

SLOVENSKI STANDARD SIST EN 1497:2007 01-december-2007

BUXca Yý U. SIST EN 1497:1996

Osebna oprema za varovanje pred padci - Reševalni pasovi
Personal fall protection equipment - Rescue harnesses
Persönliche Absturzschutzausrüstungen - Rettungsgurte
Equipement de protection personnel contre les chutes Harnais de sauvetage
Ta slovenski standard je istoveten z: EN 1497:2007 SIST EN 1497:2007 https://standards.iteh.ai/catabo/standards/sist/71d7e016-1daf-48fb-93d7-
7981e115afab/sist-en-1497-2007
ICS:
slipping
SIST EN 1497:2007 en

# iTeh STANDARD PREVIEW (standards.iteh.ai)

<u>SIST EN 1497:2007</u> https://standards.iteh.ai/catalog/standards/sist/71d7e016-1daf-48fb-93d7-7981e115afab/sist-en-1497-2007

# EUROPEAN STANDARD NORME EUROPÉENNE EUROPÄISCHE NORM

# EN 1497

August 2007

ICS 13.340.60

Supersedes EN 1497:1996

**English Version** 

## Personal fall protection equipment - Rescue harnesses

Equipement de protection personnel contre les chutes -Harnais de sauvetage Persönliche Absturzschutzausrüstungen - Rettungsgurte

This European Standard was approved by CEN on 30 June 2007.

CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration. Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN Management Centre or to any CEN member.

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

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

> <u>SIST EN 1497:2007</u> https://standards.iteh.ai/catalog/standards/sist/71d7e016-1daf-48fb-93d7-7981e115afab/sist-en-1497-2007



EUROPEAN COMMITTEE FOR STANDARDIZATION COMITÉ EUROPÉEN DE NORMALISATION EUROPÄISCHES KOMITEE FÜR NORMUNG

Management Centre: rue de Stassart, 36 B-1050 Brussels

© 2007 CEN All rights of exploitation in any form and by any means reserved worldwide for CEN national Members.

# Contents

Forewo	ord	3
Introdu	uction	4
1	Scope	5
2	Normative references	5
3	Terms and definitions	5
4	Requirements	7
4.1	Ergonomics	7
4.2	Materials and construction	7
4.3	Dynamic strength	8
4.4	Static strength	8
4.5	Corrosion resistance	8
4.6	Marking and information	8
5	Test methodsITeh STANDARD PREVIEW	8
5.1	Examination of design	8
5.2	Dynamic strength test	9
5.3	Static strength test	12
5.4	Corrosion resistance test	13
6	Marking	13
7	Information supplied by the manufacturer	13
Annex	A (informative) Significant technical changes between this European Standard and the previous edition EN 1497:1996	14
Annex	ZA (informative) Relationship between this European Standard and the Essential Requirements of EU Directive 89/686/EEC	15

## **Figures**

Figure 1 — Example of a rescue harness	6
Figure 2 — Test lanyard for the dynamic strength test	9
Figure 3 — Bowline knot	10
Figure 4 — Dynamic strength test	11
Figure 5— Static strength test	12

## Foreword

This document (EN 1497:2007) has been prepared by Technical Committee CEN/TC 160 "Protection against falls from a height including working belts", the secretariat of which is held by DIN.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by February 2008, and conflicting national standards shall be withdrawn at the latest by February 2008.

This document has been prepared under a mandate given to CEN by the European Commission and the European Free Trade Association, and supports essential requirements of EU Directive 89/686/EEC.

For relationship with EU Directive, see informative Annex ZA, which is an integral part of this document.

Annex A provides details of significant technical changes between this European Standard and the previous edition: EN 1497:1996.

This document supersedes EN 1497:1996.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard. Austria, Belgium, Bulgaria, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland and United Kingdom.

<u>SIST EN 1497:2007</u> https://standards.iteh.ai/catalog/standards/sist/71d7e016-1daf-48fb-93d7-7981e115afab/sist-en-1497-2007

## Introduction

A rescue harness conforming to this European Standard can be such that it is either intended to be used only for rescue or it may be incorporated into the design of other types of harnesses for personal fall protection, e.g. a full body harness.

A rescue harness is intended to be worn during normal working activities.

# iTeh STANDARD PREVIEW (standards.iteh.ai)

<u>SIST EN 1497:2007</u> https://standards.iteh.ai/catalog/standards/sist/71d7e016-1daf-48fb-93d7-7981e115afab/sist-en-1497-2007

### 1 Scope

This European Standard specifies requirements, test methods, marking and information supplied by the manufacturer for rescue harnesses. Rescue harnesses conforming to this European Standard are used as components of rescue systems, which are personal fall protection systems.

Rescue harnesses are not intended to be used as body holding devices in fall arrest systems.

### 2 Normative references

The following referenced documents are indispensable for the application of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 362, Personal protective equipment against falls from a height — Connectors

EN 363:2002, Personal protective equipment against falls from a height — Fall arrest systems

EN 364:1992, Personal protective equipment against falls from a height — Test methods

EN 365, Personal protective equipment against falls from a height — General requirements for instructions for use, maintenance, periodic examination, repair, marking and packaging

EN 892, Mountaineering equipment — Dynamic mountaineering ropes — Safety requirements and test methods (standards.iteh.ai)

EN ISO 9227, Corrosion tests in artificial atmospheres - Salt spray tests (ISO 9227:2006)

https://standards.iteh.ai/catalog/standards/sist/71d7e016-1daf-48fb-93d7-

7981e115afab/sist-en-1497-2007

#### 3 Terms and definitions

For the purposes of this document, the terms and definitions given in EN 363:2002 and the following apply.

#### 3.1

#### rescue harness

body support for rescue purposes comprising straps, fittings, buckles or other elements, suitably arranged and assembled to support the whole body of a person in an appropriate position during a rescue

NOTE 1 See Figure 1.

NOTE 2 Rescue harnesses are intended to be worn during normal working activities.



#### Key

- Primary straps (shoulder straps) 1
- 2 Primary straps (thigh straps)
- 3 Primary straps
- iTeh STANDARD PRE VIEW Attachment point (consisting of two attachment elements) 4
- Padding 5

# Figure 1 — Example of a rescue harness with average by standards/sist/71d/e016-1daf-48fb-93d7-

https:

7981e115afab/sist-en-1497-2007

(standards.iteh.ai)

#### 3.2 primary straps (for rescue harnesses)

straps intended by the manufacturer to support the body or exert pressure on the body during a rescue

NOTE Other straps are called secondary straps.

#### 3.3

#### attachment point

specific connecting point for the attachment to other components, consisting of one or more attachment elements

#### 3.4

#### rescue system

personal fall protection system by which a person can rescue himself/herself or others, in such a way that a fall is prevented

#### 3.5

#### personal fall protection system

assembly of components for protection against falls from a height at work, including at least a body holding device connected to a reliable anchor

NOTE Excludes systems for professional and private sports activities.

### 3.6

### maximum rated load (for the rescue harness)

maximum mass of the person, including tools and equipment, as specified by the manufacturer for the rescue harness

NOTE Maximum rated load is expressed in kilograms.

### 4 Requirements

#### 4.1 Ergonomics

**4.1.1** When tested and examined in accordance with 5.1, the rescue harness shall be designed so that in the conditions of use for which it is intended:

— it should offer an acceptable degree of comfort;

- rescuee is not endangered and safety is not impaired due to a displacement of the straps.
- **4.1.2** The width of the primary straps shall be at least 40 mm.

#### 4.2 Materials and construction

#### 4.2.1 General

The elements of the harness shall have no sharp edges or burrs that may cause injury to the user.

Materials that may come into contact with the skin of a user shall not be known to cause irritating or sensitization effects during normal use of the rescue harness REVIEW

## 4.2.2 Webbings and yarns (standards.iteh.ai)

Webbings and yarns shall be made of filament or multifilament synthetic fibres, suitable for the use intended. The breaking tenacity of the synthetic fibre shall be known to be at least 0.6 N/tex.

Threads used for sewing shall be physically compatible with the webbing and their quality shall be comparable to that of the webbing. They shall, however, be of a contrasting shade in order to facilitate visual inspection.

#### 4.2.3 Construction

#### 4.2.3.1 General

The rescue harness shall be provided with means of adjustment to ensure that it can be correctly fitted to the wearer.

The rescue harness may be incorporated within a garment. It shall be possible to inspect visually each element and component of the rescue harness.

#### 4.2.3.2 Attachment

The rescue harness shall have at least one attachment point, which is located above the user's centre of gravity.

NOTE Attachment points can be located at the front and/or at the back of the rescue harness.

The eye of each attachment element shall be designed so that a rod of a diameter of 25 mm can pass through it.

#### 4.2.3.3 Connectors

Connectors shall conform to EN 362.