TEN ESSENTIAL SYSTEMS TO REMEMBER

WHEN PACKING FOR A HIKE

1. Navigation

Added to the obligatory map of the area and the map compass must be the ability to use them. This requires training, study and practice. Navigating with a map alone is also a necessary skill. Attach a whistle to your compass lanyard. Almost everyone will add an accurate GPS receiver but you must not be entirely dependant on this alone. Learn to use map, compass and GPS together.

2. Sun Protection

Sun glasses and a sunscreen are an obvious addition to a pack. Sun protection should come from at least SPF 35 sun screen lotion, dark glasses approved for altitude and reflective snow fields, and long sleeves, gloves and hat rated for strong sun. Have a sun skirt on the hat or wear a bandana under the hat and over your neck and ears.

3. Insulation (extra clothing)

This is the most essential system. The weather can change in a very short time, leaving people shivering in shorts and vulnerable to rain, sweat and wind-induced hypothermia. Hiking fast may keep your body heat up, until you "run out of gas" (glycogen), or have to hike slow with others, go slow to find your way or have to stop and tend an injured companion or stranger.

Cotton clothing, soaked in sweat, rain or melted snow, can hold so much water that it loses 70% of its insulating value and has resulted in the deaths of many people. Layers of polypropylene, pile and Gortex are the equivalent to the wool underwear, pants, shirts, sweaters and coated nylon jackets of the 70's and before. Polypro, pile, softshells and Gortex had not been invented when Everest was first summited. However, early hikers used layers to 1) wick body moisture, 2) adjust insulation and 3) cut off wind and rain. Remember, layers must be "peeled" to avoid sweat-soaked clothes! All of this essential seasonal personal clothing and equipment must be accommodated in a sturdy day / summit pack large enough to hold it. Garments or equipment tied to the outside are likely to catch on something or get wet or lost.

4. Illumination

A small flashlight can assist in finding a lost or injured person or help your hiking group get back after dark. Headlamps now weigh very little. Carry spare batteries and bulb if the torch allows for these.

5. First-Aid Supplies

A first aid kit sized to the trip is a must. First aid supplies can fit in a Ziploc bag and should deal with cuts and scrapes with small and large plasters. Add mosquito repellent for the woods. Have OTC drugs and a personal prescription pain medication for that broken ankle. Weight can be very little. Only carry what you know how to use. Don't forget the toilet paper!

6. Fire

Waterproof matches and a fire starter can be combined in an adjustable propane pocket lighter. Remember, when you most need a fire, it will be windy, wet and cold. Do not depend on being able to start a fire. Learn how to stay warm without a fire. Don't try to be a "survivalist". Preferably have two separate sources of fire in case one does not work. In winter in dry areas keep one in your pocket to start back-burns in an emergency.

7. Repair Kit and Tools

A small knife should be light and sharp - a tool kit knife is heavy and of little use. Carry the smallest Swiss Army or multi-tool knife, 2 metres of duct tape and some dental floss.

8. Nutrition and Hydration

Extra food should be carbohydrates in the form of easily digested quick-acting energy bars. Glycogen (sugar or starch) is the one essential fuel that must be replaced during a hard hike or climb or an unexpected cold, wet night. Most people have ample stores of the other essential muscle fuel: fat. A small packet of rice and a packet of soup cooked and mixed together are great on a freezing ledge when you are past your due back time.

Add extra water or the equipment to obtain it (stove for snow or a filter for summer) to your list. In the summer you may need to drink 5 litres or more per day. In the winter you may be able to get by with 2 litres if you are careful not to sweat. Use electrolyte replacement powder such as Game, Cytomax or Rehidrat.

9. Shelter

Carry your normal shelter if planning overnight trips or emergency shelter that can range from an emergency bivvy bag to a four season Gore-Tex bivvy bag, pad and sleeping bag. You cannot shelter on snow without an insulating pad carried strapped to the outside of your pack. An aluminium rescue blanket, plastic survival bag and a 40 cm square of high density foam (cut up an old mat) should be the minimum to carry on *all* trips.

10. Communication

Carry your cell phone, or a personal satellite communicator. Several cell phones in a group are far better than one because of flat batteries and varying service provider signal strengths. Also carry a pad and waterproof pen or pencil to send written messages. You cannot go amiss with a metal signalling mirror and a hand-held distress flare. All the above weighs in at about 1 kg – not too much when your life is at risk!

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