
**Wood-based panels — Wet-process
fibreboard —**

**Part 1:
Classifications**

*Panneaux à base de bois — Panneau de fibres obtenu par procédé
humide —*

Partie 1: Classifications



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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. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of technical committees is to prepare International Standards. Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

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

ISO 27769-1 was prepared by Technical Committee ISO/TC 89, *Wood-based panels*, Subcommittee SC 1, *Fibre boards*.

ISO 27769 consists of the following parts, under the general title *Wood-based panels — Wet-process fibreboard*:

- *Part 1: Classifications*
- *Part 2: Requirements*

Wood-based panels — Wet-process fibreboard —

Part 1: Classifications

1 Scope

This part of ISO 27769 provides a classification matrix and related mandatory tests for two types of wet-process fibreboard: softboards and hardboards.

NOTE 1 Wet-process fibreboards are divided into three types: softboards, medium boards and hardboards.

NOTE 2 This part of ISO 27769 is not applicable to medium boards.

NOTE 3 Fibreboards are broadly divided into two groups based on the manufacturing process, namely the dry-process group and the wet-process group. This part of ISO 27769 is not applicable to dry-process fibreboards (see ISO 16895-1 and ISO 16895-2).

2 Normative references

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

ISO 3340, *Fibre building boards — Determination of sand content*

ISO 9426, *Wood-based panels — Determination of dimensions of panels*

ISO 9427, *Wood-based panels — Determination of density*

ISO 16978, *Wood-based panels — Determination of modulus of elasticity in bending and of bending strength*

ISO 16979, *Wood-based panels — Determination of moisture content*

ISO 16981, *Wood-based panels — Determination of surface soundness*

ISO 16983, *Wood-based panels — Determination of swelling in thickness after immersion in water*

ISO 16984, *Wood-based panels — Determination of tensile strength perpendicular to the plane of the panel*

ISO 16985, *Wood-based panels — Determination of dimensional changes associated with changes in relative humidity*

ISO 16998, *Wood-based panels — Determination of moisture resistance — Boil test*

ISO 17064, *Wood-based panels — Fibreboard, particleboard and oriented strand board (OSB) — Vocabulary*

ISO 20585, *Wood-based panels — Determination of wet bending strength after immersion in water at 70 °C or 100 °C (boiling temperature)*

3 Terms, definitions, symbols and abbreviated terms

For the purposes of this document, the terms and definitions given in ISO 17064 and the following terms, definitions, symbols and abbreviated terms apply.

3.1 Terms and definitions

3.1.1

wet-process fibreboard

fibreboard with a forming line moisture content of greater than 20 %, and whose primary bonding results from the felting of the fibres and their inherent adhesive properties

NOTE 1 According to the density, the types of fibreboard are:

- a) softboards, of density $< 400 \text{ kg/m}^3$;
- b) medium boards, of density $\geq 400 \text{ kg/m}^3$ to $< 900 \text{ kg/m}^3$;
- c) hardboards, of density $\geq 900 \text{ kg/m}^3$.

NOTE 2 Tables for the classification of medium boards are not included in this part of ISO 27769. They can be included as they become available on the international market.

NOTE 3 Density ranges given in product descriptions in 5.2 and 5.3 are a guide. Manufacturers can classify a product as a particular type if the product is within 20 % of the nominated density range and if it has all of the properties of the nominated type.

3.2 Symbols and abbreviated terms

The following abbreviated terms are used in the preparation of the classification matrices in Clause 4:

REG	regular	for use in dry conditions only
MR	moisture resistant	for use in humid conditions
HMR	high moisture resistant	for use in high-humidity conditions
EXT	exterior	for exterior use above ground
LB	load-bearing	for structural or load-bearing use
GP	general purpose	for use in general applications and furniture, not requiring the specific properties of load-bearing grades
DIY	do-it-yourself	for use in home projects, rather than by professional tradespersons
δ	thickness	

NOTE For definitions of the terms dry, humid, high humid, load-bearing and structural, see ISO 17064.