SLOVENSKI STANDARD
SIST-TP CLC/TR 61158-1:2004

01-december-2004

Digital data communications for measurement and control - Fieldbus for use in industrial control systems - Part 1: Overview and guidance for the IEC 61158 series

Digital data communications for measurement and control - Fieldbus for use in industrial control systems -- Part 1: Overview and guidance for the IEC 61158 series

Digitale Datenkommunikation in der Leittechnik - Feldbus für industrielle Leitsysteme -- Teil 1: Übersicht und Leitfaden für die Reihe IEC 61158

Communications numériques pour les systèmes de mesure et de commande - Bus de terrain utilisés dans les systèmes de commande industriels -- Partie 1: Vue d'ensemble et guide pour la série CEI 61158

Ta slovenski standard je istoveten z: **CLC/TR 61158-1:2004**

ICS:

25.040.40	Merjenje in krmiljenje industrijskih postopkov	Industrial process measurement and control
35.110	Omreževanje	Networking

SIST-TP CLC/TR 61158-1:2004 **en**

TECHNICAL REPORT

RAPPORT TECHNIQUE

TECHNISCHER BERICHT

CLC/TR 61158-1

July 2004

ICS 25.040; 35.100; 35.240.50

English version

Digital data communications for measurement and control – Fieldbus for use in industrial control systems Part 1: Overview and guidance for the IEC 61158 series

(IEC/TR 61158-1:2003)

Communications numériques pour les systèmes de mesure et de commande – Bus de terrain utilisés dans les systèmes de commande industriels Partie 1: Vue d'ensemble et guide pour la série CEI 61158 (CEI/TR 61158-1:2003)

Digitale Datenkommunikation in der Leittechnik – Feldbus für industrielle Leitsysteme Teil 1: Übersicht und Leitfaden für die Reihe IEC 61158 (IEC/TR 61158-1:2003)

This Technical Report was approved by CENELEC on 2004-05-22.

CENELEC members are the national electrotechnical committees of Austria, Belgium, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Slovakia, Slovenia, Spain, Sweden, Switzerland and United Kingdom.

CENELEC

European Committee for Electrotechnical Standardization
Comité Européen de Normalisation Electrotechnique
Europäisches Komitee für Elektrotechnische Normung

Central Secretariat: rue de Stassart 35, B - 1050 Brussels

Ref. No. CLC/TR 61158-1:2004 E

Foreword

The text of the Technical Report IEC/TR 61158-1:2003, prepared by SC 65C, Digital communications, of IEC TC 65, Industrial-process measurement and control, was submitted to the formal vote and was approved by CENELEC as CLC/TR 61158-1 on 2004-05-22 without any modification.

Annex ZA has been added by CENELEC.

_____

Endorsement notice

The text of the Technical Report IEC/TR 61158-1:2003 was approved by CENELEC as a Technical Report without any modification.

_____

Annex ZA
(normative)

Normative references to international publications with their corresponding European publications

The following referenced documents are indispensable for the application 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.

NOTE When an international publication has been modified by common modifications, indicated by (mod), the relevant EN/HD applies.

Publication	Year	Title	EN/HD	Year
IEC 61158-2	- [1)]	Digital data communications for measurement and control - Fieldbus for use in industrial control systems Part 2: Physical layer specification and service definition	EN 61158-2	2004 [2)]
IEC 61158-3	- [1)]	Part 3: Data link service definition	EN 61158-3	2004 [2)]
IEC 61158-4	- [1)]	Part 4: Data link protocol specification	EN 61158-4	2004 [2)]
IEC 61158-5	- [1)]	Part 5: Application layer service definition	EN 61158-5	2004 [2)]
IEC 61158-6	- [1)]	Part 6: Application layer protocol specification	EN 61158-6	2004 [2)]
IEC 61784-1	- [1)]	Digital data communications for measurement and control Part 1: Profile sets for continuous and discrete manufacturing relative to fieldbus use in industrial control systems	EN 61784-1	2004 [2)]
ISO/IEC 7498-1	- [1)]	Information technology - Open systems interconnection - Basic reference model Part 1: The basic model	EN ISO/IEC 7498-1	1995 [2)]

[1)] Undated reference.

[2)] Valid edition at date of issue.

TECHNICAL REPORT

IEC TR 61158-1

First edition
2003-04

Digital data communications for measurement and control – Fieldbus for use in industrial control systems –

Part 1: Overview and guidance for the IEC 61158 series

International Electrotechnical Commission, 3, rue de Varembé, PO Box 131, CH-1211 Geneva 20, Switzerland
Telephone: +41 22 919 02 11 Telefax: +41 22 919 03 00 E-mail: inmail@iec.ch Web: www.iec.ch

Commission Electrotechnique Internationale
International Electrotechnical Commission
Международная Электротехническая Комиссия

PRICE CODE L

For price, see current catalogue

INTERNATIONAL ELECTROTECHNICAL COMMISSION

DIGITAL DATA COMMUNICATIONS FOR MEASUREMENT AND CONTROL – FIELDBUS FOR USE IN INDUSTRIAL CONTROL SYSTEMS –

Part 1: Overview and guidance for the IEC 61158 series

FOREWORD

1) The IEC (International Electrotechnical Commission) is a worldwide organization for standardization comprising all national electrotechnical committees (IEC National Committees). The object of the IEC is to promote international co-operation on all questions concerning standardization in the electrical and electronic fields. To this end and in addition to other activities, the IEC publishes International Standards. Their preparation is entrusted to technical committees; any IEC National Committee interested in the subject dealt with may participate in this preparatory work. International, governmental and non-governmental organizations liaising with the IEC also participate in this preparation. The IEC collaborates closely with the International Organization for Standardization (ISO) in accordance with conditions determined by agreement between the two organizations.
2) The formal decisions or agreements of the IEC on technical matters express, as nearly as possible, an international consensus of opinion on the relevant subjects since each technical committee has representation from all interested National Committees.
3) The documents produced have the form of recommendations for international use and are published in the form of standards, technical specifications, technical reports or guides and they are accepted by the National Committees in that sense.
4) In order to promote international unification, IEC National Committees undertake to apply IEC International Standards transparently to the maximum extent possible in their national and regional standards. Any divergence between the IEC Standard and the corresponding national or regional standard shall be clearly indicated in the latter.
5) The IEC provides no marking procedure to indicate its approval and cannot be rendered responsible for any equipment declared to be in conformity with one of its standards.
6) Attention is drawn to the possibility that some of the elements of this technical report may be the subject of patent rights. IEC shall not be held responsible for identifying any or all such patent rights.

The main task of IEC technical committees is to prepare International Standards. However, a technical committee may propose the publication of a technical report when it has collected data of a different kind from that which is normally published as an International Standard, for example "state of the art".

Technical reports do not necessarily have to be reviewed until the data they provide are considered to be no longer valid or useful by the maintenance team.

IEC 61158-1, which is a Technical Report, has been prepared by subcommittee 65C: Digital communications, of IEC technical committee 65: Industrial-process measurement and control.

The text of this technical report is based on the following documents:

Enquiry draft	Report on voting
65C/267/DTR	65C/277/RVC

Full information on the voting for the approval of this Technical Report 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.

IEC 61158 consists of the following parts, under the general title *Digital data communications for measurement and control – Fieldbus for use in industrial control systems*:

Part 1: Overview and guidance for the IEC 61158 series

Part 2: Physical Layer specification and service definition

Part 3: Data Link Service definition

Part 4: Data Link protocol specification

Part 5: Application Layer Service definition

Part 6: Application Layer protocol specification

The committee has decided that the contents of this publication will remain unchanged until 2007. At this date the publication will be

- reconfirmed;
- withdrawn;
- replaced by a revised edition, or
- amended.

NOTE When revised, this report will be synchronized with the other parts of the IEC 61158 series.