

T'ai Chi Can Reduce Falls In Older People, Says New Research

Taken from 'The Journal of Advanced Nursing' - June 2005

A group of fall-prone adults - average age 78 - took part in a 12-week T'ai Chi course and the results were compared with a control group. The exercise group found that their balance and physical strength improved, reducing the risk of falls.

Older people who took part in a structured programme of T'ai Chi found that their balance and physical strength improved, reducing the risk of falls, according to a paper in the latest Journal of Advanced Nursing.

Researchers studied a group of fall-prone adults, with an average age of 78, living in residential care. 29 undertook a 12-week T'ai Chi course three times a week and 30 formed the non-exercise control group.

They found that the physical fitness of the exercise group showed significant improvement, with stronger knee and ankle muscles, improved mobility and flexibility and better balance.

For example, after the exercise programme had finished, the time taken by the exercise group to walk six metres (almost 20 feet) had fallen by 25 per cent, while the control group took 14 per cent longer.

"As people get older they are more likely to experience falls and this can lead to some very serious health issues" says co-author Professor Rhayun Song from the Chung Nam National University in South Korea.

"Figures published in the United States estimate that 30 per cent of people over 65 living in the community fall each year and this rises to up to 50 per cent for people in long-term care facilities, such as residential homes. One in ten falls results in a fracture.

"Regular exercise is very important as we get older because when we get to 65 we start losing muscle strength at a rate of up to two per cent per year."

T'ai Chi, an ancient Chinese martial art consisting of a series of slow, gentle, continuous movements, is particularly suitable for older people as it helps them to develop stronger muscles and better balance and concentration.

The exercise programme used in the research consisted of 10 minutes of warming up exercises, 20 minutes of Sun-style T'ai Chi movement and five minutes of cooling down exercises. Traditional instrumental music was used to help the group maintain slow and continuous movements and provide a soothing effect.

Both groups underwent a series of tests before the 12-week exercise programme and once it had been completed. This measured their muscle strength, balance and confidence in avoiding falls.

Participants were also asked to report any falls they experienced during the test period. 31 per cent of the exercise group said they had had a fall, compared with 50 per cent of the control group.

In the year before the research started, 66 per cent of the exercise group had reported a fall, together with 57 per cent of the control group.

"Our study shows that low-intensity exercise such as T'ai Chi has great potential for health promotion as it can help older people to avoid falls by developing their balance, muscle strength and confidence" says Professor Song.

"We believe that regular exercise should be a fundamental part of caring for older people living in the community and in residential care."