

Empowering Movement: Physiotherapy strategies for individuals with disabilities

Dr Michelle McDonnell- Physiotherapist

Nicolle Macaitis- Physiotherapist

Division of Aged Care, Rehabilitation and Palliative Care,
NALHN



Government
of South Australia

Health

Northern Adelaide
Local Health Network

Acknowledgement of Country

Northern Adelaide Local Health Networkrlu tampintheta Kurna miyurna yaitya yarta-mathanya Kurna yartarna-arra ngadlu warpulayintheta.

Ngadlu tampintheta purkarna pukinangku, yalaka, tarrkaritya.

Ngadlu tampintheta yaitya mathanya kuma parnaku tuwila yartangka

NALHN recognises the Kurna people as the traditional custodians of the land where we proudly work to deliver health and wellbeing services.

We also honour Kurna Elders past, present and emerging.

We recognise Aboriginal cultural authority, and their ongoing spiritual connection to country.

Topics to discuss:

- What do we do?
- Who can we help?
- How can we help? Depends on what the problem is
- Case studies



Government
of South Australia

Health

Northern Adelaide
Local Health Network

What do Physiotherapists do?

- PTs are experts in human movement. We:
 - Thoroughly assess the condition
 - Develop treatment plans
 - Manage pain
 - Provide rehabilitation following injuries, surgery or neurological conditions
 - Prevent future injuries and physical issues
 - Work across lifespan e.g. pregnant women, children
 - Educate and empower people



<https://yourphysio.my/what-is-physiotherapy/>

EVERYONE CONTRIBUTES

How does it differ for your clients?

- PTs may use alternative techniques to work with people who may have difficulty communicating their needs
- Skilled handling can be used to assess for problems, to guide movement or to provide a calm reassurance
- Health settings often impose (short-term) environmental restraints, and PTs can often assess abilities to allow access to activities or places
- Rehab PTs are trained to work with people with cognitive and behavioural issues, taking time to understand their issues/ needs



EVERYONE GROWS

A man with short dark hair, glasses, and a friendly smile stands in the center of the frame. He is wearing blue medical scrubs and a yellow lanyard around his neck. The background is a light-colored wall decorated with large, stylized murals of trees and leaves in various colors including green, blue, orange, and red. The text "Who can we help?" is overlaid in white, bold font across the middle of the image.

Who can we help?

Who can see a Physio?

- Babies and children
 - Breathing conditions, developmental issues, injuries
- General population
 - Self-management advice for musculoskeletal issues, chronic disease management, lifestyle modifications, workplace posture
- Hospital patient
 - Focus on mobility, breathing, return to usual daily activities and recover from orthopaedic and neurological injuries and others
- Rehab setting
 - After orthopaedic or neurological injury, reconditioning
- Community
 - Clients post rehab, those supported by MAC and NDIS

EVERYONE MATTERS



How can we help?

Role of Physio in the disability team

- Goal: to regain functional independence and improve quality of life
 - Use expertise in anatomy, biomechanics, therapeutic exercise
 - Assess the problem from the client's perspective: what are they hoping to achieve?
 - Collaborate with other healthcare professionals: understanding behaviours during certain positions may provide the key
 - Work directly with the client for hands-on treatment if appropriate
 - Develop comprehensive treatment plans to address their needs, may be carried out by other healthcare workers

EVERYONE HAS A STORY

Role of Physio in the disability team

- May involve one-off assessments, regular therapeutic activities, incorporating approaches into daily activities or all of the above
- Establish good rapport and understanding of participants, their families and past experiences especially as it relates to routines and movement
- In collaboration with multidisciplinary team, understanding their meaningful life experiences e.g. hobbies, regular physical activities

EVERYONE HAS A STORY

OFFICIAL

Let's talk details!

Lying

- Posture in bed (static, dynamic)
- Moving in bed
- Breathing, circulation issues
- Pressure area care

How can we maximise the ability to perform normal movement, and minimise effort?

EVERYONE CONTRIBUTES



Sitting

- Positioning in chair/wheelchair
- Head/neck posture
- Ability to keep head level
- Ability to do daily tasks/hobbies
- Comfortable leg posture
- How long is too long?



Transfers

- Moving from one place to another
e.g. bed, wheelchair, dining chair,
armchair, car, floor
- Assistive devices needed?
- Help from a person needed?
 - How much help?
 - Where?



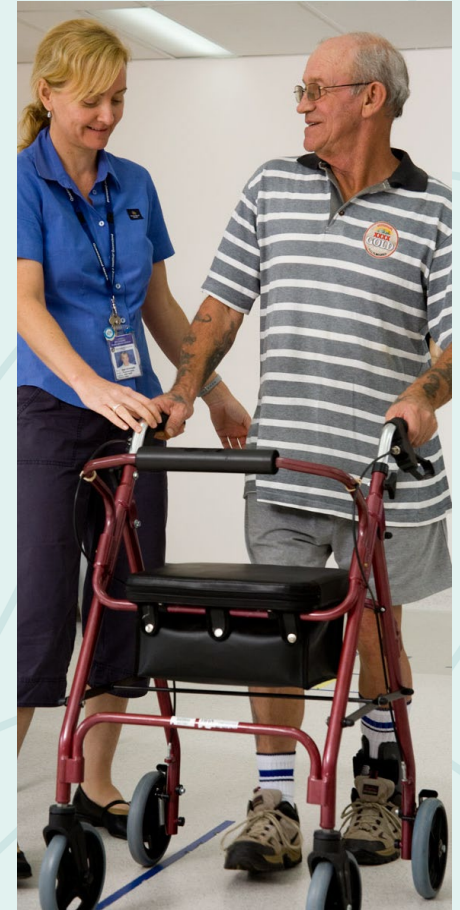
Standing

- Sufficient balance?
- Assistance from a device/person
- Safety?
- How long is too long?



Walking

- Assistive devices needed?
- Help from a person needed?
 - How much help?
 - Where?
- How long? How far? Where do they want to go?

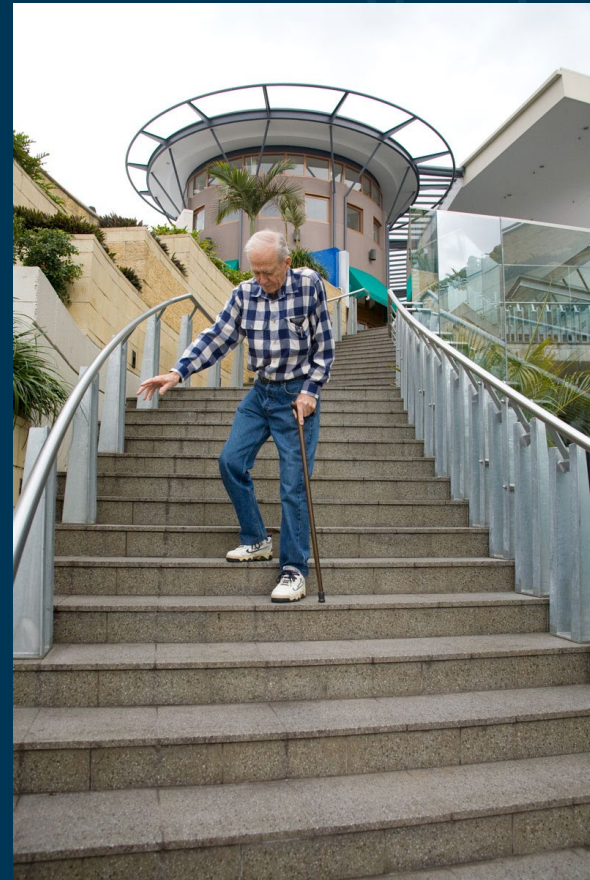


EVERYONE CONTRIBUTES

Community mobility

- Steps/stairs
- Public transport
- Uneven surfaces: beach, parks
- Concerts/sports

- Assistance of devices/person?



Considerations/complications

- Pain
- Weakness
- Tightness/contractures
- Fear
- Coordination issues (ataxia)
- Falls
- Caregiver considerations (risks of lack of movement)

EVERYONE HAS A STORY

Time for your thoughts....

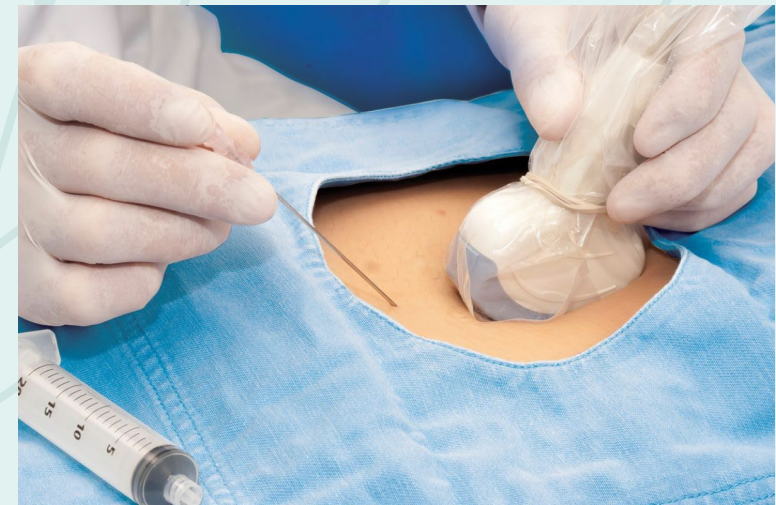
- General issues/concerns
- Common problems
- Specific examples

EVERYONE GROWS

Case study – problem solving

- A young woman with disability who had tight, painful muscles attended a Spasticity clinic
- The medical team recommended she receive botulinum toxin A injections to weaken the muscles, but she was afraid of needles
- Other approaches had been tried, but never needles – we were hopeful that it could help
- We did not have the ability to provide sedation
- Family were concerned

EVERYONE CONTRIBUTES



Case study – what did we do?

- We spoke at length with the family at the first visit, to plan for strategies that we could try that might work
- On the day, the team made a number of provisions to allow for a successful procedure which involved
 - Arriving early to apply numbing cream
 - Asked family members to bring in comfort item (toy)
 - PT assisted with gentle stroking of the forehead
 - OT was able to sing songs she liked to provide distraction
- The medical staff could focus on the treatment with minimal distress caused, leading to a positive healthcare experience (and outcome)

EVERYONE HAS A STORY

Case Study – problem solving

- A young lady with Cerebral Palsy who was wearing bilateral AFO's
- She was finding them uncomfortable and didn't enjoy walking and was reluctant to exercise.
- She was having trips and falls at home, placing her at risk of injury.
- Going up and down steps was challenging.
- Her parents were keen to help her become more active.



Case Study- What did we do?

- Physiotherapy sessions regularly, initially short, and more focused on building rapport. Sessions were fun!
- Targeted and specific treatment techniques to help her right foot and ankle
- A gentle home exercise program, developed and guided by her, and supported by her parents
- Liaison with Orthotics and Prosthetics, with medical clinics, day service providers
- Outcome: She now only needs one AFO, and has a new AFO on her left. She is enthusiastically engaging in ten pin bowling, Exercise Physiology and completes exercises at home with support of her family. She has had no recent falls. Her walking is faster and she loves going on holidays in the caravan!

EVERYONE MATTERS

Case Study

- 45yo lady with significant cognitive impairment due to early onset dementia
- Requires assistance to mobilise with a 4 wheeled walker
- When is seated in the lounge room in the recliner, tends to try to get up and walk independently (+/- walking aid), and has frequent falls due to this

EVERYONE MATTERS

What do we need to consider? What do you think?

- Comfort- stiffness, pressure areas, continence
- Pain- pain medications appropriate
- Scheduled mobility
- Understand context and past experiences- TOP 5
- Provide activities that can be completed whilst seated to keep them engaged- understand context
- Enough exercise during the day
- Chair alarm, sensor mat
- PRE-EMPT the behaviour

EVERYONE CONTRIBUTES

In summary

- PTs are experts in movement analysis
- We are often involved in what people can/can't do
- We work closely with people, often with hands-on therapies so we can develop a good understanding of challenges affecting movement
- We may offer advice as part of the team approach, or be involved more closely with goal-directed therapy in the short-term
- Long-term monitoring can help to prevent complications

**EVERYONE
HAS A STORY.
MATTERS.
CONTRIBUTES.
GROWS.**

www.sahealth.sa.gov.au/nalhn
[@northernadelaidehealth](https://www.facebook.com/northernadelaidehealth)
[@northernadelaidehealth](https://www.instagram.com/northernadelaidehealth)



Government
of South Australia

Health
Northern Adelaide
Local Health Network