

Featuring: *Glow Worm tour dates*
Guide and Botanic Gardener Profiles
Neighbourhood Living Fossil

SPECIAL EVENT

*On Thursday 3 March 2005 The Friends
will host a special event to celebrate
the registration of the Wellington
Botanic Garden as a "Historic Area".*

*The Mayor of Wellington and the Chief Executive of the
Historic Places Trust will attend to mark the occasion.*

Place: The Begonia House

Date : Thursday 3 March

Time : 5.30 to 8.00 pm

All Members are invited.

There will be an entry charge of \$5.

*Also in this issue – the Friends' Annual Bulb Sale
A not-to-be-missed, exclusive opportunity
to enhance your spring garden.*

FROM THE PRESIDENT...

Dear Members and Friends

In 2005 we will be marking the decision of the New Zealand Historic Places Trust to register the Botanic Garden as a "Historic Area". This was the culmination of sustained effort by members and deserves our recognition in suitable ways.

Our first event will be a celebration of the registration. It will take place at the Begonia House on Thursday 3 March commencing at 5.30pm. The Mayor of Wellington, Kerry Prendergast, will attend to receive plaques from the Chief Executive of the Historic Places Trust, Dr Bill Tramosch. We will be inviting as our guests people who were involved in the registration process and with heritage issues, together with representatives of interested

organizations and current and former senior Garden staff.

The 3 March gathering will provide the opportunity also for details of the 2005 programme to be presented to you; for bulb orders to be taken; and a drive for new members to be launched. **This will be a very special occasion for the Friends and we hope many members will attend.**

The annual programme of guided walks is already under way. Members are encouraged to participate, and to bring these walks to the attention of others.

I look forward to seeing you all on 3 March.

Ted Woodfield

MORE FOR YOUR MONEY

Friends are urged to support the retail outlets in the Garden. To encourage you, discounts are available to members at the Rose Garden Café and the shops in the Begonia House and the Treehouse.

Shopping

The shops have a fine range of New Zealand gifts – books, cards, practical garden products and accessories.

A discount of 10 per cent is available on all goods. A current Membership card, or Life Members card, must be shown.

Cafe

Eurest, the Managers of the Café in the Rose Garden, offer to members a 10 per cent discount on food, including ice cream,

except for items that are subject to another promotional offer.

The discount does **not** apply to coffee. A "loyalty card" covering coffee is available on request.

The discount is available at all times, except for Public Holidays, from 1 February 2005 to 30 June 2006.

A current Friends membership card, or Life Members card, must be shown. The management reserves the right to refuse a discount.

Members are asked to remember that these discounts are a privilege, not a right. We are very grateful to the management of the outlets for their generous offers.

BOTANIC BULLETIN

Great news for the Botanic Garden – the Garden has been accepted as a ‘Garden of National Significance’ by the New Zealand Gardens Trust. Not only does this underpin the ‘specialness’ of the Botanic Garden, but recognises the contribution that the staff and Friends make to the garden. Alongside the Historic Places Trust endorsement the Botanic Garden can certainly stand proud!

The initial results have come back from the DNA analysis of the pines. The trace back to the Californian parentage was unable to be made, as the DNA database in NZ for *Pinus radiata* is not large enough. However I am hoping that in the process we may have opened up some new doors which will give us access to US DNA data bases and allow confirmation or otherwise of the final link. Testing also raised the possibility that one of the key production breeding trees in NZ forestry is consistent with being an offspring of one of the BG trees. Though this cannot be accurately confirmed without an extended testing programme, it is a potentially significant result, not only in historic terms, but also commercially. Further notes in the report indicate that there were 26 breeding trees which had matches from the 130yr + trees from the Garden.

The collection review has finally been completed, with the document now being edited and formatted for printing. It includes the modified action plans, after staff and Friends submissions, and a 5 year action plan. This will point the way to the future of the garden, alongside the Management and Landscape plans.

As I write, tenders are being called for the construction of the Rose Garden – Bolton Street Memorial Park Walkway. A considerably scaled down version of earlier proposals, it will still permit safe and unhindered pedestrian access to and from the Garden via the Kinross Street Entrance. It is anticipated that the work will commence in May after the tourist season had finished. A number of small projects continue around the garden, including the placement of a seat at the entrance to the Treehouse which will become the supporting structure for a *Muhlenbeckia* topiary seat. This will

eventually be incorporated into the revised and extended Threatened Species garden

While on holiday I visited the Eastwood Hill Arboretum. I was hugely impressed and would recommend making a trip to visit it. Even though it was summer, it was great to see old (and vertical) established deciduous trees and conifers which obviously thrive in this location. Like us there are lots of hills and winding paths which have magnificent lookout points. I was pleasantly surprised at the condition of the arboretum. A lot of work has been done there over the last few years in maintaining and recovering the existing plantings and in the development of new plantings. It is a great tribute to the staff and the Trust. There is no doubt that there must be closer relationships not only with the other mainstream Botanic Gardens but also with the likes of Eastwood Hill where there are such different yet complementary growing environments to our own.

The Summer City evening concerts in the Soundshell have been a big success this year with good attendances and most viewing the upgraded lighting show afterwards. These have been good family events which encourage visitors to the garden.

Recently a large beech was removed from the ferns in Stable gully. This had been showing external signs of significant decay through one of the main stems which indicated that its removal would be prudent. This has left a much more open fernery in which Kate will plant more tree ferns to reinstate the shelter which has been removed.

Our new curator for Alpine and Theme, Nikki Woolford, began work in December. Nikki came to us from the City Gardens crew. Apprentice Tim Harness will complete his time while working as the gardener at the Cable Car mess and will then take up the position on a permanent basis.

I hope you were all able to enjoy families and holidays at Christmas! Best wishes for the New Year

David Sole
Manager, Wellington Botanic Garden

Profile of a Gardener – Jenny Hickman Botanic Garden Volunteer Guide

What makes a person dedicated enough to guide others round the delights of our Botanic Garden – year after year, month after month and in all weather?

In Jenny Hickman's case, it might almost be a matter of happenstance. She grew up on a Southland farm which had fifteen acres of native bush on it. Her mother and grandmother were great gardeners, but Jenny was originally more interested in birds. Of course, birds live in the bush, and you can't help but wonder about the trees they perch in. Her grandfather had a 1908 edition of Laing and Blackwell's 'Plants of New Zealand', "and if we didn't know what something was, we looked it up," she says. A child's curiosity took her further along the botanist's path. Nature "was all around us," she says. From her schoolroom window she was able to observe natural phenomena – "you'd notice that larch trees lose their leaves and spruce don't," she says, so wondering about that led to an understanding of deciduous versus evergreen. Or she'd see black blobs on leaves, take them inside and "lo and behold, they hatched into tiny ladybirds."

Age twelve saw her at boarding school in Dunedin, where her main interests were sports – netball, hockey, cricket, life-saving, tennis, "a bit of everything." If that wasn't enough she also enjoyed athletics and gymnastics and claims to have been "not particularly good at any, but I enjoyed them all." In the seventh form she studied biology and had the "inevitable plant collection." She would rather have studied languages at this point, but the curriculum choices didn't allow that, since she was, at the time, taking subjects pertinent to a future medical career. Her biology teacher suggested she take botany, so that was duly added to her physics, chemistry and zoology studies.

At Otago University, working on a science degree, but with a medical career still in mind, she found a couple of subjects to be a bit of a struggle. "I loved organic chemistry," she says, "but not physical chemistry, for example thermodynamics." The next year she tried botany and microbiology and thoroughly enjoyed them both. She feels that "a lot of it is chance as to what decision you make."



Replacing chemistry with botany determined her future career and hobby, although, of course, she wasn't to know that then. After gaining her BSc., the botany department asked her to come back and do an Honours degree, so she did genetics and ecology papers.

The following year she undertook a thesis for a MSc., "and set a record at the time, by completing it in one year," she says. Despite the daunting title, 'Some Physiological and Hydrological Effects of Burning and Grazing Narrow-Leaved Tussock Grassland', her thesis was very interesting and moreover, provided useful information for agriculture. Early runholders were only allowed ten-year leases on snow tussock land, so they tended not to look at the long-term health of the land. They burnt tussock to cause fresh regrowth for sheep to feed on. Continual burning and no feeding causes degradation of the tussock, the removal of litter between plants and, eventually, erosion. "When you burn snow tussock they flower the next year", she says, "weakening them even more." This is because the plants normally flower after hot summers - the blackened crowns of burnt tussocks absorb more heat, initiating flowering in years they wouldn't otherwise bloom.

Jenny saw other interesting facts emerge - for the hydrology aspect she measured not only rainfall, but what came out the bottom of

the plants - intact, clipped or burnt. More water came out of the intact plants. Further experiments to find out why revealed that the leaves can condense moisture out of fog (California redwoods do the same thing with sea fog, thus surviving periods of drought), so the more leaf area, the more water goes into the soil.

The project, set up in the Rock and Pillar Range in Central Otago, had more benefits for Jenny – she had to learn to drive up a hairpin-bend mountain road, and how to put chains on a Landrover. She worked from a tiny timber hut which was guy-wired down, the winds were so strong, and for safety reasons never worked alone. She had a series of very obliging friends and flatmates who kept her company while she monitored tussock temperatures, sometimes overnight.

Soon after her thesis was completed she landed a job with the Plant Physiology Division at the DSIR in Palmerston North. She'd fortuitously seen a note on Otago University's Botany Department noticeboard asking for someone to work on a photosynthesis rates study. "I believe in not pushing things," she says. "You can fall into things, but you've got to be ready to grab the opportunity when it comes." Fall into it – and grab it - she did. She worked there for three and a half years, then took a leave of absence to be a research assistant at Simon Fraser University on Burnaby Mountain, near Vancouver, in British Columbia.

While in Canada, she worked in the photosynthesis field, as well as going on a plant collecting trip through the Rocky Mountains, all the way down to Arizona and New Mexico! "I fell on my feet," she says, in something of an understatement. Studying alpine *Ranunculus*, she often worked at altitudes between 6,000 and 12,000 feet. An enduring memory is of seeing monarch butterflies, en masse, flying north and stopping to drink from the snow on the slopes of Mt Shasta. "One of those very special things," she says.

Three months of OE in Britain and Europe followed, after which she returned to the DSIR, working on cold tolerance in tropical grasses and the growing of them in Northland. To aid agriculture in the far north, they were trying to find grasses which could grow with less moisture. Another interesting

fact from Jenny's seemingly bottomless botanical knowledge emerges at this point – tropical grasses actually undergo a different sort of photosynthesis from your common fescues and browntops.

So how did she end up here? Her husband Bob worked in Wellington and until the first of their two children was born, Jenny's Wellington career was as assistant editor with the DSIR Journals. Jenny chose to not work while raising her children, but managed to fit in lots of community things, from organising school science experiments to collecting for the Red Cross.

When the children left home Jenny, looking for something to do, applied to become a Botanic Garden Guide after seeing an ad. The role seemed perfect for her, encompassing the two things she liked to do best: working with plants and talking to people. Typically, she found learning about all the plants in the Garden fascinating. Rob Bos, convener at the time, and a good spotter and nurturer of talent, told Jenny he thought she'd make a good convener. A year later she agreed to take over the role from him. The Guides Convener organises everything, basically; prearranged group tours, monthly walks and rostering guides during the cruise-ship season. Jenny says that Rob set a high standard to live up to. She also works part time in the Botanic Gardens shop and says she is very lucky that Phil Tomlinson has taken over a lot of the guide and walk organising.

She also attends the biennial Australasian Volunteer Guides conferences. She relishes the chance to meet guides from other Gardens and see how they do their tours, along with the chance to see Australian gardens and vegetation. "Australian plants are fascinating," she says, loving the chance to spend time with the collection in our own Botanic Garden.

You might expect that the home garden of a person who is interested in so many plants might be a little... undisciplined. Jenny and husband Bob's garden is anything but – beautifully landscaped and well-behaved, it features swathes of the sort of plants that do well in the local soil and climate. It is peaceful, restful and a delight to be in. "And I rush out and pull out a weed when I get the odd spare moment," she says.

Glowworm Tours 2005

Enjoy a visit to these fascinating insects. Get close and see them in detail. Learn about their life story and the place of the Wellington Botanic Garden in their formal identification and naming. Walk the paths and see the stars!

Please note:

The tours are not suitable for children under 6

Children under 10 must be accompanied by an adult – a maximum of 2 children per adult.

All visitors must provide a torch – a minimum of one torch per two people

Reasonable mobility is required, and good walking shoes should be worn.

On average tours take around 1¼ hours.

Tours are free but a donation appreciated (\$3 to \$5 per adult \$2 per child suggested)

Start and finish at the Founders Entrance

Tours will be run on the following dates:

Friday 11th March 8pm
Friday 8th April 8 pm
Friday 6th May 8 pm
Friday 3rd June 7.30 pm
Friday 8th July 7.30 pm
Friday 5th August 7.30
Friday 2nd September 8 pm
Friday 7th October 8.30 pm

Tours should be booked if possible to ensure sufficient guides are available.

Special tours can be run on demand with larger groups (say 10 people plus). Please advise Phil Tomlinson (phone 475 8765, 14 Putnam Street Northland) 7-10 days before tour so a guide can be arranged. 2-3 days before tour send booking form with contact numbers so guide can confirm bookings with those involved.

Profile of a Gardener – Peter Tijssen

*Next time you marvel at how green and lush Wellington's looking or stroll through the Botanic Garden, you can thank Peter Tijssen for at least some of it, says **Bethney McLennan***

In January Peter completed forty years with the Council's Parks and Reserves Department and in that time he has raised trees, designed garden displays, trained apprentices and propagated exotic rarities for the garden's plant collections.

As a lad at Matipu Primary in Taranaki Peter won prizes for his efforts in the school's gardening training schemes and when he came home from school, he carried on gardening. "We were a large family - I had four brothers and three sisters - and we all

had our jobs to do. I did the vegetable garden because that was important when you live in a paddock in the outbacks of Taranaki and Mum was always working hard looking after us and making sure we were well fed and clothed. She had no time to do gardening and I probably worked on flower gardens then to give her a bit of pleasure," Peter says. The family moved to Wellington when Peter was about 13 and gardening for friends and neighbours became the source of pocket money.

An interview with then Parks Director, Eddie Hutt, won him a five-year, 10,000-hour apprenticeship, later reduced to 9000 hours and further shortened to four years by Peter taking on overtime. Early each morning Peter would be picked up by truck and taken to the tree and shrub nursery at Makara. "Makara can be cold and bleak in a southerly - sometimes you were working in water - but you learnt a lot about balling trees and shrubs. You'd get a square of scrim and you'd fold it in such a way that it encased the whole rootball and tied it up. They'd actually plant it that way because it rotted," Peter says.

Later Peter transferred to the Botanic Garden and the Begonia House before moving up to the nursery where the foreman at the time was Donal Duthie, a well-known and dedicated plantsman whose enthusiasm was quickly passed on. "He really taught me so much about propagation and working with plantspeople rather than just gardeners you get to learn your plants more. He was a real plantsman. If he didn't have it he had to have it. You were always looking for new plants to add to our collections. "I remember when we built up the rhododendron collection, we went all over the place - to Mary Seddon and her father's garden. She would go off to rhododendron conferences and bring back the scraps and we would try to grow them.

"The sad thing about today is that there doesn't seem to be many plantspeople around; there are plenty of people that like doing the physical but I think you need to be a little different, a little special, to get involved with plants," Peter says.

Increasing the number of species and cultivars in the garden has been a highlight of Peter's career. "I'd like to think that's one area where I have made a difference. A lot of people can't or don't have the opportunity to grow the plants that we grow here and I think it's important for a botanic garden to show what can be done with plants, We are an educational facility and people come here to look and learn and to relax." Peter says.

Peter became the garden's propagator and later nursery foreman after his apprenticeship, but there were other interesting challenges including bedding design and decorations for grand events such as Royal visits. On one occasion Peter was asked by the Duke of Edinburgh why the nursery staff were growing

a mix of exotic and native plants and not just all natives. "I said, 'But how can we see your natives if we don't grow some here. A lot of people don't get the opportunity to travel.'"

Peter is currently working on a database which will record all the plants in the Botanic Garden. "Previously records have been stored as documents, such as invoices and staff records. Purchases and planting up new areas were always recorded for future study. You have to check the names - nurseries often sell things with commercial names which can be different from botanical names. With plants that have been here for some time you have to work out when they were planted or where they were sourced from and where they might have gone and they're all going to be numbered." Peter has become so enthusiastic about the database he began one for his home garden.

"When I get home I enjoy gardening. Nursery work is quite different from planting and weeding and pruning and propagating - I like to grow exhibition daffodils and that keeps me busy from about February through to September but they look after themselves the rest of the time. And I enjoy my family. My sons are both involved in water polo and I get a lot of enjoyment out of that.

As well as a career he loves, Peter's apprenticeship introduced him to his wife Christine, who began her apprenticeship in 1968 and later transferred to the Park's Office where she worked till 2003.

Unlike many of us who complete the paperwork and the job's done, Peter and thousands of others can reap the rewards of his labour for years to come. Take the avenue of *Michelia doltsopa* trees in Roy St in Newtown. "We grew them here. They said they would flower in seven years but I think we got the first ones flowering in four years. And the golden elms along Kent Terrace are special to me: I was involved with the formative structure of the trees and I learnt a lot in those days about trees."

"I'm still learning, I hope I'll learn more and I hope I'll be able to pass it on to someone else," Peter says.

Bethney's profile of Peter was first published in the Dominion Post

Wollemi pine – Living Fossil

Ten years ago a living example of a relative of our kauri that began life 120 million years ago was discovered in Australia. **Rod Bialeski** tells the fascinating story of this hugely important discovery.

The story of the Wollemi pine (*Wollemia nobilis*) really began with its discovery in fossil form. There were macrofossils which came from the Lower Cretaceous (Koonwarra beds) some 120 million years ago and which clearly belonged in the Araucariaceae, showing an overlap of *Agathis* (e.g. kauri) and *Araucaria* (e.g. Norfolk Island pine) characters. Sadly for the authors of that study, though they gave photographs and accurate drawings of this interesting find in their 1985 research paper, they did not give the fossil plant a name, thus missing out on establishing the scientific name of what we now call *Wollemia*. There were also microfossils, pollen grains of a mystery genus (given the name *Dilwynites granulatus*) that were being repeatedly found, from 1963 onwards, by geologists carrying out studies to find oil deposits in Australia. *Dilwynites* was a persistent beast. It was found in rocks through parts of the former Gondwana from the Northern Territory into Antarctica and New Zealand. The earliest discoveries dated back to 91 million years ago, when the flowering plants were starting to evolve, while the most recent were only 2 million years old. Initially it was thought to be a member of the laurel family, but its true identity was only really established when living pollen that matched it was found.

Which takes us to the next part of the story. No one had imagined that the plant species giving rise to those fossils might be still alive today, until in October 1994, exactly 10 years ago, a National Parks and Wildlife Service forestry officer, David Noble, came back from exploring a deep canyon in the Wollemi National Park (about 150 km northwest of Sydney) with a small amount of plant material he recognised as being very unusual. Initially the discovery was kept very quiet, in the offices of the National Parks and Wildlife Service. The first response of the botanists there was that it looked like a fern, but Noble called it “a bloody big tree” which seemed wrong even for the lustiest of tree ferns. Whatever it was, it was something that none of them had seen before. On a revisit to the site, cones were seen which pretty much established it as a conifer, with the Araucariaceae immediately coming to mind; but if it was a member of that family, it did not

remotely match any of the known species. They came to the conclusion that it would have to be the only member of a new genus in the Araucariaceae. At this point, with a draft research paper in hand, the material was taken in to botanists at the Royal Sydney Botanic Gardens where the staff, particularly the Director, had some knowledge of the fossils described above and an extensive knowledge of the Araucariaceae as a plant family.



It is fair to say that at this stage some quiet power struggles developed. The NWPS people felt that they had found the new plant, that it was their baby. The RSBG people felt that the level of botanical input required for such a fascinating plant could only be supplied from their organisation. The Director of the Gardens (Carrick Chambers, a New Zealander and an Auckland University graduate) did a lot to ease the tensions. Just as importantly, as an author of the original 1985 paper on the araucarian leaf fossils, he took samples of the plant material back to the Koonwarra material held in Melbourne, and confirmed his initial impression that the new species was the spitting image of his 120 million year old material. He was probably the first person (but not the last) to publicly describe what they had in their hands as the plant equivalent of a living dinosaur. It was

just a few weeks later that the happenstance visit of a palynologist led to his seeing the material and to his request to examine the pollen of the new plant. When he placed the pollen under the microscope back at home, he had the “eureka” experience: he was looking at living *Dilwynites* pollen, and at last the true nature of that mystery pollen was known. Here was confirmatory evidence of the developing view that this plant was a living fossil, and it further said that the new plant and its relatives had, back in the time when flowering plants were just evolving, been a major feature of the vegetation over a very wide region of the fracturing Gondwana continent. From that time, what had been a major event for a few botanists became a major event for the world.

It became clear that tight management of the situation would be required. There were only about 100 plants in one population, and about 30 in a second group that was later found further along the canyon. There were two extreme threats to the plants. The first was the well-known penchant for so-called “plant lovers” to collect a rare plant to extinction (as has happened with a few orchids). The second was the clear fragility of the population both to physical disturbance of people clambering around the site, and to the introduction of pathogenic organisms. It was decided to keep the location totally secret, and to set up a management protocol that strictly limited access to the plants. A major effort was put into bringing out material of this fascinating plant, now formally named *Wollemia* and informally as “the Wollemi pine” so that it could be propagated for intensive study without having to involve the wild population. Fortunately, tissue culture and propagation of cuttings both worked well, while eventually viable seeds were recovered for their ready germination. The very first finding was probably the most important: the young plants are very susceptible to soil pathogens, particularly *Phytophthora cinnamomi*, validating the need to keep entry to the native populations to a minimum, and to introduce a regime for having clean clothing and washing shoes before entering the nursery areas where the research plants are being grown.

The nine or so years that have passed since plantlets first came to hand have been very productive. Rightly or wrongly (I believe rightly) the decision was made to not make any propagating material available to the

public in any way, to avoid a plant trading fever such as happened during “tulipomania” in Europe of the 17th century. The few trees that have been allowed to be planted in public venues are there under a strict non-propagation agreement and are held in cages to prevent sticky fingers wandering off with material. All propagation is restricted to the controlled areas of the Mt. Annan Botanic Gardens where research is being carried out, and to those of the Queensland Department of Primary Industries and a nursery called “Birkdale” where commercial propagation is in hand. The intention is to build up stocks to around 150,000 plants for release to the public (and nurserymen) this year, and this project is on target. The reason for the delay is entirely a commercial one, in that the research to this stage has been hugely expensive, and this process allows the Botanic Gardens both a way of recouping expenses and providing for orderly marketing. It doesn’t do any harm for maintaining the huge public interest in this biological treasure, either.

Last year Val and I were fortunate enough to be able to visit the research area at Mt. Annan Botanic Gardens, and to meet the two main scientists responsible for the Wollemi pine work, Cathy Offord and Patricia Meagher. We were able to form some very clear impressions of what the plants are like. The first one is that the very slow growth rate of plants in the wild is not repeated in the nursery: these can be very vigorous plants, not to be planted unthinkingly in a small garden. The second is that they are very attractive, so that they would merit planting even without the tag of “dinosaur plant” attached to them. The third is that they can be very plastic in form, giving many options for the ways they might be grown. For example, if cuttings for propagation are taken from the side branches of a developed tree, they are plagiotropic, meaning that they will grow out to form a sprawling and rather slow-growing plant, suitable for bonsai work and even for a large hanging basket (for a few years anyway). In cultivation, plants have a relatively small root mass, making them suitable for being grown in pots. They coppice very readily if cut down near soil level, and could quite seriously be considered for use as a windbreak hedge, much in the way *Cryptomeria* is used in our kiwifruit country. And it’s perhaps rather shameful to say it, but three year old plants look as if they would

form the most handsome of Christmas trees (with the advantage to the grower that cutting the trees for sale will merely start up the coppicing mechanism to give a new crop).

For us it was a thrill to see the range of material that was there, and to see some of the oldest plants of Wollemi pine existing in cultivation, without having to peer through a mesh, and to shake hands with them. A particular joy was to see, on one of their most mature plants, what I believe are the first male and female cones that have been produced together on a plant growing in cultivation. We can look forward, in a couple of years, to seeing a supply of seeds as well as vegetative material coming on stream. It will sure as hell beat the present collection mechanism of hanging by a harness and cable from a helicopter hovering over the mature trees on the edge of a canyon in the wild.



Male and female cones

As a last couple of thoughts, the names have their own interest. “*Wollemia*” is of course named for the Wollemi Park, derived in turn from the Aborigine name for the rugged area, meaning “look around you” or perhaps “watch

your step”. The story of the discovery of the original trees makes it very clear that it is a very apt name for the area. And there is an element of double meaning in the second name, for though it is in fact named for the discoverer, David Noble, it could equally be applied to a species that totally deserves the description of “noble”. And as a final matter of interest: though it is improbable, it is definitely not impossible that there is a small population of *Wollemia* lurking here in New Zealand. The genus had already evolved before NZ was split by continental drift from the Australian land mass, and fossil pollen of *Dilwynites* is found in NZ rocks, so our land did support *Wollemia* during its early history. Though the botany of NZ is much better known than that of Australia, not every canyon and deep valley has yet seen the feet of botanists, and it is easy to not see something when you are sweating away pushing through enveloping bush. I have my own experience of finding an isolated population of *Metrosideros parkinsonii* in a remote place on Little Barrier Island to remind me that we still have unseen plant populations waiting to be found. If it was here in NZ, where would it be? Given the distribution of its kissing-cousin the kauri, its ecological preferences and the topography of the country, I would plump for valleys on the north-eastern side of Little Barrier, or the remote parts of the Coromandel. So go to it, plant hunters!

Thanks to Rod Bieleski for his kind permission to reprint his article, which first appeared in the journal of the Friends of the Auckland Regional Botanic Gardens

BULB SALE

Once again the Friends are able to order spring bulbs in collaboration with the Botanic Garden. Very popular last year were tulips ‘Spring Green’ and ‘Silverstream’. These have been reordered, but don’t risk missing out – be in quick. Other tulips on order are ‘Ile de France’, which is the best weatherproof red (well, almost weatherproof). Much admired during Tulip Weekend was ‘Abu Hassan’ (cover-boy for our last newsletter).

Also on the list are some smaller-flowered species tulips, which are suitable for pots or for naturalising in your garden.

Last year’s daffodil supplier has closed down, but we have been investigating other options.

Tulips and crocuses, from van Eeden, are still available in good numbers.

All profits go towards enhancing the Garden – last year’s funds went into the James Hector Memorial.

So grab your order form (with this newsletter) and start choosing *now*.

Coming Events

February 20

GW

"Insects, Birds and Plants" - a walk that looks at insects and birds and their relationship to the plants, both endemic and exotic. Moderate walk: one hour.

March 3 (Thu)

5.30pm

Friends' Special Event - The Begonia House

Stepping Out Walks in March (Walks marked * are Herb Awareness Week Walks as well):

Monday March 7, 10am

"Barking Up the Wrong Tree- Garden Trails and Tree Tales" Join the Friends of Wellington Botanic Garden for a walk and discover figs, pinenuts, tea, cork and various trees with interesting and unusual bark. Moderate walk: 1½ hours. Walking shoes recommended. *Meet at the Cable Car Entrance.*

Thursday March 10, 10am.

"Botanic Garden Sculpture Walk" - a tour of the sculptures in the Garden. Moderate walk: 1¼ hours. Walking shoes recommended. *Meet at the Rose Garden Fountain.*

*** Sunday 13 March, 10am**

"The Herb Garden" - a guided tour of the Herb Garden, looking at fragrant, medicinal, culinary and domestic herbs and their uses. Little walking involved: one hour. *Meet at the Rose Garden Fountain.*

*** Monday 14 March, 10am**

"Herbal Use of Trees" - discover that the leaves, bark, wood and resin of many trees have herbal uses. Light walking involved: 1½ hours. *Meet at the Duck Pond.*

March 20

GW

"The Botanic Garden Native Forest" - a tour of the forested areas of the Botanic Garden, looking at their history, structure and profile, and how they still give us a picture of the original lowland forest of the Wellington area. Moderate walk: 1½ hours.

Monday 21 March 10am

"Botanic Garden Plaques" - a tour of the Garden's plaques, which are tucked away in various corners of the Garden. Moderate walk: 1½ hours. Meet at the Founders' Entrance, Glenmore Street.

17 April

GW

"Amazing Aussies" - a tour of the fascinating Australian plants in the Garden, and discover their adaptations to the Australian climate and their traditional uses. Moderate walk: 1½ hours. *Meet at the Cable Car Entrance.*

15 May

GW

"The Hector Memorial, pines and the Pinetum" Visit the recently built memorial to Sir James Hector and discover the history of the Pinetum and the fascinating story of the pines and the part the Garden played in the introduction of these important trees into New Zealand. Moderate walk: 1½ hours. *Meet at the Duck Pond.*

Sunday 12 June – Friends Winter Seminar

Details to be announced

19 June

GW

"Ancient Tree Trail" - Trees with ancestry dating back to the Jurassic, when dinosaurs wandered the Earth. Moderate walk: 1½ hours. *Meet at the Cable Car Entrance.*

Sunday 10 July - Friends Winter Seminar

Details to be announced

17 July

GW

"Our Winter Garden" - a look at the Victorian influence on glasshouses, with a tour of the Begonia House. Little walking involved: one hour. *Meet in the Foyer of the Begonia House.*

GW = Guided walks, held on the third Sunday of the month at 11am. Unless stated otherwise, the walks begin at the Founders' Entrance, Glenmore Street. If it is wet there will be a talk at the Treehouse Visitor Centre instead.