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### Clinical Supervision: How Supervisors Add Value

Nicky Baker<sup>1,2</sup>, L Kapur<sup>2,3</sup>, J Garner<sup>2,3</sup>, B Lange<sup>1,2</sup>

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#### Biography:

Nicky Baker is a PhD student at Flinders University investigating stumbles and trips to prevent falls, something very relevant to her physiotherapy clinical background. Nicky also coordinates placements for final year Health Science students in a variety of health settings to provide authentic work integrated learning.

Nicky has 30 years physiotherapy clinical experience, leaving SALHN Rehabilitation, Aged and Palliative Care in 2019 to pursue full time academic study. Through her career she has held senior clinical roles in acute, rehabilitation and community settings. Highlights include the implementation of standardized aquatic physiotherapy training in the Victorian Chapter of Australian Physiotherapy Association, roll out of the South Australian State Stroke Plan at FMC, and implementing Electronic Medical Records and Telerehabilitation in Home Rehabilitation at SALHN.

Nicky is keen to keep research and clinical practice relevant by focusing always on the client, and modelling interprofessional practice and person centred care.

Background and aims: Clinical supervision (CS) provides opportunities for personal, clinical and professional development and safe, quality outcomes for our patients. Multiple models and modes of CS offer paired or group supervision both intra- and inter-professionally. Content varies and encompasses the supervisee's psychosocial wellbeing, clinical skills, leadership and career development. Supervisor expertise is essential to enhance clinician skills, knowledge and attitudes. This research explored the CS processes and outcomes relating to supervisor knowledge and skills in one Local Health Network.

Methods: Professional, clinical Allied Health staff attended focus groups to explore their perceptions and experiences of CS. Discussions were audio recorded, transcribed, analysed and coded by two to four researchers at each stage. Key themes were identified through discussion and consensus.

Results: Twenty-five clinicians from six Allied Health disciplines (dietetics, occupational therapy, speech pathology, social work, podiatry, physiotherapy) provided informed consent. Themes relating to the supervisor's role within CS included: the interpersonal relationship of mutual respect and trust; availability and readiness to embrace informal and formal discussions; and skill level of the supervisor.

Conclusions: Supervisors add value to CS and facilitate clinicians' development by gaining supervision skills through experiential, interactive training. The focus of supervising new graduate clinicians is on embedding and advancing clinical skills. With increasing clinician experience, the supervisor focus shifts to teamwork and facilitating others. As the supervisee develops into a senior clinician, the supervisor supports development of management and leadership skills.

### Identifying stumbles to prevent impact of falls

Nicky Baker<sup>1,2,3</sup>, K Grimmer<sup>2</sup>, S Gordon<sup>1,2,3</sup>

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#### Biography:

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Nicky is keen to keep research and clinical practice relevant by focusing always on the client, and modelling interprofessional practice and person centred care.

Background and aims: Maintaining good balance is essential to healthy ageing, injury prevention and quality of life. Balance testing is established for opposite populations: known fallers and elite athletes. However, there remains no standard way to test functional balance in community dwelling, middle or older aged adults who have no diagnosed neurological deficit, overt pathology and are not known fallers. This study investigates balance performance for people in this category.

Methods: This cross-section, observational study was conducted in the community with local government and business. Participants provided informed consent, responded to surveys reporting fall or near-miss events in the past 6 months, then undertook progressively more challenging static, dynamic and functional balance activities. For safety, unsuccessful attempts precluded progression to more challenging tasks. Odds Ratios (OR) and sensitivity/specificity were calculated, and Pearson's correlation coefficient classified the relationship between completed tasks and fall status.

Results: Participants who had identified a stumble or near-miss were more than twice as likely as non-fallers to fail key static and dynamic balance tasks (OR 2.77) and functional tasks (OR 3.16). Conclusions: 'Stumble' or 'near-miss' participants were less strong and agile than non-fallers, although neither group had fallen. The identification of middle or older age adults who experience stumbles, trips or near miss events provides an opportunity for early screening, intervention and prevention of potential falls.

# Using codesign in inpatient rehabilitation to develop strategies to implement the 2017 Stroke Clinical Guidelines

Elizabeth Lynch<sup>1,2</sup>, RF Harling<sup>3</sup>, DA Cadilhac<sup>2,4</sup>, G Harvey<sup>1</sup>, <u>A Barker, M West</u>

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Session Five | Oral Presentations, October 15, 2021, 14:00 - 15:20

Background: In 2018, more than one third of Australian inpatient rehabilitation centres providing care to people with stroke reported not adhering to the Stroke Clinical Guidelines and is not clear how to improve the delivery of evidence-based stroke rehabilitation. Less than 3% of research published in journals for stroke rehabilitation clinicians provides new knowledge about how to implement or evaluate evidence-based interventions.

Aim: To evaluate the feasibility and effectiveness of involving stroke survivors and carers in designing/delivering interventions that promote rehabilitation in line with the Stroke Clinical Guidelines. Method: Recommendations from the Stroke Clinical Guidelines were prioritised according to the experiences and preferences of stroke survivors and their carers. The principles of experience-based codesign were applied, with former inpatients, carers and health professionals at one inpatient rehabilitation centre working collaboratively to design and tailor implementation strategies.

Results: Priorities for implementation identified by stroke survivors and carers were information provision, practice outside of therapy hours and nursing continuity. Stroke survivors, carers and health professionals from six disciplines participated in codesign workshops to identify how to address each recommendation in a way that met the needs of the stroke survivors and carers, while being feasible and sustainable for health professionals. Health professionals welcomed the opportunity to work collaboratively with former patients and unique insights were gained. Some stroke survivor and carer participants had difficulty attending face-to-face meetings, requiring workarounds such as teleconferencing with the research coordinator. Conclusion: Codesign of implementation strategies with stroke survivors and their carers is feasible. Data regarding the effectiveness of the pilot trial will be available in February 2020.

## Improving patient access to public sector women's health physiotherapy resources

#### Mrs Tara Beaumont

Session Two | Collaborative Grants Presenters, October 14, 2021, 15:30 - 15:55

#### Biography:

Tara Beaumont is the Head of Unit, Women's Physiotherapy at the Women's and Children's Health Network – a role she has held since 2007. She has attained postgraduate qualifications in pelvic health physiotherapy and has published research on topics related to the role and impact of Physiotherapy on women's health.

In order to maximise and promote equitable access to often scarce public sector resources, in the context of competing demands and priorities, a mindset of critical analysis/evaluation and continual improvement is essential. The Women's Health Physiotherapy Unit at the Women's and Children's Hospital has been fortunate in recent times to have received supporting project funds via the Allied and Scientific Health Office's Research Seed Funding Program to undertake a range of improvement projects within our service. In this lightning presentation, Tara Beaumont will briefly describe 3 of these projects, providing broad overview of the issue, the process undertaken and the outcomes of the project.

### Management of musculoskeletal foot & ankle conditions prior to publicsector orthopaedic referral in SA

Ms Melissa Cooney<sup>2</sup>, T Walsh<sup>1</sup>, L Ferris<sup>2</sup>, N Cullen<sup>2</sup>, J Bourke<sup>2</sup>, C Gooi<sup>2</sup>, C Brown<sup>3</sup>, J Arnold <sup>1</sup>School of Clinical Sciences, Queensland University of Technology, , , <sup>2</sup>Dept of Orthopaedics & Trauma, Queen Elizabeth Hospital, CALHN, SA Health, , , <sup>3</sup>Dept of Orthopaedics, Noarlunga Hospital, SALHN, SA Health, , , <sup>4</sup>Alliance for Research in Exercise, Nutrition & Activity, Sansom Institute, University of South Australia, ,

Session Five | Oral Presentations, October 15, 2021, 14:00 - 15:20

#### Biography:

Melissa works as a Lead Clinician Podiatrist in the SALHN and CALHN networks. She coordinates an Orthopaedic High Risk Multi-Disciplinary Podiatry Clinic at Noarlunga Health Service. She has extensive experience in a high risk foot setting, with particular interest in the orthopaedic aspect of podiatric management. Melissa has a research interest in podiatry-led interventions for the orthopaedic patient population. She also runs her own private podiatry practice in Adelaide and is a mother to four young girls.

Background & Rationale: People with musculoskeletal foot/ankle conditions are often referred for orthopaedic opinion, yet management prior to referral is largely unknown. This project seeks to determine the characteristics and management of musculoskeletal foot/ankle complaints prior to public-sector orthopaedic referral.

Method: People with non-urgent foot/ankle complaints were recruited over a 12-month period from waiting-lists at three tertiary hospitals in Adelaide, Australia. Participants reported their medical history and their knowledge about their complaint. Validated questionnaires measured foot/ankle pain severity and health-related-quality-of-life (HRQoL). Descriptive statistics were generated for sample demographics, medical history and foot/ankle symptoms. Multivariable regressions were used to explore factors associated with foot/ankle pain severity and whether participants considered an operation necessary. Results: A total of 233 adults participated (38.4% response rate), 66% female, median age 57.7 years IQR 18.3, BMI 29.3 kg/m2 IQR 8.7. Half of the participants had seen a podiatrist (52.8%), while 36.5% hadn't see any other health professional prior to referral. BMI was positively associated with foot/ankle pain severity ( $\beta$ =0.48, 95%CI 0.05, 0.92), while HRQoL had a negative association ( $\beta$ =-0.31 95%CI -0.45, -0.18). Participants told by their GP that they may need an operation were significantly more likely to consider surgery necessary (OR=31.41, 95%CI 11.30, 87.35), while older people were less likely (OR=0.94, 95%CI 0.90, 0.98).

Conclusion: More than one-third of participants hadn't accessed allied-health care prior to orthopaedic referral and most expected to undergo surgery. The discordance between the expectation of surgery and historically low surgical-conversion rates suggests more work is necessary to improve the management of this group.

# Habitual Dietary Fibre And Prebiotic Intake In Inadequate In Patients With Inflammatory Bowel Disease

Rachel Davis<sup>1,2</sup>, A Day<sup>1,3</sup>, J Barrett<sup>4</sup>, A Vanlint<sup>1</sup>, J Andrews<sup>3,5</sup>, S Costello<sup>1,3</sup>, R Bryant<sup>1,3</sup>

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#### Biography:

Rachel is a clinical dietitian currently employed at the Lyell McEwin hospital working across a number of clinical areas including gastroenterology. Rachel has an interest in gastrointestinal conditions and the impact of diet and nutrition on patient and health related outcomes. Rachel completed her honours research at The Queen Elizabeth Hospital on fibre intake in patients with inflammatory bowel disease and had the opportunity to disseminate this research at both Australian Gastroenterology Week and the Australasian Society of Parenteral and Enteral Nutrition conferences. Rachel has a key interest in food and enjoys opportunities to cook and trial different recipes in her spare time.

Background: Recommendations for dietary fibre intake in patients with inflammatory bowel disease are highly variable.1 Despite the potential benefits of prebiotic fibres on the gut microbiome, many patients with inflammatory bowel disease follow a low fibre diet. This study aimed to comprehensively evaluate intakes of total and prebiotic fibres in patients with inflammatory bowel disease, so as to determine the adequacy of fibre intake and factors that may influence intake.

Methods: Outpatients with a formal diagnosis of inflammatory bowel disease were recruited to this multicentre cross-sectional study. Habitual dietary fibre intake including prebiotic fibre types were measured using a validated comprehensive nutrition assessment questionnaire. Adequacy of total fibre intake was compared to Australian Nutrient Reference Values. Multiple linear regressions were performed to determine factors influencing fibre intake.

Results: Of 92 participants, 52% had Crohn's disease, 51% were male, and the mean age was 40 years. Overall, only 38% of the cohort consumed adequate total fibre (median 24g/day, interquartile range 18.5-32.9). Adequate fibre consumption was significantly less common in males than females (21.3% vs 55.6%, p= 0.002) (Figure 1). Resistant starch intake (median 2.9g/day, interquartile range 2.1-4.8) was significantly less than proposed recommendations (20g/day). Disease-related factors such as phenotype and disease activity were not found to influence fibre intake.

Conclusions: Patients with inflammatory bowel disease habitually consume inadequate fibre, in particular, the prebiotic fibre resistant starch. The potential deleterious effects of low prebiotic intake on the gut microbiome and disease-related outcomes in inflammatory bowel disease are unknown and warrant further research.

# Support for children and families after parental acquired brain injury (ABI): moving from sequalae to inter-generational development of ABI educational technology

Mrs Kate Dawes<sup>1,2</sup>, A Carlino<sup>1</sup>, M va den Berg<sup>2</sup>, M Killington<sup>1,2</sup>

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Session One | Oral Presentations, October 14, 2021, 14:00 - 15:20

#### Biography:

Kate has worked in sub-acute rehabilitation as the Principal Clinician Social Worker in the South Australian Brain Injury Rehabilitation Service/CALHN for the past decade. She is also a current PhD student at Flinders University. Kate is investigating the impact of parental acquired brain injury on their children, as a cohort often forgotten in support and education during the recovery process. Kate's PhD focuses on filling gaps via the development of digital technology, developed by consumers and clinicians. Throughout her career, Kate has had significant experience in clinical practice with complex patients, developing, implementing and evaluating quality improvement initiatives and strategic planning.

Background and aims: Parental acquired brain injury (ABI) is particularly traumatic for children due to changes within interpersonal relationships and family functioning which increases their risk of childhood psychopathology. However, children typically receive minimal support. The aim of this study was to investigate the impact of parental ABI on children and adult family members, including their views of the support provided, gaps, and recommendations for future interventions.

Method: Twenty-six participants were recruited from 12 families across the South Australian Brain Injury Rehabilitation Service (SABIRS) and external community brain injury agencies. This study was guided by qualitative methodology via semi-structured interviews and thematic analysis.

Results: Analysis of interview data of 16 children, aged 5-18, and 10 adults revealed four main themes: 1) help parents help their children, 2) give children meaningful roles, 3) staff: don't leave children 'in the dark', and 4) support for children is not one size fits all.

Conclusions: Children and adults report significant gaps in support offered by acute, rehabilitation and community services. Children expressed a need for intervention to support their adjustment and improve family functioning. To fill identified gaps, participants recommend more input by clinical staff and the use of technology; specifically, the development of age-appropriate applications, educational videos and interactive games.

Future Studies: Phase 2 of this Research is about to commence to understand clinician's perspectives and considerations of including children in clinical interventions after parental ABI. Phase 3 will be the development of digital tools via an experience-based co-design framework and a usability and feasibility study thereafter.

# Exclusive Enteral Nutrition: An optimal care pathway for use in adult patients with active Crohn's disease

Mrs Alice Day<sup>1</sup>, J Wood<sup>2</sup>, S Melton<sup>2</sup>, L Purcell<sup>3</sup>, J O'Connor<sup>4</sup>, R Mutsekwa<sup>5</sup>, D Holt<sup>6</sup>, A Dunning<sup>7</sup>, A Dunning<sup>7</sup>, E Bidgood<sup>8</sup>, V Asrani<sup>9</sup>, E Simpson<sup>10</sup>, R Burgell<sup>11</sup>, R Bryant<sup>1</sup>

<sup>1</sup>Dept of Gastroenterology, The Queen Elizabeth Hospital, CALHN, SA Health, , , <sup>2</sup>Nutrition & Dietetics, Alfred Health, Victoria, , , , <sup>3</sup>Dept of Nutrition & Dietetics, Logan Hospital, Queensland, , , <sup>4</sup>Dept of Nutrition & Dietetics, Eastern Health, Victoria, , , <sup>5</sup>Dept of Nutrition & Dietetics, Gold Coast Hospital, Queensland, , , <sup>6</sup>Dept of Gastroenterology, Monash Health, Victoria, , , <sup>7</sup>Nutrition and Dietetics, Liverpool Hospital, New South Wales, , , <sup>8</sup>Dept of Dietetics, Royal Melbourne Hospital, Victoria, , , <sup>9</sup>Dept of Nutrition & Dietetics, Auckland City Hospital, New Zealand, , , <sup>10</sup>Royal Adelaide Hospital, CALHN, SA Health, , , <sup>11</sup>Dept of Gastroenterology, Alfred Health, Victoria, ,

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#### Biography:

Alice is a Senior Research Dietitian at The Queen Elizabeth Hospital and PhD Candidate at The University of Adelaide. Alice completed her Dietetics degree with first class honours in the UK before returning to Adelaide in 2009 to continue working as a clinical dietitian predominantly within gastroenterology, surgical, and critical care services. Alice's interest in gut nutrition research started with an honours project investigating the nutritional impact of nocturnal fasting in chronic liver disease and continued to develop through her work with patients. Alice is currently undertaking PhD in diet and inflammatory bowel disease and is the primary investigator on a pilot dietary intervention study for people with ulcerative colitis, in collaboration with SA Health IBD Services and Monash University in Victoria. Alice is an active member of SA Gastroenterology Dietitians Network, Dietitians Crohns and Colitis Network Australia, and Australasian Society of Parenteral and Enteral Nutrition.

Background and aim: Exclusive enteral nutrition (EEN) is emerging as a therapeutic option for adults with active Crohn's Disease (CD). However there is no standardised approach to delivering this therapy. The aim of this study is to develop an optimal care pathway for using EEN in adults with CD. This will create a standard of care to benchmark practice and provide direction for future research.

Methods: A working group of 12 multidisciplinary inflammatory bowel disease specialists across Australia and New Zealand was convened to develop a practical, clinically-focused care pathway for using EEN in adults with active CD. Six key areas were identified; clinical indications, nutrition assessment, EEN protocol and monitoring, accessing formula and food re-introduction. Current literature was identified via systematic review. Quality of evidence was graded. Consensus expert opinion was provided where literature gaps were identified.

Results: An optimal care pathway and toolkit guiding clinicians to use EEN in adults with active CD was developed (Figure 1.). Six key consensus statements outline a practical therapeutic approach. These key statements identify clinical indications for use, nutrition assessment and prescription, duration of therapy, monitoring criteria, food re-introduction, and the role of partial EEN. An accompanying patient resource was also developed.

Conclusion: EEN is recommended as a treatment option for inducing remission in adults with active CD. The optimal care pathway, toolkit, and patient resource are designed as standalone resources or to be used to advocate for site-specific protocols to support standardised approach to delivering EEN therapy.

### Faecal microbiota transplantation with dietary therapy for acute ulcerative colitis

Mrs Alice Day<sup>1,2</sup>, R Bryant<sup>1</sup>, CK Yao<sup>3</sup>, S Costello<sup>1</sup>

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Session One | Oral Presentations, October 14, 2021, 14:00 - 15:20

#### Biography:

Alice is a Senior Research Dietitian at The Queen Elizabeth Hospital and PhD Candidate at The University of Adelaide. Alice completed her Dietetics degree with first class honours in the UK before returning to Adelaide in 2009 to continue working as a clinical dietitian predominantly within gastroenterology, surgical, and critical care services. Alice's interest in gut nutrition research started with an honours project investigating the nutritional impact of nocturnal fasting in chronic liver disease and continued to develop through her work with patients. Alice is currently undertaking PhD in diet and inflammatory bowel disease and is the primary investigator on a pilot dietary intervention study for people with ulcerative colitis, in collaboration with SA Health IBD Services and Monash University in Victoria. Alice is an active member of SA Gastroenterology Dietitians Network, Dietitians Crohns and Colitis Network Australia, and Australasian Society of Parenteral and Enteral Nutrition.

Up to a quarter of patients with ulcerative colitis (UC) will develop acute severe ulcerative colitis (ASUC). Long-term colectomy rates remain high (>50% at 3 years). Faecal microbiota transplant (FMT) is not yet routinely used to treat UC. Alterations colonic metabolism may contribute to UC pathogenesis. This case study explores FMT with a dietary strategy as a new treatment for ASUC.

A 19-year-old man presents with ASUC meeting Truelove and Witt's criteria, and day 3 oxford criteria (>8 stools per day). He declined colectomy. Donor FMT with dietary prescription as salvage therapy was offered. Severe colitis (Mayo-3) to the descending colon was noted at colonoscopy. FMT was delivered to the cecum. A nutritionally replete dietary prescription (Figure 1.) was commenced. Comprehensive dietary education was provided. Repeat FMT was given via enema on days 3 and 7.

The patient improved rapidly; stool frequency reduced to 2-3 motions per day without blood after 2 days. At week 4, the patient was opening his bowels every second day. Flexible sigmoidoscopy demonstrated Mayo-1 colitis. At week 8, endoscopic (Mayo-0) and histological remission (absence of neutrophilic infiltrate) was seen. Dietary compliance over the 8-week period was excellent (per weighed food diaries). He remained in clinical remission at 6 months (faecal calprotectin  $4 \mu g/g$ ).

The prompt and durable efficacy of FMT as salvage therapy for ASUC may have been augmented by prescription of different dietary substrate and alterations in metabolic capacity of the microbiome. Further trials are warranted to explore this ASUC treatment option.

### Health-related quality of life improves over the duration of rehabilitation in the home services

Mr Shelley Fulton<sup>1</sup>, P Dunk<sup>1</sup>, K Stiller<sup>2</sup>

 $^{1}$ Rehabilitation in the Home, CALHN, SA Health, , ,  $^{2}$ Allied Health Research Coordinator, CALHN, SA Health , ,

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#### Biography:

Shelley is a Senior Occupational Therapist with the CALHN Rehabilitation in the Home (RITH) and Day Rehabilitation Service (DRS). Prior to working within CALHN, Shelley worked across community rehabilitation settings in Victoria, New South Wales and the United Kingdom. Shelley's clinical areas of interest include rehabilitation with neurological and amputee clients, within community settings. Shelley is passionate about clinician-led research.

Background and aims: Home-based rehabilitation services are increasingly offered as an alternative to traditional inpatient rehabilitation. There appears to be little research evaluating the effectiveness of home-based rehabilitation services on health-related quality of life (HRQOL). This study investigates if HRQOL improved over the period of time rehabilitation in the home (RITH) services were provided. Methods: A prospective observational study was undertaken whereby HRQOL was completed by participants, using the EQ-5D-5L, at the start and completion of RITH services. The service was provided to 121 patients with neurological, orthopaedic or reconditioning/restorative diagnoses for a median (IQR) of 17 (14-21) days.

Results: All five domains of the EQ-5D-5L significantly decreased and the index value significantly increased over the course of the RITH program ( $p \le 0.002$ ), indicative of an improvement in HRQOL. The EQ-VAS score significantly increased over time (p = 0.000), reflecting an improvement in self-rated health. No clear participant characteristics influencing HRQOL were identified.

Conclusions: Despite the relatively short amount of time receiving RITH services, HRQOL significantly improved from start to completion of RITH. This may reflect natural recovery and/or the effect of the RITH interventions. HRQOL measures, such as the EQ-5D-5L, may be useful for evaluating the effect of RITH and other home-based rehabilitation services.

# Supporting the schooling of children with cancer: Families' perspectives of the Women's & Children's Hospital (WCH) Oncology Education Programme.

<u>Dr Anne Gannoni</u><sup>1</sup>, S Delloso<sup>2</sup>, K Fernandez<sup>1</sup>, A James<sup>1</sup>, R Roberts<sup>2</sup> <sup>1</sup>Women's & Children's Hospital Network, SA Health, , , <sup>2</sup>University of Adelaide, ,

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#### Biography:

Anne Gannoni is Principal Lead for Psychology, Child & Adolescent Mental Health Service, WCHN and also works in the area of chronic illness and injury in the Department of Psychological Medicine, WCH.

Anne's PhD thesis, which was awarded in 2003 from Flinders University, focused on children's adjustment to chronic illness. Anne is a member of the Clinical Colleges of both the Australian Psychological Society and the British Psychological Society.

Background and aims: Following on from an earlier study by Roberts et al (2014) which found that a significant proportion of children treated for cancer at the WCH had repeated a school grade, the WCH's Oncology Education Programme was developed to prioritise schooling during treatment, facilitate school engagement, and promote positive academic and social outcomes. In this presentation, the WCH's Oncology Education Programme's service delivery components will be described and the outcome of a recently completed qualitative study exploring parents' perceptions of the Programme, including its delivery, impact and gaps will be reported.

Methods: Eligibility criteria for this qualitative study included parents whose child was of kindergarten or school age during treatment (3-18 years), had undergone treatment for any type of cancer at the WCH from May 2015—March 2018, and was currently in the 'maintenance' phase of treatment, or had completed treatment. Nine parents and two children participated in an interview about their experiences of the Programme and sixteen families completed a survey.

Results: Six major themes were identified including experiences with the Programme's components, communication, burden of responsibility and perceived impacts of cancer on schooling. As a result of the study, quality improvements are currently being developed and incorporated into the Programme. Conclusions: Although recommendations to support the schooling of children with cancer exist, few hospital-based interventions have been described in the literature, especially in an Australian context. Therefore, limited evidence is available to guide clinical practice. This study provides an example of WCH's approach to supporting the schooling of children with cancer and dissemination of the study's findings are under consideration.

### Measuring and Building Research Capacity and Culture - NALHN

#### Prof. Stacey George

Session One | Oral Presentations, October 14, 2021, 14:00 - 15:20

#### Biography:

Professor George has over 30 years of clinical experience as an occupational therapist working in acute, inpatient and community rehabilitation for people with neurological conditions and older people in Australia, the United Kingdom and Brunei. She is an experienced occupational therapy and allied health researcher, completing her PhD in 2008, in the evaluation of interventions to improve participation in the real world setting. She has coordinated randomised controlled trials evaluating the effectiveness of rehabilitation targeting vision, driving and community participation, involving government and non government sectors. She has an interest in the development, implementation and evaluation of allied health models of care. Stacey is the Allied Health Research Chair in the Northern Adelaide Local Health Network.

Background: Benefits of Allied Health Professionals (AHP) engaging in research include improved efficiencies in service delivery and patient outcomes, as well as skill development and career advancement. Building AHP capacity to undertake research is of international priority. Evidence informed approaches to build research capacity in AH practice are required.

Objectives: To explore the research capacity and culture of allied health in the acute division, Northern Adelaide Local Health Network.

Methods: A mixed methods approach included: qualitative semi-structured interviews (n = 17) and focus groups (n = 2); and a research capacity and culture survey (RCCT) (n = 109) to measure research capacity at individual, team and organisational levels.

Results: Key themes identified included (1) a developing research culture; (2) research valued for service/staff development; (3) research needs to be rebranded; and (4) recommendations for future change. Organisational level strategies to increase research capacity and culture include dissemination of research findings, access to research software and consumer involvement.

Conclusions: Findings illustrate a research culture that is developing within AHP at NALHN. Despite a sense of 'not knowing where to begin', participants reported valuing research and shared recommendations for improving culture and capacity. These findings will inform a future intervention to build research capacity within the NALHN Allied Health division.

# Intern Pharmacist Participation in Consultant Ward Rounds: A Pilot Study on Interprofessional Practice

Wala Hamid Haj Ali<sup>3</sup>, J Thomas<sup>1</sup>, C Earley<sup>3</sup>, S Marotti<sup>3</sup>, D Rowett<sup>2,3</sup>

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#### Biography:

Wala Hamid Haj Ali commenced as a newly registered pharmacist within CALHN this year after completing her internship with SA Pharmacy in CALHN in 2019. Prior to that she worked in community pharmacy while she completed her Bachelor of Pharmacy (Honours) at the University of South Australia. During her internship year, Wala took part in a SA Pharmacy research project involving development and evaluation of an illustrated medicines list as a patient education tool for Indigenous Australians and presented her research at the 2019 National Medicines Management Conference. In 2018 she completed her Honours research project assessing patterns of opioid and concurrent psychotropic medication prescription in a work-injured population and was awarded The Pharmaceutical Society of Australia Gold Medal for highest GPA in the Bachelor of Pharmacy (Honours). Wala looks forward to a continued career in pharmacy, contributing to the quality use of medicines.

Background: Conventional clinical pharmacy services often involve a ward pharmacist identifying and communicating medication related issues to the medical team. However, the current lack of presence of a pharmacist on ward rounds, often due to time constraints, in many cases results in significant delays in addressing medication-related issues.

Aim: To evaluate the perceived impact of an intern pharmacist's participation in consultant ward rounds as a new model for interdisciplinary collaboration and patient care.

Methods: For a two-week period, an intern pharmacist attended consultant ward rounds as part of the General Medicine team at the Royal Adelaide Hospital. Duties on ward rounds involved documenting and reconciling medication histories, clinical review, discharge facilitation and patient counselling. Qualitative feedback was obtained through both face –face interview at the conclusion of the pilot, written reflections from the intern pharmacist prior and post rotation as well through completion of surveys using the 'Interdisciplinary Education Perception Scale' pre and post the pilot period by both the intern pharmacist and General Medicine team.

Results: Comparisons between pre and post survey evaluations indicated notable improvements in perceived areas of understanding and appreciation of interdisciplinary roles. Furthermore, the presence of the intern pharmacist at the point of prescribing allowed for more efficient communication and streamlined resolution of medication related issues and faster discharge facilitation.

Conclusions: The presence of an Intern pharmacist during consultant ward rounds, may offer an effective model for not only increased interdisciplinary collaboration, but enhanced opportunities for improved patient care through timely optimisation of medication management.

### Dialectical Behaviour Therapy: changing lives and saving resources

<u>Sharon Heerebrand<sup>2</sup>, Ms Jemma Bray<sup>1</sup></u>, R Roberts<sup>2</sup>, C Ulbrich<sup>1</sup>, S Edwards<sup>2</sup> <sup>1</sup>Eastern Community Mental Health, CALHN, SA Health, , , <sup>2</sup>Adelaide University, ,

Session One | Oral Presentations, October 14, 2021, 14:00 - 15:20

#### Biography:

Sharon Heerebrand is a Clinically Endorsed Psychologist in Southern Adelaide Local Health Network (SALHN), specialising in comorbid Drug and Alcohol Use and Mental illness. Sharon is currently employed as a Clinical Psychologist at Drug and Alcohol Services of South Australia. Sharon has previously worked in both inpatient and community Mental Health settings providing both individual and group interventions to people with chronic and severe mental health diagnoses. Sharon completed her Masters in Clinical Psychology at the University of Adelaide where she completed a thesis titled "Effectiveness of brief dialectical behaviour therapy skills training for borderline personality disorder" which analysed 6.5 years of retrospective data collected by the Eastern Community Mental Health service's DBT Skills Training program. Sharon is interested in working with people with complex mental health presentations, including consumers with personality disorder diagnoses. Sharon has been published in the area of DBT and maintains a strong interest in ongoing research.

Jemma Bray is a Clinically Endorsed Psychologist and Board Approved Supervisor in Central Adelaide Local Health Network (CALHN), specializing in the area of Mental Health. Jemma is a Senior Clinical Psychologist in Community Mental Health and the inaugural CALHN Dialectical Behaviour Therapy (DBT) Coordinator. Jemma has many years' experience working with people with chronic and complex mental illness in Community Mental Health and Acute Inpatient settings. Jemma is passionate about working with people with Borderline Personality Disorder and is a comprehensively trained DBT therapist with several years of experience providing group and individual therapy to this high risk population. Jemma has been actively involved with quality improvement activities in CALHN and provides education to SA Health staff to further their learning and development. Jemma has been published in the areas of trauma and DBT plus is involved with ongoing research of Community Mental Health psychological practice including the DBT Program.

Objective: Borderline Personality Disorder (BPD) is a significant mental illness, associated with an increased risk of self-harming and suicidal behaviours. The prevalence of BPD in mental health settings is up to 23% in outpatient settings, and 43% in inpatient settings. The standard application of Dialectical Behavior Therapy (DBT) for the treatment of BPD has substantial evidence demonstrating efficacy. However, this treatment option is limited within SA Health. This study aimed to evaluate the effectiveness of an established, shorter and more available intervention, DBT skills training group (DBT-ST), in a publicly-funded community mental health setting.

Method: Participants (114 people with BPD) attended an 18-20 week DBT-ST in a community mental health setting between 2010 and 2016. The study utilised a quasi-experimental design with a within-persons waitlist control group. Primary outcomes were: BPD symptoms, general psychological distress, depression, and rate of Emergency Department (ED) presentations and psychiatric inpatient bed-days.

Results: Participants showed a clinically significant reduction in BPD symptoms, general psychological distress and depression. The waitlist control group showed no significant improvement in BPD symptoms. The rate of ED presentations was significantly reduced by approximately 50%. There was an emerging trend for a reduction in psychiatric inpatient bed-days however there was insufficient power to assess this.

Conclusion: Participation in DBT-ST has been shown to be an effective and accessible treatment for people with BPD, which can be life changing. Additionally, given the prevalence of BPD, DBT-ST can create substantial cost saving for SA Health as DBT-ST participants have decreased contacts with ED.

### REDUCE: Reducing Delirium with the 'Eat Walk Engage' program

<u>Dr Sarah Hunter</u><sup>1</sup>, Jo Nolan<sup>2</sup>, Tiffany Conroy<sup>1</sup>, Rebecca Feo<sup>1</sup>, Alison Kitson<sup>1</sup>, Alison Mudge<sup>3</sup>, Prue McRae<sup>3</sup>, Samantha Kruger<sup>4</sup>

<sup>1</sup>Caring Futures Institute, Flinders University, , , <sup>2</sup>Physiotherapy Dept, Flinders Medical Centre, SALHN, SA Health, , , <sup>3</sup>Royal Brisbane & Women's Hospital, , , <sup>4</sup>Flinders Medical Centre, SALHN, SA Health, ,

Session Five | Oral Presentations, October 15, 2021, 14:00 - 15:20

#### Biography:

Sarah Hunter is a post-doctoral research fellow in the College of Nursing and Health Sciences and the Caring Futures Institute, Flinders University. Sarah's background is in Psychology and her research pertains to Knowledge Translation and Implementation Science. She focuses on the various ways in which we can take research findings and successfully implement them into clinical practice. She is passionate about working alongside clinicians and teams to tailor high quality evidence to suit their practice needs. Sarah currently works across a variety of projects within SALHN, SA Health focusing on implementing evidence to address hospital acquired complications.

Delirium is a serious condition, and common hospital complication, which increases risk of falls, mortality and future dementia. Further, delirium increases length of stay and requirement for higher level accommodation on discharge, with consequent impacts on hospital flow. Delirium is also distressing to patients, families and staff. Within SALHN, delirium is the third highest hospital acquired complication (HAC). This project aims to impact on the prevention and management of delirium by translating existing evidence into practice at Flinders Medical Centre. Specifically, we are introducing the evidence-based Eat Walk Engage model of care, to reduce delirium and enhance functional recovery in older inpatients. The Eat Walk Engage model is an innovative model of care that involves implementing a 'package' of evidencebased clinical intervention activities, tailored to patient needs and local ward resources, and works with key stakeholders throughout the process to improve nutrition and hydration, mobility and cognitive stimulation for older adults. Eat Walk Engage uses the integrated Promoting Action on Research Implementation in Health Services (i-PARIHS) framework as a structured, evidence-based method of implementing complex change. Eat Walk Engage implementation outcomes (acceptability and appropriateness, adoption and fidelity and normalization), clinical outcomes (acute length of stay, delirium related readmissions) and adherence to delirium clinical care standards will be measured. This project will impact on understandings of the mechanisms required to effectively implement the Eat Walk Engage program, to ensure its successful adaptation and long-term sustainability in new contexts. These results will assist both the hospital and the wider health system in their objectives to improve the care of older adults.

# A 2-year retrospective review of opioid patch-related incident reports across South Australian hospitals: Identification of targets for improving patient safety

<u>Dr Jacinta Johnson<sup>1,2</sup></u>, A Eitel<sup>1</sup>, H Forbes<sup>2</sup>, M Atkinson<sup>3</sup>, L Spurling<sup>3</sup>

 $^1$ School of Pharmacy & Medical Sciences, University of South Australia, , ,  $^2$ SA Pharmacy, SALHN, SA Health, , ,  $^3$ Dept of Anaesthesia, SALHN, SA Health, , ,  $^4$ Division of Nursing, SALHN, SA Health, ,

ePoster

#### Biography:

Dr Jacinta Johnson is a pharmacist teacher-practitioner, currently sharing her time between roles a Lecturer in Pharmacy at the University of South Australia and Senior Pharmacist — Research, within the SA Pharmacy state-wide support service. Within her SA Health role Jacinta is the Executive Officer for the SA Pharmacy Research Leadership Group. In addition, Jacinta is the Vice President of the Society of Hospital Pharmacists of Australia (SHPA), Chairs the SHPA National Residency Advisory Committee and sits on the SHPA Research Specialty Practice Group Leadership Committee.

Background: Opioid patches provide non-invasive, continuous delivery of analgesia. Despite their advantages, they come with unique risks and potential for harm. Little is known about the specific incidents occurring related to opioid-patches in hospitalised patients.

Aim: To characterise locally occurring inpatient opioid patch-related incidents to identify targets for quality improvement.

Method: A retrospective review of opioid patch-related incidents reported via the incident reporting system in three public hospitals between 01-04-2016 and 30-06-2018 was conducted. Incidents were categorised by incident type and where in the medication management process the incident originated. Severity of incident outcome was rated using the National Coordinating Council for Medication Error Reporting and Prevention Medication Error Index. Results were summarised using quantitative descriptive statistics. Results: Forty-seven opioid patch-related incident reports describing 55 discrete incidents were retrieved; 53% pertained to buprenorphine and 47% to fentanyl. Incidents most frequently occurred during the administration phase (56%), followed by the prescribing phase (16%). Most incidents reached the patient (82%), and of these, patient harm was reported in 9% of cases.

'Failure to remove' a patch was the most frequently reported single incident type (23% of incidents). However, when pooled, incidents related to omitted analgesia (including 'displaced' and 'inappropriately removed' patches, and patches 'charted but not applied' or 'not charted'), comprised the greatest proportion of incidents (27%). More than 75% of displaced patches were never recovered. Conclusion: Many opportunities for pharmacists to promote safe and appropriate opioid-patch use exist. These results will guide development of strategies to optimise safe patch use.

### Determination of energy requirements following application of a biodegradable dermal matrix after severe burn injury: a pilot study

#### Mrs Rochelle Kurmis

Session Two | Collaborative Grants Presenters, October 14, 2021, 15:30 - 15:55

#### Biography:

Rochelle commenced as Allied Health Project Manager for the Adult Burns Service at the Royal Adelaide Hospital (RAH), in 2010. This position oversees allied health research and development activities as well as quality assurance and improvement activities for the overall Adult Burns Service. Rochelle is current co-chair of the Joanna Briggs Institute (JBI) Burns Node, steering committee and reference committee member for the Burns Registry for Australia and New Zealand (BRANZ) and Burns Quality Improvement Program (BQIP) subcommittee member. Rochelle completed a Master's in Clinical Science through the University of Adelaide in 2015.

Prior to her current position, Rochelle was a Clinical Dietitian at the RAH from 2004 covering various services and positions. Throughout her career, she has contributed to numerous quality assurance activities, including participation in local, state, and national evidence based guideline development projects, published numerous peer reviewed articles, and co-editor of the ANZBA Burns Trauma Rehabilitation Guidelines.

Background: Major burn injuries cause a hypermetabolic state that is proportionate to the severity of the injury. Nutrition management guidelines for major burn injuries recommend using Indirect calorimetry (IC) as the 'gold standard' for measuring energy expenditure in major burn injuries. Biodegradable temporising matrix (BTM) is a synthetic dermal substitute used to temporise wounds prior to subsequent definitive split thickness skin grafting (STSG) in full thickness burns. This study aimed to examine the effect BTM has on energy expenditure via IC in major burns.

Methods: A prospective pilot study was conducted, measuring energy expenditure in nine major burns with >20% TBSA that received BTM as a part of their surgical burns management over a one year period (July 2020-July 2021). IC was conducted within 24 hours pre- and post-BTM application, pre- and post-definitive STSG and weekly throughout their hospital admission. Measured energy expenditure (MEE) was compared to three commonly used predictive equations – the Toronto, modified Schofield and ratio method (30-40kcal/kg/day).

Results: Mean age and burn injury size were 48(±22) years and 41(±20)% total body area. Conclusions: Preliminary data indicates that BTM may attenuate the hypermetabolic response for energy expenditure following major burn injury. Equations were not accurate in predicting energy expenditure, grossly overestimating energy requirements in the acute recovery phase. This highlights the necessity for routine IC in clinical practice. A larger prospective comparative study is warranted to determine the effect of BTM on energy requirements and the metabolic response in major burn injuries.

# Delivering an evidence based dyadic intervention for people with dementia using telehealth

Associate Professor Kate Laver<sup>1</sup>, M Crotty<sup>1,2</sup>, L Clemson<sup>3</sup>

<sup>1</sup>Flinders University, South Australia, , , <sup>2</sup>Southern Adelaide LHN, SA Health, , , <sup>3</sup>University of Sydney, ,

Session One | Oral Presentations, October 14, 2021, 14:00 - 15:20

#### Biography:

Associate Professor Laver has over 15 years of clinical experience as an occupational therapist (2003 onwards) working in rehabilitation with people with dementia or stroke. Most of her clinical career was spent working at the Flinders Medical Centre and Repatriation General Hospital. After completing a PhD in 2012 she has research experience in testing rehabilitation interventions (in the fields of dementia and stroke) and other nonpharmacological therapy approaches. She has in interest in the use of innovative technologies in rehabilitation authoring Cochrane Reviews in this area. She has expertise in knowledge translation and leads national research projects aiming to close the gap between research and practice.

Background: People with dementia and their families have called for programs that involve carers and focus on promoting independence. Such programs have been shown to be effective in improving outcomes for both the person with dementia and their family. However, most programs tested to date have involved multiple home visits and are challenging to implement.

Objectives: This project aimed to determine whether telehealth delivery was non-inferior to conventional face-to-face delivery of the same dyadic dementia care program.

Methods: We conducted a randomised controlled trial to determine whether telehealth delivery was non-inferior to conventional home visits. People in the telehealth group received two home visits and up to eight consultations using videoconferencing software and tablet devices.

Results: 63 dyads were recruited. Outcomes were similar between groups suggesting that telehealth was non-inferior. The average travel time was significantly less in the telehealth group. Many families participating in the telehealth arm of the study already owned devices and use of the technology deterred few participants.

Conclusions: It was possible to provide multiple consultations using telehealth technologies without compromising core principles of the treatment program and while achieving similar outcomes. Telehealth delivery reduced travel time and the cost of program delivery.

## Demonstrating the impact of rehabilitation and recovery orientation service

#### Adrian Leet, Shaun Dennis

Session Six | Collaborative Grants Presenters, October 15, 2021, 15:30 - 15:50

#### Biography:

Mr Adrian Leet works for Rural and Remote Mental Health Service, Barossa, Hills, Fleurieu LHN, as the Advanced Clinical Lead for Occupational Therapy. Adrian has over 20 years of clinical and leadership experience across mental health services and has a strong passion for recovery orientated outcomes for country consumers.

Mr Shaun Dennis works for Flinders & Upper North LHN, as the Clinical Senior Occupational Therapist and also works with the Department of Rural Health, University of South Australia as an Occupational Therapy Academic. Shaun trained in the UK and holds a MSc Occupational Therapy and a BSc Psychology.

As part of significant mental health reform, the Saltbush Community Mental Health Rehabilitation Service (Saltbush CMHRS) was implemented in Whyalla in July 2014. Saltbush CMHRS is a 10-bed mental health residential program offering rehabilitative mental health support to rural residents to aid recovery. This research project analysed the service delivery model and its impact on recovery outcomes for consumers.

# Utilising students to generate evidence in practice & support research capacity

Mrs Sallly Marotti<sup>1</sup>, M Ward<sup>2</sup>, D Rowett<sup>2</sup>

<sup>1</sup>SA Pharmacy, SA Health, , , <sup>2</sup>University of South Australia, ,

Session One | Oral Presentations, October 14, 2021, 14:00 - 15:20

#### Biography:

Sally Marotti is the Lead Pharmacist for Experiential Learning, Training and Research for SA Pharmacy where she provides guidance and leadership to develop research capacity and capability in the pharmacy workforce. Her research interests include perioperative medicine, pharmacy practice, coagulation and workplace education. Sally completed her undergraduate pharmacy degree at the University of South Australia, Masters at The University of Queensland, is a fellow of the Society of Hospital Pharmacists and a credentialed Advanced Practice Pharmacist.

Each year between 120 and 150 UniSA fourth year pharmacy students participate in an SA Pharmacy Experiential Learning experience as part of their undergraduate program. Since 2018 we have designed research projects to complement their experiential learning, which has enabled generation of evidence to support quality practice, and clinician research skills development.

In 2018 we undertook our first statewide student project evaluating the provision of opioids on discharge to opioid naïve patients. This retrospective multi-centre study was undertaken across all rural and metropolitan sites. Having learnt a lot about the limitations of involving a large cohort of students to collect data with varying degrees of engagement from pharmacist preceptors we proceeded to repeat the study in 2019. With the use of behaviour change techniques such as Educational Visiting, utilising site leads as well as articulation of a clear research question, we developed a program to encourage preceptor engagement and learning through participation in the 2019 opioid project.

An expression of interest for development of our 2020 student experiential learning project resulted in the development of a mixed methods research project evaluating patient engagement in decision making to commence new medicines. This project will allow all students and their preceptors to participate in a research project utilising randomisation, patient consent and both quantitative and qualitative research methodologies, with the aim to increase student and preceptor skill development, as well as answering an important research question. This program will be supported through a site led, educational visiting program supporting preceptor engagement in the mixed methods research.

### A partnership exploration of Allied Health Rural Generalist Pathway outcomes

Jodie May, J O'Connor<sup>1</sup>, S Poklar<sup>1</sup>

<sup>1</sup>Rural Support Service, Barossa Hills Fleurieu LHN, SA Health, ,

Session Five | Oral Presentations, October 15, 2021, 14:00 - 15:20

#### Biography:

Jodie May commenced in the role of project manager, Allied Health Rural Generalist Pathway with the Rural Support Service in March 2019. Jodie has worked in rural SA Health locations since 2004, including 14 years in clinical and senior Dietetics roles, and two years as a project manager supporting regional LHN quality and safety initiatives in the areas of malnutrition, falls and pressure injury. Jodie capitalises on her own lived experience of working as a new graduate in rural SA, and her experiences of working with other AHPs starting their career in rural practice, to support the regional LHN trainees enrolled in the pathway. In her role coordinating the implementation of the Allied Health Rural Generalist Pathway, Jodie found herself in the world of research while seeking data able to provide evidence of outcomes achieved for rural SA trainees.

There are many challenges in recruiting, training, developing and retaining allied health professionals (AHPs) in rural/remote areas of South Australia (SA). The Allied Health Rural Generalist Pathway (AHRGP) is a workforce initiative that supports the development of rural generalist specialist skills in early-career AHPs, to better meet the needs of consumers and improve workforce retention in rural areas. In 2019 SA Health introduced the AHRGP in regional LHNs for the first time.

A research partnership undertaken with a Flinders University PhD student will enable a formal evaluation of the effectiveness, appropriateness, suitability and success of the program, and an exploration of rural and remote allied health workforce challenges and opportunities that exist in SA. This evaluation will be completed in phases over the duration of the 1-3 year training pathway, with the first phase completed in December 2019.

The first evaluation phase explored the intentions and early experiences of the initial 13 AHRGP trainees, their line managers, clinical supervisors, profession leads and consumer representatives. It also describes program costs, SA rural AHP workforce statistics, participant demographics, and competence and confidence ratings of trainees and their supervisors and managers.

This research collaboration has required a process of ongoing navigation and action learning. It has resulted in outputs that are valuable to the future implementation of the AHRGP, and increases our understanding of SA-specific rural and remote AHP workforce challenges. We expect future evaluation phases will expand on these themes, with outputs able to inform future rural AHP workforce research and strategies.

### NALHN Pilot 12-Week Group Program for People with Borderline Personality Disorder

#### Frances Nettle<sup>1</sup>

<sup>1</sup>Northern Community Mental Health, NALHN, SA Health,,

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#### Biography:

Frances is a Senior Clinical Psychologist at Northern Community Mental Health, NALHN. Frances has worked in community mental health settings for the past 7 years, during which time she has specialised in working with people with Borderline Personality Disorder (BPD). As part of her role, she co-ordinates the Dialectical Behaviour Therapy program in NALHN and has recently been involved with development of a stepped Model of Care for people with BPD. Frances brings a warm, empathetic and expert approach to working with highly complex BPD presentations. She is passionate about supporting the growth and development of new and emerging clinicians with a specialised interest in BPD.

Background and aims: The NALHN Borderline Personality Disorder Service Plan (June 2019) proposed a stepped model of care (MOC) in Community Mental Health. The goal of this project was to evaluate a 12-week group program for people with BPD ("12-Week BPD Group"), which forms step two of the MOC. Depending on outcomes of the evaluation, it was anticipated this program may be rolled out to both NALHN mental health sites as part of the stepped MOC.

Methods: 7 participants with BPD were assessed as suitable and offered a place in the 12-Week BPD Group. Participants were recruited from people who had been referred to the DBT Skills Group living in the NALHN catchment area. Participants were aged 21-58 years, 6 female and 1 male. People with active psychotic symptoms, significant antisocial traits, or cognitive impairment were not included. Evaluation was based on clinical outcome measures (K10, Borderline Symptom List 23, BSL – Supplement: Items for Assessing Behaviour, Emotion Regulation Scale – 18, WHO Quality of Life-BREF), client feedback, and clinician feedback. Qualitative feedback was collated and descriptive statistics were used to summarise the evaluation data.

Results: On average there were no significant differences on the clinical outcome measures. Qualitative feedback was centred on the value of supportive peer interactions, criticism of group structure; expectations as a barrier; limited uptake of skills and insufficient behavioural change.

Conclusions: Outcomes of this study will be used to inform and implement the stepped MOC.

Communication with clients will be key in managing expectations of care.

# Providing multidisciplinary pain management to regional South Australia: establishing a timely and cost-effective model of service delivery

#### Mr Joseph Orlando

Session Two | Collaborative Grants Presenters, October 14, 2021, 15:30 - 15:55

#### Biography:

Joseph Orlando is a Senior Physiotherapist in the CALHN and works across the Pain Management Unit, Spinal Assessment Clinics and the Emergency Department of the Royal Adelaide Hospital. He has undertaken postgraduate qualifications in musculoskeletal physiotherapy and has published research on topics related to telehealth and low back pain.

Background: Consumers living in regional South Australia have traditionally travelled to Adelaide to access tertiary-level pain management services. SA Health recently invested in the delivery of multidisciplinary outreach pain services as part of a state-wide model of care to address the inequities in access. Process: The CALHN Pain Management Unit commenced a two-day, monthly multidisciplinary outreach service at Whyalla Hospital in May 2018. Telehealth is utilised to augment care between site visits. Pain questionnaires as part of the electronic Persistent Pain Outcome Collaboration (ePPOC) are recorded at referral and at end of episode, as well as health literacy and patient engagement scores. Analysis: Over 18 months, 125 patients received input through the outreach service. There were 325 occasions of service. Pain questionnaires at end of episode were completed by 62 patients and illustrated improvements in psychosocial measures, such as DASS-21 depression and pain self-efficacy. Health literacy scoring was marginal/limited (53%) and engagement was low (46%). Staff travel costs to Whyalla totalled \$42,000; avoided patient travel reimbursements to Adelaide totalled \$54,000. Outcomes: The CALHN Pain Management Unit improved access to pain management services in regional South Australia whilst simultaneously reduced the economic burden of providing this service. Two additional outreach sites have since been established in Port Pirie and Port Lincoln. The challenges in this patient population include high levels of pain interference; high levels of psychosocial distress; and low levels of consumer health literacy and engagement. Providing pain management into regional areas remains an area for continued service improvement.

# Stakeholders' perceptions, expectations and experiences of a statewide Australian hospital pharmacist foundation residency program: A qualitative descriptive study

Ms Yu Ting Sim

Session Six | Collaborative Grants Presenters, October 15, 2021, 15:30 - 15:50

#### Biography:

Yu Ting Sim is a Senior Pharmacist for SA Pharmacy, coordinating education and training for the Central Adelaide Local Health Network pharmacy department. She is currently the chair of the SA Pharmacy Residency Leadership Committee and is a UNISA Masters by Research (HDR) candidate.

#### Background & Aim:

Practice-integrated education and professional development programs, or also known as residencies, have been available to pharmacists in America and United Kingdom for many years. In 2016, the Society of Hospital Pharmacists Australia launched Australia's novel Foundation Residency Program to support the critical development of early-career pharmacists (ECP), and has been implemented across many hospital sites nationally. This program model was adopted by the South Australian public hospital pharmacy statewide service and was granted full accreditation.

#### Action:

This study aimed to explore the perspectives of key stakeholders involved in making decisions about the focus and future of the program. Purposeful sampling was adopted to intentionally recruit participants who oversee preceptors and residents, across all hierarchy levels and multi-site pharmacy services. Across June and July 2020, the stakeholders were invited to participate in individual semi-structured interviews conducted by an impartial external interviewer. The interview guide developed was informed by findings of prior resident and preceptor survey and was pilot-tested. Each interview was audio-recorded and transcribed verbatim. The transcribed dataset was managed using NVivo softwareTM (version 10) and analysed using reflexive thematic analysis.

#### **Evaluation:**

Thirty-three out of thirty-five staff consented to participate. Participants were recruited across all the statewide local health networks and service areas, and were de-identified with a randomly assigned code number. An iterative data analysis process identified five key themes; alignment of program goals and visions, culture shift to prioritising workforce development as core business, program structure supports focused workforce development, adoption and implementation experiences and motivations, perceptions of outcomes and influencing complexities.

#### Discussion

The interviews identified general views that the residency benefitted the development of the residents, preceptors and the entire workforce. The multisite structure was seen as strength of the program. Whilst it was acknowledged that the rotations, cross-site rotations and research project presented challenges, they were deemed worth the investment. Overall, it was felt that incremental increases in program capacity will occur over time, as culture changes, and this becomes core business. Findings provided important insights into current enablers and barriers to program expansion. Several key recommendations include maintaining an optional selection process, outlining a pre-requisite transition to hospital pharmacy training, clarifying that the aim is to support ECP development rather than to achieve a defined level of performance and focusing on preceptor development to increase capacity.

# Effects of standard versus energy dense feeds on gastric retention, calorie delivery, and glycaemia in critically ill patients

<u>Matthew Summers<sup>1,2</sup></u>, LS Chapple<sup>1,2</sup>, L Weinel<sup>1,2</sup>, Y Ali Abdelhamid<sup>1,3</sup>, P Kar<sup>1</sup>, D Calnan<sup>4</sup>, S Hatzinikolas<sup>5</sup>, K Lange<sup>5</sup>, A Poole<sup>1</sup>, S O'Connor<sup>2</sup>, KL Jones<sup>5</sup>, A Deane<sup>3,5</sup>, M Chapman<sup>1,2</sup>

<sup>1</sup>Discipline of Acute Care Medicine, University of Adelaide, , , <sup>2</sup>Intensive Care Unit, Royal Adelaide Hospital, CALHN, SA Health, , , <sup>3</sup>Intensive Care Unit, The Royal Melbourne Hospital, Victoria, , , <sup>4</sup>Nuclear Medicine, Royal Adelaide Hospital, CALHN, SA Health, , , <sup>5</sup>Discipline of Medicine, University of Adelaide, ,

ePoster

#### Biography:

Matt is a Research Dietitian who has been working within the ICU Research team for over 10 years. Matt completed his undergraduate Bachelor of Science majoring in nutrition in 2007 and commenced a Research Scientist role within ICU Research shortly thereafter. A few years later Matt undertook a Master of Dietetics, graduating in 2014.

Matt's research interests include nutrient absorption in critically ill patients, as well as nutritional intake and outcomes following ICU stay. In addition to research experience in ICU, Matt has experience as a clinical dietitian in the outpatient setting as well as dietitian experience in the elite team sport environment.

Background: Critically ill patients frequently exhibit delayed gastric emptying and associated feed intolerance, which are frequently managed by the prescription of energy-dense formulae. However, these formulae have a higher lipid content and may delay gastric emptying (GE) further.

Aim: To compare the rate of GE of isocaloric 1 and 2 kcal/ml liquid nutrient boluses in critically ill patients. Methods: A randomised, blinded, cross-over study was performed in mechanically ventilated adults on two consecutive days following a four hour fast. They received an isocaloric, radiolabeled, intragastric bolus of either 200ml of a 1kcal/ml or 100ml of a 2kcal/ml enteral formula. GE was measured using scintigraphy. Total areas under the curve from baseline to 120 minutes (AUC120) were determined for gastric retention and small intestinal calorie delivery. Group differences were compared using a paired mixed effects model. Data are presented as mean ± SE.

Results: Fifteen patients were studied (M:F 11:4; age 55.9  $\pm$  5.9 years). There was no difference in the rate of GE (AUC120: 1 kcal/ml 5640 $\pm$ 524 vs 2 kcal/ml 7009 $\pm$ 745 %.min; p=0.059) or gastric retention at 120 mins (16.8 $\pm$ 3.7 vs 31.4 $\pm$ 9.5; mean difference 14.6 (95% CI -6.2, 35.4); p=0.147). There was no difference in small intestinal calorie delivery (AUC120: 13078 (1048) vs 9527 (1501) kcal; p=0.057) or calorie delivery per unit time (AUC120: 172 $\pm$ 25 vs 153 $\pm$ 26 kcal/min.120min; p=0.513).

Conclusion: In critically ill adults, does not appear to markedly augment calorie delivery to the small intestine.

# Weekly versus fortnightly Allied Health early intervention for children with diagnosed/suspected developmental delay

<u>Nicolette Varvounis</u><sup>1</sup>, <u>J Frost</u><sup>1</sup>, J Stott<sup>1</sup>, E Ward<sup>2</sup>, S Lefmann<sup>2</sup>, T Boyle<sup>2</sup>, K Boshoff<sup>2</sup>

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#### Biography:

Nicolette Varvounis

Nicolette is the Senior Manager of Speech Pathology for the Northern Adelaide Local Health Network which includes leadership of adult and paediatric Speech Pathology services in the acute and community settings. Nicolette has been working as a Speech Pathologist since 2009 with her professional background primarily including broad experience with the adult population presenting with swallowing and communications disorders in the acute setting.

#### Jessica Frost

Jessica is the Allied Health Clinical Educator for the Northern Adelaide Local Health Network, Allied Health Division which involves coordinating, developing and delivering divisional wide education to the allied health professions. Jessica has been working as a Physiotherapist since 2008 with her professional background primarily including broad experience in the adult acute care setting and providing clinical education to Physiotherapy students on placement.

Background and aims: NALHN Children & Families team provides Allied Health assessment and blocks of therapy for children with diagnosed/suspected developmental delays. This study compared the impact of a weekly versus fortnightly therapy model for client attendance rates, clinician caseload management and service efficiency.

Methods: A pre-post group comparison study was conducted between fortnightly intervention over 10 weeks in school term 2 and weekly intervention over 5 weeks in term 3. Pre- and post-intervention data on "did-not-attend" rates and clinical outcome measures (Canadian Occupational Performance Measure—COPM) were compared and open-ended data collected via questionnaires given to clinicians, carers and administrative staff.

Results: A non-statistically significant difference (P>0.05) between fortnightly (n=843) and weekly (n=1117) attendance rates (85.6% vs 84.3%) was recorded. No statistically significant difference between groups (group 1 n=25, group 2 n=29) (p>0.05) was obtained for the COPM pre-intervention versus post-intervention scores. Qualitative responses from parents (n=96) and clinicians (n=34) indicate a variety of preferences for intervention frequency, indicating the impact of individual child and family factors along with clinician workload pressures.

Conclusions: It is recommended that where possible, a flexible model of frequency for service delivery be adopted to suit the needs of children and families, in alignment with clinician clinical reasoning related to the intervention type for each child. Considerations to the decision making around frequency should include: child's condition, type of therapy; relationship building with child and family, family practicalities, vulnerability of the family and benefits of contact time with the service.

# "HPE App": Creating a High Protein and Energy diet app to promote interactive learning for rehabilitation patients.

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<sup>1</sup>Division Rehabilitation, Aged Care and Palliative Care, SALHN, SA Health, ,

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#### Biography:

Natalie Wakeham

Natalie Wakeham is the Acting Director for Dietetics in the Rehabilitation, Aged and Palliative Care Division in SALHN and has significant experience in clinical practice in a rehabilitation setting. She has expertise designing and maintaining therapy interventions and quality initiatives for rehabilitation patients. Natalie is leading her dietetics team to strive to continuously improve the service and innovate in line with evidence based guidelines. She is passionate about interdisciplinary practice and improving the patient's hospital experience and is currently working on several projects in this space.

#### Cassandra Lawless

Cassandra Lawless is an enthusiastic Accredited Practising Dietitian (APD) and author who has worked with rehabilitation clients for the majority of her career. Cassandra uses food science to underpin her practice in helping clients reach their optimum health and has a particular interest in best nutrition to prevent sarcopenia and frailty. She continually strives to modernise health care and has spent the last year working with IT to develop a high energy high protein application. She is also currently undertaking her Honours degree looking at the validity of digitally diagnosing malnutrition.

Background: A paper based pamphlet is the traditional means of delivering generic nutritional information to patients. However, in an increasingly technology driven health environment, a digital application (app) may be an alternative to deliver nutrition information to patients in an interactive way.

Aims: To develop and pilot an app, to allow patients to undertake self-directed or clinician-supported learning on the general principals of a High Protein and Energy (HPE) diet.

Methods: The app content was written by dietitians who are expert in delivering nutrition information to patients; based on evidence and current food and food product knowledge. The app was designed and created by the SALHN Telerehab IT specialist and piloted with consumers and clinicians. The app was continually modified based on feedback regarding readability, ease of use and visual appeal, until it was well accepted by consumers.

Results: Initial data suggests the introduction of a HPE diet app is an effective, enjoyable and engaging way to support patient learning. The app allows patients to complete a pre and post learning quiz, in order to understand baseline knowledge and provide an outcome measure for patients' knowledge gain. The app also includes a survey to gather feedback after each use so, that the platform can continue to be improved. Conclusions: The app has been used successfully in a home rehabilitation setting. Future plans are to explore the use of the app in other settings and to create additional apps covering different nutrition topics.

### A Novel Advanced Scope Physiotherapist Clinic for Rheumatology

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Session One | Oral Presentations, October 14, 2021, 14:00 - 15:20

#### Biography:

Alison is a Senior Physiotherapist currently working at the Royal Adelaide Hospital in advanced scope roles in Rheumatology and Spinal Orthopaedics. She has a Bachelor of Applied Science and a Master of Applied Science in Physiotherapy and a Master of Business Administration. Prior to her current roles, she worked in private practice in Adelaide and Brisbane, as a lecturer and clinical educator on undergraduate and postgraduate programmes at the Universities of South Australia and Queensland, and as the Physiotherapy Head of Department, Royal Darwin Hospital. She has held a range research and project management positions in orthopaedics and rheumatology and was a recipient of a SA Health and UniSA Allied Health Research Collaboration Grant, which helped fund the current project.

Background and aims: The Royal Adelaide Hospital (RAH) physiotherapist-led combined rheumatologist/physiotherapist clinic (CRPC) is a unique model of care where advanced scope physiotherapists work with consultant rheumatologists to provide a single visit, multidisciplinary assessment of patients. The clinic was established to reduce the non-inflammatory burden on rheumatologist-led clinics and to fast-track patients with inflammatory presentations. The aims of this study were to evaluate stakeholder satisfaction and clinical and service outcomes.

Methods: Patient and referring doctor surveys were administered and patient reported outcome measures collected. Wait times, discharge rates and costs were compared with a general rheumatology assessment clinic (GRAC)

Results: 102 patients were included (mean age 49 years). The majority were female, overweight and underactive and 94% had chronic pain (> 3 months).

The overall mean wait time was 3.3 months (vs 3 months for GRAC) and 15 days (vs 21 days) for category 1 patients. Following assessment, 24% (vs 51%) were classified as inflammatory, 29% (vs 10%) non-inflammatory and 47% (vs 39%) required further investigation. Forty-two percent (vs 10%) were discharged after initial assessment. Cost savings and benefits were observed for the CRPC and clinical improvements reported at 3 months.

Patient surveys were collected prior to (n=101), immediately post (n=98) and three months post (n=48) clinic. Immediately post clinic, over 90% of patients were satisfied with their experience with the clinic and the service provided by the clinicians. Numbers satisfied regarding confidence to cope with their condition almost tripled from pre- to post-clinic. At 3 months, improvements persisted but levels had reduced.

Referring doctors' response rate was 42% (n=43). Over 90% were satisfied with all aspects of the clinic and all aspects of the physiotherapists involvement.

#### Conclusion:

The physiotherapist-led CRPC almost doubled capacity of the RAH rheumatology service for new patients. All patients were seen within clinically appropriate timeframes and almost half were discharged with

conservative advice only. Stakeholder satisfaction was high. An advanced scope physiotherapist can assist in early identification of inflammatory patients requiring timely medical intervention, and discharge of a large cohort of patients not requiring specialist follow up, thereby reducing wait times and inappropriate patient burden on rheumatologist clinics.

### Paliperidone 3-monthly injection – experience in a real world setting

**Alice Wisdom<sup>1</sup>**, S Cole<sup>1</sup>, A Ingole<sup>2</sup>

 $^{1}$ Northern Adelaide LHN, SA Health, , ,  $^{2}$ Central Adelaide LHN, SA Health, ,

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#### Biography:

Alice is currently a Senior Pharmacist within the Northern Adelaide Local Health Network, working in Mental Health and Research. Her areas of interest include promoting and sustaining quality use of medicines and expanding the role of pharmacists to improve patient care. Alice also has a special interest in research within the area of mental health. Alice has over 5 peer-reviewed publications and has presented her work at several national conferences. Within her research role, partnering with SA Pharmacy, Alice supports and promotes quality, innovative and collaborative research within NALHN.

Background: Paliperidone palmitate (Invega Trinza) is currently the only 3-monthly antipsychotic formulation approved for the treatment of schizophrenia. While clinical trials have demonstrated successful results, post-marketing data is limited.

Objectives: To assess rates of successful transition to the 3-monthly paliperidone injection, while exploring whether the longer dosing interval has an effect on consumer contact with mental health clinicians. Methods: Community mental health consumers initiated on the 3-monthly paliperidone injection were followed for 6 months following their first 3-monthly injection. Successful transition was defined as transition to the 3-monthly injection without one or more of the following events occurring within 6 months: hospital admission, additional or increased supplemental antipsychotic therapy, or change or cessation of the 3-monthly injection.

Findings: During the 6 months post transition 41 of 65 (63.1%) consumers successfully transitioned to the 3-monthly injection. Hospital admission was required for 8 (12.3%) consumers and 12 (18.5%) required increased or new antipsychotic supplementation. The 3-monthly injection was discontinued in 11 (16.9%) consumers including 7 (10.8%) who returned to the 1-monthly preparation. Consumers had fewer mean face-to-face contacts with clinicians compared to the 6 months prior to transition (8.2 vs 11.1, p<0.001). This was true for both medical (1.8 vs 2.3, p=0.01) and non-medical contacts (6.4 vs 8.8, p<0.01). Conclusions: Challenges may be present when transitioning to a long acting antipsychotic injection with a longer dosing interval in a real world setting. Dissemination of these findings to multi-disciplinary community teams is anticipated to increase purposeful engagement with consumers during this transition period.

### Scars of childhood stress exposures: A Systematic Review

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#### Biography:

Natasha is a PhD candidate (Clinical Psychology) in the Behavioural Genomic and Environmental Mechanisms Lab at Flinders University. Natasha completed her Bachelor of Psychology (First Class Honours) in 2016 and commenced her Clinical PhD in 2018. Her research focuses on investigating the association between social disadvantage, genomic outcomes, and child and adult behaviour. Natasha is also undertaking clinician training at Flinders University and develops her clinical skills through placements and skill-based assessments. She is currently on placement as a Provisional Psychologist at Older Persons Mental Health Service in the Eastern Community team (Central Adelaide Local Health Network) and will be undertaking her next placement at the Central Australian Aboriginal Congress in Alice Springs in the latter half of 2020.

Childhood socioeconomic position (SEP) has potential to alter epigenetic pathways associated in the development of adulthood psychiatric outcomes. We present a systematic review synthesising the literature investigating childhood SEP and DNA methylation, with a focus on pathways involved in the development of psychiatric outcomes. We reviewed literature up to October 2019 from three databases. Studies investigating childhood SEP and DNA methylation were identified, resulting in inclusion of thirty-two publications. In total seventeen studies focused on candidate genes, typically focusing on genes implicated with the stress response and/or development of psychiatric conditions. There was little overlap of genes studied, with three genes were studied more than once. These studies typically investigated different regions of the genes, which revealed inconsistent results. Six studies calculated epigenetic age, with a small number revealing a significant association with childhood SEP. Epigenome-wide studies revealed altered patterns of DNA methylation, but patterns varied between the nine studies. This research area is emerging, and no clear patterns identified across studies. It is critical to consider factors that contribute to these variances to inform research practice, and long-term uncover replicable findings. Multiple methodological shortcomings are identified, including at the phenotypic level where construct validity of childhood SEP is highly problematic, with studies using a wide range of measures. At the epigenomic and epigenetic level studies fail to consistently use suitable controls. Study designs often utilised small samples sizes, and no preregistered studies are reported. Larger cohorts will be required with international collaborations to strengthen this research area.