

# SUGAR GLIDER

## Habitat Box Designs



*Lifestyle Capital of Victoria*

Sugar Gliders are one of six gliding mammals found in Victoria and the most likely to be found in the municipality. They have a membrane between their front and back legs which, when spread out, enables them to glide up to 50m between trees. The gliders spend their whole life above ground feeding amongst the foliage of trees and large shrubs.



Sugar Glider (photo Credit: Patrick Kavanagh (CC BY 2.0))

Their diet consists mostly of nectar and insects but they also like to dine on the sap of wattles and some gum trees. They use their sharp teeth to bite open the bark and then they drink the sap, often coming back to the same tree night after night to feed on fresh sap



Sugar Glider family (photo Credit: nestboxtales.com)

They can be found in the suburbs, especially in parks and reserves that contain remnant native vegetation especially trees and tall shrubs. Sugar Gliders typically live together in family groups of up to 12 individuals in tree hollows but will take to habitat boxes readily.

Suitable habitat boxes need to be relatively large to accommodate the family but they do “pack in” resembling a large fluff ball with many tails.

Their nest is made of fresh green gum leaves, in a ball shape within the box. The habitat box has the entrance hole towards the bottom on the side and an internal baffle, which they build their nest behind. The baffle deters other fauna that cannot climb the baffle, from using the box. The gliders may not use the same box all year round.

### General tips:

- Face away from prevailing winds
- Face them away from direct midday sun- north-east
- Ensure water proof with drainage and sealant
- Monitor your habitat box (from a distance as to not disturb the birds)- this data is useful for council and Birdlife
- Be aware of unwanted visitors moving in!
- Please resist feeding your new neighbours as it creates a dependency on artificial food sources

### Materials

Material	Quantity (per box)
Timber	2000mm length, 400mm wide or greater, 18mm <b>marine ply</b>
	550mm x 70mm x 35mm <b>treated pine</b> for box mount
Screws	40 x 40mm treated pine screws
Gap sealer	To seal box eg. Silastic
Cup head bolts	2 bolts, nuts and washers, recommend M8 ≥60mm (for attaching box to mount)
Coach / screws	2 coach screws M8 ≥90mm (for attaching box to tree). Can also use large treated pine screws of similar length (would need washers for TP screws)
Rubber Grommet	4 grommets, 2 per screw- allows for tree growth
Butt Hinge	1 butt hinge for lid of box
Gate hook and eye	1 gate hook and eye
Paint / timber seal	Acrylic paint or organic sealer to preserve box (eg Tung Oil)
Box lining	To insulate box - natural wood chips / shavings. Avoid treated wood

## Equipment

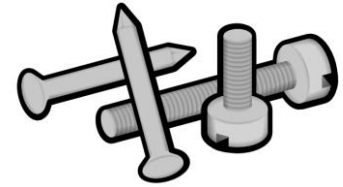
<b>Bench Saw</b>	To cut timber lengths
<b>Cordless Drill</b>	For construction and installation
<b>Jig saw or similar</b>	For entrance hole – drill pilot hole (8mm bit) so jig saw blade can fit in
<b>8mm drill bit</b>	For drainage holes, for jig saw, fixing cup head bolts to box mount and coach bolts
<b>Screwdriver / screwdriver bit</b>	For box construction
<b>3mm drill bit</b>	Pilot holes for screws
<b>22mm Spade Bit</b>	To countersink nuts and washers into box mount
<b>Socket wrench</b>	Helpful to tighten cup head bolts into box mount / coach screws into pole / tree

## Assembly

### *Prepare the Pieces*

1. Cut the timber to the dimensions provided to make the pieces. **See Diagram Insert.**  
*N.B Dimensions are for 18 mm ply and will need to be adjusted for other materials*
2. Use the bench saw to “mark” (shallow cuts) diagonal or straight cuts on both sides of the baffle and on the outside of the Right and Left side piece. This gives the gliders a rough surface to climb over.
3. Use a jig saw to cut the 30mm entrance hole– drill pilot hole (8mm bit) for jig saw blade to fit into first. The entrance hole should be on right side panel, near the bottom of the box and towards the back. This will allow gliders to enter and leave the box directly from the tree trunk
4. Drill (8mm drill bit) 4 drainage holes in the bottom piece.
5. To prepare for assembly- drill pilot holes (3mm drill bit) into ply to avoid splitting. 2 holes on short edge and 3 holes on long edge are recommended. Following the diagram, mark and drill pilot holes for baffle attachment.
6. Mark and drill 2 pilot hole (8mm drill bit) on the back piece and the box mount. Countersink 2 bolt holes with 22mm spade bit into box mount pilot hole for the washers and nut. Add another 2 pilot holes (3mm drill bit) to box mount 40mm from each end.

## Construction



7. Bolt the box mount to the side panel using cuphead bolts, nut and washer (cuphead on the inside of the box). Don't tighten it until you have determined the positioning of the box on the tree.
8. Prepare the joints with Silastic or similar sealant.
9. Screw the box edges together. Attach lid last, allowing 30mm overlap on the each side, placing the butt hinge to be evenly positioned in the middle. The hinge needs to be on the opposite side to the entrance hole. Attach gate hook on lid and eye, on the other side of box to fit snugly.
10. You can now paint or coat the outside of the box.
11. Add two handfuls of your insulation (e.g. wood chips etc.) to the box.

## Installation

Note: Your box can be installed professionally by an arborist or wildlife expert. If you are using a ladder to install, follow manufacturer's safety instructions.

**Sugar Gliders like a habitat box that is 3m above the ground in a tree with leafy coverage and sturdy branches.**

12. Select a suitable site for your habitat box. With the box mount against the tree, drill and mark the position of the holes on the tree.
13. Return box to the ground and drill 2 holes (8mm drill bit) for coach screws / timber screws (3mm bit) into the tree.
14. Attach box to tree with coach screws using the socket wrench (put grommets on screws before screwing into place). If using timber screws, place a washer between the screw head and the two grommets to ensure screw doesn't go through the grommets while drilling into the tree.
15. Congratulations- your nest box is ready for use!

**Diagram**

