

Plastics piping systems for non-pressure underground drainage and sewerage — Unplasticized poly (vinyl chloride) (PVC-U) —

Part 2: Guidance for assessment of conformity

ICS 23.040.20; 93.030

National foreword

This Draft for Development (DD) is the official English language version of ENV 1401-2:2000. It is specifically intended to give guidance for the assessment of conformity to BS EN 1401-1:1998 of unplasticized poly(vinyl chloride) (PVC-U) piping system components and their joints.
(BS EN 1401-1:1998 superseded BS 4660:1989 and BS 5481:1977)

There is no British Standard corresponding to ENV 1401-2:2000. The publication of this DD does not imply that its use is mandatory. Unless any specific aspects of ENV 1401-2 are called up on a normative basis in EN 1401-1, this DD is available for optional use in conjunction with any other existing procedures for such purposes. The intention is to enable the published European Standards and associated documents to be applied on a consistent and trial basis where industry specifiers choose to specify them.

The UK participation in its preparation was entrusted by Technical Committee PRI/88, Plastics piping systems and components (previously PRI/61) to Subcommittee PRI/88/1, Thermoplastics piping for non-pressure applications (previously PRI/61/1, which has the responsibility to:

- aid enquirers to understand the text;
- present to the responsible 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.

Subcommittee PRI/88/1 would therefore welcome any comments to assist the further development of this draft for future use.

A list of organizations represented on this subcommittee 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 Standards Catalogue under the section entitled “International Standards Correspondence Index”, or by using the “Find” facility of the BSI Standards Electronic Catalogue.

Warning This Draft for Development, which is identical with ENV 1401-2:2000, does not necessarily detail all the precautions necessary to meet the requirements of the Health and Safety at Work etc. Act 1974 and subsequent legislation. Attention should be paid to any appropriate safety precautions and only trained personnel should operate the test methods. The UK committee responsible for implementing this European document hereby draws attention to the hazards associated with dichloromethane and hence the need for care to prevent exposure of personnel or release to atmosphere of that material, particularly since this document indicates use of the relevant test for routine product quality control/release purposes.

This Draft for Development is not to be regarded as a British Standard.

This Draft for Development having been prepared under the direction of the Sector Committee for Materials and Chemicals, was published under the authority of the Standards Committee and comes into effect on 15 May 2001

Summary of pages

This document comprises a front cover, an inside front cover, the ENV title page, pages 2 to 18, an inside back cover and a back cover.

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Amendments issued since publication

Amd. No.	Date	Comments

English version

**Plastics piping systems for non-pressure underground drainage
and sewerage - Unplasticized poly(vinyl chloride) (PVC-U) - Part
2: Guidance for assessment of conformity**

Systèmes de canalisations en plastique pour les
branchements et les collecteurs d'assainissement enterrés
sans pression - Poly(chlorure de vinyle) non plastifié (PVC-
U) - Partie 2: Guide pour l'évaluation de la conformité

Kunststoff-Rohrleitungssysteme für erdverlegte
Abwasserkanäle und -leitungen - Weichmacherfreies
Polyvinylchlorid (PVC-U) - Teil 2: Empfehlungen für die
Beurteilung der Konformität

This European Prestandard (ENV) was approved by CEN on 15 November 1999 as a prospective standard for provisional application.

The period of validity of this ENV is limited initially to three years. After two years the members of CEN will be requested to submit their comments, particularly on the question whether the ENV can be converted into a European Standard.

CEN members are required to announce the existence of this ENV in the same way as for an EN and to make the ENV available promptly at national level in an appropriate form. It is permissible to keep conflicting national standards in force (in parallel to the ENV) until the final decision about the possible conversion of the ENV into an EN is reached.

CEN members are the national standards bodies of Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and United Kingdom.



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Foreword

This European Prestandard has been prepared by Technical Committee CEN/TC 155 "Plastics piping systems and ducting systems", the secretariat of which is held by NNI.

This prestandard can be used to support elaboration of national third party certification procedures for products conforming to EN 1401-1.

NOTE This draft was initially published as draft European standard. At a later stage CEN/TC 155 decided that documents covering the assessment of conformity shall become European Prestandards (ENV).

This prestandard is a Part of a System Standard for plastics piping systems of a particular material for a specified application. There are a number of such System Standards.

System Standards are based on the results of the work undertaken in ISO/TC 138 "Plastics pipes, fittings and valves for the transport of fluids", which is a Technical Committee of the International Organization for Standardization (ISO).

They are supported by separate standards on test methods to which references are made throughout the System Standard.

The System Standards are consistent with general standards on functional requirements and on recommended practice for installation.

EN 1401 consists of the following Parts, under the general title "*Plastics piping systems for non-pressure underground drainage and sewerage — Unplasticized poly(vinyl chloride) (PVC-U)*".

- Part 1: *Specifications for pipes, fittings and the system*
- Part 2: *Guidance for assessment of conformity (this prestandard)*
- Part 3: *Guidance for installation*

This Part of EN 1401 includes the following annex:

- Annex A (informative): Bibliography

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

1 Scope

This Part of EN 1401 gives guidance for the assessment of conformity to be included in the manufacturer's quality plan as part of the quality system.

This standard includes:

- a) requirements for materials, components and assemblies given in EN 1401-1;
- b) requirements for the manufacturer's quality system;

NOTE 1 It is recommended that the quality system conforms to EN ISO 9001 or EN ISO 9002, as applicable.

- c) definitions and procedures to be applied if a third party certification is involved.

NOTE 2 If third party certification is involved, it is recommended that the certification body is accredited to EN 45011 or EN 45012, as applicable.

This Part of EN 1401 is applicable to piping systems made of unplasticized poly(vinyl chloride) (PVC-U) in the field of non-pressure underground drainage and sewerage outside the building structure (application area code "U") and for non-pressure underground drainage and sewerage for both buried in ground within the building structure (application area code "D") and outside the building structure. This is reflected in the marking of products by "U" and "UD".

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.

EN 1401-1:1998, *Plastics piping systems for non-pressure underground drainage and sewerage — Unplasticized poly(vinyl chloride) (PVC-U) — Part 1: Specifications for pipes, fittings and the system*

ISO 2859-1, *Sampling procedures for inspection by attributes — Part 1: Sampling plans indexed by acceptable quality level (AQL) for lot-by-lot inspection*

ISO 2859-2, *Sampling procedures for inspection by attributes — Part 2: Sampling plans indexed by limiting quality (LQ) for isolated lot inspection*

3 Definitions, symbols and abbreviations

For the purposes of this standard the definitions, symbols and abbreviations given in EN 1401-1 apply together with the following.

3.1 Definitions

3.1.1

certification body

An impartial body, governmental or non-governmental, possessing the necessary competence and responsibility to carry out certification of conformity according to given rules of procedure and management.

3.1.2
inspection body

An impartial organization or company, approved by a certification body as possessing the necessary competence to verify and/or to carry out initial type testing, audit testing and inspection of the manufacturer's factory production control in accordance with the relevant European Standard.

3.1.3
testing laboratory

A laboratory which measures, tests, calibrates or otherwise determines the characteristics of the performance of materials and products.

3.1.4
quality system

The organizational structure, responsibilities, procedures, processes and resources for implementing quality management (see EN ISO 8402:1995).

3.1.5
quality plan

A document setting out the specific quality practices, resources and sequence of activities relevant to a particular product or range of products.

3.1.6
type testing (TT)

Testing performed to prove that the material, component, joint or assembly is capable of conforming to the requirements given in the relevant standard.

3.1.6.1
preliminary type testing (PTT)

Type testing carried out by or on behalf of the manufacturer.

3.1.6.2
initial type testing (ITT)

Type testing carried out by, or on behalf of a certification body for certification purposes.

3.1.7
batch release test (BRT)

A test performed by the manufacturer on a batch of components, which has to be satisfactorily completed before that batch can be released.

3.1.8
process verification test (PVT)

A test performed by the manufacturer on materials, components, joints or assemblies at specified intervals to confirm that the process continues to be capable of producing components conforming to the requirements given in the relevant standard.

NOTE Such tests are not required to release batches of components and are carried out as a measure of process control.

3.1.9
audit test (AT)

A test performed by, or on behalf of a certification body to confirm that the material, component, joint or assembly continues to conform with the requirements given in the relevant standard and to provide information to assess the effectiveness of the quality system.

3.1.10
indirect test (IT)

A test performed by the manufacturer different from that specified for that particular characteristic, having verified its correlation with the specified test.