
**Road vehicles — Standardized repair
and maintenance information (RMI)
terminology —**

**Part 2:
Standardized process implementation
requirements, Registration Authority**

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*Véhicules routiers — Terminologie normalisée pour l'information sur
la réparation et la maintenance (RMI) —*

*Partie 2: Exigences de mise en oeuvre des procédés normalisés,
autorité d'enregistrement*

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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).

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).

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

For an explanation on the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the WTO principles in the Technical Barriers to Trade (TBT) see the following URL: Foreword - Supplementary information

ISO 18542-2 was prepared by the European Committee for Standardization (CEN) in collaboration with ISO Technical Committee ISO/TC 22, *Road vehicles*, Subcommittee SC 3, *Electrical and electronic equipment* in accordance with the Agreement on technical cooperation between ISO and CEN (Vienna Agreement).

ISO 18542 consists of the following parts, under the general title *Road vehicles — Standardized repair and maintenance information (RMI) terminology*:

- *Part 1: General information and use case definition*
- *Part 2: Standardized process implementation requirements, Registration Authority*

Introduction

The ISO 18542 series includes the requirements to be fulfilled by Repair and Maintenance Information (RMI) systems as applied by the:

EUROPEAN COMMISSION - ENTERPRISE AND INDUSTRY DIRECTORATE-GENERAL, Consumer goods - Automotive industry EC mandate M/421^[1] “MANDATE TO THE EUROPEAN STANDARDIZATION ORGANISATIONS FOR STANDARDIZATION IN THE FIELD OF VEHICLE OBD, REPAIR AND MAINTENANCE INFORMATION” dated Brussels, 21 January 2008.

This mandate relates to the EC type-approval system for vehicles falling into the scopes of Directives 2002/24/EC,^[2] 2003/37/EC^[3] and 70/156/EEC (replaced by 2007/46/EC),^[4] and, in particular, to requirements for access to vehicle repair and maintenance information by independent operators.

This part of ISO 18542 addresses terminology for access to automotive repair and maintenance information for light passenger and commercial vehicles¹⁾ and heavy duty vehicles²⁾ based on Directive 70/156/EEC (replaced by 2007/46/EC).

The purpose of the EC Mandate M/421 is to develop a standard or set of standards which specify the requirements to provide “standardized access to automotive repair and maintenance information (RMI)” for independent operators.

The information included in this part of ISO 18542 derives from the legislative requirements on a European level in the field of repair and maintenance information and related security requirements and can be referenced by legislation in other countries.

It is intended to be read in conjunction with:

- ISO 18542-1: General information and use case definition, that defines a framework and a process for agreeing terms for a standardized automotive terminology process;
- ISO 18541-1: General information and use case definition, that describes the requirements for the vehicle manufacturers RMI systems;
- ISO 18541-2: Technical requirements;
- ISO 18541-3: Functional user interface requirements, and;
- ISO 18541-4: Conformance test.

This part of ISO 18542-2 is predicated by some key decisions and concepts that need to be understood in order to fully appreciate its intent.

1) REGULATION (EC) No 715/2007 [5] OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 20 June 2007 on type approval of motor vehicles with respect to emissions from light passenger and commercial vehicles (Euro 5 and Euro 6) and on access to vehicle repair and maintenance information and COMMISSION REGULATION (EC) No 692/2008 of 18 July 2008 [6] implementing and amending Regulation (EC) No 715/2007 of the European Parliament and of the Council on type-approval of motor vehicles with respect to emissions from light passenger and commercial vehicles (Euro 5 and Euro 6) and on access to vehicle repair and maintenance information and amending COMMISSION REGULATION (EU) No 566/2011 of 8 June 2011 [7] amending Regulation (EC) No 715/2007 of the European Parliament and of the Council and Commission Regulation (EC) No 692/2008 as regards access to vehicle repair and maintenance information.

2) REGULATION (EC) No 595/2009 [8] OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 18 June 2009 on type approval of motor vehicles with respect to emissions from heavy duty vehicles (Euro VI) and on access to vehicle repair and maintenance information, COMMISSION REGULATION (EU) No 582/2011 of 25 May 2011 [9] implementing and amending Regulation (EC) No 595/2009 of the European Parliament and of the Council with respect to emissions from heavy duty vehicles (Euro VI), and COMMISSION REGULATION (EU) No 64/2012 of 23 January 2012 [10] amending Regulation (EU) No 582/2011 2011 implementing and amending Regulation (EC) No 595/2009 of the European Parliament and of the Council with respect to emissions from heavy duty vehicles (Euro VI).

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From the outset it was determined that a set of 'Agreed Terms' would be used by an IO to search a VM's RMI. The phrase 'Agreed Terms' is used rather than 'Standardized Terms' because the terms should not be 'standardized' in the established sense. The standardization process is lengthy and the need to have terms available for searching in a short timescale means such an approach is inappropriate. The process by which a panel of expert terminologists agrees and reviews terms is systemized and central to ISO 18542-1.

The provision of the agreed Automotive RMI Terminology itself is outside the remit of this part of ISO 18542 and therefore outside the scope of this part of ISO 18542. Rather, it is foreseen that the agreed Automotive RMI Terminology will follow a lifecycle beyond the timeframe of this part of ISO 18542 and be dependent upon the work of a Registration Authority, a Terminology Review Group for its creation and management, and of a Digital Annex for its publication. For the development of the Digital Annex existing standards will be reviewed and elements included where appropriate and practical.

- In order to effectively maintain the 'Agreed Terminology', it has been determined that a Commercial-Off-The-Shelf (COTS) Terminology Management System (TMS) is required. The COTS TMS functions as a 'back-end' database repository with a workflow element that will ensure 'Agreed Terms' are created, and managed in line with the standardized process outlined in ISO 18542-1.
- It is anticipated that there will be a maintenance agency which will be responsible for overseeing the procurement and hosting of the COTS TMS.
- A Registration Authority (RA) controls the IP for the Digital Annex (DA) and is responsible for managing and publishing the content of that DA.
- The maintenance agency for the Commercial-Off-The-Shelf Terminology Management System (COTS TMS) and the Registration Authority (RA) for the Digital Annex (DA) may be a single organization.

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Road vehicles — Standardized repair and maintenance information (RMI) terminology —

Part 2: Standardized process implementation requirements, Registration Authority

1 Scope

The ISO 18542 series is structured into two parts:

- Part 1: General information and use case definition: defines a framework and a process for agreeing terms
- Part 2: Standardized process implementation requirements, Registration Authority: defines the process implementation requirements for a Terminology Management System and for a Registration Authority with a Digital Annex.

The purpose of the ISO 18542 series is to facilitate searching by Independent Operators (IOs) of Vehicle Manufacturer (VM) Repair and Maintenance Information (RMI) websites.

This part of ISO 18542 specifies:

- the technical requirements that must be met by the Terminology Management System (TMS) that will be used to manage and store the 'Agreed RMI Terminology';
- the requirements for the Registration Authority (RA) (i.e. the agency responsible for maintaining and publishing the 'Agreed RMI Terminology').

The framework and process for creating 'Agreed Terminology' is the subject of ISO 18542-1.

The target audience for this part of ISO 18542-2 is a technical one, and focused on those responsible for the implementation of mandate M/421.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 18542-1, *Road vehicles — Standardized repair and maintenance information (RMI) terminology — Part 1: General information and use case definition*

ISO 18541-1³⁾, *Road vehicles — Standardized access to automotive repair and maintenance information (RMI) — Part 1: General information and use case definition*

ISO 18541-2⁴⁾, *Road vehicles — Standardized access to automotive repair and maintenance information (RMI) — Part 2: Technical requirements*

3) To be published.

4) To be published.

ISO 18541-3⁵⁾, *Road vehicles — Standardized access to automotive repair and maintenance information (RMI) — Part 3: Functional user interface requirements*

ISO 18541-4⁶⁾, *Road vehicles — Standardized access to automotive repair and maintenance information (RMI) — Part 4: Conformance test*

3 Terms and definitions, symbols and abbreviated terms

3.1 Terms and definitions

For the purposes of this document the following terms and definitions apply.

3.1.1

access levels

one of the levels of access to RMI including the rights and permissions assigned to a category of users

EXAMPLE One may consider an access to RMI relevant to security and another one to RMI not relevant to security. They represent two different access levels.

3.1.2

commercial-off-the-shelf application

COTS application

software that is 'ready-made' and available for use by way of a license to the general public requiring no or minimal customization

3.1.3

digital annex

DA

digital library in which terms related to Automotive RMI Terminology are stored and made available in digital formats in the defined target languages

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3.1.4

end user

Independent Operator or Vehicle Manufacturer user

3.1.5

entity

object, concept or notion in the automotive domain designated by a term

Note 1 to entry: An entity only exists for this process if there is a term in US-English designating it. The entity is the common meaning of the US-English term and all its translated terms in the defined target languages.

3.1.6

independent operator

IO

undertakings other than authorized dealers and repairers which are directly or indirectly involved in the repair and maintenance of motor vehicles

EXAMPLE Repairers, manufacturers or distributors of repair equipment, tools or spare parts, publishers of technical information, automobile clubs, roadside assistance operators, operators offering inspection and testing services, operators offering training for installers, manufacturers and repairers of equipment for alternative fuel vehicles.

5) To be published.

6) To be published.

3.1.7**process user**

terminology experts appointed by the Registration Authority (RA), Vehicle Manufacturers (VMs) and Independent Operators (IOs) to manage the agreed terminology using the Terminology Management System (TMS)

Note 1 to entry: Process users are assigned to different roles as described in ISO 18542-1.

3.1.8**Registration Authority****RA**

institution that is responsible for managing the Automotive RMI Terminology process, the Terminology Management System (TMS) and publishing the content of the Digital Annex (DA)

3.1.9**repair and maintenance information system****RMI system**

vehicle manufacturer repair and maintenance information system

VM RMI system

information system by which the Vehicle Manufacturer (VM) provides access to Repair and Maintenance Information (RMI) through a website

3.1.10**service level agreement****SLA**

contract between a service provider and a customer that details, usually in measurable terms, the nature, quality, and scope of the service to be provided in the form of deliverables or metrics

Note 1 to entry: It may also be called a service level contract.

3.1.11**source term**

term in US-English that starts the terminology process as a proposed term subject to the review process of acceptance, rejection or evaluation

3.1.12**term[s]**

word or standalone expression for an entity that has linguistic, semantic and grammatical integrity

3.1.13**terminology management system****TMS**

RMI terminology management system

system that is used to track the creation of, and manage, the agreed terms

Note 1 to entry: It has been agreed that it shall be web-based.

3.1.14**vehicle manufacturer****VM**

person or body responsible to the approval authority for all aspects of the type approval or authorization process and for ensuring conformity of production of a vehicle

Note 1 to entry: It is not essential that the person or body be directly involved in all stages of the construction of the vehicle, system, component or separate technical unit which is the subject of the approval process.

Note 2 to entry: Adopted from Directive 2007/46/EC.^[3]

3.2 Abbreviated terms

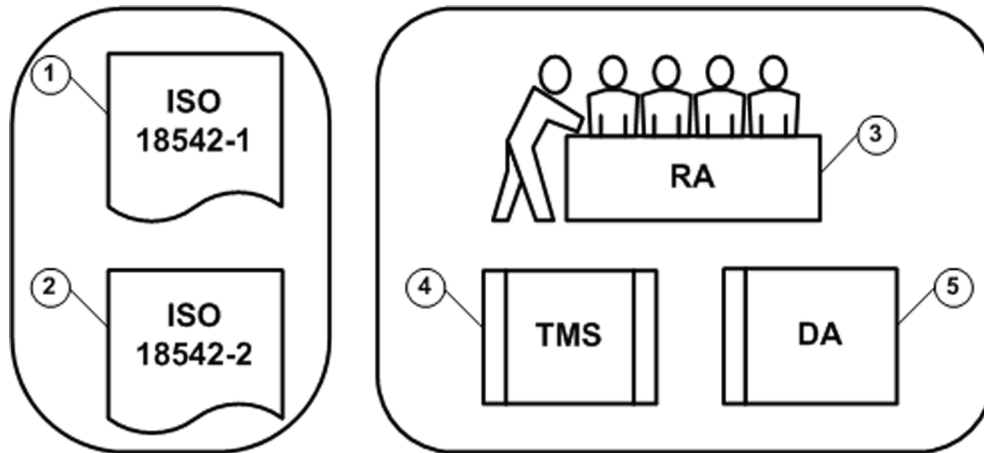
COTS	commercial-off-the-shelf system
DA	digital annex
DBMS	database management system
GUI	graphical user interface
IO	independent operator
OS	operating system
RA	registration authority
RMI	repair and maintenance information
SLA	service level agreement
TMS	terminology management system
UC	use case
VM	vehicle manufacturer

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4 Standard and implementation

4.1 Overview of Standard ISO 18542

An overview describing the framework of ISO 18542 and its constituent Parts 1 and 2 is shown in [Figure 1](#).

**Key**

- 1 ISO 18542-1: process specification to develop and maintain an agreed Automotive RMI Terminology
- 2 ISO 18542-2: standardized process implementation specification including requirements, and Registration Authority
- 3 Registration Authority – Terminology review group
- 4 Terminology Management System
- 5 Digital Annex: agreed Automotive RMI Terminology

NOTE As illustrated in Figure 1, a distinction is made between ISO 18542-1 and ISO 18542-2, and the Digital Annex as an artefact resulting from the standardized process. The Digital Annex will be published for the end user.

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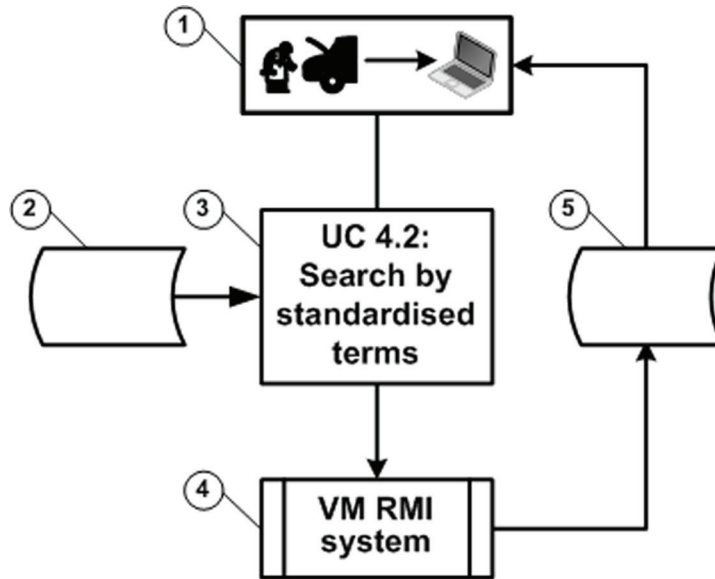
Figure 1 — Overview of the elements of the standard

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[fa8ce14a609b/iso-18542-2-2014](https://standards.iteh.ai/catalog/standards/sist/3e9488b1-ccb1-421e-9502-fa8ce14a609b/iso-18542-2-2014)

4.2 Overview of the usage of the Digital Annex within the context of ISO 18541

An overview of the usage of the Digital Annex in a standardized RMI request by an IO is shown in Figure 2.



Key

- 1 Independent operator: end user searching for information on any VM Euro 5 or later vehicle
- 2 A term in the Digital Annex
- 3 ISO 18541-1: Request under UC 4.2: UC 5.1 – Workshop Procedures, UC 5.2 – Wiring Diagrams, UC 5.3 – Technical Service Bulletins
- 4 VM RMI system
- 5 Response from VM RMI system

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Figure 2 — Independent Operator request showing the usage of the Digital Annex

5 Structure of the COTS TMS Requirements

5.1 Main technical requirements clusters

The COTS TMS, previously referred to as ‘the system’, has specific technical requirements that are divided into three primary clusters. Each individual requirement belongs to one of these three primary clusters (first level). For ease of reading, successive sub-clusters (second level) and sub-sub-clusters (third level) will be referred to by their own immediate title and the primary cluster to which they belong. The list of primary clusters is provided in [Table 1](#).