WPSQ Bayside Branch

Newsletter | March 2022



Growing native food using seawater and solar power

Systems engineer Terry Sullavan will tell us about a project he worked on in South Australia which uses concentrated solar power to farm in the desert.

Sundrop Farms has developed a unique concept of growing high value crops in arid climates using seawater and sunlight as the main resources. The success of their pilot plant encouraged a larger application of the technology, expanding to 20 hectares producing over 17,000 tonnes of fresh tomatoes annually- 15% of Australia's tomato market, plus a savings of 400,000 tons CO2 over 25 years!

Come along and find out how on earth this is even possible.

Is there anything in this that we can adapt and apply to our own backyard gardening?

When: Friday 25th March 2022 at 7.00 pm Where: Alexandra Hills Community Hall,

131-155 Finucane Road, near "Aldi". Entry & car parking just around corner in

Windemere Road.

Please <u>click here</u> to register for event, limited to 50 attendees.

For more information phone Steve 0423 036 676 or email bayside@wildlife.org.au

In this edition

- 2 Presidents Report
- 4 ENSO update ALA wants your data
- 5 Creek bank protection
- 7 Biodiversity Flying foxes
- 8 Books to read
- 9 AGM
- 10 Wildlife Diary
- 11 Social Networks
- 12 Contacts, Links and Membership Form

President's Report

Bayside Branch | March 2022

Well, we had been warned of La Nina instability; Queensland extreme weather events have never ceased to amaze me, although this one with the volume of rain that fell last weekend was quite extraordinary. Unfortunately, we had to cancel our first meeting of the year, we will bring Martin Fingland back, maybe in June. The threat of inclement weather and the closure of sites by Clean up Australia meant that our event last Sunday was low key and without the participation of the Mount Cotton scouts. We did however collect several bags of rubbish and more containers for recycling, thanks to all those who came along.

Much of our local fauna and flora environment will prosper from this rain event as there has been an explosion in the frog and insect population replenishing the food chain. I hope these deluges have not affected you too much, the return of better weather and the easing of Covid restrictions will soon enable life to return to some normality.

Our AGM will be held on Friday 27th May in conjunction with our general meeting with a speaker on Native Bees. We do need an injection of new committee members with their ideas, so if you are interested in nominating for positions on the committee, not an onerous task, or sending in a proxy, there are forms in the Newsletter. We would like as many members to attend the AGM in person so we can achieve a quorum, so please put that date in your diary straightaway.

Redland City Council among many councils has received a grant from the state government to draft a Redlands Coast Flying-fox plan to understand how it may be able to reduce the impact flying-foxes have on Redlands Coast communities and have asked for community input by 13th March.

https://yoursay.redland.qld.gov.au/flying-fox-plan



Dangerous way to hitch a lift.

Credit: TikTok / @Carleen2332



Loving the rain, not moving from here



Calling but no response

Redland City Council among many councils has received a grant from the state government to draft a Redlands Coast Flying-fox plan to understand how it may be able to reduce the impact flying-foxes have on Redlands Coast communities and have asked for community input by 13th March. As we all know Flying-foxes play an important role in dispersing seeds and pollinating flowering plants and are crucial to keeping native forests healthy. In turn, native forests provide valuable timber, act as carbon sinks, and stabilise river systems and water catchments, and provide recreational and tourism opportunities worth millions of dollars each year. It seems indefensible in this time of climate change that governments are considering measures to harass flying foxes and their roosts which are "protected" under QLD Conservation laws.

Bats are an important part of the food chain consuming enormous of insects, pollinating our forests and crops, an integral part of ecosystem services, they should not be persecuted but completely protected.

https://yoursay.redland.qld.gov.au/flying-fox-plan

Terry Sullavan, talking about growing food using seawater and solar power, will be our speaker on Friday 25th March 7.00 pm at our <u>new venue Alexandra Hills Community Hall</u>. With the easing of restrictions, this first meeting will be a chance to catch up with friends and here about a very innovative project.

See you there

"Rain is not only drops of water. It's the love of the sky for earth. They never meet each other but it sends love this way." Unknown



Steve, Enjoying the clean up



Interesting find at Clean up



Less rubbish in our wetlands

ENSO outlook



http://www.bom.gov.au/climate/enso/outlook/

The ENSO Outlook remains at LA NIÑA, with most atmospheric and oceanic indicators persisting at La Niña levels.

Latest oceanic observations, along with most model outlooks, suggest this La Niña event is past its peak, with a return to neutral El Niño—Southern Oscillation (ENSO) forecast around the middle of the southern hemisphere autumn. This is consistent with the typical ENSO event life cycle.

Bureau climatologists will continue to closely monitor conditions in the tropical Pacific as well as model outlooks as this La Niña event evolves.

The ALA Australian Biodiversity Data Mobilisation Program

Do you work in an institution with historic biodiversity data? Our new grant program is designed to help you digitise, mobilise and share your biodiversity data via the Atlas of Living Australia.

The ALA Australian Biodiversity Data Mobilisation Program is a grant program to support people and institutions make their biodiversity data more accessible.

Making your data open and accessible makes it more valuable. FAIR data – findable, accessible, interoperable, reusable – can be shared with other researchers and people working in biodiversity policy.

High quality and accessible biodiversity data helps conservation efforts and informs decision-making and solutions for environmental challenges.

We know that organising, standardising, and digitising data takes time and effort. The ALA Australian Biodiversity Data Mobilisation Program is here to help. The grant program will award small (up to \$20k) and large (up to \$50k) grants to biodiversity data owners to support purchasing equipment (e.g. camera, scanner) or employing staff in order to mobilise data.

Applications for the program will open in mid-March 2022. Keep an eye on our ALA news channels (Blog, Twitter, Facebook, LinkedIn) to find out when applications open.

We're looking for institutions or biodiversity researchers who need help digitising historic physical records and mobilising data into the ALA.

There's no catch, as long as the records are biodiversity-related. This can be for any wild species in Australia – from koalas to cane toads, eucalypts to bioluminescent fungi, we want to know about it. The data might be in paper field notes, or species in physical collections. Whatever it is, we'll be giving out grants to 6 institutions through both small (\$20K) and large grants(\$50k).

You might be wondering why! Well, available data = useful data - so by making historical data accessible, it can be shared more widely and used by researchers to support biodiversity conservation efforts and decision-making. https://www.ala.org.au/blogs-news/the-ala-australian-biodiversity-data-mobilisation-program/

Climate Change – creek bank protection Lessons learnt

Professor Will Steffen, former IPCC report author, Climate Councillor, climate change expert and ANU Emeritus Professor said:

"For most Australians, this report is long, technical and at times dry. But its message is anything but. We are being harmed by climate change now, and the future is potentially terrifying."

"We are seeing climate change play out in real time with unprecedented rainfall and flooding taking a horrible toll on communities in QLD and NSW. These events will only get worse if we don't act now to reduce emissions."

The editor can remember in Primary school over 50 years ago scientists raising the alert about human activity and their impact upon our climate.

To date governments and particularly in Australia have taken little meaningful action to protect our environment, which includes its people. Quite the opposite, in Queensland for example the government has allowed a substantial increase in coal extraction, coal being one of the biggest contributors to the greenhouse effect, which is driving up temperatures.

Climate Councillor, former IPCC author and Distinguished Professor of Biology at Macquarie University, <u>Professor Lesley Hughes said</u>:

"Right now, inadequate global action means the Earth is heading towards catastrophic warming of over 2°C. Governments must slash emissions this decade and rapidly transition away from burning fossil fuels.

If all countries copied Australia's dangerously weak response, we would be headed for warming in excess of $3^{\circ}C$ – far beyond anything it is possible to adapt to."

It seems money is more important than people and the environment they live in and enjoy. Perhaps they forgot you cannot eat money.

That all said it seems its up to the people to now take action at the ballot box to ensure we support candidates who understand climate change and will do something about it and commence on ground action to protect our environment.

The editor has had first-hand experience of the impact of extreme weather with recent flood water reaching levels in Tarradarrapin Creek never seen in the 17 years of living along this waterway. While there has been big events before nothing came close to the volume and ferocity of the recent flood.

Lessons learnt from this flood is the editor will not build further infrastructure in the area affected. Damaged structures and fencing are removed. Old netting laid down and now used for erosion control.

The plants that survived was interesting to note. The old growth Melaleuca quinquenervia and Blue Quandong, Elaeocarpus grandis with its buttressed root system survived unscathed. Despite being at ground zero facing the full force of the flood water the local native shade grass not only survived but held its ground, which was great for top soil retention. Similarly the Round-leaf vine, Legnephora moorei and Monkey Rope vine, Parsonsia straminea held the ground and slowed the water flow. Young trees like Eprapah wattle and eucalypts succumbed to the intense flow and were damaged to the point on requiring removal. My planting of Lomandra hystrix (R.Br.) L.R.Fraser & Vickery deliberately planted to protect the creek bank did a great job. I also had two (2) clumps of exotic bamboo grown to protect a small shed and fence. While this bamboo is an exotic and can become a weed if not manage they worked well at lowering the force of the water to the extent that the infrastructure they were protecting was not harmed. I'm NOT advocating planting bamboo but a vegetated creek certainly can diminish the destructive velocity of a flood.



Native vines worked well in protecting soil and slowing water flow.



Native shade grass despite under 3 metres of fast flowing water with debris torpedoing down the creek it still held on.



Quandong – buttress roots captured soil and water.



Lomandra hystrix — did their job in protecting the creek bank.



Old growth *Melaleuca* and even *Cordyline rubra* and *Cordyline stricta* held their ground.

Guidelines for riparian fencing in flood-prone areas

 $\frac{\text{https://www.water.vic.gov.au/}}{\text{flood-prone-areas-guidelines-low-res-June-2015.pdf}}$

Biodiversity – Flying foxes

Flying-foxes are large bats that feed on plant products such as fruit, flowers, pollen and nectar. They generally congregate in camps made up of large numbers of individuals, but some also roost singly or in small groups. Camps can be found in a range of vegetation types, usually close to water in an area with a dense understorey.

Flying-foxes are highly mobile, ranging up to 40 km from their camps at night to feed. They also move up to hundreds of kilometres to follow the flowering and fruiting of food sources.

Flying-foxes play a vital role in keeping our ecosystems in good health. They pollinate flowers and disperse seeds as they forage on the nectar and pollen of eucalypts, melaleucas and banksias and on the fruits of rainforest trees and vines. Flying-foxes are important in ensuring the survival of our threatened rainforests such as the Wet Tropics and Gondwana Rainforests, both listed as World Heritage sites.

Seven species of flying-fox are found in Australia. Information on the status and distribution of these flying-foxes is shown in the table below.

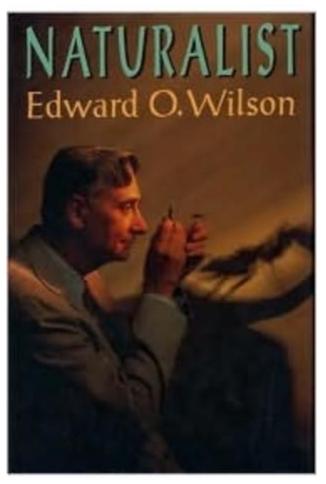
The Grey-headed Flying-fox, Pteropus poliocephalus, Spectacled Flying-fox, Pteropus conspicillatus subsp. conspicillatus and the Christmas Island Flying-fox, Pteropus melanotus natalis) are listed under national environmental law (Environment Protection and Biodiversity Conservation Act 1999, the EPBC Act). The numbers of all three EPBC listed flying-foxes have declined over recent times, due to habitat clearance, natural stochastic events and culling.

Counts of Grey-headed Flying-foxes conducted in 1989 and 1998-2001 indicated a 30 per cent decline in the national population. This qualified the species for listing as a vulnerable species under national environmental law.

Source:

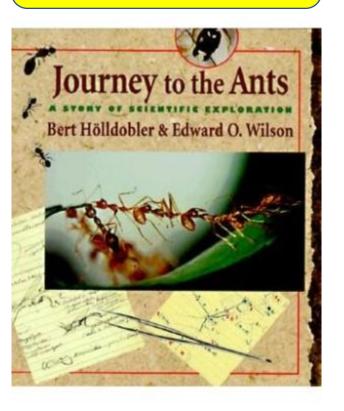
https://www.awe.gov.au/environment/biodiversity/threatened/species/flying-fox-law

Name	National status (EPBC Act)	State status	IUCN status	Distribution
Grey-headed Flying-fox (Pteropus poliocephalus)	Vulnerable	Vulnerable (NSW); Vulnerable (Victoria); Least Concern (Queensland)	Vulnerable	Australia's only endemic flying-fox species. Occurs in the coastal belt from Rockhampton in central Queensland to Adelaide in South Australia.
Spectacled Flying fox (Pteropus conspicillatus subsp. conspicillatus)	Vulnerable		Least concern	Restricted to tropical rainforest areas between Ingham and Cooktown, and between the McIlwraith and Iron Ranges of Cape York.



In Naturalist, Wilson describes for the first time both his growth as a scientist and the evolution of the science he has helped define. He traces the trajectory of his life - from a childhood spent exploring the Gulf Coast of Alabama and Florida to life as a tenured professor at Harvard - detailing how his youthful fascination with nature blossomed into a lifelong calling. He recounts with drama and wit the adventures of his days as a student at the University of Alabama and his four decades at Harvard University, where he has achieved renown as both teacher and researcher. As the narrative of Wilson's life unfolds, the reader is treated to an inside look at the origin and development of ideas that guide today's biological research. Theories that are now widely accepted in the scientific world were once untested hypotheses emerging from one man's broadgauged studies. Throughout Naturalist, we see Wilson's mind and energies constantly striving to help establish many of the central principles of the field of evolutionary biology. The story of Edward O. Wilson's life provides fascinating insights into the making of a scientist and a valuable look at some of the most thought-provoking ideas of our time.

Presidential Medal for Global and Visionary Leadership, Father of Biodiversity, Edward O. Wilson June 10, 1929 – December 26, 2021.



Hailed as "a masterpiece" by Scientific American and as "the greatest of all entomology books" by Science, Bert Holldobler and Edward O. Wilson's monumental treatise The Ants also was praised in the popular press and won a Pulitzer Prize. This overwhelming success attests to a fact long known and deeply felt by the authors: the infinite fascination of their tiny subjects. This fascination finds its full expression in Journey to the Ants, an overview of myrmecology that is also an eloquent tale of the authors' pursuit of these astonishing insects. Richly illustrated and delightfully written, Journey to the Ants combines autobiography and scientific lore to convey the excitement and pleasure the study of ants can offer. The authors interweave their personal adventures with the social lives of ants, building, from the first minute observations of childhood, a remarkable account of these abundant insects' evolutionary achievement. Accompanying Holldobler and Wilson, we peer into the colony to see how ants cooperate and make war, how they reproduce and bury their dead, how they use propaganda and surveillance, and how they exhibit a startlingly familiar ambivalence between allegiance and self-aggrandizement.

NOMINATION FORM

Wildlife Preservation Society of Queensland Bayside Branch (Qld) Inc. (WPSQBB)
Annual General Meeting 27th May 2022- Election of Office Bearers

NAME OF PERSON BEING NOMINATED FOR A POSITION	Positions that may be nominated for			
	be nominated for			
POSITION NOMINATED FOR	President Vice President			
NOMINATED BY	Secretary			
NAME Lam a financial member of WPSOPP	Treasurer Executive member			
NAME I am a financial member of WPSQBB	Executive member			
SIGNATUREDate / /				
NOMINATION SECONDED BY				
NAMEI am a financial member of WPSQBB				
SIGNATUREDate / /				
ACCEPTANCE OF PERSON BEING NOMINATED				
I am a financial member of WPSQBB and am willing to accept the				
nomination.				
SIGNATUREDate / /				
	<u></u>			
THE WILDLIFE PRESERVATION SOCIETY OF QUEENSLAND BAYSIDE	BRANCH (OLD)			
Inc	, Did II (CII (QDD)			
PROXY FORM AGM 27 th May 2022				
I,of				
Postcode				
being a financial member of the Wildlife Preservation Society of Queensland, Bayside Branch hereby appoint				
as my proxy to vote on my behalf at the (Annual) General meeting to be held on (date)				
Signature :				
Is this proxy a general proxy? (Yes/No).				
If 'No', indicate if this form is to be used against or in favour of the following specific resolution:				
Strike out whichever is not desired.				

Wildlife Diary

Graceful tree frog, *Litoria gracilenta* heard calling in Capalaba and Birkdale after heavy rain.

Eastern sedge frog, Litoria fallax likewise heard calling.

Juvenile **Striped Marsh frogs**, *Limnodynastes peronii* are enjoying the rain so are **Green Tree Frog**, *Litoria caerulea*

Green turtle, *Chelonia mydas* noted resting in northern Redland creeks at low tide.

Numerous baby **Australian Water dragon**, *Intellagama lesueurii* sighted.

Cottonwood, *Hibiscus tiliaceus*, are very notable with their large yellow flowers.

Melaleuca quinquenervia are enjoying the wet weather and are flowering their creamy coloured short bottlebrush flowers are readily seen.

Climate change is a crisis that threatens our life-support systems. Humans have created the crisis and we have the skills and solutions to turn it around. We can better care for nature, each other and ourselves.

Australian Museum

Firetail Gudgeon, *Hypseleotris galii* (Ogilby, 1898) is a small native Australian fish that occurs in freshwater coastal streams. During the breeding season the fins of males become bright red-orange.

The Firetail Gudgeon has a compressed body, two dorsal fins and a small, oblique mouth that reaches to below the front of the eye.

The colouration of the species varies with age, habitat and season. The body is generally grey to bronze with black scale margins. During the breeding season males can be almost black, with intense red-orange fins. There is often a black bar above the pectoral fins base and a faint stripe along the side of the body.

Female Firetail Gudgeons can be easily distinguished from other species of *Hypseleotris* by the black area around the vent. This area is usually brown in males.

The species feeds on aquatic invertebrates.



Melaleuca quinquenervia



Insects are enjoying the humid weather, and these caterpillars are enjoying a cunjevoi (*Araceae*). They are possibly the **Vine hawk-moth**, *Hippotion Celerio*.



https://australian.museum/learn/animals/fishes/firetail-gudgeon-hypseleotris-galii/

Social Networks





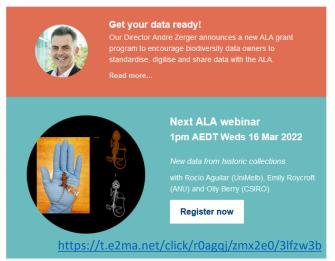
Koala Action Group

The Koala Action Group Qld Inc (KAG) is a community group working to help koalas in our unique Redland environment.

Become a member of KAG and you will be kept up to date with the current issues affecting the future of Redland's koalas and receive a regular newsletter.

KAG has joined an alliance of environmental organisations including EDO, WWF, The Wilderness Society, Qld Conservation Council and many other community groups.

If you would like more information on koalas or how to make your property wildlife friendly phone KAG on 07 3823 5575 https://koalagroup.asn.au/





Weed Busters

Weedbusters is an awareness and action campaign that helps protect Queensland's environment, agriculture and way of life from the impacts of weeds. Weedbusters focuses on raising awareness about weeds and involves people in weed management.

Weedbuster Week is held annually in September. Weedbusters:

- o provides a focus for government, industry bodies, natural resource management groups, volunteer groups and individuals to raise awareness and increase public understanding about the impact of weeds
- helps people see how some gardening and agricultural activities can introduce and spread weeds, leading to land and environmental degradation
- helps build skills and knowledge to enable people to better manage weeds
- o recognises the efforts of individuals, community groups and local governments in weed management
- encourages community ownership of problems leading to greater acceptance of and support for weed management.

Contacts and Important Links

Committee & Contacts

President Steve 0423036676

V President Don Baxter

Secretary Simon Baltais baltais@bigpond.net.au

Treasurer Maureen Totten ham 0418 197 160

Executive Tracey Mann

Janelle Devery

Bayside Newsletter Editor Alix Baltais/Simon Baltais

Email: bayside@wildlife.org.au

Memberships Types

Web: http://www.branches.wildlife.org.au/bayside



Bayside Branch

Facebook <u>LINK</u>
Wordpress Blog <u>LINK</u>
Website <u>LINK</u>

Curlew Watch LINK



Head office

Facebook LINK



Coastal Citizen Science

Facebook LINK

Wordpress Blog LINK



Name

Signature _____

Cicada Film Festival

Facebook <u>LINK</u> Website <u>LINK</u>

Membership Application Wildlife Preservation Society of Queensland

	\$30.00 Single	AddressP/C	
	\$20.00 Concession (Pensioner/Full		
	Student) \$45.00 Family or Non Profit Group \$12.50 Junior	Phone NoEmail	
Optional Wildlife Magazine Subscription \$47.00 per year Inc GST (Four Issues)		Special Interests	
		Pay by Credit Card	
Optional Donation \$ For Campaign (Bayside does not tax deductible status) Postal address: PO Box 427, Capalaba 4157		Card Type: ☐ VISA ☐ Mastercard Card No	
		Exp Date/ Name on Card	