



WORKING PAPER

**DANGEROUS GOODS PANEL (DGP)
WORKING GROUP MEETING (DGP-WG/24)**

Montreal, 21 to 25 October 2024

Agenda Item 4: Managing safety risks posed by the carriage of lithium batteries by air (Ref: Job Card DGP.003.04)

SCOPE OF APPLICATION FOR SECTIONS IA OF PACKING INSTRUCTIONS 965 AND 968

(Presented by P. Guo)

SUMMARY

The current scope of application for Section IA in Packing Instructions 965 and 968 is not accurate, as it ignores the situation where the Watt-hour rating or lithium mental content does not exceed the limit for Section IB, while the quantities of cells or batteries does exceed the limit for Section IB.

Action by the DGP-WG: Action by the DGP-WG is in paragraph 2.

1. INTRODUCTION

1.1 The introductory section of Packing Instruction 965 specifies the following applicability for Section IA and Section IB:

Section IA applies to lithium ion cells with a Watt-hour rating in excess of 20 Wh and lithium ion batteries with a Watt-hour rating in excess of 100 Wh, which must be assigned to Class 9 and are subject to all of the applicable requirements of these Instructions. and Section IB applies to lithium ion cells with a Watt-hour rating not exceeding 20 Wh and lithium ion batteries with a Watt-hour rating not exceeding 100 Wh.

Section IB applies to lithium ion cells with a Watt-hour rating not exceeding 20 Wh and lithium ion batteries with a Watt-hour rating not exceeding 100 Wh.

1.2 However, the Watt-hour rating is not the only difference between Sections IA and IB. The maximum allowed net quantity per package for cells and batteries under Section IB of Packing Instruction 965 is 10 kg. A package with lithium ion cells with a Watt-hour rating not exceeding 20 Wh or lithium ion batteries with a Watt-hour rating not exceeding 100 Wh with a net quantity of 15 kg cannot be consigned under Section IB of Packing Instruction 965, but, considering only the provision in Section IA of this packing instruction, there seems no reason to reject this package from being transported under Section IA of Packing Instruction 965. The scope of application described in the introductory section seems not accurate. While Section IB applies only to lithium ion cells with a Watt-hour rating not exceeding 20 Wh and lithium ion batteries with a Watt-hour rating not exceeding 100 Wh, Section IA can also apply to these cells and batteries if the quantity of cells or batteries exceeds what is permitted in accordance with Section IB.

1.3 Section IA in the *Dangerous Goods Regulations of the International Air Transport Association (IATA)* specifies that “Section IA applies to lithium ion cells with a Watt-hour rating in excess of 20 Wh and lithium ion batteries with a Watt-hour rating in excess of 100 Wh, or to quantities of lithium cells or batteries in excess of those permitted in Section IB of this packing instruction which must be assigned to Class 9 and are subject to all of the applicable requirements of these Regulations”. This statement is closer to the real practice.

1.4 The same problem can be found in Packing Instruction 968.

2. ACTION BY THE DGP-WG

2.1 The DGP-WG is invited to incorporate the language used in the IATA *Dangerous Goods Regulations* in the introductory text of Packing Instructions 965 and 968, to include the situation where quantities of lithium cells or batteries are in excess of those permitted in Section IB of the respective packing instructions, as shown in the appendix to this working paper.

APPENDIX

PROPOSED AMENDMENT TO PACKING INSTRUCTION 965 AND 968

Packing Instruction 965

Cargo aircraft only for UN 3480

1. Introduction

This entry applies to lithium ion or lithium polymer batteries. This packing instruction is structured as follows:

- Section IA applies to lithium ion cells with a Watt-hour rating in excess of 20 Wh and lithium ion batteries with a Watt-hour rating in excess of 100 Wh, or to quantities of lithium cells or batteries in excess of those permitted in Section IB of this packing instruction, which must be assigned to Class 9 and are subject to all of the applicable requirements of these Instructions; and

A single cell battery as defined in Part III, sub-section 38.3.2.3 of the UN *Manual of Tests and Criteria* is considered a "cell" and must be transported according to the requirements for "cells" for the purpose of this packing instruction.

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Packing Instruction 968

Cargo aircraft only for UN 3090

1. Introduction

This entry applies to lithium metal or lithium alloy batteries. This packing instruction is structured as follows:

- Section IA applies to lithium metal cells with a lithium metal content in excess of 1 g and lithium metal batteries with a lithium metal content in excess of 2 g, or to quantities of lithium cells or batteries in excess of those permitted in Section IB of this packing instruction, which must be assigned to Class 9 and are subject to all of the applicable requirements of these Instructions; and
- Section IB applies to lithium metal cells with a lithium metal content not exceeding 1 g and lithium metal batteries with a lithium metal content not exceeding 2 g.

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