SLOVENSKI STANDARD
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Blank Detail Specification: Electromechanical all-or-nothing relays for enhanced industrial application

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Vordruck für Bauartspezifikation: Elektromechanische Schaltrelais für industrielle Anwendungen mit erhöhten Anforderungen

Spécification particulière cadre: A présent, cette spécification n'existe pas en français

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This European Standard was approved by the CENELEC Electronic Components Committee (CECC) on 25 October 1992. CENELEC members are bound to comply with CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration.

Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the General Secretariat of the CECC or to any CENELEC member.

This European Standard exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CENELEC member into its own language and notified to the CECC General Secretariat has the same status as the official versions.

CENELEC members are the national electrotechnical committees of Austria, Belgium, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland, and United Kingdom. The membership of the CECC is identical, with the exception of the national electrotechnical committees of Greece, Iceland and Luxembourg.

CECC

CENELEC Electronic Components Committee

Comité des Composants Electroniques du CENELEC

CENELEC- Komitee für Bauelemente der Elektronik

General Secretariat: Gartenstr. 179, 60596 Frankfurt am Main

FOREWORD

The CENELEC Electronic Components Committee (CECC) is composed of those member countries of the European Committee for Electrotechnical Standardization (CENELEC) who wish to take part in a harmonized System for electronic components of assessed quality.

The object of the System is to facilitate international trade by the harmonization of the specifications and quality assessment procedures for electronic components, and by the grant of an internationally recognized Mark, or Certificate, of Conformity. The components produced under the System are thereby acceptable in all member countries without further testing.

This specification was prepared by CECC WG 16 " Relays".

The text of the draft based on document CECC (Secretariat)3093 was submitted to the formal vote; together with the voting report, circulated as document CECC(Secretariat)3240, it was approved by CECC as EN 116 203 on 25 October 1992.

The following dates were fixed:

- latest date of announcement of the EN at national level	(doa)	1993-11-23
- latest date of publication of an identical national standard	(dop)	1994-05-23
- latest date of declaration of national standards obsolescence		1994-05-23
- latest date of withdrawal of conflicting national standards	(dow)	2003-11-23

Specification available from: [1]	CECC 16 203-XXX [2] Issue ..... Page 1 of .....
Electronic components of assessed quality in accordance with: [3] EN 116 000-1 : 1992 EN 116 200 : 1991	[4]

Detail specification for electromechanical all-or-nothing relays for enhanced industrial application

Type: [5]

Construction: [6]

Outline drawing [7]	Application: [8]
Dimensions in mm	Test schedule 3

Coil data: [9]

Contact data: [10]

Temperature range [11]
- Operating temperature:
- Storage temperature:

Information about manufacturers who have components qualified to this detail specification is available in the current CECC 00 200 (Register of Approvals).

BLANK DETAIL SPECIFICATION

A blank detail specification is a supplementary document to the sectional specification and contains requirements for style and layout and minimum content of detail specifications.

In the preparation of detail specifications the content of EN 116 000-1 : 1992 shall be taken into account.

KEY FOR PAGE 3

The numbers between square brackets on page 3 correspond to the following indications which should be given in the appropriate boxes.

IDENTIFICATION OF THE DETAIL SPECIFICATION

[1] The name of the National Standards Organization under whose authority the detail specification is published and, if applicable, the organization from whom the detail specification is available.

[2] The CECC symbol and the number allotted to the completed detail specification by the CECC General Secretariat.

[3] The number and year of availability of the EN generic and/or sectional specification as relevant; also national reference if different.

[4] If different from the CECC number, the national number of the detail specification, date of issue and any further information required by the national system, together with any amendment numbers.

IDENTIFICATION OF THE RELAY

[5] A brief description of the relay or range of relays.

[6] Information on typical construction (where applicable).

For [5] and [6] the text to be given in the detail specification should be suitable for an entry in CECC 00 200 (Register of Approvals) and CECC 00 300 (Register of National Documents).

[7] An outline drawing with main dimensions which are of importance for interchangeability and/or reference to the appropriate national or international document for outlines. Alternatively, this drawing may by given in an annex to the detail specification, but [7] should always contain an illustration of the general outer appearance of the relay.

[8] Application and assessment level.

[9] Available coil voltages.

[10] Available contact arrangements and contact current and voltage.

[11] Temperature range.

1. Related documents

EN 116 000-1 : 1992	Generic Specification: Electromechanical all-or-nothing relays.
EN 116 200 : 1991	Sectional Specification: Electromechanical all-or-nothing relays.

2. Characteristic values of the relay

These shall be in accordance with IEC 255-1-00 as applicable.

2.1 General data

Contact application : .....
Contact arrangement : .....
Mass : .....g max.
Finish of the relay housing : .....
Finish of the terminals : .....
Insulation resistance : .....MΩ min.
Dielectric strength : .....V min.

Table 1: Dielectric test voltages

	Test voltage V a.c. min.
Open contacts	
Between adjacent contacts	
Contacts to case	
Coil to contacts	
Coil to case	

2.2 Construction of designation (ordering information)

Relay CECC16203 - XXX A 1 B 1

Denomination — Relay
CECC number — CECC16203
Type code (CECC registration number) — XXX
Coil voltage (according to 2.3) — A
Terminals (according to 2.5 and Annex 2) — 1
Mounting (according to 2.6 and Annex 1) — B
Special attributes (e.g. suppression diode, additional functions according to 2.3 and Annex ...) — 1

Note: The reference to monostable or bistable, polarized or not polarized, number and kind of contacts and general coil additives shall be given in the title of the specification. Only if one or more of these attributes is optional, shall the respective codes be given. There shall be no special marks or open space for non applicable criteria.

2.3 Coil data

Table 2: Coil data

Code letter	Voltage d.c. / a.c. V		Coil resistance and / or impedance at 23 °C	Must-operate voltage d.c. / a.c. V_{max} at		Must-release voltage d.c. / a.c. V_{max} at		V_{min} at		Must-not-release voltage at UTC	Rated power/ burden	Suppres-sion or additional function, code or letter 1)
	rated	max.	Ω ± 10 %	23°C	UTC	23°C	UTC	23°C	LTC	V	W/VA	

1) Configuration of coil suppression or additional function if applicable.

UTC = maximum permissible operating temperature
LTC = minimum permissible operating temperature

2.4 Contact data

2.4.1 Contacts, number, configuration and application categories

2.4.2 Contact load, electrical endurance and switching frequency

Maximum contact voltage : V
Minimum contact voltage : V
Maximum contact current : .....A
Minimum contact current : .....A

Table 3 : Loads, switching cycles and frequencies for endurance tests

Loads	at V d.c.	at V a.c. / Hz	switching cycles	switching frequencies
Resistive				
Low level				

For inductive load the maximum induction relating to the load shall be specified. For relays with contact application 0, the lower values for switching voltage and current shall be specified.

2.4.3 Static contact resistance

.....mΩ max. initial resistance
.....mΩ max. after electrical life.
(Relays with long leads to be measured at a prescribed distance from the relay body.)

2.4.4 Dynamic contact resistance

.....mΩ max. for the respective nominal load (according to 2.4.2).
.....mΩ max. for dry circuit switching.
(For relays with long leads the test point shall be specified according to 2.4.3.)

2.4.5 Mechanical life

.....switching cycles

2.4.6 Timing (over the whole temperature range)

Operate time	max.	.....ms	
Bounce time	max.	.....ms	
Stabilization time	max.	.....ms	
Release time	max.	.....ms	
Release time	max.	.....ms	(with suppression device)

2.5 Terminals

The type of terminals with their respective finish shall be stated together with the identifying code number.
(If the terminals are specified in Annex 2 there shall be made a reference to the annex.)

Table 4: Terminals

Code number	Terminals	Finish

2.6 Mounting

The mounting variants and the respective code letters shall be specified.
Details and drawings shall be included in Annex 1.

2.7 Environmental data

The relays shall withstand at least the following environmental stresses:

Shock: .....m/s^2, 1/2 sine pulse
Bump: .....m/s^2, ...ms duration
Vibration (sinusoidal): amplitude .....mm or acceleration ..... m/s^2, ...Hz to .....Hz
(random): .....g^2/Hz, ...Hz to .....Hz
Acceleration (steady state): .....m/s^2
Climatic category : .....