

Efamol



Background and Objective:

A complex relationship exists between mobility and cognition with studies demonstrating how in older people a decline in gait performance often precedes or coexists with a decline in cognition. Consequently this study aimed to determine whether a DHA rich multi-nutrient supplement Active Memory can help reduce frailty in women over the age of 60 through beneficially altering measures of mobility and cognition.

Study Design:

In this double blind, randomised trial 27 women over the age of 60 received either 2 Active Memory capsules or placebo daily for 24 weeks.

This study was the first ever to use the 9 camera Vicon motion capture system (famously used to animate Gollum in Lord of the Rings) to objectively measure changes in mobility whereas the CANTAB computer based cognitive tests were used to measure changes in cognition.

Results:

For the primary outcome measures there were a number of statistically significant results demonstrating a benefit of the intervention over the placebo. Firstly using the Vicon motion capture system mobility was shown to improve through increases in walking speed, with the intervention group demonstrating significantly increased habitual walking speed (0.07 meters per second) over the placebo. This is clinically significant as

maintaining walking speed in old age is a risk factor for cognitive impairment, falls and mortality.

For cognition a significant benefit was demonstrated in both the psychomotor response latency test (MOT) as well as an increase in words immediately remembered in the VRM test with a mean adjusted difference over placebo of 1.3 words out of a maximum of 12.

The author concluded that the combination of nutrients used in this study was a contributing factor to the success of the trial due to the synergistic effect they have. This is even more pronounced when considering that a number of trials using single nutrient interventions conducted in this area have failed to demonstrate a benefit.

Conclusion:

In healthy older women 2 capsules per day of Active memory were found to improve both mobility and cognitive function after 24 weeks of supplementation.

Follow up:

Due to the success of this preliminary study Efamol in conjunction with primary researcher Simon Dyall at Bournemouth University have decided to conduct a follow up study to help further elucidate the benefits of Active Memory in frailty, however this time the study will also investigate whether there is a synergistic benefit of supplementation alongside increasing physical activity levels (anabolic stimulus).

EFFECTS OF TREATMENT ON COGNITION AND MOBILITY

VARIABLE	BASELINE MEAN (SD)	SIX MONTHS MEAN (SD) COGNITION	ADJUSTED MEAN (SD)	P VALUE
COGNITION				
MOT Latency (ms)				
Placebo	1171 (276)	1162 (180)	1170 (162)	0.038
Intervention	1171 (275)	1058 (190)	1052 (162)	
VRM immediate free recall (words)				
Placebo	9.2 (1.7)	8.0 (2.2)	7.7 (1.7)	0.029
Intervention	8.7 (2.3)	8.8 (2.1)	9.0 (1.7)	
MOBILITY				
HW Speed (m/s)				
Placebo	1.35 (0.20)	1.32 (0.15)	1.29 (0.08)	0.031
Intervention	1.30 (0.24)	1.33 (0.25)	1.36 (0.10)	