

Ventilation for buildings — Non-metallic ducts — Ductwork made from insulation ductboards

The European Standard EN 13403:2003 has the status of a
British Standard

ICS 91.140.30

National foreword

This British Standard is the official English language version of EN 13403:2003.

The UK participation in its preparation was entrusted to Technical Committee RHE/2, Air distribution and air diffusion, 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 6 May 2003

Summary of pages

This document comprises a front cover, an inside front cover, the EN title page, pages 2 to 17 and a back cover.

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

Amendments issued since publication

Amd. No.	Date	Comments

© BSI 6 May 2003

ISBN 0 580 41783 2

English version

Ventilation for buildings - Non-metallic ducts - Ductwork made from insulation ductboards

Ventilation des bâtiments - Conduits non métalliques -
Réseau de conduits en panneaux isolants de conduits

Lüftung von Gebäuden - Nichtmetallische Luftleitungen -
Luftleitungen aus Dämmplatten

This European Standard was approved by CEN on 17 January 2003.

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 Management Centre or to any CEN member.

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

CEN members are the national standards bodies of Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Luxembourg, Malta, Netherlands, Norway, Portugal, Slovakia, 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

Contents

	page
Foreword	3
1 Scope	4
2 Normative references	4
3 Terms and definitions, symbols and abbreviations	5
3.1 Terms and definitions.....	5
3.2 Symbols and abbreviations	5
4 Requirements	5
4.1 Erosion and emission of particles	5
4.2 Resistance against pressure (without reinforcements).....	6
4.3 Air leakage factor and air tightness class.....	6
4.4 Bulging and/or caving, air leakage.....	7
4.5 Supports and hangers	7
4.6 Facilities for cleaning	7
4.7 Requirements for ductboards.....	7
5 Application restrictions	9
6 Test conditions	9
7 Test methods.....	10
7.1 Board stiffness.....	10
7.2 Determination of particle emission	13
7.3 Pressure test	14
7.4 Microbial growth	15
8 Marking, labelling and packaging	16
Bibliography	17

Foreword

This document (EN 13403:2003) has been prepared by Technical Committee CEN/TC 156, "Ventilation for buildings" the secretariat of which is held by BSI.

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 October 2003, and conflicting national standards shall be withdrawn at the latest by October 2003.

This standard is a part of a series of standards for ductwork used in ventilation and air conditioning of buildings for human occupancy.

The position of this standard in the field of mechanical building services is shown in Figure 1.

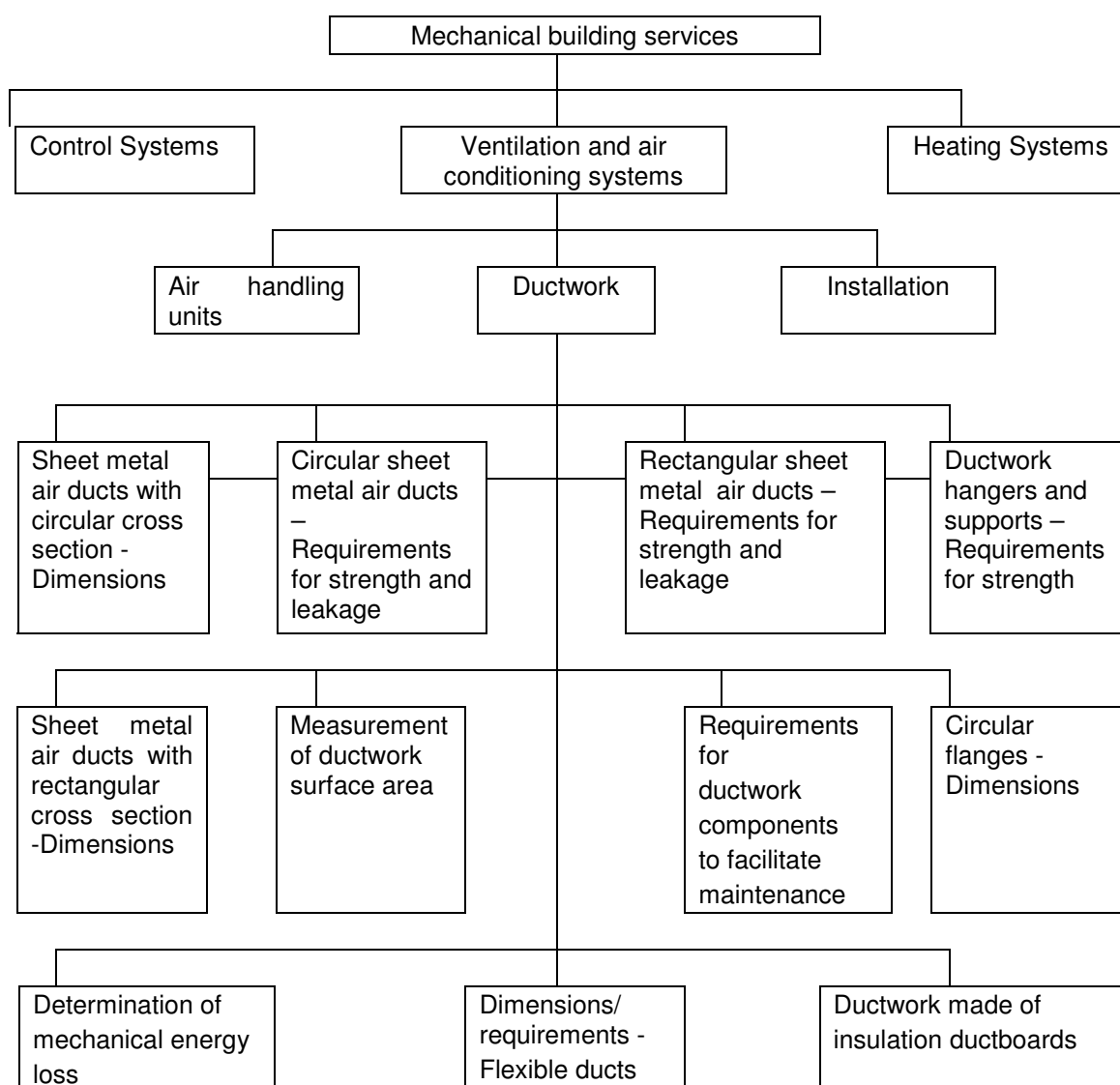


Figure 1 Position of EN 13403 in the field of mechanical building services

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

1 Scope

This European Standard contains the basic requirements and characteristics for ductwork made of insulation ductboards, and used in ventilation and air conditioning systems of buildings, subject to human occupancy.

2 Normative references

This European Standard incorporates by dated or undated reference, provisions from other publications. These normative references are cited at the appropriate places in the text, and the publications are listed hereafter. For dated references, subsequent amendments to or revisions of any of these publications apply to this European Standard only when incorporated in it by amendment or revision. For undated references the latest edition of the publication referred to applies (including amendments).

EN 822	<i>Thermal insulating products for building applications – Determination of length and width.</i>
EN 823	<i>Thermal insulating products for building applications – Determination of thickness.</i>
EN 12086	<i>Thermal insulating products for building applications - Determination of water vapour transmission properties.</i>
ENV 12097	<i>Ventilation for buildings - Ductwork - Requirements for ductwork components to facilitate maintenance of ductwork systems.</i>
EN 12236	<i>Ventilation for buildings – Ductwork hangers and supports – Requirements for strength.</i>
EN 12667	<i>Thermal performance of building materials and products - Determination of thermal resistance by means of guarded hot plate and heat flow meter methods - Products of high and medium thermal resistance.</i>
EN 12939	<i>Thermal performance of building materials and products - Determination of thermal resistance by means of guarded hot plate and heat flow meter methods - Thick products of high and medium thermal resistance.</i>
EN 13162	<i>Thermal insulation products for buildings - Factory made mineral wool (MW) products - Specification.</i>
EN 13165	<i>Thermal insulation products for buildings - Factory made rigid polyurethane foam (PUR) products - Specification.</i>
EN 13166	<i>Thermal insulation products for buildings - Factory made products of phenolic foam (PF) - Specification.</i>
EN 13501-1	<i>Fire classification of construction products and building elements - Part 1: Classification using test data from reaction to fire tests.</i>
EN 11654:1997	ISO <i>Acoustics - Sound absorbers for use in buildings - Rating of sound absorption (ISO 11654:1997).</i>
CR 12792:1997	<i>Ventilation for buildings - Symbols and terminology.</i>