



## ***Clothing & Equipment***

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***Revised September 2023***

***Young people should only be walking in Wild Country if they are adequately clothed, have the appropriate equipment and know how to use it both in the prevalent and often changing conditions.***

### **INTRODUCTION**

Dartmoor can, and sometimes does provide 'four seasons in one day'; you must be ready for all eventualities during the training phase and the Ten Tors Event. Snow and floods have both caused early termination of the Ten Tors Challenge; and on occasions, heat exhaustion has led to high fallout rates.

Understanding how kit can protect from the extremes of weather makes a critical difference to effectiveness. If the walkers know what their kit can do for them, understand how and when it should be deployed, it can make the difference between success and failure.

Annex B to the Rules states the **minimum** clothing and equipment to be carried during the Ten Tors and Jubilee Challenges by individuals and teams and directs that other items might be required depending on the conditions. This *Guidance* is designed to help Team Managers in equipping participants for the Event and may also be of help for the training period when terrain and duration of walks will be additional factors for consideration.

### **INITIAL PREPARATION**

Prior to Ten Tors training, Team Managers should:

- Ensure the Team kit is of an appropriate type and quality required for both the training and the Challenges.
- 'Unpack' *Annex B to the Ten Tors Rules* as more detailed guidance may help walkers/ parents to acquire appropriate kit. Discuss the rationale for the kit requirements with your walkers so that they're able to understand the comfort and performance benefits.
- Inform walkers and their parents of the list of shops on the Ten Tors website offering discounts.
- Ensure that your walkers (rather than their parents and/or staff) have the knowledge and skills to maintain their own and their team kit in good condition. For instance detergents destroy waterproofness; use Nikwax or similar.
- Educate walkers of the need to match clothing to the weather forecast and prevailing conditions. Too many do not adjust to changing weather during the event.
- For those who are returning to the Challenges, check that previous year's kit still fits and is in good enough condition to last through training to the

Challenge and ensure that any items which aren't are replaced.

## SCRUTINEERING

During the training, you are responsible for the health and safety of your walkers and staff. Consequently, you are advised to scrutinize clothing and equipment prior to each walk.

It is your responsibility to ensure that participants in the Event are suitably clothed and equipped. To save embarrassment, delay and the potential for disqualification, you should thoroughly check kit before the Event.

Checks on some participants will be carried out during and after the Challenges but not before. Scrutineers are likely to be reassured if they see kit – both personal and team - that is well maintained and well organised.

## CLOTHING

Outdoor clothing is intended to keep the body at a constant, comfortable and safe temperature in all weather conditions. As no single item of clothing can cope with all types of weather and temperature, several layers, each fulfilling different functions, work better. Three layers - base, mid, and outer (or shell) – are the norm.

**Base Layer.** Moisture evaporating from the surface of the skin causes rapid cooling, leaving you feeling clammy and uncomfortable, especially if wearing cotton next to the skin. Unlike cotton, synthetic moisture management garments continue to offer warmth even when wet. Base layer garments have to transport moisture away from the skin, be fast drying, made of wicking fabric with flat seams in areas that rub and be comfortable to wear.

**Mid-Layer** garments provide thermal insulation by trapping warm air around the body and allow moisture to pass quickly from base layer to outer layer. Non-absorbent 'open weave' fabric should be avoided as they allow the wind to penetrate the fabric, replacing warm air with cold.

**Thermal Layer** A good insulating layer (thick fleece or equivalent) will provide

warmth when static, particularly at camp when the overnight temperature falls.

**Trousers or leggings** should be robust, relatively wind proof and quick drying. Thin nylon tracksuit trousers or tights are not suitable as they provide insufficient protection. Shorts are not recommended for walking because of the prevalence of ticks and Lyme Disease, potential sunburn and scratches.

**Headgear and Gloves/Mittens.** Cold weather hats should cover the ears. Fingerless gloves are not acceptable; synthetic, rather than woollen gloves, with a water and/or windproof layer provide better protection. It is worth carrying easily accessible spares as a dry hat and gloves are a real morale booster at the end of a tough day's walking whilst you're setting up camp.

**Waterproof Outer (or Shell) Layer.** In even a moderate wind, mid-layer garments start to lose their insulation properties in the absence of a windproof outer layer. This protects the underlying layers and the body from the effects of wind, rain and snow, allowing the base and mid-layers to work more efficiently.

The outer/shell layer should be both breathable and waterproof – potentially needing to provide protection for two days' wind-driven rain. Robust, remaining durable and effective during training and the Challenge, in spite of being subject to wear and tear, abrasion, and tested by strong winds and rain. Ultra-lightweight jackets offering little or no warmth are not suitable.

The jacket should have:

- A securely attached wired/stiffened hood.
- Water resistant zips and/or double storm flaps.
- A dry waterproof map-sized secure pocket.
- Hood, waist and lower hem adjustments to enhance protection, and

- Be a little too large – not only can the walker ‘grow into it’ but the extra size allows room for layers and longer sleeves offer added hand protection.

The over-trousers should be:

- Robust and not ripped in anyway.
- Such that the walker can fit/remove them over their boots without assistance, implying knee length, or longer, zips, which must be undamaged.
- Fit well enough so that they don’t impede the walker.

**Boots** should be well fitting and have adequate ankle support and a Vibram-type sole.

- Leather or quality waterproof fabric boots are recommended for the Challenges.
- Boots that are tight at the start of training are likely to be uncomfortable by the Challenge; better to move up a size at the start of training and temporarily wear an extra pair of thin socks or double footbeds, enabling the boots to be broken in well before the Event.
- Light-weight boots, which are essentially trainers with a raised ankle cuff, are neither robust nor durable enough for the Challenges.

## EQUIPMENT

**Rucksacks** need to fit the user and for the Ten Tors Challenge will normally be between 50 and 65 litres in capacity to carry the walker’s personal kit, their share of the team kit and potentially some of another team member’s kit. The bulkiest item, the packed size of the sleeping bag, has a critical impact on the size of the rucksack. ‘Fitting the user’ needs to take account of gender, back length, and ensuring that both the hip belt and shoulder straps can be fitted correctly to ensure comfortable weight transfer. Time spent making sure that rucksacks are correctly adjusted is vital.

Avoid carrying items on the outside of the rucksack; where it is unavoidable, ensure

that such items are packed in robust waterproof bags, (not bin liners), and attached securely so that nothing can be lost, damaged or other walkers injured. Encourage walkers to have a system for packing so that items can be found quickly – making life easier in poor weather conditions. Packing equipment in waterproof bags will keep clothing dry. Loads should not exceed the lesser of 1/3 of the walker’s bodyweight or 12kgs without water and food (13.6kgs (30lbs) inclusive of both).

**Stoves and fuel** – which is most suitable for your team/s? Trangia meths or re-sealable butane/propane gas canister stoves are usually the least problematic. Gas stoves with a separate canister linked to the burner via hose are far more stable – and much safer - than ‘all-in-one’ stoves unless the latter have a wide stabiliser fitted under the canister. Whilst many stoves have built-in ignition devices, these can fail; matches, together with a suitable ‘striker’ or lighter need to be packed in a waterproof container. Gel fuel" is now being sold as an alternative to gas or liquid fuel. Team Managers need to carefully consider that Gel is a combustible compound and with heavy treatment its pouch container is at risk of being punctured - resulting in leaking fuel. Use of a robust outer container is recommended.

All team members need to be properly trained in safe use and associated refuelling to reduce the risks of scalds, burns or explosion. Minimise the risk of tent fires by teaching that cooking is carried out in the open, using windshields when necessary.

Trangia brand meths bottles are safer and avoid leakage within rucksacks or tents. If using butane/propane gas canisters, always pack a spare full canister per team.

**Water Bottles** should be of robust construction with a secure stopper. Thin plastic bottles are vulnerable to breakage, resulting in disastrous consequences in a rucksack. Teach participants the issue of making up potable water and ensure that they have a system to achieve this.

**Tents** need to be robust enough to cope with Dartmoor's weather. 'Summer' tents with fibreglass poles are often relatively heavy and are not designed to stand up to Dartmoor storms; tents need to be 'fit for purpose' if walkers are to be offered a challenging yet safe experience. A tent pole repair kit, spare cord and pegs are essential.

**Sleeping Bags.** Key for the Team Manager's consideration are: what is the predicted ambient temperature for the training, will the bag offer the user good thermal protection? The sleeping bag thermal requirement is set in the Rules – ensure you follow it. While down filled sleeping bags are light, they are not as effective when wet as synthetic material. Consider the trade-off between the 2 properties and the need for sleeping bags to be kept in dry bags.

#### **AFTERTHOUGHTS**

The following are worth considering as "good to have" items:

**Survival Bag.** A survival bag should be made of heavy gauge plastic to avoid the risk of suffocating the casualty - thin, flexible plastic can be drawn against the face impeding breathing. Bags must be long enough and undamaged – problems usually result from years of being kept folded and unused in the bottom of a rucksack.

**Bothy Bag.** A Bothy bag is a useful group shelter offering rapidly deployable temporary respite in demanding conditions, which keeps the whole team together, whether in need of shelter to minimise the onset of hypothermia or a break for lunch and maintain collective morale, whilst allowing time to regroup.

**A waterproof map case** is essential if an unwaterproofed map is to survive for long,

but don't 'wear' the map case with a cord/ligature around the neck. Both the 1:50,000 and 1:25,000 Dartmoor Training Area map will be issued; teams should be familiar with navigating using both. Waterproof maps of the area in which you're training are likely to be easier to manage than attempting to refold paper maps back into map cases in wet and windy weather.

#### **Waterproof container for route card**

This key document needs to be looked after; too often it gets wet and then becomes unusable.

**Mug, knife, fork and spoon** – a mug is useful but use of a 'spork' or just a spoon, will save a little weight.

**Hygiene.** Wet wipes and anti-bacteria 'dry' hand wash can improve personal hygiene and minimise the risk of food contamination. Alcohol gel is not effective on dirty hands and should not be relied upon for hand washing. Where walkers have no soap/water available, they should use wet wipes (soap/water based and not alcohol based).

**Spectacles/Contact Lenses** - consider carrying a second pair of spectacles or sufficient contact lenses.

**Rubbish bag** – whilst the Organisers issue a rubbish bag to each team for the Event, during training, walkers should carry their own personal rubbish bag so that they can remove all litter and debris for disposal at home.

**Flip Flops** - Flip flops or sandals for when you have taken your boots off for the night stop.

**Gaiters** Wearing of these is highly recommended to reduce the likelihood of water ingress into boots.