Plants, gardening and asthma

FACT SHEET prepared by the Asthma and Respiratory Foundation NZ

Gardening used to be a no-no for people with asthma and hay fever. However, with a little planning and careful plant selection even those with severe allergies can enjoy the many benefits that working and being in the garden can bring.

Which plants may trigger asthma and/or hay fever symptoms?

A number of plants may create discomfort in susceptible people.

Wind-pollinated plants:

- Some plants are pollinated by the wind. These plants include deciduous plants which release pollen from insignificant-looking flowers. Their pollen is small and light and floats through the air. We inhale the pollen when it is airborne and it can trigger asthma or hay-fever symptoms.

Bird and insect-pollinated plants:

- These plants often have large, flamboyant flowers. They are less likely to trouble people with asthma and allergies.

Scented plants:

- Pollen is the main trigger for people with allergies, but strongly scented plants e.g. lilies, sweet peas can also affect some people.

- Olive trees are an increasing problem as they become more widely grown.

- Asteraceae (daisies, marigolds, and chrysanthemums, etc.) can also be triggers.

- Other common trigger plants include alder, ash, coprosma, cypress, elm, liquidambar, maple, lily-family, mulberry and plane trees.

Did you know that female trees are more allergy friendly than male trees (they don’t produce large amounts of pollen), although they create more plant litter (flowers, seed pods etc)?

Christmas trees Some of the biggest pollen producers include the cypress family of trees and pine trees - the same trees that we often use as the central focus of our Christmas celebrations, often bringing them into our living rooms for weeks on end.

Artificial Christmas trees can also present problems depending upon how they are stored – they can be loaded with mould and dust when you take them out of storage to set up prior to Christmas. We recommend vacuuming or wiping down artificial trees and decorations as you get them out of the box, and unpacking them outside.
Tips for gardeners:

Wear a mask to reduce exposure to asthma triggers. (When purchasing a mask, check for a secure fit and suitability, and ask how often it should be replaced.) Minimise your weeding with appropriate ground cover plants and mulches. If mould spores trigger your asthma/allergies, avoid organic mulches such as tree bark and manures, and use gravel mulch instead. As a long-term alternative, you may wish to consider replacing lawns with paving or plantings, and replacing hedges with fencing or trellis. As composting depends on moulds as well as bacteria, have compost. Also, exercise caution with bags of compost – open them slowly, and away from the face.

Commonly Found “problem plants” in New Zealand include:

<table>
<thead>
<tr>
<th>Plants</th>
<th>Issue</th>
<th>Flowering Period</th>
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</thead>
<tbody>
<tr>
<td>Pines</td>
<td>Widespread/major source of pollen.</td>
<td>July-September</td>
</tr>
<tr>
<td>Oaks</td>
<td>Produce a lot of pollen/some people are very sensitive to it</td>
<td>August-October</td>
</tr>
<tr>
<td>Wattles</td>
<td>Produce large quantities of pollen – though most settles near the plants.</td>
<td>August-November</td>
</tr>
<tr>
<td>Birches</td>
<td>Produce a lot of pollen – some people are very sensitive to it.</td>
<td>October-November</td>
</tr>
<tr>
<td>Grasses</td>
<td>Widespread – produce a lot of pollen, which is carried long distances by the wind</td>
<td>October-February</td>
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<tr>
<td>Plantains</td>
<td>Widespread – moderate pollen producers, but the pollen is strongly allergenic.</td>
<td>October-March</td>
</tr>
<tr>
<td>Privets</td>
<td>Produce a lot of pollen – most settles on the ground within about 15m. Privet perfume is also an irritant for some people.</td>
<td>October-February</td>
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How can we help ourselves?

As organisations: (schools, local authorities, etc.)

- Help by avoiding common trigger plants in grounds, gardens and hedges.

As individuals:

- The best solution is avoidance, but this is not always possible
- Reduce your outings on windy days
- Remove plants that trouble you from your garden or move them further away from the house
- Mowing, weeding and hedge-trimming stir up pollen, dust and spores which are then inhaled. If you can, stay inside while someone else does the work
- Close car windows. (Some vehicles have air intake filters to reduce the amount of pollen taken into the car)
- Keep bedroom windows closed at night as many plants release their pollens in the early hours of the morning
- Keep flowers outside in the garden – pollens are more concentrated
The Met Service issues regularly updated pollen forecasts on its website metservice.co.nz. Pollen forecasts help you gauge the risk of exposure.

Find out more about your allergic triggers with a skin prick test. For further information on allergy testing see the fact sheet “Asthma and Allergy” or visit our website asthmaandrespiratory.org.nz

The Asthma and Respiratory Foundation NZ can help you

The Asthma and Respiratory Foundation NZ is New Zealand's not-for-profit sector authority on asthma and other respiratory illnesses. We advocate to government and raise awareness of respiratory illnesses, fund research for better treatments and educate on best practice.

Check out our comprehensive website at asthmaandrespiratory.org.nz

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