International Standard

ISO 11126-1

Third edition
2025-07

Preparation of steel substrates before application of paints and related products — Specifications for non-metallic blast-cleaning abrasives —

Part 1: General introduction and classification

Préparation des subjectiles d'acier avant application de peintures et de produits assimilés — Spécifications des abrasifs non métalliques destinés au décapage par projection —

Partie 1: Introduction générale et classification

Reference number
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Foreword

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This document was prepared by Technical Committee ISO/TC 35, *Paints and varnishes*, Subcommittee SC 12, *Preparation of steel substrates before application of paints and related products,* in collaboration with the European Committee for Standardization (CEN) Technical Committee CEN/TC 139, *Paints and varnishes,* in accordance with the Agreement on technical cooperation between ISO and CEN (Vienna Agreement).

This third edition cancels and replaces the second edition (ISO 11126-1:2018), which has been technically revised.

The main changes are as follows:

— Table 1, Table 2 have been technically revised to incorporate new abrasives;

— Annex A has been removed.

A list of all parts in the ISO 11126 series can be found on the ISO website.

Any feedback or questions on this document should be directed to the user’s national standards body. A complete listing of these bodies can be found at www.iso.org/members.html.

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Introduction

This document is one of a number of parts of the ISO 11126 series specifying requirements for non-metallic abrasives for blast-cleaning.

Test methods for non-metallic blast-cleaning abrasives are given in the various parts of the ISO 11127 series

The requirements for metallic abrasives commonly used for blast-cleaning are specified in the various parts of the ISO 11124 series. Test methods to be used to define these requirements are contained in the various parts of the ISO 11125 series.

Abrasive blast-cleaning techniques are widely used to clean and prepare surfaces (see ISO 8504-2). During the development of a series of International Standards dealing with the preparation of steel substrates before application of paints and related products, it was decided there was a need for a series of International Standards covering those blast-cleaning abrasives commonly used in preparation of steelwork.

The type of blast-cleaning abrasive used and its particle shape can significantly affect the surface appearance and profile form of the treated surface.

ISO 8503-2 describes the assessment of the surface roughness of prepared surfaces using comparators. Table 1 of this document identifies the type of comparator to be used with each of the blast-cleaning abrasives considered.

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Preparation of steel substrates before application of paints and related products — Specifications for non-metallic blast-cleaning abrasives —

Part 1:
General introduction and classification

WARNING — Equipment, materials and abrasives used for surface preparation can be hazardous. It is important to ensure that adequate instructions are given and that all required precautions are exercised.

1 Scope

This document describes a classification of non-metallic blast-cleaning abrasives for the preparation of steel substrates before application of paints and related products.

It specifies the characteristics which are required for the complete designation of such abrasives.

This document applies to abrasives supplied in the new or unused condition only. It does not apply to abrasives either during or after use.

NOTE Although this document has been developed specifically to meet requirements for preparation of steelwork, the properties specified will generally be appropriate for use when preparing other material surfaces, or components, using blast-cleaning techniques. These techniques are described in ISO 8504-2.

2 Normative references

There are no normative references in this document.

3 Terms and definitions

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

ISO and IEC maintain terminology databases for use in standardization at the following addresses:

— ISO Online browsing platform: available at https://www.iso.org/obp

— IEC Electropedia: available at https://www.electropedia.org/

3.1
blast-cleaning abrasive
solid material intended to be used for *abrasive blast-cleaning* (3.2)

3.2
abrasive blast-cleaning
impingement of a high-kinetic-energy stream of *blast-cleaning abrasive* (3.1) on to the surface to be prepared

3.3
shot
particle that is predominantly round, that has a length of less than twice the maximum particle width and that does not have edges, broken faces or other sharp surface defects

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