BRITISH STANDARD

BS EN
14350-1:2004

Child use and care articles — Drinking equipment —

Part 1: General and mechanical requirements and tests

The European Standard EN 14350-1:2004 has the status of a British Standard

ICS 97.190

National foreword

This British Standard is the official English language version of EN 14350-1:2004.

The UK participation in its preparation was entrusted to Technical Committee CW/42, Baby soothers, soother holders, which has the responsibility to:

— aid enquirers to understand the text;

— present to the responsible international/European committee any enquiries on the interpretation, or proposals for change, and keep the UK interests informed;

— monitor related international and European developments and promulgate them in the UK.

A list of organizations represented on this committee can be obtained on request to its secretary.

Cross-references

The British Standards which implement international or European publications referred to in this document may be found in the *BSI Catalogue* under the section entitled "International Standards Correspondence Index", or by using the "Search" facility of the *BSI Electronic Catalogue* or of British Standards Online.

This publication does not purport to include all the necessary provisions of a contract. Users are responsible for its correct application.

Compliance with a British Standard does not of itself confer immunity from legal obligations.

This British Standard was published under the authority of the Standards Policy and Strategy Committee on 26 November 2004

Summary of pages

This document comprises a front cover, an inside front cover, the EN title page, pages 2 to 24, an inside back cover and a back cover.

The BSI copyright notice displayed in this document indicates when the document was last issued.

Amendments issued since publication

Amd. No.	Date	Comments

ISBN 0 580 44911 4

EUROPEAN STANDARD

NORME EUROPÉENNE

EUROPÄISCHE NORM

EN 14350-1

August 2004

ICS 97.190

English version

Child use and care articles - Drinking equipment - Part 1: General and mechanical requirements and tests

Articles de puériculture - Articles pour l'alimentation liquide - Partie 1: Exigences générales et mécaniques et essais

Artikel für Säuglinge und Kleinkinder - Artikel für flüssige Kindernahrung - Teil 1: Allgemeine und mechanische Anforderungen und Prüfungen

This European Standard was approved by CEN on 30 April 2004.

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 Central Secretariat 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 Central Secretariat has the same status as the official versions.

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

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

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

Ref. No. EN 14350-1:2004: E

Contents

page

Foreword

This document EN 14350-1:2004 has been prepared by Technical Committee CEN/TC 252 “Child use and care articles”, the secretariat of which is held by AFNOR.

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 2005, and conflicting national standards shall be withdrawn at the latest by February 2005.

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

This European Standard EN 14350 "Child use and care articles – Drinking equipment" consists of the following parts:

– *Part 1: General and mechanical requirements and tests*

– *Part 2: Chemical requirements and tests*

Introduction

This document establishes minimum safety requirements and gives appropriate test methods for children's drinking equipment.

The complete document harmonises for the first time minimum safety requirements and test methods for children's drinking equipment. Some of the provisions have been taken from other existing national and European Standards and for these provisions the Technical Committee has relied on previous validation.

It is not permitted to claim compliance with individual parts of this document. Any claim relates to all published parts.

A significant choking hazard can arise if the component parts of drinking equipment become separated during use. This hazard is addressed in this document by the inclusion of a security test. However, as the fixing of such products to the container is user-dependent, the risk of an accident cannot be completely eliminated. This document sets out labelling requirements stating that parents or carers should not leave children unattended whilst being fed with a product containing a feeding teat or drinking accessory and that children should not be allowed to use feeding teats as a soother.

The Technical Committee considered the possibility of standardizing both the sizes of feeding teats and ranges of flow rates. However, it was decided that the many combinations of container systems in use precluded the standardization of sizes. It is recommended that all container and feeding teat combinations used are matched components.

The provision of meaningful flow rate information is difficult because of several factors including hole diameter, teat thickness, hole shape /type of feed, and also how individual infants suck the teat. Accordingly, it was decided not to include a test for flow rate but to recommend that manufacturers provide information on flow rate and hole size that is appropriate to their particular product.

It is recommended that manufacturers and suppliers operate to EN ISO 9001 [1] standard for quality management systems.

1 Scope

This part of this document specifies general and mechanical requirements for materials to be used for the manufacture of:

— Re-usable feeding teats and drinking accessories;

— Re-usable feeding bottles and drinking cups;

— Single-use feeding bottles, feeding teats, feeding bags and drinking accessories, which do not contain fluid when purchased.

It includes test methods for the mechanical safety requirements specified.

It does not apply to drinking equipment designed for medical applications or for use under medical supervision.

This document is not applicable to soothers. Safety requirements and test methods for soothers are specified in EN 1400-1, EN1400-2 and EN 1400-3.

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

EN ISO 2409, *Paints and varnishes - Cross-cut test (ISO 2409:1992)*.

EN ISO 3696, *Water for analytical laboratory use - Specification and test methods (ISO 3696:1987).*

ISO 188, *Rubber, vulcanized or thermoplastic - Accelerated ageing and heat resistance tests*.

3 Terms and definitions

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

3.1
feeding teat
substitute mother‘s nipple that when attached to a container permits a child to obtain fluid by suckling

3.2
drinking accessory
any device other than a feeding teat which permits a child to obtain fluid from a container

EXAMPLE feeding spout

3.2.1
straw
hollow tube drinking accessory through which fluid is sucked

3.3
container
either a feeding bottle, drinking cup or feeding bag

3.3.1
feeding bottle
container which is capable of holding a fluid and incorporates a graduated scale suitable for visual measurement and is intended for feeding a child through a feeding teat or drinking accessory

3.3.2
drinking cup
container other than a feeding bottle or feeding bag capable of holding a fluid intended for feeding a child

3.3.3
feeding bag
bag capable of holding fluid and supported for use by a holder

NOTE Feeding bags are also known as feeding liners

3.4
locking ring
component used to secure a feeding teat or drinking accessory to a container

3.5
sealing disc
component used to create a seal between the container and the locking ring

3.6
protective cover
component to cover a feeding teat or drinking accessory

3.7
matched components
any of the above defined components which are used together whilst feeding a child

3.8
numbered graduations
numbered markings which indicate the volume of fluid within the container

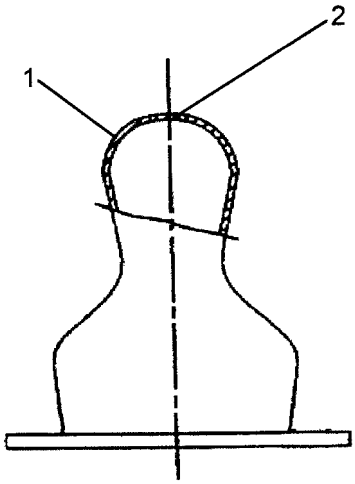
3.9
single-use feeding teat, drinking accessory or container
any item of drinking equipment sold for single-use

3.10
re-usable
component intended to be used again after first use

3.11
protrusions
drinking accessory, feeding teat or spoon, excluding straws

4 Description

Figures 1, 2, 3, 4 and 5 illustrate typical examples of different items of drinking equipment and their design features.



Key

1 Nipple
2 Feeding Hole/Holes

Figure 1 — Design features of a feeding teat

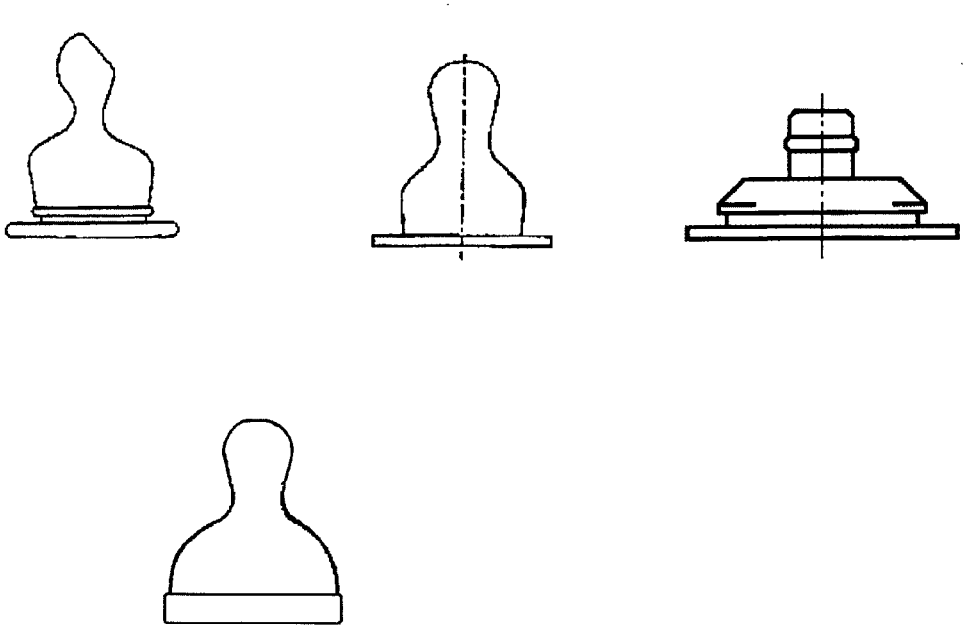
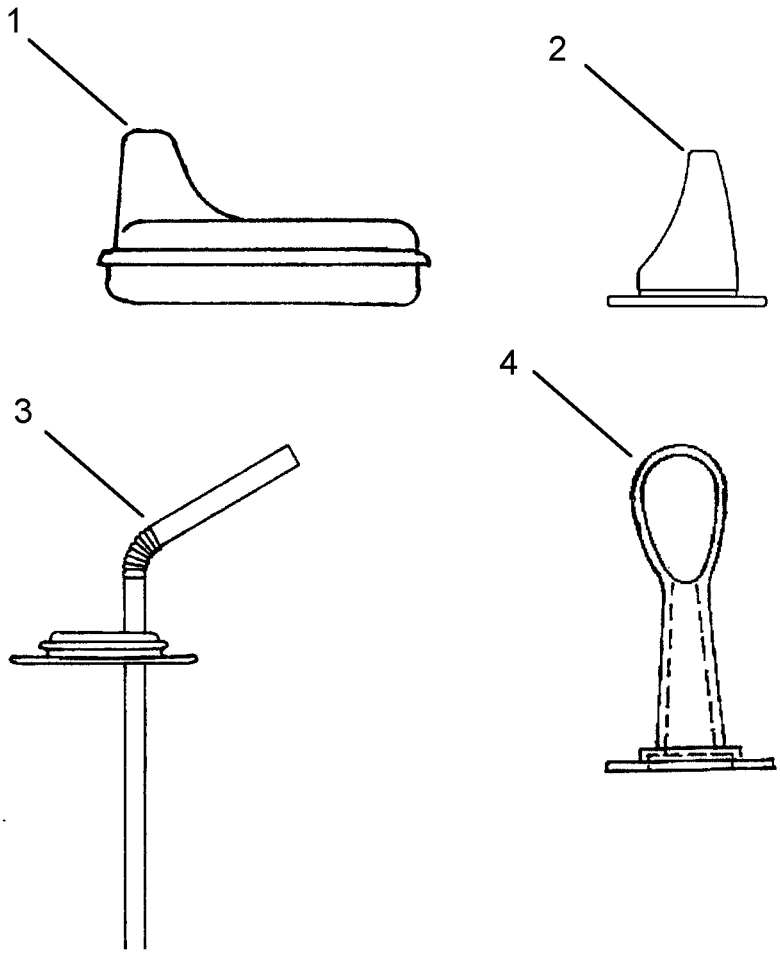


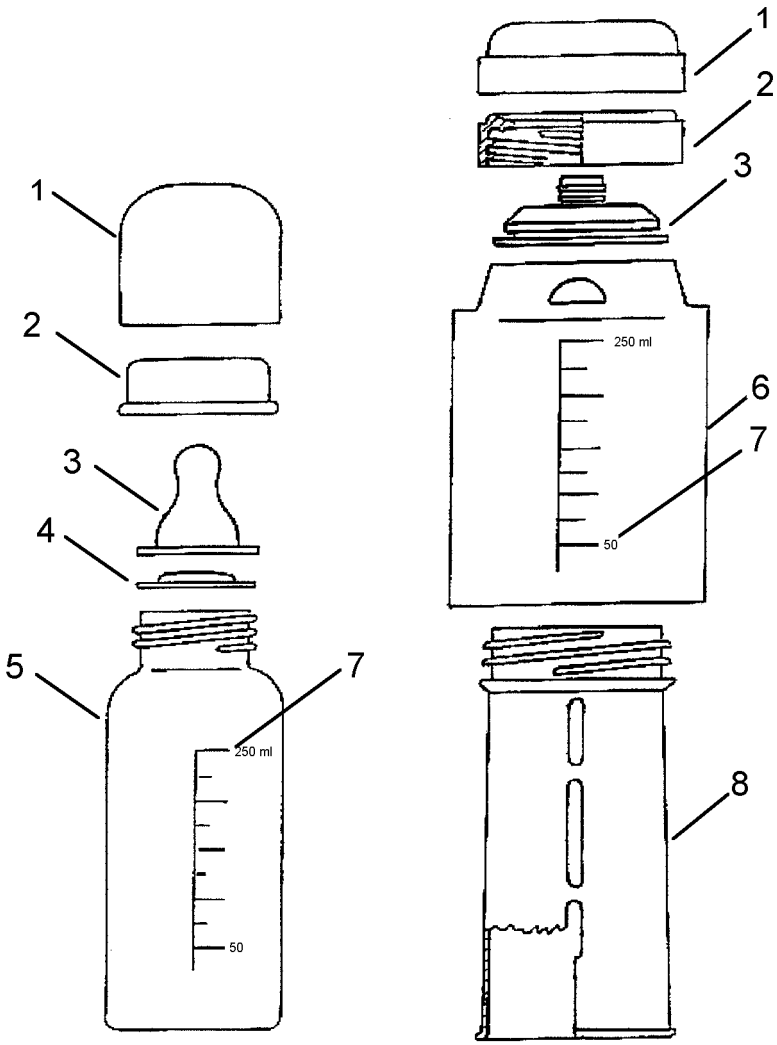
Figure 2 — Examples of feeding teats



Key

1 Feeding spout
2 Trainer spout
3 Straw
4 Trainer spoon

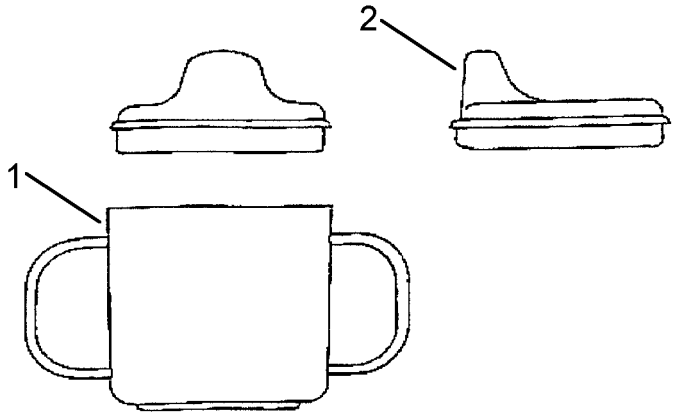
Figure 3 — Examples of drinking accessories



Key

1 Protective cover
2 Locking ring
3 Feeding teat
4 Sealing disc
5 Feeding bottle
6 Feeding bag
7 Numbered graduations
8 Holder for feeding bag

Figure 4 — Examples of containers with feeding teats



Key

1 Drinking cup

2 Drinking accessory/feeding spout

Figure 5 — Example of container with drinking accessory

5 Requirements

5.1 General

Drinking equipment shall conform to 5.2 to 5.10.

5.2 Visual and tactile examination

All components of drinking equipment when assembled for use shall be free from points and edges which are likely to cause injury.

5.3 Small parts

All parts which are designed to be detached (e.g. for cleaning) shall not fit entirely within the small parts cylinder (see Figure 6) in any orientation and without compression.

Dimensions in millimetres

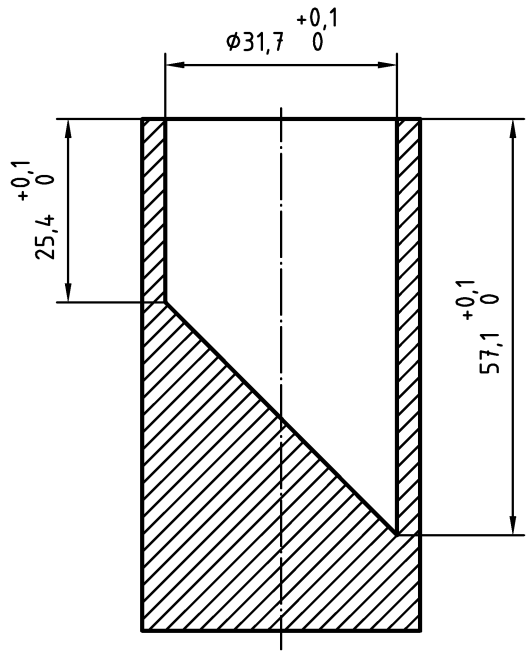


Figure 6 — Small parts cylinder

5.4 Volume

5.4.1 Volumetric labelling

5.4.1.1 All feeding bottles, but not necessarily drinking cups, shall be marked with graduations at least in millilitres.

5.4.1.2 Feeding bottles

All feeding bottles shall be marked at least once with the letters “ml”.

NOTE 1 Additional units for measurement can be used if applicable.

NOTE 2 Although this document only requires the provision of numbered graduations, further unnumbered graduations in any position, may be provided.

The lowest numbered graduation shall not be more than 60 ml.

The highest numbered graduation shall be equal to the nominated maximum measurable use of the feeding bottle or container, e.g. 125 ml, 250 ml, 320 ml.

The gap between numbered graduations shall not exceed 60 ml.

5.4.1.3 Drinking cups

Where drinking cups have one or more numbered graduations, the letters “ml“ shall appear at least once.

NOTE 1 Additional units for measurement can be used if applicable.

Where a single numbered graduation is present on drinking cups it shall indicate the nominated maximum measurable use of the drinking cup, e.g. 125 ml, 250 ml, 320 ml.

Where more than one numbered graduation is present on drinking cups, the gap between graduations shall not exceed 60 ml.

5.4.2 Volumetric accuracy

When tested in accordance with 6.4 the volumetric accuracy of numbered graduations on feeding bottles and drinking cups (if marked with numbered graduations), shall be as follows:

- numbered graduations ≥ 100 ml: ± 5 %;
- numbered graduations < 100 ml: ± 5 ml.

5.5 Resistance to tearing

When tested in accordance with 6.3, no feeding teats, drinking accessories (with the exception of drinking straws) which punctures in 6.3.1, shall break, tear or separate.

5.6 Additional requirements for re-usable products

5.6.1 Resistance to boiling water

When tested in accordance with 6.1.1, there shall be no visual deformation or damage.

5.6.2 Print adhesion of markings and decorations

When tested in accordance with EN ISO 2409, no print from marked graduations or decorations, shall be removed from any products except ‘single-use‘ items.

NOTE Where there is insufficient printed area as specified in EN ISO 2409, the largest print area available on the container should be used.

5.6.3 Thermal shock

When tested in accordance with 6.5 no part of any product, shall crack or break.

5.7 Additional requirements for sealing discs

The minimum diameter of a sealing disc shall be 35 mm.

5.8 Requirements for matched components

5.8.1 Includes protrusions

When tested in accordance with 6.6, any individual item of matched components (with the exception of a drinking straw) that includes a protrusion and that passes through templates A and B (see Figure 10) or protrudes from the base of the templates shall meet the requirements of 5.9.

5.8.2 Includes straws

When tested in accordance with 6.6, any individual item of matched components that includes a straw and that passes through templates A and B (see Figure 10) or protrudes from the base of the templates shall meet the requirements of 5.10.

5.9 Requirements for protrusions

The maximum length of any protrusion shall be 100 mm when fixed in the normal position of use. Measure the maximum length emerging from the container.

When tested in accordance with 6.7 no part of a protrusion shall break, tear or separate from the container.

When tested in accordance with 6.8 the protrusion shall collapse to less than 40 mm.

5.10 Requirements for straws

When the base of the straw is in contact with the inside base of the container, the maximum length of a straw shall be 100 mm from the top of the locking ring or when no locking ring exists from where it emerges from the container.

When tested in accordance with 6.8 the straw shall collapse to less than 40 mm.

6 Tests

6.1 Preparation of samples

6.1.1 Re-usable

Vulcanised rubber and thermoplastic elastomer products (but not silicone products) taken directly from the manufacturer prior to being placed on the market, shall be artificially aged for seven days in an aerated drying cabinet at a temperature of (70 ± 2) °C (as described in ISO 188).

All samples shall be totally immersed in boiling water conforming to EN ISO 3696, Grade 3, for 10 min without touching the walls of the container and then conditioned in accordance with 6.1.3.

NOTE This procedure is designed to remove any surface coating remaining from manufacturing processes and to ensure that the construction and materials used are stable in boiling water.

New samples, preferably from the same batch, shall be used for each test.

6.1.2 Single-use

All samples shall be conditioned in accordance with 6.1.3.

New samples, preferably from the same batch, shall be used for each test.

6.1.3 Conditioning

All samples shall be conditioned for at least 40 h, in a standard atmosphere (as described in EN ISO 291) at a temperature of (23 ± 2) °C and relative humidity of (50 ± 5) %.

Samples shall remain in the conditioning atmosphere until just before the test is carried out. The tests may be carried out in a non-conditioned room.

6.2 Order of testing

The different product types shall be subjected to the appropriate tests in the order shown in Figure 7.

New samples, preferably from the same batch, shall be used for each test.

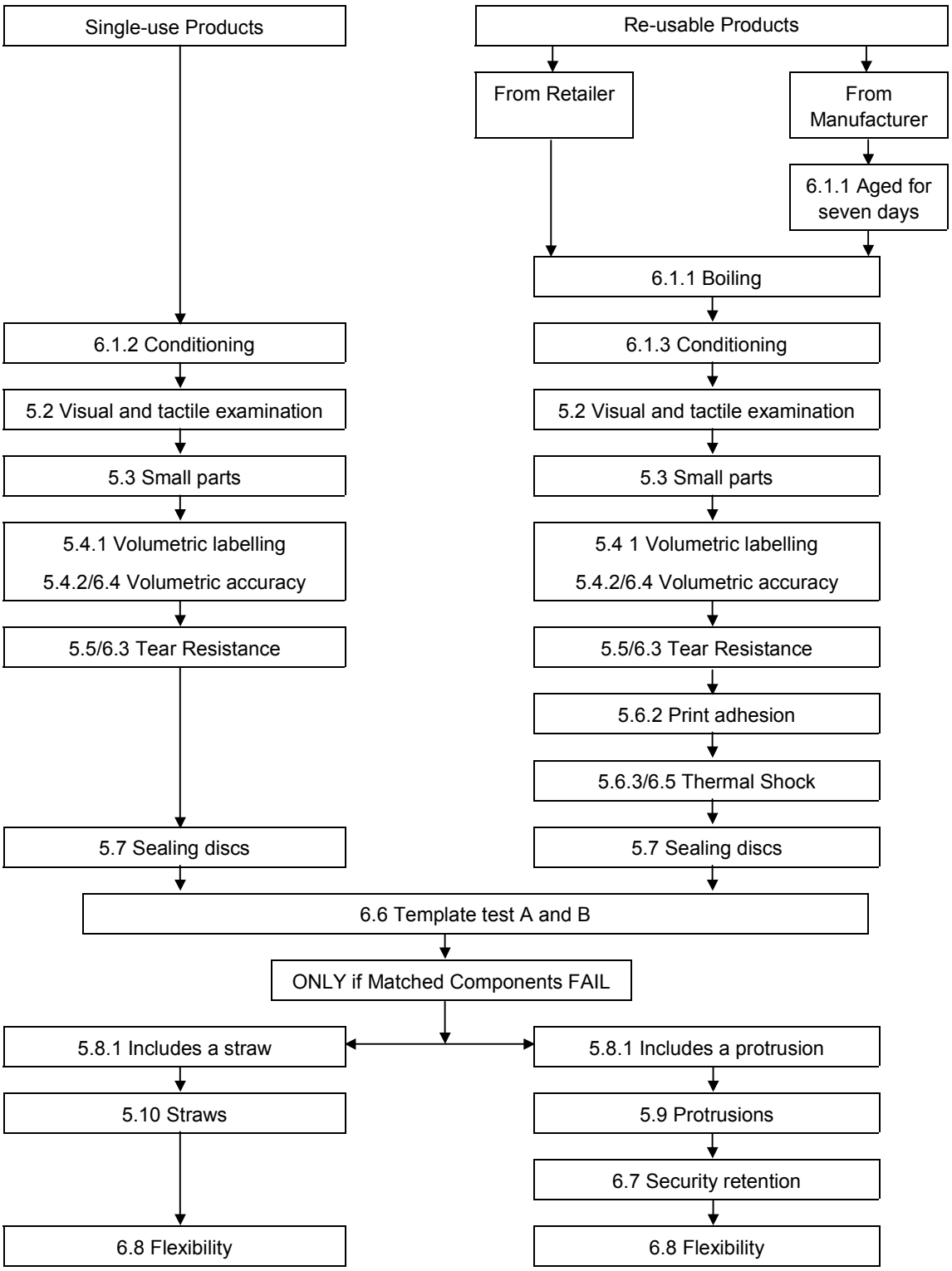


Figure 7 — Order of testing

6.3 Tear resistance test

6.3.1 Test method

For feeding teats and drinking accessories, place the teat or accessory on a cutting board of at least 10 mm thickness and (70 ± 5) Shore D hardness (see Figure 8).

NOTE This Shore Hardness is equivalent to 97 IRHDs.

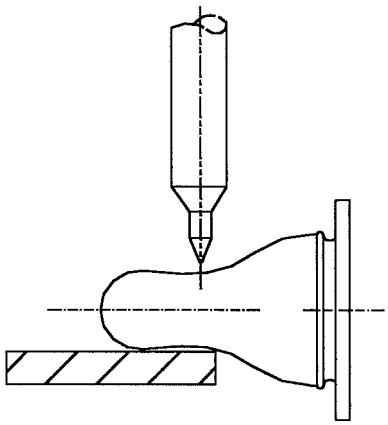


Figure 8 — Position of teat for tear resistance

Place the tip of the indentor (see Figure 9) centred over, and at right angles to, the major axis of the teat or accessory, in the region of the waist or neck of the nipple of the teat (i.e. 15 mm to 20 mm) from the tip of the nipple or 15 mm to 20 mm from the end of the accessory.

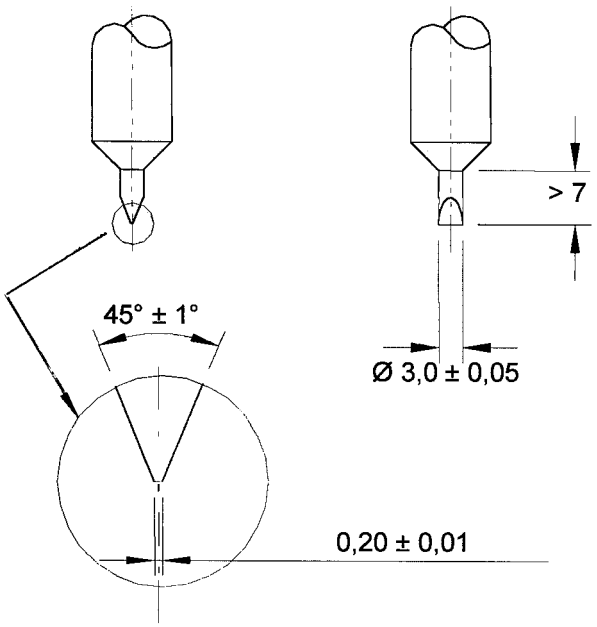
In the case of a feeding teat or drinking accessory not having a circular cross-section, the indentor shall be placed over the flattened surfaces of the neck of the teat or the flattened surfaces of the drinking accessory.

At a cross head speed of (10 ± 5) mm/min apply a force of (200 ± 10) N for (1 ± 0,5) s (see Figure 8).

If the indentor punctures the component, test in accordance with 6.3.2.

NOTE Before use, the tip of the indentor should be visually inspected. If any damage is observed, the indentor should not be used as the results of the test may be affected.

Dimensions in millimetres



NOTE 1 All dimensions with a tolerance are machined as EN ISO 1302 [2] to Ra 0,4

NOTE 2 Material: H13 high chrome tool steel or equivalent. Harden to 45-50 Rockwell C

Figure 9 — Sample indentor

6.3.2 Tensile test

For feeding teats and drinking accessories, suitable fixing devices shall be used to hold opposite ends of the component securely, along the major axis.

Apply a force of (5 ± 2) N along the major axis to align the specimen before increasing the force to (90 ± 5) N for (10 ± 0,5) s at a crosshead speed of (200 ± 10) mm/min. Maintain for (10 ± 0,5) s.

Clamps or other devices shall hold the components securely during the test without causing damage which might affect the test result. Any results where such damage occurs should be disregarded.

6.4 Volumetric accuracy test

Fill the container with pre-boiled water at (20 ± 5) ºC to each of the following three numbered graduations:

– lowest numbered graduation;

– highest numbered graduation;

– numbered graduation where present, approximately halfway between the lowest and the highest numbered graduations;

Check the mass of the water using a balance, with an accuracy of ± 0,1 g.

Ensure that the base of the meniscus of the water is level with the marked line of the graduation.

6.5 Thermal shock test

Place the sample in boiling water for $\left(10^{+2}_{0}\right)$ min. Remove, and place immediately in water at $\left(5^{\ 0}_{-5}\right)$ °C for $\left(10^{+2}_{0}\right)$ min.

The sample shall be examined for cracks or breaks.

6.6 Template test

Each individual component which is used in combination whilst feeding a child shall be tested using Template A and B (see Figure 10).

Dimensions in millimetres

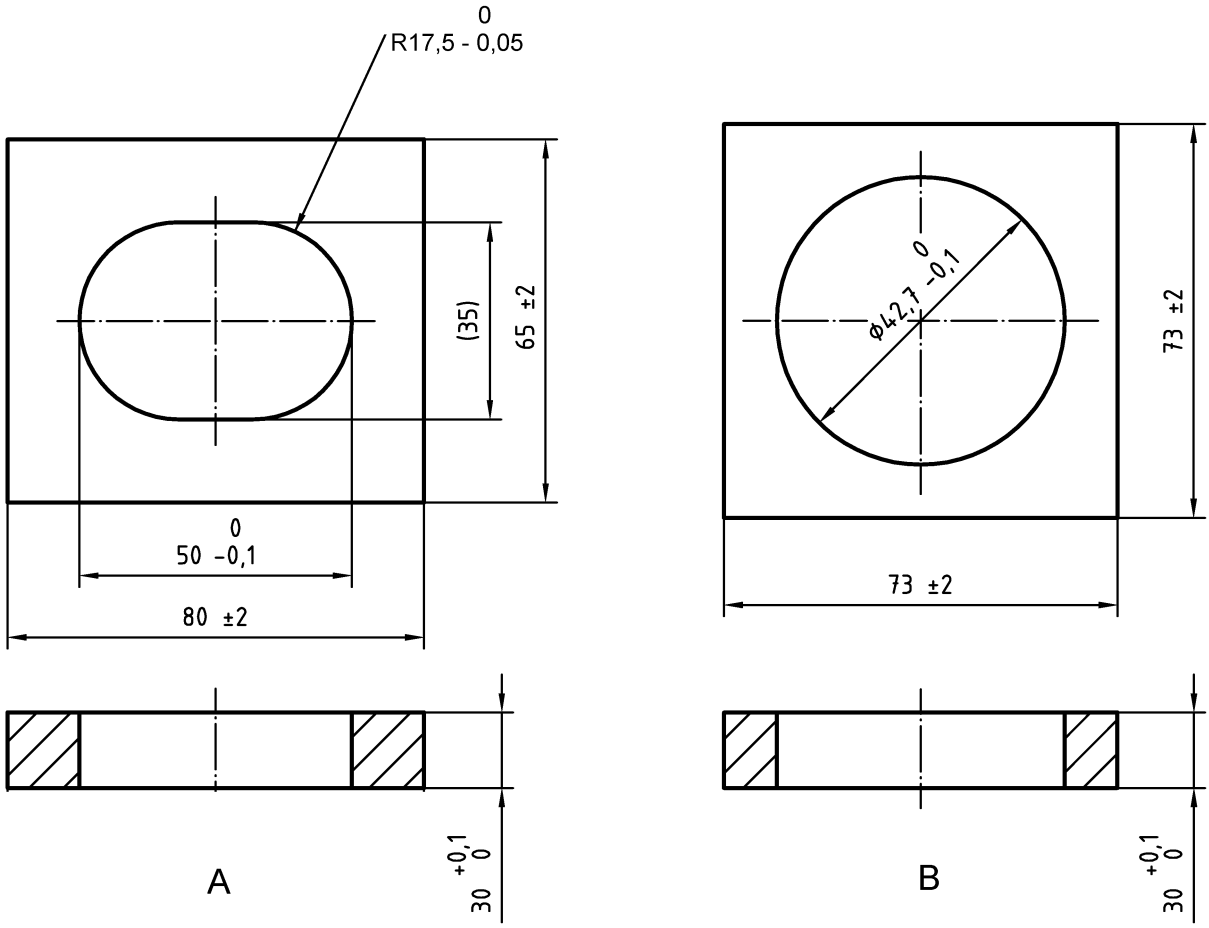


Figure 10 — Test Templates A and B

Orientate the component to be tested in a position which would most likely permit the entry of the component through the slot in the test template. Using only the mass of the component, check if it passes through the slot or whether any part protrudes beyond the base of the template.

6.7 Security/retention test

6.7.1 Principle

The purpose is to test the security of protrusions (drinking accessory, feeding teat or spoon), as fitted in the normal in-use configuration, that is where applicable, with locking ring, lid, bottle or cup. Protrusions (see 3.11) that fail to comply with 5.8 shall be tested in combination with all their matched components.

6.7.2 Test procedure

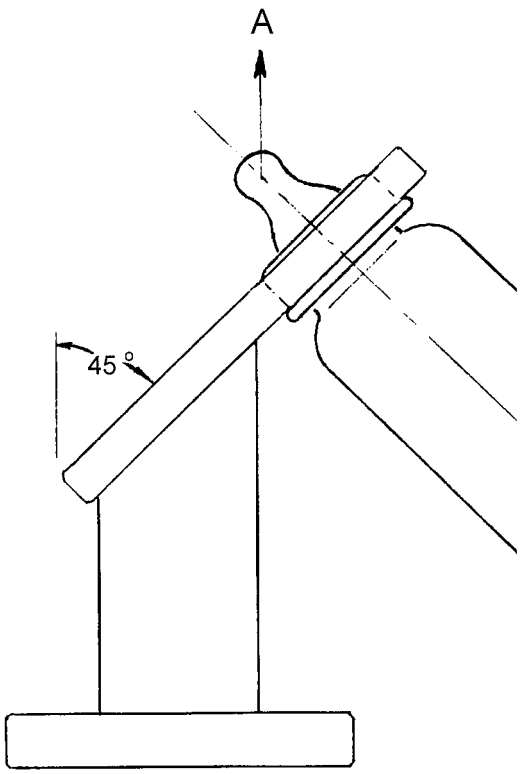
Where a locking ring is provided, tighten it to a torque of (1,75 ± 0,25) Nm. Alternatively fit all the individual parts of the assembly together.

Secure the container at an angle of 45° to the major axis (see Figure 11).

Using a suitable clamping device, hold either (10 ± 2) mm of the tip of the nipple of the teat or (10 ± 2) mm of the sides of the accessory which have been compressed together in line with the major axis.

Apply a pre-load of (5 ± 2) N at 45 degrees to the major axis of the feeding teat or drinking accessory to ensure alignment, prior to increasing the force to (60 ± 5) N in the same direction, at a crosshead speed of (200 ± 5) mm/min. Maintain for (10 ± 0,5) s.

NOTE Clamps or other devices should hold the components securely during the test without causing damage which might affect the test result. Any results where such damage occurs should be disregarded.



Key

A Direction of tensile force

Figure 11 — Fixture for security/retention test

6.8 Flexibility test

6.8.1 Principle

A force is applied to the end of the protrusion or straw using a steel plate and the point at which the protrusion or straw bends is measured

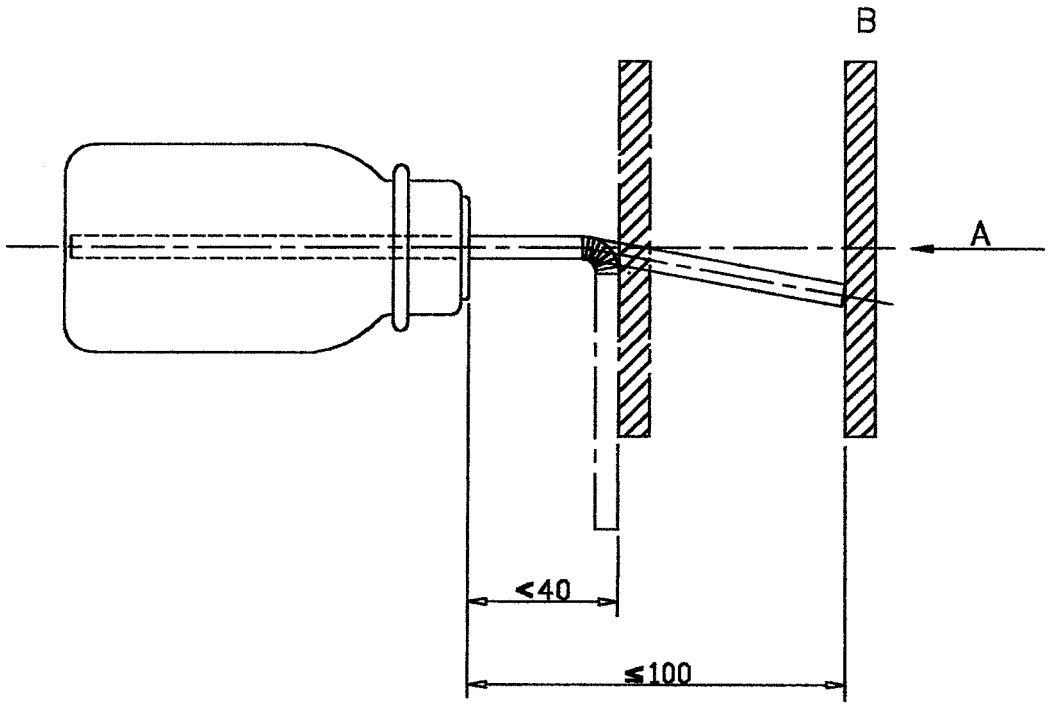
6.8.2 Method

Assemble the protrusion (or straw) with its matched component (s) including the container. Clamp the container in a suitable device.

Apply a force of (10 ± 1) N at a crosshead speed of (10 ± 2) mm/min to a 100 mm x 100 mm polished steel plate positioned at right angles to the major axis of the protrusion (see Figure 12). The end of the protrusion can be moved a maximum of 5° off the major axis at the start of the test.

Measure the length from the locking ring to where the protrusion (or straw) bends. If no locking ring exists measure the length from where the protrusion (or straw) emerges from the container to where the protrusion (or straw) bends.

Dimensions in millimetres



Key

A Direction of force
B Steel Plate

Figure 12 — Example of flexibility test

7 Consumer packaging

The pack as received by the consumer shall include clear, legible instructions for the use, and hygienic care of the drinking equipment.

These instructions for use shall be given as described in Clause 8.3 and may be included on a separate leaflet placed inside the packaging or in/on the product.

Feeding teats sold separately shall be in a clean condition in closed packs.

8 Product information

8.1 General

The text shall be printed in the official languages of the country of retail sale. If other languages are included, they shall be easy to distinguish, e.g. by separate presentation.

The text shall be clearly legible. Sentences shall be short and of simple construction. The words used shall be uncomplicated and in everyday use.

NOTE It is recommended that products or packaging be batch coded.

8.2 Purchase information

The following information shall be visible at the point of retail sale:

NOTE Some examples are: on the packaging, on a leaflet placed inside the product but which is visible at the point of sale; printed on the side of the product.

1) name, trademark or other means identification, and the address of the manufacturer, distributor or retailer. The particulars may be abbreviated provided that the abbreviation enables the manufacturer, the distributor or the retailer to be identified and easily contacted;

2) number of this document, but not year;

3) instructions for use given in 8.3, or if these are included in a leaflet within the packaging, a note indicating that this is the case;

4) for products containing natural rubber latex the following information shall be given:

“Produced from natural rubber latex which may cause allergic reactions.”

5) for products containing straws, the following warning shall be given:

“Straws are not suitable for a child under 6 months.”

6) for products containing feeding teats and drinking accessories an indication of the container for which they are suitable shall be provided;

NOTE It is recommended that for feeding teats, additional information on flow rate, hole size or type of use of the feeding teats should be given.

A claim for compliance with EN 14350 “Child use and care articles – Drinking equipment” shall relate to all published parts. It is not allowed to claim compliance with only part of the standard.

8.3 Instructions for use

The following information shall be provided:

1) information for the safe use of the product;

2) unsuitable common methods of heating which might damage the product.

For re-usable products the following additional instructions shall be provided:

1) at least one method of cleaning;

2) before first use, clean the product;

3) unsuitable common methods of cleaning, storage and use which might damage the product.

For products with feeding teats the following **warnings** shall be provided in the form given:

For your child's safety and health

WARNING!

Always use this product with adult supervision.

Never use feeding teats as a soother.

Continuous and prolonged sucking of fluids will cause tooth decay.

Always check food temperature before feeding.

For products with drinking accessories the following **warnings** shall be provided in the form given:

For your child's safety and health

WARNING!

Always use this product with adult supervision.

Continuous and prolonged sucking of fluids will cause tooth decay.

Always check food temperature before feeding.

NOTE It is recommended that the supplier of drinking equipment include informative literature to explain the reasons and background for these warnings. Examples of possible phrases are:

Accidents have occurred when babies have been left alone with drinking equipment due to the baby falling or if the product has disassembled.

Tooth decay in young children can occur even when non-sweetened fluids are used. This can occur if the baby is allowed to use the bottle/cup for long periods through the day and particularly through the night, when saliva flow is reduced or if it is used as a soother.

Heating in a microwave oven may produce localised high temperatures.

The following additional **warnings** shall be provided if applicable in the form given.

For glass bottles:

Glass bottles may break.

For products containing sealing discs or protective covers:

Keep all components not in use out of the reach of children.

For single-use products:

Single-use only.

For products containing natural rubber latex:

Produced from natural rubber latex which may cause allergic reactions.

NOTE It is recommended that more information relating to possible allergic reactions should be given.

For every product containing a feeding teat the following instructions shall be provided although alternative wording is permitted. Further instructions may also be provided.

1) Inspect before each use and pull the feeding teat in all directions. Throw away at the first signs of damage or weakness.

2) Do not leave a feeding teat in direct sunlight or heat, or leave in disinfectant (“sterilising solution”) for longer than recommended, as this may weaken the teat

3) Before first use place in boiling water for 5 minutes. This is to ensure hygiene.

4) Clean before each use.

For products where microwave heating is recommended as a suitable method of food preparation the following instructions shall be provided although alternative wording is permitted. Further instructions may also be provided.

Take extra care when microwave heating. Always stir heated food to ensure even heat distribution and test the temperature before serving.

Annex A
(informative)

A-deviations

A-deviation: National deviation due to regulations, the alteration of which is for the time being outside of the competence of the CEN/CENELEC member.

This European Standard does not fall under any Directive of the EC.

In the relevant CEN/CENELEC countries these A-deviations are valid instead of the provisions of the European Standard until they have been removed.

Clause	Deviation
8.2	Danish deviation in accordance with Danish Statutory Order from the Ministry of the Environment No 51 of 10 February 1986 0n Soothers and Bottle teats, Part 2, Section 4:

"All manufacturers, importers and agents shall provide the sales packaging of soothers and bottle teats with a legible, visible and permanent marking stating:

1. name/company, name and address or registered trade mark;
2. **batch number or equivalent reference;**
3. commercial name of the soother or bottle teat."

Bibliography

[1] EN ISO 9001, *Quality management systems – Requirements (ISO 9001:2000).*

[2] EN ISO 1302, *Geometrical Product Specification (GPS) – Indication of surface texture in technical product documentation (ISO 1302:2002).*

EN 1400-1, *Child use and care articles - Soothers for babies and young children - Part 1: General safety requirements and product information*.

EN 1400-2, *Child use and care articles - Soothers for babies and young children - Part 2: Mechanical requirements and tests*.

EN 1400-3, *Child use and care articles - Soothers for babies and young children - Part 3: Chemical requirements and tests*.

BSI — British Standards Institution

BSI is the independent national body responsible for preparing British Standards. It presents the UK view on standards in Europe and at the international level. It is incorporated by Royal Charter.

Revisions

British Standards are updated by amendment or revision. Users of British Standards should make sure that they possess the latest amendments or editions.

It is the constant aim of BSI to improve the quality of our products and services. We would be grateful if anyone finding an inaccuracy or ambiguity while using this British Standard would inform the Secretary of the technical committee responsible, the identity of which can be found on the inside front cover. Tel: +44 (0)20 8996 9000. Fax: +44 (0)20 8996 7400.

BSI offers members an individual updating service called PLUS which ensures that subscribers automatically receive the latest editions of standards.

Buying standards

Orders for all BSI, international and foreign standards publications should be addressed to Customer Services. Tel: +44 (0)20 8996 9001. Fax: +44 (0)20 8996 7001. Email: orders@bsi-global.com. Standards are also available from the BSI website at http://www.bsi-global.com.

In response to orders for international standards, it is BSI policy to supply the BSI implementation of those that have been published as British Standards, unless otherwise requested.

Information on standards

BSI provides a wide range of information on national, European and international standards through its Library and its Technical Help to Exporters Service. Various BSI electronic information services are also available which give details on all its products and services. Contact the Information Centre. Tel: +44 (0)20 8996 7111. Fax: +44 (0)20 8996 7048. Email: info@bsi-global.com.

Subscribing members of BSI are kept up to date with standards developments and receive substantial discounts on the purchase price of standards. For details of these and other benefits contact Membership Administration. Tel: +44 (0)20 8996 7002. Fax: +44 (0)20 8996 7001. Email: membership@bsi-global.com.

Information regarding online access to British Standards via British Standards Online can be found at http://www.bsi-global.com/bsonline.

Further information about BSI is available on the BSI website at http://www.bsi-global.com.

Copyright

BSI
389 Chiswick High Road
London
W4 4AL