

European Oak

Oak has a heartwood which is yellow-brown, and which is clearly distinguishable from the 25-50 mm thick pale brown sapwood. Oak has a high tannin content as a result of which metals coming into contact with oak corrode very quickly.



Properties of this timber species

General

- Botanical name: 1. Quercus robur (pedunculate oak), 2. Quercus petraea (sessile oak)
- Other names: Chêne, Eiche, Eiken

Quality requirements

- European Oak (the oak in Northern Europe, Quercus petraea) is listed in the Dutch norm NEN 5493 'Quality Requirements For deciduous wood In Road Construction Works, Hydraulic Engineering Works And Other Structural Applications'.

Strength class

- Polish Oak Category 3/NEN 5493, quality class European A, is classed in strength class D24 (NEN-EN 338)
- Central European Oak Category 3/NEN 5493, quality class European A, is classed in strength class D22 (NEN-EN 338)
- Central European Oak Category 3/NEN 5493, quality class European B, is classed in strength class C14 (NEN-EN 338)

Uses

- Oak can be used almost anywhere and in any industry, both in the construction industry, in shipyards, for bridge-building and hydraulic works, as well as in the chemical industry, furniture, toys, agricultural machinery, etc.
- European oak is indispensable in the manufacture of barrels for wine, sherry and cognac
- The uses of oak are far too numerous to mention all here

Durability

- Resistance to fungi: class 2-3 (durable - moderately durable)
- Resistance to insects: Termites class M (moderately durable), Anobium (woodworm) class G (sapwood susceptible to damage), the sapwood is susceptible to damage by Lyctus (wood-boring beetle).

Density

- (500)-670-710-760-(970) kg/m³ at 12% moisture content
 - Fresh 900-1200 kg/m³
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