

# The Auckland Garden

Newsletter of the Auckland Botanic Gardens and Friends

December 2018



# Contents

## GARDENS NEWS

- 3 Jack's update
- 4 Aroha Kauri Day - Celebrating Kauri
- 6 Animal pest control at the Gardens
- 7 Little Sprouts

## FRIENDS & VOLUNTEERS

- 8 From the President
- 9 Early plant sales
- 10 Botanical Art Worldwide
- 10 Wiri Rambler report
- 10 Growing Friends
- 11 Photographic competition
- 13 Painting Group

## AN IN-DEPTH LOOK

- 15 Summer seasonal activities
- 16 Learning from leading interpreters
- 19 Research round-up
- 20 Visitor Centre/Huakaiwaka gardens
- 21 Camellia breeding
- 25 "Rhubarb rhubarb rhubarb"
- 27 Two new books in the Library
- 29 West to Waiuku

Front cover image: *Anigozanthos manglesii*  
pictured at Kings Park by Jack Hobbs

© Material in this Newsletter is copyright. Please refer to the Friends' website [www.friendsabg.co.nz](http://www.friendsabg.co.nz) for the full Copyright Statement. Individual items may be reproduced provided that the source is acknowledged and the author's permission is obtained. **Contributions are welcome and material for the March 2019 issue should be submitted by 3 p.m. Friday 8 February 2019 to the Editor [ross.ferguson@plantandfood.co.nz](mailto:ross.ferguson@plantandfood.co.nz).** Botanic Gardens staff should send their contributions to Jack Hobbs.



The  
**Auckland Garden**  
is the quarterly  
newsletter of the  
Auckland Botanic  
Gardens and Friends

Auckland  
Botanic Gardens  
102 Hill Road  
Manurewa  
Auckland 2105

# Jack's update

Having spent most of October in Australia I am still catching up with everything at the Gardens. I am always so impressed with how smoothly things run whenever I go away, and I return feeling extremely fortunate to have such capable and professional staff.

It is great to see the new carpark finally open and functioning after so many months of disruption. The project did leave us with some repair work to do such as tidying up path edges and installing safety fences near the lake. We also took the opportunity to upgrade the Herb Garden, especially where it meets the new access road. Vince, Hippy (Alan) and Danielle have done a

great job planning and installing a new retaining wall and preparing beds for planting with help from our long-standing contractors Gardens with Attitude. The *Lavandula dentata* hedge is to be replaced and support plantings will include *Tagetes lemmonii* and *Stachys byzantina*. Both pergolas adjacent to the road are also being repaired.

A new retaining wall has been installed at the rear of the Perennial Garden along the Loop Road. This border will now slope gently inwards towards visitors.

Just as one major project closes another begins. Once completed the Pacific Pathway will have significant

Danielle Cipperly, Alan Matthews, Bevan Hunter and Vince Soulje in the Herb Garden



impact on the way our visitors get around the Gardens, providing much improved access around the gardens and leading visitors into our plant collections. The pedestrian and vehicle route most disrupted will be from the Perennial Garden entrance to the Rose Garden. Signage will be installed to indicate alternative pedestrian accessways while temporary pathway closures are in place, and progress reports will be regularly posted on our website.

My recent travels through Australia began with a cruise from Adelaide around western Australia ending in Darwin. Our ship stopped at Albany, Busselton and Perth which enabled me to spend time plant hunting in these botanical hotspots. Luckily recent rainfall resulted in wonderful wildflower displays. I also visited botanic gardens in Alice Springs and Darwin, and spent a wonderful few

days in Kakadu National Park and Litchfield National Park in Northern Territory. I will write about some of the fascinating plants we encountered in future newsletters. Throughout my travels I was reminded what a magnificent and diverse country Australia is. Fortunately, my forty-strong tour party proved to be a lovely group who all got on and gave me little grief. It was especially nice to have our Friends Treasurer, Judy Williams, along, and we spent some fun times together checking out the plant life and other attractions.

It is always sad when one of our apprentices completes their time with us and moves on to the next stage of their career. Pleasingly, Katja Wilson has secured a position at Mitre 10 in Pukekohe which will suit her bubbly outgoing personality. We wish you all the best Katja.

Jack Hobbs

---

## Aroha Kauri Day - Celebrating Kauri

The Gardens, Nathan Homestead and The Kauri Project (a charitable trust that uses art to promote awareness of kauri and kauri dieback) co-hosted the "Aroha Kauri Day" on 21 July. The day was planned to coincide with an exhibition by The Kauri Project on show at Nathan Homestead. We split the day in half with the morning at the Gardens and

the afternoon at Nathan Homestead. In the morning the visitor centre was a bustle of artists leading children's art activities, and three Victoria University students and Landcare scientist Dr Stan Bellgard intercepted visitors and discussed scientific posters of their dieback research. Amanda Peart, from Council's Biosecurity team, set up an





Bruce Burns, Nick Waipara, Monica Gerth, Rosie Bradshaw and Ian Horner.

information centre for kauri dieback to provide resources and give advice to landowners. Artists, visitors and Green MP (and co-leader) Marama Davidson planted kauri in the New Zealand Gondwana collection (the trees were sourced from kauri at Colin McCahon house in Titirangi). In the afternoon we toured The Kauri Project exhibition “Āta Haere I Te Wao A Walk in the Park” at Nathan Homestead. The exhibition brought together 14 artists to explore the relationship between people and kauri in response to the rapid spread of kauri dieback disease. The day concluded with a series of talks presenting cutting-edge science on

kauri dieback from Dr Monica Gerth (Victoria University), Prof Rosie Bradshaw (Massey University), Dr Nick Waipara and Dr Ian Horner (Plant & Food Research) and Dr Bruce Burns (Auckland University). Over 70 people attended the talks and we received feedback from the scientists that they rarely get the opportunity to share their science with the public and they enjoyed the chance to connect with a non-technical audience. In a modern twist the talks were all broadcast on Facebook Live and most talks have been viewed over 400 times.

Bec Stanley

# Animal pest control at the Gardens

For a number of years, we have carried out pest control at the Botanic Gardens. Targeted pests are rats, possums, rabbits and mustelids (weasels, stoats and ferrets). Following recent advice from the Council's Biosecurity team we have modified the program. We now bait and trap on a "pulsing system". Research has shown pulsing to be far more effective: carrying out baiting and trapping periodically when the pests are most active, i.e., breeding season and the warmer months. This reduces the chances of pests becoming wary of the traps and "bait shy". Additionally, we have changed the types of traps and baits we use. Traps are GPS tracked to make it easier to identify their location. Data are captured and reviewed to see where pest "hotspots" are. We can then modify the trapping and baiting to suit. We have also taken the opportunity to update our safety signage around the Botanic Gardens.

Rabbit numbers are controlled by night shooting. This is conducted by an Auckland Council approved contractor. Sighting of rabbits and their locations are recorded. Following a mail drop to neighbours and further communication via electronic media, a night shoot is conducted under strictly controlled conditions. The company engaged uses the very latest thermal imaging scopes to guarantee 100% target identification. We coordinate our shooting to align with Totara Park's programme. This reduces the opportunity for re-infestation from that population and vice versa.

Results so far have been extremely positive. One good indicator species is the kiekie (*Freycinetia banksii*) which, when rat and possum numbers are high, only flowers and fruits with effective animal control. For the past 5 years kiekie in the forest have flowered and fruited well.

Renton Campbell

Kiekie in flower in the Botanic Gardens Forest (Photo: Bec Stanley)



# Little Sprouts - Growing future plant lovers!

One of the initiatives we have started in the library is based on programmes that are already run in public libraries throughout Auckland to get parents and their young children into libraries through "Storytime" and "Wriggle and Rhyme" sessions. These sessions are all about getting children activated and using the public space. We used this concept to develop our own session "Little Sprouts".

Little Sprouts is a free one-hour session for children ages 0 – 5. We will run Little Sprouts sessions once a month. Children and adults/caregivers are invited to join in nature-themed stories, songs, nature-based crafts and investigating flowers. Each session is tailored to the current season, following a similar template but changing the craft activity, and the songs and books to the relevant season. The content has been developed for another project ABG has been involved in with local communities called "Thriving Tamariki Maori". We are maximising the resource investment of this content, so the thinking, planning and time into the original project goes even further with the application to Little Sprouts. The sessions are run by Sarah Robinson who is an experienced educator.

Our first session of Little Sprouts was kicked off in early September.

We had about 30 children from a local kindergarten, plus six of their teachers, come along to the first session so that we could see how the session worked. The children walked over from the kindergarten and the session ran for about an hour. The children loved the songs, especially holding the toy birds, bees, butterflies and flowers. They picked up the hand actions in songs easily and were great at listening through the two spring-themed stories. We collected a range of fresh flowers for the children to investigate and take home to press. The final 15 minutes of the session allowed the children to be creative by colouring and assembling bee and butterfly finger puppets. The kindergarten teachers had positive feedback for us after the session. The songs and themes were different to what the children are normally exposed to, so they were very engaged and had a wonderful time.

This a great way for our library to be used as a place for our local community to get together, meet new people, visit the garden, and learn about plants and nature. Our motto is "Where ideas grow" so why not start with the young sprouts!

Emma Bodley

# From the President

Thank you to all those members who attended the Friends' AGM on Saturday 29 September. It was a beautiful sunny afternoon which meant the car park was overflowing and there may have been some members who despaired of getting a car park and returned home. We do so look forward to opening the new car park! A few items are reported here.

We farewelled some valuable committee members – Annette Toon who has given great service to you through the website, e-news and photographic competition, Rosalie Williams who provided contact with ATEED, and Jenny Hunt a volunteer in the Gardens. Your new Executive Committee has a new face – Viv Canham who comes to us from the Wiri Rambler volunteers and has offered to train to be our Health and Safety Officer, all others are returning members.

The birthday gift of \$10,000 was approved as a second contribution for an entrance to the Pacific Pathway which is undergoing development over the next few months – last year's birthday gift was the first of the significant entrances approved. We look forward to this Pathway, leading visitors off the roadway and away from machinery using the road, into the collections making their visit

more  
rewarding.

The Buchanan Award was granted to staff member Pippa Lucas to travel in May/June 2019, to America for three weeks to volunteer at Chanticleer Garden in Philadelphia and to visit New York Botanic Garden. This will be followed by three weeks in England visiting significant gardens and a flight back to New Zealand via the Gardens by the Bay in Singapore. Members will recall a visit this past year, from Dan Benarcik, a horticulturist at the Chanticleer Garden and his visual presentation "Creating World Class Displays for Your Garden". Chanticleer is regarded as one of the world's most beautiful gardens and greatest expression of gardening as an art form. Pippa intends to learn much from both this Garden and others she will visit to assist with her development of container displays such as the Waka planting in front of the Visitors Centre. We hope that on her return she can plan some exhibits for the main courtyard demonstrating that it is possible to have a garden in tiny spaces in modern urban living including

A snippet of the 1770 Getaway Garden





for townhouses, apartments and balconies. Pippa also wishes to get more youth involved in a career in horticulture, hoping to learn from the UK gardens and then seeking more apprenticeships in the Auckland Botanic Gardens. We wish her well and will learn from her experiences next AGM.

Spring is a wonderful time to visit gardens – some of you will have been on the Spring Bus Trip to visit gardens in the Waiuku/Awhitu area, others will have just witnessed our Gardens or others on your travels, enjoying all the wonderful spring

foliage and flowers. I was fortunate to travel to Queensland, Australia in July/August and to visit east coast Agnes Water and 1770 where Captain Cook sailed into port for food and water in 1770. (Have you been watching “Uncharted with Sam Neill” as he recalls Captain James Cook’s voyages into the Pacific?) If you visit this area, do visit the “1770 Getaway Gardens and Café”. Delightful garden setting of Australian trees, shrubs and plants. Food is great too.

Dianne Glenn ONZM, JP

---

## Early plant sales

The success of the special plant sale held in the Perennial Garden in July reminded me of some of the earliest plant sales held by the Friends – but just how long ago were those first sales held? Information in the Friends’ newsletters, held in the Library, showed that the Committee established the idea of a mid-winter event with the first one in 1987 featuring a talk, lunch and two performances by Morris dancers.

In 1988 the event was held in the classroom and courtyard and included the sale of surplus perennial plants from the Gardens, a talk on winter flowering shrubs, and a simple soup lunch. The financial report for that year showed takings

of Plants, \$186.60; Seeds, \$64.70 and Food, \$70.00. In 1989 a similar event raised \$800.00 (including lunch).

In 1990 the midwinter event moved across to the Carrington classroom, now the Children’s classroom. “Surplus divisions” of plants from the Perennial Garden were sold from 10.00 a.m., lunch of soup and accompaniments cost \$4.00, there was a talk and then a walk to the Camellia Garden. The total takings, including lunch, were \$1,100.00. This seems quite an achievement considering these events and sales were for members only.

Sue Davison

# Botanical Art Worldwide

After a very successful show in the Treehouse Gallery at the Wellington Botanic Gardens the exhibition is now showing at the Millennium Gallery in Blenheim, closing there on 9 December.

Sales in Wellington were good which is very encouraging for the exhibiting artists. Carlee Reid, Team Leader, Customer Services for the Wellington Botanic Gardens has reported that interest in the exhibition was high and that feedback has

been very positive. – apparently people in Wellington have been asking “Will it be happening again next year??” That’s probably a little optimistic as those of us involved in the organisation, and, no doubt, the artists need a little time to get our breath back!

We look forward to having the works returned to Auckland in December and the many purchasers of these wonderful works being able to claim them and take them home to enjoy.

## Wiri Rambler report

This is only a very short report as the construction of the new car park and adjoining road prevented us from operating for six months. The team were looking forward to starting in September but we learned that further construction, the Pacific Pathway, meant another long delay to operating again.

We now have a full team of volunteers and will be running Saturdays and Sundays on an exciting new route as soon as we are able to.

Kate Moodie

## Growing Friends

After our winter of no access it is wonderful to have spring and customers again. The new path and road are exciting, and it is great to have people who love plants visit us again.

With the new carpark the fence has been rebuilt and we have some more space we are planning to use.

During the winter we have tweaked all our stock and made many additions, with support from the great nursery staff. Now we are ready for business with an interesting range of beautiful plants. Our first Sunday sale was 4 November.

Bronwen Rowse

# Photographic competition

## Photographic competition winners recognised and rewarded

Congratulations to the winners in the Friends of the Auckland Botanic Gardens Photographic Competition 2018.

On Sunday 28 October prizes and certificates were presented to the winners at a Prizegiving held at the Huakaiwaka Visitor Centre.

In her comments the Judge, Pauline Smith said that her job was difficult because of the high standard of photographs and she changed her mind a number of times before deciding on the finalists. She provided a detailed description as to why she chose each of the winners.

The public had an opportunity to vote for their favourite photograph in the People’s Choice Award.

There were two sections this year. The results are as follows:

### We thank:

Annette Toon for organising the competition, with assistance from Bev McIntyre and Dominic Toon, and the Judge, Pauline Smith.

Look out for information about the next competition in 2019.

### Most Promising Child/Teen Award

Winner  
Alex McIntyre  
He was awarded a trophy, a voucher and a certificate.

Runner up  
Ashton Warnock  
He was awarded a certificate.

### Adult Supreme Award

Winner  
Jiongxin Peng  
(See photo on back cover). He was awarded the Rod Bieleski cup, *Seasons* book and a certificate.

Runner up  
Alan Stoker  
He was awarded a certificate.

### Child/Teen - People’s Choice Award

Winner  
Jamie Hilliam

Runner up  
Ashton Warnock

### Adult - People’s Choice Award

Winner  
Jiongxin Peng

Runner up  
Natalia Marshalkina



Above: The Friends Photography Competition winner of the Adult Supreme Award and People's Choice Award categories, Jiongxin Peng, with Friends President Dianne Glenn.  
Below: Most Promising Child/Teen Award Winner Alex McIntyre, and his winning photograph. Photograph of prizegiving: Bev and Ewen McIntyre.





# Painting Group - November 2018

As the days become longer with the year drawing to a close, I look back on 2018 and am amazed to see how much the painting group have achieved over this exceptionally busy year.

The "Botanical Art Worldwide - Ngai Tipu Taketake" exhibition took up much of our members' time for the first half of the year – either as organisers, accepted artists, demonstrators and helpers at the "Worldwide Day of Botanical Art" or manning the exhibition during its 3-month run in the Visitor Centre Gallery. The calibre of the work shown certainly inspired our group and this was evident by the high quality of work shown at our annual members' exhibition, "In our Gardens" last month. There was a good variety of subjects and styles

and I was delighted to see new members submit work. Although we didn't sell many paintings, the many, very positive comments left by visitors confirmed that our decision to keep it purely botanical was the right one.

Our bi-monthly artist talks over the past year have all been, apart from one, by artists who had work chosen for the "Ngai Tipu Taketake" exhibition. Our own Jenny Haslimeier, back from Edinburgh kicked off the year with a very interesting demo using coloured pencils. Kohl Tyler Dunshea delighted us with her watercolour demo and her fascinating collaboration with New Zealand based company Merchant1948 who used her artwork on shoes and bags for the "Kohl For Isabella Anselmi" collection. Printmaker Val Cuthbert

Jenny Haslimeier colour pencil workshop



had us all scratching madly on acetate to produce our own intaglio botanical prints and Julie Freeman, along with her husband Michael, inspired us with their incredibly detailed pastel work. Maria Moldavsky, one of our new members was very generous with her watercolour tips, giving two talks over the course of the year. Sadly, she will be leaving us to go back to the UK but we shall definitely be keeping in touch. Emma Scheltema, medical and scientific illustrator, finished off the year explaining how she uses “col erase” pencils and Photoshop in her commissioned work. All these artists have websites and I recommend having a look at them!

Overall our numbers have increased – I now email out to 80 of you each

month (it was 50 something when I took over at the beginning of 2016) and on average we have between 15 and 30 come to our meetings! It's probably just as well not everyone turns up each month, as Health and Safety would have a field day, but it would be lovely to see faces to go with the email addresses!

Our last meeting for the year will be our Christmas shared morning tea on Saturday, 24 November from 9.30 a.m. in the Friends Building. Why not come along and see what we have in store for next year. At this stage I can only guarantee good comradery and encouragement in your artistic endeavours, but with it being 250 years since Captain Cook's first Pacific voyage, I am sure we will have another busy and exciting year!

---

## Albie McCabe 1929 – 2018

Albie was a well-loved member of the Friends of the Gardens Painting Group – a cheeky Cockney who achieved fame as a press photographer both here and in the UK, winning the British Press Photographer of the Year award in 1970. Working as a photographer on various Royal tours brought him to New Zealand and in 1975 he moved here with his family. Albie became a prolific painter of both landscape and botanical subjects and while living on Rakino Island and later in Otaua became part of the Friends Painting Group.

He submitted his work, Kawakawa, for the Botanical Art World Wide exhibition, however, it was not selected for the exhibition. At the wake held for Albie by his family on 13 October, 2018, which was attended by a number from the Painting Group, his many paintings were set out and those attending invited to take one each in his memory. We discovered ‘Kawakawa’ in the collection and asked his family if we could take the work to frame and hang in the Friends Building as a reminder of our old friend.

Lesley Alexander Smith

# Summer seasonal activities

It only felt like yesterday we were discussing our summer tasks in the garden. Does time pass even faster as we age? Tending to garden tasks certainly makes me feel better.

## Garden beds

Prevent garden beds drying out over the summer months by applying copious amounts of compost before planting the rest of your vegetables or perennials. In addition, add mulch to help retain moisture over the summer and mulch will also help suppress weeds. Remove dead plant materials to minimise the onset of fungal diseases. Install garden stakes or support plants that require them.

## Planting

There is still time to plant heat-loving plants like cucumbers, watermelons, courgettes and basil. Beans, beetroots, lettuces and salad mix can be sown for a continual harvest right through to end of autumn. Add colour and attract beneficial insects to the garden by planting marigold, nasturtium, coriander, yarrow, tansy and dill.

## Pruning

Start deadheading roses now and continue deadheading until early autumn for a prolonged flowering period. Prune to a five-leaflet leaf, cutting an angle just above the

leaflet. Now is also the time to start deadheading perennials until autumn; you will be rewarded with repeat flowering if you deadhead *Penstemon*, *Ageratum*, *Dahlia*, *Scabiosa*, *Canna*, *Achillea*, *Coreopsis* and other daisies.

Prune spring-flowering shrubs once they have finished flowering. Remove old flowering stems or cut them back to a strong side shoot or healthy bud. Spring-flowering shrubs such as *Forsythia*, *Deutzia* and *Philadelphus* produce most of their flowers on the new young growths made in the previous season.

Carry out formative pruning on young trees by removing dead wood and weak internal branches crossing over. Remove multiple leaders from apical dominant trees and ensure that you retain the balanced aesthetic of the tree by pruning all-round it. Apical dominant trees are those that have a strong central leader such as Norfolk pines.

There is still time to prune winter-flowering camellias before new growth becomes vigorous. The overall look you want is an open, airy plant with a uniform look. You can achieve this by:

- removing weak, internal crossing branches;
- removing lower branches 30 cm

- off the ground;
- remove or shorten laterals which are thickening into heavy branches to encourage good floral display;
- pruning around the whole plant and always prune to an outward facing bud.

Mere Brewer

# Learning from leading interpreters

In September I attended the Interpretation Network New Zealand (INNZ) conference held over two days at the Otago Museum in Dunedin. Having never been to Dunedin before I was keen to make the most of my time and upon arrival visited Dunedin Botanic Gardens. I met with the curators of the Rhododendron Dell, the Native Plant Collection and the Rock Garden who showed me around their collections and answered my many questions! I thoroughly enjoyed my time here. The staff were very welcoming, and the Dunedin Botanic Gardens are something special (a New Zealand Gardens Trust 6 Star Garden of International Significance).

The morning of the first day of the conference was spent listening to several keynote speakers. I particularly enjoyed listening to Neil Harraway who has spent over 40 years making wildlife, science and history documentaries for global audiences and who now operates Monarch Wildlife Cruises and Tours, which run bus and boat tours out of

Otago. He had some great stories to tell and spoke about the theory and application of meaningful story-telling. I learnt that live story-telling has its challenges and to tell a good story and keep your audience engaged you need to be adaptable. Also be prepared to rehearse and make a personal connection with your audience.

After a morning inside it was good to get out and enjoy the beautiful weather that Dunedin had turned on for us with a selection of field trips. I chose to go to Hotere Garden which is situated on top of Observation Point in Port Chalmers. The garden was created in 2005 according to the wishes of artist Ralph Hotere and built on a small, very steep, residential property. It has the most spectacular views of the port and Otago Harbour but is a very exposed and windy site. At the 2008 Landscape Industries Association of New Zealand awards it won the premier award for "Best Use of Native Plants". I enjoyed seeing the selection of native plants that had been chosen specifically for





Orokonui Ecosanctuary visitor centre

this site thriving in the harsh, windy environment.

Next stop was Orokonui Ecosanctuary, a 307 ha nature reserve surrounded by an 8.7 km long predator fence. This was one of the highlights of my trip. Many species of plants and animals are protected from predators. Rare and endangered species have been able to be re-introduced to the environment with much success and the reserve is now home to bellbird, grey warbler, shining cuckoo, rifleman, kiwi, takahe and tuatara, to name but a few. I've never seen such large plants of tree fuchsia, *Fuchsia excorticata*, growing in the wild before! The visitor centre and cafe are ultra-modern and have stunning views over the entire ecosanctuary. While there our group was taken on an hour-long guided walk through

some of the tracks in the reserve.

Dunedin again put on spectacular weather for the second and final day of the conference. First up were short presentations by four of the conference attendees on interpretation projects that they had been involved with. I enjoyed listening to the entertaining Whakatane DOC rangers who spoke about "Interpretation with Iwi and Hapu" and the upgrading of some of their local park brochures. Julia Albrecht from the University of Otago Tourism Department took us on a journey of "Food, Places and Visitor Experience", which was mouthwatering! We then split up into two groups to attend workshops. I attended "Communication Through Design" with Michael Findlay who talked about design-led ways of thinking about exhibitions and I

also listened to Nancy Longnecker from the University of Otago speak about “The Importance of Evaluating Interpretation”. I found both workshops valuable as they apply to my role in the visitor centre at ABG both when we are designing and

View of Orokonui Ecosanctuary from the visitor centre



setting up displays and evaluating the success of them afterwards.

The following day I was pleased to be able to attend a “Face to Face interpretation” course run by Lynda Burns from Christchurch Botanic Gardens. Part of my job here at ABG involves taking guided tours and Lynda had put together a fantastic workshop on how to structure a guided walk. She gave plenty of practical advice and the session culminated in each participant giving a short, guided walk presentation to the rest of the group. It was a fun way to end my few days in Dunedin.

Continuing with the guided walk theme, myself and the visitor centre team attended a guided walk review session with Riki Bennett, who is an Auckland Council park ranger and an extremely talented storyteller. We spent an enjoyable morning with Riki listening to him sharing cultural stories and heading out into the New Zealand native plant collection where he spent time talking to us about some of his favourite plants, playing the flute and giving us some helpful tips on giving an engaging guided walk.

Come and join us at the Gardens on Wednesday mornings at 10.30 a.m. for a Seasonal Highlights tour if you would like to see for yourself how we are continually working on improving our guided tours.

Shelley Small

# Research round-up spring 2018

This summer we are trialing nine cultivars of *Gomphrena* (globe amaranth or bachelor button) for annual bedding options. Last summer we had two cultivars as temporary displays in the perennial garden and the visitors loved them. We constantly had questions about where they could source them. We've decided to trial *Gomphrena* to see if they will provide the five to six months of flowering we require from a bedding plant, stay pest and disease free and require little maintenance.

We have some new additions to the hedge trial which we will be evaluating over the next year. There is a range of plants in this trial so we are interested to see which ones do well in Auckland and what the maintenance requirements are. All hedges in this trial are being kept to under 1 m, which is practical for a small home garden.

The *Agapanthus* trial is still very active. Over the next few weeks we will be collecting data as part of a nationwide *Agapanthus* trial to find low-fertility cultivars. We have supplied Wellington Botanic Gardens,

Christchurch Botanic Gardens, Dunedin Botanic Gardens and Pukekura Park with three plants of the cultivars showing promise. We are all collecting the same information which will be collated to make final calculations about their fertility. This is an exciting project to be involved in and we are grateful to the other BGANZ (Botanic Gardens Australia and NZ) gardens who have put their hands up to help with the work.

There are two newly planted camellia beds in the trial this year. One bed is a collection of seedlings that Neville Haydon selected which show promise in being petal blight resistant. The second collection is from seed that Neville imported from Dan Charvet (California) who had done extensive crossing of camellia species. We are assessing these plants for petal blight resistance and their merit for including in our breeding programme.

Keep an eye on our website for published reports of our trials, as well as the *New Zealand Garden Journal* where our work is originally published.

Emma Bodley



# Visitor Centre/Huakaiwaka gardens

The gardens I care for surrounding the visitor centre are designed to convey a sense of the South Pacific as part of the arrival experience to the Gardens. They also give a sense of the character of Auckland's planted landscape by using distinctive New Zealand native and subtropical plants suited to our climate. Pohutukawa are used as the signature tree on the sunny northern side of the visitor centre, with nikau fulfilling this role on the cooler southern side. As you enter the visitor centre all the plantings are green foliage plants with few flowers. When visitors arrive this calms the eye before they enter the gardens.

This winter we have considerably thinned the tropical planting which was becoming overgrown after 13 years. I am excited to see how the planting of *Strobilantes gossypinus* and *Cyathea tomentosa* (transplanted from the Urban Trees) comes into maturity. I think the combination of golden and silver foliage will look great.

The northern side is also the focus of annual planting, with two colourful summer and winter displays each year in the waka, around the terrace and along the Pohutukawa Walk. Annual plants are chosen for their colour, high survival, dense habitat, long flowering period and low pest and diseases issues. Over the past two years we have used a perennial, the cultivar 'So White' of *Gaura lindheimeri* (sometimes now named *Oenothera lindheimeri*), for the summer display in the terrace beds. We have cut them back over winter and planted larger-leaved annual plants such as mustard and silver beet to cover them. When these cover plants are removed the *Gaura* bursts back into leaf which ensures a well-established feature plant for our summer display and reduces the workload of maintaining summer annual plantings.

The featured plants this summer will be Begonia 'Dragon Wing Red', *Gaura lindheimeri* 'So White' and *Pennisetum glaucum* 'Purple Baron'.

Pippa Lucas





# Camellia Breeding at Auckland Botanic Gardens

## Objective

The ABG Camellia breeding programme aims to develop a range of attractive garden hybrids resistant to camellia flower blight caused by the fungus *Ciborinia camelliae*. Desirable characteristics include handsome glossy foliage, attractive flowers (in a range of sizes but larger than *Camellia transnokoensis* and *C. lutchuensis* flowers), and they must be resistant to flower blight. Additional desirable characteristics include long flowering periods, blooms that drop cleanly away when spent, and attractive colourful new growth. Scented blooms are a bonus. Small to medium sized trees of slender habit have particular value in small gardens and containers.

The process involves crossing petal blight resistant species (mainly *C. lutchuensis* and *C. transnokoensis*) with a selection of larger flowered hybrids such as japonicas and reticulatas.

The hypothesis is that crossing petal-blight resistant *Camellia* species with large- flowered cultivars will produce ornamental hybrids with increased disease resistance. Over time it should be possible to increase the flower size and colour range of disease-resistant cultivars and restore the status of camellias as first rate garden plants.

## Background

The fungus *Ciborinia camelliae* rapidly spread throughout New Zealand following its accidental introduction in the early 1990s. It infects the blooms of many ornamental camellias, notably spring-flowering cultivars, causing them to turn brown and fall early.

Field surveys of cultivars susceptible to camellia petal blight conducted during spring 2016 at ABG confirmed 190 camellias infected with petal

*Camellia lutchuensis*



blight. The total number is likely to be much higher as many cultivars were not flowering during the survey period and will be re-surveyed.

There are 500 *Camellia* species and cultivars in the ABG Camellia Garden, including 60 species. This extensive collection has significant educational and conservation value, and some species have considerable ornamental value.

Following the introduction of camellia flower blight into New Zealand Matt Denton-Giles (Massey University) tested 39 camellia species in the ABG collection for susceptibility to camellia flower blight and found variable degrees of susceptibility (Denton-Giles et al., 2013).

This research identified four species as having flower blight resistance: *C. lutchuensis*, *C. transnokoensis*, *C. yunnanensis* and *C. yuhsienensis*. The first three species are primarily being used in the ABG breeding programme.

In 2015 the Auckland Branch, New Zealand Camellia Society and the Friends of the Auckland Botanic Gardens established the Neville Haydon Fund to assist with the breeding of petal blight-resistant ornamental camellias.

Neville Haydon was the driving force behind the establishment of the Camellia Garden in 1985, donating most of the plants and advising

on the layout of the plantings. He also donated most of the species camellias in our collection.

The first crosses were made in 2015 but produced few seedlings. This was partly due to some selected parents proving infertile. Subsequently more vigilant observation of the reproductive capacity of potential parents was undertaken before finalising breeding programmes.

The ABG breeding project has been led by Rebecca Stanley (Curator) and Emma Bodley (Botanical Records & Conservation). Support has been provided by Billie Elliot (Propagator), Mark Fielder (Collection Curator Magnolias & Camellias), and Jack Hobbs (Manager). Neville Haydon, former proprietor of Camellia Haven, has been an invaluable source of information and plant material. Matt Denton-Giles has also provided advice and information.

Students contracted to undertake the pollination and recording of crosses have been Jess Ryder (2015), Keely Paler (2016) and Matthew Savage (2017).

## Description

The first step was to identify flower blight resistant species and cultivars (mainly *C. japonica* and *C. reticulata*) for use in the breeding programme.

*Camellia lutchuensis* and *C. transnokoensis* have been the main species used as parents, *C.*

*yunnanensis* has been sparingly used and *C. yuhsienensis* has not yet been used.

Surveys were then undertaken to ascertain the relative petal blight resistance of *C. japonica* and *C. reticulata* cultivars. Cultivars resistant to petal blight were subsequently surveyed to identify those that set viable seed to inform planning of future crosses.

Breeding plans were then prepared that considered using parents with compatible chromosome numbers which is critical to performing genetically compatible crosses.

*Camellia japonica* consists of diploid ( $2n = 30$ ) and triploid ( $2n = 45$ ) cultivars. Many of the *C. japonica* cultivars originally selected as potentially useful parents have not set seed.

*Camellia reticulata* ( $2n = 90$ ) cultivars have been used sparingly in the breeding programme. However autumn flowering camellias such as *C. sasanqua* ( $2n = 90$ ) cultivars have not been included in the programme as they mainly escape blight by being early flowering, and also the flowers shatter fairly quickly when spent. Therefore they remain fine garden subjects with many cultivars widely available. However some hybrids such as *C. sasanqua* x *fraterna* 'Yoimachi' have been included.

*Camellia transnokoensis* x *lutchuensis*

'Translucent' is of particular interest as a parent being a cross (by John Lesnie) of the two most resistant species, *C. transnokoensis* ( $2n = 90$ ) and *C. lutchuensis* ( $2n = 30$ ). Therefore *C. 'Translucent'* should have a chromosome count of  $2n = 60$ , making it a good fit with hybrids between *C. reticulata* and *C. japonica* which should also have a chromosome count of  $2n = 60$ .

*Camellia 'Transpink'* is a *C. transnokoensis* hybrid raised by Neville Haydon that he believes should have a chromosome count of  $2n = 60$ . It sets seeds and should be compatible with diploid *C. japonica* cultivars ( $2n = 30$ ).

Species      camellia      chromosome counts:

*C. yunnanensis* ( $2n = 30$ )

*C. lutchuensis* ( $2n = 30$ )

*C. transnokoensis* ( $2n = 90$ )

*C. yuhsienensis* ( $2n = 45, 75 \text{ \& } 90$ )

Hand pollination is undertaken by students both ways when possible (i.e., where both potential parents set seed and produce pollen).

The flowers of pollen recipients are emasculated prior to pollination. Different coloured pipe cleaners are used to identify different pollinators.

Pollen of donor plants is often stored in refrigerators so it can be applied to the recipient plant when receptive.

Students complete field data collection sheets that include recipient and donor name, bed location, number of flowers pollinated and date of pollination.

Mesh bags are placed over all visible fruit to collect seed as it ripens and prevent it being lost. Seeds are germinated and grown in the ABG nursery and accessioned to ensure records are kept in the ABG database. Seedlings are planted at ABG. They should flower approximately after 18 months which will enable identification of resistance early on and discarding of any susceptible to petal blight.

## Summary

The *Camellia* breeding programme is a long term project that will ultimately produce a range of high health cultivars that will help restore camellias as one of the most popular garden subjects.

## References

Denton-Giles, M., Bradshaw, R.E., Dijkwel, P.P. (2013). *Ciborinia camelliae* (Sclerotiniaceae) induces variable plant resistance responses in selected species of *Camellia*. *Phytopathology* **103**(7): 725-732.

Gao, J.-Y., Parks, C.R., Du, Y.-Q. (2005). Collected species of the genus *Camellia*: an illustrated outline. China: Zhejiang Science and Technology Publishing House.

This article originally appeared in the *New Zealand Camellia Bulletin* **30**(5)(2018): 4. It is republished with permission.

Jack Hobbs and Emma Bodley

Neville Haydon and Jess Ryder



# "Rhubarb rhubarb rhubarb..."

... is a phrase often used by actors to describe indecipherable background noise or conversation or, to provide ambience for a crowd scene or, as a reaction to plain nonsense. Thought to date from at least Shakespearean times it was much loved by the cast of The Goon Show who would sometimes throw in "and custard" for good measure.

Rhubarb (*Rheum x hybridum*), which is a vegetable although we treat it as a fruit, is probably an ancient hybrid involving *R. rhaponticum* and was cultivated in China as far back as 2700 BC. This rhizomatous member of the Polygonaceae was a medicinal herb, used as a laxative and to reduce fever. The plant's eating qualities were not recognised until much later.

It can be grown successfully on most moist soils and handles cold climates particularly well. I have seen it flourishing in early May in Juneau and Ketchikan, Alaska. Conversely its performance tapers right off above 25°C. In Auckland stems can be harvested all-year-round provided the plot is kept watered and mulched during the summer months. To maintain vigour the crowns should be lifted every five years when they can be divided with a sharp spade into numerous divisions and then replanted.

In the United Kingdom rhubarb has been traditionally grown in the "Yorkshire Triangle" where crowns are dug up in November after a few frosts and placed in sheds in total darkness. There the forced stems, noted for their enhanced sweet tenderness, can grow up to 60 cm in length and harvesting continues until March when the exhausted crowns are composted. Since World War II demand has fallen away as new and more exotic fruits have become readily available.

Three rhubarb collections in the United Kingdom have been given National Collection status. The first was at the Royal Horticultural Society (RHS) Garden Wisley in 1904, then the RHS Garden Harlow Carr in North Yorkshire and more recently at the National Trust's Cumber Park in Nottinghamshire. Each of these collections contains over 100 cultivars. About 35 cultivars are grown by United Kingdom nurseries (RHS Plantfinder, 2015) but very few are listed locally. The stems come in a range of hues of red and green. Most folk desire a completely bright red stem but "red" cultivars will probably not come true from seed and it is best to request a division from a desirable plant. Kings Seeds, Katikati offer seed of an F1 hybrid 'Red Cherry'.



The plant's most ardent fans would be at the older end of the demographic spectrum. I counted 290 rhubarb plants in the allotment gardens attached to our rest home.

Sorry, but I do not have a favourite rhubarb recipe to share. A rising 93-year-old friend provides a delicious rhubarb jam and I am partial to a decent-sized dollop of stewed, unsweetened rhubarb on my morning bowl of porridge!

Graham Robertson

Section of the National Rhubarb Collection at the RHS Garden Harlow Carr. *Rheum* 'Cutbush's Seedling' on the left. (July 1997)

Text from the sign in the image below:

### National Rhubarb Collection

The first rhubarbs introduced into Britain from China and Russia were grown as medicinal plants, the roots being used as a purgative. In the Victorian era the leaf stalks began to be used in pies and desserts and over 100 new varieties were raised. The West Riding of Yorkshire became the main growing area producing over 5,000 tons of forced rhubarb annually in its heyday. The collection includes medicinal and decorative species like *Rheum palmatum* and Victorian culinary favourites like 'Prince Albert' and 'Victoria'.



# Two new books in the Library

*Joseph Banks' Florilegium: Botanical Treasures from Cook's First Voyage.* Thames & Hudson, 2017

---

This remarkably handsome volume was donated to the Library in memory of the late Dr Ron Davison.

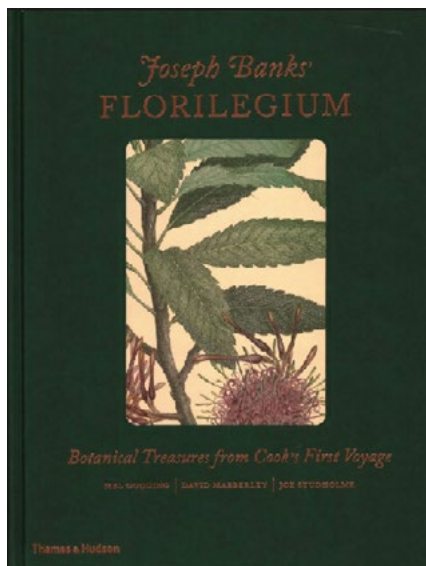
It contains illustrations of plants collected during Cook's first great voyage. The illustrations are based on sketches and paintings by Sydney Parkinson. Copper engravings were prepared in the late 18th century but not published in colour until about 30 years ago in the Alecto edition of *Banks' Florilegium*. That was a huge effort taking more than a decade: the printing of 743 plates, more than 86,000 individual impressions. The Botanic Gardens Library has two such prints from the Alecto edition: *Brachyglottis repanda*, presented by the Friends, and *Pteris macilenta*, presented by the late Miss Joan Dingley.

Te Papa and the Auckland War Memorial Museum have complete sets of the New Zealand plants, and the Alexander Turnbull the complete edition of all the plates of the Alecto edition. These are individually mounted and held in special archival boxes.

The new book, *Joseph Banks' Florilegium*, presents some of the plates in much more readily accessible form and at a much

more affordable price. It contains illustrations of 147 plants, about one fifth of the plates in the Alecto *Florilegium*, of which 38 are of New Zealand plants, likewise about one fifth of the original 183. The illustrations are printed on rich creamy paper at about three quarters of the size of the initial plates (when the plants were depicted life-size). The plates are annotated by David Mabberley and there is an account of the first printing as the Alecto *Banks Florilegium* by Joe Studholme.

*Joseph Banks' Florilegium* is a beautiful book and a deserved tribute to that wonderful botanical artist, Sydney Parkinson.



*Woodland Gardening: Landscaping with Rhododendrons, Magnolias & Camellias* by Kenneth Cox, Glendoick Publishing, 2018

.....

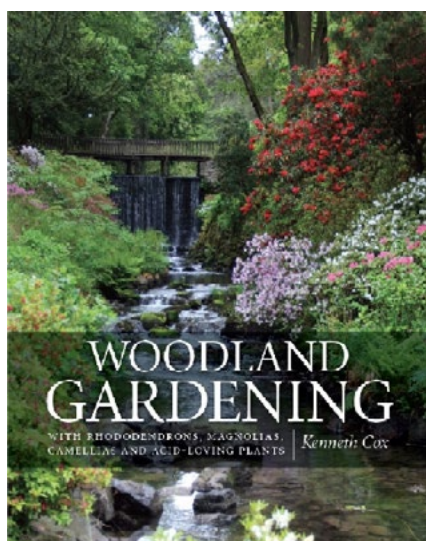
Kenneth Cox comes from a distinguished family of plant collectors. His grandfather, Euan Cox, knew personally many of the great collectors in China and went on the last trip of Reginald Farrer. His father, Peter, has made many collecting trips, especially to the Himalayas, and Kenneth himself has been on at least a dozen plant collecting trips. Grandfather, father and grandson have all written numerous books, and the family nursery, Glendoick, in Perth, Scotland is a Mecca for rhododendron lovers.

*Woodland Gardening* describes the history of woodland gardening and some of the great plant hunters. Cox next gives an account of some of the world's leading woodland

gardens (including Pukeiti and Maple Glen in Southland), covers design and maintenance, and then writes in detail of what he considers the best rhododendrons, camellias, hydrangeas and appropriate bulbs. The excellent photographs are mainly by his brother, Ray Cox.

Woodland gardens and most of the plants that Cox describes are better suited to cooler climates than Auckland's and local gardeners can only dream of many of the rhododendrons and *Meconopsis* species. Nevertheless, there is much to learn from this book or it can be enjoyed simply for the photographs. I particularly liked the chapter on my favourite plants, magnolias.

Ross Ferguson



# West to Waiuku - Friends spring bus trip

Saturday, 10 November

After a week or two of variable and not-very-pleasant weather, the Saturday of the Friends bus trip to four Waiuku gardens was sunny, bright and clear.

Our first stop was to Ngodevwa, the garden of David and Anthea Adams. Anthea explained that Ngodevwa meant 'Flowers of the Angels' in Tibetan. This is a two acre garden set in farmland. Large trees which have been planted by the Adams since their arrival in 1972 provide a backdrop and welcome shelter and shade. The gardens are a joyous and colourful mix of cottage garden plants, trees, shrubs and perennials with many exuberant roses adding colour and perfume. Meandering paths took us through the garden to the paddocks where Arabian horses grazed – one friendly mare enjoyed the attention of an admiring crowd – and past ponds and sculptures. A "Fairy House" hidden deep within the garden was a glitter of lights and decoration. David said that this had been a place intended for enjoying morning tea, but that there never seemed time to use it! Ngodevwa is a magical place – angels would certainly approve.

We then visited Park Farm, the garden of Mary and Brian Hull. The

farm has been in the Hull family for over 160 years and is currently farmed by the fourth generation of the family. Around the large villa-style farmhouse, Mary has created a serene space taking advantage of mature trees, with lawns and interesting and varied plantings, with evidence of some interesting and varied methods of deterring invasive rabbits! Mary has a particular interest in fuchsias and bromeliads – shade houses had fuchsias in various stages of growth and they were in evidence throughout the garden, as were bromeliads. A "colour wheel" of dahlias will be a cheerful riot later in the season. The garden looks out on to fertile rolling hills and bush – a lovely, green backdrop. Park Farm was our lunch stop and we enjoyed finding sheltered and tranquil spaces to sit and enjoy lunch and soak up the atmosphere of this relaxing and beautifully maintained garden.

Third on our itinerary was Bothwell Farm Garden, the garden of Jenny and Cyd Goodwright. The farm is at the end of a long drive, quite steep in parts, and we were not altogether sure where we would finish up, but thanks to our intrepid driver we arrived at the gates of the farmhouse and were welcomed by Jenny. The entry to the garden is through a largely native area into a small orchard and vegetable garden,





beautifully scented by citrus blossom. A cottagey area along the side of the house leads past a swimming pool onto a large open lawn, bounded by a carefully maintained *Photinia* hedge and leading down to a pond with a little jetty and dinghy, fountain and waterwheel. There is a gazebo at one end of the pond – a quiet sitting place surrounded by flowering flaxes and other, mainly native, planting. A large bed of Mutabilis roses and cottage plants breaks up the lawn space and the border leading up to the other side of the house has many interesting and unusual plants including a huge *Xeronema* with dark, dark red flowers. This is another serene and tranquil garden, carefully designed and beautifully maintained by Jenny pretty much singlehandedly!

Our final stop was at Ardojalo, the garden of Jan and Arthur Withers. Enjoyment of this garden starts as you approach along the road – the roadside is a blaze of colour – and

the driveway in is through borders of perennials, shrubs, including scented *Philadelphus*, and roses. Jan had thoughtfully provided hot water for tea and coffee and cold drinks. We took our drinks and headed off into the garden – again a garden of surprises. Winding paths led through a jungle of natives, ferns, palms, bromeliads and other shade-loving plants past a dry pond – evidently it is full from May to October with winter rain, but dry at this time of the year. The paths lead finally to a large open lawn with colourful cottage borders and back to the house. Interesting stone walls and rock work built by Arthur are a special feature of the garden. They are made from flat slabs of slag, a by-product of the Glenbrook Steelworks manufacturing process.

All four gardens were full of variety and surprises, and while there were some common elements they were different enough from each other to provide a day of interest. Thanks to our hosts who so willingly shared



their gardens and their knowledge with us.

After twelve years of organising the Friends Bus Trips I am stepping aside. I feel it is time for fresh ideas and Kate Moodie has volunteered to take over from here. Over that time I have met many Friends who have been regulars on the trips and many who come along from time-to-time when there have been visits

of special interest. I have also met many dedicated, enthusiastic and skilled gardeners who have warmly welcomed our groups to their slices of paradise and have learned so much from their willingness to share – gardeners are very special people and I'd like to offer my sincere thanks to those of you who have come on the trips and to those who have opened their gardens to us.

Liz Powell

Photographs: Heather Hine



### **Fuchsia Show**

Friends member, Mary Hull from Park Farm is involved with the Fuchsia Society. The Franklin Fuchsia Show will be held on 18 and 19 January, 2019 in the Waiuku Civic Centre, King Street.

Ph 027 287 268  
for further  
information.



Winning photograph in the The Friends Photography Competition Adult Supreme Award and the People's Choice Award, 'Bud' by Jiongxin Peng. © J.X. Peng.