

Successful Grant-in-Aid Applicants and CMRF Fellowship Round

Congratulations to the following researchers who were successful in our recent Grant-in-Aid and Fellowship Rounds.

Grant-in-Aid - Professor Andrew Day. Department of Paediatrics, University of Otago



The project: Designing and testing an app for young people with inflammatory bowel disease. Keeping track of daily symptoms, food habits and medication use are essential for individuals learning to cope with the daily challenge of inflammatory bowel disease. The aim of this project is to develop a phone app for this purpose.

Reviewers felt the development of a phone app could be a game changer for the management of this condition in young people, who find monitoring their own condition difficult. A useful app can make this monitoring very easy and could also provide a good record to help the consulting physician to offer advice and management planning.

Prof Day trained in paediatrics in Christchurch and undertook further subspeciality training in Toronto, Canada. After completing clinical and research training in Canada, Professor Day took up a clinical academic position at University of New South Wales, Sydney, Australia. He returned to the department in 2009 and was appointed to Head of Department in 2010. Professor Day is a paediatric gastroenterologist.

Nursing Fellowship - Ian Averill, Clinical Psychiatric Nurse, Mental Health Services, CDHB



The project: Evaluating the worth of physical activity monitoring as an early indicator of response to therapy in depressed hospitalised individuals.

It is well known that response to anti-depressants is slow and often many weeks and even months can elapse before a response can be confirmed. Not all drugs work for all people and it is not uncommon for a number of combinations to be trialled before an effective therapy is found. Therefore, improved detection of a response could greatly diminish the period of clinical uncertainty and would certainly enhance that patient treatment.

Mr Averill was first registered as a Psychiatric nurse in 1984 and more recently has been a specialist mental health clinical nurse.

All reviewers felt this was a very strong application in a clear area of clinical need.

Registrar Fellowship - Dr Natalie Martin: Assessing the outcomes of children with meningitis in a multi-centre study



Dr Martin is enrolled for a PhD at the University of Oxford and wishes to finalise her studies by completing the analysis of data collected while training part-time in general paediatrics. Her study has involved assessing the outcomes of children with meningitis in a multi-centre study with 3005 children, monitoring mortality, neurological ramifications, quality of life outcomes, and neuropsychological outcomes. The worth of this study has already been validated in Oxford and the completion of the thesis and publication of the findings will undoubtedly be of major benefit.

Dr Martin has recently returned to New Zealand from the UK. Her intention is to establish her clinical research career in Christchurch and she states a commitment to remaining in the City. The reviewers felt that Dr Martin will be a great asset for medical care and research in Canterbury.

Thank you to the Ballantyne Family

Born and bred in Canterbury, Timothy Ballantyne had many adventures in life such as rowing at Henley-on-Thames, sailing round the World in the BT Challenge and helping build the Emirates Air Line Cable Car over the Thames prior to the 2012 Olympics. In his twenties he settled in England to work in his own business as a mechanical engineering consultant with British Railways. Tragically, early in 2015, Timothy was diagnosed with Leukaemia and passed away in October last year in his late forties. He leaves behind his wife Liz and 3 year old son, Oscar.

His parents, Campbell and Lesley Ballantyne, pressed by family, wanted to enable them to help make a difference in Tim's memory. They knew he was passionate about his hometown and about research, leading them to consider donating to our Foundation in his memory.

Knowing that others who could not attend Timothy's UK funeral wanted to honour his memory, we assisted Campbell and Lesley to write a letter to the wider family, informing them how they could contribute.



We have been overwhelmed with the response with \$20,000 donated in Tim's memory. CMRF would like to sincerely thank those who donated. A wonderful gesture, after what has been a very difficult time for family and friends.

Thanks to the Neil and Pearl Hamilton Charitable Trust

We have had a great relationship with this Trust over the years with them helping us to fund various Summer Scholarships in the area of cancer.

This year, one of our successful applicants Dr Rachel Purcell, University of Otago, is running a project on the role of bacteria in the gut as a factor in bowel cancer.

“Contribution of enterotoxigenic Bacteroides fragilis to colorectal carcinogenesis”

Thanks to the Neil and Pearl Hamilton Trust who have agreed to fully fund this project in 2017.

YES, I WISH TO SUPPORT THE CANTERBURY MEDICAL RESEARCH FOUNDATION

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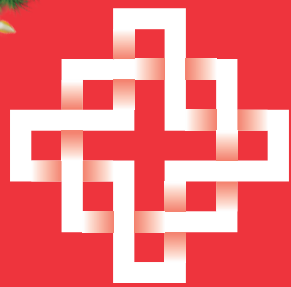
Please return to the Canterbury Medical Research Foundation, Level 1, 230 Antigua Street, Christchurch 8011

If you would like to make a donation to the CMRF by internet banking, please deposit your gift to: CMRF Account number: 010797 0530278 00 Please note your last name and "donation" in the reference line and if you would like a receipt, please email your details to caroline@cmrf.org.nz or call us on 353 1240

All donations over \$5 will receive a tax deduction receipt. If you do not wish to receive mail from us, please email kate@cmrf.org.nz



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Research Saves Lives

Research News December 2016

Wine and Art Auction boosts Mental Health Research

Every year, around this date, we publish an article on the Wine and Art Auction that always seems to have the same theme – “What a night!”.

The 23rd Annual W&A, brought together a glittering array of fine wine and art items, kindly provided by our many friends in the wine industry and an impressive list of local artists. The items on offer were matched in their sparkle, by our many lovely guests decked out in their ‘gladrags’ for the night. With stand out experiential items such as a signed Muhammad Ali glove, Signed Ronaldo football boot and weekend in the Hunter Valley, the bidding was, as always, pretty fierce. We were delighted at the prices attained and our wonderful auctioneers did a great job of encouraging generous bids from their very willing ‘victims’! A highlight was the sale of a Grace Butler painting “Bowl of Roses” which came to us via the Estate of Rhona Wright, who also donated \$1.8 million in 2016 via a bequest.

Dr Julia Rucklidge spoke to us all about her research and challenged us all to think differently about the treatment of mental illness. We are delighted to be able to provide \$100,000 in funding for Julia and her team as a result of this year's auction.

With any event of this kind, so much depends on the goodwill and generosity of many people, so our list of thank you's is a necessarily long one. *Charles & Sandi Wiffen of Charles Wiffen Wines, Dr Bala Patel, Ivan & Chris Donaldson of Pegasus Bay Winery & Restaurant, Southern Eye Specialists, Phil & Mark McGoldrick, Ned Allison Harcourts, Gary Tricker, Karen Purchas of Passion Flower, Llew Summers, Rachel & Matthew Rose, Rydges Latimer Christchurch, John Gillies, Dr Marcel & Mel Brew, Gabrielle Tasman, Sutherland Todd, Hogland Glass Art, Darryn George.*

The many the generous donations of items from Artists, wineries, businesses and individual donors who helped make up the stellar line up of auction items. Those who ‘bidded large’ to ensure we raised \$100K for Prof Julia Rucklidge's research. Also to the committee Caroline Wagteveld McKenzie, Sue Stenhouse, Mel Brew, Julie Hutton, Janette Borthwick, Ron Wright and Shona Ross.

“I am so delighted to accept the funds raised from the Annual CMRF Wine and Art Event. Our team are excited about the opportunities this presents to us, including being able to conduct genetic analyses for our current RCT with children with ADHD as well as get some new projects off the ground. Thank you to the donors for their generosity in supporting our research.” Dr Julia Rucklidge



Research Story - Dr Kristin Gozdzikowska

One of the projects we have been tremendously proud to support, is the UC Rose Centre for Stroke Recovery and Research at St Georges Hospital. As you will know from previous stories, CMRF was instrumental in funding the set up of the Centre through a generous bequest from the Estate of Shirley Rose. This year, one of the researchers at the Centre was successful in securing a research grant from CMRF through our Major Projects Round.

I spoke to Dr Kristin Gozdzikowska about her project.

I began my study in the field of Speech Language Therapy at the University of Missouri in 2004. After obtaining my Bachelor's degree, I worked towards my Master's degree at the University of Washington in Seattle. This degree was focused on assessment and rehabilitation of adults with cognitive, communication and/or swallowing-related deficits following neurologic impairment.

I began clinical work as a Speech Therapist in acute care and inpatient rehabilitation and from there developed a specific interest in the assessment and management of swallowing impairments after neurologic impairment. This has been expanded in my doctoral research, which I completed this year. My doctoral programme centered around an international, multi-site project to investigate dysphagia in acute neurologic injury. I have a passion for research in the area of rehabilitation, and feel great pride contributing to increasing positive outcomes for patients and their families.

After stroke, the majority of patients will experience difficulties swallowing. Being able to evaluate swallowing quickly and accurately is critical in a hospital setting, as swallowing impairments can place patients at a high risk of chest infections or mortality if not managed appropriately. We want to further investigate a technique called manometry, which measures throat pressure when swallowing. This measure is one of the only tools available to measure swallowing objectively, but there is disagreement on the most valid and reliable way to analyse this data. Our project aims to compare manometry to swallowing x-rays in order to further clarify measurement methods. From an international perspective, I have been invited to speak on a panel at one of the largest Speech Therapy Conferences in the United States regarding this same topic and there is a pressing need worldwide for further evaluation of best practice in swallowing assessment, which is critical to keep patients swallowing safely and effectively.

My future goals include establishing a research line supporting the great work being done at the UC Rose Centre for Stroke Recovery and Research. This state of the art facility is one of the best appointed swallowing-research laboratories in the southern hemisphere and will extend this research / clinical expertise to address all aspects of rehabilitation in this population in the coming years. The field of Speech and Language therapy is very expansive in its scope across many neurologic domains, including communication, swallowing, cognition, among others. Therefore, the list of clinically-necessary research projects increases by the moment!

My three biggest challenges currently are:

1. As an emerging researcher, it is always difficult initiating increasingly independent research. With competitive funding rounds, it can be an intimidating prospect for recent graduates to demonstrate the skills and experience needed attract funding prospects. Therefore, I greatly appreciate funding organisations such as the CMRF who purposefully endeavor to expand funding for emerging researchers, providing the opportunities to develop fulfilling and clinically meaningful research programmes.
2. Another great challenge I face is related to geographic constraints of New Zealand – it takes great financial resources to



(from left to right): Dr Kristin Gozdzikowska and Rose Centre Biomedical Engineer Esther Guiu Hernandez

stay relevant in the international research community with regard to travel! Thankfully, increases in information sharing and social media have been great in aiding to establish collaboration and research links across centres. Additionally, increasing world awareness of the great research occurring in New Zealand has truly put this research powerhouse country on the map. State of the art combined clinical and research centres such as ours have aided in raising the international profile of Christchurch as a research destination.

3. The third biggest challenge in my present research is engaging and promoting efforts to change clinical practice. This is a long-standing struggle for many clinical researchers and clinicians alike – and is a topic that warrants research in and of itself! Currently, I am working at a specialty traumatic brain injury centre called Rehabilitation at Laura Fergusson, which provides truly evidence-based, interdisciplinary, intensive rehabilitation. However, not all rehabilitation centres have access (and open mindedness) to engage with researchers and shape clinical practice to adhere to best practice for patients. Clinicians are very busy with understandable barriers to accessing and integrating new research in clinical practice. Similarly, researchers can always improve the methods in which they disseminate their findings in clinically accessible way. This is why I have enjoyed my work under the supervision of Prof Maggie-Lee Huckabee, who is very clinically-minded alongside conducting world-renowned research. I always try to challenge myself to keep a clinical perspective to make small steps towards this goal.

2016 has been a year of my biggest achievements so far – lifetime milestones! I started this year by successfully completing my doctoral degree – accepted without correction, shortly followed by my wedding (and the long process of changing to my new, and very long, Polish last name :-)) , and then being informed I was successful in receiving my first post-Ph.D. Project Grant application through the CMRF. This year has truly been magical and I greatly appreciate the generous support provided by the CMRF in contributing to these successes.

Summer Student subjects and co-sponsors

We are delighted to be funding several projects at both the University of Canterbury and the University of Otago Medical School, over the Christmas and New Year break.

We have several key supporters that assist us with this funding so our grateful thanks to the following Trusts and people who make our support of the Summer Student programme possible:

Neil and Pearl Hamilton Charitable Trust
S J Charitable Trust
Rose Estate
Anonymous donor
W H Travis



Canterbury University

- Inhibitory effect of statins on atheroma inflammation
- Characterising the active site of NagA - an enzyme critical for bacterial sialic acid catabolism
- Characterising the active site of NanK - an enzyme critical for bacterial sialic acid catabolism
- The phosphoribosyl transferases: potential targets for new anti-tuberculosis therapies
- Vibrotactile stimulation of cough reflex: a pilot study
- Establishing normative data for ultrasound assessment of swallowing

University of Otago Christchurch

- The effects of oestradiol and progesterone on the expression of Focal Adhesion Pathway and proliferation markers in Ishikawa cell culture
- A naturalistic study of outcomes with olanzapine long acting injection
- A cross-sectional analysis and benchmarking of clinical assessment data using the electronic Persistent Pain Outcomes Collaboration assessment tools
- Early unplanned hospital re-admissions in frail older people receiving a community rehabilitation service - Causes and precipitants.
- A New Zealand PHODA: A measure for identifying the perceived harmfulness of activities

Introducing Dr Cheryl Doig

Having farewelled John Bayley as Chairman for the NZ Brain Research Institute Board after twelve years of sterling service, the Board elected Dr Cheryl Doig as the new Chairperson.

Cheryl is a leadership futurist and curator of leadership ideas. She follows leadership trends and research and translates these into practice, working internationally and virtually with organisations, business leaders and educators. Her passion is for challenging organisations to think differently in order to adapt to a changing future – to think beyond their current leadership realities, while still using the best of the past.

Cheryl has been a highly successful school principal, teaching fellow in Education Management, and school reviewer. As a principal, Cheryl led both Richmond and Fendalton schools to achieving national recognition for their standards of excellence in education, including being awarded Goodman Fielder School of the Year. Cheryl has also received a number of prestigious awards for leadership in education, including the Beeby Fellowship and the Woolf Fisher Fellowship.

The CMRF Board look forward to working alongside Cheryl and her governance team at the NZBRI.

Welcome to Professor Ian Wright

The Board warmly welcomes Ian to the CMRF governance team as a Co-opted member.

Professor Ian Wright is the Deputy Vice-Chancellor (Research and Innovation) at University of Canterbury. Ian has a significant personal research career, coupled with extensive experience in research and technological leadership and management, having previously worked at the National Institute of Water and Atmospheric Research in Wellington. At NIWA he was the Centre Leader for Coasts and Oceans, and then spent eight years at the National Oceanography Centre / University of Southampton in the UK. His time in the UK included four years as Director of Science and Technology at the National Oceanography Centre, and a member of the UK Natural Environment Research Council Science Board. Ian sits on a number of National Science Challenges governance groups including the Brain Research New Zealand, a Centre of Research Excellence. Ian has also been welcomed onto the NZ Brain research Institute Board.

Did you know?

All medical advances have come about from medical research and New Zealand has had its fair share of medical ‘ground breakers’. Over the next year, we will bring you a few facts about medical discoveries and inventions that have originated in NZ!

Colin Albert Murdoch ONZM (6 February 1929 – 4 May 2008)

was a New Zealand pharmacist and veterinarian from Christchurch, who made a number of significant inventions, in particular the tranquilliser gun, the disposable hypodermic syringe and the child-proof medicine container. He had a total of 46 patents registered in his name!

