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**Refuse collection vehicles — Waste odour and leachate prevention and control**

*Véhicules de collecte de déchets — Prévention et maîtrise des odeurs et des jus émanant des déchets*



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Published in Switzerland

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## Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular, the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see [www.iso.org/directives](http://www.iso.org/directives)).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights. Details of any patent rights identified during the development of the document will be in the Introduction and/or on the ISO list of patent declarations received (see [www.iso.org/patents](http://www.iso.org/patents)).

Any trade name used in this document is information given for the convenience of users and does not constitute an endorsement.

For an explanation of the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT), see [www.iso.org/iso/foreword.html](http://www.iso.org/iso/foreword.html).

This document was prepared by Technical Committee ISO/TC 297, *Waste collection and transportation management*.

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at [www.iso.org/members.html](http://www.iso.org/members.html).

## Introduction

Waste odour and leachate emitted from refuse collection vehicles (RCVs) have a negative impact on living environments and can be a cause of complaints by residents. Proper control of waste odour and leachate has the potential to increase the acceptance of liquids and smells from waste collection.

Odour emitted from waste – particularly organic waste – has a negative impact on living environments, such as contributing to a feeling of discomfort.

Leachate emitted from the liquid component of waste can be a cause of water contamination and also odour if leaked outside RCVs.

This document provides support, advice and guidance to the owners of RCVs, waste service providers, vehicle manufacturers, suppliers, maintenance providers, consultants, authorities and others on properly controlling waste odour and leachate emitted from RCVs.



# Refuse collection vehicles — Waste odour and leachate prevention and control

## 1 Scope

This document specifies methods for preventing the spread of waste odour and the leakage of leachate during the collection and transportation of waste in refuse collection vehicles (RCVs), when the control of the spread of waste odour and leakage of leachate is required in order to protect the surrounding environment.

This document is not applicable in cases when it is not necessary to provide control of waste odour or leachate due to the composition or packaging of waste and there is no influence on the environment due to the loaded waste.

## 2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 24161:—,<sup>1)</sup> *Waste collection and transportation management — Vocabulary*

## 3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 24161 and the following apply.

ISO and IEC maintain terminology databases for use in standardization at the following addresses:

- ISO Online browsing platform: available at <https://www.iso.org/obp>
- IEC Electropedia: available at <https://www.electropedia.org/>

### 3.1

#### refuse collection vehicle

##### RCV

purpose-built vehicle for the collecting and transporting of waste or recyclables in containers, whereby the refuse or recyclables are transferred via differential air pressure, a lifting device, mechanical means or by hand

Note 1 to entry: An RCV can be fitted with sullage tanks, usually below the RCV's *body* (3.6), to contain *leachate* (3.4) for spillage control during transportation. The RCV can also be fitted with internet of things or smart solutions as part of an integrated waste management system. Waste or recyclables that are collected by RCVs are sent for further processing to a recycling facility or material recovery facility, or to be disposed of at incineration plants or landfill.

[SOURCE: ISO 24161:—, 3.43]

### 3.2

#### waste odour

unpleasant smell caused by waste during the whole process of waste collection, transportation and disposal

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1) Under preparation. Stage at the time of publication: ISO/DIS 24161:2022.