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МЕЖДУНАРОДНАЯ ОРГАНИЗАЦИЯ ПО СТАНДАРТИЗАЦИИ

Textiles — Tests for colour fastness —

Part E11:
Colour fastness to steaming

Textiles — Essais de solidité des teintures —

Partie E11: Solidité des teintures au vaporisage à la pression atmosphérique

Reference number
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Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work.

Draft International Standards adopted by the technical committees are circulated to the member bodies for approval before their acceptance as International Standards by the ISO Council. They are approved in accordance with ISO procedures requiring at least 75 % approval by the member bodies voting.

International Standard ISO 105-E11 was prepared by Technical Committee ISO/TC 38, *Textiles*.

This second edition cancels and replaces the first edition (included in ISO 105-E : 1978), of which it constitutes a minor revision.

ISO 105 was previously published in thirteen "parts", each designated by a letter (e.g. "Part A"), with publication dates between 1978 and 1985. Each part contained a series of "sections" each designated by the respective part letter and by a two-digit serial number (e.g. "Section A01"). These sections are now being republished as separate documents, themselves designated "parts" but retaining their earlier alphanumeric designations. A complete list of these parts is given in ISO 105-A01.

Users should note that all International Standards undergo revision from time to time and that any reference made herein to any other International Standard implies its latest edition, unless otherwise stated.

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Textiles — Tests for colour fastness —

Part E11:
Colour fastness to steaming

1 Scope and field of application

This part of ISO 105 specifies a method for determining the resistance of the colour of textiles of all kinds and in all forms to the action of steam under atmospheric pressure.

2 References

ISO 105, *Textiles — Tests for colour fastness —*

Part A01: General principles of testing.

Part A03: Grey scale for assessing staining.

3 Principle

A specimen of the textile in contact with specified adjacent fabrics is rolled into a cylinder and placed in the neck of a flask containing boiling water. The staining of the adjacent fabrics is assessed with the grey scale.

4 Apparatus

4.1 Glass tube, open at both ends, with 3 cm inside diameter, mounted in a cork stopper and fitted into the neck of a wide-neck conical flask of about 2 litres capacity. A wire ring is fixed in the cork stopper, with the loop covered with a thin fabric to catch spray. The flask contains about 0,5 litre of water, to which some small beads are added (see figure).

4.2 Adjacent fabric, 10 cm × 4 cm, of the same fibre as the specimen. [1)]

4.3 Two cotton adjacent fabrics, each 10 cm × 4 cm. [1)]

4.4 Undyed scoured wool felt.

4.5 Grey scale for assessing staining (see clause 2).

5 Test specimen

5.1 If the textile to be tested is fabric, prepare a composite specimen measuring 10 cm × 4 cm [1)] by placing successively on a piece of cotton adjacent fabric (4.3) the textile to be tested, a piece of adjacent fabric (4.2) and a further piece of cotton adjacent fabric (4.3). Roll this composite specimen into a cylinder, with the fabric being tested as near the middle as possible.

5.2 If the textile to be tested is yarn, knit it into fabric and use a piece 10 cm × 4 cm [1)]; treat as in 5.1.

5.3 If the textile to be tested is loose fibre, comb and compress enough of it to form a sheet 10 cm × 4 cm [1)], and place it on a piece of cotton adjacent fabric (4.3); place successively on this a piece of adjacent fabric (4.2) and a further piece of cotton adjacent fabric (4.3). Roll the composite specimen into a cylinder, with the fibre to be tested as near the middle as possible.

6 Procedure

6.1 Bring the water in the conical flask to the boil. Wrap the cylindrical composite specimen in felt (4.4) so that the whole fits snugly into the glass tube in the neck of the flask and is

1) The length of 10 cm may be reduced if the cloth to be tested is too thick for the cylinder to be inserted into the tube. To facilitate rolling, stitch at one end the composite specimen.

retained by protuberances in the lower part of the tube. Steam for 30 min.

6.2 Remove the composite specimen from the tube, separate the components and dry by hanging in air at a temperature not exceeding 60 °C.

6.3 Assess the staining of the adjacent fabrics with the grey scale.

7 Test report

Report the numerical rating for staining of the adjacent fabrics.

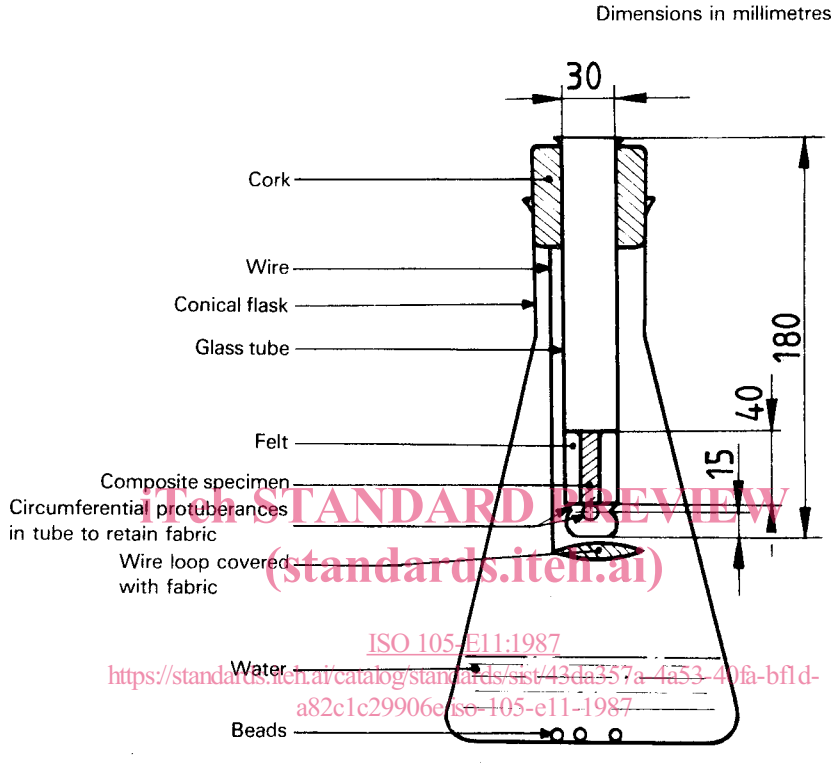

Figure — Apparatus for determining colour fastness to steaming under atmospheric pressure

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