

# INTERNATIONAL STANDARD

# NORME INTERNATIONALE



**Industrial communication networks – Fieldbus specifications –  
Part 5-2: Application layer service definition – Type 2 elements**

**Réseaux de communication industriels – Spécifications des bus de terrain –  
Partie 5-2: Définition des services de la couche application – Éléments de type 2**



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INTERNATIONAL  
ELECTROTECHNICAL  
COMMISSION

COMMISSION  
ELECTROTECHNIQUE  
INTERNATIONALE

ICS 25.040.40; 35.100.70; 35.110

ISBN 978-2-8322-9264-8

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## INTERNATIONAL ELECTROTECHNICAL COMMISSION

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FIELDBUS SPECIFICATIONS –****Part 5-2: Application layer service definition –  
Type 2 elements**

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NOTE Combinations of protocol types are specified in IEC 61784-1 and IEC 61784-2.

International Standard IEC 61158-5-2 has been prepared by subcommittee 65C: Industrial networks, of IEC technical committee 65: Industrial-process measurement, control and automation.

This fourth edition cancels and replaces the third edition published in 2014. This edition constitutes a technical revision.



This edition includes the following significant technical changes with respect to the previous edition:

- addition of a data type in 5.3.2;
- clarifications of Object management ASE in 6.2.1;
- extensions of General ASE in 6.2.1.2.1;
- extensions/clarifications of Identity ASE in 6.2.1.2.2;
- update of Message Router ASE in 6.2.1.2.4;
- extensions/clarifications of Time Sync ASE in 6.2.1.2.6;
- updates of Parameter ASE in 6.2.1.2.7;
- updates of FAL ASE service specification in 6.2.1.3;
- extensions/clarifications of Connection manager ASE in 6.2.2;
- extensions/clarifications of Connection ASE in 6.2.3;
- extensions/clarifications of Application type in 6.3.1.4.5.
- miscellaneous editorial corrections.

The text of this International Standard is based on the following documents:

FDIS	Report on voting
65C/947/FDIS	65C/950/RVD

Full information on the voting for the approval of this International Standard can be found in the report on voting indicated in the above table.

This publication has been drafted in accordance with ISO/IEC Directives, Part 2.

A list of all parts of the IEC 61158 series, published under the general title *Industrial communication networks – Fieldbus specifications*, can be found on the IEC web site.

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## INTRODUCTION

This document is one of a series produced to facilitate the interconnection of automation system components. It is related to other standards in the set as defined by the “three-layer” fieldbus reference model described in IEC 61158-1.

The application service is provided by the application protocol making use of the services available from the data-link or other immediately lower layer. This document defines the application service characteristics that fieldbus applications and/or system management may exploit.

Throughout the set of fieldbus standards, the term “service” refers to the abstract capability provided by one layer of the OSI Basic Reference Model to the layer immediately above. Thus, the application layer service defined in this document is a conceptual architectural service, independent of administrative and implementation divisions.

Withdrawing