

**Investigation and assessment of drain and sewer  
systems outside buildings - Part 1: General  
Requirements**

## EESTI STANDARDI EESSÕNA

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See Eesti standard EVS-EN 13508-1:2012 sisaldab Euroopa standardi EN 13508-1:2012 ingliskeelset teksti.	This Estonian standard EVS-EN 13508-1:2012 consists of the English text of the European standard EN 13508-1:2012.
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English Version

## Investigation and assessment of drain and sewer systems outside buildings - Part 1: General Requirements

Investigation et évaluation des réseaux d'assainissement à  
l'extérieur des bâtiments - Partie 1: Exigences générales

Untersuchung und Beurteilung von  
Entwässerungssystemen außerhalb von Gebäuden - Teil 1:  
Allgemeine Anforderungen

This European Standard was approved by CEN on 18 August 2012.

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Management Centre: Avenue Marnix 17, B-1000 Brussels

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## Foreword

This document (EN 13508-1:2012) has been prepared by Technical Committee CEN/TC 165 "Waste water engineering", the secretariat of which is held by DIN.

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of an identical text or by endorsement, at the latest by April 2013, and conflicting national standards shall be withdrawn at the latest by April 2013.

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 EN 13508-1:2003.

This European Standard, EN 13508, *Investigation and assessment of drain and sewer systems outside buildings*, contains the following parts:

- *Part 1: General requirements* (the present document)
- *Part 2: Visual inspection coding system*

Other parts, dealing with other investigation and assessment aspects may be added later.

In drafting this document, account has been taken of other available standards, in particular EN 752, *Drain and sewer systems outside buildings*.

According to the CEN/CENELEC Internal Regulations, the national standards organisations of the following countries are bound to implement this European Standard: 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

Drain and sewer systems are part of the overall wastewater system that provides a service to the community.

This can be briefly described as:

- removal of wastewater from premises for public health and hygienic reasons;
- prevention of flooding in urbanised areas;
- protection of the environment.

The overall wastewater system has four successive functions:

- collection;
- transport;
- treatment;
- discharge.

Drain and sewer systems provide for the collection and transport of wastewater.

Historically, drain and sewer systems were installed because there was a need to remove the polluted water to prevent diseases.

Traditionally, drain and sewer systems were constructed to collect and transport all types of wastewater together, irrespective of the initial source. This led to difficulties in handling the peak flows in times of heavy rainfall and to the introduction of combined sewer overflows, which discharged polluted water to surface receiving waters.

Although many drain and sewer systems started out as combined systems there are arguments for considering the separation of foul wastewater and surface water. The pollutant effects are not the same and the separation of effluents allows for the different treatment for each element of wastewater, providing more environmentally friendly solutions.

This concept is included in the approach of integrated sewer system management.

EN 752 provides a framework for the design, construction, rehabilitation, maintenance and operation of drain and sewer systems outside buildings. This is illustrated in the upper part of Figure 1. EN 752 is supported by more detailed standards for the investigation, design, construction, organisation and control of drain and sewer systems such as those listed in the lower part of the diagram.

This standard is one of a number of standards which support the general principles set out in EN 752. The relationship between these standards is illustrated in Figure 1.

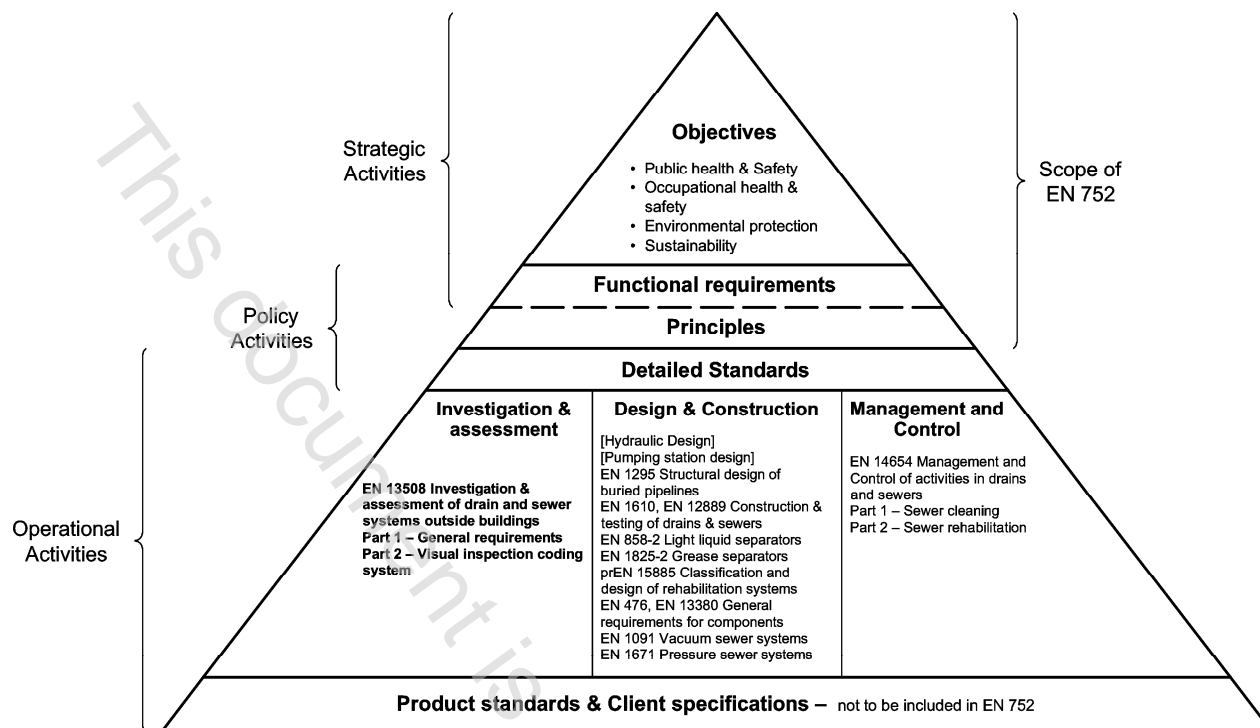


Figure 1 — Relationship between EN 752 and other drain and sewer standards



## 1 Scope

This European Standard is applicable to the investigation and assessment of drain and sewer systems outside buildings. It is applicable to drain and sewer systems, which operate essentially under gravity, from the point where the sewage leaves a building or roof drainage system, or enters a road gully, to the point where it is discharged into a treatment works or receiving water. Drains and sewers below buildings are included provided that they do not form part of the drainage system of the building.

This part of this European Standard specifies general requirements for the investigation and assessment of drain and sewer systems outside buildings.

## 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 752:2008, *Drain and sewer systems outside buildings*

EN 13508-2, *Investigation and assessment of drain and sewer systems outside buildings — Part 2: Visual inspection coding system*

EN 14654 (all parts), *Management and control of cleaning operations in drains and sewers*

## 3 Terms and definitions

For the purposes of this document, the following term and definition together with those given in EN 752:2008 apply.

### 3.1

#### **resilience**

ability of a component or group of components to continue to perform or quickly recover from an endangering incident

## 4 General

EN 752:2008, Clause 6, describes the process for integrated sewer system management. This process involves the integrated planning of the rehabilitation, maintenance and operation of existing drain and sewer systems.

This European Standard specifies general requirements for the investigation and assessment of aspects of the integrated sewer system management procedure (see Figure 2) to establish the condition of drain and sewer systems. This process can be applied to the development of the integrated sewer system management plan in accordance with EN 752:2008, Clause 6, as well as in the development of programmes of work and projects in accordance with EN 14654 (all parts).