

<b>STN</b>	<b>Vystužujúce vlákna Tkaniny Požiadavky a špecifikácie</b>	<b>STN ISO 2113</b>  64 4411
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Reinforcement fibres  
Woven fabrics  
Requirements and specifications

Fibres de renfort  
Tissus  
Exigences et spécifications

Táto slovenská technická norma obsahuje anglickú verziu medzinárodnej normy ISO 2113: 2023 a má postavenie oficiálnej verzie.

This Slovak standard includes the English version of the International standard ISO 2113: 2023 and has the status of the official version.

#### **Nahradenie predchádzajúcich dokumentov**

Táto slovenská technická norma nahrádza STN ISO 2113 z februára 2002 v celom rozsahu.

**138134**

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Úrad pre normalizáciu, metrológiu a skúšobníctvo Slovenskej republiky, 2024  
Slovenská technická norma a technická normalizačná informácia je chránená zákonom č. 60/2018 Z. z. o technickej normalizácii v znení neskorších predpisov.

## Anotácia

Tento dokument poskytuje charakteristiky a požiadavky na vytvorenie špecifikácií tkanín tkaných z nití (vrátane jednoduchých nití, združených nití, zosúkaných nití, káblových nití a rovingov) vyrobených z textilného skla, uhlíka alebo aramidu a všeobecne používaných na vystuženie plastov.

## Národný predhovor

Na nasledujúce dokumenty sa odkazuje v texte takým spôsobom, že časť ich obsahu alebo celý obsah predstavuje požiadavky tohto dokumentu. Pri datovaných odkazoch sa používa len citované vydanie. Pri nedatovaných odkazoch sa používa najnovšie vydanie citovaného dokumentu (vrátane akýchkoľvek zmien).

POZNÁMKA 1. – Ak bola medzinárodná publikácia zmenená spoločnými modifikáciami, čo je indikované označením (mod), použije sa príslušná EN/HD.

POZNÁMKA 2. – Aktuálne informácie o platných a zrušených STN a TNI možno získať na webovom sídle [www.unms.sk](http://www.unms.sk).

ISO 291 prijatá ako STN EN ISO 291 Plasty. Štandardné prostredie na kondicionovanie a skúšanie (ISO 291) (64 0204)

ISO 1887 dosiaľ neprijatá

ISO 2078 prijatá ako STN EN ISO 2078 Sklené textílie. Nite. Označovanie (ISO 2078) (70 1650)

ISO 2797 prijatá ako STN ISO 2797 Sklené textílie. Roviny. Základy pre špecifikáciu (70 1660)

ISO 2859-1 prijatá ako STN ISO 2859-1 Štatistické prebierky porovnávaním. Časť 1: Preberacie plány AQL na kontrolu každej dávky v sérii (01 0261)

ISO 3374 dosiaľ neprijatá

ISO 3598 prijatá ako STN ISO 3598 Sklené textílie. Nite. Základy pre špecifikáciu (70 1653)

ISO 3951-1 prijatá ako STN ISO 3951-1 Štatistické prebierky meraním. Časť 1: Špecifikácia preberacích plánov AQL jedným výberom na kontrolu každej dávky pre jeden znak kvality a jednu hodnotu AQL

ISO 4602 dosiaľ neprijatá

ISO 4603 dosiaľ neprijatá

ISO 4604 dosiaľ neprijatá

ISO 4606 dosiaľ neprijatá

ISO 5025 dosiaľ neprijatá

ISO 10548 prijatá ako STN EN ISO 10548 Uhlíkové vlákna. Stanovenie obsahu apretúry (ISO 10548) (64 4005)

ISO 13002 prijatá ako STN EN ISO 13002 Uhlíkové vlákna. Systém označovania nití z nekonečných vláken (ISO 13002) (64 4004)

## Vypracovanie slovenskej technickej normy

Spracovateľ: Úrad pre normalizáciu, metrológiu a skúšobníctvo SR, Bratislava

Technická komisia: TK 39 Plasty

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## Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular, the different approval criteria needed for the different types of ISO document should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see [www.iso.org/directives](http://www.iso.org/directives)).

ISO draws attention to the possibility that the implementation of this document may involve the use of (a) patent(s). ISO takes no position concerning the evidence, validity or applicability of any claimed patent rights in respect thereof. As of the date of publication of this document, ISO had not received notice of (a) patent(s) which may be required to implement this document. However, implementers are cautioned that this may not represent the latest information, which may be obtained from the patent database available at [www.iso.org/patents](http://www.iso.org/patents). ISO shall not be held responsible for identifying any or all such patent rights.

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For an explanation of the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT), see [www.iso.org/iso/foreword.html](http://www.iso.org/iso/foreword.html).

This document was prepared by Technical Committee ISO/TC 61, *Plastics*, Subcommittee SC 13, *Composites and reinforcement fibres*.

This third edition cancels and replaces the second edition (ISO 2113:1996), which has been technically revised. It also incorporates the Technical Corrigendum ISO 2113:1996/Cor 1:2003.

The main changes are as follows:

- [Clause 2](#) has been updated with new references added and others deleted;
- some editorial changes have been made.

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at [www.iso.org/members.html](http://www.iso.org/members.html).

## Introduction

A specification is intended to "specify" the standardized object by providing verifiable requirements, and its necessary elements include "requirements" and "verification methods". It should enumerate as completely as possible the points that should be considered at the time of drafting the specification.

The specification, therefore, can be used as the basis for procurement and trade, the basis for judging the conformity of products, processes or services, and the benchmark for self-declaration and certification.



# Reinforcement fibres — Woven fabrics — Requirements and specifications

## 1 Scope

This document provides characteristics and requirements to create specifications of fabrics woven from yarns (including single yarns, multiple-wound yarns, plied yarns, cabled yarns and rovings) made from textile glass, carbon or aramid and generally used for plastics reinforcements.

This document does not cover all requirements for some specialized applications.

## 2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 291, *Plastics — Standard atmospheres for conditioning and testing*

ISO 1887, *Textile glass — Determination of combustible-matter content*

ISO 2078, *Textile glass — Yarns — Designation*

ISO 2797, *Textile glass — Rovings — Basis for a specification*

ISO 2859-1, *Sampling procedures for inspection by attributes — Part 1: Sampling schemes indexed by acceptance quality limit (AQL) for lot-by-lot inspection*

ISO 3374, *Reinforcement products — Mats and fabrics — Determination of mass per unit area*

ISO 3598, *Textile glass — Yarns — Basis for a specification*

ISO 3951-1, *Sampling procedures for inspection by variables — Part 1: Specification for single sampling plans indexed by acceptance quality limit (AQL) for lot-by-lot inspection for a single quality characteristic and a single AQL*

ISO 4602, *Reinforcements — Woven fabrics — Determination of number of yarns per unit length of warp and weft*

ISO 4603, *Textile glass — Woven fabrics — Determination of thickness*

ISO 4604, *Reinforcement fabrics — Determination of conventional flexural stiffness — Fixed-angle flexometer method*

ISO 4606, *Textile glass — Woven fabric — Determination of tensile breaking force and elongation at break by the strip method*

ISO 5025, *Reinforcement products — Woven fabrics — Determination of width and length*

ISO 10548, *Carbon fibre — Determination of size content*

ISO 13002, *Carbon fibre — Designation system for filament yarns*

**koniec náhl'adu – text ďalej pokračuje v platenej verzii STN**