



NA 020 Normenausschuss Eisen-, Blech- und Metallwaren (NAEBM) NA 020-00-08 AA Arbeitsausschuss Öffnungen von Briefkästen E-Mail des Bearbeiters im DIN: kirschner naebm.de@livelink.din.de

prEN 13724 - 6. Arbeitspapier, Reinfassung

Datum des Dokumentes 2010-09-07

Aktion Stellungnahme Antworttermin 2010-09-22

Sehr geehrte Damen und Herren,

mit Dok. CEN/TC331/WG5 N65 erhalten Sie das aktuelle Arbeitspapier prEN 13724, das nach abschließender Prüfung in die CEN-Umfrage geleitet werden soll. Bitte prüfen Sie das Dokument und leiten Sie uns Ihre Stellungnahmen / Änderungsvorschläge in englischer Sprache bis zum **22.09.2010** zu. Vielen Dank.

Mit freundlichen Grüßen

Viktor Kirschner



CEN/TC 331/WG 5 N 65

CEN/TC 331/WG 5

Apertures in letter boxes

E-mail of Secretary: kirschner_naebm.de@livelink.din.de

Secretariat: DIN

prEN 13724 - 6th working draft, clean version

Date of document 2010-09-03

Expected action Comment
Due Date 2010-09-24

Background

Dear all,

please find attached the 6th working draft prEN 13724 which is meant to be forwarded to CEN/TC331 for CEN-enquiry. In case you have any objections please state them clearly by giving a positive proposal for change, the deadline for comments is **2010-09-24**. After this date we will assume that you approve the draft.

Kind regards

Viktor Kirschner

CEN/TC 331

Date: 2010-07

prEN 13724:2010

CEN/TC 331

Secretariat: NEN

Postal services — Apertures of private letter boxes and letter plates — Requirements and test methods

 $Postalische \ Dienstleistungen -- Einwurf\"{o}ffnungen \ von \ Hausbriefk\"{a}sten -- Anforderungen \ und \ Pr\"{u}fungen$

Services postaux — Fenêtres d'introduction de boîtes aux lettres et d'entrées de courrier particulières — Préscriptions et méthodes d'essai

ICS:

Descriptors:

Con	Page Page Page Page Page Page Page Page		
1	Scope		
2	Normative references	4	
3	Terms and definitions	2	
4	Classification	6	
4.1	Aperture types		
4.2	Aperture sizes		
4.3 4.4	Corrosion resistance		
5	Requirements		
5.1	General requirements		
5.2	Components	7	
5.3	Dimensions	7	
5.3.1	Aperature dimensions		
5.3.2	Smaller apertures – Types 1, 2 and 3		
5.3.3	Gauge mail		
5.4	Ergonomics and safety	<u>7</u>	
5.4.1	Installation height of the aperture and lock		
5.4.2 5.4.3	Safety Opening force of the flap		
5.4.4 5.4.4	Closing of the flap		
5.4.5	Fire protection regulations		
5.5	Confidentiality		
5.6	Corrosion and water penetration	8	
5.6.1	Corrosion		
5.6.2	Water penetration (types 1, 3 and 4)	8	
5.7	Security		
5.7.1	Security requirements	9	
5.7.2	Theft prevention - types 1, 2 and 3		
5.7.3	Theft prevention - type 4		
5.7.4	Security and locks - types 1, 2 and 3	12	
5.7.5 5.7.6	Protection against the opening of doors and windows - type 4	12	
	Tests		
6 6.1	General test requirements		
6.2	Components		
6.3	Dimensions.		
6.4	Ergonomics and safety		
6.4.1	Installation height of the aperture and lock	14	
6.4.2	Safety	14	
6.4.3	Opening force of the flap		
6.4.4	Closing of the flap		
6.5	Confidentiality		
6.6	Corrosion and water penetration		
6.6.1	Corrosion	14	
6.6.2	Water penetration		
6.7	Security		
6.7.1 6.7.2	Security requirements		
6.7.3	Theft prevention - types 1, 2 and 3 Theft prevention - type 4		
6.7.4	Security and locks - types 1, 2 and 3	18	
6.7.5	Protection against the opening of doors and windows - type 4	22	

6.7.6	Security – type 4	.22
7	Marking and labelling	.24
Annex	A (normative) Dimensions	.27
Annex	B (informative) Installation height of aperture	.28
Annex	C (informative) Installation height of lock	.29
Annex	D (informative) A-deviations	.30

Foreword

This document (prEN 13724:2010) has been prepared by Technical Committee CEN/TC 331 "Postal services", the secretariat of which is held by NEN.

This document is a working document. It is the seventh working draft.

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(s).

Annex A is normative. Annex B, C and D are informative.

1 Scope

This document specifies the requirements and the test methods of the apertures for the delivery of letter post items when fitted in accordance with the manufacturer's instructions.

It takes into account security, impregnability, safety and performance for the recipient, and ergonomics and efficiency for delivery personnel. It allows the daily delivery in good condition of a great majority of letter post items.

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 1670:2007/AC:2008, Building hardware — Corrosion resistance - Requirements and test methods

ISO 269, Correspondence envelopes —Designation and sizes

3 Terms and definitions

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

3.1

aperture

opening through which a letter post item is delivered

3.2

aperture components

all parts supplied by the manufacturer of the private letter boxes and the letter plates, including installation material

3.3

burglary prevention

protecting against unauthorised opening of doors and windows

3.4

casing

enclosure receiving the letter post items delivered excluding the box door, flap and frame

Kommentar [T1]: Important standard, but seems to be withdrawn. Tim will check with ISO and with ISO/TC6 for a solution.

3.5

delivery floor level

floor level on the delivery side of the aperture, adjacent to the background or door where it is mounted and of sufficient area for the delivery person to stand on

3.6

door installation

installation of a letter plate or private letter box in a door

3.7

flap

pivoted component, generally flat, whose purpose is to cover and/or seal the aperture. Flaps can open inwards or outwards

3.8

frame

parts directly surrounding the aperture

3.9

gauge mail

envelope used to test the clear delivery of letter post items

3.10

key differ

variation between lock mechanism of similar design that allow each lock to be operated by only its corresponding key(s)

3.11

letter plate

aperture with flap located on door, door-side-panel or a wall consisting of a frame, a flap and installation material

3.12

letter post item

item classified according to the speed of processing or the contents

NOTE Classification according to the speed of processing, for example: priority item, non-priority item. Classification according to the contents, for example: letter, postcard, printed paper, literature for the blind and small packet.

3.13

lock mechanism

locking device which is operated mechanically, electronically or by other means provided by the postal operator

3.14

private letter box

receptacle into which mail is delivered at the domicile of the addressee

3.15

receiving floor level

floor level on the receiving side of the aperture of sufficient area, adjacent to the background or door where the recipient is standing

3.16

slide-through box

aperture at the delivery side, item removal at the opposite side

3.17

theft prevention

protection against the theft of letter post items

3.18

grade

category or rank given to different requirements for quality or design validation

4 Classification

4.1 Aperture types

Apertures are classified in this standard in four categories using the following criteria (see 5.7.2 and Figure 2 — Distances for theft prevention).

- a) type 1: apertures of private letter boxes for outdoor use
- b) type 2: apertures of private letter boxes for indoor use
- c) type 3: apertures of slide-through boxes
- d) type 4: apertures of letter plates (fixed to doors or side-panels)

4.2 Aperture sizes

Three sizes are identified (for dimensions see Table A.1 — Dimensions of the aperture)

- a) size 1
- b) size 2
- c) size 3 (not valid for type 4)

4.3 Corrosion resistance

Three grades of corrosion are identified according to EN 1670:2007/AC:2008, (see 5.6.1)

- a) Corrosion grade 0
- b) Corrosion grade 3
- c) Corrosion grade 4

4.4 Security

Three grades of security are identified (see 5.7.4 and 5.7.6)

- a) Security grade 0
- b) Security grade 1
- c) Security grade 2

5 Requirements

5.1 General requirements

The test methods that shall be used to meet these requirements are described in clause 6 using the same sequence as below.

Kommentar [T2]: Check all cross-references!

6

All items shall be installed in accordance with the manufacturer's fixing instructions as supplied with the product.

5.2 Components

Fixing instructions shall be supplied with each individual product enabling the correct installation in accordance with this standard.

The aperture shall be fitted with a flap. This is not necessary if the components are specified for indoor use only.

5.3 Dimensions

5.3.1 Aperature dimensions

The aperture shall have the dimensions given in annex A.

5.3.2 Smaller apertures - Types 1, 2 and 3

Where letter items can be delivered by another means than through the aperture, the aperture dimensions may be smaller than the dimensions given in Table A.1. The means shall be designed so that, when opened, the size of the opening shall meet the minimum requirement of Table A.1. The means shall fulfil the appropriate requirements of clause 5.

5.3.3 Gauge mail

It shall be possible to push gauge mail through the aperture without folding or damaging it. It shall be possible to empty gauge mail from a private letter box without folding or damaging it (types 1, 2 and 3 only).

4 different gauge postal items are identified:

Gauge 1 (flexible): The overall thickness of gauge mail (including the envelope, size C4-ISO [ISO 269]) is 24 mm with a tolerance of + 0 mm and - 1 mm. The envelope shall be filled with A4 papers with a mass per area of 80 g/m^2 .

Gauge 2 (solid): 138 mm × 225 mm × 20 mm

Gauge 3 (solid): 273mm x 238mm x 20mm

Gauge 4 (solid): 229 mm \times 324 mm \times 34,5 mm,

Gauge 3 and 4 shall be used for aperture size 3 only.

Gauge 2, 3 and 4 shall be made of an inflexible material, with a tolerance of \pm 0,2 mm

5.4 Ergonomics and safety

5.4.1 Installation height of the aperture and lock

5.4.1.1 Compliance

Failure to comply with the installation requirements as stated under clause 5.4.1shall result in non-conformity with this standard.

5.4.1.2 Aperture

The installation height of the aperture shall be according to national legislation and regulation, where available. This information shall be included in the installation instructions.

NOTE The manufacturer is free to include information of Annex B in the installation instructions.

5.4.1.3 Lock

The installation height of the locks of all individual types 1, 2 and 3 shall be within 900 mm and 1 300 mm.

In case of sets of types 1, 2 and 3 at least 30% of the locks should be within 900 mm and 1 300 mm.

This information shall be included in the installation instructions.

Informative Annex C, including figures A1 and A2, provides more information on locks.

5.4.2 Safety

To avoid injuries, all components that can be reached when inserting or removing a letter post item shall not have sharp edges.

5.4.3 Opening force of the flap

The force required to fully open the flap shall not exceed 8 N (as shown in Figure 8 — Fastening points, point a).

5.4.4 Closing of the flap

The flap shall be self-closing after a letter post item has been inserted.

5.4.5 Fire protection regulations

The component materials and the location for types 1, 2, 3 or 4 and/or installation within any building shall be in accordance with the requirements for fire protection in staircases and access routes provided for rescue operations as laid down in the relevant planning laws and building regulations.

NOTE It should be referred to national legal and administrative regulations.

5.3.6 Receiver

Means shall be available (e. g. as an optional extra) to ensure that an easy removal of postal items laying flat on a horizontal surface inside type 1, 2 or 3, is possible.

5.5 Confidentiality

Types 1, 2 and 3 should be provided without a sight window. If a sight window is requested, it shall be translucent.

5.6 Corrosion and water penetration

5.6.1 Corrosion

Corrosion resistance shall be in accordance with EN 1670:2007/AC:2008.

Aperture components of types 1, 3 and 4 shall meet grade 3 or better.

For type 2 the corrosion resistance may be grade 0.

5.6.2 Water penetration (types 1, 3 and 4)

Delivered letter post items shall not be affected by water penetration in accordance with 6.5.2. The requirement can only be fulfilled if all openings are closed. The product shall be mounted according to the manufacturer's

instructions without any modification. Tests shall be carried out at a temperature between 10 °C and 30 °C. The environment shall be free from draughts.

NOTE To prevent rainwater or snow entering through apertures, all delivery personnel are recommended to insert all items completely through the aperture at the time of delivery and not to leave part of them outside, ensuring that the flap is closed.

5.7 Security

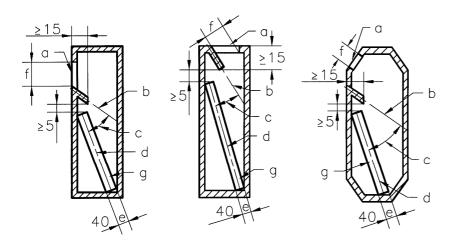
5.7.1 Security requirements

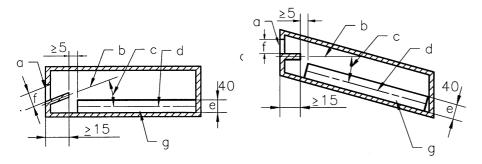
The requirements in this clause are intended to make the theft of letter post items more difficult. For type 4, additional requirements are given to reduce the risk of unauthorised access through the aperture.

5.7.2 Theft prevention - types 1, 2 and 3

If the distance between a 40 mm high pile of letter post and the bottom of the aperture is less than 260 mm, the aperture shall be provided with a security attachment which makes access to and removal of letter post item(s) more difficult (see Figure 2 — Distances for theft prevention). If the security attachment is not in place, the security grade is 0.

Where the aperture conforms to Table A.1 and if the distance, as shown in the theft prevention requirements and shown in Figure 2, is less than 260 mm, the width of the security attachment shall be at least 15 mm. The distance between the rear edge of the security attachment and a pile of size C4 letter post items with a thickness of 40 mm shall be at least 5 mm. The design of the security attachment shall be such that, when referred to the main axis of the letter post item, it has a positive angle of incidence and prevents access to the letter post item without auxiliary means and without the use of force (see Figure 1 — Examples of security attachments).





Key

- a) Example for types 1,2 and 3
- b) Example for types 1,2 and 3
- c) Example for types 1,2 and 3
- d) Example for type 3
- e) Example for type 3
- a Aperture
- b Axis of security attachment
- c Positive angle of postal items
- d Main axis of postal items
- e Stacking height
- f Short side of aperture
- g Pile of letter post items

NOTE The examples are only relevant in respect of the security attachment. The design of the letter boxes is not determined by this standard.

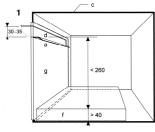
Figure 1 — Examples of security attachments

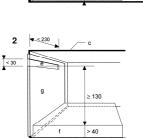
If an aperture with or without a flap is smaller than indicated in Table A.1 - but of a size which makes it possible to remove letter post item(s) whose smallest dimension (length or width) is 90 mm - then the aperture shall be positioned in such a way that the distance between the aperture and the 40 mm high pile of letter post items shall be at least 130 mm (see Figure 2 — Distances for theft prevention).

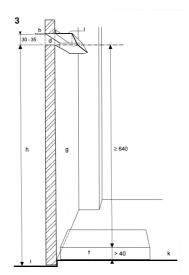
If the distance shown in Figure 2 between the aperture and the 40 mm high pile of letters is less than 125 mm, and if the aperture size is size 3, the security grade is 0.

Figure 2 shows the necessary distances for theft prevention.

Dimensions in millimetres







Key

- Security attachment
- a b Flap
- С Casing
- Aperture confirm Tabel A.1 d e f Aperture smaller 30 mm
- Pile of letter post items
- g h Door
- Installation height of aperture
- Delivery floor level k
- Receiving floor level optional letter plate deflector
- Private letter box
- Letter box with smaller aperture 2.
- 3. Letter plate

Figure 2 — Distances for theft prevention

5.7.3 Theft prevention - type 4

The following requirements shall form part of the installation instructions (see also Table A.1 and Figure 2 — Distances for theft prevention):

If the distance between the bottom of the aperture and the receiving floor level is at least 680 mm, the maximum aperture height may be 40 mm and a security attachment shall not be required.

For distances less than 680 mm, the aperture shall be provided with a security attachment, as shown in figure 6, which makes access to and removal of letter post item(s) more difficult.

Failure to comply with these installation requirements shall result in non-conformity with this standard.

5.7.4 Security and locks - types 1, 2 and 3

Types 1, 2 and 3 private letter boxes shall have adequate strength to resist mechanical forces in accordance with security grades 1 or 2:

- a) grade 1 shall resist a tensile force of 150 N
- b) grade 2 shall resist a tensile force of 220 N.

After the test, the permanent deformation shall be not more than 2 mm for both grades.

Two grades of private letter box door locks are identified which refer to the number of key differs.

- a) security grade 1 shall have a minimum of 200 key differs.
- b) security grade 2 shall have a minimum of 500 key differs.

The manufacturer of the private letter boxes shall ensure that the specified key differs are available and used. It is not sufficient that the lock has the theoretical possibility of the specified key differs.

5.7.5 Protection against the opening of doors and windows - type 4

The following requirements shall form part of the installation instructions:

A letter plate shall not be fitted within 400 mm of a door or window lock unless an auxiliary locking device is also fitted more than 400 mm from the letter plate. If the door or window can be locked from the inside with a key and the key withdrawn, these requirements do not apply.

If a box is placed behind the letter plate, it shall meet all the requirements for types 1, 2 and 3.

Failure to comply with these installation requirements shall result in non-conformity with this standard.

5.7.6 Security - type 4

Letter plates shall be supplied with fixings which, once installed, cannot be removed from the outside. The fixing shall remain intact when tested in accordance with 6.7.6.1, 6.7.6.2.

If a letter plate deflector is to be installed, it shall be in accordance with 6.7.6.3. If it does not fulfil these requirements, it shall not be considered to be a letter plate deflector in conformance to this standard.

After the tests according to 6.7.6.1 and 6.7.6.2 the permanent deformation shall not be more than 2mm for both grades. During and after the test according to 6.7.6.3 the deformation shall not be more than 2mm.

Apertures of type 4 - letter plates without a letter plate deflector shall have the security grade 0.

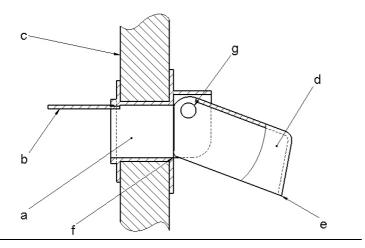
Apertures of type 4 – letter plates with a letter plate deflector which is **not** according to the requirements as prescribed in 6.7.6.3, shall have the security grade 0.

Apertures of type 4 – letter plates with a letter plate deflector shall have the security grade 2.

The letter plate deflector can be fixed to the letter plate or to the door.

The letter plate deflector can be adjustable, but then it shall not be possible to move the lower edge of the letter plate deflector (Figure 3 — letter plate deflector, mark e) to a position higher than the lower edge of the aperture (Figure 3 — letter plate deflector, mark f).

If a letter plate deflector is installed, it shall still be possible to insert all gauge postal items (as mentioned in clause 5.3.3) through the aperture without damaging it.



<u>Key</u>

- aperture
- flap
- door or other background
- d
- letter plate deflector lower edge of letter plate deflector
- lower edge of aperture
- g optional hinge

Figure 3 — letter plate deflector

Tests

6.1 General test requirements

The requirements of 5.1 shall be satisfied.

6.2 Components

The requirements of 5.2 shall be satisfied.

6.3 Dimensions

The requirements of 5.3 shall be satisfied.

The dimensions are measured at 90° to the introducing direction (see Figure 1 — Examples of security attachments).

The accuracy of the measuring instrument shall have a tolerance of less than $\pm\,0.5$ mm.

6.4 Ergonomics and safety

6.4.1 Installation height of the aperture and lock

The requirements of 5.4.1 shall be satisfied.

The accuracy of the measuring instrument shall have a tolerance of ± 2 mm.

6.4.2 Safety

The requirements of 5.4.2 shall be satisfied.

6.4.3 Opening force of the flap

The requirements of 5.4.3 shall be satisfied.

The force shall be determined by means of a measuring device with a tolerance of \pm 0,25 N.

6.4.4 Closing of the flap

The requirements of 5.4.4 shall be satisfied.

The test shall be carried out before and after the corrosion test has been performed.

6.5 Confidentiality

The requirements of 5.5 shall be satisfied.

6.6 Corrosion and water penetration

6.6.1 Corrosion

The testing of aperture components shall be carried out in accordance with EN 1670:2007/AC:2008, and shall refer to functionality and appearance.

NOTE The appearance of copper or copper alloys can change.

6.6.2 Water penetration

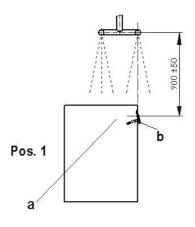
Types 1 and 3 shall be exposed to a rain test in accordance with Figure 4 — Rain test, type 1 and type 3. A sample shall be tested in position 1 and position 2. The duration of each test shall be 5 min. On conclusion of the test, the specimen shall be dried on the outside and opened. The volume of penetrated water shall not exceed 1 cm³.

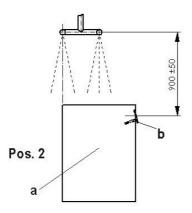
Types 1, 3 and 4 shall be exposed to a rain test in accordance with Figure 5 — Rain test, type 1, type 3 and type 4. The duration of the rain test shall be 10 m. On conclusion of the test, the specimen shall be dried on the outside and opened. The volume of penetrated water shall not exceed 1 cm³.

The volume of the penetrated water shall be measured with water-absorbent material, the weight of which shall be taken before and after absorption of the water.

The accepted volume shall be 1 cm 3 . The accuracy of the measuring instrument shall have a tolerance of less than \pm 10 %.

The design of the rain shower test device that shall be used is shown in Figure 6 — Design of rain shower test device. It consists of a welded H-shaped construction of $\frac{1}{2}$ " threaded galvanized pipe with a wall thickness of 2,6 \pm 0,15 mm. The rain shower test device has 42 outflow holes. The water outflow during a test shall be 100 \pm 10 l per hour. This corresponds to 800 l/ m^2/h .

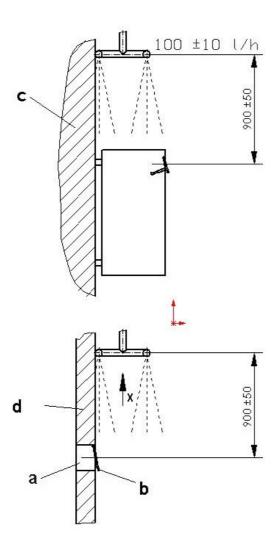




Key

a Aperture b Flap Dimensions in millimetres

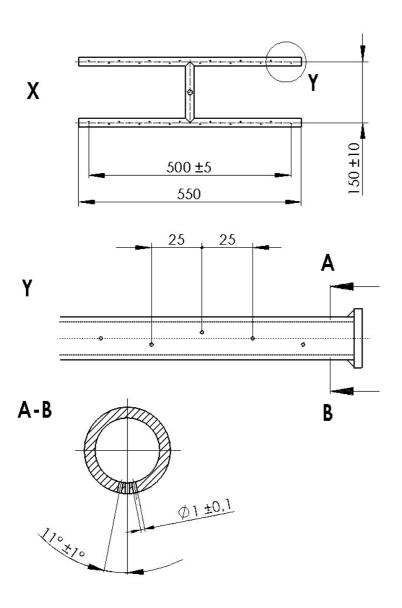
Figure 4 — Rain test, type 1 and type 3



Key

- a Aperture
 b Flap
 c Wall
 d Door
 Dimensions in millimetres

Figure 5 — Rain test, type 1, type 3 and type 4



Threaded Pipe: ½" welded, galvanized, wall thickness: 2,6 mm \pm 0,15 mm Rate of rainwater flow: 100 l/h in test 800 l Rainwater per m²/h Dimensions in millimetres

Figure 6 — Design of rain shower test device

6.7 Security

6.7.1 Security requirements

The requirements of 5.7.1 shall be satisfied.

6.7.2 Theft prevention - types 1, 2 and 3

The requirements of 5.7.2 shall be satisfied.

Where the aperture is smaller than the dimensions stated in Table A.1 but wide enough to remove a letter post item whose smallest dimension (length or width) is 90 mm, the minimum distance of 130 mm between the aperture and a 40 mm high pile of letter post items shall be measured from the top of the pile to the nearest point of the aperture.

The accuracy of the measuring instrument shall be within ± 2 mm.

6.7.3 Theft prevention - type 4

If the minimum distance between the aperture and the receiving floor level is less than 680 mm, the same requirements as stated for types 1, 2 and 3 shall be satisfied (see 5.7.2 and 6.7.2).

6.7.4 Security and locks - types 1, 2 and 3

The construction of the box door and the lock shall be tested for resistance to mechanical forces on a test device in compliance with the following description:

The test device (see Figure 7 — Test device) consists of a horizontal wire with an integrated tension spring and a deflection pulley, from which a mass (m) of 15 kg for grade 1 and 22 kg for grade 2 (equivalent to a tensile force of 150 N for grade 1 and 220 N for grade 2) is suspended. By actuating a release mechanism, the weight drops an unobstructed distance of 300 mm after which it starts to act on the spring as a tensile force.

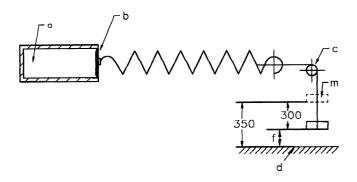
The spring travel (f) shall amount to 50 mm and the total drop of the weight shall be 350 mm, limited by a stop plate.

On testing doors:

- with an aperture, the test device shall be fastened in the middle of the aperture (see part a of Figure 8 Fastening points).;
- without an aperture, the test device shall be fastened at the top edge of the door and at a distance of 25 % of the door width from the outer edge of the side opposite to the hinge side (see part b of Figure 8 — Fastening points).

NOTE The spring should be fastened to the door with a M6 size nut and screw. A plain washer with a maximum outer diameter of 12,8 mm can be used additionally.

The objective of the test is to check the test specimen for any permanent deformation.



Key

Types 1,2 and 3 а

b

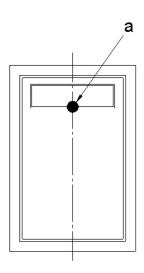
Door Deflection pulley С

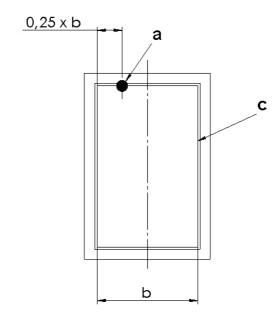
Stop plate Spring travel d f

Mass

Dimensions in millimetres All tolerances \pm 2 mm

Figure 7 — Test device





- a) Fastening points for test device $\operatorname{Door}\nolimits$ with aperture
- b) Fastening points for test device Door without aperture $\,$

Key

a Fastening point

Key

a Fastening pointb Lock sidec Hinge side

Figure 8 — Fastening points

6.7.5 Protection against the opening of doors and windows - type 4

The requirements of 5.7.5 shall be satisfied.

The tolerance of the measuring tape shall be $\,\pm\,2$ mm.

6.7.6 Security - type 4

The letter plate and letter plate deflector shall be assembled in accordance with clause 5.7.6.

The letter plate or letter plate deflector shall be mounted in a 50 mm \pm 2 mm thick block of European redwood in accordance with the manufacturer's fixing instructions.

6.7.6.1 Fixings

This test is only required if, in order to fix a letter plate, it is necessary to cut a slot in the door or other background of which the short side is greater than 30 mm but no more than 40 mm. A load of 0,5 kN shall be applied gradually for 2 sec. and without shock separately at each end of the frame and held for 10 s (see Figure 9 — Test apparatus for testing strength of fixings).

If the slot in the door or other background is greater than 40 mm the applied load shall be 1,2 kN. The load shall be applied gradually for 2 sec. and without shock separately at each end of the frame and held for 10 s.

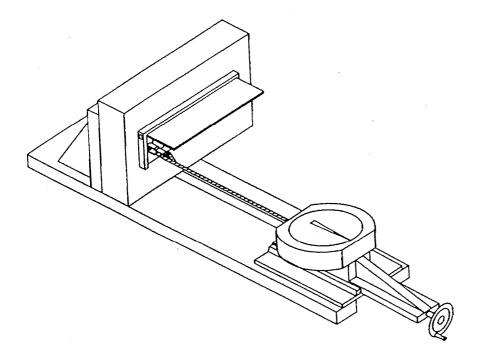


Figure 9 — Test apparatus for testing strength of fixings

6.7.6.2 Flap

The letter plate shall be assembled in accordance with clause 5.7.6.

This test is only required if the short side of the aperture behind the flap is greater than 40 mm. A load of 1,0 kN shall be applied gradually for 2 sec. and without shock to the flap, such that the force acts directly in shear with the pivot pin. Maintain for 10 s and repeat for each pivot pin (see Figure 10 — Test apparatus for testing strength of flap pivot).

The test has to be carried out for both inward and outward opening flaps.

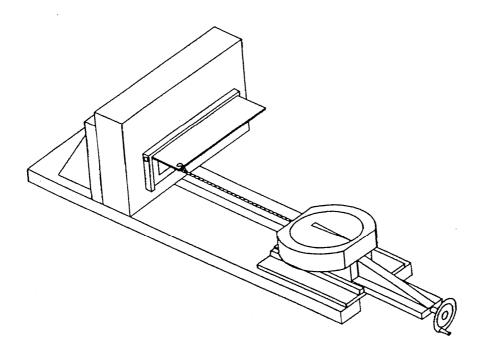


Figure 10 — Test apparatus for testing strength of flap pivot

The accuracy of the measuring tools shall be within \pm 0,1 kN or \pm 1,0 s or \pm 0,5 mm.

6.7.6.3 Letter plate deflector

The letter plate deflector shall be assembled in accordance with clause 5.7.6.

A load of 1,2 kN shall be applied gradually for 2 sec. and without shock to the letter plate deflector, such that the force acts directly in shear with the pivot pin. It shall be maintained for 10 sec. (see Figure 11 — Test apparatus for testing strength letter plate deflector).

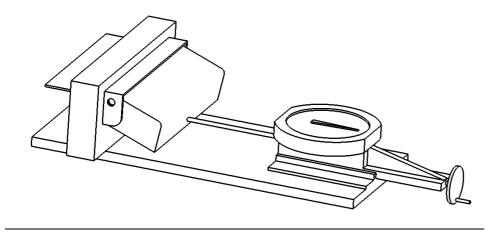


Figure 11 — Test apparatus for testing strength letter plate deflector

The accuracy of the measuring tools shall be within $\pm\,0.1$ kN or $\pm\,1.0$ s or $\pm\,0.5$ mm.

7 Marking and labelling

If a manufacturer or trade mark owner claims that a product conforms to this standard, the manufacturer's name or the trade mark shall be included on the marking of the product.

In addition the marking shall be included as portrayed in Figure 12 — Product marking:

EN	Standard:
Туре	1: outdoor use
	2: indoor use
	3: slide-through
	4: letter plate
Size	1: widthwise posting
	2: lengthwise posting
	3: large widthwise posting
Corrosion resistance	0: no defined corrosion resistance
	3: high corrosion resistance
	4: very high corrosion resistance
Theft and burglar resistance	0: no prevention
	1: standard prevention
	2: improved prevention

Figure 12 — Product marking

The method of affixing the marks i.e. by embossing, riveting or gluing, shall be left to the discretion of the manufacturer or trademark owner.

Stickers shall be put on the type 4 aperture to give hints to customers that, when using letter plates, there is a risk that they might be used for fishing, identity theft or arson.

An example for the marking on product is given in Figure 13 — Example of product marking.

Example:

EN	Standard:
13724:20XX	
Туре	1: outdoor use
	2: indoor use
3	3: slide-through
	4: letter plate
Size	1: widthwise posting
2	2: lengthwise posting
_	3: large widthwise posting
Corrosion resistance	0: no defined corrosion resistance
3	3: high corrosion resistance
	4: very high corrosion resistance
Theft and burglar resistance	0: no prevention
1	1: standard prevention
	2: improved prevention

Figure 13 — Example of product marking

Annex A (normative)

Dimensions

Table A.1 states the dimensions of the aperture.

Table A.1 — Dimensions of the aperture

size	type 1, 2 and 3	Type 4	long side of aperture
	short side of aperture	Short side of aperture	
1	min. 30 mm max. 35 mm	min. 30 mm max. 35 mm max. 40 mm*	min. 325, max. 400 mm for widthwise posting of C4 envelopes
2	min. 30 mm max. 35 mm	min. 30 mm max. 35 mm max. 40 mm*	min. 230, max. 280 mm for lengthwise posting of C4 envelopes
3	min. 35 mm max. 45 mm		min. 325, max. 400 mm for widthwise posting of C4 envelopes only valid for type 1,2 and 3

 $^{^{\}star}$ The maximum size of the short side of the aperture can be 40 mm, but only when the distance required in 5.6.2 is at least 680 mm.

Annex B (informative)

Installation height of aperture

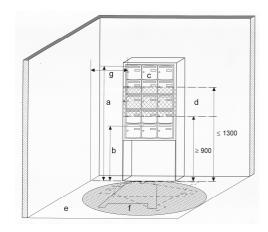
For ergonomic reasons the centreline of the aperture should be at a height between 700 mm and 1700 mm measured from the delivery floor level.

In special cases such as groups of apertures the range may be extended but should be between 400 mm and 1800 mm.

Annex C (informative)

Installation height of lock

Dimensions in millimetres



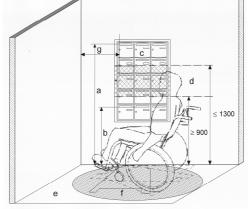


Figure A.1 – accessible installation of letter boxes outside the wall

Figure A.2 - accessible installation space of letterboxes inside a wall

Key

- Maximum height of the aperture ≤ 1800 mm Minimum height of the aperture ≥ 400 mm b Group of letter boxes
 Accessible operating range of the locks c d
- е
- Floor level
 Manoeuvring space
- Accessible distance to the adjacent wall \geq 400 mm g

Annex D (informative)

A-deviations

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

This European Standard does not fall under any directive of the EU.

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

Netherlands:

Ministerial Decree on Letter Boxes "Besluit Brievenbussen" (Besluit van 12 december 1988/Nr. TP/10.423 HDTP (Stert. 1988, 252) stemming from Article 9 of the Dutch Postal Act (postwet 26 0ktober 1988 (Stb. 1988, 522)) on the following points:

	<u>Clause</u>	<u>Deviation</u>
5.3.1	5.3.1	"Besluit Brievenbussen", Article 2.2 prescribes that the apertures must be situated between 60 cm and 180 cm above floor level, and should preferably be situated at 110 cm above floor level. This requirement conflicts with the present European Standard which allows for apertures to be situated between 70 cm and 170 cm above floor level and in special cases between 40 cm and 180 cm above floor level.
		"Besluit Brievenbussen", Article 2.2 prescribes that apertures must be horizontal whereas the present European Standard allows vertical positioning.
	Narmative Annex A	"Dealuit Drievenburgen" Article 0.0 prescribes that the aparture must be at least

Normative Annex A

"Besluit Brievenbussen", Article 2.3 prescribes that the aperture must be at least 265 mm wide and 32 mm high. This requirement conflicts with the present European Standard, which defines a minimum width of 230 mm and a minimum height of 30 mm for lengthwise posting.

Poland:

Ordinances of the Minister of Infrastructure on Letter boxes, pursuant to art. 37 paragraph 5 of the Act dated June 12, 2003 – Postal Law (Dz. U. 2008, Nr 189, poz. 1159 z późn.zm.):

June 12, 2003 – Postal Law (Dz. U. 2008, Nr 189, poz. 1159 z późn.zm.):	
<u>Clause</u>	<u>Deviation</u>
Annex A	"ROZPORZĄDZENIE MINISTRA INFRASTRUKTURY z dnia 24 września 2003 r. w sprawie oddawczych skrzynek pocztowych." (Dz. U. Nr 177, poz. 1731), \S 3.3 prescribes that the minimal short side of aperture shall be 20 mm of height with a tolerance of +/- 1mm.
	"ROZPORZĄDZENIE MINISTRA INFRASTRUKTURY z dnia 15 kwietnia 2004 r. zmieniające rozporządzenie w sprawie oddawczych skrzynek pocztowych." (Dz. U. Nr 83, poz. 770), § 1.2 also prescribes that the minimal short side of aperture must be 20 mm.
	This requirement conflicts with the present European Standard which defines a

minimum height of 30 mm for the short side of the aperture.

Denmark:

Executive Order on the Provision of Postal Services and Postal Distribution(Executive Order No. 1313 of 14 December 2004). Act No. 472 of June 2004.

Clause	Deviation
5.3.1	Clustered delivery boxes must be placed in such a way that the centerline of the aperture should be at a high between 70 cm and 160 cm measured from the delivery floor level.
	Individual delivery boxes and several individual delivery boxes set up in a horizontal row must be placed in such a way that the centerline of the apertures should be at a height between 100 cm and 120 cm measured from the delivery floor level.
5.3.1.2	Lock Denmark has no requirements to the installation requirements of locks.
Annex A	Minimum dimensions of letter slots for all types is 3.5 cm under consideration of the dimensions versus security.

Bibliography

ISO/CD 21542.3, Building construction — Accessibility and usability of the built environment Figure 58

CEN/CENELEC Guide 6, Guidelines for standard developers to address the needs of older persons and persons with disabilities.