Chiropractic Update

Update 50

Regular Moderate Physical Activity Sustains The Aging Mind And Body

Three new studies (1-3) all suggest keeping active as we age makes an important contribution to sustaining our well-being.

The authors of the first study (1) set out to investigate the single and combined effect of Mediterranean diet, being physically active, moderate alcohol use, and nonsmoking on all-cause and cause-specific mortality in European elderly individuals.

This cohort study, conducted between 1988 and 2000, included 1507 apparently healthy men and 832 women, aged 70 to 90 years from 11 European countries.

The main outcome measures were ten-year mortality from all causes, coronary heart disease, cardiovascular diseases, and cancer.

The authors report that at follow-up, after 10 years, 935 participants had died: 371 from cardiovascular diseases, 233 from cancer, 145 from other causes; and for 186, the cause of death was unknown.

Adhering to a Mediterranean diet, moderate alcohol use, physical activity and nonsmoking were associated with a lower risk of all-cause mortality. Similar results were observed for mortality from coronary heart disease, cardiovascular diseases, and cancer. In total, lack of adherence to this low-risk pattern was associated with a population attributable risk of 60% of all deaths, 64% of deaths from coronary heart disease, 61% from cardiovascular diseases, and 60% from cancer.

In summary the authors found that the more healthful dietary and lifestyle factors a participant had, the lower the risk for death. This supports the hypothesis that participants who follow a Mediterranean type of diet and maintain a healthful lifestyle are less likely to die even at ages 70 to 90 years. The authors concede that the number of years an individual needs to maintain such a lifestyle to realize a benefit is unknown. However, a Mediterranean diet, rich in plant foods in combination with nonsmoking, moderate alcohol consumption, and at least 30 minutes of physical activity per day is associated with a significantly lower mortality rate, even in old age.

The authors of the second study (2), also a prospective cohort study, set out to examine the association between walking and future risk of dementia in older men.

The authors assessed the distanced walked per day from 1991 to 1993 in 2257 physically capable men aged 71 to 93 years. Follow-up for incident dementia was based on neurological assessment at 2 repeat examinations (1994-1996 and 1997-1999).

During the course of follow-up, 158 cases of dementia were identified After adjusting for age, men who walked the least (<0.25 mile/day) experienced a 1.8-fold excess risk of dementia compared with those who walked more than 2 mile/day.

These associations persisted after accounting for other factors, including the possibility that limited amounts of walking could be the result of a decline in physical function due to preclinical dementia.

The authors concluded,

“Findings suggest that walking is associated with a reduced risk of dementia. Promoting active lifestyles in physically capable men could help late-life cognitive function.”

EDITOR: ADRIAN B. WENBAN, B.SC., B.APP.SC., M.MED.SC.

The final study (3) aimed to examine the relation of long-term regular physical activity, including walking, to cognitive function amongst older women.

This study including 18,766 US women aged 70 to 81 years.

Women reported participation in leisure-time physical activities on biennial mailed questionnaires beginning in 1986. The authors assessed long-term activity by averaging energy expenditures from questionnaires in 1986 through participants' baseline cognitive assessments (1995 to 2001). Linear regression was then used to estimate adjusted mean differences in baseline cognitive performance and cognitive decline over 2 years, across levels of physical activity and walking.

The authors report that higher levels of activity were associated with better cognitive performance.

Compared with women who had the lowest physical activity levels, the authors found a 20% lower risk of cognitive impairment for women in the highest physical activity levels. Among women performing the equivalent of walking at an easy pace for at least 1.5 hours/week, mean global scores (of cognitive function) were statistically significantly higher compared with walking less than 40 minutes/week.

The authors concluded,

"Long-term regular physical activity, including walking, is associated with significantly better cognitive function and less cognitive decline in older women."

References:

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