Optimising musculoskeletal health and physical activity
Acknowledgement of Country

The Institute for Musculoskeletal Health acknowledges the Gadigal People of the Eora Nation as the traditional owners of the land on which The Institute is located.

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Musculoskeletal conditions affect an estimated 6.1 million Australians – almost one-third of the population. Even more people will have reduced musculoskeletal function due to ageing or inactivity.

These problems can significantly affect a person’s quality of life, often impairing their ability to fully participate in family, social and working life.

Compared with the general population, people with musculoskeletal conditions have higher rates of poor health, very high psychological distress and very severe pain.

Due to their diverse nature, there is considerable variation in the prevalence, treatment and management, and quality of life of people with these conditions across various life stages.

In fact, researchers from Sydney Local Health District and the University of Sydney featured in a 2018 series in The Lancet that revealed a global epidemic of inappropriate tests and treatments for back pain, such as imaging, opioids and surgery.

The series highlighted the extent to which musculoskeletal conditions are mistreated, often against best practice treatment guidelines.

We aim to address these problems by bringing together patients and clinicians with world-leading musculoskeletal health researchers. Our goal is better musculoskeletal health through a physically active lifestyle and better healthcare for musculoskeletal conditions. Our partnership provides a platform to strengthen clinician-researcher alliances, and improve the translation of research into the community.

This collaboration between Sydney Local Health District and the University builds on one of the longest health-related partnerships in the history of NSW.

RPA became the first teaching hospital of the University in 1882. Since then the partnership with the University has expanded to Concord, Canterbury, Balmain and Sydney Dental Hospitals and Population and Community Health Services.

We have worked to promote, facilitate and encourage health and medical research in the fields of medicine, health sciences, dentistry, pharmacy and nursing.

The Institute for Musculoskeletal Health will continue to build on this legacy to empower people of all ages and stages to maximise their health and wellbeing.

Dr Teresa Anderson AM
Chief Executive,
Sydney Local Health District

The University of Sydney is deeply committed to enabling our world class research to help improve the lives of millions of Australians and others worldwide. We believe the very highest quality research delivers the best possible outcomes for the communities we serve.

Conditions affecting musculoskeletal health are already the most common reason for Australians to access healthcare services. They cost the Australian economy over $55 billion in direct health costs, loss of productivity and burden of disease.

As our population ages over the next two decades, the number of people living with a musculoskeletal condition will rise substantially. By 2032, it is estimated that the number of cases will increase by 43% to 8.7 million affecting 30.2% of the Australian population.

Our newly established Institute is dedicated to improving the lives of patients with musculoskeletal health conditions and promoting physical activity for older Australians and people living with disability.

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The Institute brings front line clinicians and researchers together to conduct high quality, patient-centered research.

The Institute is identifying priority areas for musculoskeletal research, facilitating the generation of new ideas, improving the translation of evidence into policy and clinical practice, evaluating the cost-effectiveness of real-world health services, and providing opportunities, education and mentorship to future generations of musculoskeletal health researchers. It has already managed to secure $32M of NHMRC funding, has over 110 staff and affiliates, including 40% of whom are clinician researchers.

The Institute has the strong support of consumers, professional organisations and funders.

Working closely with the Sydney Local Health District, a long term and deeply valued partner, we are committed to developing the innovative solutions required to reduce the growing burden of musculoskeletal disease and physical inactivity in Australia and around the world.

Professor Duncan Ivison
Deputy Vice Chancellor, Research
The University of Sydney
Introduction

The Institute for Musculoskeletal Health is a world-class innovative research collaboration between Sydney Local Health District and the University of Sydney.

The Institute brings together musculoskeletal healthcare researchers and clinicians who have direct contact with patients in the health system.

Poor musculoskeletal health is the leading cause of disability globally and this burden will increase in coming decades with an ageing population.

An intensified research effort is needed where consumers are actively involved and the research delivers real world impact.

In bringing together frontline clinicians, policy makers, researchers and consumers to design and conduct high quality, patient-centred research, the Institute positively impacts practice, health systems and health policy.

The Institute will promote translational research, foster the development of a highly-skilled musculoskeletal research workforce, and contribute to developing sustainable, equitable and cost-effective health care services.
Our vision

Our vision is to optimise musculoskeletal health and physical activity through high quality, patient-centred collaborative research.

Our purpose

The Institute provides a platform to strengthen local, national and international collaborative links with key academics, clinicians, health care organisations and research networks, and promote the translation of research findings into policy and practice.

In parallel the Institute seeks to foster the use of evidence to guide healthcare and promote equity in healthcare and research.

Our mission

The Institute aims to foster and enable a culture of clinical and public health research excellence that spans the University and the District.

We will attract, develop and support outstanding researchers who will work on projects that will make an important impact locally and globally.

Our development approach is based around excellence: allowing the best and brightest clinicians to undertake research training working on NHMRC - funded studies led by NHMRC research fellows who collaborate with the leading musculoskeletal researchers globally.

Our objectives

In the short-to-medium term, we will:

- **Produce high-quality** patient-centred, collaborative research that addresses the most important research questions.
- **Be recognised** by government, policy makers and peers as leaders in musculoskeletal health research and its translation, and engage with these partners to inform policies, programs and investments in musculoskeletal health.
- **Strengthen** local, national and international collaborative links with key academics, clinicians, health care organisations and research networks to produce and promote the translation of our research findings into clinical care at the District and beyond.
- **Attract** the most outstanding researchers and clinician researchers from a wide multidisciplinary talent pool by offering joint appointments with the District and the University, and recognising the importance of diversity and inclusion in building a highly performing musculoskeletal health research Institute.
- **Ensure** the Institute has the financial resources and human capital to develop and sustain a visionary agenda by optimising the intersection of the Institute’s research and development priorities with those of the District, the University, NHMRC, the Medical Research Futures Fund and other research funding agencies.
- **Enable** and develop a diverse workforce equipped with the essential research resources to pursue emerging opportunities in musculoskeletal healthcare research.
- **Provide** high quality resources for clinicians, consumers, government and industry, fostering excellence in clinical practice and for use in informing health policy and guidelines.
About Sydney
Local Health District

Sydney Local Health District is one of the leading Local Health Districts in Australia.

Our District is located in the centre and inner west of Sydney and is made up of the Local Government Areas of the City of Sydney (western part), Inner West Council, Canterbury-Bankstown (Canterbury part), Canada Bay, Burwood and Strathfield.

With around 12,000 staff, our District is responsible for the health and wellbeing of more than 700,000 people living within our boundaries, rural and remote parts of NSW and Australia and more than a million people who come into our District each day to work, study and visit.

Our District includes principal referral hospitals at Royal Prince Alfred (RPA) and Concord Repatriation General Hospital (Concord Hospital or CRGH), a major metropolitan hospital at Canterbury, the aged care and rehabilitation specialist hospital at Balmain, and the tertiary oral health facility, the Sydney Dental Hospital.

Our District has comprehensive community-based health services ranging across child and family health, community nursing, oral health, mental health, aged care, chronic care, drug and alcohol services, sexual health, population health, health promotion, Aboriginal health and multicultural health. Services are linked with primary care providers, including the local primary healthcare network, the Central and Eastern Sydney PHN.

Our District has a vision to be a world leader in research which drives excellence in healthcare and ultimately improves the health and wellbeing of the community, while generating social and economic benefits.

We believe in education for all and leadership that makes lives better: the kind of leadership that inspires people to push themselves through critical thinking; encourages debate and discussion in a public forum; and uses imagination to unlock age-old problems and address some of the major global challenges of our time.

We are one of the world’s top research universities, with 100 percent of our research ranked at world standard or above **.

About the University of Sydney

Established in 1850 as Australia’s first university, the University of Sydney is one of the world’s leading, comprehensive research and teaching institutions, ranked in the top 50 universities in the world *.

Our diverse community of more than 60,000 students and 7500 staff aims to create and sustain a university that will, for the benefit of both Australia and the wider world, maximise the potential of the brightest researchers and most promising students, whatever their social or cultural background.

Our research is driven by the big picture. We take a problem and look at it from all angles, combining the expertise and talents of scholars from many disciplines to advance teaching and research objectives in a collaborative environment. To find out more, visit sydney.edu.au/research

* QS World University Rankings 2019
** Australian Research Council Excellence in Research for Australia Initiative 2015
The last 12 months

181 peer-reviewed journal articles

$35 million in NHMRC grants

11 fellowships (ten NHMRC and one European Union)

In 2018 we

- Authored 181 peer-reviewed articles in scientific journals including 5 Lancet publications
- Had one Higher Doctorate and three PhD completions
- Undertook projects with 40 clinicians from a range of disciplines
- Contributed to the ANZ Musculoskeletal Clinical Trials Network, the ANZ Fall Prevention Society and Global Fragility Fracture Network
- Provided over 16 presentations to District conferences or clinical meetings
- Contributed to the ANZ Musculoskeletal Clinical Trials Network, the ANZ Fall Prevention Society and Global Fragility Fracture Network
- Featured in extensive national and international media broadcasts and publications
- Impacted policy and practice by contributing at 20 policy and government meetings (including APEC meetings, invited appointments to expert working groups of the Australian Academies of Science)
- Appointed to NHMRC Assigners Academy and NHMRC Grant Review Panels
- Received 8 national and international awards including the NPS MedicineWise Award for Excellence in e-health resources, and, finalist in the ACTA Trial of the Year

NHMRC Fellowships

- Professor Chris Maher
- Professor Cathie Sherrington
- Associate Professor Anne Tiedemann
- Associate Professor Steve Kamper
- Associate Professor Chris Lin
- Dr Leanne Hassett
- Dr Mary O’Keeffe (European Union funded)
- Dr Gustavo De Carvalho Machado
- Dr Adrian Traeger
- Dr Stephanie Mathieson
- Dr Marina De Barros Pinheiro

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- Received 8 national and international awards including the NPS MedicineWise Award for Excellence in e-health resources, and, finalist in the ACTA Trial of the Year
- Contributed to the ANZ Musculoskeletal Clinical Trials Network, the ANZ Fall Prevention Society and Global Fragility Fracture Network
- Provided more than 70 oral, poster and abstract presentations at 28 international and national conferences
- Featured in extensive national and international media broadcasts and publications
Our research streams

- Improving clinical care
- Preventing overdiagnosis
- Intervention testing
- Children and Adolescents
- Surgery
- Inflammatory disease/Connective tissue disease

Back pain and musculoskeletal conditions

Our research streams

- Mobility and falls
- Healthy ageing
- Disability

Physical Activity, Ageing and Disability

Evidence and Equity

PEDro partnership

Indigenous health
Our Team

The Institute for Musculoskeletal Health has more than 110 staff, students and affiliates. Approximately 40 per cent are clinician researchers.

Our team includes eight recognised world leaders in musculoskeletal health who have strong collaborations with researchers from other university faculties, with clinician researchers from the District and with leading international researchers.

Our research, our stories
Following are snapshots of the work of the Institute. We are involved in a comprehensive range of clinical and translational research and activities to promote evidence-based practice. For more information about our team and our research please visit imh.org.au
Executive committee

Professor Chris Maher
Director, Institute for Musculoskeletal Health
Professor, School of Public Health
NHMRC Principal Research Fellow
Fellow of the Australian Academy of Health and Medical Sciences

Dr Bethan Richards
Deputy Director, Institute for Musculoskeletal Health
Head of the Department of Rheumatology, Royal Prince Alfred Hospital, Sydney Local Health District
Senior Clinical Lecturer, University of Sydney Medical School

Professor Jane Latimer
Deputy Director, Institute for Musculoskeletal Health
Professor, School of Public Health
Visiting Professor, University of Oxford

Professor Cathie Sherrington
Deputy Director, Institute for Musculoskeletal Health
Professor, School of Public Health
NHMRC Senior Research Fellow
Fellow of the Australian Academy of Health and Medical Sciences
Our research streams

The back pain and musculoskeletal conditions stream includes students, researchers and professional staff from a variety of backgrounds including medicine, allied health, nursing and pharmacy. The focus areas of this theme are improving clinical care, preventing overdiagnosis, intervention testing, children and adolescents, surgery and inflammatory disease/connective tissue disease.

Latest scientific developments

Clinical trials are an important part of delivering high quality, evidence based care. Bringing clinicians, researchers, patients and industry partners together, the Institute’s inflammatory arthritis, soft tissue and connective tissue disease clinical trials program ensures that our patients have access to the latest scientific developments and best possible treatment outcomes.

Our clinical trials also provide an opportunity for patients to make a valuable contribution to musculoskeletal research.

The Institute’s rheumatology clinical trial program is strategically embedded into a multi-disciplinary clinical practice setting within the Institute for Rheumatology and Orthopaedics at Royal Prince Alfred Hospital. Consistent with Sydney Local Health District’s ethos of patient-centred care, each patient involved in a clinical trial receives individualised treatment, observation and monitoring from our highly skilled researchers, nurses, allied health care clinicians and specialists.

With the capacity to conduct multi-centre, international clinical trials for products at various stages of development, our patients have benefited from early access to biological and targeted small molecule therapies for rheumatoid arthritis, psoriatic arthritis, ankylosing spondylitis, systemic lupus erythematosus (SLE), Sjogren’s disease, inflammatory myositis, and systemic sclerosis.

Our clinical trial program is also at the forefront of testing the latest scientific developments for patients with common diseases including tennis elbow (lateral epicondylitis), adhesive capsulitis (frozen shoulder), osteoarthritis, and fibromyalgia with trials evaluating platelet rich plasma (PRP), mesenchymal stem cells, and novel pain medications all recently completed or underway.
Pain medicines
The most commonly used treatments for back pain are pain medicines, but many in common use have not been adequately tested. As all medicines have the potential for harm, establishing whether these medicines truly are effective is vitally important.

The Institute has extensive experience in planning, designing and conducting randomised double blind, placebo-controlled clinical trials. Our team of renowned clinicians, researchers and research professionals are currently investigating whether taking a short course of oxycodone reduces pain severity in acute back or neck pain compared to placebo (the OPAL trial).

Our earlier trial in sciatica was awarded the 2018 Finalist for ‘Trial of the Year’ by the Australian Clinical Trials Alliance (ACTA) and presented by the Hon Greg Hunt MP, Minister for Health. The PRECISE trial was the first trial to rigorously examine the efficacy and safety of pregabalin in sciatica, and provided unequivocal evidence against its use for this condition. The results were published in the New England Journal of Medicine.

The OPAL and PRECISE trials are part of a program of research investigating the benefits of commonly prescribed treatments in spinal pain.

Sydney Health Partners Emergency Department (SHaPED) trial
Every year, more than 50,000 people visit NSW emergency departments (ED) with low back pain, generating huge costs to the healthcare system at an estimated $142 million. Despite there being clear evidence on how low back pain should be managed, in the busy ED setting it can be hard to deliver best practice care. For example, about 70 per cent of patients with low back pain receive opioids in the ED – a pain medicine that not only has questionable benefits but comes with serious consequences, including dependence, overdose and death.

To rectify this, our group is bringing the latest research to clinical care of patients with low back pain visiting NSW emergency departments.

We are implementing a new model of care developed by the Agency for Clinical Innovation, which equips emergency clinicians with the skills, knowledge and support to ensure their patients receive the best possible care. The SHaPED trial is a collaboration between clinicians, hospital managers and researchers with a variety of backgrounds including physiotherapy, emergency medicine, rheumatology, health economics, behavioural science, and digital health technologies.

Better management of low back pain in the emergency department has the potential to improve the health and quality of life of a large number of patients and save health dollars. It could also reduce use of inappropriate interventions, avoid unnecessary hospital admissions, and improve patient’s experience with the hospital service. The ultimate goal of our research is to reduce pain and suffering and speed recovery of our patients with low back pain, so that they can resume a productive and enjoyable life.
Our research streams

Physical activity, Ageing and Disability

Mobility and falls
Healthy ageing
Disability

Our current studies involve testing:

- The use of health coaching and internet-based technology to support physical activity behaviour change in older people, people with disabilities and middle-aged people.
- Education of health professionals to enhance referral to suitable exercise and sporting opportunities as part of clinical care.
- Investigation of the role of exercise (including yoga-based exercise) for preventing falls in older age.

Physical inactivity is a public health concern that requires urgent action, as it is recognised as a global pandemic.

The World Health Organization recommends physical activity across the life course to enable global healthy ageing. Priority groups for physical activity interventions to enable future healthy ageing are people with disabilities, middle-aged adults and older adults.

These groups are at high risk of loss of independence, are particularly inactive, face specific barriers to being more active, and are likely to require different targeted strategies and benefit from health professional guidance to increase activity levels.

Falls and mobility limitations are a major concern among older people. Approximately 30% of community-dwelling older adults fall once or more every year, and around one third of older people have mobility limitations and report difficulties related to walking and climbing stairs. Preventing falls and improving mobility are key health priorities.

The Institute's physical activity aims to help reduce the global epidemic of physical inactivity through the development, evaluation and implementation of strategies that address the needs of older people and people with disabilities. We test ‘real world’ strategies to enhance physical activity designed for ‘scale up’ i.e., incorporation into clinical and preventive services. We are currently running four large scale (n=500+) NHMRC-funded trials.

The physical activity, ageing and disability stream includes students, professional and research staff from a variety of backgrounds including physiotherapy, exercise physiology and health promotion.

The focus areas of this theme are Mobility and falls, Healthy ageing and Disability.
Stories from participants in physical activity trials

Gayle’s story
Gayle contracted polio when she was 18 months old, during an epidemic in the 1950s. At age 64 Gayle was admitted to hospital suffering from pain. This resulted in her referral to rehabilitation and, consequently, her participation in the recently-completed NHMRC-funded Activity and MOBility UsIng Technology (AMOUNT) rehabilitation trial. After her hospital stay, Gayle wanted to get back to her previous level of activity. The use of various devices in this study – such as videogames, exercise apps and an activity tracker (Fitbit) – enabled her to make balance and strength exercises a daily habit, helping her to regain her confidence in going out.

“Now I can do the longer walk. I’m not using my walking stick so much.” Gayle reports that the physiotherapists working on the program provided the encouragement and motivation to change, and that being part of the AMOUNT study improved her physical activity and wellbeing. “My quality of life, it’s changed so much. I want to try new things now.”

Dennis’ story
After heart surgery, Dennis realised that he needed to become more active and reduce weight for his health, so he decided to take part in our recently-published physical activity coaching trial. Dennis worked with our health coach to create a tailored physical activity plan based on his needs and interests. Dennis also received a Fitbit activity monitor to help him track his personal physical activity goals.

“I make it a point to do between 30 and 40 kilometres a week, walking. I actually do Santa Claus for Christmas, and for that, you need to be fit. That’s another inspiration. I don’t want to let people down by not being Santa this year.”

Our trial gave Dennis more confidence and awareness of the importance of daily physical activity. “You do the steps, you do the walking, and then you’re losing the calories, so you think, is that really me? But it is. Over the last three years, that’s me. You just need the mindset.”

Cherie’s story
Cherie was involved in our 12 month Coaching for Healthy Ageing (CHAnGE) trial in which we are aiming to increase physical activity using pedometers and health coaching, and incorporating balance and strength exercises to prevent falls. When Cherie started in the study, she was aware that she was becoming less active and slowing down in life. She was keen to make changes to keep doing what she wanted to do. “I think it’s really sad that people aren’t taught how to be old.”

She found she could make home balance and strength exercises part of her daily routine. She gradually increased the amount of walking she was doing and regained her confidence in getting out and about. “My sense of wellbeing is better,” she said. “You are the answer, use it or lose it.”

For more information
Gayle and Dennis were featured in the short film selected to showing at the Run Nation Film Festival shown around Australia
www.georgeinstitute.org/videos/run-nation-running-film-festival

Cherie was recently interviewed for Channel 9 news where she talked about the benefits of becoming more active.
www.9news.com.au national/2018/08/03/22/16/elderly-falls-how-to-prevent
Our research streams

The Evidence and Equity theme, although smaller than other Institute themes, is a very important part of the Institute’s work. The focus areas of this theme are the PEDro Partnership and Indigenous Health.

PEDro Partnership
The Physiotherapy Evidence Database (PEDro; www.pedro.org.au) is the pre-eminent global resource to support evidence-based physiotherapy. PEDro provides rapid access to all evidence-based clinical practice guidelines, systematic reviews and randomised controlled trials evaluating physiotherapy interventions.

Users can perform searches to answer their clinical questions or sign up for feeds to keep up-to-date with the latest developments in their area of practice (“Evidence in your inbox”).

To help break down barriers to using high-quality clinical research to guide practice, PEDro is available in 12 languages (English, Chinese (simplified characters), Chinese (traditional characters), Portuguese, German, French, Spanish, Italian, Japanese, Korean, Turkish, and Tamil). Skills training for evidence-based practice is also available in 12 languages.
The Institute has engaged in authentic partnerships with Aboriginal communities to work together to improve the health of Aboriginal and Torres Strait Islander peoples. In mid 2009, Aboriginal leaders from communities in the Fitzroy Valley in far north-west Australia were concerned that alcohol misuse was significantly impacting the health of their children. In particular, unborn babies exposed to alcohol were at risk of developing Fetal Alcohol Spectrum Disorders (FASD), a range of disorders that occur when mothers drink alcohol during pregnancy. Children with FASD may suffer significant lifelong behavioral and learning difficulties.

Aboriginal leaders invited researchers from The Institute for Musculoskeletal Health and the Discipline of Paediatrics and Child Health at The University of Sydney, to partner with them on a groundbreaking program of research to determine the number of children affected by fetal alcohol spectrum disorders and to identify solutions for these children. This work included The Lililwan Project, which was the first study to describe the burden of FASD in remote Aboriginal communities and had significant impact in raising awareness of these disorders within government and across Australia.

The work continues with the communities of the Fitzroy Valley and with key collaborators at the Telethon Kids Institute in Western Australia.

**Indigenous Health**

**Facts**

**PEDro currently indexes over** 42,000 articles, so is the most complete index of trials, reviews and guidelines evaluating physiotherapy interventions globally. The number of articles is growing exponentially, doubling in size every 6 years.

**During 2018 PEDro was used to answer over** 2.6-million questions. This means that a new search was initiated every 12 seconds, on average, during 2018. PEDro users were from 213 countries. The five countries with the highest usage in 2018 were the Brazil (22%), United States of America (10%), Spain (8%), Australia (7%), and France (5%).

**Over 10,000 users subscribe to “Evidence in your inbox”**

**30,800+ people follow PEDro on Facebook and 8,400+ on Twitter**

**PEDro videos** (how-to and skills for evidence-based practice) have been viewed nearly 10,000 times.

**Achievements**

**PEDro is celebrating its 20th anniversary** as the global resource to support evidence-based physiotherapy in 2019.

**PEDro has been continuously** available and free to use for the past 20 years. This has been made possible through the generous support from industry partners (funders for 2018 were: Australian Physiotherapy Association, Motor Accidents Insurance Commission, Transport Accident Commission, Chartered Society of Physiotherapy, Cerebral Palsy Alliance, and World Confederation for Physical Therapy Member Organisations from 23 countries).

**PEDro will be featuring prominently at the World Confederation for Physical Therapy Congress in May 2019**, including running a stand in the exhibition hall and contributing to the program (2 symposia, 1 post-congress workshop, and two free presentations).

**Associate Professor Anne Moseley** received the Inaugural Achievement Award for the Faculty of Medicine and Health, The University of Sydney in 2018 for her leadership of PEDro.
Home-based video game exercises can reduce chronic low back pain in older people, study finds

New research from University of Sydney has found home-based video-game exercises can reduce chronic low back pain in older people by 27 percent, which is comparable to benefits gained under programs supervised by a physiotherapist.

Published today in Physical Therapy journal, this first-of-its-kind study investigated the effectiveness of self-managed home-based video game exercises in people over 55 years using a Nintendo Wii-Fit U.

Low back pain (LBP) is the most disabling and costly musculoskeletal condition worldwide with most of this burden among older people who develop chronic symptoms. Chronic LBP becomes more severe and disabling with age, and can have a significant impact on physical functioning such as balance, strength and walking speed.

“Our study found that home-based video game exercises are a valuable treatment option for older people suffering from chronic low back pain as participants experienced a 27 percent reduction in pain and a 23 percent increase in function from the exercises,” said Dr Joshua Zadro, a physiotherapist and postdoctoral research fellow from the University of Sydney School of Public Health.

Participants practiced flexibility, strengthening and aerobic exercises for 60 minutes, three times per week at home without therapist supervision, and the effect of the 8-week video-game program was comparable to exercise programs completed under the supervision of a physiotherapist.

Structured exercise programs are recommended for the management of chronic LBP, but there is poor compliance to unsupervised home-exercises. Our study however had high compliance to video-game exercises, with participants completing on average 85 percent of recommended sessions.

Reviewed by Alina Shrourou, BSc Sep 19 2018
Advisory Board

**Professor Andrew McLachlan**  
Chair  
Head of School and Dean of Pharmacy,  
The University of Sydney

**Dr Teresa Anderson AM**  
Chief Executive,  
Sydney Local Health District

**Professor Rachelle Buchbinder**  
Chair, Australia and New Zealand Musculoskeletal Clinical Trials Network (ANZMUSC)

**Professor Joel Negin**  
Head of the Sydney School of Public Health, The University of Sydney

**Professor Sallie Lamb**  
Co-Director, Clinical Trials Unit,  
The University of Oxford

**Dr Michael Moore**  
Chief Executive Officer, Central and Eastern Sydney Primary Healthcare Network

**Ms Ornella Clavisi**  
Chair, Australia and New Zealand Musculoskeletal Clinical Trials Network (ANZMUSC) Consumer Advisory Group

**Professor Maureen Ashe**  
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University of British Columbia

**Dr Paul Stalley**  
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**Professor Maureen Ashe**  
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