INFLUENCE OF PHYSICAL ACTIVITY ON COGNITIVE DYSFUNCTION IN PATIENTS WITH MILD AND MODERATE ALZHEIMER DEMENTIA

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Introduction: Part of the patients with mild and moderate AD are not physically active. The authors developed for polish patients a program of 17 safe and easy physical exercises.

Aims: Assessment of the influence of physical training on the dynamics of cognitive and memory dysfunction in patients with AD as well as the timing of progression of mild into moderate AD dependent on gender, age and training intensity.

Methods: Study group consisted of patients over 65 years of age whose daily physical activity was less than one hour. Physical training assisted by the caregiver was performed at least 3 times a week and noted in the logbook. There were 4 study groups (n=60 in each): performing the program: I-mild AD, II-moderate AD, not performing the program: III-mild AD, IV-moderate AD. MMSE, Clock Test and DemTect were performed after 6, 12, 18 and 24 months.

Results: Mild AD patients performing the program (group I) as compared with the control group (III) had significantly delayed dysfunction in all tests. Comparable results were obtained from the comparison of groups II and IV with moderate severity of AD. Progression of mild AD into moderate AD was significantly delayed in the group performing the training program as compared to the control group.

Conclusion: Patients who perform regular physical activity have markedly delayed cognitive and memory dysfunction and the strongest relationship exists for the frequency of performing the program. There is no relationship for gender, age and education level.