10 Pyrophoric solids (see Chapter 2.10 for classification criteria)

(	Classification			Labelling			
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement code
Pyrophoric solids	1	4.2			Danger	Catches fire spontaneously if exposed to air	H250

# A1.11 Self-heating substances and mixtures (see Chapter 2.11 for classification criteria)

	Classification			Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes	
Self-heating substances	1	4.2			Danger	Self-heating; may catch fire	H251	
and mixtures	2	4.2		4	Warning	Self-heating in large quantities; may catch fire	H252	

b May not be acceptable for transport in the packaging in which it is tested (See Chapter 2.5, para 2.5.3.2.2 of the UN Model Regulations).

**A1.12** Substances and mixtures, which in contact with water, emit flammable gases (see Chapter 2.12 for classification criteria)

C	Classificatio	n	Labelling				Hazard
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes
Substances and	1				Danger	In contact with water releases flammable gases which may ignite spontaneously	H260
mixtures, which in contact with water, emit	2	4.3		or	Danger	In contact with water releases flammable	11261
flammable gases	3			4	Warning	gases	H261

<sup>\*</sup> Under the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, the symbol, number and border line may be shown in black instead of white. The background colour stays blue in both cases.

# A1.13 Oxidizing liquids (see Chapter 2.13 for classification criteria)

C	Classificatio	n	Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes
	1				Danger	May cause fire or explosion; strong oxidizer	H271
Oxidizing liquids	2	5.1		5.1	Danger	May intensify fact avidings	H272
	3		*	·	Warning	May intensify fire; oxidizer	П2/2

# **A1.14** Oxidizing solids (see Chapter 2.14 for classification criteria)

(	Classificatio	n	Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes
	1		•		Danger	May cause fire or explosion; strong oxidizer	H271
Oxidizing solids	2	5.1		5.1	Danger		11050
	3		•	*	Warning	May intensify fire; oxidizer	H272

## **A1.15** Organic peroxides (see Chapter 2.15 for classification criteria)

(	Classificatio	n		Labelling			Hazard statement
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	codes
	Type A	5.2 <u>Type A</u>		(Transport <del>not </del> may not be allowed) <sup>b</sup>	Danger	Heating may cause an explosion	H240
Organic peroxides	Туре В	5.2 Type B	and	or 5.2 s.2 and if applicable a:	<b>Danger</b>	Heating may cause a fire or explosion	H241
	Types C and D	5.2 Types C and D			Danger	Heating may cause a	H242
	Types E and F	5.2 Types E and F		5.2 Or 5.2	Warning	fire	П242
	Type G	Not applicable Type G	No pictogram	Not applicable Not required	No signal word	No hazard statement	None

For Type B, uUnder the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, where a Type B substance or mixture has an explosive subsidiary hazard, then the transport pictogram for Divisions 1.1, 1.2 and 1.3 shall also be used without the indication of the division number or the compatibility group, for For a substance or mixture of hazard category Type B, special provision 181 may apply (Exemption of explosive label with competent authority approval. See Chapter 3.3 of the UN Model Regulations for more details). Where a Type B substance has an explosive subsidiary risk, then the orange pictogram assigned to Divisions 1.1, 1.2 and 1.3 is also used, but without the indication of the division number or the compatibility group.

May not be acceptable for transport in the packaging in which it is tested (See Chapter 2.5, para 2.5.3.2.2 of the UN Model Regulations).

## A1.16 Corrosive to metals (see Chapter 2.16 for classification criteria)

(	Classificatio	n	Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement code
Corrosive to metals	1	Class 8		8	Warning	May be corrosive to metals	H290

#### **A1.17 Desensitized explosives** (see Chapter 2.17 for classification criteria)

C	lassificatio	n		Lab	elling		Hazard
Hazard class	GHS hazard category	UN Model Regulations class or division <sup>a</sup>	GHS pictogram	UN Model Regulations pictograma	Signal word	Hazard statement	statement codes
	1	1 Class-3 (for		Not applicable  For liquids:	Danger	Fire, blast projection hazard; increased risk of explosion if desensitizing agent is reduced	H206
Desensitized explosives	liquids) or		or or	Danger	Fire or projection hazard; increased risk of explosion	H207	
explosives	3	<b>4.1</b> (for solids)		For solids:	Warning	if desensitizing agent is reduced	11207
	4				Warning	Fire hazard; increased risk of explosion if desensitizing agent is reduced	H208

Under the UN Model Regulations, cClassification and labelling of desensitized explosives are addressed in transport regulations in a different way to that under the GHS. In transport:

- Liquid desensitized explosives are classified in Class 3 (flammable liquids) for transport purposes without any Division or
  Category and shall bear a Class 3 label UN Model Regulationstransport pictogram (see Chapter 2.3, section 2.3.1.4 of the
  UN Model Regulations).
- Solid desensitized explosives are classified in Division 4.1 (flammable solids, self-reactive substances, solid desensitised explosives and polymerising substances) and shall bear a Division 4.1 label UN Model Regulationstransport pictogram (see Chapter 2.4, section 2.1.2.4 of the UN Recommendations on the Transport of Dangerous Goods, Model Regulations).

**A1.18 Acute toxicity** (see Chapter 3.1 for classification criteria)

	Cl	assification				Labelling	ţ	Hazard statement
Hazard class	_	S hazard itegory	UN Model Regulations class or division *	GHS pictogram	UN Model Regulations pictogram*	Signal word	Hazard statement	codes
		Oral			For toxic		Fatal if swallowed	H300
	1, 2	Dermal	<b>2.3</b> (for toxic		gases:	Danger	Fatal in contact with skin	H310
		Inhalation	gases)		2		Fatal if inhaled	Н330
	Oral	or		For toxic substances ba:		Toxic if swallowed	H301	
	3	Dermal	6.1 (for toxic substances ba)			Danger	Toxic in contact with skin	H311
Acute		Inhalation			6		Toxic if inhaled	H331
toxicity		Oral		^			Harmful if swallowed	H302
	4	Dermal		<b>(!)</b>		Warnin g	Harmful in contact with skin	H312
		Inhalation	Not		Not		Harmful if inhaled	Н332
		Oral	applicable		applicable Not required		May be harmful if swallowed	Н303
	5	Dermal		No pictogram		Warnin g	May be harmful in contact with skin	H313
		Inhalation				<b>5</b>	May be harmful if inhaled	Н333

<sup>\*</sup> For gases, uUnder the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, replace the number "6" in the bottom corner of the pictogram by "2".

<sup>•</sup> Toxic gases are classified in Division 2.3 and the number "2" must be displayed at the bottom corner of the UN Model Regulations pictogram.

Toxic substances are classified in Division 6.1 and the number "6" must be displayed at the bottom corner of the UN Model Regulations pictogram.

The term 'substance(s)' has a slightly different meaning under the UN Model Regulations (see Chapter 2.0 section 2.0.1.1 'Definitions') than under the GHS (see Chapter 1.2 'Definitions and Abbreviations'). As defined in the UN Model Regulations (see Chapter 2.6, paragraph 2.6.1 (a)). The term "substances" in the Model Regulations covers substances and mixtures.

## **A1.19 Skin corrosion/irritation** (see Chapter 3.2 for classification criteria)

Cla	assification				Labelling		Hazard
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes
Skin corrosion/irritation	1, 1A <sup>a</sup> , 1B <sup>a</sup> , 1C <sup>a</sup>	Class-8			Danger	Causes severe skin burns and eye damage	Н314
	2	Not		Not applicable	Warning	Causes skin irritation	Н315
	3ªb	applicable	No pictogram	applicable Not required	Warning	Causes mild skin irritation	Н316

Hazard Ssub-categories may be applied where data are sufficient and where required by a competent authority In accordance with the criteria, classification into sub-categories 1A, 1B and 1C may be required by some competent authorities. Others may only require classification in category 1 (see Section 3.2.2.2.1.2).

## A1.20 Serious eye damage/eye irritation (see Chapter 3.3 for classification criteria)

C	Classification			Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes	
	1				Danger	Causes serious eye damage	Н318	
Serious eye damage/eye irritation	2/2A <sup>a</sup>	Not applicable	<b>(!)</b>	Not applicable Not required	Warning	Causes serious eye irritation	Н319	
	2B <sup>a</sup>		No pictogram		Warning	Causes eye irritation	Н320	

<sup>&</sup>lt;sup>a</sup> <u>In accordance with the criteria, classification into sub-categories 2A and 2B may be required by some competent authorities.</u>

<u>Others may only require classification in category 2 (see Section 3.3.2.1.2.1)</u>

<u>Hazard sub-categories may be applied where data are sufficient and where required by a competent authority</u>

<sup>&</sup>lt;sup>4b</sup> Available for those some competent authorities that want more than one skin irritation category (see Section 3.2.2.2.2.2) Applies to some authorities.

## **A1.21** Respiratory sensitizer (see Chapter 3.4 for classification criteria)

C	Classification			Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes	
Respiratory sensitization	1, 1A <sup>a</sup> , 1B <sup>a</sup>	Not applicable		Not applicable Not required	Danger	May cause allergy or asthma symptoms or breathing difficulties if inhaled	Н334	

<sup>&</sup>lt;sup>a</sup> In accordance with the criteria, classification into sub-categories 1A and 1B may be required by some competent authorities. Others may only require classification in category 1 (see Section 3.4.2.1.1.1). Hazard sSub-categories may be applied where data are sufficient and where required by a competent authority.

## A1.22 Skin sensitizer (see Chapter 3.4 for classification criteria)

C	lassification		Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement code <del>s</del>
Skin sensitization	1, 1A <sup>a</sup> , 1B <sup>a</sup>	Not applicable		Not applicable Not required	Warning	May cause an allergic skin reaction	Н317

In accordance with the criteria, classification into sub-categories 1A and 1B may be required by some competent authorities.

Others may only require classification in category 1 (see Section 3.4.2.2.1.1). Hazard sSub-categories may be applied where data are sufficient and where required by a competent authority.

## A1.23 Germ cell mutagenicity (see Chapter 3.5 for classification criteria)

Cl	Classification			Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	codes	
Germ cell	1, 1A, 1B	Not		Not	Danger	May cause genetic defects (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н340	
mutagenicity	2	applicable		applicable Not required	Warning	Suspected of causing genetic defects (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	H341	

# A1.24 Carcinogenicity (see Chapter 3.6 for classification criteria)

Cl	Classification			Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal		codes	
	1, 1A, 1B	Not		Not	Danger	May cause cancer (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н350	
Carcinogenicity	2	applicable		applicable Not required	Warning	Suspected of causing cancer (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	H351	

# **A1.25** Reproductive toxicity Toxic to reproduction (see Chapter 3.7 for classification criteria)

Classification				Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes	
	1, 1A, 1B				Danger	May damage fertility or the unborn child (state specific effect if known) (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н360	
Reproductive toxicity	2	Not applicable		Not applicable Not required	Warning	Suspected of damaging fertility or the unborn child (state specific effect if known) (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н361	
	Additional category for effects on or via lactation		No pictogram		No signal word	May cause harm to breast-fed children	Н362	

A1.26 Specific target organ toxicity following single exposure (see Chapter 3.8 for classification criteria)

Classification				Hazard			
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes
	1				Danger	Causes damage to organs (or state all organs affected, if known) (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н370
Specific target organ toxicity – single exposure	2	Not applicable		Not applicable Not required	Warning	May cause damage to organs (or state all organs affected, if known) (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н371
	3				Warning	May cause respiratory irritation or	Н335
					-	May cause drowsiness or dizziness	Н336

# A1.27 Specific target organ toxicity following repeated exposure (see Chapter 3.9 for classification criteria)

Classification				Labelling			Hazard	
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	statement codes	
Specific target organ toxicity – repeated exposure	1	Not		Not	Not	Danger	Causes damage to organs (state all organs affected, if known) through prolonged or repeated exposure (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н372
	2	applicable		applicable Not required	Warning	May cause damage to organs (state all organs affected, if known) through prolonged or repeated exposure (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard)	Н373	

# A1.28 Aspiration hazard (See chapter 3.10 for classification criteria)

Classification			Labelling				Hazard	
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	codes	
Aspiration hazard	1	Not			Not applicable	Danger	May be fatal if swallowed and enters airways	Н304
	2	applicable		Not required	Warning	May be harmful if swallowed and enters airways	H305	

A1.29 (a) Hazardous to the aquatic environment, short-term (acute) (see Chapter 4.1 for classification criteria)

Classification				Hazard			
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes
Hazardous to the aquatic environment, short-term (Acute)	Acute 1	<del>Class</del> 9ª	****	and **	Warning	Very toxic to aquatic life	H400
	Acute 2	Not	No	Not applicable	No signal	Toxic to aquatic life	H401
	Acute 3	applicable	pictogram	Not required	word	Harmful to aquatic life	H402

For Category 1, uUnder the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, for category Acute 1, environmentally hazardous substances are classified under Class 9 and shall bear both the Class 9 transport pictogram and the environmentally hazardous substance UN Model Regulations pictogram transport mark (see Chapter 5.2, section 5.2.1.6 and Chapter 5.3, section 5.3.2.3, of the UN Model Regulations). the pictogram is not required if the substance presents any other hazards covered by UN Model Regulations. If no other hazard is presented, this pictogram is required as a mark in addition to the UN Model Regulations Class 9 label. However, if the environmentally hazardous substance presents any other hazards covered by UN Model Regulations, then the Class 9 pictogram transport pictogram would not be applicable and would shall be replaced by the transport pictogram(s) applicable to of the other hazard(s) reppresented.

A1.29 (b) Hazardous to the aquatic environment, long-term (chronic) (see Chapter 4.1 for classification criteria)

Cla	Classification			Labelling				
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram <sup>a</sup>	Signal word	Hazard statement	statement codes	
Hazardous to the aquatic environment, long-term (Chronic)	Chronic 1	Class-9ª	*	*	and and	Warning	Very toxic to aquatic life with long lasting effects	H410
	Chronic 2			¥2>	No signal word	Toxic to aquatic life with long lasting effects	H411	
	Chronic 3		No pictogram	Not applicable Not required	N . 1	Harmful to aquatic life with long lasting effects	H412	
	Chronic 4	Not applicable			No signal word	May cause long lasting harmful effects to aquatic life	H413	

For categories 1 and 2, uUnder the UN Recommendations on the Transport of Dangerous Goods, Model Regulations, for categories Chronic 1 and 2, environmentally hazardous substances are classified under Class 9 and shall bear both the Class 9 transport pictogram and the environmentally hazardous substance UN Model Regulations pictogramtransport mark (see Chapter 5.2, section 5.2.1.6 and Chapter 5.3, section 5.3.2.3, of the UN Model Regulations). the pictogram is not required if the substance presents any other hazards covered by UN Model Regulations. If no other hazard is presented, this pictogram is required as a mark in addition to the UN Model Regulations Class 9 label. However, if the environmentally hazardous substance presents any other hazards covered by UN Model Regulations, then the Class 9 transport pictogram would not be applicable and would shall be replaced by the transport pictogram(s) applicable to of the other-hazard(s) represented.

## A1.30 Hazard to the ozone layer (see Chapter 4.2 for classification criteria)

Classification			Labelling				Hazard statement
Hazard class	GHS hazard category	UN Model Regulations class or division	GHS pictogram	UN Model Regulations pictogram	Signal word	Hazard statement	code
Hazardous to the ozone layer	1	Not applicable		Not applicable Not required	Warning	Harms public health and the environment by destroying ozone in the upper atmosphere	H420

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