

Category

ME Medicine

Session Number

ME-2

Session Title

Human science from the extreme poles

Session Description

Antarctica and the Arctic are natural laboratories to investigate psycho-physiological adaptation to the extremes. This session will cover all applied research supporting health and well-being from deployed personnel or indigenous population living at high latitudes and the recently rising specific effects of chronic hypobaric hypoxia experienced by personnel deployed on high altitude stations. It will also cover research results about how to recruit, select, train and support the staff above the polar circles, either from individual or group psychological perspectives, or from organizational and management perspectives. An aim of the session is to present current projects' results as examples of how Antarctic and Arctic research is delivering important knowledge for the benefit of human space flight and exploration class missions to outer space, as well as to link the "poles" of field research and fundamental research in this environment to the benefit of overwintering and space crews.

Keywords: Antarctic bases personnel, high altitude medicine, extreme medicine, long-duration spaceflight, telehealth, medical evacuation, psychology, physiology, adaptation, metabolism, immunity, stress

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