

# **SLOVENSKI STANDARD**

## **SIST HD 21.2 S2:1998/A2:1998**

# Polyvinyl chloride insulated cables of rated voltages up to and including 450/750 V - Part 2: Test methods - Amendment A2

Polyvinyl chloride insulated cables of rated voltages up to and including 450/750 V -- Part 2: Test methods

# Polyvinylchlorid-isolierte Leitungen mit Nennspannungen bis 450/750 V -- Teil 2: Prüfverfahren

Conducteurs et câbles isolés au polychlorure de vinyle, de tension assignée au plus égale à 450/750 V -- Partie 2: Méthodes d'essais  
ISS 2014-09/A2:1998

**Ta slovenski standard je istoveten z:** **HD 21.2 S2:1990/A2:1990**

ICS:

29.060.20 Kabli Cables

SIST HD 21.2 S2:1998/A2:1998 en

**iTeh STANDARD PREVIEW  
(standards.iteh.ai)**

[SIST HD 21.2 S2:1998/A2:1998](#)

<https://standards.iteh.ai/catalog/standards/sist/18f1346f-4e2e-47f1-b864-b54d1eacf6ce/sist-hd-21-2-s2-1998-a2-1998>

**CENELEC**

Rue Bréderode 2, Bte 5 - 1000 BRUXELLES  
 Tél.: [+32.2] 519.68 71 - Téléx: 26257 Cenlec b  
 Fax: [+32.2] 519 68 19 - Télétex: 206 2210097 CENELC

HD 21.2 S2  
 Amendment 2  
 July 1990

## ENGLISH VERSION

Date of issue: 1990-07-06

doa: 1990-12-15  
 dop: 1991-06-15  
 dow: 1991-06-15

POLYVINYL CHLORIDE INSULATED CABLES OF RATED  
 VOLTAGES UP TO AND INCLUDING 450/750 V  
 PART 2: TEST METHODS

Conducteurs et câbles isolés  
 au polychlorure de vinyle, de  
 tension nominale au plus égale à  
 450/750 V  
 Deuxième partie: Méthodes d'essais

Isolierte Starkstromleitungen  
 mit einer Isolierung aus  
 thermoplastischem Kunststoff auf  
 Basis von Polyvinylchlorid (PVC)  
 mit Nennspannungen bis 450/750 V  
 Teil 2: Prüfverfahren

**iTeh STANDARD PREVIEW**  
**(standards.iteh.ai)**

SIST HD 21.2 S2:1998/A2:1998

Amendment 2 to HD 21.2 S2 was prepared by CLC/TC 20 and IEC/TC 18 fl 346 f-4 e2c-47 fl-b864-  
 ratified by CENELEC on 1990-06-11.

It corrects/modifies the English version of HD 21.2 S2.

The changes to be made to the HD are given overleaf.



REPUBLIKA SLOVENIJA  
 MINISTRSTVO ZA ZNANOST IN TEHNOLOGIJO  
 Urad RS za standardizacijo in meroslovje  
 LJUBLJANA

SIST.....HD 21.2 S2 / A2....  
 PREVZET PO METODI RAZGLASITVE

-02- 1998

Table A: Mass of weight and diameter of pulleys

Types of flexible cables	Number of cores	Nominal cross sectional area (mm <sup>2</sup> )	Mass of weight (kg)	Diameter of pulleys (1) (mm)
Flat non-sheathed cord	2	0.5 0.75	0.5 1.0	60 60
Light polyvinyl chloride sheathed cord		0.5 0.75	0.5 1.0	60 80
Ordinary polyvinyl chloride sheathed cord	2	1 1.5 2.5	1.0 1.0 1.5	80 80 120
	3	0.5 0.75 1 1.5 2.5	0.5 1.0 1.0 1.0 1.5	80 80 80 80 120
	4	0.5 0.75 1 1.5 2.5	0.5 1.0 1.0 1.5 1.5	80 80 80 120 120
	5	0.75 1 1.5 2.5	1.0 1.0 1.5 2.0	80 120 120 120
iTeh STANDARD PREVIEW (standardsiteh.ai)				
<a href="https://standardsiteh.a/catalog/standards/sist/18fl346f4e2c47fl-b864-b54d1eacf6ce/sist-hd-21-3-s2-1998-a2-1998">https://standardsiteh.a/catalog/standards/sist/18fl346f4e2c47fl-b864-b54d1eacf6ce/sist-hd-21-3-s2-1998-a2-1998</a>				

(1) Diameter measured at the lowest point of the groove.

Table B: Current loadings

Nominal cross sectional area	mm <sup>2</sup>	0.5	0.75	1	1.5	2.5
Current I <sub>3</sub>	A	1.5	3	5	8	12.5



Delete existing Sub-Clause 3.1 and insert the following:-

### 3.1 Flexing Test

The requirements are given in Part 1, Sub-Clause 5.6.3.1

This test does not apply to tinsel cords, to single-core cables with flexible conductors for fixed wiring or to multi-core flexible cables having cores of nominal cross sectional area greater than 2.5 mm<sup>2</sup>.

This test shall be carried out by means of the apparatus shown in Part 2, Figure 1. This apparatus has a carrier C supporting two pulleys A and B arranged so that the cable is horizontal between the pulleys. The carrier makes a forward and backward movement over a distance of 1m at an approximately constant speed of 0.33 m/s between each reversal of the direction of movement.

A sample of flexible cable about 5 m long shall be stretched over the pulleys, as shown in Figure 1, each end being loaded with a weight. The mass of this weight and the diameter of the pulleys A and B are shown in Table A.

The pulleys have a semi-circular shaped groove for circular cables and a flat groove for flat cables. The restraining clamps D shall be fixed so that the pull is always applied by the weight from which the carrier is moving away.

The carrier makes forward and backward movements.

[SIST HD 21.2 S2:1998/A2:1998](https://standards.iec.ch/catalog/standards/ji/189346f4e3e47fb864)

During the flexing test the cable sample shall be loaded with the current specified in Table B as follows:

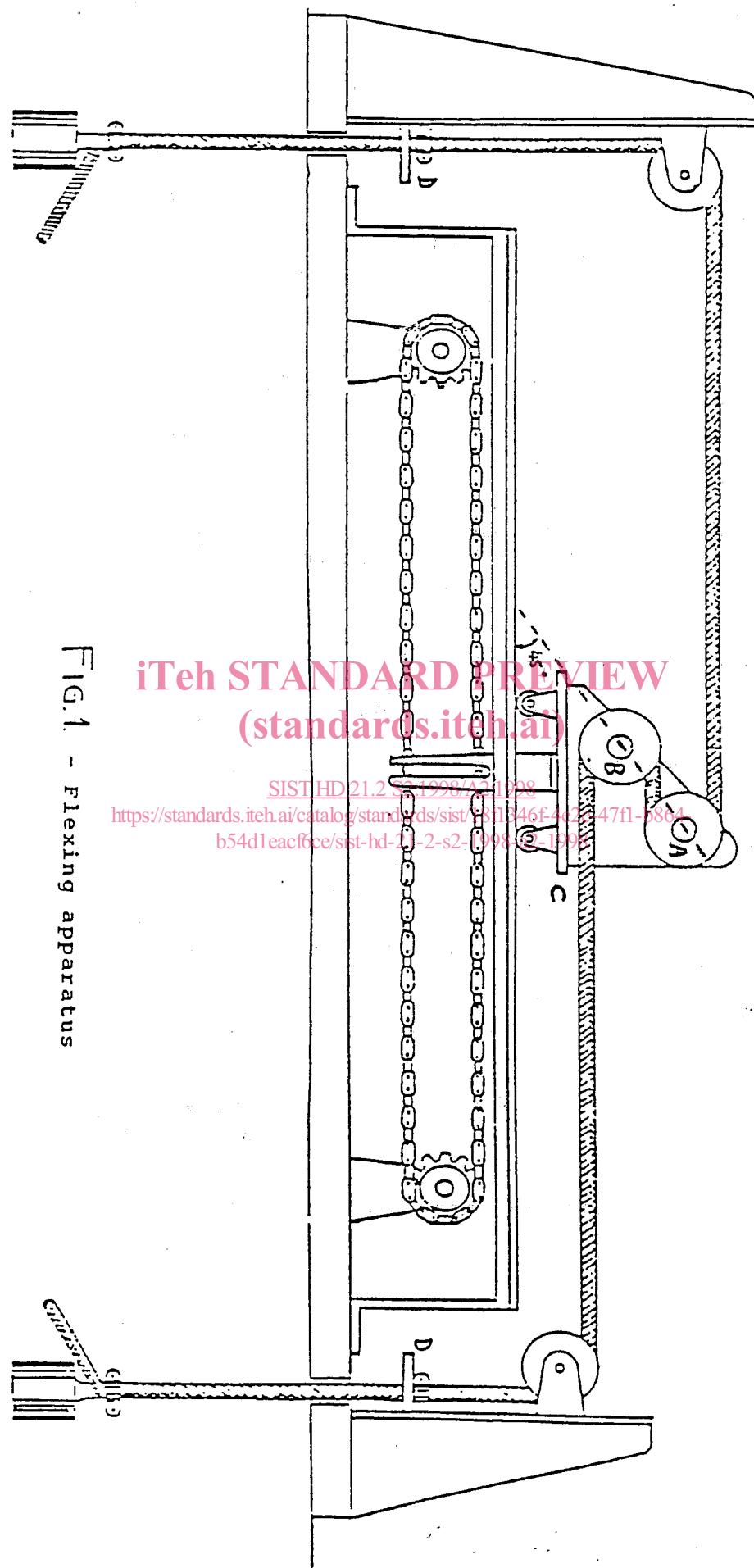
- 2 and 3 core cables: all cores to be loaded fully
- 4 and 5 core cables: three cores to be loaded fully or all cores to be loaded according to the following formula:

$$I_n = I_3 \sqrt{\frac{3}{n}}; \text{ where } n = \text{number of cores}$$

$I_3$  = full current according to Table B

For the current loading either a low voltage or a voltage of 220/380 V may be used. On cores which are not loaded a signal current shall be applied.

After the required number of movements the sheath of the sample, if any, shall be removed. The cores shall then withstand the voltage test carried out in accordance with Part 2, Sub-clause 2.3.



iTeh STANDARD PREVIEW  
(standards.iteh.ai)

SIST HD 21.2 S2:1998/A2:1998  
<https://standards.iteh.ai/catalog/standards/sist/031346f-4c2a-47f1-5864-b54d1eacf6ce/sist-hd-21-2-s2-1998-a2-1998>

FIG. 1. - Flexing apparatus