

English Version

**Plastics piping systems for non-pressure underground drainage
and sewerage - Structured-wall piping systems of unplasticized
poly(vinyl chloride) (PVC-U), polypropylene (PP) and
polyethylene (PE) - Part 4: Guidance for the assessment of
conformity**

Systèmes de canalisations en plastique pour les
branchements et les collecteurs d'assainissement sans
pression enterrés - Systèmes de canalisations à parois
structurées en poly(chlorure de vinyle) non plastifié (PVC-
U), polypropylène (PP) et polyéthylène (PE) - Partie 4:
Guide pour l'évaluation de la conformité

Kunststoff-Rohrleitungssysteme für erdverlegte drucklose
Abwasserkanäle und -leitungen - Rohrleitungssysteme mit
profilierter Wandung aus weichmacherfreiem
Polyvinylchlorid (PVC-U), Polypropylen (PP) und
Polyethylen (PE) - Teil 4: Empfehlungen für die Beurteilung
der Konformität

This Technical Specification (CEN/TS) was approved by CEN on 10 June 2012 for provisional application.

The period of validity of this CEN/TS 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 CEN/TS can be converted into a European Standard.

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

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

Management Centre: Avenue Marnix 17, B-1000 Brussels

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Foreword

This document (CEN/TS 13476-4:2013) has been prepared by Technical Committee CEN/TC 155 "Plastics piping systems and ducting systems", the secretariat of which is held by NEN.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN [and/or CENELEC] shall not be held responsible for identifying any or all such patent rights.

This document supersedes CEN/TS 13476-4:2008.

The main changes with respect to the previous edition are listed below:

- updating of the references in Clause 2 and Bibliography;
- updating of the definitions in Clause 3;
- Specification of PVC reprocessable and recycling material Table 2;
- deletion of Table 3, Compound specification PP masterbatch;
- deletion of Table 5, Compound specification PE masterbatch;
- changing Table 8, by deletion of column "P";
- deletion of 4.2.3.2, Preliminary type testing;
- deletion of 4.2.3.3, Initial type testing;
- deletion of Table 11, Specification of use of reprocessable and recyclable material that shall require the production to be considered at least as one batch;
- deletion of Table 12, Material characteristics that require BRT.

EN 13476 consists of the following Parts under the general title *Plastics piping systems for non-pressure underground drainage and sewerage — Structured-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE)*:

- *Part 1: General requirements and performance characteristics;*
- *Part 2: Specifications for pipes and fittings with smooth internal and external surface and the system, Type A;*
- *Part 3: Specifications for pipes and fittings with smooth internal and profiled external surface and the system, Type B;*
- *Part 4: Guidance for the assessment of conformity* (this Technical Specification).

According to the CEN-CENELEC Internal Regulations, the national standards organisations of the following countries are bound to announce this Technical Specification: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, Former Yugoslav Republic of Macedonia, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and the United Kingdom.

Introduction

Figures 1 and 2 are intended to provide general information on the concept of testing and organisation of those tests used for the purpose of the assessment of conformity. For each type of test, i.e. type testing (TT), batch release test (BRT), process verification test (PVT), and audit test (AT), this part of EN 13476 details the applicable characteristics to be assessed as well as the frequency and sampling of testing.

A typical scheme for the assessment of conformity of compounds/formulations, pipes, fittings, joints or assemblies by manufacturers is given in Figure 1.

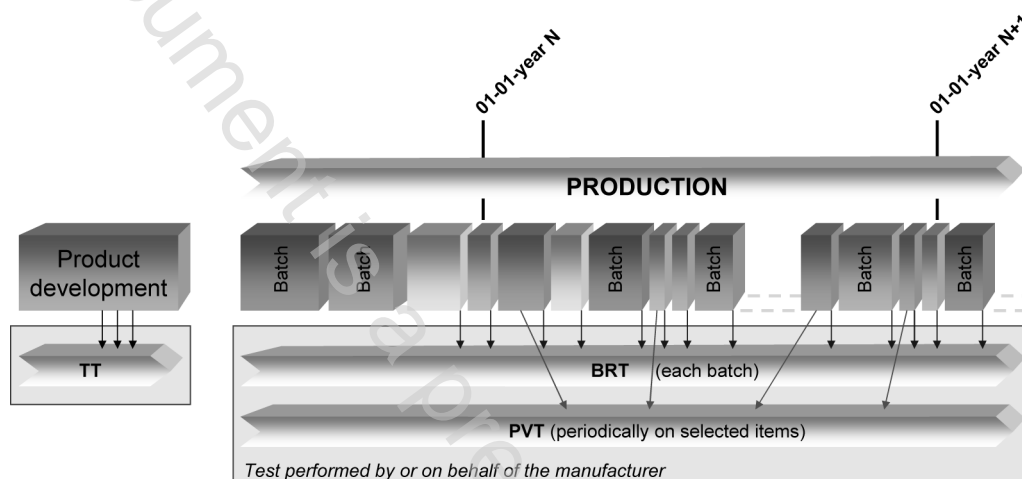


Figure 1 — Typical scheme for the assessment of conformity by a manufacturer

A typical scheme for the assessment of conformity of compounds/formulations, pipes, fittings, joints or assemblies by manufacturers, including a third-party certification, is given in Figure 2.

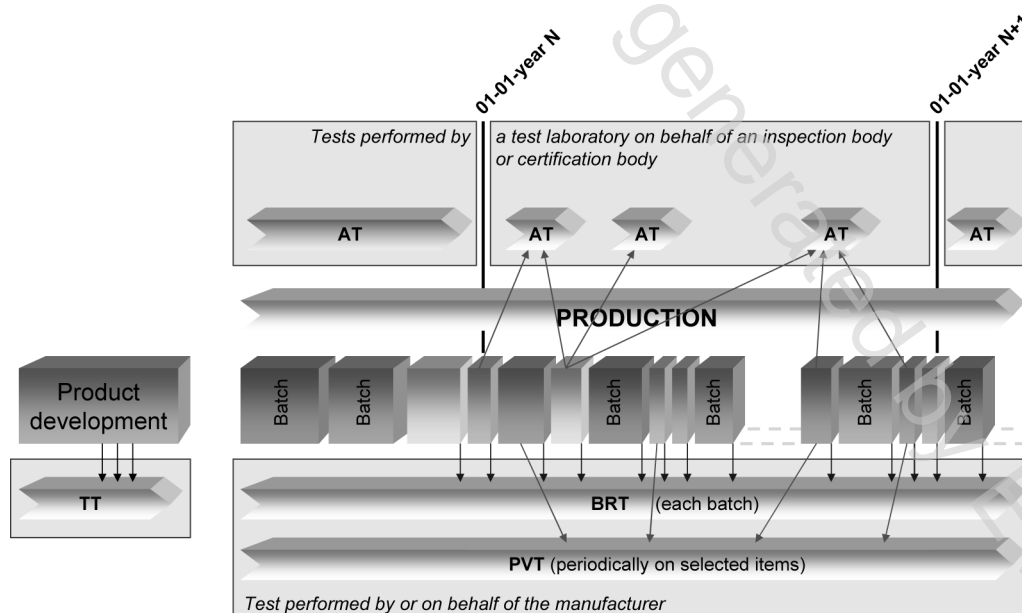


Figure 2 — Typical scheme for the assessment of conformity by a manufacturer, including a third-party certification

1 Scope

This Technical Specification gives guidance for the assessment of conformity of compounds / formulations, products and assemblies in accordance with the applicable part(s) of EN 13476-1, EN 13476-2 and EN 13476-3 intended to be included in the manufacturer's quality plan as part of the quality management system and for the establishment of third-party certification procedures.

It is recommended that the quality management system conforms to or is no less stringent than the relevant requirements to EN ISO 9001:2008 [1].

If third-party certification is involved, it is recommended that the certification body is accredited to EN 45011 [2], EN 45012 [3] or EN ISO/IEC 17021 [4], as applicable.

In conjunction with EN 13476-1, EN 13476-2 and EN 13476-3 (see Foreword) this document is applicable to *Plastics piping systems for non-pressure underground drainage and sewerage — Structural-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE)*:

- for non-pressure underground drainage and sewerage outside the building structure (application area code “U”) reflected in de-marking of products by “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 (application area code “U”) reflected in de marking of products by “UD”.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 13476-1:2007, *Plastics piping systems for non-pressure underground drainage and sewerage — Structured-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE) — Part 1: General requirements and performance characteristics*

EN 13476-2:2007, *Plastics piping systems for non-pressure underground drainage and sewerage — Structured-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE) — Part 2: Specifications for pipes and fittings with smooth internal and external surface and the system, Type A*

EN 13476-3:2007+A1:2009, *Plastics piping systems for non-pressure underground drainage and sewerage — Structured-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE) — Part 3: Specifications for pipes and fittings with smooth internal and profiled external surface and the system, Type B*

3 Terms and definitions

For the purposes of this document, the following terms and definitions given in EN 13476-1:2007, EN 13476-2:2007 and EN 13476-3:2007+A1:2009 and the following apply.

3.1 certification body

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

Note 1 to entry: A certification body is preferably accredited to EN 45011 [2].