

## Species suitable for planting near power lines\*

Species	Height (metres)	Wind Tolerance	Special soil conditions	Features of species
Acacia spectabilis (Mudgee wattle)	4m	Low	No phosphate	Showy, golden flowers in spring
Acacia verticillata 'Rewa' (Rice's wattle)	2.5m	Low	No phosphate	Spring lemon-yellow flowers. Coppery-green new growth
Acer palmatum 'Atropurpureum' (Purple Japanese maple)	3.5	Low	Needs lime in peat soils.	Purplish-red foliage esp. brilliant in spring and autumn
Acer palmatum 'Tsumigaki'	3	Low	Needs lime in peat soils	Leaf tips only are coppery-purple. Good autumn colour
Banksia ericifolia (heath banksias)	3	High coastal	No phosphate. Avoid heavy clay soils	Golden amber, up to 20cm erect flowers, winter-early spring. Attracts bees
Banksia occidentalis	3	High coastal	No phosphate. Avoid heavy clay soils	Bright brownish-red flowers, 10-15cm, winter. Long, very narrow leaves
Camellia japonica (any cultivar)	4	High	No lime	Variety of flower forms and colours. Flower winter-spring
Ceanothus 'Roweanus' (Californian lilac)	2.5	High		Blue flowers, spring. Short lived, approx. 10yrs
Coprosma rugosa	4	High		
Corokia cheesemanii	3	High		Yellow flowers, red berries, silver foliage. Attracts birds
Fejoia sellowiana (Fejoia)	4	High coastal		Winter fruit on new growth
Grevillea banksia 'Forsteri'	3	High coastal	No phosphate	Bright red spidery flowers in summer
Hebe stricta	2-4	Medium		White flowers, summer
Hibiscus syriacus (Rose of Sharon)	3	High		Flowers summer-autumn. White, pink, mauve flowers available
Magnolia stellata (Star magnolia)	3	High		White flowers, midwinter-spring
Olearia cheesemanii	3-4	High		Prolific white flowers in spring
Photinia glabara 'Rubens'	4	High		Easier to grow than 'Red Robin'
Pittosporum tenuifolium 'Mountain Green'	4	Medium		
Prunus persica e.g. 'Iceberg' (Flowering almond)	4	High		Double white blossom, spring

## Species suitable for planting near lines (shelter belts)\*

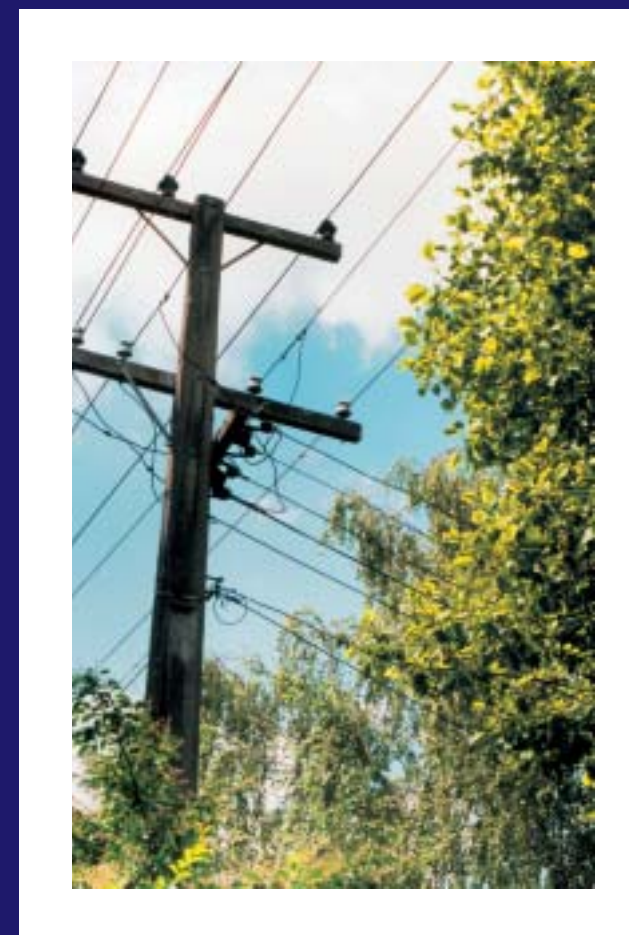
Species	Height (metres)	Wind Tolerance	Distance from lines (metres)	Special soil conditions	Features of species
Pinus radiata	30	High	35		
Poplar	30	Medium	35		Good soil stabiliser
Casuarina equisetifolia (sheoak)	20	High coastal	23		Fast growing
Salix (Willow)	15	Medium	17		Good soil stabiliser
Phebalium squameum	6	High	6		Good fast shelter belt, easy to maintain
Pittosporum ralphii (karo)	5	Medium	5		
Callistemon citrinus 'Splendens' (Bottlebrush)	5	High coastal	5		Crimson-red flowers in spring and summer
Acacia longifolia (Sydney golden wattle)	6	Low coastal	6	No phosphate. Flourishes in sandy soils	Golden yellow flowers in spring
Banksia serrata	6	High coastal	6	No phosphate. Avoid heavy clay soils	Deeply serrated, leathery leaves. Silver-grey 15cm flower spikes
Agonis juniperina	6	Average coastal	6		Mass of tiny white heath-like flowers in winter. Prefers annual trim
Olearia alba	5	High coastal	5		White flowers, summer-autumn

\* Note: Depending on local growing conditions, some species may still require maintenance. For shelter belts these species are only suitable if they are set back from the lines by the recommended distance.



Corner Victoria & London Streets  
 PO Box 925, Hamilton  
 Phone: 07-838 1399. Fax: 07-858 1426  
 Email: [connect@wel.co.nz](mailto:connect@wel.co.nz)  
 Website: [www.wel.co.nz](http://www.wel.co.nz)

# Trees and your power supply



# Trees near power lines cause unnecessary power cuts and are dangerous!



## The Waikato is a region of great beauty – fertile pastures, clean rivers and millions of trees.

Unfortunately, overgrown and inappropriate trees near power lines are one of the biggest contributors to power outages in our area.

Even when trees appear to be well clear of the lines, they still pose a threat to the power supply during storms and strong winds.

WEL Networks, your electricity lines company, is dedicated to delivering safe and reliable power to you.

To help increase the reliability of your power supply, we have prepared a guide for planting trees, and some guidelines on how to deal with problem trees growing around power lines.



## Some facts about trees and power lines

Trees and vegetation growing in the power lines cause about 20% of unplanned outages to your power supply.

Trees and branches that are touching or near the lines, cause interruptions and fluctuations to your power, particularly during strong winds.

Trees in the power lines are a safety hazard, with the potential of causing injury or even death by electrocution if someone touches the tree.

## Are your trees growing near lines?

WEL Networks regularly carries out patrols on its lines to identify problem trees. However as a property owner, **you are responsible** for keeping your trees on your property clear of the lines that run inside your property. This also includes trees that reach over your property boundary and encroach on lines in the roadside reserve.

## What should I do if my trees are near the lines?

If you have noticed that your trees are encroaching on the lines, or if you have received a letter from WEL informing you of the problem, you should attend to the problem immediately by either:

- Doing the work yourself. But beware! This is hazardous work and only permissible under the Health and Safety Act by qualified persons if within the growth limit zone. If you have any doubts please phone our Customer Contact Centre on 0800 800 935 for advice.
- Have the work done by a specialist contractor. These contractors are fully qualified and experienced in tree trimming around live power lines. Please contact our Customer Contact Centre and they will advise you who to contact to obtain competitive quotes.

Note: If you trim or fell any tree and cause a fault, you will be liable for all costs associated with the fault.

## Planting near lines?

Many people like to plant trees on their boundary for privacy or to beautify their property. The planning stage is the time when serious consideration should be given to the species you are choosing, especially if you are planting near overhead lines on your boundary. Remember, that lovely little shrub you planted may become a monster in a few years.

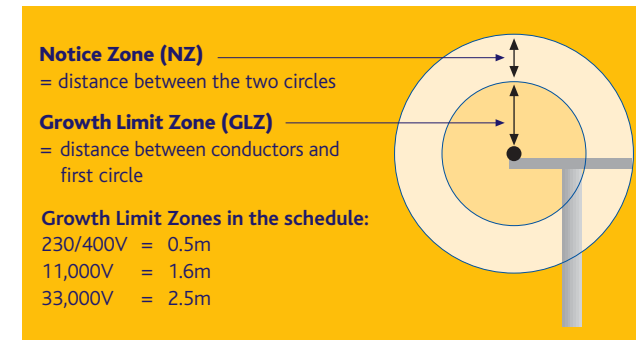
If the species selected and its location is such that it does not grow close to the lines you will save time and money by not having to undertake costly trimming.

## How much clearance is required and what are the rules?

A "clear zone" (known as the "growth limit zone") is required around the lines at all times. The minimum clearance requirements are 2.5 metres at 33,000 Volts, 1.6 metres for 11,000 Volts and 0.5 metres for 400/230 Volts.

If your trees are within one metre of the growth limit zone you may be given a hazard warning notice identifying the problem to you.

If we become aware of the tree encroaching the growth limit zone you will be given a cut or trim notification asking you to make arrangements and presenting options to have the trees trimmed or removed.



The rules surrounding trees and power lines are now covered by the Electricity (Hazards from Trees) Regulations 2003.

Where WEL is aware that there is immediate danger to persons or property because a tree has come in contact with or constitutes a hazard to a conductor, or has caused damage to a conductor, WEL is obliged to undertake any work needed to remove that danger.

A tree owner commits an offence where a notice to cut or trim a tree is given, and without reasonable excuse, the tree owner fails to cause the tree to be cut or trimmed, or fails to advise WEL of the time and location of the cutting or trimming of the tree.