

Common name:	ANDIRA
Family:	FABACEAE
Scientific name(s):	Andira spp.

LOG DESCRIPTION	WOOD DESCRIPTION
Diameter: from 60 to 90 cm	Colour: Red brown
Thickness of sapwood: from 3 to 5 cm	Sapwood: Clearly demarcated
Floats: no	Texture: Coarse
Durability in forest : Good	Grain: Straight or interlocked
	Interlocked grain: Slight
Note:	Pink brown to red brown, bands of light coloured parenchyma tissue give this wood a distinctive figure. Presence of internal stresses and wind shakes.

PHYSICAL PROPERTIES			MECHANICAL PROPERTIES		
Physical and mechanical properties are based on mature heartwood specimens. These properties can vary greatly depending on origin and growth conditions.					
	mean	standard deviation		mean	standard deviation
Density *:	0.86 g/cm ³	0.09	Crushing strength *:	72 MPa	12
Monnin hardness*:	8.8	2.0	Static bending strength *:	128 MPa	24
Coef of volumetric shrinkage:	0.65 %	0.10	Modulus of elasticity *:	20170 MPa	4724
Total tangential shrinkage:	7.3 %	0.7			
Total radial shrinkage:	4.6 %	0.6			
Fibre saturation point:	23 %				
Stability:	Poorly stable		(* : at 12 % moisture content ; 1 MPa = 1 N/mm ²)		

NATURAL DURABILITY AND TREATABILITY

Fungi and termite resistance refers to end-uses under temperate climate.
 Except for special comments on sapwood, natural durability is based on mature heartwood.
 Sapwood must always be considered as non-durable against wood degrading agents.

Fungi:	Class 2 - durable	* ensured by natural durability (according EN standards).
Dry wood borers:	Durable; sapwood demarcated (risk limited to sapwood)	
Termites:	Class D - Durable	
Treatability:	3 - poorly permeable	
Use class*:	4 - in ground or fresh water contact	
Note:	The species <i>Andira coriacea</i> is very resistant to decay (class 1); it naturally covers the use class 5 (end-uses in marine environment and in brackish water). According to the European standard NF EN 335, performance length might be modified by the intensity of end-use exposition.	

MAIN LOCAL NAMES

Countries	Local names
Brazil	ACAPURANA
Brazil	ALMENDRO DE RIO
Brazil	ANDIRA
Brazil	ANDIRA UCHI
Brazil	ANGELIM
Colombia	CONGO
Ecuador	MOTON
French Guiana	SAINT MARTIN ROUGE
Guyana	BAT SEED
Guyana	KORARO
Mexico	MAQUILLA
Peru	QUINILLO COLORADO
Surinam	RODE KABBES
Trinidad and Tobago	ANGELIN
Venezuela	SARRAPIO MONTANERO

ANDIRA

REQUIREMENT OF A PRESERVATIVE TREATMENT

Against dry wood borer attacks:	Does not require any preservative treatment
In case of temporary humidification risk:	Does not require any preservative treatment
In case of permanent humidification risk:	Does not require any preservative treatment

DRYING

Possible drying schedule

Drying rate:	Rapid to normal	Temperature (°C)			Air humidity (%)
		M.C. (%)	dry-bulb	wet-bulb	
Risk of distortion:	Slight risk	Green	42	39	82
Risk of casehardening:	No	50	48	43	74
Risk of checking:	Slight risk	40	48	43	74
Risk of collapse:	No	30	48	43	74
		15	54	46	63

This schedule is given for information only and is applicable to thickness < 38 mm.

It must be used in compliance with the code of practice.

For thickness from 38 to 75 mm , the air relative humidity should be increased by 5 % at each step.

For thickness over 75 mm , a 10 % increase should be considered.

SAWING AND MACHINING

Blunting effect:	Fairly high
Sawteeth recommended:	Stellite-tipped
Cutting tools:	Tungsten carbide
Peeling:	Bad
Slicing:	Good
Note:	It is difficult to obtain a smooth surface in planing because of the alternate bands of hard and soft wood. Splinters may cause infection.

ASSEMBLING

Nailing / Screwing:	Good but pre-boring necessary
Gluing:	Correct (for interior only)
Note:	Tends to split when nailing. Gluing must be done with care (dry wood and smooth surfaces).

END-USES

Main known end-uses; they must to be implemented according to the code of practice.

Important remark: some end-uses are mentionned for information (traditional, regional or ancient end-uses).

Cabinetwork (high class furniture)

Exterior joinery

Interior joinery

Exterior panelling

Sliced veneer

Current furniture or furniture components

Bridges (parts not in contact with water or ground)

Heavy carpentry

Wood frame house

Industrial or heavy flooring

Turned goods

Vehicle or container flooring
