ASM Education SIG News Letter

September 2023



Highlights of EduCon 2023

The annual Australian Society of Microbiology EduCon 2023 conference was held on the picturesque campus of the University of Western Australia (UWA) in Perth, on July 3rd and 4th. Attendees were greeted by the familiar warmth of the EdSIG (Education Special Interest Group) committee, setting the stage for an inspiring experience under the theme "Diversity, Inclusion and Education for all."

The conference commenced with an engaging introduction delivered by the 2021-'23 EdSIG convenor Thiru Vanniasinkam (Charles Sturt University). Thiru was also this year's recipient of the esteemed ASM David White Excellence Award, a testament to her outstanding contributions in the field of education.

EdSIG also celebrated a significant milestone – the 10th year of EduCon conferences. Cheryl Power, a cherished member of the EdSIG community did the honor of cutting a chocolate cake. The attendees shared fond memories of EduCon's earlier years. A decade of growth, learning and connection led by committed leaders and participated-in by like-minded educators – a true cause for celebration!









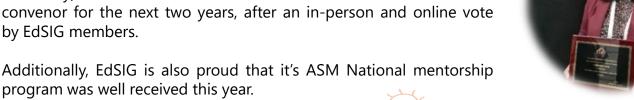




The EdSIG acknowledges the collaborative efforts of Thiru and Megan Lloyd (University of Western Australia), who both invited education research articles for the September 2023 Education issue of Microbiology Australia (a CSIRO publication). This marked a significant step, as the last education edition was published in 2016.

Click <u>here</u> to access a variety of articles on innovative education approaches and reflections on the changing tides in education, particularly in Microbiology.

EduCon 2023 also unveiled the introduction of the ASM Early Career Excellence Award. The first recipient of this accolade was Charmaine Lloyd, from Swinburne University of Technology (now at RMIT University). She has also been entrusted with the role of EdSIG convenor for the next two years, after an in-person and online vote by EdSIG members.



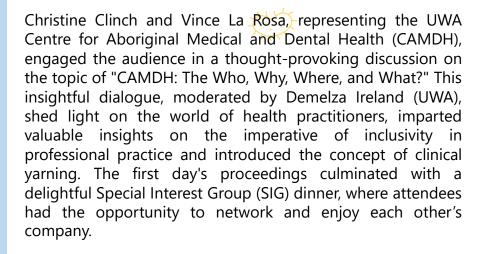


Education symposium (Perth convention centre)

The Education session chaired by Megan Lloyd (UWA) at Perth convention centre, provided a platform for thought-provoking discussions and knowledge-sharing. It began with Jack Wang's (University of Queensland) signature-style captivating presentation on professional learning strategies for educators, followed by Bri McKenzie's (Curtin University) moving talk on LGBTQIA+ inclusive practices in higher education & Katherine Hammer's (UWA) experiences with delivering microbiology content to students from different degrees.

Educon sessions at UWA

On the *first day* of EduCon, Ulrike Kappler (UQ), the esteemed recipient of the ASM David White Excellence Award for the year 2022, provided valuable insights during her presentation titled "Can Practical Training Be Effectively Delivered in a Virtual Environment?" Her talk delved into the challenges and possibilities of virtual practical training, including how the Virtual Labs can be used to support practicals by recreating them in the virtual space, or to carry out and teach extension tasks such as experimental design that cannot normally be covered in wetlabs.









The second day of the conference brimmed with a diverse array of presentations and talks. Megan Waldhuber (Monash University) (picture on the left) presented her research on the utilization of the 'Microbiology Concept Inventory' as both a pre-test and post-test assessment tool. Her work aimed to evaluate the impact of conceptual framework design on students' comprehension of the fundamental principles of microbiology. Jemma Berry (ECU - Edith Cowan University) shared her innovative approach of employing virtual reality (VR) simulations to efficiently train students in various processes and procedures within the field of forensics. This immersive training preceded live simulations, enhancing students' preparedness.

Sophie Paquet-Fifield (University of Melbourne) described an engaging pedagogical approach where students had the autonomy to select specific research or clinical topics. They assumed responsibility for choosing the techniques and methodologies to address their research questions spanning histopathology, macroscopic analysis, bioinformatics approaches, and molecular pathology. Charmaine Lloyd illustrated the creative use of podcasts as an assignment exercise, fostering the development of communication skills among Health Science students. Senaka Ranadheera (University of Melbourne) shared his valuable experiences in conducting online group activities focused on HACCP (Hazard Analysis and Critical Control Points) planning within a Food Microbiology course.





The presentations concluded with the recognition of Jemma Berry (ECU) (picture on the left), who earned the distinction of delivering the best presentation. The prize for this achievement was generously sponsored by Access Microbiology, the Microbiology Society, UK.

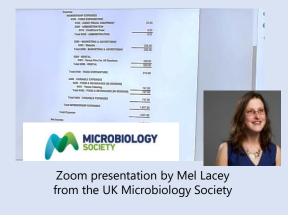
Congratulations Jemma!

INVITED TALK

Mel Lacey, from Sheffield-Hallam University, UK presented a talk on behalf of the UK Microbiology Education society. EdSIG is planning to work with Mel Lacey's team (Education and Outreach Network) in the UK on future collaborations for teaching resources through the Microbiology Society.

WORKSHOP: EVIDENCE BASED ACTIVE LEARNING IN THE DIVERSE CLASSROOM

Shakeel Mowlabocccus from Murdoch University, Justine Liepkalns from Colorado State University & Thiru Vanniasinkam (CSU) conducted a workshop on active learning. Shaxx shared with the audience how his step-by-step notes provided a positive learning experience for his students.









Round table discussion Diversity, Inclusion and Education for all

Jemma Berry from Edith Cowan University and Megan Lloyd from UWA (also the immediate past convenor) facilitated a round table discussion on how we currently address inclusivity in disability and cultural diversity and examples of good practice. The session was around the "inclusive classroom." While the perspectives of educators are more widely known, this was an opportunity to hear from students on their experiences.

"Being able to hear the students' perspective on inclusivity really highlighted just how varied each person's experience in higher education really is. It was disturbing to hear that some students may not fight for their rights, fearing the backlash that may result, preferring instead to keep the peace and just tolerate the injustice. Uncovering these stories, and the reasons behind them, is the first step to ensuring this pattern is not repeated for future students" (Jemma Berry, ECU)





"My name is Candy Dao - second-year BSC Biomedical student at ECU. It was a privilege for me to be at EduCon2023 and an esteemed opportunity to listen to the thoughts of other students with disabilities, as well as sophisticated knowledge from microbiology educators. Many students with disabilities feel disclosure is not necessary as they might have experienced unconscious bias in the past. So, I believe that these students need to be encouraged into higher education to reinforce their mindset in order to protect themselves, if their disclosure is accidental blowback. Additionally, they can express their voice toward problems academically and professionally. Thanks for the inclusive setting by joining complex student backgrounds with other professional faculty in the supportive environment which reflected the understanding of the inclusivity in the workplace.

"Hi, my name is Syed TAQVI, a final semester International BSC Nursing student at Edith Cowan University from Pakistan. I had the absolute pleasure of attending EduCon 2023 and representing ECU as a Nursing Student Ambassador. This was a very positive platform where I had the opportunity to discuss the hardships that I faced during my nursing degree and provide suggestions on what could be done to improve future nursing education to achieve positive student learning outcomes. By attending EduCon 2023, I got the opportunity to meet education leaders from across Australia. I would highly recommend organizing this conference every year, I am happy to be a part every year to support international students."

Students' views



"Tertiary education has its own challenges, even more so as a student with a disability. I am grateful for the opportunity to have shared my lived experience as a student with a disability, in both the challenges and success that I face. Lecturers who provide learning opportunities with effective accessible and inclusive practices have made a significant difference in my university journey. It has enabled me to achieve better success in my studies, which has positively impacted my self-confidence and self-worth. It was exciting to see educators at the EduCon2023 demonstrating their desire and commitment to ensure inclusive classrooms. One of the most important ways to show you care, is to listen. I felt heard by the people who need to hear the student voice."

Phillippa Combrink (ECU Student)

My Reflections on EduCon 2023

Shakeel (Shaxx) Mowlaboccus Murdoch University, PathWest Laboratory Medicine WA, UWA

"Education is the passport to the future, for tomorrow belongs to those who prepare for it today" – Malcolm X.



When we hear the word "education", we can't help but think of a classroom being led by a teacher. An "educator" in the tertiary sector is often, if not always, perceived as a lecturer running an undergraduate or a postgraduate course through lectures, lab classes or workshops. But how about the "invisible educators" who are in the research labs, i.e. the researchers who train and educate PhD students – yes, the very same PhD students who become the educators of tomorrow. Many consider education and research to be two separate paths, but no research lab can progress without an educator, be it the overly cautious research assistant or the multitasker postdoc or the diligent team leader, all of whom play a big role in training and educating the research students enrolled in Honours, Masters or PhD.

Being an ECR heavily involved in research and not having run a classroom for more than two years, I was worried I would not be perceived as an educator when I attended EduCon 2023. However, it was a delight to be around people who just simply valued the importance of education and the importance of designing protocols for improving education delivery, thus maximizing students' understanding – be it a physical or virtual delivery.

The presenters shared diverse methods they had successfully implemented in their education delivery to foster students' interactions either by encouraging them to take the lead during practical classes or by tempting them through the use of new technology. The session at EduCon 2023 which left a mark for me though was the "Round Table Discussion on Inclusivity" near the end of the conference where we listened to three students sharing their individual personal experiences at university with us. It was astounding to hear how even in 2023, in Australia, students can still experience certain forms of discrimination – be it the inconvenient landscape and infrastructure of an institution versus a wheelchair user or the disregard of students with invisible disabilities such as chronic fatigue syndrome and vision impairment. It was also sad and disappointing to hear that international students still experience discrimination – based on their race, country of origin, first language, and choice of course (to align with the skilled occupation list for securing a visa) – not only from their classmates but also from some educators. This shows our education system still needs improvement for every student to feel respected, emotionally safe, and equally included, so their learning experience is not compromised.

Overall, my experience at EduCon 2023 was exciting and eye-opening. The theme of "Diversity, Inclusion and Education for All" was an important one to address and everyone who participated did justice to it. I highly recommend everyone, especially researchers who are interested in improving education and want to learn more about the tools educators implement in the classroom to join us at EduCon 2024 in Brisbane!





Tips for the Educator

Create your own interesting microbial cartoon images with Adobe Firefly - Simply create a school account, type in words that suit your imagination and voila!! This image was created with the keywords – "Microbe + searching." Enjoy!	by Charmaine Lloyd
New!! ACDS TLOs	<u>Link</u> shared by Rebecca LeBard
New!! US National Academic Integrity Network has produced GenAl Guidelines for Educators:	<u>Link</u> shared by Charmaine Lloyd



Your voice in the newsletter, the Education symposium and Educon 2024

You are warmly invited **to contribute** articles (long/short), tips and tricks for educators, event notices or talks relevant to EdSIG and any other creative content for the newsletter. Submit them to **edsig.asm@gmail.com**.

Are there topics you want discussed at the EdSIG and Educon? Are there good speakers you know of in 'Microbiology Education & related sciences'? Do share your suggestions with us at this **Google form LINK**.

Upcoming events in Education









Join us



EdSIG link Mentorship program - link. Education awards link



Thank you to the EduCon 2023 committee:

Thiru Vanniasinkam (Chair) (Charles Sturt University), Megan Lloyd (Past Chair) (University of Western Australia), Demelza Ireland (University of Western Australia), Priscilla Johanesen (Monash University), Ipek Kurtboke (University of the Sunshine Coast), Shaxx Mowlaboccus (Murdoch University), Senaka Ranadheera (University of Melbourne), Gal Winter Ziv (University of New England).

If you are interested to take part in EdSIG committee activities please email edsig.asm@gmail.com

September 2023 EdSIG Newsletter team:

Charmaine Lloyd (RMIT University), Thiru Vanniasinkam (Charles Sturt University), Megan Lloyd (University of Western Australia), Senaka Ranadheera (University of Melbourne).

