Abstract

The thesis deals with the evaluation of the influence of foam rolling on selected parameters of somatosensory perception (pressure-algic threshold, vibrotactile sensation). The theoretical part discusses fascial tissue, summarizes the current knowledge of foam rolling and focuses on the mechanisms of pain and vibrotactile sensation. The research part consists of a randomized blind study on a group of 15 healthy probands (11 women, 4 men), which evaluates the effect of foam rolling. The effect is objectivized by pressure algometry and vibrametry on the m. rectus femoris and m. biceps femoris of both lower limbs (measured before and after therapy). The value of the pressure pain threshold (PPT) increased after foam rolling. Vibrotactile threshold (VT) was lower after foam rolling than before its use, which means that vibrotactile sensitivity was increased. The results show that these changes do not occur only in the interventioned m. rectus femoris, but some changes in parameters can be found in other muscles as well.

Keywords

fascial tissues, foam rolling, pressure algometry, pressure pain treshold, PPT, vibrametry, somatosensory system, nociception, diffuse noxious inhibitory control, DNIC