Objective
To determine the efficacy of daily consumption of a low-fat dairy product supplemented with Mobilee® [80 mg/day] compared with a non-supplemented low-fat dairy product consumed during 3 months on healthy volunteers with knee discomfort.

Methods
Pooled analysis of the individualized results from 148 volunteers included in two randomized, controlled, double-blind, parallel trials performed on healthy patients with mild knee pain [VAS between 30 and 50 mm] developed in medical centers of Barcelona and Reus [Spain] by implementing the same protocol.

The primary outcome was the muscle function determined by peak torque, total work, and mean power using an isokinetic dynamometer Biodex 4. Secondary parameters were the ultrasonographic evolution of the affected joint using an osteoarthritis risk parameter scale and the level of joint discomfort using VAS scale.

Results
Subjects taking the yoghurt supplemented with Mobilee® showed greater improvements in the majority of the isokinetic parameters, with the difference between groups being statistically significant for the total work of the affected joint measured in flexion at 180º/s (p=0.0391).

The ultrasonographic evaluation showed a significantly greater reduction in the synovial fluid in the volunteers supplemented with Mobilee® in comparison to the non-supplemented group (p=0.0293).

The pain perceived by the volunteers that consumed the supplemented yoghurt decreased throughout the trial, reaching significantly lower values compared to the control group at the end of the study (p=0.0036).

Conclusions
Long-term consumption of low-fat dairy products supplemented with Mobilee® improves muscle function, synovial effusion and reduces pain, providing clinical benefit for healthy people with mild knee pain. These results support the use of Mobilee® to reduce the risk and progression of osteoarthritis.

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