

The Dangers of Cold Stress

Now that winter is upon us, it is time to think about the potentially very serious effects of overexposure to cold weather, called cold stress. When your body is unable to warm itself, cold stress may occur. While we normally associate conditions such as hypothermia or frostbite with freezing conditions, in mildly cool weather wind chill can make your skin receive the equivalent of freezing air temperatures. No one likes to feel cold; but it is important to distinguish discomfort from potentially life-threatening cold stress.

The three most common cold stress induced conditions are frostbite, trench foot and hypothermia. Frostbite occurs when the skin freezes and loses water; it typically affects the ears, face, fingers and toes. If you suspect frostbite, do not rub the area to warm it. It is safe to place the affected area in warm water only if there isn't a chance it could become cool again. Warming and re-cooling will cause severe tissue damage. Contact emergency services as soon as possible.

Trench foot is caused by having your feet immersed in cold or freezing water for extended periods of time. The symptoms include burning, itching or tingling sensations, as well as the presence of blisters. If you suspect trench foot, soak your feet in warm water and wrap in dry cloth bandages.

Hypothermia is the most serious of cold stress conditions. Hypothermia occurs when the core body temperature lowers beyond normal. Initially, the person may stomp his feet and shiver, however as hypothermia progresses it results in slurred speech, loss of coordination and confused or disoriented behavior. Treatment of hypothermia depends on its severity. For milder cases, move to a warm area, remove all wet clothing and cover with warm blankets and dry clothing. Drink a warm sugary drink, being careful to avoid caffeine and alcohol. For more severe cases contact emergency services immediately, as hospital treatment will certainly be required.

There are several preventative measures you can take to minimize your risk of cold stress conditions. The most important step is to plan ahead for cold weather. Wear several layers of protective clothing, avoiding cotton as it loses its insulation if it becomes wet. Wear a hat and protective clothing, and be sure to bring along an extra change of clothing in the event that your clothing becomes wet. Avoid alcohol, certain medications (sedatives, tranquilizers, etc) and smoking if you will be exposed to prolonged cold weather as they may prevent your body from generating heat normally. While we can't change the weather, we can take steps to prevent the potentially devastating effects of cold stress.

The above information is not a substitute for professional medical advice and is for general informational purposes only. Consult a physician in all matters relating to your health, particularly in matters that may require diagnosis or medical attention. Any action taken as a result of the information provided above is taken at your own discretion.

