The Efficacy of an Eight-Week Exercise and Self-Management Education Program for People with Parkinson's Disease

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Introduction: Parkinson's disease (PD) is a chronic progressive condition which requires long-term management. Exercise is one non-medical therapy which has resulted in numerous physical, psychological, and social benefits in people with PD. In addition to the recommendation of exercise for PD, Europe has also implemented a national self-management education program called the Patient Education Parkinson's Program (PEPP). To our knowledge, no study has yet to combine these two management methods into one program for people with PD. Methods: Five participants with PD completed the intervention. Weeks 1–4 included 2 × 1 hr weekly exercise sessions with an exercise physiologist (EP). Weeks 5–8 included 1 × 1 hr exercise session with an EP and 1 × 1 hr supervised independent exercise session weekly. Participants attended weekly group PEPP sessions. Assessments included Movement Disorder Society Unified PD Rating Scale (MDS-UPDRS), Stanford Self-Efficacy for Managing Chronic Disease Scale, physical activity level, sit-to-stand test, grip strength, Berg Balance Scale, 2-Minute Walk Test (2MWT), and 10-m gait parameters of walking. Upon completion of the program, a focus group explored the self-perceived effects, strengths, and weaknesses of the program. Results: All participants improved motor aspects and motor examination scores (MDS-UPDRS), activity level, and 2MWT, while four participants improved their balance score. Strengths of the program included: perceived improvements in symptoms, exercising with an EP, socialising, shared identity, and cost-effectiveness. Perceived weaknesses were increases in pain, stiffness, and fatigue, independent exercise sessions, and travel. Conclusion: Exercise and self-management education is beneficial for improving physical and psychosocial wellness in people with PD.

The Impact of Exercise Training on Promoting Safety and Healthy Ageing

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Introduction: Unintentional injuries are a major health problem for older people. While injury in the elderly is related to a combination of factors including those resulting from the aging process, the home environment and product design are important, and often modifiable, contributors. Also, preventive health screenings, lifestyle changes, and environmental modifications are methods that are effective. Appropriate physical activity constitutes one of the major components of a healthy lifestyle. The purpose of this randomized controlled trial (RCT) study was to investigate the impact of a three-month physical activity program on different aspects of health-related quality of life and establish the role of consumer products in injuries to older persons. Also, the biological, behavioral, environmental, and socio-economic factors are reviewed. **Methods:** Among 60 subjects between the ages of 55–65, participants were randomized to either the control group (n = 30, mass = 71 ± 2/2) or physical activity group (n = 30, mass = 70 ± 2/6). All in the latter group were given a training session and received daily exercise. The subjects did the exercises while supervised three times per week during three months. The control group did not receive any activity. All subjects were given an SF-36 scale to fulfill pretest and posttest. **Results:** At the end of the program, in a between-group comparison, the results of independent sample *t*-test analysis showed significant changes in physical functioning, general health, physical component summary, and total scores of the SF-36 scale (P < 0.001). Physical functioning—Control: P = .75 (nonsignificant); Experimental: P < .01 (significant). Role limitation, physical—Control: P = .22 (nonsignificant); Experimental: P = .9 (significant). Social functioning—Control: P = .21 (nonsignificant); Experimental: P = .21 (nonsignificant); Experimental:

Who Trains the Oldest Old? Prevalence and Correlates of Australian Fitness Trainers Who Train Adults 75 Years and Older

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Introduction: The Australian Public Health Physical Activity Guidelines recommend that older adults aged ≥ 65 years should engage in regular aerobic, strength, balance, and flexibility training (Australian Government Department of Health, 2014). However, it is estimated that only ~6% of Australians aged ≥ 65 years meet the aerobic and strength training guidelines (Bennie et al., 2015). Due to their skills in exercise prescription, fitness trainers (e.g., gym/group instructors) may have a role in promoting exercise among older adults. However, little is known about the prevalence and characteristics of Australian fitness trainers who train older adults. *Methods:* In 2014, a convenience sample of 9,100 registered Australian fitness trainers were invited to complete an online survey. Participants reported how frequently they trained clients (4-point scale: 1 = 'never' to 4 = 'most of the time') from five different age groups (range: 1 = 'children ≤ 12 years' to 5 = 'adults ≥ 75 years'). The proportions reporting training adults age ≥ 75 years 'never' and 'most of the time' were calculated. Associations with selected sociodemographic (e.g., age, sex) and fitness industry-related (e.g., setting, employment status, fitness industry qualification) variables and frequency of training adults aged 75+ years ('never' vs. 'most of the time') were examined using multiple logistic regression analyses. **Results:** Out of 1,206 fitness trainers who completed the survey (response rate = 13.7%, mean age = 37.4 ± 10.8 years), 75.2% (95% CI: 69.1–80.2) reported 'never' training adults aged ≥ 75 years, and 6.9% (95% CI: 5.5–8.4) reported training adults this age 'most of the time'. In the adjusted analysis, trainers who were females (OR 5.9, 95% CI: 2.4–14.1), ≥ 61 years (OR 5.4, 95% CI: 2.6–11.6), aged 51–60 years (OR 2.4, 95% CI: 1.4-3.9), and with more than 10 years' experience within the fitness industry (OR 1.3, 95% CI: 1.7-3.6) were more likely to train clients aged ≥ 75 years 'most of the time'. *Conclusion:* Among a large sample of registered Australian Fitness trainers, over three-quarters reported 'never' training older adults aged ≥ 75 years. Given that older adults are among the most inactive population groups, policy-driven efforts should be made to support exercise adherence among this age group. Future efforts should also ensure that trainers are provided with adequate professional training to prescribe exercise to older adults. References: Australian Government Department of Health. (2014). Australia's physical activity and sedentary

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