

QRW Programme

QMB

Wednesday 1st – Thursday 2nd September, 2021

Rydges Hotel, Queenstown, New Zealand

Tuesday 31 August

Time	Details	Location
Queenstown Research Week Session <i>sponsored by University of Otago</i>		
6.30pm – 7.30pm	Professor Gary Evans, Chief Science Adviser MBIE “The Changing Landscape of Science Funding”	Queenstown & Wakatipu Rm
7.30pm - 9.30pm	Fashionomics <i>sponsored by Thermo Fisher Scientific</i>	Level 4, Trade Area

Wednesday 1st September

Time	Details	Location
Molecular biology and genomics of climate change Chaired by Associate Professors Maren Wellenreuther (PFR, UoA) & Björn Oback (AgResearch)		
8.30am - 8.35am	Welcome and Introduction: Maren Wellenreuther Plant and Food Research & University of Auckland	Clancy's Rm & QT Rees Rm
8.35am - 9.00am	Greg Bryan^{1,2} (Q1) ¹ AgResearch, ² ZeaKal Inc <i>Enhancing crop yield and composition to reduce environmental impacts of agriculture</i>	Clancy's Rm & QT Rees Rm
9.00am - 9.25am	Goetz Laible^{1,2} (Q2) ¹ AgResearch, ² University of Auckland <i>Climate-smart cattle – rapid adaptation to warmer environmental conditions using modern genetic technologies</i>	Clancy's Rm & QT Rees Rm
9.25am - 9.45am	Michael Knapp (Q3) University of Otago <i>Is the kea really an alpine parrot? A genomic investigation into the fate of the kea in a warming world.</i>	Clancy's Rm & QT Rees Rm
9.45am - 10.00am	Dafni Anastasiadi (Q4) Plant and Food Research (PFR) <i>The thermal environment experienced by the parents can affect gene expression of the offspring in the Australasian snapper</i>	Clancy's Rm & QT Rees Rm
10.00am - 10.30am	Morning Tea	Level 5 & Trade Area
Māori, genomics, and Indigenous data sovereignty Chaired by Drs Alana Alexander (UoO), Linley Jesson (PFR), Rebekah Fuller (Independent)		
10.30am - 10.35am	Brief mihi to welcome folks to the session	Queenstown & Wakatipu Rm
10.35am - 10:55am	Peter-Lucas Jones/Keoni Mahelona (Q5) Te Hiku Media	Queenstown & Wakatipu Rm

	<i>He reo tuku iho, he reo ora: Living language transmitted intergenerationally</i>	
10:55am - 11.15am	Waitangi Wood^{1,2} (Q6) ¹ Independent Researcher, ² Ngatirua, Ngati Awa, Ngati Kahu and Nga Puhi Nui <i>Connectivity: a sovereign authority perspective</i>	Queenstown & Wakatipu Rm
11.15am - 11.35am	Maui Hudson^{1,2} (Q7) <i>sponsored by University of Otago</i> ¹ Te Kotahi Research Institute, University of Waikato, ² Equity in Indigenous Research and Innovation Coordinating Hub (ENRICH) <i>Biocultural Labels: disclosing Indigenous rights in genomic data</i>	Queenstown & Wakatipu Rm
11.35am - 11:55am	Lisa Warbrick^{1,2} (Q8) <i>sponsored by University of Otago</i> ¹ Indigenous Genomics Institute, ² Ngāti Awa, Ngāti Rangitahi, Ngāti Maru, Te Atihaunui a Pāpārangī <i>The Indigenous Genomics Institute</i>	Queenstown & Wakatipu Rm
11:55am - 12.15pm	Rebekah Fuller¹/Mere George² (Q9) ¹ Independent Researcher, ² Minginui Nursery <i>“Nāku te rourou nāu te rourou, ka ora ai te iwi” Acknowledging IP from Mātauranga Māori and Western Science</i>	Queenstown & Wakatipu Rm
12.15pm - 12.30pm	Launch of Te Nohonga Kaitiaki Guidelines for Genomic Research on Taonga Species (Maui Hudson) Whakamutunga	Queenstown & Wakatipu Rm
12.30pm - 1.30pm	Lunch	Level 5 & Trade Area
Big data, data integration and metaomics: from phenotype to genotype Chaired by Dr Heidi Dungey (Scion) and Linley Jesson (PFR)		
1.30pm - 2.00pm	Blake List (Q10) Plant and Food Research (PFR) <i>New technologies for building and understanding plant interaction networks</i>	Queenstown & Wakatipu Rm
2.00pm - 2.30pm	Olivia Angelin-Bonnet (Q11) Massey University <i>From genotype to phenotype: reconstructing causal multi-omics networks in the autotetraploid potato</i>	Queenstown & Wakatipu Rm
2.30pm - 3.00pm	Matthew Littlejohn (Q12) Livestock Improvement Corporation (LIC) <i>Non-additive mutation discovery in sequenced cattle populations</i>	Queenstown & Wakatipu Rm
3.00pm - 3.15pm	Jeremy Han (Q13) (ZOOM) Garvan Institute of Medical Research, Sydney, Australia <i>Modelling drug-induced apoptosis to rationalise multi-agent chemotherapy in high-risk neuroblastoma</i>	Queenstown & Wakatipu Rm
3.15pm - 3.30pm	Sreemol Gokuladhas (Q14) University of Auckland	Queenstown & Wakatipu Rm

	<i>Unravelling the shared genetic mechanisms underlying 18 autoimmune diseases using a systems approach</i>	
3.30pm - 4.00pm	Afternoon Tea	Level 5 & Trade Area
4.00pm - 5.30pm	POSTER SESSION <i>sponsored by Abcam</i>	Marquee
6.00pm	Conference dinner <i>sponsored by QIAGEN</i>	Skyline

Thursday 2nd September		
Time	Details	Location
<u>The art and value of presenting molecular biology to the public</u> Chaired by Associate Professor Ceridwen Fraser (UoO)		
8.30am - 9.05am	Siouxie Wiles (Q15) <i>sponsored by Thermo Fisher Scientific</i> University of Auckland <i>Creating a trusted media presence: from ivory-towered academic to “pink-haired COVID lady”.</i>	Clancy’s Rm & QT Rees Rm
9.00am-1.00pm	<u>Parallel Room: Science Communication Workshop – facilitated by the Science Media Centre</u>	QT Von Rm
9.05am - 9.20am	Justin O’Sullivan (Q16) University of Auckland <i>Making science palatable for our communities</i>	Clancy’s Rm & QT Rees Rm
9.20am - 9.35am	Lisa Matissoo-Smith (Q17) University of Otago <i>Community engaged and community driven research – and example from PNG</i>	Clancy’s Rm & QT Rees Rm
9.35am - 9.55am	Kathy Belov (Q18) (ZOOM) <i>sponsored by illumina</i> University of Sydney, Sydney, Australia <i>Making genomics relevant</i>	Clancy’s Rm & QT Rees Rm
10.00am - 10.30am	Morning Tea	Level 5 & Trade Area
<u>Environmental DNA/RNA monitoring to inform ecosystem management and conservation</u> Chaired by Associate Professor Xavier Pochon (UoA) <i>sponsored by QIAGEN</i>		
10.30am - 11.00am	Mike Bunce (Q19) Curtin University, Perth, Australia <i>Community Engagement, Biobanks, Accessible Data and Deterrents – how important are these elements in a rapidly developing eDNA landscape?</i>	Queenstown & Wakatipu Rm
11.00am - 11.30am	Susie Wood (Q20) <i>sponsored by Millennium Science</i> Cawthron Institute <i>Learning from the past to protect and guide lake restoration</i>	Queenstown & Wakatipu Rm
11.30am - 11.45am	Gavin Lear (Q21) University of Auckland <i>Environmental DNA as an indicator of soil quality and pathogen abundance</i>	Queenstown & Wakatipu Rm
11.45am - 12.00pm	Pamela Olmedo-Rojas (Q22) University of Otago	Queenstown & Wakatipu Rm

	<i>Optimizing metabarcoding protocols for assessing diversity of plants and animals using high-value (e.g., Antarctic) soil samples</i>	
12.00pm - 12.15pm	Lara Urban (Q23) University of Otago <i>Leveraging Adaptive Sampling of Environmental DNA for Monitoring the Critically Endangered Kākāpō</i>	Queenstown & Wakatipu Rm
12.15pm - 12.30pm	Jessica Wallbank (Q24) University of Auckland <i>Marine plastic-degrading bacteria are rare and exhibit little substrate preference for attachment</i>	Queenstown & Wakatipu Rm
12.30pm - 1.30pm	Lunch	Level 5 & Trade Area
<u>Parallel room</u>		
<u>Environmental DNA/RNA monitoring to inform ecosystem management and conservation</u> Chaired by Associate Professor Xavier Pochon (UoA) sponsored by QIAGEN		
1.30pm - 1.30pm	<u>Second session on eDNA</u>	
1.30pm - 2.00pm	Anastasija Zaiko (Q25) <i>sponsored by Bio-Rad Laboratories Pty Ltd</i> Cawthron Institute <i>Towards optimisation of molecular surveillance techniques for wide uptake in marine biosecurity</i>	QT Von Rm
2.00pm - 2.30pm	Neill Gemmell (Q26) <i>sponsored by Thermo Fisher Scientific</i> University of Otago <i>Global surveillance using environmental DNA</i>	QT Von Rm
2.30pm - 2.45pm	Jo Stanton (Q27) University of Otago <i>The effect of DNA extraction on environmental sampling using a skin microbial model from the New Zealand native frog Leiopelma hochstetteri</i>	QT Von Rm
2.45pm - 3.00pm	Gert-Jan Jeunen (Q28) University of Otago <i>Sentinels of change. biodiversity monitoring through environmental DNA obtained from filter feeders</i>	QT Von Rm
3.00pm - 3.15pm	Ulla von Ammon (Q29) Cawthron Institute <i>Bucket overboard. Simplifying eDNA sampling at SEA for targeted detection and community acquisition</i>	QT Von Rm
3.15pm - 3.30pm	Shaun Wilkinson (Q30) Wilderlab NZ <i>Community science provides an effective catalyst for the uptake of regulatory eDNA monitoring in Aotearoa New Zealand</i>	QT Von Rm
3.30pm - 4.00pm	Afternoon Tea	Level 5 & Trade Area
<u>3rd generation sequencing - a new era for molecular biology</u> Chaired by Dr Donia Macartney-Coxson (ESR) and Miles Benton (ESR)		

1.00pm - 1.30pm	Miles Benton (Q31) ESR <i>The game-changing nature of Nanopore sequencing</i>	Queenstown & Wakatipu Rm
1.30pm - 2.15pm	Real-life Applications of nanopore sequencing Jurgen Hench (Q32) Recorded Universitätsspital Basel, Basel, Switzerland <i>Digital Pathology through DNA Methylome Analysis: Clinical Implications</i> Jean-Baka Domelevo Entfellner (Q33) (ZOOM) International Livestock Research Institute, Nairobi, Kenya <i>A long road to the wide adoption of 3rd-gen genomics: haps and mishaps of nanopore sequencing in Africa</i>	Queenstown & Wakatipu Rm
2.15pm - 2.40pm	Ting-Hsuan Chen (Q34) Department of Wine, Food, and Molecular Biosciences, Lincoln University, Christchurch, NZ. Current affiliation: The New Zealand Institute for Plant and Food Research Ltd, Lincoln, <i>Long-read sequencing technology enables comprehensive profiling of transposon expression and reverse transcription</i>	Queenstown & Wakatipu Rm
2.40pm-2.55pm	Georgia Breckell (Q35) Massey University <i>Bacterial DNA modifications are dependent on both genotype and growth conditions</i>	Queenstown & Wakatipu Rm
2.55pm-3.10pm	Tim Hore (Q36) University of Otago <i>Long read sequencing and understanding the genome and biology of the New Zealand Brushtail Possum</i>	Queenstown & Wakatipu Rm
3.10pm-3.25pm	Julie Blommaert (Q37) Uppsala University, Uppsala, Sweden <i>What can third-generation sequencing reveal about conservation in G-quadruplexes and other GC-rich genomic regions?</i>	Queenstown & Wakatipu Rm

3.25pm - 4.00pm	Afternoon Tea	Level 5 Lobby
Host biology in light of the microbiome: advances towards understanding the hologenome Chaired by Drs Amali Thrimawithana (PFR) & Manpreet Dhani (Landcare Research)		
4.00pm - 4.30pm	Gene Tyson (Q38) (ZOOM) <i>sponsored by Abcam</i> Queensland University of Technology, Australia	Queenstown & Wakatipu Rm
4.30pm - 4.45pm	William Pearman (Q39) University of Otago <i>Environmental and host-genetic analysis of host-associated microbiomes over large spatial scales</i>	Queenstown & Wakatipu Rm
4.45pm - 5.00pm	Giselle Wong (Q40) University of Auckland	Queenstown & Wakatipu Rm

	<i>Effect of dietary zinc supplementation on the gastrointestinal microbiota and host gene expression in a mouse model of autism spectrum disorder</i>	
5.00pm - 5.15pm	Andrew Wallace (Q41) Livestock Improvement Corporation (LIC) <i>Large scale shotgun sequencing study of the NZ dairy cow milk microbiome</i>	Queenstown & Wakatipu Rm
5.15pm - 5.30pm	Christian Lux (Q42) University of Auckland <i>Unilateral intervention in the sinuses of rabbits induces bilateral inflammatory and microbial changes</i>	Queenstown & Wakatipu Rm
5.30pm - 6.00pm	Emily Parke (Q43) Victoria University of Wellington <i>Microbiomes and causal explanations</i>	Queenstown & Wakatipu Rm
6.00pm	Conference close	