UNITED NATIONS **E**

Economic and Social Council

Distr.
GENERAL

ECE/TRANS/WP.15/AC.1/2010/25
11 January 2010

Original: ENGLISH

ECONOMIC COMMISSION FOR EUROPE

INLAND TRANSPORT COMMITTEE

Working Party on the Transport of Dangerous Goods

Joint Meeting of the RID Committee of Experts and the
Working Party on the Transport of Dangerous Goods

Bern, 22-26 March 2010
Item 5 (a) of the provisional agenda

PROPOSALS FOR AMENDMENTS TO RID/ADR/ADN

Pending issues

Carriage in bulk and in bulk containers

Transmitted by the Government of the United Kingdom[1, 2]

Summary	
Executive summary:	There are currently two parallel systems for dealing with carriage in bulk in RID/ADR. The Government of the United Kingdom proposes that, in the future, there should only be one based on the multimodal system from the UN Model Regulations using bulk containers of codes BK1 and BK2. In the Annex to this document, the United Kingdom has drafted some initial proposals on how to take this subject forward towards a single system.
Action to be taken:	Consider initial proposals on how to develop a single system of bulk container codes
Related documents:	Informal document INF.16 (United Kingdom) presented to the March 2009 Joint Meeting (but not discussed), ECE/TRANS/WP.15/AC.1/2009/48 and INF.12 presented to the September 2009 Joint Meeting.

[1] In accordance with the programme of work of the Inland Transport Committee for 2006-2010 (ECE/TRANS/166/Add.1, programme activity 02.7 (c)).

[2] Circulated by the Intergovernmental Organisation for International Carriage by Rail (OTIF) under the symbol OTIF/RID/RC/2009/25.

Background to the current double system

1. The Joint Meeting will recall that currently within RID/ADR, there are two parallel systems for dealing with carriage in bulk. The general provisions for both are dealt with in 7.3.1:

(a) The traditional RID/ADR system of allocating VW/VV provisions (1 to 17) given in 7.3.3 and allocated in column (17) of Table A in Chapter 3.2 against a fairly wide range of UN entries for solids in Classes 4.1, 4.2, 4.3, 5.1, 6.1, 8 and 9 in packing groups II and III.

(b) The multimodal system from the United Nations, and also present in the International Maritime Dangerous Goods (IMDG) Code, based on allocation of codes BK1 (sheeted bulk containers) or BK2 (closed bulk containers) shown in column (10) of Table A of Chapter 3.2. The requirements for the design, construction, inspection and testing of bulk containers are given in Chapter 6.11 and the additional provisions linked to the class of dangerous goods carried are given in 7.3.2. The number of entries allocated a code BK1 and/or BK2 is quite limited, based on those permitted to be carried in bulk containers under the IMDG Code.

2. When the new provisions for bulk containers from the UN Model Regulations were being proposed for inclusion in RID/ADR, these were based on text prepared by the United Nations secretariat and discussed at the ad hoc Working Group on Harmonization of RID/ADR/ADN with the UN Recommendations that met on 26–28 May 2003. The record of these discussions is given in paragraphs 39–46 of the report of this Working Group (TRANS/WP.15/AC.1/2003/56). The United Kingdom felt that rather than have two systems for carriage in bulk, one system based on the detailed multimodal provisions just agreed at United Nations level should form the basis of the new bulk provisions in RID/ADR (as reflected in paragraph 43).

3. The United Kingdom duly submitted informal documents INF.6 and INF.6/Add.1 to the September 2003 Joint Meeting which prompted Belgium to table INF.13. The United Kingdom proposed that the current list of substances that could be carried in bulk in RID/ADR should remain unchanged but in general that substances should be allocated the bulk container Codes BK1/BK2 rather than the VW/VV Codes. The United Kingdom proposal was not adopted and the record of these discussions on this topic is given in paragraphs 40–44 of the report of this Joint Meeting (TRANS/WP.15/AC.1/94).

Developments

4. Since then there have been formal and informal discussions in the context of RID/ADR about the inadequacy and lack of consistency of many of the VW/VV provisions leading others to think that, as a minimum, there should be a fundamental review of these provisions and to consider a move to a more comprehensive system based on BK Codes. For example, Sweden tabled informal document INF.8 at the RID Committee of Experts meeting in Zagreb, November 2007. On a question of interpretation, Sweden was asking whether a tank without an RID

approval and IBCs could be treated as carriage in bulk under the VW provisions. The discussions are reflected in paragraphs 67-72 of the report of the meeting (OTIF/RID/CE/2007-A).

5. Since the introduction of the BK1 and BK2 codes, practical experience has also been gained of this system, particularly in national transport operations. Details of the United Kingdom system are given in informal document INF.3. For this paper the United Kingdom has not attached the relevant extracts to ADR which are normally appended at the rear of the document.

6. ECE/TRANS/WP.15/AC.1/2009/9 from the secretariat on worldwide multimodal harmonization reflects the wishes of many industries to fully harmonize with the United Nations Model Regulations.

Discussions at the September 2009 Joint Meeting

7. Preliminary discussions on a move towards a single system for carriage in bulk were held at the September 2009 Joint Meeting on the basis of ECE/TRANS/WP.15/AC.1/2009/48 and INF.12. The outcome of these discussions is reflected in the report of this meeting (ECE/TRANS/WP.15/AC.1/116, paragraphs 94 to 96).

8. Some concern was expressed that this move would harm multimodal harmonization of the BK1 and BK2 system. However it was pointed out that the IMDG Code does not allow the use of BK1 (sheeted bulk containers) for sea transport, so there is not true multimodal harmonization currently.

9. Comments were made that vehicles and wagons should be included in a new scheme involving BK1 and BK2 bulk containers. This must be a misunderstanding as “bulk container” is defined in 1.2.1 and examples are given. In addition 6.11.4 deals with bulk containers other than containers conforming to the International Convention for Safe Containers (CSC), e.g. the load compartments of wagons and vehicles (in particular see 6.11.4.1 including the Note).

Proposals

10. The United Kingdom firmly believes that it is now appropriate to have a fundamental review of the two parallel systems for carriage in bulk with a view to integrating them into one system based on the multimodal BK1 and BK2 system.

11. The traditional RID/ADR system of VW/VV provisions should be reviewed to assess:

(a) which ones it is probably appropriate to retain, e.g. VW/VV 12 and 13 which deal with carriage in bulk in special wagons/vehicles and containers for elevated temperature liquids and solids, UN 3257 and UN 3258 respectively, reflecting part of UN special provision 232.

(b) which ones contain specific aspects which may be appropriate to integrate into the new single system - either as RID/ADR special provisions if they are deemed

appropriate for rail and road transport only, or to consider proposing amendments to the multimodal system if they are judged appropriate also for sea transport.

(c) which ones should be simply subsumed into the BK1 and BK2 system.

12. As before, the United Kingdom proposes that the current list of substances that can be carried in bulk in RID/ADR should remain unchanged and that, in general, substances should be allocated the bulk container codes BK1 and BK2 rather than the VW/VV Codes.

13. The United Kingdom also proposes that there should be transitional measures of appropriate length to allow adequate time to change over to the new system and to permit continued use of existing vehicles/wagons that may not fully meet the requirements of Chapter 6.11. The United Kingdom suggests 1 July 2015 initially for new builds and to permit the continued use of existing vehicles and wagons until the end of their natural life.

14. The United Kingdom has drafted initial proposals in the annex to this document on a change towards a new single system to aid discussion.

Annex

Initial proposals

Introduction

1. This Annex lists each of the current RID/ADR special provisions for carriage in bulk together with the entries in Table A of Chapter 3.2 that are allocated the code and where applicable the current UN bulk container codes (BK1, BK2). The last column gives the proposed bulk container code(s).

2. After each RID/ADR special provision (VW/VV code), comments are made on the content of these, and initial proposals are put forward. It is important to bear in mind that when the parallel UN system based on bulk container codes BK1 and BK2 was included in RID/ADR for the 2005 editions, the general provisions in 7.3.1 were added from the text of Chapter 4.3 of the UN Model Regulations to apply to both systems without any consequential changes being made to the texts of the VW/VV special provisions.

3. It is considered that in general, specific requirements in the VW/VV special provisions are adequately covered in 7.3.1 together with any Class specific provisions in 7.3.2 to allow a move towards one system based on the BK1 and BK2 codes.

I. CODES VW1/VV1

4. Codes VW1 and VV1 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1309	Aluminium powder, coated	4.1	III		BK1, BK2
1312	Borneol	4.1	III		BK1, BK2
1313	Calcium resinate	4.1	III		BK1, BK2
1314	Calcium resinate (fused)	4.1	III		BK1, BK2
1318	Cobalt resinate (precipitated)	4.1	III		BK1, BK2
1325	Flammable solid	4.1	III		BK1, BK2
1328	Hexamethylenetetramine	4.1	III		BK1, BK2
1330	Manganese resinate	4.1	III		BK1, BK2
1332	Metaldehyde	4.1	III		BK1, BK2
1338	Phosphorus, amorphous	4.1	III		BK1, BK2
1346	Silicon powder, amorphous	4.1	III		BK1, BK2
1350	Sulphur	4.1	III	BK1, BK2	BK1, BK2
1408	Ferrosilicon	4.3	III	BK2	BK1, BK2
1869	Magnesium or Magnesium alloys	4.1	III		BK1, BK2
2001	Cobalt naphthenates, powder	4.1	III		BK1, BK2
2213	Paraformaldehyde	4.1	III	BK1, BK2	BK1, BK2
2538	Nitronaphthalene	4.1	III		BK1, BK2

2687	Dicyclohexylammonium nitrite	4.1	III		BK1, BK2
2714	Zinc resinate	4.1	III		BK1, BK2
2715	Aluminium resinate	4.1	III		BK1, BK2
2717	Camphor	4.1	III		BK1, BK2
2858	Zirconium, dry	4.1	III		BK1, BK2
2878	Titanium sponge granules or powder	4.1	III		BK1, BK2
2989	Lead phosphite, dibasic	4.1	III		BK1, BK2
3077	Environmentally hazardous substance, solid, n.o.s.	9	III	BK1, BK2	BK1, BK2
3089	Metal powder, flammable, n.o.s.	4.1	III		BK1, BK2
3178	Flammable solid, inorganic, n.o.s.	4.1	III		BK1, BK2
3181	Metal salts of organic compounds, flammable, n.o.s.	4.1	III		BK1, BK2
3182	Metal hydrides, flammable, n.o.s.	4.1	III		BK1, BK2

"**VW1** Carriage in bulk in closed wagons, movable-roof wagons, sheeted wagons, closed containers or in sheeted large containers is permitted."

"**VV1** Carriage in bulk in closed or sheeted vehicles, in closed containers or in large sheeted containers is permitted."

Comment

5. There are no special requirements contained in codes VW1/VV1.

Proposal 1

6. It is proposed that codes VW1/VV1 be deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 be added to Column (10) where not already provided for.

II. CODES VW1/VV1 AND VW5/VV5

7. Codes VW1 and VW5/VV1 and VV5 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
3170	Aluminium smelting or remelting by-products	4.3	III	BK1, BK2	BK1, BK2

"**VW1** Carriage in bulk in closed wagons, movable-roof wagons, sheeted wagons, closed containers or in sheeted large containers is permitted."

"**VW5** Carriage in bulk is permitted in specially equipped wagons and containers. The receptacles of specially equipped wagons and containers and their closures shall conform to the general packing conditions of 4.1.1.1, 4.1.1.2 and 4.1.1.8. Openings designed for loading and unloading shall be capable of being hermetically closed."

"**VV1** Carriage in bulk in closed or sheeted vehicles, in closed containers or in large sheeted containers is permitted."

"**VV5** Carriage in bulk is permitted in specially equipped vehicles and containers. The openings used for loading and unloading shall be capable of being closed hermetically."

Comment

8. Although codes VW5/VV5 provide for special equipment, there are no special requirements contained in codes VW1/VV1. This means that special equipment is not necessary to carry this substance in bulk.

Proposal 2

9. It is proposed that codes VW1/VV1 and VW5/VV5 are deleted from Column (17) against this entry in Table A in Chapter 3.2.

III. CODES VW2/VV2

10. Codes VW2 and VV2 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1334	Naphthalene, crude or refined	4.1	III	BK1, BK2	BK1, BK2

"**VW2** Carriage in bulk is permitted in movable-roof wagons with a metal body, closed large metal containers and in wagons or large containers with a metal body covered with a non-combustible sheet."

"**VV2** Carriage in bulk is permitted in closed vehicles with a metal body, closed metal containers and in sheeted vehicles and sheeted large containers covered with a non-combustible sheet and having a metal body or having a floor and walls protected from the load."

Comment

11. Carriage in bulk containers of codes BK1 and BK2 is already permitted for this substance.

Proposal 3

12. It is proposed that codes VW2/VV2 be deleted from Column (17) against this entry in Table A in Chapter 3.2.

IV. CODES VW3/VV3

13. Codes VW3 and VV3 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
2211	Polymeric beads, expandable	9	III		BK1, BK2
3175	Solid containing flammable liquid, n.o.s.	4.1	II	BK1, BK2	BK1, BK2
3314	Plastics moulding compound	9	III		BK1, BK2

"**VW3** Carriage in bulk is permitted in sheeted wagons or sheeted large containers with adequate ventilation or in movable-roof wagons. Suitable measures shall be taken to ensure that none of the contents, particularly any liquid components, can escape."
"**VV3** Carriage in bulk is permitted in sheeted vehicles and sheeted large containers with adequate ventilation."

Comment

14. Bulk container codes BK1 and BK2 already provide for adequate ventilation to be given (see 6.11.1 and 6.11.3.2.3).

Proposal 4

15. It is proposed that codes VW3/VV3 be deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 be added to Column (10) where not already provided for. A new special provision 6xa is proposed to be added to Chapter 3.3 and against UN 3175 in table A of Chapter 3.2 to reflect part of UN special provision 216 adapted to be consistent with the text for UN 3243 and UN 3244 (see paragraph 16 of this Annex) "Bulk containers shall be leakproof or rendered leakproof, for example by means of a suitable and sufficiently stout inner lining."

V. CODES VW4/VV4

16. Codes VW4 and VV4 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1361	Carbon	4.2	III		BK1, BK2
1362	Carbon, activated	4.2	III		BK1, BK2
1363	Copra	4.2	III		BK1, BK2
1364	Cotton waste, oily	4.2	III		BK1, BK2
1365	Cotton, wet	4.2	III		BK1, BK2
1373	Fibres, fabrics with oil	4.2	III		BK1, BK2
1376	Iron oxide or iron sponge, spent	4.2	III	BK2	BK1, BK2
1379	Paper, unsaturated oil treated	4.2	III		BK1, BK2
1386	Seed cake	4.2	III		BK1, BK2

1932	Zirconium scrap	4.2	III		BK1, BK2
2008	Zirconium powder, dry	4.2	III		BK1, BK2
2009	Zirconium, dry, sheets, strips etc	4.2	III		BK1, BK2
2210	Maneb or maneb preparation	4.2	III		BK1, BK2
2217	Seed cake	4.2	III		BK1, BK2
2545	Hafnium powder, dry	4.2	III		BK1, BK2
2546	Titanium powder, dry	4.2	III		BK1, BK2
2793	Ferrous metal borings, shavings, etc	4.2	III		BK1, BK2
2881	Metal catalyst, dry	4.2	III		BK1, BK2
3189	Metal powder, self heating, dry	4.2	III		BK1, BK2
3190	Self heating solid, inorganic, n.o.s.	4.2	III		BK1, BK2

"**VW4** Carriage in bulk is permitted in sheeted metal wagons, movable-roof metal wagons, closed metal containers or in sheeted large metal containers. For UN Nos. 2008, 2009, 2210, 2545, 2546, 2881, 3189 and 3190, only carriage in bulk of solid waste is permitted."

"**VV4** Carriage in bulk is permitted in closed or sheeted vehicles with a metal body, and in closed metal containers or in sheeted large metal containers. For UN Nos. 2008, 2009, 2210, 2545, 2546, 2881, 3189 and 3190, only carriage in bulk of solid waste is permitted."

Comment

17. If there is still a need to require the use of metal, and to limit the carriage of eight entries to solid waste then special provisions can be drafted to cover this.

Proposal 5

18. It is proposed that codes VW4/VV4 be deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 be added to Column (10) where not already provided for.

VI. CODES VW5/VV5

19. Codes VW5 and VV5 are assigned to the following entries:

UN No.	**Substance name**	**Class**	**PG**	**UN Bulk Code**	
				Current	**Proposed**
1394	Aluminium carbide	4.3	II		BK2
1396	Aluminium powder, uncoated	4.3	III		BK2
1398	Aluminium silicon powder, uncoated	4.3	III		BK2
1402	Calcium carbide	4.3	II		BK2
1418	Magnesium or magnesium alloys, powder	4.3	III		BK2
1435	Zinc ashes	4.3	III		BK2
1436	Zinc powder or dust	4.3	III		BK2

2813	Water-reactive solid, n.o.s.	4.3	III		BK2
2950	Magnesium granules, coated	4.3	III	BK2	BK2
2968	Maneb or maneb preparation, stabilized	4.3	III		BK2
3208	Metallic substance, water-reactive, n.o.s.	4.3	III		BK2
3209	Metallic substance, water-reactive, self-heating, n.o.s.	4.3	III		BK2

"**VW5** Carriage in bulk is permitted in specially equipped wagons and containers. The receptacles of specially equipped wagons and containers and their closures shall conform to the general packing conditions of 4.1.1.1, 4.1.1.2 and 4.1.1.8. Openings designed for loading and unloading shall be capable of being hermetically closed."

"**VV5** Carriage in bulk is permitted in specially equipped vehicles and containers. The openings used for loading and unloading shall be capable of being closed hermetically."

Comment

20. It is not clear why there is an extra second sentence in code VW5 over code VV5 with additional requirements. 7.3.2.4 requires bulk containers for goods of Class 4.3 to be waterproof.

Proposal 6

21. It is proposed that codes VW5/VV5 be deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container code BK2 be added to Column (10) where not already provided for.

VII. CODES VW5/VV5 AND VW7/VV7

22. Codes VW5 and VW7/VV5 and VV7 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1405	Calcium silicide	4.3	III		BK1, BK2
2844	Calcium manganese silicon	4.3	III		BK1, BK2

"**VW5** Carriage in bulk is permitted in specially equipped wagons and containers. The receptacles of specially equipped wagons and containers and their closures shall conform to the general packing conditions of 4.1.1.1, 4.1.1.2 and 4.1.1.8. Openings designed for loading and unloading shall be capable of being hermetically closed."

"**VW7** Carriage in bulk in closed wagons, sheeted wagons, movable-roof wagons, closed containers or in sheeted large containers is permitted only if the substance is in pieces."

"**VV5** Carriage in bulk is permitted in specially equipped vehicles and containers. The openings used for loading and unloading shall be capable of being closed hermetically."

"**VV7** Carriage in bulk in closed or sheeted vehicles, in closed containers or in large sheeted containers is permitted only if the substance is in pieces."

Comment

23. It is not clear why there is an extra second sentence in code VW5 over code VV5 with additional requirements. 7.3.2.4 requires bulk containers for goods of Class 4.3 to be waterproof.

Proposal 7

24. It is proposed that codes VW5/VV5, VW7/VV7 be deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 be added to Column (10).

VIII. CODES VW6 AND VV3

25. Codes VW6 and VV3 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
3170	Aluminium smelting or remelting by-products	4.3	II	BK1, BK2	BK1, BK2

"**VW6** Carriage in bulk is permitted in movable-roof wagons or in closed large containers."
"**VV3** Carriage in bulk is permitted in sheeted vehicles and sheeted large containers with adequate ventilation."

Comment

26. It is not clear why sheeted wagons and containers are not permitted by rail by the allocation of code VW6, particularly when code VV3 permits the equivalent for road and the bulk container code BK1 is used for both modes. Adequate ventilation is required for road transport but not for rail. Bulk container codes BK1 and BK2 provide for adequate ventilation to be given (see 6.11.1 and 6.11.3.2.3).

Proposal 8

27. It is proposed that codes VW6 and VV3 be deleted from Column (17) against this entry in Table A in Chapter 3.2.

IX. CODES VW7/VV7

28. Codes VW7 and VV7 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1405	Calcium silicide	4.3	II		BK1, BK2

"**VW7** Carriage in bulk in closed wagons, sheeted wagons, movable-roof wagons, closed containers or in sheeted large containers is permitted only if the substance is in pieces."

"**VV7** Carriage in bulk in closed or sheeted vehicles, in closed containers or in large sheeted containers is permitted only if the substance is in pieces."

Comment

29. Carriage in bulk of calcium silicide at the packing group II level is provided for only if the substance is in pieces. This is presumably to limit the potential amount of gas evolved by contact with moisture (smaller overall surface area).

Proposal 9

30. It is proposed that codes VW7/VV7 be deleted from Column (17) against this entry in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 be added to Column (10). Add a new special provision 6xb in Chapter 3.3 and against this entry UN 1405 packing group II in Chapter 3.2A to read as follows: - "Carriage in bulk containers is permitted only if the substance is in pieces."

X. CODES VW8/VV8

31. Codes VW8 and VV8 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1438	Aluminium nitrate	5.1	III	BK1, BK2	BK1, BK2
1442	Ammonium perchlorate	5.1	II		BK1, BK2
1444	Ammonium persulphate	5.1	III		BK1, BK2
1450	Bromates, inorganic, n.o.s.	5.1	II		BK1, BK2
1451	Caesium nitrate	5.1	III		BK1, BK2
1452	Calcium chlorate	5.1	II		BK1, BK2
1454	Calcium nitrate	5.1	III	BK1, BK2	BK1, BK2
1458	Chlorate and borate mixture	5.1	II		BK1, BK2
1458	Chlorate and borate mixture	5.1	III		BK1, BK2
1459	Chlorate and magnesium chloride mixture, solid	5.1	II		BK1, BK2
1459	Chlorate and magnesium chloride	5.1	III		BK1, BK2

	mixture, solid				
1461	Chlorates, inorganic, n.o.s.	5.1	II		BK1, BK2
1465	Didymium nitrate	5.1	III		BK1, BK2
1466	Ferric nitrate	5.1	III		BK1, BK2
1467	Guanidine nitrate	5.1	III		BK1, BK2
1473	Magnesium bromate	5.1	II		BK1, BK2
1474	Magnesium nitrate	5.1	III	BK1, BK2	BK1, BK2
1475	Magnesium perchlorate	5.1	II		BK1, BK2
1477	Nitrates, inorganic, n.o.s.	5.1	III		BK1, BK2
1481	Perchlorates, inorganic, n.o.s.	5.1	II		BK1, BK2
1481	Perchlorates, inorganic, n.o.s.	5.1	III		BK1, BK2
1484	Potassium bromate	5.1	II		BK1, BK2
1485	Potassium chlorate	5.1	II		BK1, BK2
1486	Potassium nitrate	5.1	III	BK1, BK2	BK1, BK2
1487	Potassium nitrate and sodium nitrite mixture	5.1	II		BK1, BK2
1488	Potassium nitrite	5.1	II		BK1, BK2
1489	Potassium perchlorate	5.1	II		BK1, BK2
1492	Potassium persulphate	5.1	III		BK1, BK2
1493	Silver nitrate	5.1	II		BK1, BK2
1494	Sodium bromate	5.1	II		BK1, BK2
1495	Sodium chlorate	5.1	II	BK1, BK2	BK1, BK2
1498	Sodium nitrate	5.1	III	BK1, BK2	BK1, BK2
1499	Potassium nitrate and sodium nitrate mixture	5.1	III	BK1, BK2	BK1, BK2
1502	Sodium perchlorate	5.1	II		BK1, BK2
1505	Sodium persulphate	5.1	III		BK1, BK2
1506	Strontium chlorate	5.1	II		BK1, BK2
1507	Strontium nitrate	5.1	III		BK1, BK2
1508	Strontium perchlorate	5.1	II		BK1, BK2
1513	Zinc chlorate	5.1	II		BK1, BK2
1942	Ammonium nitrate	5.1	III	BK1, BK2	BK1, BK2
2067	Ammonium nitrate based fertilizer	5.1	III	BK1, BK2	BK1, BK2
2469	Zinc bromate	5.1	III		BK1, BK2
2720	Chromium nitrate	5.1	III		BK1, BK2
2721	Copper chlorate	5.1	II		BK1, BK2
2722	Lithium nitrate	5.1	III		BK1, BK2
2723	Magnesium chlorate	5.1	II		BK1, BK2
2724	Manganese nitrate	5.1	III		BK1, BK2
2725	Nickel nitrate	5.1	III		BK1, BK2
2726	Nickel nitrite	5.1	III		BK1, BK2
2728	Zirconium nitrate	5.1	III		BK1, BK2
2880	Calcium hypochlorite, hydrated or hydrated mixture	5.1	III		BK1, BK2
3215	Persulphates, inorganic, n.o.s.	5.1	III		BK1, BK2
3377	Sodium perborate monohydrate	5.1	III	BK1, BK2	BK1, BK2
3378	Sodium carbonate peroxyhydrate	5.1	II	BK1, BK2	BK1, BK2
3378	Sodium carbonate peroxyhydrate	5.1	III	BK1, BK2	BK1, BK2

"**VW8** Carriage in bulk is permitted in open wagons or containers covered with an impermeable and non-combustible sheet, or in movable-roof wagons or in closed containers. Wagons and containers shall be so constructed either that the substances contained cannot come into contact with wood or any other combustible material, or that the entire surface of the floor and walls, if made of wood or other combustible material has been provided with an impermeable surfacing resistant to combustion or has been coated with sodium silicate or a similar substance."

"**VV8** Carriage in bulk is permitted, as a full load, in closed vehicles, closed containers or sheeted vehicles or large containers covered with an impermeable, non-combustible sheet. Vehicles and containers shall be so constructed either that the substances contained cannot come into contact with wood or any other combustible material, or that the entire surface of the floor and walls, if made of wood or other combustible material has been provided with an impermeable surfacing resistant to combustion or has been coated with sodium silicate or a similar substance."

Comment

32. 7.3.2.5 requires bulk containers used for goods of Class 5.1 to be so constructed or adapted that the goods cannot come into contact with wood or any other combustible material.

Proposal 10

33. It is proposed that codes VW8/VV8 be deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 be added to Column (10) where not already provided for.

XI. CODES VW9 AND VV3

34. Codes VW9 and VV3 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1841	Acetaldehyde ammonia	9	III		BK1, BK2
1931	Zinc dithionite (Zinc hydrosulphite)	9	III		BK1, BK2
2969	Castor beans, meal, pomace or flake	9	II	BK1, BK2	BK1, BK2

"**VW9** Carriage in bulk is permitted in sheeted wagons or in sheeted large containers, movable-roof wagons or in closed containers. For substances of Class 8, wagons and containers shall be equipped with a suitable and sufficiently stout inner lining."

"**VV3** Carriage in bulk is permitted in sheeted vehicles and sheeted large containers with adequate ventilation."

Comment

35. The second sentence of VW9 is not applicable in these circumstances. Bulk container codes BK1 and BK2 provide for adequate ventilation to be given (see 6.11.1 and 6.11.3.2.3).

Proposal 11

36. It is proposed that codes VW9 and VV3 be deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 be added to Column (10) where not already provided for.

XII. CODES VW9/VV9

37. Codes VW9 and VV9 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
1544	Alkaloids or alkaloid salts, solid, n.o.s.	6.1	III		BK1, BK2
1548	Aniline hydrochloride	6.1	III		BK1, BK2
1549	Antimony compound, inorganic, solid, n.o.s.	6.1	III		BK1, BK2
1550	Antimony lactate	6.1	III		BK1, BK2
1551	Antimony potassium tartrate	6.1	III		BK1, BK2
1557	Arsenic compound, solid, n.o.s.	6.1	III		BK1, BK2
1564	Barium compound, n.o.s.	6.1	III		BK1, BK2
1566	Beryllium compound, n.o.s.	6.1	III		BK1, BK2
1579	4-Chloro-o-toluidine hydrochloride, solid	6.1	III		BK1, BK2
1588	Cyanides, inorganic, solid, n.o.s.	6.1	III		BK1, BK2
1601	Disinfectant, solid, toxic, n.o.s.	6.1	III		BK1, BK2
1616	Lead acetate	6.1	III		BK1, BK2
1655	Nicotine compound or preparation, solid, n.o.s.	6.1	III		BK1, BK2
1663	Nitrophenols	6.1	III		BK1, BK2
1673	Phenyldiamines	6.1	III		BK1, BK2
1690	Sodium fluoride, solid	6.1	III		BK1, BK2
1709	2,4-Toluenediamine, solid	6.1	III		BK1, BK2
1740	Hydrogendifluorides, solid, n.o.s.	8	III		BK1, BK2
1759	Corrosive solid n.o.s.	8	III		BK1, BK2
1773	Ferric chloride, anhydrous	8	III		BK1, BK2
1794	Lead sulphate	8	II		BK1, BK2
1812	Potassium fluoride, solid	6.1	III		BK1, BK2
1884	Barium oxide	6.1	III		BK1, BK2
1907	Soda lime	8	III		BK1, BK2
2020	Chlorophenols, solid	6.1	III		BK1, BK2
2025	Mercury compound, solid, n.o.s.	6.1	III		BK1, BK2
2026	Phenylmercuric compound, n.o.s.	6.1	III		BK1, BK2
2074	Acrylamide, solid	6.1	III		BK1, BK2

2077	alpha-Naphthylamine	6.1	III		BK1, BK2
2214	Phthalic anhydride	8	III		BK1, BK2
2215	Maleic anhydride	8	III		BK1, BK2
2237	Chloronitroanilines	6.1	III		BK1, BK2
2239	Chlorotoluidines solid	6.1	III		BK1, BK2
2280	Hexamethylenediamine, solid	8	III		BK1, BK2
2291	Lead compound, soluble, n.o.s.	6.1	III		BK1, BK2
2331	Zinc chloride, anhydrous	8	III		BK1, BK2
2430	Alkylphenols, solid, n.o.s.	8	III		BK1, BK2
2433	Chloronitrotoluenes, solid	6.1	III		BK1, BK2
2440	Stannic chloride pentahydrate	8	III		BK1, BK2
2446	Nitrocresols, solid	6.1	III		BK1, BK2
2473	Sodium arsanilate	6.1	III		BK1, BK2
2475	Vanadium trichloride	8	III		BK1, BK2
2503	Zirconium tetrachloride	8	III		BK1, BK2
2505	Ammonium fluoride	6.1	III		BK1, BK2
2506	Ammonium hydrogen sulphate	8	II		BK1, BK2
2507	Chloroplatinic acid, solid	8	III		BK1, BK2
2508	Molybdenum pentachloride	8	III		BK1, BK2
2509	Potassium hydrogen sulphate	8	II		BK1, BK2
2512	Aminophenols	6.1	III		BK1, BK2
2516	Carbon tetrabromide	6.1	III		BK1, BK2
2570	Cadmium compound	6.1	III		BK1, BK2
2578	Phosphorus trioxide	8	III		BK1, BK2
2579	Piperazine	8	III		BK1, BK2
2585	Alkylsulphonic acids, solid	8	III		BK1, BK2
2588	Pesticide, solid, toxic, n.o.s.	6.1	III		BK1, BK2
2651	4,4’-Diaminodiphenylmethane	6.1	III		BK1, BK2
2655	Potassium fluorosilicate	6.1	III		BK1, BK2
2659	Sodium chloroacetate	6.1	III		BK1, BK2
2660	Nitrotoluidines (mono)	6.1	III		BK1, BK2
2674	Sodium fluorosilicate	6.1	III		BK1, BK2
2698	Tetrahydrophthalic anhydrides	8	III		BK1, BK2
2713	Acridine	6.1	III		BK1, BK2
2716	1,4,Butynediol	6.1	III		BK1, BK2
2729	Hexachlorobenzene	6.1	III		BK1, BK2
2757	Carbamate pesticide, solid, toxic	6.1	III		BK1, BK2
2759	Arsenical pesticide, solid, toxic	6.1	III		BK1, BK2
2761	Organochlorine pesticide, solid, toxic	6.1	III		BK1, BK2
2763	Triazine pesticide, solid, toxic	6.1	III		BK1, BK2
2771	Thiocarbamate pesticide, solid, toxic	6.1	III		BK1, BK2
2775	Copper based pesticide, solid, toxic	6.1	III		BK1, BK2
2777	Mercury based pesticide, solid, toxic	6.1	III		BK1, BK2
2779	Substituted nitrophenol pesticide, solid, toxic	6.1	III		BK1, BK2
2781	Bipyridilium pesticide, solid, toxic	6.1	III		BK1, BK2
2783	Organophosphorus pesticide, solid, toxic	6.1	III		BK1, BK2
2786	Organotin pesticide, solid, toxic	6.1	III		BK1, BK2
2802	Copper chloride	8	III		BK1, BK2

2803	Gallium	8	III		BK1, BK2
2811	Toxic solid, organic, n.o.s.	6.1	III		BK1, BK2
2823	Crotonic acid, solid	8	III		BK1, BK2
2834	Phosphorous acid	8	III		BK1, BK2
2853	Magnesium fluorosilicate	6.1	III		BK1, BK2
2854	Ammonium fluorosilicate	6.1	III		BK1, BK2
2855	Zinc fluorosilicate	6.1	III		BK1, BK2
2856	Fluorosilicates, n.o.s.	6.1	III		BK1, BK2
2862	Vanadium pentoxide	6.1	III		BK1, BK2
2865	Hydroxylamine sulphate	8	III		BK1, BK2
2869	Titanium trichloride mixture	8	III		BK1, BK2
2871	Antimony powder	6.1	III		BK1, BK2
2875	Hexachlorophene	6.1	III		BK1, BK2
2876	Resorcinol	6.1	III		BK1, BK2
2905	Chlorophenolates or phenolates, solid	8	III		BK1, BK2
2923	Corrosive solid, toxic, n.o.s.	8	III		BK1, BK2
2967	Sulphamic acid	8	III		BK1, BK2
3027	Coumarin derivative pesticide, solid, toxic	6.1	III		BK1, BK2
3143	Dye or dye intermediate, solid, toxic, n.o.s.	6.1	III		BK1, BK2
3146	Organotin compound, solid, n.o.s.	6.1	III		BK1, BK2
3147	Dye or dye intermediate, solid, corrosive, n.o.s.	8	III		BK1, BK2
3249	Medicine, solid, toxic, n.o.s.	6.1	III		BK1, BK2
3253	Disodium trioxosilicate	8	III		BK1, BK2
3259	Amines or polyamines, solid, corrosive, n.o.s.	8	III		BK1, BK2
3260	Corrosive solid, acidic, inorganic, n.o.s.	8	III		BK1, BK2
3261	Corrosive solid, acidic, organic, n.o.s.	8	III		BK1, BK2
3262	Corrosive solid, basic, inorganic, n.o.s.	8	III		BK1, BK2
3263	Corrosive solid, basic, organic, n.o.s.	8	III		BK1, BK2
3283	Selenium compound, solid, n.o.s.	6.1	III		BK1, BK2
3284	Tellerium compound, n.o.s.	6.1	III		BK1, BK2
3285	Vanadium compound, n.o.s.	6.1	III		BK1, BK2
3288	Toxic solid, inorganic, n.o.s.	6.1	III		BK1, BK2
3345	Phenoxyacetic acid derivative pesticide, solid, toxic	6.1	III		BK1, BK2
3349	Pyrethroid pesticide, solid, toxic	6.1	III		BK1, BK2
3427	Chlorobenzyl chlorides, solid	6.1	III		BK1, BK2
3438	alpha-Methylbenzyl alcohol, solid	6.1	III		BK1, BK2
3439	Nitriles, toxic, solid, n.o.s.	6.1	III		BK1, BK2
3453	Phosphoric acid, solid	8	III		BK1, BK2
3457	Chloronitrotoluenes, solid	6.1	III		BK1, BK2
3458	Nitroanisoles, solid	6.1	III		BK1, BK2
3459	Nitrobromobenzenes, solid	6.1	III		BK1, BK2
3460	N-Ethylbenzyltoluidines, solid	6.1	III		BK1, BK2
3462	Toxins, extracted from living sources, solid, n.o.s.	6.1	III		BK1, BK2

3464	Organophosphorus compound, toxic, solid, n.o.s.	6.1	III		BK1, BK2
3465	Organoarsenic compound, solid, n.o.s.	6.1	III		BK1, BK2
3466	Metal carbonyls, solid, n.o.s.	6.1	III		BK1, BK2
3467	Organometallic compound, toxic, solid, n.o.s.	6.1	III		BK1, BK2
3495	Iodine	8	III		BK1, BK2

"**VW9** Carriage in bulk is permitted in sheeted wagons or in sheeted large containers, movable-roof wagons or in closed containers. For substances of Class 8, wagons and containers shall be equipped with a suitable and sufficiently stout inner lining."

"**VV9** Carriage in bulk is permitted, as a full load, in sheeted vehicles, closed containers or in sheeted large containers with complete walls. For substances of Class 8, wagons and containers shall be equipped with a suitable and sufficiently stout inner lining."

Comment

38. Codes VW9/VV9 contain an extra requirement for substances of Class 8.

Proposal 12

39. It is proposed that code VW9/VV9 is deleted from Column (17) against these entries in Table A in Chapter 3.2 and bulk container codes BK1 and BK2 are added to Column (10). Through UN, consider amending 7.3.2.8 to read "These goods shall be carried in bulk containers which are leakproof or rendered leakproof, for example by means of a suitable and sufficiently stout inner lining. Propose a similar amendment to permit the carriage of the above substances of Class 6.1 packing group III in bulk containers.

XIII. CODES VW10 AND VV10

40. Codes VW10 and VV10 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
3243	Solid containing toxic liquid, n.o.s.	6.1	II	BK1, BK2	BK1, BK2
3244	Solid containing corrosive liquid, n.o.s.	8	II	BK1, BK2	BK1, BK2

"**VW10** Carriage in bulk is permitted in sheeted wagons, in sheeted large containers, movable-roof wagons or in closed containers. Wagons and containers shall be leakproof or rendered leakproof, for example by means of a suitable, sufficiently stout inner lining."

"**VV10** Carriage in bulk is permitted, as a full load, in sheeted vehicles, closed containers or sheeted large containers with complete walls. The bodies of vehicles or containers shall be leakproof or rendered leakproof, for example by means of a suitable, sufficiently stout inner lining."

Comment

41. The proposed amendment to 7.3.2.8 dealt with in paragraph 15 above would cover the extra requirement for UN 3244.

Proposal 13

42. It is proposed that code VW10/VV10 be deleted from Column (17) against these entries in Table A in Chapter 3.2. It is proposed to add special provision 6xa dealt with in paragraph 7 above to similarly deal with the extra requirement for UN 3243.

XIV. CODES VW11/VV11

43. Codes VW11 and VV11 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
3291	Clinical waste, unspecified n.o.s. or (bio)medical waste, n.o.s. or regulated medical waste, n.o.s.	6.2	II	BK2	BK2

"**VW11** Carriage in bulk is permitted in specially equipped wagons and containers. The receptacles of specially equipped wagons and containers shall be so constructed that the openings designed for loading and unloading can be closed hermetically. Substances shall be filled in the receptacles in a manner which avoids risks to humans, animals and the environment."

"**VV11** Carriage in bulk is permitted in specially equipped vehicles and containers in a manner that which avoids risks to humans, animals and the environment, e.g. by loading the wastes in bags or by airtight connections."

Comment

44. 7.3.2.6.2 includes comprehensive special requirements for the carriage of UN 3291.

Proposal 14

45. It is proposed that codes VW11/VV11 be deleted from Column (17) against this entry in Table A in Chapter 3.2.

XV. CODES VW12/VV12

46. Codes VW12 and VV12 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
3257	Elevated temperature liquid, n.o.s.	9	III		

"**VW12** Substances for which carriage in tank wagons, in portable tanks or in tank-containers is unsuitable because of the high temperature and density of the substance may be carried in special wagons or containers in accordance with standards specified by the competent authority of the country of origin. If the country of origin is not a COTIF Member State, the conditions laid down shall be recognized by the competent authority of the first COTIF Member State reached by the consignment."

"**VV12** Substances for which carriage in tank-vehicles, in portable tanks or in tank-containers is unsuitable because of the high temperature and density of the substance may be carried in special vehicles or containers in accordance with standards specified by the competent authority of the country of origin. If the country of origin is not a contracting party to ADR, the conditions laid down shall be recognized by the competent authority of the first country contracting party to ADR reached by the consignment."

Comment

47. Codes VW12/VV12 are specialized provisions not catered for by the UN bulk containers scheme. They reflect part of UN special provision 232 adapted for RID and ADR.

Proposal 15

48. It is proposed that codes VW12/VV12 be retained.

XVI. CODES VW13/VV13

49. Codes VW13 and VV13 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
3258	Elevated temperature solid, n.o.s.	9	III		

"**VW13** Carriage in bulk is permitted in specially equipped wagons or large containers in accordance with standards specified by the competent authority of the country of origin. If the country of origin is not a COTIF Member State, the conditions laid down shall be recognized by the competent authority of the first COTIF Member State reached by the consignment."

"**VV13** Carriage in bulk is permitted in specially equipped vehicles or containers in accordance with standards specified by the competent authority of the country of origin. If the country of origin is not a contracting party to ADR, the conditions laid down shall be recognized by the competent authority of the first country contracting party to ADR reached by the consignment."

Comment

50. Codes VW13/VV13 are specialized provisions not catered for by the UN bulk containers scheme. They reflect part of UN special provision 232 adapted for RID and ADR.

Proposal 16

51. It is proposed that codes VW13/VV13 be retained.

XVII. CODES VW14/VV14

52. Codes VW14 and VV14 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
2794	Batteries, wet, filled with acid	8			
2795	Batteries, wet, filled with alkali	8			
2800	Batteries, wet, non-spillable	8			
3028	Batteries, dry, containing potassium hydroxide solid	8			

"**VW14**

(1) Used batteries may be carried in bulk in specially equipped wagons or containers. Large plastics containers shall not be permitted. Small plastics containers shall be capable of withstanding, when fully loaded, a drop from a height of 0·8 m onto a hard surface at -18 °C, without breakage.

(2) The load compartments of wagons or containers shall be of steel resistant to the corrosive substances contained in the batteries. Less resistant steels may be used when there is a sufficiently great wall thickness or a plastics lining/layer resistant to the corrosive substances.
The design of the load compartments of wagons or containers shall take account of any residual currents and impact from the batteries.

NOTE: Steel exhibiting a maximum rate of progressive reduction of 0·1 mm per year under the effects of the corrosive substances may be considered as resistant.

(3) It shall be ensured by means of constructional measures that there will be no leakage of corrosive substances from the load compartments of wagons or containers during carriage. Open load compartments shall be covered. The cover shall be resistant to the corrosive substances.

(4) Before loading, the load compartments of wagons or containers, including their equipment, shall be inspected for damage. Wagons or containers with damaged load compartments shall not be loaded. The load compartments of wagons or containers shall not be loaded above the top of their walls.

(5) No batteries containing different substances and no other goods liable to react dangerously with each other shall be present in the load compartments of wagons or containers (see "dangerous reaction" in 1.2.1).

During carriage no dangerous residue of the corrosive substances contained in the batteries shall adhere to the outer surface of the load compartments of wagons or containers."

"**VV14**

(1) Used batteries may be carried in bulk in specially equipped vehicles or containers. Large plastics containers shall not be permitted. Small plastics containers shall be capable of withstanding, when fully loaded, a drop from a height of 0·8 m onto a hard surface at -18 °C, without breakage.

(2) The load compartments of vehicles or containers shall be of steel resistant to the corrosive substances contained in the batteries. Less resistant steels may be used when there is a sufficiently great wall thickness or a plastics lining/layer resistant to the corrosive substances. The design of the load compartments of vehicles or containers shall take account of any residual currents and impact from the batteries.

NOTE: *Steel exhibiting a maximum rate of progressive reduction of 0·1 mm per year under the effects of the corrosive substances may be considered as resistant.*

(3) It shall be ensured by means of constructional measures that there will be no leakage of corrosive substances from the load compartments of vehicles or containers during carriage. Open load compartments shall be covered. The cover shall be resistant to the corrosive substances.

(4) Before loading, the load compartments of vehicles or containers, including their equipment, shall be inspected for damage. Vehicles or containers with damaged load compartments shall not be loaded. The load compartments of vehicles or containers shall not be loaded above the top of their walls.

(5) No batteries containing different substances and no other goods liable to react dangerously with each other shall be present in the load compartments of vehicles or containers (see "*Dangerous reaction*" in 1.2.1).

During carriage no dangerous residue of the corrosive substances contained in the batteries shall adhere to the outer surface of the load compartments of vehicles or containers."

Comment

53. Codes VW14/VV14 are very specialized provisions for used batteries not catered for in the UN bulk containers scheme.

Proposal 17

54. It is proposed that codes VW14/VV14 be retained.

XVIII. CODES VW15/VV15

55. Codes VW15 and VV15 are assigned to the following entries:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
2315	Polychlorinated biphenyls, liquid	9	II		
3151	Polyhalogenated bi- or terphenyls, liquid	9	II		
3152	Polyhalogenated bi- or terphenyls, solid	9	II		
3432	Polychlorinated biphenyls, solid	9	II		

"**VW15** Carriage in bulk is permitted in closed wagons, movable-roof wagons, sheeted wagons, closed containers or sheeted large containers for substances or mixtures (such as preparations or wastes) containing not more than 1000 mg/kg of substance to which this UN No is assigned.

The bodies of wagons or containers shall be leakproof or rendered leakproof, for example by means of a suitable and sufficiently stout inner lining."

"VV15 Carriage in bulk is permitted in closed or sheeted vehicles, closed containers or sheeted large containers with complete walls for substances or mixtures (such as preparations or wastes) containing not more than 1000 mg/kg of substance to which this UN No is assigned.

The bodies of vehicles or containers shall be leakproof or rendered leakproof, for example by means of a suitable and sufficiently stout inner lining."

Comment

56. Codes VW15/VV15 are particular provisions not catered for in the UN bulk containers scheme.

Proposal 18

57. It is proposed that codes VW15/VV15 be retained.

XIX. CODES VW16/VV16

58. Codes VW16 and VV16 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
2912	Radioactive material, low specific activity (LSA-I)	7			See 4.1.9.2.3

"**VW16** Carriage in bulk is permitted in accordance with the provisions of 4.1.9.2.3."

"**VV16** Carriage in bulk is permitted in accordance with the provisions of 4.1.9.2.3."

Comment

59. The two systems are the same (i.e. duplicate each other) and refer off to 4.1.9.2.3,

Proposal 19

60. It is proposed that codes VW16/VV16 be deleted from Column (17) and "see 4.1.9.2.3" is added to Column (10) against these entries in Table A in Chapter 3.2.

XX. CODES VW17/VV17

61. Codes VW17 and VV17 are assigned to the following entry:

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
2913	Radioactive material, surface contaminated objects (SCO-I or SCO-II)	7			See 4.1.9.2.3

"**VW17** Carriage in bulk of SCO-I is permitted in accordance with the provisions of 4.1.9.2.3."

"**VV17** Carriage in bulk of SCO-I is permitted in accordance with the provisions of 4.1.9.2.3."

Comment

62. The two systems are the same (i.e. duplicate each other) and refer off to 4.1.9.2.3,

Proposal 20

63. It is proposed that codes VW17/VV17 be deleted from Column (17) and "see 4.1.9.2.3" be added to Column (10) against these entries in Table A in Chapter 3.2.

XXI. MISCELLANEOUS

64. The following substances are listed in RID/ADR with UN Bulk Codes in Column (10) but not with RID/ADR Bulk Codes in Column (17), so no change is proposed.

UN No.	Substance name	Class	PG	UN Bulk Code	
				Current	Proposed
2814	Infectious substance, affecting humans (animal material only)	6.2		BK1, BK2	BK1, BK2
2900	Infectious substance, affecting animals only (animal material only)	6.2		BK1, BK2	BK1, BK2
3373	Biological substance, Category B, (animal material only)	6.2		BK1, BK2	BK1, BK2

Proposal 21

65. As a consequence of all the above proposals, it is proposed to delete the text of the following special provisions/VW/VV codes in 7.3.3 and replace with "(deleted)": -

VW1/VV1 to VW11/VV11 inclusive, VW16/VV16 and VW17/VV17 (Note that VV6 is reserved already).

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