

ISO

INTERNATIONAL ORGANIZATION FOR STANDARDIZATION

ISO RECOMMENDATION

R 633

CORK
GLOSSARY

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BRIEF HISTORY

The ISO Recommendation R 633, *Cork – Glossary*, was drawn up by Technical Committee ISO/TC 87, *Cork*, the Secretariat of which is held by Repartição de Normalização (IGPAI).

Work on this question by the Technical Committee began in 1958 and led, in 1963, to the adoption of a Draft ISO Recommendation.

In June 1964, this Draft ISO Recommendation (No.733) was circulated to all the ISO Member Bodies for enquiry. It was approved, subject to a few modifications of an editorial nature, by the following Member Bodies:

Argentina	France	Netherlands
Australia	Germany	Poland
Brazil	Israel	Portugal
Chile	Italy	United Kingdom
Colombia	Japan	Yugoslavia
Czechoslovakia	Morocco	

One Member Body opposed the approval of the Draft:

Spain.

The Draft ISO Recommendation was then submitted by correspondence to the ISO Council, which decided, in November 1967, to accept it as an ISO RECOMMENDATION.

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CORK

GLOSSARY

INTRODUCTION

The purpose of this ISO Recommendation is to define cork and to determine and define the terms to be used in describing the various states in which cork may be found and the principal products manufactured therefrom.

1. CORK

The suberous parenchyma developed by the subero-phellogenetic meristem of the cork tree (*Quercus Suber* L.) whose trunks and branches it envelops.

Cork is made up of dead cells, most of them of a prismatic-hexagonal form and radially arranged, having no meatus in between them and filled with air. The dividing wall between two adjoining cells is composed of five layers; two of a cellulosic nature, lining the cellular cavities, two thicker suberized layers enclosing the former ones and an intermediate lignified layer.

2. RAW CORK

Cork having undergone no treatment whatsoever after stripping.

2.1 Virgin cork. Cork constituting the original cover of the trunk and branches.

2.1.1 Summer virgin. Virgin cork obtained from growing trees being stripped for the first time.

2.1.2 Summer virgin (augment). Virgin cork cut from growing trees above the level of a previous stripping.

2.1.3 Ordinary virgin. Virgin cork stripped from felled trees.

2.1.4 Winter virgin (hatchet). Virgin cork, generally from pruned branches, obtained by stripping the bark after cutting it with an axe along the axis of the branches, along with fragments of inner bark and/or even lignified tissue.

2.1.5 Winter virgin (adze). Virgin cork, generally from pruned branches, adze-cut transversely to the axis of the branch and free from inner bark and lignified tissue.

2.1.6 Virgin "flambé". Virgin cork from trees scorched by fire.

2.2 Reproduction cork. Cork formed, after stripping virgin cork, as a result of the regeneration of the subero-phellodermic meristem in the inactive inner bark the external part of which forms the back of this cork.

NOTE. — A preliminary sorting operation may be carried out to separate inferior quality reproduction cork. The product of this quality is known under the name *raw refuse*.

2.2.1 Reproduction cork (first stripping after virgin) or secundaria. The first mature regenerated cork.

2.2.2 Reproduction cork (second and subsequent strippings). Regenerated cork coming after the first mature and regenerated cork.

2.2.3 Reproduction cork or wedges. Reproduction cork growing about the part near the earth, not collected at the time of normal stripping but later on in a more careful extraction.

2.2.4 Reproduction "flambé". Reproduction cork from trees scorched by fire.

NOTE. — Raw refuse coming from reproduction "flambé" is known under the name *raw refuse "flambé"*.

2.3 Ramassage. Virgin or reproduction cork from trees, branches or other parts of trees whose wood and even the bast has rotted away.

2.4 Gleanings or rebusca. Small pieces of virgin or reproduction cork left lying in the oak groves during normal stripping and collected afterwards.

3. MANUFACTURED CORK (corkwood)

Reproduction cork, boiled, scraped, flattened, selected and where applicable trimmed.

NOTE. — The prepared cork is described as *scraped* when excess back has been removed by scraping. It is described as *debacked* when the whole of the back has been removed.

3.1 Corkwood in planks. Large size pieces of corkwood, the surface area of which is at least 400 cm², of a quality suitable for further transformation by cutting and trimming.

3.2 Corkwood pieces. Corkwood pieces measuring less than 400 cm² and of a quality suitable for further transformation by cutting.

3.3 Corkwood refuse or rebusca. Corkwood of a low quality, not suitable for further transformation by cutting.

3.4 Corkwaste. Corkwood scraps remaining after the manufacture of cork or its transformation by cutting.

3.4.1 Common corkwaste. Corkwaste with adherent back (see term 2.2). These wastes may be packaged separately but are often mixed.

3.4.1.1 Sliced corkwaste. Irregularly shaped corkwaste cut from corkwood in planks during selection.

- 3.4.1.2 *Trimming corkwaste.* Corkwaste of reduced width, obtained from the surfacing or the trimming of the edges of corkwood in planks.
- 3.4.1.3 *Strip corkwaste.** Strips (see term 4.1.1) or portions of strips not suitable for transformation by cutting, owing to inferior quality, irregular shape or reduced dimensions.
- 3.4.1.4 *Square waste.** Corkwaste obtained when corkwood in planks or corkwood pieces are transformed into squares.
- 3.4.1.5 *Blocker waste.** Corkwaste from hollow-punch stopper cutting.
- 3.4.2 *Backs.* Corkwaste consisting of back (see term 2.2) with adherent suberous tissue of reduced thickness obtained by removal of cork back.
- 3.4.3 *Debacked waste.* Corkwaste from which the back has been removed.
- 3.4.4 *Bellies.* Corkwaste consisting of suberous tissue of reduced thickness cut from corkwood in planks and consisting of the inner portion of the cork (bellies) which was in contact with the trunk of the tree.
- 3.4.5 *Fine waste.* Corkwaste free from backs (see term 2.2) and bellies (see term 3.4.4). These wastes may be packaged separately but are more generally mixed.
- 3.4.5.1 *Ribot machine waste.* Fine waste from the manufacture of corks from squares (see term 4.1.2) using the ribot machine, the parings themselves therefore being in the form of rectangular parallelepipeds from which the inner cylinder has been removed.
- 3.4.5.2 *Shaving machine waste.* Fine waste from the modification of the diameter and/or the form of cork stoppers already manufactured.
- 3.4.5.3 *Disc waste.* Fine waste being the skeleton sheets from which discs (see term 4.1.4) have been stamped out.
- 3.4.5.4 *Split waste.* Fine waste being the skeleton sheets from which shoe socks have been stamped out, and/or the sheets rejected in consequence of deficiency of quality or size.
- 3.4.5.5 *Cork stopper waste.* Corks or parts of corks rejected as waste because their form or quality makes them unsuitable for closures.
- 3.4.5.6 *Rejected disc waste.* Discs or parts of discs rejected as waste because their form or quality makes them unsuitable for closures.

4. WORKED CORK

Raw and/or manufactured cork transformed primarily by cutting, granulation or agglomeration.

* These products may be corkwaste from which have been removed

- (1) backs or
- (2) backs and bellies

Their designation will then be completed

in the first instance, by the qualification "debacked",
in the second instance, by the qualification "fine".

- 4.1 Simple cut pieces.** Cork cut into pieces of varying form and size in a direction either parallel with or at right angles to the medullary rays and subject to subsequent gluing or sanding according to their final purpose.
- 4.1.1 Strips.*** Rectangular parallelepipeds of elongated shape, obtained from corkwood in planks or corkwood pieces.
- 4.1.2 Squares.*** Rectangular parallelepipeds made of one piece or a number of pieces glued together and normally used for stopper manufacture.
- 4.1.3 Corks (cork stoppers).*** Cork pieces shaped like cylinders, cone frustums or rectangular prisms with rounded lateral edges, each made of one piece or more than one piece glued together and used as plugs to close containers, or contribute to their tightness.
- 4.1.4 Discs.*** Circular pieces of small thickness.
- 4.1.5 Washers.*** Annular pieces of various diameters and thicknesses.
- 4.1.6 Gaskets.*** Jointing pieces of appropriate form and thickness.
- 4.1.7 Cork paper.*** Very thin-cut sheets.
- 4.1.8 Cork wool.*** Very thin ribbons used principally to fill mattresses and in packaging.
- 4.1.9 Shoe socks.*** Cork pieces which have been stamped out from thin sheets and intended principally for the boot and shoe industry.
- 4.1.10 Floats.*** Pieces of varying shape intended for fishing purposes.
- 4.2 Granulated cork.** Fragments of various dimensions obtained by grinding and/or milling raw cork, manufactured cork or simple cut pieces.
- 4.3 Expanded granulated cork.** Granulated cork expanded by thermal treatments.
- 4.4 Agglomerated cork.** Material obtained by agglomeration or agglutination of granulated cork (expanded or not) or, occasionally, of regranulated cork or corkwaste.
- 4.4.1 Pure agglomerated cork.** Agglomerated cork obtained with no added binder not derived from cork.
- 4.4.1.1 Unexpanded pure agglomerated cork.** Agglomerated cork manufactured by a process that does not appreciably alter the suberous tissue.**
- 4.4.1.2 Expanded pure agglomerated cork.** Agglomerated cork manufactured by a process which appreciably alters the suberous tissue.***

* These products may also be worked with composition cork. In this case, their name will consist of the name given preceded by the word "composition".

** The different products made of unexpanded pure agglomerated cork, such as, for example, wall panels and floor tiles, are described in the appropriate ISO Recommendations. These products may also be worked with composition cork. In this case, their name will consist of the name given, except for the word "composition" substituted for the word "pure".

*** The products manufactured of expanded pure agglomerated cork such as, for example, thermal, acoustic or anti-vibration corkboard, are described in the appropriate ISO Recommendations. These products may also be worked with composition cork. In this case, their name will consist of the name given, except for the word "composition" substituted for the word "pure".