



## Congratulations

The RSB Director's 2021 RSB best thesis prize was awarded to **Carlos Pavon Vazquez** (Keogh Group, E&E) *From genes to communities: an integrative approach to the evolution of varanidae*. Special mention to **Zu Zhou** (Whitney Group, PS) and **Kelly Chapman** (Djordjevic Group, PS) for also producing outstanding theses.



**Daniel Yu** (Williams Group, PS) received the best poster prize in the category of protein structure at the Crystal Lite meeting (Melbourne May19-20) run by the Society of Crystallographers in Australia and New Zealand.

**Timothee Bonnet** (Jennions Group, E&E) has received great national coverage on his research. New RSB-led research published in *Science* shows that adaptive evolution is currently more rapid than expected in wild vertebrates (<https://doi.org/10.1126/science.abk0853>). **Timothee** and **Loeske Kruuk** worked with 38 co-authors worldwide to measure the current rate of adaptive evolution in 19 bird and mammal populations.



The research has generated 164 media items with an upper potential audience reach of 12,682,086.



The CPGA (Canberra Protein Group) Symposium was held on the 17th June 2022 to select a representative to give a guaranteed oral presentation at ComBio2022 in Melbourne. The ANU had three excellent EMCR speakers, **Sacha Pulsford** (Jackson Group, BSB), **Cassidy Whitefield** (RSC), and **Carl**



**McCombe** (Williams Group, PS), who were short-listed based on their conference abstracts, and all three delivered fantastic talks.



An independent panel selected **Carl**

**McCombe**, PhD candidate, to represent the CPGA. Congratulations Carl! A People's Choice Award was also selected by the audience and will be announced in the next CPGA meeting on 1st July.

## News

**Ryszard Maleszka** (BSB) was an invited speaker at the inaugural Clinical Epigenetics Conference in the Baltic city of Szczecin (Poland). In the spirit of solidarity with Ukrainian academics, his talk was entitled *Nothing in [epigenetics]*



*makes sense except in the light of evolution*, which is a paraphrase of Theodosius Dobzhansky's famous 1973 essay criticising anti-evolution creationism. Dobzhansky was a Ukrainian scientist who studied at the University of Kyiv before moving to the USA

where he became one of the most influential geneticists and evolutionary biologists of the 20th century. (<https://www.clep.org/>)

## PhDs submitted

**Gregory Gauthier-Coles** (Broer Group, BSB)

*A Study of Cellular Amino Acid Homeostasis Identifies Novel Targets, Inhibitors and Combination Therapies in Cancer*

**Rocco Notarnicola** (Nicotra Group, E&E) *Responses of an alpine plant to warming temperatures: from plasticity to molecular pathways*

## PhDs awarded

**Fernanda Alves de Amorim** (Langmore Group, E&E)

*Conservation biology of forty-spotted pardalotes (Pardalotus quadragintus)*

**Jian Chen** (Rathjen Group, PS) *Investigation of the recognition and activation of plant NLRs*

**Zoltán Kócsi** (Zeil Group, E&E) *Using reconstructed visual reality in ant navigation research*

**Veronica Alozie-Chidi** (Gordon Group, E&E) *Why do some human associated escherichia coli strains lack antibiotic resistance?*

**Tanuka Sen** (Verma Group, BSB) *Study of the functional roles of hypothetical proteins in the virulence of Shigella flexneri serotype 1c*

## PhDs commenced

**Dominik Fachet** (Saliba Group, BSB)

**Frederick Jaya** (Lanfear Group, E&E)

## Welcome

**Aiden Beauglehole** (Brock Group, BSB) will be working on engineering protein secretion that has been funded by an industry collaboration.

Many international students have recently arrived over the semester from other countries after not being able to travel to Australia for the past two years! So it's been a big deal that they are finally here and there have been some welcoming events. The School hosted a welcome lunch introducing the new masters cohort to established post graduate students as well as academic staff and researchers.

A poster symposium for our BIOL8291 class where students presented findings from novel research



conducted by ANU science laboratories (from peer-reviewed manuscripts). These students presented research from laboratories that they are interested

in collaborating with when they conduct their Masters research year. The symposium was conducted in a dual delivery-online and in person interaction!

There was a celebration of the completion of the semester.



## Farewell

Farewell to **Helen Bothwell** (Borevitz Group, PS/E&E)

While at ANU, Helen began as a post doc under the ARC Centre for Plant Energy Biology in the Borevitz Group (PS), then moved onto an ARC DECRA Fellowship investigating the genomics of drought adaptation in eucalyptus. Helen worked closely with the Upper Snowy Landcare Network and ACT Parks & Conservation on bushfire recovery and research projects, including planting of 3500 eucalyptus. In association with the High Country Dieback Network, Helen investigated genetic-based resilience to climate stress in snow gums. Helen will be joining the University of Georgia as an Assistant Professor of Landscape Conservation Genetics.

## In the media

In mid-June we released some exciting preliminary results from our conservation translocation program for the northern corroboree frog in the ACT. In the video **Benjamin Scheele** (Keogh and Cardillo Groups, E&E) talks about the program and the results and a short paper outlining the rationale behind the project can be found at the [link](#).



Here's a link to the [ABC TV 7pm New Bulletin](#), Corroboree Frog hops away from extinction, 15th June.

Here's a link to the [associated research](#).

## Papers

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Bonnet T, Morrissey MB, de Villemereuil P, Cockburn A, Osmond HL, Kruuk LEB et al. Genetic variance in fitness indicates rapid contemporary adaptive evolution in wild animals. *Science*. <https://doi.org/10.1126/science.abk0853>

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Maleszka R & Kucharski R. Without mechanisms, theories and models in insect epigenetics remain a black box. *Trends in Genetics*. <https://doi.org/10.1016/j.tig.2022.05.004>.

Mead OL, Hahn EE & Adamska MA. Hybrid genome assemblies of marine bacteria isolated from the sponge sycon capricorn. *Microbiology Resource Announcements*. <https://doi.org/10.1128/MRA.00858-21>.

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