evidence. Findings from this review can raise awareness among clinicians and promote significant savings if they follow clinical guidelines.

Objectives: To investigate the effectiveness of implementation strategies to reduce the proportion of low-value care and increase the proportion of high-value care in the management of low back pain.

Methods: This review was registered to the to the Open Science Framework (OSF) (https://osf.io/7jfpr/). Searches were performed in the following electronic databases: MEDLINE, Embase, CINAHL and Cochrane Library. Two independent reviewers performed study selection, data extraction and risk of bias assessment. Clinical trials investigating the effect of evidence-in-practice implementation strategies on reducing low-value care and promoting low-value care were included. Studies including adults with non-specific LBP were considered eligible. The primary outcome of this systematic review was outcomes related to the practices of health professionals. However, the primary outcomes were determined considering two recent clinical care standards. Meta-analyses were calculated using random effect models, the risk of bias by the Cochrane Risk of Bias Tool and the overall quality of evidence was assessed using the Grading of Recommendations, Assessment, Development and Evaluations (GRADE).

Results: Thirty-two articles were included. Interventions focusing on implementing clinical guidelines were not effective in referral to specialists (5 studies, n=6223; RR=0.88; 95% CI: 0.62, 1.25), referral to physical therapists (3 studies, n=7937; RR=1.42 ; 95% CI: 0.74, 2.72) or for prescribing non-opioid drugs (6 studies, n=7297; RR = 0.75, 95% CI: 0.52, 1.10) when compared to the control group. However, the implementation of clinical guidelines was effective in reducing the number of imaging requests (12 studies, n= 44,689; RR = 0.83, 95% CI: 0.70, 0.99), opioid prescription (5 studies, n=6681; RR = 0.60, 95% CI: 0.44, 0.80), and promote active approaches (exercise, counseling, etc.) (6 studies, n=2553; RR = 1.36, 95% CI: 1.04, 1.76). Confidence of all meta-analyses was low, as most studies were assessed at high risk of bias because they were not randomized clinical trials and because of serious inconsistency ($I^2 > 50\%$).

Conclusion: Although clinical guidelines are important to improve the quality of care for people with LBP, it is not always effective in clinical practice. The quality of evidence found was low. Better quality studies are still needed to confirm these findings.

Implications: Clinical guidelines are important tools that are effective in reducing imaging, prescribing opioids and promoting active approaches and were ineffective for referrals and prescribing non-opioids.

Keywords: Low back Pain, Practice Guideline, Lumbago, Systematic Review

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COMPARISON BETWEEN PHYSICAL PERFORMANCE TESTS IN CROSSFIT PRACTITIONERS WITH AND WITHOUT SUBACROMIAL PAIN SYNDROME: A CROSS-SECTIONAL STUDY

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Background: Subacromial Pain Syndrome (SPS) is a prevalent musculoskeletal shoulder disorder. Shoulder pain in overhead athletes is often associated with sport-specific demands and changes in strength, flexibility, and posture at the shoulder and along the upper limb. Crossfit is a popular sport with a high prevalence of musculoskeletal disorders, including in the shoulder. Therefore, identifying performance and physical impairments in the shoulder of Crossfit practitioners with SPS may contribute to a better understanding of the high prevalence of this disorder.

Objectives: This study aimed to compare the shoulder's physical performance and clinical measures between Crossfit practitioners with and without SPS.

Methods: An observational cross-sectional study was conducted in CrossFit boxes in Rio de Janeiro, Brazil. Twenty participants with SPS and 23 participants without SPS were included. Participants performed upper limb physical performance tests (Closed Kinetic Chain Upper Extremity Stability Test, Seated Medicine Ball Throw Test, Upper Quarter Y-Balance Test). Range of motion and isometric muscle strength were also investigated.

Self-reported pain, disability. Possible differences between groups were investigated using the independent sample t-test (two tailed).

Results: There was no statistically significant difference between groups for upper limb physical performance tests, shoulder range of motion and isometric strength. The result of the SPADI in the SDSA group was 30.7% (23.62) for pain, 16.46% (19.24) for disability, and a total score of 21.92% (20.22).

Conclusion: Crossfit practitioners with and without SPS presented similar upper limb physical performance.

Implications: Subacromial pain syndrome may not influence performance on physical tests, strength level, and upper quadrant range of motion in CrossFit practitioners. Including crossfit-specific movements in the physical assessment can complement the physical evaluation.

Keywords: Shoulder, Pain, Athletes

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EVIDENCE-BASED PRACTICE OF PHYSICAL THERAPISTS WHO WORK IN DEAF SPORTS - PILOT STUDY

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Background: Deaf sport involves the practice of sports performed by deaf athletes, contributing to the development of self-esteem, quality of life and greater social participation of members of the deaf community. Thus, physical therapy performance plays a fundamental role in maintaining and improving the functional capacity of this population. Evidence-Based Practice (EBP) is a process that integrates the best scientific evidence, the physical therapist's clinical experience and the patient's preferences, aiming to offer an adequate and efficient service and treatment, guaranteeing quality of care. Thus, EBP should be used by professionals in clinical

practice with the deaf athlete population. However, no studies are found in the literature that highlight its use by professionals working with this population.

Objectives: Evaluate the knowledge and use of EBP by physical therapists who work in deaf sports

Methods: This is a pilot study, conducted in parallel with a quantitative exploratory cross-sectional study. Brazilian physical therapists participated, female and male, who had been working for at least 3 months in deaf sports and who were associated with state deaf sports federations or the Brazilian Confederation of Deaf Sports (CBDS). A semi-structured questionnaire was used, prepared by the research team, with questions about personal and demographic data, professional training, and the use of EBP. Nominal and/or ordinal variables were described in absolute and relative frequency.

Results: Five physical therapists (30.4±3.36 years) participated, mostly male (60%, n=3). 80% of the participants (n=4) had already heard about EBP, with 60% (n=3) indicating that they use EBP partially in their appointments, and 20% (n=1) said that EBP is a determining factor in choosing the best conduct. As resources used for clinical decision-making, 100% (n=5) use clinical experience, 80% (n=4) use clinical practice guidelines and 60% (n=3) use scientific articles, demonstrating a non-homogeneous use of the pillars that support EBP. Regarding the updating of clinical knowledge, 80% (n=4) took courses and participated in scientific events/conferences, 60% (n=3) use scientific articles, 40% (n=2) reported participating in study groups and only 20% (n=1) reported using books, suggesting that knowledge updating may have often been based on sources with high risks of bias.

Conclusion: Physical therapists who work in deaf sports are aware of EBP, use resources related to it, but still encounter difficulties and limitations for its applicability in clinical practice. Future studies, with more professionals, are necessary for a national overview of the knowledge of EBP by physical therapists who work in deaf sports.

Implications: There are still no studies in the literature evaluating the influence of EBP on the performance of the physical therapist in Brazilian deaf sports, despite knowing that this can promote adequate, efficient, and higher quality physical therapy treatment. From the data found, professional education policies to promote greater knowledge and use of EBP by these professionals are necessary for a more qualified service to the deaf athlete population.

Keywords: Physical Therapy, persons with Hearing Impairments, Sports for Persons with Disabilities

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COMBINATION OF CLINICAL AND GAIT MEASURES TO CLASSIFY FALLERS AND NON-FALLERS IN PARKINSON'S DISEASE

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Background: The multifactorial nature of falls in Parkinson's disease (PD) is well described. Clinical aspects (e.g., fear of falling and disease severity) and gait deficits (e.g., difficulties with dual task walking and freezing of gait episodes) are among identified risk factors of falling. However, optimal assessment for the identification of fallers remains unclear.

Objectives: To identify clinical and objective gait measures that best discriminate fallers from non-fallers in PD, with suggestions of optimal cutoff scores.

Methods: Cross-sectional study composed by 127 individuals with mild to moderate PD classified as fallers (≥ 2 falls) or non-fallers based on previous 12 months falls. Clinical measures (demographic, motor, cognitive and patient-reported outcomes) were assessed with standard scales/tests. For measuring gait parameters, participants were asked to walk, at a self-selected pace, back and forth on a straight 9-m walkway for 2 minutes in single and dual-task (i.e., forward digit span) conditions, while instrumented with eight, synchronized inertial sensors at the sternum, lumbar spine, bilaterally on the wrists, shins, and feet. We extracted 24 clinical measurements and 39 objective variables from those instruments. Receiver operating characteristic (ROC) curve analysis identified measures (separately and in combination) that best discriminate fallers from non-fallers; we calculated the area under the curve (AUC) and identified optimal cutoff scores (i.e., point closest-to-(0,1) corner).

Results: Thirty-one participants (24.4%) were classified as fallers and 96 (75.6%) as non-fallers. Fallers had more severe motor symptoms and more advanced disease stage than non-fallers. Single gait and clinical measures that best classified fallers were foot strike angle (AUC=0.728; cutoff=14.07°) and the Falls Efficacy Scale International (FES-I; AUC=0.716, cutoff=25.5), respectively. Combinations of clinical+gait measures had higher AUCs than combinations of clinical-only or gait-only measures. The best performing combination included FES-I score, New Freezing of Gait Questionnaire score, foot strike angle and trunk transverse range of motion (AUC=0.85).

Conclusion: The combinations of clinical and gait measures have higher discriminative ability in classifying fallers from non-fallers among people with PD than combinations of clinical-only and gait-only measures.

Implications: The falls consequences represent great independence and autonomy loss for patients and high costs to health-care services. In this context, it is necessary to devote attention to falls management in PD, including the identification of PD-specific markers for risk of falling. Therefore, the use of wearable inertial sensors is useful and can enhance the traditional fall risk assessment in PD.

Keywords: Parkinson, Gait, Falls

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INCREASING OLDER ADULTS' VITALITY THROUGH A PRIMARY CARE INTERVENTION

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