



GUARIUBA

Source

FSC Guariuba is available in the forests of Precious Woods, located in the Amazon region of Brazil. The trees attain diameters up to 80 cm and heights up to 40 m. The trunks have a straight and cylindrical shape. The sapwood is 2-5 cm wide.

Appearance

Freshly cut, the timber has a light yellow to orange red color, strongly darkening to (dark) brown. Plain sawn timber shows a nice pattern. The timber has a tendency to ring shakes (delaminating of the growth rings). The heartwood has a moderate lustre. The whitish yellow sapwood is easy to distinguish. The grain is mainly straight and the texture is fine. This species is approved for window frames according to the Dutch KOMO guidelines. The heartwood has a tendency to bleed.

Processing properties

Machining results in a pretty smooth surface. However, specially kiln dried timber will cause a quite severe blunting effect on the tools due to the high Silica content in the heartwood. Pre-drilling is recommended. The results with gluing (also lamination) and finishing are good, but apply a suitable primer to avoid damage caused by bleeding of extractives. Drying goes relatively quickly. Kiln drying must be done with care, to prevent (end) checking.

Application

This beautiful species can be used for several applications:

- interior: e.g. flooring/parquet, doors, window frames and stairs
- exterior: e.g. window frames, doors, garden furniture, cladding and playground equipment

Technical properties

Green density	1.000 – 1.200 kg/m ³
Density (at 12%)	700 kg/m ³
Shrinkage green – oven dry	2,7% radial; 5,6% tangential
Shrinkage green – 65% RH (abt. 12% EMC)	0,8% radial; 1,8% tangential
Equilibrium Moisture Content (EMC)	8,5% (at 65% RH water adsorption) 12,8% (at 65% RH water desorption)
Fibre Saturation Point (FSP)	22%
Durability according to EN 113 (without soil contact)	Heartwood class 1
Durability according to ENV 807 (with soil contact)	Heartwood class 1
Durability according to literature	Heartwood class 1-3
Bending strength, MOR (defect free samples)	105 N/mm ²
Modulus of elasticity, MOE (defect free samples)	17.060 N/mm ²
Shear strength (defect free samples)	11,7 N/mm ²
Janka hardness	7.800 N (transversal); 6.200 N (parallel)
Chemical composition	Cellulose: 48%; Hemicellulose: 24%; Lignine: 28%
<i>The figures in this table are mainly indicative, unless a specific standard is mentioned, which provides exact figures.</i>	

References

This information is based on research (mainly independent) and experience of Precious Woods, (semi-) scientific literature and the (Dutch) Houtvademecum (10th edition 2010).