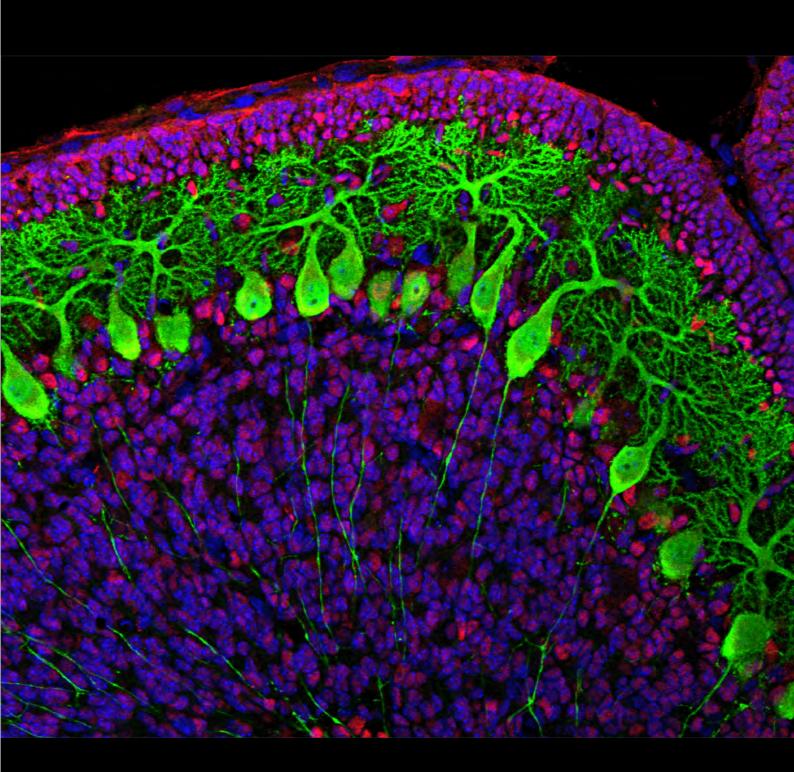
# ANZSCDB

Australia and New Zealand Society for Cell and Developmental Biology Inc.





### **SUMMER NEWSLETTER 2018**

## ANZSCDB

Australia and New Zealand Society for Cell and Developmental Biology Inc.



### **SUMMER NEWSLETTER - JANUARY 2019**

Dear ANZSCDB members,

The summer and the season of festivities are here as I share with you the news of the Society. I hope you have had a successful year of research and fellowship funding, and if not, as an ever-resilient cell and/or developmental biologist, you are already busy planning for the next round of grant applications. Something to look forward to in 2019 and beyond are the new NHMRC Funding Schemes, which will no doubt provide many challenges and, hopefully opportunities for the ANZSCDB community.

At the last AGM held during the 2018 ComBio Meeting in Sydney, a number of new ANZSCDB office holders were elected. I extend my very warm welcome to three new

In this issue

- Key Dates
- ANZSCDB Corporate
  Member News
- Updated information on ANZSCDB State Representatives
- Meeting Reports

Committee Members, Aleksandra (WA), Brett Collins (Qld) and Julia Horsfield (NZ), and new State Representatives, Julie Thoms (NSW), Srikanth Budnar (Qld), Cristina Keightley (Vic), Winnie Kan (SA) and Carl Mousley (WA). I look forward to working with the new committee members and the state representatives in promoting the objectives of ANZSCDB. I would like to thank the outgoing committee members, Peter Koopman (Qld) and Miranda Grounds (WA) and o utgoing Representatives Hungjun S hi (NSW), Larisa Haupt (QLD), Alex Combes (VIC), Sarah Boyle (SA), Oliver Rackham (WA) and Caroline Beck (NZ) for their invaluable contribution to ANZSCDB.

At the 2018 ComBio Meeting we also recognised outstanding contributions to Cell or Developmental Biology through various society awards. As previously announced, the President's Medal and Emerging Leader Awards were presented to Sally Dunwoodie and Michael Piper, respectively. Additionally, Sarah Boyle was presented the Toshiya Yamada Early Career Award for the best oral presentation by a junior postdoc, Olga Zaytseva received the David Walsh Student Prize for the best oral presentation by a student, Jess Robinson received the Keith Dixon Prize in Developmental Biology for the best poster presentation in the field of developmental biology by a student, and Daisy Shu was awarded the Cell Biology Student Poster Prize. The ANZSCDB travel bursary awardees who attended the 2018 ComBio present their experiences in the following pages. As a president of the society I very much enjoy the privilege of recognising the best and b rightest of our community and extend my very warm congratulations to all those who received ANZSCDB awards or travel support.

The state meetings are our most popular meetings, providing local members and non-members alike a great opportunity to engage with each other, present their work and network. Several of these meetings were held in the past few months and the Newsletter provides reports from the State Representatives, who play the leading roles

in organising the meetings. These meeting also recognise local early and emerging talent in the Cell and Developmental Biology fields by awarding prizes. On behalf of the society I am grateful to the State Representatives and the local organising committee members for their hard work and dedication in raising sponsorship funds and organising these highly successful meetings.

I and six other members of the ANZSCDB, including Natasha Harvey, Ben Hogan, Ian Smyth, Edwina M cGlinn, Jo Bowles and Michael Piper have just re turned from

attending the 2018 Indian Society for Developmental B iology ( InSDB) Biennial Meeting Kanpur, India. Promoted а joint meeting between I nSDB and ANZSCDB, this was an excellent Developmental Biology c onference w ith presentaoutstanding tions b y e stablished investigators as well as many ECRs and students. Such ioint meetings provide us with opportunity to e ngage network and scientists and ECRs in our region, which hopefully will



Photograph courtesy of Dr. Jo Bowles

result in new research collaborations, supported by inter-country funding schemes, such as the Australia-India Strategic Research Fund.

As you know, the Society's Newsletter (prepared by our tireless Secretary Michael Samuel, with the assistance on this occasion by SA State Rep Winnie Kan) provides a forum of communication for all members. We are always looking for brief profiles of our members and exciting research reports for the Newsletter, so if you have a story to share, please write to us.

I look forward to catching up with many of you in 2019.

Season's Greetings and all the very best for the New Year.

### **Sharad Kumar**

### **Key Dates**

**18<sup>th</sup> – 22<sup>nd</sup> March 2019: The Hunter Meeting,** Hunter Valley NSW. You can register your interest and stay tuned for registration information.

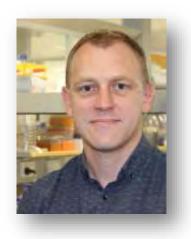
**20<sup>th</sup> – 23<sup>rd</sup> October 2019: DOHaD 2019**, Melbourne, Vic toria. You can register you interest on the website and stay tuned for registration information.

### A very warm welcome to our New ANZSCDB Committee Members



### Prof. Aleksandra Filipovska

Professor A leksanda Filipovska is an NHMRC S enior Research Fellow and Research Professor at the Harry Perkins Institute of Medical Research and the University of WA. H er re search interests are in the re gulation of mitochondrial gene expression by RNA-binding proteins in health and disease. In addition, her research group uses next ge neration sequencing technologies t o i dentify pathogenic mutations in mitochondrial genes that cause mitochondrial disease in genetically isolated populations.



#### A/Prof. Brett Collins

Brett Collins is an NHMRC Career Development Fellow and head of the Molecular Trafficking Lab at UQ's Institute for Molecular Bioscience. He was a lead investigator in the seminal s tructural s tudies of A P2, the p rotein adaptor molecule central to clathrin-mediated endocytosis and has since defined the molecular basis for the function of critical proteins regulating membrane trafficking and signalling at the en dosome or ganelle. H is t eam is n ow f ocused on understanding ho w d iscrete m olecular interactions between proteins and lipids control these processes in human cells.



### A/Prof. Julia Horsfield

Dr Julia Horsfield is a developmental geneticist based in the Department of Pathology at the University of Otago. She leads a research group investigating the role of chromosome structure in animal development and cancer. Her specific research interest lies in cohesin proteins, which are present in all animals and important for cell division and DNA repair. Cohesin proteins' main function is to hold replicated c hromosomes to gether until c ells d ivide. However, they are also involved in gene expression and this is whe re J ulia's re search focus I ies, part icularly in relation to Cornelia de Lange and Roberts syndromes.

### And to our new ANZSCDB State Representatives



### Julie Thoms (NSW)

I am currently a Senior Research Associate with Prof John Pimanda at the Lowy Cancer Research Centre at UNSW. My research focuses on und erstanding how gene regulatory networks determine stemness or self-renewal haematopoietic stem and progenitor cells (HSPCs), how these networks are turned off during normal differentiation, and how leukemic cells reactivate stem cell programs. In the long-term we hope to exploit the difference between normal and leukemic stem cells in order to identify new therapeutic targets for leukemia. I originally trained as a cell biologist working on the actin cytoskeleton, but I have always been fascinated with DNA, and most of my work now involves genome wide techniques including ChIP-seg and RNA-seg. I

enjoy mentoring students and am a strong advocate for equity and inclusion in the science community.



### Srikanth Budnar (QLD)

I completed my Ph.D. studies at the Tata Memorial Centre in Mumbai, India in 2012 and joined Prof. Alpha Yap's group at the Institute of Molecular Bioscience, UQ, as a post-doctoral scientist. My research focuses on understanding signalling pathways at cell-cell and extracellular matrix adhesion and their role in controlling the behaviour and function of epithelial cells and tissues. Using a combination of quantitative imaging, molecular tools, genome editing, and quantitative proteomics, my research aims to discover pathways and mechanisms that dictate the behaviour of epithelial cells and tissues during cell-division, migration and oncogenic insults.



#### Cristina Keightley (VIC)

I am a Group Leader and Senior Lecturer at the La Trobe Institute for Molecular Science (LIMS), La Trobe University. My lab is fascinated by the transcriptional regulation of myeloid d evelopment a nd d isease. We use z ebrafish to discover and understand molecular pathways in haematopoietic development, in part icular, the role of transcription factors and mRNA splicing regulators.



### Winnie Kan (SA)

I am a postdoctoral re search s cientist in the C ytokine Receptor Labo ratory at the C entre f or C ancer B iology, SA Pathology and University of South Australia. My research interests are on the as sembly and f unctional activation of cytokine re ceptors a nd the ir deregulation in c ancer and inflammatory diseases. I am currently working with Prof. Angel Lopez to investigate how the  $\beta c$  family of cytokines activate the ir re ceptors to initiate d ownstream s ignalling pathways and functional effects.



### Carl Mousley (WA)

My long-term research interests centre on understanding how secretory pathway f unction is re gulated and ho w it coordinates cell cycle progression. My pre-doctoral research at the U niversity of Manchester focused on understanding how the ER translocase, the Sec61 complex, is assembled. During this time, I re alised that very little, if any, consideration was given to how the organellar lipid environment regulates the activity of the macromolecular complexes that promote vesicle trafficking. With this in mind I conducted my post-doctoral research in the laboratory of one of the world's leading lipids ignalling researchers Professor Vytas Bankaitis at both the University of North

Carolina at Chapel Hill and Texas A & M University. During this time, we were the first to show that sterol binding proteins regulate the general amino acid control pathway and the target of rapamycin, the master regulator of cellular metabolism. More recently we have found that activity of the *trans*-Golgi network coordinates cellular entry i nto qu iescence. I s tarted the Molecular C ell B iology L aboratory, m y f irst independent position, in the School of Pharmacy and Biomedical Sciences at Curtin University in 2014 where we are continuing both avenues of research.

#### **ANZSCDB State Representatives who are staying on are:**

NSW Sophie Pageon

ACT Erin Vaughn

QLD Samantha Stehbens

VIC Roger Pocock

SA Yoon Lim

WA Yu Suk Choi

TAS Owen Marshall

NZ Adele Wooley

### **Outgoing ANZSCDB Representatives:**

A big th ank you to our outgoing AN ZSCDB State/Country Representatives Hungjun Shi (NSW), Larisa Haupt (QLD), Alex Combes (VIC), Sarah Boyle (SA), Oliver Rackham (WA) and Caroline Beck (NZ) for their enormous support of the ANZSCDB. We especially appreciate all your efforts in the past two years in organising the State/NZ-based Cell and Developmental Biology Meetings.

### **Outgoing ANZSCDB Committee Members:**

Thank you also to our outgoing Committee Members, Peter Koopman and Miranda Grounds for the invaluable contribution to our Society over the past several years.

### **ANZSCDB Corporate Member News:**

We would like to thank the following corporate sponsors. Please visit their websites below and peruse their advertisements at the end of this newsletter.

**Promega Australia** 

**Australian BioResources** (Advertisement on the last page)

**NewSpec Pty. Ltd.** 

**Pakair Cargo Specialists** 

**ATA Scientific Pty. Ltd.** 

Monash Genome Modification Platform (Advertisement on the last page)

### **ANZSCDB ComBio2018 Presentation Award Winners**

Congratulations to our ANZSCDB Students and Postdocs who won prizes for their presentations at ComBio2018. They are:

**Sarah Boyle, Centre for Cancer Biology – Toshiya Yamada Early Career Award** (Best oral presentation in the fields of cell or developmental biology by a junior postdoc) - "Compressive forces activate RHO/ROCK-mediated cellular processes characteristic of disease states"

I attended ComBio2018 in Sydney and was fortunate enough to have my abstract selected for oral presentation and am honoured to have subsequently received the Toshiya Yamada Postdoc Symposium Prize. Having the opportunity to present my work on how compressive forces can activate cancerpromoting signalling and induce pathophysiological changes in cells allowed me to get important feedback on our findings, and a number of relevant talks at the conference suggested directions in which we may take this project. The quality of presentations was high, and the plenaries were clear, comprehensive, and fascinating. In particular, Professor Valerie Weaver's plenary lecture on mechanobiology in cancer was captivating. Furthermore, the poster sessions, welcome/closing functions and the Society dinner



allowed me the invaluable opportunity to interact with fellow researchers in an informal setting. Overall ComBio 2018 was a highly enjoyable experience, with exposure to a wide range of science together with helpful career development sessions and plenty of opportunities for networking and meeting new researchers.



Olga Zaytseva, John Curtin School of Medical Research – The David Walsh Student Prize (Best oral presentation by a student in the fields of cell or developmental biology) - "Control of Drosophila MYC transcription, cell growth and developmental patterning by the single stranded DNA binding protein Psi"

Jess Robinson, Murdoch Children's Research Institute – The Keith Dixon Prize in Developmental Biology (Best poster presentation in the field of developmental biology by a student) – "The A/HeJ mouse: a dysfunction in sex development"

I enjoyed this year's ComBio conference in Sydney, in particular the number of developmental biology plenaries and symposia in the mix with a broad range of disciplines. One of the most enjoyable plenaries was Professor Sally Dunwoodie's President's Medal lecture covering many years of work into mammalian embryogenesis and the interaction of genes with hypoxia during gestation. A remarkable point to me was the large amount of collaborations that contributed to this work, and how the information derived from mouse models was able to be translated into usable medical information for families. The willingness of these



prestigious researchers to engage with students and early career researchers, such as during the poster presentation sessions, was a fantastic aspect of this conference. To be able to present my work at an event with such high-quality presentations and influential presenters was an honour. My presentation of work relating to the sex development defects in a mouse strain with a Y chromosome containing a mild defect received a lot of positive feedback from many researchers, both those with knowledge in this area and those without. The high engagement with students and early career researchers during poster sessions combined with the career development symposia run during the conference really set ComBio apart in my mind with its emphasis on encouraging the next generation of researchers. Overall, I thoroughly enjoyed ComBio 2018 at Sydney Darling Harbour, and highly recommend this conference for students.



Daisy Shu, University of Sydney – The Cell Biology Student Poster Prize (Best poster presentation in the field of cell biology by a student) – "EGF exacerbates TGF-Beta-induced epithelialmesenchymal transition in the ocular lens: a novel mechanism in cataract formation"

I had a wonderful and informative time at ComBio2018 in Sydney. I presented a poster on the interplay of growth factor signalling pathways underlying the development of cataract, a major cause of blindness worldwide. Attending ComBio 2018 gave me a unique opportunity to be exposed to such a breadth of disciplines from cancer biology and

nanotechnology to biochemistry and plant biology that was a refreshing change as I had previously only attended conferences specific to eye research. I am very grateful

to have researchers from such diverse backgrounds visit my poster and provide me with valuable insights and thought-provoking questions. This not only enabled me to see my research from a new perspective but has also shed light on the intriguing parallels and differences between the eye and other organs. My research explores the role of transforming growth factor-beta in inducing epithelial-mesenchymal transition leading to cataract formation and this mechanism is also extensively studied in the context of cancer metastasis and organ fibrosis. There were several sessions and posters dedicated to cancer cell biology and signalling pathways that I found very enlightening. I was very honoured to have been able to meet and engage with leading cancer experts around Australia, exchanging insights regarding the complexities of signalling pathway networks underlying our diseases. One of my favourite sessions of ComBio 2018 was the Career Development Forum that discussed many topics including career progression, mentoring, grant writing, self-promotion and networking that were particularly useful to me as a final year PhD student. In addition to learning a great deal, I made many new friends including PhD students and other researchers at the meeting from around Australia. ComBio2018 was my very first ComBio conference but I know it is certainly not the last and I am looking forward to many more future meetings.

**ANZSCDB ComBio2017 Travel Bursary Awardees** were invited to provide reports of their experience at the conference.

### **Ann Kristin Altekoester** (Ph.D. student, Harvey Lab, Victor Chang Cardiac Research Institute)

I really enjoyed ComBio2018. I have not attended a conference of this scale before and was pleased to find it very well organised. All the sessions were on time and easy to find. The location was absolutely stunning. I enjoyed the different plenary lectures from extracellular vesicles to cancer research as well as the career development forums to hear about the different stories of current group leaders. I was lucky enough to get selected for a talk to present my work on a novel long non-coding RNA and its function in the heart. This was not only a great opportunity to gain experience in giving presentations, but I also received great and helpful feedback. Overall, I attended session from organogenesis to epigenetic control and would definitely recommend attending ComBio to any students.

### **Arjun Chahal** (Ph.D. student, Quinn lab – John Curtain School of Medical Research)

Attending the ComBio2018 conference, which showcased such a wide spectrum of high quality local and international speakers, was an invaluable experience for me. Being selected for a talk in such prestigious company was an extremely daunting, but definitely a worthwhile experience, with the feedback I received allowing me to fully appreciate my project and examine my findings from a different perspective. It was nice to see some familiar faces and to make new friends at this conference, where everyone from students to PIs was friendly, approachable and generous with their helpful advice. Thank you again to the ANZSCDB for supporting my attendance at the

conference with a travel award and the organisers for allowing me the opportunity to present my work. I look forward to the next meeting!

### Martin Estermann (Ph.D. student, Smith Lab, Monash University)

ComBio 2018 was my first time presenting my PhD results in an international conference and my first conference in Australia. It was amazing to meet in real life several excellent researchers who I only knew by their publications. The organisation and talks were outstanding, especially Patrick Tam's talk and Sally Dunwoodie's and Anna Philpott's plenaries. The poster sessions were interesting too, I really enjoyed talking with other PhD students about their results and discussing the future of their research. It was also an honour to being able to share my research with exceptional researchers that take their time to stop by my poster. It was definitely the perfect environment for networking. To culminate the event, I was awarded the ISD Beverly Kerr McKinnell Award for the best poster presentation, which really took me for surprise. I had a great time at ComBio 2018 and I know I will be part of ComBio 2020 in Melbourne.

### Jade Kannangara (Ph.D. student, Mirth Lab, Monash University)

As a PhD student, ComBio2018 was the first large scale conference I had attended, yet alone spoken at! I highly enjoyed the atmosphere and it was a privilege to have attended the same conference as some of the best researchers around the world, as well as hear about their research. Speaking at this conference was an excellent opportunity as I had to communicate my research to a large and broad audience, which is something I had never done before. It has allowed me to not only further develop my skills presentation skills, but also networking skills as there were such a variety of researchers to speak to. The highlight of the conference was listening to the various plenary speakers who each had such interesting and inspiring research to share. It was often hard to choose which session to attend with such a jam-packed schedule! ComBio2018 was an excellent conference and exposed me to wider fields which has broadened my thinking, especially in deciding what fields I might like to explore post PhD.

### **Susie Szakats** (Ph.D. student, Wilson Lab, University of Otago)

ComBio 2018 provided a great opportunity to for me to present some of my PhD work to date. I presented a poster, and additionally was invited to take part in the poster teaser session. I found the poster sessions were engaging and interactive, with a variety of researchers in attendance willing to discuss my work and provide useful feedback. The poster sessions also facilitated networking, both allowing me to meet other students and more established researchers. Attending the developmental symposia was also fascinating due to the breadth of talks. Topics spanning aspects of developmental biology and related fields broadened my understanding of what research is out there. The opportunities to explore topics further away from my field at other symposia and plenary talks also provided fresh perspective. I'm particularly grateful that ANZSCDB and ComBio facilitate developmental biology meetings down under. Thank you for assistance in travelling across the ditch to attend the conference-I have greatly enjoyed my first visit to Sydney.

### **Olga Zaytseva** (Ph.D. student, Quinn Lab, John Curtin School of Medical Research)

I immensely enjoyed the 2018 ComBio conference in Sydney. A stimulating and informative conference with a staggering range of topics, mechanosignalling, emerging microscopy techniques, exosome vesicle behaviour to synthetic biology. Particularly remarkable was the presentation by Professor Sally Dunwoodie, the recipient of the President's Medal, covering a tremendous body of work resulting from extensive collaborations. It was inspiring to see how initial studies into mechanisms of development during embryogenesis could be extended to insights into human congenital disease due to hypoxia, leading to informative clinical outcomes for patients. It was a privilege to be able to interact with such leaders in the field, the quality of presentations and the poster sessions was truly outstanding. I was extremely grateful to the organisers for the opportunity to give an oral presentation, and very honoured to receive the David Walsh Student Prize. This was my first experience presenting the observations from my PhD studies to such a diverse audience and the opportunity to receive feedback was invaluable. I am also grateful to the ANZSCDB for providing the travel award to support my trip to Sydney. ComBio is an excellent conference that I will attend in the future and would highly recommend for any student.

The other ComBio travel award winners were, Hananeh Fonoudi (Harvey lab – Victor Chang Cardiac Research Institute and Zahida Roly (Smith lab – Monash University). Thank you to everyone who contributed their thoughts on ComBio 2018.

### **Member Publications**

Friedman CE, Nguyen Q, Lukowski SW, Helfer A, Chiu HS, Miklas J, Levy S, Suo S, Han JJ, Osteil P, Peng G, Jing N, Baillie GJ, Senabouth A, Christ AN, Bruxner TJ, Murry CE, Wong ES, Ding J, Wang Y, Hudson J, Ruohola-Baker H, Bar-Joseph Z, Tam PPL, Powell JE, Palpant NJ. Single-Cell Transcriptomic Analysis of Cardiac Differentiation from Human PS Cs R eveals HOPX-Dependent Cardiomyocyte Maturation. Cell Stem Cell. 2018 Oct 4;23(4):586-598.e8. doi: 10.1016/j.stem.2018.09.009.

This publication was featured in a video from the Australian Academy of Sciences: <a href="https://www.facebook.com/AustralianAcademyofScience/videos/707250772965659/">https://www.facebook.com/AustralianAcademyofScience/videos/707250772965659/</a>

and EurekAlert from AAAS: <a href="https://www.eurekalert.org/pub\_releases/2018-10/giom-ute100318.php">https://www.eurekalert.org/pub\_releases/2018-10/giom-ute100318.php</a>

Kovtun O, Leneva N, Bykov YS, Ariotti N, Teasdale RD, Schaffer M, Engel BD, Owen DJ, Briggs JAG, Collins BM. Structure of the membrane-assembled retromer coat determined by cryo-electron tomography. Nature. 2018 Sep;561(7724):561-564. doi: 10.1038/s41586-018-0526-z.

Healy MD, Hospenthal MK, Hall RJ, Chandra M, Chilton M, Tillu V, Chen KE, Celligoi DJ, McDonald F J, C ullen P J, Lo tt J S, C ollins B M, Ghai R. S tructural insights into the architecture and membrane interactions of the conserved COMMD proteins. Elife. 2018 Aug 1;7. pii: e35898. doi: 10.7554/eLife.35898.

Tillu VA, Lim YW, Kovtun O, Mureev S, Ferguson C, Bastiani M, McMahon KA, Lo HP, Hall TE, Alexandrov K, Collins BM, Parton RG. A variable undecad repeat domain in cavin1 regulates caveola formation and stability. EMBO Rep. 2018 Sep;19(9). pii: e45775. doi: 10.15252/embr.201845775.

#### **ANZSCDB Member News:**

Congratulations to student member **Chieh (Jade) Yu** from Larisa Haupt's laboratory at QUT, who was recently awarded the International Society for Matrix Biology (ISMB) international travel grant to attend the annual Matrix Biology Society of Australia and New Zealand (MBSANZ) meeting in Auckland, New Zealand from 4<sup>th</sup>-7<sup>th</sup> of December.

### **ANZSCDB State Meeting Reports**

### **ANZSCDB ACT Meeting 2018**

The inaugural ANZSCDB ACT territory meeting held on the 22nd of November this year at The John Curtin School of Medical Research (JCSMR) was a great success. The Australian National University (ANU) Cell and Developmental Biology community were privileged to host several high calibre speakers from home and abroad (Heena Lad and Steve Brown from MRC Harwell Institute, UK; Alex de Mendosa Soler, University of Western Australia; Linda Parsons, Monash University and Julia Horsfield from University of Otago, New Zealand. We also hosted ANZSCDB President Sharad Kumar and Secretary Michael Samuel (Centre of Cancer Biology, UniSA, Adelaide) who gave fantastic talks! The more than 70 registrants were also treated to extremely highquality talks from our ECRs and students. Competition was fierce but the best ECR talk Awards were secured by Sam Montague and Kristen Barratt, PhD Student awards went to Christine Lee and Nan-Hee Kim, while Keeva Connelly and Kelsey Walsh won the prizes for the best Honours student talk. Congratulations all! Thanks again to our sponsors (JCSMR, General Electric, ThermoFisher Scientific, Eppendorf, Bio-Rad and Bio-line) for your generous support that made this meeting possible. Here's to many more gatherings of our growing Canberra Cell and Developmental Biology community in the future!!

Report by convenors: Erin Vaughn, Rippei Hayashi, Ruth Arkell and Leonie Quinn



Reception at the Nishi Gallery, Acton

### **NSW State Cell and Developmental Biology Meeting 2018**

(written by Sophie Pageon and Stefan Oehlers)

The NSW annual meeting was held on 27<sup>th</sup> September 2018. It was hosted by the University of Sydney in the Veterinary Science Conference Centre. The meeting was generously supported by the NSW Research Attraction and Acceleration Program and the UNSW School of Medical Sciences, as well as Labcabs, Zeiss and ATA Scientific. There was a strong showing from the local academic community, with a total of 138 registered attendees (including 73 students) and 10 oral presentations selected from

abstracts. The meeting also had an international feel, headlined by plenary speakers from Canada, the US and the UK.

The Cell and Developmental Biology meeting touched on a fascinating array of to pics, s panning from the development of the chicken urogenital system to the brooding behaviour of sea stars, including talks on corneal cell trans plants, e ngineering biomaterials for bone regeneration, transgenerational silencing in worms and the underlying mechanisms of embryonic heart defects. The majority of talks were by graduate students and postdoctoral f ellows s howcasing largely unpub lished wo rk to the ir peers. Talks we re complemented by two poster sessions to fit in a total of 24 poster presentations.



The Veterinary Science Conference Centre (University of Sydney) where the meeting was held and delegates enjoying the poster sessions and trade display.

A panel of international invited speakers were chosen to expose our early career researchers to cutting-edge science including: **Professor Keiko Torii** (Howard Hughes M edical I nstitute, U niversity of Washington) who talked about a pplying synthetic chemical-receptor pairing to study signal transduction in plants, **Professor Anna Philpott** (University of Cambridge) who described several aspects of cell cycle control that she has shown can be restored in cancer cells as novel anti-cancer targets, and **Associate Professor Gary Brouhard** (McGill University) who spoke about the structure and dynamics of internal cellular scaffolding. In keeping with the spirit of our meeting, the invited speakers' talks were concluded with robust discussion sessions – essential for the professional development of our younger's cientists. The invited speakers all engaged with early career researcher talks and posters throughout the meeting.

Prizes were awarded for Best PhD oral presentation (Hananeh Fonoudi, Victor Chang

Cardiac Institute), Best PhD poster presentation (Manuela Ecker, UNSW), Best Postdoc oral presentation (Dr. Julie Moreau, Victor Chang Cardiac Institute) and Best Postdoc poster presentation (Hartmut Cuny, Victor Chang Cardiac Institute).

(Hartiflut Curry, Victor Charing Cardiac Institute).

We also displayed a beautiful selection of entries for our Image Competition – where the best image was selected by popular vote and the prize was awarded to Dr. Alex Richardson (UNSW).



Tracing the fate of limbal stem cells (Alexander Richardson, UNSW)

### Thanks to the whole NSW committee:

Sophie Pageon (UNSW)

Hongjun Shi (Westlake University, China)

Annemiek Beverdam (UNSW)

Stefan Oehlers (Centenary Institute)

Marcus Heisler (University of Sydney)

Kazu Kikuchi (Victor Chang Cardiac Institute)

Tennille Luker (Children's Medical Research Institute)

Munira Xaymardan (University of Sydney)

Daniel Hesselson (Garvan Institute)



### **SA State Cell and Developmental Biology Meeting 2018**

This year's ANZSCDB Adelaide meeting was the 8<sup>th</sup> meeting of the Adelaide Chapter, held on November 13<sup>th</sup> in UniSA's new Cancer Research Institute building. Convened by SA State Representatives Dr Sarah Boyle and Dr Yoon Lim, both of the Centre for Cancer B iology, the re we re 6 0 re gistrants f or the f ull-day meeting. A s a lways, registration for the meeting was free, thanks to our generous sponsors.

Plenary speakers included Dr Ivan Poon from La Trobe University in Melbourne, who spoke about cytoskeletal dynamics during cell death, and Dr Kara Britt from the Peter MacCallum Cancer Centre in Melbourne, who presented her work on how parity influences breast cancer risk and finding a cell-of-origin for hormonally-responsive breast cancer. We also heard a Special Symposium from Dr Tim Sargeant of the Hopwood Centre for Neurobiology at SAHMRI in Adelaide, who discussed his investigations into Alzheimer's and other neurodegenerative diseases.

In addition to our invited speakers we also heard from a selected number of post-doctoral researchers and post-graduate students, all of which were of extremely high quality. The poster session over lunch included post-doc and student posters from a diverse range of cell and developmental biologists from multiple un iversities and institutes across Adelaide, and the interactive atmosphere was wonderfully stimulating and beneficial for all our young scientists, the next generation of researchers in South Australia.

We also ran our image competition again, generously sponsored by Zeiss and with awards presented by state representative Benjamin Ung. First prize was taken out Anna Oszmiana for her image "Passing Deadly Bullets Through Tiny Gates", with second place to Kelly Betterman for "There's More to Science Than Meets the Eye!". We would like to congratulate the following presenters for the iro utstanding presentations that won prizes: Best Post-Doctoral Oral Winner Jantina Manning and Runner-up Natasha Kolesnikoff, Best Student Oral Winner Ellen Potoczky and Runner-Up Valentina Poltavets, Best Post-Doctoral Poster Winner Winnie Kan and Runner-up Genevieve Secker, and Best Student Poster Mara Zeissig and Runner-Up Yu Chen (Josh) Chey. (Presentation winners are pictured with Sarah Boyle.)

Thank you very much to our sponsors for their generous support of this free event: Centre for Cancer Biology, University of South Australia, University of Adelaide Faculty of Health and Medical Sciences, Eppendorf, Abacus DX and TrendBio. We look forward to seeing everyone again at the ANZSCDB meeting in Adelaide in 2019!

Report by ANZSCDB State Representatives and meeting convenors Sarah Boyle and Yoon Lim

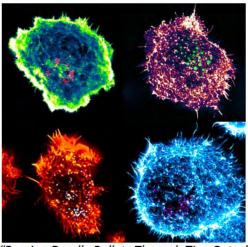












"Passing Deadly Bullets Through Tiny Gates"



Invited Speakers Dr Ivan Poon, Dr Kara Britt and Dr Tim Sargeant



Poster Session at the 8<sup>th</sup> ANZSCDB Adelaide Meeting

### **Keeping up to date**

Thanks to Megan Wilson and Leonie Quinn, the **ANZSCDB** has a <u>Facebook page</u> for news updates and is also on Twitter as <u>@ANZSCDB</u>.

Please engage with us via social media for society news and updates and tag us in your work-related posts.

### Would you like to contribute to the ANZSCDB newsletter?

Please send items to Michael Samuel, the society Secretary.

The ne wsletter will be published approximately every three months and distributed to all ANZSCDB Members via e-mail.

Please ensure that your submissions are no more than 100 words and have been fact-checked.



### **Australian BioResources**

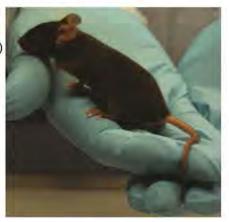
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- C57BL/6JAusb\*
- C57BL/6NJAusb\* (NEW!



- FVB/NJAusb\*
- NOD.Cg-PrkdcscidII2rgtm1Wil/SzJAusb\* ('NSG')
- BALB/cJAusb\*

\*Propagated under License Agreement with The Jackson Laboratory





- 129S6SvEvTacAusb
- BALB/C-Fox1nu/Ausb ('Nude')
- CBA/CaHArcAusb
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