Irish Standard
I.S. EN ISO 25649-6:2017

Floating leisure articles for use on and in the water - Part 6: Additional specific safety requirements and test methods for Class D devices (ISO 25649-6:2017)

I.S. EN ISO 25649-6:2017

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National Foreword

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EUROPEAN STANDARD

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English Version

Floating leisure articles for use on and in the water - Part 6: Additional specific safety requirements and test methods for Class D devices (ISO 25649-6:2017)

Articles des loisirs flottants à utiliser sur ou dans l'eau - Partie 6: Exigences de sécurité et méthodes d'essai complémentaires propres aux dispositifs de Classe D (ISO 25649-6:2017)

Schwimmende Freizeitartikel zum Gebrauch auf und im Wasser - Teil 6: Zusätzliche besondere sicherheitstechnische Anforderungen und Prüfverfahren für Artikel der Klasse D (ISO 25649-6:2017)

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CEN-CENELEC Management Centre: Avenue Marnix 17, B-1000 Brussels

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European foreword

This document (EN ISO 25649-6:2017) has been prepared by Technical Committee ISO/TC 83 “Sports and other recreational facilities and equipment” in collaboration with Technical Committee CEN/TC 136 “Sports, playground and other recreational facilities and equipment” 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of an identical text or by endorsement, at the latest by April 2018, and conflicting national standards shall be withdrawn at the latest by April 2018.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN shall not be held responsible for identifying any or all such patent rights.

This document supersedes EN 15649-6:2009+A1:2013.

This document has been prepared under a mandate given to CEN by the European Commission and the European Free Trade Association.

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Endorsement notice

The text of ISO 25649-6:2017 has been approved by CEN as EN ISO 25649-6:2017 without any modification.

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INTERNATIONAL STANDARD

ISO 25649-6

First edition
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Floating leisure articles for use on and in the water —

Part 6: Additional specific safety requirements and test methods for Class D devices

Articles des loisirs flottants à utiliser sur ou dans l'eau —

Partie 6: Exigences de sécurité et méthodes d'essai complémentaires propres aux dispositifs de Classe D

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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 documents 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).

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ISO 25649-6 was prepared by the European Committee Standardization (CEN) Technical Committee CEN/TC 136, *Sports, playground and other recreational facilities and equipment*, in collaboration with ISO Technical Committee TC 83, *Sports and other recreational facilities and equipment*, in accordance with the agreement on technical cooperation between ISO and CEN (Vienna Agreement).

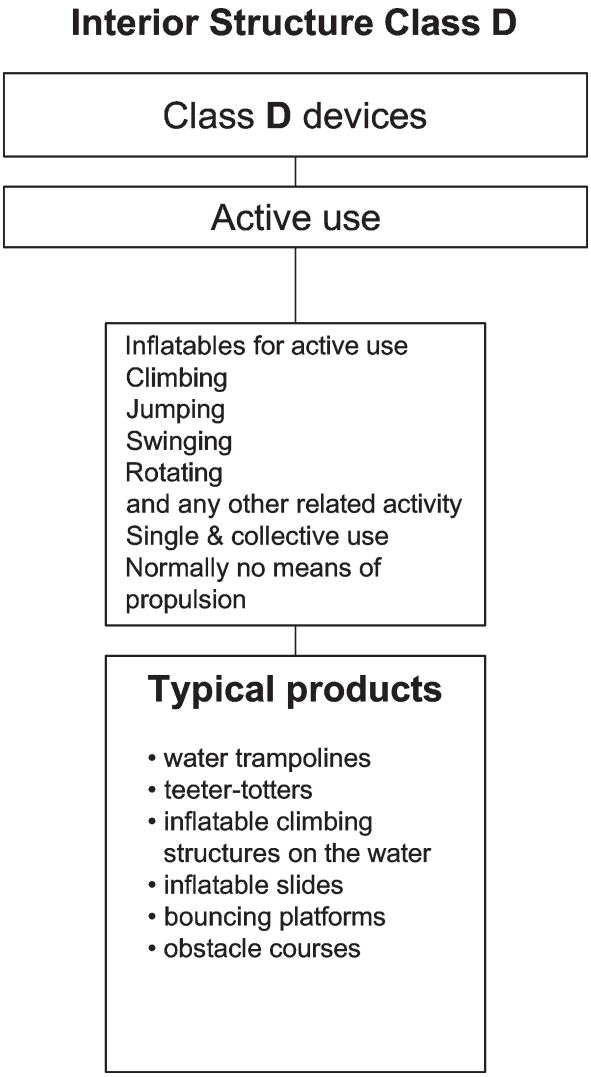
A list of all the parts in the ISO 25649-series can be found on the ISO website.

Introduction

The overriding property of Part-6-products is their enormous size and intended collective use. Therefore, the majority of safety requirements concentrate on floating stability under full and single sided load, collision of users, entrapment and entanglement issues as well as safety distances and sufficient water depth in relation to jumping and potential falling heights provided by the various "action modules". Another issue is the assembly of these stand-alone modules to large and complex activity courses. The assembly creates entrapment risks at the interfaces and needs to be assessed and regulated under the aspect of closing those interfaces.

Consumer information related to safe use is an important supplement.

Class D devices are applicable to persons older than 36 months with the restriction of the capability to swim. Class D devices are intended to be anchored in position or free floating. They are designed for active use on the water surface. Characteristics for Class D devices are especially the active use. Jumping, playing, climbing and any other related activity on the inflatable are part of the use.



Risk assessment for entire part 6 is shown in Table 1.

Table 1 — Introductory risk analysis

No.	Typical products	Place of usage	Function; range of usage; target/age group	Type of movement/ propulsion	Position of user in regard to the equipment, elevation above water	Predictable misuse	Partial risk related to water environment	Final risk	Protection aims standard/ regulation
Trampoline D (D1, D2) Climbing/ jumping structures	Trampolines on the water of various sizes	Sea shore/ close to shore; lakes; smoothly running rivers; big pools; fun parks	Jumping on devices/in the water, dual use: resting, use as platform all age groups, swimmers	Static use on a determined place, device moored may also be free floating; users jumping; all sorts of movements	Considerable elevation depending on the size of the device and jumping height; entrapment through swimming underneath the structure	Use by non swimmers; overcrowding; insufficient water depth; impact in water, collision; entrapment through swimming underneath device, lack of supervision (small children)	Collision of persons; collision with objects (anchoring); insufficient water depth; safety distances; dangerous proximity to other objects; shallow water; re-embarking (grab handles)	**DROWNING**	Age limits; swimmers only; no protruding parts; no entrapment; cushioning; warnings; supervision of small children
	Large floatable structures for action and fun, mainly climbing jumping, rollicking; bouncing castles on water	Sea shore/ close to shore; lakes; rivers; big pools; fun parks	All age groups, swimmers	Devices static (drifting or moored); users are jumping; climbing; sliding; bouncing; (see also trampolines)	Depending on the size of the device; height up to 4 m are likely; jumps and falls are part of the game	Depending on the size of the device; heights up to 4 m are likely; jumps and falls are part of the game	As above		Supervision; no rules are known for on the water equipment; safety transfers are likely from land bound toy-structures

Floating leisure articles for use on and in the water —

Part 6:
Additional specific safety requirements and test methods for Class D devices

1 Scope

This document is applicable for Class D floating leisure articles for use on and in water according to ISO 25649-1 regardless whether the buoyancy is achieved by inflation or inherent buoyant material.

This document is to be applied with ISO 25649-1 and ISO 25649-2.

NOTE 1 Typical products forming Class D (see Annex A):

— inflatable climbing structures on the water;

— bouncing platforms;

— inflatable slides;

— water trampolines;

— teeter totters;

— obstacle courses.

NOTE 2 Typical places for application:

— pools;

— lakes, ponds;

— open sea;

— sea shore (no offshore winds, no currents).

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 25649-1:2017, *Floating leisure articles for use on and in the water — Part 1: Classification, materials, general requirements and test methods*

ISO 25649-2, *Floating leisure articles for use on and in the water — Part 2: Consumer information*

ISO 25649-3:2017, *Floating leisure articles for use on and in the water — Part 3: Additional specific safety requirements and test methods for Class A devices*

EN 913:2008, *Gymnastic equipment — General safety requirements and test methods*

EN 13138-3:2014, *Buoyant aids for swimming instruction — Part 3: Safety requirements and test methods for swim seats to be worn*