

#BIBC2025 Schedule

Tuesday

Start	Arc Cinema	Theatrette
08:15	Conference Registration	
08:45	Opening remarks and housekeeping	
09:05	Keynote – Chair: Chris Brien On Finding Good Experiments by <i>Cheng Soon Ong</i>	
10:00	Session 1A – Chair: Garth Tarr Data-Adaptive Automatic Threshold Calibration for Stability Selection by <i>Martin Huang</i> Variable Selection in a Joint Model for Huntington’s Disease Data by <i>Rajan Shankar</i> StableMate: a regression framework for selecting stable predictors across heterogeneous data environments by <i>Yidi Deng</i>	Session 1B – Chair: Scott Foster Estimating abundance in small populations using pedigree reconstruction by <i>Sarah Croft</i> Accounting for heterogeneous detection rates when inferring eradication of an invasive species by <i>Sean A. Martin</i> Zero-inflated Tweedie distribution for abundance of rare ecological species by <i>Nokuthaba Sibanda</i>
11:00	Morning Tea	
11:30	Session 2A – Chair: Alan Welsh Extending Spatial Capture-Recapture with the Hawkes Process by <i>Alec B. M. van Helsdingen</i> A Test for Detecting Multiple Clusters with Hotspot Spatial Properties by <i>Kunihiko Takahashi</i> Outlier-robust estimation of state-space models using a penalised approach by <i>Garth Tarr</i> Disease cluster detection via functional additive models incorporating spatial correlation by <i>Michio Yamamoto</i>	Session 2B – Chair: James Curran Group Sampling with Imperfect Testing for Biosecurity Applications by <i>Adele Jackson</i> Koala Distribution and Abundance by <i>Scott D. Foster</i> Speed: An R package for Spatially Efficient Experimental Designs by <i>Sam Rogers</i> Running Human Subject Experiments via Online Crowdsourcing by <i>Patrick Li</i>

(continued)

Start	Arc Cinema	Theatrette
12:50	Lunch	
13:50	Invited Session: A Cluster of Modern Clustering Methods for Biometrics – Chair: Francis Hui Bayesian clustered ensemble prediction for multivariate time series by Shonosuke Sugasawa The difficulties of clustering categorical or mixed data by Louise McMillan Species archetype models for presence-only data by Skipton N.C. Woolley	Session 3B – Chair: Ruth Butler Building Trust Without Peer Review: Establishing Reproducibility Standards in Industrial Statistical Consulting by Dean Marchiori Teaching Meta-Analysis for Systematic Reviewers with Mixed Statistical Training by Xu Ning Tales from the jungle: a personal perspective of statistical consulting since COVID by Alice Richardson Better Conversations, Better Support: Strengthening Consulting through Practical Education and Community by Sharon G. Nielsen
15:20	Afternoon Tea	
15:50	Session 4A – Chair: Zhanglong Cao Nested-factorial treatment models: types, their uses and examples by Chris Brien Integrating Spatial Data and On-Farm Experimentation to Understand Wheat Variety Performance Across Western Australia by Sandra K. Tanz Multi-environment trial analysis of count data with complex variance structures using generalised linear mixed models by Michael H. Mumford	Session 4B – Chair: Graham Hepworth Enhancing Fraud Detection in Banking through Random Survival Forests: Addressing Data Imbalance and Model Transparency by Arjun Sekhar Using point cloud data to discover genomic regions associated with dynamic height by Colleen H Hunt Automatic debiased machine learning (autoDML) for causal inference: implementation and evaluation in real-world observational studies by Tong Chen

Tuesday Poster Session

- Location: Gallery
 - Time: 17:00-19:00
1. **Using atmospheric transport models to predict species incursions in northern Australia** by *Zhenhua (Iris) Hao Dr*
 2. **Visualisation of multinomial multilevel time-series modelling with application to current smoking status** by *Alice Richardson*
 3. **Paired Comparison with Cyclic Dominance: An Extension of the Bradley-Terry Model** by *Yuki Ohno*
 4. **Cleaning Text Data with Large Language Models** by *Jiajia Li*
 5. **ggincerta: An R Package for Uncertainty Visualisation with a Layered Grammar of Graphics** by *Xueqi Ma*
 6. **The “Theory of Sampling” (ToS) - have statisticians missed the boat?** by *Damian Collins*
 7. **Evaluating Diagnostic Performance via Bayesian F_1 Score Estimation without a Gold Standard** by *Jun Tamura*
 8. **Evaluating Remote Monitoring in Automated Peritoneal Dialysis: A Difference-in-Differences Analysis** by *Annie Conway*
 9. **Judgement Post-Stratification for Covariate Adjustment in Pairwise Comparisons in Block Designs** by *Sam Rogers*
 10. **Bayesian inference for sparse Gaussian copula graphical model** by *Tomotaka Momozaki*
 11. **Visualization for departures from symmetry with the power-divergence-type measure in square contingency tables** by *Wataru Urasaki*
 12. **Performance of Factor Analytic Mixed Models and Plackett-Luce Models for Genotype Ranking in Multi-Environment Trials** by *Jiazhe Lin*

Wednesday

Start	Arc Cinema	Theatrette
08:30	Conference Registration	
08:50	Housekeeping	
08:55	Keynote – Chair: Thomas Lumley Uses of gnm for Generalized (Non)linear Modelling by <i>Heather L. Turner</i>	
09:50	Session 5A – Chair: David Warton Scalable finite mixture of regression models for clustering species responses in ecology by <i>Francis KC Hui</i>	Session 5B – Chair: Sam Rogers Using a linear mixed model based wavelet transform to model non-smooth trends arising from designed experiments by <i>Clayton Forknall</i>

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Start	Arc Cinema	Theatrette
	Elastic Net Regularization for Vector Generalized Linear Models: A Flexible Framework for High-Dimensional Biomedical Data by <i>Wenqi Zhao</i>	Functional Data Analysis for the Australian Grains Industry by <i>Braden J. Thorne</i>
	Fitting Generalised Linear Mixed Models using Sequential Quadratic Programming by <i>Peter Green</i>	Bayesian Ordinal Regression for Crop Development and Disease Assessment by <i>Zhanglong Cao</i>
10:50	Morning Tea	
11:20	Invited Session: Statistics for Biosecurity Surveillance – Chair: Robert Clark	Session 6B – Chair: Linh Nghiem
	Optimal allocation of resources between control and surveillance for complex eradication scenarios by <i>Mahdi Parsa</i>	Estimating extinction time from the fossil record using regression inversion by <i>David I. Warton</i>
	Inferring the rate of undetected contamination using random effects modelling of biosecurity screening histories by <i>Sumonkanti Das and Robert Clark</i>	The performance of Yu and Hoff's confidence intervals for treatment means in a one-way layout by <i>Paul Kabaila</i>
	Optimal sampling in border biosecurity: Application to skip-lot sampling by <i>Raphael Trouve</i>	Rate-optimal sparse gamma scale mixture detection by <i>Michael Stewart</i>
		Extension of the corrected score estimator in a Poisson regression model with a measurement error by <i>Kentarou Wada</i>
12:50	Lunch	
13:00	Social Activities	
18:30	Young (at heart) Biometrician Social Event	

Thursday

Start	Arc Cinema	Theatrette
08:30	Conference Registration	
08:50	Housekeeping	
08:55	Invited Session: Statistics for Biosecurity Surveillance – Chair: <i>Beatrix Jones</i> Modularizing Biometric Models Facilitates Multistage Computing by <i>Mevin B. Hooten</i>	
09:50	Session 7A – Chair: Vanessa Cave	Session 7B – Chair: Alice Richardson
	Visualize your fitted non-linear dimension reduction model in the high-dimensional data space by <i>P. G. Jayani Lakshika</i> The geometry of diet: using projections to quantify the similarity between sets of dietary patterns by <i>Beatrix Jones</i> Multivariate meta-analysis methods for high-dimensional data by <i>Alysha M. De Livera</i>	Reporting Odds Ratios under Fluctuating Reporting Rates in Spontaneous Reporting Systems by <i>Tatsuhiko Anzai</i> Handling Missingness in Prevalence Estimates from National Surveys by <i>Oyelola Adegboye</i> Pooled testing with penalized regression models by <i>Christopher Bilder</i>
10:50	Morning Tea	
11:20	Session 8A – Chair: Matthew Schofield	Session 8B – Chair: Chris Triggs
	Integrated Species Distribution Models: A Single-Index Approach by <i>Quan Vu</i> Simultaneous Inference for Latent Variable Predictions in Factor Analytic Models by <i>Zhining Wang</i> Model-based assessment of functional and phylogenetic diversity by <i>Shaoqian Huang</i> Fitting integrated species distribution models using mgcv by <i>Elliot Dovers</i>	Crossvalidation for predictive models in complex survey data by <i>Thomas Lumley</i> A Set of Precise Asymptotics for Gaussian Variational Approximation in Generalised Linear Mixed Models by <i>Nelson J. Y. Chua</i> An allometric differential equation model quantifies energy trade-offs between growth and reproduction under temperature variation by <i>Hideyasu Shimadzu</i> A circular hidden Markov model for directional time series data by <i>A.A.P.N.M. Perera</i>
12:40	Lunch	
12:50	AGM	

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Start	Arc Cinema	Theatrette
13:40	Invited Session: Methods and Practice in Agricultural Analytics – Chair: Emi Tanaka Evaluating the impact of trait measurement error on genetic analysis of computer vision-based phenotypes by <i>Gota Morota</i> Predication of Daily Weight Gain with Cattle Behaviour and Daily Activity Using Triaxial Accelerometer Data by <i>Shuwen Hu</i> Fishing for Heritability in the Gill Microbiome: Why Statisticians Should get out into the field by <i>Elle Saber</i>	Session 9B – Chair: Sam Mason Do Mice Matter? The Impact of Mice on a New Zealand Ecosanctuary by <i>Vanessa Cave</i> Modelling Species Diversity from Citizen-Science Bird Counts by <i>Graham Hepworth</i> Continental-Scale Bayesian Analysis of Acacia Flowering Phenology: A Novel Framework Integrating Phylogenetic Signal and Circular Statistics by <i>Owen Forbes</i> Spatio-Temporal Species Distribution Modelling by <i>Sam Mason</i>
15:10	Afternoon Tea	
15:40	Session 10A – Chair: Julian Taylor The <i>equalto</i> covariance structure for meta-analysis using the glmmTMB R package by <i>Coralie C. Williams</i> Simulation-based Inference about Variance Components by <i>Farwa Saleem</i> A Proportional Random Effect Block Bootstrap for Highly Unbalanced Clustered Data by <i>Zhi Yang Tho</i>	Session 10B – Chair: Oyelola Adegboye Extending diagnostic validity meta-analysis to several diagnostic guidelines by <i>Alain C. Vandal</i> Risk of Guillain-Barré Syndrome after COVID-19 vaccination and SARS-CoV-2 infection: A multinational self-controlled case series study by <i>Han Lu</i> Childhood Risk and Resilience Factors for Pasifika Youth Respiratory Health: Accounting for Attrition and Missingness by <i>Siwei Zhai</i> A missing data detective story – how I navigated through a perfect storm of drop-out's, COVID and informative missingness. by <i>Eve Slavich</i>
18:30	Conference Dinner	

Friday

Start	Arc Cinema	Theatrette
08:40	Conference Registration	
09:00	Housekeeping	
09:05	Keynote – Chair: Louise McMillan	
	Saddlepoint approximations for likelihoods by <i>Jesse Goodman</i>	
10:00	Session 11A – Chair: Yidi Deng	Session 11B – Chair: David Baird
	False Discovery Rate Controlled Robust Variable Selection under Cellwise Contamination by <i>Xiaoya Sun</i>	Genstat Markdown: Reproducible Research with Genstat by <i>James M. Curran</i>
	A covariate-adaptive test for replicability across multiple studies with false discovery rate control by <i>Dennis Leung</i>	The 4S method for the longitudinal analysis of multidimensional questionnaires: application to Parkinson's disease progression from patient perception by <i>Tiphaine Saulnier</i>
	A semi-supervised framework for diverse multiple hypothesis testing scenarios by <i>Jack Freestone</i>	heritable An R package for heritability calculations for plant breeding trials by <i>Fonti Kar</i>
11:00	Morning Tea	
11:30	Keynote – Chair: James Curran	
	Optimizing Research Impact Through Interdisciplinary and Collaborative Research by <i>Charmaine B. Dean</i>	
12:20	Closing Ceremony	
12:40	Lunch	