

THE LAUNCESTON NATURALIST

Issued to members of the Launceston Field Naturalists Club as a contribution to club activities.



The aim of the Launceston Field Naturalists Club is to encourage the study of all aspects of natural history and to support the conservation of our natural heritage

Volume XLVII No. 4

April/May 2014

Patron	:	Professor Nigel Forteach
President	:	Mr T Trelolgen, 68 Mulgrave St Launceston, 0408 341 397
Vice President	:	Ms J Handler, 52 Entally Rd Hadspen, 6393 6603
Hon. Secretary	:	Mr N Manning, 46 Robin St Newstead, 6344 2277
Hon.Treasurer	:	Ms K Manning, 46 Robin St Newstead, 6344 2277
N'letter Co-ordinator	:	Ms K Manning
Librarian	:	Ms T McGlynn
Committee	:	Ms Campbell, Ms McGlynn, P Wright, P Warren

Meetings 1st Tuesday of month, Feb-Dec at Scotch-Oakburn College, Penquite Rd Newstead

PROGRAM

JUNE

- Tuesday 3 **Guest speaker Tineke Morrison: *Macquarie Harbour***
- Saturday 7 **Skemp Day: Bruce Fuhrer visit**
- Saturday 21 **Field Trip: Beachcombing on East Beach, Low Head**
- Sunday 29 **Skemp Day: Skullduggery @ Skemps**

JULY

- Tuesday 1 **Guest speaker: David Maynard & Tammy Gordon - *Tasmanian Tiger, Precious Little Remains***
- Sat 19/Sun 20 **Field Trip: Tony Arnold's property @ Ulverstone and Created from Chaos sites (more detail this newsletter, expressions of interest by 13 June 2014)**
- Sunday 27 **Skemp Day: National Tree Day - planting shrubs along the creek**

AUGUST

- Tuesday 5 **Guest speaker: Leigh Walters - *Tasmanian Land Conservancy***
- TBA **Field Trip: Maria Island (more details this newsletter, expressions of interest by 13 June 2014)**
- TBA **Skemp Day**

The full June to December 2014 program will be available shortly

<http://www.lfnc.org.au/meetings.htm>

COMMITTEE/GENERAL MEETING

SKEMP REPORT

April - Noel advised that following a lightning strike in the vicinity of the old fire shed, the telephone in the Centre was rendered unusable and has since been replaced. The dry summer had meant no mowing in the last month and there were three water leakages in the last few months which have been rectified.

May - With the colder weather, additional wood has been moved up to the Centre. John has asked that members who had volunteered to look after a track on the property to please check it regularly and keep it clear. Blockages should be reported to either John or Noel.

PUGGLE

April - Tom Treloggen placed four large furry toys on the desk and asked members which one was out of place. Peter Ralph correctly stated that the kookaburra was not a native. The others were an eastern rosella, a wallaby and a wombat

May - Peter Ralph asked members to name the lake, which at 167 metres, is the deepest in Tasmania, Australia and possibly the southern hemisphere. Alma McKay correctly answered first that it was Lake St Clair. There was some discussion on the accuracy of the claim with visitor Matthew Cloudsdale stating that there was an ice covered lake in the Antarctic which was deeper.

SIGHTINGS

April - Margrit Korosi had seen a katydid at Prospect Vale. John Elliott reported eastern rosellas in Blamey Road, freckled ducks and white-fronted chats at Narawntpu. Alison Green had seen 17 pink and grey galahs and one white cockatoo at Bridport. Prue Wright had seen four royal spoonbills and 15 - 20 cattle egrets at Queechy Lake. Peter Longman had seen a white browed scrub wren at Dilston and Peter Ralph a sea eagle at Legana.

May - Noel Manning had seen a platypus at Skemps in the middle pond over Easter and also on watermonitoring day. Visitor Matthew Cloudsdale had seen platypus at Fernglade in Burnie. Tom Treloggen had seen a giant stick insect in South Launceston. Paul Edwards had seen *Nothofagus gunnii* which was turning at Tarn Shelf and a black faced cormorant at West Arm. Linda Douglass reported silvereyes not in large numbers. John Elliott reported that four currawongs at Skemps had black bums and were therefore black currawongs. At Travellers Rest, Tony Geeves has seen cape barren geese and Sarah Katarzynski had seen a dead deer. Alma McKay had seen 11 white cockatoos in Princes Square.

LIBRARY REPORT

Tina McGlynn reported that the John Douglas book on spiders was available to view, she had received the Central North newsletter. The sale of surplus and books not suited to the Skemps library had gone well at the weekend and that there were some books at the meeting for people to purchase.

NEW PATRON

Professor Nigel Forteach was recently appointed as our Club Patron after being approached by Judith Handlihnger. He enthusiastically accepted to take on this role held since 2005 by Chris Tassell. Chris and his wife have left Launceston and we wish them well in their new endeavour.

THE YEAR THAT WAS

At the December General Meeting, Prue Wright will present a slideshow of images from Club activities during 2014. Could members please submit images directly after activities so Prue can start putting the presentation together. Images of people, places and the focus of our activity, should be submitted on either CD or USB or by email to redgum101@gmail.com. Your support for this end of year presentation would be appreciated otherwise it won't happen and we won't be able to reminisce on the interesting activities we have participated in over the year.

CLUB CALENDAR 2015

Members are invited to submit images that meet the Conditions of Entry detailed below for the Club's 2015 calendar. Prue Wright will be compiling the images and accompanying sentence regarding the image content. Due to time constraints these must be submitted by 30 June. The final decision will be made by the Committee to ensure a balanced and representative calendar.

Conditions of entry:-

- ◆ Print topics: subjects are to be related to Tasmanian flora, fauna, minerals, Tasmanian landscapes and astronomical events observed in Tasmania. Animals and plants must occur naturally in Tasmania. Introduced species or garden varieties are not acceptable.
- ◆ All images submitted must be identified and a sentence is required about the content, for example:- *The Copperleaf Snowberry is endemic to Tasmania and is found in mountain rainforest and wet eucalypt forests, from sea level to montane forest.*
- ◆ The above requirement also applies to landscapes. A sentence or two on the aspect of natural history that the landscape illustrates is required. A couple of

examples might be:

The organ pipes on Mt Wellington are composed of dolerite. Dolerite is an igneous rock that has intruded into overlying (usually sedimentary) rocks, or Fagus (Nothofagus gunnii) occurs only in Tasmania. It is the only winter-deciduous species in Australia.

- ◆ Photos should be at least 2 megapixels in size so that good quality pictures can be printed. Photos with a 3:2 aspect ratio are preferred eg a 15cm x 10cm post-card print. Most of the photos used on the calendar have to be 15cm wide and 10cm high rather than 10cm x 15cm.

Images to be submitted on CD or USB, or by Email (as below) with accompanying Word document containing the written information required in the previous **Condition of Entry**.

Each email should contain no more than 2 photos as these should be submitted as high quality (large) files as required for printing. Each email to be labelled as LFN calendar entry and include your name. Written information sent by email can be either a Word attachment or clearly marked in the email text.

Send emails to redgum101@gmail.com before 30 June. Members please support this activity as if there are no images there will not be a fundraising calendar this year.

SKEMP DAY - BRUCE FUHRER VISIT - Saturday 7 June

Rob Mitchelson will be bringing his friend Bruce Fuhrer to visit the Skemp property on this day. Bruce is a mycologist and photographer, with many of us knowing his name for his publications on the topic of fungi.

Come along and meet Bruce, and take a walk on the property to see what fungi is about. Rob also mentioned that if we would like our copy of his book signed to bring it along.

For members that would like to come along but not necessarily go for a walk, Rob will show some of his powerpoint presentations in the Centre on fungi and other topics.

Hot drinks and biscuits will be provided as usual, bring your own lunch, BBQ will be lit for those who would like a hot lunch.

FIELD TRIP - ROCK POOLS AT EAST BEACH - Saturday 21 June

Meet at Museum's Inveresk carpark at 8.45am to arrange carpooling and departure at 9.00am sharp. Bring sturdy shoes for rock hopping, lunch and drinks, camera, binoculars etc., and clothing for all types of weather. If you are carpooling and leaving your vehicle in the carpark, don't forget to feed the meter.

We will see what marine life we can find in the rockpools and in the low tide zone, and hopefully have time to also go looking for petrified wood along the beach.

Lunch will be at the picnic ground at the rear of the beach.

FIELD TRIP TO ULVERSTONE AREA - July 19 and 20, 2014

Members are invited to attend this trip which will be both a day or overnight trip depending on your choice.

During the trip we will be visiting sites on the *Created from Chaos* trail, leaving Launceston to visit the Don Heads where the tide will be receding around 11am. We will then proceed to North Motton to lunch and look over the property of Phil Arnold which has a ferngully, water features, freshwater crayfish, platypus and fungi. Day trippers would head back to Launceston from here at the end of our visit.

Overnight in a yet to be decided motel in Ulverstone or members could organise their own accommodation. The following morning we will visit Goat Island and proceed along the shoreline towards Lillico Beach. These sites are of great geological interest and may also provide opportunity for intertidal exploration. Heading back to Launceston in the afternoon there would be the option of a visit to either Gunn's Plains Caves, the Arboretum or Leven Canyon.

Any member interested in attending, no matter whether they are coming for the day or overnight, needs to let the Secretary know as Phil Arnold would like to know in advance the number of people visiting his property. Email secretary@lfn.org.au or phone 6344 2277 by 13 June, to enable other arrangements to be made.

MARIA ISLAND TRIP - PROPOSED FOR AUGUST

If you are interested in visiting the island for a 2 night stay mid August, please email secretary@lfn.org.au or telephone 6344 2277 by 13 Jun 2014 so arrangements can be made.

Parks are providing a free ferry service and reduced accommodation costs. Warm, comfy, relaxed, heaps to see and do, what more could you ask for in a Winter field trip!

LAUNCESTON FIELD NATURALISTS FACEBOOK PAGE?

One of the ideas that the Committee would like to progress in the next few months is that of a Facebook page linked to our main website. This would be a much more informal site, to which members could post directly, and could be used for things such as photographs of recent field trips, or perhaps questions about the identification of a photo subject. Creating a link to our existing formal Web page is relatively easy, which means that the content can change frequently and members can post directly, without compromising our main page or adding to the work load of the Administrator for that page. But first, we would like your feedback on which of the three types of group Facebook page would best suit our purpose.

For all of these Facebook page types, the Facebook Group refers only to club members who choose to join that group. (That is, you opt in, you don't need to opt out.) For any of these groups, it is suggested that we take up the option that any existing group member can suggest new additions to the group, but these need to be approved by an Administrator.

The differences between the three groups are these.

In an **Open Group**, anyone can both see the group page, who is in the group, and what members post. There are disadvantages with regard to copying of photographs posted, but members can use their discretion with what they choose to post. Two examples of Open groups linked to a main club page, are those of the Northern Adult Riding Club and the Launceston Walking Club. (The link to the Launceston walking club's Facebook page is under the Who We Are tab.)

In a **Closed Group**, anyone can see the group and who is in it but only members see what is posted by the members. Club members might choose this option if they have concerns about, for example, the copyright of their photographs. There may still well be sections with public documents, and public posts that are available to the public at large, but this would be more limited and more static, and members names can still be seen.

In a so-called **Secret Group**, only members, and former members, can see the group (that is only members can find it on the search such as Google), who is in it, and what members post. This type of group would be strictly Members Only and would be of no value to increasing our profile in the public domain and locating potential future members, but would allow our club members to share photographs and discussions.

Any feedback from members will help the committee in pursuing this. In the age of electronic photographs, it does seem a pity that we don't have a Skite page to share the photos from our outings.

Judith Handlinger

TASMANIAN LAND CONSERVANCY

The Tasmanian Land Conservancy (TLC) recently enquired whether the Club could assist with a donation to protect The Big Punchbowl, a chain of wetlands on the east coast of Tasmania. The Committee has considered this request and have decided not to contribute due to our financial commitment to the Skemps property.

The TLC raises funds to protect irreplaceable sites, endangered species habitats and threatened ecosystems by buying and managing private land in Tasmania. For more information visit <http://www.tasland.org.au/> or contact them at info@tasland.org.au or telephone 6225 1399 if you would like to make a personal donation.

GENERAL MEETING - Tuesday 1 April - John Douglas - *Spiders*

John Douglas gave a splendid photographic review of Tasmanian spiders. He introduced this with an account of how he developed his interest in animals, especially invertebrates. As a child he lived in outback parts of South and Western Australia. Human company there was sparse so he spent much time observing local fauna and he kept a few examples as pets.

While a high school student in Kalgoorlie, John Douglas was able to join an expedition to the Warburton Ranges in company with Harry Butler and some WA scientists. Harry Butler's knowledge of where to find particular animals was genuine and not reliant on advance preparation for television interviews.

John's career as an adult took a different path but his interest in insects and spiders remained strong. A succession of cameras gave him increasingly good results with photography. In Tasmania he found that much of the information about our spiders was scattered, while Professor V.V. Hickman's (1967) book, *Some Common Spiders of Tasmania*, needed updating. Spider classification continues to move as new species are established and further research brings changes to earlier names and relationships.

Now John Douglas has used his spider photos for a website to help interested people to identify what they find. The next step is the launching, on 12th April, of his book *Webs: A Guide to the Spiders of Tasmania*.

Most of the April meeting was occupied by the screening of John's excellent photos. Where possible he records at least two views of a specimen; dorsal and anterior (the spider's "face"). Not all spiders are docile subjects. A lively one can be quietened by placing it on a cold surface. At first all animals photographed were set free. Later a selected few have been preserved to be reference specimens and available for specialist study.

Among the species pictured the Tasmanian funnelweb, *Hadronyche venenata*, and a trapdoor spider represent an ancient group whose fangs point backwards when at rest. These spiders must rear up before they can extend their fangs and strike downwards.

The Tasmanian cave spider, *Hickmania troglodytes*, lives only in Tasmania. As a member of a rare spider group it has few relatives elsewhere. Cave spiders stay near entrances where insects can drift in.

Most spiders belong to a more modern group. Their fangs point towards each other so they can bite with all feet on the ground. Some familiar examples included were as follows: Redback, *Latrodectus hasselti*; white-tailed, *Lampona cylindrata*; black house, *Badumna insignis*; flat huntsman, *Delena cancerides*; badge huntsman, *Neosparassus diana*; swift ground spider, *Supunna picta*; and slater-eating spider, *Dysdera crocata*. Last one listed, the European garden spider, has become international. Its main prey, the slaters in Tasmanian gardens, also are European species.

Some spider families were represented by photos of several of their species. For example:- Salticidae, jumping spiders. Four of their eight eyes face forwards so their sudden leaps are accurate. Thomisidae; crab spiders. Their legs extend sideways. These ambush hunters hide among vegetation until prey comes within reach.

Orb-weavers spin classical, round spiders' webs to trap flying insects. Wolf spiders live in burrows and emerge to hunt on the ground. These kinds were included.

In addition to the photos of Tasmania's water spider, two live specimens, male and female, were on display. Until recently these would have been placed in a mainland Australian species of *Megadolomedes*. Now the Tasmanian form has been recognised as a new species which will be named in honour of John Douglas. Water spiders live near freshwater streams where they prey on aquatic insects. They can walk on water and dive into it while carrying air trapped among body hairs.

Other interesting and unusual spiders were represented among John Douglas' many fine photos. Our thanks to him for a very enjoyable and information evening.

Alison Green

OUTING - Saturday 12 April - Queen Victoria Museum & Art Gallery

Nineteen members visited the Inveresk site today to attend the launch of John Douglas' book *Webs: A Guide to the Spiders of Tasmania*. We heard both the QVMAG Director, Richard Mulvaney and Natural History curator David Maynard talk about John and his passion for spiders, the need for a spider identification book and John's participation in the Bug Days held at the museum.

John then spoke to us about his earlier life and love for insects, spiders in particular. Following his retirement from teaching he was able to spend more time researching for his book which is self published. He also made lights for his cameras to enable better photographs. He thanked his wife and family for their support, and acknowledged that many of the images in the book had been provided by other photographers. John was then presented with an QVMAG Honorary Associate status by Richard Mulvaney. We were then asked to stay and have refreshments, a chat with John and have our books signed. Considering the subject there was a long line and a considerable wait to both purchase the book and have it signed by the author.

We then viewed the *The Skullbone Experiment* exhibition. A group of Australian artists had visited the remote Skullbone Plains and this was a display of their artistic interpretation of the area. There were two videos playing, photographs, paintings and works which included fabric and plant life.

We spent sometime looking over the native animal and bird displays in the natural history area, before we headed to the Railway Café for lunch. The eleven members who stayed on, enjoyed soup and toasted sandwiches, followed by waffles and cake, very yummy indeed. With other places to go, we departed company following a relaxed and interesting morning.

Karen Manning

SKEMP WEEKEND - Saturday 26 - Sunday 27 April **Water monitoring and Astronomy evening**

The morning was cold following pre-dawn thunder and lightning with heavy rains. Arriving at Skemps the fire was going thanks to Peter and John, but the air was still very cool. Noel, John and Vicki (John's sister) headed off to obtain the water sample from the usual spot while I set up a table and the monitoring equipment in the back porch out of the wind and Tina made the final arrangements for the book sale.

Noel mentioned they had seen a platypus in the middle pond when returning from the sampling spot, so Peter W, Jill, Taylor and I walked down to take a look. We caught a glimpse of the platypus rolling near the island and nothing more. On the way back we stopped by some old stumps at the Barn and took photos of the fungi on them. While waiting Jill spotted a red dot in the grass that we presumed was a spider. Peter was able to focus on it and took a photo which helped us to see it better.

With many members lending a hand to find and sort the creatures from the water sample, the task of identifying them started by referring to the 'keys to macroinvertebrate groups'. John and Vicki found a couple of interesting species not recorded very often during sampling days and were happy to show off the critters under the microscope for a better view. Meanwhile the book sale was going well and there were people

heading off for short walks prior to lunch.

Lunch was as normal, noisy with chatter, and busy due to the sharing of salads, wine and cakes. Members took short walks after lunch and discussed their book purchases prior to tidying up the Centre in preparation for departure. With daylight savings finished the days have become cooler and after a day of activity most headed home early.

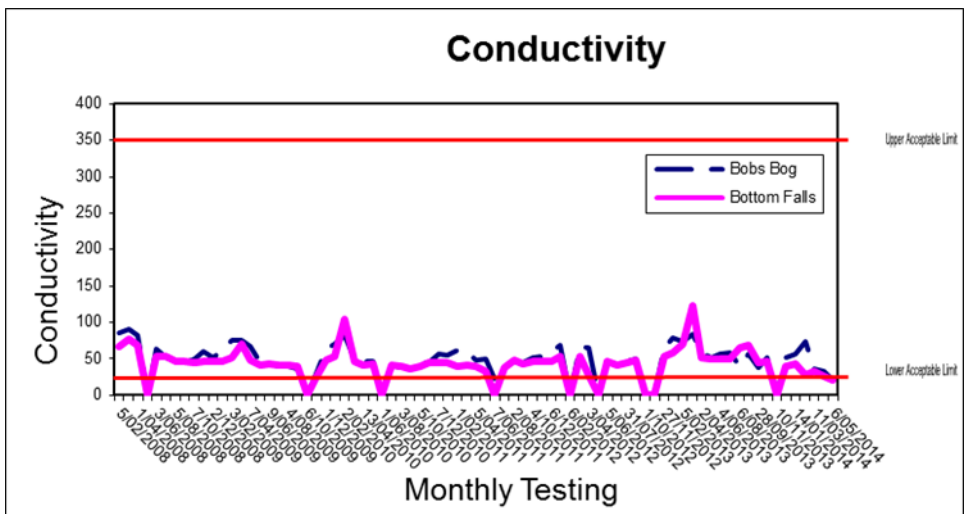
This left only Noel and I staying overnight with Peter W staying to provide his equipment for the astronomy evening. Prior to our evening meal we walked to the middle pond to check for the platypus but had no luck seeing it. Following tea, the evening sky was very clear and with the moon under the horizon, there was no light interference. Once Peter had set up his telescope we were able to get a closer view of Mars, Jupiter and its four moons, Saturn and the ring, open cluster of stars, large Magellan cloud, great Orion nebula, the Southern Cross and the Iron Pot. Three shooting stars and one satellite orbiting were also seen. I came in after an hour due to the cold, but Noel and Peter remained star gazing for another hour before coming in. To defrost them both, we had a hot drink and talked until 11pm when Peter headed home. Noel and I stoked the fire and put on another log of wood for what was to be a very cold night.

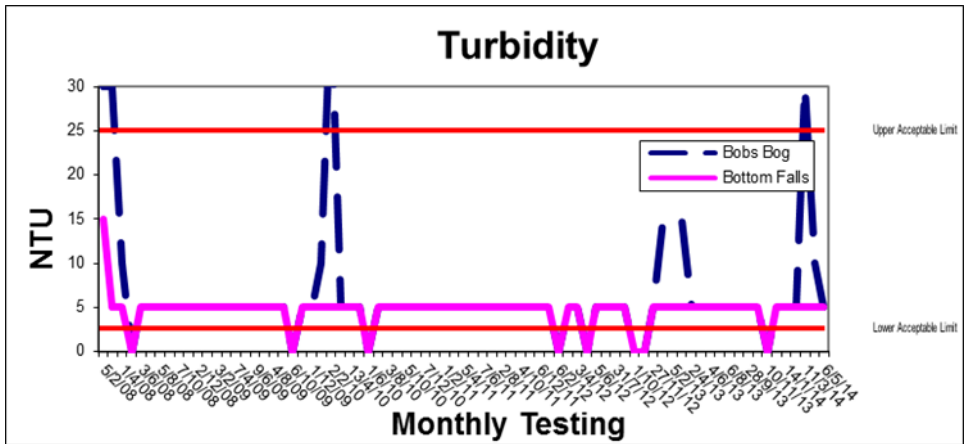
Unfortunately we were unable to stay for the Sunday activities as we had other arrangements and at 10.30am departed before anyone had arrived. It was unfortunate and we apologise to members who arrived after we had left who did not have keys to access the Centre.

Karen Manning

John Elliott's reports are as follows: -

Conductivity and Turbidity Results - as these graphs show, the conductivity ("salinity") results and turbidity results for both sites have basically stayed within acceptable limits.





Macroinvertebrate Monitoring: Bottom Falls/Below Bob’s Bog 26/4/14 - overall, this result is consistent with most of the other results from this site, which cluster around the boundary between excellent water quality and good water quality.

Date Sampled	Taxa	Signal 2 Scores	Interpretation	Water Quality
14/04/2010	8	5.6	Fair quality. Some degradation due to agriculture	Good
23/10/2010	6	6.5	Questionable quality, Indications of disturbance or poor sampling	Fair
20/11/2010	7	5.9	Good quality. Little or no environmental degradation	Excellent
10/04/2011	9	5.3	Fair quality. Some degradation due to agriculture	Good
23/10/2011	8	5.8	Good quality. Little or no environmental degradation	Excellent
21/04/2012	6	5.7	Questionable quality, Indications of disturbance or poor sampling	Fair
28/10/2012	8	5.1	Fair quality. Some degradation due to agriculture	Good
27/04/2012	7	5.4	Fair quality. Some degradation due to agriculture	Good
27/10/2013	7	5.4	Fair quality. Some degradation due to agriculture	Good
26/04/2014	9	5.7	Good quality. Little or no environmental degradation	Excellent

The following taxa were seen: -

Coleoptera	Beetles
Cyclopoda	Copepods
Diptera	True flies – Chironomids, blackflies, U-bent larvae
Ephemeroptera	Mayflies
Hemiptera	True bugs – Veliidae, backswimmers
Mecoptera	Scorpionflies
Odonata	Dragonfly larva
Plecoptera	Stoneflies
Trichoptera	Caddis flies

**GENERAL MEETING - Tuesday 6 May - John Skemp Memorial Lecture -
Dr Genevieve Gates - *Fungi***

John introduced Genevieve who opened her talk by telling members that she had never been asked to speak at a memorial lecture before, but she was pleased to be there presenting the John Skemp Memorial Lecture as she had some very fond memories of Skemps (the property), remembering a time when Tom dressed up as the ghost of Skemps amusing her children no end. She also had collections of fungi from the property when visiting with David.

Genevieve stated that she called the talk '*Fungi: the orphans in biodiversity*' because when doing biodiversity studies they are completely ignored, when going for grants they are completely ignored and Mr Skemp himself in his books talked about plants and birds and completely ignored fungi, but he must have seen them.

Her talk would be on the roll and uses of fungi, ecology of Tasmanian fungi and her book, the result of 15 years tramping the forests of Tasmania with David. To the amusement of members she added that this was sometimes amicably and sometimes not so amicably, but they managed to produce quite good work. The last section of the talk would cover taking a good photograph of fungi to assist with identification.

The roles and uses of fungi included decomposition of wood, litter and animal remains, micorrhizality with plants and lichens (a symbiotic relationship which benefits both), food and shelter for animals and food and medicine for humans. Fungi can be pathogenic as well as parasitic and the hyphae (hair like structures) bind soil particles and create space for water retention and drainage.

For decomposition there are brown-rotters, so named for the characteristic colour of rotting wood, which degrade cellulose and hemicelluloses but not lignin and the more numerous white-rotters, the only known organism to completely degrade lignin. The accompanying slide showed an example of brown rotting wood in one image while the other showed white pocket rot caused by *Obba valdiviana*.

She then moved on to fruit bodies which is the sexual stage in the life cycle of the fungus. The fruiting bodies of fungi provide food and shelter for many invertebrates and is also where the food and medicine comes from for humans. She quoted a study where 257 arthropods were found from a study of insects associated with 2600 fruiting bodies

of the northern hemisphere fungi, *Polyporus betulinus*. Many of the invertebrates live only on a specific part of the fruiting body and if you destroy a tree because fungi make it look diseased you could also be destroying the home of many invertebrates.

Genevieve stated that the fungi formed hollows in trees which provided shelter to birds and small animals and sometimes larger ones. The accompanying slide showed a wombat dozing peacefully in the hollow of a fallen tree.

We can harness fungi by culturing it on agar from the collected spores and there are many uses for different fungi. In Chile cultured fungi is used with wood pulp to break down cellulose and it works faster than chemicals while others are used for bioremediation such as cleaning up oil spills. Cultures can also be used as bio control agents by putting them in a liquid and spraying to control other fungi and weeds and a fungi is used in the UK as a green wood stain.

Genevieve mentioned the fungal pharmacy with 126 medical functions considered to be produced by medical fungi including: antitumor, immunomodulating, antioxidant, radical scavenging, cardiovascular, anti-hypercholesterolemia, antiviral, antibacterial, antiparasitic, antifungal, detoxification, hepatoprotective, and antidiabetic effects.

David and Genevieve have been to Asia for conferences and she stated that there are many stalls selling mushrooms and her slide showed David sampling from a stall with other pictures of the sales tables.

Genevieve was asked recently to give a talk on radio about toxic fungi after more deaths associated with death caps, *Amanita phalloides*, and with little notice found that the interviewer expected her to tell the audience how to stay safe while foraging for mushrooms. Her answer was don't, don't pick them.

She then described the various medical issues from fungi toxins and stated that she knows people who will get sick from supermarket mushrooms. One of the biggest problems with some of these toxins is that the effect may not show up for many days or even weeks when it is too late to identify the toxin which caused the problem. She stated that 18 people had died from eating wild mushrooms in Italy last season (Italian friends claim this is a conservative figure) and to the amusement of members said that collecting them could be dangerous as well. People had fallen off cliffs and had been mistaken for boar by hunters and shot.

The talk then moved onto mycorrhiza, fungi which have a symbiotic relationship with a plant through the roots and she gave the nine types of mycorrhiza followed by details of how both benefit from the association.

We heard that at a talk at the Tasmanian Field Naturalists by Nigel Swarts on orchids and their fungi partner, that Genevieve learnt that common orchids form an association with several fungi while rare orchids are only associated with one fungi.

A slide showed a drawing from early studies of fungi and Genevieve stated that Frank (Albert Bernhard) is considered the father of mycorrhizality as he was the first to suggest it in 1885.

She mentioned the Rambold study from 2013 detailing the omnipresence of fungi in the ecosystem and that fungal function diversity is therefore highly relevant to any kind of ecosystem analysis. She pointed out that fungal spores are just as bad for asthmatics as pollen and smoke particles, and was vehement in her condemnation of mould in the bathroom because it is poisonous and can lodge in the lungs and brain. While fungi are important in biodiversity they are often overlooked as some may only

fruit once every 15 years and you will only know they are there by the fruiting bodies.

Genevieve detailed her study over 14 years in the Tasmanian bush of the ecology of Tasmanian macrofungi including 55492 records, around 300 genera which she does not expect to add to and this included the hypogene fungi which grow under the soil and are called native truffle. These are not a true truffle and we call them earth ball. There are only around 630 fungi named which is not very many compared to the northern hemisphere where they know their mycota. Australia is new to the study of mycology, there are not many mycologists, taxonomy takes a long time to do it properly and we have a lot of unknown species, especially of the genus *Cortinarius* and corticoid fungi. The corticoid fungi are the flat fungi which look like paint or a smear on the underside of rotting wood. Using a dissecting microscope or 10 times lens you will see spines and pores.

May is the best time for fungi although you can see them all year round if you go to wet forests in November or December and a wet October will cause what is called a spring flood. Having said that Genevieve described a bad season in Hobart with only 10 species found in March she promised that May would be better. Come May it was still dry and they found only five species.

Genevieve was happy to note that her online Ph.D thesis had 5700 partial downloads from 93 countries. A slide showed an article from the paper detailing how Genevieve and David became lost on the Forestier Peninsular during a field trip. They were found just before a big search party headed off from Hobart. Another slide was an unflattering one of a miserable looking Genevieve.

She told us that she did the Cradle Mountain walk to add to her collecting points over the state choosing to stay in huts using the heaters to dry the fungi collected. A slide here showed her well kitted out with a map included showing the areas surveyed. "This is why I did it" she said showing a slide with 18 pictures of fungi and although many showed the underside for identification purposes there was still great beauty in them.

She then introduced what she said was a favourite part of her talk, the Gondwanan connection. A list of 10 fungi which are all polypores in the *Nothofagus* forests of the Patagonia region of Argentina and Chile. She said she felt right at home with so many Tasmanian fungi in a *Nothofagus* forest.

At this stage we had a false end to the talk because of a problem with the slide show with an acclamation from members and a request for questions. She eventually found the slide show she wanted to present, including the first slide with pictures of the types of fauna and flora which attract funding for research. She then went on to explain that fungi are neither in the plant nor animal kingdom and followed up with some information on fungi and that mushroom and toadstool are colloquial terms.

A slide illustrated the hair like structure of the mycorrhiza followed by one of a bush fire, a leaping bettong, the remains of fungi and a selection of earth balls. Genevieve explained that some small animals will eat these fungi when fire has destroyed their usual food.

Jumping through slides covered earlier brought Genevieve to her book with two slides showing pages including the 'Keys to the gilled genera' and the a 'Table of characteristics'. Next we were introduced to the 'CLUES to IDENTIFICATION' and it is worth mentioning these in full. When you find a fungi you should note the
*Substrate: wood, soil, litter, dung *Spore print colour * Presence or absence of veils *

Gills, gill like structures, pores, gill attachment, gill edges * Colour changes with bruising * Odour. She also stated that essential equipment for identification included a mirror, a 10x lens, a camera and her book.

A slide showed a collection of spore prints as she explained in detail the clues to identification. We learnt that agarics are fungi with gills and non-agarics are everything else including polypores, boletes, cups, discs, leathers, jellies, earth tongues etcetera. To the amusement of the members we saw a photo of something which was sent in for identification which was not a fungi but maybe the innards of an animal. There followed impressive photos of fungi showing details of gills as used for identification followed by what she considered to be good and bad images sent to her with a request for identification of the fungi.

This time the presentation ended and after more than ten minutes of questions and answers Roy gave the thank you with the usual acclamation by members. Tom then told members the story behind the memorial lecture before presenting Genevieve with her medallion.

Noel Manning

FIELD TRIP - Sunday 11 May - Liffey Falls State Reserve - Fungi

Members and friends met at the lower car park in the Liffey Falls State Reserve on a sunny autumn morning. After a quick cuppa and booting up we headed off along a well formed track surrounded by myrtle beech, musk daisybush, soft treefern and forest flaxlily to name a few species. The mosses on fallen trees and stumps was very lush. Mike walked with us for about half an hour, showing us some of his images from the walk ahead, before going back to his car to take our lunches to the top picnic ground.

The group had already split into smaller groups; those wanting to walk and enjoy the reserve and a smaller group observing and recording by name or an image, all the fungi along the trail. For the latter group this proved very slow and after three quarter of an hour, Roy decided to return to his car and drive around to our lunch destination and walk in from that end and meet up with us.

At the first bridge we had been walking well over an hour (the time it should have taken to get to the far end), and had found lots of interesting fungi. After two and half hours, Prue said 'eyes up and walk', but then decided that if we hadn't already seen the fungi we would stop and take photos etc. We met four of our group who had already had lunch and a look around and were heading home. Catching up with Louise prior to the track into the lower waterfall, we found a large patch of flame fungi on the bank. At 1.45 pm we met Roy who intended to walk down to the second bridge before returning for afternoon tea. We also met Noel and Tina who were doing the return trek to retrieve their cars. Prue, Louise and I then spent another forty-five minutes on the twenty minute return walk, finding more fungi, including some very interesting brackets, toothed fungi and russulas.

After our four hour walk Prue and I ate our lunch while looking at specimens. With the help of Roy and Louise we put names to some of those collected and photographed, unfortunately there were quite a few yet to be identified.

With other participants heading off, we sat and enjoyed mud cake and chocolate brownie to celebrate Mother's Day, as we had missed the earlier lunchtime celebration.

It was a very enjoyable warm day and we were pleasantly surprised by the amount of young families we met on our walk who were enjoying the great outdoors, the water crashing over the falls was a spectacular sight.

Karen Manning



Liffey River

Ferns: *Blechnum nudum*, fishbone water fern; *Blechnum watsii*, hard water fern; *Dicksonia Antarctica*, soft treefern; Epiphyte single leaf fern (not kangaroo fern); *Grammitis billardieri*, finger fern; *Histiopteris incisa*, bat's wing fern; *Hymenophyllum* sp., filmy fern; *Microsorium pustulatum*, kangaroo fern; *Polystichum proliferum*, mother shield fern.

Plants: *Atherosperma moschatum*, sassafras; *Coprosma nitida*, mountain currant; *Dianella tasmanica*, forest flaxlily; *Nothofagus cunninghamii*, myrtle beech; *Olearia argophylla*, musk daisybush; *Oxalis* sp; *Pimelea* sp; *Pittosporum bicolor*, cheesewood; *Pomaderris apetala*, dogwood; *Zieria arborescens*, stinkwood.

Moss/Lichen: *Hypopterygium didictyon*, moss; *Peltigera* sp., foliose lichen; *Pseudocyphellaria billardieri*, foliose lichen; *Usnea* sp., old man's beard – lichen

Fungi: *Aleuria* sp., cup fungi; *Ascocoryne sarcoides*, pink gelatinous clubs; *Aurantiporus pulcherrimus*, strawberry bracket fungus; *Australoporus tasmanicus*, bracket fungi; *Austropaxillus muelleri*, funnel shaped cap with forked gills; *Byssomerulius corium*, leathery shelf fungi; *Calostoma* sp., puffball; *Chlorociboria aeruginascens*, blue wood staining fungi; *Clavaria* sp., fine beige coral fungi growing on log; *C. miniata*, red flame fungus; *Collybia eucalyptorum*; *Coprinellus disseminatus*, fairy inkcap; *Dermocybe* sp., black/brown glutinous with white gills; *Entoloma* sp (possibly *E. rufobasis*); *Geastrum triplex*, earth star; Glossy purple fungus with white gills and purple tinge to stipe; *Hericium coralloides*, spine fungi; *Heterotextus miltinus*, golden jelly-bells; *Hohenbuehelia aff clelandii*; *Hygrocybe lewellinae*, mauve splitting waxcap; *H. miniata*; *Hypholoma brunneum*; *H. fasciculare*, sulphur tuft; *Hypoxylon aff. chrysoconium*; *Lentinellus* sp (possibly *L. Tasmanica*); *Lycoperdon pyriforme*, puffball; *Mycena albidocappilaris*; *M. cystidiosa*; *M. interrupta*, pixie's parasol; *M. mulawaestris*; *M. toyerlaricola*; *Mycena* sp; *Mycena*, bell shaped cap, cream with stripe – large cluster; *Mycena*, light brown in soil; *Mycoacia subceracea*, golden splash tooth; *Phellinus robustus*; *Postia* sp; *P. pelliculosa* (black variety); *P. punctata*; *Pseudohydnum gelatinosum*, toothed jelly; *Russula* sp; *Stereum ostrea*, golden curtain crust; *Trametes* sp, black furry with grey/white edge with pores; *T. versicolour*, polypore with multiple thin brackets varying in colour; *Tremella fuciformis*; *Xylaria apiculata*, little clubs some with white tips.

SKEMPS DAY - Saturday 24 May - Fungi

Eighteen members and three visitors braved the cold weather to visit Skemps to hunt for fungi. The day was overcast on arrival, but the sun finally came out and it was enjoyable sitting out under the verandah soaking in the warmth. Around 10.30am everyone was ready so we headed up the Power Track, our aim was to make it to the Ferngully.

On the Power Track we found many varieties of *Mycena* only a few of which we could definitely identify, along with a large variety of others species including *Cordyceps gunni*, a fungus that emerges from soil where it has parasitised a caterpillar. Although we all set off together, Roy, Louise, Prue and I were left behind scouring the bush off the track for other species taking many photos and vying for the best position to take photos to submit for the calendar.

We reached the driveway, some 500 metres from the Centre, after 12.00pm and as we were feeling hungry decided to return for lunch. It took another half an hour walking the roadway to return to the Centre, as we were finding other fungi that we hadn't seen today, there were many scleroderma, pagoda fungus *Podoserpula pusio*, and coral fungi to name a few. At the snail's pace we were going, there was no way that we were going to see the Fern Gully today.

Arriving at the Centre we were surprised to see only Marion, Lois and Claire; they told us that Jill and her three grandchildren had walked two tracks before heading off to a soccer game. While eating our lunch, small groups of members returned for their lunches, they had taken different tracks and most reported seeing a large variety of fungus. Tina was rather excited about her find, a tiny skeleton of probably a mouse,

which she will bring along to identify at the Skullduggery Day at Skemps next month.

After lunch Roy, Louise, Tony and Christine went for another walk, while others staying at the Centre looking at images from the Liffey Falls field trip and discussed the program for the later part of the year.

By 4pm the temperature had dropped quite a bit and rather than put another few logs on the fire, we tidied up and headed home after seeing what we all agreed was an impressive amount of fungi.

Karen Manning

Bisporella citrina; *Cortinarius* sp.; *Cortinarius austroveneta*, green skinhead; *Cordyceps gunnii*; *Entoloma* sp.; *Galerina hypnorum*; *Galerina patagonica*; *Heterotextus miltinus*, golden jelly-bells; *Hygrocybe chromolimonea*; *Hymenoscyphus* sp.; *Hypoloma sublateritium*, brick caps; *Laccaria* sp.; *Lentinellus pulvinulus*; *Leotia lubrica*, jellybaby; *Lycoperdon periatum*; *Lycoperdon pyriforme*; *Marasmiellus affixus*; *Mycena albidocapillaris*; *Mycena cystidiosa*; *Mycena* aff. *epipterygia*; *Mycena interrupta*, Pixie's parasols; *Mycena kuurkacea*; *Mycena mulawaestrus*; *Mycena viscidocruenta*; *Podoserpula pusio*, pagoda fungus; *Polyporus badius*; *Postia* sp.; *Pseudohydnum gelatinosum*, toothed jelly; *Russula* sp.; *Ryvardenia campyla*, weeping polypore; *Scleroderma* sp.; *Stereum illudens*



Hypoloma sublateritium

AUSTRALIAN PLANT SOCIETY MEETINGS

LFNC members are welcome to attend APS meetings held on the third Tuesday of the month at Max Fry Hall, Gorge Road Trevallyn at 7.30 pm. Their next meetings will be held on:

June 17 - Matthew Larcombe Tasmanian Hadenbergia conservation

July 15 - Speaker to be advised

Visit their [website](#) for future program details.

QVMAG EXHIBITIONS

2014 The Bug Day Out! A science club at the QVMAG Museum, Inveresk for children, teens, adults and seniors that focuses on the amazing diversity of our natural work. Sessions run from 1pm to 3pm. For more information please telephone 6323 3798 or email bookings@qvmag.tas.gov.au.

Additional Information

Club Outings:

1. All outings depart from Inveresk carpark (near Museum entrance) at 9 am unless otherwise specified. Internet site updated regularly to reflect short notice changes. Saturday all-day parking cost is \$3.00. Sunday parking free.
2. You need to provide your own food and drinks for the outing unless otherwise specified. Morning tea is normally provided by the bus company on bus outings.
3. When travelling by car in convoy, each driver is responsible to ensure that the vehicle behind is in sight immediately after passing each cross road or fork in the road.
4. When car pooling, petrol costs should be shared between all the passengers, including family of the driver, and based on other clubs the Committee suggested \$11 per 100 km. This is a guideline only.

Name Tags: Name tags are to be worn at meetings and on outings.

Tea/Coffee: A levy of 50c is currently charged for supper provided at meetings.

Field Centre: All members have access to the John Skemp Field Centre. Contact our booking manager, John Elliott on 6344 9303 regarding availability and keys.

Field Centre Phone Number - 6399 3361

Postal Address: PO Box 1072 Launceston 7250

Internet site : <http://www.lfnc.org.au>

E.mail : secretary@lfnc.org.au