

1 May 2015 Ken Walker (<a href="mailto:kwalker@museum.vic.gov.au">kwalker@museum.vic.gov.au</a>) Museum Victoria. Edition 7.

Hi All – Yet another exciting and interesting week of BowerBird uploads. If anyone has ever been night insect collecting at a light-sheet then that is how I view BowerBird. When light-sheet trapping, you stand in the overpowering brightness of a UV lamp and everything else around you is jet black – due to the intensity of the UV lamp. So, you never see insects flying into the sheet until they "just pop" onto the sheet. For me, BowerBird is like that. I continually enjoy the wide range of animals, plants and fungi that just "pop" onto my PC screen and I go "WOW" when I see an image and its location.

I recently played email ping-pong with the developers of a Canberra based citizen science website called Canberra Nature Map (<a href="http://canberranaturemap.org/">http://canberranaturemap.org/</a>). The original idea of that website was to assist with weed management by a ACT Government plant and weed conservation agency. Interestingly, the website caters for records only from the Canberra region and will only accept record for plants, orchids, ferns, grasses, sedges and rushes, fungi, mosses and liverworts.











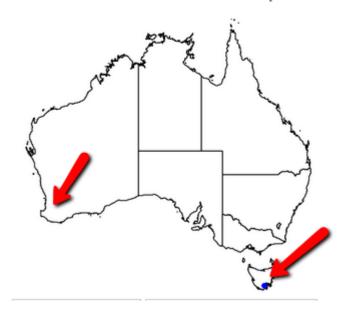
Each record is checked by several moderators before it is accepted. The developers of the Canberra Nature Map website could not understand the reason(s) behind BowerBird which "just" takes any record from anywhere in Australia. How is the data used, collated, verified were some of the questions they asked. They found it difficult to appreciate the value of "Serendipity" behind BowerBird and how could it work without a managerial hierarchy and a team of moderators. I do enjoy such debates as they reinforce the original ideas behind BowerBird – contribute to Australia's Biodiversity knowledge: Speaking of anything from anywhere ... Jean and Fred Hort posted this non-biting midge image from just east of Perth:



Photo Jean and Fred Hort

Fortunately, the world expert on non-biting midges is an Australian called Pete Cranston, whom I have known for many years. So I flicked the image to Pete and within an hour he returned a species level identification: Chironomidae - *Polypedilum Polypedilum nubiferum.* Interestingly, ALA (Atlas of Living Australia) had only one other record for this species from SW of Hobart Tasmania – AND IT CAME FROM BOWERBIRD! Jean's WA record is new for that state.

#### Occurrence records map



And speaking of anything from anywhere – how remote is this location? John Read was in the area and photographed a:

Sighted 24 Apr 2015



Pukatja Homeland SA 0872, Australia

A desert scorpion belonging to the genus Lychas.

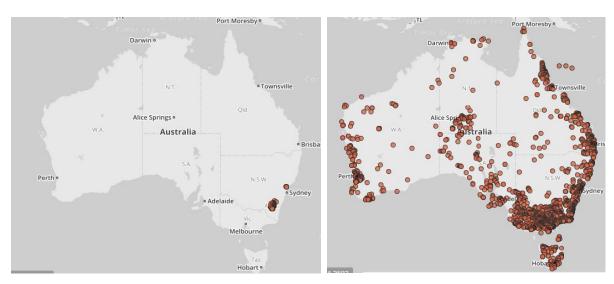


Photo John Read.

A comparison of records between Canberra Nature Map versus BowerBird on ALA shows. Different horses; Different Courses

#### Canberra Nature Map

BowerBird



# Going, Going, Gone!

This wonderful set of images makes you feel like you were there .. location just south of Perth: Skipper versus Crab spider







Photos by Daniel Heald

# Have you ever wondered .. why does this spider have a cross in its web?



Photo by Dave Walter.

The role of the cross-like web decoration, called the stabilimentum, has long been a puzzle. At first thought to strengthen or 'stabilise' the web, more recent ideas associate it with capturing prey or avoiding predators. The ribbon-like silk reflects ultra-violet light strongly. Such light is attractive to flying insects, which use it to locate food sources like flowers and to navigate through openings in the vegetation. If the stabilimentum silk attracts insects it may increase the web's prey catching efficiency. The silk decoration could also make the web and its owner more obvious to day-active predators like birds and wasps. However, the variability of the shape of

the cross decoration (a complete cross; a partial cross with from one to three arms; or sometimes absent altogether) could make web recognition confusing for the predator. Another possibility is that the stabilimentum advertises a warning to predators like birds to stay away - after diving through the sticky web, the effort required to clean silk off plumage may deter birds from trying again.

# From the BowerBird Recipe book.

Linda Rogan uploaded these wonderful images of a Galah presumably digging out a nesting hollow ..... which reminded me of a "Bush Recipe" on "How to Cook a Galah".





- 1. Pot of boiling water
- 2. Add carrots, spuds, onions and season with S&P
- 3. Toss in the bird and add an axe head
- 4. Simmer
- 5. When axe head softens, throw out bird and eat axe head.

Apparently delicious!!

# Fungal delights.

Several Victorian localities have provided a wealth of fungal images taken in the past 2 weeks – a sure sign it is cool and damp in Victoria! *Mycena mulawaestris* below and above:





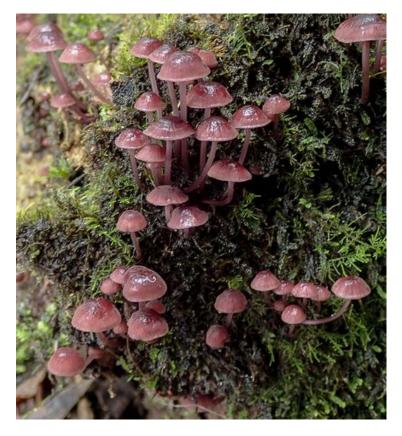
## Mycena austrororida



Collybia eucalyptorum



## Mycena kurramulla



## Calocera sp.



#### Russula



Photos by David Akers

## Ox-tongue fungus - Fistulina hepatica near Churchill, Vic



Photo by Tamara Leitch

## Mycena interrupta



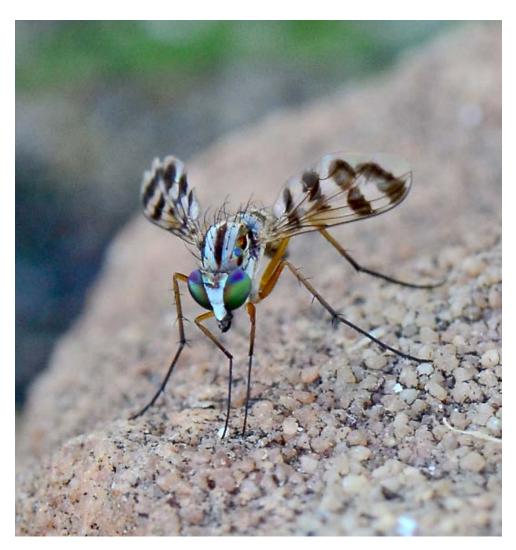
Cortinarius metallicus: A rare fungus that only grows under Nothofagus.



Photos by Reiner Richter

# Our "Bird-bath" photographer is back!

Yes, Maree – our well known and much admired western Victorian "bushy" photographer, who spends her days (sorry, only part of her days!) lying on her tummy photographing insects that visit her bird-bath is back. I asked Maree if her husband had ever called an ambulance when he saw her lying prostrate on the ground ... Graham's in trouble I fear. Well, Maree has looked up and is now photographing insects visiting her flowering plants. Maree commented: "At least I did not have to lie flat on my tummy for these. I set up the tripod and could sit on a chair. How's that for taking photos at ease." And what photos! Long-legged fly Dolichopodidae *Heteropsilopus trifasciatus* 



This wasp had me stumped when I first looked it. Then I noticed the enlarged and toothed hind tibia (see red arrow) which places it in the superfamily Chalcidoidea. After about 30 minutes of research I finally realised it was the "hen's tooth" of Hymenoptera – the extremely rare bee parasitic family Leucopsidae. There are 11 Australian species in the single genus *Leucospis* but there is so little reference material. On ALA, this is the first Victorian record. This is a male specimen – note the truncate end of the abdomen. From the known records, they seem to only parasitise solitary bees especially leaf cutter bees – Megachilidae. What a thrill it was for me to see this image. Another "hen's tooth" ... they're getting more and more common aren't they! This is probably a new species.



Photo by Maree Goods.

And finally, for what has to be one of my favourite images of the week comes from Maree's garden. Maree has captured both sexes (right winged specimen is the male and the left wingless specimen is the adult female) of the arctiid the "Clouded footman" moth - *Anestia ombrophanes*. When the wingless female emerges from her pupa (see in between the two moths), she releases a pheromone that attracts the male to fly to her. Notice her swollen abdomen - full of eggs.

This image has it all !! Male, female and pupal case (note the pupal case has the urticating larval hairs woven around the pupa itself.) Also note the large and pectinate "nose" or antennae on the male moth – All the better to smell you with ..



Photo by Maree Goods

Maree sent me an update image a few days later and now the female has laid eggs on her old pupal cocoon case. The female's abdomen looks less swollen than in the original above image:



**Photo Maree Goods** 

There is a "quirky" BowerBird Project called "Traces" that shows evidence of where an animal has been and you have to work what animal made the traces. Here is one such example just uploaded from just south of Perth.

What do you think made these tracks? Answer at the end of this BowerBird Bugle edition.



Sighted 18 Apr 2015



7 Magnetic Square, Halls Head WA 6210, Australia

Or here is another track from about as remote a place as you can get in Australia! I love the stubby holder used as a length marker. What else would you have handy in such a remote, dry location but a well-worn stubby holder???



Giles-Mulga Park, Ngaanyatjarra-Giles WA 0872, Australia



Photo by John Read

These tracks were made by the Northern spiny-tailed gecko, *Strophurus ciliaris*.

# Favourite images from this week ....



Carder bee (Afranthidium repetitum) in Brisbane 20 March 2015. Photo by Erica Siegel



And, when is a bird dropping not a bird dropping? *Celaenia excavata* 28 April 2015 Photo by Suzanne Jones

And finally, I imagine this is an "Ant's view" of this magnificent fungal image from Gippsland, Victoria 13 April 2015 : Psathyrella sp.



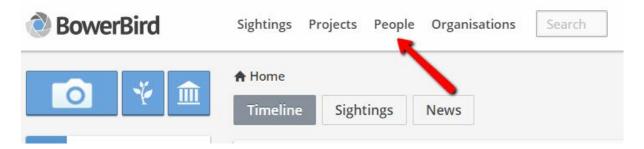


Photo by David Akers

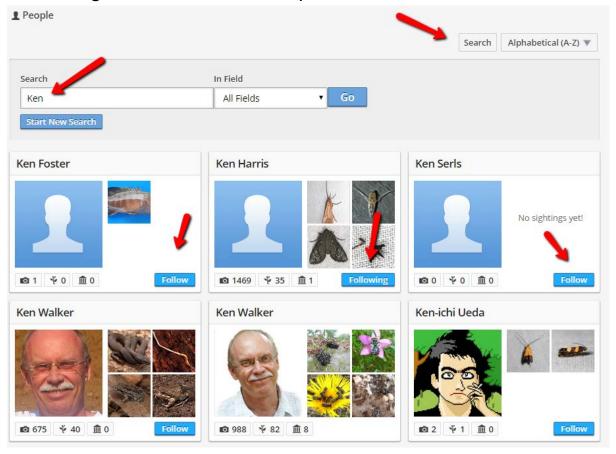
# BowerBird Tip.

Apart from Joining Projects, did you know you can Follow People? If there is someone whose images you like, then **Follow** them rather than joining all of the Projects where they put their images.

First – Click the "People" icon on the top line.



Then click Search and type in a Name. When you find the person you want to follow, simply click the "Follow" in the bottom right corner of their template.



And, just as I wrapping up this edition, this little weevil gem came in from John Read – our remote South Australian photographer – from the middle of nowhere: Pukatja Homeland SA

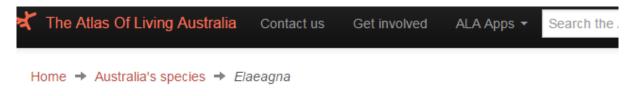


Pukatja Homeland SA 0872, Australia



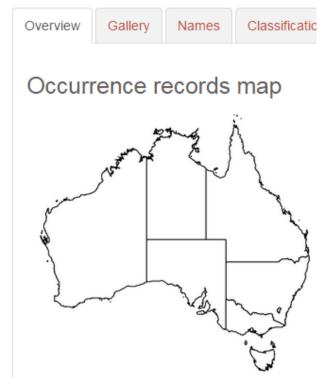
I sent John's images to Australia's CSIRO weevil expert in Canberra who placed it to genus but suggested it was an undescribed species and noted: "The genus seems to be associated with saltbush (*Atriplex*)". A check on ALA for other records of this genus showed none. John's record will provide the first dot on the map and image for ALA.

I think that's a nice way to finish this week!



## Elaeagna Pascoe, 1870





### Haveagoodweekend ....

#### Cheers - Ken

(If you wish to leave this email list, please contact me directly at <a href="mailto:kwalker@museum.vic.gov.au">kwalker@museum.vic.gov.au</a> – else share with your friends)

Answer to traces photo: Portuguese Millipede tracks. How many correctly guessed it?