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In the spirit of respect, Menzies School of Health Research acknowledges the people and elders of the Aboriginal and Torres Strait Islander Nations who are the Traditional Owners of the land and seas of Australia.

For the purposes of this document, ‘Indigenous’ refers to Australia’s Aboriginal and Torres Strait Islander peoples.

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Director and Chairman’s message

2016 marked an important period of consolidation for Menzies. Our researchers continued to be recognised as leaders in their fields, receiving prestigious awards and funding for new and important projects. We also received our most significant philanthropic support to date, with over $4 million committed to sustain our research programs. In addition, the Northern Territory (NT) Government provided $5 million of additional funding to support our work in the Territory.

In October, the Menzies School of Health Research Act was amended to include a move to a skills-based board. The new board structure and our new strategic plan, Menzies 2021, will position us as leaders in our sector.

Highlights

Our work continued to inform and influence policy decisions and practices. Some of these include:

- Malaysia’s national malaria treatment guidelines were updated based on findings from our recent malaria study in Sabah.
- The American College of Chest Physicians guidelines (2016-17) were updated to include results from a study on chronic cough in children led by Menzies.
- The first cohort of community-based researchers graduated with a Certificate II in Community Health Research.
- The Darwin Prospective Melioidosis Study recorded the 1000th consecutive case of melioidosis in the NT. The 27-year study has informed international guidelines for diagnosis and treatment of melioidosis.
- Our research informed the 2016 national campaign ‘Don’t make smokes your story’.
- We hosted the inaugural World Indigenous Cancer Conference (WHICC) in Brisbane.

Our priorities

Our new five-year strategic plan, Menzies 2021, will be launched in 2017. The plan will provide a strong foundation to ensure we continue to be regarded as leaders in Indigenous and tropical health research, achieve excellence in research translation and impact, and remain a strong and resilient organisation.

Our people

Menzies’ most vital asset is its people. Our staff are proof world-class research can be conducted in northern Australia, and the results translated to change health service delivery.

We thank the members of the Menzies Board who give generously of their time and expertise.

Our thanks

During the year, a number of longstanding members retired from the Board: The Honourable Claire Martin, The Honourable Justice Hilary Hannam; Professor David Celemajer AO; Professor Len Notaras AM; Professor Sharon Bell and Mr Robert Wells. We would like to acknowledge their significant contribution to Menzies. In October, we were pleased to welcome new Board member, Mr Trevor Riley, who brings a depth of expertise and enthusiasm as the former Chief Justice of the NT.

Our Board

Mr Peter Plummer
Board Chair
Prior to retirement, Peter spent forty years working in the public service in Papua New Guinea (PNG) (16 years) and the NT (25 years).

He was founding Principal of Batchelor College and subsequently deputy secretary of Primary Industries and Fisheries then Industries and Development. Than followed appointments as chief executive officer of Mines and Energy, Health and Community Services, and finally Education.

He has also served on many boards and committees including Chair of Cullen Bay Management Committee, National Curriculum Corporation, CDU Council, and CDU Strategic Positioning Project.

Mr Richard Ryan AO
Board Treasurer
Richard is currently director of a number of public and government boards including the NT Treasury, the Australian Government Solicitor’s Advisory Board and the Adelaide Festival.

He is the Chairman of Edtute, Chair of Auspep Holdings Ltd and Deputy Chancellor of CDU.

Ms Donna Ah Chee
Board Deputy Chair
Donna is the chief executive officer of the Central Australian Aboriginal Congress Aboriginal Corporation, the Aboriginal community controlled primary health care service in Alice Springs.

She is a Bundjalung woman from the far north coast of New South Wales (NSW) and has lived in Alice Springs for over 25 years.

She has been actively involved in Indigenous affairs for many years, especially in the area of Indigenous adult education and Indigenous health.

She convened the Workforce Working Party under the NT Aboriginal Health Forum, was Chairperson of the Central Australian Regional Indigenous Health Planning Committee, a member of the NT Child Protection External Monitoring Committee and jointly headed up the NT Government’s Alcohol Framework Project Team.

She currently sits on the National Drug and Alcohol Committee and at a local level, represents the Congress on the People’s Alcohol Action Coalition.

Our engagement with Charles Darwin University (CDU), the NT Government, health services, and communities here in the NT and across the region is essential to our success.

We thank everyone who supported us throughout 2016 and welcome those of you who joined us for the first time.

We look forward to 2017 as we continue to work together to advance access to essential healthcare and improve health outcomes.

Director, Professor Alan Cass
Chair of the Menzies Board, Mr Peter Plummer

Our Board
**Professor Simon Maddocks**  
Maddocks is the Director of the Menzies Foundation and Menzies. He has a strong record of working in Indigenous health. He has a particular interest in the prevention and management of chronic disease and Indigenous health. His research has focused on developing, implementing and evaluating effective strategies to improve health outcomes.

**Mr Ken Davies**  
Ken is currently the chief executive officer of Territory Families and a member of the CDU Council. He has previously held chief executive officer roles with NT departments of Education; Lands, Planning and Environment; Housing, Local Government and Regional Services, and was the deputy chief executive of the Department of the Chief Minister.

**Mr Rowan Johnston**  
Rowan is a Sydney-based corporate advisor and is currently Managing Director of C42 Consulting, a private advisory firm. He previously spent almost 30 years as an investment banker and corporate advisor in senior roles with Deutsche & Co. Australia (formerly Caliburn) and Deutsche Bank in Australia and Hong Kong.

**Mr Trevor Riley**  
Appointed 17 October 2016  
Prior to retirement in 2016, Trevor was the Chief Justice of the Supreme Court of the NT. He served on the Supreme Court for some 18 years. During his tenure as Chief Justice, he was outspoken about cuts to legal aid, high imprisonment rates and addressing alcohol abuse.

**Professor Sharon Bell**  
Until 7 March 2016  
Professor Bell’s background is as a senior academic administrator, a documentary filmmaker and an anthropologist. Professor Bell holds a PhD from the University of Sydney in the discipline of Anthropology. She has worked with international agencies such as the World Bank, the Sri Lankan University Grants Commission and AusAid on institutional capacity building projects.

**The Honourable Clare Martin**  
Until 30 June 2016  
In 2001 Clare Martin led the Labor Party to its first ever victory in the NT. Clare was Chief Minister for over six years, and during that time held a number of ministries including Treasury, Police, Asian Relations and Trade, Arts and Museums, Indigenous Policy and Tourism. Following her 13 years in politics, Clare was CEO of the Australian Council of Social Service, and then Professorial Fellow at the Northern Institute of CDU. During her years at CDU, Clare co-wrote, with Dr Mickey Dewar, ‘Speaking for yourself’, reflections from eight Territory leaders on the challenges of being a chief minister of a territory rather than a premier of a state.

**Mr Robert Wells**  
Until 16 October 2016  
Robert Wells heads policy for research assets at the Sax Institute in Sydney. This role involves overseeing the management and development including the Secure United Research Environment (SURE) which provides capacity for researchers to access linked patient data for research purposes. He is also involved in programs to build links between researchers and policy makers and to enhance the availability of research knowledge in informing policy.

Prior to joining the Australian National University in 2004, Robert was a senior executive in the Federal Health Department for over 20 years. He held a wide range of policy areas over that time including programs for chronic disease, health workforce, rural health, health and medical research and private health insurance. Robert has extensive experience in facilitating the take-up of evidence in developing sound policies. He advises government agencies, non-government organisations and the private sector in policy areas. He has represented Australia at meetings and conferences overseas and has established global research collaborations in health policy areas.
Corporate governance

Menzies is an independent body corporate established under the Menzies School of Health Research Act, and has its own Board. Menzies is a controlled entity of CDU.

Menzies is required to present an annual report and audited annual financial statements to an annual general meeting.

Menzies financial statements are subject to audit by the Auditor-General of the NT.

In October 2016, the Menzies School of Health Research Act was amended. The amendments, amongst other things, transition Menzies to a skills-based board, requiring members to have skills in areas such as commerce, finance, accounting, law, marketing, philanthropy, scientific, biomedical or clinical health research.

Three standing committees assist the Board in carrying out its responsibilities:

- Risk and audit committee
- Finance committee
- Academic standing committee

Each committee has its own Charter which is reviewed on an annual basis.

During 2016, committee members were:

**Risk and audit committee:**
- Mr Bob Hudson (Chair)
- Mr Ken Davies (appointed 30 June 2016)
- The Hon Clare Martin (resigned 30 June 2016)
- Mr Robert Wells (term ended 17 October 2016)
- Mr Trevor Riley (appointed 17 October 2016)
- Professor Alan Cass
- Mr Ross Springolo
- Ms Sophie Cleveland
- Ms Louise Dutton
- Mr Peter Hopton (leave of absence)

**Finance committee:**
- Mr Richard Ryan AO
- Mr Rowan Johnston
- Mr Tom Ganley
- Ms Tracey Scott
- Professor Alan Cass

**Academic standing committee:**
- Professor Lawrence Cram
- Professor Alan Cass
- Professor John Chalmers
- Professor Ric Price

**Development committee**

- Mr Rowan Johnston (Chair)
- Mr Richard Ryan AO
- Professor Alan Cass
- Ms Suzi Huilick
- Mrs Kate Russell
- Dr Richard Russell
- Mr Simon Schwarz
- Mr Colin Baillie

Our organisation

Who we are

As one of Australia’s leading medical research institutes dedicated to improving the health and wellbeing of Indigenous Australians and a leader in global research into life-threatening illnesses, we continue to translate our research into effective partnerships and programs in communities across Australia and the Asia-Pacific region.

Research focus areas

- Child Health: Anaemia, child development and education, ear health, lung diseases, child protection, skin diseases
- Global and Tropical Health: Malaria, melioidosis, rheumatic heart disease, tuberculosis, Hep B
- Wellbeing and Preventable Chronic Diseases: Cancer, addictive behaviours, mental health, kidney disease, diabetes, nutrition

Number of staff = 192 FTE

Number of students = 193

Senior management team

- Professor Alan Cass
- Brendon Douglas
- David Blair
- Heather D’Antoine
- Associate Professor Gail Garvey
- Associate Director for Aboriginal Programs

- Number of staff
- Number of students
- Senior management team
Organisational structure

Our impact

Where we work

Our headquarters are in Darwin, with offices in Alice Springs, Brisbane, Melbourne, Timika (Indonesia) and Kota Kinabalu (Malaysia).

Our work spans central and northern Australia, and developing countries within our global neighbourhood.

For every $1 invested in Menzies there is an economic and health return of $2.70.

Pioneering global and tropical health work extending into countries across the Asia-Pacific region.

150+ research projects and programs.

60+ remote community partnerships across central and northern Australia.
2016 highlights

April
Hosted the inaugural World Indigenous Cancer Conference in Brisbane.

May
An additional $5 million in funding from the NT Government was announced to further support research that is delivering strong economic and health returns for the Territory.

July
The Deloitte Access Economics report on the Social and Economic Contribution of Menzies was launched at the Deloitte offices in Sydney.

October
Amended Menzies School of Health Research Act comes into force.

November
Awarded a $6 million grant to lead the collaborative project Improving Health Outcomes in the Tropical North: A Multidisciplinary Collaboration (HOT NORTH) as part of the Australian Government’s Northern Australia Tropical Disease Collaborative Research Programme derived from policies outlined in the White Paper, Developing Northern Australia.

December
Awarded a $2 million research grant to lead a program of work for the prevention, control and elimination of malaria and TB in Southeast Asia and the Pacific.

March
The Governor-General, His Excellency General the Honourable Sir Peter Cosgrove AK MC (Retd) and his wife, Her Excellency, Lady Lynne Cosgrove visited our headquarters in Darwin and met with our senior researchers.

May
International leader in Indigenous cancer research, Associate Professor Gail Garvey and PhD student, Dr Robert Commons received the 2016 National Health and Medical Research Council (NHMRC) Rising Star Research Excellence and Gustav Nossal awards respectively.

July
The first cohort of community-based researchers graduated with a Certificate II in Community Health Research.

August
Awarded $2.25 million over three years by Queensland Health to deliver the Aboriginal and Torres Strait Islander Brief Intervention Training Program.

October
Awarded a $2 million research grant to lead a program of work for the prevention, control and elimination of malaria and TB in Southeast Asia and the Pacific.

November
Dr Christine Connors awarded the 2016 Menzies Medallion for her significant contribution to primary health care, Indigenous health and Top End health services delivery in the NT.

December
Record-breaking corporate and philanthropic income of over $4 million committed.

365* peer-reviewed publications published.

*Preliminary data.
How you have helped

Our key supporters, and the many people who quietly donate funds each year, continue to make an enormous difference to people’s lives. Your support is crucial to driving our research and efforts to innovate and respond to major health problems. Every day you help Indigenous Australians and communities across our region exercise their right to good health.

We extend our gratitude to all of our donors and supporters. In 2016, over $4 million was committed which has helped us to:

**Our research Centre for Child Development and Education**

The Menzies Centre for Child Development and Education (CCDE) conducts research to improve the health, wellbeing and education of children, particularly Indigenous children, in the NT and beyond.

Last year, under the direction of Professor Gary Robinson, the Centre consolidated its ground-breaking work in the emerging field of linked data analysis and ventured onto the international stage, working with UNICEF to design and pilot a positive parenting program in Papua New Guinea (PNG).

**Suicide prevention for Indigenous children**

CCDE continued to lead research informing public policy on the prevention of Indigenous suicide.

Statistically, Indigenous residents are at far greater risk of suicide than the general population with the NT having the highest rates of hospitalisation for suicidal behaviour and death by suicide in the country.

The Centre is studying NT residents who have been hospitalised for suicidal behaviour – one of the greatest risk factors for death by suicide. The study is examining the risk factors associated with repeat hospitalisation and death by suicide to highlight opportunities for prevention to enable young lives to be saved.

**Submission to ‘Don Dale’ Royal Commission**

In 2016, the Centre provided a submission to the Royal Commission into the Detention and Protection of Children in the NT. The submission addressed the critical importance and cost-effectiveness of early intervention targeting at-risk families and diverting children from criminal trajectories and imprisonment.

By drawing attention to research evidence, along with media coverage of its work, the Centre has contributed to an improved understanding of the complex issues within the Royal Commission.

**Case study**

**PNG Parenting Program**

The Centre, collaborating with UNICEF and the Catholic Church in PNG, is working to develop and implement a positive parenting program for remote communities.

The program, “Parenting for child development: Pasin bilong lukautim pikinini gut”, aims to address the widespread corporal punishment and child maltreatment in the developing nation. It is an important element of PNG’s child protection program.

The program was developed after consultation with approximately 400 people in remote locations in three provinces and is being piloted in 10 communities in Madang and the Western Highlands to test its feasibility and cultural appropriateness and its potential as a preventive program.

Once the pilot findings are reviewed, the program will be extended to communities in four other remote provinces.
Our research
Child Health

Our child health research team continued to investigate strategies to improve the health of Indigenous children. Early childhood illness affects a child’s health as well as their ability to grow, develop and learn.

Fourth wave data released for ABC study

The Aboriginal Birth Cohort, or ABC Study has spent the last three decades checking for the earliest signs of chronic disease such as diabetes, heart and kidney disease, anxiety and depression in 686 Aboriginal infants born between 1987 and 1990 at the RDH.

The study is recognised as the largest and longest-running study of the lives of Indigenous babies born in Australia. It recently completed its fourth wave of data collection, with 71 per cent of living participants in over 40 locations across the Top End undergoing a comprehensive health assessment. The participants, now aged 22-27 years, were previously assessed in childhood (85 per cent aged 8-14 years) and adolescence (71 per cent aged 16-20 years).

Notably, data from the fourth wave revealed the dual burden of malnutrition: an increasing rate of overweight and obesity with continuing high rates of under-nutrition.

Encouragingly, the low prevalence of chronic disease markers in the cohort during young adulthood suggested there was a window of opportunity beyond childhood to target interventions aimed at reducing the high burden of chronic disease in this high risk population.

Vaccines to improve school readiness for children at risk of ear disease

Our ear health team is conducting two consecutive randomised controlled trials to determine the best vaccination strategy for early prevention of infection in Indigenous children at high risk of otitis media and hearing loss. Additional studies, also funded by the NHMRC, have recently commenced including audiological and developmental milestone assessments throughout the first three years of life. Our aim is to extend the benefits of vaccination and design interventions to improve school readiness of Indigenous children.

Results from the trials have the potential to change Australia’s National Immunisation Program schedule for pneumococcal conjugate vaccines in Indigenous and high-risk children.

Asthma app to be released in language

Popular asthma flipcharts produced by our child health respiratory team will soon be available as an app.

The flipcharts, used extensively for asthma education and health promotion, will be adapted into multilingual digital platforms with voiceovers in local Indigenous languages.

The asthma app can improve knowledge in the community by increasing access to health education, once limited to being delivered in health centres, and usability.

The app, funded through a National Asthma Research Grant, aims to reduce language and context barriers faced by Indigenous people in rural or remote settings.

Menzies’ HealthLAB beneficiary of Rotary Ladies Long Lunch

Menzies’ HealthLAB, an innovative, interactive and educational travelling health program which measures biomedical risk factors for chronic diseases from a mobile laboratory, is continuing to deliver its landmark program as the beneficiary of the Rotary Club of Darwin’s second Ladies Long Lunch fundraiser.

HealthLAB engages participants in discussions about their own biomedical measures and risk factors and empowers them to make healthy lifestyle decisions now, for better outcomes in the future. HealthLAB visits urban, rural and remote schools and public spaces to demonstrate how to ‘own your health’.

The results of the trial will become the best available evidence to guide future medical management of CSOM in high-risk children.

Case study
Improving hearing outcomes through I HEAR BETA study

Indigenous children living in remote areas of the NT are prone to a severe middle ear disease known as chronic suppurative otitis media (CSOM), or runny ears.

Although disease rates have decreased over the years, it is estimated that 15 per cent of children still live with CSOM. It can result in hearing loss, which negatively impacts the child’s future.

The I HEAR BETA study, carried out in 24 communities, aimed to discover if antibiotics and Betadine ear washes could fix chronic runny ears.

“We had one mum with six kids, at least two of whom had ears leaking pus; she felt optimistic about being part of the study because standard treatments were just not working.”

Ms Wigger said participating families felt supported through visits by trained community workers and regular phone calls from the study nurses. More than 200 children have already been enrolled in the study to trial different treatment combinations and help determine which works best.

“I HEAR BETA project coordinator, Christine Wigger.
Health practitioners in the remote Katherine East region are not sure why anaemia in young children is so common in Indigenous communities. What they do know is low haemoglobin levels in children under the age of two years can cause delays in cognitive development, which then affects their schooling and health. A health organisation successfully rolled out an anaemia prevention program in one community, and wants to identify the key components of this program to replicate it in other communities.

Our Child Health division was tasked with performing this program evaluation. We will identify the major contributors to the development of anaemia, and this program evaluation. We will identify the major contributors to the development of anaemia, and potentially change best practice guidelines when it comes to anaemia prevention.

“A quarter of the children in most remote Indigenous communities are anaemic by six months of age, and we want to identify what causes this and prevent it from happening in the future.”

Two particular areas of interest are the prevention of anaemia in pregnant mothers, and the use of oral iron supplementation in children under six months of age.

Our research
RHDAustralia

Australia has the highest recorded rate of acute rheumatic fever (ARF) and rheumatic heart disease (RHD) in the world, despite it being completely preventable. Almost all of the 6000 people on Australian RHD registers are Indigenous. In the NT, 58 per cent of cases are children aged between 5 and 14 years old.

RHDAustralia is the National Coordination Unit for the Australian Government’s Rheumatic Fever Strategy. It aims to prevent and reduce ARF and RHD through education, access and use of quality data and national engagement. RHDAustralia works with partners to translate research findings into evidence-based policy.

Data collection system improves care for ARF and RHD patients

The first report generated from the RHDAustralia Data Collection System was submitted to the Commonwealth Department of Health on 30 June 2016, marking a significant milestone for the program. The new system is the central repository for the collection of ARF and RHD data provided by participating Australian jurisdictions. RHDAustralia director, Professor Bart Currie said that the availability of accurate public health data was vital in ensuring best practice care for those living with ARF and RHD.

“If we identify the major contributors to childhood anaemia, we will then be able to develop local and targeted interventions that are specific to the NT population,” said lead investigator, Dr Therese Kearns.

“A quarter of the children in most remote Indigenous communities are anaemic by six months of age, and we want to identify what causes this and prevent it from happening in the future.”

Two particular areas of interest are the prevention of anaemia in pregnant mothers, and the use of oral iron supplementation in children under six months of age.

 RHDAustralia clinical director, Associate Professor Anna Ralph said patients who should be referred for specialist investigation could be sent home due to the difficulty in diagnosis and the lack of disease awareness.

“The thing about ARF diagnosis is there is no definitive diagnostic test. The only way to diagnose ARF is to put together a whole constellation of signs and symptoms to see if a patient has the disease,” Associate Professor Ralph said.

Education and advocacy events in QLD and the NT

As a key strategy to prevent and reduce ARF and RHD, RHDAustralia held a series of education and advocacy events in Brisbane and Darwin in 2016. Targeted workshops provided more than 280 health professionals an opportunity to learn best practice approaches to prevention, treatment and management of ARF and RHD and to hear the latest developments in RHD control.

Advocacy events followed the workshops, providing a forum for patient advocates to share their stories and voice concerns. Eddie Masina, a Djuw man from Mission Beach in Far North Queensland, shared his RHD journey which started at age five and the impact the disease has had on his life, including his survival after five open-heart surgeries and two strokes. His story highlighted the importance of early detection and diagnosis.

The free RHDAustralia Diagnosis Calculator App is a key tool for clinicians to promptly and accurately diagnose ARF. The app can be downloaded at www.rhdaustralia.org.au

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Our research

Wellbeing and Preventable Chronic Diseases

Our Wellbeing and Preventable Chronic Diseases division seeks to advance the health of Indigenous Australians by researching the causes, prevention and treatment of chronic disease, and translating the results into practical solutions.

Our research examines the many environmental factors that shape behaviour over the life course and contribute to the development and progression of chronic disease. We strive to inform policy and practice through conducting ‘real world’ research that demonstrates the most effective solutions to chronic disease.

Inaugural World Indigenous Cancer Conference (WICC) hosted by Menzies

In 2016, Menzies partnered with the International Agency for Research on Cancer to host the WICC in Brisbane.

The conference celebrated Indigenous cultures through its theme, ‘Connecting, communicating, collaborating’. It provided opportunities for delegates to network and build partnerships with a focus on improving cancer outcomes for Indigenous peoples around the globe.

More than 300 researchers, public health practitioners, clinicians, nurses, advocacy groups, allied health professionals, consumers, Indigenous community groups and leaders from 15 countries attended the conference.

Presentations from the conference can be viewed at www.menzies.edu.au/WICC2016

Report reveals petrol sniffing on decline

A national evaluation of the introduction of low aromatic fuel (LAF) in Indigenous communities affected by petrol sniffing found sniffing rates fell by 88 per cent. In most communities the introduction of LAF was widely supported, although in some places this was qualified by frustration regarding the continuing availability of regular unleaded petrol from other outlets. Overall, the findings show that improvements to community programs and services, combined with the effectiveness of LAF in preventing petrol sniffing, have helped to improve the health and wellbeing of young people.

Determining the effect of fruit and vegetable discounts in remote stores

The SHOP@RIC trial is one of four studies worldwide to provide evidence of population health interventions needed to create healthier food environments. The study tested the impact of a 20 per cent discount on fruit, vegetables, bottled water and diet drinks in 20 remote stores across the Territory. The discount was made available and promoted for 24 weeks, with an in-store consumer education strategy also implemented in ten of the stores.

Our research shows that a price discount can nudge consumers in remote communities to purchase more fruit, vegetables and bottled water. In addition, consumer education helped achieve a further small increase in vegetable purchases, confirming that creating healthier food environments can enable healthier food choices.

Indigenous women missing timely Pap test follow-up

The first results published by the National Indigenous Cervical Screening Project have confirmed Indigenous women living in Queensland (QLD) had lower screening participation and a higher prevalence of high-grade abnormal Pap tests compared to non-Indigenous women in cervical screening.

Recent results from the study, published in the Medical Journal of Australia, showed that 34 per cent of Indigenous women living in QLD with abnormal Pap test results followed up in two months compared to 47 per cent of non-Indigenous women.

Lead author, Menzies research fellow, Dr Lisa Whop, said the key contributor to Indigenous women’s higher cervical cancer incidence and mortality, however, was their lower participation in cervical screening. The findings from QLD show that any changes to the renewed National Cervical Screening Program, due to be rolled-out in 2017, need to appropriately address the needs of Indigenous women.

Case study

Story-sharing builds care relationships in Alice Springs

Kidney disease affects many Indigenous families in Central Australia. People are forced to leave their home communities to access life-maintaining dialysis treatment in major towns like Alice Springs.

The social, cultural, emotional and financial impact of this dislocation on people and their families is devastating, while the health system strains at this interface to effectively provide culturally safe care.

A consumer-led project involving people from four indigenous language groups in Alice Springs offered a transformative experience for them and the mainly non-Indigenous workforce involved in their care.

A group of Indigenous people with kidney disease, and dialysis nurses from diverse cultures, worked together to increase cultural understanding and transform care relationships using a participatory action research approach that aligned with traditional ways of learning and knowing.

“Sharing stories about personal experiences of kidney disease, living apart from family and having dialysis was central to the project,” said project facilitator Samantha Togni.

“The nurses told us that hearing these stories really had a big impact and helped them to better understand the experience of people they were caring for.”

Samantha said in turn, feedback received from patient co-researchers was that they felt listened to and developed stronger relationships with the nurses.

Co-researchers Irene Nangala and Eileen Bonney with drawings they used to tell their stories about their lives and being on dialysis in the project workshops.
Case study
Improving wellbeing through brief interventions

Health and wellbeing self management has become more accessible through the availability of apps.

The Stay Strong app developed by Menzies is a unique electronic resource for clinicians or case workers to use with clients. It was developed with culture in mind and can be adapted for different organisations to use in a range of settings.

The app takes clients through care planning steps in a visual, interactive and engaging way and has helped break down communication barriers between healthcare workers and clients.

Practitioners have given the feedback that the app is a good conversation aid. It operates on a strengths-based approach, which encourages positive engagement.

"Clients feel like they have more of a say in their care plans, and can outline their priorities – this isn’t always an easy conversation to have when you both don’t have the same first language," said a youth worker based in the NT.

In the last year, more than 300 people based in over 20 organisations in the NT have been trained in the use of the app.

Menzies researchers are now evaluating the training to find out how the Stay Strong app is used within different settings and how organisations implement digital mental health tools.

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The Stay Strong app is available for download on iTunes and the Google Play Store.

Our research
Global and Tropical Health

Our global and tropical health research spans central and northern Australia, and the developing countries within our global neighbourhood.

A major focus of our work in the region is the prevention and clinical management of malaria, TB, rheumatic fever, RHD and melioidosis.

In tropical northern Australia, the focus is on melioidosis, *Staphylococcus aureus* and *Streptococcus pyogenes*, bacteria that cause skin disease, scabies, rheumatic fever and RHD and other infectious diseases including influenza and hepatitis B (HBV).
Study to understand the impact of hepatitis B

Our research has shown that Indigenous Australians living in the NT with HBV suffer from a particularly aggressive strain of the virus - HBV/C4. But despite a deep understanding of the HBV/C4 virus, little is known about how it affects people.

The CHARM study, which recently enrolled its 200th patient, is investigating the natural history of this unique strain to understand if the virus is causing high rates of liver damage in a real world setting.

The study, which has a target of 250 participants, will inform NT and national HBV guidelines for Indigenous Australians and is due for completion in 2019.

Multiple studies examine the effectiveness of malaria treatment regime

A multicentre clinical trial across four continents is close to completing enrolment of 1900 patients. The study is examining the effectiveness of primaquine regimens to prevent relapse of the hidden liver stage of the parasite causing vivax malaria.

An additional trial in Timika, Papua Indonesia also began the recruitment of participants. Papua is a region which has one of the highest rates of multi drug-resistant vivax malaria in the world.

There is also a concern that primaquine can cause severe anaemia in some patients. Data from a large meta-analysis of 46 clinical trials is also being examined to define the risk-benefit of primaquine to cure vivax malaria.

Improving treatment for Staphylococcal blood stream infections

Bacterial infections are a major cause of illness and death in tropical Australia. Sepsis, particularly, one of the main causes of death in children worldwide, is a burden largely carried by Indigenous children in northern Australia.

The CAMERA-2 project, a major trial across Australia and Singapore which aims to improve the treatment for Staphylococcal blood stream infections, is on track to meet its study's recruitment target with the enrolment of its 150th patient this year.

The study's recruitment target with the enrolment of its 150th patient this year.

The relationship between the high incidence of skin sores and overcrowding in remote communities is one factor underpinning the need to improve the provision of appropriate accommodation across northern Australia.

In 2016, we hosted a Healthy Skin Workshop to share information with stakeholders from across the public health spectrum to enable an effective and coordinated approach to skin health in the Top End.

Case study

Menzies hosts healthy skin workshop for public health professionals

It is estimated that more than 16 000 children suffer from impetigo (skin sores) across northern Australia at any one time, a far higher incidence than is reported elsewhere globally.

Childhood infections can be extremely serious and can have long-lasting and devastating effects, including the development of ARF and RHD.

Our research demonstrated the widespread and frequent transmission of skin pathogens both within and between households in Indigenous communities.

Case study

Melioidosis study improves patient outcomes

Our research continued to put Menzies at the centre of better melioidosis patient outcomes through improved diagnosis and treatment.

In August 2016, the Menzies melioidosis team contributed to 17 abstracts at the World Melioidosis Congress, held in Cebu, in the Philippines. Professor Bart Currie and Mark Mayo, co-managers of the melioidosis programs, are on the executive committee of the International Melioidosis Society, which coordinates the congress.

Our long-running Darwin Prospective Melioidosis Study (DPMS) also achieved a significant milestone, recording the 1000th consecutive case of melioidosis from the Top End of the NT. The study has been running for 27 years and has informed international guidelines for diagnosis and treatment of melioidosis. Mortality from melioidosis currently stands at 10 per cent, in comparison to more than 30 per cent when we commenced the DPMS in 1989.

Menzies also houses a large prospective clinical and bacterial dataset, which enabled us for the first time to link specific genes present only in certain strains of Burkholderia pseudomallei to more severe disease in patients infected with those strains.

Our bacterial genomics has also found a new melioidosis strain in Darwin which originated in Asia rather than Australia. We are now searching for why it has appeared in Darwin.
Research translation

Beyond our commitment to research excellence, we set our sights on solutions - using our research findings to kick-start and sustain positive change.

We are committed to ensuring our research is put into practice and policy by health care providers, governments and other key stakeholders to achieve practical and tangible health outcomes.

Research translated into Malaysia’s national malaria treatment guidelines

Malaysia’s national malaria treatment guidelines have been updated as a result of the ground-breaking findings from our recent knowlesi malaria study in Sabah.

The clinical trial of people diagnosed with monkey malaria found a key combination of antimalarial drugs works well in curing the infection.

The monkey parasite, an emerging infection called Plasmodium knowlesi, has become the most common cause of human malaria in Malaysia and is also found throughout Southeast Asia.

Menzies clinical researcher, Dr Matthew Grigg, said the evaluation of the impact of policy implementation showed a six-fold reduction in the rate of death from knowlesi malaria, in parallel with improved diagnosis, early referral and the early usage of intravenous artemisinin-combination therapy.

“Based on our advice and evidence from our research, the new campaign material can be adapted by local communities,” Associate Professor David Thomas said.

Research informs national anti-tobacco campaign

Mass media anti-tobacco campaigns have been a crucial element in reducing smoking internationally. In Australia, statistics show smoking contributes 23 per cent of the health gap between Indigenous and non-Indigenous Australians.

Menzies research was used to inform the 2016 national Indigenous campaign ‘Don’t make smokes your story’. The Talking About The Smokes project generated important evidence about Indigenous smokers’ attitudes, localised and Indigenous-specific advertising, and the importance of messages about the impact of smoking on others.

“Based on our advice and evidence from our research, the new campaign material can be adapted by local communities,” Associate Professor David Thomas said.

Case study

High-quality evidence informs chronic cough guidelines

Results from the first multicentre randomised controlled trial on chronic cough in children led by our child health respiratory team were incorporated into the updated American College of Chest Physicians guideline (2016-17).

The NHMRC-funded trial found that managing children with chronic cough in accordance with a standardised algorithm improved clinical outcomes through improved quality of life and enhanced cough resolution.

“In children with cough lasting more than four weeks, wet and productive cough is common. Compared with the 2006 Cough Guidelines, our trial has provided high-quality evidence for management of chronic wet cough in specialist settings,” explained Menzies’ lead respiratory researcher, Professor Anne Chang.

Data from the trial will also be incorporated into the 2017 National Guide to a Preventive Health Assessment for Aboriginal and Torres Strait Islander peoples.

Lung researcher, Dr Gabrielle McCallum with Mabel Miller and William Hughes.
Menzies has again achieved a remarkable outcome in the current very competitive area of Australian Competitive Grants. Although project grants have become harder to achieve, Menzies was again above the Australian average.

In 2016, we earned an outstanding success rate in the targeted Northern Australian Tropical Disease Collaborative Research Programme being the only institution to be successful in two distinct applications - this is a 100 per cent success rate and establishes Menzies as a significant centre for northern Australian research.

Specialised Grants - Northern Australia Tropical Disease Collaborative Research Programme

Chief investigator Professor Bart Currie - Improving Health Outcomes in the Tropical North: A Multidisciplinary Collaboration (HOT NORTH).

Chief investigator Professor Nick Anstey - Strengthening regional research collaboration in the prevention and containment of multidrug-resistant tuberculosis and malaria.

Project grants

Chief investigator Professor Peter Morris - Rapid ferric carboxymaltose infusion [Ferinject] for iron deficiency anaemia in Aboriginal children: a randomised controlled trial.

Chief investigator Professor Amanda Leach - Otitis media, hearing loss and school readiness of Indigenous children followed from birth in two randomised controlled trials of novel pneumococcal conjugate vaccine schedules (VOICES. Vaccines to prevent Otitis media In Children Entering School).

Postgraduate Scholarship

Ms Stefanie Puszka – this scholarship will assist Stefanie with her studies in livelihoods of Indigenous People displaced from remote communities to urban centres for dialysis treatment.

Research support grants awarded to Menzies

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Funding source category 2016

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Publications authored by Menzies researchers 2011-2016

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Providing a training ground for health professionals

2016 saw our Child Health division hosting Indigenous trainees, students and visiting scientists as well as the appointment of the inaugural Sue Sayers Bursary placement.

Indigenous trainee, Susanne Munkara from the Tiwi Islands, joined medical, nursing, dietetic and science students to work with the Menzies HealthLAB while completing her Certificate III in Health and Community Services.

Indigenous trainee, Erin Gargan studied microbiology and molecular biology, hosted by the child health laboratory team. This enabled her to complete her Certificate III in Laboratory Skills before commencing a science degree in 2017. The team also hosted CDU students, Angela Rumaseb and Niko Tsangaris for their placements units.

Vietnamese scientists, Hoan Pham and Thuy Nguyen spent six weeks working with the child health laboratory team as part of an exchange with the Pasteur Institute in Ho Chi Minh City. Associate Professor Heidi Smith-Vaughan and Child Health laboratory manager, Jemima Beissbarth in turn spent time in Ho Chi Minh City training a larger group of scientists.

In addition to our cutting-edge laboratory-based and biomedical research, we strive to increase the capacity of communities, health service providers, Indigenous health workers, health professionals, and researchers – to help them deliver better services based on evidence about what works, and what doesn’t.

Empowering communities to implement rheumatic fever prevention strategies

For two decades, we have been at the forefront of research into rheumatic fever. The drivers of high rheumatic fever rates are understood by clinicians and researchers; however, major barriers to translating this information to affected communities and empowering them to take steps to reduce their risk still exist.

On Track Watch, a community-based participatory action research project, addresses this challenge in a sustainable way. To begin, more than ten community members are commencing Menzies’ Certificate II in Community Health Research.

As part of the course, trainees learn about and implement rheumatic fever prevention strategies. These include better health literacy through to stronger self-management and recognising and treating the streptococcal infections which drive rheumatic fever.
Our Indigenous Capacity Building Unit (ICBU) aims to build and sustain a highly-skilled Indigenous workforce through employment, training and professional development opportunities which welcome, value and provide a safe environment for Indigenous staff.

Key activities for the unit in 2016 included delivering cultural training workshops, a mentoring program, the continuation of the Indigenous Traineeships Program and the graduation of four community-based researchers through CDU. The unit also completed Reconciliation Australia’s Reconciliation Action Plan Impact Measurement Questionnaire report and celebrated Close the Gap day as well as Reconciliation and NAIDOC weeks.

In addition, the team promoted Menzies at the Barunga Festival and Darwin Careers Expo and delivered a presentation about the Pathways Program at the Lowitja Institute’s International Indigenous Health and Wellbeing Conference.

Indigenous mentoring program a success

In 2016, the unit delivered an Indigenous mentoring program to a number of Brisbane staff. Four mentors participated in the program and worked with two Indigenous mentees keen to further develop their skills and knowledge to achieve their goals.

The program provided an opportunity for mentors to learn and develop new leadership skills and mentees to improve their self-confidence.

The program received positive feedback with both mentees and their mentors indicating they would informally continue the mentoring relationship.

Menzies’ first community-based researchers graduate

In 2016, the first Indigenous community-based researchers graduated from the Certificate II in Community Health Research. Based in Galiwin’ku, Elcho Island, the four senior Indigenous graduates, George Gurrumwi, Roslyn Dhurrkay, Djillirri Garawirrita and Veronica Gandarra were able to attend the graduation ceremony in Darwin as a result of funding sourced by the ICBU.

In addition, the graduates completed mentor training to enable them to mentor less-experienced community-based researchers in the workplace.

Sian Graham is an Indigenous woman from the Balladong area near Perth and One Arm Point community out of Broome.

Born and raised in Darwin, Sian has strong links throughout the NT and Western Australia (WA) where she has lived and worked in remote communities.

In 2009, Sian commenced her career as a researcher at Menzies. After three years, she was inspired to build on her career. She found she had the knowledge, connection and skills, but no documentation to back up her skillset. In 2013, she ignited her education journey by enrolling in a Certificate IV in Indigenous Research Capacity Building.

A year later, Sian commenced a Bachelor of Applied Science in Indigenous Community Health degree at Curtin University, WA.

“This was one of the scariest things I had ever done in my life but I was determined to battle my demons and to pursue a higher education,” Sian said.

In 2016, Sian completed her degree and is enrolled in an Honours degree at CDU. But she won’t stop there; her goal is to complete a Masters, followed by a PhD. She hopes to lead her own qualitative research and manage an all-Indigenous research team at Menzies.

Sian is passionate about working with her people. She has a strong commitment to Indigenous health issues and takes great satisfaction in knowing that she is working towards better health outcomes and stronger futures for her mob.
Our Youth Engagement Strategy is designed to attract more young people to consider a career in health, science, research and corporate areas.

The strategy provides opportunities for young Territorians to interact with leading health researchers through a number of programs and activities, including school student visits, work experience, career expos and traineeships.

Successful traineeships

In 2016, we hosted four trainees who successfully completed their Certificate III requirements before securing positions at Menzies or progressing to further study. Corporate services trainees, Stephanie Lyons and Clarissa Carter, completed the Certificate III in Business before securing administrative positions at Menzies. Child health trainee, Susanne Munkara, worked with the Menzies HealthLAB team while completing her Certificate III in Health and Community Services. In 2017, she will commence a Bachelor of Health Science at Monash University.

After completing the Certificate III in Laboratory Skills, our fourth trainee commenced a Bachelor of Forensics at Flinders University in Adelaide.

Three of the trainees were part of the Indigenous Youth Traineeship Program funded by the Department of the Prime Minister and Cabinet’s Indigenous Advancement Strategy.

Skills and Employment Careers Expo

Our trainees represented Menzies at the 2016 Skills and Employment Careers Expo held at the Darwin Convention Centre.

The two-day expo provided them the opportunity to interact with school students about their traineeship experience, including their vocational education and training course. They spoke about the support received from Menzies staff and Group Training NT, as well as the work they were involved with as part of the on the job component.

Child Health

- Jemima Beissbarth was a finalist in the Group Training NT Supervisor of the Year Award for her remarkable work in training nine Menzies trainees over the last four years.

Wellbeing and Preventable Chronic Diseases

- Associate Professor Gail Garvey received the highly competitive 2016 Bupa Health Foundation Emerging Health Researcher Award.
- Associate Professor Gail Garvey was also awarded the NHMRC Rising Star Award as the top ranked Indigenous Early Career Fellowship recipient in recognition of her work to raise both the research and health services profile regarding the cancer disparities facing Indigenous Australians.
- Associate Professor Gail Garvey also received the Lowitja Institute Research Leadership award in recognition of her outstanding leadership and excellence within the Indigenous community.
- Dr Lisa Whop received the Lowitja Institute Aboriginal and Torres Strait Islander Student Award for excellence in her PhD study, focusing on research in Indigenous Australian women and cervical cancer prevention and cervical cancer outcomes.
- The Menzies nutrition team was named joint winner of the Exceptional Research Team award as part of CDU’s Vice-Chancellor’s Awards for their leadership and innovation, and the continued dedication of Menzies teams to conduct the highest quality, directly relevant research to address critical issues in tropical and Indigenous health.

Global and Tropical Health

- Dr Robert Commons was awarded the Gustav Nossal Award as the highest ranked applicant for an NHMRC Postgraduate Scholarship in the field of medical and dental research for his project to tackle the global burden of malaria.
- The Menzies melioidosis team was named joint winner of the Exceptional Research Team award as part of CDU’s Vice-Chancellor’s Awards for their leadership and innovation, and the continued dedication of Menzies teams to conduct the highest quality, directly relevant research to address critical issues in tropical and Indigenous health.
- Former PhD student Rini Poespoprodjo received the Humanitarian Award at the Australia Indonesia Awards.

Award winners

Child Health

Internal awards

- The 2016 Menzies Medallion was presented to Dr Christine Connors for her significant contribution to primary health care, Indigenous health and Top End health services delivery in the NT.
- The 2016 Ryan Family Prize was awarded to Joanne Beech for her outstanding, ongoing commitment to her role as laboratory manager.
- The 2016 Harry Christian Giese Research Into Action award was won by Dr Jozi Hughes. Dr Hughes will use the award to support translation of her research findings of effective treatment for people on dialysis who have contracted melioidosis into medical interventions.
- The 2016 Val Asche Prize for academic excellence was awarded to Emma Grimes (Master of Public Health) and Jodi Phillips and Leigh Moore (Graduate Diploma in Health Research).

External awards

- The 2016 Menzies Medallion recipient, Dr Christine Connors.
Long service awards

Our long service awards provide the opportunity to reflect on the contributions of those that have been instrumental to Menzies' development, growth and success.

Recognised in 2016 for their long-standing contributions were:

20 years
• Professor Joan Cunningham
• Professor Nicholas Aristei

15 years
• Christine Wigger
• Dr Matthew Stevens
• Dr Susan Pizzutto

10 years
• Associate Professor David Thomas
• Associate Professor Julie Brimblecombe
• Linda Quall
• Associate Professor Louise Maple-Brown
• Rachael Gorie
• Professor Ross Andrews
• Dr Thérèse Keams

5 years
• Alana Gall
• Christel van den Boogaard
• Christina Spargo
• Associate Professor Gail Garvey
• Hayley Williams
• Dr Helen Harper
• Jason Chin
• Jodi Phillips
• Jennifer Roberts
• Jennifer Wong
• Kathryn Bright
• Dr Lisa Whop
• Nina Downie
• Dr Patyian Andersson
• Dr Rebekah McWhirter
• Stefanie Puszka
• Dr Tegan Harris
• Vanessa Rigas
• Veronica Matthews

Associate Professor Gail Garvey

Feature award winner

Associate Professor Garvey’s star shone brightly among Menzies researchers last year, taking home three major national awards recognising research excellence. Assoc Prof Garvey, who leads two large national grants, has a widely-recognised leadership role in Indigenous cancer research.

In her work, she has brought together key cancer researchers, clinicians and Indigenous people to identify cancer research priorities with the aim of closing the health gap.

In July, Assoc Prof Garvey was awarded the NHMRC Rising Star Award. She was recognised as the top ranked Indigenous Early Career Fellowship recipient for her work in raising awareness of the cancer disparities facing Indigenous Australians.

Later in the year, she was awarded the Lowitja Institute Research Leadership award in recognition of her outstanding leadership and excellence within the Indigenous community.

Just over a week later, Assoc Prof Garvey received the highly competitive 2016 Bupa Health Foundation Emerging Health Researcher Award.

The year was a big one for our Brisbane-based researcher, who also successfully hosted the world’s first Indigenous cancer conference in April.
Education and training

2016 saw the graduation of nine higher degree by research (HDR) students and the continual development of the CDU postgraduate coursework and VET programs taught by Menzies.

Our research academics supervised an exceptional cohort of HDR students with a strong completion and scholarship success record. Last year’s PhD graduates produced significant research contributions in Indigenous health, with a focus on cancer care, cervical screening, hepatitis B and smoking prevention; epidemiological studies of melioidosis, chronic kidney disease and survival analysis as well as anthropological studies of female reproduction and child malnutrition.

Our enrolments in the postgraduate courses of Master of Public Health and the Graduate Diplomas in Public Health and Health Research continued to strengthen. The fact that more than half of our students are NT residents also bodes well for local impact on public health practice and health research. In addition, student confidence to move between coursework and higher degrees by research has grown with the increased participation in research methods units and research projects.

In preparation for the launch of the Master of Public Health to international students in 2017, we visited potential collaborators in Hong Kong and Malaysia with the aim of enhancing academic programs for prospective students.

In 2016, we celebrated the graduation of the first cohort of Certificate II in Community Health Research (10513NAT) students. The six community-based researchers were the first to complete the course after it received national accreditation in 2015, with Menzies as the CDU Registered Training Organisation. A further 19 community-based researchers are on track to complete the course in 2017.

At the end of the year, we farewelled our long-serving academic administrator, Catherine Richardson as she embarked on her retirement after 17 years of outstanding contribution to Menzies.

Master of Public Health Graduates completing with a research thesis

• Emily Bowen: Strongyloidiasis: A nested, matched, case-control study.

HDR graduates in 2016

• Sarah Ireland (PhD): Paperbark and Pinard: A cultural and historical exploration of female reproduction in one remote northern Australian Aboriginal Town.

• Anna Szava (PhD): Explaining child malnutrition in two villages in south-west Ethiopia. Local views and local opportunities.

• Associate Professor Gail Garvey (PhD): Psychosocial aspects of cancer care for Indigenous Australians.

• Jane Davies (PhD): Hepatitis B in Australia’s Northern Territory: Understanding the true story.

• Yaofeng Vincent He (PhD): Long Term Health Outcomes of Indigenous and Non-Indigenous Australians in the NT After Serious Illness: A Survival Analysis Approach.

• Paul Lawton (PhD): The incidence and outcomes of chronic kidney disease amongst Indigenous Australians.

• Evan McRobb (PhD): Burkholderia pseudomallei in northern Australia: Sequencing approaches to better biogeographical and epidemiological understanding.

• Anna Nicholson (PhD): On target: Health information recall and effects in Aboriginal and Torres Strait Islander smokers.

• Lisa Whop (PhD): Indigenous women and cervical screening in QLD. The first comprehensive study of Indigenous women’s inequalities in cervical screening; a QLD record-linkage study.

• Emily Bowden: Strongyloidiasis: A nested, matched, case-control study.

HDR scholarships announced in 2016

• Alana Gali (Master by Research): Indigenous Australian gynaecological cancer patients’ use of and disclosure of Complementary and Alternative Medicine (CAM) and/or Traditional Medicine (TM). Discover - TT CRE scholarship.


• Josie Povey (PhD): Developing a new e-mental health resource: The Aboriginal and Islander Mental Health Initiative for Youth (AIMHi-Y). Research Training Program (RTP) Stipend Scholarship.

• Jiunn-Yih Su (Doctor of Public Health): Collecting and analysing testing data to improve the surveillance of sexually transmissible infections in the NT. Research Training Program (RTP) Stipend Scholarship.

• Jessica Webb (PhD): Characterisation of antibiotic resistance mechanisms in Burkholderia pseudomallei, the causative agent of melioidosis. The Barbara Hale Fellowship.

• Lyndall Warton (Master by Research): Systematic review to improve parents’ ability to shape healthful eating and physical activity behaviours in Indigenous children. Research Training Program (RTP) Stipend Scholarship.

• Alana Gall (Master by Research): Indigenous children. Research Training Program (RTP) Stipend Scholarship.

• Caroline Greenslief (Doctor of Health): Collecting and analysing testing data to improve the surveillance of sexually transmissible infections in the NT.

• Juiun-Yih Su (Doctor of Public Health): Collecting and analysing testing data to improve the surveillance of sexually transmissible infections in the NT.
HDR and Coursework Student Numbers (2012 – 2016)

In 2016

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2016: 10513 NAT Certificate II in Community Health Research (first year)

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Community engagement

2016 Menzies Oration delivered by The Honourable Linda Burney MP

The first elected Indigenous woman in the House of Representatives, Shadow Minister for Human Services, The Hon Linda Burney MP delivered a powerful, inspiring and moving Menzies Oration to over 200 guests at the Darwin Convention Centre.

Ms Burney’s presentation, ‘Truth Telling and Generosity: Healing the Heart of a Nation’ focused on the importance of narrative in the reconciliation process, the recognition of First Peoples in the constitution and the current governments’ Indigenous Affairs policy.

In addition to Ms Burney’s presentation, the crowd was entertained by singer-songwriter Leah Flanagan.

HealthLAB tours the Top End during National Science Week

Assisted by a National Science Week grant, HealthLAB visited four remote Top End communities throughout August.

The HealthLAB team engaged community members in Bathurst Island, Mataranka, Katherine and Batchelor to conduct their own health tests and find out what the results mean for their general wellbeing.

Below images: Students from Jilkminggan school near Mataranka enjoy learning about their health with HealthLAB.
Last year, the Menzies Development team introduced a number of new supporters to the work of Menzies and continued to build the strong foundation of established community and corporate relationships.

Our combined corporate and philanthropic commitment for 2016 was over $4 million, and we extend our gratitude to our donors, collaborators and supporters who enabled us to continue our work.

We would like to thank Richard Ryan AO, Rowan Johnston, Dr Richard Russell, Kate Russell, Simon Schwarz and Suzi Huilnic from the Menzies Development Committee, who give many hours of their time each year to provide advice and expertise to the Executive and Development Team.

Engagement events

Three events were sponsored and hosted for Menzies during the year in Melbourne, Sydney and Brisbane. This provided an opportunity for business and philanthropic leaders to hear from Menzies staff working at the coalface of Indigenous health research.

We thank our hosts: Suzi Huilnic (National Head of Indigenous Business, Commercial Banking - Westpac); Keith Jones (Chairman - Deloitte Australia); Maryjane Crabtree (Partner - Allens); John Hedge (Partner - Allens) and Stuart Giles (Founding Chairman - Icon Cancer Care).

We are grateful to the organisations which supported our attendance at Garma Developing East Arthur Land; Westpac; Australian Unity; Dreamedia Creative; Zip Print and Boab Design.

Whole-of-Community Health Needs Assessments

In 2016, we launched two new projects in two remote Indigenous communities. The Whole-of-Community Health Needs Assessments will support local Indigenous peoples to achieve significant improvements in the health and wellbeing of their entire community, utilising an innovative, community-led, integrated planning process and implementation strategy.

We are working with Medibank and the McArthur River Mine Communities Benefits Trust to support the communities to set their own health agendas and to be active participants in co-creating, implementing and delivering health services and initiatives that meet their health priorities.

Our donors and supporters

We are grateful to the following donors and partners for their generous support in 2016:

Menzies HealthLAB was a highly visible element of the festival measuring the health of more than 250 local guests and local community members across four days.

This mobile interactive and educational health assessment laboratory travels to urban, rural and remote communities around the NT to give people a snapshot of their current health picture, highlighting any risk markers for future chronic disease and providing important health information to help people make healthier choices going forward.

Menzies Director Professor Alan Cass chaired a forum on Indigenous health and hosted a fireside chat discussing our collaborative model for supporting Indigenous-led, whole-of-community health planning and service reorientation.

Menzies’ HealthLAB was a highly visible element of the Menzies Festival measuring the health of more than 250 local guests and local community members across four days.

This mobile interactive and educational health assessment laboratory travels to urban, rural and remote communities around the NT to give people a snapshot of their current health picture, highlighting any risk markers for future chronic disease and providing important health information to help people make healthier choices going forward.
Michelle Woody with daughter Maria on the Tiwi Islands.
Our researchers are committed to conveying their research findings to a wide audience. In 2016, 398 publications, including 365* peer-reviewed articles were published. This ensures our research is effectively translated, leading to better outcomes for Indigenous and non-Indigenous Australians, as well as disadvantaged populations in our global neighbourhood. Below is a selection of highlighted publications from 2016.


Protracted bacterial bronchitis is a diagnostic entity first recognised by Chang and colleagues in 2006. This state of the art review summaries how the field has progressed since the road ahead.

The first study to longitudinally describe vitamin D among pregnant Indigenous mothers and their offspring. We found a high proportion of cord blood vitamin D (<50nmol/L; vitamin D deficiency cut-off in adults) which was associated with a higher risk of infant respiratory infection hospitalisation.

This report the first genome sequencing of Australian trachoma strains. The study has significant public health implications.

This longitudinal follow-up of 550 Indigenous participants across over 15 years confirmed aurumurate as the strongest predictor of kidney damage progression.

This large randomised stepped-wedge trial enrolled ten communities across the NT in order to expose and combat the political influence of tobacco companies in these countries.

An important clinical trial that shows that artemisinin combination therapy is a better treatment option for P. knowlesi, with earlier discharge from hospital.

A high profile publication on the genomics of P. vivax that will lead to a better understanding of the parasite’s biology.

Genome sequencing reveals its extensive community-level transmission of group A streptococcus in remote communities. Epidemiology and Infection, 144(9), 1951-8.

Wholegenome sequencing technology has been applied to demonstrate the widespread and frequent transmission of skin pathogens both within and between households in Indigenous communities. Strategies to prevent future transmission will require whole of community interventions.

Carcinoma in situ. A high profile publication that shows that artemisinin combination therapy is a better treatment option for P. knowlesi, with earlier discharge from hospital.

An important clinical trial that shows that artemisinin combination therapy is a better treatment option for P. knowlesi, with earlier discharge from hospital.

A high profile publication on the genomics of P. vivax that will lead to a better understanding of the parasite’s biology.

Genome sequencing reveals its extensive community-level transmission of group A streptococcus in remote communities. Epidemiology and Infection, 144(9), 1951-8.
STATEMENT OF PROFIT OR LOSS AND OTHER COMPREHENSIVE INCOME FOR THE YEAR ENDED 31 DECEMBER 2016

INCOME FROM CONTINUING OPERATIONS

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>National Health and Medical Research Council</td>
<td>11,687,385</td>
<td>12,451,542</td>
</tr>
<tr>
<td>Other government agencies</td>
<td>3,956,591</td>
<td>4,899,826</td>
</tr>
<tr>
<td>NT Government financial assistance</td>
<td>9,787,331</td>
<td>4,640,060</td>
</tr>
<tr>
<td>Fees and charges</td>
<td>3,501,465</td>
<td>3,916,103</td>
</tr>
<tr>
<td>Investment income</td>
<td>769,599</td>
<td>706,971</td>
</tr>
<tr>
<td>Consultancy and contract research</td>
<td>9,408,806</td>
<td>6,668,651</td>
</tr>
<tr>
<td>Other revenue</td>
<td>3,944,465</td>
<td>3,491,095</td>
</tr>
</tbody>
</table>

TOTAL REVENUE FROM CONTINUING OPERATIONS | 43,085,462 | 36,774,248 |

Gain on disposal of assets | 8,000 | 8,901,734 |

TOTAL INCOME FROM CONTINUING OPERATIONS | 43,093,462 | 45,675,982 |

EXPENSES FROM CONTINUING OPERATIONS

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee related expenses</td>
<td>(23,335,161)</td>
<td>(22,584,391)</td>
</tr>
<tr>
<td>Depreciation and amortisation expense</td>
<td>(2,556,646)</td>
<td>(2,366,006)</td>
</tr>
<tr>
<td>Repairs and maintenance</td>
<td>(1,178,544)</td>
<td>(1,122,791)</td>
</tr>
<tr>
<td>Direct research costs</td>
<td>(5,695,057)</td>
<td>(5,799,455)</td>
</tr>
<tr>
<td>Other expenses</td>
<td>(6,466,987)</td>
<td>(5,867,495)</td>
</tr>
</tbody>
</table>

TOTAL EXPENSES FROM CONTINUING OPERATIONS | (39,232,395) | (37,730,136) |

OPERATING RESULT FROM CONTINUING OPERATIONS | 3,861,067 | 7,945,846 |

OPERATING RESULT ATTRIBUTABLE TO MEMBERS | 3,861,067 | 7,945,846 |

Revaluation of investment | 5,003 | 5,003 |

TOTAL COMPREHENSIVE INCOME ATTRIBUTABLE TO MEMBERS | 3,867,067 | 7,950,849 |

The above Statement of Profit or Loss and Other Comprehensive income should be read in conjunction with the notes included in the audited 2016 financial statements.
ANALYSIS OF NET SURPLUS

The surplus for the year ended 31 December 2016 includes revenue received for research projects that have a life beyond the end of the financial year. Revenue received for these projects is recognised in the year of receipt. Future commitments for these projects will extend beyond the year income was received for those projects.

The research investment funding ($5m) received from the NT Government is one-off funding to be used strategically to fund research that delivers strong economic and health return for the Territory.

The gain on disposal of assets in the 2015 year is mainly due to the difference between building refurbishment costs of $8.4m subsequently transferred to the NT Government Department of Health, and the recognition of an intangible asset at fair value of $17.3m in respect of the right to use that refurbished building at a peppercorn rent.

<table>
<thead>
<tr>
<th>NOTE</th>
<th>RETAINED EARNINGS</th>
<th>RESERVES</th>
<th>TOTAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016</td>
<td>$53,476,726</td>
<td>$6,077,224</td>
<td>$59,553,950</td>
</tr>
<tr>
<td>Operating result for the year</td>
<td>25</td>
<td>$3,861,067</td>
<td></td>
</tr>
<tr>
<td>Net revaluation gain on investments</td>
<td>23</td>
<td>-</td>
<td>$5,967</td>
</tr>
<tr>
<td>TOTAL COMPREHENSIVE INCOME</td>
<td></td>
<td>$57,337,793</td>
<td>$60,831,191</td>
</tr>
<tr>
<td>Transfers</td>
<td>24</td>
<td>($748,672)</td>
<td>$748,672</td>
</tr>
<tr>
<td>Balance at 31 December 2016</td>
<td></td>
<td>$56,589,121</td>
<td>$6,831,863</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>NOTE</th>
<th>RETAINED EARNINGS</th>
<th>RESERVES</th>
<th>TOTAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>2015</td>
<td>$44,929,749</td>
<td>$6,814,786</td>
<td>$51,744,535</td>
</tr>
<tr>
<td>Operating result for the year</td>
<td>25</td>
<td>$7,945,846</td>
<td></td>
</tr>
<tr>
<td>Net revaluation gain on investments</td>
<td>23</td>
<td>-</td>
<td>$5,003</td>
</tr>
<tr>
<td>TOTAL COMPREHENSIVE INCOME</td>
<td></td>
<td>$52,875,595</td>
<td>$6,819,789</td>
</tr>
<tr>
<td>Distributions to owners</td>
<td>24</td>
<td>($141,434)</td>
<td>-</td>
</tr>
<tr>
<td>Transfers</td>
<td>24</td>
<td>$742,565</td>
<td>($742,565)</td>
</tr>
<tr>
<td>Balance at 31 December 2015</td>
<td></td>
<td>$53,476,726</td>
<td>$6,077,224</td>
</tr>
</tbody>
</table>

The above Statement of Changes in Equity should be read in conjunction with the notes included in the audited 2016 financial statements.

STATEMENT OF CASH FLOWS
FOR THE YEAR ENDED 31 DECEMBER 2016

CASH FLOWS FROM OPERATING ACTIVITIES:

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>Australian Government grants</td>
<td>16,093,962</td>
<td>20,190,631</td>
</tr>
<tr>
<td>NT Government funding</td>
<td>9,787,331</td>
<td>4,640,060</td>
</tr>
<tr>
<td>Fees and charges</td>
<td>3,501,465</td>
<td>3,916,103</td>
</tr>
<tr>
<td>Interest received</td>
<td>768,478</td>
<td>706,971</td>
</tr>
<tr>
<td>Consultancies and contract research</td>
<td>9,408,806</td>
<td>6,668,651</td>
</tr>
<tr>
<td>Other receipts</td>
<td>3,662,621</td>
<td>4,656,186</td>
</tr>
<tr>
<td>Payments to suppliers</td>
<td>(12,619,736)</td>
<td>(17,292,687)</td>
</tr>
<tr>
<td>Payments to employees</td>
<td>(23,165,688)</td>
<td>(22,203,428)</td>
</tr>
<tr>
<td>NET CASH GENERATED FROM OPERATING ACTIVITIES</td>
<td>27</td>
<td>7,437,239</td>
</tr>
</tbody>
</table>

CASH FLOWS FROM INVESTING ACTIVITIES:

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proceeds from sale of plant and equipment</td>
<td>8,000</td>
<td>500</td>
</tr>
<tr>
<td>Purchase of property, plant and equipment</td>
<td>(325,398)</td>
<td>(2,004,083)</td>
</tr>
<tr>
<td>Charles Darwin University – Menzies investment funds</td>
<td>(2,000,000)</td>
<td>(22,727,000)</td>
</tr>
<tr>
<td>NET CASH USED BY INVESTING ACTIVITIES</td>
<td>(2,317,398)</td>
<td>(24,730,583)</td>
</tr>
</tbody>
</table>

NET INCREASE / (DECREASE) IN CASH AND CASH EQUIVALENTS HELD

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>5,119,841</td>
<td>(23,448,093)</td>
<td></td>
</tr>
</tbody>
</table>

CASH AND CASH EQUIVALENTS AT BEGINNING OF YEAR

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>5,526,088</td>
<td>28,974,181</td>
<td></td>
</tr>
</tbody>
</table>

CASH AND CASH EQUIVALENTS AT END OF FINANCIAL YEAR

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>14</td>
<td>10,645,929</td>
<td>5,526,088</td>
</tr>
</tbody>
</table>

The above Statement of Cash Flows should be read in conjunction with the notes included in the audited 2016 financial statements.

RECONCILIATION OF TOTAL NET SURPLUS / (DEFICIT)

<table>
<thead>
<tr>
<th>NOTE</th>
<th>2016 $</th>
<th>2015 $</th>
</tr>
</thead>
<tbody>
<tr>
<td>3,861,067</td>
<td>7,945,846</td>
<td></td>
</tr>
</tbody>
</table>

Represented by:

- Capital Funding - interest earned | 1,294 | 20,355 |
- Plus / (Minus) | | |
- Research and Education surplus | 1,203,690 | 1,716,083 |
- Non-research surplus | 204,729 | (326,321) |
- NT Government research investment funding | 5,000,000 | |
- Depreciation and amortisation | (2,556,646) | (2,366,005) |
- Gain on disposal of assets | 8,000 | 8,901,734 |

3,861,067 | 7,945,846 |

The above Statement of Changes in Equity should be read in conjunction with the notes included in the audited 2016 financial statements.
In 2013, we commissioned Larrakia Nation to create artwork in the form of the panels that are seen on the exterior of our RDH campus building.

The artwork incorporates the themes of community, health, research, learning, teaching, listening and the Larrakia story, combining elements of the research undertaken by Menzies, with the location of our headquarters within Larrakia land.

**Larrakia artists:** Dotty Fejo, Denise Quall and Kenny Reid

**Roper River artist:** James Gaston

This artwork embodies traditional ritual knowledge of the Larrakia Community. It was created with the consent of the custodians of the Community.

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