

Effects of ageing and exercise habits on facial skin blood flow

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The purpose of this study was to investigate the effects of aging and exercise habits on facial skin blood flow (FBF). We hypothesized that FBF declines with aging, and that exercise habits would inhibit the decline. FBF was assessed in 180 healthy subjects (male 109, female 71, 38 ± 17 yrs, 168 ± 9 cm, 62.9 ± 13.7 kg) in sitting position using the laser speckle flowgraphy. Blood flow in forehead significantly but slightly increased with ageing, showing regional differences that relative blood flow in cheek to forehead decreased with ageing. The blood flow in the forehead and cheeks was greater in those who had an exercise habit. No clear effects of type of exercise or location of exercise were observed. These results suggest that blood flow in the facial skin may change with aging, showing regional differences and that exercise habits could inhibit the change with ageing. To clarify the effects of aging and exercise habits on blood flow in facial skin, it is necessary to increase the sample size and conduct a longitudinal study.