

² Department of Physical Therapy, Universidade Estadual do Centro-Oeste (UNICENTRO), Guarapuava, Paraná, Brazil

³ Postgraduate Program in Pharmaceutical Sciences, Universidade Estadual do Centro-Oeste (UNICENTRO), Guarapuava, Paraná, Brasil

⁴ Discipline of Physiotherapy, Graduate School of Health, University of Technology Sydney, Sydney, Australia

Background: Primary healthcare provides coordinated care to the needs of users of the Brazilian Unified Health System (SUS), within the Health Care Network (RAS), in a collaborative intervention model that involves the primary, secondary and tertiary levels of healthcare. The prognostic stratification of SUS users with chronic musculoskeletal pain can help structure the care network and establish adequate flows for user care.

Objectives: To analyze the prognostic stratification of SUS users with chronic musculoskeletal pain referred to the pain neuroscience education program (*EducaDor*), in the city of Guarapuava, Brazil

Methods: This is an exploratory cross-sectional observational study, following the recommendations of Strengthening the Reporting of Observational Studies in Epidemiology (STROBE). The sample consisted of 140 SUS users with chronic musculoskeletal pain, referred from primary healthcare in Guarapuava city to the *EducaDor* program. The prognostic stratification for chronic musculoskeletal pain was analyzed using the Keele STarT MSK Tool: 0 to 4 points for low risk, 5 to 8 points for medium risk, and 9 to 12 points for high prognostic risk. Sociodemographic data, performance and location of physiotherapeutic treatment (primary healthcare, or medium-complexity clinic) were collected.

Results: The study included 114 SUS users with chronic musculoskeletal pain, aged 55.46 ± 11.9 years, and 79% (n=90) were women. 7% (n=8) of SUS users were low risk, 43% (n=49) were medium risk, and 50% (n=57) were high risk. It was also observed that primary healthcare did not carry out physical therapy interventions for users with low risk, intervening only in users with medium and high risk (n=31; 27.2%).

Conclusion: Primary healthcare performs physical therapy interventions for SUS users with chronic musculoskeletal pain at medium and high prognostic risk. This indicates that an organizational redesign of the referral system for users with chronic musculoskeletal pain should be structured in the public health, keeping SUS users with low risk in primary healthcare. Those SUS users with medium and high risk should be referred to specialized services in the secondary level of healthcare.

Implications: It is necessary to analyze the organization of primary healthcare regarding the referral system for SUS users with chronic musculoskeletal pain. The Keele STarT MSK Tool is an instrument that can be implemented in primary healthcare to organize the Health Care Network of SUS users with chronic musculoskeletal pain and improve clinical decision-making by primary healthcare professionals.

Keywords: Primary healthcare, Chronic pain, Prognosis

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PAIN NEUROSCIENCE EDUCATION IN THE BRAZILIAN PUBLIC HEALTH SYSTEM: PRE-IMPLEMENTATION PROCESS

Marina P Baroni¹, Luiz Hespanhol¹, Sibebe AM Knaut², Cintia R B Quartiero², Ligia S Pedrosa³, Bruno T Saragiotto^{1,4}

¹ Masters and Doctoral Programs in Physical Therapy, Universidade Cidade de São Paulo (UNICID), São Paulo, São Paulo, Brazil

² Department of Physical Therapy, Universidade Estadual do Centro-Oeste (UNICENTRO), Guarapuava, Paraná, Brazil

³ Department of Pharmacy, Universidade Estadual do Centro-Oeste (UNICENTRO), Guarapuava, Paraná, Brazil

⁴ Discipline of Physiotherapy, Graduate School of Health, University of Technology Sydney, Sydney, Australia

Background: Non-pharmacological approaches, including pain neuroscience education, are recommended for the management of chronic musculoskeletal pain. Although, pain neuroscience education is commonly non-implemented in the Brazilian Public Health System (SUS). The implementation of evidence-based practices is challenging at different levels of organizational analysis, including public policies, public management, health services and primary healthcare.

Objectives: To describe the pre-implementation process of a pain neuroscience education program (*EducaDor*) in the SUS, at the organizational level of analysis of public health managers, in the city of Guarapuava, Brazil

Methods: This is an exploratory qualitative study, with the focal group. The *EducaDor* program was presented to a group of five public health managers in Guarapuava city, from Planning and Management Department, Health Information System Department, Regulation Department and Primary Healthcare Department. Then there was a discussion about possible facilitators, barriers, and solutions for the implementation of *EducaDor*, with a written document record. Afterwards, the points discussed were identified in the five domains of the Consolidated Framework for Implementation Research (CFIR).

Results: The main facilitators, barriers, and potential solutions for the implementation of *EducaDor* were: (1) Intervention characteristics – municipal public health does not offer pain neuroscience education to its users, with the interest of managers in its implementation. However, the implementation needs to be carried out in the secondary level healthcare, in partnership with the University; (2) Outer setting – the public health managers recognize the high prevalence of chronic musculoskeletal pain among SUS users, and that most of them have smartphones and internet. The public health managers suggested monitoring SUS users through WhatsApp groups, due to previous experience with the Anti-Tobacco Program, carried out by the Primary Healthcare Department; (3) Inner setting – *EducaDor* is aligned with the Clinical Protocol and Therapeutic Guidelines of the Brazilian Ministry of Health, and strengthens the Health Care Network (RAS) for users with chronic pain; (4) Characteristics of individuals – it was identified the need to strengthen the dialogue with primary healthcare professionals in the Guarapuava city for the success of scheduling SUS users to *EducaDor*; (5) Process of implementation – the case managers, through their study groups, could facilitate the dissemination of *EducaDor* at the various organizational levels of municipal public health to assist the *EducaDor* implementation process.

Conclusion: The barriers, facilitators and solutions identified in the pre-implementation phase of *EducaDor* were essential for the reorganization of the structure and operationalization of *EducaDor*. Continuous monitoring during the implementation of *EducaDor* is necessary to ensure the success of the implementation and

strengthen the collaborative intervention model involving primary healthcare professionals, secondary-level healthcare providers, and patients to enhance self-management of chronic pain in Guaraçuva SUS users.

Implications: The implementation of *EducaDor* in the SUS of Guaraçuva city may provide information to discuss about pain neuroscience education inclusion in other cities, the best strategies and mode of delivery, and will support the expansion of the implementation science in public health.

Keywords: Chronic pain, Health education, Public health

Conflict of interest: The authors declare no conflict of interest.

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EVIDENCE BASED PRACTICE'S RELEVANCE IN OBSTETRICS' TEACHING

Marina Porto Kasper¹, Patrícia da Rosa Viana¹,
Raphael Maciel da Silva Caballero¹, Gabriela Tomedi Leites¹

¹ Department of Physical Therapy, Universidade Federal de Ciências da Saúde de Porto Alegre (UFCSPA), Porto Alegre, Rio Grande do Sul, Brazil

Background: Considering the abusive and inadequate use of interventions in the present Brazilian obstetrics scenario and this field's relevance for human and social development, a technically proficient, humanized and updated health assistance is essential. Evidence Based Practice (EBP) becomes a relevant tool in Obstetrics having in mind its capability of promoting individualization and care quality improvement. EBP incorporation in graduation studies can be a determinant in care's quality, clinic results improvement, health practice safety and efficiency during professional life.

Objectives: To evaluate health graduate students' perception about Obstetrics' teaching, taking into consideration EBP presentation during classes. From that assumption, their ability to identify evidence-based interventions within the field.

Methods: Survey like research, applied remotely through Google Forms, with graduate students from a health university. The questionnaire is compound of 12 multiple choice questions aiming to draw participants' academic profile, their EBP in Obstetrics' perception and their ability to identify, within 11 interventions common to Obstetrics (offering non-pharmacological pain relief methods, food intake denial, water intake, encouraging the adoption of mobility and an upright position, adoption of a birth position of the individual woman's choice, lumbar massage, routine use of episiotomy, application of manual fundal pressure, water immersion, skin-to-skin contact with their mothers during the first hour after birth, incentive and orientation to breastfeeding in the first hour of life). From this, 3 interventions are not recommended by the World Health Organization - food intake denial, routine use of episiotomy and application of manual fundal pressure. A descriptive analysis of data was conducted.

Results: 58 students participated in the study, 86,2% were female, with 23,37 average age (19-45 minimum and maximum), from 8 courses (Biomedicine, Nursing, Pharmacy, Physiotherapy, Fonoaudiology, Medicine, Nutrition and Psychology). 37 students (63,8%) answered that during graduation classes EBP theoretical and practical concepts were presented in Obstetrics. 10 participants (17,24%)

marked at least one of the 3 options not recommended by WHO. 27 participants (46,55%) marked all correct alternatives.

Conclusion: By analyzing available data, a great percentage of graduate health students didn't have contact with EBP in Obstetrics (36,2%). 17,24% from participants wrongly identified interventions not recommended by lack of scientific evidence. Less than half (46,6%) of participants were able to correctly identify all evidence-based interventions proposed.

Implications: With the important growth of obstetrics' field for physical therapy professionals, an academic graduation targeted to offer the best quality care, having as principle EBP and humanized care should be of interest in this professional category.

Keywords: Obstetrics, Evidence Based Practice, Teaching

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DO SEX AND AGE MODERATE THE RELATIONSHIP BETWEEN BELIEFS ABOUT PAIN AND CLINICAL OUTCOMES IN INDIVIDUALS WITH CHRONIC SHOULDER PAIN?

Mario L R Sacomano¹, Lucas A Almeida¹, Cerqueira A¹,
Melina N Haik¹

¹ Department of Physical Therapy, Federal University of São Carlos (UFSCar). São Carlos, São Paulo, Brazil

Background: Shoulder pain is one of the most prevalent musculoskeletal conditions in the general population. Beliefs about pain seem to significantly influence the variability of symptoms in this population, however, it is not yet clear how personal, gender, and age variables can influence this relationship between beliefs and pain.

Objectives: Verify whether the personal aspects of gender and age moderate the relationship between pain beliefs and clinical outcomes in individuals with chronic shoulder pain.

Methods: Sixty-seven individuals aged between 18 and 80 years who complained of shoulder pain were evaluated. Age was divided into 3 groups: young adults (18-29 years old), middle-aged adults (30-49 years old), and adults (50-80 years old), and gender was divided into male and female. Pain beliefs, such as pain catastrophizing, kinesophobia, fear-avoidance beliefs, and self-efficacy, were assessed using the Brazilian version of the Pain Catastrophizing Scale, Tampa Kinesophobia Scale, Fear-Avoidance Beliefs Questionnaire and Chronic Pain Self-Efficacy Scale experiments, respectively. Clinical symptoms included frequent pain intensity, measured by the Numerical Pain Scale, and upper limb disability, assessed by the Brazilian version of the Disabilities of the Arm, Shoulder and Hand Questionnaire. Moderation analyzes verify the impact of gender and age moderation on the relationship between pain beliefs and clinical outcomes. The significance criterion used was $p < 0.05$.

Results: Gender does not significantly moderate the relationship between pain beliefs and clinical outcomes ($p > 0.05$), so that men and women had the same pain and disability outcomes in view of variations in pain beliefs. Age moderates the relationship between kinesophobia and clinical outcomes, so that the positive correlation between pain intensity and kinesophobia is stronger in middle-aged adults ($p = 0.04$) and the positive correlation between disability and