



PICTURE COURTESY GAIL BENSON

Barwon Research Bulletin

Edition 4

December 2015



We, Barwon Health, acknowledge the Traditional Owners of the land, the Wadawurrung people of the Kulin Nation. We pay our respects to the Elders both past and present.

A word from the Director of Research..

Dear Colleagues,

It's hard to believe we are at the end of year again but what a great year 2015 has been!

This year has been one of consolidation and success—we have launched two key publications that underpin and promote research as part of the fabric of everyday life at Barwon Health; the Strategic Plan 2015-2020, with Pillar 4 as Research, Education and Training for Excellence and the 2015 Research Report, with features on our leading researchers and research groups, health and medical research across the organisation, the Barwon Health ethics committees and personal reflections from staff and students on what it means to them to be research engaged.

Download a copy from
<http://www.barwonhealth.org.au/research/column-2/research-publications/87-barwon-health-research-report-2015>

For the first time this year Research Week was co-branded by Barwon Health and Deakin University. It was a very successful week with the majority of sessions very well attended, good feedback on the workshops and an innovative live voting Ethics Debate to close the week. Each year Research Week has grown, becoming a fantastic opportunity to showcase and celebrate the health and medical research happening on our doorstep. Next year we hope to increase the community focus and introduce community based-activities in the months leading up to Research Week. So, watch this space!

Finally, with the imminent departure of Professor David Ashbridge, as our CEO, on behalf of the research community at Barwon Health we wish you well David and extend our gratitude for your tremendous support and leadership, which has enabled health and medical research to thrive at Barwon Health. We are looking forward with great excitement to another year of successful research endeavour.

Professor Frances Quirk
 Director of Research



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BARWON HEALTH & DEAKIN UNIVERSITY

RESEARCH WEEK

Poster Competition



This year a record number of entries were submitted for the annual Poster Competition, with approximately 100 entries across all categories. Thank you to all of the research teams who shared their work and congratulations to the following on their success:

**Most Outstanding
Basic Science Research -
Michael Muleme**

**Most Outstanding
Service Delivery /
Health Systems -
Shalika Bohingamuwa**

**Most Outstanding
Early Career Research -
Dual Winners:
Shalika Bohingamuwa
Alexandra Wright**

**Most Outstanding
Clinical Research -
Claire Stevens**

**Audience Choice -
Sharmilla Perinpanathan**

**Most Outstanding
Health Outcomes / Clinical
Practice -
Pam Pratumswan**

**Most Outstanding
Population Health -
Alex Wright**

Scientist's Research

Award:

Presentation-

Histone deacetylases regulate mitochondrial function, metabolism and cell survival of malignant paediatric tumours.

Rasika Samarasi

On Monday 11th November 2015 the first co-branded Barwon Health and Deakin University Research Week was launched with a keynote address from Professor Len Harrison who gave an informative and entertaining talk to a large crowd entitled "*Horizons of bio-research: let's begin with the microbiome.*"

The popular Barwon Health Research Week Poster Competition culminated on Wednesday with prize giving and celebrations. The Professorial address was given by the GCEID Foundation Director, Professor Soren Alexandersen, who shared a personal look at his global travels and achievements and insights in his talk, entitled, "*Keeping an eye on animal viruses - global spread, evolution and zoonotic potential.*"



Research Highlights:

NHMRC GRANT and FELLOWSHIPS SUCCESS

Congratulations to the following Deakin University-Barwon Health researchers on their outstanding NHMRC grant successes.

Project Grants:

“Bone health in bipolar disorder”
Led by Doctor Lana Williams,
School of Medicine (IMPACT).

Career Development Fellowships:

“Diet and mental health: translating new knowledge into innovative prevention and treatment strategies”.

A/Professor Felice Jacka,
School of Medicine (IMPACT).

“Multidisciplinary translational research to address social disparities in osteoporosis: Understanding the social context of biological mechanisms”

Doctor Sharon Brennan-Olsen
School of Medicine (IMPACT).

Did you know...

The [REGI website](#) provides easy 'how to' guides for all types of research applications

A NEW HOME FOR RESEARCH ON INFECTIOUS DISEASES

(Excerpt from [Deakin University Research Showcase 20 Nov](#))

A new phase of research on infectious diseases has begun, with the official launch of the purpose built high-tech laboratories of the Geelong Centre for Emerging Infectious Diseases (GCEID) this week.

The GCEID is a multidisciplinary collaboration between Deakin University, Barwon Health & the CSIRO's Australian Animal Health Laboratory (AAHL). GCEID researchers will seek to better understand and develop responses to the threat of emerging pandemic diseases such as Ebola, SARS & the Hendra virus, which were the result of cross-infections between humans and animals – whether livestock, pets or wildlife.

Sarah Henderson MP, Member for Corangamite, officially launched the GCEID laboratories, noting that the launch marked a “significant day in the life of the city, and of our reputation as a powerhouse of science, research, education and innovation.”

“Geelong has the ability to be the top regional centre in science research in Australia,” Ms Henderson said. “I am very proud of what we're doing in this city... and of our efforts to bring the best and brightest to Geelong.”

Deakin University Vice-Chancellor Professor Jane den Hollander officially welcomed GCEID's new Director, Professor Soren Alexandersen, an international virology and 'One Health' expert, who was recruited as one of the “best in the world” in his field of research. Professor Alexandersen recently arrived in Australia from his position as Executive Director of Canada's National Centres for Animal Disease. ('Meet the Prof' this edition)



GCEID Director, Professor Soren Alexandersen, with Sarah Henderson



In his address Professor David Ashbridge, CEO, Barwon Health, added that “The GCEID brings us all together, with a strong natural synergy, working with the City, the State and the Commonwealth to build on the biomedical expertise that we all have.”

Meet the Professor Soren Alexandersen-

Professor Alexandersen joined us on 1st October 2015 as Professor, Deakin University School of Medicine and Director of the Geelong Centre of Emerging Infectious Diseases (GCEID), a collaboration of Deakin University, Barwon Health and the CSIRO Australian Animal Health Laboratory.

GCEID is located in its new purpose built facilities on Level 3 of the Health Education and Research Building (HERB) above the Geelong Clinical School.

Prof Alexandersen completed a PhD in Veterinary Pathology, a DVSc in Molecular Virology and postdoctoral training in molecular virology, animal models of human disease, experimental epidemiology and veterinary public health.

Cont...

Prof. Sorensen's postdoctoral work was undertaken at the National Institutes of Health (NIH) Laboratory in Montana, USA, after which he returned to the University of Copenhagen as an Assistant Professor of Veterinary Pathology.

Since then he has held a variety of academic positions including; visiting Adjunct Professor at Iowa State University, Research Professor of Molecular Pathobiology, Professor and Chair of Veterinary Virology, Director of the Danish Veterinary Institute for Virus Research, Research Professor of Exotic Virology, Adjunct Professor of General Pathology and Adjunct Professor of Exotic Virology at the University of Copenhagen and the Technical University of Denmark and Head of Experimental Epidemiology at the Pirbright Institute in England.

Most recently, until his move to Geelong, Prof Alexandersen, was the Executive Director of the Canadian National Centres for Animal Disease in Winnipeg and Lethbridge, Canada.

During this period he was also the lead for the Canadian Animal Health Surveillance Network (CAHSN), a national network of front-line diagnostic animal health laboratories across Canada.

Outside of work Prof Alexandersen describes himself as "a genuine Viking", who grew up in Denmark and has travelled across the world. He enjoys snow and ice and in particular cross-country skiing, but here in Geelong he may have to settle for his second outdoor passion, kayaking.

The Research Directorate extends a warm welcome to Prof Alexandersen and we encourage our research community to take the opportunity to 'meet the Prof' and take a tour of the impressive new facilities in HERB.

Research in the news:

Promising Ebola drug

A new study suggests that gamma interferon, an FDA-approved drug, may have potential as an antiviral therapy to prevent Ebola infection when given either before or after exposure to the virus.

The findings, published in the journal PLOS Pathogens, show that gamma interferon, given up to 24 hours after exposure, inhibits Ebola infection in mice and completely protects the animals from death.

Hospital in home 'safe'



TREATING patients with nursing home-acquired pneumonia at home may be less risky than transferring them to hospital, with new research showing they can be safely treated at home with an intensive medically based program.

A case-control study published today by the *MJA* found high-level care nursing home patients treated for pneumonia through the Royal Melbourne Hospital's hospital in the home (HITH) program had similar outcomes to those receiving usual ward-based care.

Scientists debate how far to go in editing human genes

The International Summit on Human Gene Editing convened in Washington, D.C. this week, to debate: How far should scientists go when editing human DNA?

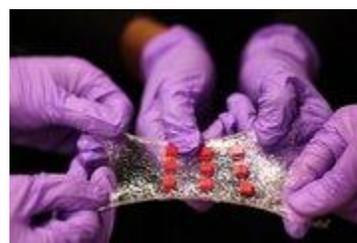
The main focus was whether scientists should be allowed to use powerful new genetic engineering techniques to edit genes in human eggs, sperm or embryos — an extremely controversial step that raises a host of thorny safety and ethical issues.

At the end of the meeting Thursday, conference organizers concluded it would be "irresponsible to proceed" with any attempt to create a pregnancy or a baby from human eggs, sperm or embryos that have been altered, because of safety and ethical concerns.

But "intensive basic" research is "clearly needed and should proceed" the committee.

Stretchy hydrogel 'band aid' senses, lights up, delivers medicine

Engineers have designed what may be the Band-Aid of the future: a sticky, stretchy, gel-like material that can incorporate temperature sensors, LED lights, and other electronics, as well as tiny, drug-delivering reservoirs and channels. The 'smart wound dressing' releases medicine in response to changes in skin temperature and can be designed to light up if, say, medicine is running low.



Biostatisticus sapiens

(the common: Biostatistician)

By Stephen Lane

Rather than my usual thoughts on all matters statistics and research, I thought I would use my column this time around to 'spruik' access to statistical packages for researchers here at Barwon Health. Funded by the 2014/2015 round of the ETRPF (see last newsletter for further details), StatLab is a dedicated computational server that is accessible via remote connection.

Using the right tool for the job is just as essential for research as it is in construction, and StatLab provides access to two statistical computing environments:

R (<https://www.r-project.org/>)

Stata 14 (<http://www.stata.com/>).

Both programs provide fully-featured statistical analysis routines, as well as direct programmatic access for power users (eg, write your own algorithms). No longer will you have to rely on using a spreadsheet or some online calculator of dubious origin to power your research – rely on StatLab instead!

Also as part of the ETRPF funding, a regular statistical computing drop-in session will be set up to begin in the New Year. Two dedicated PCs will be located in the new library building within St Mary's, and I will be providing direct support for new (and seasoned) users.

Look out for further announcements in 2016!

To get access to StatLab, or arrange a demonstration, please direct enquiries to biostatistics@barwonhealth.org.au

Selected Recent Publications



O'Brien, D. P., Friedman, N. D., Cowan, R., Pollard, J., McDonald, A., Callan, P., & Athan, E. (2015). Mycobacterium ulcerans in the Elderly: More Severe Disease and Suboptimal Outcomes. *PLoS neglected tropical diseases*, 9(12), e0004253.

Eyre, H. A., Forbes, M., Raji, C., Cork, N., Durning, S., Armstrong, E., & Berk, M. (2015). Strengthening the role of convergence science in medicine.

Convergent Science Physical Oncology, 1(2), 026001.

Garnier, K. A., Ismail, K. A., Moylan, S., & Harvey, R. (2015). Thyroid function testing in an inpatient mental health unit.

Australasian Psychiatry, 1039856215618522.

Daglas, R., Cotton, S. M., Allott, K., Yücel, M., Macneil, C. A., Hasty, M. K., & Berk, M. (2016). A single-blind, randomised controlled trial on the effects of lithium and quetiapine monotherapy on the trajectory of cognitive functioning in first episode mania: A 12-month follow-up study.

European Psychiatry, 31, 20-28.

Gabbe, B. J., Simpson, P. M., Cameron, P. A., Ekegren, C. L., Edwards, E. R., Page, R., & de Steiger, R. (2015). Association between perception of fault for the crash and function, return to work and health status 1 year after road traffic injury: a registry-based cohort study.

BMJ open, 5(11), e009907.

Dunning, T. (2016). Lifestyle management, including nutrition, of diabetes in older people. *Advanced Nutrition and Dietetics in Diabetes*, 218-228.

Peters, A. T., Shesler, L. W., Sylvia, L., da Silva Magalhaes, P. V., Miklowitz, D. J., Otto, M. W., Ellen Frank E, Berk M, Dougherty DD, A Nierenberg A, ADeckersbach T (2015). Medical burden, body mass index and the outcome of psychosocial interventions for bipolar depression. *Australian and New Zealand Journal of Psychiatry*, 0004867415616694.

Ong, W. L., Evans, S. M., Spelman, T., Kearns, P. A., Murphy, D. G., & Millar, J. L. (2015). Comparison of oncological and health related quality of life (HRQOL) outcomes between open (ORP) and robotic-assisted radical prostatectomy (RARP) for localized prostate cancer—findings from the population-based Victorian Prostate Cancer Registry (PCR). *BJU international*.

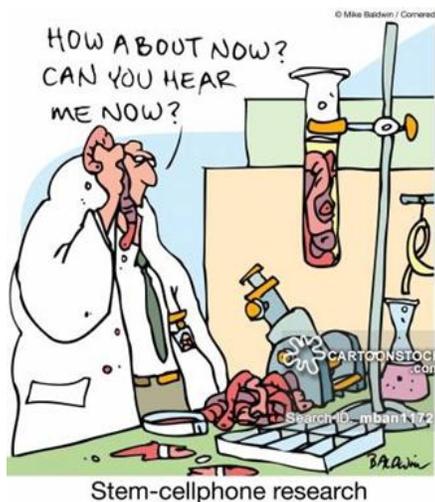
Gill, S. D., Redden-Hoare, J., Dunning, T. L., Hughes, A. J., & Dolley, P. J. (2015). Health services should collect feedback from inpatients at the point of service: opinions from patients and staff in acute and subacute facilities. *International Journal for Quality in Health Care*, mzvo81.

Moloney, J., & Sanders, K. M. Kara L. Holloway, Gosia Bucki-Smith, Amelia G. Morse, Sharon L. Brennan-Olsen, Mark A. Kotowicz, David.(2015) Humeral Fractures in South-Eastern Australia: Epidemiology and Risk Factors. *Calcified Tissue International and Musculoskeletal Research* 10.1007/s00223-015-0039-9

Orford, N. R., Lane, S. E., Bailey, M., Pasco, J. A., Cattigan, C., Elderkin, T., & Kotowicz, M. A. (2015). Changes in Bone Mineral Density in the Year After Critical Illness. *American journal of respiratory and critical care medicine*, (ja).

Marshall, M. R., Polkinghorne, K. R., Kerr, P. G., Hawley, C. M., Agar, J. W., & McDonald, S. P. (2015). Intensive Hemodialysis and Mortality Risk in Australian and New Zealand Populations. *American Journal of Kidney Diseases*. Available online 11 November 2015





Upcoming Training & Workshops

CLINICAL RESEARCH

CCR2 - Coordinating Site Start-up, Ethics and Resourcing More Effectively (for coordinators)
 Melbourne - 17 March 2016 NEW DATE
 Sydney - 6 June 2016

Conducting Clinical Research (CCR1) - Essential GCP Training for Study Coordinators
 Melbourne - 18 - 19 February 2016
 Sydney - 22 - 23 February 2016
 Brisbane - 16 - 17 June 2016

CRA 1 - Essential GCP Training for New CRAs
 Melbourne - 25 - 26 February 2016
 Sydney - 3 - 4 March 2016

CRA 2 - Clinical project management for CRAs
 Melbourne - 10 - 11 March 2016
 Sydney - 23 - 23 March 2016

MEDICAL AFFAIRS

Medical Affairs Interest Area Meeting - Biosimilars and the Australian Pharmaceutical Environment
 Online - 15 December 2015
 FREE FOR ARCS MEMBERS

GENERAL INDUSTRY

An Introduction to Project Management
 Sydney - 8 February 2016

Making Sense of Statistics
 Sydney - 3 - 4 March 2016
 Melbourne - Expressions of interest

Health Economics for Non-Economists
 Sydney - 21 March 2016

REGULATORY AFFAIRS

Introduction to Australian Regulatory Affairs
 Sydney - 24 - 26 February 2016
 Melbourne - 7 - 9 March 2016
 Brisbane - Expressions of interest for February 2016

Document Authoring for Electronic Regulatory Submissions
 Sydney - 14 March 2016
 Melbourne - Expressions of interest

MEDICAL DEVICES

Post-market Requirements for Medical Devices
 Sydney - 15 December 2015 LAST CHANCE!

PHARMACOVIGILANCE

An Introduction to Pharmacovigilance: A theoretical approach
 Sydney - 16 March 2016
 Melbourne - 27 April 2016

Pharmacovigilance in Practice - The Pharmacovigilance Professional
 Sydney - 4 April 2016
 Melbourne - 18 May 2016

ON DEMAND WEBINAR RECORDINGS

Oncology Therapeutic Area Training for Clinical Professionals
 Online - Recorded on the 19th of November 2015 ARCS MEMBER LOGIN REQUIRED

Clinical Sites - How to be Audit Ready
 Online - Recorded on the 5th of November 2015 ARCS MEMBER LOGIN REQUIRED

ARCS e-learning On Demand courses

Clinical Research ARCS Clinical Certification Programme

Clinical Research Applied GCP Training for Investigational Sites and Sponsors (Full Programme)

Clinical Research ARCS GCP Refresher Training for Investigational Sites

Coming Soon !

REGI Unit will be offering some 'Lunch & Learn' Research, Ethics and Governance Training Unit sessions in 2016. Details to follow in the new year.

Statistics Workshop Series

Interpreting The Numbers:

A Guide to Statistical Concepts in Diabetes

Session One: One: Study Design, 30th March

Session Two: Subgroups, 1st June

Session Three: Real World Evidence, 21st September

Session Four: Endpoints and Analysis Methods, 23rd November

Each session will involve a presentation (45 mins) & a Q&A session (15 mins).

To be held in the HERB - details to follow in the new year.



ETHICS COMMITTEE

MEETINGS 2016

No meeting in January.

Next BH HREC Meeting

10 FEBRUARY 2016

(Submission date 27 January 2016)

Next BH RRC Meeting

09 FEBRUARY 2016

(Submission date 26 January 2016)

For all 2016 Committee dates see:

http://www.barwonhealth.org.au-RRC_HREC_Meeting_Dates_2016.pdf

MJA Poll

Should all medical specialities become more proactive in stamping out bullying and harassment?

Choices

- Yes – it's not just surgeons
- Maybe – some specialties don't have a problem
- No – change is happening

[Vote here](#)

Goodbye to Gail Benson

In this Christmas edition of our newsletter we are sad to report that Gail is leaving REGI and Barwon Health.



Gail has decided to retire on the north coast of NSW where she will pursue her great love of photography, walking her dogs and doing nothing on the beach.

Gail joined REGI in May 2014 and things have not been the same since. She found a place for everything and put everything in its place.

Gail revolutionised our filing and contracts storage, and was invaluable in getting the GPP pilot project running. Gail does much of the preparation for our research newsletter and contributed the wonderful photos for the cover pages.

During her time with us we learned that Gail hates Xmas, loves dogs, has trouble with diets, used to ride a big motorbike and would do anything for her good mates and colleagues.

Gail has brought much laughter and coffee to REGI and she works with a sense of pride and joy that has permeated the corridors of KHERB.

It has been an enormous pleasure working with and getting to know Gail and REGI admin is in great shape thanks to her hard work and efficiency.

We will miss her profoundly and might have to have some of our next team meetings on the NSW coast!

We wish Gail every happiness on her new adventures and thank her for her 7 years of dedication to Barwon Health.



Wishing everyone

A Very *Qualitative* Christmas

DARE

VERIFYING CHRISTMAS SPIRIT EFFICIENCY

