NSW Cancer Conference 2022 Conference Report



Name: Lionel Leck

Position & Affiliation: PhD candidate, University of Sydney, Kolling Institute

Full Reference: Lionel Leck, Karolina Bořánková, Josef Gillson, Kelly McKelvey, Yomna S Abd El-Aziz, Sumit Sahni, Darius Lane, Jan Skoda, Patric Jansson. *Doxycycline Targets SOX2-mediated Cancer Stem Cells via Activating Mitochondrial Integrated Stress Response Pathway*

Presentation Type: Poster



My research poster which focuses on repurposing an old and giving it a new life – the use of antibiotic drug, Doxycycline to help eradicate a hard-to-kill populations of cells within the tumor, while sparing the normal cancer cells and this enables us to utilize this strategy to treat many different forms of highly aggressive tumors, such as the brain, pancreatic and gastric cancers by sensitizing to their conventional drugs. Our finding interested one of the research representative from Merck, which could potentially lead to exciting future collaborations.

The experience of presenting at the conference has no doubt given me the opportunity to promote our work and findings, in the hope that it could result in more collaborations with other fellow postgraduate students and researchers from other institutions, as well as developing ideas for the future studies. I was also excited to learn about exciting novel studies that other researchers have been working on.

It has also provided a great opportunity to extend my experience to present to a diverse and expert scientific

audience of different backgrounds. The keynote and general sessions featured thought leaders and experts who provided invaluable insight of significance to me. Participation at the conference has been rewarding and it provided a valuable experience by advancing knowledge, generating new ideas in the pathophysiology of cancers, as well as initiating new collaborations. Overall, this experience is important especially at this early stage of my career as a medical research scientist. Attending this conference has provided me with the foundation for extensive future opportunity to become an outstanding and excellent medical researchers within the field of cancer and to pursue research of global significance.

Since the start of Covid, most conferences have been either cancelled or moved online – which lacked the face-to-face aspect of communications among other participants. The NSW Cancer Conference gave researchers a wonderful opportunity to get together face-to-face and this sparked some interesting conversations and discussion with researchers from other institutions. I found the mini workshops really helpful and engaging. These workshops involved interactive components, which engaged the audience while also allowing us to learn some of the newer techniques out there that can be applied into our own projects and studies.

One of the research presentations and highlight during the conference for me was the topic on Space Biology by Dr. Joshua Chou from UTS. I was really fascinated by his talk on this new and unheard research area of using space technology to treat cancers. His talk in particular has sparked some new ideas and potential collaborations.



Proudly supported by Cancer Institute NSW