EXERCISE CAPACITY AND FUNCTION IMPACT AFTER A HOME-BASED LIFESTYLE INTEGRATED FUNCTIONAL EXERCISE FOR PEOPLE WITH DEMENTIA

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1. Objectives

Autonomy in activities of daily living in people with dementia is highly dependent of individual's exercise capacity and function. This study explored the impact of the Lifestyle Integrated Functional Exercise for People with Dementia programme (LiFE4D) on exercise capacity and function.

2. Methods

An exploratory study was conducted with 5 participants with dementia living at home (4 (80%) female, 83 [71-93] years old, Addenbrooke's Cognitive Examination-III 22 [4-79] points). Participants received an individualised home-based physical activity programme with a decreased face-to-face contact with the health professional, which was progressively replaced by the caregivers' involvement. Exercise capacity (2 Minute Step Test–2-min step test) and function (Functional Reach Test-FRT) were assessed at baseline, during (1-2 months) and after (3 months) the programme. Friedman test with post hoc test were performed (p≤0.05).

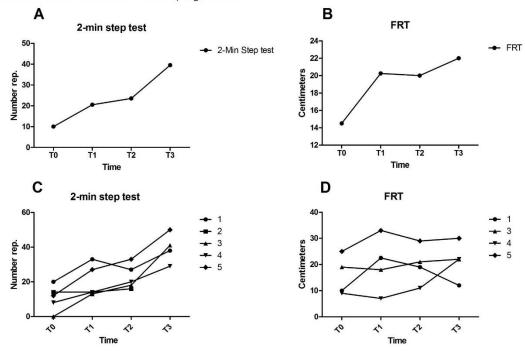
3. Results

Although results did not reach statistical significance, a trend of improvement was observed in the 2-min step test and FRT measures. Most participants seemed to continue to improve their exercise capacity when face-to-face contact with health professionals decreased however, a larger individual variation was observed in the function (Figure 1).

4. Conclusion

LiFE4D seems a promising intervention to improve exercise capacity and function in people with dementia living at home. A larger study with a robust methodology is now warranted to further clarify these results.

Figure 1 - Overall (A-B) and per participant (C-D) results of exercise capacity and function at baseline and at 1 month, 2 months and 3 months after LiFE4D programme.



Legend: 2-min step test, 2 Minutes Step Test; FRT, Functional Reach Test; T0, baseline; T1, 1 month; T2, 2 months; T3, 3 months.