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# 10

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- tematske poizvedbe o slovenskih in tujih standardih
- poizvedbe o slovenskih in tujih tehničnih predpisih (kontaktna točka WTO/TBT)
- naročnina na periodične novosti pri standardih izbranega profila ali izbranega seznama
- naročnina na mesečna obvestila o sklicevanju na standarde v tehničnih predpisih

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### Prodaja strokovne literature

- slovenski standardi SIST
- publikacije SIST
- kopije standardov JUS (do 25. 6. 1991)
- posredovanje tujih standardov in literature
- licenčne kopije standardov ISO in IEC, ETS, DIN BS in predlogov prEN
- Naročila morajo biti pisna (pošta, faks, e-pošta ali osebni obisk); na nadnadno poslanih izvirnih naročilnic mora biti navedena opomba o prvem naročilu. Prosimo vas, da pri prvem naročilu navedete natančen naslov za račun.

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# Objava novih slovenskih nacionalnih standardov

## SIST/TC AGO Alternativna goriva iz odpadkov

**SIST EN ISO 17225-5:2021**                      SIST EN ISO 17225-5:2014  
**2021-10**                      **(po) (en;fr;de)**                      **20 str. (E)**

Trdna biogoriva - Specifikacije goriv in razredi - 5. del: Razvrščena drva (ISO 17225-5:2021)  
*Solid biofuels - Fuel specifications and classes - Part 5: Graded firewood (ISO 17225-5:2021)*

Osnova:                      EN ISO 17225-5:2021

ICS:                              75.160.40

This document determines the fuel quality classes and specifications of graded firewood. This document

covers only firewood produced from the following raw materials (see ISO 17225-1:2021, Table 1):

- 1.1.1 Whole trees without roots;
- 1.1.3 Stem wood;
- 1.1.4 Logging residues (thick branches, tops etc.);
- 1.2.1 Chemically untreated by-products and residues from wood processing industry.

**SIST EN ISO 17225-6:2021**                      SIST EN ISO 17225-6:2014  
**2021-10**                      **(po) (en;fr;de)**                      **15 str. (D)**

Trdna biogoriva - Specifikacije goriv in razredi - 6. del: Razvrščeni nelesni peleti (ISO 17225-6:2021)  
*Solid biofuels - Fuel specifications and classes - Part 6: Graded non-woody pellets (ISO 17225-6:2021)*

Osnova:                      EN ISO 17225-6:2021

ICS:                              75.160.40

This document determines the fuel quality classes and specifications of graded non-woody pellets.

This document covers only non-woody pellets produced from the following raw material (see ISO 17225-1:2021, Table 1):

- 2 Herbaceous biomass
- 3 Fruit biomass
- 4 Aquatic biomass
- 5 Biomass blends and mixtures

NOTE 1 Herbaceous biomass originates from plants that have a non-woody stem and which die back at the end of the growing season. It includes grains or seeds crops from food production or processing industry and their by-products such as cereals.

NOTE 2 Blends and mixtures include blends and mixtures from the main origin-based solid biofuel groups woody biomass, herbaceous biomass, fruit biomass and aquatic biomass.

Blends are intentionally mixed biofuels, whereas mixtures are unintentionally mixed biofuels. The origin of the blend and mixture is to be described using ISO 17225-1:2021, Table 1.

If solid biofuel blend or mixture contains chemically treated material it shall be stated.

NOTE 3 Thermally treated biomass pellets (e.g. torrefied pellets) are not included in the scope of this document.

**SIST EN ISO 17225-7:2021**                      SIST EN ISO 17225-7:2014  
**2021-10**                      **(po) (en;fr;de)**                      **15 str. (D)**

Trdna biogoriva - Specifikacije goriv in razredi - 7. del: Razvrščeni nelesni briketi (ISO 17225-7:2021)  
*Solid biofuels - Fuel specifications and classes - Part 7: Graded non-woody briquettes (ISO 17225-7:2021)*

Osnova:                      EN ISO 17225-7:2021

ICS:                              75.160.40

This document determines the fuel quality classes and specifications of graded non-woody briquettes. This document covers only non-woody briquettes produced from the following raw materials (see ISO 17225-1:2021, Table 1):

- 2 Herbaceous biomass
- 3 Fruit biomass
- 4 Aquatic biomass
- 5 Biomass blends and mixtures

NOTE 1 Herbaceous biomass originates from plants that have a non-woody stem and which die back at the end of the growing season. It includes grains or seeds crops from food production or processing industry and their by-products such as cereals.

NOTE 2 Blends and mixtures include blends and mixtures from the main origin-based solid biofuel groups woody biomass, herbaceous biomass, fruit biomass and aquatic biomass.

Blends are intentionally mixed biofuels, whereas mixtures are unintentionally mixed biofuels. The origin of the blend and mixture is to be described using ISO 17225-1:2021, Table 1.

If solid biofuel blend or mixture contains chemically treated material it shall be stated.

NOTE 3 Thermally treated biomass briquettes (e.g. torrefied briquettes) are not included in the scope of this document.

### **SIST EN ISO 17225-9:2021**

**2021-10 (po) (en;fr;de) 16 str. (D)**

Trdna biogoriva - Specifikacije goriv in razredi - 9. del: Klasifikacija grobo drobljenega lesa in sekancev za industrijsko uporabo (ISO 17225-9:2021)

*Solid biofuels - Fuel specifications and classes - Part 9: Graded hog fuel and wood chips for industrial use (ISO 17225-9:2021)*

Osnova: EN ISO 17225-9:2021

ICS: 75.160.10

This document determines the fuel quality classes and specifications of graded hog fuel and wood chips for industrial use. It covers only hog fuel and wood chips produced from the following raw materials (see ISO 17225-1:—, Table 1):

- 1.1 forest, plantation and other virgin wood;
- 1.2 by-products and residues from wood processing industry;
- 1.3.1 chemically untreated used wood;
- 1.4 blends and mixtures.

This document covers hog fuel, which is produced with blunt tools, and wood chips, which are produced with sharp tools.

NOTE 1 1.2.2 By-products and residues from wood processing industry, which can include chemically treated material (e.g. glued, painted, laminated) are not allowed include halogenated organic compounds or heavy metals at levels higher than those in typical virgin material values (see Annex B in ISO 17225-1) or higher than typical values of the country of origin.

NOTE 2 If class I4 includes chemically treated used wood (1.3.2), it can be only used in the installations permitted to use 1.3.2.

### **SIST EN ISO 21654:2021**

SIST EN 15400:2011

**2021-10 (po) (en;fr;de) 69 str. (K)**

Trdna alternativna goriva - Določevanje kalorične vrednosti (ISO 21654:2021)

*Solid recovered fuels - Determination of calorific value (ISO 21654:2021)*

Osnova: EN ISO 21654:2021

ICS: 75.160.10

This Standard specifies a method for the determination of gross calorific value of solid recovered fuels at constant volume and at the reference temperature 25 °C in a bomb calorimeter calibrated by combustion of certified benzoic acid.

## SIST/TC BIM Informacijsko modeliranje gradenj

### SIST-TP CEN/TR 17654:2021

2021-10 (po) (en;fr;de) 55 str. (J)

Smernica za izvajanje načrtov za izvedbo BIM-pristopa (BEP) in informacijskih zahtev naročnika (EIR) na evropski ravni na podlagi EN ISO 19650-1 in EN ISO 19650-2

*Guideline for the implementation of BIM Execution Plans (BEP) and Exchange Information Requirements (EIR) on European level based on EN ISO 19650-1 and -2*

Osnova: CEN/TR 17654:2021

ICS: 91.010.01, 35.240.67

BIM Execution Plans (BEP) and Exchange Information requirements (EIR) are central complementary documents for the definition of information requirements and how to process them in collaborative BIM environments.

Where EIR defines the Exchange information requirements of an appointing party and BEP – the BIM execution Plan – is the plan how to fulfill these requirements by the appointed parties.

This work item will

- examine and explain the demands for Exchange Information Requirements (EIR) and BIM execution Plans (BEP) based on EN/ISO 19650-1 and -2.
- Provide guidance for the implementation of EIR and BEP
- Provide templates for the creation of EIR and BEP

## SIST/TC DPL Oskrba s plinom

### SIST EN 17278:2021

2021-10 (po) (en;fr;de) 34 str. (H)

Vozila na zemeljski plin - Polnilne naprave za vozila na zemeljski plin

*Natural gas vehicles - Vehicle fuelling appliances*

Osnova: EN 17278:2021

ICS: 75.060, 43.060.40

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This work item will

- examine and explain the demands for Exchange Information Requirements (EIR) and BIM execution Plans (BEP) based on EN/ISO 19650-1 and -2.
- Provide guidance for the implementation of EIR and BEP
- Provide templates for the creation of EIR and BEP

### SIST EN ISO 20257-2:2021

2021-10 (po) (en;fr;de) 49 str. (I)

Napeljave in oprema za utekočinjeni zemeljski plin - Načrtovanje plavajočih napeljav za utekočinjeni zemeljski plin - 2. del: Posebne zahteve za plavajoča skladišča z enotami za uplinjanje (FSRU) (ISO 20257-2:2021)

*Installation and equipment for liquefied natural gas - Design of floating LNG installations - Part 2: Specific FSRU issues (ISO 20257-2:2021)*

Osnova: EN ISO 20257-2:2021

ICS: 75.200

The objective of ISO 20257 is to provide functional guidelines and recommend practices for the design of floating liquefied natural gas (LNG) installations in order to have a safe and environmentally acceptable design and operation of floating LNG installations. ISO 20257 gives functional guidelines for the design and operation of all floating LNG installations including those for the liquefaction, storage, vaporisation, transfer and handling of LNG.

## SIST/TC EPR Električni pribor

### SIST EN 50696:2021

2021-10 (po) (en;fr;de) 76 str. (L)

Kontaktni vmesnik za avtomatizirane priključne naprave

*Contact Interface for Automated Connection Device*

Osnova: EN 50696:2021

ICS: 43.040.10

This European Standard covers specifications concerning the contact interface for charging of electrical vehicles/buses which make use of an automated connection device (ACD).

### SIST EN 60320-1:2015/A1:2021

2021-10 (po) (en;fr;de) 6 str. (B)

Aparatne spojke za gospodinjstva in podobne splošne namene - 1. del: Splošne zahteve (IEC 60320-1:2015/A1:2018)

*Appliance couplers for household and similar general purposes - Part 1: General requirements (IEC 60320-1:2015/A1:2018)*

Osnova: EN 60320-1:2015/A1:2021

ICS: 29.120.30

Amandma A1:2021 je dodatek k standardu SIST EN 60320-1:2015.

Ta del standarda IEC 60320 določa splošne zahteve za aparatne spojke za dva pola in dva pola z ozemljitvijo ter povezavo električnih naprav za gospodinjstve in podobne namene z napajalnim omrežjem.

Ta del standarda IEC 60320 se uporablja tudi za vhode/izhode aparatov, ki so vgrajeni v aparate oziroma jih ti vključujejo.

Nazivna napetost ne presega 250 V (pri izmeničnem toku) in nazivni tok ne presega 16 A. Aparatne spojke v skladu s tem delom standarda IEC 60320 so primerne za običajno uporabo pri temperaturah okolja, ki običajno ne presegajo 40 °C, vendar njihovo povprečje v 24-urnem obdobju ne presega 35 °C, pri čemer je spodnja meja temperature okoljskega zraka -5 °C. Aparatne spojke niso primerne za:

- uporabo namesto vtičnih naprav v skladu s standardom IEC 60884-1;
- uporabo namesto naprav za priključitev svetilk (DCL) v skladu s standardom IEC 61995 ali spojke za podporo svetilk (LSC).

OPOMBA: Zahteve za enosmerni tok se ne uporabljajo.

### SIST EN 60320-3:2015/A1:2021

2021-10 (po) (en;fr;de) 19 str. (E)

Aparatne spojke za hišno rabo in podobne splošne namene - 3. del: Standardni merilni lističi (IEC 60320-3:2014/A1:2018)

*Appliance couplers for household and similar general purposes - Part 3: Standard sheets and gauges (IEC 60320-3:2014/A1:2018)*

Osnova: EN 60320-3:2014/A1:2021

ICS: 29.120.30

Amandma A1:2021 je dodatek k standardu SIST EN 60320-3:2015.

Ta del standarda IEC 60320 določa dimenzije aparatnih spojke za dva pola in dva pola z ozemljitvijo

- za priključitev električnih naprav za hišno rabo in podobnih na omrežno napetost,
- za povezovanje električne oskrbe z aparati ali opremo in
- dimenzije merilnikov.

**SIST EN 61995-1:2008/A11:2021****2021-10 (po) (en;fr;de) 7 str. (B)**

Elementi za priključitev svetilk za gospodinjstva in podobne namene - 1. del: Splošne zahteve - Dopolnilo A11

*Devices for the connection of luminaires for household and similar purposes - Part 1: General requirements*

Osnova: EN 61995-1:2008/A11:2021

ICS: 29.140.40, 29.120.20

Amandma A11:2021 je dodatek k standardu SIST EN 61995-1:2008.

Ta del standarda IEC 61995-1 velja za naprave za priključitev svetilk (DCL), namenjene za gospodinjstvo in podobne namene, za električno priključitev vgrajenih svetilk v končna vezja z močjo največ 16 A brez zagotavljanja mehanske podpore za svetilko. DCL-ji so namenjeni uporabi v skladu s svojo stopnjo IP po standardu IEC 60529. Vtičnice imajo kontakt za ozemljitev in naznačeni tok 6 A, vtiči so ocenjeni na 6 A, razen če v ustreznem 2. delu ni določeno drugače. Nazivna napetost je 125 V ali 250 V pri 50/60 Hz. Ta standard se lahko uporablja tudi za druge vrste brez standardiziranega vmesnika. Vtiči DCL in vtičnice DCL, ki so v skladu s tem standardom, so primerni za uporabo pod naslednjimi pogoji: - temperatura okolice, ki običajno ne presega 25 °C, vendar občasno doseže 35 °C; - temperatura, ki ne presega 70 °C na terminalnih vtičnicah DCL, vključno z učinkom toplote, ki jo povzroči svetilka, in prehodom toka.

**SIST EN 62423:2013/A11:2021****2021-10 (po) (en;fr;de) 11 str. (C)**

Odklopniki na preostali tok tipov F in B z vgrajeno nadtokovno zaščito ali brez nje za gospodinjstvo in podobno rabo

*Type F and type B residual current operated circuit-breakers with and without integral overcurrent protection for household and similar uses*

Osnova: EN 62423:2012/A11:2021

ICS: 29.120.50

Amandma A11:2021 je dodatek k standardu SIST EN 62423:2013.

Na področje uporabe standardov IEC 61008-1 in IEC 61009-1 spadajo tudi naslednji dodatki. Ta standard navaja zahteve in preskuse za zaščitne naprave na preostali (residualni) tok (RCD) tipa F in B. Zahteve in preskusi, ki so podani v tem standardu, so dodatek k zahtevam za zaščitne naprave na preostali (residualni) tok tipa A. Ta standard se lahko uporablja samo skupaj s standardoma IEC 61008-1 in IEC 61009-1. Odklopniki RCCB (odklopniki na preostali (residualni) tok) tipa F in odklopniki RCBO (odklopniki na preostali (residualni) tok z vgrajeno nadtokovno zaščito) z naznačeno frekvenco 50 ali 60 Hz so namenjeni za naprave, kjer so frekvenčni razsmerniki napajani med faznim in nevtralnim ali med faznim in ozemljenim srednjim vodnikom in lahko omogočajo zaščito v primeru, da pride do izmeničnih sinusoidnih residualnih tokov na naznačeni frekvenci, enosmernih utripajočih residualnih tokov in sestavljenih residualnih tokov. Odklopniki RCCB tipa B in odklopniki RCBO tipa B omogočajo zaščito v primeru izmeničnih sinusoidnih residualnih tokov do 1 000 Hz, enosmernih utripajočih residualnih tokov in mehkih enosmernih residualnih tokov. Zaščitne naprave na preostali (residualni) tok v skladu s tem standardom niso namenjene uporabi v enosmerni napajanih sistemih. Nadaljnje zahteve in preskusi za izdelke, ki se uporabljajo v primerih, ko residualni tok ni namenjen obravnavi v standardih IEC 61008-1 in IEC 61009-1, so v obravnavi. Za potrebe izjave proizvajalca ali preverjanja skladnosti bi morali biti tipski preskusi izvedeni v zaporedjih, ki so v skladu z dodatki A, B, C ali D k temu standardu. Popolno zaporedje preskusov za tipski preskus odklopnikov RCCB tipa F in odklopnikov RCBO tipa F je podano v preglednicah A.1 in B.1. Popolno zaporedje preskusov za tipski preskus odklopnikov RCCB tipa B in odklopnikov RCBO tipa B je podano v preglednicah C.1 in D.1.

**SIST EN IEC 60320-2-1:2021**  
**2021-10** (po) (en;fr;de)

SIST EN 60320-2-1:2003  
**19 str. (E)**

Spojni elementi za gospodinjske aparate in podobne namene - 2-1. del: Spojke za šivalne stroje (IEC 60320-2-1:2018)

*Appliance couplers for household and similar general purposes - Part 2-1: Sewing machine couplers (IEC 60320-2-1:2018)*

Osnova: EN IEC 60320-2-1:2021

ICS: 61.080, 29.120.30

This clause of IEC 60320-1 is replaced as follows:

This part of IEC 60320 is applicable to special purpose appliance couplers for household sewing machines. These sewing machine couplers are for alternating current only and have a rated voltage not exceeding 250 V and a rated current not exceeding 2,5 A.

The sewing machine couplers can include two or more contacts depending on the control components or circuitry required to operate the sewing machine and can be with or without earthing contact.

**SIST EN IEC 60320-2-3:2021**

SIST EN 60320-2-3:2000  
SIST EN 60320-2-3:2000/A1:2006

**2021-10** (po) (en;fr;de) **21 str. (F)**

Spojni elementi za gospodinjske aparate in podobne namene - 2-3. del: Aparatne spojke s stopnjo zaščite, višjo od IPX0 (IEC 60320-2-3:2018)

*Appliance couplers for household and similar general purposes - Part 2-3: Appliance couplers with a degree of protection higher than IPX0 (IEC 60320-2-3:2018)*

Osnova: EN IEC 60320-2-3:2021

ICS: 29.120.30

This clause of IEC 60320-1 applies with the following addition:

This document applies to appliance couplers with a degree of protection against ingress of water higher than IPX0.

**SIST EN IEC 60320-2-4:2021**

SIST EN 60320-2-4:2007  
SIST EN 60320-2-4:2007/A1:2010

**2021-10** (po) (en;fr;de) **42 str. (I)**

Spojni elementi za gospodinjske aparate in podobne namene - 2-4. del: Aparatne spojke, izdelane v odvisnosti od mase aparata (IEC 60320-2-4:2018)

*Appliance couplers for household and similar general purposes - Part 2-4: Couplers dependent on appliance weight for engagement (IEC 60320-2-4:2018)*

Osnova: EN IEC 60320-2-4:2021

ICS: 29.120.30

This clause of IEC 60320-1 is replaced as follows:

This part of IEC 60320 is applicable to two-pole appliance couplers for alternating current only, with or without earthing contact, with a rated voltage not exceeding 250 V and a rated current not exceeding 16 A, for household and similar general purposes and intended for incorporation or integration within electric appliances or other electric equipment of multi-part construction for 50 Hz or 60 Hz supply which depend on the weight of the appliance to ensure correct engagement.

This document is also applicable to appliance couplers with auxiliary contacts rated for alternating current, direct current or both, with a total rated current not exceeding 16 A. This document is also valid for appliance inlets/appliance outlets integrated or incorporated in appliances.

NOTE 1 Appliance couplers complying with this document are suitable for use in appliances which are used in an ambient temperature not normally exceeding 25 °C but occasionally reaching 35 °C. However the ambient temperature surrounding the appliance coupler can exceed these figures and can be declared by the manufacturer.

It is possible that the maximum working ambient temperature for the appliance inlet and for the connector can be different.

NOTE 2 Appliance couplers dependent on appliance weight for engagement can be subject to spillage of liquid in normal use. They are classified according to whether protection against liquid spillage is provided, when installed in accordance with the manufacturer's installation instructions.



NOTE 3 If appliance inlets according to this document are used with appliances or other equipment which can be subject to spillage of liquid affecting the appliance inlet when the functioning part of the appliance or equipment is seated on its power base, then protection against moisture is provided by the equipment.

NOTE 4 References to standard sheets within IEC 60320-1 do not apply to appliance couplers dependent on appliance weight for engagement.

NOTE 5 Special constructions can be required:

- in locations where special conditions can prevail, for example, in ships, vehicles and the like;
- in hazardous locations, for example, where explosions are likely to occur.

NOTE 6 Additional auxiliary contacts can be used as part of the appliance coupler. An example of an auxiliary contact is a contact used to supply a low power device or used to transmit signals for sensors and to/from a microprocessor.

**SIST EN IEC 60670-1:2021**

SIST EN 60670-1:2006

SIST EN 60670-1:2006/A1:2013

SIST EN 60670-1:2006/IS1:2009

**2021-10 (po) (en;fr;de) 67 str. (K)**

Škatle in ohišja za električno opremo za gospodinjstvo in podobne nepremične električne inštalacije - 1. del: Splošne zahteve

*Boxes and enclosures for electrical accessories for household and similar fixed electrical installations - Part 1: General requirements*

Osnova: EN IEC 60670-1:2021

ICS: 29.120.99

This part of IEC 60670 applies to boxes, enclosures and parts of enclosures (hereafter called “boxes” and “enclosures”) for electrical accessories with a rated voltage not exceeding 1 000 V a.c. and 1 500 V d.c. intended for household or similar fixed electrical installations, either indoors or outdoors. Boxes and enclosures complying with this standard are suitable for use at ambient temperatures not normally exceeding +40 °C, but their average over a period of 24 h does not exceed +35 °C, with a lower limit of the ambient air temperature of –5 °C.

During the installation the temperature may be outside the above temperature range according to the classification of the boxes and the enclosures.

This International Standard is intended to apply to boxes and enclosures for electrical accessories within the scope of IEC technical committee 23.

This standard may be used as a reference document for other IEC technical committees and subcommittees.

A box or an enclosure which is an integral part of an electrical accessory and provides protection for that accessory against external influences (for example mechanical impact, ingress of solid objects or water, etc.) is covered by the relevant standard for such an accessory.

This standard does not apply to

- ceiling roses;
- luminaire supporting couplers;
- boxes, enclosures and parts of enclosures specifically designed to be used for cable trunking and ducting systems complying with IEC 61084 and which are not intended to be installed outside of these systems.

**SIST EN IEC 60670-1:2021/A11:2021**

**2021-10 (po) (en;fr;de) 11 str. (C)**

Škatle in ohišja za električno opremo za gospodinjstvo in podobne nepremične električne inštalacije - 1. del: Splošne zahteve

*Boxes and enclosures for electrical accessories for household and similar fixed electrical installations - Part 1: General requirements*

Osnova: EN IEC 60670-1:2021/A11:2021

ICS: 29.120.99

Amandma A11:2021 je dodatek k standardu SIST EN IEC 60670-1:2021.

This part of IEC 60670 applies to boxes, enclosures and parts of enclosures (hereafter called “boxes” and “enclosures”) for electrical accessories with a rated voltage not exceeding 1 000 V a.c. and 1 500 V d.c. intended for household or similar fixed electrical installations, either indoors or outdoors.

Boxes and enclosures complying with this standard are suitable for use at ambient temperatures not normally exceeding +40 °C, but their average over a period of 24 h does not exceed +35 °C, with a lower limit of the ambient air temperature of –5 °C.

During the installation the temperature may be outside the above temperature range according to the classification of the boxes and the enclosures.

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- luminaire supporting couplers;
- boxes, enclosures and parts of enclosures specifically designed to be used for cable trunking and ducting systems complying with IEC 61084 and which are not intended to be installed outside of these systems.

**SIST EN IEC 60799:2021**

SIST EN 60799:2000

**2021-10**

**(po) (en;fr;de)**

**14 str. (D)**

Električni pribor - Priključni kabli in povezava priključnih kablov (IEC 60799:2018)

*Electrical accessories - Cord sets and interconnection cord sets (IEC 60799:2018)*

Osnova: EN IEC 60799:2021

ICS: 29.120.30, 29.060.20

This document specifies requirements for cord sets and interconnection cord sets for household and similar general purpose equipment.

It does not apply to cord sets for industrial purposes (with plugs and connectors according to IEC 60309) nor to cord extension sets.

NOTE Although electrical supply flexes provided with rewirable plugs and connectors are not cord sets in the sense of this document, but considered as being similar to cord sets and serving the same purpose, the requirements as specified in this document are also applicable to such assemblies as well as far as is reasonable.

**SIST EN IEC 62020-1:2021**

SIST EN 62020:2000

SIST EN 62020:2000/A1:2006

**2021-10**

**(po) (en;fr;de)**

**119 str. (N)**

Električni pribor - Nadzorovanje preostalega (difernečnega) toka (RCM) - 1. Del: RCM za gospodinjske in podobne namene (IEC 62020-1:2020 + COR1:2020)

*Electrical accessories - Residual current monitors (RCMs) - Part 1: RCMs for household and similar uses (IEC 62020-1:2020 + COR1:2020)*

Osnova: EN IEC 62020-1:2021

ICS: 29.120.50

This document applies to residual current monitors for household and similar purposes, having rated operational voltages and a rated voltage of the monitored circuit not exceeding 440 V AC and rated currents not exceeding 125 A.

NOTE 1 The standard for residual current monitors having rated operational voltages and a rated voltage of the monitored circuit exceeding 440 V AC is in preparation, as IEC 62020-2.

RCMs are intended to monitor the residual current of the installation and to give a warning if the residual current between a live part and an exposed conductive part or earth exceeds a predetermined level.

RCMs covered by this document are not intended to be used as protective devices.

RCMs detect residual currents circulating in an AC circuit (e.g. residual alternating current, residual pulsating direct current, residual smooth direct current), whether suddenly applied or slowly rising. NOTE 2 RCMs for DC systems are under consideration.

This document applies to monitors performing simultaneously the functions of detection of the residual current, of comparison of the value of this current with the residual operating current of the device and providing the specified warning signal(s) when the residual current exceeds this value.

RCMs supplied by internal batteries are not covered by this document.

The requirements of this document apply for standard conditions (see 7.1). Additional requirements can be necessary for RCMs used in locations having severe environmental conditions.

RCMs are intended for use in an environment with pollution degree 2 and overvoltage category III. For an environment with a higher pollution degree, enclosures giving the appropriate degree of protection are used.

RCMs in compliance with this document are suitable for use in TN, TT, and IT systems. This document does not cover Insulation Monitoring Devices (IMDs), which are covered by the scope of IEC 61557-8.

NOTE 3 An RCM is distinguished from an IMD in that it is passive in its monitoring function and only responds to an unbalanced fault current in the installation being monitored. An IMD is active in its monitoring and measuring functions in that it can measure the balanced and unbalanced insulation resistance or impedance in the installation (see IEC 61557-8).

### **SIST HD 62640:2015/A12:2021**

**2021-10** (po) (en;fr;de) **3 str. (A)**

Naprave na preostali (diferenčni) tok z nadtokovno zaščito ali brez nje za vtičnice za gospodinjsko in podobno rabo - Dopolnilo A12

*Residual current devices with or without overcurrent protection for socket-outlets for household and similar uses*

Osnova: HD 62640:2015/A12:2021

ICS: 29.120.50

Amandma A12:2021 je dodatek k standardu SIST HD 62640:2015.

Standard IEC 62640:2011 se uporablja za naprave na preostali (diferenčni) tok (RCD), ki so vgrajene v vtičnice z ozemljitvenim priključkom za gospodinjsko in podobno rabo (SRCD: naprave na preostali (diferenčni) tok za vtičnice) ali so namenjene izključno za uporabo z njimi. V skladu s tem standardom so naprave na preostali (diferenčni) tok za vtičnice namenjene za uporabo v enofaznih sistemih, kot je napajanje med faznim in nevtralnim, med faznim in faznim ali med faznim in ozemljenim srednjim vodnikom. Naprave na preostali (diferenčni) tok za vtičnice so namenjene za zagotavljanje dodatne zaščite le od teh naprav naprej. Naprave na preostali (diferenčni) tok za vtičnice so namenjene za uporabo v tokokrogih, kjer je okvarna zaščita (zaščita pred neposrednim dotikom) že zagotovljena pred temi napravami.

## **SIST/TC ERS Električni rotacijski stroji**

### **SIST EN IEC 60773:2021**

**2021-10** (po) (en;fr;de) **80 str. (L)**

Električni rotacijski stroji - Preskusne metode in aparati za merjenje obratovalnih lastnosti ščetk (IEC 60773:2021)

*Rotating electrical machines - Test methods and apparatus for the measurement of the operational characteristics of brushes (IEC 60773:2021)*

Osnova: EN IEC 60773:2021

ICS: 29.160.01

This document applies to test methods for the measurement of the operational characteristics of brushes designed to operate on commutating and slip ring machines under specified test conditions.

By extension some tests may be relevant for other kinds of sliding electrical contacts for electrical appliances.

## SIST/TC GIG Geografske informacije

### SIST EN ISO 19111:2020/A1:2021

2021-10 (po) (en;fr;de) 9 str. (C)

Geografske informacije - Lociranje s koordinatami - Dopolnilo 1 (ISO 19111:2019/Amd 1:2021)

*Geographic information - Referencing by coordinates - Amendment 1 (ISO 19111:2019/Amd 1:2021)*

Osnova: EN ISO 19111:2020/A1:2021

ICS: 07.040, 35.240.70

Amandma A1:2021 je dodatek k standardu SIST EN ISO 19111:2020.

This document defines the conceptual schema for the description of referencing by coordinates. It describes the minimum data required to define coordinate reference systems. This document supports the definition of:

— spatial coordinate reference systems where coordinate values do not change with time. The system may:

— be geodetic and apply on a national or regional basis, or

— apply locally such as for a building or construction site, or

— apply locally to an image or image sensor;

— be referenced to a moving platform such as a car, a ship, an aircraft or a spacecraft. Such a coordinate reference system can be related to a second coordinate reference system which is referenced to the Earth through a transformation that includes a time element;

— spatial coordinate reference systems in which coordinate values of points on or near the surface of the earth change with time due to tectonic plate motion or other crustal deformation. Such dynamic systems include time evolution, however they remain spatial in nature;

— parametric coordinate reference systems which use a non-spatial parameter that varies monotonically with height or depth;

— temporal coordinate reference systems which use date/time, temporal count or temporal measure quantities that vary monotonically with time;

— mixed spatial, parametric or temporal coordinate reference systems.

The definition of a coordinate reference system does not change with time, although in some cases some of the defining parameters can include a rate of change of the parameter. The coordinate values within a dynamic and in a temporal coordinate reference system can change with time.

This document also describes the conceptual schema for defining the information required to describe operations that change coordinate values.

In addition to the minimum data required for the definition of the coordinate reference system or coordinate operation, the conceptual schema allows additional descriptive information - coordinate reference system metadata - to be provided.

This document is applicable to producers and users of geographic information. Although it is applicable to digital geographic data, the principles described in this document can be extended to many other forms of spatial data such as maps, charts and text documents.

### SIST EN ISO 19116:2020/A1:2021

2021-10 (po) (en;fr;de) 8 str. (B)

Geografske informacije - Lokacijske storitve - Dopolnilo 1 (ISO 19116:2019/Amd 1:2021)

*Geographic information - Positioning services - Amendment 1 (ISO 19116:2019/Amd 1:2021)*

Osnova: EN ISO 19116:2019/A1:2021

ICS: 35.240.70, 07.040

Amandma A1:2021 je dodatek k standardu SIST EN ISO 19116:2020.

Ta standard določa strukturo podatkov in vsebino vmesnika za komunikacijo med napravami, ki zagotavljajo položaj, in napravami, ki uporabljajo položaj. Omogoča, da naprave, ki uporabljajo položaj, pridobijo in nedvoumno razlagajo informacije o položaju ter na podlagi stopnje zanesljivosti določijo, ali pridobljena informacija o položaju ustreza zahtevam predvidene uporabe. Standardiziran vmesnik za določanje položaja omogoča integracijo zanesljivih informacij o položaju, pridobljenih iz nespecifičnih tehnologij za pozicioniranje in je uporaben za različne lokacijsko usmerjene vrste uporabe informacij, kot so opazovanje, navigacija, inteligentni transportni sistemi (ITS) in lokacijske storitve (LBS).

## SIST/TC IBLP Barve, laki in premazi

### SIST ISO 7724-3:2021

2021-10 (po) (en;fr;de) 6 str. (B)

Barve in laki - Kolorimetrija - 3. del: Izračun barvne razlike

*Paints and varnishes - Colorimetry - Part 3: Calculation of colour differences*

Osnova: ISO 7724-3:1984

ICS: 17.180.20, 87.040

Describes a method for the quantitative colorimetric evaluation of small differences between paint films. The CIE 1976 colour difference formula recommended in 1976 by the CIE has proved to be of practical value and is specified for this application. The principle is based on the calculation of differences in colour, lightness, chroma and hue between the paint films of a test specimen and a reference specimen in the CIE 1976 colour space. If the two methods specified are carried out, comparable results are obtained for high gloss paint films.

## SIST/TC IDT Informatika, dokumentacija in splošna terminologija

### SIST ISO 24617-11:2021

2021-10 (po) (en;fr) 26 str. (F)

Upravljanje jezikovnih virov - Ogradje za semantično označevanje (SemAF) - 11. del: Merljive kvantitativne informacije (MQI)

*Language resource management -- Semantic annotation framework (SemAF) - Part 11: Measurable Quantitative information (MQI)*

Osnova: ISO 24617-11:2021

ICS: 01.140.20, 35.240.30, 01.020

This document covers the measurable or magnitudinal aspect of quantity so that it can focus on the technical or practical use of measurements in IR (information retrieval), QA (question answering), TS (text summarization), and other NLP (natural language processing) applications. It is applicable to the domains of technology that carry more applicational relevance than some theoretical issues found in the ordinary use of language.

NOTE 1 ISO 24617-12 deals with more general and theoretical issues of quantification and quantitative information.

This document also treats temporal durations that are discussed in ISO 24617-1, and spatial measures such as distances that are treated in ISO 24617-7, while making them interoperable with other measure types. It also accommodates the treatment of measures or amounts that are introduced in ISO 24617-6:2016, 8.3.

### SIST ISO 690:2021

SIST ISO 690:2010

2021-10 (po) (en) 169 str. (P)

Informatika in dokumentacija - Smernice za bibliografske navedbe in citiranje virov informacij

*Information and documentation -- Guidelines for bibliographic references and citations to information resources*

Osnova: ISO 690:2021

ICS: 01.140.20

This document describes a set of principles, guidelines, and requirements for the preparation of bibliographic references and citations in works that are not themselves primarily bibliographical. It is applicable to bibliographic references and citations for all kinds of information resources, including but not limited to monographs, serials, contributions within monographs and serials, patents, cartographic materials, artworks, performances and diverse electronic resources, such as research datasets, databases, programs and applications, Web archives and social media, music, recorded sound, prints, photographs, graphic and audio-visual materials, archival sources and moving images.

This document provides a system for citing information resources that renders deterministic output, such that a citation generated by this system can be uniquely mapped back to the originally defined set of source elements. This system is intended to be applicable across multiple languages.

Citations generated by this system are machine-parseable. The citation system described in this document can be used as a configurable framework for building citation styles.

This document does not specify a data model for machine-readable citations, although such specification may be provided in a separate document or added to a later edition of ISO 690.

Guidelines for legal citations, such as references to cases, statutes or treatises, are not addressed in this document, since such guidelines are usually country-specific<sup>1</sup>. Recommendations with regards to what kind of information resources may or may not be cited, or describing the risks involved with, for example, citing social media, are not within the scope of this document<sup>2</sup>.

1

For example, the ALWD Guide to Legal Citation, and Bluebook, are commonly used in the USA depending on jurisdiction acceptance.

2 Academic institutions or scientific publishers may not accept references for some information resources such as Wikipedia articles for research papers and other scientific documents.

## SIST/TC IEHT Elektrotehnika - Hidravlične turbine

### SIST EN IEC 60545:2021

2021-10 (po) (en) 50 str. (I)

Smernica za zagon in delovanje vodnih turbin, črpalnih turbin in akumulacijskih črpalk (IEC 60545:2021)

*Guideline for commissioning and operation of hydraulic turbines, pump-turbines and storage pumps (IEC 60545:2021)*

Osnova: EN IEC 60545:2021

ICS: 23.100.10, 27.040, 23.080

The purpose of this document is to establish, in a general way, suitable procedures for commissioning and operation of hydraulic machines and associated equipment, and to indicate how such machines and equipment should be commissioned and operated.

Commissioning and operation of the associated equipment are not described in detail in this document but is considered in the commissioning and operation procedure as a separate step.

Machines of up to about 15 MW and reference diameters of about 3 m are generally covered by IEC 62006.

It is understood that a guideline of this type will be binding only if the contracting parties have agreed upon it.

The guidelines exclude matters of purely commercial interest, except those inextricably connected with the conduct of commissioning and operation.

The guidelines are not concerned with waterways, gates, drainage pumps, cooling-water equipment, generators, motor-generators, electrical equipment (e.g. circuit breakers, transformers) etc., except where they cannot be separated from the hydraulic machinery and its equipment.

Wherever the guidelines specify that documents, drawings or information are supplied by a supplier (or by suppliers), each individual supplier should furnish the appropriate information for its own supply only.

## SIST/TC IFEK Železne kovine

### SIST EN 10253-2:2021

2021-10 (po) (en;fr;de) 145 str. (P)

SIST EN 10253-2:2008

Cevni fitingi za soležne zware - 2. del: Nelegirana in feritna legirana jekla s posebnimi zahtevami kontrole

*Butt-welding pipe fittings - Part 2: Non alloy and ferritic alloy steels with specific inspection requirements*

Osnova: EN 10253-2:2021

ICS: 77.140.20, 77.140.45, 23.040.40

This draft European Standard specifies the technical delivery requirements for seamless and welded butt welding fittings (elbows, concentric and eccentric reducers, equal and reducing tees, caps) made of carbon and alloy steel in two test categories which are intended for pressure purposes at room

temperature, at low temperature or at elevated temperatures, and for the transmission and distribution of fluids and gases.

It specifies:

- a) type of fittings;
- 1) type A: Butt-welding fittings with reduced pressure factor;
- 2) type B: Butt-welding fittings for use at full service pressure;
- b) steel grades and their chemical compositions;
- c) mechanical properties;
- d) dimensions and tolerances;
- e) requirements for inspection and testing;
- f) inspection documents;
- g) marking;
- h) protection and packaging.

**NOTE** In the case of a harmonised supporting standard for materials, presumption of conformity to the ESRs is limited to technical data of materials in the standard and does not presume adequacy of the material to a specific item of equipment. Consequently it is essential that the technical data stated in the material standard be assessed against the design requirements of this specific item of equipment to verify that the ESRs of the PED are satisfied.

**SIST EN ISO 15349-2:2021**                      **SIST EN ISO 15349-2:2003**  
**2021-10**                      **(po) (en;fr;de)**                      **20 str. (E)**

Nelegirana jekla - Določevanje ogljika v majhnih količinah - 2. del: Metoda z infrardečo absorpcijo po zgorevanju v indukcijski peči (s predgrevanjem) (ISO 15349-2:2021)

*Unalloyed steel - Determination of low carbon content - Part 2: Infrared absorption method after combustion in an induction furnace (with preheating) (ISO 15349-2:2021)*

Osnova: EN ISO 15349-2:2021

ICS: 77.140.45, 77.040.30

This document specifies an infrared absorption method after combustion in an induction furnace for the determination of the low carbon content in unalloyed steel.

The method is applicable to carbon contents between 0,000 3 % (mass fraction) and 0,009 % (mass fraction).

## **SIST/TC IIZS Izolacijski materiali in sistemi**

**SIST EN IEC 60455-3-8:2021**                      **SIST EN 60455-3-8:2013**  
**2021-10**                      **(po) (en)**                      **22 str. (F)**

Reaktivne zmesi na osnovi smole, ki se uporabljajo za električno izolacijo - 3-8. del: Specifikacije za posamezne materiale - Smolnate zmesi za kabelski pribor (IEC 60455-3-8:2021)

*Resin based reactive compounds used for electrical insulation - Part 3-8: Specifications for individual materials - Resins for cable accessories (IEC 60455-3-8:2021)*

Osnova: EN IEC 60455-3-8:2021

ICS: 29.035.99

This part of IEC 60455 gives the requirements for resins for power cable accessories that conform to this specification and meet established levels of performance. However, the selection of a material by a user for a specific application will be based on the actual requirements necessary for adequate performance in that application and not on this specification alone.

These materials are designed to be used in low and medium voltage cable accessories and as such, electrical performance is proven as part of the assembly. Examples of this are described in EN 50393 and IEC 60502-4.

## SIST/TC IMIN Merilni instrumenti

**SIST ISO 3455:2021**

**2021-10 (po) (en)**

SIST ISO 3455:2013

**17 str. (E)**

Hidrometrija - Kalibracija merilnikov tokov v ravnih odprtih cisternah

*Hydrometry - Calibration of current-meters in straight open tanks*

Osnova: ISO 3455:2021

ICS: 17.120.20

This document specifies a calibration method for mechanical type, electromagnetic type and acoustic type hydrometric current-meters used for point velocity measurement of flowing water. The method requires towing the instrument through still water in a straight open tank. It includes measuring apparatus, the calibration procedure, the method of presenting the results and the uncertainties associated with the method.

## SIST/TC INEK Neželezne kovine

**SIST EN 1706:2020+A1:2021**

**2021-10 (po) (en;fr;de)**

SIST EN 1706:2020

SIST EN 1706:2020/oprA1:2021

**35 str. (H)**

Aluminij in aluminijeve zlitine - Ulitki - Kemična sestava in mehanske lastnosti

*Aluminium and aluminium alloys - Castings - Chemical composition and mechanical properties*

Osnova: EN 1706:2020+A1:2021

ICS: 77.040.30, 77.150.10

This document specifies a calibration method for mechanical type, electromagnetic type and acoustic type hydrometric current-meters used for point velocity measurement of flowing water. The method requires towing the instrument through still water in a straight open tank. It includes measuring apparatus, the calibration procedure, the method of presenting the results and the uncertainties associated with the method.

## SIST/TC INIR Neionizirna sevanja

**SIST EN 50554:2021**

**2021-10 (po) (en)**

SIST EN 50554:2011

**18 str. (E)**

Osnovni standard za terensko ocenjevanje mesta oddajanja v zvezi z izpostavljenostjo ljudi elektromagnetnemu sevanju

*Basic standard for the in-situ assessment of a broadcast site related to general public exposure to radio frequency electromagnetic fields*

Osnova: EN 50554:2021

ICS: 17.240

This document specifies the method for assessing overall exposure from all fixed radio frequency sources at a broadcast site. This assessment can be applied at any time but is carried out when the exposure situation changes in or around the aforementioned site.

This document plays an essential role in the coordination of different stakeholders, with respect to ensuring EMF exposure compliance in and around a broadcast site especially for equipment installed within the site.

**SIST-TP CLC/TR 50713:2021**

**2021-10 (po) (en)**

**24 str. (F)**

Razumno predvidljivi pogoji uporabe pri sklicevanju na oceno izpostavljenosti elektromagnetnim poljem (EMF)

*Reasonably Foreseeable Use Conditions when referring to EMF Exposure Assessment*

Osnova: CLC/TR 50713:2021

ICS: 13.280





## SIST/TC IPMA Polimerni materiali in izdelki

**SIST EN ISO 1043-4:2021**

SIST EN ISO 1043-4:2000  
SIST EN ISO 1043-4:2000/A1:2016

**2021-10 (po) (en;fr;de) 12 str. (C)**

Polimerni materiali - Simboli in kratice - 4. del: Zaviralci gorenja (ISO 1043-4:2021)  
*Plastics - Symbols and abbreviated terms - Part 4: Flame retardants (ISO 1043-4:2021)*

Osnova: EN ISO 1043-4:2021

ICS: 01.075, 83.080.01

This document provides uniform symbols for flame retardants added to plastics materials.

**SIST EN ISO 4892-2:2013/A1:2021**

**2021-10 (po) (en;fr;de) 10 str. (C)**

Polimerni materiali - Metode izpostavitve laboratorijskim virom svetlobe - 2. del: Ksenonske svetilke -  
Dopolnilo A1: Razvrstitev filtrov za dnevno svetlobo (ISO 4892-2:2013/Amd 1:2021)

*Plastics - Methods of exposure to laboratory light sources - Part 2: Xenon-arc lamps - Amendment 1:  
Classification of daylight filters (ISO 4892-2:2013/Amd 1:2021)*

Osnova: EN ISO 4892-2:2013/A1:2021

ICS: 83.080.01

Amandma A1:2021 je dodatek k standardu SIST EN ISO 4892-2:2013.

Ta del standarda ISO 4892 navaja metode izpostavitve primerkov ksenonski svetlobi v vlažnem okolju, kar poustvari vremenske vplive (temperaturo, vlažnost in/ali močenje), do katerih pride, ko so materiali v okolju, kjer se uporabljajo, izpostavljeni neposredni dnevni svetlobi ali dnevni svetlobi, ki se filtrira skozi okensko steklo. Priprava primerkov in vrednotenje rezultatov sta obravnavana v drugih mednarodnih standardih za določene materiale. Splošne smernice so podane v standardu ISO 4892-1.

## SIST/TC ISCB Sekundarne celice in baterije

**SIST EN 50604-1:2016/A1:2021**

**2021-10 (po) (en) 24 str. (F)**

Sekundarne litijeve baterije za lahka električna vozila - 1. del: Splošne varnostne zahteve in  
preskusne metode - Dopolnilo A1

*Secondary lithium batteries for light EV (electric vehicle) applications - Part 1: General safety  
requirements and test methods*

Osnova: EN 50604-1:2016/A1:2021

ICS: 43.120, 29.220.30

Amandma A1:2021 je dodatek k standardu SIST EN 50604-1:2016.

Ta standard določa preskusne metode in zahteve za sekundarne litijeve baterije ter vmesnik z ustreznim sistemom polnjenja za varno uporabo v kolesih s pomožnim električnim pogonom in pedali (EPAC).

Ta standard se ne uporablja za zmogljivost in funkcijske značilnosti baterij.

Ta standard se sklicuje na priporočila Združenih narodov o prevozu nevarnega blaga – Priročnik za preskuse in merila: razdelek 38.3, ki se izvajajo neodvisno od tega preskusnega programa. Poročila o preskusih, ki jih izda ILAC, APLAC ali podobna akreditirana organizacija, so sprejemljiva za baterije, ki so skladne z vsemi vidiki razdelka 38.3 v Priročniku za preskuse in merila priporočil Združenih narodov o prevozu nevarnega blaga.

Električni polnilniki so v tem standardu obravnavani le v okviru določitve zahtev za vmesnik med baterijskim paketom in polnilnikom, ki vplivajo na varnost litij-ionskega baterijskega paketa med polnjenjem.

Ta standard ne zajema baterij za električna vozila, ki so obravnavane v standardih ISO 6469 in ISO 18246.

Za člene: ustreznimi mednarodni standard IEC 62133, IEC 61960; IEC 62660.

Ta standard se ne uporablja za:

- litijeve člene;
- baterije, ki niso litij-ionske;
- primarne baterije (vključno z litijevimi);
- litijeve baterijske pakete, katerih skupna teža je večja od 12 kg (UNT 38.3);
- baterije, ki so obravnavane v standardih ISO 12405 in ISO 18243.

### **SIST EN IEC 63056:2021/AC:2021**

**2021-10 (po) (en) 3 str. (AC)**

Sekundarni členi in baterije z alkalnimi ali drugimi nekislinskimi elektroliti - Varnostne zahteve za sekundarne litijeve člene in baterije za industrijsko uporabo v električnih napravah za shranjevanje energije

*Secondary cells and batteries containing alkaline or other non-acid electrolytes - Safety requirements for secondary lithium cells and batteries for use in electrical energy storage systems*

Osnova: EN IEC 63056:2020/AC:2021-07

ICS: 29.220.30

Popravek k standardu SIST EN IEC 63056:2021.

This document specifies requirements and tests for the product safety of secondary lithium cells and batteries used in electrical energy storage systems (Figure 2) with a maximum DC voltage of 1 500 V (nominal).

Basic safety requirements for the secondary lithium cells and batteries used in industrial applications are included in IEC 62619. This document provides additional or specific requirements for electrical energy storage systems.

Since this document covers batteries for various electrical energy storage systems, it includes those requirements which are common and minimum to the electrical energy storage systems.

Examples of appliances that are within the scope of this document are:

- telecommunications,
- central emergency lighting and alarm systems,
- stationary engine starting,
- photovoltaic systems,
- home (residential) energy storage systems (HESS), and
- large energy storage: on-grid/off-grid.

This document applies to cells and batteries for uninterruptible power supplies (UPS).

This document does not apply to portable systems 500 Wh or below, which are covered by IEC 61960-3.

## **SIST/TC ISEL Strojni elementi**

**SIST ISO 12128:2021**

SIST ISO 12128:2002

**2021-10 (po) (en) 12 str. (C)**

Drnsni ležaji - Luknje za mazanje, žlebovi in prekati - Mere, oblike, poimenovanje in uporaba na ležajnih pušah

*Plain bearings - Lubrication holes, grooves and pockets - Dimensions, types, designation and their application to bearing bushes*

Osnova: ISO 12128:2020

ICS: 21.100.10

This document specifies dimensions for lubrication holes, grooves and pockets for bearing bushes. These dimensions can be entered, for example on drawings, using the designation examples. Their use depends in particular on the specific operating conditions.

In addition, it enables the user to assign the different types of lubricant feed and distribution to solid and steel-backed plain bearing bushes made of copper alloys, aluminium alloys, thermosetting plastics, thermoplastics or artificial carbon.

NOTE Different types of lubricant feed and distribution for plain bearing bushes made of sintered metals have not been specified due to the fact that these bushes are soaked with lubricant. Plain bearing bushes made of artificial carbon are not lubricated with oil or grease.

**SIST ISO 3031:2021**

SIST ISO 3031:2002

**2021-10 (po) (en;fr)****14 str. (D)**

Kotalni ležaji - Aksialne iglične kotalke in kletka, pritisni kolut - Mejne mere, geometrične specifikacije izdelka (GPS) in vrednosti tolerance

*Rolling bearings - Thrust needle roller and cage assemblies, thrust washers - Boundary dimensions, geometrical product specifications (GPS) and tolerance values*

Osnova: ISO 3031:2021

ICS: 21.100.20

This document specifies the boundary dimensions and tolerances for thrust needle roller and cage assemblies. Furthermore, it recommends dimensions and tolerances for thrust washers, i.e. raceway members, which can be used either as shaft or housing washers.

Annex A gives general characteristics for application of thrust needle roller and cage assemblies and thrust washers.

Gauging method for thrust needle roller and cage assemblies and thrust washers is given in Annex B.

**SIST ISO 3547-5:2021**

SIST ISO 3547-5:2008

**2021-10 (po) (en)****20 str. (E)**

Drсни ležaji - Zvite puše - 5. del: Merjenje zunanjšega premera

*Plain bearings - Wrapped bushes - Part 5: Checking the outside diameter*

Osnova: ISO 3547-5:2020

ICS: 21.100.10

This document specifies, following ISO 12301, the checking of the outside diameter of wrapped bushes (ISO 3547-2:2017, methods A, B and D) and describes the necessary checking methods and measuring equipment.

NOTE The dimensions and tolerances of wrapped bushes are given in ISO 3547-1. Checking the wall thickness is the subject of ISO 3547-7.

**SIST ISO 3547-7:2021**

SIST ISO 3547-7:2008

**2021-10 (po) (en)****10 str. (C)**

Drсни ležaji - Zvite puše - 7. del: Merjenje debeline stene tankostenskih puš

*Plain bearings - Wrapped bushes - Part 7: Measurement of wall thickness of thin-walled bushes*

Osnova: ISO 3547-7:2020

ICS: 21.100.10

This document describes, following ISO 12301, the checking methods and measuring equipment used for measuring the total wall thickness of thin-walled bushes in the finished state.

NOTE All dimensions in this document are given in millimetres.

**SIST ISO 3548-2:2021**

SIST ISO 3548-2:2010

**2021-10 (po) (en)****14 str. (D)**

Drсни ležaji - Tankosteni polovični ležaji s prirobnico ali brez nje - 2. del: Merjenje debelin stene in prirobnice

*Plain bearings - Thin-walled half bearings with or without flange - Part 2: Measurement of wall thickness and flange thickness*

Osnova: ISO 3548-2:2020

ICS: 21.100.10

This document specifies in accordance with ISO 12301 the checking of the wall-thickness of thin-walled half bearings with or without flange and describes the necessary checking methods and measuring equipment.

It applies to a maximum bearing diameter of 150 mm. It can be applied to a bigger diameter, provided that there is an agreement between the supplier and the user.

**SIST ISO 7902-1:2021**

SIST ISO 7902-1:2015

**2021-10 (po) (en)**

**36 str. (H)**

Hidrodinamični radialni drsni ležaji za neprekinjeno obratovanje - Valjasti ležaji - 1. del: Postopek dimenzioniranja

*Hydrodynamic plain journal bearings under steady-state conditions - Circular cylindrical bearings - Part 1: Calculation procedure*

Osnova: ISO 7902-1:2020

ICS: 21.100.10

This document specifies a calculation procedure for oil-lubricated hydrodynamic plain bearings, with complete separation of the shaft and bearing sliding surfaces by a film of lubricant, used for designing plain bearings that are reliable in operation.

It deals with circular cylindrical bearings having angular spans,  $\Omega$ , of 360°, 180°, 150°, 120°, and 90°, the arc segment being loaded centrally. Their clearance geometry is constant except for negligible deformations resulting from lubricant film pressure and temperature.

The calculation procedure serves to provide dimensions and optimize plain bearings in turbines, generators, electric motors, gear units, rolling mills, pumps, and other machines. It is limited to steady-state operation, i.e. under continuously driven operating conditions, with the magnitude and direction of loading as well as the angular speeds of all rotating parts constant. It can also be applied if a full plain bearing is subjected to a constant force rotating at any speed. Dynamic loadings (i.e. those whose magnitude and direction vary with time), such as those that can result from vibration effects and instabilities of rapid-running rotors, are not taken into account.

NOTE Equivalent calculation procedures exist that enable operating conditions to be estimated and checked against acceptable conditions. The use of them is equally admissible.

## **SIST/TC ISTM Statistične metode**

**SIST ISO 22514-3:2021**

SIST ISO 22514-3:2010

**2021-10 (po) (en)**

**24 str. (F)**

Statistične metode za obvladovanje procesov - Sposobnost in delovanje - 3. del: Študije strojnega delovanja za izmerjene podatke na diskretnih delih

*Statistical methods in process management - Capability and performance - Part 3: Machine performance studies for measured data on discrete parts*

Osnova: ISO 22514-3:2020

ICS: 03.120.30

This document describes the steps for conducting short-term performance studies that are typically performed on machines (including devices, appliances, apparatuses) where parts produced consecutively under repeatability conditions are considered. The number of observations to be analysed vary according to the patterns the data produce, or if the runs (the rate at which items are produced) on the machine are low in quantity. The methods are not considered suitable where the sample size produced is less than 30 observations. Methods for handling the data and carrying out the calculations are described. In addition, machine performance indices and the actions required at the conclusion of a machine performance study are described.

This document is not applicable when tool wear patterns are expected to be present during the duration of the study, nor if autocorrelation between observations is present. The situation where a machine has captured the data, sometimes thousands of data points collected in a minute, is not considered suitable for the application of this document.

**SIST ISO 2859-4:2021**

SIST ISO 2859-4:2010

**2021-10 (po) (en;fr)**

**23 str. (F)**

Postopki vzorčenja za kontrolo po opisnih spremenljivkah - 4. del: Postopki za ugotavljanje deklariranih ravni kakovosti

*Sampling procedures for inspection by attributes - Part 4: Procedures for assessment of declared quality levels*

Osnova: ISO 2859-4:2020

ICS: 03.120.30

This document establishes single sampling plans for conformance testing, i.e., for assessing whether the quality level of a relevant audit population (lot, process, inventory, file etc) conforms to a declared value. Sampling plans are provided corresponding to four levels of discriminatory ability. The limiting quality ratio (LQR) (see Clause 4) of each sampling plan is given for reference. For levels I-III, the sampling plans have been devised so as to obtain a risk no more than 5 % of contradicting a correct declared quality level. The risk of failing to contradict an incorrectly declared quality level which is related to the LQR is no more than 10 %. The sample sizes for level 0 are designed in a way that the LQR factors of the sampling plans are compatible with the LQR factors for level I.

In contrast to the procedures in the other parts of the ISO 2859 series, the procedures in this document are not applicable to acceptance assessment of lots. Generally, this document mainly focuses on controlling type I error, which differs from the balancing of the risks in the procedures for acceptance sampling.

This document can be used for various forms of quality inspection in situations where objective evidence of conformity to some declared quality level is to be provided by means of inspection of a sample. The procedures are applicable to entities such as lots, process output, etc. that allow random samples of individual items to be taken from the entity.

The sampling plans provided in this document are applicable, but not limited, to the inspection of a variety of targets such as:

- end items;
- components and raw materials;
- operations;
- materials in process;
- supplies in storage;
- maintenance operations;
- data or records;
- administrative procedures;
- accounting procedures or accounting entries;
- internal control procedures.

This document considers two types of quality models for discrete items and populations, as follows.

i) The conforming-nonconforming model, where each item is classified as conforming or nonconforming, and where the quality indicator of a population of items is the proportion  $p$  of nonconforming items, or, equivalently, the percentage  $100 p$  of nonconforming items.

ii) The nonconformities model, where the number of nonconformities is counted on each item, and where the quality indicator of a population of items is the average number  $\lambda$  of nonconformities found on items in the population, or, equivalently, the percentage  $100 \lambda$  of nonconformities on items in the population.

## SIST/TC ISTP Stavno pohoštvo

### SIST EN 16759:2021

2021-10 (po) (en;fr;de) 32 str. (G)

Lepljena zasteklitev za vrata, okna in obešene fasade - Preverjanje mehanskih lastnosti zlepljenosti aluminijeve in jeklene površine

*Bonded Glazing for doors, windows and curtain walling - Verification of mechanical performance of bonding on aluminium and steel surfaces*

Osnova: EN 16759:2021

ICS: 81.040.20

This document specifies the method to be used to verify the mechanical performance of the bonded glazing for doors, windows and curtain walling (see examples in Annex A) and its durability. The bonding covered is only that between the glass and the metal surface.

NOTE 1 Bonded glazing was formerly known as structural sealant glazing SSGS.

This document covers bonded glazing incorporated into the product construction works as follows:

- either vertically; or
- up to 83° from the vertical (positive slope); or
- up to 15° from the vertical onto the building face (negative slope).

NOTE 2 A wall has a positive slope if its outer surface faces upwards.

NOTE 3 Specific additional safety provisions can apply nationally.

This document gives information to the manufacturer to comply with requirements regarding design, factory production control and assembly rules.

The parts concerned in the testing are the metal surface (anodized and coated aluminium, stainless steel), the glass coated or not which shall be bonded, the bonding sealant and mechanical restraints when required.

This document does not apply to:

- other surfaces materials;
- direct glazing;
- glass-to-glass bonding and edge seal of insulating glass units (which are covered by EN 13022 1:2014 and EN 1279 5);
- adhesive tapes.

### **SIST EN 17490:2021**

**2021-10** (po) (en;fr;de) **13 str. (D)**

Ugotavljanje izvlečne sile vijakov iz kanalov z navoji

*Determination of screw pull out forces from screw thread channels*

Osnova: EN 17490:2021

ICS: 91.190, 21.060.99

This document provides a test method for determining the bearing capacity (pull out force) of a connection consisting of a screw in a screw thread channel, which cannot be calculated in accordance with current codes or conventional calculations. This document can be applied to several products, including doors, windows and curtain walling.

This document applies to screw thread channels made out of metal as well as metal screws.

The pull out forces of such connections may already be assessed indirectly with another test method e.g. wind load resistance for doors/windows according to EN 12211 or curtain walling kits according to EN 12179. Additional information with respect to the mechanical performance of connections and direct applications can be determined with the test method described in this document.

## **SIST/TC ITC Informacijska tehnologija**

### **SIST EN ISO 21393:2021**

**2021-10** (po) (en;fr;de) **55 str. (J)**

Zdravstvena informatika - Označevalski jezik OMICS (OML) (ISO 21393:2021)

*Health informatics - Omics Markup Language (OML) (ISO 21393:2021)*

Osnova: EN ISO 21393:2021

ICS: 35.060, 35.240.80

Basically OML is the data exchanging format that is designed to facilitate exchanging the omics data around the world without forcing to change any database schema.

- From Informatics side of view, OML is the data exchanging format based on XML. Here the data exchanging format in the messaging and communication is in the scope, but the database schema itself is out of the scope of this document.

- From biological side of view, all kinds of omics are in consideration and are in the scope of this document, the genomic sequence variations and the whole genomic sequence are out of the scope of this document.

- In otherwise, the annotations as clinical concerns and the relation with other omics concerns are in the scope of this document.

- Though omics exist in various biological species, the scope of this document is in the human health associated species as human, cell line, and preclinical animals. The other biological species are out of the scope of this document.

- The clinical field is in the scope of this document, but the basic research fields and other scientific fields are out of the scope of this document.

- Here the clinical trials including drug discovery is in the scope of this document. As for supposed application fields, our main focus is in human health including clinical practice, preventive medicine, translational research, and clinical researches.

**SIST-TS CEN ISO/TS 82304-2:2021****2021-10 (po) (en;fr;de) 87 str. (M)**

Programska oprema v zdravstvu - 2. del: Aplikacije za zdravje in dobro počutje (wellness) - Kakovost in zanesljivost (ISO/TS 82304-2:2021)

*Health software - Part 2: Health and wellness apps - Quality and reliability (ISO/TS 82304-2:2021)*

Osnova: CEN ISO/TS 82304-2:2021

ICS: 35.240.80, 35.080

This European Technical Specification will provide a set of requirements for developers of health and wellness apps, intending to meet the needs of health care professionals, patients, carers and the wider public. It will include a set of quality criteria and cover the app project life cycle, through the development, testing, releasing and updating of an app, including native, hybrid and web based apps, those apps associated with wearable, ambient and other health equipment and apps that are linked to other apps. It will also address fitness for purpose and the monitoring of usage. The specification will inform the development of health and wellness apps irrespective of whether they are placed in the market, and including free of charge.

The specification will not cover the processes or criteria that an app developer or publisher follow to establish whether a health and wellness app is subject to regulatory control (e.g. as a medical device, or related to information governance).

**SIST-TS CEN/TS 17642:2021****2021-10 (po) (en;fr;de) 25 str. (F)**

Inteligentni transportni sistemi - e-Varnost - Vmesnik elektronskega klica v sili za center za usklajevanje reševanja (PSAP) za dostop do zbirk podatkov o tovoru in nevarnem blagu

*Intelligent Transport Systems - eSafety - eCall Interface for PSAPs to access cargo and dangerous goods databases*

Osnova: CEN/TS 17642:2021

ICS: 13.300, 35.240.60

Within the context of 112-eCall (operating requirements defined in EN 16072), this document defines specifications for the provision of 112-eCall for regulated commercial vehicles, including rigid body trucks and variants thereof, prime mover and trailer combinations (sometimes called "semi's", road trains [one prime mover with multiple trailers]) and other regulated commercial vehicles (for example vans carrying medical supplies or radioactive material).

The work of CEN/TS 16405 is adopted and extended in this document. (A revised version of CEN/TS 16405 will remain the principal reference document for the content and definition of the commercial vehicle optional additional data set).

As with the existing provisions for 112-eCall for Category M1/N1 vehicles, these are specified within the paradigm of being OEM fit equipment supplied with new vehicles.

The scope of this specification is limited to the provision of eCall from a commercial vehicle prime mover /rigid body truck ) designed for conveying cargo. (UNECE Category N).

This document specifies the requirements for the use of 112-eCall by a commercial vehicle prime mover /rigid body truck and defines the interface between the PSAPs and an external transport database.

Unless superseded by European Regulation at some future date, all data schemas specified herein and defined in a revision of CEN/TS 16405 are "Optional Additional Data" (OAD) concepts, as enabled in accordance with EN 15722:2020 as part of the minimum set of data As OAD they, and the elements within them, are, by definition, "optional" with use at the discretion of the operator of the vehicle.

This document defines how eCall for commercial vehicles is expected to interact with the future eFTI standards and the prerequisites for these standards to allow the access to the relevant freight information for the PSAPs in case of an eCall.

NOTE 1 The provision of eCall from IVS located within trailers is not included in this document, but could be the subject of a further standards deliverable.

NOTE 2 The provision of eCall for vehicles via the aftermarket (post sale and registration) will be the subject of other work, and in respect of the operational requirements for any such aftermarket solutions for commercial vehicles, will use this document as a principle reference point.

NOTE 3 The 112-eCall paradigm involves a direct call from the vehicle to the most appropriate PSAP (Third party service provision by comparison, involves the support of an



intermediary third party service provider before the call is forwarded to the PSAP). The specifications herein relate only to the provision of 112-eCall or IMS-112-eCall, and do not provide specifications for third party service provision of eCall, although in the case of 112-eCall for commercial vehicles, links to third party provision of service aspects (such as cargo contents) could be required.

## **SIST/TC ITEK Tekstil in tekstilni izdelki**

### **SIST EN 17117-2:2021**

**2021-10** (po) (en;fr;de) **23 str. (F)**

Gumirane ali plastificirane tekstilije - Mehanske preskusne metode v dvoosnih napetostnih stanjih - 2. del: Določanje vrednosti kompenzacije vzorca

*Rubber- or plastics-coated fabrics - Mechanical test methods under biaxial stress states - Part 2: Determination of the pattern compensation values*

Osnova: EN 17117-2:2021

ICS: 59.080.40

This document describes methods for the determination of compensation values for orthotropic coated

fabrics (different properties along ideally perpendicular directions, such as the weft and warp yarns for woven based coated fabrics, or along the courses and wales of knitted based coated fabrics) for determining cutting patterns.

NOTE The final interpretation and the determination of the compensation values remains the responsibility of the project engineer.

Annex C describes a method to determine comparable measures of extensibility along ideally perpendicular directions of coated fabrics. The comparable measures of extensibility can be used by design engineers to assess the extensibility of a coated fabric by comparison with other coated fabrics. In

this way, they can help to interpret results of compensation tests. Moreover, they can be used by material suppliers to measure the consistency of extensibility along perpendicular directions of a coated fabric from batch to batch.

### **SIST EN 17539:2021**

**2021-10** (po) (en;fr;de) **16 str. (D)**

Modularne mehansko spojene talne obloge (MMF) - Ugotavljanje geometrijskih značilnosti

*Modular mechanical locked floor coverings (MMF) - Determination of geometrical characteristics*

Osnova: EN 17539:2021

ICS: 97.150

This document describes test methods for determination of the geometrical characteristics of modular mechanical locked floor covering panels in respect to thickness, length, width, squareness, straightness, width flatness, length flatness, openings between assembled elements and height differences between assembled elements.

The geometrical characteristics of modular mechanical locked panels are important considerations because installed flooring will have an objectionable appearance if these performance criteria are not followed. This can cause the installed panels to line up unevenly, producing unsightly seams, uneven surfaces and corners that do not match.

### **SIST EN ISO 1833-22:2021**

SIST EN ISO 1833-22:2013

**2021-10** (po) (en;fr;de) **12 str. (C)**

Tekstilije - Kvantitativna kemična analiza - 22. del: Mešanice viskoznih ali določenih vrst bakrenih ali modalnih ali liocelnih in ploščatih vlaken (metoda z uporabo mravljične kisline in cinkovega klorida) (ISO 1833-22:2020)

*Textiles - Quantitative chemical analysis - Part 22: Mixtures of viscose or certain types of cupro or modal or lyocell with flax fibres (method using formic acid and zinc chloride) (ISO 1833 22:2020)*

Osnova: EN ISO 1833-22:2021

ICS: 59.060.01, 71.040.40

This document specifies a method, using formic acid and zinc chloride, to determine the mass percentage of viscose or certain types of cupro or modal or lyocell, after removal of non-fibrous matter, in textiles made of mixtures of

— viscose or certain types of the cupro or modal or lyocell fibres  
with  
— flax fibres.

This document is not applicable to mixtures in which the flax fibre has suffered extensive chemical degradation, nor when the viscose, cupro, modal or lyocell fibre is rendered incompletely soluble by the presence of certain permanent finishes or reactive dyes that cannot be removed completely.

**SIST ISO 1763:2021**

SIST ISO 1763:1999

**2021-10 (po) (en)**

**9 str. (C)**

Preproge - Ugotavljanje števila rezanih in/ali nerezanih zank na dolžinsko in površinsko enoto

*Textile floor coverings - Determination of number of tufts and/or loops per unit length and per unit area*

Osnova: ISO 1763:2020

ICS: 97.150

This document specifies a method for the determination of the number of tufts and/or loops per unit length and per unit area of a textile floor covering. It is applicable to textile floor coverings with the pile of which consists of tufts and/or loops.

**SIST ISO 2647:2021**

SIST ISO 2647:1995

**2021-10 (po) (en;fr)**

**10 str. (C)**

Volna - Določanje odstotka vlaken s strženom po metodi s projekcijskim mikroskopom

*Wool - Determination of percentage of medullated fibres by the projection microscope*

Osnova: ISO 2647:2020

ICS: 59.060.10

This document specifies a method of test for determining the percentage of medullated wool fibres by means of the projection microscope.

The method is applicable to woollen and worsted products, at all stages, from raw materials to yarn.

## **SIST/TC ITIV Tiskana vezja in ravnanje z okoljem**

**SIST EN IEC 61188-6-1:2021**

SIST EN 61188-5-1:2003

**2021-10 (po) (en)**

**33 str. (H)**

Plošče tiskanih vezij in sestavi plošč tiskanih vezij - Zasnova in uporaba - 6-1. del: Razmestitev priključkov - Osnovne zahteve za razmestitev priključkov na tiskanih vezjih

*Circuit boards and circuit board assemblies - Design and use - Part 6-1: Land pattern design - Generic requirements for land pattern on circuit boards*

Osnova: EN IEC 61188-6-1:2021

ICS: 31.180

This part of IEC 61188 specifies the requirements for soldering surfaces on circuit boards. This includes lands and land pattern for surface mounted components and also solderable hole configurations for through-hole mounted components. These requirements are based on the solder joint requirements of the IEC 61191-1, IEC 61191-2, IEC 61191-3 and IEC 61191-4.

**SIST EN IEC 61188-6-2:2021**

**2021-10 (po) (en)**

**28 str. (G)**

Plošče tiskanih vezij in sestavi plošč tiskanih vezij - Zasnova in uporaba - 6-2. del: Razmestitev priključkov - Opis razmestitve priključkov za najpogostejše elemente za površinsko montažo (SMD)

*Circuit boards and circuit board assemblies - Design and use - Part 6-2: Land pattern design - Description of land pattern for the most common surface mounted components (SMD)*

Osnova: EN IEC 61188-6-2:2021

ICS: 31.180

This part of IEC 61188 describes the requirements of design and use for soldering surfaces of land pattern on circuit boards. This document includes land pattern for surface mounted components. These requirements are based on the solder joint requirements of IEC 61191-2:2017.

### **SIST EN IEC 62878-2-602:2021**

**2021-10** (po) (en) **15 str. (D)**

Tehnologija sestavov z vdelanimi elementi - 2-602. del: Smernice za zložene elektronske module - Metode vrednotenja vmesnih modulov električne povezljivosti  
*Device Embedding assembly technology - Part 2-602: Guideline for stacked electronic module - Evaluation method of inter-module electrical connectivity*

Osnova: EN IEC 62878-2-602:2021

ICS: 31.190, 31.180

This part of IEC 62878 specifies the requirements and evaluation methods of electrical connectivity. It is applicable to stacked electronic modules.

## **SIST/TC IUSN Usnje**

### **SIST EN ISO 10195:2021**

**2021-10** (po) (en;fr;de) **13 str. (D)**

Usnje - Kemično določevanje kroma (VI) v usnju - Termično staranje usnja in določevanje šestvalentnega kroma (ISO 10195:2018)

*Leather - Chemical determination of chromium(VI) content in leather - Thermal pre-ageing of leather and determination of hexavalent chromium (ISO 10195:2018)*

Osnova: EN ISO 10195:2021

ICS: 71.060.10, 59.140.30

This document specifies a thermal pre-ageing procedure for leather to obtain indications about the tendency to the formation of hexavalent chromium under specified conditions and the determination of hexavalent chromium according to ISO 17075-1 or ISO 17075-2.

This thermal pre-ageing procedure does not simulate any real condition in leather production or use. It is applicable to all types of chromium tanned leather.

### **SIST EN ISO 22517:2021**

**2021-10** (po) (en;fr;de) **22 str. (F)**

Usnje - Kemični preskusi - Določevanje ostankov pesticidov (ISO 22517:2019)

*Leather - Chemical tests - Determination of pesticide residues content (ISO 22517:2019)*

Osnova: EN ISO 22517:2021

ICS: 65.100.99, 59.140.30

This document specifies a quantitative test method to determine 24 kinds of pesticide residues in leather by gas chromatography-mass spectrometry (GC-MS). This document is applicable to all types of leather that could release pesticides

## **SIST/TC IŽNP Železniške naprave**

### **SIST EN 16186-5:2021**

**2021-10** (po) (en;fr;de) **19 str. (E)**

Železniške naprave - Voznikova kabina - 5. del: Zunanja vidljivost tramvajskih vozil

*Railway applications - Driver's cabs - Part 5: External visibility for tram vehicles*

Osnova: EN 16186-5:2021

ICS: 45.140, 45.060.10

This document defines the external front and rear visibility conditions for cabs of tram vehicles and the associated assessment method.

The requirements of this document apply to vehicles operating on tram networks.

This document does not apply to refurbishment of existing vehicles.  
This document does not apply to driver's auxiliary cabs.

## **SIST EN 17168:2021**

**2021-10** (po) (en;fr;de) **58 str. (J)**

Železniške naprave - Ploščad pregradnih sistemov

*Railway applications - Platform barrier systems*

Osnova: EN 17168:2021

ICS: 93.100, 45.020

This European Standard specifies requirements for the design, construction and operation of platform barrier systems positioned at the edge of a station platform immediately adjacent to rail or other guided vehicles in stations and boarding points for passenger services and includes:

- requirements for the fixed structure and fixed parts along the platform;
- physical requirements for the movable doors and gates normally used by passengers;
- requirements for emergency doors;
- requirements for driver access doors;
- requirements for platform extremity doors;
- requirements for management of safety risks that are particular to barrier systems.

This European Standard also gives requirements for the integration of barriers with the overall rail system including:

- synchronization of vehicle and platform barrier doors or gates;
- audible and visible alerts;
- integrity of control systems;
- testing of the barrier installation;
- operational performance;
- requirements relating to other interfacing sub-systems, notably signalling and vehicles.

For barrier systems set back from the platform edge, which are used to control access to trains or for crowd management, relevant sections of the document can be used as guidance.

This European Standard applies to all actors involved in the implementation and system integration of a platform barrier system, including infrastructure owners, designers, installers and operators.

This European Standard does not cover barrier systems using bars, ropes, etc. or which operate in a vertical direction.

This European Standard applies to light rail services, e.g. metro and tramway systems and heavy rail services as requested by a project specification. It applies to small systems, working in conjunction with a single vehicle, or with larger systems working with a complete train.

This European Standard applies to platform barrier systems used at sub-surface stations, enclosed surface stations (e.g. those enclosed for the purposes of providing an air-conditioned environment for waiting passengers), and those fully in the open-air.

This European Standard does not cover normative requirements relating to fire performance or fire requirements arising from use of platform barrier systems as fire barriers.

## **SIST/TC KAV Kakovost vode**

**SIST EN ISO 10703:2021**

SIST EN ISO 10703:2016

SIST ISO 10703:2010

**2021-10** (po) (en;fr;de) **37 str. (H)**

Kakovost vode - Radionuklidi, ki sevajo žarke gama - Preskusna metoda z gama spektrometrijo visoke ločljivosti (ISO 10703:2021)

*Water quality - Gamma-ray emitting radionuclides - Test method using high resolution gamma-ray spectrometry (ISO 10703:2021)*

Osnova: EN ISO 10703:2021

ICS: 17.240, 13.060.60

This document specifies a method for the physical pre-treatment and conditioning of water samples and the determination of the activity concentration of various radionuclides emitting gamma-rays with energies between 40 keV and 2 MeV, by gamma-ray spectrometry according to the generic test method described in ISO 20042.



The analysis of <sup>90</sup>Sr and <sup>89</sup>Sr adsorbed to suspended matter is not covered by this method. It is the user's responsibility to ensure the validity of this test method selected for the water samples tested.

#### **SIST EN ISO 21676:2021**

**2021-10** (po) (en;fr;de) **42 str. (I)**

Kakovost vode - Določevanje raztopljenih frakcij izbranih aktivnih farmacevtskih učinkovin, produktov razgradnje in drugih organskih spojin v vodi in obdelani odpadni vodi - Metoda tekočinske kromatografije visoke ločljivosti in masne spektrometrije (HPLC-MS/MS ali -HRMS) po neposrednem injiciranju (ISO 21676:2018)

*Water quality - Determination of the dissolved fraction of selected active pharmaceutical ingredients, transformation products and other organic substances in water and treated waste water - Method using high performance liquid chromatography and mass spectrometric detection (HPLC-MS/MS or -HRMS) after direct injection (ISO 21676:2018)*

Osnova: EN ISO 21676:2021

ICS: 13.060.50

This document specifies a method for the determination of the dissolved fraction of selected active pharmaceutical ingredients and transformation products, as well as other organic substances (see Table 1 of the document) in drinking water, ground water, surface water and treated waste water.

The lower application range of this method can vary depending on the sensitivity of the equipment used and the matrix of the sample. For most compounds to which this document applies, the range is  $\geq 0,025 \mu\text{g/l}$  for drinking water, ground water and surface water, and  $\geq 0,050 \mu\text{g/l}$  for treated waste water.

The method can be used to determine further organic substances or in other types of water (e.g. process water) provided that accuracy has been tested and verified for each case, and that storage conditions of both samples and reference solutions have been validated.

## **SIST/TC MOC Mobilne komunikacije**

#### **SIST EN 301 192 V1.7.1:2021**

**2021-10** (po) (en) **82 str. (M)**

Digitalna videoradiodifuzija (DVB) - Specifikacija DVB za podatkovno radiodifuzijo

*Digital Video Broadcasting (DVB) - DVB specification for data broadcasting*

Osnova: ETSI EN 301 192 V1.7.1 (2021-08)

ICS: 33.170

The present document specifies transport and encapsulation protocols, and signalling for carrying general purpose data over DVB Transport Streams. The present document is designed to be used in conjunction with ETSI EN 300 468 [2].

Data broadcasting is an important extension of the MPEG-2 based DVB transmission standards. Examples are the download of software over satellite, cable or terrestrial links, the delivery of Internet services over broadcast channels (IP tunnelling), interactive TV, etc.

#### **SIST EN IEC 63249-1:2021**

**2021-10** (po) (en) **29 str. (G)**

Valovod do koaksialnih adapterjev - 1. del: Splošna specifikacija - Splošne zahteve in merilne metode (IEC 63249-1:2021)

*Waveguide to coaxial adapters - Part 1: Generic specification - General requirements and test methods (IEC 63249-1:2021)*

Osnova: EN IEC 63249-1:2021

ICS: 33.120.10

This part of IEC 63249 defines general requirements and test methods for waveguide to coaxial adapters. It includes terms and definitions, design and construction, ratings and characteristics, climatic categories, IEC type designation, requirements and test methods, quality assessment, marking, etc.

It provides the basis for establishing the sectional specifications for various waveguide to coaxial adapters.

This specification applies to waveguide to coaxial adapters (short name adapter).

For the purpose of this specification, according to ends, adapters are classified as the following:

- Class I: Waveguide to coaxial connector adapter, waveguide at one end and coaxial connector at the other end;
- Class II: Waveguide to coaxial cable adapter, waveguide at one end, and coaxial cable at the other end;
- Class III: Waveguide to coaxial cabled connector adapter, waveguide at one end, and coaxial cabled connector at the other end.

According to whether the inner conductor probe of coaxial end is connected with the inner wall of waveguide cavity or not, adapters are classified as the following :

- Connected adapter: Inner conductor probe of coaxial end is connected with inner wall of waveguide cavity;
- Disconnected adapter: Inner conductor probe of coaxial end is disconnected with inner wall of waveguide cavity.

## **SIST/TC MOV Merilna oprema za elektromagnetne veličine**

**SIST EN IEC 61326-2-3:2021**

**2021-10**

**(po) (en;fr;de)**

**SIST EN 61326-2-3:2013**

**25 str. (F)**

Električna oprema za merjenje, nadzor in laboratorijsko uporabo - Zahteve za elektromagnetno združljivost (EMC) - 2-3. del: Posebne zahteve - Preskusna konfiguracija, obratovalni pogoji in merila učinkovitosti za delovanje pretvornikov z vgrajenim ali daljinskim kondicioniranjem signalov (IEC 61326-2-3:2020)

*Electrical equipment for measurement, control and laboratory use - EMC requirements - Part 2-3: Particular requirements - Test configuration, operational conditions and performance criteria for transducers with integrated or remote signal conditioning (IEC 61326-2-3:2020)*

Osnova: EN IEC 61326-2-3:2021

ICS: 33.100.01, 19.080

In addition to the requirements of IEC 61326-1, this part of IEC 61326 specifies more detailed test configurations, operational conditions and performance criteria for transducers with integrated or remote signal conditioning.

This document applies only to transducers characterized by their ability to transform, with the aid of an auxiliary energy source, a non-electric quantity to a process-relevant electrical signal, and to output the signal at one or more PORTS. This document includes transducers for electrochemical and biological measured quantities.

The transducers covered by this document can be powered by AC or DC voltage and/or by battery or with internal power supply.

Transducers referred to by this document comprise at least the following items (see Figure 101 and Figure 102):

- one or more elements for transforming a non-electrical input quantity to an electrical quantity;
- a TRANSMISSION LINK for transferral of the electrical quantity to a component for signal conditioning;
- a unit for signal conditioning that converts the electrical quantity to a process-relevant electrical signal;
- an enclosure for enclosing the above-stated components fully or in parts.

Transducers referred to by this document can also have the following items (see Figure 101 and Figure 102):

- a communication and control unit;
- a display unit;
- control elements such as keys, buttons, switches, etc.;
- transducer output signals (for example, switch outputs, alarm outputs) which are clearly assigned to the input signal(s);
- transducers with signal conditioning which may be integrated or remote.

The manufacturer specifies the environment for which the product is intended to be used and utilizes the corresponding test levels of IEC 61326-1.

Additional requirements and exceptions for specific types of transducers are given in Annex AA, Annex BB and Annex CC to this document.

**SIST EN 61784-3-18:2011/A2:2021**

**2021-10** (po) (en;fr;de) **12 str. (C)**

Industrijska komunikacijska omrežja - Profili - 3-18. del: Funkcijska varnost procesnih vodil - Dodatne specifikacije za CPF 18 (IEC 61784-3-18:2011/AMD2:2021)

*Industrial communication networks - Profiles - Part 3-18: Functional safety fieldbuses - Additional specifications for CPF 18 (IEC 61784-3-18:2011/AMD2:2021)*

Osnova: EN 61784-3-18:2011/A2:2021

ICS: 35.100.05, 25.040.40

Amandma A2:2021 je dodatek k standardu SIST EN 61784-3-18:2011.

Ta del serije IEC 61784-3 določa varnostno komunikacijsko plast (storitve in protokol) na osnovi CPF 18 IEC 61784-2 in IEC 61158 tipa 22. Določa načela za funkcijsko varnost komunikacij, opredeljena v IEC 61784-3, ki so pomembna za to varnostno komunikacijsko plast. Ta del opredeljuje mehanizme za prenos sporočil, pomembnih za varnost, med udeleženci v porazdeljenem omrežju z uporabo tehnologije vodil v skladu z zahtevami IEC 61508 serije 2 za funkcijsko varnost. Ti mehanizmi se lahko uporabljajo v različnih industrijskih aplikacijah, kot je procesni nadzor, proizvodna avtomatizacija in stroji. Ta del zagotavlja smernice za razvijalce in ocenjevalce skladnih pripomočkov in sistemov.

**SIST EN IEC 60051-3:2021**

SIST EN 60051-3:1995

SIST EN 60051-3:1995/A1:1999

**2021-10** (po) (en;fr;de) **21 str. (F)**

Neposredni kazalni analogni električni merilni instrumenti in njihov pribor - 3. del: Posebne zahteve za wattmetre in varmetre (IEC 60051-3:2018)

*Direct acting indicating analogue electrical measuring instruments and their accessories - Part 3: Special requirements for wattmeters and varmeters (IEC 60051-3:2018)*

Osnova: EN IEC 60051-3:2021

ICS: 17.220.20

This part of IEC 60051 applies to direct acting indicating wattmeters and varmeters having an analogue display.

NOTE For multi-function instruments, see IEC 60051-7.

It also applies to:

- non-interchangeable accessories (as defined in 3.1.23 of IEC 60051-1:2016) used with wattmeters and varmeters;
- a combination of the instruments and the accessories provided that the adjustments have been made for the combination;
- direct acting indicating electrical measuring instruments whose scale marks do not correspond directly to their electrical input quantity, provided that the relationship between them is known;
- instruments and accessories having electronic devices in their measuring and/or auxiliary circuits.

This document does not apply to:

- special purpose instruments which are covered by their own IEC standards;
- special purpose devices which are covered by their own IEC standards when they are used as accessories.



**SIST EN IEC 61326-2-1:2021**                      SIST EN 61326-2-1:2013  
**2021-10**                      **(po) (en;fr;de)**                      **13 str. (D)**

Električna oprema za merjenje, nadzor in laboratorijsko uporabo - Zahteve za elektromagnetno združljivost (EMC) - 2-1. del: Posebne zahteve - Preskusne konfiguracije, obratovalni pogoji in merila učinkovitosti za delovanje občutljive preskusne in merilne opreme za nezaščiteno uporabo EMC (IEC 61326-2-1:2020)

*Electrical equipment for measurement, control and laboratory use - EMC requirements - Part 2-1: Particular requirements - Test configurations, operational conditions and performance criteria for sensitive test and measurement equipment for EMC unprotected applications (IEC 61326-2-1:2020)*

Osnova:                      EN IEC 61326-2-1:2021

ICS:                              19.080, 33.100.01

In addition to the scope of IEC 61326-1, this part of IEC 61326 specifies more detailed test configurations, operational conditions and performance criteria for equipment with test and measurement circuits (internal or, external to the equipment, or both) that are not EMC protected for operational and/or functional reasons, as specified by the manufacturer.

The manufacturer specifies the environment for which the product is intended to be used and selects the appropriate test level specifications of IEC 61326-1:2020.

NOTE Examples of equipment include, but are not limited to, oscilloscopes, logic analysers, spectrum analysers, network analysers, analogue instruments, digital multimeters (DMM) and board test systems.

**SIST EN IEC 61326-2-2:2021**                      SIST EN 61326-2-2:2013  
**2021-10**                      **(po) (en;fr;de)**                      **15 str. (D)**

Električna oprema za merjenje, nadzor in laboratorijsko uporabo - Zahteve za elektromagnetno združljivost (EMC) - 2-2. del: Posebne zahteve - Preskusne konfiguracije, obratovalni pogoji in merila učinkovitosti za prenosno preskusno merilno opremo in opremo za nadzorovanje, ki se uporablja v nizkonapetostnih distribucijskih sistemih (IEC 61326-2-2:2020)

*Electrical equipment for measurement, control and laboratory use - EMC requirements - Part 2-2: Particular requirements - Test configurations, operational conditions and performance criteria for portable test, measuring and monitoring equipment used in low-voltage distribution systems (IEC 61326-2-2:2020)*

Osnova:                      EN IEC 61326-2-2:2021

ICS:                              33.100.01, 19.080

In addition to the scope of IEC 61326-1, this part of IEC 61326 specifies more detailed test configurations, operational conditions and performance criteria for equipment covered by Annex A of IEC 61326-1:2020 which is:

- used for testing, measuring or monitoring of protective measures in low-voltage distribution systems, and;
- powered by battery and/or from the circuit measured, and
- portable.

Examples of such EUTs include, but are not limited to, voltage detectors, insulation testers, earth continuity testers, earth resistance testers, leakage current clamps, loop impedance testers, "residual-current-device-testers" (RCD-testers) and phase sequence testers as defined in IEC 61557 (all parts).

NOTE Particular EMC requirements for equipment covered by IEC 61557-8 and IEC 61557-9 are given in IEC 61326-2-4.

The manufacturer specifies the environment for which the product is intended to be used and/or selects the appropriate test level specifications of IEC 61326-1.

**SIST EN IEC 61784-3-13:2021**                      SIST EN 61784-3-13:2018  
**2021-10**                      **(po) (en;fr;de)**                      **209 str. (S)**

Industrijska komunikacijska omrežja - Profili - 3-13. del: Funkcijska varnost procesnih vodil - Dodatne specifikacije za CPF 13 (IEC 61784-3-13:2021)

*Industrial communication networks - Profiles - Part 3-13: Functional safety fieldbuses - Additional specifications for CPF 13 (IEC 61784-3-13:2021)*

Osnova:                      EN IEC 61784-3-13:2021

ICS:                              35.100.05, 25.040.40

IEC 61784-3-13:2021 specifies a safety communication layer (services and protocol) based on CPF 13 of IEC 61784 2 and IEC 61158 Type 13. It identifies the principles for functional safety communications defined in IEC 61784 3 that are relevant for this safety communication layer. This safety communication layer is intended for implementation in safety devices only.

NOTE 1 It does not cover electrical safety and intrinsic safety aspects. Electrical safety relates to hazards such as electrical shock. Intrinsic safety relates to hazards associated with potentially explosive atmospheres. This document defines mechanisms for the transmission of safety-relevant messages among participants within a distributed network using fieldbus technology in accordance with the requirements of IEC 61508 (all parts) for functional safety. These mechanisms may be used in various industrial applications such as process control, manufacturing automation and machinery. This document provides guidelines for both developers and assessors of compliant devices and systems.

**SIST EN IEC 61784-3-2:2021**                      **SIST EN 61784-3-2:2018**  
**2021-10**                      **(po) (en;fr;de)**                      **285 str. (U)**

Industrijska komunikacijska omrežja - Profili - 3-2. del: Funkcijska varnost procesnih vodil - Dodatne specifikacije za CPF 2 (IEC 61784-3-2:2021)

*Industrial communication networks - Profiles - Part 3-2: Functional safety fieldbuses - Additional specifications for CPF 2 (IEC 61784-3-2:2021)*

Osnova:                      EN IEC 61784-3-2:2021

ICS:                              35.100.05, 25.040.40

This part of IEC 61784-3 (all parts) specifies a safety communication layer (services and protocol) based on CPF 2 of IEC 61784-1, IEC 61784-2 and IEC 61158 Type 2. It identifies the principles for functional safety communications defined in IEC 61784-3 that are relevant for this safety communication layer. This safety communication layer is intended for implementation in safety devices only.

NOTE 1 It does not cover electrical safety and intrinsic safety aspects. Electrical safety relates to hazards such as electrical shock. Intrinsic safety relates to hazards associated with potentially explosive atmospheres.

This document defines mechanisms for the transmission of safety-relevant messages among participants within a distributed network using fieldbus technology in accordance with the requirements of IEC 61508 (all parts)<sup>1</sup> for functional safety. These mechanisms may be used in various industrial applications such as process control, manufacturing automation and machinery.

This document provides guidelines for both developers and assessors of compliant devices and systems.

NOTE 2 The resulting SIL claim of a system depends on the implementation of the selected functional safety communication profile within this system – implementation of a functional safety communication profile according to this document in a standard device is not sufficient to qualify it as a safety device.

**SIST EN IEC 61784-3-3:2021**                      **SIST EN 61784-3-3:2018**  
**2021-10**                      **(po) (en;fr;de)**                      **150 str. (P)**

Industrijska komunikacijska omrežja - Profili - 3-3. del: Funkcijska varnost procesnih vodil - Dodatne specifikacije za CPF 3

*Industrial communication networks - Profiles - Part 3-3: Functional safety fieldbuses - Additional specifications for CPF 3*

Osnova:                      EN IEC 61784-3-3:2021

ICS:                              35.100.05, 25.040.40

IEC 61784-3-3:2021 specifies a safety communication layer (services and protocol) based on CPF 3 of IEC 61784-1, IEC 61784-2 (CP 3/1, CP 3/2, CP 3/4, CP 3/5 and CP 3/6) and IEC 61158 Types 3 and 10. It identifies the principles for functional safety communications defined in IEC 61784-3 that are relevant for this safety communication layer. This safety communication layer is intended for implementation in safety devices only.

NOTE 1 It does not cover electrical safety and intrinsic safety aspects. Electrical safety relates to hazards such as electrical shock. Intrinsic safety relates to hazards associated with potentially explosive atmospheres.



– is restricted to risks arising directly from the hazards of the machine itself or from a group of machines working together in a co-ordinated manner;

NOTE 2 Requirements to mitigate risks arising from other hazards are provided in relevant sector standards.

For example, where a machine(s) is part of a process activity, additional information is available in IEC 61511.

This document does not cover

– electrical hazards arising from the electrical control equipment itself (e.g. electric shock – see IEC 60204-1);

– other safety requirements necessary at the machine level such as safeguarding;

– specific measures for security aspects – see IEC TR 63074.

This document is not intended to limit or inhibit technological advancement.

Figure 1 illustrates the scope of this document.

**SIST-TP CLC IEC/TR 62541-1:2021**      SIST-TP CLC/TR 62541-1:2010  
**2021-10**                      **(po) (en;fr;de)**                      **31 str. (G)**

Enotna arhitektura OPC - 1. del: Pregled in koncepti

*OPC unified architecture - Part 1: Overview and concepts*

Osnova:                      CLC IEC/TR 62541-1:2021

ICS:                              35.100.01, 25.040.40

This part of IEC 62541 presents the concepts and overview of the OPC Unified Architecture (OPC UA). Reading this document is helpful to understand the remaining parts of this multi-part document set. Each of the other parts of IEC 62541 is briefly explained along with a suggested reading order.

## **SIST/TC NAD Naftni proizvodi, maziva in sorodni proizvodi**

**SIST EN 15692:2021**                                      SIST EN 15692:2009  
**2021-10**                      **(po) (en;fr;de)**                      **10 str. (C)**

Etanol kot komponenta za dodajanje motornemu bencinu - Določevanje vode - Metoda potenciometrične titracije po Karlu Fischerju

*Ethanol as a blending component for gasoline - Determination of water content - Karl Fischer potentiometric titration method*

Osnova:                      EN 15692:2021

ICS:                              71.080.60, 75.160.20

This European standard specifies a method for the direct determination of water in ethanol to be used in gasoline blends. It is applicable in the range 0,05 % (m/m) to 0,54 % (m/m).

NOTE                      For the purposes of this European Standard, the term “% (m/m)” is used to represent the mass fraction.

**SIST EN ISO 22854:2021**                                      SIST EN ISO 22854:2016  
**2021-10**                      **(po) (en;fr;de)**                      **29 str. (G)**

Tekoči naftni proizvodi - Določevanje vrste ogljikovodikov in oksigenatov v motornem bencinu in bencinu na osnovi etanola (E85) - Metoda multidimenzionalne plinske kromatografije (ISO 22854:2021)

*Liquid petroleum products - Determination of hydrocarbon types and oxygenates in automotive-motor gasoline and in ethanol (E85) automotive fuel - Multidimensional gas chromatography method (ISO 22854:2021)*

Osnova:                      EN ISO 22854:2021

ICS:                              71.040.50, 75.160.20

This document specifies the gas chromatographic (GC) method for the determination of saturated, olefinic and aromatic hydrocarbons in automotive motor gasoline and ethanol (E85) automotive fuel. Additionally, the benzene and toluene content, oxygenated compounds and the total oxygen content can be determined.

NOTE 1 For the purposes of this document, the terms % (m/m) and % (V/V) are used to represent respectively the mass fraction,  $w$ , and the volume fraction,  $\varphi$ .

This document defines two procedures, A and B.

Procedure A is applicable to automotive motor gasoline with total aromatics of 19,32 % (V/V) up to 46,29 % (V/V); total olefins from 0,40 % (V/V) up to 26,85 % (V/V); oxygenates from 0,61 % (V/V) up to 9,85 % (V/V); oxygen content from 1,50 % (m/m) to 12,32 % (m/m); benzene content from 0,38 % (V/V) up to 1,98 % (V/V) and toluene content from 5,85 % (V/V) up to 31,65 % (V/V).

The method has also been tested for individual oxygenates. A precision has been determined for a total volume of methanol from 1,05 % (V/V) up to 16,96 % (V/V); a total volume of ethanol from 0,50 % (V/V) up to 17,86 % (V/V); a total volume of MTBE from 0,99 % (V/V) up to 15,70 % (V/V), a total volume of ETBE from 0,99 % (V/V) up to 15,49 % (V/V), a total volume of TAME from 0,99 % (V/V) up to 5,92 % (V/V), and a total volume of TAE from 0,98 % (V/V) up to 15,59 % (V/V).

Although this test method can be used to determine higher-olefin contents of up to 50 % (V/V), the precision for olefins was tested only in the range from 0,40 % (V/V) to 26,85 % (V/V).

Although specifically developed for the analysis of automotive motor gasoline that contains oxygenates, this test method can also be applied to other hydrocarbon streams having similar boiling ranges, such as naphthas and reformates.

NOTE 2 For Procedure A, applicability of this document has also been verified for the determination of n-propanol, acetone, and di-isopropyl ether (DIPE). However, no precision data have been determined for these compounds.

Procedure B describes the analysis of oxygenated groups (ethanol, methanol, ethers, C3 – C5 alcohols) in ethanol (E85) automotive fuel containing ethanol between 50 % (V/V) and 85 % (V/V). The gasoline is diluted with an oxygenate-free component to lower the ethanol content to a value below 20 % (V/V) before the analysis by GC.

The sample can be fully analysed including hydrocarbons. Precision data for the diluted sample are only available for the oxygenated groups.

NOTE 3 For Procedure B, the precision can be used for an ethanol fraction from about 50 % up to 85 % (V/V).

For the ether fraction, the precision as specified in Table 6 can be used for samples containing at least 11 % (V/V) of ethers. For the higher alcohol fraction, too few data were obtained to derive a full precision statement and the data presented in Table 6 are therefore only indicative.

NOTE 4 An overlap between C9 and C10 aromatics can occur. However, the total is accurate. Isopropyl benzene is resolved from the C8 aromatics and is included with the other C9 aromatics.

## SIST/TC PIP Pigmenti in polnila

**SIST EN ISO 787-2:2021**

**2021-10 (po) (en;fr;de)**

**SIST EN ISO 787-2:1997**

**10 str. (C)**

Splošne preskusne metode za pigmente in polnila - 2. del: Določevanje snovi, hlapnih pri 105 °C (ISO 787-2:2021)

*General methods of test for pigments and extenders - Part 2: Determination of matter volatile at 105 °C (ISO 787-2:2021)*

Osnova: EN ISO 787-2:2021

ICS: 87.060.10

This document specifies a general method of test for determining the mass fraction in percent of matter

volatile at a temperature of 105 °C in a sample of pigment or extender.

This method is applicable to pigments and extenders that are stable at 105 °C.

## SIST/TC POZ Požarna varnost

### SIST EN 14972-3:2021

2021-10 (po) (en;fr;de) 25 str. (F)

Vgrajeni gasilni sistemi - Sistemi s pršečo vodo - 3. del: Protokol preskušanja sistemov z avtomatskimi šobami za požarno zaščito pisarn, šolskih učilnic in hotelov

*Fixed firefighting systems - Water mist systems - Part 3: Test protocol for office, school classrooms and hotel for automatic nozzle systems*

Osnova: EN 14972-3:2021

ICS: 13.220.10

This document specifies the evaluation of the fire performance of water mist systems for offices, schools class rooms and hotels. This document test protocol is applicable to ceiling mounted automatic nozzles to be used in unlimited volume. This document is applicable for horizontal, solid, flat ceilings with heights of 2 m and above, up to the maximum ceiling height tested.

### SIST EN 17446:2021

2021-10 (po) (en;fr;de) 36 str. (H)

Gasilni sistemi v profesionalnih kuhinjah - Načrtovanje sistema, dokumentacija in preskusne zahteve

*Fire extinguishing systems in commercial kitchens - System design, documentation, and test requirements*

Osnova: EN 17446:2021

ICS: 97.040.99, 13.220.20

This document establishes the minimum requirements applicable to the design, installation, functioning, test and maintenance of fixed automatic fire extinguishing systems for kitchen protection that covers the kitchen appliances, the hood, the plenum and the exhaust ducts.

This document also provides requirements for the construction and components performance as applicable to specific types, designs, sizes and arrangements of pre-engineered kitchen fire-extinguishing systems.

This document does not cover household kitchens or industrial food production equipment.

### SIST EN 3-8:2021

SIST EN 3-8:2007

SIST EN 3-8:2007/AC:2008

2021-10 (po) (en;fr;de) 36 str. (H)

Prenosni gasilniki - 8. del: Zahteve za konstrukcijo, odpornost proti tlaku in mehanski preskusi za gasilnike z največjim dovoljenim tlakom, enakim ali nižjim od 30 bar, ki ustrezajo zahtevam EN 3-7

*Portable fire extinguishers - Part 8: Requirements for the construction, pressure resistance and mechanical tests for extinguishers with a maximum allowable pressure equal to or lower than 30 bar, which comply with the requirements of EN 3-7*

Osnova: EN 3-8:2021

ICS: 13.220.10

This European Standard specifies the rules of design, type testing, fabrication and inspection control of portable fire extinguishers manufactured with metallic bodies as far as pressure risk is concerned.

This part applies to portable fire extinguishers of which the maximum allowable pressure PS is lower than or equal to 30 bar and containing non-explosive, non-flammable, non-toxic and non-oxidising fluids.

This European Standard also applies to the metallic gas cartridge of a volume less than 0,12 l (see Annex E) and gives guidance for sound engineering practice for metallic gas cartridges equal to or greater than 0,12 l and less than 0,5 l, see Annex F.

This European Standard does not apply to carbon dioxide fire extinguishers.

NOTE Annex A gives the classification of the different parts forming the portable fire extinguisher.

## SIST/TC SKA Stikalni in krmilni aparati

**SIST EN IEC 62271-213:2021**

**2021-10 (po) (en) 56 str. (J)**

Visokonapetostne stikalne in krmilne naprave - 213. del: Sistem za detekcijo in indikacijo napetosti (IEC 62271-213:2021)

*High-voltage switchgear and controlgear - Part 213: Voltage detecting and indicating system (IEC 62271-213:2021)*

Osnova: EN IEC 62271-213:2021

ICS: 29.130.10

This part of IEC 62271 is applicable to the voltage detecting and indicating system (VDIS) to be installed on indoor and outdoor high-voltage equipment.

The VDIS as defined by this document includes a coupling system per phase (capacitive, resistive coupling or other technology) to connect to live parts (main circuit).

The VDIS is applicable on systems with nominal voltages above 1 kV and service frequencies from 16,7 Hz up to and including 60 Hz. The VDIS is used to detect and indicate the presence or absence of operating voltage. It is not intended to distinguish between voltage not present (i.e.  $U < 10\%$  of nominal voltage) and dead circuit state (i.e.  $U = 0\text{ V}$ ).

NOTE 1 The use of a specific means of connection to earth of the main circuit (e.g. by an earthing switch) provides the "dead circuit" ( $U = 0\text{ V}$ ) state.

NOTE 2 The VDIS has the same threshold values as the voltage presence indicating system (VPIS) (IEC 62271-206) and the voltage detecting system (VDS) (IEC 61243-5) for not indicating presence of voltage and for detecting an absence of operating voltage, respectively.

The VDIS is fixed on equipment such as switchgear and controlgear according to the IEC 62271 series or transformers according to their own standards.

The products designed and manufactured in accordance with this document contribute to the safety of the users, provided they are used by skilled or instructed persons in accordance with safe methods of work and the instructions for use.

## SIST/TC SPN Storitve in protokoli v omrežjih

**SIST ES 201 873-1 V4.13.1:2021**

**2021-10 (po) (en) 379 str. (Z)**

Metode za preskušanje in specificiranje (MTS) - 3. različica zapisa preskušanja in krmiljenja preskusov - 1. del: Jedrni jezik TTCN-3

*Methods for Testing and Specification (MTS) - The Testing and Test Control Notation version 3 - Part 1: TTCN-3 Core Language*

Osnova: ETSI ES 201 873-1 V4.13.1 (2021-08)

ICS: 33.040.01, 35.060

The present document defines the Core Language of TTCN-3. TTCN-3 can be used for the specification of all types of reactive system tests over a variety of communication ports. Typical areas of application are protocol testing (including mobile and Internet protocols), service testing (including supplementary services), module testing, testing of CORBA® based platforms, APIs, etc. TTCN-3 is not restricted to conformance testing and can be used for many other kinds of testing including interoperability, robustness, regression, system and integration testing. The specification of test suites for physical layer protocols is outside the scope of the present document.

TTCN-3 is intended to be used for the specification of test suites which are independent of test methods, layers and protocols. In addition to the textual format defined in the present document, while GFT (ETSI ES 201 873-3 [i.2]) defines a graphical presentation format for TTCN-3. The specification of these formats is outside the scope of the present document.

While the design of TTCN-3 has taken the eventual implementation of TTCN-3 translators and compilers into consideration the means of realization of Executable Test Suites (ETS) from Abstract Test Suites (ATS) is outside the scope of the present document.

**SIST ES 202 781 V1.8.1:2021****2021-10 (po) (en) 98 str. (M)**

Metode za preskušanje in specificiranje (MTS) - 3. različica zapisa preskušanja in krmiljenja preskusov - Razširitev nabora jezika TTCN-3: podpora konfiguriranju in uvajanju

*Methods for Testing and Specification (MTS) - The Testing and Test Control Notation version 3 - TTCN-3 Language Extensions: Configuration and Deployment Support*

Osnova: ETSI ES 202 781 V1.8.1 (2021-06)

ICS: 35.060

The present document defines the Configuration and Deployment Support package of TTCN-3. TTCN-3 can be used for the specification of all types of reactive system tests over a variety of communication ports. Typical areas of application are protocol testing (including mobile and Internet protocols), service testing (including supplementary services), module testing, testing of APIs, etc. TTCN-3 is not restricted to conformance testing and can be used for many other kinds of testing including interoperability, robustness, regression, system and integration testing. The specification of test suites for physical layer protocols is outside the scope of the present document.

TTCN-3 packages are intended to define additional TTCN-3 concepts, which are not mandatory as concepts in the TTCN-3 core language, but which are optional as part of a package which is suited for dedicated applications and/or usages of TTCN-3.

This package defines the TTCN-3 support for static test configurations.

While the design of TTCN-3 package has taken into account the consistency of a combined usage of the core language with a number of packages, the concrete usages of and guidelines for this package in combination with other packages is outside the scope of the present document.

## **SIST/TC STV Steklo, svetloba in razsvetljava v gradbeništvu**

**SIST EN 15193-1:2017+A1:2021**

SIST EN 15193-1:2017

SIST EN 15193-1:2017/oprA1:2020

**2021-10 (po) (en;fr;de) 106 str. (N)**

Energetska učinkovitost stavb - Energijske zahteve za razsvetljavo - 1. del: Specifikacije, modul M9

*Energy performance of buildings - Energy requirements for lighting - Part 1: Specifications, Module M9*

Osnova: EN 15193-1:2017+A1:2021

ICS: 27.015, 91.160.01, 91.120.10

This standard specifies the methodology for evaluating the energy performance of lighting systems for providing general illumination in residential and non-residential buildings and for calculating or measuring the amount of energy required or used for lighting in buildings. The method may be applied to new, existing or refurbished buildings. It also provides a methodology (LENI) as the measure of the energy efficiency of the lighting installations in buildings.

This standard does not cover lighting requirements, the design of lighting systems, the planning of lighting installations, the characteristics of lighting equipment (lamps, control gear and luminaires) and systems used for display lighting, desk lighting or luminaires built into furniture. This standard does not provide any procedure for the dynamic simulation of lighting scene setting.

Table 1 shows the relative position of this standard within the set of EPB standards in the context of the modular structure as set out in EN ISO 52000-1.

NOTE In CEN ISO/TR 52000-2 the same table can be found, with, for each module, the numbers of the relevant EPB standards and accompanying technical reports that are published or in preparation.

The modules represent EPB standards, although one EPB standard may cover more than one module and one module may be covered by more than one EPB standard, for instance a simplified and a detailed method respectively. See also Clause 2.

(...)



## SIST/TC TGO Trajnostnost gradbenih objektov

### SIST EN 15804:2012+A2:2019/AC:2021

2021-10 (po) (en;fr;de) 4 str. (AC)

Trajnostnost gradbenih objektov - Okoljske deklaracije za proizvode - Skupna pravila za kategorije proizvodov za gradbene proizvode

*Sustainability of construction works - Environmental product declarations - Core rules for the product category of construction products*

Osnova: EN 15804:2012+A2:2019/AC:2021

ICS: 91.010.01, 13.020.20

Popravek k standardu SIST EN 15804:2012+A2:2019.

Ta evropski standard vsebuje osnovna pravila za kategorije proizvodov (PCR) za okoljske deklaracije tipa III za vse gradbene proizvode in storitve.

OPOMBA: Ocena družbenih in gospodarskih lastnosti na ravni proizvodov ni zajeta v tem standardu.

Osnovna pravila za kategorije proizvodov:

- določajo parametre, ki jih je treba deklarirati, ter način njihovega zbiranja in sporočanja;
- opisujejo, katere stopnje življenjskega cikla proizvoda so obravnavane v okoljskih deklaracijah na proizvodih in kateri procesi bodo vključeni v stopnje življenjskega cikla;
- določajo pravila za pripravo scenarijev;
- vključujejo pravila za izračun popisa življenjskega cikla in ocenjevanje vpliva življenjskega cikla, na katerih temeljijo okoljske deklaracije za proizvode, vključno s specifikacijo kakovosti podatkov, ki jo je treba uporabiti;
- vključujejo pravila za sporočanje vnaprej določenih, okoljskih in zdravstvenih informacij, ki niso obravnavane v oceni življenjskega cikla za proizvod, gradbene procese in gradbene storitve, kadar je to potrebno;
- določajo pogoje, pod katerimi je mogoče gradbene proizvode primerjati na podlagi informacij iz okoljskih deklaracij na proizvodih.

Za okoljsko deklaracijo na proizvodih za gradbene storitve se uporabljajo enaka pravila in zahteve kot za okoljsko deklaracijo na proizvodih za gradbene proizvode.

## SIST/TC TIT Tobak in tobačni proizvodi

### SIST ISO 10315:2021

SIST ISO 10315:2014

2021-10 (po) (en;fr;de) 14 str. (D)

Cigarete - Določevanje nikotina v skupnih trdnih delcih iz običajnega dima - Plinsko-kromatografska metoda

*Cigarettes - Determination of nicotine in total particulate matter from the mainstream smoke - Gas-chromatographic method*

Osnova: ISO 10315:2021

ICS: 65.160

This document specifies a method for the gas-chromatographic determination of nicotine in total particulate matter from the mainstream smoke. The smoking of cigarettes and the collection of mainstream smoke are carried out according to ISO 4387.

NOTE 1 1 1 1 1 ISO 20778 and ISO 22253 provide the determination method of nicotine in smoke with an intense smoking regime.

### SIST ISO 6488:2021

SIST ISO 6488:2004

2021-10 (po) (en) 13 str. (D)

Tobak in tobačni proizvodi - Določevanje vode – Metoda po Karl Fischerju

*Tobacco and tobacco products - Determination of water content - Karl Fischer method*

Osnova: ISO 6488:2021

ICS: 65.160

This document specifies a method for the determination of water content by the Karl Fischer method. It is applicable to raw tobacco as well as tobacco taken from finished products. The method is suitable for water contents ranging from a mass fraction of at least 2Å % to 55Å %.

## SIST/TC UZO Upravljanje z okoljem

**SIST EN ISO 14031:2021**

SIST EN ISO 14031:2013

**2021-10 (po) (en)**

**52 str. (J)**

Ravnanje z okoljem - Vrednotenje učinkov ravnanja z okoljem - Smernice (ISO 14031:2021)

*Environmental management - Environmental performance evaluation - Guidelines*

Osnova: EN ISO 14031:2021

ICS: 13.020.10

This document gives guidelines for the design and use of environmental performance evaluation (EPE) within an organization. It is applicable to all organizations, regardless of type, size, location and complexity.

This document does not establish environmental performance levels. It is not intended for use for the establishment of any other environmental management system (EMS) conformity requirements.

The guidance in this document can be used to support an organization's own approach to EPE including its commitments to compliance with legal and other requirements, the prevention of pollution and continual improvement, among others.

NOTE This document is a generic standard and does not include guidance on specific methods for valuing or weighting different kinds of impacts in different kinds of sectors, disciplines, etc. Depending on the nature of the organization's activities, there is often a need to also go to other sources for additional information and guidance on sector-specific topics, different subject matters or different scientific disciplines.

## SIST/TC VAR Varjenje

**SIST EN ISO 17633:2018/A1:2021**

**2021-10 (po) (en;fr;de)**

**7 str. (B)**

Dodajni materiali za varjenje - Strženske žice in palice za obločno varjenje nerjavnih in ognjeodpornih jekel v zaščitnem plinu in brez zaščite - Razvrstitev - Dopolnilo A1 (ISO 17633:2017/Amd 1:2021)

*Welding consumables - Tubular cored electrodes and rods for gas shielded and non-gas shielded metal arc welding of stainless and heat-resisting steels - Classification - Amendment 1 (ISO 17633:2017/Amd 1:2021)*

Osnova: EN ISO 17633:2018/A1:2021

ICS: 25.160.20

Amandma A1:2021 je dodatek k standardu SIST EN ISO 17633:2018.

Ta dokument določa zahteve za razvrstitev strženskih žic in palic na osnovi kemične sestave čistega vara, vrste stržena, zaščitnega plina, položaja varjenja ter mehanskih lastnosti čistega vara v varjenem stanju ali s toplotno obdelavo za obločno varjenje nerjavnih in ognjeodpornih jekel v zaščitnem plinu in brez zaščite.

Ta dokument je združen standard, ki omogoča razvrstitev po sistemu na osnovi nominalne sestave ali sistemu na osnovi vrste zlitine.

a) Točke, podtočke in preglednice z dodano črko »A« se uporabljajo samo za proizvode, razvrščene po sistemu na osnovi nominalne sestave.

b) Točke, podtočke in preglednice z dodano črko »B« se uporabljajo samo za proizvode, razvrščene po sistemu na osnovi vrste zlitine.

c) Točke, podtočke in preglednice brez dodane črke »A« ali »B« se uporabljajo za vse proizvode, razvrščene v skladu s tem dokumentom.

Za določanje razvrstitve proizvodov v tem dokumentu se ne uporablja udarni tok.

**SIST EN ISO 8167:2021**

SIST EN 28167:1999

**2021-10 (po) (en;fr;de)**

**20 str. (E)**

Uporovno varjenje - Bradavično uporovno varjenje - Bradavice za uporovno varjenje (ISO 8167:2021)  
*Resistance welding - Embossed projection welding - Projections for resistance welding (ISO 8167:2021)*

Osnova: EN ISO 8167:2021

ICS: 25.160.30

This document specifies the geometries and dimensions of projections for embossed projection welding.

Tools to make the projections are also included in Annex B.

The projections are used on hot-rolled, cold-rolled, uncoated and coated steels, stainless steels and nickel alloys for conventional welding quality up to 3 mm thickness, as single projections, in multiples or as a group of multiples.

Any solid projections are not included in this document.

## **SIST/TC VAZ Varovanje zdravja**

**SIST EN ISO 11138-8:2021**

**2021-10 (po) (en;fr;de)**

**15 str. (D)**

Sterilizacija izdelkov za zdravstveno oskrbo - Biološki indikatorji - 8. del: Metoda za validacijo skrajšanega časa inkubacije biološkega indikatorja (ISO 11138-8:2021)

*Sterilization of health care products - Biological indicators - Part 8: Method for validation of a reduced incubation time for a biological indicator (ISO 11138-8:2021)*

Osnova: EN ISO 11138-8:2021

ICS: 11.080.01

1.1 This document specifies the requirements for a test method to be utilized to establish or confirm a reduced incubation time (RIT) that is shorter than the 7 day reference incubation time specified in 7.3.22 of ISO 11138-1:2017 for biological indicators used to monitor moist heat sterilization processes or ethylene oxide (EO) sterilization processes.

1.2 This document is applicable to manufacturers of biological indicators and to end users of biological indicators who intend to, if required by their quality system, establish, validate or confirm an RIT.

1.3 This document is not applicable to biological indicators used to monitor dry heat, low temperature steam formaldehyde (LTSF) or vaporized hydrogen peroxide (VH<sub>2</sub>O<sub>2</sub>) sterilization processes.

NOTE 1 The method described in this document to establish an RIT for biological indicators used to monitor moist heat or EO sterilization processes has been used extensively for many years. However, there is limited experience in use of this method to establish an RIT for biological indicators used to monitor dry heat, low temperature steam formaldehyde or vaporized hydrogen peroxide sterilization processes. This document, therefore, does not include these sterilization processes.

NOTE 2 For EO as a sterilizing agent, the stated RIT will be applicable for any EO cycle type, i.e. 100% EO, EO blends, etc.

**SIST EN ISO 15883-5:2021**

SIST-TS CEN ISO/TS 15883-5:2006

**2021-10 (po) (en)**

**68 str. (K)**

Čistila - 5. del: Zahtevane lastnosti in merila preskusnih metod za prikaz učinka čiščenja (ISO 15883-5:2021)

*Washer-disinfectors - Part 5: Performance requirements and test method criteria for demonstrating cleaning efficacy (ISO 15883-5:2021)*

Osnova: EN ISO 15883-5:2021

ICS: 11.080.10

This document specifies procedures and test methods used to demonstrate the cleaning efficacy of washer-disinfectors (WD) and their accessories intended to be used for cleaning of reusable medical devices.

NOTE 1 The requirements can be used for washer-disinfectors intended for use with other articles used in the context of medical, dental, laboratory, pharmaceutical and veterinary practice.

NOTE 2 This document does not apply to the activities to be performed by the manufacturers of reusable medical devices.

**SIST EN ISO 20166-4:2021**

**2021-10** (po) (en;fr;de) **35 str. (H)**

Molekularne diagnostične preiskave in vitro - Specifikacije za predpreiskovalne procese za tkiva, ki so fiksirana v formalinu ter položena v parafin - 4. del: Tehnike detekcije in situ (ISO 20166-4:2021)

*Molecular in vitro diagnostic examinations - Specifications for preexamination processes for formalin-fixed and paraffin-embedded (FFPE) tissue - Part 4: In situ detection techniques (ISO 20166-4:2021)*

Osnova: EN ISO 20166-4:2021

ICS: 11.100.10

This document gives requirements for the collection, handling, documentation, transport, storage and processing during the pre-examination phase of formalin-fixed and paraffin-embedded (FFPE) tissue specimens intended for examinations of morphology and biomolecules, such as metabolites, proteins, DNA and/or RNA in situ on FFPE tissue sections by using different in situ detection techniques.

This document is applicable to routine and molecular diagnostic examinations using in situ detection techniques including laboratory developed tests performed by routine pathology laboratories (histology laboratories) as well as molecular pathology laboratories and other medical laboratories. It is also intended to be used by laboratory customers, in vitro diagnostics developers and manufacturers, as well as institutions and commercial organizations performing biomedical research, biobanks, and regulatory authorities.

This document is not applicable for the examination of isolated biomolecules such as proteins, DNA and RNA that cannot be mapped with a defined region of a FFPE section.

NOTE International, national or regional regulations or requirements can also apply to specific topics covered in this document.

**SIST EN ISO 21802:2021**

**2021-10** (po) (en;fr;de) **30 str. (G)**

Tehnični pripomočki - Smernice za kognitivno dostopnost - Dnevno upravljanje časa (ISO 21802:2019)

*Assistive products - Guidelines on cognitive accessibility - Daily time management (ISO 21802:2019)*

Osnova: EN ISO 21802:2021

ICS: 11.180.01

This document specifies principles of cognitive accessibility within the area of daily time management. This document gives guidelines for design application for features and functions known to increase the

accessibility of products and systems used to support daily time management for people with cognitive

impairment regardless of age.

This document does not provide test methods and specific instructions for measuring and reporting.

**SIST EN ISO 22748:2021**

**2021-10** (po) (en) **16 str. (D)**

Vpojni pripomočki za inkontinenco za urin in/ali blato - Tipi proizvodov in slike (ISO 22748:2021)

*Absorbent incontinence products for urine and/or faeces - Product type names and illustrations (ISO 22748:2021)*

Osnova: EN ISO 22748:2021

ICS: 11.180.20, 01.040.11

This document provides recommended and other product type names and example pictures of product

categories defined in ISO 9999, subclass 09 30, "Absorbing products to contain urine and faeces".

**SIST EN ISO 80601-2-74:2021**

SIST EN ISO 80601-2-74:2020

**2021-10** (po) (en;fr;de)

**110 str. (N)**

Medicinska električna oprema - 2-74. del: Posebne zahteve za osnovno varnost in bistvene lastnosti za vlažilne sisteme dihalne opreme (ISO 80601-2-74:2021)

*Medical electrical equipment - Part 2-74: Particular requirements for basic safety and essential performance of respiratory humidifying equipment (ISO 80601-2-74:2021)*

Osnova: EN ISO 80601-2-74:2021

ICS: 11.040.10

ISO 80601-2-74 applies to the basic safety and essential performance of a humidifier, also hereafter referred to as ME equipment, in combination with its accessories, the combination also hereafter referred to as ME system. This document is also applicable to those accessories intended by their manufacturer to be connected to a humidifier where the characteristics of those accessories can affect the basic safety or essential performance of the humidifier. EXAMPLE 1 Heated breathing tubes (heated-wire breathing tubes) or ME equipment intended to control these heated breathing tubes (heated breathing tube controllers). This document includes requirements for the different medical uses of humidification, such as invasive ventilation, non-invasive ventilation, nasal high-flow therapy, and obstructive sleep apnoea therapy, as well as humidification therapy for tracheostomy patients. EXAMPLE 2 Heated humidifier incorporated into a critical care ventilator where ISO 80601-2-12[10] also applies. EXAMPLE 3 Heated humidifier incorporated into a homecare ventilator for dependent patients where ISO 80601-2-72[12] also applies. EXAMPLE 4 Heated humidifier incorporated into sleep apnoea therapy equipment where ISO 80601-2-70[11] also applies. EXAMPLE 5 Heated humidifier incorporated into ventilatory support equipment where either ISO 80601-2-79[13] or ISO 80601-2-80[14] also apply. EXAMPLE 6 Heated humidifier incorporated into respiratory high-flow therapy equipment where ISO 80601-2-90[15] also applies. This document also includes requirements for an active HME (heat and moisture exchanger), ME equipment which actively adds heat and moisture to increase the humidity level of the gas delivered from the HME to the patient. This document is not applicable to a passive HME, which returns a portion of the expired moisture and heat of the patient to the respiratory tract during inspiration without adding heat or moisture. Hazards inherent in the intended physiological function of ME equipment or ME systems within the scope of this document are not covered by specific requirements in this document except in IEC 60601-1:2005+AMD1:2012+AMD2:2020, 7.2.13 and 8.4.1.

## **SIST/TC ŽEN Železniške električne naprave**

**SIST EN 50155:2021**

SIST EN 50155:2018

**2021-10** (po) (en)

**108 str. (N)**

Železniške naprave - Vozna sredstva - Elektronska oprema

*Railway applications - Rolling stock - Electronic equipment*

Osnova: EN 50155:2021

ICS: 45.060.01

This document applies to all electronic equipment for control, regulation, protection, diagnostic, energy supply, etc. installed on rail vehicles.

For the purpose of this document, electronic equipment is defined as equipment composed of electronic components (e.g. resistors, capacitors, transistors, diodes, integrated circuits, hybrids, application specific integrated circuits, wound components and relays), and recognized associated components (e.g. connectors, mechanical parts). These components are mainly mounted on printed circuit boards.

Sensors (e.g. current, voltage, speed) and semiconductor drive units for power electronic devices are covered by this standard. Complete semiconductor drive units and power converters are covered by EN 61287-1.

This document covers the requirements for operating conditions, design, documentation, testing and integration of electronic equipment, as well as hardware and software requirements considered necessary for compliant and reliable equipment.

Specific requirements related to practices necessary to ensure defined safety integrity level or functional safety are not covered by this document. Nevertheless, this document applies to the hardware of all rolling stock electronic equipment or systems performing safety-related functions. The software requirements for on-board railway equipment are specified by EN 50657.

## **SS EIT Strokovni svet SIST za področja elektrotehnike, informacijske tehnologije in telekomunikacij**

**SIST EN IEC 60695-4:2021**  
**2021-10 (po) (en)**

SIST EN 60695-4:2012  
**11 str. (C)**

Preskušanje požarne ogroženosti - 4. del: Izrazje v zvezi s požarnimi preskusi elektrotehničnih proizvodov (IEC 60695-4:2021)

*Fire hazard testing - Part 4: Terminology concerning fire tests for electrotechnical products (IEC 60695-4:2021)*

Osnova: EN IEC 60695-4:2021

ICS: 13.220.40, 29.020, 01.040.13

The terms and definitions in this part of IEC 60695 are applicable to fire tests for electrotechnical products.

This basic safety publication focusing on safety guidance is primarily intended for use by technical committees in the preparation of safety publications in accordance with the principles laid down in IEC Guide 104 and ISO/IEC Guide 51.

One of the responsibilities of a technical committee is, wherever applicable, to make use of basic safety publications in the preparation of its publications. The requirements, test methods or test conditions of this basic safety publication will not apply unless specifically referred to or included in the relevant publications.

**SIST EN IEC 60851-1:2021**

SIST EN 60851-1:2001  
SIST EN 60851-1:2001/A1:2004  
SIST EN 60851-1:2001/A2:2010

**2021-10 (po) (en) 18 str. (E)**

Navijalne žice - Preskusne metode - 1. del: Splošno (IEC 60851-1:2021)

*Winding wires - Test methods - Part 1: General (IEC 60851-1:2021)*

Osnova: EN IEC 60851-1:2021

ICS: 29.060.10

This part of IEC 60851 specifies the general notes on methods of test for winding wires. It also gives the definitions for terms used in IEC 60851 (all parts). A survey of the contents of IEC 60851-2 to IEC 60851-6 is given in Annex A.

**SIST EN IEC 63203-204-1:2021**

**2021-10 (po) (en) 12 str. (C)**

Nosljive elektronske naprave in tehnologije - 204-1. del: Elektronski tekstil - Preskusna metoda za ocenjevanje pralne vzdržljivosti za e-tekstilne sisteme za prostočasna in športna oblačila (IEC 63203-204-1:2021)

*Wearable electronic devices and technologies - Part 204-1: Electronic textile - Test method for assessing washing durability of leisurewear and sportswear e-textile systems (IEC 63203-204-1:2021)*

Osnova: EN IEC 63203-204-1:2021

ICS: 59.080.80

This document specifies a household washing durability test method for leisurewear and sportswear e-textile systems. This document includes testing procedures for leisurewear and sportswear products with electrically conductive components and sensors to collect the data of the user.

This document does not cover safety or heat-generation test methods. Products containing other components than those listed in this clause are not covered by this document.

**SIST EN IEC 60938-1:2021**SIST EN 60938-1:2002  
SIST EN 60938-1:2002/A1:2007**2021-10 (po) (en)****35 str. (H)**

Fiksne dušilke za dušenje elektromagnetnega motenja - 1. del: Splošna specifikacija (IEC 60938-1:2021)

*Fixed inductors for electromagnetic interference suppression - Part 1: Generic specification (IEC 60938-1:2021)*

Osnova: EN IEC 60938-1:2021

ICS: 29.180

This International Standard applies to inductors designed for electromagnetic interference suppression intended for use within all kind of electric and electronic equipment.

In this Generic Specification normative reference, terms and definitions are given. It also prescribes General requirements and the suitable test and measurement procedures for interference suppression inductors.

**SIST EN IEC 61076-2-011:2021****2021-10 (po) (en)****15 str. (D)**

Konektorji za električno in elektronsko opremo - Zahteve za izdelek - 2-011. del: Okrogli konektorji - Podrobna specifikacija za bajonetne spojke B12 na osnovi vmesnikov v skladu s standardoma IEC 61076-2-101 in IEC 61076-2-109 (IEC 61076-2-011:2021)

*Connectors for electrical and electronic equipment - Product requirements - Part 2-011: Circular connectors - Detail specification for B12 bayonet coupling connectors based on mating interfaces according to IEC 61076-2-101 and IEC 61076-2-109 (IEC 61076-2-011:2021)*

Osnova: EN IEC 61076-2-011:2021

ICS: 31.220.10

This part of IEC 61076-2 describes the bayonet coupling interface of circular connectors that are typically used for industrial process measurement and control. These connectors consist of fixed and free connectors either rewirable or non-rewirable, with bayonet-coupling. These connectors may have glass to metal seal inserts. They have male or female contacts and are deemed to be intermateable with corresponding free connectors produced according to this document. Male connectors have round contacts  $\varnothing$  0,6 mm,  $\varnothing$  0,76 mm,  $\varnothing$  0,8 mm and  $\varnothing$  1,0 mm.

Different codings prevent the mating of these individually coded fixed connectors (and consequently of individually coded free connectors deemed to couple with them) to other interfaces and cross-mating between the different codings. However, the styles and interface dimensions, except for the coupling mechanism, are as given in 4.3 of IEC 61076-2-101:2012 and 4.3.1 of IEC 61076-2-109:2014.

The male type B12 circular connectors are interoperable with the female type B12 connector of the same coding and ways. The female type B12 connectors are interoperable with the male type B12 and M12 (threaded screw coupling) connector of the same coding and ways.

NOTE B12 relates to a bayonet coupling with tube dimensions compatible with a M12 thread. M12 is the dimension of the thread of the screw-coupling mechanism of circular connectors covered by IEC 61076-2-101 and IEC 61076-2-109, which provide the mating interface (connector insert level) to these connectors with bayonet coupling.

**SIST EN IEC 63173-1:2021****2021-10 (po) (en)****250 str. (T)**

Pomorska navigacijska in radiokomunikacijska oprema in sistemi - Podatkovni vmesnik - 1. del: Načrt poti S-421 na podlagi S-100 (IEC 63173-1:2021)

*Maritime navigation and radiocommunication equipment and systems - Data Interface - Part 1: S-421 Route Plan Based on S-100 (IEC 63173-1:2021)*

Osnova: EN IEC 63173-1:2021

ICS: 47.020.70

This part of the standard specifies an S-100 compliant product specification for route plan intended for exchange of information. It specifies the content, structure, and metadata needed for creating fully S-100 compliant route plan information and its portrayal within an S-100-based application. The IHO

manages all numbers for S-100 compliant product specifications and has assigned S-421 for this route plan IEC standard.

This document specifies only a data format for the route plan exchange. This document does not specify a data format of vessel monitoring and logging information. This information can be provided by other mechanisms or be specified in other standards.

The format of the route plan exchange includes some limited vessel static information. When more static information is required, it can be obtained by other methods such as AIS.

#### **SIST-TP CEN/TR 17419-2:2021**

**2021-10 (po) (en;fr;de) 61 str. (K)**

Digitalna izmenjava informacij v zavarovalniški dejavnosti - Prenos elektronskih dokumentov - 2. del: Izvajanje EN 17419-1 v odprti specifikaciji API 3.0

*Digital information interchange in the insurance industry - Transfer of electronic documents - Part 2: Implementation of EN 17419-1 in Open API 3.0 specification*

Osnova: CEN/TR 17419-2:2021

ICS: 35.240.20, 03.060

This document specifies a concrete REST webservice API description of the processes and data (see EN 17419-1:2020 for more information) as an OpenAPI definition specified by the OpenAPI specification.

## **SS SPL Strokovni svet SIST za splošno področje**

#### **SIST ISO 21102:2021**

SIST-TP ISO/TR 21102:2017

**2021-10 (po) (en) 14 str. (D)**

Avanturistični turizem - Voditelji - Usposobljenost zaposlenih

*Adventure tourism - Leaders - Personnel competence*

Osnova: ISO 21102:2020

ICS: 03.100.30, 03.200.10, 03.080.30

This document establishes the requirements and recommendations of competencies and the related expected results of competencies for adventure tourism activity leaders common to any adventure tourism activity, which can affect the quality and safety of the services provided. It can be used by all types and sizes of providers operating in different geographic, cultural and social environments.

This document does not apply to diving leaders, for whom References [1], [2] and [4] to [9] apply.

#### **SIST ISO 334:2021**

SIST ISO 334:2015

**2021-10 (po) (en) 12 str. (C)**

Trdna fosilna goriva - Določevanje celotnega žvepla - Eschkajeva metoda

*Coal and coke - Determination of total sulfur - Eschka method*

Osnova: ISO 334:2020

ICS: 75.160.10, 73.040

This document specifies a reference method for determining the total sulfur content of hard coal, brown coals and lignites, and coke by the Eschka method.

#### **SIST ISO 4156-1:2021**

SIST ISO 4156-1:2006

**2021-10 (po) (en;fr;de) 68 str. (K)**

Ravni utori z evolventnimi boki na valjih - Meterski modul, bočno prileganje – 1. del: Splošno

*Straight cylindrical involute splines - Metric module, side fit - Part 1: Generalities*

Osnova: ISO 4156-1:2021

ICS: 21.120.30

This document provides the data and indications necessary for the design and manufacture of straight (non-helical) side-fitting cylindrical involute splines.

Limiting dimensions, tolerances, manufacturing deviations and their effects on the fit between connecting coaxial spline elements are defined in the formulae and given in the tables. Unless otherwise specified, linear dimensions are expressed in millimetres and angular dimensions in degrees.



**SIST ISO 4156-2:2021**

SIST ISO 4156-2:2006

**2021-10 (po) (en;fr)****380 str. (Z)**Ravni utori z evolventnimi bokii na valjih - Metrski modul, bočno prileganje – 2. del: Mere  
*Straight cylindrical involute splines - Metric module, side fit - Part 2: Dimensions*

Osnova: ISO 4156-2:2021

ICS: 21.120.30

This document specifies geometry and inspection dimensions for the design and manufacture of straight (non-helical) side-fitting cylindrical involute splines.

Limiting dimensions, tolerances, manufacturing errors and their effects on the fit between connecting coaxial spline elements are defined and tabulated. Linear dimensions are expressed in millimetres and angular dimensions in degrees.

The specified diameters for external splines in the geometry tables and the values in the inspection dimension tables are only valid for fundamental deviation "h".

For fundamental deviations other than "h", diameters and tooth thicknesses are calculated for external splines according to the formulae in ISO 4156-1 and inspection dimensions according to the formulae in ISO 4156-3.

**SIST ISO 4156-3:2021**

SIST ISO 4156-3:2006

**2021-10 (po) (en;fr)****53 str. (J)**Ravni utori z evolventnimi bokii na valjih - Metrski modul, bočno prileganje – 3. del: Kontrola  
*Straight cylindrical involute splines - Metric module, side fit - Part 3: Inspection*

Osnova: ISO 4156-3:2021

ICS: 21.120.30

This document provides data, guidance and requirements for the inspection of straight (non-helical) side fitting cylindrical involute splines.

Limiting dimensions, tolerances, manufacturing deviations and their effects on the fit between connecting coaxial spline elements are defined and tabulated. Linear dimensions are expressed in millimetres and angular dimensions in degrees.

**SIST EN 1647:2019+A1:2021**

SIST EN 1647:2019

SIST EN 1647:2019/oprA1:2021

**2021-10 (po) (en;fr;de)****39 str. (H)**Bivalna počitniška vozila - Premične počitniške hišice - Zdravstvene in varnostne zahteve za bivanje  
*Leisure accommodation vehicles - Caravan holiday homes - Habitation requirements relating to health and safety*

Osnova: EN 1647:2018+A1:2021

ICS: 43.100

This European Standard specifies requirements intended to ensure safety and health of persons using caravan holiday homes as defined in EN 13878, as temporary or seasonal accommodation.

It specifies grades of resistance to snow loads and the stability of the structure of caravan holiday homes as well as the minimum information to be included in a user's handbook.

It also specifies the corresponding test methods.

**SIST EN 17281:2021****2021-10 (po) (en;fr;de)****38 str. (H)**Varnostne zahteve - Oprema za čiščenje vozil  
*Safety requirements - Vehicle cleaning equipment*

Osnova: EN 17281:2021

ICS: 43.180

This document contains technical safety requirements for the design, equipment and testing of brushless vehicle washing systems and vehicle washing systems with brushes for, indoor and outdoor operation e.g. roll-over vehicle washing systems, vehicle washing tunnels, manually movable vehicle washing facilities.

This standard does not apply to hand-guided high pressure cleaners which are covered by EN 60335-2-79, to water recycling systems, buildings and doors for entering the traffic zone, for powered ride-on machines and powered walk-behind machines with a traction drive.

NOTE Signals (example doors, lighting systems) may be provided by the vehicle washing system.

This standard contains requirements for the protection of persons and objects from accidents and damages during use and operation of vehicle washing systems.

Persons to be protected are

- operators,
- maintenance and monitoring personnel,
- persons in the vicinity of vehicle washing systems,
- persons sitting in the vehicle during cleaning.

Objects to be protected are

- vehicles.

Significant hazards associated with vehicle washing systems are listed in Clause 4. These hazards have been established by a risk assessment according to EN ISO 12100 and require measures to eliminate the hazard or to reduce the risk. These measures are specified in Clause 5 of this standard.

The safety requirements assume that vehicle washing systems are regularly maintained by trained and competent persons according to the manufacturer's information and that the operators, with the exception of users of self-service washing systems, have been instructed in the handling of vehicle washing systems.

#### **SIST EN 17443:2021**

**2021-10** (po) (en;fr;de) **21 str. (F)**

Oprema za zimska vzdrževalna dela - Sistemi za proizvodnjo slanice - Zahteve in preskusne metode  
*Winter service equipment - Brine production systems - Requirements and test methods*

Osnova: EN 17443:2021

ICS: 13.030.40

This European standard specifies the essential requirements of stationary systems for production of brines for winter road maintenance and includes tests of these requirements. Battery limits: chloride and water inlet to the saturator, brine outlet to the spreading machine. Within the scope are storage and loading/unloading equipment also.

The following points are not covered by this standard:

- System and construction requirements;
- Requirements according national legislations.

#### **SIST EN 17477:2021**

**2021-10** (po) (en;fr;de) **29 str. (G)**

Alge in izdelki iz alg - Ugotavljanje biomase pri mikroalgah, makroalgah, cianobakterijah in labirintulomicetah - Odkrivanje in prepoznavanje z morfološkimi in/ali molekularnimi metodami  
*Algae and algae products - Identification of the biomass of microalgae, macroalgae, cyanobacteria and Labyrinthulomycetes - Detection and identification with morphological and/or molecular methods*

Osnova: EN 17477:2021

ICS: 13.020.55

This document specifies a method for the detection and identification of microalgae, macroalgae (seaweed), cyanobacteria and Labyrinthulomycetes by using morphological methods and/or molecular methods.

The morphological methods in this document are applicable to harvested wet biomass and to harvested dried unground biomass from microalgae, macroalgae, cyanobacteria and Labyrinthulomycetes that have been grown and/or harvested for further processing and/or use.

The molecular methods in this document are applicable to harvested wet biomass and to harvested dried and/or ground biomass from microalgae, macroalgae, cyanobacteria and Labyrinthulomycetes that have been grown and/or harvested for further processing and/or use.

This document describes a toolbox, consisting of several identification methods that can be chosen according to the applicability and purpose of the identification:

- morphological methods based on observation and referring to scientific literature on taxonomy:
- macroscopic observation;
- light microscopic observation;
- molecular methods of sequencing and blasting of sequences:
- 16S-rDNA sequencing;
- 18S-rDNA sequencing;
- rbcL DNA sequencing;
- ITS sequencing;
- COX 1 gene sequencing;
- tufA gene sequencing.

This document does not deal with genetic purity of the biomass or quantification of the identified taxa.

#### **SIST EN 17480:2021**

**2021-10 (po) (en;fr;de) 17 str. (E)**

Alge in izdelki iz alg - Metode za določanje produktivnosti rastišč alg

*Algae and algae products - Methods for the determination of productivity of algae growth sites*

Osnova: EN 17480:2021

ICS: 13.020.55

This document specifies the methods to be used for the determination of productivity of algae growth sites.

This document excludes methods for sampling, harvesting and pre-/postprocessing. Excluded as well is 'wild growth', which is defined as algae growing in nature without human interference except when harvesting the algae.

#### **SIST EN 17543:2021**

**2021-10 (po) (en;fr;de) 18 str. (E)**

Ohranjanje kulturne dediščine - Zidne obloge gradbene dediščine - Preiskovanje in dokumentiranje

*Conservation of Cultural Heritage - Finishes of built heritage - Investigation and documentation*

Osnova: EN 17543:2021

ICS: 97.195

This document defines best practice for collecting data and processing findings when investigating finishes on built heritage, with the aim of establishing existing schemes. It applies to decorative and protective finishes on buildings and their interiors, as well as other objects of built heritage.

This document applies to the planning and execution of such investigations with documentation throughout. It can be used as a process reference for stakeholders involved in the investigation of built heritage.

#### **SIST EN ISO 10276:2021**

**2021-10 (po) (en;fr;de) 31 str. (G)**

Jedrska energija - Tehnologija goriv - Ovojni sistemi za pakete, ki se uporabljajo za prevoz radioaktivnih snovi (ISO 10276:2019)

*Nuclear energy - Fuel technology - Trunnion systems for packages used to transport radioactive material (ISO 10276:2019)*

Osnova: EN ISO 10276:2021

ICS: 27.120.30

This document covers trunnion systems used for tie-down, tilting and/or lifting of a package of radioactive material during transport operations.

Aspects included are the design, manufacture, maintenance, inspection and management system. Regulations which can apply during handling operation in nuclear facilities are not addressed in document.

This document does not supersede any of the requirements of international or national regulations, concerning trunnions used for lifting and tie-down.

**SIST EN ISO 16647:2021****2021-10 (po) (en;fr;de) 43 str. (I)**

Jedrski objekti - Merila za projektiranje in delovanje zadrževalnih sistemov za jedrska delovišča in jedrske naprave, ki so v razgradnji (ISO 16647:2018)

*Nuclear facilities - Criteria for design and operation of confinement systems for nuclear worksite and for nuclear installations under decommissioning (ISO 16647:2018)*

Osnova: EN ISO 16647:2021

ICS: 27.120.20

This document specifies the requirements applicable to the design and use of airborne confinement systems that ensure safety and radioprotection functions in nuclear worksites and in nuclear installations under decommissioning to protect from radioactive contamination produced: aerosol or gas.

The purpose of confinement systems is to protect the workers, members of the public and the environment against the spread of radioactive contamination resulting from operations in nuclear worksites and from nuclear installations under decommissioning.

The confinement of nuclear worksites and of nuclear installations under decommissioning is characterized by the temporary and evolving (dynamic) nature of the operations to be performed. These operations often take place in area not specifically designed for this purpose.

This document applies to maintenance or upgrades at worksites which fit the above definition.

**SIST EN ISO 18229:2021****2021-10 (po) (en;fr;de) 38 str. (H)**

Bistvene tehnične zahteve za mehanske komponente in kovinske konstrukcije, namenjene četrti generaciji jedrskih reaktorjev (ISO 18229:2018)

*Essential technical requirements for mechanical components and metallic structures foreseen for Generation IV nuclear reactors (ISO 18229:2018)*

Osnova: EN ISO 18229:2021

ICS: 27.120.10

This document defines the essential technical requirements that are addressed in the process of design and construction of Generation IV (GEN IV) nuclear reactors. It does not address operation, maintenance and in-service inspection of reactors.

Six reactor concepts are considered for GEN IV: the sodium fast reactor, the lead fast reactor, the gas fast reactor, the very high temperature reactor, the supercritical water reactor and the molten salt reactor.

Annex A details the main characteristics for the different concepts.

The scope of application of this document is limited to mechanical components related to nuclear safety and to the prevention of the release of radioactive materials

- that are considered to be important in terms of nuclear safety and operability,
- that play a role in ensuring leaktightness, partitioning, guiding, securing and supporting, and
- that contain and/or are in contact with fluids (such as vessels, pumps, valves, pipes, bellows, box structures, heat exchangers, handling and driving mechanisms).

**SIST EN ISO 18589-1:2021****2021-10 (po) (en;fr;de) 23 str. (F)**

Merjenje radioaktivnosti v okolju - Tla - 1. del: Splošne smernice in definicije (ISO 18589-1:2019)

*Measurement of radioactivity in the environment - Soil - Part 1: General guidelines and definitions (ISO 18589-1:2019)*

Osnova: EN ISO 18589-1:2021

ICS: 13.080.99, 17.240

This document specifies the general requirements to carry out radionuclides tests, including sampling of soil including rock from bedrock and ore as well as of construction materials and products, pottery, etc. using NORM or those from technological processes involving Technologically Enhanced Naturally Occurring Radioactive Materials (TENORM) e.g. the mining and processing of mineral sands or phosphate fertilizer production and use.

For simplification, the term "soil" used in this document covers the set of elements mentioned above. This document is addressed to people responsible for determining the radioactivity present in soils for the purpose of radiation protection. This concerns soils from gardens and farmland, urban or industrial sites, as well as soil not affected by human activities.

This document is applicable to all laboratories regardless of the number of personnel or the extent of the scope of testing activities. When a laboratory does not undertake one or more of the activities covered by this document, such as planning, sampling or testing, the requirements of those clauses do not apply.

This document is to be used in conjunction with other parts of ISO 18589 that outline the setting up of programmes and sampling techniques, methods of general processing of samples in the laboratory and also methods for measuring the radioactivity in soil. Its purpose is the following:

- define the main terms relating to soils, sampling, radioactivity and its measurement;
- describe the origins of the radioactivity in soils;
- define the main objectives of the study of radioactivity in soil samples;
- present the principles of studies of soil radioactivity;
- identify the analytical and procedural requirements when measuring radioactivity in soil.

This document is applicable if radionuclide measurements for the purpose of radiation protection are to be made in the following cases:

- initial characterization of radioactivity in the environment;
- routine surveillance of the impact of nuclear installations or of the evolution of the general territory;
- investigations of accident and incident situations;
- planning and surveillance of remedial action;
- decommissioning of installations or clearance of materials.

#### **SIST EN ISO 18589-4:2021**

**2021-10** (po) (en;fr;de) **32 str. (G)**

Merjenje radioaktivnosti v okolju - T1a - 4. del: Plutonij 238 in plutonij 239 + 240 - Preskusna metoda z alfa spektrometrijo (ISO 18589-4:2019)

*Measurement of radioactivity in the environment - Soil - Part 4: Plutonium 238 and plutonium 239 + 240 - Test method using alpha spectrometry (ISO 18589-4:2019)*

Osnova: EN ISO 18589-4:2021

ICS: 13.080.99, 17.240

This document describes a method for measuring 238Pu and 239 + 240 isotopes in soil by alpha spectrometry samples using chemical separation techniques.

The method can be used for any type of environmental study or monitoring. These techniques can also be used for measurements of very low levels of activity, one or two orders of magnitude less than the level of natural alpha-emitting radionuclides.

The test methods described in this document can also be used to measure the radionuclides in sludge, sediment, construction material and products following proper sampling procedure[2][3][4][5][7][8].

The mass of the test portion required depends on the assumed activity of the sample and the desired detection limit. In practice, it can range from 0,1 g to 100 g of the test sample.

#### **SIST EN ISO 18589-5:2021**

**2021-10** (po) (en;fr;de) **42 str. (I)**

Merjenje radioaktivnosti v okolju - T1a - 5. del: Stroncij 90 - Preskusna metoda z uporabo proporcionalnega štetja ali tekočega scintilacijskega štetja (ISO 18589-5:2019)

*Measurement of radioactivity in the environment - Soil - Part 5: Strontium 90 - Test method using proportional counting or liquid scintillation counting (ISO 18589-5:2019)*

Osnova: EN ISO 18589-5:2021

ICS: 13.080.99, 17.240

This document describes the principles for the measurement of the activity of  $^{90}\text{Sr}$  in equilibrium with  $^{90}\text{Y}$  and  $^{89}\text{Sr}$ , pure beta emitting radionuclides, in soil samples. Different chemical separation methods are presented to produce strontium and yttrium sources, the activity of which is determined using proportional counters (PC) or liquid scintillation counters (LSC).  $^{90}\text{Sr}$  can be obtained from the test samples when the equilibrium between  $^{90}\text{Sr}$  and  $^{90}\text{Y}$  is reached or through direct  $^{90}\text{Y}$  measurement. The selection of the measuring method depends on the origin of the contamination, the characteristics of the soil to be analysed, the required accuracy of measurement and the resources of the available laboratories.

These methods are used for soil monitoring following discharges, whether past or present, accidental or routine, liquid or gaseous. It also covers the monitoring of contamination caused by global nuclear fallout.

In case of recent fallout immediately following a nuclear accident, the contribution of  $^{89}\text{Sr}$  to the total amount of strontium activity will not be negligible. This standard provides the measurement method to determine the activity of  $^{90}\text{Sr}$  in presence of  $^{89}\text{Sr}$ .

The test methods described in this document can also be used to measure the radionuclides in sludge, sediment, construction material and products by following proper sampling procedure.

Using samples sizes of 20 g and counting times of 1 000 min, detection limits of (0,1 to 0,5) Bq·kg<sup>-1</sup> can be achievable for  $^{90}\text{Sr}$  using conventional and commercially available proportional counter or liquid scintillation counter when the presence of  $^{89}\text{Sr}$  can be neglected. If  $^{89}\text{Sr}$  is present in the test sample, detection limits of (1 to 2) Bq·kg<sup>-1</sup> can be obtained for both  $^{90}\text{Sr}$  and  $^{89}\text{Sr}$  using the same sample size, counting time and proportional counter or liquid scintillation counter as in the previous situation.

#### **SIST EN ISO 18589-6:2021**

**2021-10** (po) (en;fr;de) **21 str. (F)**

Merjenje radioaktivnosti v okolju - Tla - 6. del: Skupna alfa in skupna beta aktivnost - Preskusna metoda z uporabo proporcionalnega merjenja pretoka plina (ISO 18589-6:2019)

*Measurement of radioactivity in the environment - Soil - Part 6: Gross alpha and gross beta activities - Test method using gas-flow proportional counting (ISO 18589-6:2019)*

Osnova: EN ISO 18589-6:2021

ICS: 13.080.99, 17.240

This document provides a method that allows an estimation of gross radioactivity of alpha- and beta-emitters present in soil samples. It applies, essentially, to systematic inspections based on comparative measurements or to preliminary site studies to guide the testing staff both in the choice of soil samples for measurement as a priority and in the specific analysis methods for implementation. The gross  $\alpha$  or  $\beta$  radioactivity is generally different from the sum of the effective radioactivities of the radionuclides present since, by convention, the same alpha counting efficiency is assigned for all the alpha emissions and the same beta counting efficiency is assigned for all the beta emissions.

Soil includes rock from bedrock and ore as well as construction materials and products, pottery, etc. using naturally occurring radioactive materials (NORM) or those from technological processes involving Technologically Enhanced Naturally Occurring Radioactive Materials (TENORM), e.g. the mining and processing of mineral sands or phosphate fertilizer production and use.

The test methods described in this document can also be used to assess gross radioactivity of alpha- and beta-emitters in sludge, sediment, construction material and products following proper sampling procedure[2][3][4][5][7][8].

For simplification, the term "soil" used in this document covers the set of elements mentioned above.

#### **SIST EN ISO 20042:2021**

**2021-10** (po) (en;fr;de) **60 str. (J)**

Merjenje radioaktivnosti - Radionuklidi, ki sevajo žarke gama - Splošna preskusna metoda z uporabo spektrometrije žarkov gama (ISO 20042:2019)

*Measurement of radioactivity - Gamma-ray emitting radionuclides - Generic test method using gamma-ray spectrometry (ISO 20042:2019)*

Osnova: EN ISO 20042:2021

ICS: 13.280

This document describes the methods for determining the activity in becquerel (Bq) of gamma-ray emitting radionuclides in test samples by gamma-ray spectrometry. The measurements are carried out in a testing laboratory following proper sample preparation. The test samples can be solid, liquid or gaseous. Applications include:

- routine surveillance of radioactivity released from nuclear installations or from sites discharging enhanced levels of naturally occurring radioactive materials;
- contributing to determining the evolution of radioactivity in the environment;
- investigating accident and incident situations, in order to plan remedial actions and monitor their effectiveness;
- assessment of potentially contaminated waste materials from nuclear decommissioning activities;
- surveillance of radioactive contamination in media such as soils, foodstuffs, potable water, groundwaters, seawater or sewage sludge;
- measurements for estimating the intake (inhalation, ingestion or injection) of activity of gamma-ray emitting radionuclides in the body.

It is assumed that the user of this document has been given information on the composition of the test sample or the site. In some cases, the radionuclides for analysis have also been specified if characteristic limits are needed. It is also assumed that the test sample has been homogenised and is representative of the material under test.

General guidance is included for preparing the samples for measurement. However, some types of sample are to be prepared following the requirements of specific standards referred to in this document. The generic recommendations can also be useful for the measurement of gamma-ray emitters in situ.

This document includes generic advice on equipment selection (see Annex A), detectors (more detailed information is included in Annex D), and commissioning of instrumentation and method validation. Annex F summarises the influence of different measurement parameters on results for a typical gamma-ray spectrometry system. Quality control and routine maintenance are also covered, but electrical testing of the detector and pulse processing electronics is excluded. It is assumed that any data collection and analysis software used has been written and tested in accordance with relevant software standards such as ISO/IEC/IEEE 12207.

Calibration using reference sources and/or numerical methods is covered, including verification of the results. It also covers the procedure to estimate the activity content of the sample (Bq) from the spectrum.

The principles set out in this document are applicable to measurements by gamma-ray spectrometry in testing laboratories and in situ. However, the detailed requirements for in situ measurement are given in ISO 18589-7 and are outside the scope of this document.

This document covers, but is not restricted to, gamma-ray emitters which emit photons in the energy range of 5 keV to 3 000 keV. However, most of the measurements fall into the range 40 keV to 2 000 keV. The activity (Bq) ranges from the low levels (sub-Bq) found in environmental samples to activities found in accident conditions and high level radioactive wastes.

## **SIST EN ISO 20785-4:2021**

**2021-10 (po) (en;fr;de) 17 str. (E)**

Dozimetrija za merjenje izpostavljenosti kozmičnemu sevanju v civilnem letalskem prometu - 4. del: Kode za preverjanje veljavnosti (ISO 20785-4:2019)

*Dosimetry for exposures to cosmic radiation in civilian aircraft - Part 4: Validation of codes (ISO 20785-4:2019)*

Osnova: EN ISO 20785-4:2021

ICS: 49.020, 13.280

This document is intended for the validation of codes used for the calculation of doses received by individuals on board aircraft. It gives guidance to radiation protection authorities and code developers on the basic functional requirements which the code fulfils.

Depending on any formal approval by a radiation protection authority, additional requirements concerning the software testing can apply.

**SIST EN ISO 8847:2021**

SIST EN ISO 8847:2017

**2021-10 (po) (en;fr;de)****31 str. (G)**

Mala plovila - Krmilni mehanizem - Sistemi s kabli preko škripčevja (ISO 8847:2021)

*Small craft - Steering gear - Cable over pulley systems (ISO 8847:2021)*

Osnova: EN ISO 8847:2021

ICS: 47.020.70, 47.080

This document specifies the requirements for the design, installation and testing of cable over pulley steering systems on small craft with or without a propulsion engine(s), and on small craft with outboard engine(s) up to and including 37 kW total power.

It specifies the requirements for the design and testing of all components of a cable over pulley steering system, from the steering mechanism to the mechanical interface with the rudder shaft or the outboard engine. It applies to cable over pulley steering systems, whether for pedestal or bulkhead types. This document does not address emergency means of steering the craft.

**SIST-TP CEN/CLC/TR 17603-20-05:2021****2021-10 (po) (en;fr;de) 218 str. (S)**

Vesoljska tehnika - Priročnik o visokonapetostni tehniki in načrtovanju

*Space engineering - High voltage engineering and design handbook*

Osnova: CEN/CLC/TR 17603-20-05:2021

ICS: 49.140

This Handbook establishes guidelines to ensure a reliable design, manufacturing and testing of high voltage electronic equipment and covers:

- Design
- Manufacturing
- Verification/Testing

of equipment generating, carrying or consuming high voltage, like: high voltage power conditioner, high voltage distribution (cables and connectors).

This Handbook is dedicated to all parties involved at all levels in the realization of space segment hardware and its interface with high voltage for which EN 16603-20 (based on ECSS-E-ST-20) is applicable.

This handbook sets out to:

- summarize most relevant aspects and data of high voltage insulation
- provide design guidelines for high voltage insulation
- provide design guidelines for high voltage electronic equipment
- give an overview of appropriate high voltage test methods
- establish a set of recommendations for generation design and verification rules and methods
- provide best practices

Applicability is mainly focused on power conditioning equipment but may be also applicable for all other high voltage electric and electronic power equipment used on space missions, except items of experimental nature.

**SIST-TP CEN/CLC/TR 17603-31-01:2021****2021-10 (po) (en;fr;de) 126 str. (O)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 1. del: Vizualni dejavniki

*Space Engineering - Thermal design handbook - Part 1: View factors*

Osnova: CEN/CLC/TR 17603-31-01:2021

ICS: 49.140

In this Part 1 of the spacecraft thermal control and design data handbooks, view factors of diffuse and specular thermal surfaces are discussed.

For diffuse surfaces, calculations are given for radiation emission and absorption between different configurations of planar, cylindrical, conical, spherical and ellipsoidal surfaces for finite and infinite surfaces.

For specular surfaces the affect of reflectance on calculations for view factors is included in the calculations. View factors for specular and diffuse surfaces are also included.

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**SIST-TP CEN/CLC/TR 17603-31-02:2021**

**2021-10 (po) (en;fr;de) 19 str. (E)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 2. del: Luknje, utori in votline  
*Space Engineering - Thermal design handbook - Part 2: Holes, Grooves and Cavities*

Osnova: CEN/CLC/TR 17603-31-02:2021

ICS: 49.140

In this Part 2 of the spacecraft thermal control and design data handbooks, the radiant heat transfer properties of cavities that do not contain an absorbing-emitting medium are analyzed. The effect of radiant energy entering a cavity with one or more openings is discussed taking into consideration the characteristics and properties of the constituents. Examples support the solutions discussed.

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**2021-10 (po) (en;fr;de) 144 str. (P)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 3. del: Površinska temperatura vesoljskih plovil  
*Space Engineering - Thermal design handbook - Part 3: Spacecraft Surface Temperature*

Osnova: CEN/CLC/TR 17603-31-03:2021

ICS: 49.140

Factors affecting the equilibrium temperature of a spacecraft surface are described in this Part 3 using simple geometrical configurations and basic assumptions.

Methods for conducting calculations on the affect of Solar, planetary and albedo radiation are given taking into consideration the internal and immediate environmental factors and incorporating the various configurations and dimensions of the constituent parts.

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**2021-10** (po) (en;fr;de) **155 str. (P)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 4. del: Konduktivni prenos toplote  
*Space Engineering - Thermal design handbook - Part 4: Conductive Heat Transfer*

Osnova: CEN/CLC/TR 17603-31-04:2021

ICS: 49.140

This Part 4 of the spacecraft thermal control and design data handbooks, provides information on calculating the conductive heat transfer rate for a variety of two and three-dimensional configurations. Calculations for the conductance of the interface between two surfaces (joints) require special consideration and are included as a separate clause.

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**SIST-TP CEN/CLC/TR 17603-31-05:2021**

**2021-10** (po) (en;fr;de) **398 str. (Z)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 5. del: Strukturni materiali: kovinski in kompozitni

*Space Engineering - Thermal design handbook - Part 5: Structural Materials: Metallic and Composite*

Osnova: CEN/CLC/TR 17603-31-05:2021

ICS: 49.140

In this Part 5 of the spacecraft thermal control and design data handbooks, clause 4 contains technical data on the metallic alloys used in spacecrafts is given: composition, application areas, properties and behaviour from a thermal and thermo-optics point of view, degeneration and aging. All other properties of the metallic alloys are outside the scope of this document.

Properties of composite materials combined to form heterogeneous structures are given in clause 5.

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**2021-10 (po) (en;fr;de) 342 str. (V)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 6. del: Toplotne nadzorne površine

*Space Engineering - Thermal design handbook - Part 6: Thermal Control Surfaces*

Osnova: CEN/CLC/TR 17603-31-06:2021

ICS: 49.140

This Part 6 of the spacecraft thermal control and design data handbooks, provides information on coatings on spacecrafts for the purposes of thermal and thermo-optical regulation.

Properties of pigmented and contact coatings, are described and are classified according to their thermal radiation characteristics.

Also included in this Part are the properties and characteristics of foils and tapes with particular emphasis on their adhesive characteristics; these are not classified according to their thermal radiation properties.

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**2021-10** (po) (en;fr;de) **323 str. (V)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 7. del: Izolacija  
*Space Engineering - Thermal design handbook - Part 7: Insulations*

Osnova: CEN/CLC/TR 17603-31-07:2021

ICS: 49.140

There are 3 main categories of insulators used in spacecrafts:

1. foams: organic and inorganic;
2. fibrous insulations: for internal and external insulation and for high temperature environments
3. multilayer insulations (MLI): layers of radiation reflecting shields.

Properties, thermal behaviour and application areas of the insulation materials used in spacecrafts are detailed in this Part 7.

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**2021-10 (po) (en;fr;de) 151 str. (P)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 8. del: Toplotne cevi

*Space Engineering - Thermal design handbook - Part 8: Heat Pipes*

Osnova: CEN/CLC/TR 17603-31-08:2021

ICS: 49.140

Heat pipes are a solution to many thermal dissipation problems encountered in space systems. The types of heat pipes that can be used in spacecrafts are described. Details on design and construction, usability, compatibility and the limitations of each type are given.

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**SIST-TP CEN/CLC/TR 17603-31-09:2021****2021-10 (po) (en;fr;de) 126 str. (O)**Vesoljska tehnika - Priročnik o toplotni zasnovi - 9. del: Radiatorji  
*Space Engineering - Thermal design handbook - Part 9: Radiators*

Osnova: CEN/CLC/TR 17603-31-09:2021

ICS: 49.140

In this Part 9 of the spacecraft thermal control and design data handbooks, view factors of diffuse and specular thermal surfaces are discussed.

For diffuse surfaces, calculations are given for radiation emission and absorption between different configurations of planar, cylindrical, conical, spherical and ellipsoidal surfaces for finite and infinite surfaces.

For specular surfaces the affect of reflectance on calculations for view factors is included in the calculations. View factors for specular and diffuse surfaces are also included.

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**SIST-TP CEN/CLC/TR 17603-31-10:2021****2021-10 (po) (en;fr;de) 127 str. (O)**Vesoljska tehnika - Priročnik o toplotni zasnovi - 10. del: Kondenzatorji s faznimi prehodi  
*Space engineering - Thermal design handbook - Part 10: Phase - Change Capacitor*

Osnova: CEN/CLC/TR 17603-31-10:2021

ICS: 31.060.99, 49.140

Solid-liquid phase-change materials (PCM) are a favoured approach to spacecraft passive thermal control for incident orbital heat fluxes or when there are wide fluctuations in onboard equipment.

The PCM thermal control system consists of a container which is filled with a substance capable of undergoing a phase-change. When there is an the increase in surface temperature of spacecraft the

PCM absorbs the excess heat by melting. If there is a temperature decrease, then the PCM can provide heat by solidifying.

Many types of PCM systems are used in spacecrafts for different types of thermal transfer control.

Characteristics and performance of phase control materials are described in this Part. Existing PCM systems are also described.

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#### **SIST-TP CEN/CLC/TR 17603-31-11:2021**

**2021-10 (po) (en;fr;de) 49 str. (I)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 11. del: Električno ogrevanje

*Space engineering - Thermal design handbook - Part 11: Electrical Heating*

Osnova: CEN/CLC/TR 17603-31-11:2021

ICS: 49.140

In this Part 11, the use of electrical heaters and electrical coolers in spacecraft systems are described. Electrical thermal control is an efficient and reliable method for attaining and maintaining temperatures. Solid state systems provide for flexibility in control of thermal regulation, they are resistant to shock and vibration and can operate in extreme physical conditions such as high and zero gravity levels. They are also easy to integrate into spacecraft subsystems.

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**SIST-TP CEN/CLC/TR 17603-31-12:2021**

**2021-10** (po) (en;fr;de) **106 str. (N)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 12. del: Žaluzije  
*Space Engineering - Thermal design handbook - Part 12: Louvers*

Osnova: CEN/CLC/TR 17603-31-12:2021

ICS: 49.140

Thermal louvers are thermal control surfaces whose radiation characteristics can be varied in order to maintain the correct operating temperature of a component subject to cyclical changes in the amount of heat that it absorbs or generates.

The design and construction of louvers for space systems are described in this Part 12 and a clause is

also dedicated to providing details on existing systems.

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Vesoljska tehnika - Priročnik o toplotni zasnovi - 13. del: Fluidne zanke

*Space Engineering - Thermal design handbook - Part 13: Fluid Loops*

Osnova: CEN/CLC/TR 17603-31-13:2021

ICS: 49.140

Fluid loops are used to control the temperature of sensitive components in spacecraft systems in order to ensure that they can function correctly.

While there are several methods for thermal control (such as passive thermal insulations, thermoelectric devices, phase change materials, heat pipes and short-term discharge systems), fluid loops have a specific application area.

This Part 13 provides a detailed description of fluid loop systems for use in spacecraft.

The Thermal design handbook is published in 16 Parts:

TR 17603-31-01-31-01 Part 1A Thermal design handbook – Part 1: View factors

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TR 17603-31-01-31-01 Part 3A Thermal design handbook – Part 3: Spacecraft Surface Temperature

TR 17603-31-01-31-01 Part 4A Thermal design handbook – Part 4: Conductive Heat Transfer

TR 17603-31-01-31-01 Part 5A Thermal design handbook – Part 5: Structural Materials: Metallic and Composite

TR 17603-31-01-31-01 Part 6A Thermal design handbook – Part 6: Thermal Control Surfaces

TR 17603-31-01-31-01 Part 7A Thermal design handbook – Part 7: Insulations

TR 17603-31-01-31-01 Part 8A Thermal design handbook – Part 8: Heat Pipes

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TR 17603-31-01-31-01 Part 10A Thermal design handbook – Part 10: Phase – Change Capacitors

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TR 17603-31-01-31-01 Part 12A Thermal design handbook – Part 12: Louvers

TR 17603-31-01-31-01 Part 13A Thermal design handbook – Part 13: Fluid Loops

TR 17603-31-01-31-01 Part 14A Thermal design handbook – Part 14: Cryogenic Cooling

TR 17603-31-01-31-01 Part 15A Thermal design handbook – Part 15: Existing Satellites

TR 17603-31-01-31-01 Part 16A Thermal design handbook – Part 16: Thermal Protection System

**SIST-TP CEN/CLC/TR 17603-31-14:2021****2021-10 (po) (en;fr;de) 545 str. (2C)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 14. del: Kriogeno hlajenje

*Space Engineering - Thermal design handbook - Part 14: Cryogenic Cooling*

Osnova: CEN/CLC/TR 17603-31-14:2021

ICS: 49.140

In this Part 14 cooling methods below 100 K are described. These low temperature levels are mainly required by space borne electronic systems operating under very low noise conditions. Details on the materials used and safety factors are given.

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**2021-10** (po) (en;fr;de) **136 str. (O)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 15. del: Obstoječi sateliti  
*Space Engineering - Thermal design handbook - Part 15: Existing Satellites*  
Osnova: CEN/CLC/TR 17603-31-15:2021  
ICS: 49.140

In this Part 15, existing satellites are described and examined from a thermal control and design view. The thermal control requirements are given and an assessment is made of the thermal control systems used against performance for each satellite.

The Thermal design handbook is published in 16 Parts

TR 17603-31-01 Part 1 Thermal design handbook – Part 1: View factors  
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TR 17603-31-01 Part 14 Thermal design handbook – Part 14: Cryogenic Cooling  
TR 17603-31-01 Part 15 Thermal design handbook – Part 15: Existing Satellites  
TR 17603-31-01 Part 16 Thermal design handbook – Part 16: Thermal Protection System

#### **SIST-TP CEN/CLC/TR 17603-31-16:2021**

**2021-10** (po) (en;fr;de) **55 str. (J)**

Vesoljska tehnika - Priročnik o toplotni zasnovi - 16. del: Sistem toplotne zaščite  
*Space Engineering - Thermal design handbook - Part 16: Thermal Protection System*  
Osnova: CEN/CLC/TR 17603-31-16:2021  
ICS: 49.140

The thermal protection system (TPS) of a space vehicle ensures the structural integrity of the surface of the craft and maintains the correct internal temperatures (for crew, electronic equipment, etc.) when the vehicle is under the severe thermal loads of re-entry. These loads are characterised by very large heat fluxes over the relatively short period of re-entry.

The design of thermal protection systems for re-entry vehicles is very complex due to the number and complexity of phenomena involved: the flow around the vehicle is hypersonic, tridimensional and reactive, and its interaction with the vehicle's surface may induce chemical reactions which are not fully understood.

Two TPS concepts for re-entry vehicles, ablative and radiative are examined and there is also an analysis of existing systems using them.

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**SIST-TP CEN/TR 17674:2021**

**2021-10 (po) (en;fr;de) 31 str. (G)**

Bioizdelki - Uporaba stabilnih razmerij izotopov ogljika, vodika, kisika in dušika kot orodij za preverjanje izvora biosurovin in karakteristik proizvodnih procesov - Pregled ustrezne obstoječe uporabe

*Bio-based products- Use of stable isotope ratios of Carbon, Hydrogen, Oxygen and Nitrogen as tools for verification of the origin of bio-based feedstock and characteristics of production processes - Overview of relevant existing applications*

Osnova: CEN/TR 17674:2021

ICS: 13.020.55

The stable isotope ratios of carbon, hydrogen, oxygen and nitrogen can be used to obtain information about the origin of bio-based feedstock and characteristics of production processes of bio-based products. However, no or limited attention for the use of the elements nitrogen and sulphur is given in this document due to the fact that these applications are not yet available.

This Technical Report provides an overview of existing applications of isotope ratio analysis of carbon, hydrogen, oxygen and nitrogen that are relevant to the analysis of bio-based feedstocks, products and production processes.