



Forestry Species

CONDITIONING FORESTRY SEEDLINGS IN AUTUMN

Douglas fir stop growing and set a terminal bud when day lengths shorten in the autumn. *Pinus radiata* is a tree species that will grow whenever the temperatures are sufficiently warm enough.

The challenge for the nurseryman is to have seedlings with good root collar diameter, as well as a high foliar nutrient status, with good root development. These are our methods to achieve a well-conditioned seedling:

We grow the tree seedlings vigorously, using topping as a means for height control which allows us to meet these specifications.

Apically dominant radiata seedlings re-establish a dominant leader and topping aids the establishment of good root development rather than excessive early height growth.



Undercutting is done using a serrated steel blade which cuts the tap root and encourages lateral and fibrous roots to develop.



Wrenching is the process of passing a cutting blade under the seedbed to aerate and disturb the seedlings, further encouraging root development.





A period of frosts is necessary to truly stop radiata seedling growth and is the final stage of seedling conditioning prior to planting.

Keeping seedlings cool while being transported and stored prior to planting, is equally as important.



PINUS RADIATA

This is the most commonly planted forestry species because it is adaptable over a wide range of planting sites. A choice of GF (growth and form) ratings are available including GF Plus certified seedlots which provide information on the individual traits of particular seedlots.

Seedlings	100+	1,000
GF19	\$50	\$310 + GST
Seed stand open pollinated (SSOP)	\$50	\$310 + GST
GF + Wood density 24		
Control pollinated (CP)	\$90	\$520 + GST
Cuttings		
GF + Wood density 24 cuttings		
Control pollinated (CP)	\$90	\$540 + GST

We will quote on large orders.

Appletons have a reputation as suppliers of quality-grown forestry seedlings.



2016 FORESTRY SPECIES

Cedrus deodara

Himalayan cedar

Large conical timber tree, branch ends droop, softer appearance. Drought and inland exposure tolerant.



	50+	1,000
Seedlings 20-30cm	\$1.60	\$1.55
Transplants 25-50cm	\$2.35	\$2.30
Transplants 50-75cm	\$3.05	\$2.95

Cupressocyparis ovensii

Ovens hybrid cypress

Hybrid between *Chamaecyparis nootkatensis* and *Cupressus lusitanica*. Cutting grown, fast straight growth, canker resistant. Not for coastal areas, light branching, no fluting.



	50+	1,000
Open Ground 25-50cm	\$2.50	\$2.35

Cupressus sp. Hybrid

Satchell cypress

Displays a mix of *C. arizonica* & *C. lusitanica* genes, fast growing, showing wind & drought tolerance



	50+	1,000
Plug Grown	\$2.00	\$2.70
Seedlings 25-50cm		
Seedlings 50-75cm		

Cupressus lusitanica

Mexican cypress

Important timber, straight trunk, branches gently ascending or descending, copes with dry & wet soils, but not exposure to salt winds. Canker resistant.



	50+	1,000
Proseed seed	SOLD OUT	SOLD OUT
Seedlings 25-50cm		
Plugs 25-50cm	\$1.55	\$1.10

Cupressus macrocarpa

Monterey cypress

Quick growing, quality timber, shelter and hedging tree for use in coastal areas. Susceptible to canker in humid, warm areas. Strathallen Progeny Trial seed selected for low incidence of canker.



Includes 4c per plant royalty.

	50+	1,000
Seedlings 25-50cm	\$1.25	\$1.00
Plugs 25-50cm	\$1.55	\$1.10

Pseudotsuga menziesii 'Fort Bragg' **SOLD OUT**

Douglas fir

A high quality timber and shelter tree, suited to colder, inland areas with moist well drained soils. Withstands snow and root grafting lessens the risk from wind storms.



	50+	1,000
2 yr seedlings 25-50cm	\$0.90	\$0.55
Transplants 50-75cm	\$1.90	\$1.75

Sequoia sempervirens

Californian or coast redwood **SOLD OUT**

Tall timber tree, prefers moist sheltered sites, can cope with drought. Good weed control initially.

Re-grows from cut stump.



	50+	1,000
Seedlings 25-50cm	\$1.85	\$1.55
Transplants 50-75cm	\$2.15	\$1.90
Clones 25-50cm	\$2.50	\$2.35
(Improved growth and form)		

Thuja plicata

Western Red Cedar

Tall, conical evergreen, excellent shelter and major timber tree in Western USA. Durable, stable timber.



	50+	1,000
Transplants 25-50cm	\$2.35	\$2.30
Transplants 50-75cm	\$3.05	\$2.95

Cryptomeria japonica

Japanese cedar

Withstands wind well, including salt laden winds in Westland. Good Kiwifruit shelter where it is trimmed. Major timber tree in Japan.



	50+
Open ground	\$3.05
2 yr transplants 50-75cm	



WE WILL QUOTE ON LARGE ORDERS

BROADLEAF FORESTRY SPECIES

The following are major timber producing species in Australia and the northern hemisphere. To achieve optimum growth, they must be planted on to a medium to high quality site and managed with an intensive pruning and thinning regime. They should be planted at no more than 3 x 3 metre spacing and have complete weed control for three years.



ACACIA

Acacia melanoxylon

Tasmanian Blackwood



Quick growing evergreen hardwood, dark brown timber for cabinets and joinery. Best growth in moist gullies. Grown from mature South African and Australian seedlots in 150cc side slit plug cells for reliable transplanting, topped at 40cm.

	50+	1,000
Price each	\$1.80	\$1.75

ALDER



All alders fix atmospheric nitrogen on their root nodules, have widely utilised hardwood timber, and are used for shade and shelter. When inter-planted with oaks, growth of oaks is enhanced probably due to the additional available nitrogen.

	50+	1,000
Seedlings 25-50cm	\$1.85	\$1.70
Seedlings 50-75cm	\$2.35	\$2.25

Alnus acuminata

Andean evergreen alder

Evergreen in mild climates, deciduous in frosty conditions.

Alnus cordata

Italian alder

Widely used in horticultural shelterbelts. Narrower crown, ideal nurse tree encouraging upright growth and suppressing side branches.

Alnus glutinosa

European or black alder

Vigorous growth & good form. Grows in very wet places and tolerates salt winds better than other alders.

Alnus rubra

Oregon or Red alder

Vigorous growth from stream to ridge top. Growing in Golden Downs since 1930s.



EUCALYPTUS

Eucalyptus fastigata **SOLD OUT**

Brown barrel



Tall forest tree, 40-60m tall from New South Wales tablelands to Eastern Victoria. Stable timber prized for decorative floors. Cold hardy and healthy over most of N.Z. Ideal for carbon farming credits.

	50+	1,000
Seedlings 25-50cm	\$1.40	\$1.00

OAK



	50+	1,000
Seedlings 25-50cm	\$2.00	\$1.65
Seedlings 50-75cm	\$2.95	\$2.70
Seedlings 75-100cm	\$3.90	\$3.65

Quercus palustris

Pin oak

This 'Eastwoodhill' selection has grown to an impressive size, with a strong central leader. Prefers moist, deep soils.

Quercus petraea x robur

Hybrid oak

Strong, central leader with hybrid vigour. Good straight trunk for furniture timber. Thrives on a variety of soils.

Quercus robur

English oak

Valuable, heavy timber for building and furniture. Close initial planting for straight tall trunks. Prefers moist, deep soils.

POPLAR



Please refer to our main species list for CLONAL SELECTION. Plant as a firebreak in moist gullies and for stabilising slips. Light coloured timber. Similar density to *Pinus radiata*. Yellow autumn colours. Rooted plants establish better than poles. Topped at 1.3m.

	50+	1,000
P. 'Chiba' ASP1 (Refer to page 40)	\$2.80	\$2.70
P. 'Androscoggin'	\$2.70	\$2.60
P. 'Argyle' NZ 5015	\$2.70	\$2.60
P. 'Crow's Nest' PN5010	\$2.70	\$2.60
P. 'Geyles + 'Pecam'	\$2.70	\$2.60
P. 'Tasman' PN559	\$2.70	\$2.60
P. trichocarpa PN471	\$2.70	\$2.60
P. 'Veronese' PN870	\$2.70	\$2.60
P. Yunnanensis	\$2.70	\$2.60