



01 | Immature spores of an elkhorn.

Propagation of native and non-native elks and stags

Staghorns and elkhorns can be propagated by tissue culture, but for the home gardener there are two simple ways to produce more plants for the garden. These wonderful ferns can be propagated by division for those species that produce 'pups' and by spore (with varying degrees of success).

To divide a plant with pups, select a pup growing close to the edge of the mother plant and carefully excise it using a sharp knife. Try to leave as much plant material (of the staghorn/elkhorn) at the back of the shield as possible. If the pup is large, trim some fertile fronds off so there is less stress on the new plant. Mount the new separated specimen on board (timber,

cork, plastic) or other material – some growers overseas use wire frames.

Do not allow the new plant to dry out – watering can be decreased once the plant is producing new shield fronds.

It is best to do this when the shield fronds are brown (and therefore dead). Accidentally cutting into the green shield can leave the living shield vulnerable to fungal rot that could adversely affect the mother plant or the new pup.

For propagation by spore, first collect the spores from the frond and place into a paper bag.

Sterilise your growing medium (either coir fibre or sphagnum moss) with hot boiling water.

Once cooled, sow the spores directly over the growing medium. Place a lid on the container (many fern growers use takeaway containers that have lids) and then place this in a cool and shaded location. Every few weeks open the lid to check that it is moist and add rainwater (or filtered water) if necessary via a mister. Misting is critical to assist the 'fertilising' of the young spores as they grow.

After about 1-2 years, the plantlets can be separated and grown on.

Successful spore propagation is all based on patience.

For more visual assistance, there are many excellent videos on YouTube showing this technique.



02 | Select a suitable pup from the side.



03 | Carefully cut and remove the pup.



04 | Removed pup showing retention of fibre.



05 | Reduce number of fertile fronds.



06 | Ready for mounting.



07 | Newly removed pup in a bespoke elkhorn cradle mount.

Cultivation

Staghorns and elkhorns are usually grown outdoors, either mounted on a board, placed in a hanging basket or attached directly to a tree or rock. They can also be grown indoors on a board mounted on a wall. The current international trend is to buy and grow these plants in pots so that the antlers grow upwards to create an attractive potted specimen for indoors.

Outdoors, *Platycerium* specimens grow best in bright, indirect light (except for *P. veitchii* which will grow in full sun) and should be allowed to almost dry out between waterings but should never be kept so wet that the shield fronds rot. Check our article to verify which species need more regular watering or humidity.

Australian species of *Platycerium* will usually require little attention apart from watering, but an occasional misting is beneficial during extended dry periods.

To water an indoor plant, place the root section of the plant into room temperature water for 10-15 minutes, and then allow the pot to drip dry. Generally, humidity inside offices and homes is fairly low so a regular misting of the fronds will help to compensate for this.

A weak foliar fertiliser whilst in active growth can be beneficial. Some gardeners throw a few fertiliser pellets (such as chicken manure) or a cow pat into the top nest of shield fronds to give the plant a nutrient boost. Fish emulsion liquid fertilisers are also used by other gardeners. **STG**