

Late Breaking Systematic & Meta-analytic Review Posters

Late Breaking Systematic & Meta-analytic Review Poster 2229329

A Meta-synthesis of Individual, Interpersonal, and Systemic Factors Impacting Resilience after Traumatic Brain Injury

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Objective(s): To offer the first meta-synthesis of factors influencing resilience after TBI using a Social Ecological model framework.

Data Sources: We performed key word searches in five electronic data bases (Google Scholar, PubMed, PsycINFO, and EBSCOhost) from inception- June 2021.

Study Selection: We selected studies that met the following criteria: (1) included civilian adults with history of at least 1 moderate-severe TBI; (2) included information on psychosocial stressors, coping strategies, and/or resources related to adjustment after TBI; (3) used qualitative methods; (4) not a systematic review; (5) written in English. Two reviewers separately screened article titles, abstracts, and texts to select eligible articles, and resolved disagreements through discussion with the research team.

Data Extraction: We used the 9-item quality appraisal tool developed by Hawker and colleagues to assess the methodological and reporting quality of all included studies (Hawker, Payne, Kerr, Hardey, & Powell, 2002). Two members of the team independently reviewed each full-text article and extracted findings. We then inserted extracted findings into a standardized form for all articles.

Data Synthesis: We chose to adopt meta-synthesis framework to data analysis to integrate findings across studies and produce novel interpretations of the data (Walsh & Downe, 2005). We performed a taxonomic analysis on our a-priori determined themes of interest. We extracted findings into 2 taxonomies—one for barriers of resilience and another for facilitators of resilience, consistent with empirical models of resilience following TBI. We utilized a Social Ecological Model (Fleury & Lee, 2006; Partelow, 2018) framework to organize findings within each taxonomy into individual, interpersonal, and systemic levels.

Conclusions: We synthesized findings using a Social Ecological Model framework to guide thematic analysis. Persons with TBI identified barriers and facilitators to resilience at individual (e.g., physical and cognitive challenges, coping behaviors), interpersonal, (e.g., stigma and isolation) and systemic (e.g., access to resources, rehabilitation support) levels. Considering multifaceted factors at individual, interpersonal and systemic levels in clinical, research, and policy-setting contexts is important for cultivating resilience and optimizing recovery after TBI.

Author(s) Disclosures: We have no conflicts of interest to disclose.

Key Words: Traumatic Brain Injury, Resilience, Qualitative, Meta-Synthesis

Late Breaking Systematic & Meta-analytic Review Poster 2245737

Access to Healthcare Experiences for People with Disabilities: A Mixed-Methods Systematic Review and Meta-Synthesis Protocol

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Objective(s): To characterize access to healthcare experiences reported by people with disabilities living in the United States since 2014.

Data Sources: An experienced librarian will query PubMed and CINAHL using a search protocol informed by previously published methods for “persons with disabilities (PWD)” and Levesque’s and Souliotis’s conceptual framework for “access to care.” One constraint will be used, publication date 2014-present, to capture experiences following implementation of the most recent healthcare reform.

Study Selection: Search results will be screened independently by two reviewers in two stages, first by title and abstract, then by full text. Discrepancies will be resolved by adjudication in team meetings. Articles that meet the following criteria will be included: empirical research in English, data collected in the United States and from 2014 or later, and includes self- or proxy-reported access to healthcare experiences for PWD.

Data Extraction: Data will be extracted independently by two reviewers and discrepancies adjudicated in team meetings. Data Extraction will be piloted prior to initiation. Data Extraction includes study characteristics, sample age, gender, race, insurance status, and disability type, and access to care measurement, analyses, and results for PWD. A modified Critical Appraisal Skills Programme will be used to evaluate the quality of included studies.

Data Synthesis: Data will be synthesized using a convergent, integrated approach. Quantitative data will be transformed (‘qualitized’), combined with qualitative data, and analyzed using a Best Fit Framework Synthesis. We will deductively code our data to access to care dimensions and themes identified will be mapped onto the Levesque Access to Care Framework. Data will be independently coded by two trained team members using the software Dedoose. Themes will be interrogated to explore similarities and differences across sample sub-groups (disability type, insurance status, race).

Conclusions: Results will provide an in-depth understanding of access to care experiences for PWD, and inform future research and policies to promote equitable access to care for PWD.

Author(s) Disclosures: Funded in part by the FISA Foundation and National Institutes of Health (K23HD106011).

Key Words: Systematic Review, Research Design, Health Services Accessibility, Health Care Quality, Access, and Evaluation, Disabled Persons

Late Breaking Systematic & Meta-analytic Review Poster 2184185

An Overview of Literature Related to Post COVID-19 Rehabilitation

Objective(s): To examine current literature on the role of physical therapy (PT) in management of post COVID-19 related conditions and common symptomatology in adults, as well as potential guidelines for rehabilitation in the outpatient setting.

Data Sources: PubMed, CINAHL, Medline, Cochrane.

Study Selection: Searches were conducted to examine current data related to PT interventions and their effectiveness for treating post COVID-19

conditions. Articles were evaluated for relevance based on the following criteria: articles in English, original peer reviewed articles, adult population (over 18), relevant PT interventions for rehabilitation, post-acute infection of COVID-19.

Consensus agreement confirmed approximately 25% of reviewed articles.

Data Extraction: Articles were analyzed for relevance to implications regarding post COVID-19 and potential PT rehabilitation interventions. Interventions were assessed in feasibility and applicability to an outpatient clinic setting. Independent Data Extraction followed by consensus discussion was applied. Articles were examined for content regarding the latest updates on disease criteria, manifestations, new classifications, and cohorts emerging as the pandemic progresses as well as management strategies applicable to PT practice.

Data Synthesis: After article analysis, the findings include a key theme that PT services helped improve overall functional mobility and symptom management in patients after an acute infection of COVID-19. An essential consideration is keeping the interventions specific to the patient and their goals while preventing exacerbations of symptoms that could lead to further setbacks.

Conclusions: PT has a growing role in the management of post COVID-19 deficits as well as implications related to long COVID sequelae. By choosing the appropriate parameters and having awareness of the varying symptomatology amongst patients, physical therapists can improve patients' functional mobility and post COVID-19 disease management. The focus of future studies should include more specific interventions related to managing conditions and finding the most effective treatment strategies.

Author(s) Disclosures: No conflicts to disclose.

Key Words: Post-Acute Covid, Post-Covid

Late Breaking Systematic & Meta-analytic Review Poster 2229386

Effects of Hydrokinesiotherapy and Conventional Bathing on Physiological Factors That Influence Stress on Preterm Newborns

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Objective(s): The purpose of this systematic review is to compare the effects hydrokinesiotherapy and immersion bathing on the physiological factors that influence stress on preterm newborns in the NICU. Therapeutic interventions minimize the negative effects of prematurity on physiological parameters. Preterm newborns undergo different immersion bathing techniques such as conventional bathing and swaddle bathing to stabilize vital signs. Hydrokinesiotherapy is an alternative intervention that uses submersion in water to promote positive physiological effects while also incorporating muscle strengthening and relaxation.

Data Sources: A review of literature was conducted using CINAHL Complete, Academic Search Ultimate, PubMed, PEDro, and Google Scholar. Search terms included neonatal hydrotherapy, NICU hydrotherapy, water therapy, preterm, hydrokinesiotherapy, and physical therapy. A hand search was also conducted.

Study Selection: Inclusion criteria consisted of articles published within the last 12 years, premature infants less than 34 weeks gestation, and infants with no underlying medical diagnoses.

Data Extraction: Sixteen articles met the inclusion criteria with five articles on hydrokinesiotherapy and 11 articles on conventional bathing. Each article was analyzed for quality using the hierarchy of evidence scale to assess the methodological quality. There were four level two, 11 level three, and one level four included in the study.

Data Synthesis: Hydrokinesiotherapy, swaddle bathing and tub bathing decreased RR, HR, crying, salivary cortisol levels and increased SO₂, and sleep. Hydrokinesiotherapy was superior to all types of bathing, swaddle bathing was superior to conventional bathing, and conventional bathing

was superior to sponge bathing. Hydrokinesiotherapy can be provided simultaneously while maintaining body temperature, calming atypical physiological responses to movement, and decreasing overall stress.

Conclusions: Conventional bathing, swaddle bathing, and hydrokinesiotherapy decrease RR, HR, crying, and salivary cortisol levels and improve SO₂, and sleep in preterm infants. Hydrokinesiotherapy can provide neurodevelopmental techniques such as light and slow movements aimed at tactile-kinesthetic stimulation. It facilitates the flexed posture of body organization via the effect of the thrusting motion, allows for passive mobilizations of the upper and lower limbs, global stretching, trunk rotation, and tactile, proprioceptive, and vestibular stimulation.

Author(s) Disclosures: N/A.

Key Words: Preterm Hydrotherapy Heart Rate, Neonatal Hydrotherapy, Water Therapy, NICU Hydrotherapy

Late Breaking Systematic & Meta-analytic Review Poster 2245731

Exploring Rehabilitation for Survivors of Intimate Partner Violence: A Scoping Review

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Objective(s): To understand the types and contexts of rehabilitation care currently available for survivors of IPV, opportunities identified in the literature for rehabilitation care, and IPV awareness and education of rehabilitation care providers.

Data Sources: Ten databases were comprehensively searched to identify articles related to IPV and the rehabilitation professions of interest. This search was complimented by a grey literature search of relevant IPV, gender-based violence, and rehabilitation organizations. Searches were not limited by language, year of publication, or geographic location.

Study Selection: Two reviewers independently assessed articles for inclusion based on the following criteria: (1) Describe or evaluate a rehabilitation intervention or opportunity for intervention, or an educational or awareness intervention for rehabilitation professionals; AND (2) focus on selected rehabilitation professionals (occupational therapist, physiotherapist, speech language pathologists, psychiatrists); AND (3) focus on interventions for or about adult survivors of IPV.

Data Extraction: One researcher independently extracted data which was peer reviewed by a second reviewer. Extracted information included publication details (author, year, location), study details (objective, design, setting), and information on study populations, interventions, and outcomes, when appropriate.

Data Synthesis: Included articles ranged from primary research articles to clinical newsletter articles. While all rehabilitation professionals of interest were represented in the included articles, most focused on occupational therapy (>70%). A large majority of articles (>70%) suggested opportunities for rehabilitation professionals to support survivors of IPV. Most provided an overview of IPV followed by recommendations for rehabilitation professionals in supporting survivors. The remaining examined specific interventions for IPV survivors (< 15%) or assessed for knowledge, attitudes, or beliefs about IPV (< 15%).

Conclusions: To our knowledge, this is the first scoping review addressing the rehabilitation literature for IPV survivors. Though still preliminary, these findings suggest there is an awareness of IPV among rehabilitation professionals, the importance of identifying IPV in clients, and the ways in which rehabilitation professionals are uniquely situated to support survivors of IPV. There remains opportunity to explore interventions designed specifically for IPV survivors.

Author(s) Disclosures: The authors have no conflicts to disclose.

Key Words: Intimate Partner Violence, Rehabilitation, Occupational Therapy, Physiotherapy, Speech Language Pathology

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