ST-2016(第 3 版)	ST-2016(第 4 版)	該当頁
1 Scope	1 Scope	
The requirements in this part of the Toy Safety Standard	The requirements in this part of the Toy Safety Standard	8頁
(hereinafter referred to as "ST Standard") apply to all toys, i.e. any	(hereinafter referred to as "ST Standard") apply to all toys, i.e. any	
product or material designed or clearly intended for use in play by	product or material designed or clearly intended for use in play by	
children 14 years of age and under.	children <u>under 14 years of age</u> .	
3 Terms and definitions	3 Terms and definitions	
3.1 toy	3.1 toy	
any product or material designed or clearly intended for use in	any product or material designed or clearly intended for use	
play by children 14 years of age and under	in play by children under 14 years of age	11 頁
4. Requirements	4. Requirements	
4.4.2 For children 36 months and over	4.4.2 For children 36 months and over	25-26 頁
Toys and toys containing removable components, intended	Toys and toys containing removable components, intended	
for children 36 months and over, which fit entirely in the small	for children 36 months and over, which fit entirely in the	
parts cylinder when tested in accordance with 5.2, shall carry	small parts cylinder when tested in accordance with 5.2,	
a warning (see 7.2.4.1 for guidance).	shall carry a warning (see 7.2.4.1 for guidance).	
This requirement applies to toys and toys containing	This requirement is not applicable to small parts liberated	
removable components, intended for children under 8 years,	after testing in accordance with 5.22.2 (drop test). (For	
when they produce small parts after conducting the drop test	children 36 months and over but under 96 months (8 years))	
specified in 5.22.2.		

Safety of toys — Part 1:

Safety aspects related to mechanical and physical properties

1 Scope

The requirements in this part of the Toy Safety Standard (hereinafter referred to as "ST Standard") apply to all toys, i.e. any product or material designed or clearly intended for use in play by children under 14 years of age.

They are applicable to a toy as it is initially received by the consumer and, in addition, they apply after a toy is subjected to reasonably foreseeable conditions of normal use and abuse unless specifically noted otherwise.

The requirements of this part of ST Standard specify acceptable criteria for structural characteristics of toys, such as shape, size, contour, spacing (e.g. rattles, small parts, sharp points and edges, and hinge-line clearances) as well as acceptable criteria for properties peculiar to certain categories of toy (e.g. maximum kinetic energy values for non-resilient-tipped projectiles and minimum tip angles for certain ride-on toys).

This part of ST Standard specifies requirements and test methods for toys intended for use by children in various age groups from birth to 14 years of age. The requirements vary according to the age group for which a particular toy is intended. The requirements for a particular age group reflect the nature of the hazards and the expected mental and/or physical abilities of a child to cope with them.

This part of ST Standard does not purport to cover or include every conceivable potential hazard of a particular toy or toy category.

This part of ST Standard has no requirements for those characteristics of toys which represent an inherent and recognized hazard which is integral to the function of the toy.

EXAMPLE: An example of such a hazard is the sharp point necessary for the proper function of a needle. The needle is a hazard which is well understood by the purchaser of a toy sewing kit, and the functional sharp-point hazard is communicated to the user as part of the normal educational process of learning to sew as well as at the point of purchase by means of cautionary labelling on the product's packaging.

The requirements of this standard do not release parents or the persons in charge of caring for a child from their responsibility of watching over the child while he or she is playing.

The requirements of this standard aim at reducing as far as possible the hazards considered to be commonly posed by toys (e.g. hazards caused by toy materials, hazards specific to children of the intended age group, or hazards specific to characteristics of different kinds of toys).

Most toys are likely to avoid causing accidents by conforming to this Standard.

sound pressure — Survey method using an enveloping measurement surface over a reflecting plane

- ISO 4287, Geometrical Product Specifications (GPS) Surface texture: Profile method —

 Terms, definitions and surface texture parameters
- ISO 4593, Plastics Film and sheeting Determination of thickness by mechanical scanning
- ISO 6508-1, Metallic materials Rockwell hardness test Part 1: Test method (scales A, B, C, D, E, F, G, H, K, N, T)
- ISO 11201, Acoustics Noise emitted by machinery and equipment Measurement of emission sound pressure levels at a work station and at other specified positions Engineering method in an essentially free field over a reflecting plane
- ISO 11202, Acoustics Noise emitted by machinery and equipment Measurement of emission sound pressure levels at a work station and at other specified positions Survey method in situ
- ISO 11204, Acoustics Noise emitted by machinery and equipment Measurement of emission sound pressure levels at a work station and at other specified positions Method requiring environmental corrections
- IEC 61672-1, Electroacoustics Sound level meters Part 1: Specifications
- IEC 61672-2, Electroacoustics Sound level meters Part 2: Pattern evaluation tests

3 Terms and definitions (Non-alphabetical order)

For the purposes of this document, the following terms and definitions apply.

3.1 toy

any product or material designed or clearly intended for use in play by children under 14 years of age

3.2 normal use

play modes that conform to the instructions which accompany the toy, and which have been established by tradition or custom, or which are evident from an examination of the toy

3.3 reasonably foreseeable abuse

use of a toy under conditions or for purposes not intended by the supplier, but which can happen, induced by the toy in combination with, or as a result of, common behaviour in a child

EXAMPLE: Deliberate disassembly, dropping or use of a toy for a purpose for which it was not intended.

NOTE: Tests simulating reasonably foreseeable abuse are given in 5.24.

(2) A toy with stuffing materials comprised of small parts or with soft-fillings (e.g. plastic foam) from which pieces can be bitten or torn thereby producing small parts, which fit entirely in the cylinder when tested according to 4.4 (small parts), shall have at least one covering so that, after being tested according to 5.22.6.2 (Tension test for seams in soft-filled (stuffed) toys and beanbag-type toys), it shall not be possible to insert the front part of probe A, as specified in 5.7 (Accessibility of a part or component), through any one opening in the seam or cover material.

4.3.4 Glass and pottery

- (1) Accessible glass and pottery may not be used for toys intended for children under 3 years of age
- (2) Glass may be used for toys intended for children of 3 years of age and over where;
 - ① Its use is necessary to the function of the toys (for example, glass slides in an optical toy);
 - ② Small glass vessels are included in scientific kits and scale models. Where such vessels are intended to be exposed to heat, only borosilicate glass shall be used;
 - ③ Solid glass marbles, solid glass eyes for dolls.

4.4 Small parts

4.4.1 For children under 36 months

Toys intended for children under 36 months, removable components thereof and components liberated during testing in accordance with 5.22 (reasonably foreseeable abuse tests) shall not fit entirely, whatever their orientation, into the small parts cylinder when tested in accordance with 5.2 (small parts test).

The requirement also applies to fragments of toys, including, but not limited to, pieces of flash, slivers of plastics and pieces of foam or shavings.

The following are exempted before and after subjecting the toy to the tests according to Clause 5:

- paper books and other articles made of paper and pieces of paper;
- fuzz;
- textile fabric;
- yarn;
- elastic and string;

4.4.2 For children 36 months and over

Toys and toys containing removable components, intended for children 36 months and over, which fit entirely in the small parts cylinder when tested in accordance with 5.2, shall carry a warning (see 7.2.4.1 for guidance).

This requirement is not applicable to small parts liberated after testing in accordance with 5.22.2 (drop test). (For children 36 months and over but under 96 months (8 years))

(See Reference, article 6)

4.5 Shape, size and strength of certain toys

4.5.1 Squeeze toys, rattles, fasteners, and certain other toys and components of toys

4.5.1.1 General

Soft-filled (stuffed) toys or soft-filled parts of toys or parts made entirely of fabric are exempted from the requirements of 4.5.1.

4.5.1.2 Squeeze toys, rattles, and certain other toys and components of toys

Toys that are specified in the table below;

- a) shall be designed so that no part of the toy protrudes past the base of test template A, when tested in accordance with 5.3,
- b) with nearly spherical, hemispherical, or circular flared ends shall be designed so that such ends do not protrude past the base of the supplemental test template B when tested in accordance with 5.3.
- c) shall conform to the Bite Test (5.3.1).

Applicable toys

- squeeze toys, building blocks and their components and hand-held activity toys intended for children under 18 months;
- rattles:
- pacifiers, teethers and teething toys for children under 18 months;
- legs of baby gyms for children under 18 months.

the following toys with a mass less than 0,5 kg intended for children too young to sit up unaided:

- removable components of toys intended to be strung across a crib, playpen or perambulator;
- removable components of baby gyms.

4.5.1.3 Other toys or components of toys with nearly spherical, hemispherical, circular flared, or dome-shaped ends of toys having a mass less than 0,5 kg and intended for children under 18 months

The requirements of 4.5.1.3 apply only to toys or components of toys where the nearly spherical, hemispherical, circular flared, or dome-shaped end adjoins a shaft, handle, or support that has a smaller cross section.