AVAILABILITY, SIZES AND PROPERTIES OF TIMBERS IMPORTED INTO WESTERN AUSTRALIA

FOREST PRODUCTS ASSOCIATION (WA)
103 COLIN STREET, WEST PERTH 6005

DOUGLAS FIR

(Pseudotsuga Menziesii) Also known as Oregon

Origin:

U.S.A. and Canada (West Coast).

Availability:

Readily available. Supplied in un-

seasoned condition.

Sizes:

75 x 50 to 300 x 150 in lengths up

to 6.0m and occasionally up to 7.2m

Uses:

General construction where long length of large sections are required. Also used in scantling, laminated

beams, furniture and panelling.

Advantages:

Available in long length large section sizes, machines well and of uniform

light colour.

Limitations:

Unsuitable for exterior work, does

not bend well.

Density:

Unseasoned approx. 450 kg/m³

Seasoned approx. $560 \text{ kg/m}^3 (12\% \text{ M.C.})$

Strength Group:

Unseasoned - S5

Seasoned - SD5

Stress Grade (Structural Grade):

Unseasoned

Select Merchantable Merchantable F5

Other grades may be available by

arrangement with supplier.

Durability:

Non-durable in exposed conditions

or in ground contact.

JELUTONG

(Dyera costulata)

Origin:

Malaysia

Availability:

Supplied seasoned in limited quan-

tities.

Sizes:

 50×25 to 150×25 with limited quantities up to 100×100 . Lengths

up to 3.0m occasionally available to

3.6m.

Uses:

Pattern making, mouldings, interior

joinery, cabinet work, coffins and

drawing boards.

Advantages:

Light and soft, easy to work.

Limitations:

Very soft, non-durable, has large latex tubes that mar appearance.

Density:

Approx. 465 kg/m³ (12% M.C.)

Strength Group:

Not normally used for structural

purposes.

Durability:

Non-durable in ground contact, sap-

wood is susceptible to Lyctus attack.

KAPUR

(Dryobalanops spp.)

Origin:

Malaysia, Indonesia

Availability:

Readily available. Generally supplied seasoned but unseasoned sizes are

available.

Sizes:

Up to 300×50 , in lengths up to 6.0 m.

Uses:

Joinery, general construction barges

and fascias.

Advantages:

Straight grain, seasons readily, strong

and stable.

Limitations:

Inclined to dull planer knives due to

fibrous nature of the timber.

Density:

Approx. 740 kg/m³ (12% M.C.).

Strength Group:

Unseasoned - S3

Seasoned - SD3

Stress Grade (Structural Grade);

ry north a stage of fire

Unseasoned - F11 (Str. 3 AS 2082)

Seasoned — F17 (Str. 3 AS 2082)

Durability:

Durable in exposed situations.

KERUING

(Dipterocarpus spp.)

Origin:

Malaysia, Phillipines, Thailand, India.

Available:

Not normally stocked in W.A., limited quantities of unseasoned

timber available.

Sizes:

 50×25 to 100×50 in lengths 1.8m

to 6.0m.

Uses:

General construction timber, suitable

for flooring especially industrial

flooring.

Advantages:

Strong with straight grain with a few

growth imperfections.

Limitations:

The timber gives off a lot of gum, when dressed the grain tends to rise; hard on saws and tools due to silica and

gum.

Density:

Unseasoned approx. 700 kg/m³

Seasoned approx. 850 kg/m³

(12% M.C.)

Strength Group:

Unseasoned - S3

Seasoned - SD3

Stress Grade (Structural Grade):

Unseasoned — F11 (Str. 3 AS 2082)

Seasoned - F17 (Str. 3 AS 2082)

Durability:

Non durable in ground contact, sap-

wood susceptible to lyctus attack.

MENGKULANG

(Heritiera simplicifolia)

Origin:

Malaysia, Sarawak and Indonesia.

Availability:

Limited — not widely stocked in W.A., Supplied in both seasoned and

unseasoned condition.

Sizes:

Up to 200 x 38, in lengths to 6.0m.

Uses:

Internal joinery, panelling, plywood

veneers, general utility timber.

Advantages:

Easy to work and bend.

Limitations:

Very severe on plane saws and knives

when seasoned.

Density:

Approx 705 kg/m³ (12% M.C.)

Strength Group:

Green

- S3

Seasoned - SD4

Stress Grade (Structural Grade):

Unseasoned — F11 (Str. 3 AS 2082) Seasoned — F14 (Str. 3 AS 2082)

Durability:

Moderate — Suitable for exterior above ground applications, sapwood is susceptible to Lyctus attack.

MERAKA ALAN

(Shorea albida) Also known as Alan Batu

Note: This species produces two distinct sorts of commercial material the lighter juvenile wood (480 kg/m³ to 690 kg/m³ at 12% M.C.) is sold as Alan Bunga or Meranti Bunga. Meraka Alan is that part of the wood with a density around 860 kg/m at 12% M.C. (i.e. similar density to seasoned Jarrah).

Origin:

Sarawak, Brunei

Availability:

Limited — not widely carried in W.A.

Sizes:

 75×25 to 250×50 , in lengths up to

5.4m.

Uses:

General construction, flooring and

joinery.

Advantages:

Works easily with handtools, readily

accepts glues and polishes when

filled.

Limitations:

Difficult to ensure that the timber is of the required density. Alan Bunga

is strength Group S6.

Density:

Approx. 860 kg/m³ (12% M.C.).

Strength Group:

Unseasoned - S2 (See Limitations)

Stress Grade (Structural Grade):

Unseasoned - F14 (Str. 3 AS 2082)

Durability:

Moderately durable — unsuitable for

use in ground contact. Sapwood is

susceptible to Lyctus attack.

MERANTI --- LIGHT RED

(Shorea spp.)
also known as Phillipine Mahogony

Note: Dark Red Meranti is produced from the same species grouping and has similar properties to Light Red Meranti, however, sizes and availability is limited.

Origin:

Malaysia, Sabah, Indonesia and Phil-

lipines.

Availability:

Readily available, usually supplied

seasoned.

Sizes:

t

 75×25 to 200×50 , in lengths from

1.8m to 6.0m.

Uses:

Extensively used in furntiure, in-

ternal joinery and mouldings.

Advantages:

Light, easy to work, accepts timber

stains readily.

Limitations:

Porous nature makes it difficult to obtain a high polish. The species

lacks variety of figure.

Density:

Approx. 500 kg/m³ (12% M.C.)

Density is highly variable.

Strength Group:

Seasoned -SD7

(Not normally used for structural

purposes).

Durability:

Non-durable — not recommended for

external use. Sapwood is susceptible

to Lyctus attack.

NYATOH

(Palaquium spp., Payena spp.)

Origin:

Malaysia

Availability:

Readily available in seasoned con-

dition.

Sizes:

From 50×25 to 250×50 , in lengths

up to 6.0m.

Uses:

Furniture, cabinet making, internal

joinery, mouldings and panelling.

Advantages:

Close grained, machines well and

takes a high polish.

Limitation:

Not suitable for exterior joinery.

Density:

Approx. 670 kg/m³ (12% M.C.).

Strength Group:

Not normally used for structural

purposes in W.A.

Durability:

Non-durable in exposed situations, sapwood is susceptible to Lyctus

attack.

RAMIN

(Gonystylus spp.)

Origin:

Sarawak, Indonesia.

Availability:

Available in limited quantities, generally supplied in seasoned con-

dition.

Sizes:

75 x 25 to 200 x 50 in lengths up to 6.0m. Sizes over 125 x 25 and lengths over 4.5m have limited avail-

ability.

Uses:

Extensively used for furniture and cabinet work. Also used for mouldings, internal joinery and plywood.

Advantages:

Machines well, suitable for blond furniture and mouldings because of light uniform colour.

Limitations:

Unsuitable for exterior use, does not bend well.

Density:

Approx. 670 kg/m³ (12% M.C.).

Strength Group:

Not normally used for structural

purposes.

Durability:

Non-durable in exposed situations or ground contact, sapwood is sus-

ceptible to Lyctus attack.

REDWOOD - Californian or Canadian

(Sequoia sempervirens)

Origin: West Coast North America.

Availability: Limited availability — not generally

stocked, Supplied in both seasoned

and unseasoned condition.

Sizes: $25 \times 25 \text{ up to } 150 \times 150 \text{ in lengths}$

to 6.0m.

Uses: Exterior garden furniture, joinery

other uses where high durability is

important.

Advantages: Extremely durable, machines well,

and is very stable. Suitable for use in situations of constant exposure to heat or moisture. e.g. sauna baths,

cooling towers.

Density: Approx, 400 kg/m³ (12% M.C.).

Strength Group: Unseasoned — S5

Seasoned - SD6

(Not normally used for structural

purposes).

Durability: Highly durable in all situations.

TASMANIAN OAK

(also known as Australian Oak)

(Consists of a mixture of a large number of Eucalypt species including Alpine Ash, Mountain Ash and Messmate).

Origin:

South Eastern Australia and Tas-

mania.

Availability:

Limited — Not usually stocked.

Supplied seasoned.

Sizes:

50 x 25 to 100 x 50 (actual dressed

sizes are slightly smaller) in lengths

to 4.2m.

Uses:

Furniture and joinery. Used ex-

tensively in Eastern States for house framing and scantling gener-

ally.

Advantages:

Straight grained and strong,

machines well, has unifrom light colour and readily accepts polishes

and stains.

Limitations:

Difficult to obtain long lengths and

wide boards.

Density:

Approx. 670 kg/m³ (12% M.C.).

Strength Group:

Unseasoned - S4

Seasoned

- SD4

Stress Grade (Structural Grade):

Structural grades not normally avail-

able in W.A.

Seasoned -F14 (Str. 3 AS 2082)

Durability:

Moderately durable — Not suitable

for ground contact.

TEAK

(Tectona grandis)

Origin:

Thailand, Burma, Indonesia.

Availability:

Available from a limited number of

suppliers. Supplied seasoned.

Sizes:

 100×25 to 200×50 , in lengths from

1.8m to 3.6m.

Uses:

Primarily used for cabinet work and furniture. Also used for general ship-building including decking, and suitable for acid tanks and cooling

towers.

Advantages:

A stable, highly durable decorative timber that polishes well and has an

attractive figure.

Density:

Approx. 640 kg/m³ (12% M.C.).

Strength Group:

Unseasoned - S4

Seasoned - SD5

(Not normally used for structural

purposes in W.A.).

Durability:

Highly durable in all exposed situations, sapwood is susceptible to

Lyctus attack.

WESTERN RED CEDAR

(Thuja plicata)

Origin:

North America.

Availability:

Limited availability — not generally stocked. Supplied in both seasoned

and unseasoned condition.

Sizes:

Up to 150×50 , in lengths to 4.2m.

Uses:

Well suited as weather boards, fascias external joinery and internal wall

panelling. Also used for boat building, shakes and shingles.

Advantages:

Extremely durable, easy to work, light weight, paints and polishes well.

Limitations:

Rather soft and requires careful

handling.

Density:

Approx. 370 kg/m³ (12% M.C.).

Strength Group:

Not normally used for structural pur-

poses.

Durability:

Highly durable in all situations in-

cluding ground contact.

YELLOW PINE — Ponderosa Pine

(Pinus ponderosa)

Origin:

North America.

Availability:

Readily available in seasoned con-

dition from major suppliers.

Sizes:

Available in sizes up to 25, 38 and 50×150 and occasionally up to 50×300 in lengths from 2.4 to 4.8m.

Uses:

Pattern making, cooperage, interior mouldings, toys and furniture. Suitable for most purposes where regularly exposed to but not immersed in water and bench tops.

water e.g. bench tops.

Advantages:

Light weight, stable and easy to

work.

Density:

Approx. 430 kg/m³ (12% M.C.).

Strength Group:

Seasoned -SD7

(Not normally used for structural

purposes).

Durability:

Non-durable, but water resistant, pri-

marily for internal use.