



Cryotherapy-Induced Persistent Vasoconstriction after Cutaneous Cooling: Hysteresis Between Skin Temperature and Blood Perfusion.

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Abstract: The goal of this study was to investigate the persistence of cold-induced vasoconstriction following cessation of active skin-surface cooling. This study demonstrates a hysteresis effect that develops between skin temperature and blood perfusion during the cooling and subsequent rewarming period. An Arctic Ice cryotherapy unit was applied to the knee region of 6 healthy subjects for 60 minutes of active cooling followed by 120 min of passive rewarming. Multiple laser Doppler flowmetry perfusion probes were used to measure skin blood flow (expressed as cutaneous vascular conductance, CVC). Skin surface cooling produced a significant reduction in CVC (P

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