

Newsletter

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The Torbay Catchment Group is a community-based volunteer organisation whose primary focus is protecting and restoring the health of the lands and waterways as well as supporting prosperous and sustainable communities within the catchment.

Exciting Sightings!

Western Quoll remains found at West **Cape Howe**



An exciting discovery was recently made by two locals: skeletal remains of a Western Quoll in February this year on the northern boundary of the West Cape Howe National Park. The specimen was identified by its' distinctive teeth and jawbone as well as

scats (faeces) and tracks. Quoll sightings have also been reported at Fitzgerald River National Park and Two People's Bay. Previously it had been assumed that the Noongar name for this delightful looking but fearsome predator is Chuditch pronounced djooditj. The Chuditch is Western Australia's largest carnivorous marsupial, about the size of a domestic cat. It feeds on large invertebrates and small animals and is coloured reddish-brown (red kelpie colour) through to grey and has white spots on its back with a creamy white underside. A solitary mostly terrestrial nocturnal predator, it is most active around dusk. They mostly hunt on the ground, which makes them susceptible to fox and cat predation. The

Chuditch range has declined severely. Saving the Chuditch means saving its habitat, and the smaller species it relies on. The remnant Jarrah forest is the last Quoll was no longer to be found locally. The stronghold of the Chuditch which is listed as 'Rare or Threatened with Extinction' under the Western Australian Wildlife Conservation Act and as 'Vulnerable' under the Commonwealth Endangered Species Protection Act using the revised International Union for Conservation of Nature (IUCN) criteria. If you see a Chuditch (or its remains, scats or tracks) or any other unusual animal in your area please note the date and location and contact the Project Officer on 0439 461 591. Sightings and evidence are important for our records and will be reported to the appropriate authority.

The Intriguing Antechinus

What looks like a large mouse or a rat but isn't? Why, an Antechinus! These small, carnivorous animals primarily prey on invertebrates such as spiders, beetles (including larvae), and weevils and live communally in tree -hollows. They lack the pungent odour of a mouse and lack enlarged front teeth. They do not gnaw on cables like mice and are unlikely to eat stored food. They have short hair and vary from grey-cinnamon to brown-black in colour depending on the species and nose-to-tail they measure from 80-120 mm. With prominent whiskers, large ears and a pronounced, pointed snout they are quite intriguing!

Torbay Hill residents are concerned that their numbers are in decline as very few have been sighted in recent times. These delightful creatures are, unfortunately, very easy prey for cats and foxes, and humans who mistake them for feral rodents.

Please do all you can to help this very special protected little creature to survive.



Left: a baby **Antechinus**

Below: an adult **Antechinus**



Ocean Plastic

sea birds as marine health sentinels

Our recent Catchment Catch-up was cancelled. Thankfully our local Seabird Rescue representative Carol Biddulph and her husband Graham opened their home for a private gathering. Those present heard from visiting researchers Dr Jennifer Lavers and Jann Gilbert who were here assessing the breeding of Flesh Footed Shearwaters (Mutttonbirds) on Shelter Island. Thank you to our hosts for the opportunity to hear from these skilled and knowledgeable presenters. Every person present was deeply affected by what they heard. "It was very sobering to hear about

the impact of plastic on all marine life" said TCG Secretary Mandy Arnold. "The research Jennifer and Jann are doing is helping us to understand that our local seabirds serve as indicators of our ocean health. I did not understand the extent or impact of ocean plastic and that there is 40x more plastic than plankton in our oceans. Unfortunately our Muttonbird chicks are being fed plastic by their unknowing parents who mistake it for food causing failure to thrive and can result in a painful death. I was shocked and horrified and at the same time motivated to do what I can to reduce my reliance on plastic on daily basis." Those present also heard about research into the impact of

Fukushima radiation on Shearwaters in the Sea of Japan. We look forward to hearing more from our presenters on their return.

If you want to learn more about how to reduce plastic consumption go to http://www.jenniferlavers.org (see below)



Western Australian Seabird Rescue
Wildcare Helpline 9474 9055
Seabird Rescue Mobile 0418 952 683
Discourage pelicans from popular fishing spots by not feeding them fish or food.

Increasing Native Species in the Catchment—we pay you!

Are you living on a property with unfenced bush?

Would you like more native plant species on your land?

TCG have special funding to assist landholders with both these projects!



Fencing bush from pasture prevents domestic animals from accessing and damaging native bush species; improves biodiversity and environmental health; promotes the growth of native trees, bushes, plants and wildflowers; and prevents loss of essential understorey species that provide shelter for our native birds, insects and animals.

In turn these creatures provide farmers with natural protection against pests and diseases thus reducing or preventing the need to use pesticides that eventually enter the food chain via waterways.

Fencing remnant bush and replanting native species means landholders are increasing the refuge for our native animals many of whom are severely threatened due to habitat loss.

There are many more benefits to having more bush on your property: it adds \$ value; provides heritage and biodiversity values; provides shelter for stock; protects animals from prevailing winds and also greatly reduces soil moisture loss during summer months. Trees and bush also help reduce water table heights which helps keeps salinity in check.

Landowners report an increased sense of well-being from having native vegetation on their farm.

Now is the time to act!

Fencing subsidy is up to \$2,400 per km Planting native species subsidy is up to \$1,450 per hectare.

Contact Pip Tilbrook on 0439 461 591 or pojectofficer@torbay.southcoastwa.org.au

Community Updates

Natural Reserve Strategy - Have your say!

The City of Albany is currently developing a strategy for its coastal reserves with the community invited to participated in the planning process and have a say on future management of these important areas. Community meetings will be held during May at locations in Albany, Bornholm (24th) and Lower Kalgan. For more information see local press or contact Greenskills on 9845 3310. Alternatively complete an online survey at https://www.surveymonkey.com/r/NaturalReserves

Watercorp Denmark Desalination

Meetings were held in late April for the community to hear Watercorp's ideas regarding the management of brackish water from the proposed desalination plant at Denmark Dam. Options include Albany Tree Farm/s, Denmark River, Denmark beaches, Wilson Inlet, Point King and a private liquid waste facility. For more information contact Kate Duff at Watercorp Albany on 9842 4252 or http://www.watercorporation.com.au/water-supply-and-services/ongoing-works/denmark-water-supply-upgrade

Torbay Catchment Group Sponsors







WoW! Weekend of Workshops with TCG

Saturday 28 May @ 6pm Possum Detectives Night Stalk
Sunday 29 May @ 10am Foxes & Furry Ferals Forum
Sunday 29 May @ 1.30pm Possum Box (materials included)

Whether you're interested in being a possum detective, building a possum home or learning how to rid your area of furry ferals, Torbay Catchment Group's WoW! is for you. Project Officer Pip Tilbrook stated "We are very fortunate to have two expert presenters each with a wealth of knowledge and skills in their field for this special Weekend of Workshops for local residents".

The series kicks off on Saturday evening 28 May with the **Possum** Detectives Night Stalk, with our local endangered species, the Western Ringtailed Possum, in the spotlight. Participants will learn about the importance of recording possum sightings and the health of this shy engaging furry creature. Our guide Joe Tonga from Natsync Environmental (www.natsync.com.au) will bring his thermal imaging equipment so we will see everything that is out and about, whether its possums, bats or bandicoots - there is no hiding from the camera! Numbers are limited so please book early. Joe will also co-host the Foxes and Furry Ferals Forum with Graham Lawrence of Foxbusters fame on Sunday morning. This event will provide small and large landholders with a range of strategies for controlling these pesky predators which wreak havoc on wildlife and domestic poultry. There will be time for people to ask questions and share experiences. "Shared knowledge is such an important aspect of making sure we continue to develop the best techniques and strategies to tackle this problem" said Pip. During

the workshop Graham will demonstrate his secret 'weapon' in his fox-fighting quest, which each participant will receive free of charge. Then, join us on Sunday afternoon for the *Possum Box* making hands-on workshop with Joe. Learn about the many threats to our wildlife and why so many of them are homeless, then, with Joe's help create a special home suitable for our endangered Western Ringtailed Possum. Workshop locations to be advised.

Cost \$10 per person per workshop / TCG members FREE Membership is just \$5 per person or \$10 per household!

Bookings: Pip Tilbrook <u>projectofficer@torbay.southcoastwa.org.au</u> 0439 461 591

Western Ringtailed Posum





Trailing Away ... on the Torbay Rail Trail

Anyone venturing along the Torbay Rail Trail recently will have noticed that over gown sections are now clear and the trail is once again a wonderful way to experience an amazing diversity of wildlife and bush on your own or with a group, providing a safe and enjoyable experience for walkers, cyclists and horse riders.

TCG would like to acknowledge Wilsons Machinery for their support with trail slashing over the past few years. Also a big thank you to the Greenskills Green Army participants who recently hand pruned

the trail to make it more accessible.

At about 8km in length
Torbay Rail Trail is part of
the much longer Munda
Biddi Trail and a reminder of
bygone times when the
railway was a lifeline linking
communities between
Nornalup and Albany
transporting passengers,
locally sourced timber, local
produce, household goods
and the mail.

Located at the west end of the trail is the picturesque Torbay Hall, nestled amongst karri trees with plenty of shade and parking for cars and horse floats. Take your camera, and record the beautiful old paperbarks with gnarled trunks or the

attractively restored railway bridges. For the historians there is a nod to the first European arrivals via interpretive signage at Wilgie Siding. Nature lovers will experience numerous birds and even the occasional bandicoot. The vegetation variety also makes the trail a wonder for the amateur botanist. The eastern trail end is located in Elleker opposite the hall with a large shady carpark, toilets and interpretive signage.

Why not organise a group of family or friends, take a picnic and enjoy the beauty, tranquillity and history of our very own Torbay Rail Trail?

https://www.railtrails.org.au/ trail-descriptions/westernaustralia?view=trail&id=218

Ocean Plastic Contamination

by Dr Jennifer Lavers Research Scientist, Institute for Marine & Antarctic Studies, Adjunct Fellow, RMIT University

For years we've heard about the North Pacific Gyre (or Garbage Patch) where there is up to 40x more plastic in the ocean than plankton. But the North Pacific Garbage Patch is not the only one of its kind.

There are at least five others, **fed by more than20 million items that enter the world's oceans each and every day** (~6.4 million tonnes of plastic per year)

(a recent study suggests there are FIVE TRILLION pieces of plastic already in the surface layer of the ocean, as of 2014).

The wind and wave patterns that lead to the development of Gyres (some with more than 26,000 pieces of plastic per km²) redistribute this plastic around the globe, so that one country's garbage washes up in another's backyard. **Our garbage is everywhere. Even in Antarctica.**

In 2011, one chick was found to have more than 275 pieces of plastic in it's stomach (equivalent to an average human ingesting 10kg of plastic; Lavers et al. 2014). See image below



See the ABC 7.30 Report Video: <u>Plastic ingested by Flesh-footed</u> Shearwater chicks on Lord Howe Island

The film trailer for 'A Plastic Ocean' has been released Features Sir David Attenborough & Dr Sylvia Earle.

https://youtu.be/6zrn4-FfbXw http://www.plasticoceans.net/a-plastic -ocean-the-film/

Plastic Oceans has assembled a team of the world's top scientists and leading film makers to produce a powerful, high-end documentary in high definition 'A Plastic Ocean'. The team is headed up by film producer Jo Ruxton who was involved in programmes including Blue Planet, Pacific Abyss, and LIFE. She brings years of experience of working within the BBC Natural History Unit on wildlife documentaries to the Plastic Oceans programme. Accompanied by scientists, conservationists and engineers, the film follows the journey of two explorers as they travel to some of the most remote parts of the world, documenting the environmental issues associated with plastic pollution and its impact on the environment, ecosystems and human health.

Removing white and purple balloons from the stomach of a shearwater (2015) See image below.



More than 690 marine species are known to ingest plastic, including fish and other animals at the very base of the marine food chain. This plastic accumulates toxins such as polychlorinated biphenyls (PCBs) at more than 100x the surrounding seawater concentrations.

Once ingested, plastic can block or rupture the digestive tract and leak contaminants into the bird's blood stream resulting in stomach ulcerations, liver damage, infertility, and in many cases, death.

Here in Australia, 90-100% of Flesh-footed Shearwater *Puffinus carneipes* adults and chicks contain plastic (Lavers & Bond 2016).

Recent data indicates this species is one of the world's most heavily contaminated seabirds and chicks that ingest large amounts of plastic have poor body condition and likely suffer reduced juvenile survival. Not surprisingly, Flesh-footed Shearwater populations on Lord Howe Island in New Zealand (and in Albany) have declined significantly over the past few decades.

To address this serious issue, we are utilising 15 years of existing data combined with experimental trials to identify characteristics of plastic that may influence the birds willingness to ingest it as well as determine whether certain techniques can be used to safely remove plastic (and therefore contaminants) from seabird stomachs, providing a management tool for numerous species at risk from the ingestion of plastic at sea.

Collaborators: Ian Hutton, Dr. Alex Bond, Australian Synchrotron Institute, Two Hands Project & Plastic Oceans Foundation

TCG Update – Soil Health Project

In the next six months TCG will have a new soil health trial off the ground. We will also be running a series of soil health related workshops and would like your feedback. Topics being considered include:

- Understanding your soil test;
- Composting, compost extracts and bio stimulants;
 what are they and what they can do for your soil.
- Introducing spring active dung beetles;
- Soil microbes and soil health;
 - Water harvesting making the most of your rainfall;
 - Farmers forum sharing experiences and methods;

Register your ideas & interest with the Project Officer.