SWIFT PARROT SEARCH

Introductory Support Guide to Identification of Eucalypts and Mistletoes

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standing together to stop extinctions

birdlife AUSTRALIA

Contents

1. Introduction

This document is a guide to assist birdwatchers who are undertaking "Swift Parrot Search" – the monitoring program to help us to urgently address knowledge gaps around the movements, distribution and habitat use of the critically endangered Swift Parrot, Regent Honeyeater and other woodland birds in south-eastern mainland Australia – particularly in the context of climate change. Further information is available on the project webpage – https://birdlife.org.au/swift-parrot

As part of this revised monitoring program, citizen-science birdwatchers are being asked to document the flowering intensity of tree and mistletoe species that are present at each site. This will increase of understanding of how food availability influences the use of habitats by Swift Parrots and other nectar-feeding birds.

This document assists with the identification of tree and mistletoe species likely to be encountered at these monitoring locations. Only a proportion of the trees – and none of the mistletoes - are known to be used by Swift Parrots for nectar feeding. However, but they all occur at locations where Swift Parrot have known to be present or could potentially be present.[1] Many may also provide a source of nectar for other honeyeaters and lorikeet species. Therefore, obtaining an understanding of flowering patterns across the landscape, regardless of whether they are used by Swift Parrots and other nectar feeders, will greatly enhance our understanding of many potential threats and opportunities – potentially leading to conservation management that is more effective and targeted.

For the tree species that are known to be important sources of food for the Swift Parrot – particular nectar, but also lerps and other types of food – detailed identification features are provided in Chapter 2.

In chapter 3 of this document, the entire list of tree species that may be encountered have been grouped into five main categories. For each species, the information provided includes its common name, latin name, occurrence within the mainland range of the Swift Parrot, expected use by Swift Parrots for foraging (if at all) and hyperlinks to further identification information.

- Boxes (usually rough, finely fibrous bark on trunk) – section 3.1.
- Gums (smooth barked trunks) – section 3.2.
- Ironbarks (permanent, dark deeply furrowed bark) – section 3.3.
- Other eucalypts and eucalypt-affiliates (Peppermints, Angophthora spp., Corymbia spp., Mahogany, stringybarks). – section 3.4.
- Other trees and tall shrubs (e.g., Banksia, Casuarina) – section 3.5.

Although mistletoe is not a known feed tree for Swift Parrot, it is important for Regent Honeyeaters, Painted Honeyeaters and a range of other threatened and declining woodland birds. As such, it has also been included in this monitoring project, with similar details provided particularly for those species of mistletoe that are known to be important for the Regent Honeyeater. (See section 3.6)

A range of online and hardcopy documents to further assist in the identification of tree and mistletoe species within the mainland range of the Swift Parrot is provided in Chapter 4.

This document will be updated over time, with the intention to increase the number of species with detailed descriptions, as provided in Chapter 2.

Feedback on corrections and possible updates to this document would be welcomed. Please send these to either Chris Timewell (chris.timewell@birdlife.org.au) or Beau Meney (beau.meney@birdlife.org.au).

[1] Many of these other tree species are still used by Swift Parrots for lerp-feeding (sugary exudates on the leaves of eucalypts formed by sap-sucking psyllid insects) and other leaf-gleaning foraging as they seek insects, etc.

2. Detailed Descriptions of selected feed trees for Swift Parrots

The following five pages contain detailed descriptions and identification assistance for 14 species of trees that are known to be used by Swift Parrots for feeding on nectar, and usually also lerp.

Most of these species are ones that are used by Swifties for nectar feeding on the mainland. The two exceptions are Southern Blue Gum (*Eucalyptus globulus*) and Swamp Gum (*E. ovata*). These species both occur on the mainland, but are not known as important Swift Parrot feed trees on the mainland. However, in Tasmania, these two tree species are critical foraging resources for Swift Parrots in their nesting areas.

Sidenotes:

- There are other trees used by Swift Parrots for foraging on occasions that are not included below. There are also likely to be additional species encountered within the range of the Swift Parrot at monitoring sites. See Chapter 3 for a more comprehensive list.

- The Red Ironbark is a common name used for two different species occurring within the range of the Swift Parrot. The detailed description provided here is for *Eucalyptus tricarpa*, which is the species to which this common name is most commonly applied. As noted in Table 3, it is sometimes also applied as a common name to the Broad-leaved Ironbark (*E. fibrosa*).

- Blackbutt is a common name used for different species occurring within the overall range of the Swift Parrot. The detailed description provided here is for *Eucalyptus pilularis*, which is the species which is most likely to be encountered during Swift Parrot Search surveys. However, *E. caniculata* is a species with a similar appearance, and can be difficult to distinguish during rapid assessments. For the purposes of this project, it is fine to put them both under the single **Blackbutt sp.** category during the field surveys.

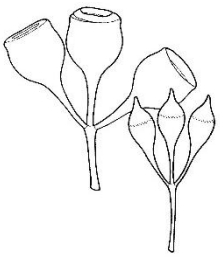
Yellow Gum
Eucalyptus leucoxylon

Tree to 25m tall. Occurs in open forest and woodland in western Victoria, South Australia and south-western NSW.

Bark mainly smooth grey / yellow with cream patches. May also have grey-brown fibrous-flaky ('box') bark persisting on lower trunk, shedding irregularly.

Flowering occurs mainly in autumn and winter. Flowers in clusters of three, may be white, cream, pink or red.

Adult leaves 8–15 cm long, 1–1.8 cm wide, green, grey-green or yellow-green, dull, densely veined.



Buds egg-shaped to globular, waxy white, 8–14 mm long, 5–6 mm wide. Fruit is cup-shaped to spherical, 8–11 mm long, 8–10 mm wide.

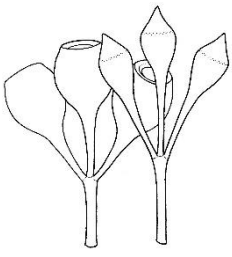
Red Ironbark
Eucalyptus tricarpa

Tree to 35 m high. Grows in dry sclerophyll forest or woodland on shallow, poorer soils south from Araluen NSW to coastal and subcoastal areas of Victoria.

Bark persistent throughout: red-brown to brown-black, deeply-furrowed `ironbark'.

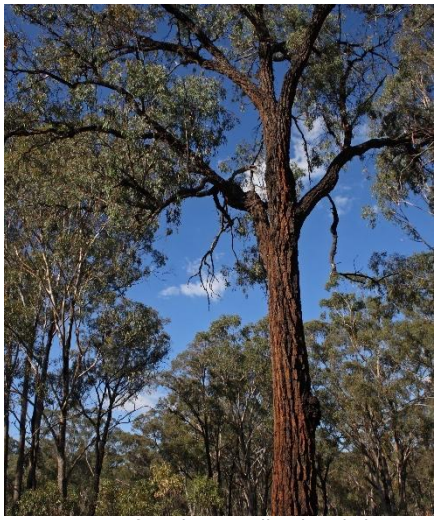
White (rarely pink) flowers in clusters of 3. Flowering usually in winter, although also a summer-flowering form near St Arnaud.

Adult leaves 9–19 cm long, 1.4–2.4 cm wide, dull green.



Buds egg-shaped, 10–14 mm long, 5–7 mm wide. Fruit spherical or hemispherical, 10–14 mm long, 10–15 mm wide.

Mugga Ironbark
Eucalyptus sideroxylon

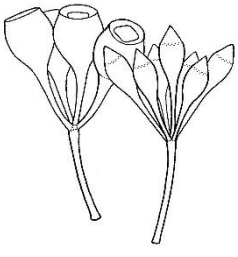


Tree to 35m, found in woodland on lighter, poorer soils. Widespread on the western slopes and plains from south-eastern QLD through NSW, into northern Victoria.

"Ironbark" – bark is red-brown to brown-black and deeply furrowed. Bark persistent over most of tree to the smaller branches.

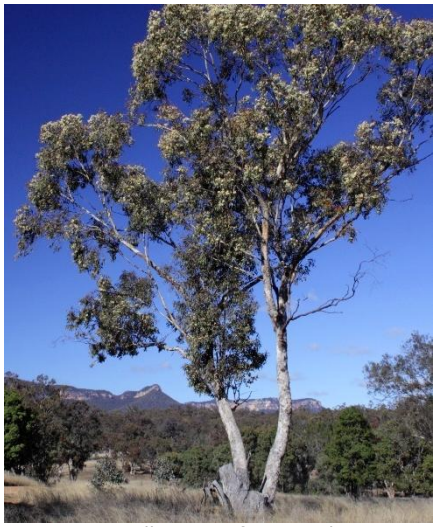
Flowers white, red, pink, yellow or lemon. Flowering March – November (varying greatly across regions).

Adult leaves 7–14 cm long, 1.2–1.8 cm wide, dull green or grey-green.



Buds are egg- or diamond-shaped, 0.6–1.5 cm long, 0.4–0.6 cm wide, green, creamy or waxy white. Fruit spherical to egg-shaped, 5–11 mm long, 5–9 mm wide.

White Box
Eucalyptus albens

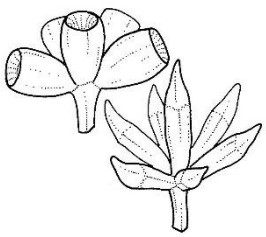


Tree to 25m tall. Occurs from south-eastern QLD throughout the western slopes of NSW to eastern Victoria.

Bark rough over trunk and to base of large branches, fibrous, becoming tessellated, with pale grey and white patches. Upper branches smooth and white.

Flowers white, in clusters of 7. Flowering occurs May–February (varying across regions).

Adult leaves 10–16 cm long, 1.7–3 cm wide, dull blue-grey and densely veined.



Buds up to 18 mm long and 6 mm wide. Usually waxy white, with a conical cap. Fruit barrel-shaped to slightly urn-shaped. Up to 15 mm long and 10 mm wide.

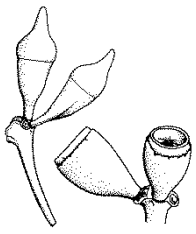
Swamp Mahogany
Eucalyptus robusta

Tree to 25 m high; found on low swampy sites on sandy soils. Occurs in coastal NSW north from Moruya to north-west of Bundaberg in QLD.

Bark persistent over whole tree, red-brown, fibrous, thick and spongy.

White flowers in clusters of 7-11+. Flowering occurs May - October.

Adult leaves 10–17 cm long, 2–4.5 cm wide, dark green, glossy, different colour on either side, densely veined.



Buds tapered, 16–24 mm long, 6–8 mm wide. Fruit cylindrical, 10–18 mm long, 6–11 mm wide.

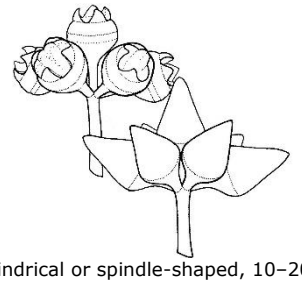
Forest Red-gum
Eucalyptus tereticornis

Tree to 50 m high growing in grassy wet or dry forest or woodland on soils of medium to high fertility. Widespread in eastern Australia from Victoria to QLD.

Bark smooth, white or grey, shedding in large plates or flakes. Sometimes with persistent dark grey flakes of rough bark on base of larger trunks.

White flowers in clusters of 7-11. Has been recorded in flower over most of the year.

Adult leaves 10–20 cm long, 1–3 cm wide, dull green.



Buds cylindrical or spindle-shaped, 10–20 mm long, 4–8 mm wide. Fruit spherical or egg-shaped, 4–6 mm long, 4–8 mm wide.

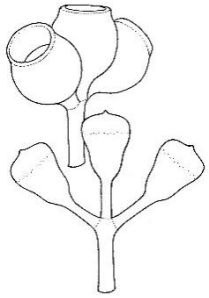
Spotted Gum
Corymbia maculata

Tree to 45 m high. Found in open forest on often infertile and drier sites on shales and slates. Grows on coastal plains and hills of NSW with isolated patches elsewhere.

Bark smooth, powdery, white, grey or pink, often spotted, sheds in small polygonal flakes.

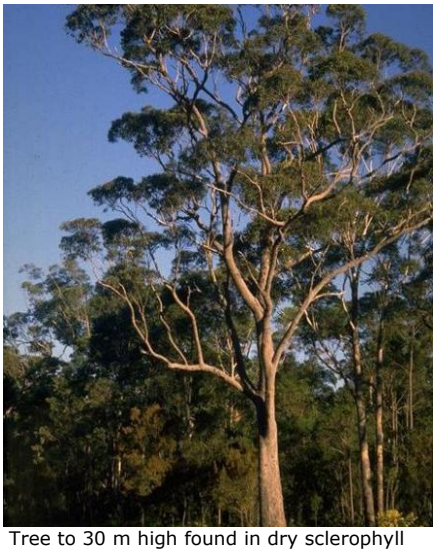
White flowers in clusters of 3. Flowering May-September.

Adult leaves 10–21 cm long, 1.5–3 cm wide, deep green.

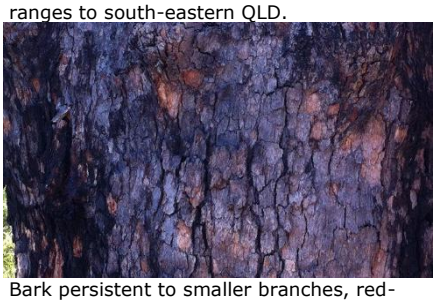


Buds egg-shaped, 10–11 mm long, 6–7 mm wide. Fruit barrel- or urn-shaped, 10–14 mm long, 9–11 mm wide.

Red Bloodwood
Corymbia gummifera



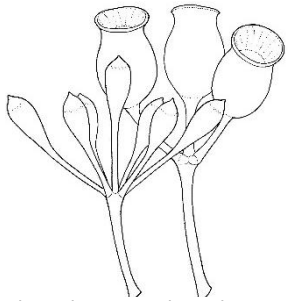
Tree to 30 m high found in dry sclerophyll forest or woodland on low fertility sand or sandstone. Found from far eastern Victoria north along the coastal plains and subcoastal ranges to south-eastern QLD.



Bark persistent to smaller branches, red-brown or grey-brown, tessellated. Wounds exude thick resinous red sap.

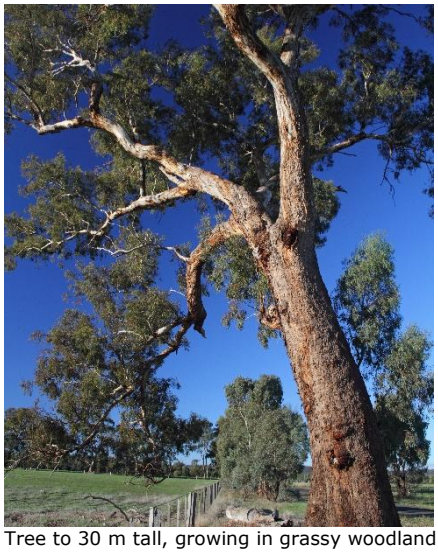
White/cream flowers in clusters of 7. Flowering may occur from December to June.

Adult leaves 10–16 cm long, 2–4 cm wide, thick, dark green, different colour on each side.



Buds egg-shaped to pear-shaped, 9–11 mm long, 5–6 mm wide. Fruit urn-shaped, 12–20 mm long, 10–15 mm wide.

Yellow Box
Eucalyptus melliodora

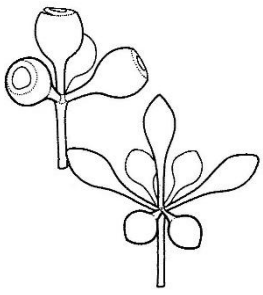


Tree to 30 m tall, growing in grassy woodland on moderately fertile and often sandy or alluvial soils. Occurs on plains and tablelands from western Victoria, through NSW to south-central QLD.

'Box' type bark, grey, pale brown or yellow-brown, fibrous-flaky, shedding in short ribbons. Upper branches are smooth and pale.

Flowers white-cream, in clusters of 3-7. Flowering occurs September-February.

Adult leaves 6–14 cm long, 0.8–3 cm wide, dull grey-green, densely veined.



Buds very small: 5–8 mm long and 3–4 mm wide, sometimes waxy white. Small, stalked fruit 3–8 mm long, 3–7 mm wide.

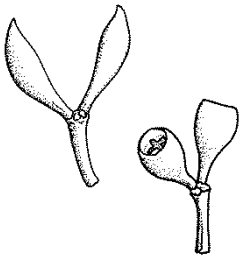
Inland Grey Box
Eucalyptus microcarpa

Tree to 25 m high. Occurs in grassy woodland on loamy soils of moderate fertility on the drier side of the Dividing Range. Found from south-east South Australia to south-eastern QLD.

Bark persistent on trunk and larger branches, grey with whitish patches, fibrous-flaky (`box' bark). Upper branches smooth, grey, shedding in short ribbons.

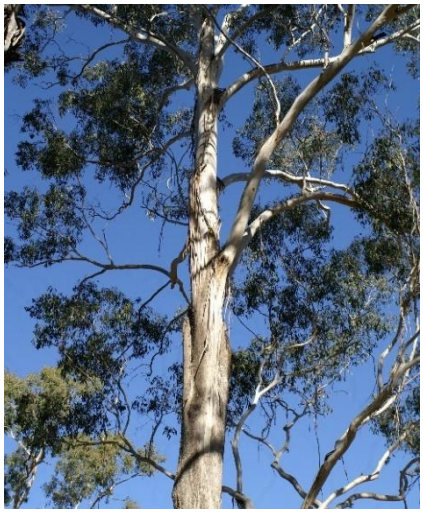
White flowers in clusters of 7–11. Flowers from February-June.

Adult leaves 8–15 cm long, 1–2 cm wide, dull green.



Buds egg-shaped to diamond-shaped, 4–7 mm long, 2–4 mm wide. Fruit cylindrical to hemispherical, 3–7 mm long, 3–5 mm wide.

Coastal Grey Box
Eucalyptus moluccana

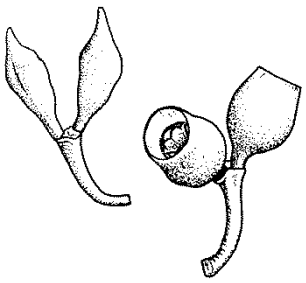


Tree to 25 m high. Widespread in grassy woodland or forest on loamy soils of moderate to high fertility. Occurs on coastal plains and lower slopes of ranges, north from Nowra NSW to the Atherton Tableland in QLD.

Bark persistent on lower or full trunk, grey with whitish patches, fibrous-flaky (`box' type bark). Branches smooth and white.

Flowers in clusters of 7+. Flowering has been recorded in most months of the year.

Adult leaves 8–14 cm long, 2–3.3 cm wide, glossy green.

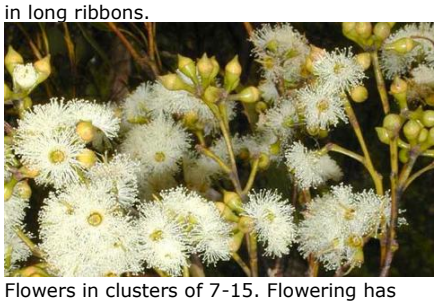


Buds spindle-shaped to diamond-shaped, 5–9 mm long, 3–4 mm wide. Fruit cup-shaped to barrel-shaped, 5–9 mm long, 4–6 mm wide.

Blackbutt
Eucalyptus pilularis

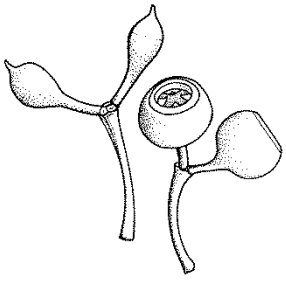
Tree to 70 m high. Grows in wet sclerophyll or grassy coastal forest on fertile south-east coastal plains and hills north from Eden NSW to Fraser Island in south-east QLD.

Bark rough on lower half of trunk, grey-brown, finely fibrous to stringy. Upper trunk smooth, white to grey, often with scribbles, shedding in long ribbons.



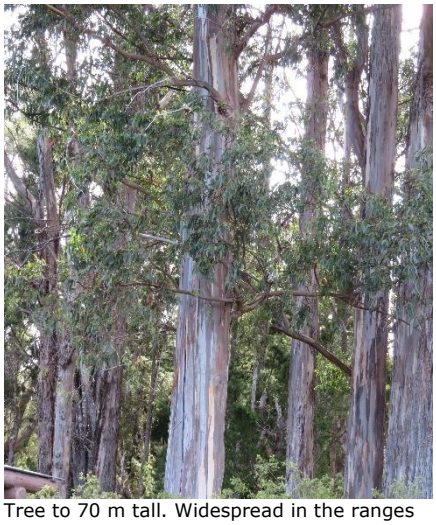
Flowers in clusters of 7-15. Flowering has been recorded in most months of the year.

Adult leaves 9–16 cm long, 1.5–3 cm wide, glossy green.



Buds egg-shaped to diamond-shaped, 7–10 mm long, 3–5 mm wide. Fruit spherical or hemispherical, 6–11 mm long, 7–11 mm wide.

Southern Blue Gum
Eucalyptus globulus

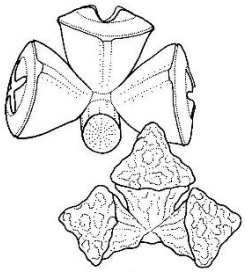


Tree to 70 m tall. Widespread in the ranges and subcoastal forests of eastern NSW as far north as the Carrai Plateau; eastern, southern and central Victoria; and Tasmania.

Bark smooth apart from base which has persistent slabs, shedding in large strips. The smooth bark can be white, cream, grey, yellowish or pale creamy orange.

Flowers white, vary among subspecies in clusters of 1, 3 or 7. Flowering times vary between subspecies but generally January-February on mainland.

Adult leaves 12–30 cm long, 1.7–3 cm wide, bright glossy green to dark green.



Buds very warty, waxy white or green, 1.4–2.5 cm long, 1.4–2 cm wide. In clusters of 1,3 or 7. Fruit waxy white or green, hemispherical or conical, 1-1.5 cm long and 1.4–2.7 cm wide.

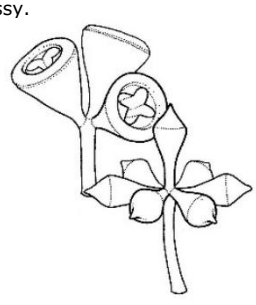
Swamp Gum
Eucalyptus ovata

Tree to 30 m high. Occurs in woodland in low and damp sites in south-east SA, eastern Tasmania, southern Victoria and the NSW south coast, southern tablelands, and south-west slopes.

Bark persistent on lower trunk, grey-black, shortly fibrous, compact, platy. Smooth on upper trunk, white, pink or yellow, shedding in long broad ribbons.

White flowers in clusters of 7. Flowering has been recorded between March - November.

Adult leaves 6–15 cm long, 1.5–5 cm wide, green, glossy.



Buds egg-shaped or spindle-shaped, 6–11 mm long, 3–6 mm wide. Fruit conical or bell-shaped, 3–8 mm long, 4–8 mm wide.

3. Tree and Mistletoe Species Summary

The following section provides a summary of the main tree and mistletoe species likely to be encountered at the Swift Parrot Search monitoring sites. The Common Names provided below are those that will be encountered by birdwatchers using the Swift Parrot Search portal within the Birdata app or website.

If you encounter a tree or mistletoe species that you are unable to immediately identify, a range of groupings are also provided as alternatives (e.g., box sp., gum sp., ironbark sp., stringybark sp., peppermint sp., *Corymbia* sp., *Angophora* sp., mistletoe sp.).

3.1. Box Trees

For this chapter, the box trees are defined as those that have 'box' as part of their common name[2]. The box trees likely to be most frequently encountered as part of the Swift Parrot Search project are listed in Table 1.

Box trees in south-eastern Australia commonly have a form of rough persistent bark which is composed of" short fibres that cannot be removed from the trunk in long strips. On the trunk it has narrow longitudinal fissures and appears thin." (RBGV 2021). For some box eucalypts, the rough bark is composed of "short fibres which breaks up into plates" (RBGV 2021). The bark is on the trunk as a minimum, and extends along the branches to varying extents in different species.

It is quite feasible that you will encounter some box that are either difficult to identify to species-level and/or distinguish from each other in the absence of fruit or juvenile leaves (e.g., White Box and Grey Box). There may also be some boxes encountered that are not provided in this list below. In these instances, you are encouraged to choose the generic **Box sp.** option.

Table 1. Box-type eucalypts encountered at the mainland monitoring sites as part of the Swift Parrot Search program.
- Species highlight in pink with detailed ID information in chapter 2. – GDR = Great Dividing Range
- 'Other' foods include insects and other non-lerp food collected from leaf gleaning.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[3]	Known Swift Parrot feeding	Web-link for identification
Apple Box (a.k.a. But But)	*E. bridgesiana*	GDR and inland foothills from east Vic to sthn Qld	-	VicFlora NSW PlantNET
Bimble Box	*E. populnea*	Inland of GDR. Nth of Nanderra NSW	-	NSW PlantNET
Black Box	*E. largiflorens*	Semi-arid inland. Seasonal floodplains. Heavy clay soils.	-	VicFlora NSW PlantNET

[2] The one exception is the Brush Box – not a eucalypt or closely related to the other boxes at all – which is instead covered in Table 5.
[3] Excluding scattered outliers and plantings in parks, gardens, roadsides, etc.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[3]	Known Swift Parrot feeding	Web-link for identification
Coastal Grey Box	*E. moluccana*	North of Nowra, NSW.	Nectar, Lerp	NSW PlantNET Also detailed info in Chpt 2.
Fuzzy Box	*E. conica*	North from Wagga. Not on coast.	-	NSW PlantNET
Inland Grey Box	*E. microcarpa*	Mostly south of Dubbo. Inland foothills VIC, & greater Melb	Nectar, Lerp, Other	VicFlora NSW PlantNET Also detailed info in Chpt 2.
Long-leaved Box (a.k.a. Bundy)	*E. goniocalyx*	Along GDR thru Vic and into NSW. South of Liverpool Ranges.	Nectar, Lerp, Other	VicFlora NSW PlantNET
Norton's Long-leaved Box	*E. nortonii*	Foothills of GDR from central west Vic to near Manilla NSW.	-	VicFlora NSW PlantNET
Red Box	*E. polyanthemos*	From central west Vic to Gulgong NSW.	Lerp	VicFlora NSW PlantNET
White Box	*E. albens*	Foothills of GDR from sthn Qld to central Vic. Scattered outliers.	Nectar, Lerp, Other	VicFlora NSW PlantNET Also detailed info in Chpt 3.
Yellow Box	*E. melliodora*	Throughout Vic, thru NSW to sthn Qld.	Nectar, Lerp	VicFlora NSW PlantNET Also detailed info in Chpt 2.
Box sp. – unidentifiable to species-level		Throughout mainland range of Swift Parrot	Nectar, Lerp	Boxes are broadly character-ised by having rough, finely-fibrous bark.

3.2. Gum Trees

For this chapter, the gum trees are defined as those that have 'gum' as part of their common name. There are some other species with gum-like appearances (e.g,. most of the *Corymbia* bloodwoods; Candlebark) which are separately covered in Chapter 3.4. The gum trees likely to be most frequently encountered as part of the Swift Parrot Search project are listed in Table 2. All but one of the gum trees are eucalypts (Spotted Gum).

Gum trees are broadly identified by the smooth bark on their trunks. This can include species with wholly smooth trunks, where "old and dead bark is completely shed from the trunk and stems annually exposing a smooth fresh bark" (RBGV 2021). It can also include species with partially smooth trunks where "at least some of the old and dead bark is shed annually so that the lower parts of the trunk remains with old rough bark and the rest of the trunk or stem has the smooth fresh bark showing." (RBGC 2021). Some of these gum trees characteristically display wiggly thin lines on their smooth trunk – scribbles – that have been caused by insect larvae.

It is quite feasible that you will encounter some gum that are either difficult to identify to species-level and/or distinguish from each other in the absence of fruit or juvenile leaves. There may also be some boxes encountered that are not provided in this list below. In these instances, you are encouraged to choose the generic **Gum sp.** option.

Table 2. - Gum-type eucalypts encountered at the mainland monitoring sites as part of the Swift Parrot Search program.
- Species highlight in pink with detailed ID information in chapter 2. – GDR = Great Dividing Range
- 'Other' foods include insects and other non-lerp food collected from leaf gleaning.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[4]	Known Swift Parrot feeding	Web-link for identification
Blakely's Red-gum	*E. blakelyi*	Mostly inland GDR foothills from central Vic to sth Qld. Scattered outliers.	Lerp	VicFlora NSW-PlantNET
Blue Gum (a.k.a. Southern Blue Gum, Tas Blue Gum)	*E. globulus*	Complex taxonomy, further complicated by plantations and park plantings. E Vic, plus Otways, central-west Vic.	Nectar	VicFlora Also detailed info in Chpt 2.
Candlebark	*E. rubida*	-	-	Have a gum-like appearance. These species covered in section 3.4 below.
Corymbia sp. (a.k.a. Bloodwoods)	-	-	-	
Flooded Gum	*E. grandis*	Coastal side of GDR, wetter forests. North of Newcastle, NSW.	Nectar, Lerp	NSW-PlantNET
Forest Red-gum	*E. tereticornis*	Coastal side of GDR, occurs north from Bega NSW. Also central Gippsland, Vic.	Nectar, Lerp	VicFlora NSW-PlantNET Also detailed info in Chpt 2.
Grey Gum	*E. punctata* *E. canaliculata*	*E.p.* – Low-medium fertility soils from Nowra to Liverpool Ranges NSW. E.c. – Sthn foothills of Barrington Tops NSW, from Gloucester to Hunter River	Lerp	*E.p.* - NSW-PlantNET *E.c.* - NSW-PlantNET
Lemon-scented Gum	*Corymbia citriodora*	Nth Qld species, but planted in parks and gardens thru-out SWP range.	-	Aust Nat Herbarium NSW-PlantNET

[4] Excluding scattered outliers and plantings in parks, gardens, roadsides, etc.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[4]	Known Swift Parrot feeding	Web-link for identification
Manna Gum - both smooth and rough-barked forms (a.k.a. Ribbon Gum)	*E. viminalis*	GDR foothills and lower slopes from SE Sth Aust to sthn Qld. Less prevalent on inland slopes.	Nectar	VicFlora NSW-PlantNET
Mountain Grey Gum (a.k.a. Grey Gum)	*E. cypellocarpa*	Mostly wetter forest in mountains from Grampians to Tamworth.	-	VicFlora NSW-PlantNET
River Red-gum	*E. camaldulensis*	Along waterways and floodplains throughout most range.	Lerp	VicFlora NSW-PlantNET
Scribbly Gum sp. – coastal side of GDR (also see White Gum)	*E. haemastoma* *E. racemosa* *E.signata*	*E.h.* – Lake Macquarie to Royal NP, NSW E.r. – Coastal side of GDR, north of Port Jackson, NSW. E.s. - Coastal side of GDR, north of Morriset, NSW.	-	E.h.-NSW-PlantNET E.r.- NSW-PlantNET E.s. – NSW-PlantNET
Spotted Gum	*Corymbia maculata*	Coastal side GDR from East Gipps VIC to Port Macquarie NSW. Widely planted elsewhere in parks and gardens.	Nectar, Lerp	VicFlora NSW-PlantNET Also detailed info in Chpt 2.
Sugar Gum	*E. cladocalyx*	Native in SE Sth Aust. Widely planted for firewood, windbreaks, shade, etc.	Lerp	VicFlora Wikipedia
Swamp Gum	*E. ovata*	GDR and coastal-side foothills from SE Sth Aust to central Tablelands NSW.	Nectar (in Tas, at least)	VicFlora NSW-PlantNET Also detailed info in Chpt 2.
Sydney Blue Gum	*E. saligna*	GDR and coastal-side foothills from Port Jackson northwards.	-	NSW-PlantNET
White Gum (a.k.a. Inland Scribbly Gum)	*E. rossii*	GDR and inland foothills from sth NSW to sthn Qld.	-	NSW-PlantNET
Yellow Gum	*E. leucoxylon*	GDR and foothills from central Vic to SE Sth Aust (plus greater Melb & outliers)	Nectar, Lerp	VicFlora Also detailed info in Chpt 2.
Gum sp. - unidentifiable to species-level	-	Throughout mainland range of Swift Parrot	Nectar, Lerp, Other	Refers to trees with smooth-barked trunks – although often with flaking or peeling bark.

3.3. Ironbarks

For this chapter, the ironbark trees are defined as those that have 'ironbark' as part of their common name. The ironbark trees likely to be most frequently encountered as part of the Swift Parrot Search project are listed in Table 3. All are eucalypts.

Ironbarks trees are broadly identified by their form of rough bark on their trunks and branches which is "hard, deeply and widely furrowed and tends to be dark in colour, often black or dark brown or grey" (RBGV 2021).

Particularly in NSW and Queensland[5], it is quite feasible that you will encounter some ironbark species that are either difficult to identify to species-level and/or distinguish from each other in the absence of fruit or juvenile leaves. There may also be some ironbarks encountered that are not provided in this list below. In these instances, you are encouraged to choose the generic **Ironbark sp.** option.

Table 3. Ironbark eucalypts encountered at the mainland monitoring sites as part of the Swift Parrot Search program.
- Species highlight in pink with detailed ID information in chapter 2. – GDR = Great Dividing Range
- 'Other' foods include insects and other non-lerp food collected from leaf gleaning.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[6]	Known Swift Parrot feeding	Web-link for identification
Broad-leaved Ironbark (a.k.a. Red Ironbark, but not *E. tricarpa*)	*E. fibrosa*	From Moruya NSW to sth Qld	-	NSW-PlantNET
Grey Ironbark	*E. siderophloia* *E. paniculata*	E.s. – GDR and coastal foothills from Sydney to sth Qld. E.p. – Mostly coastal foothills from Bermagui to Belahdelah NSW.	-	NSW-PlantNET
Mugga Ironbark	*E. sideroxylon*	GDR and mostly inland foothills from NE Vic to sthn Qld. Planted in urban areas widely.	Nectar, Lerp	VicFlora NSW-PlantNET Also detailed info in Chpt 2.

[5] Although there are only two ironbark species occurring in Victoria, which do not have overlapping ranges, challenges with species identification can still be caused by ironbark plantings in gardens, parks and as street trees using ironbark species that are outside of their natural range.
[6] Excluding scattered outliers and plantings in parks, gardens, roadsides, etc.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[6]	Known Swift Parrot feeding	Web-link for identification
Narrow-leaf Ironbark	*E. crebra*	Occurs widely north from Picton NSW to sth Qld.	-	NSW-PlantNET
Red Ironbark (NB: not Broad-leaf Ironbark *E. fibrosa*)	*E. tricarpa*	Scattered pop'ns. Central-west Vic, Greater Melb and surrounds. Central Gipps to south coast NSW.	Nectar, Lerp, Other	VicFlora NSW-PlantNET Also detailed info in Chpt 2.
Ironbark sp.		Throughout mainland range of Swift Parrot – although not SE Sth Aust and scattered gaps in Vic	Nectar	Characterised by dark, deep-furrowed bark. Non-shedding bark.

3.4. Peppermint, Stringybark, Mahogany, Bloodwood, Apple and other 'eucalypts'

This chapter covers all of the other eucalypts (and eucalypt affiliates – *Angophthora* spp. and *Corymbia* spp.), where the tree does not have 'box', 'gum' or 'ironbark' as part of its common name. Within this broad grouping, the species most likely to be most frequently encountered as part of the Swift Parrot Search project are listed in Table 4.

Table 4: Other eucalypt-type trees likely encountered at the mainland monitoring sites as part of the Swift Parrot Search program.
- Species highlight in pink with detailed ID information in chapter 2. – GDR = Great Dividing Range
- 'Other' foods include insects and other non-lerp food collected from leaf gleaning.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[7]	Known Swift Parrot feeding	Web-link for identification
Angophora sp. (a.k.a. Apples)	*Angophora* sp.	Naturally eastern Vic to southern Qld. Planted widely in parks and gardens.	-	Wikipedia Differ from eucalyptus and bloodwoods in having both juvenile and adults leaves in opposite pairs, plus other fine differences in flowers and fruit. Mostly rough-barked.

[7] Excluding scattered outliers and plantings in parks, gardens, roadsides, etc.

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[7]	Known Swift Parrot feeding	Web-link for identification
Blackbutt sp.	Mostly refers to *E. pilularis* (but also *E. andrewsii, E. campanulata, E. pyrocarpa)*	*E.pil.* – Coastal forest from Eden northwards to sth Qld. *E.a.* – Inland foothills from Niangala district NSW to sth Qld. E.c. – GDR and coastal foothills from Barrington Tops NSW to sth Qld *E.pyr.* – Coastal forest from Washpool NSW to Wauchope NSW	*E. pil.* – Nectar, Lerp	*E.pil.* NSW-PlantNET Also *E. pil.* info in Chptr 2. *E.a.* – NSW-PlantNET *E.c.* – NSW-PlantNET *E.pyr.* – NSW-PlantNET
Broad-leaved Peppermint	*E. dives*	GDR and slopes from central west Vic to Niangala district NSW.	-	VicFlora NSW-PlantNET
Candlebark	*E. rubida*	GDR foothills from Grampians Vic to Glen Innes NSW	-	VicFlora NSW-PlantNET Not that this species has a gum-like appearance on trunk and branches.
Corymbia sp. (a.k.a. Bloodwoods)	*Corymbia sp.*	Naturally from East Gippsland Vic northwards. Widely planted in parks and gardens elsewhere.	Nectar (*C. maculata, C. gummifera)* *Lerp (C. maculata)*	Wikipedia Distinguished from Eucalyptus and Angophora by the flower buds arranged in groups on a branching peduncle, plus other differences in flowers and fruit. Usually have rough, fibrous or flaky bark, or smooth bark shed in small flakes.
Eucalypt sp.	Unidentified eucalyptus-type tree	Throughout mainland range of Swift Parrot.	-	A "coverall" category for those struggling to identify eucalypt-type tree to genus level or lower.
Lemon-scented Gum	*Corymbia citriodora*	See Lemon-scented Gum in Gum Trees in Table 2.	-	-

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[7]	Known Swift Parrot feeding	Web-link for identification
Green Mallee	*E. viridis*	Inland slopes of GDR and semi-arid woodland plains. Western NSW, sth Qld, central and west Vic.	Lerp	VicFlora NSW-PlantNET
Mallee eucalypt sp. – unidentified species	May include species such as: *E. viridis, E. froggattii, E. behriana, E. polybractea, etc.*	Within Swift Parrot distribution, generally inland slopes and semi-arid woodland plains. Outliers such as Long Forest near Melbourne.	Lerp (*E. viridis*)	Wikipedia Refers to eucalypts growing with single-stem or often multi-stems from an underground tuber. Usually less than 10m tall.
Messmate (a.k.a. Messmate Stringybark)	*E. obliqua*	From SE Sth Aust through southern and central Vic, along GDR to sth Qld.	-	VicFlora NSW-PlantNET
Peppermint sp.		From central west Vic to sth Qld.	-	A group of eucalypts broadly united by the strong peppermint smell released when the leaves are crushed, but with other morphological features in common. Research paper
Red Bloodwood	*Corymbia gummifera*	From far east Gipps Vic to sth Qld on coastal side of GDR.	Nectar	VicFlora NSW-PlantNET Also detailed info in Chpt 2.
Rough-barked Apple	*Angophora floribunda*	From far east Gipps Vic to sth Qld. Coastal south of Sydney, both sides GDR to north.	-	VicFlora NSW-PlantNET
Smooth-barked Apple	*Angophora costata*	Natural from Narooma NSW northwards, mostly coastal side GDR. Scattered plantings elsewhere.	-	NSW-PlantNET
Southern Mahogany (a.k.a. Bangalay)	*E. botryoides*	Naturally from Gipps Lakes VIC north to Hunter River NSW, coastal.	-	VicFlora NSW-PlantNET

Common Name	Latin Name (most Eucalyptus)	Tree distribution in Swift Parrot mainland range[7]	Known Swift Parrot feeding	Web-link for identification
Stringybark sp. (NB: Messmate Stringy-bark *E. obliqua* provided with own category)	Potential widespread species include: *E. agglomerata* *E. baxteri* *E. eugenoides* *E. globoidea* *E. macrorhyncha* *E. muelleriana*	Throughout Swift Parrot range	Lerp, Other	Group generally of low value to Swift Parrots and other nectar feeder. Difficult to ID to species level. Grouped by thick fibrous bark. Wikipedia
Swamp Mahogany	*E. robusta*	From Moruya NSW to sth Qld, coastal	Nectar	NSW-PlantNET Also detailed info in Chpt 2.
Tallowwood	*E. microcorys*	Coastal side of GDR, north from Cooranbong NSW.	-	NSW-PlantNET
White Mahogany	*E. acmenoides*	From Port Jackson NSW to sth Qld. Along GDR and coastal foothills	-	NSW-PlantNET

3.5. Other relevant non-eucalypt trees and tall shrubs

As part of Swift Parrot Search, a range of other trees and tall shrubs are likely to be encountered. This includes some naturally occurring species (e.g., Cypress pines, She-oaks, Ballarts), and well as some non-indigenous species that are naturally spreading (e.g., pines, willows). In parks, gardens and other public spaces, there may also be a range of other trees originated from elsewhere in Australia or worldwide that have been planted within the area covered by a Swift Parrot Search survey area. For the most part, these species can be ignored as part of the assessment of flowering intensity.

However, a small number of tree and shrub species have been included due to their occasional known use – or potential use – by Swift Parrots and other similar nectar feeding birds. This includes species such as Banksia which have been rarely observed as a source for Swift Parrot nectar feeding. Similarly, there have also been occasional sightings of Swift Parrots feeding on the flowering racemes (flowering spikes) of the Golden Wattle *Acacia pycnantha*. This limited selection of additional "non-eucalypts" is provided in Table 5.

Table 5. - Other relevant trees and shrubs that may be encountered at the mainland monitoring sites as part of the Swift Parrot Search program.
- 'Other' foods include insects and other non-lerp food collected from leaf gleaning. Can also sometimes include wattle racemes.
- GDR = Great Dividing Range

Common Name	Latin Name (most Eucalyptus)	Tree and Shrub distribution in Swift Parrot mainland range[8]	Known Swift Parrot feeding	Web-link for identification
Banksia sp. (small tree and large shrub forms)	*Banksia* spp.	Scattered throughout Swift Parrot mainland range. More common in heathy woodlands and wetter schlerophyll forests.	Nectar	Recognised by their characteristic flower spikes and fruiting "cones" and heads Wikipedia
Brush Box	*Lophostemon confertus*	Coastal side of GDR, wetter forests. North of Hunter, NSW.	-	NSW PlantNET
Golden Wattle	*Acacia pynantha*	From SE sth Aust, thru most of Vic, to ACT. Scattered plantings elsewhere.	Other – buds / racemes	VicFlora NSW-PlantNET
Old Man Banksia (a.k.a. Saw Banksia)	*Banksia serrata*	Near coastal (and Blue Mountains), from Wilsons Prom Vic to sth Qld – although scattered north of Newcastle)	Nectar	VicFlora NSW-PlantNET
Rainforest tree sp.	-	From Gippsland VIC to sth Qld, along GDR and coastal foothills.	-	Low priority species for Swift Parrots. Catch-all category for a range of non-eucalypt trees found in rainforests and wet forests.
Swamp Oak	*Casuarina glauca*	Coastal streams and rivers from Bega to sth Qld.	-	NSW-PlantNet
Turpentine	*Syncarpia glomulifera*	Wetter forests from Murramurang NP north to sth Qld.	-	NSW-PlantNET

[8] Excluding scattered outliers and plantings in parks, gardens, roadsides, etc.

3.6. Mistletoes (for Regent Honeyeaters, Painted Honeyeaters, etc.)

Mistletoes are not known to used by Swift Parrots for as part of their foraging activities. However, there is considerable existing evidence – and increasing volumes of new research – demonstrating the importance of mistletoe for a range of other woodland fauna. Mistletoe flowers are known to be visited by a range of nectar-feeding birds and the ripe berries are also a widely consumed food source (including for the aptly named Mistletoebird). The three particular mistletoe species highlighted in Table 6 are each species that are known to be of importance to the critically endangered Regent Honeyeater – which is a species whose current and historical distribution overlaps considerably with the mainland range of the Swift Parrot. As such, it was deemed to be appropriate to also collect data on the flowering patterns of these species.

Many other mistletoe species will undoubtedly be encountered at the survey locations. In these instances, you are encouraged to choose the generic **Mistletoe sp.** option. You can also use this option if you are unsure of the identification of the three target species below.

Table 6. Significant mistletoes encountered within the mainland range of Swift Parrot.

Common Name	Latin Name (most Eucalyptus)	Mistletoe distribution in Swift Parrot mainland range[9]	Known Swift Parrot feeding[10]	Web-link for identification
Box Mistletoe	*Amyema miquelli*	From SE Sth Aust, thru most Vic (not SW), NSW and sth Qld. Grows on Eucalypts and some Acacia.	-	VicFlora NSW-PlantNET
Long-flowered Mistletoe	*Dendrophthoe vitellina*	From far east Gipps Vic to sth Qld. Coastal mostly, but inland in north. Grows on eucalypts and affiliate trees.	-	VicFlora NSW-PlantNET
Needle-leaf Mistletoe	*Amyema cambagei*	From sth NSW to sth Qld, inland and coastal. Grows on Casuarina.	-	NSW-PlantNET
Mistletoe sp.	-	-		National Herbarium A "coverall" category for the dozens of other mistletoe species in the range of Swift Parrots. Largely a category for mistletoe species that are not known for foraging by Regent Honeyeaters.

[9] Excluding scattered outliers and plantings in parks, gardens, roadsides, etc.
[10] First three species in Table 6 are important feed species for Regent Honeyeater – another critically endangered bird that we encourage observers to look for the Swift Parrot Search program.

4. Additional information to assist with plant identification

The following documents are suggested as additional materials to assist with the identification of tree and mistletoe species within the mainland range of the Swift Parrot.

Broad plant guides

Bell, S., Rockley, C. and Llewellyn, A., *Flora of the Hunter region.* CSIRO Publishing, VIC, Australia.

Cosgrove, M., (2014), *Photographic guide to Native Plants of the ACT.* Published by Meadow Argus.

Harden, G. J. (1990-93), *Flora of New South Wales.* NSW University Press, Kensignton, NSW.

National herbarium of NSW (2021), *PlantNET – The Plant Information Network System of The Royal Botanic Gardens and Domain Trust Version 2.0.* - https://plantnet.rbgsyd.nsw.gov.au/

Robinson, Les – *Field guide to the native plants of Sydney. 3rd Edition.* Simon and Schuster, Sydney.

Royal Botanic Gardens Victoria (2021a), *Vicflora – Flora of Victoria.* - *https://vicflora.rbg.vic.gov.au/*

Castlemaine Field Naturalists Club and Connecting Country (2016) – *Wild plants of the Castlemaine district* - https://www.castlemaineflora.org.au/

Tree guides

Brooker, M. I. H. And Kleinig, D. A., (1998), *Field Guide to Eucalypts. Vol. 1. South-eastern Australia.*, Inkata, Melbourne, Aust.

Centre for Australian National Biodiversity Research (2020), EUCLID: Eucalypts of Australia. 4th edition. - https://apps.lucidcentral.org/euclid/text/intro/index.html

Costermans, L. F. (2005), *Native trees and shrubs of South-eastern Australia.* New Holland Publishers, Australia.

Costermans, L. F., (2006), *Trees of Victoria and surrounding areas. 6th Edn.* Costermans Publishing, Vic.

Goulburn Broken CMA - *Eucalyptus tree identification booklet for the Strathbogie Ranges and surrounds* https://www.gbcma.vic.gov.au/downloads/Biodiversity%20Current%20Projects/2017_-_November_-_Eucalyptus_tree_identity_guide_for_the_Strathbogie_Ranges_and_surrounds.pdf

Nicolle, Dean (2006), *Eucalypts of Victoria and Tasmania.* Bloomings Books, Melbourne.

Royal Botanic Gardens Victoria (2021b), *Vicflora – Multi-access key to the Eucalypts of Victoria* - https://vicflora.rbg.vic.gov.au/static/keys/eucalypts

Slattery, B., Perkins, E. and Silver, B. (2015), *Eucalypts of the Mount Alexander region.* Published by Friends of the Box Ironbark Forests.

Mistletoe guides

Australian National Botanic Gardens (2021). Exploring the world of Mistletoes. https://www.anbg.gov.au/mistletoe/

Watson, David (2019), Mistletoes of Southern Australia. 2nd edition. CSIRO Publishing, Collingwood, VIC, Australia.

5. Acknowledgements

Plant image credits

Botanical line drawings
Swamp Mahogany, Coastal Grey Box, Blackbutt, Inland Grey Box: David Mackay ©Royal Botanical Gardens and Domain Trust
Remainder: Thiele, K.R., Australian National Herbarium, © 2020 Royal Botanic Gardens Board. Modified from the originals. BY-NC-SA

Yellow Gum
Tree: photo by BirdLife Australia
Bark: "Yellow Gum1" by Team Axe 1 (https://commons.wikimedia.org/w/index.php?curid=29309287). Cropped from original. BY-SA
Flowers: "Eucalyptus leucoxylon buds" by Murray Fagg (https://commons.wikimedia.org/w/index.php?curid=82141856). Cropped from original. BY
Leaves: "Eucalyptus leucoxylon (Inland Blue Gum)" by Arthur Chapman (https://flickr.com/photos/32005048@N06/27765552570). Cropped from original. BY-NC-SA

Red Ironbark
Tree: "Eucalyptus tricarpa - upper branch bark" by Geekstreet (https://upload.wikimedia.org/wikipedia/commons/e/e1/Eucalyptus_tricarpa_-_upper_branch_bark.jpg) BY-SA
Flowers/leaves/bark: "Eucalyptus tricarpa subsp. tricarpa (Red Ironbark, Mugga Ironbark)" by Arthur Chapman (https://flickr.com/photos/arthur_chapman/) BY-NC-SA

Mugga Ironbark
Tree: photo by BirdLife Australia
Bark: "eucalyptus-sideroxylon-subsp.-sideroxylon-2" by Friends of Chiltern Mt Pilot National Park (https://flickr.com/photos/82806364@N02/50230728291). Cropped from original. BY-NC-SA
Flowers: "Eucalyptus sideroxylon-flowers leaves-Hawea Pl Olinda-Maui (32084441570) " by Forest and Kim Starr (https://commons.wikimedia.org/w/index.php?curid=71978695) BY
Leaves: "Eucalyptus sideroxylon foliage NC1-1" by Macleay Grass Man (https://flickr.com/photos/73840284@N04/48735243502) BY

White Box
Tree and bark: photos by BirdLife Australia
Flowers: "eucalyptus-albens-7" by Friends of Chiltern Mt Pilot National Park (https://flickr.com/photos/friendsofchiltern/50228034382/) BY-NC-SA
Leaves: "Eucsomerton1b" by Casliber (https://commons.wikimedia.org/w/index.php?curid=19864931) BY-NC-SA

Swamp Mahogany
Tree: photo by Allan Richardson
Flowers: "Eucalyptus robusta Lai Chi Kok Park, Hong Kong" by KHQ Flower Guide (https://flickr.com/photos/52582306@N03/9229858028) BY-SA
Leaves**:** "Swamp mahogany in flower" by Doug Beckers (https://flickr.com/photos/37103729@N02/3490147630) BY-SA
Bark: "Swamp Mahogany bark, Galgabba Point" by Tim J Keegan (https://flickr.com/photos/49333819@N00/47391881021) BY-SA

Forest Red Gum
Tree: "Eucalyptus tereticornis 120619-0296" by Tony Rodd (https://flickr.com/photos/8108294@N05/8436823501) BY-NC-SA
Bark: "Eucalyptus tereticornis bark 7th Brigade Park Chermside L1020038" by John Robert McPherson (https://commons.wikimedia.org/w/index.php?curid=83481203) Cropped from original. BY-SA
Flowers: "Eucalyptus tereticornis 090718-6190" by Tony Rodd (https://flickr.com/photos/8108294@N05/3793998675) BY-NC-SA
Leaves: "Eucalyptus tereticornis white flowers 7th Brigade Park Chermside P1070049" by John Robert McPherson (https://commons.wikimedia.org/w/index.php?curid=83503608) BY-SA

Spotted Gum
Tree: "spotted gum" by robynejay (https://flickr.com/photos/65749227@N00/452441063) BY-NC-SA
Bark: "Corymbia maculata bark 7th Brigade Park Chermside P1030124" by John Robert McPherson (https://commons.wikimedia.org/wiki/File:Corymbia_maculata_bark_7th_Brigade_Park_Chermside_P1030124.jpg) BY-SA
Flowers: Photo by Mick Roderick
Leaves: "Eucalyptus maculata (Spotted Gum) Flowers & Foliage, Drysdale Victoria Australia" by Rexness (https://commons.wikimedia.org/wiki/File:Eucalyptus_maculata_(1).jpg) BY-SA

Red Bloodwood
Tree: "Corymbia gummifera habit" by Ian Brooker and David Kleinig (https://commons.wikimedia.org/w/index.php?curid=86979361) BY
Bark: "Red Bloodwood bark, Yengo National Park" by Doug Beckers (https://flickr.com/photos/37103729@N02/8543723152) Cropped from original. BY-SA
Flowers: "Red Bloodwood flowers" by John Tann (https://flickr.com/photos/31031835@N08/6783420557) BY

Leaves: "Corymbia gummifera" by Tatters (https://flickr.com/photos/62938898@N00/48656884066) PUBLICDOMAIN

Yellow Box
Tree: BirdLife Australia
Bark: "Eucalyptus melliodora" by NSW Grassy Ecosystems (https://flickr.com/photos/31390704@N06/2945686505). Cropped from original. BY-SA
Flowers: "Eucalyptus Melliodora" by candlebarkeucalypts (https://flickr.com/photos/140790241@N02/37639274136) PUBLICDOMAIN
Leaves: "Yellow box leaves" by John Tann (https://flickr.com/photos/31031835@N08/3437416809) BY

Inland Grey Box
Tree: "Eucalyptus microcarpa. Grey Box." by Mamma Knows Plants (https://flickr.com/photos/156978158@N03/25407351877) BY-SA
Bark: *Eucalyptus microcarpa* Blair, Neil © 2020 Royal Botanic Gardens Board (https://vicflora.rbg.vic.gov.au/flora/taxon/e5427742-1a80-43b7-bef8-d41745ac0f3f). Cropped from original. BY-NC-SA
Flowers: "Eucalyptus microcarpa – Grey Box" by Nathan_Johnson (https://flickr.com/photos/55432009@N08/16692494940). Cropped from original. BY-NC-SA
Leaves:"eucalyptus-microcarpa-4" by Friends of Chiltern Mt Pilot National Park (https://flickr.com/photos/82806364@N02/50229140662). Cropped from original. BY-NC-SA

Coastal Grey Box
Tree: "Eucalyptus moluccana trunk CC2" by Macleay Grass Man (https://flickr.com/photos/73840284@N04/29738862588) BY
Bark: "Eucalyptus moluccana trunk NC7" by Macleay Grass Man (https://flickr.com/photos/73840284@N04/28721223407). Cropped from original. BY
Flowers: Photo by Kirrily Hughes.
Leaves: "Eucalyptus moluccana fruit NC6" by Macleay Grass Man (https://flickr.com/photos/73840284@N04/41801358840). Cropped from original. BY

Blackbutt
Tree: "Blackbutt (Eucalyptus pilularis)" by Poytr (https://flickr.com/photos/73840284@N04/29738862588) BY-NC
Bark / flowers / leaves: © Australian Plants Society (Sutherland Group) (http://sutherland.austplants.com.au/)

Southern Blue Gum
Tree: "Eucalyptus_globulus-trunk_bark-Hosmers_Grove_Haleakala_National_Park-Maui" by Starr Environmental (https://flickr.com/photos/97499887@N06/43428763232) BY
Bark: "IMG_0886.JPG" by nautical2k (https://flickr.com/photos/62614925@N00/2232533188) BY-NC
Flowers: "Eucalyptus globulus subsp. globulus" by dracophylla (https://flickr.com/photos/40325561@N04/4716989528) BY-NC-SA
Leaves: "Eucalyptus globulus" by Joan Simon (https://flickr.com/photos/95905799@N00/15345095225) BY-SA

Swamp Gum
Tree: "*Eucalyptus ovata* subsp. *ovata*". by Andre Messina, © 2020 Royal Botanic Gardens Victoria Board (https://vicflora.rbg.vic.gov.au/flora/taxon/0ace770d-d8bf-43f6-be31-dfbf4ae1a4b7) BY-NC-SA
Bark: "Bark Eucalyptus ovata - San Francisco Zoo - San Francisco, CA" by Daderot (https://commons.wikimedia.org/wiki/File:Eucalyptus_ovata_-_San_Francisco_Zoo_-_San_Francisco,_CA_-_DSC03544.jpg) PUBLICDOMAIN
Flowers: "Eucalyptus ovata. Swamp gum" by McCann, Ian, © 2020 Royal Botanic Gardens Board (https://vicflora.rbg.vic.gov.au/flora/taxon/0ace770d-d8bf-43f6-be31-dfbf4ae1a4b7). Cropped from original. BY-NC-SA
Leaves: "Eucalyptus ovata 071009-7396" by Tony Rodd (https://flickr.com/photos/8108294@N05/1895363475) BY-NC-SA